Moderating Effects of Institutional Ownership on the Relation Between Capital Structure and Firm Performance

Azzahra Mufida Rahma[1], Nurcahyono Nurcahyono[1](✉), Andwiani Sinarasri[1], and Luluk Muhimatul Ifada[2]

[1] Department of Accounting, Universitas Muhammadiyah Semarang, Semarang, Indonesia
nurcahyo@unimus.aci.id
[2] Department of Accounting, Universitas Islam Sultan Agung, Semarang, Indonesia

Abstract. The development of a brisk and competitive business based in the era of globalization on the establishment of companies that want to go public, resulting in companies competing to improve the quality of their companies. With good company operations, the asset structure, capital structure, ownership structure and company size are good, so a company's performance will increase. Management must manage finances well to achieve company goals. Quantitative methods with secondary data are used in this study where the population used is financial sector companies, and a sample that meets the criteria is 57 companies. The annual report for 2017–2021 registered at IDX is a reference for this research in the data collection process. After testing descriptive statistical analysis data and multiple linear regression analysis, it has been obtained that capital structure affects company performance, capital structure affects company performance, ownership structure has no effect on shares, and company size negatively affects stock prices. These results indicate that the four variables simultaneously affect the performance of the company, so the asset structure, capital structure, ownership structure, and firm size strengthen the influence of institutional ownership as a moderating variable.

Keywords: asset structure · capital structure · ownership structure · company size · company performance · institutional ownership

1 Introduction

The development of a brisk and competitive business based in the era of globalization is the establishment of companies that want to go public and have advantages in each of their entities, resulting in companies competing to improve the quality of their companies. With the intense competition between entities, the influence on the performance of the company is getting stronger. Company performance is the result of a business and business process where many sacrifices from an entity's business come from the human and financial resources of an entity [1]. Performance maximization needs to be done in every company to provide the best for an entity so that it runs effectively and efficiently for

C. Wen-Hai and A. Mursid (Eds.): ICBABE 2022, AEBMR 240, pp. 293–306, 2023.
https://doi.org/10.2991/978-94-6463-154-8_26

its business's continuity and has high competitiveness and excellence to attract potential investors who will invest [2, 3].

Institutional ownership is a condition where a company can display the percentage owned by an institution [4]. As the company's organizer, the manager will know more internal information and opportunities that the company will obtain in the future compared to the shareholder or principal. Some institutions included government institutions, private institutions, and domestic and foreign [5].

Performance is a person's achievement in producing a job following responsibility and authority. Financial statements are essential information because, in these financial reports, investors can assess whether a company's performance is going well. Return on assets is a ratio where the company's performance can be utilized through all company assets in generating net profit before tax. When the value of return on a company is high, the company's performance can be said to be good, conversely when the company's rate of return is low, its performance will decrease [6]. Return on equity is used to compare net income with total equity, and companies can use these results to seek profits when the company has an effective and efficient performance. Conversely, if the value of return on equity is low, the position of the company owner will decrease [7].

Assets structure is one variable that has a significant role in seeing how the size of these assets dominates the wealth owned by the company. Asset structure can be measured using the formula for current assets divided by total assets [8]. Asset structure has an essential role in a company because fixed assets are related to the company's production process as a source of increasing company profits [1]. If the value of assets in the company has a high value, then the company already has an effective performance in generating profits, and if the company has a low asset value, the company can suffer losses because the profits obtained are small [9].

Debt to equity ratio is proxied as a measurement to determine the value of the capital structure. The capital structure compares the total debt with the capital owned by the company [3]. To avoid risk to the company, the debt held by the company must be paid immediately before maturity. If the ratio is high, large amounts of debt will be owned, thus influencing a company's performance where the company has high liquidity. So that it causes investors to be hesitant when investing in the company because this can pose a high risk to the company. Companies that are able to pay off all debts borne by their assets can be measured using the debt to equity ratio [10].

The ownership structure is used as a source of decision-making on a matter of interest between managers and shareholders. The ownership structure is very influential on company performance to optimalization the value of a company because decisions issued can represent the interests of management and stakeholders [11]. The decision to make the best use of the company's resources must be made by the managers who run the business. When management acts in their interest, they put their company at risk. Shareholders and management must realize the importance of their respective duties in achieving company goals [12, 13].

