Q.1 Least Square Error

Q.2 Linear regression is sensitive to outliers

Q.3 Negative

Q.4 Correlation

Q.5 Low bias and high variance

Q.6 Predictive modal

Q.7 Regularization

Q.8 SMOTE

Q.9 Recall and precision

Q.10 True

Q.11 Apply PCA to project high dimensional data

Q.12 A) We don't have to choose the learning rate and B) It becomes slow when number of features is very large.

Q.13 Regression: This is a form of regression that constrains or shrinks the coefficient estimates to zero, and it also discourages learning of more complex or flexible models to avoid the risk of overfitting.

Q.14 There are 3 types of Regularization Algorithms LASSO, Ridge, and Elastic-Net regression.

Q.15 The term Error is a value or variable that represents how the observed model or data is different from the actual data. An error term represents the margin of error within a statistical model; it refers to the sum of the deviations within the regression line, which provides an explanation for the difference between the theoretical value of the model and the actual observed results.