

# Return on Equity, Cash Ratio & Debt Equity Ratio Affect Stock Returns in the Banking Industry Listed on the IDX With Non-Performing Loans as a Moderating Variable

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## ABSTRACT

This study aims to determine the effect of return on equity, cash ratio and debt to equity ratio on stock returns in the banking industry listed on the IDX with non-performing loans as a moderating variable. The research design used is the simple design method. The population used in this study are banking companies listed on the Indonesia stock exchange for the 2016-2021 period, with a total sample of 26 companies using 156 data samples. The data analysis technique used is panel data analysis using the e-views program. The results of the study show that Return on equity has a positive and insignificant effect on stock returns, Cash ratio has a negative and significant effect on stock returns, Debt to equity ratio has a positive and insignificant effect on Return, Non-performing loans cannot moderate the effect of return on equity on returns stocks, non-performing loans cannot moderate the effect of cash ratio on stock returns and non-performing loans cannot moderate the effect of debt to equity ratio on stock returns.

**Keywords:** *Return on Equity, Cash Ratio and Debt to Equity Ratio, Stock Return, Non-Performing Loan*

## INTRODUCTION

Competition in today's business world is increasingly competitive and tighter. In these companies, survival and development opportunities are greatly influenced by the

availability of funds and access to sources of funds. One source of external funding for companies in the capital market. The capital market allows companies to compete fairly to attract investors to invest in their companies (Antari et al., 2020). The capital market is a means between parties with excess funds and those who need funds with the same hope of obtaining profits (Hendayana & Nurlina, 2020).

Investors (investors) generally make observations and evaluate the companies to be selected by monitoring the financial statements of these companies, especially companies that have gone public (Maisy et al., 2022). Through these financial reports, the company's performance in carrying out business activities and ability to utilise its business activities efficiently and effectively, as well as factors outside the company are economic, political, financial and others (Andari & Bakhtiar, 2019).

Many factors influence stock returns, such as internal factors (related to banking performance) or external factors, such as economic conditions and state policies (Yudistira & Adiputra, 2020). The results of research conducted by Sunaryo (2020) gave the result that stock returns are influenced by the capital adequacy ratio (CAR) as a proxy for capital capability and return on equity (ROE) as a proxy for profitability. Then Astohar et al.'s research. (2021) gave

the result that stock returns are influenced by the capital adequacy ratio (CAR), return on equity (ROE) and loan-to-deposit ratio (LDR). Andriani & Winedar's research (2020) gives the result that stock returns are influenced by the Current Ratio (CuR), Cash Ratio (CaS), Total Debt to Total Assets Ratio (DAR), Debt to Equity Ratio (DER), Return on Investment (ROI), Return on Assets (ROA), Fixed Assets Turnover (FATO), and Total Assets Turnover (TATO). Surono & Hadinata's research (2020) gives the result that stock returns are influenced by the Cash Ratio (CaS), Debt to Equity Ratio (DER), and Return on Assets (ROA). Moreover, Non-Performing Loan (NPL) is a moderating variable (Maulida & Wahyuningsih, 2021), (Sulaeman et al., 2018), (Firmansyah, 2022).

The factors selected in this study that can affect stock returns as independent variables are Return on equity (ROE), Cash Ratio (CaS), and Debt Equity Ratio (DER) as the dependent variable, and Non-Performing Loans (NPL) as a moderating variable.

Return on equity is a ratio that shows the profit that the shareholder will enjoy. ROE growth shows better prospects for the company because it means there is a potential for increased profits. Investors capture this as a positive signal from the company to increase investor confidence and make it easier for company management to attract capital in the form of shares (Trihatmoko, 2022).

Cash Ratio (CaS) is a liquidity ratio to measure a company's ability to meet short-term obligations. Bank liquidity is a bank's ability to pay all its short-term debts with liquid assets under control (Villy & Nuryasman, 2019). The ability to provide sufficient funds to fulfil all its obligations and commitments to its customers at any time. A high level of liquidity indicates that the company can fulfil its short-term obligations well. In contrast, low liquidity indicates that the company cannot properly fulfil its short-term obligations (Doni et al., 2022).

Debt to Equity Ratio (DER) is used to assess debt to equity. This ratio is useful for knowing how much capital is used to cover company debt (Precilia & Triyonowati, 2020). The smaller this ratio, the better. The smaller the portion of the debt to capital, the safer it is (Luthfiah & Suherman, 2018).

