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"Digital Transformation and Sustainable Business: Challenges and Opportunities for Higher Education Research and Development"

Environmental, Social and Governance on Market Value: Evidence From Indonesia Market

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Abstract

This study examines the impact of Environmental, Social, and Governance (ESG) factors on market value of Indonesian publicly listed companies. The study was conducted on the companies listed on the IDX that received ESG assessments from LSEG Refinitiv. Based on these criteria, 99 companies received ESG scores in 2022-2023. Market value was assessed from data obtained from the financial reports by measuring Tobins'Q value. Data analysis was performed using multiple regression analysis. The results show that environmental and governance factors have a significant positive effect on market value. Social factors do not effect the market value significicantly. A limitation of this study is the limited number of companies that received assessments from LSEG Refinitiv. It is hoped that further research can explore other indicators to measure ESG scores and can add variables such as company size as moderating variables.

Keywords: ESG score, Environmental, Social, Governance, Market Value,

Introduction

Consumer purchasing behavior is influenced by multiple pivotal factors, notably brand image, brand loyalty, promotional strategies, and product quality. Brand image represents the collective perceptions consumers hold regarding a brand's distinctive identity, attributes, fundamental values, and competitive market position (Keller, 2020). When organizations successfully develop a positive brand image, they strengthen customer loyalty, evidenced through repeat purchasing behavior, favorable word-of-mouth communications, and continued brand preference despite the availability of competing options (Aaker, 2020). Brand loyalty reflects the degree of consistent consumer commitment to a specific brand compared to alternative offerings, often converting loyal customers into voluntary brand advocates who actively promote products to others (Oliver, 2020). Promotional initiatives serve as deliberate marketing communication mechanisms aimed at increasing brand awareness, generating purchase intent, and facilitating buying decisions (Kotler & Armstrong, 2024). In practical application, promotional strategies can provide tangible incentives that prompt immediate consumer action, demonstrating particular effectiveness in driving short-term sales growth (Chaffey & Ellis-Chadwick, 2022). Simultaneously, product quality stands as a critical factor in shaping perceived value propositions (Zeithaml et al., 2021). High-quality products not only satisfy consumer requirements but also create competitive advantages by attracting new customers and maintaining existing loyalty (Solomon, 2020). Therefore, these four variables are interrelated and play crucial roles in shaping consumer purchase behavior within dynamic competitive markets.

Considering the observable market dynamics and the existing gap in academic literature, this research aims to explore the extent to which Brand Image, Brand Loyalty, Promotional Strategies, and Product Quality affect Consumer Purchasing Decisions. While Apple maintains a well-established premium brand position, a growing segment of consumers actively conducts comparative analyses with rival brands that deliver enhanced technical capabilities at more accessible price levels. The company's premium pricing strategy creates substantial

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financial constraints that restrict consumers' capacity to acquire multiple devices within short time intervals. Additionally, replacement cycles are increasingly extended as buyers determine that the incremental enhancements introduced in newer model iterations provide insufficient added value, leading them to maximize the utilization period of their current devices before making subsequent purchase commitments.

Hypotheses of the study are as follows:

H1: Environment factor affecting the market value significantly positive

H2: Social factor affecting the market value significantly positive

H3: Governance factor affecting the market value significantly positive

Literature Review

Organizational performance emphasizes the formulation of strategic approaches to accomplish management-defined objectives (Teeratansirikool et al., 2013). Corporate performance demonstrates the effectiveness of managerial capabilities in executing financial decision-making processes (Mcguire et al., 2015). Performance evaluation can be conducted through comparative analysis between realized outcomes and predetermined performance benchmarks (Ricardianto et al., 2023). Organizations exhibiting superior performance demonstrate characteristics including sustained growth trajectories, enhanced profitability metrics, and increased stakeholder value creation (Miller et al., 2013). This investigation evaluates organizational performance through dual dimensions: market-based performance indicators and profitability measures. Market valuation is assessed utilizing Tobin's Q ratio as the primary proxy metric (Fu et al., 2016; Malik et al., 2020; Soliman & Adam, 2017).

