

# EFFECT OF ENTERPRISES' FUNDAMENTAL FACTORS AND SYSTEMATIC RISK ON STOCK RETURNS

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**Abstract:** This study aims to determine the influence of fundamental factors of companies and systematic risks on stock returns. The type of data used in this study is secondary data. The data is obtained from annual reports and financial reports sourced from [www.idx.co.id](http://www.idx.co.id). The population used in the study is manufacturing companies listed on the Indonesia Stock Exchange (IDX) for the period 2018 – 2021. The samples used in this study were 42 manufacturing companies listed on the IDX that met the criteria. Data were analyzed using multiple linear regression method. The results of this study indicate that the enterprise's fundamental factors affect stock returns. There are significant differences in the variable size of enterprise asset sizes before and during the Covid-19 pandemic. However, there were no significant differences in liquidity variables, debt to equity ratio, return on equity, earnings per share, price earnings ratio and systematic risk before and during the Covid-19 pandemic.

**Keywords:** Fundamental factors; systematic risk; stock return

## INTRODUCTION

In 2020, the capital market of Indonesia experienced a drastic decline due to the impact of the covid-19 pandemic. The outbreak of this virus also had an adverse effect on the Composite Stock Price Index (IHSG), causing it to decline. IHSG faced pressures that were happening in various stock exchanges worldwide, driven by the negative sentiment surrounding the spread of the coronavirus. Based on the Composite Stock Price Index (IHSG) value in September 2019, it stood at the final figure of 6,196.102, and from October 2019, the development of the IHSG

remained relatively stable until the end of December 2019.

Subsequently, the value of the Composite Stock Price Index (IHSG) continued to rise from March 2020 to August 2020. The economic conditions in Indonesia during the COVID-19 pandemic significantly influenced all aspects, especially health and the national economy. It is undeniable that, with the presence of the covid-19 pandemic, Indonesia's economy is currently in a highly unstable condition.

In addition, this pandemic condition introduced unprecedented disruptions in global markets, affecting

various sectors differently. Understanding how a company's fundamental strengths and weaknesses evolved in response to these challenges is essential for making informed investment decisions. Moreover, assessing how a company leveraged or coped with these changes is essential for gauging its competitive position in the evolving business landscape. This understanding can be determined by analyzing the fundamental stock of enterprises before and after covid-19 pandemic. It aims to give comprehensive understanding of the enterprises' adaptability, resilience, and potential for growth in a post-pandemic world. Therefore, additional analysis regarding the fundamental stock of enterprises before and after covid-19 pandemic is highly needed.

The research conducted by Jaza'i et al. (2018), (Parhusip & Silalahi, 2017), Machdar (2015), (Sondakh et al., 2014), and Ni Nyoman and Ni Luh (2014) has focused on fundamental analysis of stocks listed on the Indonesian Stock Exchange (BEI). However, none of these studies have compared the results of fundamental stock analysis before and after the covid-19 pandemic era. Consequently, the objective of this research is to present an analysis of stocks listed on the Indonesian stock exchange, specifically focusing on manufacturing companies, both before and after the covid-19 pandemic during the period from 2018 to 2021, utilizing fundamental analysis.

Manufacturing enterprises were chosen for this study due to their generally higher business risk compared to other industry types. These companies have been selected as the subject of this research because the industries within this group have experienced highly fluctuating stock returns during the period from 2018 to 2022.

The factors observed in this research include Liquidity, Enterprise Size (Assets Size), Debt Equity Ratio, Return on Equity, Earnings Per Share, Price Earnings Ratio, and Systematic Risk. Previous studies have shown that there is no significant influence between EPS, PER, and systematic risk on stock returns. Therefore, in this research, EPS, PER, and systematic risk are reutilized as independent variables to ascertain whether there is any influence on stock returns. Based on this background, this research will analyze the impact of fundamental enterprise factors and systematic risk on stock returns.

## **THEORETICAL FRAMEWORK**

### **Effect of Enterprises' Fundamental on Stock Return**

According to Hartono (2014: 89), fundamental factors of an enterprise pertain to the conditions of the enterprise, encompassing its management, organization, human resources, and financial status, all of which are reflected in its performance. Fundamental analysis is employed to assess a enterprise's future prospects, which are influenced by both micro and

macro factors, along with an evaluation of the enterprise's stocks. The fundamental analysis of an enterprise revolves around the assessment of its performance, focusing on its effectiveness and efficiency in achieving its objectives. To evaluate a enterprise's performance, financial ratios are employed, which can be categorized into four groups: liquidity, activity, debt, and profitability. The better an enterprise's financial performance, as reflected in its ratios, the higher the return on its stocks.

These ratios are derived from the enterprise's financial statements, which consist of the balance sheet and income statement. The utility of ratio analysis extends beyond internal enterprise interests; it is also valuable for external stakeholders, particularly prospective investors or creditors who invest in publicly traded companies. For financial managers, calculating specific ratios provides insights into a enterprise's financial strengths and weaknesses, enabling them to make critical decisions in the enterprise's best interests for the future.

This research incorporates fundamental factors influenced by micro-level enterprise factors. Measurement relies on financial ratios that mathematically affect stock returns. These factors encompass Asset Size as a performance indicator, Liquidity measured by Current Assets as a dimension of an enterprise's size policy, Earnings Per Share and Price Earnings Ratio as elements of Capital Market

Ratio, while Debt to Equity Ratio and Return on Investment are factors of Financial Leverage and Profitability Ratio.