Banks face credit risk because they channel funds through loans to the public. Due to various reasons, the debtor may not fulfil his obligations to the bank, such as repaying the loan principal, paying interest, etc. Non-fulfilment of the customer's obligations to the bank causes the bank to suffer losses in not receiving previously expected receipts. One type of credit risk that is often discussed is Non-Performing Loans (NPL). Many Non-Performing Loans (NPL) impact the bank concerned and expand nationally if it cannot be handled properly (Putriyani, 2021).

Non-Performing Loan (NPL) is a ratio used to measure a bank's ability to refute the risk of default on credit repayments by debtors. To mitigate risks resulting from debtors' failure to pay their obligations due to the Covid-19 Pandemic, the Government has issued various stimuli to banking companies and debtors so that they do not collapse and disrupt economic stability (Wahyu, 2020).

This factor is also evidenced by the magnitude of the phenomenon caused by the variables Return on equity (ROE), Cash Ratio (CaS), Debt Equity Ratio (DER) and Non-Performing Loans (NPL) on the return of shares of companies in the banking sector listed on the IDX for the period 2016- 2021, which can be seen in table 1.

Table 1. shows that of the 10 banking companies in Indonesia in 2019 and 2020, there tends to be a decline in the ratios of ROE, CR, DER, Stock Return and NPL. This was caused by the Covid-19 pandemic, which caused the economy to decline, resulting in increased corporate debt and bad loans. Banking companies experienced difficulties during the Covid-19 pandemic due to limited company activities. Several previous researchers have researched ROE, CaS, DER, and NPL, including Hikmah et

al. (2022), Nurhikmawaty et al. (2020), Alfiah & Lubis (2021) stated that ROE has a positive effect on stock returns. The research conducted by Ho & Wage (2022), Andriani & Winedar (2020), and Surono & Hadinata (2020) states that CaS has a positive effect on stock returns. Research conducted by Andriani & Winedar (2020) and Surono & Hadinata (2020) states that DER negatively affects stock returns. The research conducted by Ho & Wage (2022) and Kerim et al. (2022) states that NPL affects stock returns.

**Table 1. List of ROE, CR, DER, NPL Ratio Values, and Share Returns at Commercial Banks Registered on the IDX for the 2016-2021**

Bank Name	Year	ROE (%)	CR (%)	DER (%)	NPL (%)	Return Saham (%)
BCA	2017	19,2	0,13	4,71	1,5	0,41
	2018	18,8	0,15	4,44	1,4	0,19
	2019	18,0	0,15	4,28	1,3	0,29
	2020	16,5	0,12	4,82	1,8	0,01
	2021	18,3	0,17	5,06	2,2	0,08
BNI	2017	15,6	0,16	5,79	0,7	0,79
	2018	16,1	0,15	6,08	0,8	-0,11
	2019	14,0	0,12	5,51	1,2	-0,11
	2020	2,9	0,17	6,61	0,9	-0,21
	2021	10,4	0,21	6,63	0,7	0,09
BRI	2017	20,03	0,19	5,71	0,88	0,56
	2018	20,49	0,19	5,60	0,92	0,01
	2019	19,41	0,20	5,67	1,04	0,20
	2020	11,05	0,12	6,02	0,80	-0,05
	2021	16,87	0,11	4,75	0,70	-0,01
BTN	2017	8,2	0,19	4,74	0,4	1,05
	2018	11,6	0,25	4,54	0,5	-0,29
	2019	9,9	0,13	4,77	2,5	-0,16
	2020	6,1	0,17	4,56	3,1	0,47
	2021	8,6	0,20	4,31	3,0	-0,16
DANAMON	2017	10,5	0,11	3,55	2,8	0,88
	2018	10,6	0,13	3,45	2,7	0,08
	2019	11,6	0,09	3,26	3,0	-0,48
	2020	2,6	0,11	3,61	2,8	-0,19
	2021	4,1	0,12	3,26	2,7	-0,26
MANDIRI	2017	14,53	0,18	5,22	1,06	-0,31
	2018	16,23	0,13	5,09	0,67	-0,08
	2019	15,08	0,12	4,81	0,84	0,04
	2020	9,36	0,17	5,79	0,43	-0,18
	2021	16,24	0,15	5,97	0,41	0,11
MAYAPADA	2017	10,64	0,18	5,57	4,20	0,22
	2018	5,75	0,16	7,06	3,26	0,82
	2019	5,92	0,11	6,57	1,63	0,29
	2020	0,58	0,13	6,16	1,60	-0,16
	2021	0,35	0,15	7,52	2,17	-0,91
MEGA	2017	11,66	0,25	5,30	2,01	0,43
	2018	13,76	0,11	5,08	1,60	0,47
	2019	14,85	0,16	5,49	2,46	0,29
	2020	19,42	0,08	5,16	1,39	0,13
	2021	23,49	0,15	5,49	1,12	0,18
MESTIKA	2017	9,55	0,11	2,83	7,08	0,11
	2018	9,01	0,12	2,92	6,41	0,003
	2019	7,50	0,11	2,71	0,63	1,03
	2020	9,35	0,06	2,53	0,75	0,45
	2021	12,50	0,08	2,73	0,34	0,29
NIAGA	2017	8,73	0,15	6,20	2,16	0,59
	2018	9,49	0,12	5,74	1,56	-0,32
	2019	9,03	0,14	5,33	1,30	0,05
	2020	5,33	0,12	5,84	1,40	0,03
	2021	10,44	0,18	6,16	1,17	-0,03

