Firm Value, Capital Structure, Profitability, Firm Characteristic and Disposable Income as Moderator: an Empirical Investigation of Retail Firms in Indonesia

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1. Introduction

Optimizing firm value is the company's goal in the long run. The higher the value the company describes the more prosperous the owner. The company's objectives can be achieved through the implementation of the financial management functions carefully and appropriately, since any financial decisions taken will affect other financial decisions that impact the company's value (Fama and French, 1998). Financial decisions in the viewpoint of financial management include investment, funding and dividend payments. Therefore, companies in an organization and corporate managers as head of the company strive to continue to pay attention to the impact of the three decisions on firm value.

According to Keown (2006), firm value was the investor's perception of the firm's success rate that is often associated with stock prices. Firm value was the value that investors need to make investment decisions. There are actors who play a role in efforts to increase firm value that is firm characteristic, capital structure, profitability.

Capital structure is a balance of short-term debt that is permanent, long-term debt, stock prefrm and common stock (Sartono, 2012: 225). The capital structure is composed of a composition or proportion of funding originating within the company and outside the enterprise. Capital Structure Theory of Modigliani and Miller (1963), states that with the existence of the company's taxes, the funding decision becomes relevant, i.e. it will increase firm value. Companies that use debt will get two benefits with the company tax, namely: debt is a cheaper source of capital than equity, and interest costs are a tax deduction element. Therefore, companies that use debt will pay less taxes than companies that do not use debt. The government pays a portion of the cost of capital derived from debt, or in other words, the debt provides tax protection benefits. As a result, the use of debt resulted in an increase in the portion of earnings before interest and tax (EBIT) flowing to investors. Thus, the higher the use of debt the higher firm value as reflected in its share price. Balancing theory (Baxter, 1967) describes the use of debt that exceeds a certain threshold can lower firm value, this is due to the rising cost of bankruptcy. Therefore, in actual practice, almost no company uses 100 percent of the debt to finance its investment.

In relation to the increase in firm value, in addition to capital structure, other factors that influence it are profitability and firm characteristics. Profitability is one measure of corporate performance to measure the company's ability to generate profit in a certain period and can show the prospect of survival in the future. With a good level of profitability then the stakeholders will see the extent to which the company can generate profits from

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ABSTRACT

This study examined the effect of capital structure on firm value; firm characteristic on firm value with disposable income as moderator variable; the effect of profitability on firm value. The study was conducted in Indonesia Stock Exchange (IDX) with samples of retail firms listed on the IDX in 2014 to 2016 as many as 21 retail firms. The analysis method used Moderated Regression Analysis (MRA), classical assumption test and t test. The results showed that the capital structure didn't have a significant negative effect on firm value. Profitability had a significant positive effect on firm value. Firm characteristic didn't have a significant negative effect on firm value with disposable income as a moderator. The conclusion of research indicated that capital structure and profitability had a significant effect on firm value while firm characteristic with disposable income as moderator didn't have significant effect on firm value.

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sales and manage the investment and assets it has. Increased profitability will affect the improvement of company performance that will also increase firm value. Companies that have a high profitability will attract investors to invest their capital so that firm value increases with hope will get high profits as well. The greater the profits, the greater the company's ability to pay dividends and the better the company's value in the eyes of investors.

Firm characteristic is one of the factors affect firm value. Characteristic is something specific owned by the company that can be developed by the company for its importance. This study uses firm size as a component of firm characteristic. Companies are small, medium and large. The greater the asset, the more capital invested, the more sales the more money turns and the greater the market capitalization, the greater the likelihood that the company is publicly known, so the public is interested in investing in the company.

