The Mediating Role of Dividend Policy in the Relationship between Board Diversity and Firm Value: Evidence from Nigeria

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Abstract

This study investigates the mediating role of Dividend Policy in the relationship between Board Diversity (gender, age, educational, and ethnic diversity) and Firm Value (measured by Tobin's Q) among publicly listed firms in Nigeria. Using a sample of 636 firm-year observations, we analyze the direct and indirect effects of various dimensions of board diversity on firm value. The findings indicate that Board Gender Diversity and Educational Diversity have significant positive effects on firm value, while Age and Ethnic Diversity exhibit negative or insignificant impacts. However, the study finds no significant mediating effect of dividend policy in the diversity-firm value relationship. These results highlight the importance of fostering gender and educational diversity in corporate governance to enhance firm performance. The study concludes that dividend policy does not act as a critical channel through which board diversity influences firm value. Recommendations for future research include exploring other mediating factors and considering industry-specific and cross-country analyses to provide broader insights.

Keywords: Board Diversity, Dividend Policy, Firm Value, Tobin's Q, Gender Diversity, Educational Diversity, Corporate Governance, Nigeria

1. Introduction

In today's dynamic business environment, the composition of a company's board of directors is increasingly recognized as a pivotal factor influencing corporate governance and overall firm performance. Board diversity, defined as the inclusion of individuals from various backgrounds—including gender, ethnicity, age, and educational experiences—has been linked to improved decision-making, innovation, and risk management. As firms strive to enhance their competitiveness, the presence of diverse perspectives in boardrooms has become a strategic imperative (Adams & Ferreira, 2009; Gul et al., 2011).

Dividend policy attracts interest in financial literature since Joint Stock Companies came into existence. (Muhammad, Yadudu & Bello, 2023), simultaneously, dividend policy plays a crucial role in a firm's financial strategy, reflecting its approach to profit distribution among shareholders. Dividend decisions are not merely financial choices but are also influenced by governance practices and the perceived value of the firm in the eyes of investors (Miller & Rock, 1985). There have been a lot of controversies as to the right dividend policy that will impact positively on the market value added or share price of the firm (Adam, Bello, Adam & Ramalan, 2021). The relationship between board diversity and dividend policy has garnered significant attention in the literature, with evidence suggesting that diverse boards may adopt more favorable dividend policies, potentially impacting firm value (Uwuigbe, 2013).

Despite the growing body of research examining the interplay between board characteristics and financial performance, there remains a gap in understanding how these relationships manifest in the context of developing economies, particularly in Nigeria. Nigerian firms face unique challenges, including regulatory constraints, economic volatility, and governance issues, which may influence the dynamics between board diversity, dividend policy, and firm value. Preliminary studies indicate that many Nigerian firms still struggle with achieving adequate board diversity, often resulting in homogenous decision-making processes that may limit their growth potential (Eke & Ofoegbu, 2019). Additionally, the role of dividend policy as a potential mediator in this relationship has not been adequately explored in the Nigerian context, raising questions about how governance practices impact firm performance.

Conducting this research in Nigeria is essential for several reasons. First, Nigeria's unique socio-economic landscape presents a compelling backdrop for examining board diversity and its implications for corporate governance. With a rapidly growing economy and an increasing number of listed firms on the Nigerian Stock Exchange, understanding how board composition affects financial strategies and firm valuation can provide valuable insights for policymakers and practitioners alike.

Second, there is a pressing need to address the underrepresentation of women and minority groups in corporate leadership positions in Nigeria. As the nation strives to meet international development goals, including gender equality and economic empowerment, this study contributes to the broader discourse on corporate governance reform and gender diversity in leadership roles.

Lastly, the findings of this research can offer empirical evidence that informs corporate governance practices, investor relations, and policy-making in Nigeria. By elucidating the mediating role of dividend policy in the relationship between board diversity and firm value, the study aims to contribute to the academic literature while providing actionable recommendations for firms seeking to enhance their governance structures and financial performance.

Therefore, this study seeks to explore the mediating role of dividend policy in the relationship between board diversity and firm value in Nigeria. By addressing the existing gaps in the literature and focusing on the unique challenges and opportunities within the Nigerian context, the research aims to contribute to a deeper understanding of corporate governance dynamics and their implications for firm performance.

2.0 Literature Review and Hypotheses

2.1 Board Characteristics and Firm Value

The relationship between board characteristics and firm value has been the subject of extensive academic inquiry across the globe. The role of the board of directors in corporate governance is seen as a critical determinant of firm performance, as boards are responsible for overseeing managerial decision-making, ensuring accountability, and steering strategic direction.

