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DEBT TO EQUITY RATIO AND CORPORATE PERFORMANCE OF LISTED COMMERCIAL BANKS IN NIGERIA

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Key words: *Corporate Performance, Debt to Equity Ratio, Earnings Before Tax Margin, Equity Ratio, Short-Term Debt to Equity Ratio.*

ABSTRACT

The study examined the effect of debt to equity ratio on the corporate performance of listed commercial banks in Nigeria. The specific objective was to ascertain the effect of long-term debt to equity ratio and short-term debt to equity ratio on the earnings before tax margin of listed commercial banks in Nigeria. Ex-post facto research design was used in the study. From a population of thirteen (13) listed commercial banks in Nigeria, a sample size of nine (9) was obtained using purposive sampling technique. Secondary data for the study were gotten from the financial statements of the banks for a period of twelve years which spanned across 2012 to 2023. Data analyses were done in three phases: descriptive test, robustness analysis and test of hypotheses. The Panel Estimated Generalised Least Square method which was conducted for hypotheses testing revealed that: long-term debt to equity ratio has a non-significant negative effect on earnings before tax margin of listed commercial banks in Nigeria (β = -0.000967; p-value = 0.7617); short-term debt to equity ratio has a non-significant positive effect on earnings before tax margin of listed commercial banks in Nigeria (β = 0.005427; p-value = 0.5606). In conclusion, the study found that debt to equity ratio does not significantly affect the corporate performance of commercial banks in Nigeria. The study recommended that the Treasury Department in Nigerian commercial banks should however focus on maintaining an optimal debt ratio by improving equity liquidity and reducing the dependence on borrowings in order to enable the banks have more consistent profitability and reduce the risk of financial instability.

1INTRODUCTION

Understanding financial ratios is helpful in today's world of sustainable business operations as it can help forecast a company's performance over an extended period of time. The smooth operation of financial markets is essential to the development and expansion of a country's economy. Retained earnings and depreciation are internal sources of cash, but stock and debt in the capital markets continue to be significant external funding sources for businesses

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because of their low cost of borrowing and easy access (Aghaebe & Oranefo, 2024). Retained earnings are a type of equity that carries risk and varies greatly depending on the success of the company and the state of the external market. Equity valuation frequently depends on the highest likely returns from a company, the risk-free rate of return that prevails in the overall economy, and the premium for market risk. The financing mix of debt and equity instruments in a portfolio significantly influences the long-term returns anticipated by stakeholders and financial management (Akaji, Nwadialor & Agubata, 2021; Okudo, Mbonu & Amahalu, 2022). Returns on capital projects are often defined as income or profits from investments expressed as a percentage of the project's cost. Debt-to-equity ratios are typically regarded by financial experts as crucial capital structure ratios for determining a company's valuation.

Debt-to-equity ratios are crucial for balancing risk and return, which makes deciding how best to finance such decisions difficult for the company because it must choose a financing arrangement that maximizes both its value and the wealth of its shareholders (Akaji, Nwadialor & Agubata, 2021). Debt-to-equity is a significant determinant of listed economic businesses' valuation in the financial markets. Additionally, because of how volatile the markets are, a company's ranking is mostly determined by its debt-to-equity ratio—that is, by selecting the resources that will allow for the maximization of shareholders' wealth (Ajibiola, Wisdom & Qudus, 2018). Thus, financial executives may optimize the wealth of shareholders by figuring out how best to combine the organization's financial resources. Every company has a different capital structure, and businesses have the option to obtain funding from external financial resources or internal financial resources. Instead of dividing profits among shareholders, executives can use the funds in the earlier scenario to fund the company's return-efficient operations through accumulated earnings. Regarding the latter, money can be raised by issuing debt and equity (Akaji, Nwadialor & Agubata, 2021). Many business owners in the current economic climate, regardless of size, rely on external funding sources like credit or debit cards. Debt is the responsibility resulting from previous or past transactions to give money, products, or services to other people at a later time. Two categories of debt can be distinguished based on the repayment duration or debt repayment tool: short-term (also known as current debt) and long-term debt. Long-term debt is defined as debt that takes priority over principal repayment and periodic interest payments. It is frequently secured by a lien on the property.

