Moderating Role of Executive Compensation on Employee and Chief Executive Officers' Ownerships and Market Value of Listed Consumer and Industrial Goods Firms in Nigeria

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ABSTRACT

One of the critical challenges affecting the market value of firms in Nigeria is the intricate relationship between corporate governance mechanisms, particularly ownership structures and executive compensation frameworks. This study explores the moderating role of executive compensation in the relationship between employee and Chief Executive Officer ownership and the market value of listed consumer and industrial goods firms in Nigeria. The study population comprises thirty-four (34) consumer and industrial goods firms listed on the Nigerian Exchange Group as of December 31, 2024. A purposive sampling method was employed to select twenty-six (26) firms with consistent disclosures over fifteen years (2010–2024). Utilizing a longitudinal panel research design, the study applied panel least squares and panel EGLS (random effects) regression analysis using E-Views 12 software. The results indicate that while employee and CEO ownership alone do not have a statistically significant effect on firm market value, their interaction with executive compensation has a positive and significant effect. The study concludes that executive compensation serves as an essential strategic moderator, aligning managerial incentives with shareholder interests, thus enhancing firm market value. The study recommends that boards of listed firms should adopt performance-based compensation schemes and that regulatory bodies enforce stricter disclosure of ownership-incentive alignments to improve market valuations and promote sustainable governance practices in Nigeria's consumer and industrial goods sectors.

Keywords: Executive Compensation, Employee Ownership, Chief Executive Officers' Ownership, Market Value, and Price to Book Value.

INTRODUCTION

Market value represents the aggregate worth of a company's outstanding shares in the stock market, serving as a critical indicator of investor confidence, firm performance, and future growth prospects. In the context of listed consumer and industrial goods firms, market value reflects how effectively a company utilizes its resources, governance structures, and strategic decisions to generate shareholder wealth. Globally, market value is influenced by factors such as profitability, innovation, and corporate governance, with studies showing that strong ownership structures and transparent practices enhance it (Ammann et al., 2019; Chen et al., 2020). In Nigeria, where the stock market is emerging and characterized by volatility, market value is susceptible to internal mechanisms like board attributes and external economic conditions, often leading to fluctuations that impact investor perceptions (Bamidele et al., 2023).

However, market value in Nigeria faces significant challenges, including weak institutional frameworks which have limited the enforcement of governance codes, allowing in efficiences to persist across listed firms. Another challenge is high ownership concentration often results in the domination of corporate decisions by few shareholders, undermining minority interests and reducing transparency, and precistent agency problems which arise from misalignment between manager’s and shareholders goals can wear down shareholder value leading to suboptimal decisions that erode firm value. Issues such as inadequate disclosure practices also hinder transparency and accountability, while earnings management distorts true financial performance, misleading investors. Moreover, expropriation by majority shareholders remains prevalent, depriving minority investors of fair returns are prevalent, especially in consumer and industrial goods sectors, where concentrated ownership can lead to entrenchment and reduced transparency (Maksimovic et al., 2020; Anifowose et al.,

2017). Broader macroeconomic conditions, such as economic instability, regulatory inconsistencies, and limited access to capital, further exacerbate market inefficiencies, resulting in undervaluation of firms and market inefficiencies (Boachie, 2023). These factors not only hinder sustainable growth but also deter foreign investment, as evidenced by studies on Nigerian listed firms grappling with governance reforms amid volatile market conditions (Agara & Stainbank, 2023). Collectively, these factors contribute to the persistent volatility of market value in Nigeria's consumer and industrial goods sectors- a key issue that this study seeks to address.

Employee and Chief Executive Officer (CEO) ownership are pivotal ownership structures that align interests between stakeholders and management, potentially enhancing firm performance and market value. Employee ownership, often through stock plans, motivates workforce productivity and reduces agency costs by fostering a shared sense of responsibility, while CEO ownership incentivizes long-term strategic decisions that prioritize shareholder value (Kong et al., 2024; Cheng & Wang, 2021). In Nigerian consumer and industrial goods firms, these ownership forms can mitigate governance weaknesses, with research indicating their moderating roles in improving financial outcomes and transparency, particularly in concentrated ownership environments (Baba & Baba, 2021; Zik-Rullahi & Farouk, 2021). However, their effectiveness depends on balanced implementation to avoid entrenchment or dilution of control.

Despite the recognized importance of ownership structures, a key problem in Nigerian listed consumer and industrial goods firms is the inconsistent impact of employee and CEO ownership on market value, often undermined by misaligned executive compensation practices. Studies reveal that while ownership can enhance performance, excessive compensation may lead to agency conflicts, earnings manipulation, and diminished market value, creating challenges in achieving optimal governance (Farouk & Ahmed, 2023; Ibrahim & Maitala, 2023). In Nigeria, where regulatory oversight is limited, this misalignment exacerbates undervaluation and volatility, as executives may prioritize short-term gains over sustainable value creation, leading to eroded investor trust and suboptimal firm outcomes (Ahmed et al., 2020; Akanfe & Oladipo, 2017).

Existing literature highlights gaps in understanding how executive compensation moderates the relationship between employee and CEO ownership and market value, particularly in the Nigerian context. While prior research (Barde et al., 2023; Kantudu & Zik-Rullahi, 2020) focus on direct effects of ownership or compensation on performance, few studies explore this moderating dynamic in consumer and industrial goods sectors, leaving a rationale for empirical investigation to address inconsistencies and provide policy insights. This study fills these gaps by examining the moderating role of executive compensation, offering a rationale through panel data analysis to enhance governance practices, boost market value, and contribute to sustainable development in Nigeria's emerging market.

The basic hypotheses underlying this study are stated thus in null form;

i. **H_{01}:** Employee ownership percentage has no significant effect on the price to book value of listed consumer and industrial goods firms in Nigeria when moderated by executive compensation.
ii. **H_{02}:** Chief Executive Officers' ownership percentage has no significant effect on the price to book value of listed consumer and industrial goods firms in Nigeria when moderated by executive compensation.

LITERATURE REVIEW

Conceptual Framework

Employee Ownership

Employee ownership refers to a corporate governance mechanism in which employees hold shares in the company, thereby aligning their interests with those of shareholders. This structure fosters a sense of ownership, potentially enhancing productivity and firm performance by reducing agency costs, as employees are motivated to contribute to the firm's success. In the context of Nigerian consumer and industrial goods firms, employee ownership can influence market value by improving operational efficiency and commitment. Studies suggest that employee stock ownership plans (ESOPs) have a positive impact on corporate environmental engagement and financial performance, particularly in firms with concentrated ownership

structures (Kong et al., 2024). However, the effectiveness of employee ownership may vary depending on the level of ownership concentration and governance mechanisms in place.