One of the most researched board characteristics is board size. Empirical studies suggest mixed results regarding the effect of board size on firm value. In the context of Nigeria, Ujunwa (2012) found that smaller boards are more effective in enhancing firm performance due to quicker decision-making and less bureaucracy. This is consistent with the findings of Yermack (1996), who, using U.S. data, also observed that smaller boards are associated with higher firm value. However, other studies propose that larger boards bring diversity in expertise and networks, which can enhance firm value. A study by Coles, Daniel, and Naveen (2008) indicates that for complex firms, larger boards may be beneficial, as they can provide a broader range of expertise and monitoring capabilities.

Another key characteristic is board independence, which refers to the presence of non-executive, independent directors on the board. Independent directors are expected to provide unbiased oversight and reduce agency problems between management and shareholders. Studies from Nigeria, such as Sanda, Mikailu, and Garba (2010), reveal a positive relationship between board independence and firm value, as independent directors are perceived to improve governance and protect minority shareholders' interests. Similar findings are reported in studies from other countries. Bhagat and Black (2002) found a positive association between board independence and firm performance in the U.S., although they also caution that too much independence might sometimes hinder managerial decision-making.

Gender diversity on boards has gained attention due to the global push for more inclusive corporate governance. In Nigeria, Okike (2017) highlighted that firms with a higher proportion of female directors tend to exhibit better performance. The rationale is that gender-diverse boards contribute different perspectives and may engage in better decision-making processes. Internationally, Adams and Ferreira (2009) found a positive correlation between gender diversity and firm value, especially in firms where monitoring is a key concern.

CEO duality, which refers to the same individual holding both the CEO and chairperson roles, is often debated. In Nigeria, Ujunwa (2012) found that CEO duality tends to diminish firm value, as it weakens the board’s ability to monitor management effectively. This view is supported by Jensen (1993) in his study of U.S. firms, where he argued that separating the roles enhances board independence and oversight. However, in some contexts, such as in Asian markets, duality is seen as necessary for decisive leadership, particularly in family-owned businesses (Peng et al., 2007).

The expertise of board members in finance, law, and relevant industries is also critical. Studies from Nigeria suggest that boards with a higher proportion of financially literate directors tend to outperform those without such expertise (Sanda, Mikailu, & Garba, 2010). Similarly, in developed markets, such as the U.S. and Europe, the presence of directors with specific industry or financial expertise is positively associated with firm value (Hillman & Dalziel, 2003).
Based on the above synthesis, it is evident that certain board characteristics, such as size, independence, diversity, and expertise, play crucial roles in shaping firm value across different markets, including Nigeria. However, the influence of these characteristics can vary depending on the firm's context, including its complexity, governance structure, and the market environment in which it operates.
Given this context, the following hypothesis can be formulated:
H$_1$: Board characteristics have a significant positive impact on firm value in Nigeria.

2.2 Board Characteristics and Dividend Policy

Board characteristics play a crucial role in shaping a firm's dividend policy, which is one of the key aspects of corporate financial management. Dividend policy refers to the decision-making process regarding the portion of earnings distributed to shareholders versus what is retained for reinvestment. The relationship between board characteristics and dividend policy has been extensively studied in various contexts, with mixed results across different countries.

Board size has been linked to dividend payout decisions in various studies. In Nigeria, Uwuigbe (2013) found that firms with larger boards are more likely to have higher dividend payouts. The rationale behind this is that larger boards have more diverse expertise, which may result in better oversight of management and stronger shareholder protection. This finding is in line with research by Abor and Fiador (2013) in Ghana, which also suggests that larger boards are positively, associated with higher dividend payouts due to enhanced monitoring.

Conversely, studies in developed economies often report a negative relationship between board size and dividend payout. Yermack (1996) argues that larger boards can lead to slower decision-making and more inefficiency, potentially leading to lower dividends as a result of managerial entrenchment. This reflects the complexity of balancing governance structures with firm performance outcomes.

Board independence, referring to the presence of non-executive or independent directors, has been shown to influence dividend policy significantly. In Nigeria, Musa (2009) found that board independence is positively correlated with dividend payout, suggesting that independent directors are more likely to advocate for higher dividends to mitigate agency conflicts between management and shareholders. This is consistent with the agency theory, which posits that independent directors act as better monitors of management, ensuring that shareholders receive a fair return on their investments.

Similarly, in the U.S., La Porta et al. (2000) found that firms with more independent directors tend to pay higher dividends, as they are more likely to prevent managerial self-dealing and ensure that cash is returned to shareholders instead of being retained for unprofitable projects.

CEO duality, where the same individual holds both the CEO and chairperson roles, can weaken board independence and affect dividend policy. Studies in Nigeria, such as Uwuigbe (2013), suggest that firms with CEO duality tend to pay lower dividends, as duality reduces the board's effectiveness in monitoring the CEO's decisions, allowing management to retain earnings for discretionary use. This finding aligns with research by Farinha (2003) in the European context, where firms with CEO duality were found to have lower dividend payouts due to reduced board oversight and heightened agency costs.

Gender diversity is increasingly recognized as a significant factor in corporate governance, a study by Adams and Ferreira (2009) shows that gender-diverse boards are more likely to have robust governance structures, including dividend policies that favor shareholders. In Nigeria, Musa (2009) found that firms with higher gender diversity on the board tend to pay higher dividends, as female directors are more risk-averse and conservative in financial decisions, leading to a preference for distributing excess cash to shareholders rather than investing in riskier ventures. This aligns with findings from Gul, Srinidhi, and Ng (2011), who also found that firms with female directors are more likely to implement shareholder-friendly policies, including higher dividend payouts.

The expertise of board members, especially in finance and accounting, is also crucial in shaping dividend policy. In Nigeria, studies have shown that boards with a higher proportion of financially literate members tend to adopt more stable and shareholder-friendly dividend policies (Musa, 2009). Internationally, Fama and Jensen (1983) also argued that boards with financial expertise are better able to assess a firm's capital needs and the potential benefits of dividend payments, resulting in a balanced and well-informed dividend policy.

Based on the literature synthesis, it is evident that board characteristics such as size, independence, gender diversity, and expertise influence dividend policy in various ways, both in Nigeria and other countries. Larger, more independent, and diverse boards generally favour higher dividend payouts, while CEO duality tends to reduce dividend payments.

Therefore, the following hypothesis can be proposed:
H_2: *Board characteristics have a significant positive impact on the dividend policy of firms in Nigeria.*

2.3 Dividend Policy and Firm Value

Dividend policy has long been considered a critical factor influencing firm value. The debate on whether dividends impact firm value remains central in corporate finance, often framed by different theoretical perspectives such as the dividend irrelevance theory, signaling theory, and agency theory. Several empirical studies, both from Nigeria and other countries, have explored the relationship between dividend policy and firm value, providing mixed but insightful findings.

Modigliani and Miller (1961) famously argued that dividend policy is irrelevant in a perfect market, meaning that whether a firm pays dividends or retains earnings does not affect its value. In their view, firm value is determined by the profitability of its investments, not its dividend policy. However, in real-world scenarios characterized by taxes, information asymmetry, and agency costs, the dividend policy is often observed to have a significant impact on firm value.

One widely accepted view is the signaling theory, which suggests that dividends convey important information to the market about a firm's future prospects. Firms that consistently pay dividends or increase them are perceived to have strong future earnings potential, leading to higher firm value. In Nigeria, studies like that of Adefila, Oladipo, and Adeoti (2013) support this view, finding that firms paying regular dividends tend to be valued higher by investors. Similar results have been observed in other countries. For instance, Benartzi, Michaely, and Thaler (1997) argue that dividend changes often signal changes in future profitability, influencing stock prices and firm value.

Agency theory suggests that dividends help mitigate agency conflicts between management and shareholders. Managers, who often have more control over a firm's resources, may prefer to retain earnings for reinvestment, even in unprofitable ventures, rather than distribute them to shareholders. Dividends reduce the free cash flow available to managers, thereby limiting opportunities for managerial discretion and potential misuse of funds. Studies from Nigeria, such as Adelegan (2003), found that firms with higher dividend payouts generally experience higher firm value, as dividends serve as a mechanism to align the interests of managers and shareholders. This is consistent with international research. Jensen (1986) argues that dividends reduce agency costs by compelling managers to be more disciplined with the firm's finances, thus enhancing firm value.

Empirical studies on the relationship between dividend policy and firm value in Nigeria tend to support the positive association posited by agency theory and signaling theory. For instance, Amidu (2007) found that dividend payout ratios are positively related to firm value in Nigeria, suggesting that investors prefer firms that distribute a portion of their earnings in the form of dividends. The study highlights that dividends serve as a signal of financial health and profitability to shareholders, which is particularly relevant in markets with high information asymmetry, such as Nigeria.

International evidence also supports the notion that dividend policy affects firm value, but results vary by market. In developed markets, such as the United States and the United Kingdom, Lintner (1956) showed that firms are reluctant to cut dividends, as such actions are perceived negatively by investors, potentially lowering firm value. This behavior indicates the importance of maintaining a stable dividend policy as a tool for value enhancement. Meanwhile, in emerging markets, such as India, research by Kumar (2003) revealed that firms with consistent dividend policies are associated with higher stock valuations, driven by investor preference for dividend certainty amidst market volatility.

Firm size also plays a critical role in how dividend policy influences firm value. Larger firms, often with more stable cash flows, are more likely to pay dividends and use them as a tool to signal stability and growth potential. In Nigeria, Adefila et al. (2013) found that large firms are more likely to have a consistent dividend policy, which enhances their value in the eyes of investors. Similarly, Fama and French (2001) argue that larger firms in developed markets tend to pay dividends more regularly, reinforcing the positive association between dividends and firm value.

