**Lab 6: Logistic Regression using Scikit-Learn**

**Goals**

In this lab you will:

- Train a logistic regression model using scikit-learn.

**Guidelines for Completing the Lab**

In order to complete this lab, you need to provide the following deliverable(s):

1. Python file(s) to demonstrate your implementation
2. Screenshots of task wise outputs generated by your code.

**Dataset**

There are two datasets provided with this lab. You have to complete the following sections by using the both datasets. For each dataset, you need to define the input feature matrix X containing all the training examples and the output/true labels vector y.

**Fit the model**

The code below imports the logistic regression model from scikit-learn. You can fit this model on the training data by calling `fit` function.

from sklearn.linear\_model import LogisticRegression

lr\_model = LogisticRegression()

lr\_model.fit(X, y)

**Make Predictions**

You can see the predictions made by this model by calling the `predict` function.

y\_pred = lr\_model.predict(X)

print("Prediction on training set:", y\_pred)

**Calculate accuracy**

You can calculate this accuracy of this model by calling the `score` function.

print("Accuracy on training set:", lr\_model.score(X, y))