MYSQL QUERIES ON NORMALIZATION PROJECT

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MORNING

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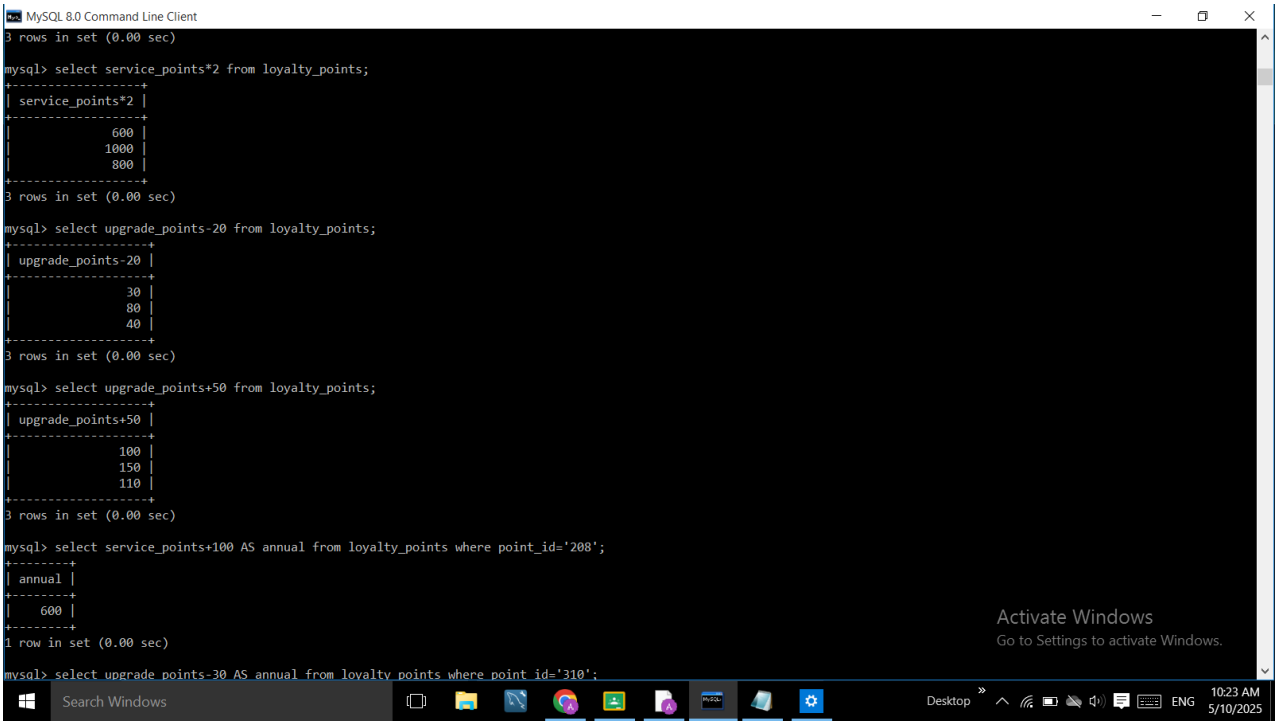
ARITHMETIC & LOGICAL OPERATIONS ON LOYALTY_POINTS TABLE

Arithmetic operations include +,-,*, /.

Syntax

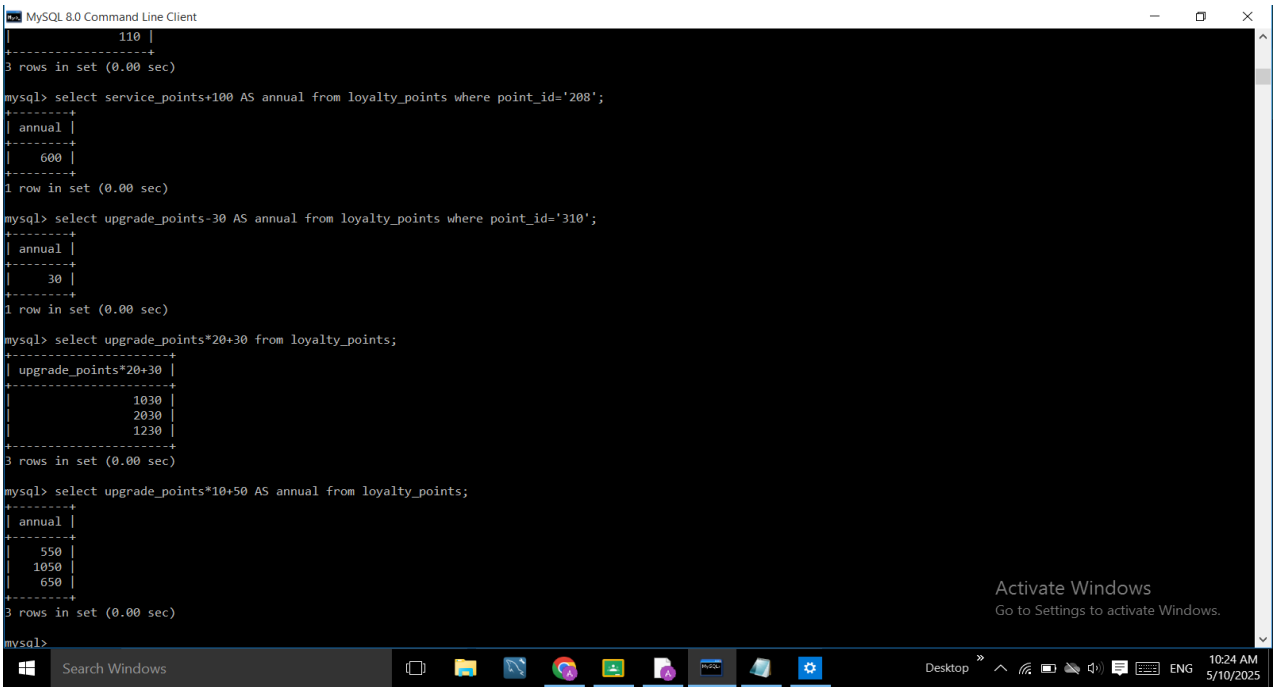
```
select attribute+value from table;
```

