

The Effect of Market Risk, Business Risk, and Financial Risk on Stock Returns in Automotive Companies

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ABSTRACT

This research aims to determine the influence of investment risk consisting of market risk (X1), business risk (X2), and financial risk (X3) on stock returns (Y) in automotive companies listed on the BEI in 2014-2023 simultaneously and Partial. This research data was obtained from the financial reports of automotive companies listed on the Indonesia Stock Exchange (BEI) and the finance.yahoo.com website. The research sample consisted of 10 automotive companies listed on the Indonesia Stock Exchange for 10 years, namely the 2014-2023 period. The data analysis technique used is descriptive statistical analysis and multiple linear regression analysis using the t test and F test methods. The results of the research show that the market risk variable has a significant negative influence on stock returns, business risk has a significant positive influence on stock returns and financial variables. risk has an insignificant negative effect on stock returns. Meanwhile, simultaneously (F test) the independent variables have a significant influence on the stock return variable. With a determinant coefficient (R²) of 0.111, it shows that 11.1% of the dependent variable on stock returns can be explained by independent variables consisting of market risk, business risk and financial risk and the remaining 88.9% is explained by other variables that are not researched.

Keywords: market risk, business risk, financial risk, stock return

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1. INTRODUCTION

In facing the era of globalization and increasingly fierce economic competition, Indonesia as a developing country cannot ignore the role of the capital market as the main pillar in accelerating economic growth. The capital market is not only a source of funding for companies in Indonesia, but also provides opportunities for investors to participate in national economic development (Miller & Skinner, 2015). With increasing awareness of the potential of the capital market, the government and business actors in Indonesia continue to strive to create a conducive investment climate and support the growth of the economic sector through financial instruments available on the capital market.

According to Gunawan (2017), the capital market in Indonesia is not just a funding tool, but also a mechanism that encourages transparency and accountability in business. Through the issuance of shares and bonds, companies are required to provide detailed financial reports, providing confidence to investors and the general public. Thus, the capital market is not only a forum for economic growth, but also a means to improve overall corporate governance. By continuing to develop the capital market, Indonesia can optimize its potential as a dynamic and highly competitive developing country in the global economic arena (Rizal et al., 2017; Eliana, et al., 2023).

The capital market plays a crucial role as an intermediary between the two main economic entities, namely investors and issuers. According to Bonini & Capizzi (2019), in carrying out its economic function, the

capital market creates a platform that allows parties who have excess funds to invest to meet with parties who need these funds for business or project development (issuers). Through transactions on the capital market, investors have the opportunity to allocate their funds by choosing investment instruments that suit their financial goals and desired risks.

The financial function of the capital market is the foundation for economic growth (Valickova et al., 2015). Investors, by providing funds through the purchase of shares or bonds, have the hope of earning rewards commensurate with the level of risk they take. In return for their investment, investors receive profits in the form of dividends, increases in stock prices, or interest on bonds. Thus, the capital market not only becomes a means for efficient flow of funds, but also motivates investors to support the growth of companies or projects that have the potential to provide optimal results.

In the world of investment, rationality is a key point put forward by investors. Investment decisions taken are based on careful consideration regarding elements of risk and return (Huang & Pearce, 2015; Isma et al., 2020). Investors tend to look for investment alternatives that provide the highest returns with an acceptable level of risk (Chuen et al., 2017). Portfolio theory describes the close relationship between return and risk in investment. The principle of "high return high risk" reflects the idea that the higher the potential return of a security instrument, the higher the level of risk contained in it (Siamwalla, 2015). In other words, any expectation of high returns in the future will be offset by the potential risks inherent in the investment, and understanding this correlation becomes the basis for investors to make more informed and wise decisions. This theory provides a basis for investors to design portfolios that suit their risk tolerance.

Through diversification, namely spreading investments across various financial instruments, investors can manage risk and potential returns more effectively. Awareness of this correlation between return and risk provides a more realistic view of investment return expectations, helps investors to better deal with market uncertainty (Amromin & Sharpe, 2014) and increases their ability to achieve long-term financial goals (Siegel, 2021). Investment risk can basically be divided into two types, namely systematic risk and unsystematic risk (Halim, 2015:74). Risks that affect stock returns in general are systematic risk/market risk and financial risk (Hutauruk et al., 2014). Meanwhile, another factor that influences stock returns is business risk (Habib, 2018; Tahir et al., 2020). Apart from systematic risk and unsystematic risk, another variable which is a fundamental factor in determining stock returns is company size.

Automotive companies are one of the sub-sectors of manufacturing industrial companies listed on the Indonesia Stock Exchange. The development of the automotive sector is predicted to accelerate every year and will even become the government's backbone in realizing the industrial growth target of 5.67%. The movement of share prices of companies in the automotive industry listed on the Indonesia Stock Exchange (BEI) shows how interested investors are in buying shares of each automotive company in Indonesia.

