

# The Effect of Earnings Management and Leverage on Stock Returns with Audit Quality as a Moderating Variable

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**Abstract.** The purpose of the research is to investigate the impact that earnings management and leverage have on stock returns, with the quality of audits serving as a moderating variable. In the time period between 2018 and 2020, this study focused on the manufacturing companies that are listed on the Indonesia Stock Exchange. This examination uses concepts from Agency Theory as well as Signaling Theory. 67 manufacturing businesses make up the study sample, and the data analysis methods include multiple linear regression analysis and Moderate Regression Analysis (MRA). The conditional revenue model that was developed by Stubben (2010) is used to assess earnings management. In the course of this research, the following possibilities were proposed: 1) The manipulation of earnings has a large and detrimental impact on the returns on stocks. Audit quality moderates the association between earnings management and stock returns. However, audit quality does not moderate the relationship between leverage and stock returns. It is necessary for the abstract to provide a synopsis of the whole work. At a minimum of 70 and no more than 150 words should be included in the abstract. It is recommended that the font size be set to 9 points and that it be offset from both the right and left margins by 1 centimeter. Before and after the abstract, there should be a line that is completely blank and set at 20 points.

**Keywords:** Earning, Leverage, Audit, Return.

## 1 Introduction

The capital market is a way of connecting people who need money with owners of capital, who may be individuals or organizations, and it facilitates the trading of several kinds of securities that provide varying degrees of return or return in exchange for varying degrees of risk. Actual stock returns, also known as realized returns, and anticipated returns, sometimes known as return expectations, are the two categories that make up stock returns [1]. Returns on stocks are susceptible to influence from both macroeconomic issues and factors that are not related to the economy. rises in currency values and exchange rates, as well as rises in the cost of gasoline and IHSG on the worldwide market are examples of economic variables. In addition, local socio-political situations as well as foreign socio-political policies are included

in the category of external variables. There are also micro variables, which include the internal workings of a firm, such as its financial and non-financial information or data. These elements may have a significant impact on a company's performance.

Despite the fact that the JCI still produced returns of 19.99% and 15.32% in 2017 and 2016, the performance of the Composite Stock Price Index (IHSG) at the end of 2018 was the poorest it had been in the previous 3 years after posting a loss of 2.54% in a single year. On Friday, December 28, 2018, the Indonesia Stock Exchange reported that the JCI finished the trading day with a gain of 0.06%, placing it at a level of 6,194.50. From the beginning of January to the end of 2018, the Index saw a loss of 2.54% over the course of a year. The JCI at the end of 2020 was at the position of 5,979.07, representing a correction of 5.09 percent when compared to its previous value of 6,299.54 at the end of 2019.

Earnings management refers to the process by which management becomes involved in the process of creating financial reports for external parties in order to stabilize, raise, or reduce profits [2]. A dispute between the shareholders (the principals) and the managers (the agents) of a corporation is the root cause of earnings management in that company. The tension that arises between shareholders and management may be seen through the lens of agency theory. Agency theory is a theory that describes how agency relationships may form when one or more persons (principals) contract another person (agents) to deliver a service and then transfer decision-making power to the agent [3]. Agency theory is sometimes referred to simply as the theory of agency.

Some of the biggest firms in the world, such as World Com, Enron, and Xerox in the United States; Parmalat and HIH in Italy; One Tell and Harris Scarfe in Australia; and many other significant companies are instances of earnings management actions that produce a reduction in trust in published financial reports. In addition, many other large organizations have made decisions similar to these. The case of PT. Kimia Farma, PT. Indofarma, and PT. Ades Alfindo [4, for example] are three examples of earnings management scandals that are distinct from the one described in the previous paragraph involving falsified financial reports.

Stubben came up with a brand new concept in 2010 that he named the Revenue Conditional concept. However, policy dictates how much emphasis should be placed on turnover as an essential component of earnings testing. Stubben found evidence to support the hypothesis that the Revenue Conditional Model is a more effective tool for detecting earnings management. Instead of calculating aggregate accruals, the conditional revenue model calculates accruals receivable as a function of fluctuations in income. Receivables have a strong empirical link and a clear conceptual tie to revenue [5]. Receivables are a significant component of the accrual method.

The quality of the audit plays a significant role in determining the returns on stocks. To be able to provide accurate and trustworthy information to the general public, those who work in the auditing industry place a high priority on both the quality and the actual services provided [6]. An audit process that is carried out efficiently by competent auditors such as the Big 4 is necessary in order to provide financial reports that are of a high quality, relevant, and dependable. Ernst & Young (EY), Deloitte, Price Waterhouse Coopers (PWC), and KPMG are the four companies that are considered to be public accounting firms.

