Debt Ratio, Debt to Equity Ratio, Net Profit Margin and Return Effects on Stock Price Assets

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Keywords: debt ratio, debt to equity ratio, net profit margin and return on assets to stock prices.

Abstrak: The aims of this study are to determine the effect of debt ratio, debt to equity ratio, net profit margin and return on assets to stock prices. The results of the partial coefficient of debt ratio, debt to equity ratio, net profit margin, and return on assets on stock prices were 10.27%, -32.7%, 22.27%, and -41%, respectively. Meanwhile, the coefficient of determination of the debt ratio, debt to equity ratio, net profit margin and return on assets to stock prices was 60.3%. Simultaneously, the debt ratio, debt to equity ratio, net profit margin and return on assets have a significant effect on stock prices.

1 INTRODUCTION

In today's economy, competition in the business world, especially in the consumer goods industry, is increasingly competitive. Every company is required to maintain, develop and improve company standards in order to achieve the company's vision and mission. The consumer goods industry sector is one of the sectors that investors are interested in as a long-term investment. The share price is one of the indicators of a company's success, which is indicated by market strength and the occurrence of trading transactions of the company's shares in the capital market. The share price reflects the value of a company. If the company achieves good performance, the company's shares will be of great interest to investors.

According to Fahmi (2014), the debt ratio is a measure of how much a company is financed by debt. The use of debt that is too high will endanger the company because it will fall into the category of extreme leverage, in which the company is trapped in a high level of debt and it is difficult to release the debt burden. The importance of financial ratio for predicting stock price trends was an important, debatable issue (Lewellen, 2002).

According to Siegel and Shim in (Fahmi, 2015), the debt to equity ratio is used as a measure in analyzing financial statements to show the amount of collateral available to creditors. Debt to Equity Ratio is a ratio used to assess debt to equity. This ratio comparases all debt including current money with all equity, knowing the amount of funds provided by the creditor and the owner of the company. This ratio serves to find out any own capital used as collateral for debt. For creditors the greater the ratio is the more unprofitable because the greater the risk borne by failures that may occur in the company. The bigger the ratio, in contrast to the low ratio, the higher the level of funding provided by the owner and the greater the seurity limit for the borroweer in the event of loss or depreciation of the value of assets. This ratio also provides general guidance on the financial viability and risk of the company. Debt to equity ratio for each company diffrent, depending on the business characteristics and diversity of cash. Companies with stable cash flow usually have a higher ratio than the less stable cash ratio (Hapsoro and Husain, 2019)

According to Wahyudiono (2014), when a company has a high profit margin, it usually has a better competitive advantage. Companies with high net profit margins will automatically have the ability to protect themselves during difficult times. On the other hand, companies with low margins tend to keep going down. Profit margin with competitive profit level will be able to help the company and have a market niche even in difficult times. Net profit margin measures how much profit out of each sales dollar is left after all expenses are subtracted that is, after all operating expenses, interest, and income tax are subtracted (Andrews,2007)

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According to Pandia (2012), a bank must have the ability to measure management's ability to gain overall benefits. The greater the ROA of a bank, the greater the level of profit and the better the position of the bank in terms of asset use. High return on assets indicates how well the assets are managed by the companies to bring profit for each one dollar of asset that has been invested to the company (Gut et al.2011). Return on assets is one of profitability ratios. In the analysis of financial statements, this ratio is most often highlighted, because it is able to indicate company succes to create profits. ROA is able to measure the company ability to generate profits in the past to then be projected in the future.

2 RESEARCH METHODS

In this research, the method used is quantitative (Sugiyono 2013) with descriptive statistics. The sampling technique used was purposive sampling. The population seen in the study is 37 consumer goods industry companies listed on the Indonesia Stock Exchange for the period 2012-2017. Types and sources of data used come from secondary sources.

According to Sugiyono (2013), secondary data sources are data sources that are not directly processed by data collectors, for example through other people or through documents. Secondary data used comes from financial reports, journals or company annual reports obtained from *www.idx.co.id.*

3 RESEARCH RESULTS AND DISCUSSION

3.1 Descriptive Statisctics

Based on the result of the analysis of statistical description, it follows in table 1 shown the characteristics of the sample used in this study include: number of samples (N), sample mean, maximum value for each variable

Table 1: Descriptive Statistic Test.