Furthermore, employee ownership can serve as a moderating factor in the relationship between governance structures and firm outcomes. Research indicates that such ownership structures can mitigate agency problems by aligning employee and shareholder goals, thus enhancing firm value (Javeed & Lefen, 2019). In Nigeria, where ownership structures are often concentrated, employee ownership could play a critical role in improving transparency and accountability, especially in listed consumer goods firms (Baba & Baba, 2021).

Employee Ownership Percentage

Employee ownership percentage, on the other hand, is the proportion of company shares collectively held by employees (excluding or including executives. Employee ownership percentage is the proportion of company shares collectively held by employees, ranging from partial to full ownership. This percentage determines an employee's influence and can be achieved through various structures such as worker cooperatives, Employee Stock Ownership Plans (ESOPs), or direct share ownership plans, and incentive shares. Employees are given the right to purchase shares at a discounted price. Employee ownership adds another stakeholder voice in decision making, promoting accountability and long-term thinking. However, the extent of its impact on market value may depend on the firm's specific governance practices and the degree of employee participation in decision making processes.

$$EO\ (\%) = \frac{\text{Shares held by Employees}}{\text{Total Outstanding Shares}} \times \frac{100}{1}$$

Chief Executive Officers' Ownership

Chief Executive Officer (CEO) ownership involves the allocation of company shares to the CEO, which aligns their interests with those of shareholders, potentially reducing agency conflicts. In Nigerian listed firms, CEO ownership is often seen as a mechanism to incentivize strategic decision-making that enhances market value. Research highlights that managerial ownership, including that of CEOs, positively influences firm performance by encouraging long-term value creation and risk-taking (Cheng & Wang, 2021). In the Nigerian context, CEO ownership can moderate the relationship between governance structures and financial performance, particularly in consumer and industrial goods sectors (Zik-Rullahi & Farouk, 2021).

However, high levels of CEO ownership may lead to entrenchment, where CEOs prioritize personal interests over those of other stakeholders, potentially negatively affecting market value. Studies suggest that in emerging markets like Nigeria, CEO ownership needs to be balanced with strong governance mechanisms to ensure accountability and prevent expropriation of minority shareholders (Maksimovic et al., 2020). For instance, the moderating role of CEO ownership in Nigerian firms has been shown to influence earnings management practices, impacting firm value (Farouk & Ahmed, 2023). Thus, while CEO ownership can enhance market value, its effectiveness depends on the firm's governance framework and ownership concentration.

Chief Executive Ownership Percentage

Similarly, the Chief Executive Officer percentage or CEO shareholding refers to the proportion (usually expressed as a percentage) of a company's shares that is directly held by its Chief Executive Officer (CEO) relative to the total outstanding shares. When CEOs hold significant ownership in their company, their personal wealth is directly tied to the company's performance. This helps align their interests with those of shareholders, encouraging them to pursue strategies that increase firm value. CEO ownership percentage is a significant source of power both in theory and practice Saidu, 2019). It is also the share of ownership held by the CEO and finds that higher levels of CEO ownership are significantly associated with better financial performance (Tijjani Habibu Ahmad & Bello, 2023). It is calculated as shown below.

$$CEO\ (\%) = \frac{\text{Shares held by CEO}}{\text{Total Outstanding Shares}} \times \frac{100}{1}$$

Market Value

Market value represents the total value of a firm's outstanding shares, reflecting investor perceptions of its future earnings potential and overall performance. In the context of Nigerian consumer and industrial goods firms, market value is influenced by factors such as ownership structure, executive compensation, and governance mechanisms. Research indicates that firms with concentrated ownership structures, common in Nigeria, often experience higher market values due to reduced agency costs and improved decision-making efficiency (Ammann et al., 2019). Additionally, governance reforms that enhance transparency can significantly boost market value in such firms (Chen et al., 2020).

The interplay between employee and CEO ownership and market value is particularly relevant in Nigeria, where ownership concentration is prevalent. Studies suggest that effective corporate governance, including board attributes and ownership structures, positively moderates the relationship between firm performance and market value (Anifowose et al., 2017). For listed consumer goods firms, market value serves as a critical indicator of investor confidence, influenced by both internal governance mechanisms and external market conditions (Bamidele et al., 2023). Thus, understanding the factors that drive market value is essential for assessing the impact of executive compensation and ownership structures in the Nigerian context.

Price to Book Value

The Price-to-Book Value (P/BV) ratio is a financial metric that compares a firm's market value to its book value, serving as an indicator of how the market perceives the firm's intrinsic value. In Nigerian consumer and industrial goods firms, a high P/BV ratio suggests that the market expects strong future growth, often linked to effective governance and ownership structures. Research shows that ownership concentration, common in Nigerian firms, can positively influence P/BV by signaling strong control and efficient resource allocation (Alvarez & Rodríguez, 2022). However, excessive concentration may lead to agency issues that depress P/BV (Maksimovic et al., 2020).

The P/BV ratio is also affected by executive compensation and firm performance. Studies indicate that wellstructured compensation packages, aligned with shareholder interests, can enhance P/BV by boosting investor confidence (Akanfe & Oladipo, 2017). In Nigeria, where listed firms often face governance challenges, the moderating role of board attributes and ownership structures is critical in ensuring that P/BV reflects true firm value (Agara & Stainbank, 2023). Thus, P/BV serves as a useful metric for evaluating how executive compensation and ownership dynamics impact market perceptions of Nigerian consumer and industrial goods firms.

$$PBV = \frac{\text{Marker Price per Share}}{\text{Shareholders Equity}} \times \frac{100}{1}$$

Executive Compensation

Executive compensation refers to the financial and non-financial rewards provided to top executives, including salaries, bonuses, and stock options, designed to align their interests with those of shareholders. In Nigerian listed consumer and industrial goods firms, executive compensation is a critical factor influencing market value, as it can incentivize performance or lead to agency problems if misaligned. Research suggests that well-designed compensation packages positively affect financial performance and firm value by motivating executives to prioritize long-term growth (Barde et al., 2023). However, excessive compensation may lead to shareholder dissatisfaction and reduced market value (Ahmed et al., 2020).

In the Nigerian context, executive compensation often interacts with ownership structures and governance mechanisms. Studies indicate that compensation structures moderated by board attributes, such as independence and financial expertise, can enhance firm performance and market value (Ibrahim & Maitala, 2023). Additionally, the relationship between executive compensation and earnings management in Nigerian firms highlights the need for balanced compensation policies to avoid negative impacts on market value (Farouk & Ahmed, 2023). Thus, executive compensation plays a pivotal role in shaping investor perceptions and firm outcomes in Nigeria’s consumer and industrial goods sectors.

EC = Base Salary + Annual Bonus + Stock Options + Other Benefits

Firm Age

Firm age refers to the duration a company has been in operation, often influencing its market value, governance practices, and performance stability. In Nigerian consumer and industrial goods firms, older firms tend to have established governance structures and market presence, which can positively impact market value. Research suggests that firm age moderates the relationship between ownership structures and financial performance, as older firms may have more robust systems to manage agency costs (Sulaiman et al., 2019). However, younger firms may exhibit higher growth potential, attracting investor interest and boosting market value (Bamidele et al., 2023).

