

## AUDIT QUALITY AND FIRM VALUE OF MEDIUM SCALE ENTERPRISES IN NIGERIA

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### ABSTRACT

*The study investigated how quality audits impacts the value of medium-sized enterprises in Nigeria. In particular, the research examined how audit firm size, audit tenure, and audit fees impact the market value of medium-sized enterprises. Data collected from 2012 to 2021 were obtained from annual reports as a secondary source. The study used a panel regression analysis econometric model and the Hausman test was used to select between fixed effects (FE) and random effects (RE) models. The findings showed that both the length of time a firm's audit had been conducted and the amount of fees paid for the audit had significant impacts on market value. It was surprising that the size of the audit firm did not show a statistically significant impact on market value. According to the results, it was recommended medium-sized businesses to expand their options when choosing audit firms. Selecting reputable and competent firms could improve how the market views them and ultimately increase their market value. Additionally, it is important for organizations to prioritize building lasting relationships with auditing firms because established and reliable audit partnerships can have a positive effect on their market value.*

**Key Words:** *Audit Quality, Firm Value, Audit firm size, Audit tenure, Audit fees.*

### Introduction

Audit quality has a vital role in strengthening confidence in the credibility and integrity of financial statements which is essential for enhanced firm financial performance (Farouk & Hassan, 2014). Furthermore, the quality of the audit also plays a crucial role in building the trust of users in the audit report, which they base their investment decisions on. An auditor is responsible for preventing, identifying, and reporting fraud, as well as other illegal activities and errors (Oluwagbemiga, 2010). This point has been especially emphasized by the collapse of small and large companies around the globe. Tobi et al. (2016) stated that auditor independence plays a crucial role in enhancing financial reporting quality by enhancing the audit process effectiveness and efficiency, and preventing auditors from becoming too close to their clients, which could potentially compromise their impartiality. Auditors' independence is crucial for ensuring that users have trust in the audited statement. Impact auditor independence could be enhance through factors such as non-audit services and association with clients.

Furthermore, prolonged audit tenure with a client can potentially compromise the independence of auditors (Jackson et al, 2008). Therefore, regulators set rules to supervise the relationship between auditors and clients. The Sarbanes-Oxley (SOX) Act and SEC regulations impose additional limitations on auditors offering non-audit services. An auditor is responsible for preventing,

identifying, and disclosing fraud, as well as other unlawful activities and mistakes (Oluwagbemiga, 2010). This point has been greatly emphasized by the collapse of various small and large companies globally. Auditor independence plays a crucial role in enhancing the quality of financial reporting by enhancing the audit process's efficiency and effectiveness and preventing auditors from becoming too close to their clients, which could compromise their objectivity according to Tobi et al. (2016). Maintaining user confidence in audited financial statements relies heavily on the independence of auditors.

Also, if the auditors overstay with a client as extended audit tenure, the independence may be affected (Jackson *et al*, 2008). Therefore, regulators established guidelines to govern the connection between the auditor and the client. Arens et al. (2012) stated that the PCAOB has released further independence rules concerning the offering of specific tax services.

The SOX act requires that the lead and concurring audit partner rotate off the audit engagement after five years Arens et al. (2012). Preventing the provision of certain audit services to the client and rotating audit partners can uphold auditor independence. Furthermore, the continual pursuit of higher company profits underlines the significance of improving company financial performance. Lee et al. (2007) investigates whether the impact of the quality of financial statements is higher when financial statements are audited by the big accounting firms. Investors can make better predictions about future earnings when financial statements are audited by big accounting firms.

Apart from Ugwunta *et al*. (2018) who assessed the effect of audit quality on share prices in Nigerian oil and gas sector using regression and covariance analyses; Egbunike and Abiahu, (2017) who investigated audit firm report and financial performance of Money Deposit Banks in Nigeria, and Eshitemi and Omwenga (2016) examined the relationship between auditor's independence, size of the audit firm, attributes of the audit team and experience of the auditor and Financial Performance of Listed Parastatals in Nigeria Exchange Group. This study aware of the study of the relationship between audit quality and firm value of medium scale enterprises in Nigeria. Thus, this study investigates how the quality of audits impacts the value of companies in Nigeria. In practice, auditors often extend that communication to include less significant deficiencies as well, along with suggestions for improving internal control. The latter communication is ordinarily in writing, although it is customary to review its contents with management before the document, known as either a "management letter" or an "internal control letter," is finalized. The management letter is provided as a service and is an important by-product of an audit. On the contrary, what we have to day with most companies is the liquidation and winding up. What then is responsible for this? Does audit quality influence the firm value of a firm?

## **2. LITERATURE REVIEW AND THEORETICAL FRAMEWORK**

### **2.1 Theoretical framework**

Audits play a key role in building trust and instilling confidence in financial data. Many theories have been created to help understand the existence of firms and the variations in their structure and success. This research is based on the Theory of inspired confidence and is backed up by Agency Theory. Audits play a vital role in boosting confidence and strengthening trust in financial data. A variety of theories have been created in an effort to clarify the existence of firms and their varying structures and achievements. This research is based on Theory of inspired confidence and bolstered by Agency Theory.

### **2.1.1 Theory of inspired confidence**

Concept of instilled trust was introduced by Theodore Limperg in 1932. It focuses on the need for and the provision of audit services and stated that the demand for audit services arises from external stakeholders engaging with the company. These stakeholders require the management to be accountable for their contributions to the firm. So, it links the need for dependable financial information with audit techniques' capacity to fulfill this need, emphasizing the evolution of both the environmental needs and auditing methods over time.

This theory is important for this research as it offers a complete framework that enhances traditional audit quality measures and gives useful information on how audit quality relates to firm value. By including behaviors and trust factors, It improves our comprehension of how audit quality impacts stakeholders' views, faith, and choices, ultimately impacting firm value in the Nigerian manufacturing industry and beyond.

