

Performance of Commercial Banks in Rwanda.

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Abstract- The purpose of this study was to assess the effect of regulations of central bank on performance of commercial banks in Rwanda using Rwanda commercial banks as the case study. A descriptive design was used and the target population was eleven licensed commercial banks in Rwanda. A census was conducted to obtain secondary data from commercial banks as well as review of information from central bank's annual audited reports for the period 2010 to 2015. The data obtained was processed and analyzed using STATA programming to get progressively point by point results. The study found that capital adequacy regulation affects performance of commercial banks in Rwanda positively and this influence was found to be significant. The study concluded that capital adequacy positively and significantly influences financial performance suggesting that an increase in capital adequacy regulations within a bank will result in financial improvements in the bank. The study recommended that banks should comply entirely with the stipulated regulations since this will ensure a stable banking sector which plays a major role in the economy.

Index Terms- Capital Adequacy Regulation, Financial Performance and Commercial Banks

I. INTRODUCTION

Bank regulations are defined as a form of government or state commands subjecting banking sectors to certain requirements, restrictions and guidelines as formulated by their regulators, such as the Central Bank, in order to ensure market transparency between banking industry and individuals, or between banking institutions and other corporations with which they conduct business. Mentoring has been used as a useful personal development tool globally, Mentoring has been practiced in different cultures for hundreds of years. But it is only recently that mentoring has been (re) discovered by the private sector, and now by the civil society sector, as a mechanism for leadership development(Berger&Bouwman, 2014)

Globally, in USA, Capital adequacy has played a historical role in the bank regulatory processes. However, until recently, this role was largely internalized, with the regulations being utilized (in disparate ways by the different regulators) to assist in evaluating the financial soundness of banking institutions for examination purposes. But, the external significance of capital adequacy as a more formal concern of prudential supervision was becoming apparent. The first visibility came with the efforts of the Federal Financial Institutions Examination Council to have the

federal bank regulators formulate a common definition of bank capital(Alkadamani, 2015).

Capital adequacy measures and bank financial performances in Nigeria. The study tends to determine whether it could be said with consistency that getting enough capital can impact positively and significantly on the financial performance of banks in Nigeria. The method used was the augmented Dickson fuller unit root test. The Johnson co integration test was also employed which revealed the existence of the significant long run relationship between bank performance variables and capital adequacy indicators in the Nigerian banking industry. The granger causality tests also revealed that there was a unidirectional causality flowing from the ratio of shareholders' funds to bank assets, causality also trickled from the ratio of shareholder's fund to return on assets in the Nigerian banks. The theory used was the earning theory of capitalization, Dynamic theory of profits and wages theory of profit. The study sampled 19 commercial banks whose stocks were quoted on the floor of the Nigerian stock exchange. The study period was 2008-2012. The findings from this study indicates that capital adequacy strongly have an impact on the financial performances of Banks in Nigeria(Baltagi, 2015).

Regionally, in Uganda every financial organization shall have in place an internal capital adequacy assessment process as set out in a guideline issued by the Central Bank that is proportional to their nature, scale, complexity and business strategy, Every financial organization shall have document the internal capital adequacy assessment process which must be approved by the board of directors and updated at least once a year or more frequently as may be required to take account of changes in the business, strategy, nature, scale or complexity of activities or operational environment; and submit the internal capital adequacy assessment process to the Central Bank within four months of its financial year end. Commercial banks are one of the major money related mediators on the budgetary market, filling in as delegates between two gatherings in a monetary exchange, for example, moving assets from abundance capital gatherings (loan specialists) to less capital gatherings (borrowers). In money related market, there is an uncommon instance of assets streaming straightforwardly from the supplier to end clients without going through the monetary middle person, so incredible banks guidelines must be set up for the insurance of the two gatherings (Cornett et al, 2009).

