



The Influence of Profitability, Leverage, and Liquidity on Dividend Policy in the Infrastructure Sector 2022- 2024

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ABSTRACT

The purpose of this study is to evaluate various variables that can influence dividend policy. Several independent variables studied include profitability, leverage, and liquidity. In this study, dividend policy is used as the dependent variable. Furthermore, the subjects of this study were infrastructure companies listed on the Indonesia Stock Exchange during 2022–2024. This quantitative study employed a purposive sampling method. A total of 87 data sets were selected from 29 companies that met the sample criteria. This study collected data through literature review and internet access. The data analysis used multiple regression analysis. E-views 12 is the statistical processing tool used. This study found that profitability and leverage do not significantly influence dividend policy. Conversely, liquidity has a significant positive effect on dividend policy.

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INTRODUCTION

According to Mulyawan (2017), dividend policy is a policy of a company to distribute its profits to shareholders in the form of dividends or to retain them as retained earnings, which are then reinvested in the future. According to Sudana (2009), the amount of dividends distributed will affect the amount of retained earnings. Retained earnings are one of the company's internal sources of funds.

According to Rodoni and Ali (2010), the main objective of a company is to maximize the welfare of its shareholders. Managers strive to achieve this through investment decisions, financing decisions, and dividend policy. Dividend policy determines the portion of profits that will be retained as retained earnings and the portion that will be distributed as dividends (Husnan, 2018:319). Both the company and its shareholders are highly dependent on dividend policy. The company's Dividend Payout Ratio (DPR) reflects its dividend policy.

The Dividend Payout Ratio (DPR) is the percentage of a company's profit that is paid to shareholders as cash dividends (Harjito, 2017:35). The higher the DPR set by the company, the greater the portion of profits distributed to shareholders.

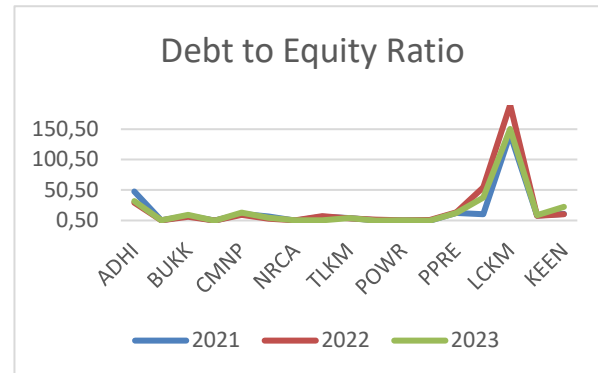
The company's profits paid as dividends represent the Dividend Payout Ratio (DPR). The higher the DPR, the smaller the retained earnings, which may hinder the company's growth rate. Conversely, the greater the retained earnings, the smaller the DPR, which may create a negative impression among shareholders.

Table 1 Average Dividend Payout Ratio (DPR) of Manufacturing Companies for the 2022-2024 Period

Company Code	Dividend Payout Ratio		
	2022	2023	2024
ADHI	47.90	29.72	32.15
BALI	0.57	0.84	0.54
BUCK	8.22	6.60	9.68
CASS	0.38	0.34	0.16
CMNP	11.16	9.88	13.46
JSMR	7.06	3.35	4.79
NRCA	0.48	1.02	0.85
TBIG	6.46	7.62	0.87
TLKM	4.66	4.2	4.62
TOTAL	0.93	1.97	0.53
POWR	0.93	0.97	0.94
PBSA	0.52	1.24	0.18
PPRE	12.9	14.05	13
WEGE	11.02	54.98	38.31
LCKM	142.35	1904.17	1509.13
GHON	8.6	8.33	9.41
KEEN	11.14	10.95	23.11

Source: Data Processed by Researchers, 2025.

Figure 1.1 Dividend Policy Phenomenon in the infrastructure sector in Indonesia for the period 2022 – 2024.



Based on the graph, several companies with the codes ADHI, BALI, BUKK, CASS, CMNP, JSMR, NRCA, TBIG, TLKM, TOTL, POWR, PBSA, PPRE, WEGE, LCKM, GHON, and KEEN show fluctuations in dividend distribution among shareholders. Many factors influence dividend distribution in infrastructure companies. According to Riyanto (1995:267), several factors affect dividend policy, including the company's liquidity position, the need for funds to pay debts, the company's growth rate, and corporate control. In this study, profitability, leverage, and liquidity are used as factors influencing dividend policy.

The size of the Dividend Payout Ratio (DPR) depends on each company's dividend policy. In general, many variables influence the determination of dividend policy. According to Ni Putu (2019), several factors that affect dividend policy include the company's profitability, current ratio, and debt-to-equity ratio.

