Forensic Accounting Practices and Fraud Management in selected listed Fast Moving Consumer Goods (FMCGs) in Nigeria

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***Abstract***

*The study explores the influence of forensic accounting practices on fraud management in selected listed fast moving consumer goods (FMCGs) in Nigeria. Survey research design was used as the method for this study. The sample size was 20 quoted consumer goods companies as at 31st December, 2023 and 15 questionnaires each were allotted to each selected company which gave 300 observations out of which 258 were found useful. The sample size determination adopted was Taro Yemane which gave 20 companies. The Simple random sampling was the method employed for the sample. A structured questionnaire was employed as the data gathering tool. The research tool adopted for descriptive statistics was simple table, mean and standard deviation while the two hypotheses were tested using inferential statistics, analysis of variance (ANOVA), and ordinary least square (OLS). The findings revealed that forensic accounting practices have significant influence on fraud prevention of FMCGs in Nigeria (F= 2.071, p-value =0.000). Also, it was also discovered that forensic accounting practices significantly influence fraud detection in FMCGs (F= 1.698, p-value =0.000) indicating that forensic accounting practices enhance fraud management in FMCGs sector in Nigeria. From the findings of this study, revealed that fraud prevention in Nigerian fast-moving consumer products is significantly correlated with the use of forensic accounting techniques. Also, it was observed that forensic accounting practices significantly detect fraudulent activities easily in Nigerian fast moving consumer goods. According to the report, it is critical to update the organizational structure of the business to better accommodate forensic accounting services. Additionally, the business needed to develop precise guidelines to direct forensic accounting practices in the quickly evolving consumer products industry.*

***Keywords:*** *Forensic accounting practices, fraud management, fraud prevention, fraud detection*

# Introduction

In the recent time, the decline level of trust in auditor’s professional output has demonstrated the failure of traditional auditing. This probably due to a lack of professional skepticism and dedication, particularly in developing economies. Stakeholders in both public and private companies have long recognised the importance of quality financial reporting systems that are separate from the creation and presentation of financial statements, but this is being undermined by financial irregularities, especially in the public sector. This could have prompted scholars and other public information that argued that corruption and other fraudulent practices have becoming alarming in Nigeria (Frankline et.al, 2022; Oyerogba, 2021; Ogiriki and Appah, 2018).

Fraud is the deliberate use of false pretenses to coerce individuals or groups to give up assets or a number of legal rights. It is the dishonest act of denying someone anything to which they would otherwise be entitled because they committed fraud. (Akpoveta, Agbomah, and Onuora 2018)

Accordingly, the corrupt practices menace has become more pervasive, leading to continued resource mismanagement and the loss of government assets (Nonye & Okoli, 2015). As a result of this, the quality of financial statements produced are being undermined, leading to the public mistrust on the traditional auditing. Due to the pervasive fraud, the stakeholders, thus, are of the opinion of the need to improve the quality of financial statements in the public sector through the adoption of forensic accounting. While the functions of the traditional auditing are crucial, it is believed that the skills of forensic accounting, in the technological advancement age, especially on digital forensic accounting, will better enhance the public sector financial statement quality. The audit practice failures, however, are seen as some of the reasons that the key factors driving the development of forensic accounting, which fueled expectations gap (Okoye & Akamobi, 2009).

Regarding this, the public's expectations of the need for forensic auditors in fraud detection, prevention, and reporting have continued to grow, particularly in the public service audit, as a result of the issuance of reports by the conventional auditor that are materially fraudulent. The public anticipates that forensic accounting will alleviate the existing susceptibility of traditional accounting and auditing systems to financial fraud, even though this expectation is like a consensus in general. Studies have previously established the effectiveness of forensic accounting in the elimination of fraudulent practices in financial statements, and corruption, among others (Abdulrahman et al.; Tapang & Ihendinihu, 2020; Bangura, 2020; Akinadewo & Akinkoye, 2019). While these studies have established the relationship between forensic accounting and fraudulent practices in the financial statements, etc., there is a lacuna in the area of digital forensic through big data, business intelligence tools and cloud computing, which could be instrumental to improved quality in the output of forensic accounting investigation.

In the recent time, the decline level of trust in auditor’s professional output has demonstrated the failure of traditional auditing. This probably due to a lack of professional skepticism and dedication, particularly in developing economies. Stakeholders in both public and private

companies have long recognised the importance of quality financial reporting systems that are separate from the creation and presentation of financial statements, but this is being undermined by financial irregularities, especially in the public sector. This could have prompted scholars and other public information that argued that corruption and other fraudulent practices have becoming alarming in Nigeria (Frankline et.al, 2022; Oyerogba, 2021; Ogiriki and Appah, 2018).

In Nigeria, although the banking sector is one of the most regulated sectors, consumer goods sector plays a vital role of feeding the nation. In spite of this regulations and control, financial crimes have taken center stage in the industry, including embezzlement, bribery, insolvency, and security fraud (Adeniyi, 2016). Given the profound repercussions that financial crimes have on corporate organizations, forensic accounting was developed. It is a reaction to financial crimes' increasing sophistication and knowledge. According to Karwai (2002), the growing fraud wave is affecting a lot of havoc in Nigeria. This is because fraud has eaten deep into every aspect of the Nigerian society to the to the degree that a lot of businesses no longer trust their clients. To combat corruption, important organizations like the Economic and Financial Crime Commission (EFCC) and the Independence Corrupt Practices Commission (ICPC) were founded. Due to a number of obstacles, including political blackmail and politicization, constitutional immunity as defined by section 308 of the modified Nigerian Constitution of 1999, public indifference and skepticism toward anti-corruption efforts, and a delayed judicial system, none of them could be implemented successfully.

# Statement of the Problem

Forensic accounting comprises of three major areas of investigation, dispute resolution and litigation support. In the light of the previous studies that have discussed the forensic accounting in handling problem of financial crimes in both private and public sectors of the economy without minding the consumers’ goods firms and also did not take the systematic approach in the handling the financial crimes. This study aims at examining the effects of forensic accounting as a systematic tool and approach in detecting and preventing frauds in consumers’ goods firms in Nigeria, with a singular question of how effective is the systematic approach of forensic accounting detect and prevent fraud in a listed consumers’ goods firms in Nigeria.

Several studies conducted on forensic accounting or auditing did not investigate consumer goods industry in Nigeria, hence this study aims to identify the importance of forensic accounting practice in the consumers’ goods in the detection and prevention of financial fraud which goes beyond the opinion of external auditors. The study will also fill the gap between the practice of external auditors and forensic accounting expert which also suggest to the users that in detecting financial fraud, forensic accounting exercise goes beyond public and banking sectors.

The major goal of this study is to access the influence of forensic accounting systematic approach on detecting and preventing financial fraud in the fast-moving consumers’ goods in 21st century from the Nigerian perspective.

# Research Objectives

This study's main objective is to find out how forensic accounting practice affect fraud management in Nigerian listed consumer goods companies. More specifically, the following specific objectives are being pursued:

* + 1. Establish the application of forensic accounting practices prevents financial fraud in selected listed consumers’ goods firms in Nigeria.
    2. Access the application of forensic accounting practices on detection of financial fraud in selected listed consumers’ goods firms in Nigeria.

# Research Questions

The following research questions were formulated:

* + 1. Does the application of forensic accounting practices established prevent financial fraud in selected listed consumers’ goods firms in Nigeria?
    2. Does the application of forensic accounting practices accessed detect financial fraud in selected listed consumers’ goods firms in Nigeria?

# Research Hypotheses

Based on the above research questions, the following hypotheses were tested and stated in null form:

Ho1: Application of forensic accounting practices established do not prevent financial fraud in selected listed consumers’ goods firms in Nigeria.

Ho2: Application of forensic accounting practices accessed do not detect financial fraud in selected listed consumers’ goods firms in Nigeria.

# Significance of the Study

This study is important because it would serve as a policy framework for:

* + 1. The management of consumer goods companies.
    2. The Independent Corrupt Practices and Other Related Offenses Commission (ICPC).
    3. The Economic and Financial Crimes Commission (EFCC).
    4. The External Auditors and other stakeholders on the influence of forensic accounting practices on fraud management and;
    5. Be of great importance as it will contribute to academic knowledge.

# Scope of the Study

This study covers the forensic accounting practices and fraud management in consumer goods sector; hence the scope of this paper is limited to Forensic accounting, forensic accounting practices, fraud management, fraud prevention, fraud detection and fast-moving consumer goods alone.

* 1. **Literature Review**
  2. **Conceptual Framework**
     1. **Forensic Accounting**

Since there are numerous authors in this field of accounting literature, there are numerous definitions of forensic accounting. As a result, no one definition is considered to be the best. The term "forensics" has to do with identifying crimes. In order to improve financial investigations and reduce or prevent financial impropriety in all its forms, science is therefore applied to resolve questions arising from crime or litigation and as such introduced in the accounting domains (Chepngeno & Fred 2020).

