FINANCIAL CONDITION MODERATED THE EFFECTIVENESS OF AUDIT COMMITTEE TO REDUCE EARNINGS MANAGEMENT

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Abstract
Some cases of financial fraud invite inquiries about the effectiveness of corporate governance mechanism in financial distress companies. This study empirically examines whether the financial distress moderate the impact of corporate governance mechanism to earnings management. The sample of this study is manufacturing companies listed at Indonesia Stock Exchange for period 2010-2012. Discretionary accruals are used as a proxy for earnings management, while financially distressed and non-distressed firms are identified based on Altman Z-score test. Corporate governance mechanism is measured by four characteristics of the audit committee, i.e. size (total number of audit committee members), independence (audit committee composition), activity (frequency of audit committee meeting), and expertise (the number of audit committee have finance or accounting background). This study finds that (1) financial distress does not moderate the impact of total members of audit committee to earnings management; (2) financial distress does not moderate the impact of frequency of audit committee meeting to earnings management; (3) financial distress does not moderate the impact of audit committee composition to earnings management; (4) financial distress moderates the impact of audit committee finance/accounting knowledge to earnings management. These results suggest that the effectiveness corporate governance is low, and finance/accounting literacy of audit committee should be alert.

Abstrak
Beberapa kasus manipulasi keuangan pada perusahaan yang mengalami kesulitan keuangan mengundang pertanyaan terkait efektifitas mekanisme tata kelola perusahaan. Penelitian ini secara empiris menguji apakah kondisi kesulitan keuangan dapat memoderasi pengaruh mekanisme tata kelola perusahaan terhadap manajemen laba. Sampel dari penelitian ini adalah perusahaan sektor manufaktur yang terdaftar di Bursa Efek Indonesia periode 2010-2012. Discretionary accruals digunakan sebagai proksi untuk manajemen laba, sedangkan kondisi kesulitan keuangan diidentifikasi menggunakan uji Altman Z-score. Mekanisme tata kelola perusahaan diukur dengan 4 karakteristik komite audit, yaitu ukuran (jumlah anggota komite audit), independensi (komposisi komite audit), aktivitas (frekuensi pertemuan komite audit), dan keahlian (jumlah anggota komite audit yang memiliki latar belakang keuangan atau akuntansi). Penelitian ini menemukan bahwa (1) kondisi kesulitan keuangan tidak memoderasi pengaruh jumlah anggota komite audit terhadap manajemen laba; (2) kondisi kesulitan keuangan tidak memoderasi pengaruh frekuensi pertemuan komite audit terhadap manajemen laba; (3) kondisi kesulitan keuangan tidak memoderasi pengaruh komposisi komite audit terhadap manajemen laba; (4) kondisi kesulitan keuangan memoderasi...
penguara jumlah anggota komite audit yang memiliki latar belakang keuangan atau akuntansi terhadap manajemen laba. Hasil ini menunjukkan bahwa efektivitas tata kelola perusahaan masih rendah dan anggota komite audit yang memiliki latar belakang keuangan atau akuntansi harus mewaspadainya.

Keywords: corporate governance, audit committee, earnings management, financial distress

JEL Classification: M40

1. Research Background

Business competition today requires company to improve its performance in order to survive, even win the competition. According to Veronica (2012), inability of the company to survive in the global competition may cause the company runs into diminution of business volume that may ultimately have an impact on business bankruptcy. One of the cause of business bankruptcy is sustaining financial distress problem in a company. According to Platt and Platt (2002) in Atmini (2005), financial distress is a decline stage of financial condition in a company, which occurred prior to the bankruptcy or liquidation. This condition is usually characterized by delivery delays, declining product quality and delay bill payments from the bank.

In practice, a financial distress company tends to do variety ways to hide their real performance to the external parties, such as investors, creditors, and public. One of them is perform earnings management. According to Jaggi and Lee (2002) in Jaggi and Sun (2006), it has been well documented in the literature that managers of financially distressed firms would have a strong motivation to engage in earnings manipulation for sending positive signals or reducing the impact of negative signals emanating from financial distress.