Kasmir (2017:196) states that profitability ratios are used to assess a company's ability to generate profits. Profitability ratios, also known as profit ratios, are used to measure the efficiency of a company's asset utilization or its ability to generate profits over a certain period of time. Thus, it can be concluded that a company's ability to operate efficiently can be reflected through its profitability. The level of dividend payments is influenced by the company's ability to generate profits. The greater the profit earned by the company, the higher the likelihood that the company will fulfill its obligation to pay dividends.

Leverage describes the amount of debt used to finance a company's investments (Sartono, 2001:120). Excessive use of debt in company operations has a negative impact because the company must make debt repayment, which reduces the profits earned. The decrease in company income will, in turn, reduce dividend distributions to shareholders. The company's asset growth can be observed from year to year, reflecting its overall development. According to Brigham (2011:211), a company's growth affects its dividend policy, as rapidly growing companies tend to allocate more funds for investment, thereby reducing dividend payments to shareholders. The Debt to Equity Ratio (DER) is a ratio that indicates the extent to which a company is financed by debt; the higher this ratio, the worse the company's financial condition (Sartono, 2017).

consequently, the company's ability to meet all its obligations improves as the DER decreases. Excessive use of debt can endanger a company because it places the firm in a high-leverage position, making it difficult to escape from heavy debt burdens. When the DER decreases, the company's profits and the dividends paid to shareholders tend to increase.

Before making a decision regarding the amount of dividends to be distributed to shareholders, an important factor that must be considered is the company's liquidity. As stated by Sutrisno (2017:5), a company's ability to pay dividends is closely related to the strength of its cash position. Investors' confidence in receiving cash dividends increases when the company's cash position is strong. Dividend distribution is based on the belief that the company's liquidity is stable, that it is not making investments that could reduce cash holdings, and that it has no outstanding debts or has fulfilled its short-term obligations. Liquidity can be measured using the current ratio, which compares current assets to current liabilities and indicates the company's ability to meet its short-term debt obligations. A high current ratio provides strong assurance to short-term creditors, as it demonstrates that the company can settle its short-term financial liabilities, which in turn may result in higher dividends to shareholders payments.

Formulation of the problem

1. Does profitability affect dividend policy in infrastructure sector companies listed on the Indonesia Stock Exchange during the period 2022–2024?
2. Does leverage affect dividend policy in infrastructure sector companies listed on the Indonesia Stock Exchange during the period 2022–2024?
3. Does liquidity affect dividend policy in infrastructure sector companies listed on the Indonesia Stock Exchange during the period 2022–2024?

LITERATURE REVIEW AND RESEARCH HYPOTHESIS

Agency Theory

Agency theory is a theory that explains the relationship between the principal and the agent. It is a concept that describes the relationship between a contract giver (the principal) and a contract receiver (the agent), in which the principal hires the agent to work in the principal's interests and to achieve the principal's objectives. The principal delegates authority to the agent to make decisions in order to accomplish those objectives (Supriyono, 2018).

This theory explains that there are two parties involved, namely the owner as the principal and the management as the agent, who are interconnected to exchange information between parties in a transparent and accountable manner. Such transparency enables both parties to understand the company's direction and development in real time without concealment, thereby facilitating the decision-making process (Kimmerling & Moore, 1997).

Jensen and Meckling (1976) developed the agency theory, which defines an agency relationship as a contract or agreement in which one or more

persons (the principals) engage another person (the agent) to perform services on their behalf in the conduct of the firm's activities, granting the agent authority to manage those activities.

Dividend Policy

Dividend policy is a policy or decision regarding whether the profits earned by a company will be distributed to shareholders as dividends or retained as retained earnings to finance future investments (Sartono, 2000). According to Sudarsi (2000), dividend policy refers to the policy related to a company's dividend payments, including the determination of the amount of dividends to be distributed and the portion of earnings to be retained for the company's interests.

According to Sutrisno (2009:266), dividend policy is the decision regarding whether a company's profits during a certain period will be distributed entirely or partially as dividends, and whether the remainder will be retained as retained earnings. If a company chooses to distribute its profits as dividends, it reduces the amount of retained earnings, which in turn decreases the internal funds available for the company's development. Conversely, if the company decides not to distribute its profits as dividends, the internal funds will increase, allowing the company to expand more effectively in the future. One of the key issues in dividend policy is how the rights of shareholders are exercised. Profits can either be distributed as dividends or retained for reinvestment (Husnan & Enny, 2012:297).

Profitability

Profitability is a company's ability to earn profits in relation to sales, total assets, and shareholders' equity (Sartono, 2000). Therefore, long-term investors are highly interested in analyzing a company's profitability. Profitability indicates a company's capability to generate earnings from the assets it employs. Profitability analysis provides supporting evidence regarding a company's ability to generate profits and the extent to which its management operates effectively (Smith and Skousen, 1992).

According to Riyanto, profitability is the company's ability to generate profits or earnings within a certain period. A company that is able to generate good profits indicates strong company performance. Profitability is often used as a key measure for evaluating a company's performance.

Leverage

Leverage is a company's ability to meet its financial obligations, both in the short and long terms. A higher leverage ratio indicates that the company has more financial obligations to fulfill (Wiagustini, 2010:76). Conversely, a lower leverage ratio shows that the company is able to finance its operational and investment needs using its own capital. The amount of debt that must be repaid reduces the company's profits, which consequently affects dividend distribution. The higher the level of debt, the lower the dividends that will be distributed.

According to Rozef (1982) in Suharli and Oktorina (2005), companies with high operating or financial leverage tend to distribute lower dividends. When a company's capital structure consists of debt, management will prioritize debt repayment over dividend distribution. This is because companies with higher debt ratios should distribute smaller dividends, as their earnings are allocated to meet debt obligations.

According to Prihantoro (2003), the debt-to-equity ratio (DER) has a strongly negative correlation with the dividend payout ratio (DPR). Furthermore, Megginson (1997), as cited in Mahadwarta (2002), states that dividend policy is negatively influenced by debt policy. Companies with high levels of debt tend to reduce their agency debt costs by lowering their debt levels. In doing so, shareholders are willing to forgo internal cash flows—which could otherwise be used for dividend payments—to finance investment activities instead.

Liquidity

One of the factors that influences dividend policy is liquidity. The liquidity ratio indicates a company's ability to meet its short-term obligations using its current assets. This is because, for a company, dividends represent a cash outflow; therefore, the greater the company's cash position and liquidity, the higher its ability to distribute dividends (Sartono, 2010:293).

A company's liquidity reflects its ability to finance operations and meet short-term obligations. Consequently, firms with higher liquidity are more likely to pay dividends. Suharli (2004) provided an early insight into how a company's liquidity influences its dividend payment policy. Financial ratios such as the current ratio, quick ratio, and cash ratio can be used to assess a company's level of liquidity. According to this study, a company's liquidity can be used to predict the rate of return on investment in the form of dividends for investors. The current ratio is often used as a measure of liquidity and is commonly included in credit agreement requirements. Suharli and Oktorina (2005) found a positive correlation between liquidity and dividend policy.

RESEARCH HYPOTHESIS

The Effect Of Profitability On Dividend Policy

Dividend policy cannot be separated from profitability because dividend distribution largely depends on the company's earnings. Dividends are distributed from the company's profits after fulfilling its obligations, including interest and taxes. The higher the company's net income, the greater the dividends that will be paid to shareholders. According to Lintner's Smoothing Theory, dividend policy depends on the current earnings and the previous year's dividends. This is consistent with the findings of Sunarya (2013), Fira (2009), Suharli (2006), Attina (2011), Amidu (2006), and Wicaksana (2012), who found that profitability has a significant positive effect on dividend policy:

H1: Profitability has a positive and significant effect on dividend policy.

The Effect Of Leverage On Dividend Policy

Leverage refers to a company's ability to fulfill its financial obligations, both in the short and long term (Wiagustini, 2010:76). A higher leverage ratio indicates that the company has greater financial obligations to meet; conversely, a lower leverage ratio indicates that the company is able to finance its operations primarily through its own capital. High levels of debt obligations will reduce the company's net income, which in turn affects dividend distribution. The higher the company's debt, the lower the level of dividends distributed to shareholders. This is consistent with the findings of Dewi (2008), Lopolusi (2013), Fira (2009), Franklin (2010), Sunarya (2013), Suharli (2006), and Attina (2011), who stated that debt has a negative effect on dividend policy, meaning that the higher the company's debt level, the lower the dividends distributed to shareholders. This will reduce dividend distribution. Based on this explanation, the following hypothesis can be proposed:

H2: Leverage has a negative and significant effect on Dividend Policy.

