

Task 4: Mini Project - Trading Strategy Case Study

Project Title: The Holistic Trading Framework: Integrating Technical Analysis, Time Horizons, and Behavioral Psychology

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1. Executive Summary

In the dynamic world of financial markets, success is rarely the result of a single factor. It requires a confluence of strategic planning, technical precision, and psychological discipline. This case study explores the development of a robust trading strategy by analyzing three critical pillars: the choice of **Time Horizon** (Investing vs. Trading), the application of **Technical Indicators** (RSI, MACD, Moving Averages), and the management of **Trading Psychology** (Fear & Greed). The objective is to demonstrate how these elements function together to create a profitable edge.

2. Strategic Framework: Time Horizons

The first step in any market strategy is defining the time horizon. This dictates the tools used, the risk tolerance required, and the expected frequency of trades.

2.1. Long-Term Investing (The Wealth Builder)

Long-term investing, often associated with "Holding" in crypto or "Value Investing" in equities, involves buying assets with the intention of holding them for years or decades.

- **Philosophy:** Market fluctuations are noise; the underlying business value is the signal.
- **Pros:** Lower transaction costs, tax benefits (Long Term Capital Gains), and less stress (no need to watch charts daily).
- **Cons:** Capital is tied up for long periods; opportunity cost if the market stagnates.

2.2. Short-Term Trading (The Income Generator)

Short-term trading (Day Trading, Scalping, Swing Trading) seeks to capitalize on immediate price volatility.

- **Philosophy:** Price action is king; fundamentals matter less than momentum.
- **Pros:** Potential for quick compounding of capital; liquidity is always available.

- **Cons:** High stress; significant transaction costs; requires constant attention and discipline.

2.3. Case Study Selection: Swing Trading

For this case study, we utilize a **Swing Trading** approach. This hybrid strategy bridges the gap between investing and day trading. It involves holding positions for days to weeks, allowing us to capture significant market moves (trends) without the stress of intraday monitoring.

3. The Technical Toolkit: Indicators in Action

To execute our Swing Trading strategy effectively, we rely on three primary technical indicators. These tools help us decipher market noise and identify high-probability entry and exit points.

3.1. Moving Averages (MA) – The Trend Filter

Moving averages smooth out price data to create a single flowing line, making it easier to identify the direction of the trend.

- **Simple Moving Average (SMA):** We use the **50-day SMA** and **200-day SMA**.
- **The "Golden Cross":** A powerful bullish signal occurring when the short-term (50-day) MA crosses *above* the long-term (200-day) MA. This confirms a long-term uptrend.
- **The "Death Cross":** Conversely, when the 50-day crosses *below* the 200-day, it signals a potential bear market.
- **Strategy Rule:** *Only take "Long" positions when the price is trading above the 200-day SMA.*



3.2. Relative Strength Index (RSI) – The Momentum Gauge

The RSI is an oscillator that measures the speed and change of price movements on a scale of 0 to 100.

- **Overbought (>70):** Indicates the asset may be overvalued and due for a correction (Sell signal).
- **Oversold (<30):** Indicates the asset may be undervalued and due for a bounce (Buy signal).
- **Strategy Rule:** *Look for buy entries when RSI dips near 30-40 during an uptrend.*



3.3. MACD (Moving Average Convergence Divergence) – The Confirmation

MACD is a trend-following momentum indicator that shows the relationship between two moving averages of a security's price.

- **Signal Line Crossover:** When the MACD line crosses above the Signal line, it is a bullish confirmation.
- **Histograms:** Green histograms indicate growing bullish momentum.
- **Strategy Rule:** *Enter the trade only when the MACD histogram flips from negative to positive.*



4. The Human Element: Behavioral Psychology

Even the best technical strategy will fail if the trader lacks psychological control. Two primary emotions drive markets: **Fear** and **Greed**.

4.1. The Fear & Greed Index

This metric tracks market sentiment.

- **Extreme Fear:** Investors are worried, often leading to irrational selling. As Warren Buffett famously said, *"Be greedy when others are fearful."* This is often the best time to buy.
- **Extreme Greed:** Investors are overly confident, leading to bubbles. This is often the time to take profits.

