|  |  |  |  |
| --- | --- | --- | --- |
|  | Kernel | Splitter=best | Splitter=random |
| DC | Default value  squared\_error | 0.9093219352933499 | 0.7149589618831533 |
| DC | friedman\_mse | 0.8884477867087537 | 0.908739025949194 |
| DC | absolute\_error | 0.9132210727054325 | 0.6341153342526771 |
| DC | poisson | **0.911555029919116** | 0.6583249077924588 |
|  |  |  |  |

Splitter=random

|  |  |  |  |
| --- | --- | --- | --- |
|  | Kernel | max\_features=sqrt | max\_features=log2 |
| DC | Default value  squared\_error | 0.881417999829354 | -0.15753155303640454 |
| DC | friedman\_mse | 0.5257461768153179 | 0.1378259243181601 |
| DC | absolute\_error | 0.6873451698454208 | 0.765596038087818 |
| DC | poisson | **0.828377975024518** | -0.4485871605551024 |
|  |  |  |  |

Splitter= best

|  |  |  |  |
| --- | --- | --- | --- |
|  | Kernel | max\_features=sqrt | max\_features=log2 |
| DC | Default value  squared\_error | -0.6952480111265169 | **0.915269575508962** |
| DC | friedman\_mse | 0.6813763095091789 | 0.8197959833528152 |
| DC | absolute\_error | -1.5065890638367576 | 0.7882949374313402 |
| DC | poisson | 0.49211669779496603 | 0.23661281639708664 |
|  |  |  |  |

1.from sklearn.tree import DecisionTreeRegressor

regressor=DecisionTreeRegressor(criterion='squared\_error', splitter='best') #whatever we are passing inside the parameter is called hyper tuning parameter

regressor=regressor.fit(X\_train,y\_train)

2.from sklearn.tree import DecisionTreeRegressor

regressor=DecisionTreeRegressor(criterion='squared\_error', splitter=random) #whatever we are passing inside the parameter is called hyper tuning parameter

regressor=regressor.fit(X\_train,y\_train)

3.from sklearn.tree import DecisionTreeRegressor

regressor=DecisionTreeRegressor(criterion='friedman\_mse', splitter='random',max\_features='log2') #whatever we are passing inside the parameter is called hyper tuning parameter

regressor=regressor.fit(X\_train,y\_train)

4.from sklearn.tree import DecisionTreeRegressor

regressor=DecisionTreeRegressor(criterion='friedman\_mse', splitter='random',max\_features=sqrt) #whatever we are passing inside the parameter is called hyper tuning parameter

regressor=regressor.fit(X\_train,y\_train)

5.from sklearn.tree import DecisionTreeRegressor

regressor=DecisionTreeRegressor(criterion='friedman\_mse', splitter='best',max\_features='log2') #whatever we are passing inside the parameter is called hyper tuning parameter

regressor=regressor.fit(X\_train,y\_train)

6.from sklearn.tree import DecisionTreeRegressor

regressor=DecisionTreeRegressor(criterion='friedman\_mse', splitter='best',max\_features=sqrt) #whatever we are passing inside the parameter is called hyper tuning parameter

regressor=regressor.fit(X\_train,y\_train)