

```
Create table dept (deptno decimal(2,0) primary key,  
dname varchar(14) default Null, loc varchar(13)  
default Null);
```

```
Create table emp (empno decimal(4,0) primary  
key, ename varchar(10) default Null, mgr_no  
decimal(4,0) default Null, hiredate date  
default Null, sal decimal(7,2) default Null,  
dept_no decimal(2,0) references dept (deptno)  
on delete cascade on update cascade);
```

```
Create table incentives (empno decimal(4,0)  
references emp (empno) on delete cascade on  
update cascade, incentive_date date, incentive  
- amount decimal(10,2), primary key (empno,  
incentive_date);
```

```
Create table project (pno int primary key,  
pname varchar(30) not null, ploc varchar(30);
```

```
Create table assigned_to (empno decimal  
(4,0) references emp (empno) on delete cascade  
on update cascade, pno int references project  
(pno) on delete cascade on update cas-  
-cade, job_role varchar(30), primary  
key (empno, pno);
```

```
INSERT INTO dept VALUES  
(10, 'ACCOUNTING', 'MUMBAI'),  
(20, 'RESEARCH', 'Bengaluru'),  
(30, 'SALES', 'Delhi'),  
(40, 'OPERATIONS', 'Chennai');
```


INSERT INTO emp VALUES

(7369, 'Adarsh', 7902, '2012-12-17', 80000.00, 3)
(7499, 'Shruthi', 7698, '2013-02-20', 16000.00, 3)
(7521, 'Anvitha', 7698, '2015-02-22', 12500.00, 3)
(7566, 'Tanvir', 7839, '2008-04-02', 29750.00, 3)
(7654, 'Ramesh', 7698, '2014-09-28', 12500.00, 3)
(7698, 'Kumar', 7839, '2015-05-01', 28500.00, 3)
(7782, 'Clark', 7839, '2017-06-09', 24500.00, 3)
(7788, 'Scott', 7566, '2010-12-09', 30000.00, 20)
(7839, 'King', NULL, '2009-11-17', 50000.00, 10)
(7844, 'Turner', 7698, '2010-09-08', 15000.00, 30)
(7876, 'Adams', 7788, '2013-01-12', 11000.00, 20)
(7900, 'James', 7698, '2017-12-03', 9500.00, 30)
(7902, 'Ford', 7566, '2010-12-03', 30000.00, 20)

INSERT INTO incentives VALUES

(7499, '2019-02-01', 5000.00),
(7521, '2019-03-01', 2500.00),
(7566, '2022-02-01', 5070.00),
(7654, '2020-02-01', 2000.00),
(7654, '2022-04-01', 879.00),
(7521, '2019-02-01', 8000.00),
(7698, '2019-03-01', 500.00),
(7698, '2020-03-01', 9000.00),
(7698, '2022-04-01', 4500.00),

Insert into project-s1 values

(101, 'AI Project', 'Bengaluru'),

(102, 'IoT', 'Hyderabad'),

(103, 'Blockchain', 'Bengaluru'),

(104, 'Data Science', 'Mysuru'),

(105, 'Autonomous Systems', 'Pune');

Insert into assigned-to-s1 values.

(7499, 101, 'Software Engineer'),

(7521, 101, 'Software Architect'),

(7566, 101, 'Project Manager'),

(7654, 102, 'Sales'),

(7521, 102, 'Software Engineer'),

(7499, 102, 'Software Engineer'),

(7654, 103, 'Cyber Security'),

(7698, 104, 'Software Engineer'),

(7900, 105, 'Software Engineer')

(7839, 104, 'General Manager');

Select e.empno

From emp-s1 e

Join assigned-to-s1 a ON e.empno = a.empno

Join project-s1 p ON a.pno = p.no

Where p.ploc IN ('Bengaluru', 'Hyderabad', 'Mysuru')

Output:

Empno

7499

7521

7566

7499

7521

7654
7654
7698
7839

Select empno, e name

From emp : S1,

Where empno NOT IN (Select empno from incentive S1);

Output:

empno	ename
7369	Ad arsh
7782	Clark
7788	Scott
7839	King
7844	Turner
7876	Adams
7900	James
7902	Ford

Select

e.empno AS employee-number,

e.ename AS employee-name,

d.dname AS department-name,

a.job-role AS job-role,

d.loc AS department-location,

p.loc AS project-location

From emp - S1 e

Join dept - S1 d ON e.deptno = d.deptno

Join assigned-to - S1 a ON e.empno = a.empno

Join project - S1 p ON a.pno = p.no

Where d.loc = p.ploc;

~~Describe assigned to S1;~~

Output

empno	department	employee name	dept-name	Job-role
7566		Tanvir	Research	Project Manager

department_location

Bengaluru

project_location

Bengaluru

Select m.ename, count(*)

From emp e, emp m

Where e.mgr-no = m.empno

Group By m.ename

Having count (*) = (select Max(mycount))

from (select count(*) mycount

from emp

Group By mgr-no) a);

Output

ename	count
-------	-------

Kumar	5
-------	---

Select distinct m.mgr-no from emp e, emp m

Where e.mgr-no = m.mgr-no and e.dept no

= m.dept no and e.emp no in (select distinct

m.mgr-no from emp e, emp m where e.mgr-

no = m.mgr-no and e.dept no = m.dept no);

mgr-no

7566

7839

Select *
 from emp e, incentives i
 where e.empno = i.empno and 2 = (select
 count (*)
 from incentives;
 where i.incentive_amount <= j.incentive_amo

empno	ename	mgr_no	hire date	sal	dept
7521	Anvitha	7698	2015-02-22	125000	30

empno	incentive_date	incentive amount
7521	2019-02-01	8000.00

Select *
 from EMP E
 where E.Dept no = (select E1.Dept no from emp
 E1 where E1.EMP NO = E.MGR_NO);

emp no	ename	mgr_no	hiredate	sal	dept
7369	Adarsh	7902	2012-12-17	8000	20
7499	Shruthi	7698	2013-02-20	16000	30
7521	Anvitha	7698	2015-02-22	12500	30
7654	Ramesh	7698	2014-09-28	12500	30
7782	CLARK	7839	2017-06-09	24500	10
7788	SLOTT	7566	2010-12-09	30000	20
7844	JAMES	7698	2010-09-08	15000	30
7876	ADAMS	7788	2013-04-12	11000	20
7900	JAMES	7698	2017-12-03	9500	30
7902	FORD	7566	2010-12-03	30000	20
NULL	NULL	NULL	NULL	NULL	NULL

Select distinct e-ename
 from emp e, incentives i
 where (select max (sal + incentive - amount)
 from emp, incentives >= ANY (select emp e1
 where e. deptno = c1.
 deptno),

e name
 Adarsh
 Shruthi
 Anwita
 Parvir
 Ramesh
 Kumar
 CLARK
 SCOTT
 Kings
 Turner
 Adams
 James
 FORD

20/11/2021