

Practical-1 (Aditya Pulikal / 22 / DSAI)

```
CREATE TABLE salesman(salesman_id INTEGER PRIMARY KEY,name TEXT,city
TEXT,comission float);
INSERT INTO salesman VALUES (5001, 'James Hoog', 'New York', 0.15);
INSERT INTO salesman VALUES (5002, 'Nail Knite', 'Paris' ,0.13);
INSERT INTO salesman VALUES (5005, 'Pit Alex','London', 0.11);
INSERT INTO salesman VALUES (5006, 'Mc Lyon', 'Paris' ,0.14);
INSERT INTO salesman VALUES (5003, 'Lauson Hen', " ,0.12);
INSERT INTO salesman VALUES (5007, 'Paul Adam', 'Rome' , 0.13);
select * from salesman;
```

salesman_id	name	city	comission
5001	James Hoog	New York	0.15
5002	Nail Knite	Paris	0.13
5003	Lauson Hen		0.12
5005	Pit Alex	London	0.11
5006	Mc Lyon	Paris	0.14
5007	Paul Adam	Rome	0.13

```
CREATE TABLE customer(customer_id int primary key,customer_name text,city text,grade
int,salesman_id int,foreign key(salesman_id) references salesman(salesman_id));
INSERT INTO customer VALUES ( 3002, 'Nick Rimando' , 'New York', 100 ,5001);
INSERT INTO customer VALUES (3005, 'Graham Zusi', 'California' ,200 ,5002);
INSERT INTO customer VALUES (3001, 'Brad Guzan', 'London',null,null);
INSERT INTO customer VALUES (3004, 'Fabian Johnson', 'Paris' , 300, 5006);
INSERT INTO customer VALUES (3007, 'Brad Davis', 'New York' , 200, 5001);
INSERT INTO customer VALUES (3009, 'Geoff Cameron', 'Berlin', 100, null);
INSERT INTO customer VALUES (3008, 'Julian Green', 'London' , 300, 5002);
INSERT INTO customer VALUES (3003, 'Jozy Altidor', 'Moscow', 200, 5007);
select * from customer;
```

customer_id	customer_name	city	grade	salesman_id
3001	Brad Guzan	London	NULL	NULL
3002	Nick Rimando	New York	100	5001
3003	Jozy Altidor	Moscow	200	5007
3004	Fabian Johnson	Paris	300	5006
3005	Graham Zusi	California	200	5002
3007	Brad Davis	New York	200	5001
3008	Julian Green	London	300	5002
3009	Geoff Cameron	Berlin	100	NULL

```

CREATE TABLE orders (ord_no INTEGER PRIMARY KEY,purch_amt float,ord_date
date,customer_id INTEGER,foreign key(customer_id) references
customer(customer_id),salesman_id INTEGER,foreign key(salesman_id) references
salesman(salesman_id));
INSERT INTO orders VALUES (70001, 150.5, '2012-10-05', 3005, 5002);
INSERT INTO orders VALUES (70009, 270.65, '2012-09-10', 3001, null);
INSERT INTO orders VALUES (70002, 65.26, '2012-10-05', 3002, 5001);
INSERT INTO orders VALUES (70004, 110.5, '2012-08-17', 3009, null);
INSERT INTO orders VALUES (70007, 948.5, '2012-09-10', 3005, 5002);
INSERT INTO orders VALUES (70005, 2400.6, '2012-07-27', 3007, 5001);
INSERT INTO orders VALUES (70008, 5760, '2012-09-10', 3002, 5001);
INSERT INTO orders VALUES (70010, 1983.43, '2012-10-10', 3004, 5006);
INSERT INTO orders VALUES (70003, 2480.4, '2012-10-10', 3009, null);
INSERT INTO orders VALUES (70012, 250.45, '2012-06-27', 3008, 5002);
INSERT INTO orders VALUES (70011, 75.29, '2012-08-17', 3003, 5007);
select * from orders;

```

ord_no	purch_amt	ord_date	customer_id	salesman_id
70001	150.5	2012-10-05	3005	5002
70002	65.26	2012-10-05	3002	5001
70003	2480.4	2012-10-10	3009	NULL
70004	110.5	2012-08-17	3009	NULL
70005	2400.6	2012-07-27	3007	5001
70007	948.5	2012-09-10	3005	5002
70008	5760	2012-09-10	3002	5001
70009	270.65	2012-09-10	3001	NULL
70010	1983.43	2012-10-10	3004	5006
70011	75.29	2012-08-17	3003	5007
70012	250.45	2012-06-27	3008	5002

Q1:

```

mysql> select name,comission from salesman;
+-----+-----+
| name      | comission |
+-----+-----+
| James Hoog | 0.15      |
| Nail Knite | 0.13      |
| Lauson Hen | 0.12      |
| Pit Alex   | 0.11      |
| Mc Lyon    | 0.14      |
| Paul Adam  | 0.13      |
+-----+-----+
6 rows in set (0.00 sec)

```

Q2:

```
mysql> select distinct salesman_id from salesman;
+-----+
| salesman_id |
+-----+
|          5001 |
|          5002 |
|          5003 |
|          5005 |
|          5006 |
|          5007 |
+-----+
6 rows in set (0.02 sec)
```

