The impact of the funding gap on capital projects in state universities: Case of Midlands State University (Gweru) from 2012 to 2014

BY:
FORTUNATE NONGERAYI

R12414N (VISITING)

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SEPTEMBER, 2014
APPROVAL FORM

The undersigned certify that they have supervised the student Fortunate Nongerayi dissertation entitled: The impact of the funding gap on capital projects in state universities: Case of Midlands State University submitted in partial fulfillment of the requirements of the Bachelor of Commerce Honours Degree in Accounting at Midlands State University.

………………………………..  …………………………………………………
SUPERVISOR                        DATE

………………………………..  …………………………………………………
CHAIRPERSON                      DATE

………………………………..  …………………………………………………
EXTERNAL EXAMINER                DATE
RELEASE FORM

NAME OF STUDENT: FORTUNATE NONGERAYI

DISSERTATION TITLE: The impact of the funding gap on capital projects in state universities: Case of Midlands State University.

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SIGNED

DATE

PERMAMANT ADDRESS: Stand No. 5181/2 Mkoba 11

Gweru

Zimbabwe

DATE: September 2014
DEDICATION

I dedicate this study to my husband Njabulo, my son Leon and my mother Mektilda and friends; you were my pillar of strength and to my late father.
ACKNOWLEDGEMENTS

I would like to thank the Almighty God for granting me this life and all the experiences I have passed through, good and bad times.

To the people who enormously helped me in the preparation of this research, I wish to extend my gratitude to my supervisor Ms Mhaka for her time, her guidance and patience, support and encouragement. Ms Mhaka “May God bless you” for you have always been forthcoming with valuable insights, suggestions and advice. I also wish to extend my gentle gratefulness to Mr Zvidzayi, Mr Paraffin, Mr and Mrs Chigwaza, Mr Satande, Mr Japu, Tendeukai Mutizwa, Mr Mapetere, Thulani Marufu, Zodwa Makaza, and all the Midlands State University (MSU) Bursary personnel for their undaunted support and advice throughout the research period. I would like to thank them for their moral and intellectual support because without them I could not have gone this far. I extend my gratitude to my Husband Njabulo Ngwenya for his encouragement, patience and moral support throughout my studies.

Lastly, I would like to pay a very special recognition to my parents, brothers, sisters, my son and my friends for their encouragement, patience and love.
ABSTRACT

The study focuses on the funding gap on capital projects in state universities which is a case at Midlands State University. Capital projects funded from Government capital grants in this study and members of staff in the Bursary Department, Planning Section were involved in this research as respondents to questionnaires and interviews as the researcher collected primary data. This data was then presented in tables, bar graphs, line graphs and pie charts. The study results ascertained that the main factor that leads to the funding gap in state universities is fiscal instability and its impact is that it compromises the quality of infrastructure that is built at the institution; complex projects such as the storey hostels and the library are at stand still, students do not have enough residence and learning space. Economic and political conditions hinder investment in the education sector as corporate governance is compromised in appropriation of capital grants and accessing other investment internally and externally. There is need for authorities review policies to those that clearly postulate the funding of capital projects in state universities such that growth can be accelerated to the rate at which enrolment increases. The research recommended that the government, institution’s management and policy makers should come together to make strategic plans to come up with a suitable policy.
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CHAPTER 1

INTRODUCTION

1.1 Background of the study

This research study follows other researchers who have once looked at funding gaps in state universities. As advocated by Musselin (2014) the evaluation of funding gap empowers management of universities and the government to come to terms with the budgeting and resource allocation techniques that promotes national growth. According to Midlands State University, General Information and Regulations, Year Book (2011-2014) the university is a government institution falls under the Ministry of Higher and Tertiary Education, Science and Technology Development. According to the MSU Budget Process Guide (2014) it gets its revenue from students’ fees, government grants from the national budget allocations as per Blue Book, for salaries, operations and capital projects. With reference to Planning Section Committee meetings minutes Mr Paraffin said that, it has been experienced that annual revenue and other funds that Midlands State University has been receiving cannot cover operating expenses and annual capital expenditure on projects. The Ministry of Finance Strategic Plan (2013-2017) stated that government grants do not come in time and at times come in shortfalls, and to make matters worse students do not pay their fees in time.

In the 2012 Government Work Programme (GWP) (13/03/2012) presentation it is stated that universities, including Midlands State University embarked on the building of halls of residence, lecture rooms, libraries and computer laboratories among other projects at faculty sites. This came as a means to accommodate around 20 000 students according to Student Registration Statistics (2014). The university can only accommodate 4900 students in hostels
according to Residence Statistics (2014) because there are no funds to build adequate hostels. According to the authorities in the Business Development Section in the Bursar’s department investments Audit Report (14/03/2014) there is need to bridge between the funding-gap in order to develop quality infrastructure for a conducive education and working environment for competitive service delivery.

According to the 89th Budget Committee Meeting (04/07/13) minutes, the Deputy Bursar-Planning, said that the university on its own cannot construct the required infrastructures to facilitate service delivery therefore capital projects are in dire need of funding assistance from the government. It was noted in the minutes of the same meeting that no capital and operations grants have been received up to that date for 2013. Again it was noted in the 90th (14/08/13) and 93rd (21/03/14) Budget Committee Meetings that every year the proposed budget allocations are received late and in shortfalls and at times nothing is received from government. In the Midlands State University Act Chapter 25:21 it is stressed out that government would disburse funds for each university to engage on one major project at a time. But, the Deputy Bursar-Planning Mr Zvidzayi explained in the 92nd Budget Committee Meeting (20/01/14) minutes that this does not necessarily mean that adequate funds are disbursed for that particular project and again allocations for 2014 have not been received. The government does not carry over accruals from the previous years, thereby creating a huge funding gap in state universities projects.
In year 2011, the library’s budget grant was set at $664 000 and nothing was received for the project during the year putting the funding gap at 100%. In 2012, the estimated budget for the library budget was $2 300 000 and only $585 000 was received allowing the funding gap of 74%. The upgrading of labs and the renovation of buildings had 40% and 100% funding gap respectively. In 2013, the estimated budgets for the library and the halls of residence was $3 000 000 and $3 627 000 respectively. Nothing was disbursed from the government for the library and only $453 300 was received for the halls of residence leading to a gap of 100% and 88% respectively. In the year 2014, the grant for the library, rehabilitation of buildings and halls of residence had not yet been received of $1 500 000, $200 000 and $2 510 000 which have the funding gap percentage of 100% respectively. None of these shortfalls had been carried over to the next period over the years since the government operated on cash.

Table 1.1 MSU Capital projects funding gap (amounts are rounded off)

<table>
<thead>
<tr>
<th>Year</th>
<th>Capital project</th>
<th>Budget estimate($)</th>
<th>Funds received($)</th>
<th>Variance</th>
<th>Gap %</th>
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<tr>
<td>2011</td>
<td>Library</td>
<td>664 000</td>
<td>-</td>
<td>664 000</td>
<td>100</td>
</tr>
<tr>
<td></td>
<td>Library</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>upgrading labs</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>renovation(buildings)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2012</td>
<td>Library</td>
<td>2 300 000</td>
<td>585 000</td>
<td>1 715 000</td>
<td>74</td>
</tr>
<tr>
<td></td>
<td>upgrading labs</td>
<td>500 000</td>
<td>200 000</td>
<td>300 000</td>
<td>40</td>
</tr>
<tr>
<td></td>
<td>renovation(buildings)</td>
<td>265 000</td>
<td>-</td>
<td>265 000</td>
<td>100</td>
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<tr>
<td>2013</td>
<td>Library</td>
<td>3 000 000</td>
<td>-</td>
<td>3 000 000</td>
<td>100</td>
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<tr>
<td></td>
<td>Hall of residence</td>
<td>3 627 000</td>
<td>453 000</td>
<td>3 174 000</td>
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<td>2014</td>
<td>Library</td>
<td>1 500 000</td>
<td>-</td>
<td>1 500 000</td>
<td>100</td>
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<td>Rehab(buildings)</td>
<td>200 000</td>
<td>-</td>
<td>200 000</td>
<td>100</td>
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<td>Hostels</td>
<td>2 510 000</td>
<td>-</td>
<td>2 510 000</td>
<td>100</td>
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basis and it could not account for contingent liabilities and capital projects (assets) were
expensed. Not much has been allocated to the building of lecture rooms, hotels and libraries,
which are the crucial aspects of lecturing-learning process as compared to student population
at MSU that is why temporary buildings were put in place to try and solve the problem.

1.2 Statement of the problem

The issue of concern is the failure by the government to disburse the optimum funds required
by Midlands State University to meet its budgeted capital expenditure on projects. Midlands
State University is a growing university with a very large enrolment of students due to the
high demand of its services. The university is failing to meet its financing strategies on its
projects as a result of inadequate finance such as provision of adequate students’ residence
and learning space (that is learning and living conditions). Pre-fabricated temporary
structures are being used due to this problem.

The responsible authorities (management) call for government establish alternatives decisions
(policies) to build the quality infrastructures to effectively attain organisational goals. This
has prompted the researcher to come up with alternative policies and strategies that would
reduce the impact of funding gap on investments at Midlands State University.

1.3 Main research question

What is the impact of funding gap on investment projects at Midlands State University?

1.4 Research objectives

(i) To identify the ministry policy requirements on funding state universities and how they
are implemented.

(ii) To establish the factors contributing to the funding gap at Midlands State University.
(iii) To identify the revenue schemes (strategies) to mitigate the funding gaps.

(iv) To analyse the challenges that could be encountered in implementing the revenue strategies.

(v) To find out the best practice on funding universities.

1.5 Research questions

(i) How is the funding policy implemented at Midlands State University?

(ii) What are the factors contributing to the funding gap at Midlands State University?

(iii) What revenue schemes could be implemented to mitigate the funding gap?

(iv) What are the challenges that could be encountered in implementing the revenue strategies?

(v) What is the best practice on funding universities?

1.6 Limitations to the study

The research study is limited only to Midlands State University revenue received from the government as funds for capital projects and not receipts for employees’ salaries, for operations and student cadetship funds from the government. The researcher is not able to interview or provide questionnaires to everybody working in the organisation and selected a sample population from the Bursar’s Department. The research study is focused on to Midlands State University due to time and financial constraints for the researcher to travel to other universities to obtain relevant information.
1.7 Delimitations to the study

The research study is directly focused on Midlands State University capital projects at the Main campus and the Telone campus in Gweru that get funds from the government for the period from year 2011 to 2014. It involves mainly the university employees operating in the Bursar’s Department Planning Section for the reliable information.

1.8 Justifications of the study

This study was genuinely aimed at making a distinction on people’s perceptions that when organisations engage into valuable investments, resources are not being wasted and instead every citizen benefit. This research study from its findings would help financial management in organisations, at Midlands State University and the government of Zimbabwe to make unified investments schemes in building permanent structures for the growth and development of the economy at large. Students may also use the research findings as resource material in their studies. The research study is a partial fulfilment to the Bachelor of Commerce Honours Accounting Degree at Midlands State University to the researcher.

1.9 Definition of terms

1.9.1 Best practice - en.instagram.org defines best practice as a method or technique that has consistently shown results superior to those achieved with other means, and that is used as a benchmark. A best practice can evolve to become better as improvements are discovered. Best practice is used to describe the process of developing and following a standard way of doing things that multiple organizations can use.

1.9.2 Funding – www.businessdictionary.com defines funding as providing financial services to finance a need, program or project. The term funding is used when a firm fills the need for cash from its own internal reserves, and the term financing is used when the need is
filled from external or borrowed money meaning the grant of authority to an agency, department, or unity to incur monetary obligation and to pay for them. In this study the terms funding and financing are going to be used interchangeably.

1.9.3 Funding gap

According to [www.busiessdictionary.com](http://www.busiessdictionary.com) a funding gap is “a shortfall in capital needed to fund future operation or projects”. According to [www.wisegeek.com](http://www.wisegeek.com) a funding gap is the difference between the money required to begin or continue operations, and the money currently accessible.