Around the year 2000s, the business world was surprised by the bankruptcy of several major companies in the United States such as Enron Corporation(2001), WorldCom(2002), and Xerox Corporation(2001). According to Purnomo and Pratiwi (2009), Enron’s earnings manipulation was done by the executive and their auditor, so Enron can increase their profit approaching 1 billion USD, which actually never existed. Similarly, Xerox manipulates its earnings by window dressing their revenue in the amount of USD 6 billion. The similar case in Indonesia is financial fraud of PT. Kimia Farma. PT. Kimia Farma overstated profit in their 2001 financial report (Tempo, 2002). All of these fraud scan happen because of ineffectiveness of companies’ corporate governance mechanism.

According to Ruzaidah and Takiah (2004), audit committee is one of the key elements in the corporate governance structure that helps control and monitor management. The audit committee contributes to development of company strategic plan and is expected to provide input and recommendations to the board with regard to any financial or operational matters. Charan (1998) and Craven and Wallace (2001) in Rahmat and Takiah (2008), prove that an effective audit committee would focus on improving the company performance and competitiveness, particularly in a changing business environment which is beyond the control of the company. Thus it can be said that corporate governance has a significant effect on the company financial condition. However, Chagaanti et al. (1985) in Wardhani (2006) who examine the structure of corporate governance, i.e. the composition of the board of directors, did not find evidence to support that the bankruptcy associates to the composition of the board of directors.
Lo et al. (2010) prove that good corporate governance can reduce earnings management practice in a company. Similar result was also obtained by Uadia (2012) who does research on Nigeria listed companies. Uadia (2012) found that the mechanisms of corporate governance as measured by board independence and audit committee negatively affect earnings management practices.

Mostly previous studies focus on effectiveness corporate governance mechanism in normal financial condition firms. Limited studies have explored effectiveness of corporate governance in financial distress firms. This is important because financial distress firms increase company motivation to increase their earnings, in order to hide their real financial performance to the public. If corporate governance mechanism is effective in the financial distress firms, it should reduce the tendency to manage their earnings. However, if the organs of corporate governance collude to the management interest, they will not provide any effect in order to reduce the earnings management tendency.

In sum, this study intends to examine whether financial distress that occurs in the company will moderate the effect of corporate governance on earnings management. Objects that are examined in this study are manufacturing companies listed on the Indonesia Stock Exchange in the period 2010 – 2012.

This study utilizes characteristics of audit committee as proxy of corporate governance mechanism. The audit committee characteristics include size, meeting frequency, composition and financial literacy of audit committee. The result of this study shows that only existence of audit committee members who have accounting background will reduce the firm tendency to manage up its earning. Other audit committee characteristics do not provide any significant effect to the earnings management practices in financial distress firms.

The remainder of this paper is organized as follows. Literature review and hypothesis development are discussed in section two. Section three discusses research method. The result of study and discussion are explained in section four and five. Finally, the conclusion is presented in section six.

2. Research Method

2.1. Sample

Sample of this study is manufacturing companies that were listed on the Indonesia Stock Exchange (IDX) during 2010 – 2012. Only companies that have complete data, reporting currency in Rupiah, and firm with the period ended on December are selected as sample. All data are collected from the financial statements and annual reports of the companies of the year 2010-2012. The final sample is 252 firm years, as illustrated on Table 1.

<table>
<thead>
<tr>
<th>Descriptions</th>
<th>2010</th>
<th>2011</th>
<th>2012</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Manufacturing firms listed at Indonesia Stock</td>
<td>132</td>
<td>136</td>
<td>136</td>
<td>404</td>
</tr>
<tr>
<td>Exchange</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Less: Reporting currency other than Rupiahs</td>
<td>10</td>
<td>11</td>
<td>25</td>
<td>46</td>
</tr>
<tr>
<td>Less: Unavailable data</td>
<td>10</td>
<td>10</td>
<td>9</td>
<td>29</td>
</tr>
<tr>
<td>Less: Fiscal period ended other than December 31</td>
<td>0</td>
<td>1</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>Sample</td>
<td>112</td>
<td>114</td>
<td>101</td>
<td>327</td>
</tr>
<tr>
<td>Less: Outlier</td>
<td></td>
<td></td>
<td></td>
<td>75</td>
</tr>
<tr>
<td>Final sample</td>
<td></td>
<td></td>
<td></td>
<td>252</td>
</tr>
</tbody>
</table>