The Effect Of Liquidity On Dividend Policy

A company's liquidity has a positive and significant effect on dividend policy. Megawati (2005) found that the dividend payout ratio impacts business liquidity. A company's ability to finance its operations and meet short-term obligations is reflected in its liquidity. The analysis indicates that the magnitude of dividend payments is not solely determined by the company's high liquidity. Before making decisions regarding the amount of dividends to be distributed to shareholders, the company must carefully consider its cash position and overall liquidity. In considering dividend policy, it is important to take into account the company's cash position or liquidity. Since dividends represent a cash outflow, the stronger the company's liquidity position, the greater its ability to distribute dividends. According to Griffin (2010), Wicaksana (2012), Andriyani and Sulistyaningsih (2012), Idawati (2014), Dewi (2014), and Sari (2015), liquidity has a positive and significant effect on dividend policy. Based on this explanation, it can be understood that the dividend payout ratio is proportional to the strength of the company's liquidity position in relation to its future funding prospects (Riyanto, 2011:267). Therefore, based on the theories and previous research, the following hypothesis is proposed.

H3: Liquidity has a significant positive effect on Dividend Policy.

RESEARCH METHODS

Definition and measurement of variables

This study is classified as an associative research. Associative research aims to determine the effect or the relationship between two or more variables. The dependent variable in this study is dividend policy, while the independent variables are profitability, leverage, and liquidity. The research is conducted on infrastructure sector companies listed on the Indonesia Stock Exchange (IDX).

Sampling Method

A sample is a subset of the population that possesses certain characteristics or conditions to be studied. For infrastructure sector companies from 2022 to 2024, the criteria for selecting samples using the purposive sampling method are as follows:

1. Infrastructure sector companies listed on the Indonesia Stock Exchange (IDX) during the period 2022–2024.
2. Infrastructure sector companies that consistently publish complete financial statements during the 2022–2024 period.
3. Infrastructure sector companies that recorded profits (net income) during the 2022–2024 period.
4. Infrastructure sector companies that have complete data for the variables Profitability, Leverage, Liquidity, and Dividend Policy during the 2022–2024 period.

Data Analysis Method

This study employs a quantitative approach, which involves the analysis of secondary data using statistical methods. The purpose of this quantitative approach is to obtain results that can be generalized to a larger population, providing insights beyond what previous studies have achieved. The secondary data used in this research are derived from the financial statements of infrastructure sector companies listed on the Indonesia Stock Exchange (IDX) for the 2022–2024 period. These financial statements were obtained from the official company websites and the companies' own published financial reports.

Descriptive Statistical Analysis

This study employs a quantitative approach, which involves the analysis of secondary data using statistical methods. The purpose of this quantitative approach is to obtain results that can be generalized to a larger population, providing insights beyond what previous studies have achieved. The secondary data used in this research are derived from the financial statements of infrastructure sector companies listed on the Indonesia Stock Exchange (IDX) for the 2022–2024 period. These financial statements were obtained from the official company websites and the companies' own published financial reports.

Panel Data Regression Estimation

Panel data regression analysis is a technique used to simulate the effect of predictor variables on a response variable across specific units of the study subjects over a certain period of time. There are three methods that can be used to determine the appropriate regression estimation method, namely:

Common Effect Model (CEM)

This method is applied by combining time series data and cross-sectional data. The model does not take into account the time or individual dimensions, so the behavior of the company data is assumed to be the same across different periods (Basuki, 2021). According to the general regression model (pooled

regression), the disturbance variable, namely the error or residual, is assumed to account for both the intercept and slope.

Fixed Effect Model (FEM)

This model method assumes that differences between individuals can be influenced by differences in the intercept. To estimate a fixed effects panel data model, the dummy variable method can be used, which will indicate differences in intercepts between companies. Variations in incentives, management, and corporate culture contribute to these differences (Basuki, 2021).

Random Effect Model (REM)

This model examines panel data in which the disturbance variables may be correlated across both individuals and over time. In the random effects model, the error term for each company reflects differences in the intercept (Basuki, 2021).

Selection of Panel Data Regression Model Techniques

- a. Requirements for the F-Stat/Chow Test are as follows: The Chow Test is a statistical test used to determine whether the regression model employed in panel data analysis should use a Fixed Effects Model (FEM) or a Common Effects Model (CEM). This method is applied to help select the appropriate panel data regression model.
 - b. 1). If the probability value of the Cross-Section F and Cross-Section Chi-square is greater than 0.05, then H_0 is accepted, and the selected regression model is the Common Effects Model (CEM).
2). If the probability value of the Cross-Section F and Cross-Section Chi-square is less than 0.05, then H_0 is rejected, and the selected regression model is the Fixed Effects Model (FEM).
 - c. Hausman Test (Hausman Test), It is a statistical test used to determine which panel data regression model is more appropriate between the Fixed Effects Model (FEM) and the Random Effects Model (REM). The criteria are as follows:
 - d. 1). If the probability value of the Cross-Section Random is greater than 0.05, then H_0 is accepted, and the selected regression model is the Random Effects Model (REM).
e. 2). If the probability value of the Random Cross-Section is less than 0.05, then H_0 is rejected, and the chosen regression model is the Fixed Effects Model (FEM).
 - f. Lagrange Multiplier (LM) Test, It is a statistical test used to determine whether the Common Effects Model (CEM) or the Random Effects Model (REM) is more appropriate for panel data analysis. The criteria are as follows: (1) If the Cross-Section Breusch-Pagan value is greater than 0.05, then H_0 is accepted, and the model used is the Common Effects Model (CEM). (2) If the Cross-Section Breusch-Pagan value is less than 0.05, then H_0 is rejected, and the appropriate model to use is the Random Effects Model (REM).
-

