## Examining the Influence of Macroeconomic Factors and Corporate Governance on Firm Performance in the ACE Market

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**Abstract:** This study focused on investigating the impact of macroeconomic factors and corporate governance on the financial performance of firms listed on the ACE Market of Bursa Malaysia. The ACE Market serves as a platform for smaller, emerging companies, providing them with an opportunity to raise capital with less stringent requirements compared to the Main Market. Using a panel data set of 72 companies over the period 2018-2022, the research employed panel-corrected standard errors (PCSE) regression. PCSE is a panel regression model that accounts for contemporaneous correlations, corrects for deviations from spherical errors, and enhances inference from linear models. The analysis revealed that ACE market companies, on average, show a negative return on equity (ROE) but positive numbers of women (NOW) and board meetings (NOM). The PCSE regression results, however, failed to show a statistically significant relationship between NOW and ROE, suggesting that the presence of women on the board of directors does not significantly impact the firm performance. The findings provide valuable insights for the firms in the ACE market companies regarding the consideration of important factors in improving firm performance. The research's broader goal is to inform the development of strategies fostering enhanced overall performance and sustainability in the ACE market. The study also suggests several recommendations such as broadening the scope and inclusion of international trade dynamics variables.

**Keywords**: Firm performance, Corporate Governance, Macroeconomics Factor, consumer product and services sector, ACE Market

## 1. Introduction and Background

The health and effectiveness of a firm are evaluated through financial performance, which considers assets and sales (Siddiqui, YuSheng, & Tajeddini, 2023). Internal stakeholders assess this measure to gauge the well-being of the firm, while external stakeholders use it to evaluate its performance. There are two types of analysis used: technical analysis based on market statistics and fundamental analysis based on financial statements (Brealey and Myers, 1991). According to Kyere and Ausloos (2021), a company's strong financial performance draws investors and helps decision-makers. Additionally, affects market reactions and is essential for risk assessment to improve a company's standing in the marketplace, drawing clients, financiers, and possible workers. In this study, Return on Equity (ROE) has been used as the measure of firm performance. ROE measures both the profitability and efficiency of a corporation in managing its growing capital. ROE indicates the company's ability to earn significant profits without needing to increase capital. Efficient evaluation of the firm may be achieved by monitoring the rise in ROE, as it indicates the ability to generate significant profits without requiring more cash (Purwohandoko & Iriani, 2021).

Macroeconomic variables play a pivotal role in understanding and foreseeing overall financial execution. These components are external to the organization and lie outside the realm of management's control. Bobenič-Hintošová, Bobenič, Hajduová, and Szajt (2020) highlight GDP as a degree of a country's total production value, while inflation rates demonstrate the overall cost of products and services. In addition, corporate governance's relationship with business performance is a crucial focus of empirical and theoretical research in the field of corporate studies. Corporate governance has gained prominence and evolved as a crucial tool in recent decades (Guluma,2021). The rapid expansion of privatizations, the recent global financial crises, and the advancement of financial institutions have strengthened the enhancement of corporate governance procedures. Efficient corporate governance processes are crucial for enhancing business performance since they enhance its reputation, boost investor trust, and minimize the likelihood of fraudulent behavior (Nguyen & Dao, 2022).

Bursa Malaysia plays a pivotal role in Malaysia's economic development by providing two distinct segments: the Main Market and the ACE Market. The Main Market caters to well-established businesses, while the ACE

Market focuses on facilitating fundraising for smaller, emerging enterprises. Established in 2009, the ACE Market offers startups a platform to secure additional funding with its flexible standards. This fosters economic growth by providing smaller companies the opportunity to thrive. Bursa Malaysia's significance in capital formation and as a venue for IPOs further emphasizes its crucial role in supporting Malaysia's economic progress (Saddam et al., 2021). However, the performance of ACE market companies is impacted by various macroeconomic and corporate governance factors, posing challenges for the whole market. The objective of this research is to examine the relationships and contribute to the existing body of research. This process will uncover gaps and offer valuable perspectives for enhancing performance. It aims to pinpoint precise areas for improvement.