**Gap analysis**- [www.investopedia.com](http://www.investopedia.com) defines gap analysis as the process through which a company compares its actual performance to its expected performance to determine whether it is meeting expectations and using its resources effectively.

1.9.4 Policy- [en.wikipedia.org](http://en.wikipedia.org) defines a policy as a principle or protocol to guide decisions and achieve rational outcomes. A policy is a statement of intent, and is implemented as a procedure or protocol. Policies are generally adopted by the Board of or senior governance body within an organization whereas procedures or protocols would be developed and adopted by senior executive officers.

1.9.5 Revenue- According to EC staff consolidated version (2009) revenue is the gross inflow of economic benefits during the period arising in the course of the ordinary activities of an entity when those inflows result in increases in equity, other than increases relating to contributions from equity participants.

**Expenditure**-[www.businessdictionary.com](http://www.businessdictionary.com) defines expenditure as the payment of cash or cash-equivalent for goods or services, or a charge against available funds in settlement of an obligation as evidenced by an invoice, receipt, voucher, or other such document.
1.10 **Summary**

This chapter was concerned with providing a concise introduction and summary of the research paper involved. It also looked at the background of study, statement of the problem, main research question, research objectives, research questions, limitation of the study, delimitation to the study, justification of the, definition of terms which form the basis of the following chapters.
CHAPTER 2

LITERATURE REVIEW

2.0 Introduction

In this chapter scholarly thoughts from academic sources about the study of funding gaps in the Ministry of Higher and Tertiary Education, Science and Technology Development particularly universities is going to be deeply looked into and its impact on expansion and infrastructural development. The State Universities funding policies that govern the deployment of funds on investments, implementation strategies and review of controls will be highlighted.

2.1. Ministry policy requirements and implementation

According to Moyo (2009) ‘there is no clear national vision and policy for higher education’. Shoko (2013) also says that education is no longer an integral component of the overall national development. The key policy concepts and tools such as quality assurance, research infrastructure support for employability and supra-national policies have been deliberately ignored in the education of Zimbabwe. The Report on the Technical and Vocational Education and Training Policy Review Framework (2005) says the technical and vocational policies over the years were difficult to implement due to lack of a sustainable funding policy. The reporter advances to say schools capital investment, purchase of consumables and maintenance of equipment are financed by the School Services Fund (SSF) due to lack of sustainable funding policy and the absence of a regulatory authority for refurbishment and replacement of infrastructure and equipment. The Country Analysis Report for Zimbabwe (2010) has evidence that economic problems analysed emanated from the poverty and lack of participatory policy formulation, incoherence and inadequate implementation of policies, as well as budgetary constraints are a result of lack of clear policies and interventions targeted.
According to SARUA (2009) resulting to lack of funding policy like other universities which were stated the Midlands State University faces infrastructure constraints that are inadequate funds for capital development, slow infrastructure development, inadequate teaching and learning space; inadequate funds for renovation of existing buildings, and shortage of student accommodation and also the lack of funding for quality assurance processes and these constraints have negatively affected the institution’s ability to achieve its goals and objectives. Altbach et al (2009) says countries in Europe have pursued foreign policy agendas focused on capacity building.

With these regards the researcher found out that the lack of a Higher and Tertiary Education, Science and Development funding policy have a negative impact on the development of capital projects. The resultant lack of a sustainable funding policy for the refurbishment and replacement of the state’s infrastructure and equipment has continued to diminish and some capital projects dilapidated, which means not much have been advocated for on the policies to develop state universities’ infrastructure through capital funding. However, the Midlands State University is using the Result Based Management (RBM) through the Result-Based Budgeting Program budget process as the implied policy followed to fund the public sector as well as other state universities (Budget Process).

2.1.1 Result-Based Budgeting

Besrest (2012) pointed out that the Result-Based Budgeting (RBB) is a component of Result-Based Management (RBM). The Midlands State University is relying on the RBB as an appropriate policy to get operational and capital grants from the Government according to the Midlands State University’s Budget Process. It explained that the RBB is implemented through a participative zero surplus budgeting system that runs for a twelve months period from January to December. According to Madhekeni (2012:123), the Result Based
Management (RBM) system “emphasizes value for money from usage of limited resources, move agencies away from input-driven incremental budgets towards results-driven performance budgets, from workload and activity-completion personnel performance towards results-oriented performance and, from activity and output-based monitoring to outcomes and impact evaluation”.

**Strengths of RBB**

The performance based contracting systems seek to buttress RBM in general and RBB in particular, these approaches have been practiced by government since 2005, migrating from line item budgeting to program based budgeting to improve efficiency and effectiveness of public expenditure linking budget to results to be delivered (2013 Budget final). These systems are deemed critical to assist government in conducting systematic program planning formulation and implementation to improve the government development initiatives (Madhekeni 2012). Arunaselam (2000), supported that the results based budgeting system as eminently suited for public expenditure management with limited resources, as it necessitates a focused and disciplined approach to overall fiscal efficient management, allocation of scarce resources to strategic development priorities and the efficient and effective use of public resources. And most importantly is its view as a prerequisite to ensure the institutionalisation of a public accountability system as vital in Zimbabwe as one of the developing country. According to the Midlands State University’s Budget Process financial issues operate under the Result Based Management (RBM) system policies are taking cognisance of relevant national objectives such as Zim-Asset and it is indifferent about the impact of capital projects funding. According to the Result-Based Budgeting Report to Albertans (2013) the process provides an opportunity to redirect funds to achieve higher priority outcomes and the document looked particularly at municipalities, support for
disabilities, health, enterprise, economic development and in education they focused on equitable, affordable access and quality of education. Mizutami (2002) argues that ‘Importing such initiatives into the international context requires a thorough review of the nature of international administrations which are different from those of national administrations’

**Weaknesses**

The Result-Based Management Module (2009) argues that the RBB has put many responsibilities to program managers who define priorities and evaluate activities taking cognisance of data collection methods that allow an analysis of past activities experience and anticipate changes in the impact of their programs. RBB need to be communicated across so that an average citizen can understand how it operates that is analysing the facilitation, making budgets decisions, managing agency processes and informing the public need to be evaluated (Vision for RBB in North Carolina State Government). According to the Framework for Result-Based Public Sector Management and Country Cases (2011) Results-Based Budgeting (RBB) systems ideally produce multiyear budgets, but in Cambodia revenue collection has been gradually increasing, but only one-fifth of resources to back up the budget still came from grants and actual expenditures exceeded the total revenues and grants, resulting in deficits that required domestic and foreign borrowings. Madhekeni (2012) says that if good governance is exercised in Zimbabwe the adoption of RBB would lead the improved funding opportunities and used as a demonstration of commitment towards accountability and people’s welfare. In support to this Special Meeting of the West Virginia Higher Education (2012) presented that grants appropriation s are very competitive the actual revenues received would vary from the approved budgeted figures. Actual capital expenditures may also vary significantly from budgets and the capital projects may be delayed because of the inadequate funds allocation. RBB Manual stated that not only
continuous supervision during its implementation but frequent reporting to senior management levels, committees and other interested parties for accountability issues. With Zimbabwe’s prevailing political, social and economic crisis it is incapable of effectively implementing RBM and RBB to get meaningful results (Madhekeni, 2012). Binnendijk (2001) in agreement to this said that under RBB says performance measurement have been emphasized by government agencies for external reporting only with little attention to internal performance reporting and management for internal decision making. Performances are measured by only one source of information and are limited to costs of materials capacity, timing and inflation (Curistine, 2010).

RECABASO (2011) tried to be indifferent saying that, although the RBM and RBB systems tries to embrace the issue of scarce resources being effectively allocated to projects to achieve results, the implementation of the programs is seemingly indicating that it requires more resources of which in their adoption in the developing countries like Zimbabwe, they are supposed to have a policy which first focus on how best they can accumulate limited resources in order to have a successful implementation. However, failure to have resources which meet the results planned has further widened many gaps in state universities funding but probes the strategic skills of management in state universities (Mapolisa and Tshabalala, 2013). This explains that the RBB system is not a failure in funding capital projects but requires adequate policies, manpower and resources to implement it so that results are physically in place says (Tandberg, 2008).

The researcher’s view on the above strength and weaknesses of RBB in the case of Zimbabwe’s state universities the lack of funding policies on capital projects and government freezing manpower posts led to weak projects monitoring process so that funding gaps could be minimised. Again relating the RBB system, for government to focus on results without the a quantifiable revenue or income base is seemingly meaningless as Zimbabwe’s economic
environment is not viable and conducive for this kind of program which is leading to funding gaps in capital projects in state universities as authorities budget for results of which inputs may not be adequate in a given period. This means that change process consumes time and resources, and again the system is complex and hardly understood that training of managers or ministers in public financial management is required. Since each government ministry is given an opportunity to budget prioritising their activities and the system gives allowance for funds to be redirected towards state priorities thereby depriving most public sectors in the RBB facilitation of their right to budget appropriations, a funding gap as the case at Midlands State University is created by so doing and budgeting becomes senseless. The impact of not accessing budgeted funds will be explored in this study.

2.1.2 Policies in other state universities

The Long-Range Facilities/ Infrastructure Master Planning policy, directs a Commission to review and approve master planning and program planning for all capital construction projects of institutions of higher education and directs that facilities master plans conforms to approved educational master plans. The policy stated that the Commission provides guidelines that describe what a long –range facilities master plan may include that is institutional data and the Facilities/Infrastructure plan giving data collected and analysis of the institution before planning infrastructure and facilities for the campus. Informal reviews by Commission of Higher Education (CHE) are coordinated by the institutional governing board and the commission in the final review of the strategic academic, facility and technology development that serves as a foundation of the plan. The final published document must have the following formal approval before becoming official the institution, Governing board and the Commission of Higher Education as stated in Colorado Approved Policy, Section III, Part D (2006:2)
Again it is stated that long-range plan must be developed as a flexible framework for campus growth that as enrolments grow or decline, academic programs change or become more comprehensive to serve new students’ needs, campus facility will inevitably change, meeting these changing circumstances. In at least every ten years the long-range plan for each campus must be re-examined and updated to keep it current.

Relating to the Colorado Approved Policy, S (2), Part (b), (2005:1) on Budget Instructions, “the Commission’s main goals are to make efficient use of state resources provided to higher education; to implement legislative policy for higher education, and to work collaboratively with the governing boards in implementing its fiscal responsibilities.”

Ermasova (2013) pointed out that there is a group of scholars who suggest that budgeting is incremental and not comprehensive. The best that the annual budgets can do in terms of preparing for future economic downturns is to accumulate annual surpluses that would be consumed when annual budgets are not sufficient.

In this case the surpluses could help to have capital projects’ steady developments in like resorting to prefabricated structures which are for the short term period. The funds used to put a prefabricated structure will have to be used in development of part of a permanent structure.
thereby saving cost through not repeating to build the same structure again as global quality and competitive development is a concern.

2.2 Factors contributing to Funding gap

2.2.1 Political Environment

Tandberg (2008) explained that state political systems affect the proportion of state spending that is directed toward public higher education and internal political factors involve budgetary powers of the governor (or minister of finance), party of the governor and party of the legislature, legislative professional, unified institutional control, and public higher education governance structures and the external political factors includes electoral competition, public opinion, state political culture, interest groups, and voter turnout have an effect on the funding higher education. Political influence had caused a difficulty in obtaining the relevant information from government departments (Madhekeni, 2012). Hou (2006) further said that “politically, the [annual] budget was a governance tool to promote democracy and curb corruption; managerially, it was intended to coordinate the legislative and executive branches; and technically, it aimed to improve administrative efficiency.”