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Bonds that are placed confidentially with major financial institutions or traded publicly in financial markets can be considered long-term debt. Transaction costs are greater for debt and equity instruments that are issued to the public. As a result, the majority of loans are given in private using the company's insurance and the bank. One of the variables that can impact profitability is the long-term debt to equity ratio. Because of the fierce competition, the business must continue to innovate and enhance its performance in order to gain more public recognition. Companies require additional funding in order to increase product performance and innovation. The expansion and performance of the business demonstrate its ability to meet its objectives. Commercial banks are expected to operate within a balanced financial structure where financial leverage is optimally managed to enhance corporate performance. In this context, banks effectively utilize a combination of equity and debt to maximize shareholder value, achieve sustainable growth, and maintain financial stability (Okeke, 2023). This optimal leverage ratio allows banks to finance their operations and growth opportunities while minimizing the cost of capital and avoiding excessive financial risk. In such a setting, the banks' ability to manage their debt levels ensures they can capitalize on profitable investments, increase returns on equity, and maintain a solid capital base to absorb potential losses (Bustamante & D'Acunto, 2024). However, banks in Nigeria face challenges in managing their financial leverage effectively as a result of the volatile economic environment, characterized by fluctuating interest rates, inflation, and currency instability (Tonye & Gbawae, 2024), which jointly or individually complicates the management of debt levels. Additionally, some banks may be compelled to take on higher levels of debt to remain competitive, leading to an over-leveraged financial structure.

This over-reliance on debt increases financial risk, particularly in a market where economic shocks and regulatory changes can rapidly alter the financial domain. Moreover, the regulatory requirements, while necessary for maintaining financial stability, sometimes create constraints that limit the banks' ability to optimize their capital structure. Consequently, rather than enhancing corporate performance, financial leverage in many cases exacerbates financial vulnerabilities (Dhananjaya, 2024), leading to suboptimal performance outcomes. As a consequence, excessive financial leverage exposes Nigerian commercial banks to increased financial risk, including the heightened probability of financial distress or insolvency. This vulnerability can lead to a decline in investor confidence, negatively impacting the banks' market valuation and ability to raise additional capital. Furthermore, over-leveraged banks may struggle to meet their debt obligations (Suresha, 2021), leading to liquidity crises that can trigger broader financial instability within the sector. In extreme cases, this could result

in bank failures, with devastating effects on depositors, the banking system, and the wider economy. The inability to manage leverage effectively also impairs the banks' capacity to invest in growth opportunities, innovate, and remain competitive in an increasingly globalized financial market. Therefore, the actual situation presents a significant challenge to the sustainability and performance of listed commercial banks in Nigeria, necessitating a closer examination of the factors influencing financial leverage and its impact on corporate performance.

The existing empirical literature on financial leverage and corporate performance often lacks a focused analysis of how specific debt ratios affect earnings before tax margins (EBT margins) in Nigerian commercial banks. Studies such as those by Olagunju, Olaiya, and Alaketu (2024) and Okeke (2023) have explored the broader impacts of capital structure but have not distinctly separated the effects of long-term versus short-term debt or debt-to-asset ratios on EBT margins. While Sifullah, Shelly, Uddin, Tabassum, and Uddin (2024) and Omokore, Njogo, Omankhanlen, Islaka, and Akinjare (2024) analyze debt effects, they do not specifically address how these components influence EBT margins for Nigerian banks. Similarly, Bala and Babangnida (2022) and Olulu-Briggs (2024) have examined capital structure impacts using aggregate metrics like Return on Assets (ROA) or Return on Equity (ROE) rather than focusing on EBT margins. This indicates a gap in understanding the specific effects of long-term and short-term debt ratios, as well as debt-to-asset ratios, on the EBT margins of commercial banks in Nigeria, highlighting the need for targeted research in this area.

1.1 Objectives

The main objective of the study is to examine the effect of debt to equity ratio on the corporate performance of listed commercial banks in Nigeria. The specific objectives were as follows:

1. to examine the effect of long-term debt to equity ratio on earnings before tax margin of listed commercial banks in Nigeria.
2. to ascertain the effect of short-term debt to equity ratio on earnings before tax margin of listed commercial banks in Nigeria.

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1.2 Hypotheses

H_{o1}: Long-term debt to equity ratio has no significant effect on earnings before tax margin of listed commercial banks in Nigeria.

H_0: Short-term debt to equity ratio has no significant effect on earnings before tax margin of listed commercial banks in Nigeria.