Environmental, Social, and Governance (ESG) principles are intrinsically linked to corporate sustainability, presenting both challenges and opportunities in competitive environments while serving as critical determinants of investor confidence (Albitar et al., 2020). Existing scholarly literature has explored this relationship through diverse methodological approaches, with certain investigations examining individual ESG components and their performance implications, while others assess aggregate ESG metrics. Empirical evidence demonstrates that comprehensive ESG scores, encompassing environmental, social, and governance dimensions, exert positive influences on corporate market performance (Albitar et al., 2020; Bissoondoyal-Bheenick et al., 2023; Naseem et al., 2019; Pulino et al., 2022). Conversely, alternative research findings indicate that ESG implementation positively affects financial performance without corresponding market performance impacts, with governance components exhibiting dominance over environmental and social elements (Velte, 2017).

Additional scholarly investigations have concentrated on analyzing individual ESG dimensions and their distinct performance effects, revealing that environmental factors demonstrate stronger performance influences compared to social and governance components (Huang, 2019). Pulino et al. (2022) provide specific evidence that environmental and social scores significantly enhance firm performance, while governance dimensions exhibit no statistically significant relationships with performance outcomes. Contrasting findings indicate that social factors negatively impact performance while governance positively influences organizational efficiency. Furthermore, environmental and social dimensions have been shown to negatively affect firm performance, whereas governance positively influences market performance but negatively impacts Return on Assets (Dwibedi et al., 2024). Consequently, the research hypothesis posits that sustained ESG disclosure practices will generate positive performance implications for organizations.

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Methods

Data and Sample

This research was conducted by collecting data from companies that listed on the IDX, which were assessed for ESG aspects by an independent analysis agency, LSEG Revinitif. Based on the availability of ESG data, 99 companies listed on the IDX were identified for the years 2022 and 2023. Based on the availability of the required data, 198 companies were observed in this study. Data for firm performance was obtained from annual reports and financial statements, while ESG data was obtained from the LSEG Revinitif database.

ESG

This study uses environmental score, social score, and governance score data from the LSEG Revinitif, which assesses the application of ESG values in companies' annual reports. Assessments are conducted on each environmental aspects, social aspects, and governance aspects, with score ranging from 1 to 100. The assessment agency will assess listed companies based on information on the implementation of ESG values presented in the annual report (Xie et al., 2017; Ruan and Liu, 2021). A higher score indicates a better implementation of principles that support sustainability. Categories assessed for environmental aspect include using of resources, emissions of the carbon, and innovation of the business. Social aspects consist of workforce, labor, community, and responsibility of the products. The governance aspects consist of managerial factors, stokholders, and corporate social responsibility strategies (lseg.com).

Market Performance

Market performance is proxied by examining performance across financial then non-financial (market) factors. In this study we examine the non-financial performance indicator assessed is market performance based on Tobin's Q (Dincer et. al., 2023; Rahman et al., 2023).

Tobin's Q = (Total Equity Market Value + Total Liabilities) / (Assets Book Value)
Equity Market Value is obtained by multiplying share price and the number of shares outstanding.

Methodology

The study using multiple regression analysis. Before conducting the multiple linear regression analysis technique, the study conducted a test of classical assumption that consisting of a normality testing, a multicollinearity testing, a heteroscedasticity testing, and an autocorrelation testing to ensure that data processed was free from BLUE.

Results and Discussion

This study was consist of 99 companies that listed on the LSEG Revinitif and listed on IDX in 2022 to 2023. Therefore, sample used in this study was 198 companies. This study used 11 company sectors, consisting of:

Table 1. Industry Specification

Industry	Amount
Financial	28
Technology	3
Healthcare	1
Basic Material	13
Transportation	2

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Consumer Non-Cyclical	13
Industrial	3
Energy	9
Consumer Cyclical	6
Infrastructure	15
Property	6
Total	99

References: processed data

Tabel 2. Classical Assumption Test

Classical Assumption Test	Result	Conclusions
Normality Test K-Smirnov	Asym. Sig. 0,121 > 0,05	Normal
Multicollinearity Test	Tolerance = 0,4; VIF = 2,037	No Multicollinearity
Heteroscedasticity Test	p-value = 0,08	No Heteroscedasticity
Autocorrelation Test	DW = 1,768; DL = 1,7; 4-DU =2,36	No Autocorrelation

References: processed data

Based on the table of the classical assumption test, can be informed that the data in this study are free from BLUE (Best Linear Unbiased Estimator), allowing data testing to be performed using multiple regression analysis techniques.

