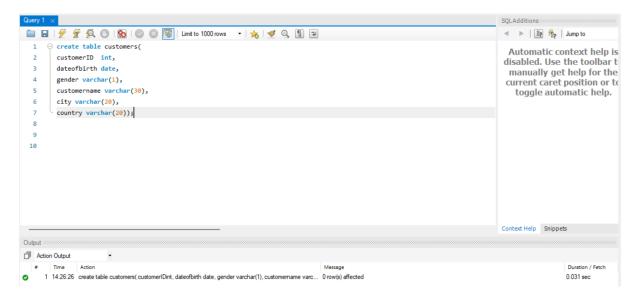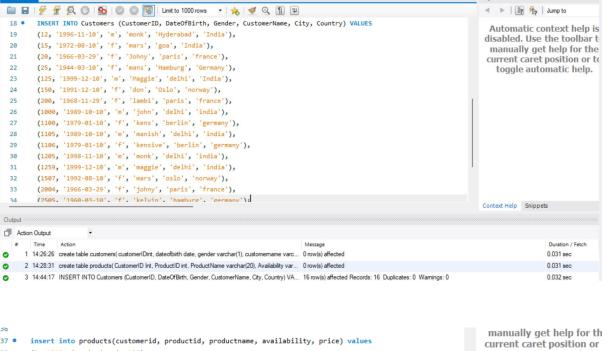# S20230010225

DBMS Lab assignment 3

Create table customer


```
 1    create table customers(
 2        customerID  int,
 3        dateofbirth date,
 4        gender varchar(1),
 5        customername varchar(30),
 6        city varchar(20),
 7        country varchar(20));
 8
 9
10
```

#	Time	Action	Message	Duration / Fetch
1	14:26:26	create table customers(customerIDint, dateofbirth date, gender varchar(1), customername varc...	0 row(s) affected	0.031 sec

Create table products


```
10    create table products(
11        CustomerID Int,
12        ProductID int,
13        ProductName varchar(20),
14        Availability varchar(20),
15        Price int);
```

#	Time	Action	Message
1	14:26:26	create table customers(customerIDint, dateofbirth date, gender varchar(1), customername varc...	0 row(s) affected
2	14:28:31	create table products(CustomerID Int, ProductID int, ProductName varchar(20), Availability var...	0 row(s) affected

Limit to 1000 rows

```
18 • INSERT INTO Customers (CustomerID, DateOfBirth, Gender, CustomerName, City, Country) VALUES
19   (12, '1996-11-10', 'm', 'monk', 'Hyderabad', 'India'),
20   (15, '1972-08-10', 'f', 'mars', 'goa', 'India'),
21   (20, '1966-03-29', 'f', 'Johny', 'paris', 'france'),
22   (25, '1944-03-10', 'f', 'mans', 'Hamburg', 'Germany'),
23   (125, '1999-12-10', 'm', 'Maggie', 'delhi', 'India'),
24   (150, '1991-12-10', 'f', 'don', 'Oslo', 'norway'),
25   (200, '1968-11-29', 'f', 'lambi', 'paris', 'france'),
26   (1000, '1989-10-10', 'm', 'john', 'delhi', 'india'),
27   (1100, '1979-01-10', 'f', 'kens', 'berlin', 'germany'),
28   (1105, '1989-10-10', 'm', 'manish', 'delhi', 'india'),
29   (1106, '1979-01-10', 'f', 'kensive', 'berlin', 'germany'),
30   (1205, '1998-11-10', 'm', 'monk', 'delhi', 'india'),
31   (1259, '1999-12-10', 'm', 'maggie', 'delhi', 'india'),
32   (1507, '1992-08-10', 'f', 'mars', 'oslo', 'norway'),
33   (2004, '1966-03-29', 'f', 'johny', 'paris', 'france'),
34   (2505, '1960-03-10', 'f', 'kelvin', 'hamburg', 'germany');
```

Output

Action Output

#	Time	Action	Message	Duration / Fetch
✓ 1	14:26:26	create table customers(customerIDint, dateofbirth date, gender varchar(1), customername varc...	0 row(s) affected	0.031 sec
✓ 2	14:28:31	create table products(CustomerID Int, ProductID int, ProductName varchar(20), Availability var...	0 row(s) affected	0.031 sec
✓ 3	14:44:17	INSERT INTO Customers (CustomerID, DateOfBirth, Gender, CustomerName, City, Country) VA...	16 row(s) affected Records: 16 Duplicates: 0 Warnings: 0	0.032 sec

```
36
37 • insert into products(customerid, productid, productname, availability, price) values
38   (1, 1000, 'pen', 'yes', 100),
39   (2, 1100, 'toy', 'no', 10),
40   (3, 2505, 'pencil', 'yes', 30),
41   (4, 1205, 'duck', 'yes', 50),
42   (6, 200, 'hat', 'yes', 10),
43   (7, 2505, 'pot', 'no', 90),
44   (9, 1100, 'chalk', 'no', 10);
45
46
47
48
49
```

Output

Action Output

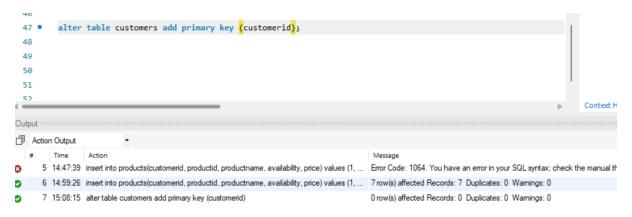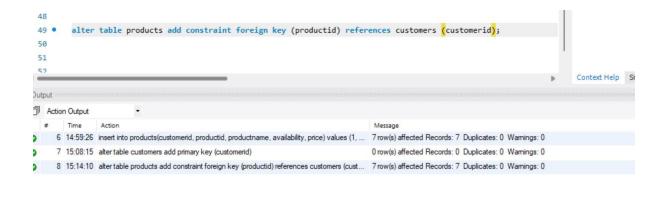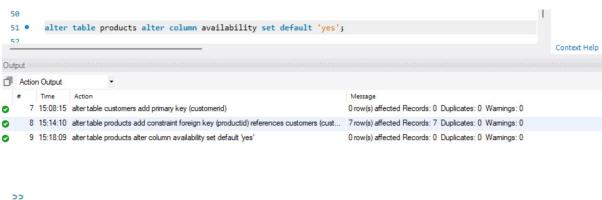| #	Time	Action	Message	Duration / Fetch
4	14:47:37	insert into products(customerid, productid, productname, availability, price) values (1, ...	Error Code: 1064. You have an error in your SQL syntax; check the manual that corre...	0.016 sec
5	14:47:39	insert into products(customerid, productid, productname, availability, price) values (1, ...	Error Code: 1064. You have an error in your SQL syntax; check the manual that corre...	0.000 sec
6	14:59:26	insert into products(customerid, productid, productname, availability, price) values (1, ...	7 row(s) affected Records: 7 Duplicates: 0 Warnings: 0	0.015 sec

Inserting data into tables(above)

Q1-Q20

```
46
47 • alter table customers add primary key (customerid);
48
49
50
51
52
```

Output

Action Output

#	Time	Action	Message
✗ 5	14:47:39	insert into products(customerid, productid, productname, availability, price) values (1, ...	Error Code: 1064. You have an error in your SQL syntax; check the manual th
✓ 6	14:59:26	insert into products(customerid, productid, productname, availability, price) values (1, ...	7 row(s) affected Records: 7 Duplicates: 0 Warnings: 0
✓ 7	15:08:15	alter table customers add primary key (customerid)	0 row(s) affected Records: 0 Duplicates: 0 Warnings: 0

```
48
49 •    alter table products add constraint foreign key (productid) references customers (customerid);
50
51
52
```

Output

Action Output ▼

#	Time	Action	Message
6	14:59:26	insert into products(customerid, productid, productname, availability, price) values (1, ...	7 row(s) affected Records: 7 Duplicates: 0 Warnings: 0
7	15:08:15	alter table customers add primary key (customerid)	0 row(s) affected Records: 0 Duplicates: 0 Warnings: 0
8	15:14:10	alter table products add constraint foreign key (productid) references customers (cust...	7 row(s) affected Records: 7 Duplicates: 0 Warnings: 0

```
50
51 •    alter table products alter column availability set default 'yes';
52
```

