

**THE INFLUENCE OF THE BUSINESS ENVIRONMENT ON BOTSWANA'S
PUBLIC PROCUREMENT PROCESS AND ITS IMPACT ON MILITARY
CAPABILITY**

by

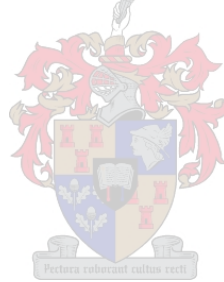
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DECLARATION

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ABSTRACT

While limited literature on public procurement exists, not much research has been conducted on how the influence of the business environment on public procurement has impacted on military capability in Botswana. The limited literature has only concentrated on reforms, without much emphasis on evaluating the impact on military capability. In attempting to close this gap, this thesis thoroughly explains the concept of public procurement based on the existing literature. Of importance are the legislative and policy frameworks in Botswana in which public procurement is conducted, as well as their implications for defence procurement. In formulating the possible best practice for defence procurement in Botswana, international perspectives were evaluated, which culminated in a regional perspective of conducting defence procurement.

This study sought to address the question: “What needs to be done to ensure a prompt and efficient defence force, while being dependent on public procurement that exists in a complex business environment characterised by a bureaucratic system?” In answering this question, this study contributes to addressing the existing deficiency in the literature, as well as contributing a solution to an existing practical problem.

This was a qualitative study in approach, case study by design, and an exploratory study by purpose. The study used interviews with a non-statistical expert purposive sampling technique, as well as document analysis. A deductive approach to data analysis and interpretation was adopted through the application of the systems theory and systems thinking approach as major theories. These were augmented with the organisational buying behaviour and dialectical theories. As the analysis was deductive in approach, the elements of systemic structures as derived from the iceberg model were applied for coding.

The study concluded that Botswana’s defence procurement requires total structural reforms, which include proper placement of the procurement function, engagement of civil professionals, the development of a security and defence policy, as well as developing a procurement model that will be in line with striking a balance between defence spending and national development goals in line with the current Fourth Industrial Revolution debate.

Keywords: Public procurement; business environment; legislative and policy frameworks; bureaucracy; defence capability; Botswana Defence Force.

OPSOMMING

Hoewel daar beperkte literatuur oor openbare bevoorrading bestaan, is daar nog nie veel navorsing gedoen rakende hoe die invloed van die besigheidsomgewing op openbare bevoorrading die verdedigingsvermoë in Botswana beïnvloed nie. Die beperkte literatuur het slegs gefokus op hervorming, met min klem op die evaluering van die invloed op verdedigingsvermoë. In 'n poging om hierdie gaping te vul, verduidelik hierdie tesis omvattend die konsep van openbare bevoorrading gebaseer op die bestaande literatuur. Die wetgewende en beleidsraamwerke in Botswana waarin openbare bevoorrading onderneem word is belangrik, asook hul implikasies vir verdedigingsbevoorrading. Ten einde die beste moontlike praktyke vir verdedigingsbevoorrading in Botswana te formuleer, is internasionale perspektiewe getakseer, wat gelei het na 'n streekspektief tot die onderneming van verdedigingsbevoorrading.

Hierdie studie het gepoog om die vraag "Wat moet gedoen word om 'n vaardige en doeltreffende verdedigingsmag te verseker terwyl dit afhanklik is van openbare bevoorrading wat bestaan in 'n ingewikkelde besigheidsomgewing wat gekenmerk word deur 'n burokratiese stelsel?" te beantwoord. Deur hierdie vraag te beantwoord, dra hierdie studie daartoe by om die bestaande gebrek in die literatuur aan te spreek, en dra ook by tot 'n oplossing vir 'n bestaande praktiese probleem.

Hierdie studie het 'n kwalitatiewe navorsingsbenadering en 'n gevallestudie-ontwerp gevolg, en was 'n verkennende studie. Hierdie studie het gebruik gemaak van onderhoude met 'n nie-statistiese kundige doelgerigte steekproeftegniek, asook dokumentontleding. 'n Deduktiewe benadering tot data-ontleding en interpretering is onderneem deur middel van die toepassing van die stelselsteorie en stelselndenkebenadering as die hoofteorieë. Hulle is uitgebrei met die organisatoriese koopgedrag- en dialektiese teorieë. Aangesien die ontleding deduktief van aard was, is die elemente van sistemiese strukture soos ontleen van die ysbergmodel toegepas vir kodering.

Die studie het bevind dat Botswana se verdedigingsbevoorrading totale strukturele hervorming benodig, wat insluit die behoorlike plasing van die bevoorradingsfunksie, die betrokkenheid van siviele beroepsmense, die ontwikkeling van 'n sekuriteits- en verdedigingsbeleid, asook die ontwikkeling van 'n bevoorradingsmodel wat in lyn is met die verkryging van balans tussen verdedigingsbesteding en nasionale

ontwikkelingsdoelwitte wat belyn is met die huidige debat rakende die Vierde Industriële Revolusie.

Sleutelwoorde: Openbare bevoorrading; besigheidsomgewing; wetgewende en beleidsraamwerke; burokrasie; verdedigingsvermoë; Botswana-weermag.

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LIST OF ABBREVIATIONS

Arm Scor	Armament Corporation of South Africa Ltd
BDF	Botswana Defence Force
BURS	Botswana Unified Revenue Services
CEE	Citizen Economic Empowerment
CSDP	Common Security and Defence Policy
DAC	Defence Acquisition Council
DAF	Doorne's Aanhangwagen Fabriek
DATC	District Administrative Tender Committee
DE&S	Defence Equipment and Support
DGA	Direction General de'l Armament
DLC	Defence Logistics Command
DMO	Defence Materiel Organisation
DND	Department of National Defence
DOD	Department of Defence
EU	European Union
FMV	Defence Materiel Administration [Försvarets Materielverk]
GDP	Gross domestic product
GOCO	Government-owned, contractor-operated
HDI	Human Development Index
IT	Information technology
J4	Logistics Function
MDJS	Ministry of Defence, Justice and Security
MFED	Ministry of Finance and Economic Development
MTC	Ministerial Tender Committee
NATO	North Atlantic Treaty Organization
NDF	Namibian Defence Force

NDP	National Development Plan
P	Pula [Botswana currency]
PESTEL	Political, Economic, Social, Technological, Environmental, and Legal
PPADA	Public Procurement and Asset Disposal Act
PPADB	Public Procurement and Asset Disposal Board
PPoI	Public Procurement of Innovation
PS	Permanent Secretary
PTP	Public Technology Procurement
PWGSC	Public Works and Government Services Canada
R&D	Research and development
RDB	Restricted domestic bidding
RIB	Restricted international bidding
RUAG	Rustungs Unternehmen Aktiengesellschaft
SADC	Southern African Development Community
SANDF	South African National Defence Force
SAPS	South African Police Service
SCM	Supply chain management
SPADC	Special Procurement and Asset Disposal Committee
SPTC	Special Procurement Tender Committee
ST	Systems theory
UBM	Ultimate Building Machine
UK	United Kingdom
US	United States
USA	United States of America
WMF	Windhoek Machine Fabric
ZPPA	Zambia Public Procurement Authority

CHAPTER 1: INTRODUCTION AND BACKGROUND

1.1 INTRODUCTION

This study seeks to explore how the procurement process interacts with the business environment and what its ultimate impact is on military capability in Botswana. In so doing this study sought to address the question: “What needs to be done to ensure a prompt and efficient defence force, while being dependent on public procurement that exists in a complex business environment characterised by a bureaucratic system?”

This study presents the findings of a research study that was qualitative in nature. It provides the respondents’ views on how conducting defence procurement in Botswana’s mainstream procurement has impacted on Botswana’s defence capability. Not only did the respondents prove this, but documents that were analysed also confirmed it. In answering the research question, this study contributes to the body of knowledge within the discipline of public management, as well as contributing a solution to an existing practical problem.

This chapter outlines the background of the study, as well as the research focus, research statement, research purpose, objectives, and the research questions. The chapter briefly explains the research methods, data analysis, merit of the research, and proposed contribution to science. The chapter culminates in outlining the chapters of this study.

1.2 BACKGROUND OF THE STUDY

While public procurement is alleged as a major function of government, more attention is paid to procurement improvements or reforms, which renders public procurement a neglected area of academic education and research (Thai, 2001). Public procurement is the use of public funds for the acquisition of goods and services. It is the responsibility of the government to ensure that development takes place and that the general administration of the country is in place. According to Lynch and Angel (2013), there are three classifications of government spending, namely recurrent expenditure, capital expenditure, and transfer payments. Recurrent expenditure is the final consumption expenditure on goods and services for current use to directly satisfy the

individual or collective needs of the members of the community. Capital expenditure is government spending on goods and services intended to create future benefits, such as infrastructure investment in transport (roads, rail, and airports), health (water collection and distribution, and sewerage systems), communication (telephone, radio, and television), and research spending (defence, space, and genetics). Transfer payment spending does not involve transactions of goods and services, but instead represent transfers of money, such as social security payments, pensions, and unemployment benefits. The country of Botswana has adopted the same budgeting categories.

According to Witting (2003), most countries now understand that public procurement is done under the pretext of development and modernisation, which are continuous processes that must be achieved with effort that touches upon all seven stages that have been documented as “typical” for the development of public procurement systems. These stages are “obtaining the goods and services required; establishing rules and regulations that define compliance and seek to deter fraud and corruption; improving efficiency; increasing accountability; achieving ‘value for money’, which moves beyond the lowest price; supporting other government policy objectives; and finally delivery of government policy objectives” (Harland, Telgen, Knight, Callender & Thai, 2007).

Public procurement has several challenges, which include both logistical and business environment challenges. Among the challenges faced by procuring entities is the business environment in which goods must be acquired and delivered for further distribution. In Botswana, public procurement follows set rules and procedures and does not exempt any of the government departments from the rules and procedures. Among the government departments that acquire goods and services through the same process is the military. The military is expected to have the capability to be able to carry out its mandate as may be required from time to time. Potgieter and Theletsane (2012) indicated that the military must always be flexible to deploy in various types of security problems and must be able to deploy in a variety of different roles. In addition, a change in a role will affect the defensive posture of the defence force, which includes men and women, weapons, and equipment. The implication is the need for flexible and fluid defence procurement that will meet robust environmental

changes through the acquisition of equipment that will meet the requirements of a new role.

The Botswana Defence Force (BDF) has a mandate to defend Botswana's territorial integrity, sovereignty, and national interest. Its vision is to be a professional, prompt, and decisive force. Henk (2005) stated that the military struggled against poaching in Botswana, which is a low-intensity conflict that poses significant intelligence, mobility, and communication challenges. Successful execution of the BDF mandate requires effective military planning and good leadership, as well as significant technical and tactical competence (Henk, 2005). The BDF as a government department conducts its procurement with public funds. During the early days of its evolution, the BDF was more independent and could choose where to acquire its goods and services from. It could use direct appointment or single sourcing, selective tendering, or very limited tenders on public tendering, even on common goods such as food and goods for domestic use, as well as common services.

A significant turn of events affected the procurement system of Botswana in general. Among some of the factors that influenced defence procurement were the change in the security environment in the region, which got more relaxed, and the type of threat that shifted from warfare to poaching, drug smuggling, and human trafficking, among others; the introduction of government strategies such as the Economic Diversification Drive, which promoted the procurement of locally manufactured goods and services; as well as the formalisation of the procurement legislative and policy framework.

Among major reforms was the establishment of the Public Procurement and Asset Disposal Board (PPADB), which was established through the Public Procurement and Asset Disposal Act (PPADA), Cap 42:08 of 2001, operating under the Ministry of Finance. It was established with the core mandate of conducting adjudication and awarding tenders for central government departments and ministries. Its other responsibilities include contractor registration and discipline, issuing of standard bidding documents, vetting of tender documents prior to issue, capacity building, compliance monitoring, and providing overall advice on public procurement and asset disposal in order to improve efficiency.

The PPADA stipulates the establishment, constitution, and membership of the PPADB. It further stipulates the meetings and proceedings of the board, as well as the

powers and functions of the board. Part IV of the PPADA stipulates the levels of procurement of Botswana, which are apart from the micro-purchasing of a threshold of P50 000 in 2018: Ministerial Tender Committees (MTCs), District Administrative Tender Committees (DATCs), and Special Procurement Tender Committees (SPTCs) (Republic of Botswana, 2001). Section 65 of PPADA indicates the financial ceilings for these levels of procurement.

Defence procurement is not immune to these procedures, and Regulation 19(1) of the PPADA Regulations states that “[p]rocurring entities of the Defence Force, Police Service and other security organs of the State may conduct their procurement through an open or restricted list basis”. Subsection (3) further explains that “[u]nless otherwise provided under the Act or these Regulations, the Defence Force, Police Service and other security organs of the State shall comply with the provisions of these Regulations” (Republic of Botswana, 2001).

Defence procurement of supplies, works, and services is conducted as per the regulations and authorised as per the prescribed thresholds. Only defence specialised equipment or weapons are adjudicated by the SPTC, regardless of their value. These are predominantly done through selective tendering or direct appointment. It must also be noted that most of the goods or weapon systems used by the military are produced outside the country, which exposes the process to international trade laws, engagement of sales agents and clearing agents, import taxes, and transportation of such goods. The whole process of procurement is only complete once goods are delivered to the procuring entity for further distribution.

Military equipment in nature is expensive and complex, which makes it very difficult for developing countries such as Botswana to manufacture them in the domestic market. This means such equipment must be sourced from international markets. To ensure that such equipment is in a serviceable state, the department is forced to outsource such services from the international community as well. Despite the vision of the BDF of being a professional, prompt, and decisive force, its procurement function is exposed to a complex and challenging business environment, which results in late deliveries and failure to supply, which sometimes results in contract failure. Around 2006, the BDF identified the need to replace its ageing fleet of operational vehicles. Trials were conducted, which were meant to standardise the operational

vehicles, which were concluded and an initial order was placed. Despite this exhaustive exercise of trials, it later appeared that the BDF's fleet was not improving to meet the operational needs of the units, while at the same time there were provisions for this in the National Development Plans (NDPs). This study therefore seeks to assess the effects of the business environment on Botswana's public procurement process with a view to determine its impact on the capability of the BDF and to suggest a solution to these challenges.

1.3 PROBLEM STATEMENT

Not much has been written about Botswana's public procurement and its interaction with the business environment, particularly the consequential impact of such an interaction on military capability. Botswana's public procurement encountered some transformations around 2002 after the establishment of the PPADB, which was intended to regulate public procurement to comply with the world best principles of public procurement. This did not exclude the BDF as it is one of the government departments. Despite having made a provision for an SPTC for sensitive equipment, the procurement of equipment is not conducted along those lines. The BDF around 2006 saw a need to review and replace its ageing vehicle fleet, which had reached the end of its lifecycle, as well as to standardise the vehicles for basic military operations.

After the completion of the exercise, one would have expected to see a tremendous improvement in Botswana's military capability in terms of mobilising the force timeously and efficiently. However, this is not the case. The BDF fleet continued to deteriorate, which impacts on military capability. This study reflects on the period from 2008 to 2018 to explore how Botswana's business environment influenced public procurement and its ultimate impact on military capability. In identifying and understanding the problem, it will be necessary to establish if the conduct of military procurement under mainstream public procurement is not a contributing factor and, if so, what is the best model for the conduct of military procurement with the view to timeously and efficiently equip the BDF in order to achieve its vision of a professional, prompt and decisive force. This assessment is intended to contribute towards the realignment of procurement processes and effective military capability while enhancing the operational readiness of the BDF.

1.4 RESEARCH PURPOSE

This dissertation is a qualitative study on the influence of the business environment on Botswana's public procurement process. The aim of the study is to explore how the procurement process interacts with the business environment and what its ultimate impact is on military capability, with the view to recommend the best model to conduct defence procurement in Botswana.

1.5 RESEARCH OBJECTIVES

In order to address the research statement, the following objectives must be met:

- To explore the current influence of stakeholders on the business environment;
- To establish the rules of engagement between stakeholders and the defence procurement process;
- To evaluate if the business environment has an influence on the public procurement process;
- To assess if the public procurement process has an impact on military capability; and
- To determine the best practice, if any, in the domain of public procurement in the SADC region that can be adopted by the BDF.

1.6 RESEARCH QUESTIONS

In contributing towards addressing the research statement, the study aims to answer the following primary research question:

- What needs to be done to ensure a prompt and effective defence force, while it is dependent on a public procurement process that exists in a complex business environment characterised by a bureaucratic system?

In addition, the study aims to answer the following secondary research questions:

- What is the influence of stakeholders on the business environment?
- What are the rules of engagement between stakeholders and the procurement process?

- Does the business environment have an influence on the defence procurement process?
- What is the impact of the procurement process on military capability?
- What are best practices in the domain of defence procurement in the region?

1.7 SIGNIFICANCE AND MOTIVATION OF THE STUDY

This research is intended to contribute towards best practices of conducting military procurement within Botswana's public procurement, without compromising military capability. It will also assist in determining how different stakeholders contribute to the success or failure of acquiring goods and services at the right time, in the right quantity, and of the right quality. It intends to contribute to solving a long-standing problem in the public procurement process in the military. Not much has been written on this topic. Botlhale (2016) investigated public procurement bodies at national and local levels and concluded that there are different challenges such as the capacity of subnational bodies, information management, delays in vetting tenders, and the perception of corruption by the public and media. Botlhale (2017) also investigated public procurement challenges in Botswana, as well as how public procurement can be improved in Botswana. However, the interaction of public procurement and the business environment and the impact on military capability have not been explored. Botlhale (2016; 2017) did not raise the issue of how defence capability could be affected by the interaction of the public procurement process and the business environment.

Sianang (2014) highlighted factors that would defy the BDF in attaining its envisaged vision of a prompt and decisive defence force. These include deficient policies and strategic defence management frameworks, as well as defence procurement that lacks the requisite focus. Sianang's (2014) work, however, lacked empirical evidence and a theoretical framework. Mompati (2005) made the same discovery but his emphasis was on turnaround time in defence procurement, which is only a challenge in procurement. His study was more focused on internal structures in the BDF and hence utilised more of a reductionism approach than a synthesis approach. This study was therefore undertaken to close this literature gap, as well as to contribute a possible solution to a long-standing practical defence problem.

1.8 DEFINITION OF KEY TERMS

The following key terms are very important for this study as all discussions revolve around them. These definitions are used throughout this study. Relevant scholarly contributions in the discussion of public procurement and the business environment and defence capability were reviewed to provide these definitions.

Procurement is the acquisition of systems, goods, or services at the best possible total cost of ownership, in the right quantity, at the right time, in the right place, for the direct benefit or use of governments, corporations, or individuals generally via, but not limited to, a contract (Stradford, 2017).

Public procurement is the contractual acquisition of goods and services with appropriated funds by the government through purchase or lease, whether the supplies or services are already in existence or must be created, developed, demonstrated, and evaluated (Andrecka, 2015).

Business environment: The business environment consists of external forces, factors, and institutions that are beyond the control of the firm and they affect the functioning of a business enterprise. These include customers, competitors, suppliers, the government, and social, political, legal, and technological factors (Paulson, 2012).

Bureaucracy: Informal, multiple layers of decision making develop the influence that causes a contract to be awarded on the basis of subjective or unannounced criteria to an apparently specially favoured contractor (Witting, 2003).

Legislative and policy framework refers to the policies, laws, guidelines, and/or regulations that govern procurement in an organisation (Russell, 2016).

Military/defence capability is defined as the ability to achieve a specified wartime objective (win a battle, destroy a target, etc.) in a given time and space. It includes four major components, namely force structure, modernisation, readiness, and sustainability. Force structure defines the number, size, and composition of the units that comprise the defence force; modernisation defines the technical sophistication of the forces, units, weapon systems, and equipment; and unit readiness defines the ability to provide capabilities required by the combatant commanders to execute their assigned missions, while sustainability is the ability to use available resources without

the possibility of future depletion (Carafano, 2014). The literature consulted indicates that 'military procurement' and 'defence procurement' refer to the same concept except that 'military procurement' has been applied while discussing larger military forces like in Caldwell and Mickey (2014) while 'defence procurement' has been used while discussing smaller military forces like in Markowski and Hall (1998). The terms therefore have been adopted to refer to the same concept and have been used interchangeably in this study.

1.9 SCOPE OF THE STUDY

It is important that a study be conducted within some parameters to avoid ambiguities. Because the military is a single department in Botswana served by the BDF, the research is more focused on it. This research focused on the procurement process over a 10-year period from 2008 to 2018. This study is a single embedded case study by design; it is therefore limited to discussing the BDF within the broader public procurement spectrum of Botswana.

1.10 STUDY ASSUMPTIONS

Study assumptions are defined as those aspects that are out of the researcher's control and of which their violation can lead to invalid results (Simon, 2011). The following assumptions were key to this study:

- All targeted participants would be identified and accessed. It was important to access all participants because they form a very small sample and therefore, should the study have missed some, it would impact on the quality of the study. The identified participants were, however, traced and interviewed.
- It was also assumed that the participants would answer the interview questions honestly. This was ensured when the participants were assured of the confidentiality of the information they divulged, that participation was voluntary, and that the participants could withdraw at any time if they felt uncomfortable being interviewed. It was also important that the participants signed the confidentiality form before they were interviewed.
- The interviews were conducted with participants who could communicate in both English and Setswana and, as such, the respondents used both languages

during the interviews. It is thus assumed that since a transcriber was engaged, the transcriptions captured the exact views of the respondents. The transcriber was also conversant in the two languages; translation was therefore not a challenge. The researcher confirmed what was transcribed against the audio recordings as he is also conversant in the two languages.

1.11 LIMITATIONS OF THE STUDY

The limitations of a study are those characteristics of design or methodology that impact on or influence the interpretation of the research findings (Babbie, 1990). The BDF is a security entity and most of its operational equipment is procured under “secret” or “confidential” security classifications. It was therefore not possible to access some procurement documents such as the procurement plans of some critical equipment, which could have added value to this research. The study, however, did not investigate classified procurement, but rather basic military operational assets, specifically transport. Over and above these, media reports and other publications were available to reveal some of the information that could have been difficult to access.

Although some of the candidates interviewed had already left some of the institutions, which was anticipated to lead to some difficulty in tracing and finding them, the reality was to the contrary. All participants were accessed with limited difficulty.

In reviewing the different capabilities of the BDF, it would have been valuable to have assessed the four infantry battalions in the BDF; however, the assumption was that since all deploy in the same area of responsibility on an exchange basis, the capability of one would reflect the capability of the other three.

In determining who would constitute the sample, it was assumed that the inclusion criteria were appropriate and therefore assured that the participants had all experienced the same phenomenon under study.

1.12 CHAPTER OUTLINE

Chapter 1 provides the introduction and background of the study. This chapter discusses the problem statement, research question, research objectives, and the motivation of the study's importance.

Chapter 2 focuses on the literature review, with scholarly contributions to the concept of public procurement. In this chapter, procurement is defined and its comparison with private procurement, the procurement cycle, and the principles of procurement is discussed.

Chapter 3 discusses the policy and legal frameworks of Botswana's public procurement process. It discusses all legal instruments that legitimise public procurement, the dual budgeting system and how it impacts on procurement, the various procurement models available under public procurement, administrative and operational oversight, as well as the Citizen Economic Empowerment (CEE) schemes.

Chapter 4 dwells on defence procurement from an international perspective and culminates in a regional perspective. This chapter discusses the concept of defence capability in depth, as well as factors that influence defence procurement and different models of defence procurement from an international perspective that culminate in a regional perspective. Regionally, the South African defence model, the Namibian defence model, and the Zambian defence model are discussed and evaluated.

Chapter 5 presents the theoretical and methodological framework of the study. This chapter discusses in detail the systems theory (ST) and its approach to the analysis of systems thinking as the main theory of the study. It discusses its evolution, assumptions, characteristics, and the rationale for its adoption by the study. The organisational buying behaviour theory and the dialectical theory are also discussed as complements to the ST. Further discussions in this chapter include the research philosophy, research methodology, research design, research methods, and data analysis.

Chapter 6 presents an integration of the data analysis, discussions, and findings.

Chapter 7 presents the conclusions and recommendations of the study.

1.13 CONCLUSION

This chapter presented a synopsis of the thesis by highlighting the problem statement, the research question, and the rationale of the study. These are key as one should have an idea of what to expect from the different chapters. A problem statement addresses an area that has gone wrong and, as such, when writing a problem statement, one must indicate what the problem is, why it is a problem, and how the study proposes it should be fixed. The study limitations and the scope were identified since they are the potential weaknesses that are beyond the researcher's control and may affect the outcomes of the study. The scope delineates the boundaries of the study in terms of time and organisation, as well as concepts. From this chapter going forward there will be a reflection back to this chapter as it is the foundation of the chapters that follow.

CHAPTER 2: LITERATURE REVIEW

2.1 INTRODUCTION

This chapter discusses relevant scholarly contributions to the discussion of public procurement, the business environment, and military capability. In reviewing what others have contributed to a certain field, one is able to find existing knowledge, identify gaps, compare emerging data, and generate new avenues for research (Hussey & Hussey, 1997). A literature review is important as it shows command of the subject area and understanding of the problem. Mentzer, Min and Bobbitt (2004) stated that procurement as an aspect of logistics does not have a unified theory and it does not have a rich heritage of theory development. In advancing the discipline, borrowing theories from other disciplines has been advocated as a viable option (Stock, 1997). Logistics literature and research have so far focused mainly on managerial problem solving rather than theory development (Mentzer & Kahn, 1995). This study focuses on contributing to procurement managerial problem solving as opposed to theory development.

The available literature on public procurement covers different aspects of the public procurement process. Some literature focuses on legislation reforms (Ameyaw, Mensah & Osei-Tutu, 2012), factors that affect compliance (Hawkings & Muir, 2014), while some explore lessons learned (Hawkings & Muir, 2014). The latter are case studies of different countries, especially in East Africa. There is little literature on the case of Botswana, and it is limited to research on the participation of the Batswana in the form of a budget *pitso* by Botlhale (2013), which focused on the aspect of the business process. In this research, Botlhale (2013) attempted to answer the question as to whether the budget *pitso* was enough to enhance the budgetary participation of the Batswana. Botlhale (2013) found that there is a need for detailed reforms in the form of budget legislation and a strong parliament to complement the budget *pitso* initiative.

In another research study, on infusing value for money into public procurement in Botswana, Botlhale (2017) attempted to answer two main questions: What are the main challenges of public procurement in Botswana, and how can public procurement

in Botswana be improved? The conclusion was that public procurement in Botswana was not based on the value-for-money concept, which called for public procurement reforms and adoption of public sector improvement tools.

In yet another research study, Botlhale (2016) found some discrepancies after analysing the goals against the outcomes after the restructuring of public procurement reforms in Botswana. Despite the efforts to put in place various regulatory and executory bodies at both national and local governance levels, challenges such as lack of capacity by subnational bodies, delays in vetting tenders, and perceptions of corruption by the media and the public continue to take place (Botlhale, 2016). Botlhale (2016) further identified that there is some imbalance in awarding tenders, which gives foreigners more advantage than locals.

In the literature that has been discussed, more emphasis was placed on aspects of procurement in the process. Budgeting was not discussed as an important activity in the public procurement process. While major focus areas have been corruption issues, effects on the legal frameworks, and lessons learned, this research seeks to assess the influence of the business environment on the public procurement process in Botswana and how it impacts on military capability, with a view to establish what best needs to be done to ensure an efficient and effective defence force in this very turbulent business environment.

In expanding on these issues, it is important to discuss key concepts such as public procurement, the business environment, and military capability. The following subsections define these concepts and expand on them through further subheadings. The reviewed literature was predominantly drawn from peer-reviewed articles, and most of the articles are from the *Journal of Public Procurement*, as well as other relevant information from books and organisational reports. Peer-reviewed articles are those articles that have been subjected to expert input, which gives their findings validity and credibility (Kelly, Sadeghieh & Adeli, 2014). Most of the cited research articles are therefore valid and are credible sources of information.

2.2 CONCEPTUALISING PROCUREMENT

Procurement will be defined as a point of departure. It should first be noted that there is a plethora of sources with definitions for procurement. Apart from the vast number

of published studies, there are textbooks, professional guides, university course materials, and dozens of other sources that all might have claims of being definitive or the best sources. However, most of these sources would likely define procurement to best suit their needs, and thus will be biased towards other needs.

The approach of this study in articulating procurement is from the ground-up approach, which is a method used by Marcell and Grendel (2018). This approach discusses procurement without presupposing anything. As such, an obvious place to start looking is a basic dictionary. First, the definitions are reviewed and then the key points of the definitions are discussed.

According to Hornby (2010), procurement is defined as “the act or process of procuring; especially: the obtaining of military supplies by a government”. This is an immediately troublesome start, given that the definition uses another form of the word (procuring) that is defined in the definition. There is therefore a need to define “procure”, which Hornby (2010) defines as “to get possession of: obtain by particular care and effort”. Although there are other definitions of the word “procure”, they are much less applicable to the discussion in this study. As a combination of the meanings deduced from both procure and procurement, one gets “the act or process of gaining possession of something by particular care and effort”.

The second lexical approach of procurement is the one provided by Randall (2014), who defined procurement as “the action of obtaining or procuring something” or “the action or occupation of acquiring military equipment and supplies”. As above, the first definition describes the term using a different form of the word it seeks to define. “Procure”, according to Hornby (2010), is essentially the same as alluded by Randall (2014), namely to “obtain (something), especially with care or effort”.

However, Hornby (2010) added a different twist to the second definition, namely the notion of acquiring something, and he defined “acquire” as “buy or obtain (an asset or object) for oneself”. Interestingly, Hornby (2010) seemed to believe that one cannot acquire something on behalf of a third party; for example, a procurement department cannot procure something for another department in a government ministry. This subtlety may be a start in determining the difference between acquisition and procurement. However, this differentiation is better dealt with below with a more comprehensive analysis of the terms. The third definition is by Greaves (2012), who

defined procurement as “the act of procuring, or obtaining or getting by effort, care, or the use of special means”.

A summary of linguistic definitions is that procurement must be active in terms of a process. It therefore seems appropriate to expand upon the dictionary definition from “obtaining something” to “obtaining an outcome”. This allows the possibility of obtaining a tangible or intangible object – one that can literally be grasped or not. It could also be deduced that a measure of carefulness seems attributable to the definition. The resulting working definition of procurement at this point can therefore be given as “the act of carefully obtaining an outcome”. However, there is more to procurement than from a mere lexicographical perspective.

The remaining part of this section provides some clarity and weight behind what procurement means, beyond its dictionary meaning. As articulated by Imrhan (2015), procurement exists as an independent concept, and is not necessarily tied to any other concept. This is the approach of this study; otherwise this discussion can easily end up going in many different directions at once.

Various authors have defined procurement in many different and in somewhat similar ways but the definitions still have some basic points. For example, Lyson (2006) defined procurement as a management function that involves purchasing and obtaining goods or services in any way, including borrowing, leasing, or pillage. Similarly, Stukhart (2007) defined procurement as integrated coordination of the material management system, which includes materials’ take-off, purchasing, expediting, receiving, warehousing and distribution, and even contract administration. The latter definition is more detailed and provides a breakdown of what procurement entails in an organisation. Min and Galle (2009) defined procurement as an activity to get or bring about something by some effort. Their definition of procurement is rather general; however, it highlights that procurement activities are an inseparable part of any organisation. In all the foregoing definitions, procurement is presented as a range of activities that constitute a process.

In an earlier study that compared procurement and purchasing, Kraljic (1983) argued that procurement has a broader meaning than purchasing, which encompasses all activities involved in obtaining materials and services to manage inflow into an organisation toward the end user. In the view of their study, procurement includes

purchasing, transportation, warehousing, and moving goods towards the production process; a process that Kraljic (1983) referred to as integrated procurement.

In addition, Alecson (2014) defined procurement as a business management function that ensures identification, sourcing, access to, and management of the external resources that an organisation needs or may need to fulfil its strategic objectives. Here, procurement is presented as a functionary mechanism to explore supply market opportunities and to implement resourcing strategies that deliver the best possible supply outcome to the organisation, its stakeholders, and customers. So far, one of the difficulties the researcher experienced in defining procurement is that it does not deal with a single action or process. Procurement covers a range of events; from the identification of a need for goods or services through to disposal or cessation.

Furthermore, Stradford (2017) defined procurement as the acquisition of systems, goods, or services at the best possible total cost of ownership, in the right quantity, at the right time, in the right place, for the direct benefit or use of the governments, corporations, or individuals generally via, but not limited to, a contract. This definition is loaded with several concepts. For example, it presents procurement as getting hold of an arrangement or structure that is targeted at securing the right quantity of goods and services through a contractual process. One therefore sees that procurement deals directly with economic variables such as cost, quantity, and utility. On the contrary, Bergeron *et al.* (2017) and Mayson and Donald (2014) defined procurement as a process of acquiring goods, works, and services, which covers both acquisition from third parties and from in-house providers. Their argument was that the process spans the whole lifecycle from identification of need, through to the end of a service contract or the end of the useful life of an asset. Mayson and Donald (2014) perceived procurement as acquisition, a perception also held by Stradford (2017); the former's approach to procurement is more as a process that includes activities and events before and after the signing of a contract, as well as the general management of activities associated with a range of contracts.

The articulation of procurement as a process was presented by Dobler (2007), who maintained that procurement not only includes the function of purchasing but other activities as well, such as material specifications, material studies and value analysis, management of supplier quality, purchase of inbound transportation, and

management of investment recovery. This definition is critical to the ongoing discussion because it brings in purchasing and supply management, which are related concepts to procurement. Procurement, purchasing, and supplier management are all terms used extensively, and sometimes synonymously (Knudsen, 1999).

According to Pollit (2010), procurement and purchasing are often used interchangeably; however, purchasing refers to the process of acquisition in manufacturing, while procurement is a term used in governmental circles for acquisitions. However, there are more details to the distinction in the semantics of the concepts. Handfield (2011) considered procurement, purchasing, and supply management as the same. His view was that the three concepts suggest a strategic approach to planning for and acquiring an organisation's current and future needs through effectively managing the supply base, and utilising a process orientation in conjunction with cross-functional teams to achieve the organisational mission. The view of this study is that there are significant differences in the articulation and practice of the three concepts. In this regard, one deficiency of this view is the inability to distinguish the clear contextual usage of the three terms "purchasing", "procurement", and "supply management", as is done in other studies. For example, Arnold (2007) argued that procurement is a wider concept than purchasing. In effect, his study contended that purchasing, materials management, inbound logistics, and outbound logistics, among others, are subsets of procurement.

In contrast with the above opinions, Tempelmeir (2005) contended that purchasing is the basic level of the way of obtaining materials via a supply management chain, while procurement is a strategic focus that acts proactively and contributes significantly to company performance. Here, procurement is the next level of purchasing, and both are subsumed as aspects of supply chain management (SCM). Despite the different ways of articulating the concepts, there are some common ideas. Whatever the case may be, each of the activities involves supporting an organisation to achieve a competitive advantage.

For the purposes of this study, procurement, purchasing, and supply management are not synonyms. The rationale for this position is that procurement spans beyond mere purchasing and supplying. As evident in the sources interrogated earlier, procurement has already transformed into a concept that combines with technologies, marketing,

and business strategies. The working definition at this point is therefore that procurement is a careful, documented process that results in the delivery of goods or services in a set time period.

Procurement is conducted in two main sectors, i.e. the public sector and the private sector. These two sectors conduct procurement differently and may also define it differently. The other factor is that the two may have different objectives for conducting procurement. The private sector may procure for competitive advantage, while the public sector may procure for the provision of goods and services. It is therefore worth discussing the two main sectors of private and public procurement.

2.3 PRIVATE PROCUREMENT VERSUS PUBLIC PROCUREMENT

Anderson (2016) argued that public procurement is different from that derived from private sector procurement in terms of responsiveness, professionalism, accountability, competition, and transparency. In most cases, public sector procurement is not that different from private sector procurement, because public sector customers demand that service delivery must happen very fast and cost effectively.

Murray (1999) analysed local government procurement, and confirmed that there are several differences regarding the objectives and more operational issues that characterise private and public procurement. The demands on public sector procurement are far greater than those found in the private sector procurement (Neill & Batchelor, 1999). Lomas (2000) estimated that 80% of public procurement is largely similar to that in the private sector. This therefore means that approximately 20% of public procurement is different because of different demands. What are these different demands that exist in public procurement but are absent from private sector procurement? Consolidating the existing literature, Leenderset, Trent and Monckzka (1997), Telgen and Lenselink (1998), Murray (1999), Arrowsmith and Trybus (2003), Burtet, Zhama and Burnece (2003), Thaiet, Klein and Hutchinson (2004), and Davis (2005) grouped them for clarity and oversight, which highlighted additional demands found in the public sector.

Trybus (2003) noted the differences and similarities of both sectors to enhance partnerships between public and private sector procurement. What is more important

is to focus on the similarities rather than the differences between public and private sector procurement (Trybus, 2003). Davis (2005) argued that both sectors share a common goal, which is to obtain the best value for the organisation. This means getting the most from the money spent at every step in the supply chain.

Murray's (2009) view is that in the public sector spending, efficiency equals organisational efficiency. This applies not only to purchasing but also to the entire supply chain's value operations. In this regard, both domains of procurement are interested in optimising the value for money spent in the acquisition of goods and services.

In both instances, Rectez (2018) argued that customers or service consumers (these are public citizens) continue to demand better quality, faster service, and lower cost. This is also true of organisations in the private sector because if they cannot continuously and consistently provide better materials faster and cheaper, then their long-term survival is doubtful. In practical terms, more and more pressure is exerted on both private sector and public sector procurement in that services, materials, and information are expected to be of high quality despite the high scarcity and shortages of resources for both sectors.

One interesting interaction between private procurement and public procurement is that more and more governments reduce their procurement initiatives through outsourcing. On the other hand, private sector procurement initiatives grow bigger and bigger. Stated differently, the reality is evident in that governments are now and again considering reducing their staff complement as it adds high costs to the wage bill. Governments therefore consider outsourcing most of their services.

Furthermore, Oughton (2007) claimed that another way that public procurement and private sector procurement are similar is that they are both subject to three trends that are driving change. Oughton's (2007) view was that both the public sector and private sector procurement processes need complete visibility in order to speed up the sourcing of goods and services, to decrease inventory costs, and to improve cash liquidity. The reality for public sector supply chain managers is that they too need to reduce costs from the supply chain to ensure their organisations' long-term sustainability.

Responsiveness to clientele is another factor both sectors have in common (Gregson, 2017). The argument postulated by Gregson (2017) is that both private and public sector procurement must become more responsive to the needs of their clientele. In a world where continuous improvements in information, communication, and technology lead to shorter shelf lives for many products, supply chains have an increasingly difficult job of maintaining a relevant portfolio of materials and services while avoiding losses caused by holding obsolete material. Responsiveness keeps obsolescence to a minimum standard.

Jang and Wong (2015) contended that private and public sector procurement must have transparency, where transparency is not only about compliance with forms, rules, and regulations, but also encompasses the ethics in dealing with relationships in business operations. The reality is that transparency is possible for both public sector and private sector procurement in terms of having procurement operations that are based on trust and sharing of information that will lead to innovations and improved service delivery. It can be done by using private sector principles such as strategic sourcing, supplier relationship management, and inventory control in a way that is acceptable in public sector settings.

Oughton (2007) alluded to the fact that it is how well these concepts work that truly determines their worth. It is clear that public and private sector supply chains are two sides of the same coin and that many private sector best practices can be used in the public sector with great success and with little or no modification; thereby fostering the much-needed partnership between these two sectors. By focusing on the three areas of strategic sourcing, supplier relationship management, and inventory management, public sector supply chains can make order of magnitude improvements, generate real savings, and create even more supply chain successes.

Ultimately, the private sector is leading when it comes to the flexibility and adoption of new methods of procurement, including quick adoption of new procurement technologies (Khau, 2012); whereas the public sector may be different in this respect partly because it is required to observe special rules and regulations. The goals for public procurement, set by governments, are often products of compromise and may sometimes conflict globally (Erridge, 2005). Goods and services are procured in both private and public sectors and in both sectors the main mandate is to conclude a very

attractive and favourable procurement deal for the acquisition of goods and services (Erridge, 1996; Thai, 2001). It is therefore necessary to discuss public procurement in isolation to gain an in-depth understanding of the concept.

2.4 PUBLIC PROCUREMENT

This section of the study focuses on the concept of public procurement. The word “public” in “public procurement”, according to Bickerstaff (2014), implies that procurement is done by public servants for the public and from taxes. Those who are involved in the procurement use public funds and it is imperative for them to adhere to procurement regulations. Murray (2019) defined public procurement as purchases for people by agents of people by using public funds. Murray’s (2019) view is consistent with the previous definitions. The definition highlighted that public procurement uses public funds, and that public procurement is executed by public servants, dubbed as agents of the people (Murray, 2019).

In addition, Anderson and Pelletier (2016) asserted that public procurement is the purchase by governments and state-owned enterprises of goods and services. This definition used terms such as “government” and “state” to highlight what public procurement entails. The government or the state is all about the people. In other words, public procurement is informed by the people and triggered by the people’s needs. As in the definitions presented in the previous paragraph, this definition by Anderson and Pelletier (2016) also suggested that public procurement is a people-orientated activity. This line of thought is logical because public procurement, according to Brammli-Greenberg, Weitzberg, Perman and Gamzu (2016), accounts for a substantial portion of taxpayers’ money. Taxpayers’ money is managed by governments, and they are expected to use it efficiently and with high standards of conduct in order to ensure high quality of service delivery and to safeguard the public interest (Brammli-Greenberg *et al.*, 2016). Andrecka (2015) maintained that public procurement means the contractual acquisition of goods and services with appropriated funds by the government through purchase or lease, whether the supplies or services are already in existence or must be created, developed, demonstrated, and/or evaluated. This definition brings in another dimension of what public procurement entails. For example, it articulates that public procurement passes through a contractual process, executed with appropriated funds, and has elements

of an evaluation mechanism. For a contract to take place, two or more parties must be involved in the process. There are other stakeholders who work with government agents to ensure that public procurement takes place. Additionally, public procurement is executed with funds that are often approved by legitimate institutions or government agencies; funds are therefore not used impulsively, but prudently. The approval of funds meant for public procurement comes with estimation or assessment mechanisms that provide for checks and balances.

Moreover, Arden (2013) defined public procurement as buying, purchasing, renting, leasing, or otherwise acquiring any supplies, services, or construction through the awarding of contracts, and all phases of contract administration. Arden's (2013) definition of public procurement is similar to Arksey and Baxter's (2012) definition, who defined public procurement as the acquisition of works, supplies, and services by public bodies. Consistent with all sources discussed so far, both Arden (2013) and Arksey and Baxter (2012) pointed out that public bodies, state enterprises, and/or government agencies are at the centre of public procurement. In other words, public procurement is not complete without a government ministry or state-owned agency.

A different dimension of the definition of public procurement is provided by Borson (2017) as a methodology that encourages competitive bidding through a generalised requirement specification sheet. This definition viewed public procurement as a procedural or systematic model of acquiring goods and services for the government. Unlike all other definitions interrogated earlier, Borson (2017) not only related public procurement as a methodology, but also pointed to bidding as the procedure through which public procurement is achieved. Through the bidding process, any bidder who meets the requirements as indicated in the specifications can bid and the chance for a number of bidders participating therefore increases, which increases the competitive bidding. It is a basic principle of public procurement that a competitive process should be used, unless there are justifiably exceptional circumstances (Borson, 2017).

The final source of a definition of public procurement articulated in this study is by Arrowsmith (2017), who defined public procurement as a process by which public authorities, such as government departments or local authorities, purchase work, goods, or services from companies. Arrowsmith (2017) contextualised this definition of public procurement by providing examples to include, among others, building of a

state school, purchasing furniture for a public prosecutor's office, and contracting cleaning services for a public university. The use of the word "process" in the above definition suggests the systematic use of resources in public procurement. This ensures that the procurement activity is undertaken with sufficient caution, and that the funds are utilised judiciously, efficiently, and economically.

2.5 EVOLUTION OF PUBLIC PROCUREMENT

According to Mokoya (2011), the public procurement system has evolved from a rudimentary stage to a vibrant regulated system. The idea of evolution as used in the context of this study means the growth and development of public procurement. Public procurement has evolved over time in terms of context and organisational setup. In other words, the pace at which public procurement has evolved depends largely on the dynamics of the environment. For example, one does not expect public procurement in a democratic setting to be the same in an environment where rule of law is not respected; nor does one expect a public procurement process in a vibrant public-private partnership to be the same as in a predominantly public system.

Nevertheless, the growth and development of public procurement are argued by Thai and Piga (2007) to have intensified towards the early 1990s, when the general public's expectations of the government also intensified. Thai and Piga (2007) stated that rich and poor countries have been struggling with persistent budget constraints, government downsizing, public demand for transparency in public procurement, and greater concerns about fairness, efficiency, and equity. Public procurement is largely dependent on government activities. The size of a government budget determines the strength of public procurement, and the size of a government inevitably limits the dynamics of public procurement. Public procurement is intricately weaved into the day-to-day running of a government.

This discussion interrogates the various factors that have interacted in the evolution of public procurement. Stated differently, the evolution of public procurement has been influenced by a number of issues, and some of the issues are related to socioeconomics, political reforms, and technology.

Technology is fundamental in the evolution of public procurement in most European countries. Mahran (2013) asserted that the public procurement process has been

enhanced through technology, and this has brought about what is known as e-procurement. In the year 2000, the European Union (EU) in Lisbon started to pay attention to the concept of e-procurement. E-procurement entails an Internet technology platform and services that make corporate procurement activities more efficient and cost effective (Mahran, 2013). This concept was initially pursued by the Scandinavian countries of Norway, Denmark, and Finland and some others such as the United Kingdom (UK), Germany, Spain, Portugal, and Italy, as well as others outside the EU such as Singapore and Brazil (Moe, 2004).

Interestingly, the implementation of e-procurement has shown immediate positive results from the onset. The main expectations of e-procurement were the improvement of efficiency, which was intended to reduce the costs of issuing invoices and other administrative work for low-value, high-volume goods (Panayiotou, Gayialis & Tatsiopoulos, 2004). The overall objective of integrating technology and public procurement is to enhance the evolution of public procurement. However, integration of this concept has been slow, with some resistance in places. This alludes to the validity of the statement made earlier in this discussion that the growth and development of public procurement are situation-specific.

In the UK, the evolving public procurement process has been informed by several multilateral factors. According to Oughton (2004), the evolution of public procurement in the UK is informed by leveraging economies of scale and scope while maximising local decision making and flexibility, developing and embedding world-class procurement policy throughout the public service, managing supplier relationships to strike the right balance between ensuring competitive markets and building longer-term strategic relationships, and minimising the costs of procurement for the public and private sectors.

In a review of public procurement in Scotland, McClelland (2016) posited that every organisation should give public procurement relevant importance and ensure that there are qualified, professional staff with the appropriate level of seniority and influence. McClelland's (2016) point was that public procurement must be given a professional facelift. One way in which this can be achieved is by collaboration across the public sector to realise aggregate procurement and to optimise scarce skills. From a more procedural outlook, McClelland (2016) further maintained that setting out how

contact and business with outside parties should be conducted is a clear indication that procurement reform should benefit the client agency, as well as its contractors, consultants, and suppliers. It can be used to build the capability and global competitiveness of industries. The overall objective is to contribute to the growth of the economy.

Additionally, some studies conducted in the European community, such as by Watermeyer (2000), Allan (2012), Prochrosty (2015), and Brimson (2017), indicated that procurement has been used by governments to stimulate the economy, protect local industries against the foreign competition, increase competition within various sectors of the economy, and remedy regional disparities. To further justify that public procurement interacts with socio-politics and the economy, Grandia and Meehan (2017) indicated that public procurement has been applied to a wide range of fields as a tool to address issues such as reducing unemployment, reform the national industrial policy, improving working conditions, supporting small businesses and local development, and advancing equal pay for men and women. Brimson (2017), however, was sceptical of this phenomenon of public procurement achieving policy outcomes as far as its legitimacy and effectiveness are concerned. There is contention that the output may be compromised against time or quality.

The evolution of public procurement is considered to be crucial and beneficial in Australia. The Australian Procurement and Construction Council (2013) suggested that the adoption of the National Procurement Reform Principles provided an opportunity for government agencies to make considerable savings and efficiency gains through improved procurement practices and outcomes. In Western Australia, the reform initiative “aims to deliver increased savings and better procurement outcomes for government” (Department of Treasury and Finance, 2015).

For most developing countries, conforming to the various stages of evolution has been a challenge. Some countries continue to conduct procurement manually because of limited resources such as technology, which requires good infrastructure and investment in training personnel. As the procurement practices progressed, there was also a need for principles under which the procurement activity would be conducted. The point is that there are several interacting factors that converge in the public procurement evolving stage.

Khan (2016) suggested that procurement reform in Bangladesh would offer better value for money in public spending; enhance the country's capacity to use aid effectively; reduce the cost of doing business, thus improving the investment climate; develop the capacity of the contracting and consulting firms and preparing them for entry into the global market; and creating employment opportunities for Bangladeshis. Despite public procurement being the acquisition of goods and services, it has been seen to have serious implications for socioeconomic and political reforms in countries.

In Morocco, Hasheed (2018) argued that, given the substantive role that procurement plays in public financial management, and in light of its impact on wider public sector objectives including sustainability and socioeconomic objectives, it was imperative for Morocco to develop and implement workable strategies. Hasheed (2018) submitted that only through collaborative action plans can organisations mitigate the challenges and weaknesses identified with public procurement evolution and look to driving forward the economy, efficiency, effectiveness, and equity. This kind of evolution requires sustained country ownership and political commitment, together with appropriate technical solutions.

In post-1994 South Africa, the public procurement system was a reflection of the apartheid system. Bolton (2006) reported that public procurement practices existed that were discriminatory in nature, because the system was so closed that it was difficult for new entrants to participate. This resulted in the review of these practices post-1994 elections, which saw a new balance in the market (Bolton, 2006). A decade later, Smith (2016) asserted that public procurement in South Africa relies greatly on the tender process as regulated by various pieces of legislation and legal principles in order to obtain contracts for the procurement of the goods and services needed to maintain, upgrade, and advance public assets. Similarly, the *Encyclopedia of Management* (2020) posited that since the Constitution came into effect in 1996, various rules and principles regarding the public procurement process in South Africa were changed and expanded to recover and improve the new democratic South Africa. Evidently, this change is as a result of change in the South African political system. This reiterates the point made earlier in this discussion that the evolution of public procurement depends on factors such as socioeconomics, politics, and technology; among others.

Public procurement was predominantly conducted in terms of the availability of goods and services but it happened that some important and high-value items were not kept readily in stock. Then came the introduction of concepts such as Public Technology Procurement (PTP), which is the procurement of goods or systems, which are not readily available but could be manufactured or developed in a reasonable timeframe (Edquist & Hommen, 2000). This is different from Regular Public Procurement, which involves the procurement of items that are readily available in stock such as stationery and related wares. Edquist and Hommen (2000) further indicated that PTP is the mostly common means of procurement for military equipment. Firstly, because it has proven to be a potent means of influencing speed and direction of innovation; and secondly, it promotes competition among firms that meet specifications and win contracts. This kind of competition has been seen to contribute to growth; for example, in Sweden, some firms reached their growth by expanding into international markets (Edquist & Hommen, 2000).

The key objectives of the procurement evolution initiatives often cited in the literature include value for money, predictability, contestability, efficiency, transparency, and accountability. Most of the programmes also emphasised effective implementation and thus paid attention to capacity building, awareness creation, and sound administrative mechanisms. For example, the objectives of procurement reform in Nigeria, according to Nwadike (2015), were to promote effective and efficient procurement practices and systems, and to enable the government to deliver the quantity and quality of services demanded by its constituents in a timely manner. Similar objectives were articulated in Mboye (2017) in the case of Kenya, and Ahmed (2014) in the case of Ethiopia. Some of the reasons articulated in the two sources include to achieve continuing improvement in value for money based on whole-life cost and quality, to enhance the competitiveness of suppliers through the development of world-class procurement systems and practices, and to ensure that control and accountability are maintained through comprehensive auditing. In a nutshell, the evolution of public procurement is a welcome development in many countries. As articulated in the literature, the overarching objective of the evolution of public procurement is to achieve a uniform procurement system with standardised tendering procedures, policies, and contract documentation at all levels, and to ensure that public sector procurement complies with the provisions of the countries' constitutions.

2.6 THE IMPORTANCE OF PUBLIC PROCUREMENT

Public procurement is an important tool for strategic change (Stykes, 2007). Kelman (2015) contended that it entails complex set of rules, procedures, and structure; hence public procurement has a more systematic and strategic approach. However, these make it more difficult to handle several factors, both internal and external, as they interact in the public procurement process. For example, the media, organised civil societies, labour unions, politicians, public servants, and other structures of society all combine to add value to the public procurement process.

Nevertheless, Murray (2010) argued that public procurement is an important tool to drive the economy of a country. In his UK-focused study, Murray's (2010) key argument was that public procurement is a strategic tool for accelerating economic recovery in the context of the UK and highlighted how public procurement can help small and medium enterprises to deal with economic downturns. The conclusion of the study is that lean, working, simple tendering procedures that follow best practices and ensuring timely payment to contractors and subcontractors will help both buyer and sellers, irrespective of the size of their business.

The government plays an important role in supporting economic growth and development, on the one hand, and helping businesses innovate, on the other hand. However, its effect on government departments and the way they organise themselves to undertake what Yeow, Rigby and Li (2017) referred to as Public Procurement of Innovation (PPol) has not been widely explored in contemporary research. Using a case study of the Australian Small Business Research Initiative, Yeow *et al.* (2017) examined the different ways in which departments organise themselves to undertake PPol, and in particular the effect of a target set on departments' innovation procurement activities. They identified huge prospects for the growth of local small and medium enterprises, and at the same time isolated some challenges that procurement departments encounter. Finally, their study highlighted the need for a clear understanding of the logic and benefits of procurement departments.

Similarly, Gunasekaran and Ngai (2008) posited that public procurement can be used as a propelling force behind economic development. For example, Gunasekaran and Ngai (2008) suggested that there are four key areas in which public procurement can be strategically implemented to drive the economy. First is by providing leadership for

upcoming entrepreneurs and building or developing local capacity. The second strategy is partnering and collaboration with existing structures, even with the institutions that have a variety of mandates. Thirdly, public procurement must embrace technology, and as such must do business electronically. The reason is that the digital platform has been recommended as an effective tool for business growth by a number of empirical studies, including those by Sands and Yaggo (2016), Smart (2010), and Ahmed (2017). The fourth strategy recommended by Gunasekaran and Ngai (2008) is stimulating markets and achieving community benefits. From the foregoing, one can see that public procurement is a community-orientated activity.

Furthermore, according to Khan (2016), public procurement is the driver of the policy tools of the government. Khan's (2016) study was focused primarily on India and asserted that the total public procurement in India contributes almost 30% to the gross domestic product (GDP). Consistent with Khan (2016) and the World Bank (2017a), almost all developed countries have used a variety of policy tools to encourage domestic bidder participation to enhance indigenous domestic content in government supply, as well as clever use of outsourcing to encourage local employment. A procedural system must be put in place in order to achieve these objectives. In the case of Kenya, Kambobe (2016) maintained that a strategic policy approach was put in place, and the policy framework included preferential treatment of domestic bidders, exclusive reservation for domestic bidders, imposing mandatory minimum domestic content in government supplies, and imposing offset obligations; among others. In practical terms, this could be achieved if there is a policy on purchase preference given to domestically manufactured electronic products, for example.

According to Allison (2013), public procurement has contributed a great deal to South Africa's economy and is therefore of great importance. Allison (2013) asserted that with South Africa's political transformation in 1994, the construction industry was used as the model for public sector procurement reform. The industry regulates all infrastructure and currently constitutes approximately 4% of South Africa's GDP, with the private sector as its biggest client (Sigala, 2018). The legal regulation of construction procurement in South Africa is therefore significant. The South African construction procurement system is currently regulated by section 217 of the Constitution, which requires the procurement system to be fair, equitable, transparent, competitive, and cost effective. Further to that, there is also the Construction Industry

Development Board Act and its subordinate legislation that also feature prominently in regulating the process of public procurement. The essence of these legislative and regulatory frameworks is to ascertain whether public procurement processes comply with stipulated requirements.

