ML Lab program no 3

Use an appropriate data set for building the decision tree (ID3) and apply this knowledge to classify a new sample.

- Import pandas
- Import matplotlib
- From sklearn import iris
- Import seaborn
- Display iris using load dataset
- Classify independent feature (y) and dependent feature (x)
- From sklearn.model_selection import train_test_split

```
### train test split
from sklearn.model_selection import train_test_split
X_train, X_test, y_train, y_test = train_test_split(
    X, y, test_size=0.33, random_state=42)
```

- sklearn.tree import decision tree classifier

```
## Postpruning
treemodel=DecisionTreeClassifier()

treemodel.fit(X_train,y_train)

DecisionTreeClassifier()
```

- construct the decision tree using import tree use tree_plot_tree

- Predict the accuracy using decision tree classifier