LOGISTIC REGRESSION : INTERPRETATION  
The logistic regression results you provided can be interpreted as follows:

**Results Interpretation**

1. **Model Coefficients and Intercept**:
   * Model Coefficients:

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[[ 7.93504080e-09 -1.79724048e-05 -3.34915919e-07 7.26659108e-10]]

These coefficients represent the weights of the independent variables in your logistic regression model. For each independent variable, the coefficient indicates the log-odds of the target variable (price\_change = 1) increasing by one unit.

* + Intercept:

python

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[-6.58023375e-07]

This is the bias term in the logistic regression equation.

1. **Accuracy Score**:
   * Accuracy on Test Data: 0.5122338387432263 The model correctly predicted the target variable 51.22% of the time on the test set.
2. **Classification Report**:
   * The classification report provides precision, recall, and F1-score for each class:
     + **Class 0 (price did not increase)**:
       - Precision: 0.53
       - Recall: 0.67
       - F1-score: 0.59
     + **Class 1 (price increased)**:
       - Precision: 0.48
       - Recall: 0.34
       - F1-score: 0.39
   * The **macro average** averages the metrics across classes equally, while the **weighted average** adjusts for the class imbalance.
3. **Performance Observations**:
   * The model is slightly better at predicting when the price does not increase (Class 0) than when it does (Class 1).
   * The low F1-scores, especially for Class 1, indicate room for improvement in model performance, perhaps due to data imbalance, feature selection, or model choice.

**Accuracy Score Computation**

The accuracy score is calculated using accuracy\_score(y\_test, y\_pred):

* y\_test: The true labels for the test set.
* y\_pred: The predicted labels for the test set.

The formula for accuracy:

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Descrição gerada automaticamenteIn your case, 51.22% of the predictions matched the actual labels. This is a direct result of the accuracy\_score function applied to y\_test and y\_pred.