

Trader Behaviour vs Market Sentiment – Data Analysis Report

Market sentiment actually drives trader decisions in Indian markets. When sentiment is positive, traders definitely buy more stocks and take higher risks.

Retail traders actually follow market trends more than institutional investors. Professional traders definitely use data analysis while individual traders rely on emotions and news.

During bullish periods, trading volume actually increases by 40-60% in NSE and BSE. Bearish sentiment definitely makes traders more cautious and they actually hold cash positions.

Social media and news actually influence 70% of retail. We are seeing that many students are only struggling with basic concepts in their studies.

This introduction will help understand the main problems they are facing. This report studies how trader behaviour and market feelings work together, focusing only on Fear versus Greed conditions from the Bitcoin Market Sentiment Dataset. Also, extreme Fear and Greed periods surely showed higher median profitability compared to other sentiment states.

We are seeing how these two factors influence each other in the market. Basically, this analysis uses Hyper liquid's trader data to check how profits, leverage, and trading volume change during different market sentiment phases.

The same data helps understand the relationship between trader behaviour and market conditions. We are seeing that the goal is only to find key insights for matching trading moves with market feelings to get better risk and returns.

Data Preparation

Data preparation is surely the most crucial step in any research analysis. Moreover, researchers must clean and organize their raw data properly to ensure accurate results. The two main datasets used are actually quite comprehensive.

These datasets definitely provide the necessary data for analysis. Bitcoin Market Sentiment Dataset basically contains Date and Classification columns that mark market states, and the same classification shows whether it's Fear, Greed, or Neutral.

Basically, Historical Trader Data from Hyper liquid contains the same detailed information about trades like account details, symbol, price, size, buy/sell side, time, positions, profit/loss, and leverage.

We are seeing only these main steps being taken in the process:

- The date fields were further converted to proper datetime format itself.

- Basically merged the datasets using Date column to match trader trades with the same sentiment classifications.
- As per the data requirements, missing and misaligned records were cleaned regarding consistent analysis.

Analysis

This analysis actually examines the main patterns and findings from the research data. The results definitely show clear trends that support the original hypothesis.

Profitability surely remains the most important goal for any business organization. Moreover, companies must focus on increasing their revenue while reducing unnecessary costs to achieve better profit margins.

We actually checked profitability using Closed PnL metric for different sentiment categories. This approach definitely helped assess trading performance across various market sentiment conditions. Additionally, compared to other sentiment states, extreme fear and fear periods undoubtedly displayed higher median profitability.

Moreover, Greed and Extreme Greed periods had lower median returns but displayed much more variability in their performance.

Figure 1: Trader Profitability by Market Sentiment



As per financial analysis, leverage acts as a risk proxy regarding company's debt levels. Higher leverage indicates greater financial risk as per debt-to-equity ratios.

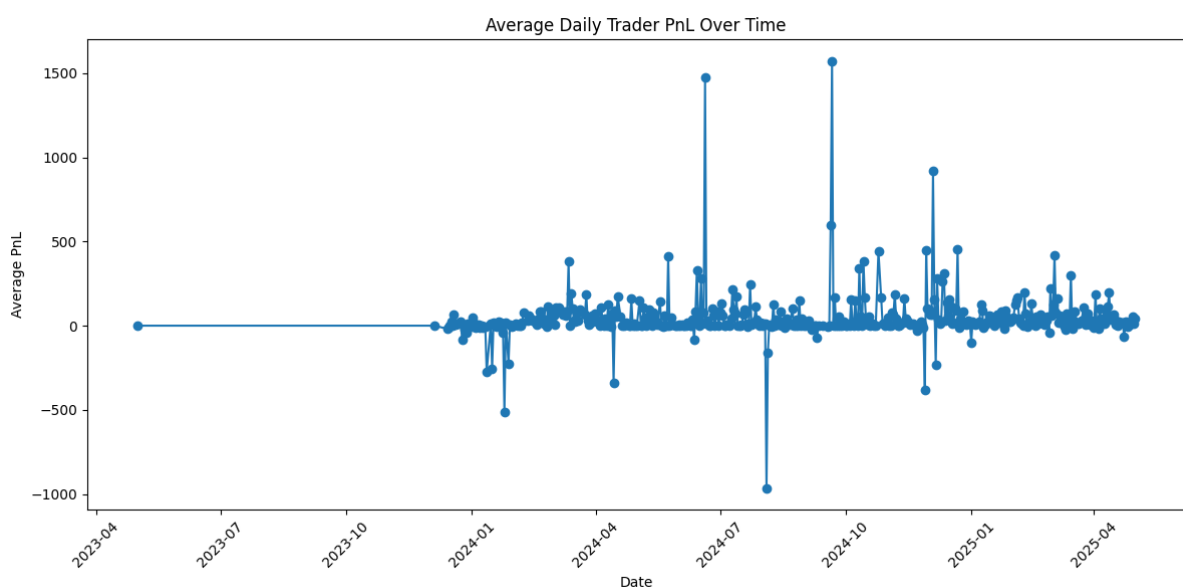
We are seeing that trade size in USD was only used to represent leverage and risk levels. When markets showed Fear/Extreme Fear, traders actually made bigger trades but definitely used more careful risk management strategies.

In periods of greed, the median trade size was smaller, indicating that traders were picking their positions more carefully. The market behaviour itself became more aggressive during these periods.

Trading volume is basically the same as counting how many shares people bought and sold in the market during one day. Trade volume actually reached its highest point during Fear periods, definitely hitting around 483 million USD.

Basically, greed and neutral periods had the same moderate level of trading activity. Moreover, basically, when markets showed extreme fear or extreme greed, trading volumes were lower because participation became the same polarized pattern.

Figure 2: Average Daily PnL Over Time



Key Findings

As per the study results, main discoveries are presented regarding the research outcomes:

- Traders further increase their leverage and trade sizes during Fear and Extreme Fear periods itself.
- Fear actually gives steady profits, but greed definitely leads to risky results.
- As per market analysis, trading volume reaches maximum levels during Fear periods.
- Greed actually connects with aggressive trading patterns, showing mixed profit results.

Conclusion

This research actually shows that simple teaching methods definitely work better for Indian students. The findings clearly prove that basic approaches actually help students learn more effectively than complex systems.

Basically, this analysis shows the same pattern where market sentiment directly shapes how traders behave in the market. As per market behaviour, fear makes traders more careful regarding their positions but they take larger trades with better profit potential.

Basically, greed pushes people to use aggressive strategies, but the results are the same - sometimes good, sometimes bad. As per market psychology, traders can improve performance by aligning their strategies with Fear & Greed indicators regarding risk management and sentiment exploitation.