Political mixed messages from Government is a major hindrance in efforts to bring and lure meaningful investment to Zimbabwe (Parliament of Zimbabwe, 2012). In support of this Zhou (2012) says “the political climate is disabling concerted efforts directed at resuscitating the economy and strengthening the management of the fiscal sector”. According to TCRP Report (2009) leadership is a key role in arriving at final funding proposals and investment plans, advocating those proposals actively in the community, and ministers responding to criticisms that are inevitably raised when new public revenue-raising initiatives or specific projects are proposed can actively stand for their ministries.
The researcher sees politics as embracing both favourable and unfavourable effects to the funding of Midlands State University capital projects.

2.2.2 Rapid increase in the demand for higher education

According to funding strategies.pptx (accessed: 29/04/14; 15:35) some of the major factors which lead to funding gap on state universities are the rapid increase in the demand for higher education by the end of the twentieth century in Zimbabwe and world-wide and was the time when the country’s economy started diminishing leading to a background of a limited and dwindling funding. According Cheung (no date) developing countries, expanded their higher education sectors rapidly in the 80’s and 90’s. Kramarenko et al (2010) the legacy of underinvestment in Zimbabwe is acting as a major constraint on the country’s growth potential. In the World Economic Forum’s most recent Global Competitiveness Report, inadequate supply of infrastructure was the third most frequently cited problem with doing business in Zimbabwe after access to finance and political instability.

In the researcher’s understanding, as stated in the background of the problem the Registration Statistics portrayed that Midlands State University’s enrolment rose from 12 580 students in 2011 to 20 243 students in 2014 which gives a 38% enrolment increase. The increase in enrolment would have led to increases a number of facilities also to accommodate the percentage increase in the capacity of a university if government appropriations cannot cater for the increase then a funding gap was created as a conducive learning and living environment could not be achieved in the years.
2.2.3 Economic factors (Fiscal capacity)

Public higher education institutions depended upon the fiscus for current and recurrent expenditures as their source of funds. (fundingstrategies.pptx. accessed: 29/04/14; 15:35). The World Bank (2010) says that the national budget initial allocation decisions are made by the Ministry of Finance in light of available government revenues, political priorities, and the amounts provided in the previous year. Ross (2014) says that the fiscal framework defines how a country chooses priorities and objectives to formulate its fiscal policy which comprise of indicators, rules, and institutions in support of a particular policy objective. According to Chan et al (2009) the fiscal and macroeconomic conditions are potentially restricting use of particular financing vehicles because of their budgetary consequences. Mikesell (2011) indicated that the effect of recession on state fiscal capacity over time has been increasingly negative, indicating that the state revenue systems remain vulnerable and inflexible under fiscal stress. International experience showed that resource revenues can be a curse increasing vulnerability of the economy to external shocks reducing the capacity tax to non-resource sector contributing to weak political and economic governance (Segura-Ubiergo et al, 2012). The writers continued to elaborate that the fiscal challenge would be to leverage natural resources revenues without compromising the stability in a complex fiscal policy formulation and this would require a political will to use natural wealth well, transparency to ensure accountability, good governance and fiscal instruments that prevent pitfalls.

The researcher’s opinions on the economic factors that affect capital funding gap at Midlands State University are being over-dependent on budget appropriations while the government would restrict the allocation of funds and has to focus on priorities as it will be dealing with limited revenue resources.
2.2.4 Rigidities and inefficiency in public sector (bureaucracy)

Curistine, (2010) says if the system has too many restrictions and managers do not have enough freedom to improve performance result in inefficiency. According to the Industrial Development Policy (2012-2016) says that in Zimbabwe there is “shortage of development finance and inefficiency of enablers”. According to the Public Finance Management Act (Chapter22:19) s.30 the treasury can withhold from a ministry any remaining funds appropriated to a specific function and allocate it to another ministry and it is silent about approved budget amounts but not appropriated to a ministry, reporting unit, constitutional entity public entities in any period. Some governments gave autonomy to state universities so as to solve the problems of inflexibility and inefficiency and an example of China was given where the line budget was replaced by block grants and institutions can decide how to spend the money. The government only exercised the audit and supervisory functions to ensure that they were accountable for the appropriate utilisation of public resources (Cheung). Results-based budgeting (2008) says internal auditing provide independent assessments to department management; ensure operations and programs comply with applicable laws and regulations; prevent inefficiency, fraud, and abuse; analyse exposure to risk and determine appropriate countermeasures; and ensure accounting, administrative, and other information systems have the proper controls.

The rigidity and inefficiency in public sector makes it difficult for the management of Midlands State University independently put into effect their own strategic ways to fund capital investments so that the impact of funding gap can be reduced.
2.3 Funding strategies to mitigate funding gaps

2.3.1 Sources of funding

As the funding for universities’ capital projects by government remain tight or inadequate, various appropriate alternative approaches can be adopted (Alemna, 1994). The options for creating fiscal space that could be implemented by Zimbabwe government are through mobilizing additional revenues through strengthening revenue administration and eliminating tax expenditures, restraining the cost of the country’s relatively expensive public administration; in particular wages, resolving external payments arrears with the support of the international community and gaining access to fresh financing and additional donor support (Kramarenko et al, 2010). According to the National Action Plan for Zimbabwe: Education for all (2005), Universities funding comes from church organisations, central government, local authorities, individuals, private companies, committees and trustees and Non-Governmental Organisations (NGOs). Zimbabwe: NAP, EFA (2005) further explained that “there are also several companies, organisations and cooperating partners that offer scholarships and contribute to the provision of learning materials and institutional development”. In support to this like any other public entity the Zimbabwe Institute Local Government Paper (2005), says for it to provide various social and infrastructural services access grants from central government for the general administration costs,, loans received under the Public Sector Investment Programme (PSIP) for infrastructure development, revenue received from any activity engaged in by council, interest earned on moneys invested in any investment instrument as provided for in the Act and may also engage in any commercial, industrial, agricultural or any other activity for the purpose of raising revenue.

The newzimbabwe.com accessed 29/04/14; 16:00 says that the development of financing schemes involve various stakeholders and includes the Ministries of Education, Finance and
Local Government, responsible authorities, institutions of higher learning, experts, teachers’ unions, UN agencies such as UNESCO, UNICEF and UNDP, donors, civil society organisations and others. The sources of funds can be categorised into public funds and private funds, the private sector, and the public sector provides the largest share of funding for infrastructure which comes from current revenues or public borrowing (Bond et al, 2012).

The following are strategies aim at eradicating or filling the gaps that come up when finance needed falls short of what is available being looked at in detail.

**2.3.2 Public-Private Partnerships (PPPs)**

According to Zimbabwe Council of Higher Education (ZIMCHE) in a presentation on funding strategies Public-Private Partnerships (PPPs) performs service delivery on administrative function and assumes associated risks in return for a predetermined fee. PPPs are “arrangements typically medium to long term, between the public and private sectors whereby some of the services that fall under the responsibilities of the public sector are provided by the private sector, with clear agreement on shared objectives for delivery of public infrastructure and/ or public services” (http://ppp.worldbank.org accessed 20/09/14; 10:06) or Public-private partnerships (PPP), are where the government contracts a private partner to variously finance, design, build and operate infrastructure assets for a fixed period and transfer the fixed asset the maturity of the returns of the investment. (Miller et al 2009). Istrate and Puentes (2011) say that PPPs are a financing tool and not a new source of funding that is project funding can be derived from the public entity directly from the users of the facility, who will pay the private party for pay services in the PPP project in the long run relieving some of the pressure on the annual budget. According to Zhou and Chilunjika (2013) an example of PPPs’ administration is the toll systems in the development and maintenance of the road infrastructure. They said PPPs involve direct revenue streams which
help to better match the benefits and costs of the use of a facility and shift the funding burden from the government to the users. In addition Zhou and Chilunjika (2013) says if the public entity pays periodic disbursements to the private party for post-construction services (i.e. availability payments); the public organization gets a piece of infrastructure, while paying for it over time, relieving some of the pressure on the annual budget. “PPPs should be a tool for better risk and cost allocation, and not merely a way to fill in budget gaps”.

Miller et al (2009) opposed this saying as PPPs assist in improving productive efficiency but there is no guarantee that the investments are optimal and the off-budget treatment of future funding obligations related to some PPPs might reduce the scrutiny applied to the investment. The authors further disagreed saying that the global financial crisis, governments are looking to infrastructure investment as methods of stimulating the economy whilst financing options are also much constrained by the economic crisis (Miller et al 2009). On the other hand Istrate and Puentes (2011) oppose their first view saying that PPPs is a better cost and risk allocating tool but not a way to fill budget gaps.

This reviews that PPPs act as a method of easing funding gaps to a certain level but other revenue strategies need to be explored.

2.3.3 Public Sector Investment Program (PSIP)

The 2014 Budget Statement says that PSIP is a public sector revenue source that complements budgetary resources and is administered by government to relevant agencies as infrastructural bonds to finance prioritised projects under Zim-Asset. The Zimbabwe Institute Local Government Paper (2005) depicted that the local government infrastructure is financed by central government through the Public Sector Investment Program (PSIP) that provides loans at below market rates, allowing government to control and account for local government capital as a policy. The PSIP 2014 (2013) added on saying that PSIP is a
government capital expenditure component focussed on project and projects that would achieve sustainable development in the medium and long term. Bedi and Jong (2010) found that the importance of PSIP is that social spending increased rapidly in Guyana a country under HIPC and allowed government to increase the level and quality of expenditure.

2.3.4 Joint ventures

According to funding strategies.pptx other strategies are through making joint ventures with willing partners in academic ventures. Lam (2009) described venture capital funds as are more visible, command more resources and tend to more organised than business angels. Freear et al (2002) have described business angels as informal venture capitalists or investors whose funds are less visible, difficult to find and they invest much smaller amounts than venture capital funds.

2.3.5 Fundraising

According to Davis (2013), educational fundraising is the activity of gaining financial support for the higher education sector from private donations. Ascher et al (2004) explained that capital campaigns to move large facility project forward enabled fund raising strategies to combine private funds, public grants and financing mechanisms.

2.3.6 Donor funding

“Donors can play a catalytic role by providing technical assistance to develop projects and credit enhancement to attract commercial financing” (Bond; 2012).

Kramarenko et al (2010:54) also says “in many key social sectors in Zimbabwe, donors finance some capital expenditures directly as part of humanitarian assistance. In 2009, donors financed US$156 million (3 percent of GDP) in off-budget capital expenditures, mainly directed towards the health and education sectors”. Potential for Donor Support Zimbabwe
could enjoy significant additional budgetary resources once policies have been strengthened and external payments arrears have been resolved with the support of the international community. This would create “upside” potential, generating further fiscal space for growth enhancing capital expenditure. The magnitude and timing of donor financing of capital expenditures is uncertain. Alemna (1994) says the attraction of external and internal donors which could be organisations, institutions or individuals to provide assistance in any form such as funding, materials and buildings to contribute to development of universities.

The Report on the Technical and Vocational Education and Training Policy Review Framework (2005) donors complemented national efforts in financing colleges through building and equipping them despite of the lack of a refurbishment and replacement policy. This has caused the poor and inadequate infrastructure and equipment in tertiary institutions as the enrolment in these institutions is rapidly increasing. SARUA (2009) supported this saying that as regional collaboration challenged ICT infrastructure donors facilitated and provided funding whilst government also facilitated other funding.

2.3.7 Advantages of private funding in capital projects

The benefits of private funding in state universities capital projects are that they public funding agencies support willing private donors’ ideas for investment; with private money in a project the university can include items that otherwise might have been eschewed: private sponsors contribute to the project with a keen interest in its successful outcome; private money can be used to provide enhancement in the establishment a fund for maintenance of particular areas, and for particular services or programs; private investors have potential of bringing in gifts for endowment, These funds can be invested in future capital projects (Nicely, 2002). According to Chan et al (2009) says that approaches used to finance public infrastructure can improve efficiency and lower the life-time project cost when management
has the capacity to manage project risk and whether negotiations are cost saving. It is said that the potential for governments to shift risk onto private partners may be limited, and any non-diversifiable risk assumed by the private sector will be reflected in their required rates of return.