Q3:

```
mysql> select name,city from salesman where city = 'paris';
+-----+-----+
| name      | city  |
+-----+-----+
| Nail Knite | Paris |
| Mc Lyon   | Paris |
+-----+-----+
2 rows in set (0.00 sec)
```

Q4:

```
mysql> select * from customer where grade = 200;
+-----+-----+-----+-----+-----+
| customer_id | customer_name | city      | grade | salesman_id |
+-----+-----+-----+-----+-----+
|          3003 | Jozy Altidor  | Moscow    | 200   |          5007 |
|          3005 | Graham Zusi   | California | 200   |          5002 |
|          3007 | Brad Davis    | New York  | 200   |          5001 |
+-----+-----+-----+-----+-----+
3 rows in set (0.00 sec)
```

Q5:

```
mysql> select ord_no,ord_date,purch_amt from orders where salesman_id = 5001;
+-----+-----+-----+
| ord_no | ord_date  | purch_amt |
+-----+-----+-----+
| 70002  | 2012-10-05 | 65.26     |
| 70005  | 2012-07-27 | 2400.6    |
| 70008  | 2012-09-10 | 5760      |
+-----+-----+-----+
3 rows in set (0.01 sec)
```

Q12:

```
mysql> select * from customer where city = 'new york' or not grade>100;
+-----+-----+-----+-----+-----+
| customer_id | customer_name | city      | grade | salesman_id |
+-----+-----+-----+-----+-----+
|          3002 | Nick Rimando   | New York  | 100    |          5001 |
|          3007 | Brad Davis     | New York  | 200    |          5001 |
|          3009 | Geoff Cameron  | Berlin    | 100    |          NULL |
+-----+-----+-----+-----+-----+
3 rows in set (0.02 sec)
```

Q13:

```
mysql> select * from salesman where comission between 0.12 and 0.14;
+-----+-----+-----+-----+
| salesman_id | name          | city      | comission |
+-----+-----+-----+-----+
|          5002 | Nail Knite    | Paris     | 0.13      |
|          5007 | Paul Adam     | Rome      | 0.13      |
+-----+-----+-----+-----+
2 rows in set (0.01 sec)
```

Q14:

```
mysql> select * from customer where customer_name like '%n';
+-----+-----+-----+-----+-----+
| customer_id | customer_name | city      | grade | salesman_id |
+-----+-----+-----+-----+-----+
|          3001 | Brad Guzan    | London    | NULL   |          NULL |
|          3004 | Fabian Johnson | Paris     | 300    |          5006 |
|          3008 | Julian Green   | London    | 300    |          5002 |
|          3009 | Geoff Cameron  | Berlin    | 100    |          NULL |
+-----+-----+-----+-----+-----+
4 rows in set (0.01 sec)
```

Q15: mysql> select * from salesman where name like 'n_i%';

```
+-----+-----+-----+-----+
| salesman_id | name          | city      | comission |
+-----+-----+-----+-----+
|          5002 | Nail Knite    | Paris     | 0.13      |
+-----+-----+-----+-----+
```

Q16: mysql> select * from customer where grade is NULL;

```
+-----+-----+-----+-----+-----+
| customer_id | customer_name | city      | grade | salesman_id |
+-----+-----+-----+-----+-----+
|          3001 | Brad Guzan    | London    | NULL   |          NULL |
+-----+-----+-----+-----+-----+
```

Q17: mysql> select sum(purch_amt) from orders;

sum(purch_amt)
14495.580047607422

Q18: mysql> select count(salesman_id) from orders;

count(salesman_id)
8

select count(distinct salesman_id) from orders;

count(distinct salesman_id)
4

Q19: mysql> select city,max(grade) from customer Group by city;

city	max(grade)
London	300
New York	200
Moscow	200
Paris	300
California	200
Berlin	100

Q20: mysql> select customer_id,max(purch_amt) from orders Group by customer_id;

customer_id	max(purch_amt)
3001	270.65
3002	5760
3003	75.29
3004	1983.43
3005	948.5
3007	2400.6
3008	250.45
3009	2480.4

Q21: mysql> select customer_id,ord_date,max(purch_amt) from orders group by customer_id,ord_date;

customer_id	ord_date	max(purch_amt)
3005	2012-10-05	150.5
3002	2012-10-05	65.26
3009	2012-10-10	2480.4
3009	2012-08-17	110.5
3007	2012-07-27	2400.6
3005	2012-09-10	948.5
3002	2012-09-10	5760
3001	2012-09-10	270.65
3004	2012-10-10	1983.43
3003	2012-08-17	75.29
3008	2012-06-27	250.45

Q22: mysql> select salesman_id,max(purch_amt) from orders where ord_date = '2012-08-17' group by salesman_id;

salesman_id	max(purch_amt)
NULL	110.5
5007	75.29

Q23: mysql> select customer_id,ord_date,max(purch_amt) from orders group by customer_id,ord_date having max(purch_amt)>2000;

customer_id	ord_date	max(purch_amt)
3009	2012-10-10	2480.4
3007	2012-07-27	2400.6
3002	2012-09-10	5760

Q24: mysql> select count(*) from orders where ord_date= '2012-08-17';

count(*)
2