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Basel III Implementation and Financial Performance of Banks in Rwanda: A Case of Bank of Kigali Huye Branch

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Abstract

The banks assume a huge part in the economy by working with the progression of assets from various gatherings and businesses inside an economy. Notwithstanding, their presentation might be impacted by the steadiness and capacity to oversee gambles. Given this, different guidelines, including worldwide guidelines, have been figured out. This study explored the effect of implementing the Basel III standard on the financial performance of banks in Rwanda. It was directed by three explicit targets, which spin around three key developments, specifically, the impact of extension execution of Basel III, the connection between quality execution of Basel III, and the impact of the assessment system of Basel III on the monetary execution of banks in Rwanda. The study used descriptive and correlational research designs. Primary data was collected using structured surveys and interview guides, while secondary data was obtained from the annual financial reports of Bank of Kigali plc and other relevant documentation. The collected data were processed and analysed using SPSS version 23, where frequency tables, percentages, mean, standard deviation, Pearson's correlation, and regression analysis were conducted. Pearson correlation analysis revealed that coverage implementation ($r=0.429$, $p=0.000$), quality implementation ($r=0.495$, $p=0.000$), and evaluation structure ($r=0.490$, $p=0.000$) were all positive and statistically significant. The overall impact of Basel III implementation showed $R^2=0.570$, indicating that 57% of the changes in the financial performance of banks in Rwanda can be attributed to the implementation of banking regulations, more specifically, the Basel standards. The regulatory body should ensure that the financial industry meets global financial standards. The study suggests that individual banks should also ensure that they provide quality compliance through transparent disclosure of their compliance and performance level of the Basel III standard

Keywords: *Basel III Implementation, Financial Performance, Banks, Huye Branch, Rwanda*

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1.1 Background of the Study

The stability of the financial sector is very important for any economy worldwide. In many developing worlds, the financial sector is dominated by banks, which hold most of the assets in the financial system. For instance, the banking industry in Rwanda holds more than 66.6% of the assets in the financial market; the Kenya banking sector holds slightly more than 56.2%, and the Nigerian banking sector holds about 45.5% of the assets (World Bank, 2020). In this respect, the maintenance of these institutions' financial strength is crucial. This is not a practice left to the developing countries only. In developed countries, different experiences of financial distress, including the global financial crisis of 2008, have made the supervisory bodies provide stringent regulations in the banking sector. Following these observations, central banks have been mandated to monitor the stability and healthy competition of the banking institutions. This has been done globally over the decades through meetings and policy formulation at the top level. For instance, the Basel Committee on Banking Supervision (BCBS) has been campaigning for this from the front. The BCBS was established in the year 1974 by governors from central banks constituted in the Group of Ten (G10) countries which are: Belgium, Canada, France, Germany, Italy, Japan, Luxembourg, the Netherlands, Spain,¹ Sweden, Switzerland, United Kingdom, and the United States

This was formed as a response to the financial disruptions experienced in these and other countries across the globe. It was set up as a forum where member states could sit down and deliberate upon matters touching the supervision of the banks. The membership would eventually expand in 2009 to 27 jurisdictions. The Committee met for the first time in 1988 in Basel, Switzerland, and formulated policies concerning minimum capital requirements for the banking sector. This first sitting would come to be known as the Basel I Accord. The main focus of this Accord was the minimum regulatory capital that the banks should have. However, this Basel I Accord was considered inadequate as it did not fully address banking institutions' risks. For instance, Brehm and Macht (2004) note that Basel I was unsuccessful in addressing the operational and market risks to which the banks are exposed. It was, therefore, not sensitive enough to address the risk as a whole. Consequently, this prompted the Committee to look into ways to broaden the policies. It would eventually lead to the sitting held in 2004 that came up with the so-called Basel II Accord. This aimed at creating international standards that the regulators can use in their supervisory and regulatory roles, especially in formulating roles involving minimum capital needed. This was mainly addressing the broad aspects of risks that include operational and financial risks (Gatzert & Wesker, 2012)

The recent Basel III, released in 2010 after the world experienced the 2007/08 global financial crises, aimed at accomplishing three major goals by 2019. These include, in the first place, strengthening the banks further to the point that there is no repeat of the 2008 crisis and preventing a spill over to other sectors in case of a crisis. Secondly, the Accord aims to improve risk management techniques within the banking industry so individual banks can effectively address their risk portfolio. This translates to increase risk management within the entire banking system. The third main objective of the Accord is to strengthen corporate governance, transparency, and disclosures of the banks. It addresses the issues of strengthening the regulation, supervision, and risk management in the banking industry. However, different countries worldwide have adopted this policy gradually, with many still dragging behind the original implementation schedule. According to Beck, Jones, and Knaack (2019), the original schedule of the implementation of Basel III was planned to take place gradually. The first phase was intended to cover the global framework to increase resilience in banks by June 2012; it

was also planned to gradually implement the liquidity coverage ratio by January 2013 and, by October 2014, to implement the net stable funding ratio. Finally, the implementation framework was intended to finalize the post-crisis reforms by December 2017 and the minimum capital requirements by January 2019. However, different jurisdictions are still dragging behind schedule, with most only having partial implementations of the reforms

