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Effect of Firm Competitiveness on Financial Performance of Commercial Banks in Kenya

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Abstract

Banks have operated in a relatively stable environment for a long time. However deregulation of financial systems across the globe in mid 1990s caused fierce competition among banks. In today's dynamic business environment, firm competitiveness has become very important for firm's survival and growth and to enhance their financial performance. This study sought to establish the effect of firm competitiveness on financial performance of commercial banks in Kenya. The target population comprised the 39 commercial banks licensed in Kenya for a period of 10 years from 2011-2020. Secondary data was obtained from published financial statements from commercial banks, annual banking supervision reports from CBK and Banking Survey Reports and analyzed using Eviews statistical software. The study findings infer that market share had a negative statistically significant effect on financial performance of commercial banks in Kenya while bank assets did not have a significant effect on financial performance of commercial banks in Kenya. It was also established that loan portfolio had a significant positive effect on financial performance of commercial banks while level of deposits was dropped because of multicollinearity problem with loan portfolio. Premised on the findings, it is recommended that banks should avoid investing in expanding their market share and increasing their asset base as it may not improve profitability of commercial banks. It also recommended that banks should consider increasing their loan portfolios as it boosts financial performance of commercial banks.

Keywords: *Firm Competitiveness, Financial Performance, Commercial Banks in Kenya*

Introduction

Banks have operated in a relatively stable environment for a long time (Reynolds, 2005). With deregulation of the financial systems across the globe in mid 1990s and early 2000, there was fierce competition among banks and other non-bank financial institutions. Following the financial crisis of the 2007-2009, stringent regulatory measures, such as higher capital requirements have become more prominent as a move towards having stable and more competitive banking sector (Financial Service Authority, 2009). The environment has been characterized by continuous change, hyper competition, changing demographics and

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customer needs that demand adoption of counter strategies in order to perform better and survive (Quinn & Connolly, 2017; Kiiyuru, 2014).

In today's dynamic business environment, firm competitiveness has become very important for a firm's survival and growth. Fierce competition has forced firms to improve their competitiveness in order to gain competitive advantage. Massive transformations witnessed in financial institutions are geared towards gaining competitive advantage as well as remaining relevant in the market (Wonglimpiyarat, 2014). Since most financial institutions offer similar products and services, they continually search for a competitive advantage that will attract new customers and retain the existing ones so as to enhance their financial performance (Porter, 2008).

Singh *et al.*, 2006, among others, defines competitiveness as the capability of company to design, create and realize a product better or more effective compared to competitors concerning price and non-price factors. Longman's Advanced American Dictionary (2000) defines competitiveness as "the ability of a company or a product to compete with others and the desire to be more successful than other people". Therefore competitiveness of a firm can be taken as its ability to do better than comparable firms in sales, market shares, or profitability (Lall, 2001). Profitability, productivity and market share are all indicators of competitiveness at the firm level. Ramasamy (1995) perceives competitiveness as the ability of a firm to segment market share, profit and growth in value in order to remain competitive in the long run. According to Gorynia (2001), the basic measure of competitive position of a firm is its market share and financial condition. It shows that competitiveness is the ultimate concern for long term performance. Kumar and Chadee (2002) maintain that profitability and market share are the main indicators of competitiveness.

Jacobson (1999) defines financial performance as measuring the results of a firm's policies and operations in monetary terms which are reflected in the firm's return on investment, return on assets and value added. According to Stoner (2003), financial performance refers to ability of a firm to operate efficiently, profitably, survive, grow and react to the environmental opportunities and threats. In agreement with this, Sollenberg and Anderson (1995) asserts that, financial performance is measured by how efficient the enterprise uses its resources in achieving its objectives. It uses measurement ratios such as asset utilization/efficiency ratios, deposit mobilization, loan performance, liquidity ratio, financial efficiency

ratios, profitability ratios, solvency ratios and coverage ratios to evaluate the bank's financial performance (Bekana, 2011).