Company size is a characteristic of the company where the company can have more usable funds as investment costs to earn profits. Company size is handy in the process of financial reporting a company because it can see how many assets the company has. Company size can be used as a benchmark for total assets, market capitalization, or market value [14]. Investors can use companies grouped by size to make investment decisions. Investors can use this information to analyze the company and its performance. Investors prefer companies that are open to company information, especially information related to social activities carried out. When the size of the company is large, the company can easily obtain capital in the stock market because it is considered that the company's performance is more stable than companies that have a small size [15].

The financial sector plays an important role in a country's economy. This financial sector is the centre of the economy that holds the flow of monetary circulation in a country because when the economy grows, the financial industry can provide benefits. Conversely, if a country's economy is hampered, the financial sector will experience losses. This study examines how the effect of asset structure, capital structure, ownership structure and company size on company performance. Thus, the authors intend to choose financial sector companies to serve as samples in this study.

The company's performance variable has previously been studied by previous researchers with different sectors, but this has not been explained in detail by previous researchers. Hence, researchers propose a new variable, institutional ownership, as a moderating variable. The asset structure, capital structure, ownership structure and company size can be said to be good when the company's operations are carried out well, so that it will improve the company's performance. Therefore, management must be able to manage finances well to achieve company goals.

2 Literature Review

2.1 Agency Theory

Jensen and Meckling first created agency theory in 1976 as the basis for understanding the issues of good corporate governance [16]. Agency theory is formed because there are problems of interest between company owners and shareholders. The company's owner is responsible for delegating tasks when making decisions to the manager following the agreed contract, where the responsibility is stipulated in the contract. The relationship between shareholders and company owners reflects the agency relationship of companies that have gone public.

2.2 Effect of Asset Structure on Company Performance

Asset structure compares fixed assets with current assets, where the comparison is in the form of nominal and percentage. The asset structure is intended for company operations because it is a company-owned resource. An increase in the number of assets and an increase in performance will subsequently affect increasing the confidence of outsiders in the company. Asset structure can be measured by comparing current assets with total assets. When the company's performance is in good condition, the asset structure of the company is also good. Research conducted by [17, 18] shows that company performance positively influences asset structure. Then the research hypothesis formulated is:

H1: Asset structure has a positive effect on company performance.

2.3 Effect of Capital Structure on Company Performance

The capital structure is the ratio between total debt and equity, which is the policy for comparing debt to shareholder risk. A good capital structure can make the company have maximum performance, because the capital used by the company is effective and efficient. The ratio between liabilities and own capital must also be balanced. If the value is high, investors will avoid companies with a debt-to-equity ratio because the company has a high dependence on equity financing. This statement is supported by research [19] which states that the company's performance does not affect the capital structure, then the research hypothesis formulated is:

H2 = Capital structure has a negative effect on company performance.

2.4 The Effect of Ownership Structure on Company Performance

Ownership structure affects the running of an activity in an institution, because the company's performance will affect an activity. The capital structure gets funding from internal and external sources of the company, with components consisting of own and foreign capital. Foreign capital comes from companies that still have unpaid debts. In contrast, the own capital comes from shareholders whose funds are embedded in the company for an indefinite period. When an institution has a good percentage of shares, this indicates that the ownership structure of the company is also in good condition. And if the presentation is high, it will lead to increased supervision efforts by the investors. Study [5, 20] support the statement that the ownership structure has no effect on the company's performance, so the formulation of the research hypothesis is:

H3 = Ownership Structure has a negative effect on Company Performance.

The Effect of Company Size on Company Performance

Company size can be measured by observing the size of the value indicated by total assets, total expenses, total profits which have an influence on the social performance of the company to achieve a goal. When the size of the company is good, it will make the company's performance better, because it can be a view for the company on the growth of its social performance. This statement is in line with [21, 22] that company size has an influence on company performance.

H4 = Company size has a positive effect on company performance.

2.5 Institutional Ownership strengthens Asset Structure, Capital Structure, Ownership Structure, Company Size, and Company Performance

Institutional ownership in the corporate ownership structure serves as a party that oversees corporate governance. The greater the institutional ownership in the ownership structure of a company, the greater the institutional encouragement in decision-making

