Database Technologies Lab

Homework1B

Data = 9/16/2021

1. CREATE TABLE teachers(

First\_name varchar(25),

Last\_name varchar(50),

School varchar(50),

Salary numeric);

1. insert into teachers (first\_name, last\_name, school, hire\_date, salary)

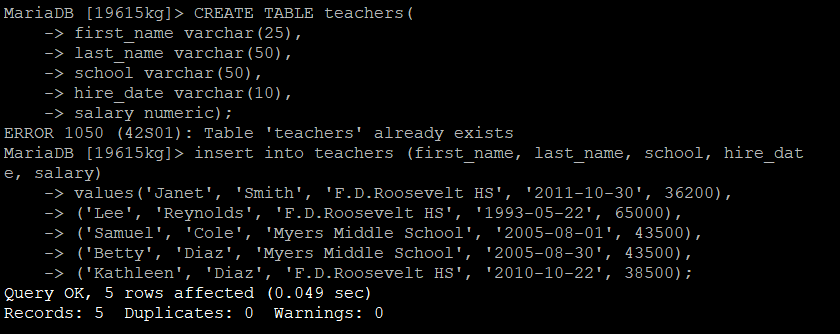
values(‘Janet’, ‘Smith’, ‘F.D.Roosevelt HS’, ‘2011-10-30’, 36200),

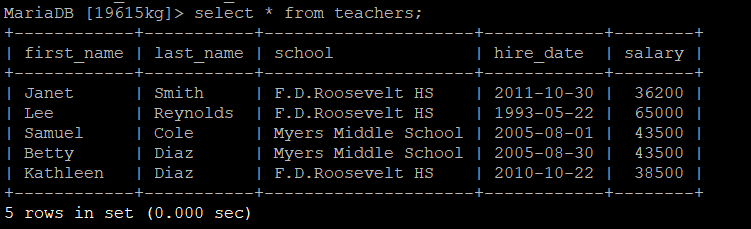
(‘Lee’, ‘Reynods’, ‘F.D.Roosevelt HS’,’1993-05-22’,65000),

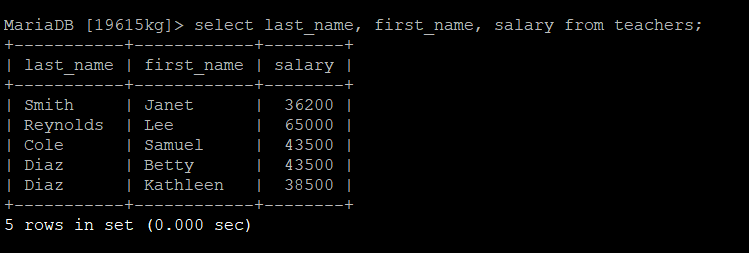
(‘Samual’, ‘Cole’, ‘Myers Middle School’,’2005-08-01’,43500),

(‘Betty’,’Diaz’,’ Myers Middle School’,’2005-08-30’,43500),

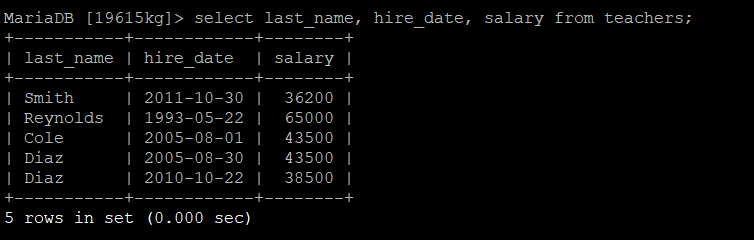
(‘Kathleen’,’Diaz’,’ F.D.Roosevelt HS’,2010-10-22’,38500);



