



## Corporate Governance and Liquidity Management: Evidence from Nigerian Deposit Money Banks

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### Abstract

The liquidity crisis is the major driver of banks' failure in Nigeria as a failure of some banks in the past was brought in connection with a liquidity problem. We examined the CG and LM of Nigerian banks by obtaining data from annual accounts and reports of the 10 DMBs from 2012 to 2018. Data were analyzed using the Generalized Method of Moment (GMM). Findings showed that the previous year's liquidity significantly and positively influence the current year's liquidity ratio. Board size exerts a negative insignificant influence on liquidity management; meetings have a direct but insignificant influence on liquidity management. Board independence shows a significant but negative effect on liquidity management. Gender diversity and bank size were found to exhibit indirect and insignificant influence. The study concludes that corporate governance exhibits a joint significant effect on liquidity management of Nigerian DMBs. The main recommendation arising from the finding is that the inclusion of directors on the board should be based on their skills and ability to understand and drive banks' operations.

**Keywords:** Boards Attributes, GMM, and Loan to Deposit Ratio.

**JEL Classification:** C30, E44, E51, G20.

### Introduction

For the stability of any system, some factors are germane. Banking becomes germane to the economic activities of Nigeria as her economic success is significantly hinged on the banking sector, arising from the fact that finance from the sector represents a significant proportion of the entire financial inflow to the real sector. Banks are therefore primarily established to perform vital financial intermediation of funds from surplus economic end to deficit economic end. This financial intermediation is beneficial to the economy as it facilitates the supply of the finances that are needed by the real sectors of the economy for investment purposes which in turn increases aggregate output, productivity, aggregate employment, reduces inflation, and contributes to the well-being of the citizenry. The banking sector has therefore been regarded by Kajola et al. (2019) as a panacea to economic instability. The decision regarding the management of liquid resources is one of the core fundamental decisions that must be made by managers regardless of the nature of their businesses. This is particularly important for banks whose inventory is cash and its continued survival and stability are significantly predicated on its continuous liquidity.

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Effective and efficient financial intermediation of funds, therefore, relies significantly on banks' stability, profitability, and particularly liquidity. For banks to effectively act as agents of fund intermediation, be able to meet up with depositors' withdrawal demand, and abide by regulatory statutory reserve; the role of effective and efficient management of its liquidity cannot be over-emphasized. Series of banks failure significantly linked to liquidity risk due to non-maintenance of optimum liquidity arising from the mismatch between asset and liability have been witnessed in the Nigerian banking sector. Liquidity according to Abogun et al. (2014) is regarded as being fundamental in banking operation. Just as blood is important to our body system for daily survival, so also is liquidity for banks' daily operation and stability. The recent global financial crisis of 2007-2009 according to Díaz and Huang (2017) has provided a convincing argument on immediate erosion of liquidity and how such incidence can persist for long. For banks to avoid illiquidity trauma, which can challenge their going concern, they must appropriately manage their liquid resources. An efficient liquidity management strategy is specifically designed to balance liquidity and profitability tradeoff as the extreme pursuit of liquidity may lower profitability while lower liquidity may land banks into crisis (Idowu et al., 2017).

The major problem which has hindered effective and efficient financial intermediation is the illiquidity problem due to corporate governance failure which manifested in lending above single obligor limit, ineffective planning, ability to respond to changing business circumstances, and ignorance or lack of compliance with rule and laws regulating banking business and operation (CBN, 2006). This corporate abuse of the corporate governance system that has propelled the collapse of some Nigerian banks has further re-iterated the need to reform the corporate governance mechanism of the Nigerian banking system. For instance, between 1989 and 2011, a total of 124 banks were distressed (Ikoh et al., 2013). Therefore, the role of good CG practices in developing economies like Nigeria cannot be overemphasized. This is particularly true of Nigeria as laws relating to the protection of investors and other stakeholders' interests are not rigorously enforced. These afford the lucky managers the opportunities of fraudulent practices that are detrimental to the achievement of corporate objectives and maximization of shareholders' wealth. More often than not, the managers do abuse their privileged position in a way that is detrimental to corporate objectives which have had a devastating effect on banks' stability resulting in loss of fortunes in terms of billions of dollars by depositors and investors.