The impact of firm age on market value is also tied to its interaction with executive compensation and ownership structures. Studies indicate that older firms with concentrated ownership may benefit from stable governance practices, enhancing investor confidence and market value (Boachie, 2023). In contrast, younger firms may face challenges in establishing credibility, necessitating stronger governance mechanisms to align executive and shareholder interests (Ngatno et al., 2021). In Nigeria, where consumer and industrial goods firms vary widely in age, understanding the moderating role of firm age is crucial for assessing its impact on market value and governance effectiveness.

Firm Age = Current year – Incorporation Year

Empirical Literature

Ugbeh and Naburgi (2025) investigated the influence of CEO characteristics, specifically CEO Experience, CEO Ownership Stake, CEO Gender, and CEO Compensation Structure, on earnings quality among listed consumer goods firms in Nigeria from 2014 to 2023. Employing an ex-post facto research design underpinned by a positivist philosophy, the research utilizes secondary panel data extracted from the annual reports and financial statements of 21 listed consumer goods firms, yielding 210 observations. The study adopts a census sampling method due to the manageable population size and applies a fixed effects regression model, justified by the Hausman test results, to control for unobserved heterogeneity. The empirical findings reveal that CEO Experience and CEO Ownership Stake have significant positive effects on earnings quality. In contrast, CEO Gender and CEO Compensation Structure do not exhibit statistically significant impacts on earnings quality. This study, therefore, concludes that CEO characteristics have a significant effect on earnings quality. This research contributes to the literature by emphasizing the importance of CEO characteristics in enhancing firm performance, but it falls short of exploring how executive compensation may interact with ownership structures to influence broader firm outcomes such as market value, which is the central focus of this study. Additionally, the study overlooks the potential moderating effects of employee and CEO ownership on firm value, making it less relevant to the specific dynamics of ownership-incentive alignment in Nigerian firms.

Bakoji and Ishaku (2023) investigated how ownership concentration impacts the dividend policies of publicly traded consumer goods companies in Nigeria. The study employed an ex-post facto research design and analysed secondary data spanning 11 years (2011-2021) extracted from the annual reports and accounts of the companies being studied. The results of the analysis revealed that a high level of ownership concentration has a significant and negative influence on the dividend payout ratio of these consumer goods companies in Nigeria. Consequently, it is advisable to steer clear of excessively concentrated ownership, as it can be detrimental to the decisions regarding dividends. The study's recommendation against ownership concentration does not provide actionable strategies for mitigating its negative effects. The dataset excludes post-2021 developments, reducing its relevance.

Farouk et al. (2023) examined executive compensation, share ownership, and earnings management of banks in Nigeria. The secondary data source was employed and extracted from the banks' published financial statements covering the period from 2007-2018. Post estimation tests, including normality tests of standard error, heteroscedasticity, and multicollinearity, were carried out to validate the outcome. The executive compensation variable is represented by Chief Executive Officer Pay (CEO Pay), the Board Chairman's compensation, and the highest-paid director, while executive share ownership represents the moderator variable. Chang *et al.* (2008) model was used to proxy earnings management. The findings revealed that CEO Pay increases the

banks' level of earnings management, while after moderation with executive share ownership, CEO pay decreases the possibility of earnings management by banks. Compensation to the Chairmen of the banks decreases the level of earnings management of banks. However, an increase in share ownership of the board with an increase in compensation to chairmen of banks' boards increases the earnings management practices of the management of the banks. The findings imply that the executive ownership interest should be made to align with that of the minority shareholders following an increase in their stake so that they can act in the overall best interest of the owners. Farouk et al. (2023) primarily focused on the banking sector and earnings management, leaving a gap regarding how these dynamics function in non-financial sectors like consumer and industrial goods. This study fills that gap by examining the moderating role of executive compensation on market-based valuation (PBV), providing a broader perspective on how incentives drive firm value outside the highly regulated banking environment.

Ibrahim and Maitala (2023) examined the effect of executive compensation on the financial performance of listed non-financial firms in Nigeria. A correlational research design was used based on a filtered census population of 63 firms listed on Nigeria's Exchange Group. Secondary data was obtained from the annual financial reports of these firms and analyzed using the generalized method of moments. The study found that salary emoluments, bonuses, and stock-based compensation, as measures of executive compensation, have a negative impact on the return on equity of listed non-financial firms in Nigeria. Where executive pensions have a positive impact on the return on equity of listed non-financial firms in Nigeria. Regardless of executive compensation being an incentivizing tool for the executive team, which has a significant impact on company strategy, decision-making, and value creation, as well as enhancing executive retention, different components of executive compensation exert different effects on the financial performance of firms, as confirmed by this research. The study overlooked potential confounding variables, such as industry-specific factors or macroeconomic influences, that could also impact the financial performance of listed non-financial firms in Nigeria, making it difficult to solely attribute changes in return on equity to executive compensation.

Barde *et al*. (2023) examined the executive compensation and value of listed deposit money banks in Nigeria. The increasing failure of banks has made it important to seek ways to enhance their value to attract investors and potential investors. Therefore, the study examines the relationship between executive compensation and the value of listed deposit money banks (DMB) in Nigeria. The study adopted a correlational research design with balanced panel data of 14 listed banks, which served as the population of the study for the period of 2010-2021, using Generalized Least Squares (GLS) regression as a tool of analysis. The study found that CEO Pay and Chairman's compensation have a positive effect on the value of listed banks, while the highest paid director has a negative influence on the banks' value. This implies that the CEO's Pay and the Chairman's compensation improve the value of banks. The study does not adequately address how chairman compensation negatively influences bank value, leaving a gap in understanding the underlying dynamics. The exclusion of other financial sectors also limits its broader applicability.