2.4 Challenges that can be encountered in implementing revenue strategies

2.4.1 Financial sustainability (fiscal and macroeconomic conditions)

SARUA (2009) viewed the main challenges to financial sustainability on the implementation of revenue strategies are hyperinflation, regulation fees by the state shortage of goods and unavailability of credit terms by suppliers. Fiscal and macroeconomic conditions may also be potentially restricting the use of particular financing vehicles because of their budgetary consequences, institutional arrangements through defining the legal and regulatory framework as well as the intergovernmental relationship within which public infrastructure assets are operated and financed together with the perceptions of the role of government and voters expectations for the involvement of government in delivering specific services and managing the economy (Miller, 2009). Kramarenko et al (2010) pointed out that due to the declines in capital investment and nonwage current expenses affects the quality of education thereby constraining growth for a long term. Grant et al (2011) explained the collecting of data and connecting performance to funding decisions are the other challenges in implementing revenue strategies, there is a need to find ways to compare public systems and to collect accurate and relevant data from their public capital projects funds providers.

2.4.2 Availability of resources (raw materials)
Resources need to be readily available for the smooth implementation of a capital project and this is to ensure that adequate funding and resources are well aligned to the implementation of the project (Nguyen et al, 2004).

2.4.3 Infrastructure characteristics (construction projects’ complexity)

The other challenges of implementing revenue strategies according to Miller (2009) are infrastructure characteristics that affect user profiles and revenue-raising capacities of particular assets. According to Meyer (2002) says that construction projects’ complexity, uncertainty and dynamics are difficult for even experienced managers and when the risk management has been done to ensure that the project is completed in time delays may still be encountered.

2.4.4 Competence, commitment and communication

The other challenges on implementing revenue strategies on capital projects discovered by Nguyen et al (2004) were competence, commitment and communication applicable to this study and they were explained as the availability of competent technological equipment, the availability of committed personnel towards the project and there is need to establish intensive communication. Nguyen (2004) went on to say a project is acknowledged as successful when it is completed on time, within the budget in accordance to specifications and to stakeholders’ satisfaction.

2.4.4.1 Competence

The component includes the use of up to date technological equipment, proper emphasis on past experience, multi-disciplinary or competent project team and awarding bids to the right designer or contractor. Developing countries still use obsolete technology; the possession of
modern technology is a critical factor of project success. In developing countries there is a serious challenge of failure to adopt and adapt to established best practices working in other countries, although public sector clients and some donor agencies support construction technology transfer, it faces several problems (Ngowi, 2002). A project team must consist of specialists, professionals and experts able to make interactive decisions based on seeing the picture as a whole and execute them later on with great pace (Laufer et al 1996)

2.4.4.2 Commitment

According to Clarke (1999), the commitment component grouping is made up of commitment to the project, clear objectives and scope and top management support. People should be informed about the project direction, expected outcome and their roles. Clear responsibility and accountability are necessary to keep away ‘counter-productive effects of individualism’. Top management support demonstrates how strong the commitment to the project is. Motivation is pre-requisite to ensure comfortable working environment.

2.4.3.3 Communication

Intensive communication is a central factor in leading and integrating people and taking decisions to create a successful project (Laufer et al 1996). There is need to establish effective information systems for construction project so that every right and concerned person can access and share ideas. Frequent progress meetings are inevitable, corrective and preventive measures are then timely applied to ensure project performance success. A supportive and understanding community is necessary for the smooth implementation of capital projects when information is shared adequately (Nguyen et al, 2004).

2.5 Best practice for funding universities capital projects
Brady (2006) also defined ‘best value’ as the most favourable value from the service procured which includes purchasing a service that delivers optimal outcome, and is cost effective, after taking into account the non-financial attributes which are quality, impact on the community and the environment, design integrity, innovation, whole-life costs such as maintenance, training and development opportunities, health and safety practices and capital invested. Ermasova (2013) says the knowledge about the best practice in capital planning and budgeting contributes to greater efficiency in capital spending in states. The availability and quality of services to the public provided by infrastructure are critical factors in improving economic growth. The USA department of the Treasury and the Council of Economic Advisors (2010) explained that a well-designed infrastructure investment improves the economic growth, productivity and land value, while also providing significant benefits to the economic development, energy efficiency, public health and manufacturing. Ermasova (2013) emphasised that former researches suggest that during economic decline effective capital budget process and planning must be incremental, the efficiency of a multi-year budget process advocates countercyclical fiscal policies, studies propose that the use of an emergent budget process during economic downturn, must be recommended as the optimal strategy and the midpoint on the emergent-to-planned strategy continuum. Research proposes that economic decline as the trigger for innovations (Ermasova; 2013).

Hou (2006) called for a countercyclical policy approach in which budgeting for stability involves saving for downturns in the economy’s business cycles that is saving during times of boom to meet expenditure during economic recession. Countercyclical policy approach involves taking a multiyear approach to budgeting rather than annual budgeting approach which is suitable for spending controls and day-to-day management operations and is not adequate on facing economic distress. According to New Zealand Construction Industry Council (NZCIC) (2006), the principles of best practice in procurement in construction in
New Zealand internationally recognised factors other than price minimisation of the procurement process in obtaining ‘best value’ from procurement process and this is particularly so in public sector procurement. This had made changes to funding criteria in public works to value based criteria and processes being used. Hou (2006) says that annual budgets politically promotes democracy and curb corruption, managerially coordinates to the legislative and executive branches and technically aims at improving administrative efficiency. Curristine (2005) says the performance of government can be improved through putting focus on results in policy advice, central and departmental management processes, and parliamentary and public accountability and to identify the relative priority of these in any country. “The combined experiences of Organisation for Economic Cooperation and Development (OECD) countries highlighted the importance of taking a long-term approach and having realistic expectations about the capacity of performance management and budgeting to improve performance and accountability. A long-term approach and persistence are needed to achieve the necessary technical and behavioural changes that this lever requires” (OECD, 2005)

Kovnar and Lusk (2010) suggested a sustainability (fiscal status) budget model that combines budgeting and planning process to achieve inflows relative to outflows that ensure long-term budget balance. The expected value projection for a project or funding is compared to a breakeven range related to variability and balancing inflows/revenue and outflows/costs that is analogous to planning for budgetary responses in the event of budget shortfalls brought by economic downturns. Four economic components were identified by Pew Centre on States (2009) for establishing an effective long term budget which are estimate revenues and expenditures into the future; considering the long term impact on tax and expenditure decisions; managing long term liabilities and maintaining a reasonable level of debt. According to Ermasova (2013) during and after the great depression in USA states explored
several directions the fiscal stress through budgeting. They improved the budget making through a special computer database; recognition of performance links and economic stimulus; some states increased the duration of their capital budget from a two year period to three or four years; great emphasis was on the prioritisation and selection process; they emphasised on improved governance through greater fiscal transparency and enhanced framework of financial and program accountability as well as collaborative initiatives and teamwork; improved coordination with the operating budget; and additional emphasis on the planning and execution of preventive maintenance. These changes emphasised on increasing the planning period, using the long term or medium term planning, developing formal mechanisms to set aside funds for preserving existing facilities, using specialised computer programs, to increase automation of the process, increased collaboration between agencies and linking capital planning decisions to state wide performance goal and strategic plans.

Therefore the central budget office coordinate the submission of capital projects, develops a report and determines the effect on the additional capital requests on the state budget and debt capacity. The completed plan is forwarded for the development of recommended appropriations to the legislature, which makes the final on which project to be funded. The central budget office develops a Capital Projects Database (CPD) which is state wide web-based, secure application that will be used to capture agency capital project information.

2.6 Summary

This chapter stressed on the literature review particularly the findings of other are searchers on this study’s objectives. The literature revealed that there is a lot to be done on Higher Education capital funding that scholars pointed out that has not been effected in this country but put on trial in developed countries. Therefore in developing countries with unstable
economic condition further research still need to be instituted filling the gaps of funding on capital projects and also looking into the quality of the investments. The following chapter dwells on the research methodology to this study.
CHAPTER 3

RESEARCH METHODOLOGY

3.0 Introduction

This chapter focuses on research methodology applied on the investigation of the funding gap and the strategies on how the gaps can be filled. It outlines the research design, sample population and research instruments to be used. The researcher carried out the study using qualitative research design collecting data through interviews and questionnaires and record data graphically or tabulated it.

3.1 Research Design

According to Sekaran and Bougie (2009) research design is the way through which data can be gathered and analysed to arrive at a solution. Fischer et al (2008) also described it as the methods and procedures which include these elements: methodology, sample type, data collection procedures, frequency and data analysis types and how the design minimises validity threats. Gray (2011:132) says “a research design describe the purpose of the study and types of questions addressed, the techniques to be employed in collecting data, approaches used to collect data and how data is analysed by the researcher”. To ensure that adequate procedures are valid accurate and objective and answering the research questions the researcher is going to carry out a descriptive research design under a mixed research method and embracing a case study approach.

Mixed research method is more of qualitative and quantitative in nature. It employs strategies of inquiry that involve collecting data either simultaneously or sequentially to best understand research problems data collection also involves gathering both numeric information as well as
text information such as interviews so that the final database represents both quantitative and qualitative information Creswell (2003).

Qualitative method seeks the researcher to understand the context and setting of participants through visiting the context and gathering information personally. The research findings were interpreted and shaped by the researcher’s experience and backgrounds and the meanings socially from the human community. The qualitative research process is largely inductive, with the inquirer generating meaning from the data collected in the field (Creswell, 2003). The appropriateness of this research method to this study is that it typically involved small samples that you study in-depth allowing a lot to be gathered from a few people, and qualitative samples are purposive which means they are chosen for a particular purpose Gallardo (2009). Quantitative research method invigorates a cause and effect thinking, reduction to specific variables and hypotheses and questions, use of measurement and observation, and the test of theories, and also employ strategies of inquiry such as experiments and surveys, and collects data on predetermined instruments that yield statistical data Creswell (2003).

In this study mixed research method was valid such that the combination neutralised the limitations in quantitative and qualitative research methods, the method served the purpose of advocating change in marginalised groups and in this case advocating for capital project funding policies. The mixed method considered the full range of possibilities for data collection in any study that is it allowed the use of both open-ended and closed-ended questions.

3.1.1 Case study

Case study analysis was the approach used in this research and it is both descriptive and explanatory in nature. The study was carried out through a case study because observations
were to be carried out in a real world setting and the objective being submerged oneself into the situation and gaining a holistic understanding of the phenomena in its natural setting (Moody, 2002). Looking at this note the study was carried out at Midlands State University, the researcher had a complete grasp of how capital funding gap emerged and how the impacts are going to be addressed. A case study may use quantitative or qualitative methods and many case study designs use a mix of these methods to collect and analyse data such as interviews, observation, documentary analysis and questionnaires (Saunders, 2012). Case study research design served best on finding the impact of funding gap in state universities and also qualitative data analysis can be used together with quantitative data analysis where information gathered from interviews and questionnaires can be tabled and portrayed graphically andcharted as agreed by Sekaran and Bougie (2009).

Sekaran and Bougie (2009) further elaborated that ‘case studies involve in-depth, contextual analysis of matters relating to similar situation in other organisations and is a problem solving technique which is qualitative in nature useful to current problems based to past problem solving experiences. Support was given that case study approach is the approach in which the researcher explores in depth a program, an event, an activity, a process, or one or more individuals whilst the case or cases are limited to time on which the researcher is going to collect detailed information using a variety of data collection methods (Creswell 2003).

This approach was adopted due to its advantages outlined by Saunders et al (2012) which are that a case study explores a research topic or phenomenon within its context or within a number of real life context more easily. The case study approach is able to generate answers to the question ‘why’, ‘what’ and ‘how’.