### **2.1.2 Agency Theory**

The theory of agency was introduced by Stephen Rose and Barry Mitnick in 1973 but gained popularity when Jensen Meckling popularized it in 1976. The Agency Theory assumes that auditors are responsible for overseeing the relationship between managers and owners. The manager and owners must understand clearly that the auditor is not responsible for the accounting. Nonetheless, it is the responsibility of the auditor to ensure that the audit is sufficient (Andersson and Emander, 2005). It is a useful economic concept that helps explain how audit quality can be enhanced through accountability.

The need for auditing comes from information differences and conflicts of various stakeholders. The Theory is frequently utilized in research to investigate the disparity in information between principals (shareholders) and agents (management). The need for audits is driven by disparities in information and conflicts of interest among corporate managers, external investors, and intermediaries. Agency Theory is commonly used in research to examine the unequal distribution of information between shareholders (principals) and management (agents). The need for auditing comes from information differences and conflicts of interest among corporate managers, outside investors, and intermediaries.

## **2.2 Conceptual framework**

### **2.2.1 Concept of audit quality**

It is on record that several efforts have been made to conceptualize “audit quality” in the past, however, none has achieved recognition and acceptance on a universal basis (International Auditing and Assurance Standards Board, 2014). The starting point in defining audit quality that is cited by most audit researchers is that of DeAngelo (1981) who defines audit quality as the market-assessed joint probability that an auditor will (i) discover a breach in the client’s accounting system and (ii) be able to report the breach. The explanation highlights two key points of audit quality: the expertise of the auditor firm affecting the chance of finding errors, and the independence and objectivity of the auditor influencing the response to errors found. Audit quality in this situation is seen as a combination of both the auditor's skills and their ability to remain impartial.

In a wider perspective, elements that influence audit quality encompass effective corporate governance; Legislation and regulation, oversight by regulators, and the quality of the financial reporting standards in place (DeFond & Zhang, 2013). Two perspectives on the assessment of audit quality involve utilizing direct measures such as bankruptcy rates, financial reporting adherence to GAAP, desk reviews, quality control reviews, and SEC evaluations. An alternative viewpoint involves using indirect indicators such as audit charges, length of time with auditor, audit scale, industry

knowledge, financial reliance, credibility, and capital expenses. In a wider perspective, elements that influence audit quality encompass effective corporate governance; Legislation and regulation, oversight by regulators, and the quality of the financial reporting standards in place (DeFond & Zhang, 2013). Two perspectives on the assessment of audit quality involve utilizing direct measures such as bankruptcy rates, financial reporting adherence to GAAP, desk reviews, quality control reviews, and SEC evaluations. An alternative viewpoint involves using indirect indicators such as audit charges, length of time with auditor, audit scale, industry knowledge, financial reliance, credibility, and capital expenses.

### **2.2.2 Firm value**

The value of a firm is equivalent to the assets that belong to the company. It is important because it indicates the success of the entrepreneurs. The manager, as the representative of the business owners, is accountable for maximizing the value of the firm, which is the main objective of any organization. A high company valuation suggests that the company is successful, leading to increased wealth for shareholders. The firm value, auditor tenure, audit size, industry expertise, economic dependence, reputation, and cost of capital reflect the prosperity level of shareholders and investors.

Firm value serves as a measure for evaluating a company's performance. Investors also view the company based on its market value, which is connected to the stock price. As per Ftouhi et al., a greater stock price will result in an increased firm value. Bhabra believes that the value of a company is determined by the price paid by a wealthy buyer during a sale, and he also considers firm value to be the objective value perceived by the public and the company's focus on survival (Bhabra, 2007).

## **2.3 Literature and hypothesis development**

### **2.3.1 Audit firm size and firm value**

Sori and Karbhari (2006) state that large companies provide higher audit quality compared to small companies. They are able to benefit from technological advancements, conduct required research, and hire seasoned auditors due to their superior financial resources. They also possess extensive and detailed databases on clients' portfolios to accurately identify actions that may impact clients' business longevity. In contrast, they possess more motivation and put in more effort to prevent audit failures compared to smaller companies.

Francis and Yu (2009) found that larger companies can achieve better audit quality due to their increased collective experiences, access to more partners for consultation, and higher expertise in identifying material misstatements compared to smaller firms. In contrast, Choi et al. (2010) examined how the size of audit firms affected audit quality in the USA between 2000 and 2005. The findings indicate that there is a beneficial impact on audit quality as larger companies are able to enhance their staff's knowledge, skills, and experiences in both client's business growth and internal control mechanisms. Additionally, Sirois and Simunic (2011) argued that larger companies can utilize technology-driven auditing processes that are faster and more precise compared to smaller firms. Its findings indicate a beneficial impact on audit quality as larger companies have increased chances to exchange expertise, knowledge, and skills within their staff regarding client business growth and internal control mechanisms. Furthermore, Sirois and Simunic (2011) further back up this claim by stating that larger companies are capable of utilizing technology-driven audits that are more precise and faster compared to smaller firms. The findings indicate that there is a beneficial impact on audit quality as larger companies are able to enhance their staff's knowledge, skills, and experiences in both

client's business growth and internal control mechanisms. Based on the foregoing, we hypothesised as follows:

Ho; Audit firm size has no significant effect on firm value of medium scale enterprises in Nigeria

### **2.3.2 Audit tenure and firm value**

According to Johnson et al (2002), as the auditor-client relationship lengthens, there is the tendency that auditors may develop a “learned confidence” in the client which may result in the auditor not performing religiously, the required testing of financial reports. This self-assurance causes the auditor to assume results and employ less stringent audit procedures or unchanging audit programs. Arrunada and Paz-Ares (1998) argue that a long auditor–client relationship may result to the development of personal relationship that may lead to the bonds of loyalty, trust or emotive relationships been developed between the client and the auditor. This means that it is challenging for auditors to remain truly independent, leading to a higher chance of auditors giving in to client pressure on accounting policy decisions. This negatively impacts the auditor's independence and capacity to provide an accurate and unbiased audit report.

