GRID SEARCH GRAPHS
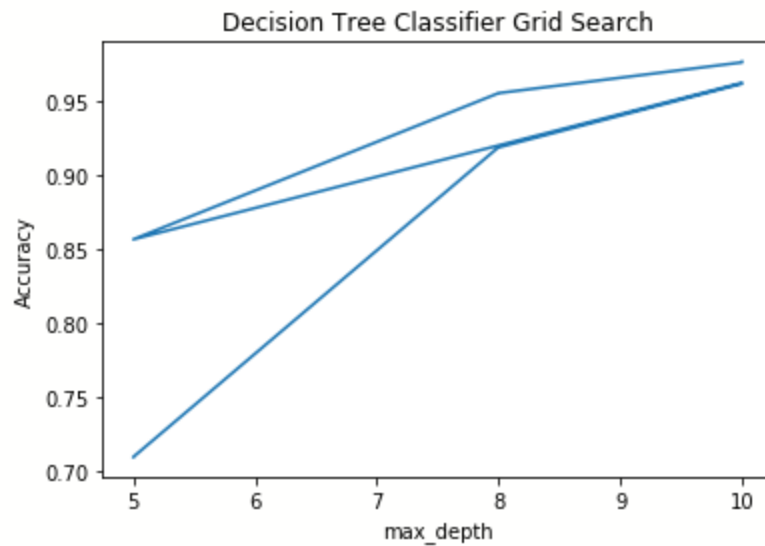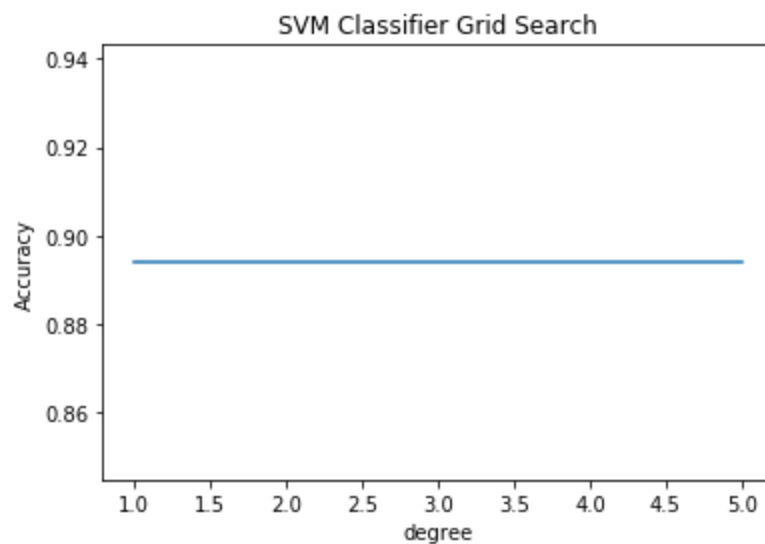
1. Decision Tree Classifier Grid Search

   Hyperparameters taken: `{'max_depth':[5,8,10],`
   `'criterion':['gini','entropy'],`
   `'Min_samples_split':[2,4]}`
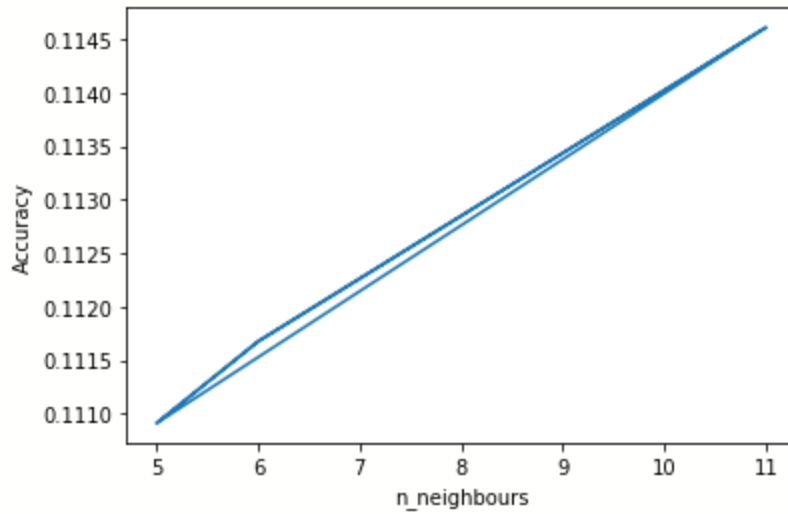