The National Bank of Rwanda will be Rwanda's principle business bank controller and is focused on playing out its capacities liberated from intercession by people; gathering of people or legislative issues. Throughout the years, banking industry in Rwanda has become quickly because of development

in administrations, for example, portable and organization banking, where clients can execute at whatever point they need to utilize their cell phones without lining up long lines in banking corridors. As indicated by Central bank yearly report, banking industry in Rwanda enlisted execution improvement in the money related year finished June 2018, where the advantages, advances and advances expanded. In Rwanda, Commercial banks are approved and oversaw by national bank which regulates them to ensure they follow rules in their undertakings. Every business is depended upon to agree to those rules as compressed by Central Bank of Rwanda round into; requested to develop liquidity, dissolvability and real budgetary systems working (NBR,2015).

Objectives

The study aimed at assessing the effect of central bank regulations on financial performance of commercial banks in Rwanda with the following objectives;

- a) To examine the effect of capital adequacy regulation on financial performance of commercial banks in Rwanda.
- b) To determine the effect of liquidity Management regulation on financial performance of commercial banks in Rwanda.
- c) To find out the effect of credit risk management regulation on financial performance of commercial banks in Rwanda.

II. LITERATURE REVIEW

The central bank regulations on banking sector points out as bank approaches the minimum capital requirements they tend to raise capital to avoid costs which may be incurred in case of breach of set regulatory capital. According to Calem and Rob (2015) Observed that U-formed connection exists between capital and hazard taking for banks. Thus, undercapitalized banks will in general face more challenges. Moreover, sufficiently promoted banks put resources into hazardous portfolio envisioning of higher benefits which can be utilized for proceeded with progress of their capital position (Rime, 2011).

The theories underlying the study are the Buffer Theory of Capital Adequacy which points out as bank approaches the minimum capital requirements they tend to raise capital to avoid costs which may be incurred in case of breach of set regulatory capital. According to Calem and Rob (2015) breaching the regulatory provisions will lead to penalties. Banks prefer to maintain capital in excess of prudential limits to reduce the chances of falling below legal capital requirements. The theory is significant to the investigation since it underpins holding of overabundance capital. Overabundance capital prompts decrease of costs which could bring about punishments if there should arise an occurrence of break of administrative necessity and furthermore bolster activities final product being improved budgetary execution.

Liquidity inclination Theory alludes basically to a craving to have money in your pockets. Liquidity is any type of advantage that can undoubtedly be changed over into money, and cash is viewed as the most fluid resource. Banks, especially business ones, handle for the most part fluid resources that financial specialists can request whenever. Loan fee is a pay for neglecting to hold fluid resources for a predetermined period which is

dictated by request and cash supply. As indicated by Keynes, interest for cash is sorted for three reasons; initial, an exchange thought process which is a longing to have money for fundamental exchanges, for example, transportation, wages or installment of crude materials. This theory is applicable to the study in that it emphasizes need for holding optimally levels of money for the precautionary motives.

Bridges, Gregory, and Spaltro (2014) conducted a study on capital adequacy on bank lending, a Bank of England case study. They found that any adjustment in capital sufficiency brings about a change in both capital and loaning that is, an expansion in capital necessity prompts an expansion in the capital proportions of banks and an abatement in credit development. The assessment moreover found that, after change in capital essential development advancement for the most part returns to run of the mill inside 3 years. He contemplated that, banks response to change in capital adequacy shifts depending business cycle, bank size and heading of the modification in capital essential. The above dispute was supported by various makers, for instance, (Francis et al, 2009) who inquired about on bank rule, capital and credit supply: assessing the impact of prudential standards in United Kingdom. They suggested that, the higher the capital essential the lower the bank's optimal credit improvement and the a different way, sway depends upon the level of wealth capitalization.

Nzioki (2011), investigated on impact of capital adequacy on cash related execution of business banks referred to in NSE. He found that, capital plentifulness impacts execution Kenyan bank distinctly. In his choice he suggested that, the more conspicuous the bank capital adequacy the lower the probability of cash related difficulty and liquidity creation. (Aymen, 2013) who found that, in Tunisia capital expect a critical activity in ensuring smooth money related action similarly as affirmation of adventure right now high profit. In 1990s, United States experienced credit crunch which was trailed by number of studies choose the explanation.