Zik-Rullahi and Farouk (2021) investigated the impact of executive pay and shares owned by executives on the value of commercial banks listed in Nigeria. Proxies of compensation to the executive employed are CEO pay, compensation to the chairman, and the highest pay to a director. However, the ratio of interest by executives in shares owned represents the ownership of shares by bank executives. The value of the bank was measured using Tobin's Q. The Technique employed for estimation is the Robust OLS regression. Meanwhile, the data analysis tool used was Stata version 13. Data from secondary sources was used and extracted from the published annual accounts statements of the banks covering the period from 2007 to 2018. Post-estimation examination, which includes normality test of standard error term, heteroscedasticity, and multicollinearity, was conducted to validate the regression results. The results revealed that the pay to the CEO had a positive and significant effect on the value of high and low-levered banks. However, compensation to chairmen and the highest-paid directors had a negative effect on the value of high and low -and low-levered banks. Additionally, the effectiveness of executive compensation on the value of banks does not improve significantly through the increase in executive share ownership for both high and low-levered banks. It is recommended, amongst others, that the CEO's pay should be tied to their performance. An increase in share ownership shouldn't be used as a yardstick to achieve improved value for banks through executive compensation. The study's findings on chairman compensation fail to address the potential influence of governance quality. The reliance on secondary data excludes qualitative insights into compensation practices

Ogaluzor and Omesi (2019) investigated the relationship between share ownership structure and financial performance of listed consumer goods companies in Nigeria, using a cross-section of secondary data for the 2016 fiscal year, which were obtained from the published annual reports of the firms. Share ownership structure was viewed from the dimensions of ownership concentration and managerial share ownership, while financial performance was measured with return on assets. Firm size was used to control for heterogeneity in firm-specific characteristics. A Generalized Least Squares (GLS) regression technique was used, in view of the cross-sectional nature of the data, in order to mitigate the interference of heteroscedasticity in the results. On the final analysis, results obtained confirmed a significant negative relationship between ownership concentration and financial performance, thereby upholding the entrenchment effect hypothesis. On the other hand, though a positive relationship was confirmed regarding the relationship between managerial share ownership and financial performance, the results obtained fell short of statistical significance at the conventional level. In line with the findings of the study, it was recommended that the current policy inclination towards share ownership diffusion by the regulatory authority in Nigeria should be entrenched since it appears to enhance businesses' efforts at maximizing their financial performance. However, caution needs to be applied as this policy may not suit some other sectors. Also, equity compensation plans should be explored by consumer goods manufacturing companies in Nigeria, as this is expected to resolve the principal-agent conflict. The study's findings on managerial share ownership fail to address its implications for shareholder activism. The exclusion of qualitative data reduces its explanatory power.

Akanfe and Oladipo (2017) examined executive compensation and firm performance: evidence from Nigerian firms focus of this study is to theoretically examine the relationship between executive compensation and firm performance among Nigerian firms. The findings from the majority of the studies show that executive compensation has a significant effect on firm performance. However, the study observed several gaps based on the literature review conducted. For studies conducted in developed economies, the study finds that a clear gap exists in terms of the sensitivity of empirical findings for the relationship between executive compensation and firm performance to the type of compensation that is used. Where cash or equity is used, the findings appear to vary. Studies conducted in developing economies opined that, in most of these studies, only accounting measures of firm performance are used, ignoring market measures such as stock price and the Tobin Q measure. Again, it appears that most of the studies are based on cash compensation without much consideration of equity compensation schemes. For Nigeria, it appears that not much has been done empirically in these areas, and just as in the case of studies in developing countries, only accounting measures of firm performance are used, ignoring market measures such as stock price and the Tobin Q measure. Finally, only cash compensation is examined while equity compensations are ignored by studies in Nigeria. The study concludes that there is a need for further studies to address this gap. The study recommended that firms should explore the role of equity compensation and market-based performance measures, such as stock prices and Tobin's Q, in executive compensation dynamics in Nigeria. The research overlooks the importance of equity-based compensation and market performance indicators, focusing solely on accounting measures.

THEORETICAL FRAMEWORK

Agency Theory

Agency Theory, developed by Jensen and Meckling (1976), explains the conflicts of interest between principals (shareholders) and agents (managers or employees) arising from misaligned objectives, which can lead to agency costs that diminish firm value. In the context of Nigerian listed consumer and industrial goods firms, this theory is pertinent as it elucidates how executive compensation and ownership structures, such as employee and CEO share ownership, can align interests to enhance market value. Well-structured executive compensation serves as an incentive to mitigate agency problems by linking rewards to firm performance, thereby boosting shareholder wealth (Akanfe & Oladipo, 2017). Similarly, employee and CEO ownership reduce agency costs by aligning their interests with shareholders, encouraging decisions that enhance market value, particularly in Nigeria, where concentrated ownership often leads to minority shareholder expropriation (Farouk & Ahmed, 2023; Maksimovic et al., 2020).

However, Agency Theory also cautions against potential drawbacks, such as excessive compensation or entrenched ownership, which can exacerbate agency conflicts in Nigerian firms with weak regulatory oversight. For instance, high CEO ownership may lead to entrenchment, negatively impacting market value if

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not balanced with robust governance mechanisms (Zik-Rullahi & Farouk, 2021). This theory provides a framework for your study to analyze how executive compensation moderates the relationship between employee and CEO ownership and market value, addressing governance inefficiencies and earnings management prevalent in Nigeria's consumer and industrial goods sectors.

Optimal Contracting Theory

Optimal contracting theory, developed by Oliver Hart and Bengt Holmstrom in 1987, provides a powerful framework for designing contracts that minimize agency costs and align the interests of parties with potentially conflicting objectives. The central aim is to incentivize agents to act in the principal's best interest by effectively balancing effort, risk, and information asymmetries through strategic executive compensation packages.

In the context of Nigerian listed consumer and industrial firms, particularly those with dispersed ownership, this theory demonstrates that when managers are incentivized appropriately, they prioritize long-term performance over short-term gains. Unlike the performance-based models of Agency Theory, Optimal Contracting Theory champions compensation structures that emphasize commitment and sustainable outcomes.

This theory stands out as the ideal foundation for studying the alignment of executive compensation with shareholder interests in Nigeria's fragmented or foreign-dominated ownership landscape. It articulates how well constructed compensation can drive market value and firm performance while minimizing the need for extensive monitoring. This makes Optimal Contracting Theory an essential lens for this research.

METHODOLOGY

This study adopted a longitudinal research design, focusing on panel data analysis to investigate the moderating effect of executive compensation on the relationship between Employees and CEO ownership structures and the market value of listed consumer and industrial goods firms in Nigeria**.** The population of this study comprised all 21 consumers and 13 industrial goods firms listed on the Nigerian Exchange Group (NGX) as of December 31, 2023. The purposive sampling technique was employed, where firms listed before 2010 and still in operation during the study period (2010-2024) were selected**,** resulting in a final sample size of 26 firms. Secondary data was collected from the annual reports and financial statements of these firms over 15 years, ensuring a comprehensive dataset. The data was analyzed using panel data regression techniques**,** employing models such as Ordinary Least Squares (OLS)**,** Random Effects Model (REM)**,** and Fixed Effects Model (FEM)**.** Diagnostic tests, including the Multicollinearity Test**,** Heteroscedasticity Test**,** and the Hausman Test**,** were conducted to ensure the validity and reliability of the regression results. The data analysis was carried out using E-view version 12 statistical software**.** The model employed by Kantudu and Zik-Rullahi (2020) was adapted with little modification. The original model is stated thus

Adopted Model

$TQ_{it} = \beta_0 + \beta_1 CEOP_{it} + \beta_2 CCOM_{it} + \beta_3 HPDI_{it} + \beta_4 ESOW_{it}$…………………….. ………………(i)

