

Influence of Capital Adequacy Ratio (CAR) and Operational Expenses to Operating Income (BOPO) towards Return on Assets (ROA)**Andi Silvan**

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Keywords

CAR, BOPO, ROA

Abstract

The reason for this ponder is to get data within the shape of a more in-depth clarification of the relationship and impact between the CAR and BOPO proportions on ROA and comes about from handled information concerning how much the relationship and impact between the CAR and BOPO proportions on ROA. This research aims to obtain deeper information about the relationship and influence of the Capital Adequacy Ratio (CAR) on Return on Assets (ROA). The strategy utilized in this considers employment the impact strategy. This sort of investigation is graphic confirmation with a quantitative approach. Information collection procedures utilizing auxiliary information. At that point the information examination procedure employments a computer application program, specifically the Factual Item and Benefit Arrangement (SPSS) adaptation 26. The comes about of examination of different straight relapse conditions delivers a condition, to specific $Y = 0.002 + 0.004X_1 + 0.000X_2 + e$. It can be concluded that on the off chance that all free factors are zero, the esteem of the subordinate variable is 0.002. The coefficient esteem of the CAR variable (X_1) is 0.004 and the coefficient esteem of the BOPO variable (X_2) is 0.000.

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**INTRODUCTION**

Agreeing to PT Law No. 40 of 2007 Article 1 Definition of a Constrained Risk Company may be a legitimate substance that could be a capital association, built up based on an assertion, carrying out commerce exercises with authorized capital which is partitioned into offers, and meets the prerequisites stipulated in this law and executing controls (Lubis, 2018).

The Indonesian Stock Exchange commonly abbreviated as BEI is regulated in Law No. 8 of 1995 as a capital market (Lubis, 2018). The Indonesian Stock Exchange has a broad definition, namely the party that organizes and provides a system or means for bringing together offers to sell and buy securities of other parties to trade securities between them, including debt recognition letters, shares, bonds, proof of debt, and securities. commercial (Kanawa, 2017). The Indonesian Stock Exchange acts as a securities trading facilitator by disseminating stock exchange information and as an authority that controls the course of securities transactions. The Indonesian Stock Exchange is the official exchange in Indonesia, so companies that want to go public in Indonesia must go through the Indonesian Stock Exchange (BEI).

Keeping money may be a financial institution that incorporates a part of the budgetary framework in Indonesia. The presence of the banking segment is a critical part, where most people's lives involve services from managing an account division. This is often since the keeping money division is an institution that carries out the most work as a money-related middle person between parties who have stores (overflow stores) and parties who require stores (shortfall stores) as well as an institution whose work is to encourage the stream of activity installment.

In Indonesia, the keeping money framework utilized could be a double managing an account framework where two sorts of managing an account businesses work, to be specific sharia banks and routine banks. In this way, the approaches taken by the government through Bank Indonesia are certainly distinctive for the two sorts of banks. Sharia banks don't recognize the intrigued framework, so benefits can be sourced from benefit sharing with trade-performing artists who utilize reserves from Sharia banks as well as ventures from Sharia banks themselves.

Initially, there were only three Islamic banks in Indonesia, but now their growth is increasing. One of the indicators of a company's performance is profitability. Profitability is management's ability to generate profits. One of the appropriate proxies for measuring the profitability of a bank is to look at the size of the Return On Assets (ROA), this shows the bank's ability to generate income from managing the assets it owns (Niode & Chabachib, 2016) .

One way to decide the well-being level of a bank's money-related execution is by measuring the bank's benefit execution. Return on Resources (ROA) may be a proportion utilized to the degree of bank management's capacity to get benefits and oversee the general level of bank commerce effectiveness. The more noteworthy the esteem of this proportion demonstrates the bank's commerce productivity level is getting way better or more advantageous. The reason for choosing ROA as the dependent variable is that ROA is used to measure the company's effectiveness in generating profits. The ROA obtained in 2017 – 2021 at Bank Muamalat is shown in Table 1.

Table 1 ROA Growth Data PT. Bank Muamalat, Tbk.

2017-2021		
Year	ROA	ROA Growth
2017	0.11%	0
2018	0.08%	-0.92%
2019	0.05%	-0.95%
2020	0.03%	-0.97%
2021	0.02%	-0.98%
Average	0.29%	-0.955%

Source: PT. Bank Muamalat, Tbk.