For instance, in the USA, the implementation of the Accord is still behind schedule, with the deferment pushed to January 2023, partly due to the Covid-19 impact and the 2017 reforms to the Standards (FSB, 2021). In Europe, the Bank of Europe (2021) acknowledges that the implementation of the current Basel reforms is taking place by adopting international standards while considering some European specifics. This is also noted by Young (2014) in his research, where the implementation of the standards is gradually taking shape to full implementation. However, the author acknowledges that the standards must be adopted and ‘fitted’ to the local situation for each market. In addition, Damyanova (2021) notes that the EU region has asked for flexibility in implementing the standards owing to the pressure on the banks caused by the Covid-19 pandemic. According to the Bank for International Settlements (BIS) report released on China’s level of implementation of the reforms, it was reported that the country was closely aligned with the BIS implementation timeline. The report further revealed that by 2013, 12 out of 14 components that were assessed were compliant. Therefore, China’s capital regulation framework was graded as compliant (BIS, 2013)

In Southeast Asia (SEA), Pricewaterhouse Cooper [PwC] (2021) notes that the adoption and implementation of the reforms have been splintered across the region. Some of the countries in the SEA region are still progressing in implementing the first part of Basel III, while others are still in Basel II. For instance, Singapore and Indonesia, which will be members of the Basel Committee by 2021, were still seeking comments on the reforms through a consultative process. In addition, some banks have made progress and started assessing their operational and capital impact as required under the new Basel reforms. Nevertheless, other banks in the SEA countries are yet to follow the implementations after a full consultative process within their local financial system. As opined by Walter (2020), Asian countries have also been dragged behind the implementation of the Basel reforms due to their perceptions about the reforms. In Asia, the feeling has been that the Basel Bank regulations were devised by the European and North American developed countries for their purpose. Hence, feeling that the standards do not apply to their situation. However, this perception has changed with time, though gradually, as many of the central banks in Asia advocating for the adoption of the standards

In Africa, Adesina and Mwamba (2015) document that implementing Basel III reforms by 2015 in Africa was still wanting, with South Africa leading the pack. However, Adesina (2019) notes that the Basel III framework application in Africa raises the supervision bar relative to the previous framework. In this regard, the framework has brought many concerns about potential unintended effects on the financial system, especially for Africa and other developing countries. For instance, the increase in the minimum capital requirements and other regulatory measures were designed primarily for advanced economies and large banks. These standards may constrain the banks in Africa, where the financial markets are less developed, and the banks are the sole providers of credit. Despite these concerns, different African countries (for instance, South Africa, Kenya, Nigeria, and Rwanda) are implementing the Basel III standards. The eight West African countries covered by the Central Bank of West Africa States are slowly following Basel III. In Rwanda, the National Bank of Rwanda has been keen on implementing

Basel II within the sector and is currently reinforcing the Basel III standards implementation. As noted in the Financial Stability Report (FSR) 2020, the resilience in the banking industry in Rwanda amidst the Covid-19 pandemic has been facilitated by the adoption and implementation of Basel II and Basel III. In this respect, this study sought to investigate the implementation of Basel III and its effect on the financial performance of the Bank of Kigali plc (BK).

1.2 Problem Statement

Various regulatory policies put forward have aimed at stabilizing the banking industry. However, different authors and practitioners have criticized the regulations, advocating for self-discipline in the market (Jayadev, 2013; Lileikiene et al., 2021; Albera & Ramadan, 2022). Historically, the Basel I Accord failed to adequately address the banking industry's risks. Further, Basel II was insufficient to handle the 2007/2008 financial crises. This has prompted different authors to criticize the applicability of the Basel III Accord. In addition, some authors have branded the Basel III Accord as a charge for developed countries or as standards targeting big banks. Adesina and Mwamba (2015) criticize the repercussions of adopting the Basel III Accord within the context of Africa and in less developed countries. Further, Ozili (2019) has argued that the Accord was primarily designed to address large banks, especially international ones, and therefore may not entirely be applicable to domestic and small banks, which characterizes African banks.

In addition, challenges have hindered the implementation of the Basel III Accord since its inception in 2010. As earlier planned during the meeting of the BCBS in November 2010, the introduction and implementation of Basel III was scheduled to start from 2013 to 2015. This kick-start plan has, however, been postponed repeatedly, with the latest dates indicating January 2022, which was further extended to January 2023. Across East Africa, Basel III has slowly been taking effect, with a series of countries adopting and implementing the standards into their banking industry. Rwanda and Burundi adopted Basel III in 2018 and 2019, respectively (BNR, 2021). As argued by Africa Development Bank (AfDB), African banks should adopt Basel III albeit cautiously, terming Basel III as a 'one-size-fits-all' policy. This, according to AfDB, may not be a perfect fit and panacea for all African countries. Despite these challenges, the importance of banking regulations cannot be wished away. With this in mind, therefore, this research sought to investigate the effect of Basel III implementation and the financial performance of banks in Rwanda, taking the case of Bank of Kigali plc.

1.3 Objectives of the Study

- i. To investigate the effect of scope implementation of the Basel III on the financial performance of banks in Rwanda, Case of Bank of Kigali plc.
- ii. To investigate the relationship between quality implementation of Basel III on the financial performance of Bank of Kigali plc.
- iii. To assess the effect of evaluation framework of the Basel III on the financial performance of Bank of Kigali plc.