Several studies relating to competitiveness and financial performance have been carried out in different industries by several researchers. For instance, Zanotti, Reyes and Fernandez (2018) studied the relationship between competitiveness, operational and financial performance of European brewing industries and established that competitiveness is significantly related to financial performance. Similarly, Waswa, Mukras and Oima (2018) who examined the effect of competitiveness on financial performance of sugar industries in Kenya concluded that firms with small production costs per tonne seem to perform better compared to those with high production costs. Moreover, Akims (2022) who studied bank competitiveness in Kenya established that those banks with high market concentration are characterized by high profitability. Mustry, Khushk, Memon and Saeed (2011) opined that an important indicator that influences financial performance of the industry is its competitiveness. Therefore, the study interrogated the extent to which individual banks are competitive in terms of market share, bank assets, loan portfolio, level of deposits and how they affect financial performance of individual commercial banks.

Commercial Banks in Kenya

Banking sector in Kenya has continued to grow in assets, deposits, profitability and products offering. Players in this sector have experienced increased competition over the last few years resulting from increased innovations among the players and new entrants into the market (Price Water House Coopers (PWC), 2008). Fayman, Chen and Camp (2019), postulates that in the past decade, there have been numerous changes in the banking industry due to several factors such as adoption of the modern technologies for instance information communication technology (ICT) and also growth in infrastructure. The banking sector in Kenya is regulated by three major Acts, namely: The companies Act, Central Bank of Kenya Act and the Banking Act (CBK, 2013). In total, the industry has 39 licensed commercial banks (CBK, 2020). All these commercial banks vary from one another in terms of market share, level of deposits, total assets and loan portfolios, which are all important aspects in this study.

According to banking survey report of 2019, Kenya Commercial Bank maintained its lead of level deposits with Ksh 438 billion followed closely by Equity bank with Ksh 301 billion, Co-operative Bank with Kshs 294 billion while Standard Chartered Bank and Diamond Trust Bank with Ksh 231 billion and Kshs 196

billion respectively. In terms of assets, Kenya Commercial Bank led with assets worth Kshs 560 billion followed closely by Equity with Kshs 402 billion, Co-operative Bank with Kshs 393 billion, Standard Chartered and Absa Bank with Kshs 293 billion and Kshs 291 billion respectively. In 2019, Kenya Commercial Bank led in market share with 18.13% followed closely by Co-operative Bank and Equity Bank with 12.37% and 9.67% respectively. According to banking survey report of 2018, in loans and advances to customers, Kenya Commercial Bank emerged top managing to lend out Ksh 383 billion followed closely by Co-operative Bank with Kshs 251 billion, Equity Bank and Absa Bank with Ksh 206 billion and Kshs 165 billion respectively. This clearly indicates how volatile and competitive the banking industry in Kenya is.

The CBK has grouped banks in Kenya into three tiers using weighted composite index. This helps distinguish different banks according to their market share, asset base and level of deposits. The five commercial banks in Tier 1 include Co-operative Bank, Kenya Commercial Bank, Equity Bank, Absa Bank and Standard Chartered. Tier 2 commercial banks comprises I&M Holdings, Diamond Trust Bank, NCBA Bank, CFC Stanbic and Housing Finance. A bank with a weighted composite index of 5% and above is classified as a large bank. A medium bank has a weighted composite index of between 1% and 5 % while a small bank has a weighted composite index of less than 1% (CBK, 2019). These indicators become the critical measure of the market strength (competitiveness) of commercial banks. This clearly illustrates that some banks are more competitive than others.

Theoretical Framework

This study will be informed by two theories; Resource Based View theory and Agency theory. As proposed by Wernerfelt (1984) this theory asserts that for a company to achieve sustained success in the market place and maintain a competitive edge over its rivals, it has to be underpinned by an appropriate set of superior resources and capabilities (Strickland et al., 2012). In particular, Resource-Based View theory promotes the significance of resources and capabilities the firm has control over and/or can access as a source of sustainable competitiveness (Barney, 1991; Kor and Mahoney, 2004). Further and most important is that these resources and capabilities should be highly valuable, rare and difficult to imitate by other competing firms (Barney, 1991). The RBV theory assumes that resources and capabilities are in a position to generate competitive advantage when they are heterogeneously distributed across firms and the differences are sustained over time (Barney, 1991; Barney, Wright and Ketchen, 2001). Thus RBV

encourages banks to focus on exploiting those resources that offer the most sustainable competitive position.

