Financial Performance Analysis Using the Economic Value Added Method in the Food and Beverage Sub-Sector Listed on the Indonesia Stock Exchange

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ABSTRACT

This study aims to determine the financial performance using the Economic Value Added (EVA) method in food and beverage sub-sector companies listed on the Indonesia Stock Exchange for the last five years (2016-2020 period). The research method used is a quantitative method with a descriptive approach. The data used is secondary data in the form of Company Financial Statements obtained from the official website of the Indonesia Stock Exchange. The results of the study were based on an analysis using the EVA method from five food and beverage companies that had good financial performance (positive EVA) during the 2016-2020 period, namely MLBI, MYOR, and ULTJ. Analysis of the company's performance with the method shows the EVA fluctuating results. This is because the value of NOPAT and capital charges is very influential on EVA results. Where if the NOPAT value is greater than the value of capital charges, the resulting EVA will increase and vice versa. The results of the EVA analysis show that positive accounting earnings do not always show the results that the EVA value is also positive. This is due to an increase in the cost of equity capital which greatly affects the value of WACC which results in an increase in the value of capital charges borne by the company, where the value of capital charges reduces the value of EVA.

INTRODUCTION

Every company established has a goal to get the maximum profit. The way that can be done is by increasing the value of the company, by producing a return on invested capital that is higher than the cost of capital. The higher the value of the company indicates an increase in shareholder profits. The factors that influence the company's assessment come from the company's performance.

Financial statements are used as a means of assessing the company's performance. Financial reports can also be used to see the progress and results of the company's ability to run its business. Investors can assess a company through the information contained in the company's financial statements. With this information, investors can analyze how the company's financial condition is related to investment decisions. This analysis aims to see the company's ability to manage investment funds (Syam, 2018).

Many methods can be used in measuring financial performance, the most common is to use of financial analysis tools such as liquidity ratios, profitability, or solvency. However, measurement with this ratio has a risk because it ignores the cost of capital, this is the weakness of these methods. The Economic Value Added (EVA) method is a solution to these weaknesses, whereas the EVA method is a measurement based on the value added (Cahyandari et al., 2021).

The EVA method looks at how the company's ability to process operating costs and capital costs is based on company profits. This is the basis for assessing the company's welfare. So this method is used as a benchmark for investors in assessing how the company's influence on invested capital (Saputra, 2020).

With the EVA method we can see the value added obtained by the company, this value added is important for investors. A positive EVA indicates the ability of the company's management to create added value for the company and will be a reference for potential investors in making investments because the company is considered to have good performance. A negative Eva indicates that there is no added value or a decrease in value so that investors have a desire to sell shares in the company. Companies that have good performance will be able to attract many investors so that the company can increase their share prices (Verjenia, 2020).

The manufacturing industry has a great influence on economic growth in Indonesia. Despite the threat from the Covid-19 pandemic, in the second quarter of 2021, the manufacturing industry grew by 6.91%. Meanwhile, in the third quarter of 2021, the manufacturing industry grew by 3.68% and supported 0.75% of Indonesia's economic growth (BKPM, 2021).

The manufacturing sector is very influential on the national GDP. Based on data from the Ministry of Industry, the percentage in the manufacturing sector in 2021 is 17.34%, and the food and beverage sub-sector is the top supporter...
with a percentage of 6.66% (BKPM, 2021).

Fig.1 Trends in Food and Beverage Industry Growth Data for 2010-2021

Compared to other sectors, the growth rate of the consumer goods industry is the highest. One of the food and beverage sub-sectors is because food and beverages are very important in people's lives and people will always consume food and drinks. That's why the authors chose this sub-sector as the object of research.

Along with economic growth in Indonesia, intense competition has resulted in the creation of a demand for companies to continuously improve their information and financial performance of companies. EVA is the right measuring tool because it pays attention to all variables in creating economic added value by reducing the cost of capital for investment activities (Triani, 2017).

Based on research by Malhamah & Octavera (2018) on Financial Performance Analysis Using the Economic Value Added (EVA) and Market Value Added (MVA) method, an empirical study on manufacturing companies in the food and beverage sub-sector that went public in the Indonesia Stock Exchange for the period 2011-2015. The results showed that PT Indofood Sukses Makmur Tbk had the highest EVA and MVA values, while PT Ultrajaya Milk Industry & Trading Company Tbk had the lowest EVA and MVA values. High or low EVA value is influenced by the size of the company's capital.

