THE EFFECT OF OPERATIONAL COSTS BUDGET AND INCOME BUDGET ON RETURN ON ASSETS IN JASA MARGA (PERSERO) TBK BELMERA BRANCH MEDAN

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ABSTRACT

This research was conducted aimed at knowing the Effect of Operational Cost Budget and the Effect of Income Budget on Return On Asset at PT. Jasa Marga (Persero) Tbk Belmera Medan Branch. Return On Asset is a measurement of a company's ability to manage assets it has to obtain profits from both investment and own capital. Types of data in this study using quantitative data and data sources used are primary data in the form of financial statements of PT. Jasa Marga (Persero) Tbk Belmera Medan Branch 2007-2016.

The data collection technique used is by using documentation techniques. The test used in this study is multiple linear regression which is used as an analytical tool to test the hypothesis used t-test, F test, and determination coefficient test using SPSS16.0.

The results of this study indicate that partially the Operational Cost Budget has a significant effect on Return On Asset and Revenue Budget has a significant effect on Return On Asset. and simultaneously the Operational Cost Budget and Income Budget have a significant effect on Return On Asset at PT. Jasa Marga (Persero) Tbk Belmera Medan Branch 2007-2016.

Keywords: Operational Cost Budget, Income Budget And Return On Assets.

INTRODUCTION

In facing the era of globalization which is marked by the rapid development of Indonesia's economy at this time, companies are required to be able to further improve their performance in order to survive in the face of the ever-changing economic development. The success of a company is generally achieved due to management's ability to control and forecast both the short and long term of the company.

The right planning is the key to the success of managers in controlling a company. Good planning must be able to be connected between the strengths and weaknesses of the company. To realize the achievement of goals effectively and efficiently in generating company profits measure using the Profitability ratio. Profitability Ratio is an analysis that is used to make comparisons of financial data as information assessing a company's ability to obtain or seek profits. This ratio also provides a level of effectiveness of a manager in managing the management of a company. This can be seen from the profits generated by the company both in sales and investment income earned.

An indicator used in assessing the profitability of a company is by using return on assets. According to Hery (2017, p.193) Return On Asset is a ratio that shows how much assets contribute to creating net income. In other words, this ratio is used to measure the company's ability to manage assets or every rupiah embedded funds from total assets to be an advantage for the company. To obtain a high Return On Asset level, company managers are required to be able to control or predict every company's planning including budget. Budget is a planning or forecasting that is done to forecast a company in the present and the future.
But in the research that I made, I used the operational cost budget as one of the activities to forecast or plan a company to achieve its objectives. According to Rudianto (2013, p.67) Budget Operational Costs is a company work plan that covers all the main activities of the company in obtaining income during a certain period. In addition to the operational budget, researchers also use income budgets as a plan of planning that is designed to plan revenue budgets in achieving company goals.

According to Rudianto (2013, p.67) Revenue Budget is a plan made by a company to earn income for a certain period of time. In managing a company, a policy is needed, namely by arranging a budget as one of the tools used in planning and controlling a company. the budget can provide credible projections and considerations regarding its planning before implementation of the results.

Without planning, a company performance cannot run effectively and efficiently because to do or take a decision, it is necessary to look first at how the company is currently and in the future. One of the State-Owned Enterprises (BUMN) is PT Jasa Marga (Persero) Tbk Belmera Medan Branch which is a company engaged in toll road services.

THEORETICAL REVIEW

Return on Asset

Return On Asset is part of the profitability ratio or as a profitability ratio used to measure a company's ability to generate profits from the normal activities of a business or business carried out by a company. according to Rudianto (2013, p.189) "Profitability is a measure of corporate performance evaluation that shows the final results of a number of policies and decisions taken by management of the company".

Profitability ratio is a ratio that describes the company's ability to generate profits through the ability of its resources. According to Kasmir (2012, p.196) "Profitability is a ratio to assess a company's ability to seek profits". This ratio also gives a measure of the management effectiveness of a company. this is indicated by profits generated from sales and income from investment.