Gudmundsson, Kisinguh and Odongo (2013) directed a review to set up the job of capital necessities on rivalry and strength of banks and their discoveries built up positive connections between execution, capital guidelines, and money related dependability. Goretti (2012) explored money related guidelines' impacts on budgetary execution at DTMs in Rwanda and her decision was that guidelines on DTMs have prompted improvement in their financial performancy. Various studies show that the true effect of central bank regulations on the performance of commercial banks is lacking in detail, and that is the reason for this study.

The overabundance capital prompts increment in tasks and this wind up improving the money related execution. The hypothesis is significant to the investigation since it underpins holding of overabundance capital. Overabundance capital prompts decrease of costs which could bring about punishments if there should arise an occurrence of break of administrative necessity and furthermore bolster activities final product being improved budgetary.

III. METHODOLOGY

The researcher used a descriptive design contacted on the eleven licensed commercial banks in Rwanda that included I&M Bank Rwanda Ltd (Former Banque Commerciale du Rwanda),

Bank of Kigali Ltd, Guaranty Trust Bank Rwanda Ltd (Former, Fina Bank Rwanda, ex BACAR, Access Bank Rwanda Ltd (Former BANCOR), ECOBANK Rwanda Ltd (ex, BCDI), COGEBANQUE Ltd, BanquePopulaire du Rwanda Ltd, Kenya Commercial Bank Rwanda Ltd (KCBR), Equity Bank Rwanda Ltd, Bank of Africa Rwanda Ltd (Former Agaseke Bank) and Crane bank Rwanda LTD using census. a documentary review of the National Bank of Rwanda audited reports for 2010 to 2015 was

also done. The data obtained was processed and analyzed using STATA programming to get progressively point by point results.

IV. RESULTS AND FINDINGS

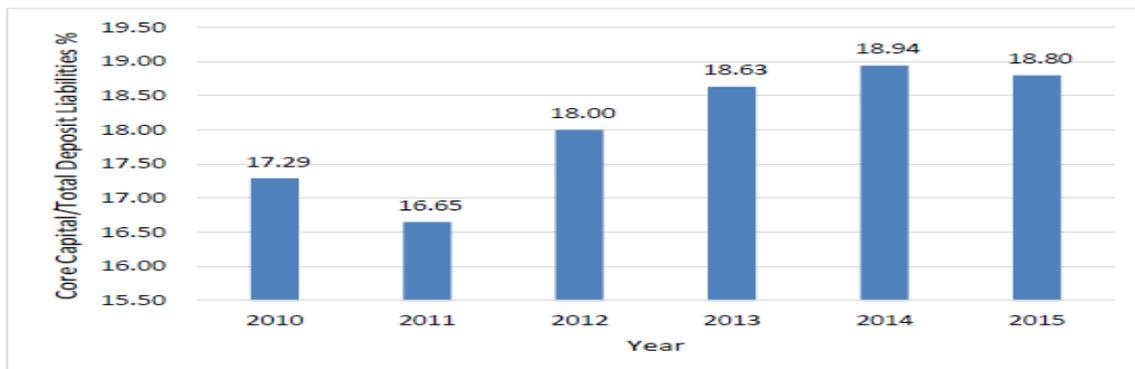
4.3.1 Core Capital to RWA



The graph above shows the ratio of core capital to RWA and it was above the statutory minimum of 10 per cent including the 2.5 per cent resource protection buffer. Yet between 2012 and 2015, this ratio declined. Capital ratio measures a bank's core equity capital against its total risk-weighted assets which include all the assets the bank holds that are systematically weighted for

credit risk. Core capital is a key determinant in a bank's profitability, it enables financial institutions to engage in more lending because lending is related to the bank's profitability. It declined in the above period due to decline in the economic activities leading to decline in commercial activities.

4.3.2 Core Capital to Total Deposit Liabilities



The figure above shows the ratio of core capital to total deposit liabilities and it was above the 8 per cent statutory. Aside from a decline in 2011, it had increased but then a slight decline occurred in 2015. the higher the core capital in commercial banks

the lower the liabilities simply because commercial banks will be having more capital that will enable them to have less liabilities. There was an increase in the core capital in the table above meaning an improvement in the operations of commercial banks.