2.7 PRINCIPLES OF PUBLIC PROCUREMENT

In the practice of procurement, there are no generally accepted and standardised principles that are deeply entrenched therein. Different countries emphasise different principles. However, there may be some commonalities and overlapping interactions among the principles of procurement to a larger extent. In New Zealand, for example, Shadson (2014) reported that there are five principles that guide public procurement. The first principle is that the procuring entity must plan and manage for great results. A similar view is presented by Sarter (2016), who argued that when a procuring entity identifies what it needs and then plans how to get it, it must set up a team with the right mix of skills and experiences. This suggests that suppliers must be involved early, and it must understand the market, and choose the right process.

The second procurement principle articulated by Shadson (2014) is fairness, which is to be reasonable to all suppliers. Riigi (2018) opined that fairness arises when the procuring entity creates even-handed competition and encourages capable suppliers to respond. It involves treating all suppliers equally; giving local suppliers a full and fair opportunity to compete; making it easy for all suppliers, small to large, to do business with the company; and giving feedback to unsuccessful suppliers. In other words, fairness in public procurement means creating a level playing field for all stakeholders to participate in the process.

In addition, a sense of fairness emanating from the decisions of the procuring office must prevail. The members of society should feel like equal participants in the procurement process. According to Abu (2010), fairness entails that all persons should be regarded as equals, and certain rights that are considered inalienable to humans must be respected. Discrimination of any kind must not be condoned. Fairness in procurement, according to Jacorvich (2015), is equal opportunity given to everyone to improve or maintain their wellbeing.

Shadson (2014) continued in the articulation of the principles of public procurement by highlighting “get the right supplier” as the third principle. This principle is important as it emphasises being clear about what is needed in choosing the right supplier who can deliver what is needed at a fair price and on time. Shadson (2014) posited that in order to find the right supplier for the procurement process, the procuring office must set out the terms of operation of the transaction. This is what is commonly known as terms and conditions. Those who are willing to be part of the process must adhere to the standard set out by the procuring office. All those who adhere are perhaps the right suppliers. In addition, the right suppliers also include those who offer the right price and deliver the goods and services when they are needed. By so doing, the right suppliers establish fair and productive relationships with the procuring office. In turn, the procuring office encourages and rewards the delivery of greater results.

The fourth principle, according to Shadson (2014), is to get the best deal for everyone by ensuring the best value for money; making balanced decisions by considering the social, environmental, and economic effects of the deal; as well as monitoring and managing to ensure that great results are attained. Narayana (2015) asserted that value for money is the totality of the utility derived from every purchase or every sum of money spent. Suppliers must demonstrate to the procuring office that the money they spent is worth it. Narayana (2015) summarised and opined that value for money is based not only on the minimum purchase price, but also on the maximum efficiency and effectiveness of the purchase. In the fourth principle, one also sees decisions that reflect the totality of the environment. Decision making is key in the procurement process.

The fifth principle is to play by the rules. Shadson (2014) stated that this means being accountable, transparent, and reasonable; to ensure that everyone involved in the process acts responsibly, lawfully, and with integrity; as well as protecting suppliers’ commercially sensitive information and intellectual property. The rules of public procurement, transparency, accountability, and equal participation, among others, are important. The view of this study is that these are key features of good governance. In other words, public procurement cannot be completely articulated outside the context of good governance. Consequently, the paragraphs that follow concisely articulate transparency and accountability.

Hornby's (2010) view of the word "accountability" showed that the word stems from the Latin word "*accomptare*" (to account), a prefixed form of "*computare*" (to calculate), which in turn is derived from "*putare*" (to reckon). Seidman (2015) confirmed that whereas the word itself did not appear in English until its use in 13th-century Norman England, the concept of account giving has ancient roots in recordkeeping activities related to governance and money-lending systems that first developed in ancient Israel. Cohen (2014) defined accountability as a tool to enhance financial reporting quality and as a mechanism for procurement. Her study considered accountability issues beyond financial reporting focus.

As an aspect of public procurement, accountability has been central to discussions related to problems in the public sector and non-profit and private corporate worlds. However, accountability in public procurement has been a major concern in all societies and civilizations. There are variations in the criteria, means, and agents of accountability based on the nature of the polity ranging from traditional to modern, conservative to liberal, and capitalist to socialist.

Public procurement entails the accountability of those who have been entrusted with certain duties and powers (Howers & Penny, 2018). Since the procuring officers are considered in the decision making through representative brainstorming and through the appointed decision makers, these decision makers are accountable to the supplier community and other stakeholders. The level of this accountability may, however, differ in accordance with the organisation in question and the nature of the decision. The point remains that accountability must exist. In general, an organisation or an institution is accountable to those who will be affected by its decisions or actions.

Accountability cannot be enforced without transparency and the rule of law. Hornby (2010) argued that transparency refers to making decisions and enforcing them in accordance with rules and regulations and making the information regarding such actions accessible for scrutiny by those that the decisions affect. In simplistic terms, it also means that sufficient information is provided and that it is provided in easily understandable forms and mediums. Transparency depends on the building of a free flow of information. Processes, institutions, and information are directly made accessible to those concerned with them, and enough information is provided to understand and monitor them (Grande, 2015).

Mpesa (2017) asserted that the Kenyan government emphasised efficiency, consistency, open and effective competition, ethics and fair dealing, as well as integration with other policies in its public procurement process. These principles, together with the ones discussed above, are more internal and can easily be controlled by the procuring entity. Both Mpesa (2017) and Larson (2001) argued that the absence of effective and ethical competition has led to delays in public procurement in Kenya. Similarly, Ogudoro (2014) asserted that similar delays in preparing technical specifications, scope of work or terms of reference, failure to start the procurement process on time, and extension of bid or proposal submission dates have been the norm in Nigerian public procurement.

Additionally, delays in opening bids or proposals received, delays in starting or finishing the evaluation process, delays during the approval process, delays in contract negotiations, and a supplier or service provider challenging the procurement process are some of the characteristics of a system devoid of the key principles of public procurement (Arch, 2009). The principles in general are always aligned to world best practices. Despite these practices, there are several factors that should be considered because the procurement of goods and services take place in an environment that may have a direct or indirect influence on it.

In summarising the discussion above, a number of countries have been selected not according to any particular criteria but on the basis of the available literature to compare their principles with the ones discussed above. In Table 2.1, a tick indicates that the country has included the principle in their policy, while an x indicates that such a principle is not included. These were extracted from country legal documents such as Acts and procurement policies.

Table 2.1: Summary of common procurement principles among states

Principle	South Africa	UK	Kenya	Uganda	Canada	Namibia	Rwanda
Plan and manage for great results	x	x	√	x	x	x	x
Fairness	√	√	√	√	√	√	√
Get the right supplier	x	x	x	x	x	x	x
Best value for money/efficiency	√	√	√	√	√	x	√
Accountability	√	x	√		√		√
Transparency	√	√	√	√	√	√	√
Equity/competition	√	√	√	√	√	√	x

Source: Researcher (2019)

According to Table 2.1, most of the countries are very clear on the principles of fairness, transparency, equity, value for money, and accountability. Although it appears that some countries do not promote some of the principles, it must be noted that some countries have expressed some of these principles under ethical conduct or as part of procedures. It must be noted that principles and ethics are different but some states do not differentiate between the two. The differentiation of the two is expressed by Spacey (2016), who posited that principles are laws, theories, or rules that form the groundwork of either a society, system, philosophy, science, or profession, while ethics are more related to knowledge or principles related to morals by either an individual or a profession. From the literature, it is clear that most of the countries have covered the core principles, while some, although not specified, are embedded within others. This leads to the conclusion that it is envisaged that public money is used in the best interest of the public, which makes the public players who are given a fair chance of participation and a need for feedback in the form of reporting.

2.8 STEPS IN PROCUREMENT

The procurement cycle follows a number of steps to complete the actual delivery of supplies, services, or works. Authors like Erridge (1995) called it a process, while Lysons (1994) called them procurement procedures, and Edler *et al.* (2005) called these steps a cycle. According to Bernstein and Newcomer (2009), one must specify the steps, and Kapuruge, Jun and Colman (2014) contested that a process should have a start and an end. This implies that there are steps in processes that must be defined in terms of which step facilitates action in the next. A cycle, according to the *Business Dictionary* (2019), is a periodic repetition of events in a process over time or which is indefinite. Regarding the definitions of a cycle and a process, there is no clear distinction between the two as both involve steps. The difference is that a process seems to be a one-directional series of activities, while a cycle is a series of activities that occur more frequently and repeat the same steps. The different terms used may be particular to the type of acquisition made. For supplies, it is relevant to classify these steps as a cycle because supplies are mostly consumed faster and replenishment is necessary more often; hence these steps follow a circular and repetitive manner, while projects such as works may be a once-off activity that may not be repetitive like supplies.

There are no fixed number of steps in the process; however, Erridge (1995) defined five: requisition, checking the requisition, selecting the supplier, ordering, and expediting. Lysons (1994), on the other hand, categorised the process into three: the notification phase (requisition and bill of material), the ordering phase (enquiries, quotations, purchase order, and acknowledgement of order), and the post-ordering phase (advice note, goods receipt, invoice). Handfield, Monczka, Giunipero and Patterson (2011), on the other hand, identified six steps in the process: forecast and plan requirements; need clarification/requisition; supplier identification/selection and approval/contract/purchase order generation; receipt of material; documentation and settlement/payment, and measure performance. The Construction Industry Development Board, which offers works, classified these steps into six: establish what is to be procured, decide on the procurement strategy, solicit tender offers, evaluate tender offers, award contract, and administer contract and compliance with specifications (Ofori, 2007). Coyle, Bardi and Langley (2003) in their presentation of their seven steps of the procurement process included the step of a buy or make decision.

As indicated above, the various authors have shown that there are no fixed and defined numbers of steps in procurement. The buy or make decision is predominately applicable where the institution has the ability to make the product on its own. In the case of the discussion in this thesis, the buy or make decision will not be relevant as it is a rarely used practice in public procurement, except in works such as defence/security institutions where such works are to be kept secret. Despite the differences in the number of steps, some have been embedded into others, as defined by Erridge (1995) in the five steps of procurement as summarised below:

- **Step 1: Requisition**

This the stage in which the unit or section that requires goods places a requisition from the officer in charge of the section unit or branch. The authorising officer will sign the requisition and forward it to the purchasing or procurement section.

- **Step 2: Validate requisition**

The procuring department will check the authenticity of the order, the availability of funds, and the specifications.

- **Step 3: Selecting a supplier**

The selection of the supplier will depend on the method of procurement in the case of public procurement; however, in private entities, catalogues may be utilised or a supplier may be selected based on previous purchases or an existing contract. The rules of the organisation will dictate how many quotations must be sought, and whether quotes can be sought via telephone or mail.

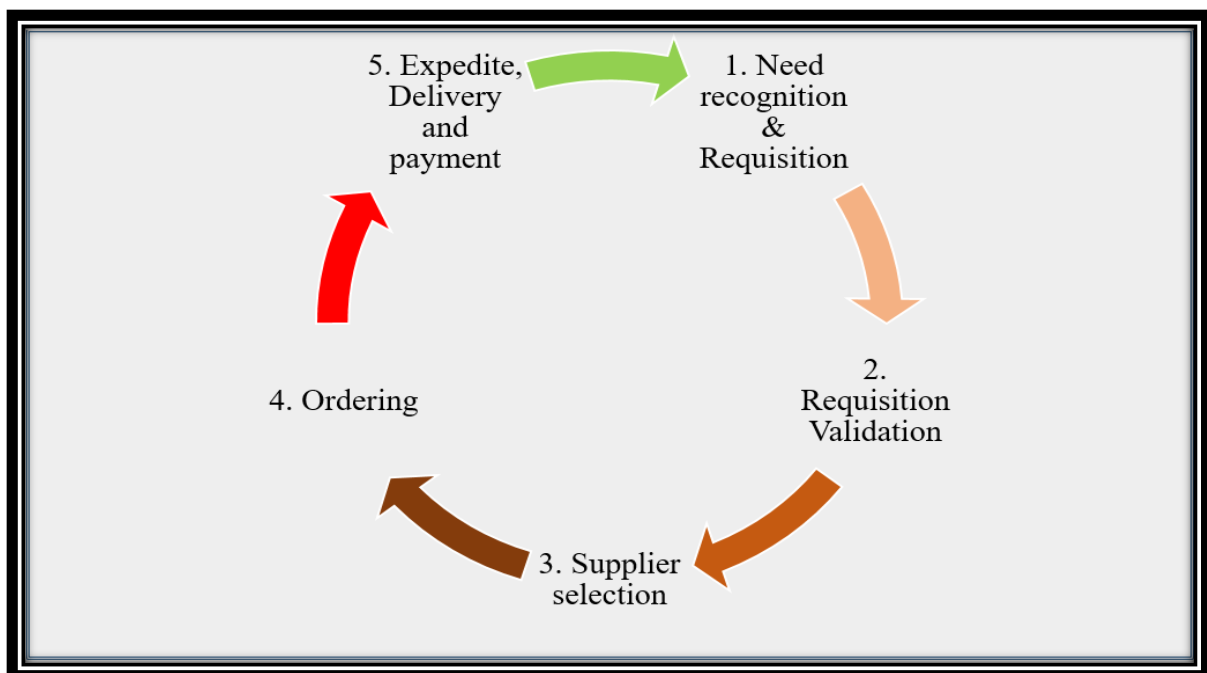
- **Step 4: Ordering**

At this stage, tenders/quotations are evaluated and a supplier is selected. A purchase order is created and is sent to the supplier, which should specify the price, the place where goods are to be delivered, as well as the quantities and expected delivery period.

- **Stage 5: Expediting, delivery, and payment**

This is the stage where the procurement department follows up the order to ensure the delivery of goods. This department needs to expedite delivery because at the end of the year, it may be evaluated on the speed by which supplies or services had been acquired, whether the budget has been fully spent, if there are goods in the warehouse, and/or the quality of goods acquired during the year. Figure 2.1 is a summary of the procurement process steps as discussed above.

Figure 2.1: Procurement cycle



Source: Erridge (1995)

As indicated above, different presentations have been made and the number of steps is not restricted to five. However, looking at other steps, one will find that a step in this model, such as Step 1, is divided into a number of sub-steps. The above presentation therefore captures the steps in summary form, of which the steps are subject to different perspectives by other authors. Also note that this is a simple process, which may be different depending on the value of the purchase. If the value is high(er), the process may include signing a contract and pre-delivery inspections in some cases.

2.9 FACTORS THAT INFLUENCE PUBLIC PROCUREMENT

One of the factors that influences public procurement is the business environment. A business environment is defined by Eruemegbe (2015) as all the factors that influence the operations of an entity to achieve its objectives. The business environment of an organisation is imperative since it has the potential to impact on the totality of the business. It is thus very important to understand the business environment in which one is operating to successfully achieve organisational objectives.

Kennerley and Neely (2003) classified a business environment into external and internal factors. This presents the complexity of the business environment. Kennerley and Neely (2003) argued that the concept of a business environment cannot be defined by a single definition due its complexity. Paulson (2012) defined the business environment as external forces, factors, and institutions that are beyond the control of the firm and that affect the functioning of the business enterprise. These include customers, competitors, suppliers, government, social and political, legal, and technological factors. While some of these factors or forces may affect the operations directly, some may affect them indirectly. However, there is consensus that business environmental factors are important antecedents of corporate entrepreneurship (Guth & Ginseberg, 1990). Ayyagari, Demirgüç-Kunt and Maksimovic (2008) reported that inadequate knowledge of business environments has brought about poor security and weak enforcement of property rights, inefficient functioning of financial markets, poor provision of infrastructural services, inefficient regulations and taxation, and broader governance features such as corruption and macro-economic instability. These demonstrate the extent to which poor knowledge of the business environment can hamper business development and growth. Organisations operate in a continuously

changing business environment in which they compete, which requires constant modifications of strategies and operations to reflect the changing circumstances (Kennerley & Neely, 2003).

Most studies on the business environment have used the Political, Economic, Social, Technological, Environmental, and Legal (PESTEL) tool for analysis. This tool examines political factors (for example, by Thai, 2011), environmental factors (e.g. by Mota & Filho, 2001), technological factors (as applied by Somasundaram & Damsgaard, 2005), and legal factors (as in Thai, 2011). The point here is that despite the existence of a procurement regulatory framework, there exists a broader business environmental framework that governs all public procurement.

Regarding the political environment, McDonald and Wilson (2011) stated that many individuals, groups, and organisations in the private sector, including trade associations, professional associations, and business firms or companies, or even interest groups, are actively involved in all aspects of the public procurement process. Having various interests, objectives, and beliefs, interest groups are involved in the public procurement process in several ways. In a democratic setting, these may include lobbying legislative bodies to pass or alter procurement statutes, influencing the implementation of these statutes, and influencing budget authorisation and appropriations processes. Normally, a government programme that is eventually adopted is a compromise among different views of interest groups, policymakers, and management (McDonald & Wilson, 2011). In a democratic environment, there are cases of a strong coalition of policymakers, bureaucrats, and interest groups in their effort to get their programmes adopted. This coalition has led to the concept of the iron triangle, which is very popular in the area of defence procurement.

The quality of the business environment in which public officials operate can affect their incentive to behave efficiently. In the specific sector of public procurement, Cadle, Paul and Turner (2010) found that the characteristics of the local environment, as captured by different dimensions such as social capital and corruption, significantly affect the efficiency of the execution of public works, even after controlling for many other factors. Moving on from this evidence, Guccio, Lissi and Rizzo (2015) developed a theoretical model where a debauched local environment unambiguously reduces the efficiency of the execution of public works, because procurement officers have less

incentives to pursue mandated tasks from the contracting authority. Guccio *et al.* (2015) therefore established a rationale and clear interpretation of the empirical evidence found in the literature on public works.

This study is interested in the relationship between public procurement and the business environment and how it impacts on defence capability. As a result, there is a need to also understand and appreciate the concept of defence or military procurement.

2.10 MILITARY PROCUREMENT

Biswas, Kabir and Rafi (2018) established that there have been contentions regarding procuring military equipment through public tendering procedures. This was advocated primarily from the principle of secrecy and security. Further to this understanding, there are always questions as to why states must continue to spend funds, which could be used for the development of other sectors of the economy, on military spending. The answer given always emanates from the concept of minimum deterrence, which advocates for continued military procurement. Evans and Newnham (1998) defined minimum deterrent as capabilities in favour of a force posture that is sufficient to create doubts and uncertainties in the mind of the putative opponent so that this adversary will be deterred from the behaviour that is deemed unacceptable in the first case.

Some procurement is widely publicised, while some are kept secret and covert and it will require the engagement of military intelligence to search for information about the force structure and the posture of the other military. The question now is, must military procurement be conducted like normal goods and services procurement? A consideration of what is obtainable in several countries suffices. The rationale behind such a consideration is to examine the extent to which practices relate to or deviate from rules, norms, and conventions.

India has invested heavily in military capability in the past few decades. It has adopted the principles of procurement, such as transparency and accountability, among others. However, its defence acquisition is conducted under a parallel structure to that of the procurement of normal goods and services. Dunay (2002) asserted that Hungarian defence procurement was characterised by total isolation and a closed structure in the

period between World War II and the political transformation at the end of the 1980s. Mainly for reasons of national security, figures on defence expenditure were not allowed to be made public in this period. Consequently, procurement procedures were carried out in a divided market in which competition and equal opportunities were unknown concepts (Kutlina-Dimitrova & Lakatos, 2014).

In Africa, largely due to the secrecy afforded to procurement transactions due to national security, the large sums involved, and the technical specificity of the transactions, the defence sector is particularly prone to corruption (Justice Africa, 2014). Critics continue to view defence expenditure as unnecessary as compared to research and development (R&D). For example, Biswas *et al.* (2018) posited that defence procurement marginally contributes to the GDP but does not contribute to the Human Development Index (HDI). They argued that R&D contributes to human development, with the ultimate effect on the public development of the country as a whole. Ahmedullah (2011) identified military capability as an important reform within a state. Ahmedullah's (2011) study cited Thailand; arguing that, after the military coup, defence procurement was not done properly, which led to a poorly equipped defence force, which made it difficult to deal with gangs in the country that terrorise citizens and kill each other.

Many studies have attempted to identify factors that determine military procurement. One such study was by Sen (1992), who summarised the factors into geostrategic considerations and security environment, politics of the budgetary decision-making process, the influence of financial and economic constraints, and others. Their study indicated that the literature around geostrategic considerations has shown a linkage between national security and threat perception, and defence expenditure and economic development. In explaining this further, Ball (2013) used the model of the arms race, which predominantly explains that defence procurement is determined by the political, psychological, and international parameters that emphasise the government's perception of its adversaries and the behaviour of its allies and neighbouring states. There is also the other aspect of "threat perception and inter-state conflict" in which military capabilities of neighbouring states are often seen as both the source of and response to a perceived threat. Weede (1986) argued that international competition and threats to national security lead to higher military participation ratios and large military outlays.

The other aspect of military spending, the politics of the budgetary decision-making process, begins with the proposition that the military is a very important actor in domestic politics, especially in developing countries (Covaleski & Dirsmith, 1986). The activities of the military are therefore determined by bureaucracy and political interactions. They are bureaucratic because the military defends its institutional interest against those of others, usually those organisations from the government. Military institutions are also seen to be political actors in the sense that the military continues to engage in defining its relationship with and power over political institutions and political forces in the country.

Regarding the factor influence of financial and economic constraints, studies have shown that the relative size of government spending has an inherent tendency to grow as the per-capita economy grows (Ayyagari *et al.*, 2008). This generally implies that when the economy in general grows, government expenditure also grows, which will see government spending to various departments also increasing. All departments will generally experience growth in their budget allocation; hence a tendency for that department to increase its spending.

Considering a country such as Botswana, of which Henk (2010) indicated that the mandate has changed after the Southern African Development Community (SADC) region became stable, the defence force is now more inclined to anti-poaching operations, which were low conflict in nature but has escalated to another level due to the type of weapons used by the poachers. Botswana is generally challenged by its long borders. The total boundary length is 4 347.15 km, which is constituted by Namibia: 1 544 km, South Africa: 1 969 km, Zimbabwe: 834 km, and Zambia: 0.15 km (Morton & Ramsay, 2018). This on its own poses a serious challenge to the BDF and other security forces entrusted with ensuring a secure boundary. Henk (2005) stated that the military's struggles against poaching in Botswana are a low-intensity conflict but it poses significant intelligence, mobility, and communication challenges. Henk (2005) further stated that the successful execution of the BDF mandate requires effective military planning and good leadership, as well as significant technical and tactical competence. This calls for a well-equipped defence force in terms of mobility both on the ground and in the air, as well as surveillance, to be able to cover ground timeously for the efficient execution of its mandate. This also requires well-trained personnel to be able to operate the equipment and to be able to coordinate activities

in the operational area. It is, however, important that Botswana's military spending is justified along these lines.

2.11 CONCLUSION

The definition of public procurement was articulated as the contractual acquisition of goods and services with appropriated funds by the government through purchase or lease, whether the supplies or services are already in existence or must be created, developed, demonstrated, and evaluated (Andrecka, 2015). In comparing public procurement with private procurement, it was shown that although both have the same intent and purpose, private entities have a fluid and flexible procurement system.

Public procurement was shown to be an important instrument in the economy, especially in supporting economic growth and development, on the one hand, and helping businesses innovation, on the other hand. The discussion elaborated on the principles of public procurement, which are not only limited to planning and managing for great results, fairness, getting the right supplier, best value for money/efficiency, accountability, transparency, and equity/competition. The legal framework must be designed in such a manner that there is no room for corrupt practices and where all citizens derive equal benefit.

The steps in procurement as defined by Erridge (1995) discussed in this chapter are not cast in stone. It is important that in designing these steps, it must be clear in terms of the activities to be conducted at each step so as not to have overlapping roles that may cause audit problems in the long run. Regarding factors that determine defence procurement, it is necessary that a proper evaluation of the defence procurement should be conducted in order to determine the value add, as defence procurement has often been found to be in conflict with other national priorities. As suggested in the chapter, there are different models for analysis and the PESTEL is one that can be engaged. From the foregoing, it is clear that military procurement is conducted differently and with different outcomes, which are predominately criticised by the public. It is thus important that models be put in place that define how military procurement must be conducted in a cost-effective setup, which will enhance the efficiency and effectiveness of the defence force and/or the military institution.

CHAPTER 3: LEGISLATIVE AND POLICY FRAMEWORKS

3.1 INTRODUCTION

This chapter discusses legislative and policy frameworks that govern public procurement in Botswana. The chapter achieves this by discussing the statutory basis; the budgetary process framework; the regulatory agenda, which includes committees and financial thresholds; and citizen empowerment schemes that influence procurement processes. The discussion lastly examines the oversight strategies in Botswana, and more specifically within the BDF. The discussion begins with a conceptual background of oversight in procurement. The rationale is that the primary objective of legislative and policy frameworks in procurement is to ensure accountability and transparency.

3.2 CONCEPTUAL BACKGROUND

According to Gelderman, Paul and Brugman (2006), the procurement process remains opaque, unfair, anti-competitive, and riddled with corruption, whether or not a new law replaces another, which indicates that the problem runs deeper. Gelderman *et al.*'s (2006) view is consistent with the view of the World Bank (2017a). The World Bank (2017a) presents many shortcomings in the global procurement system. Some of the outstanding discoveries of the World Bank (2017a) are the absence of a sound regulatory framework; lack of accountability, efficiency, and transparency in the procurement process; lack of competition; and widespread abuses and fraud in the system. In other words, these are common variables in global procurement systems. In view of the foregoing, a number of studies, including by Hui, Othman, Rahman and Haron (2011) and Ameyaw, Mensah and Osei-Tutu (2016), have maintained that procurement remains inadequate and without proper oversight in defining the public procurement process. In order to ensure that public resources are not misused, an oversight body or regulations are imperative.

The conviction expressed in Hui *et al.* (2011) is that a central purchasing authority can ensure purchasing integrity, fix accountability, and provide for the efficient transition of goods and services between the supplier and the consumer. Furthermore, Ameyaw

et al. (2016) contended that a central purchasing authority is desirable to limit the power of the agency; to ensure professionalism, consistency, and accountability in the conduct of public business; to provide for maximum procurement planning; to standardise the purchase of commonly used goods and services; and to link diverse agency needs in order to take advantage of economies of scale.

There is a contrary view regarding the existence of an oversight body in procurement practice; for example, Kagendo (2012) criticised the World Bank's report of 1997 and argued that a decentralised purchasing oversight body is necessary to provide more responsive support to end users, eliminate unnecessary and procedural obstacles to programme flexibility, improve interdepartmental coordination, and empower service delivery managers to procure what they need without impediments caused by a centralised organisation. Similarly, Rogers (2007) maintained that strengthening the procurement process does not lie in the establishment of oversight bodies, but in the procurement department's ability to position itself as an integral part of the business strategy, which it can run more effectively and efficiently.

In other words, Rogers' (2007) argument is that the solution to whatever problem that bedevils procurement must not come from outside, but from within. Wensink and De Vet (2013) concurred with Rogers (2007) and asserted that a good purchasing department must maintain focus on three key imperatives: people, processes, and technology. One cannot exist without the other. Wensink and De Vet's (2013) view was that procurement departments must have advanced tools, executive-level support, and cross-company commitment. The cross-company approach is what really drives procurement leverage and ultimately the bottom-line impact.

The position of this study is that oversight bodies are imperative for procurement efficiency. The rationale is that some public officials would claim urgency as an excuse to award a single contractor without competition, disqualify potential suppliers through improper pre-qualifications, interfere improperly in the work of evaluators, restrict information about contracting opportunities, and breach the confidentiality of suppliers' offers; among others.

This is consistent with the view of Lynch and Angel (2013) that public procurement requires a solid legal and policy framework, which emanates from the laws sanctioned by the judicial system of a particular country. Lynch and Angel (2013) further noted

that laws are further expanded through policies, procedures, manuals, and guidelines for the purposes of standardising and closing any gaps in the process. In the context of Botswana, however, public procurement is guided by several statutory elements that attain their legitimacy from the Constitution of the Republic of Botswana (hereafter referred to as the Constitution). Some of them include the Financial Management Act, Financial Procedures, and the PPADA; to mention a few. The question is, to what extent have they provided for defence procurement, considering the nature of Botswana's procurement processes?

It is thus important to investigate Botswana's legislative and policy frameworks that govern procurement. This discussion shows how the legal framework has become a contributing factor in regulating and informing public procurement regulatory activities in Botswana.

3.3 LEGISLATIVE AND POLICY FRAMEWORKS

Legislative and regulatory frameworks refer to the policies, laws, guidelines, and/or regulations that govern procurement in an organisation (Russell, 2016). It was highlighted in the introductory chapter of this study that every organisation, be it public sector, private sector, or third-sector entities, has some rules that govern the acquisition of goods, works, and services to ensure fulfilment of its goals. Legislative and regulatory frameworks in the context of this study involve the laws, regulations, and policies that govern the implementation of the procedures and processes necessary to acquire goods, works, and services of public sector organisations.

The following sections discuss the legislative instruments and policies in the public procurement space. These are very critical for the public procurement process; especially how these pieces of legislation contribute to the impact of the procurement process on defence capability.

3.3.1 The Constitution of the Republic of Botswana

The constitution of a country is the supreme law. No law is supposed to contradict this body of law but must support it. According to the World Bank (2017b), a constitution is the basic principles and laws of a nation, state, or social group that determine the powers and duties of the government and guarantee certain rights to the people.

National procurement policies or laws must support the constitution. Anything to the contrary is null and void.

Botswana's Constitution was developed from 1959 onwards through the Constitutional Committee's Joint Advisory Council, which was later modified in 1963 towards the elections in 1965 (Morton & Ramsay, 2018). The Constitution comprises nine chapters that each provides details such as individual rights and designation of powers. For the purposes of this study, the focus is on Chapter 8, which elaborates on issues of finance, under which procurement is a function.

Section 117 of the Constitution states: "All revenues or money raised or received for the purposes of the Government of Botswana (not being revenues or other moneys that are payable by or under any law into some other fund established for a specific purpose or that may by or under any law be retained by the department of Government that received them for the purposes of defraying the expenses of that department) shall be paid into and form one Consolidated Fund". Sections 118 to 124 further explain when withdrawals can be made from the fund and that such withdrawals must be in line with the Constitution and or any Act of Parliament. Section 119(1) empowers the Minister of Finance and Economic Development and states that "[t]he Minister for the time being responsible for finance shall cause to be prepared and laid before the National Assembly, before or not later than 30 days after the commencement of each financial year, estimates of the revenues and expenditure of Botswana for that year. (2) The heads of expenditure contained in the estimates for a financial year (other than expenditure charged upon the Consolidated Fund by this Constitution or any other law) shall be included in a Bill to be known as an Appropriation Bill which shall be introduced into the Assembly to provide for the issue from the Consolidated Fund of the sums necessary to meet that expenditure and the appropriation of those sums for the purposes specified in the said Bill".

It is this piece of legislation that empowers the state to acquire public goods and services that are essential for the development of society, including those needed for the provision of law and order. This piece of legislation empowers the process of public procurement to take place through different institutions. It is through government institutions that these goods and services are availed to the public for consumption (Ostrom & Ostrom, 2015). The Constitution as the supreme law makes provision for

the establishment of other laws, regulations, and procedures for good management of funds. Since the BDF is an organ of state, all its procurement processes must adhere to the Constitution.

The disadvantage to defence procurement in terms of the Constitution is that it did not empower the military to conduct its procurement differently; hence it is conducted in line with normal goods and services. This may be primarily due to the fact that at the time the Constitution was drafted, the BDF did not exist. It was only in 1977 that it was established through an Act of Parliament. The following subsections of this discussion focus on laws that define and govern procurement using public funds.

3.3.2 Public Finance Management Act

The Public Finance Management Act was established in line with Chapter 8, section 116, of the Constitution, to make further and better provision for the control and management of public money and public supplies and for matters connected thereto. The Act replaced the Finance and Audit Act. Section 6, which empowers the Minister of the MFED to designate an accounting officer who shall be responsible for laying the annual estimates of revenue and expenditure of the Consolidated Fund in respect of each head thereof, designates a public officer to be the accounting officer for such a head.

This Act focuses on the control and management of public finances and public supplies (Part I, sections 4 to 18), loans, guarantees, and grants (Part III, sections 19 to 27) expenditure (Part IV, sections 28 to 35), development fund and special funds (Part V, sections 36 to 41), the auditor and accounts (Part VI, section 42), and surcharge and supplementary funds (Part VII, section 43).

The purposes of public finance management are overall fiscal discipline, allocation of resources to significant social needs, and efficient and effective allocation of public services (World Bank, 2017a). Public finance management is very critical for the development process of an economy. Rigorous public finance management supports control, accountability, and efficiency in the management of public resources and delivery of services. It is based on this principle that the government of Botswana introduced the Public Finance Management Act to adhere to the principles of control,

accountability, and efficiency. In it there are guiding principles that are the foundations of principles of public procurement.

The public procurement process is facilitated through this Act, as it empowers the minister to draw from the Consolidated Fund in line with the Constitution. The minister, through an Appropriation Bill on annual basis, where he/she presents the annual budget to the parliament, avails funds for the procurement of goods and services for the public. This is the initial or first step in the public procurement process. The amount of funds made available to the procuring entity will determine the extent to which a national good or service can be provided.

3.3.3 The Public Procurement and Asset Disposal Act (PPADA)

The PPADA of 2001 established the PPADB and its committees and provides for the procurement of works, supplies, and services for the disposal of public assets and related matters (Republic of Botswana, 2001). This Act was established in line with section 118 of Chapter XIII of the Constitution to regulate all entities of the central government that are involved in public procurement or the disposal of public assets, whether they are located abroad or in Botswana; however, the minister may make an exception through a notice published in the Gazette (Republic of Botswana, 2001). The role of this Act is further emphasised in Chapter 4.1 of the PPADB (2014a) manual which states that “all contractors involved in any aspect of public procurement using Botswana Consolidated Fund are required to adhere to the rules and regulations stipulated in the PPAD Act of 2001 and Regulations of 2006 and the Operations Manual”.

The PPADA stipulates the establishment, constitution, and membership of the board. It further stipulates the meetings and proceedings, as well as the powers and functions of the board. Part IV of the Act stipulates the levels of procurement of Botswana, which are apart from the micro-purchasing of a threshold of P50 000 for MTCs, DATCs, and SPTCs (Republic of Botswana, 2001). Section 65 of the PPADA explains the financial ceilings for these levels of procurement.

The Act on its own does not make any separate provision for defence procurement; it only established the Special Procurement and Asset Disposal Committee (SPADC), which does not give any advantage to defence procurement in any way. Lack of

provision for the defence force results in defence procurement being conducted like any other goods and services, which results in challenges faced by all departments.

3.3.4 Financial Instructions and Procedures

The Financial Instructions and Procedures were issued by the Minister of Finance and Economic Development in line with section 52 of the Finance and Audit Act. This Act was recently replaced by the Public Finance Management Act. These Instructions and Procedures apply to the control and use of public funds as defined in the Act (Ministry of Finance and Economic Development [MFED], 1993). The Instructions ensure proper records of monies received and discharged from the Consolidated Fund, debt management, and audit of the fund (MFED, 1993). Chapter 8 of the Constitution provides for the establishment of the Consolidated Fund.

From the Consolidated Fund, the minister can withdraw money for development and provision of services to the public. The minister initially presents to the parliament budget estimates from different departments to pass an Appropriation Bill, which entitles the minister to spend from the Consolidated Fund. After the Bill is passed, the Minister of Finance empowers the Accountant General to ensure that transactions are conducted in line with budgets and allocations. The Accountant General therefore establishes Instructions and Procedures for conducting procurement, payments of grants, and other related activities facilitated by funds from the Consolidated Fund. The Accountant General does this through the establishment of the Financial Instructions and Procedures Manual.

Although there should be controls for the use of public funds, the Instructions and Procedures were not customised to meet different procurement needs and environments. In this case, defence procurement has always had to request waivers for some of its international procurement. This leads to delays in deliveries and therefore negatively impacts on equipping the defence force.

3.3.5 Supplies Regulations and Procedures

The Supplies Regulations and Procedures were issued by the Minister of Finance in line with section 44 of the Finance and Audit Act (Chapter 54:01), which is now the Public Finance Management Act (Chapter 54:01) of 2013. These regulations are

applied to the purchasing, safe custody, issue, sale, or other disposal or stock taking of such supplies (MFED, 1993). The purpose of Supplies Regulations and Procedures is for the management of public procurement activities in line with the set rules and practices.

3.3.6 Public Procurement and Asset Disposal Board (PPADB) Operations Manual

The PPADB Operations Manual is a document intended to put in place the standard operating policies and procedures for public procurement. The Operations Manual is designed to assist procurement staff with the management of procurement and asset disposal. It provides an essential knowledge base that imparts a clear understanding of what is expected to be done and how it should be done. Chapter 2 of the manual states that “all civil servants, contractors, public enterprises and parastatals, local authorities, consultants or private sector firms, suppliers involved in procurement activities will be bound by the policies, procedures and practices appearing in this manual, which may change from time to time in line with the provisions of the PPAD Act and Regulations” (PPADB, 2014a).

The significance of procurement legislative and regulatory frameworks is to clearly define the rules that govern the procedures and processes of every aspect of public procurement management and to ensure the achievement of the principles of public procurement to the fullest. The legislative and regulatory frameworks for procurement in Botswana are intended to support the economic development policies. It is important to note that public procurement is a part of the actual implementation of government expenditure in the GDP Economic Model. How procurement is conducted is very important for the achievement of the delivery of public goods and services and economic development. Public procurement legislative and regulatory frameworks are intended to ensure that principles of governance are adhered to equitably. Despite all these pieces of legislation, there is a need for oversight.

3.4 BOTSWANA’S PUBLIC FUNDS OVERSIGHT FRAMEWORK

Chapter II (sections 201 to 212) of the Finance Instructions and Procedures summarises the public finance oversight authority and responsibility. The authority

emanates from Chapter VIII of the Constitution, which provides for the creation of the Consolidated Fund. The Constitution further provides for a law that must be passed every year called the Appropriation Act. The Appropriation Act aims to authorise payment out of the Consolidated Fund and the Development Fund of sums of money for a year to commence on 1 April. The Constitution further provides for expenditure and any withdrawals to be made from the Consolidated Fund.

There is also the Public Finance Management Act, which provides for the establishment of development funds that are meant to fund government projects for economic and social development. It is the responsibility of the Minister of Finance, on an annual basis, to prepare and present before the National Assembly estimates and expenditure for each year. Under the MFED, the Accountant General is responsible for dispatching or receiving money from the Consolidated Fund (Republic of Botswana, 1966). The government is divided into ministries that are responsible for the provision of goods and services related to people's needs. The line of authority is that ministries submit their estimates to the Minister of Finance, who discusses it with the Executive and presents it to the National Assembly for approval (Republic of Botswana, 2013).

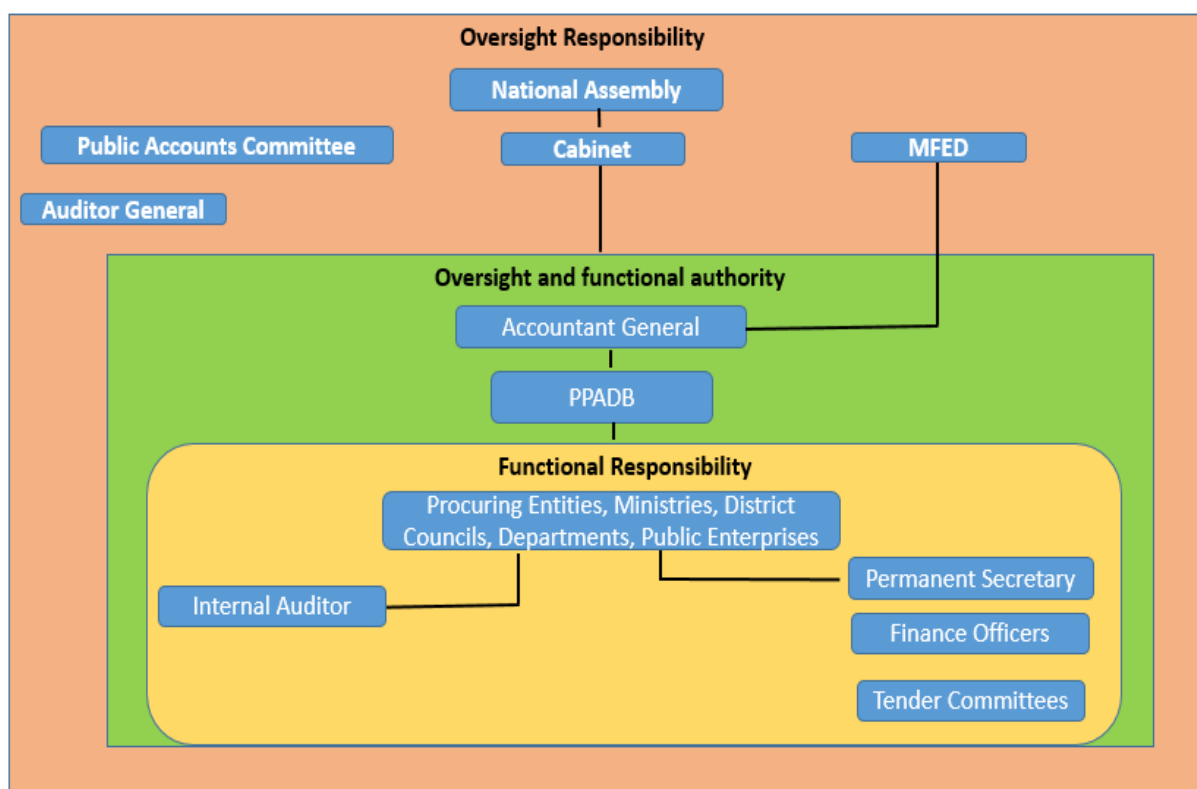
After the National Assembly gives authority to withdraw from the Consolidated Fund by passing an Appropriation Bill and Act, the responsibility then lies with the minister responsible for finance and economic development (Republic of Botswana, 2013). However, there are public accounting procedures that require the Minister of Finance to account to the National Assembly for all expenditure and revenues. This gave birth to an independent Public Accounts Committee, which is constituted by members of parliament from both ruling and opposition parties.

As highlighted above, the Accountant General is responsible for transactions from the Consolidated Fund. The Accountant General is a department in the Ministry of Finance and is located at the ministry's headquarters. Some of the expenditure under the Accountant General includes payment of civil servants' salaries, collection of revenue, and banking (Republic of Botswana, 2013). The Accountant General has delegated some of these responsibilities to towns and districts to ensure an efficient and effective mechanism. The officers may be seconded from the MFED. While different responsibilities are given to the Executive, National Assembly, and the MFED, the

Auditor General is established, as per the Constitution, with independence to ensure that it is free from political influence to ensure that the government's books of accounts are audited.

Figure 3.1 summarises the overall oversight authority and functional authority of Botswana's public procurement process, which cascades into ensuring that the public is facilitated with goods and services for economic and social development. It is a model as modified from that of the state of Belize, formerly called British Honduras (Government of Belize, 2013). This model was influenced by the British system due to the state having been colonised by the British until its independence in 1981. Botswana was also a protectorate of the British Empire; hence the similarities between Botswana and Belize on issues of governance. Also, as Morton and Ramsay (2018) indicated, the dual budgeting system was adopted from Tanzania, and the same concept as in the case of Belize applies.

Figure 3.1: Botswana's public procurement oversight framework



Source: Developed by the author as adopted from the Government of Belize (2013)

The summarised oversight function of different levels of governance provides a clear picture of different stakeholders in the public procurement process. As the literature

has indicated, procurement is facilitated by the availability of funds. Budgeting is therefore a significant activity in the procurement process. The following discussion focuses on Botswana's dual budgeting system, as well as the procurement process.

3.5 BOTSWANA'S DUAL BUDGETING SYSTEM

Botswana's dual budgeting system is said to be one of the longest planning and development systems in sub-Saharan Africa (Lienert & Sarraf, 2001). The budget is run twofold: the recurrent and the development budgets – hence a dual budgeting system. The dual budgeting system was adopted from the Tanzanian national planning system and introduced in Botswana under the Ministry of Finance prior to Botswana's independence. The dual system of budgeting has since been adopted from independence with the transitional plan in 1966 to 1968. During the evolution of Botswana's budgeting system, some functions were consolidated under the Ministry of Finance such as planning; hence the initial name being the Ministry of Finance and Development Planning. Doost (1984) posited that budgeting systems are important as they are tools for planning and controlling expenses, as well as a means by which the government achieves programmes and provides services. The importance of budgeting to this thesis is that it is the backbone of procurement. The absence of a budget means that there will be unguided expenditure. The regulations, on the other hand, do not allow any public expenditure without a budget. Budgeting is the beginning of the process of public procurement, because without it the process cannot begin.

In defining a budget, Lauth (1987) stated that it is the distribution of scarce resources among competing sectors of the economy. In current times, most countries present their budgets on annual basis under recurrent and development/capital budgets. Despite the two running together on an annual basis, the difference is at times difficult to determine. According to Webber (2007), the origins of separate budgets, i.e. where there is a recurrent budget and a development/capital budget, can be traced to the colonial administration. The two budgets are differentiated on the basis that a recurrent budget is meant to meet operational costs on a yearly basis, while a development budget is meant to establish new developments such as building roads and infrastructure, as well as extending the government's administrative function (Webber, 2007). Webber (2007) further indicated that even though the dual budget has been traced to the colonial influence even after the departure of colonialists, most of the

states continued with the same practice. Those who advocate for the dual budgeting method argue that it assists in separating the cost of government and the cost associated with raising current revenues with determined new development plans and associated financing needs.

For most post-conflict states, the method of dual budgeting continues to be relevant as the heavy requirements for financing reforms and reconstruction of the country receive preference. Since it depends on donations and trust funds, there is a dictatorial requirement to maintain the dual budgeting system. In advocating for the dual budgeting system, governments posit that different skills are required to manage the two, with a recurrent budget requiring fewer skills as it is conducted on an annual basis and needs few adjustments. On the other hand, capital expenditure requires advanced skills, which include cost-analysis skills and project management skills (Webber, 2007).

Botswana, as discussed above, conducts its budgeting on a dual basis approach. This is a process that takes time over the period of a year. After the budgeting process, around the month of February, the Minister of the MFED presents the national budget, which is categorised as recurrent and development budgets.

3.6 BOTSWANA'S BUDGETARY PROCESS

The adjective "process" comes in to give a definition in the context that is relevant to this study. Van de Ven (1992) posited that a process is used in three ways in the literature: (1) as a logic used to explain a causal relationship in a variance theory; (2) as a category of concepts that refer to activities of individuals or organisations; and (3) as a sequence of events that describes how things change over time. In this case, the thesis adopts the second definition, where a process is defined as a category of concepts that refers to the activities of an organisation.

Some literature has addressed the process of acquisition as part of the procurement process but not as a whole. Botlhale (2017) engaged in defining the discrepancies in the public procurement reforms in Botswana and reported a lack of capacity in subnational bodies, information management constraints, delays in the vetting of tenders, and perceptions of corruption by the public and the media. Little has been

linked to the process to include the budget, which is key to the procurement of goods and services.

In this study, the process is analysed from the macro level, which could be classified as strategic and entails role players such as the Ministry of Finance; Ministry of Defence, Justice and Security (MDJS); the BDF as a procuring entity; the PPADB as the regulator; as well as the MTCs and DATCs as adjudicators. It defines the external factors (business environment) that influences decisions at every stage of the process of procurement at each level. The public procurement process can therefore be defined as the acquisition (through buying or purchasing) of goods and services by government or public organisations and various activities that influence decision making at various stages of the development.

At the beginning of every year, around February, the Minister of Finance gives a budget speech in the form of a proposal. The process of procurement starts with the Ministry of Finance through the preparation of a budget, which emanates from the NDPs. The system of developmental planning is on a five-year basis, which informs the recurrent budget. Botswana is currently on its 11th NDP (2016/2017-2020/2021). The Ministry of Finance, as established through section 119(1) of the Constitution, stipulates the responsibilities of the Minister of Finance (Republic of Botswana, 1966). The Ministry of Finance and Development Planning has the following core functions: Treasury, budgeting and administration, economic management, and national development planning (Republic of Botswana, 2013). These functions are coordinated through the Division of Budget Administration. Botswana's financial year runs from 1 April to 31 March, during which time the Constitution requires the minister to present the estimates to the National Assembly before the beginning of every financial year (Republic of Botswana, 1966).

The budget process starts around June/July through the issuance of manpower and financial ceilings by the MFED to various ministries (Botlhale, 2013). The government of Botswana has adopted an incremental method of budgeting in which the current year's budget is dependent on the previous year's budget. After various ministries submit their comments, the budget ceiling is concluded and submitted to the Estimates Committee. The Estimates Committee is responsible for making final decisions on the allocation of manpower and financial resources. The Estimates Committee will hold a

meeting attended by the Division of Budget Administration and the estimates are presented to the Minister of the MFED. The minister is empowered by law to adopt the estimates or make some alterations (Republic of Botswana, 2013). A cabinet memorandum will then be prepared and submitted to the cabinet for debate and approval, after which an Appropriation Bill is presented as part of the budget speech in the first week of February. Once the Bill becomes an Appropriation Act and is published in the Government Gazette, the Minister of Finance issues General Statutory Warrants to the Permanent Secretary, who also issues the same to the ministries and departments to commence spending on 1 April (Republic of Botswana, 2013).

Warrants are issued to various ministries, who also engage further on the allocation to various departments. An example is in the MDJS, which has five departments, namely the BDF, Botswana Police Services, Directorate of Intelligence Services, Department of Justice, and the Prisons Department. Deliberations at ministerial level will subject the allocations to further reallocations. This is where departments justify the need for projects over other departments. After allocations from ministries to departments, each department will further appropriate warrants to sub-warrants for actual procurement. When the units conduct their procurement, the MTC, DATC, or PPADB will have to adjudicate and that is when a contract can be put in place for actual procurement. Figure 3.2 outlines the timelines of Botswana's procurement process, which runs simultaneously with the budgetary process based on what prevails on the ground through communication.

Figure 3.2: Procurement cycle vs budgeting process

Source: Developed by the author (2019)

The procurement timelines as depicted in Figure 3.2 clearly indicate that the procurement process and the budgeting system run almost parallel. What is important to note is that the previous year's procurement informs the following or current year's budget. The following are relevant to this discussion: that military procurement, especially of capital items in nature, are rarely available off-shelf; that such procurement is administered under a development budget, which runs for only 12 months; and that the funds are returned to the Consolidated Fund once they were not spent in a year. This translates into a system that does not support military procurement. In the actual sense, the military budget is eroded on a year-to-year basis; hence it is unable to conduct future procurement because the funds were returned for reallocation.

In summary, what Figure 3.2 depicts is a sequence of events related to the procurement process against time. This model was developed from ground experience as events usually unfold over time. The average activities for major procurement usually happen within six months or less. Around November, the Director of Finance usually issues a circular to inform procuring entities not to issue purchase orders for

items that are possibly deliverable outside the financial year. This poses a handicap to equipping the defence force on its own.

On an annual basis, before the military can evaluate what it had spent and what it needs to replenish for the following year, it is already required to submit a budget. This system does not align the actual procurement with the plan. The development budget is treated the same as the recurrent budget, which has completely different objectives. The recurrent budget is for the short term, while the development budget is for the long term. In the sense that defence capability is more dependent on the development budget, which does not support its procurement environment, there is thus a potential impact on the projected capability of the defence force.

3.7 PUBLIC PROCUREMENT OVERSIGHT IN BOTSWANA

According to Rutherford (2016), one of the paramount objectives of procurement oversight is not only to increase the integrity of public procurement but also to oversee a selected number of procurements with an agreement from the respective contracting authorities to open the selected procurements to external monitoring.

In Botswana, the oversight authority is charged with maintaining oversight over the procurement system and is tasked with ensuring that the procurement procedures are complied with, monitoring and reporting on the functioning of the procurement system, developing procurement policy, and assisting in the operations of public procurement by developing the appropriate documentation, assisting procuring entities, and supporting the capacity development of the procurement workforce.

Practically, the precise scope of oversight generally includes the legality, transparency, and efficiency of procurement. In other words, although the main objective of this oversight mechanism is ultimately to prevent and deter corrupt practices in procurement, it can bring a much wider range of benefits, such as increased transparency and accountability, enhanced trust in authorities and government contracting, contributing to a good reputation among contracting authorities, and saving costs.

Procurement oversight in the military is essential as it can be used for high-risk or complex procurement, major work projects, or projects with high national or regional

public interest and sensitivity, where an additional layer of control is needed to ensure that public funds are handled correctly. Oversight is a necessary tool as it is critical to ensure quality, cost, and timely delivery of a service or a project by third parties. Basheka (2009) emphasised that a well-functioning public sector requires oversight mechanisms (checks and balances) to guard against uncertainties and to ensure accountability in the use of public funds.

As a way of reforming military procurement, Perlo-Freeman and Solmirano (2012) suggested that key principles for effective reforms should be addressed. These include tackling the “national security exception”, engaging the parliament and civil society, addressing all stages of the procurement cycle, and holistic efforts to tackle corruption. The review confirms that the offers received are the result of a fully compliant process, that sufficient funding exists, and that risks have been assessed and mitigated.

The following discussion focuses on different institutions of authority, their functions, and their authority level.

3.8 THE PPADB

In reforming the public procurement sector, there was a need to establish an independent public procurement regulatory authority that would be responsible for the application of procurement law, monitoring compliance with the regulations, playing an advisory role to the government on procurement procedures and potential changes to the law, and implementing recommendations by the government (PPADB, 2014a). Each procuring entity will continue with responsibility for procurement activities, i.e. planning, tendering, evaluation, and recommendations, and thereafter contract negotiation, delivery and inspections, and post-contract activities. A procuring entity is defined as “ministries, departments, agencies and all other organisations that are designated, from time to time by the government of Botswana as a procuring entity. Procuring entities are generally entities that are deriving public funds for their main activities and in essence they are contracting authorities” (PPADB, 2014a).

The PPADB was established as a parastatal after the introduction of the PPADA in 2001. The main role of the PPADB is to adjudicate and award tenders for the government departments of Botswana. Other roles of the PPADB include, but are not limited to, “contractor registration and discipline, issuing of standardised bidding

documents, vetting of tender documents prior to issue, capacity building, compliance monitoring and providing overall advice on public procurement and asset disposal in order to improve efficiency” (PPADB, 2012). The PPADB was necessitated by some factors that include “rapid expansion of volume of procurement, shift in procurement budget from simple supplier-based contracts to technically sophisticated works and services, donor-funded projects, [and] lack of efficient citizen involvement in public procurement to promote transparency, accountability and efficiency”. The PPADB started its operations in 2002 after the endorsement of the PPADA (Chapter 42:08 of 2001).

There are also MTCs, which are established in terms of section 61 of the PPADA. Committees are appointed by the PPADB and comprise officials from ministries to carry out duties delegated to them by the PPADB as per the Act. The threshold for MTCs ranges from P25 million to P320 million. These financial thresholds are reviewed every two years based on performance and capacity (PPADB, 2016).

Another level of procurement is the DATCs as defined under section 62 of the PPADA. The members are appointed by the PPADB on the recommendation of the district commissioners in the districts and deputy commissioners in the sub-districts. The PPADB currently delegates authority to 28 DATCs. The officials are appointed from the district and adjudicate and award tenders ranging from P2 million to P10 million in value (PPADB, 2016).

The SPADC was established under section 63 of the PPADA. It adjudicates on the procurement of classified highly sensitive supplies, works, and services from the disciplined forces such as the BDF, the Botswana Police Service, the Directorate of Intelligence Services, and other institutions that need classified procurement. These goods, services, and works are classified as confidential and secret and are expected to be treated as such. There is no specific threshold at this level. The cost may be lower than for the MTC or the DATC but the classification takes precedence (PPADB, 2016).

Defence procurement is not immune to these procedures and regulations. Regulation 19(1) of the PPADA Regulations states that “[p]rocurring entities of the Defence Force, Police Service and other security organs of the State may conduct their procurement through an open or restricted list basis”. Subsection (3) further explains that “[u]nless

otherwise provided under the Act or these Regulations, the Defence Force, Police Service and other security organs of the State shall comply with the provisions of these Regulations” (Republic of Botswana, 2001). The defence procurement of supplies, works, and services is conducted as per the regulations and authorised as per the prescribed thresholds. Only specialised defence equipment or weapons are adjudicated by the SPTCs, regardless of their value.

