

**CAPITAL STRUCTURE AND FINANCIAL PERFORMANCE OF
QUOTED INSURANCE FIRMS IN NIGERIA**

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**A PROJECT WRITTEN AND SUBMITTED TO THE DEPARTMENT
OF BANKING AND FINANCE, FACULTY OF MANAGEMENT
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DECLARATION

I, **Odinaka Emmanuel EZENWAIGBO** do hereby declare that this project is entirely my work and composition. The work embodied in this project has not been submitted by another candidate for any degree and is not currently being submitted for any other degree. All references made to the works of other persons have been duly acknowledged.

Odinaka Emmanuel EZENWAIGBO

Date

CERTIFICATION

We, the undersigned certify that this research work was submitted by **Odinaka Emmanuel EZENWAIGBO** and it is hereby approved for the partial fulfilment of the requirement for the award of Bachelor of Science (B.Sc.) degree in Insurance, University of Benin, Benin City.

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DEDICATION

This project is dedicated to God and my parents; Mr Ezenwaigbo George and Mrs Ezenwaigbo Louretta Amaka for their support throughout my stay in school.

ACKNOWLEDGEMENTS

I sincerely express my profound gratitude to the Almighty God who in His infinite love and care has kept me safe and made this project a huge success.

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ABSTRACT

The study is on the impact of capital structure on the performance of quoted insurance firms in Nigeria. The study adopted the panel data regression method. The outcome of the study revealed that total debt to total assets ratio has a negative significant impact on performance of Nigerian insurance firms, short-term debt to total assets ratio has a positive significant impact on performance of Nigerian insurance firms, long-term debt to total assets ratio has a negative significant impact on performance of Nigerian insurance firms. The study however recommends that in order to continue to be profitable and competitive, top management of every insurance company needs make wise financial decisions. In order to finance their operating activities, listed insurance companies must step up their efforts to rely more on internally generated money.

CHAPTER ONE

INTRODUCTION

1.1 Background to the Study

It has been observed that successful businesses are an essential component for developing countries. Many economists compare them to an engine in terms of determining their economic, social, and political development. Therefore, every industry function under performance-based criteria if it wants to survive in a cutthroat commercial environment. In an insurance industry, performance is a factor that determine how efficiently the insurance firm operates. For insurance firms, performance is crucial since it helps ensure their existence in the market. Therefore, it is important to ensure that Nigerian insurance businesses operate admirably and productively.

However, one of the most essential factors for firms is their financial decision. As a result of this, every firm places a high value on the decision-making process of an organization's financial and its capital structure. Reducing the weighted average cost of capital (WACC) calls for a smart combination of the various financing options (debt vs. equity). This is so because businesses choose to use multiple forms of financing, which results in various capital structures, each of which may impact a firms' performance (Pandey & Sahu, 2019). Therefore, for firms to achieve their financial goals, they must make decisions about how to raise and manage its capital, what investments to make,

how much of the revenues should be distributed to shareholders in the form of dividends, and whether it makes sense to merge alongside or acquire subsidiaries.

Following the foundational paper work by Modigliani and Miller (1958), which dealt with the problem of the relationship between a firm's choice of finance and its value, it has been observed in subsequent years that financing decision preferences of enterprises are undoubtedly the most explored topic area in finance. Modigliani and Miller's (1958)'s revolutionary study was the first to emphasize the importance of taking capital structure decisions into account. Modigliani and Miller (1958) contended that the firm's performance is independent of the capital structure it chooses when there are no bankrupt costs, taxes, or friction in the capital markets in their initial claim made under the perfect capital market assumption. After giving the introduction of corporate taxes careful thought, Modigliani and Miller (1963) revised their first claim to state that when corporation taxes are present, interest payments are tax deductible and that the best form of financing is one that is entirely based on debt. In other words, as loans grow, the firm's performance rises. Based on this current hypothesis, the business executives could desire to borrow more money to optimize stockholders' wealth as shown by the firm's performance. From the findings of Migliori et al. (2018), businesses run by owners would choose a better capital structure than organizations run by people who are not owners. As a result, one of the key problems in business management is financial decisions. The discussion that has just been undertaken demonstrates how capital structure and business performance are intertwined. In a similar vein, the discussion suggests that attaining an

ideal capital structure depends significantly on the ownership structure. The development of enterprises gains momentum when an optimal capital structure is built. Thus, decisions regarding the capital structure, which have a direct and immediate impact on firms' performance are therefore crucial to the stockholders' objective of maximizing wealth.

1.2 Statement of the Research Problem

Academic debate surrounds the significance of a company's capital structure decision. The main issue is how dividing the cash flow stream into a loan component and how earn equity component would affect the firm's overall market performance (i.e., the total value of its debt and stock). Financial experts believed that raising the firm's leverage, or the amount of debt in its capital structure, would improve value to a certain extent. But after that, maintaining to grow the firm's debt would raise its overall cost of capital and lower its value in the market. However, it has been discovered that depending on how effectively debt was utilized, using it as part of the funds of a business might either improve or deteriorate the status of an organization. The majority of the time, long-term financing is necessary for the acquisition of new fixed assets or the growth of production capacity. It is incorrect and risky since it will increase the likelihood of bankruptcy if loan credit exceeds equity capital (owner's fund). Therefore, the capital structure a company chooses to finance capital projects will greatly influences the value, profitability, and increases the risk of a corporation to its shareholders.

Numerous studies have been undertaken, and one of the main reasons capital structures is essential is because it significantly affects organizations' performance. A firm's capital structure has no effect on its performance in perfect circumstances and without incurring bankruptcy expenses, according to Modigliani and Miller (1958). The idea of Modigliani and Miller (1958) that capital structure is irrelevant is supported by extant investigations, including studies by Cheng et al. (2010) and Myers (2011). The value and performance of a company are unrelated, according to these scholars. However, capital structure is relevant and affects the performance and value of enterprises, according to recent studies by Goh et al. (2018), Nenu et al. (2018), and Wu (2019). These authors claim that a poor financial mix can be difficult for managers and detrimental to a firm's future prospects.

While the debate over the relevance of capital structure is still open, other studies, like the ones by Vu et al. (2018) and Elmagrhi et al. (2018), maintain that a discussion of the significance of capital structure is pointless if it is not coupled with a discussion of the ownership structure of businesses. A similar theory contends that a firm's ownership structure will influence how much its capital structure affects a firm's performance. Indeed, Vu et al. (2018) and Elmagrhi et al. (2018) support the idea that owner-managed businesses would have the optimum capital mix and ultimately benefit from it. In literature, this problem has not been adequately addressed. Studies already conducted had a developed-country focus and produced contradictory empirical findings.

Given that emerging nations function in diverse political, economic, legal, social, and cultural situations, there is much debate over whether such studies are universally applicable. Studies on the relationship between capital structure and firms' performance in the insurance sector, in particular, have gotten scant attention in emerging nations, particularly in Nigeria. This leaves a gap in the literature, which is what this study seeks to address by adding new data on the impact of capital structure on the performance of listed insurance firms in Nigeria.

