

**NAME: AYESHA HASSAN**

**ROLL NO: FA19-BSE-110**

**SECTION: BSE-7C**

**SUBJECT: DATA WAREHOUSING AND DATA MINING**

**MODERATOR: MAM MAMUNA FATIMA**

**DATE: October 2, 2022**

**LAB TASK 01:**

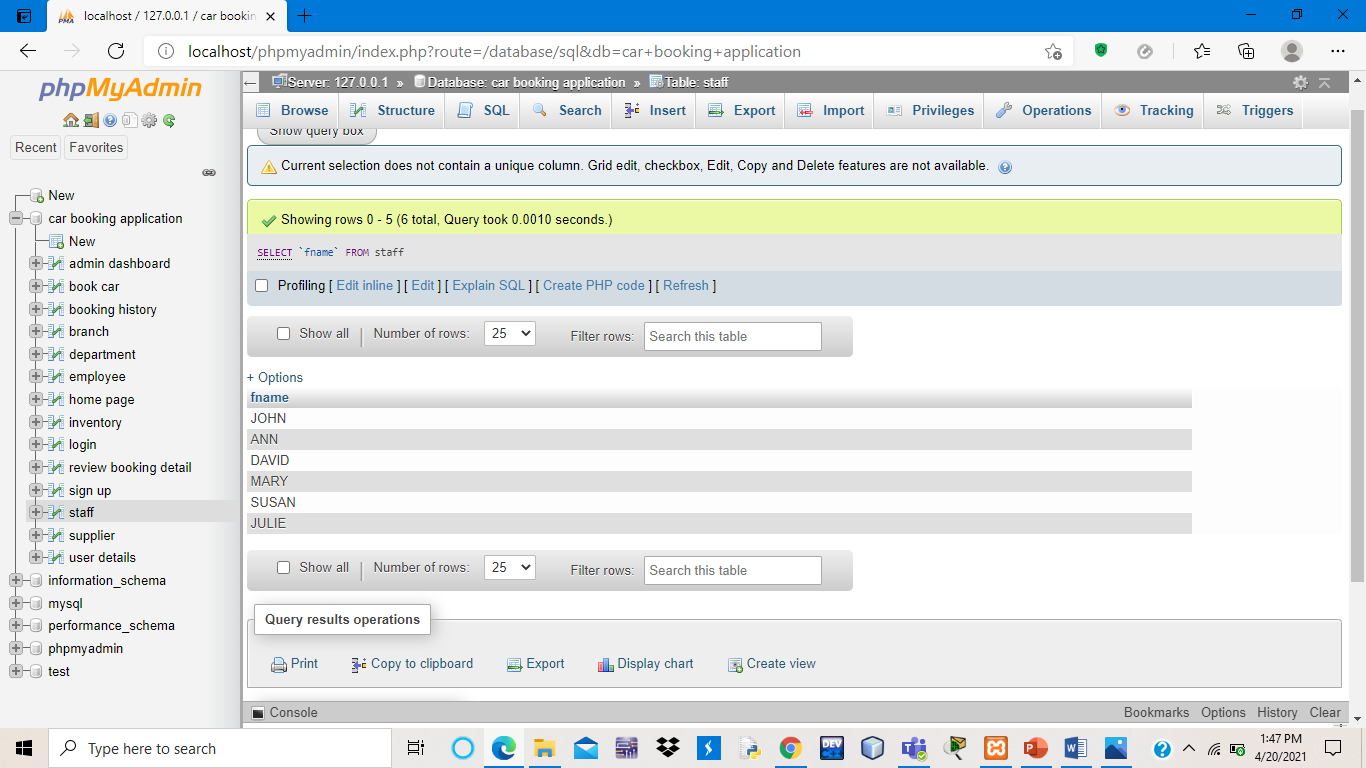
**QUESTION NO 01:**

**The purpose of this assignment is to understand following SQL queries syntax and the purpose. You have to make a database of your choice in SQL Server or any other DBMS and run the following SQL queries on it. The output of this assignment is a document containing the SQL queries plus the screen shots of the output tables.**

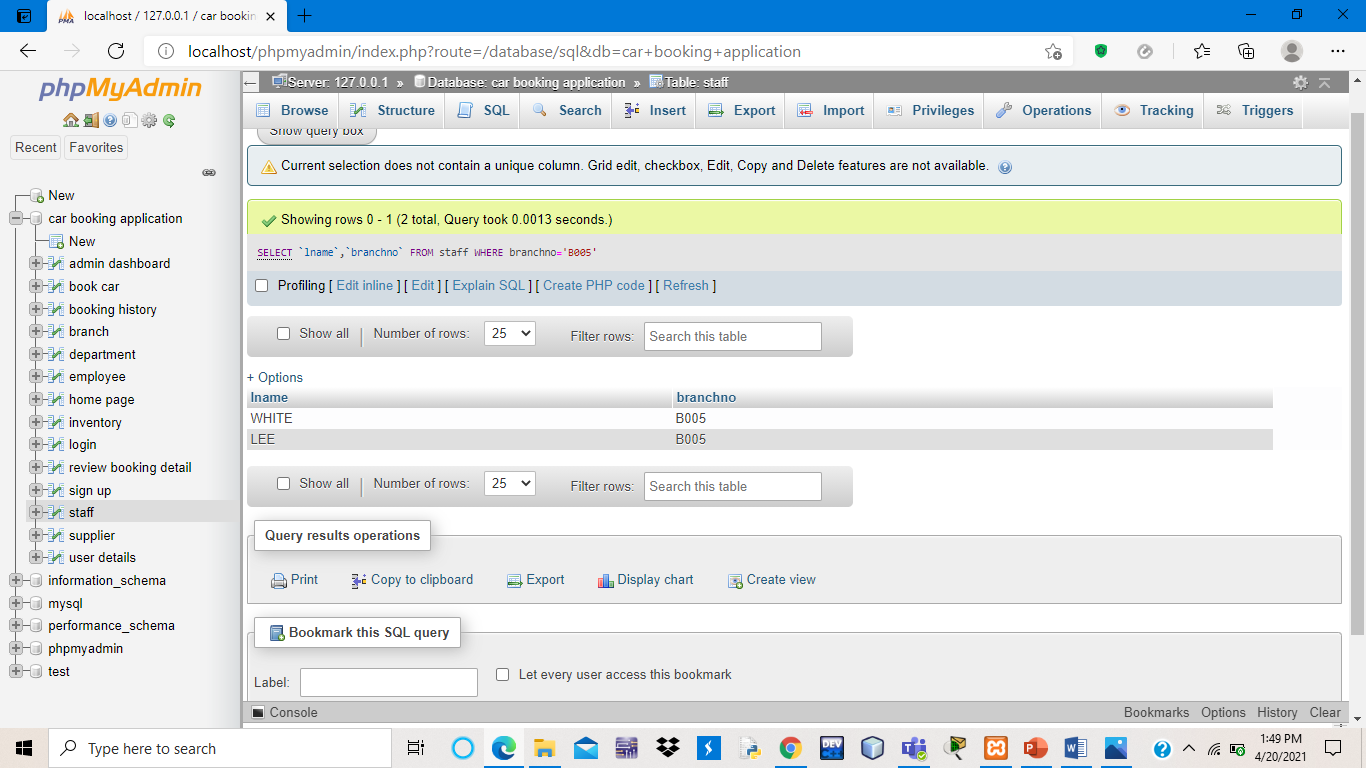
**Additional points will be given to those groups who will make GUI along with as well.**

Select

SELECT `fname` FROM staff

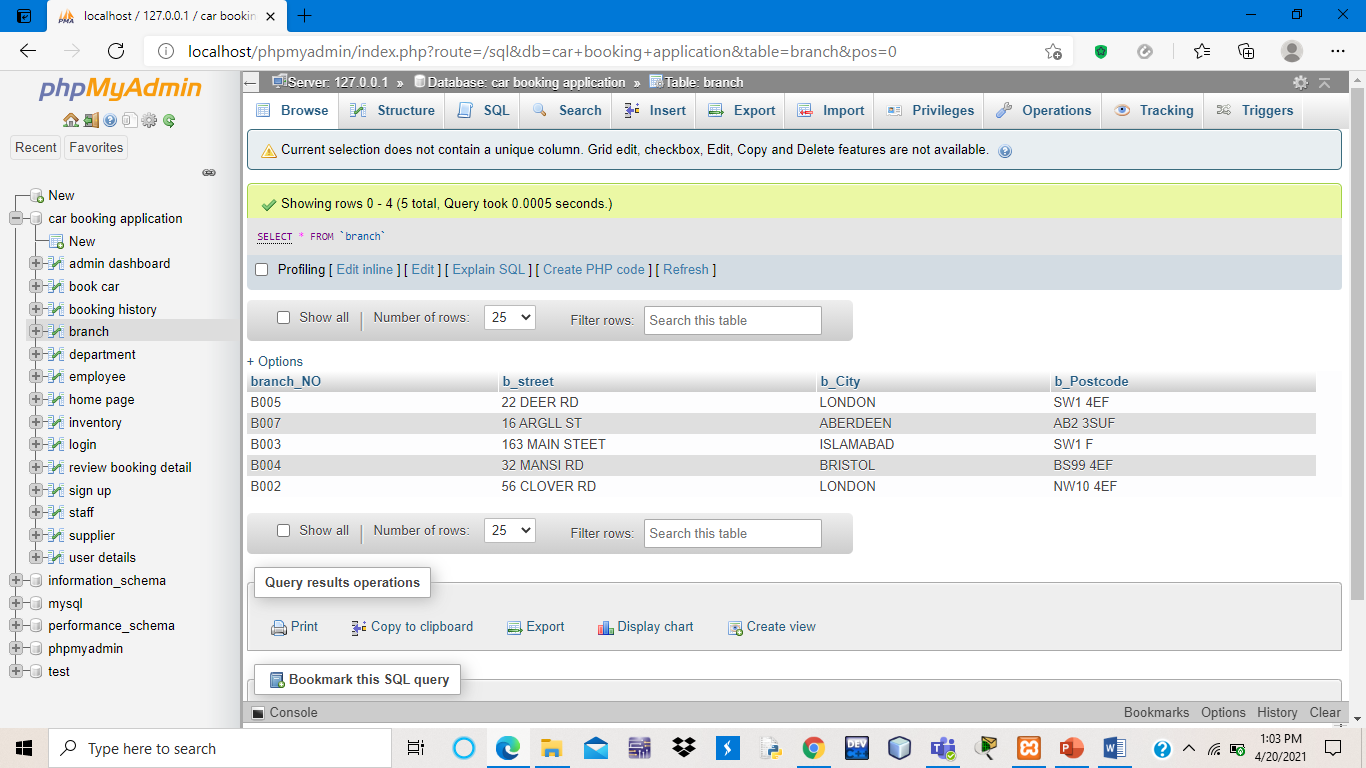


[SELECT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/select.html) `lname`,`branchno` FROM staff WHERE branchno='B005'