According to the PPADB’s report of 2014, Botswana’s public procurement constitutes 70% of the GDP (PPADB, 2014a). This makes public procurement a very sensitive activity in both the public and private sector. Like most countries, Botswana is not an exception of malpractices, which include political systems conducting government business, varying degrees of flexibility or rigidity, or self-interest of certain government officials. In retrospect, procurement activities suffered from negligence, poor coordination, lack of direction, lack of open competition and transparency, corruption, and lack of skilled manpower for timely and cost-effective delivery of services (PPADB, 2014b).

The report further established that an inflexible and bureaucratic system of procurement contributes to contract delays, increased costs, manipulation of contracts, and lack of fair competition. Public procurement is largely seen as slow, ineffective, expensive, and corrupt. As a way of reforming public procurement in Botswana, the PPADB (2014a) developed the Operations Manual: Standard Operating Policies and Procedures for Public Procurement. This manual is for assisting procurement staff and management with what is expected of them and how public procurement must be conducted. All civil servants, parastatals, local authorities, private sector companies, and suppliers are bound by the policies, procedures, and practices in this manual, as amended from time to time.

The philosophy behind public procurement is through the adoption of key principles of procurement. This manual governs all concern groups in line with the PPADA (Republic of Botswana, 2001). Botswana, like many countries, has taken steps to align its public procurement regulations with those of the rest of the world through multinational agreements such as the World Trade Organization, Government Procurement Agreements, as well as international bodies such as the International Monetary Fund, the Organisation for Economic Co-operation and Development, the

World Bank, and the EU, among others (PPADB, 2014a). Aligning the procurement system with these organisations is intended for implementing best practices and conducting procurement in line with their principles.

Despite all these procedures put in place, it has been shown that the advantages of such an arrangement are far outweighed by the disadvantages. The PPADB as an oversight authority also has an adjudication role. This on its own creates conflict as the PPADB becomes a player and a referee at the same time. This raises concerns such as how the PPADB can influence the procurement process as it forms part of the business environment from a legal perspective. The regulatory body (the PPADB) further emerges as a major stakeholder in the procurement process by virtue of its role. Different methods have been designed that are aimed at facilitating the efficiency of the procurement process while working in line with the policies and procedures.

It is further important for the understanding of the military business by both the legislators and those designated with the role of oversight. Ball and Len (2006) indicated that legislatures in the African region face many challenges as they seek to exercise their oversight functions. According to Ball and Len (2006), this includes a dearth of technical expertise in military issues, lack of communication with their military counterparts, inefficient use of the committee system, and inexperience in drafting legislation on defence issues. Ball and Len (2006) further indicated that prior to the advent of political pluralism and competitive politics in the region, defence policy and legislation drafting was traditionally the domain of a strong executive branch that also monopolised interactions with the military, which led to legislatures, where they existed, simply “rubberstamping” initiatives forwarded to them by the Executive (Ball & Len, 2006). The challenge of oversight shifts between those empowered with oversight authority and those with specific technical expertise or skills. This constitutes an environment where hierarchies are developed in the interest of a few. It must be determined in the analysis if the BDF is exposed to such an environmental factor.

3.9 TYPES AND METHODS OF PUBLIC PROCUREMENT

There is a general agreement that there is no specific procurement method that is the best for a certain project, and no specific procurement method is better than others (Love, Skitmore & Earl, 1998). Different methods have been developed for projects

but the selection of a procurement method has always been a challenge; however, experienced clients are likely to settle for a procurement method that has worked well for them in the past (Mortledge, Smith & Kashiwagi, 2006). Accordingly, Love, Davis, Edwards and Baccarini (2008) emphasised that the selection of a procurement method is influenced by the external environment, the client's characteristics, and the characteristics of the project itself; hence there is a need to conduct a thorough assessment before selecting a method. Among the most emphasised characteristics of a good method are timeliness, as early delivery is important; flexibility, as variations may be necessary after the commencement of the project; quality, because the quality of the project is important; and risk, as risk transfer is important. All these factors must be considered, and have also been submitted by others such as Skitmore and Marsden (1988) and Bennett and Grice (1990).

Aligning these arguments with Botswana's public procurement methods, as outlined in the PPADA (2001), it is still to be determined whether the methods are in line with the factors for a good method, as opposed to principles of procurement or predetermined thresholds. In discussing the methods, it will be indicated whether these methods are advantageous or disadvantageous to Botswana's military. It will further establish how the procurement process can be enhanced to equip the military for efficiency and effectiveness.

The Operations Manual, in section 8.2, classifies procurement into the following three types:

- (i) Procurement of supplies, which entails the acquisition of physical products, articles, or equipment to be delivered to the procuring entity. It involves delivery and transfer of ownership from the supplier to the procuring entity. This may involve installation and connectivity to services (water, gas, or electricity).
- (ii) Procurement of services entails acquiring services by the procurement entity that facilitate or create change. These services may include security guards or cleaning services, or the procuring entity may seek professional or advisory services such as consultancy services.
- (iii) Procurement of works, which involves physical construction such as building schools, construction of roads, extension of existing service centres,

demolition of a physical structure, or even reconstruction or refurbishment of an old building (PPADB, 2014a).

This study is more focused on the first type.

In conducting the above three types of procurement, one must follow a defined method of procurement as per the PPADA. The methods of public procurement are outlined in the PPADA Regulations of 2006 in sections 55 to 61 (Republic of Botswana, 2001). The procuring entity should use the procurement method in line with the provisions of the regulations. The regulations have set up two main parameters as determinants of the choice of method, namely the estimated value of the requirements, and circumstances pertaining to the requirement. The value of goods and services shall be the main determinant of the choice; however, such a choice must be in line with the guidelines as prescribed in the manual. The following sections discuss the different methods of procurement established for procuring entities.

3.9.1 Open domestic bidding

This is a method of procurement where all relevant companies that are resident in Botswana can compete. It does not restrict the number of companies to enter the bidding but only domestic companies should compete; however, foreign bidders may participate subject to eligibility requirements. This is the preferred method for supplies, services, and works as it is intended to give the Botswana an opportunity to take part in procurement. This method is to the disadvantage of the BDF because it attracts too many suppliers, which makes the process of evaluation and award lengthy. This further brings about disputes as domestic bidders often feel entitled over international bidders, which delays the delivery of goods and services because they outsource from outside Botswana. Bidders become very influential in this method of procurement and thus become major stakeholders in the business environment.

3.9.2 Open international bidding

This method includes both domestic and foreign companies and is published in the Government Gazette. This method is used where foreign bidding participation may enhance competition, where it is anticipated that foreign bidders will increase value for

money, or where there is a high level of technical complexity that may be enhanced by foreign bidders. This method of procurement should be given the widest publicity both nationally and internationally (Republic of Botswana, 2001). This method is to the advantage of the BDF as Botswana does not have the capability to produce defence equipment locally; hence opening up to international markets provides the opportunity to procure what is not available in the local markets. This method is also to the disadvantage of the BDF in the sense that it attracts a wide range of bidders, which makes the evaluation process longer and which may result in losing funds for a financial year. This is a method that further involves international treaties in the case of an award to an international company. This may delay delivery and may attract more charges as some duties may be imposed, which impacts further on the limited defence budget.

3.9.3 Restricted international bidding (RIB)

The RIB method is where foreign bidders are allowed to compete for the delivery of supplies, services, or works on a selective basis. The method is subject to Regulation 57(1) of the PPADA, which requires that this method can only be used where supplies, services, and works are available from a limited number of suppliers, where there is limited time to conduct open bidding, where the value does not exceed the threshold stated in the guidelines, or where there are other circumstances that compel deviation from open bidding. For a procuring entity to adopt the RIB method, prior authority must be sought from the PPADB or its committees. Suppliers are directly invited to bid without public advertising (Republic of Botswana, 2001).

This method gives an advantage to the BDF where it is guaranteed that goods or services will be delivered from manufacturers and not through agents. Acquisition through agents has been shown to have disadvantages in terms of the delivery of obsolete stock and sometimes the wrong items. The same method also creates disadvantages as, similar to open international bidding, goods and services are subject to additional charges such as duties that may erode the already limited defence budget. The process of acquisition from the international market is sometimes not in line with Botswana's budgeting process; hence chances of losing the allocated budget in a given year increase.

3.9.4 Restricted domestic bidding (RDB)

The RDB method is where bids are restricted to domestic companies for the delivery of supplies, services, or works on a selective basis. The method is subject to Regulation 58 of the PPADA. Like the RIB method, the RDB method requires that it can only be used where supplies, services, and works are available from a limited number of suppliers, where there is limited time to conduct open bidding, where the value does not exceed the threshold stated in the guidelines, or in other circumstances that compel deviation from open bidding. For a procurement entity to adopt the RDB method, prior authority must be sought from the PPADB or its committees, and suppliers are directly invited to bid without public advertising.

As the method requires that, before its adoption, permission must be sought from the PPADB, it shows the bureaucracy involved, which lengthens the procurement process. Despite the fact that the method can be adopted when there is insufficient time to conduct open bidding, the process of using this method becomes longer, which results in late deliveries or failure to spend the allocated funds. The method also brings in the implementation of CEE schemes, which further complicates the awarding process and results in split awards or awarding to a company that fails to deliver.

3.9.5 Quotation proposal procurement

This is a method of procurement in which a set number of quotations are sought for supplies, services, or works of a value not exceeding a set threshold. This threshold is reviewed from time to time. The quotation proposals must be in line with PPADA Regulation 59(1). This method can only be adopted when there is insufficient time for open bidding due to emergencies, when the value does not exceed the threshold stated in the guidelines, or in other circumstances where departure from restricted bidding is justified. PPADA Regulation 59(3) requires that there must be a minimum of five quotations for this method but does not limit the maximum number of quotations. Where a minimum of five quotations cannot be obtained, it must be well documented and justified and appropriately signed for audit purposes (Republic of Botswana, 2001).

This is predominantly the most attractive method as it is quicker and the most efficient as the process is shorter. The disadvantage is that it was shown to be the most abused method, which is why it is not encouraged. The other disadvantage of this method is that it is only relevant for the acquisition of small goods or services as the threshold is currently curbed at P150 000. As the quickest and most favourable method, it cannot achieve major procurement of military equipment such as motor vehicles and radios.

3.9.6 Micro procurement

PPADA Regulation 60 defines micro procurement as the type of procurement that procuring entities conduct when the value of such procurement does not exceed the threshold as set out in the guidelines. The threshold is the lowest of all methods of procurement usually conducted on a sole supplier basis without competition and without the bidding package, written bids, or a contract in place. However, there is a need for the procuring entity to obtain supporting documents such as the original copy of the invoice or receipt to indicate the supplies procured and the price paid. Such a procurement should be reported to the MTC within 30 days of the procurement (Republic of Botswana, 2001).

This method, like the quotation method, is also subject to abuse as it involves the use of only one quotation. The selection of a sole supplier and the cost associated are always very controversial. It is a method that is practised daily but has the disadvantage of acquiring only small goods or services and cannot be applied to capital expenditure.

3.9.7 Direct procurement

This is a method of procurement where only one supplier is selected for supplies, services, or works without competition. This method can be adopted where there is insufficient time for another method or when there is an emergency. Other parameters for this method are that there must be supplies, services, or works from only one supplier or it may be preferable to purchase additional supplies from the original supplier for purposes of ensuring continuity (Republic of Botswana, 2001).

This method shortens the procurement process and can ensure the timely delivery of goods or services, especially when there is a purchase of additional supplies from a

supplier who has not supplied before. However, it requires a process of authority from the PPADB, which makes the process longer. One of the disadvantages of this method is that it is prone to legal litigation if it so happens that there is a supplier who has the capacity to supply the same goods, works, or services. Once litigation takes place, delivery is halted, which results in the procuring entity not being able to use the funds available to it in that financial year. The other disadvantage of this method is that, because it is usually associated with the Original Equipment Manufacturer, long-term contracts are put in place, which gives the manufacturer the opportunity to increase prices and thereby exhaust the limited budget allocated to the procuring entity.

3.9.8 Emergency procurement

Emergency procurement is not a method of procurement but is seen as a factor that influences the methods of procurement as discussed above. Emergency procurement should be permitted only for unforeseen circumstances and procuring entities must obtain permission from the PPADB in writing to give reasons and justification for deviating from the set procedures (PPADB, 2014a). The Operations Manual: Standard Operating Policies and Procedures for Public Procurement categorises emergencies into two categories: Category 1: Critical Emergency Procurement, and Category 2: Standard Emergency Procurement. Category 1 is when there is an accident, catastrophe, or calamity in the nation, which, if not attended to, can cause (more) destruction or harm to the nation. Category 2 is when there is a need to mitigate a situation, such as the unexpected consumption of stock and hence a need for immediate replenishment or as the need arises for a stock item that was not in the initial procurement plan (PPADB, 2014a).

As previously indicated, this is not a method of procurement but a method associated with time and situation. It is hardly used because the assumption is that each procuring entity must make its budget well in time and execute it. It is a method that cannot be advantageous to the defence force, especially for equipment and vehicles, as these are capital in nature and may take time to be manufactured and delivered.

3.10 CITIZEN ECONOMIC EMPOWERMENT (CEE) PROGRAMMES

Economic empowerment policies are seen as affirmative action programmes that are meant to address imbalances in the distribution of wealth. This imbalance came as a result of colonialism by European countries (Lekgowe, 2016). Most of the African states that were colonised by Britain saw expatriates owning a larger portion of wealth than the native citizens, who were marginalised (Lekgowe, 2016). Botswana, as previously colonised by the British, was no exception. Although it was long after independence, in 1999 Botswana developed the Citizen Empowerment Policy, which was reviewed in 2012. Botswana's CEE Policy defines such policies as "a set of interrelated interventions aimed at strengthening the ability of the indigenous or citizens of the country to own, manage and control resources, and the flexibility to exercise options, which will enable the natives of a country to generate income and wealth through a sustainable, resilient and diversified economy" (Republic of Botswana, 2012).

As in many other sectors, procurement has attracted significant interest and policymakers found it to be an economic empowerment tool. Each empowerment tool, however, must be defined as to what its main objectives are. Discussions on the Economic Diversification Drive, locally manufactured goods, and economic empowerment of disadvantaged groups follow in the sections below.

3.10.1 Economic Diversification Drive

The Economic Diversification Drive was developed by the Ministry of Trade and Industry in 2011 through a medium- to long-term strategy for 2011 to 2016. The theme of this strategy was "Key Sustainable Economic Growth and a Vibrant Globally Competitive Private Sector". This initiative was the result of the government observation that Botswana's economy was less diversified as it depended greatly on diamonds and other minerals (Republic of Botswana, 2012). Added to that, the country's import bill was standing at P20 billion per year over the past five years to 2011. In the short term, the government wanted to intervene to promote procurement of locally manufactured goods, as well as to provide preference margins and citizen empowerment. The aim of the strategy was to diversify the economy while at the same time reducing the import bill (Republic of Botswana, 2012).

The short-term objectives of this policy were to use “administrative interventions to promote domestic production and consumption, the use of government local procurement, use of government reservations as well as the use of government preferential schemes” (Republic of Botswana, 2012). The long-term objectives were to develop modern technology and skills that would result in a knowledge-based economy in which the Batswana would compete on the basis of quality (Republic of Botswana, 2012). Other schemes aimed at diversifying the economy include the promotion of purchasing locally manufactured goods/services, as well as empowering disadvantaged groups.

3.10.2 Locally manufactured goods

Locally manufactured goods are referred to as “goods and services provided by companies registered in Botswana irrespective of whether or not the companies are wholly owned or controlled by citizens of Botswana” (Republic of Botswana, 2015). The scheme afforded local companies discounts against non-local manufacturers based on the company’s turnover. Companies with an annual turnover of P5 million are afforded 15% discount, those with P5 million receive a 10% discount, while those with P20 million and above are given a 5% discount (Republic of Botswana, 2015). This was done to ensure that procuring entities support local manufacturers through preference margins based on turnover.

This has not given any advantage to procurement processes as some of the local manufacturers do not have the capacity to produce large volumes. This results in importing some of their goods from neighbouring countries, which prolongs the delivery period or results in failure to deliver at all. This is how the effectiveness of the defence force is affected, which defeats its envisaged vision of promptness.

3.10.3 Economic empowerment of disadvantaged groups

The economic empowerment scheme was intended to give the citizens of Botswana who are classified as disadvantaged an opportunity to participate in the economic space (Republic of Botswana, 2012). Apart from other policies such as the localisation policy, privatisation policy, etc., this policy addresses disadvantaged groups in the procurement arch. The defined disadvantaged groups include, women, the disabled,

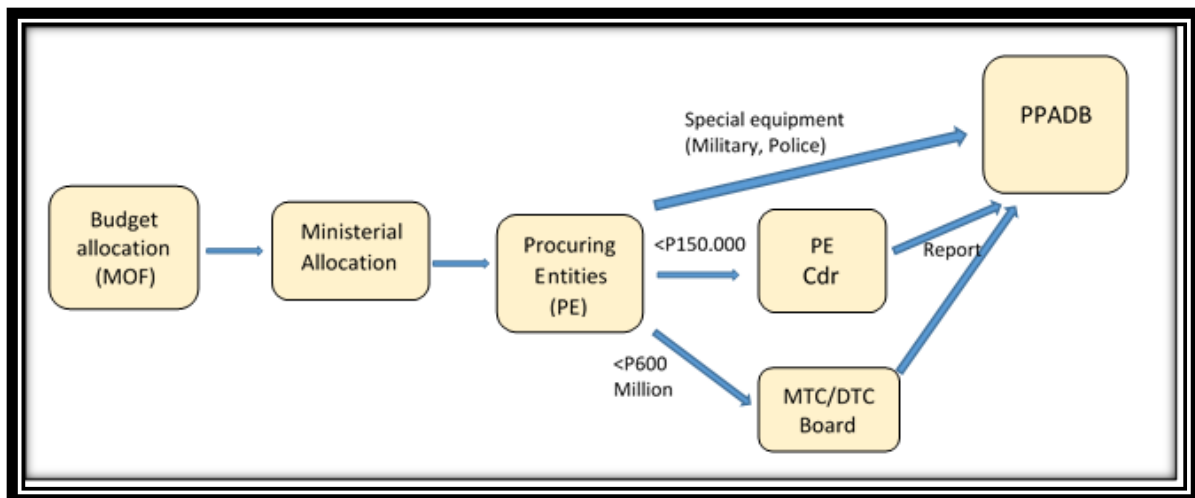
youths, and those in rural areas (Republic of Botswana, 2012). The policy provides for discounting of prices for tender projects to these groups by 20%, while the discount is 15% for quotations or micro procurement.

With all the above schemes, procurement for the BDF is no exception. Despite the fact that most defence equipment is not manufactured locally, the policies apply. This may have a negative impact on efficient defence procurement due to failure to deliver on time or failure to deliver at all.

3.11 THE BDF'S PROCUREMENT

As indicated earlier, the BDF conducts its procurement within the centralised public procurement system. The whole system falls under the PPADB as an oversight authority. Figure 3.3 is a general model of the public procurement process in Botswana, and summarises the budget allocation to the defence force.

Figure 3.3: Botswana's defence force budget allocation and procurement process



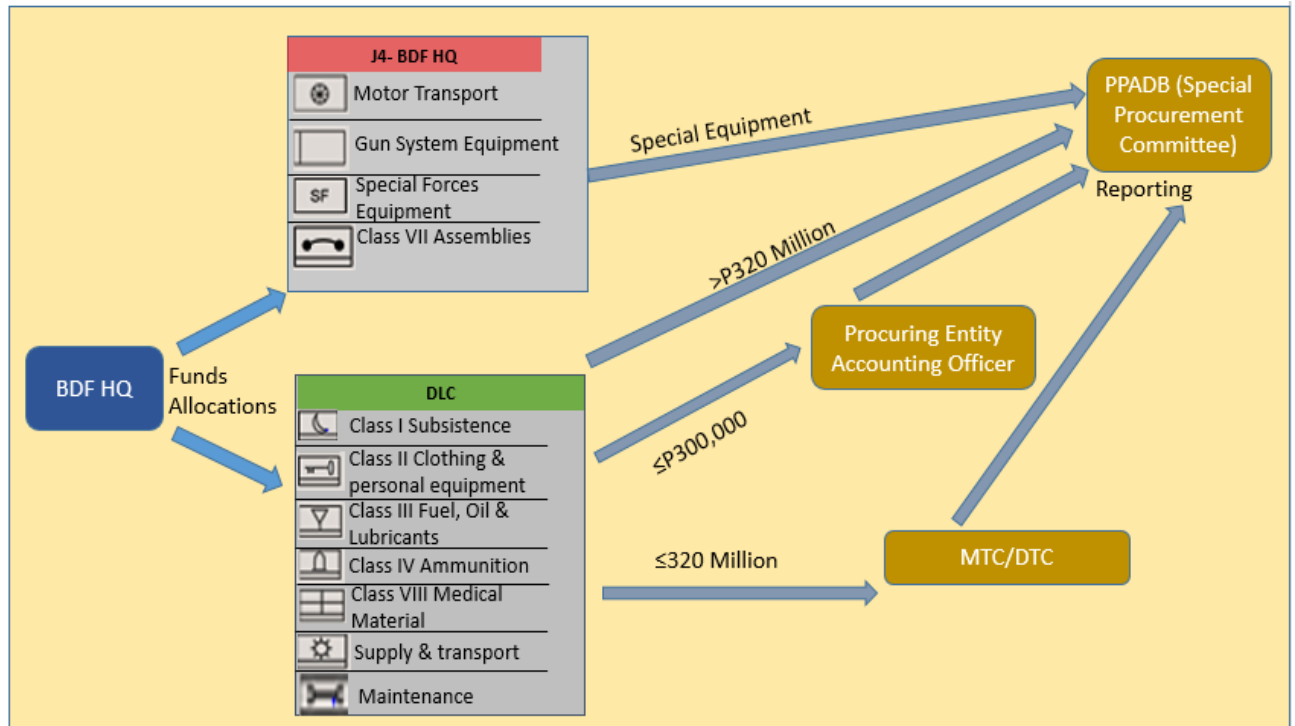
Source: PPADB (2018)

In the above model, the BDF, like any other department or procuring entity, follows the same procedures; however, the BDF also has its own procedures for segregation of duties.

As shown in Figure 3.4, the BDF conducts its procurement through two major axes: the Logistics Function (J4) at the Higher Headquarters and the Defence Logistics Command (DLC) as an independent command. The J4 predominantly procures special equipment as defined by the Commander of the BDF, which is seen to be of a

certain security classification, as well as high-value items for the defence force. After procuring, it becomes the responsibility of the DLC to ensure that equipment is stored properly, as well as distributed and maintained properly. The procurement conducted by the DLC is predominantly of other classes; mainly supplies other than special equipment, major assemblies, and/or weapon systems. Figure 3.4 summarises the functional framework as discussed above.

Figure 3.4: Summary of the BDF's functional framework



Source: Developed by the author

What should be understood is that there is no specific model designed to facilitate defence procurement. This reflects on the problem statement that the defence force continues to experience operational handicaps while conducting its procurement in this centralised procurement system. It is this operational gap that this research intended to explore by assessing Botswana's current procurement setup, as influenced by the business environment and the consequential impact on Botswana's military capability.

An appreciation of Botswana's public procurement framework will provide good understanding during the presentation and discussion of the findings. This framework,

together with other literature, will collaborate to provide guidance on possible recommendations.

Table 3.1: Summary of policy and legislative frameworks

Legislation or policy	Role	Impact on procurement in the BDF
Constitution	The supreme law of the country.	There was no provision for the military from the beginning.
Public Finance Management Act	To make further and better provision for the control and management of public money and public supplies and for matters connected thereto.	Its main focus is development and recurrent expenditure and it has set up a system that is not flexible enough to cater for defence procurement.
Financial Instructions and Procedures	For the control and use of public funds as defined in the Act. Established along the minister's opinion, that it is necessary or convenient to be prescribed for better carrying out of the objects and purposes of the Act or to give force or effect to its provisions or for its better administration.	These are the extensions of the Public Finance Management Act that simply emphasise execution. In the absence of the flexibility from above, the disadvantage to the military is extended through these instructions.
PPADA	An Act to establish the PPADB and its committees and to provide for the procurement of works, supplies, and services, for the disposal of public assets and related matters.	As the oversight authority, it views procurement on the same platform. Although it makes provisions for aspects such as the SPADC, it is not sufficient to resolve the defence procurement dilemma.
Supplies Regulations and Procedures	Supplies Regulations and Procedures are for the management of public procurement activities in line with set rules and practices.	These procedures offer a rigid process that does not contribute to solving the defence procurement dilemma.
PPADB Operations Manual	To assist procurement staff in the management of procurement and asset disposal by providing an essential knowledge base, which imparts a clear understanding of what is expected to be done and how it should be done with the intent to have a methodology at hand that will speed up the business process.	This is just an implementation tool that further makes defence procurement difficult by introducing lengthy procedures that further delay the delivery of goods and services.

Lastly, the integrity and transparency of a public procurement system rely on several control mechanisms. These include an effective control and audit system, and an efficient appeals mechanism. Other mechanisms include a comprehensive information sharing system to enable civil society and interested stakeholders to conduct social audits, as well as effective ethics and anti-corruption measures. Without such control mechanisms, flaws in the procurement system may not be detected and addressed.

3.12 CONCLUSION

Different pieces of legislation were discussed and some of them have been amended over time. All are aimed at ensuring that public funds are prudently used and to the benefit of citizens. Despite the evolution of the legislative and policy frameworks, the question remains as to why the military does not conduct procurement differently considering the uniqueness of the goods and services it requires and the nature of its core business. Based on the literature, the Constitution did not establish the BDF from the beginning, which made it difficult for other pieces of legislation to recognise the uniqueness of the military after its formation.

The dual budgeting system was established in 1965 before the BDF was established, which only came into existence in 1977. There are implications that defence budgeting and execution could have long been left from the onset. This resulted in defence force procedures being superimposed into what was already in existence after its formation. The evaluation of the procurement process, as illustrated in Figure 3.2, shows that the concept of a 12-month procurement cycle is a myth. The underlying fact is that procurement is conducted a few months in a year for capital expenditure, which results in funds being surrendered to the Consolidated Fund. The effects of the budgeting process cannot be neglected in this regard, particularly in line with defence procurement.

The influence of the oversight authority cannot be neglected as being necessary for public sector procurement. As long as the PPADB continues to conduct adjudication, its oversight authority and independence are compromised. It is in the interest of this thesis to determine if the PPADB's role as an adjudicator and oversight authority infringes on the procurement process.

It also becomes very imperative that the constitutions of the regulatory authorities are scrutinised. There is always a conflict between defence procurement against national agenda priorities, while at the same time those who are empowered with the responsibility to adjudicate are without knowledge of the defence business. The PPADB is not interested in the urgency and importance of defence business, but rather in aligning all procurement to the set rules and procedures, and does not want to be undermined in that regard. The SPADC only adjudicates on items highly classified as

sensitive but the same procedures and processes are followed; hence the same layers of decision making and approval are used.

The different procurement models/types presented have limitations in terms of thresholds. The last two methods discussed, i.e. direct appointment and emergency procurement, are just methods within the other methods discussed, except for micro procurement and quotation procurement. It is important to note that defence procurement as discussed in this thesis is confined to transport and radio equipment. It is thus a fact that some methods cannot be adopted for acquisition of these assets, thereby leaving only four methods, i.e. open domestic bidding, open international bidding, RIB, and RDB. In further scrutiny of the four methods, one can say in the absence of manufacturing industries for vehicles and radios that open international bidding and RIB are the most relevant. As such, it is important to determine how these methods of procurement have affected the defence procurement over the time period under review.

CEE schemes are an agenda that is pursued from both the socio-political and socioeconomic perspective. Most recent policies in Botswana have attempted to empower citizens to take part in the procurement space. The implementation of these policies cannot be neglected as they are influential factors in the business environment. The effects of CEE schemes will be traced to see if they constitute a significant force in the public procurement space and in the defence procurement space.

CHAPTER 4:

DEFENCE PROCUREMENT: AN INTERNATIONAL PERSPECTIVE

4.1 INTRODUCTION

Defence organisations are always given more than one obligation, which requires the acquisition of different assets for the defence force to be able to achieve its mandate. This is often conflicting as the national protection agenda is combined with other goals inclusive of civil emergencies, employment, industry assistance, and stability of payment, among others (Markowski & Hall, 1998). In the context of the defence force being expected to perform with excellence its various duties, it must be properly capacitated to carry out these multiple tasks. On the premise of this, the question of capability surfaces. One can also argue that capacitating the military entails training, equipping, and sustenance. This, on the other hand, raises the question as to how these will all be done or how they may be acquired. All this has to do with expenditure from the budgets provided by the government. Procurement and how it should be conducted for the military continue to be at the centre of the discussion of this study.

In further emphasis of the dilemma, Markowski and Hall's (1998) argument is whether or not the procurement of defence equipment must be a mandate of users or whether it needs to be delegated to a valuable procurement agent acting on behalf of the consumer. It continues to be a predicament as to the extent to which procurement must be delegated to a centralised organisation or the client, especially given the dimensions of the transaction. The recent trend is to switch the procurement characteristic by retaining small transactions, while large-budget procurement transactions are delegated. Another issue with client procurement is that there are frequent changes of procurement staff, which results in the organisation considering all fees associated with complex acquisition; however, a decision to delegate that to an external party can be a factor in time.

An international collaboration model has been developed by some developed countries where one country provides strong markets and technological leadership and others are junior equity holders (Markowski & Hall, 1998). The main challenge of this model is bringing together force structure development and financial support in terms of budgets to finance such joint ventures, especially for smaller countries.

For the purposes of this thesis, the focus is on an environment for developing countries; hence such a model will not be significant to the current discussion.

In view of the aforesaid, this chapter seeks to define the concept of defence capability as derived from the literature. It is further important to link the defence capability to the conducting of military procurement, how is it informed, factors that determine defence procurement, as well as models available with a view to determine if Botswana's military can adopt any of them. The discussion then shifts from international perspectives to regional practices. The chapter also discusses Canada's procurement, because Canada has adopted a multi-departmental model of defence procurement that is said to be unique (Auger, 2014).

4.2 THE CONCEPT OF MILITARY CAPABILITY

Defence capability is a concept that traces its development from the 20th century, where a shift in thinking suggested that military capability must be approached from a capability-based approach as opposed to a threat-based approach (Mazarr *et al.*, 2019). Over time, different models have been developed to attain military capability. The most recent models were after World War II, namely capability as an effect or a function to execute a task, capability as a system, and capability as a military unit (Anteroinen, 2012). These models were defined by Anteroinen (2012) as follows:

- **Capability as an effect or a function to execute a task:** This is said to have been a popular framework since World War II. This model emphasises “the effects of armed forces rather than the specific solutions” (Anteroinen, 2012). It also attempts to provide for a wide range of challenges without consideration of what the economy can provide. This model emphasises command and control, intelligence, communication, force logistics, force protection, and force application.
- **Capability as a system:** This model views capability as a system of interlocking and interdependent components. Under this model, the major focus is on issues such as doctrine, organisation, training, material, leadership, education, personnel, and facilities. All these functions must be intertwined to provide capability.

- **Capability as a military unit:** This model is more dependent on military units as led by their commanders. Military units are seen as the building blocks of the force structure, with standard operating procedures and tactics for a designed operational environment. The weakness of this model is that it operates on the basis of operating procedures as opposed to military concepts. The operating procedures only guide how the military units can be deployed; whereas concepts are futuristic.

Which model has been adopted determines one's definition of military capability (Yue & Henshaw, 2009). The definition of military capability has, however, been defined further by other authors.

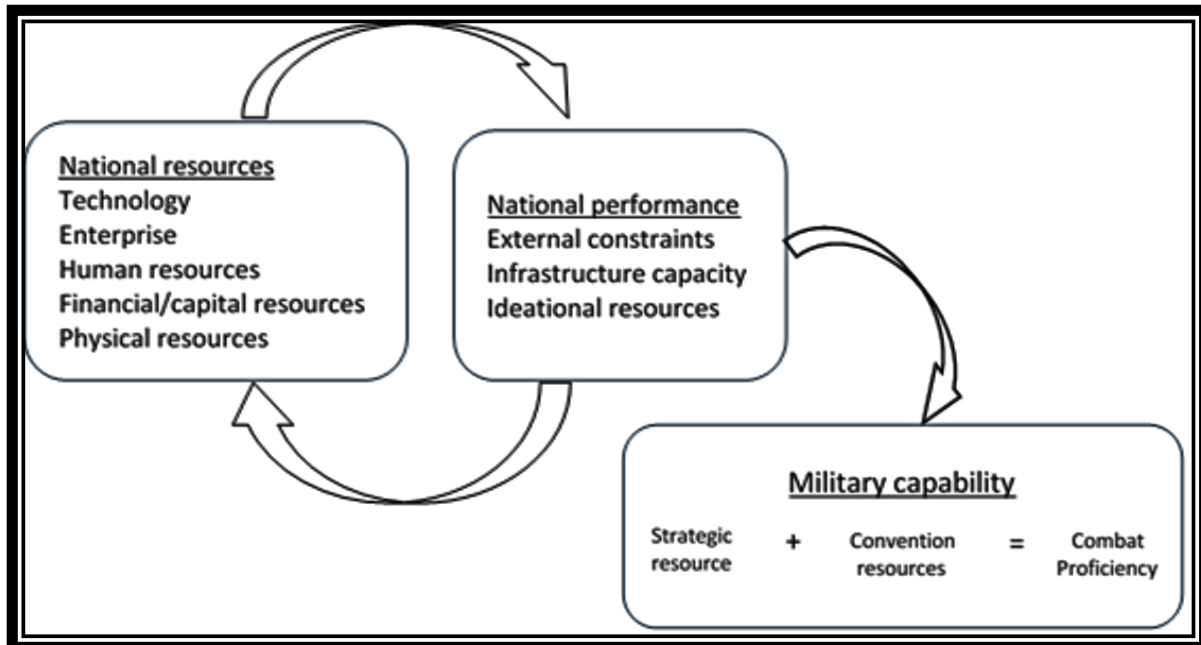
Military capability has been defined as “the ability to achieve a specified wartime objective (win a battle, destroy a target, etc.) in a given time and space. It includes four major components: force structure, modernisation, readiness, and sustainability. Force structure defines the number, size, and composition of the units that comprise the defence force; modernisation defines the technical sophistication of the forces, units, weapon system, and equipment; unit readiness defines the ability to provide capabilities required by the combatant commanders to execute their assigned missions, which is derived from the ability of each unit to deliver the outputs for which it was designed; while sustainability defines the ability to maintain the necessary level and duration of operational activity to achieve military objectives” (Carafano, 2014). Evans and Newnham (1998) stated that it is the capability that gives a state power in the international arena.

Furthermore, Markowski, Chand and Wylie (2017) posited that military forces serve as an alternative for a state to pursue a justified cause, which is the ability of a state to deal with military threat, a certain opportunity, or as an aid to civil authority. Markowski *et al.* (2017) defined military capability as “the capacity of an extant military force to achieve a military effect”. This includes force structure, readiness, and the extent to which such an operation can be sustained. They contested that it is the assets of the military that will facilitate it to deal with an anticipated threat.

The other perspective, as argued by Tellis, Bially, Layne, McPherson and Sollinger (2000), is that military capability can be classified as “output to national power”.

This is so because states exist in an environment of anarchy; hence the ability of the state to employ military power to deal with its competitors as the first line of defence is important. This military power is, however, dependent on the resources that facilitate national performance, from which military capability derives its execution.

Figure 4.1: Linking national resources and national performance to military capability



Source: Tellis *et al.* (2000)

Tellis *et al.* (2000) defined military as an output of national performance production. Treverton and Jones (2005) stated that there is a defined pattern of the relationship between national resources and national performance that ultimately informs military capability. State power can be conceived on three levels: (1) resources or capabilities, or power-in-being; (2) how that power is converted through national processes; and (3) power in outcomes, or which state prevails in particular circumstances.

These different authors defined military capability from different perspectives. While Markowski *et al.* (2017) defined it from more of an operational view, Tellis *et al.* (2000) and Evans and Newnham (1998) viewed it from a strategic perspective. The discussion centres on the ability of the defence force or military to achieve an objective in a given time. The definitions touch on different levels of military operations. While some are tactical, such as capability by unit, some are strategic, such as the systems capability model. It must also be noted that defence capability is shaped by a country's security policy; for example, the Russian security policy "sees territory as an important

instrument for the country as it serves as a buffer zone for the security of Russia” (Persson, 2016). This is why Persson (2016) indicated that Russia’s military spending has more than doubled in the 10 years before 2016, which was as a result of the Russian leadership’s commitment to modernising the armed forces. Tellis *et al.* (2000) and Treverton and Jones (2005), on the other hand, defined defence capability as a measure of economic activities that include the conversion of national resources. For the purposes of this study, the first three definitions, which identify force structure, modernisation, sustainability, and timeliness, define defence capability from a functional perspective and are thus the most suitable.

Having understood the concept of military capability, which will be further discussed under factors that inform defence acquisition, it is now important to discuss military procurement in breadth. Although procurement is not solely responsible for military capability, it forms the nucleus of activities that facilitate military capability. Various enabling capabilities are defined by Anteroinen (2012) in his development of a Holistic Capacity Life Cycle Model. Anteroinen (2012) defined these capabilities as enablers. They are capability development and experiment, capability planning, procurement, and in-service support. For the purposes of this study, the discussion focuses on procurement.

4.3 MILITARY PROCUREMENT

Although there is no authoritative definition of defence procurement, it could arguably be defined in a wide and in a narrow way. On the one hand, defence procurement, as widely defined, covers any procurement carried out by contracting authorities in the field of defence (Snyder *et al.*, 2019). In this sense, the notion of defence procurement therefore includes areas such as procurement of stationery, information technology (IT) equipment, aircraft, and submarines; among others.

On the other hand, defence procurement, as narrowly defined by Snyder *et al.* (2019), covers only the goods and services manufactured for or intended to be used for purely military purposes, and these might include submarines, fighter jets, armoured vehicles, munitions, missiles, and associated services. Pagonis (2017) argued that defence procurement, as narrowly defined, also covers the procurement of technologies that could be used, in principle, for both military and non-military purposes – provided that

the acquisition was made primarily for military use and that the specifications of these “dual-use” technologies underwent some alterations to meet military requirements.

In a nutshell, the distinction between military procurement, as narrowly and widely defined, reflects the fact that some procurement activities in the field of defence are more closely linked to the core of what could be termed as national defence and national security and are often characterised by the complex nature of the relevant technologies. This distinction further highlights the fact that more sensitive procurement needs to be subject to a regulatory regime that acknowledges its specificities and attempts to strike a balance between the openness and transparency of the procurement process on the one hand and protection of the core security concerns of the procuring state on the other hand.

Werber *et al.* (2019) established that there has been a debate about procuring military equipment through public tendering procedures. This was advocated primarily from the principle of secrecy and security. There are always questions as to why states must continue to spend funds, which could be used for the development of other sectors of the economy, on military expenditure. The answer given always emanates from the concept of minimum deterrence, which advocates for continued military procurement. Evans and Newnham (1998) defined minimum deterrents as capabilities in favour of a force posture that is sufficient to create doubts and uncertainties in the mind of the putative opponent to the extent that this adversary will be deterred from behaviour that is deemed unacceptable in the first place.

Some procurement is widely publicised, while some are kept secret and covert and require the engagement of military intelligence to search for information about the force structure and posture of the other military. The question now is, must military procurement be conducted like normal goods and services? A consideration of what is obtainable in a number of countries suffices. The rationale behind such considerations is to examine the extent to which practices relate or deviate from rules, norms, and conventions.

India has invested heavily in military capability in the past few decades. It has adopted principles of procurement such as transparency and accountability, among others. However, its defence acquisition is conducted under a parallel structure to that of the procurement of normal goods and services (Singh, 1998).

Silfersten *et al.* (2018) asserted that during the period between World War II and the political transformation at the end of the 1980s, Hungarian defence procurement was characterised by total isolation and a closed structure, mainly for reasons of national security. Figures on defence expenditure were not allowed to be made public in this period. Consequently, procurement procedures were carried out in a divided market in which competition and equal opportunities were unknown concepts (Kutlina-Dimitrova & Lakatos, 2014).

In Africa, largely due to the secrecy afforded to procurement transactions under the pretext of national security, the large sums involved, and the technical specificity of the transactions, the defence sector is particularly prone to corruption (Justice Africa, 2014). Critics continue to consider defence expenditure as unnecessary compared to R&D. For example, Werber *et al.* (2019) posited that defence procurement marginally contributes to GDP but does not contribute to the HDI. They argued that R&D contributes to human development, with the ultimate effect on the public development of the country as a whole. Ruttan (2006) posited that military- and defence-related R&D and procurement have been a major source of technological development across a broad spectrum of industries in the United States of America (USA). There are various views on the issue of military procurement, but it has been shown that these views depend on the developmental stage of each country. The question that must still be addressed is the importance of defence capability. Ahmedullah (2018) found military capability as an important reform in a state. Ahmedullah (2018) cited Thailand, arguing that after the military coup, defence procurement was not done properly, which led to a poorly equipped defence force, which made it difficult to deal with the “red shirt” and the “green shirt” gangs in the country who terrorised citizens and killed each other. The defence capability of a state is dependent on a number of factors. We may seek to consider other factors for discussion.

4.4 FACTORS THAT DETERMINE MILITARY PROCUREMENT

McNaugher (2011) argued that over the past 40 years, nations have failed to strike a balance between three equally important and legitimate dimensions of the military acquisition process, namely the technical dimension, where the state transforms basic science and technology into advanced weaponry; the military dimension, where the state converts weapons for military power; and the political dimension, where the

nation converts tax payers' money to develop a public good in the form of national defence. The view is that all these dimensions are in conflict with one another while each needs the input of the other.

One of the major factors that influences the practice of military procurement is logistic support. This is what Pagonis (2017) referred to as Combat Service Support. It holds the key to success and victory in any military operation. According to Morgan (2009), past wars, such as World War I, World War II, the Vietnam War, the Gulf War, the Iraq War, the War in Afghanistan, and the Libyan intervention, were all fundamentally fought and won on the basis of more logistic support afforded to the forces in combat.

One of the outstanding factors that influences military procurement is hierarchical communication. The main feature of military organisations remains structure, more specifically a clearly defined and respected hierarchy. This is because the structure of marketing and purchasing has clear subordination, with no intermediaries in the chain of communication, and the provisions of the commander are transmitted on the shortest channel, which enables it to be executed in a very limited time. Therefore, in military institutions, highly formalised, formal communication occupies the most space for communication. In the military structure, McKernan, Riposo, McGovern, Shontz and Ahtchi (2018) submitted that messages, channels, and communication networks are predetermined and regulated by clearly stipulated norms in the military organisation.

In this section, the discussion contextualises the factor of communication in military procurement within the framework of downward communication approach. In Persi Paoli and Kytomaki's (2016) conceptualisation of communication, downward communication is conducted from the upper levels to the lower levels, with the promoters being the managers and receptors of communication and their subordinates being the implementers. Also specific to the military organisation is that all communications pursue compliance with the military structure's hierarchy chain, but when talking about procurement, this segment is very short. In the public procurement process, this activity aims for the transmission of orders, provisions, and guidelines for implementation of organisational goals and strategies; supply of any information on the procedures and practices to be used in the procedures; and assessment feedback on activities and results consistent with the proposed organisational objectives.

In practical terms, effective downward communication, during the conduct of procurement procedures, not only ensures the coordination and control of subordinates at the organisational level, but also allows interstructural interaction to establish needs (Persi Paoli & Kytomaki, 2016). However, there is an adverse effect, as Ausink *et al.* (2016) contended that the focus of downward communication only on the transmission of instructions and procedures is to the detriment of performance assessment, and information on the reasons for performing certain tasks may have a negative organisational impact. There is therefore a need for constant reassessment and reconstruction of military structures to bring about changes in the management process, in terms of modernising and adapting it to the requirements of procurement.

Furthermore, like any economic process, military procurement in an organisation suffers both positive and negative influences. Among the latter, Ausink *et al.* (2016) identified a series of influences, especially of internal origin, such as the coverage of the needs of the institution by the allocated budget, management strategies, and readiness of staff at managerial and at execution levels.

In recent years, Greenfield and Camm (2007) reported that due to the global economic crisis, military procurement, for example, suffered significantly in the Romanian economy. Insufficiently developed to better cope with such a shock, there have been successive reductions in budget allocations for the institutions in the defence sector, public order, and national safety. Budgetary reductions have caused adverse effects for institutions, including the military, both in terms of staff and in terms of current endowment and operating activity.

A study conducted by Tripp, Drew and Lynch (2015) evaluated factors critical for successful military intervention and humanitarian operations in dealing with conflicts around the world, particularly in weak political states and nations ravaged by civil war. The study noted that for the North Atlantic Treaty Organization (NATO) to deploy expeditionary forces that can move quickly to wherever they are needed and to sustain the operations over long distance and time and achieve their objectives, vibrant military procurement must be in place. Given the importance of military procurement, there will be a continuing need to adapt to new challenges to ensure that NATO nations have deployable structures and sustainable forces capable of responding to emerging threats in the future (Tripp *et al.*, 2015).

In addition, Blickstein, Yurchak, Martin, Sollinger and Tremblay (2016) noted that military procurement is the bridge between military operations and the national economy presented in a country's economic resources and systems used to generate personnel and material. The recommendation articulated by Blickstein *et al.* (2016) is for nations to harmonise the national goals to the strategic military plans and ensure that the national economy supports the army through proper recruitment, training, and equipping forces. The study noted that procurement support to the military directly influences the swiftness with which the country can mobilise and how long a country can endure a conflict.

In his empirical study on supplying the coalition forces in Afghanistan, Keller (2016) analysed the effect of the operational environment on logistic support to troops. The study observed that land operations in a harsh environment with underdeveloped infrastructure puts strain on the systems, processes, and resources intrinsic in military logistics and exacerbates friction along the combatants' lines of communication. Keller (2016) recommended that commanders must account for their supply lines and exploit the vulnerability of their enemies. The point is therefore that procurement should be recognised as an effective force multiplier to achieve joint deployment and sustainment beyond geographical limits. It is worth noting that procurement cannot be effective without an effective transport system in place. Transportation and procurement are integral parts of logistics support.

Sreenivas and Srinivas (2013) set out to analyse the interrelationships, structures, costs, and effects of transportation on logistics chains. They found that the operation of transportation determines the efficiency of moving products from the producers to the consumers. Progress in techniques and management principles improves the moving load, delivery speed, service quality, operation costs, the usage of facilities, and energy saving. Sreenivas and Srinivas' (2013) argument was that a good transport system in logistics activities could provide better logistics efficiency, reduce operational costs, and promote service quality. Be that as it may, the improvement of transportation systems needs integrated and collaborated efforts from both public and private sectors. Sreenivas and Srinivas (2013) concluded that reviewing a transportation system needs a clear frame of logistics and a proper transport infrastructure and techniques to link production to the market.

This study is more interested in the issue of transport and communication, as indicated earlier. This study investigates the deficiency in the transport and communication capability, which, as indicated above, are at the core of service support. Whichever goods that must be delivered to operational area, must be procured and the same applies to the transport that delivers them. Procurement therefore plays a very significant role in military capability and the extent thereof may be justified by future studies.

In addition, Loredó, Raffensperger and Moore (2015) summarised the factors in geostrategic considerations and security environment, the politics of budgetary decision-making processes, the influence of financial and economic constraints, and other factors. Their study indicated that the literature around geostrategic considerations has shown a linkage between national security and threat perception, defence expenditure, and economic development.

In explaining this further, Ball (2017) used the model of an arms race, which predominantly explains that military procurement is determined by the political, psychological, and international parameters that emphasise a government's perception of its adversaries and the behaviour of its allies and neighbouring states. There is also the aspect of "threat perception and inter-state conflict" in which the military capabilities of neighbouring states are often seen as both the source of and response to a perceived threat (Ball, 2017).

Weede (1986) stated that international competition and threats to national security lead to higher military participation ratios and large military outlays. Changes in defence and security policies for nations and organisations are one of the factors that inform military procurement. Freeman *et al.* (2015) contended that policies are intended to guide an organisation, business entity, a nation, or a union by laying guidelines and a platform on which all must adapt to achieve best practices for acceptable behaviour. Military procurement can be affected by policy changes, whether national or international.

The most recent discussion in the field of international relations focuses more on how states relate. Different theories have attempted to explain how states relate. Morgenthau (1948), in the theory of realism, posited that states are the main actors in world politics, states act through their governments, and states seek military power as

a means to an end. Wendt (1999) argued that the weakness of this theory was identified as the exclusion of other actors from the international scene. Webber, Croft, Howorth, Terriff and Krahmman (2004) developed the concept of security governance in which they emphasised the involvement of non-state actors in various policies, including defence. They concluded that despite the state being responsible for its security, other non-state actors are also important in shaping the defence policy.

Since the emphasis is to demonstrate how policies shape or determine defence procurement, an example of the EU's policies of defence is briefly discussed. On 1 December 2009, the EU entered into the Lisbon Treaty on foreign affairs and security with EU member states that was intended to coordinate foreign and security policy. It established the Common Foreign and Security Policy, the European Security and Defence Policy, and later the Common Security and Defence Policy (CSDP). These policies were intended to lay a framework to enhance EU member states' participation as global political players and to ease deployment in missions and operations effectively.

The CSDP was scrutinised by the European Parliament and sub-policies were developed to ensure its effectiveness. In March 2017, the EU established the Military Planning and Conduct Capability policy intended to improve the EU's capacity to respond in a faster, more efficient, and seamless manner to the planning and carrying out of non-executive military missions. In June 2017, a European Defence Fund was launched that was aimed at research, co-financing development and support, and for the acquisition of defence products by EU member states (Jehin, 2015). Based on the challenges faced by different countries, it is the policy that will guide its procurement. For every state, security and defence policies will determine what must be bought to give the defence force the posture that is in line with the state's envisaged level of security.

The next question in this chapter is, since some believe that the military has a role as may be defined from the national security perspective, how does it conduct its procurement in a manner that continues to be effective and efficient? Procurement is a function that requires skilled manpower and it will draw from the already limited defence manpower if performed by the military itself. It is also necessary to discuss the existing military procurement models of recent times. Models will assist in shaping

Botswana's procurement process to align military procurement for an effective defence force.

4.5 IMPROVING DEFENCE PROCUREMENT

Although there is no absolute solution to challenges in military procurement, it is important that some means are developed for effective defence procurement. From the Canadian perspective, defence procurement is a subject that is debated from the perspective of morals, security, and economic concerns. This makes defence procurement a widely debated issue of the current times (Cardenas, 2016). The Institute for Research on Public Policy, through its *Policy Options* magazine, sought expert input on the debate. The main question was, what needs to be done to improve Canadian defence procurement? Five different authors all had different views on improving Canadian defence procurement.

One of the propositions was that the defence force needs informed, evidence-based defence purchases (Stone, 2016). Stone (2016) stated that ministries lack the information they need to make evidence-based defence procurement decisions. This is something that a defence analytics institute could address. His opinion was that the absence of such an institute makes it difficult to provide sufficient information for decision makers. There was a recommendation that a "defence research and analysis capability centre" should be established in Canada (Stone, 2016).

According to Stone (2016), there is a need to establish a system that can gather proper information and guide defence procurement. This instrument or institution will close the gap between the budgeting department and the parliament. A procurement process without proper information will misinform and misdirect defence procurement. Information links the different components of the process.

Lagueux's (2016) contribution to the debate was that the defence procurement market is not like any other. He stated that governments purchasing defence equipment had a poor record because buying military hardware is not like any other type of procurement. Lagueux (2016) stated that the simple question one must ask is, why is it that large commercial entities do not have procurement problems while the military has? If there is a solution for large industries' procurement, why is it not applied to solve the problem the military has? The answer to these questions is simply that

military procurement and commercial procurement are totally different (Lagueux, 2016).

Lagueux (2016) ascribed this difference to the following main factors: defence markets are few, they are often subject to secondary objectives and they tend to drive technology, commercial buyers use well-defined and proven products and conduct their procurement on the basis of a “tender” as opposed to “invitation for proposal”, the defence budget is always prone to debate on its cut for use for other objectives such as socioeconomic objectives, and the military industry and government are always on two conflicting sides where none knows what drives the other; for example, for an industry, time is money, while for the government time is an infinite resource (Lagueux, 2016). Sapolsky (2009) stated: “You can centralise or decentralise. You can create a specialist acquisition corps or you can outsource their tasks. You can fly before you buy or buy before you fly. Another blue-ribbon study, more legislation and a new slogan will not make it happen at last.”

Lagueux (2016) recommended that solutions that do not suit the military and government environment must be avoided and appropriate instruments to measure output must be adopted. It must be acknowledged that military procurement is unique and may take longer and cost more than first thought as there must be buffers established, and despite the fact that it must be done in line with principles of procurement, it must be free from partisan political influence.

The views expressed above indicate that defence procurement cannot be conducted on the same platform as normal goods for governments. The main issues raised are business environment-related factors such as the markets, technology, methods of procurement, and socio-political issues. This is what the focus of this thesis is. This study sought to determine if the business environment influences the procurement process. Through data collection, it is imperative to determine if these issues are present in Botswana’s context.

Davies (2016) believed that managing defence procurement will always be a challenge, but it can be done better by simply fixing the defence procurement fundamentals. He stated that attempting to solve defence procurement by increasing the defence budget is not the solution. Due to the complexity of defence projects and costs associated, governments at times find themselves compromising among many

political imperatives to build support for the direction they choose. This may take months or years, which may result in significant increases in costs and manipulation of schedules. Davies (2016) recommended the following: concrete measures to ensure effective lifecycle management of complex defence systems, establishment of integrated management of defence procurement across all departments involved (to include performance standards and measures, integrated data collection, analysis, and reporting of results review of results by leadership, collective follow-up and monitoring, and evaluation), and the establishment of one entity responsible for the acquisition and lifecycle management of defence material (Davies, 2016).

Davies (2016) raised issues of fundamentals. The issues raised are to examine the characteristics of defence procurement and to make plans in line with those, including the length of time of delivery of defence equipment. What was brought up by Davies (2016) was that the components of the process must be well informed, as echoed by Stone (2016), which should be in line with the acquisition and lifecycle of such equipment. This piece of literature contributes to establishing the rules of engagement in place for different components of the procurement process.

Williams (2016) suggested three ways to improve defence procurement in Canada, which are a dedicated organisation, better performance measures, and a long-term capital plan as the only factors that could improve defence procurement in Canada. He indicated that defence procurement has become a nightmare for the government. Williams (2016) stated that to effect change, the direction must come from the Commander-in-Chief (Prime Minister), which has not been the case. Governments have not over time attempted to understand the impediments of effective and efficient defence procurement; rather, they have relied on superficial remedies, often advanced by companies whose self-interests conflict with those of the military or taxpayers. Williams (2016) pointed out that lack of accountability and companies who put their self-interest ahead of the interest of the military or taxpayers compromise defence procurement. The recommendations were that one defence procurement organisation headed by one minister must be established; the new defence procurement organisation must provide systems-wide performance measures on acquisition cycle times, identifying variances from plans based on delays while awaiting external approvals, internal delays, cost variances, and quality; and prepare and promulgate a cabinet-approved long-term capital plan for defence spending.

Williams' (2016) proposal is that there should be strategic guidance from the top. The business of defence must also be pursued in line with this strategic guidance. Williams' (2016) contribution to this paper is in line with the objectives of identifying different stakeholders in the procurement process; current stakeholders in the business environment and how they interact with the procurement process. It must still be determined in this study if companies influence defence procurement as opposed to defence strategic plans driving defence procurement.

Cianfarani (2016) suggested three steps towards better defence procurement, which are short-, medium-, and longer-term steps that can be adopted to bring reforms to the defence procurement process in Canada. The author indicated that due to the complexity of defence procurement, a solution has not yet been identified. Cianfarani (2016) identified three practical measures as the short, medium, and long term. These include setting more rigorous defence acquisition priorities and sticking to them, ensuring that the funds that the parliament has approved for defence capital programmes are spent, and developing a defence industry strategy and perhaps an even broader Canadian industry strategy to improve domestic economic returns from defence acquisition. Accordingly, the adoption of these approaches will contribute to the overall growth of the economy; however, this does not advocate for the government to own companies in defence industries (Cianfarani, 2016).