1.3 Research Questions

The study seeks to provide answers to the following research questions:

- i. What is the effect of total debt to total asset ratio on the performance of quoted insurance firms in Nigeria?
- ii. What is the impact of short-term debt to total assets ratio on the performance of quoted insurance firms in Nigeria?
- iii. What is the influence of long-term debts to total assets ratio on the performance of quoted insurance firms in Nigeria?

1.4 Objectives of the Study

The broad objective of the study is to examine the impact of capital structure on the performance of quoted insurance firms in Nigeria. In order to achieve the broad objective, the following specific objectives are to:

- i. evaluate the extent to which total debt to total asset ratio affect performance of quoted insurance firms in Nigeria;
- ii. determine the effect of short-term debt to total assets ratio on the performance of quoted insurance firms in Nigeria; and
- iii. examine the influence of long-term debt to total assets ratio on performance of quoted insurance firms in Nigeria.

1.5 Research Hypotheses

The hypotheses of the study will be tested in null form:

Hypothesis 1

H₀₁: Total debt to total asset ratio does not have a significant impact on the performance of quoted insurance firms in Nigeria

Hypothesis 2

H₀₂: Short-term debt to total assets ratio does not have a significant effect on the performance of quoted insurance firms in Nigeria

Hypothesis 3

H₀₃: Long-term debt to total assets ratio does not have a significant influence on the performance of quoted insurance firms in Nigeria.

1.6 Scope of the Study

The research focuses on capital structure and performance of quoted insurance firms in Nigeria. The sample size is restricted to Ten (10) selected quoted insurance firms on the Nigeria Exchange Group. They are selected in order to get the effect of capital structure on the performance of quoted insurance firms in Nigeria. The study covers the period 2011 to 2021 (11years). The reason for this time frame is deemed appropriate for the study because it covers different economic dispensations in Nigeria, especially after the Covid 19 pandemic that affected the global economic.

1.7 Significance of the Study

This study will be beneficiary to the following categories of people:

- 1. Top Executives:** this study will aid the Chief Executive Officer, Chairman and members of board, in managing the issues arising from raising of capital for business. This study will also broaden their perspective on the aspects of capital structure that need to be enhanced which will improve insurance firms' performance.
- 2. Shareholders/ Investors:** it will assist potential investors and existing shareholders to make appropriate judgements as regards their investments and performance of insurance firms in which they are stakeholders.

3. Regulators: this study will assist regulators in formulating better regulations that will be encompassing and contribute effectively to enhancing firms' performance most especially insurance firms in the country.

4. Future Researchers: this study will also help future researchers to carry out further studies in the same area or related area by serving as a theoretical basis for the research to be carried out. i.e. it will serve as reference point for further studies.

1.8 Limitation of the Study

One of the major limitations of this study is the problem on the part of previous researchers in extracting consistent and accurate data from relevant data source. Nevertheless, this constraint will be minimized by trying as much as possible to stick to recent data from in annual report since these sources are more credible and reliable.

Other limitations stem from setback and pitfall of the various preliminary test and estimation techniques that was employed by prior researchers in the cause of the study. However, efforts will be made such that the results from the study are accurate and reliable for policy implementation.

CHAPTER TWO

LITERATURE REVIEW

2.1 Introduction

In keeping with the objectives of this study, this chapter gives an overview of Nigeria's capital structure and insurance sector. A brief summary of earlier research that was done by many researchers that addressed concerns relevant to the research issues of this study is also included in this chapter. To establish the necessity for more research on this topic, an effort was made to examine their varying findings and determine whether they are consistent or inconsistent.

2.2 Conceptual Review

2.2.1 Concept of Capital Structure

According to Suardi and Noor (2015), a company's capital structure describes how it uses a range of financial sources to finance its operations and achieve its strategic goals. Sometimes it referred to as the financing plan for a company's general operations and growth, combines specified retained earnings, short-term debt, long-term debt, equity capital, and preferred shares (Awais, et al., 2016). A company's capital structure is the ratio of equity to debt that it utilizes to fund its activities. All businesses are financed by stock, debt, or hybrid securities. The amount of debt or equity a corporation uses to operate depends on the capital structure of the firm. Ndiwa (2014) defined a company's

capital structure as the combination of its financial liabilities. For a company to fund its assets, a combination of debt and equity financing is necessary. The ability of an enterprise to satisfy the needs of its stakeholders through dividend payments, the repayment of debt and other financial obligations, the timely payment of salaries, and other activities are directly tied to the capital structure of the company. A firm's long-term debt, particularly short-term debt, common equity, and preferred equity can all be grouped together as its capital structure. The capital structure demonstrates the various funding sources a company uses to finance its overall operations and expansion. While equity is defined as common stock, preferred stock, or retained earnings, debt typically takes the form of bond offerings or long-term notes payable.

2.2.2 Components of Capital Structure

i. Equity Financing

In capital structure components, equity financing is used to indicate the ownership of the organization's capital. It is perpetual capital, and the organization cannot afford to dispose of it while it is still in operation. Shareholders are the real risk-takers because they stand to gain from incurring them. Only the money they offered holds them accountable. Equity shares are well-liked by the investment community. Equity financing via common stock enables customers to alter their ownership share in the company through the sale or acquisition of common stock to or from several individuals or entities in exchange for a set amount of money.

ii. Debt Financing

Debt financing is a phrase used to describe funds borrowed and utilized for activities related to the capital structure of an organization. Nawaz (2011) asserts that long-term debt tends to be thought of as the safest kind because the business has years or even decades to pay back the principal while simply making repayments for interest in the course of that time. Debenture holders are the company's creditors and one of the elements of the capital structure, encompassing loan capital. There are several different debenture forms obtainable to investors to make investing simpler. Furthermore, businesses can get long- and medium-term loans from banks and other financial institutions.

iii. Interest (Cost of Debt)

The business had a number of choices for generating capital, including borrowing money from financial institutions or from the government in the form of bonds (debentures) for a set period of time at a set interest rate (Wakida, 2011). As a result of the corporation's ability to use a range of bonds, loans, and other kinds of debt, this measure is helpful for measuring the overall rate paid by the company to use debt financing. This measure may additionally offer investors considerable information about how hazardous the company is relative to other companies because riskier organizations often have higher loan costs. Since lenders often want lower returns since they assume the least risk of any contributors to long-term capital, the cost of debt is typically lower than the cost of other

forms of financing. The tax advantages of interest payments also greatly lower the cost of debt for the company.

iv. Dividends

Investors who contribute equity capital to the company have a claim to the firm's future payouts since they become part owners of the business and because these dividends cannot be foreseen from the start (Wakida, 2011). By maintaining their profits, businesses have the capability to raise money internally. The opportunity cost of retained earnings is the rate of return on dividends that equity holders forego, and the cost of external equity is the minimal rate of return that shareholders require on funds they supply by purchasing new shares in order to prevent a drop in the equity share's current market price (Wakida, 2011).