Multiple Regression Analysis

The model in this study is:

MarketValue = α + β_1Environmental + β_2Social + β_3Governance + ε
MV = - 0,311 + 0,021 Env + 0,007 Social + 0,008 Gov

Based on this equation, it can be interpreted that:

1. Market Value is -0.311 if all independent variables are held constant.

2. The environmental coefficient is 0.021, meaning that every 1-unit increase in the environmental score results in a 0.021-unit increase in Tobin's Q ratio.

3. The social coefficient is 0.007, meaning that every 1 point gain in the social score then a 0.007-point increase in Tobin's Q ratio.

4. The governance coefficient is 0.008, meaning that every 1point gain in the governance value then a 0.008-point gain in Tobin's Q ratio.

Table 3. Hypothesis Testing

Variabel	t-value	Sig.	R square	Nilai F.
Environment	5,681	0,000	0,415	0,000
Social	1,592	0,113		
Governance	2,350	0,020		

References: processed data

From the table above, can be summarized that:

1. Environmental factor affecting the market value significantly positive.

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2. Social factor do not affecting the market value significantly positive.

3. Governance factor affecting the market value significantly positive.

4. ESG components, namely environment, social, and governance affecting the market value significantly positive.

5. The correlation value of .415 indicates that environmental, social, and governance variables explain 41.5% of the market value in the study's model, with the residual explained by other variables outside the regression model.

The Effect of Environmental Value on Market Value

Environmental performance evaluations executed by independent assessment agencies and undertaken voluntarily by organizations reflect corporate commitment to sustainable business practices. These findings demonstrate that environmental performance exerts significant positive influences on market valuation, indicating that markets increasingly attribute higher value to companies demonstrating robust environmental stewardship. This conclusion aligns with empirical research conducted by Liang et al. (2021), Yusoff & Darus (2021), Zhou et al. (2022), and Audito et al. (2024). Superior environmental performance scores, evaluated through metrics encompassing emissions management, resource efficiency, and innovation adoption, signify organizational attention to mitigating environmental degradation from emissions, optimizing resource utilization, and embracing technological advancements, thereby ensuring long-term business sustainability. Exemplary environmental performance outcomes elicit favorable market reactions, guiding investors toward informed decision-making processes.

The Influence of Social Score on Market Value

Social performance demonstrates no statistically significant impact on market valuation ($p > 0.05$), implying that Indonesian investors have not yet comprehensively integrated social considerations into their investment evaluation frameworks. This suggests that social dimensions evaluated through human rights practices, product accountability, labor management, and community engagement metrics exert minimal influence on market perceptions. Evidence indicates that social performance ratings neither enhance nor diminish market-based assessments of corporate value. Investment decisions appear independent of corporate social performance metrics, attributable to multiple factors including substantial social investment costs that potentially compress short-term investor returns. These results correspond with empirical findings from Devianti (2023) and Sutrisno & Iqbal (2023).

The Effect of Governance Score on Market Value

Effective corporate governance practices undoubtedly mitigate agency conflicts within organizations, consequently enhancing market trust in corporate performance. This research demonstrates that elevated governance scores transmit positive signals to market participants, thereby augmenting market valuation as measured through Tobin's Q. These findings correspond with investigations conducted by Güneş & Şengül (2023) and Putra & Adrianto (2024), which confirmed that governance components evaluated through management quality, shareholder relations, and corporate social responsibility strategies exert significant influences on market value.

Conclusion

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This study was conducted to assess ESG factors in influencing market value. ESG is assessed based on the score given by LSEG Revitinitif based on the annual report and sustainability report that has been prepared by the company. This study uses environmental value, social value, and governance value as independent variables and market value measured by the TobinsQ value as the dependent variable. From this study can be comfirmed that the environmental score has a significant effect on market value. The result indicates that higher environmental performance value more positive response from investors will be assessed by higher TobinsQ score and vice versa. The social score results do not have a significant positive effect on market value, this indicates that the high or low value of social performance in the ESG assessment does not have a significant effect on market response as assessed by the TobinsQ score. A limitations of this study are the incompleteness of ESG data, this study relatively short research period only 2 years. Future research could explore other sources for measuring ESG values besides the ESG score. Further research could also use variables such as market growth, firm size and leverage as control variable and use homogen industry sector.

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