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| **Ex.No.2** | **DATA MANIPULATION LANGUAGE, DATA CONTROL LANGUAGE COMMANDS AND TCL COMMANDS** |

**AIM**

To execute data manipulation language, data control language commands and TCL commands.

**DATA MANIPULATION LANGUAGE (DML):**

**1.INSERTING VALUES TO THE TABLE**

SQL> create table students(id number(5) primary key, name varchar(15), deptno number(2), maths number(2), english number(2));

Table created.

SQL> desc students

Name Null? Type

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ID NOT NULL NUMBER(5)

NAME VARCHAR2(15)

DEPTNO NUMBER(2)

MATHS NUMBER(2)

ENGLISH NUMBER(2)

SQL> insert into students values(120001,'Jisoo',12,70,85);

1 row created.

SQL> insert into students values(120002,'Rose`',11,80,85);

1 row created.

SQL> insert into students values(120002,'Jennie',11,80,85);

1 row created.

SQL> insert into students values(120003,'Lisa',11,75,78);

1 row created.

SQL> insert into students values(120004,'Job',10,95,90);

1 row created.

SQL> select \* from students;

ID NAME DEPTNO MATHS ENGLISH

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120001 Jisoo 12 70 85

120002 Rose` 11 80 85

120003 Jennie 11 75 78

120004 Lisa 10 95 90

120005 Job 9 75 85

**2.UPDATING THE VALUES IN THE TABLE**

120001 Jisoo 12 70 85

120002 Rose` 11 80 85

120003 Jennie 11 75 90

120004 Lisa 10 95 90

120005 Job 9 75 90

SQL> update students set english=90 where maths=75;

2 rows updated.

SQL> select \* from students;

ID NAME DEPTNO MATHS ENGLISH

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**3.SELECT**

**a) SELECT COLUMNS FROM THE TABLE**

SQL> select id, maths from students;

ID MATHS

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120001 70

120002 80

120003 75

120004 95

120005 75

**b) SELECT ROWS FROM THE TABLE**

SQL> select \* from students where maths>80;

ID NAME DEPTNO MATHS ENGLISH

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120004 Lisa 10 95 90

**c) SELECT ENTIRE TABLE**

SQL> select \* from students;

ID NAME DEPTNO MATHS ENGLISH

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120001 Jisoo 12 70 85

120002 Rose` 11 80 85

120003 Jennie 11 75 90

120004 Lisa 10 95 90

120005 Job 9 75 90

**4.DELETE**

SQL> delete from students where maths=70;

1 row deleted.

SQL> select \* from students;

ID NAME DEPTNO MATHS ENGLISH

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120002 Rose` 11 80 85

120003 Jennie 11 75 90

120004 Lisa 10 95 90

120005 Job 9 75 90

**ARRANGE IN ASCENDING ORDER**

SQL> select \* from students order by id;

ID NAME DEPTNO MATHS ENGLISH

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120002 Rose` 11 80 85

120003 Jennie 11 75 90

120004 Lisa 10 95 90

120005 Job 9 75 90

**ARRANGE IN DESCENDING ORDER**

SQL> select \* from students order by id desc;

ID NAME DEPTNO MATHS ENGLISH

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120005 Job 9 75 90

120004 Lisa 10 95 90

120003 Jennie 11 75 90

120002 Rose` 11 80 85

**DATA CONTROL LANGUAGE(DCL):**

**1.GRANT**

**a) Grant all privilages**

SQL> create user Job identified by us;

User created.

SQL> grant all on students to Job;

Grant succeeded.

**b) Grant some privilages of students**

SQL> grant select,update,insert on students to Job with grant option;

Grant succeeded.

**2.REVOKE**

Revoke all privilages

SQL> revoke all on students from Job;

Revoke succeeded.

**TRANSACTION CONTROL LANGUAGE(TCL)**

**1.SAVE POINT**

SQL> savepoint s1;

Savepoint created.

**2.ROLL BACK**

SQL> roll back s1;

Rollback complete.

**3.COMMIT**

SQL> commit;

Commit complete.

**4.SET TRANSACTION**

SQL> set transaction read only;

Transaction set.

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**RESULT**

Thusdata manipulation language, data control language commands and TCL commands were executed.