


## The Effect of Board Characteristics on Environmental, Social, and Governance Disclosure

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Article Info	Abstract
<p><b>Keywords:</b></p> <ul style="list-style-type: none"> <li>○ Board Gender Diversity</li> <li>○ Independent Commissioners;</li> <li>○ Board Size;</li> <li>○ Environmental, Social, and Governance Disclosure</li> </ul>	<p><b>Purpose</b> – This study aims to obtain empirical evidence on the influence of board gender diversity, independent commissioners, and board size on environmental, social, and governance disclosure.</p> <p><b>Design/methodology/approach</b> – This study uses a type of quantitative research. The sample in this study is the infrastructure sector companies listed on the Indonesia Stock Exchange in 2022-2024 as many as 48 companies. The analysis technique used to test the hypothesis is multiple regression analysis using the Eviews 9 software.</p> <p><b>Findings</b> – The results of this study found that board gender diversity had a positive and statistically significant effect on environmental, social, and governance disclosure, while independent commissioners had a positive and statistically insignificant effect on environmental, social, and governance disclosure, and board size had a positive and statistically significant effect on environmental, social, and governance disclosure.</p> <p><b>Research limitations/implications</b> – This study is limited to the 2022-2024 observation period and uses only three independent variables, so it does not include other factors such as profitability and company size. The practical implication is that management needs to optimize the board structure and oversight functions to support sustainability strategies and long-term value creation.</p>
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 <p>Copyright: © 2026by the authors. Submitted for possible open access publication under the terms and conditions of the Creative Commons Attribution (CC BY SA) license (<a href="https://creativecommons.org/licenses/by-sa/4.0/">https://creativecommons.org/licenses/by-sa/4.0/</a>)</p>	<p><b>JEL : G34, M14, J16, Q56</b></p>

## INTRODUCTION

The infrastructure sector has a strategic role in driving economic growth and sustainable development, but on the other hand it also has significant environmental and social impacts due to the characteristics of its large-scale and long-term projects. This condition makes Environmental, Social, and Governance (ESG) disclosure an important instrument for infrastructure companies to demonstrate transparency, accountability, and commitment to sustainable business practices. In Indonesia, regulators' push for sustainability reporting is

getting stronger, as reflected in the Financial Services Authority (OJK) regulations that encourage public companies to submit sustainability reports as a form of corporate accountability (Jimantoro et al., 2023). However, the level and quality of ESG disclosure between infrastructure companies still shows considerable variation. These differences indicate that ESG disclosure is not only influenced by external factors such as regulations, but also by internal factors of the company, in particular corporate governance mechanisms.

Factors that can affect Environmental, Social, and Governance (ESG) Disclosure are Board Gender Diversity. Gender diversity on the board of directors reflects differences in perspectives, values, and leadership styles in the company's strategic decision-making process, including in the disclosure of social and environmental responsibilities (Farizki & Harto, 2025). Research findings conducted by (Ali & Firmansyah, 2023) and (Risanti et al., 2024), which states that the board gender diversity has a positive effect on environmental, social, and governmental disclosure. However, in contrast to research conducted by (Paramita & Dewi, 2024), which states that board gender diversity has a negative effect on environmental, social, and governmental disclosure.

Another factor that can affect is Independent Commissioners. With a higher proportion of independent commissioners, oversight of the implementation of governance principles and the disclosure of ESG information becomes more effective (Fujianti et al., 2024). As the findings of the research conducted by (Sirait & Fuad, 2024) and (Susanto et al., 2024), which states that independent commissioners have a positive effect on environmental, social, and governmental disclosure. However, it is inversely proportional to the research conducted by (Zachary & Fuad, 2025), which states that independent commissioners have a negative effect on environmental, social, and governmental disclosure.

Furthermore, board size can be a factor that affects environmental, social, and governance (ESG) disclosure. Larger board sizes typically reflect a wider diversity of views, experiences, and expertise in the decision-making process. Research findings conducted by (Chebbi & Ammer, 2022) stated that board size has a positive effect on environmental, social, and governance disclosure. However, in contrast to research conducted by (Alvahlevi & Syafruddin, 2025) stating that board size has a negative effect on environmental, social, and governance disclosure.

