



Universidad Autónoma de Chihuahua

Facultad de Ingeniería

Asignatura: Fundamentos de bases de datos

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Act. 2 Proyección/Selección

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Realizar un documento formal en formato PDF con la respuesta a los requerimientos(Se deberá incluir la redacción del problema, la consulta de SQL y el resultado para cada consulta de la actividad)

1. Obtener employee_id y el first_name de los empleados, que su nombre contenga el carácter “R” en cualquier posición.

The screenshot shows the Oracle SQL Developer interface. The 'Conexiones' pane on the left lists 'HR' and 'System' connections. The 'Hoja de Trabajo de SQL' pane contains the following SQL query:

```
select employee_id, first_name
from employees
WHERE upper (first_name) LIKE '%R%'
```

The 'Resultado de la Consulta' pane shows the results of the query, displaying 10 rows of employee data where the first name contains the letter 'R'.

EMPLOYEE_ID	FIRST_NAME
1	166 Sundar
2	204 Hermann
3	192 Sarah
4	129 Laura
5	169 Harrison
6	148 Gerald
7	119 Karen
8	142 Curtis
9	189 Jennifer
10	104 Bruce

2. Obtener employee_id, first_name, job_id y department_id de los empleados, ordenados por job_id y department_id.

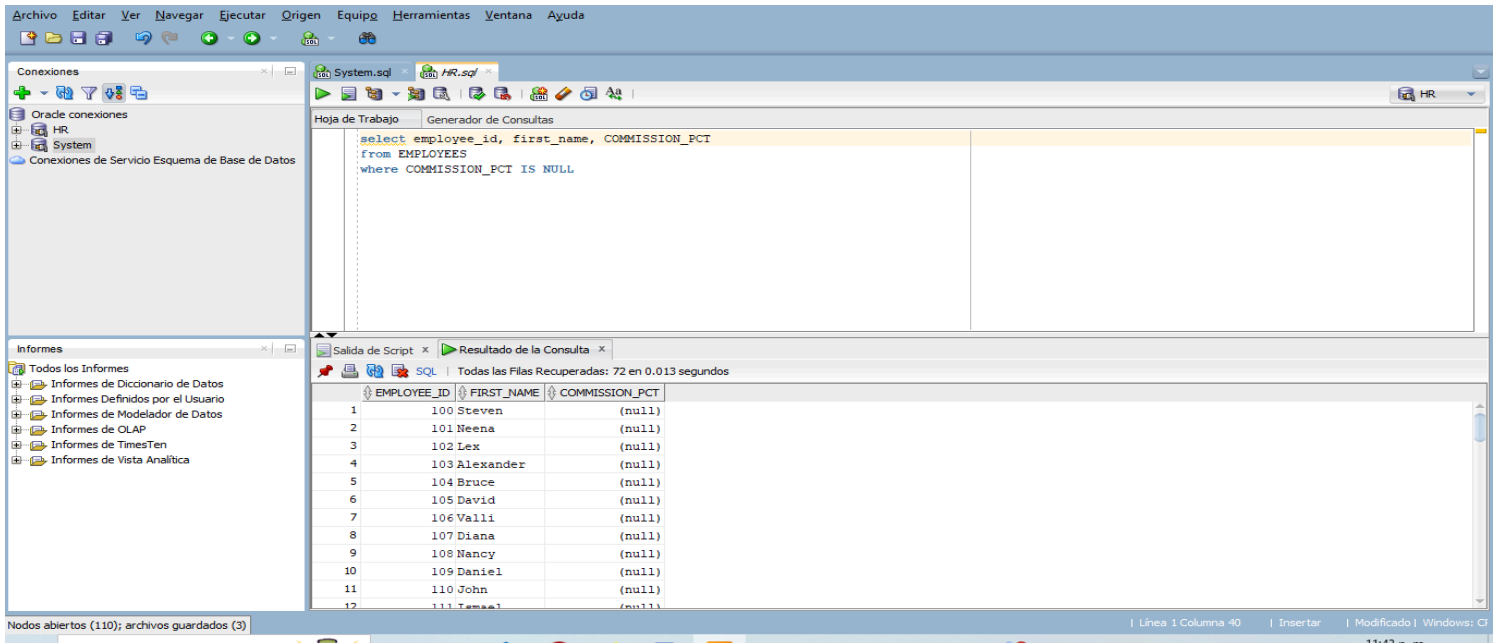
The screenshot shows the Oracle SQL Developer interface. The 'Conexiones' pane on the left lists 'HR' and 'System' connections. The 'Hoja de Trabajo de SQL' pane contains the following SQL query:

```
select EMPLOYEE_ID, FIRST_NAME, job_id, department_id
from EMPLOYEES
ORDER BY job_id, department_id
```

The 'Resultado de la Consulta' pane shows the results of the query, displaying 12 rows of employee data ordered by job_id and department_id.

