### Variable names to follow:

| VARIABLE NAME | DESCRIPTION |
| --- | --- |
| data\_set | To load digits data set |
| X | Capital X for features |
| Y | Capital Y for Target |
|  |  |
| MODELS: |  |
| model\_dr | Decision tree |
| model\_lr | Logistic regression |
| model\_rf | Random forest |
| model\_knn | K-NN |
| model\_svm | SVM |
| model\_gnb | Gaussian Naive Bayes |
| model\_lda | LDA |
| model\_qda | QDA |
|  |  |
| MODEL PREDICTION |  |
| pred\_dr | Decision tree prediction |
| pred\_lr | Logistic regression prediction |
| pred\_rf | Random forest prediction |
| pred\_knn | K-NN prediction |
| pred\_svm | SVM prediction |
| pred\_gnb | Gaussian Naive Bayes prediction |
| pred\_lda | LDA prediction |
| pred\_qda | QDA prediction |
|  |  |
| BALANCED ACCURACY |  |
| bal\_acc\_dr | Decision tree balanced accuracy |
| bal\_acc\_lr | Logistic regression balanced accuracy |
| bal\_acc\_rf | Random forest balanced accuracy |
| bal\_acc\_knn | K-NN balanced accuracy |
| bal\_acc\_svm | SVM balanced accuracy |
| bal\_acc\_gnb | Gaussian Naive Bayes balanced accuracy |
| bal\_acc\_lda | LDA balanced accuracy |
| bal\_acc\_qda | QDA balanced accuracy |
|  |  |
| ROC measure |  |
| roc\_dr | Decision tree ROC |
| roc\_lr | Logistic regression ROC |
| roc\_rf | Random forest ROC |
| roc\_knn | K-NN ROC |
| roc\_svm | SVM ROC |
| roc\_gnb | Gaussian Naive Bayes ROC |
| roc\_lda | LDA ROC |
| roc\_qda | QDA ROC |