

RESEARCH ARTICLE

Cashless Policy and Profitability of Quoted Deposit Money Banks in Nigeria

Alika Blessing¹, Okolie, O. Augustine², Ebiaghan, Frank O¹

¹*Department of Accounting, Delta State University, Abraka, Nigeria.*

²*Professor of Accounting, Delta State University, Abraka, Nigeria.*

Received: 19 October 2025 Accepted: 05 November 2025 Published: 07 November 2025

Corresponding Author: A.O. Okolie, Professor of Accounting, Delta State University, Abraka, Nigeria.

Abstract

This study investigates the effect of digital financial reforms and cashless policy on the level of profitability of quoted deposit money banks in Nigeria. Using an ex-post facto research design, panel data was obtained from the yearly audited and published annual reports and accounts of five quoted deposit money banks from 2013-2022. The variables of interest were the cashless policy measures(automated teller machine, NIBBS instant payment, web, mobile banking, cheques, NEFT, and point of sale transactions), and profitability measure which is profit after tax. Data obtained were analyzed using descriptive statistics (mean, minimum and maximum values & standard deviation) and inferential statistics(multiple regression models).

The regression results revealed that automated teller machine, NIBBS instant payment, web, mobile banking, cheques, NEFT, and point of sale transactions had significant effects on the level of profitability of quoted deposit money banks in Nigeria. The study recommends that quoted deposit money banks' technical staff should undergo continuous training in order to learn and develop competencies in contemporary development in electronic banking. SAlso, bank management should be encouraged to emphasize efforts to improve automated teller machine services in order to increase returns on investment because it may lead to increased customers' satisfaction and loyalty

Keywords: Cashless Policy, Electronic Banking, Profitability, Digital Financial Reforms.

1. Introduction

The current monetary system is the consequence of decades of continual evolution. It all started as a barter economy and has evolved multiple times due to the limits of subsequent systems. Electronic approvals and settlements issued by banks around the world have helped to shape the concept of a global community. The importance of banks in the expansion of any economy cannot be overestimated (Godswill, et al, 2018; Itiveh & Omoye, 2023). Customers in Nigeria had to physically visit a bank office to complete any type of transaction prior to the introduction of electronic payment years. The customers queue up, needed to, and speak with a teller for an extended period of time.

Most individuals are put off by inconvenience of the queue and occasionally break away out of rage. Bankers, IT specialists, business owners, and others have been pushing for years to do away with cash in favour of more adaptable, efficient, and cheap retail payment methods (Adu, 2016).

Electronic payments (e-payments) and other forms of electronic banking enables the cashless economy to grow. Electronic payments can be made via a variety of methods, such as online/internet banking, POS terminals, and mobile banking apps. Ikpefan, et al (2018) argued that widespread use of such channels is favourable to transition to a cashless society. A cashless economy is not a fictional society in which

Citation: Alika Blessing, Okolie, O. Augustine, Ebiaghan, Frank O. Cashless Policy and Profitability of Quoted Deposit Money Banks in Nigeria. Open Journal of Economics and Commerce. 2025;6(2): 6-12.

©The Author(s) 2025. This is an open access article distributed under the Creative Commons Attribution License, which permits unrestricted use, distribution, and reproduction in any medium, provided the original work is properly cited.

all transactions take place digitally and no physical currency exists. In a cashless economy, people and businesses can perform financial transactions without ever touching physical currency, relying instead on electronic payment systems such as credit and debit cards. The goal of cashless policy is to eliminate high cost of cash, risk of carrying cash, enormous subsidy, the informal source, inefficiency, and corruption caused by the widespread usage of physical currency in the economy.

The Central Bank of Nigeria's (CBN) cashless economy policy plan however, is a positive step while the programme's long-term survival is dependent on end-user acceptance and compliance (Muotolu & Nwadiakor, 2019). The growth of ICT has enabled the global acceptance of cashless banking. The transition to cashless banking in Nigeria has changed the way the government, businesses, and citizens manage their money. This might have caused numerous complications in the society. The cashless policy has resulted in the emergence of numerous new kinds of cashless payments. The most common types of electronic payment hardware in Nigeria are automatic teller machines (ATMs), point-of-sale terminals (POSs), mobile money transfers (MMTs), and online money payments (WEBs).

