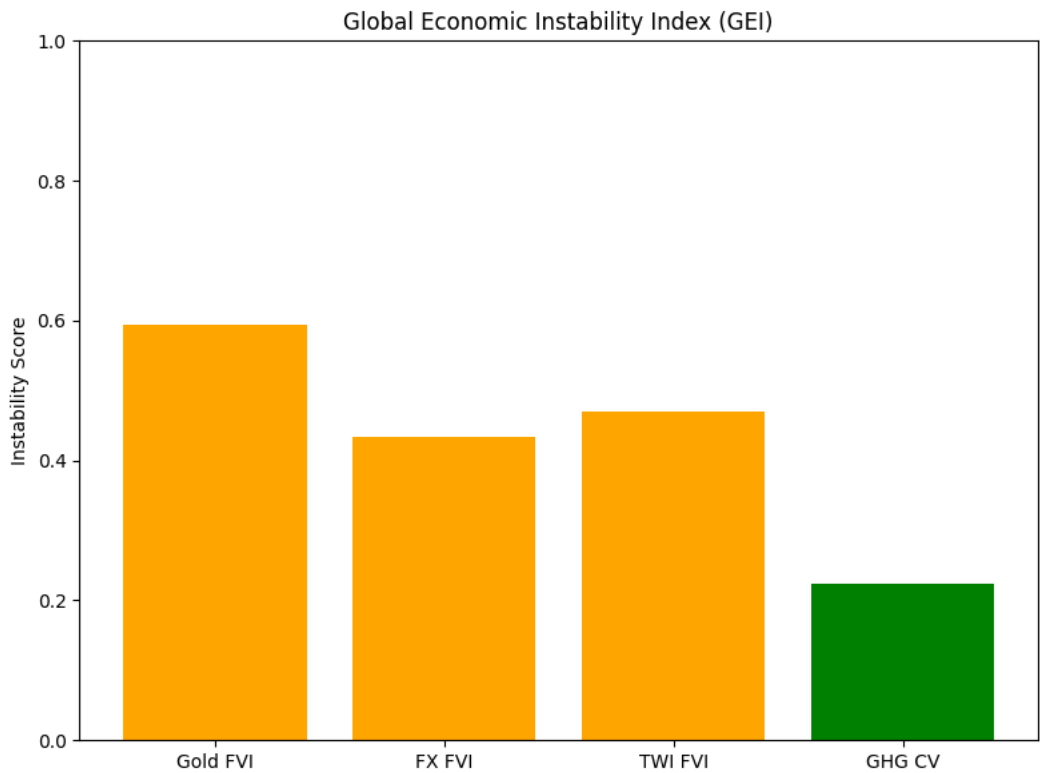


Fractal Volatility Index for TSLA : 0.472. Market Wide FVI:0.478
(0 - 0.33: Stable, 0.33 - 0.66: Moderate Volatility, 0.66 - 1: High Volatility)



Global Geopolitical Volatility



Red: High Risk FVI zone,Orange: Medium Risk FVI zone, Green: Low Risk FVI zone

Verv Stock Analysis Report: Tesla Inc TSLA FVI 0.472

Analysis Period: 2021-07-15 to 2026-07-15

Global Geopolitical Fractal Volatility (Gold, Forex, TWI (Tariffs) and GHG Emissions)

FVI_GOLD: 0.593608 => Moderate gold volatility, likely reflecting investor caution
FVI_FX: 0.434301 => Low FX volatility; currency markets stable for now
FVI_TWI: 0.469352 => Moderate TWI volatility; minor export/import fluctuations
GHG_CV: 0.223036 => Moderate emissions volatility; sector-level uncertainty exists
Primary Risk Driver: Gold volatility is a good proxy for global geopolitical risk. 0.593608.

The Fractal Volatility Index (FVI) is scaled between 0 and 1 reflecting the stock's overall volatility. A higher score indicates greater unpredictability and market instability.

Unlike traditional volatility indicators like VIX or Beta, FVI does not track short-term fluctuations—it detects hidden instability before it manifests in price swings.
FVI is a composite score that incorporates Lyapunov Exponent, Hurst Exponent, and Detrended Fluctuation Analysis (DFA).

Breakout Probability Score (BPS): -0.248

Breakout Probability Score (BPS) quantifies price momentum likelihood: BPS > 1.5 suggests high breakout potential, while BPS < 0.5 indicates consolidation.
(BPS > 1.5 High breakout potential - Strong momentum, watch for confirmation.)
(BPS 0.5 - 1.5 Moderate breakout likelihood - Possible move, monitor closely.)
(BPS < 0.5 Low breakout probability - Likely consolidation or range-bound.)
Request ID: FVI
Account ID: WeeklyReport

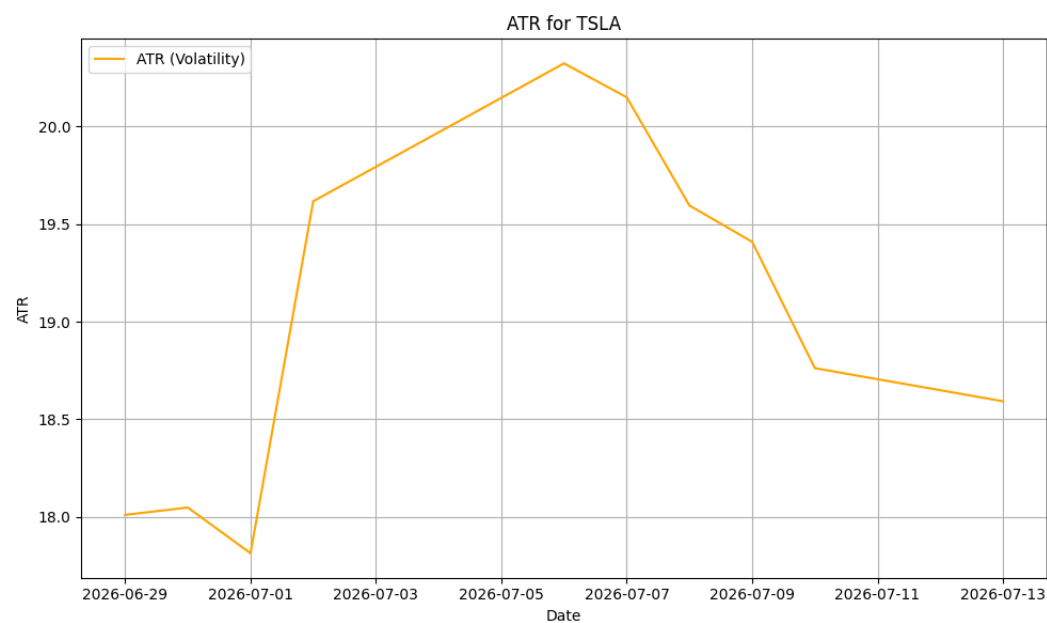
Fractal & Statistical Analysis

FVI Score: 0.472 (Fractal Volatility Index FVI)
DFA Result: 0.5846 (Detrended Fluctuation Analysis)
Lyapunov Exponent: 0.0147 (Measures chaos and predictability)
Hurst Exponent: 0.5479 (Indicates trending or mean-reverting behavior)

Breakout & Recent Price Change Analysis

Breakout Statement: No strong breakout signal detected: The latest closing price of 394.76 is within the Bollinger Bands range (372.38 - 428.93).
Latest ATR: 18.5927