The main objective of this study is to analyze the factors that affect firm performance, enabling companies to make well-informed decisions regarding corporate governance and navigate the macroeconomic landscape. The goal is to devise strategies that improve performance and ensure sustainability in the consumer product and services sector of the ACE market. The consumer products sector has been selected since this sector is vital to the global economy because of its tight ties to other sectors. It is the foundation of many nations' economies and a major contributor to the country's GDP. It also catalyzes other sectors of the economy, particularly the retail and advertising sectors.

Both Corporate government and macroeconomics variables are crucial in determining the form performance. The agency theory demonstrates the crucial role of corporate governance in aligning the interests of stakeholders and enhancing the financial performance of the company. Through the implementation of effective control and supervision mechanisms, corporate governance can mitigate conflicts of interest and enhance the value for shareholders. Effective governance structures enable organizations to access information quickly to make an informed decision. Additionally, economic variables that are associated with improvements in income distribution include higher growth rates, higher income levels, higher investment rates, real depreciation (particularly in low-income countries), and improvements in the terms of trade. The variables are also highly associated with firm performance. Therefore, this study aims to examine the contribution of macroeconomic variables and corporate governance to firms in the ACE market.

# 2. Literature Review

## **Financial Performance**

Financial performance may be defined as the efficiency with which a corporation makes profits, encompassing several other aspects as well. It reflects all the contributing components to profitability, both individually and collectively. Financial performance is crucial for the organization's overall performance. The statement evaluates the financial health and sustainability of the organization by assessing its potential to generate money from its assets (Fatihudin & Mochklas, 2018). Financial ratios are commonly used to assess a company's financial health and forecast its performance, according to Masa'deh, Tayeh, Jarrah & Tarhini (2015). Financial ratios are the predominant method of performance evaluation in the field of finance (Naz & Ijaz, 2016). Typically, investors and creditors are primarily concerned with a firm's financial performance as it offers insights into the firm's economic status, ensuring the safety and profitability of their investments. Various stakeholders, including management, investors, and lenders, will evaluate a business's financial performance from different perspectives and with specific goals. Therefore, a business's financial success cannot be accurately assessed using only one measure. Various metrics, both individually and jointly, are utilized to conduct this evaluation (Fatihudin & Mochklas, 2018). Financial performance significantly influences growth potential, as well as the success and failure of commercial organizations. It is a crucial factor in all economic decision-making. ROA and ROE are often used metrics by investors, creditors, and managers to measure a company's financial success (Samiloglu, Oztop, & Kahraman, 2017). This study uses ROE as a financial performance indicator.

## **Macroeconomics Factors**

Macroeconomics is a field of economics that examines the whole behavior of an economy, encompassing markets, businesses, consumers, and governments (Egbunike & Okerekeoti, 2018b). Macroeconomics originates from the Greek prefix makro, meaning "large," and economics. It is a field of economics that focuses on the overall performance, structure, behavior, and decision-making of the economy (Egbunike & Okerekeoti,

2018). The connection between macroeconomic conditions and corporate performance is intricate, demonstrated by the inconclusive findings in past studies. It assesses the performance of an economy, identifies affecting variables, and predicts future performance. Macroeconomic factors such as GDP, and interest rates impact corporate performance (Soukhakian & Khodakarami, 2019). GDP quantifies the total worth of goods and services generated in a nation, and interest rates establish the fee for using assets. Numerous research has examined the connection between macroeconomic conditions and publicly listed companies' performance; yet experts have produced inconsistent results (Romus, Anita, Abdillah, & Zakaria, 2020).

## **Gross Domestic Product (GDP)**

GDP is the aggregate value of all products and services generated within a country's economy during a specific period. It comprises all end products and services created by economic entities within a country, irrespective of ownership, and not intended for resale (Egbunike & Okerekeoti, 2018). The economic well-being of nations and its effects on different industries can be effectively evaluated through the Gross Domestic Product (GDP), making it a critical measure. A decrease in GDP has the potential to result in a diminished impact. The profitability of a company can be adversely impacted by a decrease in credit demand, whereas a growing economy is often associated with positive GDP growth (Tanaka, Bloom, David, & Koga, 2020). This correlation is particularly relevant for microfinance customers. To reduce the effects of local economic fluctuations, it is recommended to limit financial market integration. This approach is particularly beneficial during periods of economic decline as it helps protect consumer interests. As per Mwangi (2013), GDP is a commonly applied macroeconomic statistic that gauges the whole economic activity in an economy; its growth rate is indicative of the economic cycle's condition. It serves as the primary indicator of output and economic activity globally.