2.1 Literature Review

2.2 Theoretical Literature

The financial business is essential to every country's monetary improvement. The banks fulfil their roles by taking deposits from individuals and institutions as savings and converting this into credit. This conversion of deposits to credit enables the flow of funds from one sector of

the economy to another, enabling firms and entrepreneurs to increase their production levels. Describe three bank stages in capital formation (Barth, Caprio & Levine, 2012). The first includes the creation of savings. As noted, the amount of capital formation depends on how much savings a bank can attract from customers. Similarly, capital formation at the national level depends on aggregate savings within an economy. However, the level of savings depends on the national income and the ability of individuals to set aside part of these incomes as savings. However, public confidence and orientation can be used to increase the level of savings from individuals. This can be achieved especially through stabilizing the banking institutions. When the level of supervision of the banks is high, and the banks exercise prudential practices, the public gets more confidence to put their money in the banks. Consequently, the presence of regulatory policies and oversight institutions helps in increasing the willingness to save (Young, 2014)

The financial area is generally managed and regulated by a national bank. A central bank, also called the reserve bank, is a national bank mandated to provide financial and banking services for the government and commercial banks. It is therefore considered as the government bank or banker's bank. Its main role is to provide the country with currencies through printing notes and currency. The central bank also plays a significant role in price stabilization by controlling inflation and financial stabilization by controlling the financial system within an economy. The central bank of any given country is also mandated to provide a regulatory framework and play an oversight role over the financial institutions within its jurisdiction. For this purpose, central banks play a significant role in ensuring that prudential regulations are formulated, implemented, and followed as necessary. In addition, the supervisory role played by the central bank is important in implementing the Basel III reforms. Through the individual central banks around the world, the BIS and the Basel Committee can monitor the progress of individual countries; even; of the implementation of the reforms.

As Michail (2021) described, banks are inherently exposed to various risks due to their business or operations. As the main function of a commercial bank is to extend credit, the bank is exposed to default and interest risks. Other common risks for a bank include foreign exchange, market, and operation risks, among others. In describing risk management in a bank, Bessis (2011) notes that the process should be such that there is a logical framework that defines the potential risks and losses and identifies the major risk exposures for the bank. Generally, the main concern for the risk manager in a bank is to ensure that the bank can control its risk exposure and, at the same time, safeguard the value of the assets from potential losses. As seen over history, different circumstance triggered by risk management at the institutional level has led to various financial crises around the globe. For instance, the Asian financial crisis of the 1990s was triggered by the exposure to the risk of Japanese banks arising from real estate and market bubbles.

Similarly, the recently experienced global financial crisis of 2007/08 was also triggered by bank risk management policies. This therefore solicited interest in banks' risk management from various quotas, including practitioners, policymakers, academicians, and others. This interest drove the Basel Committee to be formed in the first place.

Controllers are more watchful and worried about the executives' gamble at the singular financial and area levels. This vigilant knowledge stirred during the 2007/08 worldwide monetary emergency, which to some degree added to the interest in the arrangement of the administrative system. Following the phenomenal occasions after the emergency, numerous administrative bodies have seen the requirement for a functioning structure that can identify

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issues immediately, keep away from them, forestall their event, or decrease their conceivable impact on the financial framework and the economy overall. Moreover, the expanded interest in stable financial foundations has seen the need to consolidate the Basel III guidelines. For example, Kim and Katchova (2020) note that the US administrative organizations gave mandates and execution plans of the guidelines to build the financial area versatility in the country. This way, this segment meets the requirement for scope execution, which meets the need to include Basel III for all nations fully. Like this, the need to have the full execution of Basel III is pervaded in the hypothetical supporting that such execution would guarantee strength in the banks. In this respect, scope execution adjusts the analyst to explore the fundamental regions planned to be covered by the principles. The three principal regions the guidelines cover include capital ampleness, risk the board, and liquidity necessities.

The main idea behind Basel III is to build on the foundation laid down by the other previous accords, that is, Basel I and Basel II. It aims to bring a continuous process geared towards enhancing regulations in the banking sector. Thereby increasing the health of the banks and the economy at large. Concomitantly, the accord's objective is to provide prudential guidelines that can help prevent the banks from hurting the economy by assuming too many risks than they can handle. The main argument in this section is that individual banks and the entire banking sector should adopt international standards but customize them to their circumstances. This would ensure that the Basel reforms are not just taken as a whole but integrated into the banking environment characteristic of the particular bank. This would help the banks to model the framework in a way that it 'fit.' For instance, Ozili (2019) argues that the Basel III reforms targeted international banks and developed economies and should therefore be adopted piece-wise by other banks and jurisdictions. This call for local adoption of the Basel reforms may increase the quality of the implementation of the Accords rather than taking them as 'gospel truth' or norms that cannot be customized.

The financial area is generally managed and regulated by a national bank across the globe in supervising commercial banks in the CAMELS model.

It is used as an off-site supervisory tool by central banks. The CAMELS model was first developed in the United States (US) in 1979 by the Federal Financial Institutions Examination Council (FFIEC). Initially, it was known as the Uniform Financial Institutions Rating System (UFIRS), then it would change to CAMEL, including five evaluation categories. Later, in 1995, the model would change to the now-known CAMELS to include a sixth category, namely, sensitivity to market. CAMELS is a commonly used tool for supervising banks. It is usually referred to as an off-site supervisory tool through which the regulatory bodies can monitor the performance of banks by observing some specific elements. The components engaged with this administrative apparatus are remembered for the abbreviation, which represents Capital sufficiency, Resource quality, the executive's effectiveness, Profit, Liquidity, and Aversion to showcase risk. It used to assess the strength of a bank by examining its performance alongside the six categories and can be able to provide useful information to the supervisors on the overall conditions of the bank (Colombini, 2018).

2.3 Empirical Literature

2.3.1 Scope Implementation and Financial Performance

One of the areas for advancement in the execution of Basel III, as referred to in the concentrate by Chabanel (2011), is the degree execution. This, the maker found as the basic area in the execution cycle where the regulators should start to ensure full execution of the standards. A

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more related observational survey was coordinated by Zaky and Soliman (2017), who explored the effect of the statement of Basel III on the presentation of banks in Egypt. The expert investigated the impact of the execution of Basel III on the introduction of the banks perceiving the sets aside cash with high capital, high liquidity, and higher efficiency than the others. The makers used an illustrative investigation plan and abstract procedures covering data from 2013-201. The Basel III markers used included liquidity extents, capital extents, impact extent, and efficiency extents, while the show was assessed using ROA, ROE, and commitment to esteem extent. In their revelations, the researcher found that the statement of the Basel III influences the presentation of business banking in Egypt.6. The Basel III markers utilized included liquidity proportions, capital proportions, influence proportion, and productivity proportions. In contrast, the presentation was estimated utilizing ROA, ROE, and obligation to value proportion.

In their discoveries, the analyst found that the declaration of Basel III affects the exhibition of business banking in Egypt. An observational examination led by Jayadev (2013) on the Basel III execution issues and difficulties among the Indian banks observed that the difficulties in the execution favoured the expanded administrative necessities. From the discoveries, the creator shows that the exhibition of the banks is significantly impacted by the execution of Basel III temporarily. This exhibition improves with time as the financial area settles against the extension execution of the principles. The creator additionally showed that the execution of Basel III would influence the ROE of the banks altogether. These discoveries are upheld by the discoveries featured by Albera and Ramadan (2022) in their exploration. Kori et al. (2020) researched the financial guidelines and bank execution among the financial establishments in Kenya. The exploration covered 40 banks and information from 2016-2018. Utilizing enlightening insights and relapse examination, the discoveries showed a measurably tremendous impact of the administrative system on the presentation of banks. In any case, this impact was negligible, or at least not a more prominent impact. The R2 was 0.046, which implied that the regulatory framework influences the performance of banks by 4.6%. On their part, Lileikienė, Obi, and Valackienė (2021) found an adverse relationship between stringent capital requirements and commercial banks' performance in USA and EU community.

2.3.2 Quality Implementation and Financial Performance

In his study, Chabanel (2011) investigated banks' challenges in implementing Basel III. In the study, the author highlights that the quality of data for implementation is among the challenges among others. In this, the research indicated that the banks could have adequately implemented the Basel III standards if the level of implementation was measured alongside the quality of the implementation. In addition, the implementation should meet the demands of integration with the entire bank operations to avoid the process being overly costly. In this way, the bank and the entire banking system can seamlessly streamline the implementation process. Similar emphases had been given earlier in the study by Harle et al. (2010). The authors focused on the Basel III implementation in the European banking system. The authors emphasized that high-quality data are essential for any effective implementation of the standards and a measure of the ability of the banks to adopt the standards. While investigating the impact of bank regulations on efficiency and banks' performance, Hassan (2019) found that higher capital requirements improve bank growth in terms of its operations in European and Latin American banks. In his research, Adesina (2019) investigated the effect of Basel III liquidity requirements on the growth of lending in the banking sector in Africa. The author investigated 361 commercial banks covering 38 different African countries. The findings showed that quality

implementation of the liquidity requirements significantly positively affects loan growth. At the same time, this smooths out the challenges of non-performing loans.

2.3.3 Evaluation Framework and Financial Performance

Research conducted by Naceur and Omran (2011) in the Middle East and North Africa (MENA) investigated the incentive of bank regulation and concentration on the financial performance of the banks. The paper focused on estimating the guidelines against the monetary exhibition of the banks. As noticed, the creators tracked down the bank guidelines' positive and massive impact on the bank's exhibition. Alber and Ramadan (2022) explored the impact of financial guidelines on the banks' exhibition inside MENA. The information covered the 19 MENA nations and information from 2008 to 2018. Utilizing board information examination techniques, the creators observed the critical impact of applying the guidelines on the banks' productivity. The outcomes showed that the R2 territory was from 5.02% to 75.02% with a p-worth of under 5%. Hence, the outcomes showed that utilizing bank guidelines and the Basel concurs further develops the bank execution regarding security, execution, and proficiency. The creators additionally prescribe the utilization of assessment methods to ensure that the execution of the guidelines is full, gathering the characteristics of the execution.

Moreover, consistent observation would guarantee negligible deviations from the guidelines in the financial area. On his part, Nayak (2021) researches the impact of banking guidelines on the exhibition of banks.

The investigation utilized information given by World Bank and covered 129 nations. Utilizing various relapse and stepwise relapse models, the outcomes showed a positive effect of severe guidelines and oversight on the presentation of the banks. Then again, the creator showed that there exists a negative and critical connection between capital prerequisites and outer observing on the monetary execution of banks. Monetary emergencies may moneylender the loaning channel distant to many firms as the expense of loaning increments or as the banks face liquidity challenges. Bank guidelines can be utilized to direct the usable idea of the banks as well as help with streamlining credit difficulties that might emerge. Hence, the lending channel theory applies in this research to the extent that it links banks' operative activities (lending) with the protective nature of the regulation. In particular, the Basel III regulations aim at giving banks more flexibility in providing credit by increasing their capital base, regulating their risk management, and through liquidity requirements. As such, the standards help the banks ensure they have available funds for lending to other sectors.

2.4 Theoretical Framework

This research is guided by three main theories which are discussed in this section. These include moral hazard theory, bank lending channel theory and public interest theory.

2.4.1 Moral Hazard Theory

The extent of the 2007/08 financial crisis led to a renewed interest in the need for government interventions in the private market, more so in the financial sector. The unprecedented events that were experienced then warranted the need for closer scrutiny of the existing regulatory framework, application, and implementation level. In light of this growing interest, the significance of the already existing moral hazard theory came to be recognized as an important theory to describe the operation within the financial system. The moral hazard theory, which according to Marshall (1976), is generally attributed to Arrow and Pauly in the 1960s, postulates that one party in a relationship participates in risky behavior or declines to perform

in good faith, believing the other person will shoulder the consequences, of their behavior. In light of this, one party engages in undesirable activities unknown to the other party, which bears the burden of the outcome. In the banking sector, this theory holds that banks will engage in risky activities knowing that they can get a government bailout if they fail. This is commonly known as the 'big-to-fail' syndrome, where banks believe they can do whatever they want since the government can risk their failure.

The moral hazard theory, further, can be explained within the setting of the banking sector based on the operations of the banks. Banks normally engage in credit provision, which in itself creates credit risks. The banks can do so without much scrutiny of the borrowers, especially during economic boom seasons, assuming too many risks than they can handle. The Basel III accord aimed at strengthening the gamble of the executives at the institutional level as well as at the area level. The basic idea was to ensure that banks operate within their capital base and do not engage in risky investments beyond their capital base. Allen et al. (2015) argue that government regulations induce stability within the banking sector by increasing public confidence, hence reducing the possibility of bank runs. In effect, the regulations help reduce the moral hazard problems associated with the banks' risk appetite. In support of the need for bank regulation, Ping (2014) investigated the significance of bank regulation for both the banks and the general public.

The author points out the regulations as an ongoing process to ensure that the banking sector is well supervised vis-à-vis the regulations. This helps to reduce the challenges brought about by the moral hazard as a result of the government guaranteeing funds for the stability of the banks. Consequently, one way that can be seen to reduce moral hazard challenges effectively is through prudential regulations, both at the micro level and macro levels.

Therefore, this moral hazard theory was considered in this research because it practically relates to the research objectives and interests. In other words, the theory was key in explaining the significance of the scope and quality implementation of the Basel III regulations to strengthen the banks and protect the depositors. With this as a backdrop, the researcher sought to assess the effect of the Basel III implementation on the performance of banks in Rwanda

2.4.2 Lending Channel Theory

The Lending Channel Theory (LCT), as proposed by Arellano and Bond (1991), postulates that banks will ration the provision of credit due to various reasons attributed to their lending ability, the financial system, or due to the overall economic environment. For instance, the theory argues that banks usually cut their lending during monetary contraction seasons regardless of the interest rates. On the other hand, banks would increase their lending during monetary expansion. In addition, banks may regulate their lending based on the prevailing interest rates or when government provides an interest rate ceiling. In all these circumstances, the LCT theory argues that banks make decisions on lending to the private sector based on various factors. In this way, the ordinary tasks of the banks are impacted by those factors that make bank apportion their credit loaning (Nilsen, 2002).

LCT further argues that banks play a significant role in monetary policy, offering the monetary transmission channel. The monetary policy is seen to impact the lending rates of the banks, consequently influencing the lending appetite of the banks. In furtherance to this argument, banks would significantly affect the private sector through the provision of credit. When such roles of the bank are distracted, economic activities would significantly decrease as firms

cannot access credit. Financial crises may render the lending channel inaccessible to many firms as the lending cost increases or the banks face liquidity challenges.

Bank regulations can be used to moderate the operative nature of the banks as well as aid in smoothing out credit challenges that may arise. Hence, the lending channel theory is applied in this research to the extent that it links banks' operative activities (lending) with the protective nature of the regulation. In particular, the Basel III regulations aim at giving banks more flexibility in providing credit by increasing their capital base, regulating their risk management, and through liquidity requirements. As such, the standards would help the banks ensure they have available funds for lending to other sectors. This improves the allocative function of the banks to the point that there can be efficiency in the operations of the banks.

2.4.3 Public Interest Theory

The Public Interest Theory (PIT) may be traced back to the 1960s when it was more prevalent among academicians. However, the theory's origin can be seen in the earlier work of Pigou (1932) in his book entitled the economics of Welfare. As Hantke-Domas (2003) noted, PIT is concerned with protecting public Welfare through government-initiated regulations. In the banking sector, the regulations initiated by governments are done through the central bank, which is the government agency mandated to oversee the operations of the banks. All the Basel reforms were initiated by different governments who, through their respective governors of the central banks, sat and decided to provide prudential regulations to detect and prevent financial crises from happening. The public interest theory holds that the country's intervention in the private sector through regulations is done to correct market failure and imperfections. The theory further propagates that government regulations are done with the interest of the public at heart rather than the interest of private institutions. Therefore, this promotes social interest that should be derived from the private sector at the expense of the private sector.

This theory further promotes the public interest in the capitalist tendency of investors, institutions, shareholders, or the private sector, who may not always have the interest of others in their dealings. Therefore, this theory's silver lining can be found in the argument for social cohesion and public protection. In the banking sector, there is a need always to consider the public interests. This is because the public has trusted the banks with their funds, expecting that the funds are protected and that the banks will always act in their best interest. Basel III regulations should strengthen this public trust and confidence by ensuring that the banks are well-capitalized and that their liquidity level is maintained at a level that will meet the on-demand deposits from the public. In addition, the reforms should be formulated to protect the public interest by containing the banks' risk appetite, especially during an economic boom. The public interest theory helps to place these international reforms within the realm of promoting the general Welfare of the depositors and the public in general. With such reforms, the banks, in turn, are protected from possible bank runs that may result from public information since the regulations give some sense of assurance to the public.

As noted by Ping (2014), the basic underpinning for regulations in the financial industry is to ensure the bank is operating within the mandate given to them by the public. The banking regulations are seen as an enforcement framework controlling the bank's behaviour or directing the bank towards a given behaviour. As such, the main goal behind formulating regulations is to direct the banks to protect the public. The theory of public interest helps to explain the "why" of the regulations. It helps to see the rationale behind the regulation. Therefore, the significance of the Basel III regulations can better be explained if they adhere to the public interest theory.

In this research, the main interest was to investigate the implementation of Basel III accords within the banking sector in Rwanda. This cannot be well understood without understanding the need for these regulations.

This also could be why most jurisdictions opt to adopt the reforms rather than saying the reforms were meant for big international banks and most developed countries. Since the main principle is to protect the public interest, implementing the Basel III reforms should be smoothed within all jurisdictions. This theory was important in this research because it guided the researcher in investigating the effect of the regulations on the monetary performance of the banks. The regulations should not draw back the bank's performance but rather strengthen its performance.

2.5 Conceptual Framework

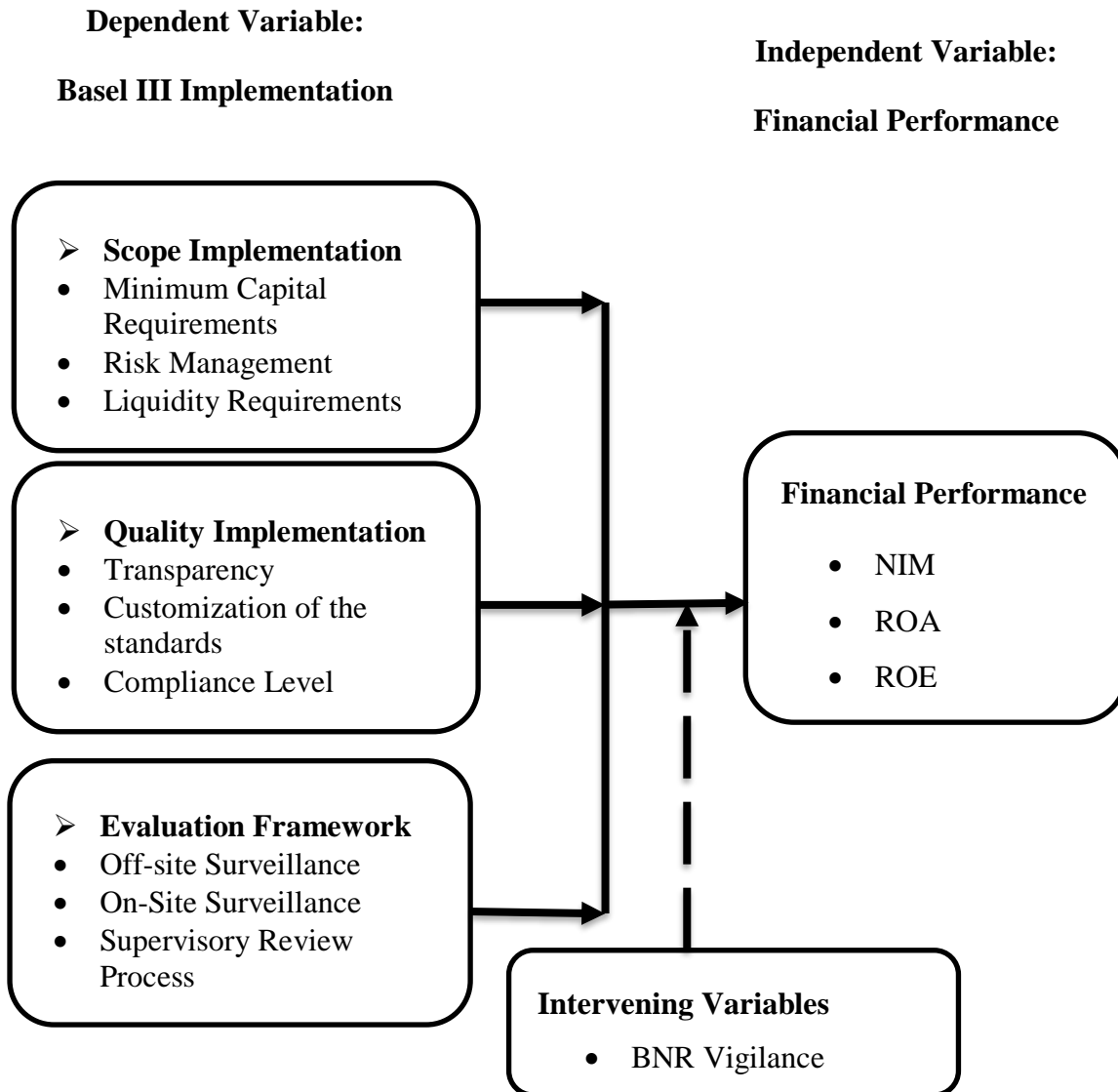


Figure 2.1: Conceptual Framework

3.0 Research Methodology

The study utilized a correlational exploration design. The target population included the employees working in BK, Huye Branch. The target population comprised one hundred and twenty employees per human resource records. The researcher used the census as the sampling method. Both essential and optional information was utilized to accomplish the prior expressed exploration targets.

The essential information was gathered from distinguished respondents who remembered the BK and Huye branch representatives. The organized survey was utilized as the fundamental instrument for get-together essential information. The survey was isolated into two segments,

Area A and B. Segment A gathered information connected with the respondents' profile, while Segment B gathered information connected with the examination question. Segment B was partitioned into four areas, each for the three explicit exploration goals and the fourth for gathering information connected with the overall goal. The researcher used a set of questions measured on a five-point Likert scale with 5= strongly agree, 4 agree, 3= neutral, 2= disagree, and 1= strongly disagree. In addition, an interview guide was used to add more information. Key informants were selected for this exercise. Lastly, secondary data was obtained using the desktop approach. In this regard, the researcher gathered secondary data from published financial statements. Data were presented using descriptive techniques where frequency tables, percentages, mean; standard deviation will be used. Pearson correlation and multiple regression analysis were also used in order to measure the effect of Basel III implementation on the financial performance of banks.

4.1 Research Findings and Discussions

Out of 120 surveys appropriated to BK's representatives, 102 were occupied and returned on time for information examination. This addressed 85% reaction rate viewed as adequate for investigation reasons. Most participants were female at 62.7%, while the male participants were 37.3%. 50% of the participants were aged 35 years or below, indicating a youthful working generation at the Bank of Kigali plc. To quantify the impact of Basel III execution on the monetary execution of banks in Rwanda, the specialist utilized the Karl Pearson coefficient of relationship and various relapse examinations. The Pearson connection assisted with estimating the connection between the three-pointer factors of Basel execution, with being specific, scope execution, quality execution, assessment structure, and the reliant variable. Then again, the various relapse examination assisted with estimating the contributing impact of every one of these factors on the monetary execution of banks in Rwanda.

Table 4.1: Correlation matrix between Basel III implementation and financial performance

		Financial Performance	Scope Implementation	Quality Implementation	Evaluation Framework
Financial Performance	Pearson Correlation	1	.429**	.495**	.490**
	Sig. (2-tailed)		.000	.000	.000
	N	102	102	102	102
Scope Implementation	Pearson Correlation	.429**	1	-.090	.260**
	Sig. (2-tailed)	.000		.367	.008
	N	102	102	102	102
Quality Implementation	Pearson Correlation	.495**	-.090	1	.122
	Sig. (2-tailed)	.000	.367		.220
	N	102	102	102	102
Evaluation Framework	Pearson Correlation	.490**	.260**	.122	1
	Sig. (2-tailed)	.000	.008	.220	
	N	102	102	102	102

Source: Researcher (2022)

Table 1 shows the Pearson relationship yield between the reliant variable and pointer factors. In this review, the reliant variable was the monetary execution of banks in Rwanda. The autonomous variable was Basel III execution, estimated using three key pointer factors. These incorporate extension execution, quality execution, and assessment system. In every one of these, the Pearson relationships were viewed as genuinely critical since their particular qualities were under the 5% limit. For scope execution, the relationship results showed that the Pearson connection ($r=0.429$, $p=0.000$) was positive and fundamentally connected with the monetary execution of banks in Rwanda. It was critical since the p-esteem was under a 5% degree of importance. Scope execution incorporated the execution of the Basel III Accord as per its inclusion concerning the least capital prerequisite, risk the board, and liquidity necessities.

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Thus, these guidelines critically cover Basel III and essentially impact the exhibition of banks in Rwanda. Further, the quality execution of Basel III principles was considered sure and measurably critical ($r=0.495$, $p=0.000$) to the monetary exhibition of banks in Rwanda. In particular, the relationship was critical at 5% since the p-esteem was under a 5% degree of certainty. Quality execution of Basel principles remembered straightforwardness for monetary revelation, customization of the guidelines to fit the neighborhood market, and consistency level. The meaning of the Pearson relationship suggested that business banks should guarantee quality reports while delivering monetary data. For assessment structure, the Pearson connection ($r=0.490$, $p=0.000$) was a sure and genuinely important sign that p-esteem was under 5%. This suggested that assessment of the execution progress is significant in guaranteeing total execution and consistency and influences the monetary presentation of banks in Rwanda.

Table 2: Regression model summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.755 ^a	.570	.556	.14958

Table 2 shows the summary of the regression model. The table shows that the regression model adequately fits the analysis since it gave an $R=0.755$. It also showed $R^2=0.570$, implying that 57% of the changes in the financial performance of banks in Rwanda can be attributed to the implementation of banking regulations, more specifically, the Basel standards. This showed that scope implementation, quality implementation, and evaluation of the progressive implementation of Basel standards improve financial performance significantly. These findings agree with previous studies that pointed out a positive and significant effect between banking regulations implementations and financial performance. For their part, Kori et al. (2020) investigated the banking regulations and banks' performance among the banking institutions in Kenya. They found a low but significant R^2 of 0.046, which implied that regulatory framework influences the performance of banks by 4.6%.

Table 3: Analysis of Variance results

Model		Sum of Squares	df	Mean Square	F	Sig.
	Regression	2.901	3	.967	43.215	.000 ^b
1	Residual	2.193	98	.022		
	Total	5.093	101			

Table 3 relates to the ANOVA results, which show that the regression model ($F=43.215$, $p=0.000$) was statistically significant since the p-value was less than 5%. This implied that the use of Basel regulation standards while ensuring scope implementation, quality implementation, and evaluation framework significantly affects the financial performance of banks in Rwanda. Similar findings can be seen in the study by Alber and Ramadan (2022), who found a significant influence of applying the regulations on the profitability of the banks in the MENA region. The results showed that the R^2 range from 5.02% to 75.02% with a p-value of less than 5%.

Table 4: Regression coefficient analysis results

Model	Unstandardized		Standardize	t	Sig.
	Coefficients		d		
	B	Std. Error	Beta		
(Constant)	-1.492	.510		-2.926	.004
Scope	.454	.081	.388	5.604	.000
Implementation					
1 Quality	.508	.070	.489	7.268	.000
Implementation					
Evaluation	.397	.084	.329	4.734	.000
Framework					

Utilizing the relapse coefficient examination, the analyst had the option to break down the impact of every one of the marker factors on the monetary execution enough. This examination additionally assisted with catching the importance and the indication of the impact between scope execution, quality execution, and assessment system on one hand and monetary execution then again. According to the discoveries in Table 4, scope execution ($\beta_1=0.454$, $p=0.000$) showed that scope execution emphatically influences monetary execution. The p-esteem was under 5%, implying the coefficient was measurably huge. Scope execution as a vital part of the execution of the Basel Accord was like this affirmed in this review. For quality execution ($\beta_2=0.508$, $p=0.000$), the outcomes showed that quality execution emphatically influences the monetary execution of banks in Rwanda. The p-esteem was under 5%, implying that the coefficient was critical.

This way, quality execution as a vital part of the execution of the Basel Accord was affirmed in this review. This additionally implies that business banks do not simply have to decrepitate the guidelines but instead ought to do as such while noticing the subjective part of these rules. For assessment structure ($\beta_3=0.397$, $p=0.000$), the outcomes showed that the assessment system emphatically influences the monetary execution of banks in Rwanda. The p-esteem was under 5%, implying that the coefficient was huge. Hence, the assessment of the advancement in the execution cycle as a vital part of the execution of the Basel Accord was affirmed in this review. This showed that the proclamation of the guidelines is not enough without help from anyone else; the controller should continue observing and assessing the advancement in the execution of these norms. Comparative discoveries should be visible in the concentrate by Alber and Ramadan (2022), who tracked down a critical impact of applying the guidelines on the productivity of the banks in the MENA district. The outcomes showed that the R2 territory was from 5.02% to 75.02% with a p-value of under 5%.

Table 5: BK’s Net Interest Margin for 2018-2021

	2018	2019	2020	2021
Profit after Tax(000Rwf)	27,366,616	37,308,336	38,433,289	51,894,970
Net Interest Income(000Rwf)	75,798,699	94,773,445	112,793,315	136,271,358
NIM (%)	36.10	39.37	34.07	38.08

Table 5 shows the financial performance of BK for 2018-2021 in terms of net interest margin. The NIM has not been stable, starting at 36.10% in 2018 and increasing to 39.37% in 2019. It would, however, decrease to 34.07% in 2020 and later increase to 38.08% in 2021. The results show that the highest NIM for the study period was reached in 2021, while 2020 was the lowest. This indicated fluctuations in the net interest that the Bank earned over the period.

Table 6: BK’s Return on Assets for 2018-2021

	2018	2019	2020	2021
Profit after Tax(000Rwf)	27,366,616	37,308,336	38,433,289	51,894,970
Assets (000Rwf)	877,401,364	1,019,075,587	1,304,004,486	1,590,372,983
ROA(%)	3.12	3.66	2.95	3.26

The results displayed in Table 6 show that the ROA for Bank of Kigali plc has changed from 3.12% in 2018 to rise to 3.66% in 2019. However, this would drop downwards to its lowest at 2.95% in 2020 but then rise to 3.26% in 2021. The trend shows that the ROA was not steady but kept moving up and down.

Table 7: BK’s Return on Equity for 2018-2021

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	2018	2019	2020	2021
Profit after Tax(000Rwf)	27,366,616	37,308,336	38,433,289	51,894,970
Equity(000Rwf)	194,705,081	220,810,886	259,344,020	283,031,691
ROE	14.06	16.90	14.82	18.34

Table 7 shows the financial performance of BK for 2018-2021 in terms of its returns on equity. The ROE has not been stable, starting at 14.06% in 2018 and increasing to 16.90% in 2019. It would, however, decrease to 14.82% in 2020 and later increase to reach its highest at 18.34% in 2021. The lowest point for ROE was in 2018, while the highest was in 2021. This indicated fluctuations in terms of the returns on equity that the Bank has earned over the period

5.0 Conclusions

This study looked to research the impact of Basel III execution on the monetary execution of banks in Rwanda, taking a contextual analysis of Bank of Kigali plc. The concentrate specifically examined the job of extension execution, quality execution, and assessment system as key areas of Basel III execution. The outcomes have shown that every one of the three regions examined altogether decides the execution progress of the Basel III Accord. They were additionally seen to have a critical impact on the monetary execution of banks in Rwanda. The outcomes additionally re-underscored the requirement for quality execution as well as the requirement for ceaseless observing and assessment. In this way, BNR, as the general controller, should be adequately careful to guarantee quality consistency and moderate execution of the principles.

6.0 Recommendations

This study has shown that banking regulations are important in improving the financial performance of banks in Rwanda. The results have also shown that with banking regulations, public confidence is improved, which in turn increases the level of performance of the banks. Therefore, the regulatory body must keep the banking industry abreast of international regulations. There is also a need for BNR to ensure that these regulations are not just adopted or implemented for compliance's sake. They should be localized to fit the Rwandan market. In this way, the standards can help the banks to improve their financial performance. The study also recommends that individual banks ensure quality compliance through transparent disclosure of their compliance and implementation level of the Basel III regulations. Their cooperation with BNR is important to ensure that Basel III is fully implemented in Rwanda and that the effect is experienced in all the banking institutions. In addition, it is important for individual banks to regularly review their implementation progress and provide updates to BNR in line with the Basel III recommendations.

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