When the KAP size is increased, the quality of the audit performed on the firm improves [7]. businesses that are audited by public accounting firms that are not included in the big four tend to report higher levels of opportunistic profits, according to the audit findings of such businesses. This is in contrast to companies that are audited by accounting firms that are included in the big four. firms that have been audited by the Big 4 KAPs have a higher effect on the association between earnings management and stock returns than firms that have not been audited by the Big 4 KAPs. Audit quality may increase the relationship between earnings management and stock returns. The impact of earnings management's unfavorable correlation with stock returns may be mitigated by audit quality. [8].

### **1.1. Agency Theory**

Agency theory was established to explain and address difficulties that emerge when entering into a contract (engagement) between the owner and the agent. This information asymmetry may occur when there is a mismatch in the amount of knowledge held by each party. The objective of agency theory, sometimes known simply as agency theory, is to explain how the parties to a contractual partnership may minimize costs while having asymmetric knowledge [3]. The theory of agency is predicated on a number of assumptions, the most important of which is the premise of human nature. Other assumptions include those about organizations and information. [9]

### **1.2. Signalling Theory**

The term "signaling theory" refers to the way in which managers make use of financial reports to get insight into future expectations and the overall objectives of the organization. Therefore, signaling theory is an example of managing its finances in the form of data, and it is knowledgeable of the requirements of company and is superior to other businesses in this regard. [10]

Morris (1987) demonstrates that the solution to the challenge of information asymmetry in commercial settings is to engage in conversation with other parties. Because corporations and their management have access to more knowledge than outsiders in the form of investors, the capital market is characterized by information asymmetries. [11]

### **1.3. The Effect of Earning Management on Stock Returns**

The activities taken by management to manage profits lower the dependability of reported results, which in turn lowers the quality of earnings. This is due to the fact that the earnings information supplied does not represent true economic reality, which will eventually have an effect on stock prices. According to Stubben (2010), turnover is a significant factor in determining how profits are managed, although this factor is contingent on policy. Stubben discovered evidence in 2010 that the Revenue Conditional Model was more successful in detecting earnings management than other models. If a firm has a high level of earnings management, then the investment risk in that company is likewise significant, which may result in inferior returns. [8]

H1 : Earnings management has a negative effect on stock returns

### **1.4. The Effect of Leverage on Stock Returns**

The phrase "debt ratio," also known as "leverage" or "solvency," is widely used by businesses in order to estimate a firm's capacity to meet all of its financial commitments in the event that the company is liquidated. In general, leverage may be calculated by dividing total debt by total equity. When looking more closely, the findings of a number of research evaluating the impact of leverage on stock returns have indicated conflicting conclusions. After analyzing all of the available data for the 2006-2010 time period across all industries, Achaamong et al. (2014) found that there is a strong and negative negative link between leverage and stock returns. In keeping with the findings of study carried out by Abdullah et al. (2015), which found that leverage has a substantial negative link to stock returns, this is consistent with what we have seen.

H2 : Leverage has a negative effect on stock returns

### **1.5. Audit Quality Moderates the relationship between earnings management and stock returns**

It is generally accepted that higher audit quality will result in fewer instances of inappropriate accounting procedures being used in financial reporting. Therefore, consumers of financial reports that have a high audit quality are more likely to trust such reports when making judgments about investments. firms that utilize high-quality audit services will not only have access to more trustworthy financial information, but investors will also see such firms as having additional value, which will encourage investors to make investments and drive up stock prices.

H3 : Audit Quality Moderates the Relationship of Earnings Management to Stock Returns.

### **1.6. Audit Quality Moderates the relationship between Leverage and stock returns**

A financial tool known as leverage is used to determine the extent to which a firm is dependent on its creditors for the purpose of financing the company's assets. If the firm has a significant level of leverage, it will be forced to rely on the financing of its assets provided by other parties. If a corporation has a significant financial risk, it likely means that it is in a difficult financial position as a result of having a large amount of obligations. Investors are becoming more concerned about the rising levels of corporate debt held by businesses that have been subjected to audits by the KAP Big Four. , which led to a decline in the stock price of the corporation, fell as a direct consequence of the fall in the amount of shares traded.

H4 : Audit Quality Moderates the Relationship of Leverage to Stock Returns.