Variabel	N	Minimum	Maximum	Mean
DR	90	,07132	,75178	,3676046
DER	90	,15018	171,40450	3,5477355
NPM	90	,01982	,39002	,1199222
ROA	90	,02969	,65720	,1525569
Stock Prie	90	180	1200000	47546,44
Valid N	90			

Sources: Processed Secondary data.

Table 1 above shows that the number of observation in the Consumer Goods in Indonesia stock exchange 2012-2017 period in this study is 90 sample. The lowest(minimum) of stock price is 180 and the highest (maximum) of stock price is 120000000.

Variabel Debt ratio has the smallest value (minimum) of 0,07132 and the largest (maximum)0,75178.

3.2 Normality Test

Normality test aims to obtain a regression model and confounding or residual variables. The normality test is used to test whether the data is normally distributed or not. The following is a test of the results of data normality in the form of a histogram graphic in Figure 1.

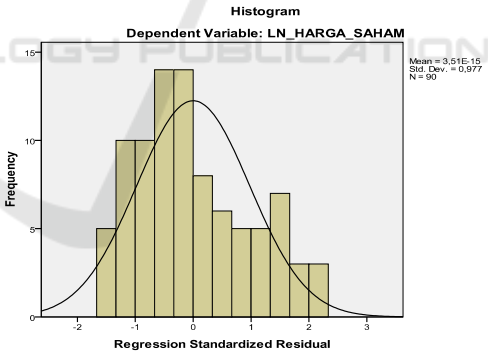

Figure 1: Normality Test.

Sources: Processed Secondary data.

Based on Figure 1 Graphical display is data that has normal distribution. The histogram graph shows that the data is symmetrical or not tilted to the right and left.

Normality test data statistical analysis can be done using Kolmogorov – smirrnov. In multivariate data normality test performed on residual value . The data indicated normal distribution with significant value above 0,05(Ghozali,2006). The data shown in table 2 below:

Table 2: On-Sample Kolmogorov Smirnov Test.

	Untandardized Residual
N	90
Normal Parameters Mean	,0000000
Std. Deviation	1,45403293
Most Exxtreme Differences Absolute	,105
Positive	,105
Negative	-,075
Kolmogorov – Smirnovz	,991
Asymp. Sig(2-tailed)	,279

Based on the result in table 2 above, from the result of the second test, it shows that the data was normally distributed. This is indicated by the test Kolmogorov – smirrnov showed result that significance level of 0,279 which is far above 0,05.

3.3 Multicolinearity Test

Multicolinearity test aims to test whether the regression model shows a correlation relationship between independent variables (independent). A good regression model should not have a correlation between the independent variables. If the independent variables correlate with each other, then the independent variable which has a correlation value between independent variables is equal to zero. To determine the absence of multicolinearity, it can be seen from the Variance Inflation Factor (VIF) value and the Tolerance value. With the criteria, if the Variance Inflation Factor (VIF) value is <0.10 then there is no multicollinearity, but if the VIF value> 10 then there is multicollinearity. Tolerance> 0.1 means there is no multicollinearity and vice versa.

Table 3: Multicolinearity Test.

Variables	Tolerance	VIF
Debt Ratio	0,747	1,338
Debt to Equity	0,810	1,234
Net Profit Margin	0,189	5,285
Return On Asset	0,209	4,774

Sources: Processed Secondary data.

Based on Table 3, the following conclusions can be drawn: (i) debt ratio with a tolerance value of 0.747 greater than 0.10 and a VIF value of 1,338 less than 10. (ii) debt to equity ratio with a tolerance value of 0.810 greater than 0.10 and a VIF value of 1,234 less than 10. (iii) net profit margin with a tolerance value of 0.189 greater than 0.10 and a VIF value of 5,285 less than 10. (iv) return on assets with a tolerance value of 0.209 greater than 0.10 and a VIF value of 4,774 less than 10. (v) Because the tolerance value obtained by each variable is greater of 0.10 and the VIF value obtained for each variable is less than 10, the data for the variable debt ratio, debt to equity ratio, net profit margin and return on asset do not have multicollinearity.

3.4 Autocorrelation Test

The autocorrelation test aims to see whether in a linear model there is a correlation between confounding errors in period t with errors in period t-1 (previous). This value is used as a measure in determining the presence or absence of an autocorrelation problem.

