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Tax aggressiveness and sustainable income smoothing: The moderating of independent commissioner

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ABSTRACT

This study aims to empirically investigate the influence of tax aggressiveness on the probability of sustainable income smoothing. Furthermore, it explores how the presence of independent commissioners moderates this relationship. The analysis is based on a sample of 49 manufacturing firms listed on the Indonesia Stock Exchange during the period 2021–2023, selected through a purposive sampling technique. Logistic regression was employed to assess the research hypotheses. The empirical findings confirm that tax aggressiveness significantly increases the likelihood of sustainable income smoothing. Additionally, the results demonstrate that independent commissioners can attenuate the effect of tax aggressiveness on income smoothing, highlighting their critical role in corporate governance mechanisms. Firms exhibiting aggressive tax behavior appear to engage in income smoothing as a strategic approach to maintain earnings stability and support long-term sustainability objectives. Companies engaged in tax aggressiveness may exhibit income-smoothing behaviors, and independent commissioners, as part of corporate governance mechanisms, can mitigate the impact of tax aggressiveness on the likelihood of such practices. This study offers valuable insights for regulatory bodies such as the Financial Services Authority (OJK) in formulating governance-related policies. Strengthening the role and effectiveness of independent commissioners may help mitigate earnings management associated with tax avoidance strategies.

Contribution/Originality: This research contributes to the literature by introducing independent commissioners as a moderating variable in the nexus between tax aggressiveness and sustainable income smoothing an area that remains underexplored, particularly in the context of emerging markets.

1. INTRODUCTION

Financial statements represent the culmination of the accounting process and serve as a crucial source of information for stakeholders in assessing the financial condition and performance of a company (Pradipta & Susanto, 2019). The data presented in these reports can significantly influence economic decision-making. One key element is the reported profit in the income statement, which frequently becomes the primary focus of financial statement users (Sugiarti, 2017). Recognizing the importance of profit figures often drives management to engage in opportunistic behavior that distorts financial information (Budiasih, 2009). The prevailing belief that rising profits lead to increased stock prices remains widely accepted. As a result, management may be incentivized to manipulate revenues and expenses to achieve targeted profit outcomes. Such practices are generally referred to as earnings management (Pradipta & Susanto, 2019; Susanto, Pradipta, & Handojo, 2021).

Income smoothing constitutes a specific form of earnings management wherein management intentionally reduces fluctuations in reported earnings over time. This strategy is typically employed to present a stable and favorable portrayal of the company's financial performance, retain investor confidence, and safeguard managerial positions (Fudenberg & Tirole, 1995; Pradipta & Susanto, 2019). However, such practices can be detrimental to investors, as they may obscure the actual financial health of the firm and impair informed decision-making (Matsuura, 2008; Pradipta & Susanto, 2019). To mitigate these risks, previous studies have emphasized the importance of enhancing the oversight of financial reporting through robust corporate governance mechanisms (Obiaga & Ikiriko, 2021). Although accounting standard-setting bodies have made efforts to curb earnings management, existing standards still allow managers significant flexibility in the preparation and presentation of financial statements (Matsuura, 2008).

Income smoothing defined as the deliberate management of reported earnings to minimize fluctuations over time has been examined across a wide range of organizational and economic settings. The underlying motivation often arises from managerial opportunism, where executives aim to secure personal benefits or job security, given that current financial performance tends to be prioritized over historical outcomes (Fudenberg & Tirole, 1995). The ethical implications of this practice remain contested, as it entails purposeful manipulation of financial outcomes to meet predetermined objectives (Chong, 2006). Although previous research has explored the relationship between income smoothing, tax aggressiveness, and the role of independent commissioners, there remains a gap in the literature concerning the interactive effect of tax aggressiveness and independent board oversight on income smoothing particularly within the framework of corporate sustainability.

Income smoothing refers to the deliberate actions taken by management to either elevate or reduce reported earnings with the aim of minimizing fluctuations over time, thereby aligning current income figures more closely with those of prior periods (Pradipta & Susanto, 2019). This practice is often employed to enhance the company's financial image and may be driven by various factors such as declining stock prices, disparities between expected and actual earnings, or the influence of changes in accounting policies on reported income (Wijaya, Mauren, & Cahyadi, 2020). However, income smoothing can mislead users of financial statements, potentially resulting in suboptimal economic decisions. These concerns form the foundation of this study, which seeks to identify the key determinants influencing income smoothing behavior.

The relationship between tax aggressiveness and income smoothing is multifaceted and warrants further investigation. While profitability and financial leverage are known to influence tax aggressiveness, existing findings suggest that income smoothing does not serve as a mediating factor in this relationship (Alfandia & Muliasari, 2024). Companies may engage in earnings management strategies to present stable and positive earnings, particularly during periods of financial distress. Interestingly, practices aimed at inflating earnings are often found to have an inverse association with tax aggressiveness (Sánchez-Ballesta & Yagüe, 2021). Conversely, both financial leverage and earnings management exhibit a positive correlation with tax aggressiveness (Nurhandono & Firmansyah, 2017). A key motivation behind income smoothing is management's intent to minimize tax obligations, thereby indicating a direct positive effect of tax aggressiveness on income smoothing behavior (Saputra & Agustin, 2022).

The inconsistent findings in previous studies regarding the relationship between tax aggressiveness and income smoothing suggest the potential influence of contextual factors. This research introduces independent commissioners as a moderating variable that may shape the relationship between tax aggressiveness and income smoothing. Prior evidence shows that independent commissioners can have a positive impact on income smoothing practices (Kustono, Roziq, & Nanggala, 2021). As part of the corporate governance mechanism, independent commissioners are expected to oversee managerial behavior and curb opportunistic actions (Kustono et al., 2021). These insights point to a nuanced interplay between tax aggressiveness and income smoothing, particularly when the presence of independent commissioners facilitates the realization of sustainable income smoothing.

This paper aims to present empirical data regarding how tax aggressiveness affects the possibility of sustainable income smoothing. It also explores how independent commissioners may moderate the association between sustainable income smoothing and tax aggressiveness. The manufacturing companies included in the research sample were listed between 2021 and 2023 on the Indonesia Stock Exchange. Since the connection between tax aggressiveness and sustainable income smoothing continues to garner scholarly attention, the topic remains highly relevant today. The uniqueness and importance of this research are underscored by the fact that independent commissioners have not yet been included as a moderating component in previous studies examining this particular relationship.

The findings of this study confirm the hypothesis that tax aggressiveness significantly influences the likelihood of sustainable income smoothing. Moreover, the results validate the proposed hypothesis regarding the moderating role of independent commissioners in the relationship between tax aggressiveness and sustainable income smoothing. Firms engaging in tax aggressive behavior often exhibit tendencies toward income smoothing as part of their efforts to meet long-term sustainability objectives. As a key mechanism of corporate governance, independent commissioners are instrumental in mitigating the influence of tax aggressiveness on income smoothing practices. These insights offer valuable implications for financial regulatory bodies, particularly in formulating policies that enhance the effectiveness of corporate governance frameworks through strengthened oversight by independent commissioners. Such regulatory measures may help curb the prevalence of tax aggressiveness, which often serves as an indicator of sustainable income smoothing behavior.

This study contributes to the sustainable income smoothing research literature. First, this study provides empirical evidence of the relationship between tax aggressiveness and sustainable income smoothing, which is rarely researched (Saputra & Agustin, 2022). Most studies examine the relationship between tax aggressiveness and earnings management (Alfandia & Muliasari, 2024; Nurhandono & Firmansyah, 2017; Sánchez-Ballesta & Yagüe, 2021). Second, this study provides empirical evidence of the literature on the effect of independent commissioners on the relationship between tax aggressiveness and sustainable income smoothing.