Table 1. Sample Selection
2.2. Research Model

The impact of corporate governance to earnings management moderated by company financial condition was investigated using multivariate linear regression. The main regression model is defined in the following equation:

\[ \text{EM} = a + b \text{FD} + c \text{ACSIZE} + d \text{ACCOMP} + e \text{ACMEET} + f \text{ACLITERACY} + g \text{FD} \times \text{ACSIZE} + h \text{FD} \times \text{ACCOMP} + i \text{FD} \times \text{ACMEET} + j \text{FD} \times \text{ACLITERACY} + k \times \text{LEVERAGE} + l \times \text{PB RATIO} + \epsilon \] ............................. (1)

Where,
- EM earnings management,
- FD financial distress condition,
- ACSIZE audit committee size,
- ACCOMP audit committee composition
- ACMEET audit committee meetings
- ACLITERACY audit committee literacy in finance or accounting
- LEVERAGE leverage
- PB RATIO price book ratio

2.3. Variables

2.3.1. Earnings Management

In this study, earnings management is dependent variable. Earnings management is measured by Performance – Adjusted Current Discretionary Accruals (PACDA) based on the research of Jaggi and Sun (2006). There are some steps to calculate PACDA:

1. Finding the value of the coefficient on the following regression model:

   \[ \text{CA} = \alpha_0 + \alpha_1 \left( \frac{1}{\text{lag asset}} \right) + \alpha_2 (\Delta \text{Rev}) \] ............................. (2)

   Where,
   - CA = Current accruals, reflected by net income before extraordinary items plus depreciation and amortization minus operating cash flows scaled by the total asset at the beginning of fiscal year \( t \).
   - Lag asset = Total assets at the beginning of the fiscal year \( t \).
   - \( \Delta \text{Rev} = \) Net sales in year \( t \) less net sales in year \( t-1 \) scaled by the total asset at the beginning of fiscal year \( t \).

2. Insert the estimated coefficient of regression model (2) to calculate the expected current accruals (ECA), using the following equation:

   \[ \text{ECA} = \bar{\alpha}_0 + \bar{\alpha}_1 \left( \frac{1}{\text{lag asset}} \right) + \bar{\alpha}_2 (\Delta \text{Rev} - \Delta \text{AR}) \] ............................. (3)

   Where,
   - \( \Delta \text{AR} = \) Account receivable in year \( t \) less account receivable in year \( t-1 \), scaled by the total asset at the beginning of fiscal year \( t \).

3. Calculate discretionary current accruals (DCA), using the following equation:

   \[ \text{DCA} = \text{CA} - \text{ECA} \] ............................. (4)

4. Calculate PACDA using the following equation:

   \[ \text{PACDA} = \text{DCA} - \text{median DCA of the matching portfolio} \] ............................. (5)

Notes:
- Median DCA is calculated by divided all of the samples into 10 groups based on the value of ROA in year \( t-1 \). After that we calculate the median DCA from each group.

2.3.2. Financial Distress

In this study, financial distress is a moderating variable. Financially distressed firms are identified using Altman Z-Score (Altman, 1968).
Z-score = 0.012*(Working Capital/Total Assets) + 0.014*(Retained Earnings/Total Assets) + 0.033* (Earnings before Interest and Tax/Total Assets) + 0.006*(Market Value Equity/Book Value of Total Debt) + 0.999*(Sales/Total Assets)........................ (6)

Company is scored one(1) if Altman Z-Score is smaller than 1.81, and otherwise scored zero (0).

