

**THE RELATIONSHIP BETWEEN CORE CAPITAL AND
FINANCIAL PERFORMANCE OF COMMERCIAL BANKS IN
KENYA**

BY

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DECLARATION

I, the undersigned, declare that this project is my original work and has not been submitted for examination in any educational institutions.

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DEDICATION

This project is dedicated to my wife Dinah Mbithe and my daughter Shantel Ngina for been a source of inspiration to me throughout the research work. I also dedicate it to my parents for instilling value of life and teaching me how to turn my dreams into reality through hard work and commitment. Besides, I dedicate the project to Almighty God for his unending love and grace to me.

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LIST OF ACRONYMS AND ABBREVIATIONS

ANOVA	Analysis of Variance
BCBS	Basel Committee on Bank Supervision
CBK	Central Bank of Kenya
KBA	Kenya Bankers Association
NIM	Net Interest Margin
ROA	Return on Asset
ROE	Return on Equity
ROI	Return on Investment
SPSS	Statistical Package for Social Sciences

ABSTRACT

For decades, capital significance and its adequacy has elucidated serious debate on banking industry performance to both banks and regulators. Though much attention has been given to capital regulations, conflicting views and findings among scholars still exist. Ongore (2013) argued that capital creates buffer against banks' failure and thus banks' should hold more capital to reduce any chances of bankruptcy occurrence. Banking crisis of 2007 clearly showed that capital adequacy must be gradual and consistent. However, banks have expressed reservation on whether raising more core capital provides compensating benefits to them as regulators claims. This study sought to determine the relationship between core capital and financial performance of commercial banks in Kenya. The population for the study was all the 42 commercial banks operating in Kenya. Data was collected from 38 of the 42 banks giving a response rate of 90.48% . The independent variables for the study were core capital as measured by natural logarithm of permanent shareholder equity and retained earnings, bank size as measured by natural logarithm of total assets and liquidity as measured by current ratio. Financial performance was the dependent variable and was measured by Return on Equity (ROE). Secondary data was collected for a period of 8 years (January 2009 to December 2016) on an annual basis. The study employed a descriptive cross-sectional research design and a multiple linear regression model was used to analyze the relationship between the variables. Data collected was analyzed using SPSS version. The results of the study produced R-square value of 0.979 which means that about 97.9 percent of the variation in financial performance of banks in Kenya can be explained by the three selected independent variables while 2.1 percent of the variation in financial performance was associated with other factors not covered in this research. The study also found that the independent variables had a strong correlation with financial performance ($R=0.989$). ANOVA results show that the F statistic was significant at 5% level with a $p=0.000$. Therefore the model was fit to explain the association between the selected variables. The findings further revealed that core capital and bank size produced positive and statistically significant values for this study while liquidity produced negative and statistically insignificant values. This study recommends adequate measures should be put in place by managers of these firms to improve and grow their capital base as it has a significant positive effect on financial performance and this translates to maximization of shareholders' wealth.

CHAPTER ONE

INTRODUCTION

1.1 Background of the Study

Core capital is a key determinant of banks profitability (Bourke, 1989; Berger, 1995; Navapan & Tripe, 2003; White & Morrison, 2001). Core capital enables financial institutions to engage in more lending activities because lending is linked to the banks' level of capital (CBK, 2012). The level of core capital held by banks plays a significant function in the establishing the bank's performance. The higher the core capital, the higher the lending ability and thus the higher the interest earned and, by extension, the profits generated and vice versa. Core capital and profitability of banks' is linearly related (Gudmundsson, Kisinguh & Odongo, 2013). According to Obiero (2002) out of 39 commercial banks which closed operations between 1984 and 2001, 14 of them failed partly due to under capitalization and non- performing loans. Core capital cushions banks from market shocks (Demirguc-Kunt & Huizinga, 1999). Banks with excellent financial performance attracts more investors in securities market, enjoy depositor's confidence and can extend more loans to borrowers and earn high interests.

According to Modigliani and Miller (1958) in a world of perfect financial market, with no bankruptcy costs and taxes, the banks' capital structure and hence capital regulation of commercial banks remains irrelevant. Proponents of static trade-off theory argue that a firm must make a predetermined capital structure which they must abide by. According to the theory, a higher capital requirement may jeopardize banks profitability and as a result cost and benefit trade-off must come into play. Also, the theory postulates that the benefits of debt financing must be fully evaluated against the cost of debt financing if the

firm has to achieve optimal capital structure. Likewise, Jensen and Meckling (1976) in agency cost theory maintain that for optimal capital structure to exist, a firm must try to reduce costs related to conflicts between managers, debt holders and shareholders.

The Central Bank of Kenya is mandated under the banking act (Cap 488) to license and regulate banks in Kenya. By December 2016, banking sector in Kenya comprised of the CBK, as the regulatory entity and 42 commercial banks (CBK, 2016). According to Beck and Fuchs (2010) all commercial banks in Kenya had fully complied with the stipulated minimum ratio of eight percent of capital to risk-weighted assets. In 2012, banks in Kenya were required by CBK to increase core capital to Kshs 1 billion (USD 12 million) from Kshs 250 Million (USD 4 Million) to engage in business activities. The pressure to meet the requirements saw banks take up rights issues to raise their capital base to the stipulated margins (CBK, 2012). However, CBK requirement for banks to increase core capital to 5 billion in 2015 generated intense resistance and heightened lobbying by small and medium banks, to the legislative arm of government, calling for intervention to push forwards the deadline to 2018 (CBK, 2016).

The growth and financial stability of any country or economic bloc depends mainly on the financial soundness of its banking sector (Ikhide, 2000). Thus regulatory entities must work to maintain the stability of financial service providers via close evaluation of their financial conditions by ensuring that failure does not occur under adverse conditions (Kalanidis, 2016). Banks assert that higher capital requirement will endanger their financial performance. However, this is only practical if the costs of funding were to rise significantly as a result of increased holding of core capital. Hence, a higher cost of funding may reduce the profit margins of the banks and interrupt its lending activities.

1.1.1 Core Capital

Core Capital is the minimum capital that banks and other deposit taking institutions are required by regulators to maintain (BCBS, 2010). Core capital, also known as Tier 1 capital is the money paid up to acquire bank securities, retained profits and as well as qualifiable Tier 1 capital securities (BCBS, 2004). Core capital is that part of equity that would be difficult to distribute to the shareholders and serves as permanent capital in the bank (Berger, 1994). In many jurisdictions, financial institutions with satisfactory core capital are assumed to be better placed to extend more credits and receive more deposits from the larger members of the public as lending of loans is pegged on the available core capital (Gudmundsson, Kisinguh, & Odongo, 2013). This is because banks' profit margin is determined by its ability to withstand and absorb any arising market turmoil's (Bichsel & Blum, 2005).

Capital adequacy is the capital held by banks in line with the regulators requirements so that such banks can comfortably absorb any unexpected losses within the industry and as well protect the financial institutions debt holder (Dang, 2011). Capital adequacy ratio measures the percentage of capital to bank's risk weighted credit exposure. Also, Capital adequacy is defined as the amount of capital that financial service providers are mandated to hold by financial regulators (Thumbi, 2014). Banks' capital adequacy measures its financial muscles, expressed generally as a percentage ratio of its capital to existing assets. Thus enables commercial banks to maintain public confidence and as well support the banks' basic business infrastructure.

Capital adequacy indicates that banks owners are willing and ready to make their funds permanently available to support the core business of the bank. Further, it protects

uninsured depositors and keeps the insurance cost of deposit low and as well minimizes chances of banks collapsing. Moreover, capital increase comes at a cost but also provides additional benefits that are fully compensating. Higher level of capitalization will enable banks to weather moderate shocks to their balance sheet and absorb losses that may result from non- performing loans (Ikhide, 2000).

Central Bank of Kenya is mandated to enforce capital requirements for all commercial banks and in line with general international banking practice guided by Basel accord. In 2008, the CBK reviewed the minimum core capital that banks should hold to enhance stability of financial system. According to CBK (2015), all banks were obligated to hold minimum core capital of Kshs 5 billion, core capital of more than eight percent of total risk adjusted assets; total capital of not less than twelve percent of its total risk adjusted assets and core capital of more than eight percent of its total deposit liabilities. In the banking sector, core capital enables a bank to lend more as lending activities is largely linked to the bank's level of capital (CBK, 2012). The higher the level of lending, the more interest income the bank can earn and thus the higher level of profits.

1.1.2 Financial Performance

Financial performance measures how efficiency firms use their assets to generate revenue. The financial performance is a function of both external and internal elements influencing a firm. However, the notable difference in performance of various financial institutions is a clear indicator of how management activities influence their success factor. Some of the internal factors influencing banks profitability includes; management decisions, regulatory objectives like level of core capital and liquidity, size of the bank, and expenditure control while the external factors includes macro-economic

characteristics, industry trends and business concentration (Athanasoglou, Delis & Staikouras, 2006). Thus the financial strength and weakness of banks is notable on financial statements (Irungu, 2012). Banks with excellent financial performance attracts more investors and depositors and can engage in large credit extension.

The banking crisis of 2007 resulted into many financial challenges which affected the strength and financial health of the banking sector. The crisis proved that appropriate supervisory practices and capital regulations were important to financial health of banking sector. Besides, capital inadequacy was found to affects banks' profitability and to some extreme circumstances may contribute to insolvency of financial institutions (Kiarie, 2011). The financial performance of banks' is measured by how well a firm uses its assets to generate revenue. Consequently, it's very crucial to understand the key performance metrics which are used by firms to measure performance. They include; return on asset, net interest margin and return on equity (ROE).

1.1.3 Core Capital and Financial Performance of Banks

For decades, capital significance and its adequacy has elucidated serious debate on banking industry performance to both banks and regulators. Though much attention has been given to capital regulations, conflicting views and findings among scholars still exist. Ongore (2013) argued that capital creates buffer against banks' failure and thus banks' should hold more capital to reduce any chances of bankruptcy occurrence. Banking crisis of 2007 clearly showed that capital adequacy must be gradual and consistency (Chumo, 2011). However, banks have express reservation on whether raising more core capital provides compensating benefits to them as regulators claims.

The expected relationship between profitability of banks and its core capital is linearly related (Oyier, 2015). Demirguc-Kunt and Huizinga (1999) studied eighty countries from 1988 to 1995 and found that capital and returns had statistically significant positive relationship. Also, Goddard, J., Molyneux, P., and Wilson, J. (2004) established that capital and profitability of banks is positively related. However, a study done on endogenous capital and profitability of Asian banking sector found out that no any systematic relationship exists between capital and profitability of banks (Phong, 2006). Other studies carried out indicate that financial service providers with excess of core capital relative to set capital exhibited a strongly negative relationship between the two variables both in non-stressed and stressed circumstances (Osborne, 2012). Given that the holding of additional core capital among banks' will precipitates to financial systems resilience and stability, some banks' are of the opinion that higher capital adequacy ratio will lower their expected profit margins.

1.1.4 Commercial Banks in Kenya

Commercial banks are financial institutions mandated by the regulator to collect money from businesses, individuals and extend credits to the public (Kamau & Were, 2013). Also, commercial bank is defined as financial institution that receives deposits from clients via savings deposits (Gudmundsson, Kisinguh, & Odongo, 2013). In Kenya, CBK is the only institution mandated by Banking Act (cap 488) to license, supervise and regulate all financial institutions (CBK, 2014).

By December 2016, the banking sector in Kenya constituted the CBK and 42 commercial banks, 8 foreign banks representative, 77 foreign exchange bureaus, 13 micro finance institution, 3 Credit reference bureaus, and 17 money remittance providers. According to

CBK reports, the banking industry capital and reserve stood at Kshs 592.42 billion and all had already achieved the required margin of Kshs 1 billion and more than eight percent of core capital to risk adjusted assets (CBK, 2016).

1.2 Research Problem

Core capital provides a platform upon which financial service providers extend loans to customers in order to earn interest income. The level of core capital held by commercial banks influences significantly the bank's profitability. The lower the core capital, the lower the lending capability and thus the lower the interest earned and, by extension, the profits generated. However, Gudmundsson, Kisinguh and Odongo (2013) asserted that high capital requirement increases competition on loans, deposits and equity investment among the service providers. Generally, the profitability of banks' is linearly related to its capital adequacy. Thus a decrease in core capital level, also leads to a decrease in the banks' profitability whereas a rise in core capital level, leads to a rise in the banks' profit margin.

In 2016, commercial banks in Kenya had met the stipulated core capital margin of at least Kshs 1 billion and almost all were in advanced stage of fulfilling the required Kshs 5 billion capital base as stipulated by Basel III prudential guidelines. The banks' core capital stood way above the required risk adjusted assets margin of 8% (CBK, 2016). Majority of the banks in Kenya were in full or partial compliance with the minimum capital requirement provided to create a buffer capital in line with the Basel III prudential guidelines for stress testing as the conservation buffer (Kamau & Were, 2013). In 2016, the banking industry capital and reserves rose by 9.58 percent from Kshs 540 billion in December 2015 to Kshs 592.42 billion in December 2016 while profit increased from

Kshs 134 billion to Kshs 147.4 billion respectively (CBK, 2016). Such capital increase is attributed to the additional injections of capital by banks trying to achieve the set core capital and total capital regulatory requirements which by extension influence the banks' revenue generated.

Over the years, studies done in the local and international banking arena have shown conflicting findings regarding the impact of core capital on banks profitability. Kiambi (2009) in a study using banks' core capital and profitability variables found out that core capital is linearly related to profitability but weakly. Mwega (2009) found no clear relationship between the two variables; i.e. banks core capital and profitability. A research by Berger (1995) found the relationship between the core capital level and earnings of U.S banks to be positive. However, Fraisse and Thesmar (2015) found that higher capital requirements imposed on banks had significant effects on banks' lending capacity and influenced profits negatively. Phong (2006) established that there existed no systematic relationship between banks' endogenous capital and profitability. Xuezhui and Dickson (2012) in their study on the Tanzanian banking sector concluded that core capital had a negative effect on banks' profitability.

An empirical review of previous studies has shown conflicting views and lack of consensus on how banks' core capital relates to its financial performance. Whereas some studies have concluded the relationship between the two variables; core capital and performance of banks' to be negative, others found the relationship to be positive. While the aforesaid research conclusion provides a worth insights on core capital, it's evident that there is no consensus on how core capital relates to banks performance and to what extent. The gap poised by the previously done research work, makes it prudent to conduct

further research to bring more light on how core capital relate to banks' financial performance.

The study looked at the performance metrics of banks in Kenya and in particular return on asset for the period 2009 to 2016. The research question of this study was; what is the relationship between core capital and financial performance of commercial banks in Kenya? Since in 2015, there were general outcries by banks' in Kenya particularly tier II and III banks' and lobbied CBK to push forward the deadline for additional core capital as per Basel III prudential guidelines. The study therefore helps in establishing the association of the two variables.

1.3 Objective of the Study

The objective of this study is to determine the relationship between core capital and financial performance of commercial banks in Kenya.

1.4 Value of the Study

The study is of great essence to policy makers, investors, scholars among other key banking industry players. The findings will help CBK in policy formulation and implementation of capital requirement and other monetary policies concerning financial institution in Kenya. The regulator will obtain valuable information that will help make capital adequacy policies and legal framework that will guide banks in implementation Basel III guidelines. Moreover, the government will use the findings of this research to facilitate policy making or in coming up with strong banking framework that will enables banks to execute their core functions and steer the country's economy forward.

The banking sector will be better placed to establish how core capital relates to profitability of commercial banks in their quest to attain wealth maximization objectives. The current and potential investors in banking industry will benefit from the findings of the study by gaining more insights on core capital and banks performance relationship which will help them in aligning their objectives with capital structure decisions. The findings will contribute to the existing body of knowledge, indicate further areas of research and form empirical basis for future studies by researchers. The research findings will enable scholars to form a solid basis for supporting and critiquing existing theories.

CHAPTER TWO

LITERATURE REVIEW

2.1 Introduction

Relevant studies done previously are reviewed in this chapter. This chapter is organized into capital structure theories, empirical review, concept framework and literature review summary. The chapter summarizes information from other researchers that have similar studies.

2.2 Theoretical Framework

This section of the study shows the relevant theories that depict capital structure and its financial implications. However, only four theories are factored in the study.

2.2.1 Modigliani-Miller Theory

According to Modigliani and Miller (1958) capital structure theorem constitutes the foundation upon which modern thinking of capital structure is derived. According to this theory, in a perfect world of financial market, with no bankruptcy costs and taxes, the banks' capital structure and hence capital regulation of commercial banks remains irrelevant. The theorem is relevant to capital decision approaches. It states that, it does not matter how banks' capital is raised by management; either through internal funding, selling of debts or issuing stock.

Modigliani and Miller (1958) summarized the broadly known theory of capital structure irrelevance by stating that firms' financial relevance does not affect the firms' value. The proponents argues that the bank's value is unaffected by how that bank is financed under efficient market capital process, without taxes, bankruptcy costs, agency costs and

asymmetric information. The theory posits that investors will increase their debt in order to enjoy maximum tax shield at more attractive costs of debt. However, M&M theory is criticized for its assumptions which depict existence of perfect financial market.

2.2.2 Statics Trade- Off Theory

Under this theory, firm's makes deliberate predetermined capital structure decision and consequentially sticks by it over a long time (Jensen & Meckling, 1976). A firm is seen as precipitating for a target debt-to-value ratio decision which it abides by progressively. These targets debt-to-value ratios are products of trade-off between costs and benefits. The theory is relevant in capital decision as it strikes a cost and profitability trade-off. Thus, since higher capital requirement may jeopardize banks profitability, a cost benefit trade-off must come into play.

The trade-off theory maintains that the benefits of debt financing must be fully evaluated against the cost of debt financing if the firm aims to achieve optimal capital structure. The theory advocates for substitution of debt to equity, or equity for debt until the firms value is fully maximized while balancing interest tax shield value and costs associated with debt financing (Jensen & Meckling, 1976).

2.2.3 Market Timing Theory

Market timing theory postulates that firm's tend to raise equity when the value of market equity is relatively high compared to past market and book values (Kwast & Rose, 1982). The firms' shares will be released when the market prices are high and repurchased when the market prices are low. This theory holds that management mostly prefers to issues

debt securities to equity and vice versa from time to time depending on cost associated with prior issuance debt and equity securities decisions.

According to Kwast and Rose (1982) market timing theory holds that firm's issuance of new stocks is largely when their market prices are perceived to be overvalued, and repurchase activities is depicted when their market prices are believed to be undervalued. In a nutshell, is relevant as it helps management in issuance of securities is guided by the facts that the prevailing costs. However, this issuance decision has long term implication on capital structure as it is guided by the outcome of past decisions.

2.2.4 The Agency Cost Theory.

The proponents of this theory are Jensen and Meckling (1976). The theory holds the belief that for optimal capital structure to exists, a firm must endeavour to minimize costs associated with conflicts between various parties particularly shareholders, managers and debt holders. Agency theory helps firm's managers in making informed financing decisions considering costs associated with conflicts that may exist between shareholders and debt holders. The proponents suggest that the disciplinary role of debt manager influences the firm's capital structure (Hart & Moore, 1995).

An increase in core capital makes managers reluctant and as a result affects banks performance. According to the theory, higher capital requirement may yield moral hazards of shareholder and debt holders. Agency costs is relevant on the firm's capital structure and in particularly in capital decision making. According to the theory, managers must strive to resolve the costs or problems associated with unaligned goals in an agency relationship (Jensen & Meckling, 1976).