2. LITERATURE REVIEW

Agency theory describes a contractual relationship in which one party, the agent, is authorized to act on behalf of another party, the principal (Pradipta & Susanto, 2019). Within this framework, conflicts may arise due to the misalignment of interests between shareholders (or investors) and corporate management. These differing objectives create potential for agency problems, wherein managerial decisions may not always align with the best interests of the owners. Thus, agency theory highlights the principal-agent relationship and the inherent possibility of divergent goals between the two parties.

Income smoothing, a form of earnings management, poses a risk to investors by presenting an artificially enhanced picture of company performance (Pradipta & Susanto, 2019). It involves the manipulation of reported earnings by management, creating a misleading portrayal of financial stability (Firnanti, 2019). In countries with limited adoption of International Financial Reporting Standards (IFRS), such as Indonesia, Thailand, and Vietnam, income smoothing is often employed as a strategy to attract investors (Alexander, 2019). This practice entails altering financial statements to moderate earnings fluctuations over time, reducing perceived risk (Di Fabio, Ramassa, & Quagli, 2021). By utilizing the flexibility inherent in financial accounting standards, income smoothing helps to mitigate abnormal earnings volatility (Saputra & Agustin, 2022). When earnings are excessively high, management may smooth income by reducing them, and vice versa, ensuring more stable financial reporting. This practice allows management to secure consistent compensation, irrespective of fluctuations in actual performance (Fasipe & Sun, 2020).

The relationship between tax aggressiveness and income smoothing is intricate and warrants further examination. Profitability and leverage have a direct influence on tax aggressiveness; however, income smoothing does not mediate this relationship (Alfandia & Muliasari, 2024). Companies engage in earnings management to present positive and stable financial results, particularly when facing financial challenges. Nevertheless, attempts to manage earnings in order to inflate profits are found to have an inverse relationship with tax aggressiveness (Sánchez-Ballesta & Yagüe, 2021). Conversely, both financial leverage and earnings management are positively correlated with tax aggressiveness (Nurhandono & Firmansyah, 2017). Previous studies, Alfandia and Muliasari (2024); Sánchez-Ballesta and Yagüe (2021); and Nurhandono and Firmansyah (2017) underscore the complex and multifaceted nature of the interaction between earnings management and tax aggressiveness.

One key motivation for management to engage in income smoothing is the desire to minimize tax liabilities, as tax aggressiveness is often associated with an increased likelihood of income smoothing (Saputra & Agustin, 2022). Companies may smooth earnings to reduce the overall tax burden by presenting more consistent income figures. On the other hand, some argue that tax aggressiveness does not directly influence income smoothing, as companies may flatten earnings primarily to meet investor expectations rather than tax objectives (Alexander, 2019). Given the discrepancies in the existing literature, this study aims to further investigate the impact of tax aggressiveness on the practice of income smoothing. Therefore, the following hypothesis is proposed:

H_1: Tax aggressiveness influences the likelihood of engaging in sustainable income smoothing.

The inconsistent findings in prior research regarding the impact of tax aggressiveness on income smoothing (Alfandia & Muliasari, 2024; Nurhandono & Firmansyah, 2017; Sánchez-Ballesta & Yagüe, 2021) suggest the potential influence of contextual factors. According to contingency theory, no single system or approach is universally applicable across all contexts. In this study, the role of independent commissioners is examined as a contextual factor that may affect the relationship between tax aggressiveness and income smoothing. Independent commissioners, serving as a supervisory mechanism for company management, are anticipated to reduce opportunistic behavior by management. When income smoothing practices are effective, independent commissioners may encourage their adoption (Kustono et al., 2021). Furthermore, independent commissioners are found to positively influence the practice of income smoothing (Kustono et al., 2021). Companies with independent commissioners are more likely to engage in income smoothing, as they may be seen as enhancing future performance forecasts. Tax aggressiveness, when coupled with income smoothing, reflects efforts by companies to achieve sustainable development objectives. As a key element of corporate governance, independent commissioners may mitigate the impact of tax aggressiveness on sustainable income smoothing. Hence, the following hypothesis is proposed:

H_2: The interaction between tax aggressiveness and independent commissioners influences the likelihood of sustainable income smoothing.