2.2.3 Determinants of Capital Structure

i. Profitability

Profitability has regularly been recognized as one of the independent variables in the elements determining the worth of a business, confirming the existence of the relationship between profitability and capital structure. Chakraborty (2010) integrates the pecking order theory and the static trade-off theory to explain the connection in his case study on India. The pecking order idea states that firms only use outside financing after consumption of up their retained profits. In simpler terms, since there is an adverse

connection between leverage and profitability, a company that is more advantageous is more likely to utilize internal sources of finance.

ii. Tangibility

Performance in business and tangibleness do not complement one another well. According to Mahakud and Misra (2009), there are two elements that contribute to this unfavourable connection. First, it happened because the firm did not utilize the asset to its full potential to produce the greatest amount of output, which might have increased the effectiveness of the regular operations of the business. secondly, the cost of borrowing against fixed assets will result in high leverage for the company. It was shown that tangibility is negatively correlated with business performance when Mahakud & Misra's (2009) research found that the value of fixed asset collateralization in India was not good. However, prior empirical research has found a beneficial relationship between company tangibility and company worth, as expressed in terms of leverage.

iii. Firm Size

Firm size is thought to be a key component of the capital structure. Because of this, the size of the company has historically been regarded as one of the independent variables in variables affecting the capital structure and the firm performance (Mahakud & Misra, 2009). According to Mahakud and Misra (2009), size has a positive impact on a company's performance. This is because larger businesses are able to produce by applying less

expensive financing sources, whilst smaller businesses find it difficult to raise capital from less expensive sources of the market. Large businesses were also able to hire top managers because they were offered better benefits.

iv. Liquidity

According to Suhaila et al. (2008), there is a bad association between a company's debt ratio and its liquidity. Because high liquidity can produce more income to finance operations and investment activities, they anticipate that firms with high liquidity will likely to use less debt. They frequently use debt to finance their operations as opposed to low liquidity enterprises. It has been demonstrated that liquidity is important to company performance because a high debt ratio will result in poor firm performance. From previous research, Wong and Kong (2011) completed a significant challenge that employs illiquidity measurements to analyze the illiquidity proxies in asset pricing literature in the Chinese stock market. They then developed illiquidity measures as a benchmark using easily accessible instantaneous data from the Chinese stock market, and they evaluated the practicability of proxies for illiquidity that were commonly used in the asset pricing literature. The conclusion showed that turnover has a stronger explanation capacity in the asset pricing models utilized on the Chinese stock market and is a more accurate measure of illiquidity. The study by Boulton, et al., (2010), on the other hand, demonstrates that increased investor protections have a beneficial effect since investors will pay more for financial assets if shareholders and management place greater attention on their wealth.

They find that initial public offerings (IPOs) with more after-market liquidity have less underpricing, or, to put it another way, higher valuations of businesses correlate with higher market liquidity.

v. Leverage

Leverage was the most prevalent variable previously investigated under firm performance. Leverage and firm performance may be positively or negatively correlated; hence this relationship is ambiguous. Whether maximizing profit or market value is the goal, leverage or cost of capital should be chosen accordingly, according to Modigliani and Miller (1958). According to Iturriaga and Crisostomo (2010), who outlined two hypotheses for their investigation, leverage has two distinct effects on firm performance. First off, a firm performance is negatively connected with its degree of corporate debt if it has potential for expansion. Second, the performance of the company is positively connected with corporate debt if there are no prospects for the company to grow.

Likewise, Iturriaga and Crisostomo (2010) demonstrated that the investments that businesses are now making have an effect on the leverage, which indirectly affects the firm's performance. Leverage had a negative impact on a company's performance in India, according to the Mahakud & Misra (2009) study. High leverage would reduce a company's financial flexibility, the studies indicated. A high agency cost and interest load brought on by a high leverage ratio, according to Mahakud & Misra (2009), would make it difficult for managers to operate at their peak levels in the Indian market. The results

support Ghosh and Ghosh's (2008) finding that increased leverage as a result of potential stakeholder and stockholder disputes has a detrimental effect on future firm performance growth in India. However, as demonstrated by Iturriaga and Crisostomo (2010), leverage has a positive impact on a firm's performance when it lacks potential projects. In order to prevent the manager from making unneeded purchases when free cash flow has diminished, this is done.

State-owned businesses and those in more developed regions do well with long-term debt, according to Li (2009), even though a corporation's foreign ownership has a negative effect on leverage. Using the data from the article under consideration, we arrived to the conclusion that leverage has a positive relationship with business performance. The results support Ghosh and Ghosh's (2008) finding that increased leverage as a result of potential stakeholder and stockholder disputes has a detrimental effect on future firm performance growth in India.

However, as demonstrated by Iturriaga and Crisostomo (2010), leverage has a positive impact on a firm's value when it lacks potential projects. In order to prevent the manager from making unneeded purchases when free cash flow has diminished, this is done. State-owned businesses and those in areas with greater development do well with long-term debt, according to Li (2009), even though a corporation's foreign ownership has a negative effect on leverage. Using the data from the article under consideration, we

arrived to the conclusion that leverage has a positive relationship with business performance.

2.2.4 Factors Which Influences Capital Structure

- **Business Risk**

Business risk is the main risk connected to a firm's operations, excluding debt. As business risk increases, the proper debt ratio declines.

- **Business's Tax Exposure**

Taxation can be set off when paying off debt. Consequently, utilizing debt to finance a project is useful if a company has a high tax rate since the tax deduction of the debt payments protects some profits from taxes. Consequently, debts mount up as the cheaper form of funding. Additionally, because the holders of the firm's financial liabilities or creditors are not allowed to share in the profits, the corporation is able to preserve a sizable portion of its earnings during prosperous times. And present equity stockholders will benefit from this.

- **Financial Flexibility**

In a nutshell, this is the business's ability to raise money under extremely difficult circumstances. It shouldn't be shocking as a surprise that businesses frequently have minimal issues acquiring capital when sales are expanding and earnings are strong. Yet given an organization's substantial cash flow during the good times, acquiring money is

not as challenging. Firms should make an effort to exercise precaution and avoid stretching their finances too thin while raising capital during good times. If a business has fewer loans the more financial independence it has. An organization with excessive debt may find it difficult to raise money.

- **Management Approach**

There are different management philosophies, from aggressive to conservative. As cautious the management team is in its approach, the less likely it is that it would use debt to increase earnings. A competitive management group may borrow a sizable sum of money in order to hasten the increase in the firm's earnings per share (EPS).

- **Rate of Growth**

When an enterprise is in the growth stage of its life cycle, it typically borrows money to finance the growth of its business in order to grow more quickly. This strategy encounters difficulties because the income of growth firms can occasionally be unsteady and unverified. Hence, it tends to be not a good idea to carry a great deal of debt. The need for debt to finance expansions is typically reduced as a business grows more established and mature since its earnings are more consistent and proven. These businesses also generate cash flow, which may be used to pay for initiatives as they arise.

