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THE EFFECT OF LIQUIDITY AND PROFITABILITY TO RETURN ON INVESTMENT

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ABSTRACT

The purpose of this research is to know empirically about influence Liquidity and Profitability to Return on Investment. In this research, the method used the quantitative approach with the data source used is the financial statements 2010 - 2015. The study area is the Bank Mega located in South Jakarta. Data analysis technique were computed using multiple regression, correlation coefficient, determination coefficient, partial test and simultaneous test. Statistical results indicate there is showed that partially and simultaneously there is a significant effect of Liquidity and Profitability to Return on Investment (ROI).

Keywords: *liquidity, profitability and return on investment.*

INTRODUCTION

In 2015, Bank Mega strengthened their capital positions by using the momentum of the government's policy in the revalued assets. Through this step, Liquidity or Capital Adequacy Ratio of Bank Mega after considering credit, operational and market risk aspects reached 23%. These measures reflect Bank Mega commitment to maintaining a sound balance sheet for sustainable business growth. The control of liquidity by monitoring some third-party funds that harmonized with the balance between the ratio of LDR (Loan to Deposit Ratio) to target total assets to be achieved. Bank Mega Policy focus set LDR ratio in the range of 65%-70%.

Bank Mega posted earnings after tax at the end of 2015 increased by 88% over the previous year. This increase is getting contributions from net interest income and fee-based income and gains on the sale of securities. Operating income was 14%, 20.3% in net interest income and fee-based income by 39% when compared to the previous year. However, it must recognize that the achievement of credit and total third-party funds decreased because of macroeconomic conditions. In anticipation of a slowing economy, the Bank Mega run a more conservative approach in dealing with this condition, by making prudent loans to companies that have tested and real industrial sectors. With this method, the credit portfolio decreased by 3.76%.

The largest decrease occurred in the micro-finance by 35% in line with the strategy of Bank Mega to more conservative on this segment. Of these total loans, the segment Corporate and Credit Cards show improvement compared to the previous year. Third party funds decreased 2.6% from 2014. With macro conditions leading to slowing growth in credit, third-party funding achievement with a loan to Deposit Ratio target at 65%.

Also, other financial indicator ratios also show a positive achievement. Current Asset Ratio at the end of 2015 to 22.85%, reflecting the strong capital structure to support business growth in future. Net Interest

Margin grew to 6.04% from the previous period of 5.27%. It shows that the Bank targets set out in the 2015 business plan had to realized well. As for some indicators that have not met the target is inevitable, given the volatile economic and industrial conditions throughout the year 2015 so that the Bank must make various adjustments to keep the Bank continues to be in the healthy category. The purpose of this study is to find out the Return on Investment in Bank Mega by investigating the following factors: profitability and liquidity.

Return on Investment

Return on Investment is a tool to measure the company's ability to generate profits with all available assets in the company by looking at how much the level of profit generated on a few investments that have been invested (Sutrisno, 2011; Munawir 2007; Harahap, 2007; Mulyadi, 2011; Simamora. 2012; Syamsudin, 2009). It is “frequently used to compare alternative investment strategies” (Sonnenreich, et al, 2006)

Return on Investment can also see by combining two factors, namely: (1) Turnover from operating assets and (2) Profit Margin. The amount of Return on Investment will change if there is a change in profit margin or asset turnover, either each or both. Thus, the head of the company may use either or both to increase Return on Investment. Enterprises enhance it by increasing the profit margin is concerned with the business sector to strengthen the efficiency of production, sales, and administration. Return on Investment increasing by enlarging assets turnover is the policy of investment funds in various assets, either current assets or fixed assets.

The operating profit ratio to sales is complementary with the ratio of net income to Return on Investment. “ROI is a clearly defined and quantifiable objective and limited time, energy, or resources, it makes sense to choose options that maximize the return per unit investment” (Murdoch, et al, 2007). Profit margin is intended to determine the efficiency of the company by looking at the size of the operating profit about sales, while "operating turnover" aims to establish the effectiveness of the business to the rotational speed of the operating assets in each period.

