

# Fundamental and Technical Analysis of PT Astra International Tbk's Financial Performance for the 2020-2024 Period

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**Abstract.** The purpose of this study is to evaluate the financial performance of PT Astra International, Tbk in the 2020–2024 period through fundamental and technical analysis approaches. Data sources include annual financial reports and stock price history compiled from the Indonesia Stock Exchange (IDX). Fundamental analysis was conducted using profitability, liquidity, solvency, and activity ratios, while technical analysis was conducted using the *moving average (MA) method*. The results of the study indicate that PT Astra International Tbk has healthy financial performance and a positive stock price trend, including a 71% increase in EPS, a surge in dividend yield to 12.59% in 2024, and a post-pandemic profit recovery trend. Although stock prices have stagnated since 2022, technical analysis provides positive signals approaching mid-2025. This study provides a comprehensive overview for investors and management in making investment decisions.

**Keywords:** Fundamental Analysis, Technical Analysis, Financial Performance, Astra International, Stocks

## 1. INTRODUCTION

In the world of investment and finance, analyzing a company's performance is crucial as a basis for investment decision-making. One major Indonesian company that has attracted the attention of investors is PT Astra International Tbk (ASII). As a multinational corporation, Astra International manages various integrated strategic business lines, ranging from the automotive and agribusiness sectors to financial services, information technology, and logistics and infrastructure [1]. With a highly diverse business structure and large scale of operations, it is important to evaluate the company's financial performance comprehensively and systematically. Based on financial ratio data for the 2020-2024 period, ASII shows an improvement in fundamental performance, particularly in terms of profitability. This is evident in the growth of *EPS (Earnings Per Share)* which increased from 491.01 in 2020 to 839.90 in 2024, as well as an increase in *dividend yield* from 3.05% to 12.59% in the same period [2]. Profitability ratios such as *ROE*, *ROA*, and *NPM* also improved, indicating improved operational efficiency and capital management. However, from a technical perspective (stock price movements), ASII's stock performance does not yet reflect a strong fundamental condition. Based on stock price movement data over the past 5 years, ASII shares have experienced a decline of -24.4%, and in the past year they have fallen -6.3% [3]. [3] This indicates a gap between the intrinsic value based on fundamental analysis and market perception of ASII shares.

This phenomenon is interesting to study further, considering that ASII shares continue to show good operational performance and dividend distribution, but are not accompanied by a significant increase in share prices [4]. By analyzing both the fundamental (financial reports, financial ratios, fair value of shares) and technical (price trends, volume, and other technical indicators) aspects, it is hoped that a comprehensive picture of ASII's share performance and considerations in making investment decisions can be obtained.

**Table 1.** Stock Price Performance

No.	Code	6M	YTD	1Y	3Y	5Y
1.	ASII	1.7%	-2%	-6.3%	-12.3%	-24.4%
2.	BNBR	38.5%	2.9%	-28.0%	-28.0%	-28.0%
3.	BHIT	-31.1%	-8.8%	-38.0%	-47.5%	-52.3%
4.	FOLK	-10.7%	0.0%	-15.3%	na	na
5.	ZBRA	-83.4%	-5.6%	-88.9%	-93.0%	-4.2%

Source: [www.idx.co.id](http://www.idx.co.id)

The table shows the stock price performance of five companies in the “Multi-sector Holdings” sector over various time periods: 6 months (6M), since the beginning of the year (YTD), 1 year (1Y), 3 years (3Y), and 5

years (5Y). In 6M there was an increase of 1.7%, in *YTD* there was a decrease of -2.0%, in 1Y there was also a decrease of -6.3% and in 3Y there was a decrease of -12.3% and in 5Y there was a decrease of -24.4%. This shows that short-term performance is stable, but the long-term trend shows a consistent decline [5]. Therefore, one of the main approaches in assessing the performance and prospects of this company to be better is through fundamental analysis and technical analysis. Fundamental analysis is an approach carried out by evaluating the company's financial statements, including financial ratios such as profitability, solvency, liquidity, and efficiency [6]. Through this analysis, investors can assess the financial health and prospects of the company to determine the right investment position (buy, sell, or hold). This fundamental approach not only focuses on internal data, but also considers external determinants such as macroeconomic conditions and government policies that impact the issuer's performance [7]. By understanding its performance, a company can make the right decisions to achieve its goals. In practice, ratio analysis serves as a comprehensive financial condition evaluation tool, both for the current period and future projections. The main indicators in this performance assessment consist of liquidity, profitability, solvency, and activity ratios.