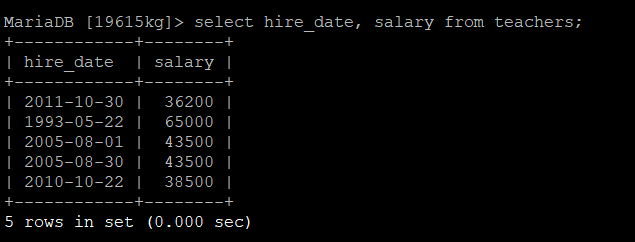
1. select \* from teacher
2. select last\_name, first\_name,salary from teachers;



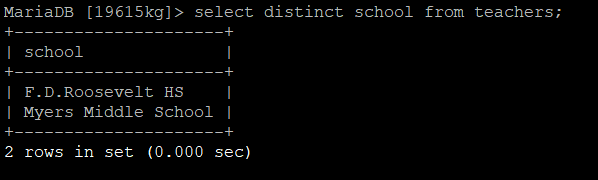
1. select last\_name, hire\_date, salary from teachers;



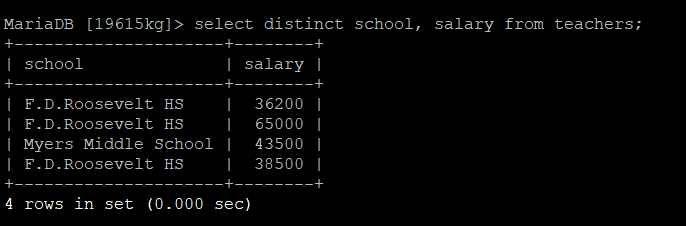
1. select hire\_date, salary from teachers;



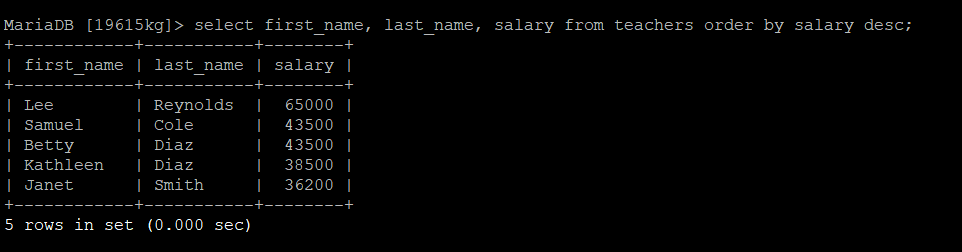
1. select distinct school from teachers;



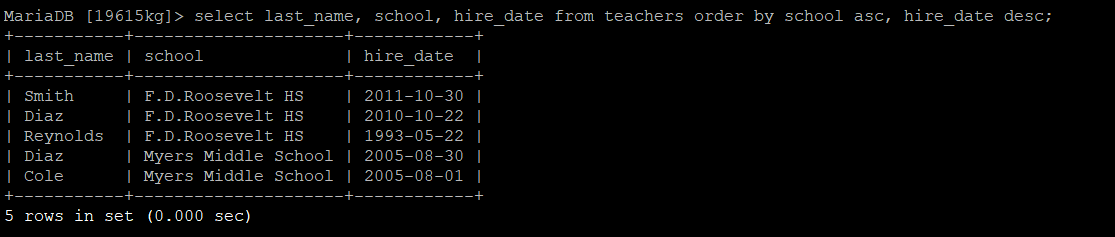
1. select distinct school, salary from teachers;



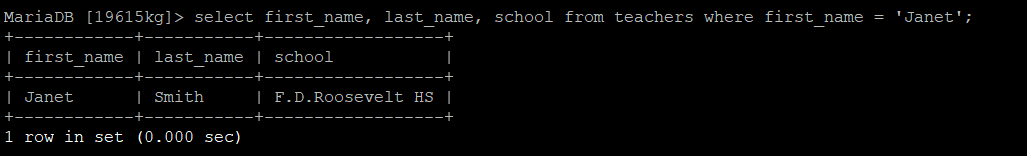
1. select first\_name, last\_name,salary from teachers order by salary desc;