- **Market Circumstances**

Market circumstances can have a big impact on a company's capital structure. Consider a situation where a business wants to borrow money to pay for a new plant. If the market is failing and investors are limiting enterprises' access to cash because of market fears, a company may have to pay a higher interest rate than it would like to. Then it could be a good idea for the company to wait to try to secure funding for the facility until after the market has returned to a more regular state.

2.2.5 Insurance

Insurance is an obligation to make payments on a regular basis in exchange for a promise to make up for particular potential future losses. In the scenario of an unforeseen loss, insurance is meant to protect an individual, a business, or any entity's financial security. Whilst certain types of insurance are mandated by law, others are not, there are all. A contract is formed between the insured and the insurer when the conditions of an insurance policy are accepted. The insurer agrees to pay the policyholder a certain amount of money should a specified event occur in return for payments from the insured (referred to as premiums). The policyholder typically pays the deductible, or portion of the loss, and the insurer picks up the tab for the remaining costs. The following are some examples: auto insurance, health insurance, life insurance, disability insurance, and business insurance.

2.3 Theoretical Review

2.3.1 Capital Structure Irrelevance and Relevance Theory

By these theories, which Modigliani and Miller formulated in 1958 and 1963, the worth of a business in an ideal capital market depends more on its operating profitability than on its capital structure, in other words, value is irrelevant (Modigliani and Miller, 1963). But Modigliani and Miller (1963) demonstrated how a firm's worth rises as a function of leverage when corporate tax laws permit interest payments to be deducted.

A leveraged corporation's equilibrium market value is given by:

$$V_L = X(1 - \tau_c) / \rho + \tau_c D_L$$

Where, X equals expected earnings before interest and taxes, $X(1 - \tau_c) / \rho = V_u$, is the worth of the firm if it were entirely financed with equity, and $\tau_c D_L$ is the present value of the interest tax-shield, the tax advantage of debt. Since interest is a tax-exempt expense, V_L grows with leverage given X .

Although this theory was successful in integrating the potential impact of corporate taxes into the capital structure theory, it only results in a severe corner consequence because the firm's value is maximized when 100% debt financing is adopted. The lack of certainty underlying interest tax savings plus the possibility of personal taxes (Miller, 1977) and non-debt tax shields (DeAngelo & Masulis, 1980) which put a limit on this perpetual tax benefit of debt, yet, make it impossible to implement.

Leland (1994) demonstrated, using the usual trade-off model, that marginal bankruptcy expenses connected with a firm's debt are similar to marginal tax benefits at the ideal capital structure. Static tradeoff theory was the original rebuttal to the theory of capital structure significance.

The conclusion stated by Modigliani and Miller (1963) regarding the tax shield effect of loan capital states that businesses strive for the best capital structure due to tax advantages and drawbacks related to financial stress. Firms are believed to work toward a common objective and may represent their prospects by adjusting their capital structure since adding more debt increases companies' worth by the market's perception of larger tax shields or lower bankruptcy expenses. The desired capital structure, however, cannot be achieved with 100% debt financing.

As a consequence of their discoveries, a sizable amount of study was done to pinpoint debt financing expenses that would offset the corporate tax benefit with observed capital structures. This theory holds that it is clear that a firm's choice of capital structure and its market value had a significant bearing on one another. However, debt financing is ineffective in practice and only results in a negative corner impact. Since it was first put forth, a lot of researchers have provided extensions to this idea. According to Baxter (1967), who conducted research on individual and small-business liquidations, the expenses of bankruptcy were significant enough to require attention.

Warner (1977) observed that the direct effects of bankruptcy were little when he looked at the bankruptcies of significant public limited firms from his own perspective. Altman (1984) demonstrated that the cost of bankruptcy is high when direct and indirect costs are combined. Although Myers (1984) conceded the existence of bankruptcy expenses, he questioned their magnitude.

2.3.2 Agency Cost Theory

The ideal capital structure will be determined by minimizing the costs connected with conflicts between the parties, in accordance with Jensen and Meckling's (1976) agency cost theory of capital structure. They asserted that while shareholders and debt holders might not agree, agency costs have a big impact on financing choices. Furthermore, if a company is about to go bankrupt, shareholders may pressure administrators to take moves that unintentionally transfer funds from debt holders to equity holders.

The overall finding regarding these variations is that the amalgamation of leverage-related costs (such as bankruptcy and agency costs) and a tax benefit of debt yields an optimal capital structure at less than 100% debt financing as the tax benefit is traded off with the likelihood of imposing the costs. The agency costs of debt, nevertheless are not enough to compensate for the tax benefits, according to empirical estimates by Parrino & Weisbach (1999). Contrarily, debt enhances the manager's ownership position in the business, which lowers agency costs of equity and eliminates manager-shareholder conflict.

Debt can also lower agency costs of equity by reducing the amount of free capital available to management to engage in their projects because it obligates the company to make cash payments (Jensen, 1986). This capital structure theory emphasizes the idea that an organization's preferred capital mix defines its ideal capital structure. Thus, it follows the static trade-off theory's assertion that a firm's capital structure decision is crucial to maximizing its value. It indicates that finding the appropriate capital structure will result in reducing the expenses related to disputes among the parties. Excessive dividend payments, the issuance of senior debt, asset substitution, and underinvestment are all problems that have an impact on the agency's cost of debt (Smith & Warner, 1979). These concerns reflect the likely outcome of bankruptcy, the price of debt restructuring, and the cost of upholding debt covenants. A decision on the capital structure of an enterprise may have an impact on its value in the marketplace, as rising businesses should have less debt, according to agency theory.

2.3.3 Static Tradeoff Theory

In accordance with the static tradeoff theory of capital structure, sometimes referred to as the tax-based theory, the optimal capital structure is achieved when the net tax benefit of debt financing balances leverage-related costs like financial distress and bankruptcy, holding firm assets, and investment options. From this vantage point, issuing equity departs from the ideal and ought to be considered unfavourably. Firms that use this strategy, in Myers's assessment (1984), could be seen to have set a target debt-to-value

ratio and been steadily working toward it. He failed to express the opinion that managers might be reluctant to issue shares if they think the market has undervalued them. Investors thereby think that problems with equity only occur when equity is either evaluated effectively or overpriced. As a result, the board of directors is reluctant to issue shares because investors often react negatively to such situations. According to Myers and Majluf (1984), managers have a better understanding of the true worth of a business and will time a new equity issue if the market price exceeds their estimate of the stock value, or if the market has overvalued the stocks. Investors that recognize the information asymmetry and interpret the announcement of an equity issue as a sign that the listed stocks are costly will have a negative price reaction. Numerous issues, such as cash flow fluctuation, potential bankruptcy costs in the event of failing, and an economic threat if cash is scarce, have been brought up in the extensive static tradeoff theory literature in relation to the forecast increase in tax advantages from employing debt financing. By evaluating the costs of bankruptcy against the advantages of debt in terms of company tax savings, this method determines the appropriate amount of debt to issue (DeAngelo and Masulis, 1980; Myers, 1984). Some people are disputing it.

