

In Employee & Department tables, write a SQL query for the following scenarios.

1) to fetch last x number of records

Soln: Let us consider Employee table having following fields:

Employee(EmpId,EmpName,DeptNo,Salary)

Where EmpId is the primary key in the employee table and Deptno is the foreign key that References Deptno in the Department table.

Structure of Employee Table:

```
Create table Employee( EmpId int Primary Key,  
                        EmpName varchar(20),  
                        DeptNo int Foreign Key references Department(Deptno),  
                        Salary int)
```

Let us consider Department table having following fields:

Department(DeptNo,DeptName)

Where Deptno is the primary key in the department table.

```
Create table Department( DeptNo int Primary Key,  
                        DeptName varchar(20),  
                        )
```

To fetch last x number of records in Employee Table:

```
(Select * from Employee Order By EmpId Desc Limit x) Order by EmpId Asc
```

To fetch last x number of records in Department Table:

```
(Select * from Department Order By DeptNo Desc Limit x) Order by DeptNo Asc
```

2) To create a report of employees having max salary for each department and should be listed max salary first.

Soln) Since we want information from both Employee and Department we need to create a join so that we can have information from both tables.

```
Select EmpId,  
       EmpName,  
       Salary,  
       DeptName  
FROM (Select EmpId,  
            EmpName,  
            Salary,  
            DeptNo,  
            DENSE_RANK() over (PARTITION BY D.DeptNo order by E.Salary DESC) as rnk  
      FROM Employee E INNER JOIN Department D on E.DeptNo = D.DeptNo  
     ) AS temp  
WHERE RowNum=1
```