Source: <https://www.idx.co.id/> (2022)

There is one thing that distinguishes this research from previous studies that the researchers have described in the previous paragraph, that is, as an added value in this study, the researchers used three independent variables, namely Return on Equity (ROE), Cash Ratio (CaS) and Debt to Equity Ratio (DER). And stock returns as the dependent variable, and non-performing loans as the moderating variable. This research needs to be examined further because it relates to the phenomena that occur in the current condition of the banking sub-sector. Namely, in 2019 and 2020, many companies experienced decreased ratios due to increased debt. The entry of the Covid-19 pandemic resulted in banks having difficulties in billing loans where many debtors are unable to repay their obligations, and the Covid-19 pandemic has resulted in many customers saving funds. However, banks lack capital due to the inability to suppress NPLs. Also, banks are intermediary institutions with a high risk. They must be minimised so that they do not have a systemic effect because potential investors still buy shares without looking at stock returns.

## LITERATURE REVIEW

### Stock Returns

The capital market can be interpreted as a vehicle that brings together parties who need funds with those who provide funds under the rules set by institutions and professions related to securities. Investors must realise that they will also experience losses while making a profit. Investors' goal is to get the maximum return at minimal risk. In addition, investors will, of course, also choose which company's stock will provide a high return. In buying and selling shares, the profits from investing in shares are called capital gains (Dewi & Fajri, 2020).

Stock prices that have decreased will certainly have implications for the returns obtained by investors (Gunasekarage & Power in Sugiyantol et al., 2020). Return is the comparison between the initial costs and

the results obtained by investors. For stocks, the initial cost is the purchase price, resulting in the difference between the purchase price and the selling price (capital gain). Investment returns will be directly proportional to the risks borne by investors. The higher the expected return, the higher the risk level investors must bear (Lau et al. in Sugiyantol et al., 2020).

### **Non-Performing Loan**

Banking institutions play an important role in the financial system. There have been many experiences of financial crises related to the deteriorating quality of assets in the banking sector, especially the accumulation of non-performing loans (after this NPL). One of the main sources of banking activity is lending; significant credit expansion by financial institutions during the two decades before the global financial crisis of 2007-2009 was a defining feature of those years. NPL is the commonly used metric for assessing credit risk. This indicator reflects the underlying cash flow risk from loans held by financial institutions that may not be fully repaid and is related to the quality of bank assets. Many previous empirical investigations show that bank failures are usually caused by high NPLs (Alnabulsi & Kozarevi, 2023).

### **Cash Ratio**

The tool that is often used to determine the company's financial performance and financial development to various groups so that they can make the right decision is the financial report. According to the Statement of Financial Accounting Standards (PSAK No. 1: 2019), financial reports are a structured presentation of an entity's financial position and performance. This report displays the history of the entity quantified in monetary value. In assessing and analysing a company's financial performance position, it can use financial ratios such as liquidity ratios, solvency/leverage, activity, and profitability (Novika & Siswanti, 2022).