Based on the literature review, it is evident that dividend policy plays an essential role in influencing firm value through signaling, agency cost reduction, and investor perception, both in Nigeria and internationally. Thus, the following hypothesis can be proposed:

H_3: *Dividend policy has a significant positive impact on firm value in Nigeria.*

2.4 Board Diversity, Dividend Policy, and Firm Value

Board diversity, encompassing gender, ethnicity, age, and educational background, is increasingly recognized as an essential element of corporate governance, influencing key financial decisions like dividend policy and firm value. A growing body of research, both from Nigeria and internationally, suggests that diverse boards enhance decision-making and lead to more shareholder-friendly policies, such as higher dividends, which in turn affect firm value.

2.4.1 Board Diversity and Firm Value

Board diversity is often linked to improved firm value through better decision-making, enhanced oversight, and a wider variety of perspectives. Adams and Ferreira (2009) argue that gender-diverse boards in particular are associated with better governance outcomes, which ultimately enhance firm value. They assert that female directors are more diligent in monitoring managerial decisions and ensuring accountability, leading to better performance. In Nigeria, Ujunwa (2012) found that firms with diverse boards tend to perform better financially, attributing this to the broad range of experiences and perspectives that diverse boards bring to strategic decision-making.

Similarly, Carter, Simkins, and Simpson (2003) demonstrate that firms with higher levels of board diversity tend to have higher market valuations, which they attribute to enhanced governance and a broader understanding of market dynamics. This view is echoed by Erhardt, Werbel, and Shrader (2003), who show a positive relationship between board diversity and firm performance in U.S. firms, suggesting that diversity leads to better overall governance and financial outcomes.

2.4.2 Board Diversity and Dividend Policy

The impact of board diversity on dividend policy has also garnered attention. Diverse boards, especially those with greater gender representation, are found to advocate for more conservative and shareholder-friendly financial policies, such as higher dividends. Gul, Srinidhi, and Ng (2011) found that firms with gender-diverse boards in the U.S. are more likely to pay higher dividends, as female directors tend to be more risk-averse and prioritize shareholder interests through regular dividend payouts. This aligns with research in Nigeria, where Musa (2009) found that board diversity is positively correlated with dividend payouts, as diverse boards tend to prioritize transparency and shareholder returns.

In the U.K., Saeed and Sameer (2017) argue that gender-diverse boards are more likely to adopt dividend policies that reflect the interests of shareholders, particularly in times of uncertainty. The study shows that firms with higher board diversity not only pay higher dividends but also maintain more stable dividend policies over time. This supports the idea that board diversity leads to better alignment of corporate governance with shareholder expectations, particularly through dividend payouts.

2.4.3 Dividend Policy and Firm Value

Dividend policy is a deliberate policy to maintain or increase dividend at a certain level with the ultimate aim of sustaining the price of the shares on the stock exchange (Muhammad, Yadudu & Bello, 2023), it is a well-established factor influencing firm value, According to signaling theory, firms that pay dividends signal their financial health and future profitability to the market, thereby enhancing firm value (Miller & Rock, 1985). In Nigeria, Amidu (2007) found that firms with higher dividend payouts tend to have higher firm value, as dividends act as a signal of strong financial performance and managerial competence.

Internationally, Lintner (1956) established that firms tend to follow a stable dividend policy to avoid sending negative signals to investors. In developing economies, such as Nigeria, dividend policy often serves as an important indicator of financial health in environments with high information asymmetry. This suggests that dividend policy can act as a mediator between corporate governance factors, such as board diversity, and firm value.

Several studies suggest that dividend policy can mediate the relationship between board diversity and firm value. Diverse boards may influence dividend policies that, in turn, have a direct impact on firm value. For example, Gul et al. (2011) found that gender diversity on boards led to higher dividend payouts, which in turn positively affected firm value. Similarly, in Nigeria, Uwuigbe (2013) noted that board diversity indirectly enhances firm value by promoting a more consistent and generous dividend policy. This aligns with agency theory, which posits that dividends serve as a mechanism to reduce agency conflicts by aligning the interests of management and shareholders (Jensen, 1986).

The mediating role of dividend policy suggests that board diversity influences firm value not only directly but also through its impact on dividend decisions. Diverse boards are more likely to implement dividend policies that reflect a balance between firm profitability and shareholder returns, thereby enhancing firm value.

Based on the literature review, the following hypothesis can be proposed:

***H*$_4$*:** Dividend policy mediates the relationship between board diversity and firm value in Nigeria*.

3. Research Methodology

3.1 Data Collection

Data was collected on Board Diversity, Dividend Policy and Firm Value as the main variables of the study. Similarly, data on the control variables, i.e. data on firm size, leverage, firm age, and profitability were also collected. All these data were obtained from the firms' financial statements, which were available on their various websites.