Based on Table 1 at PT. Bank Muamalat, Tbk, the level of Return on Assets for the period 2017 to 2021 has decreased where the ROA is 0.11%, 0.08%, 0.05%, 0.03%, and 0.02%. With an average value of negative ROA growth, namely (-)0.955. This value indicates a decrease in ROA, this decrease indicates that the company management's ability has decreased in manage its assets to generate profits. For example, from 2017 to 2018, based on the annual financial report of PT. Bank Muamalat Tbk, in 2017 the profit earned was IDR 26,115,563 (in thousands of Rupiah), and in 2018 it was IDR 46,002,044 (in thousands of Rupiah) while the total assets in 2017 were IDR 61,696,919,644 (in thousands of Rupiah) and in 2018 amounting to IDR 57,227,276,046 (in thousands of Rupiah). This shows that the level of bank efficiency in carrying out its operations influences the level of income generated by the bank.

Profitability is the most appropriate indicator for measuring the success of a bank. The level of benefit is measured utilizing ROA (Return on Resources) which is utilized to determine a company's viability in creating benefits by utilizing the resources it possesses. ROA could be a comparison between benefits that are sometimes recently charged and normally add up to resources, which appears the capacity of all resources utilized to produce benefits. The budgetary proportions that impact ROA are Capital Ampleness Proportion (CAR), Working Costs and Working Wage (BOPO), Financing to Store Proportion (FDR), Net Intrigued Edge (NIM), Non-Performing Credits (NPL) (Nanda, Hasan, & Aristyanto, 2019) .

Capital Adequacy Ratio (CAR) is capital ampleness which appears as the bank's capacity to preserve adequate capital and the capacity of bank administration to distinguish,

degree, screen, and control dangers that emerge which can impact the sum of bank capital (Dedi Gunawan Putra & Raymond, 2019) .

Working Costs and Working Salary (BOPO) may be a proportion that appears in the execution comparison between operational costs brought about by the bank and operational wage that the bank can create (Budianto & Dewi, 2023) . This operating income ratio is also called the efficiency ratio which is used to measure the ability of bank management to control the operational costs incurred against the operational income it obtains (Asri, 2018) .

Net Interest Margin (NIM) is a comparison of net interest income to average productive assets (Purba & Triaryati, 2018) . This proportion demonstrates the bank's capacity to create net intrigued pay by putting in profitable resources. The more prominent this proportion, the superior the bank's execution in creating intrigued wages. Be that as it may, it must be guaranteed that typically not due to tall intermediation costs, the suspicion is that intrigued pay must be reinvested to reinforce bank capital (Purwanti, 2020) .

Non-performing credits (NPL) could be a proportion utilized to the degree of a bank's capacity to cover the chance of disappointment in repaying credit by indebted individuals. Banks must watch out in disseminating credit to maintain a strategic distance from tall NPLs (Fernos & Itra, 2022) .

Financing to Store Proportion (FDR) could be a proportion that measures a bank's capacity to reimburse commitments to clients who have contributed to the stores they have with the credit they have given to their indebted individuals (Nanda et al., 2019) .

Financing to Store Extent (FDR) may well be an extent that measures a bank's capacity to repay commitments to clients who have contributed to the stores they have with the credit they have given to their obliged individuals (Ferdinan Eka Putra Eka Putra & Kindangen, 2016) .

Based on the research background, it is suspected that the Capital Adequacy Ratio (CAR) and Operating Expenses and Operating Income (BOPO) play a significant role in contributing to Return On Assets (ROA), so this research is entitled "The Effect of Capital Adequacy Ratio (CAR) and Operating Expenses on Operating Income (BOPO) on Return On Assets (ROA) at PT. Bank Muamalat Tbk, Jakarta" (Sari, nd) .

This research aims to obtain deeper information about the relationship and influence of the Capital Adequacy Ratio (CAR) on Return on Assets (ROA). CAR is an indicator used to measure the level of bank capital adequacy in facing risk. This research aims to identify whether there is a relationship between CAR and ROA, which can provide an understanding of the extent to which the level of bank capital adequacy affects the bank's financial performance.

