```
import statistics as stats
from math import *
from pandas import *
from pandas_datareader import data
from matplotlib.pyplot import *

set_option ("display.max_rows", 20000)
set_option ("display.max_columns", 1000)
set_option ("display.width", 1000)

start_date = "2014-01-01"
end_date = "2020-02-22"
google_data = data.DataReader( "GOOG", "yahoo", start_date, end_date )

time_period = 20

history = []
mom_values = []

for close_price in google_data ["Adj Close"]:
    history.append(close_price)
    if len (history) > time_period:
        del (history [0])

    mom = close_price - history [0]
    mom_values.append (mom)

google_data = google_data.assign(MomentumFromPrice20DaysAgo= Series(mom_values,
index=google_data.index))

close_price = google_data ["Adj Close"]
mom = google_data ["MomentumFromPrice20DaysAgo"]

fig = figure ()
ax1 = fig.add_subplot (211, ylabel= "Google Price in $")
close_price.plot  (ax=ax1, color= "g", lw= 2., legend= True)
ax2 = fig.add_subplot (212, ylabel= "Momentum in $")
mom.plot (ax=ax2, color= "b", lw= 2., legend= True)
print (google_data)
legend ()
show ()
```