

THE EFFECT OF RETAINED EARNINGS ON TRADING VOLUME ACTIVITY (TVA) WITH RETURN ON ASSETS AS A MODERATION VARIABLE

Pristin Prima Sari^{1*}, Ardian Prima Putra², Risal Rinofah³

^{1,3}Universitas Sarjanawiyata Tamansiswa

² Universitas Veteran Bangun Nusantara

ABSTRACT

Trading Volume Activity (TVA) indicates the amount of stock trading volume in a company's stock market. Companies with good stock volume and financial performance can increase stock trading volume. The research aims to empirically examine the effect of retained earnings on Trading Volume Activity (TVA) with Return On Assets (ROA) as a moderating variable. The study uses data from the 2018-2020 financial statements of companies in the consumption and construction services sector listed on IDX and analyzed using moderation regression analysis. The results show that the variable retained earnings is simultaneously significant to Trading Volume Activity (TVA) with Return On Assets (ROA) as a moderating variable. Partially retained earnings can significantly influence Trading Volume Activity (TVA), while ROA can moderate the retained earnings variable on Trading Volume Activity (TVA). The research contributes that companies can increase the amount of retained earnings and increase ROA so that trading volume can be increased. The more companies trade, the value-added received will increase.

Keywords : Return on Asset; retained earning; Trading Volume Activity

Correspondence to : pristin.primas@ustjogja.ac.id

ABSTRAK

Trading Volume Activity (TVA) mengindikasikan sebagai banyaknya volume perdagangan saham di pasar saham dari sebuah perusahaan. Perusahaan dengan volume saham dan performa keuangan yang baik akan mampu meningkatkan volume perdagangan saham. Penelitian bertujuan untuk menguji secara empiris pengaruh faktor laba ditahan terhadap Trading Volume Activity (TVA) dengan Return On Asset (ROA) sebagai variabel Moderasi. Penelitian menggunakan data laporan keuangan 2018-2020 perusahaan sektor jasa konsumsi dan konstruksi yang terdaftar pada IDX dan dianalisis menggunakan analisis regresi moderasi. Hasil menunjukkan bahwa secara simultan variabel laba ditahan signifikan terhadap Trading Volume Activity (TVA) dengan Return On Asset (ROA) sebagai variabel moderasi. Secara parsial laba ditahan mampu mempengaruhi signifikan Trading Volume Activity (TVA) Sedangkan ROA mampu memoderasi variabel laba ditahan terhadap Trading Volume Activity (TVA). Kontribusi penelitian bahwa perusahaan dapat meningkatkan besarnya laba ditahan dan meningkatkan ROA sehingga volume perdagangan dapat ditingkatkan. Semakin banyak perusahaan melakukan perdagangan value added yang diterima akan semakin meningkat.

Kata kunci : Return on Asset, Saldo Laba; *Trading Volume Activity*

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INTRODUCTION

Volume Trading activity (TVA) indicates the number of shares traded on the Stock Exchange. The number of stock trades becomes a benchmark for the market's assessment of the firm's value. If the firm's stock is good and performs well, the volume of stock trading increases. TVA also shows the liquidity of stocks circulating in the market means that more liquid stocks will be more investors looking for these stocks so that stock prices move actively in stock exchange trading. Factors affecting the TVA include retained earnings (Wicaksono, 2014) and return on assets (Saputra, 2018). Retained earnings reflect earnings that cannot be divided as dividends to shareholders. Retained earnings can be allocated to the company's future operations. Retained earnings are of concerning to investors in response to stock trading movements. Investors like the good news from the management company so that investors provide positive feedback assessment of the company on the new information. The investor's response was in the form of an increase in the volume of stock trading on the Stock Exchange. For this reason, the volume of stock trading is the concern of company management in assessing stock market performance.

Return On Assets is also a benchmark for determining the amount of stock trading volume on the Stock Exchange. Companies that obtain high ROA tend to get a positive response from the market so that volume rises. Trading volume can determine the magnitude of market capitalization. The larger the market capitalization, the higher the TVA (Camilleri & Galea, 2019).

The benefit of calculating trading volume is to determine the level of stock activity in the capital market. Company managers can determine the level of liveliness to drive the stock market. (Radermacher Jan & Zhou, 2013) said that trading volume is being a benchmark for the response of information circulating in the capital market, financial information is more vulnerable to investor response than political information. The reason investors increase that stock trading volume is to balance the stock portfolio when new information, testing use intrinsic value analysis and random walk theory (Atiase et al., 2011).

