

## **Esg Performance And Firm Performance In Indonesia: Does External Assurance Matter?**

Lalu Rahmat Sohdi<sup>1✉</sup>, Armadani<sup>2</sup>, Komang Adhitanaya<sup>3</sup>, Al Putri Oktavia<sup>4</sup>

<sup>1</sup>*Economics and Bussiness, Ma Chung University, Indonesia,*

<sup>2</sup>*Islamic Economics and Business, Al-Kifayah Islamic College, Indonesia,*

<sup>3</sup>*Economics and Bussiness, Udayana University, Indonesia,*

<sup>4</sup>*Economics and Bussiness, Sriwijaya State Polytechnic, Indonesia.*

### **Abstract**

The high level of stakeholder awareness of sustainability issues creates a demand for companies to practice in accordance with principles that prioritize sustainability. This study aims to examine the moderating role of external assurance on the relationship between ESG performance and firm performance. This study uses a panel data regression approach to test the research hypothesis. The sample for this study consists of non-financial companies and includes 1,535 total observations. This study's findings reveal that ESG performance positively affects firm performance. However, the enhancement of ESG performance is not significantly moderated by external assurance. To the author's knowledge, this study is the first of its kind in Indonesia. Therefore, this study significantly fills the gap in previous research by comprehensively analyzing and providing empirical evidence regarding the role of ESG in improving firm performance.

**Kata Kunci:** *ESG performance; Firm Performance; External Assurance; Indonesia*

### **Abstrak**

Tingginya tingkat kesadaran pemangku kepentingan terhadap isu keberlanjutan mendorong perusahaan untuk menjalankan praktik yang selaras dengan prinsip-prinsip yang mengutamakan keberlanjutan. Penelitian ini bertujuan untuk menguji peran moderasi external assurance terhadap hubungan antara kinerja ESG dan kinerja perusahaan. Penelitian ini menggunakan pendekatan regresi data panel untuk menguji hipotesis penelitian. Sampel penelitian terdiri dari perusahaan non-keuangan dengan total 1.535 observasi. Hasil penelitian menunjukkan bahwa kinerja ESG berpengaruh positif terhadap kinerja perusahaan. Namun, peningkatan kinerja ESG tidak dimoderasi secara signifikan oleh external assurance. Sepengetahuan penulis, penelitian ini merupakan studi pertama di Indonesia yang membahas topik tersebut. Oleh karena itu, penelitian ini memberikan kontribusi penting dengan mengisi kesenjangan dalam penelitian sebelumnya melalui analisis yang komprehensif serta penyediaan bukti empiris mengenai peran ESG dalam meningkatkan kinerja perusahaan.

**Keywords:** *ESG performance; Firm Performance; External Assurance; Indonesia.*

Copyright (c) 2026 Lalu Rahmat Sohdi

---

✉ Corresponding author :

Email Address : lalu.rahmat@machung.ac.id

## INTRODUCTION

In recent decades, researchers and practitioners worldwide have focused on sustainability issues (Duque et al., 2021; Lestari & Soewarno, 2023, 2024; Saini & Singhania, 2019). The concept of Environmental, Social, and Governance (ESG) has attracted considerable attention and continues to be refined to ensure it significantly impacts sustainability and benefits companies (Kamarudin et al., 2022; Mkadmi & Daafous, 2025; Zharfpeykan & Bai, 2025). Rising awareness of sustainability issues, particularly corporate social responsibility and the environment, has shifted investor investment assessments from a single economic perspective (Cheng & Feng, 2023; Lu, 2021; Shahwan & Fathalla, 2020). They are increasingly considering a company's sustainability performance as a key factor in deciding whether to invest in that company. In Indonesia, due to pressure from stakeholders and government policies regarding sustainability transparency, ESG implementation has progressed considerably, but further development is still needed (Afifa et al., 2025; Farhan, 2025; Al-Tahat et al., 2025). Therefore, understanding the extent to which ESG performance generates benefits for companies in the form of performance is still urgently needed for further research.

The implementation of ESG in companies brings a form of legitimacy to the company (Baldini et al., 2016; Doni et al., 2022; Erin et al., 2022; Simoni et al., 2020). Good legitimacy will provide both economic and non-economic benefits. ESG practices in companies lead to improved company performance by reducing adverse risks, increasing efficiency, and increasing investor confidence (Farhan, 2025). Good and high-quality ESG practices create added value for companies, thereby attracting more investment and long-term competitive advantage. However, this influence is not always consistent. It is because the impact of ESG on performance is highly dependent on the nature of the industry, existing regulations, and the level of implementation in a country. Indonesia presents an exciting dynamic to study because, within the context of the Indonesian market, governance and transparency mechanisms are still developing towards global standards.

The relationship between ESG performance and company performance has been examined several times in previous research. There is a positive impact of ESG performance on company performance (Tasnia et al., 2020; Aydoğmuş et al., 2022; Miao et al., 2023; Sunil & Nair, 2021). It is because companies with good performance will have support from their stakeholders, increase operational effectiveness, minimize risk, and more. On the other hand, studies have also revealed the opposite results (Duque-Grisales & Aguilera-Caracuel, 2021; Helfaya et al., 2023; Gutsche, 2016; Kevser et al., 2024; Castillo-Merino & Rodríguez-Pérez, 2021). These non-linear results leave a gap in the research to be explored. The differences in results from previous studies also indicate the potential and need for moderating variables to explain the non-linear relationship. In this study, we consider external assurance as the moderating variable.