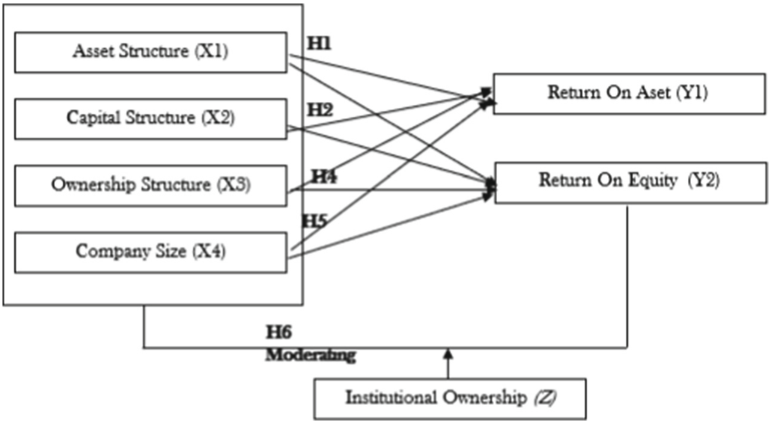

Fig. 1. Conceptual Framework

that leads management, and the greater the incentive to optimize company performance. This motivates researchers to re-test based on the theories used in explaining the variables studied and with different moderators, namely institutional ownership, to strengthen the asset structure, capital structure, ownership structure, and firm size with firm performance. The research formulated are:

H5 = Institutional Ownership strengthens Asset Structure, Capital Structure, Ownership Structure, Company Size, and Company Performance.

2.6 Conceptual Framework

The conceptual framework in this study can be used as a link between independent, dependent, and moderating variables. The independent variables of this research are asset structure, capital structure, ownership structure, and company size. The company's performance as a proxy for the ratio of return on assets and return on equity is the dependent variable. And the moderating variable in this study is institutional ownership (Fig. 1).

3 Research Methods

Quantitative research with a descriptive approach is used in this study. Quantitative research aims to measure or test data that will produce answers to the existing problem formulations and must be measured and tested with statistical analysis to test hypotheses [23]. The descriptive approach has the purpose of describing the object and research results. The population used is 105 financial sector companies listed on IDX in 2017–2021, with a sample of 57 companies taken based on the sample criteria in this study, namely financial sector companies listed on IDX in 2017–2021 and financial sector companies with complete data available. in full in the company's financial statements for 2017–2021 sequentially.

Table 1. Variable Operational Definition

Variable	Variable Measurement
Asset Structure	$SA = \frac{\text{Currentasset}}{\text{Totalassets}}$
Capital Structure	$SM = \frac{\text{Totaldebt}}{\text{Totalequity}}$
Ownership Structure	$SK = \frac{\text{Institutionalshares}}{Outstandingshares} \times 100\%$
Company Size	$SK = LN(\text{Totalassets})$
Return **on** Asset	$ROA = \frac{\text{Netprofitaftertax}}{\text{Totalassets}} \times 100\%$
Return **on** Equity	$ROE = \frac{\text{Netprofitaftertax}}{\text{TotalEquity}}$
Institutional Ownership	$KI = \frac{\text{Institutionalshares}}{Outstandingshares}$

The data used in this study is based on the financial statements of financial sector companies for the period 2017–2021. The financial statements are sourced from www.idx.co.id and the company's official website for five periods, 2017–2021. In comparison, the data collection techniques used by researchers are descriptive statistical analysis, multiple linear regression analysis, classical assumption test, and hypothesis testing.

Descriptive statistical analysis is a statistical test that is used to analyze data descriptively or as an explanation of data that has been collected to provide an overview of data descriptions on independent and dependent variables that can be known from the mean, lowest value, and the highest value [23]. Descriptive statistics provide an overview between the two variables, and a summary of describing data so that the data produces clear and understandable information.

To test how the relationship between the independent variables on the dependent variable can use multiple linear regression analysis. Multiple Linear Regression Analysis is used for more than one independent variable, with only one dependent variable. This analysis can explain the relationship and influence between the independent and dependent variables [23]. The formulation is as follows:

$$KP = \alpha + \beta 1(SA) + -\beta 2(SM) + -\beta 3(SK) + \beta 4(SIZE) + e \quad (1)$$

$$\begin{aligned} KPa = {} & \alpha + \beta 1(SA) + -\beta 2(SM) + -\beta 3(SK) + \beta 4(SIZE) \\ & + \beta 5\ KI * SA * SM * SK * SIZE + e \end{aligned} \quad (2)$$

Note: KP is Company Performance, SA is Asset Structure, SM is Capital Structure, SK is Ownership Structure, and SIZE is Company Size. β1, β2, β3, β4 is the regression coefficient of the independent variable. α is a constant and e is an error (Table 1).

4 Result and Discussion

4.1 Descriptive Statistical Analysis

Based on the results of the SPSS output, the descriptive statistical analysis test recapitulation was obtained as follows Table 2. Table 2 shows that, on the institutional ownership variable, the lowest value is 0.03, the highest value is 0.99, the average value is 0.7025, and the standard deviation is 0.21767. Institutional Ownership is a moderating variable that has an average value that is greater than the standard deviation value.

The variable return on assets obtained the lowest value of -73.83, the highest value of 25.87, the mean of 1.0922, and the standard deviation of 7.04634. Return on assets has a high standard deviation value compared to the average value, indicating that assets are used efficiently to generate net income from company operations. The variable return on equity obtained the lowest value of -94.01, the maximum value of 36.50, the average count of 3.3317, and the standard deviation of 16.33029. The average value of the variable Return on assets has a low value compared to the standard deviation value. This indicates that the company has an advantage in competition between companies, and the capital invested by investors will increase annual growth. The share price will also increase in value.

In the Table 2, the asset structure variable shows that the asset structure has a value range of 0.00 to 1.00. This data can indicate that the distribution is relatively small because the standard deviation value is smaller than the average value. due to the acquisition of a minimum score of 0.00, a maximum value of 1.00, with an average value of 0.8851, and a standard deviation of 0.19570. The capital structure variable obtained a minimum value of -0.52, a maximum weight of 3.17, an average count (mean) of 1.5667, and a standard deviation of 1.08997. These data can show that the capital structure has a value range of -0.52 to 3.17.

The ownership structure variable produces a test for a minimum value of 0.03, a maximum value of 0.99, a mean value of 0.7025, and a standard deviation of 0.21767. The data can show that the ownership structure has a value range of 0.03 to 0.09, where the standard deviation value is smaller than the average value, so the data distribution is small. The variable company size obtained a minimum value of 9.20, a maximum weight of 29.07, a mean of 18.6668, and a standard deviation of 8.90186. The data can show that the size of the company has a small range of data distribution values, namely 9.20 to 29.07, because the standard deviation value is smaller than the average value.

4.2 Multiple Linear Regression Analysis

Based on the results of the SPSS output, the recapitulation of multiple linear regression analysis tests is obtained, as follows Table 3.

4.3 Effect of Asset Structure on Company Performance

Asset structure has a significant role because fixed assets are related to the company's production process as a source of increasing company profits. The t-value was 1.570, and the significance value was $0.018 < 0.05$. This shows that the Asset Structure positively affects the company's performance.

The results of this test indicate that asset structure has an influence on company performance, so that h1 is accepted [17]. With a high asset structure, depreciation and amortization will increase, and this will also increase the company's profit so that the company's performance will also increase. Companies with a high asset structure value have a good view of investors because they have large amounts of fixed assets [8].

The composition of the asset structure, in this case, must be able to support revenue generation to increase the company's success. In other words, an asset structure does not guarantee the allocation level for each asset component, both current and fixed assets. Research conducted by [9, 24, 25] is in line with this hypothesis if the company has a significant asset structure value, this situation can look quite suitable for investors and other stakeholders because the company is guaranteed in the form of substantial fixed assets. So that the asset structure affects the company's performance.

4.4 Effect of Capital Structure on Company Performance

The capital structure has a significant role because it shows how well liabilities finance the company's financing compared to equity. Based on the test in this research, it was obtained that the t value was -0.643 and a significance value of $0.0521 > 0.05$. This shows that capital structure has no effect on company performance, so h2 is rejected.

The company has a high debt-to-equity ratio it uses debt with an amount greater than the capital it has. Even though the company adds or reduces its debt, it will not affect its performance because it prefers internal funding to meet its needs rather than an external budget. So that it also causes the company's performance to be bad for investors because it will cause risks to the company's operations. Study [19, 26] stated that financial managers cannot increase the value of the company by changing the proportion of debt and equity used to finance the company and research conducted by [5, 11, 20] which states that the financing component in the form of debt for companies is still a complement to global corporate financing, which mainly comes from internal funds so that the capital structure does not affect the company's performance.

4.5 The Effect of Ownership Structure on Company Performance

Based on the test in this research, the t-count value is 3.232, and the significance value is $0.001 < 0.05$. This shows that the Ownership Structure positively affects the Company's Performance. The ownership structure has a high value, the company's debt increases, and the company's performance will decrease. The greater the ownership of an institution, the greater the voting power and the more compelled one is to oversee management. When the company's performance improves, the administration will continue to optimize its performance. This is in contrast to research [27], which states that ownership structure does not affect company performance (Table 4).