Consumer goods sector and construction have good issue for investor because this sector is important for investor and society in long life. Profit balance have impact on value for Consumer Goods Sector (Hermuningsih S et al., 2022), so that it can impact on trading volume. Retained earning have impact on construction sector during 2018-2021

especially on funding (Hermuningsih et al., 2022), so that it is important to gain information the impact retained earning for trading volume in construction sector.

Based on the importance of related research Trading Volume Activity and retained earnings, this study takes the title of the effect of retained earnings on Trading Volume Activity (TVA) with ROA as the moderation variable.

Trading Volume Activity (Padungsaksawasdi et al., 2019) found that trading volume activity was a proxy for investor attention. Trading volume activity is significantly related to stock returns and volatility. Investors overreact to a developed stock market rather than a growing stock market. (Wibawa & Suryantini, 2019) found that there was an abnormal return difference in the trading volume of shares in the right issue. (Merthadiyanti Luh & Yasa, 2019) say that TVA tends to increase along with the low stock price when stock split.

$$TVA = \frac{\text{Total Trading Volume}}{\text{Stock Share}}$$

(Merthadiyanti Luh & Yasa, 2019)

Ratio Return On Asset (ROA) is ratio of profitability. Profitability analysis is an analysis that measures the level of profit or profit of the company. Profitability analysis is also a measure of the rate of return or return received by the company from the business and investments carried out.

$$ROA = \frac{\text{Net Profit}}{\text{Total Asset}}$$

(Hermuningsih S et al., 2022)

Retained earnings are profits that are reallocated to the company. Retained earnings are a measure of how much the pay-out ratio to shareholders is. If the company's payments are large, then the company's value increases, as well as the hope of growing in the company is also in retained earnings. Increasing retained earnings means the company has a chance to grow in the future.

$$\text{Retained Earning Ratio} = \frac{\text{Retained Earning}}{\text{Total Aset}}$$

(Hermuningsih S et al., 2022)

The Effect of Retained Earnings on Trading Volume Activity

Retained earnings reflect earnings not distributed to shareholders. The greater the retained earnings, the more likely it is that the number of trading volumes is decreasing. Retained earning

have significant impact on trading volume stock (Wicaksono, 2014). The Company's reinvestment in retained earnings relies on a positive dividend payout ratio. A research found that there was significant different between Retained earning and trading volume activity after dividend announcement (Sulastri, 2018), it confirmed that retained earning also have impact on trading volume of stock. Thus, the research hypothesis is :

H1 Retained earnings have a significant positive effect on Trading Volume Activity

The Influence of Return On Asset on Trading Volume Activity

Return On Asset (ROA) is the rate of return on assets. The greater the ROA indicates an increase in TVA. However, there are differences in the results that (Saputra, 2018) found that ROA cannot affect TVA. Thus, the research hypothesis is :

H2 Return On Asset Significantly Positive Effect on Trading Volume Activity

The Moderation Role Return On Asset In Effect of Retained Earnings on Trading Volume Activity

Return On Asset is a measure of financial performance called the profitability ratio. The higher the ratio of profitabilias, the significantly able to encourage retained earnings in increasing the number of stock trades (TVA). (Wibawa & Suryantini, 2019) found that there was an abnormal difference in return on stock trading volume in right issue. (Merthadiyanti Luh & Yasa, 2019) TVA tends to increase with the low current stock price stock split. Thus, the research hypothesis is :

H3 : Return On Asset was able to significantly moderate the effect of retained earnings on Trading Volume Activity

METHODS

The research uses quantitative method, meaning that the research uses numerical data and is processed using statistical analysis. Data is sourced from published quarterly financial statements from December 2018-December 2020. The sample were firms operating in the consumables and construction services sectors on the Indonesia Stock Exchange. The independent variable is Retained Earnings, the Moderating Variable is Return On Asset (ROA) and the

Dependent Variable is Trading Volume Activity (TVA). Test of Statistic Descriptive which is The data sought in this test are mean, median with percentile, standard deviation, maximum value, and minimum value per variable. Classical Assumption Test which is The classic assumption test in the research model is to meet the assumptions of Moderated Regression Analysis (MRA) with SPSS 20 software. The classical assumption test carried out is : (1) Normality test. Normality test : is to determined the residual data, the residual data normally distributed or not. Good data is normally distributed data, which can reduce the possibility of bias. (2) Heteroscedasticity test. This test is carried out to find out whether in the regression model on the residual factor there are the same variants. A good regression model is heteroscedasticity.(3) Autocorrelation test. This test is carried out to determine whether there is a correlation between observation members sorted by time and space. A good regression model is independent of autocorrelation. (4) Multicollinearity test, where the tolerance value test is > 0.10 and the VIF value is < 10, then the data is avoided from Multicollinearity between independent variables (Ghozali, 2012).

