9/9/25

Task-5

WRITING JOIN QUERIES, EQUIVALENT AND/OR RECURSIVE QUERIES :-

Aim:- To implement and execute JOIN Queries equivalent Queries, and recursive Queries using mobile database.

INNERTION:

Return records that matching values in both tables

```
SELECT m phone.Id, m.brand, m.model
S.ram, S.storage, s.battery
FROM Mobile Phone
INNIER JOIN Phone SpeciR.
```

Phone_id	brand	model	price
1	Realme	14pro	30,000
2	Redmi	10pro	15,000
3	Vivo	13 pro	25,000

INNERTION Phone specifications

ON. m.phone_id = S phone_id;

Phone_id	ram	storage	battery
1	16GB	256GB	5000mah
2	8GB	128GB	4500mah
3	12GB	256GB	5500 mah

LEFT (outer) JOIN:- Return all records from the right table.

```
SELECT. m. phone_id, m brand, m model.
 S.ram, S storage, S. battery
FROM mobile purchase
 Phone specification on. m. phone_id
        = S. phone_id;
```

Phone_id	brand	model	Price
1	realme	14pro	30,000
2	Redmi	10pro	15,000
3	Vivo	13 pro	25,000

ram	storage	battery
16GB	256GB	5000mAh
8GB	128GB	4500mAh
12GB	256GB	5500mAh

RIGHT (outer) Join :- Return all Records from the right table and the matched records from the left table.

```
SELECT m.phone_id, m.brand, m.model
 S.ram S.storage, s.battery
FROM mobile phones m
RIGHT JOIN phone Specifications
 ON m.phone_id = s.phone_id;
```

phone_id	brand	model	price	ram	storage	battery
1	Redme	14pro	30,000	12GB	256GB	5000mAh
2	Redmi	10pro	15,000	8GB	128GB	4500mAh
3	Vivo	13pro	25,000	12GB	256GB	5000mAh

FULL OUTER JOIN :- Return all records when There is a match in either left or Right table SELECT, m.phone_id, m.brand, m.model, S.ram, S.storage, s.battery.

FROM Mobile Phones M
Full Outer Join phone specification on
m.phone_id = s. phone_id;

Phone-id	brand	model	price	ram	storage	battery
1	Redme	14pro	30,000	16GB	256GB	5000
2	Redmi	10 pro	15,000	8GB	128GB	4500
3	Vivo	13 pro	25,000	12GB	256GB	5500

3. Join Queries

INNER JOIN

SELECT m. Phone_id m. brand . m.models. rom
s storage , s. battery
FROM Mobile Phone m
INNER Join Phone specification on. m. phone
_id = s. Phone_id ;

b) LEFT JOIN
SELECT m.phone-id m.brand . m.model s.rom
S. storage s .battery
FROM mobile Phones. m
LEFT JOIN Phone spectition ON m.phone_Id
= S Phone-id;

c) RIGHT JOIN
SELECT m.phone-id, m. brand , m.model
S.rom, S. storage , S battery
FROM mobile phones m
RIGHT mobile phone specification
ON m.phone_id = s.phone-id;

VEL TECH	
EX No.	5
PERFORMANCE (5)	5
RESULT AND ANALYSIS (5)	5
VIVA VOCE (5)	5
RECORD (5)	13
TOTAL (20)	
SIGN WITH DATE	

Result:- Thus the implementation of SQL commands using joins and recursive Queries are executed successfully.