The contribution made by Cianfarani (2016) revolves around planning, which can be associated with budgeting in the procurement process. It also reflects what Stone (2016) stated about proper information. This sheds light on achieving the objective of establishing the rules of engagement in the procurement process. How are short-, medium-, and long-term procurements conducted for defence? In line with what the different authors have contributed above, it is worth discussing different models adopted for defence procurement around the world. The selection of the models was limited to the available literature.

4.6 MILITARY PROCUREMENT MODELS

As discussed previously, there are numerous factors that determine military spending. Among them is the threat level. Since the 11 September 2001 incident in the USA, many countries responded to such threats by intensifying security, especially to

terrorism, and increasing their defence spending. This saw the world defence spending increasing from US\$839 billion in 2001 to US\$1 747 billion in 2013 (Auger, 2014). This procurement included new systems and military equipment such as artillery, small arms, military helicopters, warships, and others. When a force is in the middle of an operation or in the preparation phase, there must be an efficient and effective procurement process to enable the operation to continue. The question to ask is: Which procurement process or model is adequate to give sustenance to the operation?

Gregson (2017) presented several models adopted by a number of countries globally. The selection of these models was based on limited literature. In this section of the discussion, the Canadian model and three other models are briefly discussed, namely procurement by the individual armed forces, procurement by centralised government organisations, and procurement by independent civilian organisations. The discussion will be limited to the concept and will not discuss the models in detail. None of these models have been approved to best address the problems of bureaucratic hurdles, political influence, cost overruns, and delays in delivering major projects (Auger, 2014).

4.6.1 The Canadian model

Canada has adopted a multi-departmental model of defence procurement that is said to be unique from other countries. It conducts its procurement through several federal government agencies such as the Department of National Defence (DND), Public Works and Government Services Canada (PWGSC), Industry Canada, and the Treasury Board of Canada Secretariat. Each department and each agency are responsible for different stages of the defence procurement process. The PWGSC is the government's central procurement organisation with authority as empowered by the Defence Production Act to procure defence products required by the DND.

Explaining the different functionalities, Davis (2015) stated that the DND is responsible for defining the operational and technical specifications, product requisition, inspection and selection of the product, and post-delivery of the product, while the PWGSC is responsible for the development of procurement plans, soliciting and evaluating bids, contracting processes, and administering contracts. The Industry Canada also plays a role as the coordinator and administrator of the federal government's Industrial and

Technological Benefits programme (Holder, 2015). The Industry of Canada was established to ensure that the federal government uses defence procurement to uplift the industrial and economic benefits of the Canadian defence industry in order to stimulate economic activities across Canada.

There is also the Treasury Board of Canada Secretariat, which is responsible for federal government procurement policies, directives, and guidelines; approval of preliminary funding for major projects; and the financial oversight of projects. The model continues to encompass other stakeholders such as the Privy Council Office; Finance Canada; and Foreign Affairs, Trade, and Development Canada. This model does not have a single department as an oversight authority. In 2014, however, the Defence Procurement Secretariat was created within the PWGSC to oversee the defence procurement system and to coordinate the defence procurement strategy.

In the Canadian model, different agencies are involved at the different stages of procurement. No one entity prepares specifications up to the delivery of the project. This gives the advantage of monitoring one another to curb corruption. With many agencies involved, this model requires an effective system of coordination and synchronisation to ensure the timely delivery of projects. The disadvantage of this model is that the multiple agencies involved may have conflict with one another along the process, which will result in project delays and consequently project cost overruns.

4.6.2 Procurement by individual armed forces model

Under this model, different arms of the military conduct their procurement independently. The Army, Air Force, and Navy conduct the planning and procurement of the various equipment they require. The procurement policies and regulations are, however, developed by the Department of Defence (DOD). This gives the procuring arm of defence almost total control over the procurement system. Countries that use this approach include the USA, in which different arms of the military (United States [US] Army, US Air Force, US Marine Corps, US Navy, and US Coast Guard) procure through the DOD, which includes other organisations such as the Under Secretary of Defence for Acquisition and Sustainment, while the Technology and Logistics Organisation provides oversight authority over the various activities of the DOD.

This model may include other agencies, such as the Defence Logistics Agency responsible for food supply, spares, fuel, medical, and other stores. It is estimated that in 2011 there were approximately 22 agencies and departments with over 136 000 military and civilian employees under the DOD in the USA. Other countries that have adopted this model of military procurement include Chile, Mexico, and Nigeria.

4.6.3 Procurement by centralised government organisation model

In this model, military procurement of weapon systems and armament required by the military is done through a central government organisation. Such organisations operate under the scope of influence of the country's DOD. Such departments have their own budgets and are independent from the military. The UK, France, and Australia have adopted this model of military procurement. In the UK military, procurement is done under a single agency called Defence Equipment and Support (DE&S). This department was a merger of two entities of the Ministry of Defence Organisation in 2007, namely the Defence Procurement Agency and the Defence Logistics Organisation. The DE&S is led by the Chief of Defence Material under the Ministry of Defence Equipment, Support and Technology.

France, on the other hand, conducts military procurement under a single organisation that was established in 1961, namely the Direction General de l'Armement (DGA). The DGA is the central procurement agency of the Ministry of Defence. It conducts procurement of military equipment for the French forces from conception to delivery. This organisation also promotes the French defence industries' sales for exports.

Australia has the Defence Materiel Organisation (DMO), which is responsible for defence procurement. Formed in 2000, as part of the Australian DOD, in 2005 it attained autonomy after being made an agency through the Australian Financial Management and Accountability Act. After its agency status, despite being part of the DOD, it attained autonomy and control specifically over its own resources and staff. This agency's main function is the responsibility to procure and dispose of all military equipment used by the Australian Defence Forces.

India conducts its military procurement through the Defence Acquisition Council (DAC). It was established in 2001 under the Ministry of Defence.

Under the DAC, there are three boards that are responsible for the implementation of the DAC's decisions: the Defence Procurement Board, the Defence Production Board, and the Defence Research & Development Board. Among these three boards, the Defence Procurement Board is responsible for the procurement of the Indian military's equipment and weapon systems.

Other countries have also adopted this kind of procurement model with a single department agency, namely Brazil, China, Denmark, Germany, Spain, and South Korea. Russia has also been conducting its military procurement through two agencies, namely Rosboronzakaz and Rosoboronpostavka, which were dismantled in 2014 to concentrate military procurement under the Ministry of Defence. In this model, task-driven procurement is well defined and specified. The agencies deal specifically with military procurement (task driven) and know what they must acquire for the military in the specified time.

Since the model conducts task-driven procurement, it has a high probability of timely delivery; however, characteristics of bureaucratic hurdles, political influence, cost overruns, and delays in delivering major projects cannot be ruled out. This was the case in the UK and Australia. In Australia, by 2008, when the DMO modified reforms to improve efficiency and cost effectiveness of the acquisition process, it experienced a 15.5% (AU\$6.5 billion) cumulative budget increase in the 2012/2013 project fiscal year, while in the UK in 2009, defence procurement reports revealed that some projects were delayed by five years, which incurred additional costs of between £900 million and £2.2 billion each year (Auger, 2014). This proves that this model does not curb the problem of project delays and cost overruns.

4.6.4 Procurement by independent civilian organisation model

The other common model of military procurement is where military procurement is done through civilian organisations that are either state owned or partly private owned. Countries such as Sweden, South Africa, and Switzerland have adopted this approach to military procurement. Sweden conducts military procurement through the Swedish Defence Materiel Administration (FMV), which was established in 1968 as an independent civil authority. The FMV deals directly with the Swedish DOD and provided the Swedish armed forces with all the equipment and weapons systems they

require. This function is extended to the Swedish Coast Guard, Police, and Swedish Emergency Management Agency. Apart from conducting military procurement, the FMV assists with international matters related to defence procurement and material cooperation. The FMV operates under a board of directors and is fully accountable to the Swedish government.

Switzerland conducts its procurement through Armasuisse, an independent procurement organisation operating outside the scope and responsibility of the Swiss armed forces. Its reporting structure is that it reports to the Swiss Federal Department of Defence, Civil Protection and Sports. It was established in 1968 as the Defence Procurement Agency, which came about because of cost overruns when the procurement was still conducted under the Swiss armed forces. Because of the complexity of weapons systems, the Swiss government concluded that there was a need to establish the Defence Procurement Agency, which was reformed in 2000 to combine government-owned armament factories into a new state-owned defence technology company called RUAG (Rustungs Unternehmen Aktiengesellschaft).

As stated earlier, models are designed to address characteristic problems of bureaucratic hurdles, political influence, cost overruns, and delays in delivering major projects. The advantage of this model is that it does not suffocate the defence force in terms of manpower since procurement is done by an independent civilian company. The other advantage is that its structure design shortens the delivery time of projects. This was, however, not the case in South Africa during the arms deal case of 1999 (Crawford-Browne, 2004). The deal involved the African National Congress' former Chief Whip of the parliament, Toney Yengeni, business advisor Shabir Shaik, and former president Jacob Zuma, to mention a few. The projects that were awarded at R30 billion ended up costing R52.3 billion in three years (Crawford-Browne, 2004). This indicates that this model failed to curb political influence, cost overruns, and delays in delivering major projects.

4.6.5 Effectiveness of the models

Attempting to address the research question by improving or adopting one of the models discussed above poses the question regarding the effectiveness of the models. Auger (2014) stated that despite various models adopted by countries,

defence spending has not been able to effectively respond to rising military demands or to avoid bureaucratic challenges, political influence, technological difficulties, cost overruns, and delays in the delivery of weapons systems and military equipment. No existing model has been shown to be a solution to the growing complexity and rising costs of major projects. In 2008, Australia made 46 recommendations to improve the DMO and the efficiency and cost effectiveness of the acquisition process, of which 42 were accepted. Despite these reforms, Australia experienced a 15.5% (AU\$6.5 billion) cumulative budget increase in the 2012/2013 project fiscal year. In 2009, the UK conducted a study of its defence procurement, which revealed that some projects were delayed by five years, which attracted additional costs of between £900 million and £2.2 billion each year (Auger, 2014). The recommendation was that the DE&S should cease to be part of the Ministry of Defence but be transformed into a government-owned, contractor-operated (GOCO) company. The House of Commons rejected this recommendation; however, legislation provides for the Secretary of the State to conduct some military procurement where deemed fit through an arrangement such as a GOCO company.

From the practical experiences discussed above, it is important that procurement systems should be developed to achieve maximum efficiency, accelerated product delivery time, cost reduction, and provide better oversight. It has, however, been shown that there is no specific outstanding model that has proven to meet all the parameters of an efficient procurement system. It therefore means that despite the model, there must be continuous evaluation and modification. This may require continuous monitoring and evaluation of reforms, because models are challenged over time and it is important that they be reviewed over time to ensure that they achieve their intended purpose. This literature contributes directly to the research question as it assists to answer the question: What can be done in the case of Botswana to ensure an efficient and effective procurement system that will keep the BDF in line with its vision?

Narrowing down the discussion, it is important to examine regions to determine how other countries conduct procurement for their militaries. Since Botswana does not have a specific model for defence procurement, it is important to investigate how it can develop a model or adopt any of the existing models for purposes of efficiency and effectiveness in executing its mandate.

4.7 REGIONAL PERSPECTIVE

One of the research objectives is to determine if there is a model in the region that could best suit how the BDF can conduct its procurement. For the purposes of this study, the region is limited to the SADC region. Three countries were selected from the region, namely South Africa, Namibia, and Zambia. These countries were chosen because they share boundaries with Botswana. Furthermore, these countries face the same challenges when it comes to monitoring their borders and airspace. Zimbabwe was not considered because of it currently being classified as a fragile state. Fragile states tend to have weak institutions, which often serve the interest of individuals as opposed to the provision of goods and services to the public; as such, there is no conducive platform for the development of policies or their implementation (Maunganidze, 2016). Information was sourced from available sources such as websites and public documents such as public procurement legislation. This is because publications about defence procurement are classified as secret and there is very limited literature on them. The discussion is also limited to the structure and levels of authority, as opposed to tactical issues.

4.7.1 The Namibian Defence Force (NDF)

The NDF was established in line with section 114 of the Constitution of the Republic of Namibia as amended in 2008. It shall be established by an Act of Parliament, which will prescribe the composition, powers, duties, and procedures, in order to defend the territory and national interests of Namibia. Article 125 of the Constitution defines that expenditure for the state will be channelled through the State Revenue Fund. It empowers the responsible minister to prepare an Appropriation Bill on an annual basis, which must be passed by the parliament before expenditure can commence.

The NDF is controlled by the Ministry of Defence, which formulates defence policies, provides central operational headquarters for the NDF, and procures equipment for the NDF. It is also the responsibility of the Ministry of Defence to present the budget to parliament. The Ministry of Defence is a civilian-dominated ministry with employees with specialised skills, while military personnel are seconded from various units of the defence force on a rotation basis. Furthermore, the ministry plays a dual role of being the headquarter of defence. The Ministry of Defence has established companies to

take part in tenders involving defence, with the main one being August 26 Holding Company (Pty) Ltd (August 26, 2020). Although the Ministry of Defence is responsible for the procurement for the military, it becomes a question of how it engages with its own companies.

August 26's website outlines the structure of the company. August 26 is a 100% state-owned company that was incorporated on 14 August 1998 in line with the Companies Act (No. 61 of 1973). The company was registered as an umbrella company for the defence industry and it is committed to the country's medium-term NDPs and other initiatives of improving the economic and the social welfare of the Namibian people.

The general objectives of August 26 are to "supplement treasury resources in providing the defence capability and readiness of the national defences to defend and protect the nation sovereignty, interest and territorial integrity" (August 26, 2020). August 26 operates with the following subsidiaries:

- **Windhoek Machine Fabric (WMF)**

In 1998, WMF was incorporated as a commercial venture of the Ministry of Defence with 100% of its shares owned by August 26 Holding Company. Its main business is vehicle manufacturing, fittings, and repairs mainly for the defence market. It also manufactures trailers, tractors, tankers, and fencing. The directors to the board of WMF board is appointed directly by the Ministry of Defence.

- **Sat-Com (Pty) Ltd**

Sat-Com is among the major players within the Namibian telecommunications industry. It is involved with "manufacturing, installation and servicing electronic and telecommunications equipment including two-way radios, satellites and radio transmitters manufacturing, installation" (August 26, 2020). In April 2003, August 26 bought 49% of Sat-Com's shares after an offer by Sat-Com's founding partners. It has since increased its shareholdership, standing at 74.5% by May 2009, which makes August 26 a major shareholder in Sat-Com. The company has expanded into the IT space and has expanded its participation into the region. Sat-Com's board of directors consists of Sat-Com's managing director and two members of the Ministry of Defence.

- **August 26 Industries**

Another subsidiary of August 26 is August 26 Industries, which was incorporated in April 2007 as a 100%-owned subsidiary of August 26 Holding Company.

It manufactures footwear that is primarily for use by the NDF and other uniformed services, as well as for industrial use. There is no specific board for this business venture, but reporting is done by the general manager of August 26 through a management committee.

- **August 26 Textile and Garments**

This subsidiary of August 26 manufactures different types of garments such as combat fatigues, trousers, jackets, shirts, protective clothing, school uniforms, other uniforms, and linen. Its main consumer is the domestic market but there are future prospects of expanding into the SADC region.

- **August 26 Logistics**

Despite its exclusion from the holding company's website, August 26 Logistics forms part of August 26 Holding Company (Pty) Ltd (Kahiurika & Immanuel, 2014). August 26 owns 51% of this company. It is responsible for logistics supply such as food for the military and other defence support functions. According to media reports, there are other conglomerates related to August 26, which, except for the above, include August 26 UBM (Ultimate Building Machine) for construction, NamForce for insurance, and Agri-Tour for agricultural business (Kahiurika & Immanuel, 2014).

For some, this is an approach that enhances the growth of the defence industry in Namibia. For example, if the Textile and Garment Factory can be adequately funded, it can enter into business with major garment producers and grow the textile industry in the country, which may curb unemployment in Namibia (Global Security, 2016).

The Ministry of Defence as the owner or shareholder of all these companies has a responsibility to defend the budget and execute the actual procurement of defence equipment. This model may be defined as a situation in which the Ministry of Defence, in partnership with the NDF, forms companies that compete with domestic companies for public funds. As much as the ministry is responsible for defence procurement, the decision to award always starts with own considerations.

This model could be good if its intents and purposes were for swift support of the defence force. It, however, seems to have its shortfalls, especially on issues of ownership. Despite its positives, this model is not in line with the principles of procurement as even the ministry cannot disclose some of its procurement under the pretext of secrecy (Kahiurika & Immanuel, 2014). It has been a general concern that the situation in Namibia constitutes an environment where military companies “could be favoured by the government and state-owned entities in public tendering processes, and that private sector firms were likely to face increased risk of discrimination in public bidding processes” (Sweet, 2014).

4.7.2 The Zambian Defence Force

The Zambian Defence Force was established through Article 100 of the Constitution of Zambia. Articles 101 to 102 define the role and functions of the defence force. It clearly states that the defence force will be subject to civilian authority. It will be regulated by parliament, which will make decisions as to its organs and structures, which will include recruitment terms and conditions of service and the deployment of troops outside of Zambia. Like other countries, Article 115 defines drawing money from the Revenue Account for public expenditure.

Zambia conducts its procurement through the Ministry of Defence as empowered by the Defence Act. However, the procurement is kept secret. Even the Zambia Public Procurement Authority (ZPPA) has limitations to know what the defence force has procured. This is as per sections 6(4) and (5) of Zambia’s Public Procurement Act, which states that “the authority shall not access any information, documents, records or report, or enter upon any premises of the Zambian Defence Force or the Zambian Security Intelligence Service”. Subsection (5) in extension of the Act further elaborates that, “the authority may, where circumstances of procurement audit so require, with the written consent of the President, access any information, documents, records or report, or enter upon any premises of the Zambian Defence Force or the Zambian Security Intelligence Service” (Republic of Zambia, 2008).

In a statement issued by the Minister of Defence, Mr Kalambo Mwansa, when there were allegations by the former Minister of Defence, Hon. George Mpombo, that His Excellency, the then president Mr Rupiah Banda (Republic of Zambia, 2008), gave

instructions for the acquisition of arms at a total cost of US\$100 million, he responded by saying: “Procurement of equipment for the Defence Force follows the normal and legally established tender procedures except that the process does not unfold publicly on the open market. Any procurement is initiated by the Defence and Security Wings following a pertinent needs assessment. This process goes through the Ministry of Defence Procurement Committee, Zambia Public Procurement Authority (ZPPA) and Ministry of Finance and National Planning. Even after approval is given; a contract will only be signed after the Attorney General Chambers has scrutinized it and given its legal opinion. In all these processes, the President of Zambia and Commander-In-Chief of the Armed Forces are not involved at all” (*Zambian Watchdog*, 2011).

From the minister’s response, it can be deduced that the Zambian Defence Force conducts its procurement through the Ministry of Defence. It can also be noted that defence procurement is a secret activity as it is not conducted in the public domain; hence the principles of transparency, fair competition, and equity are violated by this model.

It was also noted that the Ministry of Defence can own some stake in companies; for example, the 34% it owned in the Zambia-China Mulungushi Textiles Joint Venture (Pty), which collapsed in 2007 (Brooks, 2010). Unlike what Sweet (2014) stated earlier, that the participation of government entities as shareholders in private companies can be a solution to unemployment, Brooks (2010) contested that such arrangements limit the intervention of the government when workers’ rights are being violated, such as what led to the closure of Mulungushi Textiles in Zambia.

4.7.3 The South African National Defence Force (SANDF)

The SANDF was established in line with Chapter 11 of the South African Constitution of 1996. Chapter 11 of the Constitution defines the establishment of the South African Police Service (SAPS) and the SANDF. The budget allocation to the SANDF is done after parliamentary debate. Section 228 of the Constitution defines how the defence force must account for the budget allocated to it. The Minister of Defence is the accounting officer who reports to the parliament through the Joint Standing Committee of Parliament on Defence. This leads one to wonder about the difference between

defence institutions that were established through an Act of Parliament and those established through Constitutional law.

In South Africa, defence procurement is done through the Armament Corporation of South Africa Ltd (Armcor), a state-owned civilian company. This company is operated under a board of directors, whose chairperson is fully accountable to the Minister of Defence and Military Veterans. Like other institutions under this model, the main function of Armcor is the acquisition, maintenance, and disposal of defence material for the SANDF and the Department of Military Veterans, as well as other government agencies that may require such services, such as the SAPS.

The SANDF falls under the DOD under the authority of the Minister of Defence. There are two entities under the Minister of Defence, namely the Defence Secretariat and the SANDF. The DOD is responsible for the general oversight authority and facilitating defence policy. In so doing, it ensures that the SANDF is well equipped for its envisaged defensive posture. It conducts procurement for the SANDF through the model of procurement by independent civilian organisation, through the engagement of Armcor as a state-owned civilian company.

The Armcor report of 2018/2019 summarised the details of the entity (Armcor, 2019). It stipulated that Armcor was established in terms of the Armaments Corporation of South Africa Limited Act (No. 51 of 2003), as amended (called the Armcor Act). It is a state-owned company as provided for in the Companies Act, No. 71 of 2008. The Public Finance Management Act (No. 1 of 1999) also recognises the entity and it is administered in line with its provisions. Armcor reports directly to the Minister of Defence and Military Veterans. This state-owned entity is provided for by the Act to incorporate companies that are in line with its mandate, such as the Armcor Defence Institutes (Pty) Ltd (Armcor, 2012). Armcor must adhere to accepted corporate governance principles, best business practices and generally accepted accounting standards, and the established framework, and must promote the principles of procurement as per the guidelines.

This model is not conducted in isolation as “[d]efence procurement is conducted in line with the DOD’s pillars of procurement where value for money, open and effective competition, ethics and fair dealing, accountability and reporting, and equity are at the forefront”. These were the words of Brig. Gen. Edward Mulaudzi, Director General:

Procurement, DOD, when he had to account for alleged anomalies during the construction of a military hospital (Parliamentary Monitoring Group, 2016). There is a parliamentary committee that serves as the oversight authority and ensures that defence procurement is conducted properly because of its use of public funds. The use of a state-owned enterprise also gives this model some provision of flexibility as some means are within its jurisdiction.

Transparency in defence procurement must be limited by national security interests (Ball & Len, 2006). The confidentiality clause is applicable to most defence forces in terms of the acquisition of weapons systems. Ball and Len (2006) highlighted that the South African Defence Review listed several reasons for confidentiality in defence procurement. These include the protection of third-party commercial information, the national security of South Africa, prevention of harm to South Africa's ability to conduct international relations, and the protection of South Africa's economic interests and the commercial activities of government bodies. This implies that the SANDF does not open all items of defence to the public.

4.7.4 Evaluation of the regional procurement models

In summarising the various models as per the selected countries, a number of factors come into play, such as what does the legal procurement framework outline, and what will the perception of the public be of the adoption of a certain model? One of the objectives of this thesis is to determine whether the BDF can adopt one of the models in the region. It is therefore worth comparing the different models discussed above to determine which one has more advantages than the others and to try to superimpose it onto Botswana's framework. It is very important to note that public funds must be accounted for to the people of the country, and the following matrix (see Table 4.1) will consider the principles of procurement (value for money, accountability, fair competition, equity, and transparency) and the characteristics of an efficient and effective procurement system (flexibility and timeliness). The grading was done under the following assumption: if the procurement system is kept secret from the public, then the principles of transparency, fair competition, accountability, and transparency are violated. The responses are to the question as to whether the procurement process adheres to principles of procurement, as well as to the characteristics of an efficient procurement system in terms of flexibility and timeliness.

Table 4.1: Evaluation of defence forces' procurement

Criteria	Namibia	South Africa	Zambia	
Accountability				
Fair competition				
Equity				
Value for money				
Transparency				
Flexibility				
Timeliness				
Legend		No	Somewhat	Yes

From Table 4.1, it is clear that Namibia has the upper hand in the case of a flexible system in the sense that the Ministry of Defence owns multiple companies, including food supply, defence equipment, construction, textiles, and others. As such, Namibia must have a flexible procurement system as all sources are within its means. Otherwise, Namibia, with a close procurement system, together with Zambia, does not comply with other principles of procurement.

South Africa, like most countries and those discussed above, conducts its business through its Ministry of Defence / DOD. What differentiates it from others is the fact that unlike other countries, there is a civil component with some military personnel attached to it within the department/ministry who are solely responsible for procurement. Instead of South Africa adopting a model of acquisition through the DOD, the DOD outsources the services to a state-owned enterprise to conduct the procurement function on its behalf.

4.8 CONCLUSION

In concluding this chapter, it is very important to align procurement processes to world best practices in line with principles of good governance. It was shown that failure to align a procurement model to these principles opens up opportunities for corruption and misappropriation of funds. Adopting a model does not mean taking it as a whole. There may be some aspects of the model that can be integrated into the one the institution wants to adopt.

The literature in this chapter highlighted very important issues to guide military procurement. It emphasised the importance of a national security policy that will in turn guide the national defence policy. This literature advocates for informed defence

procurement that is directed from the top and considers national interests. It was also shown that world best practices and regional practices as a matter of principle conduct procurement through the Ministry of Defence. The question of now engaging an independent company or building capacity for the Ministry of Defence / DOD remains the prerogative of the ministry.

This study focuses on Botswana's defence capability in so far as combating poaching and securing the borders from infiltration are concerned. The major enablers are transportation and communication, which will enhance the mobility of forces and coordination of forces on the ground. Since poaching has become a threat to the country, there is a need for strategic guidance and effort to combat this threat. This could be through a long-term strategy that will equip the force to achieve its envisaged goals and the national strategic goals.

Models were presented as conducted by different states. What emerged significantly is that most of the models seek to cut down the bureaucracy in the defence procurement cycle. The Ministry of Defence is responsible for defence procurement and has structures within it that involve military personnel who have a good understanding of the defence business. This process makes adjudication much quicker and there is continuity due to the limited contracts under administration.

In developing or adopting a model, the following should be fully exploited: does the new model disadvantage the public? Does the country's legal framework allow some violation of the existing pieces of legislation? What economic impact will such a model have? The adoption of a new model requires a thorough analysis of the business environment as a whole in an ideal democratic setup. It is important that the model does not violate the principles of public procurement as the funds used are public funds. The discussion above will guide the recommendations to be made at the end of this thesis. This discussion will contribute significantly to addressing the research question. The literature has highlighted many aspects related to the research question and research objectives, which will make data analysis easier.

CHAPTER 5: RESEARCH METHODOLOGY

5.1 INTRODUCTION

This chapter provides a holistic understanding of this thesis' theoretical framework, methodology, and research design. This chapter outlines the plan to achieve the different research objectives. Research design and methodology are about how one's research is designed and which data-collection methods to use so that the research objectives can be achieved. Having achieved the objectives will guide answering the research question. Methodology refers to the step-by-step process one must use or key activities that one must perform in order to implement a chosen method. This chapter also discusses data-collection methods/instruments and data analysis.

The methodology section is mainly characterised by two main issues: details and justification. When explaining details, it is meant that there must be an understanding of the design and methodology so that another researcher will be able to conduct the same study. Justification implies the rationale for the choice of methods, including indicating the advantages and disadvantages of each method. If the justification for the methodology is weak, it will compromise the validity of the results, analysis, and conclusions (Grant & Osanloo, 2014).

5.2 THEORETICAL FRAMEWORK

A theoretical framework is articulated for the purpose of interpretation of gathered data to enable a clear explanation of the phenomenon under scrutiny (Sarter, 2006). Sterrer (1998) stated that a theoretical framework provides a foundation from which knowledge is constructed for a research study. "It serves as a structure and support for the rationale for the study, the problem statement, the purpose, the significance and the research question" (Grant & Osanloo, 2014:12). Frameworks include concepts, constructs, or categories and identify the relationship between variables but do not predict relationships, while theories include constructs or variables and predict the relationship between variables (Bergeron *et al.*, 2017). There is no perfect theory for a dissertation but one needs to select a suitable theory for a dissertation as to how

it will look as a whole (Grant & Osanloo, 2014). This is not a random selection. The choice of a theory is informed by the nature and objectives of the study.

This study sought to assess how the business environment influences Botswana's public procurement process and what its ultimate impact on BDF capability is. In this case, Botswana's procurement process is seen as a "system" with different government departments playing an interactive role, while external players such as the nation, suppliers, and the government constitute the business environment. The ST now comes into perspective. Various works use the ST and systems thinking interchangeably. However, they are articulated differently in this study as one is embedded in the other and the discussion below clarifies this. An interrogation of the ST begins with the articulation of the concept of a system.

5.2.1 Defining a system

A system is defined by Arnold and Wade (2015) as a group of interacting, interrelated, or interdependent elements that form a complex whole. It is almost always defined in respect of a specific purpose within a larger system. Three keywords are used in the definition above to convey the meaning of a system. These are, firstly, "interact", which suggests a relationship or cooperation; second is "interrelate", which suggests connectivity; and third is "interdependent", which suggests a symbiotic mutual relationship. In all, a system is a network of relating variables.

Mele, Pels and Polese (2010) defined a system as a congregation of objects united by some form of regular interaction or interdependence. The use of the word "congregation" here suggests that a system is a composite structure that is made up of various indispensable elements. The idea of a system can be illustrated with the human body. Different body parts function differently, but in an interconnected way. Also, a system can be natural (e.g. a lake), built (e.g. a government building), physical (e.g. a space shuttle), conceptual (e.g. a plan), closed (e.g. chemicals in a stationary, closed bottle), open (e.g. a tree), static (e.g. a bridge), or dynamic (e.g. a human) (Tien & Berg, 2003).

Furthermore, systems can be viewed as either closed or open. A closed system perspective views organisations as relatively independent of environmental influences. The closed systems approach conceives of an organisation as a system

of management, technology, personnel, equipment, and materials, but tends to exclude competitors, suppliers, distributors, and governmental regulators (Katz & Kahn, 1978). This approach allows managers and organisational theorists to analyse problems by examining the internal structure of a business with little consideration of the external environment.

In contrast to closed systems, the open system perspective views an organisation as an entity that takes inputs from the environment, transforms them, and releases them as outputs in tandem with reciprocal effects on the organisation itself, along with the environment in which the organisation operates (Katz & Kahn, 1978). That is, the organisation becomes part and parcel of the environment in which it is situated and initiates feedback mechanisms to the results achieved by the outputs of the organisation to the environment.

Regarding its elements, a system can be detailed in terms of its components, material and immaterial; composed of people, processes, and products; attributes; input compilation; process and output characteristics of each component; and its relationships, composed of interactions between components and characteristics (Tien & Berg, 2003:23). Parsons (1977) emphasised that the fundamental unit of analysis is a “system” made up of structures. Systems at different levels are in relationships with supra-systems and subsystems. In this case, we are looking at the procurement process as a system, which is influenced by subsystems such as the PPADB, suppliers, procuring units, and the military itself as a procuring entity.

In summarising the concept of a system, Luhmann (1995) asserted that “[s]ystems are oriented by their environment not just occasionally and adaptively, but structurally, and they cannot exist without organization. They constitute and maintain themselves by creating and maintaining a difference from their environment, and they use their boundaries to regulate this difference. Without difference from an environment, there would not even be self-reference, because difference is the functional premise of self-referential operations processes which cross boundaries (e.g., the exchange of energy or information) have different conditions for their continuance (e.g., different conditions or utilization or of consensus) after they cross the boundaries” (Luhmann, 1995:16-17).

Botswana's public procurement process is viewed as an open system where public funds are released as inputs, then processed to procure military assets, which return to the people in the form of security services. Throughout this whole process, there are interactions with suppliers, the oversight authority, and legislation. Cutlip and Broom (2006) believed that organisations depend on their environments for several essential resources: customers who purchase the product or service, suppliers who provide materials, employees who provide labour or management, shareholders who invest, and governments that regulate. The organisation as an open social system that must interact with its environments in order to survive is viewed as an ST approach (Cutlip & Broom, 2006). This brings about the ST as an appropriate framework for this study. For this study, the ST forms the basis of the theoretical framework, while analysis/reductionism and synthesis/systems thinking are the approaches for analysis to solve complex systems problems.

5.2.2 The systems theory (ST)

The ST is said not to have a formally accepted definition; however, it is a term that is widely used and most often found in systems literature (Adams, 2012). The origins of the ST can be traced back to approximately 1949 when Von Bertalanffy developed the general systems theory. The theory evolved over time and across disciplines, as depicted in Table 5.1.

Table 5.1: Summary of the evolution of the ST

Major streams	Proponents
General systems theory	Von Bertalanffy (1949, 1950, 1968); Boulding (1956)
Living systems theory	Miller (1978)
Mathematical systems theory	Mesarovic (1964); Wymore (1967); Klir (1968)
Cybernetics	Rosenblueth <i>et al.</i> (1943); Wiener (1948); Ashby (1947, 1952, 1956); Forrester (1961, 1969, 1971); Odobleja (1938)
Social systems theory	Parsons (1970, 1979, 1991); Buckley (1967, 1998); Luhmann (1995, 2012)
Philosophical systems theory	Laszlo (1972, 1973, 1996); Bunge (1979, 1997, 1999, 2004)

Source: Adams (2012)

The ST is formally defined in a variety of ways. Drawing from the literature, this discussion presents a variety of definitions of the ST. The ST is a unified system of propositions made with the aim of achieving some form of understanding that provides explanatory power and predictive ability (Proudfoot & Lacey, 2009). This definition

views the ST from a unification perspective, which suggests that the elements to be unified are originally single units. Additionally, the ST is a modelling approach that accommodates the interrelationships and overlaps between separate disciplines (Luhmann, Baecker & Gilgen, 2013). It is a theoretical approach that allowed scientists and philosophers to explain how things worked in the universe, especially at a time when there were no separate compartments of disciplines.

Vallacher and Nowak (2007) asserted that the ST is the analysis of how society adapts to its environment through adjustments in its structure, with important implications for the understanding of social order. Vallacher and Nowak (2007) approached their articulation of the ST from a social point of view, and revealed the complexity of social evolution and, on this basis, stressed the limited possibility of steering society. The ST aims to explicate dynamic relationships and interdependence between components of the system and organisation-environment relationships.

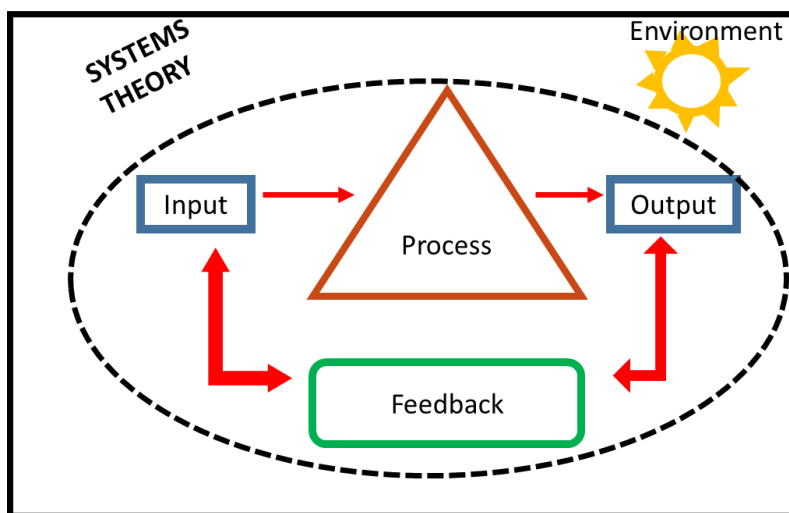
According to Lai and Lin (2017), the ST focuses on three levels of observations: the environment, the social organisation as a system, and human participants in the organisation. The components of each system are structured in a hierarchical order, and components are interdependent in the system to the extent that one component cannot function without the support of other components. The components of a system can be tightly coupled, where the components are closely interdependent, or loosely coupled, where the smaller subsets of tightly connected components are loosely connected to one another. At the organisational level, the organisation and other organisations in the environment are also interdependent. Underlying this interdependence are permeable boundaries, both within and among organisations (Lai & Lin, 2017).

Luhmann *et al.* (2013) argued that a sociological articulation of the ST is attractive because of its universalism, conceiving a multifaceted approach to the analysis of social systems, which in the plurality of theoretical approaches it brought about promises to be applicable to the whole range of problems relevant for sociology. Theme (1993) argued that the ST is a reminder of the value of the integration of parts of a problem that hitherto were considered in isolation from interrelated components. This explanation of the ST is consistent with the idea of systems. It presents an enormous advantage for systems analysts in that the definitions of the ST present

ideal guidelines for initial familiarisation with a new problem, which, of course, is a new system.

In a nutshell, the ST advances a compelling need for a unified and disciplined inquiry to understand and deal with increasing complexities, which are beyond the competence of any single discipline. The ST emphasises that everything is interconnected and researchers should therefore study interconnectedness as a means of understanding the world. This departs from empirical approaches that traditionally study phenomena by examining individual components.

Figure 5.1: Systems conceptual model



Source: Mele (2007)

Figure 5.1 presents a glossary of key terms in the articulation of the ST. As highlighted at the onset of this discussion, a system is a set of related components that work together in a particular environment to perform whatever functions are required to achieve the system's objectives. Every system has both input and output. It is fair to say that a system may be evaluated by determining if its output results in the achievement of its objectives. There is also the feedback element. In order to be effective and efficient, a system needs a feedback mechanism that can ascertain whether the outputs of the system are what they should be. In the absence of a feedback mechanism, a system is unable to adjust its inputs or processes to improve the outputs (Adams, 2012). Put differently, the feedback mechanism in an information system is fundamental, and may be automated or manual.

Additionally, there is the element of the environment. The environment can be either internal or external. A system operates in an environment with both internal and external components. The internal environment is the part over which the system has some control, and therefore can be altered. On the contrary, a system's external environment is that part of its environment over which it has no control, but it still affects the requirements of the system.

In summary, a system is usually composed of interrelated elements. The elements are interdependent. Interestingly, one of the most important concepts in the ST is the notion of interdependence between the variables of a system. This suggests that systems rarely exist in isolation.

Luhmann (1995:15) posited that "every social contact is understood as a system, up to and including society as the inclusion of all possible contacts". Figure 5.1 further depicts an ideal system that entails input, process, and output operating in a boundary in a given environment. During this throughput process, the system is engaged in two types of feedback mechanisms: negative and positive. Negative feedback is to correct errors in order to maintain the current state of the system, whereas positive feedback is to change the system through improvement or growth. In response to a change in the environment, a system develops the capacity to become complicated as the conditions of the environment become complex.

Although the ST has been extensively applied in organisational research, concerns are also raised about its environmentally deterministic orientation. Organisations are treated as biological organisms that undergo the lifecycle of growth, maturity, and death; thus, chances for adaptations may be frowned upon or ignored (Schneider & Somers, 2006). From an organisational approach, Reigeluth, Banathy and Olson (1993) maintained that organisations depend on their environments for several essential resources: customers who purchase the product or service, suppliers who provide materials, employees who provide labour or management, shareholders who invest, and governments that regulate.

Buckley (1998:3) opined that the ST was not so much a theory "but rather a theoretical framework and set of methodological tools that may be applied to any field of study". The ST, as such, serves as a theoretical framework for this study. From the theoretical framework, one must analyse data based on concepts derived from the theory.

Two methodological tools for analysis, i.e. paradigms as defined by Buckley (1998) or approaches as defined by Haines (2000), become available for consideration; namely reductionism and systems thinking. This is done in conjunction with the question as to how the analysis will be conducted. Is it going to focus on component parts of the system or component parts as a whole? As such, reductionism seems relevant as the core approach of this study if the component parts of the process were to be analysed. This brings about the necessity to discuss the two fundamental paradigms in science as defined by Buckley (1998), namely analysis and syntheses. Analysis is the traditional method of reasoning of the traditional science where the understanding of a system is gained by breaking it down into constituent parts, while synthesis is the foundation of systems thinking as gaining the understanding of an entity through the context of its relation within a whole of what it is part of (Henry, 2013).

5.2.3 Analysis/reductionism approach to the study

This approach is based on the premise that the basic unit of interest should be the individual parts of a system, from which follows the process of reasoning called reductionism. Reductionism is the thinking that things must be broken down into constituent parts in order to understand them (Østreng, 2005). Reductionism denotes any approach to clarification that aims to reduce complexities of structure or behaviour to less complex units (Baxter & Jack, 2008; Eisenhardt, 1989). Through this lens, scientists attempt to understand reality by breaking it down into component parts, and then studying the behaviour of those parts. A huge range of experimental methods and tools can be employed to study reality using this lens; therefore, it has been successful as a sort of meta-methodology.

Reductionism also has a particular meaning, and Kaplan (1964) contested that human behaviour can be condensed to physical laws related to the instinctive type of behaviour of other animals to intensively investigate emergent properties and categories and their interactions in complex and dynamic social systems. This study was conducted in a complex environment whereby there are various stakeholders such as the end user, the government, the public, and the defence-related industry; among others. Applying reductionism minimises this complexity. Reductionism is therefore relevant to this study as the study is exploratory in nature and the analysis will be enhanced by its use.

Reductionism is the principle that things must be dismantled into simple, small parts and be studied independently to gain a better understanding of phenomena (Ackoff, 1974). Reductionism is understood to bring up the concept of chronological and logical ways of thinking about the world to explain and understand the world. Reliance on reductionism has been minimised because it was assumed to believe in doing things in an old-fashioned way to solve problems; however, on a larger scale, it has been common across numerous disciplines. Jackson (2003) provided a valuable outline for supporting reductionism. Reductionism can be labelled in many ways, including “stepwise refinement”, “disaggregation”, and simply “breaking the problem down”. Arksey and Knight (1999) posited that in reductionism, problems are broken down into simpler parts and are possibly reconstructed into a single whole solution or given a single systemic understanding.

Alternatively, individual sub-problems can gain self-contained answers with no reference to other parts of the understanding of the problem. Reductionism is the paradigm of understanding that has been used by the human race in a number of scenarios with limitless achievements (Østreng, 2005). This knowledge of breaking problems down into their fundamental pieces comes naturally to people and goes a long way towards relieving the burden of bounded rationality (O’Loughlin & McFadzean, 1999). That is, there are some very difficult challenges, concepts, and/or issues that can only be correctly understood by first subdividing them into their basic parts. With this method, there is an implicit assumption that there is little necessity or effort to understand the context or “whole” system or problem.

Reductionism, however, fails to account for dynamics in organisms in the field of biology where it was obvious that the whole, which is the organism, cannot be understood only through the behaviour of its fundamental parts (Flood, 2010). The organism as a whole took a form that is not comprehensible from its integral parts or, to state it differently, the whole was bigger than its inseparable parts. This occurrence where the whole emerged from the interface between the individual parts and the parts affecting one another in a network relationship was called emergence by Jackson (2003). When reductionism failed to deal with emergence, systems thinking was developed as a counter to reductionism and in reply to the need for knowledge generation and understanding phenomena that take interrelatedness and emergence into consideration.

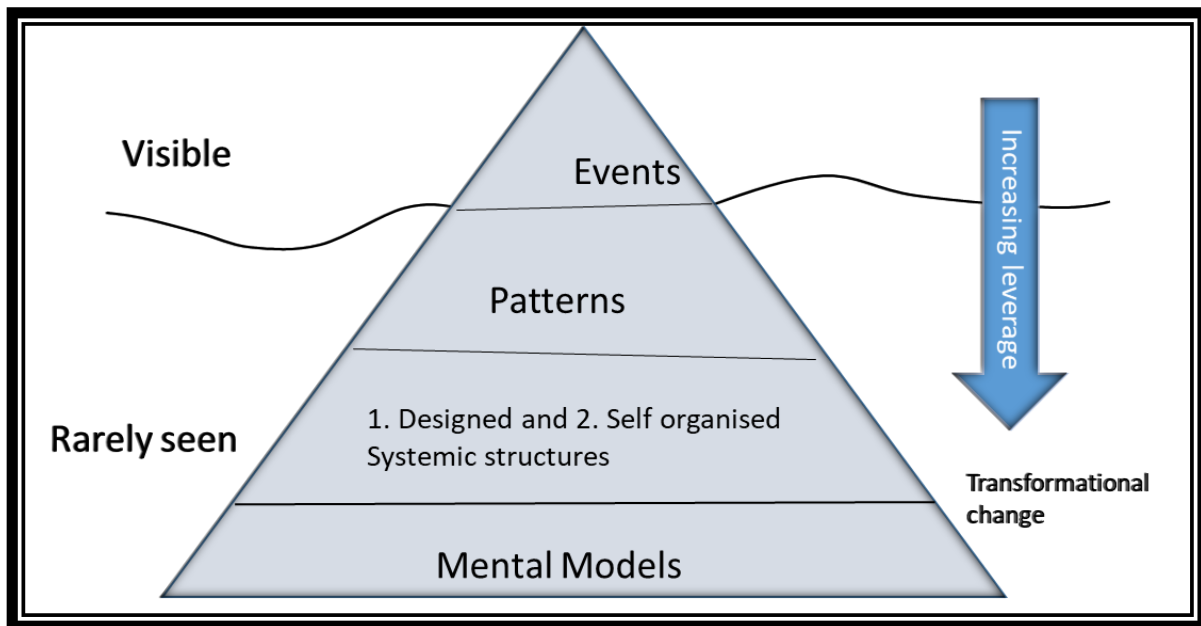
5.2.4 Synthesis/systems thinking approach to the study

Many of the systems that we are interested in describing have a high level of interconnectivity and interdependency, such as ecosystems, social systems, and many others. These systems, in contrast, are defined by their relationships within the system and not the static properties of the elements. People often continue to use an analysis approach to describe them but the reductionism approach is not designed for this and people thus need to change their basic paradigm to one that is more focused on these relations as opposed to components, and this is where systems thinking comes in.

Systems thinking is considered an interdisciplinary theory about every system in nature, society, and many scientific domains (Monat & Gannon, 2015). This approach's argument is that we are not able to fully comprehend a phenomenon by simply breaking it up into elementary parts and then reforming it; instead, we need to apply a global vision to underline its functioning. Despite the fact that the analysis will have to be conducted on elementary components, ultimately it must be observed from a holistic perspective. Systems thinking is intended to improve the quality of those perceptions of the whole, its parts, and the interactions within and between levels (Peters, 2014). Systems thinking is a school of thought that focuses on reorganising the interconnections between the parts of a system and synthesising them into a unified view of the whole. The key insight in systems thinking is "how we describe our actions in the world affects the kind of actions we take in the world" (Kim, 1999).

In defining a system, Barile and Saviano (2011) indicated that "it's a structure addressed to achieving a goal. The goal is reached through the interaction of the components in a series of relations (processes) respecting the rules".

In putting systems thinking into context, the "iceberg model", as defined by Kim (1999), can be brought into perspective. Kim (1999) advocated that reality can be viewed from three levels of perspective, namely events, patterns, and systemic structures, as depicted in Figure 5.2. Monat and Gannon (2015) later introduced the mental modes level.

Figure 5.2: The iceberg model

Source: Kim (1999)

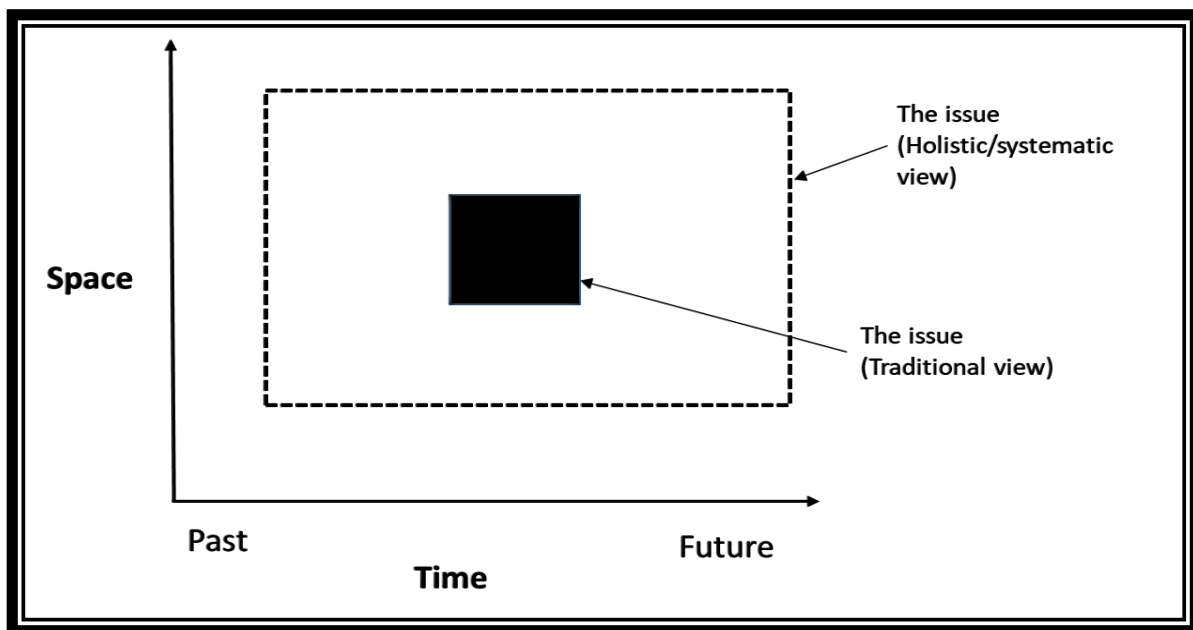
Events are occurrences that people come across on a daily basis. One can make deductions about Botswana's defence capability by observing the number of operational vehicles in garages, breakdowns along the roads, or engagement of procurement officers on a daily basis. It is what is seen on a daily basis that causes one to make one's own interpretations. Patterns are the accumulated "memories" of events. When strung together as a series over time, they can reveal recurring trends. Patterns may reveal the actions taken by the BDF when it had issues in the past and could inform future actions.

Systemic structures are the ways in which the parts are organised. These structures actually generate observable patterns and events. The structure may be influenced by command or the relationship between components of the procurement process as a whole, or where the BDF's procurement function is conducted.

Due to the complex nature of the BDF's procurement process, the reductionism approach would have been appropriate; however, due to the criticism that led to the development of the systems thinking approach, provision is made for systems thinking as a possible complement to reductionism. Monat and Gannon (2015) argued that reductionism is embedded in systems thinking (see Figure 5.3). Since the limitation of reductionism was its failure to account for relationships between component parts,

systems thinking is just an extension of reductionism. It is worth noting that the BDF's procurement process is a system within a system, which has component parts within itself. This means that one needs to understand the components in detail before expanding into the relationships between component parts. Systems thinking and reductionism were adopted in this study; i.e. systems thinking is applied as a complement to reductionism. Monat and Gannon (2015) concluded that systems thinking is a perspective, a language, and a set of tools.

Figure 5.3: Systems thinking versus the traditional approach to analysis



Source: Monat and Gannon (2015)

This research aimed to analyse the influence of the business environment on Botswana's public procurement process and the resultant impact on military capability. It is important to note that this influence is very diverse and comes from multiple stakeholders. The influences are interrelated and are part of a bigger system that has various stakeholders. Stakeholders are, among others, the public, the end users, the government, defence industries, and international organisations.

Because the BDF is an entity in Botswana's public procurement process, one needs to understand it and take it further to understand how it interacts in the environment in which it exists in the whole process. This implies that understanding the BDF requires a reductionist approach. Taking it further through the application of the systems thinking approach implies that systems thinking simply complements reductionism.

In terms of systems thinking, Monat and Gannon (2015) emphasised the issue of language. Within the systems thinking language, they indicated several key terms that are predominantly used, such as systems mapping, which includes the iceberg model and takes note of key concepts such as events, patterns, systemic structures, and mental models. Other keywords include self-organisation, emergence, feedback, system dynamics, and unintended consequences. Causal loop diagrams and stock-and-flow diagrams are important parts of the systems thinking language and key means for communicating system components and relationships (Monat & Gannon, 2015). The keywords and their definitions that Monat and Gannon (2015) suggested form a pool that constitutes systems thinking language and must be known and understood. These are attached as Appendix A.

Over and above the language used in systems thinking, there are a number of tools that are used. Monat and Gannon (2015) identified eight tools but this does not mean they are the only tools in systems thinking. These are Systems Archetypes, Behaviour over Time Graphs, Causal Loops Diagrams with Feedback and Delays, Systemigrams, Stock-and-Flow Diagrams (including Main Chain Infrastructures), System Dynamics/Computer Modelling, Root Cause Analysis, and Interpretive Structural Modelling. These tools may not all be used in a case scenario but they reinforce one's adopted approach.

Having discussed the ST and its approaches or paradigms of reductionism and systems thinking, it is important to narrow down the discussion to focus on the key assumptions of the ST. Several articles use the ST and systems thinking as synonymous, which makes it difficult to differentiate between the two. In this study, systems thinking is an approach as opposed to a theory in itself. The main theory is the ST.

5.2.5 Assumptions of the ST

The basic idea behind the ST, in the view of Checkland (1999:141), is that "the whole is greater than the sum of its parts". One example is an automobile engine. If all the pieces of an automobile engine are on a garage floor, there is no engine. They are mere parts of an engine. But if one puts the engine parts together in the right way, one gets something much greater than the parts, namely a whole engine. This example

demonstrates the idea that what makes an automobile engine is the actual interaction or combination of the parts, not the simple sum of the parts themselves.

In addition, Wolfram (2002) maintained that the ST is based on universal principles of organisation across different fields, and aims to point out similarities in the theoretical constructions of different disciplines and to develop something like a spectrum of theories. The ST is designated by Wolfram (2002) as a system of systems that may perform a gestalt in theoretical constructions. Reigeluth *et al.* (1993:11) described the following assumption in terms of communication and design: “A systems view suggests that the essential quality of a part resides in its relationship to the whole; the system and its parts should be designed from the perspective of the whole system and in view of its embeddedness in its environment; and the systems design notion requires both coordination and integration”. In other words, there is a need to design all parts operating at a specific system level of the organisation interactively and simultaneously. This requires coordination and communication. This is imperative to illustrate the transmission of information through communication channels and the concept of feedback, which evolves to emphasise the constructive power of the observer, who controls and constructs models of the systems with which the observer interacts. The section that follows discusses the characteristics of the ST.

5.2.6 Characteristic features of the ST

One characteristic feature of the ST is that systems are teleological, as stated by Von Kiedrowski, Otto and Herdewijn (2010), which means that they seek to achieve a particular goal or outcome. For example, the goal of combining the ingredients of a cake is to produce a cake and celebrate an occasion. The goal of a working automobile engine is transportation. The goal of having a family is love and support, and the goal of a business is to produce products and profit. Banathy (1996) examined the interactions of those parts that make up systems to understand the systems' goals, as well as how they attempt to achieve goals.

Another characteristic feature of the ST is that the interacting elements are always trying to achieve homeostasis, or a state of equilibrium or balance (Banathy, 1996). Using the idea of a family, most families attempt to fit in with their neighbours, co-workers, friends, city, country, culture, etc. Interacting elements of the ST are always

in a process of attempting to achieve a level of compatibility with their environment. When changes occur in either the environment or the system, system participants adapt in order to maintain balance. For example, if one moves away from his or her immediate family to a new environment, such a move will have an impact on the homeostasis of the family. As a result, everyone in the family will have to adjust in some way to the change brought about by the move in order to create a new sense of homeostasis.

Another contribution made by Kim (1999) on the characteristics of a system is that a system must have a purpose, which is defined as a discrete entity that provides a kind of integrity that holds it together; all parts must be present for a system to carry out its purpose optimally; the order in which the parts are arranged affects the performance of a system; and systems attempt to maintain stability through feedback. From the foregoing, a system is highlighted as being discretely arranged in a mutually interactive, unwavering, and steady order. The interaction that exists among constituent elements is coordinated in such a way that feedback is conveyed.

5.2.7 Limitations of the ST

The ST, however, is not without some shortcomings. Robbins (1990) indicated that the first shortcoming relates to measurement. There is no built-in mechanism to ensure that the level of interaction among variables is measured. This therefore presents a problem in the application of the ST because one variable might be overly dominating over the others. In other words, there is no balance of interaction and interconnection. The second problem associated with the ST is the issue of whether the means by which an organisation survives really matters (Robbins, 1990). Robbins (1990) noted that its focus is on the means necessary to achieve effectiveness rather than on organisational effectiveness itself. Measuring the means, or process, of an organisation can be very difficult when compared to measuring specific end goals of a goal-attainment approach.

5.2.8 Rationale for the choice of the ST

One of the justifications for the choice of the ST is that it recognises the interrelationships and interdependencies among the parts of an organisational system,

with the consequence that desired changes in one part of the system are accompanied by changes in other parts that are necessary to support those desired changes. The ST can also implement protocols for regular feedback to an organisation, thereby aligning it with the desires of the public in its environment. The practical implementation of this approach keeps procurement services from being used as a simple function, and rather places the function squarely in the strategic planning process.

The ST views the firm as a holistic system with some degree of integration between factors that intervene in the process of value creation. Accordingly, value creation is related to subsystems through aspects such as R&D, internal audits, and quality management, while the supra-system is through aspects such as cooperation logic and asset improvement in terms of technical, cognitive, relational, and adaptive aspects (Mele *et al.*, 2010). An example given by Mele (2007) is that the systems thinking perspective allows movement from one firm to the entire supply chain, while Polese (2004) stated that this perspective allows for networking that involves many systems actors such as firms, individuals, districts, nations, and markets.

When one explains the ST and presents the BDF as an independent system, four fundamental notions must be clear: an open system (as opposed to closed system), subsystem, entropy, and synergy. Smit, Botha, Vrba and Ngambi (2016) explained that a system is closed when it is independent and can exist self-sufficiently in a specific setting. However, the system is open if:

- it is reliant on the environment in which it operates, as is the case with the BDF, which is reliant on the government for resources such as budget and oversight;
- the environment is dependent on the system, because the government is dependent on the BDF to protect the territorial integrity of the country; and
- there is a specific interface between the environment and the system.

The BDF is therefore a subsystem; that is, a system within a system (the broader DOD or government). It is reliant on the government for resources through the budget to acquire equipment and other resources, which can facilitate its operations. The environment in which the BDF operates is also dependent on it for safety and security. The whole system operates in the same environment; hence there is an interface. The systems approach to research provides a framework in which numerous

organisational subsystems can be considered individually, but also in terms of the whole setup. A specific value of the systems approach is that it highlights the fact that the actions in one part of an organisation influence activities in other parts. The systems thinking approach also suggests that public procurement is an open system, which has an explicit connection with its environment. The application of the ST and systems thinking is discussed in the following section.

5.2.9 The application of the ST in research

Since the ST has been found to be suitable for this study, it is worth highlighting how it has been applied in previous research. There is evidence that the ST has been used in various fields of research. Mele *et al.* (2010) defined some aspects for application of the ST in management. Among those defined, the aspects discussed below were the most relevant for the research topic/question and research objectives. The research question focuses on value creation, the business environment, relationships, and the complexity of the procurement system.

However, few studies have applied the ST in the field of procurement. Thai and Grimm (2000) sought to capture the whole scope of public procurement with particular focus on the core elements of the procurement system and the relationship among them. Thai and Grimm's (2000) emphasis was on the policymaking function, which placed management executives at the top level of the procurement system. This study focuses more on defining the problem that results in the BDF having a deficiency in transport by analysing the procurement process, and it differs from Thai and Grimm (2000) as this study adopted the iceberg model, which focuses on events, patterns, systemic structures, and mental models within the systems thinking approach.

This study sought to establish how the business environment affects the procurement process in Botswana. The theory therefore becomes relevant as posed by Hakansson and Snehota (1995) that organisations are embedded in a set of interorganisational relationships with a set of stakeholders and, as such, organisations are connected and operate in an environment of interdependencies. The suitability of the systems thinking approach in management is further emphasised by Christopher (2007) in the viability systems model that behaviour in firms is linked to the ability to identify and manage functions and relationships, thereby establishing communication channels, organising

information flow, and rationalising and harmonising a firm's development in line with external relationships.

The ST and systems thinking are further applicable to interpreting service systems since they are complex and adaptive (Holland, 1999). Mele *et al.* (2010:131) believed that, given real-world complexity, systems theories and perspectives can effectively contribute to management, marketing, and service research due to their dual approach; the global, holistic view of observed phenomena; and the specific, reductionist view of their specific components and traits.

Since this study is located in the field of management and the interest is to explore a phenomenon to determine value creation, relationships, interactions, and complexity in the business environment, the ST and its systems thinking perspective became more relevant to this study than as applied in previous studies. In this study, the ST has the systems thinking approach embedded in it for understanding the phenomenon under study.

To the knowledge of the researcher, no studies have used the ST to investigate procurement in Botswana. This therefore creates a gap in the scholarly literature. It is this theoretical gap that this study seeks to fill. Below is a discussion of some other theories that are intended to augment the ST for the purposes of rigour in this study.

5.2.10 The organisational buying behaviour theory

In attempting to explain information processing concepts to group buying behaviour, Sanderson, Lonsdale, Mannion and Matharu (2015) could not develop a concept that covered procurement as a whole but rather aspects that can only explain the pre-contract phase of procurement. They developed a theory on organisational buying behaviour. Sanderson *et al.* (2015) suggested that risk is involved in procurement decisions and it differs according to how this risk exposes the organisation. The main discipline behind this literature is derived from organisational sociology with political models of decision making as the focal point. Sanderson *et al.* (2015) suggested that the basic assumptions of this literature are that "actors have bounded rationality and differing motivations and preferences, and that intra-organisational conflict is inevitable in situations of joint decision-making". These assumptions will guide the discussion of the public procurement process to validate it. According to Sanderson

et al. (2015), this theory suggests that interorganisational politics exists. This theory further suggests that decision-making conflicts can be resolved without the use of power, through problem solving and persuasion.

In their research, where they reviewed the status of organisational buying behaviour, Wind and Thomas (1980) stated that academic studies that need to focus on gaining a deeper understanding of organisational buying behaviour must concentrate on three major areas, namely (1) organisational buying centres, (2) factors that affect the organisational buying centre, and (3) the process.

On the other hand, Essien and Udo-Imeh (2013) reflected on models and theories that were intended to explain industrial buyers' behaviour and the nature of the relationships between organisational buyers and sellers. In defining models and theories, Bergeron *et al.* (2017) stated that theories include constructs or variables and predict relationships, while models are descriptive simplifications of phenomena and could include steps or phases. This gave rise to the interest in how these models and theories could support the main assumptions as alluded by Sanderson *et al.* (2015). Among the models and theories discussed by Essien and Udo-Imeh (2013), Webster and Wind's (1972) general model seemed relevant to reinforce the use of the organisational buying behaviour theory in this study.

5.2.10.1 Webster and Wind's (1972) general model

Webster and Wind (1972) posited that industrial procurement takes place in the context of a formal organisation influenced by budget, cost, and profit considerations. This process of procurement involves many people in the decision-making process, with complex interactions among people and organisational goals. According to Webster and Wind (1972), the general model can be applied to all organisations' buying behaviour and does not describe a specific buying situation and cannot be quantified. Webster and Wind (1972) classified four factors as very critical in organisational procurement. These are individual, social, organisational, and environmental factors.

- *Individual factors*

According to the general model, individuals are at the core of the buying process. The individual is influenced by a complex combination of personal and organisational objectives bounded by policies, as well as by other members of power centres. The organisation's buying behaviour is centred on the individual's behaviour. Cultural, organisational, and social factors are said to be important in influencing the individuals and are the result of their previous experience, awareness, attitude, and preferences towards a particular vendor and products and the model they are comfortable with. The decision by the organisation can therefore be termed as constrained towards individuals.

- *Environmental factors*

Environmental factors include physical, technological, political, legal, and cultural factors. The execution of these factors is through trade unions, business firms, governments, political parties, educational institutions, trade associations, and other pressure groups. Environmental factors define the availability of goods and services and the general business conditions faced by the procuring organisation, which include economic growth rate, unemployment, interest rate, GDP, and other economic factors. The environment also determines the norms and values between organisational relationships, personal relationships, relationships between competitors, as well as relationships between the government and bargaining institutions. Norms and cultural values derive their legitimacy from cultural, legal, social, and political forces. Finally, the factor of information flow as an environmental factor affects organisational buying behaviour. The way various companies or suppliers communicate through the available means of communication plays a vital role. Some marketing strategies involve one-on-one discussions as a personal channel.

- *Social influences*

Five actors have been identified according to their role in the procurement process, namely users, buyers, influencers, deciders, and gatekeepers. The model states that one of the actors may play a single or several roles, i.e. one may be a buyer and an

influencer. Buyers always have contacts of suppliers and may determine how they become influencers in the decision-making process.

- *Organisational influence*

This model posits that organisational factors make individuals behave differently than they would have behaved if it was their personal decision or if acting on behalf of another organisation. Organisational buying behaviour is directed by its goals but is constrained by financial, technological, and human resources. Leavitt's (1964) classification of variables was adopted, which outlines four sets of interacting variables in organisations that are seen as multivariate systems. These variables are: Tasks, to work towards accomplishing the goals of the organisation; structure, subsystems of communications, authority, status, reward, and workflow; technology, how the firm conducts its problem solving through invention, which includes plant and equipment and programmes, as well as managing work flow; and people, as the players within the system.

The model established that in an organisational structure there are subsystems that are responsible for communication, authority, status, reward, and workflow. The communication subsystem is said to perform functions such as information, command and instructions, influence and persuasion, and integration. The authority subsystem takes control of organisational actors to judge, command, and/or influence the behaviour of others. The authority subsystem interacts with the communication structure to determine the degree of decentralisation in the decision-making process. The reward subsystem takes responsibility for payoffs to the individuals who made decisions accordingly. This subsystem is affiliated with the authority subsystem. This is where the evaluation of organisational task accomplishment and individual non-task objectives takes place.

5.2.11 The dialectical theory

The dialectical theory's origins date as far back as 1770 when it was pioneered by one of the philosophers of that time, G.W.F. Hegel (Stern, 1993). Hegel's work was later further developed by others such as Marx and Kant (Soll & Kaufmann, 1969).

Van de Ven and Poole (1995:517) stated that “the dialectical theory begins with the Hegelian assumption that the organizational entity exists in a pluralistic world of colliding events, forces, or contradictory values that compete with each other for domination and control. These propositions may be internal to an organizational entity which may have several conflicting goals or interest groups competing for priority. But propositions may also be external to the organizational entity”. Two forces exist, which are classified as thesis and antithesis. Thesis forces are those that want to maintain the status quo or do not want to give way for the envisaged change, while antithesis forces are those that are for the change. In organisational buying, there are institutions that would be given the inner space by the central power and those within the power circle that are not pleased with new entrants; hence the thesis. On the other hand, those who have been in the outer power circle would like to see those who have been in it be replaced by those who have been outside it.

In the use of this theory, Moe and Sein (2014), in laying the theoretical foundation for analysing procurement in the public sector, indicated that this theory cannot explain phenomena in public procurement alone as it fails to explain why conflicts arise and how different the persons or subgroups involved influence the process. There is therefore a need to engage other theories such as the agency theory and the stakeholder management theory when using it as the main theory. The dialectical theory is relevant to this study in the sense that procurement not only involves the buyer and the seller, but also includes many stakeholders such as the Ministry of Finance, the MDJS, regulatory authority bodies, suppliers, and other interested organisations. This theory will therefore reveal the relationship between these various stakeholders to augment the ST.

Webster and Wind's (1972) general model is very close to the ST in that while the ST focuses on interconnectivity and relatedness, this model expands into the factors of influence, which include individual, organisation, social, and the environmental factors. These factors of influence will be analysed to determine interconnectivity and relatedness. The dialectical theory further emphasises organisational relationships, which are also embedded in systems thinking. The underlying assumptions of these theories, together with those of the systems thinking perspective, will merge well in assisting with the analysis of Botswana's public procurement process.

5.3 RESEARCH DESIGN AND METHODOLOGY

5.3.1 Research philosophy and paradigm

The term “philosophy” refers to a body of knowledge. It means the study of wisdom, and “by ‘wisdom’ it means not only prudence in our everyday affairs but also perfect knowledge of all things that mankind is capable of knowing, both for the conduct of life and for the preservation of health and the discovery of all manner of skills” (Kant, 2013). The evolution of philosophy saw it lately being more dependent on whether it is analytical philosophy, pragmatist philosophy, or continental philosophy (Joll, 2010). In achieving knowledge, according to academically accepted standards, one must follow a certain paradigm through the use of philosophical underlying assumptions of ontology, epistemology, and methodology.

Gaining knowledge is further defined by paradigms, which are systems of interrelated systems that encompass ontological, epistemological, and methodological assumptions (Durrheim, 1999). The paradigm confines the researcher to certain methods for data collection, observation, and interpretation. Durrheim (2002) emphasised that a paradigm is very important for research design as it impacts on what is to be studied and the way it must be studied. The evolution of paradigms, as highlighted by Kuhn (1962), encountered a time of “paradigm conflicts” where different paradigms fought for scientific space. However, as paradigms in the long run no longer speak to the concerns of practising scientists, new ones come in to replace the old ones (Terre Blanche & Durrheim, 1999). Paradigms are therefore not applicable forever but are subject to being refuted and being replaced by new ones.

In addressing the objectives and questions of the research, this study also takes a cue from the scholarly contributions made by Carter and Little in 2007 and Tuli in 2010 in that the study subscribes to their key definitions. The study also takes note of Carter and Little's (2007) contribution to epistemology and methodology, Tuli's (2010) to ontology, and Creswell and Poth's (2018) to axiology. These four elements were classified by Creswell and Poth (2018) as philosophical assumptions.

5.3.1.1 *Ontology*

Ontology specifies the nature of reality that must be studied and known. Ontological questions are those that enquire about the “nature of reality both physical reality (such as the bundle of paper or computer monitor from which you are currently reading) and social reality (such as the organization that employs you)” (Tuli, 2010).

5.3.1.2 *Epistemology*

Epistemology is defined as the study of the nature of knowledge and justification; and epistemological imperatives are issues about an adequate theory of knowledge or justification. It specifies the nature of the relationship between the researcher and what must be known (Terre Blanche & Durrheim, 1999). Tuli (2010) purported that epistemology poses questions such as: “What is the relationship between the knower and what is known? How do we know what we know? What counts as knowledge?”.

5.3.1.3 *Axiology*

Axiology refers to the value that researchers bring to a study. It is a major characteristic of qualitative research. Researchers must admit their influence on a study and continuously report their values and biases, as well as the value-laden nature of information gathered from the field. Researchers’ identity depends on how they position themselves (Creswell & Poth, 2018).

5.3.1.4 *Methodology*

Methodology entails the theory and analysis of how research should proceed; analysis of the assumptions, principles, and procedures in a particular approach to inquiry; the description, the explanation, and the justification of methods, and not the methods themselves; reconstructed reasons that justify, clarify, and help us understand research methods; and methodology aims to justify the method of a research project. It specifically outlines how the researcher goes about practically studying whatever he or she believes is the subject of enquiry (Terre Blanche & Durrheim, 1999).

These assumptions are predominantly linked with paradigms. The most common paradigms include positivism, which proposes that “the purpose of research is scientific explanation” (Tuli, 2010). Positivism views the social nature of reality as

“empirical facts which exist apart from personal ideas or thoughts; they are governed by laws of cause and effect; patterns of social reality, are stable and knowledge of them is additive” (Crotty, 1998). This paradigm basically assumes that the ultimate goal of science is to develop the most objective methods possible to be as close to reality as possible.

The post-positivist paradigm, as noted by Ryan (2006), is a broad paradigm that brings together theory and practice and allows acknowledgement of the researcher’s motivation and commitment to the topic. This paradigm is of the view that many techniques can be applied to collecting and analysing data. The post-positivist paradigm has been seen as being more associated with mixed-methods research. The interpretivism paradigm “claims multiple, individual or socially constructed reality (both the researcher and the participant construct their own reality and knowledge) that will be studied contextually and holistically” (Tuli, 2010).

Paradigms as basic belief systems are concerned with the ontological, epistemological, axiological, and methodological assumptions as defined above. Having discussed the underlying assumptions that determine the type of paradigm one will adopt in a study, it is worth noting Guba and Lincoln’s (1994) view that paradigms are a matter of human construction. They are representative of the views of their proponents. They are just an interpretation through human minds and are subject to errors. Guba and Lincoln (1994) stated that no particular paradigm is better than another in an inquiry. Paradigms are always linked to the research approach one adopts for his or her study.

5.3.2 Research approaches

There are generally three broadly defined approaches to research, namely qualitative, quantitative, and mixed-methods research approaches (Merriam & Tisdell, 2015). The main approaches are qualitative and quantitative, and the mixed-methods approach is a hybrid of the two. Goertz (2012) pointed out that the two main approaches, namely qualitative and quantitative, have been subject to differences in approaches by various scholars. The qualitative approach applies discussions about the meaning of concepts, while the quantitative approach applies statistical models using available

data. The discussion that follows focuses on the qualitative approach, which was adopted for this study.

5.3.2.1 Qualitative research

Qualitative research was defined by Denzin and Lincoln (2005:2) as a type of research that “involves an interpretive, naturalistic approach to its subject matter; it attempts to make sense of, or to interpret, phenomena in terms of the meaning people bring to them”. It is naturalistic as it attempts to study the everyday life of different groups of people and communities in their natural setting. It is useful in studying processes and settings such as education. Denzin and Lincoln (2008) further stated that it is a research approach in which qualities of entities and meaning are not deduced through experiments but as the socially constructed nature of reality, taking into consideration the relationship between the researcher and what is being researched. Accordingly, qualitative research methodology often relies on personal contact over some period of time between the researcher and the group being studied (Tuli, 2010).

According to Denzin and Lincoln (2005), qualitative research seeks to understand a given research problem or topic from the perspective of the local population it involves. Qualitative research is especially effective in obtaining culturally specific information about the values, opinions, behaviours, and social contexts of particular populations. Denzin and Lincoln (2005) further stated that the strength of qualitative research is its ability to provide complex textual descriptions of how people experience a given research issue. It provides information about the “human” side of an issue; that is, the often contradictory behaviours, beliefs, opinions, emotions, and relationships of individuals. Qualitative methods are also effective in identifying intangible factors, such as social norms, socioeconomic status, gender roles, ethnicity, and religion, whose role in a research issue may not be readily apparent.

The description of qualitative research is in line with the research question, which seeks to determine what can be done to ensure an effective procurement process that will capacitate the BDF. The thesis does so by obtaining opinions from the identified population. While quantitative research may confirm the existence of the problem, it may not give options on how to resolve it. That is why a qualitative approach was adopted for this study. Furthermore, the qualitative approach, as reinforced by Denzin

and Lincoln (2005), links very well with the theoretical framework when it highlights the importance of this approach in relation to providing information about the “human” side of an issue; that is, the often contradictory behaviours, beliefs, opinions, emotions, and relationships of individuals.

5.3.3 Research designs

Among the critical issues to discuss is the research design, which is the overall plan to connect the conceptual research problems to the pertinent empirical research. In other words, the research design articulates what data are required, what methods must be used to collect and analyse the data, and how all of it will be used to answer the research question. Both data and methods, and the way these will be configured in the research project, need to be the most effective in producing answers to the research question.

Epistemology entails how to go about “getting to know what you know” (Virunhagarun & Kaewchird, 2011). As such, the research design can be referred to as different types of epistemologies, as referred to by Virunhagarun and Kaewchird (2011). This is because epistemology entails gaining an understanding of a phenomenon.

Different fields of studies have different types of designs. There are no specified and standard research designs (Creswell & Poth, 2018). Creswell and Poth (2018) indicated that different designs are used in different fields. Moustakas (1994) developed six in psychology, Denzin and Lincoln (1994) developed nine in social sciences and later reduced them to eight in 2005, and other fields such as education have their own designs. This study recognises the existence of the five designs (approaches) as outlined by Creswell and Poth (2018), namely narrative research, phenomenology, ethnography, grounded theory, and case study. The following discussion centres on the case study approach, which was adopted for this study.

5.3.3.1 Case study

A case study is defined as a type of design in qualitative research that may be an objective study, as well as a product of enquiry. It explores a contemporary bounded system or case or multiple bounded systems over time through detailed, in-depth data collection involving multiple sources (observations, interviews, and document review)

and reports case themes (Creswell & Poth, 2018). According to Obasi (1999), a case study (or case report) is a descriptive, exploratory, or explanatory analysis of a person, group, or event. An explanatory case study is used to explore causation in order to find underlying principles. Obasi (1999) explained that case studies involve an in-depth focus on a particular phenomenon in order to maximise details. Case studies may be utilised for examination of multiple variables and the interaction of the unit of study with its content as a significant part of the investigation (Babbie & Mouton, 2012).

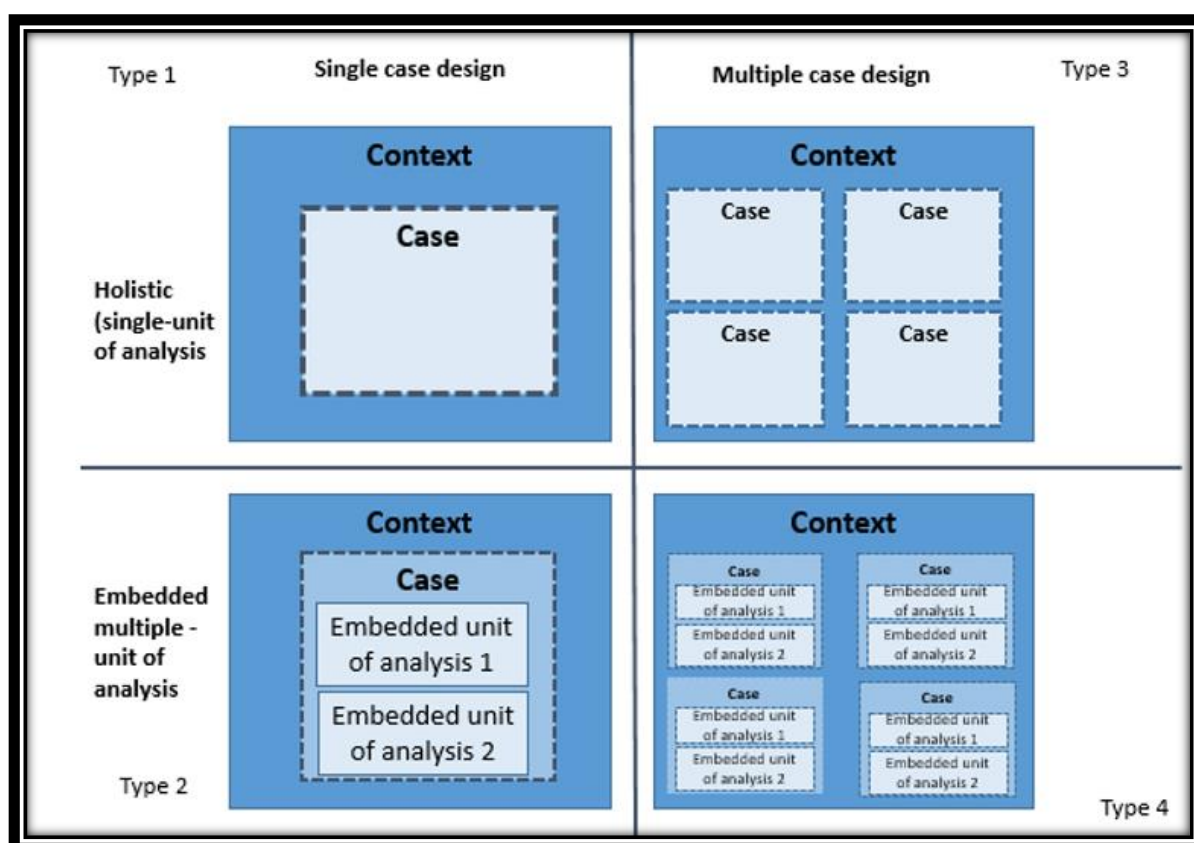
The case study approach is familiar to social scientists because of its popularity in psychology, medicine, and political science. In a single case study, there are two approaches: intrinsic, in which the focus is on a unique case, while the instrumental case study aims to understand a specific issue, problem, or concern (Creswell & Poth, 2018). Creswell and Poth (2018) classified case studies into three types: single instrumental case studies, collective or multiple case studies, and intrinsic case studies. The single instrumental case study is where the researcher focuses on an issue of concern, then selects one bounded case; the multiple case study involves focusing on the issue of concern through more than one case study; while in the intrinsic case study the focus is the case itself (Creswell & Poth, 2018).

The single case design is used primarily to evaluate the effect of a variety of interventions in applied research and has been widely applied in various disciplines, from psychology and medicine to business and industry (Kazdin, 2019).

Yin (2003) argued that the choice of a single case with embedded units gives the researcher the ability to explore the subunits that are located in the larger cases. This design is more appropriate when the researcher wants to have the ability to study the case with data analysis within case analyses, between case analyses, and across case analyses.

The multiple case study design is more appropriate when the researcher studies multiple cases to understand the similarities and differences between cases (Stake, 1995). When the study includes more than one single case, a multiple case study is most appropriate. Figure 5.4 presents the types of case studies that are differentiated as single case studies, holistic case studies, and multiple case studies, as presented by Yin (2003).

Figure 5.4: Types of case studies



Source: Yin (2003)

A case study is considered relevant for theory development as it bridges the qualitative evidence to mainstream deductive reasoning (Eisenhardt & Graebner, 2007). Eisenhardt and Graebner (2007) emphasised that inductive and deductive logic are mirrors of each other; with inductive theory building from cases producing new theory from data and deductive theory testing completing the cycle by using data to test the theory.

There are three reasons why a case study is viable, as stated by Benbasat, Goldstem and Mead (1987) and Crowe *et al.* (2011), namely that it is necessary to study the phenomenon in its natural setting; the researcher can ask “what”, “how”, and “why” questions, so as to understand the nature and complexity of processes taking place; and research is conducted in an area where few, if any, previous studies have been undertaken. In this case, the case study approach is more relevant because the area of focus is on an institution or organisation where few or no studies have been conducted before.

This study used a single embedded case study that uses qualitative methods. This study's approach is in line with Yin's (2003) position that in case studies that use qualitative methods, it is the testing of theory that is important rather than the issue of inference or generalisability. The ST, the theory of organisational buying behaviour, and the dialectical theory were put to the test.

5.3.3.2 Limitations of case studies

This study is a single case study; therefore it is necessary to focus specifically on the limitations of single case studies. Willis (2014) outlined the following as specific single case study limitations: the absence of systematic procedures for case study research, as defined by Yin (2003), as it results in the comparative absence of methodological guidelines; issues of construct validity, which concern that of the reliability and replicability of various forms of single case study analysis that are usually associated with a wider critique of qualitative research methods as a whole; and the issue of external validity or generalisability.

In mitigating the above limitations of this study, guidelines were taken from Gibbert and Ruigrok (2010). They adopted the natural science model, which groups a number of research actions under four criteria that will give a case study rigour, namely construct validity, internal validity, external validity, and reliability (Cook & Campbell, 1979). The approach of applying these criteria has been widely used from the natural sciences based on a positivist approach; however, other scholars from interpretivist traditions also applied the criteria for ensuring rigour in their studies, such as Denzin and Lincoln (1994), Stake (1995), and Silverman (2006).

Construct validity, according to Denzin and Lincoln (1994), refers to a procedure to the extent to which a study investigates what it claims to investigate; that is, to the extent to which a procedure leads to an accurate observation of reality. Denzin and Lincoln (1994) suggested that this can be attained through the triangulation of different sources of data, such as interview data, archival sources, and participatory or direct observation.

The second criterion is internal validity, as denoted by Cook and Campbell (1979), which refers to the presence of causal relationships between variables and results. This can be attained through three methods: through formulating a clear research

framework, which demonstrates that variable x leads to outcome y , and that y was not caused spuriously by a third variable z ; through pattern matching, where researchers compare empirically observed patterns with either predicted ones or patterns established in previous studies and in different contexts (Denzin & Lincoln, 1994); and through theory triangulation, which enables a researcher to verify findings by adopting multiple perspectives, which Yin (1994) defined as reporting through different theoretical lenses and bodies of literature, used either as research frameworks to guide data gathering and analysis or as means to interpret findings.

The third criterion of ensuring rigour in research proposed by Cook and Campbell (1979) is through “external validity”, or “generalisability”, which is rooted in the natural belief that theories must be shown to account for phenomena not only in the setting in which they are studied, but in other settings as well. The rationale for the selection of a case study should be reported and suggests that researchers should provide a clear rationale for the case study selection, as well as ample details on the case study context to allow the reader to appreciate the researcher’s sampling choice(s) (Cook & Campbell, 1979).

The last criterion is reliability, which Denzin and Lincoln (1994) defined as the absence of random error, which will enable subsequent researchers to arrive at the same insights if they conducted the study along the same steps. For this criterion of reliability, Gibbert and Ruigrok’s (2010) emphasis is on the issue of transparency and replication. They, however, suggested that transparency can be enhanced through strategies such as careful documentation and clarification of the research procedures; for example, a report that specifies how the entire case study was conducted. Yin (1994) encouraged authors to refer to a case study database, in which data such as interview transcripts, preliminary conclusions, and the narratives collected during a study are organised in such a way as to facilitate retrieval for later investigators; that is, to facilitate the replication of the case study.

The limitations of case studies as outlined by Willis (2014) have absolute reference to the above four criteria of ensuring rigour in a case study approach. This study, as such, must be compliant with these criteria for rigour to address the limitations of a case study approach. In ensuring construct validity, triangulation of different sources of

data, such as interview data, archival sources, and participatory or direct observation, was adopted.

This study applied theory triangulation, which enables a researcher to verify findings by adopting multiple perspectives, as suggested by Yin (1994), to satisfy the internal validity criterion. This study applied the ST, the organisational buying behaviour theory, and the dialectical theory as different theoretical lenses, together with bodies of literature, as research frameworks to guide data gathering, as well as the use of the iceberg model, which is a systems thinking tool for analysis or a means to interpret findings.

Furthermore, external validity was achieved by stating the rationale for the choice of a single case study approach. Since the approach is used to contribute to a practical problem, it was imperative to focus on a single case as opposed to multiple cases. The natural setting of Botswana's procurement process and the defence capability of Botswana's military dictate that for one to understand the phenomena, an in-depth understanding of this system is justified through a single case study approach. The findings of this study are not intended for inference; hence generalisability may not be relevant for this study.

Lastly, the reliability of this study is based on that transparency can be enhanced through strategies such as careful documentation and clarification of the research procedures, which is a report that specifies how the entire case study was conducted. Further to these guidelines, Yin (1994) advised that data such as interview transcripts, preliminary conclusions, and the narratives collected during the study must be organised in such a way as to facilitate retrieval for later investigators; that is, to facilitate the replication of the case study. All the interviews were transcribed and, together with the audio recordings, were stored safely, which can facilitate their retrieval at a later stage.

5.3.4 Data collection

The major data-collection methods and instruments are questionnaires and interviews; however, there are also other methods such as observation and examination of documents (Obasi, 1999). This study was predominantly dependent on interviews and document analysis. The documents analysed included procurement newsletters,

publications, and periodic reports. These documents were chosen at the discretion of the researcher based on their relevance to the study. Officers who were responsible for the execution of procurement plans were interviewed, as well as other representatives of external stakeholders.

5.3.4.1 Documents

Document analysis is a way of collecting data by reviewing existing documents, both internal and external documents. Documents may be hard copy or electronic and may include reports, programme logs, performance ratings, funding proposals, meeting minutes, newsletters, and marketing materials (Annum, 2015). Documents that were reviewed included procurement reports from the PPADB, as well as monthly vehicle returns for one of the BDF operational units. These are legitimate documents that originated from the source. Other documents that were reviewed included the “Committee of Supplies” extracts presented by the Minister of Defence to parliament in defence of the ministerial budget. Secondary documents included newspaper articles, which are very important in leading to a specific issue to be investigated.

The limitation of this approach was that some of the documents were classified and the researcher did not have access to them; however, those were specific purchases that were mitigated through intensive interviews. However, this did not affect the quality of the study or its results.

5.3.4.2 Interviews

An interview is a direct, face-to-face attempt to obtain reliable and valid measures in the form of verbal responses from one or more respondents (Key, 1997). It is a conversation in which the roles of the interviewer and the respondent change continually. Interviews have some advantages, which include direct contact with the respondents, which leads to specific, constructive suggestions; they are good at obtaining detailed information; and few participants are needed to gather rich and detailed data. This study took note of various types of interviews, which Alsaawi (2014) outlined as follows: unstructured interviews, which allow the interviewer to pose open-ended questions and the interviewee to express his or her own opinion freely; structured interviews, which use a set of predetermined questions that are short and

clearly worded (in some cases, these questions are closed and therefore require precise answers in the form of a set of options read out or presented on paper); and semi-structured interviews, which use both structured and unstructured approaches through the use of both closed- and open-ended questions. There is also the focus group method, which includes more than one person to discuss the subject matter. This method gives the advantage of feedback through the interaction of participants but it depends on the composition of the group as some may not feel comfortable to speak in front of other participants.

This study used structured interviews because, as Leech (2002) suggested, they are more appropriate when a researcher knows a great deal about the subject matter but wants to focus on some specific areas. This approach was taken in this study because the study had some specific areas that needed to be addressed in relation to BDF procurement. The disadvantage of a personal interview is that respondents are not anonymous as there is face-to-face interaction (Babbie, 1990). This may result in the respondent being reluctant to disclose confidential information. In mitigating the disadvantages, the respondents were assured of their confidentiality. They read and signed the informed consent document before the interviews commenced.

5.3.5 Population and sampling

In statistical terms, the population is the entire pool from which a sample can be drawn, which may be people, objects, events, documents, or measurements (Zikmund, Babin, Carr & Griffin, 2003). The population can be assessed in totality depending on the time and resources available; however, most studies have been conducted by selecting a few elements from a population for study. A sample as such refers to a smaller, manageable version of a larger group. It is a subset that contains the characteristics of a larger population (Zikmund *et al.*, 2003).

5.3.5.1 Population

The population of this study was limited to stakeholders involved in procurement and supplies to the BDF. This included; procurement officers of the BDF, corporate agents, clearing agents, shipping agents, and officers from other government institutions such as the PPADB, Botswana Unified Revenue Services (BURS), MTCs, and others that

are involved in defence procurement. For selection from this array of stakeholders, a sample was selected in the form of human participants for interviews. Documents used included Committee of Supplies publications, which are presented by the Minister of Defence after the presentation of the budget speech. Since the period of study is 10 years, each year's Committee of Supplies document was selected. The study further wanted to determine if there was an impact on defence capability. Four infantry battalions were available to select from but only one was selected because, since they conduct their operations on an interchange basis, they must possess the same capability and structure.

5.3.5.2 Sampling

Sampling is a technique employed by a researcher to systematically select a smaller number of representative items or individuals from a predetermined population to serve as a data source for observation or experimentation as per the objectives of a study (Sharma, 2017). Sampling is generally classified into probabilistic and non-probabilistic sampling, with probabilistic sampling being where the chances of choosing a participant are the same, while non-probabilistic sampling is judgemental and the choice is dependent on the researcher. Accordingly, Marshall (1996) indicated that "non-probability methods are more appropriate for in-depth qualitative research in which the focus is often to understand complex social phenomena". Sharma (2017), however, highlighted that it is important to know the benefits and disadvantages of the sampling techniques before one is adopted. It must be noted that this study conducted interviews and analysed documents to fulfil the first four objectives of the research, while it further analysed documents to determine the impact of procurement on defence capability. The sampling for the interviews entailed a non-probabilistic purposive sampling technique.

Purposive sampling, as Neuman (2014) suggested, is useful for case studies in three situations: (1) when a researcher wants to select unique cases that are especially informative, (2) when a researcher would like to select members of a difficult-to-reach, specialised population, and (3) when a researcher wants to identify particular types of cases for in-depth investigation. The purpose is to gain a deeper understanding of those particular types of cases. On the basis of the above, the issue of sample size prevails. Hennink, Kaiser and Marconi's (2017) view is that when it comes to how

adequate the sample size is, there is no straightforward answer. Bryman (2012) noted several factors that determine sample size, which include available resources, the characteristics of the study population, the analytical approach, the purpose of the study, and the research design. Authors such as Morse (2015) noted the importance of data saturation as it is believed to give rigour to a study to replace the issue of a determined sample size. Saturation has been defined as the point where there is repetition of stories among participants and the researcher does not gain any new information from participants. Kerr, Nixon and Wild (2010), however, argued that there are no standards for the attainment of saturation and, as such, it is not clear as to what saturation is and how it is achieved. While assessing saturation, Guest, Bunce and Johnson (2006) argued that some qualitative studies attain saturation between six and 12 interviews, while others classify them by design, such as Bernard (2000), who recommend 30 to 60 for ethnography, while Bertaux (1981) suggested 15 as the smallest sample size for a qualitative study. Others, like Creswell (1998), recommended five to 25 for phenomenology and 20 to 30 for grounded theory.

While the debate seems to be endless and does not reflect much on case studies, the sample size of this study was guided by the fact that the researcher identified a case for in-depth investigation, which is the BDF procurement process in relation to Botswana's public procurement process. Further to that, the researcher wanted to select members of a difficult-to-reach, specialised population, as one may be aware that not everyone is at liberty to discuss issues of security freely, in line with Neuman's (2014) factors that determine a sample size for a case study. The study had a heterogeneous population, with some being members or former members of the BDF and others being external formal stakeholders. Through non-statistical purposive sampling, which targeted respondents who were very much involved in BDF procurement during the period under review, saturation was reached with a sample size of 11. With the defined codes, as this study took a deductive approach to analysis, almost all respondents made submissions to the defined codes. It was intended that the purposive sampling would transform into snowball sampling, but this was short-lived as few respondents were available and no new information was forthcoming when the last respondent was interviewed.

5.3.5.3 Sampling participants for interviews

This research adopted a non-probabilistic, expert purposive sampling technique. Researchers use purposive sampling when they want to access a particular subset of people, as all participants of a study are selected because they fit a particular profile. The advantages of this technique are that it provides the researcher with the justification to make generalisations and it provides for adaptation at different stages of the study. The disadvantage, however, is that it is prone to researcher bias (Sharma, 2017). The other intended sampling technique was the snowball technique where the initial selected participants would recruit future participants but this was short-lived as the data reached saturation at 11 respondents. Farmer and Lawrenson (1996) indicated that snowball sampling is most suitable for hard-to-reach groups. This increased the initial sample from four to 11. The first four selected participants were two commanders of the BDF during the period 2008 to 2016 and their procurement Chiefs of Staff for the period. These officers referred the researcher to other participants at various departments in Botswana's public procurement process. Seven additional participants were interviewed until all experts involved in the defence procurement process were almost exhausted. Note that due to the secrecy of defence procurement, there is a limitation in so far as the size of the population is concerned.

5.3.5.4 Document sampling

Documents were used for purposes of triangulation and matching with the interviews that were conducted. The selected documents were extracted from the Committee of Supplies documents from the MDJS as published on the Hansard. This committee comprises all members of parliament and is chaired by the Speaker or Deputy Speaker, and is convened to approve the Appropriation Bill and Supplementary Appropriation Bill. The extraction from these records was specific to the BDF's procurement. Since the extracts were short and summarised, and to give validity to the data, all the presentations for the 10-year period were considered for the study. Other documents included vehicle status registers to determine the capability of the unit.

5.3.5.5 Sampling for defence capability

There was also a need for sampling to determine the impact on Botswana's defence capability. There are currently four infantry battalions in the BDF, with two infantry battalions in each infantry brigade. Initially, there were two full-fledged infantry battalions – one in the south and one in the north. This study purposively selected one infantry battalion from the south, which was among the founding battalions of the BDF, on the assumption that it would be representative of the rest. The reason for its selection is that all the battalions conduct operational assignments on an interchange basis and must therefore have the same capability and structure to execute such tasks. In justifying the impact, an assessment of the unit transport capability was made by comparing the unit transport requirement against the unit holding, serviceable and unserviceable, throughout the 10-year period from 2008 to 2018.

The study previously indicated that observation was also key as it leads to the formulation of the problem statement. Referring to the theoretical framework, one must reflect on the iceberg model that highlights events and patterns. These are observable elements that one can define in a problem statement, as was the case with this study.

5.4 DATA ANALYSIS

Qualitative analysis transforms data into findings (Patton, 2002). No specific formula exists for this transformation of data. Direction can and will be offered, but the final destination remains unique for each inquirer, which is known only when, and if, arrived at (Patton, 2002). According to Huberman and Miles (2002), from a hermeneutic perspective, a researcher is constructing a "reality" with his or her interpretations of the text provided by the subjects of the research; other researchers, with different backgrounds, could come to markedly different conclusions. It is further explained that in qualitative research, the analyst identifies important categories in the data, as well as patterns and relationships through a process of discovery.

There are different approaches to data analysis. These approaches depend on what ultimately needs to be achieved. It may be theory development or validating an existing theory. Since data were collected in the form of interviews and documents, the deductive thematic analysis approach was adopted.

According to Jacelon and O'Dell (2005), data analysis in qualitative research is a creative process. As the instrument of data analysis, the researcher explores and reflects on the meaning of the data. The data-analysis phase is said to overlap the data-collection phase. As data analysis proceeds, the researcher moves back and forth between data analysis and data collection in order to create and explain the findings (Jacelon & O'Dell, 2005).

5.4.1 Deductive qualitative analysis

Deductive qualitative analysis, also referred to as theoretical thematic analysis by Braun and Clarke (2006), is deductive as opposed to inductive in nature. Gilgun (2019) reiterated that deductive procedures were commonly used in quantitative research for theory testing; however, it was reintroduced into qualitative research because most researchers are trained in deductive approaches, i.e. literature review, defining terms, and developing a research question and hypothesis. Deductive thematic analysis is a method applicable to identifying, analysing, and reporting patterns (themes) in data (Braun & Clarke, 2006). This approach to data analysis, because it is deductive in nature, is said to be theory driven as it uses theory, unlike other approaches, and such theory may have been developed from the literature in a traditional sequence of research or may emerge from the analysed data (Boyatzis, 1998).

Theoretical thematic analysis is driven by the researcher's theoretical or analytical interest in an area. Researchers begin with a preliminary theory that can be composed or might be loosely formulated hunches based on personal or professional experience, formal hypotheses, or a set of ideas that form a model of how things work (Gilgun, 2005). In further justifying the application of deductive thematic analysis, Boyatzis (1998) stated that the theory-driven approach is particularly suitable when there is already knowledge and a conceptual organisation of the themes, which should be analysed in the answers or when the goal is to test a theory. In deductive thematic analysis, a structure or predetermined framework is used to analyse data (Gilgun, 2015). In other words, researchers impose their own structure or theories on the data and then use these to analyse it.

As Gilgun (2015) indicated, proponents of this approach state that it is particularly useful when one has specific research questions that already identify the main themes

or categories used to group the data and then look for similarities and differences. Given that this approach is relatively quicker and easier to perform, it is also particularly useful when time and resources are limited (Gilgun, 2015). The disadvantage of using a predetermined thematic framework is that one loses flexibility of analysis, which can bias and limit the interpretation of the data (Braun & Clarke, 2006).

Despite these disadvantages, the deductive qualitative analysis approach links well with the research question of this study, which is: What needs to be done to ensure a prompt and effective defence force, while it is dependent on a public procurement process that exists in a complex business environment characterised by a bureaucratic system? Linking the research question to the secondary questions and the concepts of the ST, it can be summarised as follows: what is the influence of stakeholders on the business environment? (relationships); what are the rules of engagement between stakeholders and the procurement process? (connectivity); and does the business environment have an influence on the public procurement process? (interdependence).

Since collected data are intended to address a specific research question through its secondary questions, this deductive approach becomes more relevant. Another aspect to note is that this study seeks to contribute to the solution for a practical problem; hence this approach will make it easier to identify issues and develop solutions to the problem. The coding was conducted using a theoretical approach as outlined in Boyatzis' (1998) book, *Transforming Qualitative Information: Thematic Analysis and Code Development*.

5.4.2 Validity and reliability

Qualitative research, as Rolfe (2006) stated, often faces criticism for lack of scientific rigour for justification of the methods adopted and lack of transparency in the logical process. The findings are also often seen as just a collection of personal opinions subject to the researcher's bias (Rolfe, 2006). There is currently an ongoing debate as to whether terms such as validity, reliability, and generalisability are appropriate to evaluate a qualitative research study. Ali and Yusof (2011) suggested that these terms are applicable, with validity referring to the integrity and application of the methods

undertaken and the precision with which the findings accurately reflect the data, while reliability describes consistency in the employed analytical process.

Validity and consistency in this study were achieved through the application of a triangulation technique through the adoption of three of the four approaches of triangulation posed by Williamson (2018), namely data triangulation, methodological triangulation, and theoretical triangulation. Triangulation is a method of cross-checking data from multiple sources to search for regularities in the research data (O'Donoghue & Punch, 2003). In adopting such an approach, one ensures the breadth, depth, and rigour of the study (Denzin & Lincoln, 1998).

Data triangulation involves a collection of data from a spectrum of sources for purposes of different views. In this case, various stakeholders were interviewed at different levels of the procurement process. These included former commanders as accounting officers and at the strategic level, Chiefs of Staff: Procurement for both strategic and operational levels, as well as procurement staff officers at the operational level. External sources from the Ministry of Finance and the Budgeting Department, senior officers from the MDJS, as well as desk officers from the oversight authority (the PPADB) were also interviewed.

Method triangulation is the use of different methods of data collection. This study conducted interviews and analysed documents. The documents used included extracts from the Ministerial Committee of Supplies. These are documents that are archived in the parliamentary library that are presented by the Minister of the MDJS in justifying the budget for departments under its jurisdiction. Other documents used were PPADB annual reports for the period under review, with particular focus on defence procurement. Extracts from the BDF vehicle operational readiness registers were also used.

Theoretical triangulation is the use of more than one theory for interpreting the same data (O'Donoghue & Punch, 2003). This study used more than one theory, namely the Systems Theory, the organisational buying behaviour theory, and the dialectical theory. Theory triangulation is more relevant as it involves the use of more than one theoretical approach to interpret and support data. This ensures that after the study is conducted, another study conducted through the same institution would give the same results.

5.5 ETHICAL CONSIDERATIONS

When conducting research, one must understand the basics of ethical research and how this may affect the study. One must avoid any risk of harming people, the environment, or property. The Tuskegee Syphilis Study was an example of a study that seriously violated these standards (Beauchamp & Bowie, 1997). A wide range of interaction took place in this study, which involved interviews, surveys, and document review. Through this interaction it was possible that some negative effects could have occurred. Such harm could have been psychological, financial, or even social. It was the responsibility of the researcher to ensure that he behaved according to the appropriate ethical standards, assessed how the research could affect the participants, and protected everyone, including supervisors and the institution.

In undertaking this study, the researcher ensured that ethical requirements were in line with university policy. Firstly, an application for ethical clearance was submitted to the Stellenbosch University Ethics Committee. Upon approval of the research project by the University Ethics Committee, permission to gather empirical data was sought from relevant stakeholders. Upon the approval of the research project by the relevant gatekeepers, the nature and purpose of this research project were explained at length to the potential study participants. The identity and the institutional association of the researcher (doctoral candidate and the university under which this research is conducted) were revealed to the potential study participants. The researcher guaranteed that the nature of participation in this study was completely voluntary. In this regard, when participants wished to withdraw their participation because of unforeseen circumstances, they could do so. They were not forced to participate in the study. The data were typically kept in a safe place to which only the researcher had access. The password used to upload and store data to the computer is only known to the researcher. Nobody else has access to the data.

No costs were incurred by the study participants. There were no discomforts and hurt feelings on the side of the participants. No benefits accrued to the participants due to participating in the study. Informed consent (clearly stipulating the purpose of the study and the identity of the researcher) in written form was obtained from the study participants before any interview was conducted. The dissemination of the results will be in the form of a completed doctoral thesis.

5.6 DELIMITATIONS OF THE STUDY

Study delimitations are those aspects or characteristics that limit the scope and define the boundaries of a study (Simon, 2011). These are merely a justification of why the researcher chose A over B. Although such justifications were given in different discussions in the study, it is necessary to reiterate them in this section so that they are distinctly identifiable.

The BDF has other issues that could be investigated, such as maintenance of the fleet, coordination of the logistics function, or areas of R&D. However, the choice of this study's problem was because the researcher believed that there is a need to address the basics before the organisation can engage in advanced defence capability. Most importantly, as the literature has indicated, defence procurement is unique; hence it needs to be conducted differently from the acquisition of normal goods and services. As indicated in the problem statement, this study covered a 10-year period from 2008 to 2018. It is important to focus on this period because it was during this period when the BDF started to notice a need to replenish its fleet, which turned out not to have achieved the envisaged outcomes.

On the issue of the sample size, there are other methods of non-probabilistic sampling that could have been adopted, but the adoption of a purposive sampling scheme ensured that interviews were conducted with the right people who understand the proceeding of the events over that period. While Simon (2011) recommended that for the research to get to the heart of the research problem and enable the research to answer the research question, one must conduct a pilot study, with the type of research instrument in the form of structured interviews, a pilot study was not necessary (Crowe *et al.*, 2011). In this case, the sample was too small to allow conducting a pilot study. Should the study have focused on something else, it would have gathered general information as opposed to specific details, which contributed significantly to issues as per the problem statement.

Sanderson *et al.* (2015) argued that procurement and SCM are theoretically diverse and that relevant discussions depend on a wide range of disciplines that include marketing, logistics, strategy, sociology, economics, and operations management. Procurement and SCM are thus characterised by borrowing theories from related disciplines such as economics (game theory and transaction cost analysis), sociology

(inter-organisational networks and organisational learning), and strategic management (resourced-based view of a firm). The ST for thinking about value for money and coordinated and collaborative relationships and networks from the field of biology and physics has also been brought into the field of procurement and SCM from an integrated SCM perspective. The different perspectives by these theories were summarised by Webster and Wind (1972), where they posited that organisational buying behaviour must be treated as a process with various phases in the form of a sequence of activities.

This study considered public procurement as a process that requires an integrated approach to thinking; hence the ST, reinforced by Webster and Wind's (1972) general model under organisational buying behaviour theories. Webster and Wind (1972) posited that industrial procurement takes place in the context of a formal organisation influenced by budget, cost, and profit considerations. This process of procurement involves many people in the decision-making process, with complex interactions among people, individuals, and organisational goals. This brings about the dialectical theory, and it is argued by Van de Ven and Poole (1995) that "the organizational entity exists in a pluralistic world of colliding events, forces, or contradictory values that compete with each other for domination and control". The choice of these three theories for the study ensured theoretical rigour, as one complemented the other. The ST as the key theory is much more concerned about the components of the procurement process and how they relate and interact with one another. Webster and Wind (1972) defined the different stakeholders in the procurement process and how they influence decision making, while the dialectical theory focuses on conflicts that arise as a result of these interactions.

Creswell and Poth (2018) argued that different fields of study have different types of designs but there are no specified and standard research designs. The standard number of designs also differs by fields of study. For example, Moustakas (1994) developed six in psychology, Denzin and Lincoln (1994) developed eight, and other fields such as education have their own different designs. This study recognises the existence of five designs (approaches) as outlined by Creswell and Poth (2018), namely narrative research, phenomenology, ethnography, grounded theory, and case study. This study adopted a case study design based on what the researcher wanted to achieve. The study wanted to explore a contemporary bounded system over time

through detailed, in-depth data collection involving multiple sources (observations, interviews, and document review) to report case themes (Creswell & Poth, 2018).

Thematic analysis was used for data analysis as opposed to narrative analysis, discourse analysis, and grounded theory because it emphasises identifying, analysing, and interpreting patterns of meaning in qualitative data. Thematic analysis was conducted in line with the classes of thematic analysis as defined by Braun and Clarke (2019) and in line with Boyatzis' (1998) coding guidelines. There are different ways in which thematic analysis can be approached, as defined by Braun and Clarke (2006), which include inductive, deductive, semantic, and theme development. This study adopted a deductive approach in which coding and theme development were directed by existing concepts or ideas. The deductive approach was therefore guided by the ST, the organisational buying behaviour theory, and the dialectical theory for code development.

5.7 CONCLUSION

This chapter was characterised by two main issues, namely details and justification. The theoretical framework was discussed in detail. The ST was selected as the major theory for this study's theoretical framework, with the application of a systems thinking approach to analysis through the use of the iceberg model. The discussion covered its origins and evolution over time. The theoretical framework culminated into the systems thinking approach to analyse this complex problem. The systems thinking approach was adopted as a complement to reductionism, which was a possible option for this study. Since this study sought to assess a process, the concept of synthesis was more appropriate than analysis.

The systems thinking approach has prevailed over reductionism in contemporary studies. The systems thinking approach was augmented by the organisational buying theory, Webster and Wind's (1972) general model of industrial procurement, and the dialectical theory. These theories in isolation cannot explain the whole process and, as such, where one has limitations, the other one complements it. Since this is a deductive study, codes were derived from these theories and part of the literature review and tested with themes from the collected data. This is discussed in detail in the next chapter.

The discussion further included the concept of philosophy and paradigms, which touched on positivism, post-positivism, and interpretivism and their relevance to the study's approach. Scholarly debates on these paradigms and their relevance to research in support of qualitative versus quantitative research appear unending. Contemporary research has shown that one can utilise more than one paradigm to gain a deeper understanding of phenomena. This continues to raise uncertainty in terms of precisely defining the paradigm adopted for a study. To further complicate the issue, there are the philosophical assumptions, namely ontology, epistemology, axiology, and methodology, as there seems to be a thin line that differentiates them when defining these paradigms. The different fields of study also bring different spheres of application of these different paradigms. It, however, remains the prerogative of the researcher and the line of study that will define the relevance of the paradigm choice.

When defining the research purpose, design, and approach, different authors use these terms interchangeably, which creates confusion. The purpose was defined as to whether it is exploratory, descriptive, or explanatory research (Educational Portal, 2014). For this study, an exploratory approach was adopted as the researcher had an idea or had observed something and sought to understand more about it.

The discussion dwelled on the two main approaches to research, namely qualitative and quantitative research. This study adopted a qualitative approach. The literature indicated that many qualitative research studies are inductive in nature; however, this study is deductive in nature as it is more focused on problem solving than theory development. As Merriam and Tisdell (2015) indicated, there are various types of qualitative research, such as evaluation-applied research, with its purpose being to evaluate data to inform a programme, process, or technique, as is the case with this study. This study will contribute to limited deductive qualitative research conducted so far. While most qualitative studies are from specific to generalisation, this one is from the general to the specific (Botswana's defence procurement problem).

Among the various research designs discussed, the case study was deemed most relevant to this study as it involves studying a bounded system over time. The case study is said to be more appropriate to study events, interventions, policy developments, and programme-based reforms, which must be studied in detail in a

real-life context (Crowe *et al.*, 2011). A case study is also relevant when an experimental design is inappropriate to answer the research question.

This study used interviews as its primary source of data. Various key personnel were selected on a purposive non-statistical sampling basis. All those selected were part of the procurement process throughout the period under investigation, i.e. 2008 to 2018. The use of various respondents, multiple theories, and different methods of data collection (namely interviews and document review) provided this study with validity due to data, theory, and method triangulation.

This study took a deductive thematic approach. The theories and literature were used to develop codes, and themes were deduced from the interviews and document review to address the research question through the research objectives. The details of the analysis are discussed in the next chapter, which outlines the procedures and then presents the data for discussion.

CHAPTER 6: DATA ANALYSIS, PRESENTATION OF FINDINGS, AND DISCUSSION

6.1 INTRODUCTION

This chapter discusses the data analysis, which includes the findings of the study. Data were collected primarily through open-ended interviews. The data and findings are presented in the form of tables, percentages, and graphs, where possible.

The overall aim of this study was to analyse the influence of the business environment on the public procurement process in Botswana and its ultimate impact on defence capability. This was intended to result in recommendations of what can best be done to ensure a prompt and efficient defence force in line with the vision of the defence force.

The data analysis was conducted in line with the research questions, which, when all addressed, will contribute to the overall answer to the primary research question. The study intended to conduct 12 interviews but conducted only 11. The selection of interviewees was based on expert purposive selection, which provided the opportunity of different people from different specialities giving their views, which contributed to data triangulation. Data are therefore presented along with the objectives as outlined in Chapter 1. Before the presentation of the data, it is worth understanding the data-analysis process, the computer software that was used, as well as the procedure of using the software.

6.2 DATA ANALYSIS

There is no single and accepted approach to analysing qualitative data; however, guidelines exist and qualitative research is also interpretive in that the researcher makes a personal assessment as to the description that fits the situation or themes that capture the major categories of information (Creswell & Guetterman, 2019).