Furthermore, the CBN implemented a cashless policy that increased the significance of e-products such as ATMs, POS terminals, mobile and internet banking, NIBBS Electronic Funds Transfer (NEFT), and NIBBS Instant Payment (NIP) transactions. This is now feasible due to widespread advancements in ICT. To remain relevant and competitive in the face of the challenges posed by the cashless policy, deposit money banks made significant investments in ICT. Despite the significant operating costs associated with a cash-based economy, most Nigerian banks are well-known for the large profits they report each year (Okafor, 2020). Nigeria's cashless policy has significantly benefited the country's thriving commercial sector. Cashless practices, however, have been linked to an increase in fraud and other sorts of dishonesty because cashless policy relies only electronic money transactions.

Nigeria has experienced a surge in cybercrime and fraud in recent years, as well as an unstable network infrastructure (Ogbeide & Fapohunda, 2017). It has been noted that there are challenges associated with the implementation of a cashless policy; Akhalumeh and Ohiokha (2011) showed that 34.0% of respondents highlighted the issue of online fraud, 15.5% cited the issue of restricted POS/ATM, 19.6% listed the issue

of illiteracy, and 30.9% were agnostic. Furthermore, the majority of Nigerian studies on cashless policy used various factors rather than the most recent data. This study sought to close these gaps. Although Onoh (2017), Itiveh and Omoye (2023), might have rightly argued that electronic money contains technological and economic components, yet how to describe it remains an issue.

2. Review of Related Literature

2.1 Cashless Policy

Ogbeide and Fapohunda (2017) describe a cashless policy as having no transaction frictions that may be eased by the usage of money balances, and hence providing a purpose for maintaining such balances even when they earn a rate of return. Money would continue to be a means of exchange for goods and services for the foreseeable future, hence it was emphasized that a cashless policy does not mean its extinction. It is a monetary system that encourages the use of electronic payment methods, reducing the demand for actual currency. Contrary to popular belief, the term "cashless economy" refers to a system in which only the most important monetary transactions take place with cash (Adu, 2016).

The phrase "e-banking" refers to the use of the internet to ease financial transactions and distribute associated information to customers. This is accomplished by using internet-connected devices such as desktop computers and laptops (Okafor, 2020). The bank promotes its services through its own website. In E-Banking, consumers' requests are received and processed through the same medium they used before the Internet. Customers may access banking services whenever they need them as a result of this provision.

2.1.1 Mobile Banking

The process comprises making monetary transactions with a cell phone. As a result, the phrase "mobile banking" (or "m-banking") refers to the supply and management of banking and financial services through mobile communication devices. Essentially, this is a technique of moving money between users, with funds coming practically instantaneously. Payment instructions are delivered over the card infrastructure, and receivers receive receipt confirmations via secure SMS. Because of the rapid rise of mobile phone usage and the low infrastructure investment necessary to support it, this new breakthrough has quickly become popular among customers. This product also supports account queries, transfers, recharges, password changes, and bill payments (Adu 2016).

2.1.2 Automated Teller Machine (ATM)

ATMs enable customers to execute financial transactions at any time and from any location. An ATM can be used for a variety of purposes, including cash withdrawals, account balance checks, fund transfers, topping up mobile phone airtime, and so on. A personal identification number (PIN) can be used to access a cardholder's account. The chemical bank in Rockville Center, New York, established the world's first public ATM in 1969. Nigeria became the world's first country to implement automated teller machines (ATM) in 1989. NCR was commissioned by the General Bank of Nigeria Society to establish it. ATMs are primarily used for cash withdrawals; hence they fall short of totally automating the economy and transforming Nigeria into a cashless society. The convenience of ATMs for depositors simply boosts the flow of funds into the economy. Credit and debit cards are required to facilitate Nigeria's transition to a cashless economy (Okafor, 2020).

2.1.3 Point of Sale (POS)

Customers can use this electronic payment method to check their balance, make purchases, and send money from a real retail store. Customers can use the device to pay for their products without physically giving over any cash. Customers pay for goods and services by inserting their credit card into a POS terminal and providing personal information. If the transaction is successful, the customer's account will be debited and the funds transferred to the merchant's account. Customers that pay using credit or debit cards can utilize a POS terminal to complete their transactions. Consumers can make retail purchases, cashless payments, cash back balance inquiries, airtime sales, mini-statement printing, and other transactions (Ikpefan, Akpan, Godswill, Grace, and Chisom, 2018).

2.1.4 NIBSS Fund Transfers

The Nigerian Interbank Settlement Scheme is an internet platform where banks exchange currency to facilitate quick payments between banks for single or multiple recipients with individual amounts not exceeding N10 million. While NIBSS fast payments are completed instantly, National Electronic Funds Transfer (NEFT) transactions are executed during the CBN's next available clearing session and are frequently deposited in the beneficiary's account the same or next business day. (Onoh, 2017).

2.2 Empirical Studies

The impact of cashless policy in Nigeria was researched

by Omotunde, et al (2013). The questionnaire has become the primary tool for conducting survey research. The majority of respondents agree that transitioning to a cashless society would benefit the economy by increasing the number of available jobs, reducing the frequency with which people are robbed, and increasing the number of international investors interested in the country.

Adeniyi and Olutayo (2015) discovered that people were pleased with their lives after implementing a cashless policy since it gave them easier access to financial services. Akhalumeh and Ohiokha (2012) conducted empirical study and discovered that instituting a cashless system was not without challenges. The empirical analysis revealed that 34% of respondents mentioned internet fraud, 15.5% mentioned limited POS and ATM availability, 18.69% mentioned illiteracy, and 30.99% remained neutral, indicating that the respondent was unsure of the problems they would face or expected to face under the cashless policy. They say that the cashless policy is having a lesser impact in Nigeria's rural communities due to isolated incidences of fraud, theft, and violence. People's preference for cashless policy is likely to rise as a result, supporting financial inclusion in some form or another.

According to Acha Ikechukwu (2012), the existing challenges with cashless banking can be addressed by the implementation of appropriate regulatory interventions and the commitment of other interested parties to the fundamental goal of microfinance banking. Yaqub et al. (2013) shed light on the constraints imposed by existing norms on the growth of cashless banking operations. In 2015, Alao and Sorinola conducted an empirical study on the influence of commercial banks' cashless policy on customer satisfaction in Nigeria's Ogun State. According to the study's findings, a cashless policy has the potential to improve consumer happiness, especially when applied through digital channels.

Ajayi (2014) investigated how a cashless monetary policy in Nigeria will impact the banking sector, finding potential issues and solutions. Odumeru (2013) proposed that in order to increase mobile banking usage in Nigeria, key stakeholders should focus more on its relative advantage, complexity, compatibility, trialability, and observability. According to Achor and Robert (2013) and Oghenero, Omoye and Odiri (2025), Nigerian policymakers with due process, are transitioning from a cash-based to a cashless economy. Okoye and Ezejiofor (2013) investigated the potential of cashless policies in Nigeria to improve economic

growth by examining their primary benefits and distinguishing qualities. They proposed numerous techniques for informing Nigeria's uneducated masses about the benefits of a cashless society. Mieseigha and Ogbodo (2013) conducted an empirical study of the positive benefits of a cashless economy on Nigerian economic growth.

3. Methodology

This study adopted the longitudinal research design because the variables under consideration have manifested and they were sourced for a period of time. There are 24 commercial banks in the country which therefore make up the entire study population. Zenith Bank, GTBank, Access Bank, UBA, and First Bank, the top five commercial banks in the country, serve as samples, and data on each variable is gathered in a time series from 2013 to 2022. Deposit money bank financial performance was modeled as a function of the average earnings of the five selected banks. In contrast, the ATM, NEFT, NIP, EBN, POS, CHQ, and WEB cashless tools are the independent variables used to measure the cashless policy.

