

DBMS PROJECT (FOOD DELIVERY DATABASE SYSTEM)

INTRODUCTION

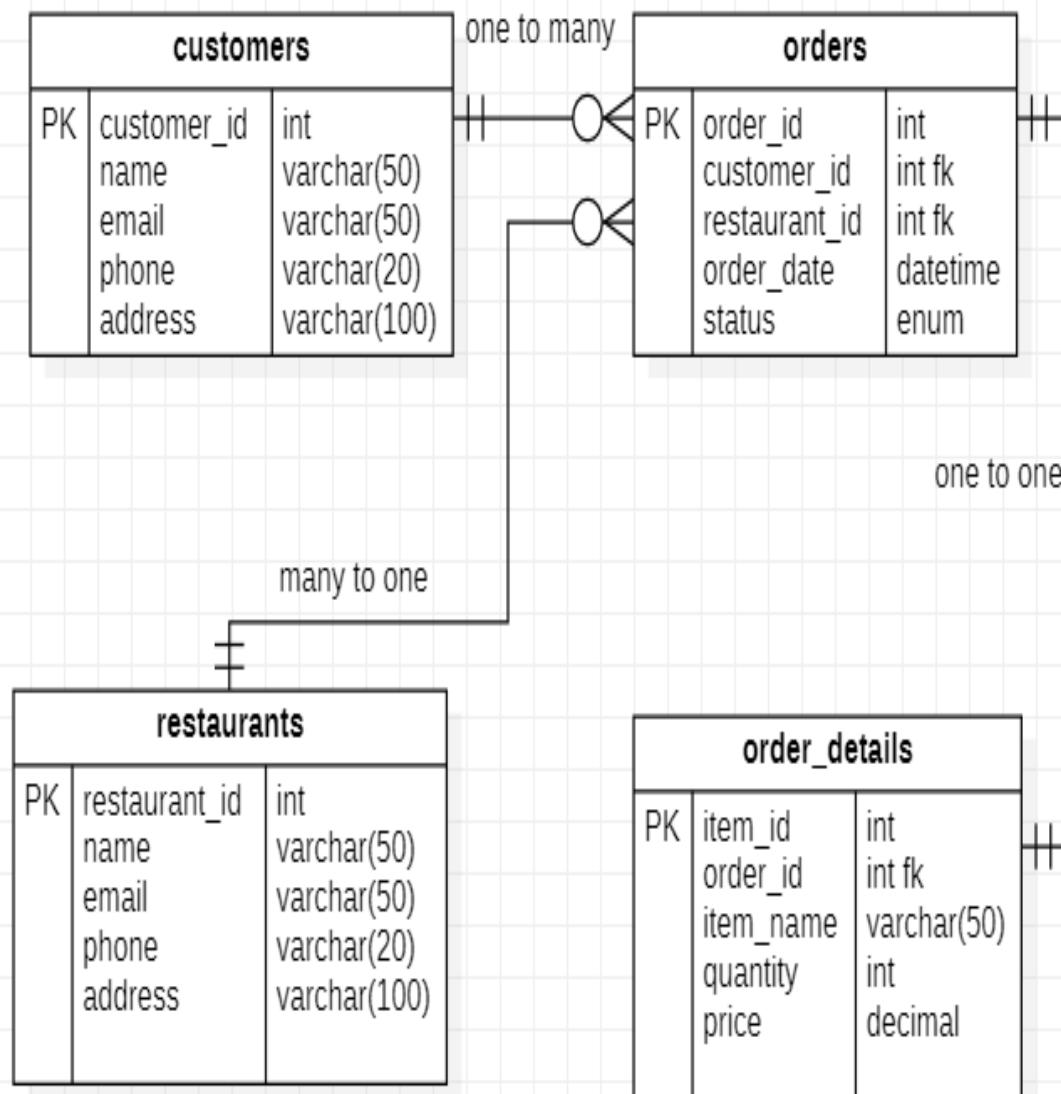
In today's fast-paced world, people often find it challenging to take the time to prepare meals at home. As a result, food delivery services have become increasingly popular. However, managing orders, deliveries, and payments can be a complex and time-consuming process for food delivery businesses.

This is where a Database Management System (DBMS) can come in handy. A DBMS is a software system that helps to manage large amounts of data efficiently. In the case of a food delivery business, a DBMS can be used to store and manage information about customers, orders, delivery drivers, and payments.

The goal of this project is to design and implement a DBMS for a food delivery service. The system will enable the food delivery business to efficiently manage its operations and provide an excellent customer experience. This project will involve designing a database schema, implementing it in a relational database management system, and building an application interface to interact with the database.

The project will require a deep understanding of database design principles, SQL, and programming. It will also require knowledge of the food delivery industry and an understanding of the needs of customers and businesses in this space. With the successful implementation of this project, the food delivery business will be able to improve its efficiency, reduce errors, and provide a better experience for its customers.