### **Effects of Systematic Risk on Stock Return**

Systematic risk is a type of risk that cannot be eliminated through diversification because it is influenced by macroeconomic factors that can affect the entire market. It serves as an indicator of how sensitive a stock's returns are to the movements of other stocks in the market. A high level of market risk serves as a warning to investors, urging caution in their investment decisions. Investors tend to be cautious and may wait in unstable market conditions, leading to reduced demand for stocks. The decreased investor interest can, in turn, cause stock prices to decline, impacting those who have invested in high-risk stock situations.

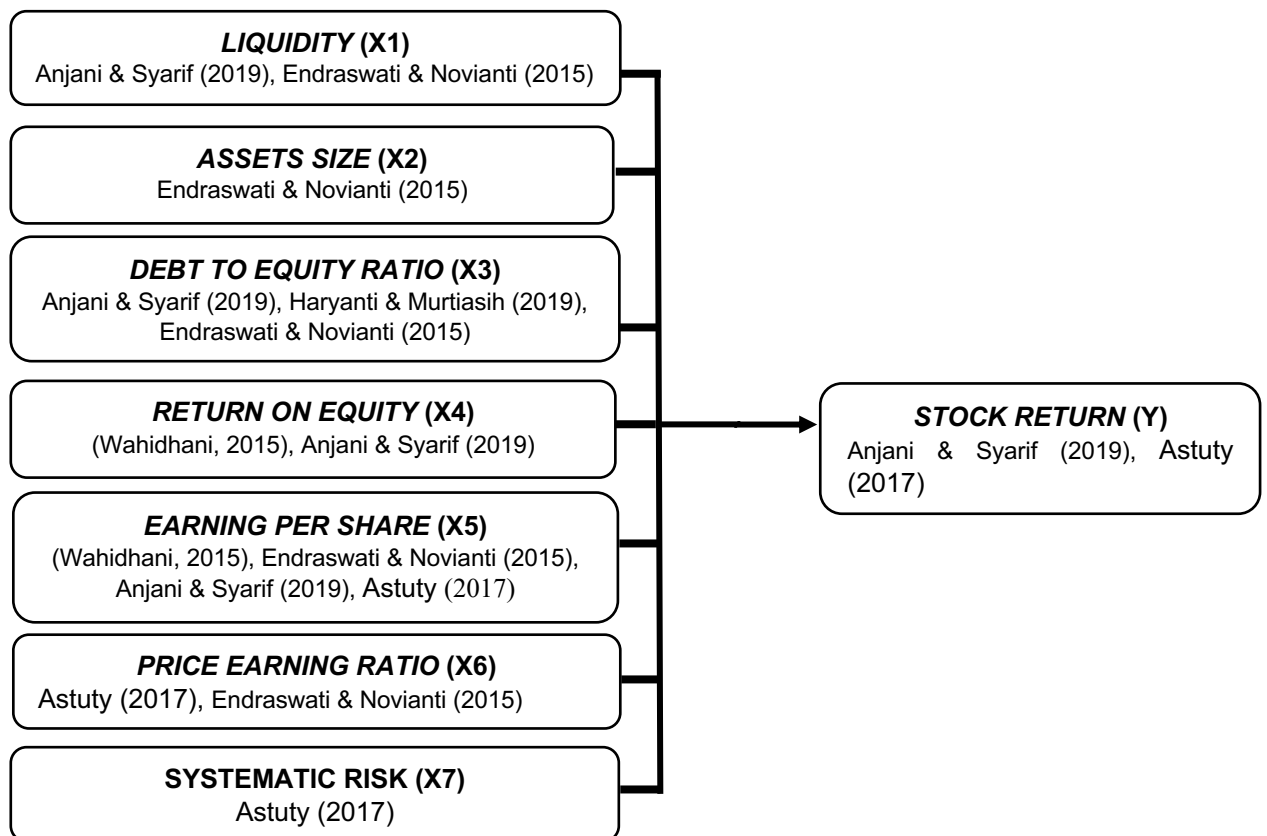
Hartono (2014: 130) asserts that there is a positive relationship between the level of risk and the level of return. In other words, the higher the risk, the greater the potential profit. Systematic risk can be measured using the beta coefficient. As Hartono (2014: 266) explains, beta measures the volatility of a security's returns or portfolio returns concerning market returns. Volatility refers to the fluctuations in the returns of a security or portfolio over a specific period. Beta also serves as a gauge of how much a stock's returns change in response to market fluctuations. The

value of beta carries specific significance. A beta greater than 1.0 indicates higher risk compared to the market (an aggressive stock). A beta less than 1.0 implies lower risk compared to the market (a defensive stock). A beta of 1.0 suggests that the stock carries the same level of risk as the market.

An enterprise with a beta greater than 1 is considered high-risk because even slight market return fluctuations can lead to larger changes in the stock's returns. Given that investors are generally risk-averse, they are likely to consider investing in companies with stocks that have a beta less than 1. As a result, it is expected that the market

price of the enterprise's stock will decline. The performance of the capital market can be assessed through the Composite Stock Price Index (IHSG), which represents overall stock prices in the market through stock trading transactions. A decrease in stock trading transactions leads to a decline in trading volume and value, subsequently affecting the IHSG. In such conditions, stockholders may experience reduced capital gains and potential capital losses in the capital market.