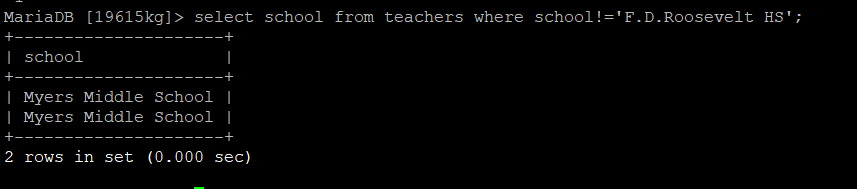
1. select last\_name,school,hire\_date from teachers order by school asc,hire\_date desc;



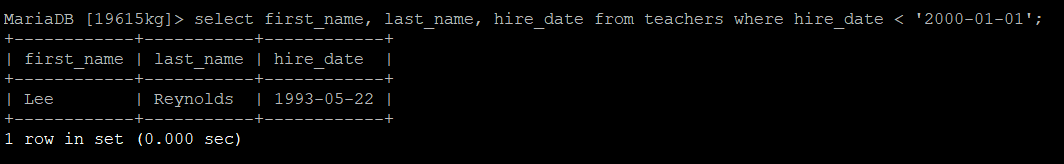
1. select first\_name, last\_name, school from teachers where first\_name=’Janet’;



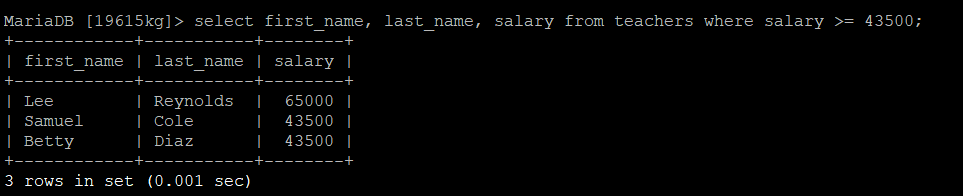
1. select school from teachers where school!=’F.D.Roosevelt HS’;



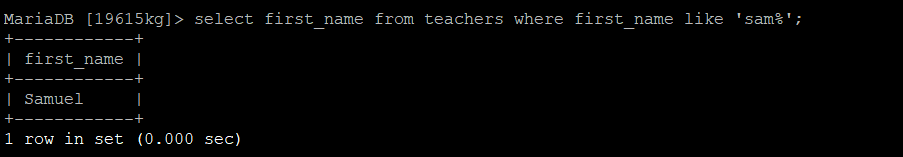
1. select first\_name, last\_name, hire\_date from teachers where hire\_date <’2000-01-01’;



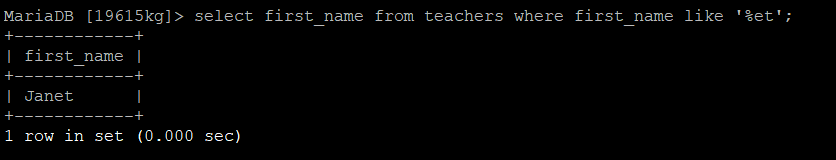
1. select first\_name, last\_name, salary from teachers where salary>= 43500;



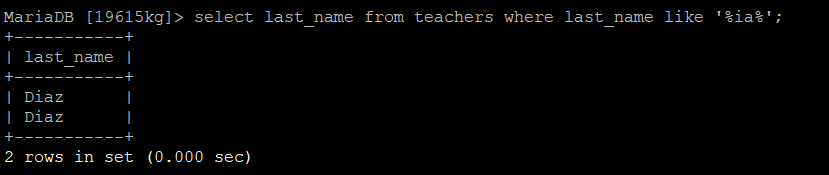
select first\_name from teachers where first\_name like ‘sam%’;



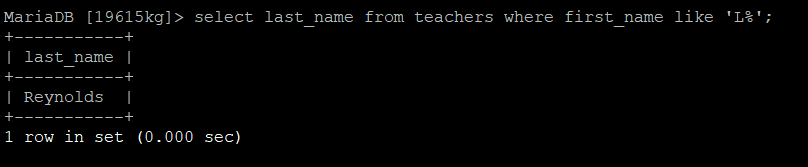
1. select first\_name from teachers where first\_name like ‘%et’;



