

```
1 • create database banking;
2 • show databases;
3 • use banking;
4 • show tables;
5 • ⊖ create table branch(
6     branch_name varchar(20),
7     branch_city varchar(20),
8     assets real,
9     primary key(branch_name)
10 );
11 • ⊖ create table account(
12     accno int,
13     branch_name varchar(20),
14     balance real,
15     primary key(accno),
16     foreign key (branch_name) references branch(branch_name)
17 );
18 • ⊖ create table depositor(
19     customer_name varchar(20),
20     customer_street varchar(20),
21     customer_city varchar(20),
22     primary key(customer_name)
23 );
```

```
22     primary key(customer_name)
23 );
24 • ⊖ create table loan(
25     loan_number int,
26     branch_name varchar(20),
27     amount real,
28     foreign key (branch_name) references branch(branch_name)
29 );
30 • ⊖ create table borrower(
31     customer_name varchar(20),
32     loan_number int,
33     primary key(loan_number),
34     foreign key(customer_name)references depositor(customer_name),
35     foreign key(loan_number)references loan(loan_number)
36 );
37 • ⊖ create table customer(
38     customer_name varchar(20),
39     accno int,
40     primary key(customer_name ,accno),
41     foreign key (accno) references accounts(accno) on delete cascade on update cascade,
42     foreign key (customer_name) references customer(customer_name) on delete cascade on update
43     cascade);
44
```

```
46 • insert into branch values ('SBI RAJAJI NAGAR','MUMBAI',500000);
47 • insert into branch values ('SBI JAYANAGAR','DELHI',660000);
48 • insert into branch values ('SBI VIJAY NAGAR','BANGALORE',870000);
49 • insert into branch values ('SBI HOSAKEREHALLI','HYDERABAD',550000);
50 • commit;
51 • select * from branch;
52 • insert into account values (1234602,'SBI HOSAKEREHALLI',5000);
53 • insert into account values (1234603,'SBI VIJAY NAGAR',5000);
54 • insert into account values (1234604,'SBI JAYANAGAR',5000);
55 • insert into account values (1234605,'SBI RAJAJI NAGAR',10000);
56 • insert into account values (1234503,'SBI VIJAY NAGAR',40000);
57 • insert into account values (1234504,'SBI PD NAGAR',4000);
58 • commit;
59 • select * from account;
60 • insert into depositor values ('KEZAR','M G ROAD','DELHI');
61 • insert into depositor values ('LAL KRISHNA','ST MKS ROAD','BANGALORE');
62 • insert into depositor values ('RAHUL','AUGSTEN ROAD','HYDERABAD');
63 • insert into depositor values ('LALLU','V S ROAD','MUMBAI');
64 • insert into depositor values ('FAIZAL','RESEGENCY ROAD','CHENNAI');
65 • insert into depositor values ('RAJEEV','DICKNSN ROAD','RAJASTHAN');
66 • commit;
67 • select * from depositor;
68 • insert into loan values (10011,'SBI JAYANAGAR',10000);
```

```
67 • select * from depositor;
68 • insert into loan values (10011,'SBI JAYANAGAR',10000);
69 • insert into loan values (10012,'SBI VIJAY NAGAR',5000);
70 • insert into loan values (10013,'SBI HOSAKEREHALLI',20000);
71 • insert into loan values (10014,'SBI PD NAGAR',15000);
72 • insert into loan values (10015,'SBI RAJAJI NAGAR',25000);
73 • commit;
74 • select * from loan;
75 • insert into borrower values ('KEZAR',10011);
76 • insert into borrower values ('LAL KRISHNA',10012);
77 • insert into borrower values ('RAHUL',10013);
78 • insert into borrower values ('LALLU',10014);
79 • insert into borrower values ('LAL KRISHNA',10015);
80 • commit;
81 • select * from borrower;
82 • insert into customer values ('KEZAR',1234602);
83 • insert into customer values ('LAL KRISHNA',1234603);
84 • insert into customer values ('RAHUL',1234604);
85 • insert into customer values ('LALLU',1234605);
86 • insert into customer values ('FAIZAL',1234503);
87 • insert into customer values ('RAJEEV',1234604);
88 • commit;
89 • select * from customer;
```


```
88 • commit;
89 • select * from customer;
90
91
92 • SELECT customer_name
93         FROM customer c,account a
94         WHERE c.accno=a.accno
95         AND a.branch_name='SBI VIJAY NAGAR'
96         GROUP BY c.customer_name
97         HAVING COUNT(c.customer_name)>=1;
98
99 • SELECT customer_name
100 FROM branch b, account a, customer c
101 WHERE b.branch_name = a.branch_name AND
102        a.accno = c.accno AND
103        b.branch_city = 'BANGALORE'
104 GROUP BY customer_name HAVING COUNT( DISTINCT(b.branch_name)) = ( SELECT COUNT(branch_name)
105        FROM branch WHERE branch_city = 'BANGALORE');
106
107 • SELECT * FROM account ;
108 • DELETE FROM account
109 WHERE branch_name IN (SELECT branch_name FROM branch WHERE branch_city = 'BANGALORE');
110 • SELECT * FROM account ;
```

```
51 • select * from branch;
52 • insert into account values (1234602, 'SBI HOSAKEREHALLI', 5000);
```


