CHAPTER V
CONCLUSION

5.1 Research Conclusion

The research findings and discussion investigate the determinants of carbon emissions disclosure at the manufacturing firms in Southeast Asia countries, from 2020 to 2024. The dependent variable is carbon emissions disclosure, which measures of total GHG in scope 1 and scope 2 to total revenue. The independent variables are firm size, profitability, debt financing, and capital expenditure. The moderating variable is environmental performance, including the control variables such as capital intensity and growth. The analysis for hypothesis testing was conducted through STATA MP 17. The detailed panel data regression analysis is below.

1. Firm Size has a significantly positive effect on determining carbon emissions disclosure. The finding explains that the higher of firm size, indicates higher the level of disclosure of carbon emissions. Otherwise, the role of environmental performance can not moderate the relationship between firm size on carbon emissions disclosure.
2. Profitability has an insignificantly negative effect on determining carbon emissions disclosure. Otherwise, the role of environmental performance can not moderate the relationship between profitability on carbon emissions disclosure.
3. Debt financing has a significantly negative effect on carbon emissions disclosure. Firms with higher leverage tend to disclose less, possibly due to financial constraint and risk aversion. Otherwise, the environmental

performance can moderate the relationship between debt financing and carbon emissions disclosure. Thus, indicating that environmentally responsible firms are more likely to offset the negative influence of debt on disclosure, using carbon transparency as a strategic communication tool to build trust with creditors and investors.

4. The regression of this study suggests that capital expenditure, capital intensity, growth, and environmental performance as direct variable shows no significant effect on carbon emissions disclosure. These variables may influence disclosure indirectly through firm strategy or external pressures rather than direct operational measures.

5.2 Research Limitations

While providing valuable insight, this study contains limitations that offer opportunities for future study:

1. This study only focuses on the five years of 2020-2024, which requires at least three years of complete data, resulting in a relatively small sample size. Due to the total number of firms that disclose the ratio of GHG Scope 1 and Scope 2 to total revenue being limited. This may limit the generalization of the findings. Additionally, this analysis focuses solely on environmental performance as a moderating factor.
2. The study only observes financial characteristics, omitting other potential variables like governance aspects, such as board gender diversity, national diversity of the board, and so on.

3. This study only focuses on the manufacturing firms in Southeast Asia that were collected from the database Eikon Refinitiv.

5.3 Research Implications

The study is expected to be useful and can be implemented by the interested parties. The following implication of the research is explained below:

1. Theoretical Implications

   The study enriches the empirical evidence regarding how specific ESG sub-categories, particularly those related to carbon emissions, are disclosed in the Southeast Asian market. However, this study adds literature about the environmental performance as a moderating variable that suggests sustainable behavior can mitigate financial pressure (highly debt-financed).

2. Firm's Implication

   This study suggests a firms, especially those with higher debt levels, should enhance their environmental performance and disclosure to build credibility among stakeholders and financiers.

3. Regulatory Implications

   This study supports that the policies promoting a standardized carbon disclosure framework are essential to improve reporting consistency and transparency.

4. Investors' Implications

   This study supports additional consideration of information for the investors to serve as an indicator of a firm's long-term sustainability orientation and governance quality

5.4 Research Recommendation

To advance sustainable finance literature, subsequent research has to consider:

1. Future study to expand the scope of the sample by including a wider range of the time period to capture more economic cycles, and decrease the anomalies in the short term.
2. Future study could incorporate additional moderating variables, such as corporate governance quality, board gender diversity, or ownership structure, to capture the internal dynamics that shape a firm's sustainability reporting practice.
3. Future study on this topic could explore alternative sub-categories, such as capital intensity and growth, to further identify which factors genuinely influence carbon emissions disclosure.
4. Future study on this topic explores other profitability proxies beyond those examined in this study to further identify.