Based on data from the Ministry of Investment/Investment Coordinating Board (BKPM) of the Republic of Indonesia, investment from foreign investment (PMA) for the motor vehicle, trailer and semi-trailer industry reached US\$744.43 million or the equivalent of IDR 11.35 trillion (exchange rate of IDR 15.252) from a total of 836 projects throughout semester I/2023. In the data accessed via the nswi.bkpm.go.id page, it was recorded that the amount of PMA had increased by 1.85 percent compared to the same period last year amounting to US\$730.88 million. Meanwhile, domestic investment (PMDN) was recorded at IDR 1.52 trillion from a total of 322 projects throughout semester I/2023. Meanwhile, the amount of PMDN was recorded to have increased 204.21 percent YoY from IDR 502.44 billion.

The number of projects and investment in the automotive industry from 2014 to 2023 has experienced fluctuations. The fluctuating share price movements of each automotive industry company listed on the Indonesia Stock Exchange shows that share prices continue to move in line with the buying and selling of shares from investors. Return movements like this indicate that the share price of each company is unstable. This uncertainty will certainly create concerns for potential investors who want to invest in shares. Of course, this will cause its own risks. In the automotive industry, risk factors will continue to emerge along with changes in the automotive industry itself, as well as the dynamics of the Company. Management needs to apply risk management principles that are always managed well so that the Company can continue to grow and develop. Investors' expectations of their investments are to obtain a level of return with a certain level of risk. This return is an indicator for increasing the prosperity of investors, including shareholders.

Information regarding the announcement of stock returns of a business entity is very important information for investors when investing. A fairly high stock return reflects the good condition of a company and vice versa. The higher the stock returns offered, the greater the number of investors who are interested in investing in those shares. Some companies often experience drastic increases or decreases in stock returns or do not experience significant increases from year to year. As seen in the following automotive sector companies:

Table 1. Share Returns in Automotive Companies listed on the Indonesia Stock Exchange for the 2014-2023 period.

ISSUER	YEAR									
	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
ASII	2.346	0.541	0.355	0.024	-0.099	0.092	-0.192	0.379	0.003	0.009
AUTO	0.643	1.383	0.223	0.052	0.080	0.151	-0.619	0.281	0.005	-0.286
GDYR	0.800	0.222	-0.134	0.268	0.545	-0.158	0.703	-0.295	-0.115	0.124
MASA	0.439	0.650	0.500	-0.131	-0.093	0.077	-0.164	-0.231	0.037	1.571
IMAS	-0.277	7.895	0.723	-0.199	-0.067	-0.184	-0.409	-0.446	-0.359	1.571
INDS	0.132	7.400	0.208	0.645	-0.135	-0.252	-0.781	1.314	0.556	0.762
SMSM	0.262	0.305	0.290	0.757	0.423	0.377	0.002	-0.177	0.281	0.116
HEXA	3.529	1.320	0.228	-0.096	-0.599	0.087	-0.648	1.470	-0.020	-0.047
UNTR	2.568	0.548	0.113	-0.246	-0.031	-0.087	-0.023	0.254	0.666	-0.227
GJTL	0.977	4.402	0.266	-0.261	-0.236	-0.152	-0.628	1.019	-0.365	-0.044

Source: data processed from finance.yahoo.com

Based on table 1, it can be seen that the return movement from 2014 to 2018 is fluctuating. The stock return which showed the lowest minus or loss position by PT Indospring Tbk occurred in 2020 at -0.7813 or a decrease of 78.13% and the highest stock return by PT Indospring Tbk in 2015 was 7.899 or an increase of 789.9% from the previous year. A positive return indicates that the stock price in year t is higher than the previous year, a negative return indicates that the stock price in year t is lower than the previous year, which means that the stock price has decreased.

Based on this phenomenon, it can be seen that there are factors that influence changes in stock returns. Some of these factors are internal and external factors. Internal factors in the form of unsystematic risks, namely business risks such as company policies in deciding to expand (business expansion), opening branch offices (rand offices), sub-branch offices (sub rand offices) whether opened domestically or abroad, and financial risks such as company inability pay debts with high interest due to uncollectible receivables. Meanwhile, external factors in the form of systematic risk which are reflected in stock beta, occur comprehensively and have contributed to the company becoming involved and the effects of market psychology which have been able to suppress technical conditions for buying and selling shares such as government policy, banking interest rates, macroeconomic conditions, politics, security, currency fluctuations as well as rumors and market sentiment (Sunaryo, 2020).

This research is important to carry out because several previous studies obtained different results. Among them is research conducted by Prasetyani & Isroah (2016), proving that investment risk has an insignificant effect on stock returns in food & beverages sector manufacturing companies listed on the Indonesia Stock Exchange in 2009-2012, while research conducted by Niar (2015) states that investment risk affects annual stock returns in the telecommunications industry and Nugroho & Sukhemi (2015) where research results show that stock liquidity and systematic risk simultaneously have a significant influence on stock returns. From previous research, it is known that the relationship between investment risk and stock returns still shows

different results, so further research needs to be carried out to prove the influence between variables. Based on this background, researchers are interested in conducting research with the title The Effect of Market Risk, Business Risk and Financial Risk on Stock Returns in Automotive Companies.