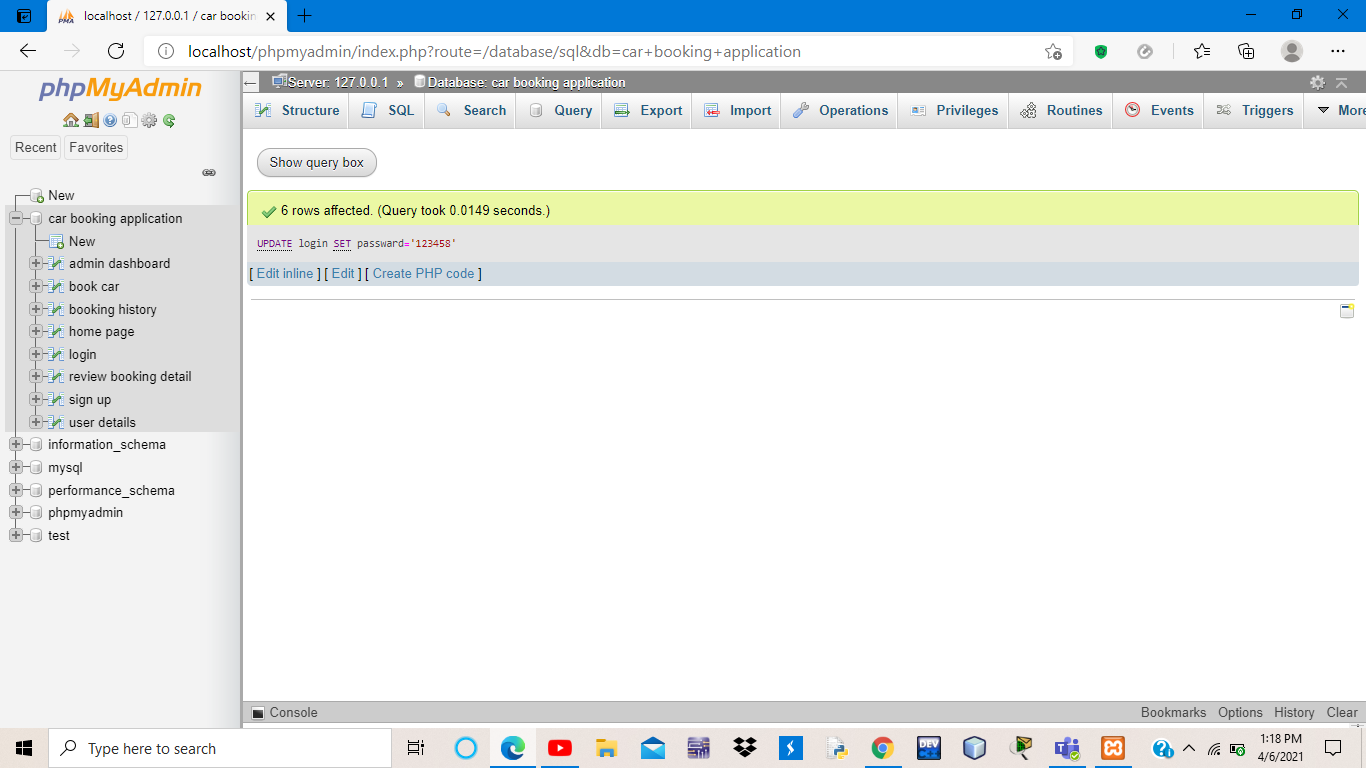


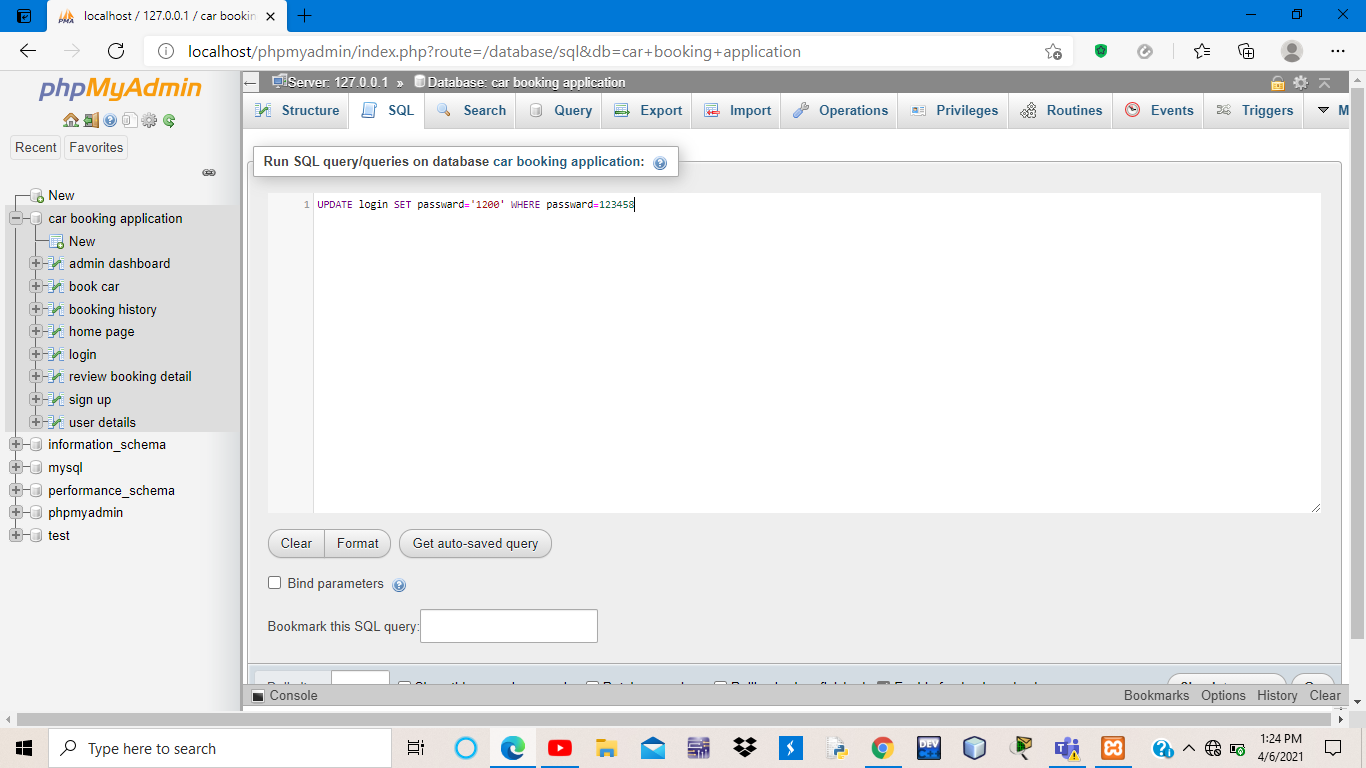
Insert

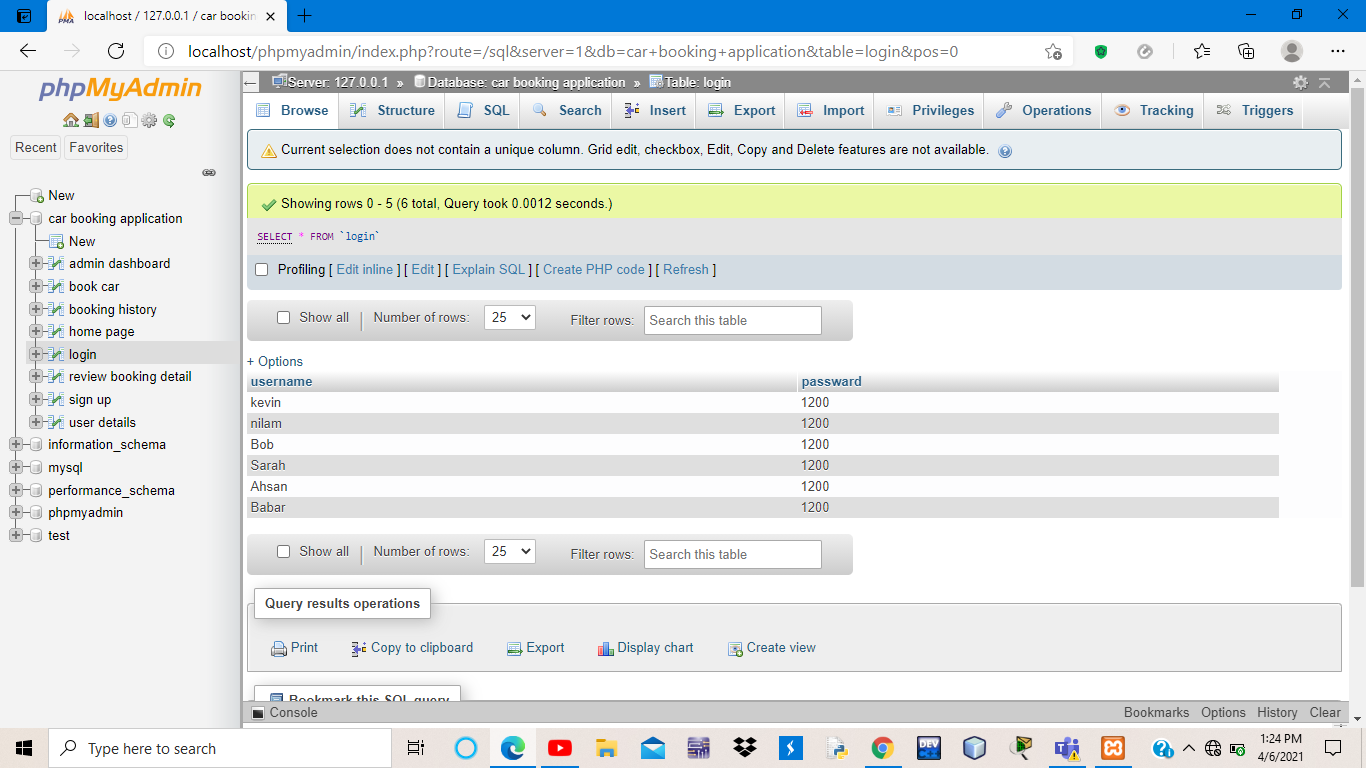
[INSERT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/insert.html) INTO branch (branch\_NO, b\_street,b\_City,b\_Postcode) [VALUES](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/miscellaneous-functions.html#function_values) ('B005','22 DEER RD','LONDON','SW1 4EF'), ('B007','16 ARGLL ST','ABERDEEN','AB2 3SUF'), ('B003','163 MAIN STEET','ISLAMABAD','SW1 F'), ('B004','32 MANSI RD','BRISTOL','BS99 4EF'), ('B002','56 CLOVER RD','LONDON','NW10 4EF')



