

Assignment-5

Stream : IT

Subject : Database Management System Lab

Subject Code: IT-694

1. Find the names of faculties of CSE Department.

```
SQL> SELECT FacultyName FROM FACULTY_005 WHERE DeptCode = 'CSE';

FACULTYNAME
-----
S.RoyChoudhury
P.Roy
SQL> █
```

2. Find the number of faculties in the Master of Computer Application department

```
SQL> SELECT COUNT(*) AS faculty_count FROM FACULTY_005 WHERE DeptCode = 'MCA';

FACULTY_COUNT
-----
1
```

3. Show the names of the heads of departments with department name.

```
SQL> SELECT HOD, DeptName FROM DEPARTMENT_005;

HOD  DEPTNAME
----  -
F201 Information Technology
F801 Electrical Engineering
F101 Computer Science and Engineering
F701 Electronics Engineering
F301 Master of Computer Application
```

4. Find the names of 3rd year CSE students whose date of birth is earlier than 15th August 1981.

```
SQL> SELECT Name FROM Student_005 WHERE YearOfAdm = 3 AND DeptCode = 'CSE' AND BirthDate < '15/08/1981';

no rows selected
```

5. Find the number of faculties who joined in August.

```
SQL> SELECT COUNT(*) AS faculty_count FROM FACULTY_005 where DateOfJoin like '___08%';  
  
FACULTY_COUNT  
-----  
1
```

6. Add an extra attribute to the faculty table - **Salary Number(8,2)**

```
SQL> alter table FACULTY_005 ADD Salary Number(8,2);  
  
Table altered.  
  
SQL> select * from FACULTY_005;  
  
FACU FACULTYNAME      DATEOFJO DEPT      SALARY  
----  -  
F101 S.RoyChoudhury  01-10-05 CSE  
F105 P.Roy          01-05-06 CSE  
F201 D.Dutta       24-08-05 IT  
F301 S.Paul        15-03-03 MCA  
F401 D.Majumdar    01-02-02 IT  
F501 N.Sanyal      31-12-03 EE  
F601 I.Majumdar    10-04-00 ECE  
F701 S.Ghosh       01-01-04 ECE  
F801 P.Das         15-06-02 EE  
  
9 rows selected.
```

7. Insert values into the corresponding field **Salary Number(8,2)** (Enter distinct values).

```
SQL> update FACULTY_005 set Salary = 600000 where FacultyName = 'S.Ghosh';
1 row updated.

SQL> update FACULTY_005 set Salary = 600000 where FacultyName = 'P.Das';
1 row updated.

SQL> COMMIT
2 ;

Commit complete.

SQL> SELECT * FROM FACULTY_005;
```

FACU	FACULTYNAME	DATEOFJO	DEPT	SALARY
F101	S.RoyChoudhury	01-10-05	CSE	700000
F105	P.Roy	01-05-06	CSE	800000
F201	D.Dutta	24-08-05	IT	800000
F301	S.Paul	15-03-03	MCA	600000
F401	D.Majumdar	01-02-02	IT	400000
F501	N.Sanyal	31-12-03	EE	500000
F601	I.Majumdar	10-04-00	ECE	600000
F701	S.Ghosh	01-01-04	ECE	600000
F801	P.Das	15-06-02	EE	600000

```
9 rows selected.
```

8. Find the Department having more than one faculty.

```
SQL> SELECT DeptCode FROM FACULTY_005 GROUP BY DeptCode HAVING COUNT(*) > 1;
```

DEPT
IT
EE
CSE
ECE

9. Find the name, department of the faculties who earn between 8000 and 12000.

```
SQL> SELECT FacultyName, DeptCode FROM FACULTY_005 where Salary BETWEEN 8000 AND 12000;
no rows selected
```

10. Find the department having maximum number of students or faculties

```
SQL> SELECT DeptCode, MAX(MaxMember) AS Max FROM (SELECT DeptCode, COUNT(*) AS MaxMember FROM Student_005 GROUP BY DeptCode UNION ALL SELECT DeptCode, COUNT(*) AS MaxMember FROM FACULTY_005 GROUP BY DeptCode) GROUP BY DeptCode;
```

DEPT	MAX
IT	2
EE	2
CSE	3
MCA	1
ECE	2

11. Display the details of HOD of the department where 'S.Ghosh' belongs.

```
SQL> SELECT * FROM FACULTY_005 WHERE FacultyCode=(select HOD from DEPARTMENT_005 WHERE DeptCode = (select DeptCode from FACULTY_005 WHERE FacultyName='S.Ghosh'));
```

FACU	FACULTYNAME	DATEOFJO	DEPT	SALARY
F701	S.Ghosh	01-01-04	ECE	600000