This capital structure theory supports the notion that a firm should have a particular capital mix in order to maximize market value while taking into consideration both the costs of bankruptcy and the tax advantages of borrowed capital. It argues that there will be an upward trend between the market value of a company and the capital structure it selects. Miller (1977) argues that numerous companies should be far more heavily

leveraged than they actually are since the tax benefits seem to be significant and certain while the risk of bankruptcy seems to be negligible. According to Myers (1984), if this theory were to be the guiding principle, tax variables should provide significant knowledge about the best capital structure option. Furthermore, enterprises that are more successful should incur more debt, according to the static-order hypothesis, because their higher profits necessitate bigger tax shelters. However, this forecast was rejected by some, including Myers (1984), Fama, and French (2012). The trade-off theory anticipates that larger, more well-established enterprises will employ more debt than equity in their capital structures.

2.3.4 Pecking Order Theory

Donaldson's pecking order capital structure theory, which was initially put forth in 1961, is one of the most significant notions of capital structure. It goes contrary to the idea that businesses should use a specific ratio of debt and equity financing to reduce their cost of capital. The idea holds that when it comes to the sources of financing it uses to finance its long-term Spending a corporation has an order of preference. This implies that a corporation should give internal resources (such as retained earnings) a higher priority than external equity and debt. He asserted that as businesses become thriving, they will need fewer funds since they will have the internal resources to finish their investment initiatives. He went on to say that when an enterprise's internal finance is insufficient, it should search for external financing, ideally in the form of lending from banks or bonds

issued by corporations. Once internal, bank, and corporate borrowing, as well as corporate bonds, have been used up, the last and least preferred source of funding is the issuing of new stock capital. According to Myers (1984), firms worth internal funding over external financing due to adverse choices. Firms prefer debt over equity when acquiring outside finance is necessary due to the lower costs of information involved with debt issues. A shift in corporate debt should typically equal the funding gap dollar-for-dollar, according to Shyam-Sunder and Myers' (1999) development of these ideas into a crucial testable prediction. As a consequence, a regression of net debt issues on the finance deficit shows a slope coefficient of 1, if businesses follow the pecking order. In 2002, Fama and French tested a number of forecasts from the quantitative pecking order theory against those from the qualitative tradeoff model. Their findings support the pecking order, with fewer leveraged businesses typically being more profitable than others. Likewise, as predicted by the tradeoff principle, businesses with greater investment opportunities are less indebted. Donaldson's (1961) argument is in strong contrast to the capital structure relevance theory put forth by Modigliani and Miller (1963). It contradicts the idea that the choice of a company's capital structure will affect its worth. It argues that a company should finance its investments in a set order instead, regardless of how doing so would harm the firm's performance

2.4 Empirical Review

The linkage between the capital structure and firm performance has received a lot of attention over the years, and numerous studies have been conducted in this field that have outlined some of the empirical ways in which the capital structure affect firm performance are stated below:

Onaolapo and Kajola (2010) look into how capital structure affects the financial performance of companies registered on the Nigeria Stock Exchange. Between 2001 and 2007, a 7-year span, the study was conducted on 30 non-financial businesses in 15 industry categories. As a result, financial metrics like ROA and ROE for these companies were significantly impacted negatively by capital structure. Nor, et al., (2012) undertook a decision to explore the effects of debt and equity financing on the results of firms listed on the Bursa Malaysia exchange. They found a statistically significant inverse relationship between capital structure and business performance using a sample of 130 firms for the years 2001 to 2010 and multiple regression analysis. Salim and Yadav (2012) investigated the hyperlink between capital structure and company performance using a sample of 237 Malaysian companies between 1995 and 2011. Their analysis showed that Tobin's Q has a strong positive association with STD and LTD, whereas company performance as evaluated by ROAD, ROE, and EPS has a negative relationship with the capital structure. The Tehran Stock Exchange's non-financial listed companies from the years 2006 to 2011 are the focus of Ebrati, Emadi, Balasong, and Safari's (2013) research

on the relationship between capital structure and firm performance. According to the empirical findings, the performance indicators EPS and ROA are inversely correlated with capital structure.

For the Nairobi Securities Exchange's industrial and related sectors from 2004 to 2008, Kaumbuthu (2011) undertook a study to ascertain the relationship between capital structure and return on equity. The debt-to-equity ratio was employed as a proxy for capital structure, and return on equity was the key performance indicator. Regression analysis was used in the study, and it revealed a bad correlation between the debt-equity ratio and ROE. The study only paid attention to one component of funding decisions and concentrated on one industry of the companies listed on the Nairobi Securities Exchange. Therefore, it may not be possible to extrapolate the study's findings to other industries. Using a sample of thirty (30) non-financial companies listed on the Nigerian Stock Exchange during the seven-year period, 2004-2010, Chinaemerem and Anthony (2012) investigated the effect of capital structure on the financial performance of Nigerian firms. research conclusions showed that the capital structure of the firm has a very detrimental impact on its financial performance.

Maina and Kondongo (2013) explored into how the debt-to-equity ratio performance of companies listed at the Nairobi Securities Exchange affected the validity of MM theory in Kenya. The sample was a census of all companies listed on the Nairobi Securities Exchange during the years 2002 and 2011. The study discovered a significant inverse link

between all performance indicators and capital structure (DE). These findings corroborated the MM theory, which states that a firm's capital structure does affect its performance. According to the survey, companies listed on the NSE utilized more short-term debt than long-term debt. The performance of companies listed on the Nairobi Securities Exchange's debt-to-equity ratio was reviewed by Maina and Kondongo (2013) to determine how it affected the applicability of the MM theory in Kenya. All businesses listed on the Nairobi Securities Exchange between the years 2002 and 2011 were sampled for this study. All performance measures and capital structure (DE) were found to have a substantial inverse relationship, according to the study. The MM theory, which contends that a firm's capital structure does affect performance, was supported by these findings. Companies listed on the NSE used more short-term debt than long-term debt, according to the poll.

Using firm-level panel data from the two markets covering the period from 1992 to 2008, Jiang and Jiranyakul (2013) undertook a study comparing the decision on dividend distribution of listed firms in the New York Stock Exchange (NYSE) and Shanghai Stock Exchange (SSE). Because NYSE is a stable stock market and SSE is a developing one, the study chose these two stock exchanges. According to the research study's panel regression estimates for 378 SSE-listed companies and 537 NYSE-listed companies, which were based on fixed effect estimates, the factors that contributed to the NYSE companies' dividend payouts proved insufficient to account for the SSE companies' dividend payouts. The study's data confirms earlier research that corporations' payout

strategies differ between advanced and emerging stock markets. According to the study, in a developing stock market, investors were more worried about dividend payments than interest.