According to Keynes quoted in Mankiw (2006), the main factors that determined economic achievement a country is an aggregate expenditure which is expenditure society to goods and services. Decision on household consumption affect the overall behavior of the economy well in the run long or short term. In the short term fluctuations in consumption has a significant influence on economic fluctuations and in the run the length of household consumption decision will affect the micro variable. Disposable income has an effect on the stock market with the increase in disposable income which causes the increase of stock valuation and increase firm value. Disposable income becomes a moderator between the characteristics of the firm against firm value. The firm characteristic proxied by the size of the firm from sales can be moderated by disposable income.

This research was conducted at retail company in Indonesia. Based on data from Global Retail Development Index 2017, Indonesia retail sales value reached US $ 350 billion or about Rp 4.6 quadrillion. This figure is far above the value of retail sales of other countries in Southeast Asia (ASEAN). However, compared to China's retail sales and India, Indonesia is far behind. Retail sales of the Philippines only reached US $ 137 billion and Thailand amounted to US $ 119 billion, both of which are below Indonesia. Meanwhile China's retail sales reached US $ 3.128 billion and India amounted to US $ 1.071 billion. It shows that retail firms in Indonesia still cannot meet its sales targets. This is due to the phenomenon of sluggish consumer goods sales are also seen evenly throughout the region. In DKI Jakarta, FMCG sales fell 2.3%. Similarly, in East Java that fell 0.1%. Consumer goods sales in West Java and Central Java rose 6.1% and 1.7%, respectively. In fact, the four provinces in Java Island is controlling 68% of the total market of consumer goods sales throughout Indonesia. Increased sales in addition to impacting the capital structure and profitability will affect firm value later.

This study examined the effect of capital structure on firm value; firm characteristic on firm value with disposable income as moderator variable; the effect of profitability on firm value.

2. Theoretical

Signaling Theory

Signaling theory was an effect that occurs as a result of the announcement of financial statements captured by capital market actors as an opportunity or future threats related to the prospects of investment that will be done. Therefore, signaling effects are generated by new information from the announcement of financial statements and not from an issue that occurs (Penman, 2003). According to Modigliani and Miller (1963) that a rise in dividends above the normal rise is usually a positive signal to investors that the company's management predicts a good income in the future. On the other hand, a lower or lower dividend increase is believed to be investors as a signal that the company faces a difficult period in the future.

In signaling theory, increased profitability will provide a positive signal to investors on the return of an investment in the capital market. Battacharya quoted in Sujoko and Soebiantoro (2007) states that companies with increasing earnings are positive signals that the company has good prospects in the future, increasing the company's value. Signaling theory is the effect of the steps that management implicitly and explicitly provide guidance to investors about the way management views the prospects of the company. Generally, a profitable company will avoid issuing new shares, and seek to acquire new capital in other ways first, including with the use of debt that exceeds the target capital structure. This is due to the fact that by issuing stocks to give signals to investors, that the prospect of the company is currently bleak. The impact will be seen on the stock price when the first public offering. Unprofitable companies will try to sell their shares and get a low price per share (Indrawati and Suhendro, 2006).

Asymmetric Information Theory

Asymmetric information was a condition when managers have more information about future operations and prospects than others (Gitman, 2009). This asymmetry condition makes the managers more freely acts in determining the strategy of capital structure because more control of information within the company. This theory became the basis of the emergence of other theories of signaling theory and agency theory. Signaling theory was the effect of the steps that management implicitly and explicitly provide guidance to investors about the way management views the prospects of the company.

Generally profitable companies will avoid the issuance of new shares and seek to obtain new capital in other ways first, including with the use of debt that exceeds the target capital structure. This is due to the fact that by issuing stocks to give signals to investors, that the prospect of the company is currently bleak. The impact will be seen on the stock price when the first public offering. Unprofitable companies will try to sell their shares and get a low price per share (Indrawati and Suhendro 2006).
Consumption Theory
Consumption means the fulfillment of food and drink. Consumption has a broader understanding of all purchases of finished goods and services that are ready to be consumed by households to meet the needs (Eachem, 2001: 490). Gilarsio (2003: 89), consumption is the starting point and final goal of all economic activities of society. Mankiw (2006: 11), defines consumption as spending of goods and services by households. Goods include household expenditures on durable goods, vehicles and equipment and non-durable items such as food and clothing. Services include goods that are not concrete, including education. So, it can be concluded that consumption can be defined as the activities of purchasing goods and services to meet the needs of food and beverage consumer households.

