In [1]:
```
import pandas as pd
import numpy as np
import matplotlib.pyplot as plt
```

In [2]:
```
df = pd.read_csv('placement.csv')
df
```

Out[2]:

	cgpa	package
0	6.89	3.26
1	5.12	1.98
2	7.82	3.25
3	7.42	3.67
4	6.94	3.57
...	...	...
195	6.93	2.46
196	5.89	2.57
197	7.21	3.24
198	7.63	3.96
199	6.22	2.33

200 rows × 2 columns

In [3]:
```
df.shape
```

Out[3]:
```
(200, 2)
```

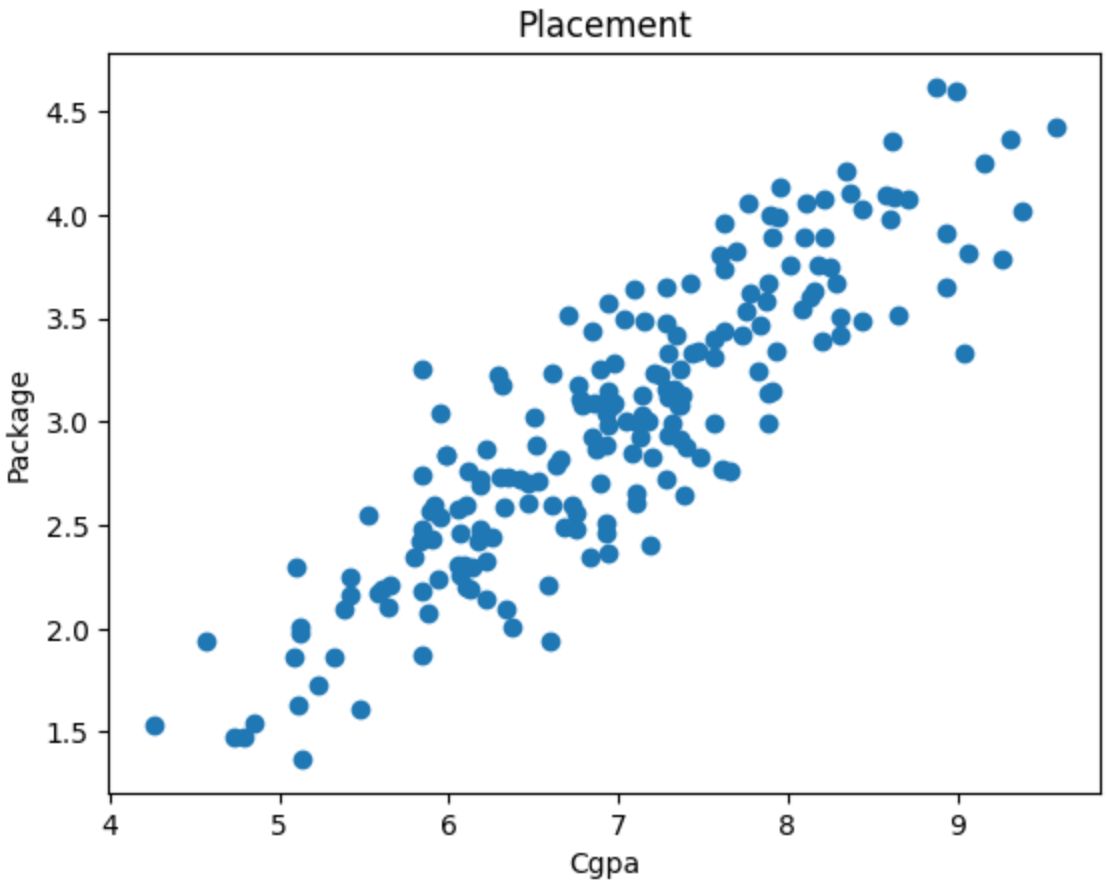
In [4]:
```
df.isnull().sum()
```

Out[4]:
```
cgpa       0
package    0
dtype: int64
```

In [5]:
```
x = df.iloc[:,:1]
y = df.iloc[:,1:2]

plt.scatter(x,y)
plt.title("Placement")
plt.xlabel("Cgpa")
plt.ylabel("Package")
```

