The Influence of Managerial Ownership and Firm Size On Debt Policy

Lihard Stevanus Lumapow
Universitas Negeri Manado
lihard_lumapow@unima.ac.id

ABSTRACT

This study aims to examine and analyse the effect of managerial ownership and firm size on debt policy in the perspective of agency theory. This research uses industrial samples of manufacturing companies listed on Indonesia Stock Exchange from 2012 until 2016. Sampling technique used is purposive sampling, and data collection techniques are panel data (cross-section and time series). The analysis tool used in this research is panel data regression with fixed effect model (FEM) approach. Based on the test results show that managerial ownership has a positive and significant effect on debt policy. Company Size has a negative impact but insignificant on debt policy. The results of this study have the potential for agency conflict.

Keywords: Agency Conflict, Agency Theory, Debt Policy, Firm Size, Managerial Ownership

I. INTRODUCTION

In today's rapid business activity has positioned the company in a state of full competition. Not only competing in the domestic environment but also the international environment. With the availability of sufficient funds to finance the company's operations, because the funds are significant for the sustainability of the company and the opportunity for the development of the company, it shows that sufficient funds become a critical factor for the company. Therefore the company must have adequate and adequate funding.

Debt policy is a corporate management action in making decisions to determine the use of capital derived from debt in finance the operations of the company. According to Brigham and Houston (2011), debt policy is a policy of decisions taken by the company to run its operations by using debt or financial leverage.

Most large-scale companies in financing the operations of their companies prefer to use debt, because the use of debt will reduce interest costs in tax incentives, thereby lowering the cost of actual debt. Also, companies that use debt are believed by the market that the company has a good prospect.

The existence of the authority possessed by the manager tends to act only for personal interests and sacrifice the interests of shareholders. It is usually called the agency problem. A common agency problem occurs between the owner (shareholder) and the manager (agent). These problems or agency conflicts occur, also due to the manager's information about the prospect of the company more than the information held by the shareholders. The enhancement of Managerial Ownership will reduce debt.
Managerial ownership is the ownership of shares owned by parties who play an active role in making decisions in the company. Managerial ownership can be measured by the proportion of shares held by the managerial party at the end of the year and expressed in percentage. The greater the proportion of management ownership the management will seek to fulfill the interests of shareholders who actually are themselves.

With the increase in managerial ownership will force the manager to bear the risk as a consequence of his decision-making. Under these circumstances, the manager as a shareholder will align his personal interests with the interests of shareholders. This will make managers more careful to make decisions on the use of debt and use more optimal debt.

Research conducted by Chen and Steiner (1999); Bathala, Moon and Rao (1994); Ismiyanti and Hanafi (2003); Kim et al. (2007); Tjeleni (2013), Agustian & Yuliandhari (2014) and Sheisarvian (2015) stated that managerial ownership has a significant effect on debt policy. But unlike the results of research conducted by Jensen, Solberg, and Zorn (1992); Nengsi (2013), Gusti (2013), Lumapow (2014); Bernice et al. (2015) and Fransiska et al. (2016), shows that managerial ownership has no significant effect on debt policy.

In addition to the managerial ownership factor, firm size (firm size) can also affect debt policy. Large companies have differences with small companies in using debt. Large companies tend to have high sales growth and thus require a greater source of corporate capital. In contrast, small companies have low sales growth, so capital needs also tend to be small.

Companies large and small have an influence on the use of corporate debt the greater the company will be the greater the funds needed to fund its operational activities through debt.

Research on the effect of firm size (size) on debt policy has been done by Syadehli (2013), Sujarweni et al. (2014) and Zuhria (2016) show that firm size has a positive and significant effect on debt policy, which means the larger the size of the company, the greater the use of debt.

Unlike the results of research conducted by Silitonga (2014), Trisnawati (2016) and Husna & Wahyudi (2016), which stated that firm size has no significant effect on debt policy, this is because although the size of large companies does not necessarily have prospects or opportunities in the future is good, so the company is not dependent or not interested in using debt.

The existence of the findings of research that has not been consistent then the researchers want to do a research back associated with managerial ownership and size of the company against debt policy. Furthermore, previous research used multiple regression analysis tools, while this research used panel data regression with Fixed Effect Model (FEM) approach. Therefore, the research objectives are 1.) to test and analyze the effect of managerial ownership on debt policy; 2.) examine and analyze the effect of firm size on debt policy.

II. BACKGROUND

2.1. Agency Theory

According to Jensen and Meckling (1976), agency relationships arise when a person or more (principal) employs others to do a job in the interests of the principal by delegating some decision-making authority including funding decisions. Agency theory is an idea of organizational control based on beliefs on the separation of ownership by management will lead to the potential that the shareholder's desires will be ignored. Meanwhile, according to Sartono (2010), the relationship between agents occurs when one or more persons (principals) appoint one or more other persons (agents) to act on the author's behalf and provide power in decision-making.

When the owner delegates the decision-making authority to the other party, there is an agency relationship between the two parties. The agency relationship, between shareholders and managers, will be effective as long as managers make funding decisions consistent with the interests of shareholders. However, when the interests of managers differ from the
interests of the owner, then the decision taken by the manager will most likely reflect the manager's preferences compared to the owner.

The agency problem between shareholders and managers has the potential to occur when management does not own a majority share of the company. The shareholder would want the manager to work with the goal of maximizing shareholder wealth, and otherwise, corporate managers may act not to maximize shareholder wealth, but maximize their own prosperity, then there is a conflict of interest.

2.2. Debt Policy

Jensen and Meckling (1976) stated that the lack of managerial ownership makes managers less work so that they are more likely to consume additional income. Hence, increasing ownership of shares by managers will lead to the convergence of interests between managers and shareholders in reducing agency conflict. On the other hand higher ownership by managers will lead to entrenchment, thereby increasing agency costs (Morck et al., 1988).

In the context of a trade-off between debt and managerial ownership, conducted by several researchers (Freind and Hasbrouck, 1987; Friends; Lang, 1988; Crutchley and Hansen, 1989; Bathala et al., 1994; and Bernie, 2015), suggest that managerial ownership can substitute debt in reducing agency costs. In fact, at a high marginal tax rate, debt costs decrease due to debt reduction and increased managerial ownership.

Debt policy is considered as one of the solutions to accelerate production activities and also maintain the company's position to continue to operate. According to Nengsi (2013), basically, the company's debt policy is a management action in order to fund the company's operations. Fransisika (2016) explains that debt policy is a decision taken by management to determine the amount of debt in its funding sources to finance the company's operational activities. So it can be concluded, debt policy is a decision taken by the management in determining the small funding to finance the operational activities of the company. Debt policy is a funding policy of external sourced companies.

According to Fahmi (2014), the use of debt that is too high will endanger the company because the company will enter the category of extreme leverage (extreme debt) such as the company stuck in a high debt level and difficult to release the debt burden. Therefore it is better for the company to balance how much debt is worth taking and from which sources can be used to repay debt. Therefore, it will force management to be more efficient and not consumptive because of the risk of bankruptcy.

2.3. Managerial ownership

Kim and Sorensen (1986) argue that managers have a greater incentive to reduce agency costs by increasing ownership. According to Leland and Pyle (1977), the willingness of shareholders to invest in a project can signal the quality of the project, causing the company's value to increase. This implies that the value of the firm positively affects the wealth of owners who are kept as stock. Companies that have a larger debt capacity then the company will use more debt. Thus, debt is expected to have a negative impact on share ownership if the convergence theory of interest prevails and has a positive effect on stock ownership if entrainment theory applies.

The Company is a meeting point between the company's owner (principal) and the management of the company (agent) in which each party seeks to maximize its usefulness (Sheisarvian et al., 2015). According to Setiana (2013), managerial ownership is a percentage of share ownership by the managerial party. Agustian (2015), states that managerial ownership is a situation in which managers own shares of companies or managers as shareholders of the company. It can be concluded that managerial ownership is the percentage of share ownership from the manager. It also constitutes an active part in the company management.

Based on the agency theory proposed by Jensen and Meckling (1976) that one way to minimise the possibility of conflict within the company by increasing ownership of shares by managers. By increasing, managerial ownership will affect the debt policy. The greater the managerial ownership then the use of debt will decrease. So with the ownership of shares from the manager will encourage the management to improve the company's performance and managers will use the debt optimally to minimize agency costs.
2.4. Firm Size

The size of the company is one factor to consider in setting the level of debt policy that will be done by the company. According to Hartono (2013), company size is a scale classified in the size of the company, while Hastalona (2013), states that the size of the company directly reflects the high level of operational activities of a company. It can be concluded that the size of the company is a scale that shows the size of the company as reflected by the high low level of company activity.

If the company has a large asset, then the management will be more flexible in using assets in the company's operational activities. Large companies are easier to obtain funds in the form of debt than small companies. The larger the size of the company then the need for funds will also be a greater one of which can come from the external financing of debt (Hartono, 2013).