The technical approach analyzes market behavior through historical price data to identify stock movement patterns and momentum [8]. This approach focuses its analysis on price movement configurations, transaction volume, and the use of various technical indicators such as Moving Average (MA), Relative Strength Index (RSI), and other derivative instruments. In the technical approach, *Moving Average* is categorized as one of the most frequently implemented indicators because of its ability to simplify short-term and long-term price fluctuations [9]. If a short-term price movement average (such as a 9-day *MA*) crosses a long-term average (such as a 15-day *MA*), a *golden cross* or *death cross* can occur as a buy or sell signal.

By combining both fundamental and technical approaches, investors gain a more comprehensive understanding of the company's condition and its investment potential. Based on this, this study focuses on analyzing the financial performance of PT Astra International, Tbk for the period 2020–2024 by applying a fundamental analysis approach to assess the company's financial health, and technical analysis (specifically the *Moving Average method*) to assess the tendency of stock price movements in the capital market. It is hoped that the results of this analysis can be a useful source of information for investors, academics, and related parties in making investment decisions on ASII shares. Based on these considerations, this study aims to analyze the financial health of PT Astra International, Tbk using financial ratio instruments.

## 2. METHODOLOGY

### 2.1 Fundamental Analysis

Fundamental analysis examines the intrinsic value of an asset through an in-depth review of its internal financial performance and the underlying macroeconomic conditions [10]. This analysis has the crucial goal of determining whether a stock is fairly valued by the market. This study applies fundamental analysis by reviewing ratios such as *ROA*, *ROE*, *Current Ratio*, *DER*, and *TATO*. The main focus is to assess the company's performance in terms of profitability, liquidity, solvency, and asset utilization efficiency.

#### 2.1.1 Liquidity Ratio

Liquidity is an indicator that measures an entity's ability to meet its short-term liabilities through the availability of current assets [11]. The higher the liquidity ratio, the better the company's ability to pay short-term debts. There are two main liquidity ratios, namely:

- a. *Current Ratio* (Current Ratio) to measure the ability to pay current liabilities with current assets.

$$\text{Current Ratio (CR)} = \frac{\text{aset lancar}}{\text{utang lancar}}$$

- b. *Quick Ratio* (Ratio Quick) to measure the ability to pay current liabilities without taking inventory into account (because inventory is less liquid):

$$\text{Quick Ratio (QR)} = \frac{\text{aset lancar} - \text{persediaan}}{\text{utang lancat}}$$

#### 2.1.2 Profitability

Ratio is an indicator to evaluate the efficiency of an entity in creating net profit from operational activities and the use of internal resources [12]. profitability main There are 3, namely :

- a. *Return on Assets (ROA)* to measure how effectively a company's assets generate net income:

$$\text{Return on Assets (ROA)} = \frac{\text{Laba Bersih}}{\text{Total Aset}} \times 100\%$$

- b. *Return on Equity (ROE)* to measure the rate of return on shareholder capital:

$$\text{Return on Equity (ROE)} = \frac{\text{Laba Bersih}}{\text{Modal Sendiri}} \times 100\%$$

- c. *Net Profit Margin (Profit Margin Net)* to measure the percentage of net profit from sales:

$$\text{Net Profit Margin (NPM)} = \frac{\text{Laba Bersih}}{\text{Penjualan}} \times 100\%$$

### 2.1.3 Solvency

Ratio solvency used For evaluate to what extent assets company financed by debt and ability entity For pay off all over obligation his finances at the time maturity [13]. This ratio is important for assessing the risk of bankruptcy. There are 2 main solvency ratios, namely:

- a. *Debt to Asset Ratio (DAR)* ie For measure percentage of total assets covered through debt evaluate risk finance and structure capital company .