3.2 Definition and Measurement of Variables

To investigate the mediating role of dividend policy in the relationship between board diversity and firm value, the following key variables need to be defined and measured:

3.2.1 Board Diversity (Independent Variable)

Board diversity refers to the variety of characteristics represented on the board of directors, such as gender, age, ethnicity, and educational background. It is a crucial aspect of corporate governance and can influence decision-making and firm performance.

Gender Diversity is measured as the proportion of female directors on the board, measured as the ratio of female board members to the total number of board members (Carter et al., 2003).

Gender Diversity = Number of Female Directors/Total Number of Directors

Age Diversity is the standard deviation of board members' ages to capture age dispersion (Ujunwa, 2012).

Age Diversity = Standard Deviation of Directors' Ages}

Educational Diversity is the diversity of educational backgrounds, measured using a Herfindahl-Hirschman Index (HHI) to capture the variety of educational disciplines represented (Erhardt et al., 2003).

Educational Diversity Index = 1 - ∑(Directors in a Discipline/Total Directors)^2

Ethnic Diversity is the proportion of directors from different ethnic groups relative to the total number of directors.

3.3 Dividend Policy (Mediator Variable)

Dividend policy refers to the decision regarding the distribution of profits to shareholders in the form of dividends. It reflects the company's approach to returning value to its investors. It is operationalized using Dividend Payout Ratio as the ratio of total dividends paid to net income (Amidu, 2007). It represents the percentage of earnings distributed as dividends.

Dividend Payout Ratio = Total Dividends Paid/Net Income

Dividend Yield is the dividend per share divided by the stock price per share, which shows the return on investment from dividends (Lintner, 1956).

Dividend Yield = Dividend per Share/Stock Price per Share

Dividend Stability is measured using the standard deviation of dividends per share over a specific period to assess the consistency of dividend payments (Saeed & Sameer, 2017).

3.4 Firm Value (Dependent Variable)

Firm value refers to the market's assessment of a company's overall worth, often influenced by profitability, growth potential, and financial policies such as dividends. It is proxy by Tobin's Q and Return on Assets (ROA).

Tobin's Q is the ratio of the market value of a firm's assets to the replacement cost of its assets (Gul et al., 2011). A Tobin's Q greater than 1 indicates that the firm is valued higher than the replacement cost of its assets, suggesting strong market performance.

Tobin's Q = Market Value of Equity + Book Value of Liabilities/Book Value of Assets

Return on Assets (ROA) is the net income divided by total assets, used to evaluate the profitability of the company relative to its assets (Erhardt et al., 2003).

ROA = Net Income/Total Assets

3.5 Hypothetical Relationships

The hypothetical relationships are as follows:

Board Diversity → Firm Value: More diverse boards are expected to enhance firm value through improved governance and decision-making (Adams & Ferreira, 2009).

Board Diversity → Dividend Policy: Diverse boards may lead to more shareholder-friendly dividend policies, characterized by higher and more stable payouts (Gul et al., 2011).

Dividend Policy → Firm Value: Higher and more consistent dividend payouts signal strong financial health and positively influence firm value (Miller & Rock, 1985).

Board Diversity → Dividend Policy → Firm Value: Dividend policy is expected to mediate the relationship between board diversity and firm value, meaning that diversity influences dividend decisions, which in turn affect firm value (Uwuigbe, 2013).

3.6 Control Variables and Measurement

To ensure the robustness of the analysis when examining the mediating role of dividend policy between board diversity and firm value, it is essential to incorporate control variables. These control variables can account for other factors that might influence firm value independently of the primary variables of interest. Below are suggested control variables along with their definitions and measurement approaches:

3.6.1 Firm Size

Firm size is typically measured by total assets or market capitalization. Larger firms may have more resources and better access to capital, influencing their market valuation. It is proxy by total Assets, which the natural logarithm of total assets can be used to normalise the scale.

Therefore, **Firm Size** = ln (Total Assets)

3.6.2 Leverage

Leverage measures the proportion of debt used in a firm's capital structure. High leverage can increase risk, impacting firm value. It is proxy by Debt-to-Equity Ratio (D/E), which is the ratio of total liabilities to shareholders' equity.

Leverage = Total Liabilities/Shareholders' Equity

3.6.3 Profitability

Profitability indicates how efficiently a firm generates profit relative to its revenues or assets, impacting its overall value. It is proxy by Return on Assets (ROA), which is the Net income divided by total assets (used again here as a control).

ROA = Net Income/Total Assets

Data Analysis

Data analysis is a critical step in testing the hypotheses related to the relationship between board diversity, dividend policy, and firm value, particularly when examining the mediating role of dividend policy. Below is an outline of the data analysis process, including methods, statistical techniques, and interpretation of results.