However, this study's results align with research conducted by [12] which states that a high ownership structure will hinder the strategic decision-making process for the company in the future due to conflicts so that the ownership structure affects the company's performance.

4.6 The Effect of Company Size on Company Performance

Based on the test in this study, the t-value was 1.937 and a significance value of $0.054 > 0.05$. This shows that company size has a negative effect on company performance. Research on company size in this study shows that there is no effect on company performance so that h4 is rejected. This is because the natural logarithm used to measure total

Table 2. Descriptive Statistical Analysis Test Results

Variable	Minimum	Maximum	Mean	Std. Deviation
Asset Structure	0.00	1.00	0.8851	0.19570
Capital Structure	-0.52	3.17	1.5667	1.08997
Ownership Structure	0.03	0.99	0.7025	0.21767
Company Size	9.20	29.07	18.6668	3.90136
Return on Assets	-73.83	25.87	1.0922	7.04634
Return on Equity	-94.01	36.50	3.3317	16.33029
Institutional Ownership	0.03	0.99	0.7025	0.21767

Table 3. Regression Analysis Test Results

Variable	B	Std. Error	Beta	t	Sig.
Asset Structure	3.750	4.818	0.047	0.778	0.037
Capital Structure	0.001	0.003	0.012	0.198	0.043
Ownership Structure	10.440	4.782	0.144	2.183	0.030
Company Size	-0.032	0.271	-0.008	-0.119	0.906

Table 4. Moderating Regression Analysis Test Results

Variable	**B**	**Std. Error**	**Beta**	**t**	**Sig.**
Asset Structure	30.066	19.149	0.375	1.570	0.018
Capital Structure	-2.464	3.834	-0.170	-0.643	0.521
Ownership Structure	191.707	59.315	2.618	3.232	0.001
Company Size	1.804	0.931	0.443	1.937	0.054
Asset Structure x Institutional Ownership	-38.367	28.257	-0.590	-1.358	0.016
Capital Structure x Institutional Ownership	3.251	5.067	0.175	-0.642	0.522
Ownership Structure x Institutional Ownership	-81.379	19.716	-1.356	-4.127	0.000
Company Size x Institutional Ownership	-2.562	1.390	-0.671	-1.843	0.056

assets does not reflect the value of assets as they should. The size of the company in this study is in a bad condition, because it is less stable and less profitable in generating profits [28, 29]. The company has a large company size, the company has financial difficulties. After all, the company needs to be more careful when making financial expenditures. This research is in line with [14, 30], which state that company size does not affect company performance.

4.7 Effect of Asset Structure on Company Performance with Institutional Ownership as Moderating

Based on the table above, the results of the moderation test of the asset structure and institutional ownership can be seen with a regression coefficient of -33.367 with a t-value of -1.358 and a significance value of 0.016 < 0.05, this indicating that institutional ownership can moderate the relationship between asset structure with institutional ownership by weakening the relationship between asset structure and company performance so that h5 is accepted.

The results of this study indicate that when the value of the asset structure is high, it can affect a company's performance. The value of the assets owned by the company is significant, then this can generate profits for the company [31]. The more institutional ownership, the more optimal the number of assets the company owns for financial performance to gain profit. Institutional ownership weakens the relationship between asset structure and company performance because high institutional shareholders are passive decision-makers, so they do not participate in making decisions to use external funds as company capital by pledging assets to the company [32].

4.8 Effect of Capital Structure on Company Performance with Institutional Ownership as Moderating

The results of the moderation of the variable capital structure and the regression coefficient can see institutional ownership of 3.251 with a count of 0.642 and a significance value of 0.522, which is greater than 0.05, thus indicating that institutional ownership cannot moderate the relationship between capital structure and institutional ownership so that h6 is rejected.

The results of this study indicate that companies use debt in large amounts from the amount of capital they have, thus causing the value of the obligation to equity ratio to be high. This also causes the company's performance to be bad for investors because it will cause risks to the company's operations [33]. The results of this study indicate that changes in company debt used for company operational activities cannot generate optimal profits with a lot of debt costs. So that institutional ownership does not provide a moderating effect on the relationship between capital structure and company performance [34].