The result of mixing both profit margin and operating assets turnover efficiency determines the low earning power. Therefore, the higher the level of profit margin or operating assets turnover of each or both would lead to higher earning power. "The amount of Return on Investments will change if there is a change Profit Margin or Asset Turn Over, either each or both (Munawir, 2007)

Liquidity

“Liquidity regulation is an important element of the Basel III supervisory framework for banks” (Van Den End & Kruidhof, 2013). Liquidity ratio is often used by companies and investors to determine the level of ability of the company in meeting the obligations that are short-term. It is like paying a salary, or a debt to a supplier who has matured. However, sometimes there are some companies were unable to pay the debt at a predetermined time, the reason the company does not have sufficient funds to cover the debt that has been maturing. The case would interfere with the relationship between the business and the creditors, as well as distributors. In the long term, the case will have an impact on customers. In the end, the company will be experiencing an economic crisis; it is because the company did not gain the trust of customers.

The liquidity ratio is a corporation's ability to meet short-term obligations; it is essential for a company associated with the change due to cash assets (Kasmir, 2012; Sartono, 2008; Brigham dan Houston, 2010; Subramanyam, 2012).

The liquidity ratio, or often called the working capital ratio is a ratio used to measure how its liquid a company, by comparing all the components in current assets, liabilities components lancer (Kasmir, 2012), “it directly influences the liquidity and profitability of the company” (Iqbal, Ahmad, & Riaz, 2014). The company's inability to pay its obligations, especially short-term (overdue) caused by various factors, namely: (1) It may be because it is the company currently does not have to fund at all; and (2) It may be possible for the enterprise to have funds, but when the maturity of the company does not have the funds (not enough funds in cash so should wait until a certain time, to disburse other assets such as collect receivables, sell securities, other assets).

Liquidity ratio calculation is enough to provide benefits for various parties interested in the company, is the owner of the company and management company to assess the performance of the enterprise or outside parties, such as creditors or providers of funds for corporations, such as banks or distributors and suppliers. The main liquidity ratio is current ratio calculated by dividing current assets by current liabilities (Kasmir, 2012; Lukas, 2008). Current assets include cash, tradable securities, accounts receivable, and inventories. If the company is experiencing financial difficulties, it will be slow in paying bills (business debt), bank bills, and other obligations that will increase current liabilities. However, if current liabilities rise faster than current assets, the current ratio will fall, and this is a sign of a problem.

The latest version of current ratio measurement is reducing inventories and receivables. Current assets are company assets that can be made money in a short time (maximum one year). Current assets components include cash, bank, securities, accounts receivable, inventories, prepaid expenses, accrued income, loans granted and other current assets. Current liabilities are short-term corporate liabilities (maximum one year). That is, this debt should repay within one year. Current debt components consist of trade payables, one-year bank debts, notes payable, salary debt, tax debt, dividend payable, upfront costs, long-term debt, and other short-term debt. There are four types of sources of short-term debt according to Luke (2008) are as follows; (1) Accruals; (2) Trade payables; (3) Bank loans; (4) Commercial Market.

Profitability

Profitability is the ability of a business entity to earn profits from sales, total assets and capital itself by dividend distribution company (Sartono, 2010; Michelle dan Megawati, 2005; Shapiro, 2010; Hanafi dan Halim, 2006). “Bank profitability is the ability of a bank to generate revenue in excess of cost, in relation to the bank’s capital base” (Lartey, et al, 2013).

It showed that the company did a great fund placement in the current assets side. This significant placement of funds has two very different effects. On the one hand, corporate liquidity is getting better. However, on the contrary, the company loses the opportunity to earn an extra profit, because the funds that should use for profitable investment for the enterprise, are reserved to meet liquidity. Due to Bank Indonesia as a manager and supervisor of banking more priority value of a bank's profitability as measured by assets of most funds from third parties (Bowo, 2013). The greater the profitability ratio, the greater the company's liquidity (Nugroho, 2012). The company's ability to generate profits will be able to attract investors to invest their funds in expanding its business. Otherwise, a low level of profitability will cause investors to withdraw cash.