EMPLOYEE_ID	FIRST_NAME	JOB_ID	DEPARTMENT_ID
1	206 William	AC_ACCOUNT	110
2	205 Shelley	AC_MGR	110
3	200 Jennifer	AD_ASST	10
4	100 Steven	AD_PRES	90
5	102 Lex	AD_VP	90
6	101 Neena	AD_VP	90
7	110 John	FI_ACCOUNT	100
8	109 Daniel	FI_ACCOUNT	100
9	113 Luis	FI_ACCOUNT	100
10	111 Ismael	FI_ACCOUNT	100
11	112 Jose Manuel	FI_ACCOUNT	100
12	108 Nancy	FI_MGR	100

3. Obtener employee_id, first_name y comisión_pct de los empleados que no tienen asignado un porcentaje de comisión.



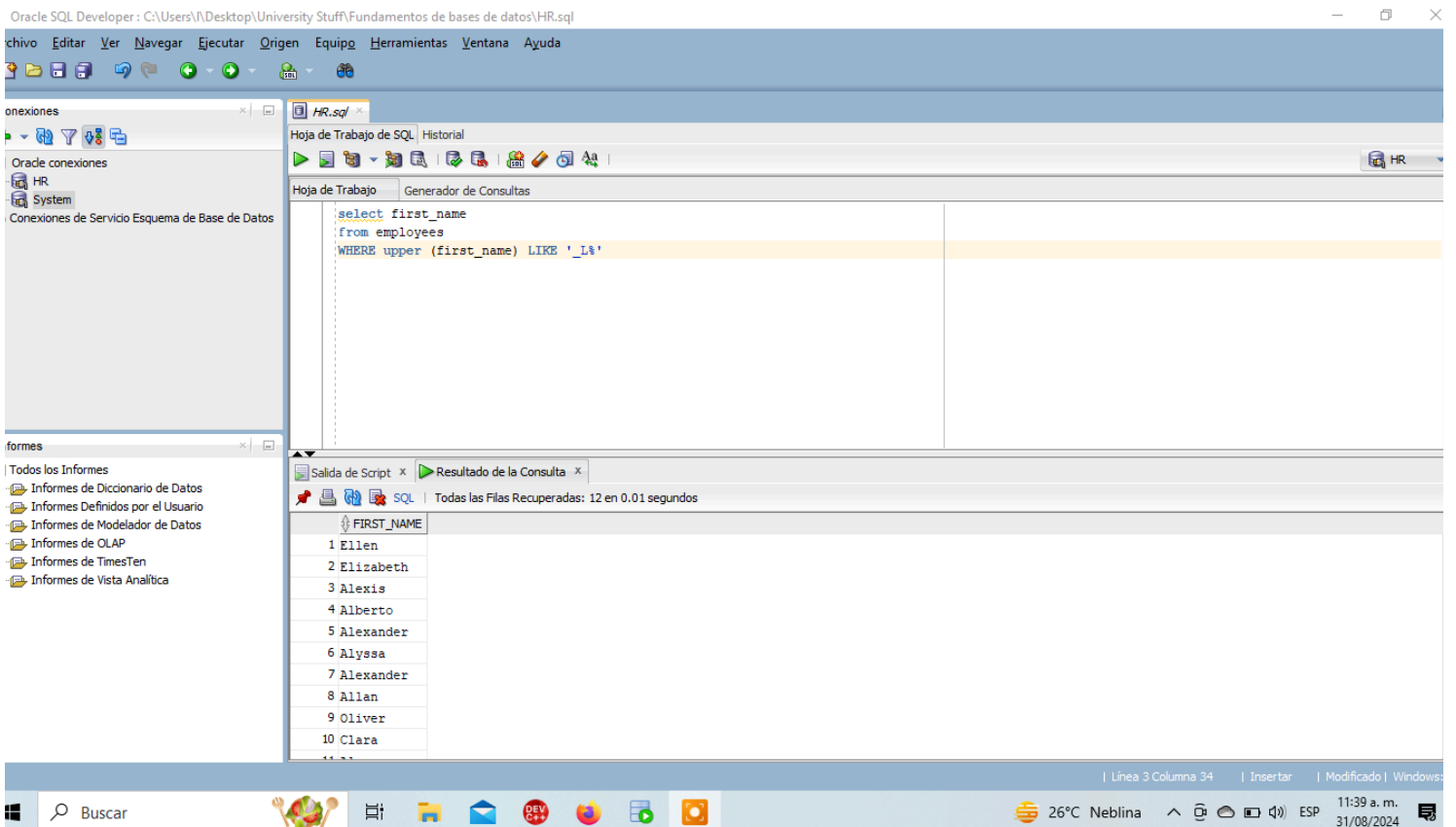
The screenshot shows the Oracle SQL Developer interface. The 'Conexiones' pane on the left lists 'HR' and 'System'. The 'Informes' pane shows various report templates. The main window displays a SQL query in the 'Hoja de Trabajo' tab:

```
select employee_id, first_name, COMMISSION_PCT
from EMPLOYEES
where COMMISSION_PCT IS NULL
```

The 'Resultado de la Consulta' pane shows the results of the query, with 72 rows recovered in 0.013 seconds. The results are displayed in a table with columns: EMPLOYEE_ID, FIRST_NAME, and COMMISSION_PCT.