Update

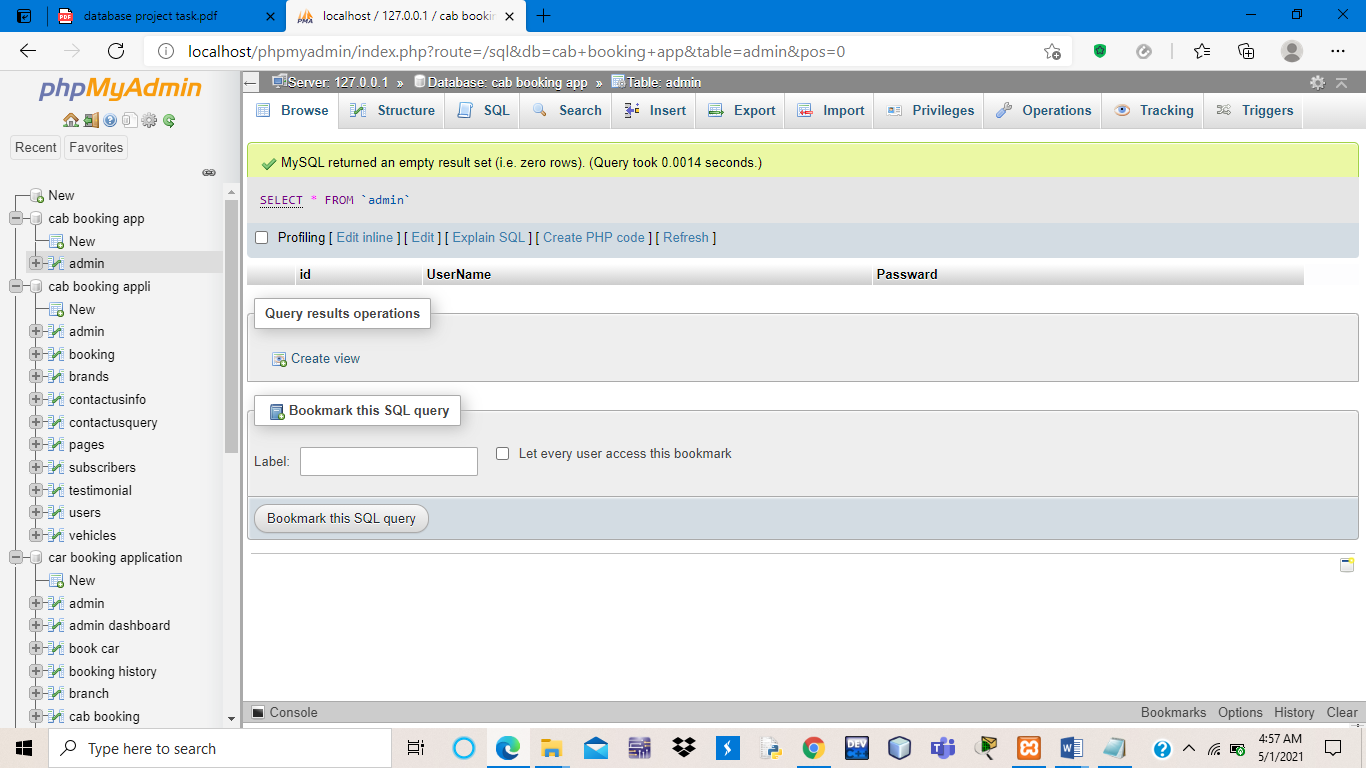






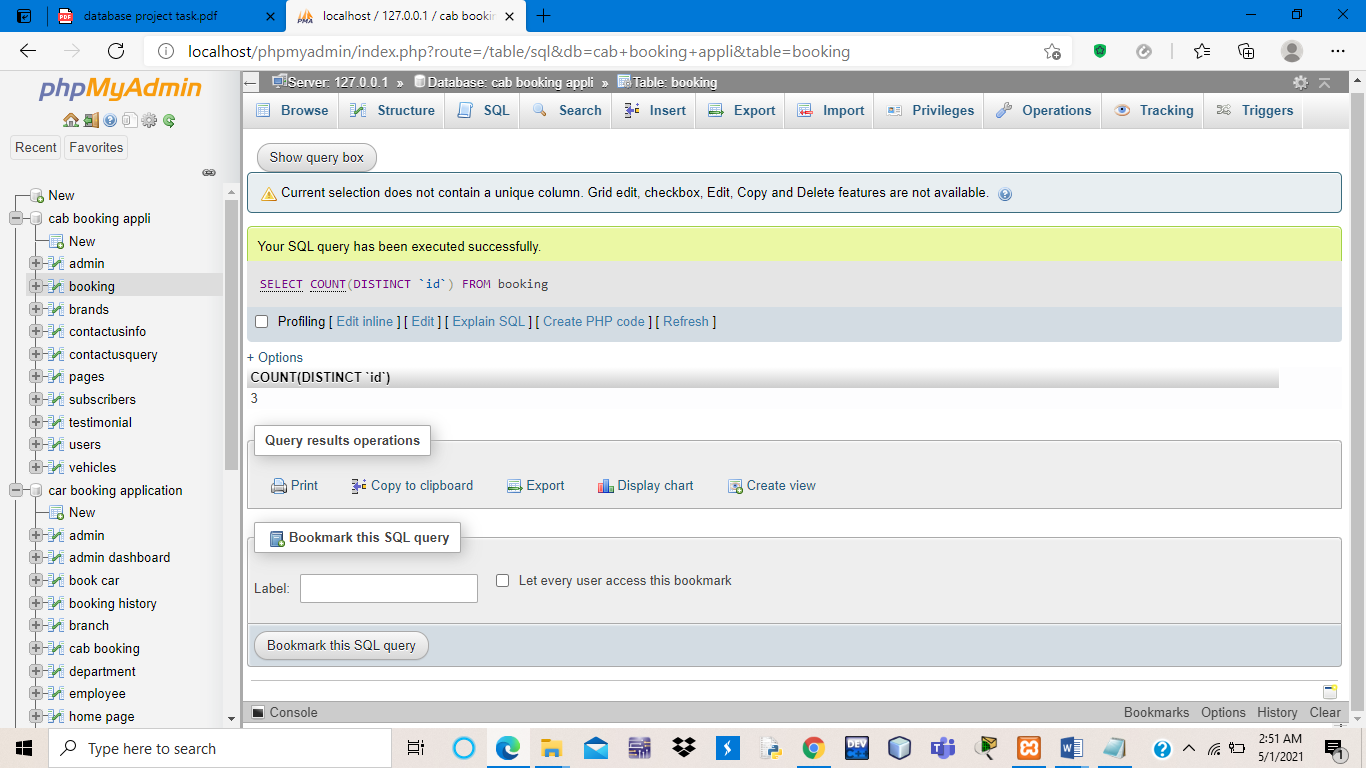
Delete

[ALTER](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/alter-table.html) [TABLE](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/alter-table.html) admin DROP COLUMN updationDate

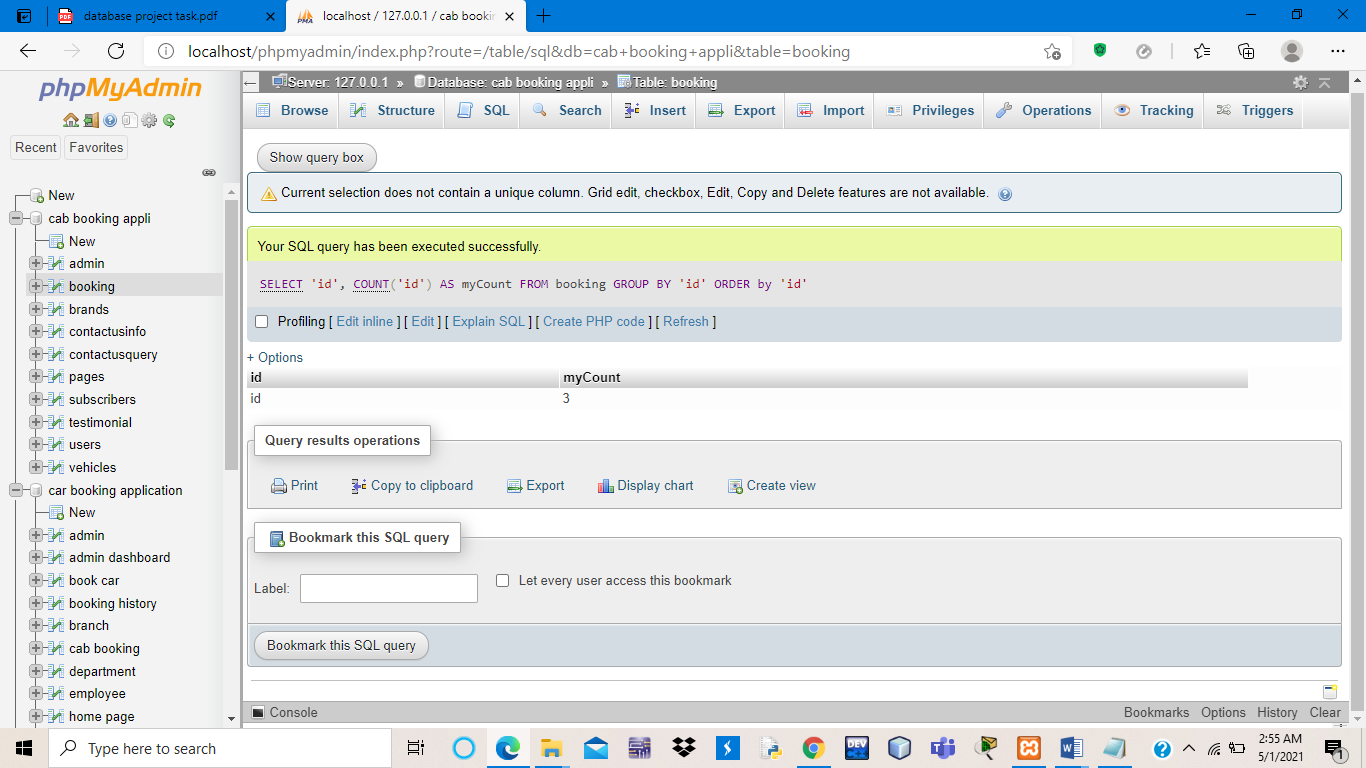


Distinct

[SELECT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/select.html) [COUNT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/group-by-functions.html#function_count)(DISTINCT `id`) FROM booking