Based on the phenomenon, uncertainty of research results, and the importance of environmental strategies on company performance, this study aims to analyze the influence of board gender diversity, independent commissioners, and board size on environmental, social, and governance disclosure. This research is expected to make an empirical contribution to the development of the literature on sustainable finance strategies, as well as practical considerations for the Company.

## LITERATUR REVIEW

### Agency Theory

Agency theory First developed by Jensen & Meckling (1976), this theory describes the relationship between principals (shareholders) and agents (management). This theory explains the existence of a conflict of interest between management (agent) and shareholders (Main) which arises due to differences in objectives and information asymmetry. According to (Risanti et al., 2024), one of these mechanisms is the existence of a board of directors whose function is

to supervise management performance and ensure information disclosure. To reduce these conflicts, an effective corporate governance mechanism is needed to ensure that management acts in accordance with the interests of shareholders.

## **Stakeholder Theory**

Stakeholder theory is a theory developed by Freeman (1984). According to (Alvahlevi & Syafruddin, 2025), explaining that the company's responsibility is not only to the interests of shareholders, but also to all stakeholders involved, including society, the environment, and Squirrel others that have a direct or indirect impact on business activities. This theory emphasizes that a company's success is determined by its ability to meet the interests of the various parties involved or affected by its activities.

## **Legitimacy Theory**

Legitimacy theory is a theory that was first developed by Dowling & Pfeffer (1975). Legitimacy theory is a corporate governance policy that aims at partiality towards the community, government, individuals, and community groups. The main focus of legitimacy theory is the relationship between companies and society. There is a "social contract" between society and the organization, with the basic principle that the organization's goal is to act in a fully socially responsible manner to meet the expectations, values, and principles of the social system of the stakeholders (Zachary & Fuad, 2025).

## **Resource Dependency Theory**

Resource dependency theory was first developed by Pfeffer & Salancik (1978), stating that complex resources can reduce uncertainty in organizational relationships and can increase the power of companies. According to (Alvahlevi & Syafruddin, 2025), Resource dependency theory states that the larger the size of the board, the more diverse the backgrounds, knowledge, skills, and expertise of its members, and the wider political and economic connections necessary to access important resources from the external environment, such as assets, capital, markets, materials, contacts, and contracts.

## **Board Gender Diversity**

A gender diversity board is a composition of board of directors or board of commissioners that includes representation of both genders, namely men and women, thus creating a mix of different perspectives, experiences, and decision-making styles (Devnew et al., 2018). As for the (Dewi et al., 2024). Board gender diversity is part of diversity that shows the existence and representation of women on the company's board with a certain number or percentage.

## **Independent Commissioners**

According to (Samsul, 2006) Independent commissioners are members of commissioners who do not have an affiliation with other members of the commissioners, members of the board of directors, and controlling shareholders. Meanwhile, according to (Novriyani, 2024) In his book, it is stated that, Independent commissioners are members of the board of commissioners who are not affiliated with management, other members of the board of commissioners and controlling shareholders, and are free from business relationships or other relationships that may affect their ability to act independently or act solely in the interest

of the company.

## **Environmental, Social, and Governance Disclosure**

Environmental, Social, and Governance (ESG) disclosure is a company's disclosure report on its sustainability practices and social responsibilities that is used as a basis for investors to assess sustainability performance (Esty & Cort, 2020). ESG disclosure is an indicator by stakeholders (*Squirrel*) in looking at the company's responsibility to the environment, social and corporate governance practices. ESG principles refer to three factors that measure the impact of sustainability and ethics in making decisions to invest. The three factors are: Environment, Social and Governance.

## **Board Size**

According to (Yocam & Choi, 2010), Board size is the number of members of the board of directors that affects the effectiveness of supervision and corporate governance, and varies depending on the characteristics and size of the company. This size tends to be related to how big or small companies with larger revenues tend to have more average board members (Larcker & Tayan, 2011).

