```
'''10.B.1: ASSIGNMENT
PROBLEM STATEMENT
Matplotlib

- Import data (data_1.csv, data_2.csv) in pandas
dataframes

- Plot them in same graph window With respective
lables on axis(x/y)
END OF ASSESSMENT
data_1.csv data_1.csv
data_2.csv data_2.csv'''
import pandas as pd
import seaborn as sns
import numpy as np
import matplotlib.pyplot as plt

v1=pd.read_csv("F:/pythonProject1/data_1.csv")
print(v1)
v2=pd.read_csv("F:/pythonProject1/data_2.csv")
print(v2)
plt.scatter(v1,v2)
plt.show()
x=v1.value
y=v2.value
#plt.scatter(x,y)
#plt.show()

#plt.scatter(x,y,marker="*")
```

```
#plt.show()
#plotting x and y points
#plt.plot(v1,v2)
#plt.show()

# plt.plot(v1,v2,"o")
# print(plt.show())

# plt.plot(v1)
#plt.show()

# plt.plot(v2)
#plt.show()

# plt.plot(v1, marker="o")
# plt.show()

# plt.plot(v2, marker="o")
# plt.show()

# plt.plot(v1, v2, marker="*" )
# plt.show()

# plt.plot(v1,v2, marker="D")
# plt.show()

# plt.plot(v1, marker="o", ms=20)
# plt.show()
```

```
# plt.plot(v1, marker="o", ms=20, mec="r")
# plt.show()

# plt.plot(v1, marker="o", ms=20, mfc="g")
# plt.show()

# plt.plot(v1,marker="o", ms=20, mfc="b")
# plt.show()

# plt.plot(v1, marker="o", ms=20, mec='r',mfc="r")
# plt.show()

# plt.plot(v1, v2, marker="o", ms=15,
mec="r",mfc="g")
# plt.show()

# plt.plot(v1,v2,marker="o", ms=15, mec='hotpink',
mfc='hotpink')
# plt.show()

# plt.plot(v1, linestyle='dotted')
# plt.show()

# plt.plot(v2, linestyle='dotted')
# plt.show()

# plt.plot(v1,color='r')
# plt.show()
```

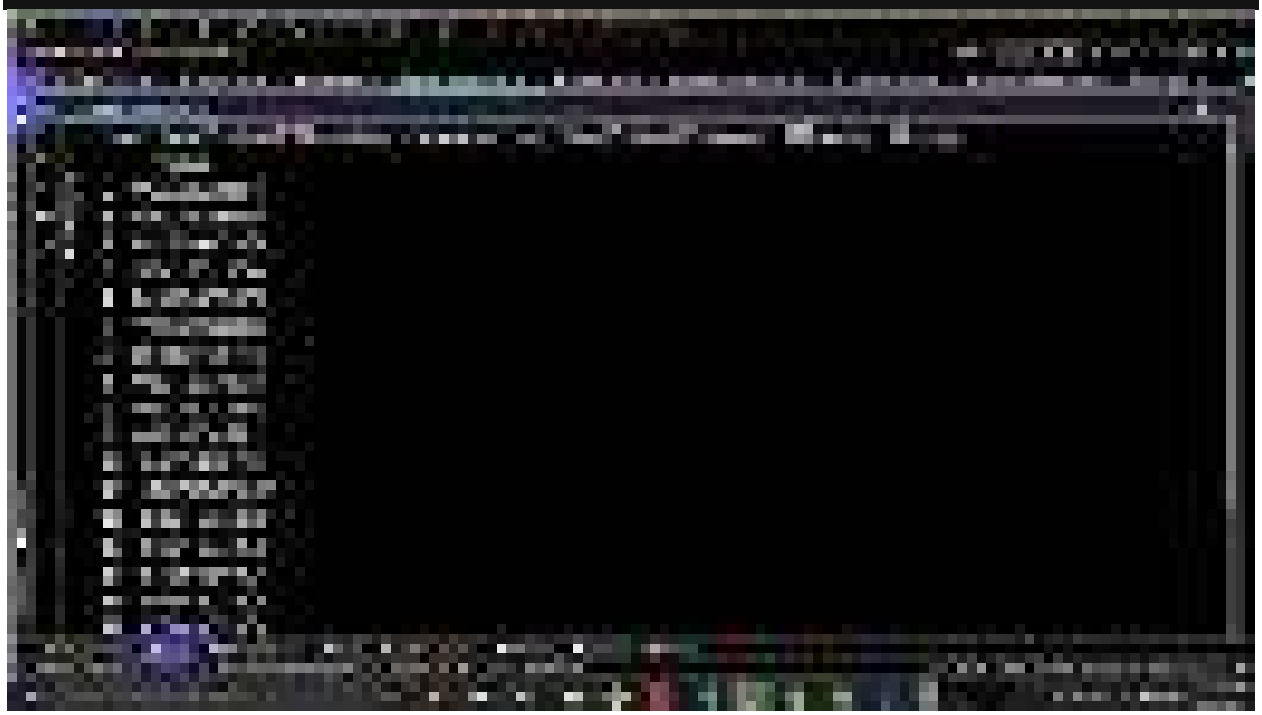
```
#linewidth
# plt.plot(v1, linewidth='20.5')
# plt.show()

# plt.plot(v2, linewidth='20.5')
# plt.show()

# plt.plot(v1,v2, linewidth='10.5')
# plt.show()

#multiple lines
# plt.plot(v1)
# plt.plot(v2)
# plt.show()

# plt.plot(x,y)
# plt.title("dataset")
# plt.xlabel("value1")
# plt.ylabel("value2")
# plt.show()


# plt.plot(x,y)
# plt.title("dataset")
# plt.xlabel("value1")
# plt.ylabel("value2")
# plt.grid()
# plt.show()
```

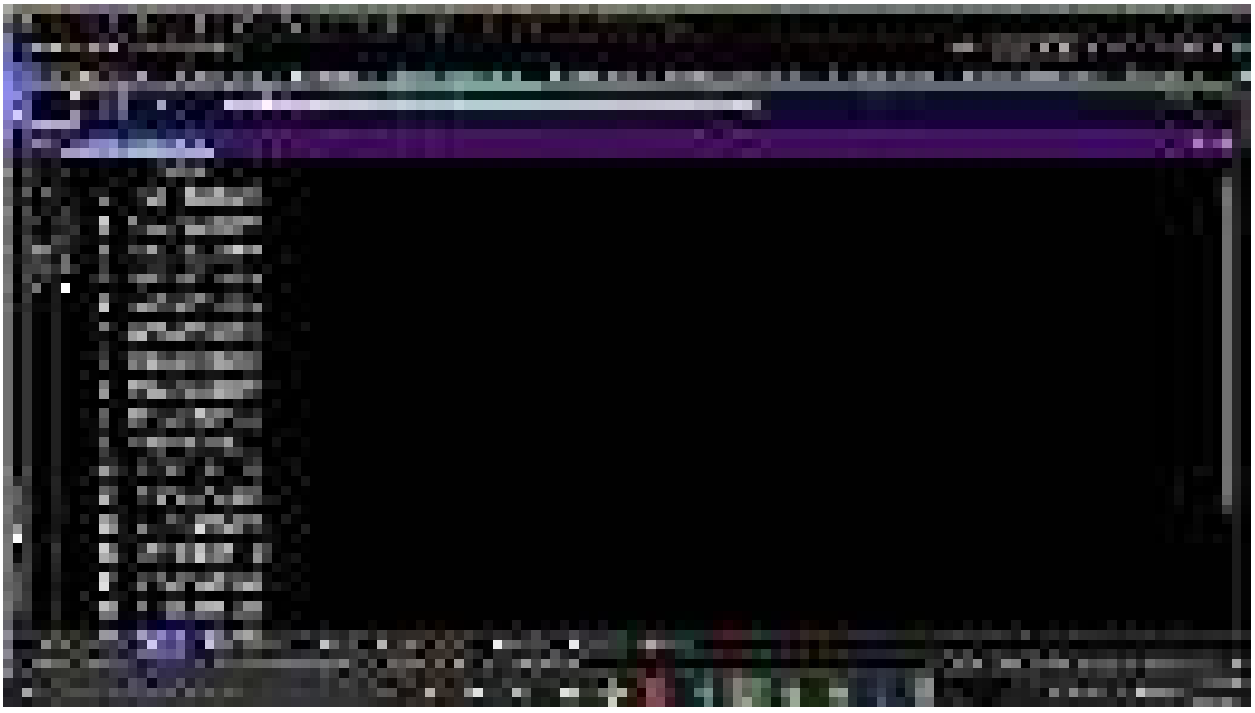
```
# plt.plot(x,y)
# plt.title("dataset")
# plt.xlabel("value1")
# plt.ylabel("value2")
# plt.grid(color="green", linestyle="--",
linewidth=0.5)
# plt.show()


# plt.plot(v1)
# plt.plot(v2)
# plt.subplot(1, 2, 2)
# plt.plot(v1, v2)
# plt.show()

# plt.scatter(x, y, marker="*")
# plt.show()

# plt.scatter(x, y)
# plt.xlabel("value1")
# plt.ylabel("value2")
# plt.show()

# plt.plot(v1)
# plt.plot(v2)
# plt.scatter(v1, v2)
# plt.show()

# plt.scatter(v1, v2, color="hotpink")
```

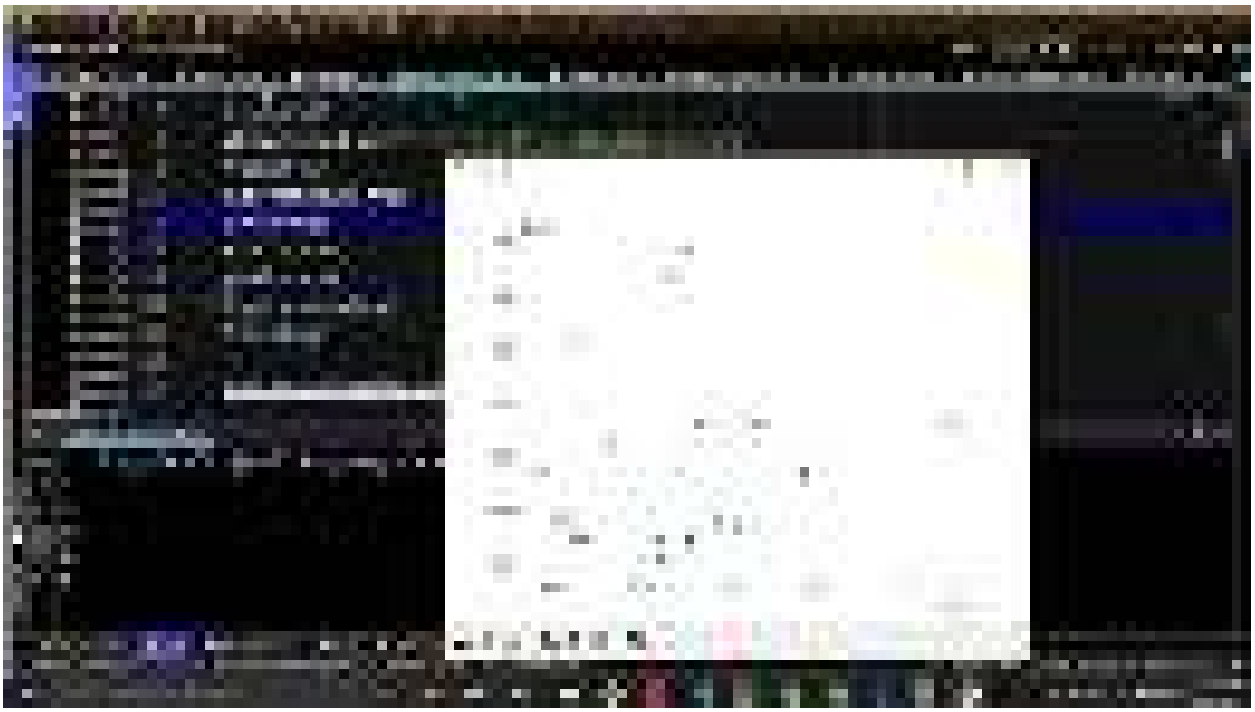
```
# plt.scatter(v1, v2, color='#88c999')
# plt.show()


'''color each dot'''
#
colors=np.array(["red","green","blue","yellow","pink
","black","orange","purple","beige","brown","gray","
cyan","magenta","red","green","red","green","blue",
"yellow","pink"])
# plt.scatter(x, y, c=colors )
# plt.show()

# plt.scatter(x, y, c=colors, cmap='viridis')
# plt.colorbar()
# plt.show()

import matplotlib.pyplot as plt
import  numpy as np

x=np.random.randint(100, size=(100))
y=np.random.randint(100, size=(100))
colors=np.random.randint(100, size=(100))
sizes=10 * np.random.randint(100, size=(100))

 plt.scatter(x, y, c=colors, s=sizes, alpha=0.5,
cmap='nipy_spectral')
 plt.colorbar()
 plt.show()
```

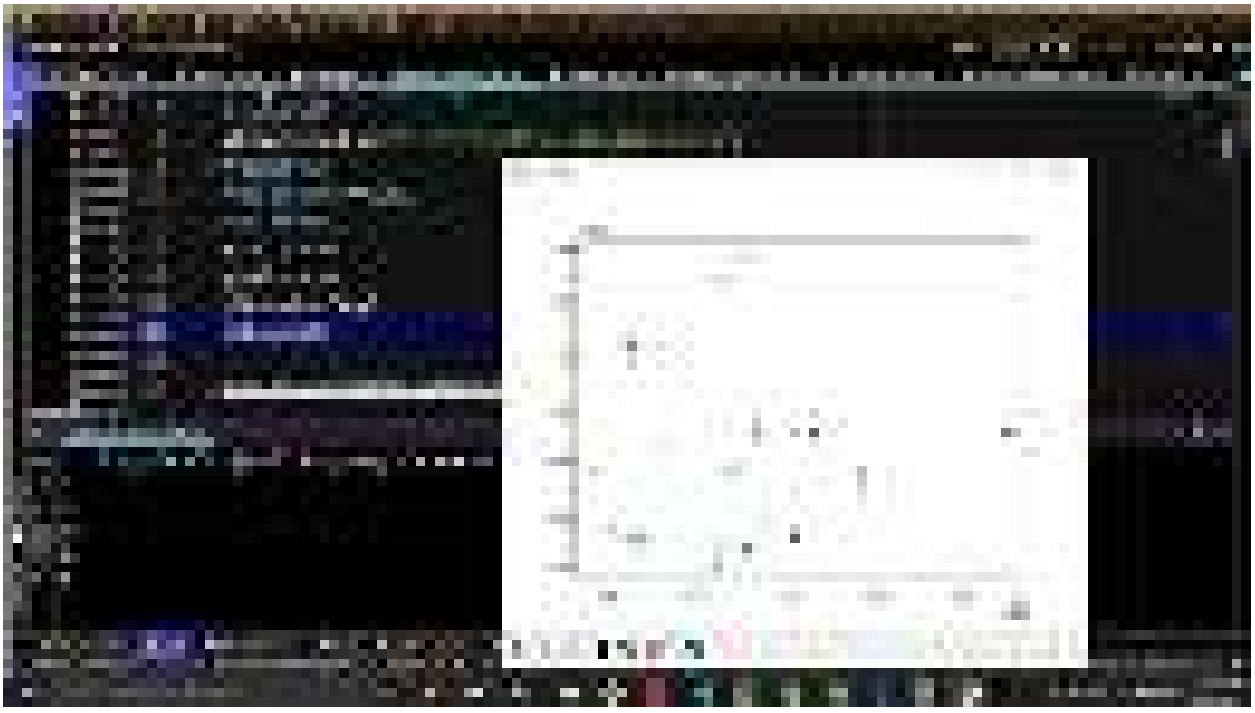
```
plt.scatter(x, y, s=sizes, alpha=0.5)
plt.show()

plt.scatter(x, y, c=colors, cmap='viridis')
plt.show()

plt.scatter(x, y, s=sizes, alpha=0.5)
plt.show()


'''matplotlib bars'''

plt.bar(x, y)
plt.show()

plt.barh(x, y)
plt.show()

plt.bar(x, y, color="red" )
plt.show()

plt.bar(x, y, color="green")
plt.show()

plt.bar(x, y, width=0.1)
plt.show()

plt.hist(x)
```

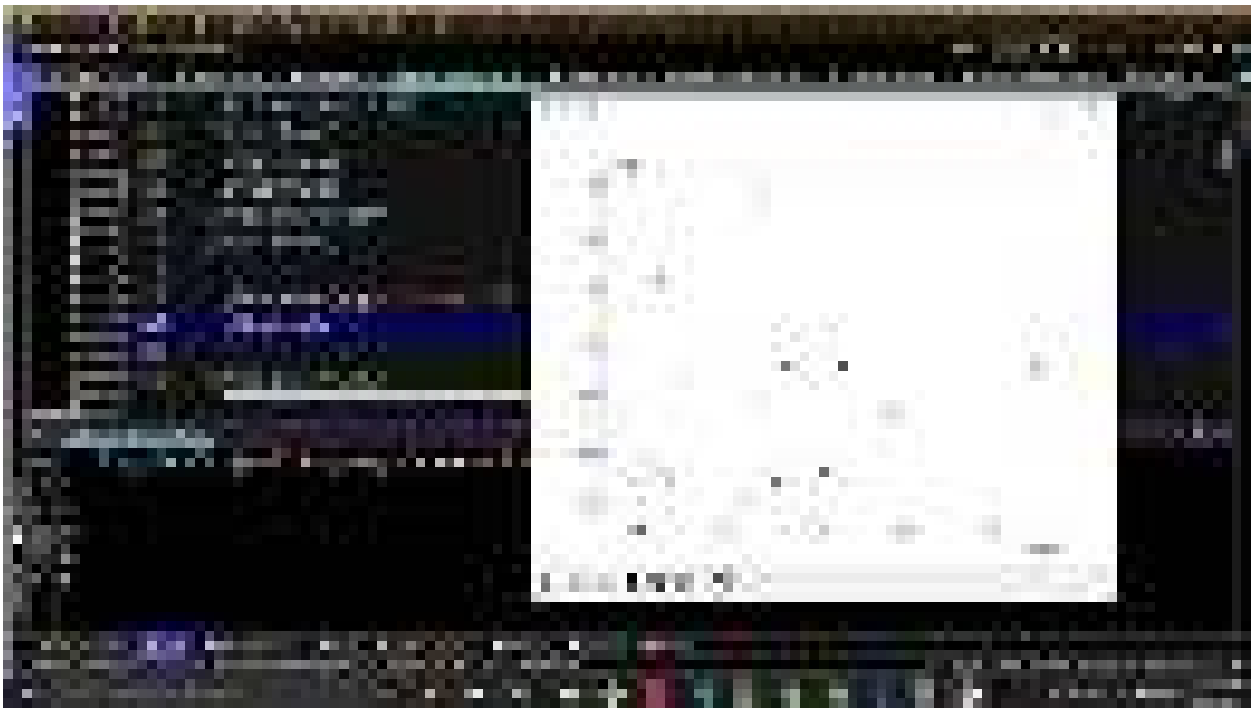
```
plt.show()

 plt.hist(y)
 plt.show()

 plt.pie(y)
 plt.show()

 plt.pie(x)
 plt.show()
```

