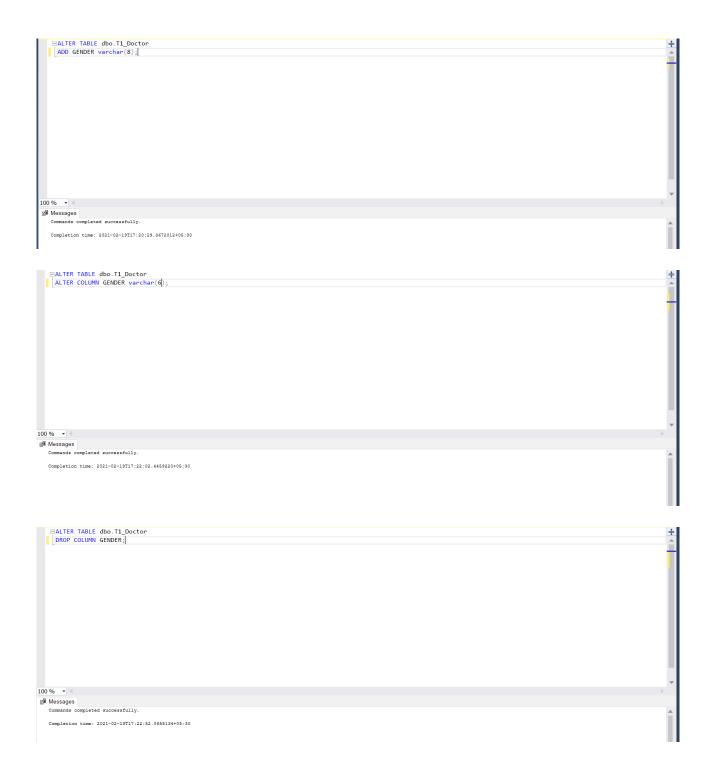
DBMS LAB ASSIGNMENT 3

NAME – APARNA KHOLIA REG NO – 19BCS116

1.) Add, Modify and Delete Column using Alter Command



2.) Insert 20 Employees Data into all the tables. Use all the 3 methods

```
□INSERT INTO dbo.T1_Doctor(doc_ID, doc_name, doc_specialization)
 VALUES (1, 'Heni', 'Ortho');
☐INSERT INTO dbo.T1 Doctor
 VALUES (2, 'Mike', 'Physician');
☐INSERT INTO dbo.T1_Doctor
VALUES (3, 'Rustom', 'Child');
☐INSERT INTO dbo.T1_Doctor
VALUES (4, 'Divyank', 'Ortho');
□INSERT INTO dbo.T1_Doctor
 VALUES (5, 'Kush', 'Phy');
☐INSERT INTO dbo.T1_Doctor
 VALUES (6, 'Amit', 'Child');
⊡INSERT INTO dbo.T1_Doctor
 VALUES (7, 'Jignesh', 'Ortho');
☐INSERT INTO dbo.T1_Doctor
VALUES (8, 'Shankar', 'Child');
□INSERT INTO dbo.T1_Doctor
VALUES (9, 'Sresth', 'Phy');
☐INSERT INTO dbo.T1_Doctor
 VALUES (10, 'Rakesh', 'Child');
☐INSERT INTO dbo.T1_Doctor
VALUES (11, 'Samarth', 'Phy');
☐INSERT INTO dbo.T1_Doctor
VALUES (12, 'Rajesh', 'Surg');

☐ INSERT INTO dbo.T1_Doctor

VALUES (13, 'Aditi', 'Child');
☐INSERT INTO dbo.T1 Doctor
 VALUES (14, 'Amita', 'Surg');

☐INSERT INTO dbo.T1_Doctor

 VALUES (15, 'Ashrith','Ortho');
☐INSERT INTO dbo.T1_Doctor
VALUES (16, 'Riya', 'Child');
□INSERT INTO dbo.T1_Doctor
VALUES (17, 'Aparna', 'Surg');
☐INSERT INTO dbo.T1_Doctor
 VALUES (18, 'Santanu', 'Child');
□INSERT INTO dbo.T1_Doctor
VALUES (19, 'Akash', 'Ortho');
☐INSERT INTO dbo.T1_Doctor
VALUES (20, 'Sumit', 'Surg');
```