A study by O. Brienet et al. (2013) assessed how capital structure affected the performance of diversification in Japanese enterprises from the standpoint of transaction cost economics (TCE) perspective. All companies having a book value of equity of more than 3 billion Yen that was listed in the Pacific-Basin Capital Markets (PACAP) Japan database and for which market value information was available from 1991 to 2001 underwent the research. Leveraging the Hausman-Taylor instrumental variables (IV) regression model, they examined the data. Their empirical research supports TCE by demonstrating that organizations generate superior returns from deploying their assets and competencies into new markets when managers are protected from the pressures of the market governance of debt, particularly bond debt. The investigation further found that enterprises that invest heavily in R&D are more vulnerable to the negative consequences of debt, whereas businesses that are either contracting or operating in a stable market environment are less likely to suffer from debt-related problems. Using a sample of about 405,000 firms from 35 different European countries and 127 NACE three-digit industries gathered by the Bureau van Dijks AMADEUS database between 1999 and 2004, Pfaffermayr et al. (2013) conducted a study to examine the relationship between corporate taxation, firm age, and debt. Regression analysis was used in the empirical study to analyze how corporate taxation has changed over a corporation's

lifetime and how firm age and corporate taxation affect loan financing. They observed that the taxation of corporations had a favorable effect on a company's debt ratio, indicating that the corporate tax system systematically encourages more leverage.

A descriptive survey research design was used by Akinyomi and Olagunju (2013) to identify the factors that affect the capital structure of Nigerian businesses. A total of 86 manufacturing companies that are listed on the Nigerian Stock Exchange made up the population, of which 24 were chosen as samples. With regard to a ten-year period from 2003 to 2012, or 240 firm-year observations, the study used correlation coefficient and regression analysis to examine the data.

The study's findings showed that, on the one hand, leverage had a negative association with business size and tax, and a positive link with the tangible nature of assets, profitability, and growth. However, a meaningful relationship between tax and tangibility of assets was not proven until then. The association between tax and size, tangibility of assets and tax, tangibility of assets and growth, and lastly the relationship between tax and growth in Nigeria was also found to be significant. The purpose of this study, undertaken by Kibet et al. in 2013, was to determine how the Nairobi Securities Exchange's (NSE) capital structure and share prices relate to one another. Debt, equity, and gearing ratio's effects on share price were evaluated in the study. Multiple regression statistical analysis was utilized to evaluate panel data from the energy sector collected between 2006 and 2011 for the study. The variables' characteristics were first examined

using descriptive statistics, and the causal relationship between the variables was then examined using Pearson's coefficient of correlation. Third multiple regressions were utilized to test the overall link described in the hypotheses. The findings showed that the factors gearing ratio, debt, and equity are important predictors of share prices for the sector under investigation. Also, it was discovered that debt and gearing ratios had a favorable impact on share prices whereas equity had a negative impact.

Furthermore, Musiega, Alala, Douglas (2013) analyzed a sample of 30 non-financial enterprises listed on NSE over 5 years, from 2007 to 2011, to examine the relationship between a firm's capital structure and performance. The study employed linear regression analysis to do the analysis, which included both descriptive statistics and inferential statistics. The study employed five performance measures: market price-to-book ratio of stocks as a dependent variable, return on asset (ROA), return on equity (ROE), earnings per share (EPS), and dividend payout (DPO); and three capital structure measures: There are three independent variables: the total debt to asset ratio (TDA), the entire debt to asset ratio (LTDA), and the short-term debt to asset ratio (STDA). The size of the firm, expressed as the natural logarithm of revenues, was thought to be a moderating factor. The findings showed a substantial positive association between total assets (TA) of a firm and capital structure proxies, showing that large enterprises utilised long-term debts when their huge assets could be used as collateral for the loans. Thus, according to the study, companies listed on NSE looked to employ less debt in their capital structures, causing

many of them to pay less interest and, as a result, not expose the company to as many risks, as debt has been shown to have a negative impact on performance.

Additionally, data was collected from listed banks on the Nigeria Stock Exchange for the years 2008 to 2012 by Idode, Adeleke, Ogunlowore, and Ashogbon (2014) in their work that evaluated the impact of capital structure on the profitability of listed Nigerian banks. Their conclusions showed that capital structure throughout the research period has a considerable favourable impact on the profitability of Nigerian banks. In their 2015 study, Adesina, Nwidobie, and Adesina sought to understand how post-consolidation capital structures affected the financial performance of Nigerian listed banks. Profit before tax and equity and debt in the capital structure were employed as the study's independent and dependent variables, respectively. Secondary data analysis using ordinary least square regression reveals a substantial positive link between capital structure and the financial performance of Nigeria's quoted banks.

Numerous gaps in knowledge exist in the subject matter, particularly when it comes to Nigeria, according to the review of the literature reviewed in this section. Despite the fact that there are numerous studies, including those by Chinaemerem and Anthony (2012), Idode, Adeleke, Ogunlowore, and Ashogbon (2014), Adesina and Nwidobie (2015), the majority of research in Nigeria focuses on the banking and non-financial sectors of the economy, and none of the studies has examined the effect of capital structure on performance of quoted insurance firms. The lack of literature in this field has made it

necessary to conduct a study that focuses on the Nigerian insurance industry. Thus, this study aims to fill in this knowledge gap about the Nigerian insurance industry. The purpose of this study is to evaluate the effect of capital structure on the performance of quoted insurance firms in Nigeria.

2.5 Theoretical Frame Work

The capital structure irrelevance and relevance theory provide the theoretical underpinning for the linkages between capital structure and performance of quoted insurance firms in Nigeria. These theories stated that the worth of a business in an ideal capital market depends more on its operating profitability than on its capital structure, in other words, value is irrelevant (Modigliani and Miller, 1963).

CHAPTER THREE

METHODOLOGY

3.1 Introduction

This chapter of the study discusses the approach and methodology that will be employed to deal with the research questions presented in chapter one. It provides a thorough review of the datasets, choice of samples, study demographics, research design, and analysis methodologies.

3.2 Research Design

The investigation will employ ex-post-facto and longitudinal research techniques, which are typical of the social and management sciences. In an Ex-Post-facto research study, which employs secondary data to investigate responses to a parameter and its impact on specific people, the researcher has no control over the independent variables.

3.3 Population and Sample of Study

All insurance firms on the Nigeria Exchange Group are the group to which this study intends to generalize its findings. As a result, the study's population consists of insurance firms listed on the Nigeria Exchange Group, which is approximately twenty-three (23) in number (Nigeria Exchange Group Fact book, 2020). Using the data filtering technique, we arrive at a sample of ten (10) insurance firms that have been listed.

3.4 Data Sources

The data for the study will be derived from various editions of the Nigeria Exchange Limited fact book published by the Central Bank of Nigeria and the annual report of the insurance firms.

3.6 Model Specification

Below is the linear regression analysis model that would be employed;

Therefore:

$$ROA = f(TDTA, STTA, LTTA) \dots \dots \dots (1)$$

The econometric form of the model above is stated as;

$$ROA_{it} = \beta_0 + \beta_1 TDTA_{it} + \beta_2 STTA_{it} + \beta_3 LTTA_{it} + \epsilon_{it} \dots \dots \dots (2)$$

Where:

ROA = Return on asset

TDTA=Total debt to total assets

STTA = Short-debt to total assets

LTTA = Long-debt to total assets

$\beta_0, \beta_1, \beta_3$ = parameters to be estimated

\mathcal{E} = error term signifying other variables not captured in the study

it = Firm i at time t

3.7 Operationalization of Variables

Operationalization refers to a method a researcher uses to articulate how a concept is measured, observed, or manipulated within a particular study. A series of precise research questions are created through this approach using theoretical, and conceptual factors of interest.