Hypothesis Testing

F test, Determination Test, and T test were used to test the hypothesis of this study.

F test

The F test is used to determine whether independent variables are simultaneously influenced or not. A scale of 0.05 or 5% is used. A significance value of F less than 0.05 indicates that the independent variables simultaneously influence the dependent variable, or vice versa. The following conditions must be met by the F test: 1) When the significance value of F is less than 0.05, H₀ is rejected and H₁ is accepted, indicating that all independent variables have a significant influence on the dependent variable. 2) when the significance value of F is greater than 0.05, H₀ is accepted and H₁ is rejected, indicating that all independent variables do not have a significant influence on the dependent variable.

Coefficient of Determination Test (R²)

The coefficient of determination (R²), or how much influence the independent variables collectively have on the dependent variable, is used to measure the model's ability to explain variation in the dependent variable. Values ranging from 0 to 1 indicate the level of regression accuracy. Values greater than 1 indicate that the independent variables provide the information necessary to estimate variation in the dependent variable. The R² value indicates the model's ability to describe independent variation.

T-test

The T-test is used to evaluate how the independent variables used to apply the dependent variable impact. In the T-test, several conditions are used to draw conclusions: (1) A significance probability value greater than 0.05 indicates the hypothesis is rejected; if it is true, it indicates that the independent variable does not affect the dependent variable. (2) If the significance probability value is less than 0.05, then the hypothesis is accepted, which indicates that the independent variable influences the dependent variable.

Panel Data Regression Analysis

Using independent and dependent variables, namely several companies and a specific time period, this panel data regression analysis is used. The systematic formulation of panel data regression analysis is as follows:

$$\text{Dividend Policy} = \alpha + B_1 \text{ROE} + B_2 \text{DER} + B_3 \text{CR} + E$$

Information :

Y = Dividend Policy

α = Constant Coefficient

B₁ = Profitability Regression Coefficient

X₁ = Return on Equity (ROE)

B₂ = Leverage Regression Coefficient

X₂ = Debt to Equity Ratio (DER)

B₃ = Liquidity regression coefficient

X₄ = Liquidity

E = Error Rate (error)

RESULT AND DISCUSSION

Sampling Criteria

The sampling criteria in this study are as follows:

INFORMATION	AMOUNT
Population: Infrastructure sector companies listed on the IDX	70
Criteria-based sampling (purposive sampling):	
1. Companies that do not publish financial reports on the IDX for the 2021-2024 period	13
2. Companies that experience losses	23
Research Sample	29
Total sample (n x research period) (*3 years)	87

Source: Author's processed results, 2025

Descriptive Statistical Analysis

Date: 05/21/25 Time: 20:41 Sample: 2022 2024				
	DPR	ROE	DER	CR
Mean	63.59391	4.873218	1.248391	250.8586
Median	8.610000	0.020000	0.890000	128.6300
Maximum	1904.180	129.4700	3.550000	2539.710
Minimum	0.160000	-2.380000	0.040000	18.22000
Std. Dev.	265.0306	23.08219	0.945132	375.3818
Skewness	5.908739	5.032877	0.900689	3.530015
Kurtosis	37.97528	26.62349	2.765509	18.58364
Jarque-Bera	4940.597	2390.284	11.96232	1061.015
Probability	0.000000	0.000000	0.002526	0.000000
Sum	5532.670	423.9700	108.6100	21824.70
Sum Sq. Dev.	6040743.	45819.71	76.82157	12118391
Observations	87	87	87	87

Source: data processed with eviews version 12, 2025

Based on the table above, it can be seen that the number of observations studied was 87, from 29 samples of infrastructure sector companies and a time span of 3 years from 2021 - 2023.