External assurance is seen as playing a crucial role in certifying and ensuring the reliability and trustworthiness of a company's ESG information (Clarkson et al., 2019; Ioannou & Serafeim, 2012; Sharma, 2025). External assurance provides assurance to stakeholders and reduces the information gap between companies and investors. In the context of ESG's influence on company performance, external assurance is expected to strengthen the positive influence of ESG on company performance by

increasing the reliability of companies' ESG reports. Interestingly, in Indonesia, there is no requirement to audit or assure companies of ESG reports or practices. Therefore, this research is highly urgent.

This study aims to examine the influence of ESG performance on company performance by considering the moderating role of external assurance. The theoretical contribution of this research is to address the gap in previous research that still shows inconsistencies, particularly in the context of a developing country like Indonesia. Empirically, this study is among the leading in examining the moderating effect of external assurance on the relationship between ESG and company performance. The findings of this study provide new knowledge and evidence that companies need external assurance to improve the effectiveness of ESG implementation. Therefore, the government and regulators can use this research as a reference for developing regulations requiring companies to implement ESG continuously. This research was conducted on non-financial companies listed on the Indonesia Stock Exchange between 2019 and 2023.

## LITERATURE REVIEW AND HYPOTHESIS DEVELOPMENT

### *ESG Performance and Company Performance*

Company practices that prioritize ESG principles bring numerous benefits to companies, both non-economic and ultimately impacting the company's economic aspects (Baldini et al., 2016; Lestari & Soewarno, 2023; Zhang et al., 2020; Zharfpeykan & Bai, 2025). A kind of unwritten contract exists between companies and society, often referred to as a social contract (Deegan, 2002; Doni et al., 2022; Erin et al., 2022; Pitrakkos & Maroun, 2020). Society expects companies to operate in accordance with prevailing social values and norms. If a company can meet these expectations, it will gain legitimacy within the community (Cheng & Feng, 2023; Elsayed & Ammar, 2020). It is crucial for a company's sustainability as it determines its strategic actions. Companies that gain legitimacy in society will face fewer obstacles and social conflicts, ultimately facilitating their performance. In other words, corporate ESG practices serve as a key enabler for companies to build this legitimacy.

A company's strong commitment to sustainability will be evident in its ESG practices. ESG practices implemented by companies will manage the environmental impact of their activities, improve social welfare, and implement transparent governance. Furthermore, these practices build a positive corporate image among the public and investors. This positive image will bring benefits in the form of market confidence, which will ultimately boost their share prices. Ultimately, ESG practices will lead to high corporate performance.

*H1: ESG performance has a positive impact on corporate performance.*

### *ESG Performance, External Assurance, and Company Performance*

The impact of ESG performance on a company's legitimacy depends heavily on the substance and credibility of the information contained in its ESG practices and reports. From the perspective of legitimacy theory, a company's legitimacy is not only achieved through its sustainability actions; it is also required to convince stakeholders of the honesty of those actions. It is where external assurance plays a crucial role in verifying and providing assurance that a company's ESG performance is reliable (Kogi et al., 2025).

The primary purpose of external assurance is to independently verify the ESG information presented by the company (Alsahali, 2025). This external assurance enhances the reliability and credibility of the report. Furthermore, stakeholders will have greater confidence that the company is genuinely implementing sustainability actions, rather than simply greenwashing. Ultimately, this will enhance the company's legitimacy before the public and investors, which in turn strengthens the positive influence of ESG performance on company performance.

*H2: External assurance strengthens the positive influence of ESG performance on company performance.*

## METHODOLOGY

### Research Data

This study used non-financial companies listed on the Indonesia Stock Exchange from 2019 to 2023 as the sample. We excluded financial companies due to their unique business characteristics and regulations, thus avoiding biased analysis. This study observed 1,535 firm-years.

### Analysis Technique

Panel data regression was the approach used to test the research hypotheses. The following is the empirical model used in this study:

$$TBNQ_{it} = \alpha + \beta_1 ESG_{it} + \beta_2 ROA_{it} + \beta_3 DER_{it} + \beta_4 SIZE_{it} + \beta_5 AC_{it} + \epsilon_{it} \dots (1)$$

$$TBNQ_{it} = \alpha + \beta_1 ESG_{it} + \beta_2 EA_{it} + \beta_3 ESG * EA_{it} + \beta_4 ROA_{it} + \beta_5 DER_{it} + \beta_6 SIZE_{it} + \beta_7 AC_{it} + \epsilon_{it} \dots (2)$$

$$MARTB_{it} = \alpha + \beta_1 ESG_{it} + \beta_2 ROA_{it} + \beta_3 DER_{it} + \beta_4 SIZE_{it} + \beta_5 AC_{it} + \epsilon_{it} \dots (3)$$

$$MARTB_{it} = \alpha + \beta_1 ESG_{it} + \beta_2 EA_{it} + \beta_3 ESG * EA_{it} + \beta_4 ROA_{it} + \beta_5 DER_{it} + \beta_6 SIZE_{it} + \beta_7 AC_{it} + \epsilon_{it} \dots (4)$$

$$PRICTB_{it} = \alpha + \beta_1 ESG_{it} + \beta_2 ROA_{it} + \beta_3 DER_{it} + \beta_4 SIZE_{it} + \beta_5 AC_{it} + \epsilon_{it} \dots (5)$$

$$PRICTB_{it} = \alpha + \beta_1 ESG_{it} + \beta_2 EA_{it} + \beta_3 ESG * EA_{it} + \beta_4 ROA_{it} + \beta_5 DER_{it} + \beta_6 SIZE_{it} + \beta_7 AC_{it} + \epsilon_{it} \dots (6)$$

Where TBNQ is TBNQ Q, MARTB is market to book ratio, PRICTB is price to book ratio, EA is external assurance, ROA is return on assets, DER is debt to equity ratio, SIZE is company SIZE, and AC is audit committee SIZE.