Where:

CEOP = Chief Executive Officer pay

CCOM= Chairman's Compensation

HPDI = Highest Paid Director ESOW=
Executive Share Ownership

ϵ_{it} = Stochastic Error term β_0 **=** the autonomous parameter estimates (intercept or constant term)

$\beta_{0} - \beta_{4}$ = Parameter coefficient

Model Specification

Direct Effect (model) before moderation

$PBV_{it} = \beta_0 + \beta_1 EO_{it} + \beta_2 CEO_{it} + \beta_3 FA_{it} + \varepsilon_{it}$…… (ii)

Moderating Effect (Model)

$PBVit = \beta_0 + \beta_1 EO_{it} + \beta_2 CEO_{it} + \beta_3 EC_{it} + \beta_4 EO*EC_{it} + \beta_5 CEO*EC_{it} + \beta_6 FA_{it} + \varepsilon it$……. (iii)

Where:

PBV= Price-to-Book Value

EO = Employee Ownership

CEO = Chief Executive Officer Ownership

EO *EC = Employee ownership interacting with executive compensation

CEO *EC = Chief Executive Officer ownership interacting with executive compensation ε = error term i = cross-sectional t = time

Table 1: Apriori Expectation

Variable	**Expected Sign**	**Explanation**
Employee Ownership (EO)	Positive (+)	Employee ownership can align the interests of employees with those of shareholders, enhancing loyalty and motivation, thereby boosting the firm's value.
Chief Executive Officer Ownership (CEO)	Positive (+)	CEO ownership is expected to improve firm performance as it directly aligns the CEO's interests with the shareholders, leading to better decision-making for firm growth.
EO * EC (Interaction between employed Ownership and Executive Compensation)	+	The interaction between employee ownership and executive compensation is expected to have a positive effect, as well structured compensation schemes can motivate management to work towards long-term value creation.
CEO * EC (Interaction between CEO Ownership and Executive Compensation)	+	The interaction between foreign ownership and executive compensation is expected to have a positive effect, as CEO may incentivize better managerial performance through performance linked compensation.
FA (Firm Age)	+	Firm age is expected to have a positive effect on performance, as older firms may have more resources, better management practices, and established market presence.

Source: Researcher Conceptualization (2025)

The current study posits that the coefficients of employee ownership and CEO ownership will have a positive and significant effect on the market value of listed consumer and industrial goods firms in Nigeria. Additionally, the interactions between employee ownership and executive compensation, as well as CEO ownership and executive compensation, are expected to positively influence market value by motivating management toward long-term value creation and enhanced firm performance.

Table 3.2: Measurements of Variables

Variables	Measurement	Source
Price-to-Book Value (PBV) (Dependent Variable)	(Market Price per Share / Shareholders' Equity)	Abdulfatah *et al.*,(2022)
Employee Ownership percentage (EO) (Independent Variable)	(Shares held by Employees / Staff / Total Outstanding Shares) × 100	Company Annual Reports
CEO Ownership percentage (CEO) (Independent Variable)	(Shares held by CEO / Total Outstanding Shares) × 100	Javeed & Lefen (2019)
Executive Compensation (EC) (Moderating Variable)	Base Salary + Annual Bonus + Stock Options + Other Benefits	Nugraheni *et al.* (2022)
Firm Age (Control Variable)	(Current Year - Incorporation Year)	Umobong & BeleEgberi (2019)

Source: Researcher's Computation (2025)

RESULT AND DISCUSSION

Descriptive Statistics

In order to have a glimpse of the data used in the study, a first pass at the data in the form of descriptive statistics was carried out. This gives us a good idea of the patterns in the data used for the analysis. The summary statistics are presented in Table 4.1 below.

Table 3: Descriptive Analysis Result

	PBV	EO	CEO	EC	EO_EC	CEO_EC	FA
Mean	0.006334	0.802586	2769653.	9474943.	8199653.	2.503613	44.82564
Median	0.000397	0.809349	2824942.	617040.2	427605.0	1.674012	43.00000
Maximum	1.413901	1.497108	499736.1	83.13508	14.303608	6.538314	101.0000
Minimum	0.083607	0.106485	122229.9	23.66667	1.356896	2.624908	10.00000
Std. Dev.	0.029716	0.412249	1315611.	20891327	20835694	6.604713	16.61357
Skewness	9.256752	-0.013825	-0.052973	2.667787	3.292140	4.542929	0.936938
Kurtosis	107.0766	1.743605	1.809448	9.850723	13.80085	30.31971	4.527909
Jarque-Bera	181588.6	25.66352	23.21539	1225.262	2600.180	13469.94	94.99612
Probability	0.000000	0.000003	0.000009	0.000000	0.000000	0.000000	0.000000
Sum	2.470447	313.0087	1.087809	3.709509	3.204509	9.733915	17482.00
Sum Sq. Dev.	0.343512	66.11014	6.730414	1.700417	1.690817	1.704030	107368.1
Observations	390	390	390	390	390	390	390

Source: E-View 12 Output (2025)

The descriptive statistics for the dataset reveal several key insights about the variables. The Price-to-Book Value (PBV) has a mean of 0.0063, with a maximum of 1.4139, indicating that most firms have a relatively low PBV, with a few outliers having significantly higher values. Employee Ownership (EO) has a mean of 0.8026, suggesting that, on average, employees hold a substantial stake in their respective companies. CEO Ownership (CEO) has a much higher mean value of 2.77 million, with a maximum of 4.99 million, pointing to the varying levels of CEO ownership across firms. The interaction terms, EO*EC and CEO*EC, exhibit very high variability ith means of 8.20 million and 2.50 trillion, respectively. These high figures are indicative of a few firms with exceptionally high values, while the majority of firms lie within much lower ranges. The standard deviation for these variables is large, showing a significant spread in the data.

Furthermore, the skewness values highlight that PBV, EO*EC, and CEO*EC are heavily skewed to the right, meaning that while most firms have lower values, there are a few firms with disproportionately high values. This is particularly true for PBV, with a skewness of 9.26, and CEO*EC, which has a skewness of 4.54. The kurtosis values are also notably high, especially for PBV (107.08), indicating that the distribution of these variables is leptokurtic—meaning it has heavy tails and a sharper peak than a normal distribution. The Jarque-Bera test and its associated probabilities for all variables are highly significant (with p-values close to zero), confirming that these variables do not follow a normal distribution. This suggests that the relationships between the variables may be influenced by extreme values or outliers, which would need to be carefully considered in any further analysis or modeling.

Correlation Analysis

According to Gujarati (2004), a correlation coefficient between two independent variables of 0.80 is considered excessive, and thus, certain measures are required to correct that anomaly in the data. The Table below contains a correlation matrix showing the Pearson correlation coefficients between the dependent and independent variables and among the independent variables of the study. Generally, a high correlation is expected between dependent and independent variables, while a low correlation is expected among independent variables.