To address these problems, the CBN in 2006 developed a corporate governance code for Nigerian banks to make directors more accountable to stakeholders in an attempt to revitalize the banking sector for improved stability and protect depositors' interests as it is believed that well-governed banks are beneficial to bank stability and economic growth. Banks' ability to attain optimum liquidity position is significantly influenced by corporate governance practices (Yun, 2009; Fresard and Frochoux, 2004). Some authors in the past have documented that good CG assists in the proper management and safety of their cash resources which ultimately improve their liquidity position. Conversely, poor CG results in mismanagement of surplus cash, which is detrimental to performance (Dittmar and Mahrt-Smith, 2007). There exist growing numbers of empirics that have emphasized the relevance of good CG towards sustainable economic development by improving corporate performance thereby increasing their access to an external source of funds (Mehrabani and Dadgar, 2013). They argued further that good CG reduces the chances of firms falling into financial crisis; tends to reduction in transaction costs and cost of funds thereby propelling the development of the capital market.

While a plethora of studies have investigated CG and bank financial performance using profitability (Emeka et al., 2016; Isaac and Nkemdilim, 2016; Oyedokun, 2019; Mustapha et al., 2020), there are scanty studies in Nigeria that have examined its influence on liquidity management of Nigerian banks using secondary data. Besides from this, among few studies on

the subject; they have produced mixed and conflicting findings (see Obasi and Nkwagu, 2017; Olusanmi and Owolabi, 2015; Oyewole, 2019). Also, most of the few studies have focused on the static perspective with no study, to our knowledge, has addressed the dynamic interaction of CG and liquidity management of Nigerian banks. To address these gaps in the literature, this study, therefore, investigated CG and LM of Nigerian DMBs between 2012 and 2018 from a dynamic perspective which does not match most of the literature reviewed for this study. The choice of GMM as an estimation technique is informed by the fact that the number of observations is greater than the time series' and that liquidity is not a static variable as it changes from time to time across banks. The following specific research questions are therefore calling for answers in line with the observed gaps in the literature:

- i. How does board size affect liquidity management of Nigerian DMBs?
- ii. How has board independence affected liquidity management of Nigerian DMBs?
- iii. To what extent has gender diversity affected the liquidity management of Nigerian DMBs?
- iv. How does board meeting impact liquidity management of Nigerian DMBs?

## **Literature Review**

### *Conceptual Review*

#### *Corporate Governance (CG)*

CG has attracted several definitions from a wide range of stakeholders due to the important roles it plays towards the success of an entity. It is defined by CBN (2006) as a system that reflects how entities' are governed and controlled in a manner that will maximize shareholders' value without taking for granted the expectations of the other stakeholders. The concept of corporate governance further attracted stakeholders' concerns following the collapse of Enron and other eminent companies in developed countries. The Nigerian banking sector for instance has been a victim of corporate misconduct which preceded the collapse of some banks arising from abuse and deficient corporate governance practices. CG assists in the reduction of agency conflict through the provision of structure that helps in aligning manager interest with that of shareholders.

#### *Board Size*

The size of the board depicts the population of directors on board. There exist mainly two schools of thought on the nexus between Board size and performance. Interpersonal Communication is less effective in boards with larger sizes as compared to when the board size is small. This further gives rise to the problem of understanding and coordinating, likely to result in faction and gang up (Chales et al., 1989). On the other hand, the second school of thought is those with the view that larger board size assists in better decision making as the size helps in reducing the domineering tendencies of the Chief Executive Officers.

#### *Board Independence*

Outside directors (those not holding executive positions in the firm) are with independent status. They possess integrity, good character, and independence of mind and can reduce agency crisis through creating congruence between the interest of shareholders and that of other stakeholders thereby making managers more answerable to shareholders and other important stakeholders. According to Marra et al. (2011), non-executive directors' main task is to enhance financial reporting transparency. Therefore, the presence of outside directors will enhance corporate

performance and make banks stronger. Board independence can therefore be assumed to assist banks in the proper management of their liquidity.

#### *Board Gender Diversity*

This refers to women's representation on the board. According to Holton (1995); Burgess and Tharenou (2002) there has been high involvement of women at the top positions of some firms which may affect board composition and the overall corporate governance.

#### *Board Meetings*

This is the number of times directors hold meeting for a given accounting period. Board meetings according to them are important as it enables them to pass a resolution and it affords them the opportunity of considering different decisions and quickly reaching a compromise (Khan, Ilyas, Javid, Visvanathan, & Jegatheesan, 2011). Boards with regular meetings are therefore associated with enhanced performance as better decisions that will enable the board to effectively manage the affairs of the business can be made on a timely basis to address challenges at hand. This can also assist them in making better decisions that will facilitate optimum liquidity management.

#### *Theoretical Review*

##### *Agency Theory*

This is likening the relationship between the shareholders and managers to that of a master and agent. Yunos et al. (2011) and Habbash (2010) efficient corporate governance assists in reducing the incidence of conflicts between the shareholders and the managers. Principals are the shareholders while the appointed managers are regarded as the agents. Information asymmetry according to Eisenhardt (1989) propels conflict of interest which enables agents to maximize their self-interest as against that of shareholders. Hence, the view of a significant relationship between CG and firms' performance is supported by agency theory as firm performance can be enhanced through the attainment of principal's objectives (Jensen and Meckling, 1976). To align the interest of managers to that of shareholders, Agency theory advocates for the use of compensation and incentives to support the concentration of power in the directors. For this, Jensen and Meckling (1976) asserted that the agency relationship is all about granting decision-making power to the agent. For banks therefore to maintain optimum liquidity, there is a need of ensuring that the appointed managers act rationally as they may make sub-optimal decisions that may halt the liquidity position in an attempt to protect their selfish interest.

##### *Stakeholders Theory*

Stakeholders' theory was introduced to correct the myopic assumption of agency theory, perceiving shareholders as the only important group in any entity (Coleman, 2007). The stakeholders of a company can be grouped into primary and secondary. The stakeholders whose interests must be fully protected are customers, creditors, banks, government, employees, and the public with each group with different objectives (Freeman and Evans, 1990). The relevance of this theory to this study of corporate and liquidity management is based on the fact effective corporate governance will assist in reducing agency problems by ensuring that all the interests of stakeholders are fully protected. For instance, banks must maintain optimum liquidity to satisfy withdrawal demand and abide by the regulatory reserves of the Central Bank. Also, for banks to be able to pay

a dividend to shareholders, pay tax to the government, and engage in social responsibility it must be liquid. Sustaining the confidence of the public according to Fadun (2017) is central to banks' survival; hence good corporate governance can boost the confidence of the investors for better decision making.

### *Empirical Review*

Mustapha et al. (2020) using random-effects on 15 Nigerian quoted banks from 2013 to 2015 discovered that board independence, board gender diversity, and board size have no significant negative influence on ROA while board meetings and banks age had a significant negative influence on ROA. The study further revealed that bank size significantly affects ROA and the effect is positive. Oyedokun (2019) using regression analysis on data of 14 DMBs in Nigeria from 2013 to 2017 that board gender diversity and board meetings have a significant indirect effect on profitability. Further findings show board size and board independence have an insignificant indirect effect on profitability.

Emeka et al. (2016) found a significant positive effect of board size and board independence on profitability. Isaac and Nkemdilim (2016) found the existence of a significant indirect effect of board size, board composition on profitability while ownership structure exerts direct and influence on banks profitability.

El-Masry et al. (2016) using data from 900 CCG banks from 2003 to 2012 discovered that role duality and board size exert an indirect but significant effect on risk management, by contrast, board independence exerts an insignificant effect on risk management. Government ownership positive effect on risk management

Oyewole et al. (2015) focused on 19 quoted banks in Nigeria from 2005 to 2009. The result provides the existence of a significant indirect effect of board composition and total assets on liquidity risk. Furthermore, director interest and board duality could not significantly drive loan to deposit ratio while board size and committee independence have a positive insignificant effect on liquidity risk. Contrarily, statutory committee positively and significantly affects liquidity risk management of Nigerian banks. Obasi and Nkwagu (2017) in their study found board committees having an indirect but significant effect on liquidity risk. Mohamed and Khairy (2017) examined board characteristics and bank risk taken of 27 Egyptian banks from 2006 to 2011 using Ordinary Least Square. Board size and CEO duality were found to be positive and significant drivers of risk while no outside directors exhibit negative significant drivers of insolvency and liquidity risk. Board female is negatively significant with insolvency and liquidity risk, while it is positively significant with credit risk.