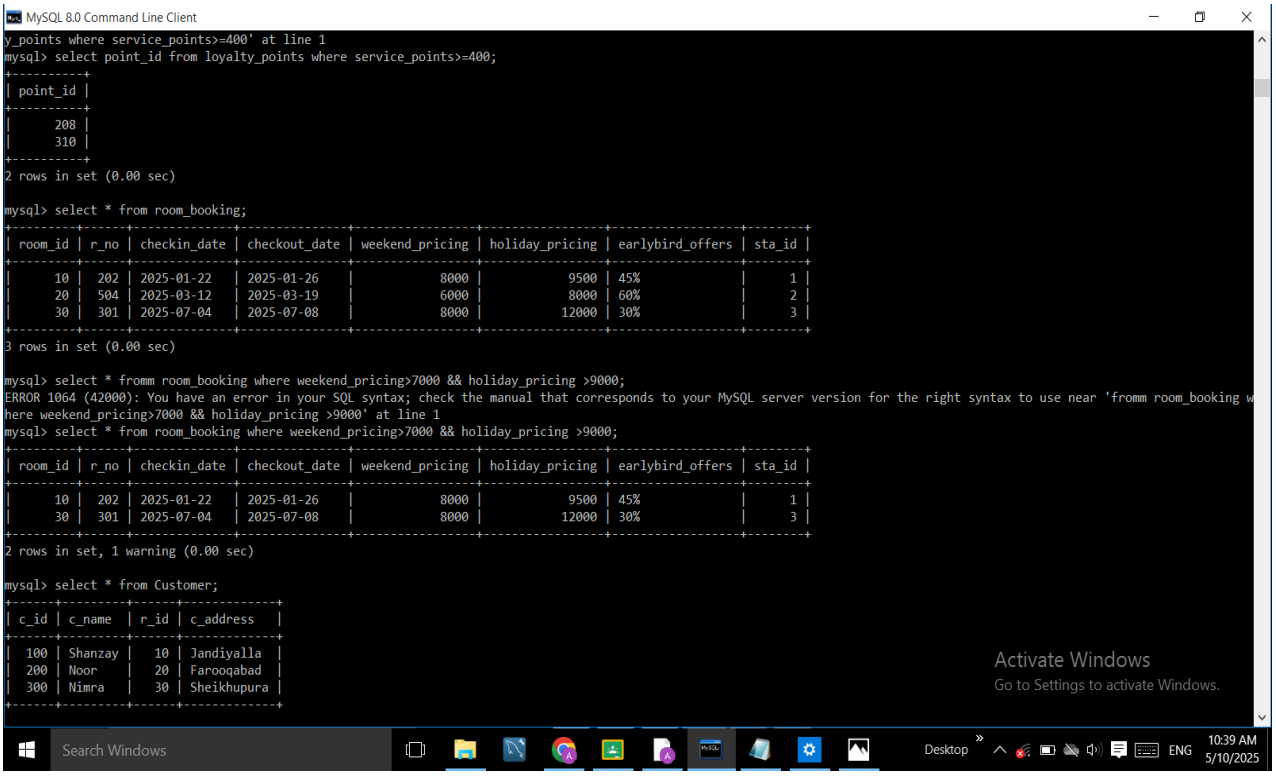
Other operations are also performed according to the above syntax.