Based on the discussion above, the authors are interested in conducting research under the title "Financial Performance Analysis with the Economic Value Added (EVA) Method in Food and Beverage Sub-Sector Companies listed on the Indonesia Stock Exchange for the 2016-2020 period".

LITERATURE REVIEW

Financial performance, according to Fahmi (2018), is a measuring tool to analyze whether the company has implemented and realized the use of financial implementation rules properly and correctly based on the applicable rules. Good financial performance is an implementation based on applicable regulations. Meanwhile, according to Askarela (2020), financial performance is a financial picture that is measured using indicators of liquidity and profitability, both in terms of collecting and using funds within a certain period. Financial performance according to Sujarweni (2017) is the result of an assessment carried out on the work that has been completed by the company and then a comparison is made with the rules that have been set. Every job that has been completed needs to be measured/assessed periodically.

Based on the above opinion, it can be concluded that financial performance is an assessment carried out on the work that has been completed. The assessment aims to explain the company's financial condition during a certain period. The objectives of the performance appraisal according to Sujarweni (2017) are:

1. Describing the level of profitability/profitability, which shows the company's ability to generate profits within a certain period.
2. Describe the level of liquidity, namely the company's ability to pay debts that will be paid soon.
3. Describe the level of solvency, namely the company's ability to pay its debts (short-term debt and long-term debt) if the company is liquidated.
4. Assessing business stability, namely the company's ability to run its business stably.

In analyzing the company's financial performance there are several stages that can be done according to Fahmi (2017), namely:

1. Review of financial report data, the aim is to help adjust the completed report with applicable standards, so that financial statements can be accounted for.
2. Perform the calculation of the application, where the calculation is based on the problems that occur so that the final result of this calculation can provide conclusions related to the analysis discussed.

3. Comparing the results of the calculations being analyzed with the results of calculations from other companies. There are several comparison methods that can be used, namely:
   a. Cross-sectional approach, by comparing the results of the ratio calculation, between one company and another company in the same scope together
   b. Time series analysis, comparing between time or between gains, in this way the conclusions will be drawn graphically.

4. Doing interpretation to find out the problems and constraints being faced by the company.

5. Finding and providing the right solution, so that the constraints being faced by the company can be resolved immediately.

Notes that contain information that explains how a company's financial performance in a period can be seen from its financial statements. A financial report, according to Kasmir (2019), is a report that describes the company's current financial condition or at a certain period.

According to Hantono (2018), financial statements are the final result of a recording and calculation process that contains a summary of financial transactions that occurred in a certain period, which will describe the condition of the company's performance. The financial report, according to Suteja (2018), is a communication tool for interested parties, this report describes the company's financial position from the results of the accounting process for a certain period. Based on the above opinion, the authors conclude that the financial statements are reports that will provide information to interested parties, how the financial condition of a company in a certain period.

According to Novriansyah et al (2020), there are several types of financial statements in general, including:
   a. Balance
      The balance sheet is a financial statement that shows the number of assets and liabilities.
   a. Income statement
      The income statement is a financial statement that shows the amount of income and sources of income in the company. The income statement also contains the number and types of costs incurred by the company.
   b. Statement of changes in capital
      The statement of changes in the capital is a report that shows changes that occur in equity and shows what triggers changes in equity.
   c. Cash flow statement
      A cash flow statement is a report that shows various changes in cash (cash in and cash out).
   d. Report notes to financial statements
      Notes to financial statements are reports that contain other information required by users of financial statements.

In the company's financial statements there are goals to be achieved by the company. According to Kasmir (2019), the objectives of the financial statements are:
1. Financial statements describe the types and amounts of assets owned by the company.
2. Financial statements describe the types and amounts of liabilities and equity owned by the company.
3. Financial statements describe the types and amounts of income earned in one period.
4. Financial statements describe the types and amounts of costs incurred by the company in one period.
5. Financial statements explain changes in assets, liabilities, and company equity.
6. Financial statements describe the company's performance in a period.
7. Provide information about the notes to the financial statements.

It can be concluded that the financial statements have the purpose to provide an overview of the company's financial position and explain how the company's financial performance. The goal is to facilitate the company's economic decision-making.