2. RESEARCH METHODS

2.1 Variables and Research Design

A variable is an attribute or trait or value of a person, object or activity that has certain variations determined by researchers to be studied and then conclusions drawn (Sugiyono 2017:39). In this research the independent variables are Market Risk (X1), Business Risk (X2), and Financial Risk (X3). The dependent variable used in this research is stock return (Y). Control variables are variables to complete or control causal relationships so that it is better to obtain a more complete and better empirical model. If not controlled, these variables will influence the symptoms being studied. The control variable used in this research is company size (size).

The associative approach is a research problem formulation that asks about the relationship between two or more variables (Sugiyono, 2017:37). In this research, an associative approach is used to determine the effect of investment risk on stock returns of automotive companies listed on the Indonesian stock exchange.

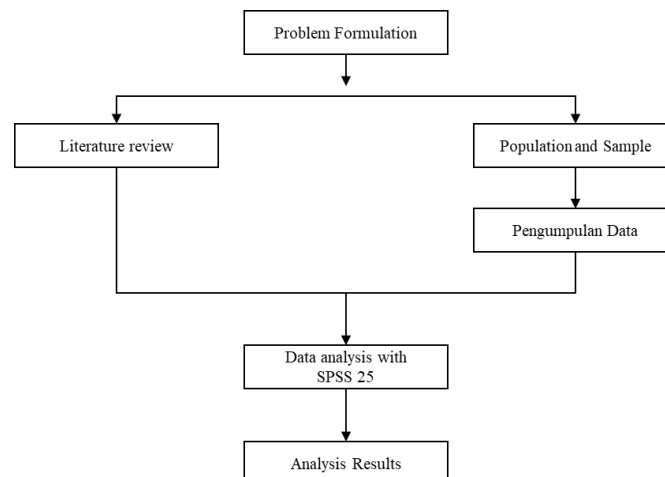


Figure 1. Research Design

2.2 Population and Sample

Population is a generalization area consisting of objects/subjects that have certain qualities and characteristics determined by researchers to be studied and then conclusions drawn (Sugiyono, 2017: 80). The population used in this research is all automotive companies that are consistently listed on the Indonesian Stock Exchange.

The sample is part of the number and characteristics of the population (Sugiyono, 2017:81). Sampling in this research used a purposive sampling method. Purposive sampling is a sample selection technique with certain considerations (Sugiyono, 2017: 85). Companies taken as samples in this research must meet the following criteria:

- Automotive companies listed on the Indonesian Stock Exchange that did not experience delisting during the observation period (2014-2023).
- Automotive companies listed on the Indonesia Stock Exchange that published financial reports during the observation period (2014-2023).
- Automotive companies listed on the Indonesia Stock Exchange which include closing share prices during the observation period (2014-2023).

Based on these criteria, the companies on the Indonesia Stock Exchange for the period (2014-2023) that meet the criteria as samples in this research are as follows:

Table 2. Sample List of Companies

No	Company Code	Company Name
1	ASII	PT Astra International Tbk
2	AUTO	PT. Astra Otoparts Tbk
3	GDYR	PT. Goodyear Indonesia Tbk
4	MASA	PT. Multistrada Arah Sarana Tbk
5	IMAS	PT. Indomobil Sukses Internasional Tbk
6	INDS	PT. Indospring Tbk
7	SMSM	PT. Selamat Sempurna Tbk
8	HEXA	PT. Hexindo Adiperkasa Tbk
9	UNTR	PT. United Tractor Tbk
10	GJTL	PT. Gajah Tunggal Tbk

Source: <http://yahoo.finance.com>

2.3 Operational Definition and Variable Measurement

The variables are the independent variable (X) consisting of market risk/market beta (X1), business risk (X2), financial risk (X3), the control variable is company size (X4) and the dependent variable is (Y) stock returns.

a. Operational Definition

The operational definition of a variable is a research element that provides an explanation or description of operational variables so that they can be observed or measured. The operational definition of the variables of this research is as follows:

- 1) Market Risk
Market risk is the result of regressing a stock's past returns on market returns (historical beta).
- 2) Business Risk
Business risk is uncertainty related to the level of income and the ability of an investment to pay a certain return to investors by looking for the standard deviation of ROE.
- 3) Financial Risk
Financial risk is an indicator variable that describes the comparison of the level of debt use against the company's capital structure.
- 4) Ukuran Perusahaan
Company size is a scale that determines the size of the company which can be seen from the equity value, sales value, number of employees and total asset value which is a context variable that measures the demand for an organization's services or products.
- 5) Return
Return is the profit that investors enjoy from investing in shares which can be calculated by comparing this year's share price minus the previous year's share price.