3. METHODS

This research focuses on a population of manufacturing firms listed on the Indonesia Stock Exchange for the period from 2021 to 2023. This study uses manufacturing companies because most of the companies listed on the Indonesia Stock Exchange are manufacturing companies. In addition, Indonesia is a country that has large resources and can provide raw materials and labor for production activities. The research period is from 2021 to 2023 because during this period the companies faced the negative impacts of the COVID-19 pandemic. During this period, the government issued tax policies and incentives to help companies survive (Taqi, Rusydiana, As-Salafiyah, Kalbuana, & Mayyizah, 2025).

Purposive sampling was used as the sampling method in this study, and the final sample size was 49 firms. Purposive sampling is used in sample selection because it enables researchers to choose samples according to research aims by considering certain attributes (Bougie & Sekaran, 2020). The following precise, predetermined criteria were used to select these samples:

Table 1. Sample selection procedure.

Criteria	Firm	Data
Manufacturing companies listed on the Indonesia Stock Exchange in the period 2021-2023.	146	438
Manufacturing companies whose financial statements do not have a financial year ending December 31st.	(4)	(12)
Manufacturing companies whose financial statements do not use the IDR.	(28)	(84)
Manufacturing companies that do not consistently earn net income.	(65)	(195)
Total	49	147

Table 1 shows that there are 146 manufacturing companies listed on the Indonesia Stock Exchange from 2021 to 2023. Four companies were eliminated because their financial reports do not end on December 31. Additionally, 28 companies do not use the Indonesian Rupiah in their financial reports. Finally, 65 companies did not record earnings consistently from 2021 to 2023. Based on the sample criteria, 49 companies were sampled, and 147 data points were processed.

Hypothesis testing is conducted using binary logistic regression because the dependent variable uses a nominal scale (Bougie & Sekaran, 2020; Pradipta & Susanto, 2019). Income smoothing refers to the practice of adjusting earnings either by increasing or decreasing them to minimize fluctuations in reported profits, thereby ensuring that current profits remain relatively consistent with those of the previous period. Sustainable income smoothing is measured on a nominal scale, as it is represented by a dummy variable. Previous studies on income smoothing have employed an index developed by Pradipta and Susanto (2019) which is calculated using the following formula:

$$Eckel\ Index = \frac{CV\ \Delta I}{CV\ \Delta S}$$

$$CV\ \Delta I = \sqrt{\frac{\sum(\Delta I - \Delta\bar{I})^2}{n-1}} : \Delta\bar{I}$$

$$CV\ \Delta S = \sqrt{\frac{\sum(\Delta S - \Delta\bar{S})^2}{n-1}} : \Delta\bar{S}$$

The formula is as follows: ΔI represents the change in income over a given period, ΔS denotes the change in sales during the same period, CV ΔI refers to the coefficient of variation of income changes, CV ΔS refers to the coefficient of variation of sales changes, and n represents the total number of data points. An Eckel index value less than 1 indicates that a company is engaging in income smoothing, while an index value of 1 or higher suggests that the company is not practicing income smoothing.

Tax aggressiveness refers to the strategic management of taxable profits through the exploitation of loopholes in tax regulations. It is typically measured by the ratio of current income tax expense to earnings before income tax, the measurement of tax aggressiveness is multiplied by -1 for the analysis (Deslandes, Fortin, & Landry, 2020; Lanis, Richardson, & Taylor, 2017; Mohanadas, Abdullah Salim, & Pheng, 2020). Independent commissioners are individuals who have no personal or professional connections with management, other members of the board, or shareholders, enabling them to act independently in the best interest of the company (Almalita, 2017; Handayani & Ibrani, 2021). The number of independent commissioners within a company is commonly used as a measure of their presence and influence (Boussaidi & Hamed-Sidhom, 2021; Susanto et al., 2021; Utaminingsih, Kurniasih, Sari, & Helmina, 2022).

