

## Effect of Electronic Accounting on Operations of Selected Commercial Banks in Nigeria

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### INTRODUCTION

The Banking industry of the 21st century operates in a complex and competitive environment characterized by these changing conditions and highly unpredictable economic climate. Information and Communication Technology (ICT) is at the centre of this global change curve of Electronic Banking System in Nigeria today (Stevens, 2002).

E-Accounting referred to as Electronic Accounting, a term used to describe an accounting system that relies on computer technology for capturing and processing financial data in organizations. In the literature, two more terms have been used to describe E-accounting: computer-based Accounting System and Accounting Information System (AIS). Stefanou (2006) observed that although accounting information system does not require a computer to function, the computerization of the accounting function, the term AIS is used primarily to denote the computer-based AIS. In this study the terms E-Accounting and financial information system are used to refer to any accounting system that depends on Information and Communication Technology (ICT) for performing its information system functions.

According to Kharuddin, Ashari, & Nassir, (2010) it is very clear that the computerized accounting system have improved the functionality of accounting departments by increasing the timeliness of financial reports. Financial reports have also been improved by computerized system cash flow statements; market shares reports and

### ABSTRACT

This study examines the effect of electronic accounting on operation of commercial banks in Nigeria. Specifically the study sought to determine whether e-accounting has restored customer's confidence on the safety of their fund and whether channel delivery system can sustain customer patronage. Survey research designs were adopted for the study. Data were collected through survey in which questionnaire was administered on a sample of 180 was purposively collected from population of selected banks. Data collected were analyzed by use of means and standard deviation and the formulated hypotheses were tested by the use of t-test and Analysis of Variance statistical tools. Findings show that emergence of e-accounting has restored confidence of the customers on the safety of their funds and delivery channels systems have helped to sustain customer's patronage in commercial banks. The findings of this study imply that e-accounting in the banking system has increased Patronage of banks customers. In fact, e-accounting has impacted positively on the banking system in Nigeria increasing its profitability, productivity and efficiency. Therefore, the researcher recommends that Central Bank of Nigeria should make it mandatory for all banks to embrace e-accounting.

**KEYWORDS:** E-accounting, Customer's satisfaction and Nigerian banks

departmental profit and loss are now more accessible with computerized system.

The application of Internet Accounting on Accounting Practice in Nigeria has become a subject of fundamental importance and concern to all business enterprise and indeed a prerequisite for local and international competitiveness. It is obvious that the way accountants plan and take decision on what and how to provide their services in the accounting profession has been affected immensely by internet accounting (e-accounting) (Shanker ,2008). This continued to change the manner in which accounting practice and their corporate relationships are organized world wide and facilitated the speed and quality services delivery in Nigerian banks and other accounting institutions.

There are some challenges associated with the use of internet banking such as poor infrastructure, continuous network failures and insecurity. It is presumed that growth within management accounting and electronic accounting system is coming alive with the advent of information and communication technology (ICT): Enterprise Resources Planning, system software (ERPSS) and ancillary equipment such as Automated Teller Machine (ATM) Debit cards, electronic commerce, computer hardware, data base, internet, intranet, extranet, telecommunication, oracle, tax software (TurboTax) sciences (SPSS). To restore confidence among customers most banks have devised a way of recording and reporting transactions. The manner in which

accountants can add value to economic entities and societies is undergoing changes. One of such measures was the impact of electronic accounting.

It is obvious that the biggest impact of E-accounting system has been made on accounting; and it is the ability of companies to develop the use of computerized system track and record financial transactions properly and accurately. The recording of business transactions manually on ledgers, papers, spread sheet etc has been translated and computerized for quick and easy presentation of individual financial transaction and give report on it (Gralund & Mountsen, 2003).

A vital message of this work is that researchers in accounting information system (AIS) and other areas of accounting such as financial, auditing, tax and managerial should work together on projects, as each party can learn great deal from the other, by so doing, a synergetic relationship arising from such teamwork hold a great potential to yield high-quality research results that can have notable impact on the accounting profession (Hunton, 2008). The use of e-accounting system in many organizations has assisted in reducing transactional cost, overcome the constraints of distance and have cut across geographic boundaries thereby assisting to improve coordination of activities within organizational boundaries (Shanker, 2008).