Table 4.4.1: Model Summary and Anova

Source	SS	df	MS			
Model	9598993	1	9598993	Number of obs	=	66
Residual	1028471	64	16069.86	F(1,64)	=	211.55
				Prob> F	=	0.0000
				R-squared	=	0.9032
				Adj R-squared	=	0.899

Total	10627464	65	9615063	Root MSE	=	122.98
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From the ANOVA statistics, the study established the regression model had a significance level of 0.000 which is an indication that there was a significant relationship between the variables. The calculated F value was greater than the F critical value (211.55 > 3.991) an indication that there was a significant relationship between capital adequacy ratio and financial performance of commercial banks in Rwanda. The p value which was less than 0.05 indicated that the relationship between the independent variable (capital adequacy ratio) and commercial banks in Rwanda was significant. From the findings, the value of adjusted R squared was 0.899, an indication that there was variation of 89.9% on financial performance of commercial banks in Rwanda due to changes in capital adequacy at 95% confidence interval. This shows that 89.9% of the changes on financial performance of commercial banks in Rwanda could be accounted for by changes in capital adequacy. This shows that the remaining 10.1% of the change in financial performance of commercial banks in Rwanda was accounted for by other factors other than capital adequacy.

V. CONCLUSION AND RECOMMENDATIONS

In a study carried out by Calem and Rob (2015) to assess the connection between capital and hazard taking for banks and found out that that U-formed connection exists between capital and hazard taking for banks meaning that undercapitalized banks will in general face more challenges. Calem and Rob (2015) on the study of prudential limits concluded that that Banks prefer to maintain capital in excess of prudential limits to reduce the chances of falling below legal capital requirements while the study by Bridges, Gregory, and Spaltro (2014) conducted a study on capital adequacy on bank lending a case study of Bank of England concluded that that any adjustment in capital sufficiency brings about a change in both capital and loaning that is, an expansion in capital necessity prompts an expansion in the capital proportions of banks while this research concluded that capital adequacy positively and significantly influences financial performance suggesting that an increase in capital adequacy regulations within a bank will result in financial improvements in the bank.

The study concluded that capital adequacy positively and significantly influences financial performance suggesting that an increase in capital adequacy regulations within a bank will result in financial improvements in the bank. The researcher recommended that Banks should to comply entirely with the stipulated regulations and must be supervised by the Central Bank. This will ensure a stable banking sector which plays a major role in the economy. If this sector is stable the economy will grow and the country will prevent financial crisis. Implementing strict regulations will also allow the regulator to identify failing banks and provide remedial action before they fail, and depositors lose their money.