**RESEARCH CONCEPTUAL FRAMEWORK**



**Figure 1. Research Conceptual Framework**

### Liquidity

Liquidity, measured by the Current Ratio, serves as a short-term indicator of an enterprise's ability to meet its short-term obligations using available current assets. The Current Ratio is calculated using the following formula.

$$\text{Current Ratio} = \frac{\text{Current Asset}}{\text{Current liabilities}}$$

H<sub>1</sub>: Liquidity affects stock return positively

### Asset Size

Assets size is a way to measure firm size. Enterprise size is an indicator of an enterprise's magnitude, represented by the total assets, sales volume, average sales rate, and average total assets. Assets Size is calculated using the following formula.

$$\text{Firm Size} = \ln \text{Total Asset}$$

H<sub>2</sub>: Assets size affects stock return positively

### Debt to Equity Ratio (DER)

The Debt-to-Equity Ratio (DER) is a ratio used to measure liabilities in relation to equity. DER is calculated using the following formula.

$$\text{DER} = \frac{\text{Total of liabilities}}{\text{Equity}}$$

H<sub>3</sub>: Debt to Equity Ratio affects stock return positively

### Return On Equity (ROE)

ROE (Return on Equity) is a measure of an enterprise's ability to generate profit using its own capital. ROE is calculated using the following formula.

$$\text{ROE} = \frac{\text{Profit after tax}}{\text{Self-funded}}$$

H<sub>4</sub>: Return on Equity affects stock return positively

### Earning Per Share (EPS)

EPS (Earnings Per Share) describes an enterprise's future earnings prospects, and a higher EPS is likely to attract investors to invest in the enterprise. EPS can be calculated using the following formula.

$$\text{EPS} = \frac{\text{Net profit after tax}}{\text{Total of Stock}}$$

H<sub>5</sub>: Earning per share affects stock return positively

### Price Earnings Ratio (PER)

PER (Price Earnings Ratio) represents the market's appreciation of an enterprise's ability to generate profits or reflects the ratio or comparison between the stock price and the enterprise's earnings. PER can be calculated using the following formula.

$$\text{PER} = \frac{\text{Stock Prize}}{\text{EPS}}$$

H<sub>6</sub>: Price Earnings Ratio affects stock return positively

### Systematic Risk

Systematic Risk is measured by the beta coefficient ( $\beta$ ). Beta of a stock gauges the level of sensitivity of that stock to market changes. The larger the beta of a security, the more sensitive its returns are to changes in the market returns. Systematic Risk can be calculated using the following formula.

$$R_i = \alpha_i + \beta_i (R_{mt}) + \epsilon_i$$

$$\beta_i = \frac{[n \sum R_m \cdot R_i - \sum R_m \sum R_i]}{[n \sum R_m^2 - (\sum R_m)^2]}$$

H7: Systematic Risk affects stock return positively

### RESEARCH METHOD

The population used in this study consists of all manufacturing companies listed on the Indonesia Stock Exchange from 2018 to 2021. The sampling method employed in this research is non-probability sampling, specifically purposive sampling, where samples are pre-determined based on the research's purpose and objectives.

The data used in this research are secondary data obtained from the official website of the Indonesia Stock Exchange ([www.idx.go.id](http://www.idx.go.id)), including financial reports and annual reports. The analytical method employed in this study is multiple regression analysis, which is processed using SPSS software. Systematically, the equation can be simplified into the following mathematical model.

$$Y = \alpha + b_1X_1 + b_2X_2 + b_3X_3 + b_4X_4 + b_5X_5 + b_6X_6 + b_7X_7 + e$$

## RESULTS AND DISCUSSION

### 1. Research Hypothesis Test

Based on the data obtained, classical assumption tests were conducted, indicating that the data follows a normal distribution and shows no signs of heteroskedasticity, multicollinearity, or autocorrelation. Subsequently, multiple regression analysis was carried out to test the hypotheses in the research, resulting in the following outcomes.

**Table 1. Results of Multiple Linear Regression**

Coefficients <sup>a</sup>						
Model		Unstandardized Coefficients		Standardized Coefficients	Sig.	
		B	Std. Error	Beta		t
1	(Constant)	-.516	.604		-.855	.394
	Liquidity	-.049	.070	-.065	-0.702	.484
	Assets Size	.391	.216	.147	1.805	.073
	DER	.106	.070	.141	1.514	.132
	ROE	.040	.037	.080	1.058	.292
	EPS	-.002	.022	-.008	-0.087	.931
	PER	-.021	.038	-.045	-0.538	.592
	Systematic Risk	.019	.012	.124	1.632	.105

a. Dependent Variable: STOCK RETURN

Source: Data Proceed by SPSS 25 (2022)

### **H<sub>1</sub>: Liquidity Affects Stock Return Positively**

According to the regression coefficient, X1 (Liquidity) has an impact of -0.049 or -4.9% on the enterprise's value, indicating a negative influence. This means that if Liquidity is increased by just 1%, stock returns will decrease by -4.9%. Conversely, if Liquidity is decreased by 1%, stock returns will increase by -4.9%. The results of the partial testing (t-test) indicate that the t-value for the Liquidity variable is -0.702, while the critical t-value is 1.65437. Since the calculated t-value (-0.702) is less than the critical t-value (1.65437), the Liquidity variable (X1) does not have a significant impact on stock returns.