2.3 Determinants of a Firm's Financial Performance

Financial performance measures efficiency and effectiveness with which a firm utilizes its asset to generate revenue. The term performance refers to how efficient or effective a company uses its resources to create revenue that accomplishes its main objectives. Several factors have been highlighted as key determinants of financial performance and includes;

2.3.1 Core Capital

Core Capital is the minimum capital that banks and deposit taking institutions are mandated by the Central bank to hold (BCBS, 2010). Core Capital enables banks to promote resilience and stability of financial systems around the world. Capital inadequacy affects banks' profitability and to some extreme circumstances paralyzes smooth operations of financial institutions. It cushions banks from any potential losses emanating from either internal or external forces which influence the profitability of the firm in either short or long term. Core capital therefore determines the bank's profitability.

The level of capital held by financial institutions facilitates deposit growth and subsequently the lending activities and by extension financial performance. Capital adequacy determines the bank's ability to withstand financial crisis and unexpected market related losses. Core capital enhances the efficiency and stability of financial system by reducing risk of becoming insolvent (Ongore & Kusa, 2013). Therefore, core capital decisions have effect on financial performance of banks (Holmstrom & Tirole, 1997).

2.3.2 Size of the Firm

The size of any firm has a greater bearing on its financial performance. The size of the firm and its financial performance are positively linked. Large firms with strong financial muscles and systems fully functioning are known to operate efficiently with minimal costs constraints and as a result enjoy improved performance. Large firms can expand its network to other regions thus reducing its exposure to business risks which are specific to certain environment (Kiambi, 2009)

Also, a large firm with monopoly power dictates the prevailing market prices and in turn small firms are forced to match their prices with such large firms for survival (Oyier, 2016). Besides, large firms have the capacity and strength to carry out a diversified business portfolio, and in turn reduce risks and generate profits. According to Boyd and Puckle (1993) study found out that an inverse association exists between size and profitability of banks.

2.3.3 Liquidity

Liquidity in banking system refers to the banks' ability to have readily available cash that help accomplish certain tasks when they fall due, without incurring any unexpected losses (BCBS, 2008). Liquidity challenges affect banks' earnings and in some extreme case may lead to insolvency or bankruptcies. Liquidity problems may force banks or other firms to borrow money at the prevailing high interest rates in order to execute their core mandate and thus limits expected earnings.

The financial crisis of 2007 led to liquidity review among banks' as they were required to keep additional liquid assets to absorb any unexpected losses or funding challenges (BCBS, 2010). Lack of adequate cash to meet firms' short time financial obligation may compel the firm to sell off investment securities at below market price just to settle their claims. A firm with high number of liquid assets offers good returns as adequate liquidity is positively related to banks performance (Kalanidis, 2016).

2.4 Empirical Studies

Hutchinson and Cox (2006) conducted study on the relationship between banks' capital and earnings in United States of America. The scope of the study involved both regulated and unregulated financial institutions around the country. The study used secondary data comprising of unregulated financial institutions for 1983 to 1989 while for regulated institution was for the period 1996 to 2002. The study concluded that there exist for periods, a positive relationship between financial leverage and return on equity and an inverse association between return on assets and financial leverage.

Phong (2006) studied endogenous capital and profitability of banks in Australia. The study used secondary data collected from the Wharton research data services, bank regulatory database. A sample of 2500 out of 37962 largest banks' according to total asset was selected for 1996 to 2005. The collected data was analyzed using regression techniques. The study found out that no systematic relationship exists between capital and profitability of banks. Also, the study further established that coefficients of single equation models of bank profitability on capital were biased.

Onaolapo and Olufemi (2012) conducted a study on capital adequacy and profitability effects of Nigerian banking sector. Secondary data from five banks was gathered from Central Bank of Nigeria publications for 1999 to 2008. SPSS model was used in the analysis of data on efficiency ratios and return on capital employed on capital adequacy ratio. The study found out that return on asset (ROA), return on capital employed (ROCE) and efficiency ratios (ER) did not reflect much on capital adequacy ratio (CAR) of the Nigeria banking industry.

Salim and Yadav (2012) examined the relationship between capital structure and firm performance in Malaysia. The study used a sample of 237 Malaysian listed companies on the Malaysian Stock Exchange from 1995 to 2011. The study used ROE, ROA and Tobin's functions to measures capital structure. The study found out that there was positive and statistically significant relationship between short term debt to total assets and ROE. However, a negative relationship between the ratio of long term debt and ROE was established. The study concluded that an increase in the long term debt position is associated with a decrease in profitability.

Xuezhui and Dickson (2012) conducted study on effects of core capital on profitability of commercial banks in Tanzania. The study used regression and correlation analysis model. The study found that core capital had a negative impact on a bank's profitability while liquidity and total assets positively affected profitability while capital structure negatively affected profitability.

Opuku, Adu and Anarfi (2013) conducted a study on impact of capital structure and profitability of listed banks on the Ghana Stock Exchange (GSE). The study applied

panel data and considered all nine banks listed on the GSE from 2005 to 2012. Data collected was analyzed using descriptive statistics, correlation and regression analysis. The predictor variables used in the research were return on equity, return on asset, economic value added and Tobin's q ratio. The findings indicated that GSE profitability decreases significantly with increase in total leverage. Also, the study found that a negative association exists between profitability and capital structure.

Hailu (2015) conducted a study to establish impact of capital structure on profitability of financial institutions in Ethiopia. The study used quantitative methodology and panel data for audited financial reports of nine from 2002 to 2013. The data collected were analyzed using statistical package 'EVIEW 8.1'. The results of the research found out that capital structure had negative impact on the profitability whereas deposits had statistically positive effect on banks profitability.

Kiambi (2009) conducted study to establish the relationship between core capital and bank's profitability in Kenya. Cross sectional survey method was used on data collected on 44 banks from CBK annual reports for 2001 to 2010. The collected data was examined using descriptive statistics, regression and correlation analysis. The study established that core capital is not a major determinant of profitability across the three tiers of the banks which were supported by weak values of correlation coefficient and correlation of determination.

Mathuva (2009) studied relationship between cost income ratio, capital adequacy and the performance of banks in Kenya. The study used data from Kenyan Capital Markets Authority Library, the Kenyan Banking Survey and web sites of the licensed commercial

banks operating in Kenya. The population of study was a selected sample of 41 out of 44 licensed commercial banks in Kenya operating from 1998 to 2007. The collected data was analyzed and interpreted using statistical tools such as averages, trend analysis, percentages, regression, correlation using Minitab statistical software. The study found that profitability is positively related to bank core ratio and the tier one risk based capital ratio.

Kiragu (2010) conducted study on relationship between capital adequacy and profitability of commercial banks in Kenya. The research used regression model to analyze the two variables. Secondary data was obtained from all the licensed banks in Kenya; operational from 2004 to 2009 was used. The measures used for profitability were return on equity and return on asset while capital adequacy was capital asset ratio (CAR). The control variables used were credit risk, operational efficiency, size, activity mix and market power. The study found that there was insignificant relationship between return on equity and capital. Also the study established that a negative relationship exist between return on asset and capital.