Decision Tree Classifier Grid Search

2. SVM Classifier Grid Search

   Hyperparameters taken: `{'gamma':['scale','auto'],`
   `'degree':[1,4,5],`
   `'kernel':['linear']}`

SVM Classifier Grid Search

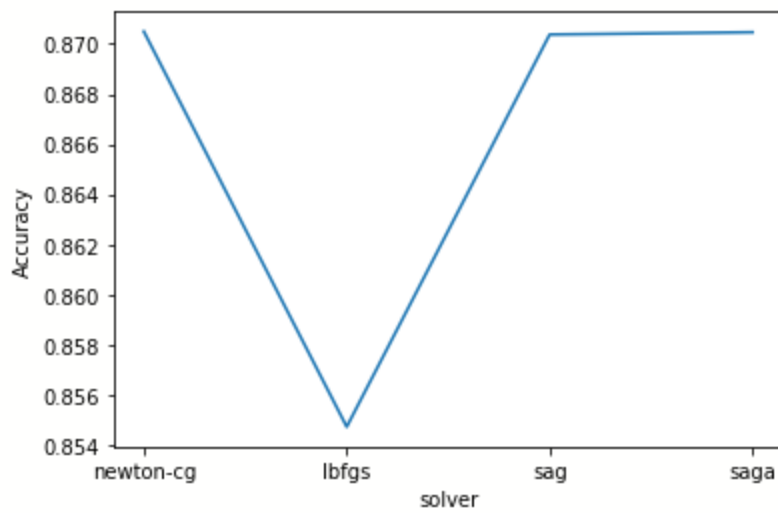3. K-Neighbours Classifier Grid Search

Hyperparameters taken:`{'n_neighbors':[5,6,11],`
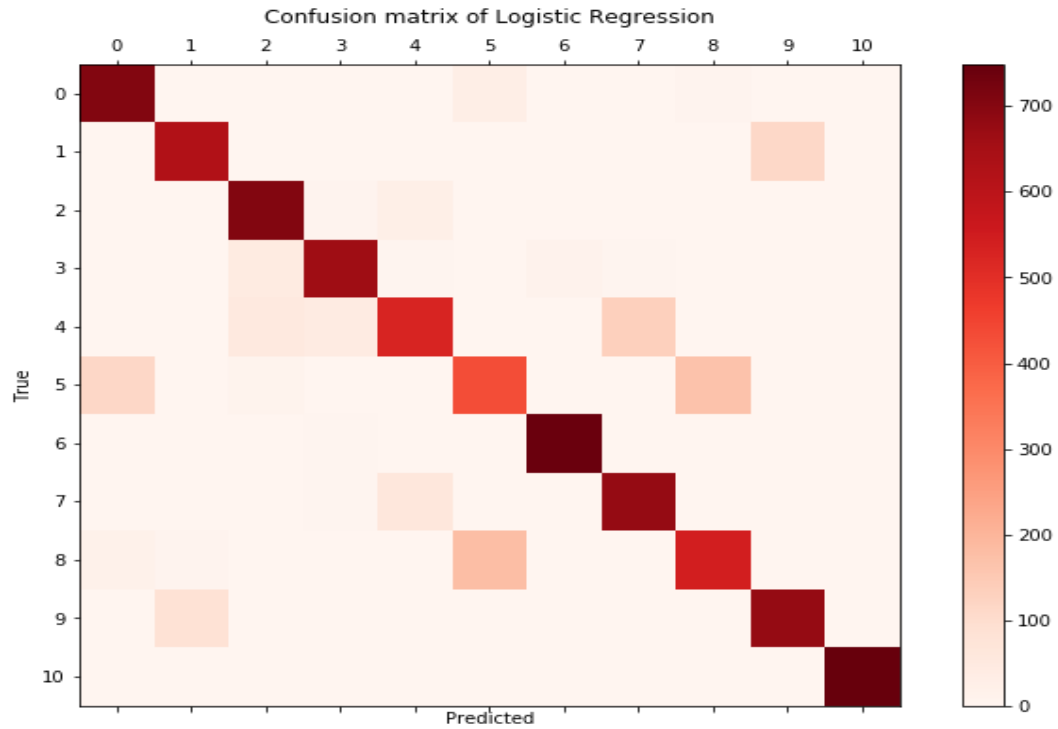`'Algorithm':['auto','ball_tree']}`