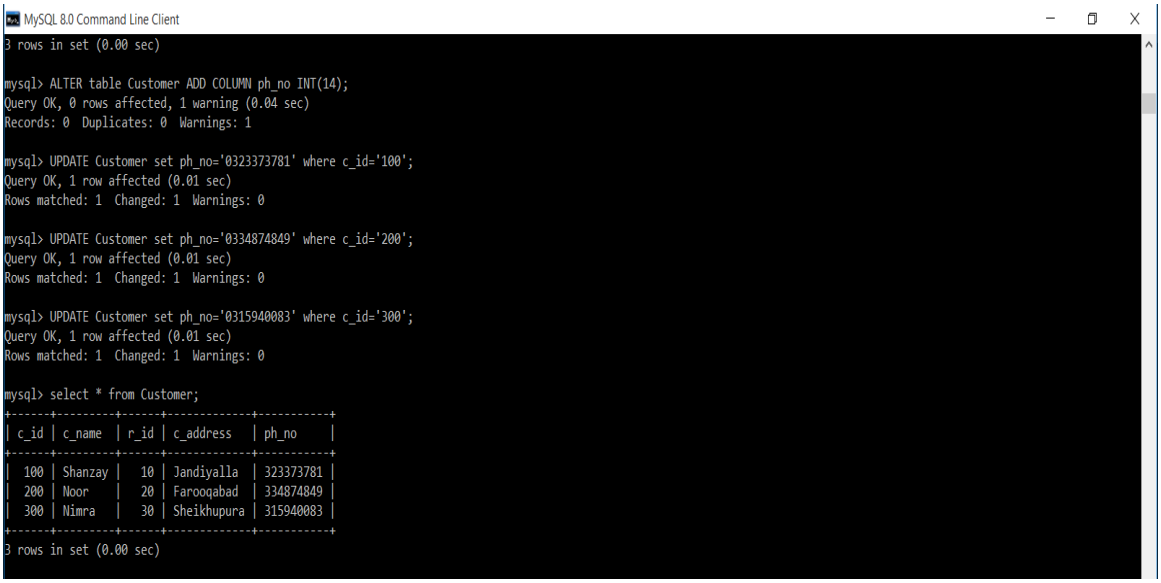
LOGICAL OPERATIONS

Logical operations contains >, <, <=, >=, !=, = etc.





ADDING ph_no COLUMN IN CUSTOMER



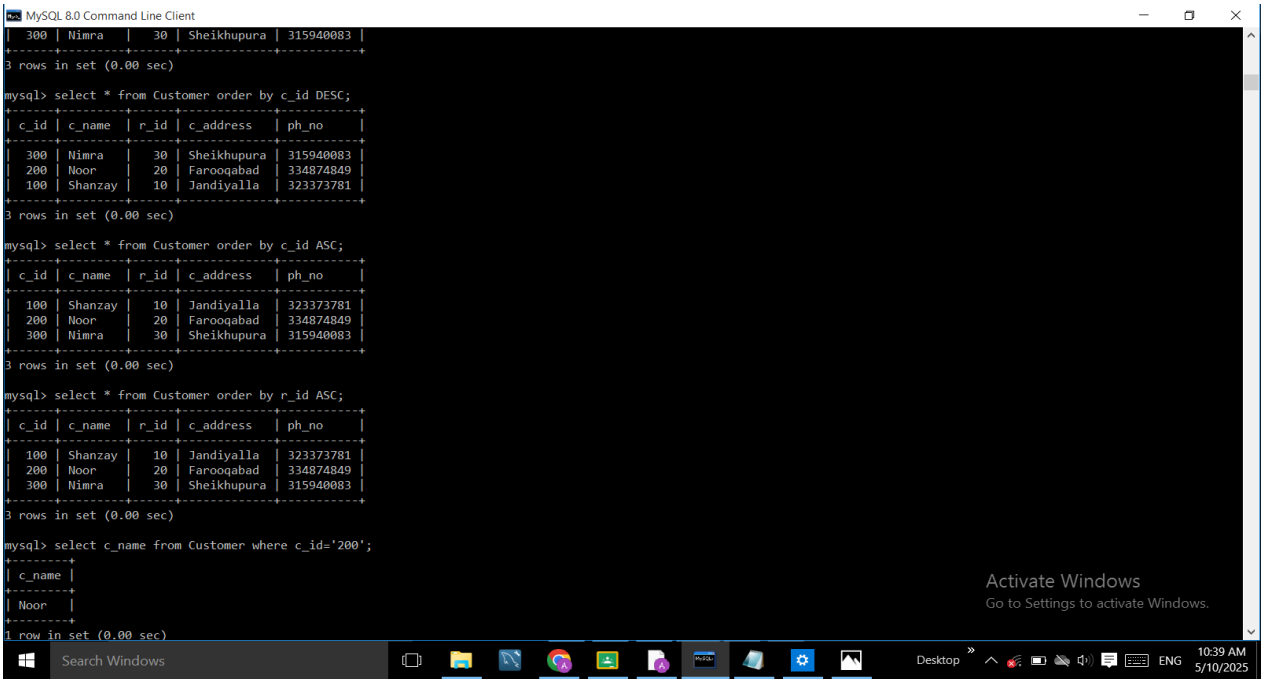
ORDER BY CLAUSE ON CUSTOMER

The ORDER BY keyword is used to sort the result-set in ascending or descending order.