4.9 Effect of Ownership Structure on Company Performance with Institutional Ownership as Moderating

The moderating result of the variable ownership structure and institutional ownership shows that the regression coefficient value is -81,379 with a count value of -4.127 and a significance value of 0.000, which is smaller than 0.05, indicating that institutional ownership can moderate the relationship between ownership structure and institutional ownership, by weakening the relationship between ownership structure and company performance so that h7 is accepted.

This study's results that a good ownership structure will also affect company performance. Management share ownership is the percentage of ordinary shares owned by management. The existence of management ownership causes supervision of the policies taken by company management. The company's management takes an approach because of management's ownership to be supervised. Shares owned by management are ordinary shares which are an encouragement for principals and agents so that management carries out its duties following the direction of shareholders so that the company's performance increases. With shared ownership, managers will make decisions carefully so that they can benefit from the right decision, and when the manager makes the wrong decision, then the party must bear the loss because it has taken the bad decision. This study's results align with research [35] which states that institutional ownership can moderate the relationship between ownership structure and institutional ownership by weakening the relationship between ownership structure and company performance.

4.10 The Influence of Company Size on Company Performance with Institutional Ownership as Moderating

The moderating result of the variable firm size and institutional ownership produces a regression coefficient value of -2.562 with a t-count value of -1.843 and a significance value of 0.056 > 0.05, indicating that institutional ownership cannot moderate firm size with institutional ownership and weakens the connection between ownership structure with company performance so that h8 is rejected.

The results of this study indicate that company size cannot generate good profits, so it will affect company performance to decrease. Company size represents the size of the company's assets, and company size affects company performance. The bigger the company, the more assets it has and the more likely it is to be in debt. This impacts the use of company debt as a source of funds more increased than the equity value achieved by the company. Institutional ownership cannot moderate the relationship between firm size and institutional ownership and weakens the relationship between ownership structure and company performance [36]. High institutional shareholders are passive decision-makers, so they do not participate in making decisions to use external funds as company capital by providing financial information—about the company to investors. So, institutional ownership does not moderate the relationship between firm size and firm performance.

5 Conclusion

From the study results, it can be concluded that (1) asset structure positively affects company performance. This shows that if the asset structure owned by the company is in good condition, then the company's performance will be good. (2) Capital structure has a positive effect on company performance. This shows that the quality of funding owned by the company is good, so it also affects a company's performance. (3) Ownership structure has no influence on company performance. This shows that the manager has yet to feel the benefits of ownership and a great sense of responsibility for the company. (4) Company size has a negative effect on company performance. This shows that the company's performance could be better, but it has a destructive impact on the company and makes it less stable and unable to generate sufficient profits. (5) Asset structure, capital structure, ownership structure, and firm size simultaneously affect firm performance.

(6) asset structure, capital structure, ownership structure, firm size, and firm performance strengthen the effect of institutional ownership as moderating variables.

Suggestions for further research are that future researchers can develop other factors that can affect company performance by using samples in different types of sectors. One crucial aspect that the market will assess is the company's capital structure condition. In making financial decisions, managers need to consider how much debt they need to finance the company. Owners or shareholders of the company must pay attention to the size of the percentage of shares owned by management because this can improve company performance through the company's capital structure.

Acknowledgment. This research was supported by the Accounting Study Program, University of Muhmamadiyah Semarang, through a P.K.K.M program grant from the Ministry of Education, Culture, Research and Technology.

