In this assignment, you are supposed to trade stocks.

For this purpose, you can follow multiple strategies (some of your own choosing).

Strategy 1:

1. You calculate the percentage change of the price given to you. The distribution of the data in this case follows normal distribution.
2. Since this is a normal distribution, you calculate expected value and hope that each time the price will follow the expected pattern. Hence you bet on the expected value all the time.
3. You check for the next value and calculate the profits.

Strategy 2:

You can calculate the probability of a few patterns. For example,

++- mean the stock moved up on two consecutive days and then it fell on the third day (and this happens everytime). In this case, you go short (that is you bet that the stock will fall).

----+ meant that the stock moved down for four consecutive days and rose on the fifth day. In this case, you went long (meaning you bet that the stock will rise).

You can look for +++-, +++++++-, and many other patterns of your choosing.

Following the numbers you obtained in this strategy, you can place your bets.

Strategy 3:

You can calculate the change in price based on the day of the week. Following the data, you can then place your bets.

Strategy X:

Based on your understanding, you can use any idea to bet on the data.

Goal:

The ultimate goal here is to earn a few bucks with the assumption that you had only 10, 000 Rs to start with. Assume every bet has a price of 50 rs. That is, you either make 50 rs (if you are right in predicting the direction) or you loose 50 rs.

**We are betting only on the up and down directions.**