Meanwhile, for the company itself, profitability can be used as an evaluation of the effectiveness of the management of the business entity (Brigham, 2011).

Profitability also has significance in an attempt to survive in the long term, because the profitability of enterprises indicates whether it has good prospects for the future. Thus, every business entity will always try to improve profitability, because the higher level of profitability of a business entity then the survival of the business entity will be more assured (Secchi dan Tamagni, 2008).

These ratios are needed to assess potential changes in potential economic resources in the future, to predict the company's capacity to generate cash (and cash equivalents) and to formulate the firm's efficient use of additional resources (Prastowo, 2008). Profitability ratios can use as control tools for management; it can be utilized by the internal to set targets, budgets, coordination, evaluation results of the implementation of the company's operations and the basis for decision-making. (Harahap, 2011).

CONCEPTUAL FRAMEWORK

In this research, used 3 (three) variables namely Liquidity (X1) and Profitability (X2) which allegedly affect Return on Investment (ROI) (Y) at Bank Mega. Based on the three variables there is a research question that whether there is influence between independent variables to Dependent Variables (figure 1).

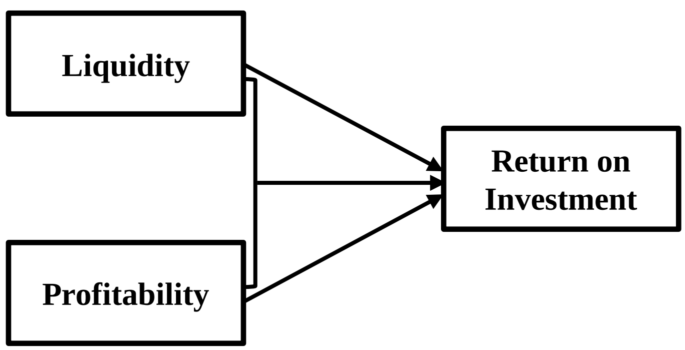

Figure 1
Proposed Conceptual Framework

From the proposed conceptual framework in figure 1, there are between the financial performance factors in Bank Mega associated with the performance attributes that are expressed as independent variables consisting of: Liquidity Ratio (X1) and Profitability (X2), to Return on Investments (Y) at Bank Mega:

H1: Liquidity has positive influence on Return on Investment.
H2: Profitability has a positive effect Return on Investment.
H3: Liquidity and Profitability has a significant positive effect to Return on Investment.

RESEARCH METHODOLOGY

In this research, the method used quantitative approach. Quantitative research is a method to test certain theories by examining the relationship between variables (Noor, 2015). This research is at the head office of Bank Mega, with the data used are five periods from 2010 to 2015. Activities in data analysis are classifying data based on variables and secondary data types, tabulating data based on variables of all secondary data, presenting data for each variable who researched, perform calculations to answer the problem formulation, and perform calculations to test the hypothesis that has been proposed. Data analysis technique were computed using multiple regression analysis. In the test with a correlation coefficient (r test), determination coefficient (r square test), Partial test (t-test) and simultaneous test (f test). Data analysis was assisted using Statistical Package for the Social Sciences version 22.

RESULTS

Normality

Normality test of data is done in two ways that are made a histogram of standardized residual distribution and made normal graph probability plot for the maximum result of the computerized test, because of following.