The purpose of analyzing financial statements according to Harahap (2018) is to find out the company's financial position, this is very important for investors to make decisions. Financial statement analysis is carried out by describing the parts of the financial statements into a smaller piece of information, then looking at their interrelated relationships or those that have a relationship between one data and another. Analysis of financial statements according to Sujarwani (2017), was carried out to see the level of success of the company in the past, present, and future. Then the results of this analysis are used as a basis for decision-making by interested parties. Financial statement analysis according to Harmono (2017) is a tool used to analyze overall cash flow conditions used to measure the company's financial health level. The conclusion from the above discussion is that the analysis of financial statements is an analysis carried out as a whole, with the aim of knowing the company's financial condition. Then the results of the analysis will be the basis for investors in making decisions.
Economic Value Added (EVA)

The concept of EVA itself was first introduced in a book written by G. Bennett Stewart, Magining Parner of Stern Stewart & Co in 1991 entitled "The Quest For Value". Stewart revealed that the EVA concept measures the value of residual income minus the cost of capital operating profit activities. The conceptual calculation of EVA value is net operating profit after tax minus the cost of capital. The cost of capital represents the expected rate of return on capital by investors. The rate of return that is higher than the cost of capital indicates that the resulting EVA is positive. If the resulting EVA is positive, it reflects the company's added value.

On the other hand, if the rate of return is lower than the cost of capital, the EVA is negative. EVA which has a negative value indicates that the company has not been able to create added value. So, by looking at the EVA value of a company, investors can find out the company's profit and the company's ability to manage its capital. Through the calculation of the EVA value, investors get information about the financial situation in terms of company profits and know how the company manages the invested capital (Dewi, 2017).

Understanding EVA according to Sutrismi & Siviana (2021), namely EVA measures the company's performance based on value (Value), which measures the economic added value generated by the company as a result of management activities or strategies. By using EVA, company owners will only reward activities that can add value to the company and discard activities that can reduce the overall value of a company. The EVA concept is based on the main objective of management in carrying out the company's operational activities, namely to create the greatest prosperity for investors.

Based on the opinion above, the authors conclude that EVA is a concept used as a measuring tool for financial performance in creating added value with the aim of increasing company value and providing prosperity for capital owners. EVA has strengths and weaknesses in measuring financial performance. The advantages of EVA according to Feranita (2017) are as follows:

1. EVA is a measuring tool for measuring the return on investment expected by investors and the benchmark is based on market value.
2. EVA focuses on value added by calculating expenses as the impact of the investment.
3. EVA calculation does not require comparative data as a basis for assessment.
4. EVA application is very easy so this concept can be a quick consideration in making business decisions.

The EVA concept itself has weaknesses, namely:

a. EVA has a dogma that investors in conducting analysis always use a basic approach, even though many factors are more dominant.
b. EVA only calculates the final result, this concept does not measure the determinant activity.

For users of financial statements, EVA calculations can help make it easier to analyze financial statements. There are several benefits to applying the EVA concept according to Abdullah in Dewi (2017) including:

1) The application of the EVA concept has benefits in measuring company performance where value creation is the focus of performance appraisal.
2) By using the EVA concept, management will focus more on the interests of investors.
3) EVA can be a means of determining projects that generate higher returns than the cost of capital.
4) EVA encourages companies to put more emphasis on their capital structure policies.
5) EVA is the excess of NOPAT over the cost of capital, it can be calculated by the formula:

\[ EVA = NOPAT - Capital \text{ Charges} \]

\[ EVA = NOPAT - (WACC \times Invested \text{ Capital}) \]

Description:
EVA = Economic Value Added
NOPAT = Net Operating Profit After Tax
WACC = Weight Average Cost Of Capital

The steps in calculating the EVA value, namely:

1. Net Operating Profit After Tax (NOPAT)

The definition of NOPAT according to Tunggal in Wahyuni et al (2019) is NOPAT or net operating profit after tax where the profit rate is obtained from the share capital invested by investors. According to Brigham & Houston in Triani (2017), NOPAT is profit from company operations before interest and taxes (EBIT) minus taxes. Then the NOPAT formula can be written as follows:

\[ NOPAT = EBIT - TAX \]

Invested Capital (IC)
According to Subramanyam, K.R in Wahyuni et al (2019) Invested Capital is the amount used by the company in financing operations, which is the sum of long-term debt plus equity, minus short-term debt. According to Tunggal in Triani (2017), Invested Capital is the number of loans, in addition to short-term loans without interest (trade payables, accrued costs, tax debts, and other debts).

\[ IC = (\text{Total long-term debt} + \text{Equity}) - \text{Short-term debt} \]

2. Weighted Average Cost Of Capital (WACC)

According to Young S. in Jasinto (2017), WACC, or a weighted average cost of capital is the sum of the costs of each component of short-term debt capital, long-term debt, and shareholder equity calculated based on their relative size in the capital structure based on market value. According to Sjahrial in Triani (2017), WACC, or the weighted average cost of capital is the result of the sum of the results of the multiplication of the types of capital with the associated capital costs.