2.3.3. Corporate Governance(CG)

In this study, CG is an independent variable. The proxy of company corporate governance mechanism is four characteristics of audit committee, they are (1) audit committee size (AC SIZE), (2) meeting frequency of audit committee (AC MEET), (3) audit committee composition (AC COMP) and (4) financial/accounting literacy of audit(ACLITERACY). Audit committee size is measured by total number of audit committee members. Meeting frequency is measured by frequency of audit committee meeting in the fiscal year t. Audit committee composition (AC COMP) is measured by the ratio of non-executive audit committee to total members of audit committee. Financial/accounting literacy is measured by the number of audit committee that have accounting or finance educational background and professional experience.

2.3.4. Control Variables

This study controls other factors that influence firm earning management practices. Two control variables are leverage and Price to book ratio (PBRATIO). Leverage is proxy for company risk, and price to book ratio is proxy for growth. We compute leverage by dividing book value of total debt at year t total assets in year t-1. Price to book ratio is measured by firm’s closing price in year t scaled by firm’s par value in year t. Higher leverage firms under debt covenant hypothesis (Watss and Zimmerman, 1986) increase tendency to increase current earnings. Besides, growth company has more accrual therefore increase accrual earnings.

3. Result and Discussion

3.1. Descriptive

Table 2 and 3 shows descriptive statistics for all variables used in regression models. Table 2 shows the descriptive statistics for distress companies, while Table 3 shows the descriptive statistics for non-distress companies.

<table>
<thead>
<tr>
<th>Variable</th>
<th>N</th>
<th>Minimum</th>
<th>Maximum</th>
<th>Mean</th>
<th>Std. Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>AC SIZE</td>
<td>219</td>
<td>0</td>
<td>4</td>
<td>3,0600</td>
<td>0,4560</td>
</tr>
<tr>
<td>AC MEET</td>
<td>219</td>
<td>0</td>
<td>41</td>
<td>6,0300</td>
<td>5,0570</td>
</tr>
<tr>
<td>AC COMP</td>
<td>219</td>
<td>0</td>
<td>3</td>
<td>0,1123</td>
<td>0,2597</td>
</tr>
<tr>
<td>AC LITERACY</td>
<td>219</td>
<td>0</td>
<td>3</td>
<td>1,8800</td>
<td>0,9010</td>
</tr>
<tr>
<td>PACDA</td>
<td>219</td>
<td>-0,6202</td>
<td>0,6654</td>
<td>0,0236</td>
<td>0,2433</td>
</tr>
<tr>
<td>LEVERAGE</td>
<td>219</td>
<td>-6,3945</td>
<td>2,9838</td>
<td>0,4918</td>
<td>0,6749</td>
</tr>
<tr>
<td>PB RATIO</td>
<td>219</td>
<td>0,0174</td>
<td>359</td>
<td>16,7386</td>
<td>37,3058</td>
</tr>
</tbody>
</table>
Table 3. Descriptive Statistics for Non-Distress Companies

<table>
<thead>
<tr>
<th>Variable</th>
<th>N</th>
<th>Minimum</th>
<th>Maximum</th>
<th>Mean</th>
<th>Std. Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>AC SIZE</td>
<td>33</td>
<td>3</td>
<td>4</td>
<td>3,1800</td>
<td>0,3920</td>
</tr>
<tr>
<td>AC MEET</td>
<td>33</td>
<td>2</td>
<td>14</td>
<td>4,9400</td>
<td>2,6090</td>
</tr>
<tr>
<td>AC COMP</td>
<td>33</td>
<td>0</td>
<td>2</td>
<td>0,2576</td>
<td>0,5049</td>
</tr>
<tr>
<td>AC LITERACY</td>
<td>33</td>
<td>0</td>
<td>4</td>
<td>1,9400</td>
<td>1,0290</td>
</tr>
<tr>
<td>PACDA</td>
<td>33</td>
<td>-0,7584</td>
<td>0,9257</td>
<td>-0,0205</td>
<td>0,3523</td>
</tr>
<tr>
<td>LEVERAGE</td>
<td>33</td>
<td>-4,2204</td>
<td>7,3524</td>
<td>0,5500</td>
<td>1,4863</td>
</tr>
<tr>
<td>PB RATIO</td>
<td>33</td>
<td>0,3000</td>
<td>2085</td>
<td>215,1328</td>
<td>548,7608</td>
</tr>
</tbody>
</table>

