



THE INFLUENCE OF BOPO LDR AND LEVERAGE ON FINANCIAL PERFORMANCE (ROA) IN BANKING COMPANIES LISTED ON BURSA EFFECTS INDONESIA

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ARTICLE INFO

ABSTRACT

Keywords:
BOPO,
LDR,
Leverage
ROA

The bank is a financial institution whose function is to collect funds from the public. Commercial banks are also institutions that function to facilitate the flow of payment traffic. Every commercial bank must maintain the soundness of its bank to compete and provide full service to customers. The strength of the bank can be seen from the financial performance of the bank. Financial performance is one of the basic assessments of the company's financial condition that can be done based on an analysis of the company's financial ratios. The company's financial performance can be assessed through various variables. The financial performance of the banking sector, which is published through financial ratios, is grouped into liquidity ratios (LDR), solvency ratios (CAR and *Leverage*), operational efficiency (BOPO). The independent variables in this study are BOPO, LDR, and leverage. The dependent variable is financial performance. This study aims to examine the effect of Operational Efficiency (BOPO), Loan to Deposit Ratio (LDR), and Leverage on Return on Assets (ROA) as a proxy for Financial Performance. The research population is all banking companies listed in the Bursa Effect Indonesia (BEI). The research object was all banking companies listed in the Bursa Effect Indonesia (BEI) in 2010-2014. Sample selection was made by *purposive sampling*. The analytical method used in this study was to perform quantitative analysis, expressed by numbers calculated using statistical methods assisted by computer technology, namely SPSS 20. The data analysis method used in this study is the Multiple Linear Regression analysis method. In performing multiple linear regression analysis, this method requires testing the classical assumptions to get good regression results. The hypothesis testing uses the individual parameter significance test (t statistical) and the determinant coefficient test (R²). The results showed that the BOPO, LDR, and Leverage. Variables significant effect on ROA as well.

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1. Introduction

The bank is a financial institution whose function is to collect funds from the public. The main purpose of a company or bank business is to seek profit or seek profit (Kasmir, 2015). The success of the Indonesian economy cannot be separated from the success of the banking industry, especially its role as a source of financing for domestic companies and industries, agriculture, mining, and other properties. (Harun, 2016) , The State of Indonesia has Commercial Banks that act as financial intermediaries between parties who have Funding funds and Lending funds with parties who need funds. Commercial banks are also institutions that function to facilitate the flow of payment traffic. Every commercial bank must maintain the soundness of its bank to compete and provide the best service to customers. We can see the level of security of commercial banks through the financial performance of these commercial banks.

(Alfabeta Fahmi, 2011), Financial performance is an analysis carried out to understand the implementation of the company and the correct and correct analysis of the financial status so that it can be known whether the company's financial situation is good or bad, which reflects the performance contained. According to (Husnan, 2015) the company's financial performance is one of the bases for assessing the company's financial condition, which can be done based on an analysis of the company's financial ratios. The company's financial performance can be evaluated through various variables. According to (Dendawijaya 2009), the financial performance of banks, which is contained through financial ratios, is grouped into liquidity ratios (LDR), solvency ratios (CAR and *Leverage*), operating expenses for operating income (BOPO). Research purposes of examining the effect of CAR, BOPO, LDR, *leverage*, to see the impact of variables on financial performance in banking companies on the Indonesia Stock Exchange. In this study, the performance measurement tool used is *Return On Assets* (ROA).

(Alfabeta Fahmi, 2011) Financial ratios are divided into liquidity ratios (LDR), solvency ratios (CAR and leverage), operating efficiency (BOPO), and company size, all of which come from internal factors. In this study, the performance measurement tool used is *Return On Assets* (ROA).

Based on (Ali, 2017) Return On Assets (ROA) is a vital profitability indicator to measure a bank's performance. ROA is a ratio that shows the results (*return*) on the number of assets used in the company. ROA is also a measure of effectiveness in managing investments (Kasmir, 2016). ROA focuses on the company's ability to earn profits in its operational activities by

utilizing the assets it owns. According to (Dietrich & Wanzanried, 2009), ROA was chosen because ROA is an effective measuring tool, using assets owned to generate profits; bank assets are more important because most bank funds come from public funds. The determinant of bank performance can also be seen from the bank's operational efficiency, namely the Operating Costs to Operating Income (BOPO) ratio. BOPO is a ratio used to measure the level of efficiency and ability in carrying out their operations. BOPO is used as a measuring tool by comparing operational costs with bank operating income. Following Bank Indonesia regulations, the effective BOPO ratio should not exceed 90%.