Importantly, since the inception of internet accounting system, computerized accounting system allows accountants to process large amounts of financial information and processes it quickly through the accounting system. Quicker processing time for individual transaction has also lessened the amount of time needed to choose out each accounting period. Transaction that would have taken an accountant months or years to prepare would be done quickly using electronic accounting.

In the recent past centuries, before the inception of information and communication technology (ICT), the banking industry witnessed lots of challenges due to increase in the awareness and utilization of banking services. The demand for bank services equally increased the staff strength and branches of most Nigerian banks. In Nigeria, customers of banks today are concerned not only about safety of their funds and increase returns on their investments; they also demand efficient, fast and convenient services.

Reem (2012) demonstrates the effectiveness of electronic accounting systems in providing appropriate financial information, which helps company administrations to take decisions related to operational alternatives and means which can be used to manage the crisis encountered by electricity companies. The electronic accounting and electronic audit concepts are basis for curbing the inefficiency in corporate organizations.

Despite the usefulness of electronic banking to organization and individuals, it has several challenges which cause inconveniences to these groups. These include customer being disappointed sometimes by ATMs- the machine is either faulty or short of money for transaction. Computers in the banking institutions do get faulty, corrupt or unable to operate because of network leading to customers queue for long hours. Also security-individuals are able to access other people's account either when they loss their ATM cards or, cheque books and other related items.

Wan Zakaria, Rahman and Elsayed (2011) Results of the study show that the adoption of E-Accounting within public sector agencies in Malaysia has significantly improved the budgeting, accounting and reporting, and auditing and controlling task performance of the public sector agencies. Siamak (2013) results indicate that implementation of e-accounting system at these companies caused to effect on financial performance with effects of internal control systems. Results also show that measures of risk are more closely associated with internal controls and will have effect on using e-accounting systems in these companies. Amaefule, and Iheduru (2014) Findings show, among other things, that the Nigerian public sector has not clearly operationalized e-accounting system and that it is of necessity that this system be activated in the sector's operational structures because corruption in the sector has been partly credited to its absence. It is against this backdrop that these studies seek to examine the effect of electronic accounting on the operation of commercial banks in Nigeria with regards to customer patronage sustenance and quality service delivery.

The broad objective of this study is to examine the effect of electronic accounting on the operations of commercial banks in Nigeria. The specific objectives of this study include:

1. To determine whether e-accounting has restored confidence of the customers on the safety of their funds.
2. To examine delivery channels system so as to determine if it can sustain customer's patronage in commercial bank.
3. To examine the operation of chip-cards so as to determine whether it can validate personal identification numbers, verify account balances and store personal records.

## REVIEW OF RELATED LITERATURE

### Conceptual Framework

#### Electronic Accounting

The new information and communication technologies represent a vector of development and an important component of the formal information system is represented by computerized information (Alves, 2010). Many traditional accounting tasks dealing with recording and processing of accounting transactions can be reliably automated. Thus, accountants add little incremental value to organizations in this regard anymore. Rather, an accountant's worth is now reflected in higher-order critical-thinking skills, such as designing business processes, developing e-business models, providing independent assurance, and integrating strategic knowledge (Hunton, 2002).

E-accounting is the application of online and Internet technologies to the business accounting function. Similar to e-mail being an electronic version of traditional mail, e-accounting is "electronic enablement" of lawful accounting and traceable accounting processes which were traditionally manual and paper-based.

E-accounting involves performing regular accounting functions, accounting research and the accounting training and education through various computer based /internet based accounting tools such as digital tool kits, various internet resources, international web-based materials, institute and company databases which are internet based, web links, internet based accounting software and electronic financial spreadsheet tools to provide efficient decision making (Wikipedia,2016)

Online accounting through a web application is typically based on a simple monthly charge and zero-administration approach to help businesses concentrate on core activities and avoid the hidden costs associated with traditional accounting software such as installation, upgrades, exchanging data files, backup and disaster recovery.