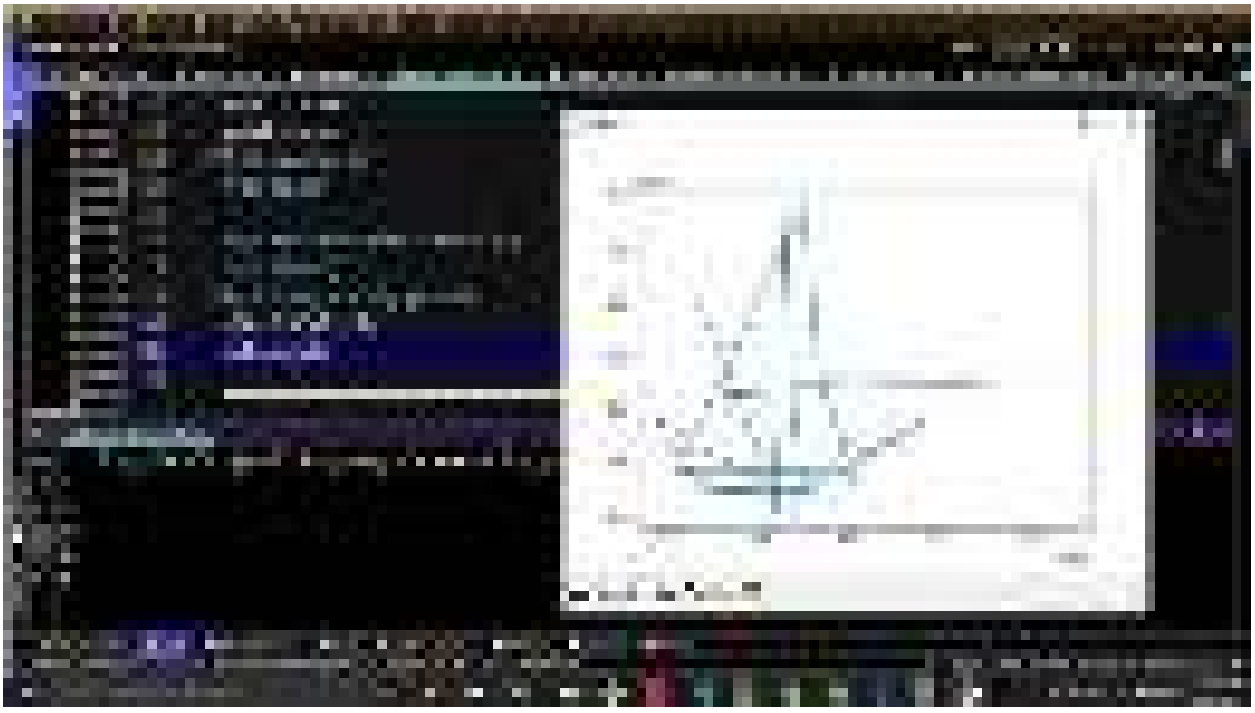


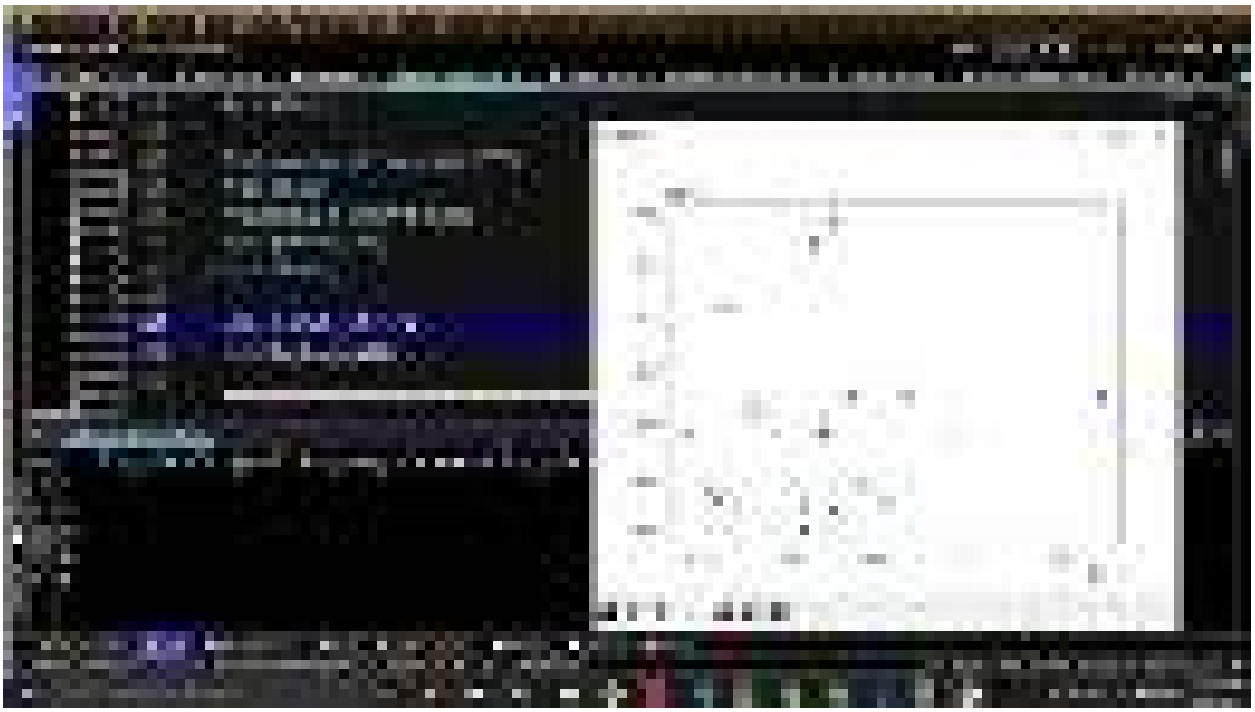


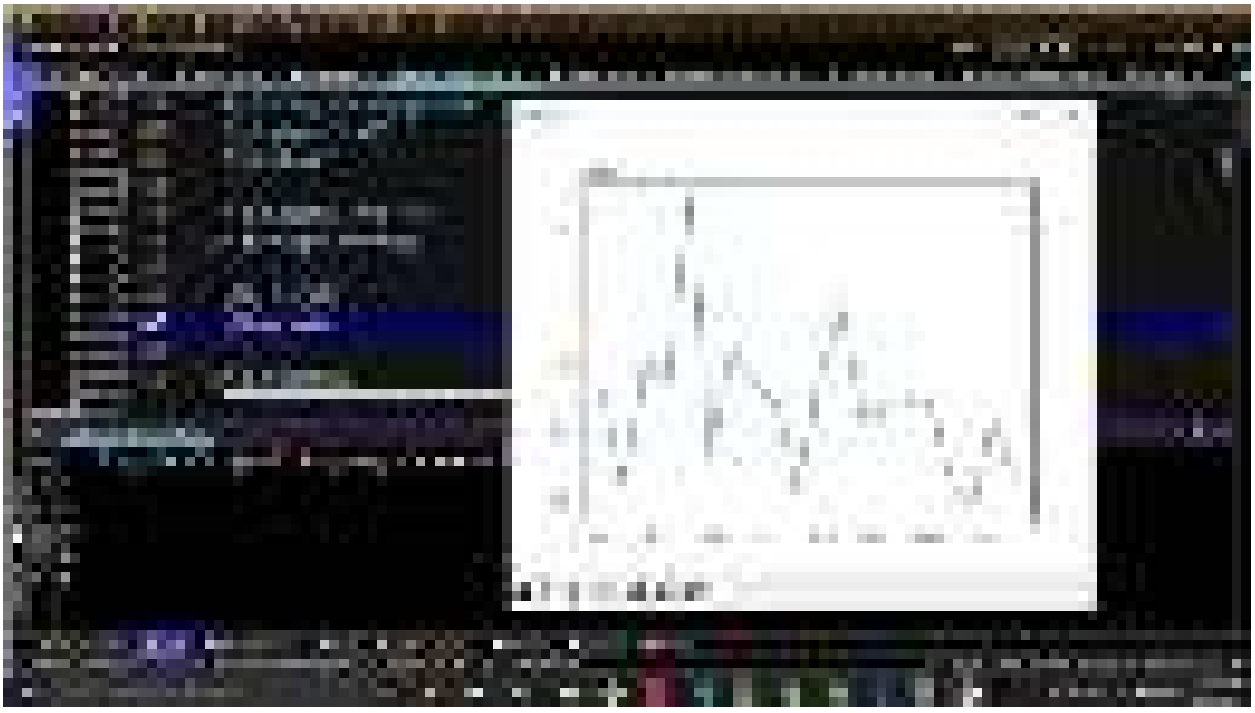


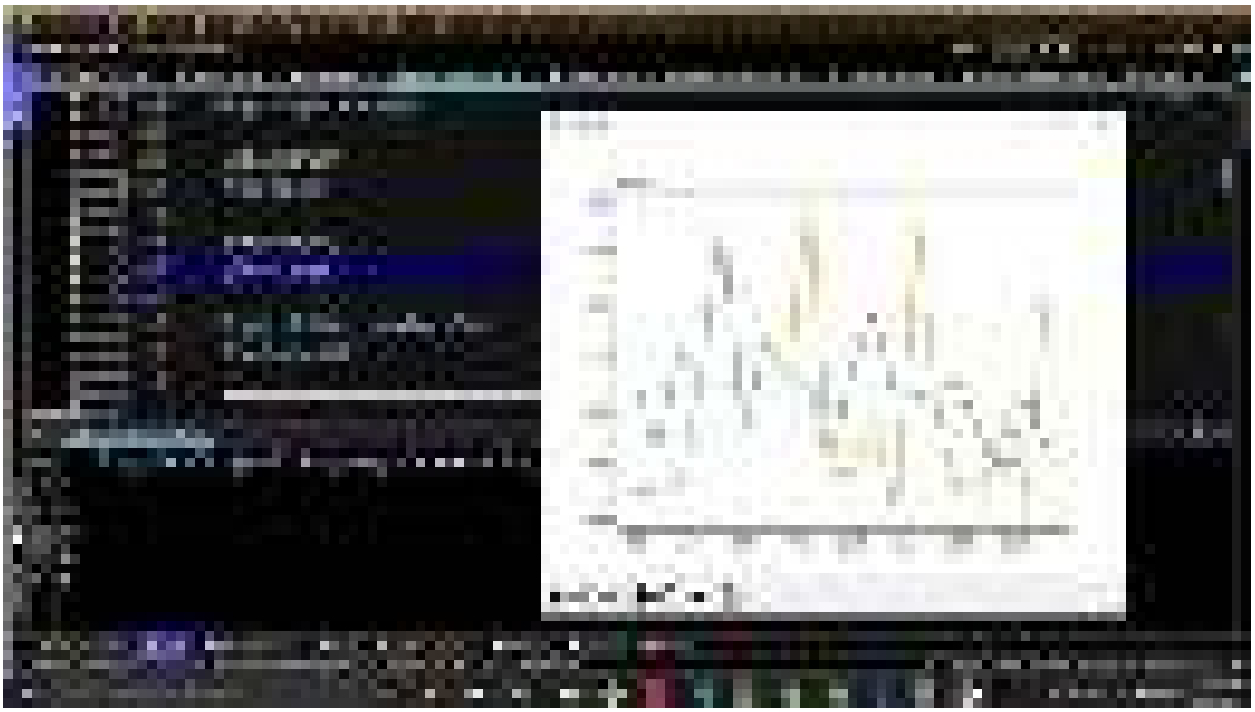


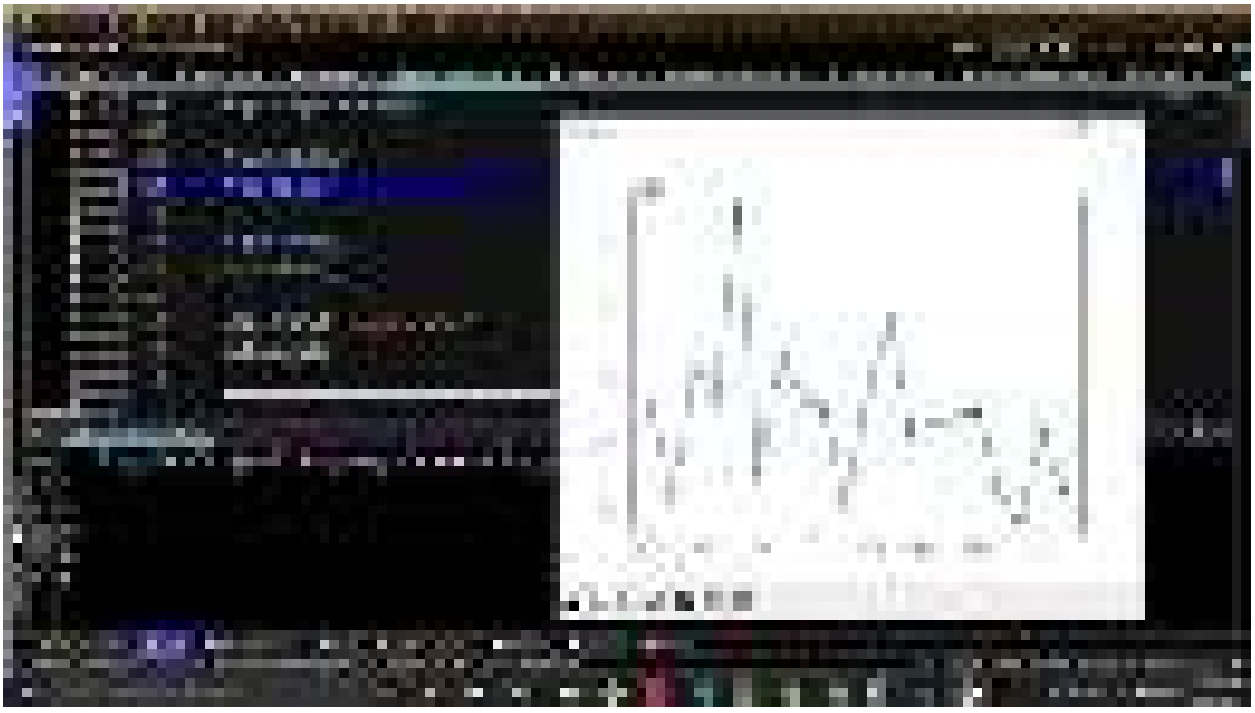


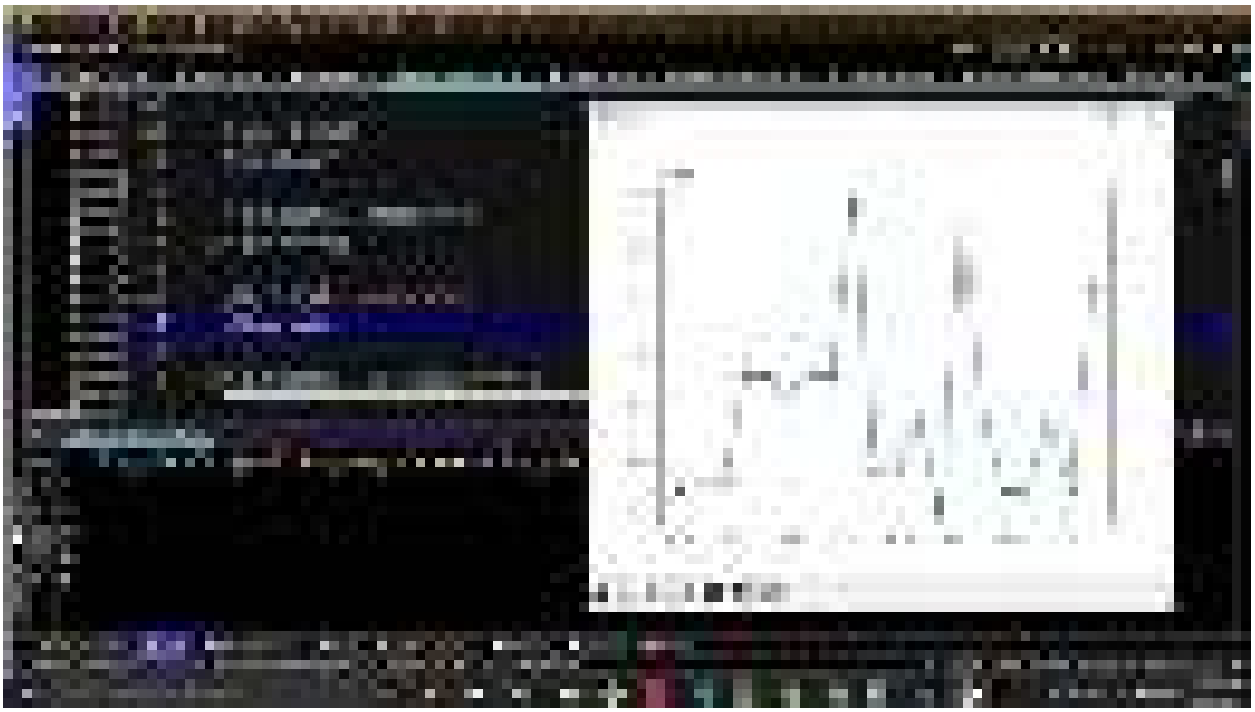


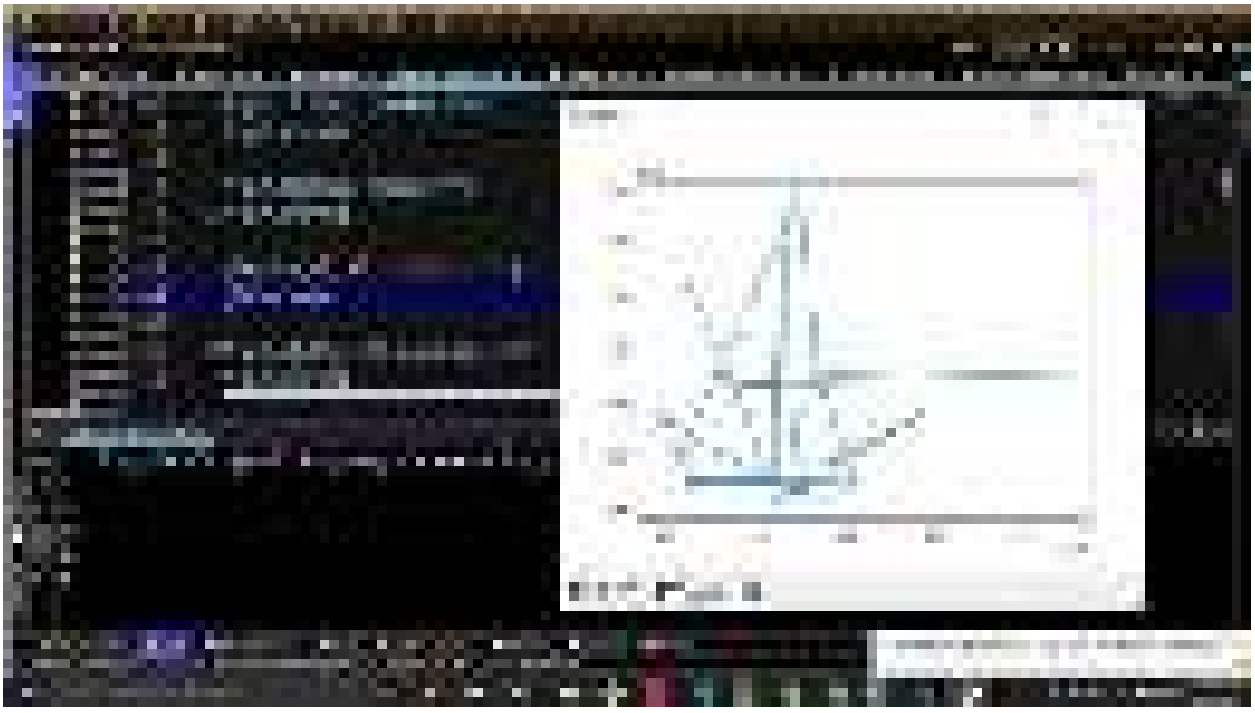


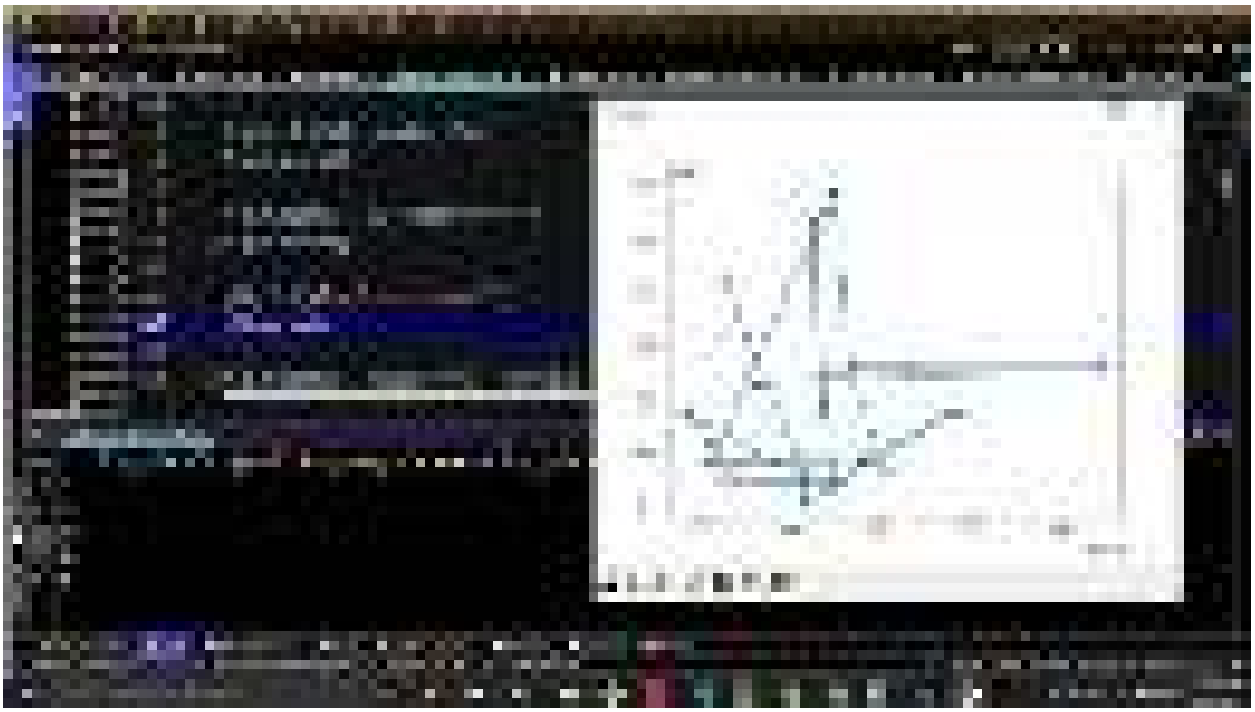


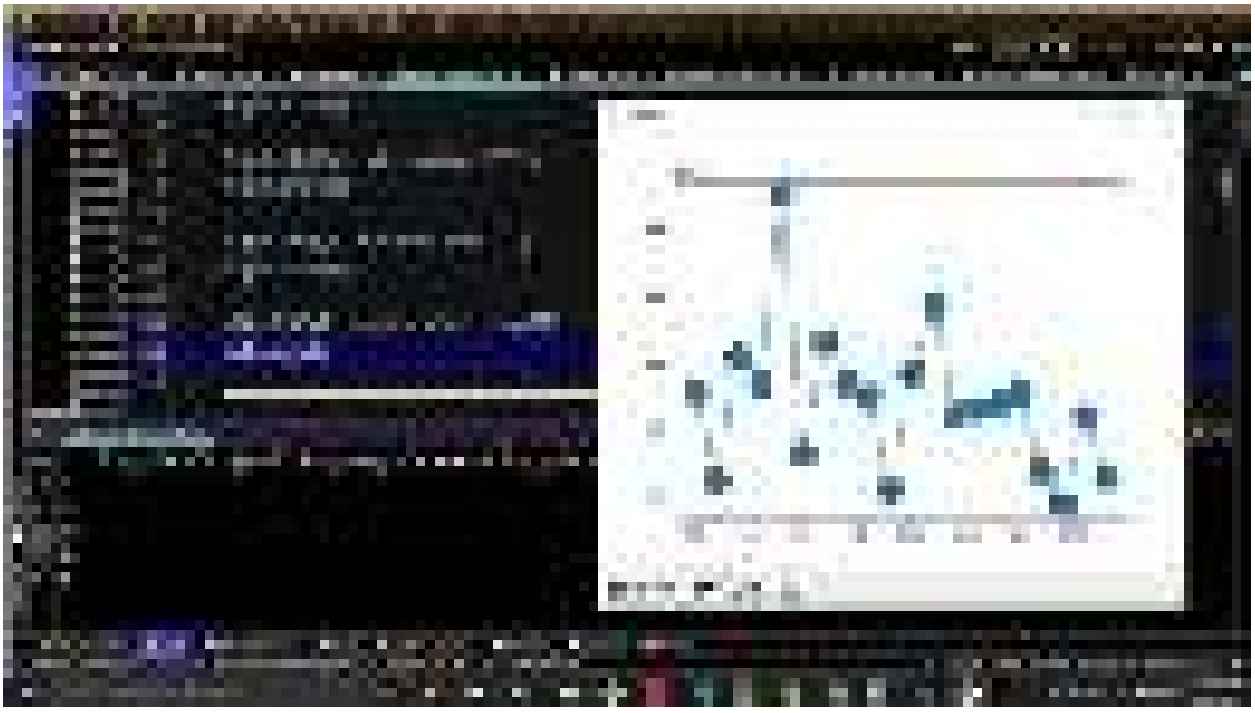


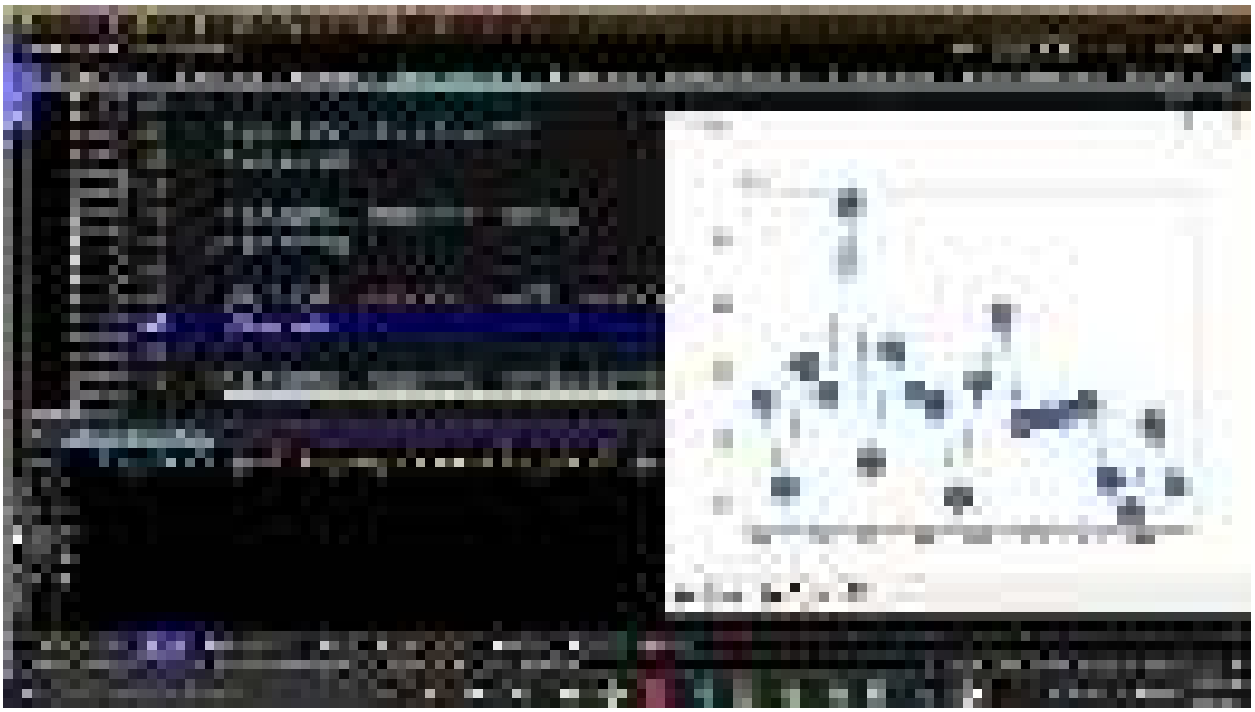


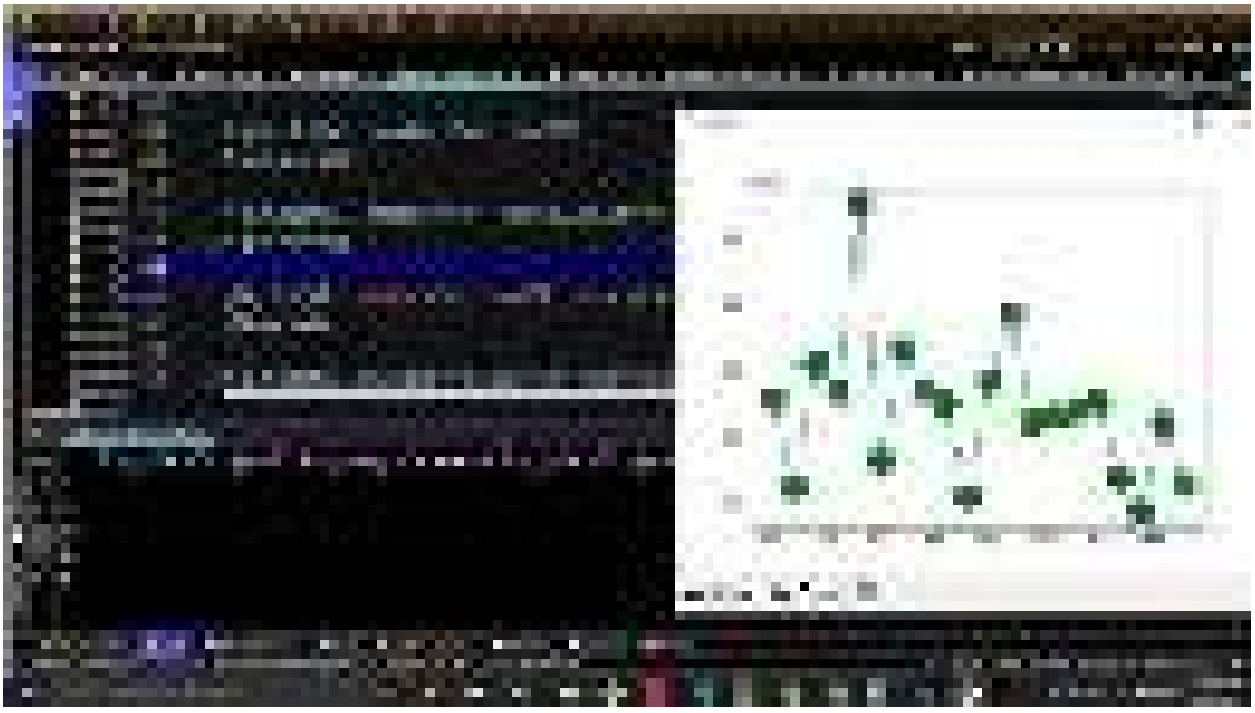