EMPLOYEE_ID	FIRST_NAME	COMMISSION_PCT
1	100 Steven	(null)
2	101 Neena	(null)
3	102 Lex	(null)
4	103 Alexander	(null)
5	104 Bruce	(null)
6	105 David	(null)
7	106 Valli	(null)
8	107 Diana	(null)
9	108 Nancy	(null)
10	109 Daniel	(null)
11	110 John	(null)
12	111 Tamas	(null)

4. Obtener el first_name de aquellos empleados que su nombre contenga una letra 'L' en la segunda posición



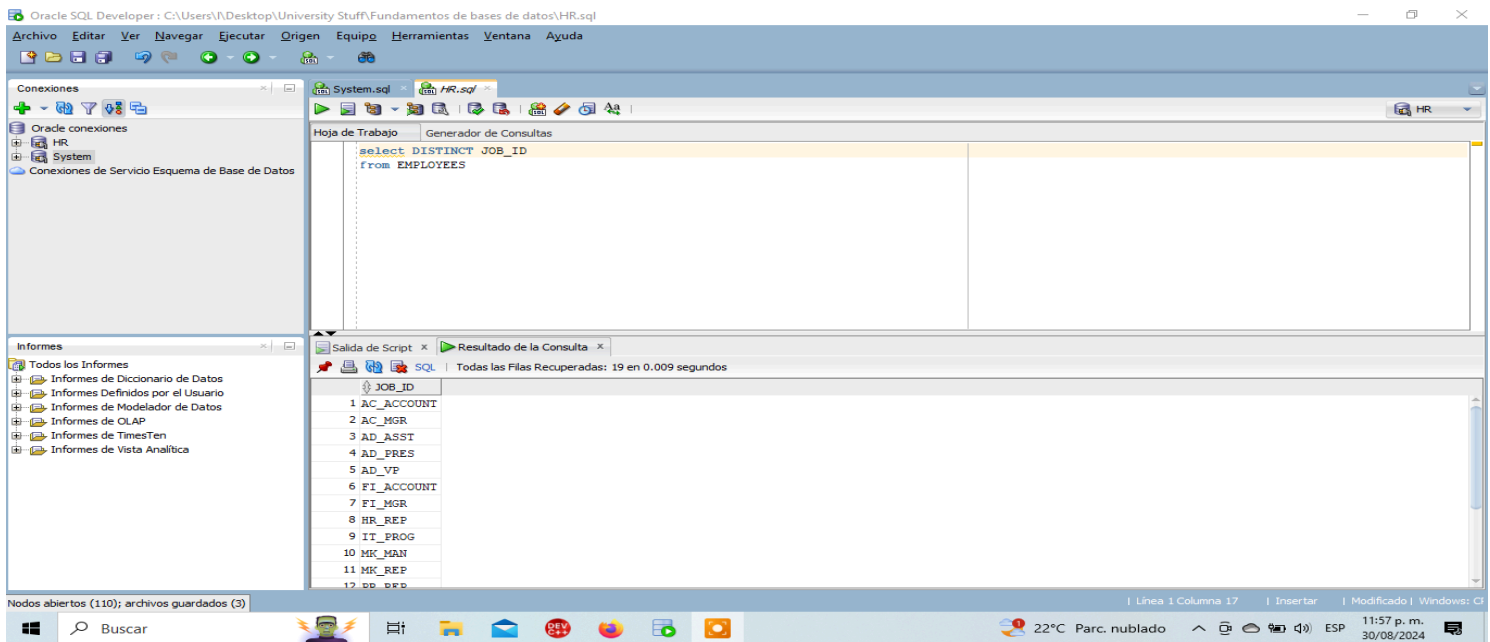
The screenshot shows the Oracle SQL Developer interface. The 'Conexiones' pane on the left lists 'HR' and 'System'. The 'Informes' pane shows various report templates. The main window displays a SQL query in the 'Hoja de Trabajo' tab:

```
select first_name
from employees
WHERE upper (first_name) LIKE '_L'
```

The 'Resultado de la Consulta' pane shows the results of the query, with 12 rows recovered in 0.01 seconds. The results are displayed in a table with columns: FIRST_NAME.