This developed self-assurance causes the auditor to assume results and employ less strict audit procedures or unchanging audit programs. Arrunada and Paz-Ares (1998) suggest that a prolonged auditor-client relationship can lead to the formation of personal connections, fostering loyalty, trust, and emotional ties between them. The suggestion is that it becomes challenging for auditors to act independently, and there is a greater chance of auditors complying with client's demands regarding accounting policies. This negatively impacts the auditor's autonomy and capacity to provide an accurate and honest audit statement. Geiger and Raghunandan (2002) examined how the duration of the auditor-client relationship affects audit reporting errors. Therefore, the goal was to examine the correlation between auditor tenure and instances of audit reporting failures. An analysis was conducted on a selection of American companies that filed for bankruptcy between 1996 and 1998. The study employed a multivariate logistic regression, with the audit report before bankruptcy as the endogenous variable and auditor tenure and other factors as exogenous variables. The findings show a strong and important link between the length of time a person has been in a position and instances of audit reporting failures. Johnson and et al (2002) conducted research to determine if there is a relationship between the duration of a company's partnership with an audit firm and the quality of financial reporting. The results of the model showed that the amount of unforeseen accruals in the brief period.

Furthermore, in the long tenure group, no significant increases in unexpected accruals were observed. Based on the foregoing, we hypothesised as follows

H<sub>0</sub>: Audit tenure has no significant effect on firm value of selected manufacturing firm in Nigeria

### **2.3.3 Audit fees and firm value**

The fees that a client firm pays to its audit firm are supposed to represent the amount of audit work needed for the auditing procedure. The auditor evaluates the complexity of the process and desired level of risk by assessing the amount of work required. Basically, if an auditor wants to reduce the chances of giving an unqualified opinion when there are material misstatements in a client's financial reports

Meta-analyses of audit fee research conducted by Hay (2012) report significant associations between audit fees and the following client attributes: size (measured, for example, by total assets, or sales), complexity (e.g., number of subsidiaries, business segments, foreign subsidiaries), risk (e.g., inventory and/or receivables), profitability (e.g., return on investment, loss), leverage and liquidity, internal control, governance (e.g., outside directors, audit committee) and industry. An interesting

recent finding is that audit fees reflect the client's future performance, because auditors have access to some information that contains forward-looking judgments (e.g., uncollectible receivables, obsolete inventory, pension and warranty costs) (Stanley, 2011). Additionally, the revealed audit fee appears to be linked to inaccuracies in financial analysts' earnings forecasts, suggesting auditors may have superior predictive accuracy compared to analysts. The possible value of this evidence is indicated by the disclosed audit fee, which could be a clue to the firm's future economic status that other market participants might notice

. Based on the foregoing, we hypothesised as follows;

Ho: Audit fees has no significant effect on firm value of selected medium scale enterprises in Nigeria

## 2.4 Empirical review

Research investigations analyze the effect of audit quality on organizational performance metrics. Some research used audit firm size, auditor experience, audit fees, auditor rotation, and auditor independence to measure audit quality. Ugwunta et al. (2018) investigated the effects of audit quality on stock prices in the Nigerian oil and gas industry using regression and covariance analyses. Studies show that the composition of the audit committee and the auditor's type can significantly influence the stock prices of publicly traded firms. The findings from the covariance analysis show that auditor type, auditor independence, and audit committee composition are associated with market share prices, while audit tenure has a negative relationship with share prices. Egbunike and Abiahu, (2017) investigated audit firm report and financial performance of Money Deposit Banks in Nigeria with the aim of determining the effect of audit firm characteristics on financial performance of money deposit banks in Nigeria. The research utilized an ex post facto and correlational design, involving all banks that had money deposits in 2015, spanning from 2014 to 2022. The research revealed that the quality of audits impacts the return on assets of banks in Nigeria; however, audit fees and the timing of audit reports do not affect the return on assets, earnings per share, or net profit margin of Nigerian banks.

Al-Attar (2017) examines how auditing affects the stock prices of the Amman stock exchange. Descriptive analysis, factor analysis, and structural equation models were used to determine the outcomes. Audit directly affects stock prices in Amman's market; higher audit quality leads to better financial performance reflected in stock prices.

Hua et al. (2016) investigated how the financial success of firms in Malaysia is influenced by their audit quality and financial reporting standard practices. The research examined companies in Malaysia's construction industry that were traded on the stock market between 2010 and 2013. Information for the research was gathered from publicly available yearly reports. A company's collaboration with a reputable audit firm is considered a stand-in for the quality of the audit, while the return on assets is used as a gauge of the company's performance. The Ordinary Least Square Regression Model was created to examine the connection between the variables being studied. The study's findings show that financial performance is positively and significantly linked to firms' adherence to disclosure requirements and audit quality assurance standards for financial reporting.

Eshitemi and Omwenga (2016) investigated how the independence of auditors, the size of audit firms, the characteristics of audit teams, and the experience of auditors are related to the financial performance of Listed Parastatals in NSE. Semi structured questionnaire was utilized for gathering primary data. The study utilized several linear regression.

In examinations, studies show a connection between audit quality factors (such as audit firm size, independence, team qualifications, and auditor experience) and financial performance indicators such as ROA and ROE. Ching et al. (2015) explores how audit quality, earnings management, and financial performance of 100 public listed Malaysian companies from 2008 to 2013 are interconnected. Analysis was conducted through multiple regression methods and findings show that strong audit quality can positively impact company financial performance. This is due to the perception that major audit firms typically uphold higher standards of audit quality, which can bolster investor trust. Nevertheless, the study employed the Sobel test to analyze the indirect impact of audit quality on financial performance, drawing conclusions as if the direct impact was studied, despite the lack of empirical evidence.

Sayyar and colleagues (2015) evaluated how the quality of audits affects the performance of 542 Malaysian companies listed on the stock exchange. Audit fees and audit firm rotation were utilized as indicators of audit quality in the research, while return on assets (ROA) and Tobin's Q were employed as metrics of firm performance. Regression analysis was utilized for data analysis. Findings indicate that there is a significant negative correlation between audit quality (audit fee and audit firm rotation) and ROA (performance).

