IMPACT OF ELECTRONIC BANKING ON CUSTOMER SERVICE IN NIGERIA

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ABSTRACT

This study was aimed at exploring the impact of electronic banking on customer service delivery in Nigeria using six selected banks in Lagos metropolis. Questionnaire was distributed to sample of selected staff and customers of the banks for purpose of data collection. Frequencies and percentages were the basic statistical tool used to analyze the data. SPSS windows software Statistical least square method and ANOVA were applied to test the hypothesis. The result of the analysis showed that bank customers have become aware of electronic banking products and despite the challenges associated with its use, majority of the respondents have embraced electronic banking. The test of hypothesis revealed that there is positive relationship between electronic banking and customer services in our banks. Based on the findings, the study recommends among other things that banks should aggressively embark on education and enlightenment of its customers on the use of electronic banking products to minimize series of challenges faced by customers presently.

KEYWORDS: *Electronic Banking, Internet, Customer Service, Commercial Banks.*

INTRODUCTION

A bank is a financial institution given license by relevant government authority to accept deposit from the public and render other financial services such as wealth management, payment services and foreign exchange services. Banks are categorized into Commercial, Investment, Mortgage and

Microfinance all performing different functions. Other services rendered by banks include account opening, debit and credit card issuance, loan disbursement and insurance.

Before the advent of computer, bank records are kept manually. Due to the difficulty in manual banking, computerization was introduced. Computerization started in the banking industry since the 1950s and it was first introduced in Bank of America. There has been transformation in the way bank render its services in the past two decades, each decade bringing different innovation. Today, you do not need to leave your house to get your banking services. Information technology using computers has changed the way banks render their services.

Computerizations of banking services have enhanced their service and productivity especially in back office activities and account maintenance. The banking industry is in stiff competition today as both big and small banks can access the same technology and can compete effectively in the market. Banking software packages have enhanced the accuracy of accounts and records that bank personnel keeps.

The height of computerization of banking industry is electronic banking innovation. Electronic banking has enhanced the efficiency of banking services. It is a menu-driven specialized software packages that are tied to different products issued by banks. Through the use of different products customers in developing countries can now enjoy banking services which hitherto was only enjoyed in developed countries of the world. Allen *et al* (2001) defined electronic banking as acquisition of data and services through computer to its customers. Daniel (1999) in his own view looked at electronic banking as a platform given by banks to its customers to get access their account online and perform business transactions through internet.

Computerization has transformed various facets of life in commerce and business. Again, electronic banking has given banks a new face with which to woo customers to do business with them. Banking industry of today have embraced and extended electronic banking services to the remotest parts of the world. All over the world electronic banking services and products are now used as a competitive strategy (Delvin, 1995).

Electronic banking is already gaining ground in African banking industry. Madueme (2009) is of the opinion that if Nigerian banks are to compete globally, it must quickly embrace electronic banking and upgrade its services above that of customer expectations. Today for any bank to stay in business, customer service spiced with electronic banking products is a must as it transcends to greater opportunity for banks and their customers which ultimately leads to higher profitability for them. Banks that want to remain competitive are deploying greater resources ICT and its innovative platform. Banking industry of today are making use of Telephone, internet, Automated Teller Machines (ATMs), and many others technologies that have altered the mode of traditional banking.

All national and international banks in Nigeria have embraced and incorporated electronic banking in their day to day operation. In spite of all these efforts, many customers are still not satisfied with the new development; some of the customers especially the older ones still prefer to withdraw their money through the Teller in the banking hall rather than through the Automated Teller Machine. The reason given by some of them is that if there is any issue with regard to their account they prefer to relate the issue to the human teller rather than the machine. This has led to long queues still being witnessed in most banking halls especially in Lagos metropolis. The attitudes displayed by majority of the bank customers especially the elderly preferring the use of banking halls rather

than perform banking transactions electronically from their home gives rise to question of the need for electronic banking.