FIRST_NAME
1 Ellen
2 Elizabeth
3 Alexis
4 Alberto
5 Alexander
6 Alyssa
7 Alexander
8 Allan
9 Oliver
10 Clara

5. Obtener un listado de los puestos(job_id) ocupados en la organización (no repetición)



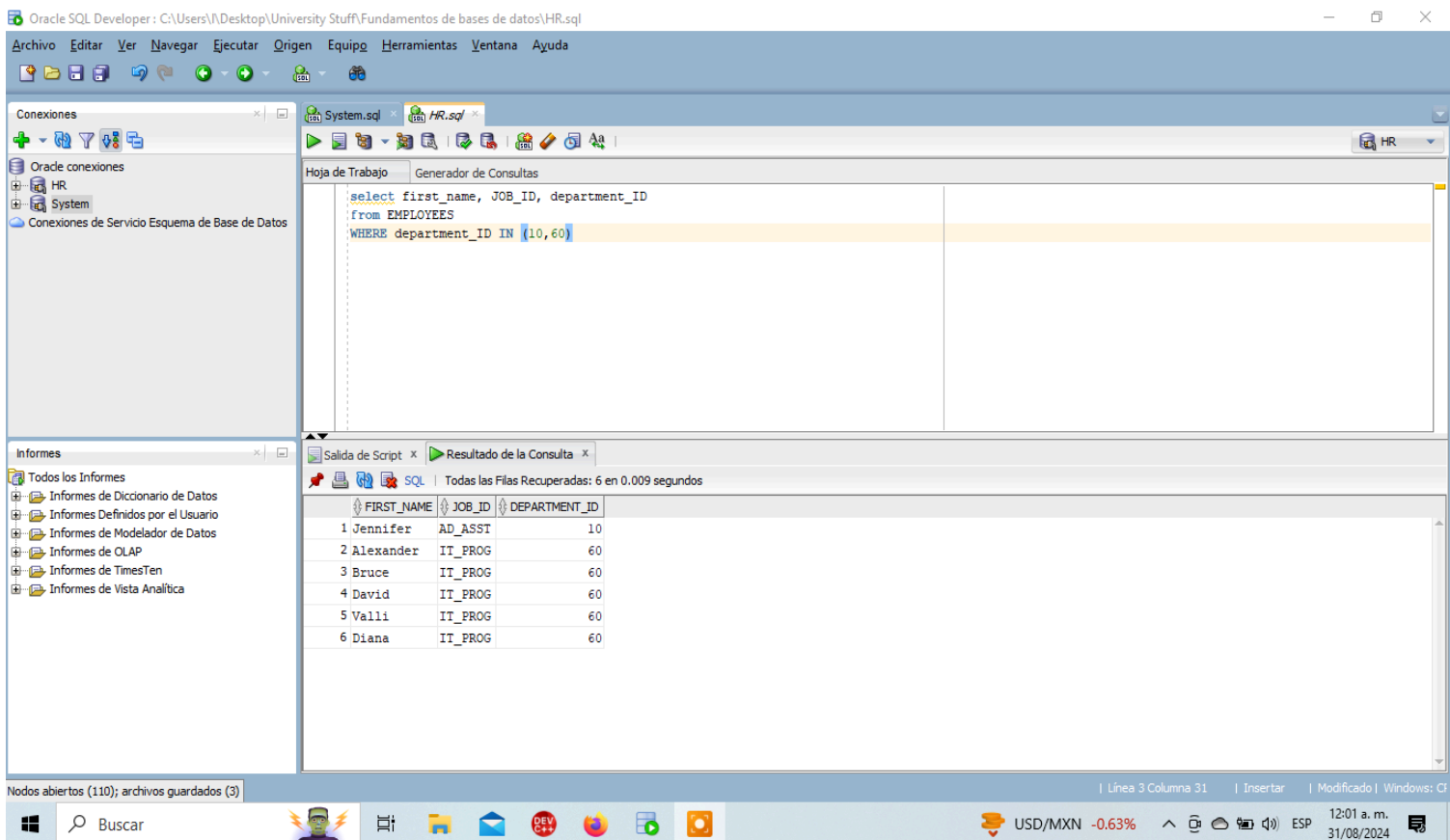
The screenshot shows the Oracle SQL Developer interface. The 'Hoja de Trabajo' (Worksheet) tab is active, displaying the following SQL query:

```
select DISTINCT JOB_ID
from EMPLOYEES
```

The 'Resultado de la Consulta' (Query Result) tab shows the output of the query, listing 12 distinct job IDs:

JOB_ID
1 AC_ACCOUNT
2 AC_MGR
3 AD_ASST
4 AD_PRES
5 AD_VP
6 FI_ACCOUNT
7 FI_MGR
8 HR_REP
9 IT_PROG
10 MK_MAN
11 MK_REP
12 PP_REP

6. Obtener de los departamentos 10 y 60, el first_name , job_id y el deparment_id de los empleados que están asignados a dichos departamentos