■ Results			
	doc_ID	doc_name	doc_specialization
1	13	Aditi	Child
2	19	Akash	Ortho
3	6	Amit	Child
4	14	Amita	Surg
5	17	Aparna	Surg
6	15	Ashrith	Ortho
7	4	Divyank	Ortho
8	1	Heni	Ortho
9	7	Jignesh	Ortho
10	5	Kush	Phy
11	2	Mike	Physician
12	12	Rajesh	Surg
13	10	Rakesh	Child
14	16	Riya	Child
15	3	Rustom	Child
16	11	Samarth	Phy
17	18	Santanu	Child
18	8	Shankar	Child
19	9	Sresth	Phy
20	20	Sumit	Surg

3.) Show Violation of Primary Key, Unique Not Null and default key constraints through insertion.

```
□INSERT INTO dbo.T1 Doctor
    VALUES(1, 'Ritika', 'Phy');
100 % ▼ ◀

■ Messages

   Msg 2627, Level 14, State 1, Line 1
Violation of PRIMARY KEY constraint 'PK_T1_Docto_8AD12ABCB4CDCD6E'. Cannot insert duplicate key in object 'dbo.T1_Doctor'. The duplicate key value is (1).
    Completion time: 2021-02-19T17:38:13.6655304+05:30
    □INSERT INTO dbo.T1 Doctor
   VALUES(NULL, 'Ritika', 'Phy');
100 % ▼ ◀

    Messages

   Msg 515, Level 16, State 2, Line 1
Cannot insert the value NULL into column 'doc_ID', table 'Hospital.dbo.Ti_Doctor'; column does not allow nulls. INSERT fails.
```

4.) Insert tuples into the table and see how foreign key constraint works if you try to insert into dependent table first.

```
DINSERT INTO dbo_T1_Patient

VALUES(3], 'Raj', 25, 'A',123456, 4,4);

100 % 

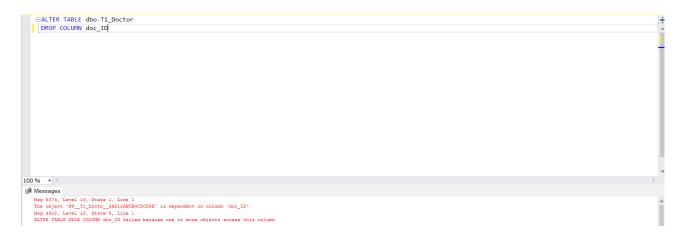
Messages

Mag Sa7, Level 16, State 0, line 1

The INSERT statement conflicted with the FOREIGN MEY constraint "FK_T1_Patien_Room_2F100078". The conflict occurred in database "Hospital", table "dbo_T1_room", column 'Room_num'.

The statement has been terminated.
```

5.) Show Violation of Foreign Key Constraint when you try to delete from a base table. If you get an error explain why deletion gives an error



Reason - The deletion is giving an error as it violates referential integrity constraint. First, we need to delete the corresponding tuple from the dependent table and then the base table.

6.) Try to update a non-existing entity data and check for error.

```
DUPDATE T1_Doctor

SET doc_name = 'Atul'

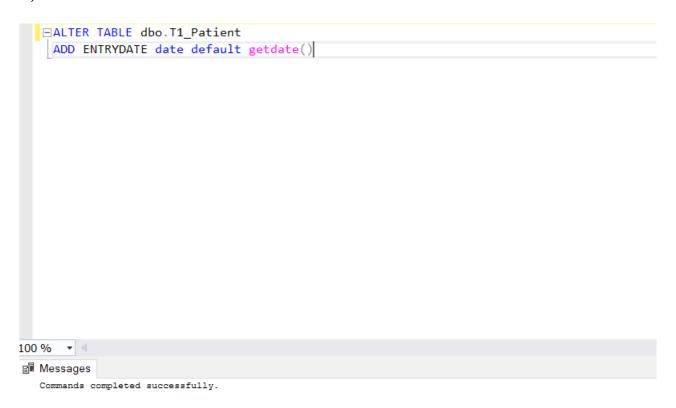
where doc_id = 100;

100 %

Where doc_id = 100;

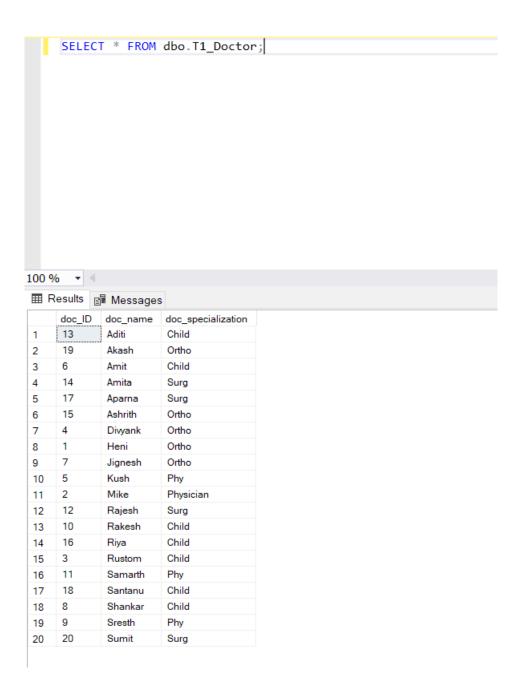
Completion time: 2021-02-1917:53:36.9928143+05:30
```