Díaz and Huang (2017) examined corporate governance and liquidity creation of the U.S. by obtaining data that span from before, during, and post-financial crises. The findings show the existence of a significant positive effect of corporate governance on the liquidity creation of larger banks. It was further documented that chief executive qualification, remunerations, progressive practice, and ownership structure have a larger effect on liquidity. The study further affirmed the presence of the positive effect mostly when larger banks regarded as high liquid creators are in crisis. Ikoh et al. (2013) using primary source of data obtained from a questionnaire administered on five commercial banks found that the expropriation of shareholders by shareholders can be reduced through a good corporate governance system while it does not reduce bank turmoil. Lasisi et al. (2018) obtained data of 14 Nigerian DMBs from 2011 to 2016 and discovered that board size indirectly but largely drives EPS and ROE while liquidity risk could not largely reduce EPS and ROE. Aebi et al. (2012) found that the reporting of CRO to BODs and not CEOs exert significant stock returns and ROE during the financial crisis. Contrarily, most CG variables exhibit no significant effect or even negative effect on banks' financial performance during the financial crisis. In Nigeria Abogun et al. (2014) used a

questionnaire to elicit data from the response and conducted ordinary least square on data obtained found that audit committee and auditors' independence positively drive liquidity management of Nigerian DMBs.

### Data and Methodology

The study sourced the relevant data from the annual reports and accounts of the sampled 10 DBMs for 7 years from 2012 to 2018. The study adopted an *ex post facto* research design as the data related to a past event and cannot be manipulated.

#### Dependent Variable

The only explained variable in this study is a loan to deposit ratio, a surrogate for liquidity management. Researchers like Kajola et al. (2019) have used it in their study.

#### Independent Variables

Four proxies: board size, board independence, gender diversity, and board meetings were used to surrogate for CG. These are described below in Table 1:

**Table 1.** Variable Measurements

Variable	Acronym	Measure	Expected effect
<b>Dependent variables</b>			
Liquidity	LDR	Total loan/Total deposit	
<b>Independent variables</b>			
Board Size	BS	Total number of directors	+
Board Independence	BI	Non-Executive Directors/ Total Directors	+
Gender Diversity	GD	Women Directors/ Total Directors	+
Board Diligence	BD	Total board meetings	+
Size	LASSET	Log of firm asset	+

**Source:** Research finding.

#### Model Specification

$$\text{Model 1: } \text{LDR}_{it} = \beta_0 + \beta_1 \text{LDR}(-1)_{it} + \beta_2 \text{BS}_{it} + \beta_3 \text{BI}_{it} + \beta_4 \text{GD}_{it} + \beta_5 \text{BM}_{it} + \beta_6 \text{LSIZE}_{it} + e_{it} \quad (3.1)$$

where:

$\text{LDR}(-1)_{it}$  = a period lag of loan to deposit ratio of bank *i* in period *t*

$\text{LDR}_{it}$  = loan to deposit ratio of bank *i* in period *t*

$\text{BS}_{it}$  = Board size of bank *i* in period *t*

$\text{BI}_{it}$  = Board independence of bank *i* in period *t*

$\text{GD}_{it}$  = Gender diversity of bank *i* in period *t*

$\text{BM}_{it}$  = Board meeting of bank *i* in period *t*

$\text{LSIZE}_{it}$  = Natural logarithm of total asset of firm *i* in period *t*

$e_{it}$  = Error Term of the firm in period *t*

### Discussion of Result

The descriptive table below shows the attributes of the data used in the analysis. Board size has a mean of 14.11429; ranging from 7.000 to 20.000. Board independence has an average value of 0.579 ranging from 0.455 to 0.895. Gender diversity averaged 20.2% ranging from 0.000 to 0.375. Board meeting averaged 6.01 and varies from 4.00 to 11.0. Log inverse of total asset averaged 21.08 ranging from 17.88 to 22.44. Finally, LDR, the explained variable, averaged 0.727 ranging from 0.364 to 1.077. Also, there is a high degree of consistency of the variables as their mean and median values are not too far from maximum and minimum values. As for Kurtosis, only loan to deposit ratio and gender diversity is platykurtic value is less than three while others are leptokurtic .3. Loan to deposit ratio, the board size, and gender diversification are negatively skewed while all others are positively skewed.