In addition, we check the univariate mean difference t-test between the two group of companies, i.e. distress and non-distress companies. We find that there is no significantly different mean in term of audit committee size, meeting, composition, and literacy. However, the mean difference test for variable PACDA indicates that distress companies more likely to use earnings management to increase income. This may be done for sending positive signals or reducing the impact of negative signals emanating from financial distress. On the other side, non-distress companies more likely use earnings management to decrease income to avoid taxes or to avoid public monitoring. While, mean difference for variable PBRATIO indicate that non-distress company’s stock price is more expensive than distress company’s stock price.

3.2. Classical Test Assumptions

To obtain the efficient and accurate regression results, the data must be free from violations of classical assumptions. There are four requirements that must be fulfilled, i.e. normality test, heteroscedasticity test, autocorrelation test, and multicollinearity test.

Normality test is done by one sample Kolmogorov Smirnov test. Then, this test also uses box plot method in order to identify outlier data. After removing all outlier data, asymp. Significant(2-tailed) is greater than 0.05. These results indicate that the regression model has passed the normality test.

Heteroscedasticity test is done by Glejser test. The significance value must be higher than 0.05 in order to indicate that there is no heteroscedasticity problem. There is no heteroscedasticity problem in this data.

Autocorrelation test is done by Durbin-Watson test. The value of Durbin-Watson must be larger than du but smaller than 4 – du (du < DW < 4-du) as indication free from autocorrelation problem. The data does not indicate autocorrelation problem.

Multicollinearity test is done by checking the value of Variance Inflation Factor (VIF) and the amount of Tolerance. The VIF must be no more than 10, and the Tolerance must be more than 0.1. The data does not show any multicollinearity problem, except for moderating variables as predicted.

3.3. Hypothesis Testing

The result of linear regression in Table 4 shows that there is no significant impact of total members of audit committee to earnings management. The relation does not change in financial distress company. Thus H1 is rejected.

There is no significant impact of frequency of audit committee meetings to earnings management. Considering firm financial condition, the result shows that financial distress does not moderate the impact of frequency of audit committee meeting to earnings management. It can be seen from the significance value of FD*AC MEET variable i.e. 0.410. Thus H2 is rejected.
The impact of audit committee composition to earnings management is not significant. Firm financial condition also does not moderate the impact of audit committee composition to earnings management. Thus H3 is rejected.

The only significant impact of audit committee characteristic to earning management is accounting literacy. More member of audit committee with accounting literacy support company to manage its earnings up. However, in financial distress firms, more member of audit committee reduce tendency of company to manage its earnings. As shown on table 4, financial distress have significant negative moderating effect on the relation between audit committee literacy to earnings management practice. Thus H4 is accepted.

<table>
<thead>
<tr>
<th>Variable</th>
<th>Coefficient</th>
<th>Sig.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Constanta</td>
<td>-0.67</td>
<td>0.905</td>
</tr>
<tr>
<td>DISTRESS</td>
<td>0.391</td>
<td>0.499</td>
</tr>
<tr>
<td>AC SIZE</td>
<td>-0.070</td>
<td>0.718</td>
</tr>
<tr>
<td>AC MEET</td>
<td>-0.016</td>
<td>0.419</td>
</tr>
<tr>
<td>AC COMP</td>
<td>-0.196</td>
<td>0.192</td>
</tr>
<tr>
<td>ACLITERACY</td>
<td>0.196</td>
<td>0.000*</td>
</tr>
<tr>
<td>Leverage</td>
<td>0.003</td>
<td>0.000*</td>
</tr>
<tr>
<td>PB RATIO</td>
<td>-8.930E-5</td>
<td>0.282</td>
</tr>
<tr>
<td>FD*ACSIZE</td>
<td>-0.023</td>
<td>0.907</td>
</tr>
<tr>
<td>FD*ACCOMP</td>
<td>0.116</td>
<td>0.478</td>
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<tr>
<td>FD*ACMEET</td>
<td>0.017</td>
<td>0.410</td>
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<tr>
<td>FD*ACLITERACY</td>
<td>-0.202</td>
<td>0.001*</td>
</tr>
<tr>
<td>F test</td>
<td>3.700</td>
<td>0.000*</td>
</tr>
<tr>
<td>Adjusted R²</td>
<td>0.106</td>
<td></td>
</tr>
</tbody>
</table>

* = significant at 5%.