Analysis was conducted using the computer-aided software ATLAS.ti, which enables one to organise text, graphic, audio, and visual data files, along with one's coding, memos, and findings, into a project (search, retrieve, and browse). It is a computer program that is used to facilitate the process of storing, analysing, sorting, and

representing or visualising data. This software does not necessarily analyse data for the research but rather facilitates data analysis.

The procedure for the use of ATLAS.ti software was in line with the guidelines prescribed by both the program's manual and Creswell and Guetterman (2019), as follows:

- Organise the files for analysis (transcribed interview, set of fieldnotes, etc.);
- Select a program to use (storing data, organising data, assigning labels or codes, and searching the data);
- Import the file directly into the software;
- Go through the file and mark sentences or paragraphs or ideas that pertain to what the participant is saying in the text;
- Provide a code label for the blocked text (and continue this process for the entire text file);
- After blocking and assigning labels to the text, search all text matching each code, and print out a file of these text passages; and
- Collapse these code labels into a few broad themes or categories, and include evidence for each category.

Among these steps of data analysis, coding is very significant because this was where the researcher merged the collected data with the themes or objectives of the study, which would assist in answering the research question. The presentation of the above approach is inductive; however, there is little difference when compared with the deductive approach.

6.3 CODING

A code in qualitative inquiry is most often a word or a short phrase that symbolically assigns a summative, salient, essence-capturing, and/or evocative attribute to a portion of language-based or visual data (Saldana, 2015). Gibbs (2007) defined coding as a way of indexing or categorising the text in order to establish a framework of thematic ideas. It is about how one defines what the data he/she is analysing are about. The two authors expressed the same sentiments; however, it must be noted that coding is not just labelling; it is linking data to the research idea and back to other

data. The data can consist of interview transcripts, participant observation, field-notes, journals, documents, literature, artefacts, photographs, video, websites, and e-mail correspondence; to mention a few (Saldana, 2015). In this case, data for this research study were obtained from interviews and documents. The importance of coding was expressed by authors such as Strauss (1987), that researchers who wish to become proficient at conducting qualitative analysis must learn to code well and easily and that the excellence of the research rests in part on the excellence of the coding.

Coding is classified as concept-driven coding or data-driven coding (or open coding). This means that one may approach the data with a developed system of codes and look for concepts/ideas in the text (concept-driven approach), or one can look for ideas/concepts in the text without a preceding conceptualisation and let the text speak for itself (data-driven coding). In both methods, initial and thorough readings of data and writing down which patterns or themes are noticed are of paramount importance. Coding for this study was concept/theory driven as codes were developed from the systems thinking theory with the iceberg model, as detailed earlier. The concepts used to develop the code book were the application of elements of systemic structures of the iceberg model as detailed in the code book (see Appendix B).

Coding was conducted in line with Boyatzis' (1998) guidelines for theory-driven coding in three stages (see Table 6.1).

Table 6.1: Boyatzis' (1998) stages of coding

Stage	Guideline
Stage I	Decide on sampling and design issues.
Stage II	Generate a code from a theory. Review and rewrite the code for applicability to the raw information. Determine reliability.
Stage III	Apply the code to the raw information. Determine validity. Interpret the results.

As indicated earlier, the coding was guided by the research objectives, which eventually constituted the main themes of this research. Through the iceberg model, systems thinking aspects of systemic structures and mental modes were allocated to different objectives as codes. Events and patterns were addressed from an observation perspective.

This chapter presents the main findings of the study according to the five main objectives of the study, which are:

- to explore the current influence of stakeholders on the business environment;
- to establish the rules of engagement between stakeholders and the procurement process;
- to evaluate if the business environment has an influence on the public procurement process;
- to assess if the procurement process has an impact on military capability; and
- to determine the best practice, if any, in the domain of public procurement in the region that can be adopted by the BDF.

These five objectives led to the development of the following five key questions:

- What is the influence of stakeholders on the business environment?
- What are the rules of engagement between stakeholders and the procurement process?
- Does the business environment have an influence on the public procurement process?
- What is the impact of the procurement process on military capability?
- What are best practices in the domain of public procurement in the region?

6.4 RESEARCH OBJECTIVES

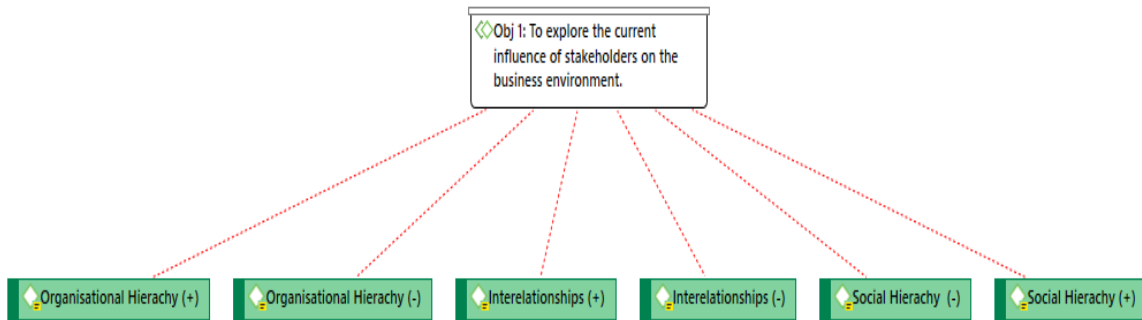
The discussion in this chapter is organised according to the five research objectives as discussed below.

6.4.1 Research Objective 1: To explore the influence of stakeholders on the business environment

Stakeholders, as defined by Bryson (2004:22), are “those individuals or groups who have the power to affect the future of an organisation, implying that those who do not have such power do not qualify as stakeholders”. In this case, it is important to examine various individuals or groups who determine the future of the BDF through procurement and how they influence its future. Considering the classification of environmental factors, it must be noted that they will be either internal or external.

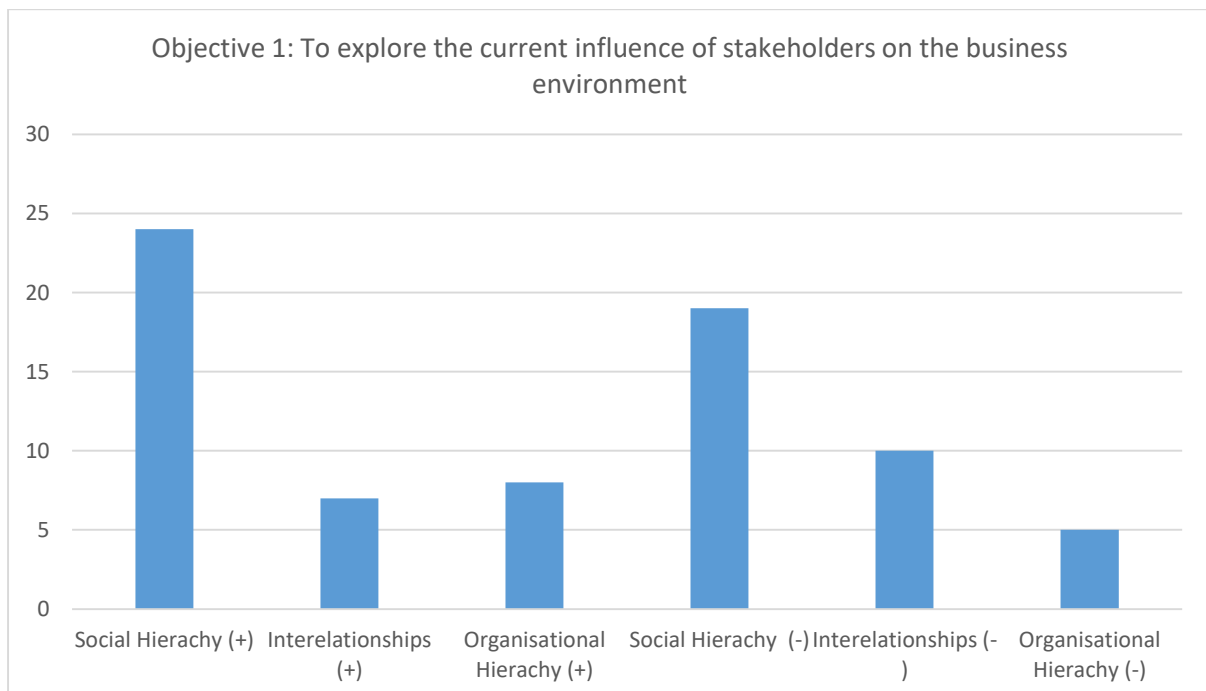
Determining the various stakeholders in Botswana’s business environment was undertaken through interrogating interrelationships, social hierarchy, and organisational hierarchy, which are elements of the systemic structures of the iceberg model as defined by Monat and Gannon (2015). The codes applied for this research objective are as presented in Figure 6.1.

Figure 6.1: Systemic structures elements for Research Objective 1



Having attached these elements of systemic structure to address the first research objective, the data indicated that social hierarchy had the highest intensity of responses. This means that there are more issues that have to do with social structures than organisational structures and interrelationships. Figure 6.2 depicts the density of the responses in relation to these elements.

Figure 6.2: Density of responses for Research Objective 1



The analysed data indicated that the business environment in Botswana possesses the characteristics as defined in the literature. The organisational buying behaviour model indicated that the procurement process is influenced by individuals, the environment, organisations, and society (Webster & Wind, 1972). The systems thinking theory further indicates that the interactions between these various stakeholders will be key to the effectiveness of the processes (Kim, 1999).

Organisational hierarchy is defined as “communication up and down the chain of command leading to decisions affecting processes using different levels of authority and a vertical link, or chain of command, between superior and subordinate levels of the organization” (McPhee, 1988). Organisational hierarchy was defined when a respondent indicated how decisions affect processes using different levels of authority. In determining the different stakeholders, the organisation is the starting point, which in this case is the BDF under the leadership of the Commander.

It is thus important to identify the stakeholders starting with the Commander of the BDF, who is also the accounting officer. He is vested with the authority of resourcing the defence force. The Commander conducts this through the engagement of Chiefs of Staff, Command Commanders, and procurement staff officers. All these role players have their personal attitudes and were identified as key stakeholders. The Commander can refuse external direction if he believes what he is doing is in good faith. This is what one of the former commanders stated:

“I remember ... being ordered to purchase the Land Rover [PUMA] ... I refused bluntly. I said to [the] president that as long as I am the Commander, I am not going to buy ... these vehicles because I know that these things are too expensive, costly to maintain, and their performance in our environment is not good, so I will not” (Respondent 5).

This statement shows the interference of the Commander-in-Chief, who also gives directions as to what can be bought for the military. This statement reveals that procurement can be derailed from the plan based on the interference of such stakeholders. Such a decision determines an alternative for the future of the organisation.

Social hierarchy is eminent in the procurement system. As defined by Magee and Galinsky (2008), “social hierarchy is the implicit or explicit rank order of individuals or

groups regarding a valued social dimension, where at least one individual or group must be subordinate to at least one other individual or group". Identifying this element from the collected data revealed stakeholders outside the organisation but not specific to the public procurement process. Social hierarchy was defined as when a respondent indicated how social groups across the procurement space rapidly self-organised into hierarchies, where members vary in their level of power, influence, skill, or dominance. This creates various stakeholders who influence the procurement process and determines the outcomes in the procurement process. The collected data indicated that society has different perceptions whenever there is a change in command or responsibility. These complications are made by personal interactions and relationships that create the opportunity for certain individuals and groups to be players in the procurement space. This was emphasised by one respondent, who said:

"... when there is a competition, the relatives of employees of the company are not allowed to partake in those competitions, that is the world that we need to be operating in but here you will find that in our situation, start with the Commander, former Commander, and then the president, his brothers were involved in businesses, he was the Commander of the BDF. Now you have the, General [name withheld], his friend [name withheld] was involved in supplying BDF with the ACMAT and stuff like that. Then came [name withheld] and then the wife was involved in the tendering businesses, so those are complications"
(Respondent 5).

Also in the social hierarchy are suppliers, who have been identified as key players and influencers. It emerged that what the military sometimes buys is determined by the suppliers. One respondent highlighted the influence of suppliers by saying:

"The other player is the suppliers who we depend on to help us know what is being offered in the market; in this particular case, they were able to give us a 'heads up' and we visited their facilities to really understand how these trucks come to life and how we can optimise them for our own specific missions"
(Respondent 1).

In the case above, suppliers are not acting as external factors in the business environment as they have the power to determine what must be bought for the military. Having a supplier giving the process some "heads up", leading to arranged visits as

indicated above, results in controversy. This kind of interaction with suppliers gives some legitimate expectations on the side of the supplier. Initiating procurement led by a certain supplier results in attempting to justify sole sourcing, which results in delays and skewed procurement procedures.

Interrelationships also help in identifying stakeholders at various stages of the procurement process. Interrelationships are defined as the way in which two or more things, people, or organisations are connected and affect one another (*Cambridge Dictionary*, 2020). Interrelationships were identified when a respondent indicated that there was a relationship between various stakeholders in the processes that contributed to identifying those stakeholders in relation to their influence. The BDF has been shown to have a disintegrated planning system, internal to external through relationships. The procurement of assets is not properly coordinated. This results in one formation acquiring a system that is not compatible with the other formations.

This is shown by Respondent 1, who said:

“Giving an example, the artillery units procure their own guns and those guns also come up with a communication system within them, so that the guns can be able to communicate. So they’ll do their own procuring for the guns with the communicating system from another company and us at Signals, we have a different communication system from another company, which we will have to merge with that one. Time and again, it is very difficult to make these things work together” (Respondent 1).

Taking the discussion further, based on the structure that the defence force is placed under the MDJS, the data showed that there is limited accountability to the ministry. Respondent 7 indicated this when he said:

“At any given time, the PS [Permanent Secretary] would not be able to say drones were bought at this place yesterday unless he is briefed by the committee itself. The minister as the political head, that accountability aspect comes now when he debates the budget of BDF and why, what is the budget required for? But on operational matters or at operational level, the procurement, the Ministerial Tender Committee, is the one which looks at procurement process of the BDF” (Respondent 7).

Further to this, the ministry, which is the custodian of the DOD, is not fully aware of what the BDF wants to acquire in a given year. The ministry does not have monitoring and evaluation responsibility over the defence force. Respondent 9 indicated this when he said:

“When it comes to BDF issues, I am a junior officer because those issues are being discussed by PS and other seniors. You know that they do not discuss their budget with everybody else, right? They have a security council, that is where these issues are discussed and we do not attend, but only the PS”
(Respondent 9).

The discussion above brought up the role of the ministry, the MTC, which by extension falls under the PPADB, and the MFED in the budget. The officers from Finance ensure that funds are availed for the procurement of goods and services for the nation. There is also an element of secrecy that emerged from the conversations with the respondents. This implies that there are high possibilities that some stakeholders may be side-lined, considering that some, such as the ministry, already have limited knowledge of what is happening in defence procurement. Table 6.2 summarises the stakeholders who are mainly involved in the defence procurement process, which is conducted in line with mainstream procurement, and their influence.

Table 6.2: Summary of stakeholder influence

Identity element	Stakeholder	Comment
Organisational hierarchy	<ul style="list-style-type: none"> • Commander-in-Chief • Defence Council • Commander: Defence Force • Deputy Commander • Chief of Staff: Procurement • Staff officers: Procurement 	These are stakeholders who, through communication, give downwards or upward input or orders for action and approval.
Social hierarchy	<ul style="list-style-type: none"> • Suppliers • Relatives • Friends • Government officials 	These are stakeholders who, from the initial stage, are not part of the process but come into the process based on the decisions made by the organisational hierarchy.
Interrelationships	<ul style="list-style-type: none"> • PPADB • Ministry of Finance (Budget) • MTC • Command Commanders • BDF Tender Secretariat 	These are predominantly stakeholders who can be classified as both internal and external factors as they interfere with the process from the beginning to the end.

From the analysed data, it is important that these components are arranged and organised in a manner so that they will bring forth an effective and efficient system. This is one of the assumptions of the systems thinking approach that the order in which these components are arranged will determine the system's effectiveness (Kim, 1999). The arrangement and effectiveness will be revealed when one looks at the rules of engagement and if the business environment has an influence on the public procurement process.

In view of the above, it is clear that stakeholders influence the business environment in the BDF. This is seen to influence the conduct of the procurement process by derailing it from normal procedures due to relationships that exist between various stakeholders.

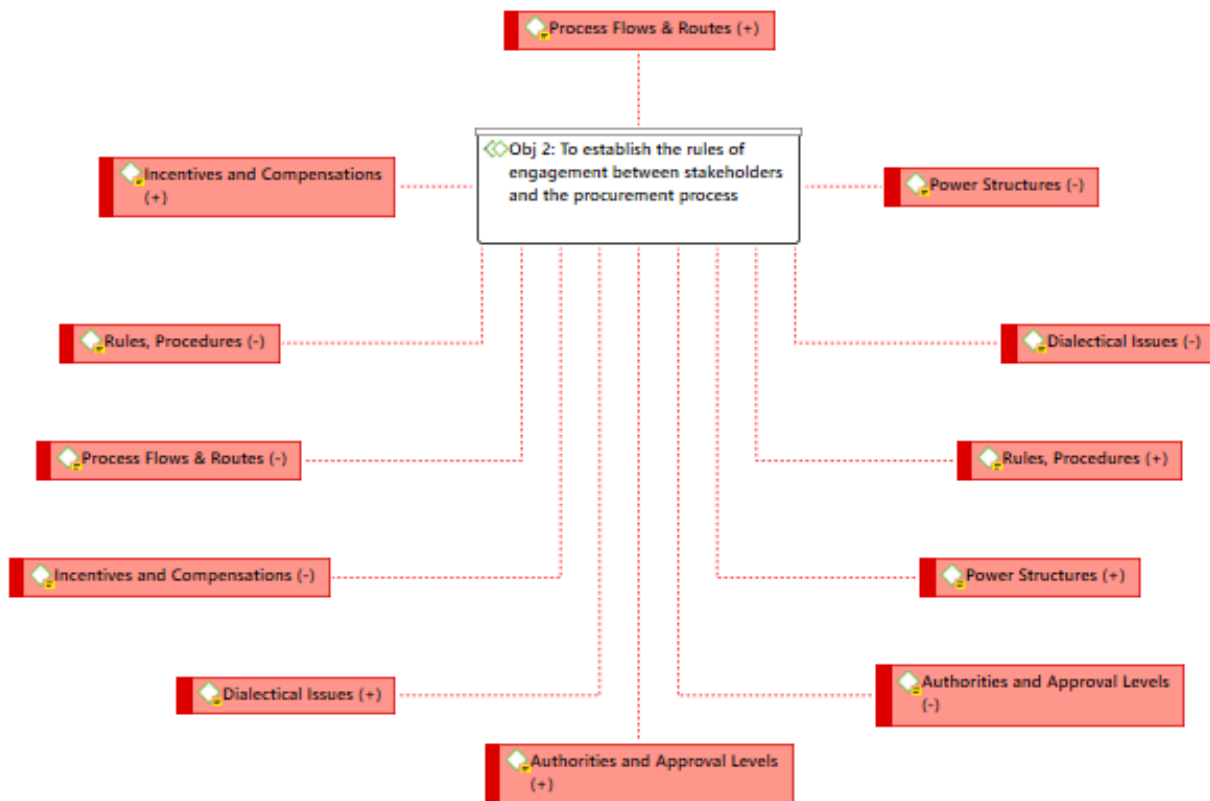
The next section discusses the second research objective, which seeks to establish if there are rules of engagement between stakeholders and the procurement process.

6.4.2 Research Objective 2: To establish the rules of engagement between stakeholders and the procurement process

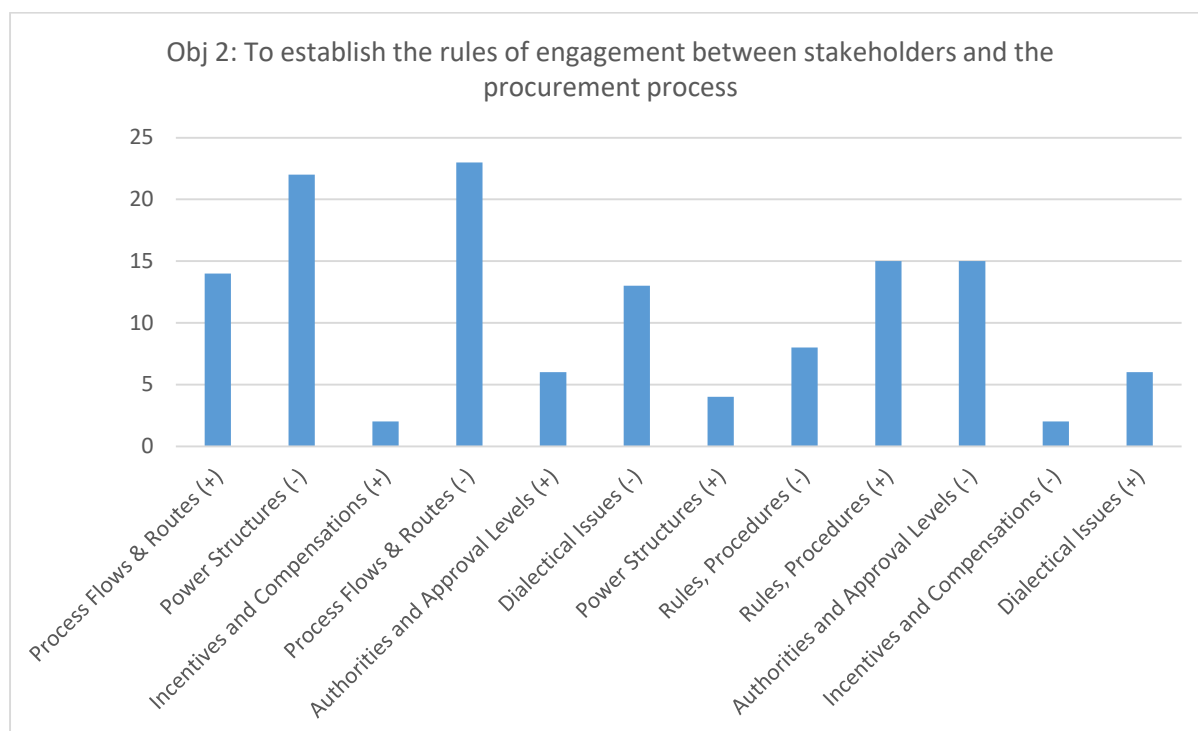
In addressing the second objective, the study sought to establish the interaction of various stakeholders with the procurement process as guided by existing policy documents and practice. In military terms, this is referred to as the rules of engagement, which are the internal rules or directives among military forces (including individuals) that define the circumstances, conditions, degree, and manner in which the use of force, or actions that might be construed as provocative, may be applied, and such rules do not normally dictate how a result is to be achieved, but will indicate what measures may be unacceptable (Cole, Drew, Maclaughlin & Mandsager, 2009). In this case, the definition will not extend to the use of force but will rather limit itself to the context of this topic, which will focus on authority, guidance, and structures with particular focus on procurement.

This was done through the identification of the following key elements of the systemic structure of an iceberg model as defined by Monat and Gannon (2015), as depicted in Figure 6.3.

Figure 6.3: Elements of systemic structures for Research Objective 2



From the literature in Chapter 3, the initial procurement plans follow the set procedures in line with the PPADA and procurement manuals. It starts with the budget, allocated by the Ministry of Finance. This budget is in line with the budget estimates submitted by various departments. After the allocations, the Minister of the MDJS makes a presentation to the parliament to justify the ministry's allocations in the form of Committee of Supplies. After such allocations, it is the responsibility of the procuring entity to execute the procurement plan. In the case of the BDF, the Commander is responsible to further evaluate the allocations and buy what he deems necessary for the defence force. The problem seems to start with the execution part. Figure 6.4 depicts the density of how different respondents gave their views on the various elements of systemic structures.

Figure 6.4: Density of responses for Research Objective 2

Authority, in simple terms, is the legitimate power that one person or a group possesses and practices over others (Bealey, 1999). Such authority is conferred to them by the rules and practices that constitute the relevant activity (McLean & McMillan, 2009). Approval levels imply that such authority levels give an action a favourable attitude or opinion or formal consent. Such will arise when a respondent indicates the occurrence of a situation or event because of influence by the authority taking action, approval, or responsibility. The collected data indicated that decisions made by the authorities most often result in influencing actions that do not correspond to the principle of value for money. Despite the procurement plans, some purchases are left without specifics, which open room for procurement that is influenced by decisions made at any given point in time. One of the respondents indicated that some purchases of second-hand vehicles were made because direction was given by the authorities without following the procurement plan and the principle of value for money.

“We bought as a second-hand [vehicle] but when we started NDP 11 as an NDP period, those vehicles were not planned for, even if you can check the write-up, there is nowhere where they said we will buy second-hand vehicles” (Respondent 2).

Most significantly to be noted is the timing of such changes in decisions. This cannot be ignored since such decisions have a great deal to do with a change in command. The assumption was that an NDP runs for five years and there must be a standing plan for execution. Based on a change in command, the assumption is that some of the planners who were involved are still available to pursue the development plan, but that does not seem to be the case. Respondent 2 indicated that he could not explain this lapse when he said:

“That is why, for instance, if you look at our Estimates Committee, it is chaired by the Deputy Commander on behalf of the Commander because he is the closest to the higher Commander who is supposed to monitor and after that chair the Estimates Committee as Deputy Commander, and then there is a general, Director General: Service Support, who is supposed to supervise all the major procurement of BDF done with development funds, so we have two generals who are in charge of BDF procurement” (Respondent 2).

The openness of the procurement plan in terms of what specifically must be bought subjects actions to some influence. The collected data indicated that there is always controversy when it comes to specific equipment to be bought. All procedures seem to be in place and agreements are reached, but the major problem comes in when a decision must be made as to what must be bought. Respondent 2 indicated:

“It was actually realised that the capability of the defence force has gone down a bit. So the BDF then took, undertook an exercise to try and review which particular areas [it needs to review] in terms of new procurement and by then, already that exercise was concluded and now we were left with the aspect of actually buying those items and the areas of [...] in particular became problematic because it was like there was that aspect of indecision to say what particular kind of communication they are going to buy and that is why they kept on postponing it, whereas the funds were made available” (Respondent 2).

In this case, if there is indecision on the actual execution, the whole process is stalled, which leads to loss of information provided to external stakeholders. When such information is leaked, it subjects the decision makers to being overwhelmed with presentations from different suppliers with different influence. This becomes terms of engagement that develop due to lack of implementation processes.

The other critical issue raised is the responsibility of the Minister of Defence. The responsibility of the minister is limited, as indicated, due to the absence of a guiding instrument in the form of a security policy or defence policy. This creates issues of authority, approval levels, and power structures that will lead to dialectical issues. There is an indication that there is a lack of direction from above. This was emphasised by Respondent 5 as follows:

“The next thing will then be the lack of the direction actually, in which you normally find rest with the minister in terms of defence policy so those two critical, I would say, policy decisions, in terms of security, how does the defence force or the military fit in the general security policy of governance among the other stakeholders, whether is commerce, whether is agriculture and then the policy, defence policy to achieve that?” (Respondent 5).

Further to the absence of guidelines in the form of defence and security policies is the question of whether defence procurement must be done in the BDF. This is a question the ministry is aware of, but no action is taken to rectify this. Respondent 7 said:

“Secondly, the issue that Botswana Defence Force, I do not know, maybe I am being controversial, Botswana Defence Force should be focusing on defending the sovereignty of the country, not running around trying to procure but rather there should be another institution, procurement should be housed here” (Respondent 7).

The above statement indicates the dilemma defined by Markowski and Hall (1998), who argued as to whether or not procurement of defence equipment must be a mandate of the users or whether it needs to be delegated to a procurement agent that acts on behalf of the consumer. It continues to be a predicament as to the extent to which procurement must be delegated to a centralised organisation or the client, especially in terms of the dimensions of the transaction. The ministry’s authority over the BDF has not been clearly defined. If the ministry was aware or of the belief that the current setup can be done differently and in a better way, what stops it from acting accordingly?

In the case above, the issue of interrelationships comes into perspective. The interrelationship, which is defragmented, leads to dialectical issues. In emphasising

relationships in a system as a characteristic, Hakansson and Snehota (1995) highlighted that organisations are embedded in a set of inter-organisational relationships with a set of stakeholders and, as such, organisations connect and operate in an environment of interdependencies. It is clear that interdependence is limited during the process. This, in most cases, leads to conflicts among the component parts and results in a dysfunctional system.

The issue of dialectics also arose from the data. Dialectical issues are issues as defined by Benson (1977) when emphasising that the organisation is seen as a concrete, multi-levelled structure affected by contradictions, which continuously undermine its existing features. Its directions depend on the interests and ideas of people and their power to produce and maintain a social formation. These arise when a respondent indicates that there exists relationships that highlight the tensions, struggles, and interplay between contrary tendencies (Griffin, 2011). While the discussion above indicates that the absence of security and defence policies contributes to the situation, the matter has been on the table before. The reason for the current situation may be because it seems favourable to some individuals. Based on such interests, the dialectical theory's assumptions come into play. The theory's assumption is that organisational entities exist in a pluralistic world of colliding events and forces, or contradictory values that compete with one another for domination and control (Van de Ven & Poole, 1995). Two forces, classified as thesis and antithesis, exist. Thesis forces are those that want to maintain the status quo or do not want to give way for the envisaged change, while antithesis forces are those that are for the change. The development of these policies was a work in progress but hit a standstill because of the forces that existed. This was justified by Respondent 4 as follows:

“All ministries which were involved, including immigration, plus everybody who deals with security, were there. They drafted that document. When it was presented to the minister, who was [name withheld], [name withheld] said it will not going to see the light of the day, I don't want this thing and he walked out of the meeting. That was the end of it and all it was doing, you know, all what we were saying was that there has to be a structure” (Respondent 4).

Further to the above statement and as reinforcement, another respondent highlighted the issue of power, which emerges in line with power structures. Power structures are

how authority is distributed between people in groups such as a government, institution, organisation, or a society to influence processes with some informal set of rules (Domhoff & Dye, 1987). This was identified when Respondent 4 indicated how authority distributed between people in groups is used to influence processes. This respondent mentioned this when he said:

“... secondly, also we as well, we are not very keen to let go of that power. That it is me who is responsible for procuring, so in the absence of a clear directive from the ministry or from the Commander-in-Chief [table banging], this is how procurement is going to be done ... It was that it never took off really. Yes, we knew we had to do things that way but it didn't work” (Respondent 4).

The statement above highlights the relationship between power and procurement. If such policies are in place, there are possibilities that some individuals will lose power to make decisions and alterations to the procurement plans; hence the thesis. Power structures indicate how the distribution of authority between people in groups influences processes with some informal sets of rules. While power structures seem to play a pivotal role in the procurement process, it is not that there are no structures at all. This was indicated by Respondent 6:

“I mean, those structures are there, it is only that organisations or procuring entities as we call them do not want to follow them to the letter because it does not favour them” (Respondent 6).

If people are aware of this anomaly, why is it not given proper attention to ensure that processes are followed to the letter?

The other conflicting issue is that of defence procurement in relation to other national priorities. The literature indicates that defence procurement is often an issue for states. The issue of how conversant the advocates are who are against equipping the military in relation to other national priorities needs serious attention. The main issue is the development of defence and security policies that will shed more light on justifying defence spending. While there was a notion that some legislators were not conversant with military issues, it becomes even worse when former generals issue controversial statements after joining politics and criticise spending on the military.

A respondent indicated this when he said:

“People still question, even politicians still question it, even today. Even people who served like General [name withheld], I think he made utterances as to the non-importance of the military. If you get that from a general, you have issues. Who was in Finance at one point and who was also Ground Forces Commander, then you know that the general perspective about the military is not in order” (Respondent 3).

While the literature has indicated debates on issues of military spending against other national priorities, authors such as Webber *et al.* (2004) posited that defence procurement marginally contributes to the GDP but does not contribute to the HDI. These are issues that must be investigated and a determination must be made as to whether defence procurement is intended to contribute to the GDP or HDI, or not. If so, then there must be a policy that guides achievement towards the HDI. On the other hand, Ruttan (2006) argued that military- and defence-related R&D and procurement have been a major source of technological development across a broad spectrum of industries in the USA. In this case, there is a need to further concentrate on how defence procurement can be enhanced together with R&D for technological development across all industries in Botswana. As a recommendation, Blickstein *et al.* (2016) believed that a way for nations to harmonise the national goals to the strategic military plans and ensure that the national economy supports the army is through proper recruitment, training, and equipping forces. They are of the view that the military directly influences the swiftness with which the country can mobilise and how long a country can endure a conflict. The literature in relation to this study concludes that guidelines are necessary through R&D, which will determine the goals of the procurement system and how the entities in the procurement space must work together to achieve the intended strategic goals.

There is also the issue of process flows and routes, which are defined as a business process and a sequence of process steps, where each process step is performed by an assigned user. A route supports the business process to provide a sequence of steps, where each step corresponds to a business process step and has an associated user to execute the step (Ouchi, 2007). This arose when a respondent indicated that the processes sometimes flows in a manner that impacts on the timely delivery of the

expected outcomes. The respondents reacted positively that a great deal is done in line with defined processes, as the intensity of the data shows. However, the issues of timeliness and the procurement cycle were identified as a barrier to the successful execution of the process. This was supported by Respondent 3:

“There is nothing for the military that can be bought within eight months which is available for your purchase. Once again, within that eight months you have three months to call or float a tender and submit to PPADB, and they return them to BDF for evaluation. After submission, if they found that you have not crossed a T, or did not put some dots, they will return them again. By the time you start your procurement, it's six months later and then you fall into a procurement deficit because you did not buy and then you cannot be refunded the money” (Respondent 3).

Such processes are extended by small issues, where if procurement was housed in one place or given to an independent entity, such delays would not be experienced. Furthermore, there is agreement that the processes in place are not sufficient or appropriate to achieve the goals of defence procurement. This was highlighted by Respondent 5:

“We created that occurrence because we did not put the proper processes in place that will lead our procurement, so we have got nobody to blame but ourselves because we are the problem” (Respondent 5).

It appears that there are conflicting views from procurement entities, adjudicators, and Finance personnel. Those from Finance indicated that they always make funds available whenever budgets and plans are submitted and as long as there is a project running, they will fund it. On the other hand, the military indicates that the Ministry of Finance always retracts funds once they are not used in a given year, while the adjudicators are of the view that the procurement period is sufficient but it is the BDF that does not have proper structures in place for effective execution of the process. The following narratives confirm the different views:

“Development recurrent budget this and that, if you did not spend and remember, even the 12 months expenditure cycle is not 12 months. You are going to get your budget announced on the 30th of March or before 30th of March

and it's said it takes effect from the 1st of April but on the 1st of April, the allocations, the votes, the money hasn't come through, you are probably going to get your money by end of April or May and when you get it in May, the procurement process as well takes long because it's not a supermarket, uhm, or shelf procurement. It is specific to your needs, made for you specifically, and it takes forever. Sometimes, the turnaround time for such procurement is two years and then there is no overlap. When you do overlap again, you are not sure because of the budget system” (Respondent 3).

“Sometimes evaluation is not a core business, the core business is the military right. Someone who is assigned may go for a three-month trip, so in most cases [evaluation] will be put aside until that individual returns. So, others were saying that is the main causes of delay” (Respondent 8).

“Then the money goes but it doesn't mean the project goes, project will remain. You will continue with your processes and when you are ready, you will come to us and ask for your money back, then we will give you the money. That is the beauty of the development budget” (Respondent 9).

The above statements indicate how the entities view one another. The guidelines may exist but there is a need for all parties to work together and take responsibility that defence procurement is not meant solely for the BDF. They should all have an understanding that defence procurement is conducted to ensure that services are provided to the nation. Security as a basic need is very important and should be understood and treated as such.

Rules, procedures, norms, policies, and guidelines are defined by March, Schulz and Zhou (2000) as explicit and implicit norms, regulations, and expectations that regulate the behaviour of individuals and interactions between them. It appears that despite the availability of rules to follow, some decisions are made based on personal interest, which is linked to incentives and compensation issues. Respondent 6 validated this when he said:

“So these things are done by people and they decide not to follow the rules as they have their own interests at heart” (Respondent 6).

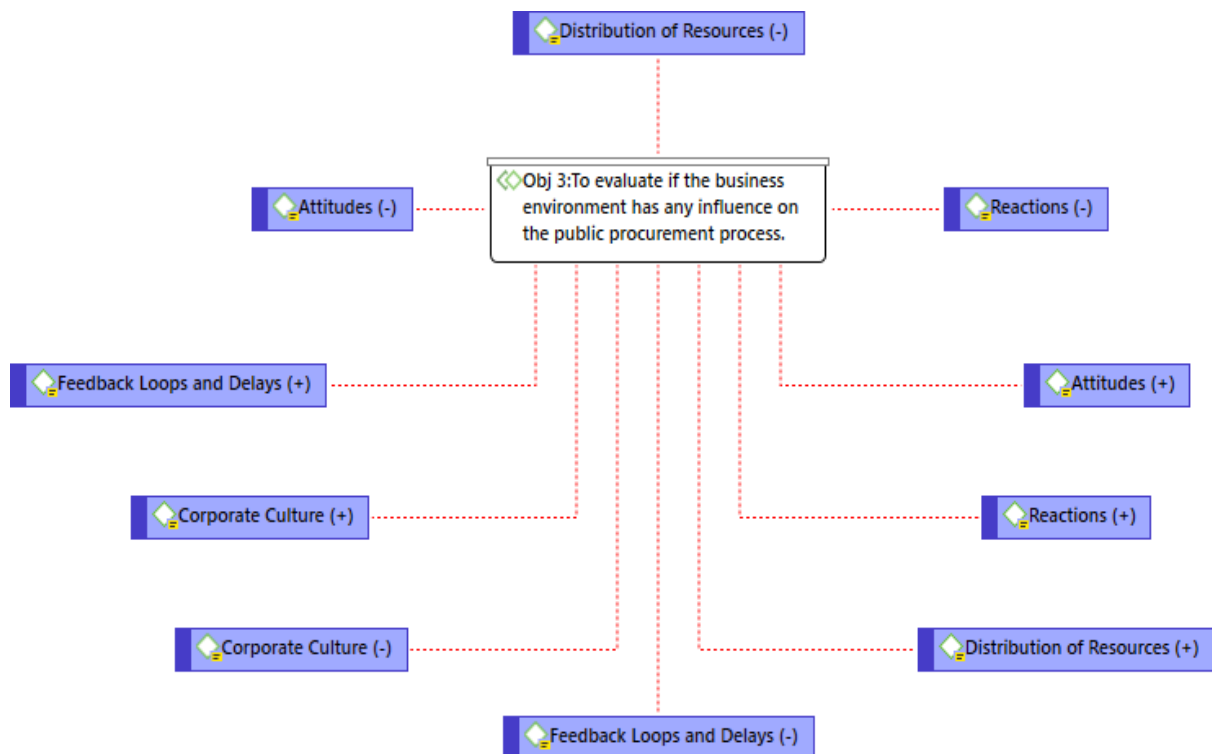
This statement made by Respondent 6 indicates that there is a vacuum where mechanisms are not in place to ensure that those who break the rules are reprimanded. Respondent 6 further revealed the issues of incentives and compensation, which are methods or systems that influence buying behaviour and may include disseminating information to external sources that on its own deserves some compensation of some kind (Varghese, 2008). If individuals have personal interests, then there must be a reward at the end in the form of compensation. These are challenges that need to be resolved to create a professional environment for the country's procurement system. This shows how individuals influence the procurement process through a culture where the roles and rules of engagement are not properly defined.

From the analysed data, it is evident that authorities and approval levels have played a pivotal role regarding what must be bought and what not. It is clear that authorities have been unsuccessful in having a clear and concise plan of what must be procured and to ensure that such is done within the set timelines. The data further indicated that power structures exist and that these are motivated by the absence of guiding tools in the form of security and defence policies. The absence of these tools therefore cannot properly illustrate the rules of engagement of different parties in the defence procurement space. The power structures eventually cross each other's lines, which results in conflict as defined by the dialectical theory. While processes have been laid out, it was shown that they encounter disruptions as a result of internal procuring entity processes and the interrelationships between different entities. Rules and guidelines exist but their enforcement was shown to be weak, which results in an informal system of individuals pursuing their own interests at the expense of those of the organisation. While different stakeholders are meant to coordinate their activities for the successful execution of their mandate, it appears that there is no connectivity between the processes and the planning part. The final issue in addressing this objective is that there are no clear rules of engagement from a security and defence policy to include monitoring and evaluation.

6.4.3 Research Objective 3: To evaluate if the business environment has an influence on the public procurement process

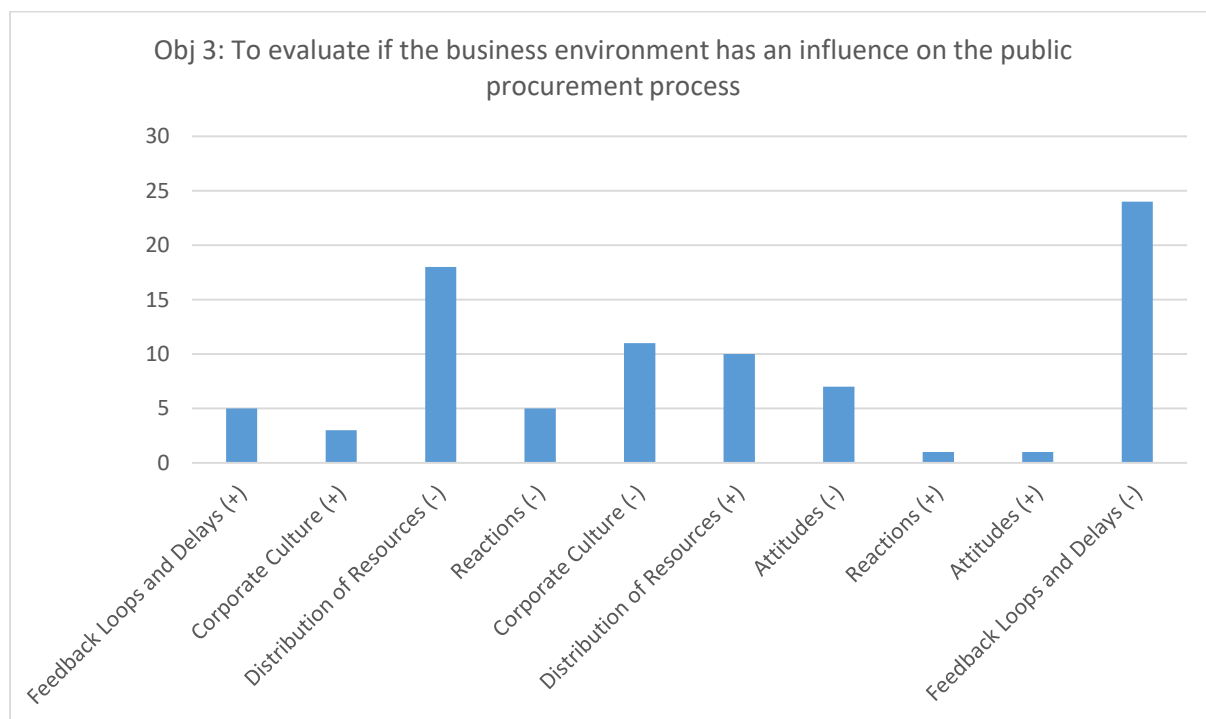
When discussing the influence that the business environment has on the public procurement process, the first objective indicated such influence to some extent by simply identifying the stakeholders. This objective takes the discussion further to the business environment as a whole, which includes both internal and external factors. A business environment as defined by Paulson (2012) entails external forces, factors, and institutions that are beyond the control of the firm and they affect the functioning of a business enterprise's processes. These include, among others, customers, competitors, suppliers, the government, and social, political, legal, and technological factors. This section identifies how these factors of the business environment have the capacity to be a compelling force for the production of effects on actions, behaviour, and/or opinions. The analysis therefore focused on the following elements of systemic structures from the iceberg model: attitudes, reactions, corporate culture, feedback loops, and delays in the system dynamics and distribution of resources to determine the influence of the business environment on the public procurement process. Figure 6.5 depicts these elements for discussion.

Figure 6.5: Systemic structure elements for Research Objective 3



The components as depicted in Figure 6.5 defined the elements of systemic structures as attitudes, reactions, corporate culture, feedback loops, and delays in the system dynamics, and distribution of resources. Figure 6.6 summarises the density of the comments in terms of each element. Density in this context will deduce the intensity of the comments towards an element of systemic structure.

Figure 6.6: Density of responses for Research Objective 3



The summary of the data presented in Figure 6.6 shows the density of the responses in relation to the different elements of systemic structures intended to address the third objective. The data showed that feedback loops (negative), which is when various respondents indicated communication between various stakeholders, resulting in delays and leading to failure to achieve the envisaged outcomes, are a major factor that influences the process. Distribution of resources (negative) is also a perception of the respondents which indicates that the allocation of funds is seen as a serious constraint to the execution of defence equipment procurement. Corporate culture (negative) is third in intensity and indicates that the respondents justified an action because they were guided by what was done before, despite its unfavourable outcomes. The discussion that follows details the findings on each of these elements in order of density.

In discussing these elements of systemic structure to address the research objective, feedback loops and delays were given more density when assessing whether the business environment affects the procurement process. Feedback loops are simply the use of feedback from both the customers and employees or product, while delays are defined as the idle time it takes to deliver a service (Stalk & Thomas, 1990). In this case, customers are institutions that play a vital role in ensuring that defence procurement is completed, while role players are different members of the BDF who take part in such procurement. This was mainly defined when a respondent indicated that communication between various stakeholders results in delays that lead to failure to achieve the envisaged outcomes.

To deliberate properly on this issue of feedback loops and delays, one must investigate the internal processes of a procuring entity before extending it beyond that. While the issue of leadership was highlighted by prior objectives, the issue emerges again to show how decision making contributes to poor feedback, which leads to delays. As a matter of procedure, the decision makers must endorse or approve some matters. This involves internal processes that ultimately result in delays. The following statement summarises these loops:

“Doing government work has got a process and this process is embedded in the [folio] system [of file movement]. A [folio] will come, a particular subject matter requires some people, whether its internal or external, then stored in a file at registries, then from registry, our normal tendency is that the files go to the senior officer but the job description of every senior officer is to take decisions. But how do you take decisions without input?” (Respondent 6).

One may ask how the BDF procurement plan is designed. One assumes that at the ministry, it must have been resolved that the BDF is to acquire operational vehicles. The BDF must then further define the type and mode of acquisition to be followed. The execution part of the actual procurement does not need further approvals and recommendations. This is an internal process that can be dealt with easily. This practice shows that there are possibilities of mistrust between the implementers of the procurement plan and the decision makers, who would by this time have little interest in the questions of what, how, and when, but rather who.

There is also the problem of a lack of follow-up on processes, especially during the back-and-forth communication between the procuring entity and the adjudicating bodies. This, however, points to internal processes with the procuring entity as they take too long to respond when required to do so. This was indicated by the following response:

“One other thing which is a [...] that we have not learned how to do the paperwork, which is required by PPADB. In fact, every time when we submit the papers, always returns and they need some corrections, but when they get here, just to correct a few things or something minor, BDF will keep the papers for the six coming weeks. You may wonder what the problem is, but otherwise the aspect of [the] PPAD [Act] is in order, it is only that we are the ones failing” (Respondent 2).

This was further proven by the chairperson of the PPADB in the 2012 report that there is poor responsiveness by procuring entities in terms of the submission of End of Activity Reports, with only 37% of the expected reports being received (PPADB, 2012). This shows how the problem of responsiveness for feedback has been emphasised. In the case of procedure in the process, the initial stages of procurement, which include vetting of the Invitation to Tender or, in the case of direct appointment, a submission to the PPADB as to why a direct appointment must be done, also contribute to delays. This includes back-and-forth communication that directly affects the period/time of such a transaction as a result of the process.

This is reflected in the following responses:

“That being the case, your request will not be accepted maybe the first time you submit your requirement or request. You will have to state really convincing reasons to the procuring body, which is PPADB” (Respondent 1).

“We have lost so many items that we could have procured in that given financial year and ended up lapsing or overlapping into the other year” (Respondent 1).

“It is a serious anomaly because when you look at the process of tendering, you know our process is cumbersome and tedious and it takes forever. So, imagine the process on its own takes around six months for us to get what we

want, for us to agree and complete a contract, it is another three months. So, by the time you finish and the negotiations, 10 months is gone” (Respondent 7).

This has to do with processes for compliance that have been determined in line with legislation. Compliance is very key and forms a critical component of the public procurement process. It is, however, unfortunate, as indicated by the data, how much time and ultimately resources are lost due to this back-and-forth communication. Further to this is the issue of compliance with purchasing plans. This leads to unauthorised purchases. This was emphasised by the chairperson of the PPADB in the annual report that “unauthorized procurement continued during the year, although the number of such transactions declined by 28% from 67 in 2010/11 to 48 in 2011/12, an increase of 26% in terms of value. Project site visits pointed to the inadequate supervision of projects and the poor enforcement of contracts by both procuring entities and contractors” (PPADB, 2012).

The other issue is that of dealing with international companies who are suppliers or manufacturers; in this case, in the delivery of specialised equipment. While such equipment takes years to manufacture, such information, despite being communicated to the national debate, is not given a provision. The outcry is that if funds were allocated and they are not spent, even if it is due to the circumstances beyond the procuring entity’s control, it becomes an unfavourable condition that will disadvantage the procuring entity in future allocations.

The following response provides evidence of the matter:

“Let me say, a couple of years when I left, in 2018, or a year and a half when I left to the ministry at the Office of the President, and we will ask, ‘Why haven’t you spent your allocation?’ It will be like we had ordered some aircrafts but they are not yet complete. We have ordered in France, some missile part of it comes from the [United] States and part of it from Israel and it is put together in a factory in Israel. There is lead time everywhere and mind you, a contract has been signed and it is in place” (Respondent 3).

This is an indication that the feedback loops are fragile. The Ministry of Finance must know what the BDF is procuring and how long ago it should have acquired such items. This should be supported by the PPADB and BURS as well. As indicated earlier,

security is a national service but if different departments of the government, who are also beneficiaries, cannot define the importance of security, then there is a problem. An instance is where BURS can hold on to military assets because some were not paid. One of the respondents stated:

“I mean we have had problems with, uuhhmm, BURS where I remember when we bought the PC-7s, you know it was a protracted debate that you know withholding tax and this and that it took months and months debating on those issues, but in the end they were resolved amicably” (Respondent 4).

While such interactions with BURS are not frequent, they do occur. The ultimate influence is that assets are held up at the expense of national security. This is why one author proposed that there must be an information centre where all major procurement projects are centralised. This will help to facilitate other projects when there are some delays in others due to such unforeseen circumstances rather than always returning the funds and limiting the allocation the following year as a form of punishment.

Corporate culture, as defined by Kerr and Slocum (2005), affects values and beliefs, which are presumed to substitute norms. This was very much prevalent in the data. Despite the fact that public procurement has taken a different stance as to the way it was done before, where one needed qualified professionals to do the job, the BDF continues to do it themselves without seeking the needed skills. This is a business environment that needs professionals to do the job. Recent years saw a mushrooming of institutions that had the ultimate goal of taking responsibility for procurement, just like auditors, economists, accountants, and other professionals do. This is shown by the following narrations from respondents who admitted that the issues were based on their own mistakes:

“But the main problem is not with PPADB. I must tell you that the main problem of procuring it is us. It is procuring entities within the defence force. Our knowledge is seriously wanting” (Respondent 2).

“We created that occurrence because we did not put the proper processes in place that will lead our procurement, so we have got nobody to blame but ourselves because we are the problem” (Respondent 5).

The professional landscape has changed and requires that procurement should be done by procurement professionals as opposed to previous times when procurement was a function of the professions of accounting and economics. Furthermore, one of the respondents indicated that the same problems kept reoccurring, despite the initiatives of personnel development:

“There is what we call lesson learned. BDF is very poor at learning. We try to develop our personnel, they keep on doing the same mistakes, and we accept and live with that. From there, we develop others and they continue doing the same mistake” (Respondent 6).

The persistent reoccurrence of these problems may be because those conducting procurement for the military are military personnel and can be deployed as and when the command deems it fit to do so. As such, they do not give the procurement function the utmost attention and priority. Despite the knowledge that engaging uniformed members results in delays, the data indicated that the BDF continues to use them, which has turned into a culture.

Further problems are created by the regulations in so far as how public procurement must be done. When the rules state that for all goods that are not specialised, an open tender is the most preferred, it brings about an assortment of goods. For example, for motor vehicles, the BDF has had an assortment of operational vehicles in the past. This culture of failing to find a solution for standardisation is shown by the data.

The data showed that the budget is prone to manipulation because what has been planned to be bought keeps on changing as a result of a lack of monitoring and evaluation. A respondent indicated this by saying:

“I mean, it will be drafted and get approved by the parliament but if there is no monitoring and evaluating or implementation, it will be back to [bangs cup] business as usual. They will buy ACMAT, tomorrow Bedford, next day buy Isuzu, next year... There has to be monitoring and evaluation” (Respondent 4).

Further to the above, there is an indication that the commanders have utmost power to make the final decision as to what must be bought. Despite the procurement plans, commanders can decide what can be bought, without thorough consultation with staff officers and other organs of the defence force. This supports the definition of the

business environment factors by the organisational buying behaviour theory that individuals play a vital role as actors in the business environment. These vacuums in the public procurement environment impact negatively on the process. A respondent indicated this by saying:

“No, no, no, definitely. It has to change. It has to change. In the current form, it will continue to create all these gaps because currently when you ask, why are you buying this, the answer is that the Commander said we should buy, but what are you saying? No, with us, we didn’t want to” (Respondent 4).

Having adopted the wrong practice as a norm makes it difficult to rectify just because it has been practised before. This is a clear indication that what is being bought was not in the procurement plan. This is what the chairman of the PPADB raised in the report of 2012; that among the challenges they have is “poor adherence to procurement plans by procuring entities resulting in adherence of only 48% overall. This translated into delayed service delivery to the public” (PPADB, 2012:7). A respondent was asked, since they are aware of these problems surrounding the public procurement system, why do they not rectify the anomaly? He answered:

“When you do not have a proper procurement system with properly defined parameters in which you work around, you end up... but is that a problem, is that the cause of the problem? It is not, it is the environment, the business environment that was created” (Respondent 5).

The statement indicates that there is an environment of normalising practices and beliefs that are well known not to be in line with rules, procedures, and guidelines because it is known that no one will follow up on them. The proper procurement system for public procurement is deliberately not attended to because it was deliberately created with such loopholes. Another respondent said:

“So these things are done by people and they decide not to follow the rules as they have their own interests at heart” (Respondent 6).

This addresses the concern above as to why things are not rectified even though they have come to the attention of the relevant authority.

As a follow-up to the findings above, the BDF has created an environment where supplier interference forms part of the culture. The suppliers have the liberty to interfere in the procurement process to the extent that the award can change or result in being nullified. One respondent validated this finding by stating:

“After tendering, after people have evaluated the tenders and satisfied themselves, then they decide to satisfy Company X. Company Y will come and say no, you shouldn’t have given to X, you should have given it to me. So, we are faced with those challenges of litigation” (Respondent 9).

Distribution of resources has also prevailed in the form of budgets as an influencing factor. This was identified when a respondent indicated that allocation of funds has been a serious constraint to the execution of defence procurement. While this has been pointed out as a constraint, it is not that funding is never done – the major challenge is that funding is time bound. This has been classified as a handicap because once one has not spent funds, they are taken back for further allocation without intentions of future replacement. As such, it has impacted on sustaining or maintaining the already bought equipment. This was emphasised by Respondent 1:

“I have realised that we have bought different systems from different companies, but many times it happened that we have not been maintaining those systems because once you fail to buy for this financial year and then you buy in the next financial year. It means that you have forfeited some of your funds, and then when the allocations for the other year comes and then you are not being given enough money so that you can maintain the systems that you have bought, so the systems have gone without being budgeted for as well” (Respondent 1).

The allocation and budgeting systems therefore do not support the nature of military procurement. From within the military, budgeting issues in relation to timelines contribute to the current state of affairs, while, to the contrary, external stakeholders believe that it is the defence force’s internal processes and decision making that contribute to the situation. This is evident from the respondents’ comments:

“And the same thing applies to do our aircraft. We had sufficient squadron for the F5, 12 plus three for trainers, and as they fell out of the sky, we had nothing

to replace them and the budget was also not there to replace them. And it was just an issue of budget, not procurement” (Respondent 3).

