

# THE ROLE OF CAPITAL STRUCTURE IN STOCK RETURN MODELS IN PROPERTY AND REAL ESTATE COMPANIES

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## Abstract

The purpose of the study is to conduct analysis and answer the research gap that occurs among researchers and the phenomenon that occurs where leverage as one of the risk elements is not a matter of concern for capital market players, especially the Indonesia Stock Exchange. This type of research is quantitative with a multiple regression analysis method of panel data using the research object of property and real estate sector companies listed on the Indonesia Stock Exchange. By using the purposive sampling method, a cross section of twenty-five companies was obtained as observations in this study and with a time series for five years so that this study further formulates to maximize stock returns through Leverage as an intervening variable. There are two research models that are integrated into one and each goes through the stages of model selection testing, namely the Chow Test, the Hausman Test. The results of the first research model using endogenous capital structure variables, all exogenous macroeconomic variables, interest rates and the rupiah exchange rate against the US dollar cannot explain their influence on capital structure. However, the company's fundamental exogenous variables can all explain their influence significantly on capital structure. The results of the second research model using stock return as an endogenous variable are different from the first model, namely all exogenous macroeconomic variables can explain their influence on stock return, while exogenous variables other than liquidity and capital structure which are also intervening variables cannot explain their influence on stock return. These results are expected to help as a guideline for public companies to gain market appreciation which is proxied into stock return.

**Keywords:** Leverage, Stock Return, Current Ratio, Return on Asset, Commercial Property Price Index, Interest Rate, Exchange Rate.

## I. INTRODUCTION DAN LITERATURE REVIEW

The property sector as an instrument that is usually chosen by investors. Property and real estate are one of the investment alternatives that are currently in demand by investors because investment in this sector is a long-term investment that requires quite a large amount of capital. Therefore, the company must have a high capital structure. The success and achievements achieved by the property and real estate sector are certainly inseparable from the policies taken by company managers in terms of company funding. Decisions on funding can certainly come from own funding or what is called owner's but also from external capital obtained through debt financing. With the use of debt, it is hoped that the company can increase the company's income. Management policy in utilizing debt to fund company assets is called leverage. Leverage consists of two types, namely leverage ratio and financial leverage. This study only uses financial leverage which aims to provide an illustration that increasing leverage will increase the rate of return given to shareholders. In principle, financial leverage refers to the

understanding that the use of funding sources by a company has a fixed burden with the intention of increasing potential finances for shareholders.

In addition to capital structure, there are many other factors both internal and external. Internal factors are factors that are influenced by conditions within the company, such as the company's financial performance. While external factors are determined beyond the company's control, for example macroeconomic variables. Macroeconomic variables have a direct or indirect influence on the increase or decrease in the company's financial performance. When there is a change in macroeconomic variables, investors will analyze the impact that will occur from the positive and negative sides on the company's financial performance for the next few years so that investors can make decisions to buy or sell shares (Mahmud, 2017).

One sector that investors should consider when investing is the property or real estate sector. The property and real estate sector is the largest issuer listed on the Indonesia Stock Exchange (IDX) with a total of 62 issuers as of December 30, 2021. Property and real estate are one of the business sectors that provide products in the form of housing and the like. This sector has quite a large business growth potential because this product is one of the primary needs of the community. In addition, the property and real estate sector is considered more stable and safe for long-term investment.

The Covid-19 pandemic has had a less favorable impact on the property and real estate sector. Throughout 2021, the performance of the property and real estate industry experienced positive growth of 2.32 percent. Although it still shows positive performance and is better than several other industrial sectors that experienced negative performance, the growth of the property and real estate industry in 2021 is still smaller than the growth of the real estate industry in 2019 and previously. Entering 2021, amidst the ongoing pandemic, the financial performance of the property and real estate sector, which was under pressure in mid-2021, has slowly begun to improve, as seen from the improvement in the financial performance of several property issuers that have released their financial reports for the second quarter of 2021. Demand for commercial property has also experienced uncertain fluctuations that tend to be sluggish. In 2017, the property demand index decreased again by 0.96% to 0.56% and in 2018 the property demand index increased again by 0.61%, but in 2019 the commercial property demand index decreased again by 0.65% to 0.52%.