REFERENCES

- [1] Adams, M and Buckles, M. (2013).The determinant of corporate financial performance in the Bermuda insurance market.Applied financial economy 13(2), 133-143.
- [2] Barth, J., Daniel E. N., Triphon P., and Glenn Y. (2013).A Cross-country Analysis of the Bank Supervisory Framework and Bank Performance.Financial Markets, Institutions & Instruments12. Malden, MA: Blackwell Publishing Inc.
- [3] Berger, A. &Bouwman, C.(2014). Financial Crises and Bank Liquidity Creation.Retrieved March 2010, from Social Science Research Network.
- [4] Casu, B. & C. Giradone. (2016). Bank competition, concentration and efficiency in the single European market. The Manchester School 74(4): 441-468.
- [5] Cornett, M.& Saunders, A. (2011). Fundamentals of Commercial banks Management International Edition.Irwin/McGraw-Hill.
- [6] Alexandru, C. (2013). The Assessments of Banking Performances-Indicators of Performance in Bank Area.MPRA Paper no. 11600.
- [7] Alkadamani, K. (2015). Capital adequacy, bank behavior and crisis: evidence from emergent economies in italy. European journal of sustainable development, 329-338.
- [8] Alshatti, A. (2015). The effects of credit risk management on financial performance of commercial banks in Jordan:.Investment management and financial innovations, volume 12, 101-112.
- [9] Athanasoglou, P. (2015). Bank specific, Industry and Macroeconomic Determinants of Bank Profitability.Bank of Greece Working Paper 25.
- [10] Aymen, B. (2013). Impact of capital on financial performance of banks: case study of Tunisia.Banks and banks systems, vol. 8.
- [11] Baltagi, B. (2015). Econometric analysis of panel data (3rd ed.) .John Wiley & Sons.
- [12] Berger, A., andUdell,G. (2015). Relationship Lending and Lines of Credit in Small Firm Finance. . The Journal of Business , 68:351.
- [13] Bound, John, David A. Jaeger and Regina M. Baker.(2015). Problems with Instrumental Variables Estimation when the Correlation between the Instruments and the Endogenous Explanatory Variable is Wea.Journal of the American Statistical Association , 90-96.
- [14] Bridges, J., D. Gregory, M. Nielsen, S. Pezzini, A. Radia and M. Spaltro. (2014). The impact of capital requirements on bank lending.Bank of England.
- [15] Burns, N., and Grove, K. (2013).Understanding nursing research (3rd ed. Philadelphia: W.B/ Saunders Company.
- [16] Dang, U. (2011). The CAMEL Rating System in Banking Supervision: a Case Study of Arcada University of Applied Sciences. International Business, 88-106.
- [17] Deloof, M. (2013).Does working capital management affect profitability of Belgium firms? finance and accounting.
- [18] Donaldson, T. and Preston,L. (2015). The stakeholder theory of the corporation: concept, evidence and implication. Academy of management review, 20:1,65-91.
- [19] Faris, J. (2014). The efficiency of liquidity management of islamic banks. International journal of business and social science, , Vol. 5, No.5(1).
- [20] Fernandez, A. and Gonzalez, F. (2015). How accounting and auditing systems can counteract risk-shifting of safety nets in banking: Some international evidence. Journal of Financial Stability, 466-500.
- [21] Francis, W. and Osborne,M. (2017). Bank regulation, capital and credit supply: measuring the impact of prudential standards: UK. Financial services authority.Occasional paper series 36.
- [22] Garleanu, N. & Pedersen, L.(2017). Liquidity and Risk ManagementT. Cambridge: National Bureau of Economic Research.
- [23] Garson, G. (2014). Multiple Regression . North Carolina State University: School of public and international affairs.
- [24] Giddy, I. (2015). The Principles and Practice of Bank Supervision: Main Features and Evaluation and Possible Alternatives. Washington, DC: IMF Central Banking Seminar.
- [25] Githinji, W. (2010).Relationship between financial performance and CAMELS rating of commercial banks in Kenya. Kenya: Unpublished thesis