Based on the above understanding it can be concluded that profitability is a measure made by companies to assess performance in describing company activities to obtain maximum profits obtained from sales and investment income of companies

Operational Cost Budget

A company can be said to be good if it is able to plan every operational cost of the company to plan or control operating activities carried out in order to obtain maximum profit or profit. According to Badric (2013, p. 114) "Budget for operational costs is the activities carried out by a company in order to obtain profits". Based on the above understanding it can be concluded that the budget for operational costs is an activity or activity carried out in a company in order to obtain profits from every activity carried out within the company

According to Nafarin (2009, p.14) "Budget for Operational Costs is a budget that is made to carry out the company's income statement". Based on the above understanding it can be concluded that the operational cost budget is an activity carried out by the company to prepare or plan the company's income statement where this report is made to see the company's development in earning profits.

Company can be said to be good if it is able to plan every operational cost of the company to plan or control operating activities carried out in order to obtain maximum profit or profit.According to Badric (2013, p. 114) "Budget for operational costs is the
activities carried out by a company in order to obtain profits”. Based on the above understanding it can be concluded that the budget for operational costs is an activity or activity carried out in a company in order to obtain profits from every activity carried out within the company.

In the activity of obtaining company profits, the budget is used as a tool to plan a company budget which includes the budget of income, production, labor costs and so on in a certain period and time. According to Samryn (2012, p.211) Operational Cost Budget is a budget that includes the income, production and other budgets to obtain income in a certain period of time.

**Income Budget**

The income budget is the estimated income that will be obtained by the company in managing the activities of its company. Even though it is good for the plan or estimate made by a company it will be possible for the company to manage each company's assets in this period and in the future. According to Rudianto (2013, p.67) "Revenue Budget is a plan made by a company to earn income for a certain period of time". Based on the above understanding it can be concluded that the income budget is a plan made by the company to be able to obtain maximum profits in a certain period of time from each activity or activity carried out by the company.

To be able to obtain the maximum income the company is asked to be more systematic in managing a company's income budget from time to time in order to get good results in a certain period and in the future. According to Munandar (2010, p. 30) "Revenue Budget is a budget that plans systematically and in detail about the income obtained by the company from time to time during a certain period"

Every company must expect good sales that will affect the level of income of a company can further increase in the future and be able to generate maximum profits for the company. According to Raharja (2011, p.141) "The Sales or Revenue Budget is an initial step or arrangement used in the preparation of other budgets.

If the income budget is a key budget because the budget is prepared before preparing other budgets. Because other budgets depend on sales or revenue projections which are the main sources of company revenue. According to Darsono (2010, p.16) "Income or sales budget is a reference for making the entire company budget, profit budget which includes gross profit, operating profit, net income (Earning After Tax), and investment budget.

Based on the above understanding it can be concluded that the revenue or sales budget is a reference for making a company budget including investment budget. Where a budget cannot be prepared before making or compiling an income budget.

**Hypothesis**

Based on the identification of the formulation of the problem and the theoretical foundation and the support of previous research that has been studied, the following hypotheses can be arranged:

1. The operational cost budget has an effect on Return On Asset at PT Jasa Marga (Persero) Tbk Belmera Medan Branch
2. The income budget has an effect on Return On Asset at PT Jasa Marga (Persero) Tbk Belmera Medan Branch.
3. The operational cost budget and revenue budget have an effect on Return On Asset at PT Jasa Marga (Persero) Tbk Belmera Medan Branch.
METHODOLOGY OF RESEARCH

The research approach taken is to use an associative research approach. According to Sugiyono (2016, p.89) Associative Approach is a statement that shows a temporary guess about the relationship between variables with one another. In this study, the author wants to know the effect of the operational cost budget and income budget on Return On Assets. The research approach uses a type of quantitative data based on the testing of theories compiled from various variables, measurements involving numbers and analysis using statistical procedures.

The data technique in this study was carried out by documentation study with tests (Testing of Classical Assumptions, Data Normality Test, Multicollinearity Symptoms Test, Heteroscedasticity Symptom Test, Autocorrelation Symptom Test, Multiple Linear Regression). Hypothesis Testing: (Partial Test t Test, F Test, Determination Coefficient (R-Square).

RESULT AND DISCUSSION

Result
Normality Test

Normality test aims to test whether in an independent variable regression or both have a normal distribution or do not have a normal distribution. A good regression model is to have normal data or close to normal data. One method to determine normality is to use graph analysis methods, either by looking at the graph histogram or by looking at the normal probability plot.

Picture 1
Normality Test P – Of Regression Standardized Residual Plots

In the normal p-plot graph shown in the figure above that the data spreads around the diagonal line and follows the direction of the diagonal line, it can be concluded that the regression model has met the assumption of normality.

