

Analysis of Liquidity, Profitability and Solvency Ratios to Assess the Financial Performance of Companies in Cigarette Industries Listed on the Indonesia Stock Exchange

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Abstract

The writing of this reaserch is aimed at knowing the company's financial performance which is assessed through ratio analysis, namely liquidity ratio, profitability and solvency. The research conducted is to analyze the company's financial statements, namely the income statement, statement of financial position or balance sheet, while for the research method carried out is to use descriptive methods. By analyzing the company's financial statements are expected to be able to provide an overview of the financial condition of the company.

Based on the results of the analysis and discussion, it can be concluded that the company's performance is still not all stable. This is due to policies regarding the sale and marketing of cigarettes in Indonesia. The results of the study show that PT. Gudang Garam Tbk is a company that does not experience much increase or decrease until it can be said that the company is safe. PT. Handjaya Mandala Sampoerna Tbk is a company that has the highest profit compared to 3 (three) other companies. PT. Bentoel International Investama Tbk suffered losses throughout 2013 to 2015. Meanwhile, PT. Wismilak Inti Makmur Tbk is in good condition as seen from the Liquidity Ratio. PT. Wismilak Inti Makmur Tbk is the most stable company and is able to manage its finances well even though the company has the lowest assets compared to 3 (three) other companies.

I. INTRODUCTION

Financial performance is a benchmark for every company to assess the company's ability to achieve company profits and the maximum performance that the company has achieved. To assess company profits can be analyzed through data reflected in the company's financial statements, by analyzing the company's financial statements themselves. Company financial statements in the form of balance sheets, income statements and cash flow statements. The company's financial statements provide information about the company's financial condition, the company's cash flow performance that is useful as a user of the financial statements themselves. Financial statements also provide information about the performance of the resources involved in the company's structure.

Economic fluctuations which always experience changes have affected the company's performance activities. Both small and large companies. Therefore, companies must utilize the available resources as efficiently and effectively as possible so that they are more useful and can maintain or improve the performance of their companies. One factor that reflects the company's performance is the financial statements that must be made by management regularly. Financial statements are basically the results of company activities which are then processed accounting which are presented in quantitative form. Where the information presented in it can help various parties (inside and outside the company) in making decisions that are very influential for the survival of the company. The use of financial information through financial statements by outside companies is to make investment decisions in placing the resources to be invested and also an effort to decide on lending by creditors.

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Basically the company's financial performance is needed to assess the potential of the company's economic resources. Is the company's performance good or good or not good enough. With the description of the performance of the company itself the company can control the business in the future. Investments or steps that should be and should be taken by the company to maintain the stability of the company or improve the results of the company's business. Therefore, researchers use liquidity ratios, profitability ratios and solvency ratios to assess the performance of cigarette industry companies listed on the Indonesia Stock Exchange (IDX). Behind sales that continue to increase it turns out the existence of the cigarette industry in Indonesia is indeed a dilemma. On the one hand, the cigarette industry is one of the sources of funding for the government because the cigarette company tax is recognized as having an important role in state revenues. On the other hand there is an anti-smoking campaign for health reasons, because smoking can reduce the health status of Indonesian people. As we know that cigarette companies in Indonesia are industries that are very influential for the economy in Indonesia. You could say this industry is a very promising industry amid debates about the negative effects of cigarettes but it cannot be denied that this industry also supports most of the needs of the Indonesian economy.

Liquidity ratio is the ability of a company to meet its short-term obligations in a timely manner. Profitability ratio aims to measure management effectiveness which is reflected in the return on investment returns through company activities or in other words measuring overall company performance and efficiency in managing liabilities and capital. Solvability ratio is a ratio that measures how much a company is financed with debt. The use of debt that is too high will make the company happy because the company will be included in the category of extreme debt, namely the company is caught in a high debt level and it is difficult to release the debt burden.

II. RELATED WORKS/LITERATURE REVIEW (OPTIONAL)

Definition of Liquidity Ratio

According to Kasmir in the book *Financial Statement Analysis* (2014: 132) as for the purpose and benefits of liquidity ratios:

1. To measure the ability of a company to pay obligations or debts that are immediately due when billed. That is, the ability to pay obligations that are already due is paid according to the set deadline (certain dates and months).
2. To measure a company's ability to pay short-term liabilities with overall current assets. This means that the number of obligations under one year or equal to one year compared to current assets.
3. To measure the company's ability to pay short-term liabilities with current assets without taking into account stocks or receivables. In this case the current assets are reduced by preparations and debts which are considered to be of lower liquidity.
4. To measure or compare the number of available stocks with the company's working capital.
5. To measure how much cash is available to pay off debt.
6. As a future planning tool, especially relating to cash and debt planning.
7. To see the condition and position of the company's liquidity from time to time by comparing it for several periods.
8. To see weaknesses owned by the company, from each component in current assets and current debt.
9. Become a trigger for management to improve its performance, by looking at the current liquidity ratio.

Definition of Profitability Ratio

The purpose of using profitability ratios for companies and for outside parties according to Kasmir in the financial statement analysis book (2014: 197-198), namely:

1. To measure or calculate profits obtained by a company in a given period;
2. To assess the position of company profits in the previous year with the current year;
3. To assess the development of profits from time to time;
4. To assess the amount of net income after tax with own capital;
5. To measure the productivity of all company funds used both loan capital and own capital:

Definition of Solvability Ratio

According to Kasmir in the *Financial Statement Analysis* book (2014: 153-154) the company' objectives from the use of solvency ratios are as follows:

1. To find out the company's position on obligations to other parties (creditors);
2. To assess the ability of a company to fulfill its fixed obligations (such as loan installments including interest);
3. To assess the balance between the value of assets, especially fixed assets and capital;
4. To assess how much the company's assets are financed by debt;
5. To assess how much influence the company's debt has on asset management;

6. To assess or measure what part of each rupiah is self-made as collateral for long-term debt;
7. To assess how much the loan will soon be billed, there are many times the capital itself is owned

Definition of Financial Performance

The company's financial performance according to Arief Sugiono and Edy Untung in the book *Basic Practical Guide Analysis of Financial Reports* (2009: 78) is the result of many individual decisions made continuously by management or is a record of the results achieved from the function of a particular activity during a period certain time. According to James C. Van Horne and John M. Wachowicz quoted by Irham Fahmi in the book *Financial Analysis Analysis* (2011:108) to assess the condition and financial performance of the company financial ratios can be used which are comparisons of numbers contained in financial statement items. From this opinion it can be seen that financial ratios and company performance have a close relationship. There are many financial ratios and each ratio has its own uses.