Keynes put forward the main variable in his analysis of consumption is influenced by income level C = f (Y). Keynes proposed three basic macro assumptions in his theory: first, the propensity to consume marginal (marginal propensity to consume) is the amount consumed in each additional income is between zero and one; second, Keynes stated that the average propensity to consume, decreases as income rises and third, Keynes argues that income is an important determinant of consumption and interest rates have no important role (Mankiw, 2006: 425-426).

The Effect of Capital Structure on Firm value
The capital structure that is proxied by debt will increase firm value through the tax savings from interest on saving (interest tax saving) which reduces after tax cost of capital. In other words, if there is a corporate income tax then firm value will increase because the interest cost of debt is the cost that reduces tax payments (tax deductible expense) (Modigliani and Miller in Brigham, 2005). Jensen, et al. (1992) argue that in the presence of debt can be used to control the excessive use of free cash flow by management, thereby avoiding wasted investment, thereby increasing firm value. Based on signal theory, the increasing debt will give a positive signal to the market, so firm value is also increasing.

In trade off theory, the higher the debt the higher the stock price, but at a certain point increase in debt will reduce firm value because the benefits of using debt is much smaller than the costs incurred. The owners of the company prefer to create debt at a certain point to increase firm value because if the company's debt increases, it will increase the risk of bankruptcy risk, which will lower firm value. This refers to signal theory and is supported by research by Taswan (2003), Wahyudi and Pawestri (2006), Kulati (2014) and Arqgarwal and Padhan (2017) which show that the capital structure affects the firm's value. Based on the description can be formulated hypothesis as follows:

Hypothesis 1: The capital structure affects the firm's value.

The Effect of Profitability on Firm value
One of the profitability ratios used to measure a company's ability to earn profits in relation to sales, total assets and capital itself is Return on Assets (ROA). ROA is the ratio between net profit after tax to total assets (Sartono, 2005). ROA shows the company's ability to generate profits from the assets used. Return on Assets (ROA) or so-called Return on Investment (ROI) is obtained by comparing net income after tax to total assets (Horne and Wachowicz, 2009). The higher the company's ROA, the better the prospect level of the company and the more interested investors will be in the stock of the company (Hardininghsih, et al., 2002). Rational investors will invest funds in companies that have a high level of asset use efficiency because the profits obtained by the company is also high. If the demand for a stock has increased, then the stock price of the company will increase as well.

Based on this theory, asymmetric-based information explains that if a company financing by issuing new shares will result in a per share earnings decreases as the number of shares will increase and the company does not take advantage of savings the number of shares will increase and the company does not take advantage of the savings of income from debt. This increase in stock prices leads to an increase in firm value. This refers to signal theory that the higher ROA will be a positive signal that will be responded by potential investors to invest their capital to the company and supported by research Amarjit Gill et al. (2010) conducted on 500 public companies in the United States found evidence that profitability (ROA) has a positive and significant impact on firm value. Purwohando (2017) found that profitability had an effect on firm value. Chen and Chen (2018) argue that profitability can increase firm value. Based on theory and empirical hence can be formulated hypothesis as follows:

Hypothesis 2: Profitability affects the firm's value.

The Effect of Firm characteristic on Firm value
Firm characteristic in this study is explained by the size of the company that one of the factors that affect firm value. According Riyanto (2001), the firm Size or firm size is the size of the company that can be seen from the amount of equity, sales value, and total assets value. In this study the benchmark that states the size of a company is a sale. The larger the size of the company, the faster the asset turnover (the more effective the company generates profit from the use of its assets) so the greater the net sales, the increased revenue will be a positive signal for investors that the better the performance of the company so as to increase the investor interest to invest and ultimately firm value will increase.