This study aims to explore these problems and other related issues which seem to have persisted in the banking industry for some time. The main purpose of this research is to assess the effect of e-banking services on customer service in Nigeria banking industry. Specifically, the study intends to;

i. Find out how electronic banking can further improve the service rendered by banks

ii. Determine the extent to which electronic banking services are embraced by customers.

iii. Examine the benefits and problems relating to electronic banking

The study hypothesis will test whether there is a relationship between electronic banking and customer satisfaction. It will also test whether the practice of electronic banking has significance influence on customer patronage of bank services.

LITERATURE REVIEW

Concept of Electronic Banking

Electronic banking means the transfer of funds through an exchange of electronic signals rather than through paper like instruments like cash, checks etc. It is synonymous with internet banking, telephone banking, and mobile banking. Electronic banking is also the process of delivering banking services and product through electronic channels such as telephone, internet, cell phone etc. Banking customers and other stakeholders can interact and transact with the bank seamlessly through a variety of channels such as internet and other wireless devices. Electronic banking bridges the gap and limitations of place and time as they can bank anywhere, anytime since these services are available twenty four hours without any physical limitations of space like a specific bank branch, city or region. Earl (2000) defined electronic banking as a bank product that enables customers to operate their account online in an easy and safe way. Customers to get services any time and any place or from comfort of their home without visiting a bank branch or office. Electronic banking takes the form of the following;

➢ Automated Teller Machines (ATMs)

➢ Telephone banking

➢ Personal computer banking

➢ Internet banking

➢ Branch networking

➢ Mobile banking

Benefits of Electronic-Banking

One of the outstanding benefits is that it puts the bank on the competitive edge above its competitors. It is one of the rebranding techniques adopted by banks as they use it to be identified as technologically advanced banks. It has also led to increase in profitability of banks.

According to Essinger (1999), e-baking brought a revolution in the industry as most tasks that use to be laborious in execution can now be done with ease and more transactions accomplished than before. Since most transactions are done outside the branch less cost are incurred and less staff are

employed at the branches. Jun and Cai (2001) opined that it has opened doors of business opportunities around the world through various innovations and products introduced to the system.

Furthermore e-banking has bridged the gap between buyers and sellers and has facilitated exchange of goods and services with both parties meeting physically (Timothy,2012). Ikechukwu (2001) demonstrated that e- baking has increased the profitability of banks arising from numerous transactions undertaken by banks and the scope of coverage. The use of credit card and ATM card has facilitated electronic commerce enabling customers to do worldwide shopping which in turn impacts on the bank's profitability

Challenges of Electronic- banking

Electronic banking as good as it is with the attendant benefits poses a risk to banks. Ahmad and Al-Zubi (2011) recommended that management of banks should identify the risk related to e-banking and deal with it before exposing customers to avoidable risk. Poor Planning and investment in e-banking can increase financial institution's strategic risk. Huge investment is required in acquiring trusted brand that has incorporated the issue of risk in its production. The risks which customers are usually exposed include; fraud, networks and system errors, password exposure and wrong account operation.

Another challenge of e-banking identified by Economist Journal (1999) is the issue of security which can be categorized into three; fraud and theft, hackers and errors in system design exposing it to security breaches. This form of insecurity has legal and financial implications. Other challenges of e-baking have to do with knowledge and working of the products. Most bank employees do not understand the working of the products not to talk of properly educating the customers on the usage. There is therefore need for capacity building on of the employees and development of infrastructure that can carry the e-baking platform.

However despite these issues, most banks are rising up to the occasion by ensuring that their system architectures are well safeguarded against security lapses. Through the promotion of market discipline, majority of banks now ensures soundness and safety of their banking system. This ensures that customer rights and public confidence are entrenched in the system.

Customer Service

Customer service can be defined as the level of satisfaction received by a customer compared to a satisfaction goal set by organization over its products or services (Alex,2019). Customer satisfaction is measured by a person's feeling or perception of the performance of a product or service in relation to his expectation (Alex, 2019). Customer service therefore relates to how a product or service meets the expectation of customers at a particular point in time. A service that exceeds customer's expectation creates a sense of satisfaction and brings positive goodwill to an organization in its entirety. This leads to positive perception of the organization which in turn breeds customer loyalty and trust towards the organization..