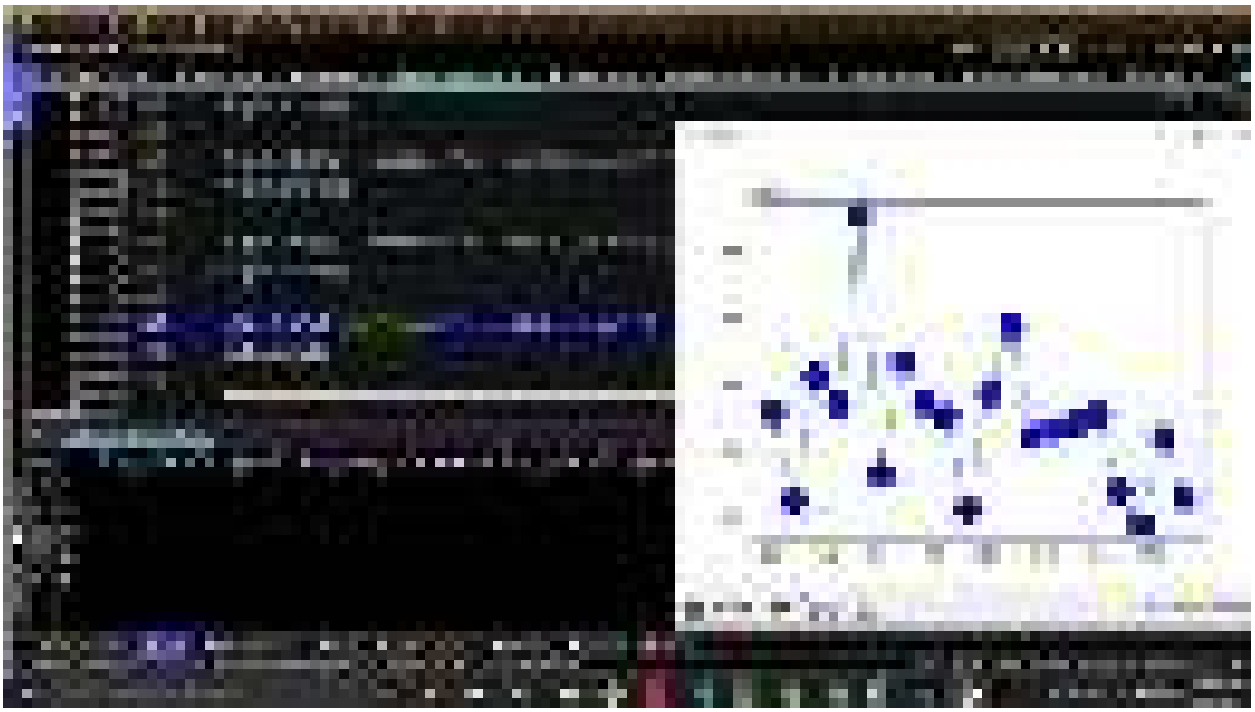


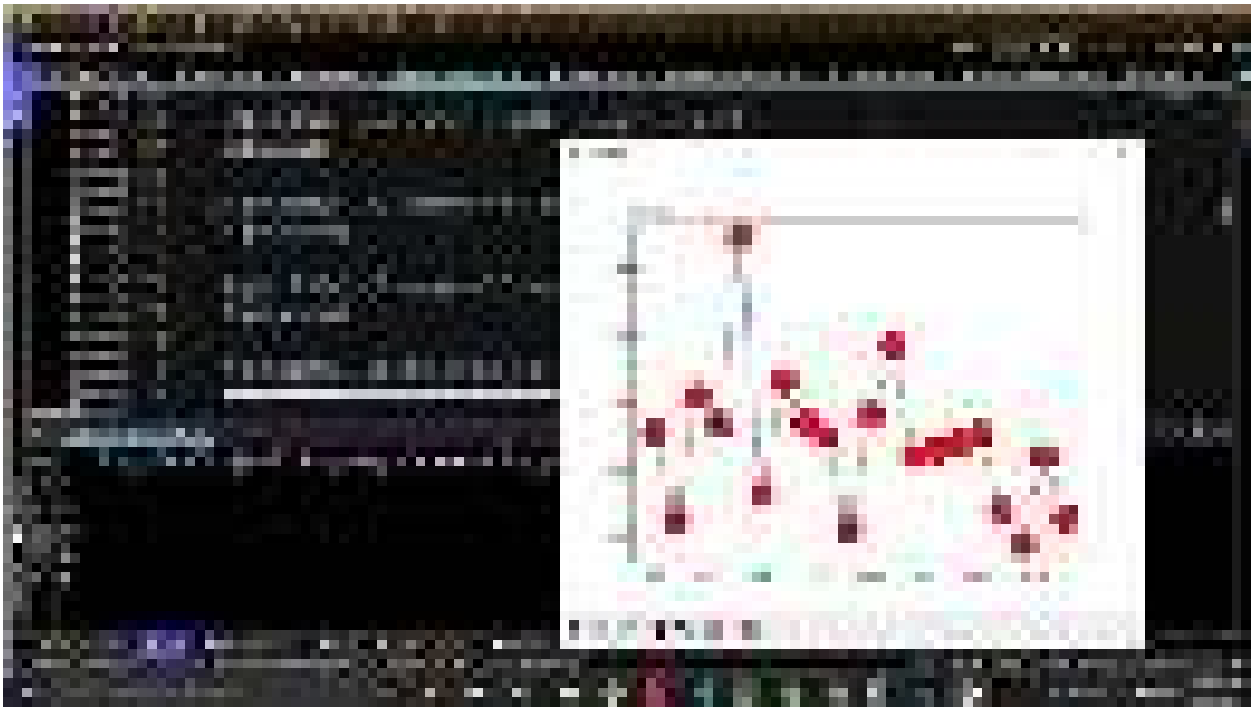


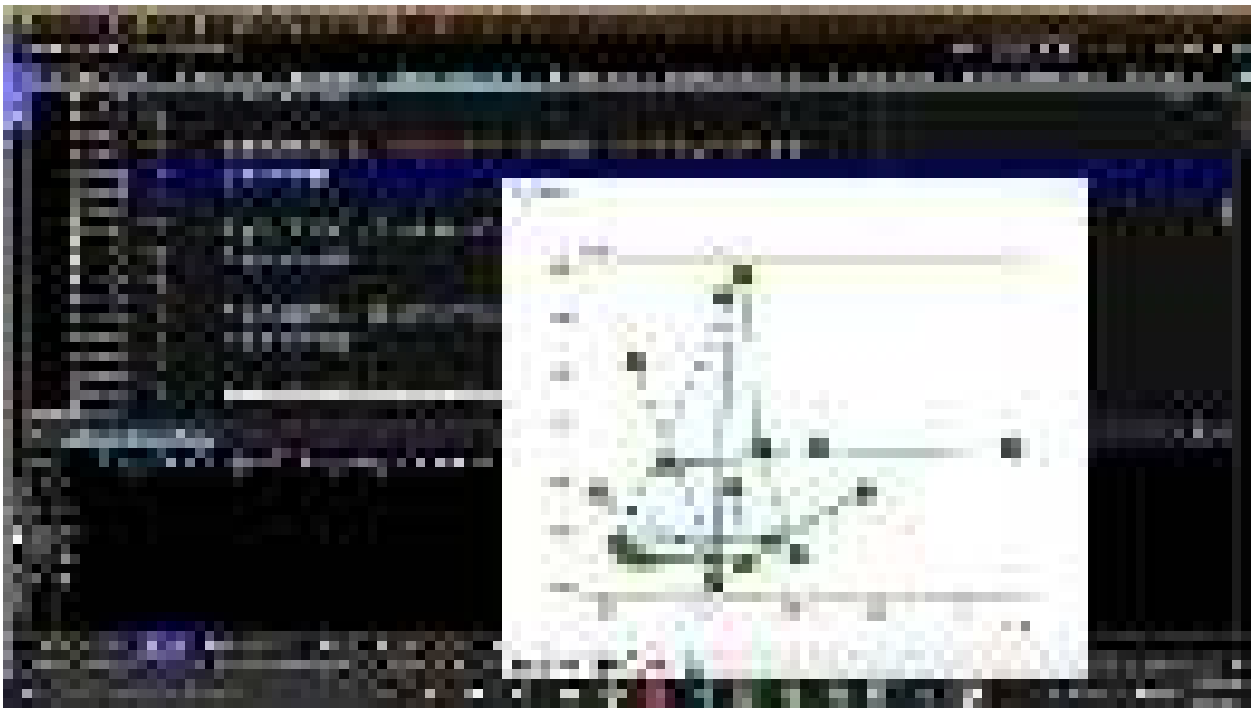


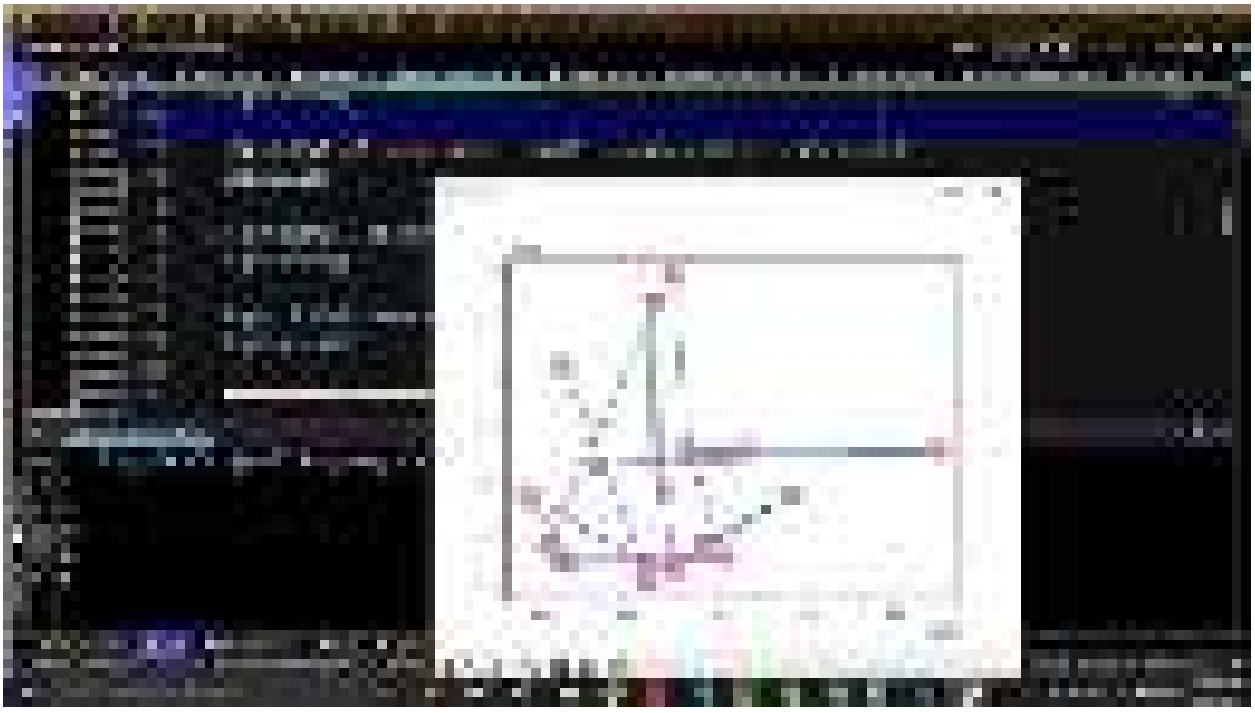


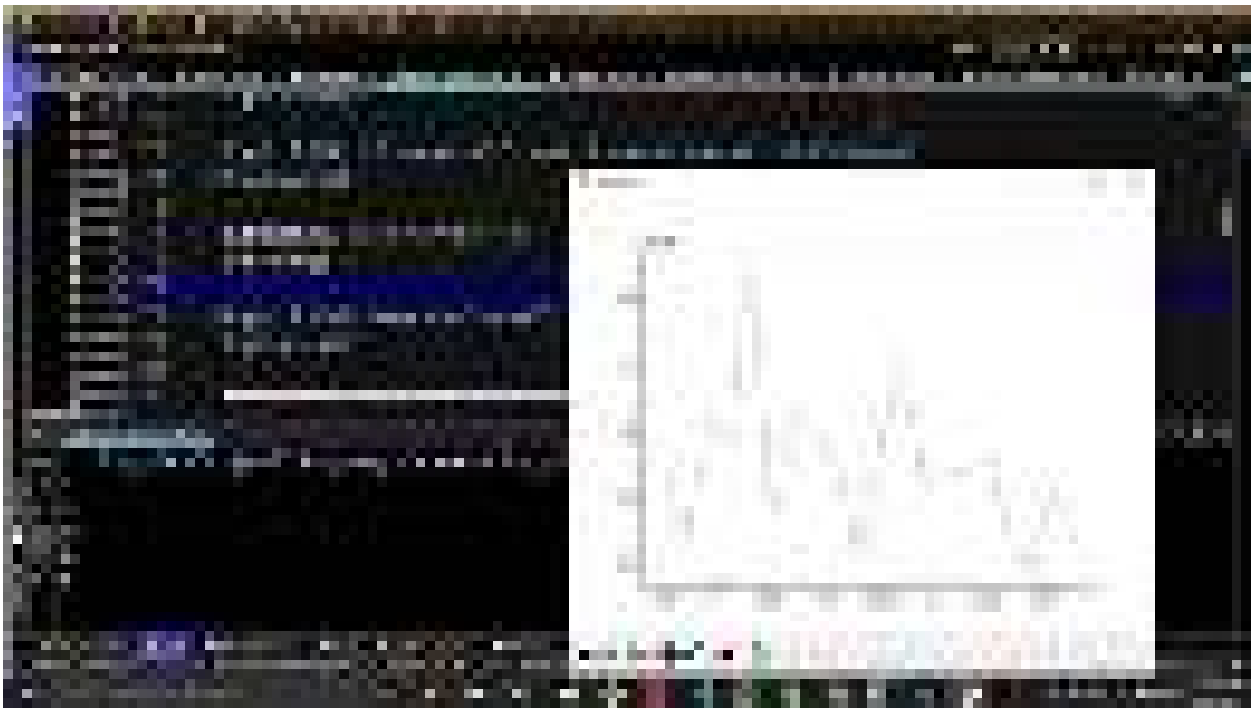


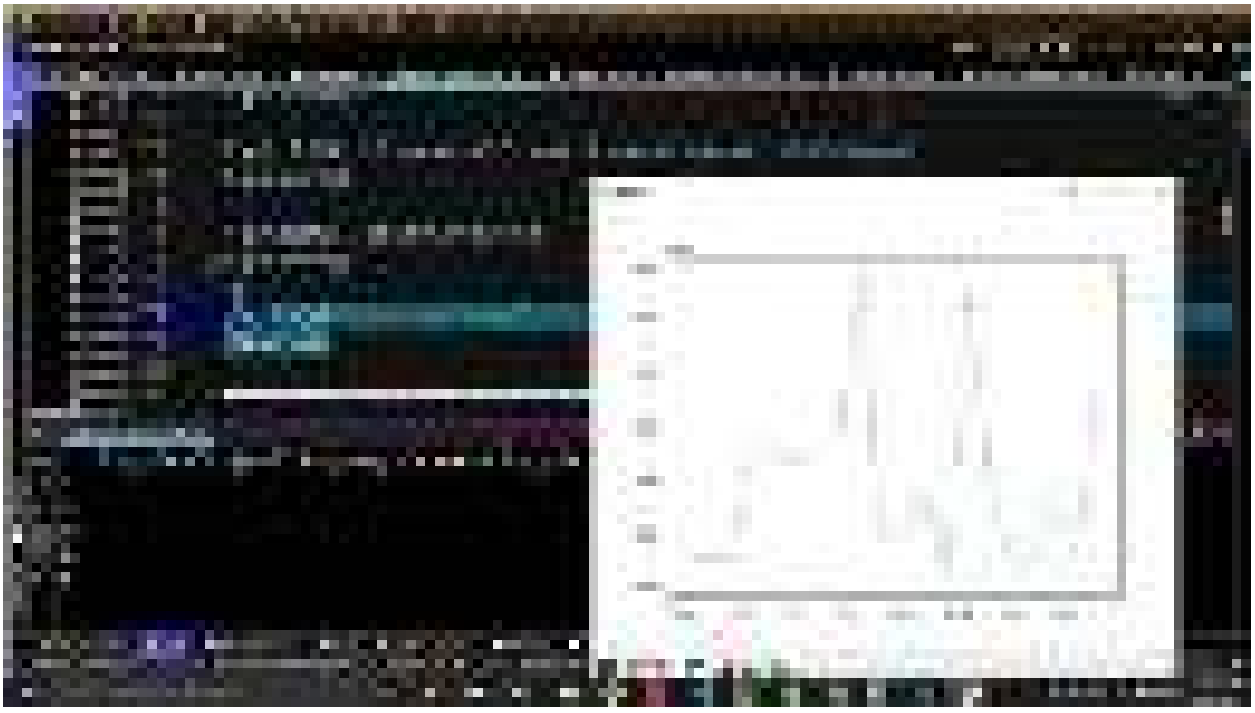


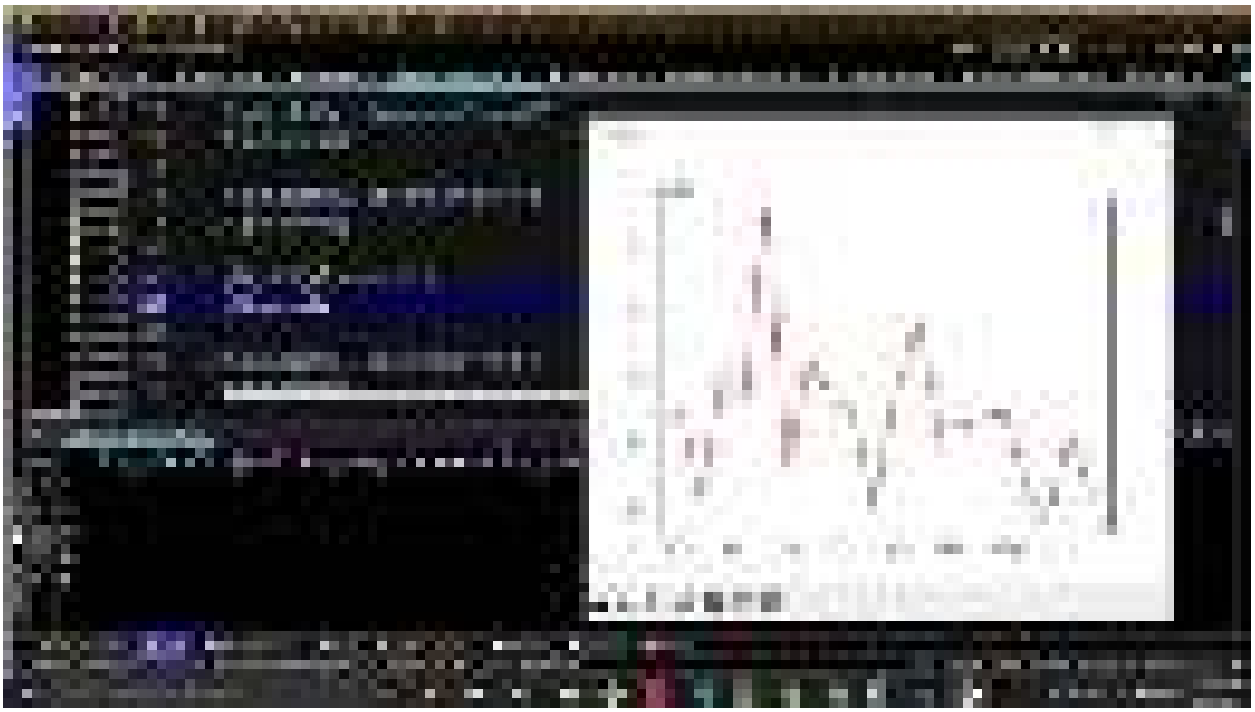


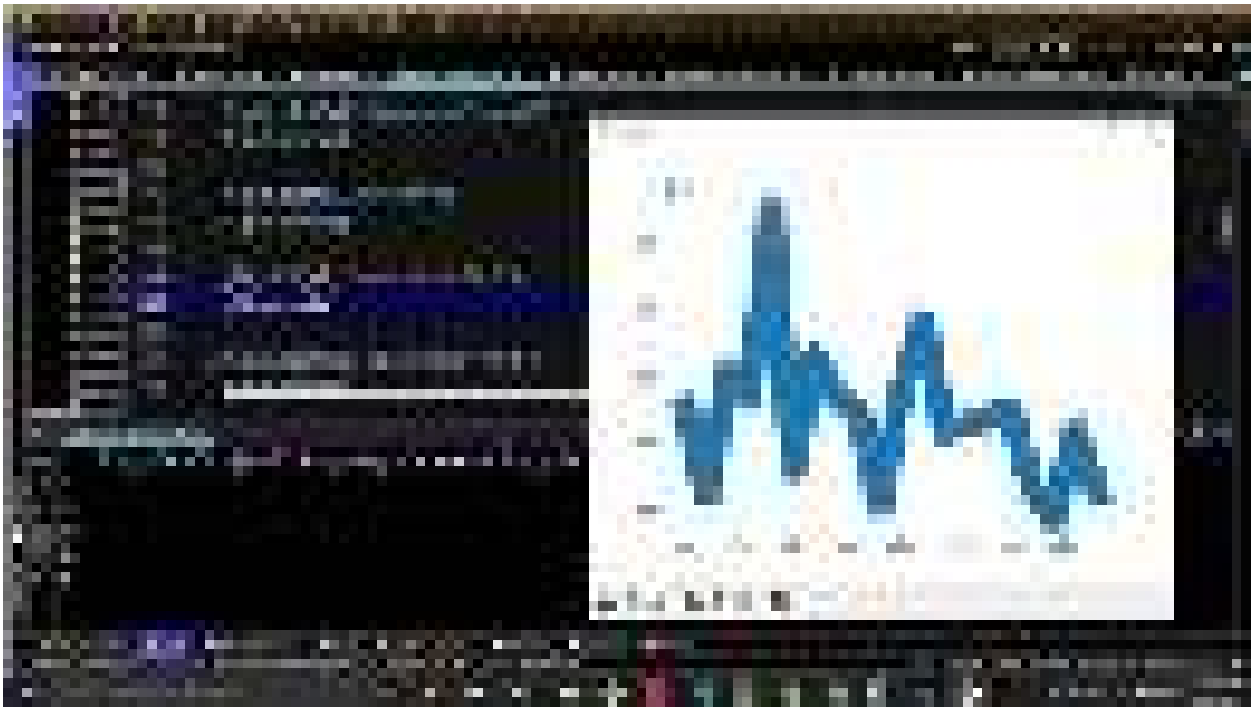


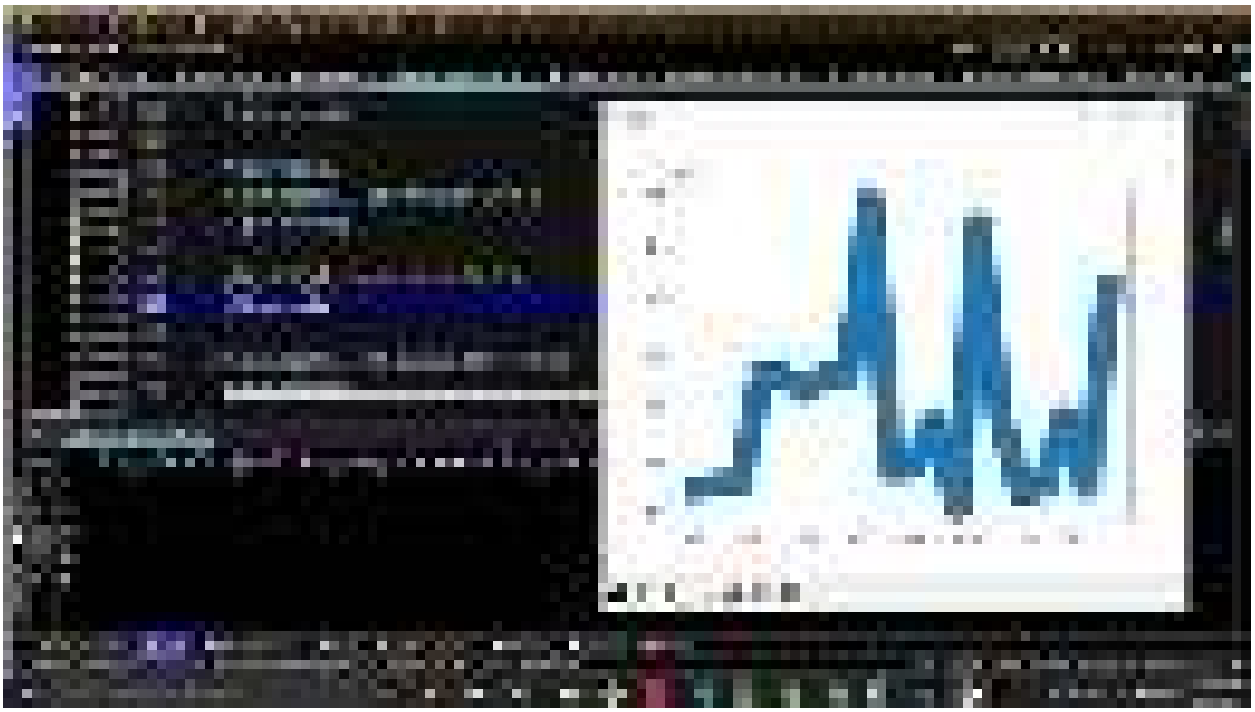


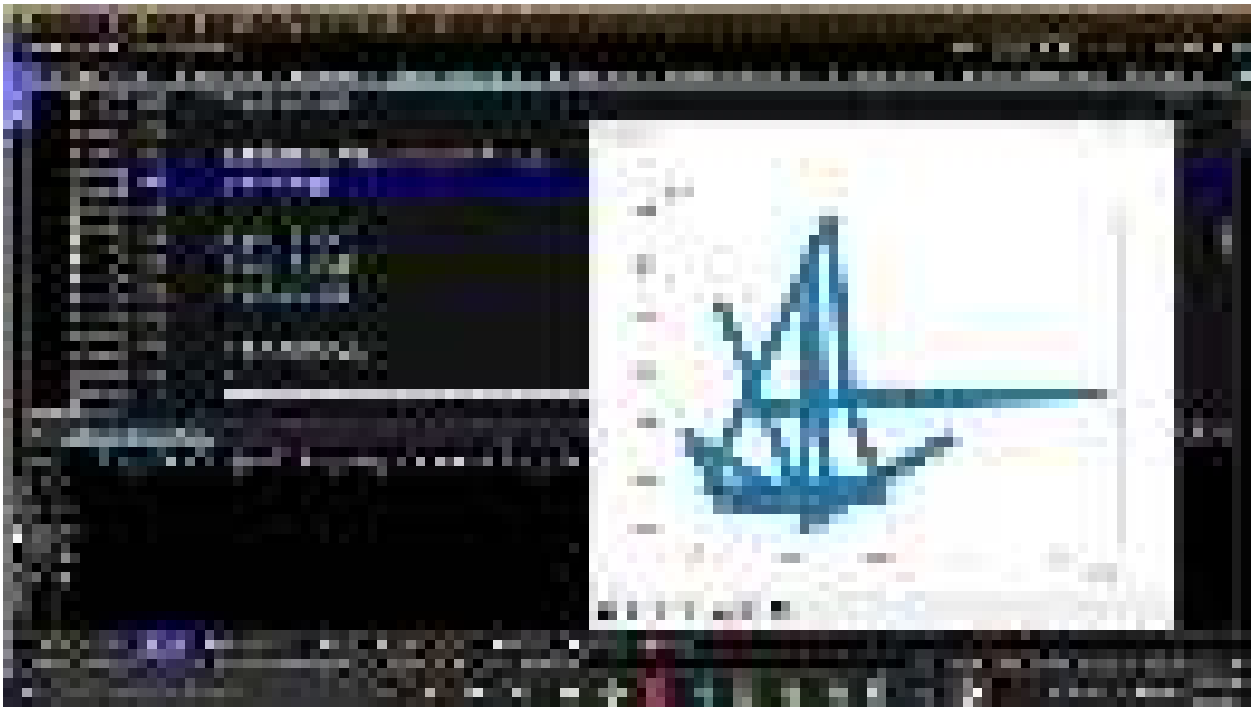


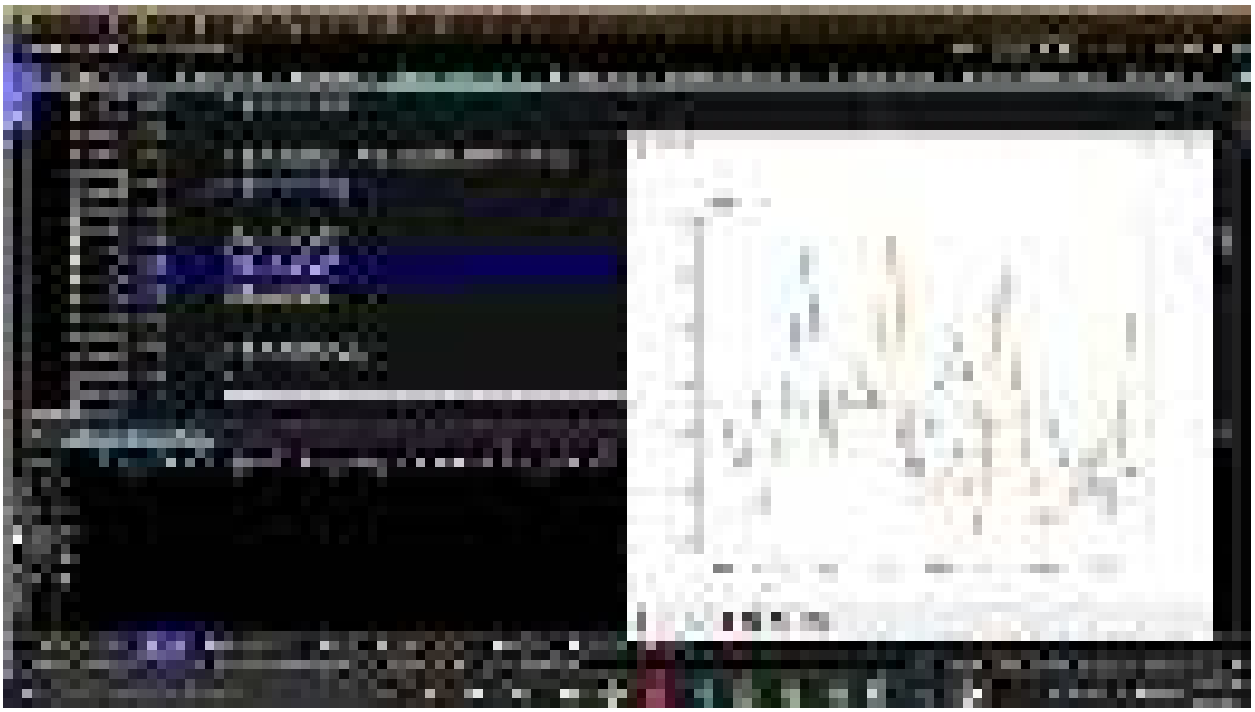


