The Effects Of Exchange Rate And Interest Sensitivity, Managerial Ownership, And Institutional Ownership On Financial Distress

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ABSTRACT: Financial distress is when a company cannot repay past due, both short-term debt and long-term debt. So that it can cause the company’s operational activities to be disrupted and bankrupt. This study examines the effect of exchange rate sensitivity, interest rate sensitivity, managerial ownership, and institutional ownership on financial distress. This study's population are all manufacturing companies listed on the Indonesia Stock Exchange from 2016 to 2018. This research used 62 manufacturing companies listed on the Indonesia Stock Exchange in the 2016-2018 period as samples from this population. This research uses a logistic regression analysis method. The results showed that the variable of exchange rate sensitivity has a significant negative effect on financial distress. Interest rate sensitivity has a significant positive impact on financial distress. Management has no significant positive effect on financial distress, and institutional ownership has no significant positive effect on financial distress. This result shows that companies need to pay attention to exchange rate sensitivity and interest rate sensitivity because the higher the sensitivity level, the worse it will have.

Keywords: Financial Distress, Exchange Rate Sensitivity, Interest Rate Sensitivity, Managerial Ownership, Institutional Ownership

INTRODUCTION

Financial distress begins with an incubation period marked by a series of bad economic conditions and poor management. Financial distress is the company's condition in a bad situation, where the company is unable to pay its long-term and short-term obligations at maturity. It can cause investors and stakeholders' trust to decline, and the company cannot pay debts.

During the last five years, the economic condition has declined, which causes the rupiah exchange rate to weaken against the USD. Where in 2014, amounting to Rp 12,440 cut until 2018, amounting to Rp. 14,710. The rupiah exchange rate influences companies that carry out exports and imports. In companies that rely on imported raw materials, if the rupiah continues to weaken, the company will pay more when making transactions abroad,
increasing production costs and cause product prices to increase. The increase from this high product price causes consumers to respond negatively. So that it will have an impact on decreasing company sales and revenue will decrease. With a decrease in income, the company's profits or profits will also decrease, so that it can cause the company to experience difficulties in its operational activities. To anticipate this, the company will seek outside funds, namely external sources such as debt. When the debt is increasing, and the company cannot pay it, it will continue to grow. Furthermore, for companies that export their products abroad, the shipped goods' price will be lower. Conditions like these can make companies vulnerable to the threat of financial distress.

In addition to the exchange rate, companies must also pay attention to the interest rate set by Bank Indonesia, because it will affect the national banking interest rate. Increasing interest rates can cause the cost of capital also to increase. Increased capital costs, of course, cause operating expenses to run the company also increase, causing losses to the company.

Furthermore, companies experiencing financial difficulties behave differently from companies participating in financial constraints (Bhage et al., 2005). So companies must pay attention to the strategies implemented to avoid economic distress conditions. These strategies include, among others, strategy in terms of good corporate governance that can determine the success of a company. Implementing good corporate governance practices will undoubtedly increase its value by increasing its financial performance; it can also reduce the risk that the board may carry out with decisions that only benefit itself and increase investor confidence (Emrinaldi, 2007). Conversely, inadequate corporate governance, of course, can also lead to lower levels of investor confidence, thereby reducing firm value.

The implementation of corporate governance is related to the ownership structure of the company. Managerial ownership and institutional ownership are factors that can affect the company's condition in the future. Managerial ownership can reduce the occurrence of agency problems in the company. Managerial ownership is the proportion of company ownership by management. The more significant the proportion of managerial ownership by management, the greater its responsibility in managing the company. The decisions taken by management are expected to be decisions in the company's interests, not just management.