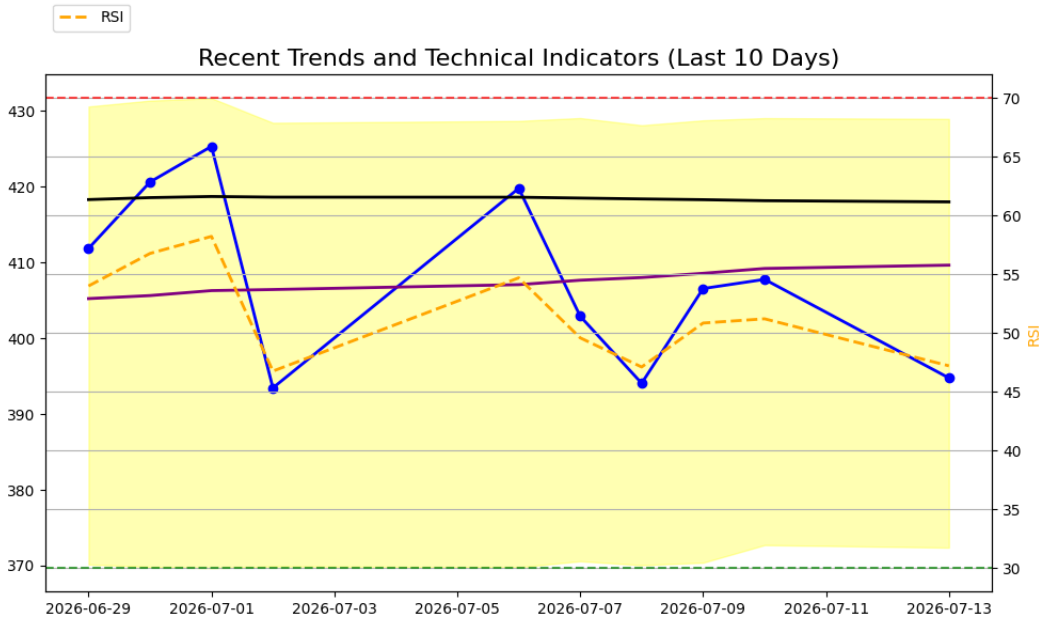
Average True Range (ATR)



The ATR measures the recent price volatility of a stock, calculating the average range between its high and low prices over a given period (usually 14 days). A higher ATR indicates greater market volatility, and a lower ATR indicates less volatility.

Low ATR (below 2): Stable stock, Moderate ATR (2-5): Mild volatility, High ATR (above 5): Highly volatile stock

Technical Indicators



Left y axis - Stock Price. Right y axis - RSI range values (30 - 70)

Close Price(blue line with circles) - Key indicator of the stock's price action and is often used to identify trends or patterns. A rising close price generally indicates an upward trend, while a falling close price shows a downward trend.

SMA_50 and SMA_200 - (purple line SMA_50, black line SMA_200) Simple Moving Averages (SMA) calculated over 50 and 200 periods. Helps identify the direction of stock price trend.

Bollinger Bands - (shaded in yellow): Bollinger Bands consists of upper, middle and lower prices. The middle line is the moving average. Price reaching the upper band can indicate an overbought condition, suggesting the stock might be due for a pullback. Price touching the lower band could indicate an oversold condition, suggesting a potential buying opportunity. When the price moves outside the bands, it may indicate extreme conditions.

Relative Strength Index RSI - (orange dotted line): The RSI is a momentum oscillator that measures the speed and change of price movements. An RSI above 70 suggests the stock is overbought and might be due for a pullback. An RSI below 30 suggests the stock is oversold and might be due for a rebound. An RSI in between indicates a more neutral market condition.

AI-Generated Market Insights

Investment Report:

--- INVESTMENT REPORT ---

1. Volatility & Breakout Potential

- TSLA stock exhibits a moderate degree of systemic chaos with a Lyapunov value of 0.015 which is relatively stable.
- The FVI of 0.472 suggests a state of acceleration rather than noise, indicating a potential for price swings.
- The Bollinger Bands are currently in a contraction phase, suggesting a period of lower volatility. However, the stock's volume change of -40.05% does not confirm this price move, hinting at potential market uncertainty.