Functional form:

$$\text{PERFF} = f(\text{ATMM}, \text{NEFTT}, \text{NIPP}, \text{EBNN}, \text{POSS}, \text{CHQQ}, \text{WEBB}) \dots\dots\dots (i)$$

4. Results

Table 1. Summary Statistics of Variables

Variable	Mean	Std.	Min.	Max,
PROFIT	948950.520	293810.490	667090	1454704.200
ATMM	54950.750	42820.8010	1561.740	165130.610
NEFTT	135410.990	15390.7320	10845.180	149460.460
NIPP	502340.140	507160.180	3891.0260	1582230.60
MBNN	17120.8180	24607.6230	18.980	72310.9650
POSS	17820.3050	27704.1430	31.020	90650.7530
CHQQ	78110.4810	52000.7680	4481.6690	223020.650
WEBB	240.42680	2520.87160	31.567360	6750.91670

Source: Using E-views 9.0 Software (2023)

From the table 1 above, over the years, banks have made an average profit of ₦94.9 billion, with a minimum of ₦66.7 billion and a maximum of ₦145 billion. The average annual value of ATM transactions over the study period was ₦5.5 trillion, with a standard deviation of ₦4,282 indicating that annual values varied widely around the mean. Annual values ranged from a low of ₦1.5 trillion to a high of ₦16.5 trillion. The total value of all NEFT transactions executed ranges from a low of ₦10.8 trillion to a high of ₦14.9 trillion every year, with an annual average of ₦13.0 trillion.

Over the years, the average value of NIP transactions

Econometric form:

$$\text{PERFF}_t = \beta_0 + \beta_1 \text{ATMM}_t + \beta_2 \text{NEFTT}_t + \beta_3 \text{NIPP}_t + \beta_4 \text{MBNN}_t + \beta_5 \text{POSS}_t + \beta_6 \text{CHQQ}_t + \beta_7 \text{WEBB}_t + \mu_t \dots\dots\dots (ii)$$

Where;

PERFF_t refers to the banks' performance during time period t .

ATMM_t corresponds to the quantity of ATM transactions during time t .

NEFTT_t signifies the quantity of NEFT transactions during time t .

NIPP_t indicates the volume of NIP transactions during time t .

MBNN_t represents the quantity of mobile banking transactions during time t .

POSS_t quantifies the volume of POS transactions during time t .

CHQQ_t denotes the quantity of cheque transactions during time t .

WEBB_t stands for the volume of web pay transactions during time

has been ₦50.2 trillion, with a minimum of ₦3.9 trillion and a maximum of ₦15.8 trillion in any one year. The average value of all mobile banking transactions handled was ₦1.7 trillion, with a low of ₦1.8 billion and a high of ₦7.2 trillion. From a low of ₦31 billion to a high of ₦9 trillion, POS transactions have processed an average of ₦1.7 trillion. The total value of all cheque transactions handled is ₦7.8 trillion, with a maximum of ₦22.3 trillion and a minimum of ₦4.5 trillion in any given year. Through its history, the web has handled transactions totaling an average of ₦240 billion per year, a low of ₦31.5 billion per year, and a maximum of ₦675 billion per year.

Table 2. *Regression Result*

Variables	Coefficients	T-Statistics	Prob. Value
ATMM	33.040	5.49580	0.04000
NEFTT	5.510	1.55130	0.26100
NIPP	3.420	4.62640	0.04170
MBNN	41.250	4.59660	0.04840
POSS	-42.330	2.89420	0.10150
CHQQ	1.140	5.19400	0.04050
WEB	-114.90	2.06770	0.17460
C	61.58	1.283	0.3281
Dependent Variable PROFIT			Sample: 2013-2022(13 Ob)
R-squared	.99480		Adj. R-squared 0.976986
F-statistic	55.5818		Prob(F-statistic) 0.017785
*indicates significance at 5% significance level			

Source: *Using E-views 9.0 Software (2025)*

Since the probability values of ATM transactions (.040), NIP transactions (.04170), mobile banking transactions (.04840), and cheque transactions (.04050) are all smaller than the 5% significance threshold, it may be concluded that these variables have a positive and substantial influence on bank profits in Nigeria. The probability values of NEFT, POS, and online transactions are all over the 5% significance level, suggesting that they have little to no effect on banks' bottom lines.

The only variables in the regression result where the signs of the coefficients are unexpected are POS transactions and online purchases. Table 2 displays the regression result, which indicates that the independent variables account for 99.25% of the variation in bank profits across Nigeria. The modified R-squared value is 0.9769%. This demonstrates that the model is accurate. Model F-statistics are 55.58, and a Prob (F-statistics) of 0.0177 indicates that the model's variables are jointly significant (p 0.05).

