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Firms' Performance in Pakistan:

The Impact of Government Policies, Capital Structure, and Board Diversity

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Abstract The present study has three main objectives. First, to investigate the effect of capital structure on firms' performance. The second is to investigate the effect of board member diversity on firms' performance. Third, given government interest in the thriving business sector, the study aims to access the impact of government Firm Performance, Capital Structure, support policies on the performance of firms, particularly in the construction and automobile sectors. For this, we selected 40 firms from these sectors from the period 2010 to 2021. The generalized method of movement (GMM) is used to test the relationships. The results of the present study show that capital structure has a significant and positive effect on firms' performance. The diversity of board members, which is divided into two sub-categories i.e. demographic diversity and cognitive diversity has significant negative and positive effects on firms' performance. Lastly, there is a negative relationship between government support policies and firms' performance. These findings provide unique insight to the government, policymakers, researchers, and managers in the context of Pakistan. The thriving business sector is key for the economic survival of a country and these finding can enable managers and policymakers to utilize capital structure and board composition for ensuring optimal performance and effective policy making.

Introduction

The thriving business sector is key for the economic survival of a country and hence firm's financial performance is one of the most important factors that attract the interest of the researchers of the economy. Investments in the companies are based on their financial performance (FP). Many other factors can affect the firm's financial performance. The firm's financial performance is influenced by many macro and micro factors. The current study incorporated the effect of both of these factors on a firm's

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performance, the micro factors included in the study are capital structure (CS) and the board of director diversity (BOD) whereas the macro aspect of firm performance is analyzed using government policies (GP).

CS is the main determinant of any organization's performance and all financial decisions are directly influenced by capital structure. The term CS represents the combination of equity and debt and companies used it for the financing of their future ventures and investments. The optimal CS is the best mixture of debt and equity (Titman, Martin, Berk, & DeMarzo, 2017). Poor capital structure decisions reduce the worth of the company and increase the cost of capital. Therefore, poor CS choice affects the stability and performance of the company (Ghosh, Cai, & Fosberg, 2017). The main purpose of studying CS is to identify a balance between equity and debt. (Birru, 2016). CS includes different sources such as (debt capital, equity capital, and hybrid securities) which can be used for financing (Olusola, Mengze, Chimezie, & Chinedum, 2022). While equity includes retained earnings and stocks (Opoku-Asante, Winful, Sharifzadeh, & Neubert, 2022). Other than that, many companies issue mixed securities that have both the features of debt and equity for financing purposes like convertible bonds and preference shares (Sari, Sintha, Bertuah, & Munandar, 2022). Generally, the cost of equity (KE) is significantly more than the cost of debt (KD) when the interest rates are low. Apart from that debt financing provides the facility of tax shield benefit (Hossain, 2021) but the literature on the topic is inconclusive and shows mixed results. Therefore, given its significance for firm valuation, and performance it is considered in the current study for better contextualized understanding.

Furthermore, the study also tries to address the debate on the board of director diversity, which is still unresolved. The board of directors works on the base of the interest of shareholders. They make decisions to improve the company's overall valuation (Conyon & He, 2017). One factor for such diversity is the education level. The current study is interested in exploring the effect of the presence of professional accountancy knowledge on firms' performance in Pakistan. As traditionally it is believed that professional accountants are better equipped to run businesses. Board of directors diversity also includes gender diversity and is considered an important aspect of corporate governance. For that purpose countries in the world have now set up a quota for women's inclusion in public limited company boards of directors. The perception is that they can run a business well as compared to men and also diversifies the decision-making process by bringing new perspectives (Dwaikat, Qubbaj, & Queiri, 2021). Earlier studies explained the benefit of diversity such as innovation, an increase in the profitability of the firm, the best utilization of resources, and idea-sharing. On the contrary, some researchers infer the opposite, it is an extra weight on the capital of the company. To avoid discrimination, some countries made it mandatory to have at least one woman on the panel of executives (Kılıç & Kuzey, 2016). In today's world, women directors are now heavily represented on the boards of directors of some developing and majority of the developed markets (Dwaikat, Qubbaj, & Queiri, 2021). Recently, there has been a breakthrough in gender diversity in Pakistan's corporate structure. The Security Exchange Commission of Pakistan made it mandatory to select at least a woman member on the board of directors (BOD) of the registered firm. The Pakistani National Assembly passed this law on May 24, 2017. After this, the proportion of women increased from 6.4% to 14.3% (PAKISTAN, 2017), and therefore the study incorporated this aspect into the analysis which can bring unique insight from the prospect of Pakistan.