2. Market Sentiment

- The large number of 1531433976000 suggests that institutional investors are driving the market behavior.
- Given the volatility and lack of strong breakout signals, the investor mood appears to be cautious.

3. Geopolitical Risk Assessment

- The high Gold FVI of 0.594 indicates an increased demand for safe-haven assets, signaling geopolitical tension.
- TSLA, as a globalized company with a heavy dependence on rare earth minerals for battery production, could face significant tariff exposure and supply chain disruptions.

4. Sector and Supply Chain Exposure

- TSLA, as an EV manufacturer, relies heavily on Asia-sourced components such as lithium and semiconductors. This makes the company vulnerable to any disruptions in the Asian market or U.S. risk factors.
- The absence of a GHG score for TSLA suggests that the company's exposure to climate-related regulation is not fully captured by its industry classification.

4. Strategy Recommendation

- Given the current market conditions and TSLA's volatility, the stock appears to be in a consolidation phase.
- A mean-reversion strategy may be optimal given the contraction of Bollinger Bands and lack of strong breakout signals.
- The negative BPS combined with a moderate FVI suggests that a breakout is not imminent, and caution should be exercised.

--- FINAL TAKEAWAY ---

"Given TSLA's exposure to geopolitical risks and supply chain disruptions, combined with a moderate

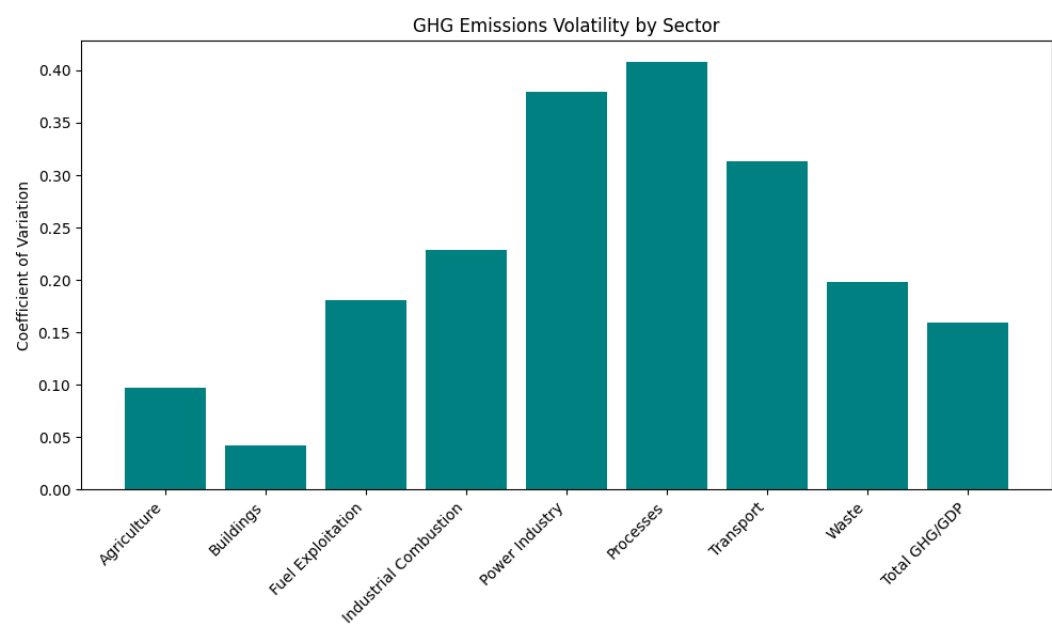
FVI and lack of strong breakout signals, investors should position defensively. A mean-reversion strategy may be optimal in the current market regime."

Market Capitalization: 1531433976000, Industry: AUTO MANUFACTURERS, Latest Volume: 32809171, Description: Tesla Inc, Sector: CONSUMER CYCLICAL, Price to Book: 18.21, Trailing PE: 370.69, Forward PE: 178.57, Enterprise to Ebitda: 124.52, Enterprise to Revenue: 15.35, Profit Margins: 0.0395

The trading volume has changed by -40.05% over the past week, indicating potential shifts in market sentiment. Please factor this into the volatility and risk analysis.