Nyagaka (2013) conducted a study on effect of core capital on profitability of commercial banks in Kenya. The study used secondary data collected from CBK Supervision Annual Reports for all licensed 43 commercial banks in Kenya. The data collected was analyzed using simple linear regression, Microsoft excel software and presented using scatter plot graphs and frequency tables. The study found out that 20% of the bank's profitability is influenced by the core capital.

Ongore (2013) studied the effects of asset quality, management efficiency and capital adequacy on performance of banks in Kenya. The research applied regression model and found that the three variables significantly affected banks' performance. Also, the study found that management efficiency and capital adequacy were positively related to banks performance while asset quality related negatively to banks performance.

Oyier (2015) conducted a study to determine proportion of core capital that influences the performance of banks in Kenya. An exploratory study of 33 out of 43 banks in Kenya was used. The research used secondary data obtained from CBK reports for 2011 to 2015 and the data was analyzed using multiple regression and correlation model. The study established that a strong positive linear relationship exist between return on asset and core capital and a weak positive association between liquidity, solvency margin and return on asset.

2.5 Conceptual Framework

The expected relationship between profitability of banks and its core capital is linearly related (Kiragu, 2010). Core capital, liquidity and the size of the bank were used as independent variable while financial performance as the dependent variable. Core capital was measured by fixed shareholders equity and retained earnings, liquidity was measured using current assets divided by current liabilities and size of the banks was measured using total assets of bank while return on equity was used to measure financial performance of commercial banks.

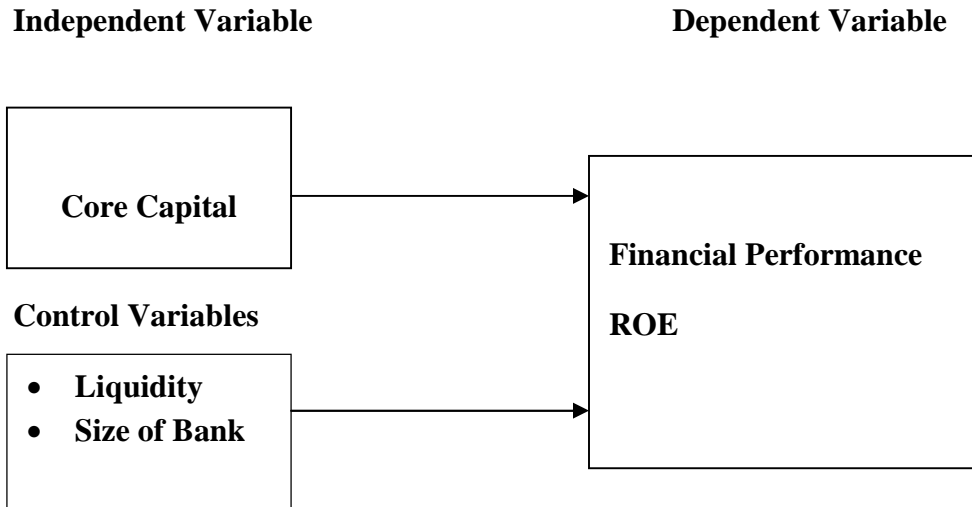


Figure 2.1: The Relationship between Core Capital and Financial Performance

2.6 Summary of the Literature Review

Commercial banks play a key intermediary role in the modern world of globalization. The success of such banks depends largely on the surrounding environmental forces (Kalanidis, 2016). Previous studies indicate a conflicting view on how core capital and profitability are related. Kiambi (2009) found out that core capital is not a major determinant of banks' profitability across the three tiers. The results were supported by weak values of correlation coefficient and correlation of determination of the banks. A study on endogenous capital and profitability in Australian banks found there were no systematic relationships between the two variables (Phong, 2006).

Also, a study carried out in the Tanzanian banking sector revealed that core capital had a negative impact on banks' profitability (Xuezhui & Dickson, 2012). From the review of these previous studies, it is evident that there exists no solid consensus on how core capital relates to the financial performance of banks. The study sought to address this gap by investigating the relationship between core capital and financial performance of

commercial banks in Kenya. This study employed secondary data gathered from the CBK, Supervision department from 2009 to 2016.

CHAPTER THREE

RESEARCH METHODOLOGY

3.1 Introduction

This chapter describes overall research methodology that was employed to investigate research objective. The section covers research design, population, data collection methods, diagnostic test and data analysis techniques.

3.2 Research Design

Research design is the arrangement of conditions for gathering and analysis of data in a manner that combines the relationship with the purpose of the research (Mugenda & Mugenda, 2003). It highlights the overall plan for carrying out a study and helps the researcher to answer the relevant research questions and objective. Mwega (2014) argues that research design ensures that the evidence obtained by the researcher can answer the relevant research questions.

The study used descriptive cross-sectional survey to determine the relationship between core capital and financial performance of commercial banks in Kenya. The method was preferred since it permits collecting of data concerning the current status of a respondent in a natural setting. The method helps in providing answers to the questions of who, what, when, and how the phenomena influence the variables. In addition to that, the method allows researchers to compare various variables under investigation at the same time (Kamau & Were, 2013).

3.3 Population

Population is a complete set of elements that possess common observable characteristics (Mugenda & Mugenda, 2003). A particular population may exhibit unique characteristics from other populations. However, target population is the population to which the researcher wants to draw inferences to make a general conclusion of the study. The target population was the 42 commercial banks operating in Kenya as at 31st December 2016 (Appendix 1). This target population provided the researcher with data analyzed to generalize the study findings.

3.4 Data Collection

According to Cooper (2008) data collection is defined as factual information used as a basis for reasoning, calculation or discussion. The study used secondary data, extracted from the CBK annual reports for the year 2009 to 2016. The CBK annual publications report contains summarized data on core capital, total assets, liquidity, earnings, net interest margin, and profitability of commercial banks in Kenya (Kiragu, 2010).

3.5 Diagnostic Tests

The study used linearity, normality, multicollinearity and auto-correlation as diagnostic test of the relationship between core capital and financial performance of commercial banks in Kenya.

3.5.1 Linearity test

Linearity test shows how two variables x and y are mathematically related using equation $y = bx + c$ where c is a constant number. This linearity test is acquired through scatter plot tests or F-statistics in ANOVA. The test was performed to establish the linear reportable

range for an analyte and is accessed by checking the performance of recovery throughout the stated range of testing system (Kamau & Were, 2013).

3.5.2 Normality Test

This test is used to establish whether a particular set of data exhibits normal distribution characteristics. It computes normal distribution of random variables of an underlying set of data. Also, normality tests whether the residual of the response variable is normally distributed around the mean. This study used Shapiro-walk test and Kolmogorov-Smirnov test to conduct the normality test (Mugenda & Mugenda, 2003).