"The application of accounting principles and techniques to investigate and analyze financial information for evidentiary purposes" is what Wells (2019) defined as forensic accounting. Identification of financial abnormalities, calculation of fraud-related damages, and submission of financial evidence in court are all included in the purview of forensic accounting. Similarly, forensic accounting is described as "the specialty practice area of accounting that describes engagements that result from actual or anticipated disputes or litigation" by the AICPA (2021).

The scope of forensic accounting encompasses asset tracing, financial fraud investigation, and expert witness testimony. Furthermore, "the practice of utilizing accounting, auditing, and investigative skills to assist in legal matters, typically related to financial fraud or disputes" is how Ezejiofor, Nwakoby, and Okoye (2019) define forensic accounting. Identification of illicit financial activity, measurement of losses, and expert witness provision in legal procedures are all included in the purview of forensic accounting. The use of analytical and investigative abilities to resolve financial disputes in a way that complies with legal norms is known as forensic accounting. The application of accounting principles and methods to legal issues is another definition of forensic accounting (Abdulrahman, 2019).

It is challenging to understand forensic accounting without drawing comparisons to auditing, primarily because auditing has historically been used to evaluate corporate situations, accounting malpractices, and investigative work is still done by auditors today. Auditors do due diligence, expert witnesses, fraud investigations, and other tasks. It is undeniable that accounting is following this similar trend as we enter a new era of professional progress that is welcoming diverse viewpoints and revealing a variety of strengths and opportunities.

According to Ozkul and Pamukc (2012), this profession identifies a field that consists of accounting, auditing, and investigative skills. The specialty area of accountancy that deals with engagements arising from actual or potential conflicts or litigation is called forensic accounting. "Suitable for use in a court of law" is what "forensic" means, and forensic accountants typically have to work toward that standard and possible result (Crumbley, Heitger & Smith, 2005).

Auditing and forensic accounting are closely intertwined, especially when discussing forensic auditing. Thus, expert witnesses—forensic services to provide proof in accounting issues in

litigations and audits, as well as to certify the integrity of accounting statements diligence—are among the services offered by accountants. The forensic work is entirely analytical in that it ultimately seeks to determine the rate at which the company has suffered losses. In forensic accounting, reports are typically scheduled for a specific time frame. However, regulatory bodies that oversee forensic accounting are nonexistent, in contrast to auditing.

# Systematic Approaches to Forensic Accounting Assignment

Since each forensic audit assignment is thought to be distinct, methods to be used and processes carried out will likewise be tailored to each one. Generally speaking, the following actions are taken: Every forensic accounting task is distinct. As a result, the actual strategy used and the actions taken will be unique. All things considered, a lot of forensic accounting projects will generally follow the procedures listed in Zysman (2004): meet with the client, conduct a conflict check, conduct an initial investigation, create an action plan, gather pertinent evidence, conduct the analysis, and write the report.

# Characteristics of Forensic Accounting

According to Imoniana, Antunes, and Formigoni (2013), it is beneficial to examine forensic accounting from a wider perspective inside the taxonomies of an accounting sub-activity in order to elaborate on its unique characteristics. Forensic accounting breakdowns like these include the following: Application of forensic standards—possibility of using the reports as a proof of law in courts or tribunals—financial accounting, economics analysis, fiscal and criminal law, psychological, administrative, and investigative dispensation and suitable for usage in the subsequent circumstances.

Examining frauds entails a detailed investigation, estimating the damage to the company, and recommending the arrest of the perpetrator in order to file a criminal complaint. This becomes crucial in today's IT world, where user profiles are quite similar and access controls are somewhat deficient. When a suspect exhibits a certain unusual trait, or combination of traits, that the criminal is also known to possess, this can pose a general issue for forensic identification (Balding and Donnelly, 1995).

# Fraud Management

The phenomenon of fraud is widespread and has been around for a while. It takes skill to describe fraud as well as to spot it. There is no one set definition of fraud that applies to all situations because it encompasses deceptive, surprising, cunning, and unfair methods of deceiving someone.

Fraud is the deliberate use of false pretenses to coerce individuals or groups to give up assets or a number of legal rights. It is the act of dishonestly denying someone something to which they might otherwise be entitled in exchange for committing fraud (Onuora, Akpoveta & Agbomah 2018).

Ehioghiren, and Atu (2016), financial crimes can be articulated but not exactly defined. A single description is insufficient. According to Nwaze (2012), In order to obtain unfair advantages that would not have come from such a deceptive procedure, fraud is defined as a prearranged and planned deceptive process or device that is typically carried out by an individual or group of individuals. Nwaze (2012) pointed out that although fraud can take many different forms, it typically involves insiders (employees) and outsiders working together to carry out the scheme.

The Electoral and Financial Crime Commission (EFCC) (2004) and Okafor (2004) define fraud as any unlawful conduct and non-violent crime carried out with the intention of obtaining illegitimate wealth, either on an individual, group, or organized level. This is against the laws currently in effect, which regulate the government's economic operations and management.

Fraud is a human behavior that involves deceit, intentionality, the possibility of getting caught, justification, intense desire, and betrayal of trust, according to Ramamoorti (2007). On the other hand, Nwaze (2012) and Wang, Liao, Tsai, & Hung (2006) have similar opinions about fraud. From their perspective, fraud is a deliberate and complex procedure or tool used by a person or group of people with the main intention of misleading a different person or organization in order to get unfair advantages.

# Fraud Prevention

According to Afriyie Akomeah, M. O., Amoakohene, G., Ampimah, B. C., Ocloo, C. E., and Kyei,

M. O. (2022), fraud prevention (FP) is the process of putting into practice a plan to identify fraudulent transactions or banking operations and stop them from affecting the client and the financial institution's money or reputation. As online and mobile banking channels grow in popularity and financial institutions continue to digitize, the need for a strong fraud protection strategy will only increase (Alamry et al., 2022). The domains of fraud prevention and cybercrime are dynamic and interconnected. While fraud prevention professionals are developing new technologies for authentication and fraud detection, criminals are using the Dark Web to network, make money, and trade information. Modern con artists use viruses and cutting-edge strategies to succeed in their scams. Internal control is one of the planning and implementation ways to improve control systems and processes to lessen the impact of potential hazards, according to Tien and Thanh (2024). An efficient internal control system must be designed, put into place, and monitored by management.

# Fraud Detection

Fraud detection is the gathering of information available to forensic investigators regarding particular and suspected acts carried out to prevent the acquisition of funds or property through deception (Oranefo et al., 2021). Fraud detection techniques are a useful tool in forensic accounting used by a number of businesses, such as banking and insurance (Aminu et al., 2022). Examples of

financial fraud include utilizing credit cards that have been stolen or forging cheques. Other forms of fraud could involve fabricating an occurrence or exaggerating losses in order to get paid. Detecting patterns is a typical goal for fraud detection since forensic accounting in fraud cases often employs multiple repeating approaches. Data analysts may, for example, prevent insurance fraud by employing algorithms to identify patterns and abnormalities (Ewa et al., 2020).

# Fast-Moving Consumer Goods

Unquestionably, one of the largest manufacturing industries globally is the fast-moving consumer goods (FMCG) sector, which offers a wide range of products, including food, beverages, personal care items, electronics, household goods, and much more (IBAN, 2016). The products stated above are essentially inexpensive, yet they typically have a high unit turnover rate among their customers. This is due to the fact that FMCGs are typically utilized in homes and are widely available (Pradhan and Misra, 2014, KPMG, 2016). FMCGs typically have significant sales volumes, but because their profit margins are low per unit of sold product, the industry as a whole typically has poor profit margins (Bijuna & Sequeira, 2012).

# Theoretical Framework

Several concepts and models that have been created over time form the basis of scholarly discourse on fraud. The fundamental theory of observation, the triangle of fraud, the social learning theory, the fraud Diamond theory, the low handling theory, the social control theory, the hyper-motivation theory, the anomie fraud theory, the differential opportunity theory, the social ecology theory, and the rotten apply theory are a few of the numerous theories on fraud. Eze (2015), Crumbley, Heitger & Smith, (2007).

# The Fraud Triangle Theory

This theory was propounded by Donald Cressey in 1950 who believes that there must be a reason behind what people do. The basic question was that what drives people to violate trust?

Forensic accountants analyze this information to find possible fraud, its root causes, and the systemic flaw that allowed it to happen. The three elements that combine to form the fraud triangle notion are opportunity, incentive, and rationalization. An incentive must be present for someone to be a part of a deception.

**Opportunity:** When internal controls are lax or there is inadequate management oversight of internal control implementation, employees take advantage of their positions to conduct fraud. The majority of employees who commit fraud do so because they can access resources and data that help them hide their dishonest activities. It's true that workers require access to specific platforms in order to carry out their duties, but that same access also gives workers the chance to perpetrate fraud.

**Pressure/Incentive:** Staff members may commit fraud under duress. Pressure doesn't just refer to monetary hardship. According to Lister (2007), there are three different kinds of pressure or motivation: pressure from within to support one's lifestyle, pressure from the employer to maintain ongoing compensation plans or the financial interests of management, and pressure from outside sources like covenants from financiers, market expectations, and threats to the company's financial stability. The factors that have been found are the driving forces for fraud.