- 1) The debt-to-equity ratio (DPR) had a maximum value of 1,904 days and a minimum value of 0 days. Meanwhile, the average DPR value for infrastructure sector companies was 63.59391, with a standard deviation of 265.0306.
- 2) Return on Equity (ROE) has a maximum value of 129.4700 and a minimum value of -2.380000. Meanwhile, the average ROE value for infrastructure sector companies is 4.873218 with a standard deviation of 23.08219.
- 3) The Debt to Equity Ratio (DER) has a maximum value of 3.550000 and a minimum value of 0.040000. Meanwhile, the average DER value for infrastructure sector companies is 1.248391 with a standard deviation of 0.945132.

- 4) Current Ratio (CR) has a maximum value of 2539.710 and a minimum value of 18.22000. Meanwhile, the average CR value for infrastructure sector companies is 250.8586 and the standard deviation is 375.3818.

Selection of panel data regression model techniques

Chow Test

Redundant Fixed Effects Tests			
Equation: Untitled			
Test cross-section fixed effects			
Effects Test	Statistic	d.f.	Prob.
Cross-section F	2.639105	(28,55)	0.0010
Cross-section Chi-square	74.094807	28	0.0000

Source: data processed by eviews 12, 2025

The Chow test results show that the cross-section profitability chi-square value of 0.0010 is less than 0.05, which means H_0 is rejected. Therefore, the fixed effects model (FEM) is the best choice for estimating the regression equation.

Hausman test

Correlated Random Effects - Hausman Test			
Equation: Untitled			
Test cross-section random effects			
Test Summary	Chi-Sq. Statistic	Chi-Sq. d.f.	Prob.
Cross-section random	0.804930	3	0.8483

The Hausman test results show that H_0 is rejected because the cross-section chi-square probability value is $0.8483 < 0.05$. Thus, the random effects model (REM) is the best for estimating the regression equation.

Lagrange Multiplier (LM) Test

Lagrange Multiplier Tests for Random Effects			
Null hypotheses: No effects			
Alternative hypotheses: Two-sided (Breusch-Pagan) and one-sided (all others) alternatives			
	Test Hypothesis		
	Cross-section	Time	Both
Breusch-Pagan	10.63520 (0.0011)	0.000691 (0.9790)	10.63589 (0.0011)
Honda	3.261165 (0.0006)	-0.026285 (0.5105)	2.287405 (0.0111)
King-Wu	3.261165 (0.0006)	-0.026285 (0.5105)	0.816635 (0.2071)
Standardized Honda	3.723124 (0.0001)	0.424882 (0.3355)	-1.553228 (0.9398)
Standardized King-Wu	3.723124 (0.0001)	0.424882 (0.3355)	-1.355217 (0.9123)
Gourieroux, et al.	--	--	10.63520 (0.0018)

The Lagrange Multiplier (LM) test results show that H_0 is rejected because the cross-section chi-square probability value is $0.0011 < 0.05$. Thus, the random effects model (REM) is the best for estimating the regression equation.

Model Selection

Method	Testing	Results
Chow Test	CEM VS FEM	FEM
Hausman test	REM VS FEM	BRAKE
LM Test	CEM VS REM	BRAKE

Based on the results of the three tests above, namely the Chow Test (FEM), the Hausman Test (REM), and the Lagrange Multiplier Test (REM), the model applied in this study is the Random Effects Model (REM).

Hypothesis Testing

Coefficient of Determination (Adjusted R-Square)

R-squared	0.560114
Adjusted R-squared	0.544214
S.E. of regression	132.4886
F-statistic	35.22840
Prob(F-statistic)	0.000000

Source: Data processed with Eviews version 12, 2025

The results of the coefficient of determination test, which produced an adjusted R-Square value of 0.544214, indicate that profitability, leverage, and liquidity can influence 54% of dividend policy, and other factors not examined in this study can influence 46% of dividend policy.

F Test (Simultaneous Test)

R-squared	0.560114
Adjusted R-squared	0.544214
S.E. of regression	132.4886
F-statistic	35.22840
Prob(F-statistic)	0.000000

Source: Data processed with Eviews version 12, 2025

The results of the F test show that the F-value The statistical significance level is 35.68492 with a probability value of 0.000000. Since the probability value of 0.000000 < 0.05, H₀ is rejected and H₁ is accepted. This indicates that during the 2022–2024 period, the dividend policy of infrastructure companies listed on the Indonesia Stock Exchange is significantly

influenced by the variables of profitability (ROE), leverage (DER), and liquidity (CR).

