Models Validation

Puntos totales 86/100

Se ha registrado el correo del encuestado (**0224969@up.edu.mx**) al enviar este formulario.

✓ The objective of a regression model is to predict * 6/6

- ○ Categories
- ◉ Numeric values ✓

✓ It is used for measuring the model's performance * 6/6

- ○ Training set
- ◉ Testing set ✓
- ○ Validation set

✓ Select the metrics for measuring the performance of CLASSIFICATION models * 8/8

- ☐ Mean Square Error (MSE)
- ☑ Accuracy ✓
- ☑ Precision ✓
- ☐ R2 score, coefficient of determination
- ☑ F1 ✓
- ☐ Mean Absolute Error (MAE)
- ☑ Recall ✓

✗ Select the metrics for measuring the performance of REGRESSION models * 0/8

- [x] Mean Square Error (MSE) ✓
- [ ] Accuracy
- [ ] Precision
- [x] R2 score, coefficient of determination ✓
- [ ] F1
- [x] Mean Absolute Error (MAE) ✓
- [x] Recall ✗

Respuesta correcta

- [x] Mean Square Error (MSE)
- [x] R2 score, coefficient of determination
- [x] Mean Absolute Error (MAE)

✓ It is like an average between precision and recall. * 6/6

- ○ R2 score, coefficient of determination
- ○ Accuracy
- ○ Precision
- ○ Macro-F1
- ○ Mean Absolute Error (MAE)
- ○ Recall
- ○ Confusion matrix
- ○ Mean Square Error (MSE)
- ◉ F1 ✓

Nombre completo *

Luis Eduardo Robles Jiménez

✓ It measures how well the model predicts based on the variance of the independent variable. Value = 1 is the best value. Value = 0 means that predictions are as good as random guesses based on the mean and the variance of the independent variable. Value < 0 means that predictions are worse than random. * 6/6

- (●) R2 score, coefficient of determination ✓
- ( ) Accuracy
- ( ) Precision
- ( ) Macro-F1
- ( ) Mean Absolute Error (MAE)
- ( ) Recall
- ( ) Confusion matrix
- ( ) Mean Square Error (MSE)
- ( ) F1

✓ Of all the samples that were 1, how many were predicted as 1. tp/(tp+fn) * 6/6

- ( ) R2 score, coefficient of determination
- ( ) Accuracy
- ( ) Precision
- ( ) Macro-F1
- ( ) Mean Absolute Error (MAE)
- (•) Recall ✓
- ( ) Confusion matrix
- ( ) Mean Square Error (MSE)
- ( ) F1

✓ The dataset is divided into several folds. Then, the model is evaluated several times, the exact times as folds are, where the testing set is set as a different fold each time. * 6/6

- (•) Cross validation ✓
- ( ) Anova test
- ( ) Training testing split

✓ Of all the samples predicted as 1, how many were 1. tp/(tp+fp) * 6/6

- ( ) R2 score, coefficient of determination
- ( ) Accuracy
- (•) Precision ✓
- ( ) Macro-F1
- ( ) Mean Absolute Error (MAE)
- ( ) Recall
- ( ) Confusion matrix
- ( ) Mean Square Error (MSE)
- ( ) F1

✓ It is recommended to use this metric when the classes are imbalanced. The number of classes is bigger than 2. * 6/6

- ( ) R2 score, coefficient of determination
- ( ) Accuracy
- ( ) Precision
- (•) Macro-F1 ✓
- ( ) Mean Absolute Error (MAE)
- ( ) Recall
- ( ) Confusion matrix
- ( ) Mean Square Error (MSE)
- ( ) F1

✓ The objective of a classification model is to predict * 6/6

- (●) Categories ✓
- ( ) Numeric values

✓ It is the average of the square differences between the real output value yi and the predicted one ŷi * 6/6

- ( ) R2 score, coefficient of determination
- ( ) Accuracy
- ( ) Precision
- ( ) Macro-F1
- ( ) Mean Absolute Error (MAE)
- ( ) Recall
- ( ) Confusion matrix
- (●) Mean Square Error (MSE) ✓
- ( ) F1

✓ It is a square matrix of k rows and k columns, where k is the number of categories or classes. Each row and column represent the test and predicted values, respectively. A cell represents the percentage of test samples of the row class predicted as the column class. * 6/6

- ○ R2 score, coefficient of determination
- ○ Accuracy
- ○ Precision
- ○ Macro-F1
- ○ Mean Absolute Error (MAE)
- ○ Recall
- ◉ Confusion matrix ✓
- ○ Mean Square Error (MSE)
- ○ F1

✗ It calculates the percentage of correct predictions. Its values range between 0 and 1, where 1 represents that all the test samples were predicted correctly. * 0/6

- ○ R2 score, coefficient of determination
- ○ Accuracy
- ○ Precision
- ○ Macro-F1
- ○ Mean Absolute Error (MAE)
- ○ Recall
- ○ Confusion matrix
- ○ Mean Square Error (MSE)
- ◉ F1 ✗

Respuesta correcta

- ◉ Accuracy

✓ It is the average of the absolute differences between the real output value yi and the predicted one ŷi * 6/6

- ( ) R2 score, coefficient of determination
- ( ) Accuracy
- ( ) Precision
- ( ) Macro-F1
- (•) Mean Absolute Error (MAE) ✓
- ( ) Recall
- ( ) Confusion matrix
- ( ) Mean Square Error (MSE)
- ( ) F1

✓ It is used for fitting the model (calculating the parameters) * 6/6

- (•) Training set ✓
- ( ) Testing set
- ( ) Validation set