### Operational Definition and Variable Measurement

This study uses company performance as the dependent variable, with the primary measure being the Tobin's Return on Assets (TBNQ). We use alternative measures to measure performance variables, including the market-to-book ratio (MARTB) and the price-to-book ratio (PRICTB). Each measure is based on previous research (Aharoni et al., 2013; David & Wang, 2025; Nasir et al., 2024; Singhanian et al., 2022; Zarefar et al., 2022; Zarefar & Armadani, 2024). Tobin's Q is measured by adding the market value of equity to the book value of debt, divided by the book value of total assets. The Market-to-Book Ratio (MARTB) is measured by dividing total market capitalization by total equity. Finally, price-to-book value (PRICBV) is measured by dividing the stock market price by the book value per share (Bustani et al., 2021; Hatane et al., 2021; Zarefar et al., 2022).

ESG performance is the independent variable used in this study. This independent variable is measured using the ESG score from the Refinitiv dataset, referring to previous research (Cheng & Feng, 2023). Refinitiv offers a comprehensive suite of Environmental, Social, and Governance (ESG) data, commencing from 2002. This dataset evaluates corporate ESG performance, encompassing 10 distinct themes and three fundamental pillars, based on more than 600 evaluation metrics (Tasnia et al., 2020).

External assurance adalah variabel moderasi pada penelitian ini. External assurance refers to an independent entity that conducts evaluations of an organization's operations and disclosures (Uyar et al., 2023). Within the scope of this research, the evaluation or auditing rendered by external assurance pertains to Environmental, Social, and Governance (ESG) initiatives and a company's sustainability report. A consensus among numerous scholars suggests that engaging external assurance for ESG activities and sustainability reports aims to enhance public confidence in the ESG information disclosed by corporations. Consistent with a number of prior investigations, this study employs a binary variable to quantify external assurance. A designation of "1" is allocated if the company indicates the involvement of an external assurance provider in its sustainability report, and a designation of "0" is assigned in the absence of such involvement (Simoni et al., 2020).

Drawing upon prior academic work, this investigation incorporates multiple control variables to enhance the dependability of the model (Armadani & Zarefar, 2023; Diaz & Armadani, 2024; Nasir et al., 2024). The Return on Assets is determined via the subsequent formula (Cao et al., 2012). ROA adalah Profit After Tax dibagi dengan Total Assets. The Debt to Equity Ratio is computed using the following equation (Devie et al., 2020; Kouaib et al., 2022). DER adalah Total Debt dibagi Total Equity. Organizational scale is quantified by the natural logarithm (LN) of total assets (Mobbs et al., 2021; Rudyanto & Pirzada, 2020). The count of board members represents board SIZE, and similarly, audit committee SIZE is determined by the number of individuals on the audit committee (Kovermann & Velte, 2019).

## RESULT AND DISCUSSION

### Result

#### *Descriptive Statistics*

This study presents descriptive statistics in Table 1, which indicate that the companies performed exceptionally well. Throughout the year, the average score ranged from 1.3 to 2.5, indicating significant potential for these companies and their investor confidence, as confirmed in Table 2. The ESG variable shows that the average performance of non-financial companies listed on the Indonesia Stock Exchange (IDX) from 2019 to 2023 was 2.317. Table 2 reveals fluctuations, but not significant year-to-year differences.

Furthermore, the moderating variable, external assurance (EA), indicates that approximately 11 percent of companies have external assurance to ensure the reliability of their ESG reports and practices. Furthermore, the external assurance used by EAKAP is performed by a Big Four public accounting firm. ROA indicates positive company performance from 2019 to 2023. The company's average debt-to-equity ratio is 1.2 and has not changed significantly over the years. The company size is around 27. Finally, the average audit committee consists of three members.

**Table 1.** Descriptive Statistics

Variable	Obs	Mean	Std. Dev.	Min	Max
TBNQ	1535	1.377	3.37	.001	72.601
MARTB	1535	A	6.179	.001	99.75
PRICTB	1535	2.503	6.178	.027	99.75
ESG	1535	2.317	.173	1.793	2.73

EA	1535	.114	.318	0	1
EAKAP	1535	.06	.237	0	1
ROA	1535	3.577	10.038	-44.33	94.36
DER	1535	1.172	1.374	.002	9.874
SIZE	1535	27.154	3.359	17.365	33.731
AC	1535	3.528	.499	3	4

Source: Data Processing, Author 2025

**Table 2.** Descriptive statistics by year

	EA								SIZE	AC
	TBNQ	MARTB	PRICTB	ESG	EAKAP	ROA	DER			
2019	1.028	2.338	2.338	2.078	.163	.025	2.768	1.568	27.45	3.563
2020	1.129	2.473	2.473	2.103	.157	.037	1.013	1.396	27.46	3.567
2021	1.658	2.981	2.981	2.32	.111	.046	3.95	1.26	27.199	3.542
2022	1.42	2.454	2.454	2.322	.113	.071	4.199	1.1	27.099	3.518
2023	1.283	2.284	2.285	2.401	.098	.07	3.572	1.066	27.051	3.514

Source: Data Processing, Author 2025

**Table 2.** Descriptive statistics by year

	EA								SIZE	AC
	TBNQ	MARTB	PRICTB	ESG	EAKAP	ROA	DER			
2019	1.028	2.338	2.338	2.078	.163	.025	2.768	1.568	27.45	3.563
2020	1.129	2.473	2.473	2.103	.157	.037	1.013	1.396	27.46	3.567
2021	1.658	2.981	2.981	2.32	.111	.046	3.95	1.26	27.199	3.542
2022	1.42	2.454	2.454	2.322	.113	.071	4.199	1.1	27.099	3.518
2023	1.283	2.284	2.285	2.401	.098	.07	3.572	1.066	27.051	3.514

Source: Data Processing, Author 2025

### Pairwise Correlations

We ensured that our research model was free from multicollinearity issues by conducting pairwise correlation tests. This test was conducted by examining the coefficients between independent variables with a threshold of 0.8 (Gujarati, 2003). Table 3 shows that this research model is free from multicollinearity issues.

**Table 3.** Pairwise correlations

Variables	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)
(1) TBNQ	1.000									
(2) MARTB	0.868*	1.000								
(3) PRICTB	0.867*	1.000*	1.000							
(4) ESG	0.066*	0.035	0.035	1.000						
(5) EA	-0.028	0.008	0.008	-	1.000					
(6) EAKAP	-0.011	0.038	0.038	-0.003	0.704*	1.000				
(7) ROA	0.149*	0.142*	0.142*	0.005	0.107*	0.068*	1.000			
(8) DER	-	0.072*	0.072*	-	0.040	0.043	-	1.000		
(9) SIZE	0.097*	-0.008	-0.008	0.120*	0.045	0.071*	0.220*	0.032	1.000	
(10) AC	0.040	0.058	0.058	-0.039	0.039	0.019	-0.010	0.045	0.049	1.000

\*\*\*  $p < 0.01$ , \*\*  $p < 0.05$ , \*  $p < 0.1$

---

*Source: Data Processing, Author 2025*

### *Regression Results and Discussion*

Table 4 presents the main regression results and the robustness test. The findings of this study reveal that company performance will be higher when they have high ESG performance, thus supporting H1. This study confirms the legitimacy theory, which states that good ESG performance in a company will bring numerous benefits to the company, both economic and non-economic. Companies with good performance gain legitimacy from stakeholders. These companies possess added value, such as stakeholder support. It will prevent the company from experiencing social barriers in the form of conflicts related to activities related to social and environmental aspects. Furthermore, the implementation of ESG by a company will enable it to operate effectively and efficiently, ultimately attracting investors and increasing its market value.

**Table 4.** Regression results for hypothesis 1 and its robustness

	(1) TBNQ	(2) MARTB	(3) PRICTB
Intercept	-1.718 (-1.286)	-4.639* (-1.676)	-4.634* (-1.676)
ESG	1.155** (2.147)	1.979* (1.759)	1.980* (1.761)
ROA	0.045*** (4.040)	0.099*** (4.284)	0.099*** (4.282)
DER	-0.180*** (-3.621)	0.441*** (2.840)	0.441*** (2.837)
SIZE	-0.071** (-2.336)	-0.099* (-1.771)	-0.099* (-1.776)
AC	0.332* (1.749)	0.595* (1.927)	0.595* (1.925)
Adj.R2	0.19	0.26	0.26
N	1535	1535	1535
F-stat	.	.	.

*Source: Data Processing, Author 2025*

Companies with good ESG performance will gain a positive image in the market and among stakeholders. A company with a good image will be readily accepted by the market and encourage investors to invest their funds. Furthermore, high consumer loyalty to companies perceived as having good sustainability practices improves company performance. Therefore, companies must consider ESG to improve their performance.

Table 5 displays the results of the hypothesis 2 test. The findings of this study reveal that external assurance does not significantly strengthen the influence of ESG performance on company performance, thus rejecting H2. This study indicates that the role of external assurance is not significant, as it should be able to ensure that companies report honest ESG practices, thereby gaining investor trust and improving company performance. This finding is likely due to the tiny percentage of companies

that use external assurance. Furthermore, while there is no empirical evidence that external assurance enhances ESG performance, it still has potential, and if sufficiently utilized by Indonesian companies, we believe that companies should continue to prioritize external assurance to provide stakeholder confidence in ESG practices.

**Table 5.** Regression results for hypothesis 2 and its robustness

	(1) TBNQ	(2) MARTB	(3) PRICTB
Intercept	-5.206* (-1.823)	-5.201* (-1.823)	-1.743 (-1.248)
ESG	2.176* (1.907)	2.177* (1.909)	1.104** (2.055)
EA	5.276 (0.885)	5.279 (0.886)	-0.335 (-0.139)
ESGxEA	-2.360 (-0.929)	-2.360 (-0.929)	-0.045 (-0.042)
ROA	0.099*** (4.327)	0.099*** (4.325)	0.045*** (4.021)
DER	0.442*** (2.855)	0.442*** (2.853)	-0.179*** (-3.617)
SIZE	-0.093* (-1.715)	-0.093* (-1.721)	-0.064** (-2.311)
AC	0.574* (1.877)	0.574* (1.875)	0.331* (1.755)
Adj.R2	0.26	0.26	0.19
N	1535	1535	1535

Source: Data Processing, Author 2025

#### Robustness test

We conducted a robustness analysis using alternative measurements for the dependent variable, as presented in Tables 4 and 5. The results showed that using the alternative measurements remained linear with the primary measurement. Therefore, the results of this study are robust.