Output

Action Output ▼

#	Time	Action	Message
7	15:08:15	alter table customers add primary key (customerid)	0 row(s) affected Records: 0 Duplicates: 0 Warnings: 0
8	15:14:10	alter table products add constraint foreign key (productid) references customers (cust...	7 row(s) affected Records: 7 Duplicates: 0 Warnings: 0
9	15:18:09	alter table products alter column availability set default 'yes'	0 row(s) affected Records: 0 Duplicates: 0 Warnings: 0

```
55
56 •    select * from customers where customername like '%or%';
57
```

Result Grid | 📊 | 🔀 Filter Rows: [   ] | Edit: 🖉 📥 📤 | Export/Import: 📥 📤 | Wrap Cell Content: 🗛

customerID	dateofbirth	gender	customername	city	country
NULL	NULL	NULL	NULL	NULL	NULL

```
58 •    insert into products (Productid, customerid, productname, availability, price) values
59      (10, 2505, 'newtoy', 'yes', 2505);
60
61
62
63
```

Output

Action Output ▼

#	Time	Action	Message
12	15:26:22	alter table products rename column temp to CustomerID	0 row(s) affected Records: 0 Duplicates: 0 Warnings: 0
13	15:26:59	select *from products LIMIT 0, 1000	7 row(s) returned
14	15:32:32	insert into products (Productid, customerid, productname, availability, price) values (...	1 row(s) affected

```
60
61 •    select * from customers where city="berlin" and country="germany";
```

Result Grid | Filter Rows: | Edit: | Export/Import: | Wrap Cell Content: $\overline{\text{IA}}$

	customerID	dateofbirth	gender	customername	city	country
▶	1100	1979-01-10	f	kens	berlin	germany
	1106	1979-01-10	f	kensive	berlin	germany
*	NULL	NULL	NULL	NULL	NULL	NULL

customers 2 ✕   Apply   Context Help   Snippets

Output

Action Output ▾

	#	Time	Action	Message	Duratic
✓	13	15:26:59	select * from products LIMIT 0, 1000	7 row(s) returned	0.000 s
✓	14	15:32:32	insert into products (Productid, customerid, productname, availability, price) values (...	1 row(s) affected	0.000 s
✓	15	15:33:38	select * from customers where city="berlin" and country="germany" LIMIT 0, 1000	2 row(s) returned	0.000 s

```
62
63 •    select * from customers where country!="germany";
64
```

Result Grid | Filter Rows: | Edit: | Export/Import: | Wrap Cell Content: $\overline{\text{IA}}$

	customerID	dateofbirth	gender	customername	city	country
▶	12	1996-11-10	m	monk	Hyderabad	India
	15	1972-08-10	f	mars	goa	India
	20	1966-03-29	f	Johny	paris	france
	125	1999-12-10	m	Maggie	delhi	India
	150	1991-12-10	f	don	Oslo	norway
	200	1968-11-29	f	lambi	paris	france

customers 3 ✕   Apply   Revert   Conte

Output

Action Output ▾

	#	Time	Action	Message
✓	14	15:32:32	insert into products (Productid, customerid, productname, availability, price) values (...	1 row(s) affected
✓	15	15:33:38	select * from customers where city="berlin" and country="germany" LIMIT 0, 1000	2 row(s) returned

```
64
65 •    select * from customers where city like 'a%';
66
67
68
```

Result Grid | Filter Rows: | Edit: | Export/Import: | Wrap Cell Content: $\overline{\text{IA}}$

	customerID	dateofbirth	gender	customername	city	country
*	NULL	NULL	NULL	NULL	NULL	NULL

customers 5 ✕   Apply   Revert

Output

Action Output ▾

	#	Time	Action	Message
✓	17	15:35:47	select * from customers where city like "a%" LIMIT 0, 1000	0 row(s) returned
✓	18	15:36:18	select * from customers where city like 'a%' LIMIT 0, 1000	0 row(s) returned

```
67 •    select * from customers where city like 'a%b';
68      |
69
```

Result Grid | Filter Rows: [ ] | Edit: 🖊 🖥 🖥 | Export/Import: 🖥 🖥 | Wrap Cell Content: ‡A

	customerID	dateofbirth	gender	customername	city	country
*	NULL	NULL	NULL	NULL	NULL	NULL

customers 6 ✕   Appl

Output

🗗 Action Output ▾

	#	Time	Action	Message
✅	18	15:36:18	select * from customers where city like 'a%' LIMIT 0, 1000	0 row(s) returned
✅	19	15:40:21	select * from customers where city like 'a%b' LIMIT 0, 1000	0 row(s) returned

```
69 •    select * from customers where city not like 'a%';|
70
```