## **2. Research Method**

Multiple regression analysis and Moderate Regression Analysis (MRA) are the methods of data analysis that were used in the course of this investigation. The amount of samples included in this research came from 67 different manufacturing businesses between the years 2018 and 2020. In addition, the researcher employed a sampling procedure that included purposive sampling in order to establish the total number of samples that should be included in this investigation. In this research, path analysis was used to find the causal link and to explain the direct and indirect impacts of a set of factors as causative variables. The variables that were utilized in this study to determine the causal relationship are listed below.

### **3. Result**

#### **3.1. Normality Test**

Based on the findings of the Kolmogorov-Smirnov test presented earlier, the Sig. (2-tailed) value is 0.000. Due to the fact that the Sig. (2-tailed) is below 0.05, it is possible to draw the conclusion that the residual data used in this regression model do not follow a normally distributed distribution. The regression model cannot be used for any further investigation since it is not viable. In order to achieve normalization of the data, treatment, more specifically the elimination of outlier data, is required. Data that has distinct properties that seem quite different from other observations and emerge in the form of extreme numbers [12] is referred to as outlier data. These data may be identified by their extreme values. Boxplots, which highlight extreme observation values, are useful for performing the outlier identification process. Following the treatment, none of the 141 study samples included any outliers. When the outliers are taken into account, the results of the Kolmogorov-Smirnov test indicate that the data follows a normal distribution since the Sig. (2-tailed) value is greater than 0.05.

#### **3.2. Autocorrelation Test**

The statistical value of Durbin Watson (D-W) is calculated to be 1.813 when run using the SPSS 25.0 software. These findings were obtained from the analysis of the data. There is no autocorrelation since the D-W figure, which is 1.813, is in the range of -2 to +2, which indicates this. Therefore, the autocorrelation test may be considered successful.

#### **3.3. Multicollinearity Test**

The heteroscedasticity test is based on the picture of the scatterplot, which demonstrates that the data does not follow a specific pattern or trend line, and instead is spread about the number 0 (located on the Y axis). As a result, one might conclude that the data exhibit homoscedasticity; alternatively, one can conclude that there is no heteroscedasticity and that the heteroscedasticity test has been satisfied.

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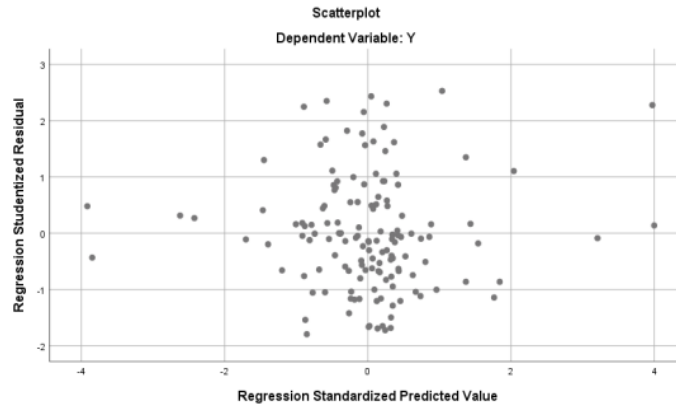


Fig. 1. Heteroscedasticity Test.

### 3.5. Hypothesis testing

On the basis of the output from SPSS, the findings of the t statistical test achieved a significant level of the independent variable X1 (Earnings Management) of  $0.000 = 0.05$  and  $-t_{count} = -3.687$   $-t_{table} = -1.977$ , which led to the conclusion that the choice  $H_0$  should not be followed. The first hypothesis, that earnings management has a considerable negative influence on stock returns, is accepted, which means that this hypothesis is true. Therefore, we may get the conclusion that the stock returns will be lower the more aggressively profits are managed.

On the basis of the output from SPSS, the findings of the t statistical test achieved a significant level of the independent variable X1 (Earnings Management) of  $0.035 = 0.05$  and  $-t_{count} = -2.133$   $-t_{table} = -1.977$ , which led to the conclusion that the choice  $H_0$  should not be accepted. It has been determined that  $H_1$  is correct, which states that leverage has a large negative influence on the returns of stocks. Therefore, one might get the conclusion that the stock returns will be lower the more leverage there is.