\[ \text{WACC} = \left[ (D \times rd)(1-tax) + (E \times re) \right] \]

Information:
- Capital Level of Debt (D) = (Total Debt if long)/(Total Debt if long+Equity) x 100%
- Cost Of Debt (rd) = (Interest expense)/(Total long term debt) x 100%
- Tax Rate (Tax) = (Tax expense)/(Net profit before tax) x 100%
- Equity Level (E) = (Total equity)/(Total debt if long+equity) x 100%
- Cost Of Equity (re) = (Net profit after tax)/(Total equity) x 100%

3. Capital Charges (CC)

According to Tunggal in Hastuti (2018) Capital Charges or capital costs are cash flows used to replace the risk of venture capital invested by investors. According to Keown et al in Triani (2017), the cost of capital is the costs sacrificed by the company in obtaining its source of funds. The cost of capital is the opportunity cost of investment funds.

\[ \text{Capital Charges} = \text{WACC} \times \text{Invested Capital} \]

According to Cahyandari et al (2021), the EVA method is an indicator that determines whether or not there is an increase in the value of an investment. The indicators in determining EVA assessment, among others:
- If EVA > 0, it means that EVA is positive indicating the added value of the company which means the company's performance is good. This shows that the profit generated exceeds the expectations of investors.
- If EVA = 0, it shows the company's break-even condition. This shows that the available profit break even is only used to meet the expectations of creditors and investors.
- If EVA < 0, it means that EVA is negative indicating that there is no added value in the company, which means that the company's performance is not good. This shows that the company's capital is greater than operating profit after tax. In this condition, the available profit cannot cover the capital on investment.

According to Candra (2017), there are factors that influence the change in EVA, which are as follows:
1. Risk Level
   The cost of equity takes into account the level of risk, so the high and low levels of risk will affect the value of capital. Indirectly, this level of risk causes changes to the company's EVA value
2. Debit Fee
   The company's financial performance can be different each year, this can be caused by changes in the cost of debt each year. The big/small cost of debt will affect the value of the company's EVA each year. If the resulting NOPAT is lower than the total cost of debt and capital, EVA will be negative and the company's performance is considered less good. Conversely, if the resulting NOPAT is higher than the total cost of debt and capital, EVA will be positive and the company's performance is considered good and able to create economic added value for the company and investors.
3. Cost of Equity
   EVA value fluctuated, also caused by the cost of capital used in operational activities. The increase in capital will affect the increase in the value of NOPAT which affects the size of the EVA value. These factors are very important in improving the company's financial performance.

METHOD

This research was conducted on 5 food and beverage companies listed on the Indonesia Stock Exchange for the 2016-2020 period. Researchers chose the Indonesia Stock Exchange as a place of research because the Indonesia Stock Exchange is the first stock exchange in Indonesia and has complete and well-organized data. This research will be carried out in 2022. Quantitative research with a descriptive approach is used as this type of research because this study
uses data in the form of numbers to calculate the EVA value of the company and then compares each period, then the results of the study are presented in tabular form. Quantitative data is the type of data used in this study. Quantitative data is data in the form of numbers and figures that can be calculated directly. The data used is in the form of the company's annual financial statements for 2016-2020. Secondary data is the data used by the author in the study. According to Sugiyono (2019), secondary data is data whose sources come from documents or other people, not given directly to researchers. Examples of secondary data in the form of documents, data, or tables related to research-related problems.

The data used by the author is the annual financial report (Annual Report) of food and beverage companies listed on the Indonesia Stock Exchange in 2016-2020, which was taken through the official website of the Indonesian Stock Exchange (IDX), namely www.idx.co.id.

The population in this study are companies in the food and beverage sub-sector listed on the Indonesia Stock Exchange in the 2016-2020 period and obtained as many as 26 companies. The purposive sampling method is the basis for determining the sample. The criteria for selecting the research sample include:

1. The food and beverage sub-sector companies are listed on the Indonesia Stock Exchange during the study period from 2016 to 2020.
2. The company has complete financial reports and annual reports for 5 years, from 2016 to 2020.
3. The company earns a profit during the 5-year study period.


The data analysis technique is the next step after the data obtained from the studied sample has been collected. The data analysis technique used in this research is a quantitative descriptive analysis where this research is related to the elaboration of statistical figures.

First, the researchers first collected data through documentation data in the form of numbers on the financial statements of the food and beverage sub-sector companies listed on the Indonesia Stock Exchange. Then the numbers are selected and summarized as needed in analyzing the data. Furthermore, the researchers analyzed the data using the Economic Value Added (EVA) method, the aim was to measure the financial performance of companies in the food and beverage sub-sector. After doing the calculations, then interpreting the conclusions to make it easier for researchers to see the overall picture of the research data.