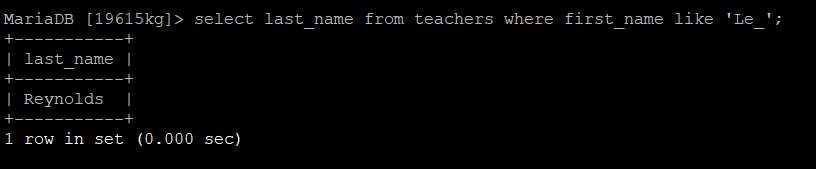
1. select last\_name from teachers where last\_name like ‘%ia%’;



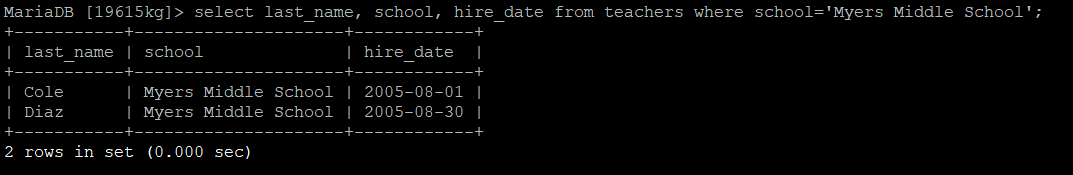
1. select last\_name from teachers where first\_name like ‘J\_\_\_t’;



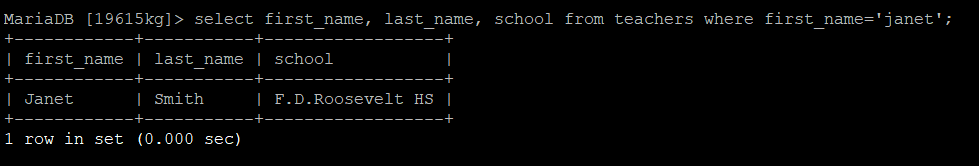
1. select last\_name from teachers where first\_name like ’Le\_’;



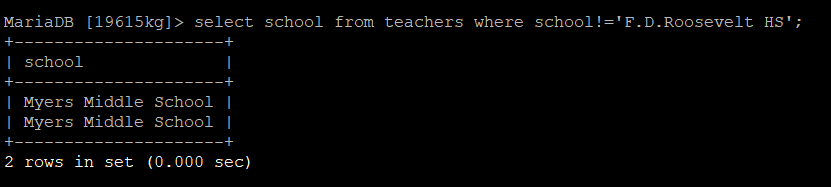
1. select last\_name, school, hire\_date from teachers where school= ‘Myers Middle School’;



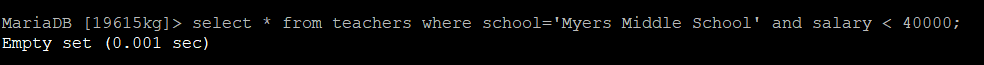
1. select first\_name,last\_name, school from teachers where first\_name=’janet’;



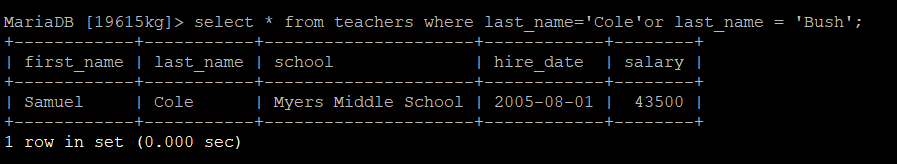
1. select school from teachers where school!=’F.D.Roosevelt HS’;



