

```
from matplotlib import pyplot as plt
```

Recommended to use when we have 5 or less values to plot

### ✓ 1. Plotting the Pie Chart

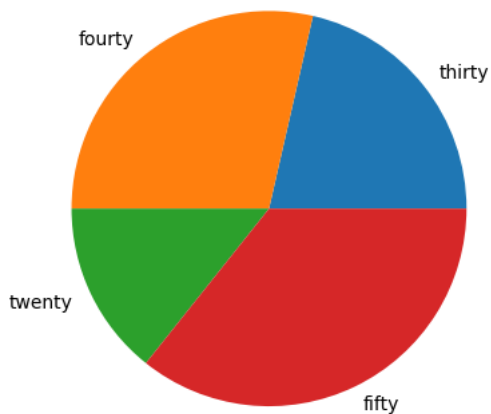
```
slices = [30, 40, 20, 50] #sum needs not be 100
```

```
import matplotlib.pyplot as plt  
plt.pie(slices)  
plt.show()
```



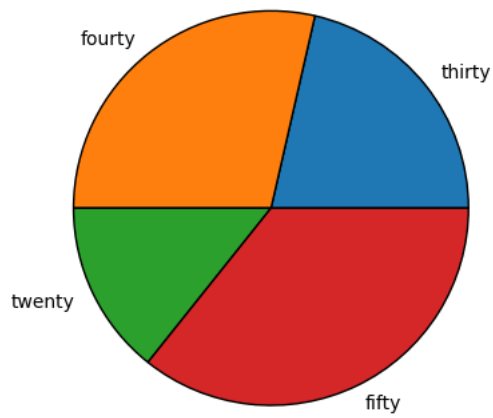
### ✓ 2. Adding labels to the pie chart

```
labels = ['thirty', 'fourty', 'twenty', 'fifty']  
plt.pie(slices, labels=labels)  
plt.show()
```



### ✓ 3. setting edge color

```
plt.pie(slices, labels=labels, wedgeprops={'edgecolor':'black'})  
plt.show()
```

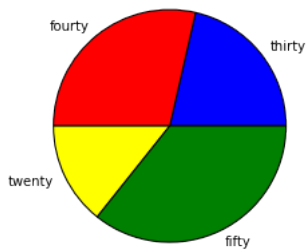


#### ✓ 4. setting color of the slices

```
color = ['blue','red','yellow','green']
```

#hexadecimal color codes can also be used

```
plt.pie(slices, labels=labels, colors=color, wedgeprops={'edgecolor':'black'})
plt.show()
```

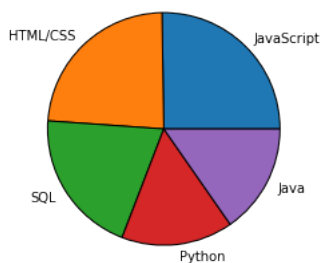


#### ✓ 5. plotting real world data

```
labels = ['JavaScript', 'HTML/CSS', 'SQL', 'Python', 'Java']
```

```
slices = [59219, 55466, 47544, 36443, 35917]
```

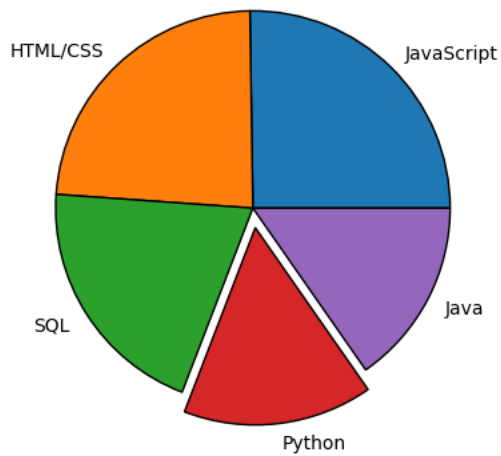
```
plt.pie(slices, labels=labels, wedgeprops={'edgecolor':'black'})
plt.show()
```



#### ✓ 6. Exploding the slice

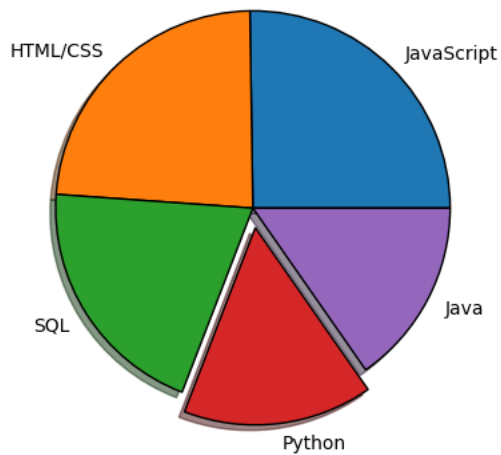
```
explode = [0, 0, 0, 0.1, 0]
```

```
plt.pie(slices, labels=labels, explode=explode, wedgeprops={'edgecolor':'black'})
plt.show()
```



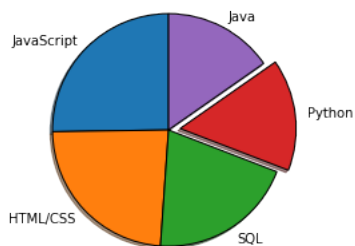
### 7. adding shadow to the chart

```
plt.pie(slices, labels=labels, explode=explode, shadow=True, wedgeprops={'edgecolor':'black'})
plt.show()
```



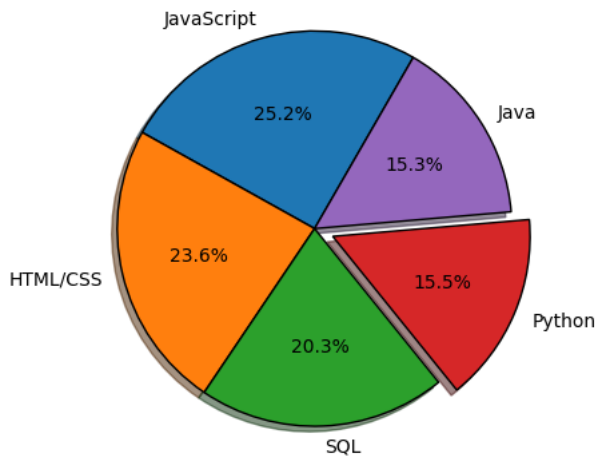
### 8. setting the starting angle

```
plt.pie(slices, labels=labels, explode=explode, shadow=True, startangle=90, wedgeprops={'edgecolor':'black'})
plt.show()
```



## 9. displaying percentage of each slices

```
plt.pie(slices, labels=labels, explode=explode, shadow=True, startangle=60, autopct="%0.1f%%", wedgeprops={'edgecolor':'black'})
plt.show()
```



## Show Your Creativity

### Covid 19 India Data as on 5th Sept 2020

```
import matplotlib.pyplot as plt
import pandas as pd
```

```
from google.colab import drive
drive.mount('/content/drive')
```

```
-----
MessageError                                Traceback (most recent call last)
<ipython-input-15-d5df0069828e> in <cell line: 2>()
      1 from google.colab import drive
----> 2 drive.mount('/content/drive')
```

```
----- 3 frames -----
/usr/local/lib/python3.10/dist-packages/google/colab/_message.py in
read_reply_from_input(message_id, timeout_sec)
    101 ):
    102     if 'error' in reply:
--> 103         raise MessageError(reply['error'])
    104     return reply.get('data', None)
    105
```

```
MessageError: Error: credential propagation was unsuccessful
```

```
data = pd.read_csv('/content/drive/My Drive/data/Covid_19.csv')
```

```
-----
FileNotFoundError                            Traceback (most recent call last)
<ipython-input-16-6163ab026785> in <cell line: 1>()
----> 1 data = pd.read_csv('/content/drive/My Drive/data/Covid_19.csv')
```

```
----- 6 frames -----
/usr/local/lib/python3.10/dist-packages/pandas/io/common.py in get_handle(path_or_buf,
mode, encoding, compression, memory_map, is_text, errors, storage_options)
    854     if ioargs.encoding and "b" not in ioargs.mode:
    855         # Encoding
--> 856         handle = open(
    857             handle,
    858             ioargs.mode,
```

```
FileNotFoundError: [Errno 2] No such file or directory: '/content/drive/My
Drive/data/Covid 19.csv'
```

```
data.head()
```

	State	last_updated	population	tested__last_updated	total__confirmed	total__d
0	AN	2020-09-05T22:09:31+05:30	397000	9/4/2020	3292	
1	AP	2020-09-05T20:15:29+05:30	52221000	9/5/2020	487331	
2	AR	2020-09-06T00:53:37+05:30	1504000	9/5/2020	4914	