Factors that affect the bank's performance can be seen in the level of liquidity ratio is called LDR (Loan to Deposit Ratio). In this case, banks need to maintain liquidity and ensure that they meet their obligations smoothly. Banks with more significant total assets have the opportunity to provide more loans to borrowers, which is expected to generate high returns (Ojalere et al., 2017). Bank Indonesia set the LDR ratio at 110%. Banks cannot rely solely on total assets in running their business and need funds to obtain more significant financing through loans or leverage. (Suad, 2000), the extent to which creditor funds are used to generate performance, the greater the leverage, the greater the risk faced, even if the bank cannot return the funds, it may face liquidation. (Ludigdo, n.d.) shows that leverage has a positive effect on bank performance.

2. Literature Review

2.1 Financial performance

According to (Indonesia 2009), financial performance is the company's ability to manage and control its resources. (Hanafi, 2005), performance is a formal effort carried out by the company to evaluate the efficiency and effectiveness of the company's activities carried out in a certain period. (Skouson, K. Fred, W Steve Albrecht, 1995) *ROA* is a bank's ability to manage the company to obtain overall profits. According to (Rahardja n.d.), *ROA* in banking is calculated from profit before tax to total assets owned by the company. So, in general, *ROA* da pat formulated as follows;

$$ROA = \frac{\text{Net Profit Before Tax}}{\text{Asset}}$$

2.2 Operating Expenses Operating Income (BOPO)

The ratio of operating costs is the ratio between operating expenses and operating income. The bank carries out operational efficiency to determine whether the bank in its operations related to its main business has carried out correctly (following the expectations of management and shareholders) and uses all production factors appropriately and effectively (Kurnia & Mawardi, 2012). According to (Se Bi, 2004), BOPO is the ratio of operating costs to operating income so that it is formulated as follows;

$$BOPO = \frac{\text{Total Operating Expenses}}{\text{Total Operating Income}}$$

2.3 Loan to Deposit Ratio (LDR)

(Kasmir, 2015) defines LDR as a ratio to measure the composition of the amount of credit given to the number of funds from the public and their capital used. According (Bank Indonesia, 2013), LDR is the ratio of loans extended to third parties in rupiah and foreign currencies, excluding loans to other banks, to third-party funds, including demand deposits, savings, and time deposits in rupiah and foreign currencies. Excluding interbank funds. For starters are as follows;

$$LDR = \frac{\text{Credits}}{\text{Third Party Funds}}$$

2.4 Leverage

Leverage is borrowed funds that can be used to increase / leverage profits as it is known that the function of the bank as a mediator where the largest source of bank funds is public deposits which can be used as banking assets as well as capital for operations, then these funds are reused for lending activities in the form of interest income which is the main source of bank income. According to (I. dan A. C. Ghozali, 2007), debt is often referred to ascertain claims on other parties against assets owned by the company, and this is because the assets or services owned by the company are derived from the existence of other parties who provide funds to obtain these assets or services. According to (Sinuraya 1999), to see how much leverage the company uses can be measured through the ratio formulated as follows;

$$\text{Leverage} = \frac{\text{Total Liabilities}}{\text{Total Asset}}$$

3. Research Method

The type of research is causality research. Causality research is a study that aims to determine the effect of independent variables on the dependent variable in a study. This research is associative research used to examine the relationship between two or more variables (Situmorang, S, 2017). The analytical method used in this research is to perform quantitative analysis expressed by numbers which in the calculation use statistical methods assisted by computer technology, namely SPSS 20. The data analysis method used in this study is the Multiple Linear Regression analysis method. In performing multiple linear regression analysis, this method requires testing the classical assumptions to get good regression results (I. Ghozali, 2011). The hypothesis testing uses the individual parameter significance test (t statistical) and the determinant coefficient test (R2). The independent variables in this study are

BOPO, LDR, and leverage. The dependent variable is financial performance. The object of research is all banking companies listed on the Bursa Effects Indonesia in 2010-2014. The object of research is 41 companies, including commercial banks and state-owned banks. Sample selection was made through purposive sampling.