## **Hypotheses development**

### **Board Gender Diversity on Environmental, Social, and Governance Disclosure**

The board of directors is an important part of a company that is fully responsible for the management and management of the company in order to achieve its goals. As in the Agency Theory introduced by (Jensen & Meckling, 1976) explains the relationship between the owner of the company (principal) and manager (agent). The board of directors serves as a supervisory mechanism to ensure that management acts in the best interests of shareholders. Gender diversity within the board of directors shows a variety of viewpoints, values, and leadership styles that are able to increase the company's awareness of social and environmental issues. In addition, the presence of women is also believed to be able to increase objectivity and transparency in company decision-making (Rinaldy & Inawati, 2025). Thus, the greater the percentage of female board members, the higher the company's chances of delivering ESG information in a more comprehensive and detailed way. This research is in line with research conducted by (Ali & Firmansyah, 2023), stating that the Gender Diversity Board has a positive effect on Environmental, Social, and Governance (ESG) Disclosure. Therefore, the researcher formulated the following hypothesis:

**H<sub>1</sub>: Board Gender Diversity has a positive effect on Environmental, Social, and Governance (ESG) Disclosure.**

### **Independent Commissioners on Environmental, Social, and Governance Disclosure**

Independent commissioners are members of the board of commissioners who come from outside the company and have no affiliational, financial, ownership, or family relationship with the management, board of directors, other commissioners, or controlling shareholders. Stakeholder Theory (Freeman, 1984) explains, to maintain the success of the company, management must be able to implement processes that satisfy stakeholders. The independent commissioner encourages transparency through ESG disclosure as one of the means of communication that the company is able to balance business performance along with

its sustainability performance (Sirait & Fuad, 2024). The more independent commissioners there are, the more independent commissioners can make more objective decisions to protect the rights of stakeholders, namely through wider information disclosure. Based on the theoretical study and also the previous research above, the researcher took a hypothesis, namely:

**H<sub>2</sub>: Independent Commissioners have a positive impact on Environmental, Social, and Governance (ESG) Disclosure.**

### **Board Size on Environmental, Social, and Governance Disclosure**

Board size is the number of members of the board of directors in a company who have an important role in the implementation of corporate governance. As in the Resource Dependence Theory introduced by (Pfeffer & Salancik, 1978), states that organizations depend on external resources to survive and achieve their strategic goals. Thus, the composition of the board (the size of the board) has a substantial role in relation to ESG disclosure. The larger the board size, the higher the level of Environmental, Social, and Governance (ESG) disclosure of the company, as the larger board is able to provide more resources, external connections, and institutional legitimacy that supports increased transparency and accountability for the company's sustainability (Chebbi & Ammer, 2022). Therefore, the researcher formulated the following hypothesis:

**H<sub>3</sub>: Board Size has a positive effect on Environmental, Social, and Governance (ESG) Disclosure.**

## **RESEARCH METHOD**

The population in this study is companies in the infrastructure sector listed on the Indonesia Stock Exchange (IDX) in 2022-2024. This study aims to determine the possible relationship regarding the influence of the independent variables Board Gender Diversity, Independent Commissioners and Board Size on the dependent variables of Environmental, Social, and Governance Disclosure. The methodology used in this study is quantitative. The data of this research is sourced from the company's annual report and sustainability report. The level of intervention of researchers in this study is with a minimum level of intervention. This study uses panel data which is a combination of cross-section and time series. This study uses non-probability sampling with purposive sampling techniques (Sekaran & Bougie, 2013).

**Table 1. Sample Selection**

Number of companies in the infrastructure sector listed on the Indonesia Stock Exchange as of December 31, 2024		73 Companies
Criteria		
	Companies in the infrastructure sector that are not listed (unlisted) on the Indonesia Stock Exchange in 2022-2024	(10 Companies)
Criteria 1	Companies in the infrastructure sector listed on the Indonesia Stock Exchange in 2022-2024	63 Companies



	Companies in the infrastructure sector that do not submit an Annual Report for 2022-2024 that can be used in this study	(7 Companies)
Criteria 2	Companies in the infrastructure sector that submit Annual Report for year 2022-2024 that can be used in this study	56 Companies
	Companies in the infrastructure sector that do not submit a Sustainability Report for 2022-2024 that can be used in this study	(7 Companies)
Criteria 3	Companies in the infrastructure sector that submit Sustainability Reports for year 2022-2024 that can be used in this study	49 Companies
Company Sample		48 Company