Apart from that, this research also aims to obtain deeper information about the relationship and influence of Operating Expenses and Operating Income (BOPO) on Return on Assets (ROA). BOPO is an indicator that describes the comparison between operational expenses and operational income of a bank. By analyzing the relationship between BOPO and ROA, this research aims to understand the extent to which bank operational efficiency can impact the bank's financial performance. Furthermore, this research also aims to obtain information from processed data on how big the relationship and influence of Capital Adequacy Ratio (CAR) and Operating Expenses and Operating Income (BOPO) are on Return on Assets (ROA). By examining these two factors simultaneously, this research will provide a more comprehensive understanding of the factors that contribute to bank financial performance, as well as the extent of their simultaneous influence on ROA.

RESEARCH METHODS

The type of research used is quantitative research with descriptive methods. The population presented in this company research is the Financial Report of PT. Bank Muamalat, Tbk which has been registered and is still listed on the Indonesia Stock Exchange (BEI). The sample in this research is the CAR, BOPO, and ROA ratios in PT's financial statements. Bank Muamalat with 32 samples or 32 quarters for 8 years. The subject of this research is PT. Bank Muamalat, Tbk. The objects that will be studied by researchers are the independent variable and the dependent variable. The independent variables in this research

are CAR (Capital Adequacy Ratio) as X1 and BOPO (Operating Expenses and Operating Income) as X2. The dependent variable in this research is ROA (Return on Assets) as Y. In this research, the data used is PT's quarterly published financial report data. Bank Muamalat, Tbk. 2014-2021 period. The type of data analysis used is descriptive statistics. This data analysis technique will be tested using the SPSS version 26 system. SPSS or the abbreviation for Statistical Package for the Social Sciences is a software that can be used to help with statistical data processing, calculations, and analysis.

RESULTS AND DISCUSSION

Normality test

Table 2 Test Data (normality)
One-Sample Kolmogorov-Smirnov Test

		Unstandardized Residual
N		32
Normal Parameters ^{a,b}	Mean	.0000000
	Std. Deviation	.11710451
Most Extreme Differences	Absolute	.318
	Positive	.166
	Negative	-.318
Test Statistic		.318
Asymp. Sig. (2-tailed)		.000 ^c

- a. Test distribution is Normal.
- b. Calculated from data.
- c. Lilliefors Significance Correction.

Source: processed with SPSS 26.0

Based on the results in Table 2 using the one-sample Kolmogorov-Smirnov test method, a probability number or Asymp. Sig. (2-tailed) of Unstandardized Residual is 0.000, which means that the significance value for the CAR variable (X1), BOPO variable (X2), and ROA variable (Y) is 0.000. Because probability numbers or Asymp. Sig. (2-tailed) is less than 0.05, which means that the data is not normally distributed (Tala & Karamoy, 2017).

Classic Test (Multicollinearity, Heteroscedasticity, Autocorrelation)

1. Multicollinearity Test

Table 3 Multicollinearity Test Results

		Coefficients ^a					Collinearity Statistics	
Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.	Tolerance	VIF
		B	Std. Error	Beta				
1	(Constant)	.002	.090		.022	.983		
	CAR	.004	.003	.225	1.249	.222	.987	1.013
	BOPO	.000	.001	-.104	-.577	.568	.987	1.013

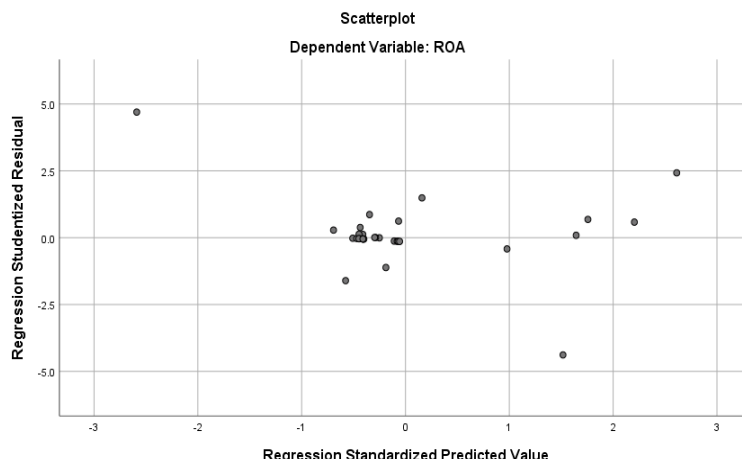
a. Dependent Variable: ROA

Source: processed with SPSS 26.0

Table 3 shows the tolerance value for the CAR variable (X1) of 0.987 > 0.1 and the BOPO variable (X2) of 0.987 > 0.1. Meanwhile, the VIF value of the CAR variable (X1) is 1.013 < 10 and the BOPO variable (X2) is 1.013 < 10, so it can be concluded that the multicollinearity assumption has been fulfilled or that there are no symptoms of multicollinearity.