T-Test (Partial Test)

Variable	Coefficient	Std. Error	t-Statistic	Prob.
C	-117.4282	46.67498	-2.515870	0.0138
ROE	0.328174	1.132345	0.289818	0.7727
DER	23.62863	26.22290	0.901069	0.3702
CR	0.597648	0.061210	9.763873	0.0000

Source: data obtained with Eviews version 12, 2025

Based on the results of the T test that was conducted using the Random Effect Model (REM), it can be explained as follows:

- The effect of dividend policy on profitability (ROE). With a t-statistic value of 0.468921 and a probability value of 0.6407, the ROE variable indicates that H1 is rejected and H0 is accepted. This indicates that the dividend policy of infrastructure companies listed on the Indonesia Stock Exchange during the 2022–2024 period is not significantly affected by profitability (ROE).
- The effect of leverage on dividend policy: With a t-statistic value of 2.874192 and a probability value of 0.0053, H0 is rejected and H2 is accepted, based on the DER variable. This indicates that during the 2022–2024 period, leverage (DER) will have a positive and significant impact on the dividend policy of infrastructure companies listed on the Indonesia Stock Exchange.
- The Effect of Dividend Policy (DPR) on Liquidity (CR). With a probability value of 0.0000 and a t-statistic of 8.240685, the CR variable indicates that H0 is rejected and H3 is accepted. This indicates that from 2022 to 2024, the dividend policy of infrastructure companies listed on the Indonesia Stock Exchange will be positively and significantly influenced by liquidity (CR).

Panel Data Regression Analysis

The estimation model obtained from the *Random Effect Model* can be written as follows:

$$\text{DPR} = -117.428183255 + 0.328174330895 \cdot \text{ROE} + 23.628630434 \cdot \text{DER} + 0.597647634133 \cdot \text{CR} + [\text{CX}=\text{R}]$$

- The results of the equation with the previous panel data linear regression show that the dividend policy (DPR) has a constant value of -117.428183255, which indicates that the ROE, DER, and CR variables are all constant in the negative direction.
- The profitability coefficient (ROE) value = 0.328174330895, which indicates that ROE will increase by one unit assuming the regression coefficient of other variables is zero.

- The leverage coefficient (DER) value = 23.628630434, which indicates that DER will increase by one unit assuming the regression coefficient of other variables is zero.
- The liquidity coefficient (CR) value = 0.597647634133, which shows that the CR will decrease by one unit assuming the regression coefficient of other variables is zero.

DISCUSSION

The Effect of Profitability on Dividend Policy.

Based on the T-test results for the ROE (Profitability) variable, which showed a t-statistic value of 0.468921 with a probability of $0.6407 > 0.05$, it can be concluded that profitability does not significantly influence dividend policy. These results indicate that the level of company profitability does not affect dividend distribution policy in infrastructure sector companies. This finding is consistent with research conducted by Hartono (2000) and Sunarto & Kartika (2003), which found that profitability had no effect on dividend policy. This may occur because infrastructure companies tend to require large amounts of funds for long-term investment. Therefore, even though the company has high profitability, management prefers to retain profits for business expansion and development rather than distributing them as dividends.

The Effect of Leverage on Dividend Policy.

Based on the T-test results for the DER (Leverage) variable, which showed a t-statistic value of 2.874192 with a probability of $0.0053 < 0.05$, it can be concluded that leverage has a positive and significant effect on dividend policy. These results indicate that the higher a company's leverage level, the higher the dividend policy set. This finding contradicts the theory that highly leveraged companies will pay low dividends (Rozeff, 1982). However, this result can be explained by signaling theory, where highly leveraged companies pay high dividends as a signal to investors that the company is able to manage its debt well and has stable cash flow to pay dividends despite its high debt obligations.

The Effect of Liquidity on Dividend Policy

Based on the T-test results for the CR (Liquidity) variable, which showed a t-statistic value of 8.240685 with a probability of $0.0000 < 0.05$, it can be concluded that liquidity has a positive and significant effect on dividend policy. These results indicate that the higher the company's liquidity level, the higher the dividend policy set. This finding aligns with research conducted by Suharli & Oktorina (2005), Griffin (2010), Wicaksana (2012), and Sari (2015), which found that liquidity has a positive and significant effect on dividend policy. This is explained by the fact that dividends are a cash outflow, so companies with strong liquidity have a greater ability to pay dividends to shareholders without disrupting company operations

CONCLUSION

Profitability has no influence on dividend policy in infrastructure sector companies listed on the Indonesia Stock Exchange (IDX) for the 2021-2023 period.

Leverage has no influence on dividend policy in infrastructure sector companies listed on the Indonesia Stock Exchange (IDX) for the 2021-2023 period.

Liquidity has a positive and significant impact on dividend policy in infrastructure sector companies listed on the Indonesia Stock Exchange (IDX) for the 2021-2023 period.