E-accounting does not have a standard definition but merely refers to the changes in accounting due to computing and networking technologies. Most e-accounting services are offered as SaaS (Software-as-a-service). E-accounting involves performing regular accounting functions, accounting research and the accounting training and education through various computer based /internet based accounting tools such as: digital tool kits, various internet resources, international web-based materials, institute and company databases which are internet based, web links, internet based accounting software and electronic financial spreadsheet tools to provide efficient decision making (Mehmet, 2011). The advancements in information technology have eventually led to the introduction of computerized accounting systems in corporate reporting to help produce relevant and faithful representative financial reports for both management and external users for decision making (Greuning, 2006). The computerized accounting is designed to automate and integrate all the business operations and helps the company handle all the business processes easily and cost-effectively. With computerized accounting the company will have greater visibility into the day-to-day business operations and greater access to vital information automatically (David & Quang, 2012). It has the ability to handle huge volumes of transactions with speed or efficiency. The many advantages from the use of these systems have led many to conclude that computerized accounting systems in corporate reporting are the „engine of growth“ in business organizations (frenzel, 2006). Financial reporting can be defined as the process of presenting financial data about a company's financial position, the company's operating performance, and its flow of funds (Rose & Hudgins, 2008).

E-accounting or online accounting is the application of online and Internet technologies to the business accounting function. Similar to e-mail being an electronic version of traditional mail, e-accounting is "electronic enablement" of lawful accounting and traceable accounting processes which were traditionally manual and paper-based (Wikipedia, 2015).

E-accounting involves performing regular accounting functions, accounting research and the accounting training and education through various computer based /internet based accounting tools such as digital tool kits, various internet resources, international web-based materials, institute and company databases which are internet based, web links, internet based accounting software and electronic financial spreadsheet tools to provide efficient decision making.

### **E-Accounting Entries**

When entries are considered within the traditional accounting approach, the issue is entering financial transactions in ledgers. When entries are considered within the electronic accounting, the issue is entering financial transactions on magnetic environments called electronic ledgers. The entries made on those magnetic environments are called e-entry. It is possible to perform the entry function

of accounting easily by the "barcode" technology. In the establishments that prepare the accounting plan in detail, it is possible to enter the information read by "barcodes" automatically to the accounts. Because the codes on a barcode are identified to the computer previously, the data of stock ins and outs are directly entered into the related accounts. For example, when a good requested by a customer is passed through the barcode reader, the amount of the good and the sale price are automatically multiplied, the debt is entered into the current account of the customer while the receivable is entered into the sales account and the accounting entries are arranged (Dinç & Varici, 2008).

The reliability of the entry function in electronic accounting depends on the structure of the accounting package software. On the other hand, within electronic accounting, the account codes, the document related detailed information, entry date and change date in case of essential cases have to be entered. In addition to the security precautions, identifying a separate input password for each computer and software will also increase the reliability of information within electronic accounting (Dinç & Varici, 2008). Great facilities are provided both for tax management and tax payer with electronic accounting system by keeping the ledgers and documents in electronic environment. The tax payer who avails from that system is saved from protection of ledgers, documents kept on paper and their transfers and paperwork, can reach any information at any time easily and the error possibility on papers is minimized.

### **How E-Accounting work**

For e-accounting, the same software needs to be running simultaneously in the customer's computer and in the accounting office. The customer would log in to the accounting programme running on the server of the accounting service provider. The programme allows you to submit queries about the financial status of your company, print reports, view and change any data, prepare, change, view and enter invoices into the system 24 hours a day. The customer can work side by side with the accountant, discussing any issues or asking for explanations. Well implemented accounting supports the collection and processing of management information. A proper information management system enables you to add and process data that are not included in the accounts, ensuring the availability of all necessary information.

### **Empirical Review**

Adel (2012) determined the effect of electronic commerce (e-commerce) on Accounting Information System (AIS) in Jordanian banks. The study importance arises from the need to recognize e-commerce and AIS as the greatest development in the world of business, the variables that will be affected by e-commerce are: reliability of AIS on the bank, the operational performance, cost of reduction, customer services. To achieve the objectives of the study a questionnaire was designed and distributed to the society of the Jordanian bank sector. The data analysis found out that the banks in Jordan have positive impact towards information technology they agree on the benefit of e-commerce and what customer can get from it. The statistical analysis showed that e-commerce had a positive impact on the AIS and that e-commerce has a significantly statistical relationship with AIS itself, AIS development, cost reduction aspect in the AIS of the bank, the aspect of improving the operational performance of the bank's AIS and finally with the customer service.