### **Debt to Equity Ratio**

According to Rahmadani et al. (2019), the need for funds will increase along with the large expansion activities carried out by the company so that in fulfilling these sources of funds, the company can use sources of funds from outside the company, namely debt. Suleman & Sumani (2021) state that the Debt to Equity Ratio (DER) is a measurement variable related to capital structure. An increase in debt will affect the risks and profits obtained by the company resulting from using this debt with a high risk, namely the cost of capital.

### **Return on Equity**

Return on equity (ROE) is generally calculated using accounting-based performance measures and is calculated as a company's net income divided by common stockholders' equity. According to Brigham & Houston (2018), Return on equity (ROE) is the net to common equity ratio, measuring ordinary shareholders' return on investment rate. A high ROE reflects that the company has succeeded in making a profit from its capital. An increase in ROE will also boost the company's selling value, impacting stock prices, which correlates with increased stock returns. ROE is a ratio to measure the amount of capital contribution in creating net profit.

### **Bank**

Bank is a financial institution whose main business is collecting funds and channelling these funds back to the public through credit and providing services in payment traffic and money circulation. According to Kasmir (2018), Banks are financial institutions whose activities collect funds from the public in the form of deposits and then channel them back to the community, as well as provide other bank services.

### **Framework**

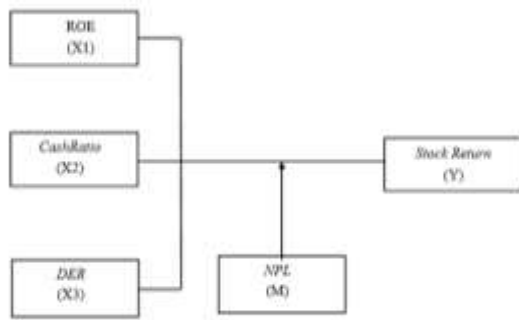


Figure 1. Framework

H1: ROE has a positive and significant effect on stock returns in the banking industry listed on the IDX

H2: Cash Ratio positively and significantly affects stock returns in the Banking Industry Listed on the IDX.

H3: DER negatively and significantly affects stock returns in the banking industry listed on the IDX.

H4: Non-performing loans can moderate the effect of return on equity on stock returns in the banking industry listed on the Indonesia Stock Exchange.

H5: Non-performing loans can moderate the effect of the cash ratio on stock returns in the banking industry listed on the Indonesia Stock Exchange.

H6: Non-performing loans can moderate the effect of the debt-equity ratio on stock returns in the banking industry listed on the Indonesia Stock Exchange.

## MATERIALS & METHODS

The research design in this study is causal associative, namely research that aims to determine the causal relationship between various variables (Erlina, 2011). This study uses independent variables, namely *Cash Ratio* ( $X_1$ ), *Debt to Equity Ratio* ( $X_2$ ), and *Return on Equity* ( $X_3$ ). The dependent variable is Return Stock ( $Y$ ), and the moderating variable is Non-Performing Loan ( $Z$ ).

The population in this study are banking companies listed on the Indonesia Stock Exchange for the 2016-2021 period. There are several reasons why researchers chose banking companies as subjects in this study, namely because in 2019 and 2020,

many banking companies experienced a decline due to increased debt due to the entry of the Covid-19 pandemic, which resulted in difficulties for banks in collecting credit where many debtors were unable to repay their obligations. Moreover, the Covid-19 pandemic resulted in many customers saving funds, but banks lacked capital due to their inability to suppress NPLs. Also, banks are intermediary institutions with high risk. They must be minimised so that they do not have a systemic effect because potential investors still buy shares without looking at stock returns.

The sampling technique was based on purposive sampling to obtain a representative sample according to the specified criteria. According to Lubis (2012: 122), the sample is part or representative of the population to be studied. The considerations used as criteria in the research are:

1. Banking companies registered and actively traded on the IDX during 2016 – 2021.
2. Banking companies that are registered and have submitted consecutive financial reports for the 2016 – 2021 period.

Based on the criteria table above, 26 banking companies meet the requirements as a sample. This study uses panel data with a time series for 6 years so that the data obtained for observation is 26 companies x 6 years of research, equal to 156 samples.

