CERTIFICATE

Certified that **Harsh Kumar Singh (2200290140066), Harshit Singhal (2200290140067), Ankur Sharma (2200290140031)** have carried out the project work having "**STOCK WALLET**" (**Project-KCA451**) for **Master of Computer Application** from Dr. A.P.J. Abdul Kalam Technical University (AKTU) (formerly UPTU), Lucknow under my supervision. The project report embodies original work, and studies are carried out by the student himself/herself and the contents of the project report do not form the basis for the award of any other degree to the candidate or to anybody else from this or any other University/Institution.

Date: 25/05/2024

HARSH KUMAR SINGH (2200290140066)
HARSHIT SINGHAL (2200290140067)
ANKUR SHARMA (2200290140031)

This is to certify that the above statement made by the candidate is correct to the best of my knowledge.

Date: 25/05/2024

Mr. Rabi Narayan Panda
Associate Professor
Department of Computer Applications
KIET Group of Institutions, Ghaziabad

Dr. Arun Kumar Tripathi
Head of Department
Department of Computer Applications
KIET Group of Institutions, Ghaziabad

"STOCK WALLET"

Harsh Kumar Singh (2200290140066)
Harshit Singhal (2200290140067)
Ankur Sharma (2200290140031)

ABSTRACT

This project presents a stock market prediction system developed using the Django framework in Python, integrating powerful data analysis libraries such as NumPy, Pandas, and Matplotlib. The system utilizes machine learning regression models to forecast stock prices, leveraging data sourced from Yahoo Finance via its API.

Unlike traditional database-driven approaches, this project eliminates the need for a database by fetching real-time stock data directly from the Yahoo Finance website through its API. Each stock is represented by a ticker symbol, allowing users to easily search for and access the desired company's stock data.

The core of the system lies in its utilization of machine learning techniques, particularly regression models, to analyse historical stock price data and predict future price movements. By harnessing the capabilities of libraries like scikit-learn, the project employs regression algorithms to train predictive models tailored to specific stock requirements.

Furthermore, the Django framework provides a robust backend infrastructure, facilitating seamless integration of the machine learning components with the user interface. Users can interact with the system through a user-friendly interface, inputting stock ticker symbols and receiving accurate predictions of future stock prices.

This project offers a practical and efficient solution for stock market prediction, catering to the needs of investors and traders seeking insights into potential market trends. By combining the power of Django, machine learning, and real-time data access through Yahoo Finance API, the system empowers users with valuable tools for informed decision-making in the dynamic world of financial markets.

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Harsh Kumar Singh

Harshit Singhal

Ankur Sharma

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