7.) Add a column which has default value.



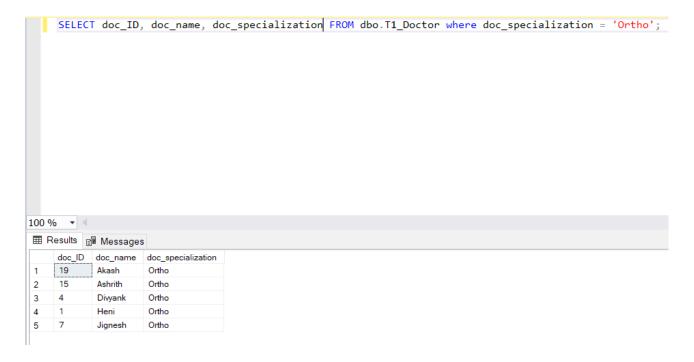
8.) 5 Simple Select queries to retrieve data from your database.

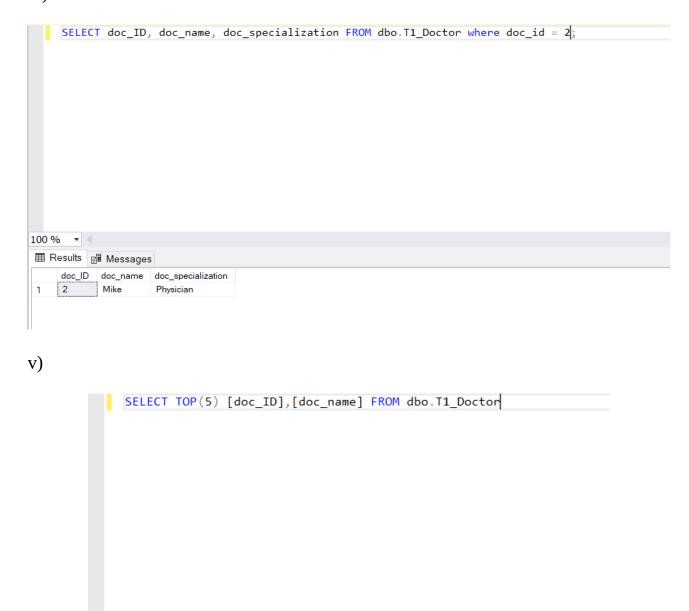
i)

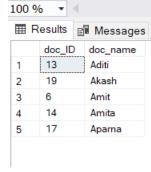


SELECT doc_ID, doc_name | FROM dbo.T1_Doctor; 100 % ▼ ◀ ■ Results ■ Messages doc_ID doc_name 13 Aditi 2 Akash 19 3 6 Amit Amita 17 Aparna Ashrith 15 6 Divyank 8 7 Jignesh 10 5 Kush Mike 11 12 12 Rajesh 13 10 Rakesh 16 Riya Rustom 15 3 11 Samarth 16 17 18 Santanu Shankar 18 8 19 Sresth 20 Sumit 20

iii)







9.) Show how Foreign key constraint effects Updating a dependent table when value is not existing and in Base table where the value is referred and you want to update it.

```
SET Room_num = 4
where Patient_ID = 1
```

100 % ▼ 4

Messages

Mag 547, Level 16, State 0, Line 1

The UDDATS statement conflicted with the FORSIGN KEY constraint "FK_Ti_Patien_Room_2F100078". The conflict occurred in database "Hospital", table "dbo.Ti_room", column 'Room_num'. The statement has been terminated.