**Rationalization:** An employee's attempt at rationalization is to explain away their fraudulent actions. This could be used to excuse dishonest behavior, for instance, if an employee is having trouble getting accommodations. Additionally, a worker who feels underpaid could counter that it's a means of increasing their compensation. Therefore, the employee's justification is an act of fraud committed in order to support his behavior. It serves as a means of disguising wrongdoing against the employer. by instilling a sense of guilt in the employers for the situation. The fraud triangle is a tool used by forensic accounting to pinpoint weak places in company systems and identify potential fraud suspects. It is comprised of three fundamental ideas—incentive, opportunity, and rationalization—which when combined produce an environment that is conducive to deception. To perpetrate financial fraud, a person needs to be motivated, given the chance, and able to defend their actions. The triangular



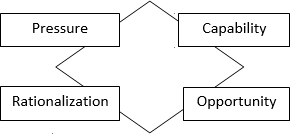
Figure 1: Fraud Triangular Theory

# Fraud Diamond Theory

The Fraud Diamond Theory is an off shoot of the fraud triangle theory which was first introduced by Wolf and Hermanson (2007) . According to Eze (2015), the diamond theory of fraud describes how a person's aptitude, character, and abilities play a significant part in determining the likelihood that fraud would occur.

Wolf and Hermanson (2004) and Crumbley, Heitger, and Smith (2007) contend that a fraudster needs specific characteristics, skills, or positional authority in order to carry out his criminal activity. Eze (2015) added that although opportunities can lead to fraud, people will be drawn to it by incentives and justifications; however, for this to happen, the person in question needs to be able to identify an opportunity when one is presented and should be able to take unfair advantage of any loopholes that have been found. For example, regardless of the opportunity or motive, someone who is not proficient in journal or ledger entry in the books of accounts will not be able to manipulate numbers (Rasey 2009).

The theories emphasized the actions taken by forensic accountants in identifying all the motives that led to fraud by parties involved, which can be seen the diagram below:



# Figure 2: Fraud Diamond Theory

* 1. **Empirical Framework**

Adesina, Erin, Ajetunmobi, Ilogho, and Asiriuwa (2024) analyze the importance of using forensic audit in avoiding financial crimes that harm or undermine the stability and business continuity of Deposit Money Banks (DMBs) in Nigeria. Of the twenty-two (22) Deposit Money Banks, seventeen (17) banks received a structured questionnaire, which provided the study's primary source of data. The study made use of survey design techniques. The findings of the Ordinary Least Squares (OLS) method analysis and hypothesis testing showed that hiring qualified and experienced forensic auditors would not only help to mitigate financial frauds in DMBs.

Abubakar, Abubakar and Hyellaki (2022) evaluated how forensic audit affected the banking industry in Nigeria's ability to detect fraud. The study's goal is to determine whether forensic audit has an impact on fraud detection. For this study, a field survey was used as the research strategy. Data were gathered from primary sources (interviews and surveys) as well as secondary sources (textbooks, journals, and the internet). A total of 100 individuals, or ten responses, were chosen at random from ten Yola banks. Regression analysis and the Statistical Package for Social Sciences (SPSS) were used to test the hypothesis. The analysis's R square value of 0.795, or nearly 79.5%, indicates that forensic audit greatly enhances fraud detection, as the study's conclusions showed. The paper recommends frequent forensic audits of deposit money bank operations by management in order to successfully detect fraud, which is already a problem in Nigeria's financial system.

Donatus, Atayi, Dashol, Chinshaka (2022) investigated how forensic accounting affected the identification of occupational fraud in deposit money institutions in Nigeria, paying particular attention to trend analysis, data mining, and computer-assisted auditing methods. A well-structured questionnaire was used to gather data from primary sources. Ordinary least square (OLS) regression and descriptive statistics were used to analyze the data. According to the results, R2 and R 2 Adjusted are worth 0.901904 and 0.917484, respectively. Following that, the study comes to the conclusion that trend analysis, computer-assisted auditing, and data mining techniques all significantly improve occupational fraud detection. Data mining technique also significantly improves occupational fraud detection. This research suggests that using forensic accounting techniques will improve the detection of occupational fraud. Therefore, the study suggests that deposit money banks improve their internal control systems by utilizing data mining, computer- assisted auditing, and trend analysis features. This will enable the central bank of Nigeria to identify asset misappropriation fraud in Nigerian deposit money banks.

Edward and Agboare (2021) investigated how forensic accounting affected the identification of financial fraud in Nigerian Deposit Money Banks (DMBs). The study used a survey research approach and heavily relied on primary data collected using a standardized Likert scale questionnaire. Using the Statistical Package for Social Sciences (SPSS version 20.0), regression analysis and descriptive statistics were used to test the data. According to the study's findings, financial fraud detection in Nigerian deposit money institutions is significantly impacted by forensic accounting procedures that involve performing investigations, evaluating financial transactions, and reconstructing incomplete accounting records. The study's conclusions led to the following recommendations: more forensic accountants should be hired by Nigerian DMBs to help combat the financial fraud that has become more prevalent in modern times due to technological advancements. All financial institutions should work with the Central Bank of Nigeria (CBN) to build an electronic fraud risk information center manned by forensic accountants. To discourage fraud, DMBs should have automated control mechanisms like biometric transaction authentication.

The evaluation of forensic accounting methods, accounting figures, and fraud prevention in listed insurance companies in Nigeria was investigated by Haruna, Oyedokun, and Mainoma (2020). The Cochran formula, as given by Kothari (2013), was used to sample a population of 257 professional accountants and auditors working for listed insurance companies in Nigeria, which made up the study population. The study used a questionnaire and the survey research method; secondary sources included text books, published materials such as journals, and the internet. The statistical software for service solution (SPSS V.21) was used in the study to analyze the data. Among other things, the integrity of the financial statements of listed insurance companies in Nigeria is improved by the use of investigative skill techniques. The individual level of significance of 0.005 and 0.022, both of which are less than the acceptable level of significance of 5%, and the 0.11 coefficient of determination of the primary model, which both corroborate this. This indicates that roughly 74% of the variation in the IFS can be attributed to IST, with other factors not included in

the model accounting for the remaining 66% of the variation in the IFS. The most significant recommendation is that Nigerian insurance companies that are publicly traded consider creating an internal control department with a forensic accounting team. This will bolster the veracity of Nigerian insurance companies' financial accounts.

The impact of forensic auditing on bank fraud in Nigeria was studied by Adabenege (2020). Due to the extraordinary rise in bank fraud cases in Nigeria, forensic auditing has become a crucial component of the audit cycle. Modern, Forensic auditing skills, also referred to as diagnostic auditing techniques, are used to help detect, prevent, and mitigate fraud. Forensic audit abilities give the technical capacity for fraud detection, prevention, and reduction in addition to offering more current knowledge of banks' internal control procedures and risk management strategies. Thus, this study examines the relationship between bank fraud in Nigeria and forensic auditing.110 respondents—106 of whom were retrieved—were randomly assigned a well-structured questionnaire as part of our survey research design, which gathered information from primary sources. After applying spearman's rank correlation method to examine the obtained data, we found that there is a statistically significant and highly strong association between forensic audit and fraud detection, prevention, and investigation. The findings show how forensic audit enhances the identification and avoidance of bank fraud. Furthermore, the results show that forensic auditing is an effective method for locating, stopping, and reducing bank fraud in Nigeria. As a result, it is suggested that forensic audit be widely used by specialized businesses like banks and insurance companies to ensure that fraud cases are quickly found and successfully stopped. The constitution also requires that forensic auditors undergo ongoing training from a separate organization. It is recommended that our universities set up standard forensic audit laboratories furnished with the necessary tools for practical study, in addition to teaching forensic accounting and auditing.

Adejana, Ajetunmobi Aina and Samuel (2020) An inquiry examined Nigeria's use of forensic accounting in fraud detection and prosecution. The study assessed the potential impact of forensic accounting on fraud detection and prosecution in Nigeria. The study employed a survey design with a sample size of 30 respondents from the EFCC's Lagos zonal office who worked in the administration, legal, and operations departments. Regression analysis was employed for data analysis, and simple random sampling was used to determine the sample size.The results showed that while the application of forensic accounting had no appreciable impact on fraud prosecution in Nigeria, it had a considerable impact on fraud detection. In accordance with the results, we urge the EFCC to undergo an immediate reorganization in order to establish an independent directorate for forensic accounting. This will enable the organization to prosecute fraud cases more effectively while also standardizing its hiring procedures to guarantee the hiring of agents with strong technical backgrounds in forensic accounting.

Ewa, Adesola and Eseneyen (2020) examined how forensic accounting methods were used to stop or identify fraudulent activity in Nigerian commercial banks, with particular attention to how commercial identification and prevention of fraud were impacted by data mining, ratio analysis,

and trend analysis techniques. The data was analyzed using descriptive statistics and the Ordinary Least Square (OLS) model. The results demonstrated that the banking system's ability to detect and prevent fraud was significantly enhanced by the application of forensic accounting techniques. The study also showed how useful trend analysis and ratio analysis techniques are for spotting and stopping fraud. The study also showed how useful commercial data mining software is for spotting and stopping fraud, as well as how most employees are unaware of the capabilities of data mining technology and how to use trend analysis techniques in these situations. It was suggested that commercial banks have to be compelled to buy dependable data mining software and be given better training on the use of data mining and its advantages for the banking sector. Public awareness efforts, the use of anonymous response hotlines, and quick bank responses to questions should also be highly prioritized.