The negative Liquidity coefficient suggests that current assets are smaller than current liabilities. A decrease in enterprise liquidity will result in a decrease in stock returns. When stock returns decline, they become less attractive to investors, and vice versa. Higher liquidity indicates better enterprise performance and, consequently, a lower risk of the enterprise failing to meet its short-term obligations. Therefore, the enterprise's risk exposure is reduced. In conclusion, higher liquidity in an enterprise leads to higher stock returns.

Previous relevant research, such as that conducted by Parhusip and Silalahi (2017) and Machdar (2015), has explored the relationship between liquidity and stock returns. Parhusip and Silalahi (2017) found that liquidity does

not have a significant partial impact on stock returns. In other words, while liquidity can influence an enterprise's overall performance, it does not significantly affect stock return rates. Machdar (2015) also reached a similar conclusion in his research, stating that liquidity does not have a significant direct impact on stock returns. His findings suggest that other factors, such as financial performance, capital structure, and market factors, may have a more dominant influence on stock returns.

Although this study aligns with previous findings, it's essential to note that the relationship between liquidity and stock returns can vary depending on the specific context and conditions of an enterprise. Other factors, such as the industry in which the enterprise operates, the enterprise's size, and market conditions, can also influence this relationship. Therefore, further research is needed to gain a more comprehensive understanding of the link between liquidity and stock returns in various business contexts.

### **H<sub>2</sub>: Assets Size Affects Stock Return Positively**

According to the regression coefficient, X2 (Assets Size) has an impact of 0.391 or 39.1% on stock returns, signifying a positive influence. This means that if Assets Size is increased by just 1%, stock returns will increase by 39.1%. Conversely, if Assets Size is decreased by 1%, stock returns

will decrease by 39.1%. The results of the partial testing (t-test) indicate that the t-value for the Assets Size variable is 1.805, while the critical t-value is 1.65437. Since the calculated t-value (1.805) is greater than the critical t-value (1.65437), the Assets Size variable (X2) significantly affects stock return.

The positive Asset Size coefficient suggests that a firm size can be measured by the total assets it possesses. When an enterprise is large in size, with abundant resources, a high number of assets, a skilled workforce, and advanced technology utilization, this can support the enterprise's operational efficiency and potentially enhance its profits. The larger the profit generated by the enterprise, the larger the enterprise's size, which, in turn, can yield higher stock returns. As a result, investors tend to be interested in purchasing shares of larger-sized companies.

Previous research, such as that conducted by Dhatt et al. (1999) and Endraswati & Novianti (2015), has provided insights into the relationship between enterprise asset size and stock returns. Dhatt et al. (1999) investigated the influence of asset size on stock returns in the Indian stock market and found that asset size had a positive, partial impact on stock returns. This study suggested that larger companies, as reflected in their total assets, tend to generate higher stock returns. Endraswati & Novianti (2015) also examined the impact of asset size on stock returns in the Indonesian stock

market. Their findings indicated that asset size had a positive, partial influence on stock returns, suggesting that companies with larger assets tend to produce higher stock returns, which can attract investor interest.

While these findings are consistent with prior research, it is important to remember that the business context and other factors can also influence the relationship between asset size and stock returns. For instance, the industry in which the enterprise operates, ownership structure, and market conditions can be additional variables affecting this relationship. Therefore, further research is needed to gain a deeper understanding of the connection between enterprise asset size and stock returns in various business contexts and environments.

### **H<sub>3</sub>: Debt to Equity Ratio Affects Stock Return Positively**

Based on the regression coefficient, X3 (Debt to Equity Ratio) has an impact of 0.106 or 10.6% on stock returns, signifying a positive influence. This means that if Debt to Equity Ratio is increased by just 1%, stock returns will increase by 10.6%. Conversely, if Debt to Equity Ratio is decreased by 1%, stock returns will decrease by 10.6%. The results of the partial testing (t-test) indicate that the t-value for the Debt to Equity Ratio variable is 1.514, while the critical t-value is 1.65437. Since the calculated t-value (1.514) is less than the critical t-value (1.65437), the Debt to Equity Ratio variable (X3) does not



significantly impact stock returns. The positive t-value for Debt to Equity Ratio indicates that the independent variable has a positive linear effect on the dependent variable.

The positive coefficient for DER suggests that it does not significantly influence stock returns. This research indicates that a lower debt ratio can be used to predict increasing stock returns. DER affects a enterprise's performance and can lead to stock price appreciation. Excessively high DER negatively impacts a enterprise's performance because higher debt levels result in greater interest expenses, which reduce profits. Furthermore, a high DER affects investor interest in buying a enterprise's stock. It implies higher investment risk for the enterprise, leading investors to believe that a enterprise with substantial debt is vulnerable. On the other hand, if an enterprise has high debt for investments that can increase profits, it becomes challenging for investors to gauge the enterprise's performance. This also affects stock prices and, consequently, stock returns. Conversely, a low DER signifies better performance because the enterprise can finance its operations with its equity. This sends a positive signal to investors to purchase the enterprise's stock, leading to higher stock prices and stock returns. This research is supported by previous studies, such as Sondakh, et al. (2014) who found that DER does not have a significant partial impact on stock returns.

#### **H<sub>4</sub>: Return on Equity Affects Stock Return Positively**

According to the regression coefficient, X<sub>4</sub> (Return on Equity) has an impact of 0.040 or 4% on stock returns, indicating a positive influence. This means that if Return on Equity is increased by just 1%, stock returns will increase by 4%. Conversely, if Return on Equity is decreased by 1%, stock returns will decrease by 4%. The results of the partial testing (t-test) reveal that the t-value for the Return on Equity variable is 1.058, while the critical t-value is 1.65437. Since the calculated t-value (1.058) is less than the critical t-value (1.65437), the Return on Equity variable (X<sub>4</sub>) does not significantly affect stock returns.

