Lab Assignment-4

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Q1) Check the structure of tables.

desc dept ;
desc emp;
desc S;
desc P;
desc J;
desc SPJ;

TABLE DEPT

Column	Null?	Type
DEPTNO	NOT NULL	NUMBER
DNAME	–	CHAR(20)

Download CSV
2 rows selected.

TABLE EMP

Column	Null?	Type
EMPNO	NOT NULL	NUMBER
ENAME	–	VARCHAR2(20)
JOB	–	CHAR(20)
SAL	NOT NULL	NUMBER
DEPTNO	–	NUMBER

Download CSV
5 rows selected.

TABLE S

Column	Null?	Type
SNO	NOT NULL	NUMBER
SNAME	–	VARCHAR2(20)
SCITY	–	VARCHAR2(20)

Download CSV

TABLE P

Column	Null?	Type
PNO	NOT NULL	NUMBER
PNAME	–	VARCHAR2(20)
COLOR	–	VARCHAR2(20)

Download CSV

3 rows selected.

TABLE J

Column	Null?	Type
JNO	NOT NULL	NUMBER
JNAME	–	VARCHAR2(20)
JCITY	–	VARCHAR2(20)

Download CSV

3 rows selected.

TABLE SPJ

Column	Null?	Type
SNO	NOT NULL	NUMBER
PNO	NOT NULL	NUMBER
JNO	NOT NULL	NUMBER
QTY	–	NUMBER

Download CSV

Q2) Check the constraint name for applied constraints?

*select CONSTRAINT_NAME from USER_CONSTRAINTS where table_name='emp';

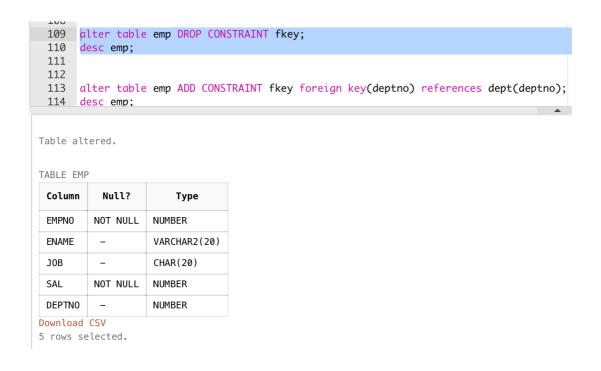**Q3) Drop the unique constraint on ENAME**

alter table emp DROP CONSTRAINT name_emp;

desc emp;

```
105
106  alter table emp DROP CONSTRAINT name_emp;
107  desc emp;
108
109  alter table emp DROP CONSTRAINT fkey;
110  desc emp;
111
112
113  alter table emp ADD CONSTRAINT fkey foreign key(deptno) references dept(deptno);
114  desc emp;
```

Table altered.

TABLE EMP

Column	Null?	Type
EMPNO	NOT NULL	NUMBER
ENAME	—	VARCHAR2(20)
JOB	—	CHAR(20)
SAL	NOT NULL	NUMBER
DEPTNO	—	NUMBER

Download CSV
5 rows selected.

Q4) Drop the Foreign Key constraint on DEPTNO

alter table emp DROP CONSTRAINT fkey;
desc emp;

```
108
109  alter table emp DROP CONSTRAINT fkey;
110  desc emp;
111
112
113  alter table emp ADD CONSTRAINT fkey foreign key(deptno) references dept(deptno);
114  desc emp;
```

Table altered.

TABLE EMP

Column	Null?	Type
EMPNO	NOT NULL	NUMBER
ENAME	—	VARCHAR2(20)
JOB	—	CHAR(20)
SAL	NOT NULL	NUMBER
DEPTNO	—	NUMBER

Download CSV
5 rows selected.

Q5) Add Foreign Key constraint on DEPTNO

alter table emp ADD CONSTRAINT fkey foreign key(deptno) references dept(deptno);
desc emp;

```
113  alter table emp ADD CONSTRAINT fkey foreign key(deptno) references dept(deptno);
114  desc emp;
115
116  alter table emp MODIFY(ename char(20));
117  desc emp;
118
119  alter table dept MODIFY(dname char(30));
120  desc dept;
```

Table altered.

TABLE EMP

Column	Null?	Type
EMPNO	NOT NULL	NUMBER
ENAME	–	VARCHAR2(20)
JOB	–	CHAR(20)
SAL	NOT NULL	NUMBER
DEPTNO	–	NUMBER

Download CSV
5 rows selected.

Q6) Change Data type of ENAME

alter table emp MODIFY(ename char(20));
desc emp;

```
115
116    alter table emp MODIFY(ename char(20));
117    desc emp;
118
119    alter table dept MODIFY(dname char(30));
120    desc dept;
```

Table altered.

TABLE EMP

Column	Null?	Type
EMPNO	NOT NULL	NUMBER
ENAME	–	CHAR(20)
JOB	–	CHAR(20)
SAL	NOT NULL	NUMBER
DEPTNO	–	NUMBER

Download CSV

5 rows selected.

Q7) Change width of DNAME

alter table dept MODIFY(dname char(30));
desc dept;

```
119    alter table dept MODIFY(dname char(30));
120    desc dept;
121
122    alter table emp ADD(COMM varchar(25));
123    desc emp;
124
125    alter table J DROP(jcity);
126    desc J;
127
128    CREATE TABLE new_emp AS  select * from emp
129    desc new_emp;
```

Table altered.

TABLE DEPT

Column	Null?	Type
DEPTNO	NOT NULL	NUMBER
DNAME	–	CHAR(30)

Download CSV

Q8) Add COMM column in EMP table

alter table emp ADD(COMM varchar(25));
desc emp;

```
122   alter table emp ADD(COMM varchar(25));
123   desc emp;
124
125   alter table J DROP(jcity);
126   desc J;
127
128   CREATE TABLE new_emp AS  select * from emp;
129   desc new_emp;
```

Table altered.

TABLE EMP

Column	Null?	Type
EMPNO	NOT NULL	NUMBER
ENAME	—	CHAR(20)
JOB	—	CHAR(20)
SAL	NOT NULL	NUMBER
DEPTNO	—	NUMBER
COMM	—	VARCHAR2(25)

Download CSV

Q9) Drop CITY column from J table

alter table J DROP(jcity);
desc J;

```
125  alter table J DROP(jcity);
126  desc J;
127
128  CREATE TABLE new_emp AS  select * from emp;
129  desc new_emp;
```

Table altered.

TABLE J

Column	Null?	Type
JNO	NOT NULL	NUMBER
JNAME	—	VARCHAR2(20)

Download CSV

Q10) Create duplicate copy of EMP table

CREATE TABLE new_emp AS select * from emp;
desc new_emp;

```
127
128  CREATE TABLE new_emp AS  select * from emp;
129  desc new_emp;
130
131
132  CREATE TABLE new_dept(d,name) AS  select * from d
133  desc new_dept;
134
135
```

Table created.

TABLE NEW_EMP

Column	Null?	Type
EMPNO	—	NUMBER
ENAME	—	CHAR(20)
JOB	—	CHAR(20)
SAL	NOT NULL	NUMBER
DEPTNO	—	NUMBER
COMM	—	VARCHAR2(25)

Download CSV
6 rows selected.

Q11) Copy structure of DEPT table in another table with different column names

CREATE TABLE new_dept(d,name) AS select * from dept;
desc new_dept;

```
131  |
132  CREATE TABLE new_dept(d,name) AS  select * from dept
133  desc new_dept;
134
135
```

Table created.

TABLE NEW_DEPT

Column	Null?	Type
D	—	NUMBER
NAME	—	CHAR(30)

Download CSV
2 rows selected.

Q12) Change the name and job of the employee whose EMPNO=100

UPDATE emp set ename = 'PREM', job = 'Lect' where empno = 100;
select * from emp order by empno asc;

```
136  UPDATE emp set ename = 'PREM', job = 'Lect'  where empno = 100;
137  select * from emp order by empno asc;
138
139  delete from emp where deptno = 20;
140  select * from emp order by empno asc;
141
```

1 row(s) updated.

EMPNO	ENAME	JOB	SAL	DEPTNO	COMM
100	PREM	Lect	20000	10	–
101	ROHAN	AP	43000	20	–
102	RAJESH	Prof	15000	30	–
103	PREET	Lect	55000	10	–
104	TEJAS	Lect	36000	30	–

Q13) Delete the record of employee who belong to computer department

delete from emp where deptno = 20;
select * from emp order by empno asc;

```
139   delete from emp where deptno = 20;
140   select * from emp order by empno asc;
141
142
143   drop table dept;
144
145   drop table new_emp;
146
147
```

1 row(s) deleted.

EMPNO	ENAME	JOB	SAL	DEPTNO	COMM
100	PREM	Lect	20000	10	–
102	RAJESH	Prof	15000	30	–
103	PREET	Lect	55000	10	–
104	TEJAS	Lect	36000	30	–

Download CSV

4 rows selected.

Q14) Drop DEPT Table

drop table dept;
(directly can't be removed as emp table contains foreign key referenced from dept table)

```
143   drop table dept;
144   |
145   drop table new_emp;
146
147
```

ORA-02449: unique/primary keys in table referenced by foreign keys

So firstly we need to drop emp table in order to drop dept table.

```
147  drop table emp;
148  drop table dept;
149

Table dropped.
```

Q15) Drop duplicate table of EMP table

drop table new_emp;

```
145  drop table new_emp;
146
147

Table dropped.
```

Code-

desc dept ;
desc emp;
desc S;
desc P;
desc J;
desc SPJ;

*select CONSTRAINT_NAME from USER_CONSTRAINTS where table_name='emp';

alter table emp DROP CONSTRAINT name_emp;
desc emp;

alter table emp DROP CONSTRAINT fkey;

```sql
desc emp;


alter table emp ADD CONSTRAINT fkey foreign key(deptno) references
dept(deptno);
desc emp;

alter table emp MODIFY(ename char(20));
desc emp;

alter table dept MODIFY(dname char(30));
desc dept;

alter table emp ADD(COMM varchar(25));
desc emp;

alter table J DROP(jcity);
desc J;

CREATE TABLE new_emp AS  select * from emp;
desc new_emp;

CREATE TABLE new_dept(d,name) AS  select * from dept;
desc new_dept;

UPDATE emp set ename = 'PREM', job = 'Lect'  where empno = 101;
select * from emp order by empno asc;

delete from emp where deptno = 20;
select * from emp order by empno asc;


drop table dept;

drop table new_emp;
```