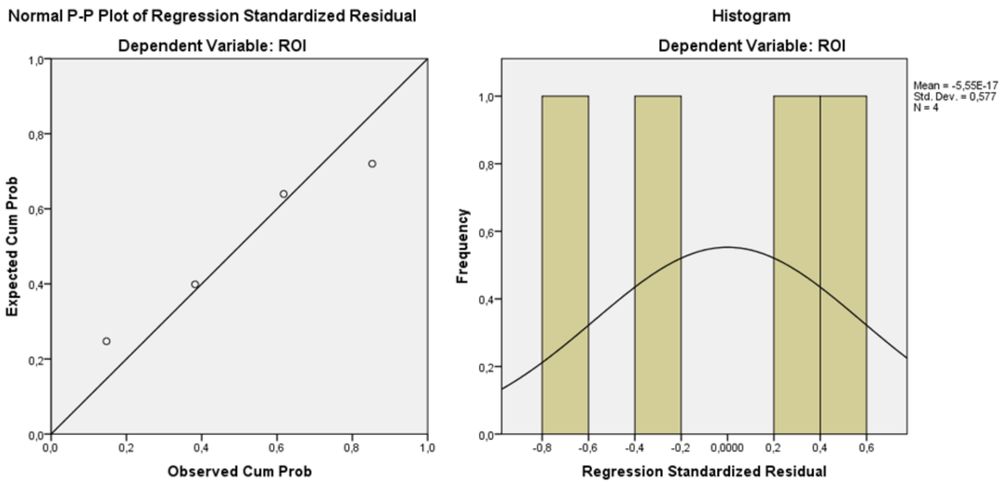

Chart 1.
Normality Test

This result is used Normal P-Plot of regression Standardized Residual as in the picture above, the results seen that the dots of data that spread around the diagonal line and the spread of the data points are in the direction of following the diagonal line, this means the data used in research meet the assumption of Normality. The second test of Normality is with Histogram, in this test illustrates that the spread of data normally spread to form the Normal curve, which means that the standard residual regression already meets the Normality.

Correlation

Correlation test to know the relationship between Liquidity Variable (X1), and Profitability (X2), to Return on Investment (Y), as follows.

Tabel 1.
Correlation Test

		Liquidity Ratio	Profitability Ratio	Return on Investment
Liquidity Ratio	Pearson Correlation	1	.282	.031
	Sig. (2-tailed)		.588	.954
	N	6	6	6
Profitability Ratio	Pearson Correlation	.282	1	.003
	Sig. (2-tailed)	.588		.996
	N	6	6	6
Return on Investment	Pearson Correlation	.031	.003	1
	Sig. (2-tailed)	.954	.996	
	N	6	6	6

From the table above can be explained that (1) there is a positive relationship between 3.1% (Liquidity) and 0.3% (profitability) to Return on Investment (ROI); and (2) there is a positive relationship between profitability with Liquidity of 28.2%.

Multiple Linear Regression Test

From the calculation result of multiple regression analysis (table 3) can be obtained the following equation: $\bar{Y} = 0{,}028 + 0{,}004X1 + 0{,}001X2$. Each independent variable on the regression equation proved to be significant.

Table 2.
Result of Multiple Linear Regression

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. error	Beta		
1	**(Constant)**	.028	.049		.561	.001
	Liquidity Ratio	.004	.063	.034	4.062	.004
	Profitability Ratio	.001	.027	.012	3.005	.002

a. Dependent Variable: Return on Investment

The results of Table 3 show the multiple linear regression can be interpreted as follows:

a. The constant of 0.028 means that if Liquidity and profitability have to value is 0, then Return on Investment of 2.8%.
b. The Liquidity regression coefficient of 0.004 means that if other independent variables are fixed, and liquidity increased 1%, then the Return on Investment will experience an increase of 0.4%.
c. The profitability regression coefficient of 0.001 means that if other independent variables are fixed, and profitability increases 1%, then the Return on Investment will increase by 0.1%.

Correlation Coefficient Test and Determination Coefficient Test

Table 3.
Results of the Correlation Coefficient Test and Determination Coefficient Test

Model	R	R square	Adjusted R Square	Std. Error of The Estimate	Change Statistics		
					df1	df2	Sig. F Change
1	.793[a]	.629	.961	.00935	3	2	.001

a. Predictors: (Constant), Liquidity, Profitability
b. Dependent Variable: Return on Investment

Based on table 4, that the correlation coefficient between Liquidity and profitability to Return on Investments of 0.793, this means the relationship between the three variables is strong and positive. If the value of liquidity and profitability increases, then the value of Return on Investment will also increase. The result of the coefficient of determination (r square) of 0.629 or 62.9%, it illustrates that the influence of liquidity and profitability on Return on Investment (ROI) has an influence by other factors of 37.1%, in this case not in the author.

