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DETERMINANTS OF RESTORING A CULTURE OF SAVING IN BANKS AMONG ZIMBABWEANS

BY

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DECLARATION

I, Shepard Makurumidze, do hereby declare that this thesis is a result of my own investigation and research, except to the extent indicated in the acknowledgements, references and by comments included in the body of the thesis, and that it has not been submitted in part or in full for any other degree to any other university.

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Student's signature Date

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Supervisor's signature Date

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Supervisor's signature Date

DEDICATION

This thesis is dedicated to my family, my wife Nyaradzai and my four children (two daughters and two sons) in their order Nyasha, Tawanda, Marcia and Takomborerwa. They were a pillar of strength and source of comfort during the arduous journey. It is further dedicated to my parents Nikosi and Modesta and to all those who believe in the Zimbabwean dream of economic prosperity through value addition and investment funded from domestic savings.

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ACRONYMS AND ABBREVIATIONS

ADB - African Development Bank

BAZ - Bankers Association of Zimbabwe

DPB - Depositors Protection Board

DTL ratio - Deposits to bank Liabilities ratio

ESAP - Economic Structural Adjustment Programme

FDI - Foreign Direct Investment

GDP - Gross Domestic Product

GDS - Gross Domestic Savings

GGS - Gross Government Savings

GNDI - Gross National Domestic Income

GNS - Gross National Savings

GPDI - Gross Private Disposable Income

GPS - Gross Private Savings

HDT - Hyperbolic Discounting Theory

IDAs - Individual Development Accounts

IMF - International Monetary Fund

IDBZ - Infrastructural Development Bank of Zimbabwe

KIDS - Kids Investment Development Savings

LCH - Life Cycle Hypothesis

LCSH- Life Cycle Savings Hypothesis

LTD ratio - Liabilities to Deposits ratio

MPS - marginal propensity to save

NCDs - Negotiable Certificates of Deposits

NSSA - National Social Security Authority

PIH - Permanent Income Hypothesis

POSB - People's Own Savings Bank

RBZ - Reserve Bank of Zimbabwe

SADC - Southern African Development Cooperation

SEED - Saving for Education, Entrepreneurship and Down-payment

SPSS - Software Package for Social Sciences

UDI - Unilateral Declaration of Independence

UBM - United Merchant Bank

ZABG - Zimbabwe Allied Bank Group

ZDB - Zimbabwe Development Bank

ABSTRACT

The study set out to examine the determinants of restoring the culture of saving in banks among Zimbabweans over the post-independence Zimbabwe. Both quantitative and qualitative approaches were used in the study. Primary data from 200 bank customers from across the ten provinces of Zimbabwe randomly selected was used in the study to gather opinion regarding the restoration of savings practices among Zimbabweans. Secondary data from the Reserve bank of Zimbabwe on bank deposits, bank liabilities, deposit rates, borrowing rates and liquidity ratios were also used to model the determinants of restoring a culture of saving in banks among Zimbabweans. The total deposits to total liabilities ratio from the secondary was used in the study as a proxy for the savings culture in Zimbabwe. Data from ZIMSTATS that included Gross Domestic Product (GDP), Gross Capital formation, exports, the country's total debt, GDP per capita and year on year inflation were also used to relate the savings practice to the performance of the economy. This was buttressed by the opinions as well as comments from the Central Bank officials, Ministry of Finance officials, Deposit Protection Corporation (DPC) officials and officials from Microfinance Institutions purposively chosen. Statistical Package for Social Sciences (SPSS) version 20 was used for the analysis of the data and theme analysis was used for the interview guide. The major research findings were the inadequacy of savings products in the market to meet different savings requirements of the diverse population. The study also found a weak association between the savings practice among Zimbabweans and the crucial macroeconomic fundamentals as well as low confidence by bank customers with the Zimbabwean financial market emanating from the inadequate legal and policy framework. The policy and legal conditions, politics, the poorly performing economy as well as product inadequacy in the financial market across the diverse population were the major factors inhibiting the restoration of the culture of saving in banks among Zimbabweans. Based on the findings and conclusions the researcher recommended legal and policy reforms for authorities and the banking institutions to come up with relevant products and services for the diverse population especially the marginalised communities. Further study recommended included an analysis of the savings behaviours of the marginalised communities in Zimbabwe like the rural communities, women and the disabled in view of the adoption of mobile and electronic banking by the financial services sector.

CHAPTER ONE

INTRODUCTION

1.0 Background of the study

Saving is the process of maintaining part of the current income for use in the future or the accumulation of financial and non-financial assets (Najarzadea, Reed and Tasan, 2014). Savings can be described in terms of net savings and gross savings. According to Raj (2004) net savings are generated when disposable personal income is greater than personal expenditure while gross savings include net savings and depreciation allowances for replacement of real assets in the future. Classical economists have postulated that savings are a necessary and sufficient condition for securing investment and the interest rate (natural return on savings) is the price that equates savings to investment. When savings rise, investment increases leading to higher capital and consequently economic growth. Higher savings rates go hand in hand with higher income growth (Lipsey and Chrystal, 2007). There are proven facts of virtuous cycles of savings and prosperity as well as poverty traps resulting from insufficient savings.

According to Fell (2000) savings are done by three main entities in the economy namely households, business units and government. Raj (2004) noted that households generally save to cover future expenses and for retirement while business units save to finance future investment and government for infrastructural development. Failure to save by households produces a dependent population whereas dissaving by business units and government affects growth potential as well as underinvestment in infrastructure.

The savings process does not operate in isolation but through the activities of the financial sector. Sometimes the role of the financial sector in the economy is subtle but complex and the sector has a relatively small share of real assets on their balance sheets. The financial sector mobilises savings and allocates credit across space and time (Herring and Santomero, 1996). Apart from providing payment services, the financial sector facilitates business units and households in coping with economic uncertainties by hedging, pooling, sharing and pricing risks. The financial sector transfers funds from surplus units (savers) to deficit units who want to invest in tangible assets (Saunders and Cornett, 2009). The financial market infrastructure collects information about firms, negotiates contracts limiting the firm's opportunities of taking advantage of the saver. The market facilitates the matching of

borrower's needs and savers preferences by underwriting an issue of direct securities and dividing them into smaller denominations for distribution to savers. This is done by entities called financial intermediaries that transform the final liabilities into different financial assets which savers prefer to hold (Fell, 2000). The financial sector offers many different products to savers and investors through a number of institutions including commercial banks, savings banks, merchant banks, building societies, insurance companies, investment banks, mutual funds, finance companies and other institutions. Saunders and Cornett (2009) broadly classified these institutions into deposit taking institutions and non-deposit taking institutions.

The financial sector must have fiducious systems i.e. systems in a position of trust, acting in the best interest of savers and investors (Herring and Santomero, 1996). They must act in good faith when conducting their banking business. The chapter will thus chronicle the savings problem among Zimbabweans as it arose from the structural changes that occurred in the country's financial sector over the years.

At independence, the new Zimbabwean government inherited a financial structure that developed under Unilateral Declaration of Independence (UDI) conditions and in 1981 the economy generated about Z$1.7 billion of investable surpluses representing 45% of Gross Domestic Product (GDP) (Seidman, 1986). Four foreign controlled commercial banks handled all of Zimbabwe's commercial banking services. First years of independence saw the government focussing on Africanizing the central bank with a few changes in the banking structure.

The Zimbabwean government liberalized its financial sector in 1991 and resulted in the establishment of indigenous banks whose number has considerably grown over the years (Brownbridge and Harvey, 1998). According to the Bankers' Association of Zimbabwe (BAZ) (2013) the fall of United Merchant Bank (UBM) in the 90s followed by Universal merchant bank sent a wrong signal in the financial system as two building societies (First National Building Society and Zimbabwe building Society) and five commercial banks (Time Bank, Trust Bank, Royal Bank, Century Bank and Barbican Bank) were closed in 2003/2004. Trust, Royal and Barbican were collapsed into a single entity, the Zimbabwe Allied Bank Group (ZABG) before the assets were separated during the dollarization era. The dollarization era, from 2009 onwards also claimed one merchant bank (Renaissance Merchant Bank), one commercial bank (Interfin Bank) and one investment bank (Genesis Bank). Although Trust Bank and Royal Bank tried to come back on the market, their licences were

later withdrawn by the central bank. Arguments for the series of bank collapses have been advanced including economic problems, liquidity crunch and gross mismanagement that involved theft and abuse of depositors' funds. It was the latter argument that has dealt a heavy blow to the financial system as they seemed to have reneged on their fiduciary role of looking after depositors' and investors' funds. Consequently, the investing and saving public has lost confidence in the Zimbabwean financial sector.

The Figure 1.1 below summarizes the trends in the Gross Savings (GDS) to Gross Domestic Product (GDP) percentages over time from 1983.

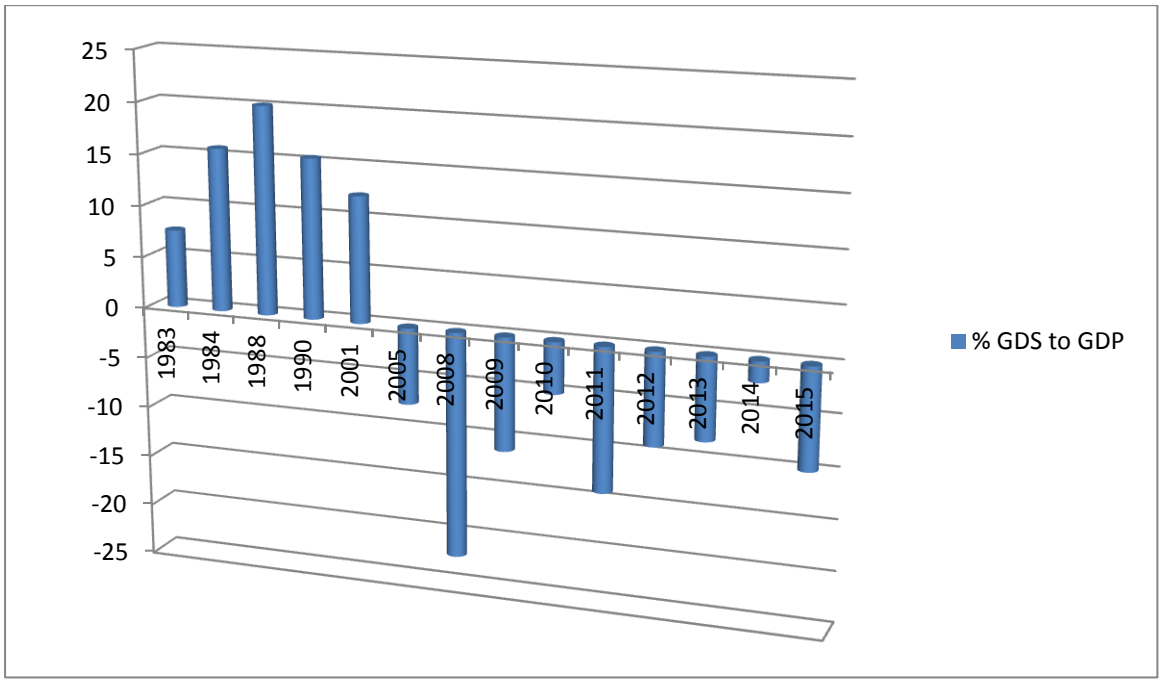


Figure 1.1: Gross Domestic Savings as percentage of GDP

Source: Adapted from the World Bank Indicators: Zimbabwe National Accounts.

Savings rates are a good indicator of a particular country's income and consumption over time. Negative rates imply that household spending is drawing down national wealth. Comparatively with its SADC counterparts the country has not fared well in terms of its savings practice as shown by the following statistics on Gross Savings as a percentage of GDP.

Table 1.1: Comparative statistics with SADC countries

Country	**2009**	**2010**	**2011**	**2012**	**2013**	**2014**	**2015**
Botswana	26	28	33	23	29	43	40
Malawi	11	10	6	-	-	12	12
Mozambique	-2	4	6	7	-	11	10
Namibia	3	6	14	11	10	25	23
South Africa	19	19	19	16	17	16	16
Tanzania	17	21	18	22	23	20	23
Zambia	24	34	34	28	29	31	32
Swaziland	-7	-3	1	-	-	20	21
Zimbabwe	**-11**	**-5**	**-14**	**-9**	**-8**	**-2**	**-9.8**

Source: World Bank National Accounts: OECD National Accounts data file.

Although some statistics for some countries are unavailable, performance for Zimbabwe is the worst compared to Mozambique and Swaziland.

Another measure of savings practice is the total deposits to liabilities ratio obtained by dividing total bank liabilities into total bank deposits as follows.

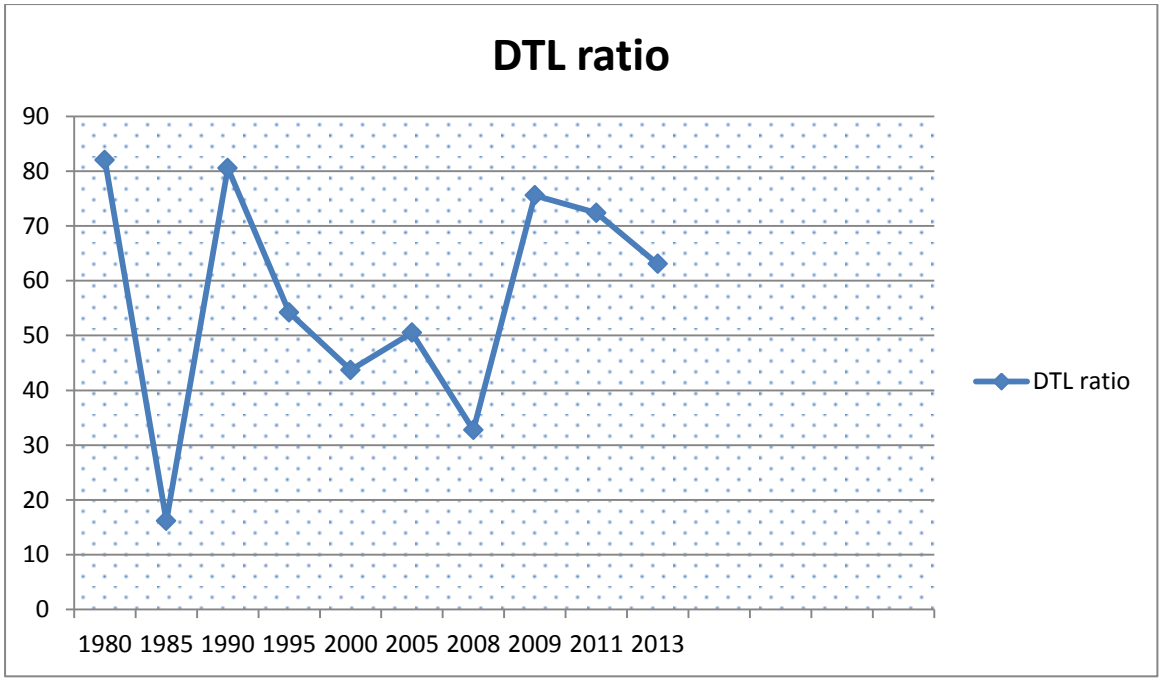
$$\frac{Total\ bank\ deposits}{Total\ bank\ liabilities}\ x\ 100$$ ----------Equation 1.1

The ratio is expressed as a percentage and the study used it as a proxy for savings practices among Zimbabweans. Bank liabilities are the debts incurred by the banking institution in the form of deposits of customers or the money banks borrow from other sources to fund their assets that earn revenue. According to the Zimbabwe Banking Act (2000), typical bank liabilities include demand deposits, savings deposits, time deposits, foreign currency deposits, negotiable certificates of deposits issued, amounts owing to the Reserve Bank of Zimbabwe, amounts owing to Deposit Money Banks, amounts owing to other banking institutions, clearing balances with the Reserve Bank of Zimbabwe, amounts owing to branches, foreign liabilities, contingent liabilities, bills payable, share capital and reserves, shareholders loans and other liabilities. The largest liabilities category is the deposits which are included in the M_1[1], M_2[2] and M_3[3] monetary aggregates. These deposits, which are the primary liabilities,

[1] M_1-coins, notes in circulation and demand deposits
[2] M_2- M_1+ savings and fixed deposits at commercial banks maturing in 30 days or less
[3] M_3- M_1 + M_2 and time deposits maturing in more than 30 days

include checking deposits, savings accounts, certificates of deposits, money market deposits, fixed deposits and other accounts. The ratio expresses these deposits in terms of the total liabilities of the banking institution and thus shows how active depositors have been in transacting in these savings products. When the ratio is too high it is a sign of high savings and that banks have enough liquidity to cover any unforeseen fund requirements. It implies the bank has enough or surplus deposits from customers to cover its liabilities. A low ratio is an indication that the financial institution does not have enough deposits to cover its liabilities. It is a sign of low savings in a country or increased bank commitments in terms of liabilities. Decline in the ratio could be an indication that bank loans are more attractive to both borrowers and lenders or it could be a sign that depositors are replacing bank deposits by other financial assets. Berg (2012) argued that increased customer deposits make banks more robust to liquidity squeezes and stabilises the banking system. This is opposed to market funding which makes banks' liquidity positions more vulnerable to external shocks.

Figure 1.2 below profiled the trends in the bank deposits to liabilities ratio computed from the total deposits and bank liabilities from the Reserve Bank of Zimbabwe. From 1990 the ratio has been on a downward trend, increased in 2009 during the government of national unity when multi-currency system was adopted as the official monetary system in the country. The increase was short term as the downward trend continued thereafter.



Source: Adopted from the RBZ statistics (2016).

Figure 1.2: Total deposits to liabilities trend

Mishkin and Eakins (2015) further alluded to the fact that the inverse ratio known as the Liabilities to deposit ratio (LTD ratio) is a commonly used statistic for assessing the liquidity of the banking institution. It is obtained by dividing the bank total loan by its total deposits. The ratio is also expressed as a percentage and if the ratio is too high, it implies that banks may not have enough liability to cover any unforeseen funds requirements. On the other hand if the ratio is too low the banks may not be earning as much as they could be.

Currently the financial sector faces a number of challenges that include capitalisation, liquidity and credit risk (Mid-Year Fiscal policy Review Statement, 2012). During the Zimbabwean dollar era investments and deposits were wiped out because of inflation that peaked 231 million percent in 2008 (Policy and Budget Framework, 2010-2012). The developments and problems in the financial sector from late 1990s to date have seriously impaired public confidence in the market as the banking sector like any other segment of the financial system thrives on trust and confidence. In 2003, a Depositors Protection Board (DPB) was established whose mandate (Section 4 of the Deposit Protection Act) was to compensate depositors for losses incurred in the event of insolvency of a contributory institution thus promoting depositors' confidence and soundness in the banking sectors. The creation of the fund was a government policy response to a growing need to moderate

instability in the banking sector and to protect the public against worst consequences of bank failure. The Depositors' Fund however offers limited coverage and depositors with funds in excess of the prescribed maximum have to risk their deposits. By October 2012, 3482 depositors have been compensated out of 4625 depositors and a paltry of US$150 was paid to almost half of Genesis depositors, (Standard, 21 October, 2012).

The debt market especially trade in Treasury bills and Bonds has been poor since 2000. A number of issues have gone undersubscribed, thus undermining the ability of the country to undertake critical projects for economic development. Zimbabwe revised downwards its growth target of 4.4% in 2012. Other economic challenges the country is facing include low industrial capacity (44.2%) and high unemployment (85%). The sluggish performance of the financial system in fulfilling its mandate of mobilizing financial resources for investment has been cited as one reason behind such performances (Monetary Policy Statement, January 2013). Bankers Association of Zimbabwe (June, 2013) reported that deposits declined from US$4.2 billion to US$3.7 billion between January 2013 and June 2013. Local banks were also finding it difficult to meet US$100 million new capital requirement by June 2015 and by February 2013, only 67% of the banks had complied with their 31 December minimum capital requirement (Monetary Policy Statement, January, 2013).

There were 183 financial institutions in Zimbabwe ranging from commercial banks to micro financial institutions in addition to the Zimbabwe Stock Exchange (Monetary Policy Statement, 2014). Table 1.2 below shows the architecture of the financial system in Zimbabwe.

Table 1.2: Architecture of Zimbabwe's Banking Sector

Type of Institution	Number
Commercial Banks	15
Building Societies	3
Merchant Banks	2
Savings Banks	1
Total Banking Institutions	21
Assets Management Companies	16
Microfinance Institutions	146

Adopted Source: Monetary Policy Statement (January, 2014)

The financial system has undergone through a lot of changes since independence. Since the fall of United Merchant Bank (UBM) in the mid-90s, Zimbabwe experienced intermittent turmoil in the financial sector, and this has adversely affected the growth prospects of the country as investors have lost confidence in the sector. Policies like the Fast track Land Reform of 2000, and the Economic Empowerment programme as viewed by some financial analysts have not made the financial sector any better. According to the World Bank report (2010), Zimbabwe is ranked number 65 in terms of depositors with commercial banks per 1000 adults and for adults borrowing from commercial banks ranked 81 and 44 on percentage of non-performing loans to total gross loans of banks.

According to Bond (1998) the financial system in Zimbabwe has evolved over some phases. The first phase referred to as the pre-independence era covered the period under which the country was under the British rule up to 1980. The period from independence up to the early 1990s was the next phase, then the period from late 1990s to 2008. The last period was the multicurrency era or the dollarisation era that stretched from 2009 to date (Gwenhamo, 2009). The background of the activities of the financial systems in Zimbabwe and the participants thereof needed to be understood within the context of the above mentioned four time phases.

1.2. Statement of the Problem

According to the RBZ report (2012), the individual deposit rate between the years 2009-2011 averaged 1% which was far below economic growth rate of 4%. After 2010 household savings with financial institutions declined sharply by 10% (*ibid)* and this has seriously

affected the economic performance of the country. Statistics from the World Bank show that Gross Savings as a ratio of GDP is far below the acceptable ratio of 20% and as per Zimbabwe National Accounts the ratio stood at -9.8% in 2015. Comparatively with its neighbours, the Gross savings to GDP percentage is not impressive and with China, its major trading partner being around 52.3%, India 31,6%. According to statistics from the Bankers Association of Zimbabwe (2013), more than 52% of the total deposits in the banking sector consist of demand deposits. A mere 17% are long term deposits placed for more than one year, while 20% are short term deposits placed for less than one month.

The latest Finscope Survey Zimbabwe (2011) found that 31% of the adults do not save or put aside some money, a percentage which was far too high compared to fellow SADC countries whose rates were in the range of 20%. The Standard Zimbabwe (2012) reported that more than half million dollars of cash has been lost while kept at home, a sign that a lot of money was outside the formal banking system. BAZ (2013) noted that such developments have resulted in the financial systems failing to channel financial resources to the productive sectors of the economy resulting in poor economic performance reflected in high unemployment figures around 80%, liquidity crunch, yearly downward revision of GDP targets.

Although savings as a percentage of GDP peaked in 1975 (22%), 1988 (22.1%) and in 1994 (21.8%), the past decade has witnessed the national savings rates plummeting from the positive 19% in 1998 to minus savings rates. The negative trend appeared to be decreasing during the government of national unity from 2008-2012. Savings rates can begin to improve beginning with an individual saver, at household level, cascading up the community to become a collective national responsibility. This study therefore sought to establish the determinants of restoring the culture of saving in banks among Zimbabweans.

1.3 Objectives

The study aimed to achieve the objectives outlined below:

1.3.1 General Objective

The main objective of the study is to establish the determinants of restoring a culture of saving in banks by Zimbabweans.

1.3.2 Specific Objectives

(i) Evaluate the development of the Zimbabwean banking system.

(ii) Define and explore the saving culture among Zimbabweans.

(iii) Examine the drivers influencing saving culture among Zimbabweans.

(iv) Evaluate the effects of saving culture on the performance of the Zimbabwe economy.

1.4. Research Questions

(i) How has the banking system in Zimbabwe evolved over time?

(ii) What is the savings practice among Zimbabweans?

(iii) What drives the practice of savings among Zimbabweans?

(iv) Does saving culture affect economic performance in Zimbabwe?

1.5. Significance of the study

The total deposits-to-total bank liabilities ratio has been very low in Zimbabwe signalling a fall in the culture of savings among Zimbabweans. According to the Monetary Policy statement (2015), although deposits grew by 13.6% between January and December 2014, concern was however on the short term nature of these deposits. This negatively affected meaningful financial intermediation by the banking institutions.

There was an urgent need to come with strategies to restore a culture of saving in banks in order to provide funds for the much needed investment in Zimbabwe. The study into the determinants of restoring a culture of savings would help to inform the Central Bank, the Ministry of Finance and Economic Development, Bankers Association of Zimbabwe (BAZ), financial institutions particularly commercial banks and related government agencies to use the research results to come up with relevant legal, institutional, and economic frameworks for enhancing good practices of saving in banks in Africa in general and in Zimbabwe in particular. The study propagates the importance of investors' and depositors' confidence in promoting a robust financial system that enhances economic growth.

The study results may also be used by the Zimbabwean government and other African governments to mobilise investment funds through domestic savings. Promotion of internal sources of funds would be a viable option to spur economic growth and development given the drying up of Foreign Direct Investment (FDI) and limited funding from multilateral financial institutions like the World Bank, International Monetary Fund (IMF) and the African Development Bank (ADB).

The study hopes to stimulate academic discourse in the area of funds mobilisation through domestic savings for the growth and development of African economies. Greater emphasis by the academia has been placed on technological development and manufacturing sector growth as engines of growth and not much has been written on the role played a sound practice of saving in providing funds for economic growth and development. There is not much knowledge in Zimbabwe and Africa on the culture of saving as it relates to economic growth and development. Academic discourse has been done on investors 'and depositors 'confidence in relation to global crises and not much has been said about the thematic area within the context of economic challenges emanating from a deteriorated savings practice. In addition literature has emphasised on the activities of financial institutions particularly their liquidity through the analysis of the total liabilities to deposit ratio (TLD ratio) and not much has been written on deposits to liabilities ratio (DTL ratio) as a measure of the depositors activities in the financial system.

The results of the research can be used to inculcate a culture of saving among African depositors and investors in general and Zimbabwean depositors and investors in particular. Furthermore the research identified some of the strategies that can be adopted by the financial institutions in Zimbabwe and in Africa in general to motivate the citizens to become net savers and be able to finance their investments from domestic savings.

1.6. Scope of Study

The research focused on depository institutions i.e. commercial banks, savings banks, merchant banks and building societies. Other key stakeholders like the Central Bank, Deposit Protection Board and Ministry of Finance as well as the depositing and investing public formed part of the delimitation of the study. Trends in the performance of the banking system and savings behaviour prior and post the year 2000 were examined. The culture of savings among Zimbabweans was proxied by the percentage of total deposits to total bank liabilities

1.7 Limitations of the study

The research pertained to the Zimbabwean banking population and due to financial constraints the study did not cover all the areas of the country to capture inherent characteristics of certain sections of the population particularly the rural and the farming communities in the country. Thus the study was not able to unravel the savings trends among the rural and farming communities around the country as mainstream banks shunned them as they were perceived to be prohibitively costly to serve and had inadequate return on their

investment. However the sample used was carefully selected to provide answers to most problems of the study. Time was also another factor taking into account the researcher's demanding job at Chinhoyi University of Technology as well as travelling costs to other towns of the country. Despite the limitations the researcher managed to interview respondents from across the 10 provinces of the country and got an insight into the savings behaviour of the generality of Zimbabweans. Most of the research work was done during vacations when adequate time was available and most interviews were conducted during industrial supervision visits by the researcher to most of the provinces of the country.

1.8 Assumptions of the study

The study assumed that the banking public in Zimbabwe was rational and would save in banks in order to maximise their savings utility. The depositors were also assumed to be risk averse. The financial systems in Zimbabwe were assumed to be operating in a legal and policy framework as defined by the Reserve Bank of Zimbabwe (RBZ), parent government Ministry of Finance and related institutions like the Deposit Protection Corporation (DPC). The study also assumed that the economy was not performing well and that savings mobilisation was one of the panaceas of addressing the economic challenges.

1.9 Definition of key terms and variables

Financial system

Consist of institutions and arrangements that facilitate the purchase and sale of financial instruments such as corporate stocks and government bonds (Saunders and Cornett, 2009).

Personal Savings

These are savings by household units (Raj, 2004).

Corporate savings

These are savings by businesses achieved by not distributing to shareholders all the profits made in a year as liquid reserves to meet tax liabilities or to maintain dividends in the event of reduced trade or an increase in taxation. Corporate savings are affected by profits, estimated future prices, government policy and other subjective factors like financial prudence or directors' ideas towards expansion (Bhole and Mahakud, 2009).

Government Savings

These consist of savings by Central government achieved through a budget surplus, national insurance or when national pension contributions exceed current payments. They also include savings by public corporations and local authorities (Raj, 2004).

Fiducious financial systems

These are financial systems that can hold depositors' funds in trust and confidence (http://www.imf.org/chp2.pdf).

Economic growth

This is an increase in the economy's ability to produce real output of goods and services (Lipsey and Chrystal, 2007).

Gross Domestic Savings

Gross Domestic Savings (GDS) are defined as gross national disposable income less final consumption expenditure, plus an adjustment for the change the equity positions in pension funds (Lipsey and Chrystal, 2007).

Demand deposits

These are deposits in depository institutions which can be withdrawn by depositors upon demand i.e. whenever they choose (Kelly, 2008).

Short term deposits

These are deposits that can be withdrawn on demand and mature in not more than three months (Kelly, 2008).

Long term deposits

These are deposits that can be withdrawn after a long period of time after three months. They are also time deposits (Kelly, 2008).

Savings practice

This is the act of depositing money with commercial banks at regular intervals to earn interest (Finscope Consumer Survey Zimbabwe, 2014).

1.10. Chapter Summary

The chapter has covered the background of the study. It explored the savings trends in Zimbabwe and comparatively in Africa, the structural changes in the financial systems in Zimbabwe, research objectives, significance of the study, the scope of study, the study limitations as well as the assumptions of study. The key terms used in connection with savings practice and used in the study were also defined.

CHAPTER TWO

LITERATURE REVIEW

2.0 Introduction

This chapter reviews the research works by other academics on savings practices and promotion in general and in particular Zimbabwe. It explores the development of the Zimbabwean banking system and the culture of savings among Zimbabweans, drivers influencing savings culture among Zimbabweans as well as the effects of the savings practice on the performance of the Zimbabwean economy. The chapter concludes by critiquing and identifying gaps in literature on banking system developments, savings practices, determinants and impact on the performance of the economy.

2.1 Overview of the banking system

This section looks at the historical background of the Zimbabwean banking system, economic performance of the banking system and the trends in the main players of the system as well as the system environment. The section reviews the developments of deposits over the years.

2.1.1 Historical background of the developments in the Zimbabwean banking system

The banking system in Zimbabwe has evolved significantly over the years from the time it was a British colony up to independence and post-independence era. The Banking Act of Zimbabwe [Chapter 24:01] of 1999 defines banking business as a business of accepting deposits withdrawable or repayable on demand or after a fixed period or after notice. The deposits are employed in whole or in part through lending or any other means for the account and at the risk of the person accepting the deposit. Rose and Hudgins (2008) view the role of banks as a system that encourages individuals and institutions to save and then transferring the savings to the individuals and institutions planning to invest in new projects.

According to Brownbridge and Harvey (1998) many new post independent African countries embarked on financial sector reforms, however when Zimbabwe attained its independence, it did not change much the financial system inherited from the British. Although the government acquired majority stake in one of the foreign banks and a minority stake in another, it did not influence policy and allowed the banking institutions to be managed on commercial principles. However, the government had control over the direction of credit and interest rates. According to Maynard (1992) the government had 51% stake in the Zimbabwe

Development Bank (ZDB), now the Infrastructural Development Bank of Zimbabwe (IDBZ) which was mandated with infrastructural development although the bank remained relatively independent of government influence.

Brownbridge and Harvey (1998) noted that the Zimbabwean financial system was foreign owned and the sector was well developed with a relatively sophisticated range of financial markets and institutions established in the 1960s. In 1946 a national stock exchange was opened and by 1963, there were 13 brokers and 98 quoted shares. The exchange came out of the three regional stock exchanges that provided finance for mining which was opened in 1895 and closed in 1924 (Sowelen, 1967). Treasury bills were first issued in 1952 to provide the government with budget finance. A central bank was established in 1956 for the federation of Rhodesia and Nyasaland with Zimbabwe (then Southern Rhodesia) as a major player with the mandate of providing credit for Africans. Two accepting houses and two discounting houses were established in 1956 (Sowelen, 1967). When the federation broke up in 1963, the bank of Rhodesia and Nyasaland became known as the Reserve Bank of Rhodesia. This did not, however, result in financial deepening as measured by the ratio of money supply to GDP.

Table 2.1: Historical performance

Performance measure	**1954**	**1963**	**1980**
Money supply to GDP	27%	21%	35%
Commercial bank lending	9%	11%	Statistics unavailable
Deposits	Unavailable	£36million	Unavailable

Source: adopted from Brownbridge and Harvey (1998 p 165)

The statistics in Table 2.1 above showed that commercial banks managed to increase lending but failed to mobilise increased deposits rather they had to run down their balances at their overseas head offices. Brownbridge and Harvey (1998) however noted that some financial deepening occurred after 1963 as ratio of money supply to GDP increased to 35% in 1980.

Owing to sanctions and tight exchange controls commercial banks had to rely on domestic mobilisation of deposits. After independence the Zimbabwean banking system did not make much changes, rather implemented the policies on a gradual basis (Maynard, 1992). The new government did not want to attack the interests of white business community of which the commercial banks formed an important part in view of the economic costs of inappropriate

intervention (Smith and Simpson, 1981 cited by Brownbridge and Harvey, 1998). The other argument explaining why the banking system had not been intervened was that it enjoyed the backing of the central bank which had been established 24 years prior to independence in 1980. It also had experienced staff and had established reputation and commitment to market principles.

Thus the first post-independence decade, the Banking Act (1965) was the main legislative framework. Since this was enacted when most commercial banks where foreign owned, there were no directions on prudential lending, insider loans, proportion of shareholder funds that could be lent to one borrower, definition of risk assets, and no provision for bank inspection. The Banking Act (24:01), which came into effect in September 1999, was the culmination of the RBZ's desire to liberalise and deregulate the financial services. This Act regulated commercial banks, merchant banks, and discount houses. Entry barriers were removed leading to increased competition. The deregulation also allowed banks some latitude to operate in non-core services. It appears that this latitude was not well delimited and hence presented opportunities for risk taking entrepreneurs. The RBZ advocated this deregulation as a way to de-segment the financial sector as well as improve efficiencies (RBZ, 2000 p 4.) These two factors presented opportunities to enterprising indigenous bankers to establish their own businesses in the industry. The Act was further revised and reissued as Chapter 24:20 in August 2000. The increased competition resulted in the introduction of new products and services e.g. e-banking and in-store banking. These entrepreneurial activities resulted in the "deepening and sophistication of the financial sector" (RBZ, 2000:5).

2.1.2 Financial sector liberalisation in the 1990s

The main objectives in the liberalisation policies enunciated by the Economic Structural Adjustment Programme (ESAP) were to remove controls over the direction of lending, increase competition by licencing new banks and to improve banking services. The policy intended to enhance efficient financial intermediation and to increase deposits by higher real interest rates, thus increasing credit to support private sector development (Reserve Bank of Zimbabwe, 1995). Statistics from the RBZ (1995) showed that the deposit rate was above the inflation rate in three out of twelve years between 1980 -1991 and the average gap was modestly negative compared to other African countries like Zambia. However the ratio of interest bearing deposits to GDP fell from 52% in 1980 to 38% in 1991. In 1992 it fell to 12.4% owing to negative returns on deposits and out-migration of white population that had

held substantial proportion of personal bank deposits. According to the IMF International Financial Statistics, the average deposit rate rose from 8.8% in 1990 to 14% in 1991 and ranged between 24%-35% thereafter.

According to Brownbridge and Harvey (1998), the Zimbabwean banking system licenced indigenous banks fifteen years after independence because the inherited financial system was more developed and extensive than most African countries as well as the availability of skilled and experienced personnel. They further observed that the licensing process was as conservative as authorities were aware of the problems with indigenous banks as evidenced elsewhere in Africa. The licencing process provided plenty opportunity to reject applications as the Registrar of Banks critically examined the proposed capital, composition of the Board of Directors, quality of senior management, the business plan and a resource mobilisation strategy. The analysis looked at the worst case scenario and the normal case scenario in checking if the bank would survive during drought years. Seidman (1986) noted the difficulty in raising the minimum capital required. Financial liberalisation could also not have resulted in an increase in additional foreign banks because of the minimum of 30% shareholding, although already established foreign banks were allowed to continue in their 100% foreign ownership.

Initially, the reforms led to the growth of the financial sector at an average rate of 3 percent per annum when other sectors of the economy were contracting. While foreign banks still dominated the market, new entrants – new commercial banks, merchant banks, finance houses, unit trusts, leasing firms, exchange bureaux, venture capital companies, and formal and informal microfinance institutions – emerged that created competition. However, the reforms did not address the structural causes that hindered financial inclusiveness. The formal banking sector continued to serve prime clients, as it had done for more than a century, leaving the small-scale sector unbanked. In addition, the majority of new entrants preferred to go into merchant and discount banking rather than into commercial banking in order to engage in trading risk-free government securities. Empirical evidence has shown that financial sector reforms would still have not resulted in deepening financial inclusiveness because the macroeconomic environment was not stable (Boyd et al, 2001).

With inflation rates in Zimbabwe averaging 32 percent per year during the reform period of the 1990s – double the critical threshold of 15 percent, inflation had already started to adversely affect the productive sector. Therefore, it is hardly surprising that neither existing

banks nor new banks were not in a position to service the untapped small-scale sector, but instead competed for government business and established corporate customers. The reforms did not improve access to credit for poor and marginalized groups and did not bolster development finance. A study by Chipika et al., (2000) reported that financial reforms had a largely negative impact on agricultural credit. In four districts surveyed it was found that there had been a decrease in access to credit, an increase in the cost of credit, with personal sources of finance accounting for over 86 percent of total household finance.

2.1.3 Main participants in the Zimbabwean banking system

Presently, the financial sector comprises of the Reserve Bank of Zimbabwe (RBZ) at the apex, discount houses, commercial banks, merchant banks, finance houses, building societies, the People's Own Savings Bank (POSB), insurance companies, pension funds, venture capital companies, asset management companies, developmental financial institutions, the Zimbabwe Stock Exchange, Microfinance Institutions (MFIs) and money transfer agencies (that intermediate remittances). At the end of 2008 there were 28 banking institutions (down from 32 as at 31 December 2003), 17 asset management companies and 75 operating microfinance institutions (see Table 2.2).

Table 2.2: Number of Banking Institutions

Types of institutions	**December 2003**	**December 2008**	**December 2013**	**December 2014**
Commercial banks	13	15	15	14
Merchant banks	5	6	2	1
Discount houses	6	3	0	0
Finance houses	4	0	0	0
Building societies	4	4	3	3
Savings banks	1	1	1	1
Total	**32**	**28**	**21**	**19**
Microfinance institutions	17	75	167	166

Source: Monetary Policy Statement (2015)

Three commercial banks had some degree of state ownership, namely, ZB Bank, CBZ and

ZABG. Four of the private commercial banks – South African-owned Stanbic Bank Limited and the Merchant Bank of Central Africa (MBCA), and British-owned Standard Chartered Bank and Barclays Bank – are multinational banks with a majority of foreign ownership. As at September 2007 these multinational banks collectively commanded 55 percent of the commercial bank market share. Since then they have faced the prospect of losing their majority foreign ownership as a result of the new Indigenization and Economic Empowerment Act (No. 14 of 2007) that requires them to indigenize 51 percent of their shareholdings.

While most institutions had the majority of their branches in major towns, there was a relatively good spread of branches throughout the provinces of the country, with the POSB and Central Africa Building Society (CABS) having networks that extend to rural and remote areas. Lack of infrastructure such as reliable energy supplies, telecommunications and road network has, however, hindered rural penetration. According to a survey by the National Task Force on Microfinance concluded in 2006, the size of the market not served by existing financial institutions was still large.

2.1.4 Empirical Literature on banking systems

Mlachila et al (2013) assessed the main features and performance of Sub-Saharan African banking institutions particularly new developments taking place in the financial sector. The study concluded that most banking systems in Sub-Saharan Africa remained underdeveloped compared to other developing regions, although gradual financial deepening was noticeable. However, small national markets, low income levels as well as weak credit rights and judicial enforcement were cited as hindrances to development. Mlachila et al (2013) however noted that the expansion of mobile-phone based banking and the spread of Pan African banking groups have changed the banking landscape and posed a fresh challenge to the financial regulators.