Fluctuations in property and real estate stock prices are largely determined by changes that occur in both external and internal company factors. External factors can be industry-specific or macroeconomic variables. One industry-specific factor is the Commercial Property Price Index (IHPK). According to BPS (2017), IHPK is one of the economic indicators that provides information on price developments in the commercial property sector. The index can also be used as an indicator in calculating asset price inflation in Indonesia which can be used by prospective investors as a reference in considering investing their funds in the property and real estate sector.

IHPK is influenced by many factors, one of which is the interest rate or BI rate. When the BI rate increases, IHPK decreases, this is because the interest received by prospective property or

real estate consumers in making credit purchases becomes high so that prospective consumers are reluctant to buy property or real estate units which results in a decrease in IHPK. Conversely, if the BI rate decreases, IHPK increases. This is because the interest received by prospective property or real estate consumers in making credit purchases becomes low so that prospective consumers are interested in buying property or real estate units so that IHPK increases. By looking at the up and down position of the CPI, investors can assume that it is an average value that represents property and real estate prices. In other words, if you want to see the condition of the property and real estate market in Indonesia, the CPI is a reliable reference.

Several studies related to capital structure determinants still have empirical findings that tend to be inconsistent or different between one researcher and another. Hendri (2018) and Shambor (2017) found that profitability has a significant negative effect on debt policy. Research by Baker and Wurgler (2002), Rajan and Zingales (1995), and Titman and Wessels (1988) also proves a negative relationship between leverage and profitability. These results contradict the results of research by Wardita et al. (2019) and Saleem et al. (2013) which state that profitability has a significant positive effect on debt policy. This finding is supported by the traditional trade-off model of capital structure predicting a positive relationship between leverage and profitability, the empirical regularity of the inverse relationship is often seen as a very strong indictment of the trade-off model (e.g., Fama and French, 2002, Myers, 1993, Shyam-Sunder and Myers, 1999). Other results actually state that profitability has no effect on debt policy such as the results of Ramadhani & Barus (2018) and Viriya & Suryaningsih (2017) studies. Recently, studies that include adjustment costs (e.g., Leary and Roberts, 2005, Strebulaev, 2007) show that the inverse relationship between leverage and profitability can be consistent with a dynamic trade-off model. However, direct evidence predicting a positive relationship between leverage and profitability is still scarce.

The research results of Christi & Titik (2015) and Gomez et.al. (2017) stated that company size has a significant negative effect on debt policy, in contrast to the research results of Wardita et.al. (2019), and Shambor (2017) which found that company size has a significant positive effect on debt policy. Meanwhile, the research results of Damayanti & Hartini (2014) and Lumapow (2018) found that company size had no effect on debt policy.

Research conducted by Ramadhani & Barus (2018), Hendri (2018) and Shambor (2017) concluded that liquidity has a significant negative effect on debt policy. The opposite result was found by Sabir and Malik (2012) and Purwanti (2017) which stated that liquidity has a significant positive effect on debt policy. Research by Titman (1998), Deesomsak (2004), Abor (2008), Song (2005), Delcoure (2006), Mas'ud (2008), Karadeniz et al (2009), Eriotis (2009), Sheik and Wang (2011), and Yartey (2011) also provided inconsistent empirical findings between profitability variables, company size, growth, asset structure, and non-debt tax shields, on the company's capital structure.

Previous studies that tested the determinants of stock returns also provided different empirical evidence, both from macroeconomic factors and internal company factors. In this case, researchers suspect that macroeconomic factors such as interest rates, exchange rates and internal company factors such as profitability, solvency and liquidity can affect stock returns.

Investors need to know what factors can affect stock returns, so they can invest in the right company and make a profit from the investment activity. Conversely, if investors do not pay attention to the factors that affect stock returns, it will result in losses in investing.

Research on stock returns is increasingly being conducted by other researchers, for example (Afiyati, 2018; Dinova (2019), Endri et al. (2019), Nofitasari (2021), Nugroho (2021) Saraswati (2021), Taunay (2021). However, this study has several differences from previous studies. First, this study is a combination of internal company factors with macroeconomic factors. Previous studies only conducted tests through internal factors or macroeconomic factors. Second, this study uses a new variable that has never been used to test the effect on stock returns by previous studies, namely the Commercial Property Price Index (IHPK).