Siamak (2013) identifying the impact of implementation of e-accounting system on financial performance with effects of internal control systems in services industry. The population of the study consisted of all listed companies have been operating in United Arab Emirate. Questionnaires were distributed among them through email; the researcher designed the questionnaire to target financial managers, accountants and internal auditors who worked at these companies. The hypotheses of the study were tested using the appropriate statistical methods, which are Cronbach Alpha, standards deviations and means, and One Sample T-(Test). The results of this study indicate that implementation of e-accounting system at these companies caused to effect on financial performance with effects of internal control systems.

In a related study, Amaefule, and Iheduru (2014) focuses on underscoring the significance of electronic accounting information system in the operations of the Nigerian public sector, and highlights the inevitability of e-accounting system in checkmating corruption in the sector. It views e-accounting approach as a catalyst to the nation's economic development. An empirical survey was conducted on the government ministries. Data collected were analyzed using 5-point Likert Scale tool. Findings show, among other things, that the Nigerian public sector has not clearly operationalized e-accounting system and that it is of necessity that this system be activated in the sector's operational structures because corruption in the sector has been partly credited to its absence. The paper thus recommends the activation of the ideals of electronic accounting system in the structure of the nation's public sector.

Shehu (2013) studied the electronic banking products and performance of Nigerian listed deposit money banks. The study showed that e banking serves several advantages to Nigeria banking sector; provides convenience and flexible advantages. It also provides transaction related benefits like easy transfer, speedy transaction, less cost and time saving. Commission, (2011), investigated internet banking and performance of micro and small enterprises in Costa Rica. The result shows that internet use is limited in MSE daily operations because of limited access to computer and the relatively low penetration of internet services.

Sullivan (2000) in his study took sample of banks that are located in tenth Federal Reserve District that have adopted internet bank and those that have not. Comparing their financial performances and risk positions, he observed that the profitability and risks of these grouped banks were similar.

Hernando and Nieto (2006) found that the impact of adopting internet on the performance of banks as a delivery channel of e-banking takes time to appear. They hold the view that the adoption of a transactional website has a positive impact on profitability which becomes significant in terms of ROA and ROE three years after adoption. This finding actually conveys that there is a lag period for positive profitability impact to manifest on adoption of electronic banking. However, their study revealed some weaker evidence of an earlier positive impact on adoption of e-banking particularly in terms of ROA.

Siam (2006) citing the works of Shuqair (2003) on "practical electronic banking services by the Jordanian banks", pointed

out that one of the most important findings in that study is the high cost of electronic banking services on the short run due to the training of employees, and the cost of the infrastructure. The implication of this finding is that electronic banking services will have a negative effect on the bank's profitability in the short run.

In another, Al-kasswna (2012) evaluate the effectiveness of electronic accounting information systems in energy sector under conditions of uncertainty in the electricity companies in Jordan through studying and assessing the availability of properties related to the quality of accounting information systems in electronic information System in electricity companies, and the ability of accounting information system to provide appropriate information for planning, control and decision-making under conditions of uncertainty. The result shows that the characteristics of electronic accounting information systems highly influence the performance of electricity companies of Jordan under conditions of uncertainty.

Khalid, (2004) evaluated the performance of computer-based accounting systems suitable to meet the department needs. The questionnaire was designed to explore the opinions of officials of industrial companies in Jordan on the performance of those systems. The study results shows that the majority of Jordanian Industrial Companies rely on computer-based accounting information systems and applicable regulations achieve the objectives of users of financial and administrative statements as well as ease and speed of such systems to meet the needs of such data users.

Muasher and Khisbeh, (2006) identified the impact of organizational and technical factors on the applications of management information systems in the Jordanian banking sector and to achieve the objectives of the study, the questionnaire was designed and developed for the purpose of data collection and distribution to the study sample. The most important results of the study is that there is a statistically significant effect for the technical and organizational factors variables in the applications of management information systems in its role and importance in achieving psychological satisfaction, acceptance of the resistance reasons, the raise of employees morale and importance in the organization.