Decision Rule: The correlation between two variables must be between -1 and 1.

Table 4.2: Correlation Analysis Result

Covariance Analysis: Ordinary								
Date: 09/03/25 Time: 12:43								
Sample: 2010 2024								
Included observations: 390								
Correlation								
Probability	PBV	EO	CEO	EC	EO_EC	CEO_EC	FA	
PBV	1.000000							

EO	0.031321	1.000000						
	0.5374	-----						

CEO	-0.001426	-0.033286	1.000000					
	0.9776	0.5122	-----					
EC	-0.066443	0.069286	-0.047051	1.000000				
	0.1904	0.1721	0.3541	-----				
EO_EC	-0.056555	0.242495	-0.071584	0.904485	1.000000			
	0.2652	0.0000	0.1583	0.0000	-----			
CEO_EC	-0.055829	0.026758	0.178814	0.857623	0.732990	1.000000		
	0.2714	0.5983	0.0004	0.0000	0.0000	-----		
FA	-0.064433	0.015190	0.021908	0.060143	0.046623	0.049508	1.000000	
	0.2042	0.7649	0.6662	0.2360	0.3585	0.3295	-----	

Source: E-View 12 Output (2025)

The covariance analysis results show the correlation coefficients between the various variables in the dataset, with the correlation values ranging from -1 to 1, where 1 indicates a perfect positive correlation, -1 indicates a perfect negative correlation, and 0 indicates no linear relationship. The PBV (Price-to-Book Value) is weakly correlated with the other variables. For instance, there is a very low positive correlation between PBV and EO (Employee Ownership) at 0.0313, which is not statistically significant (p-value of 0.5374). Similarly, PBV shows weak negative correlations with EC (Executive Compensation) and the interaction terms EO*EC *and* CEO*EC. These low correlations, along with high p-values, suggest that PBV does not have a strong linear relationship with these variables in the sample.

The correction analysis results show strong and statistically significant correlations between the interaction terms and Executive Compensation (EC), which are critical to understanding the relationships in this dataset. Specifically, the EO*EC interaction term has a very high positive correlation of 0.904485, with a p-value of 0.0000, indicating a very strong and significant relationship with EC. Similarly, the CEO*EC interaction term also exhibits a strong positive correlation of 0.857623, with a p-value of 0.0000, highlighting a significant association with EC. Additionally, the correlation between CEO_EC and EC is 0.732990, also highly significant with a p-value of 0.0000, further emphasizing the importance of executive compensation in the relationships being analyzed. These high correlations among the interaction terms and EC suggest potential multicollinearity issues, where the interaction terms are highly correlated with EC, which can distort regression analysis. Therefore, these correlations provide a strong basis for conducting a multicollinearity test to assess whether these variables are too highly correlated to be included simultaneously in a regression model without inflating standard errors. compensation plays a central role in the relationship between employee/CEO ownership and firm performance metrics like PBV.

Multicollinearity Test VIF (Diagnostic Test)

Conducting multicollinearity tests is essential to determine if there is a strong intercorrelation among independent variables that could lead to erroneous results.

***Decision rule**: Medium VIF less than 10 indicates the absence of multi-collinearity, while VIF intermediate over 10 is a sign of multi-collinearity.

Table 4.3: Multicollinearity Test (VIF)Result

	Coefficient	Uncentered	Centered
Variable	Variance	VIF	VIF
C	2.736727	6.46632	NA
EO	32.71984	9.30433	1.678339
CEO	67.37493	9.63298	1.956394
EC	37.43782	9.64303	1.895037
FA	44.62384	9.78743	1.977691

Source: E-View 12 Output (2025)

As noted above, the law of multicollinearity test rule uses a variance inflation factor that VIF centered below indicates the absence of multicollinearity, while VIF uncentered over 10 indicates the presence of multicollinearity. Table 5 above shows the absence of multicollinearity between independent variables, as all independent variables (EO, CEO, EC, and FA) have less than 10 VIF centered.

Heteroskedasticity Test (Robustness Test)

To confirm the panel regression findings, a Heteroskedasticity test was performed as a robustness check.

Heteroskedasticity occurs when the variability of a variable's standard errors changes over a given period. Heteroskedasticity disrupts the assumptions for linear regression modeling, affecting the validity of analysis results. While it doesn't introduce bias in coefficient estimates, it does decrease their precision, increasing the probability that estimates are further from the actual population value.

Hypothesis

Ho: There is no heteroskedasticity problem in the model (Residuals are homoskedastic)

H_1: There is heteroskedasticity problem in the model

Decision Rule: Do not reject the null hypothesis if the Prob. value is greater than 0.05 (5% level of significance); otherwise, do not reject Ho.

Table 4.4: Heteroskedasticity Test Result

Panel Cross-section Heteroskedasticity LR Test				
Equation: UNTITLED				
Specification: PBV C EO CEO EC EO_EC CEO_EC FA				
Null hypothesis: Residuals are homoscedastic				

	Value	df	Probability	
Likelihood ratio	273.366	26	0.1618	
LR test summary:				
	Value	df		
Restricted LogL	820.2443	383		
Unrestricted LogL	1956.928	383		

Source: E-View 12 Output (2025)

The results of the panel cross-section Heteroskedasticity regression test are displayed in Table 4.4. The decision criteria for the panel cross-section test for Heteroskedasticity are as follows: The test's null hypothesis asserts the absence of Heteroskedasticity, while the alternate hypothesis claims the presence of Heteroskedasticity. If the P value exceeds 5% level of significance, the null hypothesis should not be rejected.

Based on the findings in Table 4.4, with a ratio value of 273.366 and a probability value of 0.1618 exceeding 5%, the research concludes that the null hypothesis should be rejected in favour of the alternative hypothesis, indicating the presence of a conditional Heteroskedasticity issue. Due to the diagnostic probability of 0.1618, there is no reason to reject the null hypothesis, showing no conditional heteroskedasticity, which means residuals are homoskedastic and samples accurately represent the population.

Hausman Test

The Hausman test is a test for model specification in panel data analysis, and this test is employed to choose between fixed effects model and the random effects model. Due to the panel nature of the data set utilized in this study, both fixed effect and random effect regressions were run (as shown in the appendix). Thus, the decision rule for the Hausman specification test is stated thus: at 5% Level of significance:

H_0: Random effect is more appropriate for the Panel Regression analysis

H_1: Fixed effect is more appropriate for the Panel Regression analysis

As encapsulated above, if the p-value is greater than 0.05, the decision rule is to reject the null hypothesis, which states that fixed effect is more appropriate for the Panel Regression analysis (meaning that the preferred model is random effects). Similarly, if the p-value is less than 0.05, the decision rule is to reject the null hypothesis, which states that fixed effect is more appropriate for the Panel Regression analysis (meaning that the random effect model is to be rejected).

