Assignment 3(CLL788)

Deadline 30th March 23:59

1. Plot the training data (Data1.xlsx) to get an idea of the data distribution. Plot the points with variable 1 on x-axis and variable 2 on y-axis. Now color the coordinates/points of class 0 with blue and class 1 with red. Report your visual observations. (10)
2. Apply SVM and KMeans on training data (Data1.xlsx) to find decision boundaries. Plot training data along with decision boundary. (30)
3. Now apply SVM with "modified optimization problem" on Data2.xlsx and try out different values of C and report your observations along with plots of the decision boundary. (20)

Note: *For SVM modelling you can use numerical packages available. Experiment with kernel C and other hyper parameters and report the results*

Submission Details

1. Submit a zip file on moodle named "Name_EntryNumber.zip" with all the code files and a **pdf with all the graphs and analysis**. Only Matlab & python are allowed.
2. Deadline for the submission 30th March 23:59.