$$\text{Debt to Asset Ratio (DAR)} = \frac{\text{total utang}}{\text{total asset}} \times 100\%$$

- b. *Debt to Equity Ratio (DER)* (Debt to Equity Ratio) to measure the comparison between debt and equity :

$$\text{Debt to Equity Ratio (DER)} = \frac{\text{total utang}}{\text{Modal Sendiri}} \times 100\%$$

### 2.1.4 Activity Ratio

Activity ratios are indicators to measure an entity's productivity in converting managed assets into sales volume effectively [14]. There are 3 main activity ratios, namely:

- a. *Inventory Turnover (Turnover) Inventory* used For evaluate efficiency operational company in manage stock goods , with measure frequency conversion supply become sale in One period accountancy .

$$\text{Inventory Turnover (IT)} = \text{Inventory Turnover} \frac{\text{Harga Pokok Penjualan}}{\text{Rata rata Persediaan}}$$

- b. *Receivables Turnover (Turnover) Receivables* ) to measure how quickly receivables are collected:

$$\text{Receivables Turnover (RT)} = \text{Receivables Turnover} \frac{\text{Penjualan kredit}}{\text{Rata rata piutang}}$$

- c. *Total Asset Turnover (TATO)* used For evaluate effectiveness company in utilize the entire asset base owned use optimize acquisition income sale in something period .

$$\text{Total Asset Turnover (TAT)} = \text{Total Asset Turnover} \frac{\text{Penjualan}}{\text{Total Aset}}$$

### 2.1.5 Technical Analysis

Technical analysis is a method for analyzing stock price movements and trading volume using charts and statistical indicators [15]. This method does not pay attention to the company's financial condition, but focuses on price trends and historical patterns. In this study, technical analysis was conducted using the 9- and 15-day *Moving Average (MA) indicators* , to identify buy and sell signals, as well as the direction of the stock price trend of PT Astra International, Tbk during the 2020–2024 period. Technical analysis was conducted using the *Moving Average (MA) indicator*, specifically the *Exponential Moving Average (EMA)* .

## 2.2 Moving Average

*Moving Average (MA)* is one of the most commonly used technical analysis indicators in the world of capital markets (stocks, *forex* , and others) [16]. *MA* is used to help smooth price data so that price trends are easier to identify. Simply put, *Moving Average* is the average of stock prices in a certain period that moves over time. For example, *MA 10* means the average price of the last 10 days, which will be updated daily by adding the newest price and removing the oldest price. Types of *Moving Average* :

- a. *The Simple Moving Average (SMA)* is an indicator calculated by averaging the arithmetic average of an asset's closing prices over a specified time period to smooth out price fluctuations and objectively identify trend direction. The calculation uses the following formula:

$$SMA_n = \left( \frac{H1 + H2 + \dots + Hn}{n} \right)$$

- b. *The Exponential Moving Average (EMA)* emphasizes the most recent price data to be more sensitive to market movements. This advantage allows market participants to identify trend shifts more quickly than other moving average indicators. The calculation uses the following formula:

$$EMA_t = \left( \frac{2}{n+1} \right) \times (P_t - EMA_{t-1}) + EMA_{t-1}$$

## 2.3 Financial Performance

Financial performance is a reflection of how well a company manages its resources and operations to generate profits and meet its financial obligations [15]. This performance is usually measured using financial ratios and other accounting indicators. In this study, Astra's financial performance was analyzed to determine whether the company experienced an increase or decrease from year to year based on its annual financial report.

## 2.4 Astra International

As an integrated public company, PT Astra International, Tbk operates a multi-sector business focused on the automotive industry, heavy equipment supply, financial services, information technology, and agribusiness [15]. As one of Indonesia's *blue chip companies*, Astra's shares are highly sought after by investors. The company has a significant influence on the Jakarta Composite Index (JCI) and is often used as a reference in capital market analysis.

## 2.5 Share

Shares are defined as securities instruments that serve as legal evidence of capital participation, either by individuals or legal entities, in a limited liability company [2]. Shareholders are entitled to dividends and potential profits from rising share prices. In the context of this research, Astra International shares are the object of analysis to determine whether or not the shares are suitable as an investment option based on fundamental and technical evaluations.