2. LITERATURE REVIEW

2.1 Conceptual Review

2.1.1 Short-Term Debt to Equity Ratio

The Short-Term Debt to Equity Ratio is a financial metric that compares a company's short-term debt to its equity, showing the proportion of short-term liabilities relative to shareholders' equity (Aghaebe & Oranefo, 2024). This ratio is a key indicator of a company's financial leverage and its approach to managing its capital structure, particularly in terms of how it balances short-term obligations with the equity invested by shareholders (Olulu-Briggs, 2024). By examining this ratio, stakeholders can gain a better understanding of the company's financial risk and its reliance on short-term borrowing to fund its operations. In essence, the Short-Term Debt to Equity Ratio reflects the degree to which a company uses short-term debt to finance its activities, as opposed to relying solely on equity capital (Kibunja & Fatoki, 2020). Short-term debt typically includes obligations that are due within one year, such as short-term loans, accounts payable, and other current liabilities. Equity, on the other hand, represents the residual interest in the company's assets after deducting liabilities, essentially reflecting the ownership stake held by shareholders.

A high Short-Term Debt to Equity Ratio suggests that a company is more heavily reliant on short-term debt compared to equity, which could indicate higher financial risk (Olulu-Briggs, 2024). This is because short-term debt needs to be repaid or refinanced relatively quickly, often within a year, which can put pressure on the company's cash flow and liquidity. Companies with high short-term debt levels may face challenges in meeting these obligations, especially if their revenue streams are volatile or if they encounter difficulties in accessing new financing. In such cases, the company may need to raise additional equity or reduce its short-term debt to maintain financial stability (Oboro & Samuel, 2021). Conversely, a low Short-Term Debt to Equity Ratio indicates that a company relies more on equity financing than short-term debt, which may be seen as a sign of financial prudence and stability (Aghaebe & Oranefo, 2024). Companies with lower ratios typically have a stronger equity base, which can act as a buffer against financial distress and provide greater flexibility in managing short-

term obligations. This can be particularly advantageous during periods of economic uncertainty, where access to credit may be restricted, and the ability to draw on equity can help sustain operations. However, the ideal Short-Term Debt to Equity Ratio can vary depending on the industry, company size, and business model. In some industries, particularly those with predictable cash flows and lower capital requirements, companies may operate with higher ratios without incurring significant risk. In contrast, industries that are more capital-intensive or have less predictable revenue streams may benefit from maintaining lower ratios to reduce financial risk. Thus, the Short-Term Debt to Equity Ratio is a critical measure of a company's financial leverage and risk management strategy, particularly in terms of how it balances short-term debt with shareholders' equity (Aghaebe & Oranefo, 2024). While a high ratio may signal increased financial risk, it should be evaluated in the context of the company's broader financial position and industry standards. Understanding this ratio can help investors, creditors, and management make informed decisions about the company's capital structure and its ability to manage short-term liabilities effectively.

2.1.2 Long-Term Debt to Equity Ratio

The Long-Term Debt to Equity Ratio is a financial metric used to assess the proportion of a company's long-term debt relative to its shareholders' equity (Igwebuike & Onyali, 2023). This ratio is crucial in understanding the financial leverage and risk associated with a company's capital structure. Specifically, it evaluates how much of a company's funding is derived from long-term debt compared to the equity invested by shareholders. Long-term debt includes loans, bonds, and other forms of debt that are due beyond one year, while equity consists of the capital provided by shareholders plus any retained earnings (Rascher, 2021). A high Long-Term Debt to Equity Ratio indicates that a company relies heavily on borrowed funds to finance its activities, which can signal higher financial risk (Aghaebe & Oranefo, 2024). This elevated leverage implies that a significant portion of the company's capital comes from debt rather than equity, potentially leading to higher interest obligations and increased vulnerability to economic downturns. Conversely, a low ratio suggests that the company is less reliant on debt financing and has a more conservative approach to leveraging. Such companies might be better positioned to weather economic fluctuations due to lower financial commitments (Olaoye & Omodara, 2023).