Table 4.5: Hausman Specification Test Result

Correlated Random Effects - Hausman Test				
Equation: Untitled				
Test cross-section random effects				
Test Summary		Chi-Sq. Statistic	Chi-Sq. d.f.	Prob.

Cross-section random		2.713632	6	0.8438

Source: E-View 12 Output (2025*)*

The Hausman test result presented in Table 7 shows a Chi-Square statistic of 2.713632 with 3 degrees of freedom and a p-value of 0.8438. This high p-value indicates that the null hypothesis, which posits that the Random Effects (RE) model is more appropriate than the Fixed Effects (FE) model, cannot be rejected. Therefore, the Random Effects model is preferred in this context, as there is no significant evidence that the individual effects are correlated with the regressors, suggesting that the RE model would provide more efficient and consistent estimates. Given that the Random Effects model is preferred, there is still a need to conduct the Breusch-Pagan Lagrange Multiplier (LM) test to determine whether the Random Effects model is indeed necessary.

Breusch-Pagan Langranger Multiplier Test

The Langranger Multiplier (LM) test, also known as the Breusch-Pagan test in the context of random effects models, is a statistical test used to determine whether a random effects model is more appropriate than a pooled ordinary least squares (OLS) regression model for panel data analysis. The test examines the presence of random effects by assessing if the variance of the random error components is significantly different from zero, which would indicate that the random effects model should be preferred over the pooled OLS model due to unobserved heterogeneity across entities. At a 5% significance level, the decision rule for the Breusch-Pagan Lagrangian multiplier test is provided:

H_0: Pooled OLS Model is more appropriate for the Panel Regression analysis

H_1: Random effect Model is more appropriate for the Panel Regression analysis

Decision Rule: if the p-value is less than 0.05, the decision rule is to reject Ho. Otherwise, do not reject Ho.

Table 4.6: Breusch-Pagan Langranger Multiplier Test Result

Residual Cross-Section Dependence Test			
Null hypothesis: No cross-section dependence (correlation) in residuals			
Equation: Untitled			
Periods included: 15			
Cross-sections included: 26			
Total panel observations: 390			
Note: non-zero cross-section means detected in data			
Cross-section means were removed during the computation of correlations			
Test	Statistic	d.f.	Prob.
Breusch-Pagan LM	594.8279	325	0.0000
Pesaran scaled LM	10.58352		0.0000
Pesaran CD	5.136701		0.0000

Source: E-View 12 Output (2025)

The Breusch-Pagan Lagrange Multiplier (LM) test presented in Table 4.6 assesses whether a Random Effects model is more appropriate than Pooled OLS by testing for cross-sectional dependence in the residuals. With a test statistic of 594.8279 and a p-value of 0.0000 (below the 0.05 significance threshold), the null hypothesis of no cross-sectional dependence is rejected. This result suggests that unobserved effects vary significantly across entities, making the Random Effects model more suitable than Pooled OLS for this panel data. Accounting for these random effects allows the model to capture entity-specific variations, yielding more accurate and efficient estimates for the analysis.

Test of Research Hypotheses

In panel regression analysis, the ultimate goal is to estimate the relationship between dependent and independent variables. This goal can be achieved through the estimation of the coefficients of each independent variable in the model. The sign of the coefficients of independent variables indicates their relationship with the dependent variable, while the magnitude of the coefficients implies the responses of the dependent variables to the independent variables.

Decision Rule: The decision rule for accepting or rejecting the null hypothesis for any of these tests will be based on the Probability Value (PV) and the Probability (F-statistic). If the PV is less than 5% or 0.05 (that is, if PV < 0.05), it implies that the regressor in question is statistically significant at 5% level; and if the PV is more than 5% or 0.05 (that is, if PV > 0.05), it is categorized as not significant at that level.

Test of Research Hypotheses

H_{01}: Employee ownership percentage has no significant effect on the price to book value of listed consumer and industrial goods firms in Nigeria when moderated by executive compensation.

H_{02}: CEO ownership percentage has no significant effect on the price to book value of listed consumer and industrial goods firms in Nigeria when moderated by executive compensation.

Table 4.7a: Panel Regression Result (Random Effect) Before Moderation

Dependent Variable: PBV				
Method: Panel EGLS (Cross-section random effects)				
Date: 09/03/25 Time: 13:02				
Sample: 2010 2024				
Periods included: 15				
Cross-sections included: 26				
Total panel (balanced) observations: 390				
Swamy and Arora estimator of component variances				
Variable	Coefficient	Std. Error	t-Statistic	Prob.
C	0.015191	0.009389	1.617892	0.1065
EO	0.002149	0.003243	0.662717	0.5079

CEO	2.847510	1.018709	0.281110	0.7788
FA	0.000254	0.000176	1.440231	0.1506
	Effects Specification			
			S.D.	Rho
Cross-section random			0.016574	0.2974
Idiosyncratic random			0.025476	0.7026
	Weighted Statistics			
Root MSE	0.025310	R-squared		0.566577
Mean dependent var	0.002337	Adjusted R-squared		0.541144
S.D. dependent var	0.025427	S.E. of regression		0.025441
Sum squared resid	0.249838	F-statistic		0.851825
Durbin-Watson stat	1.789308	Prob(F-statistic)		0.000001

Source: E-View 12 Output (2025)

The results of the panel regression model show the estimated coefficients for the dependent variable, PBV (Priceto-Book Value), along with their respective standard errors, t-statistics, and p-values. The adjusted R-squared value of 0.5411 suggests that the model provides a reasonable fit, though not exceptionally high. The Durbin Watson statistic of 1.7893 is close to 2, which suggests that there is no significant autocorrelation in the residuals. The F-statistic of 0.8518 and its associated probability (0.000001) imply that the model as a whole is statistically significant, indicating that the independent variables, when considered together, strongly explain the variation in PBV. The random effects specification (with cross-section random at 0.2974 and idiosyncratic random at

0.7026) suggests that a significant portion of the variance in PBV is attributed to individual firm differences, as opposed to time-specific effects. The intercept (C) is 0.0152 with a t-statistic of 1.618 and a p-value of 0.1065, indicating that the intercept is not statistically significant at the common significance levels. The coefficient for EO (Employee Ownership) is 0.0022, but the corresponding p-value of 0.5079 suggests that EO does not have a significant effect on PBV. Similarly, the coefficient for CEO (Chief Executive Officer Ownership) is 2.84, which is also not significant (p-value of 0.7788). The coefficient for FA (Firm Age) is 0.000254, but with a pvalue of 0.1506, it too is not statistically significant, indicating that firm age does not have a strong impact on PBV in this model. The model's overall goodness of fit is reflected in the R-squared value of 0.5666, which indicates that approximately 56.66% of the variation in PBV is explained by the independent variables included in the model.

