2.Imagine, you are solving a classification problems with highly imbalanced class. The majority class is observed 99% of times in the training data. Your model has 99% accuracy after taking the predictions on test data. Which of the following is true in such a case?

- 1. Accuracy metric is not a good idea for imbalanced class problems.
- 2. Accuracy metric is a good idea for imbalanced class problems.
- 3. Precision and recall metrics are good for imbalanced class problems.
- 4. Precision and recall metrics aren't good for imbalanced class problems.

3.Naive Bayes requires?

- a. Categorical Values
- b. Numerical Values
- c. Either a or b
- d. Both a and b

4. Which of the following statement is TRUE about the Bayes classifier?

- (A) Bayes classifier works on the Bayes theorem of probability.
- (B) Bayes classifier is an unsupervised learning algorithm.
- (C) Bayes classifier is also known as maximum apriori classifier.
- (D) It assumes the independence between the independent variables or features.

5. Which of the following option is true about k-NN algorithm?

- A) It can be used for classification
- B) It can be used for regression
- C) It can be used in both classification and regression
- D)None of above

6. Which of the following will be Euclidean Distance between the two data point A(1,3) and B(2,3)?

- A) 1
- B) 2
- C) 4
- D) 8

7. Which of the following statements is true for k-NN classifiers?

- A) The classification accuracy is better with larger values of k
- B) The decision boundary is smoother with smaller values of k
- C) The decision boundary is linear
- D) k-NN does not require an explicit training

8.In k-NN what will happen when you increase/decrease the value of k?

- A) The boundary becomes smoother with increasing value of K
- B) The boundary becomes smoother with decreasing value of K
- C) Smoothness of boundary doesn't dependent on value of K
- D) None of these