The positive value of ROE indicates that enterprise management has succeeded in enhancing the enterprise's value, aligning with the financial management objective of maximizing the enterprise's value for its owners. A higher ROE leads to greater profits for shareholders. When a enterprise achieves high levels of profit, demand for its stock also increases, contributing to higher stock returns. Moreover, a high ROE can enhance the overall value of the enterprise, attracting investor interest in purchasing the enterprise's stock. However, the absence of a significant impact between ROE and stock returns suggests that investors are not solely interested in enterprise profit growth. There are other factors beyond net income that can capture investor attention for making investments. These

factors may include aspects like growth potential, enterprise risk, management quality, and broader market factors.

In this context, it is crucial for companies to consider not only achieving a high ROE but also other factors that can influence stock performance and investor interest. In investment analysis, investors often consider other fundamental factors like revenue, enterprise growth, dividend policies, and external factors affecting overall enterprise performance. This research aligns with studies conducted by Yunita, et al. (2018) and Parhusip and Silalahi (2017), which found that ROE does not have a significant partial impact on stock returns.

#### **H<sub>5</sub>: Earning per Share Affects Stock Return Positively**

According to the regression coefficient, X<sub>5</sub> (Earnings per Share) has an impact of -0.002 or -0.2% on stock returns, indicating a negative influence. This means that if Earnings per Share is increased by just 1%, stock returns will decrease by 0.2%. Conversely, if Earnings per Share is decreased by 1%, stock returns will increase by 0.2%. The results of the partial testing (t-test) show that the calculated t-value for the Earnings per Share variable is -0.087, with a significance level  $\alpha = 0.05$  and degrees of freedom (df) = 161 (168 - 7). The tabulated t-value is 1.65437, and because the calculated t-value (-0.087) is less than the tabulated t-value (1.65437), it can be concluded that the Earnings Per Share variable (X<sub>5</sub>) does not significantly

affect stock returns. Based on the results of the partial test, the hypothesis that states Earnings Per Share affects stock returns is rejected.

The regression results indicate that the coefficient of the EPS variable does not have a significant effect and has a negative relationship with stock returns. This negative coefficient suggests that an increase in EPS is associated with a decrease in stock returns. For investors, EPS is considered crucial and valuable information as it can reflect the enterprise's future earnings prospects. EPS indicates the level of profit per share. The higher the EPS, the greater the profit received by shareholders, which indicates improved enterprise operational conditions.

However, despite the increase in profit per share, it does not necessarily mean an increase in the stock returns received by investors. Other factors can influence stock returns. It is also known that if an enterprise's ability to generate profits increases, stock prices tend to rise. With the increase in stock prices, the stock returns received by investors also increase. This means that an increase in stock prices also drives an increase in stock returns. Therefore, even though profit per share increases, it does not always result in increased stock returns.

This study aligns with the research conducted by Jaza'i et al. (2018) and Sondakh et al. (2014), which showed that EPS does not have a significant partial impact on stock returns. This suggests that when considering stock investments, investors need to pay

attention to other factors besides EPS that can influence stock returns. Information about EPS is just one aspect that needs to be considered holistically in making investment decisions.

#### **H<sub>6</sub>: Price Earnings Ratio Affects Stock Return Positively**

According to the regression coefficient, X<sub>6</sub> (Price-Earnings Ratio) has a negative impact of -0.021 or -2.1% on stock returns, indicating a negative influence. This means that if the Price-Earnings Ratio is increased by just 1%, stock returns will decrease by 2.1%. Conversely, if the Price-Earnings Ratio is decreased by 1%, stock returns will increase by 2.1%. The results of the partial testing (t-test) show that the calculated t-value for the Price-Earnings Ratio variable is -0.538, with a significance level  $\alpha = 0.05$  and degrees of freedom (df) = 161 (168 - 7). The tabulated t-value is 1.65437, and because the calculated t-value (-0.538) is less than the tabulated t-value (1.65437), it can be concluded that the Price-Earnings Ratio variable (X<sub>6</sub>) does not significantly affect stock returns.

The regression coefficient of the PER variable indicates a negative relationship that leads to a decrease in stock returns. The Price-Earnings Ratio (PER) is an indicator of future growth and market conditions. The current market conditions, especially the impact of the COVID-19 pandemic, have caused a decrease in overall stock price movements. When PER is low, it means that the market price of an enterprise's

stock is lower than its intrinsic value, making it an attractive investment choice. Investors tend to choose companies with low PER because they consider a high PER as an indicator of expensive stock prices.

Several previous studies have investigated the relationship between PER and stock returns, providing relevant insights to understand the findings of this study. One relevant study was conducted by Endraswati and Novianti (2015). They examined the relationship between PER and stock returns in manufacturing companies listed on the Indonesia Stock Exchange. Their findings showed that PER has a significant impact on stock returns. In this context, companies with low PER tend to have higher stock returns, supporting the findings of the current study.

Additionally, Astuty (2017) also revealed that PER has a significant impact on stock returns in the Indonesian stock market. The study concluded that a low PER is positively related to higher stock returns. These research results support the findings of the current study, where the regression coefficient of PER shows a negative relationship with stock returns. Investors tend to choose companies with low PER because they are considered to have cheaper stock prices and higher profit potential.