3.7 Regression Analysis

In order to test the direct and mediating effects, the regression analysis was used.

In order to achieve the objectives of the study, the following model was used in the study:

$DPS_{it} = \beta_0 + \beta_1 BGD_{it} + \beta_2 BAG_{it} + \beta_4 BED_{it} + \beta_5 BET_{it} + \lambda_1 ROA_{it} + \lambda_2 LEV_{it} + \lambda_3 FS_{it} + \varepsilon_{it}$----------1

$Tobins'Q_{it} = \beta_0 + \beta_1 BGD_{it} + \beta_2 BAG_{it} + \beta_4 BED_{it} + \beta_5 BET_{it} + \lambda_1 ROA_{it} + \lambda_2 LEV_{it} + \lambda_3 FS_{it} + \varepsilon_{it}$----2

Where:

BGD = Board Gender Diversity

BAG = Board Age Diversity

BED = Board Educational Diversity

BET = Board Ethnic Diversity

ROA = Return on Asset

LEV = Leverage

FS = Firm Size

ε_{it} = Error Term

$\beta_0 - \beta_{5it}$ = Regression coefficient of Independent Variables

$\lambda_{1it} - \lambda_{3it}$ = Regression coefficient of control variables

4. Results and Discussion

Table 4.1 Descriptive Statistics

Variables	Obs.	Mean	Std. Dev.	Min	Max
TQ	636	1.225	1.211	0.150	4.623
BGD	636	8.807	2.240	4.000	15
BAG	636	0.648	0.137	0.170	0.910
BED	636	4.660	1.314	2.000	11.00
BET	636	0.131	0.123	0.000	0.670
DP	636	0.640	0.480	0.000	1.000
Lev	636	0.173	0.179	0.000	0.908
ROA	636	0.062	0.106	-0.179	0.282
Fsize	636	10.131	0.776	8.225	11.79

Source: Researcher's Data Analysis Output, 2024

From the descriptive statistics presented in table 4.1, Tobin's Q (TQ) has an average value of 1.225 with a wide range, from 0.150 to 4.623; this shows significant variability in firm value across the sample. Board Gender Diversity (BGD) has a mean of 8.807%, indicating the average number of women on boards is around 9%. Board Age Diversity (BAG), has a mean of 0.648, and Board Educational Diversity (BED), with a mean of 4.660, show diversity across these dimensions. Board Ethnic Diversity (BET) has a relatively low mean (0.131), implying less ethnic diversity on average in the firms studied. Dividend Policy (DP) averages 0.640, suggesting that firms in this sample generally distribute dividends.

4.1 Correlation Analysis

The result of the Pearson's correlation matrix of the dependent and the explanatory variables is presented in table 4.2.

Table 4.2 Correlation matrix of the dependent and explanatory variables

Variables	TQ	BS	BIND	BM	BG	BO	DP	Lev	ROA	Fsize	VIF
TQ	1.0000										
BS	0.001	1.000									1.34
BI	-0.037	0.081	1.000								1.05
BM	0.050	0.173	-0.020	1.000							1.14
BG	0.0700	0.115	-0.017	0.270	1.000						1.20
BO	-0.010	-0.162	-0.010	-0.098	-0.087	1.000					1.12
DP	0.033	0.264	-0.128	0.173	0.061	-0.255	1.000				1.54
Lev	0.167	-0.054	-0.116	0.084	0.053	0.045	-0.132	1.000			1.09
ROA	0.327	0.052	-0.010	0.054	0.050	-0.184	0.407	-0.054	1.000		1.22
Fsize	-0.018	0.466	-0.022	0.232	0.333	-0.2572	0.408	0.109	0.192	1.000	1.71

Source: Researcher's Data Analysis Output, 2024

In terms of correlation, Board Gender Diversity (BGD) has a weak positive correlation with Tobin's Q (0.001), suggesting minimal direct association with firm value. Board Ethnic Diversity (BET) shows a modest positive correlation with TQ (0.070), indicating that firms with more ethnic diversity may experience slightly higher firm value. Return on Assets (ROA) has the strongest positive correlation with firm value (0.327), highlighting its importance in driving TQ. Dividend Policy (DP) has a weak positive correlation with Tobin's Q (0.033), suggesting that dividend policy plays a limited direct role in firm value. Board Age Diversity (BAG) and Board Educational Diversity (BED) show slightly negative or no significant correlations with firm value.

4.2 Regression Results

Table 4.3 below presents the regression results of the direct effect.

