```
pip install mplfinance
```

```
Collecting mplfinance
  Downloading mplfinance-0.12.10b0-py3-none-any.whl (75 kB)
     ━━━━━━━━━━━━━━━━━━━━━━━━━━━━━━━━━━━━━━━━ 75.0/75.0 kB 2.0 MB/s eta 0:00:00
Requirement already satisfied: matplotlib in /usr/local/lib/python3.10/dist-packages (from mplfinance) (3.7.1)
Requirement already satisfied: pandas in /usr/local/lib/python3.10/dist-packages (from mplfinance) (1.5.3)
Requirement already satisfied: contourpy>=1.0.1 in /usr/local/lib/python3.10/dist-packages (from matplotlib->mplfinance) (1.1.0)
Requirement already satisfied: cycler>=0.10 in /usr/local/lib/python3.10/dist-packages (from matplotlib->mplfinance) (0.11.0)
Requirement already satisfied: fonttools>=4.22.0 in /usr/local/lib/python3.10/dist-packages (from matplotlib->mplfinance) (4.42.1)
Requirement already satisfied: kiwisolver>=1.0.1 in /usr/local/lib/python3.10/dist-packages (from matplotlib->mplfinance) (1.4.5)
Requirement already satisfied: numpy>=1.20 in /usr/local/lib/python3.10/dist-packages (from matplotlib->mplfinance) (1.23.5)
Requirement already satisfied: packaging>=20.0 in /usr/local/lib/python3.10/dist-packages (from matplotlib->mplfinance) (23.1)
Requirement already satisfied: pillow>=6.2.0 in /usr/local/lib/python3.10/dist-packages (from matplotlib->mplfinance) (9.4.0)
Requirement already satisfied: pyparsing>=2.3.1 in /usr/local/lib/python3.10/dist-packages (from matplotlib->mplfinance) (3.1.1)
Requirement already satisfied: python-dateutil>=2.7 in /usr/local/lib/python3.10/dist-packages (from matplotlib->mplfinance) (2.8.2
Requirement already satisfied: pytz>=2020.1 in /usr/local/lib/python3.10/dist-packages (from pandas->mplfinance) (2023.3.post1)
Requirement already satisfied: six>=1.5 in /usr/local/lib/python3.10/dist-packages (from python-dateutil>=2.7->matplotlib->mplfinan
Installing collected packages: mplfinance
Successfully installed mplfinance-0.12.10b0
```

```
from mplfinance.original_flavor import candlestick_ohlc
```

```
import pandas as pd
```

```
import numpy as np
```

```
import datetime as dt
```

```
import pandas_datareader as web
```

```
import matplotlib.pyplot as plt
```

```
import matplotlib.dates as mdates
```

```
import seaborn as sns
```

```
from numpy.random import randn
```

```
from sklearn.linear_model import LinearRegression
```

```
from sklearn.model_selection import train_test_split
```

```
import matplotlib.pyplot as plt
```

```
%matplotlib inline
```

```
pip install pandas-datareader
```

```
Requirement already satisfied: pandas-datareader in /usr/local/lib/python3.10/dist-packages (0.10.0)
Requirement already satisfied: lxml in /usr/local/lib/python3.10/dist-packages (from pandas-datareader) (4.9.3)
Requirement already satisfied: pandas>=0.23 in /usr/local/lib/python3.10/dist-packages (from pandas-datareader) (1.5.3)
Requirement already satisfied: requests>=2.19.0 in /usr/local/lib/python3.10/dist-packages (from pandas-datareader) (2.31.0)
Requirement already satisfied: python-dateutil>=2.8.1 in /usr/local/lib/python3.10/dist-packages (from pandas>=0.23->pandas-datarea
Requirement already satisfied: pytz>=2020.1 in /usr/local/lib/python3.10/dist-packages (from pandas>=0.23->pandas-datareader) (2023
Requirement already satisfied: numpy>=1.21.0 in /usr/local/lib/python3.10/dist-packages (from pandas>=0.23->pandas-datareader) (1.2
Requirement already satisfied: charset-normalizer<4,>=2 in /usr/local/lib/python3.10/dist-packages (from requests>=2.19.0->pandas-d
Requirement already satisfied: idna<4,>=2.5 in /usr/local/lib/python3.10/dist-packages (from requests>=2.19.0->pandas-datareader) (
Requirement already satisfied: urllib3<3,>=1.21.1 in /usr/local/lib/python3.10/dist-packages (from requests>=2.19.0->pandas-datarea
Requirement already satisfied: certifi>=2017.4.17 in /usr/local/lib/python3.10/dist-packages (from requests>=2.19.0->pandas-datarea
Requirement already satisfied: six>=1.5 in /usr/local/lib/python3.10/dist-packages (from python-dateutil>=2.8.1->pandas>=0.23->pand
```

```
ticker = 'AAPL'
start = dt.datetime(2019,1,1)
end = dt.datetime.now()
```

```
import yfinance as yf
```

```
ticker = 'AAPL'
data = yf.download('MSFT', start = '2012-01-01', end='2022-01-01')
```

```
[**********100%%**********]  1 of 1 completed
```