Lastly, Economic growth and development are of vital significance for every country's prosperity. Especially for a country like Pakistan, which has to support a huge population. Its population in 2020 was above 200 million with a population density of 287 per square kilometer. Therefore exploring and enhancing the industry's performance is vital to ensure sufficient employment and other resources. Given the special focus of the recent governments, the current research focuses on Pakistan's automobile and construction sectors. These sectors are also key contributors in developed economies whereas in Pakistan the contribution of these sectors is limited and hence got huge potential. The development of the industrial sector also reduces the dependence on agricultural exports. In recent times, with an increase in ease of doing business and lower production costs, the economic outlook of Pakistan provides excellent opportunities for such ventures. The construction industry in Pakistan is very important for the economy. The construction industry is one of the most important and well-known sectors in any country in the world. It provides much employment in the form of new projects, and repair of existing buildings, roads, railways, and so on. In 2020, when covid-19 destroyed the global economy, the government of Pakistan announced a special package to develop the construction sector, which led to the development of the industrial sector and its allied industries. The government of Pakistan intends to create economic zones in different areas and has announced to build 5 million houses from 2019 to 2023. Secondly, the government of Pakistan is also paying more attention to the country's automobile industry alongside the construction sector. The automobile industry is one of the most important pillars of every industrial economy across the globe. This industry plays a vital role in the economy of the state and is considered the backbone of the economy. In Pakistan, the automobile industry is one of the most developed. Pakistan's automobile industry is growing very fast (Hussain, Waqar, Anam, Hafeezullah, & Asma, 2022), but its market share is still very low. It contributes 3% to Pakistan's GDP and employs 3.5 million people in Pakistan (Trade., 2018). Currently, Pakistan ranks 35th in the world in making the most automobiles (Hussain et al., 2022). So, the current study is also paying special attention to the automobile industry and will analyze the effectiveness of the five-year policy (2016-2021) for the automobile industry. Which will bring useful insights for these industries and policymakers.

As discussed, the economic prosperity and growth of a country are directly associated with the performance of its industrial sector. Given the fact that it leads to increased employment and income level. Therefore, it is vital to identify and analyze the determinants of a firm's performance in Pakistan. By utilizing existing theories and literature, the current study identifies and focuses on the impact of capital structure (CS)

and board of director diversity (BD) on a firm's performance (FP) in Pakistan. A framework is proposed to test the impact of these antecedents among key sectors with a focus on governmental policy (GP).

Literature review

Prior literature identified many factors that affect the firm's performance, capital structure (CS) and board diversity (BOD) are the ones that are found to be significantly affecting a firm's performance. It is evident from the past literature and generally from the theory of human capital that both factors impact on company's performance. The most important query for CS researchers is, how a firm can choose the best CS that minimizes the overall cost. The capital structure includes different components such as debt, equity, and the firm's income (Khan, Rehan, Chhapra, & Sohail, 2021). According to Iqbal, Farooq, Sandhu, and Abbas (2018), the best capital structure (CS) is a mixture of equity and debt that increases the organization's efficiency and reduces capital costs.

After the study of Modigliani & Miller in 1958, CS and FP began to be discussed all over the world. They explained that there is no correlation between business value and debt proportion (no taxes, no transaction costs, and full profits should be distributed to shareholders). But a few years later, they changed their theory and suggested that the debt ratio positively impacts the firm value (FV) and an increase in debt can lead to an increase in their firm value. Ross (1977) further, expanded the work of FP and CS. CS provides funding for the company's needs and also for its operations. Heinkel (1982) explained that the higher debt ratio affects the FP. Harris and Raviv (1991), show that a higher debt ratio raises the wealth of shareholders. Sometimes the debt ratio shows that the world's bankrupt companies cannot afford to borrow more because they are not performing well (Barclay, Smith, & Watts, 1995). Al-Hunnayan (2020) found a positive link between firm size value and debt. Musa, Matemilola, and Bany-Ariffin (2021) found a similar relationship between the "debt ratio" and the value of firms.