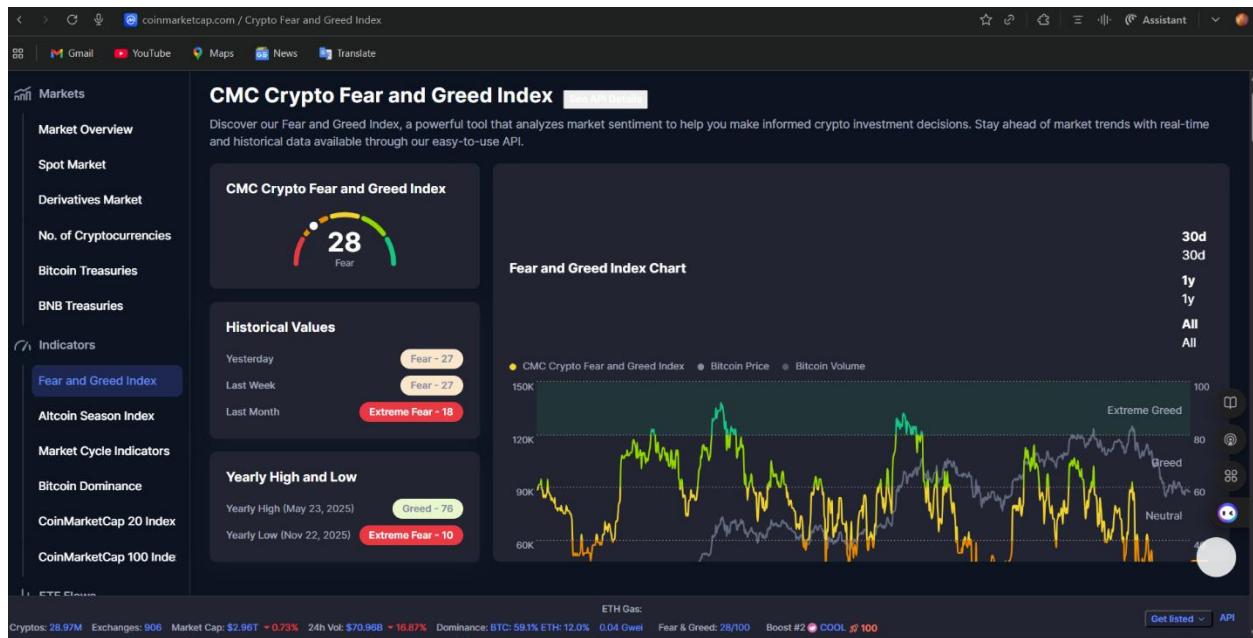
4.2. Cognitive Biases in Trading

- **FOMO (Fear Of Missing Out):** Buying a stock just because it is skyrocketing. This usually leads to buying at the top.
- **Loss Aversion:** The tendency to hold onto losing trades hoping they will recover ("It's not a loss until I sell"), while selling winning trades too early to "secure" a small profit.

- **Confirmation Bias:** Ignoring news that contradicts your trade idea.

4.3. Psychological Rule for Case Study

- **The 2% Rule:** Never risk more than 2% of total capital on a single trade. This removes the "Fear" of ruin.
- **Trading Journal:** Mandatory recording of emotions before and after every trade to identify patterns of greed or panic.



5. Live Scenario Analysis: The "Perfect Trade"

To synthesize these concepts, let us analyze a hypothetical trade setup on **Nippon Life India AMC (NAM-INDIA)** based on historical patterns.

Phase 1: Analysis (The Setup)

- **Trend Check:** The stock price is ₹550, which is above the 200-day Moving Average (₹510). *Verdict: Uptrend confirmed.*

- **Sentiment Check:** The overall Market Fear & Greed Index is at "45" (Neutral/Fear), suggesting the market is not overheated.
- **Indicator Signal:** The stock has pulled back recently. RSI is at 38 (near oversold). MACD line is just beginning to cross above the signal line.

Phase 2: Execution (The Entry)

- **Action:** Buy 100 shares at ₹550.
- **Stop Loss:** Placed at ₹530 (below the recent swing low) to manage risk.
- **Target:** ₹600 (previous resistance level).

Phase 3: Outcome & Review

- Over the next 14 days, the stock respects the Moving Average support.
- As the price rises to ₹590, the RSI climbs to 72 (Overbought).
- **Greed Check:** The trader feels the urge to hold for ₹650 due to greed. However, the strategy dictates taking profits at RSI > 70.
- **Action:** Sell 75% of the position at ₹595 to lock in profits, leaving 25% to run with a trailing stop loss.

6. Conclusion

This case study demonstrates that profitable trading is not about predicting the future, but about **probability management**.

1. **Timeframes** provided the context (Swing Trading).
2. **Technical Indicators** (MA, RSI, MACD) provided the precise entry and exit map.
3. **Psychology** ensured the plan was followed without emotional interference.

By integrating these three pillars, a trader moves from "gambling" to "business," creating a sustainable model for long-term wealth generation.