- for the degree of Masters of Business Administration- School of Business, University of Nairobi.
- [26] Gizaw, M., Matewos K. and S. Salvaraj.(2015). Impact of credit risk on profitability performance of commercial banks in Ethiopia.African journal of business management, Vol. 9(2), pp.59-66.
- [27] Gudmundsson, R., Ngoka-Kisinguh, K., &Odongo, M. T. (2013).The Role of Capital Requirements on Bank Competition and Stability: The Case of the Kenyan Banking Industry. Kenya Bankers Association-KBA Centre for Research on Financial Markets and Policy.
- [28] Ibe, S. (2013). The impact of liquidity management on profitability of Banks in Nigeria. journal of finance and bank management. , 37-48 1(1) June 2013.
- [29] Iyade, A. (2016). The Impact of Regulation and Supervision on the Activities of Banks in Nigeria (An Assessment of the Role of CBN and NDIC)". St. Clements University.
- [30] Jonathan, P. (2012). Credit risk management in banking industry: case study for AtwimanKwanwoma Rural Bank in Ghana. Kwame Nkrumah university of science and technology.
- [31] Lamberg, S. and Valming, S. (2018).Impact of liquidity management on profitability.Umea school of business.
- [32] Ledgerwood, J. (2009). Microfinance handbook: an institutional and financial perspective. Washington DC: World Bank Publications.
- [33] Masibo, J. (2015). The relative power of CEO's and Boards of Directors: associations with Corporate Performance. Strategic management Journal, , 12(2), pp.20.
- [34] McDonald, D. and Puxty, A. (2016).An Inducement – Contribution Approach to Corporate Financial Reporting", Accounting, Organization and Society.
- [35] Molefe, B. and Mazindutsi P., (2015).Effect of capital and liquidity management on profitability of Major South African Banks.Proceeding of the 28th annual conference of the Southern African Institute of management scientist. ISBN: 978-0-620-71797-7.
- [36] Mugenda, O. and Mugenda, A. (2016).Research Methods: A Quantitative and Qualitative Approach. Nairobi: ACTS press.
- [37] Muiruri, P. (2015). Effects of central bank regulatory requirements of financial performance of commercial banks in Kenya.Kenyatta University of Agriculture and Technology.
- [38] Murthy, Y. &Sree, R. (2013).A Study on Financial Ratios of Major Commercial Banks.Research Studies, College of Banking & Financial Studies, Sultanate of Oman.
- [39] Naceur, S., &Kandil, M. (2018). The impact of capital requirements on banks' cost of intermediation and performance: The case of Egypt. Journal of Economics and Business , 70-89.
- [40] Nzioki, S. (2011). The impact of capital adequacy on the financial performance of commercial banks quoted at the Nairobi Stock of Exchange. . (). Unpublished thesis for the degree of Masters of Business Administration-School of Business, University of Nairobi.
- [41] Olalekan, A. (2013). Capital adequacy and banks' profitability: An empirical evidence from Nigeria. American international journal of contemporary research , vol.3 No.10.
- [42] Olweny, T., &Shipho, T. (2011).Effects of banking sectoral factors on the profitability of commercial banks in Kenya. Economics and Finance Review, 1(5), 1-30.
- [43] Omondi, J. (2014). ffect of Central Bank of Kenya Prudential Guidelines and Regulations on the Financial Performance of the commercial banks in Kenya.Unpublished thesis for Degree of Masters of science in Finance from University of Nairobi.
- [44] Pasiouras, F., Gaganis,G. and C Zopounidis, C. (2016). The impact of bank regulations, supervision, market structure, and bank characteristics on individual bank ratings: A cross-country analysis.,Journal of finance, ,vol 10 pp 403–438.
- [45] Pessoa, M. and Mike, W. (2012).Government Cash Management: Relationship between the Treasury and the Central Bank. International Monetary Fund, Technical Notes and Manuals.
- [46] Puri, M. Rocholl,S. and S. Steffen. (2011). The importance of prior relationships in bank loans to retail customers.
- [47] Richard, P, Devinney, T., Yip, G. ,& Johnson, G. (2009). Measuring organizational performance: Towards methodological best practice. Journal of Management.
- [48] Ross, S., Westerfield, R., Jaffe, J. (2015).Corporate Finance". McGraw-Hill Inc,7th Ed.
- [49] Rwanda.(2015). Bank supervision Annual report. . [Online] Available: <http://www.bnr.rw>.
- [50] Said, R., &Tumin, M. (2011).Performance and financial ratios of commercial banks in Malaysia and China.International Review of Business Research Papers, , 157-169.
- [51] Samad, A. (2018). Comparative Efficiency of the Islamic Bank Malaysia vis-à-vis Conventional Banks.Journal of Economics and Management, 1-25.
- [52] Sangmi, M. and Nazir, T. (2010).Analyzing financial performance of commercial banks in India.
- [53] Saunders, M..K., Lewis, P. and Thornhill, A. (2010).Research Methods for Business Students, Second Edition.New York Prentice Hall.
- [54] Vianney, K. (2013). Relationship between regulations and financial performance of Rwanda commercial banks.Unpublished thesis, University of Nairobi.
- [55] Vossen, D. (2010). Bank liquidity management. New York: State university of New York.
- [56] Waweru, M. (2017).Financial regulatory structure reform in Kenya: The perception of financial intermediaries in Kenya regarding the case for a single financial regulator.
- [57] Zou, Y. and Fan. L. (2014).Impact of credit risk management on profitability of commercial banks: A case study of Europe.Umea School of Business and Economics.

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