According to Irham Fahmi in the book *Financial Statement Analysis* (2011: 240) there are five stages in analyzing the financial performance of a company as follows:

1. Review financial report data
The review here is done with the aim that the financial statements that have been made are in accordance with the application of generally accepted rules in the world of accounting, so that the results of these financial statements can be accounted for.
2. Perform calculations
Adapted to the conditions and problems that are being carried out so that the results of these calculations will provide a conclusion in accordance with the desired analysis.
3. Do a comparison of the results of the calculations that have been obtained.
From the results of the calculations that have been obtained, then a comparison is made with the results of calculations from various other companies

According to Munawir in the book *Financial Statement Analysis* (2010: 31) measurement of financial performance of the company has several objectives including:

1. To find out the level of liquidity, namely the company's ability to fulfill its financial obligations that must be fulfilled when billed.
2. To find out the level of solvency, namely the company's ability to fulfill its financial obligations if the company is liquidated.
3. To find out the level of profitability and profitability, namely the company's ability to generate profits for a certain period compared to the use of assets or equity productively.
4. To determine the level of business activity, namely the company's ability to run and maintain its business to remain stable as measured by the company's ability to pay the principal debt and interest expenses on time and pay dividends regularly to shareholders without experiencing difficulties or financial crisis

III. METHODS

Types of Liquidity Ratios

In general, the main purpose of the liquidity ratio is used to assess the company's ability to fulfill its obligations. However, besides that, from the liquidity ratio the company can find out more specific things that are also still related to the company's ability to fulfill its obligations, this depends on the type of liquidity ratio used, as for the types of liquidity ratios according to Kasmir in the *Analysis books Financial Statements* (2014: 133-142) are as follows:

1. Current Ratio
The formula in finding the current ratio is:

$$\text{Current Ratio} = \frac{\text{Current Assets}}{\text{Current Liabilities}}$$

2. Quick Ratio
The formula in finding the *quick ratio* is :

$$\text{Quick Ratio} = \frac{\text{Current Assets} - \text{Inventory}}{\text{Current Liabilities}}$$

3. Cash Ratio

Cash ratio is stated as follows:

$$\text{Cash Ratio} = \frac{\text{Cash or Cash Equivalent}}{\text{Current Liabilities}}$$

Types of Profitability Ratios

There are several types of profitability ratios used to assess the financial position of a company in a given period, while the types of profitability ratios according to Kasmir in the Financial Statement Analysis book (2014: 199-207) are as follows:

1. Gross Profit Margin

Gross profit margin is expressed by the formula:

$$\text{Gross Profit Margin} = \frac{\text{Net Sales} - \text{Cost of Goods Sold}}{\text{Sales}}$$

2. Net Profit Margin

To find the Net Profit Margin used the formula:

$$\text{Net Profit Margin} = \frac{\text{Earning After Interest and Tax}}{\text{Sales}}$$

3. Return On Assets

The formula used to find Return On Assets is:

$$\text{Return on Asset} = \frac{\text{Earning After Tax}}{\text{Total Assets}}$$

4. Return On Equity

The formula used to calculate this ratio is:

$$\text{Return on Equity} = \frac{\text{Earning After Tax}}{\text{Equity}}$$

Types of Solvability Ratios

1. Debt Ratio

The formula used to search *Debt Ratio* is:

$$\text{Debt to Equity Ratio} = \frac{\text{Total Debt}}{\text{Equity}}$$

2. Debt To Equity Ratio

The formula used to search *Debt to Equity Ratio* is:

$$\text{Debt Ratio} = \frac{\text{Total Debt}}{\text{Total Assets}}$$

IV. RESULTS

The data that I use in calculating the ratio analysis of financial statements to assess company performance are the financial statements for the period 31 December 2013, 31 December 2014, and 31 December 2015 in cigarette industry companies listed on the Indonesia Stock Exchange (IDX). The listed companies consist of 4 (four) companies, namely:

1. PT. Gudang Garam Tbk (GGRM)
2. PT. Hanjaya Mandala Sampoerna Tbk (HMSP)
3. PT. Bentoel Internasional Investama Tbk (RMBA)
4. PT. Wismilak Inti Makmur Tbk (WIIM)

Financial Ratio Analysis Liquidity Ratio

Table 1 Liquidity Ratio in Cigarette Industry Companies listed on the Indonesia Stock Exchange

Liquidity Risk	Company	Years		
		2013	2014	2015
Current Ratio	GGRM	172.21%	162.02%	177.04%
	HMSP	175.2%	152.77%	656.74%
	RMBA	118.37%	102.32%	220.34%
	WIIM	243.00%	227.49%	289.38%
Quick Ratio	GGRM	21.71%	15.95%	22.09%
	HMSP	32.29%	24.60%	236.54%
	RMBA	21.83%	22.74%	47.33%
	WIIM	73.55%	56.02%	66.30%
Cash Ratio	GGRM	6.99%	6.68%	11.34%
	HMSP	5.42%	0.48%	37.87%
	RMBA	6.91%	0.91%	5.67%
	WIIM	40.43%	17.10%	26.89%

Liquidity ratio measurement is carried out to determine the company's ability to fulfill its short-term liabilities. Table 4.1 above is the result of calculation of liquidity ratios in cigarette industry companies listed on the Indonesia Stock Exchange.

1. Current Ratio

Current ratio is a ratio used to measure the level of ability of a company to pay its current debt or short-term liabilities with current assets. The company's current ratio is obtained from the comparison of current assets with current liabilities to meet its short-term obligations

a. PT. Gudang Garam Tbk (GGRM)

Based on the results of the current ratio calculation in table 4.1 above it can be seen that the current ratio of PT. Gudang Garam Tbk is 172.21% in 2013, 162.02% in 2014, and 177.04% in 2015. This means that every Rp. 1, - current liabilities of the company are guaranteed payment by Rp. 1.72, - current assets in 2013, Rp. 1.62, - in 2014 and Rp. 1.77, - in 2015.