**Table 2. Variable Measurement**

Type	Variable	Dimension / Formula	Source
Independent Variables	Board Gender Diversity	$BGD = \frac{\sum \text{Female Directors}}{\sum \text{Members of the Board of Directors}}$	(Aulia et al., 2025)
	Independent Commissioners	$CI = \frac{\sum \text{Independent Commissioners}}{\sum \text{Members of the Board of Commissioners}}$	(Sirait & Fuad, 2024)
	Board Size	$BS = \frac{\sum \text{member of the board directors}}{\sum \text{member of the board directors minimum}}$	(Marheni et al., 2024)
Dependent Variable	Environmental, Social, and Governance Disclosure	$ESGD = \frac{\text{Number of ESG items disclosed by the company}}{\text{Number of ESG items according to GRI Standards}}$	(Paramita & Dewi, 2024)

This study uses the panel data regression method for data analysis. The data regression panel was chosen because it is able to combine cross-sectional (inter-company) dimensions and time series dimensions (2022-2024 period), so that the analysis results are more accurate than regular linear regression. The model used in this study is as follows:

$$ESGD = \beta_0 + \beta_1 BGD + \beta_2 IC + \beta_3 BS + \varepsilon$$

## RESULTS

Descriptive statistical analysis explains the independent variables and dependent variables used in this study. Based on the results of the study, it is known that the minimum,

maximum, average and standard deviation values of each variable are used in the 2022-2024 observation period. Here is a table of descriptive statistical results:

**Table 3. Descriptive Statistics**

Variable	N	Min	Max	Red	Std. Dev
BGD	144	0.000	0.670	0.249	0.193
IC	144	0.330	1.000	0.468	0.134
BS	144	1.500	4.500	2.232	0.663
ESGD	144	0.360	0.950	0.638	0.133

Source: Output Eviews 9 (2025)

## Selection of the Best Panel Data Model

### Chow Test

The criteria for making Chow test decisions are as follows:

1. If the probability (Prob) on Cross Section F < 0.05 then a better model is Fixed Effect.
2. If the probability (Prob) on Cross Section F > 0.05 then a better model is Common Effect.

**Table 4. Chow Test**

Effects Test	Statistic	D.F.	Prob.
Cross-section F	11.228348	(47,93)	0.0000
Cross-section Chi-square	273.355269	47	0.0000

Source: Output Eviews 9 (2025)

Based on the results of the Chow Test conducted using E-Views 9, a cross-section probability value of F was obtained of 0.0000, which is smaller than the level ( $\alpha = 0.05$ ). These results show that the most suitable model is the Fixed Effect Model (FEM). Therefore, it is necessary to perform the Hausman Test to determine which model is more appropriate to use between the Fixed Effect Model and the Random Effect Model.

### Hausman Test

The criteria for making decisions on the Hausman test are as follows:

1. If the Probability (Prob) < 0.05 then a better model is Fixed Effect.
2. If the Probability (Prob) > 0.05 then a better model is Random Effect

**Table 5. Hausman Test**

Test Summary	Chi-Sq. Statistic	Chi-Sq. D.F.	Prob.
Cross-section random	3.539292	3	0.3157

Source: Output Eviews 9 (2025)

Based on the results of the thirist test, the probability value is 0.3157 where this result is more than the significance level value ( $\alpha = 0.05$ ). In this case, the best model is the Random

Effect Model (REM). Therefore, a Lagrange Multiplier test is needed in order to determine the best model between the Common Effect Model and the Random Effect Model.

## Lagrange Multiplier Test

The decision-making criteria for the Lagrange Multiplier test are as follows:

1. If the Significance on Both < 0.05 then a better model is the Random Effect.
2. If the Significance on Both > 0.05 then a better model is Common Effect.

**Table 6. Multipler Lagrange Test**

	Test Hypothesis		
	Cross-section	Time	Both
Breusch-Pagan	82.38596 (0.0000)	5.512608 (0.0189)	87.89857 (0.0000)

Source: Output Eviews 9 (2025)

Based on the results of the Lagrange Multiplier test, the significance value for Both Breusch-Pagan is 0.000. This result is less than the significance level value ( $\alpha = 0.05$ ). Thus, the best model used is the Random Effect Model (REM).

## Multiple Regression Analysis

**Table 7. Regression Data Panel Analysis**

Variable	Coefficient	Std. Error	t-Statistic	Prob.
C	0.508997	0.070312	7.239115	0.0000
BGD	0.085039	0.062868	1.352665	0.1783
IC	0.015547	0.079784	0.194869	0.8458
BS	0.045243	0.020745	2.180915	0.0309

BGD: Board Gender Diversity, IC: Independent Commissioners, BS: Board Size.