Table 3. *Impact of POS on Deposits of Banks*

Variables	Coefficients	T-Statistics	Prob. Value
POSS	9.0770	4.706210	.00150
C	787150.980	12.83880	.00000
Dependent Variable DEPOSITT			Sample: 2013 - 2022 (13 Obs)
R-squared	.73460		Adjusted R-squared .701470
F-statistic	22.1480		Prob(F-statistic) .00150
*indicates significance at 5% significance level			

Source: *E-views 9.0 Software (2025)*

The regression analysis presented in Table 3 examined the influence of Point of Sale (POS) transactions on consumer deposits in Nigerian banks. The result revealed a positive relationship, as shown by the coefficient of 9.077 for POS transactions. This indicates that as POS transaction volumes increase, the amount of money customers deposit also rises. Furthermore, the p-value of 0.0015 is well below the 5% significance level, confirming that this relationship is statistically significant. Therefore, it can be confidently stated that POS transactions play a significant role in encouraging customer deposits in Nigerian deposit money banks.

First, it was found that ATM withdrawals have no significant impact on the earnings of Nigeria's

deposit money banks, the findings provided contrary evidence. The regression result showed a p-value of 0.0400, which is less than the 0.05 threshold for statistical significance. This result demonstrates that ATM transactions do, in fact, have a meaningful influence on bank earnings. This result indicates that increased ATM withdrawals contribute significantly to the revenue performance of Nigerian deposit money banks.

Second, volume of NEFT (National Electronic Funds Transfer) transactions has any appreciable impact on bank earnings in Nigeria. The regression output revealed a p-value of 0.2610, which is above the 5% level of significance. This suggests that NEFT transactions do not have a statistically significant

influence on the earnings of banks. Consequently, it was concluded that the volume of NEFT transactions does not substantially affect bank profitability in the Nigerian context.

Overall, we evaluated whether electronic banking transactions affect the profitability of deposit money banks in Nigeria, the regression analysis returned a p-value of 0.0484 for the electronic banking variable (MBN). Since this p-value is slightly below the 0.05 level, it indicates a statistically significant relationship. This result implies that electronic banking activities have a positive and significant influence on bank profitability. The result supports the view that electronic banking enhances the financial performance of Nigerian banks.

Lastly, the analysis revisited the impact of POS transactions, this time in relation to customers' deposit behaviour. The earlier coefficient of 9.077 and the p-value of 0.0015 clearly pointed to a significant positive effect. This reinforces the conclusion that the volume of POS transactions directly influences the level of money customers deposit into their accounts. Therefore, it was affirmed that POS usage significantly drives deposit mobilisation for Nigerian banks.

5. Conclusion and Recommendations

The study's results suggest that the amount of ATM and E-banking transactions significantly affects the revenues of Nigerian deposit money banks, and that the volume of POS transactions significantly affects customers' deposits. Based on the results of the study, the study recommends that in order to improve and advance the Nigerian banking system, banks should send their technical staff to schools both inside and outside of the country for training in the most cutting-edge banking technology available.

Further more, high levels of customer happiness and patronage are a direct result of a bank's management focusing on efforts that improve ATM services and boost the ROA value of the bank. However, if banks worked together with the Central Bank and Financial Settlement companies like Interswitch, Union Pay, and MasterCard to ensure prompt reconciliation and increase the turnaround time in resolving disputes, they might be able to reassure their customers and encourage them to use cashless platforms more often. The Central Bank of Nigeria and other financial institutions need to do more to warn the general people about the perils of keeping significant sums of cash at home or in personal possession.

The study contributes to knowledge by establishing that ATM and e-banking transactions significantly enhance bank revenues, while POS transactions play a critical role in influencing customer deposits in Nigerian deposit money banks. This finding advances existing literature by differentiating the financial impacts of electronic banking channels, thereby offering a clearer understanding of their roles in revenue generation and deposit mobilization.