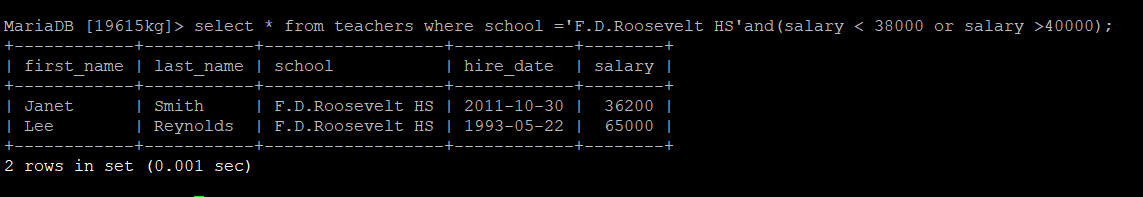
1. select \* from teachers where school = ‘Myers Middle School’ and salary < 40000;



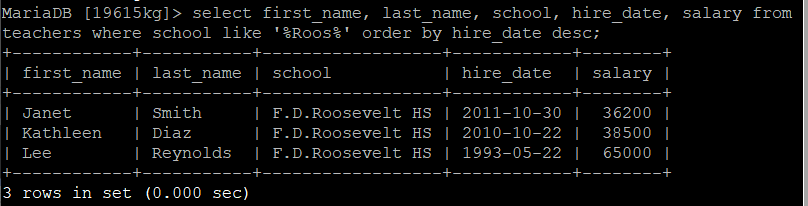
1. select \* from teachers where last\_name=’Cole’ or last\_name=’Bush’;



1. select \* from teachers where school =’F.D. Roosevelt HS’ and(salary < 38000 or salary > 40000);



1. select first\_name, last\_name, school, hire\_date, salary from teachers where school like ‘%Roos%’ order by hire\_date desc;



CREATE TABLE STATION(

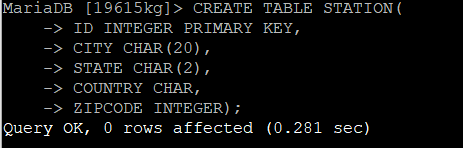
ID INTEGER PRIMARY KEY,

CITY CHAR(20),

STATE CHAR(2),

COUNTRY CHAR,

ZIPCODE INTEGER);



INSERT INTO STATION VALUES (13, 'Austin', 'TX', 'US', 78613);

INSERT INTO STATION VALUES (44, 'Nashville', 'TN', 'US', 37011);

INSERT INTO STATION VALUES (66, 'St Louis', 'MO', 'US', 63110);

INSERT INTO STATION VALUES (14, 'Los Angeles', 'CA', 'US', 90004);

INSERT INTO STATION VALUES (42, 'Santa Cruz', 'CA', 'US', 95060);

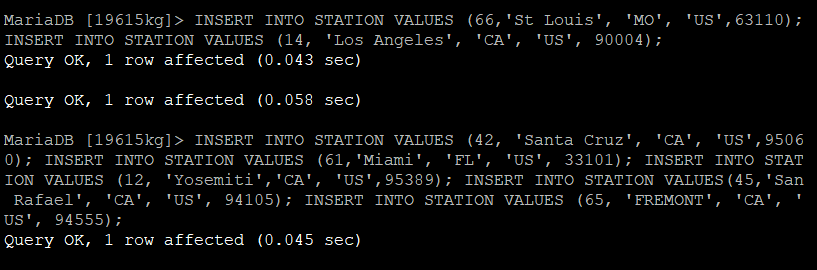
INSERT INTO STATION VALUES (61, 'Miami', 'FL', 'US', 33101);

INSERT INTO STATION VALUES (12, 'Yosemiti', 'CA', 'US', 95389);

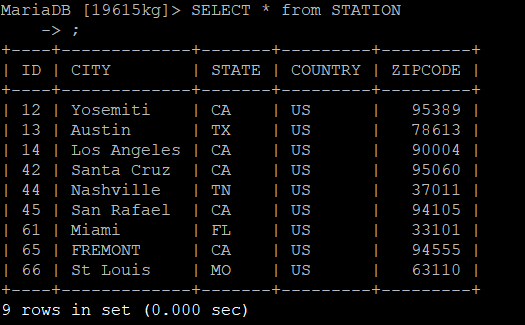
INSERT INTO STATION VALUES (45, 'San Rafael', 'CA', 'US', 94901);