## 2.6 Research Methods

The method used in this research is descriptive quantitative, namely research focused on collecting, processing, and presenting financial data to provide an objective picture of a company's financial performance based on numerical data. This approach is used to explain the fundamental conditions and stock price trends of PT Astra International Tbk during the period 2021 to 2025 using historical data and financial ratios. The object of this study is the shares of PT Astra International Tbk (ASII) listed on the Indonesia Stock Exchange (IDX). The research focuses on the company's financial performance (fundamental analysis) and stock price movements (technical analysis) during the period 2020–2024. This study uses secondary data, where the processed data is the annual financial report of PT Astra International Tbk obtained from the official website of the Indonesia Stock Exchange ([www.idx.co.id](http://www.idx.co.id)) and the company's official website. Historical weekly stock price data from *the TradingView* and *Yahoo Finance platforms*. As well as literature and journals relevant to fundamental and technical analysis. Data analysis is carried out by calculating the asset value in the financial statements to obtain financial ratios, namely liquidity, profitability, solvency and activity ratios. Technical analysis is carried out using the *Moving Average (MA) indicator*, especially the *Exponential Moving Average (EMA)*.

## 3. RESULTS AND DISCUSSION

Based on the table below, which displays the financial ratios of PT Astra International, Tbk for the period December 2020 to December 2024. The following is an explanation of each ratio and trends during that period:

### a. Liquidity

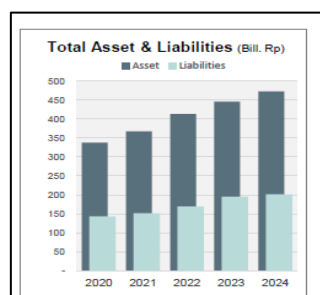
1. *The current ratio* has shown a downward trend, from 1.54 in 2020 to 1.33 in 2023–2024. This indicates a decline in the company's capacity to cover its short-term liabilities. However, the ratio remaining above 1 indicates that the company's liquidity remains adequate.

- b. Leverage (Solvency):
1. *DAR (Debt to Asset Ratio)* is relatively stable at around 0.41–0.44, meaning the proportion of debt to assets remains under control.
  2. *The Debt to Equity Ratio (DER)* decreased from 0.73 in 2020 to 0.70 in 2022, but then rose slightly to 0.78 in 2023 and then dropped again to 0.74 in 2024. This indicates relatively stable debt management with minor fluctuations.
- c. Profitability
1. *EPS (Earnings per Share)* increased significantly from 491.01 (2020) to 839.90 (2024).
  2. *PER (Price to Earnings Ratio)* decreased from 12.27 (2020) to 5.83 (2024), indicating that the stock is increasingly undervalued compared to earnings per share.
  3. *ROA (Return on Assets)* increased from 5.49% (2020) to a peak of 9.98% (2023), then slightly decreased to 9.18% (2024).
  4. *ROE (Return on Equity)* rose from 9.50% (2020) to 17.77% (2023), then A little down to 15.99% (2024).
  5. *GPM, OPM, and NPM* also showed improvement, reflecting the company's improved operational efficiency and profitability.
- d. Market Valuation
1. *BV (Book Value)* increased from 4,828 (2020) to 6,706 (2024).
  2. *PBV (Price to Book Value)* decrease from 1.25 (2020) to 0.73 (2024). This indicates that the stock is trading below its book value, which could be a signal of undervaluation.
- e. Dividend
1. *DPS (Dividend per Share)* increased significantly from 184 (2020) to 650 (2023) and slightly decreased to 617 (2024).
  2. *The DPR (Dividend Payout Ratio)* dropped to 39.99% (2022), then jumped to 84.06% (2023) and slightly decreased to 73.46% (2024).
  3. *Dividend Yield* increased drastically from 3.05% (2020) to 12.59% (2024), which is very attractive for dividend investors.

**Table 2.** Financial Ratios of PT Astra International, Tbk (During the period Dec 200-Dec 2024)

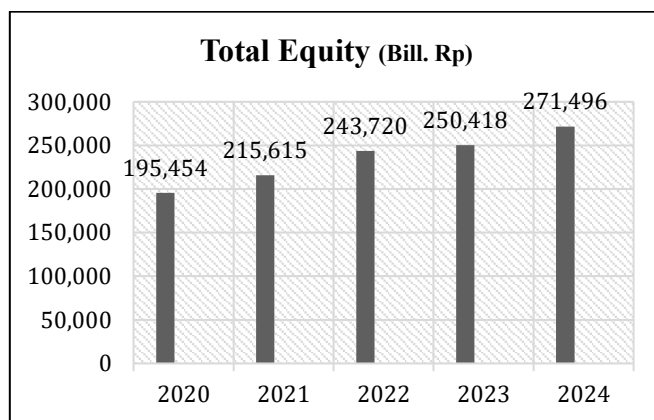
Ratios	Dec-20	Dec-21	Dec-22	Dec-23	Dec-24
Current Ration (%)	1.54	1.54	1.51	1.33	1.33
DAR (x)	0.42	0.41	0.41	0.44	0.43
DER (x)	0.73	0.70	0.70	0.78	0.74
EPS (IDR)	491.01	422.44	705.20	773.28	839.90
PER (x)	12.27	13.49	8.08	7.31	5.83
BV (IDR)	4,828	5,326	6.02	6,186	6,706
PBV (x)	1.25	1.07	0.95	0.91	0.73
ROA (%)	5.49	6.97	9.78	9.98	9.18
ROE (%)	9.50	11.87	16.58	17.77	15.99
GPM (%)	22.03	21.86	23.26	23.16	23.24
OPM (%)	7.35	10.94	14.00	13.98	13.33
NPM (%)	10.61	10.96	13.41	14.06	13.72
DPS (%)	184.00	246.00	282.00	650.00	617.00
DPR (%)	37.47	58.23	39.99	84.06	73.46
Dividend Yield (%)	3.05	4.32	4.95	11.50	12.59

Source [www.idx.co.id](http://www.idx.co.id)



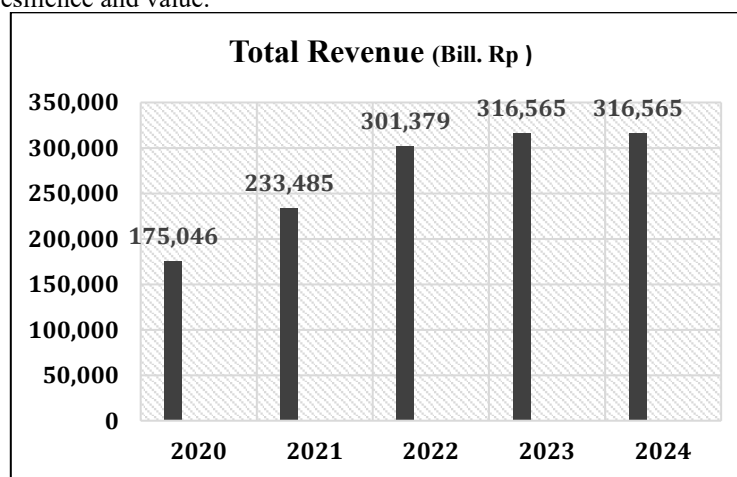
**Figure 1.** Graph of Total Assets and Liabilities  
 Source: [www.idx.co.id](http://www.idx.co.id)

The figure above shows total assets and liabilities, which the company continues to increase annually, reflecting business growth and asset expansion. The increase from approximately 350 trillion rupiah (2020) to nearly 475 trillion rupiah (2024) indicates an increase in the company's value and production/investment capacity. Total liabilities also increased from approximately 150 trillion rupiah (2020) to approximately 200 trillion rupiah (2024). Despite the increase in liabilities, the increase in assets remained higher, indicating healthy capital structure management. Compared with the Debt to *Asset Ratio (DAR)* and *Debt to Equity Ratio (DER)* data in the previous table, this increase in liabilities did not result in a significant increase in the debt ratio. This means the company uses debt in a measured manner to support asset and operational growth, rather than relying entirely on loans.