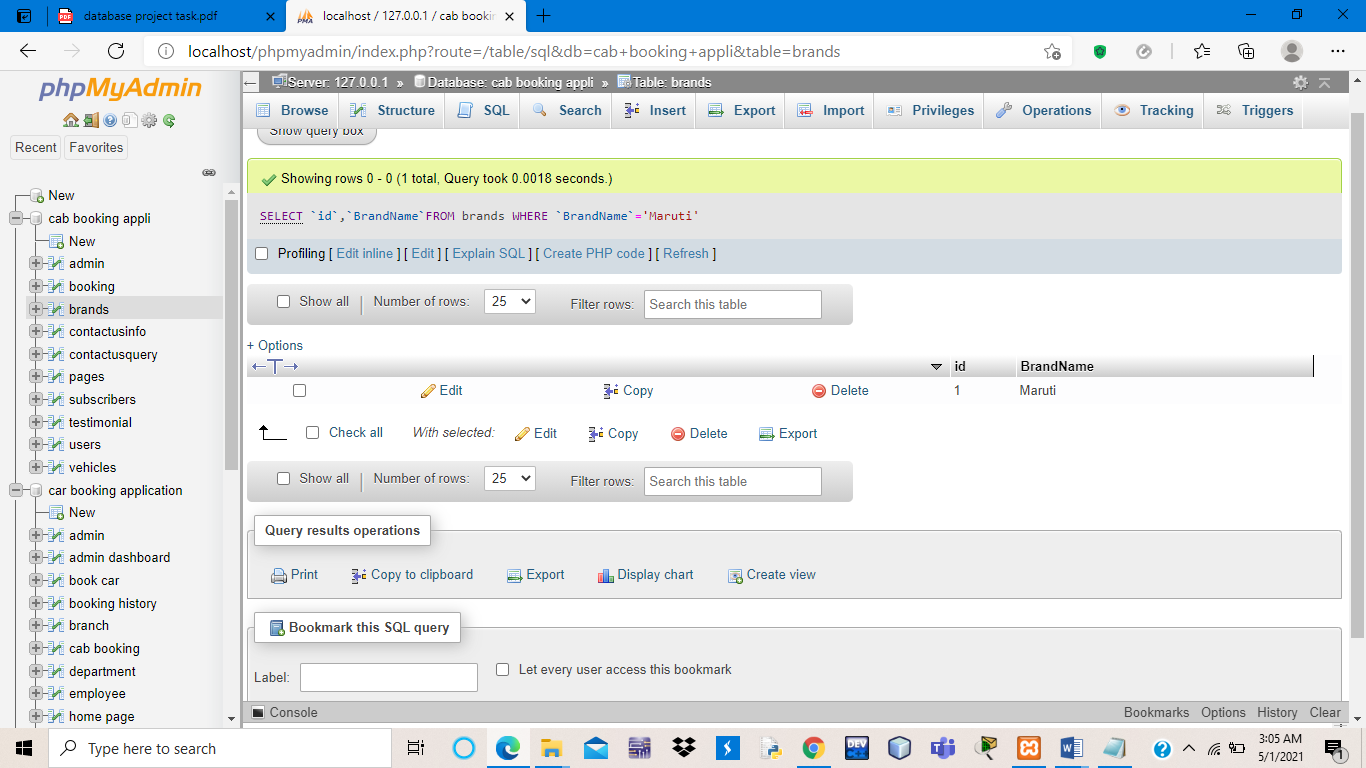


[SELECT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/select.html) 'id', [COUNT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/group-by-functions.html#function_count)('id') AS myCount FROM booking GROUP BY 'id' ORDER by 'id'



Where clause

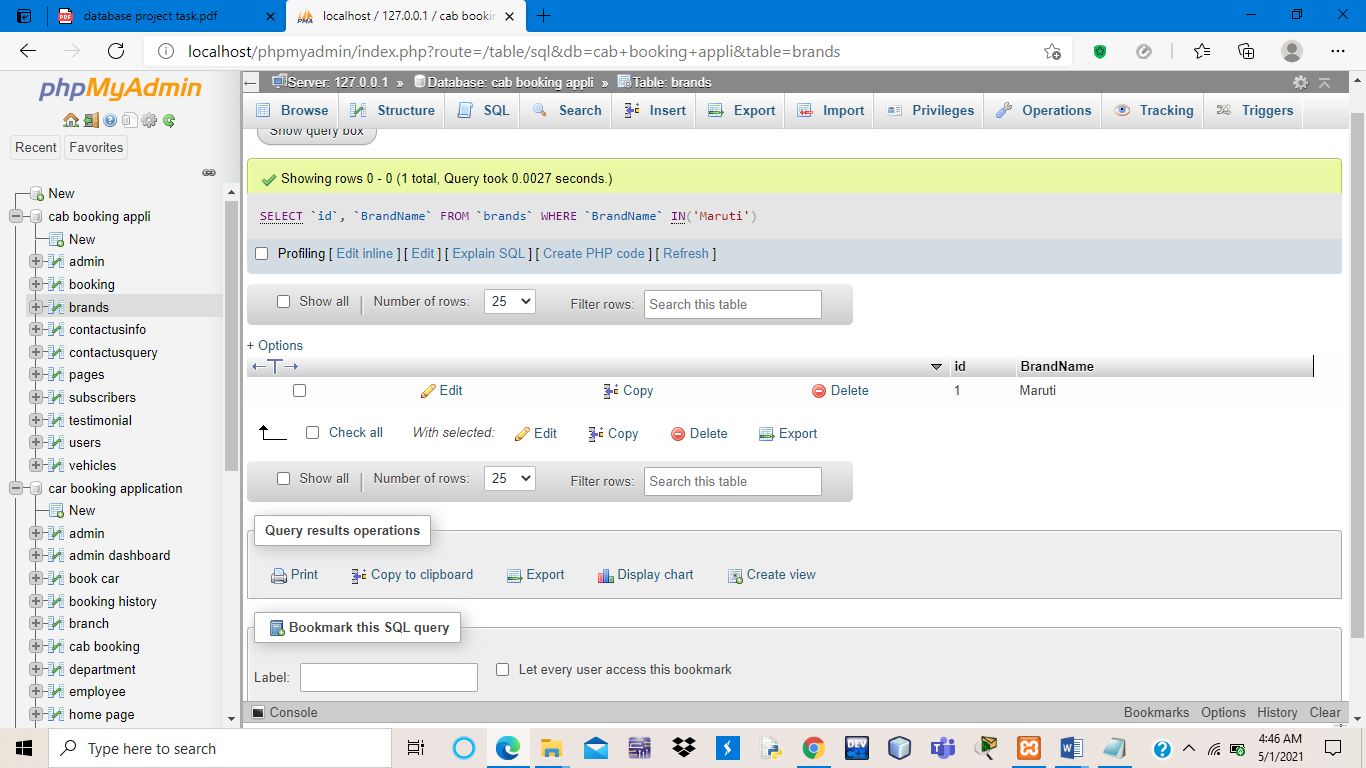
[SELECT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/select.html) `id`,`BrandName`FROM brands WHERE `BrandName`='Maruti'



AND/OR

IN

[SELECT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/select.html) `id`, `BrandName` FROM `brands` WHERE `BrandName` [IN](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/comparison-operators.html#function_in)('Maruti')



ALIAS

BETWEEN

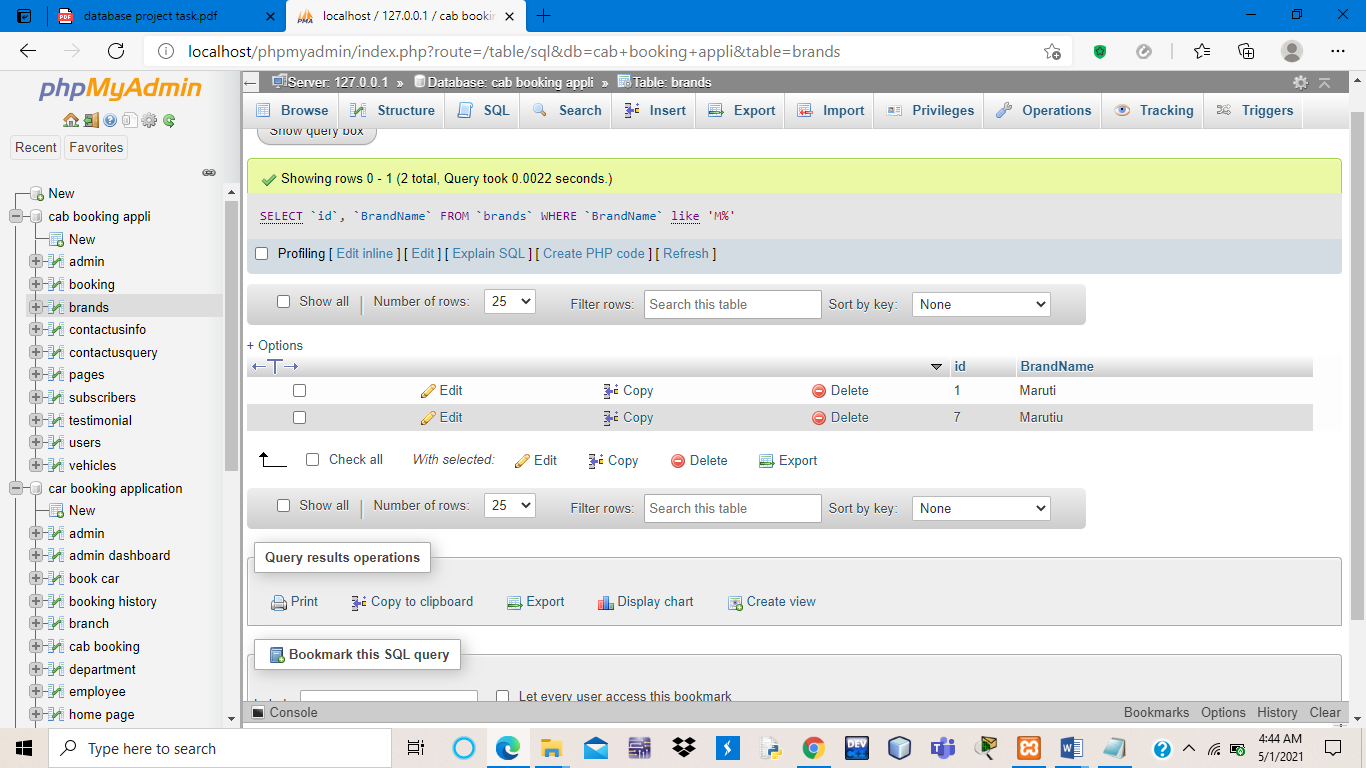
**BETWEEN**

[SELECT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/select.html) \* FROM `booking` WHERE `id` BETWEEN 2 [AND](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/logical-operators.html#operator_and) 4



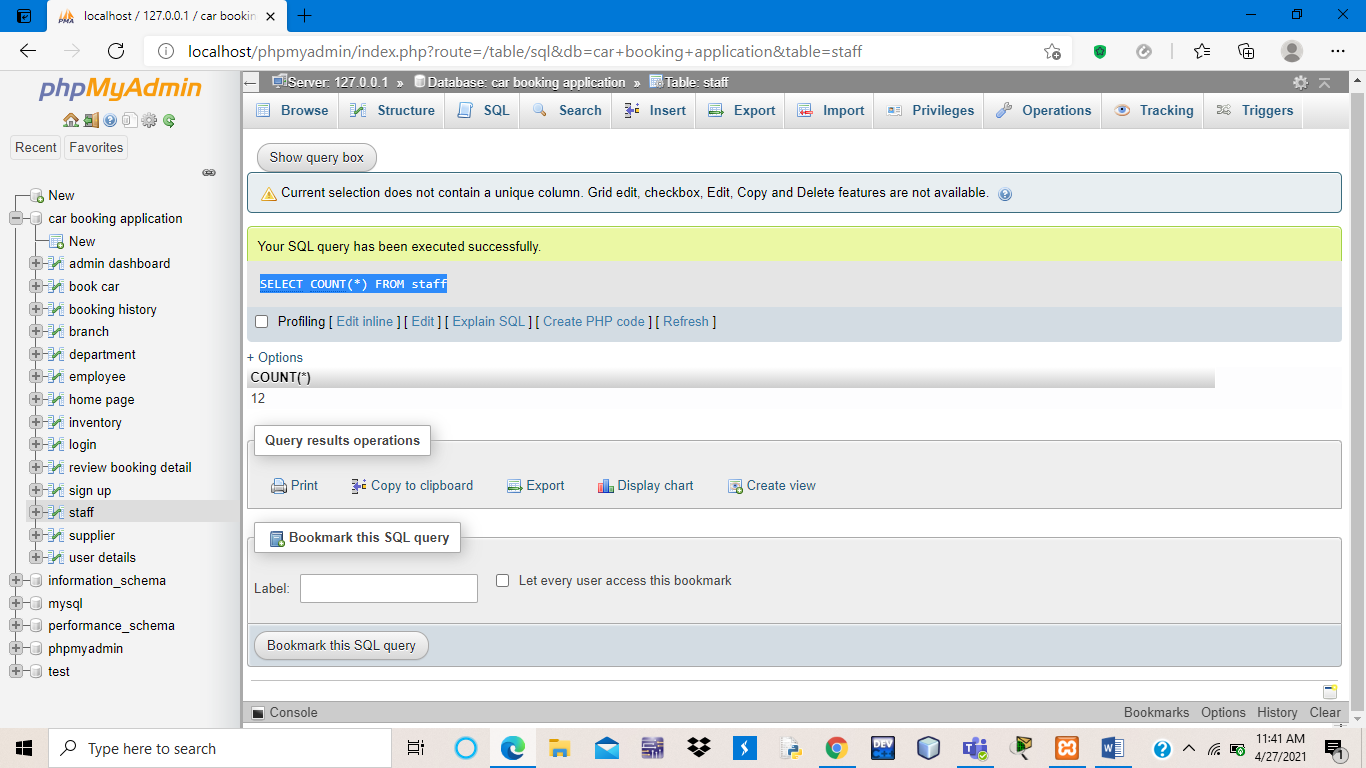
LIKE

[SELECT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/select.html) `id`, `BrandName` FROM `brands` WHERE `BrandName` [like](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/string-comparison-functions.html#operator_like) 'M%'

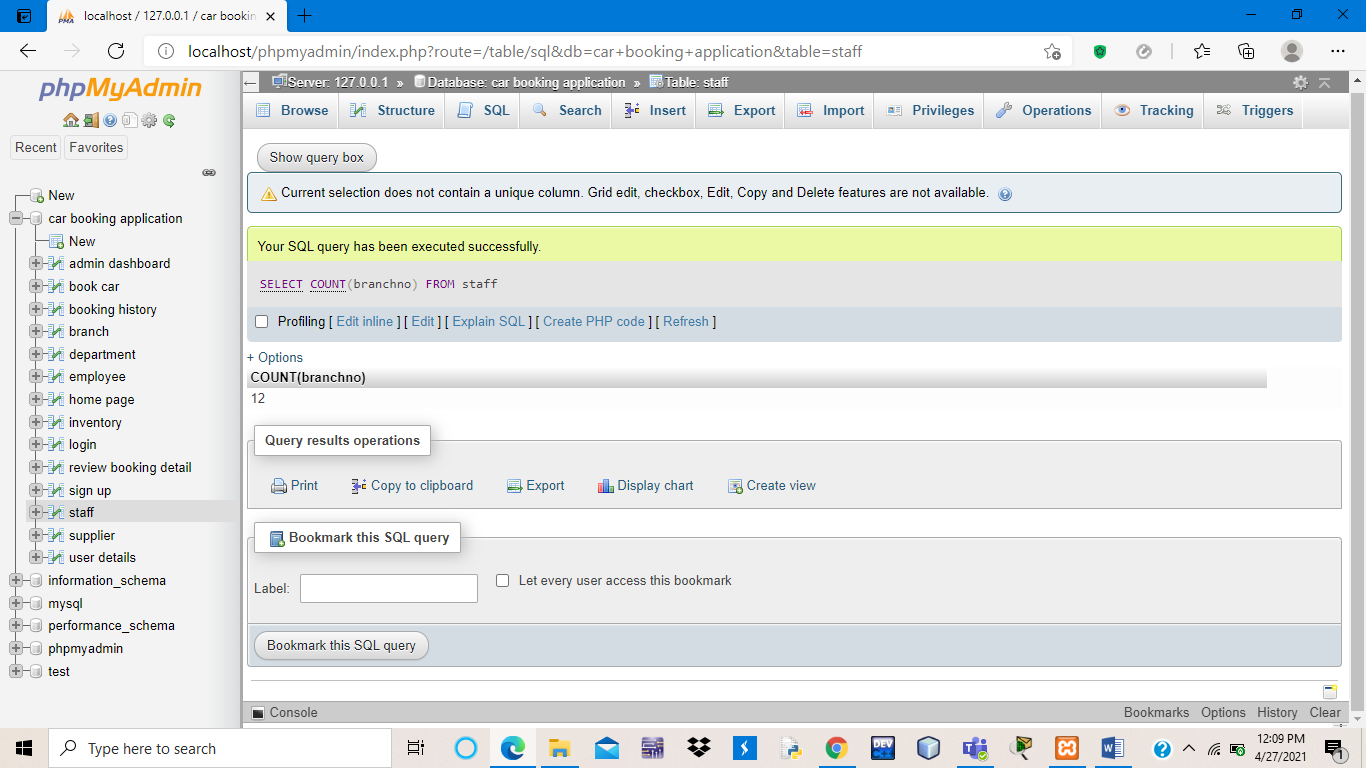


COUNT

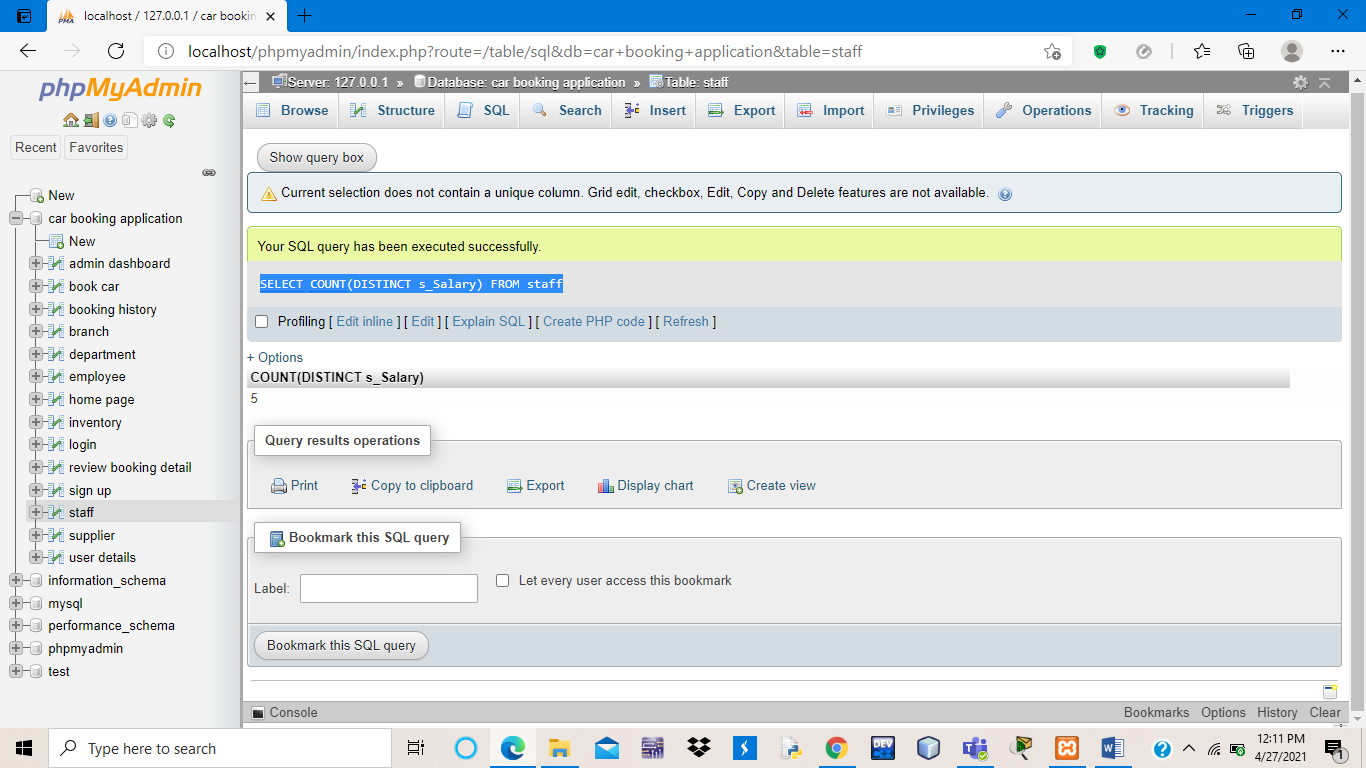
[SELECT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/select.html) [COUNT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/group-by-functions.html#function_count)(\*) FROM staff



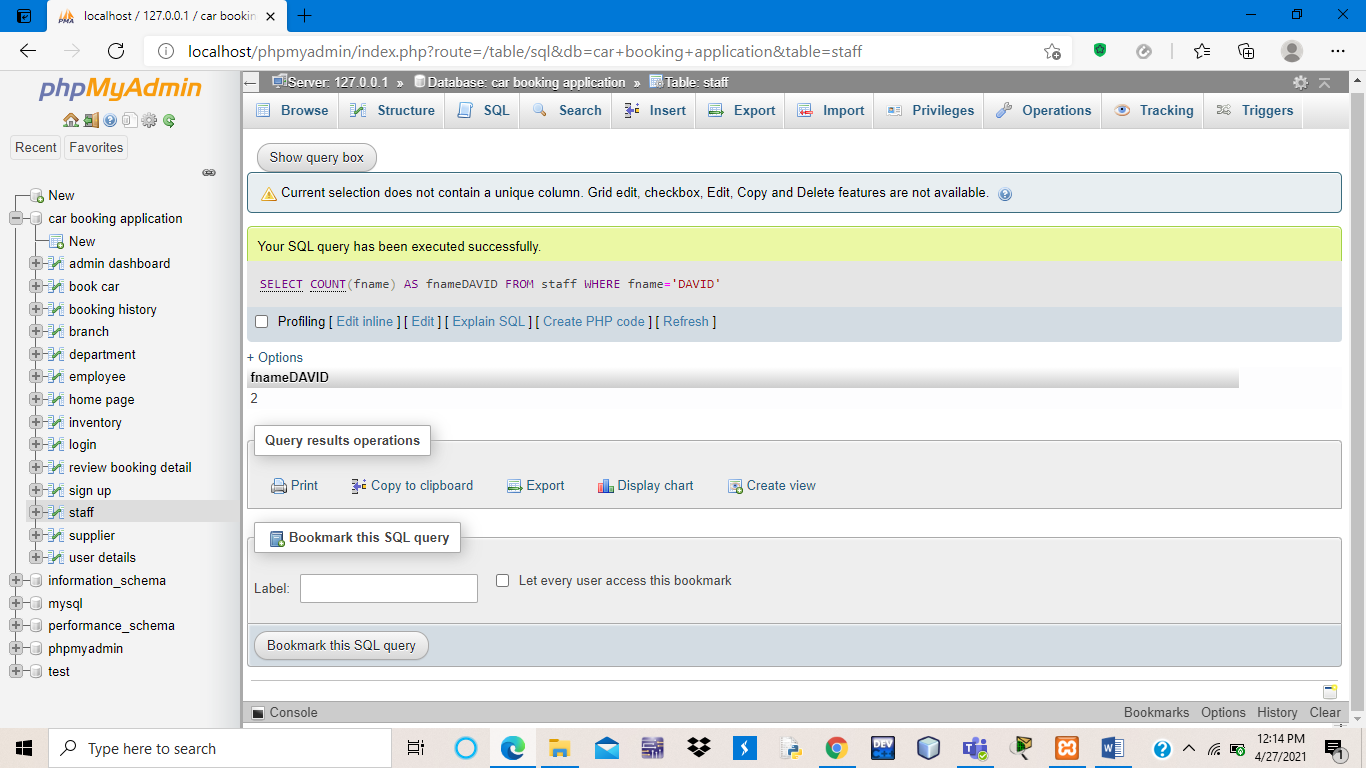
[SELECT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/select.html) [COUNT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/group-by-functions.html#function_count)(branchno) FROM staff