However, it is important to highlight that the impact of PER on stock returns is not absolute, and there are other factors that need to be considered

in investment analysis. Previous research shows that PER is not the sole factor influencing stock returns, and factors such as market conditions, enterprise fundamentals, and macroeconomic factors also play a significant role in determining stock performance. Therefore, in making investment decisions, investors need to comprehensively consider other variables to gain a more complete understanding of potential stock returns.

#### **H<sub>7</sub>: Systematic Risk Affects Stock Return Positively**

The regression coefficient for X7 (Systematic Risk) affects stock returns by 0.019 or 1.9%, indicating a positive impact. This means that if Systematic Risk is increased by just 1%, stock returns will increase by 1.9%. Conversely, if Systematic Risk is decreased by 1%, stock returns will decrease by 1.9%. The results of the partial testing (t-test) show that the calculated t-value for the Systematic Risk variable is 1.632, while the tabulated t-value is 1.65437. Since the calculated t-value (1.632) is less than the tabulated t-value (1.65437), it can be concluded that the Systematic Risk variable (X7) does not significantly affect stock returns.

The regression results indicate that the coefficient of the systematic risk variable does not have a significant impact and has a positive relationship with stock returns. The positive coefficient suggests a positive relationship between beta (systematic risk) and stock returns. Stock beta is

positively correlated with individual stock returns, meaning that as stock beta, which measures systematic risk, increases, stock returns also tend to increase. Stock beta reflects the sensitivity of a security's return to changes in the market return. The higher the beta of a security, the more sensitive its return is to changes in the market return.

However, increasing the systematic risk of a stock can reduce investor interest. In other words, the higher the beta, the greater the expected return, but it also comes with higher investment risk. This can lead to lower stock prices. This research supports the findings of previous research conducted by Ni Nyoman Devi and Ni Luh (2014), which showed that systematic risk has a partial impact on stock returns.

In this context, it is important for investors to consider systematic risk (beta) when making investment decisions. Calculating risk and understanding its relationship with stock returns can help investors evaluate the potential gains and risks associated with an investment. However, investors should also consider other factors that affect stock returns, such as enterprise fundamentals, market conditions, and other external factors, to get a more comprehensive picture of investment prospects.

## **2. Additional Analysis of Stock Return Before and After Covid-19 Pandemic**

Based on the simultaneous test results, an F-value of 2.312 was obtained with a significance level of 0.028, which is smaller than the value of 0.05. This indicates that there is a significant influence between the independent variables consisting of liquidity, Assets Size, debt to equity ratio, return on equity, earnings per share, price-earnings ratio, and systematic risk on stock returns. However, the results of the hypothesis testing on a partial basis show that no fundamental variables (liquidity, Assets Size, DER, ROE, EPS, PER, Systematic Risk) have a significant impact on stock returns. These research findings are inconsistent with previous studies conducted by Yunita et al. (2018), Jaza'i et al. (2018), Parhusip and Silalahi (2017), Machdar (2015), and Paramitasari (2014).

The difference in results between this study and previous research can be attributed to several factors, such as differences in samples, research periods,

analysis methods used, or different characteristics of the capital market. It's important to consider the context and other variables that may affect the relationship between these variables. The results of this study indicate that, overall, the fundamental variables observed in this research do not have a significant partial impact on stock returns. However, this does not rule out the possibility of other factors that can influence stock returns and need to be considered in a comprehensive investment analysis.

In this research, the Wilcoxon Signed Rank Test was used for the difference test, as after conducting the normality test above, the significance values of the data for Liquidity, Assets Size, Earnings Per Share, Price Earnings Ratio, and Systematic Risk were not normally distributed. Therefore, the results of the Wilcoxon Signed Rank Test in this study can be seen in the table below.

**Tabel 2. Wilcoxon Signed Rank Test**

		Test Statistics <sup>a</sup>	
Variable		X_AFTER	X_BEFORE
<b>X1_Liquidity</b>	Z	-1.317 <sup>b</sup>	
	Asymp. Sig. (2-tailed)	.188	
<b>X2_Assets Size</b>	Z	-7.961 <sup>b</sup>	
	Asymp. Sig. (2-tailed)	.000	
<b>X3_Debt to Equity Ratio</b>	Z	-.477 <sup>b</sup>	
	Asymp. Sig. (2-tailed)	.633	
<b>X4_Return On Equity</b>	Z	-1.779 <sup>b</sup>	
	Asymp. Sig. (2-tailed)	.075	
<b>X5_Earnings Per Share</b>	Z	-.725 <sup>b</sup>	
	Asymp. Sig. (2-tailed)	.468	
<b>X6_Price Earnings Ratio</b>	Z	-1.563 <sup>b</sup>	

	Asymp. Sig. (2-tailed)	.118
<b>X7_Risiko Sistematis</b>	Z	-.520 <sup>b</sup>
	Asymp. Sig. (2-tailed)	.603
a. Wilcoxon Signed Ranks Test		
b. Based on positive ranks.		

#### a. Difference Test of Liquidity Variable Before and During Covid-19 Pandemic

Based on the table above, it is observed that the significance value for liquidity before and during the Covid-19 pandemic in Indonesia is 0.188, which is greater than the value of 0.05. This indicates that there is no significant difference in liquidity between the periods before and during the Covid-19 pandemic. This is due to the fact that the lower the current ratio, the worse the enterprise's condition, where the current assets the enterprise holds become limited in covering its current liabilities. Conversely, the higher the current ratio, the better the enterprise's condition. From the data above, it can also be seen that the current ratio for companies in the manufacturing sector has not dropped significantly because the ongoing pandemic has not been too long. Therefore, the enterprise's assets are still in good condition, and the current assets they hold are still capable of covering or paying off their short-term liabilities. It can be said that liquidity, represented by the current ratio in manufacturing companies, remains good during the pandemic because the majority of companies have seen an increase in their current ratios.

Relevant previous studies have investigated the relationship between an enterprise's liquidity during the Covid-19 pandemic. For example, research conducted by Gustmainar & Mariani (2018) and Priyanto & Robiyanto (2020) has examined the effect of liquidity on stock returns. However, the results of this research are not consistent with the findings presented in previous studies. In those studies, most researchers found that liquidity has a significant impact on stock returns. However, the research you mentioned did not find a significant relationship between liquidity and stock returns during the Covid-19 pandemic. This suggests differences in research results that may be due to differences in samples, research methods, the study period, and different economic contexts. Therefore, further in-depth research is essential to gain a clearer understanding of the impact of liquidity on stock returns during the Covid-19 pandemic or in other unusual economic situations.

Further research may also involve other variables that could influence the relationship between liquidity and stock returns, such as capital structure, enterprise growth, and macroeconomic factors. Thus, a more holistic and comprehensive insight can be developed about the relationship

between liquidity and stock returns in complex and dynamic contexts.

#### **b. Difference Test of Assets Size Variable Before and During Covid-19 Pandemic**

Based on the data presented in the table, it can be concluded that there is a significant difference in the size of enterprise assets before and during the Covid-19 pandemic in Indonesia. This is indicated by the significance value reaching 0.000, which is smaller than the commonly used significance level (0.05). The reason for this difference can be associated with the decline in revenue or sales for the majority of companies during the pandemic. It's important to note that the enterprise's asset size existed before the pandemic occurred, and there were no asset sale or purchase transactions. However, revenue or sales, which are used as a factor in calculating the asset size, significantly affect the results of this ratio.

The higher an enterprise's revenue or sales, the higher the asset size ratio it generates. Conversely, if an enterprise's revenue or sales are low, the asset size ratio will also be low. Therefore, the decline in revenue or sales during the pandemic can explain the significant difference in the size of enterprise assets before and during the pandemic. Previous research has supported the finding that disrupted economic conditions, such as a pandemic, can significantly impact an enterprise's asset size. Some previous studies also revealed significant changes

in the size of enterprise assets during periods of crisis or economic instability.

For example, a study on the impact of the global financial crisis on the banking sector found a significant decline in the size of enterprise assets during that crisis (Choi, 2021). Other research involving manufacturing companies also revealed a significant decrease in asset size during periods of economic instability (Mok et al., 2021). Moreover, other studies examining the impact of the Covid-19 pandemic on various economic sectors also showed significant changes in the size of enterprise assets. For instance, research analyzing the impact of the Covid-19 pandemic on retail companies found a significant decline in the size of enterprise assets over a certain time period (Luo et al., 2021).

Therefore, the findings in previous research align with the analysis results in the table, which indicate a significant difference in the size of enterprise assets before and during the Covid-19 pandemic in Indonesia. This reinforces that the economic changes resulting from the pandemic can have a significant impact on the size of enterprise assets.

#### **c. Difference Test of Debt to Equity Ratio Variable Before and During Covid-19 Pandemic**

Based on the data presented in the table, it can be concluded that there is no significant difference in the DER before and during the Covid-19 pandemic in Indonesia. This is indicated

by the significance value of 0.633, which is greater than the commonly used significance level (0.05). Although there is no significant difference, many companies experienced an increase in the DER. The DER Ratio reflects the relationship between an enterprise's debt and equity. The higher the equity a enterprise has, the lower the DER will be. Conversely, if an enterprise has low equity, this ratio will be higher.

In this context, a higher Debt to Equity Ratio indicates a less favorable financial condition for the enterprise because it has more debt than its own capital. Conversely, a lower Debt to Equity Ratio suggests a better financial condition for the enterprise. Although there is no significant difference in this ratio between the periods before and during the pandemic, attention should be given to companies that experience an increase in their DER (Badruzaman, 2017). This can indicate financial stress or a greater reliance on debt, which can affect the overall financial stability of the enterprise.

#### **d. Difference Test of Return on Equity Variable Before and During Covid-19 Pandemic**

Based on the data presented in the table, it can be concluded that there is no significant difference in the Return on Equity before and during the Covid-19 pandemic in Indonesia. This is indicated by the significance value of 0.075, which is greater than the commonly used significance level (0.05). The lack of a significant difference can be

attributed to the fact that an enterprise's equity was already in place or invested before the pandemic occurred. The Return on Equity ratio depicts the level of profit generated by the enterprise based on the equity it possesses (Gustmainar & Mariani, 2018). The profit used as the numerator in the calculation of this ratio has a significant impact on its results.

The higher the profit an enterprise earns, the higher the Return on Equity will be. Conversely, if an enterprise's profit is low, the ratio will also be low. A high Return on Equity ratio indicates good performance because each unit of funds invested in equity generates a high net profit. Conversely, a low Return on Equity may indicate a less favorable enterprise value. Although there is no significant difference in Return on Equity between the periods before and during the pandemic, it is important to pay attention to the overall Return on Equity value (Gustmainar & Mariani, 2018). Companies that can achieve a high Return on Equity demonstrate good performance and the ability to generate profitable earnings from their equity.