Aryan (2015) explores how audit committee traits, audit firm excellence, and company profits are connected in Jordan. The research utilized 69 industrial sector companies from 2009 to 2014. The data was analyzed using multiple regression, which showed that there is a positive correlation between the profitability of a company and both the size of the audit committee and the frequency of audit committee meetings. There was no noticeable correlation discovered between the quality of audits and the profitability of the company.

Almomani (2015) examines how external audit quality characteristics can improve the accounting profit quality of medium-sized companies listed on the Amman Stock Exchange. Audit quality was measured using various factors such as quality indicators, audit office size, auditor fees, customer retention period, auditor opinion type, and specialization in client industry. Profit continuity was used as a proxy variable to represent the quality of earnings. By utilizing data from 45 companies over the 2009-2013 period, the research utilized multiple linear regression to determine that auditor fees have the greatest impact on earnings quality, ultimately improving the accuracy of accounting profits as a measure of financial success.

Aledwan et al. (2015) investigated how the quality of audits affects the financial performance of publicly traded companies in Jordan. The research was conducted using descriptive methods and employed correlational and ex-post facto designs. The data was analyzed and the stated hypotheses were tested using SPSS (Version 15.0) through multiple regression analysis. The findings indicated that the size and independence of auditors greatly affect the financial performance of cement firms in Jordan. Nevertheless, auditor independence has a greater impact on financial performance compared to auditor size.

Slaheddine (2015) investigates how audit quality affects the quality of earnings. The research assessed audit quality based on both BIG 7 and non-BIG 7 audit firm standards, while earnings quality was evaluated using the predictive ability of earnings time series for companies audited by BIG 7 firms and non-BIG 7 firms. A study analyzed 4030 firms over ten years (2004-2013) in the French and US markets using multiple regressions. Results indicate that higher earnings quality is associated with audits conducted by one of the BIG 7 auditing firms. However, the quality of earnings for US companies is more linked to the quality of audits compared to French companies.

Rahimi and Amini (2015) investigate how audit quality is associated with profitability in firms listed on the Tehran Stock Exchange. Auditor size and the length of time an auditor has been in the role were utilized as indicators of audit quality. The research examined 52 companies that were listed on the stock exchange market in Tehran. Findings from correlation analysis indicate a positive yet weak correlation between auditor size, auditor tenure, and profitability ratios. Additionally, a positive correlation between profitability and auditor size was found, although it was not deemed statistically significant. Conversely, a positive and statistically significant correlation between profitability and audit tenure was observed.

Santos et al. (2015) investigates the relationship between audit fees, non-audit fees, and corporate performance in the United States of America (USA). Data from Thomson Data Stream, which includes 416 companies and spans from 2002 to 2014, is utilized in the research. Utilizing least squares regression, results indicate a notable inverse correlation between Tobin's Q, EP, ROA, and ROE corporate performance metrics and non-audit fees, implying that changes in corporate performance are linked to changes in nonaudit fees. The study showed a link between corporate performance measures and audit quality proxies (audit fees and non-audit fees) but did not include stock market performance ratios, leaving a gap in the literature.

Okolie (2014) examines how the size of audit firms in Nigeria affects the market price per share of quoted companies, aiming to determine the impact of audit firms on companies' market value in Nigeria. Using audit firm size as a measure, comprehensive multivariate analyses were carried out on archival data from 2006 to 2011, using a sample of 342 companies over various years from the NSE. The findings indicate that the size of the audit firm has a notable impact on the market price per share of the companies in the study.

The empirical analysis discussed above sheds light on how audit quality impacts firm value in Nigeria's manufacturing industry, offering valuable insights on the connection between audit quality indicators and company performance. Nevertheless, there are certain gaps in the current research that require attention to improve the comprehension of this connection within the Nigerian setting. While the review includes studies on how audit quality affects firm performance in Nigeria, only a limited number focus on the manufacturing industry. The manufacturing industry has distinct challenges and features different from other sectors, highlighting a requirement for further research concentrating on medium-sized enterprises to understand its specific dynamics.

### 3. METHODOLOGY

This research utilizes the ex-post facto design. The study used an ex-post facto design to investigate how audit quality impacts the market value of chosen medium-sized businesses in Nigeria. The study focused on a total of fifty-four (54) medium-sized enterprises in the area. This study involved firms from seven (7) different sectors. This includes conglomerates, industrial products, healthcare, oil and gas, minerals, farming, and consumer products. Samples from twenty (20) medium-sized enterprises were taken. Convenience sampling technique was chosen because data availability and accessibility were used as criteria. Data for this research was collected from secondary sources, specifically annual reports of medium-sized enterprises selected from the years 2012 to 2021. Ordinary least square model was used expressed below as

$$FV_{it} = f(AQ_{it}) \dots \dots \dots \text{equ 1}$$

$$TQ_{it} = f(AFS_{it}, AT_{it}, LAF_{it}) \dots \dots \dots \text{equ 2}$$

The econometric model of the study was further given below as

$$TQ_{it} = a_0 + a_1 AFS_{it} + a_2 AT_{it} + a_3 LAF_{it} + e \text{ -----equation (i)}$$

Where;

FV = Firm Value (FV) is the measurement for Tobin’s Q (Chung & Pruitt, 1994). It is approximate MVE- PS- Debt/ TA

MVE = Market Value of Equity; PS = Liquidation value of preferred shares; Debt = Total Debt; TA = Book value of total assets

AFS = Audit firm size

AT = Audit tenure

LAF = Log. of Audit fees

The explanatory variables were the Audit firm size, Audit tenure and Log. of Audit fees. Both Audit firm size and Audit tenure were measured using the content analysis. That is, for audit firm size 1 if the firm is listed amongst the big 4 otherwise 0 if not. Also for audit tenure 1 if the audit engagement of the audit firm is up to three years otherwise 0 if not. Data were further diagnosed to investigate the existence of multi-collinearity, heteroskedasticity test and auto-correlation. Panel regression analysis was adopted. More so, the Hausman Specification test was carried out to make a choice between the random and fixed effect.