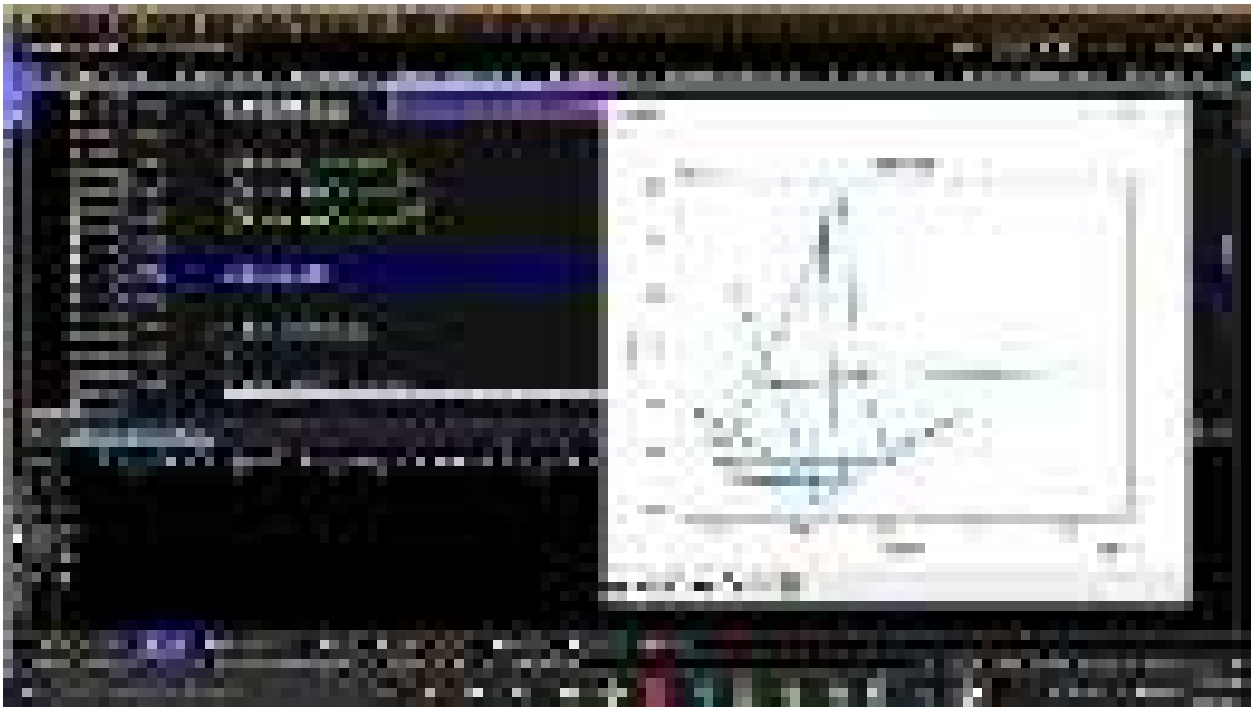


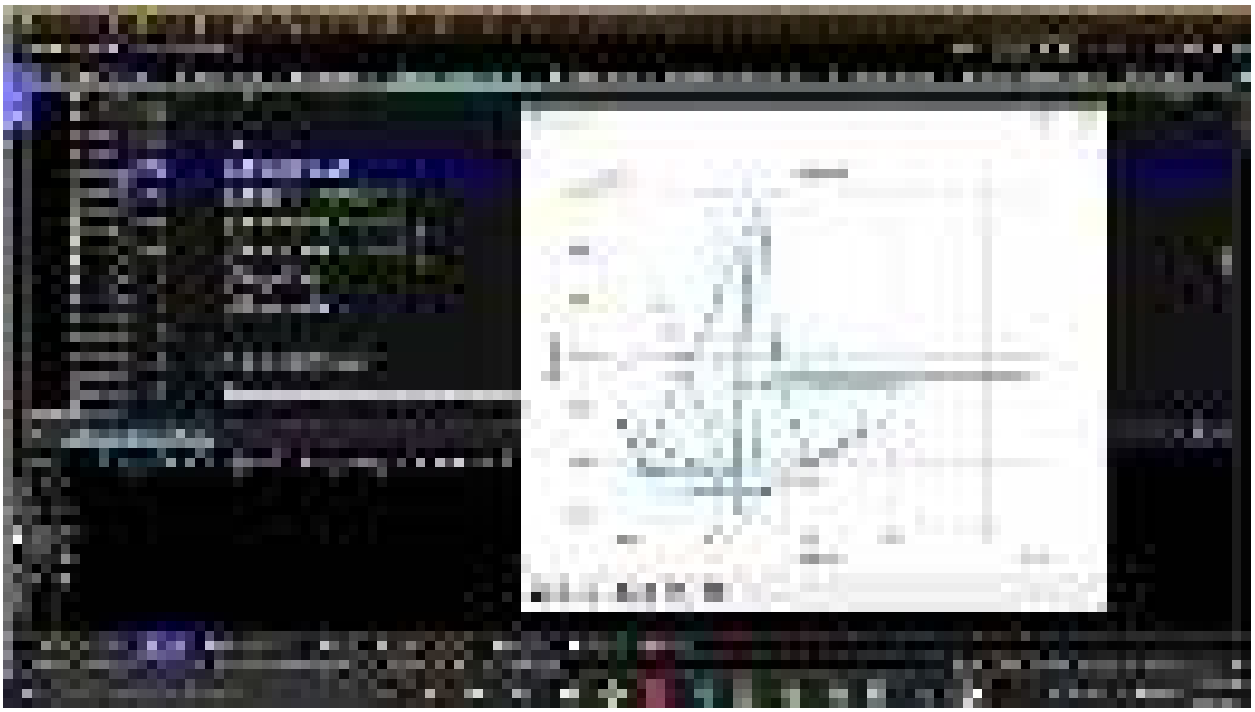


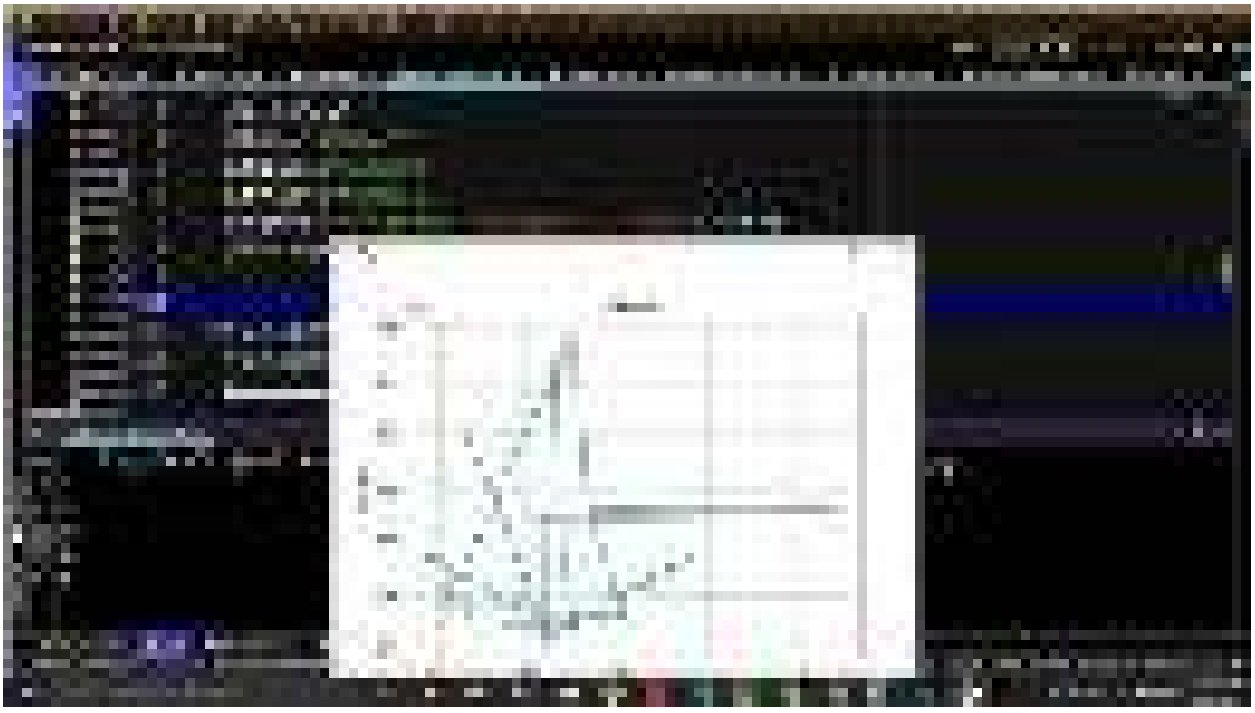


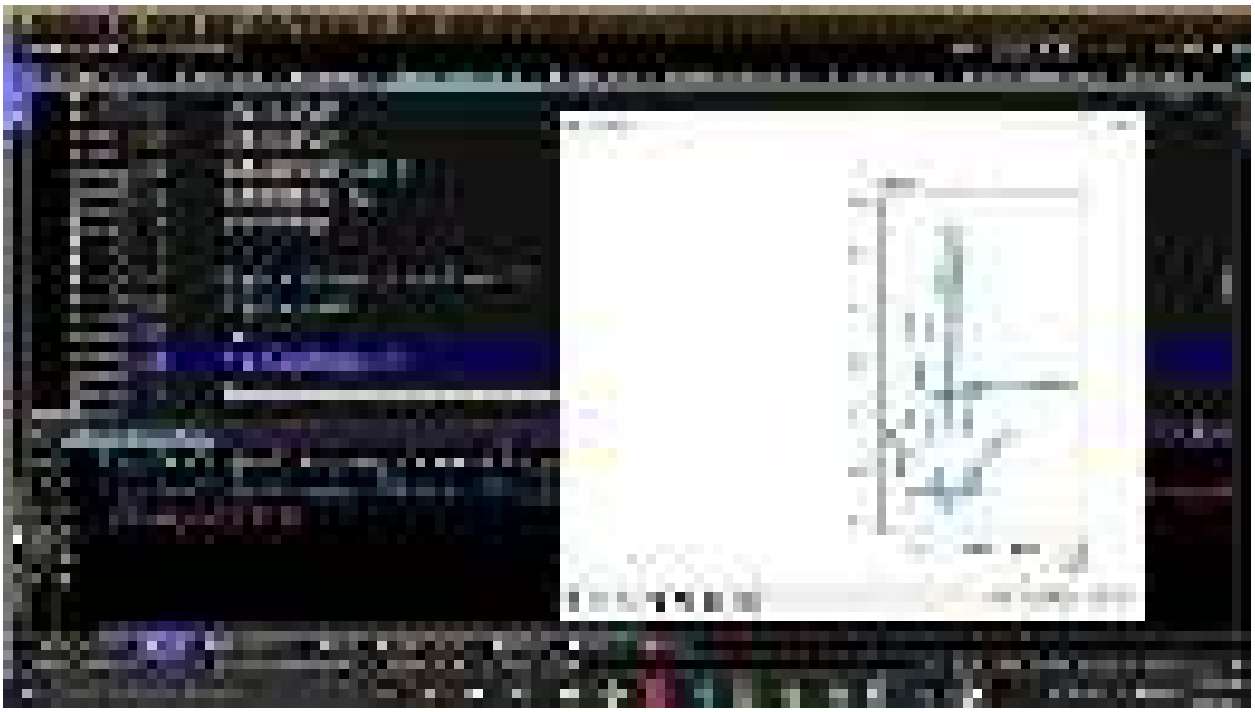


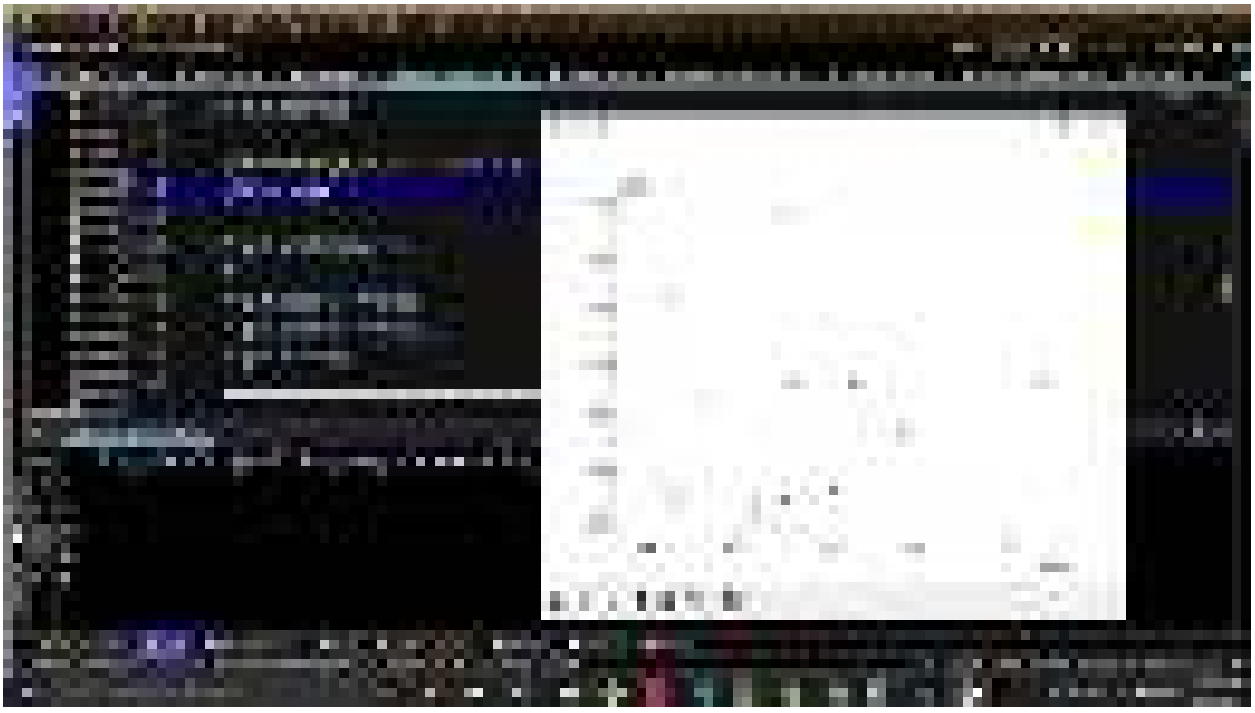


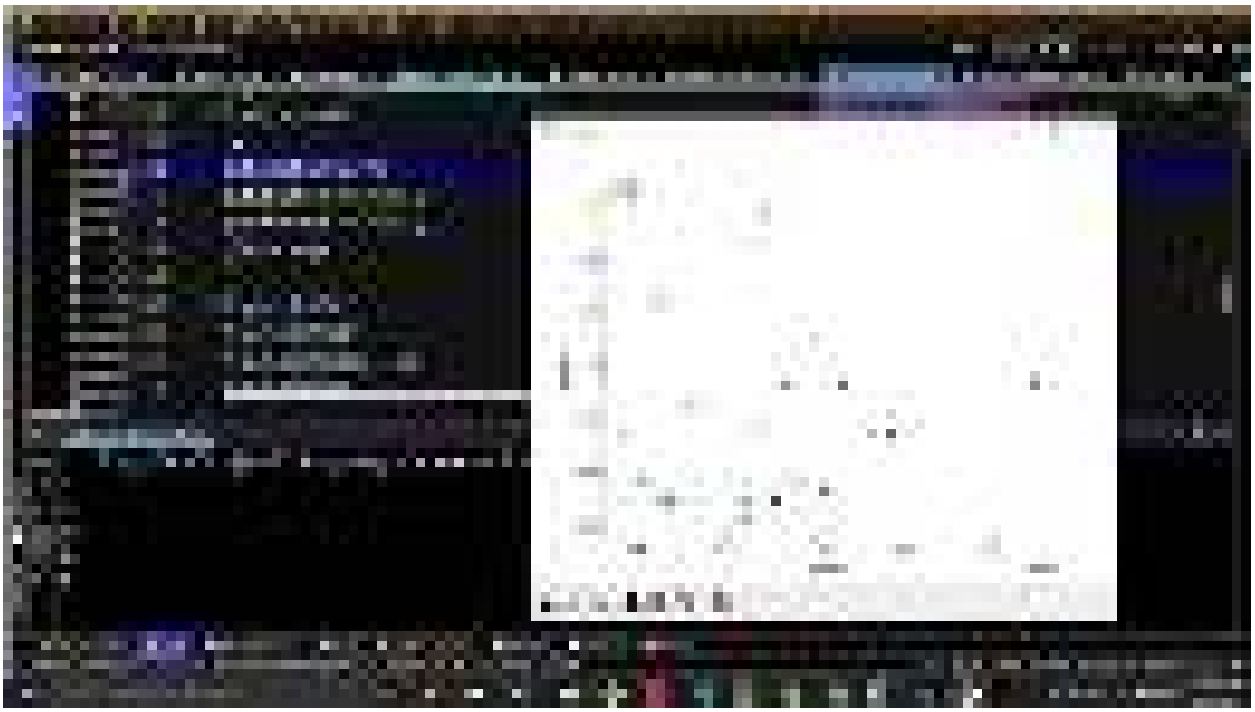


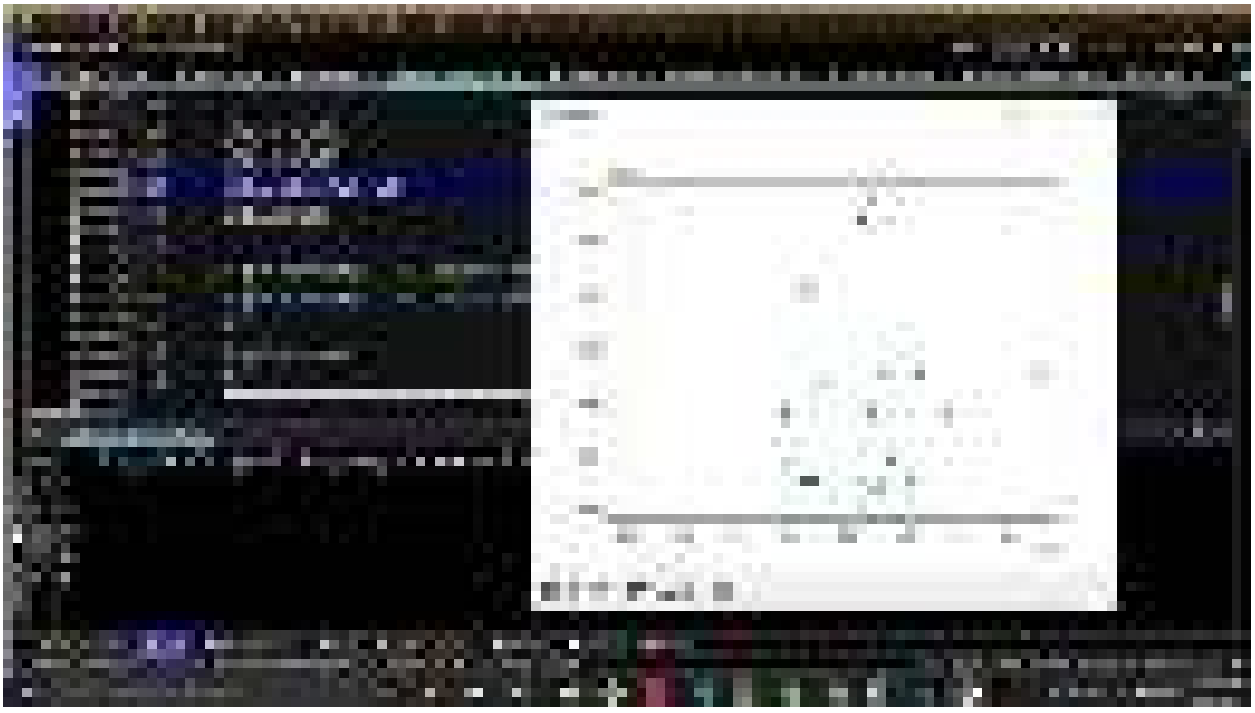


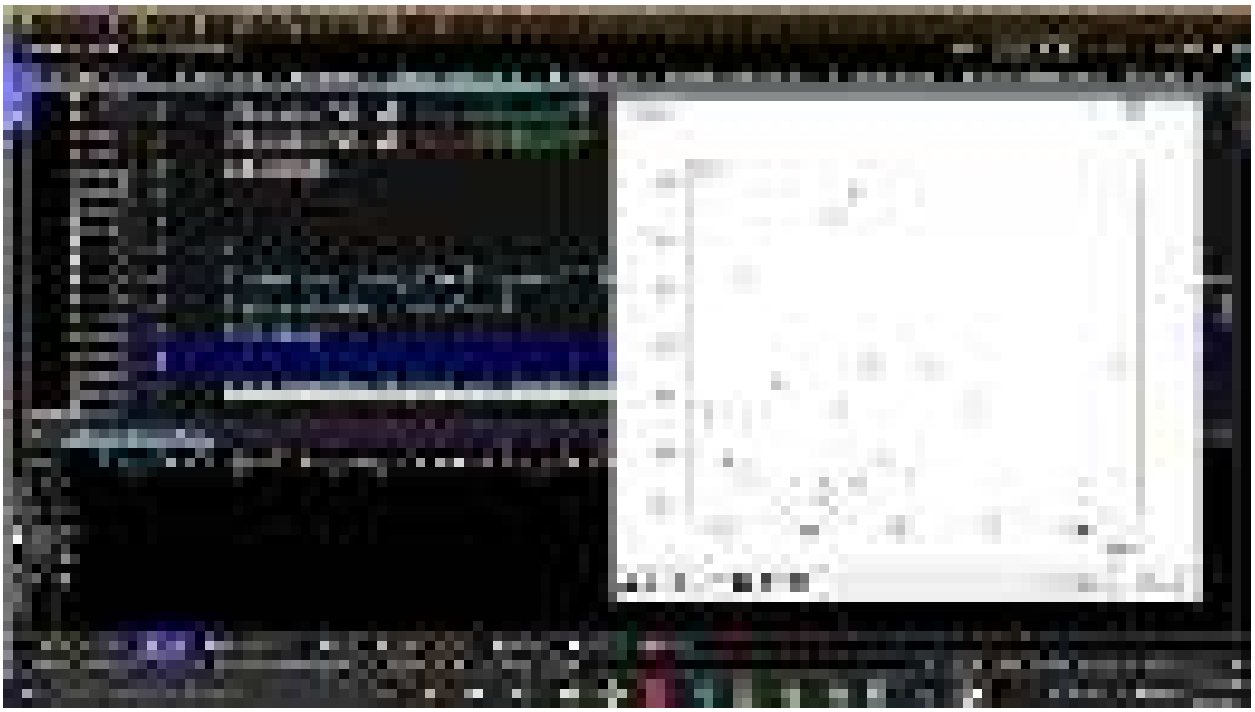


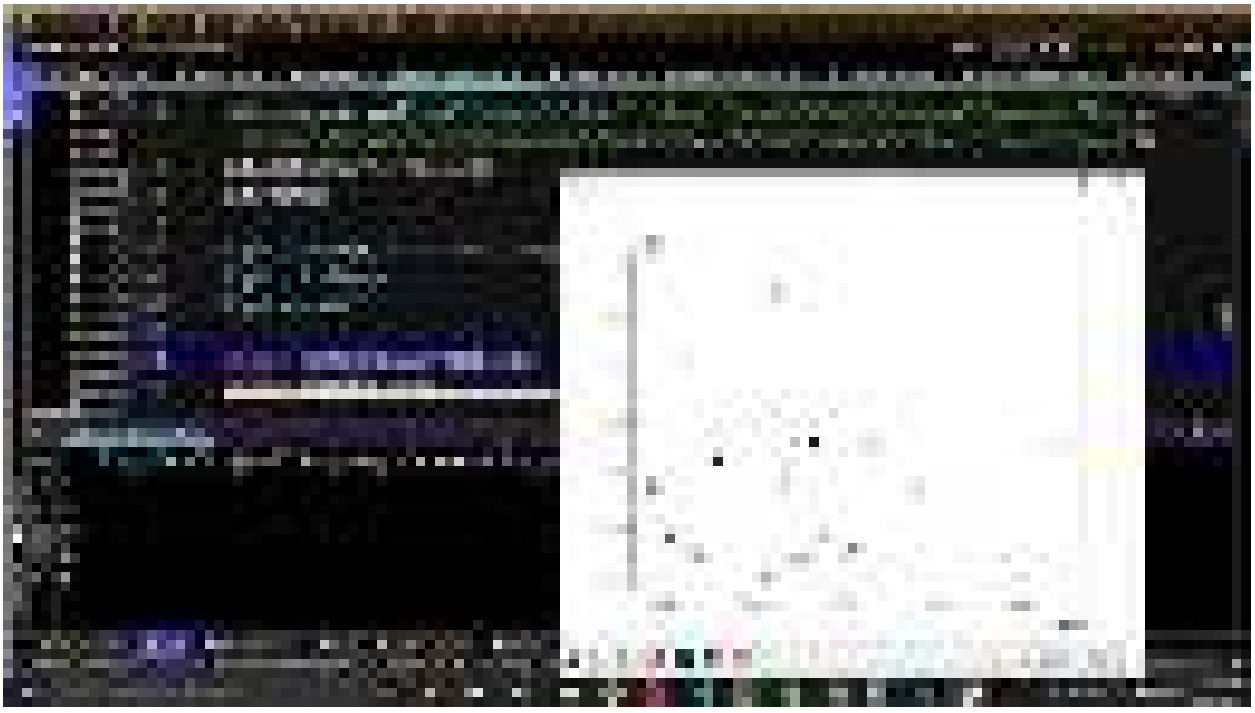


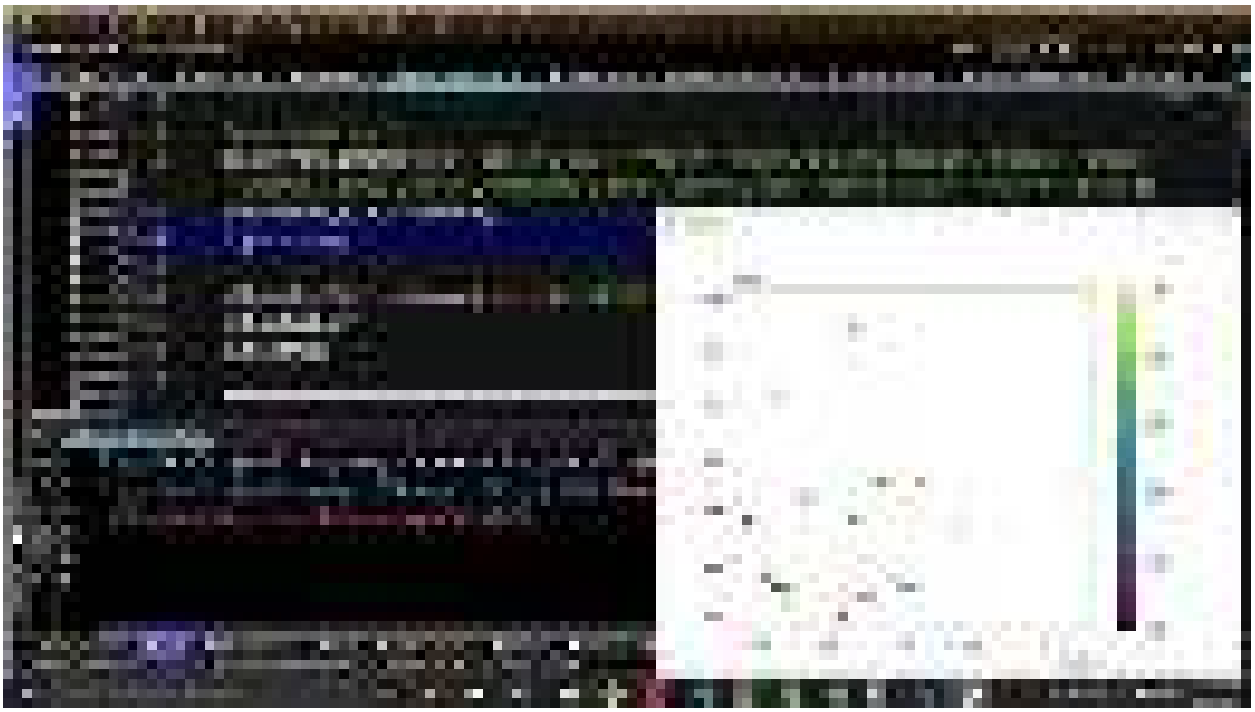