#### Additional analysis

We further elaborated our study by breaking down each ESG element and conducting regressions. Based on Table 6, the findings indicate that the environmental component has a significant positive effect on company performance. It means that the findings of this additional analysis align with the main findings, confirming that ESG brings economic benefits to companies that practice it.

**Table 6.** Additional analysis of ESG components

	(1) TBNQ	(2) MARTB	(3) PRICTB
Intercept	0.935 (0.300)	-1.946 (-0.352)	-1.917 (-0.347)
Envi	2.354** (2.350)	3.559** (2.015)	3.556** (2.013)
Soc	-1.520 (-1.184)	-1.599 (-0.814)	-1.589 (-0.809)
Gov	-0.899	0.332	0.296

	(-0.247)	(0.057)	(0.051)
ROA	0.046***	0.100***	0.100***
	(4.109)	(4.356)	(4.355)
DER	-0.188***	0.432***	0.432***
	(-3.658)	(2.752)	(2.750)
SIZE	-0.074**	-0.102*	-0.102*
	(-2.429)	(-1.781)	(-1.786)
AC	0.368*	0.649*	0.648*
	(1.697)	(1.921)	(1.919)
Adj.R2	0.19	0.26	0.26
N	1535	1535	1535

Source: Data Processing, Author 2025

We also conducted additional tests by replacing the external assurance measure with a dummy variable, 1 for Big Four auditors and 0 otherwise. The research findings are presented in Table 7, which again confirms that external assurance does not enhance the positive influence of ESG on company performance.

**Table 7.** Additional analysis with alternative external assurance measurements

	(1)	(2)	(3)
	TBNQ	MARTB	PRICTB
Intercept	-1.897	-5.464*	-5.459*
	(-1.348)	(-1.935)	(-1.936)
ESG	1.177**	2.366**	2.366**
	(2.174)	(2.084)	(2.086)
EAKAP	1.265	15.542	15.550
	(0.309)	(1.257)	(1.258)
ESGXEAKAP	-0.737	-6.549	-6.551
	(-0.415)	(-1.263)	(-1.263)
ROA	0.045***	0.098***	0.098***
	(4.035)	(4.371)	(4.370)
DER	-0.179***	0.434***	0.434***
	(-3.642)	(2.843)	(2.840)
SIZE	-0.065**	-0.095*	-0.096*
	(-2.281)	(-1.732)	(-1.737)
AC	0.324*	0.567*	0.566*
	(1.735)	(1.850)	(1.849)
Adj.R2	0.19	0.26	0.26
N	1535	1535	1535

Source: Data Processing, Author 2025

Table 8 presents the results of additional analysis that divides the sample based on the COVID-19 outbreak (COVID-19 = 1), namely the sample of companies from 2019 to 2022, and the post-COVID-19 sample (COVID-19 = 0), namely the sample of companies in 2023. An interesting finding is that ESG only affects company performance when the situation is not a COVID-19 pandemic. Legitimacy theory posits that Environmental, Social, and Governance (ESG) initiatives are employed to uphold a company's standing within society. Under typical circumstances, a company's engagement in ESG practices enhances its public perception, reputational capital, and credibility with stakeholders, thereby yielding favorable performance

outcomes. Nevertheless, the COVID-19 pandemic demonstrated that a company's social legitimacy was more a function of its swift reaction to the crisis – encompassing measures like workforce reductions, community support, and safeguarding employee welfare – than its adherence to established ESG metrics. Consequently, the significance of ESG was diminished by the more immediate concerns arising from the crisis.