Many other studies, including Friend and Lang (1988), Rajan and Luigi (1995), and Wald (1999) found an inverse association between debt ratio and a firm's performance. Similarly, Ramadan and Ramadan (2015) found an inverse association between CS and FP. Huang (2006) also suggested that there is an adverse association between firm performance and debt ratio in a Chinese firm. Moreover, Abor (2005) examined the connection between the firm's profitability and debt ratio and found a significant linkage. Muhammad and Shah (2014) analyzed the Pakistani cement industry. The results of this study show a negative correlation between FP and CS. Habib, Khan, and Wazir (2016) extended the current literature to conduct a study on a firm's performance and leverage ratio. The study also found a negative relationship between the FP and CS. Based on the theory traditional theory of capital structure and the prior literature discussed, it is inferred that there exists a significant relationship between CS and FP the nature of which is highly contextualized and subjective based on country and industry hence it is proposed,

H1: Capital structure is significantly associated with auto and construction industry performance in Pakistan.

Great importance has been given to the Board's diversity over the past two decades. Because BOD plays an important part in the firm's performance (FP). They are responsible for the overall organization and the decisions that upsurge the activity of the firm while protecting shareholders (Gillan, 2006; Amran & Ahmad, 2011; Dwaikat et al., 2021; Campbell & Mínguez-Vera, 2008). Erhardt, Werbel, and Shrader (2003) explained that BOD diversity can be divided into two types, one is ("cognitive diversity") and the second one is ("demographic diversity"). ("Demographic diversity") is concerned with age, race, and sex. While (Cognitive diversity) means values, experiences, and education. A Board of diversity is considered an important tool in corporate governance. Increasing board diversity will also enhance corporate governance and at the same time, the firm's efficiency will also increase (Eulerich, Velte, & van Uum, 2014). Another study was conducted by Sarhan, Ntim, and Al-Najjar (2019) to explore the association between a firm's performance and board diversity. The result of this study was classified into 3 parts. The first portion showed a positive association between a firm's performance & gender. The second portion showed that if there is an upsurge in governance, the firm's performance (FP) will also increase. Finally, they discovered a positive relationship between a firm's performance (FP) and gender diversity (GD). So the firm's performance can be enhanced by incorporating people from different genders, skills, and different communities into the board of directors (Ujunwa, Okoyeuzu, & Nwakoby, 2012). Board diversity can enhance the decision-making process (Terjesen, Sealy, & Singh, 2009). Another cause for the inclusion of women executives in the panel is their attendance. BOD also prefers to include female directors due to their higher attendance; Randøy, Oxelheim, & Thomsen, 2006).

Diversity is a multifaceted phenomenon and includes different forms such as sex, age, and race which is called demographic diversity (Tsui, Egan, & Xin, 1995; Baugh & Graen, 1997). As reported by Watson, Kumar, and Michaelsen (1993) demographic diversity has different characteristics. If special attention is not given to diversity in any firm, there may become conflict inside the firm and it leads to a lack of consistency (Nakai, Yamaguchi, & Takeuchi, 2016), which reduces the firm's performance and employee dissatisfaction will increase "(Jackson et al., 1991)", high turnover "(Wagner, Pfeffer, & O'Reilly III, 1984)", then the low responsibility for the job (Riordan & Shore, 1997). In addition, some studies have shown an adverse correlation between "firm performance" (FP) and the percentage of females on BOD. (Shrader, Blackburn, & Iles, 1997; Rose, 2007; Matsa & Miller, 2013; Yang, Riepe, Moser, Pull, & Terjesen, 2019) making the results inconclusive and require contextualized exploration.

Cognitive diversity refers to the individual's knowledge, experience, and values that play a part in the company's performance. Cognitive diversity is rarely highlighted or sometimes overlooked (R. Hassan, Marimuthu, & Johl, 2015), especially in underdeveloped countries like Pakistan (Z. Hassan, 2018). According to Barker III and

Mueller (2002), and Tarus and Aime (2014) past studies have tried to show that the company's top management in the decision-making process highlights something that shows their expertise, and experience and influences the firm's performance. Hassan (2018) explored the relationship between demographic and cognitive diversity and found an adverse association between demographic & cognitive diversity the monetary performance, therefore these mixed and inconclusive results indicate a highly contextualized relationship between BOD diversity and FP. Two major meta-analysis studies by Thatcher and Patel (2011) and Schneid, Isidor, Steinmetz, and Kabst (2016) were based on the FP and BOD diversity, and also found mixed effects of diversity. Therefore it also suggests that demographic and cognitive diversity affects the firm's performance and gender as part of demographic diversity and the professional education of board members as a proxy for cognitive diversity is included in the current study. Hence based on human capital theory it is proposed,

H2: Board of Directors diversity is significantly associated with auto and construction industry performance in Pakistan.