INSERT INTO STATION VALUES (67, 'San Fransisco', 'CA', 'US', 94105);

INSERT INTO STATION VALUES (65, 'Fremont', 'CA', 'US', 94555);



SELECT \* from STATION



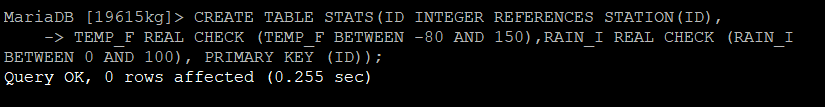
CREATE TABLE STATS(

ID INTEGER REFERENCES STATION(ID),

TEMP\_F REAL CHECK (TEMP\_F BETWEEN -80 AND 150),

RAIN\_I REAL CHECK(RAIN\_I BETWEEN 0 AND 100),

PRIMARY KEY (ID));



INSERT INTO STATS VALUES (13, 68, 35.22);

INSERT INTO STATS VALUES (44, 61, 82);

INSERT INTO STATS VALUES (66, 69, 42.2);

INSERT INTO STATS VALUES (14, 68, 96);

INSERT INTO STATS VALUES (42, 68, 14.25);

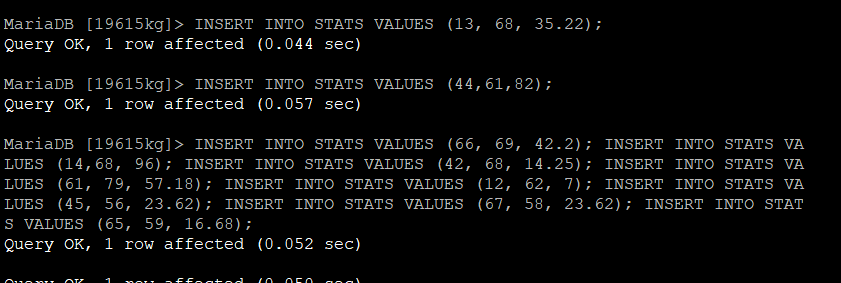
INSERT INTO STATS VALUES (61, 79, 57.18);

INSERT INTO STATS VALUES (12, 62, 7);

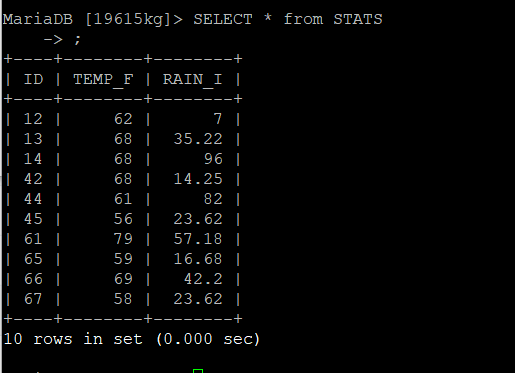
INSERT INTO STATS VALUES (45, 56, 23.62);

INSERT INTO STATS VALUES (67, 58, 23.62);

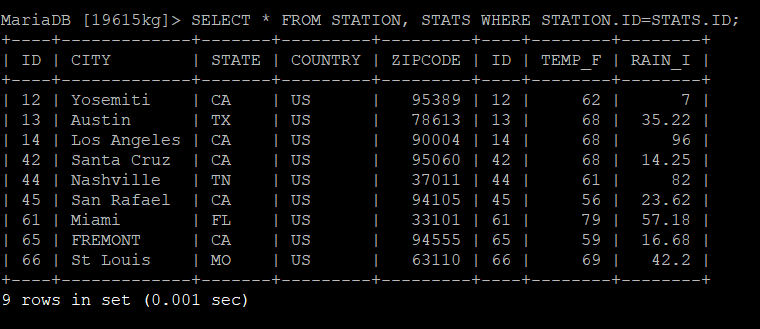
INSERT INTO STATS VALUES (65, 59, 16.68);



