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**The Influence of the Audit Committee, Auditor Rotation and Ownership Structure on Audit Quality:  
Evidence From Indonesian Mining Company**

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**Abstract**

This research, conducted with the aim of determining the influence of audit committee, auditor rotation, and ownership structure on audit quality. This research was conducted at mining companies listed on the IDX (Indonesian Stock Exchange) from 2015 to 2019. A purposive sampling method was employed to select a sample of 170 companies whose data met the criteria of research samples. The data was analyzed using multiple regression analysis. The results of the research showed that committee audit has a positive effect on audit quality. Rotation of auditor and ownership structure, however, do not have an effect. The results of this research have the implication that the existence of an audit committee in a company is very important. With the existence of an audit committee, it is hoped that the supervisory function can be implemented. The supervisory function includes monitoring the effectiveness of the internal control system, monitoring management performance and monitoring the quality of financial reporting.

**Keywords:** audit committee, audit quality, ownership structure and rotation of auditor.

**1. Introduction**

*1.1. Background*

Differences in interests between external parties and management can give rise to information asymmetry. To reduce information asymmetry, an auditor is needed as an independent party. The auditor carries out the role of mediator by providing an auditor's opinion based on the audit carried out. Audit quality also influences the reliability of information in a financial report. Audit quality improves the quality of financial reporting and increases the credibility of financial reports (DeFond & Zhang, 2014). A quality audit is the hope of various parties and is a necessary guarantee for the reliability of information from financial reports. In this regard, increasing or decreasing audit quality is something that can be influenced by various variables. Variables that are thought to have an influence on audit quality include audit committee, audit rotation and ownership structure.

The Audit Committee functions as a body that supervises and ensures the quality of financial reporting. Good quality financial reporting is a reflection of high audit quality. The main task of

the audit committee is to carry out supervisory functions, including reviewing the internal control system, internal audit supervision, and the quality of financial reports. This is one of the implementations of good corporate governance. Several studies show that the audit committee has a positive influence on audit quality. For example, research by (Pertiwi & Hardi, 2016) shows that the audit committee has a significant influence on audit quality. This is different from research conducted by (Ardianingsih, 2014) which shows that audit committees do not have a significant effect on audit quality.

The scandal that dragged down the Public Accounting Firm prompted the formation of new regulations such as The Sarbanes-Oxley Act (2002). In The Sarbanes Oxley Act (2002) audit partners and clients are required to rotate every 5 years. In Indonesia according to Government Regulation no. 20 of 2015 concerning public accounting practices, there is no longer a mandatory rotation for public accounting firm, but public accountants are still required to rotate every 5 years. The relationship that exists between clients and public accounting firms over many years can potentially reduce the independence of auditors working in a public accounting firm (Kartikasari, 2012). Auditor independence is considered to be reduced due to familiarity with clients, so that audit tenure has a negative relationship with audit quality. Therefore, it is necessary to carry out audit rotation. Studies related to audit rotation and audit quality need to be carried out because audit quality is a guarantee of the quality of financial reports. The results of research conducted by Rohman, (2014) and Andriani (2017) show that audit rotation has a positive effect on audit quality. Meanwhile, according to Salsabila, (2018) shows that public accounting firm rotation has no effect on audit quality. Other research also shows that auditor rotation does not affect audit quality (Hartadi, 2012; Harymawan, 2019).

The existence of an institutional ownership structure can control management through an effective monitoring process. This will result in reduced opportunistic actions carried out by management. Company monitoring actions carried out by institutional investors can force managers to focus more on company performance, thereby reducing opportunistic actions or self-interested behavior (Cornet, et.al. (2006). In line with this statement, this is in line with Rachman and Maghviroh (2012) who concluded that institutional ownership can be a means of supervision for management.

This research is a development of research conducted by Puspaningsih & Syarifa (2021), with updates adding auditor rotation and ownership structure variables. The addition of these two variables is because estimated that these variables will influence audit quality. Meanwhile, the audit committee variable was tested again because in previous research the audit committee was not proven to have an effect on audit quality. Another update is to replace the research object by using a mining company listed on the Indonesia Stock Exchange. This research was conducted on mining companies because since 2015 mining companies have been in decline (PwC, 2016). In a downturn, several obstacles are likely to affect the company's financial reporting. If financial reporting is not good, this will certainly affect audit quality.