**Conceptual Model**

Dispute Settlement

Ho1

Ho2

**Independent Variable Forensic Accounting Practices**

Forensic Technique

Forensic Expert

**Dependent Variable Fraud Management**

Litigation Assistance

Legal Tactics

Litigation Process

Forensic Accounting Services

**Fraud Detection**

**Fraud Prevention**

**Source: Researcher’s Conceptual Model (2024)**

1. **Research Methodology**

The research design adopted for this study is survey research design. The population of this study is 21 quoted consumer goods companies in Nigeria. The sample size is 20 quoted consumer goods companies and 15 questionnaires each were allotted to each selected company. This gave 300 observations. The sample size determination adopted was Taro Yemane which gave 20 sampled companies. The selected quoted consumer goods companies are Bua Foods, Cadbury Nigeria, Champion Brew, Dangote Sugar Refinery, DN Tyre & Rubber, Flour Mills Nig, Golden Guinea Brew., Guinness Nig, Honeywell Flour Mill, International Breweries, Mcnichols, Multi-Trex Integrated Foods, Nigeria Flour Mills. Nascon Allied Industries, Nestle Nigeria, Nigerian Breweries. Nigerian Enamelware, PZ Cussons Nigeria, Unilever Nigeria, Union Dicon Salt, Vitafoam Nig The sampling technique used was simple random sampling technique. The data type was primary data. And the nature of date was qualitative data. Data collection instrument used was structured questionnaire which contains section A for bio data of the respondents and section B for questions/statements on the objectives of the study. Research tool and analysis, for descriptive statistics, simple table, frequency mean and standard deviation while for inferential statistics, Ordinary Least Square (OLS) and Analysis of Variance (ANOVA) were used to test the Hypotheses.

# Model Specification

The general model is:

FM = f(FAP)

The model specifications for the two specific objectives are stated below: FD = f(FAP)

FP = f(FAP)

FDi= α1 + α2FAP + εi… (i)

FPi = α1 + α3FAP + εi… (ii)

Where:

FM = Fraud management; FD = Fraud Detection;

FP = Fraud Prevention;

FAP =Forensic Accounting Practice; α 1 = Constant,

α2. α3= Coefficient,

εt = Error term.

# Data Presentation and Analysis

* 1. **Preamble**

Of the three (300) questionnaires that were administered, two hundred and seventy-six (276) were returned while two hundred and fifty-eight (258) were considered to have been satisfactorily completed, resulting in a response rate of 86.0%. The study considered this to be a good representative for the data analyses.

# Presentation and Demographic Distribution of Data

**Table 4.2.1** Descriptive Statistics on demographic variables of Means and Standard Deviations of bio data which are: gender, age bracket, academic qualification, professional qualifications, years of experience, level in organization and department/unit.

# Table 4.2.1 Descriptive Statistics

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| N | | Minimum | Maximum | Mean | Std. Deviation |
| Gender | 258 | 1.00 | 2.00 | 1.3588 | .48148 |
| Age Bracket | 258 | 1.00 | 5.00 | 2.5420 | .78701 |
| Highest Academic  Qualification | 258 | 1.00 | 4.00 | 2.8473 | .66185 |
| Highest Professional  Qualification | 258 | 1.00 | 4.00 | 2.6412 | .85096 |
| Years of Accounting  Experience | 258 | 1.00 | 5.00 | 1.8550 | .92089 |
| Level in Organization | 258 | 1.00 | 3.00 | 1.7634 | .74247 |
| Department or Unit | 258 | 1.00 | 4.00 | 1.7252 | .80435 |
| Valid N (listwise) | 258 |  |  |  |  |

*(****Source****: Field Survey, 2024 & Computations Aided by SPSS Version 25.0)*

From table 4.1 above and descriptively, it can be seen that gender has a mean and standard deviation of 1.3588 and 0.4815 respectively. Age bracket has a mean and standard deviation of 2.5420 and 0.7870 respectively. The staff highest qualification has a mean and standard deviation of 2.8473 and 0.6619 respectively. Highest Professional Qualification has a mean and standard deviation of 2.6412 and 0.8510 respectively. The years of accounting and related experience has a mean and standard deviation of 1.8550 and 0.9209 respectively too. The level of organization has a mean and standard deviation of 1.7634 and 0.7425 respectively and the department or unit has a mean and standard deviation of 1.7252 and 0.8044 respectively too.

# Description of both independent and dependent variables Independent Variable

**Table 4.2.2** Descriptive Statistics on variables of Means and Standard Deviations of

*Forensic Accounting Practices* Dimension.

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| N | | Minimum | Maximum | Mean | Std. Deviation |
| FAP\_1 | 258 | 1.00 | 5.00 | 4.3206 | 1.00205 |
| FAP\_2 | 258 | 1.00 | 5.00 | 4.0687 | 1.13809 |
| FAP\_3 | 258 | 1.00 | 5.00 | 4.3664 | .79620 |
| FAP\_4 | 258 | 1.00 | 5.00 | 4.3740 | .77793 |
| FAP\_5 | 258 | 1.00 | 5.00 | 4.2977 | .90038 |
| FAP\_6 | 258 | 1.00 | 5.00 | 4.3893 | .85550 |
| Valid N (listwise) | 258 |  |  |  |  |

*(****Source****: Field Survey, 2024 & Computations Aided by SPSS Version 25.0)*

From table 4.2.2 above, it can be seen that the least mean (4.0687) is *FAP\_2* which is that *Litigation processes are part of the forensic accounting services provided by FMCGs.* and the highest mean (4.3893) is *FAP\_6* which is *Expert forensic accounting services are available in Nigerian FMCGs*, while the lowest Standard Deviation (0.7779) is FAP\_4 which is *Litigation assistance has an impact on the proper operation of forensic accounting services in Nigerian FMCGs* and highest Standard Deviation (1.1381) which is FAP\_2 which is *Litigation processes are part of the forensic accounting services provided by FMCGs*

Where FAP\_1 is “*In Nigeria, FMCGs are actively using forensic accounting services.”* FAP\_2 is “*Litigation processes are part of the forensic accounting services provided by FMCGs.”* FAP\_3 is “*Legal tactics are part of the forensic accounting services provided by FMCGs in Nigeria.”* FAP\_4 is “*Litigation assistance has an impact on the proper operation of forensic accounting services in Nigerian FMCGs.”* FAP\_5 is “*There is dispute settlement as part of the forensic accounting services employed by FMCGs.”* FAP\_6 is “*Expert forensic accounting services are available in Nigerian FMCGs.”*

# Dependent Variables

**Table 4.2.3** Descriptive Statistics on variables of Means and Standard Deviations of *Fraud Prevention* Dimension

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| N | | Minimum | Maximum | Mean | Std. Deviation |
| FP\_1 | 258 | 1.00 | 5.00 | 4.3511 | .79347 |
| FP\_2 | 258 | 1.00 | 5.00 | 4.3053 | .91897 |
| FP\_3 | 258 | 1.00 | 5.00 | 4.3740 | .82589 |
| FP\_4 | 258 | 2.00 | 5.00 | 4.4580 | .64759 |
| FP\_5 | 258 | 1.00 | 5.00 | 4.2824 | .91378 |
| FP\_6 | 258 | 1.00 | 5.00 | 4.3435 | .83915 |
| FP\_7 | 258 | 1.00 | 5.00 | 4.2290 | .96528 |
| Valid N (listwise) | 258 |  |  |  |  |

*(****Source****: Field Survey, 2024 & Computations Aided by SPSS Version 25.0)*

From table 4.2.3 above, it can be seen that the least mean (4.2824) is *FP\_5* which is *In FMCGs, forensic accountants respond swiftly to specific fraud claims.”.* and the highest mean (4.4580) is *FP\_3* which is “*Forensic accounting services aid in the prevention of fraud in FMCGs.”* while the lowest standard deviation (0.6476) is FP\_4 which is *the use of forensic accounting raises management's awareness of internal fraud in FMCGs”* and highest standard deviation (0.9653) is FI\_7 which is *the technique of forensic accounting aids in the reduction of financial fraud in Nigerian FMCGs.”*

Where FP\_1 is “*Forensic accounting aids in the fight against fraudulent activity in Nigerian FMCGs.”* FP\_2 is *A forensic accounting service minimizes the occurrence of fraud in FMCGs.”* FP\_3 is “*Forensic accounting services aid in the prevention of fraud in FMCGs.”* FP\_4 is “*The use of forensic accounting raises management's awareness of internal fraud in FMCGs.”* FP\_5 is

“*In FMCGs, forensic accountants respond swiftly to specific fraud claims.”* FP\_6 is “*As it deals directly with fraud in FMCGs companies, forensic accounting prevents expectation gaps.” and* FP\_7 is “*The technique of forensic accounting aids in the reduction of financial fraud in Nigerian FMCGs.”*