Based on the literature review, previous studies investigating the effect of IHPK on stock returns in Indonesia have not been found, except using other proxies, including property prices and residential property price indexes. Rahman et al. (2021) examined the interdependence between house prices and stock prices in seven countries, namely: Indonesia, Malaysia, the Philippines, Singapore, Thailand (ASEAN-5), Korea, and Hong Kong. Empirical findings prove that there is a positive effect of house prices on stock prices except Korea which shows a negative relationship. Further research results also reveal that the stock market is integrated with the real estate market in all selected countries except Korea. Furthermore, the positive effect of house prices on stock prices supports the wealth effect hypothesis which suggests that house prices have a positive contribution to stock price increases. Abul (2019) found a long-run and short-run relationship between Kuwaiti stock prices and multi-apartment building prices only, while no evidence of such a relationship was found for residential real estate prices (land and houses). Gokmenoglu and Hesami's (2021) study found a long-run relationship between real estate prices and stock prices and the implication is that there is no diversification benefit from allocating stock and real estate assets in a portfolio.

Related to the exchange rate which is also a macroeconomic variable also has an impact on the property and real estate market, especially on its shares. In the context of leverage and company stock prices, the exchange rate is a systematic risk factor that cannot be avoided. The relationship between the exchange rate and house prices has been analyzed by several previous studies, including; Thomas and Lee (2006), Yang and Zhiqiang (2012) and Sumer and Özorhon (2021) with a focus on the one-way impact of the exchange rate on house prices and without treating the exchange rate as a determinant or determinant of the causal relationship between the exchange rate and housing prices. Liu and Mei's (1998) study revealed that currency risk can predict property stock performance. Jack et al. (2019) found that real estate prices are cointegrated with the exchange rate. The long-term equilibrium is stable and significant. The exchange rate does not cause changes in real estate prices in either the short or long term.

Much literature on corporate governance begins with the relationship between the principal and agent which then gives rise to agency problems. Agency problems are generally influenced by "ownership structure". When ownership is dispersed as in the US and UK, agency problems arise from conflicts of interest between managers and shareholders (Jensen and Meckling 1976): Separating the problem of "Ownership and Control". The separation of ownership and

control carried out by managers can lead to selfish actions by managers. When there is a conflict between management and shareholders, the value of the company is not maximized where there is a difference between the theoretical maximum value and the actual value of the company because of agency costs (Palliam and Shalhoub, 2003) Jensen and Meckling argue that concentration of ownership has a positive impact on company value because concentrated ownership will minimize the agency cost.

According to agency theory, Jensen and Meckling (1976) define agency costs as the sum of costs incurred in connection with structuring, administering and enforcing contracts (both formal and informal). Plus residual loss. Enforcement costs include monitoring and bonding costs (formation/binding of existing relationships), namely a number of resources spent by the principal (shareholders who own the company) and agent (manager) to ensure the implementation of contract enforcement. Residual costs include opportunity loss (lost opportunities) when the contract has been optimized but not implemented perfectly. So it can be said that agency costs include all costs that refer to contracting costs, and information costs.

Some agency costs can be reduced by control procedures. Fama and Jensen (1983) analyzed how to control agency costs by applying restrictions on residual claims, for example by limiting ownership to one or more main decision-making agents. This restriction is intended to ensure that decisions made by agents provide welfare effects so that they can reduce agency costs due to outside ownership of residual claims.

Fama and Jensen (1983) stated that agency problems are controlled by a separate decision-making system between management (initiation and implementation) and supervisors (ratification and monitoring) of important decisions at all levels of the organization. Separation is said to be effective if no manager has the right to control decisions where management has the right to manage them. When the concentration of ownership increases to the level where the owner gains effective control of the company, the nature of the agency problem shifts from a conflict between managers and shareholders to a conflict between shareholders who have control and shareholders who have control and minority shareholders (Shleifer and Vishny, 1997).

The development of agency theory leads to compensation, namely the existence of incentive policies between top management and company employees. A smaller scale is the company scale. The company aligns the interests of the principal and the agent. The company owner can provide appropriate compensation for both managers and employees of the company, so that agents can carry out their work and responsibilities in accordance with the interests of the principal. Several researchers who discuss compensation policy packages, namely incentives for top managers vs. company employees are: Bhagat, Brickley and Lease (1985), Conte and Kruse (1991) and Kohn (1993), Wardhani (2008). The development of agency theory also leads to companies. Several researchers on this issue are: Murphy (1985), Jensen and Murphy (1990), De Jong and Van Dijk (1999) and Herawaty (2008).