In table 1 above can be seen the current assets or current ratio in 2013 is the highest compared to 2014 and 2015. In 2014 the current ratio fell by 10.2% compared to 2013 while experiencing an increase again in 2015 by 15% compared to 2014 that is to be equal to 177.04%.

b. PT. Hanjaya Mandala Sampoerna Tbk

Based on the results of the current ratio calculation in table 4.1 above it can be seen that the current ratio of PT. Hanjaya Mandala Sampoerna Tbk was 175.26% in 2013, 152.77% in 2014, and 656.74% in 2015. This means that every Rp. 1, - current liabilities of the company are guaranteed payment by Rp. 1.75, - current assets in 2013, Rp. 1.53, - in 2014 and Rp. 6.57, - in 2015.

In table 1 above can be seen the current assets or current ratio in 2015 is the highest compared to 2013 and 2014. In 2014 the current ratio fell by 22.5% compared to 2013 while experiencing a significant increase in 2015 which amounted to 503.9% compared to in 2014 which amounted to 656.74%. This happens because companies pay off or do not have short-term obligations which include third party debt, related debt, excise debt and other short-term debt.

c. PT. Bentoel Internasional Investama Tbk

Based on the results of the current ratio calculation in table 4.1 above it can be seen that the current ratio of PT. Bentoel Internasional Investama Tbk is 118.37% in 2013, 102.32% in 2014, and 220.34% in 2015. This means that every Rp. 1, - current liabilities of the company are guaranteed payment by Rp.1.18, - current assets in 2013, Rp. 1.02, - in 2014 and Rp.2.20, - in 2015.

In table 1 above can be seen the current assets or current ratio in 2015 is the highest compared to 2013 and 2014. In 2014 the current ratio fell by 16.1% compared to 2013 while experiencing an increase again in 2015 that is equal to 118% compared to in 2014 which was to be 220.34%. This happens because companies pay off or do not have excise debts.

d. PT. Wismilak Inti Makmur Tbk

Based on the results of the current ratio calculation in table 4.1 above it can be seen that the current ratio of PT. Wismilak Inti Makmur Tbk is 243% in 2013, 227.49% in 2014, and 289.38% in 2015. This means

that every Rp. 1, - current liabilities of the company are guaranteed payment by Rp. 2.43, - current assets in 2013, Rp. 2.27, - in 2014 and Rp. 2.89, - in 2015.

In table 1 above can be seen the current assets or current ratio in 2015 is the highest compared to 2013 and 2014. In 2014 the current ratio fell by 15.5% compared to 2013 while experiencing an increase again in 2015 which amounted to 61.9% compared to in 2014 which was to be 289.38%.

2. Quick Ratio

Quick Ratio is a ratio that shows the company's ability to fulfill or pay obligations or current debt (short-term debt) with current assets without taking into account inventory value. The fast ratio is almost the same as the current ratio which is the result of a comparison between fixed assets and current liabilities only the difference between current ratios is calculated with inventory while the fast ratio is not.

a. PT. Gudang Garam Tbk (GGRM)

Based on the results of fast ratio calculations in table 4.1 above, it can be seen that the fast ratio of PT. Gudang Garam Tbk is 21.71% in 2013, 15.95% in 2014, and 22.09% in 2015. This means that every Rp. 1, - current liabilities of the company are guaranteed payment by Rp. 0.22, - existing cash and receivables without having to wait for the results of the sale of inventory that the company already has in 2013, Rp. 0.16, - in 2014 and Rp. 0.22, - in 2015.

In table 1 above, it can be seen that the quick ratio or fast ratio in 2015 is the highest compared to 2013 and 2014. In 2014 the current ratio fell by 5.76% compared to 2013 while experiencing an increase again in 2015 which was 6.14% compared to in 2014 which was to become 22.09%.

b. PT. Hanjaya Mandala Sampoerna Tbk

Based on the results of fast ratio calculations in table 4.1 above, it can be seen that the fast ratio of PT. Hanjaya Mandala Sampoerna Tbk was 32.29% in 2013, 24.60% in 2014, and 236.54% in 2015. This means that every Rp. 1, - current liabilities of the company are guaranteed payment by Rp. 0.32, - existing cash and receivables without having to wait for the results of the sale of inventory that the company already has in 2013, Rp. 0.25, - in 2014 and Rp. 2.37, - in 2015.

In table 1 above, it can be seen that the quick ratio or fast ratio in 2015 is the highest compared to 2013 and 2014. In 2014 the current ratio fell by 7.69% compared to 2013 while experiencing a significant increase in 2015 which was 211.94% compared to in 2014 which was to be 236.54%. The fast ratio is also influenced by current liabilities so that if the current ratio or current ratio is high, the ratio will be the same or the quick ratio will also increase or increase.

c. PT. Bentoel Internasional Investama Tbk

Based on the results of fast ratio calculations in table 4.1 above, it can be seen that the fast ratio of PT. Bentoel Internasional Investama Tbk is 21.83% in 2013, 22.74% in 2014, and 47.33% in 2015. This means that every Rp. 1, - current liabilities of the company are guaranteed payment by Rp. 0.22, - existing cash and receivables without having to wait for the results of the sale of inventory that the company already has in 2013, Rp. 0.23, - in 2014 and Rp. 0.47, - in 2015.

In table 1 above, it can be seen that the quick ratio or fast ratio in 2015 is the highest compared to 2013 and 2014. In 2014 the current ratio fell by 0.91% compared to 2013 while experiencing an increase again in 2015 which was 24.59% compared to in 2014, which was 47.33%. The fast ratio is also influenced by current liabilities so that if the current ratio or current ratio is high, it will be the same at the fast ratio or the quick ratio will also be high or increase.

d. PT. Wismilak Inti Makmur Tbk

Based on the results of fast ratio calculations in table 4.1 above, it can be seen that the fast ratio of PT. Wismilak Inti Makmur Tbk was 73.55% in 2013, 56.03% in 2014, and 66.30% in 2015. This means that every Rp. 1, - current liabilities of the company are guaranteed payment by Rp. 0.74, - cash and receivables that exist without having to wait for the results of sales of inventory that the company already has in 2013, Rp. 0.56, - in 2014 and Rp. 0.66, - in 2015.