## *1.2. Literature Review*

### *1.2.1. Agensi Theory*

Jensen and Meckling (1976) argue that an agency relationship is a contractual relationship between a principal and an agent. The principal, in this case the shareholder, delegates decision-making responsibility to the agent (management) in accordance with the agreed employment contract. Agency problems arise because of a conflict of interest between the principal and the agent. Principals or shareholders want maximum profits or increased investment value in the company. Meanwhile agents or managers want adequate compensation for the performance carried out. Managers will make various efforts to make their performance look good (Kumalasari & Puspaningsih, 2024). This usually happens because it is driven by personal interests (Jusoh et al, 2022).

Conflicts of interest are unavoidable in the relationship between agents and principals. This can give rise to agency problems which cause information asymmetry. In these conditions, the information provided by management has been intervened in such a way as to be in the interests of one of the parties. To ensure the reliability of the information provided by management to shareholders, an independent party is needed as a mediator. The auditor is appointed as the party who checks and ensures that the information in the financial reports does not mislead users. The auditor as a third party is a guarantor of the fairness of financial reports to ensure that the trust given by shareholders to management is not misused (Aqmarina, 2018).

### *1.3. Hypothesis Development*

The audit committee is responsible to the Board of Commissioners in assisting in carrying out the duties and functions of the board of commissioners. The audit committee is tasked with supervising the effectiveness of the internal control system, monitoring the performance of management and auditors, as well as the quality of financial reports (OJK: 2015). The existence of an audit committee can support the process of preparing financial reports. Thus, financial reports can be prepared properly (Puspaningsih & Ristya, 2022). A quality audit committee can improve audit quality. A quality audit committee tends to select auditors with high quality, for example by appointing industry specialist auditors (DeFond & Zhang, 2014). According to Siallagan (2006), supervision of financial reports and audits carried out by the audit committee can also reduce the opportunistic nature of management that carries out earnings management. This ultimately affects the audit quality results. Research conducted by (Pertiwi et al., 2016) states that audit committees influence audit quality.

H1: The audit committee has a positive effect on audit quality

The Sarbanes Oxley Act (2002) which requires rotation of public accountants every 5 years. In Indonesia, the rules regarding audit rotation are stated in Government Regulation no. 20 of 2015 which contains rotation rules every 5 years for Public Accountants and there are no restrictions on providing audit services for Public Accounting Firms. For companies providing financial services, the use of the same Public Accountant is limited to 3 years. This is based on OJK

Regulation no. 23/POJK.03/2017. It is hoped that the restrictions can prevent fraud in financial reports. With auditor rotation, it is hoped that companies and public accountants will not have a close relationship that could affect audit quality. It can be concluded that the higher the KAP rotation carried out by the company in using public accounting services, the better the audit quality produced by the public accountant, conversely the lower the KAP rotation carried out by the company in using public accounting services, the quality of the resulting audit will be getting worse. According to the results of research conducted by Rohman, (2014) and Andriani (2017), it shows that the results of this research provide empirical evidence that audit rotation has a positive effect on audit quality. Based on the description above, the second hypothesis can be formulated as follows:

H2: Auditor rotation has a positive effect on audit quality

The existence of an institutional ownership structure can control management through an effective monitoring process. This will result in reduced opportunistic actions carried out by management. Company monitoring actions carried out by institutional investors can force managers to focus more on company performance, thereby reducing opportunistic actions or self-interested behavior (Cornet, et.al.,2006). Rachman and Maghviroh (2012) conclude that the existence of institutional ownership can be a means of supervision for management. Thus, institutional ownership will also increase audit quality. Based on the explanation above, the hypothesis proposed is:

H3: Ownership structure has a positive effect on audit quality

*1.4. Research Model*

The following is the research model:

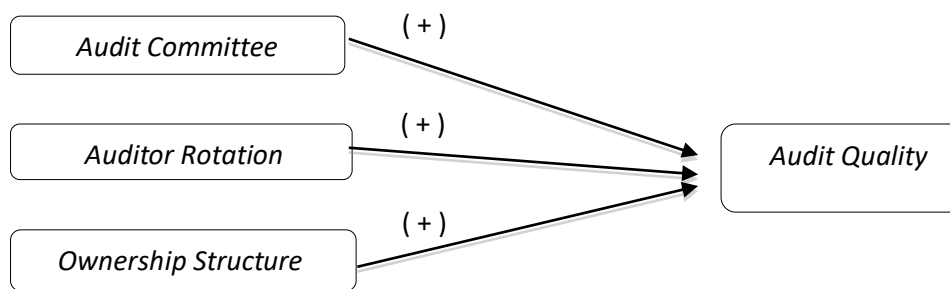


Figure 1: Research Model

## 2. Method

### 2.1. Population and Sample

This research uses a population of mining companies listed on the Indonesia Stock Exchange 2015 - 2019. The sample companies were then selected using purposive sampling. The criteria used are:

- a). Mining companies listed on the Indonesia Stock Exchange (BEI) before January 1, 2015.
- b). The company was not delisted from the IDX during the research period (2015-2019).
- c). Mining companies that publish financial reports with complete data.

Based on the criteria above, the research sample in this study is as follows:

Table 1 Research Sample

No	Criteria	Quantity
1	Number of all mining companies registered on the IDX in 2015-2019 Mining companies on the IDX registered after January 1 2015	49
2		(7)
3	Mining companies that were delisted from IDX during 2015-2019 Mining companies that do not present complete information to	(2)
4	support research	(6)
	Number of sample companies	34
	Year of observation (2015-2019)	5
	Number of sample companies during the observation year	170

### 2.2. Research Variables and Variable Measurement

The dependent variable in this research is audit quality. Audit quality is a dummy variable. If the company uses a Big Four auditor, then the number is 1. And 0 for non-Big Four.

The independent variables in this research consist of:

#### a. Audit Committee

The audit committee is a committee formed by the board of directors whose task is to carry out independent supervision over the financial reporting and external audit process. The role and responsibility of the audit committee is to monitor and supervise the audit of financial reports and ensure that applicable financial standards and policies are implemented consistently. The audit committee also assesses the quality of the audit and the reasonableness of the fees proposed by the external auditor. The audit committee variable is measured by counting the number of audit committees in the company.

#### b. Auditor Rotation

The second independent variable in this research is auditor rotation. Auditor rotation is the change of Public Accounting Firm. Auditor rotation is measured using a dummy variable. If the

company rotates auditors, the company will be given a value of 1, but if the company does not do so, the value given will be 0.

**c. Ownership Structure**

Ownership structure is proxied using institutional ownership. Institutional ownership is the percentage of share ownership owned by legal entities or institutions such as insurance companies, pension funds, mutual funds, banks and other institutions. Ownership structure is measured by institutional ownership divided by total shares outstanding.

$$\frac{\text{Institutional ownership}}{\text{Total shares outstanding}} \times 100 \%$$

**3. Results**

*3.1. Descriptive Statistical Analysis*

Descriptive statistics provide an overview of the data used in a study. The average (mean), minimum, maximum and standard deviation values can be seen to describe the dependent variable and independent variables used in this research as shown in table 2.

Table 2 Descriptive Statistic

	N	Minimum	Maximum	Mean	Std. Deviation
Audit Committee	170	0.00	5.00	3.0941	0.73176
Auditor Rotation	170	0.00	1.00	0.0882	0.28447
Ownership Structure	170	14.63	97.65	71.3484	18.44143
Audit Quality	170	0.00	1.00	0.7471	0.43598
Valid N (listwise)	170				

Table 2 shows a description of the dependent and independent variables in this study. The N value is the number of valid data totaling 170 obtained from a sample of mining companies listed on the IDX for the 2015-2019 period.

*3.2. Logistic Regression Test*

**3.2.1. Overall Model Testing (Overall Fit Model)**

Testing of all models in logistic regression analysis is carried out by comparing the Likelihood function as seen from the initial Log Likelihood value of -2 (Block Number = 0) and the final Log Likelihood -2 (Block Number = 1). Table 3 shows the results of the analysis used to test the overall model.

Table 3 Overall Model Testing

<i>-2 Log Likelihood</i>	Value
Block Number = 0 (Beginning)	192.578
Block Number = 1 (Ending)	177.585

The results of the analysis show that the initial Log Likelihood value -2 (Block Number = 0) is 192.578 and the final Log Likelihood -2 value (Block Number = 1) is 177.585. A decrease in the model value can mean that the hypothesized model fits the data or that adding independent variables to the model increases the suitability of the model.

### 3.2.2. Testing the Coefficient of Determination (Nagelkerke R Square)

Testing the coefficient of determination in logistic regression analysis uses the Nagelkerke R Square value shown in table 4 below.

Table 4. Coefficient of Determination

Step	-2 Log likelihood	Cox & Snell R Square	Nagelkerke R Square
1	177.585 <sup>a</sup>	0.083	0.122

The analysis results show that the Nagelkerke R Square value is 0.122. This means that the variability of the independent variables (audit committee, audit rotation and ownership structure) is able to explain the variability of the dependent variable by 12.2%, while the remaining 87.8 is explained by other variables outside the research.

### 3.2.3 Feasibility Testing of the Regression Model

The feasibility of the regression model in research uses the Hosmer and Lemeshow Test as presented in table 5.

Table 5 Feasibility Testing Model

Step	Chi-square	df	Sig.
1	9.045	8	0.339

The analysis results in table 5 show a Chi-square value of 9.045 with a significance of 0.339. The table Chi square value in df 8 is 15.507 while the calculated Chi Square is 9.045. Because the calculated chi square is smaller than the chi square table and the significance value is  $0.339 > 0.05$ , the null hypothesis cannot be rejected (supported). This means that the model is able to predict observation values or the model is acceptable because it matches the observation data.

3.2.4. Regression Model

Based on the results of the logistic regression test, a regression model can then be created. The following are the results of the logistic regression test:

Table 6 Result of Logistic Regression

		B	S.E.	Sig.
Step 1 <sup>a</sup>	Audit Committee	0.969	0.305	0.001
	Auditor Rotation	-0.520	0.595	0.383
	Ownership Structure	0.010	0.010	0.300
	Constant	-2.511	1.213	0.038

Table 6 shows the results of the logistic regression coefficients which form the logistic regression equation as follows:

$$Y = -2.511 + 0.969X_1 - 0.520X_2 + 0.010X_3 + e$$

**4. Discussion**

*4.1. The Influence of the Audit Committee on Audit Quality*

Testing on H1 shows that the Audit Committee has a regression coefficient of 0.969 and has a significance of 0.001. This value means that the Audit Committee has a positive effect on audit quality. Thus the results of this study indicate that H1 is supported. From the results of hypothesis 1 testing, it is concluded that the existence of an Audit Committee in a company is proven to improve audit quality. This provides an understanding that the existence of an Audit Committee is very important. The Audit Committee is responsible to the Board of Commissioners in assisting in carrying out the duties and functions of the board of commissioners. The audit committee is tasked with supervising the effectiveness of the internal control system, monitoring the performance of management and auditors, as well as the quality of financial reports. By carrying out internal supervision and control, the reliability of accounting records and financial reports will increase. This of course will ultimately improve the quality of audits carried out by independent auditors. The results of this research are in line with the results of research conducted by (Pertiwi et al., 2016) stating that audit committees influence audit quality.

*4.2. The Effect of Audit Rotation on Audit Quality*

Tests on H2 show that audit rotation has a regression coefficient of -0.520 and has a significance of 0.383. This value means that audit rotation has no effect on audit quality. Thus the results of this study indicate that H2 is not supported. With auditor rotation, it is hoped that companies and



public accountants will not have a close relationship. It is feared that this close relationship could affect audit quality. It can be concluded that the higher the rotation of the Public Accounting Firm carried out by the company in using public accounting services, the better the audit quality produced by the public accountant. Conversely the lower the rotation of the Public Accounting Firm carried out by the company in using public accounting services, the audit quality will get worse. In this research, audit rotation was not proven to have an effect on improving audit quality. This is possibly because most mining companies are audited by Public Accounting Firm that are included in the Big Four Public Accounting Firm. This is because even though there has been a rotation of auditor, these Public Accounting Firms are both the Big Four Public Accounting Firms. The Big Four Public Accounting Firm definitely have a good quality control system. If a company replaces a Public Accounting Firm with another Public Accounting Firm, there will be no increase or decrease in audit quality. This means that audit quality will remain well maintained. Quality control of the Public Accounting Firm includes the organizational structure, policies and procedures established by Public Accounting Firm. This is to provide adequate assurance regarding the conformity of professional engagements with Audit Standards. The same condition if auditor rotation occurs between the Big For and the non-Big Four. This can be seen from the results of research conducted by Puspaningsih & Syarif (2021), that internationally affiliated or non-internationally affiliated Public Accounting Firms do not show different audit qualities. This is probably because all Public Accounting Firms have implemented Audit Quality Standards. The result of this research in line with the result of research conducted by Salsabila (2018), showed that public accounting firm rotation has no effect on audit quality. Other research also showed that auditor rotation do not affect audit quality (Hartadi, 2012; Harymawan, 2019). The results of this research not in line with the results of research conducted by Rohman, (2014) and Andriani (2017) showed that the results of their research provide empirical evidence that auditor rotation has a positive effect on audit quality.

#### *4.3. The Influence of Ownership Structure on Audit Quality*

Testing of H3 shows that ownership structure has a regression coefficient of 0.010 and has a significance of 0.300. This value means that the ownership structure has no effect on audit quality. Thus the results of this study indicate that H3 is not supported. With an ownership structure where institutional ownership are getting higher, it is hoped that the monitoring and control process within the company will also get better. It is hoped that the financial reports presented by the company will be of higher quality, which will ultimately improve audit quality. In this research, ownership structure was not proven to have an effect on improving audit quality. This is likely because most mining companies are audited by Big Four public accounting firm. The Big Four public accounting firm already have a good quality control system, so audit quality is more influenced by the Public accounting firm internal factors. Quality control of public accounting firm includes the organizational structure, policies and procedures established by public accounting firm to provide adequate assurance regarding the conformity of professional engagements with Audit Standards. With the quality control of public accounting firm, the Big Four public accounting firm produce good audit quality. The results of this research are not in line with the research results of Rachman and Maghviroh (2012) which concluded that

institutional ownership can be a means of supervision for management, so institutional ownership will also increase audit quality.

## **5. Conclusion, Suggestion and Implication**

### *5.1. Conclusion*

Based on the results of the tests carried out, it can be concluded that: 1). The audit committee has a positive effect on audit quality. 2). Auditor rotation has no effect on audit quality. 3). Ownership structure has no effect on audit quality.

### *5.2. Limitation*

A limitation of this research is that it was found that several annual reports did not include independent auditor reports, thus hampering the process of collecting data on audit quality and auditor rotation.

### *5.3. Suggestion*

For companies, they are expected to include an independent auditor's report when publishing the annual report. By publishing the independent auditor's report, investors can find out the auditor's opinion given by the independent auditor. In this way, information regarding the financial condition of a company can be known by investors, including the possibility of doubt regarding the survival of a company.

### *5.4. Implications*

The results of this research have the implication that the existence of an audit committee in a company is very necessary. With the existence of an audit committee, it is hoped that the monitoring function can be implemented on the effectiveness of the internal control system, monitoring management performance and monitoring of the quality of financial reporting. From the results of this research, it is hoped that mining companies need to increase the effectiveness of audit committees. In future research, the use of the audit committee as an independent variable should not only be related to the existence of the audit committee, but also consider other factors such as the number of members committee, independence, competence, and education level. Future research needs to examine the role of audit committee member numbers, independence, competency and education level of audit committee members.

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