## Interest rate

Interest rates are the cost that a borrower incurs for using money borrowed from a lender or the charge associated with borrowed assets. The firm's performance is closely related to interest rates, as higher rates affect global liquidity (Miles & Ezzell, 1980). The study highlights the importance of corporate funding strategies, stating that in an ideal situation, a company's revenue generation technique is less important than its assets. Despite the expense, borrowing money is considered a wise decision due to the tax benefits loans provide, making them more appealing (Miles and Ezzell, 1980). The liquidity principle emphasizes the significance of interest rates in managing the balance between desired cash reserves and their actual availability. This theory encourages economic growth by encouraging investment and savings (Bondinuba, Bondinuba, Opoku, Owusu-Manu, & Mittal, 2022).

## **Corporate Governance**

Corporate governance has become a crucial tool for improving corporate performance in response to the global financial crisis, emphasizing the need for strong corporate governance practices and frameworks. Corporate governance problems have garnered significant study interest over the years due to their possible impact on the performance of enterprises in both developed and emerging countries (Puni & Anlesinya, 2019). Corporate governance encompasses rules and protocols that oversee a company, ensuring a balance between the interests of stakeholders. It covers all facets of management, serving as the basis for attaining a company's objectives, including action plans, performance evaluation, and corporate transparency (Al-Ahdal, Alsamhi, Tabash, & Farhan, 2020). Having a strong foundation of high-quality corporate governance is crucial for enhancing the enduring effectiveness and viability of enterprises. Enhanced corporate governance enhances an organization's reputation, boosts shareholder trust, and reduces the risk of fraud. The board of directors (BoD), external and internal audits, management, audit committee, and ICM are crucial elements of effective corporate governance that aid in detecting anomalies at an early stage of the project life cycle. Corporate governance varies among companies and countries, but the main goals remain consistent; to attain profitability, ensure outstanding performance, and supervise management to safeguard shareholders' interests. Inadequate or unsuitable corporate governance may result in abuses, fraud, and negative outcomes (Alabdullah, Ahmed, & Kanaan, 2022).

## **Board Meeting**

Studies on the frequency of board meetings and their influence on business performance have produced varied results. The empirical findings indicate that the frequency of board meetings typically has a beneficial influence on financial success. Similarly, many researchers (Lipton and Lorsch, 1992; Jensen, 1993) have suggested that

rare board sessions may not allow members enough opportunity to address important concerns. Frequent board meetings can enhance the performance of listed firms in Ghana by effectively reducing conflict of interest and agency costs. These meetings allow board members to assess and suggest improvements to the policies and programs implemented by the management. Kanakriyah (2021) found an initial negative correlation indicating a harmful impact on performance, followed by an improvement a year later. Pucheta-Martínez and Gallego-Álvarez (2020) discovered favorable correlations between board meeting frequency and firm performance, highlighting improved consultation, oversight, and management. Khan, Al-Jabri, and Saif's (2021) study of 328 Malaysian publicly listed enterprises found a correlation between higher board meeting frequency and lower performance.

# **Gender diversity**

The impact of gender diversity on corporate performance has been widely studied. Various theoretical frameworks suggest that gender diversity can enhance a company's success. Gender diversity is believed to impact corporate performance by introducing a variety of skills, knowledge, experience, views, values, and leadership styles (Galbreath, 2018). Rahman, Zahid, and Al-Faryan (2023) discovered that having women in leadership roles led to higher financial reporting conservatism and lower tax aggression. Faccio, Marchica, and Mura (2016) observed a negative correlation between the presence of female CEOs and corporate risk-taking and leverage. Moreover, female CFOs were linked to lower company risk and more cautious financial reporting.