**Table 4.2.4** Descriptive Statistics on demographic variables of Means and Standard Deviations of

*Fraud Detection* Dimension

# Descriptive Statistics

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| N | | Minimum | Maximum | Mean | Std. Deviation |
| FD\_1 | 258 | 1.00 | 5.00 | 4.3282 | .91519 |
| FD\_2 | 258 | 1.00 | 5.00 | 4.3359 | .83768 |
| FD\_3 | 258 | 1.00 | 5.00 | 4.4809 | .69450 |
| FD\_4 | 258 | 1.00 | 5.00 | 4.4275 | .77490 |
| FD\_5 | 258 | 1.00 | 5.00 | 4.4580 | .78701 |
| FD\_6 | 258 | 1.00 | 5.00 | 4.4046 | .75221 |
| FD\_7 | 258 | 1.00 | 5.00 | 4.3588 | .84187 |
| FD\_8 | 258 | 1.00 | 5.00 | 4.3130 | .85110 |
| Valid N (listwise) | 258 |  |  |  |  |

*(****Source****: Field Survey, 2024 & Computations Aided by SPSS Version 25.0)*

From table 4.2.4 above, it can be seen that the least mean (4.3130) is *FD\_8* which is *In The use of Forensic Accounting aids FMCGs' internal controls in the identification of fraud”.* and the highest mean (4.4809) is *FD\_3* which is “*Forensic accountants specialize in fraud investigation, especially for successful criminal prosecution.”* while the lowest standard deviation (0.6945) is FD\_3 which is *Forensic accountants specialize in fraud investigation, especially for successful criminal prosecution.”* and highest standard deviation (0.9152) is FD\_1 which is *Forensic accounting services can aid in the detection of fraud in the Nigerian FMCGs sector.”*

Where FD\_1 is “*Forensic accounting services can aid in the detection of fraud in the Nigerian FMCGs sector.* FD\_2 is “*The use of forensic accounting detects fraud and increases stakeholder trust in financial accounts.”* FD\_3 is “*Forensic accountants specialize in fraud investigation, especially for successful criminal prosecution.”* FD\_4 is “*Computer fraudulent activities are easily identified in Nigerian FMCGs using forensic accounting.”* FD\_5 is “*Forensic accounting is useful in detecting fraud in FMCGs.”* FD\_6 is “*Forensic accounting is effective in tracking fraud in FMCGs.”* FD\_7 is “*Forensic accounting is useful in evaluating internal controls in FMCGs.”* FD\_8 is “*The use of forensic accounting aids FMCGs' internal controls in the identification of fraud.”*

# Pre-Estimation Test-Homogeneity of Variance

The study conducted Levene’s test of homogeneity of variance to know whether or not Analysis of Variance would be a suitable tool in estimating the specified model. The results of the test are provided in tables 4.3.1 to 4.3.3

***Forensic Accounting Practices* Dimension**

Results in table 4.3.1 show that *p*-value of 0.328 is greater than the level of significance of 0.05. These results compel the rejection of null hypothesis of homogeneity of variance and the acceptance of alternative hypothesis of heterogeneity of variance. These results therefore provide evidence that supports the appropriateness of the use of Analysis of Variance using *Forensic Accounting Practices* as the only independent variable.

**Table 4.3.1: Results of Test of Homogeneity of Variance on *Forensic Accounting Practices***

# Dimension

**Test of Homogeneity of Variances**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Levene  Statistic | | | df1 | df2 | Sig. |
| FAP | Based on Mean | 2.796 | 4 | 254 | .328 |
| Based on Median | .797 | 4 | 254 | .453 |
| Based on Median and  with adjusted df | .797 | 4 | 253.785 | .453 |
| Based on trimmed mean | 1.888 | 4 | 254 | .196 |

*(****Source****: Field Survey, 2024 & Computations Aided by SPSS Version 25.0)*

\*\*\**p*-value< 0.01; \*\**p*-value< 0.05

***Fraud Prevention* Dimension**

Results in table 4.3.2 show that *p*-value of 0.567 is greater than the level of significance of 0.05. These results compel the rejection of null hypothesis of homogeneity of variance and the acceptance of alternative hypothesis of heterogeneity of variance. These results therefore provide evidence that supports the appropriateness of the use of Analysis of Variance using *Fraud Prevention* as one of the independent variables.

# Table 4.3.2: Results of Test of Homogeneity of Variance on *Fraud Prevention* Dimension

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Levene  Statistic | | | df1 | df2 | Sig. |
| FP | Based on Mean | .421 | 4 | 254 | .567 |
| Based on Median | .073 | 4 | 254 | .830 |
| Based on Median and  with adjusted df | .073 | 4 | 252.492 | .830 |
| Based on trimmed mean | .176 | 4 | 254 | .519 |

*(****Source****: Field Survey, 2024 & Computations Aided by SPSS Version 25.0)*

\*\*\**p*-value< 0.01; \*\**p*-value< 0.05

***Fraud Detection* Dimension**

Results in table 4.3.3 show that *p*-value of 0.326 is greater than the level of significance of 0.05. These results compel the rejection of null hypothesis of homogeneity of variance and the acceptance of alternative hypothesis of heterogeneity of variance. These results therefore provide evidence that supports the appropriateness of the use of Analysis of Variance using *Fraud Detection* as one of the independent variables.

# Table 4.3.3: Results of Test of Homogeneity of Variances on *Fraud Detection*

**Dimension**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Levene  Statistic | | | df1 | df2 | Sig. |
| FD | Based on Mean | 2.584 | 4 | 254 | .326 |
| Based on Median | .880 | 4 | 254 | .595 |
| Based on Median and  with adjusted df | .880 | 4 | 252.781 | .596 |
| Based on trimmed mean | 1.771 | 4 | 254 | .258 |

***(Source****: Field Survey, 2024 & Computations Aided by SPSS Version 25.0)*

\*\*\**p*-value< 0.01; \*\**p*-value< 0.05

# Test of Reliability

The reliability of the research measures, particularly with regard to the internal consistency of the scale employed and, consequently, its appropriateness, was assessed using Cronbach's Alpha test of reliability. The test's results are displayed in table 4.4 below:

**Table 4.4:** *Reliability Coefficient for all Research Statements*

|  |  |  |
| --- | --- | --- |
| **Dimensions of Variables** | Cronbach's Alpha  Coefficient | Number of Items |
| **Dimensions of Independent Variable** |  |  |
| Forensic Accounting Practices | 0.763 | 6 |
| **Dimensions of Dependent Variables** |  |  |
| Fraud Detection | 0.759 | 7 |
| Fraud Prevention | 0.735 | 8 |

*(****Source****: Field Survey,2024 & Computations Aided by SPSS Version 25.0)*

Table 4.4's data suggest that the study's scale is internally consistent because it displays a coefficient that is above 0.60, a benchmark set by Heliyon (2022) avail that result between 0.60 –

0.80 is good. This implies that the research measures are considerably reliable.

# Test of Hypotheses Hypothesis 1

Ho1: The application of forensic accounting practices established does not prevent financial fraud in selected listed consumers’ goods firms in Nigeria.

# Table 4.5.1: Model Summary for Hypothesis One

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Model | R | R Square | Adjusted R Square | Std. Error of the  Estimate | Durbin- Watson |
| 1 | .325a | .105 | .055 | .97434 | 1.133 |

1. Predictors: (Constant), FAP

As noted in table 4.5.1, the R Square of 10.50% suggests a very strong model. The 10.50% R Square revealed that total variation in the fraud prevention in FMCGs is attributed to forensic accounting practices while 89.50% of the total variation in the forensic accounting practices is accounted for by other variables captured in the model.

# Table 4.5.2: Result of ANOVA for Hypothesis Onea ANOVAa

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| Model |  | Sum of Squares | Df | Mean Square | F | Sig. |
| 1 | Regression | 13.765 | 7 | 1.966 | 2.071 | .052b |
| Residual | 116.769 | 251 | .949 |  |  |
| Total | 130.534 | 258 |  |  |  |

1. Dependent Variable: FP
2. Predictors: (Constant), FAP

The overall fitness of the model is established based on the results in table 4.5.2, from which it can be inferred that Forensic Accounting Practices have significant influence on fraud prevention of FMCGs in Nigeria (F= 2.071, *p*-value =0.000).

# Table 4.5.3: Result of Ordinary Least Square for Hypothesis Onea Coefficientsa

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Unstandardized  Coefficients | | | | Standardized  Coefficients | T | Sig. | Collinearity  Statistics | |
| Model | | B | Std. Error | Beta | Tolerance | VIF |
| 1 | (Constant) | 1.970 | 1.159 |  | 1.699 | .092 |  |  |
| FP\_1 | .237 | .108 | .188 | 2.199 | .030 | .997 | 1.003 |

1. Dependent Variable: FAP.

Results in table 4.5.3 revealed that the partial elasticity coefficient of forensic accounting practices with respect to fraud prevention in FMCGs in Nigeria is 0.092, indicating that forensic accounting practices affect fraud prevention in FMCGs in Nigeria. This coefficient is however significant (t=1.699, *p*-value>0.05) to individually forensic accounting practices influence slightly affects r fraud prevention in FMCGs in Nigeria. With these results, the null hypothesis is rejected, while

the alternative hypothesis is accepted. The inference there from is that the application of forensic accounting prevents financial fraud in selected listed consumers’ goods firms in Nigeria.