Source: Output Eviews 9 (2025)

The results of panel data regression estimation using the Random Effect Model (REM) show the results of testing with panel data regression, so from these results the following model equation is obtained.

$$ESGD = 0.5089 + 0.0850 \cdot BGD + 0.0155 \cdot CI + 0.0452 \cdot BS + \varepsilon$$

## Coefficient of Determination Test

**Table 8. Coefficient of Determination Test**

R-squared	0.039370	Mean dependent var	0.185985
Adjusted R-squared	0.018785	S.D. dependent var	0.063146



S.E. of regression	0.062550	Sum squared resid	0.547743
F-statistic	1.912576	Durbin-Watson stat	1.585379
Prob(F-statistic)	0.130319		

R-Squared shows a value of 0.039370 which means that 3.9% of the variables Board Gender Diversity, Independent Commissioners and Board Size can explain the variables Environmental, Social, and Governance Disclosure. This indicates that ESG disclosures are more influenced by other factors, particularly external factors such as regulatory pressures, investor demands, and public expectations of infrastructure sector companies. In addition, the governance variables used are structural so they do not fully reflect the quality of supervision and the board's commitment to sustainability issues.

## Partial Test (T-Test)

**Table 9. Partial Test (T-Test)**

Variable	Coefficient	Std. Error	t-Statistic	Prob.
C	0.508997	0.070312	7.239115	0.0000
BGD	0.085039	0.062868	1.352665	0.1783
IC	0.015547	0.079784	0.194869	0.8458
BS	0.045243	0.020745	2.180915	0.0309

BGD: Board Gender Diversity, IC: Independent Commissioners, BS: Board Size.

Source: Output Eviews 9 (2025)

The results of the test using the Random Effect Model (REM) can be concluded as follows:

1. Board Gender Diversity with a probability value of  $0.1783 > 0.05$ , can be interpreted that the Board Gender Diversity variable has a positive effect and is statistically insignificant on Environmental, Social, and Governance Disclosure.
2. Independent Commissioners with a probability value of  $0.8458 > 0.05$ , can be interpreted that the Independent Commissioners variable has a positive effect and is statistically insignificant on Environmental, Social, and Governance Disclosure.
3. Board Size with a probability value of  $0.0309 < 0.05$ , can be interpreted that the Board Size variable has a positive effect and is statistically significant on Environmental, Social, and Governance Disclosure.

## DISCUSSIONS

### Board Gender Diversity on Environmental, Social, and Governance Disclosure

Based on a partial test (t-test) using the Random Effects Model (REM), the results showed that the Board Gender Diversity variable had a coefficient of 0.085039 with a probability of  $0.1783/2 = 0.0891$ , which was greater than the significance level of  $\alpha = 5\%$  (0.05). This means that the Gender Diversity Board has a positive but not significant effect on

Environmental, Social, and Governance Disclosure. The results show that corporate governance mechanisms are not always the main determinant of ESG disclosure, thus confirming that ESG practices are influenced by a combination of internal and external factors of the company.

Based on agency theory, the board functions as a control mechanism to minimize conflicts of interest between management as agents and shareholders as principals. The insignificance of these results can be attributed to the low proportion of women on boards and the dominance of other factors, such as regulatory and external policy pressures, in determining ESG disclosure practices. Thus, from the perspective of Agency Theory, the Gender Diversity Board in infrastructure sector companies acts as an additional supervisory mechanism, but has not yet become the main tool in reducing agency problems through increased ESG disclosure.

The findings are in line with research conducted by (Ali & Firmansyah, 2023) and (Aulia et al., 2025), which states that the Gender Diversity Board has a positive effect on Environmental, Social, and Governance Disclosure.

## **Independent Commissioners on Environmental, Social, and Governance Disclosure**

Based on a partial test (t-test) using the Random Effects Model (REM), the results showed that the Independent Commissioners variable had a coefficient of 0.015547 with a probability of  $0.8458/2 = 0.4229$ , which is greater than the significance level of  $\alpha = 5\%$  (0.05). This means that Independent Commissioners have a positive but not significant effect on Environmental, Social, and Governance Disclosure. These findings indicate that the existence of independent commissioners has not been effective in encouraging ESG transparency in infrastructure sector companies.