#### 4.1 Normality test

Table 1  
Shapiro Test for Normality

Variables	Prob > Z
TOBINSQ	0.00000
AFS	0.99521
AT	0.03881
LAF	0.00019

The results of the Shapiro-Wilk test applied to the variables TQ, AFS, AT, and LAF in this study are shown in the table above. The p-value for the variable TQ is very low, around 0.00000, which is below the standard significance level of 0.05, showing strong evidence against the null hypothesis of normality. Hence, it is improbable that the variable TQ will conform to a normal distribution. The p-value for AFS is around 0.99521, which is significantly higher than the 0.05 significance level, showing strong evidence that the distribution is normal. Hence, it seems that the variable AFS follows a distribution that is close to normal. The p-value for AT is around 0.03881, which is less than the significance level of 0.05 but not significantly lower. Although there is some indication that the variable AT does not follow a normal distribution, the evidence is not significant enough to conclusively invalidate the null hypothesis of normality. The p-value for LAF is around 0.00019. Strong evidence suggests that the data is not normal, so it is unlikely that LAF follows a normal distribution. In brief, the Shapiro-Wilk test showed that TQ and LAF are not distributed normally, whereas AFS and AT seem to be distributed normally. These results should be taken into account for future statistical analyses or assumptions about data distribution as non-normality could affect the selection of suitable statistical tests and models.

## 4.2 Multi collinearity test

Table 2

Spearman rank Correlation matrix of dimension of audit quality and firm value

	TQ	AFS	AT	LAF
TQ	1.0000			
AFS	0.1181	1.0000		
AT	0.0292	0.0178	1.0000	
LAF	0.0247	0.7480	-0.0476	1.0000

Source: STATA Output version 14

Given the non-normal distribution, the Spearman rank correlation coefficient was utilized to examine the degree of correlation between the variables. The correlation coefficient of 0.1181 indicates the Spearman correlation between TQ and AFS. The weak positive monotonic relationship between TQ and AFS is indicated by the positive correlation coefficient. AFS values typically experience a mild increase as TQ values rise. Nonetheless, the correlation coefficient is near zero, suggesting that the correlation is weak. The correlation coefficient between TQ and AT is 0.0292 as calculated using Spearman's method. The weak positive monotonic relationship between TQ and AT is indicated by the positive correlation coefficient. Nevertheless, the coefficient is near zero, indicating a very weak relationship that is not practically significant. The correlation coefficient between TQ and LAF is 0.0247 as per Spearman's calculation. Likewise, the positive correlation coefficient indicates a slight positive monotonic association between TQ and LAF. Nonetheless, the coefficient is near zero, suggesting a weak relationship with minimal real-world impact. There is a weak positive monotonic relationship between AFS and AT as indicated by the Spearman correlation coefficient of 0.0178. Nevertheless, the coefficient is very close to zero, indicating that the correlation is insignificant. The correlation coefficient is 0.7480 when measuring the relationship between AFS and LAF using Spearman's method. The high positive correlation coefficient demonstrates a substantial positive monotonic connection between AFS and LAF. As AFS values rise, LAF values also tend to rise significantly. This implies that the correlation between the two variables is stronger than that of the other pairs. The correlation coefficient between AT and LAF is -0.0476. The weak negative monotonic relationship between AT and LAF is demonstrated by the negative correlation coefficient. Nonetheless, the coefficient is nearing zero, indicating a weak or insignificant relationship.

### 4.3 Test for multicollinearity and heteroscedasticity test

Table 3  
Heteroscedasticity test

Variables	Statistics	Prob.
Mean vif	1.76	
Hetttest Chi2	10.95	0.0009

Source: STATA Output version 14

The VIF is a metric utilized to identify multicollinearity among predictor variables in a regression model. It measures the extent to which collinearity with other predictors enhances the variability of the estimated regression coefficient. A VIF value above 1 signifies the existence of multicollinearity, with higher VIF values indicating more pronounced collinearity problems. The VIF for LAF is just over 1, suggesting a slight amount of multicollinearity. Nonetheless, the value is fairly near to 1, indicating that there is not a significant problem with collinearity. The 1/VIF value of 0.468099 suggests that around 46.81% of the variability in the calculated regression coefficient for LAF is attributed to multicollinearity with other predictors. The VIF of AFS is just over 1, showing a slight amount of multicollinearity. The 1/VIF value of 0.469637 implies that about 46.96% of the variability in the estimated regression coefficient for AFS is caused by collinearity with other predictors. The AT has a VIF close to 1, suggesting minimal multicollinearity. The 1/VIF value of 0.988479 indicates that nearly 98.85% of the variability in the estimated regression coefficient for AT is unrelated to collinearity with other predictors. In general, the average VIF of 1.76 suggests there is a certain level of multicollinearity in the model, but it is not considered to be serious. The variables LAF and AFS show slightly higher VIF values, suggesting mild collinearity, whereas the variable AT does not display multicollinearity.

The Breusch-Pagan / Cook-Weisberg test was used on the predicted values of the outcome variable TQ. The predicted values of TQ, acquired from the regression model, are represented by the fitted values. The chi-square distribution with 1 degree of freedom resulted in a test statistic (chi2) of 10.95. The p-value linked to the test statistic was 0.0009, significantly lower than the usual significance level of 0.05. Therefore, we have compelling evidence to refute the null hypothesis of consistent variance. Heteroskedasticity is present in the model in this scenario. Yet, in the presence of heteroskedasticity, standard regression analysis can produce distorted coefficient estimates and inaccurate standard errors, resulting in untrustworthy findings. Different approaches can be used to deal with heteroskedasticity, including utilizing robust standard errors, changing the variables, or implementing weighted least squares regression. These methods consider the different error variances and improve the accuracy and reliability of results when heteroskedasticity is present.