4. Results and Discussion

This study uses multiple linear regression analysis to evaluate the effect of BOPO, LDR, Leverage on Financial Performance. The coefficient of determination is between zero and one. The results of the Coefficient of Determination are as follows;

Table 1
Coefficient of Determination of

Model	R	R Square	Adjusted R Square	Std. The error of the Estimate
1	.845 ^a	.714	.697	.54630

From Table 1, the *adjusted R-Square value* is 0.697. This means that 69.7% of the variation in performance (ROA) can be explained by variations in the BOPO, LDR, and Leverage variables. In comparison, the remaining 30.3% is explained by other variables not defined in this study.

The t-test is a partial test or a separate test between the independent variables on the dependent variable, which can be seen in the table below;

Table 2.
t-test

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	8.264	2.275		3632	.000
	BOPO	-.058	.005	-.738	-12374	.000
	LDR	-.009	.004	-.117	-2337	.021
	LEVERAGE	4623	1.602	-.173	-2948	.004

The results of Table 2 can be made a multiple linear regression equation models as follows Variables:

- 1) BOPO with $t_{count} < t_{table}$ with a significance value of $0.000 < 0.05$. This means that H_0 rejected, H_a accepted. It is concluded that partially BOPO has a significant and negative effect on ROA. This is in line with (Harun, 2016) where BOPO is significant to ROA and shows a negative value. The increasing BOPO reflects the bank's lack of ability to reduce its operational costs, which can cause losses because banks are less efficient in managing their business. If banks run their operations efficiently by reducing BOPO, it is expected that costs will be reduced, which can increase income.
- 2) LDR variable with $t_{count} < t_{table}$ with a significance value of $0.021 < 0.05$. This means that H_0 rejected, H_a accepted. It was concluded that partially LDR had a significant and negative effect on ROA. The results of this study are the following (Suwandi, 2017), which states that LDR has a significant and negative effect on ROA. (Dendawijaya, 2009), if the LDR is higher, the bank's profit will increase (assuming the bank can channel credit effectively) so that the bank's performance will improve. In contrast to the theory, which states that the higher the LDR indicates, the greater the bank's profitability. This difference is caused by an increase in lending or withdrawing funds from the public, which impacts the bank's low liquidity, impacting the loss of public confidence in the bank in the study year so that profitability decreases.
- 3) Leverage variable with $t_{count} < t_{table}$ with a significance value of $0.004 < 0.05$. Means that H_0 rejected, H_a accepted. It is concluded that partially leverage has a significant and negative effect on ROA. The research results conducted by (Leverage et al., 2002) also states that leverage has a significant and negative effect on ROA. According to (Atmaja 2008), the higher the leverage, the greater the company's opportunity to improve performance where leverage is used

to fund assets in expansion and competitive advantage. However, too high leverage can be harmful to performance if the loan's interest payments do not match the profits. According to (Siamat 2004), leverage in financing assets for lending ranges typically from 70%-80%. The difference between this research and the theory is that it is possible that in the research year, it was not appropriate to increase leverage because it was not supported by the ability of creditors to repay funds and loan interest on time due to unstable economic conditions and high-interest rates at that time, making it less profitable for expansion—massive and lending.

5. Conclusions and Suggestions

From the results of research and hypothesis testing that has been done, the following conclusions can be drawn; Simultaneously, BOPO, LDR, and Leverage affect the Financial Performance of the Bank. The limitations in this study are as follows; The rules of using BOPO, LDR, and Leverage variables with banking financial performance described in the regression model are 69.7%, while other variables outside the model explain the remaining 30.3%. Further research is expected to add other independent variables that are suspected of having a strong influence on banking financial performance, for example, the NIM variable, ATO.