Multicolinearity

Multicollinearity test aims to test whether there is a correlation between independent variables in the regression model. If the regression model occurs
multicollinearity, then the regression coefficient cannot be estimated and the standard error value becomes infinite.

### Tabel 1
Results of Multicolinearity Test

<table>
<thead>
<tr>
<th>Coefficients</th>
<th>Collinearity Statistics</th>
</tr>
</thead>
<tbody>
<tr>
<td>Model</td>
<td>Tolerance</td>
</tr>
<tr>
<td>1 (Constant)</td>
<td>.101</td>
</tr>
<tr>
<td>Anggaran Biaya Operasional</td>
<td>.101</td>
</tr>
<tr>
<td>Anggaran Pendapatan</td>
<td>.101</td>
</tr>
</tbody>
</table>

*a. Dependent Variable: Return On Asset*

Based on the above table when processed using SPSS can be seen that the value of each variable tolerance smaller than VIF < 10: This proves that the value of each variable VIF multicollinearity free of symptoms.

**Heterokedastisity Test**

Heterokedasticity test aims to test whether the regression value variance occurs from residual inequality, one observation to another observation is different. Whereas if there is an inequality of variance from the residual observations one to another observation remains then it is called homokedasticity or heterokedasticity does not occur.

From the results heterokedastisity test seen that there is a clear pattern, and the point - the point spread above and below zero on the Y axis, then identifying not happen heterokedastisity. It can be concluded that there is no heterokedastisity in regression models.

**Multiple Linear Regression Analysis**

In analyzing the data used multiple linear regression analysis. Where multiple linear regression analysis is useful to determine the effect of each independent variable on the dependent variable.
<table>
<thead>
<tr>
<th>Model</th>
<th>Unstandardized Coefficients</th>
<th>Standardized Coefficients</th>
<th>Collinearity Statistics</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>B</td>
<td>Std. Error</td>
<td>Beta</td>
</tr>
<tr>
<td>1 (Constant)</td>
<td>1.218</td>
<td>.068</td>
<td></td>
</tr>
<tr>
<td>Anggaran Biaya Operasional</td>
<td>.264</td>
<td>.054</td>
<td>2.612</td>
</tr>
<tr>
<td>Anggaran Pendapatan</td>
<td>-.326</td>
<td>.081</td>
<td>-2.143</td>
</tr>
</tbody>
</table>

From the table above, we know the values as follows:

- Constants = 1.218
- Operational Cost Budget = 0.264
- Income Budget = 0.326

These results are entered into multiple linear regression equations so that the following equations are known:

\[ Y = 1.218 + 0.264 - 0.326 + \varepsilon \]

Explanation:

1. A constant of 1.218 with the direction of a positive relationship shows that if the independent variables, namely the Operational Cost Budget (X1) and the Revenue Budget (X2) are considered constant. Then the Return On Assets has increased by 1.218 or by 12.18%.
2. \( \beta_1 \) amounting to 0.264 with the direction of a positive relationship indicating that each increase in the Operational Cost Budget will be followed by an increase in Return On Asset of 0.264 or 2.64% assuming other variables are considered constant.
3. \( \beta_2 \) sebesar -0.326 dengan arah hubungan negative menunjukan bahwa setiap penurunan Anggaran Pendapatan maka akan diikuti dengan penurunan Return On Asset sebesar -0.326 atau sebesar 3.26%.

Hypothesis Test

Partial Test (t-test)

Testing the influence of variables - the independent variable (X) to variable dependent variable (Y):
### Table 3
**Partial Test Results (t test)**

<table>
<thead>
<tr>
<th>Model</th>
<th>Coefficients</th>
<th>Standardized Coefficients</th>
<th>t</th>
<th>Sig.</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Unstandardized Coefficients</td>
<td>Beta</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>B</td>
<td>Std. Error</td>
<td></td>
<td></td>
</tr>
<tr>
<td>1 (Constant)</td>
<td>1.218</td>
<td>.068</td>
<td>17.888</td>
<td>.000</td>
</tr>
<tr>
<td>Anggaran Biaya Operasional</td>
<td>.264</td>
<td>.054</td>
<td>2.612</td>
<td>.002</td>
</tr>
<tr>
<td>Anggaran Pendapatan</td>
<td>-.326</td>
<td>.081</td>
<td>-2.143</td>
<td>.005</td>
</tr>
</tbody>
</table>