[SELECT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/select.html) [COUNT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/group-by-functions.html#function_count)(DISTINCT s\_Salary) FROM staff



[SELECT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/select.html) [COUNT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/group-by-functions.html#function_count)(fname) AS fnameDAVID FROM staff WHERE fname='DAVID



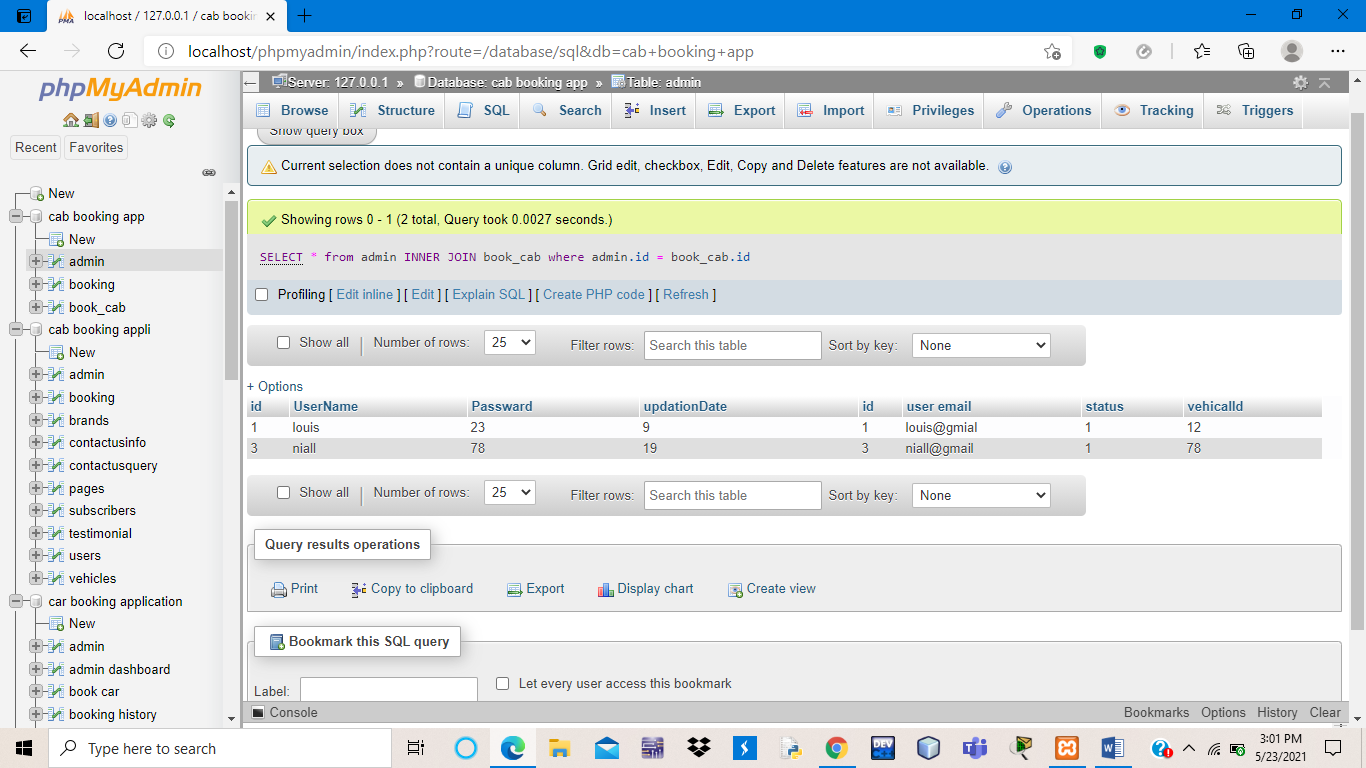
ORDER BY

GROUP BY

HAVING

INNER JOIN

[SELECT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/select.html) \* from admin INNER JOIN book\_cab where admin.id = book\_cab.id

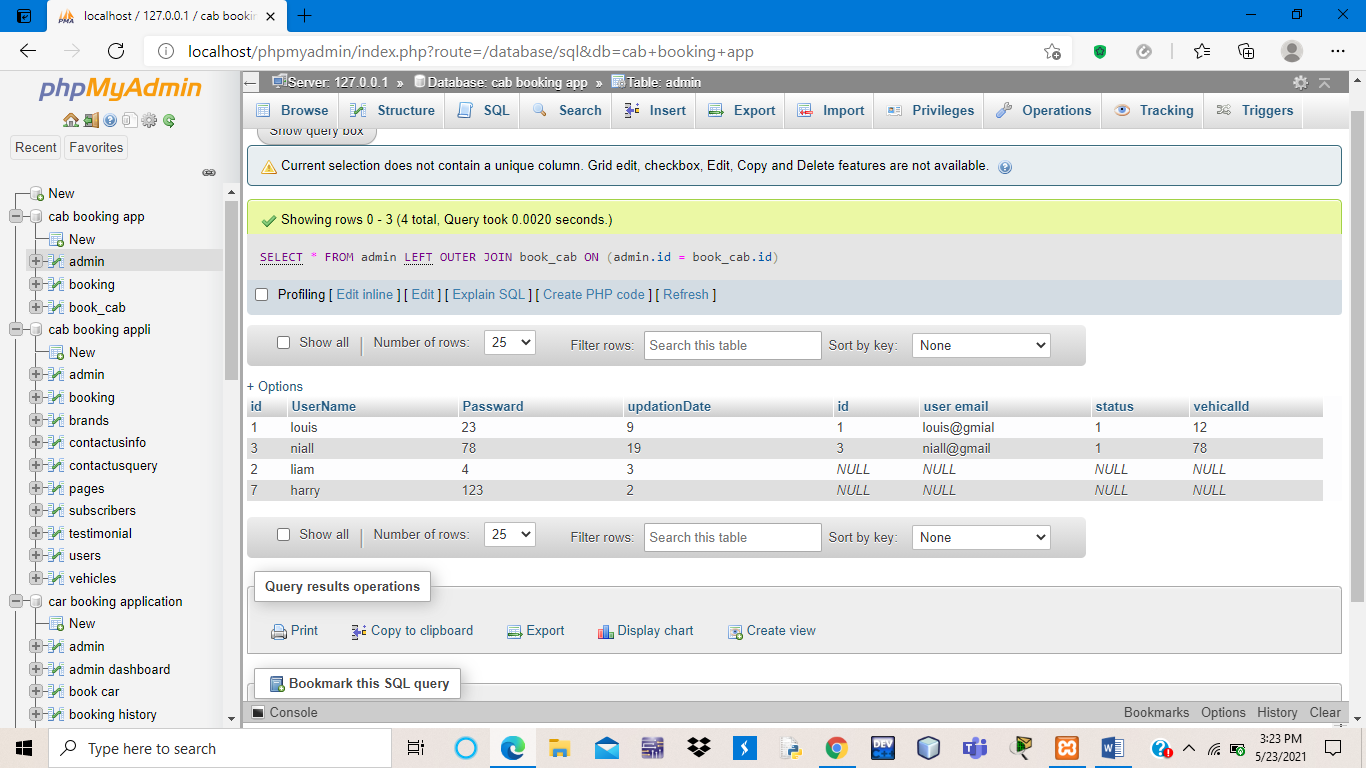


FULL JOIN

SELF JOIN

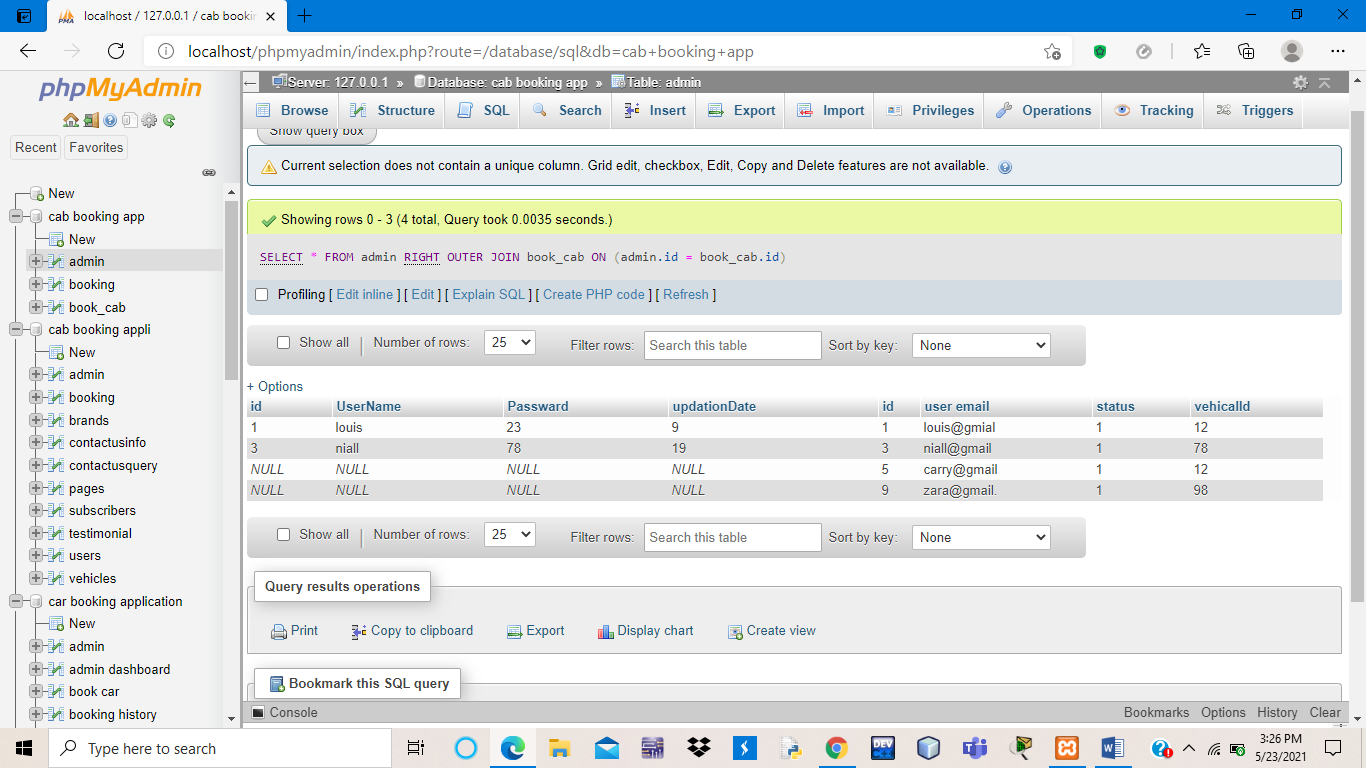
**4-Left Outer Join:**

[SELECT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/select.html) \* FROM admin [LEFT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/string-functions.html#function_left) OUTER JOIN book\_cab ON (admin.id = book\_cab.id)