“I don’t know if procurement process is that much of a problem, even though one of the bottlenecks that we have always identified is our one-year budgeting [paper noise] cycle is constraining in the sense that, uhhmm, if you did not use the money in that one year, the money is taken back” (Respondent 4).

Contrary to the statements above, that the budget and the budgeting cycle are problems, Respondent 9 indicated that the BDF budget does not present what is possible in terms of performance in a year. There is just too much of what could not be achieved given the timelines.

“We want to put more of the projects, a very long shopping list, when the budget is not enough” (Respondent 9).

The inference from Respondent 9 indicates that the BDF in most cases does not have a defined plan for procurement. It does not give a detailed plan that will ensure that the allocations provided are all spent. Taking into consideration that the bulk of the allocation to the MDJS goes to the BDF, it has emerged that instead of a detailed plan of acquisition, the BDF just submits a long list that makes it difficult to execute.

Attitudes and reactions prevailed at a very low scale from the positive and the negative. As defined by Eagly and Chaiken (1993:1), attitudes are “a psychological tendency that is expressed by evaluating a particular entity with some degree of favour or disfavour”, while a reaction is how different individuals respond to an issue of the past (Ellis, 1983). It was shown that the BDF as an organisation will have a plan in place but does not execute its procurement efficiently. Eventually, the need becomes so acute that it tends to become emergency procurement. In some instances, it led to some decisions in the past of procuring second-hand equipment. In other words, the BDF creates a situation and then addresses it as a crisis.

Among the influencers is the media, which puts pressure on the BDF on issues such as to why it bought second-hand vehicles or purchased expensive air assets. The media houses supported politicians to defeat the course of action. Politicians had come into play using the available media to intercept some defence procurement. When the BDF wanted to procure air assets from Sweden, the leader of the opposition

started a petition titled “Arms race in the mist of poverty, massive unemployment and social inequality”, where he urged the Swedish government to block the sale of military assets to Botswana (*The Patriot on Sunday*, 2017). To date, such a purchase has not been realised. The main contention was that there are other national priorities and the country was not able to maintain those assets, which have shown to be expensive in terms of maintenance. The role of the media and the influence of political actors are shown through the following responses:

“There was nothing like that, it was a decision that was taken on the purchase of the second-hand vehicles. That is why the local media, the print media, at one stage they wanted to take it up to say, ‘BDF, why are you buying second-hand vehicles?’, but the issue appeared in Sunday Standard when they questioned the rationale and the economies of buying second-hand, but we did not want to answer. We never anticipated that we are going to buy them, they were just seen, and they said but this is good” (Respondent 2).

“Now people start looking at the military procurement plan as something that is out of this world and there is even further compounded by the issues of politics around it as you have seen with the air power” (Respondent 5).

The process of attempting to attain stability reshuffles the decision-making function. The BDF has changed command three times in the period under review and it is a culture even at the formation and command levels. This is indicated as a form of reaction when those in authority can go to the extent of replacing those who have been in charge of the procuring entity with the hope of increasing efficiency. Respondent 1 said:

“One thing that I have realised is that the commanding officers end up being swapped around, thinking that one would do better than the previous one in terms of buying equipment and doing it efficiently and utilising the funds for that given financial year” (Respondent 1).

The general public has also been identified as a major influence on the business environment. This was identified by Respondent 2:

“The other aspect was the general public, during trial times, we were diverged, the whole country to get perception from Batswana on whether they admire the vehicles or not” (Respondent 2).

Having defined the business environment in Chapter 2, which was classified as comprising internal and external factors, the data presented and the discussions above illustrate how such factors have influenced public procurement in Botswana. Bureaucracy cannot be denied, where some decisions were sought from the president who, although being the Commander-in-Chief but not within the structures of public procurement, influenced the outcomes of the decisions in the process. While bureaucracy is attributed to extending the procurement process, some have different views on it. Respondent 7 indicated that public procurement in Botswana is indeed characterised by bureaucracy:

“But the best part of a bureaucracy is that things will be done and will be checked and will be thoroughly assessed and so forth, but it has its own disadvantages” (Respondent 7).

I remember the tender had to be cancelled for the second time, reasons being that they were asking for [directed] funds from UK but it was not because of that, it was sort of, it was cancelled because others were. MTC ended up cancelling, as you can see, cancellation of tenders, re-cancelling, re-tendering, re-evaluation, these are the major causes” (Respondent 8).

Table 6.3 summarises the issues identified as factors that influence Botswana’s public procurement process and how they have influenced timely delivery and the quality of goods.

Table 6.3: Summary of the influence of the business environment on public procurement

Environment factor	Comments
Internal processes	These include the flow of information from the external environment into the BDF, where files are prone to delays because some form of sequence for decision making must be followed.
Leadership	The decision-making process, where there are no concrete decisions to guide action by lower management and to influence timely delivery and quality of goods.
Monitoring and evaluation	Failure to track documents and follow up on projects, which in most cases leads to a project not being delivered or delivered at a very late stage. This results in delays and project failure.
Rules, policies, and guidelines	The rules, policies, and guidelines dictate that the preferred method of procurement is open tender. This has contributed to failure to standardise, which led to miscellaneous inventory and failure to maintain such a variety of inventory.
Nature of military equipment	Military equipment items by nature are not off-the-shelf items. This leads to these items taking longer than the budgeting cycle to manufacture, which results in delays and loss of allocated funds.
Procurement cycle	The procurement cycle of 12 months was shown to be insufficient for military procurement. It influences the nature of contracts and the use of funds, and contributes to the loss of allocated funds.
Political interference	Politicians advocate against military expenditure in favour of other national priorities. This influences which projects can be carried out and which should not.
Media	The media, as the national watchdog, acts as an independent entity other than the Public Accounts Committee, the Directorate of Corruption and Economic Crime, and the Ombudsman to probe issues that they believe are disadvantageous to ordinary citizens. They notify politicians of issues that, after being pursued, result in a different view of the projects.
Suppliers	Suppliers were shown to be very influential in what the BDF buys and they influence the procurement process when they intervene in the form of litigation after awards.

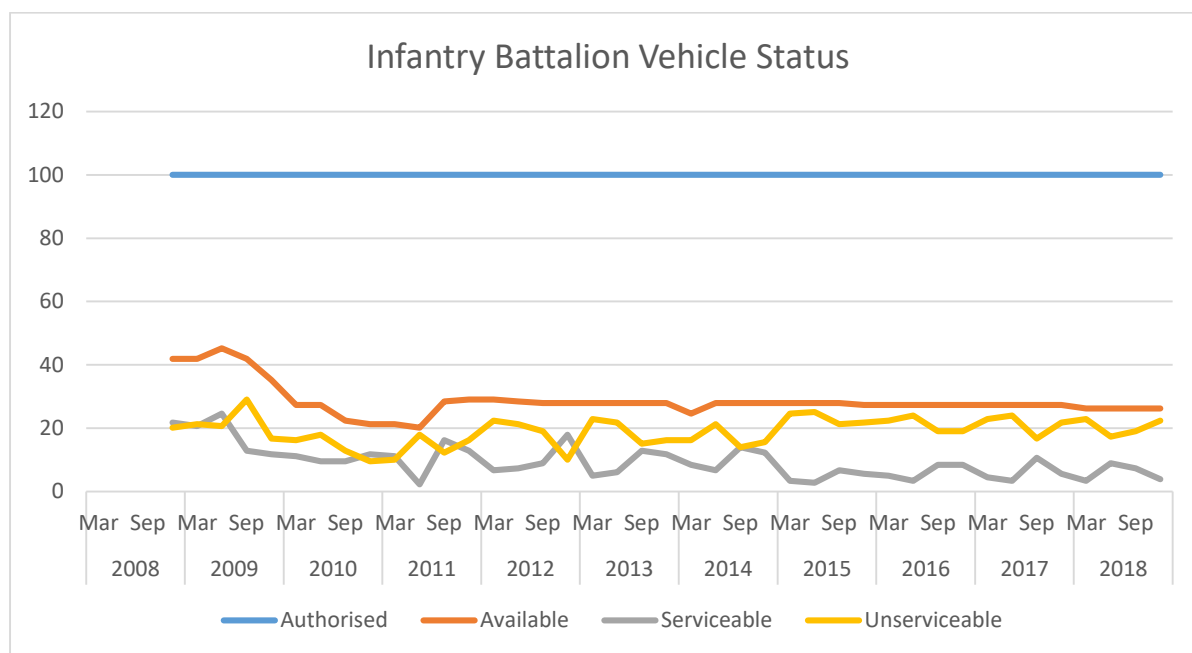
In addressing this objective, the data indicated that the business environment indeed influences the public procurement process. In other words, it gives some people or institutions the power to be a compelling force to influence the actions, behaviour, and/or opinions of others. The literature indicated that factors that influence public procurement might include social, political, economic, and technological issues, and these surfaced from the collected data. Linking this to the assumptions of the ST, there is a lack of connectivity between the component parts. When one takes the Ministry of Finance, for example, all it is concerned with is the allocation of funds and retracting funds. While the BDF stands by its belief that when funds are not used, they are retracted, the Ministry of Finance denies this. The BDF remains the major beneficiary of the budget allocated to the MDJS; however, the data indicated that the BDF is

seldom able to use all allocated funds, while at the same time it fails to acquire what is needed for the military. The findings indicated that the 12-month procurement cycle is not sufficient for military procurement. On the other hand, there are views that the BDF is not able to use its funds due to lack of proper planning and effective internal processes.

In addressing this research objective, it was found that the business environment indeed has a negative influence on public procurement. This influence has been ascribed to other stakeholders on the environment at large. This environment includes political interference, the media, and interorganisational relationships. The resultant influence is that of lengthening the process, which results in failure to deliver and loss of revenue due to financial-year constraints and litigation in some instances. Identifying these lapses in the system will assist to address the research question in terms of what must be done to ensure an effective and efficient defence force. Since the data presented here and the discussions around it were more from a general perspective, it is worth looking at the impact these influences have on the BDF. The next objective discusses this in detail.

6.4.4 Research Objective 4: To assess if the procurement process has an impact on military capability

Military capability was defined in Chapter 3 as the ability of the defence force or military to achieve an objective in a given time. The ability of the military to achieve an objective depends on viewing capability as a system of interlocking and interdependent components. Under this model, the major focus is on issues such as doctrine, organisation, training, material, leadership, education, personnel, and facilities (Anteroinen, 2012). As such, these functions must be intertwined to provide capability. Since this study focused on equipment, which forms part of material, with a specific focus on mobility, one of the infantry battalion's basic mobility assets was assessed. Interviews could not justify the actual impact; documentary records were therefore analysed. The data were drawn from records, which indicated the vehicles requirement/authorised, available, and serviceable and unserviceable over the 10-year period under review. Figure 6.7 illustrates the data as recorded.

Figure 6.7: Unit transport readiness for a 10-year period

The vertical axis defines the percentage of vehicles, while the horizontal axis defines the period from 2008 to 2018. The figure shows that there has been a negative impact on defence capability. The data show that the unit requirement, as shown by the authorised line, which is what it needs to operate effectively, is far from being achieved. Compared to what the unit is holding, it implies that there has been no purchase of additional units of vehicles to achieve unit requirements. Rather than the unit holding graph going towards the unit authorisation, there was rather a decline in 2009, which can be translated as transfer out mainly due to disposal. There was an insignificant increase in 2011, which implies that some additional units were allocated to the unit. If there was effective procurement, the unit holding or available units would have seen a positive upwards movement, but it shows a negative or downwards movement instead. This indicates that there is insufficient procurement to fulfil the unit requirements.

Taking the discussion further to the rules of engagement, as earlier discussed, there is no collaboration as to what the minister presents when securing funds for the ministry in March every year after the presentation of the budget by the Minister of the MFED. The minister presents the Committee of Supplies to the parliament to justify allocations to the ministry. Table 6.4 shows extracts of the Committee of Supplies as presented by various ministers of defence over the period under review.

Table 6.4: Extracts from Committee of Supplies by former ministers of the MDJS

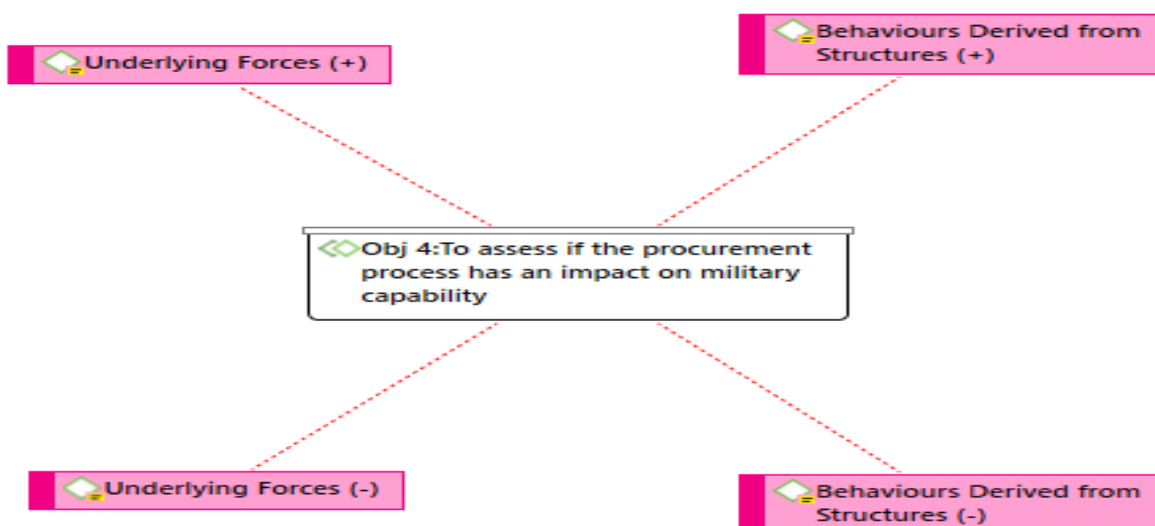
Year	Justification for allocation
2018	"The remaining eighty-two point nine percent (82.9%), which is One Billion, Seven Hundred and Eighty-Nine Million, Nine Hundred and Seventy-Six Thousand, Four Hundred and Ninety-Five Pula (P1,789,976,495) will be shared between Air Assets, Military Specification Vehicles, Communications Equipment and other defence essentials" (Botswana Parliament, 2018).
2016	"The remaining (82.5%) which is Two Billion, Six Hundred and Forty-Five Million, Five Hundred and Ninety-Two Thousand Pula (P2,645,592,000) will be shared between aircrafts, vehicles, communication and defence equipment projects as the organisation attempts to raise and maintain the desired level of operational readiness" (Botswana Parliament, 2016).
2015	"The remaining (81.8%) which is Nine Hundred and Three million, Nine Hundred Thirty-Six Thousand and Sixty-One Pula (903,936,061) will cover aircrafts, vehicles, communications and Defence equipment" (Botswana Parliament, 2015).
2014	"The remaining Four Hundred and Twenty Million, Four Hundred and Eighty-Four Thousand Pula (P420,484,000) or 67% will cover aircrafts, vehicles, Communication and defence equipment projects" (Botswana Parliament, 2014).
2013	"The remaining Four Hundred and Thirty-Six Million, Five Hundred and Five Thousand, Eight Hundred and Sixty-One Pula (P436,505 861) which is 61%, is required to make final payments to diverse military equipment and ongoing projects with financial obligations that will be due in 2013/2014 financial year" (Botswana Parliament, 2013).
2012	"The remaining Three Hundred and Sixty-Six Million Pula (P366,000,000) which is 72.3% is required to make final payments of some of the military equipment financial obligations which are due in the next financial year" (Botswana Parliament, 2012).
2011	"The remaining Four Hundred and Seventy Million Pula (P470,000,000) or 80% will cover the remaining development activities which comprise of aircrafts, vehicles, communications and defence equipment" (Botswana Parliament, 2011).
2010	"The remaining Three Hundred and Ninety Million, and Eighteen Thousand Pula (P390,018,000) which is 68% has been allocated to aircrafts, vehicles communications and defence equipment" (Botswana Parliament, 2010).
2009	"Mr Chairman, I request an amount of Five Hundred Million Pula (P500,000,000) to cover the ongoing building projects, mainly housing, as well as payments for aircrafts, vehicles, communications and defence equipment for Botswana Defence Force" (Botswana Parliament, 2009).

The extracts above do not corroborate the situation of basic unit transport requirements. Almost every year, the minister indicates that vehicles and communication equipment will be bought, but Figure 6.7 indicates the contrary. Since funds are availed for procurement, even when it is said that funds are returned when not used, does it warrant the state of affairs of the transport status? This is an indication that the minister is not well informed of the actual activities on the ground. The extracts indicate that there is never feedback of what previously happened but rather a presentation of what was said in the previous year. Figure 6.7 shows how lack of oversight by the ministry results in a negative impact on defence operational readiness because of inefficient procurement processes.

Taking the analysis of Figure 6.7 further, the number of unserviceable vehicles was higher than the serviceable numbers. What accounts for this must still be defined. One can, however, still subject this to the procurement process in the sense that the process is still insufficient; not only in procuring complete units of vehicles, but also the procurement of parts for maintenance and services of the existing fleet.

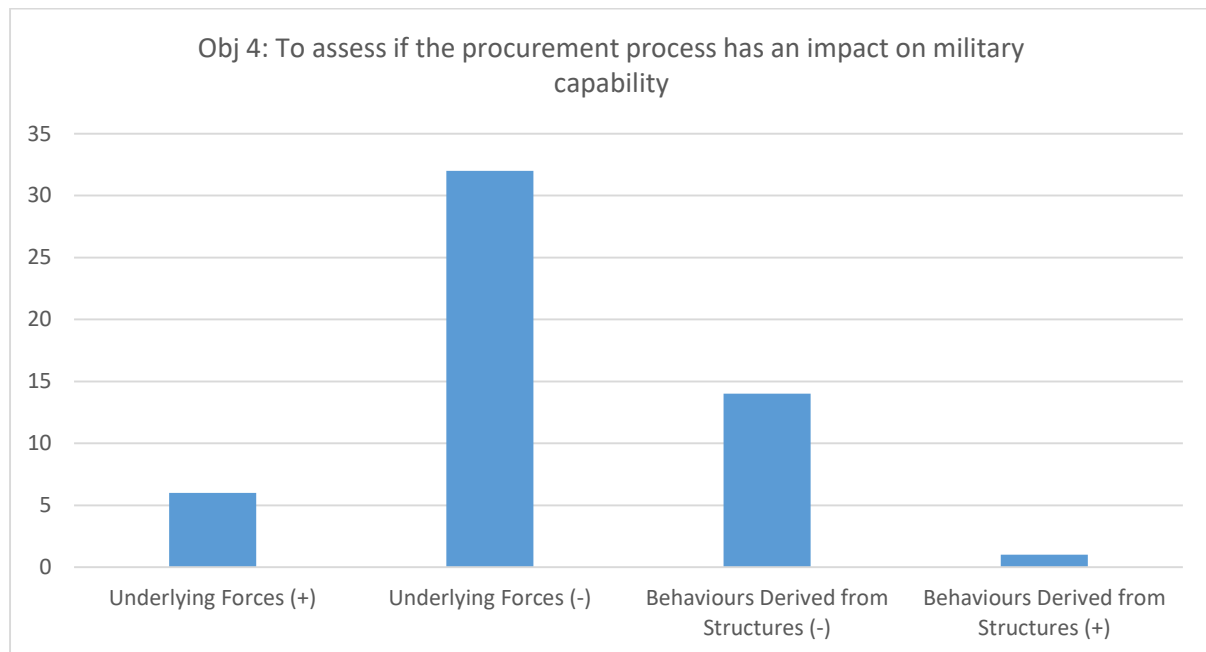
Having proven that the BDF’s capability has been impacted negatively, it is worth justifying that the procurement process has indeed led to this situation. Different interviews revealed that there is certainly a problem. In doing so, the following aspect of systemic structures of the iceberg model was examined: underlying forces that exist in the organisation, which were defined by Monat and Gannon (2015) as informal ways of work that have been tacitly or explicitly institutionalised. These are underlying features of an event or situation and are not noticeable, and which may be difficult to expose. These were identified when the respondents indicated that there are informal ways of work that have been tacitly or explicitly institutionalised. Where there is mention of a known fact but either something or nothing is done to correct it, it leads to further actions that have unfavourable or favourable results. Monat and Gannon (2015) indicated that some behaviours are derived from structures, which contribute to these underlying forces. Such behaviours were identified when a respondent indicated action taken to take advantage of the failure of the authority to give direction or guidance in terms of a given situation that results in negative or positive outcomes. Figure 6.8 depicts elements of systemic structures to address the fourth research objective.

Figure 6.8: Systemic structures elements for Research Objective 4



The presentation as per Figure 6.8 was further validated through the interviews, which were intended to justify why there is such an impact. In discussing this objective, the presentation of the data shows that most respondents indicated that there are more underlying forces in the negative, which contributes to the impact as depicted above, followed by behaviours in the negative. This is shown by the density of the responses as shown in Figure 6.9.

Figure 6.9: Density of responses for Research Objective 4



Underlying forces, as indicated earlier, are underlying features of an event or situation that are not noticeable and which may be difficult to expose. What makes it difficult to expose these events or situations when they are anticipated to happen remains an unanswered question. One may take as an example an asset's lifecycle. Every asset has its own lifecycle, which is affected by accidents leading to loss, as well as ageing and obsolescence. Why is it then that a fleet of troop carriers can reach the end of their lifecycle without a proper plan to replace them? To the contrary, there were plans to implement a process of standardisation that was conducted through the procedure of trials and final decisions but there was never continuity. A few were bought and that was the end of the project, which affected the ability of these military units to perform their duties effectively. The following responses justify these findings:

“We have tried to standardise this. Like I said, if you realise that the other command has its own system and the other one has its own different system,

because when we procure, we do not inform each other, we do not sit down and then say we want to do this. We do not include all the stakeholders within that particular project. We are working in isolation, that is the problem” (Respondent 1).

“It was actually realised that the capability of the defence force has gone down a bit. So the BDF then took, undertook an exercise to try and review which particular areas [it needs to review] in terms of new procurement and by then, already that exercise was concluded and now we were left with the aspect of actually buying those items and the areas of [...] in particular it became problematic because it was like there was that aspect of indecision to say what particular kind of communication they are going to buy and that is why they kept on postponing it, whereas the funds were made available” (Respondent 2).

The above narrations show that this negative impact is because of the approach taken when conducting procurement analysis. Rather than taking a holistic approach, the defence force takes a reductionist approach, where each component identifies its needs in isolation. By so doing, they fail to meet the systems thinking assumptions of interrelatedness and connectivity. Having failed to standardise the fleet and determine the means of acquiring such while having spent money and time to take vehicles for trials, can be ascribed to the notion of underlying forces.

The suppliers who participate in procurement and how they are informed of such defence needs must also be considered. One of the respondents indicated that failure to draw the line on who should participate in tenders also has implications. There must be a clear division of who can participate in supplying the BDF because if the brother of the president or relatives of the high command in the BDF supply the BDF, it becomes a serious force to influence the outcomes of the award of the contract or tender.

“I will tell you this, my predecessor at the time when he was there, there was a time when the wife was involved in tenders supplying BDF, you people will just pay her and you will say nothing, it was a normal world, used to tender for catering, at BDF. Something that in the real world of business of integrity, corrupt-free world will never be unheard of but there... our Commander of the defence force’s wife was participating in tenders and at the end of the day, she

was not supplying as per the agreements of the contract and nobody said anything” (Respondent 5).

Furthermore, it was indicated that defence procurement tends to be supplier driven rather than customer driven. As the data indicated, most of the suppliers make offers, because they are well informed about the defence force’s needs before something is put up for tender.

“Sometimes it looks like the information leaks to them that BDF was in an exercise of improving its capability, then leaks that they need a new fleet and an individual who could be an agent of the second hands at England comes this side to give us a picture that I heard you need new ones but those will be only 22 but if you buy second-hand [vehicles] they will be 88 and the whole of 88 are moving but they all need this and that. That is the part which is driven by the agent who tries to influence us to buy from them and successfully they do that” (Respondent 2).

The issue as defined above is an issue that happens and is seen often. What is difficult to arrive at is why proper action is not taken. It is furthermore a difficult situation in which some of those who must take action find themselves in. The following responses show that the oversight authority is also aware of such issues, but is unable to intervene.

“Look at those issues which were raised. One of the issues was on lack of transparency in procuring and that best practices dictate where procurement should be done. But I would not be able to say why we have kept quiet, why we did not do this, I will not answer that” (Respondent 7).

“They formed their own independent tender committee. Yes, maybe it, however, it is just that junior officers felt like, they were sceptical about it, they had one main reason why they were afraid; I don’t know whether you want to know?” (Respondent 8).

The BDF continues to conduct its own procurement, as indicated by the data, to the extent that it established their own committee. It is clear that junior officers were not in support of this but it had to be convened as the authorities had directed so. This is an indication of the procurement process and fragile structures that lead to some

behaviour that may be subscribed to serve interests outside of those of the defence force. The following response shows some behaviours derived from these fragile structures:

“Those of you who are still there, you should be held to blame. Today we all agree on this thing, tomorrow you change altogether” (Respondent 4).

To verify that the procurement structures were indeed fragile, Respondent 5 stated:

“This behaviour, actually it is behaviour whereby people will start running around and go and report you to the Commander-in-Chief, to some minister, to the lobbyists, because when I was Commander, my small conference room was always busy where some parliamentarians were arguing on some personalities so that they could be favoured by the outcomes” (Respondent 5).

One can conclude that while there must be a fair and transparent procurement system, in line with the pillars of public procurement, it is imperative that it must not be opened up to the extent that every party who is not satisfied can stall the proceedings. This has resulted in loss of time and resources since funds allocated for a project will be returned if not used in the current financial year. As the literature indicated, military structures are predetermined and regulated by clearly stipulated norms through messages, channels, and communication networks (McKernan *et al.*, 2018). This means that Botswana’s procurement process defies the literature, in the sense that while such organised channels and communication networks do exist, the procurement process is conducted outside such formal structures.

Further elucidating on the issue of underlying forces, the chairperson of the PPADB in the 2018 annual report indicated that “non-performing contractors continue to bid for and win government contracts, and often continue with their unacceptable performance and misconduct” (PPADB, 2018). This is a clear indication that the PPADB as the authority is aware of non-performing contractors or suppliers but they continue to be allowed to take part in government tenders while they have failed before. There must be some forces that legitimise this status quo.

The objective to determine whether the procurement process has an impact on defence capability was achieved. The outcomes clearly show how the operational capability of the defence force has not improved over the time under review.

There has rather been a decline in the operational capability of the defence force. This is because of underlying forces that are outside the formal procedures and guidelines. The major issues as defined from the respondents included lack of continuity in defence projects mainly due to changes in command, and close associates participating in defence equipment procurement and services. Other issues include lack of integrity among those who are privy to information to the extent that such information is leaked to external parties. Further to these factors are issues of fragile structures subject to interference by external stakeholders.

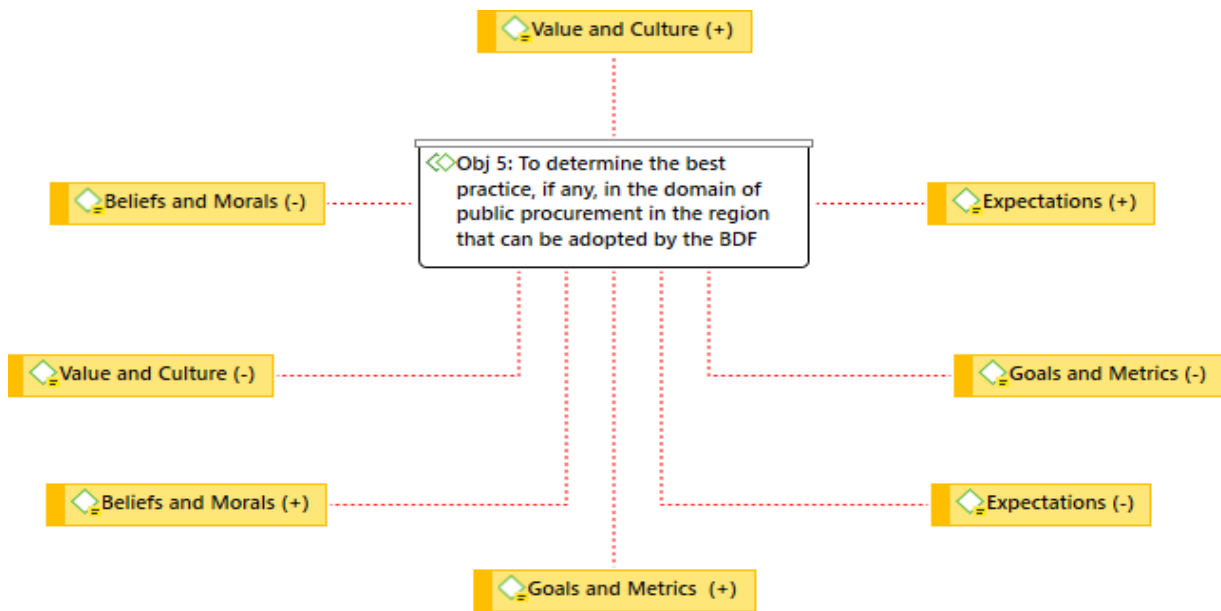
This objective contributed to answering the research question in that it revealed some underlying forces that exist in the BDF and the procurement process as a whole, as well as some behaviours derived from structures developed by these underlying forces. In answering the question as to what needs to be done to ensure an appropriate procurement process most suitable for defence procurement, the findings in this section assist in providing an answer. This leads to examining the next research objective, which sought to determine the best practice, if any, in the domain of public procurement in the region that can be adopted.

6.4.5 Research Objective 5: To determine the best practice, if any, in the domain of public procurement in the region that can be adopted by the BDF

This objective sought to determine if there are other models in the region that Botswana's public procurement process can adopt for the execution and improvement of defence procurement. This is very much linked to Chapter 4, which presented the literature on defence procurement from the international perspective. Before dwelling on the discussions from Chapter 4, it is necessary to determine what the collected data suggested and linking it to the presentations from Chapter 4.

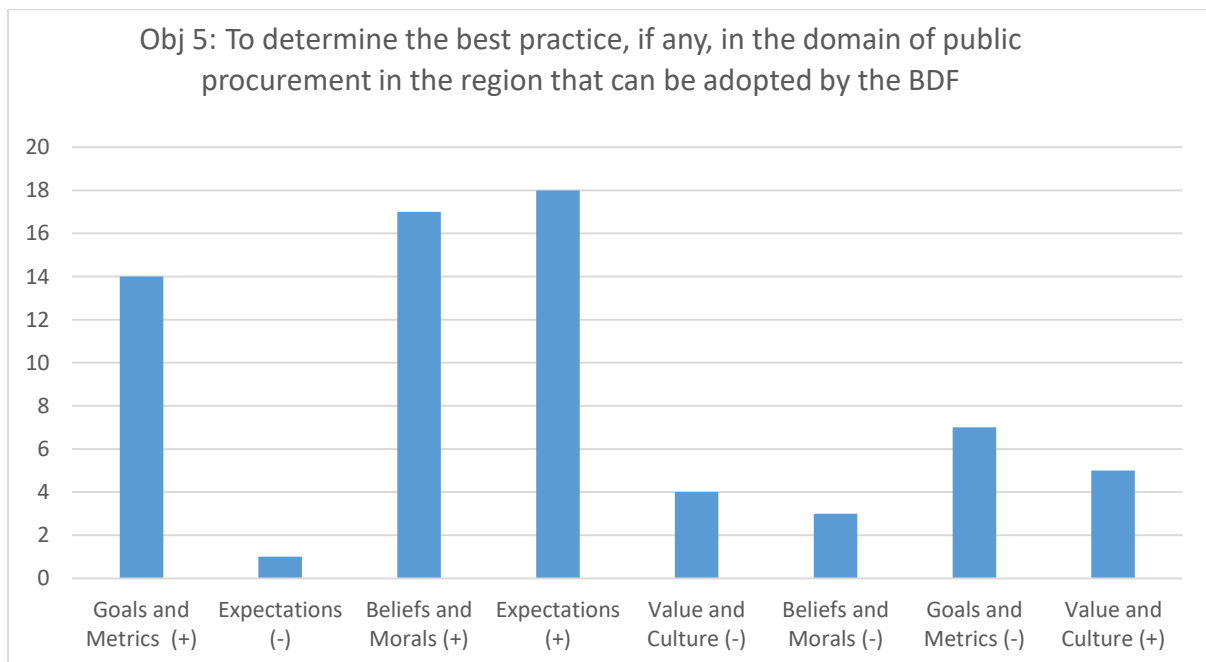
The researcher sought the views of the respondents mainly on what they have done to bring defence procurement in line with best practices. Four elements of systemic structures were considered, namely value and culture; expectations; beliefs and morals; and goals and metrics, as presented Figure 6.10.

Figure 6.10: Systemic structure elements for Research Objective 5



Regarding how the various interviewees responded to the reforms of public procurement in relation to the military, many commented to show that they have more expectations for possible reform. Many comments were also directed at issues of beliefs and morals, as well as goals and metrics. However, Figure 6.11 shows that the density of comments in the negative addressed the major issues of goal attainment, morality, and expectations.

Figure 6.11: Density for systemic elements for Research Objective 5



Expectations are defined as something that is likely to happen in the future, which may not be realistic. This was identified when a respondent was positive that if a few things could be done, then the public procurement process would be rectified. The data showed that in an effort to improve the procurement process, some of the commanding officers or officers in charge of procurement were transferred with the expectation that new ones would improve the efficiency of the procuring entity. This was shown by Respondent 1 when he said:

“One thing that I have realised is that the commanding officers end up being swapped around, thinking that one would do better than the previous one in terms of buying equipment and doing it efficiently and utilising the funds for that given financial year” (Respondent 1).

Furthermore, some decisions by the high command are based on the past, with the expectation that future results will be positive, as they were in the past. This was the case with the procurement of some second-hand vehicles that did not even match the previous batch of second-hand vehicles bought from the Netherlands. The respondent said:

“They gave us a very good service for about 10 years because they were new in terms of having not been used, they were vintage but then anything that goes past 10 years, we have issue for spares, for maintenance, and sustenance” (Respondent 3).

As per the above statement, expectations are clearly linked to culture and beliefs, and the way of doing things based on what had worked in the past. The respondent's further expectation is that the MDJS should put in place a doctrine that should guide how defence procurement must be done and what needs to be purchased. There is also a lack of education on the part of the supreme structure, such as the parliament, who always makes decisions on issues of the budget. The expectation is that all those who must make such decisions must be very knowledgeable about the country's security platform. This was indicated by Respondent 5:

“So now, that lack of education, which, this one primarily I will put on government, they should be the one that actually spearheads the education of people about military matters. Why the military, why keep the military and even

include empowering the legislature, the part of the legislature, parliamentarians, they need to be educated so that when the issues of military are discussed, they will be discussed at the level which is understandable but as you know, now there is not much” (Respondent 5).

The expectation is further that

“the Defence Council, the Commander, should not be the one who dictates terms, what to buy, what to project, but he helps the ministry, together with the PS, to try to align the ministry to what are the issues of the discussions that now come from the Defence Council” (Respondent 5).

This reflects on the issues of structure and terms of engagement. It will be determined later under this objective how other defence forces address such matters.

Beliefs and morals, which sometime overlap with values, were identified in the data. Beliefs and morals can be defined in this context by defining morality first, which, from a normative perspective, refers to “a code of conduct that, given specified conditions, would be put forward by all rational people” (Gert & Gert, 2002), while beliefs are things that we deem important and are about how we think things must be done. The respondents indicated that there are several issues, which, if rectified, would lead to the defence procurement process being conducted efficiently, which are related to morals and beliefs.

Defence procurement is complex due to the focus on sophisticated defence equipment while the basics are not addressed. These basics include housing, weapons, basic military operational vehicles, and radio communication. In view of this, Respondent 4 stated the following:

“When I was Commander, I was saying to my staff officers let’s go back to basics, let’s forget about tanks and other major weaponry, all these peripheral issues, let’s look at our daily bread, which is transport, communication, housing, and personal weapons” (Respondent 4).

The other belief that was mentioned is that the military must be separated from the main public procurement stream and it must be treated as unique. The respondents emphasised the fact that military equipment is unique in nature and must be treated

differently from the budget and implementation of main public procurement. Respondent 3 believed the following:

“The military expenditure must be treated different from expenditure of social amenities those of education, health and other, so BDF shouldn’t be paying tax just like right now when there is no payment of tax on agricultural implements.”

“Defence procurement should be separate.”

“Military will only be a functional discipline if in the government setting contains the national reflection. You have your own doctors, you have your own nurses, you have your own mechanics, you have your own people who are doing construction for you, you have your own little city, you have your own agriculture so because you have that, you are unique.”

Further to the above, there is an absolute belief that defence procurement should be housed under the MDJS. This was stated by Respondent 7:

“I mean, international best practices, procurement of BDF, just like now where we have [name withheld] who is the defence secretary, defence budgeting, defence procurement should be here but now they are running with procurement to the point where if somebody goes on a trip, it means evaluation of that particular project stops” (Respondent 7).

Regarding the issues of where to actually place defence procurement, which has been supported to be either under the Ministry of Defence or to be detached from mainstream public procurement, issues of morality and trust arise. It becomes an issue of, since military procurement is characterised by secrecy by nature, how much do you trust the external parties? There is contention that the practice of conducting defence procurement under secrecy opens up room for corruption. The following responses support what the debate is about between the non-military perspective and the military perspective:

“Similarly, even now, when you say an oversight body, we are too sensitive about the information of the defence force. So as much as I agree, I agree that it is an ideal, but it will compose of who? People inside the defence force or people outside of the defence force? People outside of the defence force are

not trusted with the information around us on what we want to buy and in no time if that information leaks, we will see it on Sunday Standard, then we will be quick to start pointing fingers at them or even attempting to investigate to find whether they are the ones who leaked the information to Sunday Standard” (Respondent 2).

“Where we are excluded from the normal procurement and make it shrouded with secrecy, it might even create or generate perceptions of corruption because at the end of the day there are a lot of procurement which are done by BDF which do not need any secrecy. So why not just do them in a normal manner like any normal procurement?” (Respondent 7).

The above narratives emphasise issues of trust and morality. The defence force does not trust that the ministry can do a good job, which is related to the aspect of security. However, another respondent believed that the maintenance of the status quo might promote corrupt practices:

“I mean, I do not know, that is your view that it must be done elsewhere, under those circumstances, countries where it is done privately, you will find that is where corruption flourishes” (Respondent 7).

While still on the discussion of beliefs and morals, the issue of turnaround time was believed to not be much of a problem. There is a strong belief that a few things need to be done to rectify it.

“But I assume it is just delay, if scoping and evaluation were done on time, I believe a lot of procurement can be completed within the given time” (Respondent 8).

“My belief is that if you start your procurement well at the beginning of the financial year, which starts in April, by June your project would have been awarded, and by the end of the financial year, the acquisition must be complete” (Respondent 10).

“You can have some civilian siting in that and the military people who know how the processes that are involved in procurement of military equipment work” (Respondent 11).

The belief that military procurement can be done within a 12-month cycle was emphasised; however, Respondent 11 above emphasised that this function must be given to civil authority, where some members of the BDF with the technical knowhow can be seconded to this procuring entity for efficiency, which can facilitate expenditure in a 12-month cycle.

The responses above further emphasise issues of goals and metrics. Goals and metrics can be defined as desired outcomes and the standard of measurement to determine the efficiency, performance, or quality of the process (Covey, 2013). Regarding the use of the allocation of funds as a metric instrument, together with a 12-month procurement cycle, it was shown that they are not appropriate to measure procurement process goals. The main goal of the process is to facilitate the nation with goods and services. Narrowing it down to the BDF, it must equip the defence force to facilitate its operations. This will be through recruitment, accommodation, air assets, and ground assets. There is a clear contention that the 12-month cycle is not sufficient for the procurement of military assets. In other words, the goals of equipping the defence force are defeated by the unit of measure for efficiency.

Two respondents supported this finding through the following statements:

“As long as our budgeting process is like that, so that even if you can bring enough money you will not be able to do, that is why that will keep on coming because that is actually the problem. For us, we are addressing the symptoms of the bigger problem” (Respondent 5).

“We failed to appreciate those scenarios, we failed to synchronise finance and reality on the ground” (Respondent 6).

The aspect of culture that is defined in terms of organisational culture as related to the basic pattern of assumptions that a group has invented, discovered, or learned in order to cope with its problems of adaptation and internal integration (Schein, 1995) also prevailed. These are prevalent as indicated in some of the quoted narratives. The procurement of second-hand vehicles defeats the concept of value. The established culture of procurement is simply on paper as guidelines, but the data showed that laid-down principles of conducting procurement exist, but others believe that there are

other ways of doing things, in contrast with the principles, since no action will be taken against them.

Having discussed the views of various respondents above, the data revealed that the general consensus was that public procurement must be conducted separately from Botswana's public procurement. There is also a clear feeling that defence procurement must cease to be conducted by the procuring entity and must be relocated to the MDJS. Further to this is also a need for guidelines in the form of a doctrine and defence policy to guide defence procurement. There was also a proposal that there is a need to have the right manpower, in the form of professionals who are well trained to ensure that there is no lapse in the process flow of the procurement process. Despite all these, defence procurement must be conducted within the framework of the values of public procurement, which include transparency, value for money, fair competition, accountability, and equity. In considering any model from the region, it should be noted that such a model should meet the above requirements. As discussed in Chapter 4, three countries in the region were examined, namely Zambia, Namibia, and South Africa.

The discussion in Chapter 4 established that the Zambian Defence Force conducts its procurement through the Ministry of Defence. It was further established that defence procurement is a secret activity as it is not conducted in the public domain; hence the principles of transparency, fair competition, and equity are violated by this model. It was also noted that the Ministry of Defence has a provision according to which it can own a stake in companies, such as the case of the 34% it owned in the Zambia-China Mulungushi Textiles Joint Venture (Pty), which collapsed in 2007 (Brooks, 2010). Unlike what Sweet (2014) stated, that the participation of government entities as shareholders in private companies can be a solution to unemployment, Brooks (2010) argued that such an arrangement limits the intervention of the government when workers' rights are violated; as what led to the closure of Mulungushi Textiles in Zambia.

In discussing Namibia in Chapter 4, it was established that the NDF is controlled by the Ministry of Defence, which formulates defence policies, provides central operational headquarters for the NDF, and procures equipment for the NDF. It is also the responsibility of the Ministry of Defence to present the budget to the parliament.

The Ministry of Defence is a civilian-dominated ministry with employees with specialised skills, while military personnel are seconded from various units of the NDF on a rotation basis. Furthermore, the ministry plays a dual role of being the headquarter of the NDF (August 26, 2020). The Ministry of Defence has established companies, with the main one being August 26. Under this holding company there are other companies such as the WMF that specialises in vehicle manufacturing, fittings, and repairs and manufactures trailers, tractors, tankers, and fencing mainly for the defence market; Sat-Com for manufacturing, installation, and servicing of electronic and telecommunications equipment; August 26 Industries, which manufactures footwear and uniforms for use by the NDF and other services; August 26 Textiles, which manufactures garments such as combat fatigues, trousers, jackets, shirts, protective clothing, school uniforms, other uniforms, and linen; and August 26 Logistics, which is responsible for logistics supply such as food for the military and other defence support functions.

The Ministry of Defence, as the owner of or shareholder in all these companies, has the responsibility to defend the budget and to execute the actual procurement of defence equipment. This model may be defined as a situation in which the Ministry of Defence, in partnership with the NDF, forms companies that compete with the domestic companies for public funds. It has been a general concern that the situation in Namibia constitutes an environment where military companies “could be favoured by the government and state-owned entities in public tendering processes, and that private sector firms were likely to face increased risk of discrimination in public bidding processes” (Sweet, 2014).

The other country that was analysed was South Africa. In South Africa, defence procurement is done through Armscor, which is a state-owned enterprise. Armscor is operated under a board of directors, whose chairperson is fully accountable to the Minister of Defence and Military Veterans. Like other institutions under this model, the main function of Armscor is the acquisition, maintenance, and disposal of defence material for the SANDF, as well as for other government agencies that may require such services, such as the SAPS.

There are two entities under the Minister of Defence and Military Veterans, namely the Defence Secretariat and the SANDF. The DOD is responsible for the general oversight

authority and facilitating the defence policy. In so doing, it ensures that the SANDF is well equipped for its envisaged defensive posture. It conducts procurement for the SANDF through the model of procurement by independent civilian organisation, through the engagement of Armscor.

This state-owned entity is provided for by the Defence Act to incorporate companies that are in line with its mandate, such as Armscor Defence Institutes (Pty) Ltd (Armscor, 2012). Armscor must adhere to accepted corporate governance principles, best business practices and generally accepted accounting standards, and the established framework, and must promote the principles of procurement as per the guidelines. What is important to note is that this model is not conducted in isolation as defence procurement is conducted in line with the DOD's pillars of procurement where value for money, open and effective competition, ethics and fair dealing, accountability and reporting, and equity are at the forefront.

The issue of confidentiality as a practice across defence procurement does exist. Ball and Len (2006) highlighted that the South African Defence Review listed a number of reasons for confidentiality in defence procurement. These include the protection of third-party commercial information, South Africa's national security, prevention of harm to South Africa's ability to conduct international relations, and the protection of South Africa's economic interests and the commercial activities of government bodies.

After the evaluation of these various models as per the selected countries, it was important to consider a number of factors. These factors include the legal procurement framework and the public's perception of the adoption of a certain model. It should be noted that public funds must be accounted for to the people of the country and public procurement must be conducted in line with the principles of public procurement (value for money, accountability, fair competition, equity, and transparency). Among the models presented above, the matrix evaluation conducted in Chapter 4 indicated that the South African model has more advantages than disadvantages for an efficient and effective procurement system (flexibility and timeliness). One can therefore recommend that it can be considered for possible adoption with suitable modifications. Chapter 4 advocated for informed defence procurement that is directed from the top and that considers national interests. It has also shown that world best practices and regional practice as a matter of principle conduct procurement through the Ministry of

Defence. The question is now whether to engage an independent company or build capacity for the Ministry of Defence / DOD.

6.5 CONCLUSION

The findings in this study were made through systematic data analysis through the use of ATLAS.ti software as prescribed by Creswell and Guetterman's (2019) guidelines for data analysis. Coding was very critical and was conducted in line with Boyatzis' (1998) guidance from a theory-driven perspective as the approach to analysis was deductive. The codes were derived from the systemic structures and mental modes defined in the iceberg model of systems thinking as defined by Monat and Gannon (2015). The presentation of the findings was in line with the objectives of this study. While interviews dominated the collected data, document review was also used, especially for Research Objectives 4 and 5.

The various objectives intended to answer the research question, which was achieved. For Research Objective 1, the analysis focused on identifying various stakeholders and how they influence public procurement. This was done through analysing organisational hierarchy, social hierarchy, and interrelationships. The data revealed that other than formal stakeholders in public procurement, informal stakeholders based on social relationships also exist. The data further indicated that there is a lack of interrelationships between these stakeholders, which results in an inefficient procurement process. This on its own validates the assumptions of the systems thinking approach that the order in which these components are arranged will determine the system's effectiveness (Kim, 1999). These components in the form of stakeholders are unsystematically arranged due to informal arrangements, which leads to the inefficiency of the system.

Research Objective 2 intended to establish rules of engagement that exist in the public procurement process. The data revealed that guidelines do exist but that they are not enforced to the letter. The limitation is that they are general and not specific to address defence procurement, which is unique. This was found through the analysis of authorities and approval levels, power structures, rules, procedures, guidelines, and norms, including issues of dialectics. The absence of a guiding tool in the form of a security and defence policy is very key in the findings. The absence of such a policy

fails to concisely illustrate the rules of engagement for different parties in the defence procurement space, which is a department under the MDJS. This promotes dialectical issues in the public procurement space, where each organisation wants to spend its funds without proper monitoring and evaluation. While different stakeholders are meant to coordinate their activities for successful execution of their mandate, it emerged that there is no connectivity between the processes of planning, funds allocation, and execution.

Research Objective 3 intended to establish if the business environment affects the public procurement process, and it was revealed that the business environment indeed has a negative impact on the procurement process. This environment includes personal interests, leadership, political interference, the media, and interorganisational relationships. The resultant influence is that of lengthening the process, which results in failure to deliver and loss of revenue due to financial-year constraints and delays due to litigation in some instances. This also extended to internal factors, namely administrative and leadership decisions.

With sufficient evidence that public procurement is influenced negatively by the business environment, Research Objective 4 revealed the same evidence. Taking into consideration the fleet of vehicles for an infantry battalion, the effects of the business environment are prevalent and showed that the defence capability of the BDF has been negatively impacted by the procurement process. Over a 10-year period, the battalion fleet deteriorated rather than improved. This was said to be the result of insufficient budget, the 12-month procurement cycle, incompetent procurement officers, the nature of defence duties, litigation, as well as non-performing suppliers.

The ultimate aim of the study was to present a model of defence procurement in the region that can be adopted for the BDF to ensure its vision of being a “professional, prompt and decisive force” in executing its mandatory duty. From the discussions it emerged that the best international practices are to conduct defence procurement through the Ministry of Defence. It is also important that procurement is conducted in line with the principles of public procurement (value for money, accountability, fair competition, equity, and transparency). Three countries’ procurement models were evaluated, considering the principles of public procurement, namely Namibia, Zambia, and South Africa. Among the models presented in line with the matrix evaluation

conducted in Chapter 4, the South African model showed more advantages than disadvantages for an efficient and effective procurement system (flexibility and timeliness). However, models need to be refined to meet the requirements of the specific environment. Such a model should also strike a balance between issues of national interest, such as unemployment and revenue generation, to the country as is the case with the South African model.

Reflecting on the rationale for the choice of the systems thinking theory for this study, one can refer to Hakansson and Snehota (1995), who posited that organisations are embedded in a set of inter-organisational relationships with a set of stakeholders and, as such, organisations connect and operate in an environment of interdependencies. The findings of this study indicated that such inter-organisational relationships are lacking and therefore fail to achieve the aspect of interdependencies. Furthermore, systems thinking was relevant to this study because the ST and systems thinking are applicable to interpreting service systems since they are complex and adaptive (Holland, 1999). This is the case with the public procurement system, which was shown to be complex. The discussion above, together with the findings, can provide guidance on what needs to be done to ensure an efficient procurement system that will enhance the capability of the defence force, which is conducted in a complex public procurement environment characterised by bureaucracy. The next chapter concludes the study and makes recommendations.

CHAPTER 7: CONCLUSIONS AND RECOMMENDATIONS

7.1 INTRODUCTION

The overall aim of this study was to analyse the influence of the business environment on the public procurement process in Botswana and its ultimate impact on military capability. This was achieved through answering the primary research question, namely: What needs to be done to ensure a prompt and efficient defence force, while being dependent on public procurement that exists in a complex business environment characterised by a bureaucratic system? This research question was addressed by answering the following secondary research questions:

- What is the influence of stakeholders on the business environment? This question was intended to identify the stakeholders and how they influence the procurement process. It was shown that structures (formal or informal) exist that are organisational and social, which dictate how procurement must be conducted and contribute to who must be awarded such tenders (bureaucracy).
- What are the rules of engagement between stakeholders and the procurement process? This question predominantly aimed to determine the guidelines for how different stakeholders and organisations interact and coordinate the procurement process. It has prevailed that there is no instrument in the form of a security and defence policy. This therefore does not properly define how different stakeholders must interact in the process of ensuring effective defence procurement. The existing guidelines are general and do not give the defence procurement any exemption.
- Does the business environment have an influence on the public procurement process? The procurement process was shown to be exposed to business environmental factors. There is an ongoing debate as to justifying defence spending over social needs such as education, health, and unemployment. This was shown in that there were some purchases that could not take place because of political interference. Other factors include CEE policies and the external (bureaucratic) structures, as well as internal (administrative and leadership) decisions.

- What is the impact of the procurement process on military capability? The result of defence procurement being under mainstream public procurement has led to a poorly equipped defence force. There has been a significant decline in capability over the 10-year period under review for the defence force units in terms of basic transport and related equipment.
- What are best practices in the domain of public procurement in the region? Having explored different models of defence procurement, the intent was to identify if there is a regional model that could be adopted for Botswana. After the evaluation of South Africa, Zambia, and Namibia's models, recommendations can be made for the improvement of defence procurement in Botswana.

Addressing all these questions answered the primary research question. After analysing the influence of the business environment on Botswana's public procurement process over a 10-year period and its ultimate impact on defence capability, the study concluded that there is a need to take a holistic approach to the transformation of Botswana's public procurement to cater for defence procurement. What needs to be done should specifically address the elimination of bureaucratic structures, with defined formal structures accompanied by regulations, sound rules of engagement between stakeholders should be developed, a balance must be struck between defence activities and national socioeconomic priorities, and a separate defence procurement model should be adopted. This is as informed by systems thinking assumptions that the whole is greater than the sum of the parts and that what makes the system is the actual interaction or combination of the parts, not the simple sum of the parts, and therefore a holistic approach.

This study is relevant to the problem statement, mainly that there is an existing practical deficiency of transport and communication in the BDF. This study contributes to the solution of the problem as it revealed many issues related to the procurement process. Furthermore, with the available literature having addressed issues of policies for Botswana's public procurement, this study actually brought up the impact of public procurement on the defence capability of the BDF, which is an area that has not been explored before. It is further important to note that the findings confirm systems thinking assumptions that the whole is greater than the sum of the parts and that what makes a system is the interaction of parts as a whole, which requires both coordination

and integration, which Botswana's public procurement system in relation to defence procurement has failed to achieve.

The study further confirmed the organisational buying behaviour theory in line with Webster and Wind's (1972) model by identifying different stakeholders as influencing factors on public procurement, which include the organisation, individuals, society, and the environment. Furthermore, the findings indicated that conflict exists in the process; with some preferring the status quo as opposed to change, as postulated by the dialectical theory.

Finally, the study achieved its purpose of exploring the public procurement process to determine how the interaction of the process with the environment ultimately impacts on defence capability. This was intended to realign defence procurement with best international practices for efficiency and effectiveness.

7.2 REFLECTION ON THE CHAPTERS

Chapter 1 laid the foundation of this study by providing a background of public procurement in Botswana. It explained the three classifications of government spending, which are recurrent expenditure, capital expenditure, and transfer payments. Since this study examined the BDF's spending on capital assets, this explanation gave an understanding of the type of funds that were the main issue of discussion in this study. This chapter illustrated that there is a single system of public procurement in Botswana, within which defence procurement is conducted. This raised the issue of the complex business environment, which was shown through the literature as influencing public procurement. The study derived its problem statement in relation to the observations made of the state of the BDF's operational capability from this background.

The general view is that the military must achieve its mandate effectively through significant intelligence, mobility, and communication capabilities. This therefore implies that defence procurement must be conducted in a manner that it is timely and efficient. However, there seems to be a gap between the defence capability and the procurement process. This led to the problem statement, given the foregoing administrative dynamics and procurement complexities, and the study sought to assess how the public procurement process is influenced by the business environment

with a view to establish how it has impacted on defence capability over a 10-year period (2008 to 2018). In so doing, the study was able to make recommendations for an efficient and effective way of conducting defence procurement. This assessment intended to contribute towards the realignment of procurement processes and effective military capability while enhancing the operational readiness of the BDF.

The purpose of this research was to explore the relationship between various stakeholders in the business environment, how this relationship influences the public procurement process, and the impact of these consequential effects on Botswana's military capability. The study's outlined research objectives were pursued in fulfilling the purpose.

Chapter 1 further outlined the primary research question and the secondary research questions, which, after being answered, contributed to answering the primary research question. These secondary research questions led to the development of research objectives, which were later utilised for analysis. Much more important were the merits of the research and the proposed contribution to science. This study contributed to discussions of public procurement in relation to its impact on defence capability in Botswana, as well as recommended a solution to a long-existing BDF problem.