**Figure 2.** Graph *Total Equity (Bill. Rp)*  
 Source [www.idx.co.id](http://www.idx.co.id)

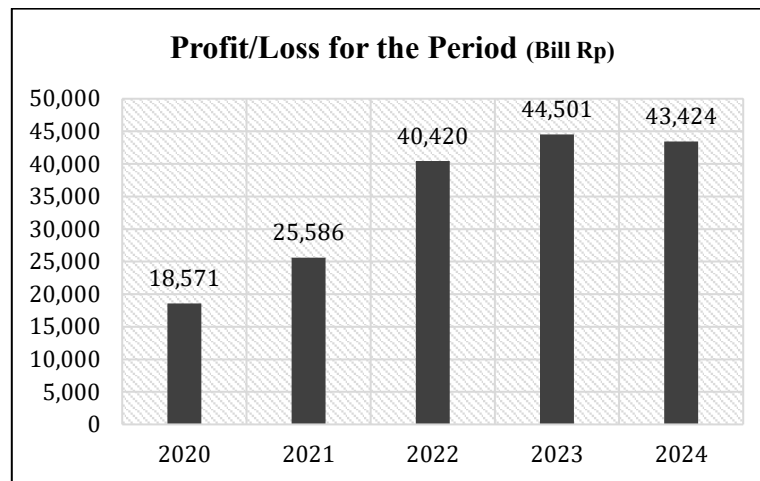
The image above display chart the stem shows total equity growth of PT Astra International, Tbk in unit billion rupiah over five years lastly , namely from 2020 to 2024. Data shows that the company's equity has experienced consistent growth each year during the observation period. The most significant increase occurred between 2021 and 2022, with an increase of approximately IDR 28.1 trillion. Solid Financial Performance. Increased retained earnings, growth in the company's net assets, and the possibility of additional capital from shareholders or new investments. This trend indicates that PT Astra International, Tbk is able to manage its resources efficiently and generate sustainable profits. This is a positive signal for investors regarding the company's long-term resilience and value.



**Figure 3.** Graph *Total Revenue*  
 Source [www.idx.co.id](http://www.idx.co.id)

The graph above depicts the total revenue of PT Astra International Tbk from 2020 to 2024, in billions of rupiah (Rp billion). Astra's revenue showed a significant annual growth trend from 2020 to 2022. Revenue nearly doubled from Rp175.05 trillion (2020) to Rp301.38 trillion (2022). In 2023 and 2024, total revenue stagnated at Rp316.565 trillion. This could indicate a consolidation phase, where the company maintained its

highest sales performance ever achieved, albeit without additional growth. The significant surge from 2020 to 2022 indicates a strong recovery after the decline caused by the COVID-19 pandemic, which had a major impact on the automotive sector and other industries that are Astra's main focus.



**Figure 4.** Total Net Profit Graph  
 Source [www.idx.co.id](http://www.idx.co.id)

This figure illustrates the net profit trend of PT Astra International Tbk for the 2020–2024 period using a bar chart to provide an overview of the company's annual profitability development. Data is presented in billions of rupiah. In 2020, Astra's net profit experienced a sharp decline to only IDR 18.57 trillion, due to the impact of the *COVID-19 pandemic* which impacted almost all business lines. However, recovery occurred quite quickly starting in 2021, where profits increased to IDR 25.59 trillion, reflecting the effectiveness of the company's adaptation strategy. Net profit experienced a significant surge in 2022, reaching IDR 40.42 trillion, and continued to grow to IDR 44.50 trillion in 2023. This indicates Astra's success in maximizing the momentum of national and global economic recovery, as well as the improving performance of the automotive and heavy equipment sectors. In 2024, net profit decreased slightly to IDR 43.42 trillion. This decline is considered minor and remains within the high performance range, which could be caused by operational costs, exchange rate fluctuations, or other external pressures.



