

RESEARCH ARTICLE

DOWNTREND OF BANKING SECTORS USING TECHNICAL ANALYSIS

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ABSTRACT

The Banking industry plays a very significant role in the economy and the development of a country. It is important to our nation's economy as it caters to the need of credit for all the section of the nation. In this paper, we are focusing on the stocks of Yes Bank Limited, Axis Bank Limited and ICICI Bank Limited and analyze them technically. Using technical analysis, we could predict the future price movements of stocks by examining the present and the past price movements of stocks. It has many tools and indicators like SMA, EMA, RSI, MACD and P&L which are used for forecasting the future stock price and also identify the pattern, trend and it directs when to buy and sell stocks.

Keywords: Stock Analysis, stock price, bullish, bearish, SMA, EMA, RSI, MACD and P&L.

1. INTRODUCTION

Technical Analysis was developed by Charles Dow in 19th century to know the value of a stock by studying patterns and signals over a period of time. Technical Analysis is a means of examining and predicting price movements in the financial markets by using historical price charts. From technical analysis, we could analyse the statistical trends based on trading activities. Technical Analysis is used for short term trades. It uses some analytical chart tools to evaluate a stock's potential. Technical Analysts observe at price movements to forecast and predict stock prices.

Murphy in 1999 described three premises in Technical Analysis such as,

- i. Market action discounts everything.
- ii. Prices move in trends.
- iii. History repeats itself.

Data in technical analysis context is information regarding the price variables namely open, high, low, close, volume etc.

2. PRELIMINARIES

Open [8]: When the markets open for trading, the first price at which a trade executes is called the opening price.

High [8]: High represents the highest price at which the market participants were willing to transact on the given day.

Low [8]: Low represents the lowest price at which the market participants were willing to transact on the given day.

Close [8]: Close is the most important price because it is the final price at which the market closed for a particular period of time.

If the close is higher than the open, then the trade day is considered as positive otherwise it is considered as negative.

Volume [8]: A stock's volume refers to the number of shares that are sold, or traded over a certain period of time. Volume gives an investor, an idea of the price action of a security. The more active the share, higher would be its volume.

Simple Moving Average: [8]

A simple moving average is formed by computing the average price of a security over a specific number of periods. Most moving averages are based on the closing prices. A 10-day simple moving average is the three day sum of closing prices divided by ten. It indicates signals to sell or buy and it make easier to view the price trend of a security.

$SMA = \frac{\sum n}{n}$ where $\sum n$ - 10 period sum; n - Number of days.

Exponential Moving Average: [8]

An Exponential Moving Average is similar to SMA. EMA evaluate the trend direction over a period of time. EMA is the best indicator for investors who deal with intraday and fast moving markets. EMA can be calculated for 12 days, 26 days and so on.

$EMA = [C - YEMA] * W.M + YEMA$, where
C-Closing Price; YEMA- Yesterday's EMA; W.M - Weight Multiplier = $2(n+1)$

Moving Average Convergence and Divergence (MACD): [8]

The MACD was developed by Gerald Appel in 17th century. The MACD is an indicator in Technical analysis used to identify a new trend such as a bullish (or) bearish flux. MACD is about convergence and divergence of the two moving averages (12D EMA and 26D EMA). Convergence occurs when the moving averages move towards each other. Divergence occurs when the moving averages move away from each other. It oscillates above and below the zero line.

- Positive MACD indicates that the 12day EMA is above the 26day EMA. Here shorter EMA diverges from the longer EMA. This means upside momentum is increasing.
- Negative MACD indicates that the 12D EMA is below the 26D EMA. Here shorter EMA diverges below the longer EMA. This means downside momentum is increasing.

$MACD = (12D EMA - 26D EMA)$

Relative Strength Index (RSI): [8]

RSI was developed by J. Welles Wilder. RSI is momentum oscillator that measures the speed and change of price movements. It oscillates between 0 and 100.

$$RSI = 100 - \frac{100}{(1+100)}$$

$$\text{Relative Strength (RS)} = \frac{\text{Average gain}}{\text{Average loss}}$$

RSI is used to identify oversold and overbought price areas. Overbought implies that the positive momentum in the stock is so high that it may not be sustainable for long period. Oversold price area indicates that the negative momentum is high

leading to a possible reversal. If RSI is above 50 then it is considered as bullish behaviour and if its value is below 50 then it is considered as bearish in nature.

Resistance: [8]

Resistance is a price level at which one can expect more sellers than buyers. It is something which stops the price from rising further. The resistance level is a price point on the chart where the traders can expect maximum supply (in terms of selling) for stock. Resistance level is always above the current market price. The resistance act as a trigger to sell.