**Hypothesis 2**

Ho2: The application of forensic accounting practices accessed does not detect financial fraud in selected listed consumers’ goods firms in Nigeria.

# Table 4.5.4: Model Summary for Hypotheses Two Model Summary

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Model | R | R Square | Adjusted R  Square | Std. Error of the  Estimate | Durbin-Watson |
| 1 | .316a | .100 | .041 | .98121 | 1.208 |

As noted in table 4.5.4, the R Square of 10.0% suggests a strong model. The 10.0% R Square revealed that the total variation in the fraud detection of FMCGs is attributed to forensic accounting practices, while 90.0% of the total variation in the fraud detection is accounted for by other variables not captured in the model.

# Table 4.5.5: Result of ANOVA for Hypothesis Two ANOVAa

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| Model | | Sum of Squares | Df | Mean Square | F | Sig. |
| 1 | Regression | 13.075 | 8 | 1.634 | 1.698 | .106b |
| Residual | 117.459 | 252 | .963 |  |  |
| Total | 130.534 | 260 |  |  |  |

1. Dependent Variable: FD
2. Predictors: (Constant), FAP

The overall fitness of the model is established based on the results in table 4.5.5, from which it can be inferred that forensic accounting practices have significant influence on fraud detection in FMCGs (F= 1.698, *p*-value =0.000).

# Table 4.5.6: Result of Ordinary Least Square for Hypothesis Two a

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Unstandardized  Coefficients | | | | Standardized  Coefficients | T | Sig. | Collinearity Statistics | |
| Model | | B | Std. Error | Beta | Tolerance | VIF |
| 1 | (Constant) | 1.025 | 1.313 |  | .781 | .436 |  |  |
| FD\_8 | .231 | .106 | .196 | 2.177 | .031 | .907 | 1.102 |

1. Dependent Variable: FAP.

Results in table 4.5.6 revealed that the partial elasticity coefficient of forensic accounting practices with respect to fraud detection of FMCGs .436, indicating that forensic accounting practices affect fraud detection of FMCGs in Nigeria. This coefficient is also statistically significant (t=2.177, *p*- value<0.05) to individually forensic accounting practices influence affects fraud detection of FMCGs. With these results, the null hypothesis is rejected, while the alternative hypothesis is accepted. The inference there from is that forensic accounting practices significantly detect fraudulent activities in Nigerian fast moving consumer goods.

# Post Estimation Tests

* + 1. **Normality of Residuals**

As shown in table 4.6.1, the mean residual of is 0.0000, indicating that the residuals from the estimated ordinary least square regression are normally distributed and the variance of the residuals is the same for all values of the independent variable.

# Table 4.6.1: Results of Residual Statistics Residuals Statisticsa

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Minimum | | Maximum | Mean | Std. Deviation | N |
| Predicted Value | 2.8652 | 5.2011 | 4.3206 | .44745 | 258 |
| Residual | -3.49258 | 1.47435 | .00000 | .89660 | 258 |
| Std. Predicted Value | -3.253 | 1.968 | .000 | 1.000 | 258 |
| Std. Residual | -3.788 | 1.599 | .000 | .973 | 258 |

a. Dependent Variable: Forensic Accounting Practices

# Residuals Statistics

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Minimum | | Maximum | Mean | Std. Deviation | N |
| Predicted Value | 3.5132 | 5.0844 | 4.3206 | .32540 | 258 |
| Residual | -3.19426 | 1.43923 | .00000 | .94775 | 258 |
| Std. Predicted Value | -2.481 | 2.347 | .000 | 1.000 | 258 |
| Std. Residual | -3.278 | 1.477 | .000 | .973 | 258 |

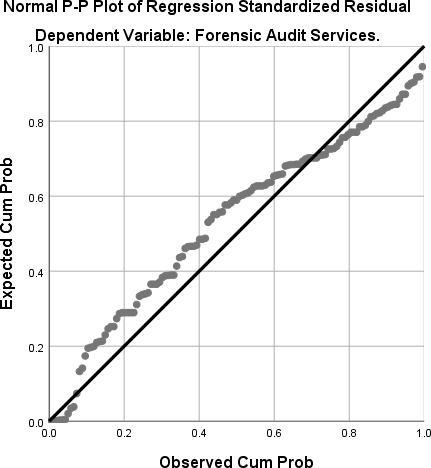
a. Independent Variable: Fraud prevention

# Residuals Statisticsa

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Minimum | | Maximum | Mean | Std. Deviation | N |
| Predicted Value | 3.2832 | 4.9996 | 4.3206 | .31714 | 258 |
| Residual | -3.40882 | 1.35137 | .00000 | .95054 | 258 |
| Std. Predicted Value | -3.271 | 2.141 | .000 | 1.000 | 258 |
| Std. Residual | -3.474 | 1.377 | .000 | .969 | 258 |

a. Independent Variable: Fraud detection

*(****Source****: Field Survey, 2024 & Computations Aided by SPSS Version 25.0)*



# Figure 4.6: Normal P-P Plot of Regression Standardized Residual

* 1. **Discussion of Findings**

Analyses from the previous sections revealed that the selected Fast Moving Consumer Goods (FMCGs) embraced forensic accounting practices and fraud management in Nigeria. Inferential results using regression analysis show as noted in table 4.5.1, the R Square of 19.9% suggests a very strong model. As noted in table 4.5.4, the R Square of 10.50% suggests a very strong model. The 10.50% R Square revealed that total variation in the fraud prevention in FMCGs is attributed to forensic accounting practices while 89.50% of the total variation in the forensic accounting practices is accounted for by other variables captured in the model. As noted in table 4.5.7, the R Square of 10.0% suggests a strong model. The 10.0% R Square revealed that the total variation in the fraud detection of FMCGs is attributed to forensic accounting practices, while 90.0% of the total variation in the fraud detection is accounted for by other variables not captured in the model.

Using ANOVA, it can be inferred that the overall fitness of the model is established based on the results in table 4.5.5, from which it can be inferred that forensic accounting practices have significant influence on fraud prevention of FMCGs in Nigeria (F= 2.071, p-value =0.000). The overall fitness of the model is established based on the results in table 4.5.8, from which it can be inferred that forensic accounting practices have significant influence on fraud detection in FMCGs (F= 1.698, p-value =0.000). Results in table 4.5.6 revealed that the partial elasticity coefficient of forensic accounting practices with respect to fraud prevention in FMCGs in Lagos State Nigeria is 0.092, indicating that forensic accounting practices affect fraud prevention in FMCGs in Nigeria. This coefficient is however significant (t=1.699, p-value>0.05) to individually forensic accounting

practices influence slightly affects r fraud prevention in FMCGs in Nigeria. With these results, the null hypothesis is rejected, while the alternative hypothesis is accepted. The inference there from is that There is significant relationship between forensic accounting practices and fraud prevention in Nigerian Fast Moving Consumer Goods. Results in table 4.5.9 revealed that the partial elasticity coefficient of forensic accounting practices with respect to fraud detection of FMCGs .436, indicating that forensic accounting practices affect fraud detection of FMCGs in Nigeria. This coefficient is also statistically significant (t=2.177, p-value<0.05) to individually forensic accounting practices influence affects fraud detection of FMCGs. With these results, the null hypothesis is rejected, while the alternative hypothesis is accepted. The inference there from is that Forensic Accounting practices significantly detect fraudulent activities in Nigerian fast moving consumer goods companies.

The study's conclusions are same with Adesina,et al (2024) whose results demonstrated that the use of knowledgeable and skilled forensic Accounting would not only contribute to the amelioration of financial frauds in FMCGs, Abubakar, et al (2022) also found from their study that forensic Accounting has a significant effect on fraud detection by virtue of the analysis showing an R square value of 0.795(i.e 79.5% approx.) Also Donatus, et al (2022) demonstrated that trend analysis and computer-assisted accounting techniques had a significant positive impact on occupational fraud detection, while data mining technique had a significant positive impact.

Edward and Agboare (2021) Results demonstrated the strong impact of forensic accounting approaches on financial fraud detection in the areas of financial transaction analysis, investigation, and reconstruction in Fast Moving Consumer Goods in Nigeria. Adabenege (2020) found out that there is a very strong and statically relationship that exist between forensic Accounting and fraud detection, prevention and investigation.

Adejana, et al, (2020) results showed that while the application of forensic accounting had no appreciable impact on fraud prosecution in Nigeria, it had a considerable impact on fraud detection.