Table 4: Durbin watson.

Durbin Watson
2,135

Sources: Processed Secondary data.

The results on table 4 the Durbin-Watson statistical value (d) = 2.135 and du = 1.7508, namely: 0 <1.7508 <2.135 <2.2492. DW value 2.135 which is greater than du 1.7508 and less than 4 - 1.7508 = 2.2492, it can be concluded that the Durbin Watson test does not have autocorrelation.

3.5 Coefficient of Determination(R^2)

The coeffiient od determination (R^2) essentially measures how far the ability of the model to explain variations in the dependent variable. R^2 value close to one means independent variables provit almost all the information needed to predict the variation of thw dependent variable (Ghozali,2006). The determination coefficient calculation result can beseen in Table 5 bellow :

Table 5: Determination Coeefficiebt (R^2).

R	R square	Adjusted R square	Std.Error of the Estimate	Durbin Watson
,603	,364	,334	1,48785	2,135

Sources : Processed Secondary data

The value of R square is 0.364, it mean 36.4% stock price variation can be explained by the variation of independent variable which are debt ratio, debt to equity ratio, net profit margin, and return on asset. On the other hand the rest of percentage whichis 63,6% will be explained by other variables outside the model research.

4 ANALYSIS RESULT

Analysis of the data used in this study is based on multiple linear regression equations to find the relationship or influence between the independent variable on the dependent variable Stock Price. The following are the results of multiple linear regression analysis which can be seen in Table 6.

Table 6: Multiple linear regression.

Variable	Unstandardized Coefficients		T	Sig
	B	Std.Error		
(Constant)	14,009	,883	15,862	,000
Debt ratio	*1,027*	*,399*	*2,576*	*,012*
Debt to Equity Ratio	*-,327*	*,169*	*-1,936*	*,056*
Net Profit Margin	*2,227*	*,558*	*3,992*	*,000*
Return On Asset	*-,410*	*,508*	*-,806*	*,442*

Sources : Processed Secondary data.

The result on Table 6 multiple linear regression equation as follow:

LN_HARGA SAHAM = 14,009 + 1,027 Debt Ratio – 0,327 Debt to Equity Ratio + 2,227 Net Profit Margin – 0,410 Return On Asset

The regression equation above has the following meanings: (i) The debt ratio regression coefficient of was 1.027(ii) The debt to equity ratio regression coefficient of was -0,327 (iii) The net profit margin regression coefficient of was 2,227 (iv) The return on asset regression coefficient of was -0,410. (v) The constant value of 14,009 shows that if the variable value of Debt ratio, Debt to Equity Ratio, Net Profit Margin and Return On Asset is considered constant, then the value of the Share Price (Y).

4.1 Effect of Debt Ratio on Stock Prices

The hypothesis to be tested states that there is an effect of debt ratio on Stock Prices.

Tabel 7: debt ratio on stock prices.

Variabel Independen	**Koefisien Standar Error**	**T**	**Signifikan**
Debt Ratio	0,258	2,576	0,012
R= 0,33 R^2= 0,001 Estimasi Standar Error = 0,399 F= 12,172			
Variabel dependen Stock Price			

Sources : Processed Secondary data

From the test results in Table 7, it is found that the results of the debt ratio test on stock prices have a positive and significant effect with the value of F = 12.172 at p <0.012 (strong relationship). This can be seen from the magnitude of R = 0.33, the R^2 value of 0.001, and the Estimated Standard Error of 0.399. The partial debit ratio has a t_{count} value of 2.576 and a t_{table} value at the confidence level of 95% (significant 5% or 0.005) with a degree of freedom (df) of 1.99394 so that tcount = 2.576> ttable = 1.98793 and a significant value of 0.012 <0 , 05. These results indicate that HO is rejected and Ha is accepted, which means that partially the debt ratio has a significant effect on stock prices.

4.2 Effect of Debt to Equity Ratio on Stock Prices

The hypothesis to be tested states that there is an effect of debt to equity ratio on stock prices.

Table 8: Debt to equity ratio on stock prices.