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

	branch_name	branch_city	assets
▶	SBI HOSAKEREHALLI	HYDERABAD	550000
	SBI JAYANAGAR	DELHI	660000
	SBI PD NAGAR	CHENNAI	200000
	SBI RAJAJI NAGAR	MUMBAI	500000
	SBI VIJAY NAGAR	BANGALORE	870000
*	NULL	NULL	NULL

 Result Grid

 Form Editor

 Field Types

 Query Stats



branch 1 ×

Apply

Revert




```
59 • select * from account;
60 • insert into depositor values ('KEZAR','M G ROAD','DELHI');
```


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

	accno	branch_name	balance
▶	1234503	SBI VIJAY NAGAR	40000
	1234504	SBI PD NAGAR	4000
	1234602	SBI HOSAKEREHALLI	5000
	1234603	SBI VIJAY NAGAR	5000
	1234604	SBI JAYANAGAR	5000
	1234605	SBI RAJAJI NAGAR	10000
*	NULL	NULL	NULL

 Result Grid

 Form Editor

 Field Types

 Query Stats



account 2 x

Apply

Revert

```
67 • select * from depositor;
68 • insert into loan values (10011,'SBI JAYANAGAR',10000);
```


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

	customer_name	customer_street	customer_city
▶	FAIZAL	RESEDENCY ROAD	CHENNAI
	KEZAR	MG ROAD	DELHI
	LAL KRISHNA	ST MKS ROAD	BANGALORE
	LALLU	V S ROAD	MUMBAI
	RAHUL	AUGSTEN ROAD	HYDERABAD
	RAJEEV	DICKNSN ROAD	RAJASTHAN
★	NULL	NULL	NULL

  
Result  
Grid

  
Form  
Editor

  
Field  
Types

  
Query  
Stats



depositor3 x

Apply

Revert





```
74 • select * from loan;
75 • insert into borrower values ('KEZAR',10011);
```


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

	loan_number	branch_name	amount
▶	10011	SBI JAYANAGAR	10000
	10012	SBI VIJAY NAGAR	5000
	10013	SBI HOSAKEREHALLI	20000
	10014	SBI PD NAGAR	15000
	10015	SBI RAJAJI NAGAR	25000
*	NULL	NULL	NULL

 Result Grid

 Form Editor

 Field Types

 Query Stats










loan 4 x

Apply


Revert


```
81 • select * from borrower;  
82 • insert into customer values ('KEZAR',1234602);
```


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

	customer_name	loan_number
▶	KEZAR	10011
	LAL KRISHNA	10012
	RAHUL	10013
	LALLU	10014
	LAL KRISHNA	10015
*	NULL	NULL

  
Result  
Grid

  
Form  
Editor

  
Field  
Types

  
Query  
Stats

borrower 5 x

Apply

Revert


89 • `select * from customer;`

90


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

	customer_name	accno
▶	FAIZAL	1234503
	KEZAR	1234602
	LAL KRISHNA	1234603
	LALLU	1234605
	RAHUL	1234604
	RAJEEV	1234604
*	NULL	NULL

  
Result  
Grid

  
Form  
Editor

  
Field  
Types

  
Query  
Stats







customer 6 ×

Apply

Revert

```
92 • SELECT customer_name
93     FROM customer c,account a
94     WHERE c.accno=a.accno
95     AND a.branch_name='SBI VIJAY NAGAR'
96     GROUP BY c.customer_name
97     HAVING COUNT(c.customer_name)>=1;
98
```

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

	customer_name
▶	FAIZAL
	LAL KRISHNA

Result Grid

Form Editor

Field Types

Query Stats

Result 7 x

Read Only

```


99 •   SELECT customer_name
100   FROM branch b, account a, customer c
101  WHERE b.branch_name = a.branch_name AND
102         a.accno = c.accno AND
103         b.branch_city = 'BANGALORE'
104  GROUP BY customer_name HAVING COUNT( DISTINCT(b.branch_name)) = ( SELECT COUNT(branch_name)
105         FROM branch WHERE branch_city = 'BANGALORE');
106

```


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

	customer_name
▶	FAIZAL
	LAL KRISHNA

Result 9 x

 Read Only

  
Result  
Grid

  
Form  
Editor

  
Field  
Types

```

107 • SELECT * FROM account ;
108 • DELETE FROM account
109 WHERE branch_name IN (SELECT branch_name FROM branch WHERE branch_city = 'BANGALORE');
110 • SELECT * FROM account ;
111

```

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

	accno	branch_name	balance
▶	1234503	SBI VIJAY NAGAR	40000
	1234504	SBI PD NAGAR	4000
	1234602	SBI HOSAKEREHALLI	5000
	1234603	SBI VIJAY NAGAR	5000
	1234604	SBI JAYANAGAR	5000
	1234605	SBI RAJAJI NAGAR	10000
*	NULL	NULL	NULL

Result Grid

Form Editor

Field Types

account 10 x

Apply