**Table 1.** Multiple Linear Regression Test Results and Partial Significance of Substructure 1.

Model		Coefficients <sup>a</sup>					Collinearity Statistics	
		Unstandardized Coefficients		Standardized Coefficients	T	Sig.	Tolerance	VIF
		B	Std. Error	Beta				
1	(Constant)	.015	.002		7.851	.000		
	X1	-.442	.120	-.297	-3.687	.000	.995	1.005
	X2	-.001	.001	-.172	-2.133	.035	.995	1.005

a. Dependent Variable: Y

On the basis of the output from SPSS, the findings of the t statistical test produced a significant level of the independent variable Earnings Management of  $0.000 = 0.05$  and  $-t_{count} = -3.687$   $-t_{table} = -1.977$ , which led to the conclusion that the choice  $H_0$  should not be followed. The hypothesis that earnings management has a considerable negative influence on stock returns is accepted, which means that this hypothesis is true. Therefore, we may get the conclusion that the stock returns will be lower the more aggressively profits are managed. On the basis of the output from SPSS, the findings of the t statistical test achieved a significant level of the independent variable X1 (Earnings Management) of  $0.035 = 0.05$  and  $-t_{count} = -2.133$   $-t_{table} = -1.977$ , which led to the conclusion that the choice  $H_0$  should not be accepted. It has been determined that  $H_1$  is correct, which states that leverage has a large negative influence on the returns of stocks. Therefore, one might get the conclusion that the stock returns will be lower the more leverage there is.

**Table2** Moderate Analysis Regression (MRA) Test Results

		<b>Coefficients<sup>a</sup></b>				
		Unstandardized Coefficients		Standardized Coefficients		
Model		B	Std. Error	Beta	T	Sig.
1	(Constant)	.017	.002		8.178	.000
	X1 (Manajemen Laba)	-.589	.129	-.396	-4.576	.000
	X2 (Leverage)	-.001	.001	-.179	-2.239	.027
	Z (Kualitas Audit)	-.012	.005	-.358	-2.498	.014
	X1 *Z	.936	.310	.388	3.018	.003
	X2 *Z	-.001	.003	-.041	-.404	.687

a. Dependent Variable: Y

The results of the t statistical test revealed a significant level of moderating variable  $X1*Z$  (the interaction of Earnings Management with Audit Quality) with a value of  $0.003 = 0.05$  and  $t_{count} > 3.018$  based on the output of SPSS.  $t_{table} = 1.978$ , which means that the choice  $H_0$  is not acceptable. It has been determined that Hypothesis 3 is correct, which states that the quality of the audit moderates the correlation between earnings management and stock returns. The findings of the t statistical test, which were based on the output of SPSS, produced a significant level of moderating variable  $X2*Z$  (Leverage interaction with Audit Quality) of  $0.687 > 0.05$ , and  $-t_{count} = -0.404 > 0.05$ . This indicated that the moderating effect of Audit Quality was moderated.  $-t_{table} = -1.978$ , which results in the judgment  $H_0$  being upheld and the decision  $H_4$  being overturned; this indicates that audit quality does not attenuate the link between leverage and stock returns.

#### 4. Conclusion

The findings of the hypothesis testing show that earnings management does, in fact, have a substantial negative influence on stock returns, which is in agreement with the first hypothesis

(H1) that was developed for the purpose of this research and stated that earnings management does have an effect on stock returns. This research suggests that decreases in stock returns are likely to occur if the firm implements efforts to control its profits. According to agency theory, the disputes that lead to earnings management in a corporation are caused by tensions between the shareholders (the primary) and the managers (the agents). These findings may be understood according to this theory.

This finding indicates that good audit quality is seen as reducing violations of accounting practices in financial reports and vice versa, which is consistent with the second hypothesis (H2) that has been formulated in this study, which states that audit quality moderates the relationship between earnings management and stock returns. H2 states that audit quality moderates the relationship between earnings management and stock returns. Therefore, consumers of financial reports that have a high audit quality are more likely to trust such reports when making judgments about investments.

This conclusion implies that strong audit quality is considered as capable of reducing accounting practice breaches in financial statements. The third hypothesis (H3) that has been proposed in this research states that audit quality moderates the association between earnings management and stock returns. Therefore, consumers of financial reports that have a high audit quality are more likely to trust such reports when making judgments about investments.

The fourth hypothesis (H4) that has been formed in this research states that audit quality moderates the link between leverage and stock returns. However, the test findings demonstrate that audit quality does not moderate the relationship between leverage and stock returns. Based on this, the fourth hypothesis (H4) has been shown to be incorrect. When the KAP size is increased, the quality of the company's audit also improves. Therefore, even if the firm has a significant amount of leverage, if the company is audited by the KAP Big Four and receives an opinion declaring that the company's financial statements are fair, then investors will still consider the company's performance to be satisfactory.

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