**Table 2.** Descriptive Statistics

	LDR	BS	BI	GD	BM	SIZE
Mean	0.726701	14.11429	0.579059	0.201581	6.014286	21.07711
Median	0.735814	14.00000	0.571429	0.214286	5.000000	21.25128
Maximum	1.076500	20.00000	0.894737	0.375000	11.00000	22.44036
Minimum	0.364000	7.000000	0.454545	0.000000	4.000000	17.87634
Std. Dev.	0.165220	2.732217	0.089675	0.092360	1.959687	0.913988
Skewness	-0.027901	-0.313980	1.630712	-0.249795	1.201869	-0.801193
Kurtosis	2.510231	3.195664	6.215053	2.136263	3.590116	3.638404
Jarque-Bera	0.708714	1.261806	61.17259	2.903930	17.86806	8.429739
Probability	0.701624	0.532111	0.000000	0.234110	0.000132	0.014774
Sum	50.86904	988.0000	40.53414	14.11068	421.0000	1433.243
Sum Sq. Dev.	1.883529	515.0857	0.554873	0.588598	264.9857	55.97007
Observations	70	70	70	70	70	70

**Source:** Research finding (2020) Using E-views 9.

The correlation matrix below shows a negative association between BS, BI, and GD while BM and Size are positively correlated with liquidity ratio. There is no problem of multi-collinearity as no explanatory variable has up to 82% coefficient (Gujarti, 2003). This shows that regression analysis will produce a reliable result.

**Table 3.** Correlation

	LDR	BS	BI	GD	BM	SIZE
LDR	1.000000					
BS	-0.247027	1.000000				
BI	-0.305395	-0.098771	1.000000			
GD	-0.174011	0.259143	0.090568	1.000000		
BM	0.240884	0.120852	0.061738	0.192662	1.000000	
SIZE	0.079555	0.150267	0.128419	0.254048	0.239442	1.0000

**Source:** Research finding (2020) Using E-views 9.

#### Regression Analysis

Table 4 reveals the result of the Generalized Method of Moment (GMM) capturing the effect of CG on liquidity management of Nigerian DMB for 7 years (2012- 2018). The finding showed that the previous year's liquidity ratio has a positive and significant effect on the current year's liquidity ratio. This implies that there is a dynamic interaction between the variables of the study which makes dynamic analysis permissible.

**Table 4.** Regression Analysis for Corporate Governance and Liquidity Management

Regressors	Pooled OLS Estimation			Fixed Effect			Random Effect		
	Coeff	t-stat	p-val	Coeff	t-stat	p-val	Coeff	t-stat	p-val
Constant	0.891492	2.460121	0.0173	2.453196	0.969209	0.3380	0.891492	2.441769	0.0181
LDR(-1)	0.751776	6.537452	0.0000	0.681243	3.650222	0.0007	0.751776	6.488685	0.0000
BS	-0.004040	-0.706290	0.4832	-0.001154	-0.156072	0.8767	-0.004040	-0.701021	0.4865
BI	-0.292070	-1.829300	0.0732	-0.519038	-1.690977	0.0983	-0.292070	-1.815654	0.0753
GD	-0.000707	-0.004105	0.9967	0.128583	0.544135	0.5892	-0.000707	-0.004074	0.9968
BM	0.007281	0.954200	0.3445	0.003824	0.300143	0.7655	0.007281	0.947082	0.3481
SIZE	-0.023894	-1.282111	0.2056	-0.091238	-0.759767	0.4516	-0.023894	-1.272547	0.2089
R-square	0.632432					0.692729			0.632432
Adj.R-square	0.589188					0.582990			0.589188
J-stat	51.0000					42.0000			51.0000
Prob J-stat	0.00000					0.0000			0.0000
Durbin Watson	1.803501					2.085448			1.803501
Instrument rank						17			8
Hausman Test	6.411229	6	0.3787						