On the other hand, Agency theory authored by Stephen Ross (1973) revolves around the issue of the agency problem and its solutions (Jensen & Meckling, 1976). As claimed by Ross (1973) an agency relation arises between two or more parties, when one of them, the agent, acts on behalf of, or as representative of the other party, called the principal, in the particular field of decision-making. The most important goal and responsibility of management is maximizing shareholders' wealth (Ogden *et al.*, 2003; Neveu, 1989). Managers are expected to target the ultimate goal to maximize shareholders' wealth so as to make their firms competitive. However, Jensen and Meckling (1976) asserts that the interests of the company's managers and its shareholders may not be perfectly aligned as managers tend to maximize their own utility rather than the value of the firm. This results to conflict between managers and shareholders, on account of separation of ownership and control as managers tend to maximize their own utility rather than the value of the firm.

Data and Methodology

Financial performance was measured using ROA. (Sapto *et al.*, 2015; Magoro, 2010; Osuagwu, 2014; Okun, 2012; Ozgur and Gorus, 2016) have also used ROA to measure firm performance. Competitiveness which is assessed in terms of market share, bank assets, loan portfolio and level of deposits was measured on different fronts. Market share was measured in terms of number of customer deposit accounts. On the other hand, bank assets was measured using natural logarithm of bank non-lending assets. Loan portfolio was indicated by gross loan portfolio in shillings while level of deposits will be measured by absolute deposit in shillings.

Time series secondary data was collected for all the 39 commercial banks operating in Kenya for the period of ten years from 2011 to 2020. However, five banks were dropped due to incomplete data hence 34 observations. Secondary data was obtained from banking supervision department of Central Bank of Kenya, Banking Survey Reports and published financial statements of commercial banks. Table 1 present summary statistics of the data while table 2 present correlations among variables.

Table 1: Descriptive Statistics of Variables

	Minimum	Maximum	Mean	Std. Deviation
Financial Performance (ROA %)	-24.59	10.4	1.812	3.636
Market Share (Accounts ‘000)	1	11,280	654.80	1826.437
Level of Deposits (Sh. ‘M)	393	591,067	67,566.25	97,893.508
Banks Assets (Sh. ‘M)	893	399,170	39,663.108	55,560.824
Loan Portfolio (Sh. M)	39	544,837	52,891.817	81,977.2584
Valid N (list wise) = 340				
Source: Research data (2022)				

As shown in table 1, ROA had a mean of 1.812%. This implies that commercial banks in Kenya performed relatively well in the period between 2011 and 2020. The standard deviation for financial performance was 3.636 implying that there was no big variation in financial performance among the commercial banks under study.

Table 2: Correlation Coefficients

	[1]	[2]	[3]	[4]	[5]
[1] Financial Performance	1				
[2] Market Share	.262**	1			
[3] Level of Deposits	.368**	.739**	1		
[4] Bank Assets	.342**	.669**	.886**	1	
[5] Loan Portfolio	.353**	.714**	.972**	.790**	1

** . Correlation is significant at the 0.01 level (2-tailed); n=340

Source: Research data (2022)

As shown in table 2, market share had a significant positive correlation (0.262) with financial performance. This implies that investing in activities to improve market share will eventually translate to improved financial performance of commercial banks. Similarly, level of deposits is significantly and positively correlated (0.368) to financial performance. This implies that as banks grow their deposit base, they boost their profitability in the long run. Bank asset also have a positive significant correlation of 0.342 with financial performance. This implies that commercial banks with large asset base tend to perform well financially. Loan portfolio was also found to have a significant positive correlation with a coefficient of

0.353 with financial performance. Lending is a major business activity in banking since it generates the largest revenue, therefore loan portfolio is treated as the main source of the asset of a bank.