Data analysis method with Moderated Regression Analysis (MRA) with the following research model:

$$Y \text{ TVA} = \alpha + \beta_1 \text{ RE} + \beta_2 \text{ ROA} + \beta_3 \text{ REROA} + e$$

Notes:

RE = Retained Earning
 ROA = Return on Assets
 REROA = Retained Earning*Return On Asset
 E = error

The research hypothesis was tested from the results of linear regression with robust check. This test uses the F test by looking at the probability value (p-value), where if the p-value of the test results is less than 0.05 (<0.05) then the hypothesis is accepted. If the p-value of the test results is more than 0.05 (>0.05) then the hypothesis is rejected.

RESULTS

Table 1. Descriptive Statistics

	Mean	Std. Deviation	N
TVA	19.2619	1.42860	45
ROA	.0670	.09665	45
RE	.2930	.18898	45
REROA	.0217	.04472	45

Source : SPSS (2022)

Table 1 shows that the statistical description of the research variables. The number of observation data was 45 from 5 manufacturing companies on the Indonesia Stock Exchange in December 2018 to December 2020 using quarterly financial report data. TVA average value of 19.26; ROA value of 6.7% and retained earnings of 29.3% and interaction of retained earnings and ROA of 2.17%.

Table 2. One-Sample Kolmogorov-Smirnov Test

		Unstandardized Residual
N		45
Normal Parameters,a,b	Mean	.0000000
	Std. Deviation	1.33088954
	Absolute Differences	
	Positive	.077
	Negative	-.077
Statistical Test		.077
Asymp. Sig. (2-tailed)		.200c,d
a. Test distribution is Normal.		
b. Calculated from data.		
c. Lilliefors Significance Correction.		
d. This is a lower bound of the true significance.		

Source : SPSS (2022)

The K-S Kolmogorov-Smirnov test shows that the significance value of 0.200 means that the research data is normally distributed. Data are normally distributed if the K-S number is greater than 0,05.

Table 3. Correlations

		TVA	ROA	RE	REROA
Pearson Correlation	TVA	1.000	-.075	-.362	-.026
	ROA	-.075	1.000	.116	.812
	RE	-.362	.116	1.000	.453
	REROA	-.026	.812	.453	1.000
Sig. (1tailed)	TVA		.313	.007	.432
	ROA	.313		.224	.000
	RE	.007	.224		.001
	REROA	.432	.000	.001	
N	TVA	45	45	45	45
	ROA	45	45	45	45
	RE	45	45	45	45
	REROA	45	45	45	45

Source : SPSS (2022)

Table 3 shows the significant results of the autocorrelation test that all variables did not occur correlation.

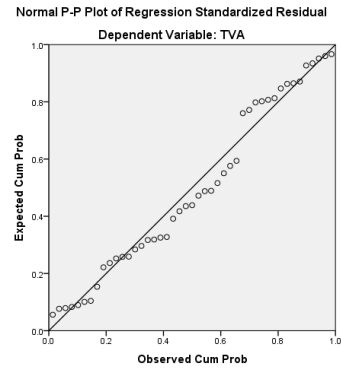


Figure 1.

Diagonal Line of Normally Distributed

Figure 1 shows that the TVA is along a diagonal line thus showing normally distributed data. Data are normally distributed if the data is on a diagonal line (Santosa, 2011)

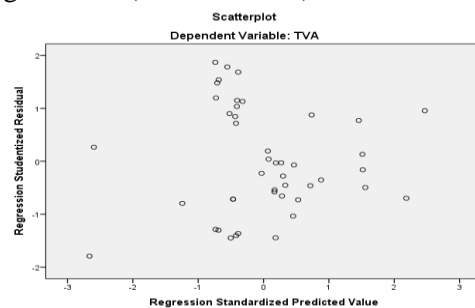


Figure 2

Heteroscedasticity

Figure 2 shows that the heteroscedasticity data that scatterplots spread do not converge, thus indicating that the data avoids homoscedasticity. Heteroscedasticity data is if scatterplot points move irregularly (Santosa, 2011).

Table 4. Durbin-Watson test

Durbin-Watson	Criteria	Description
2,364	-2 to 2	Received

Source : SPSS (2022)

Based on Table 4 of Durbin Watson test, the number is 2,364.

Table 5. Collinierity test

Collinierity Statistics			
Variable	Tolerance	VIF	Description
ROA	261	3,837	Received
RE	608	1,645	Received
REROA	210	4,765	Received

Source : SPSS (2022)

Based on Table 5 Collinierity test of VIF value and Tolerance Value then ROA, RE and REROA results show acceptable numbers.

