In [6]:
```
import cv2
import numpy as np
import pandas as pd
from sklearn.linear_model import LogisticRegression
from sklearn.neighbors import KNeighborsClassifier
from sklearn.tree import DecisionTreeClassifier
from sklearn.model_selection import train_test_split
from sklearn.metrics import classification_report
from sklearn.metrics import accuracy_score

data=pd.read_csv('iris.csv')
X=data.iloc[:,0:4]
y=data['species']
X_train,X_test,y_train,y_test=train_test_split(X,y)

clf=LogisticRegression()

clf.fit(X_train,y_train)


y_pred_train=clf.predict(X_train)
print(classification_report(y_train,y_pred_train))
print(accuracy_score(y_train,y_pred_train))


y_pred_test=clf.predict(X_test)
print(classification_report(y_test,y_pred_test))
print(accuracy_score(y_test,y_pred_test))
```

```
C:\Users\Saurabh singh\AppData\Local\Programs\Python\Python37-32\lib\site-packages\sklearn\li
near_model\logistic.py:432: FutureWarning: Default solver will be changed to 'lbfgs' in 0.22.
Specify a solver to silence this warning.
  FutureWarning)
C:\Users\Saurabh singh\AppData\Local\Programs\Python\Python37-32\lib\site-packages\sklearn\li
near_model\logistic.py:469: FutureWarning: Default multi_class will be changed to 'auto' in
0.22. Specify the multi_class option to silence this warning.
  "this warning.", FutureWarning)
              precision    recall  f1-score   support

      setosa       1.00      1.00      1.00        32
  versicolor       1.00      0.90      0.95        39
   virginica       0.91      1.00      0.95        41

    accuracy                           0.96       112
   macro avg       0.97      0.97      0.97       112
weighted avg       0.97      0.96      0.96       112

0.9642857142857143
              precision    recall  f1-score   support

      setosa       1.00      1.00      1.00        18
  versicolor       1.00      0.73      0.84        11
   virginica       0.75      1.00      0.86         9

    accuracy                           0.92        38
   macro avg       0.92      0.91      0.90        38
weighted avg       0.94      0.92      0.92        38

0.9210526315789473
```

In [ ]: