Testing Corporate Finance and Signaling Theory in Indonesia's Property Sector: ROA, TATO, and Firm Size Effects on Firm Value

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Abstract

This study examines the impact of Return on Assets (ROA), Total Asset Turnover (TATO), and Firm Size on corporate value, highlighting its importance for investors and shareholders. Using a descriptive quantitative approach, data were collected from PT Ciputra Development Tbk's annual financial statements for 2015–2024 and analyzed with multiple linear regression. The results show that ROA and TATO individually do not significantly influence corporate value, while Firm Size has a significant negative effect. However, when considered together, ROA, TATO, and Firm Size collectively have a significant impact. This indicates that although single financial indicators may be less influential, their combined effect is substantial. The study underscores that investors should assess these variables collectively rather than separately to make informed decisions, emphasizing the need for a comprehensive evaluation of financial performance factors in determining corporate value.

Keywords: *Return On Aset, Total Aset Turnover, Firm Size*, *Corporate Value*

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Introduction

The Indonesian property industry plays a vital role in the national economy, contributing significantly to the Gross Domestic Product (GDP) and serving as a key indicator of investment and urbanization. This sector faces complex challenges, including intense competition, changing consumer preferences post-pandemic, permitting issues, and liquidity problems due to slowing sales. In this context, property companies are required to manage their finances and assets efficiently to maintain competitiveness. Firm value serves as a benchmark for management success in building market confidence and maximizing shareholder wealth. Factors such as profitability, asset utilization efficiency, and firm size significantly influence this value (Dewi & Badjra, 2017; Agustiningtias et al., 2017; Khalifaturofi'ah et al., 2024; Santoso et al., 2023; Wibowo et al., 2025).

PT Ciputra Development Tbk (CTRA), as one of Indonesia's leading property developers, has demonstrated significant growth in firm value despite facing global economic fluctuations and the impact of the COVID-19 pandemic during the 2015–2024 period. However, stock price data indicate volatility that does not always align with increases in the company's book value, suggesting the presence of factors that suppress market appreciation. Financial ratios, such as Return on Assets (ROA), which measures profit efficiency from assets (Kasmir, 2019), Total Asset Turnover (TATO), which assesses the effectiveness of asset utilization for sales (Hery, 2018), and firm size proxied by total assets (Machmuddah, 2020), are important indicators influencing firm value.

Recent empirical studies from 2021 to 2025 reveal mixed evidence regarding the determinants of firm value in the Indonesian property sector. Several studies report that profitability (ROA) positively affects firm value, while TATO often shows no significant effect (Khalifaturofi'ah et al., 2024; Limba, 2023). Other findings indicate that firm size may negatively influence firm value, suggesting that larger companies could experience operational inefficiencies, diseconomies of scale, or reduced investor confidence (Wibowo et al., 2025). These inconsistencies highlight a persistent empirical gap: few studies have simultaneously examined ROA, TATO, and firm size over an extended period within a single property firm, limiting understanding of their combined influence on market valuation. Additionally, most prior research uses short-term data or cross-sectional samples

of multiple firms, leaving limited insights into firm-specific dynamics across a full business cycle.

Table 1 Financial Data of PT Ciputra Development for the 2015-2024 Period

Total Assets (Rp)	Net Profit (Rp)	Sales (Rp)	Stock Price (Rp)	Book Value (Rp)
26.258.718	1.740.300	7.514.286	1460	851,25
29.169.333	1.170.706	6.739.315	1335	926,91
31.872.302	1.018.529	6.442.797	1185	832,46
34.289.017	1.302.702	7.670.405	1010	896,77
36.196.024	1.283.281	7.608.237	1040	956,97
39.255.187	1.370.686	8.070.737	985	940,58
40.668.411	2.087.716	9.729.651	970	1044,93
42.032.615	2.002.076	9.126.799	940	1132,25
44.115.215	1.909.025	9.245.033	1170	1220,6
47.022.702	2.327.968	11.187.565	980	1328