3.1.2 Descriptive Research Design

The research design’s main objective is to conclusively describe a situation and usually
market characteristics and it provide fact upon which decisions can be drawn (Chisaka, 2001). This research design was used because it was suitably applicable when information was collected from employees at different levels and the descriptive survey technique assist in the description of respondents’ attitudes and opinions in the case study. According to this study descriptive survey technique it was cumbersome to organise data and it was also difficult to link the responses given as in some cases it was broadly not related.

3.2 Study Population

The population of this study was the entire staff in the department of accounting and finance. According to (Cooper; 2009) population refers to the total set of units in which the investigator sees accessible and to involve in the study. The population is the pool from which the researcher sampled the staff (target population) to interview and to respond to questionnaires to achieve the study objectives.

3.3 Sampling

According to Sekaran and Bougie (2009:263) “A sample is a subset of the population” and sampling is the process of selecting items from the population so that the sample characteristics can be generalised to the population and it involves both design choice and sample size decisions.

3.3.1 Sampling method

According to Sekaran and Bougie (2009:263) there are two major types of sampling design: probability and non-probability sampling. The study dwelled on the non-probability sampling method and a judgemental sampling technique was done. Saunders et al (2003) described judgmental sampling as a judgmental technique where an accessible target sample members to be strictly chosen in the study to meet a predetermined criterion on the basis that the
chosen individuals to provide the information required. Respondents were selected from the Planning Department with the knowledge of capital budgeting funding gap. This technique is cost and time saving even though it is susceptible to being bias as it does not represent the whole population but helped to collect relevant information on funding gap.

### 3.3.2 Target population and Sample size

The sample size is the actual number of objects as a sample to represent the population characteristics. The stratified random sampling was used because it is “a probability sampling design that divides the population into meaningful, non-overlapping subsets, and then randomly chooses the subjects from each subset” (Sekaran and Bougie 2009:446). According to Cooper and Schindler (2011) a stratified sampling is the segregation of population into several mutually exclusive sub population or strata. The sampling method was chosen because the population under the study are heterogeneous. The stratified random sampling also increases statistical efficiency since data is collected from various strata through the administration of the questionnaires and interviews.

**Table 2.1 Target population and Sample size**

<table>
<thead>
<tr>
<th></th>
<th>Population</th>
<th>Sample size</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Top management</td>
<td>3</td>
<td>3</td>
<td>100</td>
</tr>
<tr>
<td>Middle management</td>
<td>5</td>
<td>5</td>
<td>100</td>
</tr>
<tr>
<td>Other staff</td>
<td>10</td>
<td>7</td>
<td>80</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>18</td>
<td>15</td>
<td><strong>83</strong></td>
</tr>
</tbody>
</table>

The sample size on Table 2.1 is divided into top management, middle management other staff that are operational staff in the Accounting and Finance department in the Planning Section who are involved in budgeting for capital projects, receive appropriations for capital projects.
from the National Budget and also do the variance analysis to find funding gaps. The other part of the sample are employees in the works department who are in the operational field building capital structures and employees in the Non-current Assets department who assess building progress ascertain value of non-current asset. The 83%, \([(15/18)*100\%]\) is the targeted sample population. According to Saunders (2011), the minimum sample size is 30% that fully represent the entire population.

3.4 Methods of data collection

3.4.1 Sources of data

Data was obtained from primary and secondary sources. Data can be obtained from primary and secondary sources, where primary data refers to first-hand information obtained by the researcher on the variables of interest for the specific purpose of the study such as information from individuals, focus groups, internet administered questionnaires, videoconferencing and secondary data is information obtained from sources that already exist which are books and periodicals, company records or archives, government publications, industry analysis offered by the media, websites and the internet. (Sekaran and Bougie 2009)

3.4.2 Primary Data

Perreault and McCarthy (2009) says primary data is data which has not been organized, analyzed or processed by any statistical method which has been captured for the first time, right from the point of origin for a specific purpose. It also refers to primary data as first-hand information obtained by the researcher on the variables of interest for the specific purpose of the study such as information from individuals, focus groups, internet administered questionnaires, videoconferencing (Sekaran and Bougie, 2009).
The advantages of primary data to the study were that it gave specific results to the research objectives and the respondents provided information that was intended to solve the immediate problem. The data was very current and also very relevant to the research. On the other hand, the collection of primary data was time consuming in terms of the administration of questionnaires and interviews as some top management needed appointments to meet them. It is also an expensive data collection method as questionnaires are printed.

3.4.3 Secondary Data

According to Saunders et al (2012) secondary data is data that have already been collected for some other purpose and this data can be in form of payroll details, letters, minutes of meetings and accounts. Kumar (2005) describes secondary data is data that has been collected, readily available and already in different sources. Unlike primary data, secondary data not collected the respondents to interviews or questionnaires but from earlier researchers, archived records in institutions. Secondary data is information obtained from sources that already exist which are books and periodicals, company records or archives, government publications, industry analysis offered by the media, websites and the internet (Sekaran and Bougie, 2009).

The main advantages of secondary data were that it is cost and time saving and the disadvantage is the data available may not suit well to the needs of the researcher as the data had been collected for different purpose to the earlier researchers (Zikmund et al., 2010).
3.5 Data collection instruments

3.5.1 Questionnaire

Sekaran and Bougie (2009:197) defined a questionnaire as a “pre-formulated written set of questions to which respondents record their answers, usually within rather closely defined alternatives”. Questionnaires were an efficient data collection mechanism whereby formulated written set of questions to which respondents record their answers, usually within rather closely defined alternatives. Questionnaires were an efficient data collection mechanism when the researcher knew what is exactly required and how to measure the variables of interest. Questionnaires can be administered personally, mailed to respondents, or electronically distributed”. Questionnaires were a fast means of data collection and a respondent could answer it during spare time, it enforced uniformity and consistence of the same questions asked from different respondents, they are cheaper and provide wide population coverage. Veal (2008) noted that some respondents exaggerate and understate answers to some questions. The other demerits of questionnaires are that they are likely to be ignored and thrown away, some questions may not be answered, complex language may be used that is difficult for respondents to give relevant answers or may fail to provide an answer, and questionnaires may be biased that respondents may give answer they believe will please the researcher (Veal 2008). According to Veal (2008) the validity of questionnaire based data is the extent to which the questions accurately reflect is a source of concern. In this study open and closed ended questions were administered to comply with the mixed research method employed.
3.5.2 Interview

This is a data collection method which include face-to-face interviews, telephone interviews, computer assisted interviews and interviews through the electronic media. Interviews are flexible in terms of adapting, adopting and changing the question as the researcher proceeds with the interviews (Sekaran and Bougie 2009). According to Gray (2010:269) “An interview is a conversation between people in which one person has a role of a researcher” and usually the interviewer would have well formulated questions on hand. Interviews provide the researcher with valid and reliable information relevant for the research. Face-to-face interviews were administered for the purpose of this research at the institution the study is being conducted. The merits of using face to face interviews are that they have high response rate, provide in-depth information and can gather more information from verbal cues. Interviews can be time consuming, can provide non-standard responses, geographical limitations and sometimes interviewees feel intimidated hence can give biased information. Time to meet the respondents was set with five members of the management and any other two members of staff to avoid missing the respondents.

The interview questions were consistent with research objectives and research questions for the interview to be effective. The researcher used structured questions and intervened by unstructured and informal conversations. Saunders et al (2012) provides a topology of interviews taking into account the degree of formality; structured interviews, semi-structured interviews and unstructured or in-depths interviews. Structured interviews with open ended questions were favoured for the study as that ensures conformity to research objectives and affords an interviewee opportunity to provide as much detail as is possible. The researcher also considered time constraints in coming up with structured interviews therefore open-ended questions were administered (Saunders et al, 2012).
3.5.3 Likert Scale

The researcher also used the Likert scale. According to Sekaran and Bougie (2009) is a design which examines how strongly subjects agree or disagree to statements on a five-point scale as follows:

<table>
<thead>
<tr>
<th>Item</th>
<th>Strongly agree</th>
<th>Agree</th>
<th>Uncertain</th>
<th>Disagree</th>
<th>Strongly disagree</th>
</tr>
</thead>
<tbody>
<tr>
<td>Points</td>
<td>5</td>
<td>4</td>
<td>3</td>
<td>2</td>
<td>1</td>
</tr>
</tbody>
</table>

3.6 Data validity

Validity is defined as the extent to which an instrument measures what it purports to measure. It also relates to the extent to which research results accurately represent the collected data (internal validity) and can be generalised or transferred to other contexts or settings (external validity) (Sekaran and Bougie, 2009). This would mean that the research findings would be relied on as faithfully representing the economic and business phenomena as the research instruments yielded accurate and consistent results under (Leedy and Ormrod, 2010).

3.7 Data reliability

Davies (2011) says that reliability of data is the degree of consistence that is demonstrated by the procedure employed in a study to give reliable estimates. Reliability in quantitative data analysis includes category and inter-judge reliability, whereby categories that are defined in a very broad manner will lead to high category reliability and oversimplified categories reduces the relevance of the research findings. Sekaran and Bougie (2009:384) inter-judge reliability is “defined as a degree of consistency between coders processing the same data” and a common measure of this is the percentage of coding arrangements out of the total number of coders for example agreement rates at or above 80% are to be considered satisfactory.
3.8 Data analysis

Data from primary and secondary sources that is information from the questionnaires, interviews together with Midlands State University enrolment residence statistics and budget estimates for capital projects were analysed so that conclusions would be drawn about the research study qualitatively and quantitatively. The mode was the measure of central tendency that was used for the analysis.

3.8.1 Qualitative data

According to Sekaran and Bougie (2009:444) qualitative data is “Data that are not immediately quantifiable unless they are coded and categorised in some way”. Examples are interview notes; transcripts of focus groups or of video recordings, answers to open ended questions and news articles and these come from primary and secondary sources. According to Saunders et al (2012) the meanings from qualitative research are principally from words and not numbers. This analysis is said to be not easy. According to Sekaran and Bougie (2009) explained that qualitative data analysis can be done in three steps which are data reduction, data display and the drawing of conclusions. Data reduction is referred to as the process of selecting, coding and categorising data, and data display is referred to as the ways of presenting data such as graphs, charts, selection of quotes that may help the reader to understand the data. In this study qualitative data is going to be collected, presented and conclusions are going to be considered analysis of the information (Miles and Huberman, 1994). In this study primary data from questionnaires and interviews was sorted and then presented in table and graphs.

3.8.2 Quantitative data
Saunders et al (2012) says that business and management research undertaken usually involve some numerical data that quantified to help in answering the research questions so as to achieve the research objectives. Numerical data collected that the researcher would use in measuring responses from questionnaires are called quantitative data and the characteristic of quantitative data which tends to be its advantage is that it is scientific and can be verified thus providing credibility. This data was analysed using statistical mode.

3.9 Summary

A structured process of conducting research defines research methodology. This includes research design, data gathering and data analysis.
CHAPTER 4

DATA PRESENTATION AND ANALYSIS OF FINDINGS

4.0 Introduction

This topic transpires into the presentation and the analysis of data gathered at Midlands State University from questionnaires and interview notes on the impact capital funding gap. Findings were presented in different forms either in tables and graphs.

4.1 Response rate

Questionnaires were issued to the targeted population sample of fifteen respondents, the administration of which and the analysis of data depended on the following response rate as tabled below.

Table 4.1 Questionnaire response rate

<table>
<thead>
<tr>
<th>Questionnaires Issued</th>
<th>Questionnaires returned</th>
<th>Questionnaires completed</th>
<th>Response rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>15</td>
<td>15</td>
<td>15</td>
<td>100%</td>
</tr>
</tbody>
</table>

The 15/15 (100%) responses was achieved through a committed follow up as some respondents did not have time to respond to the questions due to pressure of work. This response rate of fifteen questionnaires issued, completed and returned assisted in coming up with the best study conclusions since the data was valid and reliable. Five interviews were administered which gave some relevant data about the study which could not be questioned in questionnaires. The data from the questionnaires and interviews were analyzed and the following information was extracted.
4.2 Analysis of questionnaire responses

Question 1: Does your institution have a funding policy for capital projects?