**Source:** Research finding (2020) Using E-views 9.

Findings further showed that BS negatively and insignificantly drives liquidity ratio. This means that BS is not an important determinant of liquidity management in Nigeria. This result validates the null hypothesis that board size exerts an insignificant negative impact on liquidity management of Nigerian DMBs. The finding shows a significant indirect influence of board independence on liquidity ratio. This implies that existence of independent directors on the board largely lowers the liquidity ratio of Nigerian banks. Gender diversity has negatively insignificantly affected liquidity management of Nigerian DMBs implying that more females on the board worsen bank liquidity. Board meetings however showed a direct but insignificant effect on liquidity ratio. This implies that frequent board meetings are associated with higher liquidity. Firm size as a control variable indirectly and insignificantly influence liquidity management meaning that larger banks are associated with lower liquidity ratio.

The value of the adjusted R-square of 58.9% implied that the almost 59% variation in liquidity management is caused by the corporate governance proxies and the control variable while the remaining 41% may be due to other variables outside the coverage of this study. The J-statistics measures the overall significance of the regressor in the model. J-statistics of 51.00 (0.000), which is significant at 5% and thus means that independent variables are jointly significant on explained variable

Durbin Watson's statistic at 1.803501 which is in the neighborhood of 2 implies that the model is serially correlated.

## Discussion of Findings

The study examined the effect of CG on liquidity management of 10 listed DMBs in Nigeria from 2012 to 2018 by extracting relevant data from the annual financial reports of the referenced banks. Findings showed a negative insignificant effect board size on liquidity management of listed DMBs in Nigeria. The findings imply that a larger Board Size may not be effective in ensuring bank strength in terms of its liquidity position. The agency problem may be more with a larger board than a smaller one which may make the board to be ineffective in core decisions making. Also, boards with larger sizes may have more directors take a loan from the bank which negatively affects its liquidity position as loans to directors may not attract sufficient interest as those granted to customers. Higher agency costs like directors'



remuneration and other benefits that are in the form of cash outflow to banks may also reduce bank liquid assets and therefore have less money to channel to loan to customers. This empirical outcome is in disagreement with that of Oyewole et al. (2015) which found positive but no significant effect of CG on liquidity risk of Nigerian banks also Mohamed and Khairy (2017) established a significant positive impact of board size on liquidity risk of banks in Egypt. Therefore, we fail to reject the  $H_{01}$  that board size has not significantly affected liquidity management of quoted DMBs in Nigeria.

Board independence is found to be negative but significant, implying that the more the outside-executive directors on the board, the lower the liquidity. This finding may be justified by the fact that most of those directors may not possess adequate knowledge of efficient management of banking operations and thus impede their ability to appreciate the importance of liquidity on the proper functioning of the banking sector. This empirical outcome corroborates early findings by Oyewole (2015) and Mohamed and Khairy (2017) that found a significant indirect influence of board independence on liquidity risk while it is in contrast with that of El-Masry, Abdelfattah, and Elbahar (2016) that found the influence to be insignificant.

Findings also showed that gender diversity indirectly and insignificantly impacts the liquidity ratio of Nigerian DMBs. Conversely, Mohamed and Khairy (2017) reported the significant negative influence of board females on liquidity ratio. We, therefore, reject the  $H_{03}$  that board independence does not significantly affect liquidity management of DMBs in Nigeria.

The further finding reveals that board meetings showed a direct but insignificant effect on liquidity management, implying that frequent board meetings favorably improve bank liquidity position even though it is not significant. We, therefore, fail to reject  $H_{04}$  that board meetings do not have a significant influence on the liquidity management of Nigerian banks.

Firm size has an indirect and no significant impact on liquidity management of DMBs, implying larger banks, in terms of size, are associated with low liquidity. This can be attributed to the fact that most of the sampled banks' asset structures may be dominated by the more non-current asset.