Mecagni et al (2015) took stock of the banking sector developments in Africa in terms of the challenges and policies to deal with the challenges. The study concluded that the diverse conditions in the 45 countries in terms of the population size, income, level of resource endowment and socio political stability significantly affected the pace of development of the financial systems. Mecagni et al (2015) also noted that there was considerable variation in depth, size, reach and complexity within Sub-Saharan Africa. The study recommended that financial sector reforms should be tailored to country specific challenges although generic

policy recommendations like financial inclusion, removal of structural impediments to credit, enhancing governance, regulation and supervision strengthening were cited.

2.2 Savings culture among Zimbabweans

Savings are defined as a leakage out of the circular flow of income meaning they are part of income that has been left unconsumed and thus not given back to the circular flow of income but is rather spared for future use (Mankiw, 2007). The forgoing of present consumption for a higher level of future consumption is a better way of defining savings. Savings also are done through the depositing of money in banks or other investment where a future greater return is expected, thus savings should equal investment without this the purpose of savings is distorted. Gardiol (2004) concurred with Mankiw (2007) in defining savings as an act putting aside current income in order to consume or invest later on. The authors went on to allude to the fact that savings can either be kept at home, deposited in a savings account or invested in different types of capital.

Hofstede and Bond (1988) defined culture as the norms and values that shape a person's behaviour as well as one's perception of the world. They argued that culture underlie the prevailing practices and norms in a society. Gray (1988) postulated that culture is an essential element in understanding how social systems change as norms and values exhibit the behaviour of groups of people in their interaction within and across systems. He further confirmed that culture is reserved as a whole for nations even though sub-cultures can subsist within this national culture, which can be used for the level of an organisation, profession or family. There is a pattern of national culture and banking practices across the country. Licht, Goldschmidt and Swartz (2005) noted that values are an essential element of culture taking the form of meanings, symbols and assumptions about what is good or bad, legitimate or illegitimate. Raj (2004) categorised savings into household savings, corporate savings, gross government savings and national savings.

2.2.1 Tenets of the culture of saving

Gardiol (2004) is of the view that savings motives differ in terms of approaches and terminologies across households in Africa, Asia, Europe and the Americas. According to Howcroft, Hamilton and Hewer (2002) most poor households live with uncertainty in terms of their ability and capacity to meet their family's basic consumption needs and would always

want to save as an insurance against bad times and emergence cases. These could include bad harvest, sickness, and job losses among other cases. He therefore argued that savings allow households to equilibrate cash-flows evenly between different periods.

Households especially in Africa and Asia save small amounts so that they accumulate lump-sums to cover lifecycle needs like marriage of daughter or son, burying a parent, paying children school or tertiary fees. The accumulated savings can be used in increasing household capital through the construction of houses, acquisition of production and agricultural equipment (Raj, 2004). Claus and Claus (2015) concurred with Duflo et al (2005) that savings accumulation can be invested in visible assets like cattle in Sahel region of West Africa. They call this investment social capital as this gives social status and also provides a higher return than monetary savings with financial institutions.

Ruthven (2001) argued that households accumulate assets for their children's future or to have disposable income in order to share with a friend or relative in urgent need. Gardiol (2004) argues that this motive for saving is often cited in formal and informal financial institutions. However some financial institutions impose on clients to deposit money in an account as a prerequisite to obtain credit.

2.2.2 Conditions for a good practice of savings

According to Gardiol (2004) conditions for good practice of savings can be categorised into success factors that emanated from the institutional perspective, macroeconomic conditions and the legal framework. These conditions once propagated can stimulate savings in a country.

2.2.2.1 Institutional perspective

(i) Level of formality

Savings practices thrive where there are legal guidelines that are observed. In case of Zimbabwe, the guideline are enshrined in the Banking Act (9/1999 and 22/200), Reserve Bank Act and the Deposit Protection Regulation (2003).

(ii) Strong management and financial viability

Gardiol (2004) argued that strong management and governance are key requisites when dealing with savings from clients. Financial institutions must have financial resources and know-how to manage large volumes of money and less predictable transactions. Households

will have confidence in the financial institution where there is clear ownership and transparency. Depositors feel more secure if they are aware of the quality and how diversified their institution's portfolio is. Management should be able to make sense and closely follow the macroeconomic indicators.

(iii) Image and accessibility

Potential depositors are interested in the image of safety and the accessibility of the financial institution. The institution must be accessible to depositors with respect to hours of operation and location. Hours of operation should be structured in such a manner that adapts to the client's habits and in case of remote areas; institutions should install mobile units to collect all savings.

(iv) Internal and external controls

Financial institutions that take deposits should be subject to external supervision and regulation by public authorities that is the central bank. Gardiol (2004) however noted that sometimes this supervision was inadequate owing to limited resources and skill. Over and above external supervision, financial institutions should have developed and efficient internal control mechanisms to safeguard the client's deposits.

(v) Diversified offer

Financial institutions should offer a variety of services ranging from liquid low interest deposits to high interest time deposits. According to Fabozzi et al (2011) financial institutions would be more competitive if they can offer a wide range of products. Financial institutions that are well diversified across business lines and geographies experience less volatility, cyclicality and concentrated risk (Fell, 2000).

2.2.2.2 Legal and economic conditions for savings

(i) Macroeconomic and political conditions

Gardiol (2004) argued that stable macroeconomic and political environments are crucial for fostering depositors' confidence in the financial institutions. Llewellyn (1999) found that most financial crises have been triggered by macroeconomic and political instability. Institutions can reduce the negative consequences of political and macroeconomic instability by constantly monitoring the indicators and adjusting their portfolios accordingly.

(ii) Legal framework

The main objective of the financial institution's legal framework is to protect savers from losing their money and the financial system from collapsing. Hillier, Grinblatt and Titman (2012) argued that regulation and supervision of financial institutions should contribute to professional management, transparency of operations and protection of customers against abusive practices. Furthermore supervision should also avoid indebtedness, excessive interest rates and fees. Gardiol (2004) distinguishes between prudential and non-prudential regulation. The former aims at protecting the financial market and the client savings while the latter is meant to enable the financial institution to operate legally. When a financial institution is in trouble it may be saved from collapse by two key protective regulatory instruments namely the lender of last resort by the central bank and deposit insurance (CGAP report, 2002).

2.2.3 Review of savings trends in Zimbabwe

The World Bank National accounts data (2013) showed that savings rates in Zimbabwe from 1982 -1994 where positive and comparable with recommended rates as illustrated by Figure below. The World Bank has calculated Gross Savings (GS) as Gross National Income (GNI) minus Total Consumption (TC) plus Net Transfers (NT).

$GS = GNI - TC + NT$----------Equation 2.1

$$Gross\ savings\ rates = \frac{Gross\ Savings}{Gross\ Domestic\ Product} \times 100$$

World Bank National Accounts data (2013) indicated that the savings rate for Zimbabwe in 2013 was 4.355%.

Figure 2.1: Savings rates from 1982 -1994.

Source: World Bank National Accounts data (2013)

Analysing the nature of the savings in Zimbabwe showed that they are driven by transactional motives. Current research has shown that 31% of Zimbabwean adults do not save and those who save keep savings at home so that they are able to pay for their living expenses during hard times as well as for school fees and emergences (Finscope, 2011). The survey has also shown that 27% of the urban adults save at home and 12% of the adults use savings clubs. Current products and services by financial institutions focus on adults who receive a regular income/salary. Evidence from Finscope (2011) indicated that Zimbabweans save for living expenses, educational expenses and for medical treatment.

Kandlela (2013), the Chief Executive of Post Office Savings Bank (POSB) alluded to the fact that Zimbabwe had a low deposit base of US$3.64 billion in 2013 compared to US$3.59 billion in 2012, a marginal increase of just 3%. The Finscope (2011) revealed that a substantial number of people in the rural areas saved their money outside the formal banking system due to limited banking products being offered. It is estimated that US$2.5 billion is circulating in the informal sector (Kandlela, 2013). Commercial banks in Zimbabwe are offering prizes for clients that are holding a certain balance for a defined period of time for instance the whole calendar month.

According to the Bankers' Association of Zimbabwe (BAZ) (2013) Zimbabwe had around US$3.8 billion deposits in the banking sector and demand deposits constitute the lion's share of 52% of total of deposits. Of the total deposits only 17% are long term deposits placed more

than one year, 13% represent savings accounts and 20% are short term deposits placed for less than one month. BAZ (2013) attributed the rising household debt as inhibiting meaningful savings in the country. The association concluded that economic productive capacity can only be enhanced if Zimbabwean citizens broaden their savings not only through mechanism like savings accounts with banks but also through mechanisms such as endowments and retirement schemes with insurance companies.

2.2.4 Review of similar studies

Although some studies have been done in Sub-Saharan Africa, developing countries and Zimbabwe in particular, however not much have focussed on how savings can be restored in Zimbabwe in order to boost the productive capacity of the country in view of dwindling donor funds and Foreign Direct Investment (FDI). The section will however highlight some of the researches done which are closer to the thematic area covered by this study.

Grigoli, Herman and Schmidt – Hebbel (2014) presented new evidence on the behaviour of savings in the world. Grigoli et al (2014) extended the previous empirical research in five dimensions covering 165 countries from 1981- 2012. Notably the study explored differences in savings behaviour during 2008-2010 financial crisis period in four different country groups and searched for commonalities and differences in behaviour across national, household and corporate savings rate. Grigoli et al (2014) concluded that signs of reported coefficients were not consistent with theory and regional trends on private savings rates evolved heterogeneously from 1981-2012 for instance boomed in Asia but experienced greater volatility in the oil producing countries. The study also concluded that private savings rates in developed countries were more sensitive to income growth than in developing countries.

In another study, Mpofu (2014) looked at the applicability of Life Cycle Savings Hypothesis (LCSH) to Zimbabwe in the post dollarization era. A comparative and survey research design was done on 512 respondents in only two cities Bulawayo and Gweru. Mpofu (2014) concluded that the major motive had been the purchase of land and housing. Savings for retirement only came after children's education and the precautionary motive. In addition Mpofu (2014) found the LCSH not applicable to explaining savings behaviour of Zimbabweans.

Chikoko, Le Roux and Dzingirai (2013) made a micro econometric analysis of the determinants of savings behaviour in Zimbabwe from 2009-2012 after the adoption of the

multi-currency system. The study used a micro econometric approach of individual characteristics of savers. Chikoko et al (2013) used a Poisson regression model and concluded that the 13 variables used were significant predictors of savings.

Beck and Cull (2013) studied the state of banking across Sub-Saharan Africa and concluded that African banking systems are still shallow but stable. The study used cross country firm level surveys to gauge access to financial services and importance of financing constraints for African enterprises. It concluded that African enterprises and households were not using much financial services compared to their peers in developed countries. Beck and Cull (2013) also recommended the innovations that African banking systems can adopt to overcome barriers of financial inclusion.

Another study was done by Hooi (2012) and it looked at the effects of culture on international bank disclosures on 37 listed domestic commercial banks from 17 countries. Hooi (2012) found long term orientation to be a non-significant culture value with banking disclosures.

In 2011, there was a Finscope consumer survey carried out in Zimbabwe whose objectives were to measure the level of financial inclusion, describe the landscape level that is the types of products as well as the drivers and barriers to the usage of financial products. A face to face interview of 3984 adults was carried out from August to September 2011. The survey concluded that most banking businesses in Zimbabwe were driven by transactional and savings products and the use of formal banking were driven by insurance and savings products.

The study also concluded that Zimbabweans use informal mechanisms of saving, insurance and borrowing. 40% of the Zimbabwean adults were financially excluded both formally and informally while only 12% of the rural adults used commercial banking products. Comparatively with other African countries, Zimbabwe was still very low in terms of the usage of financial products as illustrated by the Table 2.3 below.

Table 2.3: African access strand

Basis of inclusion	Highest	Zimbabwe	Lowest
Banked	63% (South Africa)	24%	12% (Mozambique & Tanzania)
Non-banked products	20% (Lesotho)	14%	1% (Mozambique)
Informal banking	42% (Uganda)	22%	4% (Namibia)
Not served	78% (Mozambique)	40%	19% (Lesotho)

Source: Adopted from Finscope (2011:6)

Finscope (2011) also concluded that 31% of Zimbabwean adults did not save and 27% of the 69% saved at home. Zimbabweans were driven to save by living expenses, education and emergencies.

The other study was done by Loayza, Schmidt and Serven (2000) and it looked at savings in developing countries and it used the World Savings Database to review the current state of knowledge on the determinants of their savings rates. The study analysed the key policy and non-policy determinants of private savings rates and found that savings rates around the world vary widely. Asia saves more than 30% of its Gross National Disposable Income (GNDI) while Sub-Saharan Africa saves less than 15%. The research concluded that higher savings rates go hand in hand with higher income growth. Loayza et al (2000) found that savings rates were influenced by non-policy determinants like persistence, income, growth, demographics and uncertainty. Policy determinants affecting savings rates included fiscal policies, pension reform, financial liberalisation and external borrowing as well as foreign aid. Loayza etal (2000) observed that controls in external trade and capital inflows in Zimbabwe and Kenya contributed to high public saving rates. In the case of Botswana the study found that prudential public management of non-renewable resources increased high public savings rate.

Attanasio, Picci and Scorcu (2000) analysed long term and short term correlations among savings, investment and growth rates of 123 countries from 1961-1994. The study used Granger statistical concept to show causality on panel data of countries. Attanasio et al (2000) concluded that savings rates and investment rates showed a substantial amount of persistence while growth rate was less persistent.

2.2.5 Lessons learnt

An analysis of some of the studies done on the thematic area of savings in a developing country like Zimbabwe brought out important lessons. Savings rates for developing countries are comparatively low compared to other economies in Asia, Europe and America (Beck and Cull, 2013; Grigoli etal, 2000 and Loayza et al, 2000). Most African financial systems offer limited financial services (Finscope, 2011) Increased savings rates are linked to high growth and investment (Attanasio et al, 2000 and Loayza et al, 2000). Most financial transactions in Africa are carried out in informal systems (Finscope, 2011). Zimbabwean banking systems are driven transactional products (Finscope, 2011). There are greater savings opportunities in Africa as the majority of the adult population is still unbanked (Finscope, 2011).

2.3 Drivers influencing savings culture among Zimbabweans

The determinants of savings in general and their specific effects on government policies are a pivotal force in investment and economic growth. The level of savings at household level is dependent on the marginal propensity to save (MPS) of the economic household units. MPS is the proportion of a small change in disposable income that would be saved, instead of being spent on consumption (Carroll, 1996). This is illustrated by the following set of equations:

$$Y_d = C + S \ldots\ldots\ldots\ldots\ldots\ldots\ldots\ldots\ldots Equation\ 2.2$$

Where Y_d stands for disposable or take home income, C consumption and S savings. Thus disposable income is linear summation of consumption and savings. Generally savings also depend on the willingness and ability of individuals and corporate to save. Some of the determinants are to be expounded below.

Income growth and income level

Income is also a major determinant of the level of savings. Subsistence-consumption theories suggest that countries with higher income levels tend to have a higher saving rate; the aggregate savings will increase in response to an increase in income growth and vice-versa when income is low consumption tends to be high.

Research by Grigoli et al (2014) identified the fact that there was a positive relationship between private saving rates and income levels and income growth. Permanent Income Hypothesis (PIH) and Life Cycle Hypothesis (LCH) predict that a large proportion of the

current income should be saved rather than consumed. According to the two hypotheses, consumption habits should reinforce the saving effect predicted by PIH for higher current income. However, when fundamental assumptions of the PIH and the LCH are not satisfied and when consumption habits are not that strong, current income may raise consumption with lower savings effect. This arises normally when the consumer is constrained from borrowing or when the consumer is very poor that he or she consumes close to all the subsistence income. Grigoli et al (2014) concluded that in such cases the marginal propensity to consume current income will be higher compared to the marginal propensity to saving current income.
The income used in this regard is unobserved and reflects permanent and temporal components of income and that the permanent income should be consumed while the temporal income should be saved. Any deviation from this prediction is observable when the assumptions of PIH and LCH are not satisfied.
When income is growing at a higher rate, this tends to result in an upward approximation of wealth and this might reduce savings under the PIH. However according to the LCH higher wealth may lead to less consumption and more savings.

Wealth

Consumer wealth is described as comprising of net financial assets, real assets i.e. property, and consumer durables as well as human wealth defined as the discounted present value of expected future labour income. If Ricardian Equivalence Hypothesis (REH) holds then consumer wealth is indistinguishable from national wealth after full consolidation of household, corporate, and government assets and liabilities. Grigoli et al (2014) concluded that the saving effect of wealth and its components is ambiguous and has no clear relationship.

Rates of return on financial assets

A return is a quantifiable measure of investment performance, normally the profit expressed as percentage of the investment amount. It is the investment's terminal value minus its initial amount as a proportion of the initial investment.

According to the PIH and the LCH, an increase in the rate of return in a financial asset implies income, substitution, and human-wealth effects to the holder. When the consumer is a net creditor or holds more financial assets the impact of an increase in the rate of return on savings will have a positive effect on substitution and human wealth, while effect will be

negative for income and hence the combined effected cannot be easily determined. On the other hand when the consumer is a net debtor the effect on income is negative. In this regard higher bank deposit rates will reduce lending and savings.

Relative prices

Relative prices of consumption and major consumption components affect savings because they have a substitution and income effect. When current consumer price levels increase, current prices of consumer goods increase relative to past prices and this can result in higher savings. Inflationary tendencies are signal of macroeconomic instability and this will therefore result in an increase in precautionary savings. Higher expected future inflation lowers the ex-ante real interest rate resulting in inter-temporal substitution, income, and human-wealth effects that may be ambiguous. This may result in a positive effect on savings by savers and either a positive or negative effect on net financial asset positions.

When terms of trade improve, thus results in an increase in net income from exports thus benefiting consumers by a proportional positive effect on income. Generally imported consumption constituted a large proportion compared to exported consumption therefore terms of trade will positively affect savings. Mpofu (2014) argued that a change in the current relative price level of different consumption categories has an ambiguous effect on the consumption deflator and therefore on saving. Similarly, an expected future appreciation of the real exchange rate has an ambiguous effect on saving.

Risk and uncertainty

Loayza et al (2000) postulated that precautionary saving theory predicts that high levels of classical and Knightian uncertainty result in higher precautionary savings. The levels of uncertainty are measured by larger second moments of asset returns or larger market volatility indicators. When such risks increase, this will lead to higher savings. However, when market volatility is extreme or financial, macroeconomic, and political forms of instability turn into crises, agents lose confidence in financial instruments and the institutions that issue or back them such that saving declines. Thus, the effect of risk and uncertainty on saving becomes eventually ambiguous.

Borrowing constraints

Mpofu (2014) and Grigoli et al (2014) concurred in that tighter current borrowing constraints reduce the access by consumers to credit, and this will therefore increase savings. This effect is reflected by an increase in the buffer-stock savings by risk-averse consumers as they anticipate tight future borrowing constraints. Some of the proxies for domestic borrowing constraints include money and credit flows in addition to current income of the household.

However a proxy for foreign borrowing constraints affects foreign savings or the current account deficit. This only becomes a valid determinant of savings when a country has a limitation or a binding quantitative restriction in its access to foreign funding. However in the absence of such limitations or such quantitative constraints and when a price variable like the sovereign debt premium reflects the cost of external borrowing, the premium and the current account jointly respond to savings and investment decisions in the domestic market. The sovereign debt premium is an important component of the cost of foreign funding and will therefore affect savings the same way as that of interest rate that affect the debtor positively. In addition government restrictions imposed on international capital flows affect private savings as they limit the issuance of foreign liabilities and this is likely to increase the levels of savings (Grigoli et al, 2014).

Financial depth and financial sector development

Masson et al (1998) argued that development of financial and capital markets with depth and sound regulation result in a diversified supply of savings products and investment vehicles or instruments that are similar to the instruments offered by the international market. These had the knock-on effect of intensifying home bias in domestic savers' allocation of worldwide saving and, possibly, raise private saving flows. Financial depth that includes bank credit stocks, financial assets, or broad money holdings could be largely associated with higher saving. However, the latter are also important components of consumer wealth.

The factor was also presented by Kelly and Mavrotas (2003) in a discussion paper to the World Institute for Development Economics Research and it looked at the impact of financial sector development on private savings in a developing Sri Lankan economy. They used an index for financial sector development comprising of deposit money bank assets to central bank assets, liquid liabilities to GDP and private credit by deposit money banks and other financial institutions to GDP. Bandiera et al (2000) however argued that the definition of

financial development should include various aspects of regulatory and institutional building process of the financial sector.

Kelly and Mavrotas (2003) identified that there was a lack of financial intermediation in developing financial markets because of a mismatch between institutional savings and investment. They further advanced the notion that many policies introduced into developing countries by donors have discouraged deposit mobilisation such that numerous small savers that exist have been overlooked as a source of internal funds for fixed capital formation. However the government of Zimbabwe does not encourage much donor activities but savings have remained subdued over a long period of time. Kelly and Mavrotas (2003) further advanced the notion that the financial sectors of developing countries lacked incentives for individuals to save and failed to effectively convert the savings into credit for borrowers.

The index results by Kelly and Mavrotas (2003) concluded that there was a significant positive influence of financial sector development to savings. The index was constructed based on the measures of the relative size of the financial sector including absolute size and the activities of the financial intermediaries. The relative size was measured as a ratio of deposit money bank assets to central bank assets, absolute size measured by liquid liabilities to GDP and activities by financial intermediaries are measured by the ratio of private credit by deposit money banks and other financial institutions.

Demographics

The factor emanated from the "Life Cycle" Hypothesis of saving that was promulgated by Modigliani and Brumberg (1954) and United States tested by Ando and Modigliani (1963). The factor variable showed the effect of potential aggregate savings emanating from differences in saving behaviour across different population age groups. According to Modigliani (1970), age and geographical distribution tended to have an impact on savings. He argued that households tended to have negative savings during their youth for the simple reason that they will be earning low income, have positive savings during their productive years or at their career peak and negative savings when they get old and retire from their jobs. The demographic patterns of households are therefore not homogeneous but change according to the household's life cycle stage. Thus Modigliani (1970) suggested that the general pattern of savings take a form of a hump-shaped pattern of saving over the life cycle of the household. The characteristics used to describe a country's demographic structure include the young, the middle aged, the old aged and old-age dependency ratios the ratios of

the young and the old aged to the total population as well as the active age. According the Life Cycle Savings Hypothesis, the large the ratio of the young and the old in these age groups, the smaller would be the aggregate savings in a country.

Mpofu (2014) had another dimension to the demographic variable in the form of the urbanisation ratio which he defined as the percentage of the total population living in urban areas that is in towns and cities. The demographic factor has an impact on the country's savings. According to the conventional hypothesis, city lighting is a reflection of huge consumption opportunities by urban dwellers and it thus reduced urban savings relative to rural savings. Consequently this can make farmers larger income uncertainty and less insurance and credit opportunities because of perceived high consumption by urban dwellers and will in turn lead to higher savings in rural areas.

Poverty and income distribution

Mpofu (2014) observed that as average consumption out of income declines with the distance between income and a subsistence level of consumption, the level of savings decline. This is because a larger share of population will be falling below absolute poverty for a given income inequality. Thus the effect of the relative distribution of personal income or distribution of personal wealth on savings may be ambiguous.

Fiscal policy

The Ricardian Equivalence Hypothesis predicted that there was an offset relationship between private savings due to a change in public sector saving. Although full offsetting is empirically unlikely, but when there is higher government savings, private savings tend to be lower. However government consumption has an ambiguous effect on savings (Loayza et al., 2000).

Government spending components

According to Mpofu (2014) government spending on education, health, and other in-kind transfers reduced private consumption. This is however possible when spending by the government can be used as substitutes for similar private consumption categories and this will therefore raise private savings. However, when the transfers by the government are paid

by cash, they will have the effect of raising disposable income and the impact on private savings cannot be easily determined. On the other hand an increase in government transfers and social spending reduces household uncertainty about the future resulting in reduced need for precautionary savings. Therefore the total effect on private savings as a result of increased government spending on transfers is negative.

Pension policy

When a country operates effective mandatory contributions to a fully-funded pension system, this tended to reduce voluntary savings by the contributors. In Zimbabwe there is mandatory contribution National Social Security Authority (NSSA) and this has not affected much private savings.

Employment

The factor was added by Chikoko et al (2013) and viewed it as an important determinant of private savings. The more people are employed the more is their ability to generate income that would be saved if not fully consumed. When more people are employed at a single household, the income earned will not be exhausted in consumption but will be partly saved and partly consumed. However when many individual characteristics are factored in influences can give ambiguous results. Mpofu (2014) modelled the characteristics into an econometric function predicting savings using age, marital status, religion, education, position in the household, household size, type of accommodation, place of accommodation, employment status, income, number of people employed in the household, and expenditure per month. Mixed results were found from the modelled econometric function.

2.3.1 Empirical Literature on the Determinants of savings

Schmidt-Hebbel et al (1992) tested the household savings response to income, rates of return, monetary wealth, foreign savings, inflation and demographic variables. Results showed that income and wealth variables affected savings strongly while interest rate and inflation had an ambiguous effect on savings. On the other hand foreign savings and monetary assets had a negative effect on household savings, a suggestion of the importance of liquidity constraint in developing countries.

Kukk and Staehr (2015) assessed the effect of different macroeconomic variables on the dynamics of corporate and household savings using panel data from Central and Eastern

Europe. Results showed that changes in the macroeconomic environment affect both corporate and household savings but with marked differences across sectors. The differences were pronounced for output gap, real interest rate, inflation rate and current account balance. However factors like employment rate and real exchange rate were not pronounced for both corporate and household savings.

Loayza et al (2000) viewed savings determinants in developing countries using World Bank database. The determinants were categorised into policy and non-policy determinants. Results showed that for some there was an ambiguous relationship with savings rates for instance financial depth and distribution of income and wealth. It was negative for domestic and foreign borrowing constraints and fiscal policy variables. Apergis and Christou (2012) examined the impact of age dependency ratio on domestic savings rates for 16 African countries using annual panel data. The analysis was done using panel unit roots, panel co-integration and panel causality tests. Results showed evidence of panel co-integration and panel causality showed a negative relationship between dependency rate and savings rate. Thus empirical studies have been carried on the determinants of savings and mixed results have been obtained.

2.4 Effects of savings practice on the performance of the Zimbabwe economy

The national savings rate when in tandem with the economy's investment rate, reduces the vulnerability to sudden shifts in international capital flows driven by uncontrollable variables like herd behaviour or self-fulfilling investor expectations or concern about future policy direction (Le Roux, 2010). Recent turmoil in the international financial markets was testimony of the adverse impact of low savings on the economy in the event of international capital flow reversals. Experiences in Asia and elsewhere around the world have shown that high savings rates are associated with higher economic growth and less economic volatility. Jagadeesh (2015) noted that sufficient savings are considered as engine for economic growth as they necessitate the accumulation of fixed capital. According to Kuno (2011) cited in Jagadeesh (2015**),** economic development and prosperity in Sub-Saharan Africa (Zimbabwe included) have been constrained by inadequate savings and investment. Savings create capital formation which further results in technical innovation and progress, accelerated labour productivity thus resulting in an increase in national output, income and employment. These in turn solve typical macroeconomic problems like inflation, unemployment, balance of

payments problems, poverty, inequality and debt burden characterising most African economies (Lipsey and Chrystal, 2007).

The Harrold Dormer economic models of 1939 and 1945 after World War II showed a strong and direct relationship between savings and economic growth. Overwhelming evidence is abounding from studies carried out in Africa of a strong link between savings and economic growth. A study in Namibia (Festus, 2011), a study in Zambia (Mphuka, 2010), a study in Kenya and South Africa (Odhiambo, 2009) have all shown a strong causality between savings and economic growth. However a study in Zimbabwe showed no causality between investment and economic growth (Mandishekwa, 2014).

2.4.1 Economic Developments in Zimbabwe

Since the 2009 introduction of the multiple currency monetary system[4] and the then formation of a Coalition Government, macroeconomic stability has existed in Zimbabwe. The hyperinflation and perpetually declining real national income were harnessed. The economy had experienced significant growth and remarkably low inflation rates. An unwelcome consequence of the current monetary system in the country has been the inability of the authorities to print money or mint coins, thus rendering the Reserve Bank of Zimbabwe almost obsolete. With increasing economic activity, business and employment, there has been a general rise in the demand for money.

This outstripped the current money balances in the economy and liquidity challenges have become the norm in the economy since 2009. Savings have become generally low and significantly low compared to regional trends. Chikoko et al (2013) carried out a survey of 315 households in Harare and Bulawayo: the two largest metropolitan cities in Zimbabwe. Using the data gathered, an econometric binary logistic model was estimated. The results showed strong correlation between household savings and bank-specific trends such as the rate of debit and credit card use and demographic factors like the ages of depositors. The study also provided conclusions, micro and macroeconomic policy recommendations to mitigate the problem.

The rate and level of savings in an economy have been postulated by economic theory to be drivers to long term economic growth. According to Fell (2000), savings are said to provide the loanable funds needed by firms as capital and investment. Furthermore the availability of

[4] A system where nine forms of legal tender were introduced in the country

savings provides a basis for the money creation process subject to the money multiplier and reserve requirements (Mishkin, 2004). The above is universal to all economies. Zimbabwe, since the prolonged economic depression from the turn of the century to around 2008, suffered massive losses in monetary value and in turn the incentive to save. A few years after the economic downturn, the economy was in the recovery mode but still fell short of the targeted growth rates. By end of 2013: Quarter 2, Gross Domestic Product (GDP) growth was 4.96% achieving US$8.144 billion against initial projections of 9% growth (Economy Watch, 2013). Many factors have been attributed as root causes to the stunted growth among them limited investment (domestic and foreign), inconsistent economic policies, uncertain political landscape and a general lack of confidence in the economy. The latter has had detrimental influences on the operations of many facets of the economy, in particular the financial services sector.

The Reserve Bank of Zimbabwe, RBZ (2012) identified export earnings, remittances from Zimbabwean citizens abroad, foreign direct investment (FDI) inflows, portfolio investment inflows and offshore credit lines (all of which are dependent on confidence in the economy) as sources of liquidity. These generators of liquidity have been and are still largely repressed in Zimbabwe. Additionally, the largely literate population and overzealous media have combined to divulge the weaknesses of the financial sector which has exacerbated uncertainty in risk-averse investors. The banking services industry was said to be marred with inadequate capitalization, abuse of corporate structures and widespread violations of banking laws (RBZ, 2012). Within an economy that is largely based on cash transactions, Zimbabwe can be pointed to as being overbanked; with 24 licenced bankers chasing a mega US$4.4 billion worth of deposits (an increase of 31% from 2012) (Economist, 2013).

Banking institutions and financial services firms are pivotal agents for economic prosperity. In Zimbabwe confidence in the financial sector, although improving, has not recovered fully from its low points. The effects of the 2004 recuperative curatorship by the central bank of nine banks including CFX Ltd, CFX Merchant, Barbican Bank, Intermarket Building Society, Intermarket Discount House, Royal Bank, Trust Bank Ltd and Trust Bank Corporation still lingers in the economy. Economic Watch (2013), showed Gross National Savings to have been -25.359%, 0.626% and 4.355% of GDP in 2011, 2012 and 2013 respectively. Projected national savings were estimated to rise to 7.283% and 12.407% in 2014 and 2015 respectively. Economist (2013) pointed out that despite the more than modest growth in national savings, liquidity challenges were still compounded by the short savings period

banks were subjected to. Demand deposits last on average 90 days within Zimbabwe's banking institutions thus only short term loans are feasible. 83% of deposits in Zimbabwean banking institutions are transitory and can be demanded by depositors easily and without prior notice. In October 2012, demand deposits and savings consisted 52.9% and 11.3% of deposits respectively (RBZ, 2012). A year later the ratios were respectively 52.7% and 10.4% (RBZ, 2013). The former combined with the 100% loan reserve on unsecured loans required by the Banking Act and the 30% reserve requirement dampen the credit creation process and weaken the money multiplier (Rukuni, 2013). It is pivotal that all economic agents including government, firms, households and individuals collude in the ambition to maintain the revival of the economy.

Friedman (1957) argued that money and its availability therefore is a key driver of economic growth and development at the macro level. Underpinning these economic suggestions, are the behaviours and attitudes of economic agents at the micro level. The economy and its welfare are therefore sensitive towards the perceptions and actions of the aforementioned economic agents. The typical and pervading problem in the economy currently is the overwhelming liquidity shortage. Money growth in the economy is considered to be generally low and insufficient for vibrant economic growth and development. The status quo is driven by the underwhelming level of savings in Zimbabwe's financial institutions and the high levels of liquidity preference in households. The depleted levels of liquidity in circulation is a joint consequence of the loss of faith in banking institutions (generated by the hyper inflationary conditions that resulted in massive losses of private savings), generally low disposable income levels, exorbitant bank charges vis-à-vis the incomes and the absence of institution-backed incentives towards savings.

The high preference for liquidity has triggered a lacklustre financial sector which has in turn resulted in large scale unavailability of loanable funds. Larger and more developed banks in Zimbabwe offer deposit rates of between 0.15% to 6%, while the emerging institutions offer between 8% and 16%. This is in light of the lending rates between 5% and 35% for individual and corporate loans. These rates combined with the high bank and transaction charges have not helped savings and ultimately at the very least, stunted economic growth (RBZ, 2012).

Furthermore, Econet Wireless, Zimbabwe's largest mobile phone network service provider introduced the EcoCash system[5]. It is a mobile money payment system for subscribers and

[5] This is the mobile money system on which mobile money transactions are done.

permits simple financial transactions and money transfer services (Econet, 2013). The service also allows payroll (EcoCash Payroll), bulk and banking services. 2013 saw the introduction of EcoCash Save, a savings account option from the mobile operator which allows deposits and offers deposit interest from balances as minimal as US$1. The product is also accompanied by extensive spread of the service through agents even in remote areas were the previously existent financial service providers have been unable to venture.

This has provided a massively more attractive option relative to traditional banking. The results has been massive exodus from the orthodox form of banking and conducting transactions to the simpler, more accessible and efficient system provided by Econet Wireless. The banking sector took a hit from Econet when it introduced EcoCash system which was way ahead of the traditional banking systems used in terms of convenience, flexibility, efficiency and also annexed Steward bank which introduced a stiff competitive environment forcing other banks to diversify into insurance policies and other ventures.

Also the emerging of micro finance institutions imposed stiff competition to banks. The banks that were reluctant to give economic dependency loan, but due to the challenge imposed by micro finance institutions, these banks were forced to engage in the loan facility system and some even diversified into micro finance venture in order to gain competitive edge and continued sustainability.

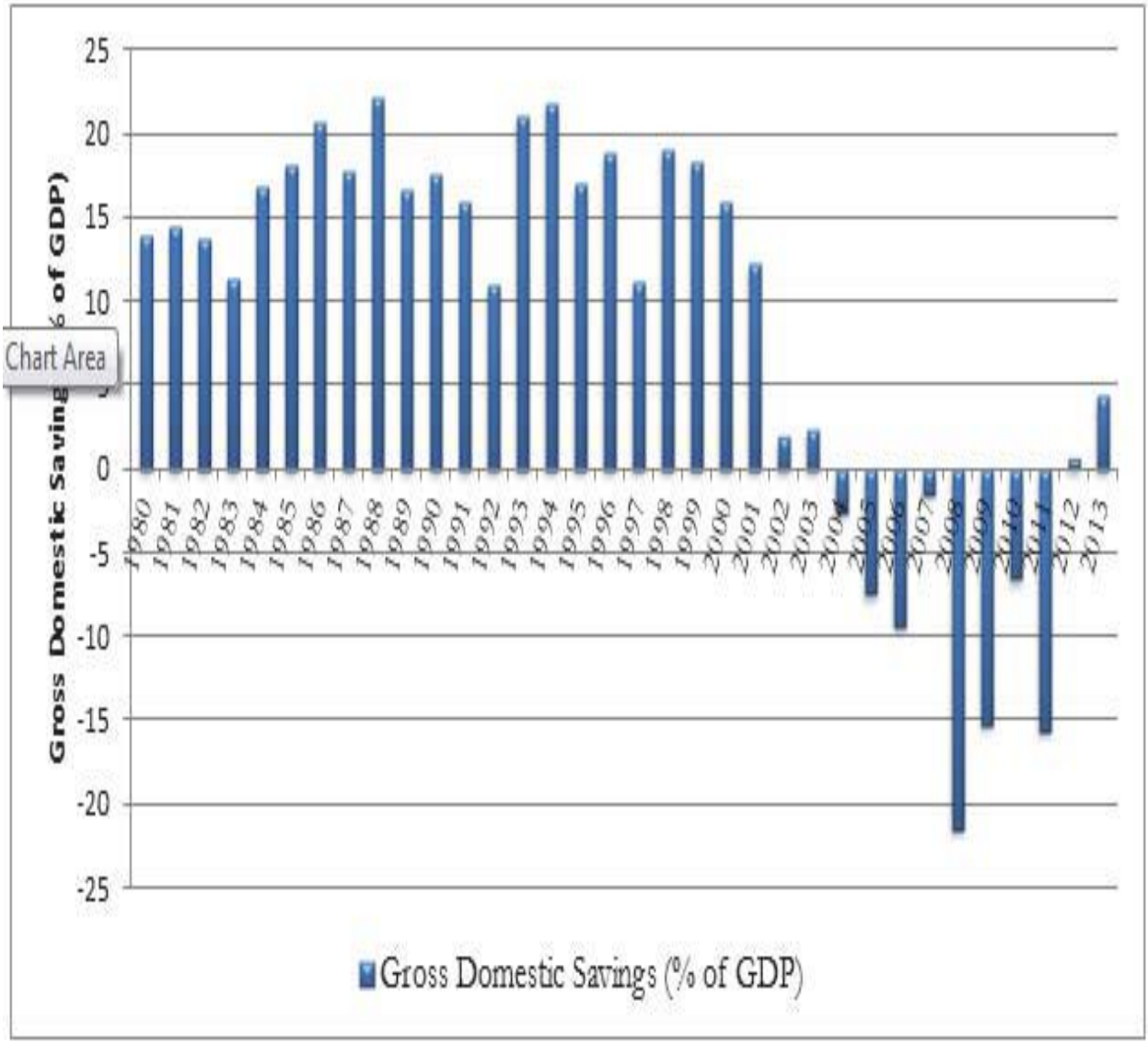


Figure 2.2**:** Gross Domestic Savings Trends in Zimbabwe 1980-2012

Source: World Bank National Accounts (2013)

Figure 2.2 above shows the Gross Domestic Savings (GDS) trends in Zimbabwe from 1980 to 2012. The GDS are GDP minus final consumption expenditure. They are an indication of the portion of national income that is not consumed or spent. The general trend over the period displays distinctly disaggregated behaviour. From 1980 to 2001, GDS rates were significantly higher compared to the succeeding period to present. Between 1980 and 1983, GDS were generally declining and roving between 10 and 15 percent. This trend could have been a result of the "political uncertainty" that surrounded the political and economic environment in immediate post-independent Zimbabwe. The trend may also have been a consequence of the inherent interventionist strategies adopted by the Government from the

colonial regime. The economy comprised strong authoritarian forces that influenced investment, business and profit repatriation (Gwenhamo, 2009). Between 1984 and 1989, the GDS rates were rising because of the comparatively higher deposit interest rates which were constantly above 10 percent compared to the 3.5 percent during the pre-independence period. Another notable declining trend occurred between 1989 and 1992. With the persistently declining investment levels during the prior period, Government relaxed the amount of profits that foreign firms could repatriate from 50% to 100%. This was consistent with the requirements of the International Monetary Fund (IMF) proposed Economic Structural Adjustment Programme (ESAP). One of the negative consequences was the decline in the domestic savings. Generally high savings occurred in Zimbabwe until 2002 when unprecedented declines began. By 2002, savings were severely depleted by outflow of labour and capital from Zimbabwe after the implementation of the contentious Land Reform Programme. Savings in the succeeding period were exacerbated by economic turmoil and galloping inflation. Between 2004 and 2011, negative savings occurred due to the hyperinflationary conditions that discouraged saving. The resultant culture of consumption persisted after the 2009 introduction of the multiple-currency monetary system that harnessed inflation. By 2012, improvements began to slowly occur.

According to the Monetary Policy Statement (2015), the RBZ issued the first deposit taking microfinance institution licence with the mandate of enhancing access of financial services by lower income groups of society thereby promoting a savings culture in the economy. From the 2015 Policy Statement, the core capital in the banking sector increased from $790.4 million as at 31 December 2013 to $812.2 million as at 31 December 2014 and 13 out of 19 operating banking institutions were compliant with the 31 December 2014 core capital requirement as indicated by the Table 2.4 below.