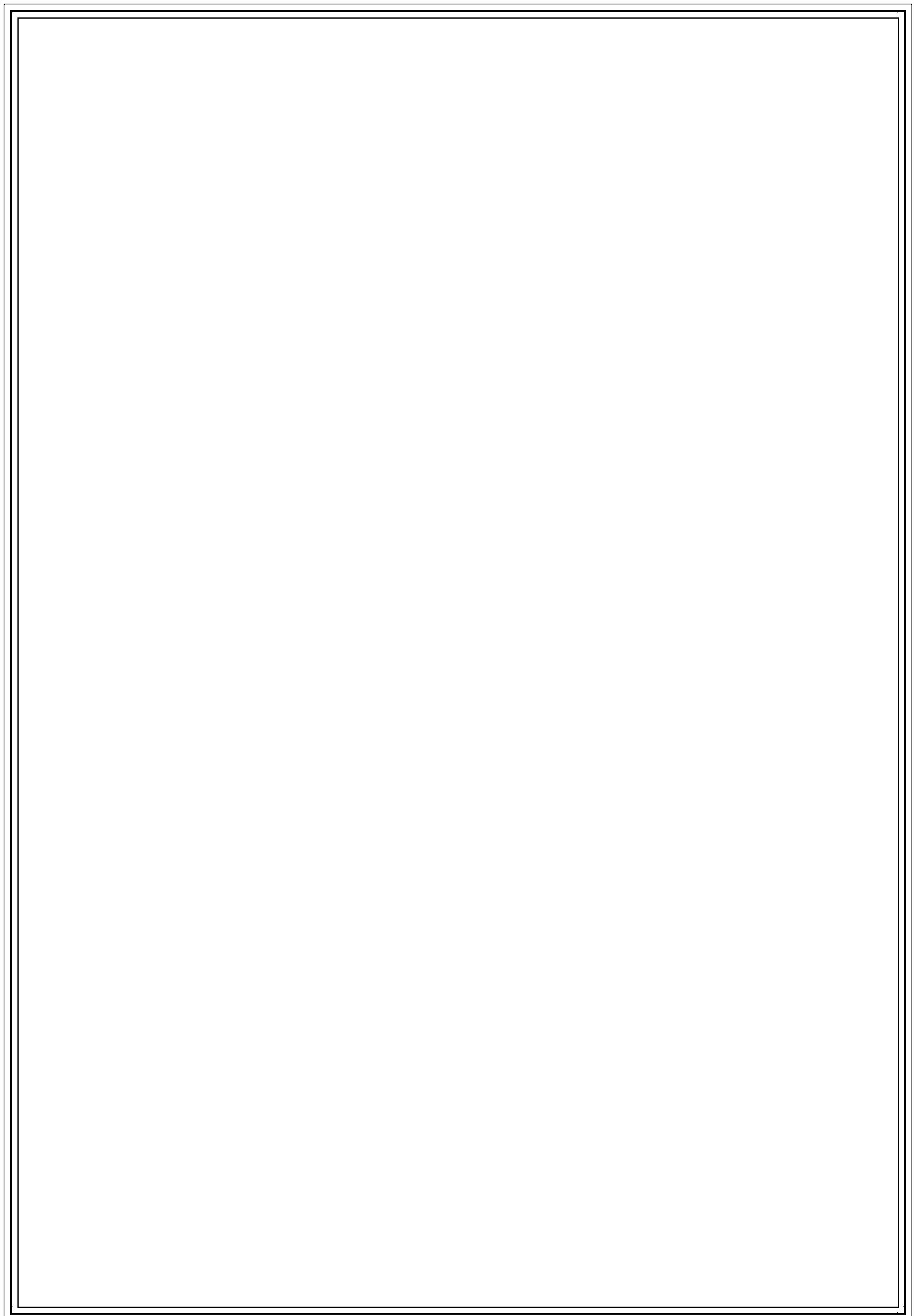
ER DIAGRAM



DATABASE DESIGN

DATABASES : FOOD DELIVERY

- A) CUSTOMERS**
- B) RESTAURANTS**
- C) ORDERS**
- D) ORDER_ITEMS**



4. CREATE DATABASE(FOOD_DELIVERY)

```
MariaDB [(none)]> CREATE DATABASE FOOD_DELIVERY  
-> ;  
Query OK, 1 row affected (0.003 sec)
```

4.CREATING TABLES

A) CUSTOMERS

```
MariaDB [(none)]> USE FOOD_DELIVERY  
Database changed  
MariaDB [FOOD_DELIVERY]> CREATE TABLE customers (  
->     customer_id INT AUTO_INCREMENT PRIMARY KEY,  
->     name VARCHAR(50) NOT NULL,  
->     email VARCHAR(50) NOT NULL,  
->     phone VARCHAR(20) NOT NULL,  
->     address VARCHAR(100) NOT NULL  
-> );  
Query OK, 0 rows affected (0.015 sec)
```

```
Query OK, 0 rows affected (0.015 sec)  
-> ;
```

B)RESTAURANTS

```
MariaDB [FOOD_DELIVERY]> CREATE TABLE restaurants (  
->     restaurant_id INT AUTO_INCREMENT PRIMARY KEY,  
->     name VARCHAR(50) NOT NULL,  
->     email VARCHAR(50) NOT NULL,  
->     phone VARCHAR(20) NOT NULL,  
->     address VARCHAR(100) NOT NULL  
-> );  
Query OK, 0 rows affected (0.010 sec)
```

```
Query OK, 0 rows affected (0.010 sec)  
-> ;
```

C)ORDERS

```
MariaDB [FOOD_DELIVERY]> CREATE TABLE orders (
    ->     order_id INT AUTO_INCREMENT PRIMARY KEY,
    ->     customer_id INT NOT NULL,
    ->     restaurant_id INT NOT NULL,
    ->     order_date DATETIME NOT NULL,
    ->     status ENUM('placed', 'processing', 'shipped', 'delivered') NOT NULL,
    ->     total DECIMAL(10, 2) NOT NULL,
    ->     FOREIGN KEY (customer_id) REFERENCES customers(customer_id),
    ->     FOREIGN KEY (restaurant_id) REFERENCES restaurants(restaurant_id)
    -> );
Query OK, 0 rows affected (0.018 sec)
```

```
Query OK, 0 rows affected (0.018 sec)
-> )?
```

D) ORDER_ITEMS

```
MariaDB [FOOD_DELIVERY]> CREATE TABLE order_items (
    ->     item_id INT AUTO_INCREMENT PRIMARY KEY,
    ->     order_id INT NOT NULL,
    ->     item_name VARCHAR(50) NOT NULL,
    ->     quantity INT NOT NULL,
    ->     price DECIMAL(10, 2) NOT NULL,
    ->     FOREIGN KEY (order_id) REFERENCES orders(order_id)
    -> );
Query OK, 0 rows affected (0.015 sec)
```

```
Query OK, 0 rows affected (0.012 sec)
-> )?
```

5. TABLES IN DATABASE(FOOD_DELIVER)

```
MariaDB [FOOD_DELIVERY]> SHOW TABLES;
+-----+
| Tables_in_food_delivery |
+-----+
| customers                |
| order_items               |
| orders                    |
| restaurants               |
+-----+
4 rows in set (0.001 sec)
```

```
4 rows in set (0.001 sec)
-> )?
```

6 DATA DEFINITION LANGUAGE(DDL)

a) CREATING TABLE

1) CUSTOMERS

```
MariaDB [food_delivery]> describe customers;
+-----+-----+-----+-----+-----+
| Field | Type   | Null | Key  | Default | Extra        |
+-----+-----+-----+-----+-----+
| customer_id | int(11) | NO   | PRI   | NULL    | auto_increment |
| name         | varchar(50)| NO  |        | NULL    |                |
| email        | varchar(50)| NO  |        | NULL    |                |
| phone        | varchar(20)| NO  |        | NULL    |                |
| address      | varchar(100)| NO |        | NULL    |                |
+-----+-----+-----+-----+-----+
5 rows in set (0.014 sec)
```