Silitonga (2014), indicates that firm size has an effect on debt policy, indicating that large firm size means that firms have more stable cash flow, lower bankruptcy risk, and have easy access to credit. Large companies generally have large profits from operating activities performed and better known to the public when compared with small companies; this triggers the need for debt funding of large companies is higher than small companies.

In general, small companies are very vulnerable to economic changes and tend to be less profitable while large companies can access the capital market. The existence of these differences can be concluded that large companies have the ability to obtain funds or capital more easily.

2.5. Thinking Framework and Hypothesis Formulation

2.5.1. The Effect of Managerial Ownership on Debt Policy

The company is the meeting point between the company's owner (principal) and the company's management (agent), where each party seeks to maximize its benefits (Sheisarvian et al., 2015). Managerial ownership is the percentage of share ownership of the company from the manager as an active part in running the company as well as shareholders.

Based on agency theory proposed by Jensen and Meckling (1976), states that one way to reduce agency conflict is to increase managerial ownership. Increased ownership of shares by managers will lead to the importance of convergence between managers and shareholders in reducing agency conflict.

Moussa and Chichti (2013) found a non-linear relationship between managerial ownership of debt. The same study conducted by Hatem (2015) who found managerial ownership of debt is non-linear. The results of their research show the greater the share owned by managers, the lower the use of debt. The existence of a negative influence is a substitution mechanism for internal control (Holderness & Sheehan, 1988). This is also confirmed by empirical studies of Kim and Sorensen (1986). Hatem (2015) concludes that managerial and debt ownership is a substitution mechanism in controlling manager behaviour, so the role of debt discipline is valid.

Results of research by Chen and Steiner (1999); Bathala, Moon and Rao (1994); Kim et al. (2007); Tjeleni (2013), Agustian & Yuliandhari (2014) and Sheisarvian (2015) explained that managerial ownership variables have a negative and significant effect on debt policy.

H1: Managerial ownership negatively affects debt policy

2.5.2. Influence of Firm Size on Debt Policy

Company size is one factor that can determine debt policy in conducting company operations. The size of a company is a scale that indicates the size of a company that reflects the high or low of each activity in the company's operations.

Generally, the larger the company size will be, the higher its activity (Hastalona, 2013). The larger the size of the company then the need for funds will also be a greater one of which can come from the external financing of debt (Hartono, 2013).

The results of Syadehli (2013); Sujarweni et al. (2014); Hatem (2015) and Zuhria (2016), show that firm size has a positive and significant effect on debt policy, which means the larger the size of the company, resulting in higher debt financing.
H2: Firm size has a positive effect on Debt Policy

III. METHODOLOGY

The research method used in this research is associative research, is a study that aims to determine the influence or also the relationship between two variables or more. The population in this study is a manufacturing company listed on the Indonesia Stock Exchange. Sample selection using Purposive Sampling technique. Based on the predetermined criteria, then the sample obtained as many as 11 companies listed on the Indonesia Stock Exchange during the year 2012-2016.

3.1. Definition and Operational Variables

Dependent variables are debt policy (DER) and independent variables are managerial ownership (OWN) and firm size (SIZE).

3.1.1. Debt Policy (DER)

Debt policy is a decision taken by the management in determining the amount of funding with debt to finance the company's operational activities. To calculate the debt policy using Debt Equity Ratio (DER) is a ratio that describes the composition of the company's capital structure used as a source of corporate funding, i.e. the results obtained from the ratio of total debt divided by total equity (Zuhria, 2016).

3.1.2. Managerial Ownership (OWN)

Managerial ownership is the percentage of share ownership of the company from the manager as an active part in running the company as well as shareholders. To calculate managerial ownership is measured from the percentage of shares held by management at the end of the year and given the symbol OWN (Agustian & Yuliandhari, 2015).

3.1.2. Firm Size (SIZE)

Firm size is a scale that indicates the size or size of a company that reflects the high or low operational activities of a company. To calculate the size of the firm using Ln (Natural Logarithm) the total book value of assets, reflecting the size of the firm that appears in the total value of the assets and given the symbol SIZE (Hartono, 2013).

3.2. Data collection technique

The data used are secondary data and in the form of panel data (Time series and Cross Section), such as financial report data that published in the annual report during the period 2012-2016, obtained through a search on the official website of Indonesia Stock Exchange (www.idx.co.id).

3.3. Data analysis technique

To answer the above hypothesis, the researcher uses the Data Panel Regression Analysis. Regression uses panel data (Pooled Data), meaning that this procedure is used to analyze data combination between time series data and cross-section (Sarwono, 2016).