3.5.3 Autocorrelation and Multicollinearity

Auto correlation is the measurement of the similarity between a certain time series and a lagged value of the same time series over successive time intervals. It was tested using Durbin-Watson statistic (Khan, 2008). Multicollinearity is said to occur when there is a nearly exact or exact linear relation among two or more of the independent variables. This was tested by the determinant of the correlation matrices, which varies from zero to one. Orthogonal independent variable is an indication that the determinant is one while it is zero if there is a complete linear dependence between variables and as it approaches to zero then the multicollinearity becomes more intense (Burns & Burns, 2008).

3.6 Data Analysis

Data analysis is the systematic way of finding patterns in the data collected and formulating ideas that account for those patterns (Straits & Singletons, 1993). Data obtained from the population of interest was analyzed using SPSS computer software version 21. Besides, a number of diagnostic tests were applied to check on the validity of

the model used. A regression analysis and correlation analysis of core capital and financial performance were conducted to establish the link between the variables. The findings were presented using tables. The study used core capital, bank size and liquidity as independent variable and financial performance as the dependent variable. The following regression model was used;

$$Y = \alpha + \beta_1 X_1 + \beta_2 X_2 + \beta_3 X_3 + \epsilon$$

Where;

Y = Financial performance as measured by natural logarithm of ROE.

α = y intercept of regression equation and measures the value of ROE when all other factors are zero.

$\beta_1, \beta_2, \beta_3$ = the regression coefficient of change induced to ROE

X_1 = Core capital of banks as measured by natural logarithm of permanent shareholder equity and retained earnings.

X_2 = Size of the banks as measured by natural logarithm of bank total assets.

X_3 = Liquidity as measured by current assets divided by current liabilities.

ϵ = error of measurement

3.6.1 Test of Significance

Correlation Coefficient (R) was used to establish the direction and the strength of dependent variable i.e. financial performance and independent variable i.e. core capital, size and liquidity relationship. Coefficient of determination (R square) measured the proportion of variation between independent and dependent variables. The significance of the relationship between core capital and financial performance and each of the independent variables was tested using F-test.

CHAPTER FOUR

DATA ANALYSIS, FINDINGS AND INTERPRETATION

4.1 Introduction

This chapter focused on the analysis of data gathered from the CBK and individual banks' websites to determine the relationship between core capital and financial performance of banks in Kenya. Using descriptive statistics, correlation analysis and regression analysis, the results of the study were presented in table forms as shown in the following sections.

4.2 Response Rate

This study targeted all the 42 banks licensed and with operations in Kenya as at 31st December 2016. Data was obtained from 38 banks representing a response rate of 90.48%. According to Mugenda and Mugenda (2003) and also Kothari (2004), a response rate of above 50% is normally sufficient for a descriptive study. From the respondents, the researcher was able to obtain secondary data on Return on Equity (ROE), core capital, firm size and liquidity.

4.3 Diagnostic Tests

The researcher carried out diagnostic tests on the collected data. The null hypothesis for the test was that the secondary data was not normal. If the p-value recorded was more than 0.05, the researcher would reject it. The results of the test are as shown in Table 4.3. The research assumed a 95 percent confidence interval or 5 percent significance level (both leading to identical conclusions) for the data used. These values helped to verify the truth or the falsity of the data. Thus, the closer to 100 percent the confidence interval (and

thus, the closer to 0 percent the significance level), the higher the accuracy of the data used and analyzed is assumed to be.

Table 4.1: Normality Test

Financial performance	Kolmogorov-Smirnov ^a			Shapiro-Wilk		
	Statistic	Df	Sig.	Statistic	Df	Sig.
Core Capital	.154	304	.300	.903	304	.822
Firm Size	.170	304	.300	.866	304	.723
Liquidity	.163	304	.300	.877	304	.784
a. Lilliefors Significance Correction						

Source: Research Findings (2017)

Both Kolmogorov-Smirnova and Shapiro-Wilk tests recorded o-values greater than 0.05 which implies that the research data used was normally distributed and therefore the null hypothesis was rejected. The data was therefore appropriate for use to conduct parametric tests such as Pearson's correlation, regression analysis and analysis of variance.

4.4 Descriptive Analysis

Descriptive statistics gives a presentation of the mean, maximum and minimum values of variables applied together with their standard deviations in this study. Table 4.2 below indicates the descriptive statistics for the variables applied in the study. An analysis of all the variables was obtained using SPSS software for the period of eight years (2009 to 2016). Return on equity which was the dependent variable in this study had a mean of 10170.81 and standard deviation of 14274.632. Core capital had a mean of 8697.42 and

standard deviation of 12025.626. Bank size resulted to a mean of 64811.25 and standard deviation of 86622.279. Liquidity recorded a mean of 42.58359 with a standard deviation of 14.996514.

Table 4.2: Descriptive Statistics

	N	Minimum	Maximum	Mean	Std. Deviation
ROE	304	527	80990	10170.81	14274.632
Core capital	304	512	72611	8697.42	12025.626
Bank Size	304	1216	504778	64811.25	86622.279
Liquidity	304	1.700	89.300	42.58359	14.996514
Valid N (listwise)	304				

Source: Research Findings (2017)

4.5 Correlation Analysis

Correlation analysis is a technique employed to determine if there exists a relationship between two variables which lies between (-) strong negative correlation and (+) perfect positive correlation. Pearson correlation was employed to analyze the level of association between the financial performance of commercial banks in Kenya and the independent variables for this study (core capital, bank size and liquidity).

The study found out that there was a positive and statistically significant correlation ($r = .988$, $p = .000$) between core capital and financial performance. The study also found out that a positive and significant correlation exists between bank size and financial

performance of banks in Kenya as evidenced by ($r = .975$, $p = .000$). Liquidity was found to have a weak negative and insignificant association with financial performance as evidenced by ($r = -.066$, $p = .252$). Analysis of correlation among the independent variables also revealed that core capital and bank size has a strong association which can cause multicollinearity as evidenced by ($r = .974$, $p = .000$). The rule of thumb is that anytime the correlation coefficient exceeds 0.7, then Multicollinearity is said to occur.

Table 4.3: Correlation Analysis

Correlations					
		ROE	Core capital	Bank Size	Liquidity
ROE	Pearson Correlation	1	.988**	.975**	-.066
	Sig. (2-tailed)		.000	.000	.252
Core capital	Pearson Correlation	.988**	1	.974**	-.051
	Sig. (2-tailed)	.000		.000	.372
Bank Size	Pearson Correlation	.975**	.974**	1	-.086
	Sig. (2-tailed)	.000	.000		.133
Liquidity	Pearson Correlation	-.066	-.051	-.086	1
	Sig. (2-tailed)	.252	.372	.133	
**. Correlation is significant at the 0.01 level (2-tailed).					