## Hypotheses

H<sub>1</sub> - There is a relationship between gender diversity and a firm's financial performance.

H<sub>2</sub>- There is a relationship between board meetings and the firm's financial performance.

H<sub>3</sub> - There is a relationship between Gross Domestic Product and the firm's financial performance.

H<sub>4</sub> - There is a relationship between Interest Rate and the firm's financial performance.

## 3. Research Methodology

## Sample and data

The research sample is centered on the ACE Market companies in Malaysia. This study focused on 72 publicly listed firms that met specified requirements, particularly those in the consumer products and services industry. The data for this study was gathered by selecting the accessibility of the firm's financial information. The macroeconomic and ROE data for five years (2018 to 2022) is retrieved by using Refinitiv Eikon Datastream. The corporate governance variables data is retrieved from the annual reports of the firms. The output of the panel dataset for this study is 276 observations at the firm level.

Variables (abbreviations)	Explanation
Dependent variable	
Return on equity (ROE)	Net income / Total equity
Independent variables	
Macroeconomics	
Growth domestic product rate (GDP)	GDP Growth
Interest rate (INTEREST)	
Corporate governance	
Board meeting (NOM)	Number of meetings
Gender diversity (NOW)	Number of women/Total number of board members

## Table 1: Variables measurement

# Figure 1: Research Framework INDEPENDENT VARIABLE

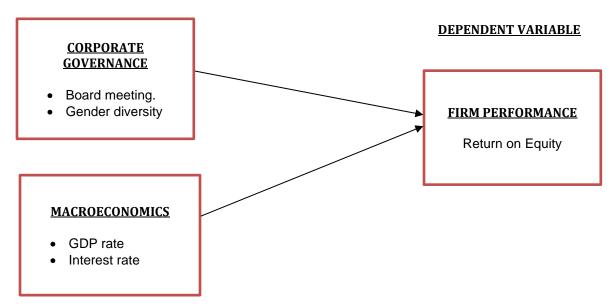


Figure 1 shows the research framework which consists of four independent variables, and one dependent variable. The independent variables are grouped into two categories which are macroeconomics and corporate governance. Macroeconomic variables consist of GDP rate (GDP), and interest rate (INTEREST). The corporate governance variables consist of board meetings (NOM) and gender diversity (NOW). Meanwhile, the dependent variable, the firm performance is measured by using ROE.

# **Regression model**

The study examines whether microeconomics and corporate governance have impacts on performance. The dependent variable of firm performance is ROE. According to Hair, Blck, Babin, and Aderson (2009), the expression in the methodology is based on the underlying hypotheses (serial correlation and heteroscedasticity) that were tested. Applying the regression formula as follows. *FP* (*ROE*<sub>it</sub>) =  $a_0 + \beta INFR_{it} + \beta_2 GDP_{it} + \beta_3 INTR_{it} + \beta_4 NOM_{it} + \beta_5 NOW_{it} + \varepsilon_{it}$ 

# 4. Results

This study uses the return on equity, number of women, number of meetings, GDP, inflation rate, and interest rate to analyze financial success. The World Bank and Bursa Malaysia provided the data, which will be analyzed between 2018 and 2022. 72 businesses from Bursa Malaysia's ACE market are included in this research. This section shows results for descriptive statistics, correlation, and regression.

## **Descriptive statistics**

The descriptive statistics for each variable are compiled in this study for the sample period of 2018 to 2022. The average (median) scores in our sample are 13.51 (12.5), 5.59 (5.00), 5.29 (4.84) and 14.10 (13.12) for NOW, NOM, GDP, and interest respectively. The variable of interest rate shows a greater score in comparison to the NOW, NOM, and GDP. Furthermore, the measurement of financial performance reveals that the mean (median) value of ROE is -0.082 (-0.035). According to Table 2 below, the descriptive analysis results for ACE market businesses listed on Bursa Malaysia show significant conclusions. The average Return on Equity (ROE) shows a negative performance, with significant variability among enterprises. Corporate governance, as assessed by the number of women (NOW), demonstrates a reasonable level, highlighting diversity. The number of meetings (NOM), shows a low level of variability, suggesting a well-balanced performance among organizations. The Malaysian GDP growth rate has a mean of 5.28%, indicating a minimal fluctuation in economic conditions. The statistical metrics offer a thorough analysis, highlighting the need to investigate the

elements affecting ROE, NOW, NOM, GDP, and INTEREST within the ACE market to enhance comprehension of firm performance. The descriptive data provide insights into the features of interest rates in Malaysia. The average interest rate is 14.09%.