Customer service is therefore a measure of relationship between an organization and its customers and brings out its image to the outsiders. An organization that wants to develop its customer service strategy must focus on the relationship between the employees themselves and the customers as a whole. Customer service encompasses the provision of service before, during and after purchase of a service or product. It is expected that employees of an organization must align themselves to different categories of customers in order to meet their varied expectations. To meet this goal, organizations that value customer service must spend money to train their employees

towards meeting or surpassing customer's expectation. This can also be achieved by proactively getting feedbacks from customers and working on those feedbacks.

Customer services are provided either through a service representative or through automation. Automation of customer service always ensures that it is provided 24 hours and usually complements the one rendered by service personnel. Artificial Intelligence (AI) is now becoming a popular means of providing customer service. The benefits of AI are that it interacts with customers as if you are interacting with human being. Interactive voice response is another type of automation that applies touchtone telephone to interact with customers. Its main menu uses keypad as options in the interaction (eg Press 1 for English, Press 2 for Yoruba etc).

The advent of internet has changed the face of customer service by eliminating human interaction as transactions are done on-line. Customers are therefore shortchanged by elimination of that interaction but it is recommended that such could still be incorporated in the on-line transactions.

Empirical Review

Research have been conducted in developing and developed countries on the effect of electronic banking on customer service in financial industry. The outcome of some of the research confirms that there is a positive correlation between electronic banking system and services rendered to customers in a bank.

Bello (2005) used data collected from three banks and 155 customers to know the level of patronage of electronic banking in these banks. The outcome of the research shows that even though majority of customer's patronize electronic banking, they still find their way to banking hall to carry out their transactions. He also found out that most customers are dissatisfied with the quality and efficiency of electronic banking products.

Balachandher (2001) in research conducted with 360 customers sampled from 6 banks found out that all the banks have websites and are all engaged in electronic banking. The study revealed that despite the facts that all the banks have electronic banking products; customers do not patronize their SMS platform and other products. The bank customers are also delighted with the electronic banking facilities that the banks put in place.

Woldie, Hinson, Iddrisu, and Boateng,(2008) investigated on how the relationship between firms and banks can be the improved through electronic banking in Ghana. They carried out the investigation using a sample of 180 firms in 6 banks. The outcome of the investigation shows that 68% of the respondents have not even embraced electronic banking while 32% that have adopted it still stick to manual banking for fear of security of their funds.

Gerald and Cunningham (2003) researched on the level of awareness of electronic banking in Singapore using a sample of 60 customers in five banks. They found that majority of the customers are yet to develop the attitude of using electronic banking products even though they are aware of it. They recommended improvement in infrastructure and creation of more awareness among bank customers' as part of the strategy to improve the patronage of electronic banking.

In their own study, Ahasanul, etal (2009) used a sample of 265 customers that has internet banking to find out if there is a link between electronic banking quality and customer service in Malaysian banking industry. The result proved that there is a strong relationship between electronic banking and customer service.

Cheung and Liao (2002) undertook a study on the use of mobile banking for financial inclusion.. TAM was employed to explore the benefits of mobile banking and ease of its use. The results showed that perceived risk in use affected the behavior of customers towards the use of mobile banking but the perceived benefits outweighed that of the risks and that increased the usage of such services. However it was discovered that the study did not consider all the electronic banking products thereby leaving a gap and doubt on the effect of other products like ATM and internet banking.

Boateng (2006) carried out investigation on the contribution of ICT on services rendered in Ghananian banking industry. The outcome of the study is that ICT has not gained root in Ghananian banking industry and went ahead to make several recommendation among which are; banks to develop user friendly systems and applications, government to build key infrastructures that will enhance ICT development and banks to come up with electronic products and services that will reduce customer's turnaround time and give customers opportunity to do transactions 24 hours at comfort of their homes.