Source: Research Findings (2017).

4.6 Regression Analysis

The financial performance of the banks was regressed against three predictor variables; core capital, bank size and liquidity. The significance level undertaken for the regression analysis was 5%. The study obtained the model summary statistics as indicated in table 4.4 below.

Table 4.4: Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.989 ^a	.979	.979	2088.097	1.511

a. Predictors: (Constant), Liquidity, Core capital, Bank Size

b. Dependent Variable: ROE

Source: Research Findings (2017)

R squared, being the coefficient of determination indicates deviations in response variable that is as a result of changes in the predictor variables. From the outcome in table 4.4 above, the value of R square was 0.979, a discovery that 97.9 percent of the deviations in financial performance of banks in Kenya are caused by changes in core capital, firm size and liquidity of the banks. Other variables not included in the model justify for 2.1 percent of the variations in financial performance of commercial banks. Also, the results revealed that there exists a strong relationship among the selected independent variables and the financial performance as shown by the correlation coefficient (R) equal to 0.989. A durbin-watson statistic of 1.511 indicated that the variable residuals were not serially correlated since the value was more than 1.5.

Table 4.5: Analysis of Variance

Model		Sum of Squares	Df	Mean Square	F	Sig.
1	Regression	60432788359	3	20144262786	4620.08	.000 ^b
	Residual	1308044417	300	4360148.058		
	Total	61740832776	303			

a. Dependent Variable: ROE

b. Predictors: (Constant), Liquidity, Core capital, Bank Size

Source: Research findings (2017)

The ANOVA table tested whether the overall regression model is a good fit for the data and whether independent variables significantly predict dependent variable. The significance value is 0.000 which is less than $p=0.05$. This implies that this model was significant in foretelling how core capital, bank size and liquidity affect financial performance of banks in Kenya. The F value derived indicates that the data used was linear and therefore can be used for regression analysis.

The researcher used t-test to determine the significance of each individual variable used in this study as a predictor of financial performance of banks in Kenya. The p-value under sig. column was used as an indicator of the significance of the association between the dependent and the independent variables. At 95 per cent confidence level, a p-value of less than 0.05 was interpreted as a measure of statistical significance. As such, a p-value above 0.05 shows a statistically insignificant association between the dependent and independent variables. The results are as indicated in table 4.6.

Table 4.6: Model Coefficients

Model	Unstandardized Coefficients		Standardized Coefficients	T	Sig.
	B	Std. Error	Beta		
1 (Constant)	60.782	384.183		.158	.874
Core capital	.879	.044	.740	19.846	.000
Bank Size	.042	.006	.254	6.783	.000
Liquidity	-5.679	8.114	-.006	-.700	.485

a. Dependent Variable: ROE

Source: Research Findings (2017)

From above results, it is evident that core capital and firm size produced positive and statistically significant values for this study (high t-values (19.846 and 6.783), $p < 0.05$). Liquidity produced a negative and statistically insignificant values for this study ($t = -.700$, $p = .485$). The following regression equation was estimated:

$$Y = 60.782 + 0.879X_1 + 0.042X_2 - 5.679X_3$$

Where,

Y = Financial performance

X_1 = Core capital

X_2 = Bank size

X_3 = Liquidity

On the estimated regression model above, the constant = 60.782 shows that if selected independent variables (core capital, firm size and liquidity) were rated zero, the financial performance of commercial banks would be 60.782. A unit increase in core capital would lead to increase in financial performance by 0.879. A unit increase in firm size would lead to an increase in financial performance by 0.042 while a unit increase in liquidity would lead to a decrease in financial performance by -5.679.

4.7 Discussion of Research Findings

The study sought to determine the relationship between core capital and financial performance of commercial banks in Kenya. Independent variables for this study were core capital as measured by natural logarithm of permanent shareholder equity and retained earnings, firm size as measured by natural logarithm of total assets and liquidity as measured by current assets divided by current liabilities. Financial performance of banks as given by return on equity was the dependent variable. The impact of each of the independent variable on the dependent variable was analyzed in terms of strength and direction.

The Pearson correlation coefficients between the variables revealed that a strong positive and statistically significant correlation exists between core capital and financial performance of commercial banks. The study also showed that a strong positive correlation exists between bank size and financial performance of banks while relationship between liquidity and financial performance was found to be weak, negative and insignificant.

The model summary revealed that the independent variables: core capital, firm size and liquidity explains 97.9% of changes in the dependent variable as indicated by the value of R^2 which implies that there are other factors not included in this model that account for 2.1% of changes in financial performance of commercial banks. The model is fit at 95% level of confidence since the F-value is 4620.08. This confirms that the multiple regression model is statistically significant, in that it is an appropriate prediction model for explaining how the selected independent variables affects financial performance of banks in Kenya.

The results of this research are in line with Nyagaka (2013) who studied the effect of core capital on profitability of banks in Kenya and discovered that core capital and profitability had a positive linear relationship. The study used exploratory study method and data collected for all licensed 43 banks in Kenya was analyzed using simple linear regression and Microsoft excel software and was presented using scatter plot graphs and frequency tables. The study found that 20% of the profitability is influenced by the core capital.

The findings of this study are in contrast with Kiragu (2010) who in establishing the relationship between capital adequacy of banks in Kenya established that there was insignificant association between return on equity and capital. Also the study established that there was a negative association between return on asset and capital. The metrics used for profitability were ROE and ROA while capital adequacy was capital asset ratio (CAR). The control variables used were credit risk, operational efficiency, size, activity mix and market power.

CHAPTER FIVE

SUMMARY, CONCLUSION AND RECOMMENDATIONS

5.1 Introduction

This chapter summarizes findings of the previous chapter, conclusion and limitations encountered during this study. This chapter also elucidates the policy recommendations that policy makers can implement to achieve the expected financial performance of commercial banks in Kenya. Lastly the chapter presents suggestions for further research which can be useful by future researchers.

5.2 Summary of Findings

The study sought to investigate the relationship between core capital and financial performance of banks in Kenya. The independent variables for the research were core capital, bank size and liquidity. The study applied a descriptive cross-sectional research design. Non-primary data was obtained from CBK and individual banks' websites and was analyzed using SPSS software version 21. The study used annual data for 38 commercial banks in Kenya covering a period of eight years from January 2009 to December 2016.

From the findings of correlation analysis, a strong positive and statistically significant correlation exists between core capital and financial performance of commercial banks in Kenya. The study also showed that strong positive association between banks size and financial performance of banks exists while the relationship between liquidity and financial performance was found to be weak, negative and insignificant.

