**PROJECT – DATABASES**

**COORDINATING PROFESSOR:**

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**STUDENT:**

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***SECOND-HAND RETAIL STORE FOR LAPTOPS***

This beginner-level project represents a dive into the world of database development, crafting a simple Second-Hand Laptop Retail Database and performing fundamental SQL operations on it. While it may not emulate professional systems, it showcases my initial exploration of the topic.

The idea of the website whose database I have created is based on customers being able to either buy a laptop from our offer or sell us a personal device they don’t want anymore.

On the next page you will see the database schema generated using Oracle SQL Developer’s Data Modeler:

***A screenshot of a computer

Description automatically generatedDATABASE SCHEMA***

**DROP, CREATE, ALTER**

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**INSERT, SEQUENCE, INDEX**

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**UPDATE**

Change a customer’s name:



Result:

A screenshot of a computer

Description automatically generated

Change a review’s message:

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Result:

A close up of a logo

Description automatically generated

**DELETE**

Insert and delete an address:

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**MERGE**

Create table with new prices for laptops and merge it with the laptops table:



Result:

A screenshot of a computer

Description automatically generated

**SELECT STATEMENTS CONTAINING ALL THE NECESSARY ELEMENTS**

1.Select all laptops which are not already sold:



Result:

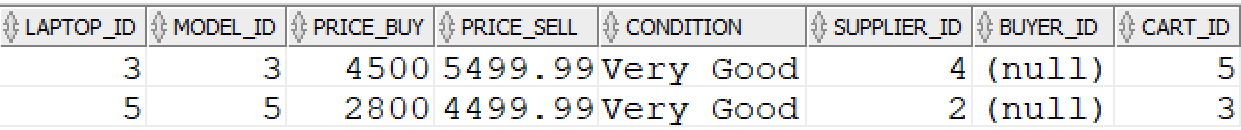
A screenshot of a computer

Description automatically generated

2.Select all laptops which have the condition of ‘Very Good’:



Result:



3.Select all laptops which have a condition above ‘Very Good’:



Result:

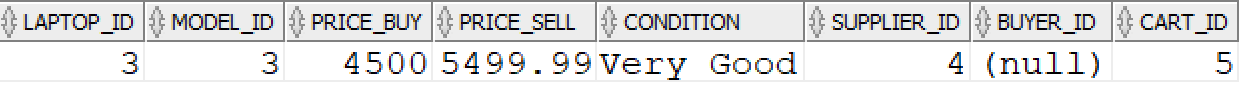
A screenshot of a computer

Description automatically generated

4.Select all laptops which have a price between 5000 and 6000:



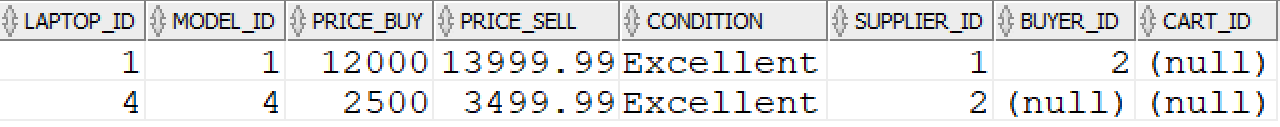
Result:



5.Select all laptops which have a price lower than 4000 and greater than 10000:



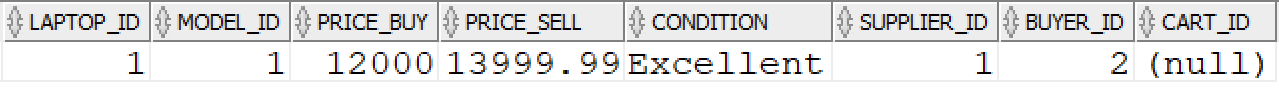
Result:



6.Select all laptops which have the sell price higher than all buy prices:



Result:



7.Select all laptops which have the buy price larger than at least one of the sell prices:



Result:

A screenshot of a computer

Description automatically generated

8.Select all customers and all the laptop models they either bought or sold:



Result:

A screenshot of a computer

Description automatically generated

9.Select all carts and the laptops inside:



Result:

A screenshot of a computer

Description automatically generated

10.Select carts which have a total value larger than 3000:



Result:

A screenshot of a computer

Description automatically generated

11.Select all laptops and categorize them based on ssd size:



Result:

A screenshot of a computer

Description automatically generated

12.Select all orders made in June:



Result:

A screenshot of a computer

Description automatically generated

13.Select all the months in which orders were made:



Result:

A screenshot of a calendar

Description automatically generated

14.Print the time between today and the last order:



Result:

A white rectangular sign with black numbers and a grey arrow

Description automatically generated

15.Categorize laptops based on display size:



Result:

A screenshot of a computer

Description automatically generated

16.Select each laptop and its buyer or -1 if there is no buyer yet:



Result:

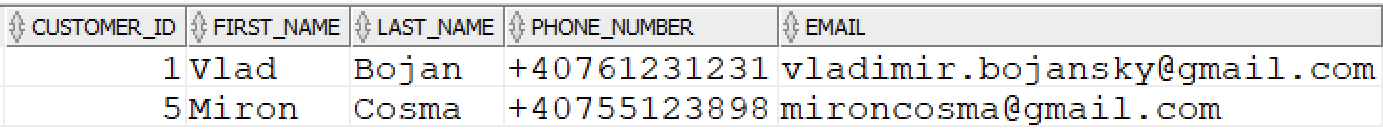
A screenshot of a computer

Description automatically generated

17.Select people who have gmail intersected with people who have romanian phone number:



Result:



18.Select union of people from Caracal and people from Craiova:



Result:

A group of black and white text

Description automatically generated

19.Select all people who don’t have romanian phone number:



Result:

A screenshot of a computer

Description automatically generated

20.Select laptops which have a price lower than the average of the laptops which have a condition of ‘Excellent’:



Result:

A close-up of a sign

Description automatically generated

21.Create a table which contains every order and the customers who placed the order:



Result:

A screenshot of a computer

Description automatically generated

22.Create a table with fewer data about a laptop and insert the respective rows into it:



Result:

A screenshot of a computer

Description automatically generated

23.Update prices on keydatalaptops with the buy prices of the laptops because we are bankrupt :P:



Result:

A screenshot of a computer

Description automatically generated

24.Join customers and orders tables and use it as a view by selecting all orders which were placed more recently than 2018 together with their customers:



Result:

A screenshot of a computer

Description automatically generated

Just to be sure: I inserted the row with my name in the customers table when doing all the insertions:

A computer screen shot of a black screen

Description automatically generated