The stages of calculating the Economic Value Added (EVA) according to Stern Steward & Co in 1993 in Hefrizal (2018), are:

a. Net Operating Profit After Tax (NOPAT)
   NOPAT=EBIT-TAX

b. Invested Capital (IC)
   IC=(Total long-term debt+Equity)-Short-term debt

c. Weighted Average Cost Of Capital (WACC)
   WACC=[(D x rd)(1-tax)+(E x re)]

   Information:
   Capital Level of Debt (D) = (Total Debt if long)/(Total Debt if long+Equity) x 100%
   Cost Of Debt (rd) = (Interest expense)/(Total long term debt) x 100%
   Tax Rate (Tax) = (Tax expense)/(Net profit before tax) x 100%
   Equity Level (E) = (Total equity)/(Total debt if length+equity) x 100%
   Cost Of Equity (re) = (Net profit after tax)/(Total equity) x 100%

d. Capital Charges (CC)
   Capital Charges=WACC x Invested Capital

e. Economic Value Added (EVA)
   EVA=NOPAT-Capital Charges

Conclusions from the results of EVA calculations in this study are based on the following indicators:

• EVA > 0 or EVA is positive, indicating that the company's economic value is added.
• EVA < 0 or EVA is negative, indicating that there is no economic added value for the company.
• EVA = 0, indicates the company's break-even position.

RESULT

The following is the calculation result of the Economic Value Added for the Food and Beverage Company sub-sector 2016-2020.
Table 1
Calculation of Economic Value Added Food and Beverage Companies 2016-2020

<table>
<thead>
<tr>
<th>No</th>
<th>Company Code</th>
<th>Years</th>
<th>Average</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>2016</td>
<td>2017</td>
<td>2018</td>
</tr>
<tr>
<td>1</td>
<td>MLBI</td>
<td>1,395,716</td>
<td>1,431,192</td>
<td>1,480,705</td>
</tr>
<tr>
<td>2</td>
<td>MYOR</td>
<td>443,701</td>
<td>533,791</td>
<td>425,035</td>
</tr>
<tr>
<td>3</td>
<td>SKBM</td>
<td>17,250</td>
<td>(2,170)</td>
<td>(3,231)</td>
</tr>
<tr>
<td>4</td>
<td>STTP</td>
<td>6,864</td>
<td>(5,039)</td>
<td>60,543</td>
</tr>
<tr>
<td>5</td>
<td>ULTJ</td>
<td>114,250</td>
<td>132,917</td>
<td>89,206</td>
</tr>
<tr>
<td></td>
<td>Rata-rata</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Source: Results of data processed in 2022

The calculation results above, it shows that the economic value added value of food and beverage companies for the 2016-2020 period has fluctuated in each company. Companies that have the highest EVA value are in MLBI with an average of 1,203,239, while companies that have the lowest EVA value are in SKBM with an average of 1,423. The average EVA value of the 5 companies is 362,675.

DISCUSSION

The following will discuss the calculation and movement of Net Operating Profit After Tax (NOPAT), Invested Capital (IC), Weighted Average Cost Of Capital (WACC), for each company.

1. Analysis of Net Operating Profit After Tax (NOPAT)
   - PT Multi Bintang Indonesia Tbk
     The following is a graph of the development of NOPAT at PT Multi Bintang Indonesia Tbk, namely:

     ![Graph of NOPAT at PT Multi Bintang Indonesia Tbk](image)

     Source: Data processed by the author, 2022

     Fig. 1 Graph of NOPAT PT Multi Bintang Indonesia Tbk

     Based on the graph above, the NOPAT value at PT Multi Bintang Indonesia Tbk each year has increased and decreased. The NOPAT value in 2016 was 982,129, the NOPAT value increased in 2017 by 34.61% to 1,322,067, this was due to an increase in profit before tax in 2017. Then the NOPAT value decreased but was not too significant, starting in 2017 amounted to 1,322,067, decreased by -7.36% in 2018 to 1,224,807, and in 2019 decreased by -1.53% to 1,206,059. In 2020 the NOPAT value decreased significantly by -76.32% to 285,617, this was due to a decrease in sales which resulted in the net profit of the company also decreasing.