The co-efficient of determination R-square shows that the independent variables: core capital, bank size and liquidity explains 97.9% of variations in the dependent variable which implies that there are other factors not included in this model that account for 2.1% of changes in financial performance of banks in Kenya. The model is fit at 95% level of confidence since the F-value is 4620.08. This confirms that the overall regression model is statistically significant and can explain the selected variables affecting the financial performance of banks in Kenya with certainty.

The regression results shows that when all the independent variables involved in the study have zero value, financial performance of banks in Kenya would be 60.782. It is also noted that a unit increase in core capital would result to increase in financial performance by 0.879. A unit increase in firm size would result into an increase in financial performance by 0.042 while a unit increase in liquidity would lead to a decline in financial performance by -5.679.

5.3 Conclusion

The study concludes that financial performance of commercial banks in Kenya is significantly affected by core capital and size of the banks. The study found that core capital had positive and significant impact on financial performance of banks in Kenya. The study therefore concludes that an increase in core capital results to an increase in financial performance of banks in Kenya. Also, the study found that bank size had a positive and significant effect on bank's financial performance and therefore it is concluded that higher levels of assets leads to an increase in financial performance of commercial banks. Liquidity was found to have a negative and statistically insignificant

relationship with financial performance and this means an increase in liquidity causes a decline in financial performance though not to a significant extent.

This study concludes that independent variables selected for this study core capital, firm size and liquidity influence to a large extent financial performance of commercial banks in Kenya. Therefore, it is sufficient to conclude that these variables significantly influence financial performance as shown by p-value in ANOVA summary. The fact that the three independent variables explain 97.9% of changes in financial performance of banks imply that the variables not included in the model explain only 2.1% of changes in financial performance of commercial banks in Kenya.

This finding concurs with Nyagaka (2013) who studied the effect of core capital on profitability of banks in Kenya and discovered that core capital and profitability had a positive linear relationship. The study used exploratory study method and data collected for all licensed 43 banks was analyzed using Microsoft excel software and simple regression and was presented using scatter plot graphs and frequency tables. The study found that 20% of the banks' profitability is influenced by core capital.

5.4 Recommendations

The study established that there was a positive influence of core capital on financial performance of commercial banks in Kenya. The research project advises adequate measures should be put in place by managers of these banks to improve and grow their capital base as it influences the banks' financial performance in a significant manner and this translates to maximization of shareholders' wealth.

The study found out that a positive association exists between financial performance and size of a bank. This study recommends that banks' management and directors should aim at increasing their asset base by coming up with measures and policies aimed at enlarging the banks' assets as this will eventually contribute positively on financial performance of the bank. From the results of this study, big banks in terms of asset base are expected to perform better than small banks and therefore banks should strive to grow their asset base.

Liquidity was also found to have a significant negative influence on financial performance of banks in Kenya. This research recommends that a comprehensive assessment of a bank's immediate liquidity position should be undertaken because some levels of liquidity have been found to be detrimental to financial performance though not to a significant extent.

5.5 Limitations of the Study

The scope of this research was for eight years 2009-2016. It has not been determined if the results would hold for a longer study period. Furthermore it is uncertain whether similar findings would result beyond 2016. A longer study period is more reliable as it will take into account major happenings not accounted for in this study.

One of the short comings of the study is the quality of the data. It is difficult to conclude from this research whether the findings present the true facts about the situation. The data that has been used is only assumed to be accurate as the study used non-primary data, which had already been gathered and was in the public domain, unlike the primary data which is first-hand information. The study also considered selected determinants and not

all the factors affecting financial performance of commercial banks mainly due to limitation of data availability. The metrics used may keep on changing from one year to another subject to prevailing condition.

For data analysis purposes, researcher applied a multiple linear regression model. Due to the shortcomings involved when using regression models such as erroneous and misleading results when the variable values change, the researcher cannot be able to generalize the findings with certainty. If more and more data is added to the functional regression model, the hypothesized relationship between two or more variables may not hold.

5.6 Suggestions for Further Research

This study emphasized on core capital and financial performance of commercial banks in Kenya and relied on secondary data. A research study where data collection relies on primary data i.e. in depth questionnaires and interviews covering all the 42 commercial banks in Kenya is recommended so as to compliment this research.

The study was not exhaustive of the independent variables affecting financial performance of banks in Kenya and therefore recommends that further studies be conducted to incorporate other variables like management efficiency, growth opportunities, corporate governance, industry practices, age of the firm, political stability and other macro-economic variables. This will enable policy makers to know what tool to use in improving financial performance.

The study concentrated on the last eight years since it was the most recent data available. Future studies may use a range of many years e.g. from 2000 to date and this can be helpful to confirm or disapprove the findings of this study. The study limited itself by focusing on commercial banks in Kenya. The recommendations of this study are that further studies be conducted on other non-financial firms operating in Kenya. Finally, due to the shortcomings of regression models, other models such as the Vector Error Correction Model (VECM) can be adopted to determine the various relationships between the variables.

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APPENDIX 1: LIST OF BANKS

Licensed Commercial Banks in Kenya as at 31st December 2016

1. African Banking Corporation Ltd
2. Bank of Africa Kenya Ltd
3. Bank of Baroda Kenya Ltd
4. Bank of India Ltd
5. Barclays Bank of Kenya
6. CFC Stanbic Bank Ltd
7. Charter house Bank Ltd (Under Statutory management)*
8. Chase Bank Kenya Ltd
9. Citibank N.A Kenya
10. Commercial Bank of Africa Ltd
11. Consolidated Bank of Kenya Ltd
12. Cooperative Bank of Kenya Ltd
13. Credit Bank Ltd
14. Development Bank of Kenya Ltd
15. Diamond Trust Bank of Kenya Ltd
16. Ecobank Kenya Ltd
17. Equity Bank Ltd
18. Family Bank Ltd
19. Fidelity Commercial Bank Ltd
20. First Community Bank Ltd
21. Giro Commercial Bank Ltd
22. Guaranty Trust Bank Kenya Ltd
23. Guardian Bank Ltd
24. Gulf African Bank Ltd
25. Habib Bank A.G Zurich
26. Habib Bank Ltd
27. HFC ltd
28. I & M Bank Ltd
29. Jamii Bora Bank Ltd
30. Kenya Commercial Bank Ltd
31. Middle East Bank Kenya Ltd
32. M-Oriental commercial Bank Ltd
33. National Bank of Kenya Ltd
34. NIC Bank Ltd
35. Paramount Bank Ltd
36. Prime Bank Ltd
37. Sidian Bank Ltd
38. Spire Bank Ltd

39. Standard Chartered Bank Ltd
40. Transnational Bank Ltd
41. UBA Kenya Bank Ltd
42. Victoria Commercial Bank Ltd