	Mean	Median	Max	Min	SD	Observations
ROE	-0.082	-0.035	0.220	-0.770	0.175	360
NOW	13.511	12.500	54.550	0.000	12.836	360
NOM	5.589	5.000	13.000	2.000	1.474	360
GDP	5.285	4.843	8.694	3.092	2.073	360
INTEREST	14.092	13.120	16.290	12.450	1.473	360

# **Table 2: Descriptive Statistics**

## **Correlation analysis**

Table 2 displays the results of the correlation analysis for the independent and dependent variables. NOW, NOM, GDP and INTEREST have significant and negative correlations with ROE. As no variables correlate 0.70, there is no multicollinearity problem exists in the data.

	ROE	NOW	NOM	GDP	INTEREST
ROE	1				
NOW	-0.062	1			
NOM	-0.271***	-0.105*	1		
GDP	-0.040	0.034	-0.038	1	
INTEREST	-0.057	0.029	0.114*	-0.047	1

## **Table 3: Correlation analysis**

Notes: Standard errors \*, \*\*, and \*\*\* indicate significance at 10%, 5% and 1% respectively.

## **Regression analysis**

Table 4 reports the findings of the panel-corrected standard error (PCSE) regression for this study. The PCSE deals with the cross-sectional dependence problem in the data. In panel data analysis, Panel-Corrected Standard Errors (PCSE) address a critical concern: cross-sectional dependence. This arises when error terms across different cross-sectional units (e.g., countries, firms) are correlated, violating the standard regression assumption of independence. This violation leads to underestimated standard errors, inflating confidence in potentially spurious results, and potentially biased coefficient estimates. PCSE rectifies this issue by explicitly incorporating information about cross-sectional correlations into the variance estimation process. This results in robust standard errors that accurately reflect the uncertainty surrounding the estimates, even in the presence of dependence. Consequently, PCSE leads to more reliable statistical inference and potentially improved model fit (Beck & Katz, 1995).

Dependent Variables	ROE
Independent Variables	Random Effect Model
NOW	-0.00
	(0.199)
NOM	-0.032***
	(0.006)
GDP	-0.006***
	(0.000)
INTEREST	-0.007***
	(0.000)
Constant	0.237***
	(0.000)
R <sup>2</sup>	0.668
F	8.597***
	(0.000)
Hausman Test	4.000
	(1.000)
Wald Chi <sup>2</sup>	470.98***
	(0.000)

#### **Table 4: Regression analysis**

Notes: Significance levels: \*\*\* p < 0.01, \*\* p < 0.05, \* p < 0.1.

Based on Table 4, the regression analysis was to examine whether the performance of ACE market enterprises in Malaysia is affected by characteristics such as the number of women (NOW), number of meetings (NOM), Gross Domestic Product (GDP), and interest rate (INTEREST). The R-squared value of the model is merely 0.02, indicating that the model explains only 2 percent of the variation in ROE. The adjusted R-squared, which accounts for the number of predictors in the model, is negative (-0.008), suggesting that the model performs worse than an intercept-only model. Additionally, the F-statistic, which assesses the overall significance of the model, is 0.36 with a p-value of 0.876, indicating that the model lacks explanatory power.