The study shows that only finance/accounting literacy attribute of audit committee influences firm earnings management practice. Audit committee size, meeting frequency and composition are not significant attributes in order to detect earnings management practice in company. It may suggest that the effectiveness of audit committee in Indonesia listed companies is still low, although it is mandatory for them to have an audit committee and there is rigid requirement for audit committee members and activities. This may happen because the appointment of audit committee may perhaps only be done by a company for regulatory compliance (rule of Indonesia securities exchange commission (Bapepam, or now OJK) No. Kep-643/BL/2012) in respect to size, composition of audit committee, and meeting frequency.

In term of finance/accounting literacy of audit committee, this study finds interesting result, which this attribute influences differently when the company financial condition is considered. In the financial distress company, more members of audit committee who have finance or accounting background will reduce firm earnings management practices. However, if the company financial condition does not take account, it will increase firm earnings management practice. This finding suggests that they utilized their expertise in finance or accounting in optimum. They will support the earnings management when the company is in the good condition; it may be the earnings management is for efficient reason (Scott, 2012). However, when the company is in financial distress, they become watchdog to ban the earnings management.
For control variables, only leverage has positive significant relation to earnings management. It support debt covenant hypothesis (Watts and Zimmerman, 1986) that closer company to debt violation, as measured by higher leverage, it will increase probability of company to increase their earnings by accruals management.

4. Conclusion

Best practice in audit committees is an important determinant of good corporate governance. An effective audit committee has a significant bearing on the financial performance and future direction of the company. Being one of the key players in good corporate governance, an effective audit committee would bring companies to a higher level of performance.

This study examine whether the financial distress moderate the impact of good corporate governance to earnings management. Moderation of financial distress can strengthen the implementation of CG or weaken the implementation of CG. It is said to strengthen the implementation of CG, in financial distress condition, the audit committee of the company would provide an effective monitoring of earnings management. Therefore the company can resolve from distress condition.

But on the other side, moderation of financial distress will weaken the implementation of CG if in financial distress condition the company does not pay attention again the implementation of CG. The company will do the earnings management for sending positive signals or reducing the impact of negative signals emanating from distress condition.

This study shows that financial distress moderate the impact of audit committee finance/accounting knowledge to earnings management. It can be happen because audit committee with knowledge in accounting and finance is capable to increase public’s confidence about credibility and objectivity of published financial statements. According to Hambrick and Mason (1984), knowledge in accounting and finance provides a good basis for audit committee members to examine and analyse financial information. The educational background becomes an important characteristic to ensure audit committees perform their roles effectively. Consequently, audit committee members who have financial knowledge would be more professional and more adaptable to change and innovation. Therefore, audit committees with finance or accounting literacy members are expected to adopt high standards of accountability and level of achievement and to strive for excellent corporate image and performance. This is the reason why accounting knowledge of audit committee can reduce the earnings management in financial distress company.

This study indicates that financial distress does not moderate the impact of three other audit committee characteristics (size, meeting frequency, and composition) to earnings management. This may happen because the appointment of audit committee may perhaps only be done by a company for regulatory compliance respect to size, composition of audit committee, and meeting frequency.

This paper finds that, on average, both financially distressed and non-distressed companies meet the minimum requirements on audit committee as prescribed by rule of Indonesia securities exchange commission (Bapepam, or now OJK) No. Kep-643/BL/2012 in terms of audit committee size and composition. However, these requirements are not enough to increase the effectiveness of audit committee in doing their job.

This paper has several limitations. First, the result of this study should be interpreted for manufacturing firms listed from 2010-2012. Second, this research only
used Altman Z-Score model to identify financially distressed and non-distressed company.

**References**


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