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Calculation of Financial Ratios on PT ACE Hardware Indonesia Tbk

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Abstract. The purpose of this research was to find out how the development ratio of liquidity, solvency and profitability at PT ACE Hardware Indonesia Tbk. Data used are descriptive data in the form of financial statements, financial position report, income statement, and cash flow statement PT ACE Hardware Indonesia Tbk 2009-2014 period obtained from Indonesia stock exchange official website "http://www.idx.co.id". The research results showed that the ratio of liquidity at PT ACE Hardware Indonesia Tbk very good in guarantee obligations as seen from the current ratio of 181%, 781, 508%, 585%, 400%, and 508%, whereas the quick ratio of 659%, 382%, 157%, 144%, 42% and 96%. Inventory turnover ratio amounted to 6.98 8.08 times, times, 2.93 times, 3.67 times, 1.62 times and 1.94 times. If seen from the solvency ratio of the growth and financial performance are still in good condition as seen from debt to total asset ratio of 10%, 20%, 15%, 15%, 10% and 19%. The times interest earned ratio of 96435.16 times, 12 times, 12 times, 235.26 times, 181.48 176.92 times and times. The performance and development of the company can also be seen from the side i.e. profitability ratio profit margin on sales amounted to 11%, 20%, 11%, 13%, 12% and 12% and the rate of return on assets amounted to 14%, 16%, 20%, 25%, 18% and 20%.

Keywords: financial statements, liquidity, solvency, profitability

Introduction

Financial reports aim to provide information concerning the financial position, performance and changes in financial position, an enterprise that is useful to a large number of users in decision-making (PSAK No. 1, 2015). Decision making by business person needs information about the condition and performance of financial companies using financial ratios.

The financial statements can be done by doing an analysis of ratio-financial ratio that illustrates the relationship between the guesses of the financial statements. Financial ratios with future-oriented which means that financial ratios can help business users, and other financial reports in assessing the company's financial condition are also useful to predict the company's profit or loss in the future. For investors top financial ratio calculations can be used to make a decision whether to buy ownership of an enterprise, as well as used also to know the opportunities that will occur in the future.

The purpose of this research was to find out how the financial condition and development company in PT ACE Hardware Indonesia Tbk. one way to find out by doing a calculation of financial ratios for several years and find out how the development of the company's performance on a periodic basis. The authors use data in this study are the audited financial statements of PT ACE Hardware Indonesia Tbk in 2009-2014.

The data used in this study are the financial statements of PT ACE Hardware Indonesia Tbk for the period 2009-2014. The reason took in 2009-2014 so that data used more graphs show the financial company and can be analyzed properly. So this research take the period audited financial report on the Indonesia stock exchange. As for the ratio used is the Division ratio according to Kieso, Weygandt (2010), namely the liquidity ratio consist of current ratio, quick or acid-test ratio, inventory turnover ratio and solvency (coverage ratio) consists of debt to total

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assets, and the times interest earned. Profitability ratios consists of the profit margin on sales, and rate of return on assets.

Literature Review

According to Kieso et al. (2011), generally there are three (3) types of ratio to assess the financial performance of the company, namely:

1. Liquidity Ratio

Which indicates the company's ability to meet its short-term financial obligations on time.

a. Current Ratio

According to Prihadi (2008), the current ratio is the ratio to measure up to how far asset company is able to pay off a lancer liabilities short-term. The higher this ratio will be increasingly safe for the creditors. The formula to calculate it is:

$$Current\ Ratio = \frac{current\ assets}{current\ liabilities}$$

b. Quick or Acid-test Ratio

According to Prihadi (2008), number 1 is considered quite safe. On a particular company where elements of inventory and cash advance is very small, then the calculation of the quick ratio and the current ratio will produces adjacent numbers. Formula to calculate the quick ratio is:

$$\frac{cash+short\ term\ investment+account\ receivable}{current\ ratio}$$

c. Inventory Turnover

This ratio indicates how fast a turnaround in the inventory cycle of normal production. The larger this ratio then the better, because it is considered that the sales activities running quickly. Formula to calculate inventory turnover is:

$$Inventory\ turnover = \frac{cost\ of\ goods\ sold}{average\ inventory}$$

2. Profitability Ratio

Profitability ratio can measure how big a company getting a return capability either in conjunction with the sale, asset or profit for private equity. This ratio also indicates the company's ability to thrive in the future.