In table 1 above, it can be seen that the quick ratio or fast ratio in 2013 was the highest compared to 2014 and 2015. In 2014 the current ratio fell by 17.52% compared to 2013 while experiencing an increase again in 2015 which was 10.27% compared to in 2014 which was to be 66.30%.

3. Cash Ratio

Cash Ratio is used to measure the level of a company's ability to pay current debt or short-term liabilities with available cash or cash equivalents. The cash ratio is obtained from the comparison between cash or cash equivalents with current liabilities.

a. PT. Gudang Garam Tbk (GGRM)

Based on the calculation of the cash ratio or cash ratio in table 4.1 above it can be seen that the fast ratio of PT. Gudang Garam Tbk is 6.99% in 2013, 6.68% in 2014, and 11.34% in 2015. This means that every Rp. 1, - current liabilities of the company are guaranteed payment by Rp. 0.07, - cash held by the company in 2013 and 2014 and Rp. 0.11, - in 2015.

In table 1 above, it can be seen that the cash ratio or ratio in 2015 was the highest compared to 2013 and 2014. In 2014 the cash ratio fell by 0.31% compared to 2013 while experiencing an increase again in 2015 at 4.66% compared to in 2014 which was to become 11.34%.

b. PT. Hanjaya Mandala Sampoerna Tbk

Based on the calculation of the cash ratio or cash ratio in table 4.1 above it can be seen that the fast ratio of PT. Hanjaya Mandala Sampoerna Tbk is 5.42% in 2013, 0.48% in 2014, and 37.87% in 2015. This means that every Rp. 1, the current liability of the company is guaranteed payment by Rp. 0.05, - cash owned by the company in 2013, Rp. 0.005, - in 2014 and Rp. 0.38, - in 2015.

In table 1 above, it can be seen that the cash ratio or ratio in 2015 was the highest compared to 2013 and 2014. In 2014 the cash ratio fell by 4.94% compared to 2013 while experiencing a significant increase in 2015 which was 37.39% compared to 2014 is 37.87%. The increase is significant because the company's cash or cash equivalents increase significantly and the company's current liabilities decrease significantly too.

c. PT. Bentoel Internasional Investama Tbk

Based on the results of the calculation of cash ratios in table 4.1 above it can be seen that the fast ratio of PT. Bentoel Internasional Investama Tbk is 6.91% in 2013, 0.91% in 2014, and 5.67% in 2015. This means that every Rp. 1, the current liability of the company is guaranteed payment by Rp. 0.07, - cash owned by the company in 2013, Rp. 0.01, - in 2014 and Rp. 0.06, - in 2015.

In table 1 above, it can be seen that the cash ratio or ratio in 2013 was the highest compared to 2014 and 2015. In 2014 the cash ratio fell by 6% compared to 2013 while experiencing an increase again in 2015 at 4.76% compared to in 2014 which was 5.67%. In 2014 the cash ratio was very small because cash and cash equivalents were very low.

d. PT. Wismilak Inti Makmur Tbk

Based on the results of the calculation of cash ratios in table 4.1 above it can be seen that the fast ratio of PT. Wismilak Inti Makmur Tbk was 40.43% in 2013, 17.10% in 2014, and 26.89% in 2015. This means that every Rp. 1, the current liability of the company is guaranteed payment by Rp. 0.40, - cash owned by the company in 2013, Rp. 0.71, - in 2014 and Rp. 0.27, - in 2015.

In table 1 above, it can be seen that the cash ratio or ratio in 2013 was the highest compared to 2014 and 2015. In 2014 the cash ratio fell by 23.33% compared to 2013 while it increased again in 2015 which was 9.79% compared to in 2014 which was 26.89%. In 2013 the company's cash and cash equivalents were the highest.

Profitability ratio

Table 2. Profitability Ratios in Cigarette Industry Companies listed on the Indonesia Stock Exchange

Liquidity Risk	Company	Years		
		2013	2014	2015
Gross Profit Margin	GGRM	19.61%	20.53%	22.01%
	HMSP	26.74%	25.41%	24.44%
	RMBA	14.98%	11.22%	10.20%
	WIIM	29.57%	29.12%	30.44%
Net Profit Margin	GGRM	7.91%	8.33%	9.17%
	HMSP	14.42%	12.62%	11.64%
	RMBA	-8.18%	-15.54%	-9.74%
	WIIM	8.33%	6.78%	7.13%
Return on Assets	GGRM	8.3%	9.33%	10.16%
	HMSP	39.48%	35.87%	27.26%
	RMBA	-10.31%	-20.80%	-12.94%
	WIIM	10.77%	8.45%	9.76%
Return on Equity	GGRM	14.90%	16.40%	16.98%
	HMSP	76.43%	75.43%	32.37%
	RMBA	-101.80%	175.74%	52.04%

	WIIM	16.93%	13.31%	13.89%
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Profitability ratio measurement is carried out to determine the company's ability to generate corporate profits. Table 2 above is the result of calculation of profitability ratios for cigarette industry companies listed on the Indonesia Stock Exchange.

1. Gross Profit Margin

Gross profit margin is a ratio that measures the efficiency of controlling the cost of goods or production costs, indicating the company's ability to produce efficiently. Gross profit margin is the percentage of gross profit compared to sales.

a. PT. Gudang Garam Tbk (GGRM)

Based on the calculation of gross profit margin in table 4.2 above, it can be seen that the gross profit margin of PT. Gudang Garam Tbk is 19.61% in 2013, 20.53% in 2014, and 22.01% in 2015. This means that each sale is Rp. 1 company gets a gross profit of Rp. 0.20, - in 2013, Rp. 0.21, - in 2014 and Rp. 0.22, - in 2015.

