## Assignment\_7: Course CS561

## Team Members (Name and Roll No):

- 1. Vishal K Singh (B18150)
- 2.Shashank Dwivedi(B18192)
- 3.Sanskar Gupta(B18140)
- 4.Om pandey(B18182)
- 5.Rahul kumar(b18079)
  - Domain: Stock market
  - Data set: Live data set from yahoo finance website.
  - Challenge:Visualization, prediction
  - Technology: R/Python

IDEA: The stock market is notorious for its volatility, dynamic, and nonlinear nature. Multiple (macro and micro) aspects, such as politics, global economic conditions, unforeseen events, a company's financial performance, and so on, make accurate stock price forecasts extremely difficult.

All of this, though, means that there is a lot of data to sort through. As a result, financial analysts, researchers, and data scientists continue to experiment with analytics to detect stock market trends. This gave rise to the concept of algorithmic trading, which involves the execution of orders using automated, pre-programmed trading techniques.

We will download live data from yahoo finance website using "**yfinance**" python library which provide data of different companies listed on NSE and BSE. The data consist of prices of stocks at different times. We will analyse the data and use different indicators like moving average, bollinger, macd, ema etc to make decision regarding buying and selling of stock. We will also visualise the data and results using the "**matplotlib**" library in python.