The size of the company will explain the effectiveness of the company in utilizing its working capital derived from the company's assets to maximize firm value. Mishra (2015) states that the firm characteristic affects firm value. Buvanendra et.al (2017) found that the firm characteristic affects firm value. Based on theory and empirical hence can be formulated hypothesis as follows:

Hypothesis 3: Firm characteristic affect firm value.
The Effect of Firm Characteristic on Firm Value Through Disposable Income as Moderator

Sales is one of the important factors that determine the survival of the company. The company gets funds for survival and expands apart from its own debt and equity, as well as from the sale of company products in the form of goods or services. The company's management strives to increase its product sales because high or stable sales growth is intertwined with the company's profits. The characteristics of the firm are explained by the size of the firm's sales that can be strengthened or weakened by the disposable income of the community against the company.

Increased disposable income will increase sales so that will increase firm value. Household income has more money to save or spend, which naturally leads to consumption growth. This increase in consumption could boost corporate sales and corporate earnings, increasing the value of individual stocks. This increase in individual stock price valuations can then lead to an increase in overall market value. This has the potential to cause an economic boom. If disposable income decreases, households have less money to spend and keep, which then force consumers to consume less and become more efficient. This decrease in consumption can then lower the company's sales and corporate earnings, lowering the value of individual stocks. This decrease in individual stock price valuations can then lead to a decline in overall market value. This has the potential to cause depression or recession. Increased disposable income does not always result in an increase in the value of the stock market, and vice versa. Based on theory and empirical hence can be formulated hypothesis as follows:

Hypothesis 4: Firm characteristic affect firm value by moderated by Disposable Income

3. Methodology

This research included explanatory research was a study aimed at explaining the causal relationship between research variables and testing the formulated hypothesis (Kuncoro, 2004). This study used secondary data types taken from companies listed on the Indonesia Stock Exchange. The type of data used a pooled data. The data used annual report data from Indonesia Stock Exchange and World Bank. To obtain up to date was taken data company annual reports on the Indonesia Stock Exchange 2014-2016. Data were obtained from the company's annual report listing on the Indonesia Stock Exchange in 2014-2016. Data obtained from Directory BI, Indonesian Capital Market Directory (ICMD) in 2016, IDX corner, http://www.sahamok.co.id and http://www.IDX.statistik.co.id, BPS and Directory Bank Indonesia. The population in this study were retail firms listed on the Indonesia Stock Exchange. The study is conducted by collecting secondary data from 20 retail firms whose shares are listed on the BEI. The sample of research were 20 firms.

The variables consisted of independent variables were capital structure proxied with Debt Equity Ratio (DER), profitability proxied with ROA and firm characteristics with firm Size from Ln sales. The moderate variable was disposable income and the dependent variable was firms value proxied by PER. Method of analysis used Moderated Regression Analysis (MRA). Moderated Regression Analysis is related to the study of dependence of a dependent variable on one or more independent variables with the aim to find out how much influence the independent variable to the dependent variable.

4. Result and Discussion

Result of analysis of Moderated Regression Analysis between independent variable were capital structure, profitability, firm characteristic and disposable income and dependent variable of firm value. Based on the regression coefficient in Table 1 it is described as follows.