Table 2.4: Core capital of financial institutions in Zimbabwe

Institution	Core Capital
CBZ Bank	$109.81m
CABS	$92.82m
Stanbic	$79.73m
CBZ BS	$65.54m
BancABC	$63.33m
Standard Chartered	$61.90m
Steward	$43.92m
Barclays	$41.67m
NMB Bank	$37.01m
Ecobank	$36.89m
MBCA	$36.21m
FBC Bank	$31.84m
FBC BS	$29.54m
Metbank	$24.62m
ZB BS	$15.58m
POSB	$12.85m
Agribank	$12.37m
ZB Bank	$9.56m
Afrasia	$6.01m
Tetrad	($31.73m)

Source: Monetary Policy Statement (2015)

The 2015 Policy Statement noted that, although bank deposits excluding interbank deposits grew over the year as indicated by the table below, the governor was however concerned about the fact that deposits remained short term in nature thus hindering meaningful financial intermediation. The governor attributed the situation to limited interbank trading, general market illiquidity and limited lender of last resort function of the Reserve Bank.

The Finance Minister in the mid-term review statement (2015) noted that the banking sector deposits had shown signs of increasing (14%) ever since the adoption of the multicurrency system was introduced as reflected by the table below:

Table 2.5: Banking sector deposits

Period	**Dec '09**	**Dec '10**	**Dec '11**	**Dec '12**	**Dec '13**	**Dec '14**	**June '15**
US$ billion	2.57	3.38	3.58	4.37	4.90	5.08	5.60

Source: Reserve Bank of Zimbabwe (2015).

Of concern is however the demand deposits which account for more than 50% of the total deposits as depicted by the Figure 2.3 below.

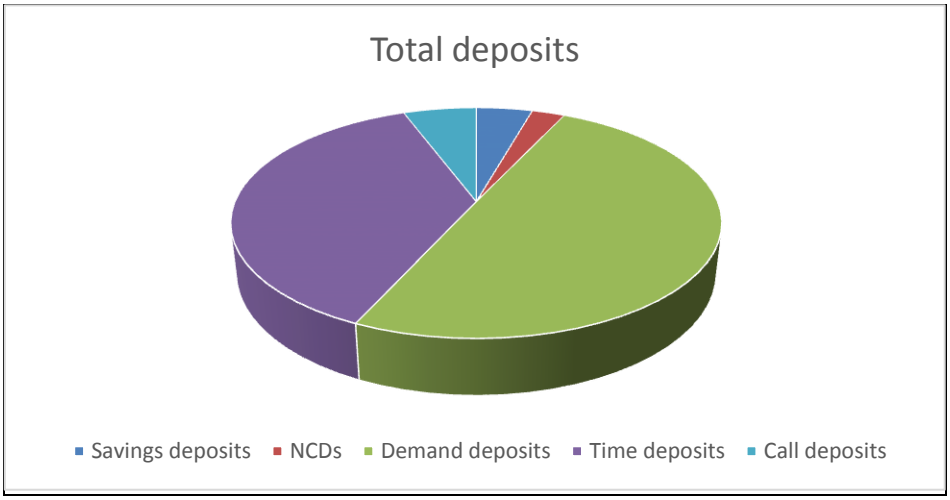


Figure 2.3: Total deposits.

Source: Mid-Fiscal policy review statement (2015).

The Finance Minister alluded to the fact that the predominant demand deposits have incapacitated banking institutions to fund long term investment projects critical for the turnaround of the economy (Mid-Fiscal policy review statement, 2015). Thus confidence building measures and strategies are a necessary requirement.

2.4.2 Empirical literature on the effects of savings on growth and economic performance

There is empirical literature abound in periodicals and books on the relationship between saving culture and economic performance. Narjarzadea et al (2014) analysed the relationship between savings and economic growth in Iran using Autoregressive Distributed Lag Model. Results from the study found that there was a positive and significant impact of savings on total and non-oil economic growth and a long run causal relationship between savings and economic growth. Schmidt-Hebbel et al (1992) in their study of household saving in developing countries using private sector saving data of 10 countries found that economic growth affect savings strongly. The study used combined Time-Series and cross country observations. Le Roux (2010) analysed the role of household, corporate and government savings in the development of the South African economy.

Attanasio et al (1999) analysed the correlation among saving investment and growth rates using World Bank data of 150 countries over the period 1961-94. Results from the study showed that saving, investment and growth rates were positively correlated. Claus et al (2004) developed an analytical link between financial systems and economic growth through overcoming information asymmetry between borrowers and lenders. They observed that

when financial systems do not work well, the economy is negatively affected. However solid legal foundations, tax policy reforms and financial development were identified as enablers to economic growth. Jagadeesh (2015) investigated the role of savings on economic growth in Botswana using the Harrod-Domer growth model. The test was based on Auto Regression Distributed Lagged (ARDL) model and tested the existence of a long-run relationship between Gross Domestic Product (GDP) and Gross Domestic Savings (GDS) in Botswana. The test concluded that there was a significant relationship between savings and economic growth.

Herring and Santomero (1996) examined the role of the financial sector in economic performance. They noted that although the impact is subtle, it is extraordinarily important as it mobilizes savings and allocates credit. The paper concluded that governments however need to support the financial sector for the smooth functioning of the economy. Thus available empirical evidence available has shown that there is a strong connection between savings and economic growth.

2.5 Critique and gaps of literature

Although Brownbridge and Harvey (1998) alluded to the fact that the Zimbabwean pre-independence banking system was stable, it had however a very low banking population. Most Africans were discriminated from using banking services for their transactions. When the Zimbabwean government reformed the financial services sector after 1980, it did not have African benchmarks to base the reforms. In the 1990s the government indigenised the banking sector without adequate capital coverage and this partly explained problems in the banking sector when the local banks collapsed. This had a huge impact on the depositors' perception on the banking system in Zimbabwe and consequently on their savings practice.

The depth of the number of players in the banking system is not adequate resulting in the sector offering limited financial products. On the other hand the government policy reforms were not holistic in incorporating all the economic facets that included the financial services sector. One of the important sectors in the financial services is the credit reference bureau responsible for the rating of the credit worthiness of the banking units. This has to a large extent affected the development of the Zimbabwean banking system.

Although most Zimbabweans are now making use of banking products, the practice is not yet deep rooted to constitute a culture. Gardiol (2004) highlighted the conditions propagating

savings from the institutional perspective. These need improvement in terms of strong management, accessibility, diversity and financial viability. The legal framework is in place although more need to be done to protect the saving units and their investments. The World Bank National accounts data (2013) report that deposits grew over the years but the bulk had been for transactional purposes and not for investment to spur up economic development.

One of the key drivers of savings is the income and the proportion of income saved is the marginal propensity to save (Carrol, 1996). Income is partly consumed and partly saved. The driver however loses its importance when there is an informalised economy like the Zimbabwean economy. The majority of the economically active population are not on regular income. In addition the growth of income has been very sluggish and the income levels are below the poverty datum line.

Savings practices in Zimbabwe however seem to be explained by risk and uncertainty posed by the financial system. Other factors like wealth, return on assets seem to have a positive effect on the savings practice whereas inflation risk and uncertainty inversely affect the savings practice. The Zimbabwean financial sector has no depth and is not that developed to attract long term savings.

2.6 Chapter summary

The chapter gave an overview of the literature on general banking systems in Zimbabwe. The Zimbabwean banking system was profiled including the main players in the banking system. The tenets of the culture of saving were also outlined and the conditions necessary for the proliferation of savings. The chapter explored and analysed policy as well as non-policy determinants of savings. The nature and trends in savings in Zimbabwe were examined as well as regional savings trends for the general Sub-Saharan Africa. An empirical review was also done for the determinants of savings as well as the impact of savings on economic performance. The chapter looked at the linkage between the practice of saving and the general performance of the economy. The chapter concluded by critiquing and finding any gaps in the existing literature.

CHAPTER THREE

THEORETICAL AND CONCEPTUAL FRAMEWORK

3.0 Introduction

The chapter looks at the theoretical framework underpinnings the savings practice in a country. Key theories that informed the study included the Permanent Income Hypothesis (PIH), Life Cycle Savings Hypothesis (LCSH), Keynesian theory, Hyperbolic Discounting theory and the Mental Accounting theory. The chapter also looked at the Conceptual framework that supports the determination of the savings practice in a country.

3.1 Theoretical Framework

Magaji and Yahaya (2016) divided the theories of savings into three categories namely traditional theories, Keynesian theory and modern savings theories. These will be outlined in the following sections.

3.1.0 Traditional theories on savings

Consist of the permanent income hypothesis (PIH) and the Life Cycle Savings Hypothesis (LCSH). The traditional theories are premised on the analysis of household choice of consumption and savings over a long time horizon. The two theories are discussed below. Magaji and Yahaya (2016) has however criticised the traditional theorists on their assumption that individuals exponentially discount consumption to determine how much to save for future consumption as opposed to current consumption.

3.1.1 Permanent Income Hypothesis (PIH)

According to Friedman (1957) permanent income is defined as the income individuals expect to receive on the basis of their wealth, occupation and ability. These expectations are formed on the basis of past experience and from observations of what other individuals earn in similar circumstances. Permanent consumption likewise is the expected future consumption that is dependent upon the permanent income. It should be noted that actual or measured income and consumption may be smaller or larger than permanent income and consumption respectively. Friedman (1957) further advanced that permanent income and permanent consumption can be observed directly for an individual consumer, but what can be observed are actual receipts and payments during some finite period.

According to Campbell and Mankiw (1989), the permanent income hypothesis implied that people save because they rationally expect their labour income to decline hence they will save for precautionary reasons. Thus savings can be used as a good indicator of declines in labour income. Loayza et al (2000) tested the regression of savings and changes in labour income and the results showed a negative correlation between the variables. Permanent income hypothesis focuses on a representative infinitely lived consumer who equates consumption to permanent of the net of the present value of taxes.

Meghir (2004 reiterated that permanent income and permanent consumption are terms that cannot be observed directly from an individual consumer unit. Estimates can however be constructed for permanent income and consumption for each consumer unit. This can be done by using evidence for other time periods and other consumer units that have similar characteristics like age occupation to interpret data for one consumer unit. Friedman (1957) measures a consumer unit's income (Y) as consisting two components that is the permanent component denoted by Y_p and the transitory component denoted by Y_t.

$Y = Y_p + Y_t$----------Equation 3.1

The permanent income consists of all the factors that a consumer unit regards as determining the capital value or wealth of the unit (Friedman, 1957). These include the unit's non-human wealth, personal attributes of the earners' unit like training, ability, personality as well as the attributes of the economic activity of the earners like occupation followed and location of economic activity.

The transitory component on the other hand reflects all other factors treated as accidental or chance occurrences. These factors may be predictable as they can emanate from specific forces for instance cyclical fluctuations in economic activity. Some of the factors giving rise to transitory income are specific to the consumer unit for instance illness, a bad opinion about when to sell or buy an investment. According to Friedman (1957) transitory component of income for any group of consumer units tend to average out. This implies that if transitory income accounts for the discrepancies between permanent income and measured income of the group, the mean measured income for the group would be equal to the mean permanent income and the mean transitory component would be zero.

However not all factors affect the transitory income in this way as some factors may common to all group members for instance weather changes for a group of farmers. When the weather

factor is favourable for earners producing farming products, the transitory component is positive. However if the condition is unfavourable the transitory income would be negative.

Similarly Friedman (1957) modelled the consumption component. Consumer unit's expenditures for some time period is denoted by C will also consist of permanent consumption (C_p) and transitory consumption(C_t). Thus permanent income is expressed as follows:

$C = C_p + C_t$----------Equation 3.2

Transitory consumption can be specific to a consumer unit for instance sickness while other factors affect groups of consumer groups. Consumer specific factors tend to average out the transitory consumption resulting in zero mean transitory consumption. Factors affecting the group can result in either positive or negative mean transitory consumption. According to the Permanent Income hypothesis higher growth of permanent income reduces current savings. The graphical interpretation of the permanent income hypothesis can be illustrated in figure 3.1 below.

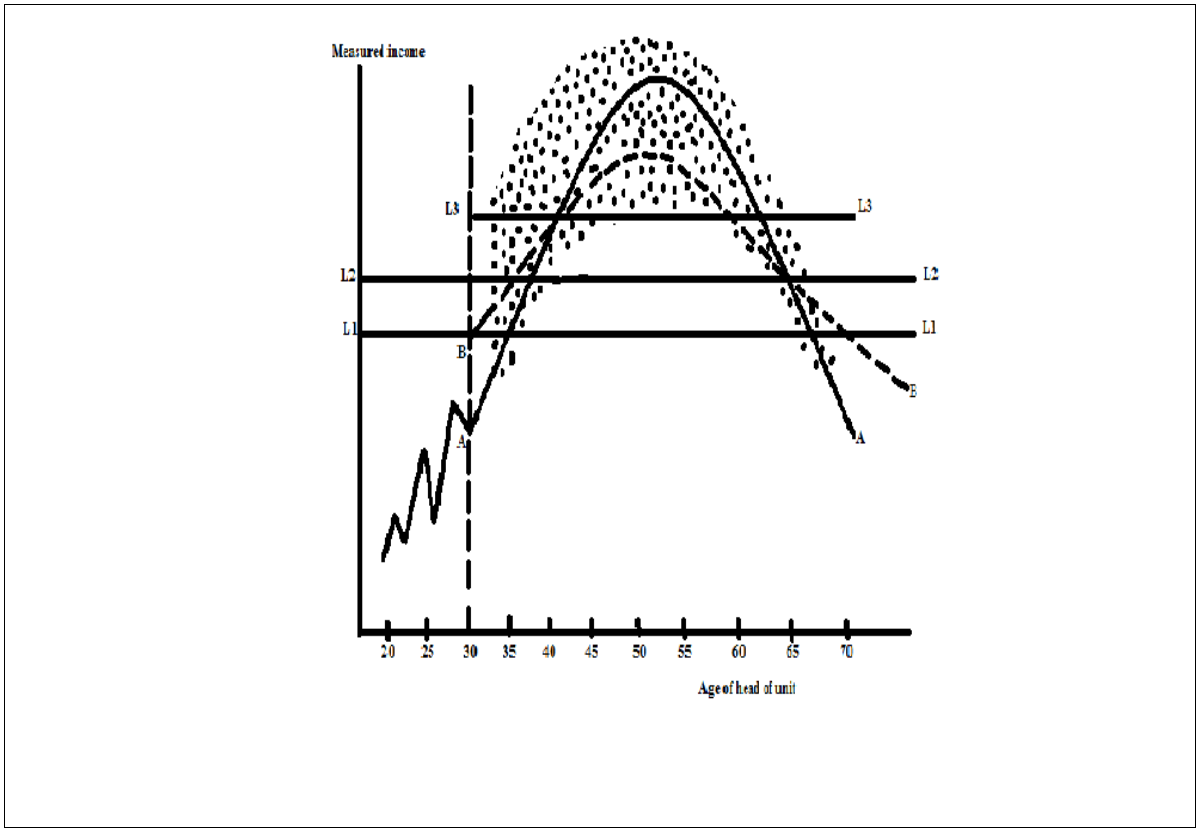


Figure 3.1: PIH-Adopted from Friedman (1957:24)

According to Friedman (1957) permanent components that are permanent income and permanent consumption represent average life-time values and transitory components represent the difference between the life-time averages and the measured values in a specific period. The solid jagged line shows the measured income experience and the scatter space shows the uncertainty of future measured income experience hence represents the possibilities as viewed by the consumer unit. The possibilities are assumed to be independent of each other but in general they are expected to be interdependent. The diagram shows a single consumer unit representative of consumer units in that category.

AA is the average of the probability distribution anticipated for future years that is the permanent income to which consumption is adopted. L_1L_1, L_2L_2 and L_3L_3 are possible because the consumer unit can borrow on the basis of anticipated receipts from both human and non-human wealth at the same interest rate. BB is the difference between AA and L_1L_1 or L_2L_2. The permanent income or the age pattern of the permanent income remains unchanged over a period of years. Thus permanent income is given by the following identity.

$C_p = k(i, w, u)Y_p$----------Equation 3.3

Equation 3.3 shows the relationship between permanent income and permanent consumption and the ratio between the two is independent of the size of the permanent income. The ratio depends on other variables.

1. i- the rate of interest or sets of interest a consumer unit can borrow or lend.
2. w- the relative importance of property and non-property income.
3. u- factors determining the consumer unit's tastes and preference for consumption as opposed to additions to wealth.

Friedman (1957) assumes that savings or certain components of savings are residual of consumption. Consumption is therefore determined by long term considerations and any transitory changes to income lead to additions to assets or the use of previously accumulated balances rather than to corresponding changes in consumption.

Grigoli et al (2014) postulated that people with high temporary income saved more to compensate for lower future income and those with lower temporary income saved less in anticipation of higher future income. According to the permanent income hypothesis consumption does not depend on current income alone and emphasise that consumer units do

not have income that follow a regular pattern rather they experience random and temporary fluctuations in income from year to year. Friedman (1957) argued that consumption primarily depended on permanent income and economic units save or borrow to smooth consumption in response to transitory changes in income.

The Figure 3.2 below shows the relationship between measured consumption and measured income.

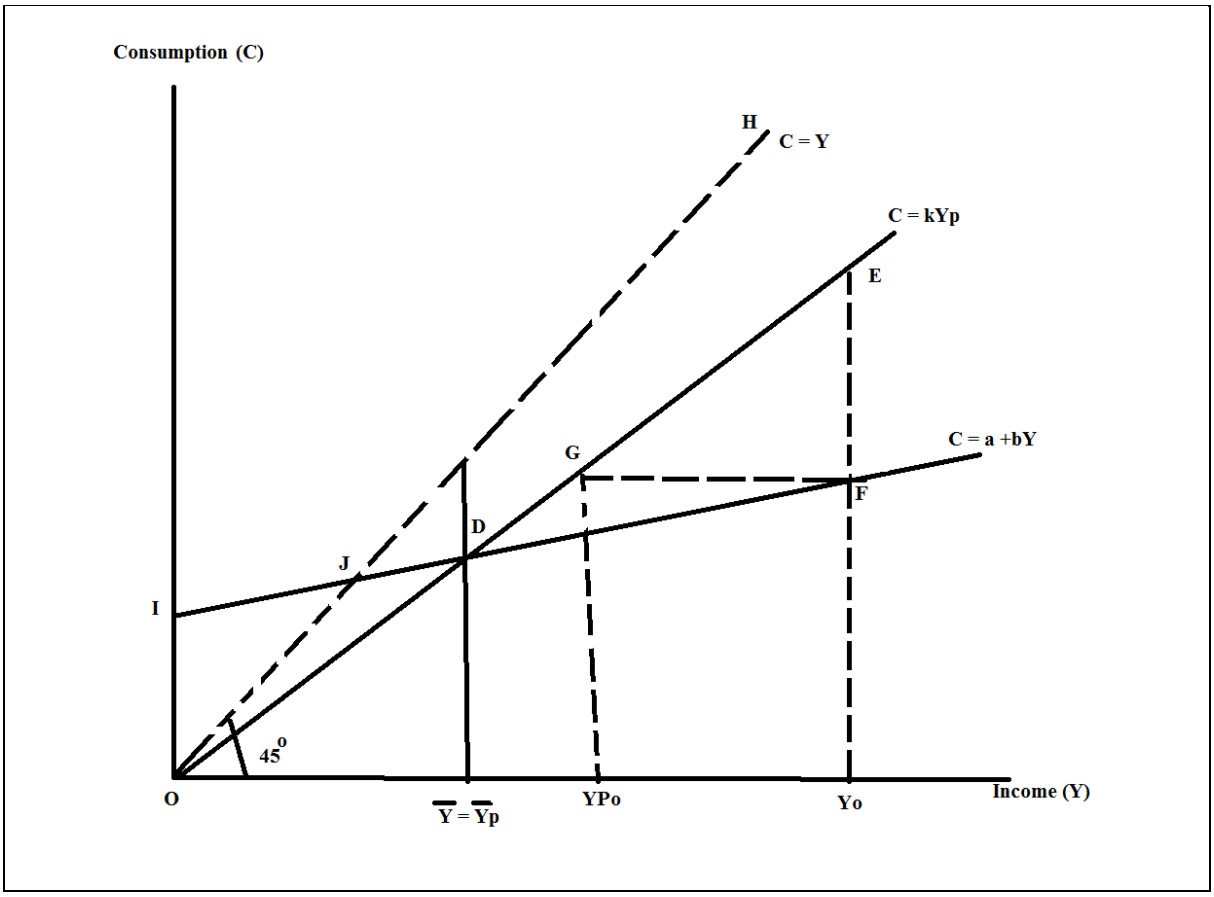


Figure 3.2: Measured income and measured consumption

Source: Adopted from Friedman (1957)

Along the 45^0 line consumption is equilibrium income.

$C = Y$----------Equation 3.4

The vertical difference between OH and IF is the average measured savings. Point J is the break-even point where $C = Y$ and savings at this point is equal to zero. To the left of J, measured savings are negative but are positive to the right. As measured income rises so does measured savings.

Dynan et al. (2004) asserts that, an analysis of standard economic approach to saving implies that people with high temporary income will save more to compensate for lower future income, with those with temporarily lower income tend to save less in anticipation of higher future income. Even though saving rates are highly volatile with lifetime income, individuals with high current income, *ceteris paribus*, are expected to be thriftier than those with low current income (Friedman, 1957). The Permanent Income Hypothesis followed the logic of the Life Cycle Hypothesis; that consumption should not depend on current income alone. Unlike the Life Cycle Hypothesis, which anticipates that income follows are regular pattern over a lifetime, the Permanent Income Hypothesis instead emphasizes that people experience random and temporary fluctuations in income from year to year. Friedman (1957) divided income into a permanent part, which is the income people expect to persist into the future, and transitory part, which is the income that people do not expect to persist. More simply, permanent income is average income and transitory income is deviations from this level of income. Friedman (1957) argued that consumption should primarily depend on permanent income because people save and borrow to smooth consumption in response to transitory changes in income. If shocks to income are permanent, then all future levels of income will be revised upwards or downwards by the same amount leading to a change in consumption, which is equal to the change in current income. Central is that the consumption plan does not depend on the transitory components. Friedman (1957) argued that individuals with high permanent income consume the same fraction of permanent income as individuals with low permanent income. Dejuan and Seater (2006) and also Dynan et al. (2002) took up several studies of the Permanent Income Hypothesis and concluded that the evidence for the hypothesis was mixed at best, with some studies supporting it and some studies rejecting it. A problem with the theorem, emphasized by Meghir (2004), was that the loose definition of permanent income made it difficult to measure. However, the reason that the Permanent Income Hypothesis has endured so much is that, beyond its simple intuitive appeal, it focused on inter-temporal optimization of consumer behaviour, which is logical and consistent.

The Permanent Income Hypothesis provides an insight as to the reasons households save in view of their envisaged permanent income and permanent consumption. The theory enables us to understand some of the circumstances of saving units that motivate them to save or dissave like wealth, occupation, ability and training received. PIH explain changes in savings rates caused by changes in permanent income. The theory is quite applicable in its focus on

inter temporal optimisation decisions that savings units make in order to smoothen consumption.

3.1.2 Life Cycle Savings Hypothesis (LCSH)

The theory was first developed by Modigliani and Brumberg (1954) in response to the contradictory Kuznets' findings on the American savings rates. The theory could not however be published because of the untimely death of Richard Brumberg in August 1954. Using longitudinal data from 1869 to 1938 Kuznets (1946) came to the conclusion that the saving rate in America remained stable even though people's incomes increased significantly during this period. The implication of the conclusion was that the saving rate was constant regardless of economic development over long periods of time. The theory is also referred to as the Modigliani-Brumberg Life Cycle Hypothesis of savings.

Loayza et al (2000) conceded that the key cornerstone of the hypothesis is age related consumer heterogeneity. They also predict that savings follow a lump shaped pattern showing high savings for middle aged consumer units and low savings at young and old ages. Deaton and Paxton (1999) predicted that according to the life cycle theory of savings and consumption, a change in the rate of economic growth affect the economy's aggregate savings rate. In their view young people save for retirement and old people consume their previously accumulated assets. According to Deaton and Paxton (1999) an increase the rate of economic growth would increase the aggregate savings rate as this increased the lifetime resources and savings of the younger age group relative to the older age group.

Kuznets (1946) had observed constant savings rates despite an increase in the American income over the same period. Modigliani (1966) observed that income tends to dry up well before the termination of life and this requires that structuring a rate of consumption consummately with earlier consumption. He argued that households must save in the earlier part of their life in order to accumulate stock of wealth which will support consumption through dissaving in the later part of their life.

Thus according to the life cycle savings theory, consumer units sought to smooth out consumption over time by saving during their working years so as to finance their consumption during retirement when income has declined. Consumer units would be able to maintain the same standard of living. Thus the broad pattern of the life cycle of savings sees an individual accumulating wealth with age up to retirement and then dissaving the wealth

during retirement to finance their consumption when the income has dried up. Thus according to Brumberg (1954) and Modigliani (1966) the primary motive for saving during a consumer unit's working life is to finance consumption during life after retirement. Horioka (1993) identifies these savings or wealth to be in the form of rent interest, dividends or drawing down of savings deposits. Modigliani (1966) added that pension benefits accruing to the retired should not be added to income earned but instead as a withdrawal from the pension wealth accumulated up to retirement. Thus the pension benefit can be viewed as withdrawn from mandatory savings accumulated during an individual's working life. Consumer units in developing countries like Zimbabwe may also rely on proceeds from the sale of livestock as a primary source of income and as such can be representative of the dissaving of the accumulated savings. Accordingly the life cycle savings theory concludes that if an individual fails to save or invest during their working years, the individual will not have income to finance their consumption for the period after retirement (Horioka, 1993).

Ado and Modigliani (1963) derived the life cycle savings theory from the utility function of the individual consumer. The function consists of an individual's aggregate consumption in the current and the future. The individual is assumed to be maximizing his lifetime utility subject to available resources defined as being the sum of the current earnings and discounted future earnings over his lifetime and his current worth. Thus the current consumption can be expressed as function of his resources and the rate of return on capital all depending on the age of the economic unit.

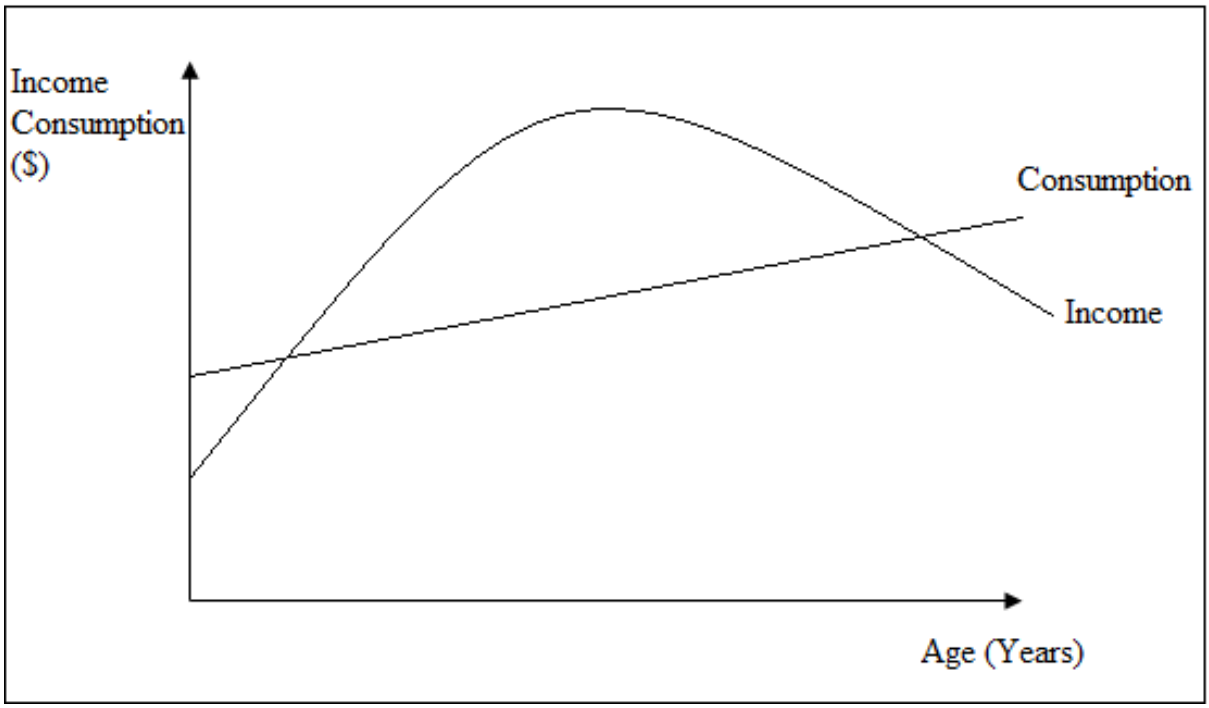


Figure 3.3: Life Cycle theory

Source: Ado and Modigliani (1963)

Ado and Modigliani (1963) aggregate the individual consumption function to deduce the aggregate consumption function for the community. However the utility function assumes the following:

1. The function is homogeneous with respect to consumption at different points in the life cycle of the of the consumer unit (t). An additional dollar worth of resources received is allocated to consumption at different times in the same proportion in which he had allocated his total resources prior to the addition.

2. The consumer unit neither expects to receive nor desires to leave an inheritance.

3. The consumer at any stage plans to consume his total resources evenly over the remainder of his life span.

4. Every age group within the earning span has the same average income in any given year (t).

5. The rate of return on assets is constant and is expected to remain constant.

Using the assumptions Ado and Modigliani (1963) household consumption can be generated as follows:

$$\boldsymbol{C_t^T = \Omega_t^T V_t^T}$$ ----------Equation 3.5

Where t – is the time period during a person's life cycle

$\boldsymbol{C_t^T}$ – is the total consumption in year t of a person aged T years.

$\boldsymbol{V_t^T}$ – is the present value of resources at age T years.

$\boldsymbol{\Omega_t^T}$ – is the proportionality factor dependent upon the form of the utility function.

Thus from the model the consumer unit's total consumption is proportional to the present value of the total resources accruing to the consumer unit over the rest of his life span. $\boldsymbol{V_t^T}$ can be viewed as the sum of the net worth carried forward from the previous period and the present value of the non-property income a person expects to earn over the remainder of his earning life expressed as follows:

$$\boldsymbol{V_t^T = a_{t-1}^T + Y_t^T + \sum_{t=T+1}^{N} \frac{Y_t^{eTr}}{(1+r_t)^{r-T}}}$$ ----------Equation 3.6

Where $\boldsymbol{Y_t^T}$ – is the income from current non-property income

$\boldsymbol{Y_t^{eTr}}$- Non-property income an individual aged T years expects to earn in the rth year of his life.

$\boldsymbol{N}$- is the earning life span of the individual.

$\boldsymbol{r_t}$- is the rate of return on assets.

$\boldsymbol{a_{t-1}^T}$- is the sum of the net worth carried over from the previous period.

Deaton and Paxton (1999) contended that the life cycle savings theory predicts that changes in the rate of economic growth will affect its aggregate savings rate. An increase in economic growth increases the savings rate as lifetime resources of the younger age group relative to the older age groups. They concluded that whether there was an increase or decrease in economic growth, the impact on savings rate primarily depended on whether the age profile of savings is negatively correlated with age.

Studies done to validate the life cycle theory have not yielded favourable factors. Studies by Poterba (1994), Paxton (1996), Deaton and Paxton (1999) could not find the negative correlation between savings rates and age when they used the time series of cross-sectional household surveys to trace out consumption and savings behaviour of the same age group. Other studies have also differed on household units' feelings towards savings for retirement.

Mankiw (2007) argued that consumer units consider both the present and the future when making decisions on consumption and savings. When household units consume more today, the less will they be able to enjoy in the future. They will therefore make trade off by looking ahead to the income they anticipate to receive in the future and the consumption of goods and services they hope to afford. This implies that they are able to consume the same goods and services on retirement. According to Modigliani (1966) household units must save in the earlier of their life in order to accumulate a stock of wealth which will be utilised to support to their consumption through dissaving in the later part of their life.

Deaton (2005) and Jappelli (2005) came up with conclusions consistent with Keynes (1936) who attributed motivation for retirement savings as a way of maintaining a more or less the same standard of living after retirement. However other studies by Lyndall (1955) advanced the notion that household units saved so as to lengthen their lifespan after retirement in view of improved living conditions and medical breakthroughs. This motivation occurred where there were no pension reforms and support from children. This argument has however received mixed reactions from empirical evidence done so far, for instance Komiya (1966) argued that it was a weak motive for savings in the west like America and Europe. Horioka (1993) however found that the motivation is quite significant in Japan and Thailand. Thus he concluded that the Life Cycle theory tends to be more applicable to western countries as non-western countries tend to rely more on family support.

Another study by Deaton (2005) noted that developing countries have more households compared to American and European households and hence retirement resources are communally shared between the workers and their dependents. Nwuchukwu and Odigie (2011) however dismissed the Life Cycle savings theory as having little relevance to developing countries as it only reflects what happens in the western countries. Donkor and Duah (2013) identified that savings for retirement in Africa is very weak owing to their extended family systems and strong reliance of household units on their families. According to most African traditions the first born son takes over the responsibility of the family upon

getting gainful employment. This trend is described as "saving through children hypothesis" advanced by Spio and Groenewald (1996).

According to Agarwal et al (2009), the theory advances that the major determinants of the saving rate as the growth rate of the economy and the age structure of the population. Modigliani (1966) observed that in an economy with constant population and growth, aggregate savings rate is zero as the positive savings of the younger households would be offset by the dissaving of the retired households drawing from their earlier accumulations. When income grows as a result of the population growth, aggregate savings rate would be positive in the absence of inheritances or legacies. Kotlikoff and Summers (1988) however advanced that in the presence of bequests, wealthier individuals have higher saving rate but if the population has a large share of the poorer individuals this can depress the saving rate.

Basically, the LCH states that consumers seek to smooth out consumption over time, by saving during their working years, so as to finance consumption during retirement when income has declined and maintain the same standard of living as that enjoyed during their working years. Therefore, the broad pattern of the life-cycle will see an individual accumulating wealth with age up to retirement and then dissaving it during retirement to finance their expenditure when income has dried up. Based on this theory Modigliani and Brumberg (1954) and Ando and Modigliani (1963) postulated that the primary motive for saving during an individual's working years is to finance life after retirement. The savings accumulated then become the primary source of income during retirement as an individual's income would have dried up. This could be in the form of property income (rent, interest and dividends) or drawing down of saving deposits (Horioka, 19993). In addition Modigliani (1966) appended that pension benefits accruing to the retired should not represent income earned, but rather a drawing down from the pension wealth accumulated up to retirement. Based on Modigliani (1986) pension benefits similarly represented the drawing down of mandatory savings accumulated during an individual's working years. In addition, to pension benefits, property income and drawing down of saving deposits individuals in developing countries may also rely on the proceeds from the sale of livestock as their primary source of income as this similarly represents the dissaving of accumulated savings.

Basically, this means that if an individual failed to save or invest during their working years for the period after retirement they will have no income. Hence to guard against the situation where they have no income to finance consumption individuals make provision during their

working years for the period after retirement. Horioka (1984) described this as the basic premise of the LCH.

Empirical studies have differed on why consumers feel the importance to save for retirement. Earlier studies by Keynes (1936) cited in Mankiw (2007) argued that when people decide how much to consume and how much to save, they consider both the present and the future. The more consumption they enjoy today, the less they will be able to enjoy tomorrow. Therefore, in making this trade off, households looked ahead to the income they anticipated to receive in the future and to the consumption of goods and services they hoped to be able to afford. Basically this implies that when individuals in their working years look ahead to the period after retirement when income has dried up, they will save a portion of their income now so that they are able to consume the same goods and services in retirement as those enjoyed during their working years. This theory by Keynes (1936) is consistent with later studies by Jappelli (2005) and Deaton (2005) that attributed the motivation to save for retirement to the fact that households seek to maintain, more or less the same standard of living after retirement to the one they enjoyed during their working years.

Other theories have, however, attributed the need to save for retirement to the lengthening life span of consumers (Lydall, 1955). These theories argued that the lengthening life span has made consumers more conscious on the importance of saving part of their current income, for use in their old age. With the improvement in living conditions, medical breakthroughs and fewer wars consumers now expect to live till retirement and in many instances several years after. Households as a result may feel the need to make provision for the lengthening life span by saving for retirement especially in the absence of pension reforms and support from their children.

Later studies by Deaton (2005) showed that because households in developing countries were large compared to those in the USA and Europe, there was a greater tendency for several generations to live together. Deaton (2005) argued that for such households there was no need to save for retirement as resources were shared between workers and dependents, and ownership was passed from parents to children. In line with Deaton (2005), Spio and Groenewald (1996) found strong evidence in South Africa that the need to save for retirement was less necessary as a result of strong family ties. Recent studies have attributed this to the fact that determinants of savings in developing countries differ from those in developed countries (Spio and Groenewald, 1996; Bendig et al. (2009) and Stenga, 2010). Due to this

controversy surrounding the LCH, Nwuchukwu and Odigie (2011) appended that the LCH mirrored what happens in developed economies with little or no regard for the distinguishing features of developing countries especially those in Africa. In light of this Donkor and Duah (2013) affirmed that theories of saving were created with developed countries in mind.

In line with Deaton (2005), Spio and Groenewald (1996), Nwuchukwu and Odigie (2011) and Donkor and Duah (2013) the need to save for retirement in developing countries especially Africa is a very weak motive due to the extended family system and households strong reliance on family. In African tradition depending on the tribe, it is normally the responsibility of the last born son to stay behind and look after their elderly parents. Other tribes may have the first born son moving in and looking after their elderly parents. Conversely, the parents may move in with their first born son. It is in rare circumstances that they stay with their daughters. In anticipation of this family support young households may not feel the need to save for retirement instead they may feel the need to save in their children so that their children are better able to look after them when they retire. Despite this evidence, we cannot completely discard the retirement motive given that regardless of their age, individuals show some elements of saving for retirement. For example given that people do not expect to retire one day and have their income dry up, they would not buy houses or other assets as they could simply rent them for the rest of their lives assuming there was no economic benefit from buying the house.

According to Modigliani (1966) in a stationary economy with a constant population and productivity, the aggregate saving rate would be zero as the positive saving of the younger households, in their accumulation phase, would be precisely offset by the dissaving of the retired households drawing down their earlier accumulation. However, if income was let to grow as a result of population growth or growth in per capita income the aggregate saving rate would be positive in the absence of bequests.

Basically, population growth has got an effect on a country's saving rate through its impact on the ratio of younger households in their accumulation phase to older households in their dissaving phase. According to Agrawal and Sahoo (2009), an increase in population growth is expected to increase the saving rate as more households in the accumulation phase will be saving compared to the older households who will be dissaving. However, if a country's population growth declines this has the effect of decreasing it's saving rate as the savings of the younger households in their accumulation phase will be outweighed by the dissaving of

older households in their dissaving phase. Similarly, a change in productivity can have an effect on a country's saving rate. Assuming the population is constant (no growth), an increase in the average income earned at each age and consequently an increase in aggregate income tends to result in a positive saving rate. This can be attributed to the fact that each successive cohort will enjoy higher life earnings than the preceding ones, as such enjoying a better standard of living. It then follows that each successive cohort will save more than the preceding ones so that they are able to enjoy a higher standard of living in their retirement compared to the currently retired households belonging to a less affluent generation.

According to Deaton and Paxton (1999), the life cycle of saving and consumption can predict the effect of aggregate savings rate on changes in the economy's rate of economic growth. Thaler (2000) argued that LCS assumes that savings rates are independent of income but dependent on the demographic characteristics of the population. Thaler (2000) contrasted two cases of one receiving income earlier in life and the other one later in life. According to LCS, the one receiving early is supposed to save his early income to increase consumption later in life while the other one ought to borrow from his future income to increase consumption earlier in life. Thaler (2000) dismissed the model as it is not supported empirically as consumption has closely tracked income over the individual's life cycle. In addition departures from behaviour cannot be explained by people's inability to borrow. Banks, Blundell and Tanner (1998) concluded that a drop in consumption on retirement is a sign that inadequate savings for retirement were made.

At the macroeconomic perspective the LCH has been used in developed and developing countries to make advanced predictions about the economy as a whole in addition to explaining the diversity in saving rates. At micro level, the LCH maintains that the major determinants of the saving rate are the growth rate of income (per capita income) and the age structure of the population (Agrawal and Sahoo, 2009). Deaton and Paxton (1999 observed that the LCH showed a link between the rate of economic growth and the savings rate. The theory cannot be discarded as the retirement motive is very much inherent in most savings practice even in developing countries.

3.2 Keynesian theory on savings

According to Keynes (1936) income received in the form of wages/salaries, rent interest is partly consumed and partly saved. Therefore income is the aggregation of current consumption and current savings.

$Y = C + S$----------Equation 3.7

Where Y current income, C is current consumption and S current savings

Equation 4.7 can be restated as follows:

$C = Y - S$ ----------Equation 3.8

The proportion of income which is saved is the average propensity to save (APS).

$APS = \frac{S}{Y}$ ----------Equation 3.9.

As the income rises, both the total amount saved and the proportion saved increases. According to Keynes (1936), consumption can be affected by savings (thrift) decisions and likewise savings can be affected by consumption decisions.

At equilibrium expenditure is equivalent to income and as income rises, the portion of savings rise. According to Keynes (1936) in long periods, people tend to be concerned about their future living standards and hence thrift exercises a greater influence on their disposable income. The main factors determining thrift according to Keynes (1936) included the rate of interest, psychological attitudes, social environment, government policies, range of financial institutions with public confidence, inflation, contractual savings and household targets.

Keynes (1936) further alluded to the fact that S is a passive residual determined by disposal income (Y_d) and marginal propensity to consume(MPC). Thus according to Keynes Savings was not a function of interest rate, rather it is determined by the demand and supply of money as expounded in Keynes Liquidity Preference Theory. Figure 3.4 below shows the derivation of interest rate from the interplay of demand and supply.

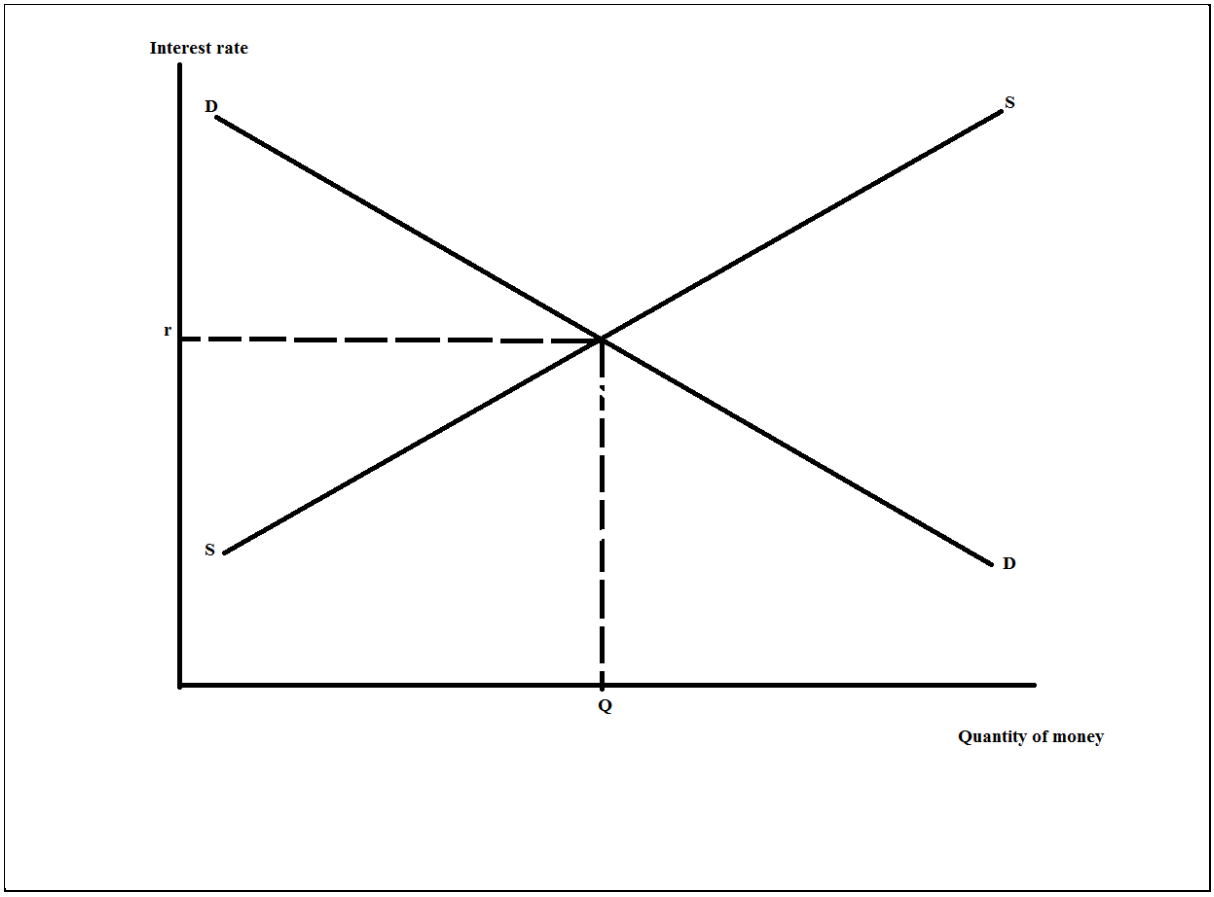


Figure 3.4: Interest rate determination.

Source: Adopted from Keynes (1936)

The demand for money (DD) and the supply of money (SS) produces interest rate r. The macroeconomic equilibrium for Keynes is $Savings = Investment$ $(S = I)$. Investment is equal to savings through income (Y) changes and the two variables are in equilibrium at full employment.

Magaji and Yahaya (2016) argued that savings are not directly offset by investment spending. Savings and Investment are influenced by interest rate but other influences are also important and can keep the interest rate from serving its vital function of equating savings to investment spending. However Keynes (1936) concluded that desired savings can only exceed investment spending at full employment level of output.

The Keynesian theory is based on current income and current consumption as opposed to some permanent income and permanent consumption in the PIH and the LCSH. The theory is based on variables that are objectively measurable that is the current income and the current savings. Thus saving units base their savings decisions on current income and not notional

income. According to Keynes the major driver of savings is the current income. As the income increases so do savings. In addition to current income the theory provided other determinants of savings ranging from interest rate to the public confidence in the financial institutions. Some of the determinants helped to inform the study.

3.3 Modern savings theories

Magaji and Yahaya (2016) maintained that traditional theories are unrealistic to assume that individuals exponentially discount consumption to determine how much to save for future consumption. On the other hand they maintained that Keynes theory was more applicable to developed countries and has limited relevance to developing economies like Africa and Zimbabwe in particular. The major reason they forward is that most African households have lower tendency to save for retirement or for inter-generational transfer. Furthermore income for African economies is uncertain and cyclical thus making estimation of long term income flows difficult. Borrowing in the early years cannot be determined because credit constraints as purported by the Life Cycle Savings theory. Households in Africa save small amounts at frequent interval to smoothen consumption rather than for retirement or savings accumulation.

The modern theories that attempt to remedy the shortcomings of the traditional theories and the Keynesian theories are the Hyperbolic Discounting theory and the Mental Accounting theory. These theories model the decision on how much to save for the future consumption and how much for the present.

3.3.1. Hyperbolic Discounting Theory (HDT)

Hyperbolic discounting theory was introduced by Phelps and Pollak (1968) and according to this discounting functional form, the rate of substitution between today and tomorrow was smaller than that between any pair of successive periods. The function generated a preference structure which was a special case of a general class of inconsistent preferences that were dynamic. According to Laibson (1997), Hyperbolic discounting theory was a model that explored the role self-control problems play in eliciting suboptimal savings level. Bernhein (1994) cited in Laibson (1997) argued that self-control is an important cause of under saving as individuals save less than they feel they should owing to the private incentives they face. Thus according to Laibson (1997), there is a gap between the actual savings level and the normative savings level.

The implication of these preferences was a conflict between the optimal contingency plan for today's perspective (Laibson, 1997). Schelling (1988) argued that when preferences are dynamically inconsistent and thus the dynamic decisions should be modelled as an intra-personal game among different temporal selves that is today's self is modelled as a different player from tomorrow's self.

Loewenstein and Prelec (1992) cited by Laibson (1997) suggested that Hyperbolic Discounting implied discount rates that decline as the discounted event is moved further away in time. These events in the future are discounted at a higher implicit discount rate than event in the distant future.

The Hyperbolic Discounting theory gives a new dimension to the understanding of the savings behaviour. The theory models savings for future consumption and for current consumption. It also helps in the understanding of pro-savings government policies that include subsidies and penalties for early withdrawal from savings plans. The model provides the main reason for under-saving which is identified as self-control dilemma. The self-control problem causes saving units to save less than they intend to save because of their personal circumstances.

3.3.2. Mental Accounting Theory (MAT)

Thaler (2000) postulated that mental accounting is a set of cognitive operations used by individuals and households to organise evaluate and keep track of financial activities. It had components.

(i) How outcomes are perceived and expressed
(ii) How decisions are made
(iii) How decisions are evaluated.

Thaler (2000) considered that households have a system of mental accounts which are the current income account(C), an asset account (A) and a future income account (F). According to Thaler (2000) the marginal propensity to consume (MPC) for C is closer to unity.

That is $MPC \cong 1$, this implies that a very amount of C is saved by households. For F, $MPC = 0$, all the future income is saved and for A, the marginal propensity to consume is between 0 and 1, that is $0 \leq MPC \leq 1$.

Thus according to mental accounting savings are behavioural and are about self-control (Thaler, 2000). At times people accomplish their savings through forced savings and when a savings matures they may buy something they might not have planned to acquire with the savings.

Thus mental accounting enhances our understanding of the psychology of choice like how much to save and how the outcomes of the financial transactions are evaluated. The choice is based on the value function defined in terms of gains and losses relative to some reference point. According to Thaler (2000) when funds can be transferred to less tempting mental accounts, they are likely to be saved. Thus long term savings can be promoted if households are persuaded to move funds from their current income accounts to their future income accounts. According to the mental accounting theory, savings behaviour is a result of cognitive operations taking place within an individual saving unit.

3.4 Conceptual framework

3.4.0 Introduction

Miles and Huberman (1994) defined the conceptual framework of the study as the system of concepts, assumptions, beliefs and theories that support and inform research. The view is also supported by Robson (2002) who defined a conceptual framework as a written or visual product. The framework explains graphically or narratively the main things under investigation that are not limited to key factors, concepts or variables and the presumed relationships. The conceptual framework also includes the actual ideas of beliefs about the phenomenon under study that is the determinants of restoring a culture of saving in banks among Zimbabweans.

The theories of savings, empirical evidence from other studies as well as non-library invisible college of informal associations among research workers (Spirduso and Silverman, 1993) have informed the conceptual map in Figure 3.5 below. The objective of the map is to explain some of the determinants of restoring a culture of savings in banks among Zimbabweans. Unexpected connections have however been developed to link funds for investment with foreign capital flow restrictions, population growth and income as well as the credibility of the financial systems with financial risk, financial instability and financial crises.

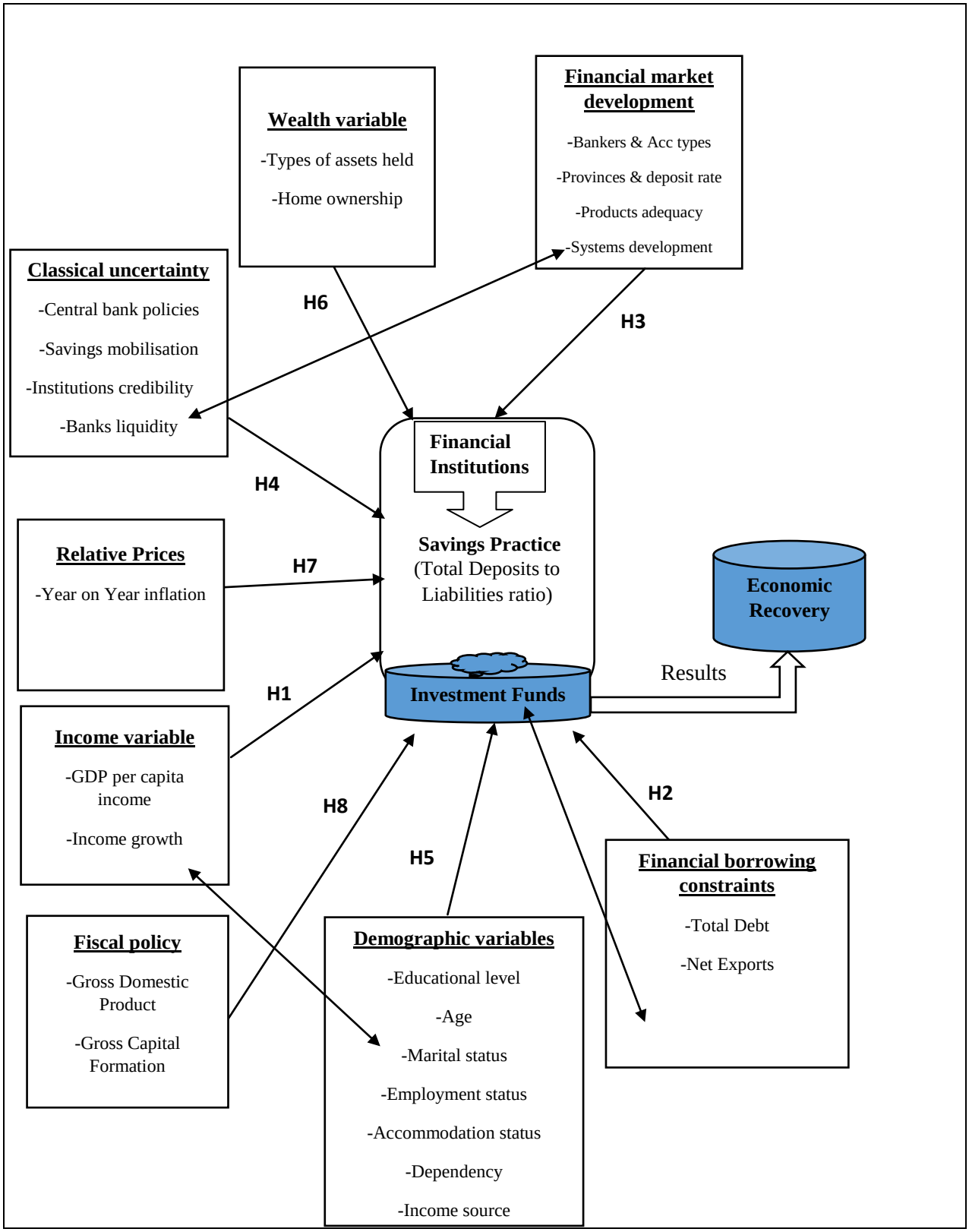


Figure 3.5: Conceptual Framework

Source: Factor categories affecting the culture of savings adopted from Grigoli etal (21014. IMF working paper.

Developing countries should make financial sector stability their prerogative as stability has a strong influence on the much needed culture of saving. The framework adapted from the COMESA framework on financial stability views financial sector stability holistically and is affected by both exogenous and endogenous factors. From the framework, savings are organised and managed by the financial institutions that operate within the confines of the legal, economic and policy framework established by the regulators that include the Central bank, Deposit Protection Corporation, Bankers Association of Zimbabwe and Ministry of Finance. The savings culture in Zimbabwe was measured by the Total Deposits and Liabilities (DTL) ratio. The restoration of the culture of saving in banks is driven by the factors classified into fiscal policy variables, demographic variables, income variable, relative price variable, financial borrowing constraints, risk factors, wealth variable and financial market development factors. Activities of saving units avail investment funds for the country which in turn can result in economic recovery.

3.5. Research Hypotheses

Therefore from the conceptual map in Figure 3.5, the study tested the following hypotheses:

Hypothesis one

H_o: The average individual income has no positive effect on the saving practice in Zimbabwe

H_1: The average individual income has a positive effect on the saving practice in Zimbabwe

Hypothesis two

H_0**:** The demographic variables are independent of the savings culture among Zimbabweans.

H_1**:** The demographic variables are dependent of the savings culture among Zimbabweans.

Hypothesis three

H_0**:** The financial market development variables have no positive effect on the savings culture among Zimbabweans.

H_1: The financial market development variables have positive effect on the savings culture among Zimbabweans.

Hypothesis four

H_0: The classical uncertainty (risk) is independent of the savings culture among Zimbabweans.

H_1: The classical uncertainty (risk) is dependent of the savings culture among Zimbabweans.

Hypothesis five

H_0: The fiscal policy variables (GDP and Gross Capital Formation) are independent of the culture of savings among Zimbabweans.

H_1: The fiscal policy variables (GDP and Gross Capital Formation) are dependent of the culture of savings among Zimbabweans.

Hypothesis six

H_0: The wealth variables have no positive effect on the culture of savings among Zimbabweans.

H_1: The wealth variables have a positive effect on the culture of savings among Zimbabweans.

Hypothesis seven

H_0: The relative price variable (Year on Year Inflation) has no positive effect on the culture of savings among Zimbabweans.

H_1: The relative price variable (Year on Year Inflation) has a positive effect on the culture of savings among Zimbabweans.

Hypothesis eight

H_0: The foreign borrowing constraints are independent of the culture of savings among Zimbabweans.

H_1: The foreign borrowing constraints are dependent of the culture of savings among Zimbabweans.

3.6 Chapter summary

The Chapter analysed the theoretical framework that informed the problem under study. The traditional theories constituting the PIH and the LCSH were analysed followed by the Keynesian theory on Savings. An analysis of the modern theories of savings namely the Hyperbolic Discounting theory and the Mental accounting theory was done. The chapter concluded by formulating a conceptual framework and the hypotheses that are to be tested in the study.

CHAPTER FOUR

RESEARCH METHODOLOGY

4.0. Introduction

The Chapter set out how the study area was investigated. The investigation has been set under the following topics, research design, research instruments, population and sampling strategy, data analysis and presentation techniques, data validity and reliability as well as ethical issues.

4.1. Research Philosophy

Research philosophy is about how the world and the processes that operate in it (realities) are viewed (Mouton, 2001). There are two paradigms of looking at the world namely positivism and anti-positivism. Positivism regards the world as being understood by an objective inquiry based on measurable variables and provable propositions (Conte, 1830). Anti-positivism or phenomenology on the other hand is premised on the fact that reality is constructed by social actors and people's perceptions of reality (Saunders, Lewis and Thornhill, 2009). It views reality as subjective and numeric measurement is not always possible. The general research objective was to establish the determinants of restoring the culture of savings among Zimbabweans. Thus the study determined the quantitative and the qualitative relationship between the savings culture measured by the Total Deposits to Liabilities (TDL) ratio and the savings determinants. In light of the above the data employed in the study was both numerical and non-numerical hence the study adopted a mixed approach.

Some of the measurable variables in the study include Gross Domestic Product (GDP), Total Deposits to Liabilities (TDL) ratio, GDP per capita income, year on year inflation, gross capital formation, deposit rate, age, total debts and net exports. The study attempted to predict the trends in some of these variables as well as identified the linkage between these variables and the nation's culture of saving. The study also got opinion on the adequacy of the savings products, effectiveness of the policies by regulators, strategies to mobilise savings among others. These views were open to several interpretations and thus the study blended the positivist approach with the anti-positivist approach.

4.2. Research Design

The research design refers to the overall strategy chosen by the researcher to integrate different components of the study in a coherent and logical way by ensuring that the research problem is effectively addressed (Saunders et al, 2009). It is a master plan specifying the methods and procedures for the collection, measurement and analysis of the information required to achieve research objectives (Mouton, 2001). Bell, (2004), defined a research design as a systematic step used to accomplish the purpose of the study that is the exercise that results in obtaining information and solutions to the identified problem. Saunders et al (2009) further expounded the research design as the plan and structure of investigation and the way in which studies are put together. Cooper et al (2003) also defined research design as the process of focusing on the researcher's perspective for the purpose of a particular study.

The study adopted exploratory and descriptive approaches. The descriptive approach enabled the study to unpack what is currently going in Zimbabwe in terms of the practice of savings through some descriptive social and economic indicators like employment status, bank deposits, bank liabilities, age, marital status, gender among other indicators. The descriptive approach invoked the "why" questions requiring the explanatory focus with the view of developing explanations to ascertain trends identified. The study developed a multi-variate regression model of various indicators that explained the savings practice among Zimbabweans. It is also a survey study as it provided a broad overview of a representative sample of the larger Zimbabwean population (Mouton, 2001). Further the study sought to gather public opinion regarding the restoration of the culture of savings among Zimbabweans and the performance of the banking institutions. Secondary data analysis was employed to re-analyse existing data to test the hypotheses..

4.3 Research instruments

A research instrument is a tool that has been used to collect data in the research. The tools used are the questionnaire, interview guide and document analysis guide.

4.3.1 Questionnaire

A questionnaire is a list of carefully structured questions chosen after considerable testing (Saunders et al, 2009). The questionnaire was used to solicit information on the determinants of restoring a culture of saving in banks among Zimbabweans as well as the performance of the banking system from the savers' view. A questionnaire has the advantage that it permits

respondents to carefully consider their responses and it allowed the researcher to address a large number of issues. The questionnaire was either emailed or hand posted. Mailed questionnaires permitted anonymity and minimised interviewer bias which in turn increased response rate. Responses from the questionnaire were scored to obtain overall measure of the opinion of the respondents. Questionnaires have one disadvantage that they are a complex instrument and if badly constructed may be misleading, may demotivate the respondents resulting in a possibility of a low response rate.

The instrument covered a wide range of thematic areas relevant to the study of the practice of savings among Zimbabweans, like demographic characteristics including age, marital status, race or ethnicity, self- employment or formally employed. Other views sought by the instrument included respondents' view about the credibility of the Zimbabwean banks in terms of the financial risks, crises, macroeconomic stability as well as economic stability among other views. The questionnaire combined both open ended questions and closed questions to stimulate discussion and uncover as well as explore issues that could not be anticipated.

Although open ended questions necessitate probing and a large quantity of data would be obtained this way, they were not employed as they somehow compromised the analysis of results. Closed ended questions were employed which had a finite answer like marital status, age, gender, race and nature of employment. They provided a high level of control to the researcher and could be easily analysed and did not put a strain on the respondents.

4.3.2. Interview guide

The interview guide specified the areas related to the research study. It gave considerable autonomy to the respondents in expressing their opinions about the determinants of restoring a culture of saving in banks among Zimbabweans. Furthermore it allowed the interviewer to make follow-ups of ideas and to investigate motives and feelings (Nachmias and Nachmias, 1981). The interview guide was administered on officials from the RBZ, DPC, Banking Institutions, MFIs and the Finance and Economic Development Ministry to gather their opinions on the restoration of savings culture among Zimbabweans.

4.3.3. Document analysis guide

This was an important part of the data collection process. According to Bowen (2009), document analysis is a systematic procedure for reviewing and evaluating documents both

printed and electronic. Corbin and Strauss (2008) cited by Bowen (2009) further noted that document analysis enabled data to be examined and interpreted in order to elicit meaning and understanding and thus develop empirical knowledge. Documents that were used for systematic evaluation as part of the study took the form of annual and mid-term budgets by the Zimbabwe Treasury, Quarterly reports by the Central Bank as well as monetary policy statements as well as documents from ZIMSTATS, World Bank and the IMF.

Document analysis informed the study on the *status quo* with regards to the savings practice among Zimbabweans measured by the ratio of total bank deposits to total bank liabilities. This enabled the researcher to collect a wide range of social indicators and economic information like GDP, GDP per capita income, total bank deposits, total bank liabilities, public sector savings, and current account movements among other information. Secondary data collected from document analysis became handy in the research because of its availability as most documents were in the public domain both print and electronic. It was also advantageous for its completeness, and coverage as well as cost effectiveness. However there was need to evaluate the quality of some of the secondary data sources as some documents lacked detail.

4.4 Pilot Test

According to Saunders et al (2009) pilot test being sound measurement test, it must meet the tests of reliability, validity and practicality. A pilot study was conducted with the questionnaire pretested on twenty depositors in Harare that were not on the sample frame to identify the questions that were ambiguous and spellings. A rule of thumb of 1% was used for pilot testing (Blumberg, Cooper and Schindler, 2011). The purpose of the proposed pilot test was to assess the reliability of the psychometric measures that were used in the study like the views of the respondents on the adequacy of savings products and banking institutions. Pilot study enabled the researcher to refine the questionnaire and make it more theoretically meaningful.

Two members from the RBZ, Deposit Protection Corporation, Ministry of Finance and five members of Banking institutions and Microfinance Institutions were also used to pre-test the interview guide to make it more meaningful. The pilot test subjects were not included in the final study subjects. It was carried out to establish the validity and reliability of the interview guide used to collect data.

4.4.1 Instruments Validity

Validity is the ability of an instrument used to measure what it is designed to measure (Leedy and Ormood, 2016). Validity answers two questions. The first to do with the study having sufficient control to ensure that the conclusions drawn are warranted by the data collected. This measures the degree to which conclusions from a study are credible or believable. The other question relates to the extent to which the researcher can make generalizations from what they have observed beyond the sample.

The validity of the questionnaire was enhanced and tested on eight depositors who were selected during a busy month-end in Chinhoyi Central Business District. The Researcher discussed the contents of the questionnaire and their comments were reviewed and incorporated in to enhance its validity. The researcher ensured content validity of the interview guide by selecting five officials, one each from the Central Bank, Banking Institutions, Deposit Protection Corporation, the Ministry of Finance and Microfinance Institutions with the requisite skills, knowledge and experience in the study area to discuss the contents in the interview guide. Their comments were reviewed and incorporated into the final interview guide.

4.4.2 Instruments Reliability

According to Leedy and Ormood (2016), reliability of a measurement instrument is the extent to which the instrument yields consistent results when the characteristic being measured has not changed. According to Cameron and Molina-Azorin (2011), reliability is a way of assessing the quality of the measurement procedure used to collect data.

In order to check the reliability of the instruments twelve questionnaires were piloted using depositors from Chinhoyi urban who were not included in the final study sample. The questionnaires were coded and fed into SPSS which was used to generate the internal Cronbach test statistic. The recommended value of 0.7 was used as the minimum threshold of the reliability of the instrument. In the case of the interview guide, the respondents were chosen based on their past experience of the savings environment and the operations of the banking systems in Zimbabwe.

4.5 Data collection procedure

In order to ensure that data was collected as accurately and as quickly as possible, the researcher recruited field assistants to expedite the data collection process. The field

assistants were recruited from the ten province of Zimbabwe. The selection criteria for the field assistants was based on good educational level with a minimum of a degree, fluency in English, Shona and Ndebele for assistants that operated in Mashonaland and Matabeleland provinces respectively and prior experience in research and data collection. The latter two languages were the predominant languages in Zimbabwe, Shona predominantly in Mashonaland provinces (Mashonaland East, Central, West, Harare, Manicaland, Masvingo and partly Midlands) and Ndebele predominantly in Matabeleland provinces (Matabeleland south, North, Bulawayo and partly Midlands). The field assistants were inducted and moved to the provincial capitals of the Zimbabwe's 10 provinces. The researcher who was responsible for the results followed up on the collection process of the field assistants.

4.6 Population and Sampling

Wegner (2003), defined population as the universal set or the totality of the elements whereas a sample as part of the universal set or the population. The population is the number of deposit account holders at commercial banks and other resident banks functioning as commercial banks that are resident in a country. The major types of depositors were checking accounts, savings accounts and time deposits. For some countries according to the World Bank report (2015), population data cover the total number of deposit accounts due to the lack of information on account holders. According to the Alfred Archival economic data (2016) the number of depositors at commercial banks at the end of 2016 stood at 738 196 depositors. The figure currently should be more than this as the variable was always changing.

The process of drawing that part of the population is known as sampling and can be categorized into two broad classes, random sampling and non-random sampling (Wegner, 2003). When random sampling has been adopted it implied every element in the population had an equal chance of being selected whereas non random sampling is when the sample characteristics are determined by the researcher. Thus non-random sampling, which is also referred to as non-probability sampling has researcher bias.

A simple random sample of 200 depositors from the ten provincial capitals of the country's ten provinces was used. The depositors were chosen as they did their banking services at the end of the month. Month end is a very busy period for depositors in Zimbabwe as the majority frequented their banks. The target sample for the questionnaire is shown in Table 4.1 below.

Table 4.1: Target Sample for the questionnaire

Respondents	Number of elements
Depositors	200

Source: Researcher

Four participants were each purposively drawn from the Deposit Protection Board, Ministry of Finance and from the Central Bank. Out of the 19 Banking institutions in Zimbabwe and 154 Microfinance institutions (RBZ Quarterly report, 2016), 74 participants and 28 participants respectively were also purposively drawn for this study. The details are presented in Table 4.2 below.

Table 4.2: Target Sample for the interviews

Respondents	Number of elements
Banking institutions	74
Micro-financiers	28
RBZ	4
Ministry of Finance	4
Deposit protection Board	4
TOTAL	**114**

Source: Researcher

Therefore the research sample consisted of 314 elements. Opinions from the respondents were used to buttress secondary data.

4.7 Data Processing and Analysis

According to Blumberg et al (2011) data analysis is the process of inspecting, cleansing, transforming and modelling data with the objective of discovering useful information, suggesting conclusions and supporting decision making. It is vital as it enables the testing of the goodness of the data and the testing of hypotheses (Saunders et al, 2009). Since the research adopted both a qualitative and quantitative approach, both analytical tools were made use of. For the analysis of qualitative data, for instance the opinion from investors a Likert scale was employed. According to Leedy and Ormrod (2016), Likert scale defines potential responses in terms of a spectrum for instance ranging from strongly agree to strongly disagree. Thus an average score on the scale and a modal response were used to

determine the most popular response from the respondents. The results from qualitative data were used to give a description of the status of the financial institutions and the determination of the restoration of the savings culture among Zimbabweans.

Results from secondary sources were tabulated into rows and columns for ease of interpretation. Trend over time in terms of gross savings, total bank deposits, total bank liabilities, GDP, GDP per capita were displayed on line graphs. Line graphs are quite useful in showing trend over time. Quantitative data was analyzed using a number of statistical tools like the regression analysis to show relationship between different performance indicators of the financial systems and associated correlation analysis. Key statistics like the Chi-Square for measuring the degree of association between qualitative variables and the Pearson correlation coefficient for quantitative variables were used to ascertain the association of the variables under study. SPSS 20, Excel application packages were used in the analysis of data.

4.7.1 Model determinants of restoring savings

Linear regressions were used as econometric tools for explaining the relationship between savings culture and various factors. Standardised regression coefficients were used to indicate the relative importance of the associated factor to the savings culture among Zimbabweans. The statistical software (SPSS version 20) computed the model and the standardised regression coefficients. A stepwise selection was used where the independent variables that contributed the most in explaining the savings culture were first added. Subsequent factors were included based on their incremental contributions.

The conceptual framework came up with the factors driving the restoration of the culture of saving in banks among Zimbabweans. These were classified into eight category variables that were used to model the determinants of restoring the savings culture among Zimbabweans. These variables included Income measured by the GDP per capita, demographic variables, financial market development variables, classical uncertainty, fiscal policy variables, wealth variables, relative prices and foreign borrowing constraints.

NVIVO software was used to analyse qualitative data from the interview guide through grouping responses to identify the major themes from the respondents. Other data analysis tools like coding, word frequency, text search and matrix coding helped to come up with major themes describing the determinants of restoring a culture of saving in banks among Zimbabweans.

4.7.2 Hypothesis testing

The variables in the model were tested on how well they fit the data using SPSS. The fitness of the tests was done using the coefficient of determination (R^2) which explained the extent to which the predictor variables (determinants of savings) caused variations in the dependent variable (determinants of restoring the culture of saving in banks among Zimbabweans). The $t-$test statistic was used to test the significance of each individual predictor or independent variable and the hypothesis. The probability value ($p-$value) for each $t-$test was used to make the conclusion of whether to fail to accept the null hypothesis or to fail to reject the null hypothesis. The benchmark for this study for failing to accept or reject the null hypothesis was 0.05 (5%) level of significance. Where the $p-$value would be less than 5%, the null hypothesis would fail to be accepted. Alternatively where the p-value would be greater than 5% the null hypothesis would fail to be rejected.

The Fisher distribution test ($F-$test) was also applied in the study. According to Blumberg, Cooper and Schindler (2011) the Fisher test refer to the ratio between the model mean square divided by the error mean square. The $F-$test was used to test the significance of the overall model at 95% confidence level. The $p-$value for the Fisher statistic was applied in determining the model robustness. The rejection or acceptance of the null hypothesis implies the overall model is significant or insignificant respectively.

4.7.3 Test for collinearity and multicollinearity

Collinearity or multicollinearity describes a situation where two or more of the independent variables are highly correlated (Blumberg et al, 2011). Independent variables with correlations that were at least 80% were checked for collinearity and multicollinearity. In addition, the Variance Inflation Factor (VIF) index was used to check the possibility of collinearity and multicollinearity of the independent variables. The VIF benchmark index of 10 was used and an index greater 10 is an indication of collinearity and multicollinearity

4.7.4 Test for Normality.

The test was done to ascertain whether the regression residuals were mesokurtic and non-skewed (Gujarati, 2003). Non-normality affects the efficiency of the estimates and may distort the statistical tests, more so when the sample size is less than fifty elements (Green, 2008). In this study, the skewness statistic and the kurtosis statistic were used to measure the normality of the variables used in regression analysis. Wegner (2003) advanced that

skewness and kurtosis coefficients must lie between -3 to +3 to imply that the variable under study is normally distributed. Kurtosis measures the peakedness of the distribution or the degree of concentration around the mean while skewness measures the extent to which observations depart from the line of symmetry (Wegner, 2003).

4.7.5 Test for Heteroscedasticity.

Heteroscedasticity is lack of constant error variance and is a problem that makes the standard errors biased leading to invalid test statistics (Gujarati, 2003). The results may thus be misleading. Gujarati (2003) however noted that the problem of heteroscedasticity is likely more common in cross-sectional data than time series data as cross-sectional data deals with members of a population at a given point a time. Time-series data on the other hand, variables tend to be of similar orders of magnitude because data is collected for the same entity over time. In the study the Levene test was used as an alternative test to check for heteroscedasticity.

4.8 Ethical considerations

This is the consideration of the principles of morality that is the right or wrong of an action prior to acting (Saunders et al, 2009). Ethics emanate from the fact that primary research involves collecting data about a given subject directly from the real world. Opinion about the performance of the financial systems in Zimbabwe as well as the determinants of restoring a culture of saving in banks among Zimbabweans was solicited from investors, depositors and regulatory authorities like the Central Bank, Deposit Protection Corporation and the Finance Ministry. When conducting a research of this academic magnitude, one needed to be aware of the ethics behind one's research activity. Mindful of research ethics the researcher firstly sought permission of the respondent before conducting the interview. However analysis of secondary public information like the total deposits, total bank liabilities, GDP, Net Exports among other secondary data did not require such permission as it was public information from the Central bank and ZIMSTATS. Carrying out an academic research of this magnitude, the researcher should not harm the respondents physically and emotionally. The researcher avoided questioning sensitive or difficult questions. The researcher assisted the respondents in answering certain difficult questions. In order to avoid personal bias, the researcher gave the respondents a fair chance to air out their opinions on certain study aspects and the researcher gave assurance of confidentiality of research results. The relevant authorities were

approached with the due procedure given that mandated the collection of data in the respective areas.

4.9 Chapter Summary

The chapter looked at the research methodology and spelt out the research philosophy and the research design of the study. The research instruments consisting of questionnaire, interview guide and the document analysis guide were analysed as well as the validity and reliability of these instruments. The population and sampling procedures were spelt out in the chapter. The data collection procedures and the analysis procedures were also laid out. The chapter concluded by looking at the ethical considerations taken in the study.

CHAPTER FIVE

DATA PRESENTATION AND ANALYSIS

5.0 Introduction

This chapter presents results of the questionnaire, the interview guide and secondary data from documentary analysis. The research hypotheses were also tested. The findings focused on addressing the four major objectives: 1) Evaluate the development of the Zimbabwean banking system. 2) Define and explore the saving practices among Zimbabweans 3) Examine the drivers influencing saving culture among Zimbabweans 4) Evaluate the effects of saving culture on the performance of the Zimbabwe economy.

5.1 Response rates

5.1.1 Response rate from the Questionnaire

A total of 200 questionnaires were randomly distributed to savers in the ten provincial capitals of Zimbabwe. The response rate results from the study indicated that the majority of the questionnaires (85%) were returned compared to 15% that were not returned as illustrated by Table 5.1 below. The high response rate of 85% was an indication of interest by the respondents on the problem being investigated. According to Mugenda and Mugenda (2003), a response rate of 50% is adequate for analysis and reporting; a rate of 60% is good and a response rate of 70% and over is excellent. Willimack (2002) cited by Snijkers (2008) suggested that response rate in the range of 50-65% is considered credible for analysis. Baruch (1999) however advanced that there are no agreed norms as to what may be considered reasonable response rate (RR). The response rate was considered credible for further statistical analysis as it was above the minimum threshold of 60% recommended by Mugenda and Mugenda (2003) and Willimack (2002).

Table 5.1: The Response Rate for the Questionnaire

Response rate	**Frequency**	**Percentage**
Returned	170	85%
Unreturned	30	15%
Total	**200**	**100%**

Source: Researcher

5.1.2 Response Rate from the Interview guide

There was 81% responses rate from Bankers, 82% response rate from Micro financiers and 100% response rate from RBZ, Ministry of Finance as well as the Deposit Protection Board. The response rates from the stakeholders' face to face interviews were considered credible for further analysis. According to Punch (2003), response rate from face to face interviews of between 80-85% is considered good. Aregbeyen (2011) achieved 100% on face to face interviews administered on five branch offices of banks in Nigeria in a paper that investigated the determinants of bank selection choices by customers. Generally the response rates detailed in Table 5.2 below were acceptable and necessitated the generalisation of the determinants of restoring the saving culture among Zimbabweans by the identified stakeholders.

Table 5.2: The Response Rate for the Interviews

Respondents profile	**Targeted Frequency**	**Actual Frequency**	**Percentage response rate**
Bankers	**74**	60	81%
Micro-financiers	**28**	23	82%
RBZ	**4**	4	100%
Finance Ministry	**4**	4	100%
DPC	**4**	4	100%
Total	**114**	**95**	**83%**

Source: Researcher

5.1.3 Distribution of depositors across gender

Table 5.3: Gender

		Frequency	**Percent**	**Valid Percent**	**Cumulative Percent**
Valid	Female	66	38.8	38.8	38.8
	Male	104	61.2	61.2	100.0
	Total	**170**	**100.0**	**100.0**	

Source: Researcher

An analysis of the respondent distribution from the questionnaire showed that 61.2% of the respondents were male. This confirmed the demographic features of the working population in Zimbabwe and imbalances created by the colonial system.

5.1.4 Reliability analysis

According to Brumberg et al (2011) reliability is a measure of assessing the quality of the measurement procedure used to collect data. The Cronbach coefficient alpha automatically generated by SPSS application software showed that banking sector development variables had an alpha of 0.76, saving culture variables of 0.83, savings drivers 0.72 and economic performance variables 0.73. The items on each of the variables of the questionnaire and secondary data were subjected to Cronbach reliability test and were found to be reliable as the reliability coefficients were greater that the 0.7 threshold as indicated in Table 5.4 below.

Table 5.4: Reliability test

Objective Variable	Cronbach statistic	Number of items
Banking sector developments	0.76	13
Saving Culture	0.83	29
Drivers of savings	0.72	9
Performance of the economy	0.73	9

Source: Researcher

5.2 Banking Systems in Zimbabwe

The architecture of the banking sector in Zimbabwe consisted of 13 commercial banks, 4 building societies and 1 savings bank (Quarterly banking sector report, March 2016). 49.4% of the respondents were aware of the commercial banks followed by 23.5% of the respondents who were aware of all the banking institutions asked namely commercial banks, investment banks, savings banks and building societies. Only 1.8% indicated that they were aware of Investment banks. The National Inclusion Strategy (2016-2020) identified a gap among Zimbabweans regarding financial literacy. The World Bank Consumer Protection and Financial Literacy Diagnostic report of 2014 revealed the low financial literacy among Zimbabweans regardless of the country despite the country (Zimbabwe) having a general literacy level around 90%.

Table 5.5: Category of institutions known

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Commercial banks	84	49.4	49.4	49.4
	Investment banks	3	1.8	1.8	51.2
	Savings banks	35	20.6	20.6	71.8
	Building societies	8	4.7	4.7	76.5
	All of them	40	23.5	23.5	100.0
	Total	**170**	**100.0**	**100.0**	

Source: Researcher

Table 5.6 below profiles the views of the respondents on the adequacy of the banking institutions and 54.7% were of the opinion that there adequate while 6.5% were not sure.

Table 5.6: Adequacy of banking institutions

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Adequate	93	54.7	54.7	54.7
	Inadequate	38	22.4	22.4	77.1
	Too many	28	16.5	16.5	93.5
	Not sure	11	6.5	6.5	100.0
	Total	**170**	**100.0**	**100.0**	

Source: Researcher

On their view of the adequacy of the savings products 48.8% of the respondents thought that the savings products were not adequate while 6.5% were not sure.

Table 5.7: Adequacy of savings products

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	56	32.9	32.9	32.9
	No	83	48.8	48.8	81.8
	Not sure	31	18.2	18.2	100.0
	Total	**170**	**100.0**	**100.0**	

Source: Researcher

Results from Table 5.8 below indicated that 30.0% of the respondents disagreed with the view that developments in the banking sector have promoted savings practices among Zimbabweans over the years. Thus developments in the banking system have not promoted savings in the country. Only 9.4% of the respondents indicated that they were not sure of whether the developments promoted savings or not.

Table 5.8: Banking system developments

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly agree	19	11.2	11.2	11.2
	Agree	43	25.3	25.3	36.5
	Not sure	16	9.4	9.4	45.9
	Disagree	51	30.0	30.0	75.9
	Strongly disagree	41	24.1	24.1	100.0
	Total	**170**	**100.0**	**100.0**	

Source: Researcher

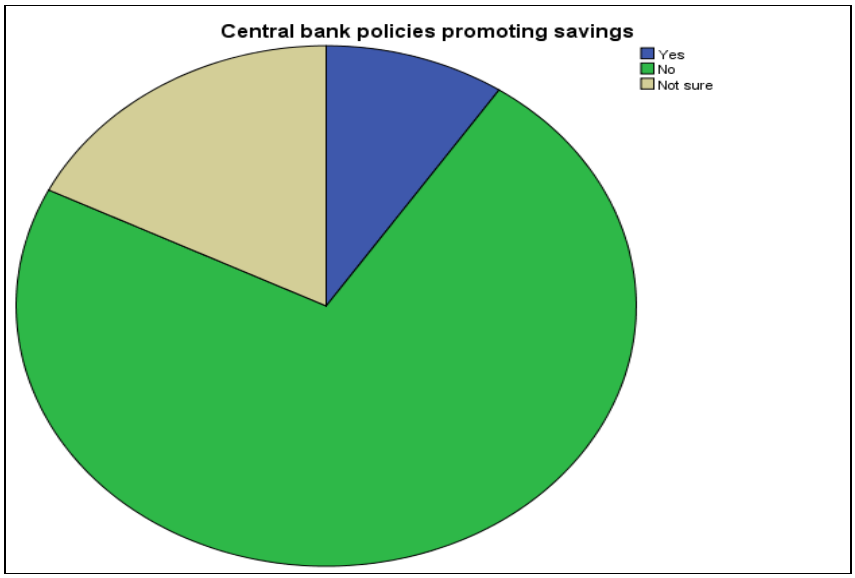


Figure 5.1: Central bank policies in promoting savings

Source: Researcher

Results from Table 5.9 below showed that 72.9% of the respondents were not satisfied with the policies of the central bank in Zimbabwe. This was reinforced by a bigger proportion of respondents with 'no' in Figure 5.1 above. However 9.4% of the respondents were satisfied with the policies of the apex bank in promoting savings.

Table 5.9: Central bank policies promoting savings

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	16	9.4	9.4	9.4
	No	124	72.9	72.9	82.4
	Not sure	30	17.6	17.6	100.0
	Total	**170**	**100.0**	**100.0**	

Source: Researcher

Although 38.2% of the respondents from Table 5.10 below, were of the opinion that reduction of service charges and increasing the interests earned on deposits should the main strategy to be used to restore the culture of saving in banks among Zimbabweans.. Banking policy reforms should be part of the solution strategy as highlighted by 28.8% of the respondents. Only 0.6% of the respondents felt increasing branch network could be used as strategy. The lower percentage highlighted showed the impact mobile technology and information technology has had in facilitating the movement of cash from one place to the other.

Table 5.10: Strategies to mobilise savings

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Reducing service charges and interest rate earned	65	38.2	38.2	38.2
	Banking policy reforms	49	28.8	28.8	67.1
	Increasing savings product range and innovations	12	7.1	7.1	74.1
	Increasing bank branch network	1	.6	.6	74.7
	Not sure	43	25.3	25.3	100.0
	Total	**170**	**100.0**	**100.0**	

Source: Researcher

Table 5.11 below shows the views about the adequacy of the products against the gender of the respondents.48.8% of the respondents were of the opinion that the savings products were not adequate on the market, whereas 18.2% were not sure of the adequacy of the savings products. 39.4% of the female respondents were of the opinion that the savings products are inadequate while 54.8% of the male respondents thought likewise.

Table 5.11: Gender against Adequacy of savings products Cross tabulation

			Adequacy of savings products			Total
			Yes	No	Not sure	
Gender	Female	Count	20	26	20	66
		% within Gender	30.3%	39.4%	30.3%	100.0%
		% within Adequacy of savings products	35.7%	31.3%	64.5%	38.8%
		% of Total	**11.8%**	**15.3%**	**11.8%**	**38.8%**
	Male	Count	36	57	11	104
		% within Gender	34.6%	54.8%	10.6%	100.0%
		% within Adequacy of savings products	64.3%	68.7%	35.5%	61.2%
		% of Total	**21.2%**	**33.5%**	**6.5%**	**61.2%**
Total		Count	56	83	31	170
		% within Gender	32.9%	48.8%	18.2%	100.0%
		% within Adequacy of savings products	100.0%	100.0%	100.0%	100.0%
		% of Total	**32.9%**	**48.8%**	**18.2%**	**100.0%**

Source: Researcher

The chi-square statistic is 10.809 and the probability value (p-value) is given by 0.004 from Table 5.12 below resulted in the rejection of the null hypothesis that the notion of the adequacy of savings products was the same across gender since the value is less than 0.05. This implied that opinion of savings products adequacy was different between male and female respondents.

Table 5.12: Chi-Square Tests for savings products adequacy and gender

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	10.809[a]	2	.004
Likelihood Ratio	10.584	2	.005
Linear-by-Linear Association	4.732	1	.030
N of Valid Cases	170		

Cells (0.0%) have expected count less than 5. The minimum expected count is 12.04.

Source: Researcher

Furthermore Table 5.13 below showed a weak association between gender and product adequacy measured by the contingency coefficient of 0.244.

Table 5.13: Symmetric measures for gender and savings products adequacy

		Value	Asymp. Std. Error[a]	Approx. T[b]	Approx. Sig.
Nominal by Nominal	Contingency Coefficient	.244			.004
Interval by Interval	Pearson's R	-.167	.078	-2.200	.029[c]
Ordinal by Ordinal	Spearman Correlation	-.154	.079	-2.022	.045[c]
N of Valid Cases		170			

a. Not assuming the null hypothesis.

b. Using the asymptotic standard error assuming the null hypothesis.

c. Based on normal approximation.

Source: Researcher

5.3. Savings practices among Zimbabweans

The average deposit to liabilities ratio was 64.73% and the distribution was negatively skewed with a static of -0.814 and as confirmed by the box plot in Figure 5.2 below. A distribution with positive skewness implies fewer large observations in the distribution. Over the period 1980 to 2014, the deposits to liabilities ratio had been lower than the average in the majority of the times. Depositors had not been very active over the period. Statistics from Table 5.14 below have a probability value less than 0.05 resulting in the rejection of the null hypothesis of independence between account activity and savings potential.

Table 5.14: Chi-Square Tests for account activity and savings potential

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	30.380	8	.000
Likelihood Ratio	28.076	8	.000
Linear-by-Linear Association	.002	1	.967
N of Valid Cases	170		

a. 7 cells (46.7%) have expected count less than 5. The minimum expected count is .53.

Source: Researcher

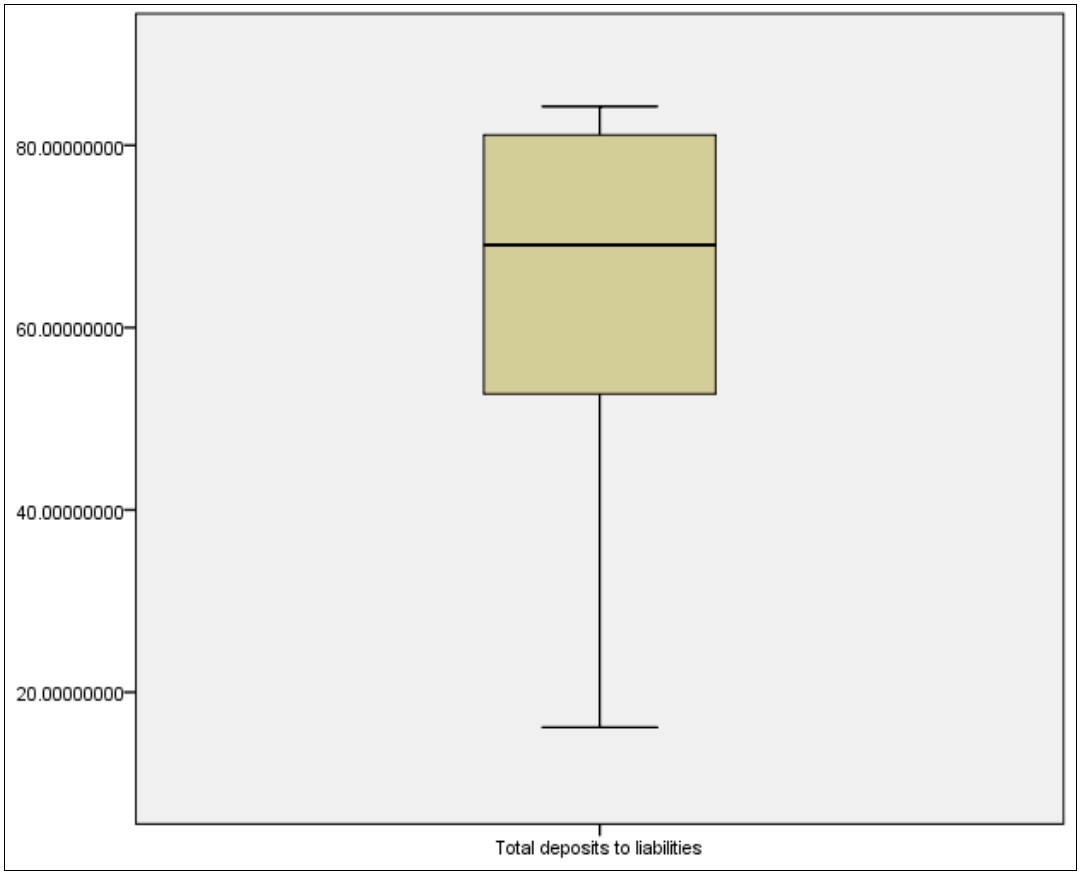


Figure 5.2: Box plot for the deposit to liabilities ratio

Source: Researcher

Generally the majority of the respondents that participated in the survey had active bank accounts as 97.6% confirmed as having the active accounts compared to 2.4% who did not have active accounts from Table 5.15 below.

Table 5.15: Having an active bank account

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	166	97.6	97.6	97.6
	No	4	2.4	2.4	100.0
	Total	170	100.0	100.0	

Source: Researcher

The majority of respondents had active bank accounts as indicated by Table 5.15 above. Table 5.16 below has a probability value less than 0.05 resulting in the rejection of the null hypothesis of independence between account activity and savings potential. The table shows

that there was a relationship between account activity and the practice of savings measured by the Cramer V coefficient of 0.299.

Table 5.16: Symmetric Measures for account activity and savings potential

		Value	Asymp. Std. Error[a]	Approx. T[b]	Approx. Sig.
Nominal by Nominal	Phi	.423			.000
	Cramer's V	.299			.000
Ordinal by Ordinal	Kendall's tau-b	.071	.078	.918	.358
	Spearman Correlation	.073	.085	.954	.341[c]
Interval by Interval	Pearson's R	.003	.096	.041	.967[c]
N of Valid Cases		170			

a. Not assuming the null hypothesis.
b. Using the asymptotic standard error assuming the null hypothesis.
c. Based on normal approximation.

Source: Researcher

5.3.1. Savings potential compared with age of respondents.

Tables 5.17 and 5.18 below show the relationship between the age of respondents and the savings practice measured by the ratio between deposits and liabilities. The correlation coefficient of the two variables measured by the Pearson correlation was -0.104. This implied that the association is not very strong and is negative. The potential of savings was negatively related to the ages of the respondents. This somehow refuted the Life Cycle hypothesis which relates the savings practice to the ages of the population.

Table 5.17: Correlations of age and savings potential

		Age in years	Savings practice potential
Age in years	Pearson Correlation	1	-.104
	Sig. (2-tailed)		.177
	N	170	170
Savings practice potential	Pearson Correlation	-.104	1
	Sig. (2-tailed)	.177	
	N	170	170

Source: Researcher

Table 5.18: Model Summary for age and savings potential

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.104[a]	.011	.005	8.847

a. Predictors: (Constant), savings potential

Source: Researcher

Tables 5.19 and 5.20 show the regression coefficients explaining the dependent variable, savings potential (Y) and the independent variable age (X). The regression equation that explained the two variables was expressed as follows:

$Y = 38.488 - 0.104X + e$----------Equation 5.1

The equation further affirmed the negative relationship or inverse relationship between the savings potential and the age measured by -0.104. This implied that 10.4% of the decrease in savings is explained by the age of the population. The statistic 38.488 was an autonomous and independent of age explaining savings potential among Zimbabweans. However the probability value (p- value) of 0.177 led to the non-rejection of the null hypothesis that savings potential and age are independent of each other.

Table 5.19: ANOVA for the age and the savings potential

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	144.201	1	144.201	1.842	.177[b]
	Residual	13150.275	168	78.275		
	Total	13294.476	169			

a. Dependent Variable: Age in years

b. Predictors: (Constant), Savings practice potential

Source: Researcher

Table 5.20: Coefficients for the age and the savings potential

Model		Unstandardized Coefficients		Standardized Coefficients	T	Sig.	Correlations	
		B	Std. Error	Beta			Zero-order	Partial
1	(Constant)	38.488	1.622		23.728	.000		
	Savings potential	-1.210	.891	-.104	-1.352	.177	-.104	-.104

a. Dependent Variable: Age in years

Source: Researcher

The major reason why Zimbabweans saved from Table 5.21 and Figure 5.3 below, was for property acquisition which had the highest percentage of 26.5% followed by preparing a better life after retirement (24.1%) and the provision of funding for the children's education which had 22.9%. Cumulatively (73.5%) the three constituted the main reasons for savings in banks by Zimbabweans. A small percentage of respondents (5.3%) saved for Travel and Leisure.

Table 5.21: Main reason for saving

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Funding children's education	39	22.9	22.9	22.9
	Property acquisition	45	26.5	26.5	49.4
	Preparing a better life at retirement	41	24.1	24.1	73.5
	Illness and other emergencies	11	6.5	6.5	80.0
	To acquire consumer durables	11	6.5	6.5	86.5
	Travel and leisure	9	5.3	5.3	91.8
	Others	14	8.2	8.2	100.0
	Total	**170**	**100.0**	**100.0**	

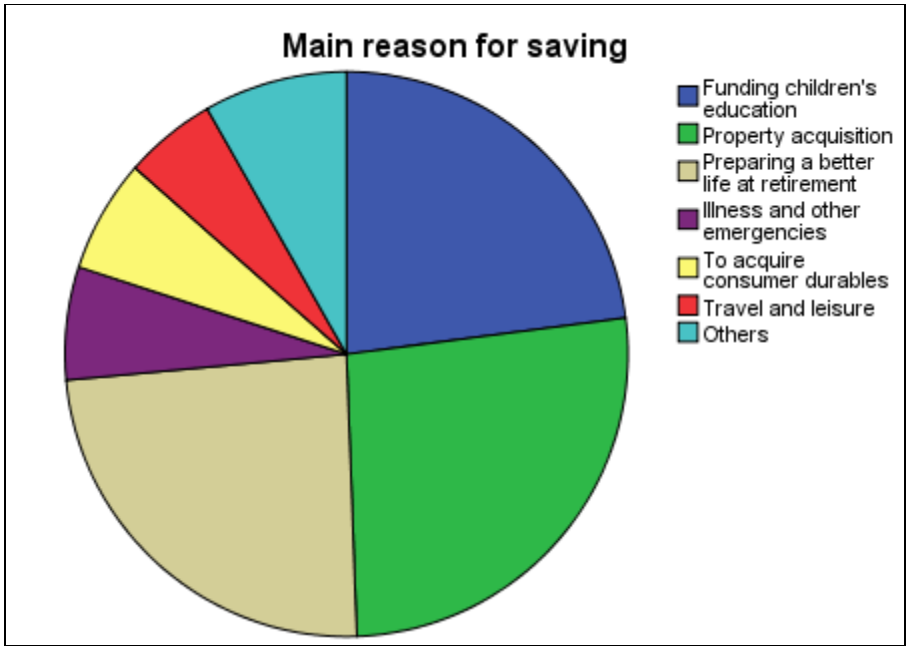


Figure 5.3: Main reasons for saving

Source: Researcher

5.3.2. Banker and reason for selecting the banker

Table 5.22 sought to find out if there was any relationship between the reason for saving and the banker selected by the respondent. The p – value of 0.000 results in the rejection of the null hypothesis of independence between the reason for saving and the banker selected. The two variables were related although the strength of association between the variables

measured by the Cramer V in Table 5.23 below was not very strong (0.422). The Pearson Chi-Square statistic was 151.342.

Table 5.22: Chi-Square Tests for saving reason and banker selection

	Value	Df	Asymp. Sig. (2-sided)
Pearson Chi-Square	151.342[a]	65	.000
Likelihood Ratio	154.457	65	.000
Linear-by-Linear Association	8.616	1	.003
N of Valid Cases	170		

a. 73 cells (86.9%) have expected count less than 5. The minimum expected count is .11.

Source: Researcher

Table 5.23: Symmetric Measures for saving reason and banker selection

		Value	Asymp. Std. Error[a]	Approx. T[b]	Approx. Sig.
Nominal by Nominal	Phi	.944			.000
	Cramer's V	.422			.000
	Contingency Coefficient	.686			.000
Interval by Interval	Pearson's R	.226	.079	3.004	.003[c]
Ordinal by Ordinal	Spearman Correlation	.174	.081	2.291	.023[c]
N of Valid Cases		170			

a. Not assuming the null hypothesis.

b. Using the asymptotic standard error assuming the null hypothesis.

c. Based on normal approximation.

Source: Researcher

Table 5.24 below shows a cross tabulation between gender and the type of account held. 84.6% of the female respondents had savings accounts and 76.9% of the male respondents had savings accounts. Overally 80.6% of all the respondents had savings accounts and this confirmed the fact that most Zimbabweans were maintaining accounts for transactional purposes as only 3% of the female respondents had call accounts and time deposits respectively. Among the male respondents only 1.0% and 0.0% of the respondents had time and call accounts respectively. Of the total respondents only 1.8% and 1.2% had time and call accounts only. Most Zimbabweans were holding short savings and not long term savings that could be used for investment according to the Keynesian theory.

Table 5.24: Gender and type of account held cross tabulation

			Type of account held					Total
			Savings account	Current account	Call account	Time deposit	Others	
Gender	Female	Count	57	5	2	2	0	66
		% within Gender	86.4%	7.6%	3.0%	3.0%	0.0%	100.0%
		% within Type of account held	41.6%	19.2%	66.7%	100.0%	0.0%	38.8%
		% of Total	33.5%	2.9%	1.2%	1.2%	0.0%	38.8%
	Male	Count	80	21	1	0	2	104
		% within Gender	76.9%	20.2%	1.0%	0.0%	1.9%	100.0%
		% within Type of account held	58.4%	80.8%	33.3%	0.0%	100.0%	61.2%
		% of Total	47.1%	12.4%	0.6%	0.0%	1.2%	61.2%
Total		Count	137	26	3	2	2	170
		% within Gender	80.6%	15.3%	1.8%	1.2%	1.2%	100.0%
		% within Type of account held	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%
		% of Total	80.6%	15.3%	1.8%	1.2%	1.2%	100.0%

Source: Researcher

According to the statistics from Table 5.25, the p- value of 0.040 and the Pearson Chi-square of 10.049 resulted in the rejection of the null hypothesis of independence between gender and the type of account held, rather the two variables were related. The results exhibited the characteristics within the Zimbabwean banking population that the majority were holding savings accounts and females constituted the highest of the account holders.

Table 5.25: Chi-Square Tests for gender and type of account held

	Value	Df	Asymp. Sig. (2-sided)
Pearson Chi-Square	10.049[a]	4	.040
Likelihood Ratio	11.785	4	.019
Linear-by-Linear Association	.453	1	.501
N of Valid Cases	170		

a. 6 cells (60.0%) have expected count less than 5. The minimum expected count is .78.

Source: Researcher

Table 5.26 below shows the degree of association between gender and the type of account held measured by the Cramer V (0.243). The two random variables were positively related although the association was not very strong.

Table 5.26: Symmetric Measures for gender and type of account held

		Value	Asymp. Std. Error[a]	Approx. T[b]	Approx. Sig.
Nominal by Nominal	Phi	.243			.040
	Cramer's V	.243			.040
Interval by Interval	Pearson's R	.052	.075	.672	.503[c]
Ordinal by Ordinal	Spearman Correlation	.105	.073	1.363	.175[c]
N of Valid Cases		170			

a. Not assuming the null hypothesis.

b. Using the asymptotic standard error assuming the null hypothesis.

c. Based on normal approximation.

Source: Researcher

Table 5.27 and Figure 5.4 below show the demography of the accounts held by the respondents according the ten provinces in Zimbabwe. The demography showed that 50% of the respondents had their accounts held in Harare which is the capital city and has the highest population compared to all the other provinces and is also the industrial hub of the country. Only 0.6% of the respondents had their accounts held in Masvingo and Matebeleland South provinces respectively.

Table 5.27: Province account held

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Bulawayo	16	9.4	9.4	9.4
	Harare	85	50.0	50.0	59.4
	Manicaland	2	1.2	1.2	60.6
	Mash central	3	1.8	1.8	62.4
	Mash east	8	4.7	4.7	67.1
	Mash west	32	18.8	18.8	85.9
	Masvingo	1	.6	.6	86.5
	Mat north	5	2.9	2.9	89.4
	Mat south	1	.6	.6	90.0
	Midlands	17	10.0	10.0	100.0
	Total	**170**	**100.0**	**100.0**	

Source: Researcher

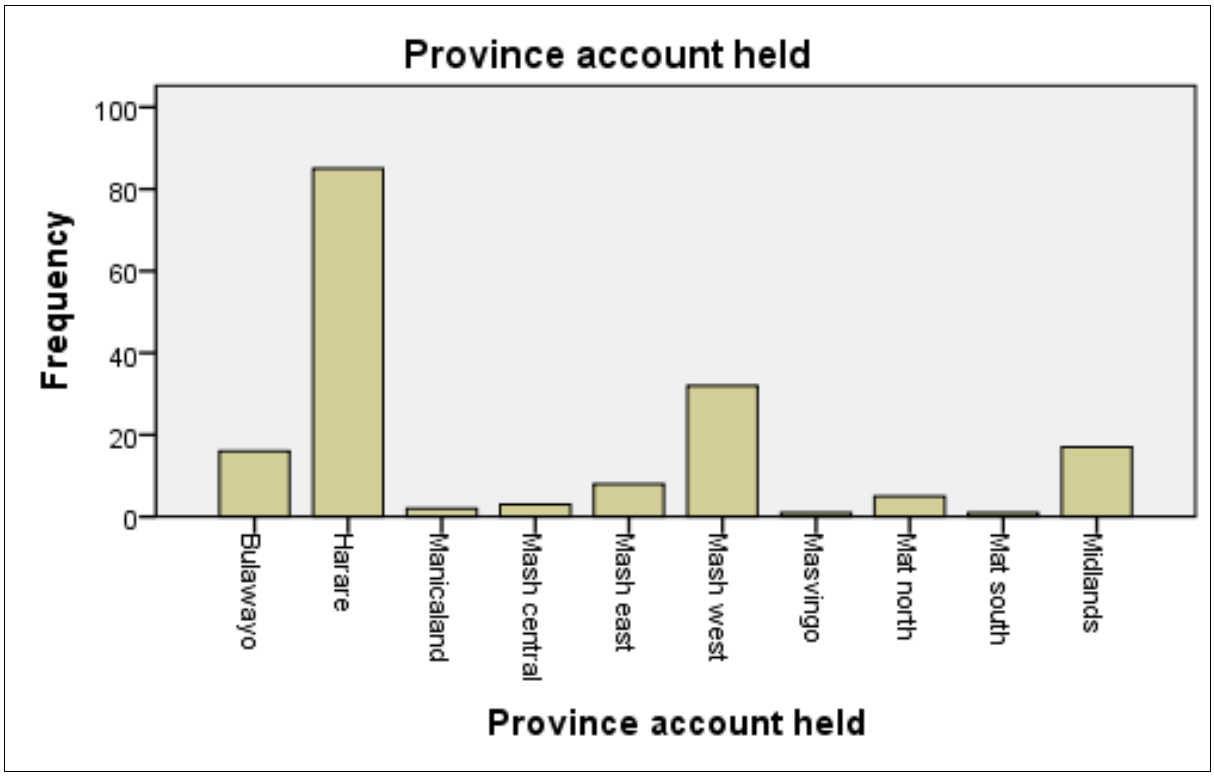


Figure 5.4: Province account is held.

Source: Researcher

Table 5.28 below has a p- value of 0.282 which is greater than 0.05 and resulted in the acceptance of the null hypothesis of independence of the savings potential and the province

the account was held. Table 5.29 below shows that the association between the savings potential and the province account is held is not significant (R = 0.083).

Table 5.28: ANOVA for Savings potential and province account is held

Model		Sum of Squares	Df	Mean Square	F	Sig.
1	Regression	9.286	1	9.286	1.167	.282[b]
	Residual	1336.808	168	7.957		
	Total	1346.094	169			

a. Dependent Variable: Savings potential

b. Predictors: (Constant), Province account held

Source: Researcher

Table 5.29: Model Summary for Savings potential and province account is held

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics				
					R Square Change	F Change	df 1	df2	Sig. F Change
1	.083[a]	.007	.001	2.829	.007	1.167	1	168	.331

a. Predictors: (Constant), Province account held

Source: Researcher

Table 5.30 and Figure 5.5 show that 50.6% of the respondents visited their banks once a month and only 1.8% of the respondents never visited their banks.

Table 5.30: Frequency of bank visit

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Daily	7	4.1	4.1	4.1
	Weekly	21	12.4	12.4	16.5
	Monthly	86	50.6	50.6	67.1
	Yearly	53	31.2	31.2	98.2
	Never	3	1.8	1.8	100.0
	Total	**170**	**100.0**	**100.0**	

Source: Researcher

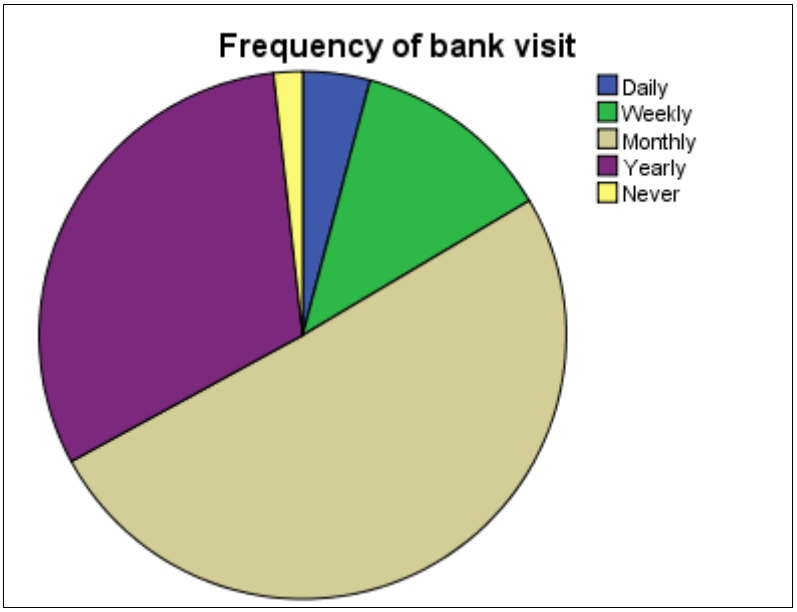


Figure 5.5: Frequency of bank visit

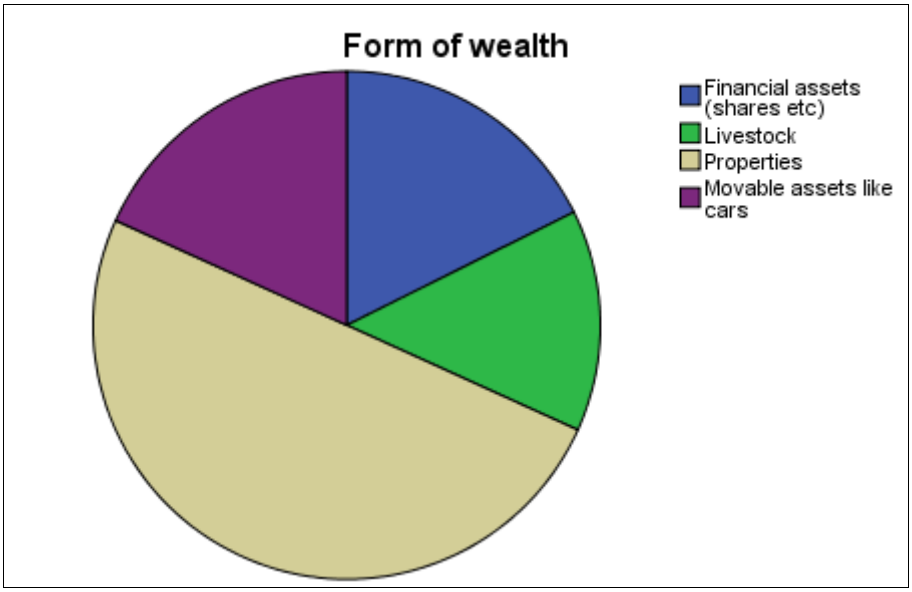
Source: Researcher

Table 5.31 and Figure 5.6 below show that the majority of Zimbabweans (85%) had property as the form of wealth held. Livestock was the least form of wealth held at 24%, even though the country is an agro-based economy. Most respondents interviewed were formally employed and resided in urban areas hence the reason for holding their wealth in the form of property.

Table 5.31: Form of wealth

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Financial assets (shares etc)	30	17.6	17.6	17.6
	Livestock	24	14.1	14.1	31.8
	Properties	85	50.0	50.0	81.8
	Movable assets like cars	31	18.2	18.2	100.0
	Total	**170**	**100.0**	**100.0**	

Source: Researcher



Source: Researcher

Figure 5.6: Form of wealth

Table 5.32 below shows that 78.8% of the respondents had the opinion that economic factors affected the restoration of the culture of saving in banks s among Zimbabweans. The factors included the performance of the economy, economy growth, employment among other variables

Table 5.32: Economic factor

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly agree	134	78.8	78.8	78.8
	Agree	23	13.5	13.5	92.4
	Not sure	7	4.1	4.1	96.5
	Disagree	2	1.2	1.2	97.6
	Strongly disagree	4	2.4	2.4	100.0
	Total	**170**	**100.0**	**100.0**	

Source: Researcher

From Table 5.33 below, credibility of the financial institutions was considered a fertile factor in promoting savings among Zimbabweans. The view was coming from the 2003 and 2004 as well as the 2008 experience where a lot of Zimbabweans lost their savings resulting from the structural changes that took place in the financial sector in those years.

Table 5.33: Credibility of institutions

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly agree	79	46.5	46.5	46.5
	Agree	37	21.8	21.8	68.2
	Not sure	32	18.8	18.8	87.1
	Disagree	13	7.6	7.6	94.7
	Strongly disagree	9	5.3	5.3	100.0
	Total	**170**	**100.0**	**100.0**	

Source: Researcher

Table 5.34 below shows the respondents' view of the effect of the political factors in the savings practices of Zimbabweans. 65.8% of the respondents strongly agreed that political factors affected the saving potential of the Zimbabweans. 1.2% and 1.8% of the respondents disagreed and strongly disagreed respectively with the view that political factors affected the savings practices among Zimbabweans.

Table 5.34: Political factor view

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly agree	112	65.9	65.9	65.9
	Agree	36	21.2	21.2	87.1
	Not sure	17	10.0	10.0	97.1
	Disagree	2	1.2	1.2	98.2
	Strongly disagree	3	1.8	1.8	100.0
	Total	**170**	**100.0**	**100.0**	

Source: Researcher

5.3.3. Savings practices and economic performance

Table 5.35 shows the correlations of the savings practices measured by the TDL ratio with the various economic indicators the deposit rate, lending rate, inflation, total debt, gross capital formation and net exports. The table showed the 2-tailed Pearson correlation coefficient at 0.01 level of significance or margin of error. There was a negligible association between savings practices and the total debt of the country (0.036), year on year inflation (0.015), lending rate (0.085) and deposit rate (0.033). Other economic variables showed a stronger association with the savings practices, particularly the level of investment measured

by the gross capital formation (0.688) and GDP (0.640). There was however moderate association between savings practice and net exports (0.305)

Table 5.35: Correlations TDL ratio and various economic indicators

		Total deposits to liabilities	Deposit rate	Lending rate	Yr on Yr inflation	Total Debt	GDP market price $m	Gross capital formation	Net Exports $m
Total deposits to liabilities	Pearson Correlation	1	-.397*	-.326	-.615*	.543*	.091	.078	-.197
	Sig. (2-tailed)		.033	.085	.015	.036	.640	.688	.305
	N	36	29	29	15	15	29	29	29
Deposit rate	Pearson Correlation	-.397*	1	.625**	.622	.638	-.416*	-.716**	-.526**
	Sig. (2-tailed)	.033		.000	.074	.065	.043	.000	.008
	N	29	29	29	9	9	24	24	24
Lending rate	Pearson Correlation	-.326	.625**	1	1.000**	.574	-.368	-.240	-.253
	Sig. (2-tailed)	.085	.000		.000	.106	.077	.258	.232
	N	29	29	29	9	9	24	24	24
Yr on Yr inflation	Pearson Correlation	-.615*	.622	1.000**	1	-.106	-.368	-.195	.132
	Sig. (2-tailed)	.015	.074	.000		.706	.195	.504	.654
	N	15	9	9	15	15	14	14	14
Total Debt	Pearson Correlation	.543*	.638	.574	-.106	1	.738**	.684**	-.892**
	Sig. (2-tailed)	.036	.065	.106	.706		.003	.007	.000
	N	15	9	9	15	15	14	14	14
GDP market price $m	Pearson Correlation	.091	-.416*	-.368	-.368	.738**	1	.512**	-.510**
	Sig. (2-tailed)	.640	.043	.077	.195	.003		.004	.005
	N	29	24	24	14	14	29	29	29
Gross capital formation	Pearson Correlation	.078	-.716**	-.240	-.195	.684**	.512**	1	-.171
	Sig. (2-tailed)	.688	.000	.258	.504	.007	.004		.375
	N	29	24	24	14	14	29	29	29
Net Exports $m	Pearson Correlation	-.197	-.526**	-.253	.132	-.892**	-.510**	-.171	1
	Sig. (2-tailed)	.305	.008	.232	.654	.000	.005	.375	
	N	29	24	24	14	14	29	29	29

*. Correlation is significant at the 0.05 level (2-tailed).

**. Correlation is significant at the 0.01 level (2-tailed).

Source: Researcher

Results from Table 5.36 and Figure 5.7, indicated that 43.5% of the respondents were of the opinion that the population had no capacity to mobilize enough savings for the country while 38% were not sure of the ability of the population to mobilise savings.

Table 5.36: Population capacity to save for investment

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	58	34.1	34.1	34.1
	No	74	43.5	43.5	77.6
	Not sure	38	22.4	22.4	100.0
	Total	**170**	**100.0**	**100.0**	

Source: Researcher

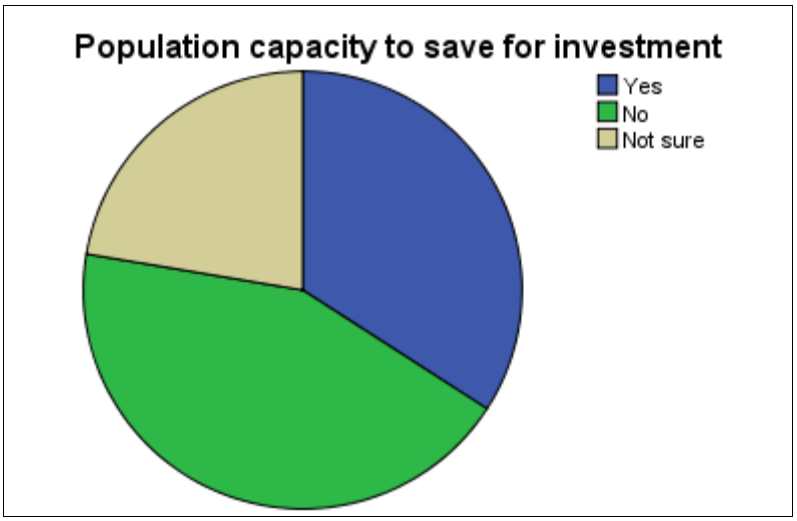


Figure 5.7: Population capacity to save for investment

Source: Researcher

The generality of the respondents (38.2%) felt that the strategy that financial institutions can use to mobilise savings should involve the reduction of service charges as well as increasing the interest rate earned on savings followed by banking policy reforms (28.8%) as indicated by Table 5.37 and Figure 5.8 below. Increasing in branch network was the least strategy that could be employed by the financial institutions. Improvement in technology could be a factor which rendered the strategy unimportant.

Table 5.37: Strategies to mobilise savings

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Reducing service charges and interest rate earned	65	38.2	38.2	38.2
	Banking policy reforms	49	28.8	28.8	67.1
	Increasing savings product range and innovations	12	7.1	7.1	74.1
	Increasing bank branch network	1	.6	.6	74.7
	Not sure	43	25.3	25.3	100.0
	Total	**170**	**100.0**	**100.0**	

Source: Researcher

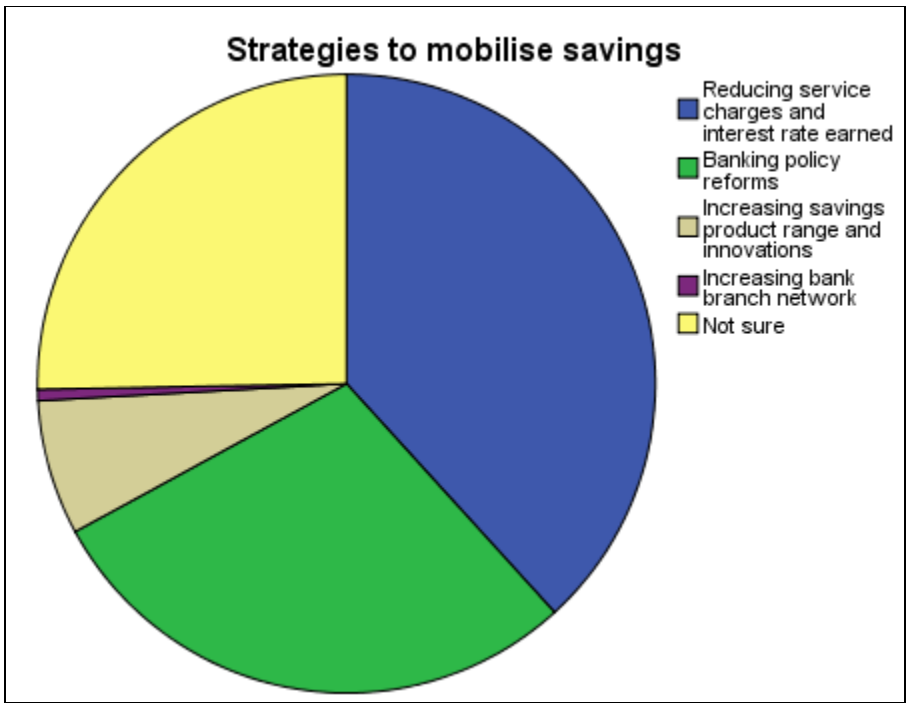


Figure 5.8: Strategies to mobilise savings

Source: Researcher

5.4. Testing Hypotheses

5.4.1 Normality test

Table 5.38 below shows the descriptive statistics of the variables that were used for testing the hypotheses and the regression coefficients. Thus the variables were normally distributed as the statistics for the skewness and kurtosis were between -3 and +3.