H2a: Board of Directors diversity is significantly associated with auto and construction industry performance in Pakistan.

H2b: Board of Directors diversity is significantly associated with auto and construction industry performance in Pakistan.

Braczyk, Cooke, Heidenreich, and Krauss (1998), Heidenreich (2003), and Howells (2005) explained that over the past several decades, governments around the world have focused on promoting economic growth, improving living standards, and gross domestic product (GDP). Govt has developed policies and programs to enhance and improve economic growth. Government policies (GP) play an important key role in the firm's performance (FP). A study was done by Chechet and Olayiwola (2014) to investigate the appropriateness of administration policies on China's stock market and found that policies were more important to high-performing firms than to low-performing companies. They explained that government policies for high-profile corporations influence investors' choices as they decide their earnings. They also point out that clear and well-known policies are more valuable. Another similar study was conducted by Guo, Guo, and Jiang, (2016) to find out the impact of government support policies on the company's performance. The outcomes of this study display that government support strategies enhance firm's performance.

The Government of Pakistan has also been paying special attention to the automobile industry and the construction industry for many years and formulating appropriate policies for them to enhance their share in the economy by increasing their productivity. The Economic Coordination Committee developed the Automobile Policy (2016-2021) based on these characteristics and the main objective of this policy was to attract foreign investors for investment purposes.

Another focused policy in the current study is the construction industry. The construction industry is considered the backbone of any country in the world. This industry is linked to 42 other sectors and the government is paying special attention to it. There are two reasons for focusing on the construction industry, one is that it employs daily wage earners, and the other is that, it plays a key role in the national economy. Because the construction industry is connected to other sectors such as cement, steel, telecommunication, etc. So the current study is the pioneer to study the effectiveness of these policies on the performance of the sector and hence the key objective of the current study is also to inspect the role of the government policies i.e., automobile policy (2016-2021) and construction support like Naya Pakistan Naya Ghar and amnesty schemes on relevant industry's performance. Therefore, as a contribution to the literature, it is proposed,

H3: Government Policies are significantly associated with automobile and construction industry performance in Pakistan.

Methodology

The data is gathered from the listed firms in the automobile and construction sector at the Pakistan stock exchange (PSX) from 2010 to 2021 and is collected from the financial statements of the relevant firms. The final sample size for this study is 50 automobile, construction, and allied firms but 40 firms were considered for final analysis due to data availability.

The Generalized method of moments (GMM) technique is used to examine the impact of government policies, capital structure (CS), and board diversity (BD) on the firm's performance (FP). The aforementioned technique is best suited for panel data having panels higher than the time period observations which was the case in the current study. Another benefit of the methodology is that it also accounts for and addresses the issues which are inherent to the panel data using the following model.

$$ROE_{i,t} = ROE_{i,t-1} + \beta_1 TD_{i,t} + \beta_2 GD_{i,t} + \beta_3 EL_{i,t} + \beta_4 G_{P_{i,t}} + \beta_5 BME_{i,t} + \beta_6 BMA_{i,t} + \beta_7 F_{Z_{i,t}} + \beta_8 F_{A_{i,t}} + \varepsilon_{i,t} \dots (Eq. \text{ no. } 3.1)$$

In above equation 3.1, ROE represents the return on equity as the dependent variable. While $ROE_{i,t-1}$ is the lag of the dependent variable $\beta_1, \beta_2, \beta_3, \beta_4, \beta_5, \beta_6, \beta_7, \beta_8$, are the values of the coefficient associated with each of the independent variables. As far as variable measurement is concerned, capital structure is measured in the percentage of total debt to the firm assets (TD). Further, board diversity is measured as the percentage of females on the board of directors (GD) and education level is represented as the percentage of directors having some professional qualification (EL), and lastly, government policies (G_P) are measured as a dummy variable where 1 represent the period when government policy is implemented and 0 when otherwise. Four control variables are also included based on existing literature i.e., the board's member age (BMA), board's member experience (BME), firm's size (F_Z), and firm's age (F_A) are included in the analysis. $\varepsilon_{(i,t)}$ represents the error term associated with the equation.