Ewa, et al (2020) outcome showed that using forensic accounting techniques greatly improved fraud identification and prevention within the financial system. Abdulrahman, (2019) According to this study, there is a strong correlation between fraud prevention and forensic accounting methods. In 2019, Zachariah et al. In order to incorporate forensic accountants into the accounting team, the study recommended changing the current statutes to allow for the use of forensic accounting in Nigerian consumer goods companies. The findings of Onodi et al. (2019) revealed that although fraud cases usually require the specialized services of forensic investigators, the majority of Nigerian accountants and accounting staff members have a poor understanding of and familiarity with forensic investigative techniques. Aribaba (2018)’ study revealed that forensic accounting services has a lot of potential and can immensely contribute to the development of Nigerian economy.

Okoye and Gbegi (2018) in their study it was discovered that using forensic accounting can improve the detection and prevention of fraud cases in public-sector organizations by substantially lowering the frequency of fraud cases in the sector. Kolawole, et al (2018) study revealed that forensic accounting reduces asset misappropriation in Nigerian Fast Moving Consumer Goods. Ogundana, Wisdom and Oladapo's (2018) research findings showed that forensic accounting significantly affects both the prevention and detection of fraud. The findings of Onuorah and Ebimobowei (2018) showed that the degree of fraud committed by consumer goods companies is impacted by the use of forensic accounting services. According to Muthusamy's (2018) findings, the current conceptual model validates perceived risks and benefits as important direct antecedents of attitude. According to Njanike, Dube, and Mashayanye's (2018) findings, forensic accounting departments face a number of difficulties, including a lack of technical expertise, materials resources, managerial intervention, and ambiguous professional recognition.

# Contribution to knowledge

The study will serve as a policy guidelines and framework for policy makers, management of fast- moving consumer goods companies, economic and financial crimes commission, and other on the importance and need for forensic accounting practices to be adopted in other to prevent and detect fraud in other industries outside Fast-Moving Consumers’ Goods Companies.

# Conclusion and Recommendations

* 1. **Conclusion**

From the findings of this study which follows Fraud triangular theory and Diamond theory, it can be concluded as follows that:

* + 1. There is significant relationship between forensic accounting practices and fraud prevention in Nigerian fast moving consumer goods.
    2. Finally result forensic accounting practices significantly detect fraudulent activities in Nigerian fast moving consumer goods.
    3. Jointly, forensic accounting practices have significant effect on fraud prevention and detection in Nigerian fast moving consumer goods system.
    4. However, availability of forensic accounting expert has the highest force when compare to other sub variables of forensic auditing practices.
    5. While the least one is among the independent variable is litigation process.

# Recommendations

The recommendations made by the study align with the findings of the literature review and research objectives with their implications.

* + 1. According to the report, it is critical to update the organizational structure of the business to better accommodate forensic accounting services in other to prevent the fraudulent activities within the organisation.
    2. It is imperative that internal controls department and management get education and information on the most prevalent kind of fraud and the department is accountable in order to detect and combat unjustifiable financial loss and fraudulent practices. This could help lower the number of lawsuits filed against the auditors, which can be expensive and harm the company's reputation.
    3. It is necessary for the industry to provide precise guidelines to direct accounting practices in the rapidly evolving consumer product’s business.
    4. Professional forensic accountants are required to conduct investigations in prosecution cases according to established forensic protocols, and in fraud situations, they are to take disciplinary action.
    5. Forensic accounting services should be made available to fast-moving consumer goods companies in Nigeria by the Corporate Affairs Commission (CAC), Manufacturing Association of Nigeria (MAN), and Nigeria Deposit Insurance Corporation (NDIC).

**Questionnaire**

**Dear Sir/Ma**

**Lagos State University School of Post Graduate Studies Faculty of Management Sciences**

**Department of Accounting Ojo Campus, Ojo**

**Request to Fill in a Questionnaire**

I **(RAHHED, Lateef Olayiwola)**, a post-graduate student of the above institution and am conducting research on *'' Forensic Accounting Practices and Fraud Management in selected listed Fast Moving Consumer Goods (FMCGs) in Nigeria*'.

The objectives of this study are to examine the extent at which application of forensic accounting detect financial fraud in selected listed consumers’ goods firms in Nigeria and to examine the extent at which application of forensic accounting prevent financial fraud in selected listed consumers’ goods firms in Nigeria.

Please assist to fill in the questionnaire to the best of your knowledge.

This research is intended for academic purpose only and all responses will be treated with utmost confidential.

Thanking you for your cooperation. **RAHHED, Olayiwola Lateef SECTION A: Bio Data**

***Please tick as appropriate***

|  |  |  |  |
| --- | --- | --- | --- |
| **1** | **Gender** | Male |  |
| Female |  |

|  |  |  |  |
| --- | --- | --- | --- |
| **2** | **Age** | 18 - 25 years |  |
| 26 - 35 years |  |
| 36 - 45 years |  |
| 46 - 55 years |  |
| 56 and above |  |

|  |  |  |  |
| --- | --- | --- | --- |
| **3** | **Highest Academic Qualifications** | O Level/SSCE/GCE |  |
| ND/NCE |  |
| HND/HSc/BSc |  |
| Masters (MSc.) |  |
| Doctorate in Philosophy (PhD) |  |

|  |  |  |  |
| --- | --- | --- | --- |
| **4** | **Highest Professional Qualifications** | None |  |
| Technician Scheme category |  |
| Associate category |  |
| Fellow category |  |
| Other category |  |

|  |  |  |  |
| --- | --- | --- | --- |
| **5** | **Years of Accounting Experience** | 1 - 5 years |  |
| 6 - 10 years |  |
| 11 -15 years |  |
| 16 - 20 years |  |
| 21 - 25 years |  |
| 26 years and above |  |

|  |  |  |  |
| --- | --- | --- | --- |
| **6** | **Level in Organization** | Executive Level |  |
| Senior Management Level |  |
| Junior Management Level |  |

|  |  |  |  |
| --- | --- | --- | --- |
| **7** | **Department or unit** | Accounting |  |
| Auditing |  |
| Treasury and Finance |  |
| Others |  |

# Section B: Statements/Questions to answer the hypotheses to be tested.

***Please tick as appropriate.***

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
|  | **Dimensions of Forensic Accounting Practices** | **Strongly Agreed** | **Agreed** | **Undecided** | **Disagreed** | **Strongly Disagreed** |
| 1 | *In Nigeria, FMCGs are actively using forensic accounting services.* | 5 | 4 | 3 | 2 | 1 |
| 2 | *Litigation processes are part of the forensic accounting services provided by FMCGs* | 5 | 4 | 3 | 2 | 1 |
| 3 | *Legal tactics are part of the forensic accounting services provided by FMCGs in Nigeria.* | 5 | 4 | 3 | 2 | 1 |
| 4 | *Litigation assistance has an impact on the proper operation of forensic accounting services in Nigerian FMCGs.* | 5 | 4 | 3 | 2 | 1 |
| 5 | *There is dispute settlement as part of the forensic accounting services employed by FMCGs.* | 5 | 4 | 3 | 2 | 1 |
| 6 | *Expert forensic accounting services are available in Nigerian FMCGs.* | 5 | 4 | 3 | 2 | 1 |
|  | **Dimensions of Fraud Prevention** |  |  |  |  |  |
| 7 | *Forensic accounting aids in the fight against fraudulent activity in Nigerian FMCGs.* | 5 | 4 | 3 | 2 | 1 |
| 8 | *A forensic accounting service minimizes the occurrence of fraud in FMCGs.* | 5 | 4 | 3 | 2 | 1 |
| 9 | *Forensic accounting services aid in the prevention of fraud in FMCGs.* | 5 | 4 | 3 | 2 | 1 |
| 10 | *The use of forensic accounting raises management's awareness of internal fraud in FMCGs.* | 5 | 4 | 3 | 2 | 1 |
| 11 | *In FMCGs, forensic accountants respond swiftly to specific fraud claims.* | 5 | 4 | 3 | 2 | 1 |
| 12 | *As it deals directly with fraud in FMCGs companies, forensic accounting prevents expectation gaps.* | 5 | 4 | 3 | 2 | 1 |
| 13 | *The technique of forensic accounting aids in the reduction of financial fraud in Nigerian FMCGs.* | 5 | 4 | 3 | 2 | 1 |
|  | **Dimensions of Fraud Detection** |  |  |  |  |  |
| 14 | *Forensic accounting services can aid in the detection of fraud in the Nigerian FMCGs sector.* | 5 | 4 | 3 | 2 | 1 |
| 15 | *The use of forensic accounting detects fraud and increases stakeholder trust in financial accounts.* | 5 | 4 | 3 | 2 | 1 |
| 16 | *Forensic accountants specialize in fraud investigation, especially for successful criminal prosecution.* | 5 | 4 | 3 | 2 | 1 |
| 17 | *Computer fraudulent activities are easily identified in Nigerian FMCGs using forensic accounting.* | 5 | 4 | 3 | 2 | 1 |
| 18 | *Forensic accounting is useful in detecting fraud in FMCGs.* | 5 | 4 | 3 | 2 | 1 |
| 19 | *Forensic accounting is effective in tracking fraud in FMCGs.* | 5 | 4 | 3 | 2 | 1 |
| 20 | *Forensic accounting is useful in evaluating internal controls in FMCGs.*. | 5 | 4 | 3 | 2 | 1 |
| 21 | *The use of forensic accounting aids FMCGs' internal controls in the identification of fraud.* | 5 | 4 | 3 | 2 | 1 |
|  | \*\*\***Thank You and God Bless You for Your Participation\*\*\*** |  |  |  |  |  |

# References

Abdulrahman M.H.A., Yajid M.S.A., Khatibi A., & Azam S.M.F. (2020). Forensic accounting on fraud detection in the UAE Banking Sector. *European Journal Management of Marketing Studies, 5*(2), 13-37.