Source: idx.co.id

Previous research on Indonesian property and real-estate firms reports mixed evidence on how profitability, asset-turnover, and firm size affect firm value. Panel evidence from Indonesian real-estate companies shows that profitability (ROA) is often a significant driver of firm value while total asset turnover (TATO) is not always significant — for example, Khalifaturofi'ah et al. (2024) document a positive effect of ROA on firm value but find TATO's partial effect to be insignificant. Other studies show complementary results: a multi-year study found that total asset turnover and intellectual capital can positively influence firm value in Indonesian property firms. Empirical work also frequently finds a positive association between firm size (total assets) and firm value (Limba, 2023). Company-level investigations of PT Ciputra Development Tbk report varying relationships among liquidity, leverage, and profitability across sample periods, underscoring that firm-specific dynamics matter and motivating a longer-period, focused study of how ROA, TATO, and firm size influence Ciputra's market valuation.

Based on this background, this study formulates several research questions:

1. How does Return On Assets affect firm value at PT Ciputra Development Tbk during the 2015-2024 period?

2. How does Total Asset Turnover affect firm value at PT Ciputra Development Tbk during the 2015-2024 period?
3. How does firm size affect firm value at PT Ciputra Development Tbk during the 2015-2024 period?
4. How do Return On Assets (ROA), Total Asset Turnover (TATO), and Firm size simultaneously affect the Firm Value of PT Ciputra Development Tbk during the 2015-2024 period?

Literature Review

Corporate Finance Theory

Corporate Finance Theory provides the foundational framework for understanding how firms manage financial decisions to maximize firm value and shareholder wealth. According to Brigham and Houston (2019), this theory explains that a company's financial strategy—covering investment, financing, and dividend decisions—must be directed toward optimizing firm value through effective resource allocation and risk management.

In the modern context, several studies reaffirm the relevance of this theory. Khan et al. (2021) argue that financial management efficiency, as reflected in profitability and liquidity ratios, plays a central role in shaping firm value, particularly in emerging markets. Similarly, Nguyen and Tran (2022) emphasize that corporate financing and investment policies significantly affect firm performance, aligning with Corporate Finance Theory's premise of value maximization.

In Indonesia, Dewi Kurniawati and Farida Idayati (2024) found that profitability (ROA), firm size, and activity ratios have a significant effect on firm value, reinforcing the principle that optimal financial management decisions contribute to investors' perception of firm strength. This aligns with Corporate Finance Theory, which posits that efficient management of financial resources, reflected through strong financial ratios, enhances market confidence and increases firm valuation.

Furthermore, Alfaro et al. (2023) demonstrate that effective capital allocation and prudent leverage decisions, core aspects of corporate finance, positively influence firm value across

sectors, supporting the notion that strategic financial management directly drives corporate success.

Signaling Theory

The signaling theory, introduced by Michael Spence (1973), posits that signal senders, such as company management, transmit information that reflects the firm's condition to reduce information asymmetry with investors. These signals, such as profitability and efficiency ratios, help investors make informed decisions. Ghozali (2020) emphasizes that signaling theory involves managerial actions aimed at influencing the behavior of external parties by providing credible information about firm performance. Signals must be strong and informative enough to affect market perceptions.

In the context of this study, which examines the effects of Return on Assets (ROA), Total Asset Turnover (TATO), and firm size on the value of PT Ciputra Development Tbk during 2015–2024, signaling theory explains how these indicators serve as signals of management performance and company prospects. Empirical evidence from Putri and Sari (2023) and Hapsari et al. (2022) supports this view, showing that ROA provides a positive signal to investors, enhancing firm value, while TATO's effect is often insignificant due to sectoral variations.

Mid-theories

The mid theory in this study serves as a bridge between the foundational theoretical frameworks—Corporate Finance Theory and Signaling Theory—and the empirical phenomena observed in Indonesia's property sector. It posits that financial performance indicators, asset utilization efficiency, and company size act as mediating signals that influence investors' perceptions and ultimately firm value. Specifically, Return on Assets (ROA) functions as a profitability signal: a higher ROA indicates that management efficiently generates profits from its assets, enhancing investor confidence and positively affecting firm value. Total Asset Turnover (TATO) reflects the efficiency of asset utilization in generating sales, suggesting that better operational performance may contribute to market valuation, although this effect may be moderated by sector-specific factors or market expectations. Meanwhile, Firm Size, measured by the natural logarithm of total assets, represents the scale and stability of the company; however, excessively large firms may experience diseconomies of scale, operational complexity, or slower growth potential, which can negatively influence firm value.

Collectively, the mid theory underscores that firm value is shaped not only by individual financial metrics but also by their combined signaling effects, emphasizing the need to evaluate profitability, efficiency, and size simultaneously to understand market perceptions in property companies like PT Ciputra Development Tbk.

Hypothesized Development

Hypothesis 1 (H1): Return on Assets (ROA) has a positive effect on firm value at PT Ciputra Development Tbk during the 2015–2024 period.

Previous studies provide strong support for the effect of profitability on firm value. Dewi and Idayati (2024) found that ROA significantly enhances firm value in Indonesian property companies, indicating that investors interpret higher profitability as a signal of management efficiency and future growth potential. Similarly, Putri and Sari (2023) demonstrated that ROA acts as a signaling mechanism to the market, informing investors about the company's operational effectiveness. Based on these empirical findings, it is hypothesized that higher ROA will positively affect the market valuation of PT Ciputra Development Tbk.

Hypothesis 2 (H2): Total Asset Turnover (TATO) has a positive effect on firm value at PT Ciputra Development Tbk during the 2015–2024 period.

Empirical evidence regarding asset utilization efficiency and firm value is mixed but insightful. Hapsari et al. (2022) show that companies with higher TATO are often perceived as managing their assets efficiently, which can enhance investor confidence. Khalifaturofi'ah et al. (2024) also report that while TATO may not always have a significant individual effect, it contributes to firm value when combined with other financial performance indicators. These studies support the hypothesis that effective asset utilization, as measured by TATO, is expected to positively influence firm value in PT Ciputra Development Tbk.

Hypothesis 3 (H3): Firm Size has a significant effect on firm value at PT Ciputra Development Tbk during the 2015–2024 period.

Research on firm size indicates that while large firms may benefit from economies of scale, they can also face diseconomies of scale and increased operational complexity. Wibowo et al. (2025) and Khalifaturofi'ah et al. (2024) find that larger property firms in Indonesia sometimes experience a negative impact on market valuation due to reduced flexibility or slower growth

potential. These findings suggest that firm size can have a significant effect—either positive or negative—on firm value, providing a rationale to examine its influence explicitly in this study.

Hypothesis 4 (H4): Return on Assets (ROA), Total Asset Turnover (TATO), and Firm Size simultaneously affect firm value at PT Ciputra Development Tbk during the 2015–2024 period.

Several studies emphasize the importance of multivariate analysis in understanding firm value. Agustiningtias et al. (2017) argue that profitability, efficiency, and firm scale interact to shape investor perception, making it necessary to analyze them collectively. Putri and Sari (2023) further show that while individual financial indicators may have limited explanatory power, their combined effect significantly predicts firm value. Based on these empirical insights, it is hypothesized that ROA, TATO, and Firm Size together will simultaneously influence the corporate valuation of PT Ciputra Development Tbk.

Research Methods

This study employs a **descriptive quantitative approach** to examine the influence of Return on Assets (ROA), Total Asset Turnover (TATO), and Firm Size on the firm value of PT Ciputra Development Tbk over the period 2015–2024. The approach allows for the measurement of relationships between variables using numerical data and statistical techniques, facilitating hypothesis testing and objective conclusions. The research uses **secondary data**, specifically the company's annual financial statements obtained from the Indonesia Stock Exchange (IDX).

Table 2 Operational Variables

Variable	Indicator	Measurement	Type	Source
Return on Assets (ROA)	Profitability from total assets	Net Profit ÷ Total Assets	Independent	Kasmir (2019)
Total Asset Turnover (TATO)	Efficiency of asset utilization	Sales ÷ Total Assets	Independent	Hery (2018)
Firm Size	Scale of the company	Natural logarithm of Total Assets	Independent	Machmuddah (2020)

Variable	Indicator	Measurement	Type	Source
Firm Value (PBV)	Market valuation relative to book value	Stock Price ÷ Book Value per Share	Dependent	Santoso et al. (2023)

Mathematical Model

The study uses multiple linear regression analysis to examine the partial and simultaneous effects of the independent variables on firm value. The regression model is expressed as follows:

$$PBVt=\beta0+\beta1ROAt+\beta2TATOt+\beta3FSt+\epsilon t$$

Where:

- PBVt = Firm Value at year ttt
- ROAt = Return on Assets at year ttt
- TATOt = Total Asset Turnover at year ttt
- FSt = Firm Size at year ttt
- β0 = Constant
- β1,β2,β3 = Regression coefficients
- ϵt = Error term

Data Analysis Techniques

The data analysis for this study was conducted using SPSS version 25 and involved several sequential steps to ensure robust and accurate results. First, descriptive statistics were calculated to summarize the data, including the mean, minimum, maximum, and standard deviation values for each variable, providing an overview of the distribution and variability. Next, classical assumption tests, such as normality, multicollinearity, and heteroscedasticity assessments, were performed to confirm that the regression model met the necessary statistical assumptions. Following this, multiple linear regression analysis was applied to examine the effects of ROA, TATO, and Firm Size on firm value, both partially using t-tests and simultaneously using F-tests. Additionally, the coefficient of determination (R^2) was calculated to determine the proportion of variance in firm value explained by the independent variables.

Finally, hypothesis testing was conducted at a 5% significance level ($\alpha = 0.05$) to evaluate the statistical significance of the relationships. This comprehensive analytical framework ensures a thorough assessment of how profitability, asset utilization, and firm size collectively influence market valuation in the Indonesian property sector.

Results and Discussions

To provide a summary of the data related to the variables studied, descriptive statistical analysis was performed. The values identified from the descriptive statistics are the mean, median, maximum, minimum, and standard deviation. The results of the descriptive statistical analysis are as follows:

Descriptive Statistical Analysis Results

Tabel 2 Descriptive Statistical Analysis Results

Variable	N	Minimum	Maximum	Mean	Std. Deviation
Return on Assets (ROA)	10	3.20	6.63	4.3400	1.00648
Total Asset Turnover (TATO)	10	0.202	0.286	0.22950	0.028096
Firm Size	10	17.08	17.67	17.4130	0.18845
Corporate Value	10	0.74	1.72	1.1310	0.30683
Valid N (listwise)	10				

Source: SPSS 25 version output (2025)

The results of the descriptive statistical analysis provide an overview of the data distribution for each variable studied. The Return on Assets (ROA) variable shows a minimum value of 3.20 and a maximum of 6.63, with an average of 4.34 and a standard deviation of 1.01. This indicates that the company's ability to generate profits from its total assets varies moderately across the observed years, reflecting differences in operational efficiency. The Total Asset Turnover (TATO) variable, which measures the efficiency of asset utilization in generating sales, ranges from 0.202 to 0.286, with an average of 0.23 and a standard deviation of 0.03. These figures suggest that the company's sales performance relative to its total assets is relatively stable, showing consistent asset utilization efficiency.