Table 3.1: Operationalization of Variables

Variables	Measurement	Source	A priori sign
Return on Asset	Earnings before interest and tax/Total assets	Abor (2008)	
Total debt to total asset	Total Debt / Total Assets	Total Debt / Total Assets (Amara & Bilal, 2014)	+
Short-term debt to total assets	Short-term debt/Total assets	Amara & Bilal (2014)	+
Long-term debt to total assets	Long-term debt/Total assets	Abdullah (2013)	+

Source: Researcher's compilations (2023).

3.8 Method of Data Analysis

The impact of capital structure on the performance of quoted insurance firms in Nigeria was examined using descriptive and inferential analysis. Descriptive statistics and correlation analysis were employed as univariate analysis tools, and panel data regression was performed to identify the impact of capital structure on the performance of quoted insurance firms in Nigeria. Panel regression analysis (cross-sectional and time series) is a statistical technique for analyzing two-dimensional data. The choice between a fixed panel effect and a random panel effect will be made using the Hausman test.

CHAPTER FOUR

DATA PRESENTATION, ANALYSES AND INTERPRETATION OF RESULTS

4.1 Introduction

This chapter deals with the analysis and interpretation of the data based on the empirical approach adopted. The panel data regression technique is used for the analysis. In order to present a robust investigation and analysis of the study, two general methods are used in the empirical analysis, namely statistical and econometric methodologies. The statistical method involves the use of descriptive statistics as well as correlation analysis to examine the initial characterization and relationship among the variables of interest; while the panel data methodology is used to estimate the empirical model drawn from the time series-cross sectional data in order to succinctly determine the impact of capital structure on the financial performance of quoted insurance firms in Nigeria.

4.2 Descriptive Statistics

Table 4.1: Descriptive Statistics

	ROA	STTA	LLTA	TDTA
Mean	0.56421	3.596718	0.7527	13.76707
Median	0.48187	1.9434	0.7226	11.67807
Maximum	29.754300	113.864	61.296	19.8372
Minimum	-8.16320	0.332	0.12300	0.091
Std. Dev.	2.32423	12.034367	2.607432	14.303176
Skewness	0.142190	1.201229	0.157948	1.120181
Kurtosis	2.318766	9.624477	1.890198	2.697488
Jarque-Bera	0.948887	60.00039	1.367994	5.013452
Probability	0.536565	0.0001	0.528328	0.059349
Sum	2.557600	136800	19.11000	18.96860
Sum Sq. Dev.	0.0673673	1.04E+12	3.951000	2.085291
Observations	110	110	110	110

Source: Researcher's Computation 2023 from E-view 9.0 Software

The summary statistics of financial performance and the independent variables for the ten (10) insurance firms is listed in Table 4.1. The descriptive statistics reveals that the average return on asset (mean value) for the insurance firms is 0.56421 which is moderately low. The median value of 0.48187 is lower than the mean value and suggests that ROA values are not similar across the insurance firms in our sample. This is further buttressed by the low (negative) minimum value of -8.16320 while the maximum value of 29.754300 is not too high. The standard deviation of 2.32423 is greater than the mean

value. The skewness value of 0.142190 is also not high, its positive value indicates positive skewness. The Kurtosis value of 2.318 is low.

4.3 Correlation Analysis

It is essential to examine, in a preliminary manner, the relationships among the variables in the study. The correlation analysis is used to conduct these investigations. The result of the correlation tests is reported in table 4.2.

Table 4.2: Correlation Results

	ROA	LLTA	SSTA	TDTA	TDTE
ROA	1.000000				
LLTA	0.4670	1.000000			
SSTA	0.5201	0.0231	1.000000		
TDTA	0.3120	0.0107	0.0302	1.000000	
TDTE	0.0244	0.1137	0.4381	0.0324	1.000000

Source: Researcher’s Computation 2023 from E-view 9.0 Software

Table 4.2 shows the correlation coefficient between all the independent variables employed in the study. The correlation coefficient between each pair of independent variables should not exceed 0.80 values; otherwise the independent variables with a coefficient in excess of 0.80 between them may be suspected of exhibiting multicollinearity. The correlation matrix shows that the correlation between the

independent variables is either low degree or moderate degree, i.e. the correlation coefficient between all the independent variables is less than 0.80, which suggests that there is absence of multicollinearity.

4.4 Empirical Results on the Panel Analysis

The standard test to determine the method of panel analysis to adopt is the Hausman test for random effects. The results of the tests for ROA equation are reported in table 4.4.

Table 4.4: Summary of Hausman Test for Cross-Section Random Effects

Test for cross-section random effects			
Test Summary	Chi-Sq. Statistic	Chi-Sq. d.f.	Prob.
Cross-section random	12.13	3	0.0001

Source: Researcher’s Computation 2023 from E-view 9.0 Software

From Table 4.4, the p-value $0.0001 < 0.05$ hence the null hypothesis that the random effect model is more appropriate is rejected and the alternate hypothesis that the fixed effect model is more appropriate is accepted. The fixed-effect method is therefore used in the estimation of the ROA equation.

Fixed Effects Model

From the results in table 4.5, the statistic provides little evidence against the alternate hypothesis that there is mis-specification when the fixed effect model is employed. Thus,

we cannot reject the alternate hypothesis that unobserved firm specific heterogeneity is uncorrelated with regressors, and so we would be concentrating our analysis on estimates provided by the fixed effect model. Hence, the best method to apply is the fixed-effect strategy. In this study, we report the fixed-effects estimates and use the results for conclusions drawn. The result of the fixed-effects model is presented in table 4.5.

Dependent Variable: ROA

<i>Variable</i>	<i>Coefficient</i>	<i>t-Statistics</i>	<i>Prob.</i>
C	0.038190	1.342076	0.0137
TDTA	-0.06541	-1.629321	0.0192**
STTA	7.13E-08	1.703668	0.0214**
LLTA	-0.02291	-0.517599	0.0001***
	R ² = 0.884; Adjusted R ² = 0.875; F = 123.66; Prob(F-statistics) = 0.001; D.W = 1.6712		

Source: Researcher’s Computation 2023 from E-view 9.0 Software

***. Correlation is significant at the 0.01 level (1-tailed), ** Correlation is significant at the 0.05 level (1-tailed), and*. Correlation is significant at the 0.10 level (1-tailed).