The data analysis technique using the software Eviews tools. The panel data regression analysis method and moderating testing analysed the data.

## RESULT

### 1. Panel Data Regression Estimation Model Test

#### Chow test

The Chow test is a test to compare the common effect model with the fixed effect that will be used in this study. The

results of the Chow test in this study can be seen in the table below:

Table 2. Chow Test Results

Redundant Fixed Effects Tests			
Equation: Untitled			
Test cross-section fixed effects			
Effects Test	Statistic	d.f.	Prob.
Cross-section F	2.922652	(25,126)	0.0000
Cross-section Chi-square	71.347546	25	0.0000

Source: EViews Output Results, 2023

The results of the Chow test in Table 2. show that the Cross-section Chi-square value is 0.0000, indicating that the significance probability value is less than 0.05 ( $0.0000 < 0.05$ ). It can be concluded that based on the results of the Chow test, the estimation model accepted is the fixed effect model (FEM).

### Hausman Test

The Hausman test is used to select the best model between the fixed and random effect models for this study. The results of the Hausman test in this study can be seen in the table below:

Table 3. Hausman Test Results

Correlated Random Effects - Hausman Test			
Equation: Untitled			
Test cross-section random effects			
Test Summary	Chi-Sq. Statistic	Chi-Sq. d.f.	Prob.
Cross-section random	1.383707	4	0.8470

Source: EViews Output Results, 2023

The results of the Hausman test in Table 3. show that a probability value of 0.8470 is obtained, indicating that the significance probability value is greater than 0.05 ( $0.8470 > 0.05$ ). It can be concluded that based on the results of the Hausman test, the estimation model accepted is the random effect model (REM).

### Lagrange Multiplier Test

Table 4. Lagrange Multiplier Test Results

Null (no rand. effect)	Cross-section	Period	Both
Alternative	One-sided	One-sided	
Breusch-Pagan	21.70853	0.940922	22.64945
	(0.0000)	(0.3320)	(0.0000)

Source: EViews Output Results, 2023

The results of the Lagrange multiplier test in Table 4. show that a probability value of 0.0000 is obtained, indicating that the Breusch-Pagan value is less than 0.005 ( $0.0000 < 0.05$ ). It can be concluded that based on the results of the Lagrange multiplier test that has been carried out, the most appropriate panel data regression estimation model used in this study is the random effect model (REM).

### Classic Assumption Test

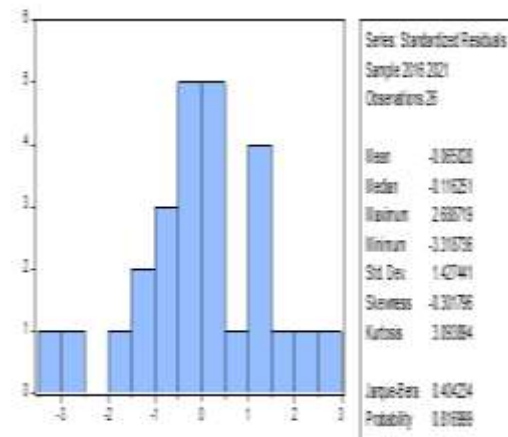


Figure 2. Normality Test  
Source: EViews Output Results, 2023

The normality test results are in Table 5. show that the Jaque-Bera probability value is 0.816999. It indicates that the probability value is greater than 0.05 ( $0.816999 > 0.05$ ). So, it can be concluded that the residual data used in this study is normally distributed.

## Multicollinearity Test

Table 5. Multicollinearity Test

	LN X1	LN X2	X3	LN Y	M
LN X1	1.000000	-0.078069	-0.019546	0.419277	-0.454924
LN X2	-0.078069	1.000000	0.110798	-0.476805	0.217419
X3	-0.019546	0.110798	1.000000	0.279648	0.013333
LN Y	0.419277	-0.476805	0.279648	1.000000	-0.467134
M	-0.454924	0.217419	0.013333	-0.467134	1.000000

Source: EViews Output Results, 2023

The results of the multicollinearity test are in Table 5. show that the correlation values obtained for the variables return on equity (X1), cash ratio (X2), debt to equity ratio (X3), stock returns (Y) and non-performing loans (M) obtained a correlation value of 1.000000. So, it can be concluded that the correlation value on the variables returns on equity (X1), cash ratio (X2), debt to equity ratio (X3), stock returns (Y) and non-performing loans (M) is less than 0.80. It can be concluded that the variables return on equity (X1), cash ratio (X2), debt to equity ratio (X3), stock returns (Y) and non-performing loans (M) do not show multicollinearity symptoms.

