

# ANALYSIS OF THE EFFECT OF FIRM SIZE, GROWTH, TANGIBILITY, LIQUIDITY, AND PROFITABILITY ON STOCK RETURN WITH DEBT LEVEL AS INTERVENING VARIABLES ON LQ45 SHARES IN INDONESIA STOCK EXCHANGE

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## Abstract

At the moment, investment is primarily defined as capital investment, and it has an essential meaning in the domestic and global economy. One of the investment types selected by society is the stock investment in the capital market. Investing in the capital market requires a barometer to provide investors with a general illustration of the stock price index. One of the stock indices in the Indonesia Stock Exchange is LQ45. The LQ45 index measures the price performances of 45 stocks with high liquidity and big market capitalization supported by the excellent company fundamental aspect. The study aimed to discover the effect of Firm Size, Growth Tangibility, Liquidity, and Profitability on Stock Return with Debt Level as the intervening variable in LQ45 stocks. This study is expected to provide suggestions and considerations for LQ45 firms to decide to improve the company stock return. The study employed a quantitative method with data processing using SPSS. The data collection was carried out using Company Public Financial Statements from the IDX website. Sample criteria were non-banking firms listed in LQ45 from 2014-2018. The study results reveal that seven variables mainly influenced Debt Level and Stock Return, i.e., Firm Size has a significant negative effect on Debt Level with statistic t-value (-2.362) and sig. value (0.019); Firm Size has a significant positive effect on Stock Return with statistic t-value (2.288) and sig. value (0.023); Growth has a significant positive effect on Debt Level with statistic t-value (3.779) and sig. value (0.000); Tangibility has a significant negative effect on Debt Level with statistic t-value (-5.520) and sig. value (0.000); Tangibility has a significant positive effect on Stock Return with statistic t-value (2.161) and sig. value (0.032); Liquidity has a significant negative effect on Debt Level with statistic t-value (-7.581) and sig. value (0.000); Profitability has a significant negative effect on Debt Level with statistic t-value (-3.158) and sig. value (0.002). Therefore, investors should consider these variables to increase Debt Level and Stock Return.

**Keywords:** Firm Size, Growth, Tangibility, Liquidity, Profitability, Debt Level, Stock Return

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## 1. Background

At the moment, investment is primarily defined as capital investment, and it has an essential meaning in the domestic and global economy. According to Picardo, E. (2020), investment allocates resources such as money and expecting for income or profit (<https://www.investopedia.com>, downloaded on 18 May 2020). Investment can be performed by starting a new business or purchasing a real estate asset, hoping for a higher reselling price in the future. Investment actors are called investors who offer guarantees as labor wages or other investment forms (Halim, 2015). In investing, investors can execute two investment types, short-term and long-term investments. The short-term investment lasts for 3-12 months. This investment type is commonly called temporary investment, or funds collected while waiting for other investment opportunities with the best return rate. Meanwhile, the long-term investment takes a relatively long time to generate a return. The long-term investment generally has a more optimal return rate than the short-term investment. However, the risk is also generally higher. The most popular type is a stock investment in the capital market.

Stock investment is a means of investment provided in the capital market. If the selling price generates a profit for investors, it can be traded. In the stock investment, an investor has two opportunities to receive profit, i.e., capital gain or dividend payout. Capital gain refers to the profit received when the capital asset selling price is higher than the buying price.

On the other hand, a dividend is a profit distributed to shareholders based on the number of stocks possessed. However, investing in stocks has risks, such as loss risk due to the difference between selling and buying prices. It follows the primary investment concept, high risk-high return, and low risk-low return.

In Indonesia, investors who invest in stocks in the capital market continue to increase. Hasan Fawzi, Director of Indonesia Stock Exchange (IDX) Development, stated that the number of Single Investor Identification (SID) until March 2020 reached 1,160,542. Compared to the initial position in 2020, this number increased by 55,932, or 4.82%. Since early 2020, investors increased by 194,685, or 7.84%. Therefore, per March 2020, total SIDs for stocks, mutual funds, and bonds were 2,679,039 (<https://market.bisnis.com/> downloaded on 18 May 2020). This SID increase is resulted from socialization and education by IDX to investors and investor candidates. Besides, the declining trend in primary stock prices in Indonesia Stock Exchange is appealing. Hence, new investors capture it as an investment opportunity, leading them to open securities accounts or SIDs in the Indonesian capital market.