Right Outer Join:

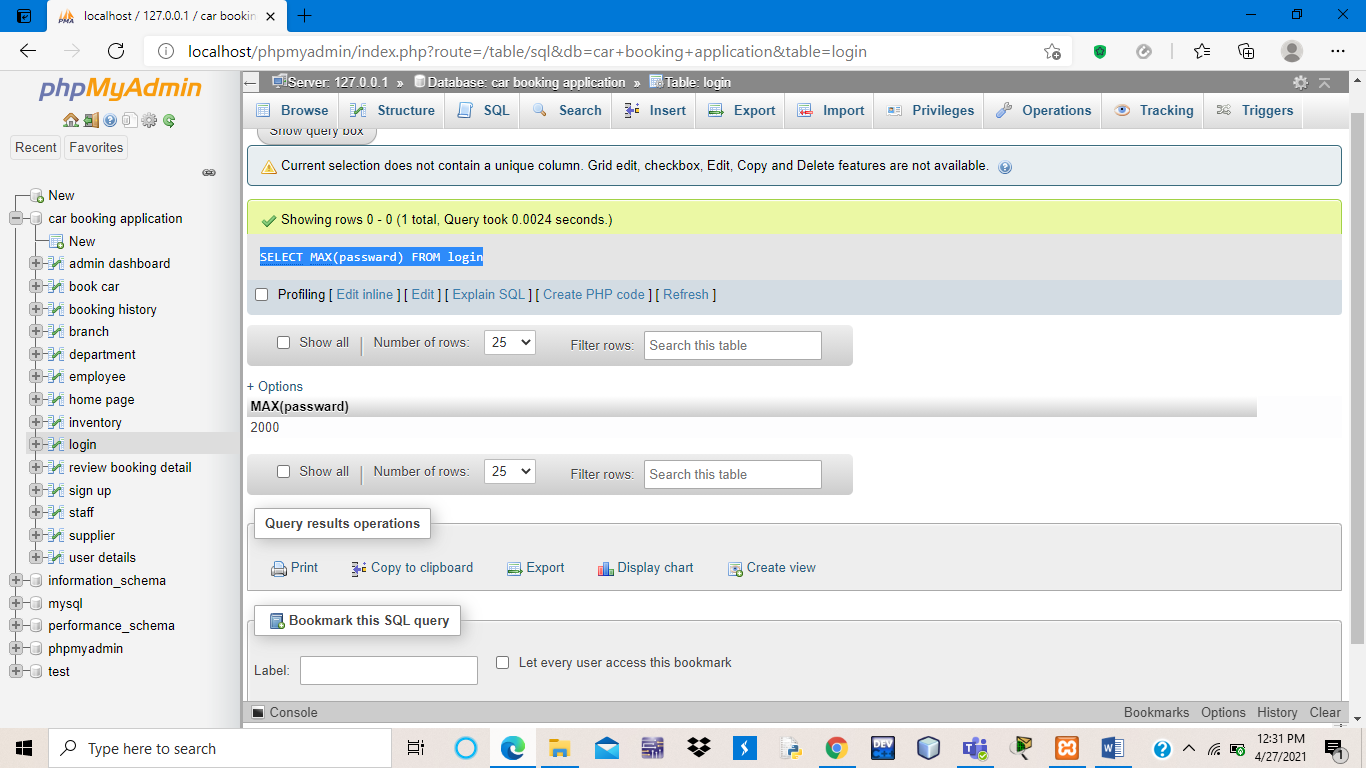
[SELECT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/select.html) \* FROM admin [RIGHT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/string-functions.html#function_right) OUTER JOIN book\_cab ON (admin.id = book\_cab.id)



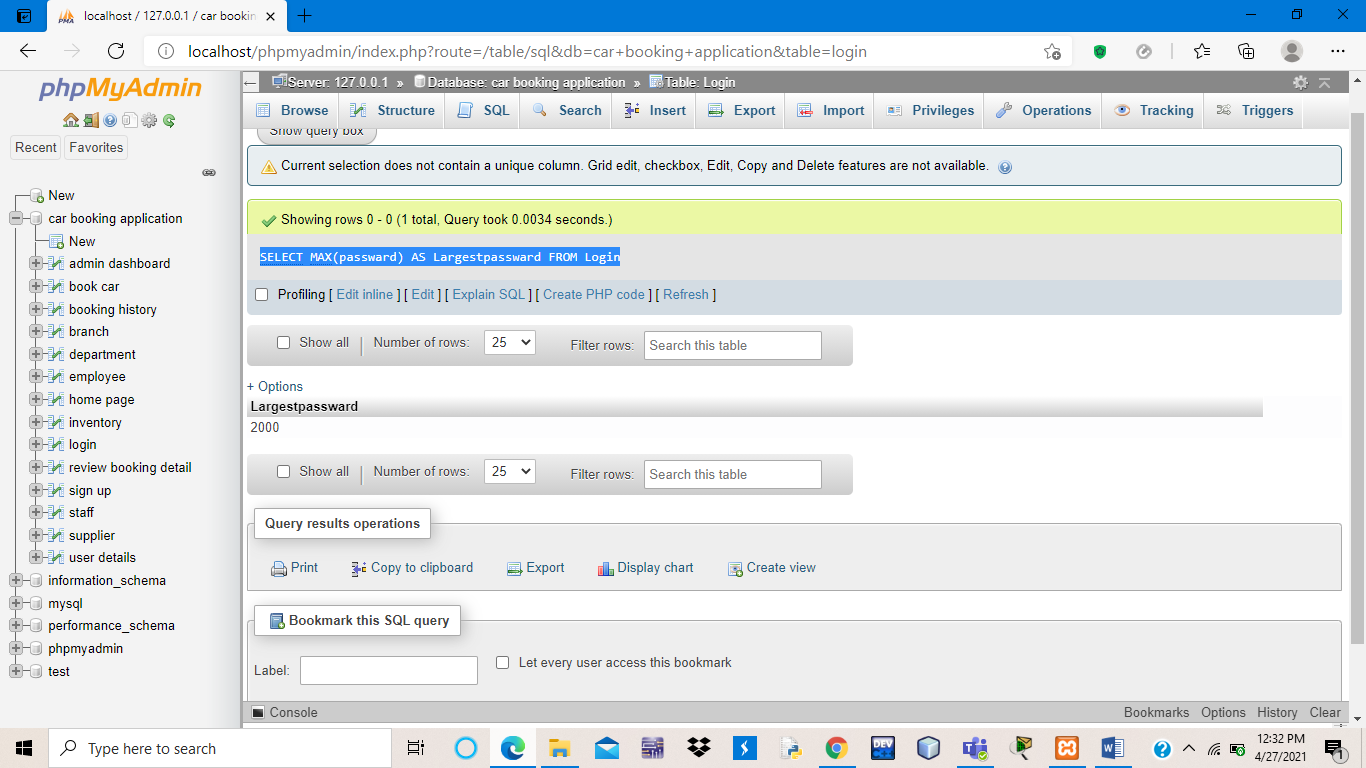
CREATE VIEW

MAX,MIN

[SELECT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/select.html) [MAX](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/group-by-functions.html#function_max)(passward) FROM login

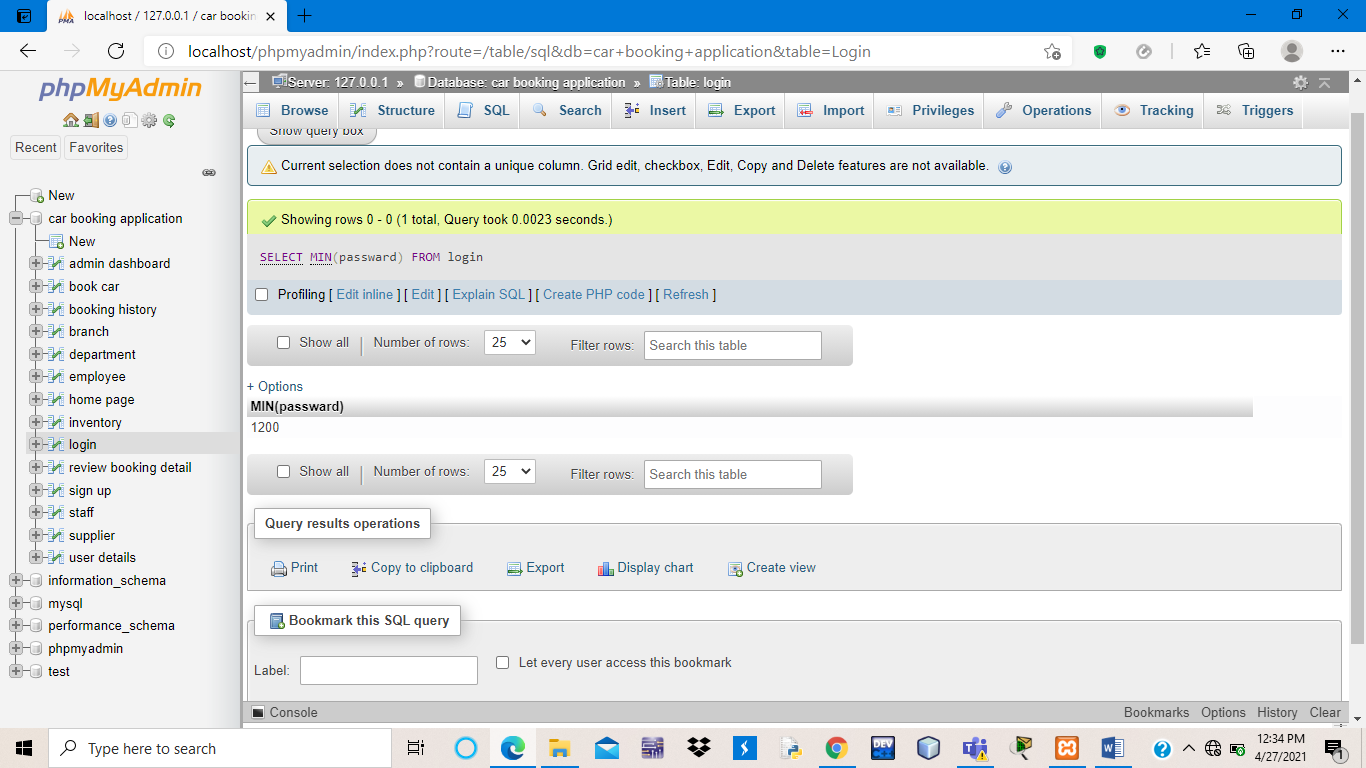


[SELECT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/select.html) [MAX](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/group-by-functions.html#function_max)(passward) AS Largestpassward FROM Login