This shows that the role of independent commissioners still tends to be formalistic in fulfillment of regulatory provisions, so their contribution to substantive oversight, especially related to sustainability issues, is still limited. In addition, the limited competence and understanding of independent commissioners on ESG issues, as well as the dominance of management or controlling shareholders in strategic decision-making, also weaken the supervisory function of independent commissioners in improving the quality and breadth of ESG disclosure. These results do not empirically support Stakeholder Theory, which assumes that independent commissioners are able to represent broader stakeholder interests through increased ESG transparency. Thus, these findings confirm that the existence of independent commissioners in infrastructure sector companies has not yet served as an effective governance mechanism in promoting ESG disclosure, although theoretically such a role is expected to exist.

Nonetheless, the positive direction of the relationship suggests that the existence of independent commissioners still has the potential to drive ESG disclosure practices. These findings are in line with research conducted by (Fujianti et al., 2024) and (Susanto et al., 2024), which found that Independent Commissioners had a positive influence on Environmental, Social, and Governance Disclosure.

## **Board Size on Environmental, Social, and Governance Disclosure**

Based on a partial test (t-test) using the Random Effects Model (REM), the results showed that the Board Size variable had a coefficient of 0.045243 with a probability of  $0.0309/2 = 0.0154$ , which was smaller than the significance level of  $\alpha = 5\%$  (0.05). This means that Board

Size has a positive and significant effect on Environmental, Social, and Governance Disclosure. This shows that the more board size a company has, the higher the level of ESG disclosure carried out.

Based on Resource Dependency Theory, this theory views the board of directors as a strategic resource that provides knowledge, expertise, experience, and external networks for companies. The larger the size of the board of directors, the more diverse the resources the company has to deal with dependence on the external environment, including the demands of transparency and sustainability. A board of directors with a larger number of members allows for a clearer division of duties and focus, so that attention to ESG issues can be more effectively integrated into corporate policies and reporting.

The findings of this study are in line with previous research conducted by (Chebbi & Ammer, 2022) and (Zachary & Fuad, 2025) which found that Board Size has a positive influence on Environmental, Social, and Governance Disclosure. This shows that a larger Board Size enhances the company's ability to formulate strategies, oversee policy implementation, and respond to stakeholder demands related to environmental and social issues.

## CONCLUSIONS

This study shows that Board Gender Diversity has a positive and significant influence on Environmental, Social, and Governance Disclosure. This shows that gender diversity in the board ranks is able to present differences in perspectives, values, and experiences between male and female board members. Meanwhile, Independent Commissioners have a positive but insignificant influence on Environmental, Social, and Governance Disclosure. Because, the existence of independent commissioners is often more focused on the function of supervising compliance and protecting the interests of shareholders, rather than specifically on sustainability disclosure. Meanwhile, Board Size has a positive and significant influence on Environmental, Social, and Governance Disclosure. This shows that larger councils tend to have more diverse knowledge and experience resources, thus being able to pay wider attention to environmental, social, and governance issues.

The implications of this study emphasize that the characteristics of corporate governance, particularly board gender diversity, independent commissioners, and board size, have not been fully dominant factors in driving ESG disclosure. Therefore, the management of the company needs to optimize the functions of the board substantially, not only in terms of structure, but also in the quality of roles and decision-making. Increasing gender diversity needs to be accompanied by giving a strategic role to female board members in sustainability committees. In addition, independent commissioners need to be actively involved in the oversight of ESG policies, while optimal board size should be balanced with clear coordination and division of duties for ESG oversight to be more effective.

This research is expected to provide input for future research, further research can consider other corporate governance variables, such as the frequency of board meetings, institutional ownership, audit committees, or sustainability committees, to gain a more comprehensive understanding of the factors that affect ESG disclosure. Then, expand the

research period to capture long-term trends related to changes in Environmental, Social, and Governance (ESG) disclosure practices. In addition, the researcher is further advised to not only focus on the infrastructure sector, but also to consider sectors such as the transportation and logistics sector as well as the property and real estate sectors. So that it has different and relevant sustainability characteristics to be studied further in the context of ESG disclosure. For regulators, it is recommended not only to set quantitative provisions related to the structure of the board, but also to strengthen the quality and competence aspects of board members in sustainability issues. Relevant authorities can encourage ESG training obligations for directors and commissioners, as well as clarify the role of independent commissioners in ESG oversight and reporting.

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