In table 2 above, it can be seen that gross profit margin or gross profit margin in 2015 is the highest compared to 2013 and 2014. In 2013 the margin of gross profit was the lowest, this means that from 2013 to 2015 the gross profit margin continued to increase from 0.92 % to 1.48%.

b. PT. Hanjaya Mandala Sampoerna Tbk

Based on the calculation of gross profit margin in table 4.2 above, it can be seen that the gross profit margin of PT. Hanjaya Mandala SampoernaTbk is 26.75% in 2013, 25.41% in 2014, and 24.44% in 2015. This means that each sale is Rp. 1 company gets a gross profit of Rp. 0.27, - in 2013, Rp. 0.25, - in 2014 and Rp. 0.24, - in 2015.

In table 2 above it can be seen that the gross profit margin or gross profit margin in 2013 was the highest compared to 2014 and 2015. In 2015 the gross profit margin was the lowest, this means that from 2013 to 2015 the gross profit margin continued to decline from 0.97% to 1.34%.

c. PT. Bentoel Internasional Investama Tbk

Based on the calculation of gross profit margin in table 4.2 above, it can be seen that the gross profit margin of PT. Bentoel International InvestamaTbk is 14.98% in 2013, 11.22% in 2014, and 10.20% in 2015. This means that each sale is Rp. 1 company gets a gross profit of Rp. 0.15, - in 2013, Rp. 0.11, - in 2014 and Rp. 0.10, - in 2015.

In table 2 above it can be seen that the gross profit margin or gross profit margin in 2013 was the highest compared to 2014 and 2015. In 2015 the gross profit margin was the lowest, this means that from 2013 to 2015 the gross profit margin continued to decline from 1.02% to 3.76%.

d. PT. Wismilak Inti Makmur Tbk

Based on the calculation of gross profit margin in table 4.2 above, it can be seen that the gross profit margin of PT. Wismilak Inti Makmur Tbk is 29.57% in 2013, 29.12% in 2014, and 30.44% in 2015. This means that each sale is Rp. 1 company gets a gross profit of Rp. 0.30, - in 2013, Rp. 0.29, - in 2014 and Rp. 0.30, - in 2015.

In table 2 above, it can be seen that the gross profit margin or gross profit margin in 2015 was the highest compared to 2014 and 2013. In 2013 the gross profit margin was the lowest, the gross profit margin in the company experienced a decline and a steady increase of 0.45 % to 1.32%.

2. Net Profit Margin

Net Profit margin is one of the ratios used to measure profit or loss margins on sales. The way to measure this ratio is to compare net profit or loss after tax with net sales.

a. PT. Gudang Garam Tbk (GGRM)

Based on the results of the calculation of net profit margins in table 4.2 above it can be seen that the net profit margin of PT. Gudang Garam Tbk is 7.91% in 2013, 8.33% in 2014, and 9.17% in 2015. This means that each sale is Rp. 1 company earns a net profit of Rp. 0.08, - in 2013 and 2014 and Rp. 0.09, - in 2015.

In table 2 above can be seen the net profit margin or net profit margin in 2015 is the highest compared to 2013 and 2014. In 2013 the net profit margin was the lowest, this means that from 2013 to 2015 the gross profit margin continued to increase from 0.42% to 0.84%.

b. PT. Hanjaya Mandala Sampoerna Tbk

Based on the results of the calculation of net profit margins in table 4.2 above it can be seen that the net profit margin of PT. Hanjaya Mandala Sampoerna Tbk is 14.42% in 2013, 12.62% in 2014, and 11.64% in 2015. This means that each sale is Rp. 1 company earns a net profit of Rp. 0.14, - in 2013, Rp. 0.13 in 2014 and Rp. 0.12, - in 2015.

In table 2 above, it can be seen that the net profit margin or net profit margin in 2013 was the highest compared to 2014 and 2015. In 2013 the net profit margin was the highest, this means that from 2013 to 2015 the gross profit margin continued to decline from 0.98% to 1.80%.

c. PT. Bentoel Internasional Investama Tbk

Based on the results of the calculation of net profit margins in table 4.2 above it can be seen that the net profit margin of PT. Bentoel International Investama Tbk suffered a loss not profit. The company's net loss was -8.18% in 2013, -15.54% in 2014, and -9.74% in 2015. This means that each sale is Rp. 1 company suffered a net loss of Rp. 0.08, - in 2013, Rp. 0.16 in 2014 and Rp. 0.10, - in 2015.

In table 2 above, it can be seen that net loss margin or net loss margin in 2014 was the highest compared to 2013 and 2015. In 2013 the net loss margin was the lowest and then increased by 7.36% in 2014 and fell back by 5.80% in 2015 a loss of 9.74%.

d. PT. Wismilak Inti Makmur Tbk

Based on the results of the calculation of net profit margins in table 4.2 above it can be seen that the net profit margin of PT. Wismilak Inti Makmur Tbk was 8.33% in 2013, 6.78% in 2014, and 7.13% in 2015. This means that each sale is Rp. 1 company earns a net profit of Rp. 0.08, - in 2013, Rp. 0.07 in 2014 and 2015.

In table 2 above, it can be seen that the net profit margin or net profit margin in 2013 was the highest compared to 2014 and 2015. In 2014 the net profit margin was the lowest, this means that from 2014 the net profit margin decreased by 1.55 % and increased again in 2015 by 0.35% to 7.13%.

3. **Return On Assets**

Return on assets is a measurement of the company's overall ability to generate profits with the total amount of assets available in the company, the higher this ratio means the better the condition of a company. Return on assets measures the ability of a company to utilize its assets to make a profit.

a. PT. Gudang Garam Tbk (GGRM)

Based on the results of the calculation of net profit margins in table 4.2 above it can be seen that the return on assets of PT. Gudang Garam Tbk is 8.63% in 2013, 9.33% in 2014, and 10.16% in 2015. This means that the company is able to manage each asset of Rp. 1 to make a profit of Rp. 0.9, - in 2013 and 2014 and Rp. 0.10, - in 2015.

In table 2 above, it can be seen that return on assets in 2015 is the highest compared to 2013 and 2014. In 2013 the return on assets was the lowest, this means that from 2013 to 2015 the return on company assets continued increased from 0.70% to 0.83%.

b. PT. Hanjaya Mandala Sampoerna Tbk

Based on the results of the calculation of net profit margins in table 4.2 above it can be seen that the return on assets of PT. Hanjaya Mandala Sampoerna Tbk is 39.48% in 2013, 35.87% in 2014, and 27.26% in 2015. This means that the company is able to manage each asset of Rp. 1 to make a profit of Rp. 0.39, - in 2013, Rp. 0.36, - in 2014 and Rp. 0.27, - in 2015.