Model of panel data regression equation as follows:

\[
DER_i = \alpha + \beta_1OWN_i + \beta_2SIZE_i + \epsilon
\]

Where:

- DER = Debt Policy
- OWN = Managerial Ownership
- SIZE = Firm Size
- \(i\) = company
- \(t\) = time
- \(\alpha\) = intercept
- \(\epsilon\) = error
IV. FINDINGS

4.1. Descriptive statistics

The descriptive analysis gives a general description of the variables studied, so it can explain the characteristics of existing data by explaining the number of values in descriptive statistics.

<table>
<thead>
<tr>
<th>Tabel 4.1</th>
<th>Descriptive Statistics</th>
</tr>
</thead>
<tbody>
<tr>
<td>DER?</td>
<td>OWN?</td>
</tr>
<tr>
<td>Mean</td>
<td>0.77345</td>
</tr>
<tr>
<td>Maximum</td>
<td>2.88000</td>
</tr>
<tr>
<td>Minimum</td>
<td>0.08000</td>
</tr>
<tr>
<td>Std. Dev.</td>
<td>0.54421</td>
</tr>
</tbody>
</table>

Based on the descriptive statistics in Table 4.1 it can be seen that the debt policy proxied using Debt Equity Ratio (DER), shows the minimum value of 0.080000 and the maximum value of 2.880000, while the average value of the debt policy is 0.773455. The average value of debt policy (DER) indicates that the company's funding through debt exceeds 0.5 or greater than 50%. The use of large debts will be due to the company's ability to recover interest and principal costs. While the standard deviation of 54%, indicates that the value of deviation is large between companies in the manufacturing industry.

In managerial ownership variables proxied using OWN has a minimum value of 0.020000%, and the maximum value of 14.78000%, while the average managerial ownership of 2.198545%. On the other side, the standard deviation of managerial ownership is 3.506%, indicating that the higher the percentage of managerial ownership in the company will encourage the managerial to improve the company's performance so that it can welfare the shareholders.

In the firm size variables proxied using SIZE. The minimum value of 23.94000 and the maximum value of 28.41000, while the average size of the company (SIZE) of 26,51691. While the standard deviation of 1,024, the higher the size of the company then the company's operational activities higher. A large asset amount will be easier to obtain funds in the form of debt.

4.2. Hypothesis Testing

This study uses panel data regression analysis to see the effect of managerial ownership (OWN) and firm size (SIZE) on debt policy (DER). Determination of estimation model that will be used is common effect model, fixed effect model or random effect model, which is most suitable for use in this research. It is necessary to do a Chow Test and Hausman Test. Based on Chow Test results obtained probability value is smaller than 0.05 0.0000 <0.05 which means fixed effect model used. And for Hausman test results obtained probability value of 0.0381 or smaller than 0.05 (0.0381 <0.05), which means the model is suitable to use fixed effect model. Therefore, the estimation model in this research is a fixed effect model.

The results of testing the effect of managerial ownership and firm size on debt policy can be summarized as in the following table:
### Table 4.2
Regression Test Results Data Panel Equations Debt Policy (DER)

<table>
<thead>
<tr>
<th>Variable</th>
<th>Expected Sign</th>
<th>Model (4.1)</th>
<th>Model (4.2)</th>
<th>Model (4.3)</th>
</tr>
</thead>
<tbody>
<tr>
<td>C</td>
<td></td>
<td>0.6228 (7.72)***</td>
<td>2.6927 (0.850)</td>
<td>5.2443 (1.664)</td>
</tr>
<tr>
<td>OWN</td>
<td>(-)</td>
<td>0.06853 (2.136)**</td>
<td></td>
<td>0.0853 (2.534)**</td>
</tr>
<tr>
<td>SIZE</td>
<td>(+)</td>
<td></td>
<td>-0.0724 (-0.61)</td>
<td>-0.1757 (-1.45)</td>
</tr>
<tr>
<td>R²</td>
<td></td>
<td>0.77234 9</td>
<td>0.7503</td>
<td>0.7834</td>
</tr>
</tbody>
</table>

Description: Number in brackets are t statistics. *** Significant at 0.01 level. ** Significant at 0.05 level. * Significant at 0.10 level.