Abdullah and Qatanani, (2007) identified the characteristics and variables, and factors that make up the banking environment and to measure the impact on the efficiency and effectiveness of accounting information systems in Jordanian commercial banks. Data were collected through a questionnaire that distributed to a sample worker in management of information systems in those banks. The most important results of the study are that there is a great influence for each legal factors, professional regulations, technical factors administrative and organizational factors, and behavioral factors on the efficiency and effectiveness of accounting information systems.

Naash and Khamis, (2009) determined the impact of accountants in developing accounting information systems on those systems efficiency and application on financial performance of industrial companies in Jordan, as well as to investigate the effect of the application of those systems on the financial performance of companies. This study has applied on a sample of 53 industrial companies listed in the financial market in Jordan. The most important results of the

study are that there is a direct correlation of statistical significance between participating accountants at all stages of the development of accounting information systems and the performance of those systems.

Akesinro and Adetoso (2016) examined the effects of computerized accounting systems on bank performance in Nigerian banking sector. Convenience sampling method was adopted to arrive at sample size of 50 covering Guaranty Trust Bank Plc, Wema Bank Plc and First Bank Plc. The study variables consist of both dependent variable and independent variable, with Computerized Accounting System being the dependent variable and banks profitability as independent variable and customer service delivery respectively being the dependent variables. Data collected were analyzed using correlation analysis. Results show that computerized accounting system has a positive effect on bank's profitability and as well customer patronage.

Amahalu, Abiahu Obi (2017) assesses the comparative analysis of computerized accounting system and manual accounting system of quoted Microfinance Banks in Nigeria from 2006-2015. Three hypotheses were formulated in line with objectives of the study. Ex-post facto research design was adopted and the data for the study were obtained from fact books, annual reports and account of the quoted Microfinance banks under study. Paired sample T- test was used to test the Hypotheses, at 5% significant level with aid of SPSS version 22 statistical software. Findings showed that computerized accounting system has a positive effect on the reported profitability of banks more than manual system of accounting.

Akande (2016) assessed whether implementation of Computerized Accounting System has positive influence on the performance of entrepreneurs in South western Nigeria. The population of the study comprises of list of 7474 registered small and Medium businesses in South West Nigeria. (Bureau of Statistic 2012) random sampling technique will be adopted for the study. The sample size of 380 were mathematically derived using the Taro Yamene's formula, 301 questionnaires were received and useful for the study representing 79% of the total sample size. Data collected were coded and analyzed using frequency table and percentage while inferential statistic such as chi-square and regression analysis was used to test the formulated hypotheses. Finding from the study indicate that advancement in technology has become a driver to business success. Evidence from findings revealed that Computerized Accounting Systems are used by entrepreneurs in order to generate timely and accurate reports through a fast and efficient processing of accounting data.

From the empirical review, Amidu, Effah and Abor, (2011); Khalid, (2004) reveal that SMEs put in place accounting soft wares to generate their financial information. Al-kasswna (2012) found that the characteristics of electronic accounting information systems highly influence the performance of electricity companies of Jordan under conditions of uncertainty yet effective in providing information for the purposes of planning, decision-making and control. The results of the study show that the adoption of E-Accounting within public sector agencies in Malaysia has significantly improved the budgeting, accounting and reporting, and auditing and controlling task performance of the public sector agencies. Siamak (2013) result indicates that implementation of e-accounting system at these

companies caused positive effect on financial performance with efficient of internal control systems. Amaefule, and Iheduru (2014) Findings show, among other things, that the Nigerian public sector has not clearly operationalized e-accounting system and that it is of great necessity that this system be activated in the sector's operational structures because corruption in the sector has been partly credited to its absence.

Importantly, since the inception of internet accounting system, computerized accounting system allows accountants to process large amounts of financial information and processes it quickly through the accounting system. Quicker processing time for individual transaction has also lessened the amount of time needed to choose out each accounting period. Transaction that would have taken an accountant months or years to prepare would be done quickly using electronic accounting.