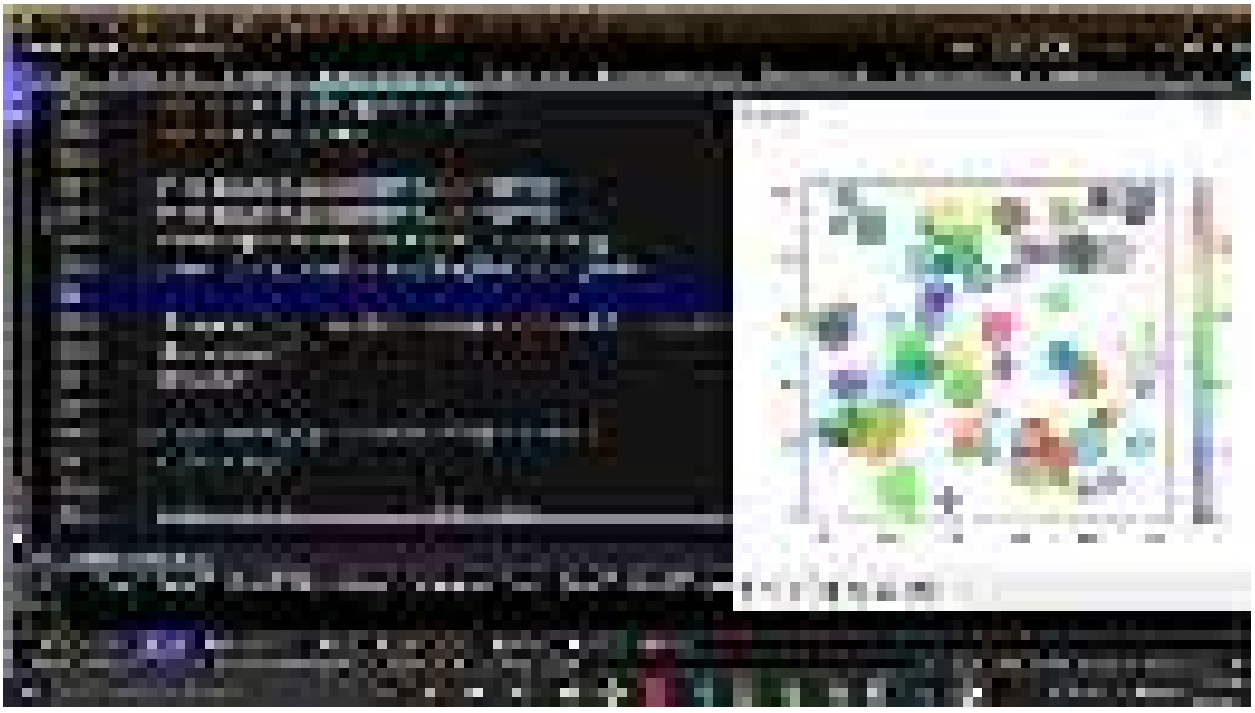


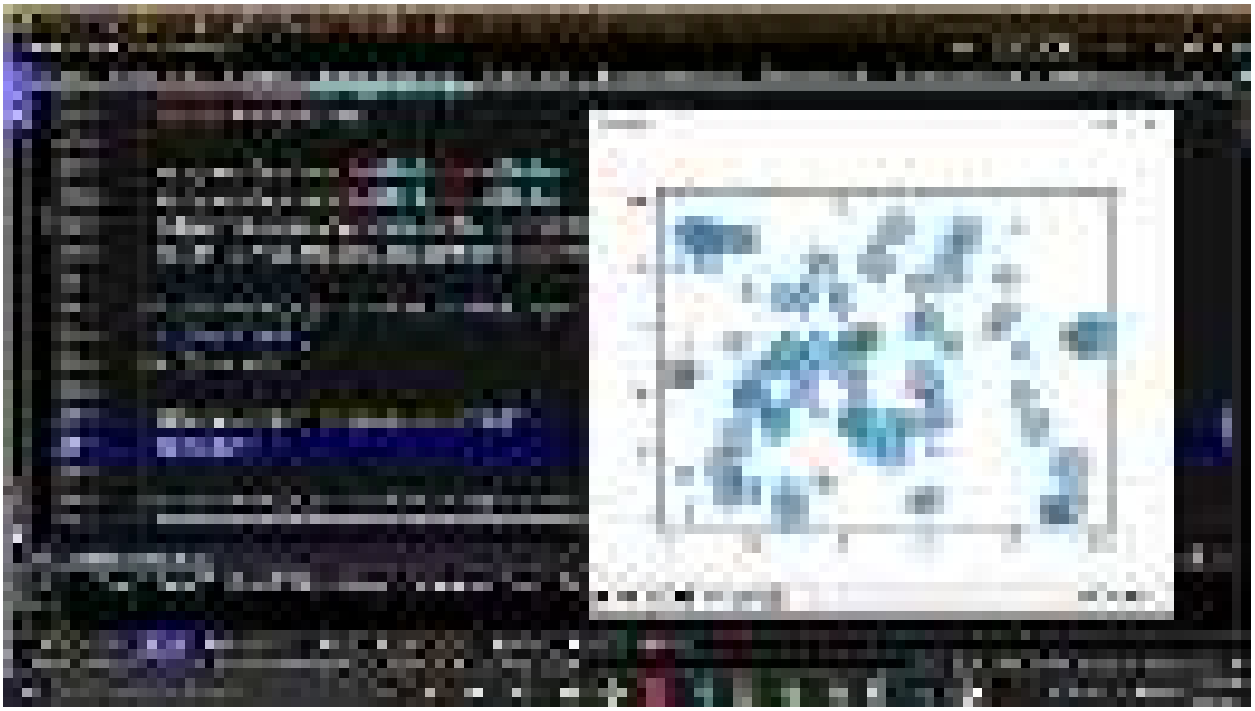


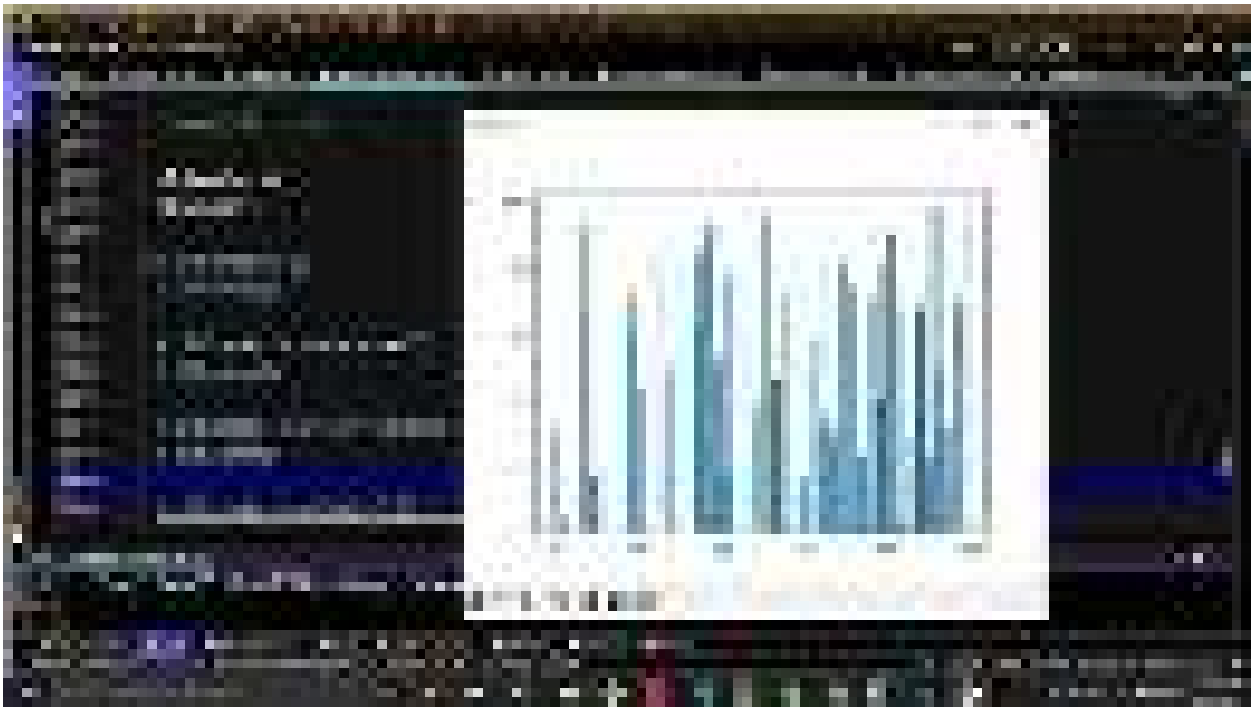


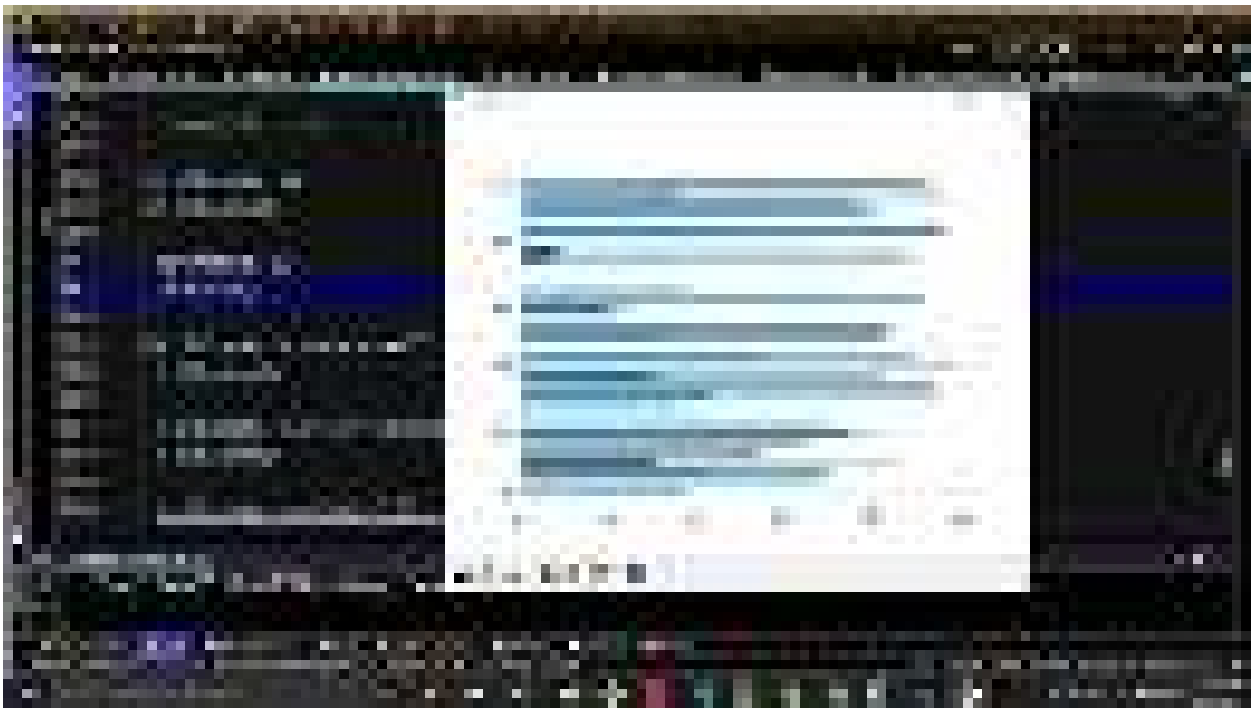


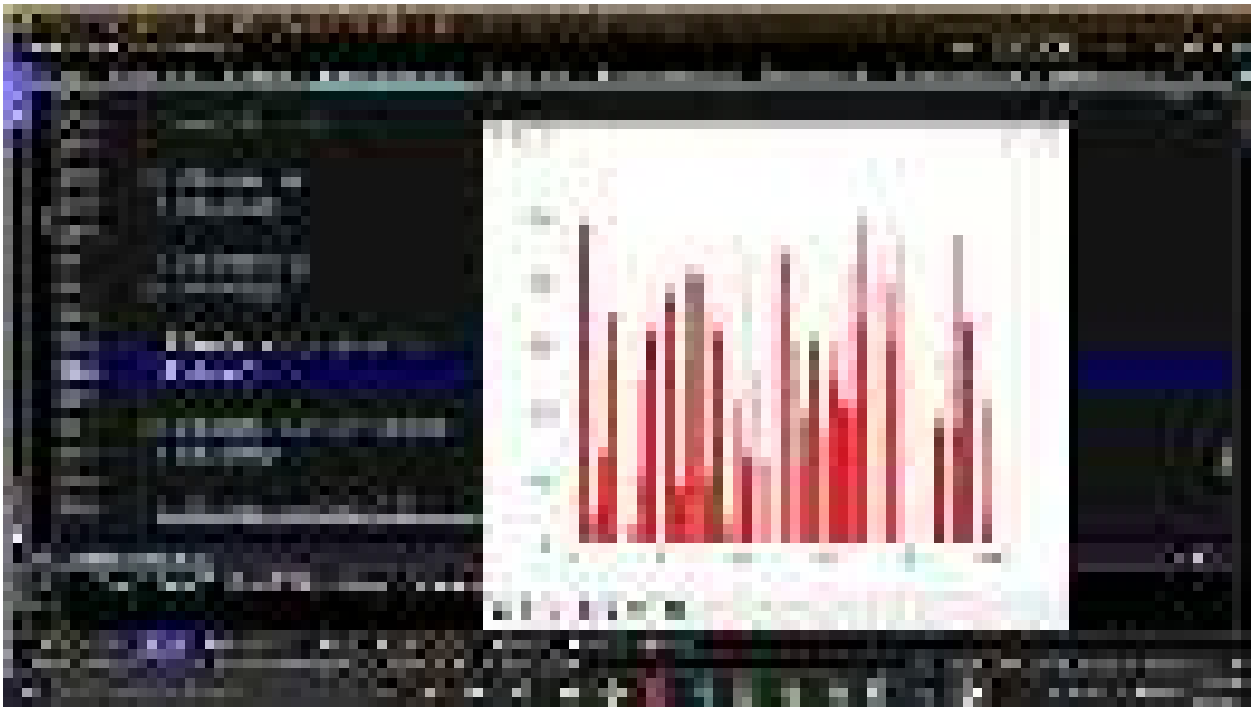


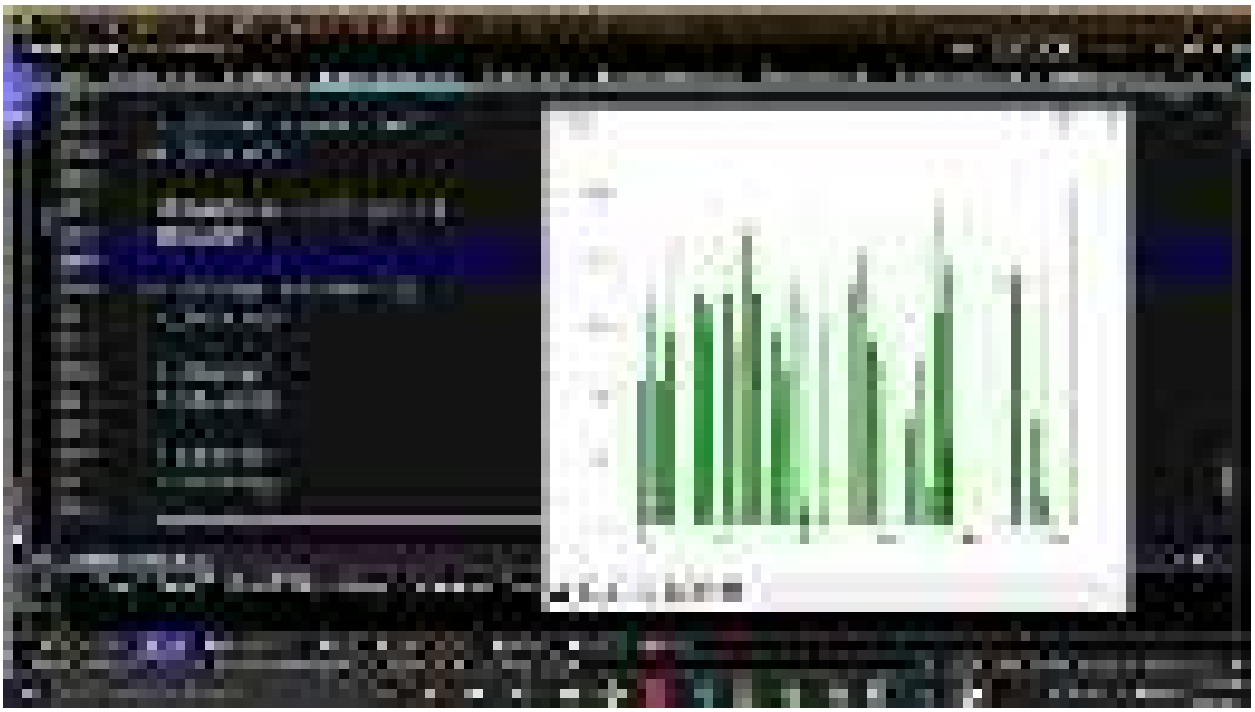


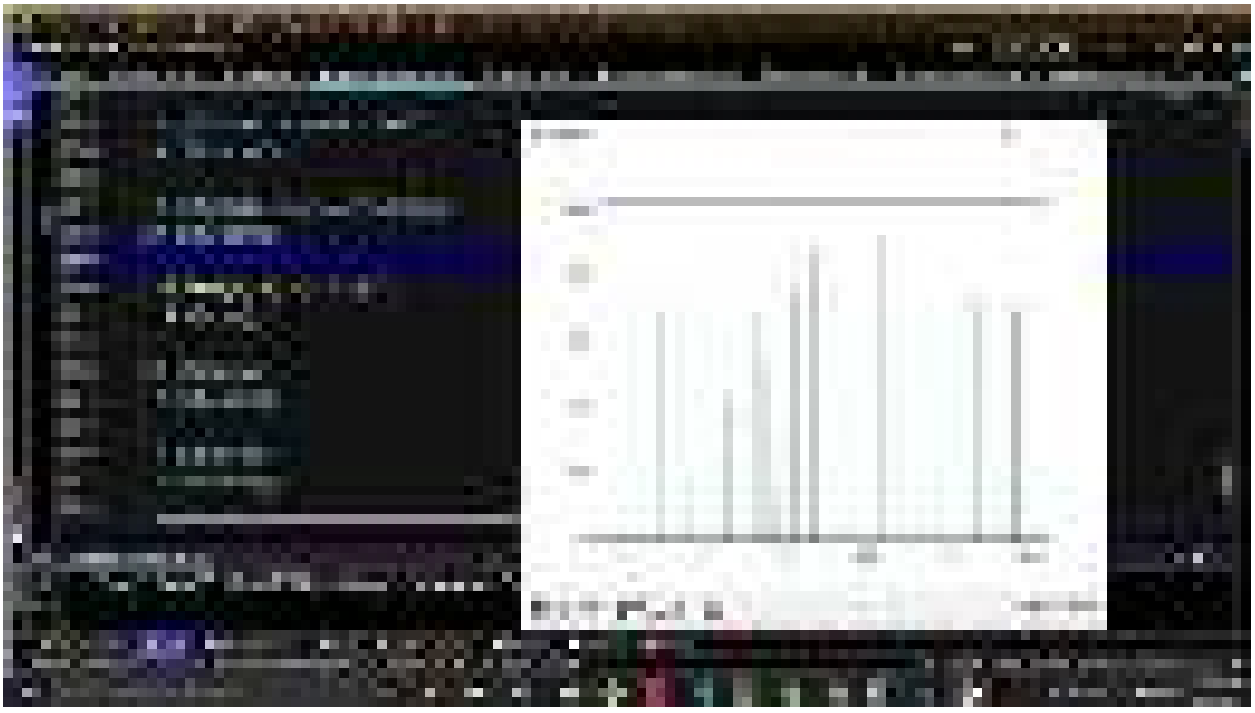


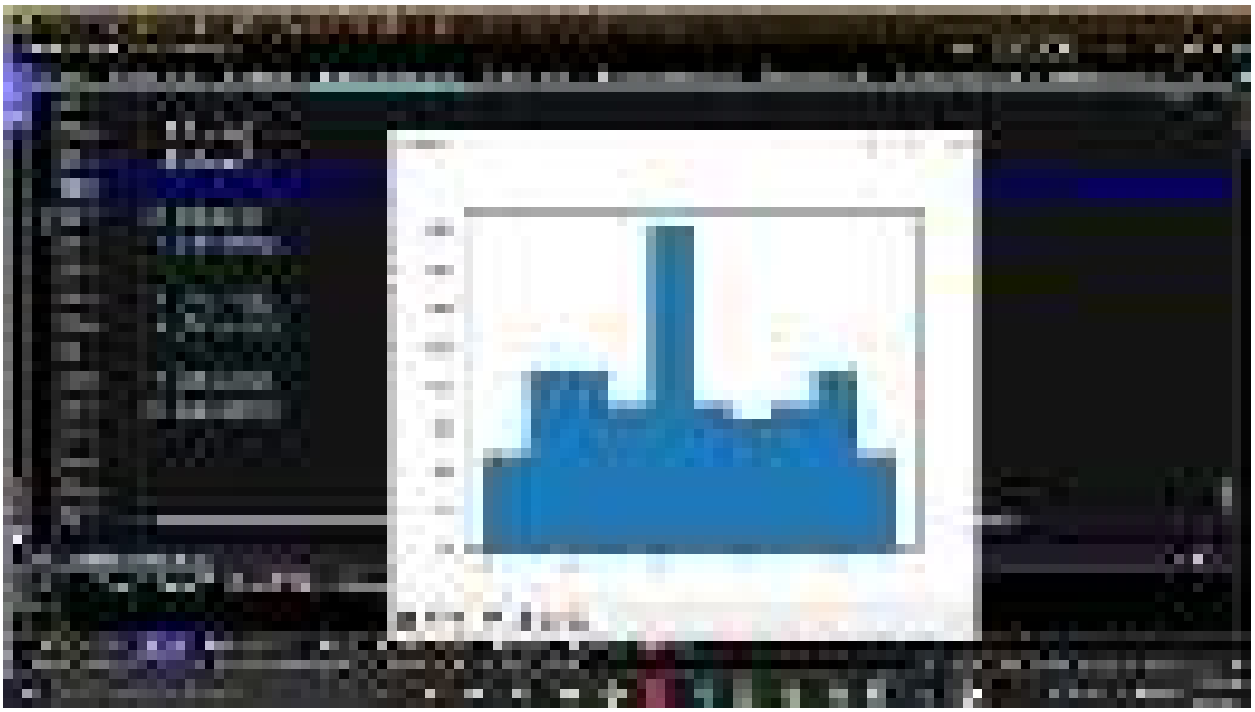


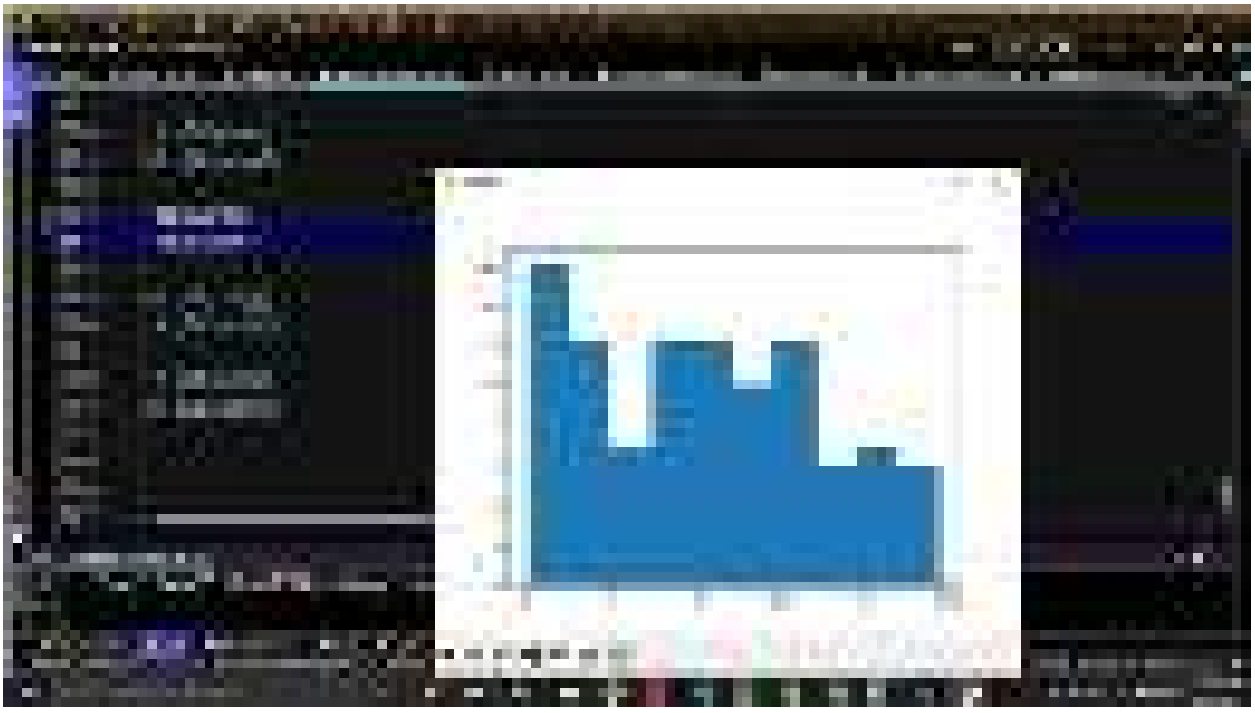


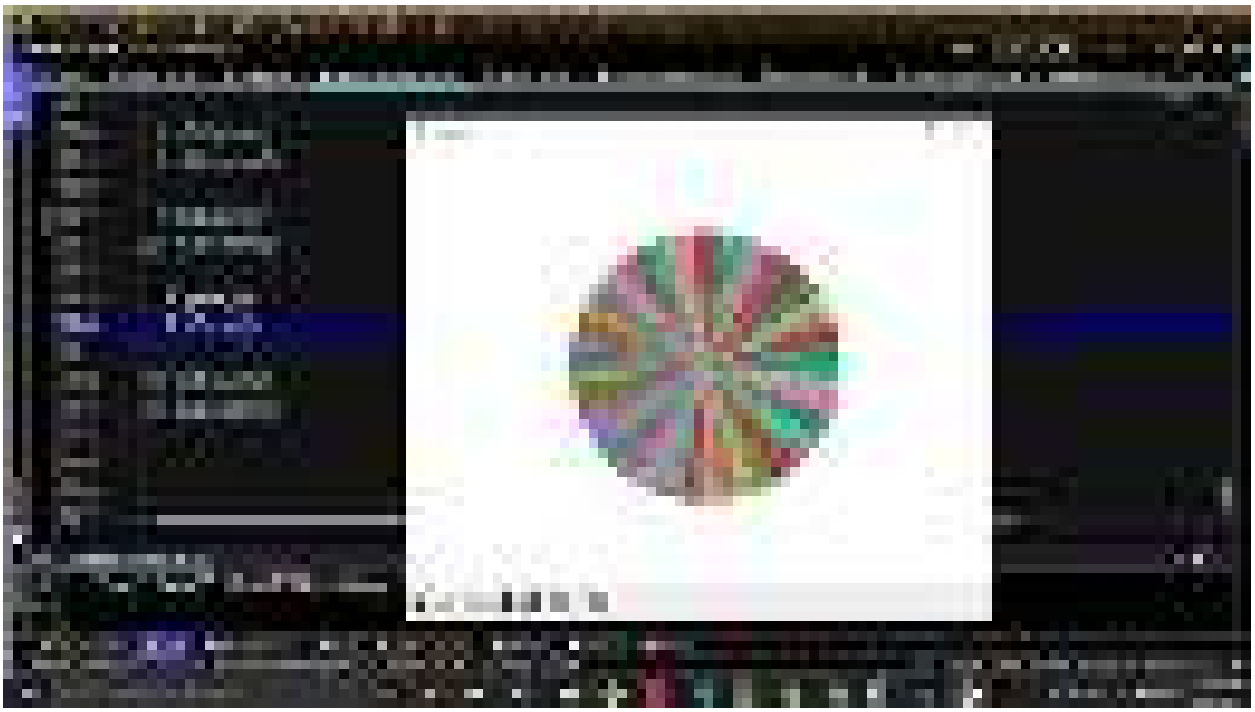


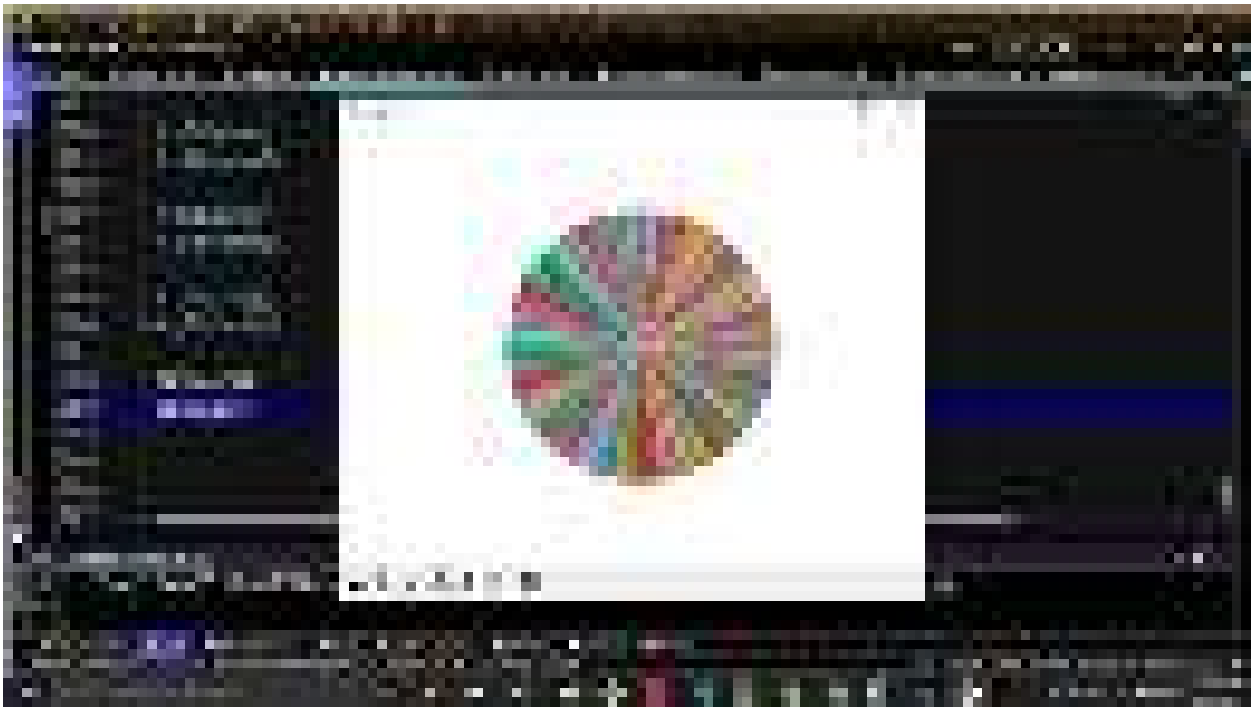