**Figure 1.1 Comparison chart of IHSG, IDX30 and LQ45 in the last 10 years**

Source: IDX Stock Index Handbook v1.1

Figure 1.1 displays the growth graph of IHSG, IDX30, and LQ45 in the last ten years. The differences between the three indices lie in the number of listed companies. IHSG is the Composite Stock Price Index in all companies listed on the Indonesia Stock Exchange. IDX30 is an index consisting of 30 companies, while LQ45 consists of companies. Based on this graph, increases are observed in the three indices. From December 2009 to December 2019, IHSG increased by 148.57%, IDX30 increased by 118.94%, and LQ45 increased by 103.59%. Following the results, an investor can conclude that companies in the LQ45 index are well-performed companies.

In this study, the researcher utilized the LQ45 index as a study object. The LQ45 index measures performances of 45 stock prices with high liquidity, big capital market, and supported by an excellent company fundamental aspect (IDX Stock Index Handbook v1.1 downloaded on 18 May 2020). Long-term investors commonly used the LQ45 index as an investment reference. Companies in the LQ45 list should be proud because capital market actors have acknowledged and convinced that the company's liquidity rate and market value are exceptional. Stocklist periods included in the LQ45 index calculation are February-July and August-January (<https://www.sahamok.com> downloaded on 18 May 2020). Stocks complying with the criteria stay in LQ45, while the ones failing the criteria will be replaced with more qualified stocks. Requirements for companies to enter the LQ45 index are record in IDX for three months, trading activities in the regular market (value, volume, and frequency), number of trading days in the regular market, market value in a specific period, and growth prospect of the company.

Fundamentally, every company aims to maximize company value. High company value reflects good company performance. In this case, company performance can be measured with the stock return rate. Stock return is the return rate expected from an investment in stocks or stock groups through a portfolio (Chandra, T. et al., 2019). Stock return is vital for investors because it is the leading factor motivating investors to invest. If the generated revenue is high, it provides welfare for investors. In contrast, if the generated revenue is low, it decreases shareholder welfare.

One of the principal factors influencing stock return is capital structure. According to Zani et al. (2014), capital structure is a method to shape companies on the right-side balance consisting of equity and liabilities. In other words, the capital structure demonstrates the liability proportion used to finance investment projects. Hence, investors can discover the balance between risk and investment return and profit size by understanding the capital structure. In this study, the capital structure was measured using the debt level. Khan et al. (2013) discovered that debt level positively influenced stock return. Therefore, the higher the company liability, the higher the company risk. Increasing corporation risk encourages shareholders to demand a higher risk premium. As a result, inventory revenue should increase. It is in line with studies by Yang et al. (2010) and Taghavi et al. (2013).

**Table 1.1 Data Relationship Factors - Factors that Affect Debt Level on the Journal**

Variabel	Chandra, T. <i>et al.</i> , (2019)	Sheikh, N. A., & Wang, Z., (2011)	Alipour, M. <i>et al.</i> , (2015)
Firm Size	(+) Not Significant	(+) Significant	(-) Significant
Growth	(-) Significant	(-) Not Significant	(-) Significant
Tangibility	(+) Not Significant	(-) Significant	
Liquidity	(+) Not Significant	(-) Significant	(-) Significant
Profitability		(-) Significant	(-) Significant

Table 1.1 shows the first research gap regarding factors affecting Debt Level. Based on the relationship data from three journals, several gaps are present. Thus, these gaps offer an opportunity for further exploration to obtain theoretical and practical concepts concerning factors affecting Debt Level.