**Table 8.** additional analysis by covid 19

	COV19 =1 TBNQ	COV19 =0 TBNQ	COV19 =1 MART B	COV19 =0 MART B	COV19 =1 PRICT B	COV19 =0 PRICT B	COV19 =1 TBNQ	COV19 =0 TBNQ	COV19 =1 MART B	COV19 =0 MART B	COV19 =1 PRICT B	COV19 =0 PRICT B
Intercept	-0.901	-1.987	0.976	-7.455	0.976	-7.452	-1.296	-1.548	-0.411	-6.785	-0.411	-6.781
	(-0.177)	(-0.713)	(0.143)	(-1.381)	(0.143)	(-1.381)	(-0.252)	(-0.548)	(-0.060)	(-1.238)	(-0.060)	(-1.237)
ESG	0.818	1.312*	0.298	2.828**	0.298	2.830**	0.879	1.087	0.781	2.514*	0.781	2.516*
	(0.616)	(1.938)	(0.168)	(2.156)	(0.168)	(2.157)	(0.646)	(1.546)	(0.430)	(1.843)	(0.430)	(1.844)
EA							5.539	-5.631	14.241	-8.058	14.241	-8.044
							(0.812)	(-1.097)	(1.564)	(-0.810)	(1.564)	(-0.808)
ESGx EA							-2.858	2.221	-6.654	3.269	-6.654	3.264
							(-0.923)	(1.015)	(-1.609)	(0.770)	(-1.609)	(0.769)
ROA	0.061**	0.030**	0.133**	0.067**	0.133**	0.067**	0.063**	0.031**	0.135**	0.067**	0.135**	0.067**
	(3.076)	(3.014)	(5.041)	(3.402)	(5.041)	(3.399)	(3.162)	(3.036)	(5.115)	(3.409)	(5.115)	(3.406)
DER	-0.136	-	0.370**	0.463**	0.370**	0.462**	-0.133	-	0.384**	0.473**	0.384**	0.472**
	(-1.090)	(-2.667)	(2.228)	(2.998)	(2.228)	(2.994)	(-1.070)	(-2.564)	(2.307)	(3.053)	(2.307)	(3.048)
SIZE	-0.109*	-0.060*	-0.114	-0.116*	-0.114	-0.116*	-0.095	-0.057	-0.099	-0.115*	-0.099	-0.116*
	(-1.758)	(-1.722)	(1.383)	(1.722)	(1.383)	(1.730)	(1.530)	(1.615)	(1.187)	(1.685)	(1.187)	(1.693)
AC	0.311	0.279	0.103	0.679*	0.103	0.680*	0.285	0.294	0.048	0.702*	0.048	0.703*
	(0.838)	(1.459)	(0.209)	(1.832)	(0.209)	(1.834)	(0.766)	(1.529)	(0.097)	(1.885)	(0.097)	(1.887)
Adj.R <sup>2</sup>	0.19	0.15	0.51	0.16	0.51	0.16	0.19	0.15	0.51	0.16	0.51	0.16
N	539	996	539	996	539	996	539	996	539	996	539	996
F-stat	2.233	2.617	6.550	2.670	6.550	2.667	2.216	2.598	6.462	2.629	6.462	2.626

Source: Data Processing, Author 2025

## CONCLUSION

Sustainability issues have become a central topic of discussion among researchers, practitioners, and governments worldwide. Therefore, companies are no longer solely focused on economic performance; they must also prioritize and implement practices related to social and environmental aspects. This study aims to test the role of ESG performance on corporate performance empirically. Furthermore, it considers the moderating effect of external assurance on the relationship between ESG performance and corporate performance. The study found that ESG performance significantly improves corporate performance. However, external assurance did not significantly strengthen the influence of ESG performance on corporate performance. This finding confirms legitimacy theory, which suggests that companies benefit from operating in accordance with societal expectations.

This study contributes to the literature by providing empirical evidence that enriches the discussion regarding the role of ESG in improving corporate performance. These findings broaden the study of the relationship between the two variables and open up opportunities for future development. Practically, this research provides input to corporate managers to increase their awareness of ESG implementation and incorporate it into their strategic planning to achieve established performance targets.

Furthermore, the government or lawmakers can consider this issue when developing regulations related to sustainability.

This study has several limitations. First, the sample used in this study focused only on non-financial companies. Therefore, further research can expand the sample size, both to other industries and across countries. Furthermore, this study also has limitations in its use of company performance measures. This study only used market-based performance measures, despite using two measures. Future research is recommended to incorporate accounting-based measures to produce a more comprehensive study.

## References :

- Afifa, M. A., Nguyen, N. M., & Bui, D. Van. (2025). *Environmental , social and governance ( ESG ) disclosure quality in developing countries : evidence from the ASEAN region*. <https://doi.org/10.1108/CG-02-2024-0102>
- Aharoni, G., Grundy, B., & Zeng, Q. (2013). Stock returns and the Miller Modigliani valuation formula : Revisiting the Fama French analysis \$. *Journal of Financial Economics*, 1–11. <https://doi.org/10.1016/j.jfineco.2013.08.003>
- Al-tahat, S., Bani-khaled, S., & Jaradat, Z. (2025). State ownership as a moderator in the relationship between board characteristics and ESG performance : evidence from Asia-Pacific markets. *Journal of Business and Socio-Economic Development*, November. <https://doi.org/10.1108/JBSED-05-2025-0145>
- Alsahali, K. F. (2025). ESG compensation policy and assurance over sustainability reports : *Managerial Finance*, November. <https://doi.org/10.1108/MF-03-2025-0201>
- Armadani, A., & Zarefar, A. (2023). Quality of Sustainability Disclosure, Foreign Board, and Firm Performance? Evidence from Indonesia. *Jurnal Dinamika Akuntansi*, 15(2), 129–138. <https://doi.org/http://dx.doi.org/10.15294/jda.v15i2.40138>
- Aydoğmuş, M., Gülay, G., & Ergun, K. (2022). Impact of ESG performance on firm value and profitability. *Borsa Istanbul Review*, 22, S119–S127. <https://doi.org/10.1016/j.bir.2022.11.006>
- Baldini, M., Dal, L., Giovanni, M., Francesco, L., & Terzani, S. (2016). Role of Country- and Firm-Level Determinants in Environmental , Social , and Governance Disclosure. *Journal of Business Ethics*. <https://doi.org/10.1007/s10551-016-3139-1>
- Bustani, Kurniaty, & Widyanti, R. (2021). The Effect of Earning Per Share , Price to Book Value , Dividend Payout Ratio , and Net Profit Margin on the Stock Price in Indonesia Stock Exchange. *Jurnal Maksipreneur*, 11(1), 1–18.
- Castillo-Merino, D., & Rodríguez-Pérez, G. (2021). The effects of legal origin and corporate governance on financial firms' sustainability performance. *Sustainability (Switzerland)*, 13(15). <https://doi.org/10.3390/su13158233>
- Cheng, X., & Feng, C. (2023). Does environmental information disclosure affect corporate cash flow? An analysis by taking media attentions into consideration. In *Journal of Environmental Management* (Vol. 342). <https://doi.org/10.1016/j.jenvman.2023.118295>
- Clarkson, P., Li, Y., Richardson, G., & Tsang, A. (2019). Causes and consequences of voluntary assurance of CSR reports: International evidence involving Dow Jones Sustainability Index Inclusion and Firm Valuation. *Accounting, Auditing and Accountability Journal*, 32(8), 2451–2474. <https://doi.org/10.1108/AAAJ-03-2018-3424>
- David, L. K., & Wang, J. (2025). Green signaling or greenwashing ? ESG disclosure , firm performance and capital allocation in BRICS equity markets. *Journal of Capital Markets Studies*, 21.