**Regression analysis**

Table 4  
OLS fixed effect of regression coefficient of audit quality and firm value

Variables	Coefficient	Prob.
AFS	-.3169321	0.433
AT	.4018545	0.048
LAF	-.4226179	0.308
Con_	3.496773	0.033
R <sup>2</sup>	0.0345	
F- Stat.		0.1010
(2.11)	4.72	0.1935
Hausman test		

Source: STATA Output version 14

The Hausman test was carried out in order to decide between fixed effects and random effects. According to the results of the Hausman test, the p-value is 0.1935 (Prob>chi2 = 0.1935). The p-value exceeds the standard significance level of 0.05, meaning that we do not reject the null hypothesis. Hence, there is insufficient evidence to indicate that the coefficients vary consistently between the fixed effects (FE) and random effects (RE) models. Typically, the random effects (RE) model is seen as more suitable in this scenario.

The value of R-squared is 0.0345. It shows that the independent variables (AFS, AT, LAF) accounted for 3.45 percent of the total variation (100 percent) in the dependent variable (TQ) within the model. In this scenario, they clarify just a small portion of the overall variability in TQ. There is a negative correlation of -0.3246 between the individual-specific effects (ui) and the fitted values (Xb). This correlation evaluates how well the fixed effects account for the unseen differences in the data. An inverse relationship indicates that the fixed effects partially account for the changes in the dependent variable. The AFS coefficient is -0.3169321.

**Test of hypotheses**

The following hypotheses was tested

Hypothesis one

Ho: Audit firm size has no significant effect on firm value of medium scale enterprises in Nigeria

The p-value for audit firm is 0.433 and is greater than 0.05. This show that it is not statistically significant at the 5% level. Thus, there is enough evidence to conclude that AFS has no significant effect on firm value of selected medium scale enterprises in Nigeria.

Hypothesis two

Ho: Audit tenure has no significant effect on firm value of medium scale enterprises in Nigeria

The p-value for Audit tenure is 0.048 and is less than 0.05. This show that it is statistically significant at the 5% level. Thus, there is no evidence to conclude that AT has no significant effect on TQ. Hence, AT has a significant effect on firm value of medium scale enterprises in Nigeria.

Hypothesis three

Ho: Audit fees has no significant effect on firm value of medium scale enterprises in Nigeria

The p-value for Audit fees is 0.308, exceeding 0.05. This indicates that Audit fees are statistically significant at the 5% level. Therefore, there is no proof to determine that Audit fees do not have a notable impact on the value of medium-sized enterprises in Nigeria. Therefore, the costs of auditing services strongly impact the worth of medium-sized businesses in Nigeria. Most importantly, the F-statistic is 2.11 and the associated p-value (Prob > F) of 0.1010 exceeds the 0.05 significance threshold. This indicates that the total model might not be statistically relevant at the 5% significance level.

## 5.0 Conclusions and Recommendations

This research analyzed how audit quality factors such as audit firm size, audit tenure, and audit fees are related to the firm value of medium-sized enterprises in Nigeria. Multiple tests were performed to evaluate the assumptions of the multiple regression model and to examine the hypotheses regarding the impact of individual variables on the firm's value.

The results revealed that audit tenure (AT) and audit fees (LAF) had statistically significant effects on the firm value of the medium scale enterprises in Nigeria. Specifically, an increase in audit tenure positively influenced market value.

On the contrary, audit fees and has negative effect on firm value. In a way, High audit fees may be perceived by investors and stakeholders as an indication of financial strain or increased financial risk within the company. This perception can raise concerns about the company's financial stability and may lead to a decrease in investor confidence, potentially affecting the firm's stock price and overall market value.

Additionally, the size of the audit firm has a detrimental impact on market value. This means that the size of the audit firm can have a negative impact on firm value due to factors such as limited resources and expertise, but it is not always the case. In any situation, major auditing companies might only cater to a significant number of clients, potentially resulting in less focus on individual clients, especially those who are smaller. This could lead to decreased monitoring and focus on specifics in the auditing procedure, resulting in possible mistakes or omissions that may affect the accuracy of financial reporting. This could decrease the quality of audits, leading to reduced investor trust and impacting the value of the company negatively. Big audit companies might lack the specific industry expertise required by certain businesses. Some sectors may have specific accounting methods or intricate regulations, and a deficiency in knowledge could result in incorrect financial reporting or misunderstanding of financial information. Investors might view this as a lack of skill, which could potentially affect the value of the company.

Ultimately, the size of the audit firm and the fees paid for the audit do not have significant impacts on the value of medium-sized enterprises in Nigeria during the period under analysis. Yet, audit tenure (AT) positively impacts firm value significantly.

Based on the above findings and conclusion, the study recommended that;

- i. Companies must take into account not just the size, but also the quality of services provided by the audit firm. Expanding the pool of audit firms and choosing trustworthy and skilled ones can enhance market opinions and, in turn, increase firm worth. It is important for companies to

regularly evaluate if the advantages of conducting an audit are greater than the expenses involved in order to prevent any adverse effects on the value of the firm.

- ii. Medium Scale Enterprises need to focus on highlighting the significance of building long-term partnerships with auditing firms. Maintaining stable and reliable audit engagements could have a positive effect on their firm's value.
- iii. Medium-sized enterprises should thoroughly evaluate and discuss audit fees with their auditing firms, considering the impact on market value. Open communication about the reasons for audit fees and how they relate to the company's operations complexity can reduce investors' potential negative perceptions. They ought to closely monitor their audit fees and evaluate if they align with industry standards and the audit services' quality delivered. Making sure that audit fees are reasonable and justified is important in order to prevent potential negative perceptions from investors.

## 7.0 SUGGESTIONS FOR FURTHER STUDY

Additional factors or alternative statistical methods could be considered in future studies to further understand what influences the value of medium-sized businesses in Nigeria.