On the other hand, institutional investors' ownership, such as securities companies, insurance companies, pension funds, and different institutional ownership, will undoubtedly encourage more optimal supervision to improve company performance. The potential for financial distress can also be minimized because companies with institutional ownership greater (more than 5%) indicate their ability to monitor management (Bodroastuti, 2009). Therefore, this study aims to determine the effect of exchange rate sensitivity, interest rate sensitivity, managerial ownership, and institutional ownership on company bankruptcy. To predict the level of company bankruptcy using the Altman ZScore method.
The results showed that the exchange rate sensitivity affects financial distress. With the rupiah depression, it will benefit companies that export. For companies that export, the demand will increase because the price of goods is cheaper so that with the increase in exports, it will have a positive impact on the company’s financial performance. This result is in line with research conducted by Almilia (2004), Taufik (2016), and Firdausi (2019) which states that exchange rates have a significant effect on financial distress. Meanwhile, different research results are shown by Afriyeni (2012), Rachmawati (2012), and Darmawan (2017) which state that exchange rates do not have a significant impact on financial distress. Related to the above, interest rate sensitivity also affects financial distress. The increase in interest rates over time will affect production. Increased interest rates cause higher capital costs so that operating costs to run the company increase and can cause losses to the company. These results align with Titonarendra (2016) research, which states that interest rates affect financial distress. Simultaneously, different research results are shown by Claudia (2017) and Firdausi (2019) state that interest rates do not affect financial distress.

Meanwhile, managerial ownership does not affect financial distress. This result is because the data in this study indicate that many companies have low managerial ownership. Furthermore, to find out the company’s health or unhealthy condition, it is not only caused by the size of the shares owned by the directors and commissioners. However, it is more caused by the ability of the board of directors in managing the company. These results are in line with research conducted by Harahap (2017). Meanwhile, research conducted by Triwahyuningyas and Muharam (2012), Novi (2012), and Hafifah and Purwanto (2013) shows that managerial ownership affects financial distress. Then institutional ownership also does not affect financial distress. This result is because manufacturing companies are 50% held by the government so that the number of institutional ownership of manufacturing companies is relatively small. This result is in line with the research conducted by Shahab et al. (2017), Hafifah and Purwanto (2013), Sunarwijaya (2016), and Harahap (2017). Meanwhile, research conducted by Triwahyuningyas and Muhamad (2012), Novi (2012) and Pritha (2015) shows that institutional ownership affects financial distress.

More explanation of the results of the study will be presented in sections 3 and 4. Section 2 describes the data and methods used in the study, while section 5 presents the research conclusions. Last but not least, section 6 explains the limitations and suggestions.

**METHODOLOGY**

Using the purposive sampling method, we obtained a sample of 62 companies from 146 populations. Twenty-eight companies do not present financial statements in rupiah currency and 56 companies with incomplete data needed by this research. This research’s type of data is secondary data, which consists of 2016-2018 manufacturing financial report data, Indonesian Capital Market Dictionary (ICMD), and website www.bi.go.id. This research uses the logistic regression analysis method, using SPSS software to process data.
To measure the company's financial health condition, we use the Altman Z-score method. Then the exchange rate sensitivity and interest rate sensitivity use the equation Y formula. With the exchange rate and interest rates as variable X and stock price as variable Y. Furthermore, to measure managerial ownership, this study uses the formula for the number of shares owned by managerial divided by the number of shares outstanding. Moreover, to measure institutional ownership by using the formula for the number of shares held by institutionally divided by the number of shares outstanding.

**RESULT Descriptive Statistical Analysis**

<table>
<thead>
<tr>
<th>Variables</th>
<th>N</th>
<th>Minimum</th>
<th>Maximum</th>
<th>Mean</th>
<th>Standard Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>FD</td>
<td>186</td>
<td>0</td>
<td>1</td>
<td>.56</td>
<td>.497</td>
</tr>
<tr>
<td>SNT</td>
<td>186</td>
<td>-1.00</td>
<td>1.00</td>
<td>.1601</td>
<td>.54068</td>
</tr>
<tr>
<td>SSB</td>
<td>186</td>
<td>-33.00</td>
<td>.81</td>
<td>-3.442</td>
<td>2.42275</td>
</tr>
<tr>
<td>KM</td>
<td>186</td>
<td>.0</td>
<td>.74</td>
<td>.0581</td>
<td>.15008</td>
</tr>
<tr>
<td>KI</td>
<td>186</td>
<td>.0</td>
<td>.96</td>
<td>.6457</td>
<td>.27177</td>
</tr>
</tbody>
</table>

Source: Processed Data.