The growing theoretical argument that the debt-equity ratio is related to agency costs. The current literature tries to link the choice of debt and capital with agency problems. There are

four predictions about this. First, leverage worsens the agency conflict between bondholders and shareholders. If debt increases in the company's capital structure, the business risk and creditor operations increase. However, decisions and operations remain with managers and shareholders. It could happen that funds from bond issuance are not used for investment in expansion projects with positive Net Present Value, but are used for dividend payments, so that the company fails to pay debts to creditors. However, creditors cannot demand more because the limited liability of shareholders is only as much as the capital that shareholders contribute as company capital. Research concerning this problem has been conducted by Kalay (1982).

Second, managers and shareholders convince creditors that they will seek safe investments in order to receive low interest rates. Furthermore, they expand their investments in high-risk projects because they will also provide high returns. If the project is successful, the debt is paid in full and the remaining returns will be fully the shareholders' rights. However, if it is not successful, the debt cannot be paid or the shareholders are declared in default. Finally, the creditors suffer losses because if the investment is successful, they will only receive a fixed return (interest). Conversely, if the investment loses, the creditors will also bear the same amount of loss as the shareholders. For this reason, Smith and Warner (1979) studied that it is necessary to implement contractual protection agreements between bondholders and stockholders/managers which are commonly called "Bond Covenants". Third, leverage reduces agency problems that arise from management attitudes that conflict with the wishes of shareholders. Fourth, the relative amount of debt (leverage) creates agency costs with stakeholders such as consumers and employees.

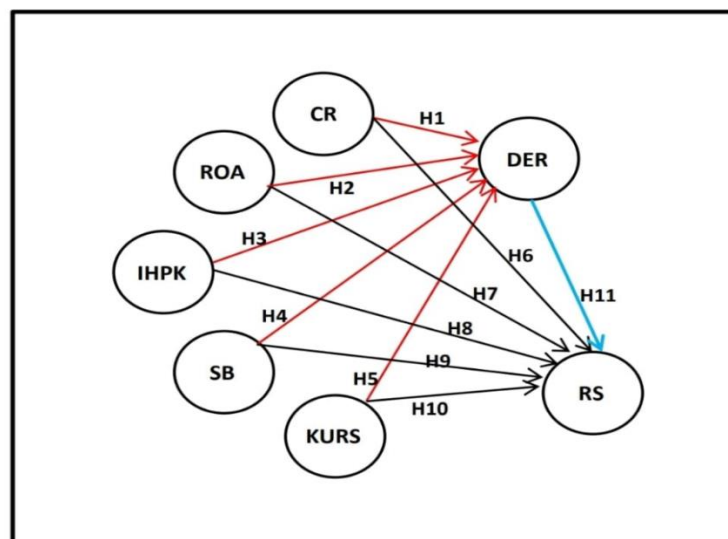
Jensen and Meckling (1986) abbreviated as JM put forward the agency theory and at the same time integrated it with the property rights theory and the development of the company ownership structure theory. The agency theory describes the relationship between the separation of ownership and control of the company. JM describes the conflict between principals and agents which can be categorized into three things, namely the conflict between shareholders (principals) and agents (board of directors), the conflict between bondholders and agents (board of directors and company owners) and the conflict between producers and consumers. In the JM paper, it is stated that agency costs are the result of the sum of (i) monitoring expenses by the owner; (ii) expenses in the context of binding by agents and (iii) other costs related to company control.

According to the agency capital structure theory, there are two possible responses to personal manager incentives. First, similar to the pecking order theory, if the company's shares are fully owned by managers and entrepreneurs (for example in small companies) then the company prefers internal funding sources to external funding sources because the costs of personal incentives are internalized. If the company needs external funding, then debt is preferred over equity because the costs of personal incentives are still internalized. However, if the amount of debt is too large so that it increases the risk of bankruptcy, then the company will turn to external equity. Second, for large companies, the problem is how to reduce the incentive of managers to invest company cash in projects that have returns below the cost of capital. In this case, debt financing can overcome this problem.

Jensen (1986) stated that free cash flow, which is cash flow in excess of the need to finance all projects that have a positive net present value (i.e. discounted at the relevant cost of capital), is used to finance projects that reduce the value of the company. This happens because managers have personal incentives to increase company assets rather than distribute them to shareholders. Therefore, according to agency theory, capital structure decisions are a response to personal incentives of managers.