## References

- Al-Attar, A. (2017). The impact of auditing on stock prices of Amman stock market's listed companies, *International Journal of Academic Research in Business and Social Sciences*, 7(6):210-220.
- Aledwan B. A., Yaseen A. A. B. & Alkubisi, A. (2015). The role of audit quality on the relationship between auditor's and financial performance quality of selected cement firm in Jordan, *International Journal of Business and Social Science*, 6(12):138-146.
- Al-Matari, E. M., Al-Swidi, A. K., Fadzil, F. H., & Al-Matari, Y. A. (2012). The impact of board characteristics on firm performance: Evidence from nonfinancial listed companies in Kuwaiti Stock Exchange. *International Journal of Accounting and Financial Reporting*, 2(2),310.
- Al-Matari, E. M., Al-Swidi, A., & Fadzil, F. H. B. (2013). The effect of the internal audit and firm performance: A proposed research framework. *International Review of Management and Marketing*, 4(1), 34-41.
- Almomani, A.M. (2015). The impact of audit quality features on enhancing earnings quality: The evidence of listed MEDIUM SCALE ENTERPRISESs at Amman stock exchange. *Asian Journal of Finance & Accounting* 7(2): 255-280.
- Arrunada, B. and Paz-Ares, C. (1998). Mandatory rotation of company auditors: A critical examination. *International Review of Law and Economics*, 17, 31-61
- Aryan, A.L. (2015). The relationship between audit committee characteristics, audit firm quality and companies' profitability. *Asian Journal of Finance & Accounting*, (72):215-226.
- Asimakopoulous, I., Samitas, A., & Papadogonas, T. (2009). Firm-specific and economy wide determinants of firm profitability: Greek evidence using panel data. *Managerial Finance*, 35(11), 930-939.
- Baltagi, B. (2008). *Econometric analysis of panel data*. John Wiley & Sons.
- Bell, T. B., Doogar, R. & Solomon, I. (2008), "Audit labor usage and fees under business risk auditing. *Journal of Accounting Research*, 46 (4), 729-760
- Bouaziz, Z. (2012). The impact of auditor size on financial performance of Tunisian companies. *Paper presented at the faculty of economics and management*. sfax university, Tunisia.
- Ching, P. C., Teh, H. B., San, T. O., & Hoe, Y. H. (2015). The relationship among audit quality, earnings management, and financial performance of Malaysian public listed companies. *International Journal of Economics and Management*, 9 (1): 211 - 229
- Chiung, J. L., Tzu, T. H., & W, C. L. (2011). Does ownership structure affect firm value? Intellectual capital across industries perspective. *Journal of Intellectual Capital*, 12(4), 552-570.

- Choi, J.-H., J.-B. Kim, X. Liu & Simunic, D. A. (2008). Audit pricing, legal liability regimes, and big 4 premiums: Theory and cross-country evidence. *Contemporary Accounting Research*, 25 (1), 55-99.
- Choi, J.H., Kim, J.B., & Zang, Y. (2010). Do abnormally high audit fees impair audit quality? *Auditing: Journal of Practice & Theory* 29: 115-140.
- Davidson, A. G., Stenning, B.W. & Wai, W. T. (1984). Auditor concentration and the impact of interlocking directors. *Journal of Accounting Research*, 22 (1): 313 - 317
- Davidson, R. A. & Neu, D. (1993). A note on association between audit firm size and audit quality. *Contemporary Accounting Research*, 9 (2): 479 – 488.
- DeAngelo, L. E. (1981). Auditor size and audit quality, *Journal of Accounting and Economics*, 3 (3), 183 -199.
- DeAngelo, L. E. (1981). Auditor size and audit quality. *Journal of Accounting and Economics*, 3(3), 183-199.
- DeFond, M., & Zhang, J. (2013). A review of archival auditing research. University of Southern California. From : [http://papers.ssrn.com/sol3/papers.cfm?abstract\\_id=2411228](http://papers.ssrn.com/sol3/papers.cfm?abstract_id=2411228).
- Deis, D. R. & Giroux, G. A. (1992). Determinants of audit quality in the public sector, *The Accounting Review* 67 (3): 462 - 479.
- Demsetz, H., & Lehn, K. (1985). The structure of corporate ownership: Causes and consequences. *Journal of Political Economy*, 93, 1155-1177. <http://dx.doi.org/10.1086/261354>
- Egbunike, F.C., & Abiahu, C.M. (2017). Audit firm report and financial performance of money deposit banks in Nigeria. *The Nigerian Account*, 5(1): 25-39
- Emander, C. & Andersson, C. (2005). The new auditing standard in Sweden-What are the effects of a more detailed auditing standard? *Rapport Nr.: Externredovisning Och Företagsanalys*.
- Eshitemi, B.P., & Omwenga, J. (2016). Effect of audit quality on the financial performance of listed parastatals in Nairobi Security Exchange. *Social Science and Humanity Journal*, 2, 186-199
- Farouk, M. A., & Hassan, S. U. (2014). Impact of audit quality and financial performance of quoted cement firms in Nigeria. *International Journal of Accounting and Taxation*, 2(2), 1-22.
- Farouk, M. A., & Hassan, U. S. (2014). Impact of audit quality and financial performance of quoted cement firms in Nigeria. *International Journal of Accounting and Taxation*, 2 (2), 01-22
- Fazlzadeh, A., Hendi, A. T. & Mahboubi, K. (2011, February). The examination of the effect of ownership structure on firm performance in listed firms of Tehran stock exchange based on the type of the industry. *International Journal of Business and Management*, 6(3), 249.
- Francis, J.R. & Yu, M.D. (2009). Big 4 office and audit quality. *The Accounting Review* 84: 1521-1552.
- Geiger, M., & Raghunandan, K. (2002). Auditor tenure and audit quality. *Auditing Journal of Practice and Theory*, 21(1), 187-196.
- Gerayli, M. S., Yanesari, A. M., & Ma'atoofi, A. R. (2011). Impact of audit quality on earnings management: evidence from Iran, International. *Research Journal of Finance and Economics*, 66,
- Hay, D. C., W. R. Knechel & Wong, N. (2006). Audit fees: A meta-analysis of the effect of supply and demand attributes. *Contemporary Accounting Research*, 23 (1), 141-191.
- Heil, D. (2012). *The influence of the auditor on the earnings quality of their clients*. (Unpublished Masters dissertation). Department of Accounting, Auditing and Control, Erasmus University, Rotterdam.
- Hu, H. W., Tam, O. K. & Tan, M. G. S. (2010). Internal governance mechanisms and firm performance in China. *Asia Pacific Journal of Management*, 27(4), 727-749.
- Hua, C.S Hla, T.D & Isa, H.A (2016). Malaysia financial reporting practices and audit quality promote financial success: The case of Malaysian Construction sector, *UNIMAS Review of Accounting and Finance*, 1(1): 36-50
- Hussainey, K. (2009). The impact of audit quality on earnings predictability. *Managerial Auditing Journal*, 24(4), 340-351.
- IAASB (2014). A Frame Work for Audit Quality: key elements that create an environment for quality audit. International Federation of Accountants (IFAC), New York
- Jackson, A. B., Moldrich, M., & Roebuck, P. (2008). Mandatory audit firm rotation and audit quality. *Managerial Auditing Journal*, 23(5), 420-437.
- Jensen, M. C. & Meckling, W. H. (1976). Theory of the firm: Managerial behavior, agency costs and ownership structure, *Journal of Financial Economics*, 3 (4):305-360