Out[5]:
```
Text(0, 0.5, 'Package')
```



In [6]:
```
from sklearn.model_selection import train_test_split
x_train,x_test,y_train,y_test = train_test_split(x,y,test_size=0.2,random_stat
x_train.shape
```

Out[6]:
```
(160, 1)
```

In [7]:
```
from sklearn.linear_model import LinearRegression
```

In [8]:
```
lr = LinearRegression()
```

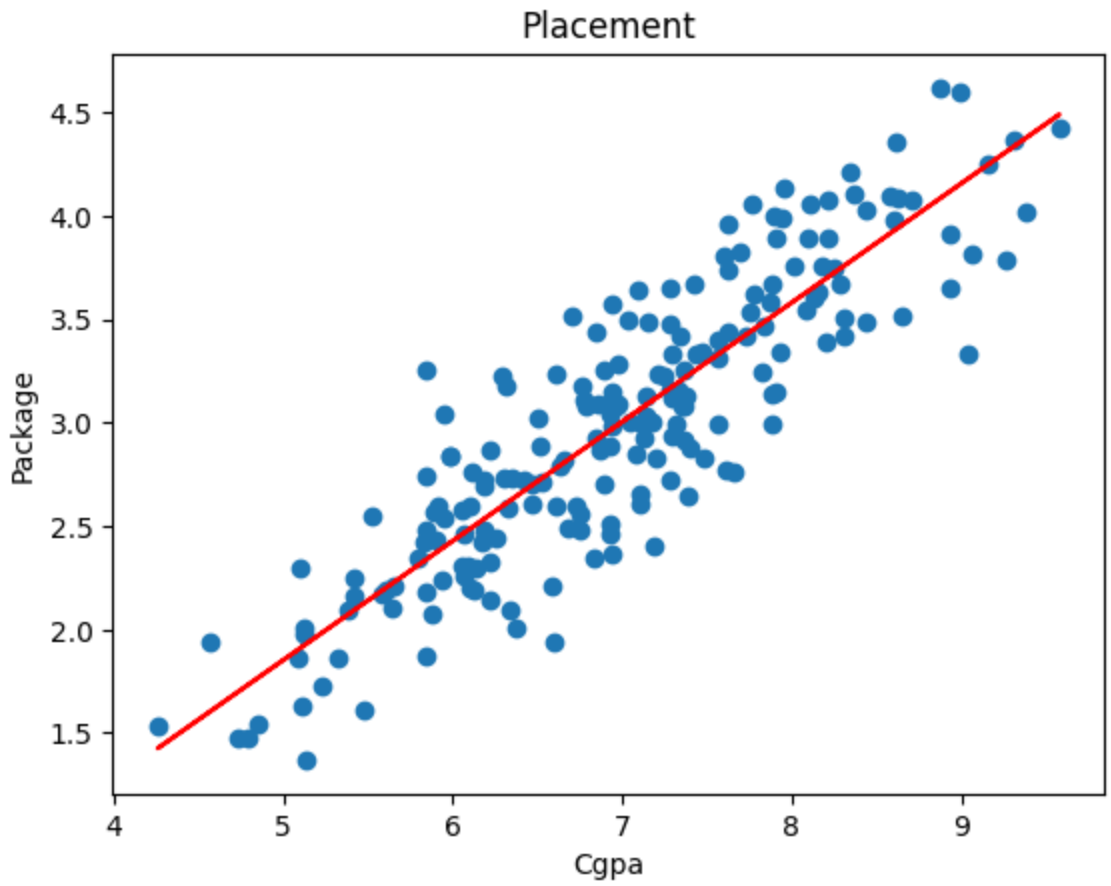
In [9]:
```
lr.fit(x_train,y_train)
```

Out[9]:
```
LinearRegression
LinearRegression()
```

In [10]:
```
y_pred = lr.predict(x_test)
```

In [14]:
```
plt.scatter(x,y)
plt.title("Placement")
plt.xlabel("Cgpa")
plt.ylabel("Package")
plt.plot(x_train,lr.predict(x_train),color='red')
```

Out[14]:
```
[<matplotlib.lines.Line2D at 0x2a7141b9ff0>]
```



In [ ]:
```

```