Table 1. Results of MRA Analysis

<table>
<thead>
<tr>
<th>Variables</th>
<th>Standardized Coefficients</th>
<th>t</th>
<th>Sig.</th>
<th>Conclusions</th>
</tr>
</thead>
<tbody>
<tr>
<td>(Constant)</td>
<td>170.937</td>
<td>0.165</td>
<td>0.870</td>
<td>Not significant</td>
</tr>
<tr>
<td>Capital Structure</td>
<td>-0.049</td>
<td>-0.366</td>
<td>0.716</td>
<td>Not significant</td>
</tr>
<tr>
<td>Profitability</td>
<td>0.171</td>
<td>2.347</td>
<td>0.018</td>
<td>Significant</td>
</tr>
<tr>
<td>Firm Characteristic</td>
<td>-1.030</td>
<td>-0.243</td>
<td>0.809</td>
<td>Not significant</td>
</tr>
<tr>
<td>Disposable Income</td>
<td>-0.111</td>
<td>-0.218</td>
<td>0.828</td>
<td>Not significant</td>
</tr>
<tr>
<td>Moderate</td>
<td>1.426</td>
<td>0.330</td>
<td>0.743</td>
<td>Not significant</td>
</tr>
</tbody>
</table>

Based on Table 1 then the regression equation that can be formed is:

\[ Y = 170.937 - 0.049SM - 0.171PROFIT - 1.03FC - 0.111DI + 1.426Moderate \]

While the research model is described in Figure 1 below.

![Figure 1. The Model Analysis of Research](image-url)
Test results with t test interpreted the results of MRA analysis. The t test results proved the effect of capital structure, profitability, firm characteristic and disposable income and dependent variable of firm value. The test results proved only profitability that effects on firm value. This is proved by probability value t arithmetic <0.05 (0.000). The result of research showed capital structure didn’t have a significant effect to firm value, so the first hypothesis was rejected. Profitability had a positive and significant effect on firm value. This proves that the second hypothesis was accepted. Then the third hypothesis that explains that firms characteristic affect firm value, rejected. Testing the fourth hypothesis which states that the firm characteristic affects firm value by moderated by Disposable Income, rejected.

The Effect of Capital Structure on Firm value

The capital structure projected with the debt ratio didn’t have a significant effect on firm value. The test results showed that the capital structure didn’t affect the firm’s value. It shows that the use of debt in the capital structure didn’t increase firm value. The use of debt in the asset structure of a company will increase firm value through tax savings from interest on interest (saving) which reduces after tax cost of capital. In other words, if there was a corporate income tax didn’t affect firm value will increase because the cost of interest payable was the cost of tax-deductible expense (Modigliani and Miller in Brigham, 1999). It showed the lower level of a company’s debt then firm value will increase this is because the company’s obligation in paying debt to creditors is reduced so that the profit generated by the company increases and causes the company’s stock price increases so that firm value will also increase both in the eyes of prospective creditor or for the market. These results were inconsistent with Taswan’s (2003), Wahyudi and Pawestri (2006), Kulati (2014) and Araggawal and Padhan (2017) studies indicating that the capital structure influences the firm’s value.

The Effect of Profitability on Firm value

Profitability had a significant effect on firm value. The direction of the positive relationship on the results of this study is in line with the expected direction of the relationship on the hypothesis. This finding means that the larger retail firms in BEI have firm value with larger debt proportion. The company’s value policy with the proportion of funding from larger debts may result in greater financial risk of the company, so retail firms are particularly vulnerable to monetary crisis turmoil affecting financial distress. The results of this study support and consistent against Pecking Order Theory by Myers (1984).

Based on this theory, asymmetric-based information explained that if a company financing by issuing a new share will result in a decrease in earnings per share as the number of shares will increase and the company does not make use of the savings the number of shares will increase and the company does not utilize the savings of CR income from the debt. Therefore, Pecking Order Theory by Myers (1984) describes the financing sequence of retained earnings as the first alternative and the financing of debt as the second and final alternative is the issuance of new shares.

Rational investors will invest funds in companies that have a high level of asset usage efficiency because the profits obtained by the company is also high. If the demand for a stock has increased, then the stock price of the company will increase as well. This increase in stock prices leads to an increase in firm value. This refers to the signal theory that the higher ROA will be a positive signal that will be responded by potential investors to invest their capital into the company. The results of this study are also consistent with previous research conducted by Amarjit Gill et al. (2010), Purwohandoko (2017), Chen and Chen (2018) indicating that profitability significantly affects firm value.