**Figure 5.** Stock Price Movements and EMA Indicators  
 Source <https://www.tradingview.com/chart/Neoq3jMA/?symbol=IDX%3AASII>

The image above shows a stock price chart for PT Astra International, Tbk (ASII) over a *weekly* period in 2024–2025, using the *Trading platform. View*. This chart displays two main technical indicators, namely:

- EMA 9* (red line), which is the *Exponential Moving Average* with a period of 9, is used to identify short-term trends.
- EMA 15* (blue line), which is the *Exponential Moving Average* with a period of 15, is used to identify intermediate trends.

It can be seen that the stock price movement from early 2025 to June 2025 tended to be flat or sideways, ranging between Rp 4,700 and Rp 4,900 per share. This indicates a market condition that has not yet provided a definitive direction, either bullish or bearish. When *the 9-EMA* (red) is below *the 15-EMA* (blue), this indicates a bearish signal or selling pressure, as seen in February–March 2025. When *the 9-EMA* begins to approach or cross *the 15-EMA* from below, as began to occur in May–June 2025, this is an early bullish signal, indicating a potential trend reversal to the upside.

*Volume* in 2024 increased to 1.63 billion shares, reflecting investor enthusiasm despite stagnant prices. The closing price on the chart was IDR 4,780, down 70 points (-1.44%) from the previous price, indicating selling pressure during the week. Although the price is slightly below both *EMA lines* (4,801 and 4,807), this position is so close that it still allows for confirmation of a buy signal if an increase occurs the following week.

**Table 3.** Stock Price

Year	Highest	Lowest	Closing	Adj. Close*	Growth (%)
2020	7,200	3,280	6,025	6,025	-
2021	6,800	4,650	5,700	5,700	-5%
2022	7,575	5,300	5,700	5,700	0%
2023	6,925	5,225	5,650	5,650	-1%
2024	5,700	4,290	4,900	4,900	-13%

Source <https://www.tradingview.com/chart/Neq3jMA/?symbol=IDX%3AASII>

The table above shows that the highest share price occurred in 2022, at Rp7,575. The lowest price occurred in 2020, at Rp3,280. Closing prices tended to decline, with negative annual growth from 2021 to 2024. 2024 recorded the largest decline, at -13% compared to the previous year.

**Table 4.** Trading Data Prices

Year	Volume ('000 lots)	Value (billion IDR)	Frequen cy	Trading Day
2020	14,859	74,691	2,214	242
2021	14,012	78,633	2,485	247
2022	13,358	85,381	2,018	246
2023	12,109	74,141	1,960	239
2024	16,312	81,180	3,137	237

Source <https://www.tradingview.com/chart/Neq3jMA/?symbol=IDX%3AASII>

The image above shows a table showing capital market trading data on the Indonesia Stock Exchange from 2020 to 2024, comprising several key indicators: Volume, Value, Frequency, and Trading Days. The table shows the number of shares traded in thousands of lots.

Where:

- 1 lot = 100 shares, so for example: 2024: 16,312 thousand lots = 1,631,200,000 shares. Trend: Volume increased significantly in 2024 compared to previous years.
- Total value of stock trading transactions in billions of rupiah. In 2024: IDR 81,180 billion = IDR 81.18 trillion. Trend: Highest in 2022 (IDR 85.381 trillion), but rising again in 2024 after a decline in 2023.
4. Frequency, indicating the number of transactions occurring (in thousands). 2024: 3,137 thousand = 3,137,000 transactions. Trend: Highest in 2024 → could indicate increased investor participation (especially retail).
- The number of active trading days (excluding holidays and weekends). Varies slightly each year depending on the calendar. For example: 2020 = 242 days, 2024 = 237 days.

## 4. CONCLUSION

PT Astra International Tbk's financial performance shows significant improvements in profitability and dividend distribution. Although liquidity has declined slightly, profitability and efficiency have increased. Its shares are increasingly undervalued, with declining PBV and PER. The high dividend yield makes it attractive to long-term investors. This study concludes that PT Astra International Tbk has stable and continuously improving financial performance during the 2020-2024 period, both from a fundamental and technical perspective. Positive financial ratios and technical signals indicating an upward trend strongly indicate that Astra shares are worthy of

consideration as a medium- to long-term investment option. Going forward, investors and financial analysts can utilize this dual approach to evaluate other companies, especially in the face of uncertain market conditions.

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