a. Profit Margin on Sales

This ratio is an advantage after calculating the costs and income taxes. This ratio shows a comparison of the net profit after tax by sales. Profit margin is expressed best if this value is greater than equal to 5.5%. Formula to calculate the profit margin on sales is:

$$profit\ margin\ on\ sales = \frac{net\ income}{net\ sales}$$

b. Rate of Return on Assets

This ratio measures the return on assets obtained with regard to net profit. Formula to calculate return on assets are:

$$ROA = \frac{net\ income}{average\ total\ asset}$$

3. Solvency Ratio

Solvency ratio indicates the company's capacity to meet its long-term obligations. The long-term lender and shareholder is a party related to the calculation of the solvency ratio as it pertains to the company's ability to pay interest and repay the shares.

a. Debt to Total Assets

Debt ratio is the ratio of total liabilities against assets. This ratio is of pressing importance of debt funding to the road shows the percentage of the company's assets backed by debt. This ratio also provides information about the company's ability to adapt to conditions in the reduction of assets due to interest payments without reducing losses on creditors. Formula to calculate the debt to total assets ratio is:

$$Debt\ to\ total\ asset = \frac{Total\ debt}{Total\ Asset}$$

b. Times Interest Earned

This ratio shows or indicates the company's ability to pay interest charges. This ability is measured from a profit before tax and interest charges. Getting three results calculation then the ability to pay interest charges will be the better. Formula to calculate times interest earned ratio is:

$$\frac{income\ before\ interest\ expense\ and\ taxes}{interest\ expense}$$

The financial report is a result of the accounting process at a certain period of time which was the result of collection and processing of financial data for the company which can be used to assist in decision making. Understanding financial statements according to PSAK No. 1 (2015) is a structured representation of the financial position and financial performance of an entity. Based on such understanding, can be drawn the conclusion that the financial report is an information describing the financial condition of a company, and any further information that can be used as an overview of the financial performance of the company. Because of the financial statements is a result of the accounting process that is used as a tool of analysis for management to make decisions related to financial companies and also useful for party's interested parties such as investors. According to Kieso et al. (2011) consists of four financial statements statement of financial position report, the income statement, the statement of cash flow, and statement changes in equity.

Results and Discussion

Current ratio measures the ability of the PT ACE Hardware Indonesia Tbk to meet short-term liabilities (maturity of less than one year) with the use of current assets (Kieso et al. 2011). The formula to calculate it as follows:

$$Current\ Ratio = \frac{current\ assets}{current\ liabilities}$$

As for the calculation of current ratio PT ACE Hardware Indonesia can be seen in Table 1.

Table 1
Current Ratio

Tahun	2009	2010	2011	2012	2013	2014
Current Assets	775.772.167.178	862.190.462.145	846.866.979.585	1.218.820.569.255	1.747.185.411.973	2.171.084.574.212
Current Liabilities	73.186.201.328	110.310.085.744	166.523.657.825	208.254.982.747	439.275.331.629	426.629.831.904
Ratio (%)	10,599	7,816	5,085	5,852	3,977	5,088

Based on Table 1, current ratio PT ACE Hardware Indonesia Tbk from 2009 to 2014 has a declining trend can be seen in Fig. 1.

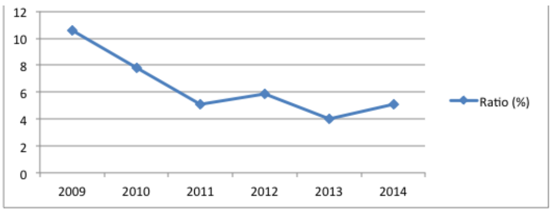

Fig. 1 Current Ratio Trend

Table 1 describes the calculation based on the results of the current ratio for the year 2009 of 10.59 means that each one rupiah of debt guaranteed by smoothly Rp10.59 current assets. The calculation above shows the current ratio of PT Indonesia Tbk ACE Hardware has a downward trend. In the following years the current assets and debts rising smoothly, but the ratio has decreased due to the increase in current liabilities are greater than the increase in current assets. This means PT ACE Hardware Indonesia Tbk was able to increase their ability to pay off short term liabilities through assets smoothly they have. The calculation of this ratio can be the Foundation for the company to improve its performance with respect to the repayment of current liabilities secured by current assets. Based on the standard criteria of assessment according to Kieso et al. (2011) that the current ratio in 2009-2014 are in a good position, because the current ratio stated is good if the value of this ratio greater equal to 200%.