4. Logistic Regression Frid Search

Hyperparameters taken:`{'solver': ['newton-cg', 'lbfgs','sag', 'saga'],`
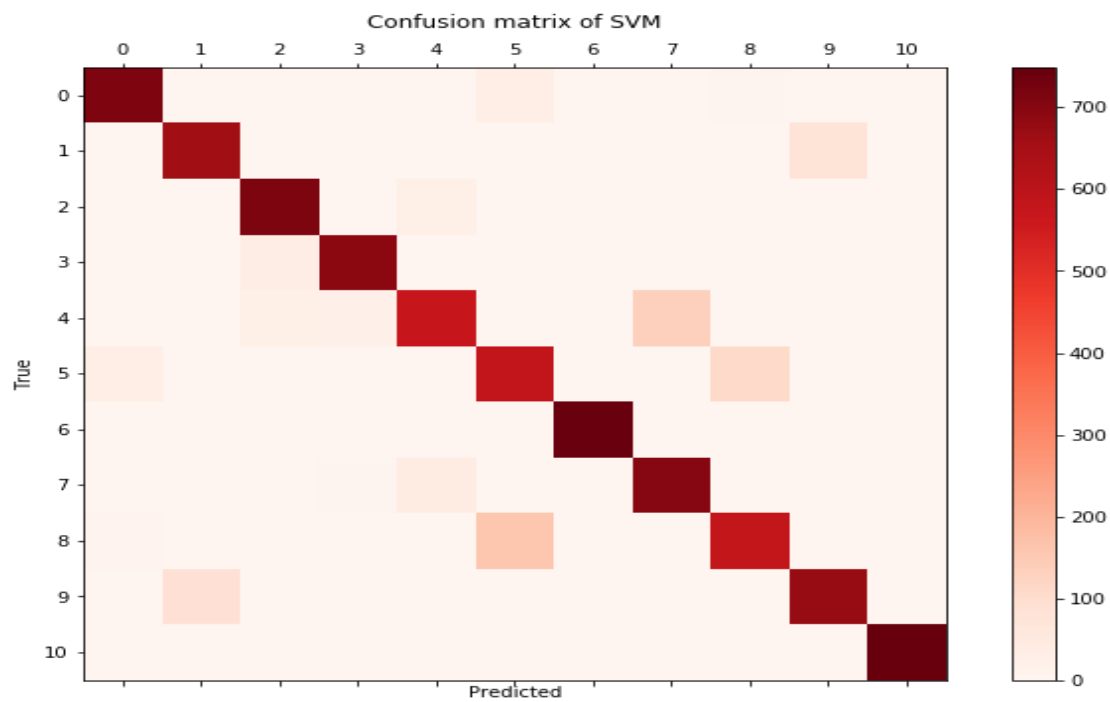`'multi_class':['multinomial']}`