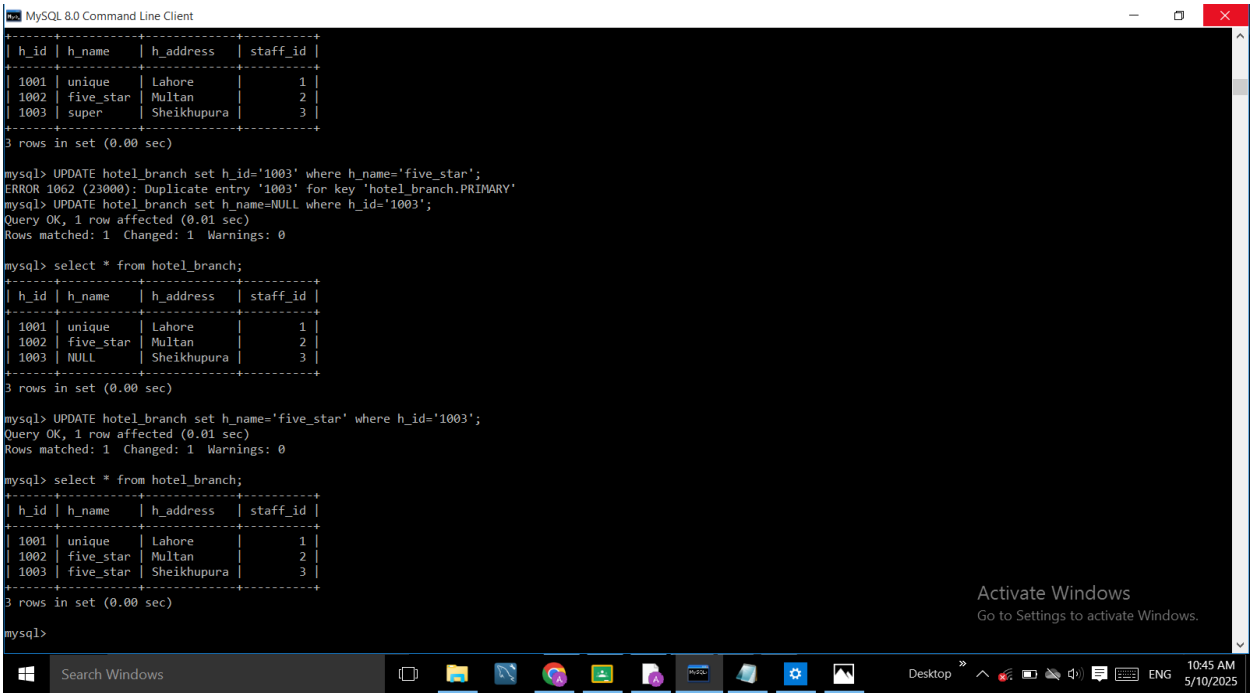
The ORDER BY keyword sorts the records in ascending order by default. To sort the records in descending order, use the DESC keyword.