Theoretical framework

This work is hinged on technology acceptance model (TAM). This theory is about the level of acceptance and use of new technology. As suggested by the model, when users are offered new technology, some factors influence their decision on how and when to use it one of which is perceived usefulness. This was defined by Davis as "the degree to which a person believes that using a particular system would enhance his or her job performance".

Perceived ease-of-use was defined by Davis as "the degree to which a person believes that using a particular system would be free from effort" (Davis,1989).The theory which is the most widely used innovation model explores the factors that influence individual's use of new technology and enables us to predict the extent of their acceptance, The theory does not limit potential consumer's choice of new technology. In some cases consumers has some constraints that can prevent them from adopting new technology but in most cases such challenges are overcame.

According to this theory, electronic banking saves costs making banking easy and convenient to customers thereby expanding their market. Delvin (1995) found that the advancement of mobile technologies gave room for financial industries to come up with financial innovations.

Research Method

Survey design has been employed for the purpose of this research in order to answer the research questions and test the hypotheses formulated. The population will be the whole banks in Lagos State where majority of banks in Nigeria had its head offices. This population was stratified into first generation banks and new generation banks.

The first generation banks selected are; First Bank of Nigeria Plc, Citibank, Ecobank, Fidelity bank, First City Monument bank, , Stanbic IBTC bank, Union bank Nigeria, United bank for Africa, Wema bank, Access bank plc

For the new generation bank they are; Enterprise bank, Guaranty Trust bank, Keystone bank, Zenith bank, Polaris bank , Jaiz bank, Hertiage bank and Sterling bank,

Six banks were purposively selected from the two categories of the banks, three from each categories base on customer patronage. For the first generation the researcher will choose, First

bank of Nigeria plc, Access bank plc and United bank for Africa, while for the new generation the researcher will choose Guaranty Trust bank, Zenith bank and Polaris bank.

From the entire population of bank staffs and customers selected, judgmental sampling techniques was used to reduce it to sizable number of 10,000 from the selected banks. This is further reduced to a manageable size by applying Taro Yameni's formula as follows,

$$n = N/1 + N (e)^2$$

Where n= sample size

N= population

e=margin of error (0.05 0n the basis of 95% confidence)

Therefore, n= $10000/1+10000(0.05)^2$

n= 10000/1+10000(0.0025)

n= 10000/1+25

n= 10000/26

n= 385

Using a population of approximately 10000 with the error of 5%, a sample size 385 is considered adequate as computed above.

The data collection instrument administered for the purpose of this research is the questionnaire. The questionnaire was subjected to reliability and validity test before being administered.

Data Analysis

Simple Percentages, Pie chart and bar chart will be used to analyze the data while linear regression analysis and ANOVA will be used to test the hypothesis in other to either accept or reject the null hypothesis.

Statistical package for social science (SPSS) software would be deployed for easy computation.

Analysis of Research Questions

Improving Customer Satisfaction

The table below summarizes the percentage of respondent to the options available for the questions under this category.

TABLE 1

S/N	QUESTIONS	SA%	A %	U %	D %	SD %
1	Customers knows all the electronic banking product available	42	22	8	13	15
2	Using electronic banking product has improve customer loyalty	37	28	12	8	15
3	Customer feel more comfortable using the electronic banking product for transaction	28	32	8	17	15

| 4 | Customer can use any of the electronic product at any time and any where | 28 | 30 | 12 | 20 | 10 |
| 5 | Using electronic devices in your banking transactions is cumbersome | 1 14 | 1 16 | 9 | 32 | 28 |

Source: Author's computation, 2019

From table 1 greater percentage of the respondent agreed that electronic banking has positively impacted on customer service and customer satisfaction. This is evidenced by the percentage of respondents that agreed and strongly agreed.

Level of Patronage

The table below summarizes the opinion of respondents as regards the level of patronage of electronic banking.