Support: [2]

Support is the price level at which demand is thought to be strong enough to prevent the price from declining further. The price decline towards support and gets cheaper which let the buyers to become more inclined towards buy action and sellers to become less inclined towards sell action.

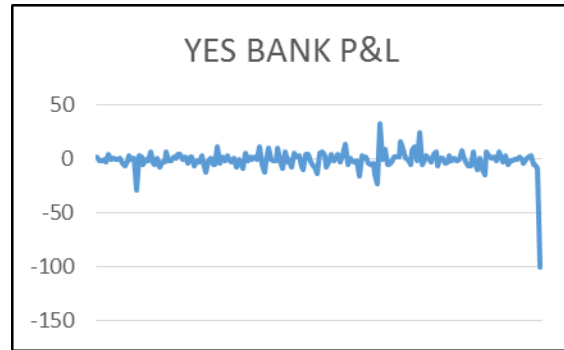
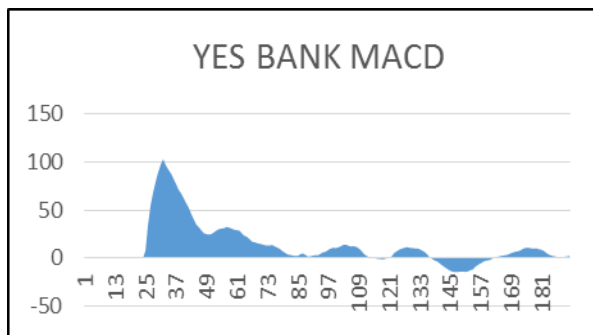
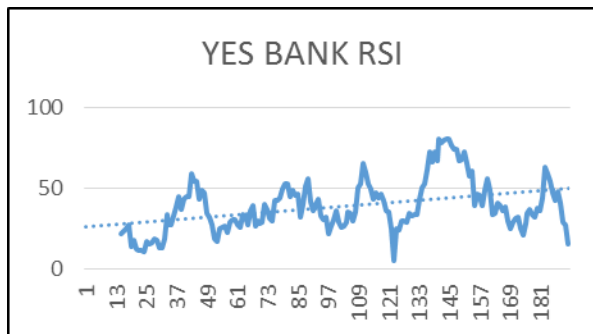
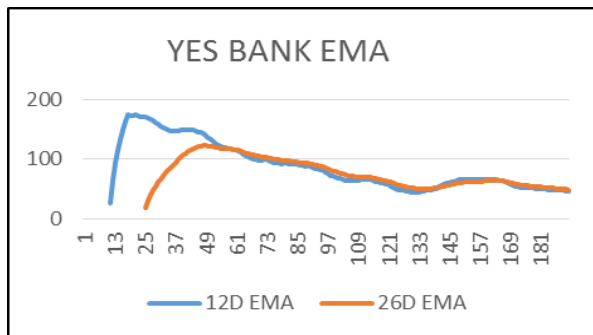
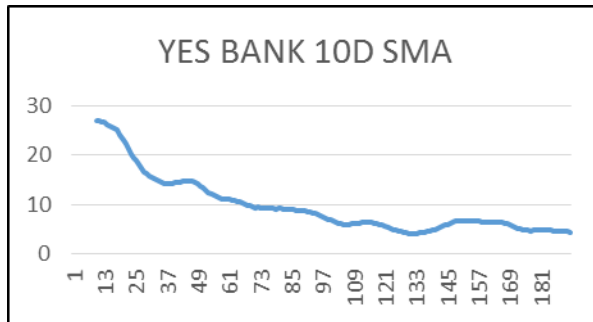
Graphical Representation using Technical Analysis:

We have collected the historical price of Yes Bank Limited, Axis Bank Limited and ICICI Bank Limited for the FY19-20 till December and analysed technically. Some of the indicators like SMA, EMA, MACD, RSI and P&L used to forecast the future price movements of stocks.

The following graphs are plotted using open, high, low, close values of stocks.

- SMA indicator is used to indicate buy and sell signals to traders and investors (i.e.,) Bullish and Bearish price actions. It is calculated using close price of a stock.
- EMA measures a trend direction over a period of time. When 12D EMA is above the 26D EMA, it shows the bullish trend and vice-versa is the bearish trend.
- MACD is calculated by using EMA.
- RSI indicates whether a market is considered to be overbought (or) oversold in relation to recent price trends. The values are bounded from 0 to 100.
- P&L ratio shows the profit and loss of a close price have made from an intraday

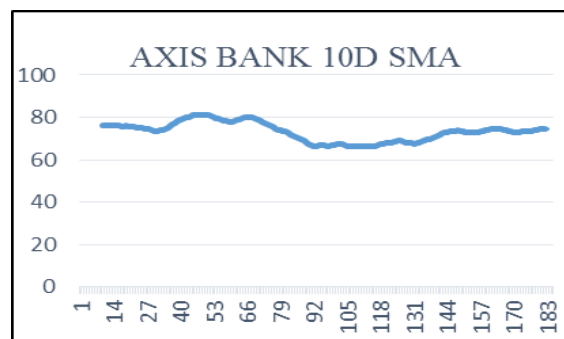
YES BANK LIMITED

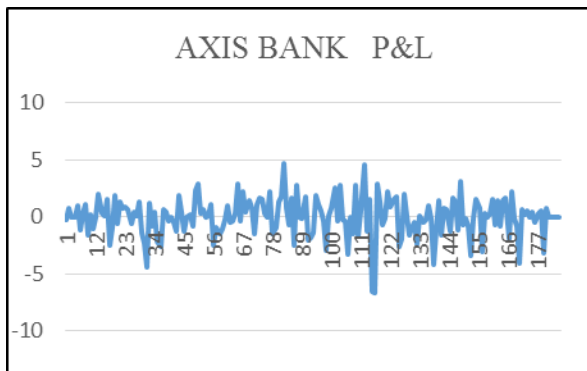
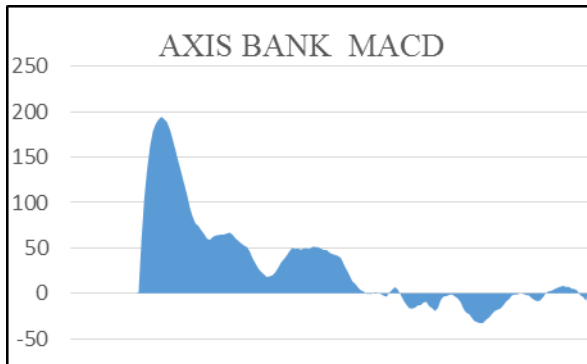
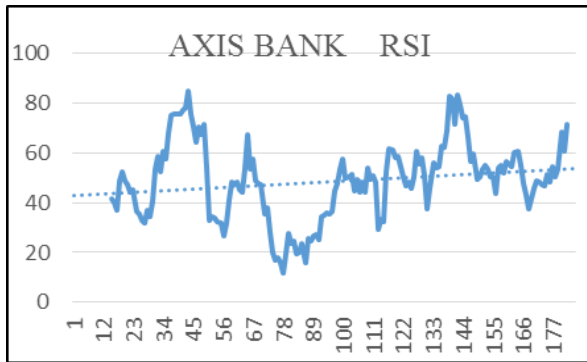
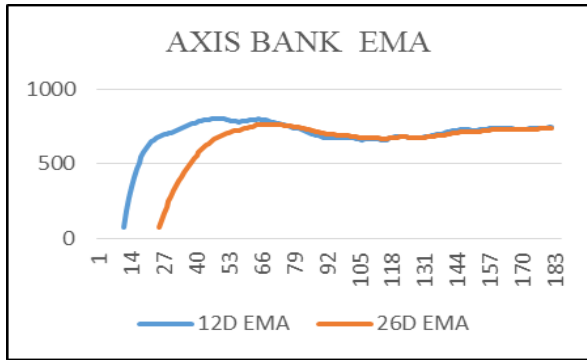


Interpretation

- SMA move downward with major decline. This shows that the price drop from Rs.205 to Rs.32 for a long period which shows the bear trend of the bank.
- Consecutively both the 12D EMA and 26D EMA where declined from June to December 2019 about Rs.175 to Rs.45. And faster moving average is below the slow moving average which shows that there was a great loss in its current market price (CMP).
- MACD falls below the signal line.
- RSI chart of Yes bank shows the bearish trend of the stock. Because it falls below the horizontal 20 level, it shows the weakness of the stock that is RSI fall at 15.9%.
- P&L shows that the bear trend that the close price fall on the critical level that it lies between +1 and -1.

