

▼ Simple Linear Regression

▼ Importing the libraries

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

▼ Importing the dataset

```
dataset=pd.read_csv("/content/Salary_Data.csv")
X=dataset.iloc[:, :-1].values
y=dataset.iloc[:, -1].values
```

▼ Splitting the dataset into the Training set and Test set

```
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_state=0)
```

▼ Training the Simple Linear Regression model on the Training set

```
from sklearn.linear_model import LinearRegression
regressor = LinearRegression()
regressor.fit(X_train, y_train)
```

```
↳ LinearRegression(copy_X=True, fit_intercept=True, n_jobs=None, normalize=False)
```

▼ Predicting the Test set results

```
y_pred=regressor.predict(X_test)
```

▼ Visualising the Training set results

```
plt.scatter(X_train, y_train, color = 'red')
plt.plot(X_train, regressor.predict(X_train), color = 'blue')
```

```
plt.title('Salary vs Experience (Training set)')  
plt.xlabel('Years of Experience')  
plt.ylabel('Salary')  
plt.show()
```



▼ Visualising the Test set results

```
plt.scatter(X_test, y_test, color = 'red')  
plt.plot(X_train, regressor.predict(X_train), color = 'blue')  
plt.title('Salary vs Experience (Test set)')  
plt.xlabel('Years of Experience')  
plt.ylabel('Salary')  
plt.show()
```