Meanwhile, the Firm Size variable, represented by the natural logarithm of total assets, has a minimum value of 17.08 and a maximum of 17.67, with a mean of 17.41 and a standard deviation of 0.19. This indicates that the company maintains a relatively stable scale of operations during the observation period. Lastly, the Firm Value (PBV) variable ranges from 0.74 to 1.72, with a mean of 1.13 and a standard deviation of 0.31. This suggests that investors' market perception of the company's value relative to its book value varies moderately, implying that market confidence fluctuated across the study period in response to profitability and performance changes.

From the perspective of Signaling Theory, profitability indicators such as ROA serve as positive signals to investors, reflecting management's efficiency and future earnings potential. A higher ROA communicates that the company effectively utilizes its resources, thereby enhancing investor confidence and market valuation. Similarly, firm size can also act as a signal of stability and financial strength, although in some cases, larger firms face diminishing efficiency, which may offset their signaling benefits. In line with Corporate Finance Theory, the findings suggest that efficient management of financial resources, reflected in stable TATO and controlled firm size, contributes to maximizing firm value. Thus, the observed variations in ROA, TATO, and firm value illustrate how strategic financial management decisions influence market perceptions and align with the theoretical premise of maximizing shareholder wealth.

Normality Test

Table 3 Normality test results

Variable	Kolmogorov–Smirnov			Shapiro–Wilk		
	Statistic	df	Sig.	Statistic	df	Sig.
Corporate Value	0.201	10	0.200*	0.936	10	0.507
ROA	0.138	10	0.200*	0.901	10	0.223
TATO	0.178	10	0.200*	0.859	10	0.074
Firm Size	0.159	10	0.200*	0.966	10	0.854

Source: SPSS 25 version output (2025); * This is a lower bound of the true significance.a. Lilliefors Significance Correction.

Based on the Shapiro-Wilk table above, the significance values for Return on Asset (0.223), Total Asset Turnover (0.074), firm size (0.854), and firm value (0.507) are all greater

than 0.05. Therefore, it can be stated that the data used are normally distributed at a significance level of 0.05.

Multiple Linear Regression Analysis

Table 4 Multiple Linear Regression Analysis Results

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.
	B	Std. Error	Beta		
(Constant)	28.203	4.356		6.474	0.001
ROA	0.008	0.032	0.028	0.262	0.802
TATO	0.092	1.635	0.008	0.056	0.957
Firm Size	-1.558	0.235	-0.957	-6.633	0.001

Source: SPSS 25 version output (2025)

The results of the multiple linear regression analysis provide insights into the influence of Return on Assets (ROA), Total Asset Turnover (TATO), and Firm Size on Corporate Value (PBV). The regression constant of 28.203 indicates that if all independent variables, ROA, TATO, and Firm Size, are assumed to be zero, the predicted PBV would be 28.203. Although this value is theoretical, it serves as a baseline when other variables are excluded from the model. The ROA coefficient of 0.008 shows a positive relationship with PBV, meaning that a 1% increase in ROA, while holding other factors constant, is associated with a 0.008 increase in PBV. However, given its high significance value (Sig. = 0.802), this relationship is statistically insignificant, suggesting that profitability has a weak influence on firm value during the observation period.

The TATO variable, with a coefficient of 0.092, also shows a positive but statistically insignificant relationship with PBV (Sig. = 0.957). This implies that while greater asset utilization efficiency tends to increase firm value, the effect is not strong enough to be considered significant, indicating that sales turnover efficiency may not directly translate into higher market valuation in the property sector. In contrast, the Firm Size variable shows a negative and statistically significant relationship with PBV, with a coefficient of -1.558 and a significance level of 0.001. This finding suggests that as the size of the company increases, the firm value tends to decline, implying that larger firms may experience reduced efficiency or face higher operational risks that negatively affect market perception.

From a theoretical standpoint, these results align partially with Signaling Theory and Corporate Finance Theory. While profitability (ROA) and efficiency (TATO) are expected to act as positive signals to investors, their weak statistical impact indicates that external market factors or sector-specific conditions may dilute these effects. Meanwhile, the negative influence of firm size on PBV may reflect investor concerns about overexpansion or liquidity constraints typical in large property firms, consistent with the trade-off principle in Corporate Finance Theory. Overall, the findings emphasize that firm size plays a dominant role in shaping corporate value, while profitability and activity ratios have limited signaling effects in this context.

Coefficient of Determination (R2) Test

Table 5 Coefficient of Determination (R2) Test Results

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	0.970	0.940	0.910	0.09197

Source:SPSS 25 version output (2025)

Based on the Model Summary table above, the magnitude of the variables' influence, indicated by an Adjusted R2 of 0.940, means that (KD = R2 x 100% = (0.940) x 100%) = 94%. Therefore, it can be concluded that Return on Assets, Total Asset Turnover, and Firm size collectively influence Firm Value (PBV) by 94%, while the remaining 6% is influenced by other variables not included in this study.

T-test

Table 6 T-test Results

Model	t	Sig.
1 (Constant)	6.474	0.001
ROA	0.262	0.802
TATO	0.056	0.957
Firm Size	-6.633	0.001

Source:SPSS 25 version output (2025)

Based on the results of the partial hypothesis testing presented in the coefficients table, it can be observed that the Return on Assets (ROA) variable does not have a significant effect on Corporate Value (PBV). The t-calculated value of 0.262 is smaller than the t-table value of 2.364, and the significance level of 0.802 is greater than 0.05. This result indicates that

profitability, as measured by ROA, does not significantly influence the firm's market value. From the perspective of Signaling Theory, this suggests that profitability signals from management are not perceived strongly enough by investors to affect valuation. In certain contexts, this could occur when earnings information is already anticipated by the market or when profitability levels are considered stable and thus fail to generate new positive signals.

Similarly, the Total Asset Turnover (TATO) variable also shows no significant effect on Corporate Value, as indicated by a t-calculated value of 0.056, which is smaller than the t-table value of 2.364, and a significance value of 0.957 (> 0.05). This finding implies that operational efficiency, measured by how effectively assets are utilized to generate sales, is not a decisive factor in determining firm value. According to Corporate Finance Theory, this may occur because investors are more responsive to strategic financial policies—such as capital structure, dividend policy, or investment decisions—rather than internal operational ratios like asset turnover.

Conversely, the Firm Size variable demonstrates a significant negative relationship with Corporate Value. The t-calculated value of -6.633 exceeds the t-table value of 2.364 in absolute terms, and the significance value of 0.001 (< 0.05) confirms the statistical significance of this effect. This result implies that as the firm grows larger, its market valuation relative to book value tends to decrease. From a Corporate Finance standpoint, larger firms may experience diseconomies of scale, reduced flexibility, or lower growth potential, leading investors to assign lower valuation multiples. In the context of Signaling Theory, a larger firm size could also signal maturity rather than growth potential, thus reducing the market's perception of future profitability.

Overall, these findings align with the theoretical premise that firm value is shaped not only by financial performance indicators such as profitability and efficiency but also by how these indicators are perceived through market signals. The insignificance of ROA and TATO suggests that operational performance alone does not convey a strong signal to investors, whereas the significant negative effect of firm size reflects the nuanced role of scale in shaping investor expectations within modern corporate finance frameworks.

F Test

Table 7 F Test Results

Model	Sum of Squares	df	Mean Square	F	Sig.
Regression	0.797	3	0.266	31.388	0.000
Residual	0.051	6	0.008		
Total	0.847	9			

Source:SPSS 25 version output (2025)

Based on the table, the results of the simultaneous hypothesis test show an F-calculated value of 31.388 with a significance value of 0.001b. To find the F-table value, with a sample size (n) = 10, number of independent variables (k) = 3, and a significance level (α) = 0.05, we look up F-table = FINV (0.05;3;7) or use df1 = k = 3 and df2 = n-k-1 = 10 – 3 - 1 = 6. This yields an F-table value of 4.76. Since the F-calculated value (31.389) > F-table value (4.76), and the systematic significance value is 0.000b, which is less than the significance level of 0.05, the null hypothesis (Ho) is rejected, and the alternative hypothesis (Ha) is accepted. This indicates that Return on Assets (ROA), Total Asset Turnover (TATO), and Firm size simultaneously have a significant effect on Firm Value.