The descriptive statistical analysis in Table 1 showing financial distress data from 2016-2018 with an average value of 0.56, a maximum value of 0, a minimum value of 1, and a standard deviation of 0.497. An average value greater than the standard deviation indicates that companies experiencing financial distress are less than companies that do not experience financial distress.

**Results of the regression coefficient assessment**

The value of regression testing can be seen in the Equation table's Variables, namely, by looking at the significance column.

<table>
<thead>
<tr>
<th>Variables</th>
<th>B</th>
<th>S.E.</th>
<th>Wald</th>
<th>Sig</th>
<th>Exp(B)</th>
</tr>
</thead>
<tbody>
<tr>
<td>SNT</td>
<td>-.662</td>
<td>.297</td>
<td>4.957</td>
<td>.026</td>
<td>.516</td>
</tr>
<tr>
<td>SSB</td>
<td>1.231</td>
<td>.607</td>
<td>4.114</td>
<td>.224</td>
<td>3.425</td>
</tr>
<tr>
<td>KM</td>
<td>.615</td>
<td>1.299</td>
<td>.000</td>
<td>.636</td>
<td>1.850</td>
</tr>
<tr>
<td>KI</td>
<td>-.014</td>
<td>.712</td>
<td>1.163</td>
<td>.984</td>
<td>1.787</td>
</tr>
<tr>
<td>Constant</td>
<td>.580</td>
<td>.538</td>
<td></td>
<td>.281</td>
<td></td>
</tr>
</tbody>
</table>

Source: Processed Data.

**Negalgarke R-Square** shows how much the independent variable affects the dependent variable. Based on table 2 above, the independent variables, namely exchange rate sensitivity, interest rate sensitivity, managerial ownership, and institutional ownership can affect the dependent variable, namely financial distress, which is 9.6%. However, keep in
mind that this value is only a form of approach because the logistic regression
determination coefficient cannot be calculated as in linear regression.

Based on table 2, it is known that the regression coefficient value at a constant of 0.580
has a probability value of 0.281. Furthermore, the exchange rate sensitivity variable (X1)
with a regression coefficient of -0.662 has a probability value of 0.026, which is below 0.05.
This figure shows that H0 is rejected; that is, the regression coefficient is significant.

The interest rate sensitivity variable (X2) with a regression coefficient of 1.231 has a
probability value of 0.043 under 0.05. This figure shows that H0 is rejected; that is, the
regression coefficient is significant.

Furthermore, the managerial ownership variable (X3) with a regression coefficient of 0.615
has a probability value of 0.636, above 0.05. This figure shows that H0 is accepted; that is, the
regression coefficient is not significant.

Furthermore, the institutional ownership variable (X4) with a regression coefficient of 0.014
has a probability value of 0.984, which is above 0.05. This figure shows that H0 is accepted;
that is, the regression coefficient is not significant.

**Match Level Table 3. Classification Table**

<table>
<thead>
<tr>
<th>Observed</th>
<th>Predicted</th>
<th>Percentage Correct</th>
</tr>
</thead>
<tbody>
<tr>
<td>Financial Distress</td>
<td>29</td>
<td>42</td>
</tr>
<tr>
<td>Non-Financial Distress</td>
<td>32</td>
<td>73</td>
</tr>
<tr>
<td>Overall Percentage</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Source: Processed Data.

Table 3 above the percentage of model accuracy in classifying the dependent variable
data can be quite useful, namely 60.2%.