These control variables are selected based on existing literature and relevance with the variables of this study.

<i>Table 3.1:</i>	Regression	analysis	(GMM)
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Tests	Cross-section	Time	Both
Breusch-Pagan	23.79328	93.0659	95.3286
p-value	0.0000	0.0000	0.0000
Hausman test	Chi-Sq.	d.f.	Prob.
	97.8790	9	0.0000
	rho	SE	Prob.
Arellano Bond Serial Correlation Test	-2.7570	9.4657	0.7709

As pre-testing for the selection of appropriate statistical analysis on the panel data, the present study tested for pooled regression equation, fixed effect model, and random effect model to test the hypothesis, and the results are reported in table 3.1. To find out the significance of these tests, a redundant test for fixed effect and the Breuch-Pagan LM test for random effect models were performed. Furthermore, the Hausman test for both was performed to select the best fit for the model. The results of the pooled regression, fixed effect, and random effect show the endogeneity problems between the independent variables. So, these models cannot be utilized to produce valid results (Roberts & Whited, 2013). This leads us to the generalized method of moments (GMM) which address these issues through an overidentification of the model.

Data Analysis and Findings

Table 4.1 shows the descriptive statistics including mean, median, range, standard deviation, and the number of observations of the all variables that are used in this study. ROE is the dependent variable and other variables such as total debt, gender diversity, education level, and government policies are the independent variables. While, the board's member age, board's member experience, firm size, and firm age are considered as control variables.

Table 4.1: Descriptive statistics

	Mean	Median	Maximum	Minimum	S.D	N
ROE	0.1257	0.1302	0.9231	-0.9534	00.219	480
TD	0.4742	0.4565	2.1765	0.0932	00.235	480
GD	10.4453	0.0000	87.5000	0.0000	14.873	480
EL	18.7189	14.2857	62.5000	0.0000	15.462	480
G_P	0.4292	0.0000	1.0000	0.0000	00.495	480
F_A	3.5603	3.5553	4.2195	1.6094	00.371	480
F_S	17.7029	16.9165	25.1271	13.8264	02.732	480
BMA	3.8889	3.8941	4.2047	3.4812	00.139	480
BME	3.1066	3.1275	3.6492	2.3394	00.281	480

TD=Total Debt, GD=Gender Diversity, EL=Professional Education, G_P=Government Policies, F_A=Firm Age, F_S=Firm Size, BMA=Board Members Age, BME=Board Member Experience

As discussed in the methodology section, for hypothesis testing GMM model is utilized and we performed the Arellano bond serial correlation test for the validity of the GMM model. The instruments' validity for GMM can be estimated by the requirements set of tests (Arellano & Bond, 1991). Hansen's test does not provide a primary reason or objection to rejecting the validity of the instrument. Therefore, the Arellano bond serial correlation that was based on the estimation of residuals is suitable (Le & Phan, 2017). Roodman (2009) explained that if the model has endogeneity and multicollinearity problems, GMM is an appropriate technique, which addresses these issues by overidentification of the model. Further validation of the GMM can be estimated using J-stats and instrument ranks which indicates sufficient validity of the model as presented in table 4.2 below. Additionally GMM method rely on appropriate instruments selection for valid results. The current study utilized lagged value of independent and control variables as instruments. In the results a non-significant j-stat. and instrument rank higher than 25 represent the appropriateness of the instruments.

Table 4.2: Regression analysis (GMM)

Variable	Coefficient	Std. Error	t-Statistic	Prob.
TD	-0.6347	0.0826	-10.2300	0.0000
GD	-0.0065	0.0005	-10.1776	0.0000
EL	0.0094	0.0022	4.3472	0.0000
G_P	-0.0972	0.0117	-8.2986	0.0000
F. A	1.1324	0.1205	9.3991	0.0000
F. S	0.0585	0.0186	3.1385	0.0018
BMA	0.4562	0.1329	3.4315	0.0007
BME	0.6375	0.0346	18.4048	0.0000
S.E. of regression	0.1935	Instrument rank	40	
J-statistic	33.0756	Prob(J-statistic)	0.3193	