<div align="center">TABLE 2.</div>

S/N	QUESTIONS	SA %	A %	U %	D %	SD %
6	Electronic banking transaction in Nigeria has gained root	41	21	9	13	16
7	Customer patronizes electronic banking system on regular bases	45	45	0	6	4
8	current power rationalization has affected electronic banking patronage by customers	36	39	16	6	3
9	The issue of bad internet has really affected the patronage of electronic banking by customer	28	32	8	17	15
10	The overall patronage of the electronic banking service is high	43	44	8	4	1

Source: Author's computation, 2019

From table 2 above, majority of the respondents agreed that the level of patronage of electronic banking practices have increased tremendously as reflected in greater percentage under each question.

Benefits and Challenges

The table below summarizes the percentage of respondents in each option available for each question regarding the benefits and challenges of e-banking.

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TABLE 3.

S/N	QUESTION	SA %	A %	U %	D %	SD %
11	Electronic banking has challenges that discourages Customer from using it	43	44	8	4	1
12	security is a problem associated with electronic banking	30	33	17	13	7
13	Customers face difficulties every day using electronic banking	46	40	9	3	2
14	Electronic banking has increased bank deposit and profitability	39	44	7	4	6
15	Using electronic banking Is very easy and convenient	36	39	16	6	3
16	Electronic banking has decongested banking hall	46	48	2	2	2
17	Customers do transaction very fast using electronic banking	28	32	8	17	15

Source: Author's computation, 2019

From table 3 above, majority of the respondents agree or strongly agree that there are challenges they encounter when using electronic banking products but on the other hand they also agreed that there are enormous benefits associated with the use of electronic banking products.

Test of Hypotheses

The hypothesis of this study will be tested using regression analysis and analysis of variance (ANOVA) at 5% level of significance where a is the predictors i.e constant variable and b is the dependent variable, with (n-1) degrees of freedom of (r-1)(c-1), where n is the number of observation, r and c are the numbers of rows and columns respectively.

Hypothesis One

Ho: There is no significant relationship between electronic banking and customer satisfaction

Table 4: Model Summary				
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.221[a]	.049	.046	.541
a. Predictors: (Constant), Customer Satisfaction				

Source: Author's computation, 2019

The model summary in table 4 shows that the value for r (coefficient of correlation) is 22.1% and R-square (coefficient of determination) is 4.9%. The R-square value indicates that 4.9% of the variation in customer satisfaction is accounted for by increase in the use of electronic banking.

Table 5: ANOVA[a]						
Model		Sum of Squares	Df	Mean Square	F	Sig.
1	Regression	5.390	1	5.390	18.447	.000[b]
	Residual	104.609	358	.292		
	Total	109.999	359			

a. Dependent Variable: Customer Satisfaction b. Predictors: (Constant), CS

Source: Author's computation, 2019

In the above ANOVA table, the F value of the model is 18.447 and the p-value is 0.000[b]. This implies that the model used in this study is suitable for the data.

Table 6: Coefficients[a]

Model		Unstandardized Coefficients		Standardized Coefficients	T	Sig.
		B	Std. Error	Beta		
1	(Constant)	1.513	.087		17.295	.000
	Electronic banking	.115	.027	.221	4.295	.000

a. Dependent Variable: Customer satisfaction
Source: Author's computation, 2019

In Table 6 above, regression coefficient represents the mean change in the response variable for 1 unit of change in the predictor variable while holding other predictors in the model constant. The coefficient table reveals the impact of the increase in the use of electronic banking on customer satisfaction.

Based on the analysis in table 6, the following equation for regression line may be derived: Customer satisfaction = 1.513 + 0.115 (Electronic Banking).

The relationship between increase in the use of electronic banking and customer satisfaction is significant at 0.000.This shows that there is a positive significant relationship between increase in the use of electronic banking and customer satisfaction. This shows that an increase in the use of electronic banking brings about increase in customer satisfaction. This implies that one unit of increase in the use of electronic banking leads to 11.5% increase in customer satisfaction while holding other independent variables constant. We therefore reject the null hypothesis and conclude that there is significant relationship between electronic banking and customer satisfaction.