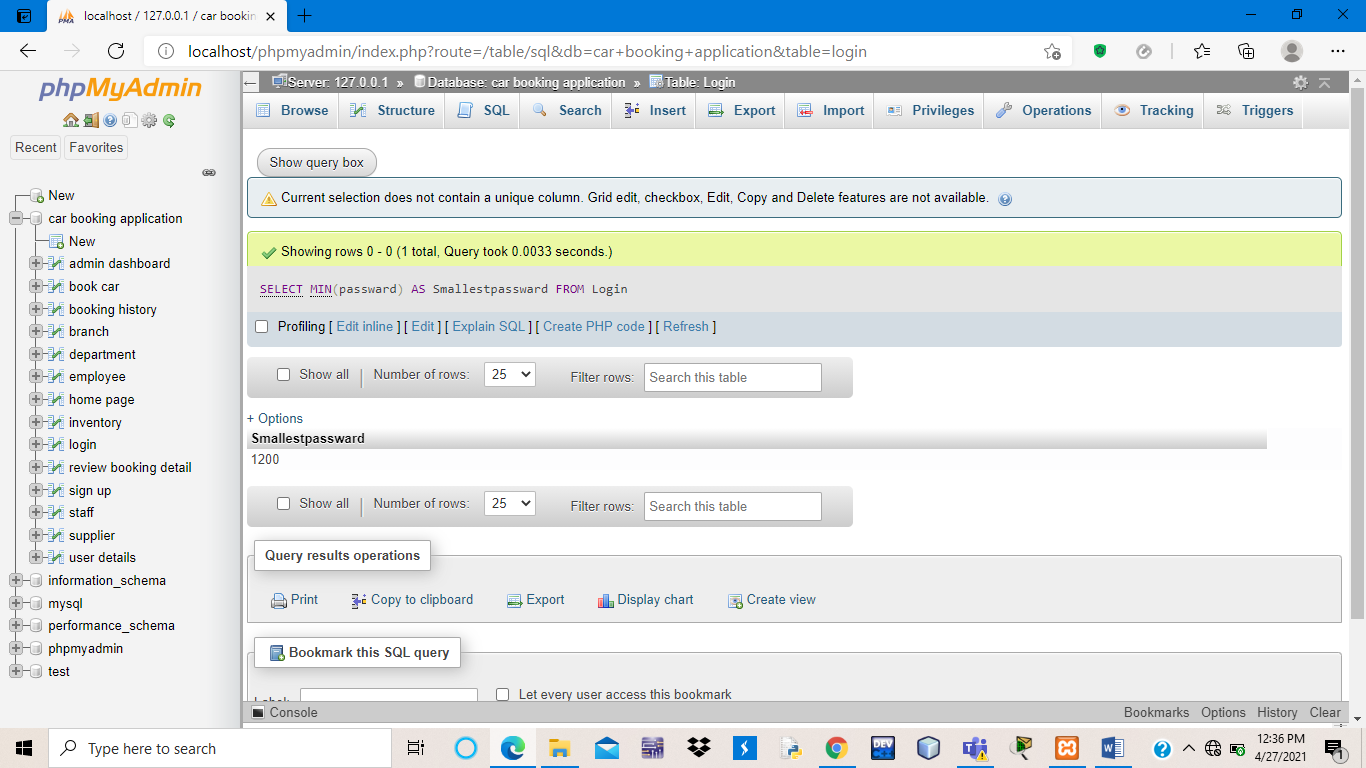


6-SQL MIN() Function

[SELECT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/select.html) [MIN](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/group-by-functions.html#function_min)(passward) FROM login

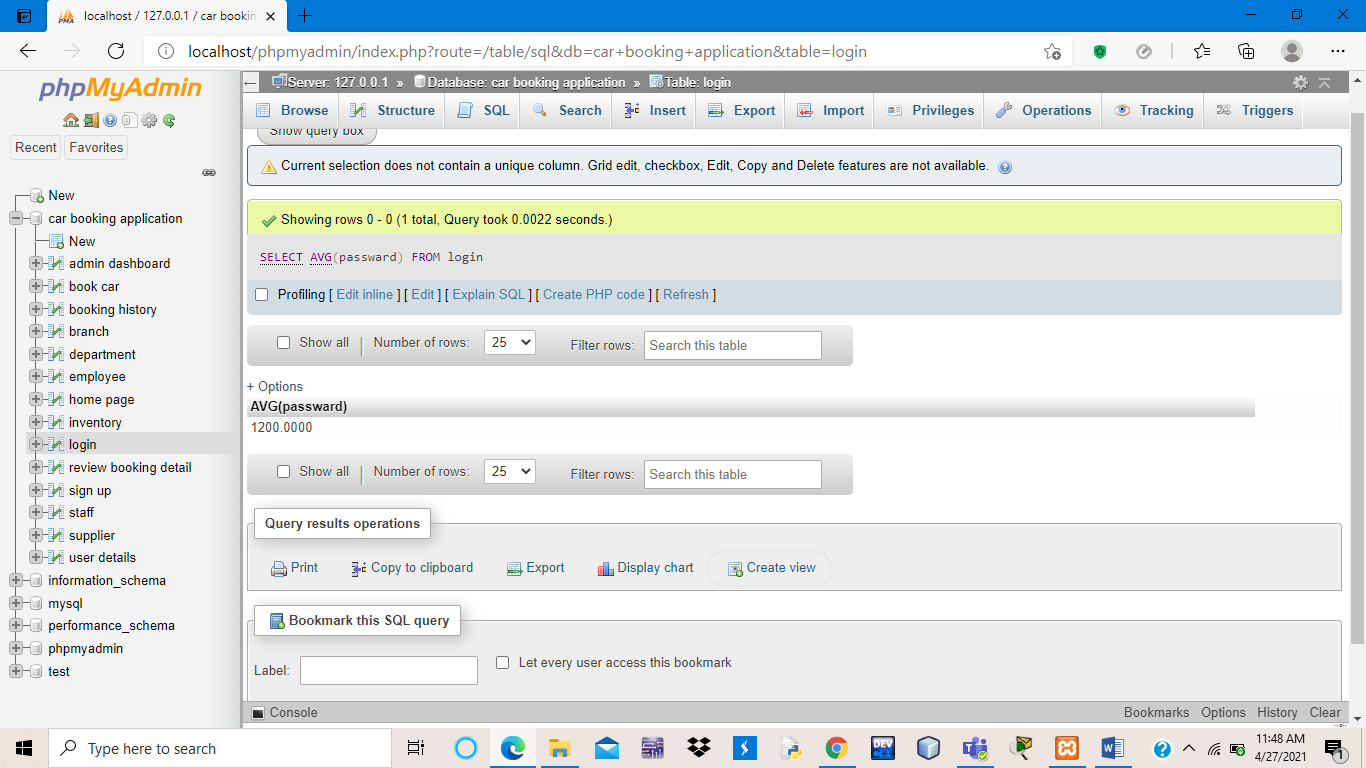


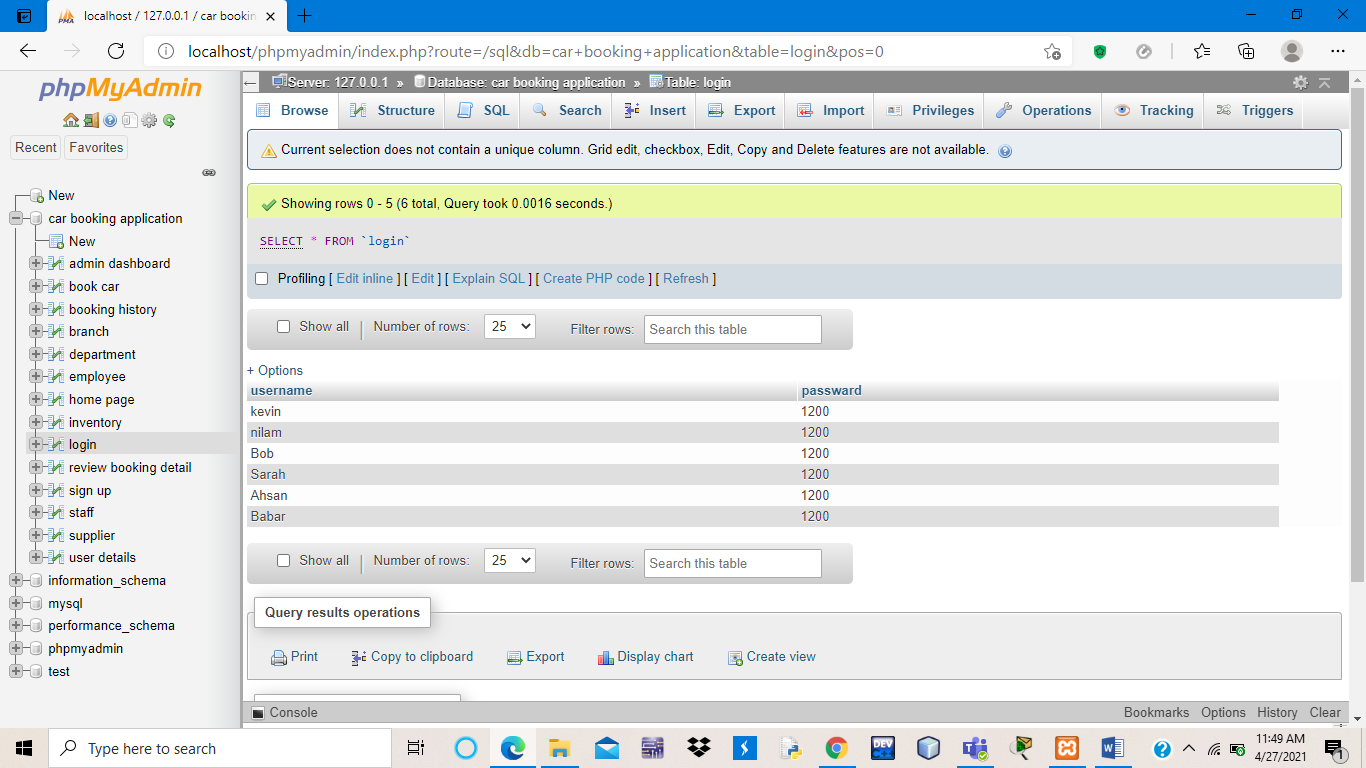
[SELECT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/select.html) [MIN](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/group-by-functions.html#function_min)(passward) AS Smallestpassward FROM Login



**2-AVG function**

[SELECT](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/select.html) [AVG](http://localhost/phpmyadmin/url.php?url=https://dev.mysql.com/doc/refman/8.0/en/group-by-functions.html#function_avg)(passward) FROM login





SQL STRING FUNCTIONS

SQL UNION