The screenshot shows the Oracle SQL Developer interface. The 'Hoja de Trabajo' (Worksheet) tab is active, displaying the following SQL query:

```
select first_name, JOB_ID, department_ID
from EMPLOYEES
WHERE department_ID IN (10,60)
```

The 'Resultado de la Consulta' (Query Result) tab shows the output of the query, listing 6 employees assigned to departments 10 and 60:

FIRST_NAME	JOB_ID	DEPARTMENT_ID
1 Jennifer	AD_ASST	10
2 Alexander	IT_PROG	60
3 Bruce	IT_PROG	60
4 David	IT_PROG	60
5 Valli	IT_PROG	60
6 Diana	IT_PROG	60

7. Obtener el first_name y commission_pct de los empleados que tienen un porcentaje de comisión mayor 0.3.

The screenshot shows the Oracle SQL Developer interface. The 'Conexiones' pane on the left lists 'HR' and 'System'. The 'Hoja de Trabajo' pane contains the following SQL query:

```
select first_name, COMMISSION_PCT
from EMPLOYEES
WHERE COMMISSION_PCT > 0.3
```

The 'Resultado de la Consulta' pane displays the results of the query:

FIRST_NAME	COMMISSION_PCT
1 John	0.4
2 Janette	0.35
3 Patrick	0.35
4 Allan	0.35

The status bar at the bottom indicates 'Todas las Filas Recuperadas: 4 en 0.009 segundos'.

8. Obtener el first_name y salario de los empleados del departamento 50, ordenados descendientemente por salary.

The screenshot shows the Oracle SQL Developer interface. The 'Conexiones' pane on the left lists 'HR' and 'System'. The 'Hoja de Trabajo' pane contains the following SQL query:

```
select FIRST_NAME, SALARY
from EMPLOYEES
WHERE department_id IN (50)
ORDER BY SALARY DESC
```

The 'Resultado de la Consulta' pane displays the results of the query:

FIRST_NAME	SALARY
1 Adam	8200
2 Matthew	8000
3 Payam	7900
4 Shanta	6500
5 Kevin	5800
6 Nandita	4200
7 Alexis	4100
8 Sarah	4000
9 Britney	3900
10 Kelly	3800
11 Jennifer	3600
12 Dena	3600

The status bar at the bottom indicates 'Todas las Filas Recuperadas: 45 en 0.009 segundos'.

9. Obtener el first_name de los empleados, que su nombre tiene una longitud 4 caracteres.

The screenshot shows the Oracle SQL Developer interface. The 'Conexiones' pane on the left lists 'HR' and 'System'. The 'Hoja de Trabajo' pane contains the following SQL query:

```
select FIRST_NAME  
from EMPLOYEES  
WHERE FIRST_NAME LIKE '____'
```

The 'Resultado de la Consulta' pane shows the results of the query, displaying a table with 9 rows and 1 column (FIRST_NAME):

FIRST_NAME
1 Amit
2 John
3 Jean
4 Adam
5 Jack
6 Lisa
7 Luis
8 John
9 John

The status bar at the bottom indicates 'Todas las Filas Recuperadas: 9 en 0.014 segundos'.

10. Obtener el first_name y manager_id de los subordinados de los administradores 148 y 149, ordenados por el first_name.

The screenshot shows the Oracle SQL Developer interface. The 'Conexiones' pane on the left lists 'HR' and 'System'. The 'Hoja de Trabajo' pane contains the following SQL query:

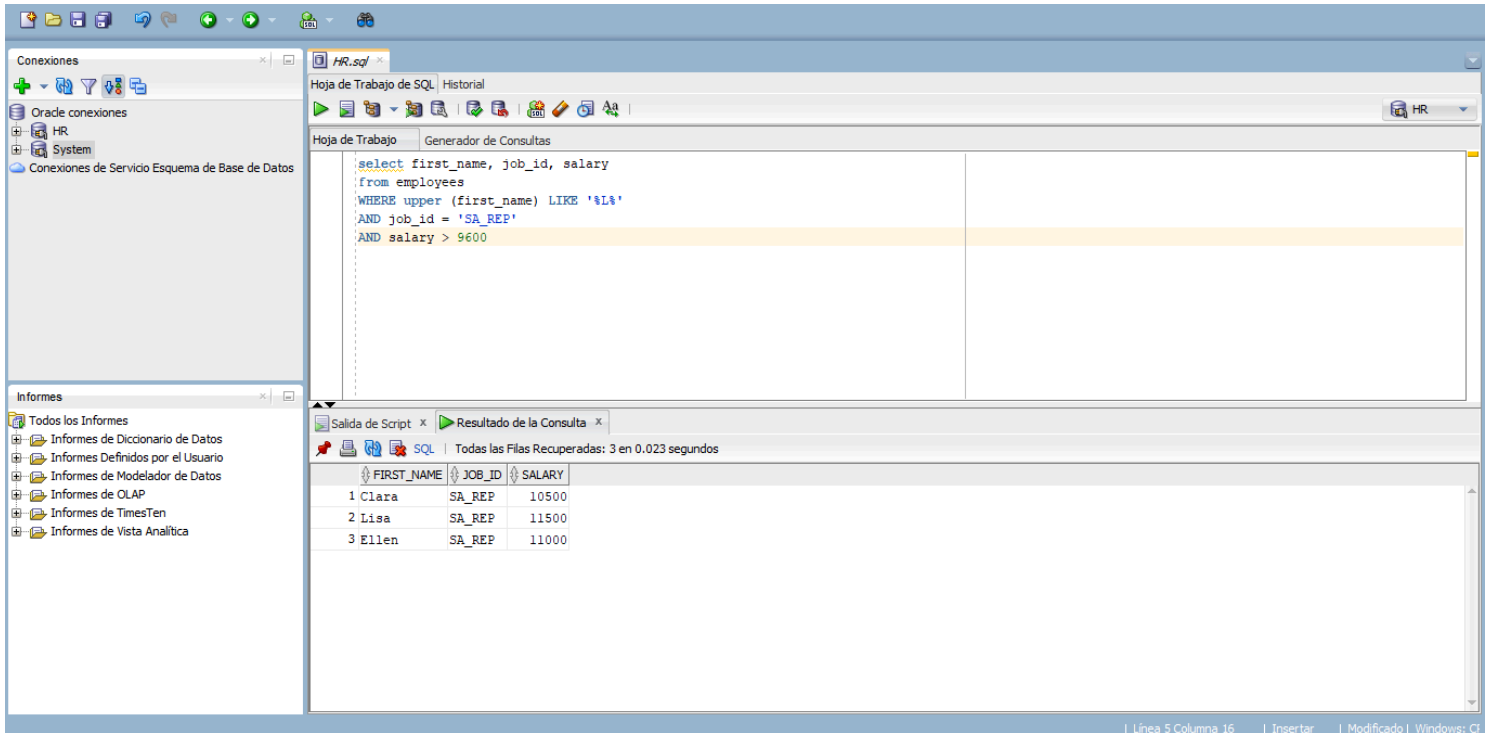
```
select FIRST_NAME, MANAGER_ID  
from EMPLOYEES  
WHERE MANAGER_ID IN (148, 149)  
ORDER BY FIRST_NAME
```

The 'Resultado de la Consulta' pane shows the results of the query, displaying a table with 12 rows and 2 columns (FIRST_NAME, MANAGER_ID):

FIRST_NAME	MANAGER_ID
1 Alyssa	149
2 Charles	149
3 Elizabeth	148
4 Ellen	149
5 Harrison	148
6 Jack	149
7 Jonathon	149
8 Kimberly	149
9 Lisa	148
10 Sundita	148
11 Tayer	148
12 William	148

The status bar at the bottom indicates 'Todas las Filas Recuperadas: 12 en 0.015 segundos'.

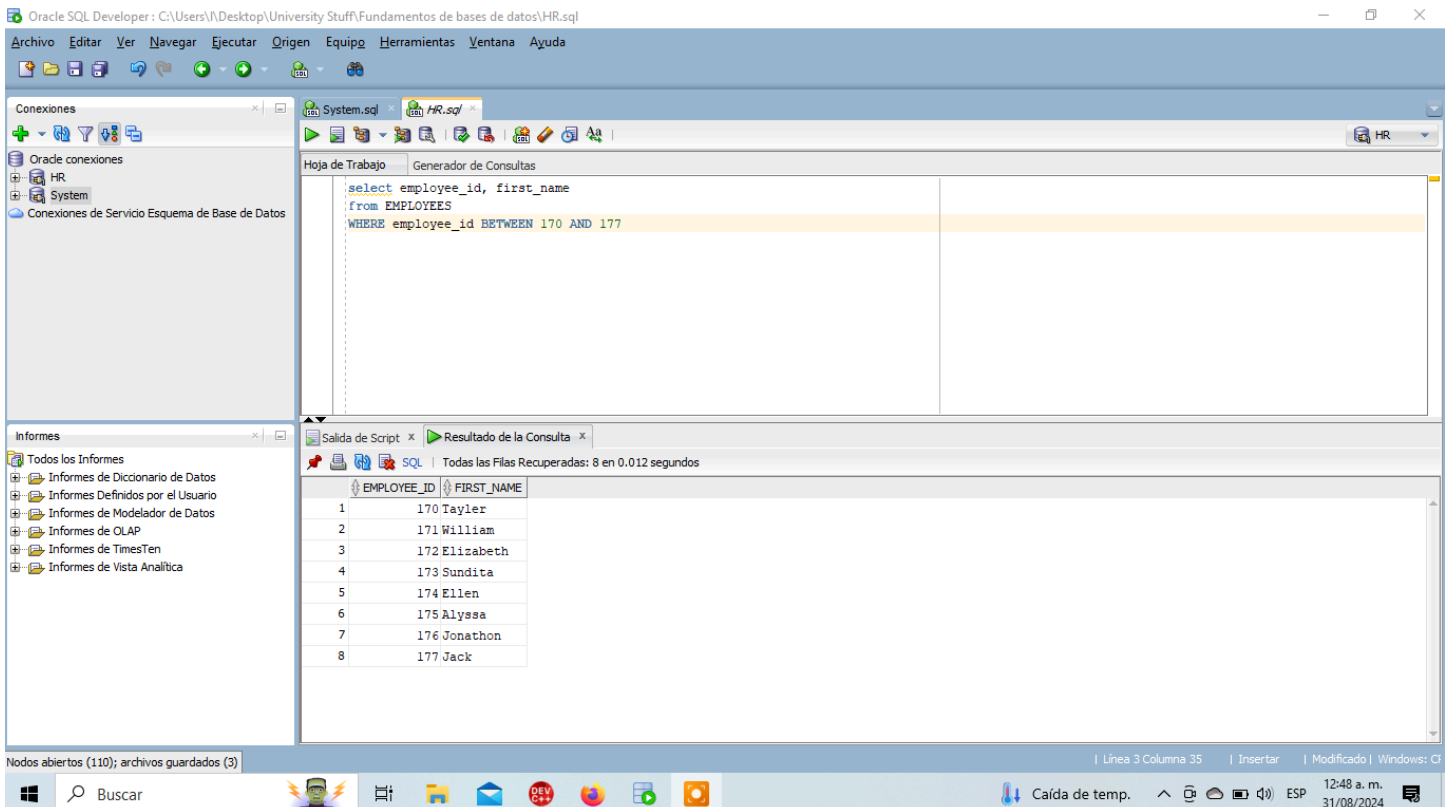
11. Obtener el first_name, job_id, y salary de aquellos empleados que first_name contenga el carácter 'L' en cualquier posición, el job_id sea 'SA_REP' y su salary sea mayor a 9600



The screenshot shows the Oracle SQL Developer interface. The 'Conexiones' pane on the left lists 'HR' and 'System'. The 'Hoja de Trabajo' pane displays a SQL query: `select first_name, job_id, salary from employees WHERE upper (first_name) LIKE '%L%' AND job_id = 'SA_REP' AND salary > 9600`. The 'Resultado de la Consulta' pane shows the results of the query, which are 3 rows of data.

FIRST_NAME	JOB_ID	SALARY
1 Clara	SA_REP	10500
2 Lisa	SA_REP	11500
3 Ellen	SA_REP	11000

12. Obtener employee_id y first_name de aquellos empleados, que su employee_id este en el rango de 170 al 177 incluyéndolos.



The screenshot shows the Oracle SQL Developer interface. The 'Conexiones' pane on the left lists 'HR' and 'System'. The 'Hoja de Trabajo' pane displays a SQL query: `select employee_id, first_name from EMPLOYEES WHERE employee_id BETWEEN 170 AND 177`. The 'Resultado de la Consulta' pane shows the results of the query, which are 8 rows of data.

EMPLOYEE_ID	FIRST_NAME
1	170 Tayler
2	171 William
3	172 Elizabeth
4	173 Sundita
5	174 Ellen
6	175 Alyssa
7	176 Jonathon
8	177 Jack

13. Obtener el employee_id, first_name y department_id de los empleados que no laboran en el departamento de 50

The screenshot shows the Oracle SQL Developer interface. The 'Conexiones' pane on the left lists 'HR' and 'System' connections. The 'Hoja de Trabajo' pane contains the following SQL query:

```
select employee_id, first_name, department_id
from EMPLOYEES
WHERE department_id NOT IN (50)
```

The 'Resultado de la Consulta' pane displays the results of the query, showing 12 rows of employee data. The status bar indicates 'Todas las Filas Recuperadas: 61 en 0.02 segundos'.

EMPLOYEE_ID	FIRST_NAME	DEPARTMENT_ID
1	100 Steven	90
2	101 Neena	90
3	102 Lex	90
4	103 Alexander	60
5	104 Bruce	60
6	105 David	60
7	106 Valli	60
8	107 Diana	60
9	108 Nancy	100
10	109 Daniel	100
11	110 John	100
12	111 Tessa	100

14. Obtener el employee_id, first_name y job_id de los empleados que ocupan el puesto de SA_MAN, (no incluir a John).

The screenshot shows the Oracle SQL Developer interface. The 'Conexiones' pane on the left lists 'HR' and 'System' connections. The 'Hoja de Trabajo' pane contains the following SQL query:

```
select employee_id, first_name, job_id
from EMPLOYEES
WHERE job_id = 'SA_MAN'
AND first_name NOT IN ('John')
```

The 'Resultado de la Consulta' pane displays the results of the query, showing 4 rows of employee data. The status bar indicates 'Todas las Filas Recuperadas: 4 en 0.012 segundos'.