Abdulrahman, S. (2019). Forensic accounting and fraud prevention in Nigerian public sector: A conceptual paper. *Igbinedion University Journal of Accounting, 2*(7), 215-238.

Afriyie, S. O., Akomeah, M. O., Amoakohene, G., Ampimah, B. C., Ocloo, C. E., & Kyei, M. O.(2022). Forensic accounting: A novel paradigm and relevant knowledge in fraud detection and prevention. *International Journal of Public Administration, 5*(2), 1-10. <https://doi.org/10.1080/01900692.2021.2009855>

Akinadewo, I. S. & Akinkoye, E. Y. (2020). Application of forensic accounting and domestic debt management on government revenue in Nigeria. *Issues in Business management and Economics, 8*(3), 25- 31. Doi.org/10.15739/IBME.20.003

Alamry, S. J. M., Al-Attar, H. A., & Salih, A. S. (2022). The effect of using the Balanced Scorecard (BSC) on reducing the financial and administrative corruption in Iraqi Government Units. *International Journal of Financial, Accounting, and Management, 4*(1), 67- 83. <https://doi.org/10.35912/ijfam.v4i1.732>

Aminu, Y., Amos, R. M., Livinus, R. & Nidiya, S. A. (2022). Forensic accounting: A means tofraud control in Nigerian economy. *Journal of Business management, 8*(12), 40-49.DOI: 10.53555/bm. v8i12.5327

Bijuna, C., & Sequeira, A. (2012). Customer-based brand equity in the fast-moving consumer goods industry in India. *International Journal of management, 1*(4), 1-19

Chepngeno, K. F., and Fred S. (2020). Effect of litigation support services on fraud mitigation in firms listed at the Nairobi Securities Exchange, Kenya. *IOSR Journal of Economics and Finance, 11*(4):43-51

Crumbley, D. L., Heitger L.E., and Smith, G. S. (2007). *Forensic and Investigative Accounting*, (3rd ed), Chicago: CCH.

Dada, S. & Jimoh, F. (2020). Forensic accounting and financial crimes in Nigerian public sector.

*Journal of Accounting and Taxation, 12(*4), 118-125.

Ehioghiren, E. E. &Atu, O. O. K. (2016). Forensic accounting and fraud management: evidence from Nigeria. *Igbinedion University Journal of Accounting*, 248-308.

Ewa, U. E, Adebisi W. A. & Eseneyan (2020). Evaluation of forensic accounting techniques in fraud prevention/detection in the banking Sector in Nigeria. *International journal of finance and accounting, 9*(3), 56-66. DOI: 10.5923/j.ijfa.20200903.02

Eze, G.P. (2015). *Corporate Fraud and Forensic Accounting.* Port Harcourt: Vinson Publishers.

Ezejiofor, R.A., Nwakoby, N.P., & Okoye, J.F.N. (2019). Impact of forensic accounting on combating fraud in Nigerian banking industry. *International Journal of Academic Research in Management and Business, 1*(1), 1-19.

Frankline, C.S.A, O.Ezeilo, C.B., Nwodo, A.T. & Ofor, T.N. (2022). Impact of forensic accounting on financial reporting of selected quoted banks in Nigeria. *International Journal of Accounting Research, 10*(6), 1-7, DO1: 10.35248/2427-114X.22.10.271

Gottschalk, P. (2010), Prevention of white-collar crime: The role of accounting. *Journal of Forensic and Investigative Accounting, 3*(1), 23-48.

Hecht, M. & Redmond, M. (2010). Unveiling the mystery of forensic accounting; retrieved on August 21, 2014, from https:/[/www.accounting.today.com/news/Unveiling-Mystery-](http://www.accounting.today.com/news/Unveiling-Mystery-) Forensic-Accounting-56712-1.html?zkPrintable=1andnopagination=1

IBAN. (2016). *A guide to inclusive business in the fast-moving consumer goods (FMCG) sector.*

Retrieved from https:/[/www.swift.com>da](http://www.swift.com/)ta-standards

Imoniana, Antunes, and Formigoni (2013). The forensic accounting and corporate fraud. *Journal of Information Systems and Technology Management*, Revista de Gestao da Tecnologia e Sietemas de Informacao*,10* (1),119-144.

Karwai, S.A (2002). Bank Fraud: Can Shariah prevent it? *Sound Of Business Administration.*

2.(*1*)62-78.

KPMG (2016). Fast Moving Consumer Goods. *Africa Sector report*.

Modugu, K.P, & Anyaduba, J.O. (2020): Forensic Accounting and Financial Fraud in Nigeria. An Empirical Approach, *IJSSET, 4*(8) htpp://ijbssnet, com/journals/vol.\_4\_No\_8\_special\_issue\_July\_2024/28.pdf.

Nonye, A. & Okoli, B. E. . (2015). Forensic Accounting As a Veritable Tool for Efficient Management of State Owned Public Sectors in Ebonyi State: The Accountants Perspective. *British Journal of Education. 3*(8), 55 -62.

Nwaze, C. (2012). Due process and accountability: Advance fee fraud (1) *Zenith Economic Quarterly 8*(2), 24-28.

Ogiriki. T. & Appah. E . (2018). Forensic Accounting & Auditing Techniques on Public sector fraud in Nigeria. *International Journal of African and Asian Studies, 47*, 7-16.

Okafor .B. (2004). Strategic approach to reduction of employee theft, fraud and embezzlement.

*Nigeria’s Accountant, 37*(4), 3-5.

Okoye, E.I. & Gbengi, D.O. (2013). The Role of Forensic Accounting: A tool for Detection and Prevention of Fraud in Public Sector (A case of Selected Ministries in Kogi State):

Retrieved April, 21, 2020. From: https:/[/www.researchgate.net/publication/324529399\_Forensic\_Accounting\_A\_tool\_](http://www.researchgate.net/publication/324529399_Forensic_Accounting_A_tool_) for\_Fraud\_Detection\_and\_Prevention\_in\_the\_Public\_Sector\_A\_Study\_of\_Selected\_ Ministries\_in\_Kogi\_State.

Okoye E.I., & Akamobi N.L. (2009). The Role of Forensic Accounting in Fraud Investigation and Litigation Support. *The Nigerian Academic Forum,17* (1).

Onuora, E., Akpoveta B., & Agbomah, D. J. (2018). Public sector accounting fraud in Nigeria.

*Accounting & Taxation Review, 2*(4), 125-135.

Oranefo, P. C., & Egbunike, C. F. (2021). An exploration of the viability of forensic accounting techniques in combating financial statement fraud in Nigerian organizations. *Annals of Management and Organization Research, 3(*1), 69-81.

<https://doi.org/10.35912/amor.v3i1.1170>

Oyerogba, E.O. (2021). Forensic auditing mechanism and fraud detection: the case of Nigerian Public Sector. *Journal of Accounting in Emerging Economies,* 2042-1168.

DO110.11808/JAEE-04-2020-0072

Ozkul, F.U., & Pamukc¸A. (2012). *Fraud Detection and Forensic Accounting*, Istanbul, Turkey.

Pradhan, J., & Misra, D. P. (2014). Rural brand awareness and preferences for FMCGs: An empirical study on Keonjhar district of Odisha, India. *IOSR Journal of Business and Management, 16*(9), 17-29.

Stanbury, J., & Paley-Menzies, C. (2010). Forensic futurama: *Why forensic accounting is evolving*. Retrievedfrom<http://www.aicpa.org/Publications/News>etters/AICPACPAInsider/201 0/jun28/Pages/ForensicFuturamaWhyForensicAcc ountingIsEvolving.aspx.

Tapang, A.T., & Ihendinihu, J.U. (2020). Effect of forensic accounting services on unethical practices in Nigerian banking industry. *Journal of Accounting and Management, 10*(1).

Tien, D. N., Thanh, H. H.(2024). The impacts of internal audit practices on the quality of internal control in Vietnamese SMES. *International Journal of Professional. Business Review, 8*(5), 01-12.

Wang, J., Liao, Y., Tsai, T. & Hung, G. (2006). Technology-based financial frauds in Taiwan: issue and approaches, IEEE Conference at *Taiwan on: Systems, Man and Cyberspace*, 1120–1124.

Williams, I. (2005). Corrupt practices: Implications for Economic Growth and Development of Nigeria. *The Nigeria accountants, 38* (4), 44-50.

Zysman, A., (2004). Forensic accounting demystified. World investigators network standard practice for investigative and forensic accounting engagement? *Canadian Institute of Chartered Accountants.*