The GMM results for hypothesis testing shows that Total Debt (TD) has a significant and negative effect on firm performance (FP). The results revealed that if one percent of debt increases in capital structure, the performance of the firm decreases by 0.6 percent. The results support our hypothesis that debt has a significant (p<0.01) effect on firms' performance in Pakistan. Similarly, gender diversity also has a significant (p<0.01) but negative effect on firm performance. Although, the impact is marginal as a 1 percent increase in female participation is leading towards a mere 0.006 percent decrease in performance. The professional education level of the board members is also found to be significant (p<0.01) and positively affects the firm's performance. If there is an increase of one percent in professional education level among BOD, the firm performance increases by 0.0094 percent. Lastly, the impact of government support policies is also found to be significant (p<0.01) but negative and in presence of these policies, the firms are found to be performing 9% less on average than in the absence of these policies. All these results indicate support for our proposed hypothesis. The detailed discussion and implication of these results are included in the upcoming section

Conclusions and Discussion

Capital structure and corporate governance are pivotal issues for firms' performance and have received special attention from the government, investors, and policymakers. It is also of vital significance to access the impact of government policies for their effectiveness, so the current focus is especially on the construction and automobile sectors (Titman, Martin, Berk, & DeMarzo, 2017). The result of the present study shows a negative relationship between capital structure and firm performance these results aligned with the studies of Huang (2006), and Habib, Khan, and Wazir (2016). Margaritis and Psillaki (2010) explained, taking more leverage can lower the agency's cost of equity but the negative results can be attributed to the fact that the cost of debt in a country like Pakistan is significantly higher and it even surpasses the cost of equity for firms in Pakistan. This anomaly of lower risk higher return can explain this negative relationship or it can be attributed to the fact the firms in Pakistan utilize debt beyond the optimal combination of debt and equity making the relationship negatively significant.

Secondly, demographic diversity which is measured by gender diversity is found to have a significant and negative effect on firms' performance. These results are aligned with the findings of Rose (2007), Matsa and Miller (2013), and Yang et al., (2019). These results can be attributed to the fact that women on corporate boards cannot significantly influence corporate performance. Another reason for this negative effect can be found in the behavioral view of finance belief that women are less risk-taking and less confident and the return of the firm is primarily dependent on the risk taken (Hussain et al., 2022; Rasheed et al., 2018). This can lead to lower returns on the inclusion of women. According to Adams and Ferreira (2009), gender diversity enhances the performance of firms with weak corporate governance. The inclusion of women on board can lead to fewer frauds and higher compliance with the law which can indirectly impact firms' performance but measurable performance based on firms' risk taken is affected negatively producing these results.

Another aspect of measuring board diversity is cognitive board member diversity. Cognitive diversity refers to an individual's knowledge, experience, and values that contribute to a firm's performance. The results of the cognitive board diversity show a significant and positive effect on firms' performance. These results aligned with the existing literature (R. Hassan, Marimuthu, & Johl, 2015; Z. Hassan, 2018). This means that any firm with professionally qualified directors on the board makes performance better for that firm. Based on the results, we concluded that complete support for our second hypothesis is found.

Lastly, the current study aimed to investigate the effect of government support policies on the firm performance of the construction, and automobile industries. The results of the construction and automobile policies showed a negative effect on firms' performance. There can be many reasons for its negative effects on firms' performance. The first one is the negative effect of the government policies on the construction and automobile industries may be due to the covid-19 pandemic. Secondly, in Pakistan, many manufacturing companies import their raw material from foreign countries and the depreciation of the rupee affects their sales, government support is not enough to cover

their loss leading to negative results but in absence of these policies, the impact would be much higher than found.

These findings provide practical implications in the context of the automobile and construction sector of Pakistan. The managers, researchers, practitioners, and policymakers can utilize this knowledge to better understand the firms' performance in Pakistan and to account for these factors to find an optimal balance of these factors which can maximize a firm's valuation. The thriving business sector is key for the economic survival of a country and these finding can enable managers and policymakers to utilize capital structure and board composition for ensuring optimal performance and effective policy making. Limitation of the study includes the unavailability of the data. Second, the findings of this research are based only on two sectors in Pakistan. Therefore, future research can be conducted by applying the same method in other regions including more sectors, and countries can also include financial companies with increased sample sizes. Further, the research can be conducted by including other aspects of capital structure, board diversity, and government policies.

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