Result Grid | Filter Rows: [ ] | Edit: 🖊 🖥 🖥 | Export/Import: 🖥 🖥 | Wrap Cell Content: ‡A

	customerID	dateofbirth	gender	customername	city	country
▶	12	1996-11-10	m	monk	Hyderabad	India
	15	1972-08-10	f	mars	goa	India
	20	1966-03-29	f	Johny	paris	france
	25	1944-03-10	f	mans	Hamburg	Germany
	125	1999-12-10	m	Maggie	delhi	India
	150	1991-12-10	f	don	Oslo	norway

customers 7 ✕

Output

🗗 Action Output ▾

	#	Time	Action	Message
✅	19	15:40:21	select * from customers where city like 'a%b' LIMIT 0, 1000	0 row(s) returned
✅	20	15:41:07	select * from customers where city not like 'a%' LIMIT 0, 1000	16 row(s) returned

```
76
77 •    select * from customers where substring(city, 1, 1) between 'a' and 'f'
```

Result Grid | Filter Rows: | Edit: | Export/Import: | Wrap Cell Content:

customerID	dateofbirth	gender	customername	city	country
125	1999-12-10	m	Maggie	delhi	India
1000	1989-10-10	m	john	delhi	india
1100	1979-01-10	f	kens	berlin	germany
1105	1989-10-10	m	manish	delhi	india
1106	1979-01-10	f	kensive	berlin	germany
1205	1998-11-10	m	monk	delhi	india

customers 12 ×   Apply

Output

Action Output ▾

#	Time	Action	Message
24	15:46:40	select *from customers where city like '[a-f]%' LIMIT 0, 1000	0 row(s) returned
25	15:48:46	select *from customers where substring(city, 1, 1) between 'a' and 'f' LIMIT 0, 1000	7 row(s) returned

```
79 •    select * from customers where country!='norway' and country!='france';
```

Result Grid | Filter Rows: | Edit: | Export/Import: | Wrap Cell Content:

customerID	dateofbirth	gender	customername	city	country
12	1996-11-10	m	monk	Hyderabad	India
15	1972-08-10	f	mars	goa	India
25	1944-03-10	f	mans	Hamburg	Germany
125	1999-12-10	m	Maggie	delhi	India
1000	1989-10-10	m	john	delhi	india
1100	1979-01-10	f	kens	berlin	germany

customers 13 ×   Apply   Rev

Output

Action Output ▾

#	Time	Action	Message
25	15:48:46	select *from customers where substring(city, 1, 1) between 'a' and 'f' LIMIT 0, 1000	7 row(s) returned
26	15:50:00	select *from customers where country!='norway' and country!='france' LIMIT 0, 1000	11 row(s) returned

```
80
81 •    select * from products where productname between 'hat' and 'pen';
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content: A̲

ProductID	CustomerID	ProductName	Availability	Price
1	1000	pen	yes	100
6	200	hat	yes	10
10	2505	newtoy	yes	2505

products 14 ×

Output

Action Output ▼

#	Time	Action	Message
✅ 26	15:50:00	select * from customers where country!='norway' and country!='france' LIMIT 0, 1000	11 row(s) returned
✅ 27	15:51:46	select * from products where productname between 'hat' and 'pen' LIMIT 0, 1000	3 row(s) returned

```
82
83 •    select * from products where price between 50 and 100;
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content: A̲

ProductID	CustomerID	ProductName	Availability	Price
1	1000	pen	yes	100
4	1205	duck	yes	50
7	2505	pot	no	90

roducts 15 ×   ❶ Read C

utput

Action Output ▼

#	Time	Action	Message
27	15:51:46	select * from products where productname between 'hat' and 'pen' LIMIT 0, 1000	3 row(s) returned
28	15:52:37	select * from products where price between 50 and 100 LIMIT 0, 1000	3 row(s) returned

```
87
88      -- alter table products drop foreign key products_ibfk_1 ;
89  •    alter table customers drop primary key;
```

Output

Action Output ▾

#	Time	Action	Message
33	16:09:07	alter table products drop foreign key products_ibfk_1	0 row(s) affecte
34	16:09:28	alter table customers drop primary key	16 row(s) affect

```
90
91  •    delete from customers where city='victoria' and country='brazil';
```