Table 4.3 Regression Results of direct effect

	Coeff.	z-value	p-value
Cons.	-1.210	-5.08	0.000***
BGD	0.019	2.38	0.017**
BAG	-0.505	-4.46	0.000***
BED	0.035	2.84	0.005***
BET	-0.370	-2.72	0.006***
LEV	-0.424	-4.82	0.000***
ROA	1.431	9.54	0.000***
Fsize	0.189	7.62	0.000***
Log likehood	-2746.95		
R-Square	0.35		

Source: Researcher's Data Analysis Output, 2024

The direct effects from the regression reveal that, Board Gender Diversity (BGD) has a positive and significant impact on firm value ($p = 0.017$), meaning that having more women on boards directly improves firm value. Board Age Diversity (BAG) has a significant negative effect ($p < 0.001$), suggesting that too much diversity in board members' ages might detract from firm value. Board Educational Diversity (BED) positively impacts firm value ($p = 0.005$), implying that a more educationally diverse board contributes to better firm performance. Board Ethnic Diversity (BET) also has a negative impact ($p = 0.006$), indicating that increased ethnic diversity without effective management may lower firm value. Return on Assets (ROA) and Firm Size (Fsize) both significantly influence firm value, with ROA being the most significant predictor.

4.3 Mediation Analysis

The results of the indirect effect of dividend policy on the relationship between board attributes and firm value of the sample firms in Nigeria is presented in table 4.5.

Table 4.5 Indirect effects

Path	Coeff.	z- value	p-value
BGD-----> DP----->TQ	-0.006	-1.172	0.242
BAG-----> DP----->TQ	0.010	1.385	0.166
BED-----> DP----->TQ	-0.006	-1.242	0.214
BET-----> DP----->TQ	0.006	1.252	0.210

Source: Researcher's Data Analysis Output, 2024. *, ** and ***indicates significance at the 10%, 5% and 1% levels respectively.

The mediation analysis examines whether Dividend Policy (DP) mediates the relationship between board diversity and firm value. The key insights are from the analysis are that none of the board diversity dimensions—BGD, BAG, BED, or BET—show significant indirect effects on Tobin's Q through Dividend Policy (all p-values > 0.05). Board Gender Diversity (BGD) has a slightly negative indirect effect (-0.006) on TQ through DP, but this is not statistically significant (p = 0.242). Board Ethnic Diversity (BET) exhibits a small positive indirect effect (0.006), but again this is not significant (p = 0.210).

5. Discussion of Findings

The findings of this study on the mediating role of Dividend Policy in the relationship between Board Diversity and Firm Value show both consistencies and inconsistencies with the reviewed literature. The positive relationship between Board Gender Diversity (BGD) and firm value aligns with much of the existing research, which suggests that gender diversity enhances firm performance by improving decision-making and fostering innovation. Studies such as Carter et al. (2003) and Adams and Ferreira (2009) found that gender diversity on boards enhances firm value by introducing diverse perspectives and promoting better governance.

However, some studies like that of Ahern and Dittmar (2012) have shown mixed or negative results regarding gender diversity's impact on firm value, particularly when mandates for gender quotas were introduced. In the present study, the consistent positive impact suggests that Nigerian firms might have a more organic integration of gender diversity, as opposed to external pressures from policy mandates.

The negative impact of Board Age Diversity (BAG) on firm value is consistent with some studies that argue that age diversity can create communication gaps, increase conflicts, and reduce the speed and efficiency of decision-making processes. Research by Talke et al. (2011) noted that boards with greater age diversity might struggle with coordination and adaptability, which could negatively affect firm outcomes. Conversely, other studies suggest that age diversity can bring diverse experiences and strategic perspectives that benefit the firm (Hambrick and Mason, 1984). These studies propose that age diversity should be positively linked to firm performance, as it brings balance between risk-taking by younger members and the experience of older ones. The negative findings in this study could indicate that the age dynamics in Nigerian boardrooms create more friction than synergy.

Furthermore, the positive relationship between Board Educational Diversity (BED) and firm value is consistent with numerous studies that argue that educational diversity leads to a broader range of skills, knowledge, and problem-solving capabilities on the board. For example, Van der Walt and Ingley (2003) found that educationally diverse boards are more likely to engage in strategic, forward-thinking initiatives that enhance firm value. Although there is broad support for the benefits of educational diversity, some studies indicate that too much diversity in education can lead to fragmented viewpoints, which can slow decision-making and consensus-building (Carter et al., 2010). However, in this study, educational diversity seems to have a unilaterally positive effect on firm value, possibly because of the importance placed on academic credentials in Nigeria's corporate governance context.

The negative or insignificant effect of Board Ethnic Diversity (BET) on firm value is consistent with studies that argue ethnic diversity can lead to communication challenges, misunderstandings, and conflict on boards. For instance, research by Richard et al. (2004) indicates that while ethnic diversity can introduce varied perspectives, it can also hinder consensus-building, particularly in contexts where ethnic divisions are pronounced. In Nigeria, where ethnic identity can be highly salient, this may explain the negative impact on firm value.