## Hypothesis testing

### Partial Test (t-test)

The partial test in this study aims to determine the effect of the independent variables partially on the dependent variable. The partial test in this study was carried out by comparing the t-statistic value with the t-table and using a significance level of 0.05. The t-table value is obtained based on the degree of freedom formula (df), namely  $df = n - k$ ,  $df = 156 - 5 = 151$ , and then the t-table value is 1.97580. The results of the partial test (t-test) in this study can be described as follows:

Table 6. Partial Test Results (t-test)

Variable	Coefficient	Std. Error	t-Statistic	Prob.
C	-7.398344	1.626371	-4.548988	0.0002
LN_X1	0.434171	0.234342	1.852722	0.0780
LN_X2	-0.606145	0.214403	-2.827128	0.0101
X3	38.61597	21.36294	1.807615	0.0850
M	-49.25715	35.81012	-1.375509	0.1835

Source: EViews Output Results, 2023

Based on the results of hypothesis testing in Table 6, it can be described as follows:

1. The variable return on equity (X1) obtained a t-statistic value of 1.852722 with a significance level of 0.0780. This shows that the t-statistic value is smaller than the t-table 1.97580 ( $1.852722 < 1.97580$ ) with a significance level greater than 0.05 ( $0.0780 > 0.05$ ). So, it can be concluded that return on equity (ROE) has a positive and insignificant effect on stock returns in the Banking Industry listed on the IDX.
2. The cash ratio variable (X2) obtained a t-statistic value of -2.827128 with a significance level 0.05. This shows that the t-statistic value is smaller than the t-table 1.97580 ( $-2.827128 < 1.97580$ ) with a significance level of less than 0.05 ( $0.0101 < 0.05$ ). So, it can be concluded that the cash ratio negatively and significantly affects stock returns in the Banking Industry listed on the IDX.
3. The variable debt-to-equity ratio (X3) obtained a t-statistic value of 1.807615 with a significance level of 0.0850. This shows that the t-statistic value is smaller than the t-table 1.97580 ( $1.807615 < 1.97580$ ) with a significance level greater than 0.05 ( $0.0850 > 0.05$ ). So, it can be concluded that the debt-to-equity ratio has a positive and insignificant effect on stock returns in the Banking Industry listed on the IDX.
4. The non-performing loan (M) variable obtained a t-statistic value of -1.375509 with a significance level of 0.1835. This

shows that the t-statistic value is smaller than the t-table 1.97580 ( $-1.375509 < 1.97580$ ) with a significance level greater than 0.05 ( $0.1835 > 0.05$ ). So, it can be concluded that non-performing loans negatively and insignificantly affect stock returns in the Banking Industry listed on the IDX.

### Simultaneous Test (f-test)

Table 7. Simultaneous Test Results (f-test)

Dependent Variable: Return Saham	
F-statistic	3.917902
Prob(F-statistic)	0.015747

Source: EViews Output Results, 2023

The results of the simultaneous test (f-test) in Table 7. show that the F-statistic value of 3.917902 is greater than 2.43 ( $3.917902 > 2.43$ ) with a probability value of 0.015747 less than 0.05 ( $0.015747 < 0.05$ ). So, it can be concluded that the variables return on equity, cash ratio, debt-equity ratio and non-performing loans jointly affect stock returns in the Banking Industry listed on the IDX.

### Determination Coefficient Test

The results of the coefficient of determination test in this study can be described as follows:

Table 8. Determination Coefficient Test Results

Dependent Variable: Return Saham	
R-squared	0.427350
Adjusted R-squared	0.318274

Source: EViews Output Results, 2023

The coefficient of determination test results in Table 8 shows that an R-squared value of 0.427350 is obtained. It indicates that the variables return on equity, cash ratio, debt-equity ratio, and non-performing loans affect 42.7% of stock returns. Hence, the coefficient of determination shows a small number, which means that the influence of the independent variable on the dependent variable is weak. In comparison, the remaining 57.3% is influenced by other variables not examined in this study.