Quick or acid-test ratio is a consideration between total assets include cash, short-term investments and accounts receivable with the amount of debt. This ratio measures the ability of the ACE Hardware Indonesia Tbk PT to meet short-term obligations based on assets smoothly quickly they have. These assets include cash, short term investments, and receivable. These assets is smoothly the fastest liquid (Kieso et al. 2010).

$$\frac{cash+short\ term\ investment+account\ receivable}{current\ ratio}$$

As for the calculation of the Acid-test or quick Ratio has the author serve on Table 2.

Table 2
Quick or Acid-test Ratio

Tahun	2009	2010	2011	2012	2013	2014
Cash	395.771.699.900	366.377.982.335	210.453.518.599	270.049.635.909	161.758.998.760	391.452.438.398
Short Term Investment	73.104.424.492	34.180.383.840	19.609.962.480	-	-	-
Account Receivable	13.965.583.110	20.983.379.378	31.505.432.002	30.945.783.560	24.978.832.549	19.782.166.768
TOTAL	482.841.707.502	421.541.745.553	261.568.913.081	300.995.419.469	186.737.831.309	411.234.605.166
Current Liabilities	73.186.201.328	110.310.085.744	166.523.657.825	208.254.982.747	439.275.331.629	426.629.831.904
Ratio (%)	6,597	3,821	1,570	1,445	0,425	0,963

Based on Table 2, quick or acid-test ratio PT ACE Hardware Indonesia Tbk from 2009 to 2014 has a declining trend. It can be seen in Fig. 2.

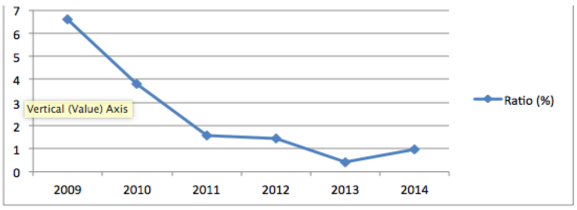

Fig. 2 Quick or Acid-test Ratio Trend

Based on Table 2, quick or acid-test ratio in 2009 amounted to 6.59. This means that short term obligations amounting to one rupiah guaranteed by cash, short term investments, accounts receivable and of 6.59. The calculation shows the quick or acid-test ratio PT ACE Hardware Indonesia Tbk, a very significant decline. In 2010 the ratio dropped to 3.82, year 2011 dropped to 1.57, down to 1.44 year 2012, 2013 dropped to 0.42, and 2014 rose to 0.96 it is caused by the amount of the liability have a trend of increase. The greater the acid-test or quick ratio of a company then that company the better.

This means that the company's ability to pay short-term obligations greater heft smoothly the companies have. The highest obtainable ratio in 2009 and the lowest in 2013. It showed that PT ACE Hardware Indonesia Tbk yet can improve quick or acid-test ratio them. The company needs to improve its performance in terms of fulfillment of obligations based on the calculation of the quick or acid-test ratio that has been acquired. Based on the standard criteria of assessment according to Kieso et al. (2011) that quick or acid-test ratio in 2009-2010 are in a good position though in 2013 a significant decline but the company was able to raise it again in 2014, as quick or acid-test ratio is expressed either if the value of this ratio greater equal to 100%.

$$Inventory\ turnover = \frac{cost\ of\ goods\ sold}{average\ inventory}$$

As for the calculation of the inventory turnover ratio has the author serve at Table 3.

Table 3
Inventory Turnover Ratio

Tahun	2009	2010	2011	2012	2013	2014
Cost of goods sold	806,337,378,080	932,518,981,447	1,290,263,614,602	1,671,714,778,515	1,961,897,730,178	2,347,889,539,199
Average Inventory	146,776,451,458	115,383,903,579	212,777,398,365	455,080,296,241	866,175,356,891	1,204,114,099,968
Ratio (Kali)	5.494	8.082	6.064	3.673	2.265	1.950

Based on Table 3, inventory turnover PT ACE Hardware Indonesia Tbk from 2009 to 2014 has a declining trend. It can be seen in Fig. 3.

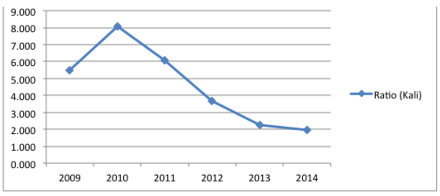

Fig. 3 Inventory Turnover Ratio Trend

Based on Table 3, inventory turnover of PT Indonesia Tbk from ACE Hardware in 2009-2014, the year 2009 of 6.98 times, year 2010 amounted to 8.08 times, year 2011 amounted to 2.83 times, year 2012 of 3.67 times, 2013 of 1.62 times, and 2014 amounted to 1.94 times. This means that in a year of PT Indonesia Tbk ACE Hardware affect 6.98 times (2009) replenishment of supplies. The calculation shows the inventory turnover PT ACE Hardware Indonesia suffered a huge decline in 2011, this is due to the increase in cost of goods sold are great but the average inventory is not experiencing a large increase.