#### **e. Difference Test of Earnings Per Share Variable Before and During Covid-19 Pandemic**

Based on the data presented in the table, it can be concluded that there is no significant difference in Earnings per Share before and during the Covid-19 pandemic in Indonesia. This is indicated by the significance value of



0.468, which is greater than the commonly used significance level (0.05).

The lack of a significant difference can be attributed to several factors, one of which is the possibility that companies were unable to maximize the number of common shares owned by investors (Hertina & Saudi, 2019). This means that companies were not able to achieve the maximum profit potential given the available shares. In theory, after an acquisition, the number of common shares owned by investors should increase, which should ideally increase the enterprise's earnings. However, the research results indicate a mismatch with this theory.

In this context, the lack of a significant difference in Earnings per Share between the periods before and during the Covid-19 pandemic suggests that the pandemic did not have a significant impact on the earnings per share generated by the companies. Other factors, such as the overall economic conditions or enterprise policies, may play a role in the observed results. It's important to consider that Earnings per Share is one of the key indicators in evaluating an enterprise's financial performance. Although there is no significant difference in this period, it's important to analyze other factors that can influence the overall performance and earnings of the enterprise.

#### **f. Difference Test of Price Earnings Ratio Variable Before and During Covid-19 Pandemic**

Based on the data presented in the table, it can be concluded that there is no significant difference in Price Earnings Ratio before and during the Covid-19 pandemic in Indonesia. This is indicated by the significance value of 0.118, which is greater than the commonly used significance level (0.05). The lack of a significant difference suggests that the Covid-19 pandemic did not have a significant impact on the Price Earnings Ratio. The Price Earnings Ratio is a measure used to assess the market valuation of an enterprise relative to its earnings per share.

Although there is no significant difference during this period, it's important to note that Price Earnings Ratio can be influenced by other factors such as market sentiment, interest rates, and the overall economic conditions. Additionally, differences in Price Earnings Ratio among companies in different industries can occur due to varying market expectations and enterprise-specific characteristics. In this context, even though there's no significant difference in Price Earnings Ratio between the periods before and during the pandemic, a more in-depth analysis should be conducted, considering other factors that can affect market valuation and overall enterprise performance.

Previous research has provided insights into the relationship between Price Earnings Ratio and economic factors or changes in the business environment. Some earlier studies have observed significant differences in Price

Earnings Ratio during crisis situations or significant economic changes. Research on the impact of the global financial crisis on stock valuation showed significant differences in Price Earnings Ratio during that crisis (Bustani et al., 2021). Other research examining changes in stock prices during unstable economic situations also found significant changes in Price Earnings Ratio (Satryo et al., 2017). Furthermore, studies related to the impact of the Covid-19 pandemic on the stock market and enterprise valuations have also provided important insights. For example, research analyzing the impact of the Covid-19 pandemic on stock prices found significant changes in Price Earnings Ratio in specific industry sectors (Imran et al., 2014).

Therefore, previous research findings suggest that significant changes in the business environment, including economic crises or pandemic situations, can affect Price Earnings Ratio. However, in the context of the provided table, there is no significant difference in Price Earnings Ratio before and during the Covid-19 pandemic in Indonesia. This suggests that other factors or market dynamics may not have significantly influenced stock valuations in this particular case.

#### **g. Difference Test of Systematic Risk Variable Before and During Covid-19 Pandemic**

Based on the data presented in the table, it can be concluded that there is no significant difference in Systematic

Risk before and during the Covid-19 pandemic in Indonesia. This is indicated by the significance value of 0.603, which is greater than the commonly used significance level (0.05). Systematic risk, or market risk, is reflected in the fluctuations of stock prices. The higher the stock price fluctuations, the higher the beta index value, which indicates higher stock risk. The beta index measures how much an individual stock's price moves in correlation with overall market price movements. The beta index can have both positive and negative values. A negative beta index means that the stock has inverse price movements.

However, in the context of the provided table, there is no significant difference in Systematic Risk between the periods before and during the Covid-19 pandemic in Indonesia. This suggests that the changes in economic or market conditions caused by the pandemic did not have a significant impact on the level of systematic risk experienced by the stocks in this study (Khanh, 2019). It's important to note that systematic risk can also be influenced by other factors such as overall economic conditions, monetary policies, and other macroeconomic factors. Although there is no significant difference during this period, further analysis can be conducted to understand the factors that may influence systematic risk overall in the context of this study.

## CONCLUSION

Based on the research findings, it can be concluded that fundamental enterprise factors have an impact on stock returns. The research results regarding the differences between the variables Liquidity, Assets Size, Debt to Equity Ratio, Return On Equity, Earnings Per Share, Price Earnings Ratio, and Systematic Risk before and during the COVID-19 pandemic show a significant difference in the variable of enterprise size (Assets Size) before and during the pandemic. However, there is no significant difference in the variables of Liquidity, Debt to Equity Ratio, Return On Equity, Earnings Per Share, Price Earnings Ratio, and Systematic Risk before and during the COVID-19 pandemic.

In addition to this research result, future research is hoped to be able to extend the study period, thereby increasing the sample size and maximizing the data analyzed. For future research, it is recommended to consider expanding or adding other variables, such as incorporating macroeconomic variables like interest rates, in addition to the enterprise's performance, the money supply, inflation, economic growth, and other factors.

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