Output

Action Output ▾

#	Time	Action	Message
34	16:09:28	alter table customers drop primary key	16 row(s) affected Records: 16 Duplicates: 0 Warnings: 0
35	16:12:15	delete from customers where city='victoria' and country='brazil'	0 row(s) affected

```
94
95  •    select customername from customers where city!='hamburg' and city!='delhi';
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content: IA

customername
monk
mars
Johny
don
lambi
kens

customers 20 ×   ❶ Read On

```
97  •    select customername from customers where timestampdiff(YEAR, dateofbirth, '1975-01-01');
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content: IA

customername
monk
mars
Johny
mans
Maggie
don

customers 22 ×   ❶ Read Only

MY MYSQL CODE FOR THE ABOVE QUESTIONS:

```sql
create table customers(

customerID    int,

dateofbirth date,

gender varchar(1),

customername varchar(30),

city varchar(20),

country varchar(20));
```

```sql
create table products(

CustomerID Int,

ProductID int,

ProductName varchar(20),

Availability varchar(20),

Price int);
```

```sql
INSERT INTO Customers (CustomerID, DateOfBirth, Gender, CustomerName, City, Country) VALUES

(12, '1996-11-10', 'm', 'monk', 'Hyderabad', 'India'),

(15, '1972-08-10', 'f', 'mars', 'goa', 'India'),

(20, '1966-03-29', 'f', 'Johny', 'paris', 'france'),

(25, '1944-03-10', 'f', 'mans', 'Hamburg', 'Germany'),
```

(125, '1999-12-10', 'm', 'Maggie', 'delhi', 'India'),

(150, '1991-12-10', 'f', 'don', 'Oslo', 'norway'),

(200, '1968-11-29', 'f', 'lambi', 'paris', 'france'),

(1000, '1989-10-10', 'm', 'john', 'delhi', 'india'),

(1100, '1979-01-10', 'f', 'kens', 'berlin', 'germany'),

(1105, '1989-10-10', 'm', 'manish', 'delhi', 'india'),

(1106, '1979-01-10', 'f', 'kensive', 'berlin', 'germany'),

(1205, '1998-11-10', 'm', 'monk', 'delhi', 'india'),

(1259, '1999-12-10', 'm', 'maggie', 'delhi', 'india'),

(1507, '1992-08-10', 'f', 'mars', 'oslo', 'norway'),

(2004, '1966-03-29', 'f', 'johny', 'paris', 'france'),

(2505, '1960-03-10', 'f', 'kelvin', 'hamburg', 'germany');

insert into products(customerid, productid, productname, availability, price) values

(1, 1000, 'pen', 'yes', 100),

(2, 1100, 'toy', 'no', 10),

(3, 2505, 'pencil', 'yes', 30),

(4, 1205, 'duck', 'yes', 50),

(6, 200, 'hat', 'yes', 10),

(7, 2505, 'pot', 'no', 90),

(9, 1100, 'chalk', 'no', 10);

alter table customers add primary key (customerid);

alter table products add constraint foreign key (productid) references customers (customerid);

```sql
alter table products rename column ProductID to temp;

alter table products rename column CustomerID to ProductID;

alter table products rename column temp to CustomerID;

select * from products;


select * from customers where customername like '%or%';


alter table products alter column availability set default 'yes';




insert into products (Productid, customerid, productname, availability, price) values
(10, 2505, 'newtoy', 'yes', 2505);


select * from customers where city="berlin" and country="germany";


select * from customers where country!="germany";


select * from customers where city like 'a%';


select * from customers where city like 'a%b';


select * from customers where city not like 'a%';


select * from customers where city like 'a%' or city like 'c%' or city like 's%';


select * from customers where substring(city, 1, 1) between 'a' and 'f'
```

```sql
select * from customers where country!='norway' and country!='france';

select * from products where productname between 'hat' and 'pen';

select * from products where price between 50 and 100;

select CONSTRAINT_NAME from INFORMATION_SCHEMA.TABLE_CONSTRAINTS
WHERE TABLE_NAME='products';

alter table products drop foreign key products_ibfk_1 ;

alter table customers drop primary key;

delete from customers where city='victoria' and country='brazil';

select productname from products where price<=50;

select customername from customers where city!='hamburg' and city!='delhi';

select * from customers;

select customername from customers where timestampdiff(YEAR, dateofbirth, '1975-01-01');
```