References

1. S. J. Cho, C. Y. Chung, and J. Young, "Study on the Relationship between CSR and Financial Performance," *Sustainability*, vol. 11, no. 2, p. 343, 2019.
2. Hannoon, A. Al-Sartawi, M. A. Musleh, and A. A. Khalid, "Relationship between financial technology and financial performance," in *The Big Data-Driven Digital Economy: Artificial and Computational Intelligence*, Springer, 2021, pp. 337–344.
3. Gartenberg, A. Prat, and G. Serafeim, "Corporate purpose and financial performance," *Organ. Sci.*, vol. 30, no. 1, pp. 1–18, 2019.
4. Ardiyanto, N. Wahdi, and A. Santoso, "Pengaruh Return on Assets, Return on Equity, Earning Per Share dan Price To Book Value Terhadap Harga Saham," *J. Bisnis dan Akunt. Unsurya*, vol. 5, no. 1, pp. 33–49, 2020.
5. S. Alawi, "Relationship between capital requirement, ownership structure, and financial performance in Saudi Arabian listed companies," *Asian Econ. Financ. Rev.*, vol. 9, no. 9, pp. 1077–1090, 2019.
6. M. S. Shabbir and O. Wisdom, "The relationship between corporate social responsibility, environmental investments and financial performance: evidence from manufacturing companies," *Environ. Sci. Pollut. Res.*, vol. 27, no. 32, pp. 39946–39957, 2020.
7. Okafor, B. N. Adeleye, and M. Adusei, "Corporate social responsibility and financial performance: Evidence from US tech firms," *J. Clean. Prod.*, vol. 292, p. 126078, 2021.
8. Z. A. F. Al-Slehat, "Impact of Financial Leverage, Size and Assets Structure on Firm Value: Evidence from Industrial Sector, Jordan," *Int. Bus. Res.*, vol. 13, no. 1, p. 109, 2019, doi: https://doi.org/10.5539/ibr.v13n1p109.
9. Rababah, L. Al-Haddad, M. S. Sial, Z. Chunmei, and J. Cherian, "Analyzing the effects of COVID-19 pandemic on the financial performance of Chinese listed companies," *J. Public Aff.*, vol. 20, no. 4, p. e2440, 2020.
10. M. Asad, K. I. Iftikhar, and A. Y. Jafary, "Relationship between capital structure and financial performance of textile sector companies," *Kashmir Econ. Rev.*, vol. 28, no. 1, 2019.
11. Purbawangsa and H. Rahyuda, "The effect of ownership structure, dividend policy, composition of the board of directors on financial performance and share return," *Accounting*, vol. 8, no. 1, pp. 1–8, 2022.
12. S. Iqbal, A. Nawaz, and S. Ehsan, "Financial performance and corporate governance in microfinance: Evidence from Asia," *J. Asian Econ.*, vol. 60, pp. 1–13, 2019.

13. M. Aksoy, M. K. Yilmaz, E. Tatoglu, and M. Basar, "Antecedents of corporate sustainability performance in Turkey: The effects of ownership structure and board attributes on non-financial companies," *J. Clean. Prod.*, vol. 276, p. 124284, 2020.
14. W.-L. Lin, J.-H. Cheah, M. Azali, J. A. Ho, and N. Yip, "Does firm size matter? Evidence on the impact of the green innovation strategy on corporate financial performance in the automotive sector," *J. Clean. Prod.*, vol. 229, pp. 974–988, 2019.
15. H. Ayuba, A. J. Bambale, M. A. Ibrahim, and S. A. Sulaiman, "Effects of Financial Performance, Capital Structure and Firm Size on Firms' Value of Insurance Companies in Nigeria.," *J. Financ. Account. Manag.*, vol. 10, no. 1, 2019.
16. M. C. Jansen and W. H. Meckling, "Theory of the Firm: Managerial," *Agency Costs Ownersh. Struct.*, 1976.
17. T. Handayani, Y. Ladewi, and S. Rahayu, "The Effect of Current Ratio, Return on Assets, Debt to Equity Ratio and Economic Value Added on Stock Returns in Manufacturing Companies Listed on the IDX," *Int. J. Art Soc. Sci.*, vol. 5, no. 8, pp. 31–41, 2022.
18. S. Hasan, A. A. M. Kassim, and M. A. A. Hamid, "the Impact of Audit Quality, Audit Committee and Financial Reporting Quality: Evidence From Malaysia," *Int. J. Econ. Financ. Issues*, vol. 10, no. 5, pp. 272–281, 2020, doi: https://doi.org/10.32479/ijefi.10136.
19. O. Al Farooque, W. Buachoom, and L. Sun, "Board, audit committee, ownership and financial performance–emerging trends from Thailand," *Pacific Account. Rev.*, 2020.
20. M. S. Farooqui and A. Nagendra, "The Impact of Person Organization Fit on Job Satisfaction and Performance of the Employees," *Procedia Econ. Financ.*, vol. 11, no. 14, pp. 122–129, 2014, doi: https://doi.org/10.1016/s2212-5671(14)00182-8.
21. H. Younis and B. Sundarakani, "The impact of firm size, firm age and environmental management certification on the relationship between green supply chain practices and corporate performance," *Benchmarking An Int. J.*, vol. 27, no. 1, pp. 319–346, 2019.
22. F. Jouini and A. S. Messai, "Corporate social responsibility and the corporate financial performance: the moderator role of firm size," *Int. J. Crit. Account.*, vol. 11, no. 3, pp. 233–251, 2020.
23. U. Sekaran and R. Bougie, *Research methods for business: A skill building approach.* john wiley & sons, 2019.
24. Habibu Ayuba, Abdu Ja'afaru Bambale, Murtala Aminu Ibrahim, and Sulaiman Abdulwahab Sulaiman, "Effects of financial performance, capital structure and firm size on firms value of Insurance companies in Nigeria," *J. Financ. accounting, Manag.*, vol. 10, no. 1, pp. 57–74, 2019, [Online]. Available: https://web-p-ebscohost-com.ezproxy.uwc.ac.za/ehost/pdfviewer/pdfviewer?vid=0&sid=97ae76ac-2057-4cc8-9c9f-28a0d8c88adb%40redis
25. S. A. Javeed and L. Lefen, "An analysis of corporate social responsibility and firm performance with moderating effects of CEO power and ownership structure: A case study of the manufacturing sector of Pakistan," *Sustain. MDPI*, vol. 11, no. 1, 2019, doi: https://doi.org/10.3390/su11010248.
26. L. Santoso and I. G. Santasyacitta, "Ownership structure and financial performance of Islamic bank in Indonesia," *Int. J. Islam. Econ. Bus. Manag. Emerg. Mark.*, vol. 1, no. 1, pp. 47–62, 2020.
27. E. Akben-Selcuk, "Corporate social responsibility and financial performance: The moderating role of ownership concentration in Turkey," *Sustainability*, vol. 11, no. 13, p. 3643, 2019.
28. H. Nguyen and D. T. Doan, "The impact of intellectual capital on firm value: Empirical evidence from Vietnam," *Int. J. Financ. Res.*, vol. 11, no. 4, pp. 74–85, 2020, doi: https://doi.org/10.5430/ijfr.v11n4p74.
29. P. Andries and U. Stephan, "Environmental innovation and firm performance: How firm size and motives matter," *Sustainability*, vol. 11, no. 13, p. 3585, 2019.