Table 5.38: Test for Normality

Variable	Skewness	Kurtosis
TDL ratio	-0.814	0.401
Total debt	1.091	0.381
GDP market Price	0.810	1.022
Gross Capital Formation	-1.166	2.762
Net Exports	-1.635	1.509
GDP per capita	0.123	-0.920
Year on Year Inflation	2.873	1.325

Source: Researcher

5.4.2 Test for Multicollinearity

According to Brumberg et al (2011), multicollinearity occurs when two or more predictor variables in the model are correlated and provide information that is redundant about the responses. The consequences of high multicollinearity are an increased standard error of the estimates of the betas and often results in confusing and misleading results. It can be detected by comparing any correlations between any pairs of predictors and if they are close to -1 and +1, remove the two correlated predictors from the list. Alternatively Variance Inflation Factors (VIF) can be computed for each predictor variable. When the VIF $\geq$ 10, there is a problem of multicollinearity. The VIFs indices were computed automatically to check for multicollinearity as shown by Table 5.39 below. The variance inflation factors are less than 10 which is an indication of the absence of multicollinearity.

Table 5.39: Test for multicollinearity

Variable	Variance Inflation Factor
GDP per capita	1.605
Deposit rate	1.641
Year on Year Inflation	1.002
Total Debt	1.491
GDP market price	1.482
Gross capital formation	1.005
Net Exports	1.0031

Source: Researcher

5.4.3 H1: Testing the Hypothesis that the average individual income measured by the GDP per capita income has no positive effect on the saving practice in Zimbabwe.

The hypothesis sought to find out if the average individual income had a positive effect on the savings practices among Zimbabweans. Results from Table 5.40 below indicated that the relationship was positive measured by the correlation coefficient (R) of 0.453. Although the association was positive it was not very significant.

Table 5.40: Model Summary for GDP per capita income and TDL ratio

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.453[a]	.172	.205	11.8653

a. Predictors: (Constant), GDP per capita

b. Dependent Variable: Total deposits to liabilities

Source: Researcher

The probability (p)-value in Table 5.41 below is less than 0.05 which resulted in the rejection of the null hypothesis that there was no positive relationship between average individual income and the savings practice among Zimbabweans. The rejection of the null hypothesis implied the acceptance of the alternative hypothesis that there was a positive relationship between average income and the savings practice.

Table 5.41: Coefficients for GDP per capita income and TDL ratio

Model		Unstandardized Coefficients		Standardized Coefficients	T	Sig.	95.0% Confidence Interval for B	
		B	Std. Error	Beta			Lower Bound	Upper Bound
1	(Constant)	29.885	12.55		2.38	.026	61.419	78.715
	GDP per capita	.040	.016	.453	2.49	.020	-.013	.001

a. Dependent Variable: Total deposits to liabilities

Source: Researcher

5.4.4 H2: Testing the hypothesis that the demographic variables are independent of the savings potential among Zimbabweans.

The levene's test for the equality of variances was used to test the hypothesis of the independence of the savings potential and gender of the Zimbabwean savers. The output from Table 5.42 below gave the Levene's statistic of 0.071 which resulted in the rejection of

the null hypothesis of the independence between the savings potential and the gender of the respondents. Results showed that there is strong link between the savings potential among Zimbabweans and the gender.

When financial institutions, government and the monetary authorities are crafting policies for mobilising savings in the country, they must take cognisance of gender demographic characteristic.

Table 5.42: Independent Samples Test for gender and Savings potential

		Levene's Test for Equality of Variances		**t-test for Equality of Means**				
		F	Sig.	T	Df	Sig. (2-tailed)	Mean Difference	Std. Error Difference
Savings potential	Equal variances assumed	3.300	.071	1.018	138	.311	0.086	0.084
	Equal variances not assumed			1.003	99.76	.318	0.086	0.086

Source: Researcher

Testing the hypothesis that there is no relationship between the practice of savings measured by the savings potential and the accommodation status of the respondents

Table 5.43 below tested the hypothesis that savings potential was independent from the accommodation status of the savers. The levene's test of the equality of variances was 0.527 and was greater than 0.05 and the null hypothesis was not rejected. Accommodation status and savings potential are independent of each other. The mere fact that someone had accommodation was not a guarantee that the person was a potential saver.

Table 5.43: Independent Samples Test for Savings potential and accommodation status

		Levene's Test for Equality of Variances		t-test for Equality of Means				
		F	Sig.	T	Df	Sig. (2-tailed	Mean Difference	Std. Error Difference
Savings potential	Equal variances assumed	.403	.527	-.465	121	.643	-0.065	0.141
	Equal variances not assumed			-.465	116	.644	-0.065	0.141

Source: Researcher

5.4.4.1 Testing the hypothesis that there is no relationship between the savings potential and the respondents' main source of income.

Table 5.44 below tested the hypothesis that the savings potential was dependent of source of income of the Zimbabwean saver. The levene's statistic 0.017 is less than 0.05 and resulted in the non-acceptance of the null hypothesis that savings potential and the income source were dependent.

Table 5.44: Independent Samples Test for Savings potential and source of income

		Levene's Test for Equality of Variances		t-test for Equality of Means				
		F	Sig.	T	df	Sig. (2-tailed	Mean Difference	Std. Error Difference
Savings potential	Equal variances assumed	5.849	.017	1.422	152	.157	0.234	0.165
	Equal variances not assumed			1.731	42.7	.091	0.234	0.135

Source: Researcher

5.4.4.2. Testing the hypothesis that there is no relationship between the savings potential and the marital status of the respondents.

The hypothesis tested the independence of savings potential and the marital status of the respondents. Results from Table 5.45 resulted in the acceptance of the null hypothesis as measured by the Levene's equality of variances of 0.982 which is greater than 0.05. The two random variables appeared not to depend on each other.

Table 5.45: Independent Samples Test for Savings potential and marital status

		Levene's Test for Equality of Variances		t-test for Equality of Means				
		F	Sig.	T	Df	Sig. 2-tailed	Mean Difference	Std. Error Difference
Savings potential	Equal variances assumed	.000	.982	1.311	158	.192	0.182	0.139
	Equal variances not assumed			1.287	62.4	.203	0.182	0.142

Source: Researcher

5.4.4.3. Testing the hypothesis that there is no relationship between the savings potential and the level of education in Zimbabwe.

The levene's test of 0.635 was greater than 0.05 in Table 5.46 below and this implied that the null hypothesis of independence would not be rejected. In Zimbabwe the level of education was independent of the savings behaviour.

Table 5.46: Independent Samples Test for Savings potential and the level of education

		Levene's Test for Equality of Variances		t-test for Equality of Means				
		F	Sig.	T	Df	Sig. (2-tailed)	Mean Difference	Std. Error Difference
Savings potential	Equal variances assumed	0.227	.635	-1.691	83	.095	-0.420	.249
	Equal variances not assumed			-1.619	12.8	.130	-0.420	.260

Source: Researcher

5.4.5. H3: Testing the hypothesis that the financial market development variables have no positive effect on the savings culture among Zimbabweans.

5.4.5.1. Testing the hypothesis that the savings potential and the developments in the market measured by the adequacy of the products are independent.

The Levene's test of the equality of variances of 0.980 from Table 5.47 below resulted in the acceptance of the null hypothesis that savings potential and adequacy of banking products were independent. Savings products adequacy did not influence the saving potential of Zimbabweans. This was consistent with the results from Table 5.7 earlier in the chapter where 48.8% of the respondents noted that the savings products were inadequate among the Zimbabwean banking public.

Table 5.47: Independent Samples Test for Savings potential and adequacy of banking products

		Levene's Test for Equality of Variances		**t-test for Equality of Means**				
		F	Sig.	T	Df	Sig. 2-tailed	Mean Difference	Std. Error Difference
Savings potential	Equal variances assumed	.001	.980	-.105	137	.916	-.014	.133
	Equal variances not assumed			-.105	117.9	.916	-.014	.133

Source: Researcher

5.4.5.2. Testing the hypothesis that there is no relationship between the practice of savings and the deposit rate.

Table 5.48 below shows the correlation between the savings practice and the deposit rate. The degree of association measured by R of 0.397 and this was not a very strong association of the two variables. Only 39.7% of the deposits were attributed to the deposit rate, an indication that depositors were influenced by other factors.

Table 5.48: Model Summary for TDL ratio and the deposit rate

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.397[a]	.158	.126	16.73958594382

a. Predictors: (Constant), Deposit rate

Source: Researcher

Table 5.49: ANOVA for TDL ratio and the deposit rate

Model		Sum of Squares	Df	Mean Square	F	Sig.
1	Regression	1414.879	1	1414.879	5.049	.033[b]
	Residual	7565.771	27	280.214		
	Total	8980.650	28			

a. Dependent Variable: Total deposits to liabilities

b. Predictors: (Constant), Deposit rate

Source: Researcher

Table 5.49 above showed the results of testing the hypothesis that the savings practice and the deposit rate were independent. The probability value 0.033 resulted in the null hypothesis of independence being rejected since it was less than 0.05. Although the results showed that the two are related, the correlation statistic in Table 5.50 below shows a weak association between the two variables.

Table 5.50: Coefficients for TDL ratio and the deposit rate

Model		Unstandardized Coefficients		Standardized Coefficients	T	Sig.
		B	Std. Error	Beta		
1	(Constant)	67.354	3.708		18.167	.000
	Deposit rate	-.061	.027	-.397	-2.247	.033

Source: Researcher

Table 5.50 above showed the regression coefficients relating savings practice to the deposit rate. The line of best fit that described the linkage was expressed as follows:

$Y = 67.354 - 0.061X + e$----------Equation 5.2

Y Represented the savings practice measured by the deposit to liabilities ratio, X denote the deposit rate and e the error term. However from the regression coefficients the savings practice and the deposit rate seemed to be inversely related. A significant portion (67.354) of the savings practice seemed to be explained by other variables that have nothing to do with the deposit rate.

5.4.6. H4: Testing the hypothesis that the classical uncertainty (risk) is independent of the savings culture among Zimbabweans.

5.4.6.1. Testing the hypothesis that the practice of savings and the depositors' risk measured by the liquidity ratio are independent.

The probability value of 0.958 from Table 5.51 was greater than 0.05 resulted in the null hypothesis of independence being accepted. The results showed that the savings practice and the liquidity ratios that measured risk are not related.

Table 5.51: ANOVA for TDL ratio and liquidity ratios

Model		Sum of Squares	Df	Mean Square	F	Sig.
1	Regression	.150	1	.150	.003	.958[b]
	Residual	244.575	5	48.915		
	Total	244.726	6			

a. Dependent Variable: Total deposits to liabilities

b. Predictors: (Constant), Liquidity ratios

Source: Researcher

Table 5.52 below shows the regression coefficients that described the link between the savings practice and the liquidity ratios as a measure of risk. The regression line linking the two random variables can be linked by the following regression line of best fit.

$Y = 72.245 + 0.025X + e$----------Equation 5.3

The regression coefficients showed that there is positive relationship between the savings practice and the liquidity ratio, however 2.5% of these ratios explained savings practice.

Table 5.52: Coefficients for TDL ratio and liquidity ratios

Model		Unstandardized Coefficients		Standardized Coefficients	T	Sig.
		B	Std. Error	Beta		
1	(Constant)	72.245	7.767		9.302	.000
	Liquidity ratios	.007	.129	.025	.055	.958

a. Dependent Variable: Total deposits to liabilities

Source: Researcher

Table 5.53 below shows some of the correlations between the Savings potential and the economic factors, credibility of the financial system, political factor view as well as the respondents' view about bank charges and interest earnings. The correlations between the savings potential and the variables were -0.119, -0.019, -0.194 and 0.024 respectively. The

degrees of association for all the variables were insignificant though negative for the three variables except for the bank charges and interest earnings variable which was positive. The correlation was somehow significant though weak for the economic variables.

Table 5.53: Correlations of savings potential and various factors affecting savings

		Economic factor	**Credibility of institutions**	**Political factor view**	**Bank charges and interest earnings**	**Savings potential**
Economic factor	Pearson Correlation	1	.350**	.291**	.456**	-.119
	Sig. (2-tailed)		.000	.000	.000	.122
	N	170	170	170	170	170
Credibility of institutions	Pearson Correlation	.350**	1	.361**	.447**	-.019
	Sig. (2-tailed)	.000		.000	.000	.807
	N	170	170	170	170	170
Political factor view	Pearson Correlation	.291**	.361**	1	.227**	-.194
	Sig. (2-tailed)	.000	.000		.003	.011
	N	170	170	170	170	170
Bank charges and interest earnings	Pearson Correlation	.456**	.447**	.227**	1	.024
	Sig. (2-tailed)	.000	.000	.003		.752
	N	170	170	170	170	170
Savings potential	Pearson Correlation	-.119	-.019	-.194	.024	1
	Sig. (2-tailed)	.122	.807	.011	.752	
	N	170	170	170	170	170

**. Correlation is significant at the 0.01 level (2-tailed).

Source: Researcher

5.4.7. H5: Testing the hypothesis that the fiscal policy variables are independent of the culture of savings among Zimbabweans.

5.4.7.1. Testing the hypothesis that GDP is independent of the practice of savings.

The first hypothesis tested was on the independence of GDP to the savings practice. The probability value (0.640) from Table 5.54 below was greater than 0.05 and this resulted in the acceptance of the null hypothesis that the savings practice and GDP were independent. However a positive correlation of 0.091 exists between the variables. The regression coefficients in Table 6.54 below showed that 0.1% of the GDP was explained by the savings activities of the Zimbabwean banking population, a percentage which was very insignificant. The regression equation linking the two variables could be expressed as follows:

$Y = 52.839 + 0.001X + e$----------Equation 5.4

Y denoted the savings practice while the X variable represented the GDP and e the error term. From the regression equation the GDP in country was influenced by other factors independent of the savings practice of the population.

Table 5.54: Coefficients of the TDL ratio and GDP

Model		Unstandardized Coefficients		Standardized Coefficients	T	Sig.	95.0% Confidence Interval for B		
		B	Std. Error	Beta			Lower Bound	Upper Bound	Zero-order
1	(Constant)	52.83	17.11		3.09	.005	17.736	87.942	
	GDP market price $m	.001	.002	.091	.473	.640	-.003	.005	.091

a. Dependent Variable: Total deposits to liabilities

Source: Researcher

5.4.7.2. Testing the hypothesis that gross capital formation (investment) is independent of the savings practice.

This was the hypothesis that savings practice and gross capital formation which was used as a measure of investment in a country. Table 5.55 below shows the correlation between the two variables of 0.078 was insignificant. The gross capital formation in Zimbabwe over the years was being driven by other factors and not from the pool of savings by the population.

Table 5.55: Model Summary for TDL ratio and Gross capital formation

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.078[a]	.006	-.031	16.47588552836

a. Predictors: (Constant), Gross capital formation

Source: Researcher

Furthermore from Table 5.56 below the null hypothesis of independence between savings practice and gross capital formation was accepted because the p-value of 0.688 is greater than 0.05. Deposits in Zimbabwe did not determine the level of investment in Zimbabwe over the years.

Table 5.56: ANOVA for TDL ratio and gross capital formation

Model		Sum of Squares	Df	Mean Square	F	Sig.
1	Regression	44.762	1	44.762	.165	.688[b]
	Residual	7329.280	27	271.455		
	Total	7374.042	28			

a. Dependent Variable: Total deposits to liabilities

b. Predictors: (Constant), Gross capital formation

Source: Researcher

The regression coefficient in Table 5.57 below indicates an insignificant relationship between savings practice and gross capital formation. 7.8% of the investments in Zimbabwe were influenced by the savings by the population. The greater part of the investments in Zimbabwe was explained by other variables as indicated by the following regression equation.

$Y = 59.010 + 0.078X + e$----------Equation 5.5

Y represented the savings practice, X represents the gross capital formation and e being the error term.

Table 5.57: Regression coefficients for TDL ratio and Gross Capital Formation

		Unstandardized Coefficients		Standardized Coefficients	T	Sig.
		B	Std. Error	Beta		
1	(Constant)	59.010	5.384		10.960	.000
	Gross capital formation	.001	.003	.078	.406	.688

a. Dependent Variable: Total deposits to liabilities

Source: Researcher

5.4.7.3. Testing the hypothesis that Net Exports are independent of the savings practice.

The hypothesis sought to test the relationship between the savings practice and the net exports. From table 5.58 below the correlation coefficient between the two variables was insignificant (0.039).

Table 5.58: Model Summary for TDL ratio and Net Exports

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.197[a]	.039	.003	16.20104203885

a. Predictors: (Constant), Net Exports $m

Source: Researcher

Results from Table 5.59 below further showed that the probability value of 0.305, resulted in the acceptance of the null hypothesis (>0.05) of independence between the savings practice and the net exports.

Table 5.59: ANOVA for TDL ratio and Net Exports

Model		Sum of Squares	Df	Mean Square	F	Sig.
1	Regression	287.250	1	287.250	1.094	.305[b]
	Residual	7086.792	27	262.474		
	Total	7374.042	28			

a. Dependent Variable: Total deposits to liabilities

b. Predictors: (Constant), Net Exports $m

Source: Researcher

Table 5.60 below shows the regression coefficients that connected the two variables. Again from the table net exports and savings practice were inversely connected as reflected by the standardised coefficient of -0.197. It meant that inverse 19.7% of the net exports explained the savings practice among Zimbabweans. The other factors seemed to explain the savings practices as reflected by the constant 58.873.

Table 5.60: Coefficients for TDL ratio and Net Exports

Model		Unstandardized Coefficients		Standardized Coefficients	T	Sig.
		B	Std. Error	Beta		
1	(Constant)	58.873	3.53		16.6	.000
	Net Exports $m	-.002	.002	-.197	-1.04	.305

a. Dependent Variable: Total deposits to liabilities

Source: Researcher

5.4.8. H6: Testing the hypothesis that the wealth variables and the savings potential among Zimbabweans are independent.

The testing of the hypothesis that there was no relationship between savings potential and the form of wealth held by the Zimbabweans produced results from table 6.58. Statistics from Table 5.61 below resulted in the non-acceptance of the null hypothesis as the probability value of 0.026 was less than the critical value 0.05. The non-acceptance of the null hypothesis implied that decision to save among Zimbabweans was influenced by the form of wealth held.

Table 5.61: Independent Samples Test for savings potential and form of wealth

		Levene's Test for Equality of Variances		t-test for Equality of Means				
		F	Sig.	T	df	Sig. (2-tailed	Mean Difference	Std. Error Difference
Savings potential	Equal variances assumed	5.092	.026	3.87	113	.000	.618	.160
	Equal variances not assumed			3.46	42.54	.001	.618	.179

Source: Researcher

Table 5.62 below shows the correlation between the form of wealth the Zimbabweans were holding and their savings potential. From the samples, the two random variables were inversely correlated and the degree of association was negligible (-0.131).

Table 5.62: Correlations for Savings potential and the Form of wealth

		Form of wealth	Savings potential
Form of wealth	Pearson Correlation	1	-.131
	Sig. (2-tailed)		.088
	N	170	170
Savings potential	Pearson Correlation	-.131	1
	Sig. (2-tailed)	.088	
	N	170	170

Source: Researcher

5.4.9. H7: Testing the hypothesis that the relative price variables have a positive effect on the culture of savings among Zimbabweans.

The R from Table 5.63 below of 0.615 shows a strong association between the savings practice and the relative prices measured by the year on year inflation. The results showed a positive correlation between the two random variables.

Table 5.63: Model Summary for TDL ratio and Year on Year Inflation

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.615[a]	.378	.330	10.21868605013

a. Predictors: (Constant), Year on Year inflation

Source: Researcher

The probability value (0.015) in Table 5.64 below is less than the critical value of 0.05 resulted in the rejection of the null hypothesis that the savings practice and the rate of inflation. Rejection of the null hypothesis implied an association between the two variables.

Table 5.64: ANOVA for TDL ratio and Year on Year Inflation

Model		Sum of Squares	Df	Mean Square	F	Sig.
1	Regression	824.582	1	824.582	7.897	.015[b]
	Residual	1357.480	13	104.422		
	Total	2182.062	14			

a. Dependent Variable: Total deposits to liabilities

b. Predictors: (Constant), Year on Year inflation

Source: Researcher

The regression coefficients (from Table 5.65 below) linking the two variables indicated that there was an inverse relationship between the savings practice and the year on year inflation. The regression line of best fit could be expressed as follows:

$Y = 62.449 - 0.615X + e$ ----------Equation 5.6

The *Y* value represented the savings practice, the *X* value the year on year inflation and *e* the error term.

Table 5.65: Coefficients for TDL ratio and Year on Year Inflation

Model		Unstandardized Coefficients		Standardized Coefficients	T	Sig.
		B	Std. Error	Beta		
1	(Constant)	62.449	2.731		22.866	.000
	Year on Year inflation	-1.286E-007	.000	-.615	-2.810	.015

a. Dependent Variable: Total deposits to liabilities

Source: Researcher

5.4.10. H8: Testing the hypothesis that foreign borrowing constraints are independent of the culture of savings among Zimbabweans.

The hypothesis meant to test the independence of the savings practice and the borrowing constraints of a country measured by the total debt of a country. The summary measures in table 5.66 showed that the association between the savings practice and the borrowing constraints was strong (0.295).

Table 5.66: Model Summary for TDL ratio and Total debt

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.543[a]	.295	.241	10.87571066235

a. Predictors: (Constant), Total Debt

Source: Researcher

Table 5.67 below shows a probability value of 0.036 which is less than the critical value of 0.05. That meant that the null hypothesis of independence would be rejected. Rejection of the null hypothesis implied dependence of the two random variables.

Table 5.67: ANOVA for TDL ratio and Total Debt

Model		Sum of Squares	Df	Mean Square	F	Sig.
1	Regression	644.408	1	644.408	5.448	.036[b]
	Residual	1537.654	13	118.281		
	Total	2182.062	14			

a. Dependent Variable: Total deposits to liabilities

b. Predictors: (Constant), Total Debt

Source: Researcher

Finally the regression coefficients between the two variables were presented in Table 5.68 below. The standardised beta coefficient of 0.543 implied that 54.3% of the positive movement in savings by the banking pubic was a result of the movement that would have taken place in the country's total debt. The following regression line of best fit expressed the linkage between the two variables.

$Y = 43.828 + 0.543X + e$----------Equation 5.7

From the equation Y represented the savings practice, X country's total debt and e the error term.

Table 5.68: Coefficients for TDL ratio and Total Debt

Model		Unstandardized Coefficients		Standardized Coefficients	T	Sig.
		B	Std. Error	Beta		
1	(Constant)	43.828	7.662		5.721	.000
	Total Debt	.003	.001	.543	2.334	.036

a. Dependent Variable: Total deposits to liabilities

Source: Researcher

5.5. Determinants for restoring a culture of savings in Zimbabwe

Thus the savings practices in Zimbabwe can be explained by the model developed from the study using the stepwise method. The model used total deposits to total liabilities ratio as the dependent variable and proxy for the savings practice in Zimbabwe. The variables health status and having a bank account have been excluded by the method because of the missing correlations. The factors in Appendix C and their corresponding betas were classified into the following categories in tandem with the hypotheses formulated.

1. Individual income measured by the GDP per capita
2. Demographic variables
3. Financial market development
4. Classical uncertainty
5. Fiscal policy variables
6. Wealth variables
7. Relative price variables
8. Foreign borrowing constraints.

Average weighted beta was used to determine the extent to which a factor influenced the restoration of the savings practice among Zimbabweans. The weights were determined by the importance of a sub-factor vis-à-vis the savings potential from the questionnaire. The beta for each factor was used to rank the relative importance of each sub-factor.

The average weighted beta for the demographic variables was computed as follows in the Table 5.69 below:

Table 5.69: Computation of the average weighted beta for the demographic factor.

Sub-factor	Beta	Ranking	weight
Gender	-0.157	9	0.2
Age in years	-0.104	3	0.07
Marital status	-0.017	8	0.18
Highest education	-0.082	2	0.04
Employment status	0.111	1	0.02
Accommodation status	-0.027	5	0.11
Having dependents	0.050	7	0.16
Number of dependents	-0.075	6	0.14
Main income source	0.044	4	0.09
Weighted average for demographic variables	**-0.04431**		**1**

Source: Researcher

The average weighted beta for the financial market development was computed in the Table 5.70 below:

Table 5.70: Computation of the average weighted beta for the financial development factor

Sub-factor	Beta	Ranking	Weight
Banker in Zimbabwe	-0.009	4	0.14
Type of account held	0.023	2	0.07
Province account held	-0.083	7	0.25
Potential savers not banking	0.179	6	0.21
Category of institutions known	-0.064	3	0.11
Adequacy of savings products	-0.030	1	0.04
Banking system developments	-0.084	5	0.18
Weighted average for financial market development	**-0.00617**		**1**

Source: Researcher

The Table 5.71 below shows the computation of the weighted average for the risk factor or the classical uncertainty

Table 5.71: Weighted average for the risk factor beta

Sub-factor	Beta	Ranking	Weight
Central bank policies promoting savings	0.269	3	0.2
Strategies to mobilise savings	0.359	4	0.1
Credibility of institutions	-0.019	1	0.4
Bank liquidity (from Table 6.49)	0.025	2	0.3
Weighted average for the risk factor	**0.0896**		**1**

Source: Researcher

The computation of the weighted average beta for the fiscal variables was as follows on table 5.72.

Table 5.72: Weighted average beta for the fiscal variables.

Sub-factor	Beta	Ranking	Weight
GDP market price $m	0.158	1	0.5
Gross capital formation	-0.049	1	0.5
Weighted average for the fiscal factor variables	**0.0545**		**1**

Source: Researcher

The computation of the weighted average beta for foreign borrowing constraints was as follows on Table 5.73.

Table 5.73: Weighted average for foreign borrowing constraints

Sub-factor	Beta	Ranking	Weight
Total Debt	-0.141	2	0.4
Net Exports $m	0.329	1	0.6
Weighted average for foreign borrowing constraints	**0.141**		**1**

Source: Researcher

Therefore the savings model is summarised in Table 5.74 below:

Table 5.74: Betas' summary of the savings determinants

Hypothesis	Factor	Beta
1	Average income (from Table 5.41))	0.453
2	Demographic variables (from Table 5.69)	-0.04431
3	Financial market development (from Table 5.70)	-0.00617
4	Classical uncertainty/risk (from Table 5.71)	0.0896
5	Fiscal policy variables (from Table 5.72)	0.0545
6	Wealth variable (from Appendix D)	-0.131
7	Relative price variable (from Appendix D)	-0.265
8	Foreign borrowing constraints (from Table 5.73)	0.141

Source: Researcher

Thus the savings determinants among Zimbabweans were modelled in Table 5.74 above

5.6 Results from the Interviews

The interviews from the Bankers, Microfinance Institutions, Reserve Bank of Zimbabwe, Ministry of Finance and Deposit Protection Corporation produced the results in Table 5.75 below. The table gives a summary of the major common themes generated from the questions on the interview guide.

Table 5.75: Interview guide summary results

Views expressed	Bankers and MFIs	RBZ	MOF	DPB
1. Number of banks	Overbanked	Adequate	Adequate	Adequate
2. Boosting DPB	More savers	Banking costs	Banking costs address.	Funding
3. Regulation and Policy	Policy questionable but regulation fine	All adequate	Policy address though regulation is fine	Adequate
4. Savers protected	Not protected	Improvement needed	Not protected with bank failure	Need improvement
5. Saving trends and economy	Related and confidence in market	Related	Linked to disposal income PDL> $500	Related
6. Financial soundness	Not sound, exposed	Sound	its sound	Its sound
7. Savings returns	At moment no	No returns but costly	Expensive to save	Need for improvement
8. Enough savers in the economy	Not enough but imports	Not enough	Not numbers but enough savings given leakages (imports)	Not enough
9. Central bank oversight role	Not adequate	Adequate	Adequate for monetary policy	Adequate
10. Foreign borrowing constraints effect	Affected FCAs	Risk exposure	Affects increase exposure	Affect savers
11. Fiscal policy effect	Policy inconsistency	Public sector debt mops savings	Adequate	Adequate
12. Financial market development	Hedge funds unavailable	Not inclusive products	Not inclusive	More choices needed

Source: Researcher

Note: RBZ stood for Reserve Bank of Zimbabwe, MOF for Ministry of Finance, MFIs stood for Microfinance Institutions and DPB stood for Deposit Protection Board.

Regulators like the Ministry of Finance, RBZ and the Deposit Protection Corporation expressed their satisfaction with the number of players in the market as well as the legal framework within which these banking institutions operated. The Ministry of Finance however observed that the country had the potential to mobilise savings for investment as was reflected by the high leakages like the imports. They reiterated that the country did not have adequate numbers of saving units because of the macroeconomic challenges the country faced.

5.7 Chapter summary

The chapter presented the results from the interviews carried out as well as the results from secondary data sources. Varied forms of presentation were used ranging from tabulation, pie charts, bar graphs and box plots. The data was analysed using various statistics that included simple descriptive statistics of central tendency, dispersion, kurtosis and skewness. Advanced analysis tools were also used that included correlation analysis, regression analysis, and test of independence as well as analysis of variance

CHAPTER SIX

FINDINGS AND DISCUSSION

6.0 Introduction

The chapter discusses and interprets the research findings on the determinants of restoring savings practices in banks among Zimbabweans that emanated from the interviews carried out and questionnaires completed by the Zimbabwean banking public selected at random as well as the findings from the secondary data collected. The rationale was to identify any gaps between the existing theory and what was obtaining on the ground. The discussions and the interpretations were made in view of the objectives of the study and the research questions.

6.1 Banking systems in Zimbabwe

6.1.1 Banking institutions known and adequacy

The banking institution known to the majority of the respondents was commercial bank, where 49% of the respondents confirmed knowledge of commercial banks. Only a small proportion of the respondents (23.5%) were aware of all the banking systems in Zimbabwe. The banking systems in Zimbabwe were inadequate to serve the banking population. The majority of the depositors (54.7% of the respondents) felt they were inadequate whereas 22.4% were adequate. The Ministry of Finance, Deposit Protection Corporation and the RBZ felt the banking institutions were adequate.

6.1.2 Savings products offered by the Zimbabwean banking system

The savings products by the banking institutions in Zimbabwe were not enough, some banking needs were not being satisfied. 48.8% of the respondents were of the view that they were not adequate, 32.9% felt were adequate while 18.2% of the respondents were nor sure of the adequacy level of the savings products that were in the market.

The savings products seemed not to be gender insensitive. 48.8% of the respondents were of the opinion that the savings products were not satisfying their saving goals across their gender. The trend was also consistent with the Finscope Consumer Survey Zimbabwe (2014) which concluded that 33% of the male adult population were banked compared to 27% female adults.

The Chi-square statistic rejected independence of savings potential and gender and the correlation coefficient showed a positive correlation between the two variables. The two variables depend on each other.

6.1.3 Policy developments in the banking sector

Developments in the banking system were discouraging savings. 24% strongly disagreed that the developments were promoting savings and 30% disagreed. Thus 54% of the respondents cumulatively were of the opinion that developments discouraged savings.

The critical intervention strategy that could be adopted by the banking system was the reduction of service charges and increasing the interest earned on savings as was supported by 38.2% of the respondents. Banking policy reform was seen as necessary for promoting savings in banks among Zimbabweans. 28.8% of the respondents felt that the intervention strategy that could be adopted by the banking system was policy reform. 0.6% of the respondents raised branch network as a strategy while 25.3% were not financially literate to proffer any policy intervention to promote savings.

Policies by the apex bank were not conducive for savings revival. 72.9% of the respondents were of the opinion that the policies by the Central bank were not promoting savings. From the interview guide, Bankers and Microfinance Institutions (MFIs) shared the same view of the inadequacy of the banking policy and the oversight role of the Central bank.

6.1.4 Discussion and Interpretation of the Zimbabwean banking system

According to Dore et al (2008) Zimbabwe adopted a sophisticated financial sector at independence in 1980 than any other African country other than South Africa. The sector was tightly controlled and highly oligopolistic with multi-national financial institutions that limited entry and competition. Small firms and low income groups did not have access to credit and those with small savings could only invest with Post Office Savings Bank (POSB) which used funds for on-lending to government. When the sector was liberalised in the 1990s through the IMF's Economic Structural Adjustment Programme (ESAP), commercial banks, merchant banks, finance houses unit trusts, leasing firms, exchange bureaux, venture capital companies, formal and informal microfinance institutions emerged.

Secondary data from the Central bank in Table 7.1 revealed that, as at the end of December 2016, the financial system in Zimbabwe consisted of 13 commercial banks, one Merchant bank, four buildings societies and a single savings banking institution (RBZ quarterly

banking sector report, 31 December 2016). In addition the core financial system, the system had 155 Microfinance institutions (of which 2 were deposit taking Micro finance institutions) and 2 development institutions. Comparatively other financial markets have credit unions as part of their financial systems (Madura, 2008). According to Madura (2008) the financial institutions have been classified into deposit taking and non-deposit taking institutions. Research results from the Zimbabwean system revealed that this distinction overlap across the financial institutions.

Finance houses ceased operation in 2003 and Discount houses in 2008. Grigoli etal (2014) were famous proponents of the development and the deepening of financial and capital markets as they attract diversified supply of savings products and investment vehicles. Bandiera etal (2000) further argued that financial development and deepening should include regulatory and institutional building process of the financial sector. Although the banking Acts 9/1999 and 22/2001 provided for the registration of Accepting houses, Discount houses and Finance houses, these institutions were not operational in the market.

Commercial banks were the majority in Zimbabwe, constituted 68% of the banking institutions. This explained the reason why the majority of the respondents expressed their knowledge of these institutions. However the products offered were inadequate to satisfy the savings needs of the population especially hedged funds that could be utilised to minimise savings risk. The observations were consistent with the results from the Finscope (2014) and the Zimbabwe National Financial Inclusion Strategy 2016-2020. According to Zimbabwe National Inclusion Strategy (2016) there was acknowledgement that although some strides have been made by the financial market to provide the requisite savings products and services, some gaps were still in existence. The gaps were felt the most among the Micro, Small and Medium Enterprises (MSMEs), women, youth, rural population and the small scale agricultural sector. Dore et al (2008) noted that when the financial sector was liberalised, no financial deepening took place rather financial institutions competed for government business and corporate customers. Developments in the banking sector discouraged people from saving in banks. The banking public had lost confidence in the financial systems. The loss of confidence had been attributed to the developments in the financial sector from 1991 when the sector was liberalised. The liberalisation of the financial sector resulted in the establishment of indigenous banking institutions which were claimed by some schools of thought to have weak governance structures and the then laxity in the oversight role by the apex bank. The collapse of almost ten indigenous banking institutions

from 1991 to 2009 largely caused the loss of confidence in the Zimbabwean financial market. It was against this background that most respondents, bankers, Microfinance institutions and the Ministry of Finance were of the opinion that addressing this aspect was key to bringing stability in financial sector. According to the Mid-term fiscal policy statement (2016), the Minister of Finance noted that the loss of confidence in the banking sector had a negative bearing on the financial intermediation role of the sector, a factor critical for the performance of the real sector of the economy. From the National Budget Speech (2017), the Ministry of Finance alluded to the fact that one of the key pillars or critical success factor of economic recovery was confidence building underpinned by policy consistency.

There were mixed responses regarding the adequacy of banking institutions in the country. The central bank, Ministry of Finance and the Deposit Protection Corporation claimed that they were adequate while the Bankers and MFIs felt the number was too big for the size of the economy. Dore et al (2008) however felt that only a few local banks that had some degree of state ownership managed to gain market share through preferential treatment from the state. The majority of the banking institutions have branches in major towns though relatively spread through the provinces with POSB and Central African Building Society (CABS) having networks that extend to rural and remote areas. Poor branch network penetration has been attributed to the unreliable infrastructure like energy supplies, telecommunications and road network.

6.2. Findings on the savings culture and savings potential among Zimbabweans

The practice of savings was represented by the deposit to liabilities ratio. The ratio over the period had been around 64.73%, range of 68.12% and negative skewness of -0.814. the other hand 52.4% of the respondents indicated that they had great potential of saving in banks.

6.2.1. Savings practices and some demographic characteristics

The majority of the respondents interviewed had a formal bank account or mobile account as confirmed by 97.6% of the respondents. The predominant account held across gender was the savings account. 76.9% of the male respondents had the account and 80.6% of the female respondents. Respondents across gender also did not have long term savings.

6.2.2. Savings potential and the age of savers

There was a negative correlation of -0.104 between the savings potential of Zimbabweans and the ages of the respondents. The null hypothesis of independence between age and

savings practice was not rejected reinforcing the independence between the two random variables, age and savings potential of the population.

6.2.3. Motives of saving

Zimbabweans saved because they wanted to acquire property, prepare retirement or wanted to provide funding for their children's fees. Cumulatively 73.5% of the respondents highlighted the reasons. The reason for saving was related to the choice of banker as reflected by the rejection of the null hypothesis of independence between the two variables.

6.2.4. Choice of banker and reason for saving

The choice of banker was related to the motive of savings by the saver given the correlation coefficient of association. The probability value also resulted in the rejection of the null hypothesis of independence of the two variables.

6.2.5. Gender and type of account held

Generally Zimbabweans had some accounts over the period under review (around 80%). Savers across the gender divide held these accounts for transactional purposes and not for long term savings. The Chi-square tests (0.040) showed a relation between the type of account held and the gender though the extent of association was not that strong (0.243) among Zimbabwean savers.

6.2.6. Province account was held

The majority of the savers had accounts in the capital city, Harare. The relationship between savings potential and the province account held was not significant (0.083) and the test (probability value of 0.282) resulted in the acceptance of the null hypothesis of independence between the two variables.

6.2.7. Banking frequency and form of wealth held

The majority (85%) of Zimbabwean savers visited the banks once in a month. Property constituted the major form of wealth held by most savers and a small number of savers had financial assets (17.6%).

6.2.8. Views on factors affecting savings practices among Zimbabweans

Economic fundamentals seemed to have significantly affected Zimbabweans' savings patterns over the period under review as 78.8% of the respondents strongly agreed to the notion. Political factors followed next (65.9%) followed by the credibility of the financial systems (46.5%).

6.2.9. Discussion and interpretation of saving practices among Zimbabweans

The study adopted the deposit to liabilities ratio as the proxy for the savings practice in Zimbabwe. The ratio showed how active depositors were in covering liabilities of the banking institution. Berg (2012) argued that a high ratio made a banking institution robust and able to overcome liquidity squeezes. A ratio more than 100% implies that deposits are more than the liabilities of the banking institution and the deposits are less than the liabilities when it is less than 100%. The average ratio over the period had been around 64.7% and the difference between the highest and the lowest ratio had been 68.12%. The average ratio is an indication that the banking institutions in Zimbabwe had their liabilities exceeding deposits. The Skewness of the ratio was negative (-0.814) implying that most deposit ratios were greater than 64.7% over the period under review. The majority were optimistic of the savings potential from the questionnaire distributed.

Berg (2012) further argued that funding from deposits was less vulnerable than funding from treasury bills, bonds or received borrowing from other financial institutions. He further postulated that low deposit to liabilities ratio can be explained by structural changes in the financial market that have redirected some financial flows affecting deposits. A low ratio shows that customers' deposits have not increased as much as the financial institution's loan book and is negative for financial stability.

Savings potentials in Zimbabwe were independent of the age of the savers and the province the account is held, but however dependent upon gender and the choice of banker. The study was inconsistent with the life cycle hypothesis on the age factor. According to Loayza et al (2000) savings are high at the middle age and low at young and old ages. Howcroft et al (2002) in their United Kingdom study found that younger customers valued convenience or time saving potential for an innovation compared to older customers. Further, younger customers considered face to face contact as less important than older customers. However research showed independence between savings patterns and the province account was held.

The key factors behind savings practice in Zimbabwe were the economic fundamentals, followed by political factors and the credibility of the financial systems.

According to Anderson et al (1976) and Ross (1989) as cited in Metawa and Almossani (1998), criteria selection of banks has been heavily investigated over the past two decades. Metawa and Almossani (1998) found the following attributes as selection criteria for banks; availability of credit, relative's advice and recommendation, friend's advice and recommendation, convenient location, variety of bank services, the quality of services, availability of Automated Machines (ATMs), adequate banking hours, return on investment, friendliness of personnel, understanding of financial needs, special services for women and bank name. The relative importance of the attributes is entirely dependent upon the customers' level of education, age, income and occupation (Metawa and Almossani, 1998).

Every adult across the ten provinces in Zimbabwe had a bank account across gender. However the majority of the respondents did not have long term savings. From the Finscope Consumer Survey (2014), 69% of the adult Zimbabweans were formally served by formal bank products and services and only 23% of the adults are financially excluded. The use of the other formal non-banking products was mainly driven by the remittances and insurance.