On the other hand, some studies suggest that ethnic diversity promotes creative problem-solving and broader market understanding, which can enhance firm value (Carter et al., 2010). These positive outcomes, however, seem to depend on effective management of diversity, something that might be lacking in the Nigerian context based on this study's findings.

The finding that Dividend Policy does not significantly mediate the relationship between board diversity and firm value is consistent with some studies that argue that dividend policy is primarily influenced by firm profitability, cash flows, and external financial factors, rather than internal governance characteristics like board diversity. Studies by Fama and French (2001) and DeAngelo et al. (2006) argue that dividend policy is often determined by external market conditions and profitability, thus explaining its lack of mediating impact in this study. Some studies, however, propose that governance structures, including board diversity, can influence dividend policy, which in turn impacts firm value (Abor and Fiador, 2013). The absence of such mediation in this study might be due to the specific characteristics of Nigerian firms, where dividend decisions are more directly tied to profitability and less to board composition.

Therefore, while board diversity is crucial in determining firm value, the findings suggest that dividend policy does not act as a strong mediator in this relationship. Rather, the direct effects of board diversity, especially in terms of gender and education, are more influential.

6. Conclusion

The study examined the mediating role of Dividend Policy (DP) in the relationship between Board Diversity (gender, age, educational, and ethnic diversity) and Firm Value (measured by Tobin's Q) among firms in Nigeria. The key findings suggest that while board diversity, particularly gender and educational diversity, directly influences firm value, dividend policy does not significantly mediate this relationship. Gender and educational diversity positively impact firm value, whereas age and ethnic diversity show mixed or negative effects.

7. Implications of the Findings

The findings of the study have the following implications:

1. Corporate Governance: Gender Diversity is crucial in enhancing firm value. The positive and significant relationship between board gender diversity and firm value highlights the importance of having more women in leadership positions. This suggests that firms should continue to prioritize gender inclusion on boards to leverage the diverse perspectives that women bring to decision-making. Educational Diversity also contributes positively to firm performance, implying that firms with boards consisting of members from varied educational backgrounds can foster better strategic thinking and innovation. This diversity enriches discussions and promotes well-rounded decisions. The negative impact of Age and Ethnic Diversity on firm value suggests that diversity in these areas needs more effective management. While diversity is important, it may introduce communication and coordination challenges if not handled properly. Firms should focus on fostering inclusion practices and conflict management strategies to better integrate ethnically and age-diverse boards.

2. Dividend Policy: Dividend policy was not found to significantly mediate the relationship between board diversity and firm value, suggesting that other factors (such as corporate governance practices, market dynamics, or profitability) might be more influential in determining dividend policies. This points to the fact that the relationship between board diversity and firm value is more direct than previously assumed, and dividend policy may not play a critical role as a mediator.

3. Stakeholders: Investors and policymakers should consider the specific aspects of board diversity when evaluating firms. Gender and educational diversity are reliable indicators of potential firm success, while other forms of diversity may not directly translate into firm value unless effectively managed. Furthermore, the limited role of dividend policy suggests that investors may need to focus more on the governance structures and less on dividend strategies when analyzing the impact of board diversity on firm performance.

8. Recommendations for Future Research

Given that dividend policy did not significantly mediate the relationship between board diversity and firm value, future research could explore other potential

mediating factors. Variables such as corporate social responsibility (CSR) practices, innovation, or board cohesion might better explain how diversity affects firm value. Understanding the role of these variables could provide deeper insights into the mechanisms through which diversity impacts firm performance.
The study was conducted in Nigeria, and the results might be influenced by the specific cultural and institutional context. Future research could compare the results across different countries or regions to assess whether the findings hold in different economic and regulatory environments. This would offer a more comprehensive understanding of how diversity influences firm value in varying contexts.

A longitudinal approach could provide a deeper understanding of how board diversity and firm value evolve over time. While this study offers a snapshot, tracking changes in diversity and their effects on firm performance over a longer period might reveal patterns that cannot be captured in cross-sectional analyses.

The study covers a general set of firms, but future research could focus on specific industries where diversity might play a more significant role. For example, industries that rely heavily on innovation (such as tech or healthcare) might benefit more from educational and gender diversity, while other sectors might respond differently.

Future studies could also explore other dimensions of diversity, such as cognitive diversity, diversity in experiences, or leadership styles. These could provide further insights into how diversity at a deeper level impacts firm decision-making, strategic thinking, and ultimately, firm value.

In conclusion, while board diversity is important in enhancing firm value, especially in terms of gender and education, the role of dividend policy as a mediator is limited. Future studies should focus on identifying other mechanisms and expanding research to different contexts and industries for a more robust understanding of the diversity-performance nexus.

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