- Johnson, V. E., Khurana, I. K., & Reynolds, J. K. (2002). Audit-firm tenure and the quality of financial reports. *Contemporary Accounting Research* 19(4), 637-660.
- Jones, F. L. and K. Raghunandan (1998), "Client risk and recent changes in the market for audit services", *Journal of Accounting and Public Policy*, Vol. 17, No. 2, pp. 169-181.
- Kamolsakulchai, M. (2015). The Impact of the Audit Committee Effectiveness and Audit Quality on Financial Reporting Quality of listed company in Stocks Exchange of Thailand, *Review of Integrative Business and Economics research*, 4(2): 328-341.
- Khan, K., Nemati, A. R., & Iftikhar, M. (2011). Impact of corporate governance on firm performance evidence from the Tobacco industry of Pakistan. *International Research Journal of Finance and Economics*, 61, 7-14.
- Mandacı, P., & Gumus, G. (2010). Ownership Concentration, Managerial Ownership and Firm Performance: Evidence from Turkey. *South East European Journal of Economics and Business*, 5(1), 57-66.
- Matoke and Omwenga. (2016). Audit Quality and Financial Performance of Companies Listed in Nairobi Securities Exchange. *International Journal of Scientific and Research Publications*, 6(11).
- Miettinen, J. (2011). The role of audit quality on the relationship between auditee's agency problems and financial information quality. *Paper presented at the Department of Accounting and Finance*, University of Vaasa, Finland.
- Myers, J., Myers, L., & Omer, T. (2003). Exploring the Term of the Auditor-Client Relationship and the Quality of Earnings: A Case for Mandatory Auditor Rotation?. *The Accounting Review*, 78(3), 779-799.
- Najjar, N. J. (2012). The impact of corporate governance on the insurance firm's performance in Bahrain. *International Journal of Learning and Development*, 2(2), 1-17.
- Nuryanah, S., & Islam, S. (2011). Corporate Governance and Performance: Evidence from an emerging market. *Malaysian Accounting Review*, 10(1).
- Obiyo, O. C., & Lenee, L. T. (2011). Corporate governance and firm performance in Nigeria. *IJEMR*, 1(4), 1-12.
- Oluwagbemiga, A. (2010). *The Role of Auditors in Fraud Detection, Prevention and Reporting in Nigeria*.
- Ongore, V. O. (2011). The relationship between ownership structure and firm performance: An empirical analysis of listed companies in Kenya. *African Journal of Business Management*, 5(6), 21-30.
- Serrasqueiro, Z. S. & Nunes, P. M. (2008). Performance and size: empirical evidence from Portuguese SMEs. *Small Business Economics*, 31(2), 195-217.
- Afza, T., & Nazir, M. S. (2014). Audit quality and firm value. *Research Journal of Applied Science, Engineering and Technology*, 7(9): 1803-1810.
- Singer, Z., & Zhang, J. (2018), Auditor tenure and the timeliness of misstatement discovery. *The Accounting Review*, 93(2), 315-338.
- Sori, Z.M., Mohamad, S., Karbhari, Y. (2006). Auditor reputation and auditor independence: Evidence from an emerging market. <http://www.econ.upm.edu.my/zms>.
- Stanley, J. D. (2011), Is the audit fee disclosure a leading indicator of clients' business risk, *A Journal of Practice & Theory*, 30, (3), 157-179.
- Tobi, B. A., Osasrere, A. O., & Emmanuel, U. (2016). Auditor's Independence and audit quality: a study of selected deposit money banks in Nigeria. *International Journal of Finance and Accounting*, 5(1), 13-21.
- Tsegba, I. N., & Ezi-Herbert, W. (2011). The Relationship Between Ownership Structure and Firm Performance: Evidence from Nigerian Listed Companies. *African Journal of Accounting, Economics, Finance and Banking Research*, 7(7), 51.
- Uwuigbe, U., & Olusanmi, O. (2012). An empirical examination of the relationship between ownership structure and the performance of firms in Nigeria. *International Business Research*, 5(1), 208.
- Woodland, A. M., & Kenneth Reynolds, J. (2003). Restatements and audit quality. *Working paper*, Louisiana State University.
- Yasser, Q., Entebang, H., & Mansor, S. (2015). *Corporate governance and firm performance in Pakistan: The case of Karachi Stock Exchange (KSE)-30*.