Syntax

```
SELECT * FROM attribute_name ORDER BY table;
```



GIVING TWO h_ids SAME NAME

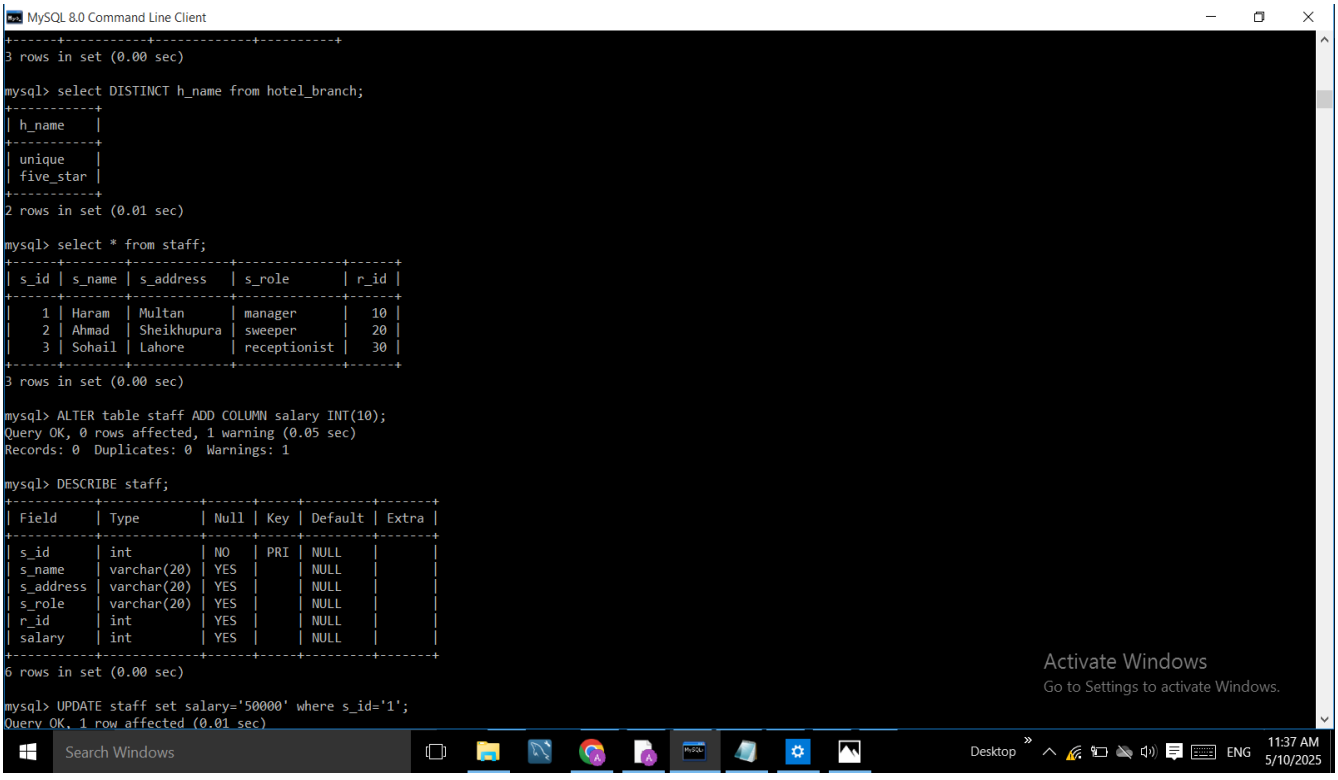


DISTINCT CLAUSE AND ADDING SALARY COLUMN IN STAFF TABLE

The DISTINCT keyword in MySQL is used to remove duplicate records from the results of a SELECT query. It ensures that the query returns only unique values in the specified columns.

Syntax

SELECT DISTINCT Country FROM Customers;



BETWEEN, HAVING AND IN CLAUSES

The **BETWEEN** clause is used to show the values/contents of the table between a given limit.

Syntax:

select attribute_name from table_name where attribute='value' OR attribute_value BETWEEN ... AND …;

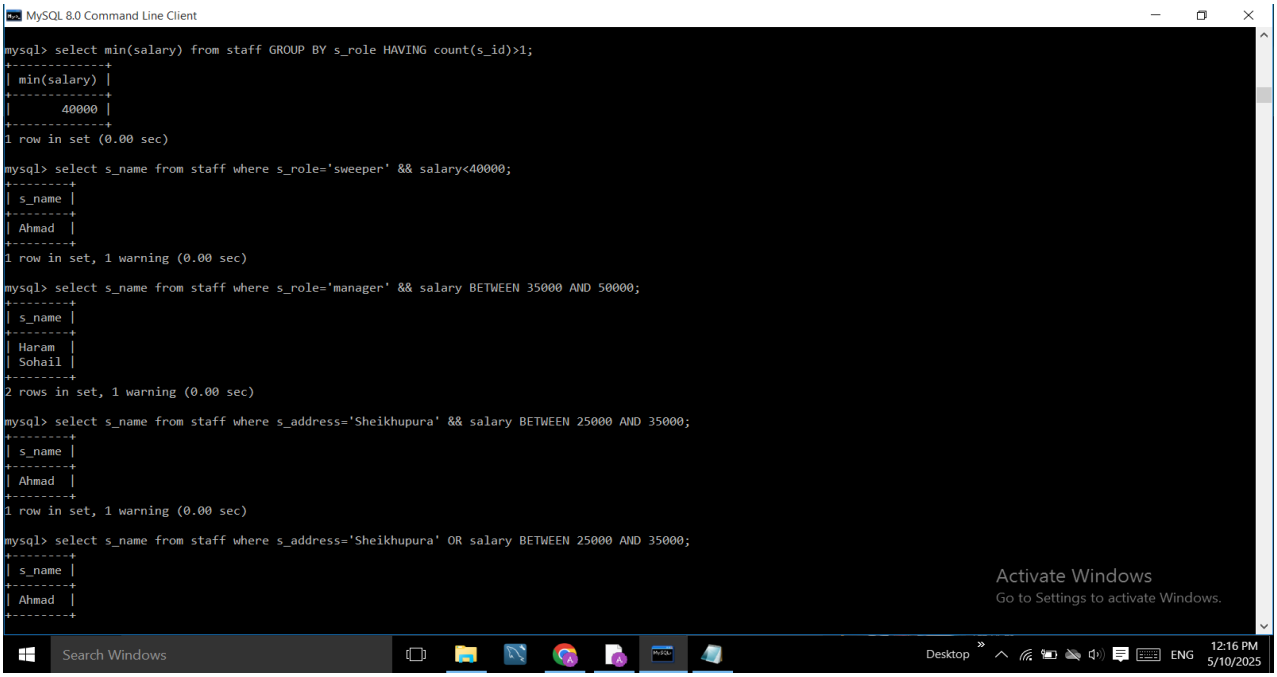
The **HAVING** clause is similar to the WHERE clause but is specifically applied after grouping and aggregation, allowing you to filter on the results of aggregate functions like COUNT, SUM, AVG, and others.