In [3]:
```
import pandas as pd
import seaborn as sns
import numpy as np
import matplotlib.pyplot as plt
```

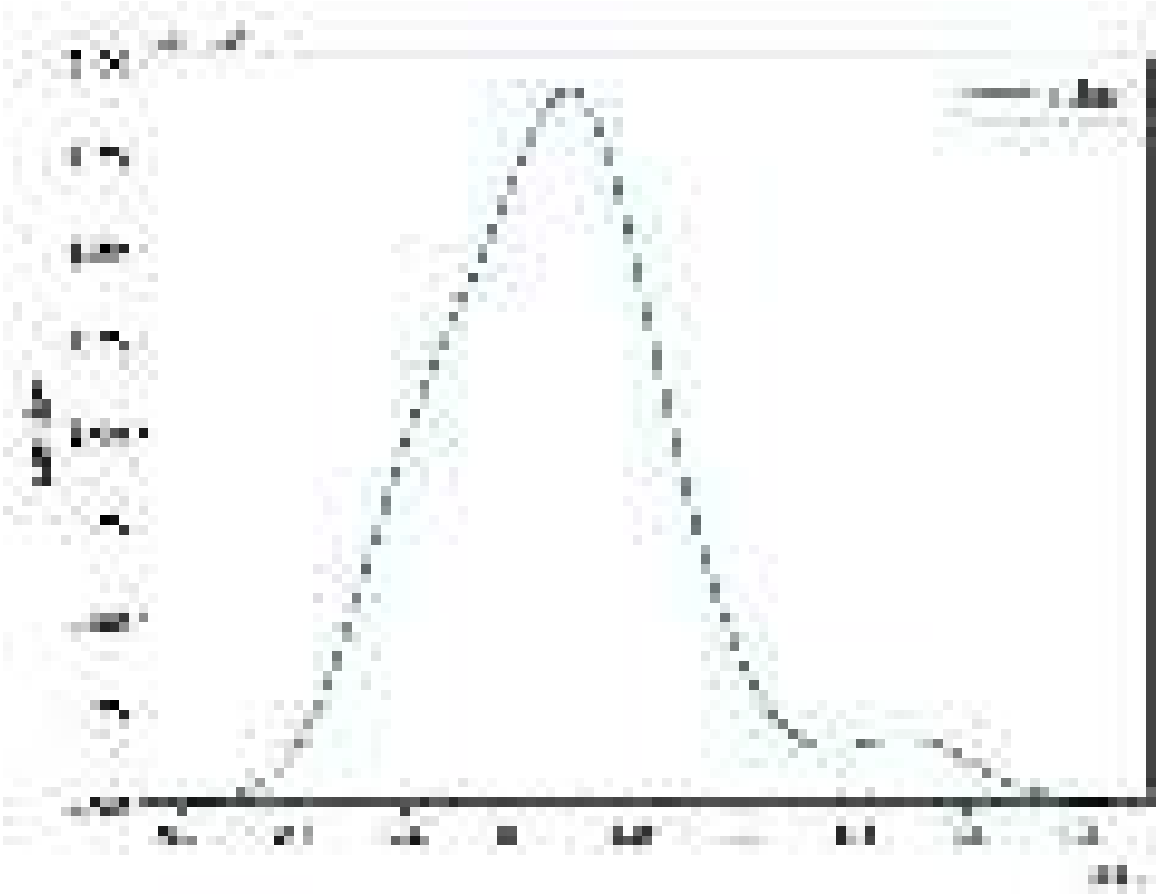
In [2]:
```
v1=pd.read_csv("F:/pythonProject1/data_1.csv")
v1
```

Out[2]:

	value
0	9092102363
1	6472709796
2	10160947368
3	9341351130
4	14949939352
5	7255855965
6	10612729729
7	9371213738
8	8973607594
9	6193104781
10	9633522721
11	11674500000
12	8374481326
13	8574481326
14	8776534994
15	9046301304
16	6746301304
