# Stock Market Performance Analysis

**Summary:**

Stock Market Performance Analysis encompasses computing moving averages, assessing volatility, conducting correlation analysis, and exploring diverse facets of the stock market. This approach aims to deepen comprehension of the elements influencing stock prices and the interconnections among the stock prices of distinct companies.

**Analysis:**

A computer screen shot of a program code

Description automatically generated

Output:

A screenshot of a computer screen

Description automatically generated

I. Performance in the stock market of all the companies

A screen shot of a computer

Description automatically generated

Output

A graph of a graph

Description automatically generated with medium confidence

II. Compare performance of different companies.

A screen shot of a computer

Description automatically generated

Output

A screenshot of a graph

Description automatically generated

III. Analyse Moving average.

A computer screen with text

Description automatically generated

Output

A graph showing the average of a stock market

Description automatically generatedA graph showing a line of different colored lines

Description automatically generated with medium confidence

A graph showing the average of the stock market

Description automatically generated

A graph showing the growth of the stock market

Description automatically generated

Inference:

The result displays four distinct graphs, each corresponding to a specific company. A bullish signal occurs when the MA10 surpasses the MA20, suggesting an upward trend in stock price. Conversely, a bearish signal is identified when the MA10 dips below the MA20, indicating a potential decline in stock price.

IV. Analyse volatility of all companies

A screen shot of a computer code

Description automatically generated

Output

A graph showing a line of a graph

Description automatically generated with medium confidence

Inference:

High volatility suggests that the stock or market undergoes significant and frequent price fluctuations, whereas low volatility suggests that the market experiences smaller or less frequent price changes.

V. Analyse the correlation between stock prices of Apple and Microsoft

A computer screen with text

Description automatically generated

Output

A graph with blue dots

Description automatically generated

Inference:

A robust linear correlation exists between the stock prices of Apple and Microsoft, implying that when Apple's stock price rises, Microsoft's tends to follow suit. This suggests a notable correlation or likeness between the two companies, possibly influenced by industry trends, market conditions, or shared business affiliations. For investors, this positive correlation signals a chance to diversify their portfolio by investing in both firms, as they may present similar potential returns and risks.

**Conclusion**

Stock Market Performance Analysis encompasses computing moving averages, assessing volatility, conducting correlation analysis, and scrutinizing diverse facets of the stock market to acquire a comprehensive insight into the elements influencing stock prices and the interrelations among the stock prices of distinct companies.