**Table 1.2 Data Relationship Factors - Factors that Affect Stock Return Based on the Journal**

Variabel	Chandra, T. <i>et al.</i> , (2019)	Yang, C. C. <i>et al.</i> , (2010)	Taghavi, M. <i>et al.</i> , (2013)
Firm Size	(+) Not Significant	(+) Not Significant	(+) Significant
Growth	(-) Not Significant	(+) Significant	(+) Significant
Tangibility	(-) Not Significant		
Liquidity	(-) Not Significant	(-) Significant	(-) Significant
Profitability	(+) Significant	(+) Significant	(+) Significant
Debt Level	(-) Not Significant	(+) Significant	(+) Significant

Table 1.2 shows the second research gap regarding factors affecting stock return. Based on the relationship data from three journals, several gaps are present. Thus, these gaps offer an opportunity for further exploration to obtain theoretical and practical concepts concerning factors affecting stock return.

The study focused on discovering whether firm size, growth tangibility, liquidity, and profitability affect stock return with debt level as the intervening variable in LQ45 stocks. Debt level played a role as an intervening variable because it connects independent and dependent variables into an indirect relationship. Therefore, the study aimed to offer information to help companies making future management decisions.

## 2. Literature Review

### 2.1 Firm Size

According to Gitman & Zutter (2015), firm size is measured by considering the company asset calculated based on the market value. Companies with higher market values show that the company has matured. According to Ernawati (2016), firm size illustrates the company size and can be stated in the form of total assets or total net sales. The higher the total asset and sales, the bigger the company. According to Surbakti (2013), firm size is a scale classifying a company's size in various methods, such as total assets. The bigger the company asset, the higher the company activity and profit; therefore, decreasing liabilities. According to the results of research by Sheikh & Wang (2011) on manufacturing companies listed on the Karachi Stock Exchange, it is found that firm size has a significant positive effect on capital structure. According to research Acheampong *et al.* (2014) at the Ghana Stock Exchange company, it was found that firm size has a significant positive effect on stock returns.

**Hypothesis 1: Firm size positively and significantly affects debt level**

**Hypothesis 6: Firm size positively and significantly affects stock return**

## 2.2 Growth

According to Kasmir (2012), growth is a ratio depicting the company's ability to maintain its economic position in economic growth and the industrial sector. The growth reflects the company's productivity and expectation (Onalapo & Kajola, 2010). At the same time, according to Hassan et al. (2014), growth is the sales or revenue increase measured by annual sales movements. Therefore, the bigger the annual sales growth, the bigger the company growth. According to research by Chang et al., (2014) found that growth has a positive effect on the capital structure studied in companies in China. According to research by Taghavi et al. (2013), growth has a significant positive effect on stock returns.

**Hypothesis 2: Growth positively and significantly affects debt level**

**Hypothesis 7: Growth positively and significantly affects stock return**

## 2.3 Tangibility

Based on Joni & Lina (2010), tangibility refers to the dominant asset position in a company's wealth or asset composition. The bigger the asset tangibility, the higher the investor trust because the company is perceived to have a bigger capability to guarantee its external financing, meaning that they can add the liabilities. Mazur, K. (2007) defines tangibility as the proportion of a company's real or tangible asset as an investment. The total fixed asset proportion from the total asset illustrates the proportion of a company's real or tangible asset. According to research by Sheikh & Wang (2011) on manufacturing companies listed on the Karachi Stock Exchange, it is found that Tangibility has a significant negative effect on the capital structure. Fama & MacBeth (1973) found a positive and statistically significant relationship between Tangibility and Stock Return.

**Hypothesis 3: Tangibility negatively and significantly affects debt level**

**Hypothesis 8: Tangibility positively and significantly affects stock return**

## 2.4 Liquidity

According to Kimathi et al. (2015), liquidity is the company's ability to pay short-term liabilities, defined as the ratio between current assets and current liabilities. Pandey (2005) explains that liquidity is the company's ability to use current assets to pay short-term liabilities past due. Here, companies with high liquidity will have higher liabilities due to their ability to endure short-term debts, indicating a positive correlation between liquidity and debt level. According to research conducted by Alipour et al. (2015) on companies located in Iran that liquidity has a significant negative effect on capital structure. According to Ahmad et al., (2013) in a study conducted at the Karachi Stock Exchange, found a significant negative effect between liquidity and stock return.