17	5746301304
18	8361462899
19	6561462899

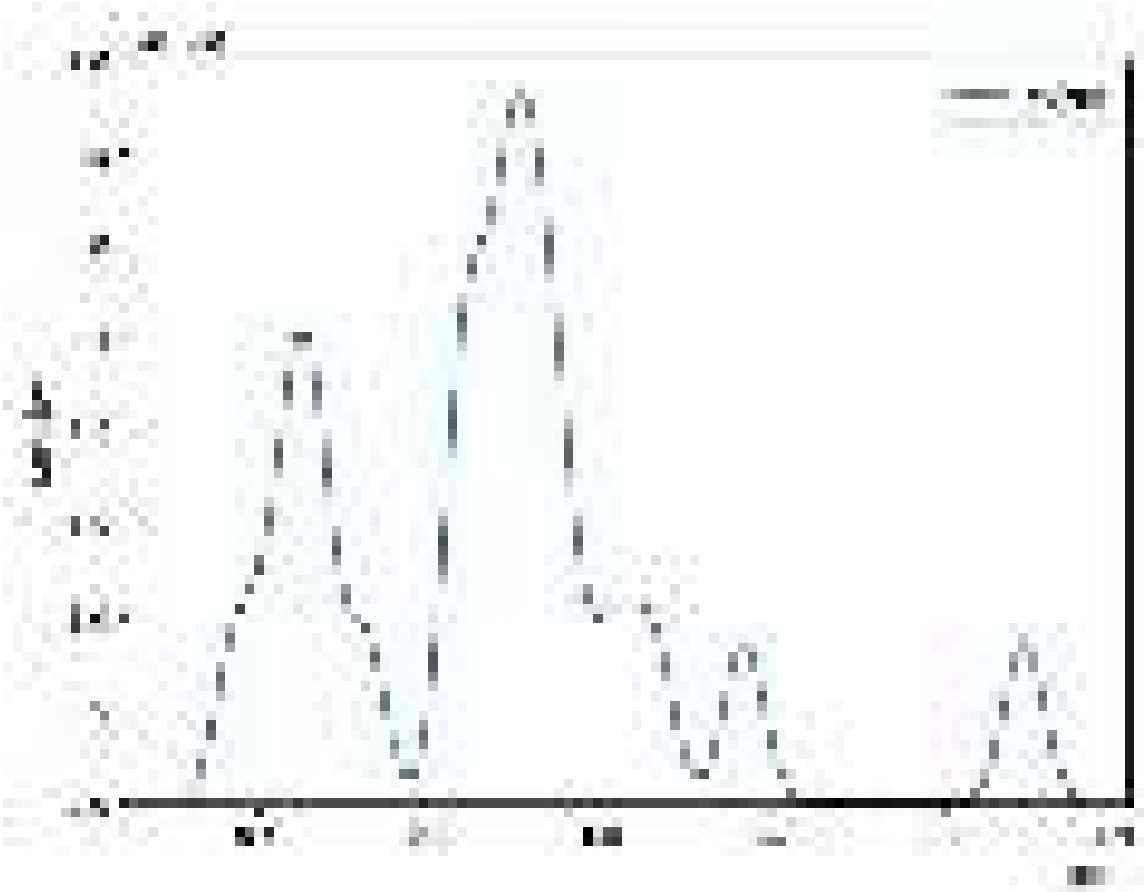
In [5]:
```
sns.kdeplot(data=v1)
```

Out[5]:
```
<AxesSubplot:ylabel='Density'>
```



In [6]:
```
sns.kdeplot(data=v1, bw_adjust=.2)
```

Out[6]:
```
<AxesSubplot:ylabel='Density'>
```



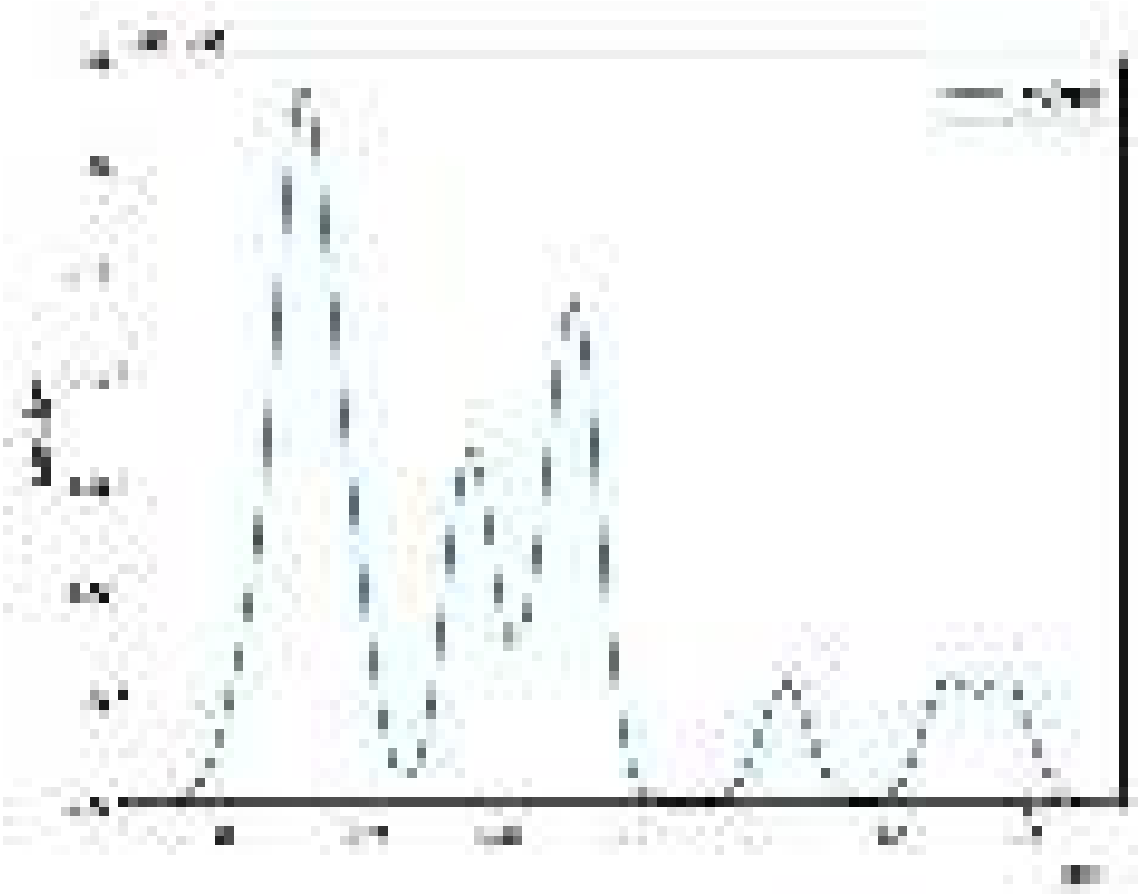
In [9]:
```
v2=pd.read_csv("F:/pythonProject1/data_2.csv")
v2
```

Out[9]:

	value
0	4961462899
1	5073212169
2	5173212169
3	9173212169
4	9173212169