According to the survey, banking in Zimbabwe had been driven by transactional products and services. The results confirmed the Finscope report findings of 2014, that most Zimbabweans were holding accounts for transaction purposes. This confirmed the fact that most Zimbabweans were of the subsistence type. The Finscope report (2014) found that Zimbabweans saved to enable themselves to pay for living expenses during hard times as well as for education, school fees and other emergencies. According to the Finscope report (2011) the major driver of banking in Zimbabwe is the transactional motive which explains the reason why a great proportion of respondents had accounts with various banking institutions. Most Zimbabweans used their accounts for the purpose of their daily transactions and facilitating payments and receipts through the banking system.

Zimbabweans opened bank accounts for safety reasons, to receive salary or deposit money from the employer and to access loans. The growth in banking by 2014 had been attributed to the use of ATMs and cash point card services.

6.3. Savings and economic performance

The following were the findings from the indicators showing economic performance of the country.

6.3.1 Findings from different economic indicators

There was a negligible positive association between savings practice measured by the TDL ratio and the total country debt (0.033), year on year inflation (0.015), deposit rate (0.015) and the lending rate (0.085). However the association seemed stronger with the level of investment measured by gross capital formation (0.688) and GDP (0.640). There was moderate association between the savings practice and the net exports (0.305).

6.3.2. Country capacity to mobilise enough savings and savings mobilisation strategy

Some of the Zimbabwean savers felt that they did not have the capacity to mobilise enough savings for investment (43.5% of respondents). Similar view was shared by the bankers, MFIs, the Central bank and the Deposit Protection Corporation. The government Treasury felt the number of savers was not enough but however in value terms, the country had the capacity given the leakages that were reported in the economy through imports as well as cash stolen outside the banking system. The view can be supported by the results of the total Exports and Imports from January to June 2016, from the Table 6.1 below adopted from Mid-term fiscal policy document.

Table 6.1: Leakages

EXPORTS	IMPORTS	LEAKAGES
US$1 124 992 150.23	US$2 496 572 394.65	US$1 371 580 244.42

Source: Adopted from ZIMSTATS (2016).

The policy intervention strategy revolved around reduction of service charges and increasing returns on savings (38.2%).

6.3.4. Discussion and interpretation of savings practices and economic performance

Results from the study showed that savings practices were insignificantly related to the country's debt, year on year inflation, deposit rate and the lending rate. However the savings were strongly correlated to the gross capital formation and the gross domestic product. Hopf (2009) noted that investment behaviour was an essential link running from savings to economic growth. According to Deaton (1989), other models do not emphasize savings but

the role of human capital formation while others have found no relation between economic growth and the rate of physical capital accumulation. The weak association between savings and growth could be attributed to the notion of the productivity of investment that is crucial and not the volume of savings. From financial repression literature low interest rates and lack of investment opportunities result in low domestic savings.

Deaton (1989) observed that savings respond positively to interest rates, since interest rates have both the income and the substitution effects which can increase or decrease current consumption thus affecting the levels of current savings. Abdelaty and Esmail (2014) identified a weak negative correlation (-0.021) between savings and investment. Deaton (1989) further pointed out that underdevelopment was a problem of too little savings. Capital accumulation was a necessary and sufficient condition for growth and is synonymous with savings. Thus one route of development was through the raising of the savings ratio according to Deaton (1989).

6.4. Findings from hypotheses tested

The following were the findings from the hypotheses that were tested using the research data. Responses from the questionnaire and the secondary data were used to test these hypotheses.

6.4.1. Average individual income and saving practice

There was a positive relationship between savings practice measured by the TDL ratio and the average individual income measured by the GDP per capita income. The relationship was measured by the correlation coefficient (0.453) and reflected by the rejection of the null hypothesis of no positive association ($0.026<0.05$). The finding was further reaffirmed by the government treasury which observed that the majority of the potential savers were in the civil service who predominantly earned below the Poverty Datum Line (PDL) over the period. They did not have much disposable income that could be spared for savings.

6.4.2. Hypotheses tests of demographic variables and savings practices and potential

The various demographic variables were tested for implication to the study.

6.4.2.1. Savings potential and gender

The test rejected the null hypothesis of independence ($0.071 < 0.05$), therefore gender and savings potential were not independent of each other.

6.4.2.2. Savings potential and accommodation status

The savings practice and accommodation status were independent of each other shown by the Levene test of 0.527>0.05. Thus the savings potential in Zimbabwe could not be related to whether someone had accommodation or not.

6.4.2.3. Savings potential and the main source of income

The two variables were dependent as 0.17>0.05. The main source of income was related to the savings potential of Zimbabweans.

6.4.2.4. Savings potential and the marital status of Zimbabweans

The two variables were independent of each other (0.982 > 0.05). The savings potential could not be linked to whether someone was married or unmarried. The financial market was not segmenting its market according to marital status when structuring their products and services.

6.4.2.5. Savings potential and literacy level of Zimbabweans

The savings potential and the level of education were independent (0.685 >0.05). Thus the manner in which Zimbabweans would save over the period had nothing to do with the literacy level of savers.

6.4.3. Hypothesis test of savings practice and financial market development

The variable for product adequacy and deposit rate were tested as the two variables showing financial market development of the economy and had the following results.

6.4.3.1. Savings potential and product adequacy

The savings potential and the financial market development measured by the product adequacy were independent as measured by the Levene test of 0.980 > 0.05. Bankers and Microfinance institutions were of the opinion that the products were inadequate for instance hedge funds were highlighted as some of the market inadequacies.

6.4.3.2. Savings practice and the deposit rate

There was a weak association or correlation between the savings practice measured by the TDL ratio and the deposit rate ($R = 0.397$). The two random variables were not independent of each other as reflected by the rejection of the null hypothesis of independence (Levene statistic 0.033 < 0.05).

6.4.4. Savings practice and fiscal policy variables

The hypotheses involving fiscal policy variables like GDP, Gross capital formation and net exports were tested against savings and generated the results that followed.

6.4.4.1. Savings practice and Gross Domestic Product (GDP)

The two variables were independent (Levene test 0.640 > 0.05) and the association between the variables was insignificant ($R = 0.091$). The relationship was very weak.

6.4.4.2. Savings practice and Gross Capital formation

The correlation ($R = 0.078$) between the two variables was very insignificant and the acceptance of the null hypothesis showed that these two random variables were independent. The regression model linking the two random variables showed that 7.8% of the savings influenced the investment levels of the country.

6.4.4.3. Savings practice and the net exports

Net exports and savings practice were independent as a result of not rejecting the null hypothesis of independency. There was negative correlation (-0.197) between the two variables

6.4.5. Savings practice and classical uncertainty

Classical risk measured by the liquidity ratio was independent from the decision to save or not (0.958 > 0.05). The correlation between savings practice measured by the TDL ratio and risk was insignificant. Bankers were concerned about the low confidence in the financial market as inhibiting the restoration of saving in banks in the country.

6.4.6. Savings potential and form of wealth held

Rejection of the null hypothesis showed that the decision to save was dependent upon the form of wealth that Zimbabweans held. There was also an inverse relationship between the two random variables (-0.131) which was insignificant.

6.4.7. Savings practice and the relative price changes

There was a strong association (0.615) between savings practice and the relative price changes measured by the year on year inflation. Rejecting the null hypothesis of independence implied that the two variables were related

6.4.8. Savings practice and the foreign borrowing constraints

There was a positive relationship between savings practice and the borrowing constraints, although the association was not significant. The rejection of the null hypothesis implied the two variables related each other. The regression model that linked the two variables showed that savings practices were positively affected significantly (54.5%) by the country's debt. Bankers and Microfinance institutions felt it affected savers particularly holders of Foreign Currency Accounts (FCAs). On the other hand Treasury felt constraints exposed the financial systems in Zimbabwe.

6.4.9. Discussion and interpretation of hypotheses tested

The hypotheses tested were interpreted and discussed with the view of identifying gaps in literature with regard to the problem under study.

6.4.9.1. Savings potential and demographic factors

Gender and savings potential were dependent on each other. Financial institutions should have considered gender differences in the market when they structured their financial products and services. Howcroft et al (2002) observed that females were more concerned with improvements in the level of service and access to a 24 hour service compared to male customers. They further noted that females value the convenience of internet banking. Male customers emphasised on peer pressure and adopted these developments as recommendation from friends, family or from newspapers. Howcroft et al (2002) further observed that males regarded loss of face to face contact as a discouraging factor for adoption of internet banking.

The hypothesis test on the independence of savings potential and the accommodation status of the respondents showed that the two variables were independent. The decision to save was not affected by whether someone owned a house or not. The absence of products that served the two categories of customers was one reason why the two were independent. Furthermore, the developments over the period in the banking sector were also another explanation for the independence of the two variables. The fact that the majority of the people that participated in the interview identified property acquisition as one of the reasons Zimbabweans saved which was not structured in the products or services offered by the market. These results showed that other non-banking means were used by the savers to acquire properties like "burning"[6] which took place in 2007 and 2008. Bosworth and Anders (2008) argued that homeowners

[6]People taking advantage of a very wide gap between the cheque rate and cash rate of the US dollar against the Zimbabwean dollar

and equity holders play a prominent role in many explanations of savings decline. However different results for savings and wealth accumulation were reported because respondents could not distinguish between active saving decisions and capital gains.

The test between the savings potential and the level of literacy among Zimbabweans showed that the two variables were independent of each other. This implied that when financial institutions structured their products and services, they did not consider the level of education of the savers. This was partly explained by the informalised nature of the economy of Zimbabwe and partly by the high unemployment level that the country was experiencing as well as unhand dealings and corruption. The income distribution in the economy was no longer based on the level of literacy of the economic units.

Laforet and Li (2005) found that educational levels of respondents did not affect the use of technologically-based banking and online banking. Bosworth and Anders (2008) were of the opinion that savings rates differ substantially by educational attainments. They further observed that more educated families have higher rates of savings compared to families that are not. Although the research results supported Laforet and Li (2005) assertion, however the results deviated from the notion held by Bosworth and Anders (2008) of dependence between the savings rates and the level of literacy. The two views were different because of probably the level of development of the two economies. This study focussed on Zimbabwe an African developing economy and Bosworth and Anders (2008) focussed on developed United States. Howcroft et al (2002) however found that educational levels of respondents did seem particularly important in encouraging or discouraging the use of telephone and internet banking. The less literate considered access to the equipment as more important than the degreed.

The hypotheses test on the marital status against the savings potential showed that the two variables were independent whereas the test with the main source of income showed the variables were dependent. The results were a reflection that the financial institutions in Zimbabwe did not have products defined by categories of customers based on marital status, although they were defined in terms of the source of income. Deaton (1989) observed that households in developing countries had larger households than those in developed countries like the United States, where there is greater tendency for several generations living together. Such households do not have the need for transferring income from high productivity to low productivity phases of the life cycle or a means of transferring wealth between generations.

Resources are shared between workers and dependents. Deaton (1989) identified another dimension to the independence of the variables to the reliance on agricultural income by developing economies which tended to be uncertain and this threatened the way the income was to be saved.

6.4.9.2. Savings practices and financial market developments

Savings practices and potentials were independent to the questions on financial market development that covered product adequacy and the structuring of the deposit rate. Independence of the variables was an indication of the inadequacies of the financial products in the market and the deposit rate not tied to the savings level in the country respectively. Mikesell and Zinser (1973) noted that the relationship between interest rates and aggregate savings had complex theoretical and econometric problems, the most being the separation of the income and the substitution effects of interest rate changes. They concluded that interest rates significantly determined the channels into which savings will flow in the developed and developing countries. Results from Williamson (1968) cited in Mikesell and Zinser (1973) found that the real rate of interest was negatively correlated with the national savings. Mason et al (1998) found that the interest rate had a significant positive effect for industrial countries but a negative though insignificant effect on developing countries. Difference in financial liberalisation was one reason advanced for the differences.

6.4.9.3. Savings practices and fiscal policy variables

The two critical policy variables used in the study were the GDP and the gross capital formation. Results showed insignificant association and independence of the two variables with the savings practice. The weak association was a reflection that the Zimbabwean population did not have surplus income to save in banks over the period resulting from structural economic problems and high unemployment levels in the country. Results on gross capital formation were an indication that the economy failed to mobilise funds for investment or capital formation, which is the bedrock of economic growth for any country.

Mason et al (1998) however found that GDP growth was weakly associated with savings for industrial countries but strongly and significantly associated for developing countries. Liquidity constraints and subsistence considerations were some of the justifications for such a relationship. Abdelaty and Esmail (2014) found that the rate of national savings in Egypt as a percentage of GDP had gone down due to the structural crisis that affected the economy. They further observed that when a small part of the per capita income is directed towards

consumption result in lack of part-oriented savings. Schmidt-Hebbel et al (1992) hypothesised that the level of per capita income had a positive effect on the savings rate since richer customers can afford the luxury of savings to assure their future consumption. Deaton (1989) and Zeldes (1989) all cited in Schmidt–Hebbel et al (1992) found a strong effect of the current income level on the savings rate. Loayza et al (2000) found a strong positive association between the savings ratio and real per capita income. The Zimbabwean case not only deviated from empirical research but also disapproved the Permanent Income Hypothesis explained in the Theoretical Framework in Chapter three.

There was a negative correlation between savings practice and net exports. The two variables were also independent. The association between the two variables confirmed the deficit on the country's trade balance. Several studies have shown a positive relationship between exports and savings. Maizels (1968) cited in Mikesell and Zinser (1973) hypothesised that the marginal propensity to save in the export sector in developing countries was higher elsewhere and in some countries, government savings depended upon export taxes. The scenario in Zimbabwe showed that export earnings were not put into the banking system.

6.4.9.4. Savings practices and classical uncertainty

Uncertainty measured by the liquidity ratio was independent from the savings practice measured by the TDL ratio and the correlation between the two variables was very insignificant. Loayza et al (2000) argued that theory predicted that greater uncertainty should raise savings since risk-averse customers will set aside something as a precaution against possible adverse changes in income and other factors. The assertion did not hold water in Zimbabwe as the economic challenges in the country were the value of the savings in the banks that were supposed to be used as precaution against loss of income. .

6.4.9.5. Savings potential and the form of wealth

The savings potential was dependent upon the wealth variable and the two variables had an insignificant negative correlation. This implied that the decision to accumulate wealth was dependent on the decision to save in a bank in Zimbabwe or not. According to Claus and Claus (2015) savings and wealth accumulation are talked about when times are good and when incomes are rising. They gave an analogy of the boom years of the 1990s and 2000s when world incomes grew and commodity prices increased. Claus and Claus (2015) further observed that during the period the savings rate was low but when the boom ended on the

onset of the global crisis, wealth created had gone down. Grigoli et al (2014) concluded that the impact and relationship between savings and wealth was ambiguous and not clear.

6.4.9.6. Savings practices and the relative price changes

Results from the study showed that there was significant correlation or association between savings practice and the relative price changes. The rejection of the null hypothesis confirmed the fact that the two variables were related. When customers made the decision to save they considered inflation. That was probably expected in Zimbabwe especially after the 2007-2008 experience when the rate of inflation went into several million percentage points and the savings were completely wiped out.

Abdelaty and Ishmail (2014) observed that higher rates of inflation especially on food prices lead to a lack of surplus that can be directed towards family savings. When the rate of inflation outweighs deposit interest rates, this will result in negative real interest rates from the banks. Abdelaty and Ishmail (2014) concluded that this scenario demotivates individuals to keep their savings with the banks and will look for other safer havens to put their savings. Masson et al (1998) argued that inflation affected savings for several reasons. The first reason they identified was that higher inflation tended to lead to higher nominal interest rates thus higher measured household income and savings. Masson et al (1998) further observed that higher inflation lowers savings by increasing uncertainty. The second argument is plausible for the Zimbabwean case.

6.4.9.7. Savings practices and the foreign borrowing constraints

The research results showed that there was positive relationship between the borrowing constraints and the savings ratio although the association was not very significant. The two variables were not independent to each other and 54.5% of the savings response was explained by the foreign borrowing constraints.

6.5. Determinants of savings in Zimbabwe

The following factors that informed the hypotheses where found to be related to the savings practices and potentials among Zimbabweans as shown in Table 6.2 below

Table 6.2: Findings from the savings model

Factor	Beta	Relationship with savings
GDP per capita income (from Table 5.41)	0.453	Direct relationship
Demographic variables (from Table 5.69)	-0.04431	Inversely related
Financial market development (from Table 5.70)	-0.00617	Inversely related
Classical uncertainty/risk (from Table 5.71)	0.0896	Direct relationship
Fiscal policy variables (from Table 5.72)	0.0545	Direct relationship
Wealth variable (from Appendix D)	-0.131	Inversely related
Relative price variable (from Appendix D)	-0.265	Inversely related
Foreign borrowing constraints (from Table 5.73)	0.141	Direct relationship

Source: Researcher

6.5.1. Discussion and interpretation of the savings determinants

From the savings model (Table 6.2), GDP per capita income, fiscal policy variables, classical uncertainty and foreign borrowing constraints were positively related to the savings rates although the extent of causation was very insignificant except for the borrowing constraints. Thus an increase for instance in any of the fiscal variables like GDP, Gross Capital Formulation, net exports resulted in approximately 5.45% positive response in savings. Demographic variables, financial market development, wealth variable and relative prices variables showed a negative relationship with the savings practice and potential. An increase in any of the variables, savings responded inversely. The negative association was however insignificant. Relative price changes and wealth variable were slightly causing the savings rate to respond more. An increase in relative prices and classical uncertainty resulted in a negative response to the savings rate by 26.5% and 10.63% respectively.

Loayza et al (2000) in their study on the savings rates around the world used saving as a percentage of the Gross National Domestic Income (GNDI). They used country savings rates and savings related variables spanning over a period of 35 years, 112 developing countries and 22 Industrial countries were used. Loayza et al (2000) analysed the determinants of the savings ratio and found that income variable and uncertainty were positively related to the savings ratio. Foreign borrowing constraints, Fiscal policy variables, some demographic variables (age and dependency ratio) were found to be negatively associated to the savings

ratio. Financial depth, public consumption and the distribution of income and wealth were found to ambiguously related to the savings ratios.

Mason et al (1998) regressed savings rates for industrial and developing countries on several explanatory variables. They found that the savings ratio was positively correlated to the GDP growth rate, real interest rate, inflation rate and wealth/GDP ratio for both industrialised and developing countries. Dependency ratio and government savings/GDP ratio were found to be negatively correlated to the savings ratio for both industrialised and developing countries.

Mikesell and Zinser (1973) analysed the nature of savings function in developing countries and found that there a slight positive relationship between the tax ratio and the savings ratio. Williamson (1968) cited in Mikesell and Zinser (1973) found that interest rate was negatively correlated with national savings. Chenery and Ecksten (1970) cited in Mikesell and Zinser (1973) had mixed results between savings and exports with some countries having positive correlation, others zero while some had negative correlation.

6.6. Chapter Summary

The chapter provided concisely the findings from the study in terms of the trends in the banking systems in Zimbabwe, the savings practices among Zimbabweans and the effect of the savings practices on the performance of the Zimbabwean economy as well as providing the findings from the determinants of restoring the culture of saving in banks among Zimbabweans from the hypotheses tested. The chapter interpreted the research findings in greater depth. This was followed by the discussion of the results by cross referring to existing literature and finding the gaps between literature and the savings practice amongst Zimbabweans over the study period.

CHAPTER SEVEN

CONCLUSIONS AND RECOMMENDATIONS

7.0. Introduction

The chapter draws conclusions from the research findings as well as proffers recommendations on the determinants of restoring a culture of savings in banks among Zimbabweans. These conclusions permeated from the objectives and questions of the study.

7.1. Conclusions

From the summary of findings regarding the determinants of restoring a culture or practice of saving in banks among Zimbabweans, the following conclusions were made:

7.1.1. Financial Literacy

Financial literacy within the Zimbabwean banking public was still low. Commercial banks were the most known financial institutions in Zimbabwe despite the fact that the market was having merchant banks, investment banks, and development banks among other institutions.

7.1.2. Inadequate financial products and services

The financial institutions lacked depth in terms of financial products and services as well as variety institutionally. The financial products and services were still excluding the previously excluded sectors of the economy. However the majority of Zimbabweans were making use of existing banking products and services though they maintained them for transactional purposes owing to low disposable incomes.

7.1.3. Savings costs and returns

The cost of saving was very high in Zimbabwe and the returns were very insignificant. Net returns from deposits were being wiped out by the high service charges by the financial institutions. Both depositors and regulators shared the same view.

7.1.4. Transactional savings

The majority of Zimbabweans were holding savings accounts in one form or another for transactional purposes and not for long term savings. The country was currently dissaving as it remained a consumptive economy, a tendency that had turned most economic units into serial borrowers.

7.1.5. Low depositors confidence

There was a low depositors' confidence in the financial services sector owing the financial crises that had rocked the sector over the years. Financial institutions were no longer credible from the perspective of depositors.

7.1.6. Weak legal and policy framework

Savers and potential savers as well as bankers and Microfinance institutions were not satisfied with the oversight role of the Central bank. Low savings rate in Zimbabwe was being attributed to the legal and policy interventions which they felt were inadequate. In addition financial systems had very expensive savings products particularly service charges and the net return on savings. The Deposit protection Corporation was not independent and offered limited deposit insurance.

7.1.7. A low deposit rate

The levels of deposits were very low as measured by the deposit to liabilities ratio. The growth of deposits was lower than the growth in the liabilities held by financial institutions. The mismatch partly explained why the financial market suffered liquidity squeezes over the period under study. Low savings resulted from the confidence in the financial services sector which had bottomed owing to years of financial crises the country had gone through.

7.1.8. Low average income

There was a low association between average income and savings. The income earned was below the PDL and hence inadequate for savings.

7.1.9. A weak economy

There was an insignificant association and independence between key fiscal variables like GDP, gross capital formation and the savings rate. These variables play a significant role in promoting economic activity and boosting good savings practices in a country.

7.2. Recommendations

In view of the findings and conclusions of the study the following recommendations were made in order to promote a practice of saving in banks for consideration by the various stakeholders highlighted in the study.

7.2.1. Financial literacy strategy

Responsible authorities and the financial institutions in Zimbabwe should have financial literacy programmes that will enable consumers of financial products and services to acquire requisite skills, attitude and behaviour that will make them aware of financial opportunities at their disposal and thus make informed decisions given their financial circumstances.

7.2.2. Financial deepening and product development

There was need for financial deepening that should include broadening the scope of the operating licences issued by the Central bank. There was also need for the policy instruments to delineate the scope of the financial institutions to minimise services overlap.

Financial institutions needed to develop financial products and services that should target the previously unbanked groups of the society that included MSMEs, women, youth, rural population and the small agricultural sector. Thus there was need to judiciously operationalise the Zimbabwe National Inclusion Strategy (2016-2020) promulgated by the Apex Bank towards the end of 2016. This can harness the needed savings for the much starved investment. Gender experts and related organisations should be involved in designing financial regulations to ensure that regulations do not exclude other groups from the mainstream economy.

7.2.3. Cost reduction strategy

Banking institutions need to reduce the cost of maintaining a savings account and at the same time increasing returns on savings. The regulatory authorities need to come up with the framework of rewarding savers.

7.2.4. Confidence restoration

Depositors' confidence need to be restored by giving guarantee to depositors and investors that their money will be protected against future losses. Policies should address the liquidity and currency problems in the market both fiscal and monetary as confidence restoration measures.

7.2.5. Legal and Policy reforms

There was need to come up with policies that attract savings and interventions that should reduce the cost of saving. Policies should be consistent and predictable as a confidence building measure. Banks should also disclose important performance indicators not only to the regulator but for the general banking public to promote transparency and enhance market discipline.

Policy reforms could take the direction of restructuring the Central bank along the lines of the South African Central bank where the South Reserve bank Act 1989 (Act 90 of 1989) granted the management powers of the bank to the Board of the bank. Out of the fifteen board members, the governor and three deputy governors appointed by the President of the Republic of South Africa in consultation with the Finance Ministry for five year terms. Four others are appointed on three year terms. The remaining seven who must come from the diverse sectors of the economy are elected by the shareholders at an ordinary general meeting. One should come from Agriculture, one from Labour, one from the field of Mining, two from Industry and the other two from Commerce or Finance. The Central bank has more than 660 shareholders whose shares are traded on an Over the Counter Share Transfer Facility market (OTCSTF market) coordinated within the Reserve Bank.

Restructuring the apex bank along these lines would enhance sound accounting, administration and functioning of the banking system and strengthen its oversight role. Since the Reserve bank has lost its lender of last resort role owing to the dollarisation of the economy, it should put in place other arrangements involving multilateral institutions. The government need to come up with sound fiscal policies that grow the economy so that enough savings for investment can be mobilised.

The Credit Asset Register needs to be operationalised to enable banks to check new loan applications against the register and thus reduce non-performing loans. The Deposit Protection Board should increase its deposit insurance cover to encourage savings as well as publishing comprehensive structural information about every institution on its website. It must operate independent of the Reserve Bank.

7.2.6. Savings promotion

The promotion of deposits should be a national strategy like setting aside a month for the promotion of deposits. Other countries in the region have done it for instance South Africa has every July as a National Savings month, although the savings were being hampered by financial literacy, consumerism and unemployment. The month is spearheaded by a non-profit making organisation, South African Savings Institute (SASI). The institute's efforts have seen an increase in savings over time especially from the informal sector.

Long term savings need to be promoted as opposed to transactional savings. The new-normal circumstances that the country finds itself in, where foreign capital and FDI have become unreliable it is prudent to come up with measures that will built a long term savings base.

7.2.7. Fiscal policy reforms

There was need of coming up with robust fiscal policies that could resuscitate the economy and the industries to boost economic activities in the country. There was strong empirical evidence that linked the country's economic growth and solid national savings.

7.3. Areas of further research

There is need for further study into areas that include financial inclusion strategy in Zimbabwe given that the generality of the population remains unbanked. The impact of the introduction of electronic payment systems (mobile and use of debit cards) on the savings practice of Zimbabweans particularly in the informal sector need also further study.

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Zimbabwe National Financial Inclusion Strategy 2016-2020. Reserve Bank of Zimbabwe.

APPENDICES

APPENDIX A: QUESTIONNAIRE

Questionnaire

Dear respondent

My name is Shepard Makurumidze. I am a PhD (Finance) student at the University of Lusaka, Zambia. As part of my study, I am gathering data on the topic, '*Determinants of restoring a culture of saving in banks among Zimbabweans'*

I would be grateful if you could spare your valuable time to respond to the attached questionnaire as honestly and objectively as is possible. Please note that your responses will be used for academic purposes only and will be treated with strict confidentiality. Please do not write your name on any pages of the questionnaire.

Thank you in advance for your co-operation.

Makurumidze Shepard (Mr)
Cell: 0777899413/0733412576
E-mail: tsmak70@gmail.com/smakurumidze@cut.ac.zw

SECTION A: DEMOGRAPHIC CHARACTERISTICS

(Where appropriate tick box to show your response)

1. Your gender: 1. Female ☐ 2. Male ☐

2. Age: ☐ years

3. What is your marital status: 1. Single ☐

2. Married ☐

3. Divorced ☐

4. Widowed ☐

4. Your highest educational qualification: 1. Ordinary level ☐

2. Advanced Level ☐

3. Diploma level ☐

4. Bachelor's degree level ☐

5. Post-graduate level ☐

5. Your employment Status: 1. Formally employed ☐

2. Self employed ☐

3. Student ☐

4. Retired ☐

5. Unemployed ☐

6. What is your main source of income (select one): 1. Formal employment ☐

2. Self-employment ☐

3. Investment income (Property/Shares) ☐

4. Government support ☐

5. Children support ☐

6. Savings/pension drawings ☐

7. Other (specify)……

7. How would you describe your health situation: 1. Good ☐ 2. Bad ☐

3. Moderate ☐

8. Your **approximate** monthly income: $ ☐

9. What is your accommodation status: 1. Own house ☐

2. Rented accommodation ☐

3. Company accommodation ☐

4. Parents accommodation ☐

5. Others (specify)……

10. Do you have dependents that you are looking after: 1. Yes ☐ 2. No ☐

11. If '**yes',** how many dependents do you have? ☐

SECTION B: SAVINGS PRACTICES

12. Do you have an active bank account? 1. Yes ☐ 2. No ☐

13. Which one is your main banker for your savings (**select one**)?

1. BancABC ☐ 2. Barclays bank ☐ 3. CBZ ☐ 4. Standard Chartered ☐

5. Stanbic ☐ 6. Steward ☐ 7. FBC ☐ 8.NMB ☐ 9. POSB ☐

10. ECOBank ☐ 11. ZB ☐ 12.CABS ☐ 13. Others……

14. What motivated you to have your savings with the institution above (select one only)?

1. High return (interest) and low bank charges ☐

2. It was conveniently located ☐

3. Financial stability and soundness ☐

4. Enabled me to access other products like loans etc. ☐

☐

5. Recommended by a friend

6. I am not sure why I chose the institution ☐

15. What type of account do you have?

1. Savings account ☐ 2. Current account ☐

3. Call account ☐ 4. Time Deposit ☐ 5. Others……

16. Indicate the province in which your account is held.

1. Bulawayo ☐ 2. Harare ☐ 3.Manicaland ☐ 4. Mash Central ☐

5. Mash East ☐ 6. Mash West ☐ 7.Masvingo ☐ 8. Mat North ☐

9. Mat South ☐ 10. Midlands ☐

17. Which one would you isolate as your main reason for saving? (select one)

1.Funding forchildren's education ☐

2. Property acquisition ☐

3. Preparing for better life at retirement ☐

4. Illness and other emergencies ☐

5. To acquire consumer durables ☐

6. Travel and Leisure ☐

7. Other (specify) …….

18. In your opinion why do you think some potential savers do not put their money in banks in Zimbabwe? **(select one)**

1. High service charges and low interest rates ☐

2. Not conveniently located ☐

3. Soundness of the financial sector. ☐

4. Inadequate savings products ☐

☐

5. Poor service delivery by banks

6. No income for savings

7. Not sure

19. How frequent do you visit your bank: 1. Daily 2.Weekly

3. Monthly 4. Yearly 5. Never

20. Select one description suiting your savings practice potential.

1. Great potential 2. No potential 3. Not Sure

21. What is the major form of your wealth (select one)?

1. Financial assets (shares etc.)

2. Livestock

3. Properties 4. Movable assets like cars

22. Give your view on whether the following factors affected savings practices of Zimbabweans over the years using the scale indicated. (Tick appropriate box)

	1	**2**	**3**	**4**	**5**
	Strongly agree	Agree	Not Sure	Disagree	Strongly disagree
Economic factors					
Credibility of the financial institutions					
Political factors					
Bank charges and interest earnings					

SECTION C: ZIMBABWE BANKING SYSTEM

23. Which category of banking institutions in Zimbabwe are you **most** aware of? (Select one choice)

1. Commercial banks 2. Investment banks 3. Savings banks

4. Building societies ☐ 5. All of them ☐ 6. Others…….

24. What is your view about the adequacy of the number of banking institutions in Zimbabwe?

1. Adequate ☐ 2. Inadequate ☐ 3.Too many ☐ 4. Not sure ☐

25. Are the savings products offered by the Zimbabwean banking institutions adequate?

1. Yes ☐ 2. No ☐ 3. Not sure ☐

26. Developments in the banking system over time are promoting savings among Zimbabwean. (Circle your view)

Strongly agree	Agree	Not sure	Disagree	Strongly disagree
1	2	3	4	5

27. Are you satisfied with the policies of the central bank in promoting savings in the country? 1. Yes ☐ 2. No ☐ 3. Not sure ☐

SECTION D: SAVINGS PRACTICES AND ECONOMIC PERFORMANCE

28. The savings practices amongst Zimbabwean can be linked to the performance of the economy. (Circle your view).

Strongly agree	Agree	Not sure	Disagree	Strongly disagree
1	2	3	4	5

29. The Zimbabwean population has the capacity to harness funds for investment through savings.

1. Yes ☐ 2. No ☐ 3. Not sure ☐

30. Savings in banks have been declining over the years, what major strategy can be employed by responsible authorities to mobilize these savings. **(Select one)**

1. Reducing service charges and increasing interest earned on savings. ☐
2. Banking policy reforms. ☐
3. Increasing savings product range and innovations ☐
4. Increasing bank branch network. ☐
5. Not sure ☐

Thank you.

APPENDIX B: INTERVIEW GUIDE

1. Are you satisfied with the number of banks and their branch network operating in the country?

……
……
……
…….....

2. In your opinion how can the savings insurance by Deposit Insurance Board be boosted to encourage Zimbabweans to save in banks.

……
……
……

3. Are you satisfied with the regulatory and policy framework within which financial institutions are operating, if not satisfied what improvements do you think need to be done?

……
……
……

4. In your opinion are the savers adequately protected by the legal and policy frameworks in the country?

……
……
…….....

5. Can savings trends in Zimbabwe be attributed to the performance of the economy?

……
……
…….....

.

6. What is your view about the financial soundness or risk exposure of the financial systems in Zimbabwe?

……
……
……

7. Are the net returns from savings in banks fair enough to encourage people to put their money in these banks?

……
……
…….

8. As a country do we have enough savers that can be mobilised to provide funds for the much needed investment in the country instead of relying on multilateral institutions?

……
……
……

9. Are you satisfied with the oversight role of the central bank?

……
……
……

11. How have the following factors affected the savings practice in Zimbabwe?

a) Foreign borrowing constraints:

……
……
……..

b) Government fiscal policies, i.e. the public sector debt

……
……
…….....

c) Financial market development, innovations, mobile banking and classical uncertainty, service delivery and branch network:

……
……
……

APPENDIX C

DOCUMENT ANALYSIS GUIDE

1. What kind of document is being evaluated and examined?

……
……
…….

2. Who compiled the document and when was it published?

……
……
……..

3. The document was written for which target group or audience?

……
……
…….

4. What are the main issues being addressed by the document in their order of importance?

a) ……..

b) ……..

c) ……..

5. What does the document say about the following?

a) Banking systems in Zimbabwe

……

b) Savings practices among Zimbabweans

……

c) Factors affecting the practice of savings among Zimbabweans

…….....

d) The effect of savings practice on the performance of the economy.

……....

APPENDIX D

DETERMINATION OF SAVINGS BEHAVIOUR

Variables for model formulation

Model		Beta In	T	Sig.	Partial Correlation	Collinearity Statistics
						Tolerance
1	Gender	-.511[b]	-2.267	.064	-.679	.875
	Age in years	.185[b]	.562	.594	.224	.721
	Marital status	.409[b]	1.176	.284	.433	.554
	Highest education	-.627[b]	-1.632	.154	-.554	.388
	Employment status	-.409[b]	-1.176	.284	-.433	.554
	Main income source	.018[b]	.057	.956	.023	.858
	Monthly income	-.262[b]	-.778	.466	-.303	.662
	Accommodation status	-.217[b]	-.789	.460	-.307	.988
	Having dependents	-.367[b]	-.974	.368	-.369	.500
	Number of dependents	-.063[b]	-.213	.838	-.087	.925
	Banker in Zimbabwe	-.439[b]	-1.744	.132	-.580	.864
	Type of account held	.484[b]	2.256	.065	.678	.969
	Province account held	-.347[b]	-1.355	.224	-.484	.963
	Main reason for saving	-.367[b]	-1.409	.208	-.499	.916
	Potential savers not banking	.568[b]	3.266	.017	.800	.982
	Frequency of bank visit	-.011[b]	-.038	.971	-.016	.988
	Form of wealth	-.106[b]	-.373	.722	-.151	.997
	Economic factor	-.120[b]	-.416	.692	-.167	.969
	Credibility of institutions	-.250[b]	-.545	.605	-.217	.375
	Political factor view	-.327[b]	-1.288	.245	-.465	1.000
	Bank charges and interest earnings	-.171[b]	-.613	.563	-.243	1.000
	Category of institutions known	-.190[b]	-.681	.521	-.268	.984
	Adequacy of banking institutions	-.201[b]	-.727	.495	-.284	.993
	Adequacy of savings products	-.382[b]	-1.165	.288	-.430	.625
	Banking system developments	-.179[b]	-.453	.667	-.182	.512
	Central bank policies promoting savings	-.120[b]	-.416	.692	-.167	.969

	Savings practices and economy	-.159[b]	-.540	.608	-.215	.912
	Population capacity to save for investment	.225[b]	.826	.441	.319	.995
	Strategies to mobilise savings	.071[b]	.228	.827	.093	.846
	Deposit rate	-.127[b]	-.403	.701	-.162	.806
	Lending rate	-.369[b]	-.984	.363	-.373	.504
	Yr on Yr inflation	-.367[b]	-.974	.368	-.369	.500
	Total Debt	-.157[b]	-.548	.603	-.218	.954
	GDP market price $m	.209[b]	.726	.495	.284	.912
	Gross capital formation	-.429[b]	-1.854	.113	-.603	.980
	Net Exports $m	.173[b]	.600	.571	.238	.936
	Gender	-.122[c]	-.397	.708	-.175	.364
	Age in years	.081[c]	.363	.731	.160	.702
	Marital status	.224[c]	.919	.400	.380	.514
	Highest education	-.415[c]	-1.635	.163	-.590	.360
	Employment status	-.224[c]	-.919	.400	-.380	.514
	Main income source	-.214[c]	-1.099	.322	-.441	.759
	Monthly income	-.085[c]	-.357	.735	-.158	.616
	Accommodation status	-.161[c]	-.909	.405	-.376	.978
	Having dependents	-.265[c]	-1.095	.323	-.440	.491
	Number of dependents	-.055[c]	-.281	.790	-.125	.925
	Banker in Zimbabwe	-.236[c]	-1.215	.278	-.478	.728
	Type of account held	.163[c]	.629	.557	.271	.491
2	Province account held	-.217[c]	-1.250	.267	-.488	.903
	Main reason for saving	-.216[c]	-1.186	.289	-.469	.840
	Frequency of bank visit	.226[c]	1.276	.258	.496	.856
	Form of wealth	.084[c]	.428	.686	.188	.893
	Economic factor	-.023[c]	-.121	.909	-.054	.941
	Credibility of institutions	-.282[c]	-1.002	.362	-.409	.375
	Political factor view	-.099[c]	-.480	.652	-.210	.806
	Bank charges and interest earnings	.051[c]	.254	.810	.113	.855
	Category of institutions known	-.142[c]	-.789	.466	-.333	.977
	Adequacy of banking institutions	-.010[c]	-.049	.963	-.022	.878

	Adequacy of savings products	-.076[c]	-.285	.787	-.126	.497
	Banking system developemnts	.000[c]	.001	.999	.000	.486
	Central bank policies promoting savings	-.023[c]	-.121	.909	-.054	.941
	Savings practices and economy	.090[c]	.425	.689	.187	.768
	Population capacity to save for investment	-.081[c]	-.376	.722	-.166	.740
	Strategies to mobilise savings	.036[c]	.175	.868	.078	.843
	Deposit rate	-.259[c]	-1.439	.210	-.541	.775
	Lending rate	-.265[c]	-1.098	.322	-.441	.494
	Yr on Yr inflation	-.265[c]	-1.095	.323	-.440	.491
	Total Debt	-.141[c]	-.770	.476	-.325	.954
	GDP market price $m	.158[c]	.851	.434	.356	.904
	Gross capital formation	-.049[c]	-.180	.864	-.080	.483
	Net Exports $m	.329[c]	2.405	.061	.732	.883

a. Dependent Variable: Total deposits to liabilities

b. Predictors in the Model: (Constant), Motivation for savings

c. Predictors in the Model: (Constant), Motivation for savings, Potential savers not banking

Variables Entered/Removed[a]

Model	Variables Entered	Variables Removed	Method
1	Motivation for savings	.	Stepwise (Criteria: Probability-of-F-to-enter <= .050, Probability-of-F-to-remove >= .100).