References

- [1] Alfabeta Fahmi, I. (2011). *Analisis Kinerja Keuangan*.
- [2] Ali, M. (2017). Pengaruh Net Interest Margin (NIM), Biaya Operasional Terhadap Pendapatan Operasional (BOPO), Loan to Deposit Ratio (LDR) dan Non Performing Loan (NPL) Terhadap Return On Assets (ROA). *Jurnal Riset Akuntansi Dan Keuangan*, 5(2), 1377–1392.
- [3] Atmaja, L. S. (2008). Teori dan praktik manajemen keuangan. *Yogyakarta: Penerbit ANDI*.
- [4] Bank Indonesia. (2013). *Peraturan Bank Indonesia No: 15/15/PBI/2013 tentang Giro Wajib Minimum*.
- [5] Dendawijaya. (2009). *Manajemen Perbankan*. Ghalia Indonesia.
- [6] Dietrich, A., & Wanzenried, G. (2009). What determines the profitability of commercial banks? New evidence from Switzerland. *12th Conference of the Swiss Society for Financial Market Researches, Geneva*, 2–39.
- [7] Ghozali, I. (2011). *Aplikasi Analisis Multivariate dengan Program SPSS*. Universitas Diponegoro.
- [8] Ghozali, I. dan A. C. (2007). *Teori Akuntansi* (3rd ed.). Universitas Diponegoro.
- [9] Hanafi. (2005). *Manajemen Keuangan* (1st ed.). BPFE, Yogyakarta.
- [10] Harun, U. (2016). Pengaruh Ratio-ratio Keuangan Car, Ldr, Nim, Bopo, Npl Terhadap Roa. *Jurnal Riset Bisnis Dan Manajemen*, 4(1), 67–82.
- [11] Husnan, S. (2015). *Dasar-dasar teori portofolio dan analisis sekuritas*.
- [12] Indonesia, I. A. (2009). Pernyataan standar akuntansi keuangan. *Jakarta: Salemba Empat*.
- [13] Kasmir. (2015). *Analisis Laporan Keuangan*. PT Raja Grafindo Persada.
- [14] Kasmir. (2016). *Pengantar Manajemen Keuangan* (II). Kencana.
- [15] Kurnia, I., & Mawardi, W. (2012). Analisis Pengaruh BOPO, EAR, LAR dan FIRM SIZE terhadap Kinerja Keuangan (Studi kasus pada bank umum konvensional yang terdaftar di Bursa Efek Indonesia periode 2008-2011). *Diponegoro Journal of Management*, 1(4), 49–57.
- [16] Leverage, R., Tertimbang, K., Pasar, P., Roa, T., Roe, D. A. N., & Martono, C. (2002). Analisis Pengaruh Profitabilitas Industri, Rasio Leverage Keuangan Tertimbang Dan Intensitas Modal Tertimbang Serta Pangsa Pasar Terhadap "Roa" Dan "Roe" Perusahaan Manufaktur Yang Go- Public Di Indonesia. *Jurnal Akuntansi Dan Keuangan*, 4(2), 126–140. <https://doi.org/10.9744/jak.4.2.pp.126-140>
- [17] Ludigdo, U. (n.d.). Machfoedz. 1999. *Transformasi Nilai Etika Dalam Rangka Peningkatan Profesionalisme Akuntan: Tinjauan Atas Kurikulum Pendidikan Tinggi Akuntansi. Makalah Dalam Diskusi Panel Nasional Mahasiswa Akuntansi Di Unibraw: Malang*.
- [18] Olalere, O. E., Bin Omar, W. A., & Kamil, S. (2017). Bank Specific and Macroeconomic Determinants of Commercial Bank Profitability: Empirical Evidence from Nigeria. *International Journal of Finance & Banking Studies* (2147-4486), 6(1), 25. <https://doi.org/10.20525/ijfbs.v6i1.627>
- [19] Rahardja, P. M. (n.d.). Mandala, 2004. *Uang, Perbankan, Dan Ekonomi Moneter (Kajian Kontekstual Indonesia)*. Lembaga Penerbit FEUI. Jakarta.
- [20] Se Bi. (2004). Perihal Sistim Penilaian Tingkat Kesehatan Bank Umum. *Se Bi Nomor 6/23/Dpnp Tanggal 31 Mei 2004*.
- [21] Siamat, D. (2004). *Manajemen Lembaga Keuangan, Edisi Keempat*. Jakarta: Lembaga Penerbit Fakultas Ekonomi Universitas Indonesia.
- [22] Sinuraya, M. (1999). *Teori Manajemen Keuangan (Edisi Revisi)*. Jakarta: Lembaga Penerbit Fakultas Ekonomi Universitas Indonesia.
- [23] Situmorang, S. H. (2017). *Riset Pemasaran*. Usu Press.
- [24] Skouson, K. Fred, W Steve Albrecht, J. D. S. (1995). *Financial Accounting* (United Sta).
- [25] Suad, H. (2000). *Manajemen Keuangan Teori dan Penerapan. Edisi Ketiga*. Yogyakarta: UPP AMP YKPN.
- [26] Sunarto, & Budi, A. P. (2009). Pengaruh Leverage, Ukuran dan Pertumbuhan Perusahaan Terhadap Profitabilitas. *Tema*, 6(1), 86–103.
- [27] Suwandi, J. (2017). Pengaruh CAR, NPL, BOPO, dan LDR terhadap ROA pada BUSN devisa. *Jurnal Ilmu Dan Riset Manajemen*, 6, 1–21.