The coefficients for all independent variables are negative, suggesting an inverse relationship with the performance of the company. The coefficients of NOM, GDP, and interest rate are statistically significant, as indicated by the p-values less than 0.05. It shows that these variables are significant at 95 percent confidence intervals. The negative relationship between the number of women and firm performance has a similar result to the previous study by Kweh, Ting, Zhang, and Hassan (2019). The result of several meetings with firm performance contrasts with the study of Buchdadi (2019). The attendance of a board meeting by a board of directors also has a statistically positive association with firm performance. The significant and negative relationship between GDP and firm performance is consistent with Sairin, Salisi and Bujang (2020). The interest rate shows a negative significant relationship, which is consistent with the findings by Bruyland, Lasfer, Maeseneire, and Song (2019).

#### Discussion

The results of this study shed light on the relationship between macroeconomic factors and corporate governance with financial performance. Results reveal that NOM, GDP, and interest rate have a negative significant relationship with the firm's performance. This aligns with existing literature that suggests that fluctuations in macroeconomic variables can exert considerable influence on corporate performance (Issah & Antwi, 2017). This is because the low NOM, GDP and interest rate have an impact on the firm's performance. However, only GDP and interest rate have a good relationship with firm performance. Moreover, the positive relationship between GDP and interest rates with firm performance highlights the nuanced dynamics at play within the macroeconomic landscape. While low GDP growth may signal economic stagnation and reduced consumer spending, thereby impacting firm revenues, it also indicates lower inflationary pressures and

potentially lower operating costs for firms (Tanaka, Bloom, David, & Koga, 2020). Similarly, while higher interest rates may increase borrowing costs for firms, they also reflect a strong economy with robust demand, which can boost overall corporate performance. ACE market companies are high-growth performance companies and some of them have not fully implemented the corporate governance elements. Hence, the  $H_2$ ,  $H_3$  and  $H_4$  are supported based on the result in this study.

## 5. Managerial Implications and Recommendations

The study has several limitations that can be considered in future research. Firstly, the sample size of 72 firms from the consumer product and services sector may not be fully representative of the entire ACE market. Using a larger and more diverse sample could enhance the generalizability of the findings. Secondly, relying solely on ROE as a measure of firm performance might overlook multidimensional aspects. Including additional indicators like market value or innovation could offer a more comprehensive understanding. Furthermore, the use of short periods may limit statistical power and reduce the precision of estimates or tests. Therefore, future studies may consider the period beyond five years. Lastly, future research in the ACE market should explore the influence of international trade dynamics, including variables like currency rates and global supply networks in the context of growing globalization. Studying the impact of digital transformation on strategy and operations would offer significant insights. Moreover, studying corporate social responsibility (CSR) practices and their impact on business performance is crucial due to increasing stakeholder worries. Lastly, investigating whether leadership styles and organizational culture influence corporate performance might reveal the impact of the human element on the success of ACE market enterprises. This research has the potential to enhance comprehension and provide practical benefits for everyone involved.

## Conclusion

Superior financial results are frequently cited as a key advantage of adopting excellent corporate governance practices and favorable macroeconomic conditions. Theoretically, this study contributes to the existing literature by providing evidence that not only firm-specific but country-specific variables are also crucial for maintaining the firm's competitiveness and sustainability. Companies that prioritize effective corporate governance may experience increased shareholder value due to better cash flow and decreased cost of capital. Companies with poor corporate governance systems are unable to provide long-term wealth generation for shareholders because the governance mechanisms are insufficient to hold leaders responsible for their management. Ultimately, in this study, the company's performance may be enhanced by primarily focusing on the number of meetings, GDP, and interest rate as key variables. This study aims to examine the impact of macroeconomics and corporate governance factors on business performance. The data for this research was obtained from 72 enterprises listed on the ACE market in Malaysia between 2018 and 2022. The study's results show that NOM, GDP, and interest rate are the most influential variables that can improve corporate performance if managed properly. Methodologically, this study contributes by using panel-corrected standard error (PCSE) for estimation which helps to cope with the problem of cross-sectional dependence. The study's results have significant consequences for management. Practically, the study's results aid firm stakeholders, decision-makers, policymakers, and academics in understanding the relationship between NOM, GDP, interest rates, and business performance. The study's findings demonstrate that firms may mitigate avoidable risks. Additionally, the results of this study might provide the foundation for future research in the field of corporate finance.

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