The control variables included in this study are company size, profitability, debt ratio, and cash holdings. Company size reflects the scale of a company within its industry. Previous studies suggest that company size has a positive impact on income smoothing (Anwar & Chandra, 2017; Ayunika & Yadnyana, 2018; Indrawan, Agoes, Pangaribuan, & Popoola, 2018). Larger companies are more likely to smooth earnings in order to avoid triggering regulatory changes by the government. Company size is typically measured as the natural logarithm of total assets

(Amri, Ben Mrad Douagi, & Guedrib, 2023; Menchaoui & Hssouna, 2024; Utaminingsih et al., 2022). Profitability represents a company's ability to efficiently manage its assets to generate profits. Companies with lower profitability are more inclined to engage in income smoothing to mitigate earnings fluctuations between periods (Firnanti, 2019). Profitability is measured using the Return on Assets (ROA) ratio (Amri et al., 2023; Mohanadas et al., 2020).

The debt ratio is a financial metric that indicates a company's ability to meet its debt obligations using its assets. A higher debt ratio suggests an increased likelihood of engaging in sustainable income smoothing practices (Ayunika & Yadnyana, 2018). Companies with higher debt levels are more likely to smooth earnings to manage or cover existing liabilities. These companies aim to reduce their debt costs, and one strategy to achieve this is through income smoothing (Kustono et al., 2021). The debt ratio is commonly calculated as the debt-to-asset ratio (Mohanadas et al., 2020; Utaminingsih et al., 2022).

A company's daily operations depend on its cash holdings, which can comprise cash or liquid cash equivalents. According to (Nirmanggi & Muslih, 2020), cash holdings are the liquid assets that a business has on hand for continuing operations. The probability of engaging in sustainable income smoothing is positively correlated with the amount of cash held (Haniftian & Dillak, 2020). A company's ability to effectively manage its liquidity is demonstrated by its high cash holdings. The usual method for calculating cash holdings is to divide the total amount of cash and cash equivalents by the total assets of the business.

4. RESULTS AND DISCUSSION

Table 2 presents the descriptive statistics of the study variables:

Table 2. Descriptive statistics results.

Variables	Minimum	Maximum	Mean	Std. deviation
IS	0	1	0.59	0.493
TA	0.000	0.959	0.239	0.131
KI	1	5	1.79	0.916
CS	26.728	33.537	29.215	1.629
ROA	0.000	0.416	0.087	0.076
DR	0.003	0.827	0.374	0.182
CH	0.006	0.857	0.152	0.142

Table 2 presents the descriptive statistics for the variables analyzed in this study. The data reveal that 59% of the companies, or 87 out of 147, engage in sustainable income smoothing (IS), which is lower than the 61% reported by Pradipta and Susanto (2019). This discrepancy may be attributed to differences in the research periods. Regarding tax aggressiveness (TA), the mean value of 0.239 surpasses the average of 0.201 reported by Mohanadas et al. (2020) for Malaysian companies, where the corporate tax rate stands at 25%. The variable for independent commissioners (KI) ranges from 1 to 5, with an average of 2 independent commissioners per company. This aligns with the regulatory requirements for the composition of independent commissioners in Indonesian firms.

The average company size is 29.215, which is nearly identical to the average company size of 29.745 reported by Utaminingsih et al. (2022) for Indonesian firms. The average return on assets (ROA) stands at 0.087, which aligns closely with the 0.089 average reported by Mohanadas et al. (2020) for companies in Malaysia, despite the difference in the country context. The average debt ratio is 0.374, which is higher than the 0.135 average reported by Mohanadas et al. (2020). This variation may stem from the different financial structures of Indonesian companies, which tend to rely more on debt compared to their Malaysian counterparts. The average cash holding is 0.152, which is closer to its minimum value of 0.006 than its maximum value of 0.857. This suggests that companies in Indonesia tend to maintain relatively low cash and cash equivalents, as these resources are more frequently allocated toward operational or investment activities.

Table 3. Result of -2 log likelihood.

Block	-2 Log likelihood
Block 0: Beginning block	198.798
Block 1: Method = Enter	183.967

Table 4. Omnibus tests of model coefficients.

Model	Chi-square	df	Sig.
Step	14.831	7	0.038
Block	14.831	7	0.038
Model	14.831	7	0.038

Table 3 presents the -2 log likelihood values for blocks 0 and 1, which are 198.798 and 183.967, respectively. The reduction of 14.831 in the log likelihood value suggests that the regression model is valid and appropriate for analysis. The inclusion of independent variables in the model results in an improvement compared to a model that consists solely of constants. Table 4 further confirms the significance of this reduction, as the associated p-value is less than 0.05, indicating a statistically significant change.

Table 5. Result of Nagelkerke's R-squared.

-2 Log likelihood	Cox & Snell R square	Nagelkerke's R square
183.967	0.096	0.129

Table 5 reports that Nagelkerke's R Square value is 0.129, indicating that 12.9% of the variation in income smoothing can be explained by the independent variables included in the model. The remaining 87.1% of the variation is attributable to other factors not considered in this research model.

Table 6. Result of Hosmer and Lemeshow's goodness-of-fit test.

Chi-square	Sig.
10.671	0.221

Table 6 presents the results of the Hosmer and Lemeshow Goodness of Fit Test, with a value of 10.671 and a significance level of 0.221. Since the significance value exceeds 0.05, it indicates that there is no significant discrepancy between the model and the observed values. Therefore, the model can be considered a good fit for the data.

Table 7. Model predictive accuracy test results.

Observed	Predicted		
	Income smoothing (IS)		Percentage correct
	Non-IS	IS	
Non-IS	17	43	28.3
IS	15	72	82.8
Overall percentage	32	115	60.5

Table 7 indicates that 87 companies engage in sustainable income smoothing, of which 72 are correctly predicted by the model, yielding an accuracy rate of 82.8%. The remaining 15 companies (17.2%) are misclassified as type I errors. On the other hand, among the 60 companies that do not practice sustainable income smoothing, the model correctly predicts 17 companies, corresponding to an accuracy of 28.3%. The remaining 43 companies (71.6%) are misclassified as type II errors. In total, the prediction accuracy of the model is 89 companies, representing 60.5% of the total.

Table 8. Correlation matrix.

Variables	Constant	TA	KI	CZ	ROA	DR	CH
Constant	1.000	-0.123	0.442	-0.978	-0.060	-0.027	-0.247
TA	-0.123	1.000	-0.025	0.004	-0.040	-0.020	0.187
KI	0.442	-0.025	1.000	-0.505	-0.191	-0.133	-0.067
CZ	-0.978	0.004	-0.505	1.000	0.017	-0.090	0.153
ROA	-0.060	-0.040	-0.191	0.017	1.000	0.163	-0.209
DR	-0.027	-0.020	-0.133	-0.090	0.163	1.000	0.248
CH	-0.247	0.187	-0.067	0.153	-0.209	0.248	1.000

Table 8 presents the Pearson correlation matrix, where the highest correlation coefficient does not exceed 0.880, as reported by Mohanadas et al. (2020). This indicates that there is no issue of multicollinearity among the independent variables in the model.

Table 9. Coefficient significance test results.

Variables	Expected direction	Coefficient I	Coefficient II	Coefficient III	Coefficient IV
Intercept	?	-0.303	-0.582	-1.655	-3.049
TA	+	2.892*	3.794**	9.969**	11.523**
KI	?		-0.012	1.049	1.189
TA*KI	-			-5.176*	-5.502*
CS	+		0.019		0.039
ROA	-		-3.721		-3.709
DR	+		-1.355		-0.893
CH	+		2.502*		2.963*

Note: * Sig <10%, ** Sig <5%.

Table 9 reveals that tax aggressiveness (TA) exhibits a positive coefficient and is significant across models I to IV, thereby supporting H1. This suggests that tax aggressiveness influences the likelihood of sustainable income smoothing. Management engages in income smoothing practices to minimize income tax liabilities, driven by the goal of reducing tax expenses. One of the management motivations to carry out income smoothing is the desire to minimize tax liabilities because tax aggressiveness is often associated with an increased likelihood of income smoothing (Saputra & Agustin, 2022).

The interaction effect between tax aggressiveness and independent commissioners shows a negative and significant coefficient in models III and IV, thereby supporting H2. This interaction significantly influences the likelihood of sustainable income smoothing. Independent commissioners, serving as a monitoring mechanism, are expected to curb management's opportunistic behavior. When income smoothing is effectively implemented, independent commissioners encourage management to stabilize earnings (Kustono et al., 2021). Furthermore, independent commissioners foster tax aggressiveness as part of the effective income smoothing strategy aimed at achieving the company's long-term sustainability goals.

Company size (CS) displays a positive coefficient, yet it is not statistically significant in models II and IV, suggesting that company size does not influence the likelihood of sustainable income smoothing. Similarly, profitability (ROA) exhibits a negative coefficient and remains insignificant in both models, indicating that profitability does not affect the likelihood of sustainable income smoothing. The debt ratio (DR) also shows a negative coefficient and lacks significance in models II and IV, suggesting that the debt ratio does not impact the likelihood of sustainable income smoothing. In contrast, cash holdings (CH) demonstrate a positive coefficient and are statistically significant in both models II and IV, indicating that cash holdings positively influence the likelihood of sustainable income smoothing. These findings align with those of Haniftian and Dillak (2020), who assert that higher cash holdings are associated with an increased likelihood of sustainable income smoothing.

5. CONCLUSION

This study examines how tax aggressiveness affects the possibility of sustainable income smoothing and how tax aggressiveness and independent commissioners combine to influence this possibility. The study focuses on industrial firms listed between 2021 and 2023 on the Indonesia Stock Exchange.

The results validate that the probability of sustainable income smoothing is highly influenced by tax aggressiveness. Furthermore, the data supports the idea that sustainable income smoothing is impacted by the relationship between independent commissioners and tax aggressiveness. Independent commissioners, as part of corporate governance procedures, can lessen the effect of tax aggressiveness on the probability of income smoothing.

This research provides valuable insights for the Financial Services Authority as a regulator in developing regulations aimed at enhancing the effectiveness of the board of commissioners. Such regulations could help mitigate tax aggressiveness, which serves as an indicator of the likelihood of income smoothing practices.

However, there are several limitations to this study. First, the sample is restricted to manufacturing companies listed on the Indonesia Stock Exchange, which may limit the generalizability of the findings to other sectors. Second, income smoothing is measured using the Eckel index, a method that has been in use since 1981 (Eckel, 1981) and may not capture all aspects of contemporary income smoothing practices. Third, the study covers a three-year period from 2021 to 2023, which is the minimum required for calculating the Eckel index, limiting the scope for long-term analysis.

Future research could focus on developing countries that exhibit a high reliance on income smoothing practices. Additionally, more recent measures of income smoothing could be employed, such as the ratio of the standard deviation of net income to the standard deviation of cash flows from operations (Pradipta & Susanto, 2019) or the discretionary model using the modified Jones model. Further studies could also extend the research period to assess the long-term evolution and trends in income smoothing practices.

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