

1. query: select empId, fullName from employee where manager_id=101;

Output:

```
test=# insert into employee values (1, 'john', 101), (2, 'blue', 101), (3, 'tony', 101), (4, 'ram', 102);
INSERT 0 4
test=# select * from employee;
 empid | fullname | manager_id 
-----+-----+-----
      1 | john    |         101
      2 | blue    |         101
      3 | tony    |         101
      4 | ram     |         102
(4 rows)

test=# select empId, fullName from employee where manager_id=101;
 empid | fullname 
-----+-----
      1 | john
      2 | blue
      3 | tony
(3 rows)
```

2. select count(*) from employee where project='P1';

Output:

```
test=# select * from employee;
 empid | fullname | manager_id | project 
-----+-----+-----+-----
      1 | john    |         101 | P1
      2 | blue    |         101 | P1
      3 | tony    |         101 | P2
      4 | ram     |         102 | P1
(4 rows)

test=# select count(*) from employee where project='P1';
 count 
-----
      3
(1 row)
```

3. select max(salary), min(salary), avg(salary) from employee;

Output:

```
test=# select max(salary), min(salary), avg(salary) from employee;
 max | min | avg 
-----+-----+-----
14000 | 11000 | 12500.000000000000
(1 row)
```

4. select empId from employee where salary between 10000 and 15000;

```
test=# select empId from employee where salary between 10000 and 15000;
 empid 
-----
      1
      2
      3
      4
(4 rows)
```

5. select empid, sum(salary+variable) as total from employee group by empid order by total asc;

Output:

```
test=# select * from employee;
 empid | fullname | manager_id | project | salary | variable 
-----+-----+-----+-----+-----+-----
      1 | john    |         101 | P1      |  11000 |      500
      2 | blue    |         101 | P1      |  12000 |      250
      3 | tony    |         101 | P2      |  13000 |      350
      4 | ram     |         102 | P1      |  14000 |      400
(4 rows)

test=# select empid, sum(salary+variable) as total from employee group by empid;
 empid | total 
-----+-----
      4 | 14400
      2 | 12250
      3 | 13350
      1 | 11500
(4 rows)

test=# select empid, sum(salary+variable) as total from employee group by empid order by total asc;
 empid | total 
-----+-----
      1 | 11500
      2 | 12250
      3 | 13350
      4 | 14400
(4 rows)
```

6. select employee.empid, fullname from employee join employeeDetails on employee.empid = employeeDetails.empid;

```
test=# select * from employeeDetails;
 empid | name | city
-----+-----+-----
      1 | john | hyderabad
      2 | blue | chennai
      4 | ram  | bangalore
      5 | steve | hyderabad
(4 rows)

test=# select employee.empid, fullname from employee join employeeDetails on employee.empid = employeeDetails.empid;
 empid | fullname
-----+-----
      1 | john
      2 | blue
      4 | ram
(3 rows)
```

7. select upper(name), lower(city) from employeeDetails;

```
test=# select upper(name), lower(city) from employeeDetails;
 upper | lower
-----+-----
 JOHN  | hyderabad
 BLUE  | chennai
 RAM    | bangalore
 STEVE  | hyderabad
(4 rows)
```

8. select project, count(*) as count from employee group by project order by count desc;

```
test=# select * from employee;
 empid | fullname | manager_id | project | salary | variable
-----+-----+-----+-----+-----+-----
      1 | john     |          101 | P1      | 11000  | 500
      2 | blue     |          101 | P1      | 12000  | 250
      3 | tony     |          101 | P2      | 13000  | 350
      4 | ram      |          102 | P1      | 14000  | 400
(4 rows)

test=# select project, count(*) as count from employee group by project order by count desc;
 project | count
-----+-----
 P1      | 3
 P2      | 1
(2 rows)
```

9. select * from employee where empid%2!=0;

```
test=# select * from employee where empid%2!=0;
 empid | fullname | manager_id | project | salary | variable
-----+-----+-----+-----+-----+-----
      1 | john    |          101 | P1      |  11000 |      500
      3 | tony    |          101 | P2      |  13000 |      350
(2 rows)
```

10. select salary from employee order by salary desc offset 2;

```
test=# select salary from employee order by salary desc offset 2;
 salary
-----
  12000
  11000
(2 rows)
```