   - PT Mayora Indah Tbk
     The following is a graph of the development of NOPAT at PT Mayora Indah Tbk, namely:
Based on the graph above, the NOPAT value at PT Mayora Indah Tbk has increased every year. NOPAT in 2016 amounted to 1,388,676, increased in 2017 by 17.45% to 1,630,954, in 2018 increased by 7.94% to 1,760,435, again increased by 15.85% in 2019 to 2,039,404, and in 2020 it rose by 2.88% to 2,098,169. This increase was due to an increase in net sales, resulting in an increase in net income.

- **PT Sekar Bumi Tbk**

The following is a graph of the development of NOPAT at PT Sekar Bumi Tbk, namely:

Based on the graph above, the NOPAT value at PT Sekar Bumi Tbk fluctuates every year. The NOPAT value in 2016 was 22,545, then increased in 2017 by 14.80% to 25,881. Then in 2018, it decreased by -38.35% to 15,955. This happened because sales in 2018 increased while other revenues decreased so the EBIT generated decreased from the previous year. In 2019 the NOPAT value again decreased by -94.00% to 957. This happened because in 2019 revenue increased by 8% but selling expenses also increased by 31%, and other income decreased by -94% so EBIT was generated smaller than the previous year. In 2020 the NOPAT value increased by 465.83% to 5,415, this was due to an increase in sales of 50% so the net profit generated increased.

- **PT Siantar Top Tbk**

The following is a graph of the development of NOPAT at PT Siantar Top Tbk, namely:
Based on the graph above, the NOPAT value at PT Siantar Top Tbk has increased every year. The NOPAT value in 2016 was 174,177, in 2017 it increased by 24.03% to 216,024, in 2018 it increased by 18.08% to 255,089, in 2019 it increased again by 89.19% to 482,591 and in 2020 increased by 30.26% to 628,629. This happens because of the increase in sales and other income every year so that the company's net profit increases.

**PT Ultrajaya Milk Industry and Trading Company Tbk**

The following is a graph of the development of NOPAT at PT Ultrajaya Milk Industry and Trading Company Tbk, namely:

Based on the graph above, the NOPAT value at PT Ultrajaya Milk Industry and Trading Company Tbk has increased and decreased every year. The NOPAT value in 2016 was 709,825, an increase of 0.26% in 2017 to 711,681 due to an increase in sales, then decreased in 2018 by -1.42% to 701,607 due to an increase in selling expenses. then in 2019 it increased by 47.64% to 1,035,865, this happened due to an increase in sales from the previous year, while in 2020 it increased by 7.12% to 1,109,666, due to a decrease in selling expenses.

2. **Invested Capital (IC) Analysis**

**PT Multi Bintang Indonesia Tbk**

The following is a graph of the development of Invested Capital at PT Multi Bintang Indonesia Tbk, namely:
Based on the graph above, the value of Invested Capital at PT Multi Bintang Indonesia Tbk has increased and decreased every year. In 2016 which was -377,484, then in 2017 it increased by 74% to -98,150 this was due to an increase in long-term debt and company equity, in 2018 and 2019 it decreased by 45% and 5% respectively to -268,337 and -280,436, this is due to an increase in the company's short-term debt. In 2020 the value of Invested Capital experienced a significant increase of 182% to 230,543, due to an increase in equity and a decrease in the company's short-term debt.

- PT Mayora Indah Tbk
  The following is a graph of the development of Invested Capital at PT Mayora Indah Tbk, namely:

Based on the graph above, the value of Invested Capital in PT Mayora Indah Tbk has increased every year. The value of Invested Capital in 2016 was 5,154,318, then increased in 2017 and 2018 by 16% and 35% to 5,968,593 and 8,062,685, this was due to an increase in the cost of debt followed by a significant increase in company equity. Whereas in 2019 and 2020 there was an increase of 44% and 11% respectively to 11,585,200 and 12,826,853, this was due to an increase in the company's equity while the company's short-term debt decreased.

- PT Sekar Bumi Tbk
  The following is a graph of the development of Invested Capital at PT Sekar Bumi Tbk, namely:
Based on the graph above, the value of Invested Capital at PT Sekar Bumi Tbk, has increased and decreased. In 2016 the value of Invested Capital, which was 63,697, then increased in 2017 by 842% to 599,833, this was due to an increase in the company's equity value of 178%. Meanwhile, from 2018-2020 the value of Invested Capital has decreased. In 2018 it fell by -10% to 540,352, in 2019 it fell by -11% to 482,520, and in 2020 it fell by -24% to 366,619. This decrease was due to an increase in the company's short-term and long-term debt, but the company's equity value decreased every year.

- **PT Siantar Top Tbk**
  The following is a graph of the development of Invested Capital at PT Siantar Top Tbk, namely:

Based on the graph above, the value of Invested Capital at PT Siantar Top Tbk has increased and decreased. The value of Invested Capital in 2016 was 1,222,906. In 2017 it increased by 33% to 1,624,505, due to an increase in the value of equity and a decrease in the value of short-term debt. In 2018 it decreased by -21% to 1,277,842, this was due to a significant increase in its short-term debt even though the equity value increased. In 2019 and 2020 the value of Invested Capital again increased by 62% and 6% to 2,064,582 and 2,196,732, this was due to an increase in the company's equity value, as well as a decrease in the value of its short-term debt.

- **PT Ultrajaya Milk Industry and Trading Company Tbk**
  The following is a graph of the development of Invested Capital at PT Ultrajaya Milk Industry and Trading Company Tbk, namely:
Based on the graph above, the value of Invested Capital at PT Ultrajaya Milk Industry and Trading Company Tbk has increased from 2017-2019. The value of Invested Capital in 2016 was 3,052,148, an increase of 16% in 2017 to 3,545,663, in 2018 and 2019 an increase of 21% and 15%, respectively, to 4,285,549 and 4,935,794. This is due to an increase in the value of the company's equity. Meanwhile, in 2020 the value of Invested Capital decreased by -17% to 4,099,438, due to an increase in long-term and short-term debt while the value of equity decreased.

3. Analysis of Weighted Average Cost Of Capital (WACC)
   - PT Multi Bintang Indonesia Tbk
     The following is a graph of the development of WACC at PT Multi Bintang Indonesia Tbk, namely:

Based on the graph above, the average cost of capital (WACC) at PT Multi Bintang Indonesia Tbk fluctuates. In 2016 the WACC value was 110%, increased in 2017 to 111%, due to an increase in the proportion of equity capital and cost of equity. In 2018 the WACC value decreased to 95%, this was due to a decrease in the proportion of debt capital and cost of equity. In 2019 the WACC value remained constant, but in 2020 the WACC value decreased significantly to 21%, this was due to a decrease in the proportion of debt capital and the cost of equity, as well as an increase in the cost of debt.

   - PT Mayora Indah Tbk
     The following is a graph of the development of WACC at PT Mayora Indah Tbk, namely:
Based on the graph above, shows that the WACC value at PT Mayora Indah Tbk is stable, although it has decreased but is not too significant every year. In 2016 and 2017 the WACC value was stable at 18%, in 2018 it decreased to 17%, and in 2019 it decreased again to 15% and in 2020 the WACC value was stable at 15%, this decrease occurred due to a decrease in the proportion of capital debt.

- **PT Sekar Bumi Tbk**

  The following is a graph of the progress of WACC at PT Sekar Bumi Tbk, namely:

  Based on the graph above, the WACC value at PT Sekar Bumi has increased and decreased. The WACC value from 2016-2019 continued to decline. In 2016 it was 8%, then decreased in 2017 to 5%, and again decreased in 2018 and 2019 to 4% and 1%. This decrease was due to an increase in the cost of debt and a decrease in the company's cost of equity. In 2020 the WACC value increased to 2% due to an increase in the company's cost of equity.

- **PT Siantar Top Tbk**

  The following is a graph of the development of WACC at PT Siantar Top Tbk, namely:
Based on the graph above, the WACC value at PT Siantar Top Tbk continues to increase. In 2016 and 2017 the WACC value remained at 14%, in 2018 it increased to 15%, and continued to increase in 2019 and 2020 to 21% and 23%, this increase occurred due to a decrease in the proportion of debt capital, and an increase in the proportion of equity capital and cost of equity.

- **PT Ultrajaya Milk Industry and Trading Company Tbk**

The following is a graph of the development of WACC at PT Ultrajaya Milk Industry and Trading Company Tbk, namely:

Based on the graph above, the WACC value at PT Ultrajaya Milk Industry and Trading Company Tbk fluctuated. The WACC value in 2016 was 20%, in 2017 and 2018 it decreased to 16% and 14%, this was due to a decrease in the company's cost of equity. In 2019 it increased to 18% due to an increase in the cost of equity and a decrease in the proportion of debt capital. In 2020 the WACC value is stable at 18%.