A high positive correlation with a coefficient of 0.886 between level of deposits and bank assets was also noted. This is because deposits form part of bank assets hence an increase in bank assets and loans advanced would indicate an increase in ROA. Further, the results also indicate that there is a high significant positive correlation of 0.972 between level of deposits and loan portfolio. This indicates that the more deposits the banks have, the more loans they can advance since banks are expected to lend 94.75% of their deposits (Central Bank of Kenya, 2017). To address the collinearity problem between Level of deposits and Loan Portfolio and Level of deposits and Bank assets, Level of deposits was dropped as recommended by Frost (2022) after which collinearity diagnostics were run. The decision to drop level of deposits was guided by the connectedness of the variable with loan portfolio since banks are expected to lend 94.75% of the domestic and foreign currency deposit liabilities (Central Bank of Kenya, 2017). This implies that a change in deposits would be matched by an almost similar change in loan portfolio. Table 3 presents tests for normality of variables.

Table 3: Tests for Normality

Tests of Normality			
	Jarque-Bera		Conclusion
	Statistic	Probability	
Financial Performance	2859.443	0.000000	Variable not normally distributed
Market Share	24.84047	0.000004	Variable not normally distributed
Bank Assets	21.77887	0.000019	Variable not normally distributed
Loan Portfolio	2.628569	0.268667	Variable normally distributed
Regression Error	3343.885	0.000000	Error term not normally distributed
N=340			

Source: Research data (2022)

The probability of the Jarque-Bera statistic for all the variables except loan portfolio were less than the critical value of 0.05 indicating that apart from Loan Portfolio, all the other variables were not normally distributed. According to Brys *et al.* 2004), the JB test tests the hypothesis that the distribution of error terms is not significantly different from normal [$H_0: E(\epsilon) \sim N(\mu=0, \text{var.} = \delta^2)$]. From the results, the significance level for the JB statistic is less than the critical p-value of 0.05 implying that the random error

term was different from a normally distributed variable (Tanweer, 2011). Consequently, following Mulwa (2018; 2020), a Generalized Linear model (GLM) was used because of its ability to allow for response variables that have non-normal distributions (Czado, 2004). A GLM model works by allowing for an arbitrary link function of the response variable to vary linearly with the predicted values (Garrido and Zhou, 2006: 2009). Consequently, the study model was modified as follows: $\eta_{i,t} = \beta_0 + \beta_1 X_{1i,t} + \beta_2 X_{2i,t} + \beta_3 X_{3i,t} + \varepsilon_{i,t}$

Where $\eta_{i,t}$ is a linear predictor determining the expected value of response variable Financial Performance, $X_{1i,t}$, $X_{2i,t}$ and $X_{3i,t}$ are Market Share, Bank Assets and Loan Portfolio for bank i at time t and $\varepsilon_{i,t}$ is the random error term.

Results and Discussions

The objective of this paper was to investigate the effect of firm competitiveness on financial performance of commercial banks in Kenya. To achieve this objective, firm competitiveness (market share, bank assets and loan portfolio) was regressed against financial performance using a GLM model at 5% significance level and the results are presented in table 4. The results show that there was a significant regression relationship between the predictors and financial performance as indicated by the significant LR statistic (LR statistic = 107.8292, Probability = 0.0000 < 0.05).

Table 4: Regression Results

Dependent Variable: Financial Performance				
Method: Generalized Linear Model (Quadratic Hill Climbing)				
Date: 02/06/22 Time: 22:57				
Sample: 2011 2020; Included observations: 340				
Family: Normal; Link: Identity				
Variable	Coefficient	Std. Error	z-Statistic	Prob.
Market Share	-0.825797	0.361130	-2.286702	0.0222
Bank Assets	0.000000	0.000000	0.670249	0.5027
Loan Portfolio	3.483280	0.771035	4.517665	0.0000
Constant	-11.89828	2.862731	-4.156268	0.0000
Mean dependent variable	1.812853	S.D. dependent variable		3.636512
Sum squared residual	3393.854	Log likelihood		-873.5829
LR statistic	107.8292	Prob.(LR statistic)		0.000000

Source: Research data (2022)