In table 2 above, it can be seen that return on assets or returns on assets in 2015 were the lowest compared to 2013 and 2014. In 2013 the return on assets was the highest, this means that from 2013 to 2015 returns on company assets continued decreased from 3.61% to 8.61%.

c. PT. Bentoel Internasional Investama Tbk

Based on the results of the calculation of net profit margins in table 4.2 above it can be seen that the return on assets of PT. Bentoel International Investama Tbk suffered a loss because its net income suffered a loss, therefore the return on assets also lost to -10.31% in 2013, -20.80% in 2014, and -12.94% in 2015. This means that companies cannot manage each assets of Rp. 1 and suffered a loss of Rp. 0.10, - in 2013, Rp. 0.21, - in 2014 and Rp. 0.13, - in 2015.

In table 2 above, it can be seen that return on assets in 2013 was the lowest compared to 2014 and 2015. In 2014 the return on assets was the highest, this means that from 2014 it increased by 10.49% compared to 2013 and decreased returned by 7.86% in 2015 to 12.94%.

d. PT. Wismilak Inti Makmur Tbk

Based on the results of the calculation of net profit margins in table 4.2 above it can be seen that the return on assets of PT. Wismilak Inti Makmur Tbk is 10.77% in 2013, 8.45% in 2014, and 9.76% in 2015. This means that the company is able to manage each asset of Rp. 1 to make a profit of Rp. 0.11, - in 2013, Rp. 0.08, - in 2014 and Rp. 0.10, - in 2015.

In table 2 above it can be seen that return on assets or returns on assets in 2014 were the lowest compared to 2013 and 2015. In 2013 the return on assets was the highest, this means that from 2014 it decreased by 2.32% compared to 2013 and increased by 1.31% in 2015 to 9.76%.

4. Return On Equity

Returns on equity or return on equity is the ratio for measuring net income after tax with own capital. This ratio shows the efficiency of the use of own capital.

a. PT. Gudang Garam Tbk (GGRM)

Based on the results of the calculation of return on equity in table 4.2 above it can be seen that the return on equity of PT. Gudang Garam Tbk is 14.90% in 2013, 16.40% in 2014, and 16.98% in 2015. This means that the company is able to manage its own capital of Rp. 1 to make a profit of Rp. 0.15, - in 2013, Rp. 0.16, - in 2014 and Rp. 0.17, - in 2015.

In table 2 above, it can be seen that the return on equity in 2015 was the highest compared to 2013 and 2014. In 2013 the net profit margin was the lowest, this means that from 2013 to 2015 the return on company assets continued increased from 0.58% to 1.50%.

b. PT. Hanjaya Mandala Sampoerna Tbk

Based on the results of the calculation of return on equity in table 4.2 above it can be seen that the return on equity of PT. Hanjaya Mandala Sampoerna Tbk was 76.43% in 2013, 75.43% in 2014, and 32.37% in 2015. It means that the company is able to manage its own capital of Rp. 1 to make a profit of Rp. 0.76, - in 2013, Rp. 0.75, - in 2014 and Rp. 0.32, - in 2015.

In table 2 above it can be seen that the return on equity or return on capital in 2013 was the highest compared to 2014 and 2015. In 2015 the return on capital was the lowest, this means that from 2013 to 2015 the return on company assets continued decreased from 1% to 43.06%.

c. PT. Bentoel Internasional Investama Tbk

Based on the results of the calculation of return on equity in table 4.2 above it can be seen that the return on equity of PT. Bentoel Internasional Investama Tbk is -101.80% in 2013, 175.74% in 2014, and 52.04% in 2015. This means that the company is unable to manage its own capital of Rp.1, -and has a loss of Rp. 1.02, - in 2013, Rp. 1.76, - in 2014 and Rp. 0.52, - in 2015.

In table 2 above, it can be seen that the return on equity or return on capital in 2014 was the highest compared to 2013 and 2015. In 2015 the return on capital was the lowest, this means that the return on company equity rose in 2014 by 73.94 % compared to 2013 and fell back in 2015 by 123.70% compared to 2014, which was -52.04%. Based on the financial statements of PT. Bentoel Internasional Investama Tbk suffered a loss and the company did not get a return on its equity.

d. PT. Wisnilak Inti Makmur Tbk

Based on the results of the calculation of return on equity in table 4.2 above it can be seen that the return on equity of PT. Wisnilak Inti Makmur Tbk is 16.93% in 2013, 13.31% in 2014, and 13.89% in 2015. This means that the company is able to manage its own capital of Rp. 1 to make a profit of Rp. 0.17, - in 2013, Rp. 0.13, - in 2014 and Rp. 0.14, - in 2015.

In table 2 above, it can be seen that the return on equity or return on capital in 2013 was the highest compared to 2014 and 2015. In 2014 it decreased by 3.62% compared to 2013 and increased again in 2015 by 0.58% to 13.89% .

Rasio Solvabilitas

Table 3 Solvability Ratios in Cigarette Industry Companies listed on the Indonesia Stock Exchange

Solvability Ratio	Company	Years		
		2013	2014	2015
Debt Ratio/Debt to Asset Ratio	GGRM	42.06%	43.09%	40.15%
	HMSP	48.35%	52.44%	15.77%
	RMBA	89.88%	111.84%	124.86%
	WIIM	37.70%	36.62%	29.72%
Debt to Equity Ratio	GGRM	72.59%	75.75%	67.08%
	HMSP	93.60%	110.26%	18.72%
	RMBA	887.71%	-994.74%	-502.30%
	WIIM	60.20%	57.67%	42.28%

Measurement of solvency ratios or leverage aims to analyze spending made in the form of debt and capital composition and the ability of companies to pay interest costs. Table 4.3 above is the result of the calculation of solvency ratios for cigarette industry companies listed on the Indonesia Stock Exchange.

1. Debt Ratio

This ratio is also known as the debt to assets ratio. Creditors want a low ratio of debt to assets equity because the higher the ratio, the greater the risk of creditors.

a. PT. Gudang Garam Tbk (GGRM)

Based on the calculation of the debt ratio or the ratio of debt to assets in table 4.3 above, it can be seen that the debt ratio of PT. Gudang Garam Tbk is 42.06% in 2013, 43.09% in 2014, and 40.15% in 2015. This means that every Rp. 1 asset is financed by a debt of Rp. 0.42, - in 2013, Rp. 0.43, - in 2014 and Rp. 0.40, - in 2015.

Table 3 above shows that the debt ratio or debt to assets ratio or the ratio of debt to assets in 2014 is the highest compared to 2013 and 2015. In 2014 the debt ratio increased by 1.03% compared to 2013 and then decreased by 2.94% in 2015 to 40.15%.

b. PT. Hanjaya Mandala Sampoerna Tbk

Based on the calculation of the debt ratio or the ratio of debt to assets in table 4.3 above, it can be seen that the debt ratio of PT. Hanjaya Mandala Sampoerna Tbk was 48.35% in 2013, 52.44% in 2014, and 15.77% in 2015. That means every Rp. 1 asset is financed by a debt of Rp. 0.48, - in 2013, Rp. 0.52, - in 2014 and Rp. 0.16, - in 2015.

Table 3 above shows that the debt ratio or debt to assets ratio or the ratio of debt to assets in 2014 is the highest compared to 2013 and 2015. In 2014 the debt ratio increased by 4.09% compared to 2013 and then decreased by 36.67% in 2015 to be 15.77%.

c. PT. Bentoel Internasional Investama Tbk

Based on the calculation of the debt ratio or the ratio of debt to assets in table 4.3 above, it can be seen that the debt ratio of PT. Bentoel Internasional Investama Tbk was 89.88% in 2013, 111.84% in 2014 and 124.86% in 2015. That means every Rp. 1 asset is financed by a debt of Rp. 0.90- in 2013, Rp. 1.12, - in 2014 and Rp. 1.25, - in 2015.

Table 3 above shows that the debt ratio or debt to assets ratio or the ratio of debt to assets in 2015 is the highest compared to 2013 and 2014. In 2013 the debt ratio was the lowest, meaning that the company's debt ratio had increased starting from 13.02 % to 21.96% during 2013 until 2015.

d. PT. Wismilak Inti Makmur Tbk

Based on the calculation of the debt ratio or the ratio of debt to assets in table 4.3 above, it can be seen that the debt ratio of PT. Wismilak Inti Makmur Tbk is 37.70% in 2013, 36.62% in 2014, and 29.72% in 2015. This means that every Rp. 1 asset is financed by a debt of Rp. 0.38, - in 2013, Rp. 0.37, - in 2014 and Rp. 0.30, - in 2015.

Table 3 above shows that the debt ratio or debt to assets ratio or the ratio of debt to assets in 2013 was the highest compared to 2014 and 2015. This means that the ratio of debt to assets declined from 2013 to 2015 by 1.08% to 6.9%.

2. **Debt To Equity Ratio**

This ratio shows the ratio of debt and capital. This ratio is an important one because it relates to the problem of trading on equity, which can have a positive and negative influence on the profitability of the equity of the company.

a. PT. Gudang Garam Tbk (GGRM)

Based on the calculation of the debt to equity ratio in table 4.3 above, it can be seen that the debt to equity ratio of PT. Gudang Garam Tbk is 72.59% in 2013, 75.75% in 2014, and 67.08% in 2015. That is to say the creditors get funding every Rp. 1, - own capital of Rp. 0.73, - in 2013, Rp. 0.76, - in 2014 and Rp. 0.67, - in 2015.

Table 3 above shows that the debt to equity ratio or the ratio of debt to equity in 2014 was the highest compared to 2013 and 2015. In 2014 the debt ratio increased by 3.16% compared to 2013 and then declined by 8.67% in 2015 to 67.08%.

b. PT. Hanjaya Mandala Sampoerna Tbk

Based on the calculation of the debt to equity ratio in table 4.3 above, it can be seen that the debt to equity ratio of PT. Hanjaya Mandala Sampoerna Tbk is 93.60% in 2013, 110.26% in 2014, and 18.72% in 2015. That is to say the creditors get funding every Rp. 1, - own capital of Rp. 0.94, - in 2013, Rp. 1.10, - in 2014 and Rp. 0.19, - in 2015.

Table 3 above shows that the debt to equity ratio or the ratio of debt to equity in 2014 was the highest compared to 2013 and 2015. In 2014 the debt ratio increased by 16.66% compared to 2013 and subsequently decreased by 91.54% in 2015 to become 18.72%.

c. PT. Bentoel Internasional Investama Tbk

Based on the calculation of the debt to equity ratio in table 4.3 above, it can be seen that the debt to equity ratio of PT. Bentoel Internasional Investama Tbk was 887.71% in 2013, -944.74% in 2014, and -

502.30% in 2015. This means that creditors receive funds of Rp. 1, - own capital of Rp. 8.88, - in 2013, Rp. -9.45, - in 2014 and Rp. -5.02, - in 2015.

In table 3 above, we can see the debt to equity ratio or the ratio of debt to equity in 2014 and 2015, which means that the company is unable to get credit from its own capital in 2014 and 2013. The ratio of the company is also unstable. This happened because the company suffered losses.

d. **PT. Wismilak Inti Makmur Tbk**

Based on the calculation of the debt to equity ratio in table 4.3 above it can be seen that the debt ratio to the equity of PT. Wismilak Inti Makmur Tbk is 60.20% in 2013, 57.67% in 2014, and 42.28% in 2015. That is to say the creditors get funding every Rp. 1, - own capital of Rp. 0.60, - in 2013, Rp. 0.58, - in 2014 and Rp. 0.42, - in 2015.

Table 3 above shows that the debt to equity ratio or the ratio of debt to equity in 2013 was the highest compared to 2014 and 2015. That means the debt to equity ratio of the company decreased in 2013 to 2015, a decrease of 2.53% to 15.39%.