2. Heteroscedasticity Test

Figure 1 Scatter plot



Source: processed with SPSS 26.0

By looking at Figure 1, you can see that the points are spread randomly, both above and below the number 0 (zero) on the Y axis. Thus it can be explained that the regression model does not have symptoms of heteroscedasticity (Lawendatu, Kekenusa, & Hatidja, 2014).

3. Autocorrelation Test

Table 4 Autocorrelation Test Results

Model Summary ^b					
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.259 ^a	.067	.003	.12108	1.887

a. Predictors: (Constant), BOPO, CAR
b. Dependent Variable: ROA

Source: processed with SPSS 26.0

Based on Table 4, the Durbin Watson value is 1.887 and the du value is obtained from $K(2) = N(32)$ with a significance of 5% which can be seen in the Durbin Watson table, namely 1.5736, which can be calculated as $du(1.5736) < Durbin\ Watson(1.887) < 4-du(2.4264)$ and the results show no symptoms of autocorrelation.

Test Method

A. Correlation coefficient

1. Partial Correlation Coefficient Test

Table 5 Partial Correlation Coefficient Test Results

		CAR	BOPO	ROA
CAR	Pearson Correlation	1	-.112	.237
	Sig. (2-tailed)		.541	.191
	N	32	32	32
BOPO	Pearson Correlation	-.112	1	-.129
	Sig. (2-tailed)	.541		.480
	N	32	32	32
ROA	Pearson Correlation	.237	-.129	1
	Sig. (2-tailed)	.191	.480	
	N	32	32	32

Source: processed with SPSS 26.0

Table 5 shows the results of the correlation coefficient value between the CAR variable (X1) and the ROA variable (Y), producing a figure of 0.237 with positive results. The correlation coefficient value between the BOPO variable (X2) and the ROA variable (Y) is (-0.129) with a negative value (Susanto & Kholis, 2016).

2. Simultaneous Correlation Coefficient Test

Table 6 Simultaneous Correlation Coefficient Test Results

Model Summary				
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.524 ^a	.275	.225	3.10607

a. Predictors: (Constant), BOPO, CAR

Source: processed with SPSS 26.0

Based on Table 6, shows the results of the simultaneous correlation coefficient test between the CAR variable (X1) and the BOPO variable (X2) on the ROA variable (Y) of 0.524 with a positive value.

B. Coefficient of Determination

1. Partial Coefficient of Determination Test

Table 7 Results of CAR Partial Determination Coefficient Test on ROA

Model Summary				
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.237 ^a	.056	.025	.11972

a. Predictors: (Constant), CAR

Source: processed with SPSS 26.0

Based on Table 7, shows that the partial coefficient of determination (R Square) between the CAR variable (X1) and the ROA variable (Y) is 0.056.

Table 8 BOPO Partial Determination Coefficient Test Results on ROA

Model Summary				
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.129 ^a	.017	-.016	.12220

a. Predictors: (Constant), BOPO

Source: processed with SPSS 26.0

Based on Table 8, shows that the partial coefficient of determination (R Square) between the BOPO variable (X2) and the ROA variable (Y) is 0.017.

2. Simultaneous Coefficient of Determination Test

Table 9 Simultaneous Coefficient of Determination Test Results

Model Summary				
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.524 ^a	.275	.225	3.10607

a. Predictors: (Constant), BOPO, CAR

Source: processed with SPSS 26.0

Based on Table 9, shows the results of the simultaneous Adjusted R Square (R²) coefficient of determination test between the CAR variable (X₁) and the BOPO variable (X₂) on the ROA variable (Y) of 0.225. This value means the ability of the combination of the CAR variable (X₁) and the BOPO variable (X₂) to simultaneously influence the ROA variable (Y).