Influence of Market Share on Financial Performance

To determine the influence of market share on financial performance, the study was guided by hypothesis that; market share has no significant effect on financial performance of commercial banks. Based on regression results in table 4, the hypothesis was rejected ($\beta=-0.825797$, $p\text{-value}=0.0222$). This implies that investing in activities to increase market share may not necessarily improve profitability of commercial banks in Kenya. These results agree with Agency theory while it disagrees with Resource Based View theory. In reference to agency theory, as banks increase their market shares, their financial performance decreases because managers tend to maximize their own utility rather than the value of the firm since interests of shareholders and managers may not be perfectly aligned. On the other hand, RBV theory asserts that for companies to remain competitive, they must have superior resources. However this may not be the case since further undertakings by banks to increase market share may not boost profitability as banks will invest huge resources hence fall in returns. These findings agree with studies by Osuagwu (2014) who explored the determinants of bank profitability and established that market power had a significant negative effect on profitability. However, the findings contradict the findings by amongst others Genchev (2012), Sapto *et.al*, (2015), Mirzaei *et.al*, (2013), Etale *et.al*, (2016), Kulu, Darko and Kubi, (2021), Sayedi (2014) and Nirasha (2016) who established that high market share boosts profitability of commercial banks.

Influence of Bank Assets on Financial Performance

To determine the influence of bank assets on financial performance, the study was guided by the hypothesis that; bank assets have no significant effect on financial performance of commercial banks in Kenya. Based on regression results, the study failed to reject the hypothesis ($\beta=0.00000$, $p\text{-value}=0.5027$). This implies that bank assets do not significantly affect financial performance of commercial banks. The findings resonates with views fronted in Agency theory and its negative impacts on financial performance of banks which asserts that managers tend to pursue their own goals rather than that of the owners and as such managers may increase the firm size in order to boost their ambitious empire building. However, the findings contradicts the propositions of RBV theory which posits that firms with significant resources and capabilities can exploit them as source of sustainable competitiveness (Barney, 1991; Kor & Mahoney, 2004). The findings agree with studies by Tarawneh (2006), Nireesh and Velnapy (2014) and Tharu and Shrestha (2019) who concluded that bank size has no profound impact on profitability of commercial banks. However studies by Rotich, Lishenga and Mwangi (2018), Mahdi *et.al* (2014), Oladele and Adebayo

(2013), Abebe (2019) and Maja and Josipa (2012) who concluded that size of a bank positively relates with profitability of a commercial bank.

Influence of Loan Portfolio on Financial Performance

To determine the influence of loan portfolio on financial performance, the study was guided by hypothesis that; loan portfolio has no significant effect on financial performance of commercial banks in Kenya. Based on regression results, the hypothesis was rejected ($\beta=3.483280$, $p\text{-value}=0.0000$). This means that an increase in loan portfolio increases financial performance of commercial banks since lending is a major business activity in the banking sector since it generates the largest revenue to the banks. The findings resonates with the tenets of RBV theory which opines that for a company to achieve sustained success in the industry and maintain a competitive edge over it rivals, it has to be underpinned by an appropriate set of superior resources and capabilities (Strickland *et.al*, 2012). Therefore, banks with the largest loan portfolios are likely to be profitable than the ones with the smallest loan portfolios. These findings agree with prior studies by Murira (2010), Wijayanti and Mardiana (2020), Cronje and Atahau (2015), Thiongo, Matata and Simiyu (2016), Onchomba (2019), Onuonga (2014), Hoang (2020) and Rotich (2020) who concluded that loan portfolio positively influences financial performance of commercial banks since lending is a major business activity in banking as it generates the largest revenue.

Conclusions

This paper investigated the effect of firm competitiveness (market share, bank assets, loan portfolio) on financial performance of commercial banks in Kenya. Firstly, market share is found to negatively affect financial performance of commercial banks in Kenya. This means that as market share increases, commercial banks do not perform well financially. It is therefore important that banks should not concentrate so much in investing in activities to grow their market shares as it may not translate to profitability nor enhance their competitiveness. Secondly, bank assets is found not to significantly affect financial performance of commercial banks in Kenya. Consequently, commercial banks in Kenya should not consider increasing their asset base as it may not enhance their financial performance due inefficient management in utilizing the assets which may arise leading to a decline in profitability of the bank. Thirdly, the study finds that loan portfolio has a significant positive effect on financial performance of commercial banks in Kenya. Therefore, it is concluded that for commercial banks to remain profitable, they must adopt the best techniques in managing their loan portfolio since the lifeblood of a lending institution is its loan

portfolio and the success of the institution depends on how well that portfolio is managed since a well-managed loan portfolio leads to improved financial performance.

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