V. CONCLUSIONS

Based on the analysis to assess the performance of the company using a financial statement measuring instrument, namely liquidity ratio, profitability and solvency with the comparison year 2013 to 2015, it can be concluded that:

1. **PT. Gudang Garam Tbk (GGRM)**

Based on the liquidity ratio, namely the current ratio or the current ratio of PT. Gudang Garam Tbk has a stable ratio from 2013 to 2015. When compared to similar industries the ratio rate at the company is not maximized, the company's performance should be maximized. When compared with similar industries, companies have the highest current liabilities compared to other similar companies. Judging from the quick ratio or quick ratio of PT. Gudang Garam Tbk is also calculated to be stable from 2013 to 2015 but the company has a low ratio due to the high availability of the company. The cash ratio or cash ratio of PT. Warehouse Salt Tbk can also be said to be stable, but cash or cash equivalents of high companies from 2013 to 2015. Cash that is too high is also not good because it means there are funds that are unemployed and companies do not use their funds effectively.

Based on profitability ratios, the gross profit margin or gross profit margin increases every year. Profitability ratio of PT. Gudang Garam Tbk can be said to be good but compared to similar companies, the company's gross profit margin should be improved. Viewed from the net profit margin or the net profit margin also increases every year. The company's net profit margin can be said to be stable but the company should be able to increase its net profit margin to get maximum profit. Judging from the return on assets or return on assets of PT. Gudang Garam Tbk has also increased from 2013 to 2015 and is stable and good. The results of the calculation of returns on equity or return on equity also increase every year, meaning that the return on equity of the company is good even though it can actually be maximized and classified as stable compared to other similar companies. Based on the solvency ratio can be said PT. Gudang Garam Tbk solvable in terms of debt to asset ratio and debt to equity ratio and the company can be said to be good because it can cover almost half of its debt with assets and approximately 70% of its equity.

2. **PT. Hanjaya Mandala Sampoerna Tbk (HMSP)**

Based on the liquidity ratio, the current ratio or current ratio is indeed PT. Hanjaya Mandala Sampoerna can be said to be good but in 2015 the company's current ratio increased significantly, because the company paid off almost part of the company's current liabilities including excise debt. Whereas, the quick ratio or quick ratio of PT. Hanjaya Mandala Sampoerna Tbk was also quite good and experienced a significant increase in 2015 due to paying off part of the company's current liabilities. Based on the cash ratio or cash ratio of PT. Hanjaya Mandala Sampoerna Tbk is unstable because from 2013 to 2014 it has decreased and in 2014 to 2015 experienced a significant increase.

Based on profitability ratios, the gross profit margin or gross profit margin has decreased every year even though the sales of PT. Hanjaya Mandala Sampoerna is increasing. Judging from the net profit margin or the net profit margin, it also decreases every year but remains good. Judging from the return on assets or return on assets of PT. Hanjaya Mandala Sampoerna Tbk also decreases every year even though the company's assets increase but the company's net income is less stable with fluctuations during 2013 to 2015. The calculation of return on equity is also decreasing every year and can be said to be less stable.

Based on the solvency ratio can be said PT. Hanjaya Mandala Sampoerna Tbk solvable in terms of debt to asset ratio and debt to equity ratio. Judging from the debt ratio, the company is very capable of paying its obligations with assets it has as well as seen from the debt to equity ratio. But in 2014 the company's debt to

equity ratio declined and then increased significantly in 2015 because the company paid off most of its obligations.

3. **PT. Bentoel Internasional Investama Tbk**

Based on the liquidity ratio, the current ratio or current ratio can be said to be less good compared to similar companies and less stable, this is caused by an increase in the company's current liabilities from 2013 to 2014 and decreases again in 2015. Based on the quick ratio or quick ratio of PT. Bentoel Internasional Investama Tbk can be said to be stable but it is still not good because the ratio is still relatively low. Based on the cash ratio or cash ratio of PT. Bentoel Internasional Investama Tbk is not good because the company's cash and cash equivalents are very much proportional to the company's total current liabilities.

Based on profitability ratios, the gross profit margin or gross profit margin has decreased every year even though the company's sales have increased, this is also caused by the increased sales burden. Judging from the net profit margin or the company's net profit margin, it loses not profit, because the company's net profit is unable to cover the sales expenses and other financial burdens of the company. Judging from the return on assets or return on assets and returns on equity or return on equity, PT. Bentoel Internasional Investama Tbk can be said not to get returns from assets and equity owned by the company because the company lost money during 2013 to 2015.

Based on the solvency ratio can be said PT. Bentoel Internasional Investama Tbk is not solvable because only in 2013 the company was able to cover its obligations with assets but in 2014 and 2015 the company could not cover its obligations with assets when viewed from the debt ratio. If viewed from the debt to equity ratio from 2013 to 2015 the company is unable to cover its obligations with equity owned.

4. **PT. Wisnilak Inti Makmur Tbk**

Based on the liquidity ratio, namely the current ratio or the current ratio of PT. Wisnilak Inti Makmur Tbk can be said to be good and stable compared to other similar companies and half of the company's assets are able to cover the company's current liabilities. Based on the quick ratio or quick ratio of PT. Wisnilak Inti Makmur Tbk can be said to be good because the company does not have a high supply but is said to be quite effective. Based on the cash ratio or cash ratio at PT. Wisnilak Inti Makmur Tbk can be said to be less good because the company has cash and cash equivalents that are far lower than the current liabilities of the company.

Based on profitability ratios, PT. Wisnilak Inti Makmur Tbk's gross profit margin or gross profit margin has the highest gross income compared to the other three similar companies and this means that PT. Wisnilak Inti Makmur Tbk has good sales. Judging from the net profit margin or the poor net profit margin, companies should be able to increase their net income higher. Judging from the return on assets or return on assets of PT. Wisnilak Inti Makmur Tbk also experienced an increase and decrease but remained stable. The results of the calculation of returns on equity or return on equity also experienced increases and decreases and were not good but remained stable.

Based on the solvency ratio can be said PT. Wisnilak Inti Makmur Tbk solvable in terms of the debt to assets ratio and the debt to equity ratio but not every year. Viewed from 2013 to 2015 it can be said that the company is able to cover its obligations with assets and equity.

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