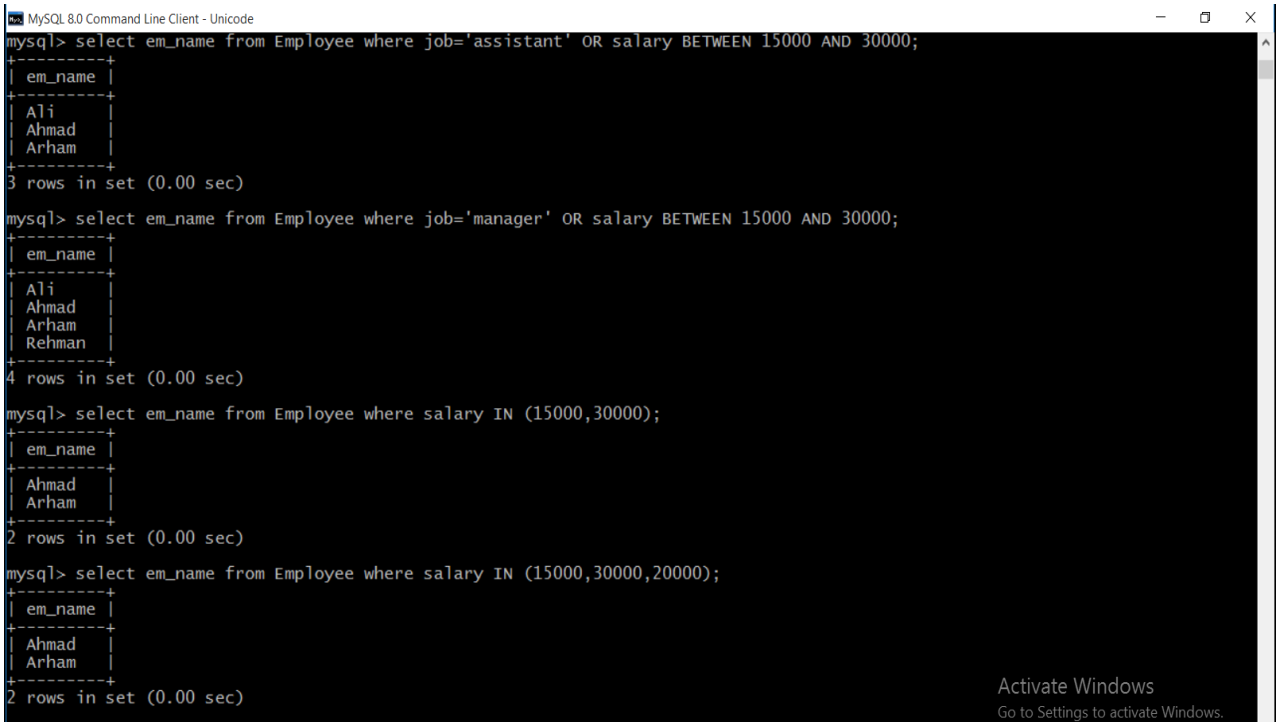
Syntax

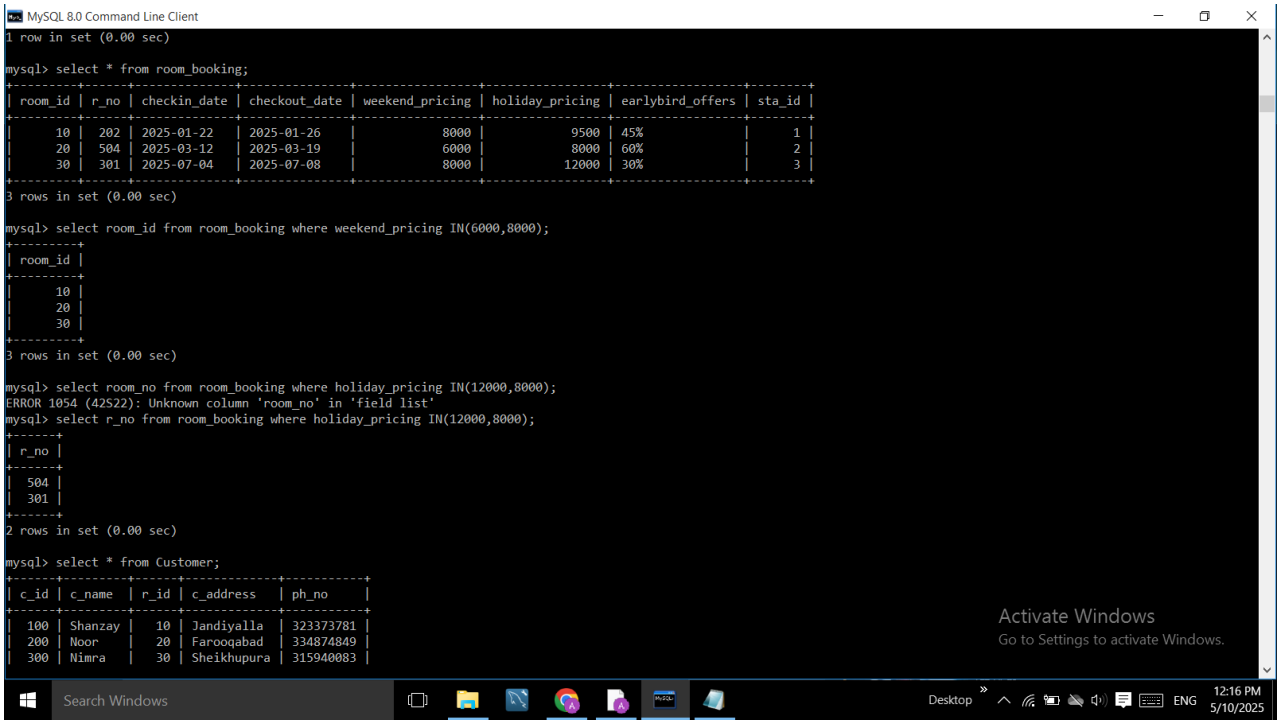
select aggreagate_function (attribute) from table GROUP BY attributes HAVING count (attribute) >1;

