Model Development Phase Template

Date	15 July 2024
Team ID	740682
Project Title	Polycystic Ovary Syndrome Classification Using Mxchine Learning
Maximum Marks	6 Marks

Model Selection Report

In the forthcoming Model Selection Report, various models will be outlined, detailing their descriptions, hyperparameters, and performance metrics, including Accuracy or F1 Score. This comprehensive report will provide insights into the chosen models and their effectiveness.

Model Selection Report:

Model	Description	Hyperparameters	Performance Metric (e.g., Accuracy, F1 Score)
Logistic Regression	Predicts the probability of a binary outcome.	C=1.0, solver='liblinear'	Accuracy: 86%, F1 Score: 0.87
Random Forest	Ensemble model using multiple decision trees.	n_estimators=100, max_depth=10	Accuracy: 87%, F1 Score: 0.88

Support vector Machine	Finds the optimal hyperplane for classification.	C=1.0, kernel='linear'	Accuracy: 66%, F1 Score: 0.67
Gradient Boosting	Ensemble model building trees sequentially.	n_estimators=200, learning_rate=0.1	Accuracy: 88%, F1 Score: 0.88