LAB QUIZ

PES1UG20CS150

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SET No 1:

1: List in descending order the number of requests sent by hospitals from the locality 'Jayanagar'.

```
MariaDB [PES1UG20CS150_BLOODBANK]> select hospital_id,count(request_id) from hospital_request natural join hospital where h_locality="Jayanagar" order by count(request_id);
+-------------+-------------------+
| hospital_id | count(request_id) |
+-------------+-------------------+
| H032        |                 2 |
+-------------+-------------------+
1 row in set (0.010 sec)
```

2: Write a query to display the number of donors and the number of request for particular blood groups in the ascending order of requests

```
MariaDB [PES1UG20CS150_BLOODBANK]> select * from (select blood_group,count(request_id) as req_count from requests group by blood_group) LHS natural join (select blood_group,count(d_id) as donor_count from donor group by blood_group) RHS order by req_count;
+-------------+-----------+-------------+
| blood_group | req_count | donor_count |
+-------------+-----------+-------------+
| B-          |         1 |           1 |
| O-          |         2 |           1 |
| A+          |         2 |           2 |
| A-          |         2 |           2 |
| AB-         |         2 |           1 |
| AB+         |         4 |           4 |
| O+          |         5 |           3 |
+-------------+-----------+-------------+
7 rows in set (0.005 sec)
```

3: Write a trigger to prevent the insertion of a donor belonging to the locality "Banashankari".

BBM_TRIGGER - Notepad

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```
DELIMITER $$
CREATE OR REPLACE TRIGGER prevent_insert
  BEFORE INSERT ON donor
  FOR EACH ROW
BEGIN
  IF NEW.d_locality="Banashankari" THEN
    SIGNAL SQLSTATE '45000' SET MESSAGE_TEXT = 'Area is not servicable';
  END IF;
END $$
DELIMITER ;
```

```
MariaDB [PES1UG20CS150_BLOODBANK]> insert into donor values("D0035","Apoorva","Nemlekar","F","O+","6877719633","10th
cross",23,"Banashankari",34,"Diabetes","6037","O+",714,"2022-11-30");
ERROR 1644 (45000): Area is not servicable
MariaDB [PES1UG20CS150_BLOODBANK]>
```

4: Write a function to set the health status of a donor. If the donor has some associated disease set health status to "Fair", otherwise to "Good"

BBM_FUNCTION - Notepad

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```
DELIMITER $$
CREATE OR REPLACE FUNCTION health(disease VARCHAR(50))
RETURNS VARCHAR(4)
DETERMINISTIC
BEGIN
 DECLARE msg varchar(4);
 IF disease = "NIL" OR disease = "Nil" THEN
   SET msg = "Good";
 ELSE
   SET msg ="Fair";
 END IF;
 RETURN msg;
END; $$
DELIMITER ;

SELECT d_name, d_disease, health(d_disease) AS result FROM donor;
```

```
MariaDB [PES1UG20CS150_BLOODBANK]> source C:/Users/Gaurav/Desktop/BBM_FUNCTION.sql
Query OK, 0 rows affected, 1 warning (0.019 sec)

+----------+-----------+--------+
| d_name   | d_disease | result |
+----------+-----------+--------+
| Vishnu   | NIL       | Good   |
| Sheeba   | NIL       | Good   |
| Allina   | Diabetes  | Fair   |
| Abhibav  | BP        | Fair   |
| Aaron    | NIL       | Good   |
| Anirudh  | NIL       | Good   |
| Dev      | Diabetes  | Fair   |
| Nisar    | Anemia    | Fair   |
| Joshua   | Nil       | Good   |
| Shrey    | Nil       | Good   |
| Varad    | Nil       | Good   |
| Shashank | Nil       | Good   |
| Nevil    | Nil       | Good   |
| Nishok   | Nil       | Good   |
| Aditi    | Nil       | Good   |
+----------+-----------+--------+
15 rows in set (0.002 sec)
```