IN keyword is used to show the contents that contain given values.

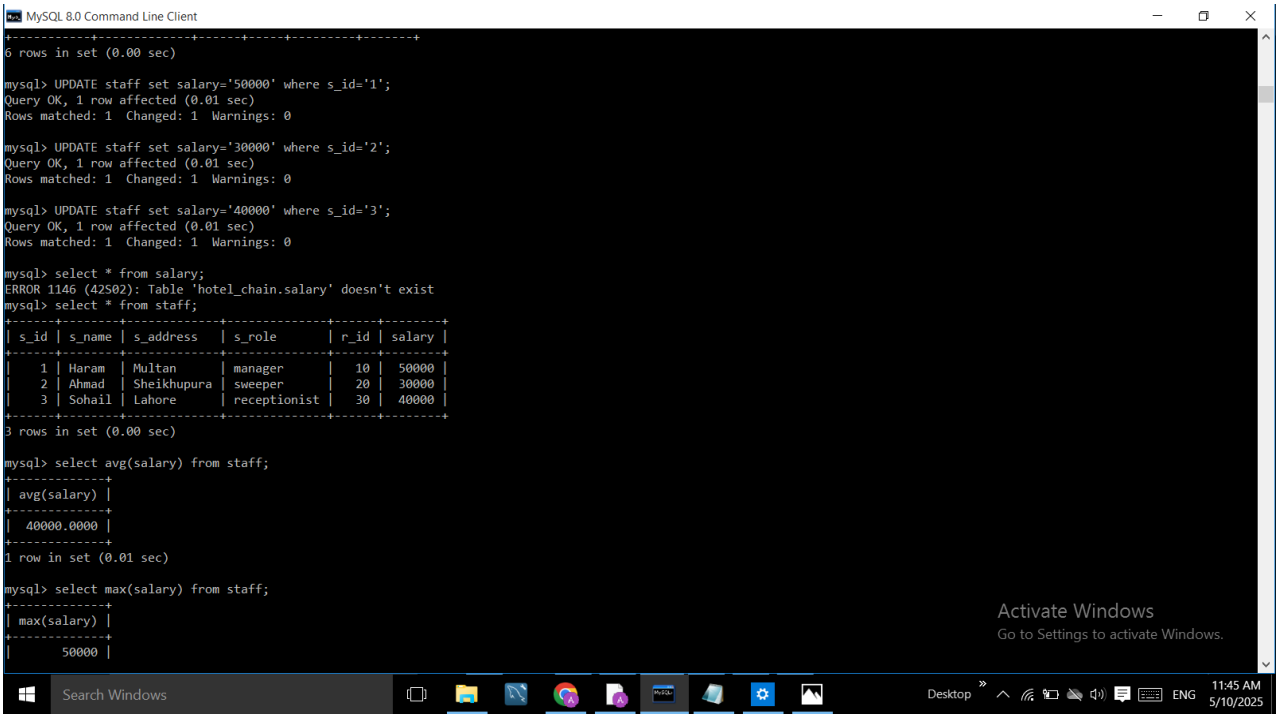
SELECT *column_name(s)* FROM *table_name*
WHERE *column_name* IN (*value1*, *value2*, ...);


MySQL 8.0 Command Line Client
mysql> select min(salary) from staff GROUP BY s_role HAVING count(s_id)>1;
+-------------+
| min(salary) |
+-------------+
| 40000 |
+-------------+
1 row in set (0.00 sec)
mysql> select s_name from staff where s_role='sweeper' && salary<40000;
+--------+
| s_name |
+--------+
| Ahmad |
+--------+
1 row in set, 1 warning (0.00 sec)
mysql> select s_name from staff where s_role='manager' && salary BETWEEN 35000 AND 50000;
+--------+
| s_name |
+--------+
| Haram |
| Sohail |
+--------+
2 rows in set, 1 warning (0.00 sec)
mysql> select s_name from staff where s_address='Sheikhupura' && salary BETWEEN 25000 AND 35000;
+--------+
| s_name |
+--------+
| Ahmad |
+--------+
1 row in set, 1 warning (0.00 sec)
mysql> select s_name from staff where s_address='Sheikhupura' OR salary BETWEEN 25000 AND 35000;
+--------+
| s_name |
+--------+
| Ahmad |
+--------+
Activate Windows
Go to Settings to activate Windows.
Search Windows
Desktop
ENG
12:16 PM
5/10/2025