C. Multiple Regression Equation

Table 10 Multiple Linear Regression Analysis
Coefficients^a

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	.002	.090		.022	.983
	CAR	.004	.003	.225	1.249	.222
	BOPO	.000	.001	-.104	-.577	.568

a. Dependent Variable: ROA

Source: processed with SPSS 26.0

Based on Table 10, the results of the multiple linear regression equation in this study are:

$$Y = a + b_1X_1 + b_2X_2 + e$$

$$Y = 0.002 + 0.004X_1 + 0.000X_2 + e$$

Where:

Y = ROA

a = constant = 0.002

b₁ = regression coefficient X₁ = 0.004

b₂ = regression coefficient X₂ = 0.000

X₁ = CAR

X₂ = BOPO

e = error

The Multiple Linear Regression equation obtained from the SPSS processing results is $Y = 0.002 + 0.004X_1 + 0.000X_2 + e$. Thus, the constant value obtained is 0.002, which means that if the CAR variable (X₁) and the BOPO variable (X₂) have a value of 0, the value of the ROA (Y) variable is 0.002. The regression coefficient value for variable X₁ is 0.004 and the regression coefficient value for variable X₂ is 0.000. So it can be interpreted that if there is an increase in variable X₁ then the value of variable Y will increase assuming the values of other variables X are fixed or constant. Meanwhile, for variable X₂, if there is an increase of 1 point, the value of variable Y will increase assuming the values of another variable

Hypothesis testing

1. T Statistical Test

Table 11 T-Test Results

Coefficients^a

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	.002	.090		.022	.983
	CAR	.004	.003	.225	1.249	.222
	BOPO	.000	.001	-.104	-.577	.568

a. Dependent Variable: ROA

Source: processed with SPSS 26.0

From Table 11 it can be clarified that most testing the theory of the relationship and impact of the Capital Ampleness Proportion (CAR) variable on the Return on Resources (ROA) variable got a t-count esteem of 1.249 with a noteworthiness level of 0.222. The t-count esteem is compared with the t-table at a noteworthiness level (α) = 5% or 0.05 with df = 29, the comes about gotten are t-count = 1.249 < t_{xss=removed}> 0.05, this implies that for testing the CAR variable (X₁) against the ROA variable (Y) H₀ is acknowledged and H₁ is

rejected. This implies that it isn't proven that there's a noteworthy relationship between the CAR variable (X1) in part and the ROA variable (Y).

The next hypothesis test, partially the relationship between the Operating Expenses and Operating Income (BOPO) variable with the Return on Assets (ROA) variable, obtained a t-value of (-0.577) with a significance level of 0.568. And the t-count value is compared with the t-table at a significance level (α) = 5% or 0.05 with $df = 29$, the result obtained is $t\text{-count} = (-0.577) < t\text{-table} = 2.045$, so H2 is rejected. So it can be concluded that there is no significant relationship between the BOPO variable (X2) and the ROA variable (Y). For a significance level of $0.568 > 0.05$, it means that H0 is accepted and H2 is rejected, meaning that it is not proven that there is a significant relationship between the BOPO variable (X2) partially and the ROA variable (Y).

2. F test

Table 12 Significant F Test Results

ANOVA ^a						
Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	.031	2	.015	1.040	.366 ^b
	Residual	.425	29	.015		
	Total	.456	31			

a. Dependent Variable: ROA

b. Predictors: (Constant), BOPO, CAR

Source: processed with SPSS 26.0

Based on Table 12, it can be seen that testing the hypothesis of the influence of the independent variables CAR (X1) and BOPO (X2) simultaneously on ROA (Y) obtained an F-count value of 1.040 with a sig of 0.366. The F-calculated value is compared with the F-Table at a significance level (α) = 5% or 0.05 with df numerator = 2 and df = 29, the results obtained are $F\text{-calculated} = 1.040 < F\text{-Table} = 3.33$ with the level significance $0.366 > 0.05$. So it can be stated that H3 is rejected and H0 is accepted, thus the results of hypothesis testing are that simultaneously there is no significant influence between the CAR variable (X1) and the BOPO variable (X2) on the ROA variable (Y).

Discussion

A. Method Test Results

Correlation coefficient

1. Partial Correlation Coefficient

Based on Table 5, the interpretation of the correlation coefficient value obtained between the CAR variable (X1) and the ROA variable (Y) produces a figure of 0.237. And this value is between the interval 0.200 – 0.399 with a low interpretation. Meanwhile, the results of the correlation coefficient test for the BOPO variable (X2) with the ROA variable (Y) are (-0.129) with a negative value and this value is between the interval 0.000 - 0.199 with a very low interpretation.

Thus, the results of the correlation coefficient analysis value obtained partially can be interpreted as meaning that the relationship between the CAR variable (X1) and the ROA variable (Y) is positive with a low level of relationship strength, and the relationship between the BOPO variable (X2) and the ROA variable (Y). is negative with a very low level of relationship strength. A positive relationship can be interpreted as the relationship between the independent variable running in the same direction as the dependent variable and vice versa if it is negative. Or it can be interpreted that if the CAR variable (X1) increases, the ROA (Y) variable will increase, whereas if BOPO (X2) increases, ROA (Y) will decrease.

2. Simultaneous Correlation Coefficient

Based on Table 6, shows the results of the correlation coefficient test (R) simultaneously between the CAR variable (X1) and the BOPO variable (X2) on the ROA variable (Y) of 0.524 with a positive value. Based on Table 3.2, this value is in the interval 0.40 – 0.599 with a moderate level of relationship strength.

Thus, the results of the correlation coefficient analysis obtained simultaneously can be interpreted as meaning that the relationship between the CAR variable (X1) and the BOPO variable (X2) simultaneously with the ROA variable (Y) is positive with a moderate level of strength.

Coefficient of Determination

1. Partial Coefficient of Determination

Based on Table 7 and Table 8, the partial value (R square) between the CAR variable (X1) and the ROA variable (Y) is 0.056. The partial value (R square) between the BOPO variable (X2) and the ROA variable (Y) is 0.017.

Thus, the value of the coefficient of determination (KD) or how large the percentage of the ability of the CAR variable (X1) to partially influence the ROA variable (Y) is 5.6%. The value of the coefficient of determination (KD) or how large the percentage of the BOPO variable (X2) can partially influence the ROA variable (Y) is 1.7%.

2. Simultaneous Coefficient of Determination

Based on Table 9, the Adjusted R Square value is 0.225. The coefficient of determination (KD) value or how large the percentage of ability between the CAR variable (X1) and the BOPO variable (X2) simultaneously influences the ROA variable (Y) requires the following calculation:

$$\begin{aligned} \text{KD} &= \text{Adjusted } R^2 \times 100\% \\ &= 0.225 \times 100\% \\ &= 22.5\% \end{aligned}$$

This means that the coefficient of determination (KD) value for the percentage of ability provided by the combination of the CAR variable (X1) and the BOPO variable (X2) in influencing the ROA variable (Y) is 22.5% and the remaining 77.5% is influenced by other variables that are not examined in this research.

Multiple Linear Regression Equations

The results in Table 10 show that the equation obtained is $Y = 0.002 + 0.004X_1 + 0.000X_2 + e$.

In this equation, it can be interpreted that for every one unit increase in the CAR variable (X1), the ROA variable (Y) will increase by 0.004 with the assumption that the other independent variables from the regression model remain constant. Every time the BOPO variable (X2) increases by one unit, the ROA (Y) variable will increase by 0.000, assuming that the other independent variables from the regression model remain constant.

B. Hypothesis Test Results

T-test

Within the T-Test, there are two ways to get data on whether the autonomous factors CAR and BOPO have a halfway impact on the ROA (Y) variable, specifically by looking at the comes about of the t column and the comes about of the critical column in Table 11 within the variable CAR (X1). The about of the t column gets the t esteem. -number = 1.249 < t xss=removed> 0.05, meaning that for testing the CAR (X1) variable on the ROA (Y) variable, Ho is acknowledged and H1 is rejected. This means that it isn't demonstrated that there's a partially significant relationship between the CAR variable (X1) and the ROA variable (Y).