From the result in Table 4.5, the goodness of fit statistics was moderate. The R² squared value of 88.4 percent shows that the three explanatory variables (Total debt to total asset, Short-debt to total assets, Long-debt to total assets) explained about 88.4 percent of the systematic variation of ROA for the quoted insurance firms. After adjusting for degree of

freedom the explanatory variables were able to explain about 87.5 percent of the systematic variation of ROA for the sampled insurance firms. The F-value is significant and shows that a significant linear relationship exists between ROA and the independent variables. Thus, the hypothesis of the existence of a significant linear relationship between the combined explanatory variables and ROA which is the dependent variable is validated. The D.W. statistic value of 1.6712 (approximately 2) suggests that there is absence of serial autocorrelation factor in the estimated model and the estimates are therefore reliable for policy directions.

The specific contribution of each of the explanatory variables to the behavior of ROA is determined by observing the individual coefficients of the variables in terms of size, signs and significance. The results in Table 4.5 show that Short-debt to total assets has positive impact on ROA in line with a priori expectation. Total debt to total asset, Long-debt to total assets exhibits a negative sign, indicating that an increase in Total debt to total asset, Long-debt to total will have a negative impact on ROA of the sampled insurance firms. More importantly, we focus on the significance of the coefficients in the model. The coefficients Total debt to total asset, Short-debt to total assets, Long-debt to total assets exert a significant impact on ROA at the 1 percent and 5 percent level respectively.

4.5 Hypotheses Testing

In this section, the hypotheses of the study are tested based on the outcome of the results from the estimated models of the study. The hypotheses are tested using the coefficients estimated in the fixed effect estimation in the empirical analysis.

Hypothesis One

H₀₁: Total debt to total asset ratio does not have a significant impact on the performance of quoted insurance firms in Nigeria

Decision Rule: with t value of -1.629321 and probability value 0.0192, as shown in table 4.5. This rejects null hypothesis which states that total debt to total asset ratio does not have a significant impact on the performance of quoted insurance firms in Nigeria. Therefore, the alternate hypothesis which states that total debt to total asset ratio has a significant impact on the performance of quoted insurance firms in Nigeria accepted.

Hypothesis Two

H₀₂: Short-term debt to total assets ratio does not have a significant effect on the performance of quoted insurance firms in Nigeria

Decision Rule: with t value of 1.703668 and probability value of 0.0214, as shown in table 4.5. This rejects the null hypothesis which states that short-term debt to total assets ratio does not have a significant effect on the performance of quoted insurance firms in

Nigeria. Therefore, the alternate hypothesis which states that short-term debt to total assets ratio has a significant effect on the performance of quoted insurance firms in Nigeria is accepted.

Hypothesis Three

H₀₃: Long-term debt to total assets ratio does not have a significant influence on the performance of quoted insurance firms in Nigeria.

Decision Rule: with t value of -0.517599 and probability value 0.0001 as shown in table 4.5. This rejects the null hypothesis which states long-term debt to total assets ratio does not have a significant influence on the performance of quoted insurance firms in Nigeria. Therefore, the alternate hypothesis which states that long-term debt to total assets ratio has a significant influence on the performance of quoted insurance firms in Nigeria is accepted.

4.6 Discussion of Results and Policy Implications

The empirical results show that total debt to total assets ratio has a negative significant impact on performance of quoted insurance firms in Nigeria. As a significant variable, it implies that total debt to total asset ratio is an important factor that influences performance of quoted insurance firms in Nigeria. This suggests that an increase in Total debt to total asset ratio will lead to a negative and significant decrease in the performance of quoted insurance firms in Nigeria.

Another important finding from the empirical analysis is short-term debt to total assets ratio has a positive significant impact on the performance of quoted insurance firms in Nigeria. This implies that an increase in short-term to total asset ratio will increase the performance of quoted insurance firms in Nigeria. This study is in agreement with the study of Anafo, Amponteng, & Yin (2015) and (Gill & Biger, 2011) who found that there was significant positive relationship between short-term debt and performance.

Finally, the results show that long-term debt to total assets ratio has a significant negative impact on the performance of quoted insurance firms in Nigeria. This indicates that long term debt to total assets has significant negative effect on the performance of quoted insurance firms in Nigeria. The implication of this finding is that the lower the long-term debt to total assets ratio of the quoted insurance firms in Nigeria, the better the quantum of profit to be reported by the firm. The finding is in agreement with the result of Alhassan (2017) who found that long-term has significantly negative effect on financial performance.

CHAPTER FIVE

SUMMARY OF FINDINGS, CONCLUSION AND RECOMMENDATIONS

5.1 Introduction

The focus of this chapter is to summarize the findings, draw conclusions reached in the study and make recommendations based on research objectives and the overall perspective of the main findings. The chapter is arranged as follows: section 5.2 summary of findings, section 5.3 covers the conclusion; section 5.4 enumerates the recommendations.

5.2 Summary of Findings

In this study, the effect of capital structure on the performance of Nigerian insurance firms was investigated. To aid in the study, several hypotheses regarding the impact of the total debt to total asset ratio, the short-term debt to total asset ratio, and the long-term debt to total asset ratio on the performance of insurance firms in Nigeria were made. Descriptive statistics, correlation analysis, and panel random effect technique were used to study a sample of ten (10) quoted insurance companies between 2011 and 2021. The relationship was objectively investigated using the panel data regression approach. The study revealed the following precise findings:

- i. Total debt to total assets ratio has a negative significant impact on performance of Nigerian insurance firms

- ii. Short-term debt to total assets ratio has a positive significant impact on performance of Nigerian insurance firms
- iii. Long-term debt to total assets ratio has a negative significant impact on performance of Nigerian insurance firms.

5.3 Conclusion

The study concludes that as a result of the business' incapacity to sustain itself and the volatile business climate, the insurance industry plays a critical part in the success of the company. The capital structure of an insurance company is particularly important because these companies require money to operate, resolve claims, or pay damages in the event of a loss. From the study, short-term debt to total assets ratio has a positive significant impact on performance of Nigerian insurance firms while total debt band long-term debt to total assets ratio has a negative significant impact on performance of Nigerian insurance firms.

5.4 Recommendations

Based on the empirical findings of this study, the following policy recommendations are suggested for policy action:

- i. In order to continue to be profitable and competitive, top management of every insurance company needs make wise financial decisions. In order to finance their operating activities, listed insurance companies must step up

their efforts to rely more on internally generated money. The insurance companies should look for low interest-bearing loans even in cases where outside funding would be required so that the tax benefits of the loan will outweigh the related financial hardship. Therefore, it is important to employ a suitable mix of capital structures in order to boost insurance companies' profitability.

- ii. Management of publicly traded insurance companies should work toward having an ideal capital structure by raising their equity level and decreasing their reliance on debts in order to avoid becoming cash-strapped and indebted. This is so that stock holders may assist the insurance companies grow in addition to providing capital by contributing their business knowledge, expertise, and contacts. As the business expands and they adopt a long-term perspective, investors are frequently willing to contribute additional capital because most do not anticipate a quick return on their investment.
- iii. Insurance companies shouldn't be afraid to take on debt to fund their operations and initiatives. In order to improve their financial performance, corporations are advised to make every effort to finance their operations with a high debt-to-equity ratio and a lower amount of debt financing.

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