The ratio is calculated by dividing long-term debt by total equity. For instance, if a company has ₦200 million in long-term debt and ₦100 million in equity, its Long-Term Debt to Equity Ratio would be 2.0, indicating that the company has twice as much debt as equity. Investors

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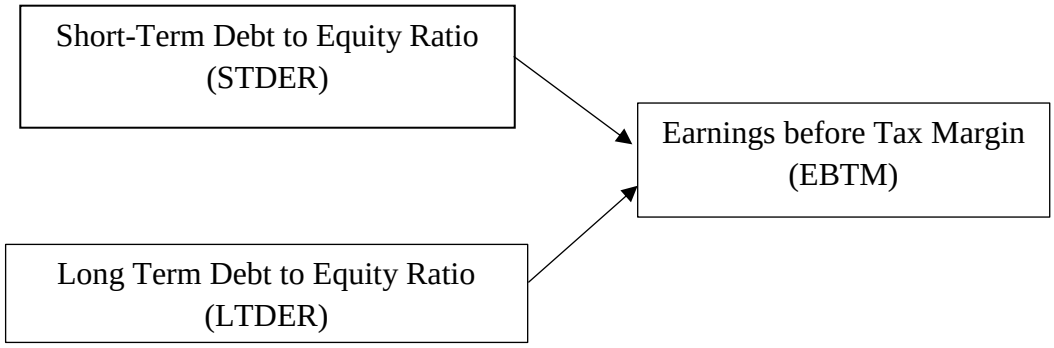
https://journals.unizik.edu.ng/joga

and analysts use this ratio to gauge a company's risk profile and financial health. A high ratio might be acceptable in capital-intensive industries where large amounts of debt are common, while in less capital-intensive sectors, it might signal excessive risk-taking.

Understanding this ratio helps stakeholders make informed decisions about the company's financial stability and risk exposure. It also affects the company's ability to secure additional financing, as lenders and investors scrutinize the ratio to determine the risk of extending credit or investing (Aghaebe & Oranefo, 2024). Overall, the Long-Term Debt to Equity Ratio is a critical tool for assessing a company's financial structure and its ability to manage and repay long-term obligations.

Based on the above hypotheses, the framework of the study is represented as:



3. MATERIAL AND METHOD

The study employed *ex-post facto research* design, which is particularly well-suited for analyzing relationships between past events and their outcomes. The population of this study is the entire 13 listed commercial banks in Nigeria as at December 31 2023. Purposive sampling technique was used to select the sample size of this study. The bases for the selection were availability of data and also that the shares of the bank must be traded on the floors of the Nigerian Stock Exchange. However, Jaiz bank was removed because it operates non-interest banking system. Among the remaining twelve banks, First Bank, Stanbic IBTC Ltd. and First City Monument Bank Ltd. were removed for failing to produce bank annual reports since they have been producing their Holding Group's annual reports instead. Based on these criteria of inclusion and exclusion, the following final sample of nine commercial banks was utilised in the study: Access Bank Plc, Ecobank Transnational Incorporated, Fidelity Bank Plc, Guaranty Trust Bank Plc, Sterling Bank Plc, United Bank for Africa Plc, Unity Bank Plc, Wema Bank Plc and Zenith Bank Plc. This study used secondary data sourced from the published financial statements and accounts of commercial banks listed on the Nigerian Exchange Group for the period from 2012 to 2023. The data are considered reliable and valid

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due to the endorsements by relevant authorities and the external audits conducted on the financial statements of these firms. This study adopts both descriptive and inferential statistical analysis. The data collected through secondary sources were tabulated, and findings from the report were presented in tables, analyzed using both descriptive and inferential statistics. Panel estimated generalised least squares was implemented for the purpose of hypotheses testing.

The functional model showing the relationship between financial leverage and firm performance was adapted from the work by Aghaebe and Oranefo (2024):

$ROA = \alpha_0 + \eta_1 STDE\ it + \eta_2 LTDE\ it + \eta_3 TDETE\ it + \mu_i \ldots\ldots$ Eq. (1)

Where: ROA = Return on Assets

STDE = Short-term Debt to Equity

LTDE = Long-term Debt to Equity

TDETE = Total Debt to Equity

μ = Error term

α = Constant

η = Coefficient of the Independent Variable

it = firm *i* in year *t*

The modification of the above model gave rise to the one used in the study as follows:

$EBTM_{it} = \alpha_0 + \eta_1 LTDER_{it} + \eta_2 STDER_{it} + \mu_i \ldots\ldots$ Eq. (2)

Where:

EBTM = Earnings before Tax Margin

LTDER = Long-term Debt to Equity Ratio

STDER = Short-term Debt to Equity Ratio

μ = Error term

α = Constant

η = Coefficient of the Independent Variable

it = firm *i* in year *t*

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Table 1. Description of Operational Variables of the Study

Name of Variables	Types of Variables	Description and Measurement
Earnings Before Tax Margin	Dependent	$\frac{Earnings\ Before\ Tax}{\text{Revenue}}$
Long-term Debt to Equity Ratio	Independent	$\frac{Noncurrent\ liabilities}{Total\ Equity}$
Short-term Debt to Equity Ratio	Independent	$\frac{Current\ liabilities}{Total\ Equity}$

Source: Researcher's Conceptualization (2024)

4. RESULT AND DISCUSSIONS

4.1 Data Analysis

The descriptive analysis was conducted to summarise the data set.

Table 2. Descriptive Statistics

	EBTM	LTDER	STDER
Mean	0.131598	5.944645	3.608286
Median	0.158987	4.646686	0.476336
Maximum	1.000000	185.3292	46.20385
Minimum	-5.353237	-1.916389	-2.311014
Std. Dev.	0.577873	17.69080	6.054868
Skewness	-8.106853	9.781030	3.562212
Kurtosis	76.94981	99.72952	23.78042
Jarque-Bera	25791.57	43826.74	2171.626
Probability	0.000000	0.000000	0.000000
Sum	14.21257	642.0217	389.6949
Sum Sq. Dev.	35.73134	33487.18	3922.773
Observations	108	108	108

Source: Eviews Output (2024)

4.1.2 EBTM (Earnings before Tax Margin)

Table 2 shows an average EBTM of 0.1316 which indicates that, on average, the listed commercial banks in Nigeria achieved an earnings before tax margin of approximately 13.16% over the study period. The median value of 0.1590 suggests that half of the banks had an EBT margin higher than 15.90%, reflecting a somewhat skewed distribution towards

higher margins. The maximum EBTM of 1.0000 represents a peak margin of 100%, an unusually high value that could indicate outliers or exceptional performance by certain banks. Conversely, the minimum value of -5.3532 indicates a significant negative margin, suggesting that some banks experienced substantial losses before tax. The wide range between the maximum and minimum values highlights considerable variability in profitability among the banks.

4.1.3 LTDER (Long-Term Debt to Equity Ratio)

The mean LTDER of 5.9446 suggests that, on average, the banks used significantly more long-term debt compared to their equity, indicating a high level of financial leverage. The median value of 4.6467 shows that half of the banks had a long-term debt to equity ratio lower than this figure, reflecting a central tendency towards less leverage. The maximum LTDER of 185.3292 indicates extreme leverage for some banks, potentially due to substantial long-term borrowing. The minimum value of -1.9164 is anomalous, as negative values are not typically expected for this ratio, possibly reflecting data errors or special cases where long-term debt was negative or negligible.

4.1.4 STDER (Short-Term Debt to Equity Ratio): The mean STDER of 3.6083 implies that, on average, the banks had a relatively high level of short-term debt compared to their equity. The median value of 0.4763 indicates that half of the banks had a lower ratio, suggesting a general trend towards lower short-term debt relative to equity. The maximum STDER of 46.2039 shows extreme cases of short-term leverage, which could point to significant financial risk for some banks. The minimum value of -2.3110 is unusual for this ratio, likely reflecting data anomalies or special conditions where short-term debt was either very low or not accurately recorded.

4.1.5 Robustness Tests of Panel Data Regression

We conducted two robustness analysis: cross-sectional dependence test and heteroskedasticity test. The outputs are shown in Table 3 and Table 4 below:

JOURNAL OF GLOBAL ACCOUNTING
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https://journals.unizik.edu.ng/joga

Table 3: Cross-Section Dependence Test

Residual Cross-Section Dependence Test

Null hypothesis: No cross-section dependence (correlation) in residuals

Equation: Untitled

Periods included: 12

Cross-sections included: 9

Total panel observations: 108

Note: non-zero cross-section means detected in data

Cross-section means were removed during computation of correlations

Test	Statistic	d.f.	Prob.
Breusch-Pagan LM	79.16740	36	0.0000
Pesaran scaled LM	5.087327		0.0000
Pesaran CD	2.247058		0.0246

Source: Eviews Output (2024)

The results from the residual cross-section dependence test in Table 3 indicates a significant p-value of 0.0000 for the Breusch-Pagan LM test, which suggests the presence of cross-sectional dependence among the residuals of the panel data. This finding implies that the residuals from different cross-sectional units (in this case, the listed commercial banks) are correlated with each other, which can affect the efficiency of standard error estimates and the validity of inference in regression analysis. The presence of cross-sectional dependence means that the errors in one bank's financial performance could be related to the errors in another, necessitating models that account for such interdependencies to avoid biased results and improve the robustness of the statistical conclusions (Nworie, Okafor & John-Akamelu, 2022).