2) RESTAURANTS

```
MariaDB [food_delivery]> describe restaurants;
+-----+-----+-----+-----+-----+
| Field | Type   | Null | Key  | Default | Extra        |
+-----+-----+-----+-----+-----+
| restaurant_id | int(11) | NO   | PRI   | NULL    | auto_increment |
| name         | varchar(50)| NO  |        | NULL    |                |
| email        | varchar(50)| NO  |        | NULL    |                |
| phone        | varchar(20)| NO  |        | NULL    |                |
| address      | varchar(100)| NO |        | NULL    |                |
+-----+-----+-----+-----+-----+
5 rows in set (0.016 sec)
```

3) ORDERS

```
MariaDB [food_delivery]> describe orders;
+-----+-----+-----+-----+-----+
| Field | Type           | Null | Key  | Default | Extra        |
+-----+-----+-----+-----+-----+
| order_id | int(11)          | NO   | PRI   | NULL    | auto_increment |
| customer_id | int(11)          | NO   | MUL   | NULL    |                |
| restaurant_id | int(11)          | NO   | MUL   | NULL    |                |
| order_date | datetime         | NO   |        | NULL    |                |
| status     | enum('placed','processing','shipped','delivered') | NO   |        | NULL    |                |
| total      | decimal(10,2)      | NO   |        | NULL    |                |
+-----+-----+-----+-----+-----+
5 rows in set (0.015 sec)
```

4) ORDER_ITEMS

```
MariaDB [food_delivery]> describe order_items;
+-----+-----+-----+-----+-----+
| Field      | Type       | Null | Key | Default | Extra           |
+-----+-----+-----+-----+-----+
| item_id    | int(11)   | NO   | PRI | NULL    | auto_increment |
| order_id   | int(11)   | NO   | MUL | NULL    |                 |
| item_name  | varchar(50)| NO   |      | NULL    |                 |
| quantity   | int(11)   | NO   |      | NULL    |                 |
| price      | decimal(10,2)| NO   |      | NULL    |                 |
+-----+-----+-----+-----+-----+
5 rows in set (0.012 sec)
```

```
? LOMs tu sef (0.015 sec)
```

B) ALTER TABLE

1) ALTER TABLE ADD COLUMN

```
MariaDB [food_delivery]> ALTER TABLE RESTAURANTS ADD DISCOUNT_CODE INT;
Query OK, 0 rows affected (0.039 sec)
Records: 0  Duplicates: 0  Warnings: 0
```

2) ALTER TABLE MODIFY COLUMN

```
MariaDB [food_delivery]> ALTER TABLE RESTAURANTS MODIFY DISCOUNT_CODE VARCHAR(10);
Query OK, 5 rows affected (0.088 sec)
Records: 5  Duplicates: 0  Warnings: 0
```

3) ALTER TABLE RENAME COLUMN

```
MariaDB [food_delivery]> ALTER TABLE RESTAURANTS CHANGE DISCOUNT_CODE DIS_CODE VARCHAR(10);
Query OK, 0 rows affected (0.014 sec)
Records: 0  Duplicates: 0  Warnings: 0
```

```
MariaDB [FOOD_DELIVERY]> DROP TABLE ORDER_ITEMS;
Query OK, 0 rows affected (0.009 sec)

MariaDB [FOOD_DELIVERY]>
```

C) RENAME TABLE

```
MariaDB [BNB]> ALTER TABLE CUSTOMERS RENAME CUSTOMER_INFO;
Query OK, 0 rows affected (0.021 sec)

MariaDB [BNB]> SHOW TABLES;
+-----+
| Tables_in_bnb |
+-----+
| customer_info |
| employee      |
| loy            |
| projects       |
+-----+
4 rows in set (0.001 sec)
```

```
+ 4 rows in set (0.001 sec)
+-----+
| bLoGecce      |
```

D) TRUNCATE TABLE

```
MariaDB [BNB]> SELECT * FROM CUSTOMERS;
+-----+-----+-----+-----+-----+
| customer_id | name      | email        | phone     | address    |
+-----+-----+-----+-----+-----+
| 1           | John Smith | john@example.com | 555-1234 | 123 Main St. |
| 2           | Jane Doe   | jane@example.com | 555-5678 | 456 Maple Ave. |
| 3           | Bob Johnson | bob@example.com | 555-9012 | 789 Oak St. |
| 4           | JON CARTER  | JON@example.com | 555-8652 | 875 RDE St. |
+-----+-----+-----+-----+-----+
4 rows in set (0.001 sec)

MariaDB [BNB]> TRUNCATE CUSTOMERS;
Query OK, 0 rows affected (0.034 sec)

MariaDB [BNB]> SELECT * FROM CUSTOMERS;
Empty set (0.001 sec)
```

```
+-----+
| MariaDB [BNB]> SELECT * FROM CUSTOMERS;
```

E)DROP TABLE

```
MariaDB [BNB]> SHOW TABLES;
+-----+
| Tables_in_bnb |
+-----+
| customers      |
| employee       |
| loy             |
| projects        |
+-----+
4 rows in set (0.002 sec)

MariaDB [BNB]> DROP TABLE CUSTOMERS;
Query OK, 0 rows affected (0.014 sec)

MariaDB [BNB]> SHOW TABLES;
+-----+
| Tables_in_bnb |
+-----+
| employee      |
| loy            |
| projects       |
+-----+
3 rows in set (0.002 sec)
```