4. **Analysis of Capital Charges (CC)**
- **PT Multi Bintang Indonesia Tbk**
  The following is a graph of the development of Capital Charges at PT Multi Bintang Indonesia Tbk, namely:

  ![Graph of Capital Charges PT Multi Bintang Indonesia Tbk](image)

  Source: Data processed by the author, 2022

  Fig. 16 Graph of Capital Charges PT Multi Bintang Indonesia Tbk

  Based on the graph above, the value of Capital Charges at PT Multi Bintang Indonesia Tbk fluctuates. The value of Capital Charges in 2016 was -413,587. There was an increase in 2017 by 74% to -109,125, due to an increase in the WACC value. Then in 2018 and 2019, it decreased by -135% and 4% to 255,898 and -265,614, this was due to an increase in the value of Invested Capital. In 2020 the value of Capital Charges increased by 118% to 48,706, due to an increase in the value of the company's Invested Capital.

- **PT Mayora Indah Tbk**
  The following is a graph of the development of Capital Charges at PT Mayora Indah Tbk, namely:

  ![Graph of Capital Charges PT Mayora Indah Tbk](image)

  Source: Data processed by the author, 2022

  Fig. 17 Graph of Capital Charges of PT Mayora Indah Tbk

  Based on the graph above, the value of Capital Charges at PT Mayora Indah Tbk continues to increase. In 2016 the value of Capital Charges was 994,976, then increased in 2017 and 2018 by 16% and 22% to 1,097,162 and 1,335,399, respectively. This increase was due to an increase in the company's WACC and Invested Capital values. In 2019 and 2020 it continued to increase by 31% and 7% to 1,745,670 and 1,868,516, this was due to an increase in the value of the company's Invested Capital.

- **PT Sekar Bumi Tbk**
  The following is a graph of the development of Capital Charges at PT Sekar Bumi Tbk, namely:
Based on the graph above, the value of Capital Charges at PT Sekar Bumi Tbk fluctuates. The value of Capital Charges in 2016 was 5,295, then experienced a significant increase in 2017 by 430% to 28,050, this was due to an increase in the value of the company's Invested Capital. In 2018 and 2019 the value of Capital Charges decreased by -32% and -78% to 19,185 and 4,237, this was due to a decrease in the WACC value and the company's Invested Capital value. In 2020, it increased again by 62% to 6,869, due to an increase in the company's WACC value.

**PT Siantar Top Tbk**
The following is a graph of the development of Capital Charges at PT Siantar Top Tbk, namely:

Based on the graph above, the value of Capital Charges at PT Siantar Top Tbk fluctuated. The value of Capital Charges in 2016 was 167,313. in 2017 it increased by 32% to 221,063, due to an increase in the value of the company's Invested Capital. In 2018 it decreased by -12% to 194,545, due to a decrease in the value of the company's Invested Capital. In 2019 and 2020 the value of Capital Charges continued to increase by 118% and 19% to 423,271 and 503,170, this increase was due to an increase in the company's WACC and Invested Capital values.

**PT Ultrajaya Milk Industry and Trading Company Tbk**
The following is a graph of the development of Capital Charges at PT Ultrajaya Milk Industry and Trading Company Tbk, namely:
Based on the graph above, the value of Capital Charges at PT Ultrajaya Milk Industry and Trading Company Tbk fluctuates every year. The value of Capital Charges in 2016 was 595,575, then decreased by -3% in 2017 to 578,764, due to a decrease in the company's WACC value. In 2018 and 2019 the value of Capital Charges increased by 6% and 45%, respectively, to 612,401 and 886,849. This increase occurred due to an increase in the value of the company's WACC and Invested Capital. In 2020 the value of Capital Charges again decreased by -18% to 724,566, due to a decrease in the value of the company's Invested Capital.

**CONCLUSION**

Based on data processing and analysis results using the economic value added method of 5 companies in the food and beverage sub-sector from 2016 to 2020, it can be concluded that there are 3 companies that produce positive EV A, namely PT Multi Bintang Indonesia Tbk (MLBI), PT Mayora Indah Tbk (MYOR ), and PT Ultrajaya Milk Industry and Trading Company Tbk (ULTJ). While the company PT Sekar Bumi Tbk (SKBM) was only able to produce a positive EVA value for 1 year, namely 2016, and PT Siantar Top Tbk (STTP) was able to produce a positive EVA value for 4 years. The company that has the highest EVA value is PT Multi Bintang Indonesia Tbk (MLBI), while the company that has the lowest EVA value is PT Sekar Bumi Tbk (SKBM). The results of the EVA analysis show that positive accounting earnings do not always show the results that the EVA value is also positive. This is due to an increase in the cost of equity capital which greatly affects the value of WACC which results in an increase in the value of capital charges borne by the company, where the value of capital charges reduces the value of EVA.

**REFERENCES**


