Date	17 November 2022
Team ID	PNT2022TMID30912
Project Name	Car Resale Value Prediction

Splitting Data into Independent and Dependent Variables :

```
X = car_dataset.drop(['Car_Name','Selling_Price'],axis= 1)

Y = car_dataset['Selling_Price']

print(X)
```

output :

```
     Year  Present_Price  Kms_Driven  Fuel_Type  Seller_Type  Transmission  \
0    2014           5.59       27000          0            0             0
1    2013           9.54       43000          1            0             0
2    2017           9.85        6900          0            0             0
3    2011           4.15        5200          0            0             0
4    2014           6.87       42450          1            0             0
..    ...            ...         ...        ...          ...           ...
296  2016          11.60       33988          1            0             0
297  2015           5.90       60000          0            0             0
298  2009          11.00       87934          0            0             0
299  2017          12.50        9000          1            0             0
300  2016           5.90        5464          0            0             0

     Owner
0        0
1        0
2        0
3        0
4        0
..     ...
296      0
297      0
298      0
299      0
300      0

[301 rows x 7 columns]
```

```
print(Y)
```

output :

```
0          3.35
1          4.75
2          7.25
3          2.85
4          4.60
          ...
296        9.50
297        4.00
298        3.35
299       11.50
300        5.30
Name: Selling_Price, Length: 301, dtype: float64
```

Spiltting the Training data and Test Data :

```
X_train,X_test,Y_train,Y_test = train_test_split(X,Y,test_size = 0.1,random_state = 2
)
```

```
print(X_train)
```

output :

```
     Year  Present_Price  Kms_Driven  Fuel_Type  Seller_Type  Transmission  \
204  2015          4.430       28282          0            0             0
249  2016          7.600       17000          0            0             0
277  2015         13.600       21780          0            0             0
194  2008          0.787       50000          0            1             0
244  2013          9.400       49000          1            0             0
..    ...            ...         ...        ...          ...           ...
75   2015          6.800       36000          0            0             0
22   2011          8.010       50000          0            0             1
72   2013         18.610       56001          0            0             0
15   2016         10.790       43000          1            0             0
168  2013          0.730       12000          0            1             0

     Owner
204      0
249      0
277      0
194      0
244      0
..     ...
75       0
22       0
72       0
15       0
168      0
```

[270 rows x 7 columns]

```
print(X_test)
```

Output :

	Year	Present_Price	Kms_Driven	Fuel_Type	Seller_Type	Transmission \
99	2010	20.450	50024	1	0	0
161	2014	0.826	23000	0	1	0
89	2014	6.760	40000	0	0	0
30	2012	5.980	51439	1	0	0
232	2015	14.790	12900	0	0	1
290	2014	6.400	19000	0	0	0
35	2011	7.740	49998	2	0	0
7	2015	8.610	33429	1	0	0
183	2013	0.470	21000	0	1	0
13	2015	7.710	26000	0	0	0
269	2015	10.000	18828	0	0	0
65	2014	6.950	45000	1	0	0
178	2014	0.520	19000	0	1	1
258	2015	13.600	25000	0	0	0
227	2011	4.430	57000	0	0	0
133	2016	0.950	500	0	1	0
130	2017	0.870	11000	0	1	0
156	2017	0.520	15000	0	1	0
237	2015	13.600	68000	1	0	0
262	2015	5.800	40023	0	0	0
112	2014	2.400	7000	0	1	0
282	2014	14.000	63000	1	0	0
164	2016	0.540	14000	0	1	0
275	2016	13.600	30753	0	0	1
154	2014	0.880	8000	0	1	0
29	2015	10.380	45000	1	0	0
141	2016	0.800	20000	0	1	0
192	2007	0.750	49000	0	1	0
216	2016	4.430	12500	0	0	0
3	2011	4.150	5200	0	0	0
159	2017	0.510	4000	0	1	1

	Owner
99	0
161	0
89	0
30	0
232	0
290	0
35	0
7	0
183	0
13	0
269	0
65	0
178	0
258	0
227	0
133	0
130	0
156	0
237	0
262	0

```
112       0
282       0
164       0
275       0
154       0
29        0
141       0
192       1
216       0
3         0
159       0
```

print(Y_train)

output :

```
204     2.75
249     5.25
277     9.70
194     0.20
244     5.95
         ...
75      3.95
22      4.40
72      7.45
15      7.75
168     0.42
Name: Selling_Price, Length: 270, dtype: float64
```

print(Y_test)

output :

```
99        9.65
161       0.45
89        4.75
30        3.10
232      11.45
290       4.50
35        2.95
7         6.50
183       0.27
13        6.10
269       6.70
65        4.75
178       0.35
258       8.40
227       2.55
133       0.72
130       0.75
156       0.48
237      11.25
262       4.00
112       1.15
282       8.25
164       0.45
275      10.90
```

```
154      0.50
29       7.45
141      0.60
192      0.20
216      2.90
3        2.85
159      0.45
Name: Selling_Price, dtype: float64
```