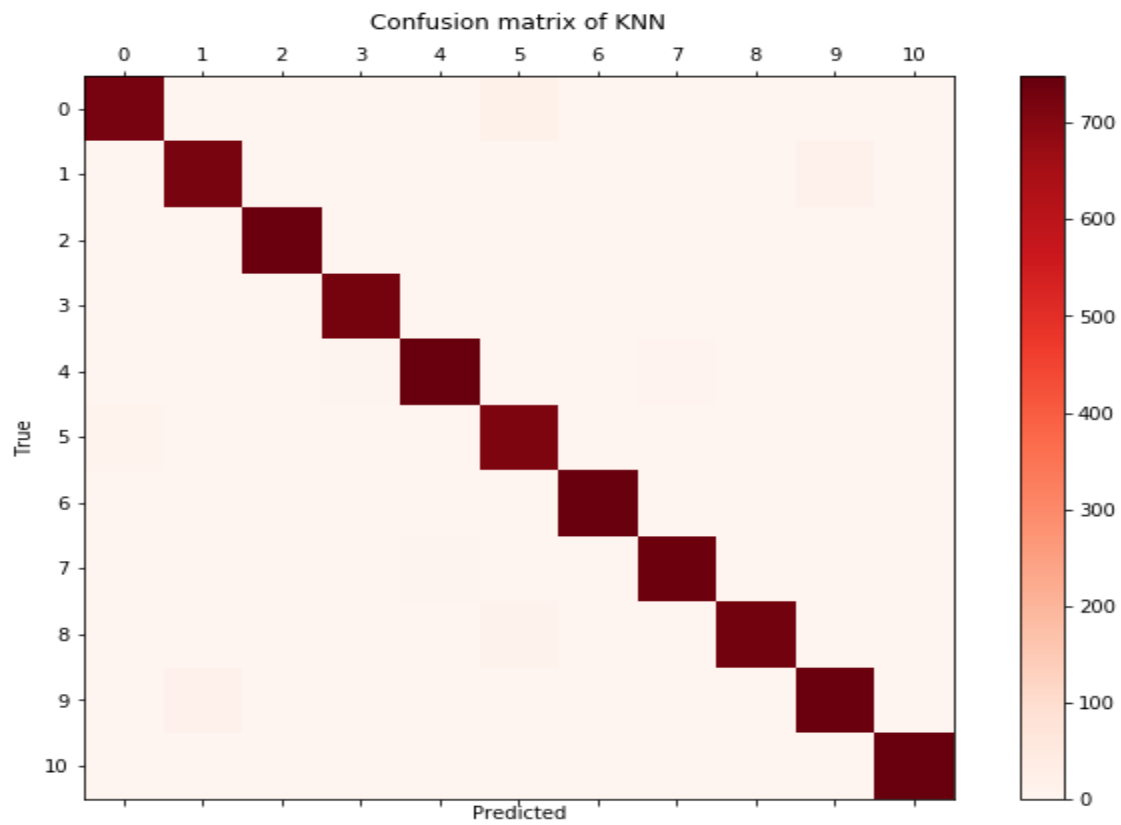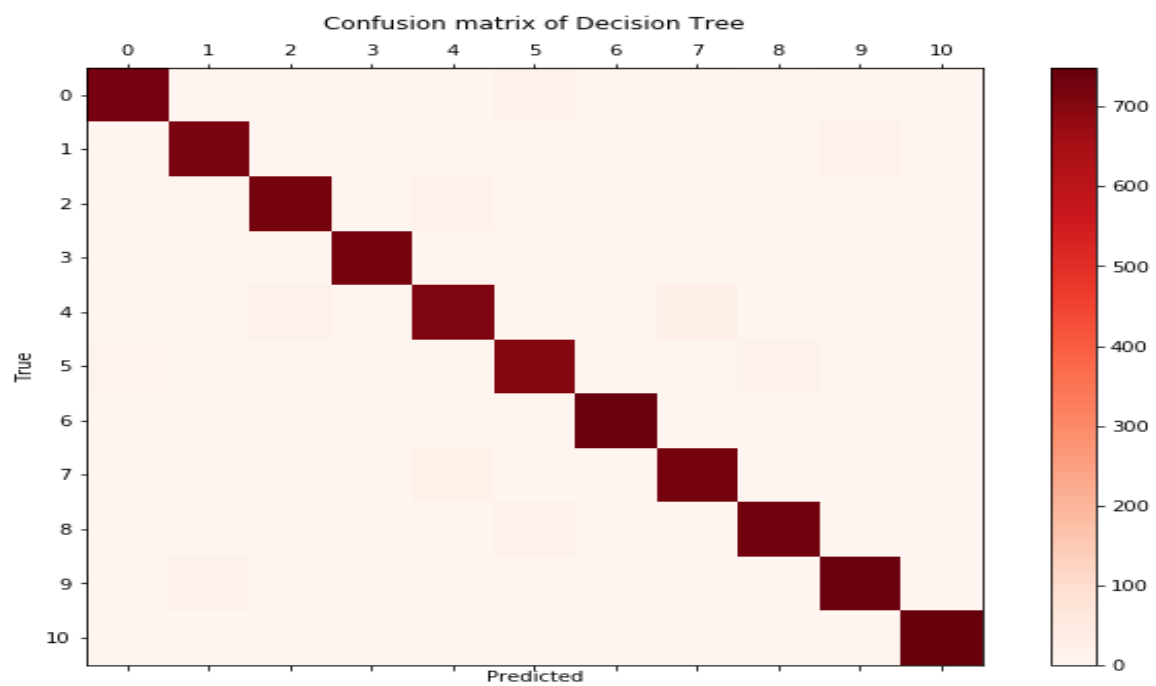# Visualizations using Matplotlib library for the confusion matrix

1. **Logistic Regression**

Confusion matrix of Logistic Regression

2. Support Vector Machine

Confusion matrix of SVM

3. KNN

Confusion matrix of KNN

4. Decision Tree

Confusion matrix of Decision Tree

5. Voting Classifier

Confusion matrix of Voting Classifier