Bahria University,

Karachi Campus



LAB EXPERIMENT NO.

\_\_\_\_\_\_\_5\_\_\_\_\_\_\_

LIST OF TASKS

|  |  |
| --- | --- |
| TASK NO | OBJECTIVE |
| 1 | **Using python implement Naïve Bayes with two different splitting ratios on Heart Attack Analysis & prediction dataset to predict the chances of heart failure in a person and performed the following steps:**  * **Data Pre-processing step** * **Fitting Naive Bayes to the Training set** * **Predicting the test result** * **Test accuracy of the result(Creation of Confusion matrix)** * **Visualizing the test set result.**   **Compare the accuracies** |
| 2 | **Design a workflow with the help of Knime to predict whether a user buys a product by clicking the ad on the site based on their salary, age, and gender dataset provided in the lab (i.e. Social network ad dataset).** |

Submitted On:

\_\_\_\_\_\_\_\_\_\_\_

(Date: 02/05/23)

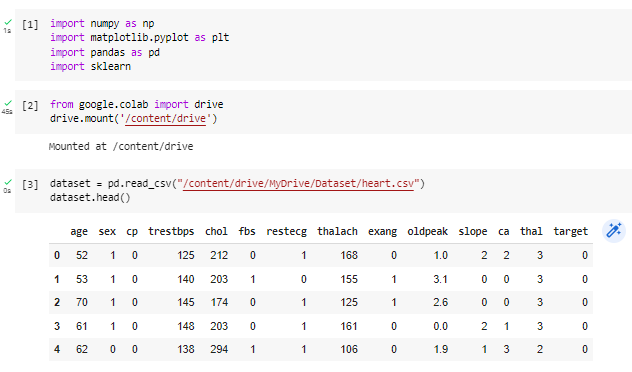
**LAB # 05**

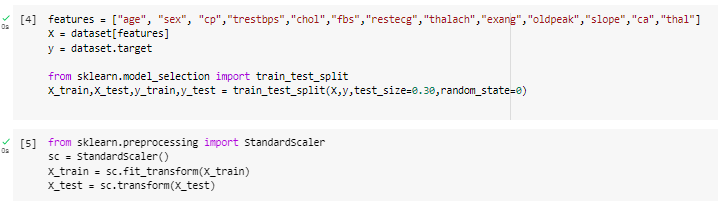
**Task # 1: Using python implement Naïve Bayes with two different splitting ratios on Heart Attack Analysis & prediction dataset to predict the chances of heart failure in a person and performed the following steps:**

* **Data Pre-processing step**
* **Fitting Naive Bayes to the Training set**
* **Predicting the test result**
* **Test accuracy of the result (Creation of Confusion matrix)**
* **Visualizing the test set result.**

**Compare the accuracies.**

**Solution:**



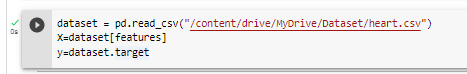


|  |  |
| --- | --- |
| **When test size is 30%** | **When test size is 40%** |
|  | A screenshot of a computer code  Description automatically generated with low confidence |

**CONFUSION MATRIX**

Graphical user interface, text, application, email

Description automatically generated



Graphical user interface, text, application, email

Description automatically generated

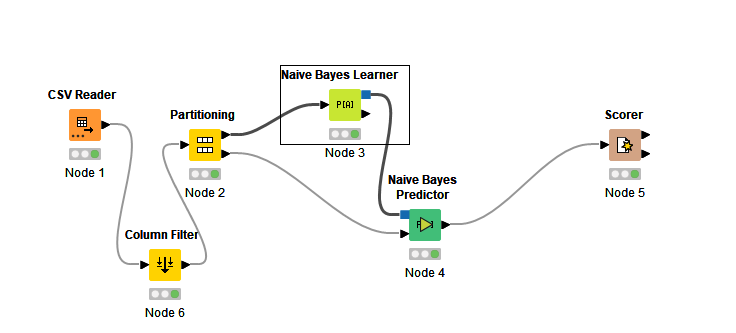
Graphical user interface, text, application

Description automatically generated

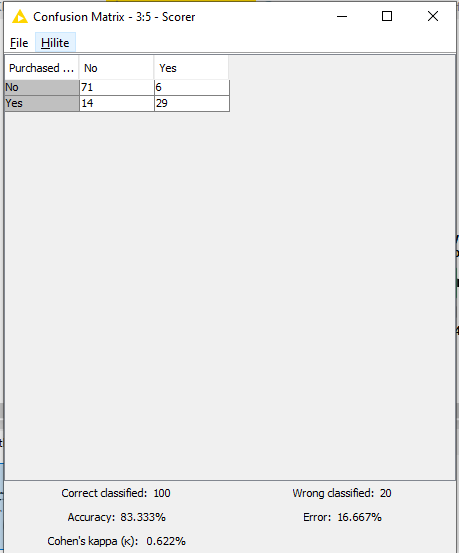
A picture containing chart

Description automatically generated

**Task # 2: Design a workflow with the help of Knime to predict whether a user buys a product by clicking the ad on the site based on their salary, age, and gender dataset provided in the lab (i.e. Social network ad dataset).**

**Solution:**

**Output:**

A screenshot of a paper

Description automatically generated with low confidence