Table 4.2 showing whether the institution has funding policy

<table>
<thead>
<tr>
<th>Responses</th>
<th>Yes</th>
<th>No</th>
</tr>
</thead>
<tbody>
<tr>
<td>No. of responses</td>
<td>6</td>
<td>9</td>
</tr>
<tr>
<td>Percentage</td>
<td>40%</td>
<td>60%</td>
</tr>
</tbody>
</table>

From the given data above, 6/15 (40%) agreed and 9/15 (60%) of the respondents disagreed that the institution has a policy for funding capital projects. This confirmed that the presence of a funding policy specifically for the funding of capital projects in state universities is uncertain. This was supported by Shoko (2013) who said that quality assurance, research infrastructure support; supra-national policies have been ignored in the education of Zimbabwe. This is why most employees at the Midlands State University are ignorant of funding policies and particularly the capital funding policy.

Question 2: If your answer in 1 is yes what are the requirements of the funding policy at your institution’s capital projects?

The 6/15 (40%) of the respondents who had answered ‘Yes’ in question 1 referred their funding policy to the formulation of budget estimates process requirements as the requirements of the capital projects funding policy whereby capital grants appropriation are supposed to be received from the government every year. This means that the budget process which has a focus of Result-Based Budgeting program is a recommended policy but need to
be supported by other policies to assure its compliance (Tandberg 2008) and for employees to see its importance and utilize it within the institution.

**Question 3: If your answer in 1 is no, then how are capital projects funded? Explain briefly.**

The other 9/15 (60%) of the respondents who had answered no in question 1 also referred to the same budget procedures, Public-Private Partnership (PPPs), the Public Sector Investment Program (PSIP) and the use of local resources as how the capital projects are funded. These reviewed that even though there is no capital funding policy there some ways through which capital projects are being funded publicly and privately (Bond et al 2012) therefore lack of a policy might not be the cause of funding gap but other factors.

**Question 4: There is evidence of information about funding gap in capital projects.**

**Figure 4.1 Graph showing the response to existence of funding gap**

![Graph showing the response to existence of funding gap](image)

Fig. 4.1 above shows the responses to whether the funding exists at Midlands State University. There are 5/15 (33%) respondents who strongly agreed, 7/15 (47%), 20% of the respondents were uncertain of the existence of the funding gap while 0/15 (0%) disagreed and
0/15 (0%) strongly disagreed. A mode of 12/15 (80%) respondents agreed to ascertain that the funding gap is in existence in the institution’s capital projects. The information gathered confirmed that there is evidence there is a funding gap at Midlands State University’s capital projects. According to the Budget Estimates (Blue Book) & MSU Management Accounts (2011-2014) there was evidence that funding in capital projects exist at Midlands State University.

Question 5: Factors contributing to funding gap

(a) Political environment

Fig. 4.2 Graph showing responses political environment factor to capital funding gap at Midlands State University

The first factor contributing to the funding gap in capital projects at Midlands State University is the political environment as shown in the Fig. 4.2 above. 4/15 (27%) of the respondents strongly agreed, 5/15 (33%) agreed, 3/15 (20%) uncertain, 2/15 (13%) disagreed and 1/15 (7%) strongly disagreed. A mode of 9/15 (60%) respondents agreed that political environment has an effect on the funding gap whilst 3/15 (20%) respondents disagreed that
the political environment has an effect on the capital funding gap. In support to the 9/15 (60%) assertion Zhou (2012) says political climate is disabling the resuscitation of the economy and management of the fiscal sector. On the other end Hou (2006) says politically the annual budget is there to promote democracy and restraint corruption to improve administrative efficiency, this reviews to a lesser extent 3/15 (20%) disagreement response rate political environment could not be the only factor fueling capital projects funding gap reflecting the view of the 3/15(20%) that it can be uncertain that politics could relatively lead to funding gap. As from the respondents having a mode of 9/15 (60%), it can be concluded that political environment has a significant influence on the funding gap.

(b) Increase in demand for higher education

Fig.4.3 Graph showing responses on the increase in demand for higher education

The second factor contributing to the funding gap is the increase in demand for higher education 4/15 (27%) strongly agreed, 9/15 (60%) agreed, 1/15 (7%) uncertain and 1/15 (7%) disagreed whilst 0/15 (0%) strongly disagreed. This gave a total of 13/15 (87%) respondents who agreed, 1/15 (7%) uncertain and a total of 1/15 (7%) respondents who disagreed. A mode totaling to 13/15 (87%) respondents positively agreed that the increase in demand for
higher education is a contributing factor towards capital funding gap in agreement with fundingstrategies.pptx (accessed: 29/04/14; 15:35). This cert to conclude that the increase in the number of students enormously led to the funding gap as the more the students the more the infrastructural facilities required in state universities and in this case students enrolment rose by 38% (2011-2014) from 12580 to 20243 students according to Student Registration Statistics.

(c) Fiscal capacity

**Table 4.3 Responses on fiscal capacity factor on capital funding gap**

<table>
<thead>
<tr>
<th></th>
<th>Strongly</th>
<th>Agree</th>
<th>Uncertain</th>
<th>Disagree</th>
<th>Strongly</th>
</tr>
</thead>
<tbody>
<tr>
<td>Frequency</td>
<td>10</td>
<td>5</td>
<td>0</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>Percentage</td>
<td>67%</td>
<td>33%</td>
<td>0%</td>
<td>0%</td>
<td>0%</td>
</tr>
</tbody>
</table>

The third factor contributing to the funding gap is fiscal capacity meaning the sustainability of the fiscus in producing revenue to fund capital projects. As shown in Table 4.3 10/15 (67%) strongly agreed, 5/15 (33%) agreed, 0/15 (0%) uncertain, 0/15 (0%) disagreed and 0/15 (0%) strongly disagreed. This data totalled to 15/15 (100%) respondents who agreed and none uncertain and again none disagreed. The mode of 15/15 (100%) of respondents agreed that the fiscal capacity totally contributes to the funding gap at Midlands State University which agreed with Chan et al (2009) who says that fiscal and macroeconomic conditions restrict the use of other finance sources due to their budgetary consequences. The 0 /15 (0%) uncertainty and on disagreeing respondents asserts that even if there may be a positive increase in the fiscal revenues economic external shocks experienced may still lead to funding gaps in capital projects (Segura-Arbiérgo et al 2012) because of weak political and economic governance. The mode of 15/15 (100%) stipulates that the fiscal environment is the factor which most influence the capital budgets together with the funding gap.
(d) Inefficiency in public sector

Fig. 4.4 Graph showing responses on the inefficiency in public sector capital funding

Fig. 4.4 portrays data responses for the fourth factor that contributes to capital funding gap which is inefficiency in the public sector. 0/15 (0%) of the respondents strongly agreed, 4/15 (27%) agreed, 5/15 (33%) uncertain, 3/15 (20%) disagreed and again 3/15 (20%) strongly disagreed. The total of 4/15 of the sample agreed, 5/15 (33%) uncertain and a total of 6/15 (40%) of respondents who strongly disagreed. The mode of 6/15 (40%) of respondents strongly disagreed that bureaucracy and inefficiency in the public sector contributes to the funding gap in state universities capital projects. In line with this outcome Result based budgeting (2008) supported this saying internal and external audit provide independent assessment in departments to ensure that operations and programs comply with applicable laws and regulations and prevent inefficiency and fraud and ensure that proper controls are in place. In relation to the 5/15 (33%) the Public Finance Management Act, Chapter 22:19 (2009) s.30 postulates that appropriated funds to a ministry can be withheld and be allocated to another ministry meaning there would a necessity for treasury to exercise that. And Curistine (2010), agreed with 4/15 (27%) that inefficiency and bureaucracy affect funding in
state universities. Over all bureaucracy and inefficiency in the public sector has a limited effect to the funding gap.

**Question 6: Sources of funding for capital projects to mitigate funding gap**

**Table 4.4 Responses on sources of funding capital projects to the mitigate funding gap**

<table>
<thead>
<tr>
<th>Source of Funding</th>
<th>Strongly Agree</th>
<th>Agree</th>
<th>Uncertain</th>
<th>Disagree</th>
<th>Strongly Disagree</th>
</tr>
</thead>
<tbody>
<tr>
<td>(a) Public-Private Partnership (PPPs)</td>
<td>7</td>
<td>6</td>
<td>2</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td></td>
<td>47%</td>
<td>40%</td>
<td>13%</td>
<td>0%</td>
<td>%</td>
</tr>
<tr>
<td>(b) Public Sector Investment Program (PSIP)</td>
<td>3</td>
<td>6</td>
<td>3</td>
<td>2</td>
<td>1</td>
</tr>
<tr>
<td></td>
<td>20%</td>
<td>40%</td>
<td>20%</td>
<td>13%</td>
<td>7%</td>
</tr>
<tr>
<td>(c) Joint Ventures</td>
<td>0</td>
<td>2</td>
<td>6</td>
<td>5</td>
<td>2</td>
</tr>
<tr>
<td></td>
<td>0%</td>
<td>13%</td>
<td>40%</td>
<td>33%</td>
<td>13%</td>
</tr>
<tr>
<td>(d) Fundraising</td>
<td>0</td>
<td>6</td>
<td>7</td>
<td>1</td>
<td>1</td>
</tr>
<tr>
<td></td>
<td>0%</td>
<td>40%</td>
<td>47%</td>
<td>7%</td>
<td>7%</td>
</tr>
<tr>
<td>(e) Donor Funding</td>
<td>0</td>
<td>6</td>
<td>7</td>
<td>1</td>
<td>1</td>
</tr>
<tr>
<td></td>
<td>0%</td>
<td>40%</td>
<td>47%</td>
<td>7%</td>
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</tbody>
</table>

The Table 4.4 above shows the responses on the sources of funds to mitigate the funding gap on capital projects and these were explained starting with the one with the highest mode of agreed response rate.

**Public-Private Partnership (PPPs)**

The Public-Private Partnership (PPPs) was rated the most applied and convenient source of funding with 7/15 (47%) respondents who strongly agreed, 6/15 (40%) agreed, 2/15 (13%) uncertain and none disagreed or strongly disagreed. A mode of 13/15 (87%) of respondents agreed also agreed with Istrate and Puentes (2011) who says that PPPs is a financing tool that the private investor can derive returns on investments directly from the users of the facility funded but Miller et al (2009) argues that there is no guarantee that optimum investments
from PPPs can be achieved supporting the 2/15(13%) respondents who were uncertain. It was concluded that sourcing funds from PPPs go a long way in trying to reduce the funding gap at Midlands State University.

**Public Sector Investment Program (PSIP)**

The Public Sector Investment Program (PSIP) was the second most applied funding strategy which could be implemented to mitigate funding gaps in capital projects with 3/15 (20%) strongly agreeing, 6/15 (40%) agreeing, 3/15 (20%) uncertain, 2/15 (13%) disagreeing and 1/15 (7%) strongly disagreeing. A mode of 9/15 (60%) agreed that PISP is a funding strategy that could be used in mitigating funding gap in state universities capital projects as supported by Zimbabwe Institute of Local Government Paper. As a government budgetary measure to eliminate funding gaps PSIP is regarded as a valuable source of funds to mitigate funding gap in state universities.

**Fundraising and Donor Funding**

The fundraising and the donor funding were rated third revenue schemes with none respondents who strongly agreed, 6/15 (40%) agreed, 7/15 (47 %) uncertain, 1/15 (7%) disagreed and 1/15 (7%) strongly disagreed. Both fundraising and donor funding had the same mode of 7/15 (47%) of uncertain respondents and literature reviewed that both sources of funds complements other funding strategies by government in infrastructure development according to the Report on the Technical and Vocational Education and Training Policy review (2005), SARUA (2009) and Ascher et al (2004). Fundraising and donor funding are enhancing tools towards capital projects funding and reducing the funding gap (Davis 2013).
Joint Ventures

Lastly but not least joint venture were recommended with 0% strongly agreeing, 2/15 (13%) agreeing, 6/15 (40%) uncertain, 5/15 (33%) disagreeing and 2/15 (13%) strongly disagreeing giving a total of 2/15 (13%) of those who agreed and 7/15 (47%) disagreed. A mode of 7/15 (47%) disagreed joint venture could be a source of funding to mitigate the funding gap but according to fundingstrategies.pptx (accessed: 29/04/14; 15:35) making partners in academic joint ventures is a funding strategy that reduces funding gap in higher education.

Question 7: Challenges encountered in implementing revenue strategies

Table 4.5 Responses on challenges encountered in implementing revenue strategies to mitigate funding gap

<table>
<thead>
<tr>
<th>Challenge</th>
<th>Strongly</th>
<th>Agree</th>
<th>Uncertain</th>
<th>Disagree</th>
<th>Strongly</th>
</tr>
</thead>
<tbody>
<tr>
<td>(a) Unsustainable fiscal condition</td>
<td>6</td>
<td>7</td>
<td>2</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td></td>
<td>40%</td>
<td>47%</td>
<td>13%</td>
<td>0%</td>
<td>0%</td>
</tr>
<tr>
<td>(b) Raw-materials availability</td>
<td>0</td>
<td>0</td>
<td>3</td>
<td>6</td>
<td>6</td>
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<tr>
<td></td>
<td>0%</td>
<td>0%</td>
<td>20%</td>
<td>40%</td>
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<tr>
<td>(c) Complexity of the project</td>
<td>5</td>
<td>3</td>
<td>2</td>
<td>4</td>
<td>1</td>
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<td></td>
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<td>20%</td>
<td>13%</td>
<td>27%</td>
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<tr>
<td>(d) Competence of technology</td>
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<td>4</td>
<td>3</td>
<td>1</td>
<td>1</td>
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<td></td>
<td>40%</td>
<td>27%</td>
<td>20%</td>
<td>7%</td>
<td>7%</td>
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<tr>
<td>(e) Commitment of personnel</td>
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<td>2</td>
<td>5</td>
<td>4</td>
<td>2</td>
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<td></td>
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<td>27%</td>
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<tr>
<td>(f) Communication of procedures</td>
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</table>

Table 4.5 shows the challenges in implementing revenue strategies at Midlands State University were ranked according to the one that has the highest agreed response rate.
Unsustainable fiscal condition

6/15 (40%) strongly agreed and 7/15 (47%) agreed, 2/15 (13%) uncertain and none disagreed or were strongly in disagreement setting a mode of 13/15 (87%) responses that the unsustainable fiscal condition was rated the greatest challenge in implementing revenue strategies. The total of respondents certainly agreed that an unsustainable fiscal condition (SARUA, 2009). In support to the uncertain respondents 2/15 (13%) Grant et al (2011) says besides the fiscal condition collection of data and connecting performance to funding decisions are the other challenges in implementing revenue strategies.

Competence of technology

The competence of technology became a second challenge with 6/15 (40%) respondents who strongly agreed, 4/15 (27%) agreed, 3/15 (20%) uncertain, 1/15 (7%) disagreed and 1/15 (7%) who strongly disagreed. The mode of 10/15 (67%) of the respondents agreed that the competence of technology is a challenge in the implementation of revenue strategies that also worsens the funding gap in capital projects at Midlands State Universities that is failure to adopt and adapt construction technology in developing might be costly as the equipment may be out dated (Ngowi, 2002). A total of 2/15 (13%) disagreed that the competence of technological equipment is a challenge in implementing revenue strategies and Laufer et al (1996) says incompetent project team may lead slacks in the developing of capital structures because to achieve the value of an infrastructure there is need for specialists, professionals and experts able to make interactive decisions.

Communication of procedures

The response rate for communication procedures was 3/15 (20%) strongly agreed, 5/15 (33%) agreed, 4/15 (27%) uncertain, 1/15 (7%) disagreed and 2/15 (13%) strongly disagreed.
The mode 8/15 (53%) agreeing respondents concurs with Nguyen et al (2004) who says frequent progress meetings, corrective and preventive measures need to be inevitable and timely applied to ensure project success. The communication procedures were the third challenge due to bureaucracy and corporate governance that have an effect on the implementation of revenue schemes.

**Complexity of the project**

The complexity of a project was rated the fourth challenge with 5/15 (33%) respondents strongly agreeing, 3/15 (20%) agreeing, 2/15 (13%) uncertain, 4/15 (27%) disagreeing and 1/15 (7%) strongly in disagreement. The mode of responses agreeing was 8/15 (53%) and in agreement to this Meyer (2002) saying that some construction projects’ complexity and dynamics are difficulty to even experienced managers and this is another challenge in implementing revenue strategies in state universities.

**Commitment of personnel**

The fifth challenge was commitment of personnel with 2/15 (13%) respondents who strongly agreed, 2/15 (3%) agreed, 5/15 (33%) uncertain, 4/15 (27%) disagreed and 2/15 (13%) strongly disagreed. The total agreeing response rate was 4/15 (27%) and disagreeing was 6/15 (40%). The modal frequency of responses was 6/15 (40%) disagreeing that personnel commitment challenges the implementation of revenue strategies and responses agrees with Clarke (1999) who says that unclear responsibilities and accountability keep away counterproductive effects of individualism. Therefore in commitment, teamwork is required so as to eliminate personnel commitment as a challenge to the implementation of revenue strategies.

**Raw-materials availability**
The last challenge is the availability of raw materials to be used in capital projects; there was none strongly agreeing, none agreeing, 3/15 (20%) uncertain, 6/15 (40%) disagreeing and 6/15 (40%) strongly disagreeing. The modes of responses were 6/15 (40%) for both uncertain and disagreeing responses which meant that raw-material are not a challenge in the implementation of revenue strategies.

In a nutshell, Ngowi et al (2004) says relating to communication, competence and commitment; a project is acknowledged as successful when it is completed on time, within budget, according to stakeholders’ specifications and satisfaction.

**Question 8: Does the funding gap have an impact on capital projects?**

**Fig 4.5 Graph showing the responses on the impact of funding gap**

Table 4.10 and Fig 4.6 show that all the respondents agreed that the funding gap has an impact on the funding of capital projects in the institution. 15 participants answered ‘Yes’ translating to 15/15 (100%) of the total while none answered ‘No’ giving 0% of the total. This was shown clearly in Table 1.1 in Chapter 1 from the Budget Estimates and Management Accounts (2011-2014).
Question 9: What impact does the funding gap have on capital projects?

6/15 (40%) respondents pointed out that the funding gap on capital projects have caused reduced capacity in meeting the objective of service provision, delays in meeting completion targets, it leads to no infrastructure development, some crucial projects have been postponed for too long and others are still to be completed such as the student residence, more lecture rooms at the Faculty of Commerce Campus and libraries at campus sites. 4/15 (27%) said that there is also uncertainty of the completion of other capital project as there are no appropriations received from the national budget for them. This has severely led to shortage of learning space, overcrowding in lecture rooms, libraries, computer laboratories and in hostels and congestion in campus pavements. There is also shortage of furniture lecture in rooms; the computer pupil ratio is not favorable. 5/15 (33%) said the funding gap led to the shortage of residence has forced students to resort to staying in Senga Residential Area other out of campus and residential areas. The funding gap resulted to the institution to rely on local initiatives that is revenue from students fees and mostly prefabricated buildings are put in up.

Question 10: What could be the best practice on funding state universities? Explain.

3/15 (20%) of the respondents explained that there must be certainty in the allocation of PSIP, fostering of PPP and making use of the fundraising strategy in the organization since the budget cannot be relied on due to the country’s fiscus. 4/15 (27%) said that the government has to draft clear capital funding policies that could be sustainable even during the economic hardships and get little help from internally generated resources. 6/15 (40%) emphasized that government support is the best practice that can reduce the funding gap. 1/15 (7%) said there need for Foreign Direct Investment (FDI) which could boost the country’s fiscal condition and rescue state universities in developing adequate infrastructure. According
to the 2014 National Budget Statement there are limited external inflows from the FDI therefore government has to repair its relations with foreign investors so as to actively participate in international trade. This could boost the fiscus thereby generating revenue to use in its different sectors including the state universities. The Medium Term Plan (2010-2015) says that government has embarked on an FDI promotion program that will result in improved inflow of foreign direct investment in manufacturing, infrastructure and tourism. Through, FDI technology improvement would lead to improved productivity and production costs are lowered thereby creating a fiscal improvement opportunity which could help in the infrastructural development of State Universities. 1/15 (7%) pointed out the implementation of Revenue Contribution to Capital Outlay (RCCO)

4.3 Interview responses

4.3.1 Interview response rate

Five out of the planned seven interviews were administered which gives a response rate of (5/7); 74% due to the unavailability of time to get to meet the respondents since they were tied up in meetings.

4.3.2 Analysis of interview responses

Question 1: Do you think that in your institution there is a funding gap on capital projects? If yes which projects lack funding?

The 5/5 (100%) management members outlined that there is a funding gap on capital projects at the Midlands State University and the projects which have suffered the most are the library of which its construction is on a stand still at first floor level and the government funded halls of residence which is again on stand still at second floor level. They said most completed
lecture rooms (new structures) are prefabricated temporary buildings aimed at easing the problem of learning space.

**Question 2: does your institution have a funding policy on capital projects? Give a brief detail of your answer.**

The 2/5 (40%) respondents addressed that the capital grant budget process is the policy in relation to the Result Based Budgeting in cognizance to the current economic policy which is the Zim-Asset. The other 3/5 (60%) respondents said that there is no clear funding policy written down by the government but they also referred to the budget process that is used to fund capital projects together with the funds assistance from allocations from students’ fees which deals with small capital projects.

**Question 3: What criteria are used by the university to get capital grants from government?**

The 5/5 (100%) respondents provided that budget estimates are compiled by the university and supplied to the Ministry of Higher and Tertiary Education, Science and Technology Development after the university’s Council approval and before the National Budget announcement. The budget estimates are then approved nationally then appropriations would be disbursed during the course of the year.

**Question 4: When does the university receive the capital grants from government per year?**

5/5 (100%) respondents stressed that funds disbursement from government are uncertain. Over the years they only capital grant received in full were for small project usually of less than a million dollars and for the twenty four blocks of halls of residence recently completed.
Other projects did not receive any funds as of last year not mentioning in detail for the other previous years.

**Question 5: What strategies did government has put in place to effectively manage the funding problem?**

The 3/5 (60%) respondents stated that the university cannot do much on the development of its infrastructure since it requires large amounts of capital investments. They urged the government to deal with the improvement of the fiscal capacity of the country and lure investors in all sector of industry and if and only if industry would grow the fiscus would be sustainable as more taxes would collected from it to sustain the economy and built the infrastructure including that of universities. Again they explicitly pointed out that the country in dire need of foreign support for its sustainable development and beginning with the manufacturing of its own goods and services and have surplus for exports and not to rely on importing. To maintain its fiscus and improving revenue income government must have policies that encourage foreign direct investment and fostering the Public-Private Partnership. 2/5 (40%) of the staff at Midlands State University referred to the economic cycle and stressed that if the other sectors (players) of industry remain missing it would take long to solve the question of infrastructure development not only in state universities but in all sectors of the country.

**Question 6: To what extent do revenue strategies being implemented by the government effective?**

4/5 (80%) of the staff did not to ascertain the extent to which success can be measured as much still need to be achieved recently. They said as long as there is overcrowding in every campus, lecture rooms and in the students residence they cannot say revenue strategies are effective although there a lot of effort in building and improving the infrastructure of the
university. 1/5 (20%) postulated that countable achievements are new hostels funded by both capital grants and Public-Private Partnerships, the faculty of Medicine laboratories and equipment and prefabricated structures at the Faculty of Commerce.

**Question 7: What are the challenges being met in implementing revenue strategies to mitigate the funding gap?**

Responding to this question, 4/5 (80%) respondents the major challenge they emphasized on was the unsustainable fiscal condition in the country, the use of obsolete technology increases the cost of a project and 1/5 (20%) said communication procedures and government priorities are a challenge whereby a planned deal could be cancelled all of a sudden when the university would have prepared and waiting to receive funds to implement a project proposed and approved.

**Question 8: Which funding strategies do you think must be adopted in universities’ capital projects funding?**

The 5/5 (100%) respondents all said funding strategies that government has to provide state universities with capital grants, help the university in acquiring better contracts with the Public-Private Partnership investors, the government has to give certainty to the Public Sector Investment Program (PSIP) so that universities can rely on the program and the university could raise funds through its fundraising strategies in place.

**4.4 Secondary Data analysis**

Secondary data was collected from the national budget estimates (Blue Book), management reports, the residence statistics and registration statistics to clearly establish the funding gap at the Midlands State University. The data was used in the Chapter One to elaborate the state
of the funding gap at Midlands State University. The information showed that there is much needed funding on the university’s infrastructure for better service delivery.

4.5 Summary

The chapter overall looked at the data presentation and the analysis of findings. These were presented in pie charts, tables, bar graphs and line graphs. The following chapter is going to look at findings, conclusions and recommendations.
CHAPTER 5

FINDINGS, CONCLUSION AND RECOMMENDATIONS

5.0 Introduction

The chapter provides summaries of the whole study, the results of the analysis in relation to the problem of the study, research objectives, and literature review, research instruments and data presentation, analysis and interpretation were concluded and recommendations are provided.

5.1 Summaries

The purpose of this study was to analyse the impact of the funding gap on capital project in state universities which is a case study of Midlands State University.

Chapter one looked at the background of the funding gap at Midland State University (MSU) that is the problem why MSU’s infrastructure is failing to adequately provide students with a favourable learning space and environment. That showed that there is a problem of government funding its state universities capital projects. The main aim was to find out information in the state capital funding policy or the institution’ funding policy which is being implemented, factors contributing to the funding gap, revenue strategies being implemented to mitigate the funding gap, the challenges being encountered in implementing revenue strategies and to find out the way to fund universities.

Chapter two reviewed the literature in support, in disagreement and indifferent views for the each research objective showing the gap on the relevance of the study. This was given reference to various literature sources which were analysed and considering their findings in relation to the study. The chapter analysed the result based budgeting as a funding tool in the public sector; its strength and weaknesses reviewed by Madhekeni (2012), Arunasalem(2000),
Result-Based Budgeting Report to Albertans (2013), RICABASO (2011), Framework for Result-Based Public Sector Management and Country Cases (2011). The capital projects policies implemented in other foreign universities was reviewed by http://highered.colorado.gov/Publications/Policies/ (accessed 28/08/14: 1155hrs). The factors contributing to the funding gap; political environment, increase in demand for higher education, fiscal capacity and inefficiency in the public sector in relation to what these said Zhou (2012), Kramarenko et al (2010), World Bank (2010, Chan et al (2009) and Tandberg (2008). The sources of funds to mitigate the funding gap were also reviewed, these were PPPs, PSIPs, joint ventures, fundraising and donor funding, challenges in implementing revenue strategies were reviewed as fiscal instability, competence of technology, communication of procedures, the complexity of the project and commitment of personnel according to Bond et al (2012), Istrate and Puentes (2011), (Miller et al 2009), Bedi and Jong (2010). The best practice on funding state universities was best reviewed by Treasury and the Council of Economic Advisors (2010) and Ermasova (2013).

Chapter three gave the methodology in carrying out this research study. The mixed research design was used due to the nature of the research problem, both quantitative and qualitative research designs were administered with the aim of coming up with reasonable results. Descriptive survey and case study analysis including judgmental sampling technique were applied in this study. Questionnaires and face to face interview were used as the methods of collecting data from the institution.

Chapter four focussed on the presentation of data which was done in tabular form, graphically and in a narrative or descriptive way. Tables summarised the data collected and frequencies were converted into percentages and this information was further outline in bar graphs, pie charts and line graphs.
5.2 Major findings

➢ There is no capital funding policy at Midlands State University and even designed by the government for its state universities capital development. Capital projects are planned for through the National Budget Estimates. This have impact on the timeframe on carrying out projects, it cannot be ascertained and making it difficult to implement closely other revenue strategies and at some it becomes very irrelevant decision makers would be forced to wait until the government disburses it funds. Funds appropriations are also uncertain such that planned projects are left in a stand still until the funds are disbursed and the companies given the tender end up living the projects.

➢ There is minimum communication between the government and the university about what will be going on, on the ground because of tall hierarchical structure of the Ministry of Higher Education, Science and Technology Development.

➢ Due to the current economic and political environment Government is facing a lot of challenges in trying to have a balanced fiscus there it cannot afford to develop major infrastructures in State Universities.

5.3 Conclusion

Conclusions were drawn from the study’s major findings and in relation to the research objectives. The study’ main objective to address the best way from which capital projects could be funded in order to make the sector participate in economic growth and development and what government could do to achieve this therefore it a joint objective between the Government of Zimbabwe and its State Universities. The conclusions came from the facts collected from the literature review, interview and the questionnaires.

5.3.1 The ministry’s policy requirements on the capital funding of state universities
No policy was discovered to do with the funding of capital projects in state universities and from the questionnaire and interviews responses it can be concluded that there is no state funding policy for capital projects currently. The National Budget, Result Based Budgeting system and the new economic policy Zim-Asset are not capital funding policies for universities that could be relied on as depicted the Colorado Higher Education policies and also by Kovnar and Lusk (2010). The government together with Ministry of Higher Education, Science and Technological Development and all state universities has a duty to come up with funding policy that is transparent and realises times of depression and boom in the fiscus.

5.3.2 Factors contributing to the funding gap at Midlands State University

The fiscal capacity, political environment, inefficiency in the public sector and the increase in the number of students in state universities have a great impact on the funding gap in state universities. Since there are many players in these factors coordination towards having sustainable fiscal environment, stable political environment, efficiency in the public sector to make a balance of everything would victor the number in increase of students enrolled by each state university to learning in a spacious, conducive environment and structures.

5.3.3 Funding sources to mitigate the funding gap

The sources explained in Chapter two and three which are the PPPs, PSIP, joint venture fundraising and donor funding are complemented by the economic and political environment. If and only if these two factors are not stable its difficulty to get a plausible investment therefore relations with foreign states need to be repaired so that foreign direct investment in all sectors of industry since they would pay taxes to the government would be improved. An improvement in the economic and political environment will lead to a positive impact on funding state universities capital projects and funding gaps will be eliminated.
5.3.4 Challenges in implementing revenue strategies to mitigate funding gaps

It was determined during the research that the fiscal and macroeconomic conditions, complexity of projects, competence of technology, commitment of personnel and communication procedure (corporate governance) hinder the elimination of funding gaps in state universities. Again the case is similar to that of the sources explained above therefore the conclusion is the same, the improvement in the economic and political environment will lead to a positive impact on funding state universities capital projects and these challenges will be eliminated.

5.3.5 Best practices for funding state universities capital projects

Relating to the questionnaire, interview responses literature review and secondary data analysed it was established that state universities are best funded by the government, other stakeholders would come into play to assist and accelerate in the development of the infrastructure. This is achievable if the government can adopt what other governments’ state universities are doing such as coming up with reliable capital funding policy such as the Colorado Long Range Infrastructure Master Planning Policy for higher education and the OECD countries long term approach for the capacity of performance management and budgeting to improve performance and accountability in the public sector.

5.4 Recommendations

From the conclusions drawn from the study, responsibility is placed in the government, the institution, management policy makers, to come together to implement strategic plans to deal with capital funding gap and the related impacts on service delivery and economic growth and development. The measures and strategies that can be employed by the government and the institution to mitigate recurring capital funding gap are establishing a ministry and
universities capital funding policy, strive for the economic and political environment that encourages investment and improve communication in the public sector for the successful implementation of the funding policy.

5.5 **Summary**

The major findings, summaries of the whole study, conclusions and recommendations of the research were highlighted in this chapter. Considering these, a capital funding policy is advocated for the mitigation of the impact funding gap in state universities. However future research needs to be carried out on the effects of implementing the capital funding policy in state universities.
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funding strategies.pptx

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Dear Sir/Madam

APPLICATION FOR AUTHORITY TO CARRY OUT RESEARCH AT MIDLANDS STATE UNIVERSITY BURSARY DEPARTMENT

My name is Fortunate Nongerayi, a fourth student at Midlands State University studying the Bachelor of Commerce Accounting Honours Degree carrying research on: The impact of the funding gap ion capital projects in state universities: Case of Midlands State University
(from 2011-2014). The research is submitted in partial fulfilment of the requirements of the Bachelor of Commerce Accounting Honours Degree at Midlands State University. I am kindly requesting for your support in responding to questionnaires attached to this letter. The information you will provide will be used for academic purposes only and is treated with confidentiality.

Your assistance is greatly appreciated.

Yours Faithfully

Fortunate Nongerayi (R12414N)
APPENDIX B

RESEARCH PROJECT QUESTIONNAIRE

Staff Questionnaire

The impact of funding gap on capital projects in state universities: Case of Midlands State University

Instructions

1. Do not write your name on the questionnaire.

2. Show response by ticking the respective answer box and fill in the relevant spaces provided.

1. Does your institution have a funding policy for capital projects?

Yes □ No □

2. If your answer in 1 is yes, what are its requirements on funding state universities capital projects?

........................................................................................................................................
........................................................................................................................................
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3. If your answer in 1 is no, then how are capital projects funded? Explain briefly.

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........................................................................................................................................
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Questionnaire Number
4. There is evidence of information about funding gap in capital investments

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<thead>
<tr>
<th>Strongly Agree</th>
<th>Agree</th>
<th>Uncertain</th>
<th>Disagree</th>
<th>Strongly disagree</th>
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5. Factors contributing to funding gap

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<td>(b) increase in the demand of higher</td>
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<td>(c) fiscal capacity</td>
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<td>(d) inefficiency in public sector</td>
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6. Sources of funding for capital projects to mitigate funding gap

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<th>Uncertain</th>
<th>Disagree</th>
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<td>(b) Public Sector Investment Program (PSIP)</td>
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<td>(c) Joint Ventures</td>
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<tr>
<td>(d) Fundraising</td>
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<tr>
<td>(e) Donor Funding</td>
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</table>

Specify other strategies if any …………………………………………………………………………………………………………………

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7. Challenges encountered in implementing revenue strategies

<table>
<thead>
<tr>
<th></th>
<th>Strongly</th>
<th>Agree</th>
<th>Uncertain</th>
<th>Disagree</th>
<th>Strongly disagree</th>
</tr>
</thead>
<tbody>
<tr>
<td>(a) Unsustainable fiscal condition</td>
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<tr>
<td>(b) Raw-materials availability</td>
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79
8. Does the funding gap have an impact on capital projects?

Yes □ No □

9. What impact does the funding gap have on capital projects?

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10. What could be the best practice on funding state universities? Explain.

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THANK YOU

Official stamp
APPENDIX C

INTERVIEW QUESTIONS

Interview guide

1. Do you think your institution there is a funding gap on capital projects? If yes which projects lack adequate funding?

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2. Does your institution have a funding policy on capital projects? Give a brief detail of your answer.

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3. What criteria are used by the university to get the capital grant from government?

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4. When does the university receive the capital grant allocation from government per year?

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5. What strategies did government or the university put in place to effectively manage the funding problem?

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6. To what extend do revenue strategies being implemented by government effective?
7. What are the challenges being met in implementing the revenue strategies to mitigate the funding gap?

8. Which funding strategies do you think must be adopted in universities’ capital projects?