**DISCUSSION The Effect of Exchange Rate Sensitivity on Financial Distress**

The logistic regression test results show that exchange rate sensitivity has a
significant negative effect on financial distress. Negative means that it benefits the
company so that it can reduce financial distress. According to Darminto (2010),
depreciation of the rupiah will cause an increase in production costs, so that it will have an
impact on decreasing company profitability. With the rupiah's depression, it will benefit
companies that export. For companies that export, their demand will increase because the
price of goods is lower. Companies that export their products abroad will receive USD
payments, whose value is getting higher and weakening the rupiah. Increasing exports will
have a positive impact on the company's financial performance. Whereas for companies
that import goods from abroad, of course, these goods will become expensive, so that it
can cause demand to decrease, so companies need to find other alternatives so that the
company still gets large profits.
This research provides empirical evidence that the exchange rate can be one of the causes of companies experiencing financial distress. If the company's exchange rate's sensitivity is high, it will disrupt the company's operational activities so that the higher the company's condition is experiencing financial distress. Therefore, a company must pay attention to the country's exchange rate to take appropriate actions and avoid the company experiencing financial distress.

The results of this research are in line with the study conducted by Almilia (2004), Taufik (2016), and Firdausi (2019).

**The Effect of Interest Rate Sensitivity on Financial Distress.**

The logistic regression test results show that interest rate sensitivity has a significant positive effect on financial distress. Interest rates are closely related to creditors (banks) and debtors (borrowers). The increase in interest rates will be a matter of concern for commercial banks because of the fear of non-performing loans. It will reduce corporate profits for companies because it has a fixed interest obligation that must be paid.

The increase in interest rates over time will also affect production. Increased interest rates cause higher capital costs. Increased capital costs cause operating costs to run the company to grow to cause losses to the company. The higher the level of interest rate sensitivity, the worse its condition will be, which will impact its operational activities.

This research provides empirical evidence that interest rates can be one of the causes of companies experiencing financial distress. The results of this research are in line with the study conducted by Hendri Titonarendra (2016).

**The Effect of Managerial Ownership on Financial Distress.**

The logistic regression test results show that managerial ownership has no significant positive effect on financial distress. The insignificance of managerial ownership on financial distress is due to the data obtained in this study showing that, on average, companies that have low managerial ownership. Then, find out the company's health or unhealthy condition is caused by the size of the shares owned by the directors and commissioners but is more driven by the board of directors' ability to manage the company.

Managerial ownership in a company is only to get sympathy from investors so that they are interested in investing in the company. Investors usually believe in managerial ownership to increase their value because they think it can handle debt properly and correctly with managerial ownership.

The results of this research are in line with research conducted by Harahap (2017).

**The Effects of Institutional Ownership on Financial Distress.**
The results of the logistic regression test show that institutional ownership does not significantly influence financial distress. According to Bodroastuti (2009), what causes institutional ownership not to affect financial distress is because generally, public companies in Indonesia have centralized ownership (in Saskhia Irving 2018). The government holds 50% of the manufacturing company shares, so the number of manufacturing companies’ institutional ownership is relatively small. Therefore, the addition of institutional ownership does not affect financial distress.

According to Fich and Slezak (2008), institutional investors tend to pay more attention to the company's mistakes than supervise the company to work better. So it can be concluded that institutional ownership does not guarantee the strength of supervision carried out by management. Thus, even though institutional ownership is broad, the company's decisions are still determined by management.

The results of this study are in line with the research conducted by Shahab et al. (2017), Haffifah and Purwanto (2013), Sunarwijaya (2016), and Harahap (2017).

**CONCLUSIONS**

High exchange rate sensitivity will disrupt the company’s operational activities to higher its condition to experience financial distress. An increase in interest rates will also affect production, leading to increased capital costs so that operating expenses to run the company also increase.

**LIMITATIONS AND RECOMMENDATIONS**

The sample used in the study was only three years, so the implications can be different if the sample period is extended. This study only uses one independent variable and four dependent variables. The model's accuracy level is only 60.2%, so it is necessary to add relevant variables, such as macro variables, inflation rates, and micro variables, such as family ownership. Hence, the expected value of the model accuracy will increase. Thus, many other variables influence that was not examined in this study.

**REFERENCES**


