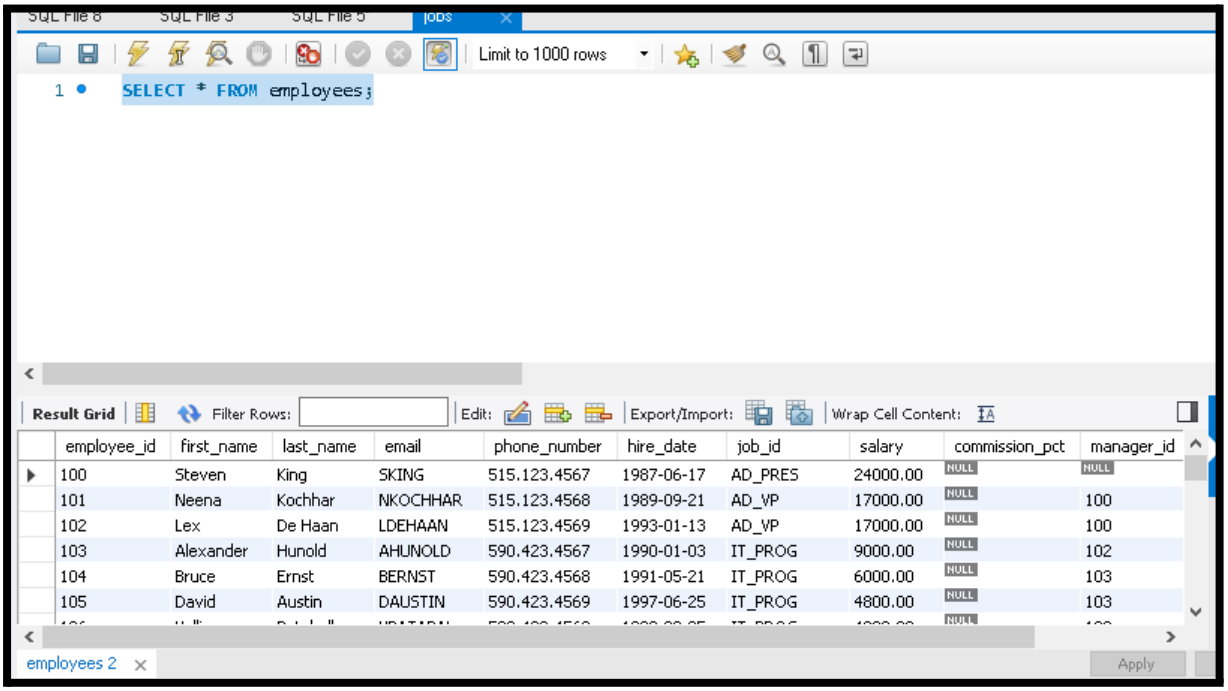
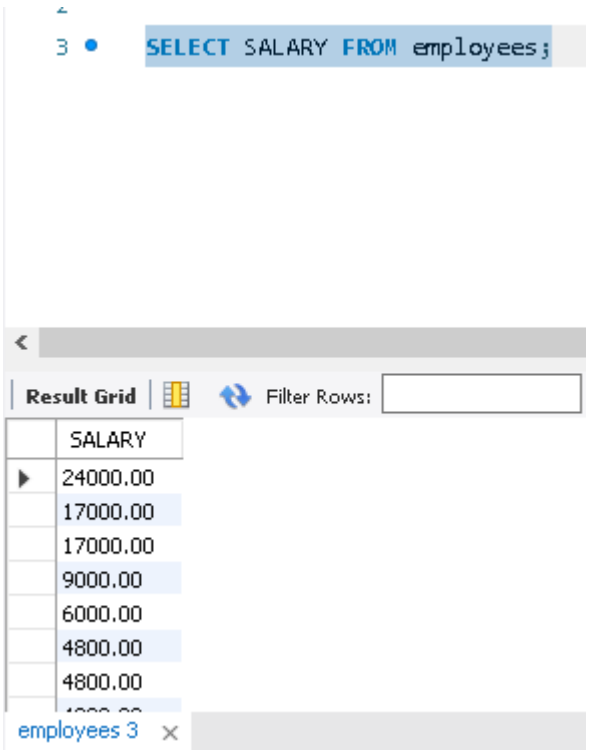
1. From the following table return complete information about the employees.

SELECT * FROM employees;

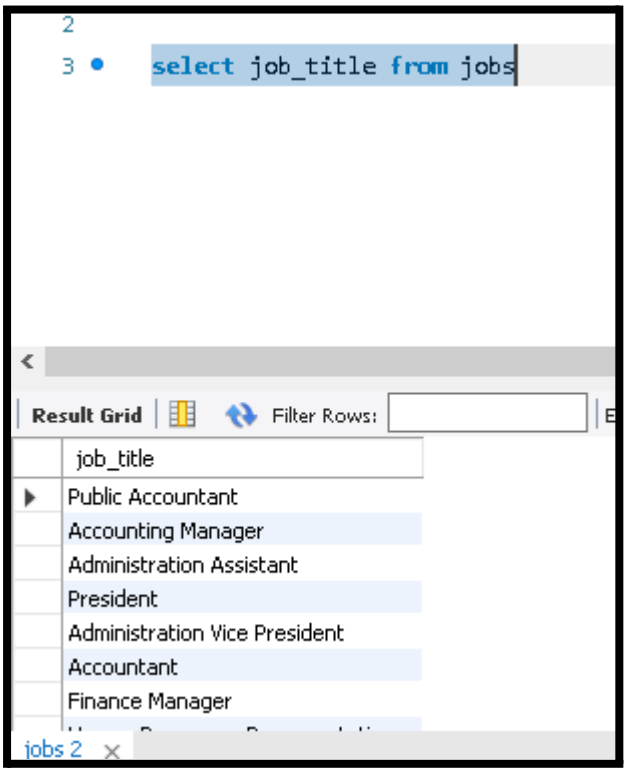


2. From the following table, write a SQL query to find the salaries of all employees. Return salary.

SELECT SALARY FROM employees;

