Group Members:

Amrik Bhadra(203)

Tejashree Darade(213)

Prajwal Ganar(220)

Code:

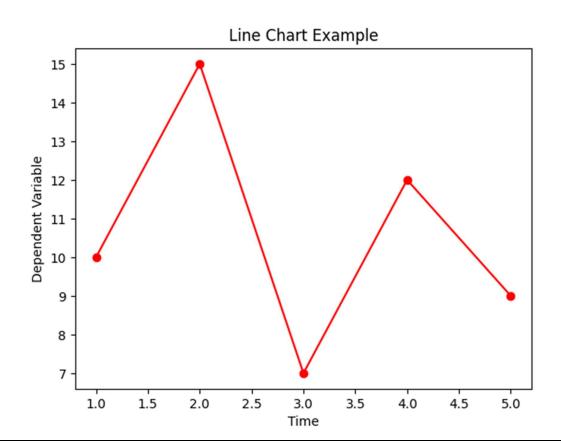
```
import matplotlib.pyplot as plt

# Sample data
x = [1, 2, 3, 4, 5] # x-axis values (time)
y = [10, 15, 7, 12, 9] # y-axis values (dependent variable)

# Create a line chart
plt.plot(x, y, marker='o', color='red')

# Customize the chart
plt.title("Line Chart Example")
plt.xlabel("Time")
plt.ylabel("Dependent Variable")

# Display the chart
plt.show()
```



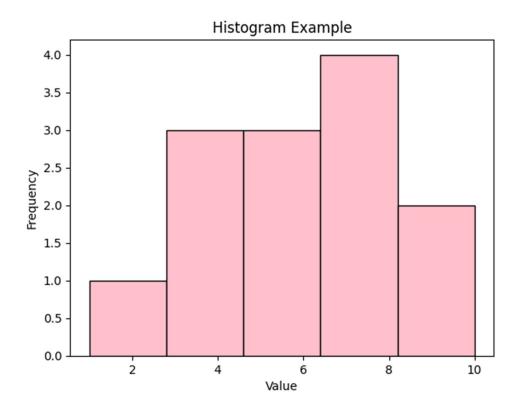
```
import matplotlib.pyplot as plt

# Example data
data = [1, 3, 4, 4, 5, 5, 6, 7, 8, 8, 8, 9, 10]

# Plotting the histogram
plt.hist(data, bins=5, edgecolor='black', color='pink')

# Adding labels and title
plt.xlabel('Value')
plt.ylabel('Frequency')
plt.title('Histogram Example')

# Displaying the histogram
plt.show()
```



```
import matplotlib.pyplot as plt

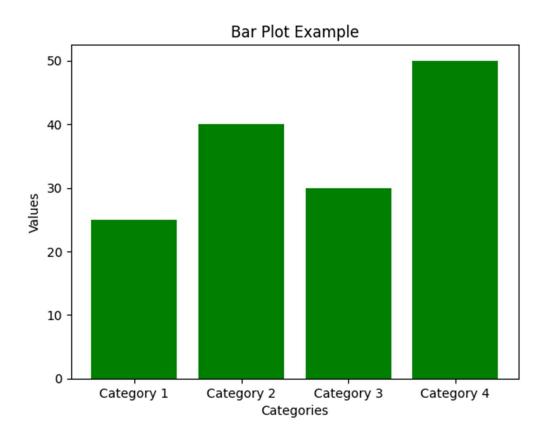
# Sample data
categories = ['Category 1', 'Category 2', 'Category 3', 'Category 4']
values = [25, 40, 30, 50]

# Create a bar plot
plt.bar(categories, values, color='green')

# Customize the plot
plt.title("Bar Plot Example")
plt.xlabel("Categories")
```

```
plt.ylabel("Values")

# Display the plot
plt.show()
```



```
import matplotlib.pyplot as plt

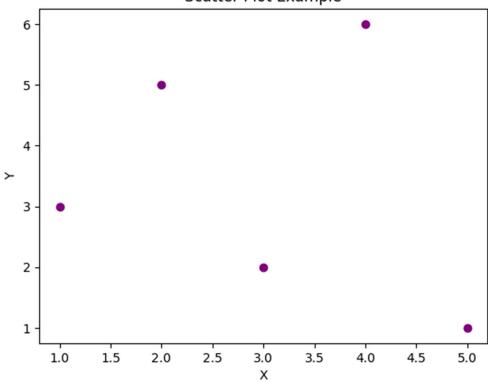
# Example data
x = [1, 2, 3, 4, 5] # x-values
y = [3, 5, 2, 6, 1] # y-values

# Plotting the scatter plot
plt.scatter(x, y, color='purple')

# Adding labels and title
plt.xlabel('X')
plt.ylabel('Y')
plt.title('Scatter Plot Example')

# Displaying the scatter plot
plt.show()
```





```
import matplotlib.pyplot as plt

# Example data
categories = ['Nitrogen', 'Oxygen', 'Water vapor', 'Argon, carbon dioxide etc']
values = [78, 21, 2, 0.98]

# Plotting the pie chart
plt.pie(values, labels=categories, autopct='%1.1f%%')

# Adding a title
plt.title('Pie Chart Example')

# Displaying the pie chart
plt.show()
```

Pie Chart Example