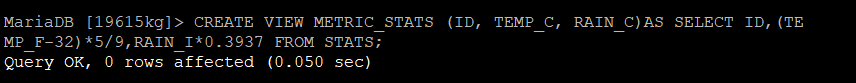
SELECT \* FROM STATS;



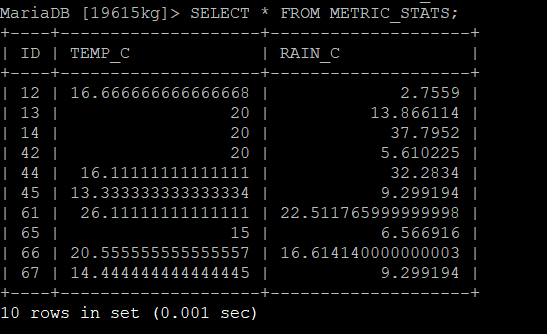
SELECT \* FROM STATION, STATS WHERE STATION.ID = STATS.ID;



CREATE VIEW METRIC\_STATS (ID, TEMP\_C, RAIN\_C) AS SELECT ID, (TEMP\_F – 32)\* 5/6, RAIN\_I \* 0.3937 FROM STATS;

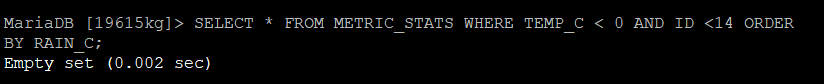


SELECT \* FROM METRIC\_STATS;



OUT OF RANGE=>

SELECT \* FROM METRIC\_STATS WHERE TEMP\_C < 0 AND ID < 14 ORDER BY RAIN\_C;



OUT OF RANGE VALUE =>

SELECT INTO STATS VALUES (44, 160, 7.1);

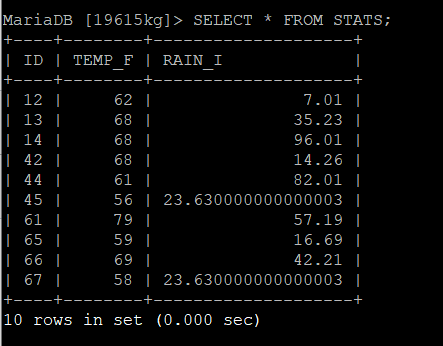


UPDATE COLUMN VALUES=>

UPDATE STATS SET RAIN\_I = RAIN\_I + 0.01;



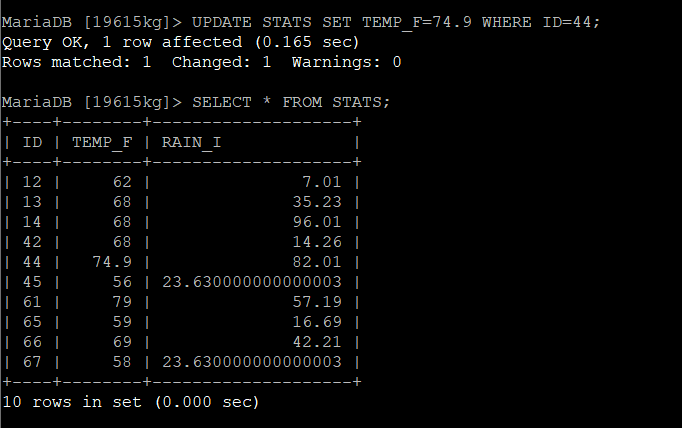
SELECT \* FROM STATS;



UPDATE=>

UPDATE STATS SET TEMP\_F=74.9

WHERE ID = 44



`

UPDATE TWO ROWS WITH NESTED QUERIES =>

UPDATE STATS SET RAIN\_I = 23.63 WHERE RAIN\_I = 23.630000000000003;