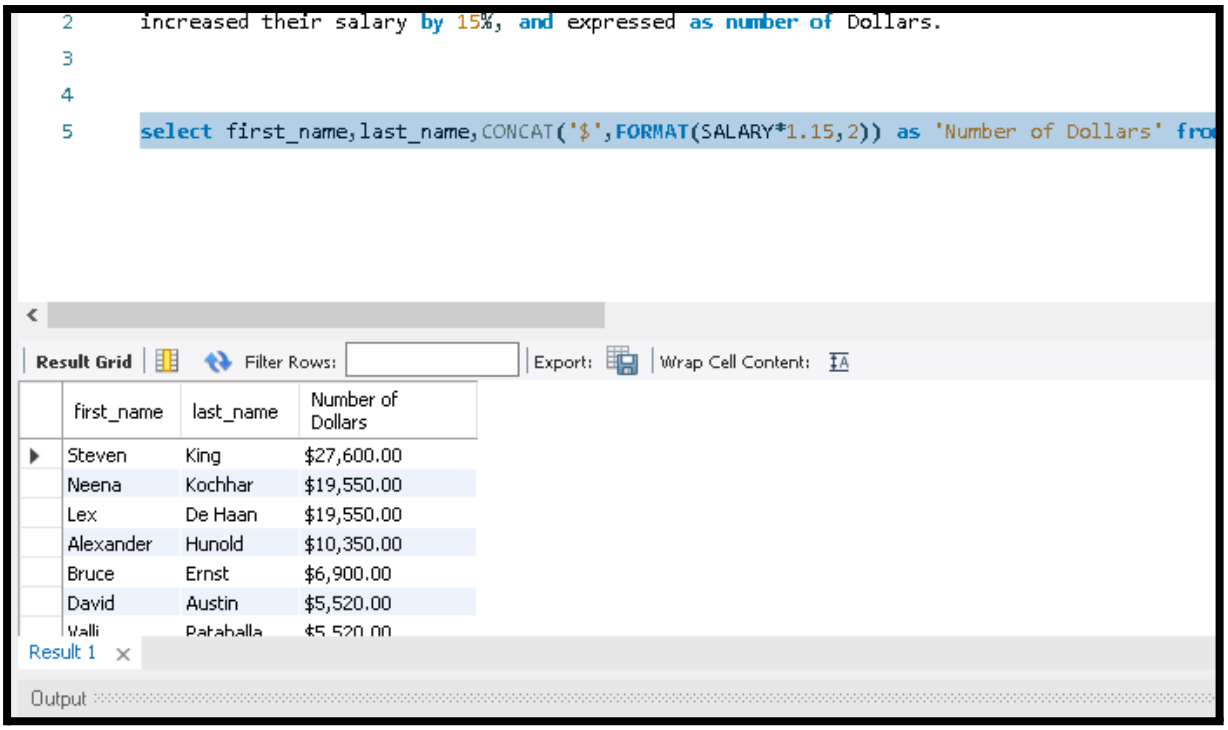


3. From the following table, write a SQL query to find the unique designations of the employees. Return job name.



4. From the following table, write a SQL query to list the employees' name, increased their salary by 15%, and expressed as number of Dollars.

select first_name,last_name,CONCAT('$',FORMAT(SALARY*1.15,2)) as 'Number of Dollars' from Employees



5. From the following table, write a SQL query to list the employee's name and job name as a format of "Employee & Job".

select concat(e.first_name,' ',e.last_name) as Name , j.job_title as "Employee & Job"

from employees e

inner join jobs j

ON e.job_id = j.job_id;

```
11
12 •  select concat(e.first_name,' ',e.last_name) as Name , j.job_title as "Employee & Job"
13    from employees e
14    inner join jobs j
15    ON e.job_id = j.job_id;
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

Name	Employee & Job
William Gietz	Public Accountant
Shelley Higgins	Accounting Manager
Jennifer Whalen	Administration Assistant
Steven King	President
Neena Kochhar	Administration Vice President
Lex De Haan	Administration Vice President
Daniel Faviet	Accountant

Result 3

6.Write a query in SQL to produce the output of employees as follows:

Employee

JONAS(manager).

select concat(e.first_name,'(',j.job_title,')') as Employee

from employees e

INNER JOIN jobs j

ON e.job_id = j.job_id;

```
18 •  select concat(e.first_name,'(',j.job_title,')') as Employee
19    from employees e
20    INNER JOIN jobs j
21    ON e.job_id = j.job_id;
22
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

Employee
William(Public Accountant)
Shelley(Accounting Manager)
Jennifer(Administration Assistant)
Steven(President)
Neena(Administration Vice President)
Lex(Administration Vice President)
Daniel(Accountant)

Result 5

7. From the following table, write a SQL query to find those employees with hire date in the format like February 22, 1991. Return employee ID, employee name, salary, hire date.

select employee_id,first_name,

concat('$',format(salary,2)) as salary,

concat(DATE_FORMAT(hire_date,'%M %d'),',', DATE_FORMAT(hire_date,'%y')) AS 'hire date'

from Employees

```
29 •  select employee_id,first_name,
30    concat('$',format(salary,2)) as salary,
31    concat( DATE_FORMAT(hire_date,'%M %d'),',', DATE_FORMAT(hire_date,'%y')) AS 'hire date'
32    from Employees
33
34
35
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

employee_id	first_name	salary	hire date
100	Steven	$24,000.00	June 17,87
101	Neena	$17,000.00	September 21,89
102	Lex	$17,000.00	January 13,93
103	Alexander	$9,000.00	January 03,90
104	Bruce	$6,000.00	May 21,91
105	David	$4,800.00	June 25,97
106	Valli	$4,800.00	February 05,98

Result 11

8. From the following table, write a SQL query to count the number of characters except the spaces for each employee name. Return employee name length.

SELECT length(first_name)+length(last_name) as Emp_Name_Lenght

from Employees;

```
35 •  SELECT length(first_name)+length(last_name) as Emp_Name_Lenght
36    from Employees;
37
38
39
```

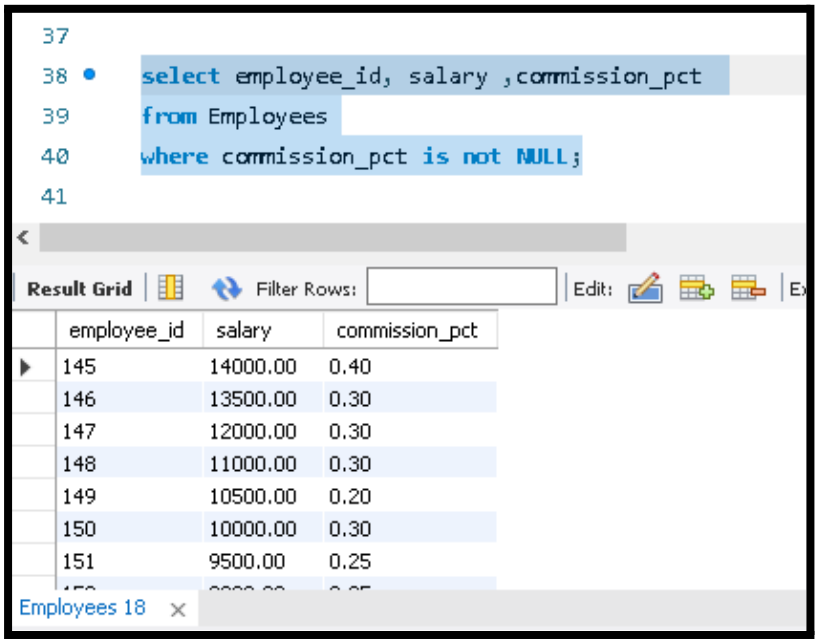
Result Grid | Filter Rows: | Export: | Wrap Cell Content:

Emp_Name_Lenght
10
12
10
15
10
11
14

Result 16

9. From the following table, write a SQL query to find the employee ID, salary, and commission of all the employees.

```
select employee_id, salary ,commission_pct

from Employees

where commission_pct is not NULL;
```



```
37
38 • select employee_id, salary ,commission_pct
39   from Employees
40   where commission_pct is not NULL;
41
```

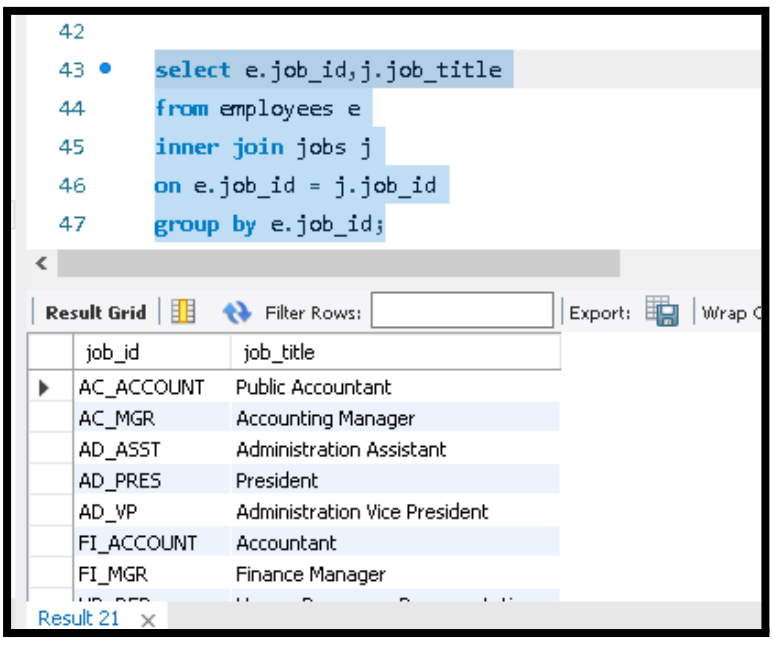
Result Grid | Filter Rows: | Edit:

employee_id	salary	commission_pct
145	14000.00	0.40
146	13500.00	0.30
147	12000.00	0.30
148	11000.00	0.30
149	10500.00	0.20
150	10000.00	0.30
151	9500.00	0.25

Employees 18

10. From the following table, write a SQL query to find the unique department with jobs. Return department ID, Job name.

```
select e.job_id,j.job_title

from employees e

inner join jobs j

on e.job_id = j.job_id

group by e.job_id;
```



```
42
43 • select e.job_id,j.job_title
44   from employees e
45   inner join jobs j
46   on e.job_id = j.job_id
47   group by e.job_id;
```

Result Grid | Filter Rows: | Export: | Wrap

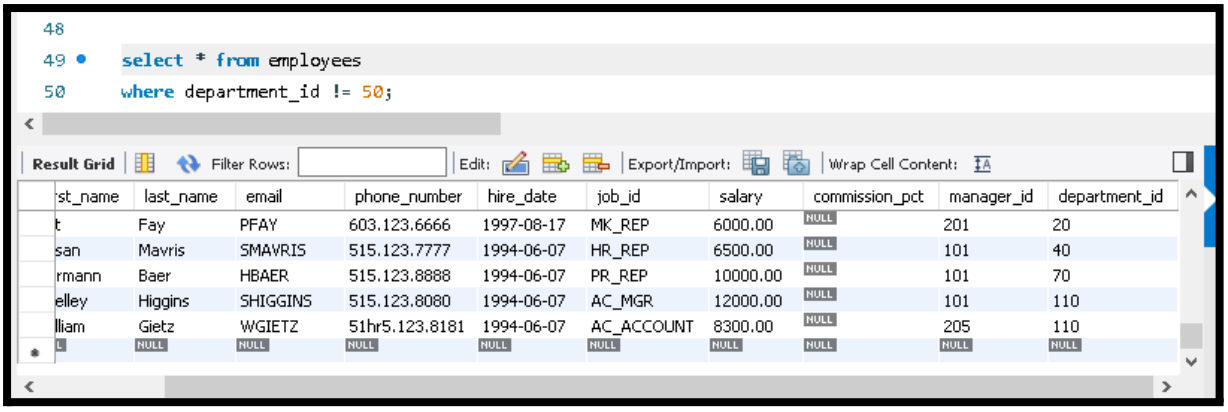
job_id	job_title
AC_ACCOUNT	Public Accountant
AC_MGR	Accounting Manager
AD_ASST	Administration Assistant
AD_PRES	President
AD_VP	Administration Vice President
FI_ACCOUNT	Accountant
FI_MGR	Finance Manager

Result 21

11. From the following table, write a SQL query to find those employees who do not belong to the department 2001. Return complete information about the

select * from employees

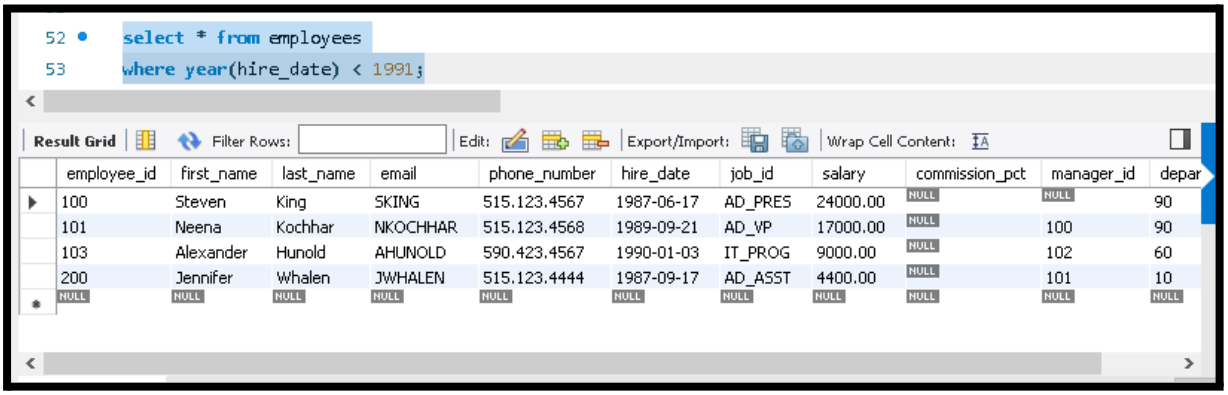
where department_id != 50;



12. From the following table, write a SQL query to find those employees who joined before 1991. Return complete information about the employees.

select * from employees

where year(hire_date) < 1991;



13. From the following table, write a SQL query to calculate the average salary of employees who work as analysts. Return average salary.

select avg(salary)

from employees e

INNER JOIN jobs j

ON e.job_id = j.job_id

where j.job_title = 'Programmer';

```
select avg(salary)
from employees e
INNER JOIN jobs j
ON e.job_id = j.job_id
where j.job_title = 'Programmer';
```

Result Grid | Filter Rows: | Export:

avg(salary)
5760.000000

14. From the following table, write a SQL query to find the details of the employee 'BLAZE'.

select * from employees

where first_name = "David";

```
select * from employees
where first_name = "David";
```

Result Grid | Filter Rows: | Edit: | Export/Import: | Wrap Cell Content:

employee_id	first_name	last_name	email	phone_number	hire_date	job_id	salary	commission_pct	manager_id	de
105	David	Austin	DAUSTIN	590.423.4569	1997-06-25	IT_PROG	4800.00	NULL	103	60
151	David	Bernstein	DBERNSTE	011.44.1344.345268	1997-03-24	SA_REP	9500.00	0.25	145	80
165	David	Lee	DLEE	011.44.1346.529268	2000-02-23	SA_REP	6800.00	0.10	147	80
NULL	NULL	NULL	NULL	NULL	NULL	NULL	NULL	NULL	NULL	NUL

15. From the following table, write a SQL query to identify employees whose commissions exceed their salaries. Return complete information about the employees.

select * from employees

where commission_pct is not Null;

```
63
64 •  select * from employees
65    where commission_pct is not Null;
```

Result Grid | Filter Rows: | Edit: | Export/Import: | Wrap Cell Content:

employee_id	first_name	last_name	email	phone_number	hire_date	job_id	salary	commission_pct	manager_id
145	John	Russell	JRUSSEL	011.44.1344.429268	1996-10-01	SA_MAN	14000.00	0.40	100
146	Karen	Partners	KPARTNER	011.44.1344.467268	1997-01-05	SA_MAN	13500.00	0.30	100
147	Alberto	Errazuriz	AERRAZUR	011.44.1344.429278	1997-03-10	SA_MAN	12000.00	0.30	100
148	Gerald	Cambrault	GCAMBRAU	011.44.1344.619268	1999-10-15	SA_MAN	11000.00	0.30	100
149	Eleni	Zlotkey	EZLOTKEY	011.44.1344.429018	2000-01-29	SA_MAN	10500.00	0.20	100
150	Peter	Tucker	PTUCKER	011.44.1344.129268	1997-01-30	SA_REP	10000.00	0.30	145

16. From the following table, write a SQL query to identify those employees whose salaries exceed 3000 after receiving a 25% salary increase. Return complete information about the employees.

select *,salary*1.25 as new_salary from employees

where salary*1.25 > 3000;

```
69
70 •  select *,salary*1.25 as new_salary from employees
71    where salary*1.25 > 3000;
72
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

employee_id	first_name	last_name	email	phone_number	hire_date	job_id	salary	commission_pct	manager_id
100	Steven	King	SKING	515.123.4567	1987-06-17	AD_PRES	24000.00	NULL	NULL
101	Neena	Kochhar	NKOCHHAR	515.123.4568	1989-09-21	AD_VP	17000.00	NULL	100
102	Lex	De Haan	LDEHAAN	515.123.4569	1993-01-13	AD_VP	17000.00	NULL	100
103	Alexander	Hunold	AHUNOLD	590.423.4567	1990-01-03	IT_PROG	9000.00	NULL	102
104	Bruce	Ernst	BERNST	590.423.4568	1991-05-21	IT_PROG	6000.00	NULL	103
105	David	Austin	DAUSTIN	590.423.4569	1997-06-25	IT_PROG	4800.00	NULL	103

17. From the following table, write a SQL query to find the names of the employees whose length is six. Return employee name.

select * from employees

where length(first_name) = 6;

```
72
73 •  select * from employees
74    where length(first_name) = 6;
```

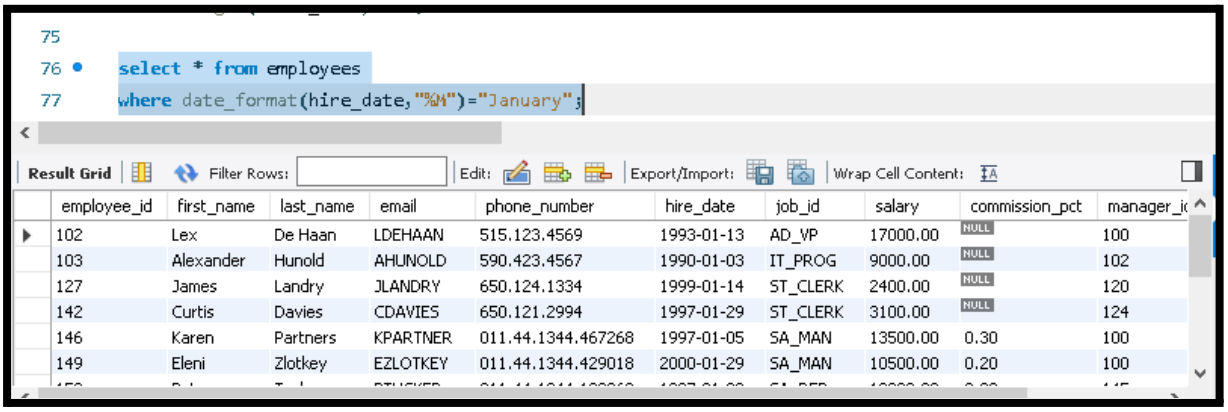
Result Grid | Filter Rows: | Edit: | Export/Import: | Wrap Cell Content:

employee_id	first_name	last_name	email	phone_number	hire_date	job_id	salary	commission_pct	manager_id
100	Steven	King	SKING	515.123.4567	1987-06-17	AD_PRES	24000.00	NULL	NULL
109	Daniel	Faviet	DFAVIET	515.124.4169	1994-08-16	FI_ACCOUNT	9000.00	NULL	108
111	Ismael	Sciarra	ISCIARRA	515.124.4369	1997-09-30	FI_ACCOUNT	7700.00	NULL	108
116	Shelli	Baida	SBAIDA	515.127.4563	1997-12-24	PU_CLERK	2900.00	NULL	114
123	Shanta	Vollman	SVOLLMAN	650.123.4234	1997-10-10	ST_MAN	6500.00	NULL	100
128	Steven	Markle	SMARKLE	650.124.1434	2000-03-08	ST_CLERK	2200.00	NULL	120

18. From the following table, write a SQL query to find out which employees joined in the month of January. Return complete information about the employees.

select * from employees

where date_format(hire_date,"%M")="January";



```
75
76 •  select * from employees
77    where date_format(hire_date,"%M")="January";
```

Result Grid | Filter Rows: | Edit: | Export/Import: | Wrap Cell Content:

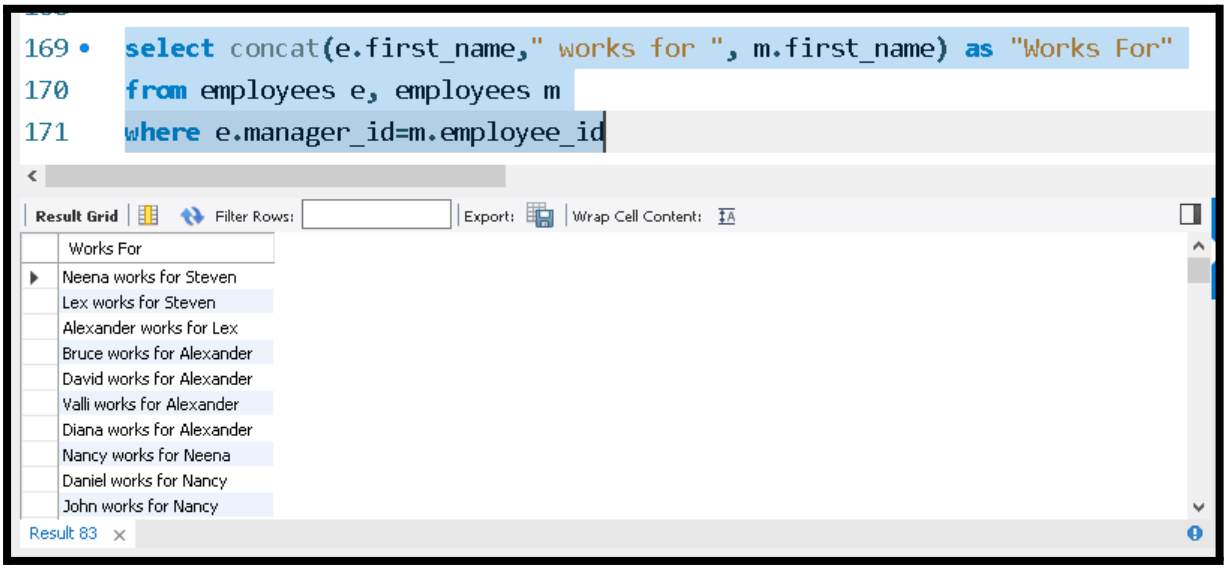
employee_id	first_name	last_name	email	phone_number	hire_date	job_id	salary	commission_pct	manager_id
102	Lex	De Haan	LDEHAAN	515.123.4569	1993-01-13	AD_VP	17000.00	NULL	100
103	Alexander	Hunold	AHUNOLD	590.423.4567	1990-01-03	IT_PROG	9000.00	NULL	102
127	James	Landry	JLANDRY	650.124.1334	1999-01-14	ST_CLERK	2400.00	NULL	120
142	Curtis	Davies	CDAVIES	650.121.2994	1997-01-29	ST_CLERK	3100.00	NULL	124
146	Karen	Partners	KPARTNER	011.44.1344.467268	1997-01-05	SA_MAN	13500.00	0.30	100
149	Eleni	Zlotkey	EZLOTKEY	011.44.1344.429018	2000-01-29	SA_MAN	10500.00	0.20	100

19. From the following table, write a SQL query to separate the names of employees and their managers by the string 'works for'.

select concat(e.first_name," works for ", m.first_name) as "Works For"

from employees e, employees m

where e.manager_id=m.employee_id



```
169 •  select concat(e.first_name," works for ", m.first_name) as "Works For"
170    from employees e, employees m
171    where e.manager_id=m.employee_id
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

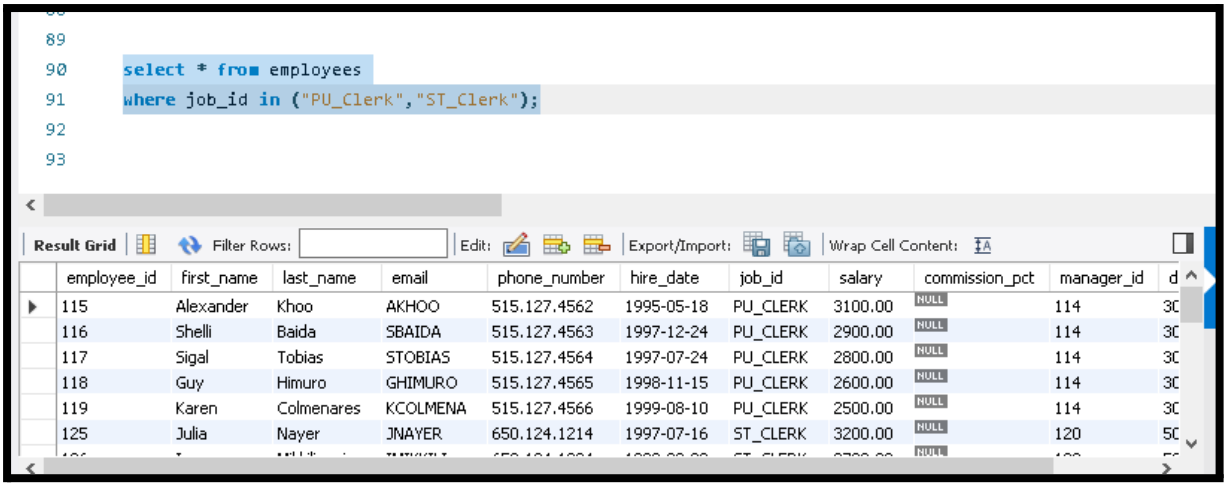
Works For
Neena works for Steven
Lex works for Steven
Alexander works for Lex
Bruce works for Alexander
David works for Alexander
Valli works for Alexander
Diana works for Alexander
Nancy works for Neena
Daniel works for Nancy
John works for Nancy

Result 83

20. From the following table, write a SQL query to find those employees whose designation is ‘CLERK’. Return complete information about the employees.

select * from employees

where job_id in ("PU_Clerk","ST_Clerk");



```
89
90      select * from employees
91      where job_id in ("PU_Clerk","ST_Clerk");
92
93
```

Result Grid | Filter Rows: | Edit: | Export/Import: | Wrap Cell Content:

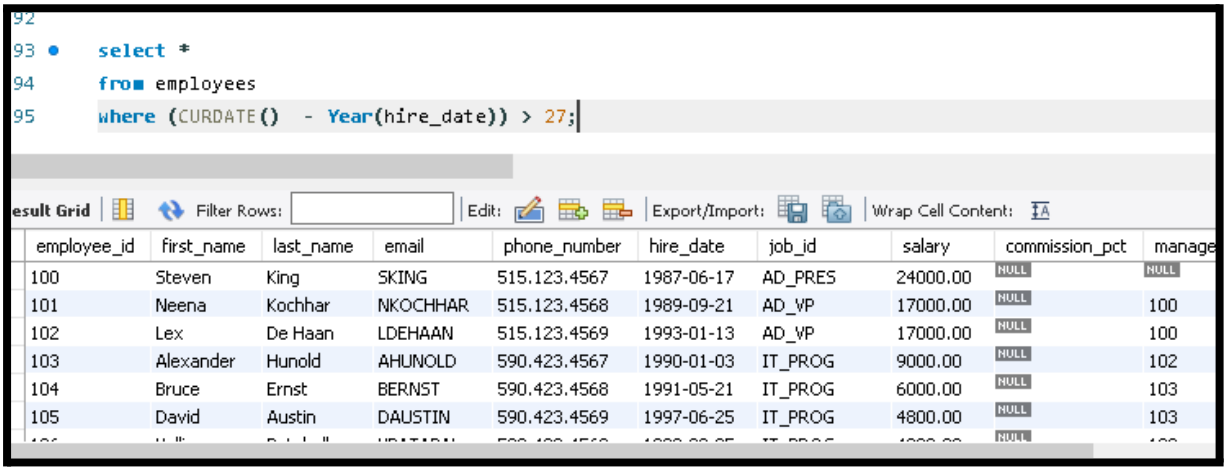
employee_id	first_name	last_name	email	phone_number	hire_date	job_id	salary	commission_pct	manager_id	d
115	Alexander	Khoo	AKHOO	515.127.4562	1995-05-18	PU_CLERK	3100.00	NULL	114	3(
116	Shelli	Baida	SBAIDA	515.127.4563	1997-12-24	PU_CLERK	2900.00	NULL	114	3(
117	Sigal	Tobias	STOBIAS	515.127.4564	1997-07-24	PU_CLERK	2800.00	NULL	114	3(
118	Guy	Himuro	GHIMURO	515.127.4565	1998-11-15	PU_CLERK	2600.00	NULL	114	3(
119	Karen	Colmenares	KCOLMENA	515.127.4566	1999-08-10	PU_CLERK	2500.00	NULL	114	3(
125	Julia	Nayer	JNAYER	650.124.1214	1997-07-16	ST_CLERK	3200.00	NULL	120	5(

21. From the following table, write a SQL query to identify employees with more than 27 years of experience. Return complete information about the employees.

select *

from employees

where (CURDATE() - Year(hire_date)) > 27;



```
92
93 •    select *
94      from employees
95      where (CURDATE()  - Year(hire_date)) > 27;
```

esult Grid | Filter Rows: | Edit: | Export/Import: | Wrap Cell Content:

employee_id	first_name	last_name	email	phone_number	hire_date	job_id	salary	commission_pct	manage
100	Steven	King	SKING	515.123.4567	1987-06-17	AD_PRES	24000.00	NULL	NULL
101	Neena	Kochhar	NKOCHHAR	515.123.4568	1989-09-21	AD_VP	17000.00	NULL	100
102	Lex	De Haan	LDEHAAN	515.123.4569	1993-01-13	AD_VP	17000.00	NULL	100
103	Alexander	Hunold	AHUNOLD	590.423.4567	1990-01-03	IT_PROG	9000.00	NULL	102
104	Bruce	Ernst	BERNST	590.423.4568	1991-05-21	IT_PROG	6000.00	NULL	103
105	David	Austin	DAUSTIN	590.423.4569	1997-06-25	IT_PROG	4800.00	NULL	103

22. From the following table, write a SQL query to find those employees whose salaries are less than 3500. Return complete information about the employees.

select * from employees

where salary < 3500;

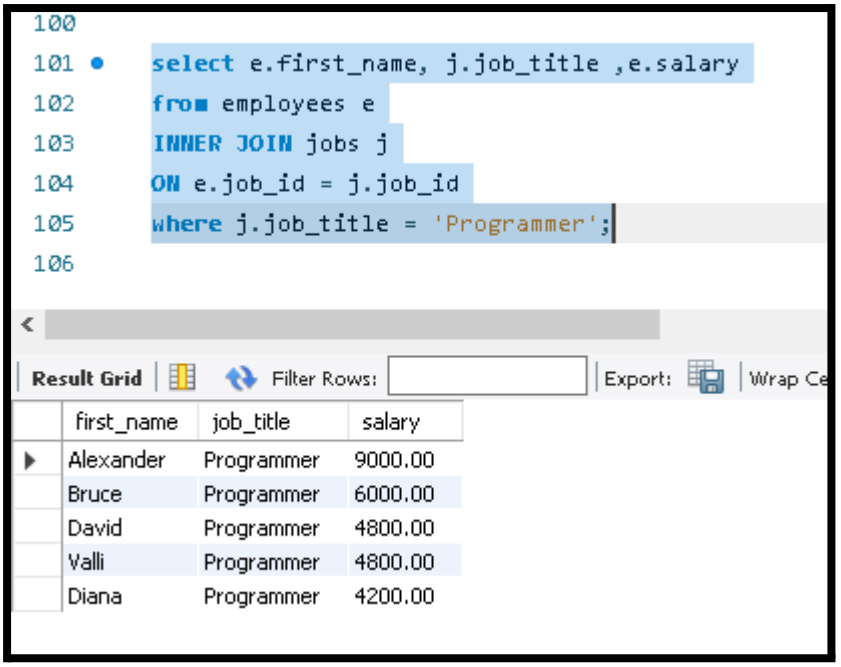
```
97
98 •   select * from employees
99      where salary < 3500;
```

Result Grid | Filter Rows: | Edit: | Export/Import: | Wrap Cell Content:

employee_id	first_name	last_name	email	phone_number	hire_date	job_id	salary	commission
115	Alexander	Khoo	AKHOO	515.127.4562	1995-05-18	PU_CLERK	3100.00	NULL
116	Shelli	Baida	SBAIDA	515.127.4563	1997-12-24	PU_CLERK	2900.00	NULL
117	Sigal	Tobias	STOBIAS	515.127.4564	1997-07-24	PU_CLERK	2800.00	NULL
118	Guy	Himuro	GHIMURO	515.127.4565	1998-11-15	PU_CLERK	2600.00	NULL
119	Karen	Colmenares	KCOLMENA	515.127.4566	1999-08-10	PU_CLERK	2500.00	NULL
125	Julia	Nayer	JNAYER	650.124.1214	1997-07-16	ST_CLERK	3200.00	NULL

23. From the following table, write a SQL query to find the employee whose designation is 'ANALYST'. Return employee name, job name and salary.

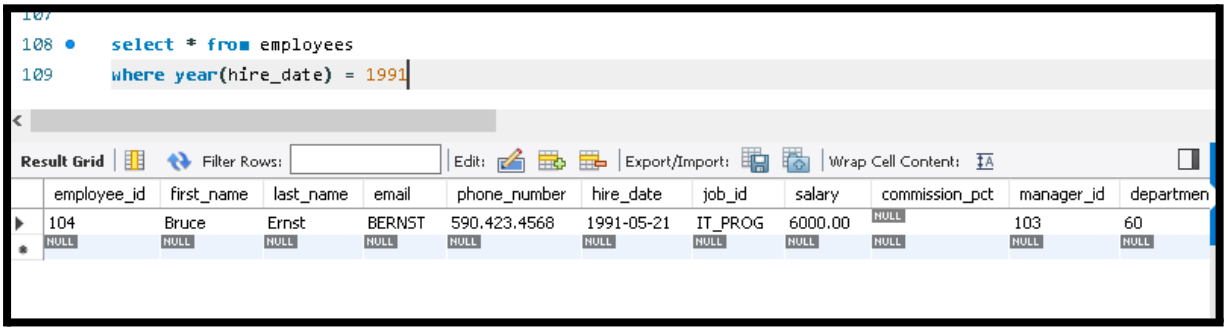
```
select e.first_name, j.job_title ,e.salary

from employees e

INNER JOIN jobs j

ON e.job_id = j.job_id

where j.job_title = 'Programmer';
```



24. From the following table, write a SQL query to identify those employees who joined the company in 1991. Return complete information about the employees.

select * from employees

where year(hire_date) = 1991



25. From the following table, write a SQL query to find those employees who joined before 1st April 1991. Return employee ID, employee name, hire date and salary.

select employee_id,first_name,last_name,hire_date,salary from employees

where hire_date < '1991-04-01';

```
13    select employee_id,first_name,last_name,hire_date,salary from employees
14    where hire_date < '1991-04-01';
```

Result Grid | Filter Rows: | Edit: | Export/Import: | Wrap Cell Content

employee_id	first_name	last_name	hire_date	salary
100	Steven	King	1987-06-17	24000.00
101	Neena	Kochhar	1989-09-21	17000.00
103	Alexander	Hunold	1990-01-03	9000.00
200	Jennifer	Whalen	1987-09-17	4400.00
NULL	NULL	NULL	NULL	NULL

26. From the following table, write a SQL query to identify the employees who do not report to a manager. Return employee name, job name.

select * from employees

where manager_id is NULL;

```
116
117 •  select * from employees
118    where manager_id is NULL;
```

Result Grid | Filter Rows: | Edit: | Export/Import: | Wrap Cell Content:

employee_id	first_name	last_name	email	phone_number	hire_date	job_id	salary	commission_pc
100	Steven	King	SKING	515.123.4567	1987-06-17	AD_PRES	24000.00	NULL
NULL	NULL	NULL	NULL	NULL	NULL	NULL	NULL	NULL

27. From the following table, write a SQL query to find the employees who joined on the 1st of May 1991. Return complete information about the employees.

select * from employees

where hire_date = '1991-05-01';

```
119
120 •    select * from employees
121      where hire_date = '1991-05-01';
```

Result Grid | Filter Rows: | Edit: | Export/Import: | Wrap Cell Content:

employee_id	first_name	last_name	email	phone_number	hire_date	job_id	salary	commission_pct	manager_
NULL	NULL	NULL	NULL	NULL	NULL	NULL	NULL	NULL	NULL

28. From the following table, write a SQL query to identify the experience of the employees who work under the manager whose ID number is 68319. Return employee ID, employee name, salary, experience.

select employee_id, first_name,last_name, salary , (year(curdate()) - year(hire_date)) as Experience

from employees

where manager_id = 108;

```
24
25      select employee_id, first_name,last_name, salary , (year(curdate()) - year(hire_date)) as Experience
26      from employees
27      where manager_id = 108;
```

esult Grid | Filter Rows: | Export: | Wrap Cell Content:

employee_id	first_name	last_name	salary	Experience
109	Daniel	Faviet	9000.00	28
110	John	Chen	8200.00	25
111	Ismael	Sciarra	7700.00	25
112	Jose Manuel	Urman	7800.00	24
113	Luis	Popp	6900.00	23

29. From the following table, write a SQL query to find out which employees earn more than 100 per day as a salary. Return employee ID, employee name, salary, and experience.

select employee_id , first_name, last_name, salary , (year(curdate()) - year(hire_date)) as Experience

from employees

where salary/30 > 100

```
132
133     select employee_id , first_name, last_name, salary , (year(curdate()) - year(hire_date)) as Experience
134     from employees
135     where salary/30 > 100
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

employee_id	first_name	last_name	salary	Experience
100	Steven	King	24000.00	35
101	Neena	Kochhar	17000.00	33
102	Lex	De Haan	17000.00	29
103	Alexander	Hunold	9000.00	32
104	Bruce	Ernst	6000.00	31
105	David	Austin	4800.00	25
106	Valli	Pataballa	4800.00	24

30. From the following table, write a SQL query to identify those employees who retired after 31-Dec-99, completing eight years of service. Return employee name.

select e.first_name, e.last_name

from employees e

inner join job_history j

on e.employee_id = j.employee_id

where j.end_date > '1999-12-31' and (year(j.end_date) - year(j.start_date)) = 8;

```
140
141     select e.first_name, e.last_name
142     from employees e
143     inner join job_history j
144     on e.employee_id = j.employee_id
145     where j.end_date > '1999-12-31' and (year(j.end_date) - year(j.start_date)) = 8;
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

first_name	last_name

31. From the following table, write a SQL query to identify the employees whose salaries are odd. Return complete information about the employees.

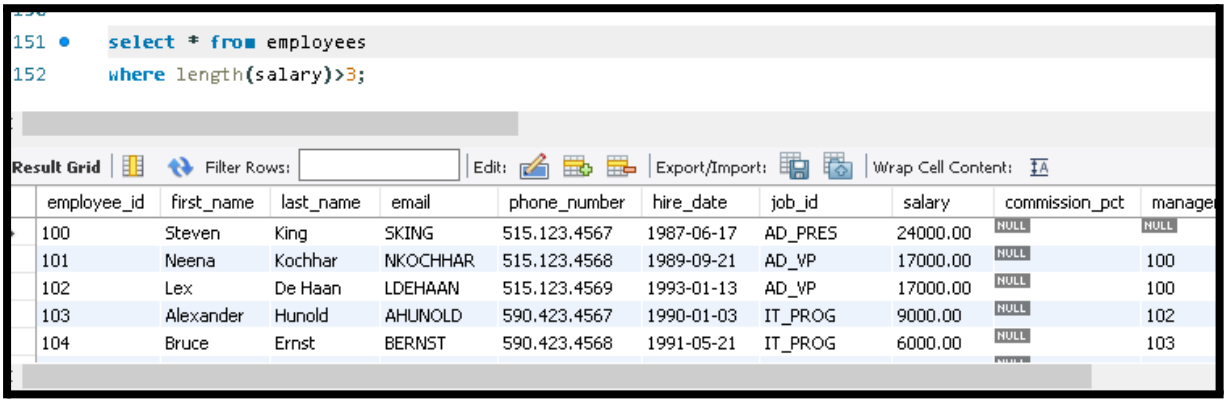
select * from employees

where salary%2 <> 0;

32. From the following table, write a SQL query to identify employees whose salaries contain only three digits. Return complete information about the employees.

select * from employees

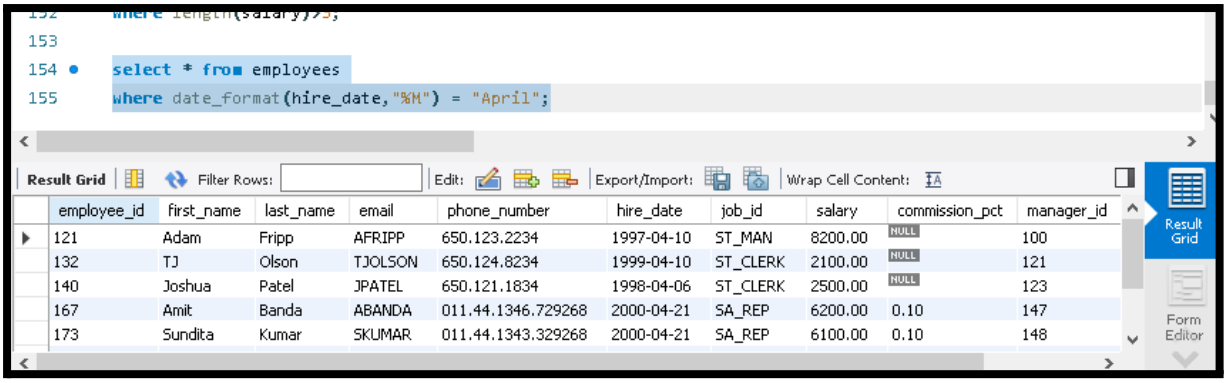
where length(salary)>3;



33. From the following table, write a SQL query to find those employees who joined in the month of APRIL. Return complete information about the employees.

select * from employees

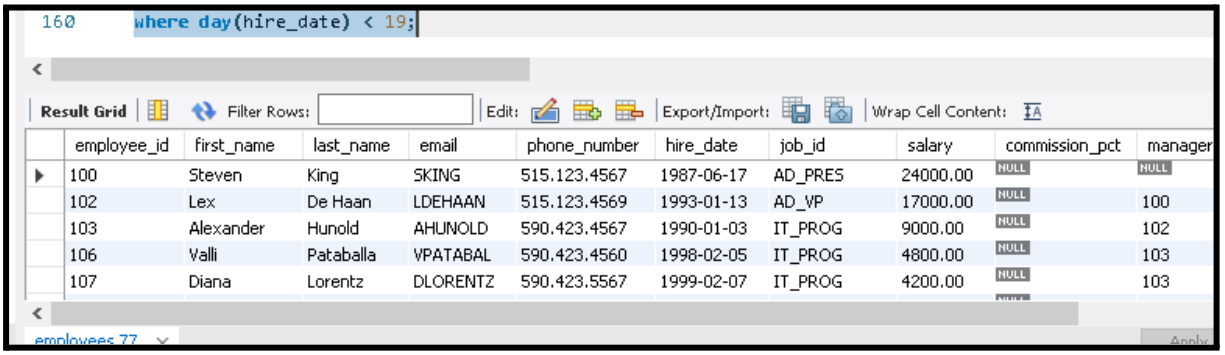
where date_format(hire_date,"%M") = "April";



34. From the following table, write a SQL query to find out which employees joined the company before the 19th of the month. Return complete information about the employees.

select * from employees

where day(hire_date) < 19;



35. From the following table, write a SQL query to identify those employees who have been working as a SALESMAN and month portion of the experience is more than 10. Return complete information about the employees.

select *

from employees e

inner join jobs j

on e.job_id = j.job_id

where j.job_title = "Sales Manager" and (year(curdate()) - year(e.hire_date)) > 10;

```
63 •  select *
64    from employees e
65    inner join jobs j
66    on e.job_id = j.job_id
67    where j.job_title = "Sales Manager" and (year(curdate()) - year(e.hire_date)) > 10;
```

esult Grid | Filter Rows: | Export: | Wrap Cell Content:

employee_id	first_name	last_name	email	phone_number	hire_date	job_id	salary	commission_pct	manager_i
145	John	Russell	JRUSSEL	011.44.1344.429268	1996-10-01	SA_MAN	14000.00	0.40	100
146	Karen	Partners	KPARTNER	011.44.1344.467268	1997-01-05	SA_MAN	13500.00	0.30	100
147	Alberto	Errazuriz	AERRAZUR	011.44.1344.429278	1997-03-10	SA_MAN	12000.00	0.30	100
148	Gerald	Cambrault	GCAMBRAU	011.44.1344.619268	1999-10-15	SA_MAN	11000.00	0.30	100
149	Eleni	Zlotkey	EZLOTKEY	011.44.1344.429018	2000-01-29	SA_MAN	10500.00	0.20	100