MySQL 8.0 Command Line Client - Unicode
mysql> select em_name from Employee where job='assistant' OR salary BETWEEN 15000 AND 30000;
+---------+
| em_name |
+---------+
| Ali |
| Ahmad |
| Arham |
+---------+
3 rows in set (0.00 sec)
mysql> select em_name from Employee where job='manager' OR salary BETWEEN 15000 AND 30000;
+---------+
| em_name |
+---------+
| Ali |
| Ahmad |
| Arham |
| Rehman |
+---------+
4 rows in set (0.00 sec)
mysql> select em_name from Employee where salary IN (15000,30000);
+---------+
| em_name |
+---------+
| Ahmad |
| Arham |
+---------+
2 rows in set (0.00 sec)
mysql> select em_name from Employee where salary IN (15000,30000,20000);
+---------+
| em_name |
+---------+
| Ahmad |
| Arham |
+---------+
2 rows in set (0.00 sec)
Activate Windows
Go to Settings to activate Windows.



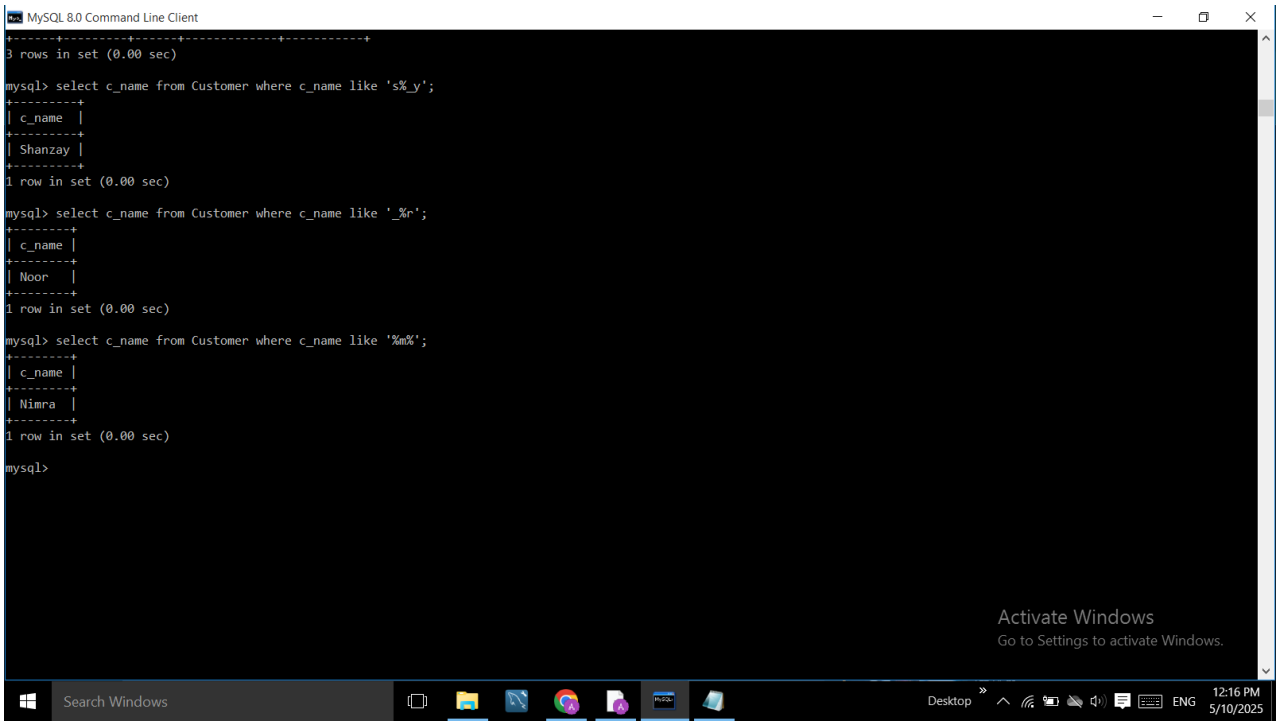
ARITHMETIC OPERATIONS ON STAFF



LIKE CLAUSE ON CUSTOMER

The LIKE operator is used in a WHERE clause to search for a specified pattern in a column.

Syntax

SELECT column1.. .FROM table_name
WHERE columnN LIKE pattern;

- The percent sign (%) represents zero, one, or multiple characters
- The underscore sign (_) represents one, single character