## Conclusion

The study examined the dynamic interaction of CG mechanisms on liquidity management of Nigerian quoted DMBs utilizing data of the 10 selected from 2012 to 2018. The study found negative and no significant effect of board size on liquidity management. Board independence negatively but significantly affects liquidity management. Gender diversity negatively but insignificantly while boarding meetings positively but insignificantly drive liquidity management of Nigerian banks. Firm size has no significant negative effect on liquidity management. Therefore, it is recommended that there should be a robust corporate governance structure put in place by deposit money banks to facilitate effective management of banks' liquidity position. The following are also recommended: the board size should always be evaluated from time to time to ensure that the board is not overpopulated; as a larger board size is prone to many problems, higher agency cost is needed to align the interest of agents to that of principals. This may further take a toll on banks' liquidity as the amount paid to directors represents the outflow of cash. Also, the outside directors should be independent in the true sense of it; priority must be given to their financial literacy and more importantly, they should be experienced in banking operations so that they can facilitate effective liquidity management. More importantly, the experience and the proficiencies as to proper management of financial resources of females' directors on the board should be considered before selection. The board should always meet regularly and deliberate on issues that are of significant relevance to banks' success in terms of their daily operation such as the one that borders on the management of

liquid resources. In all, the directors should always be sent on training that will enhance their skills towards optimum management of banks' liquid resources.

## References

- [1] Aebi, V., Sabato, G., & Schmid, M. (2012). Risk Management, Corporate Governance, and Bank Performance in the Financial Crisis. *Journal of Banking & Finance*, 36, 3213–3226.
- [2] Abogun, S., Fagbemi, T. O., & Balogun, R. B. (2014). Corporate Governance and Bank Liquidity: Evidence from Selected Banks in Nigeria. *CenterPoint Journal (Humanities Edition)*, 16(2), 191–204.
- [3] Burgess, Z., & Tharenou, P. (2002). Women Board Directors: Characteristics of the Few. *Journal of Business Ethics*, 37, 39–49.
- [4] Central Bank of Nigeria. (2006). Code of Corporate Governance for Banks in Nigeria Post Consolidation. Retrieved December 12, 2010 from <http://www.cenbank.org/OUT/PUBLICATIONS/BSD/2006/CORPGOV-POSTCONSO.PDF>
- [5] Coleman, A. K. (2007). The Impact of Capital Structure on the Performance of Microfinance Institutions. *The Journal of Risk Finance*, 8(1), 270–279.
- [6] Delis, M. D., Gaganis, C., & Pasiouras, F. (2009). Bank Liquidity and the Board of Directors. *MPRA Paper*, Retrieved December 7, 2010 from <http://mpra.ub.uni-muenchen.de/18872/>
- [7] Díaz, V., & Huang, Y. (2017). The Role of Governance on Bank Liquidity Creation. *Journal of Banking and Finance*, 77(1), 137–156.
- [8] Dittmar, A., & Mahrt-Smith, J. (2007). Corporate Governance and the Value of Cash Holdings. *Journal of Financial Economics*, 83(3), 599–634.
- [9] Eisenhardt, M. K. (1989). Agency Theory: An Assessment and Review. *The Academy of Management Review*, 14(1), 57–74.
- [10] Emeka, E., Ene, A., & Bello, I. E. (2016). The Effect of Corporate Governance on Bank's Financial Performance in Nigeria. *IOSR Journal of Business and Management (IOSR JBM)*, 18(11), 954–971.
- [11] Fadun, O. S. (2017). Risk Management through Corporate Governance: Implications on the Performance of Banks in Nigeria. *UNILAG Journal of Business*, 3(2), 147–170.
- [12] Fresard, L., & Frochaux, S. (2004). Corporate Investment, Cash Holdings, and Financial Constraints: Insights from Japan. Retrieved July 31, 2011 from [http://www.affi.asso.fr/uploads/Externe/6f/CTR\\_FICHTER\\_105\\_1226315078.pdf](http://www.affi.asso.fr/uploads/Externe/6f/CTR_FICHTER_105_1226315078.pdf).
- [13] Gujarati, D. N. (2003). *Basic Econometrics*. New York: McGraw-Hill/Irwin.
- [14] Habbash, M. (2010). The Effectiveness of Corporate Governance and External Audit on Constraining Earnings Management Practice in the UK (Unpublished Doctoral Dissertation). Durham University, United Kingdom.
- [15] Hausman, J. A. (1978). Specification Tests in Econometrics. *Econometrica*, 46(6), 1251–1271.
- [16] Holton, V. D. (1995). Women and Equal Opportunities: Creating a Level Playing Field. *Equal Opportunities*, 31, 904–907.
- [17] Idowu, A. A., Essien, M. J., & Adegboyega, R. (2017). Liquidity Management and Banks' Performance in Nigeria. *Issues in Business Management and Economics*, 5(6), 88–98.
- [18] Ikoh, I. M., Nsien, C. B., & Wokoma, T. N. (2013). Corporate Governance and Banks' Turmoil: Assessment of Shareholders Response. *Journal of Educational and Social Research*, 3(8), 39–47.
- [19] Isaac, J. E., & Nkemdilim, I. S. (2016). Corporate Governance and the Performance of Nigerian Banks. *International Journal of Economics, Finance and Management Sciences*, 4(2), 39–45.
- [20] Jensen, M. C., & Meckling, W. H. (1976). Theory of the Firm: Managerial Behavior, Agency Costs, and Ownership Structure. *Journal of Financial Economics*, 3(4), 305–360.
- [21] Kajola, S. O., Sanyaolu, W. A., Alao, A., & Ojunrongbe, O. J. (2019). Liquidity and Profitability: Evidence from the Nigerian Banking Sector. *Accounting and Taxation Review*, 3(2), 1–12.
- [22] Lasisi, I. O., Lateef, O. M., Irom, M. I., & Bulus, N. E. (2018). Corporate Board Size, Risk Management and Financial Performance of Listed Deposit Money Banks in Nigeria. *European Journal of Accounting, Auditing and Finance Research*, 6(1), 1–20.
- [23] Masry, A. A., Abdelfattah, T., & Elbahar, E. (2016). Corporate Governance and Risk Management in GCC Banks. *Corporate Ownership and Control Journal*, 13(3), 8–16.