A high inventory turnover showed a good performance of the company due to the greater level of success shows the inventory turnover sales company that runs smoothly and quickly. Conclusions in the above calculations and explanations to explain that rotation of the inventory of PT Indonesia Tbk ACE Hardware are in a State of slow-motion starting from 2011 until the last year of the study by 2014.

Based on the above calculation the following summary of the liquidity ratio of PT Indonesia Tbk ACE Hardware can be seen in Table 4 below.

Table 4
Liquidity Ratios Resume

Tahun	Current Ratio	Quick or Acid-Test Ratio	Inventory Turnover
2009	10.60	6.60	5.49
2010	7.81	3.82	8.08
2011	5.08	1.57	6.06
2012	5.85	1.44	3.67
2013	3.98	0.42	2.27
2014	5.08	0.96	1.95

Debt to Total Asset This ratio indicates how much a company funded by creditors and shareholders. Solvency ratio PT ACE Hardware Indonesia Tbk, which is used in the calculation consists of two debt to total asset and times interest earned.

Debt to total assets emphasis on how big the loan funds were used to finance the company's assets (Kieso et al. 2010). As for how to calculate this ratio is:

$$Debt\ to\ total\ asset = \frac{Total\ debt}{Total\ Asset}$$

As for the calculation of the debt to total assets has been the author serve on Table 5.

Table 5
Debt to Total Asset Ratio

Tahun	2009	2010	2011	2012	2013	2014
Total Debt	102.786.712.328	146.746.950.744	219.881.637.825	298.913.611.039	563.420.146.246	585.200.415.854
Total Assets	970.555.943.386	1.191.333.479.259	1.451.755.376.484	1.916.914.650.213	2.478.918.584.338	2.947.348.661.224
Ratio (%)	0,105	0,123	0,151	0,155	0,227	0,198

Based on Table 5, the debt to total assets of PT Indonesia Tbk from ACE Hardware in 2009 until 2013 on the rise and decline in 2014. It can be seen in Fig. 4.

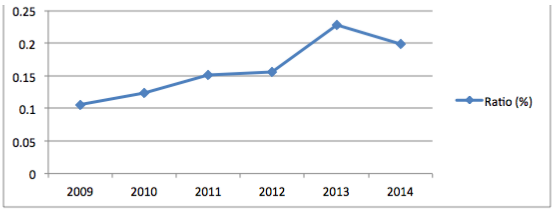

Fig. 4 Debt to Total Asset Ratio Trend

Based on Table 5, the debt to total assets of PT Indonesia Tbk from ACE Hardware in 2009-2014 i.e. 0.10 0.12 (2009), (2010), 0.15 (2011), 0.16 (2012), 0.22 (2013), and 0.19 (2014). The results of the debt to total assets for the year 2009 0.10 or 10% means that any company debts 0.10 can finance one rupiah assets company. In the years following the gradual rise occurred in the debt of companies that followed also by the increase in assets. The increase is to be expected due to an asset acquisition transaction in a credit or debt to creditors, but the increase in debt can still be secured by the value of the company's assets by 10% (2010) of the value of the existing debt.

The smaller the overall debt to total assets the company would eat the better because the level of the company's ability to repay the debt will be the better because of the level of the company's ability to pay debts on conditions of safety. PT ACE Hardware Indonesia Tbk has a debt to total assets is good it can be seen from the number of small and ratio of total assets is much larger compared with the amount of debt, thus it will give confidence to the lender (creditor) to provide loans to the company.

Times interest earned ratio shows or identify the company's ability to pay interest or provide long-term protection to the lender. As for how to calculate this ratio is as follows:

$$\frac{income\ before\ interest\ expense\ and\ taxes}{interest\ expense}$$

As for the calculation of times interest earned has been the author serve on Table 6.