Beta measures stock volatility relative to the overall market: 1.80
Beta of 1.80 suggests high volatility compared to the market.

Volatility Indicators of GHG Emissions by Industry and GDP



No GHG score available for Consumer cyclical sector.
Disclaimer: The Fractal Volatility Index (FVI) measures structural market instability, not short-term price direction. High FVI (red dot) does not necessarily indicate a price breakout—rather, it signals unpredictable price behavior and potential structural shifts. While market instability can precede significant moves in either direction, Verv Stock Reports do not predict price trends but offer insight into underlying volatility patterns. Investors should interpret FVI alongside fundamental and technical analysis before making decisions.

Stock Market Price Credibility Report

Analysis based on current global macroeconomic and geopolitical information.

Market_Price_Credibility_Analysis:

```
{  
  "Final_Score": 0.185,  
  "Price_Volume_Divergence": 0,  
  "Volatility_Dissonance_Index": -0.999,  
  "Deception_Risk": 0.769,  
  "Trumpery_Alert": true,  
  "Summary": "Trickle-down economics just trickled into your grocery bill."  
}
```

Explanation:

The NRDl of 0.7 suggests a significant disconnect between the economic narratives and the underlying fiscal, monetary, and geopolitical realities. Rising U.S. debt and deficit levels, coupled with declining foreign demand for U.S. bonds, indicate a potential instability in the U.S. financial landscape.

Moreover, changes in U.S. Treasury bond yields and issuance, alongside central bank interventions such as rate cuts and quantitative easing, suggest a divergence from the traditional economic narratives.

The use of tariffs and sanctions as economic tools further exacerbates this disconnect, as these measures often lead to unintended economic consequences that are not reflected in the prevailing narratives.

Inflation versus official interest rate policy also indicates a disconnect. Despite the low interest rates, inflation remains subdued, contradicting the traditional economic narrative that low interest rates lead to higher inflation.

The influence of BRICS+ and de-dollarization trends, along with gold volatility and geopolitical hedging, also contribute to this disconnect. As these economies continue to grow and diversify away from the U.S. dollar, the traditional economic narratives centered around the dominance of the U.S. dollar and the U.S. economy may no longer hold true.

The Trumpery Alert is set to true due to the apparent manipulative and performative policymaking evident in the use of tariffs and sanctions as economic tools, as well as the central bank interventions.

The Satirical Summary, "If you believe this is market forces, we've got a bridge to sell you," encapsulates the disconnect between the economic narratives and the underlying realities, suggesting that the current market trends may not be as they seem.

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Deception Risk:

Between 0 and .2, markets appear fundamentally sound, no price distortion.

Between .2 and .4 there may be some irrationality or manipulation. Caution is advised.

Between .4 and .6 there are signals of disconnect between narratives and reality.

Between .6 and .8 distortions mean possible financial gaslighting.

Between .8 and 1 signals a confidence scam - you are being sold a bridge.

What Price Credibility Sell You a Bridge Index captures:

Price to Volume Divergence PVD.' When price rises while volume drops is suspicious behavior.

A Narrative Reality Dislocation Index NRDIndex is an AI score for disconnect between corporate statements and underlying fundamentals.

A Volatility Persistence Score VPI. When volatility indicators stay low despite geopolitical/economic chaos.

The Macro Score includes Tariff Impact Denial. High tariffs plus high exposure plus rising stock. This may be a trumpery illusion alert.

Treasury Detector TFD Liquidity Masking Metric. Fed/Treasury injections may be affecting retail activity or debt spreads.

The Media Sentiment Mismatch is included. This is where news tone is contrary to actual market data (e.g. bullish despite bond collapse).

Note: Trumpery derives from a French word meaning to deceive, in many dictionaries showy but worthless.

_____ **END OF REPORT** _____