**The effect of the budget for operational costs on Return On Asset**

The value of \( t_{count} \) for the Budget variable for Operational Costs is 4.902 and \( t_{table} \) with 5% known as 2.308. Thus \( t_{count} \) is greater than \( t_{table} \) (4.902> 2.308) and a significant value of 0.002 (smaller than 0.05) means that Ho is rejected and Ha is accepted. Based on these results it can be concluded that Ho is rejected and Ha is accepted, this shows that partially the Operational Cost Budget has a significant effect on Return On Asset. With the increase in the Operational Cost Budget, it is followed by an increase in Return On Asset at PT Jasa Marga (Persero) Tbk Belmera Medan Branch.

**Influence of Income Budget on Return On Asset**

The \( t_{count} \) for the Income Budget variable is -4.023 and \( t_{table} \) with \( \alpha = 5\% \) is known as 2.306. Thus the \( t_{count} \) is smaller equal to \(-table (-4.023 <+2.308) \) and a significant value of 0.005 (smaller than 0.05) means that Ho is rejected and Ha is accepted, this shows that partially Income Budget has a significant effect on Return On Assets. This means that with increasing income from sales and investment, it will increase the working capital or assets owned by the company. so that with the increase in the Revenue Budget, it will be followed by an increase in Return On Assets at PT Jasa Marga (Persero) Tbk Belmera Medan Branch.

**Simultaneous test (F-test)**

F test used to determine whether the overall independent variable have an effect on the dependent variable.

### Table 4
**Simultaneous test results (F test)**

<table>
<thead>
<tr>
<th>Model</th>
<th>Sum of Squares</th>
<th>df</th>
<th>Mean Square</th>
<th>F</th>
<th>Sig.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Regression</td>
<td>.488</td>
<td>2</td>
<td>.244</td>
<td>13.949</td>
<td>.004b</td>
</tr>
<tr>
<td>Residual</td>
<td>.122</td>
<td>7</td>
<td>.017</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>.610</td>
<td>9</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

a. Predictors: (Constant), Anggaran Pendapatan, Anggaran Biaya Operasional
b. Dependent Variable: Return On Asset

The ANOVA test (analysis of variance) in the table above, \( F_{count} \) is 13.949 with a significant level of 0.004 while \( F_{table} \) is known as 4.74. Based on these results it can be
seen that $F_{count} > F_{table}$ (13.949 > 4.74) Ho refused Ha accepted. So it can be concluded that the variable Operational Cost and Income Budget variables together have a significant effect on Return On Asset at PT Jasa Marga (Persero) Tbk Belmera Medan Branch.

### The Coefficient of Determination (R-Square)

The coefficient of determination is used to determine the percentage of the effect of the dependent variable with the independent variable is by squaring the coefficients and expressed as a percentage (%).

<table>
<thead>
<tr>
<th>Model</th>
<th>R</th>
<th>R Square</th>
<th>Adjusted R Square</th>
<th>Std. Error of the Estimate</th>
<th>Durbin-Watson</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>.894$^a$</td>
<td>.799</td>
<td>.742</td>
<td>.13223</td>
<td>.866</td>
</tr>
</tbody>
</table>

a. Predictors: (Constant), Anggaran Pendapatan, Anggaran Biaya Operasional  
b. Dependent Variable: Return On Asset

In the table above the results of the overall regression analysis show that the R value of 0.894 indicates that correlation or relationship between Return On Assets (dependent variable) and the operational budget and income budget have a very strong level of relationship that is equal to:

$$D = R^2 \times 100\%$$

$$D = 0.896 \times 100\%$$

D = 89.6%  

Adjusted R (R2) or the coefficient of determination is 0.742. This number identifies that Return On Assets (dependent variable) is able to be explained by the Operational Cost Budget and Income Budget of 79.9%, while the remaining 20.1% is explained by other reasons which are not thorough in this study. Then the standard error of the estimate is 0.13223 or 0.13 while this small number will make the regression model more appropriate in predicting Return On Asset.