Table 4: Panel Cross-section Heteroskedasticity LR Test

Null hypothesis: Residuals are homoscedastic

Equation: UNTITLED

Specification: EBTM LTDER STDER LTDAR STDAR C

	Value	df	Probability
Likelihood ratio	318.4500	9	0.0000

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https://journals.unizik.edu.ng/joga

Source: Eviews Output (2024)

Table 4 presents the results of the panel cross-section heteroskedasticity LR test, with a p-value of 0.0000, indicating a rejection of the null hypothesis that residuals are homoskedastic. This result shows that there is significant heteroskedasticity across the cross-sectional units, meaning that the variance of the residuals varies across different banks. Heteroskedasticity can lead to inefficient estimates and invalid statistical tests if not properly addressed. Therefore, accounting for heteroskedasticity is crucial to ensure reliable inference and accurate standard errors in the regression analysis (Gujarati & Porter, 2009). Both findings underscore the importance of using advanced econometric techniques to handle these issues, such as robust standard errors or specific models designed to address cross-sectional dependence and heteroskedasticity.

4.2 Test of Hypotheses

The study hypotheses were tested using Panel Estimated Generalised Least Square regression method. The use of Panel Estimated Generalized Least Squares (EGLS) allowed the researcher to incorporate generalized weights through Cross-Section Seemingly Unrelated Regression (SUR) and apply a coefficient covariance method using White cross-section standard errors and covariance. These techniques addressed the issues of cross-sectional dependence and heteroskedasticity, respectively, ensuring more accurate and reliable regression estimates.

Table 5: Panel Least Square Regression

Dependent Variable: EBTM

Method: Panel Least Squares

Date: 08/06/24 Time: 03:42

Sample: 2012 2023

Periods included: 12

Cross-sections included: 9

Total panel (balanced) observations: 108

Variable	Coefficient	Std. Error	t-Statistic	Prob.
STDER	0.005427	0.009295	0.583839	0.5606
LTDER	-0.000967	0.003181	-0.303987	0.7617
C	0.117765	0.067907	1.734219	0.0858

JOURNAL OF GLOBAL ACCOUNTING
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R-squared	0.144085	Mean dependent var	0.131598
Adjusted R-squared	0.114885	S.D. dependent var	0.577873
S.E. of regression	0.582158	Akaike info criterion	1.783236
Sum squared resid	35.58537	Schwarz criterion	1.857740
Log likelihood	-93.29474	Hannan-Quinn criter.	1.813445
F-statistic	0.215352	Durbin-Watson stat	2.245186
Prob(F-statistic)	0.061154		

Source: Eviews Output (2024)

The analysis investigates the effect of debt to equity ratio, measured by short-term debt to equity ratio (STDER) and long-term debt to equity ratio (LTDER), on corporate performance, represented by earnings before tax margin (EBTM) for listed commercial banks in Nigeria. The results come from a Panel Least Squares regression method. The adjusted R-squared value of 0.114885 indicates that approximately 11.5% of the variation in the earnings before tax margin can be explained by the variations in short-term and long-term debt to equity ratios. This suggests that while the model accounts for some of the variability in corporate performance, a significant portion of the variability remains unexplained by the debt ratios alone. This relatively low adjusted R-squared value implies that other factors not included in the model could also be influencing corporate performance.

The F-statistic's p-value is 0.061154, which is higher than the 0.05 threshold. This indicates that the overall model is not statistically significant and suggests that the predictors (STDER and LTDER) are not significantly related to the earnings before tax margin. The regression model however provides a meaningful explanation of the relationship between debt to equity ratio and corporate performance. The constant term has a coefficient of 0.117765 with a p-value of 0.0858, which is not statistically significant represents the baseline level of the earnings before tax margin when both STDER and LTDER are zero. The significance of this constant indicates a positive base level of corporate performance, absent the effects of debt ratios.