### Moderated Regression Analysis (MRA) Test

The results of the moderated regression analysis (MRA) test can be described as follows:

Table 9. Moderated Regression Analysis (MRA) Test Results

Variable	Coefficient	Std. Error	t-Statistic	Prob
Cons	-7.398344	1.626371	-4.548988	0.0002
LN_X1	0.434171	0.234342	1.852722	0.0780
LN_X2	-0.606145	0.214403	-2.827128	0.0101
X3	38.61597	21.36294	1.807615	0.0850
LN_X1*M	0.356914	0.270379	1.320050	0.1975
LN_X2*M	-0.423841	0.229346	-1.848043	0.0731
X3*M	-8.400806	12.81287	-0.655654	0.5157
M	-49.25715	35.81012	-1.375509	0.1835

Source: EViews Output Results, 2023

The results of the moderated regression analysis (MRA) test in Table 9 can be explained as follows:

$$LN\_Y = -7.398344 + 0.434171 LN\_X1 + (-0.606145LN\_X2) + 38.61597 X3 + (-49.25715 M) + 0.356914 (LN\_X1*M) + (-0.423841 LN\_X2*M) + (-8.400806 X3*M)$$

1. The constant value obtained is -7.398344, with a negative value. It indicates that if the value of Return on equity (ROE), Cash ratio and Debt to Equity Ratio decreases, the stock return will also decrease.
2. The coefficient value of Return on equity (ROE) shows a value of 0.434171 with a t-statistic value of 1.852722. This shows that return on equity (ROE) positively affects stock return.
3. The coefficient value of the cash ratio is -0.606145 with a t-statistic value of -2.827128. It shows that the cash ratio has a negative effect on stock returns
4. The coefficient value of the Debt-to-Equity Ratio is 38.61597 with a t-statistic value of 1.807615. It shows that the debt-to-equity ratio has a positive effect on stock returns



5. Non-Performing loans in moderating the effect of return on equity on stock returns obtained a significance probability value of 0.1975. It indicates that the significance value is greater than 0.05 ( $0.1975 > 0.05$ ). It can be concluded that non-performing loans cannot moderate the effect of return on equity on stock returns in the Banking Industry listed on the IDX.
6. Non-Performing loans in moderating the effect of the cash ratio on stock returns obtained a significance probability value of 0.0731. It indicates that the significance value is greater than 0.05 ( $0.0731 > 0.05$ ). So, it can be concluded that non-performing loans cannot moderate the effect of the cash ratio on stock returns in the Banking Industry listed on the IDX.
7. Non-Performing loans in moderating the effect of the debt-to-equity ratio on stock returns obtained a significance probability value of 0.5157. It indicates that the significance value is greater than 0.05 ( $0.5157 > 0.05$ ). So, it can be concluded that non-performing loans cannot moderate the effect of the debt-to-equity ratio on stock returns in the Banking Industry listed on the IDX.

## CONCLUSION

The results of this study provide several conclusions that can be drawn based on the discussion of the problems that have been carried out. The following are the conclusions that the author has summarised in this study:

1. Return on equity (ROE) has a positive and insignificant effect on stock returns in the Banking Industry listed on the IDX.
2. The cash ratio has a negative and significant effect on stock returns in the Banking Industry listed on the IDX
3. Debt to equity ratio has a positive and insignificant effect on stock returns in the Banking Industry listed on the IDX.
4. Non-Performing loans cannot moderate the effect of return on equity on stock

returns in the Banking Industry listed on the IDX.

5. Non-Performing loans cannot moderate the effect of the cash ratio on stock returns in the Banking Industry listed on the IDX. Non-performing loans cannot moderate the effect of the debt-to-equity ratio on stock returns in the Banking Industry listed on the IDX.

## IMPLICATIONS

Based on the results of the conclusions that have been described, then there are implications in this study, namely as follows:

1. Practical implications.  
The practical implications of this study are expected for investors to know the level of non-performing loans in a company. It is because non-performing loans indicate the level of non-performing loans in a company, affecting the level of stock returns to the company.
2. Theoretical implications  
Theoretical implications of this research are expected for future research to use other independent variables in predicting the effect of stock returns, and it is hoped that further research will use other moderating variables to strengthen the effect on stock returns.

## Declaration by Authors

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