AXIS BANK LIMITED

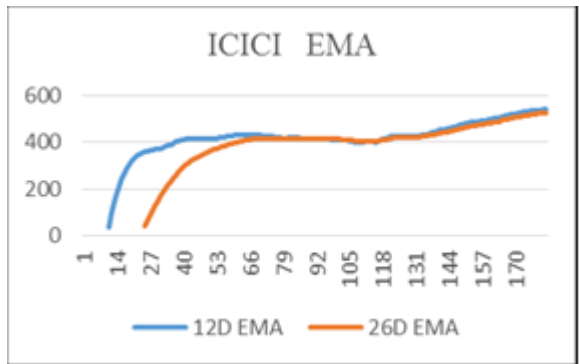
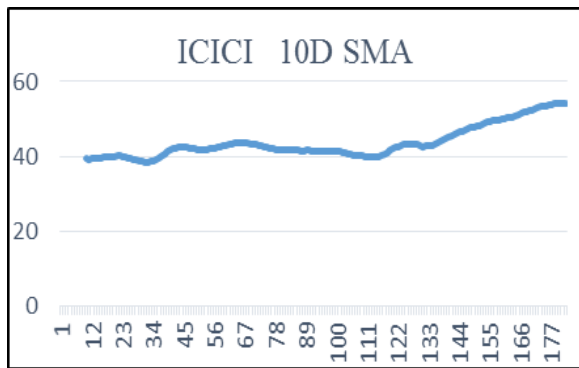


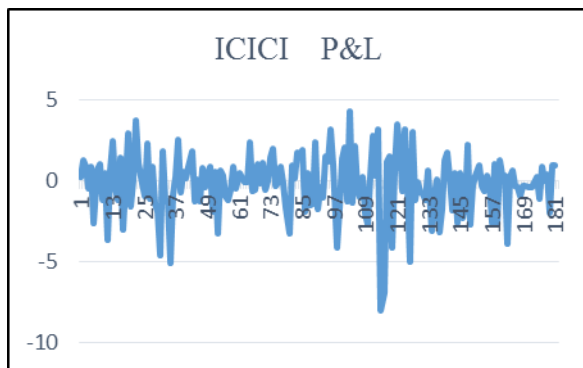
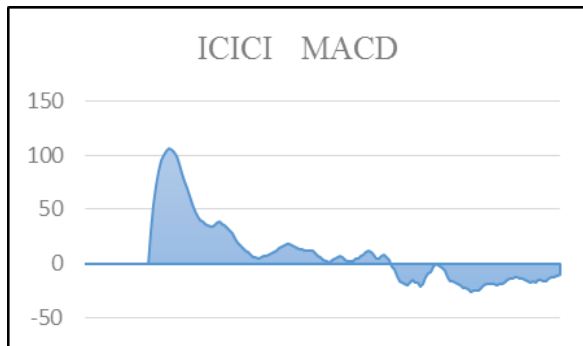
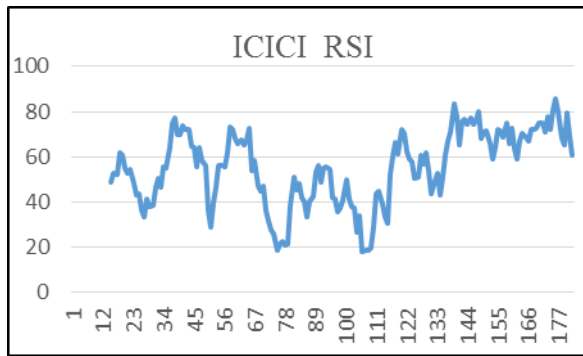


Interpretation

- SMA move moderately in the same direction. This shows that the price maintain the same level for a long period.
- The 12D EMA and 26D EMA are increasing gradually. The 12D EMA is slightly below the 26D EMA (i.e.,) faster moving average is below the slow moving average. Here the trend of Axis Bank is down trend.
- MACD values falls below the signal line that is -7.900. It forms a series of falling which shows the bearish divergence.
- RSI chart of Axis Bank shows the bullish behaviour of the stock. Because it moves above the horizontal 30 level. Here the stock hit more than 70 this indicates that RSI is in uptrend.
- P&L shows that the close price has maintained above the negative level.

ICICI BANK LIMITED





Interpretation

- SMA move upwards without any major decline. This shows that the price grows from Rs.400 to Rs.550 for a long period which shows the bull trend.
- Both the 12D EMA and 26D EMA are increased from 400 to above 500. This shows the increase in prices. Faster moving average is above slow

moving average which shows the bullish trend of ICICI Bank.

- Consecutive MACD values lie below the signal line still from 118 to 183.
- RSI chart of ICICI Bank stood 80.23. It shows that stock price falls in overbought position. This indicates that the stock is in bullish trend.
- P&L shows that the price was maintained moderately.

3. CONCLUSION

Technical Analysis shows the short term trend based on the historical data which helps the investors for the decision making. From this analysis we arrive at a conclusion that in Banking Sectors, Yes Bank was in a bearish trend because the stock price of the bank declined to Rs.46 from Rs.275 shows the drastic fall of the bank, where ICICI Bank and Axis Bank have behaved moderately.

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