Chapter 2, in conceptualising procurement for this study, indicated that procurement, purchasing, and supply management are not synonyms. The rationale for this position is that procurement spans beyond mere purchasing and supplying. As evident from the sources interrogated, procurement has transformed into a concept that combines with technologies, marketing, and business strategies. The working definition is that procurement is a careful, documented process that results in the delivery of goods or services in a set time period. The final definition of public procurement articulated in this study was by Arrowsmith (2017), who defined public procurement as a process by which public authorities, such as government departments or local authorities, purchase work, goods, or services from companies. The study contextualised its definition of public procurement by providing examples, which included, among others, building a state school, purchasing furniture for a public prosecutor's office, and contracting cleaning services for a public university.

In terms of comparing public sector procurement and private sector procurement, the literature indicated that both sectors share a common goal, which is to obtain the best

value for the organisation (Davis, 2005). This means gaining the most from the money spent at every step in the supply chain. These goals for public procurement, set by governments, are often products of compromise and may sometimes conflict globally (Erridge, 2005). Goods and services are procured in both private and public sectors and in both sectors, the main mandate is to conclude a very attractive and favourable procurement deal for the acquisition of goods and services (Erridge, 1996; Thai, 2001). Murray (1999) analysed local government procurement and confirmed that there are several differences regarding both objectives and more operational issues that characterise private and public procurement. An observation is that the demands on public sector procurement are far greater than those found in private sector procurement (Neill & Batchelor, 1999). Ultimately, the private sector is leading when it comes to the flexibility and adoption of new methods of procurement, including quick adoption of new procurement technologies (Khau, 2012).

The evolution of public procurement, as shown by the literature, indicates that, accordingly, public procurement systems have evolved from a rudimentary stage to a vibrant regulated system. The idea of evolution as used in the context of this study means the growth and development of public procurement. Public procurement has evolved over time in terms of context and organisational setup. The growth of public procurement is largely dependent on the dynamics of the environment (Mokoya, 2011). Ultimately, this evolution was intended to achieve a uniform procurement system with standardised tendering procedures, policies, and contract documentation at all levels, and to ensure that public sector procurement complies with the provisions of the Constitution.

The importance of public procurement was emphasised in the literature. Murray (2010) argued that public procurement is an important tool to drive the economy of a country. An example given was that of South Africa, where Allison (2013) indicated that public procurement has contributed a great deal to South Africa's economy and is therefore of great importance. Allison (2013) further asserted that with South Africa's political transformation in 1994, the construction industry was used as the model for public sector procurement reform. Also to be noted is that in procurement, there are no generally accepted and standardised principles. Different countries emphasise different principles; however, most important are the following: plan and manage for great results, fairness, equal participation, getting the right supplier, best value for

money, accountability, transparency, efficiency, consistency, and competition; to mention a few. Not all countries adopt all these principles but most procurement systems are developed in line with these principles.

Also discussed in Chapter 2 were the various steps undertaken to conduct public procurement. Although there is no fixed number, the five steps as defined by Erridge (1995) are requisition, checking the requisition, selecting the supplier, ordering, and expediting. The chapter ended by discussing the conduct of military procurement, which has been clouded with controversy originating primarily from the principle of secrecy and security. Defence spending is determined by changes in the security environment (Henk, 2010). Regarding the issue of conducting military procurement in line with other national goods and services, the literature indicated that military procurement is conducted differently and with different outcomes, which are often criticised by the public. This led to the third chapter, which focused on Botswana's legislative and policy frameworks in relation to public procurement.

Chapter 3 discussed different pieces of legislation, of which some have been amended over time. All are aimed at ensuring that public funds are used prudently and to the benefit of citizens. Despite the evolution of the legislative and policy frameworks, why the military is not conducting procurement differently, considering the uniqueness of the goods and services they require and the nature of their core business, continues to be a question. The issues that emerged included the formation of the BDF in relation to the Constitution. This reflects the fact that the BDF was formed by an Act of Parliament, and not by the Constitution.

The other issue was that of the dual budgeting system that traces as far back as 1965. Defence budgeting and execution were superimposed into what was already in existence after the BDF's formation. The evaluation of the procurement process as illustrated in Figure 3.2 shows that the concept of a 12-month procurement cycle is a myth. The underlying fact is that procurement is conducted during a few months of a year for capital expenditure, and results in funds being surrendered to the Consolidated Fund. The influence of oversight was also discussed, whereby the PPADB continues to conduct adjudication, as well as being the oversight authority. Its independence is therefore compromised. It was in the interest of this research to determine whether the PPADB's role as an adjudicator and oversight authority does

not infringe on the procurement process through its intervention as a stakeholder. This extends further to how the PPADB is constituted as there are always conflicts between defence procurement and national agenda priorities, while at the same time those who are empowered with the responsibility to adjudicate do not possess the prerequisite knowledge of the defence business. While there is a special committee for defence equipment (the SPADC), its effectiveness still needs to be justified.

There are defined procurement thresholds, which are by nature a limiting factor for defence procurement. The lower the value of goods, the faster the process is, but the higher the value of goods or services, the more bureaucratic and slower the process becomes. Several procurement models were discussed, which included direct appointment, open tender, micro procurement, quotation procurement, and emergency procurement. What is important to note is that defence procurement as discussed in this thesis was confined to transport and radio equipment. It is thus a fact that some other methods cannot be adopted for the acquisition of these assets.

The role of the legislative framework further extends to CEE policies as an agenda pursued from both the socio-political and socioeconomic perspective. The framework was intended to empower citizens to participate in the procurement space. The implementation of these policies cannot be neglected as they are influencing factors on the business environment. Lastly, the integrity and transparency of a public procurement system rely on a number of control mechanisms. Without such control mechanisms, flaws in the procurement system may not be detected and addressed.

Chapter 4 examined military procurement from an international perspective and culminated into evaluating some models in the region among the countries selected, which were Namibia, South Africa, and Zambia. This was with the view to recommend aligning Botswana's procurement processes with world best practices and in line with principles of good governance. It was shown that failure to align a procurement model to these principles opens up opportunities for corruption and misappropriation of funds, which result in a defence force without capabilities. Adopting a model, however, does not mean taking it as a whole; some aspects may require adjustment depending on the amount of work and responsibility involved.

Chapter 4 further raised very important issues in guiding military procurement. It highlighted the importance of a national security policy that will in turn guide a national

defence policy. The literature advocates for informed defence procurement that is directed from the top and that takes into account national interests. It was also shown that world practices and regional practices as a matter of principle conduct procurement through the Ministry of Defence. It is at the discretion of the Ministry of Defence / DOD to adjust and modify the current practices of the BDF regarding conducting procurement so that the ministry takes charge to choose best practices.

Considering the mandate of the BDF, which is currently combating poaching and securing the borders from infiltration for purposes of combating human trafficking, drug trafficking, and other challenges that the region is facing, the major enablers are transportation and communication. These facilitate the mobility of forces and coordination of forces on the ground. This can be achieved through a long-term strategy that will equip the BDF to achieve its envisaged goals and national strategic goals.

Chapter 4 presented the main models adopted by different states, which included the Canadian model, procurement by individual armed forces, procurement by a centralised government organisation, and procurement by an independent civilian organisation. It was shown that the adoption of a model requires a thorough analysis of the business environment as a whole in an ideal democratic setup. It was shown that there is no specific outstanding model that has proven to meet all the parameters of an efficient procurement system. It therefore means that despite the models, there must be continuous evaluation and modification to ensure the efficiency of such a model. Further to this, it is important that the model does not violate the principles of public procurement. The discussion in Chapter 4 guided the recommendations to be made by the study.

The main objective of Chapter 5 was to provide this study's details and justification. The theoretical framework was discussed in detail. The ST was selected as the major theory for this study's theoretical framework with the application of the systems thinking approach to analysis. The discussions around this theory covered its origins and evolution over time. The theoretical framework culminated in the systems thinking approach to analyse this complex problem. The systems thinking approach was adopted as a complement to reductionism, which was a possible option for this study.

Since this study assessed a process, the concept of synthesis was more appropriate as opposed to analysis alone as relationships were key.

It was shown in the literature that the systems thinking approach has prevailed over reductionism in contemporary studies. The systems thinking approach was augmented with the organisational buying theory, with particular consideration of Webster and Wind's (1972) general model of industrial procurement, as well as the dialectical theory. These theories in isolation cannot explain the whole process and, as such, where one had limitations, the others complemented it. Since this was deductive analysis, codes were derived from the systems thinking theory. Apart from its main assumptions of relatedness, connectivity, and complementation, the iceberg model was used as a tool for the development of codes for analysis.

The ST through the systems thinking approach assisted in answering the research question as it revealed that the problems that we see are just the tip of an iceberg and that the events and patterns we see are as a result of systemic structures. These systemic structures include social hierarchy, organisational hierarchy, process flows, power structures, corporate culture, underlying forces, etc. These elements of systemic structure surfaced, which made the theory more relevant for this study. Furthermore, the use of interviews helped to answer the research question because the selection of respondents was within the confines of experts who were involved in defence procurement over the period under review. The interviews provided an in-depth understanding of the phenomenon under investigation as the respondents were able to go beyond the designed questions to give more details due to the abundance of information they possessed.

This study's purpose was to explore a phenomenon; hence it was an exploratory study. The study adopted a qualitative research approach. The literature showed that many qualitative research studies are inductive in nature; however, this study was deductive in nature as it focused on problem solving rather than theory development. As Merriam and Tisdell (2015) indicated, there are various types of qualitative research, such as evaluation-applied research that has the purpose to evaluate data to inform a programme, process, or technique – as was the case with this study. This study thus also contributed to limited deductive qualitative research studies conducted so far.

This study was a case study by design since it is said to be more appropriate to study events, interventions, policy developments, and programme-based reforms, which must be studied in detail in a real-life context (Crowe *et al.*, 2011). This study used interviews as the primary source of data. Various key personnel were selected on a non-statistical purposive sampling basis. All those selected were part of the procurement process throughout the period under investigation, namely 2008 to 2018. Document review also contributed significantly as a means of data collection. The use of various respondents, multiple theories, and different methods of data collection, namely interviews and document review, provided this study with validity due to data, theory, and method triangulation.

This study took a deductive thematic approach. Theories and literature were used to develop codes, and themes were deduced from the interviews and documents to address the research question through the objectives. The particulars of the analysis were discussed in detail in Chapter 6.

Chapter 6 presented the data analysis, data presentation, discussions, and findings. The chapter started by defining the coding scheme, which was done in line with Boyatzis' (1998) framework of deductive coding. The systems thinking approach, through the application of the iceberg model, was applied through the extraction of systemic structure elements. These elements were attached to each objective based on compatibility in the development of the codebook.

The data were managed through the use of ATLAS.ti software, where themes were extracted from the data and matched to the codes allocated to the objectives of the study. After analysis as per Chapter 6, the following is a summary of the findings of the study:

- There is a lack of interrelationships between the various stakeholders, which results in an inefficient procurement process.
- Stakeholders are unsystematically arranged due to informal structures, which leads to the inefficiency of the system.
- The absence of a guiding tool in the form of a security and defence policy contributes to the inefficiency of the system.

- In the absence of such a policy, the rules of engagement for the different parties in the defence procurement space, which is a department under the MDJS, cannot be concisely illustrated.
- Over a 10-year period, the BDF fleet deteriorated rather than improved. This was linked to an insufficient budget, the 12-month procurement cycle, leadership decisions, incompetent procurement officers, the nature of defence duties, litigation, and non-performing suppliers.
- From the discussions, it emerged that the best international practices are to conduct defence procurement through the Ministry of Defence, not within the department itself. It is also important that procurement is conducted in line with the principles of public procurement.

The assumption is that if all these issues can be addressed, there will be an improvement in the efficiency of defence procurement, which will lead to a prompt and efficient defence force in line with its mandate. Recommendations are therefore presented in the following section.

7.3 RECOMMENDATIONS

It is worth noting that the best international practices dictate that defence procurement should not be conducted with the same protocols as normal goods and services. As such, the following are recommended:

- Place defence procurement under the MDJS. This will be in line with world best practices and the military will be concerned more with its primary duties and conserve its already limited manpower.
- The MDJS must develop a structure, which will be professionally staffed, for the development of policies and capacitated with well-trained operational staff who will be able to execute procurement efficiently. There is an outcry that members of the BDF who conduct procurement are either not available throughout the year or are lacking professionally – hence this recommendation.
- The MDJS must develop a defence and security policy that will, among others, guide the defence posture. This will ensure continuity in the procurement of equipment as it will be drawn in line with the factors that affect defence

assignments as directed by the MDJS. The defence force must be accountable to the minister through the policy guidelines.

- The MDJS must develop a robust monitoring and evaluation system that will enforce procurement plans and the determination of the defensive posture. This will ensure that the system is effective in terms of the execution of procurement plans and the services to be rendered to the nation.
- The military and the MDJS must enhance R&D that will support self-sustenance in terms of manufacturing of basic equipment such as transport and communication in line with supporting government policy objectives such as incorporation of companies. This will contribute to the creation of employment and to the evolutionary growth of the industrial sector. The military must be able to sustain itself and not to be totally dependent on external actors for its survival.
- The MDJS must develop a model in line with that of South Africa and review how it can best work for Botswana in line with the best public procurement principles. This model has been seen to support the government's socioeconomic agenda, while taking into consideration the principles of public procurement. The incorporation of companies will create employment and will improve the technological application of knowledge by the citizens, which will support the Fourth Industrial Revolution debate.

7.4 LIMITATIONS OF THE STUDY

It is worth indicating that despite reaching the objectives and goals of the study, there were some limitations to this research, which are potential weaknesses that were out of the control of the researcher. The data-collection period of the study was conducted in Botswana around the end of 2019. This was the period when some of the selected respondents were politically involved and were not readily available for interviews. It was fortunate that they ultimately made time for the interviews, which actually did not impact much on the quality of the study but on the timeframe of data collection. Furthermore, the declaration of COVID-19 as a pandemic affected the conduct of face-to-face interviews due to limited movement as Botswana and South Africa went into lockdown almost at the same time. Out of the 11 interviews conducted, only two were conducted telephonically. This did not compromise the quality of the collected data.

7.5 RECOMMENDATIONS FOR FUTURE RESEARCH

There are a number of gaps in our knowledge around ensuring and addressing the defence capability of Botswana. As the literature indicated, there are four enablers of defence capability, namely; capability development and experiment, capability planning, procurement, and in-service support. This study explored the procurement enabler; as such, the other enablers can be explored to determine how they can be enhanced for the effective capability of the BDF. Research on procurement using an inductive approach can also be conducted to determine if such a study will make the same findings as this study.

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APPENDICES

APPENDIX A: SYSTEMS THINKING LANGUAGE TERMINOLOGY

Accumulator: Anything that builds up or dwindles; for example, water in a bathtub, savings in a bank account, or inventory in a warehouse. In modelling software, a stock is often used as a generic symbol for accumulators. An accumulator is also known as a stock or level.

Balancing process/loop: Combined with reinforcing loops, balancing processes form the building blocks of dynamic systems. Balancing processes seek equilibrium: they try to bring things to a desired state and keep them there. They also limit and constrain change generated by reinforcing processes. A balancing loop in a causal loop diagram depicts a balancing process.

Complexity: Characteristic of a system having many components and the multiple ways that those components interact.

Emergence: Properties of the system as a whole rather than properties that can be derived from the properties of the system components. Emergent properties are a consequence of the relationships among system components. Examples include the flocking behaviour or murmuration of birds, the schooling of fish, the shape of an apple, traffic jam patterns, the concept of countries, and the ability of religion to influence behaviour.

Events: Things that happen that we can see or observe.

Feedback: The return of information about the status of a process. For example, annual performance reviews return information to an employee about the quality of his or her work.

Flow: The amount of change something undergoes during a particular length of time. Examples are the amount of water that flows out of a bathtub each minute, or the amount of interest earned in a savings account each month, which are also called rates.

Hierarchy: The various levels of organisation in a system. In systems, hierarchies often evolve from the bottom to the top; stable levels of the hierarchy provide system

stability and resilience. Hierarchies also facilitate the evolution of simple systems into complex systems.

Holism: The theory or philosophy that systems display characteristics that are more than the sum of their parts and that system understanding cannot be attained by analysing the parts in isolation.

Leverage point: An area where small change can yield large improvements in a system.

Mental models: Paradigms or belief structures that attempt to interpret and/or simplify the universe in which we live. Examples are “An MBA will make you rich”, “Incentive compensation increases productivity”, and “Girls like Corvettes”. Mental models often lead to systemic structures, which are either intentional or emergent.

Patterns: Sets of consistent and recurring observable events. Patterns may be physical, behavioural, or mental. Patterns are usually caused by underlying systemic structures and forces.

Reinforcing process/loop: Along with balancing loops, reinforcing loops form the building blocks of dynamic systems. Reinforcing processes compound change in one direction with even more change in that same direction. As such, they generate both growth and collapse. A reinforcing loop in a causal loop diagram depicts a reinforcing process, which is also known as a vicious cycle or a virtuous cycle.

Self-organisation: The tendency of a system to develop structures or patterns without the intervention of a designer or central plan, simply because of the interactions among the system elements. Good examples include the tendency of a free market system to organise into buyers, sellers, traders, and bankers, and the tendency of geese to organise into a V-formation.

Structural diagram: Depicts the accumulators and flows in a system, which gives an overview of the major structural elements that produce the system’s behaviour. Structural diagrams are also called flow diagrams or accumulator/flow diagrams.

Structure: The manner in which a system’s elements are organised or interrelated. The structure of an organisation, for example, could include not only the organisational chart but also information flows, interpersonal interactions and relationships, rules and

procedures, authorities and approval levels, process flows, routes, attitudes, reactions, and the incentives and fears that cause them, corporate culture, and feedback loops.

System: A group of interacting, interrelated, or interdependent elements that form a unified whole that attempts to maintain stability through feedback, has boundaries and constraints, and for which the arrangement of the parts is significant. There are both human-designed systems (which serve a specific purpose) and natural systems such as the solar system (which may not have a specific purpose or whose purpose is unknown to us).

Systems thinking: A school of thought that focuses on recognising the interconnections between the parts of a system and synthesising them into a unified view of the whole.

Unintended consequences: Results of actions that were neither planned nor foreseen due to a lack of systems thinking. Examples include the negative impact of insecticide on the environment, the dramatic increase in organised crime as a result of prohibition, the overuse of antibiotics that results in antibiotic-resistant bacteria, and the devastation caused by gypsy moths, which were originally imported into the USA as a cheaper source of silk.

APPENDIX B: CODE BOOK

S/NO	RESEARCH OBJECTIVE/THEMES	CATEGORY	CODE
OBJ. 1	To explore the current influence of stakeholders on the business environment.	Organisational hierarchy	Organisational hierarchy (+) Organisational hierarchy (-)
		Social hierarchy	Social hierarchy (+) Social hierarchy (-)
		Interrelationships	Interrelationships (+) Interrelationships (-)
OBJ. 2	To establish the rules of engagement between stakeholders and the procurement process.	Rules, procedures, norms, policies, and guidelines	Rules, procedures, norms, policies and guidelines (+) Rules, procedures, norms, policies, and guidelines (-)
		Incentives and compensation	Incentives and compensation (+) Incentives and compensation (-)
		Power structures	Power structures (+) Power structures (-)
		Authorities and approval levels	Authorities and approval levels (+) Authorities and approval levels (-)
		Process flows and routes	Process flows and routes (+) Process flows and routes (-)
OBJ. 3	To evaluate if the business environment has an influence on the public procurement process.	Attitudes	Attitudes (+) Attitudes (-)
		Reactions	Reactions (+) Reactions (-)
		Corporate culture	Corporate culture (+) Corporate culture (-)
		Feedback loops and delays in the system dynamics	Feedback loops and delays in the system dynamics (+) Feedback loops and delays in the system dynamics (-)
		Distribution of resources	Distribution of resources (+) Distribution of resources (-)
OBJ. 4	To assess if the procurement process has an impact on military capability.	Underlying forces that exist in an organisation / informal ways of work that have been tacitly or explicitly institutionalised	Underlying forces that exist in an organisation (+) Underlying forces that exist in an organisation (-)
		Behaviours derived from these structures	Behaviours derived from these structures (+) Behaviours derived from these structures (-)
OBJ. 5	To determine the best practice, if any, in the domain of public procurement in the region that can be adopted by the BDF.	Goals and metrics	Goals and metrics (+) Goals and metrics (-)
		Beliefs and morals	Beliefs and morals (+) Beliefs and morals (-)
		Expectations	Expectations (+) Expectations (-)
		Values or culture	Values or culture (+) Values or culture (-)

APPENDIX C: ETHICAL CLEARANCE APPROVAL



NOTICE OF APPROVAL

REC: Social, Behavioural and Education Research (SBER) - Initial Application Form

6 November 2019

Project number: 9516

Project Title: The influence of the business environment on Botswana public procurement process and its impact on military capability.

Dear Lt Col Bushy Rasetshwane

Your REC: Social, Behavioural and Education Research (SBER) - Initial Application Form submitted on 13 October 2019 was reviewed and approved by the REC: Humanities.

Please note the following for your approved submission:

Ethics approval period:

Protocol approval date (Humanities)	Protocol expiration date (Humanities)
6 November 2019	5 November 2022

GENERAL COMMENTS:

Please take note of the General Investigator Responsibilities attached to this letter. You may commence with your research after complying fully with these guidelines.

If the researcher deviates in any way from the proposal approved by the REC: Humanities, the researcher must notify the REC of these changes.

Please use your SU project number (9516) on any documents or correspondence with the REC concerning your project.

Please note that the REC has the prerogative and authority to ask further questions, seek additional information, require further modifications, or monitor the conduct of your research and the consent process.

FOR CONTINUATION OF PROJECTS AFTER REC APPROVAL PERIOD

Please note that a progress report should be submitted to the Research Ethics Committee: Humanities before the approval period has expired if a continuation of ethics approval is required. The Committee will then consider the continuation of the project for a further year (if necessary)

Included Documents:

Document Type	File Name	Date	Version
Research Protocol/Proposal	Proposal May 2018	25/05/2017	1
Default	Ministry of Finance ED	20/06/2019	1
Default	BDF Ethical Clearance	16/07/2019	1
Non-disclosure agreement	Research Assistant Confidentiality Agreement	09/09/2019	1
Budget	Budget 23132213	09/09/2019	1
Recruitment material	Invitee letter	03/10/2019	1
Data collection tool	COMMANDERS INTERVIEW QUESTIONS	03/10/2019	1
Data collection tool	PPADB INTERVIEW QUESTIONS	03/10/2019	1
Data collection tool	PROCUREMENT OFFICERS INTERVIEW	03/10/2019	1
Data collection tool	SUPPLIERS INTERVIEW QUESTIONS	03/10/2019	1
Default	Letter of response	03/10/2019	1
Informed Consent Form	Consent form updated	13/10/2019	1

If you have any questions or need further help, please contact the REC office at cgraham@sun.ac.za.

Sincerely, Clarissa Graham

REC Coordinator: Research Ethics Committee: Human Research (Humanities)

National Health Research Ethics Committee (NHREC) registration number: REC-050411-032.

The Research Ethics Committee: Humanities complies with the SA National Health Act No.61 2003 as it pertains to health research. In addition, this committee abides by the ethical norms and principles for research established by the Declaration of Helsinki (2013) and the Department of Health Guidelines for Ethical Research:

Principles Structures and Processes (2nd Ed.) 2015. Annually a number of projects may be selected randomly for an external audit.

Investigator Responsibilities Protection of Human Research Participants

Some of the general responsibilities investigators have when conducting research involving human participants are listed below:

1. **Conducting the Research.** You are responsible for making sure that the research is conducted according to the REC approved research protocol. You are also responsible for the actions of all your co-investigators and research staff involved with this research. You must also ensure that the research is conducted within the standards of your field of research.
2. **Participant Enrollment.** You may not recruit or enroll participants prior to the REC approval date or after the expiration date of REC approval. All recruitment materials for any form of media must be approved by the REC prior to their use.
3. **Informed Consent.** You are responsible for obtaining and documenting effective informed consent using **only** the REC-approved consent documents/process, and for ensuring that no human participants are involved in research prior to obtaining their informed consent. Please give all participants copies of the signed informed consent documents. Keep the originals in your secured research files for at least five (5) years.
4. **Continuing Review.** The REC must review and approve all REC-approved research proposals at intervals appropriate to the degree of risk but not less than once per year. There is **no grace period**. Prior to the date on which the REC approval of the research expires, **it is your responsibility to submit the progress report in a timely fashion to ensure a lapse in REC approval does not occur**. If REC approval of your research lapses, you must stop new participant enrollment, and contact the REC office immediately.
5. **Amendments and Changes.** If you wish to amend or change any aspect of your research (such as research design, interventions or procedures, participant population, informed consent document, instruments, surveys or recruiting material), you must submit the amendment to the REC for review using the current Amendment Form. You **may not initiate** any amendments or changes to your research without first obtaining written REC review and approval. The **only exception** is when it is necessary to eliminate apparent immediate hazards to participants and the REC should be immediately informed of this necessity.
6. **Adverse or Unanticipated Events.** Any serious adverse events, participant complaints, and all unanticipated problems that involve risks to participants or others, as well as any research related injuries, occurring at this institution or at other performance sites must be reported to Malene Fouche within **five (5) days** of discovery of the incident. You must also report any instances of serious or continuing problems, or non-compliance with the REC's requirements for protecting human research participants. The only exception to this policy is that the death of a research participant must be reported in accordance with the Stellenbosch University Research Ethics Committee Standard Operating Procedures. All reportable events should be submitted to the REC using the Serious Adverse Event Report Form.
7. **Research Record Keeping.** You must keep the following research related records, at a minimum, in a secure location for a minimum of five years: the REC approved research proposal and all amendments; all informed consent documents; recruiting materials; continuing review reports; adverse or unanticipated events; and all correspondence from the REC
8. **Provision of Counselling or emergency support.** When a dedicated counsellor or psychologist provides support to a participant without prior REC review and approval, to the extent permitted by law, such activities will not be recognised as research nor the data used in support of research. Such cases should be indicated in the progress report or final report.
9. **Final reports.** When you have completed (no further participant enrollment, interactions or interventions) or stopped work on your research, you must submit a Final Report to the REC.
10. **On-Site Evaluations, Inspections, or Audits.** If you are notified that your research will be reviewed or audited by the sponsor or any other external agency or any internal group, you must inform the REC immediately of the impending audit/evaluation.

APPENDIX D: BOTSWANA DEFENCE FORCE (BDF) APPROVAL

Appendix D BDF APPROVAL

TELEPHONE: 3663036
TELEGRAMS: DEFENCE



COMMANDER,
BOTSWANA DEFENCE FORCE,
PRIVATE BAG X06
GABORONE VILLAGE
BOTSWANA

REFERENCE: PF190571

07 February, 2019

Lt Col SB Rasetswane
BDF HQ
SSKB

u.f.s: Commandant
BDF HQ

Dear Lt Col.

APPROVAL FOR ETHICAL CLEARANCE-YOURSELF

1. Refer to the above captioned matter.
2. This serves to inform you that your request for ethical clearance regarding your research topic on "THE INFLUENCE OF THE BUSINESS ENVIRONMENT ON BOTSWANA PUBLIC PROCUREMENT AND ITS IMPACT ON MILITARY CAPABILITIES" has been acceded to.
3. We wish you success in your studies.
4. Thank you.

Yours Sincerely,

Brigadier S B Molomo
FOR/COMMANDER, BOTSWANA DEFENCE FORCE

L28

P.O.Box 30642
Tlokweng

30th October 2018

Commander, BDF
P/Bag X06
Gaborone

Ref: 190571

REQUEST FOR ETHICAL CLEARANCE

Sir,

1. Reference is made to the offer extended to me to pursue Doctoral studies in the Republic of South Africa. This letter serves to confirm that I am a registered student at the University of Stellenbosch, with the Faculty of Military Science in Saldanha Bay under the Department of Public and Development Management. This admission came after the development of a research proposal which I presented to the University's PhD committee on the 18th May 2018. My proposal was accepted and submitted to the PhD Senate which was approved end of July 2018.

2. My topic is: "Public procurement in today's complex Business environment and its impact on military capability"

3. The problem statement of my study reads thus:

"The BDF is a governmental institution, which conducts its procurement through public funds. The BDF mandate is to defend the country and as such, it needs to be capacitated in order for it to achieve its mandate. Over time there has develop trends of contract failures as a result of poor quality of goods, late deliveries or even failure to deliver by suppliers. This resulted into a compromised military capability. Despite its statutory, mandate, the BDF found itself facing challenges in its procurement process, which includes the bureaucratic autonomy and the complex business environment. Given the foregoing administrative dynamics and procurement complexities the study seeks to assess how public procurement process is affected by the business environment with a view to establish how it impact on defence capability. It will further assess the relationship between stakeholders and their impact in the BDF procurement process. This assessment is intended to contribute towards

Records Management Unit
Received

30 OCT 2018

the realignment of procurement processes and effective military capability while enhancing the operational readiness of the BDF.

4. The purpose of this research is to explore the relationship between various stakeholders in the business environment, how this relationship affects the public procurement process and the impact of these consequential effects on Botswana military capability.

5. As a requirement, one has to conduct ethical clearance before the conduct of study. This clearance involves the consent of organisation or persons to be studied. According to the University policy research integrity embodies a range of good research practice and conduct which can include intellectual honesty, accuracy, fairness, intellectual property, and protection of human and animal subjects involved in the conduct of research.

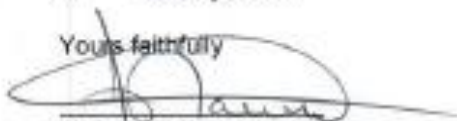
6. Participants have the right to know who has access to their data and what is being done with it. Changes to modern society have seen an increase in litigation as a means of solving disputes. If ethical approval has not been obtained, the individual researcher bears personal responsibility for any claim.

7. The aim of ethical review is to protect participants. They are a valuable part of the research process and not merely a means of accessing data. However, ethical review also helps to protect the researcher. By obtaining ethical approval, one is demonstrating that he has adhered to the accepted ethical standards of a genuine research study, which could increase recruitment potential.

8. It is on this note that I request for your approval to conduct this study because it will involve interviews of some key personnel in the BDF finance and procurement as well as analysis of some procurement related documents or sources. Attached is my admission letter.

9. Thank you sir.

Yours faithfully



Lt Col S.B Rasetshwane

APPENDIX E: MINISTRY OF FINANCE AND ECONOMIC DEVELOPMENT (MFED) APPROVAL

Appendix E- MFED Approval

PRIVATE BAG 008
GABORONE
BOTSWANA



REPUBLIC OF BOTSWANA

TEL: (+267) 3950100
FAX: (+267) 3956086

MINISTRY OF FINANCE AND ECONOMIC DEVELOPMENT

REF: MFED (c) 71/6/25 Vol.25 (23)

20th March 2019

TO: Mr. Bushy Rasetshwane

Dear Sir,

REQUEST FOR PERMISSION TO UNDERTAKE A RESEARCH STUDY

1. Reference is made to your letter dated 15th March 2019, wherein you requested permission to do a research project.
2. You are herewith granted permission to do research on **"The influence of the Business environment on Botswana public procurement processes and its impact on military capability"**.
3. The following conditions must be complied with subsequently;
 - 3.1 Upon completion you submit a copy of your research paper to the Ministry Library.
 - 3.2 Kindly note that this permission is valid from 01st June 2019 to 30th November 2019.
 - 3.3 Permission to entry of premises is limited to authority of those concerned.
 - 3.4 You are to conduct the research according to the approved application taking into account the above conditions.
 - 3.5 Failure to comply with the above will result in immediate cancellation of the permit given.
4. Please report to the Secretary – Economic and Financial Policy who will make the necessary arrangements for your research.
5. Thank you.

Yours faithfully

Gaongalelwe S. Seetasewa

For/ PERMANENT SECRETARY

PRIVATE BAG 008
GABORONE
BOTSWANA



REPUBLIC OF BOTSWANA

TEL: (+267) 3950100
FAX: (+267) 3956086

MINISTRY OF FINANCE AND ECONOMIC DEVELOPMENT

REF: MFED (c) 71/6/25 Vol. 26 (12)

27th November 2019

TO: Mr. Bushy S. Rasetshwane

Dear Sir,

REQUEST FOR EXTENSION TO CONDUCT RESEARCH: YOURSELF

1. The above subject matter refers.
2. You are herewith granted extension to do research on "**The influence of the business environment on Botswana public procurement processes and its impact on military capabilities**" within the Ministry of Finance and Economic Development. This extension is valid until 31st January 2020.
3. The following conditions must be complied with subsequently;
 - 3.1 Upon completion of the project, you must submit a copy of your research paper to the Ministry Library.
 - 3.2 You are to conduct the research taking in to consideration legal instruments governing Public Service.
 - 3.3 Failure to comply with the above will result in immediate cancellation of the permit given.
4. Thank you.

Yours faithfully

A handwritten signature in black ink, appearing to read 'Gaongalelwe S. Seetasewa'.

Gaongalelwe S. Seetasewa
For/ Permanent Secretary

Cc: Ag. Secretary, Economic and Financial Policy

Lt Col Bushy Simon Rasetshwane
P.O.Box 30642
Tlokweng

15th March 2019

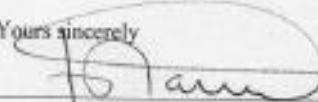
Permanent Secretary
Ministry of Finance and Economic Development
P/Bag 008
Gaborone

Sir/Madam

REQUEST FOR PERMISSION TO CONDUCT RESEARCH

1. I am an officer in Botswana Defence of the rank of Lieutenant Colonel . I am currently enrolled with the University of Stellenbosch, Faculty of Military Science in Saldanha Bay under the Department of Public Development and Management in pursuance of a PhD.
2. My topic is: **"The influence of the Business environment on Botswana public procurement process and its impact on military capability"**
3. My enquiry will involve various stakeholders within the public procurement process which includes the Ministry of Finance and Economic Development as the funder of projects. Although there are other sources such as documents, to ensure rigor in my studies requires some in-depth interviews for validity of my studies.
4. It is on this note that I request to conduct some interviews with some or any member within the Ministry who is more relevant on issues of Budget and funds allocations.
5. I hope my request will meet your favorable consideration.

Yours sincerely


Lt Col Bushy Simon Rasetshwane
+26771346834/ 72100623

Lt Col Bushy Simon Rasetshwane
P.O.Box 30642
Tlokweng

5th November 2019

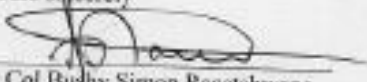
Permanent Secretary
Ministry of Finance and Economic Development
P/Bag 008
Gaborone

Sir/Madsm

REQUEST FOR EXTENSION TO CONDUCT RESEARCH

1. Reference to yours dated 20th March 2019; MFED (c) 71/6/25 Vol. 25 (23) where I was granted permission to conduct my research project from 1st June 2019- 30th November 2019 (See attached).
2. My topic is: "The influence of the Business environment on Botswana public procurement process and its impact on military capability"
3. This letter serves to request extension to 31st January 2019. The delay was because the University of Stellenbosch ethical clearance process is very lengthy and I had just been given granted a "provisionally approval" to commence my data collection while the final approval is still to be finalized by the Research Ethics Committee. Apparently the final letter of ethical approval may take up to forty day (40) (see attached e-mail extract).
4. With the limited number of days left up to the end of November, I have to recruit research assistants whom I intend sourcing from the University of Botswana and may not be available as the University is heading towards the end of the semester hence the request for extension.
5. I hope my request will meet your favorable consideration.

Yours sincerely


Lt Col Bushy Simon Rasetshwane

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3960381

APPENDIX F: MINISTRY OF DEFENCE, JUSTICE AND SECURITY (MDJS) APPROVAL

Appendix F- Ministry of Defence Justice and Security Approval

PRIVATE BAG 00384
GABORONE
BOTSWANA



TEL: (+267) 3098200
FAX: (+267) 3285751

REPUBLIC OF BOTSWANA

MINISTRY OF DEFENCE, JUSTICE AND SECURITY

REF: MDJS 1/18/5 III (5) 6th March 2020

Lt Col Bushy S. Rasetshwane
P. O. Box 30642
Tlokweng

Dear Lt Colonel

RE: REQUEST FOR PERMISSION TO DO RESEARCH

Reference is made to your letter dated 17th January 2020 regarding your request.

This serves to inform you that your request for ethical clearance in respect to your topic on **"The influence of the business environment on Botswana Public Procurement and its impact on military capabilities"** has been acceded to. Consequently, your request for permission to collect data from the Institutions under this Ministry for purposes of fulfilling your study requirements is approved.

We wish you all the best in your studies.

Yours Sincerely

Paul Mapote
FOR/PERMANENT SECRETARY

Lt Col Bushy Simon Rasetshwane
P.O.Box 30642
Tlokweng

17th January 2020

Permanent Secretary
Ministry of Defence Justice and Security
Private Bag 00384
Gaborone

REQUEST FOR PERMISSION TO CONDUCT RESEARCH

Sir/Madam

1. I am an officer in Botswana Defence Force of the rank of Lieutenant Colonel. I am currently enrolled with the University of Stellenbosch, Faculty of Military Science, under the Department of Public Development and Management in pursuance of a PhD under full sponsorship of BDF.

My topic is: **"The influence of the Business environment on Botswana public procurement process and its impact on military capability"**.

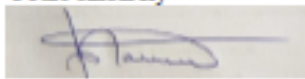
2. My enquiry involves interviewing various stakeholders within the public procurement process which includes companies, Botswana Unified Revenue Services, clearing agents and Public Procurement and Asset Disposal Board members (Ministerial/PPADB) or staff and other departments. Since the subjects of enquiry are human beings and organisations, it is a requirement that, one has to seek consent for ethical clearance before the conduct of study. This clearance involves the consent of organisation or persons to be studied.

3. According to the University policy research Integrity embodies a range of good research practice and conduct which can include intellectual honesty, accuracy, fairness, intellectual property, and protection of human and animal subjects involved in the conduct of research.

4. Seeking consent is part of the compliance to ethical standards. The aim of ethical review is to protect participants. They are a valuable part of the research process and not merely a means of accessing data. By obtaining ethical approval, one is demonstrating that he has adhered to the accepted ethical standards of a genuine research study, which could increase recruitment potential.

5. It is on this note that I request for permission to collect data through your institutions in order to fulfill the requirements of my studies. I intend to collect data from 16-24th March 2020.

Yours sincerely



Lt Col Bushy Simon Rasetshwane

Email: sbrasetshwane@gmail.com Cell No: +267 72100623; 71346824

APPENDIX G: PUBLIC PROCUREMENT AND ASSET DISPOSAL BOARD (PPADB) APPROVAL

APPENDIX G- PPADB APPROVAL

REF: PPADB 2/1/1 I

2nd June 2020

Lt Colonel Bushy Simon Rasetswane
P. O. Box 30642
Tlokweng

Dear Sir,

REQUEST FOR PERMISSION TO CONDUCT RESEARCH

Reference is made to the above matter.

Please kindly be informed that the Public Procurement and Asset Disposal Board (PPADB) has acceded to your request for ethical clearance with regard to your research topic on "The influence of business environment on Botswana Public Procurement and its impact on military capabilities".

We wish you success in your studies.

Thank you.

Yours faithfully,


P. Motswagole
BOARD SECRETARY

Rev. No: 00

Page 1 of 1

Plot 8913, Masigedjau way Gaborone West Industrial Site, Gaborone Botswana PBag 0055 Gaborone
Tel: + 267 300 8853 Fax: +267 300 8122

Board Secretary
3602077

Ms. Motswagole.



Lt Col Bushy Simon Rasetshwane
P.O.Box 30642
Tlokweng

18th December 2019

Board Chairperson
Public Procurement and Asset Disposal Board
P/Bag 0058
Gaborone

REQUEST FOR PERMISSION TO CONDUCT RESEARCH

Sir/Madam

1. I am an officer in Botswana Defence Force of the rank of Lieutenant Colonel. I am currently enrolled with the University of Stellenbosch, Faculty of Military Science in Saldanha Bay under the Department of Public Development and Management in pursuance of a PhD.

My topic is: **"The influence of the Business environment on Botswana public procurement process and its impact on military capability"**.

2. My enquiry involves interviewing various stakeholders within the public procurement process which includes companies, Botswana Unified Revenue Services, clearing agents and Public Procurement and Asset Disposal Board members or staff and other departments. Since the subjects of enquiry are human beings and organisations it is a requirement that, one has to seek consent for ethical clearance before the conduct of study. This clearance involves the consent of organisation or persons to be studied.

3. According to the University policy research Integrity embodies a range of good research practice and conduct which can include intellectual honesty, accuracy, fairness, intellectual property, and protection of human and animal subjects involved in the conduct of research.

4. Seeking consent is part of the compliance to ethical standards. The aim of ethical review is to protect participants. They are a valuable part of the research process and not merely a means of accessing data. By obtaining ethical approval, one is demonstrating that he has adhered to the accepted ethical standards of a genuine research study, which could increase recruitment potential.

5. It is on this note that I request for permission to collect data through your institutions in order to fulfill the requirements of my studies. I hope this will meet your favorable consideration.

Yours sincerely


Lt Col Bushy Simon Rasetshwane

Email: sirsimonrasetshwane@gmail.com Cell No. +267 72100623, 71346824

APPENDIX H: BOTSWANA PARLIAMENT APPROVAL

APPENDIX H- Botswana Parliament Approval

TELEPHONE: 3616800
TELEX: 2414 BD PULA
TELEGRAMS: PARLIAMENT
E-MAIL: parliament@gov.bw
FAX: 3913103



REPUBLIC OF BOTSWANA

NATIONAL ASSEMBLY
P. O. BOX 240
GABORONE
18/11/2019

REFERENCE: NA 6/5/4 2 (59)

Lt Col. Bushy Simon Rasetshwane
P.O. Box 30642
Tlokweng

Dear Sir,

RE: REQUEST TO HAVE ACCESS TO PARLIAMENTARY LIBRARY

This serves to acknowledge receipt of your letter dated 6th November 2019 in which you seek to access our library documents specifically Hansard with particular reference to 'Submissions by the Minister of Defence, Justice and Security to the Committee of Supply submissions'.

Your request has been acceded to. Should you require any further information or clarification do not hesitate to contact us, we will be happy to assist where possible.

Sincerely,

M. T. Lengwadibe
Assistant Clerk – (Research & Information Services Division)

Lt Col Bushy Simon Rasetshwane
P.O.Box 30642
Tlokweng

6th November 2019

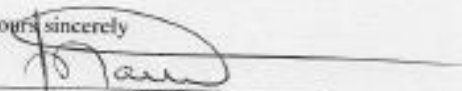
Clerk of the National Assembly
P.O.Box 240
Gaborone

REQUEST TO HAVE ACCESS TO PARLIMENTARY DOCUMENTS

Sir/Madam

1. I am an officer in Botswana Defence Force of the rank of Lieutenant Colonel. I am currently enrolled with the University of Stellenbosch, Faculty of Military Science in Saldanha Bay under the Department of Public Development and Management in pursuance of a PhD.
2. My topic is: **"The influence of the Business environment on Botswana public procurement process and its impact on military capability"**.
3. My enquiry will involve interviewing various stakeholders within the public procurement process which includes companies, Botswana Unified Revenue Services, clearing agents and Public Procurement and Asset Disposal Board members and others. In validating my finding I have to do data triangulation which is the comparison of archives records and interviews which will ensure rigor in my research.
4. The information I require from records are the "Submissions by the Minister of Defence, Justice and Security to the committee of supply" with particular focus on Botswana Defence Force over a ten (10) year period from March 2008 to March 2018.
5. I had been made aware that I can access such information from submissions presentations or the Hansard records, hence a request to access the library and be assisted with accessing these documents.

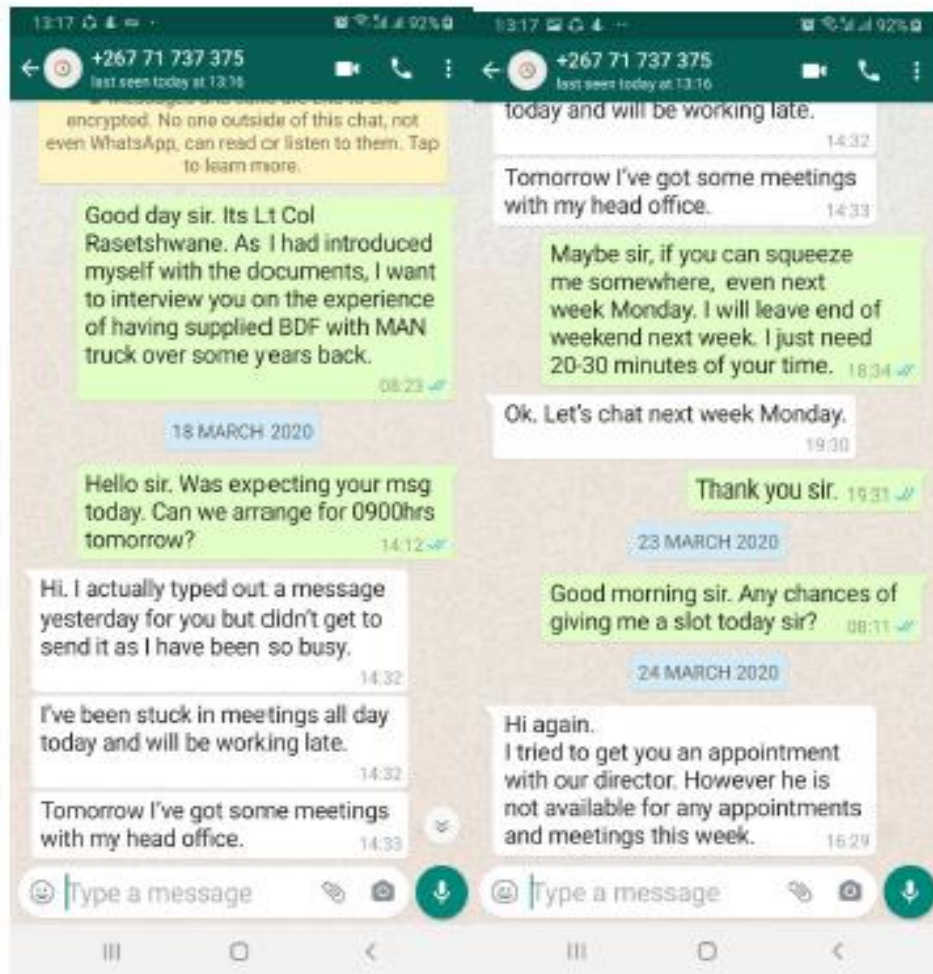
Yours sincerely


Lt Col Bushy Simon Rasetshwane



Rame

APPENDIX I Decline communication from supplier





UNIVERSITEIT • STELLENBOSCH • UNIVERSITY
jou kennisverkoort • your knowledge partner

**STELLENBOSCH UNIVERSITY
PARTICIPANT INVITATION LETTER**

Dear Director

1. My name is Lieutenant Colonel Bushy Simon Rasetshwane. I am a doctoral student at Stellenbosch University's faculty of Military Science. I am kindly requesting your participation in a doctoral research study that I am conducting titled: The influence of the business environment on public procurement process in Botswana and its impact on defence capability.
2. Having supplied BDF with some transport equipment in the past, your company has been identified as a potential respondent. The intention is to make an assessment of how the public procurement process impact on defence capability with a view of recommending the best way of conducting defence procurement to ensure a prompt and effective force.
3. The study involves an interview which will last us 45-60 minutes. Participation is completely voluntary and you may withdraw from the study at any time. The study is completely anonymous, therefore, it does not require you to provide your name or any other identifying information.
4. If you would like to participate in the study please read the Informed Consent form attached. I will be in Botswana from 16th March-24th March 2020 and request for your time in any of the days for this period.
5. Your participation in the research will be of great importance to assist in suggesting the most effective way of conducting military procurement in Botswana.
6. Thank you for your time and participation

Yours sincerely,

Lt Col S.B Rasetshwane, DABS, BAcc, MBA, MDSS, Doctoral Student, University of Stellenbosch

APPENDIX I: FORMER COMMANDERS: INTERVIEW QUESTIONS

These questions guide the interview with former commanders of the Botswana Defence Force (BDF) for the period 2008 to 2018. They were the accounting officers during that time and decisions were made solely by them.

Research question: What needs to be done to ensure a prompt and effective defence force, while it is dependent on public procurement process that exists within a complex business environment characterised by a bureaucratic system?

1. Can you please share with me your experience concerning the BDF's procurement as a former commander?
2. During the period 2008-2018, you happened to be one of the commanders of the BDF. It is also during this period that the defence force experienced challenges in terms of its operational ability, especially in terms of transport and communication. Can you share with me what could have contributed to this situation?
3. Throughout the procurement process, who can you classify as the most influential stakeholders?
4. The decision to procure is solely the responsibility of the Commander of the BDF as an accounting officer. Can you share with me how freely you were able to exercise your authority?
5. Can you explain the BDF relationship with other departments in so far as executing the defence assignment, especially those within the security sector?
6. There are reports through the media that defence procurement has always been made in favour of a few individuals and characterised by bureaucracy. What are your views on that?
7. Defence procurement has always been done in the same line as other goods and services despite the agency in which operations may dictate. Have you done any benchmarks, either regionally or internationally, to determine the best ways of defence procurement that will achieve the vision of a prompt and decisive defence force?
8. In your view, which area specifically do you think needs to be improved in the overall process of public procurement with particular reference to defence?

APPENDIX J: FORMER CHIEF OF STAFF: PROCUREMENT: INTERVIEW QUESTIONS

1. After the end of the Doorne's Aanhangwagen Fabriek (DAF) fleet lifecycle, the BDF has never been able to revive and sustain its operational effectiveness in terms of mobility and communication. Having served in the Office of Procurement at the strategic level, can you take me through your experience on the matter?
2. There are several stakeholders in the procurement process, such as suppliers, the regulatory authority, which is the PPADB; BURS, shipping agents; etc. Can you share with me how all these affect defence procurement, including bottlenecks, if there are any?
3. With your experience having been responsible for military procurement, can you share with me some of the procurement, as perceived to be influenced by bureaucracy, or so many layers of consulting and even approval?
4. The BDF has a vision of a prompt and effective defence force. Do you think the current procurement system or process of a centralised public procurement supports that vision of being a prompt and efficient defence force?
5. Further to that, what can you say about the absence of a defence policy and doctrine, and how do you think these contribute to this inefficiency?
6. There was a time when standardisation was intended to be maintained. What happened to that exercise and why did it not materialise?
7. Along the procurement policy framework, there was the introduction of citizen economic empowerment policies. How do you think they have impacted on our procurement process?

APPENDIX K: CHIEF OF STAFF: FINANCE: INTERVIEW QUESTIONS

This interview was intended to gain insight into how the finance function in the BDF collaborates with the procurement function, and their role in the process.

1. During the period 2008 to 2018, the defence force experienced challenges in terms of its operational ability, especially in terms of transport and communication. Do you think procurement could have contributed to the situation?
2. Do you have any specific stakeholders in the process who classify as very influential in the procurement process?
3. As the Directorate of Finance, how do you interact with the budgeting process for defence procurement?
4. Do you think it is appropriate to conduct defence procurement in the way it is currently conducted, i.e. in the same line with other goods and services?
5. In your view, which area specifically do you think needs to be improved in the overall process of public procurement, with particular reference to defence?

APPENDIX L: STAFF OFFICERS: PROCUREMENT: INTERVIEW QUESTIONS

You have been identified to have been a staff officer for procurement of vehicles/communication equipment during the period 2008 to 2018 or at some point during this period; hence your selection for this interview.

1. The BDF has over the period under review struggled with transport and communication for its anti-poaching operations, after the DAF fleet from Holland reached the end of its operational life. What are the reasons for having failed to come up with an effective plan to continue to be operationally effective?
2. Within the procurement process, several stakeholders are involved, including suppliers, regulatory authority, BURS, shipping and clearing agents, etc. Can you share with me how all these affect defence procurement, including bottlenecks, if any?
3. Procurement is conducted under a recurrent budget, which is only 12 months. What can you say about defence procurement in relation to the 12-month period against the type of equipment?
4. With your experience in the procurement department, what can you say about achieving your annual acquisition of military equipment against your budget?
5. Can you share with me if some of the procurement is influenced by bureaucracy, as it is always an outcry from the general public and national media?
6. What do you propose can be done to have an effective procurement system that will be able to contribute towards the vision of a prompt and effective defence force?
7. What are your views on the impact of the Citizen Economic Empowerment Policy on the overall procurement process?

APPENDIX M: MDJS PERMANENT SECRETARY: INTERVIEW QUESTIONS

Research question: What needs to be done to ensure a prompt and effective defence force, while it is dependent on a public procurement process that exists in a complex business environment characterised by a bureaucratic system?

1. Can you briefly explain to me the extent to which the ministry has played its role in ensuring that the BDF adopts a posture of a capable force through its structure and mobility assets for anti-poaching activities?
2. Among the latest national priorities and budget strategies (Budget Strategy Papers 2010-2019), it was indicated that the budget intended to address good governance and strengthening of national security. In particular, to construct offices and housing accommodation for police, prisons, and BDF personnel, as well as to upgrade equipment for the army to enhance security capabilities. To what extent do you think you are meeting these objectives?
3. Within the ministry, who do you think has been a major beneficiary of the ministerial budget over the past 10 years?
4. Have you ever considered how the one-year procurement cycle affects defence procurement, considering that military equipment usually takes more than 12 months or more to produce and deliver?
5. Have you identified any form of bureaucracy in our public procurement process?
6. Don't you think it's time that the ministry should be in total charge of defence procurement?
7. What are your views that defence acquisition can be done separately from the main public procurement process?

APPENDIX N: MDJS DESK OFFICER: INTERVIEW QUESTIONS

Research question: What needs to be done to ensure a prompt and effective defence force, while it is dependent on a public procurement process that exists in a complex business environment characterised by a bureaucratic system?

1. Having served on the Ministerial Tender Committee (MTC) board, what are your perceptions of the BDF's procurement in relation to the current state of it lacking when it comes to simple operational assets such as vehicles?
2. What has been the role of the board in ensuring that the defence force conducts its procurement in line with the budget plans?
3. What have been the major challenges to the board regarding defence procurement?
4. How do you think defence procurement has been influenced over time by various stakeholders in the security sector?
5. In your view, do you think that defence procurement is properly placed to conduct its procurement in the same line as the mainstream government procurement of goods and services?
6. What do you think needs to be done to enhance the current defence procurement system?

APPENDIX O: MINISTRY OF FINANCE AND ECONOMIC DEVELOPMENT (MFED): INTERVIEW QUESTIONS

I have been referred to you by the Director: Budgeting in the MFED to answer on her behalf.

1. Can you briefly explain to me the role of budgeting, and the challenges you encounter during the process?
2. Among the latest national priorities and budget strategies (Budget Strategy Paper 2018-2019), you have indicated that you want the budget to address good governance and strengthening national security; in particular, in order to construct offices and housing accommodation for police, prisons, and BDF personnel, as well as to upgrade equipment for the army to enhance security capabilities. To what extent do you think you are meeting these objectives?
3. Within the security sector, who do you think has been a major beneficiary of the ministerial budget over the past 10 years?
4. Have you ever considered how the one-year procurement cycle affects defence procurement, considering that military equipment usually takes more than 12 months or more to produce and deliver?
5. Is it possible that defence acquisition can be done separately from the main public procurement process with a waiver to be exempt from the 12-month procurement cycle?

APPENDIX P: PPADB DESK OFFICER: INTERVIEW QUESTIONS

You have been identified as a possible respondent in this study because you have been a desk officer at the PPADB Secretariat on issues of security, which includes the BDF over the period of this study.

1. The BDF has struggled with transport and communication over the period 2008 to 2018. How do you think the procurement process could have contributed to this deficiency?
2. During the last years of the period under review, we have seen ministries empowered to approve some of the procurement activities. How effective has this been in terms of the whole procurement process?
3. Please share with me your efforts as a regulatory body to ensure that procurement plans are aligned with the objectives of empowering institutions to function effectively through the procurement of good and services?
4. What can you say are the major challenges encountered with defence procurement?
5. Can you share with me if some of the procurement is influenced by bureaucracy as there is always an outcry from the general public and national media?
6. Military equipment is unique in nature and can take long to acquire, which may outrun the annual budget period. What do you propose can be done to have an effective procurement system that will be able to contribute to the vision of a prompt and effective defence force?
7. In your view, with the PPADB playing an oversight role and being an adjudicator, how do you think it impacts on the process as a whole?
8. What are your views on the impact of the Citizen Economic Empowerment Policy on the overall procurement process?