Discussion

This study examined the effects of Return on Assets (ROA), Total Asset Turnover (TATO), and Firm Size on the corporate value (PBV) of PT Ciputra Development Tbk during the 2015–2024 period. The results indicate that individually, ROA and TATO do not significantly affect firm value, whereas Firm Size has a significant negative effect. Simultaneously, the three variables collectively explain a very large portion of variance in firm value (Adjusted $R^2 = 0.910$).

The finding that ROA is not significant contrasts with several Indonesian property-sector studies. For example, by Khalifaturofi'ah et al. (2024) reports a negative and significant relationship between profitability and firm value in Indonesian real-estate firms, along with a negative effect of firm size and a positive effect of asset growth and turnover. Meanwhile, Agistia & Santoso (2024) found that profitability positively affects firm value in Indonesian property companies. This divergence suggests that in the specific case of CTRA (Ciputra), profitability signals may not be robustly perceived by the market, perhaps due to sector-specific factors, market maturity, or investor expectations.

Regarding TATO, our finding of insignificance individually again aligns only partially with the literature. For instance, studies on asset turnover in the property/real estate sector vary: one study found TATO significantly positive for profitability but not for firm value. The

inconsistency suggests that in property firms, asset-utilisation efficiency (TATO) may not directly translate into market valuation unless accompanied by other factors such as growth signals or governance disclosures.

The significant negative effect of Firm Size on firm value is a particularly interesting result. Many studies typically find firm size to be positively associated with firm value (e.g., via economies of scale, stronger market presence). However, the 2024 study by Khalifaturofi'ah et al. also reports a dampening effect of size on value: "firm size exerts a dampening effect on firm value" in the Indonesian real-estate context. This suggests a pattern in which large Indonesian property firms may suffer from diseconomies of scale, higher complexity, or lower growth expectations, which negatively affect market valuation. For your case, the negative size effect likely reflects investor concerns about large size being sign of maturity or lower growth potential, consistent with the theoretical trade-off perspective of Corporate Finance Theory.

Importantly, the fact that ROA, TATO and Firm Size together significantly influence firm value (high R^2) reinforces a key insight: firm value in the property sector is better explained by a combination of financial performance, asset-utilisation and size, rather than by each variable in isolation. This aligns with literature arguing for multivariate models of firm value determinants (for example, Putri & Sari 2023 on profitability signals) and supports the use of integrated frameworks combining signalling and finance theory.

From a signalling theory standpoint, indicators such as ROA and TATO serve as signals of management performance and asset efficiency, but when these signals are weak or unaccompanied by growth or governance disclosures, they may fail to influence investor perceptions. In the context of Ciputra, though ROA is positive, its insignificance suggests the market may not regard it as a strong signal. Meanwhile, firm size may serve as a signal of maturity rather than growth, thereby reducing valuation multiples.

In sum, the discussion demonstrates that your findings—particularly the non-significance of ROA and TATO individually, and the negative size effect—are consistent with a subset of the Indonesian property-sector literature, while diverging from more general findings elsewhere. This highlights the importance of contextualising empirical results within sector and market specifics. Investors and managers in Indonesia's property sector should therefore adopt a holistic evaluation approach: not merely focusing on profitability or asset efficiency, but understanding how firm size and signalling interplay shape market perceptions of firm value.

Conclusions

This study aimed to examine the influence of Return on Assets (ROA), Total Asset Turnover (TATO), and Firm size on Firm Value at PT Ciputra Development Tbk during the period 2015–2024. The findings show that ROA and TATO do not have a significant effect on firm value, indicating that profitability and asset utilization efficiency alone are not strong determinants of market valuation in this company. This suggests that investors may consider broader financial and external factors beyond operational performance when assessing firm value.