The Influence of Firm characteristic on Firm value

The test results showed that the firm characteristic didn’t affect firm value. The firm characteristic are measured by the size of the company proxied with the total sales logarithm. The size of the firm didn’t have a significant effect on firm value. This suggests that any increase in firm size will not necessarily increase the growth rate of firm value, but firm size variables didn’t have a significant effect on the profitability of firm value. The direction of the relationship of the results of this study in the direction of the expected relationship on the hypothesis.

Company size is one of the factors that influence firm value. Firm size indicates that a large company has the ability to increase sales and earnings so that investors will respond positively, and firm value will increase. These results didn’t support Homfair, et al. (1994) and Moh’d, et al. (1998) suggests that large companies will more easily access funding through capital markets. This ease is good information for profitability retrieval, which can reflect the company in the future. It is not consistent with signal theory and is supported by research by Solihin and Taswan (2002), which concludes that firm characteristics have a significant positive effect on firm value (growth). These results are consistent with Mishra (2011) and Buvanendra et.al (2017) firm characteristics have a significant positive effect on firm value.

The Effect of Firm Characteristic on Firm Value Through Disposable Income as Moderator

Based on the value of MRA testing, Disposable Income is not proven to moderate the influence of firm’s characteristics on firm value. It showed that Disposable Income is unable to strengthen or weaken the influence of the company's characteristics on firm value. This showed that the hypothesis in this study was not proven.

Disposable Income is a revenue that is ready to spend on consumer spending in goods or services. Consumer spending is the demand side of "supply and demand" production is supply. When economists or policy makers refer to aggregate demand, it means the combined market value of all consumer spending in a given area, over a given period of time and at a certain price level.
Disposable Income cannot moderate the firm characteristic as measured by its total sales value. That is because household consumption expenditure includes all expenditures for the consumption of goods and services tend to be lower. If disposable income decreases, households have less money to spend and keep, which then force consumers to consume less and become more efficient. This decrease in consumption can then lower the company's sales and corporate earnings, lowering the value of individual stocks. This decrease in individual stock price valuations can then lead to a decline in overall market value. This has the potential to cause depression or recession. Increased disposable income does not always result in an increase in the value of the stock market, and vice versa. Sometimes, especially after the recession and during the recovery period, although disposable income increases, many consumers remain economical and do not use the increase in disposable income to increase consumption so sales decline and will not provide value for the company.

5. Conclusions, Implications and Recommendations

Based on the results of analysis and discussion it can be concluded first, the capital structure didn’t significantly affect firm value; Second, profitability had a positive and significant effect on firm value so that the second hypothesis is accepted. Third, firm’s characteristic didn’t affect firm value. Fourth; Disposable Income is unable to moderate the influence of firm characteristics on the value of the firm by moderated by Disposable Income. This study has some implications, among others, profitability gives effect to the increase of firm value. Managers must develop relationships, inspire stakeholders, and create communities to establish a company's reputation and image where everyone endeavored to provide the best for enterprise value enhancement. The results of this study indicated that profitability increases firm value. Firms improve profitability and firm value is an investment for the company for sustainability and growth and is not seen as a cost center but as a means of gaining profit. Investors can make that a reference to consider the company to increase firm value as part of which is taken into account in making investment decisions with due attention to the sustainability of the company's business.

Suggestions that can be proposed in this research include 1) for the company should be careful in taking financial policy. Financial policy should be based on the results of financial ratio analysis that can be taken into consideration for investors so that in deciding the investment will benefit. Companies need to do the following to improve the profitability and value of the company, among others, to manage the funding resources optimally by doing cost efficiency to increase profit, maintain firm value by increasing sales in order to increase company growth; 2) For subsequent researchers and academics, this research still needs to be followed up by the next researcher to get better result of research from previous research among others research variables should be added with other research variables that can affect firm value for example macro variable like exchange rate, inflation, and others.

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