Table 6
Times Interest Earned Ratio

Tahun	2009	2010	2011	2012	2013	2014
Income Before Income Tax	206,330,288,011	229,167,446,013	370,865,667,373	537,312,095,280	622,993,945,777	681,878,411,656
Interest expense	2,139,553	0	0	2,293,654,659	3,541,237,909	3,777,931,440
Total Income before interest expense and taxes	206,328,148,458	229,167,446,013	370,865,667,373	535,018,440,621	619,452,707,868	678,100,480,216
Interest expense	2,139,553	-	-	2,293,654,659	3,541,237,909	3,777,931,440
Ratio (Kali)	96435.166	0	0	233.260	174.925	179.490

Based on Table 6, times interest earned PT ACE Hardware Indonesia Tbk from 2009 to 2014 has a declining trend. It can be seen in Fig. 5.

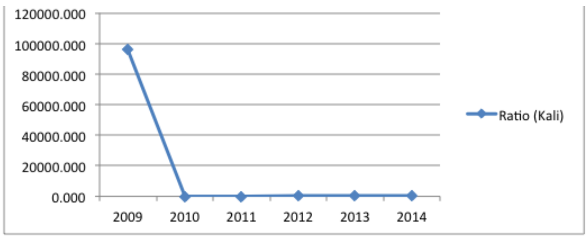

Fig. 5 Times Interest Earned Ratio Trend

Based on Table 6, times interest earned (TIE) PT Indonesia Tbk from ACE Hardware in 2009-2014 are as follows 96,435 times (2009), 0 times (2010), 0 times (2011), 235 (2012), 176 times (2013), 181 times (2014). The results of the TIE for the year 2009 of 96,435 times, this indicates that the PT ACE Hardware Indonesia Tbk gain income tax income of 96,435 before times of interest expense. In 2010 PT ACE Hardware Indonesia gained a rise in income tax, but income before interest expense no or 0 this also affect the results of the times interest earned which is also recorded as 0 (zero) on the table, neither is happening in 2011. In 2012 happens the increase in income before income tax and the increase in interest expense as well, it does have an effect on the calculation of times interest earned which decreased due to the increase in interest expense that is very significant. It also happened in 2013 and 2014 rising interest expense affecting the decline of times interest earned.

The increase in interest expense could be caused by the presence of debt bonds, the greater the debt nominal bonds, then the higher interest expense that will be charged. Based on explanation above, it can be concluded that the ability of PT ACE Hardware Indonesia Tbk in paying off the interest expense is less good situation because in 2010 and 2011 the company does not pay the interest expense. But in 2012-2014 corporate pay back interest expense in accordance with the amount. Related to the height of the low value of the TIE, the company will have the better ability to pay off interest expense if the TIE earned the higher and vice versa. Based on the above calculation the following summary of their solvency ratio PT ACE Hardware Indonesia Tbk can be seen in Table 7.

Table 7
Solvability Ratios Resume

Tahun	Debt to Total Asset	Times Interest Earned
2009	0.10	96435.17
2010	0.12	0.00
2011	0.15	0.00
2012	0.15	233.26
2013	0.22	174.93
2014	0.19	179.49

Profit margin on sales was the presentation of net income earned from each unit of currency sale (Kieso, et al. 2011). Based on the understanding that it can be understood that the profit margin on sales was the presentation of net profit against net sales. As for how to calculate this ratio is:

$$profit\ margin\ on\ sales = \frac{net\ income}{net\ sales}$$

As for the calculation of the profit margin on sales has been the author serve on Table 8:

Table 8
Profit Margin on Sales Ratio

Tahun	2009	2010	2011	2012	2013	2014
Net Income	154.442.654.114	177.851.336.490	279.504.732.018	428.849.175.516	503.004.238.918	548.892.765.278
Net Sales	1.358.774.766.612	1.641.121.796.637	2.409.860.773.817	3.223.291.022.272	3.895.446.376.165	4.541.473.969.017
Ratio (%)	0,113	0,108	0,115	0,133	0,129	0,120

Based on Table 8, the profit margin on sales of PT ACE Hardware Indonesia Tbk from 2009 to 2014 has a fluctuating trend. It can be seen in Fig. 6

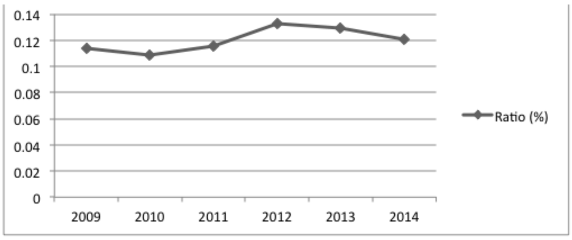

Fig. 6 Profit Margin on Sales Ratio

Profit margin on sales is a measure that can describe the success of the company manages the operational costs to obtain the maximum net profit. Based on Table 8, the profit margin on sales of PT ACE Hardware Indonesia Tbk from 2009-2014 are as follows, in 2009 the company has a profit margin on sales of 0.11 (11%), the year 2010 amounted to 0.10 (10%), the year 2011 of 0.11 (11% 0, the year 2012 of 0.13 (13%), 2013 amounting to 0.12 (12%), and 2014 of 0.12 (12%). The results of the profit margin in 2009 i.e. 0.03 0.03% means that each affect net sales of Rp1 net income. Based on the standard criteria of assessment according to Kieso et al. (2011) that the ratio of profit margin in 2009-2014 are in the position either, because the profit margin is expressed greater well if equal to 5.5%.