Hypothesis Two

Ho: The practice of electronic banking does not have any significance control on customer patronage.

Table 7: Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.203[a]	.041	.039	.543

a. Predictors: (Constant), Customer patronage
Source: Author's computation, 2019

The model summary in table 7a shows that the value for r is 20.3% and R-square is 4.1%. The R-square value indicates that 4.1% of the variation in customer patronage is accounted for by electronic banking.

Table 8: ANOVA[a]

Model	Sum of Squares	Df	Mean	F	Sig.

				Square		
1	Regression	4.555	1	4.555	15.464	.000[b]
	Residual	105.444	358	.295		
	Total	109.999	359			
a. Dependent Variable: Customer Patronage						
b. Predictors: (Constant), CP						

Source: Author's computation, 2019

In the ANOVA table above, the F value of the model is 15.464 and the p-value is 0.000. This implies that the model used in the study is suitable for the data.

Table 9: Coefficients[a]

Model		Unstandardized Coefficients		Standardized Coefficients		
		B	Std. Error	Beta	t	Sig.
1	(Constant)	1.437	.113		12.685	.000
	Electronic banking	.167	.043	.203	3.932	.000

a. Dependent Variable: CP

Source: Author's computation, 2019

The coefficient table above reveals the impact of electronic banking on customer patronage. Based on the analysis in table 28, the following equation for regression line may be derived as:

Customer Patronage = 1.437 + 0.167 (Electronic Banking).

The relationship between electronic banking and customer patronage is significant at 0.000. Therefore, this implies that there is a positive significant relationship between electronic banking and customer patronage. This implies that electronic banking account for 16.7% increase in customer patronage while holding other independent variables in the model constant. Since the relationship between electronic banking and customer patronage is significant at $p < 0.05$, we reject null hypothesis and conclude that the practice of electronic banking has significance control on customer patronage.

Summary of Findings

This study was embarked upon in order to find out the impact of electronic banking on customer service. This was done in a bid to provide answers to the research questions raised. As a result of analyses of data collected, the following were the finding obtained.

1. There is significant relationship between electronic banking and customer satisfaction

2. The practice of electronic banking has significance control on customer patronage

3. The practice of electronic banking has significant benefit to the customer and bank

CONCLUSION AND RECOMMENDATIONS

In conclusion, electronic banking in Nigeria is affected by security issues, customers face difficulties every day using electronic banking that borders on internet connectivity challenges and power rationalization. The Central Bank of Nigeria has a role to play in ensuring that bank customers get value for their patronage in addition to safety of funds entrusted in the care of banks.

The importance of electronic banking cannot be over-emphasized. Modern technology has made banking a lot easier and self-serving. However, Nigerians are greatly exposed to a lot challenges largely because majority of bank customers are not literate and academically exposed.

Adapting to new technology may not be easy for Nigerians but it is very essential if we have to meet up with cashless policy. It behooves on Nigerians to embrace and welcome electronic banking as an avenue to building our economy and bringing about financial stability in our economic system. The Central Bank of Nigeria has more to do to bring this to a reality.

As a result of this research, the following recommendations are deemed necessary for future research purposes:

a) There is an urgent need for Banks in Nigeria to intensify and sustain efforts aimed at enlightening their customers on the existence of these fraudsters and how to avoid falling prey to their schemes.

b) Banks in Nigeria should see and treat investment in security of their technology as a priority so as to ensure customers money and transactions are as safe as possible.

c) The governments as well as well-meaning private individuals are also encouraged to participate in this fight against electronic fraud.

d) Banks should use proper channels to educate customers properly on any new electronic banking products launched into the market to avoid fraudsters capitalizing on the ignorance of customers to defraud them.

e) Banks should create assessable platform for customer's problem resolution to encourage them to fully embrace electronic banking.

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