## METHODOLOGY

### Research Design

The research design adopted for this study is a survey method. The reason for this is that it involves investigation of opinion of large number of people and it involves inferences drawn from such investigation. This survey is expected to provide full understanding of the accounting for human resource capital in balance sheet and its effect on corporate profitability.

### Population of the Study

The population of this study consists of commercial banks in Anambra state, the elements of the population were the staff of three selected banks (First bank, UBA and Zenith bank) and their customers who patronize and transact other banking business with the banks. These banks were selected for convenience purposes;

### Sample Size and Sampling Techniques

The total number of their staff and their customers were shown in the table below:

S. N	Banks	Staffs	Customers	Total
1	First bank	30	84	114
2	United bank of African	34	85	119
3	Zenith	20	74	94
	Total	84	243	327

Source: Field Survey 2018

A sample size of 180 was obtained from a population of 327 tax officials/administration using Taro Yamane's formula as follows:

$$n = \frac{N}{1 + N(e)^2}$$

Where

n= Sample size.

E =error margin which the researcher chose to be 5%. (0.05)

N

$$n = \frac{327}{1 + 327(0.05)^2}$$

$$n = \frac{327}{1 + 0.8175}$$

$$n = 179.9$$

$$n = 180$$

The sample size was apportioned in proportion of their population as shown below;

First bank =  $114/327 \times 180 = 63$

United bank of African =  $119/327 \times 180 = 66$

Zenith =  $94/327 \times 180 = 51$

**Source of Data Collection**

To obtain reliable information that will help the researcher to ensure the effectiveness of the study in question, data was collected from the primary source. The researcher used questionnaire to obtain primary data.

The questionnaire was design in a structured form and made up of general questions of two (3) research questions to be answered hypothetically and was restricted with the responses made of strongly agree (SA) agree (A) undecided (U strongly disagree (SD) and disagreed (D).

**Methods of Data Analysis**

Data collected for the study were analyzed by the researcher using frequency counts, mean score and standard deviation.

**Test of Hypotheses (Null)**

Research Question 1

**Table 1: The response of the respondent to what extent has the emergence of e-accounting restored confidence of the customers on the safety of their funds.**

S. N	Statements	SA	A	UN	D	SD	Tot	Mean
1	The adoption of E-Accounting system in tertiary institutions will improve on information relating to accounting matters.	47 (235)	40 (160)	7 (21)	23 (46)	7 (7)	124 (324)	3.78
2	Electronic accountings enable the organization to easily identify the weakness in financial transaction of the tertiary institutions.	39 (195)	50 (160)	8 (24)	21 (42)	6 (6)	124 (301)	3.44
3	E- Accounting system is more reliable and accurate in proving transparency of accounting works.	48 (240)	45 (180)	8 (24)	19 (38)	4 (4)	124 (486)	3.92
4	Using electronic means of accounting will reduced duplication of accounting work thereby reduced cost of operations	50 (250)	35 (140)	9 (27)	24 (48)	6 (6)	124 (471)	3.80
5	Electronic accounting ensures proper accountability in accounting section of the tertiary institutions.	47 (235)	38 (152)	9 (27)	25 (50)	5 (5)	124 (469)	3.78

Source: Field Survey 2018

**Test of Hypotheses (Null)**

**Hypothesis 1**

Ho: Emergence of e-accounting has not restored confidence of the customers on the safety of their funds.

**Table 2: Applying the Mean Score for Testing Hypothesis One Extracted from table 1**

Questions	X	Y
1	3	3.78
2	3	3.44
3	3	3.92
4	3	3.80
5	3	3.78

	Mean	N	Std. Deviation	Std. Error Mean
Pair 1	X	3.0000	5	.00000
	Y	3.9000	5	.10536

**Table 4: Paired Samples Test**

	Paired Differences	Mean	Std. Deviation	Std. Error Mean	95% Confidence Interval of the Difference		t	df	Sig. (2-tailed)
					Lower	Upper			
					Pair 1	x - y			

The four hypotheses were tested using t-test statistical tool with aid of SPSS version 20.0 at 5% level of significance. The t-test was used to assess evidence in favor or some claim about the population from which the sample has been drawn. This also helps in compare whether there is a statistical different average values that exist after the adoption of e-accounting.

