

## E:\tracker.py

```
1 import pandas as pd
2 import yfinance as yf
3 import matplotlib.pyplot as plt
4 import seaborn as sns
5
6 def fetch_stock_data(symbol, start_date, end_date):
7     """
8     Fetches historical stock data from Yahoo Finance.
9
10    :param symbol: The stock symbol to fetch data for.
11    :param start_date: The start date of the data in 'YYYY-MM-DD' format.
12    :param end_date: The end date of the data in 'YYYY-MM-DD' format.
13    :return: A pandas DataFrame containing the stock data.
14    """
15    stock_data = yf.download(symbol, start=start_date, end=end_date)
16    return stock_data
17
18 def calculate_portfolio_metrics(df):
19     """
20     Calculates relevant metrics like daily returns and portfolio balance.
21
22    :param df: DataFrame containing stock data.
23    :return: Updated DataFrame with new metrics.
24    """
25    df['Daily Return'] = df['Adj Close'].pct_change()
26    # Additional metrics can be added here
27    return df
28
29 def plot_stock_trends(df, title):
30     """
31     Plots stock price trends.
32
33    :param df: DataFrame containing stock data.
34    :param title: Title of the plot.
35    """
36    plt.figure(figsize=(10, 6))
37    sns.lineplot(data=df['Adj Close'])
38    plt.title(title)
39    plt.xlabel('Date')
40    plt.ylabel('Adjusted Close Price')
41    plt.show()
```