## II. HYPOTHESIS

- H1: There is an influence of Liquidity Current Ratio (CR) on Capital Structure (DER)
- H2: There is an influence of Profitability Return on Assets (ROA) on Capital Structure (DER)
- H3: There is an influence of the Commercial Property Price Index (IHPK) Capital Structure (DER)
- H4: There is an influence of Interest Rates (SB) on Capital Structure (DER)
- H5: There is an influence of the Exchange Rate (KURS) on Capital Structure (DER)
- H6: There is an influence of Liquidity Current Ratio (CR) on Stock Returns (RS)
- H7: There is an influence of Profitability Return on Assets (ROA) on Stock Returns (RS)
- H8: There is an influence of the Commercial Property Price Index (IHPK) on Stock Returns (RS)
- H9: There is an influence of interest rates on stock returns (RS)
- H10: There is an influence of the Exchange Rate on Stock Returns (RS)
- H11: There is an influence of Capital Structure (DER) on Stock Returns (RS)



**Figure 1: Research Framework**

### III. RESEARCH METHODS

This study uses a quantitative descriptive approach with the analysis method used is multiple linear regression of panel data using a combination of five-year time series data or the period 2017 - 2021 or 5 years and a cross section of 25 selected companies as research samples. This study uses the objects of property and real estate companies listed on the Indonesia Stock Exchange with a population of all companies listed in the property and real estate sector.

#### Operational Variables:

**Table 1: Operational Variables**

No	Variables	Notation	Formulas
1	Current Ratio	CR <sub>it</sub>	$\frac{\text{Current Assets}_{it}}{\text{Current Liability}_{it}}$
2	Return on Asset	ROA <sub>it</sub>	$\frac{\text{Earnings After Tax}}{\text{Total Assets}}$
3	Commercial Property Price Index	IHPK <sub>it</sub>	IHPK = Ln(IHPK)
4	Interest Rate	SB <sub>it</sub>	Bank Indonesia Reference Interest Rate
5	Exchange Rate	KURS <sub>it</sub>	$\frac{\text{Kurs}_{it} + \text{Kurs}_{i(t-1)}}{\text{Kurs}_{i(t-1)}}$
6	Leverage	DER <sub>it</sub>	$\frac{\text{Debt}}{\text{Equity}}$
7	Stock Return	RS <sub>it</sub>	$\frac{P_{it} + P_{i(t-1)}}{P_{i(t-1)}}$

#### Panel Data Multiple Regression Estimation

In conducting panel data multiple regression estimation, the availability of a combination of time series data and cross-section data is first ensured.

The approach that can be taken in conducting the analysis between time series data and cross-section data can use the following analysis:

1. Common Effect Model (CEM)
2. Fixed Effect Model (FEM)
3. Random Effect Model (REM)

#### Model Selection Test

After the three basic analyses above are used, then you can run three further model suitability testing procedures to select the best panel data multiple regression model as follows:

##### *Chow Test*

F-statistic as a standard used to determine the choice between the Common Effect model or the Fixed Effect model. Acceptance or rejection of the hypothesis is based on the level of  $\alpha = 5\%$  on the null hypothesis ( $H_0$ ) and alternative hypothesis ( $H_a$ ). Each of the two models above will technically compare the calculation of the F-statistic with the F-table.

The results of the F count < from the F table will reject the null hypothesis (H0) and vice versa will accept the alternative hypothesis (Ha). Thus the appropriate model to be used is the Fixed Effect Model, the decision will be taken otherwise if the results will be different.

Test Criteria:

F count < F table H0 rejected

F count > F table H0 accepted

### ***Hausman Test***

The Hausman test will determine the choice of Fixed Effect Model or Random Effect Model. The use of the Chi-Square statistical distribution with a degree of freedom of k as the number of exogenous variables as the basis for testing.

The results will accept the null hypothesis (H0) and reject the alternative hypothesis (Ha) for the next model will be said to be fit and use the Random Effect Model, but on the contrary will use the Fixed Effect Model if the statistical hypothesis rejects the null hypothesis (H0) and accepts the alternative hypothesis (Ha).

### ***Uji Lagrange Multiplier (LM)***

Determining the fit model in Lagrange Multiplier (LM) through the selection process between the Common Effect Model or Random Effect Model. The basis of the test uses the Chi-Squares distribution with a degree of freedom equal to the number of exogenous variables.