Rate of return on assets is a measurement of the overall company profitability top (Kieso et al. 2011). Based on such statement can be understood that the rate of return on assets serves to show how efficient the use of assets to earn net income. As for how to calculate this ratio is:

$$ROA = \frac{net\ income}{average\ total\ asset}$$

As for the calculation of the profit margin on sales has been the author serve on Table 9:

Table 9
Rate of Return on Assets

Tahun	2009	2010	2011	2012	2013	2014
Net Income	154,442,654,114	177,851,336,490	279,504,732,018	428,849,175,516	503,004,238,918	548,892,765,278
Average total assets	880,416,237,092	1,080,944,711,323	821,544,427,872	1,684,335,013,349	2,197,916,617,276	2,713,133,622,781
Ratio (%)	0.175420043	0.164533241	0.340218645	0.254610379	0.228855014	0.202309522

Based on Table 9, rate of return on assets of ACE Hardware Indonesia Tbk PT from 2009 to 2014 has a fluctuating trend. It can see in Fig. 7:

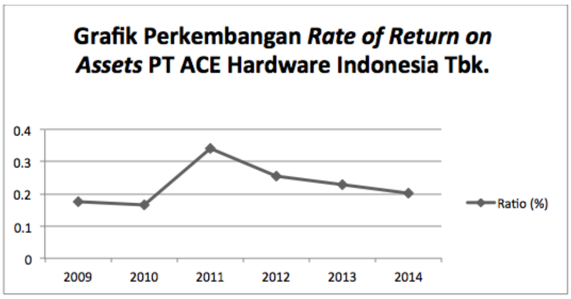

Fig. 7 Rate of Return on Assets Ratio

Based on Table 9, rate of return on assets of PT Indonesia Tbk from ACE Hardware in 2009-2014 IE the year 2009 of 0.14 (14%), the year 2010 amounted to 0.16 (16%), the year 2011 of 0.17 (17%), the year 2012 of 0.25 (25%), 2013 of 0.18 (18%), and 2014 of 0.20 (20%). The results of the rate of return on this asset means that each rupiah assets used, ACE Hardware Indonesia Tbk PT is only capable of generating USD 0.14 (2009) net profit. It could also be said that PT ACE Hardware Indonesia Tbk was only able to generate a net profit of 16% (2009) from the total assets used.Based on the above calculation the following profitability ratios summary PT ACE Hardware Indonesia Tbk can be seen in Table 10.

Table 10
Profotability Ratio

Tahun	Profit Margin on Sales	Rate of Return on Assets
2009	0.11	0.18
2010	0.10	0.16
2011	0.11	0.34
2012	0.13	0.25
2013	0.13	0.23
2014	0.12	0.20

Conclusion

Based on the results of the calculations and analysis that are already described in the previous chapter, the author then concluded as follows:

The development of liquidity ratio of PT Indonesia Tbk ACE Hardware on measured by current ratio, quick or acid-test ratio, and inventory turnover. Based on data from the financial reports in 2009-2014, the liquidity ratio has a declining trend. However, PT ACE Hardware Indonesia Tbk can still be said to be good because the company was still able to meet current liabilities with assets owned.

The development of the solvency ratio at PT ACE Hardware Indonesia Tbk as measured by debt to total asset and times interest earned. Based on data from the financial reports in 2009-2014 solvency ratio PT ACE Hardware Indonesia Tbk has increased trend in the ratio of debt to total assets and a declining trend in the times interest earned. Nevertheless, ACE Hardware Indonesia Tbk PT still allegedly good because the company has total assets greater than total obligations.

The development ratio of profitability at PT ACE Hardware Indonesia Tbk with a profit margin on sales ratio and rate of return on assets. Based on data from the financial reports in 2009-2014 profitability ratio PT ACE Hardware Indonesia Tbk has increased the trend and it showed a good development on the company's revenue.

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