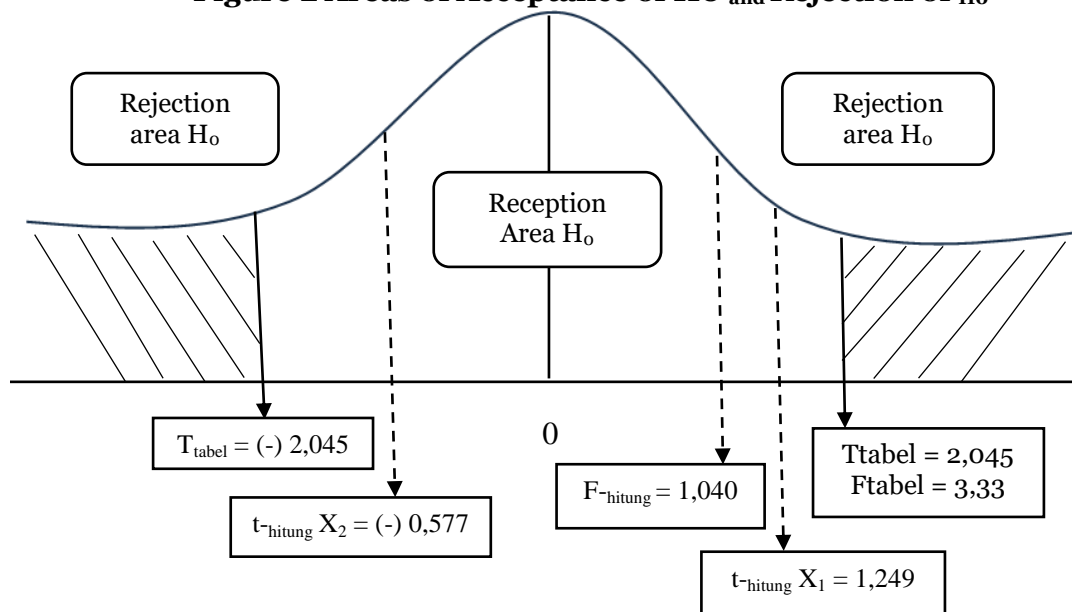
Within the BOPO variable (X2), the comes about of the t column appears that the t-value = (-0.577) < t xss=removed> 0.05, meaning that Ho is acknowledged and H2 is rejected, meaning that it isn't demonstrated that there's an in part critical relationship between the BOPO (X2) variable and the variable ROA (Y).

F test

In Table 13, it is gotten that F-count = 1.040 < F xss=removed> 0.05. This implies that for testing the CAR variable (X1) and the BOPO variable (X2) on the ROA variable (Y) is that Ho is acknowledged and H3 is rejected, meaning that there's no noteworthy impact of the CAR variable (X1) and the BOPO variable (X2) at the same time on the ROA variable (Y).

Ho Acceptance and Ho Rejection Curves

Figure 2 Areas of Acceptance of Ho and Rejection of Ho



Source: processed, 2023

The results of the first hypothesis test (H1) are that H_{01} is accepted and H_{a1} is rejected, which means that partially the CAR variable (X_1) does not have a significant relationship with ROA (Y). The results of the second hypothesis test (H2) are that H_{02} is accepted and H_{a2} is rejected, which means that partially the BOPO variable (X_2) does not have a significant relationship with ROA (Y). The results of the third hypothesis test (H3) are that H_{03} is accepted and H_{a3} is rejected, which means that simultaneously the CAR variable (X_1) and the BOPO variable (X_2) have no significant influence on ROA (Y).

CONCLUSION

Based on the inquiry about what comes about displayed, it can be concluded that this inquiry has succeeded in creating a show to analyze the relationship between the factors CAR (X_1), BOPO (X_2), and ROA (Y). The comes about of impact test shows that somewhat, the CAR variable (X_1) has an impact of 5.6% on the ROA variable (Y), whereas the BOPO variable (X_2) has an impact of 1.7%. Be that as it may, at the same time, the CAR variable (X_1) and the BOPO variable (X_2) as it were have an impact of 22.5 % on the ROA variable (Y). The numerous direct relapse conditions appear that the CAR variable (X_1) encompasses a relationship within the opposite direction to the ROA variable (Y), whereas the BOPO variable (X_2) features a relationship within the inverse heading as well. However, there's no noteworthy concurrent impact between these two factors on the ROA (Y) variable. The comes about of the relationship test shows that there's a moo and positive relationship between the CAR variable (X_1) and the ROA variable (Y), whereas the relationship between the BOPO variable (X_2) and the ROA variable (Y) is moo and negative. By and large, this inquiry bolsters the discoveries of past experimental thinks, somewhat affirming the presence of a relationship between the factors CAR (X_1), BOPO (X_2), and ROA (Y).

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