**Decision Rule:**

Using SPSS, 5% is considered a normal significance level. The accept reject criterion was based on the computed t-Value. If the calculated t-value is equal or greater than table t-value, we reject Null and accept alternate hypothesis.

**DATA PRESENTATION AND ANALYSIS**

Out of the 180 questionnaires distributed to firms, 56 were not returned, thereby constituting the invalid questionnaires to 56, while 124 questionnaires were returned and valid. Total number of valid questionnaires is 124.

From the above table, the mean of y is 3.900 as against x which is 3.00. In this case the mean of y is higher than that of x (the mean score). Looking at the mean score table 4.3.1, the mean scores of y are not by chance hence scored above the bench mark and indicate positive response. Based on this, the study rejects null hypothesis and accept the alternative hypothesis which state that emergence of e-accounting has restored confidence of the customers on the safety of their funds.

### Research Question 2

**Table 5: The response of the respondent to what extent has the effectiveness of operation of chip-cards enhanced its efficiency.**

S/N		SA	A	UN	D	SD	Tot	Mean
1	The policy operation of chip-cards is a means of removing burden/complexity in the system.	50 (250)	43 (172)	9 (27)	19 (38)	3 (3)	124 (490)	3.95
2	There will be an easy and faster means of carrying out government financial transactions with the introduction of operation of chip-cards.	46 (230)	39 (156)	11 (33)	22 (44)	6 (6)	124 (469)	3.78
3	Operations of chip-cards policy will help in eradicate fraudulent acts in financial transaction.	48 (240)	40 (160)	8 (24)	23 (46)	5 (5)	124 (475)	3.83
4	Operation of chip-cards in banking will be an easy way to boom Nigerian financial sector.	51 (255)	40 (160)	7 (21)	20 (40)	6 (6)	124 (482)	3.89
5	Operation of chip-cards policy reforms is a way to improve monetary transaction in the country.	49 (245)	40 (160)	12 (36)	28 (56)	5 (5)	124 (502)	4.05

Source: Field Survey 2018

### Hypothesis two

Ho: Delivery channels systems do not significantly helped to sustain customer's patronage in commercial banks.

**Table 6: Applying the mean score for testing hypothesis two extracted from table 5**

Questions	X	Y
1	3	3.95
2	3	3.78
3	3	3.83
4	3	3.89
5	3	4.05

**Table 7: Paired Samples Statistics**

	Mean	N	Std. Deviation	Std. Error Mean
Pair 1 x	3.0000	5	.00000	.00000
y	3.9000	5	.10536	.04712

**Table 8: Paired Samples Test**

		Paired Differences				t	df	Sig. (2-tailed)	
		Mean	Std. Deviation	Std. Error Mean	95% Confidence Interval of the Difference				
					Lower				Upper
Pair 1	x - y	-.90000	.10536	.04712	-1.03082	-.76918	-19.101	4	.000

From the above table, the mean of y is 3.900 as against x which is 3.00. In this case the mean of y is higher than that of x (the mean score). Looking at the mean score table 4.3.4, the mean scores of y are not by chance hence score above the bench mark indicate positive response. By implication, delivery channels systems helped to sustain customer's patronage in commercial banks. Based on this, the study rejects null hypothesis and accept the alternative hypothesis which state that delivery channels systems significantly helped to sustain customer's patronage in commercial banks.

### Research Question 3

**Table 9: The response of the respondent to what extent has delivery channels system helped to sustain customer's patronage in commercial bank?**

S. N	Statements	SA	A	UN	D	SD	Tot	Mean
11	Electronic accounting has ensured integrity and transparency on financial duty of the tertiary institutions.	48 (240)	45 (180)	8 (24)	19 (38)	4 (4)	124 (486)	3.92
12	More work on accounting can be done hence early completion of accounting jobs and curb some manipulations.	47 (235)	43 (172)	9 (27)	20 (40)	5 (5)	124 (479)	3.86
13	Electronic accounting promotes service delivery in order to improve corporate performance.	46 (230)	41 (164)	9 (27)	24 (44)	4 (4)	124 (469)	3.78
14	E-Accounting helps in reducing the volume of accounting jobs to be done by the accountants hence cost of operations will be reduced.	45 (225)	44 (176)	12 (24)	19 (38)	4 (4)	124 (467)	3.77
15	Electronic accounting techniques promote effectiveness of accounting reports.	48 (240)	40 (160)	8 (24)	23 (46)	5 (5)	124 (475)	3.83

Source: Field Survey 2018

**Hypothesis Three**

Ho: Effectiveness of operation of chip-cards has not significantly enhanced its efficiency.