2.4 Data Collection Techniques

Analysis of the influence of stock investment risk on stock returns in the automotive industry listed on the Indonesia Stock Exchange can be studied using several methods. Researchers used statistical methods of multiple analysis and correlation. Calculations using statistical methods use the Statistical Program for Social Science (SPSS) 25 for Windows computer program.

a. Descriptive Statistical Analysis

Descriptive analysis is statistics used to analyze data by describing or illustrating the data that has been collected as it is without the intention of making general conclusions or generalizations (Sugiyono, 2017: 147).

b. Classic assumption test

The classic basic test states whether or not there are deviations from classical assumptions that can occur when using multiple linear regression models, namely multicollinearity, heteroscedasticity and autocorrelation. If there is a deviation from this assumption, the model used is not BLUE (Best Linear Unbiased Estimate) because it is necessary to first detect the possibility of this deviation using:

1) Normality Test

The normality test is carried out to test the data for the independent variable and the dependent variable in the resulting regression equation, whether the sample used is normally distributed or not distributed normally. The basis for decision making can be done by looking at the probability number, that is, if

the probability is > 0.05 then the distribution of the regression model is normal, and if the probability is < 0.05 then the distribution of the regression model is not normal.

2) Multicollinearity Test

The multicollinearity test aims to test whether the regression model finds a correlation between independent (free) variables (Ghozali, 2015: 105). A good regression model should have no correlation between independent (free) variables. The guideline for a regression model that is free of multicollinearity is to have a tolerance number close to 1, the VIF limit is 10, if the VIF value is below 10, then there are no symptoms of multicollinearity (Gujarati, 2012: 432). The formula used is as follows:

$$VIF = \frac{1}{Tolerance} \text{ or } Tolerance = \frac{1}{VIF}$$

3) Heteroscedasticity Test

The heteroscedasticity test aims to test whether in the regression model there is unequal variation in the residuals from one observation to another. If the variation of the residuals or other observations is constant, it is called homoscedasticity and if it is different it is called heteroscedasticity. A good regression equation is if heteroscedasticity does not occur (Ghozali 2015:139).

4) Autocorrelation Test

The autocorrelation test is a test carried out to find out whether the dependent variable is correlated with itself or not. Correlation with itself is that the value of the dependent variable is not related to the value of the variable itself, either the value of the previous period or the value of the period after.

c. Multiple Linear Regression Analysis

Multiple linear regression analysis is used to measure the influence between variables that involve more than one independent variable. In this research, multiple regression analysis acts as a statistical technique used to test whether there is an influence of investment risk (independent variable) consisting of market risk, financial risk, business risk and company size (control variable) on stock returns (dependent variable). The equation used to estimate multiple linear regression is as follows:

$$Y = \alpha + \beta_1 X_1 + \beta_2 X_2 + \beta_3 X_3 + \beta_4 X_4 + \varepsilon$$

Description:

X1	= Market risk variabel
X2	= Business risk variabel
X3	= Financial risk variabel
X4	= Company size variable
Y	= Stock return variable
α	= Constant
$\beta_1, \beta_2, \beta_3, \text{ dan } \beta_4$	= Regression coefficient

In this research, the calculation of the multiple linear regression analysis model uses the SPSS 25 for Windows application software program.

d. Hypothesis Test

1) Determinant Coefficient Analysis (R^2)

In this multiple regression model, we will see the magnitude of the contribution of the independent variables together to the dependent variable by looking at the magnitude of the total coefficient of determination (R). If (R^2) obtained is close to 1 (one), it can be said that the stronger the model explains the relationship between the independent variable and the dependent variable. Conversely, if (R^2) is closer to 0 (zero), the weaker the impact of the independent variables on the dependent variable.

2) F Test (Simultaneous Test)

This test is used to determine the joint impact of independent variables on the dependent variable. Where $F_{count} > F_{table}$, then H_1 is accepted or together the independent variables can explain the dependent variable simultaneously. On the other hand, if $F_{count} < F_{table}$, then H_0 is accepted or together the independent variables have no impact on the dependent variable. To determine whether the joint impact of the independent variables on the dependent variable is significant or not, a probability of 5% ($\alpha = 0.05$) is used. If $\text{sig} > \alpha$ (0.05), then H_0 is accepted and H_1 is rejected. If $\text{sig} < \alpha$ (0.05), then H_0 is rejected and H_1 is accepted.

3) T Test (Partial Test)

This test is used to determine whether each independent variable individually has a significant impact on the dependent variable. If $\text{sig} > \alpha$ (0.05), then H_0 is accepted and H_1 is rejected and if $\text{sig} < \alpha$ (0.05), then H_0 is rejected and H_1 is accepted.

3. RESULTS AND DISCUSSION

3.1 Research Results

a. Descriptive Statistical Analysis

Descriptive statistics in this research are used to provide an overview of the research sample which consists of the amount of data, minimum value, maximum value, average value and standard deviation for market risk, business risk, financial risk, company size and stock return variables.