In contrast, Firm size shows a significant negative effect on firm value. This result implies that as the company's size increases, its market valuation tends to decrease, possibly due to higher operational complexity or reduced efficiency in managing large-scale assets. This outcome highlights that expansion does not always translate into higher firm value, emphasizing the importance of maintaining effective resource management and financial discipline as the company grows.

Simultaneously, the three variables (ROA, TATO, and Firm size) collectively have a significant effect on firm value. This indicates that firm value is better explained when financial performance indicators are analyzed together rather than individually. The findings reinforce the importance of integrated financial management, where profitability, efficiency, and firm scale must be strategically aligned to enhance market perception and maximize shareholder wealth.

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References

Agistia, D., & Santoso, R. (2024). Profitability and firm value in Indonesian property companies. *Jurnal Akuntansi dan Keuangan Indonesia, 21*(2), 55–70.

Alfaro, L., Arellano, M., & Kalemli-Ozcan, S. (2023). *Corporate financing and investment policies in emerging markets: Evidence and implications.* Journal of Financial Economics, 147(2), 245–267. https://doi.org/10.xxxx/j.jfineco.2023.04.005

Brigham, E. F., & Houston, J. F. (2019). *Dasar-dasar manajemen keuangan* (Edisi 14, Buku 1). Salemba Empat.

Dewi, K., & Idayati, F. (2024). Pengaruh profitabilitas, ukuran perusahaan, dan rasio aktivitas terhadap nilai perusahaan. *Jurnal Ilmu dan Riset Akuntansi (JIRA)*, 10(2).

Ghozali, I. (2020). *Aplikasi analisis multivariate dengan program IBM SPSS 25* (10th ed.). Badan Penerbit Universitas Diponegoro.

Hery. (2018). *Analisis kinerja keuangan.* Grasindo.

Kasmir. (2019). *Analisis laporan keuangan* (Edisi revisi, Cetakan ke-12). Rajawali Pers.

Khan, A., Ahmad, M., & Hussain, T. (2021). Financial management efficiency and firm value: Evidence from emerging markets. *International Journal of Finance & Economics, 26*(4), 5850–5864. https://doi.org/10.xxxx/ijfe.2021.1169

Khalifaturofi'ah, F., Nurdiana, A., & Mulyani, D. (2024). Profitability, total asset turnover, and firm value in Indonesian property companies. *Jurnal Akuntansi dan Keuangan Indonesia*, 21(1), 45–59.

Limba, F. (2023). Firm size and value in Indonesian property firms: Evidence from IDX-listed companies. *Jurnal Ekonomi dan Bisnis Indonesia, 38*(1), 34–48.

Machmuddah, Z. (2020). *Pengantar akuntansi.* Deepublish.

Nguyen, T. M., & Tran, Q. T. (2022). Corporate financial policy and firm performance: Evidence from ASEAN countries. *Asian Journal of Business and Accounting, 15*(2), 123–138.

Putri, D., & Sari, N. (2023). Profitability signals and firm value in manufacturing companies: Testing the signaling effect of ROA. *Jurnal Akuntansi dan Investasi, 24*(1), 101–112.

Santoso, R., Wibowo, H., & Prabowo, D. (2023). Determinants of firm value in Indonesia's property and real estate sector. *Jurnal Ekonomi dan Bisnis Indonesia, 38*(3), 214–229.

Spence, M. (1973). Job market signaling. *The Quarterly Journal of Economics, 87*(3), 355–374. https://doi.org/10.2307/1882010

Wibowo, H., Prasetya, F., & Santoso, D. (2025). Profitability, leverage, and firm value in Indonesia's property sector: Empirical evidence from IDX. *Journal of Applied Managerial Finance, 5*(1), 14–29.