**Table 10: Applying the Mean Score for Testing Hypothesis Three extracted from table 9**

Questions	X	Y
1	3	3.92
2	3	3.86
3	3	3.78
4	3	3.77
5	3	3.83

**Table 11: Paired Samples Statistics**

		Mean	N	Std. Deviation	Std. Error Mean
Pair 1	x	3.0000	5	.00000	.00000
	y	3.8320	5	.06140	.02746

**Table 12: Paired Samples Test**

		Paired Differences					t	df	Sig. (2-tailed)
		Mean	Std. Deviation	Std. Error Mean	95% Confidence Interval of the Difference				
					Lower	Upper			
Pair 1	x - y	-.83200	.06140	.02746	-.90824	-.75576	-30.300	4	.000

From the above table, the mean of y is 3.832 as against x which is 3.00. In this case the mean of y is higher than that of x (the mean score). Looking at the mean score table 4.3.7, the mean scores of y are not by chance hence score above the bench mark indicate positive response. By implication, effectiveness of operation enhanced its efficiency. Based on this, the study rejects null hypothesis and accept the alternative hypothesis which state that effectiveness of operation of chip-cards has significantly enhanced its efficiency.

**Discussion of Findings**

From the results, hypothesis one shown that the emergence of e-accounting has restored confidence of the customers on the safety of their funds, hypothesis two indicate that delivery channels systems significantly helped to sustain customer's patronage in commercial banks, and hypothesis three shown that the effectiveness of operation of chip-cards has significantly enhanced its efficiency.

This result is in line with Amaefule, and Iheduru (2014) who shows that the Nigerian public sector has not clearly operationalized e-accounting system and that it is of necessity that this system be activated in the sector's operational structures because corruption in the sector has been partly credited to its absence. Also the study of Rahman and Elsayed (2011) whose results of the study show that the adoption of E-Accounting within public sector agencies in Malaysia has significantly improved the budgeting, accounting and reporting, and auditing and controlling task performance of the public sector agencies. Others like; Amidu, Effah and Abor, (2011); Khalid, (2004); Al-kasswina (2012) were all in affirmation that e-accounting enhance efficiency and improve performance of an organization.

**CONCLUSION AND ECOMMENDATIONS****Conclusion**

The study focuses on the effect of electronic accounting on the operations of commercial banks in Nigeria. The research study covers the effect of electronic accounting on U.BA Plc, First bank Plc and Zenith Bank Plc. The outcome of the study indicates that emergence of e-accounting has restored confidence of the customers on the safety of their funds. Meanwhile that electronic accounting system is a necessity in the operations of government activities in Nigerian

banking institutions in this modern era. However the result shows that delivery channels systems significantly helped to sustain customer's patronage in commercial banks.

This implies that e-accounting in the banking system has increased Patronage of banks customers. In fact, e-accounting has impacted positively on the banking system in Nigeria increasing its profitability, productivity and efficiency. It makes internet banking possible thereby opening the door for important policy such as cashless policy, ATM card use, internet banking, inter-bank and intra-bank transfer of money etc.

**Recommendations**

In the light of the observations made, the following recommendations are made:

CBN should make it mandatory for banks staff to embrace e-accounting and also to undergo feasibility study on electronic accounting. Also banks should device a technical way of detecting illegal transaction through electronic accounting.

Government should introduce foreign technology from advance and developed country into the Nigeria banking industry and banks that make use of the e-accounting will be more and more globalised, direct and cyberspace oriented. This is a phenomenon that no Nigeria bank can neglect. Banks therefore must give adequate attention for survival and growth of the banking industry. Also any banking sector that failed to participate in ICT trends will lose out of the opportunity provided and crushed by competition. Also banks should strength their e-accounting apartments and train their staff to ensure quality service delivery.



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