1. Short-Term Debt to Equity Ratio (STDER) and ebtm

The coefficient for STDER is 0.005427 with a p-value of 0.5606. The positive coefficient suggests that an increase in the short-term debt to equity ratio is associated with a slight increase in the earnings before tax margin. However, the p-value is significantly greater than

0.05, indicating that this relationship is not statistically significant. This implies that short-term financial leverage does not have a meaningful impact on the corporate performance of the banks in this study. The effect size is very small, reflecting minimal practical significance.

This finding highlights the potential dangers of over-reliance on long-term debt, suggesting that banks may need to be more cautious in leveraging their equity to finance long-term obligations. Olagunju, Olaiya, and Alaketu (2024) found that in Nigerian deposit banks, capital structure, including long-term debt, had a minimal positive effect on returns on assets (ROA), suggesting that leveraging might marginally improve performance. However, contrasting findings were presented by Olaoye and Omodara (2023), who noted that an increase in long-term debt was associated with higher ROA in Nigerian manufacturing firms, implying that long-term debt could enhance performance under certain conditions. On the other hand, Sifullah et al. (2024) demonstrated that in the pharmaceutical sector in Bangladesh, the long-term debt ratio had a significant adverse effect on financial performance, indicating that high leverage can be risky, particularly in sectors with high uncertainty. Similarly, Bala and Babangida (2022) observed that long-term debt had a moderate impact on ROA in Nigerian deposit money banks, reinforcing the idea that excessive long-term debt can erode profitability.

2. Long-Term Debt to Equity Ratio (LTDER) AND ebtm

The coefficient for LTDER is -0.000967 with a p-value of 0.7617. This negative coefficient suggests that an increase in the long-term debt to equity ratio is associated with a very slight decrease in the earnings before tax margin. The p-value being much higher than 0.05 indicates that this result is not statistically significant. Therefore, long-term financial leverage does not have a significant effect on the corporate performance of the banks in this context. The magnitude of the coefficient is also very small, indicating a negligible practical impact.

This finding indicates that an increase in short-term debt relative to equity leads to an insignificant increase in profitability. Short-term debt typically requires quicker repayment, which can create short term liquidity pressures for banks. In the Nigerian banking sector, where market conditions can be volatile, relying heavily on short-term debt may expose banks to refinancing risks and higher borrowing costs if they need to roll over these debts in unfavorable market conditions. The insignificant impact observed could also reflect the challenge of managing liquidity and the cost associated with maintaining adequate cash reserves to meet short-term obligations. Aghaebe and Oranefo (2024) reported that in Nigerian consumer goods firms, the short-term debt to equity ratio had a significant negative

effect on ROA, attributing this to the liquidity pressures that short-term debt imposes. This aligns with the findings of Bala and Babangida (2022), who also found that short-term debt had a considerable negative impact on ROA in Nigerian banks, emphasizing the risks associated with high levels of short-term borrowing. Further supporting this view, Nwafor (2023) noted that in the pharmaceutical industry, short-term debt ratios significantly affected firm performance negatively, highlighting the importance of managing short-term obligations effectively. Moreover, in a study by Omokore et al. (2024) on the healthcare sector, both short-term and long-term debts were found to have a negative but significant relationship with return on equity (ROE), reinforcing the idea that high short-term leverage can undermine profitability.

CONCLUSION AND RECOMMENDATION

The analysis reveals that neither short-term nor long-term debt to equity ratios significantly impact the earnings before tax margin for listed commercial banks in Nigeria. Both coefficients are statistically insignificant, indicating that financial leverage, as measured by these ratios, does not have a meaningful effect on corporate performance in this sample. The adjusted R-squared value indicates that approximately 11.5% of the variation in the earnings before tax margin can be explained by the variations in short-term and long-term debt to equity ratios. This suggests that while the model accounts for some of the variability in corporate performance, a significant portion of the variability remains unexplained by the debt ratios alone. This relatively low adjusted R-squared value implies that other factors not included in the model could also be influencing corporate performance. The thus recommended that the Board of Directors of listed commercial banks in Nigeria should reduce their reliance on long-term debt in favor of alternative financing options that do not overly leverage equity in order to protect profit margins and ensure more sustainable financial performance.

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