5	8573212169
6	9173212169
7	9173212169
8	15699236601
9	5656618421
10	5732121169
11	7506454545
12	4181023880
13	14795034482
14	7620450578
15	4765268468
16	5025168365
17	7558337500
18	4987608460
19	12344579710

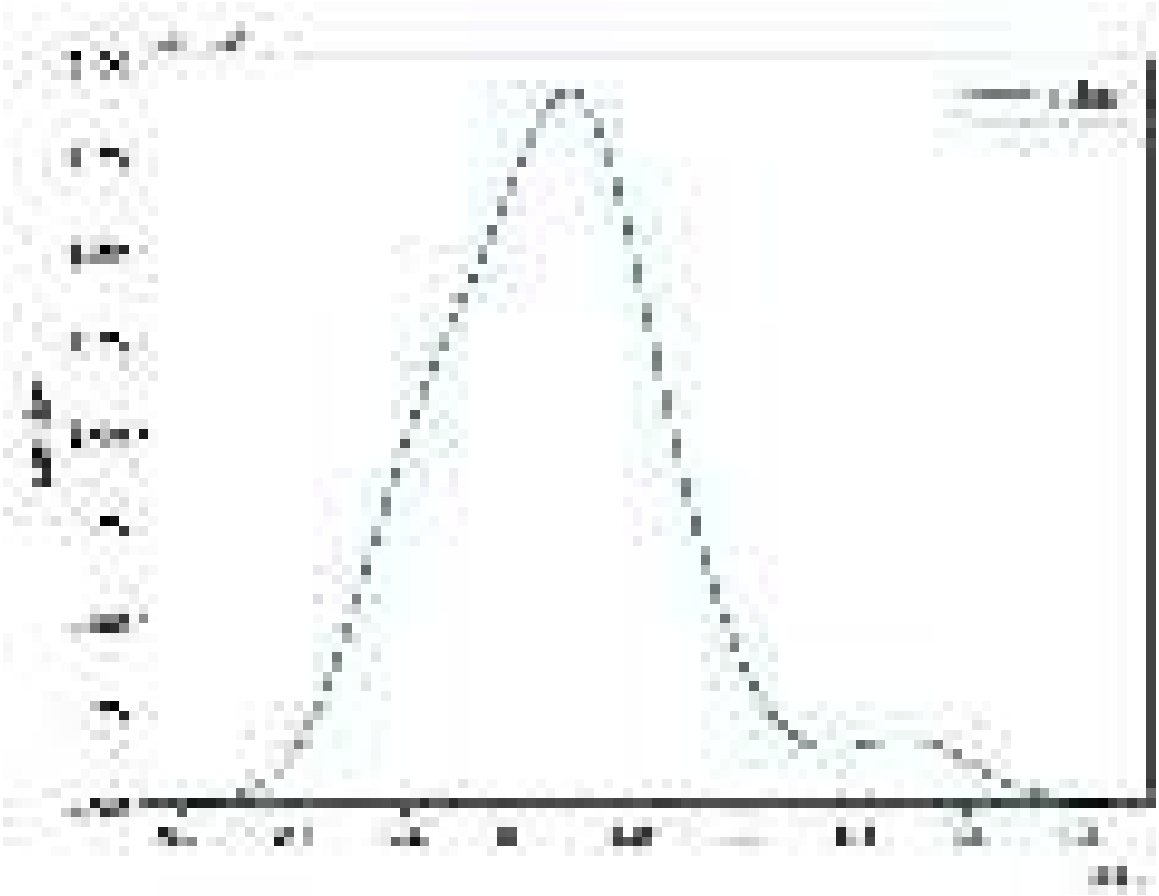
In [10]:
```
sns.kdeplot(data=v2, bw_adjust=.2)
```

Out[10]:
```
<AxesSubplot:ylabel='Density'>
```



In [12]:
```
sns.kdeplot(data=v1)
```

Out[12]:
```
<AxesSubplot:ylabel='Density'>
```



In [ ]:

In [ ]: