SQL> CREATE TABLE MUSICIAN (

2 SSN int,

3 name varchar2 (20) NOT NULL,

4 address varchar2 (20) ,

5 phone\_number int NOT NULL) ;

Table created.

SQL> DESC musician;

Name Null? Type

----------------------------------------- -------- ----------------------------

SSN NUMBER(38)

NAME NOT NULL VARCHAR2(20)

ADDRESS VARCHAR2(20)

PHONE\_NUMBER NOT NULL NUMBER(38)

SQL> ALTER TABLE MUSICIAN ADD CONSTRAINT M\_KEY PRIMARY KEY(SSN);

Table altered.

SQL> DESC musician;

Name Null? Type

----------------------------------------- -------- ----------------------------

SSN NOT NULL NUMBER(38)

NAME NOT NULL VARCHAR2(20)

ADDRESS VARCHAR2(20)

PHONE\_NUMBER NOT NULL NUMBER(38)

SQL> CREATE TABLE ALBUM(

2 Album\_identifier int ,

3 a\_title varchar2 (20) ,

4 Copyright\_date date,

5 format varchar2 (20) ,

6 SSN int,

7 CONSTRAINT AL\_KEY

8 FOREIGN KEY (SSN) REFERENCES MUSICIAN (SSN),

9 PRIMARY KEY(ALBUM\_IDENTIFIER)) ;

Table created.

SQL> DESC ALBUM;

Name Null? Type

----------------------------------------- -------- ----------------------------

ALBUM\_IDENTIFIER NOT NULL NUMBER(38)

A\_TITLE VARCHAR2(20)

COPYRIGHT\_DATE DATE

FORMAT VARCHAR2(20)

SSN NUMBER(38)

SQL> CREATE TABLE SONG(

2 s\_title varchar2 (20),

3 author varchar2 (20) ,

4 Album\_identifier int,

5 CONSTRAINT S\_KEY

6 FOREIGN KEY (album\_identifier) REFERENCES ALBUM (album\_identifier) ,

7 PRIMARY KEY (S\_TITLE)) ;

Table created.

SQL> DESC SONG

Name Null? Type

----------------------------------------- -------- ----------------------------

S\_TITLE NOT NULL VARCHAR2(20)

AUTHOR VARCHAR2(20)

ALBUM\_IDENTIFIER NUMBER(38)

SQL> CREATE TABLE INSTRUMENT (

2 name varchar2 (10) ,

3 Musical\_key varchar2 (20) ,

4 S\_TITLE VARCHAR2 (20) ,

5 CONSTRAINT I\_KEY

6 FOREIGN KEY (S\_TITLE) REFERENCES SONG(S\_TITLE),

7 primary key (name));

Table created.

SQL> DESC INSTRUMENT

Name Null? Type

----------------------------------------- -------- ----------------------------

NAME NOT NULL VARCHAR2(10)

MUSICAL\_KEY VARCHAR2(20)

S\_TITLE VARCHAR2(20)

SQL> CREATE TABLE PERFORMS (

2 SSN INT,

3 S\_TITLE VARCHAR2 (20) ,

4 CONSTRAINT P\_KEY

5 FOREIGN KEY (SSN) REFERENCES MUSICIAN (SSN) ,

6 FOREIGN KEY (S\_TITLE) REFERENCES SONG(S\_TITLE)) ;

Table created.

SQL> DESC PERFORMS;

Name Null? Type

----------------------------------------- -------- ----------------------------

SSN NUMBER(38)

S\_TITLE VARCHAR2(20)

SQL> CREATE TABLE PLAYS (

2 NAME VARCHAR2 (20) ,

3 SSN INT,

4 CONSTRAINT PLAY\_KEY

5 FOREIGN KEY (NAME) REFERENCES INSTRUMENT(NAME) ,

6 FOREIGN KEY(SSN) REFERENCES MUSICIAN (SSN) ) ;

Table created.

SQL> DESC PLAYS

Name Null? Type

----------------------------------------- -------- ----------------------------

NAME VARCHAR2(20)

SSN NUMBER(38)

SQL> ALTER TABLE INSTRUMENT MODIFY NAME VARCHAR2(20);

Table altered.

SQL> DESC INSTRUMENT

Name Null? Type

----------------------------------------- -------- ----------------------------

NAME NOT NULL VARCHAR2(20)

MUSICAL\_KEY VARCHAR2(20)

S\_TITLE VARCHAR2(20)

SQL> ALTER TABLE MUSICIAN ADD SALARY INT;

Table altered.

SQL> DESC MUSICIAN;

Name Null? Type

----------------------------------------- -------- ----------------------------

SSN NOT NULL NUMBER(38)

NAME NOT NULL VARCHAR2(20)

ADDRESS VARCHAR2(20)

PHONE\_NUMBER NOT NULL NUMBER(38)

SALARY NUMBER(38)

SQL> ALTER TABLE MUSICIAN DROP COLUMN SALARY;

Table altered.

SQL> DESC MUSICIAN;

Name Null? Type

----------------------------------------- -------- ----------------------------

SSN NOT NULL NUMBER(38)

NAME NOT NULL VARCHAR2(20)

ADDRESS VARCHAR2(20)

PHONE\_NUMBER NOT NULL NUMBER(38)

SQL> SELECT TABLE\_NAME FROM USER\_TABLES;

TABLE\_NAME

------------------------------

ALBUM

MUSICIAN

SONG

INSTRUMENT

PERFORMS

PLAYS

6 rows selected.

SQL> DROP TABLE PLAYS;

Table dropped.

SQL> SELECT TABLE\_NAME FROM USER\_TABLES;

TABLE\_NAME

------------------------------

ALBUM

MUSICIAN

SONG

INSTRUMENT

PERFORMS

SQL> TRUNCATE TABLE INSTRUMENT;

Table truncated.

SQL> DESC INSTRUMENT;

Name Null? Type

----------------------------------------- -------- ----------------------------

NAME NOT NULL VARCHAR2(20)

MUSICAL\_KEY VARCHAR2(20)

S\_TITLE VARCHAR2(20)

SQL>