Major Project Synopsis

Name	Rishabh Panesar
Semester	6
Course	BCA
Batch	2018-2021
Enrolment Number	A71004818014
Subject	Major Project

NIFTY-50 Forecasting

Problem Area:

I am going to work on building a machine learning model, which will predict and forecast the prices of NIFTY-50 index of the Indian Stock market. In this generation, we can see that there are a lot of start-ups which enable you to easily invest in stocks and trade in share market. Although these start-ups make it easier for beginners to get started with investment in stocks, but it is almost impossible for a beginner (or rather anyone) to predict the price of the stocks... Nobody can remember the past 10 years performance and predict whether a share's price will rise or fall in the next trading session. So, if a trader has an idea of how the market will perform on the next day, then, he/she can prepare a strategy for his/her next trade session.

In this project, I will be working upon this problem, and try to develop a model that will predict the price of NIFTY-50 index. The model will be trained upon past 14 years of data, which will be collected from yahoo finance.

Once I achieve this target, I will also try to develop a model that can predict price for any given stock. This task will be complex, but I am sure that this can be achieved.

Technologies Used:

- Python
- Jupyter Notebook
- Git & GitHub

Expected Outcomes:

- The accuracy of prediction should be more than 85%.
- The model will predict the following:
 - o Open price
 - o Close Price
 - o Average Price
- After successful creation of model, develop a dashboard to present the predictions.

Future Prospects:

• The scope of this project can be expanded to forecasting the price for any given stock.