EMPLOYEE_ID	FIRST_NAME	JOB_ID
1	146 Karen	SA_MAN
2	147 Alberto	SA_MAN
3	148 Gerald	SA_MAN
4	149 Eleni	SA_MAN

15. Obtener el first_name, salary y el salario con un aumento del 1 % para los empleados que ocupan el puesto SA_REP y trabajan en el departamento 80

The screenshot shows the Oracle SQL Developer interface. The 'Conexiones' pane on the left lists 'HR' and 'System'. The 'Hoja de Trabajo' pane contains the following SQL query:

```
select first_name, salary, salary+(salary*0.01) "SALARY + 1%"
from EMPLOYEES
WHERE job_id = 'SA_REP'
AND department_id IN (80)
```

The 'Resultado de la Consulta' pane displays the results of the query, showing 12 rows of data. The status bar indicates 'Todas las Filas Recuperadas: 29 en 0.03 segundos'.

	FIRST_NAME	SALARY	SALARY + 1%
1	Peter	10000	10100
2	David	9500	9595
3	Peter	9000	9090
4	Christopher	8000	8080
5	Nanette	7500	7575
6	Oliver	7000	7070
7	Janette	10000	10100
8	Patrick	9500	9595
9	Allan	9000	9090
10	Lindsey	8000	8080
11	Louise	7500	7575
12	Sarah	7000	7070

16. Obtener el employee_id, first_name y job_id de los empleados que no ocupan el puesto de SA_MAN, ordenado por el first_name.

The screenshot shows the Oracle SQL Developer interface. The 'Conexiones' pane on the left lists 'HR' and 'System'. The 'Hoja de Trabajo' pane contains the following SQL query:

```
select employee_id, first_name, job_id
from EMPLOYEES
WHERE job_id NOT IN ('SA_MAN')
ORDER BY first_name
```

The 'Resultado de la Consulta' pane displays the results of the query, showing 12 rows of data. The status bar indicates 'Todas las Filas Recuperadas: 102 en 0.024 segundos'.

	EMPLOYEE_ID	FIRST_NAME	JOB_ID
1	121	Adam	ST_MAN
2	196	Alana	SH_CLERK
3	103	Alexander	IT_PROG
4	115	Alexander	PU_CLERK
5	185	Alexis	SH_CLERK
6	158	Allan	SA_REP
7	175	Alyssa	SA_REP
8	167	Amit	SA_REP
9	187	Anthony	SH_CLERK
10	193	Britney	SH_CLERK
11	104	Bruce	IT_PROG
12	172	Charles	SA_REP

17. Obtener el employee_id, first_name y manager_id de los empleados que no son subordinados del manager 146.

The screenshot shows the Oracle SQL Developer interface. The 'Hoja de Trabajo' (Worksheet) tab contains the following SQL query:

```
select employee_id, first_name, manager_id
from EMPLOYEES
WHERE manager_id NOT IN (146)
```

The 'Resultado de la Consulta' (Query Result) tab displays the results of the query, showing 12 rows of employee data. The status bar indicates 'Todas las Filas Recuperadas: 100 en 0.027 segundos'.

EMPLOYEE_ID	FIRST_NAME	MANAGER_ID
1	101 Neena	100
2	102 Lex	100
3	103 Alexander	102
4	104 Bruce	103
5	105 David	103
6	106 Valli	103
7	107 Diana	103
8	108 Nancy	101
9	109 Daniel	108
10	110 John	108
11	111 Ismael	108
12	112 Jose Manuel	108

18. Obtener el employee_id, first_name, department_id y salario de los empleados del departamento 50 que tienen un salario mayor a 2500.

The screenshot shows the Oracle SQL Developer interface. The 'Hoja de Trabajo' (Worksheet) tab contains the following SQL query:

```
select employee_id, first_name, department_id, salary
from EMPLOYEES
WHERE department_id = 50
AND salary > 2500
```

The 'Resultado de la Consulta' (Query Result) tab displays the results of the query, showing 12 rows of employee data. The status bar indicates 'Todas las Filas Recuperadas: 35 en 0.078 segundos'.

EMPLOYEE_ID	FIRST_NAME	DEPARTMENT_ID	SALARY
24	187 Anthony	50	3000
25	188 Kelly	50	3800
26	189 Jennifer	50	3600
27	190 Timothy	50	2900
28	192 Sarah	50	4000
29	193 Britney	50	3900
30	194 Samuel	50	3200
31	195 Vance	50	2800
32	196 Alana	50	3100
33	197 Kevin	50	3000
34	198 Donald	50	2600
35	199 Douglas	50	2600