Table 6. ANOVA

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	23,262	3	7,754	4,77	.006
	Residual	66,538	41	1,623		
	Total	89,800	44			

a. Dependent Variable: TVA

b. Predictors: (Constant), REROA, RE, ROA

Source : SPSS (2022)

Table 6 Test F shows that the results of independent variables from the interaction of retained earnings and ROA (REROA), retained earnings (RE), Return On Asset (ROA) simultaneously significant to TVA with a p-value of 0.006 is smaller than 0.05, so it is significant at the level of 5%. F value of 4.778 means that every REROA, retained earnings (RE), Return on Assets (ROA) increase by 1 unit then increase TVA by 4.778 units. The amount of retained earnings (RE), ROA profitability and REROA interaction variables are getting bigger, increasing TVA.

Table 7. Determination Coefficient Test

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.509a	.259	.205	1.27392

Source : SPSS (2022)

Table 7 Determination Coefficient Test shows that the adjusted R square value of 0.205 means that the interaction variable (REROA), retained earnings (RE), Return On Asset (ROA) can affect TVA by 20.5% while the remaining 79.5% is influenced by other variables outside the research model.

Table 8. t test

Model	Unstandardized Coefficients		Standardized Coefficients		t	Sig.
	B	Std. Error	Beta	t		
1	Constant	20,768	448		46,38	.000
	ROA	-9,338	3,892	-.632	2,399	.021
	RE	-4,847	1,303	-.641	-3,719	.001
	REROA	24,841	9,374	.778	2,650	.011

Source : SPSS (2022)

Table 8 The t-test shows that Return on Assets (ROA) partially has a significant effect on Trading Volume Activity (TVA) with a significance value of 0.021 smaller than 0.05, meaning a significant 5%. The t value of -2.339 and beta standardize of -0.632 means that ROA can affect TVA significantly negatively, meaning that the ROA value narrows TVA.

Retained Earnings (RE) partially significantly affects TVA with a significance value of 0.001 smaller than 0.05, meaning that it is significant at the level of 5%. The t value of -2.339 and beta standardize of -0.632 means that ROA can affect TVA significantly negatively, meaning that the value of retained earnings can shrink TVA. The market responded negatively to the acquisition of retained earnings, impacting a decrease in TVA.

REROA as Moderation Role so that REROA is an interaction variable of Retained Earnings (RE) and Moderation Variable (ROA) which shows that partially REROA has a significant effect on TVA with a significance value of 0.011 smaller than 0.05, meaning that it is significant at the level of 5%.

DISCUSSION

The Effect of retained earnings on trading volume activity

Retained earnings are able to significantly affect Trading Volume Activity. (Ball et al., 2020) found that retained earnings there was a market able to predict return. Because book value is an intrinsic value. (Hidayat et al., 2018) trading volume activity affects stock return. Thus, H1 is accepted.

The Influence of Return on Assets on Trading Volume Activity

Return On Asset significantly affects Trading Volume Activity. The results of the study are in line with previous study that the positive response of trading volume to ROA achievement (Saputra, 2018). The ROA yield is higher then increasing the number of shares purchased on the capital market. If the company's performance is good, the number of stock trades also increases. High stock prices informed larger stock trading volumes (Chan et al., 2017). Return has a positive effect on the trading volume of undervalue performing stocks (Han et al., 2022) . Thus, H2 is accepted.

The Moderating Role of Return on Assets in the Effect of with retained earning on Trading Volume Activity

Return on Asset is able to be significant as a moderating variable in the effect of retained earnings on trading volume activity. This result is in line with the research of other study that profitability is a determinant of stock turnover liquidity on the Stock Exchange, but also finds that Investors on Tehran Exchange are not significant in stock turnover liquidity which determines dividend payments (Seyedkhhosroshahi et al., 2013). This explains that profitability is able to drive stock liquidity which can be called trading volume. Dividend payments or the reversal of retained earnings are not the main factors in stock buying and selling liquidity, which can be called trading volume. Others also stated that The factors that determine significant on TVA trading volume are dividend yield, positive returns, and negative returns (Zahoor et al., 2017) . Thus, H3 is accepted.

CONCLUSION

The t test shows that Return on Assets (ROA), Retained Earnings (RE) significantly affects Trading Volume Activity (TVA). Return on Assets (ROA) significantly moderates retained earnings affecting Trading Volume Activity (TVA). The results of the study contributed to the suggestion that the company could consider the amount of retained earnings and ROA to increase the volume of stock trading.

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