2	Potential savers not banking	.	Stepwise (Criteria: Probability-of-F-to-enter <= .050, Probability-of-F-to-remove >= .100).

a. Dependent Variable: Total deposits to liabilities

Coefficients[a]

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.	Correlations		
		B	Std. Error	Beta			Zero-order	Partial	Part
1	(Constant)	52.839	17.108		3.089	.005			
	GDP market price $m	.001	.002	.091	.473	.640	.091	.091	.091

a. Dependent Variable: Total deposits to liabilities

Coefficients[a]

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.	Correlations		
		B	Std. Error	Beta			Zero-order	Partial	P
1	(Constant)	38.488	1.622		23.728	.000			
	Savings practice potential	-1.210	.891	-.104	-1.357	.177	-.104	-.104	

a. Dependent Variable: Age in years

Excluded Variables[a]

Model		Beta In	t	Sig.	Partial Correlation	Collinearity Statistics
						Tolerance
1	Gender	-.099[b]	-1.982	.049	-.152	.994
	Age in years	-.029[b]	-.581	.562	-.045	.990
	Marital status	.011[b]	.225	.822	.017	.999
	Highest education	-.027[b]	-.528	.598	-.041	.995
	Employment status	.116[b]	2.354	.020	.179	1.000

	Main income source	.034[b]	.672	.502	.052	1.000
	Health status	.075[b]	1.488	.139	.114	.986
	Monthly income	-.055[b]	-1.073	.285	-.083	.968
	Accomodation status	.028[b]	.564	.573	.044	.995
	Having dependents	-.030[b]	-.594	.554	-.046	.989
	Number of dependents	-.001[b]	-.020	.984	-.002	.990
	Having a bank account	.024[b]	.472	.638	.036	.983
	Banker in Zimbabwe	-.003[b]	-.061	.951	-.005	1.000
	Motivation for savings	.063[b]	1.257	.211	.097	1.000
	Type of account held	-.017[b]	-.341	.733	-.026	.997
	Province account held	-.025[b]	-.499	.619	-.039	.994
	Main reason for saving	.025[b]	.496	.621	.038	.992
	Potential savers not banking	.037[b]	.729	.467	.056	.965
	Frequency of bank visit	-.025[b]	-.507	.613	-.039	.999
	Form of wealth	-.018[b]	-.349	.727	-.027	.978
	Economic factor	-.074[b]	-1.486	.139	-.114	.997
	Credibility of institutions	.008[b]	.156	.876	.012	.999
	Political factor view	-.043[b]	-.840	.402	-.065	.960
	Bank charges and interest earnings	.037[b]	.744	.458	.057	1.000
	Category of institutions known	.079[b]	1.564	.120	.120	.966
	Adequacy of banking institutions	.055[b]	1.101	.272	.085	.990
	Adequacy of savings products	.004[b]	.088	.930	.007	.998
	Banking system developemnts	.008[b]	.152	.880	.012	.985
	Central bank policies promoting savings	.066[b]	1.280	.202	.099	.926
	Savings practices and economy	-.043[b]	-.854	.394	-.066	.991
	Strategies to mobilise savings	.083[b]	1.537	.126	.118	.857
	Gender	-.088[c]	-1.780	.077	-.137	.984
	Age in years	-.006[c]	-.118	.907	-.009	.950
2	Marital status	.048[c]	.931	.353	.072	.919
	Highest education	-.009[c]	-.176	.861	-.014	.971
	Main income source	-.042[c]	-.712	.477	-.055	.704

Health status	.079[c]	1.593	.113	.123	.985
Monthly income	-.036[c]	-.710	.479	-.055	.942
Accomodation status	.002[c]	.047	.963	.004	.945
Having dependents	-.071[c]	-1.372	.172	-.106	.901
Number of dependents	.039[c]	.747	.456	.058	.895
Having a bank account	-.028[c]	-.520	.604	-.040	.821
Banker in Zimbabwe	-.020[c]	-.399	.690	-.031	.980
Motivation for savings	.053[c]	1.068	.287	.083	.992
Type of account held	-.035[c]	-.699	.485	-.054	.976
Province account held	-.017[c]	-.338	.736	-.026	.989
Main reason for saving	-.012[c]	-.239	.812	-.019	.896
Potential savers not banking	.043[c]	.858	.392	.066	.962
Frequency of bank visit	-.034[c]	-.686	.494	-.053	.993
Form of wealth	-.015[c]	-.290	.772	-.023	.977
Economic factor	-.085[c]	-1.728	.086	-.133	.989
Credibility of institutions	-.005[c]	-.091	.928	-.007	.988
Political factor view	-.051[c]	-1.007	.315	-.078	.956
Bank charges and interest earnings	.047[c]	.943	.347	.073	.993
Category of institutions known	.085[c]	1.703	.090	.131	.963
Adequacy of banking institutions	.055[c]	1.102	.272	.085	.990
Adequacy of savings products	.014[c]	.277	.782	.021	.992
Banking system developemnts	.017[c]	.341	.734	.026	.979
Central bank policies promoting savings	.056[c]	1.086	.279	.084	.918
Savings practices and economy	-.037[c]	-.742	.459	-.058	.988
Strategies to mobilise savings	.080[c]	1.497	.136	.115	.856

a. Dependent Variable: Savings practice potential

b. Predictors in the Model: (Constant), Population capacity to save for investment

c. Predictors in the Model: (Constant), Population capacity to save for investment, Employment status

APPENDIX E

SECONDARY DATA

SADC Statistics unit contact: djagai@sadc.int

PRICES

INDICATORS	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014
Annual Inflation rate as measured by National CPI - period average by COICOP (%)															
Headline Inflation-period annual average	**622.8**	**602.6**	**583.7**	**505.1**	**350.0**	**237.8**	**1016.7**	**6723.7**	**231000000.0**	**-7.7**	**3.1**	**3.5**	**3.7**	**1.6**	**-0.2**
01: FOOD & NON ALCOHOLIC BEVERAGES											*90.4*	*94.0*	*98.4*	*100.0*	*96.9*
02: ALCOHOLIC BEVERAGES & TOBACCO											*87.6*	*91.9*	*97.7*	*102.7*	*104.7*
03: Clothing & footwear											*98.1*	*99.7*	*100.5*	*100.3*	*99.9*
04: Housing, water, electricity, gas & other fuels											*86.0*	*87.4*	*97.7*	*102.1*	*103.0*
05: Furnish, hse equip & routine maintenance											*99.3*	*98.8*	*100.0*	*100.0*	*97.8*
06: Health											*97.7*	*97.4*	*98.9*	*101.7*	*102.4*
07: Transport											*88.0*	*94.6*	*96.4*	*101.5*	*102.2*
08: Communication											*91.1*	*92.4*	*99.8*	*89.4*	*85.9*
09: Recreation and culture											*99.3*	*99.5*	*100.1*	*99.6*	*98.9*
10: Education											*83.4*	*86.8*	*94.8*	*104.6*	*121.1*
11: Restaurants and hotels											*88.8*	*93.2*	*99.0*	*100.6*	*101.4*
12: Miscellaneous goods and services											*92.3*	*96.4*	*99.2*	*100.0*	*98.0*
Year on Year Inflation rate as measured by National CPI - End of year (%)	*55.2*	*112.1*	*198.9*	*598.7*	*132.7*	*585.8*	*1281.1*	*66212.3*	*231150889.4*	*0.5*	*3.2*	*4.9*	*2.9*	*0.3*	*-0.2*

SADC Statistics unit contact: djagai@sadc.int

Gross External Debt by type of lending institutions, Million $, 2000-2014

INDICATORS	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014
Gross External Debt_stock at end of year	3 525	3 422	3 510	3 812	4 071	3 978	4 246	4 607	4 690	6 289	6 695	7 385	7 497	8 934	10 838
of which: Bilateral Institutions	1 351	1 430	1 458	1 658	1 897	1 877	1 984	1 994	2 360	2 761	2 563	3 308	3 397	3 786	4 220
Multilateral institutions	*1 724*	*1 758*	*1 813*	*1 945*	*1 952*	*1 871*	*1 936*	*1 977*	*2 059*	*2 272*	*2 608*	*2 550*	*2 855*	*2 707*	2 567
Other	450.0	234.0	239.0	209.0	222.0	230.0	326.0	636.0	271.0	1256.0	1524.0	1527.0	1245.0	2441.0	4 786

Debt Servicing-flows, Million $, 2000-2014

INDICATORS	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014
Total External Debt Servicing (capital + interests)						4 326	4 753	5 100	5 304	7 020	7 205	7 968	8 270	9 674	11 667

Debt Refinancing	0.0	0.0	0.0	0.0	0.0	0.0		
Accumulation of External Payment Arrears	829.6	307.4	779.3	338.2	84.0	153.0		
Financing Gap (-) /Surplus (+)	-420.0	0.0	0.0	0.0	0.0	0		
(Memorandum Items)								
Gross Official Reserves(US$m) - At 50%	360.0	47729.000%	42668.000%	432.1	331.1	349.22436		
Import Cover (months) - At 50% (Goods only)	1.3	1.1	0.7	0.8	0.6	0.7		
Gross Official Reserves(US$m) - At 100%	365.8	477.3	427.2	425.0	331.4	349.5		
Import Cover (months) - At 100% (Goods & Services)	1.2	1.0	0.6	0.7	0.5	0.6		
Usable Reserves (US$M)*	275.8	197.3	181.6	127.9	18.3	170.9		
Net DMBs Reserves	541.5	512.4	447.1	265.6	1.5	-61.6		
Other Liabilities	515.4	536.9	524.5	567.9	569.7	609.6		
External Payment Arrears	3901.0	4208.4	4987.8	5326.0	5410.0	5563.0		
Of which: Private Sector	0.0	0.0	0.0	0.0	0.0	0.0		
Current account /GDP(%)-Exc. Grants (Revised GDP)	-0.2	-0.2	-0.3	-0.3	-0.292229	-0.233495		
GDP (Z$bn) market prices	815700.0%	908500.0%	1016700.0%	1124100.0%	1174500.0%	1215100.0%		
Effective Exchange Rate	0.0	1.0	0.4	-0.1	0.0	0.0		
GDP (US$m) market prices	0.22191015	0.606503107	0.46499401	-0.1126399	0.01470049	-0.07381896		
Export Growth (%)	117.6	-25.3	-7.5	42.6	-9.9	-46.5		
Import Growth (%)	799.4%	8641.2%	5299.1%	-1517.6%	286.3%	-320.0%		
Food %	11758.0%	-2525.9%	-749.1%	4255.3%	-992.7%	-4646.5%		
Non-Food %	8.0	86.4	53.0	-15.2	2.9	-3.2		

NOTES

*** Sign reversal - run down(+); buildup (-)**

1. Non-factor services include Shipments, Transport and Travel
2. Income include interest (Payments on due basis/scheduled)
3. Private Transfers include Homelink, Humanitarian Aid and Migrant effects
4. Other income include Dividends, Profits and Compensation of employees
5. DMB Reserves include holdings of foreign notes and coins and other investments

SOURCE: RBZ/Ministry of Finance and Economic Development

SADC Statistics unit contact: djagai@sadc.int

Public Finance, Million National Currency, 2000-2014

INDICATORS	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014
Total Revenue and Grants	90 915	138 347	302 349	1 141 340	2 111	942	520	202	133	974	2 199	2 921	3 496	3 741	3 770
Total Expenditure including Net Lending	159 621	169 089	343 589	1 307 869	2 548	1 438	696	384	258	1 070	2 373	3 223	3 505	3 987	3 912
of which: Current Expenditure	*147 903*	*157 934*	*316 870*	*1 164 666*	*2 193*	*1 303*	*572*	*305*	*241*	*1 024*	*1 780*	*2 749*	*3 076*	3 520	3 565
Capital Expenditure	*11 718*	*11 155*	*26 719*	*143 202*	*318*	*115*	*121*	*70*	*14*	*45*	*590*	*464*	*500*	466	346
Net Lending					*36*	*19*	*2*	*9*	*3*	*1*	*3*	*10*	*5*	2	1

General Govt Debt, Million National Currency, 2000-2014

INDICATORS	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014
General Government DOMESTIC Debt						*8*	*9*	*10*	*9*	*10*	*10*	*12*	*12*	*na*	*na*
General Government EXTERNAL Debt	3 525	3 422	3 510	3 812	4 071	3 978	4 246	4 607	4 690	6 289	6 695	7 385	7 497	8 934	10 838
TOTAL Government Debt															

SADC Statistics unit contact: djagai@sadc.int

GDP at Current prices in United States Dollars (millions),

Industry / Year	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014
Agriculture, Hunting and Fishing and Forestry	1,808	2,078	1,613	1,365	1,221	1,176	1,041	975	632	1,038	1,157	1,222	1377	1364	1705
Mining and Quarrying	380	283	359	256	244	314	278	279	190	561	802	1,006	1064	1187	1157
Manufacturing	1,712	1,606	1,344	1,195	1,058	1,176	1,041	975	885	1,066	1,109	1,293	1420	1457	1450
Electricity and water	190	189	269	256	244	235	208	209	190	279	359	436	448	492	546
Construction	190	94	90	85	81	78	69	70	63	137	182	289	376	399	426
Finance and Insurance	761	756	896	939	895	627	555	557	443	572	638	704	943	1073	1154
Real Estate	285	283	358	341	326	392	347	348	190	110	126	193	303	341	385
Distribution, hotels, and Restaurants	1,522	1,511	1,434	1,024	845	627	555	627	696	1,207	1,376	1,397	1601	1909	1927
Transport and communication	666	661	627	597	570	549	555	557	632	1,080	1,137	1,320	1334	1374	1478
Public administration	285	378	358	341	407	392	347	348	379	186	292	321	383	402	436
Education	666	756	717	768	814	784	694	696	696	210	304	518	710	879	1021
Health	190	189	179	171	163	157	139	139	126	87	102	109	119	123	125
Domestic Services	95	94	179	171	163	157	139	139	126	35	38	41	40	43	45
Other Services	476	472	448	427	407	392	347	348	316	343	390	453	416	400	404
Less Fin.Int Services Indirectly Measured	-666	-756	-627	-341	-244	-157	-139	-139	-63	-22	-36	-50	-67	-77	-86
GDP at factor cost	**8,562**	**8,596**	**8,245**	**7,597**	**7,194**	**6,901**	**6,179**	**6,127**	**5,502**	**6,889**	**7,977**	**9,254**	**10467**	**11365**	**12172**
Net taxes on production	0	0	0	0	0	0	0	0	63	113	131	151	171	185	184
Other taxes on production	**0**	**0**	0	**0**	**0**	0	**0**	**0**	**0**	113	131	151	171	185	184
Other subsidies on production	**0**	**0**	0	**0**	**0**	0	**0**	0	0	0	0	0	0	0	0
GDP at basic prices	**8,562**	**8,596**	**8,245**	**7,597**	**7,194**	**6,901**	**6,179**	**6,127**	**5,565**	**7,002**	**8,108**	**9,405**	**10638**	**11550**	**12356**
Net taxes on products	951	850	717	854	895	941	833	835	885	1,155	1,349	1,551	1834	1940	1841
Taxes on products	951	850	717	854	895	941	833	835	885	1,155	1,349	1,551	1834	1940	1841
Subsidies on products	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
GDP at Market Prices	**9,513**	**9,446**	**8,962**	**8,450**	**8,090**	**7,842**	**7,012**	**6,962**	**6,451**	**8,157**	**9,457**	**10,956**	**12472**	**13490**	**14197**

GDP at Constant price 2009=100 in United States Dollars (millions),

Industry / Year	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014
Agriculture, Hunting and Fishing and Forestry	1,668	1,928	1,483	1,232	1,109	1,058	1,009	920	626	1,038	1,113	1,129	1217	1186	1459
Mining and Quarrying	351	263	330	231	222	282	269	263	188	561	770	958	1034	1156	1116
Manufacturing	1,580	1,490	1,236	1,079	961	1,058	1,009	920	877	1,066	1,087	1,238	1304	1296	1230
Electricity and water	176	175	247	231	222	212	202	197	188	279	333	354	355	373	393
Construction	176	88	82	77	74	71	67	66	62	137	156	258	318	331	353
Finance and Insurance	702	701	824	847	813	564	538	526	438	572	619	670	857	954	1028
Real Estate	263	263	330	308	296	353	336	329	188	110	116	172	274	276	289
Distribution, hotels, and Restaurants	1,405	1,402	1,319	924	767	564	538	592	689	1,207	1,314	1,370	1429	1485	1522
Transport and communication	615	613	577	539	518	494	538	526	626	1,080	1,132	1,132	1207	1292	1306
Public administration	263	350	330	308	370	353	336	329	376	186	243	291	346	358	380
Education	615	701	659	693	740	705	673	657	689	210	287	471	650	669	695
Health	176	175	165	154	148	141	135	131	125	87	101	109	117	118	120
Domestic Services	88	88	165	154	148	141	135	131	125	35	39	39	38	40	41
Other Services	439	438	412	385	370	353	336	329	313	343	393	437	391	372	360
Less Fin.Int Services Indirectly Measured	-615	-701	-577	-308	-222	-141	-135	-131	-63	-22	-29	-41	-45	-50	-52
GDP at factor cost	**7,902**	**7,974**	**7,583**	**6,856**	**6,536**	**6,204**	**5,988**	**5,784**	**5,447**	**6,889**	**7,673**	**8,587**	**9494**	**9854**	**10240**
Net taxes on production	0	0	0	0	0	0	0	0	63	113	126	141	155	165	178
Other taxes on production	**0**	**0**	0	**0**	**0**	0	**0**	**0**	**0**	113	126	141	155	165	178
Other subsidies on production	**0**	**0**	0	**0**	**0**	0	**0**	0	0	0	0	0	0	0	0
GDP at basic prices	**7,902**	**7,974**	**7,583**	**6,856**	**6,536**	**6,204**	**5,920**	**5,784**	**5,385**	**7,002**	**7,799**	**8,727**	**9649**	**10019**	**10418**
Net taxes on products	878	789	659	770	813	846	807	789	877	1,155	1,286	1,439	1592	1726	1779
Taxes on products	878	789	659	770	813	846	807	789	877	1,155	1,286	1,439	1592	1726	1779
Subsidies on products	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
GDP at Market Prices	**8,779**	**8,762**	**8,242**	**7,627**	**7,349**	**7,050**	**6,795**	**6,573**	**6,261**	**8,157**	**9,085**	**10,167**	**11241**	**11745**	**12197**

GDP by Expenditure, US Dollar (millions),

INDUSTRY/YEAR	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014
Final Consumption Expenditure	8,133	8,808	8,313	10,285	9,562	9,545	6,926	6,568	7,383	10,883	9,817	13,542	14,386	15,929	15,929
Private Consumption	6,713	7,713	7,877	9,174	7,207	7,605	6,793	6,167	7,339	9,797	8,162	11,182	11,841	13,027	11,522
Consumption of Private Non- Profit Bodies	59	45	22	43	34	25	7	77	8	413	544	555	566	789	992
Government Consumption Expenditure	1,360	1,051	414	1,068	2,321	1,916	126	324	36	672	1,112	1,805	1,979	2,113	3,415
Gross Capital Formation	1,410	709	671	-1,723	311	156	558	515	142	1,232	2,259	2,453	1,687	1,758	1,879
Gross fixed Capital Formation	1,222	718	333	284	185	115	677	201	56	960	2,048	2,064	2,079	1,753	1,873
Changes in Stocks	187	-9	338	-2,007	126	41	-119	314	87	272	211	390	-392	5	6
Domestic Expenditure	**9,542**	**9,518**	**8,984**	**8,562**	**9,873**	**9,700**	**7,484**	**7,084**	**7,400**	**12,115**	**12,076**	**15,995**	**16,073**	**17,687**	**17,808**
Net Exports of Goods and Services	-30	-72	-22	-112	-1,783	-1,858	-472	-121	-1,075	-3,958	-2,619	-5,039	-3,600	-4,197	-3,611
Exports of Goods and Services	3,509	2,353	2	569	4,129	4,093	2,515	81	1,968	2,250	3,245	3,557	3,884	3,507	3,842
less Imports of Goods and Services	3,539	2,424	24	680	5,912	5,951	2,987	201	2,917	6,207	5,865	8,596	7,484	7,704	7,453
Gross Domestic Product at Market Prices	**9,513**	**9,446**	**8,962**	**8,450**	**8,090**	**7,842**	**7,012**	**6,962**	**6,451**	**8,157**	**9,457**	**10,956**	**12,472**	**13,490**	**14,197**

GDP by Expenditure at constant prices, US Dollar (millions),

INDUSTRY/YEAR	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014
Final Consumption Expenditure										10883	8950	11212	12970	13804	13712
Private Consumption										9797	7344	9032	10669	11223	9757
Consumption of Private Non- Profit Bodies										413	527	487	512	702	910
Government Consumption Expenditure										672	1079	1692	1789	1880	3044
Gross Capital Formation										1232	1985	2041	945	1595	1798
Gross fixed Capital Formation										960	1769	1669	1299	1590	1792
Changes in Stocks										272	217	372	-354	5	5
Domestic Expenditure										9128	10935	13253	13915	15399	15510
Net Exports of Goods and Services										-3958	-1850	-3086	-2674	-3654	-3313
Exports of Goods and Services										2250	2292	2179	2884	3054	3524
less Imports of Goods and Services										6207	4142	5265	5558	6707	6837
Gross Domestic Product at Market Prices										8157	9085	10167	11241	11745	12197

****data from 2000 to 2008 not available for this table***

Year	Total Deposits (Z$ Million)	Total Liabilties (Z$ Million)	% TD/L ratio	TBR	Average Deposit rates (30 day)	Average Lending Rates
1980	1,981.90	2,416.10	82.02888953	3.27	3.35	7.50
1981	2,252.80	2,741.10	82.18598373	8.12	11.38	13.00
1982	2,593.50	3,098.40	83.70449264	8.44	9.50	13.00
1983	2,689.80	3,280.70	81.98859999	8.65	12.38	13.00
1984	3,092.90	3,825.40	80.85167564	8.43	9.00	13.00
1985	3,647.50	22,598.40	16.14052322	8.62	10.25	13.00
1986	4,081.00	4,908.50	83.14148925	8.62	9.50	13.00
1987	4,771.40	5,839.70	81.70625203	8.46	9.30	13.00
1988	5,870.00	7,190.60	81.63435596	8.41	9.25	13.00
1989	7,203.60	8,847.40	81.42053033	7.73	10.00	11.50
1990	8,835.20	10,965.60	80.57197053	9.85	10.25	12.00
1991	10,790.00	13,848.20	77.91626349	18.50	24.00	17.25
1992	11,986.00	17,460.20	68.64755272	35.50	38.00	47.50
1993	15,808.20	30,740.50	51.42466778	26.96	30.00	38.00
1994	22,081.60	41,180.80	53.62110498	29.58	31.50	40.00
1995	30,460.40	56,231.30	54.16983068	29.46	30.00	38.49
1996	42,480.80	77,199.40	55.02737068	18.46	19.25	37.07
1997	55,989.00	108,034.40	51.82515939	31.39	32.50	37.86
1998	57,740.30	130,854.50	44.12557459	35.98	40.25	58.00
1999	72,485.72	155,066.00	46.74507367	76.00	69.00	76.00
2000	110,640.80	253,128.70	43.70930677	61.24	62.00	81.50
2001	233,424.00	394,071.60	59.23390572	27.63	26.00	47.50
2002	606,573.80	1,076,634.20	56.33982276	26.03	35.00	56.50
2003	3,019,572.00	4,711,082.70	64.09507521	79.75	350.00	160.00
2004	9,005,135.00	12,961,702.10	69.47494188	133.00	100.00	270.00
2005	53,654,399.25	106,265,653.22	50.49081959	340.00	340.00	550.00
2006	779,627,300.00	1,684,832,800.00	46.27327412	66.30	200.00	700.00
2007	554,580,723,790,000.00	918,782,231,160,000.00	60.36041022	66.30	180.00	1100.00
2008	248,555,977,716,455,000,000,000.00	759,518,182,549,562,000,000,000.00	32.72548089	n/q	450.00	105000.00
2009	1.36	1.8	75.55555556	n.q		
2010	2.31	3.22	71.73913043	n.q		
2011	3.04	4.2	72.38095238	n.q		
2012	3.81	5.45	69.90825688	8.51		
2013	3.72	5.9	63.05084746	9		
2014	4.4	6.14	71.66123779	9		
2015	5.62	6.67	84.25787106	9		

Year	Deposits (US$ Billions	Liabilities (US$	Min lending rate	Max Lending rate	Av Lending rate	Min Deposit rate (30 day)	Max Deposit rate (30 day)	Av Deposit rate (30 day)	TB rates (91 day)	D/TL*100
2009	1.36	1.8	1.25	16.64	8.94	0.05	2.00	1.03	n.q	75.55556
2010	2.31	3.22	1.28	58.28	29.78	0.05	5.00	2.53	n.q	71.73913
2011	3.04	4.2	5.75	39.67	22.71	0.15	5.00	2.58	n.q	72.38095
2012	3.81	5.45	6.67	32.92	19.79	0.12	11.50	5.81	8.51	69.90826
2013	3.72	5.9	6.00	32.63	19.31	0.15	16.00	8.08	9	63.05085
2014	4.4	6.14	6.00	35.00	20.50	1.63	8.00	4.82	9	71.66124
2015	5.62	6.67	4.71	27.29	16.00	0.33	8.00	4.17	9	84.25787

GDP at current prices=100 in United States Dollars (millions)

Industry / Year	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013
Agriculture, Hunting and Fishing and Forestry	1413	1106	925	1139	1088	1307	1297	586	1207	1668	1292	2083	2048	1893	2286	1943	2078	1613	1365	1221	1176	1041	975	632	1038	1157	1222	1377	1364
Mining and Quarrying	253	295	212	369	276	344	384	388	335	439	174	154	133	163	147	109	283	359	256	244	314	278	279	190	561	802	1006	1064	1187
Manufacturing	1236	1340	1462	1501	1867	1810	2315	2320	1849	1864	1851	1683	1495	1394	1295	1086	1606	1344	1195	1058	1176	1041	975	885	1066	1109	1293	1420	1457
Electricity and water	102	137	191	192	195	221	231	233	255	312	241	287	492	377	353	328	189	269	256	244	235	208	209	190	279	359	436	448	492
Construction	157	186	226	254	219	256	259	267	238	234	193	205	236	244	196	182	94	90	85	81	78	69	70	63	137	182	289	376	399
Finance and Insurance	457	419	551	516	568	547	538	699	669	810	762	677	819	1120	1168	1168	756	896	939	895	627	555	557	443	572	638	704	943	1073
Real Estate	130	137	155	185	203	194	182	207	203	205	222	185	246	224	177	173	283	358	341	326	392	347	348	190	110	126	193	303	341
Distribution, hotels, and Restaurants	1099	1168	1017	1131	1161	1342	1450	1458	1436	1444	1822	1786	1587	1567	1501	1332	1511	1434	1024	845	627	555	627	696	1207	1376	1397	1601	1909
Transport and communication	335	399	431	439	446	486	461	379	581	537	559	513	502	662	677	748	661	627	597	570	549	555	557	632	1080	1137	1320	1334	1374
Public administration	369	378	452	423	430	503	471	397	388	410	453	472	451	407	353	438	378	358	341	407	392	347	348	379	186	292	321	383	402
Education	369	405	537	446	438	521	528	492	493	517	540	667	686	611	451	620	756	717	768	814	784	694	696	696	210	304	518	710	879
Health	102	110	120	123	122	132	134	112	114	137	145	144	164	163	157	201	189	179	171	163	157	139	139	126	87	102	109	119	123
Domestic Services	75	82	92	162	146	141	134	112	97	98	96	103	102	81	59	36	94	179	171	163	157	139	139	126	35	38	41	40	43
Other Services	300	234	240	246	284	318	336	328	343	351	347	380	389	377	363	493	472	448	427	407	392	347	348	316	343	390	453	416	400
Less Fin.Int Services Indirectly Measured	*-157*	-151	-177	-162	-154	-177	-192	-129	-176	-224	-174	-185	-287	-387	*-442*	-566	-756	-627	-341	-244	-157	-139	-139	-63	-22	-36	-50	-67	-77
GDP at factor cost	**6240**	**6246**	**6435**	**6964**	**7288**	**7945**	**8529**	**7848**	**8032**	**8801**	**8524**	**9154**	**9064**	**8895**	**8742**	**8293**	**8596**	**8245**	**7597**	**7195**	**6901**	**6179**	**6127**	**5502**	**6889**	**7977**	**9254**	**10467**	**11365**
Net taxes on production	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	63	113	131	151	171	185
Other taxes on production	0	**0**	**0**	0	**0**	**0**	0	**0**	**0**	**0**	0	0	0	0	0	**0**	**0**	0	**0**	**0**	0	**0**	**0**	**0**	113	131	151	171	185
Other subsidies on production	0	**0**	**0**	0	**0**	**0**	0	**0**	0	0	0	0	0	0	0	**0**	**0**	0	**0**	**0**	0	**0**	0	0	0	0	0	0	0
GDP at basic prices	**6240**	**6246**	**6435**	**6964**	**7288**	**7856**	**8529**	**7848**	**8032**	**8801**	**8524**	**9154**	**9064**	**8895**	**8742**	**8321**	**8596**	**8245**	**7597**	**7195**	**6901**	**6179**	**6127**	**5565**	**7002**	**8108**	**9405**	**10638**	**11550**
Net taxes on products	765	768	799	817	897	972	1095	942	812	925	1069	1111	1217	1282	1092	803	850	717	854	895	941	833	835	885	1155	1349	1551	1834	1940
Taxes on products	765	768	799	817	897	972	1095	942	812	925	1069	1111	1217	1282	1092	803	850	717	854	895	941	833	835	885	1155	1349	1551	1834	1940
Subsidies on products	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
GDP at Market Prices	**6827**	**6871**	**7063**	**7695**	**8116**	**8828**	**9605**	**8625**	**8807**	**9757**	**9642**	**####**	**10242**	**10178**	**9812**	**9123**	**9446**	**8962**	**8450**	**8090**	**7843**	**7012**	**6962**	**6451**	**8157**	**9457**	**10956**	**12472**	**13490**

GDP at Constant price 2009=100 in United States Dollars (millions),

Industry / Year	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013
Agriculture, Hunting and Fishing and Forestry	1170	1073	1027	1065	1100	1237	1260	958	1221	1316	1221	1459	1510	1545	1596	1668	1928	1483	1232	1109	1058	1009	920	626	1038	1113	1129	1217	1186
Mining and Quarrying	312	299	315	311	328	326	333	328	318	364	383	372	318	399	365	351	263	330	231	222	282	269	263	188	561	770	958	1034	1156
Manufacturing	1376	1419	1431	1516	1615	1713	1899	1729	1748	1805	1676	1928	1908	1839	1759	1580	1490	1236	1079	961	1058	1009	920	877	1066	1087	1238	1304	1296
Electricity and water	126	149	185	185	219	209	198	197	176	187	187	186	179	169	192	176	175	247	231	222	212	202	197	188	279	333	354	355	373
Construction	146	170	205	251	226	209	243	254	243	249	187	215	248	259	231	176	88	82	77	74	71	67	66	62	137	156	258	318	331
Finance and Insurance	379	373	383	444	468	242	540	532	611	649	677	695	666	708	683	702	701	824	847	813	564	538	526	438	572	619	670	857	954
Real Estate	126	129	171	178	179	518	189	205	209	222	232	255	248	269	279	263	263	330	308	296	353	336	329	188	110	116	172	274	276
Distribution, hotels, and Restaurants	937	991	972	1058	1085	184	1368	1270	1271	1369	1444	1547	1580	1585	1596	1405	1402	1319	924	767	564	538	592	689	1207	1314	1370	1429	1485
Transport and communication	392	421	404	429	429	1270	477	516	493	542	669	176	805	718	692	615	613	577	539	518	494	538	526	626	1080	1132	1132	1207	1292
Public administration	452	455	479	466	468	460	486	467	452	391	392	362	348	329	317	263	350	330	308	370	353	336	329	376	186	243	291	346	358
Education	406	435	445	459	476	476	504	500	510	516	526	587	626	668	615	615	701	659	693	740	705	673	657	689	210	287	471	650	669
Health	106	115	123	133	133	493	135	131	151	178	169	166	119	130	154	176	175	165	154	148	141	135	131	125	87	101	109	117	118
Domestic Services	133	136	130	141	140	134	135	131	125	133	125	137	139	140	125	88	88	165	154	148	141	135	131	125	35	39	39	38	40
Other Services	233	251	247	281	289	301	351	360	360	373	348	382	417	429	461	439	438	412	385	370	353	336	329	313	343	393	437	391	372
Less Fin.Int Services Indirectly Measured	-153	-156	-178	-155	-164	-167	-180	-123	-167	-223	-160	-176	-278	-379	-433	-615	-701	-577	-308	-222	-141	-135	-131	-63	-22	-29	-41	-45	-50
GDP at factor cost	**6143**	**6260**	**6341**	**6761**	**6992**	**7604**	**7937**	**7455**	**7719**	**8072**	**8076**	**8291**	**8716**	**8805**	**8633**	**7902**	**7974**	**7583**	**6856**	**6536**	**6205**	**5988**	**5784**	**5447**	**6889**	**7673**	**8587**	**9494**	**9854**
Net taxes on production	0	0	0	0	0	0	0	0	0	9	0	0	0	0	0	0	0	0	0	0	0	0	0	63	113	126	141	155	165
Other taxes on production		**0**	**0**	0	**0**	**0**	**0**	0	0	0	0	0	0	**0**	**0**	0	**0**	0	**0**	**0**	0	**0**	**0**	**0**	113	126	141	155	165
Other subsidies on production	0	**0**	**0**	0	**0**	0	0	0	0	0	0	0	0	**0**	**0**	0	**0**	0	**0**	**0**	0	**0**	0	0	0	0	0	0	0
GDP at basic prices	**6143**	**6260**	**6341**	**6761**	**6905**	**7604**	**7937**	**7455**	**7719**	**8072**	**8076**	**8291**	**8716**	**8805**	**8633**	**7902**	**7974**	**7583**	**6856**	**6536**	**6205**	**5988**	**5784**	**5509**	**7002**	**7799**	**8727**	**9649**	**10019**
Net taxes on products	40	597	568	740	898	954	1220	789	739	928	964	1064	1220	1353	1154	878	789	659	770	813	846	807	789	877	1155	1286	1439	1592	1726
Taxes on products	0	0	0	0	0	0	0	0	0	0	0	0	0	0	-	878	789	659	770	813	846	807	789	877	1155	1286	1439	1592	1726
Subsidies on products	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
GDP at Market Prices	**6183**	**6857**	**6909**	**7501**	**7804**	**8558**	**9157**	**8244**	**8458**	**8999**	**9041**	**9355**	**9936**	**10158**	**9787**	**8779**	**8762**	**8242**	**7627**	**7349**	**7051**	**6795**	**6573**	**6386**	**8157**	**9085**	**10167**	**11241**	**11745**

GDP by Expenditure, at current prices US Dollar (millions),

INDUSTRY/YEAR	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013
Final Consumption Expenditure	**5598**	**5456**	**5813**	**5989**	**6734**	**7292**	**7876**	**7745**	**7380**	**7113**	**7444**	**8148**	**8880**	**7990**	**8057**	**7837**	**8808**	**8313**	**10285**	**9562**	**9545**	**6926**	**6568**	**7383**	**10883**	**9817**	**13542**	**14386**	**15929**
Private Consumption	4178	3992	4118	3828	5181	5517	6291	5615	6015	5435	5670	6383	7190	6402	6714	6551	7713	7877	9174	7207	7605	6793	6168	7339	9797	8162	11182	11841	13027
Consumption of Private Non- Profit Bodies	41	48	49	54	49	53	38	43	53	49	58	62	72	61	49	55	45	22	43	34	25	7	77	8	413	544	555	566	789
Government Consumption Expenditure	1379	1415	1653	2114	1512	1713	1546	2087	1312	1629	1726	1704	1618	1527	1304	1241	1051	414	1068	2321	1916	126	324	36	672	1112	1805	1979	2113
Gross Capital Formation	**1215**	**1244**	**1052**	**1438**	**1213**	**1536**	**2046**	**1682**	**1576**	**2830**	**2449**	**2093**	**2028**	**2351**	**1588**	**1305**	**709**	**671**	**-1723**	**311**	**156**	**558**	**515**	**142**	**1232**	**2259**	**2453**	**1687**	**1758**
Gross fixed Capital Formation	976	1038	1137	1199	1132	1607	1979	1932	2078	2088	2382	1816	1700	2097	1421	1131	718	333	284	185	115	677	201	56	960	2048	2064	2079	1753
Changes in Stocks	239	206	-85	238	81	-71	67	-250	-502	742	67	277	328	254	167	173	-9	338	-2007	126	41	-119	314	87	272	211	390	-392	5
Domestic Expenditure	**6814**	**6700**	**6872**	**7434**	**7954**	**8819**	**9922**	**9427**	**8957**	**9943**	**9903**	**####**	**10908**	**10341**	**9655**	**9151**	**9518**	**8984**	**8562**	**9873**	**9701**	**7484**	**7083**	**7526**	**12115**	**12076**	**15995**	**16073**	**17687**
Net Exports of Goods and Services	**14**	**172**	**191**	**254**	**130**	**9**	**-317**	**-802**	**-150**	**-185**	**-260**	**21**	**-666**	**-163**	**147**	**-27**	**-71**	**-22**	**-112**	**-1783**	**-1858**	**-472**	**-121**	**-949**	**-3958**	**-2619**	**-5039**	**-3600**	**-4197**
Exports of Goods and Services	1516	1649	1695	1824	1891	2022	2296	2346	2704	3376	3664	3643	3544	4203	4474	3248	2353	2	569	4129	4093	2515	81	1968	2250	3245	3557	3884	3507
less Imports of Goods and Services	1502	1477	1504	1570	1761	2013	2612	3148	2853	3561	3924	3623	4209	4366	4327	3275	2424	24	680	5912	5951	2987	201	2917	6207	5865	8596	7484	7704
Gross Domestic Product at Market Prices	**6827**	**6871**	**7063**	**7687**	**8083**	**8828**	**9605**	**8625**	**8807**	**9757**	**9642**	**####**	**10242**	**10178**	**9802**	**9123**	**9446**	**8962**	**8450**	**8090**	**7843**	**7012**	**6962**	**6576**	**8157**	**9457**	**10956**	**12472**	**13490**

GDP by Expenditure at constant prices, US Dollar (millions),

INDUSTRY/YEAR	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013
Final Consumption Expenditure	**5159**	**5530**	**5710**	**5882**	**6402**	**7064**	**7508**	**7616**	**7235**	**6402**	**7203**	**7926**	**8998**	**8463**	**8020**	**7265**	**8171**	**7645**	**9283**	**8686**	**8582**	**6712**	**6201**	**7292**	**10883**	**8950**	**11212**	**12970**	**13804**
Private Consumption	3889	4043	4123	3731	4808	5352	5798	5152	5463	4229	-12318	6290	7628	7081	6771	6239	7155	7245	8280	6547	6837	6583	5823	7249	9797	7344	9032	10669	11223
Consumption of Private Non- Profit Bodies	37	44	47	52	52	48	44	66	71	79	864	81	80	78	70	59	42	20	39	31	22	7	72	8	413	527	487	512	702
Government Consumption Expenditure	1233	1443	1539	2099	1542	1664	1667	2398	1701	2095	18656	1554	1290	1304	1178	967	975	381	964	2108	1722	122	306	35	672	1079	1692	1789	1880
Gross Capital Formation	**1016**	**1157**	**1001**	**1373**	**1218**	**1487**	**1979**	**1484**	**1383**	**2407**	**2073**	**1415**	**1610**	**1877**	**1646**	**1470**	**658**	**617**	**-1555**	**283**	**140**	**541**	**486**	**138**	**1232**	**1985**	**2041**	**945**	**1595**
Gross fixed Capital Formation	844	975	1030	1160	1129	1558	1916	1723	1854	1929	1998	1316	1337	1717	1526	1324	666	307	257	168	103	656	190	54	960	1769	1669	1299	1590
Changes in Stocks	173	182	-29	213	89	-71	63	-239	-471	478	75	100	273	160	120	146	-8	311	-1811	115	37	-115	296	84	272	217	372	-354	5
Domestic Expenditure	**6175**	**6687**	**6712**	**7254**	**7620**	**8552**	**9488**	**9101**	**8618**	**8809**	**9276**	**9341**	**10608**	**10340**	**9666**	**8735**	**8829**	**8263**	**7728**	**8969**	**8721**	**7252**	**6687**	**7430**	**12115**	**10935**	**13253**	**13915**	**15399**
Net Exports of Goods and Services	**8**	**170**	**197**	**247**	**184**	**6**	**-330**	**-856**	**-159**	**190**	**-235**	**14**	**-672**	**-182**	**121**	**44**	**-67**	**-21**	**-101**	**-1620**	**-1671**	**-457**	**-114**	**-1044**	**-3958**	**-1850**	**-3086**	**-2674**	**-3654**
Gross Domestic Product at Market Prices	**6183**	**6857**	**6909**	**7501**	**7804**	**8558**	**9157**	**8244**	**8458**	**8999**	**9041**	**9355**	**9936**	**10158**	**9787**	**8779**	**8762**	**8242**	**7627**	**7349**	**7051**	**6795**	**6573**	**6386**	**8157**	**9085**	**10167**	**11241**	**11745**