6. References

1. Acha Ikechukwu, A. (2012). Microfinance banking in Nigeria: Problems and prospects. *International Journal of Finance and Accounting*, 1(5), 106-111.
2. Achor, P. N., & Robert, A. (2013). Shifting policy paradigm from cash-based economy to cashless economy: The Nigeria experience. *Afro-Asian Journal of Social Sciences*, 4(4), 1-16.
3. Adu, C. A. (2016_a). Cashless policy and its effects on the Nigerian economy. *European Journal of Business, Economics and Accounting*, 4(2), 81-88.
4. Adu, C.A (2016_b). Cashless Policy and Its Effects on the Nigerian Economy, *European Journal of Business and Accountancy*. 4(2):23-34
5. Ajayi, L. B. (2014). Effect of cashless monetary policy on Nigerian banking industry: Issues, prospects and challenges. *International Journal of Finance and Business Management Research*, 2, 29-41.
6. Akhalumeh, P. B., & Ohiokha, F. (2012). Nigeria's cashless economy: the imperatives. *International Journal of Management and Business Studies*, 2(2), 31-36.
7. Alao, A. A., & Sorinola, O. O. (2015). Cashless policy and customers' satisfaction: A study of commercial banks in Ogun State, Nigeria. *Research Journal of Finance and Accounting*, 6(2), 37-47.
8. Commercial Banks in Ogun State, Nigeria. *Research Journal of Accounting and Finance*, 6(2), 37-48.
9. Godswill, O., Ailemen, I., Osabohien, R., Chisom, N., and Pascal, N., (2018). Working Capital Management and Bank Performance: Empirical Research of Ten Deposit Money Banks in Nigeria. *Banks and Bank Systems*, 13(2): 49-61.
10. Ikpefan, O. A., Akpan, E., Godswill, O. O., Grace, E and Chisom, N. (2018). Electronic Banking and Cashless Policy in Nigeria. *International Journal of Civil Engineering and Technology*, 9 (10): 718-731.
11. Itiveh, E.F., & Omoye, E. I. (2023). Cloud accounting and the economy system of small and medium enterprise in South-south Nigeria. *Researchjournali's Journal of Accounting*, 10(2), 1-24
12. Mieseigha, E. G., & Ogbodo, U. K. (2013). An empirical analysis of the benefits of cashless economy

- on Nigeria's economic development. *Journal of Finance and Account*, 4, 11-16.
13. Muotolu, P. C. and Nwadiakor, E. O (2019).Cashless Policy and Financial Performance of Deposit Money Banks in Nigeria. *International Journal of Trend in Scientific Research and Development*, 3(4): 465 – 476.
14. Odumeru, J. A. (2013). Going cashless: Adoption of mobile banking in Nigeria. *Arabian Journal of Business and Management Review*, 1(2), 9-17.
15. Ogbeide, S. O. and Fapohunda, F. M. (2017). Cashless Policy and Banks' Financial Performance in Nigeria: Empirical Assessment. *International Journal of Current Research*, 9(7), 55247-55252.
16. Oghenero, O. E., Omoye, E.I., & Odiri, V. I. O. (2025). Due Process and Organisational Governance in Civil Service Commission in Nigeria. *Journal of Business and African Economy*, 11(2), 48-60.
17. Okafor, C. A. (2020). Cashless Policy for Business Purpose and the Performance of Deposit Money Banks in Nigeria. *International Journal of Innovative Finance and Economics Research*, 8(3): 1-13.
18. Okoye, P. V. C., & Ezejiofor, R. (2013). An appraisal of cashless economy policy in development of Nigerian economy. *Research Journal of Finance and Accounting*, 4(7), 237-252.
19. Omotunde, M., Sunday T. and John-Dewole, A.T. (2013).Impact of Cashless Economy in Nigeria. *Greener Journal of Internet, Information and Communication Systems*, 1 (2): 40-53.
20. Onoh, J. K. (2017). Dimensions of Nigeria's Monetary and Fiscal Policies: Domestic and External. Astral Meridian Publishers: Aba.
21. Yaqub, J. O., Bello, H. T., Adenuga, I. A., & Ogundeji, M. O. (2013). The cashless policy in Nigeria: prospects and challenges. *International Journal of Humanities and Social Science*, 3(3), 200-212.