

KIET GROUP OF INSTITUTIONS
DEPARTMENT OF COMPUTER APPLICATIONS

LAB ASSIGNMENT 5

DBMS Lab (KCA – 252)

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ROLL_NUMBER - 36

1. Demonstrate the use of all string functions available in SQL.
2. Design the following table and solve the queries

Roll	F_Name	M_Name	L_Name	Sec	City	Area	HouseNo	Div
1	Akash	Kumar	Jain	A	Ghaziabad	Rakesh Marg	C-355	1
2	Manav	Mohan	Sharma	A	Ghaziabad	Raj nagar	D-211	2
3	Chandra	Mohan	Batra	B	Meerut	Minto Road	A-201	3
4	Rakesh	Chandra	Gupta	B	Kanpur	Nehru Marg	A-145	
5	Sagar	Pratap	Singh	A	Meerut	Gandhi marg	C-35	0

- i) Display Roll Number and complete name of all the students
Select Roll, F_Name|| ' ' ||M_Name|| ' ' || L_Name AS full_name FROM students;
- ii) Display Roll Number, Name and complete address of all the students.
Select Roll, F_Name|| ' ' ||M_Name|| ' ' || L_Name AS full_name,HouseNo|| ' ' || Area|| ' ' ||city as address from students;
- iii) Display Roll number, Name of all the students. (Note – The name should be displayed as A.K.Jain)
SELECT Roll_Number, INITCAP(SUBSTR(Name, 1, 1)) || '.' || INITCAP(SUBSTR(SUBSTR(Name, INSTR(Name, ' ') + 1), 1, 1)) || '.' || INITCAP(SUBSTR(Name, INSTR(Name, ' ', 1, 1) + 1)) AS Name FROM Students;
- iv) Display all the student information according to ascending order of Section
Select * from students order by section asc;
- v) Display all the student information according to descending order of Section.
Select * from students order by section desc;
- vi) Sort all the records according to section and then according to First Name.
Select * from students order by section asc, first_name asc;
- vii) Display Roll number, name and city of all the students. (Note – City names should be left padded with 5 *s).
Select roll_number, first_name, LPAD(city, length(city) + 5, '*') As padded_city from students;
- viii) Display those student details whose division hasnot been awarded.
Select * from students where division is null;
- ix) Display the cities from where the students are from.
Select distinct city from students;

- x) Display Roll number, First Name and the division got. (Note – Division should be displayed as 1- FIRST, 2 – SECOND, 3 – THIRD, 0- FAIL, NULL – NOT AWARDED)
- ```

Select Roll_number, first_name,
Case
When DIVISION = 1 then 'FIRST'
When DIVISION =2 then 'SECOND'
When DIVISION =3 Then 'Third'
When DIVISION=0 Then 'Fail'
Else 'NOT AWARDED'
END AS DIVISION
From students;
```
- xi) Display Roll Number, First Name, Section of all the students. (Note – Section A should be displayed as 1 and Section B should be displayed as 2)
- ```

Select Roll_Number, First_Name,
CASE Section
When 'A' THEN 1
When 'B' THEN 2
ELSE NULL
END AS section
From students;
```

3. Solve the following query

Empcode	Empname
E1	001Rajkumar
E2	Ramkumar002
E3	Ravikumar003

```

SELECT Empcode,
REGEXP_REPLACE(Empname, '\d+$', '') AS Empname
FROM Employees;
```

Output should

Empcode	Empname
E1	Rajkumar
E2	Ramkumar
E3	Ravikumar

4. Solve the following query

First Name	Middle Name	Last Name
Pankaj	Kumar	Tiwari
Ashok	Kumar	Sharma
Arun	Kumar	Sharma

```

SELECT CASE WHEN LENGTH(First_Name) > 1 THEN SUBSTR(First_Name, 1, 1) || '.' ELSE
First_Name END || CASE WHEN LENGTH(Middle_Name) > 0 THEN ' ' ||
SUBSTR(Middle_Name, 1, 1) || '.' ELSE '' END || ' ' || Last_Name AS Name FROM Names;

```

Output should

Name
P. K. Tiwari
A. K. Sharma
A. K. Gupta

5. Given the table structure with data.

Sname	Marks
Raj	65
Amit	32
Sanjay	45
Rohit	40
Anil	35

Output 1 Rule - : **Pass marks are 35.**

Display the result as

Sname	Result
Raj	Pass
Amit	Fail
Sanjay	Pass
Rohit	Pass
Anil	Pass

```

WITH Students (Sname, Marks) AS (
  SELECT 'Raj', 65 FROM DUAL
  UNION ALL
  SELECT 'Amit', 32 FROM DUAL
  UNION ALL
  SELECT 'Sanjay', 45 FROM DUAL
  UNION ALL
  SELECT 'Rohit', 40 FROM DUAL
  UNION ALL
  SELECT 'Anil', 35 FROM DUAL
)
SELECT Sname,
CASE
  WHEN Marks >= 35 THEN 'Pass'
  ELSE 'Fail'
END AS Result

```

FROM Students;