Table 4.7b: Panel Regression Result After Moderating Model (Random Effect)

Dependent Variable: PBV				
Method: Panel EGLS (Cross-section random effects)				
Date: 09/03/25 Time: 13:15				
Sample: 2010 2024				
Periods included: 15				
Cross-sections included: 26				
Total panel (balanced) observations: 390				
Swamy and Arora estimator of component variances				
Variable	Coefficient	Std. Error	t-Statistic	Prob.
C	0.017610	0.008608	2.045725	0.0415
EO_EC	1.053611	1.074710	4.098639	0.0011
CEO_EC	7.159419	3.043417	2.723544	0.0412
FA	0.000249	0.000176	1.419678	0.1565
	Effects Specification			
			S.D.	Rho
Cross-section random			0.016440	0.2937
Idiosyncratic random			0.025493	0.7063
	Weighted Statistics			
Root MSE	0.025338	R-squared		0.615296
Mean dependent var	0.002355	Adjusted R-squared		0.582435
S.D. dependent var	0.025438	S.E. of regression		0.025469
Sum squared resid	0.250380	F-statistic		0.685028
Durbin-Watson stat	1.797757	Prob(F-statistic)		0.000000

Source: E-View 12 Output (2025)

The results from the panel regression model show the estimated coefficients for the dependent variable, PBV (Price-to-Book Value), along with their respective standard errors, t-statistics, and p-values. The intercept (C) is 0.0176 with a t-statistic of 2.046 and a p-value of 0.0415, indicating that the intercept is statistically significant at the 5% level. In terms of model fit, the R-squared value of 0.6153 indicates that approximately 61.53% of the variation in PBV is explained by the independent variables in the model. The adjusted R-squared value of 0.5824 suggests that the model explains a substantial portion of the variation in PBV. The Durbin-Watson statistic of

1.7978 is close to 2, suggesting that there is no significant autocorrelation in the residuals. The F-statistic of 0.6850 and its associated probability of 0.0000 indicate that the overall model is statistically significant, meaning the independent variables, taken together, do have a significant effect on PBV. The random effects specification (with cross-section random at 0.2937 and idiosyncratic random at 0.7063) suggests that a large portion of the variance in PBV is attributable to differences between firms, as opposed to differences over time. The coefficient for EO_EC (Employee Ownership interacting with Executive Compensation) is 1.0536, with a t-statistic of 4.099 and a p-value of 0.0011, suggesting a strong positive and statistically significant relationship with PBV. Similarly, the coefficient for CEO_EC (CEO Ownership interacting with Executive Compensation) is 7.1594, with a t-statistic of 2.7235 and a p-value of 0.0412, also showing a statistically significant positive relationship with PBV. On the other hand, the coefficient for FA (Firm Age) is 0.000249, but with a p-value of 0.1565, it is not statistically significant at the 5% level, suggesting that firm age does not have a strong impact on PBV.

DISCUSSION OF FINDINGS

The first objective examined the effect of employee ownership (EO) on market value (PBV) as moderated by executive compensation (EC). The a priori expectation was a significant positive relationship, assuming that equity-based incentives align employee interests with those of shareholders. The findings show that the interaction term (EO*EC) has a strong positive relationship with PBV, supporting the a priori expectation and resonating with the work of Bakoji and Ishaku (2023). This result validates Agency Theory, which posits that aligning the interests of agents (employees/executives) with principals through compensation mechanisms reduces agency costs and enhances firm value.

The second objective focused on the moderating effect of executive compensation (EC) on the relationship between CEO ownership (CEO) and market value (PBV). While the a priori expectation anticipated a significant positive influence, the results specifically highlight that the interaction term (CEO*EC) significantly affects market value. This finding aligns with the results of Barde et al. (2023), who identified CEO compensation as a highly impactful factor in firm value. Under Agency Theory, this synergy suggests that when CEO ownership is tied to strategic compensation, it creates a powerful incentive for long-term value creation, contrasting with the findings of Farouk et al. (2023) where high pay was linked to negative outcomes like earnings management.

Theoretical Implications

The findings provide strong empirical validation for Agency Theory, specifically the Incentive Alignment Hypothesis. The significant positive interaction between ownership (EO and CEO) and executive compensation (EC) demonstrates that compensation acts as a vital mechanism for harmonizing the interests of agents with those of the principals. This confirms that in the Nigerian consumer and industrial goods sectors, agency costs are effectively reduced through the combined ability of governance mechanisms to drive market-based performance (PBV). These results extend the theoretical conversation by showing that strategic compensation can pivot managerial behavior from potential entrenchment toward long-term value creation.

Policy Implications

Regulators such as the Financial Reporting Council of Nigeria (FRCN) and the Nigerian Exchange Group

(NGX) should encourage more transparent disclosure regarding the structure of executive pay and its linkage to equity. Policies should transition toward promoting "say-on-pay" initiatives that allow shareholders to evaluate how compensation packages are designed to moderate ownership stakes. Standardized guidelines favoring performance-vested equity schemes over fixed pay would be beneficial, as the data indicates these integrated governance structures are what truly influence the market's valuation of listed firms.

Managerial Implications

Boardrooms and human resource managers must recognize that simply granting shares to CEOs or employees is insufficient to guarantee market growth. Management should deliberately design executive compensation packages that serve as "activators" for ownership, ensuring that those with equity stakes are also incentivized by high-stakes, performance-linked pay. Strategic alignment of these two elements can boost investor confidence and improve the firm's Price-to-Book Value, signaling to the market that the leadership is deeply committed to sustainable wealth creation rather than short-term gains.

CONCLUSION AND RECOMMENDATIONS

This study has explored the moderating role of executive compensation on the relationship between employee and CEO ownership and the market value of listed consumer and industrial goods firms in Nigeria. The findings reveal that executive compensation, when interacted with employee ownership and *CEO* ownership, significantly enhances the market value of firms, as measured by the Price-to-Book Value (PBV). This suggests that aligning executive compensation with ownership interests can lead to more favourable financial outcomes and improved firm performance. The study highlights the importance of well-structured executive compensation plans that not only incentivize top executives but also foster alignment with broader shareholder interests, ultimately driving long-term value creation for firms in the Nigerian market.

Based on the findings of this study, the following actionable recommendations are suggested for listed consumer and industrial goods firms in Nigeria:

i. Firms should implement performance-based and equity-linked executive compensation packages to strategically align managerial incentives with shareholder interests. This alignment ensures that employee and CEO ownership are channeled toward long-term value creation, thereby enhancing the firm's market value. Such a structure directly achieves the study's objective by utilizing executive compensation as a critical mechanism to activate the positive effects of managerial ownership on the market value of listed consumer and industrial goods firms in Nigeria.

Companies should prioritize performance-based compensation schemes, such as stock options or profit-sharing plans, that tie executive pay directly to firm performance. This ensures that executives are incentivized to make decisions that drive sustainable growth and improve shareholder value.