**Hypothesis 4: Liquidity negatively and significantly affects debt level**

**Hypothesis 9: Liquidity negatively and significantly affects stock return**

## 2.5 Profitability

Following Gitman (2015), profitability is an analysis used to evaluate the company profit regarding a certain sales rate, a certain asset rate, or owner investment. Ernawati (2016) asserts that profitability is the company's ability to achieve profit in a particular period. Profitability is the company's ability to achieve profit related to sales, total assets, and self-equity (Sartono, 2010). The results of research conducted by Sheikh & Wang (2011) on manufacturing companies in Pakistan show that profitability has a negative and significant effect on capital structure. Ahmad et al., (2013) conducted research on non-financial companies on the Karachi Stock Exchange and found that profitability had a significant positive effect on stock returns.

**Hypothesis 5: Profitability negatively and significantly affects debt level**

**Hypothesis 10: Profitability positively and significantly affects stock return**

## 2.6 Debt Level

According to Van Horne and Wachowicz (2012), capital structure is the mixture or proportion of the company's long-term permanent capital explained in debts, preference equity, and ordinary stocks. Brealey et al. (2017) show that capital structure is a mixture of long-term debts and equity financing. Based on Harjito, D., & Martono, S. (2014), capital structure is the comparison or balance of the long-term funds, reflected by the ratio of long-term debts and self-equity. Research conducted by Khan et al. (2013) found that debt levels have a significant positive effect on stock returns. This result is in line with the research of Yang et al. (2010) stated that there is a significant positive effect between debt levels and stock returns.

**Hypothesis 11: Debt level positively and significantly affects stock return**

**Hypothesis 12: Debt level mediates the relationship between firm size and stock return**

**Hypothesis 13: Debt level mediates the relationship between growth and stock return**

**Hypothesis 14: Debt level mediates the relationship between tangibility and stock return**

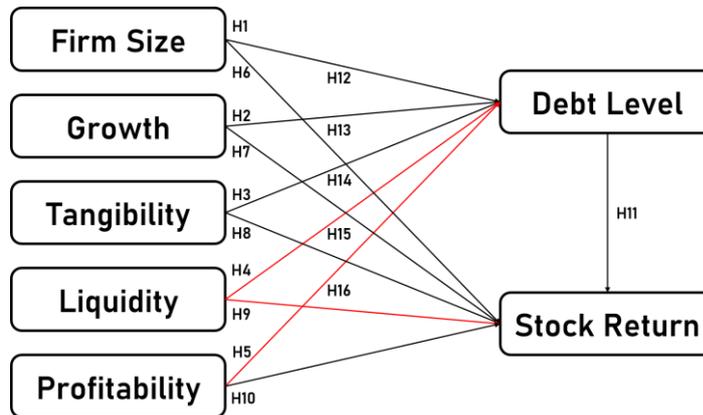
**Hypothesis 15: Debt level mediates the relationship between liquidity and stock return**

**Hypothesis 16: Debt level mediates the relationship between profitability and stock return**

**2.7 Stock Return**

Following Halim, A. (2015), the stock return is the profit acquired from stock price changes from period t to t-1. The bigger the stock price change, the higher the stock return generated. Van Horne & Wachowicz (2012) defines stock return as the revenue of investment plus market value change, and it is usually stated as the percentage of investment initial market value. Stock return is the stock return rate expected from an investment on stocks or stock groups through a portfolio (Chandra, T. et al., 2019). According to Ang, R. (1997), the stock return is the profit rate enjoyed by investors while investing, while Tandelilin, E. (2010) argues that stock return is a factor encouraging investors to invest and is a reward for investors taking the investment risk

**3. Research Methods**



**Figure 3.1 Research Model**

The method used in the study was quantitative. The study population was companies listed in LQ45, which amounted to 45 companies updated every six months. Samples used in the current study were non-banking companies listed in LQ45 from 2014-2018. Based on the predetermined criteria, the number of study samples was 169. After the data is tabulated, then the research model will be tested using IBM SPSS software version 22.0. This study uses two regression models. The first regression model is to measure the effect of independent variables on debt level variables, which shows the results of the hypothesis 1-5. The second regression model is to measure the effect of independent variables on the stock return variable which shows the results of the hypothesis 6-11. Furthermore, the Sobel Test calculation is carried out to calculate the effect of mediation which shows the results of the hypothesis 12-16.