If the result of the LM statistic value is greater than the critical value of the Chi-Squares statistic, it will reject the null hypothesis (H0) and accept the alternative hypothesis (Ha), so it means that the fit estimate to use is the Random Effect Model. Conversely, if the LM statistic value is smaller than the critical value of the Chi-Squares statistic, it will accept the null hypothesis (H0) and reject the alternative hypothesis (Ha), this means that the use of the Common Effect Model is more appropriate.

### **Panel Data Regression Model**

Structural Equation of Research Model I

$$DER_{it} = \alpha + \beta_1 CR_{it} + \beta_2 ROA_{it} + \beta_3 IHPK_{it} + \beta_4 SB_{it} + \beta_5 KURS_{it} + \varepsilon_{it} \dots\dots\dots (1)$$

i = 1,2,....., N ; t = 1,2,.....T

Structural Equation of Research Model II,

$$RS_{it} = \alpha + \beta_1 DER_{it} + \beta_2 CR_{it} + \beta_3 ROA_{it} + \beta_4 IHPK_{it} + \beta_5 SB_{it} + \beta_6 KURS_{it} + \varepsilon_{it} \dots\dots\dots (2)$$

i = 1,2,....., N ; t = 1,2,.....,T

Where:

DER	=	Leverage		$\varepsilon$	=	Error component
CR	=	Current Ratio		$\beta$	=	Slope
ROA	=	Return On Assets		$\alpha$	=	Intercept
IHPK	=	Commercial Property Price Index		N	=	Number of Observations
SB	=	Interest Rate		T	=	Lots of time
KURS	=	Exchange Rate		NxT	=	Number of Panel Data
RS	=	Stock Return				

## IV. RESEARCH RESULTS AND DISCUSSION

### A. Results

#### Descriptive Statistics

**Table 2: Descriptive Statistics**

	CR	DER	IHPK	KURS	ROA	RS	SB
Mean	2.768915	0.723602	5.047651	9.524356	0.068929	6.452889	0.057625
Median	2.076094	0.573841	5.150803	9.502411	0.045472	6.298725	0.056250
Maximum	11.39856	3.700960	5.160204	9.564262	0.890606	10.22632	0.075208
Minimum	0.617644	0.065768	4.624777	9.496074	0.000307	3.912023	0.045625
Std. Dev.	2.054408	0.609159	0.212394	0.030000	0.097759	1.481235	0.010084
Skewness	1.577902	2.006682	-1.498891	0.408099	5.607267	0.522567	0.678505
Kurtosis	5.576183	8.840294	3.248540	1.213647	45.26793	2.673165	2.326958
Jarque-Bera	79.52160	240.6190	43.35726	18.48259	9163.312	5.745817	10.99429
Probability	0.000000	0.000000	0.000000	0.000097	0.000000	0.056534	0.004098
Sum	318.4253	83.21422	580.4799	1095.301	7.926807	742.0822	6.626875
Sum Sq. Dev.	481.1474	42.30247	5.142674	0.102603	1.089469	250.1225	0.011593
Observations	115	115	115	115	115	115	115

Sumber: Data diolah

#### Leverage and Stock Return as Endogenous Variables in the Suitability Testing of Research Models 1 & 2.

**Table 3: Chow Test**

Research Model 1 Common Effect Vs Fixed Effect Endogenous Variable: DER				Research Model 2 Common Effect Vs Fixed Effect Endogenous Variable: Stock Return			
Effects Test	Statistic	d.f.	Prob.	Effects Test	Statistic	d.f.	Prob.
Cross-section F	5.063637	(22.87)	0.0000	Cross-section F	198.078320	(22.86)	0.0000
Cross-section Chi-square	94.803371	22	0.0000	Cross-section Chi-square	453.663561	22	0.0000

Source: Processed data

The test results of the Chow-test in Research Model 1 and Research Model 2 that in the F-test statistic with the chi-square test produced a statistical hypothesis: rejecting the null hypothesis (H0) and accepting the alternative hypothesis (Ha) at the level of  $\alpha = 5\%$ . This can be

interpreted that the Fixed Effect Model is better to use than the Common Effect Model. (Table-3)

**Table 4: Hausman Test**

<b>Research Model 1</b> Fixed Effect Vs Random Effect Endogenous Variable: DER				<b>Research Model 2</b> Fixed Effect Vs Random Effect Endogenous Variable: Stock Return			
Test Summary	Chi-Sq. Statistic	Chi-Sq. d.f.	Prob.	Test Summary	Chi-Sq. Statistic	Chi-Sq. d.f.	Prob.
Cross-section random	58.427525	5	0.0000	Cross-section random	92.009799	6	0.0000

Source: Processed data

The same result is also in the Hausman-test in Research Model 2, namely the F-test statistic with the chi-square test produces a statistical hypothesis: rejecting the null hypothesis ( $H_0$ ) and accepting the alternative hypothesis ( $H_a$ ) at the level of  $\alpha = 5\%$ . This means that the test results show that the use of the Fixed Effect Model is better than the Random Effect Model. (Table-4).

**Table 5: Endogenous Variable: DER**

Total pool (balanced) observations: 115

Variable	Coefficient	Std. Error	t-Statistic	Prob.
C	0.320518	1.723034	0.186020	0.8541
CR	-0.008485	0.001976	-4.295260	0.0003
ROA	-0.527656	0.127399	-4.141752	0.0004
IHPK	0.054770	0.019961	2.743834	0.0119
SB	1.351655	0.664523	2.034024	0.0542
KURS	0.011403	0.178846	0.063756	0.9497
Adjusted R-squared	0.987643			
F-statistic	338.5096; Prob(F-statistic): 0.000000			

Source: Processed data

**Table 6: Endogenous Variable: SR**

Total pool (balanced) observations: 115

Variable	Coefficient	Std. Error	t-Statistic	Prob.
C	22.80458	0.891834	25.57044	0.0000
CR	-0.028594	0.015569	-1.836639	0.1401
ROA	-1.136983	0.217841	-5.219320	0.0064
IHPK	-0.031518	0.008145	-3.869767	0.0180
SB	1.712981	0.229303	7.470381	0.0017
KURS	-1.694019	0.101130	-16.75089	0.0001
DER	0.000931	0.026810	0.034738	0.9740
Adjusted R-squared	0.978011			
F-statistic	182.0864; Prob(F-statistic): 0.000000			

Source: Processed data

- 1: Current Ratio Liquidity has a significant effect on Capital Structure with a negative correlation (Table 5).
- 2: Return on Asset Profitability has a significant effect and is negatively correlated to Capital Structure (Table 5).
- 3: Commercial Property Price Index has a significant effect and is positively correlated to Capital Structure (Table 5).
- 4: Interest Rate Level has an insignificant effect on Capital Structure (Table 5).
- 5: Exchange Rate has an insignificant effect on Capital Structure (Table 5).
- 6: Current Ratio Liquidity has an insignificant effect on Stock Return (Table 6).
- 7: Return on Asset Profitability has a significant effect and is negatively correlated to Stock Return (Table 6).
- 8: Commercial Property Price Index has a significant effect with a negative correlation to Stock Return (Table 6).
- 9: Interest Rate has a significant effect and is positively correlated to Stock Return (Table 6).
- 10: Exchange Rate has a significant effect with a negative correlation to Stock Return (Table 6).
- 11: Capital structure has no significant effect on stock returns (Table 6)

## **B. Discussion**

The results of the study using endogenous variables of capital structure or in the first research model, that macroeconomic and monetary variables that use the rupiah exchange rate against the US dollar and interest rates are unable to explain their influence on the capital structure of property and real estate companies.

In the results of this study, only fundamental corporate variables can explain it. Another thing is that the exogenous variable ROA profitability is the dominant variable among the variables used in the first research model.

In the second research model, it is the opposite of the first model, that macroeconomic and monetary variables that use the rupiah exchange rate against the US dollar and interest rates are able to explain it to the market in this case is stock return and also as the dominant variable that is able to explain it. As for the fundamental corporate variables other than liquidity current ratio, all of them can explain their impact on the market.

The use of intervening variables of capital structure in the results of the study did not function to mediate the influence of exogenous variables on the endogenous variable stock return. Thus, market reaction does not depend on the existence of capital structure in property and real estate companies.

## V. CONCLUSION

**Findings:** The results of this study conclude that Capital Structure in which there is an element of risk has an insignificant effect on stock returns, which means that market reactions do not depend on it, but rather through direct effects between macroeconomic and monetary variables and fundamental corporate variables other than current ratio liquidity. In addition, macroeconomic and monetary variables are dominant or very sensitive variables than fundamental corporate variables. This is also a suggestion for further researchers and especially for corporate management authorities regarding the importance of macroeconomic and monetary variables as key variables by capital market players in the property and real estate sectors listed on the Indonesia Stock Exchange.

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