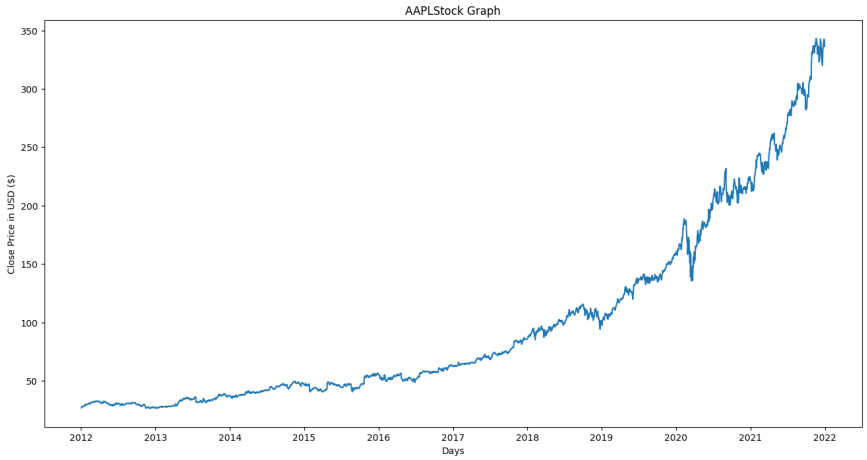
```
print(data)
```

```
                  Open        High         Low       Close   Adj Close  \
Date
2012-01-03   26.549999   26.959999   26.389999   26.770000   21.321218
2012-01-04   26.820000   27.469999   26.780001   27.400000   21.822983
2012-01-05   27.379999   27.730000   27.290001   27.680000   22.045996
2012-01-06   27.530001   28.190001   27.530001   28.110001   22.388470
2012-01-09   28.049999   28.100000   27.719999   27.740000   22.093781
...                ...         ...         ...         ...         ...
2021-12-27  335.459991  342.480011  335.429993  342.450012  336.971680
2021-12-28  343.149994  343.809998  340.320007  341.250000  335.790833
2021-12-29  341.299988  344.299988  339.679993  341.950012  336.479706
2021-12-30  341.910004  343.130005  338.820007  339.320007  333.891754
2021-12-31  338.510010  339.359985  335.850006  336.320007  330.939728

               Volume
Date
2012-01-03  64731500
2012-01-04  80516100
2012-01-05  56081400
2012-01-06  99455500
2012-01-09  59706800
...              ...
2021-12-27  19947000
2021-12-28  15661500
2021-12-29  15042000
2021-12-30  15994500
2021-12-31  18000800

[2517 rows x 6 columns]
```

```
print(data.columns)
```

```
Index(['Open', 'High', 'Low', 'Close', 'Adj Close', 'Volume'], dtype='object')
```

```
#Visualisation
plt.figure(figsize=(16,8))
plt.title(ticker+'Stock Graph')
plt.xlabel('Days')
plt.ylabel('Close Price in USD ($)')
plt.plot(data['Close'])
plt.show()
```



Colab paid products - Cancel contracts here

✓ 0s completed at 9:23 PM

Could not connect to the reCAPTCHA service. Please check your internet connection and reload to get a reCAPTCHA challenge.