### DISCUSSION

**The effect of the budget for operational costs on Return On Asset**

The value of $t_{count}$ for the Budget variable for Operational Costs is 4.902 and $t_{table}$ with 5% known as 2.308. Thus $t_{count}$ is greater than $t_{table}$ (4.902 > 2.308) and a significant value of 0.002 (smaller than 0.05) means that Ho is rejected and Ha is accepted. Based on these results it can be concluded that Ho is rejected and Ha is accepted, this shows that partially the Operational Cost Budget has a significant effect on Return On Asset. With the increase in the Operational Cost Budget, it is followed by an increase in Return On Asset at PT Jasa Marga (Persero) Tbk Belmera Medan Branch.  

This means that the high Operational Cost Budget gives a poor indication in the sense that there is a waste of costs in the implementation of the company's operating activities, and a high Operational Cost Budget has a negative effect on the company in obtaining profits.
The results of this study are in line with the research of Khadafiani (2013) stating that the Operational Cost Budget has a positive and significant effect on Return On Assets. While according to researchers Wahyuni (2013) said that the Operational Cost Budget has a significant effect on Return On Assets. According to Nafarin (2009, p. 8) if the budget for operational costs is high, it will affect Return On Asset as well if the budget for operational costs is low.

Based on the results of research conducted by the author as well as the theories, opinions and previous researchers that have been stated above regarding the influence of operational costs on Return On Asset, the writer can conclude that there is a match between the results of researchers with theories, opinions, and previous researchers, namely significant influence operational against Return On Asset at PT Jasa Marga (Persero) Tbk Belmera Medan Branch.

**Influence of Income Budget on Return On Asset**

The $t_{count}$ for the Income Budget variable is -4.023 and $t$ table with $\alpha = 5\%$ is known as 2.306. Thus the $t_{count}$ is smaller equal to $t$-table (-4.023 <<2.308) and a significant value of 0.005 (smaller than 0.05) means that Ho is rejected Ha accepted, this shows that partially Income Budget has a significant effect on Return On Assets. This means that with increasing income from sales and investment, it will increase the working capital or assets owned by the company. so that with the increase in the Revenue Budget, it will be followed by an increase in Return On Assets at PT Jasa Marga (Persero) Tbk Belmera Medan Branch.

This means that the Revenue Budget has a strong indication of Return On Assets because every company has a high ability to make an income budget so that it will have a good impact on Return On Assets. According to Darsono (2010, p.15) changes in income budgets can affect the company in generating profits both from investment and its own capital. A slightly better income budget is caused by the use of good operational costs by the company so that profits increase. The results of this study are explained by researchers Khadafiani (2013) in his research that the income budget does not have a relationship with Return On Assets and negative influence which means that if the income budget increases, the Return On Asset increases. While the researcher Meiza (2014) in his research shows that income partially affects the company's net income.

Based on the results of research conducted by the author as well as the theories, opinions and previous researchers that have been stated above regarding the effect of the income budget on Return On Assets. So the authors conclude that there is a match between the results of the study with the theory, opinion, and previous researchers, namely the income budget has a significant effect on Return On Assets with the direction of negative relations at PT Jasa Marga (Persero) Tbk Belmera Medan Branch 2007-2016.

Basically Return On Asset can be influenced by several factors. According to Munawir (2004) which states that Return On Asset is influenced by two factors, namely the factor of profit margin and turnover in increasing corporate profits. According to Hery (2017, p.138) financial ratios are a ratio calculation using financial statements that function as a measure in assessing financial conditions and company performance.

The results of this study are in line with Meiza's research (2014) showing that the Operational Cost and Revenue Budgets have a significant effect on Return On Assets. And Khadafiani's research (2013) shows the Operational Cost Budget and Income Budget have a positive relationship and have a significant effect on increasing Return On Assets.
CONCLUSION

Based on the results of the research and discussion previously stated, a conclusion can be drawn from the research on the effect of the Operational Cost Budget and Revenue Budget on Return On Asset at PT Jasa Marga (Persero) Tbk Belmera Medan Branch for the period 2007-2016 as follows:

1. The results of the research partially show that the Operational Cost Budget has a significant effect on Return On Asset at PT Jasa Marga (Persero) Tbk Belmera Medan Branch 2007-2016.

2. The results of the research partially show that the Operational Cost Budget has a significant effect on Return On Asset at PT Jasa Marga (Persero) Tbk Belmera Medan Branch 2007-2016.

3. The results of the study show that the Operational Cost Budget and Income Budget simultaneously have a significant effect on Return On Asset at PT Jasa Marga (Persero) Tbk Belmera Medan Branch 2007-2016.

BIBLIOGRAPHY