30. R. Ibrahim, "Corporate governance effect on financial distress: evidence from In-donesian public listed companies," *J. Econ. Bus. Account. Ventur.*, vol. 21, no. 3, p. 415, 2019, doi: https://doi.org/10.14414/jebav.v21i3.1626.
31. Y. Nuryani and D. Sunarsi, "The Effect of Current Ratio and Debt to Equity Ratio on Deviding Growth," *JASa (Jurnal Akuntansi, Audit dan Sist. Inf. Akuntansi)*, vol. 4, no. 2, pp. 304–312, 2020.
32. F. Sukesti, I. Ghozali, F. Fuad, A. K. Almasyhari, and N. Nurcahyono, "Factors Affecting the Stock Price: The Role of Firm Performance," *J. Asian Financ. Econ. Bus.*, vol. 8, no. 2, pp. 165–173, 2021, doi: https://doi.org/10.13106/jafeb.2021.vol8.no2.0165.
33. N. Nurcahyono, A. N. Hanum, I. Kristiana, and I. D. Pamungkas, "Predicting fraudulent financial statement risk: The testing dechow f-score financial sector company inindonesia," *Univers. J. Account. Financ.*, vol. 9, no. 6, pp. 1487–1494, 2021, doi: https://doi.org/10.13189/ujaf.2021.090625.
34. P. Jaimuk, N. Nilapornkul, and S. Ngudgratoke, "Impact of a mediator on corporate governance characteristics and real earning management of Thai listed companies," *Test Eng. Manag.*, vol. 83, no. August 2021, pp. 5912–5924, 2020, [Online]. Available: https://www.scopus.com/inward/record.uri?eid=2-s2.0-85083000162&partnerID=40&md5=2d3e3b8c33311fdaee636eba43732f44
35. Ngatno, E. P. Apriatni, and A. Youlianto, "Moderating effects of corporate governance mechanism on the relation between capital structure and firm performance," *Cogent Bus. Manag.*, vol. 8, no. 1, 2021, doi: https://doi.org/10.1080/23311975.2020.1866822.
36. E. Kusumawati and A. Setiawan, "the Effect of Managerial Ownership, Institutional Ownership, Company Growth, Liquidity, and Profitability on Company Value," *Ris. Akunt. dan Keuang. Indones.*, no. Vol 4, No 2 (2019), pp. 136–146, 2019, doi: https://doi.org/10.23917/reaksi.v4i2.8574.