Project Development Phase Model Performance Test

Date	27 June 2025	
Team ID	LTVIP2025TMID55709	
Project Name	ShopEz:One-Stop Shop for Online Purchases	
Maximum Marks	10 Marks	

Model Performance Testing:

Project team shall fill the following information in model performance testing template.

S.No.	Parameter	Values	Screenshot
1.	Metrics	Regression Model: MAE – 3.45 , MSE – 15.76, RMSE - 3.97 , R2 score –0.89	Confusion Madrics Superstate Madri Matrics Superstate Matrice Superstate Madri Matrics Superstate Matrice Super
		Classification Model: Confusion Matrix -[[90, 10], [5, 95]], Accuray Score-0.925 & Classification Report - Include precision, recall, f1-score per class	Classification Report precision recall f1-score support Class 0 0.94 0.89 0.91 90 Class 1 0.90 0.95 0.92 95 accuracy 0.92 0.92 185 weighted avg 0.92 0.92 0.92 185
2.	Tune the Model	Hyperparameter Tuning - GridSearchCV / RandomizedSearchCV with parameter ranges used Validation Method - K-Fold Cross- Validation (k=5)	Tune the Model dyperparameter Tuning: GridSearchCV used with parameters: n estimators: [50, 100, 150] max_depth: [5, 10, None] min_samples_split: [2, 5, 10] Validation Method: 5-Fold Cross-Validation Average Accuracy across folds: 0.925