REFERENCES

- Al-Malkawi, H. A. N. (2007). Determinants of corporate dividend policy in Jordan: An application of the Tobit model. *Journal of Economic and Administrative Sciences*, 23(2), 44–70.
- Andriyani, M., & Sulistyaningsih, S. (2012). Analysis of the influence of cash ratio, debt to equity ratio, insider ownership, investment opportunity set (IOS), and profitability on dividend policy. *Journal of Accounting & Investment*, 13(1), 70–75.
- Basuki, A. T. (2021). *Regression analysis in economic and business research*. Jakarta: Rajawali Pers.
- Brigham, E. F., & Houston, J. F. (2011). *Fundamentals of financial management*. Yogyakarta: Salemba Empat.
- Dewi, S. C. (2014). The influence of managerial ownership, institutional ownership, debt policy, profitability, and company size on dividend policy. *Journal of Management*, 3(2), 1–10.
- Griffin, P. A. (2010). *Corporate financial policy and R&D management*. New York: John Wiley & Sons.
- Harjito, A., & Martono. (2017). *Financial management*. Yogyakarta: Ekonisia.
- Idawati, W. (2014). The effect of profitability, leverage, and liquidity on dividend policy in manufacturing companies listed on the IDX. *Journal of Accounting*, 2(1), 15–20.
- Ismiyati, F., & Hanafi, M. M. (2003). Managerial ownership, institutional ownership, risk, debt policy, and dividend policy: Simultaneous equation analysis. In *Proceedings of VI National Accounting Symposium* (pp. 260–277).
- Jensen, M. C., & Meckling, W. H. (1976). Theory of the firm: Managerial behavior, agency costs and ownership structure. *Journal of Financial Economics*, 3(4), 305–360.
- Kasmir. (2017). *Financial report analysis*. Jakarta: Rajawali Pers.
- Mahadwarta, P. A. (2002). Testing agency theory in the interdependence relationship between debt policy and dividend policy. *Proceedings of National Accounting Symposium V*, 635–647.

- Megginson, W. L. (1997). *Corporate finance theory*. Reading: Addison-Wesley.
- Mulyawan, S. (2017). *Financial management*. Bandung: Pustaka Setia.
- Ni Putu, A. S. (2019). The effect of profitability, liquidity, and leverage on dividend policy in manufacturing companies. *E-Journal of Management*, 8(10), 6179–6198.
- Prihantoro. (2003). Estimating the effect of dividend payout ratio on public companies in Indonesia. *Journal of Economics and Business*, 8(1), 7–?.
- Rodoni, A., & Ali, H. (2010). *Financial management*. Jakarta: Mitra Wacana Media.
- Rozeff, M. S. (1982). Growth, beta and agency costs as determinants of dividend payout ratios. *Journal of Financial Research*, 5(3), 249–259.
- Riyanto. (1995). [judul tidak tercantum dalam file]. (Catatan: periksa kembali detail buku/edisi jika ingin lengkap.)
- Sartono, A. (2000). *Financial management: Theory and application*. Yogyakarta: BPFE.
- Sartono, A. (2001). *Financial management: Theory and application (rev. ed.)*. Yogyakarta: BPFE.
- Sartono, A. (2010). *Financial management: Theory and application*. Yogyakarta: BPFE.
- Sartono, A. (2017). *Financial management: Theory and application (ed.)*. Yogyakarta: BPFE.
- Sari, K. (2008). The effect of profitability and company growth on dividend policy. *Journal of Accounting*, 1(2), 45–?.
- Sari, N. P. (2015). The effect of liquidity, leverage, company growth, and profitability on dividend policy in manufacturing companies on the IDX. *Unud E-Journal of Management*, 4(10), 3346–3374.
- Smith, J. M., & Skousen, K. F. (1992). *Intermediate accounting*. Cincinnati: South-Western Publishing.
- Sudana, I. M. (2009). *Financial management theory and practice*. Surabaya: Airlangga University Press.
- Sudarsi, S. (2000). Analysis of factors affecting dividend payout ratio in companies listed on the Jakarta Stock Exchange. *Journal of Economics and Business*, 7(1), 25–?.
- Suharli, M. (2004). An empirical study on the effect of profitability, leverage, and stock price on the amount of cash dividends. *Jurnal Maksi*, 4(2), 243–256.
- Suharli, M., & Megawati. (2005). The effect of profitability and investment opportunity set on cash dividend policy with liquidity as a reinforcing variable. *Journal of Accounting and Finance*, 7(1), 9–?.
- Suharli, M., & Oktorina, M. (2005). Predicting the rate of return on investment in equity securities through profitability, liquidity, and capital. [jurnal/konferensi — data terpotong di file].
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