7. DATA MANIPULATION LANGUAGE(DML)

A. INSERT INTO TABLE

```
MariaDB [BNB]> select*from customer_info;
+-----+-----+-----+-----+
| customer_id | name      | email        | phone       | address     |
+-----+-----+-----+-----+
| 1           | John Smith | john@example.com | 555-1234 | 123 Main St. |
| 2           | Jane Doe   | jane@example.com | 555-5678 | 456 Maple Ave. |
| 3           | Bob Johnson | bob@example.com | 555-9012 | 789 Oak St.   |
| 4           | JON CARTER  | JON@example.com | 555-8652 | 875 RDE St.  |
+-----+-----+-----+-----+
4 rows in set (0.001 sec)
```

```
MariaDB [BNB]> INSERT INTO customer_info (name, email, phone, address)VALUES ('ANTHANI ROSE', 'ANTHANI@example.com', '555-9872', '777 KKB AVE.');
Query OK, 1 row affected (0.005 sec)
```

```
MariaDB [BNB]> select*from customer_info;
+-----+-----+-----+-----+
| customer_id | name      | email        | phone       | address     |
+-----+-----+-----+-----+
| 1           | John Smith | john@example.com | 555-1234 | 123 Main St. |
| 2           | Jane Doe   | jane@example.com | 555-5678 | 456 Maple Ave. |
| 3           | Bob Johnson | bob@example.com | 555-9012 | 789 Oak St.   |
| 4           | JON CARTER  | JON@example.com | 555-8652 | 875 RDE St.  |
| 5           | ANTHONI ROSE | ANTHONI@example.com | 555-9872 | 777 KKB AVE. |
+-----+-----+-----+-----+
5 rows in set (0.001 sec)
```

```
2 rows in set (0.00 sec)

+-----+-----+-----+-----+
| customer_id | name      | email        | phone       | address     |
+-----+-----+-----+-----+
| 2           | ANTHONI ROSE | ANTHONI@example.com | 222-8755 | 777 KKB AVE. |
| 4           | JON CARTER   | JON@example.com | 222-8925 | 875 RDE St.  |
| 3           | BOB JOHNSON | BOB@example.com | 222-8785 | 777 KKB AVE. |
| 5           | JANE DOE    | JANE@example.com | 222-9055 | 875 RDE St.  |
+-----+-----+-----+-----+
```

B. UPDATE INTO TABLE

```
MariaDB [food_delivery]> UPDATE RESTAURANTS SET DISCOUNT_CODE='PIZ001' WHERE RESTAURANT_ID=1;
Query OK, 1 row affected (0.023 sec)
Rows matched: 1  Changed: 1  Warnings: 0

MariaDB [food_delivery]> UPDATE RESTAURANTS SET DISCOUNT_CODE='DOMM80' WHERE RESTAURANT_ID=2;
Query OK, 1 row affected (0.007 sec)
Rows matched: 1  Changed: 1  Warnings: 0

MariaDB [food_delivery]> UPDATE RESTAURANTS SET DISCOUNT_CODE='BURG50' WHERE RESTAURANT_ID=3;
Query OK, 1 row affected (0.006 sec)
Rows matched: 1  Changed: 1  Warnings: 0

MariaDB [food_delivery]> UPDATE RESTAURANTS SET DISCOUNT_CODE='SUSH30' WHERE RESTAURANT_ID=4;
Query OK, 1 row affected (0.006 sec)
Rows matched: 1  Changed: 1  Warnings: 0

MariaDB [food_delivery]> UPDATE RESTAURANTS SET DISCOUNT_CODE='80TOCO' WHERE RESTAURANT_ID=5;
Query OK, 1 row affected (0.006 sec)
Rows matched: 1  Changed: 1  Warnings: 0
```

5 rows matched: 1 Changed: 1 Warnings: 0
Query OK, 1 row affected (0.006 sec)
Rows matched: 1 Changed: 1 Warnings: 0

C. DELETE RECORD INTO TABLE

```
MariaDB [BNB]> SELECT * FROM CUSTOMERS;
+-----+-----+-----+-----+-----+
| customer_id | name      | email        | phone       | address      |
+-----+-----+-----+-----+-----+
| 1 | John Smith | john@example.com | 555-1234 | 123 Main St. |
| 2 | Jane Doe   | jane@example.com | 555-5678 | 456 Maple Ave. |
| 3 | Bob Johnson | bob@example.com | 555-9012 | 789 Oak St. |
| 4 | JON CARTER  | JON@example.com | 555-8652 | 875 RDE St. |
| 5 | ANTHONI ROSE | ANTHONI@example.com | 555-9872 | 777 KKB AVE. |
+-----+-----+-----+-----+-----+
5 rows in set (0.001 sec)

MariaDB [BNB]> DELETE FROM CUSTOMERS WHERE CUSTOMER_ID=5;
Query OK, 1 row affected (0.016 sec)

MariaDB [BNB]> SELECT * FROM CUSTOMERS;
+-----+-----+-----+-----+-----+
| customer_id | name      | email        | phone       | address      |
+-----+-----+-----+-----+-----+
| 1 | John Smith | john@example.com | 555-1234 | 123 Main St. |
| 2 | Jane Doe   | jane@example.com | 555-5678 | 456 Maple Ave. |
| 3 | Bob Johnson | bob@example.com | 555-9012 | 789 Oak St. |
| 4 | JON CARTER  | JON@example.com | 555-8652 | 875 RDE St. |
+-----+-----+-----+-----+-----+
4 rows in set (0.001 sec)
```

4 rows in set (0.001 sec)

1	John Smith	john@example.com	555-1234	123 Main St.
2	Jane Doe	jane@example.com	555-5678	456 Maple Ave.
3	Bob Johnson	bob@example.com	555-9012	789 Oak St.
4	JON CARTER	JON@example.com	555-8652	875 RDE St.

8. DATA QUERY LANGUAGE (DQL)

a. SELECT QUERY

```
MariaDB [FOOD_DELIVERY]> SELECT * FROM CUSTOMERS;
+-----+-----+-----+-----+-----+
| customer_id | name | email | phone | address |
+-----+-----+-----+-----+-----+
| 1 | John Smith | john@example.com | 555-1234 | 123 Main St. |
| 2 | Jane Doe | jane@example.com | 555-5678 | 456 Maple Ave. |
| 3 | Bob Johnson | bob@example.com | 555-9012 | 789 Oak St. |
| 4 | JON CARTER | JON@example.com | 555-8652 | 875 RDE St. |
| 5 | ANTHONI ROSE | ANTHONI@example.com | 555-9872 | 777 KKB AVE. |
+-----+-----+-----+-----+-----+
5 rows in set (0.013 sec)
```

```
2 LOMZ TU 26f (0.013 sec)
```

```
MariaDB [FOOD_DELIVERY]> SELECT * FROM RESTAURANTS;
```

```
+-----+-----+-----+-----+-----+-----+
| restaurant_id | name | email | phone | address | DIS_CODE |
+-----+-----+-----+-----+-----+-----+
| 1 | Pizza Palace | pizza@example.com | 555-5555 | 10 Elm St. | PIZ001 |
| 2 | DOMINOZE Palace | DOMINOZE@example.com | 555-9999 | 22 ELE St. | DOMM80 |
| 3 | Burger Barn | burger@example.com | 555-6666 | 20 Oak St. | BURG50 |
| 4 | SUSHI LOVERS | SUSHI@example.com | 555-4545 | 11 TED St. | SUSH30 |
| 5 | Taco Town | taco@example.com | 555-7777 | 30 Maple Ave. | NULL |
+-----+-----+-----+-----+-----+-----+
5 rows in set (0.005 sec)
```

```
2 LOMZ TU 26f (0.002 sec)
```