Table 3. Descriptive Statistic

Variable	N	Minimum Value	Maximum Value	Mean	Standar Deviasi
Market risk	100	-8,936	4,654	-0,019	1,457
Business risk	100	0,003	7,814	2,345	1,769
Financial risk	100	0,131	10,165	1,200	1,280
Company Size	100	27,155	33,474	29,776	1,616
Stock return	100	-0,781	7,895	0,445	1,299

Source: Processed data, 2023

Based on descriptive statistical testing in the table above, it can be concluded:

- 1) The market risk variable with the lowest value is PT Indomobil Sukses Internasional Tbk with a beta of -8.936 in 2010 with β being negative and below zero indicating that the share price is contrary to market conditions, while the highest value is PT Gajah Tunggal Tbk with a market beta of 4,654 in 2016 with a β value above 1 ($\beta > 1$), this shows that share prices have movements that are very responsive or aggressive to market conditions and these shares have a level of price change or volatility above the market. The mean or average value of -0.019 ($\beta < 1$) is negative and below zero, indicating that the market risk (market beta) of the sample company throughout the observation period shows that these shares have movements that are opposite to market conditions. The standard deviation value of 1.457, which is greater than the mean, indicates poor results because it reflects varied data.
- 2) The business risk variable with the lowest value is PT. Selamat Selamat Tbk with a value of 0.003 in 2012 shows that the company faces very little risk, while the one with the highest value is PT. Gajah Tunggal Tbk with a value of 7,814 in 2009 shows that the company faces huge risks. The mean/average business risk value is 2.345, which means the average rate of return on investment on own capital is 234.5% in the sample companies throughout the observation period. The standard deviation value of 1.769 shows good results because the standard deviation value is smaller than the mean, which reflects data that does not vary.
- 3) The financial risk variable with the lowest value is PT Indospring Tbk with a value of 0.131 in 2018 indicating the lowest use of debt compared to other companies in the observation period so that financial risk is faced by small companies, while the one with the highest value is PT Indomobil Sukses Internasional Tbk with The value of 10,165 in 2009 shows the highest use of debt compared to other companies in the observation period so that the financial risk faced by the company is also high. The mean/average financial risk value is 1,200, which means the sample company's use of debt is 120% of total assets throughout the observation period. A standard deviation value of 1.280 indicates poor results because the standard deviation value is greater than the mean, which reflects varying data.

- 4) The company size variable with the lowest value is PT Indospring Tbk with a value of 27.15 in 2009 indicating the lowest value of assets owned by the company compared to other companies in the observation period while the highest value is PT Astra International Tbk with a value of 33.47 in 2018 shows the highest value of assets owned by the company compared to other companies in the observation period. The mean/average total assets of the sample companies was 29,776 in the observation period. A standard deviation of 1.616 shows good results because the standard deviation value is smaller than the mean value which reflects data that does not vary.
 - 5) The stock return variable with the lowest position by PT Indospring Tbk was -0.7813 which occurred in 2015, indicating that the rate of return on investment experienced the lowest loss in the observation period and the highest stock return by PT Indospring Tbk was 7.3999 which occurred in 2010, indicating the level return on investment experienced the highest profit in the observation period. The mean value of 0.445 indicates the company's rate of return throughout the observation period was 44.5%. A standard deviation value of 1.299 indicates poor results because the standard deviation value is greater than the mean value, reflecting varying data.
- b. Classic Assumption Test Results
- 1) Normality test
The normality test is carried out to test the data for the independent variable and the dependent variable in the resulting regression equation, whether the sample used is normally distributed or not distributed normally.

Table 4. Normality Test Results

Number of Samples	Asymp. Sig. (2-tailed)	Description
100	0,200	Normally distributed

Source: SPSS data processing results, 2023

Based on the table data from the results of the normality test, it can be seen that the significant Asymp Sig (2-tailed) variable value is $0.200 > 0.05$, so it can be concluded that the data distribution is normal.

- 2) Multicollinearity Test
The multicollinearity test aims to test whether the regression model finds a correlation between independent (free) variables.

Table 5. Multicollinearity Test Results

<i>Collinearity Statistics</i>		
Variable	Tolerance	VIF
Market Risk (X1)	0,960	1,042
Business Risk (X2)	0,859	1,164
Financial Risk (X3)	0,888	1,126
Company Size (X4)	0,953	1,050

Sumber: Hasil olah data SPSS, 2023

Based on the test results in the table above, it is found that the tolerance value for all independent variables is greater than 0.1 and the VIF value for all independent variables is smaller than 10, so it can be concluded that there is no multicollinearity in the data tested so it can be said that the independent variables used in the model are acceptable, trustworthy and objective.

- 3) Heteroscedasticity Test
The heteroscedasticity test aims to test whether in the regression model there is unequal variation in the residuals from one observation to another.