Equation Model

\[ \text{DER}_t = \alpha_0 + \beta_1 \text{OWN}_t + \epsilon \] ........................(4.1)
\[ \text{DER}_t = \alpha_0 + \beta_2 \text{SIZE}_t + \epsilon \] ........................(4.2)
\[ \text{DER}_t = \alpha_0 + \beta_1 \text{OWN}_t + \beta_2 \text{SIZE}_t + \epsilon \] ....(4.3)

4.2.1. The Impact of Managerial Ownership on Debt Policy

The first hypothesis of this study states that managerial ownership (OWN) has a negative effect on debt policy (DER). Test results of managerial ownership (OWN) on debt policy (DER) can be seen in table (4.4) shows that the OWN variable in model (4.1) obtained by regression coefficient for OWN variable is 0.068527, with probability value is 0.0384 and in model (4.3) obtained by regression coefficient for OWN variable equal to 0.0833 1, with probability value equal to 0.0151. Based on the above results, it can be seen that the significance value of the two models is smaller than the level of significance (a) = 5% or 0.05, so it can be concluded that managerial ownership has a positive and significant effect on debt policy.

Thus the first hypothesis that managerial ownership negatively affects the debt policy is rejected.

4.2.2. Influence of Firm Size on Debt Policy

The second hypothesis of this study states that firm size (SIZE) has a positive effect on debt policy (DER). The result of the testing firm size variable (SIZE) on debt policy (DER) can be seen in the table (4.4). The result of debt policy equation shows that SIZE variable in the model (4.2) obtained by regression coefficient equal to -0.072380 with a probability value of 0.5480 and in the model (4.3) obtained regression coefficient for SIZE variable equal to -0.175680 with probability value equal to 0.1499.

Based on the above results, the significant value of both models is greater than the level of significance (a) = 5% or 0.05, so it can be concluded that firm size has a negative but insignificant effect on debt policy.

Thus the second hypothesis that states firm size has a positive effect on debt policy is rejected.

4.3. Discussion

4.3.1. The Effect of Managerial Ownership on Debt Policies

Based on agency theory proposed by Jensen and Meckling (1976) states that one way to reduce agency conflict by increasing managerial ownership. The results of this study prove that managerial ownership has a positive and significant effect on debt policy. The higher the managerial ownership, the lower the use of debt. The results of this study do not support the
opinion of Jensen and Meckling (1976) which explains that greater managerial ownership may reduce agency conflicts or are unable to align agents and principals (convergence of interests). The results of this study legitimately support the theory of entrenchment by Morck et al. (1988), resulting in greater agency costs. This is triggered by the actions of shareholders to consume for their own interests.

The results of this study are not in line with research by Nengsi (2013), Lumapow (2014), and Fransiska et al. (2016) stating that managerial ownership negatively affects debt policy. In contrast, the results of this study support research conducted by Ismiyanti and Hanafi (2003) which states that managerial ownership has a positive and significant effect on debt policy.

4.3.2. Influence of Corporate Size on Debt Policy

Large corporations have a greater advantage over small firms, due to large operational activities as well as larger corporations are better known to the public so that it can trigger companies to increase funding using debt.

The results of this study indicate that firm size (SIZE) has a negative and insignificant effect. The size of the firm does not affect debt policy because firm size does not guarantee the company retains a consistent value in the future, prompting companies to use internal funding sources in order to avoid possible risks.

These results support the opinion of Brealey et al. (2008), from the perspective of Pecking Order Theory (POT) that firms are more likely to choose internal financing derived from cash flow, retained earnings, and depreciation rather than external financing, as well as companies with high levels of profitability actually use a low debt, because a profitable company has a source of internal funds are abundant. So it is clear that both large and small sized companies do have debts, but are not necessarily influenced by firm size.

The results of this study do not support research from Syadeli (2013), and Zuhria (2016) which explains that firm size has a positive and significant effect on debt policy. The results of this study support the research of Husna and Wahyudi (2016), and Trisnawati (2016) which explains that firm size does not affect the debt policy.

V. CONCLUSION

Based on the results of data analysis and discussion, it can be concluded as follows:

1) Managerial ownership has a positive and significant effect on debt policy. These results indicate that the higher the managerial ownership, the greater the debt used by the company. These results support the entrenchment theory that the ownership of shares by managers within the company, unable to reduce agency conflicts.

2) The size of the company has a negative but insignificant effect on debt policy. These results indicate that the larger the size of the company, the smaller the debt required by the company. The results support the Pecking Order Theory that the company is unable to use the asset as collateral to utilise external funding sources within the company. However, the company only uses internal funding in developing the company.

While suggestions for future research to include or add exogenous variables such as dividend policy, institutional ownership, sales growth, asset structure and free cash flow. In addition, further research is recommended to expand the object of research outside the manufacturing company so that it can cover all companies listed on the Indonesia Stock Exchange.

REFERENCES


Debt Policy (Studies in Property and Real Estate Companies in IDX in 2011-2013)”, The 3rd IBEA International Conference on Business, Economics and Accounting, 15-17 April, Ho Chi Minh City, Vietnam