Variabel Independen	Koefisien Standar Error	t	Signifikan
Debt to equity ratio	1,83252	-1,936	0,056
R= 0,38 R^2= 0,001 Estimasi Standar Error = -0,186 F= 12,172			
Variabel dependen Stock Price			

Sources: Processed Secondary data

From the test results in Table 8 it is found that the test results of the debt to equity ratio on stock prices have no effect and are significantly positive with a value of F = 12.172 at p <0.056 (weak relationship). This can also be seen from the magnitude of R = 0.38, the value of R^2 = 0.001, and the standard error estimate of -0.186. The Debt to Equity Ratio partially has a t_{count} value of -1.936 and a t_{table} value of 1.98793 so that $t_{count} < t_{table}$ with a significant value of 0.056> 0.05. These results indicate that Ha is rejected and Ho is accepted, which means that partially the Debt to Equity Ratio has no effect on stock prices.

4.3 Effect of Net Profit Margin on Stock Prices

The hypothesis to be tested states that there is an effect of net profit margin on stock prices

Table 9: Net Profit Margin on stock prices.

Variabel Independen	Koefisien Standar Error	t	Signifikan
Net Profit Margin	0,794	3,992	0,000
R= 0,553 R^2= 0,306 Estimasi Standar Error = 0,558 F = 12,172 pada p < 0,000			
Variabel dependen Stock Price			

Sources: Processed Secondary data.

From the test results in Table 9 it is found that the test results of the net profit margin on stock prices have a positive and significant effect with the value of F = 12.172 at p <0.000 (strong relationship). This can be seen from the magnitude of R = 0.553, the value of R^2 = 0.306, and the Estimated Standard error of 0.558. Partially, Net Profit Margin has a t_{count} value of 3.992 and a t_{table} value of 1.98793 so that $t_{count} > t_{table}$ with a significant value of 0.000 <0.05. These results indicate that Ha is rejected and Ho is accepted, which means that partially the Net Profit Margin affects the stock price.

4.4 Effect of Return on Assets on Stock Prices

The hypothesis to be tested states that there is an effect of return on asset on stock prices

Table 10: return on asset on stock prices.

Variabel Independen	Koefisien Standar Error	T	Signifikan
Return on asset	-0,152	-0,806	0,422
R= 0,482 R^2= 0,233 Estimasi Standar Error = 0,169 F = 12,172 pada p < 0,508			
Variabel dependen: Stock Price			

Sources : Processed Secondary data.

From the test results in table 10, it is found that the test results of the net profit margin on stock prices have a positive and significant effect with the value of F = 12.172 at p <0.000 (strong relationship). This can be seen from the magnitude of R = 0.553, the value of R^2 = 0.306, and the Estimated Standard error of 0.558. Partially, Net Profit Margin has a t_{count} value of 3.992 and a t_{table} value of 1.98793 so that $t_{count} > t_{table}$ with a significant value of 0.000 <0.05. These results indicate that Ha is rejected and Ho is accepted, which means that partially the Net Profit Margin affects the stock price.

4.5 Simultaneous Test Result (Test F)

Simultaneous hypothesis testing or the F test is carried out to test how the influence between independent variables together on the dependent or dependent variable

Table 11: Test F.

Variabel Independen	Estimasi Standar Error	F	Signifikan
Regression_Residual	1,48785	12,172	0,000
R= 0,603 R^2= 0,364 Estimasi Standar Error = 1,48785 F = 12,172 pada p < 0,000			
Predictors : (Constant) Debt ratio, debt to equity ratio , net profit margin, return on assets			
Dependent Variable: Stock Price			

Sources : Processed Secondary data.

From the test results in table 10, It was found that the value of F_{count} was 12,172> F_{table} value, namely df = (n-k-1) = 2.48 with a significant value of 0.000 <0.05. This can be seen from the magnitude of R = 0.603 and the Estimated Standard error of 1.48785. From these results it can be concluded that Ho is rejected and Ha is accepted, meaning that together all independent variables consisting of debt to asset ratio, debt to equity ratio, net profit margin and return on assets simultaneously have a significant effect on stock prices.

5 CONCLUSIONS

Based on the results of research in the previous chapter, the conclusions that can be obtained from this study are: (i) Partially debt ratio and Net Profit Margin have a significant positive effect on prices (ii) Debt to Equity Ratio and Return on Assets partially have no significant positive effect to stock prices, (iii) Debt to Equity Ratio, Net Profit Margin, Return On Asset simultaneously have a significant effect on stock prices in Goods Industrial Companies.

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