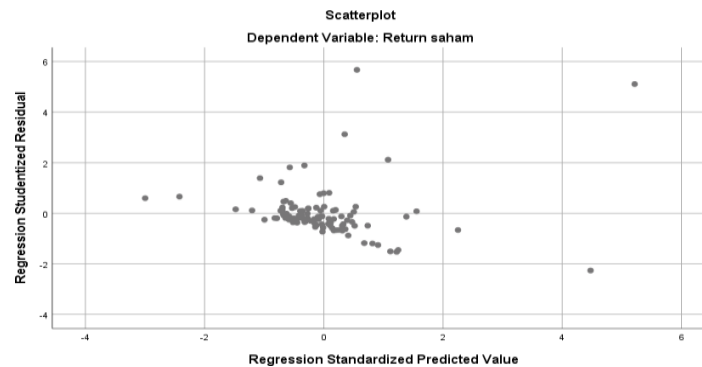


Figure 2. Scatter Plot Diagrams

Source: SPSS Data Processing Results, 2023

Based on the results of testing the symptoms of heteroscedasticity, the data does not show any particular pattern in the graph that is formed and the data is distributed randomly, so it can be concluded that the regression equation model that has been formulated does not show any symptoms of heteroscedasticity.

4) Autocorrelation Test

The autocorrelation test is used to determine whether or not there are deviations from the classic assumption of autocorrelation, namely the correlation that occurs between the residuals in one observation and other observations in the regression model.

Table 6. Autocorrelation Test Results

Nilai D-W	dU	4-dU
1,961	1,625	2,375

Source: Processed data, 2023

Based on the table it can be seen that the D-W value is 1.961. This value will be compared with the 5% significance table with the number of samples (T=100) and the number of independent variables (K=4). So the dL value (lower limit of Durbin Watson) is 1.461 and the value of dU (upper limit of Durbin Watson) is 1.625. Because D-W is located at ($dU < d < 4 - dU$) = $1.461 < 1.961 < 2.375$, it can be concluded that there is no autocorrelation or no positive or negative autocorrelation in the data tested.

c. Multiple Regression Analysis

Multiple regression analysis is used to measure the magnitude of the influence of two or more independent or independent variables (X) on the dependent or dependent variable (Y). The equation used to estimate multiple linear regression is as follows:

$$Y = \alpha + \beta_1 X_1 + \beta_2 X_2 + \beta_3 X_3 + \beta_4 X_4 + \varepsilon$$

Table 7. Results of Multiple Linear Regression Analysis

Variable	Coefficient	Std. Error	Beta	Sig.
Market Risk (X1)	1,515	2,355		0,0522
Business Risk (X2)	-0,318	0,086	-0,357	0,000
Financial Risk (X3)	0,120	0,075	0,163	0,014
Company Size (X4)	-0,079	0,102	-0,977	0,444
Market Risk (X1)	-0,042	0,078	-0,053	0,588

Source: SPSS Data Processing Results, 2023

The table above depicts the regression equation as follows:

$$Y = 1,515 - 0,318X_1 + 0,120X_2 - 0,079X_3 - 0,0042X_4$$

Based on the regression equation, the influence of the independent variables (Market Risk, Business Risk, Financial Risk) can be analyzed, the control variable (company size) on the dependent variable (Share Return), namely:

- 1) A constant value of 1.515 means that when the independent variables, namely market risk, business risk, financial risk and the control variable, namely company size, are considered constant, the stock return value will increase by 151.5%.
 - 2) The regression coefficient for the market risk variable (X1) is -0.318, meaning that if the market risk variable (X1) increases by 1%, the stock return (Y) will decrease by 31.8% assuming that the other independent variables and control variables from the model regression is constant.
 - 3) The regression coefficient for the business risk variable (X2) is 0.120, meaning that if the business risk variable (X2) increases by 1%, the stock return variable (Y) will increase by 12% assuming that the other independent variables and control variables from the regression model is fixed.
 - 4) The regression coefficient for the financial risk variable (X3) is -0.079, meaning that if the financial risk variable (X3) increases by 1%, the stock return variable (Y) will decrease by 7.9% with the assumption that the other independent variables and control variables of the regression model is fixed.
 - 5) The regression coefficient for the company size variable (X4) is -0.004, meaning that if the company size variable (X4) increases by 1%, the stock return variable (Y) will decrease by 0.4% with the assumption that the independent variables from the regression model are constant. .
- d. Hypothesis Test Results
- 1) Analysis of the Determination Coefficient (R^2)
The coefficient of determination test is carried out to find out how much the independent variables together contribute to the dependent variable by looking at the size of the total coefficient of determination (R). The results of the calculation of the coefficient of determination test can be seen in the following table:

Table 8. Coefficient of Determination

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	0,383	0,147	0,111	1,22491

Source: Processed data, 2023

From the results of the table above, the calculation results show that the coefficient of determination (R^2) is 0.111. This shows that the influence of the independent variables, namely market risk, business risk, financial risk and the control variable, namely company size, on the dependent variable, namely stock returns, which can be explained by this equation model is 11.1%, while the remaining is 89.9%. % influenced by other factors outside the research.

- 2) t test (partial test)
This test is used to determine whether each independent variable individually has a significant impact on the dependent variable. This test is carried out by comparing the significance value of t which is shown by the sig of t in table 4.7. With the level of significance taken, in this case 0.05. If the sig value of $t < 0.05$ then the independent variable has an effect on the dependent variable. The results of the T test calculations in this research can be seen as follows:

Table 9. t Test Results (Partial)

Variable	t	Sig.
Market Risk (X1)	0,643	0,522
Business Risk (X2)	-0,3691	0,000
Financial Risk (X3)	1,593	0,014
Company Size (X4)	-0,769	0,444
Market Risk (X1)	-0,543	0,588

Source: Processed data, 2023

Dengan nilai t-tabel : $(\alpha/2;96) = 0,678$. Hasil pengujian masing-masing variabel dapat dijelaskan sebagai berikut:

- a) Uji hipotesis pengaruh market risk terhadap return saham

Based on the results of the t test in the table, it can be seen that the calculated t-value is -0.3691 with a significance of 0.000 which is smaller than 0.05 ($\alpha < 0.05$). The negative t-value indicates that the market risk variable (X1) has a unidirectional relationship and has a significant effect on the stock return variable (Y), so it can be concluded that market risk (X1) has a negative and significant effect on stock returns (Y), this means that H1 is rejected.

- b) Test the hypothesis of the influence of business risk on stock returns

Based on the results of the t test in the table, it can be seen that the t-value is 1.593 with a significance of 0.014 which is greater than 0.05 ($\alpha < 0.05$). The calculated t-value is positive indicating that the business risk variable (X2) has a unidirectional but significant relationship with the stock return variable (Y), so it can be concluded that business risk (X2) has a positive and significant influence on stock returns (Y), this means H2 is accepted.

- c) Test the hypothesis of the influence of financial risk on stock returns

Based on the results of the t test in the table, it can be seen that the t-value is -0.769 with a significance of 0.444 which is greater than 0.05 ($\alpha > 0.05$). The t-calculated value is negative indicating that the financial risk variable (X3) has a unidirectional and insignificant relationship with the stock return variable (Y), so it can be concluded that financial risk (X2) has a negative and insignificant influence on stock returns (Y), This means that H3 is rejected.

- 3) F Test Results (Simultaneous)

This test is used to determine the joint impact of independent variables on the dependent variable. If $F_{count} > F_{table}$, then the independent variable simultaneously has an influence on the dependent variable. On the other hand, if $F_{count} < F_{table}$, then together the independent variables have no influence on the dependent variable. The results of the F test calculations in this research can be seen as follows:

Table 10. F Test Results

	Model	Sum of Squares	Df	Mean Square	F	Sig.
1	Regression	24,572	4	6,143	4,094	0,004
	Residual	142,538	95	1,500		
	Total	167,109	99			

Source: Processed data, 2023

F-calculated value = 4.094 and F-table $\alpha: (4);(95) = 2.47$. From the results of the F test (Anova), it was found that the F-Count > F-Table value was $4.094 > 2.47$ with a significance value smaller than 0.05, namely 0.004. So it can be concluded that the market risk, business risk and financial risk variables simultaneously influence the stock return variable, so it can be concluded that H4 is accepted.

3.2 Discussion

- a. The influence of the independent variable on the dependent variable is partial

- 1) The influence of market risk on stock returns

Based on the results of data processing, it can be concluded that market risk has a negative and significant effect on stock returns. Even though the results of this research have a negative and significant effect, they are not in accordance with the hypothesis which states that market risk has a positive and significant effect. The reason beta has a negative influence on stock returns is because throughout the research period from 2014-2023 market risk is influenced by macro factors such as interest rates which tend to rise, with high interest rates having an impact on the company's funding side which comes from loans (debt). because loan interest rates will also increase so that funding costs will become expensive. If this happens, it will affect the company's prospects, so that this condition will have a negative impact on share prices and will affect the required return value.

In conditions of high interest rates, investors will bear high risks, but the returns obtained will decrease due to increasing funding costs from debt. This is in accordance with the results of research from Jarociński & Karadi (2020) which states that high interest rates are a negative signal for stock prices. Rising interest rates will also have an impact on increasing inflation. This has a negative impact on share prices because inflation increases a company's costs. If the increase in costs is higher than the company's income, then the company's profitability will decrease. A

decrease in company profits will cause investors to not be interested in investing in the company, this can result in a decrease in share prices and will have an impact on stock returns (Karim, 2016). Conditions like this cause inflation to have a negative effect on stock returns.

2) The influence of business risk on stock returns

Based on the results of data processing, it can be concluded that business risk has a positive and significant influence on stock returns. High business risk will reflect that the company has succeeded in generating profits on the company's capital. Profit is important information for investors as a consideration when investing in a company. According to Yuniastri et al. (2021) an increase in company profits will provide a signal of good company performance so that investors will be interested in buying company shares. High demand when the number of offers remains constant will have an impact on increasing stock prices, so this will also increase stock returns (Devi & Artini, 2019). This means that there is a unidirectional (positive) relationship between business risk and stock returns.

3) The influence of financial risk on stock returns

Based on the results of data processing, it can be concluded that financial risk has a negative and insignificant influence on stock returns. Signaling theory shows that companies with a higher value will give signals in the form of using more debt (Sofiatin, 2020). The use of debt shows that the company is not vulnerable to the risk of bankruptcy, so that the market assessment of the company will increase, and investors will be interested in investing (Kosimpang et al., 2017). However, on the other hand, a company with a high DER value indicates that the company is unhealthy because the greater the DER indicates that the business capital structure utilizes more debt than equity, so the greater the company's burden on creditors. This shows that the company's capital sources are very dependent on creditors compared to funds from internal company parties, thus reflecting the company's relatively high risk, namely the risk of default or the possibility of the company going bankrupt due to the unavailability of sufficient capital to cover all debts (Dasman et al., 2023).

The higher the DER, the greater the debt, the higher the interest costs, thereby reducing profits. Although interest expenses can save company taxes, the dominance of debt provides a greater risk of liquidation. Apart from that, with high interest costs, the profits earned by the company will be used to cover the company's debts. Reduced company profits will reduce investors' interest in holding shares in the company and a fairly high DER indicates that the company's performance is poor because it cannot utilize internal funding sources properly (Ghonyah, 2016). Because of this conflict, investors do not include financial risk as measured by DER in their investment considerations, so that DER has no effect on stock returns.

b. Simultaneous Influence of Independent Variables on the dependent variable

Based on the results of data processing, it can be concluded that the independent variable simultaneously has an influence on the dependent variable. Share returns from automotive companies listed on the IDX during the 2014-2023 period are influenced by variations in the three independent variables used, namely market risk, business risk and financial risk, while the rest are influenced by other factors outside the research model, such as economic conditions, government policy, and so on. This is in accordance with the high risk high return theory which states that in a perfect and efficient market, the law of a positive relationship between return and risk applies (Ball & Brown, 2014). The higher the expected return, the higher the risk, and conversely the smaller the risk, the smaller the implied level of profit (Niar 2014; Purwanti & Nurastuti, 2020).

The importance of understanding the relationship between independent and dependent variables in this research is illustrated by the results of data processing which shows that simultaneously the three independent variables, namely market risk, business risk and financial risk, have an influence on automotive company stock returns on the Indonesia Stock Exchange (BEI). . These results provide a significant contribution to the understanding of the factors that influence stock performance in the automotive sector. Market risk describes the level of risk originating from overall market fluctuations, business risk refers to risk originating from company operations, while financial risk is related to financial risk arising from the company's capital structure. By knowing the role of each of these variables, investors and stakeholders can make more informed investment decisions.

Even though these three independent variables provide significant contributions, the research results also highlight that there are still other factors outside the research model that influence stock

returns. These factors include economic conditions and government policies, which can have an unexpected impact on stock performance. Therefore, this conclusion emphasizes the importance of involving contextual understanding and thorough analysis in detailing the external factors that play a role in shaping automotive company stock returns. This is an encouragement to continue research and further exploration of external factors that may contribute to stock return variability.

Apart from providing insight into the relationship between return and risk in accordance with the high risk high return theory, this research also creates awareness of the complexity of financial markets and the importance of in-depth research. The implications of these results can be used as a basis for automotive company investment policies and guidance for investors in managing their portfolios. As a next step, developing more complex models and considering additional variables could be a valuable contribution to improving understanding of capital market dynamics.

4. CONCLUSIONS AND SUGGESTION

Based on the research results, the researcher can draw the conclusion that the results of the partial test (t) for the market risk variable have a negative and significant effect on the stock return variable, the business risk variable has a positive and significant effect on stock returns, while the financial risk variable has a negative and insignificant effect on variable stock returns in automotive companies listed on the Indonesia Stock Exchange in 2014-2023. Then the results of the simultaneous test (F) show that the market risk, business risk and financial risk variables influence the stock return variable in automotive companies listed on the Indonesia Stock Exchange in 2014-2023.

Based on the research results, there are several suggestions that can be put forward, namely research with similar problems in the future should develop investment risk variables outside of this research so that they can be more applicable in explaining the relationship between risks, increase the observation period to better describe the company's condition, expand the number of samples and segmentation or other industrial sectors so that research can be generalized so as to produce even better research results. Then, apart from considering the stock returns that will be obtained, investors and companies should also consider investment risks which will of course affect stock returns, especially market risk and business risk which have a significant influence on stock returns as mentioned in the results of this research so that investors should pay attention as well as analyzing information related to market risk (share beta) and business risk before investing in order to achieve optimal returns.

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