<https://doi.org/10.1108/JCMS-06-2025-0080>

- Deegan, C. (2002). Introduction: The legitimising effect of social and environmental disclosures - a theoretical foundation. *Accounting, Auditing & Accountability Journal*, 15(3), 282-311. <https://doi.org/10.1108/09513570210435852>
- Devie, D., Liman, L. P., Tarigan, J., & Jie, F. (2020). Corporate social responsibility, financial performance and risk in Indonesian natural resources industry. *Social Responsibility Journal*, 16(1), 73-90. <https://doi.org/10.1108/SRJ-06-2018-0155>
- Diaz, P. wada sari, & Armadani, A. (2024). Direktur Perempuan dan Kinerja Perusahaan di Indonesia: Peran Moderasi Kepemilikan Asing. *Jurnal Akuntansi Manado (JAIM)*, 5(April), 143-157. <https://doi.org/10.53682/jaim.vi.8523>
- Doni, F., Corvino, A., & Bianchi Martini, S. (2022). Corporate governance model, stakeholder engagement and social issues evidence from European oil and gas industry. *Social Responsibility Journal*, 18(3), 636-662. <https://doi.org/10.1108/SRJ-08-2020-0336>
- Duque-Grisales, E., & Aguilera-Caracuel, J. (2021). Environmental, Social and Governance (ESG) Scores and Financial Performance of Multilatinas: Moderating Effects of Geographic International Diversification and Financial Slack. *Journal of Business Ethics*, 168(2), 315-334. <https://doi.org/10.1007/s10551-019-04177-w>
- Duque, E., Javier, G., & Caracuel, A. (2021). Environmental , Social and Governance ( ESG ) Scores and Financial Performance of Multilatinas : Moderating Effects of Geographic International Diversification and Financial Slack. *Journal of Business Ethics*, 168(2), 315-334. <https://doi.org/10.1007/s10551-019-04177-w>
- Elsayed, N., & Ammar, S. (2020). Sustainability governance and legitimisation processes: Gulf of Mexico oil spill. *Sustainability Accounting, Management and Policy Journal*, 11(1), 253-278. <https://doi.org/10.1108/SAMPJ-09-2018-0242>
- Erin, O., Adegboye, A., & Bamigboye, O. A. (2022). Corporate governance and sustainability reporting quality: evidence from Nigeria. *Sustainability Accounting, Management and Policy Journal*, 13(3), 680-707. <https://doi.org/10.1108/SAMPJ-06-2020-0185>
- Farhan, N. H. S. (2025). Does CSR committee moderate the relation between audit committee and carbon emission practices ? Empirical evidence from OECD countries. *Asian Journal of Accounting Research*, November. <https://doi.org/10.1108/AJAR-05-2024-0183>
- Gujarati, D. N. (2003). *Basic econometrics*. NY: McGraw-Hill.
- Gutsche, R. (2016). Firm-Value Effects of CSR Disclosure and CSR Performance. *SSRN Electronic Journal*. <https://doi.org/10.2139/ssrn.2821691>
- Hatane, S. E., Nathania, F., Lamuel, J., Darusman, F., & Devie. (2021). Intellectual capital disclosures and corporate governance in gaining the firms' non-discretionary profits and market value in asean-5. *Organizations and Markets in Emerging Economies*, 11(22), 276-304. <https://doi.org/10.15388/OMEE.2020.11.34>
- Helfaya, A., Aboud, A., & Amin, E. (2023). An examination of corporate environmental goals disclosure, sustainability performance and firm value - An Egyptian evidence. *Journal of International Accounting, Auditing and Taxation*, 52(June). <https://doi.org/10.1016/j.intaccaudtax.2023.100561>
- Ioannou, I., & Serafeim, G. (2012). The Consequences of Mandatory Corporate Sustainability Reporting. *SSRN Electronic Journal*, 1-49. <https://doi.org/10.2139/ssrn.1799589>
- Kamarudin, K. A., Ariff, A. M., & Wan Ismail, W. A. (2022). Product market competition, board gender diversity and corporate sustainability performance: international evidence. *Journal of Financial Reporting and Accounting*, 20(2), 233-260. <https://doi.org/10.1108/JFRA-01-2021-0020>