Hypothesis testing

The results of a hypothesis test are using t-test by comparing t-test with t-table where the significance level used is 5%. Hypothesis test results can be seen in table 2, as follows

Table 4.
Result of t-test on Liquidity to Return on Investment

Model	t-test	t-table	Sig.
Liquidity Ratio	4.062	1.637	.004
Profitability Ratio	3.005	1.637	.002

The result of hypothesis test 1, found that t-test equal to 4,062 where above t table 1.637 with significance level equal to 0,4%, hence hypothesis 1 accepted, meaning partially there is positive and significant influence between liquidity to Return on Investment.

The result of hypothesis test 2, it is found that t-test is 3.005 where above t table 1.637 with significance level equal to 0,2%, hence hypothesis 2 accepted, it means partially there is positive and significant influence between profitability to Return on Investment.

Simultaneous Test (ANOVA)

The simultaneous test is used to verify the hypothesis of the two independent variables (liquidity and profitability) have a significant effect on Return on Investment (ROI). The results are as follows.

Table 5.
ANOVA[a] Test Results

Model		Sum of Square	df	Mean Square	F	Sig.
1	Regression	.000	2	.000	11.002	.001[b]
	Residual	.003	3	.001		
	Total	.003	5			

a. Dependent Variable: Return on Investment
b. Predictors: (Constant), Liquidity, Profitability

The result of the test of hypothesis 3, found that F test equal to 11,002 where above F table 9.55 with significance level equal to 0,2%, hence hypothesis 3 accepted, meaning simultaneously there is positive and significant influence between liquidity and profitability to Return on Investment.

DISCUSSION

From the above calculations, the authors observed that the contribution of liquidity is more significant than profitability in influencing Return on Investment, this is because Bank Mega has focused on strengthening financial fundamentals and maximizing business growth by monitoring several third-party funds that are aligned with the balance between the ratio of LDR (Loan to deposit ratio) to target total assets to be achieved. The growth of financial liquidity may negatively influence the company profitability (Alagathurai, 2013).

Furthermore, Bank Mega has also created innovative programs for customers, improving quality and service features to improve customer satisfaction in banking experience to maintaining and enhancing the quality of productive assets. Also, monitoring of accounts in the loan portfolio is consistent; it is intended to improve profitability through automation of operational processes to create cost-effectively and increased the productivity of human resources and other expenses. To build synergy with retail companies in the Corporate group to increase the volume and credit card transactions of Bank Mega, this has its uniqueness than others.

CONCLUSION AND RECOMMENDATION

Conclusions

Analysis revealed there was a positive and significant influence between profitability to Return on Investment. Furthermore analysis also revealed there was a positive and significant influence between liquidity to Return on Investment. Additionally, the results of the study simultaneously state that there is a positive and significant influence of both variables (liquidity and profitability) affect the Return on Investment Bank Mega.

Recommendation

The research results related to Profitability, that Bank Mega must monitor cost of funds, increase fee-based income with various features and product innovation to increase revenue, cost control: through automation of operational process to create cost efficiency and increase human resource productivity and build synergy with retail companies to increase the volume and credit card transactions, which makes uniqueness more than others.

Furthermore, related to Liquidity, Bank Mega should be able to control liquidity by monitoring the amount of third-party funds that are aligned with the balance between the LDR (loan to deposit ratio) with target total assets will be achieved as well as maintaining and improving the quality of earning assets were healthy a priority management as a whole by crediting prudently to companies that have proven track record as well as to the industry sector is good. Additionaly, Bank Mega continues to control and increase Return on Investment (ROI) as it was achieved in 2015 at 6.81% or up 5.63% from the previous year 1.18%.

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