**4. Results and Discussion**

This study consists of two regression models, namely the first regression model (to the Stock Return) and the second regression model (to the Debt Level). Based on the test results of the classical assumption test, the first regression model and the second regression model show results that meet the criteria for each test which includes: Normality Test, Heteroscedasticity Test, Multicollinearity Test, and Linearity Test. Furthermore, based on the data feasibility test, the first regression model and the second regression model show results that meet the criteria in each test which includes: R2 Determination Test and F Statistical Test so that the research model is considered Fit and feasible to continue as a study.

**Table 4.1 The first regression model**

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.
	B	Std. Error	Beta		
1 (Constant)	1,415	,300		4,715	,000
FIRM SIZE	-,023	,010	-,145	-2,362	,019
GROWTH	,304	,080	,199	3,779	,000
TANGIBILITY	-,302	,055	-,305	-5,520	,000
LIQUIDITY	-,062	,008	-,413	-7,581	,000
PROFITABILITY	-,548	,174	-,193	-3,156	,002

a. Dependent Variable: DEBT LEVEL

$$SR_{(t+1)} = \alpha + \beta_1 FS_{(t)} + \beta_2 GROW_{(t)} + \beta_3 TANG_{(t)} + \beta_4 LIQ_{(t)} + \beta_5 PROF_{(t)} + \beta_6 DL_{(t)} + error$$

$$SR_{(t+1)} = -1,677 + 0,47 FS_{(t)} - 0,124 GROW_{(t)} + 0,263 TANG_{(t)} + 0,011 LIQ_{(t)} - 0,252 PROF_{(t)} + 0,155 DL_{(t)} + error$$

**Table 4.2 The second regression model**

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.
	B	Std. Error	Beta		
1 (Constant)	-1,677	,654		-2,565	,011
FIRM SIZE	,047	,021	,209	2,288	,023
GROWTH	-,124	,171	-,059	-,726	,469
TANGIBILITY	,263	,122	,191	2,161	,032
LIQUIDITY	,011	,020	,052	,563	,574
PROFITABILITY	-,252	,366	-,064	-,690	,491
DEBT LEVEL	,155	,160	,111	,971	,333

a. Dependent Variable: STOCK RETURN

$$DL_{(t)} = \alpha + \beta_1 FS_{(t)} + \beta_2 GROW_{(t)} + \beta_3 TANG_{(t)} + \beta_4 LIQ_{(t)} + \beta_5 PROF_{(t)} + error$$

$$DL_{(t)} = 1,415 - 0,23 FS_{(t)} + 0,304 GROW_{(t)} - 0,302 TANG_{(t)} - 0,062 LIQ_{(t)} - 0,548 PROF_{(t)} + error$$

Multiple regression test shows the influence of an independent variable on the dependent variable. The condition for a hypothesis is considered significant when the significance level is less than 0.05 ( $\alpha = 5\%$ ). So that the results in this study are explained as follows:

**Table 4.3 Summary of Testing Results**

Hypothesis	Analysis
H1: Firm size positively and significantly affects debt level	Not Accepted
H2: Growth positively and significantly affects debt level	Accepted
H3: Tangibility negatively and significantly affects debt level	Accepted
H4: Liquidity negatively and significantly affects debt level	Accepted
H5: Profitability negatively and significantly affects debt level	Accepted
H6: Firm size positively and significantly affects stock return	Accepted
H7: Growth positively and significantly affects stock return	Not Accepted
H8: Tangibility positively and significantly affects stock return	Accepted
H9: Liquidity negatively and significantly affects stock return	Not Accepted
H10: Profitability positively and significantly affects stock return	Not Accepted
H11: Debt level positively and significantly affects stock return	Not Accepted
H12: Debt level mediates the relationship between firm size and stock return	Not Accepted
H13: Debt level mediates the relationship between growth and stock return	Not Accepted
H14: Debt level mediates the relationship between tangibility and stock return	Not Accepted
H15: Debt level mediates the relationship between liquidity and stock return	Not Accepted
H16: Debt level mediates the relationship between profitability and stock return	Not Accepted

Source: IBM SPSS 22.0 Analysis Result, 2021

#### 4.1 Effect of Firm Size on Debt Level (H1)

The results of the research for the first hypothesis state that Firm Size has a significant negative effect on Debt Level. The results of this study confirm the results of previous studies conducted by Kim et al. (2006) on companies in Korea, and found the firm size has a negative effect on the capital structure. In other words, companies that have a large market value indicate that the company is well managed by company management so that when the company needs funding for future projects, the company prefers to use internal sources of funding rather than external sources of funds, this is in accordance with the Pecking Order Theory. Therefore, companies that have large market values will reduce their intention to use external financing in the form of debt. Thus **H1 is rejected**, which states that Firm Size has a positive and significant effect on Debt Level.

#### 4.2 Effect of Growth on Debt Level (H2)

The results of the research for the second hypothesis state that growth has a significant positive effect on Debt Level. The results of this study are in line with previous research conducted by Chang et al., (2014) that growth has a positive effect on the capital structure studied in companies in China. Companies that are growing, will need a lot of funds to meet the company's funding needs. Funding can be obtained through external debt provided by creditors to the company. These results are consistent with research conducted by Viviani (2008). Thus **H2 is accepted**, which states that Growth has a positive and significant effect on Stock Return.

#### 4.3 The Effect of Tangibility on Debt Level (H3)

The results of the research for the third hypothesis state that Tangibility has a significant negative effect on Debt Level. The results of this study are consistent with previous research conducted by Sheikh & Wang (2011) on manufacturing companies listed on the Karachi Stock Exchange and found that Tangibility has a significant negative effect on the capital structure. A company that has high tangibility indicates that the company has a high fixed asset composition. Fixed assets are the company's own capital, with a large number of fixed assets, the company will have a high source of internal funding. So that the existence of high fixed assets will reduce the existence of external funding with debt. These results are consistent with the Pecking Order Theory that companies prefer to use internal sources of funds rather than external sources of funds. Thus **H3 is accepted**, which states that Tangibility has a positive and significant effect on Stock Return.

#### 4.4 Effect of Liquidity on Debt Level (H4)

The results of the research for the fourth hypothesis state that Liquidity has a significant negative effect on Debt Level. The results of this study are in accordance with previous research conducted by Alipour et al. (2015) and Haron (2016) that liquidity has a significant negative effect on the capital structure. This result is in line with the pecking order theory which states that companies prefer to use internal sources of funds rather than external sources of funds. Companies that have high liquidity will tend to have low levels of debt in their capital structure, because these companies have large internal sources of funds. This internal source of funds will first be used to finance investment. If internal funds are sufficient, the company will not need debt. Thus, the higher the liquidity of the company, the lower the use of debt in its capital structure. Thus **H4 is accepted**, which states that Liquidity has a negative and significant effect on Stock Return.

#### 4.5 Effect of Profitability on Debt Level (H5)

The results of the research for the fifth hypothesis state that Profitability has a significant negative effect on Debt Level. The results of this study are consistent with previous research conducted by Sheikh & Wang (2011) and Yang et al., (2010) that profitability has a negative and significant effect on capital structure. This means that companies that have high profitability will have more internal funds so that companies will prefer to use their internal funds first rather than using debt or issuing new shares for company funding needs. This statement is in accordance with the pecking order theory. Thus **H5 is accepted**, which states that Profitability has a positive and significant effect on Stock Return.

#### 4.6 Effect of Firm Size on Stock Return (H6)

The results of the research for the sixth hypothesis state that Firm Size has a significant positive effect on Stock Return. The results of this study confirm the results of previous studies conducted by Acheampong et al., (2014), Abdullah et al., (2015), Yang et al., (2010) and Chandra, T., et al (2019) that firm size has a significant positive effect on stock return. A company with a greater market value indicates that the company is mature and capable of diversifying risk. So that the company is considered to have a good level of security by investors and has the potential to generate large stock returns. So in other words, the greater the size of the company, the higher the potential for stock returns to the issuer. Thus **H6 is accepted**, which states that Firm Size has a positive and significant effect on Stock Return.

#### 4.7 The Effect of Growth on Stock Return (H7)

The results of the research for the seventh hypothesis state that Growth has a negative and insignificant effect on Stock Return. The results of this study are in line with previous studies conducted by Chandra, T. et al. (2019) who found that the negative effect was not significant between growth on stock returns. These results indicate that the growth rate of Indonesian companies has little effect on stock returns. When growth increases due to changes in the value of total assets, it means not from the level of profitability but from debt. Companies that have a high level of debt can increase the risk of the company which will decrease investor interest and potentially decrease stock returns but have little effect on market conditions in Indonesia. Thus **H7 is rejected**, which states that Growth has a positive and significant effect on Stock Return.

#### 4.8 The Effect of Tangibility on Stock Return (H8)

The results of the research for the eighth hypothesis state that Tangibility has a significant positive effect on Stock Return. The results of this study are in accordance with previous research conducted by Fama and MacBeth (1973) and Joni

& Lina (2010) that Tangibility has a positive and significant effect on Stock Return. The greater the tangibility of an asset, the greater the confidence of investors, because the company will have a greater ability to finance investment made by the company based on the assets owned by the company. So it has an impact on increasing investor confidence in company security which shows the potential for increasing stock returns. Thus **H8 is accepted**, which states that Tangibility has a positive and significant effect on Stock Return.

#### 4.9 Effect of Liquidity on Stock Return (H9)

The results of the research for the ninth hypothesis state that Liquidity has a positive and insignificant effect on Stock Return. The results of this study are in line with previous research conducted by Banarjee (2016) and Aga et al. (2013) stated that Liquidity has a positive and significant effect on Stock Return. The higher the Liquidity, the better the company's ability to fulfill its short-term obligations, this will increase the company's credibility and attract investors to invest so as to increase the company's stock return. However, because not all companies do the same, the effect is small or insignificant. Thus **H9 is rejected**, which states that Liquidity has a negative and significant effect on Stock Return.

#### 4.10 The Effect of Profitability on Stock Return (H10)

The results of the research for the tenth hypothesis state that Profitability has a negative and insignificant effect on Stock Return. The results of this study are in line with previous research conducted by Firmansyah (2018) which shows that profitability has a negative and insignificant effect on LQ45 stock returns from 2015 to 2016. With the similarity of the samples used, the researchers conclude that the profit level is not one of the factors that investors pay attention to in determining share returns. In addition, the condition of the capital market in Indonesia is considered less efficient in seeing the profitability factor compared to the NASDAQ stock exchange. According to research by Savitri & Haryanto (2012), it shows that companies with good or bad current profitability conditions have no impact on the attractiveness of investors to own these shares. Instead, investors are more likely to see the potential of the stock in the future to improve even though it is currently experiencing a loss. Thus **H10 is rejected**, which states that Profitability has a positive and significant effect on Stock Return.

#### 4.11 Effect of Debt Level on Stock Return (H11)

The results of the research for the eleventh hypothesis state that Profitability has a positive and insignificant effect on Stock Return. The results of this study are in line with previous research conducted by Khan et al., (2013), Yang et al., (2010) and Taghavi et al., (2015) that capital structure has a significant positive effect on stock returns. This means that the greater the debt used by the company, it tends to increase the risk of the company. Increased corporate risk will encourage shareholders to demand a higher risk premium. In addition, the company will be monitored by the bank as a debt funder so that management will seek to improve the company's performance in order to maintain the level of investor confidence in the company. As a result, the stock return is expected to increase. However, this result has little effect, because investors pay more attention to other factors in estimating Stock Return. Thus **H11 is rejected**, which states that the Debt Level has a positive and significant effect on Stock Return.

**Table 4.4 Sobel Test Results for Hypotheses 12-16**

Hypothesis	p-Value	Analysis
H12: Debt level mediates the relationship between firm size and stock return	0,99790031	rejected
H13: Debt level mediates the relationship between growth and stock return	0,47777689	rejected
H14: Debt level mediates the relationship between tangibility and stock return	0,73708732	rejected
H15: Debt level mediates the relationship between liquidity and stock return	0,35138436	rejected
H16: Debt level mediates the relationship between profitability and stock return	0,47777689	rejected

Based on the results of the calculation of the Sobel test in Table 4.4, it is obtained that the p-value is smaller than the t table with a significance level of 0.05, namely 1.97, it can be concluded that **H12-H16 is rejected**. In other words, Debt Level does not play a role in mediating the effect of the independent variables on Stock Return. These results explain that the independent variables have a higher direct effect on Stock Return than the indirect effect mediated by the Debt Level variable.

## 5. Conclusion

Based on the results of the study, the variables Firm Size, Growth, Tangibility, Liquidity, Profitability, and Debt Level have a very important influence on the Stock Return of the LQ45 Index companies in the Indonesian Stock Exchange so that managerial implications should be focused more on these variables. The managerial implications of these findings can be based on the theory that has been developed as follows:

- Firm Size is a variable that has a significant influence on Debt Level and Stock Return. Firm Size reflects the size of the company as measured by market value or market capitalizations. Where, a company that has a greater market value indicates that the company is mature and able to diversify risk. Thus, Investors can use Firm Size in estimating Debt Level and Stock Return.
- Growth is a variable that has a significant effect on Debt Level. Growth reflects how much changes in the total assets of a company. Where, companies that are growing will need more funds to invest which are obtained from debt. So, Investors can use Growth in estimating the Debt Level.
- Tangibility is a variable that has a significant influence on Debt Level and Stock Return. Tangibility reflects the composition of fixed assets owned by the company. Where, companies that have high fixed assets can increase investor confidence in company security. So, Investors can use Tangibility in estimating Debt Level and Stock Return.
- Liquidity is a variable that has a significant effect on Debt Level. Liquidity reflects how big the current ratio of a company is. Where, a company that has a high current ratio indicates the company's ability to pay off short-term debt and can use internal funds as funding for company investment. So, Investors can use Liquidity in estimating Debt Level.
- Profitability is a variable that has a significant effect on Debt Level. Profitability reflects how much net profit a company gets for selling the products / services it offers. Where, a company with high profit indicates that the company has a good performance. So, Investors can use Profitability in estimating Debt Level.
- Also, providing information to company management or investors that the Debt Level has no role in mediating the relationship between Firm Size, Growth, Tangibility, Liquidity and Profitability on Stock Return on non-banking stocks listed in LQ45.

## Recommendations

There are several recommendations that can be given so that further research can be more comprehensive. The following are some recommendations that can be given, namely:

- The research period is limited to 2014-2018. Therefore, further research can extend the observation period so that the number of research samples is also more and can improve the distribution of better data.
- The object examined in this study is the LQ45 index on the Indonesian stock exchange. Therefore, for further research, object selection should not only be on the LQ45 index, but can use other indexes such as the Kompas100 or IDX30 index.
- Future research is expected to use other dependent variables such as investment decisions from shareholders
- Future studies do not use research data whose figures are too extreme and too far from the average.

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## Appendix

### *Firm Size*

$$Firm\ Size = Ln(Share\ Price \times Number\ of\ Outstanding\ Shares) \quad (1)$$

### *Growth*

$$Growth = \%Change\ in\ Total\ Assets \quad (2)$$

### *Tangibility*

$$Tangibility = \frac{Total\ Fixed\ Assets}{Total\ Assets} \quad (3)$$

### *Liquidity*

$$Current\ Ratio = \frac{Current\ Assets}{Current\ Liabilities} \quad (4)$$

### *Profitability*

$$Profitability = \frac{Earning\ after\ Tax}{Total\ Assets} \quad (5)$$

### *Debt Level*

$$Debt\ Level = \frac{Total\ Debt}{Total\ Assets} \quad (6)$$

### *Stock Return*

$$Stock\ Returns = \frac{(Price_{t1} - Price_{t-1}) - dividend}{Price_{t-1}} \quad (7)$$