b. ORDER BY QUERY ASC

```
MariaDB [FOOD_DELIVERY]> SELECT * FROM ORDER_ITEMS ORDER BY QUANTITY ASC;
+-----+-----+-----+-----+-----+
| item_id | order_id | item_name | quantity | price |
+-----+-----+-----+-----+-----+
| 1 | 1 | Large pepperoni pizza | 1 | 14.99 |
| 3 | 2 | Burger | 1 | 8.50 |
| 4 | 2 | Fries | 1 | 4.00 |
| 6 | 4 | Cheeseburger | 1 | 7.00 |
| 7 | 5 | Burrito | 1 | 10.00 |
| 2 | 1 | Soda | 2 | 1.50 |
| 5 | 3 | Taco | 2 | 2.50 |
+-----+-----+-----+-----+-----+
7 rows in set (0.004 sec)
```

```
2 LOMZ TU 26f (0.004 sec)
```

c. ORDER BY QUERY DESC

```
MariaDB [FOOD_DELIVERY]> SELECT * FROM ORDER_ITEMS ORDER BY QUANTITY DESC;
+-----+-----+-----+-----+-----+
| item_id | order_id | item_name | quantity | price |
+-----+-----+-----+-----+-----+
| 2       | 1       | Soda      | 2         | 1.50   |
| 5       | 3       | Taco      | 2         | 2.50   |
| 1       | 1       | Large pepperoni pizza | 1         | 14.99  |
| 3       | 2       | Burger    | 1         | 8.50   |
| 4       | 2       | Fries     | 1         | 4.00   |
| 6       | 4       | Cheeseburger | 1         | 7.00   |
| 7       | 5       | Burrito   | 1         | 10.00  |
+-----+-----+-----+-----+-----+
7 rows in set (0.001 sec)
```

d. LIMIT QUERY

```
MariaDB [FOOD_DELIVERY]> SELECT * FROM CUSTOMERS;
+-----+-----+-----+-----+-----+
| customer_id | name        | email      | phone     | address   |
+-----+-----+-----+-----+-----+
| 1           | John Smith  | john@example.com | 555-1234 | 123 Main St. |
| 2           | Jane Doe    | jane@example.com | 555-5678 | 456 Maple Ave. |
| 3           | Bob Johnson | bob@example.com | 555-9012 | 789 Oak St. |
| 4           | JON CARTER   | JON@example.com | 555-8652 | 875 RDE St. |
| 5           | ANTHONI ROSE | ANTHONI@example.com | 555-9872 | 777 KKB AVE. |
+-----+-----+-----+-----+-----+
5 rows in set (0.001 sec)

MariaDB [FOOD_DELIVERY]> SELECT * FROM CUSTOMERS LIMIT 3;
+-----+-----+-----+-----+-----+
| customer_id | name        | email      | phone     | address   |
+-----+-----+-----+-----+-----+
| 1           | John Smith  | john@example.com | 555-1234 | 123 Main St. |
| 2           | Jane Doe    | jane@example.com | 555-5678 | 456 Maple Ave. |
| 3           | Bob Johnson | bob@example.com | 555-9012 | 789 Oak St. |
+-----+-----+-----+-----+-----+
3 rows in set (0.001 sec)
```

e. SELECT QUERY WITH SPECIFIC COLUMN

```
MariaDB [FOOD_DELIVERY]> SELECT NAME,EMAIL FROM CUSTOMERS;
+-----+-----+
| NAME      | EMAIL       |
+-----+-----+
| John Smith | john@example.com |
| Jane Doe   | jane@example.com |
| Bob Johnson | bob@example.com |
| JON CARTER  | JON@example.com |
| ANTHONI ROSE | ANTHONI@example.com |
+-----+
5 rows in set (0.002 sec)
```

```
? LOMS IN SET (0.003 sec)
+-----+
```

f. SELECT QUERY WITH COLUMN NAME CHANGE

```
MariaDB [FOOD_DELIVERY]> SELECT NAME AS CUSTOMERS_NAME,EMAIL FROM CUSTOMERS;
+-----+-----+
| CUSTOMERS_NAME | EMAIL       |
+-----+-----+
| John Smith     | john@example.com |
| Jane Doe       | jane@example.com |
| Bob Johnson    | bob@example.com |
| JON CARTER     | JON@example.com |
| ANTHONI ROSE   | ANTHONI@example.com |
+-----+
5 rows in set (0.004 sec)
```

```
? LOMS IN SET (0.004 sec)
+-----+
```

g. DISTINCT QUERY

```
MariaDB [FOOD_DELIVERY]> SELECT DISTINCT STATUS FROM ORDERS;
+-----+
| STATUS      |
+-----+
| placed      |
| processing  |
| shipped     |
| delivered   |
+-----+
4 rows in set (0.007 sec)
```

```
? LOMS IN SET (0.007 sec)
+-----+
```

9. USING WHERE CLAUSE

a. WITH COMPARISON OPERATOR

```
MariaDB [food_delivery]> SELECT * FROM ORDERS WHERE STATUS='PLACED';
+-----+-----+-----+-----+-----+
| order_id | customer_id | restaurant_id | order_date | status | total |
+-----+-----+-----+-----+-----+
| 1 | 1 | 1 | 2023-02-18 12:00:00 | placed | 20.99 |
| 5 | 2 | 3 | 2023-02-18 13:00:00 | placed | 23.00 |
+-----+-----+-----+-----+-----+
2 rows in set (0.005 sec)
```

5 rows in set (0.002 sec)

```
MariaDB [food_delivery]> SELECT * FROM ORDERS WHERE TOTAL>=15;
+-----+-----+-----+-----+-----+
| order_id | customer_id | restaurant_id | order_date | status | total |
+-----+-----+-----+-----+-----+
| 1 | 1 | 1 | 2023-02-18 12:00:00 | placed | 20.99 |
| 2 | 2 | 2 | 2023-02-18 12:15:00 | processing | 15.50 |
| 4 | 1 | 2 | 2023-02-18 12:45:00 | delivered | 18.25 |
| 5 | 2 | 3 | 2023-02-18 13:00:00 | placed | 23.00 |
+-----+-----+-----+-----+-----+
4 rows in set (0.007 sec)
```

5 rows in set (0.001 sec)

MariaDB [food_delivery]> --FIND FIRST TWO RESTAURANT

```
MariaDB [food_delivery]> SELECT * FROM RESTAURANTS WHERE RESTAURANT_ID<=2;
```

```
+-----+-----+-----+-----+-----+
| restaurant_id | name | email | phone | address | DIS_CODE |
+-----+-----+-----+-----+-----+
| 1 | Pizza Palace | pizza@example.com | 555-5555 | 10 Elm St. | PIZ001 |
| 2 | DOMINOZE Palace | DOMINOZE@example.com | 555-9999 | 22 ELE St. | DOMM80 |
+-----+-----+-----+-----+-----+
2 rows in set (0.004 sec)
```

5 rows in set (0.004 sec)

10. USING LOGICAL OPERATOR

a. USING OR OPERATOR

```
MariaDB [food_delivery]> ---find type of burger order
MariaDB [food_delivery]> select *
-> from order_items
-> where item_name='burger' or item_name='cheeseburger';
+-----+-----+-----+-----+
| item_id | order_id | item_name | quantity | price |
+-----+-----+-----+-----+
|      3 |      2 | Burger    |        1 |   8.50 |
|      6 |      4 | Cheeseburger |        1 |   7.00 |
|     47 |      5 | Cheeseburger |        1 |  10.00 |
+-----+-----+-----+-----+
3 rows in set (0.001 sec)
```

b. USING AND/OR OPERATOR

```
MariaDB [food_delivery]> ---find type of burger order bellow 10 price
MariaDB [food_delivery]> select *
-> from order_items
-> where item_name='burger' or item_name='cheeseburger' and price<10;
+-----+-----+-----+-----+
| item_id | order_id | item_name | quantity | price |
+-----+-----+-----+-----+
|      3 |      2 | Burger    |        1 |   8.50 |
|      6 |      4 | Cheeseburger |        1 |   7.00 |
+-----+-----+-----+-----+
2 rows in set (0.001 sec)
```

c. USING IN CLAUSE

```
MariaDB [food_delivery]> --- find order of only burger,coke,soda,fries in table
MariaDB [food_delivery]> select *
-> from order_items
-> where item_name in('burger','coke','soda','fries');
+-----+-----+-----+-----+
| item_id | order_id | item_name | quantity | price |
+-----+-----+-----+-----+
|      2 |        1 | Soda       |      2 |  1.50 |
|      3 |        2 | Burger     |      1 |  8.50 |
|      4 |        2 | Fries      |      1 |  4.00 |
|    39 |        1 | Coke       |      3 |  3.00 |
|    49 |        5 | Soda       |      1 |  2.00 |
+-----+-----+-----+-----+
5 rows in set (0.004 sec)
```

```
? LOMZ ?N sef (0.004 sec)
+-----+-----+-----+-----+
| 46 |        2 | 2098 | T | 5.00 |
```

d. USING BETWEEN CLAUSE

```
MariaDB [food_delivery]> ----find order price between 1 to 10 rs
MariaDB [food_delivery]> select *
-> from order_items
-> where price between 1 and 10;
+-----+-----+-----+-----+
| item_id | order_id | item_name | quantity | price |
+-----+-----+-----+-----+
|      2 |        1 | Soda       |      2 |  1.50 |
|      3 |        2 | Burger     |      1 |  8.50 |
|      4 |        2 | Fries      |      1 |  4.00 |
|      5 |        3 | Taco       |      2 |  2.50 |
|      6 |        4 | Cheeseburger |      1 |  7.00 |
|      7 |        5 | Burrito    |      1 | 10.00 |
|    38 |        1 | Garlic Bread |      1 |  6.00 |
|    39 |        1 | Coke       |      3 |  3.00 |
|    41 |        2 | Naan       |      2 |  5.00 |
|    42 |        2 | Mango Lassi |      1 |  4.50 |
|    44 |        3 | Miso Soup   |      2 |  3.50 |
|    46 |        4 | Caesar Salad |      1 |  9.00 |
|    47 |        5 | Cheeseburger |      1 | 10.00 |
|    48 |        5 | French Fries |      1 |  5.00 |
|    49 |        5 | Soda       |      1 |  2.00 |
+-----+-----+-----+-----+
15 rows in set (0.004 sec)
```

```
? LOMZ ?N sef (0.004 sec)
+-----+-----+-----+-----+
| 46 |        2 | 2098 | T | 5.00 |
| 48 |        2 | French Fries | T | 2.00 |
| 45 |        2 | Cheeseburger | T | 10.00 |
| 49 |        2 | Caesar Salad | T | 9.00 |
```

11. AGGREGATE FUNCTION

a. COUNT FUNCTION

```
MariaDB [food_delivery]> --find count of orders
MariaDB [food_delivery]> select count(order_id)
    -> from order_items;
+-----+
| count(order_id) |
+-----+
|          20 |
+-----+
1 row in set (0.006 sec)
```

T L O M T N S E T (0.006 sec)

b. AVERAGE FUNCTION

```
MariaDB [food_delivery]> --find average of cost
MariaDB [food_delivery]> select avg(price)
    -> from order_items;
+-----+
| avg(price) |
+-----+
|   9.474500 |
+-----+
1 row in set (0.002 sec)
```

T L O M T N S E T (0.002 sec)

C. SUM FUNCTION

```
MariaDB [food_delivery]> --find sum of cost of all orders
MariaDB [food_delivery]> select sum(price)
    -> from order_items;
+-----+
| sum(price) |
+-----+
|     189.49 |
+-----+
1 row in set (0.003 sec)
```

T L O M T N S E T (0.003 sec)

d. FLOOR FUNCTION

```
MariaDB [food_delivery]> --sum of cost round value
MariaDB [food_delivery]> select floor(sum(price))
    -> from order_items;
+-----+
| floor(sum(price)) |
+-----+
|          189 |
+-----+
1 row in set (0.006 sec)
```

1 row in set (0.000 sec)

11. GROUP BY CLAUSE

```
MariaDB [food_delivery]> --FIND OUT NUMBER OF ORDER STATUS
MariaDB [food_delivery]> SELECT STATUS,COUNT(*)
    -> FROM ORDERS
    -> GROUP BY STATUS;
+-----+
| STATUS | COUNT(*) |
+-----+
| placed |      3 |
| processing |      3 |
| shipped |      1 |
| delivered |      2 |
+-----+
4 rows in set (0.007 sec)
```

1 row in set (0.001 sec)

+-----+
| GETTABLES | 3 |

```
MariaDB [food_delivery]> -- FIND TOTAL COST PAY TO EACH ESTAURANT
MariaDB [food_delivery]> SELECT RESTAURANT_ID,SUM(TOTAL)
    -> FROM ORDERS
    -> GROUP BY RESTAURANT_ID;
+-----+
| RESTAURANT_ID | SUM(TOTAL) |
+-----+
|      1 | 119.99 |
|      2 | 89.25 |
|      3 | 52.75 |
+-----+
3 rows in set (0.002 sec)
```

1 row in set (0.003 sec)

```
MariaDB [food_delivery]> SELECT NAME,SUM(TOTAL)
-> FROM ORDERS JOIN RESTAURANTS ON RESTAURANTS.RESTAURANT_ID=ORDERS.RESTAURANT_ID
-> GROUP BY NAME;
+-----+
| NAME      | SUM(TOTAL) |
+-----+
| Burger Barn |    52.75 |
| DOMINOZE Palace | 89.25 |
| Pizza Palace | 119.99 |
+-----+
3 rows in set (0.003 sec)
```

3 rows in set (0.003 sec)

12. LIKE OPERATOR

```
MariaDB [food_delivery]> SELECT *
-> FROM ORDER_ITEMS
-> WHERE ITEM_NAME LIKE '%PIZZA';
+-----+-----+-----+-----+
| item_id | order_id | item_name           | quantity | price |
+-----+-----+-----+-----+
| 1       | 1        | Large pepperoni pizza | 1        | 14.99 |
+-----+-----+-----+-----+
1 row in set (0.001 sec)
```

1 row in set (0.001 sec)

```
MariaDB [food_delivery]> SELECT *
-> FROM ORDER_ITEMS
-> WHERE ITEM_NAME LIKE '%BURGER%';
+-----+-----+-----+-----+
| item_id | order_id | item_name     | quantity | price |
+-----+-----+-----+-----+
| 3       | 2        | Burger        | 1        | 8.50  |
| 6       | 4        | Cheeseburger | 1        | 7.00  |
| 47      | 5        | Cheeseburger | 1        | 10.00 |
+-----+-----+-----+-----+
3 rows in set (0.001 sec)
```

3 rows in set (0.001 sec)

```
MariaDB [food_delivery]> SELECT *
    -> FROM ORDER_ITEMS
    -> WHERE ITEM_NAME LIKE '%SODA%';
+-----+-----+-----+-----+-----+
| item_id | order_id | item_name | quantity | price |
+-----+-----+-----+-----+-----+
|      2 |        1 | Soda      |        2 | 1.50  |
|     49 |        5 | Soda      |        1 | 2.00  |
+-----+-----+-----+-----+
2 rows in set (0.001 sec)
```

3 rows in set (0.001 sec)

```
MariaDB [food_delivery]> SELECT *
    -> FROM RESTAURANTS
    -> WHERE NAME LIKE 'SUSHI%';
+-----+-----+-----+-----+-----+
| restaurant_id | name           | email          | phone       | address      | DIS_CODE   |
+-----+-----+-----+-----+-----+
|        4 | SUSHI LOVERS | SUSHI@example.com | 555-4545 | 11 TED St. | SUSH30    |
|        6 | Sushi Express | info@sushiexpress.com | 555-1234 | 123 Main St | NULL      |
+-----+-----+-----+-----+-----+
2 rows in set (0.001 sec)
```

3 rows in set (0.001 sec)

12. UNION

```
MariaDB [food_delivery]> SELECT NAME FROM RESTAURANTS UNION SELECT ITEM_NAME FROM ORDER_ITEMS;
+-----+
| NAME          |
+-----+
| Pizza Palace |
| DOMINOZE Palace |
| Burger Barn   |
| SUSHI LOVERS  |
| Taco Town     |
| Sushi Express  |
| The Italian Kitchen |
| Burgers R Us   |
| Large pepperoni pizza |
| Soda          |
| Burger         |
| Fries          |
| Taco           |
| Cheeseburger   |
| Burrito        |
| Pizza Margherita |
| Garlic Bread   |
| Coke           |
| Chicken Tikka  |
| Naan           |
| Mango Lassi    |
| Sushi Combo    |
| Miso Soup      |
| Spaghetti      |
| Caesar Salad   |
| French Fries   |
+-----+
16 rows in set (0.009 sec)
```

3 rows in set (0.000 sec)

```
+-----+
| Item Name |
+-----+
| French Fries |
| Caesar Salad |
| Spaghetti    |
| Miso Soup    |
| Sushi Combo  |
| Garlic Bread |
| Burrito      |
| Large pepperoni pizza |
| Soda         |
| Coke         |
| Chicken Tikka |
| Naan         |
| Mango Lassi  |
| Sushi Combo  |
| Burrito      |
| French Fries |
+-----+
```

joins

```
MariaDB [food_delivery]> SELECT NAME,RESTAURANTS.RESTAURANT_ID,ORDER_DATE,STATUS  
-> FROM RESTAURANTS  
-> JOIN ORDERS ON RESTAURANTS.RESTAURANT_ID=ORDERS.RESTAURANT_ID;  
+-----+-----+-----+-----+  
| NAME | RESTAURANT_ID | ORDER_DATE | STATUS |  
+-----+-----+-----+-----+  
| Pizza Palace | 1 | 2023-02-18 12:00:00 | placed |  
| DOMINOZE Palace | 2 | 2023-02-18 12:15:00 | processing |  
| Burger Barn | 3 | 2023-02-18 12:30:00 | shipped |  
| DOMINOZE Palace | 2 | 2023-02-18 12:45:00 | delivered |  
| Burger Barn | 3 | 2023-02-18 13:00:00 | placed |  
| Pizza Palace | 1 | 2023-02-16 14:30:00 | delivered |  
| DOMINOZE Palace | 2 | 2023-02-17 18:00:00 | processing |  
| Burger Barn | 3 | 2023-02-18 12:15:00 | placed |  
| Pizza Palace | 1 | 2023-02-18 19:30:00 | processing |  
+-----+-----+-----+-----+  
9 rows in set (0.001 sec)
```

```
# LOMS ÍN sef (0.002 sec)  
+-----+-----+-----+-----+  
| NAME | RESTAURANT_ID | ORDER_DATE | STATUS |  
+-----+-----+-----+-----+  
| Pizza Palace | 1 | 2023-02-18 12:30:00 | processing |  
| DOMINOZE Palace | 2 | 2023-02-18 12:45:00 | placed |
```

```
MariaDB [food_delivery]> SELECT NAME,RESTAURANTS.RESTAURANT_ID,ORDER_DATE,STATUS  
-> FROM RESTAURANTS  
-> LEFT JOIN ORDERS ON RESTAURANTS.RESTAURANT_ID=ORDERS.RESTAURANT_ID;  
+-----+-----+-----+-----+  
| NAME | RESTAURANT_ID | ORDER_DATE | STATUS |  
+-----+-----+-----+-----+  
| Pizza Palace | 1 | 2023-02-18 12:00:00 | placed |  
| Pizza Palace | 1 | 2023-02-16 14:30:00 | delivered |  
| Pizza Palace | 1 | 2023-02-18 19:30:00 | processing |  
| DOMINOZE Palace | 2 | 2023-02-18 12:15:00 | processing |  
| DOMINOZE Palace | 2 | 2023-02-18 12:45:00 | delivered |  
| DOMINOZE Palace | 2 | 2023-02-17 18:00:00 | processing |  
| Burger Barn | 3 | 2023-02-18 12:30:00 | shipped |  
| Burger Barn | 3 | 2023-02-18 13:00:00 | placed |  
| Burger Barn | 3 | 2023-02-18 12:15:00 | placed |  
| SUSHI LOVERS | 4 | NULL | NULL |  
| Taco Town | 5 | NULL | NULL |  
| Sushi Express | 6 | NULL | NULL |  
| The Italian Kitchen | 7 | NULL | NULL |  
| Burgers R Us | 8 | NULL | NULL |  
+-----+-----+-----+-----+  
14 rows in set (0.005 sec)
```

```
# LOMS ÍN sef (0.002 sec)  
+-----+-----+-----+-----+  
| Burgers R Us | 8 | NULL | NULL |  
| The Italian Kitchen | 7 | NULL | NULL |  
| Sushi Express | 6 | NULL | NULL |
```

```
MariaDB [food_delivery]> SELECT NAME,RESTAURANTS.RESTAURANT_ID,ORDER_DATE,STATUS
-> FROM RESTAURANTS
-> RIGHT JOIN ORDERS ON RESTAURANTS.RESTAURANT_ID=ORDERS.RESTAURANT_ID;
+-----+-----+-----+-----+
| NAME | RESTAURANT_ID | ORDER_DATE | STATUS |
+-----+-----+-----+-----+
| Pizza Palace | 1 | 2023-02-18 12:00:00 | placed |
| DOMINOZE Palace | 2 | 2023-02-18 12:15:00 | processing |
| Burger Barn | 3 | 2023-02-18 12:30:00 | shipped |
| DOMINOZE Palace | 2 | 2023-02-18 12:45:00 | delivered |
| Burger Barn | 3 | 2023-02-18 13:00:00 | placed |
| Pizza Palace | 1 | 2023-02-16 14:30:00 | delivered |
| DOMINOZE Palace | 2 | 2023-02-17 18:00:00 | processing |
| Burger Barn | 3 | 2023-02-18 12:15:00 | placed |
| Pizza Palace | 1 | 2023-02-18 19:30:00 | processing |
+-----+-----+-----+-----+
9 rows in set (0.001 sec)
```

```
+-----+-----+-----+
| Pizza Palace | 1 | 2023-02-18 18:30:00 | processing |
| DOMINOZE Palace | 2 | 2023-02-18 19:30:00 | shipped |
+-----+-----+-----+
```

```
MariaDB [food_delivery]> SELECT name,TOTAL,address from restaurants
-> join orders on orders.restaurant_id=restaurants.restaurant_id
-> WHERE TOTAL IN(SELECT MAX(TOTAL) FROM ORDERS
-> WHERE TOTAL<(SELECT MAX(TOTAL) FROM ORDERS));
+-----+-----+-----+
| name | TOTAL | address |
+-----+-----+-----+
| DOMINOZE Palace | 55.50 | 22 ELE St. |
+-----+-----+-----+
1 row in set (0.001 sec)
```

```
+-----+-----+-----+
| DOMINOZE Palace | 55.50 | 22 ELE St. |
+-----+-----+-----+
```

```
MariaDB [food_delivery]> SELECT name,address from restaurants
-> join orders on orders.restaurant_id=restaurants.restaurant_id
-> WHERE TOTAL IN (SELECT MAX(TOTAL) FROM ORDERS UNION SELECT MIN(TOTAL) FROM ORDERS);
+-----+-----+
| name | address |
+-----+-----+
| Burger Barn | 20 Oak St. |
| Pizza Palace | 10 Elm St. |
+-----+-----+
2 rows in set (0.001 sec)
```

```
+-----+-----+
| Burger Barn | 20 Oak St. |
| Pizza Palace | 10 Elm St. |
+-----+-----+
```

View

```
MariaDB [bnb]> create view viewemp as select id,name,department,salary from emp001;
Query OK, 0 rows affected (0.011 sec)
```

```
MariaDB [bnb]> select * from viewemp;
+----+-----+-----+-----+
| id | name           | department | salary |
+----+-----+-----+-----+
| 1001 | John Doe       | IT          | 35000   |
| 1002 | Mary Smith     | HR          | 45000   |
| 1003 | James Brown    | Finance    | 50000   |
| 1004 | Mike Walker    | Finance    | 50000   |
| 1005 | Linda Jones    | HR          | 75000   |
| 1006 | Anurag Mohanty | IT          | 35000   |
| 1007 | Priyanla Dewangan | HR          | 45000   |
| 1008 | Sambit Mohanty | IT          | 50000   |
| 1009 | Pranaya Kumar  | IT          | 50000   |
| 1010 | Hina Sharma    | HR          | 75000   |
+----+-----+-----+-----+
10 rows in set (0.010 sec)
```

```
10 rows in set (0.010 sec)
+----+-----+-----+-----+
| id | name           | department | salary |
+----+-----+-----+-----+
| 1001 | John Doe       | IT          | 35000   |
| 1002 | Mary Smith     | HR          | 45000   |
| 1003 | James Brown    | Finance    | 50000   |
| 1004 | Mike Walker    | Finance    | 50000   |
| 1005 | Linda Jones    | HR          | 75000   |
| 1006 | Anurag Mohanty | IT          | 35000   |
| 1007 | Priyanla Dewangan | HR          | 45000   |
| 1008 | Sambit Mohanty | IT          | 50000   |
| 1009 | Pranaya Kumar  | IT          | 50000   |
| 1010 | Hina Sharma    | HR          | 75000   |
+----+-----+-----+-----+
```