- [24] Mehrabani, F., & Dadgar, Y. (2013). The Impact of Corporate Governance on Firm Performance: Evidence from Iran. *IJTEMT*, 2(3), 9-13.
- [25] Mohamed, G. A., & Khairy, E. (2017). The Relationship between Board of Directors' Characteristics and Bank Risk-Taking: Evidence from Egyptian Banking Sector. *Journal of Finance and Accounting*, 5(1), 24-33.
- [26] Mustapha, U. A., Rashid, N., Bala, H., & Musa, H. (2020). Corporate Governance and Financial Performance of Nigeria Listed Banks. *Journal of Advanced Research in Dynamical & Control Systems (JARDCS)*, 12(1), 5-10.
- [27] Obasi, A. I., & Nkwagu, L. C. (2017). Effect of Corporate Governance on Risk Management of Commercial Banks in Nigeria. *International Journal of Finance and Accounting*, 6(5), 145-153.
- [28] Oyedokun, G. O. (2019). Board Characteristics and Financial Performance of Commercial Banks in Nigeria. *Accounting and Taxation Review*, 3(2), 31-48.
- [29] Oyewole, O. S., Olusanmi, O., & Owolabi, F. (2015). Role of Corporate Governance in the Financial Crisis: Evidence from Nigerian Banks. *Journal of Accounting and Auditing: Research & Practice*, 2015(2015), 1-14.
- [30] Pandey, I. M. (2005). *Financial Management* (9<sup>th</sup> Ed.). New Delhi: VIKAS Publishing.
- [31] Yun, H. (2009). The Choice of Corporate Liquidity and Corporate Governance. *Review Financial Studies*, 22(4), 1447-1475.
- [32] Yunus, R. M., Smith, M., Ismail, Z., & Ahmad, S. A. (2011). Inside Concentrated Owners, Board of Directors, and Accounting Conservatism. *Annual Summit on Business and Entrepreneurial Studies. Proceeding*, Retrieved from <https://www.researchgate.net/>



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