- Kevser, M., Tunçel, M. B., Gürsoy, S., & Zeren, F. (2024). The impact of environmental, social and governance (ESG) scores on stock market: evidence from G7 countries. *Journal of Global Responsibility*, 15(3), 305–319. <https://doi.org/10.1108/JGR-04-2023-0070>
- Kogi, S. K., Kristanto, A. B., & Cao, J. (2025). ESG assurance and cash holdings : evidence from 18 countries in Africa. *Journal of Accounting Literature*, November. <https://doi.org/10.1108/JAL-06-2025-0281>
- Kouaib, A., Bouzouitina, A., & Jarboui, A. (2022). CEO behavior and sustainability performance: the moderating role of corporate governance. *Property Management*, 40(1), 1–16. <https://doi.org/10.1108/PM-01-2021-0009>
- Kovermann, J., & Velte, P. (2019). The impact of corporate governance on corporate tax avoidance – A literature review. *Journal of International Accounting, Auditing and Taxation*, 36, 100270. <https://doi.org/10.1016/j.intaccaudtax.2019.100270>
- Lestari, K. C., & Soewarno, N. (2023). Do female directors influence firm value? The mediating role of green innovation. *Gender in Management*, 39(2), 255–273. <https://doi.org/10.1108/GM-08-2022-0281>
- Lestari, K. C., & Soewarno, N. (2024). Do female directors influence firm value? The mediating role of green innovation. 39(2), 255–273. <https://doi.org/10.1108/GM-08-2022-0281>
- Lu, L. W. (2021). The moderating effect of corporate governance on the relationship between corporate sustainability performance and corporate financial performance. *International Journal of Disclosure and Governance*, 18(3), 193–206. <https://doi.org/10.1057/s41310-020-00099-6>
- Miao, M., Khan, M. I., Ghauri, S. P., & Zaman, S. I. (2023). The effect of corporate governance on firm performance: perspectives from an emerging market. *Economic Research-Ekonomska Istrazivanja*, 36(3). <https://doi.org/10.1080/1331677X.2023.2277275>
- Mkadmi, J. E., & Daafous, W. (2025). Does corporate governance affect the environmental, social and governance disclosure? A cross-country study. *Central European Management Journal*. <https://doi.org/10.1108/CEMJ-10-2023-0406>
- Mobbs, S., Tan, Y., & Zhang, S. (2021). Female directors: Why are some less informed than others? *Journal of Corporate Finance*, 68. <https://doi.org/10.1016/j.jcorpfin.2021.101938>
- Nasir, A., Wan Ismail, W. A., Kamarudin, K. A., Zarefar, A., & Armadani. (2024). Examining the impact of corporate governance and family ownership on corporate performance: evidence from the Indonesian Stock Exchange. *Cogent Business and Management*, 11(1). <https://doi.org/10.1080/23311975.2024.2339546>
- Pitrakkos, P., & Maroun, W. (2020). Evaluating the quality of carbon disclosures. *Sustainability Accounting, Management and Policy Journal*, 11(3), 553–589. <https://doi.org/10.1108/SAMPJ-03-2018-0081>
- Rudyanto, A., & Pirzada, K. (2020). The role of sustainability reporting in shareholder perception of tax avoidance. *Social Responsibility Journal*, 17(5), 669–685. <https://doi.org/10.1108/SRJ-01-2020-0022>
- Saini, N., & Singhania, M. (2019). Performance relevance of environmental and social disclosures The role of foreign ownership. 26(6), 1845–1873. <https://doi.org/10.1108/BIJ-04-2018-0114>
- Shahwan, T. M., & Fathalla, M. M. (2020). The mediating role of intellectual capital in corporate governance and the corporate performance relationship. *International Journal of Ethics and Systems*, 36(4), 531–561. <https://doi.org/10.1108/IJOES-03-2020-0022>
- Sharma, R. (2025). Unveiling the effects of the Corporate Sustainability Reporting Directive (CSRD) on company sustainability reporting practices: a case of German companies. *Sustainability Accounting, Management and Policy Journal*, October. <https://doi.org/10.1108/SAMPJ-01-2025-0091>

- Simoni, L., Bini, L., & Bellucci, M. (2020). Effects of social, environmental, and institutional factors on sustainability report assurance: evidence from European countries. *Meditari Accountancy Research*, 28(6), 1059–1087. <https://doi.org/10.1108/MEDAR-03-2019-0462>
- Singhania, S., Singh, J., & Aggrawal, D. (2022). Board committees and financial performance : exploring the effects of gender diversity in the emerging economy of India. *International Journal of Emerging Markets*. <https://doi.org/10.1108/IJOEM-03-2022-0491>
- Sunil, A., & Nair, K. S. (2021). Going green and CSR: An evidence from indian companies' best practices. *Academy of Strategic Management Journal*, 20(SpecialIssue2), 1–12.
- Tasnia, M., Syed Jaafar AlHabshi, S. M., & Rosman, R. (2020). The impact of corporate social responsibility on stock price volatility of the US banks: a moderating role of tax. *Journal of Financial Reporting and Accounting*, 19(1), 77–91. <https://doi.org/10.1108/JFRA-01-2020-0020>
- Zarefar, A., Agustia, D., & Soewarno, N. (2022). Bridging the Gap between Sustainability Disclosure and Firm Performance in Indonesian Firms : The Moderating Effect of the Family Firm. *Sustainability (Switzerland)*, 14, 1–13.
- Zarefar, A., & Armadani, A. (2024). Do Fundamental Financial Ratios Affect The Company 's Stock Price? Indonesia Evidence. *Jurnal Akuntansi Dan Keuangan Indonesia*, 21(1). <https://doi.org/10.21002/jaki.2024.03>
- Zharfpeykan, R., & Bai, Y. (2025). Board gender diversity and corporate environmental , social and governance performance : evidence from New Zealand listed fi rms. <https://doi.org/10.1108/PAR-01-2024-0011>