Date – 03/08/2023
Time – 2:30 – 5:00pm

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DBMS LAB – 9

Q1

```
set autocommit = 0;

create table emp (empno int(6), ename varchar(20), job varchar(10), dept varchar(10), deptno
int(3), sal float(7, 2));

start transaction;

insert into emp values (1, "sanjivkannaa", "SDE", "software", 1, 100.10);

commit;

select * from emp;
+-------+--------------+------+----------+--------+--------+
| empno | ename        | job  | dept     | deptno | sal    |
+-------+--------------+------+----------+--------+--------+
|     1 | sanjivkannaa | SDE  | software |      1 | 100.10 |
+-------+--------------+------+----------+--------+--------+

rollback;


select * from emp;
+-------+--------------+------+----------+--------+--------+
| empno | ename        | job  | dept     | deptno | sal    |
+-------+--------------+------+----------+--------+--------+
|     1 | sanjivkannaa | SDE  | software |      1 | 100.10 |
+-------+--------------+------+----------+--------+--------+


start transaction;

insert into emp values (2, "sri vignesh", "SDE", "software", 1, 200.10);

select * from emp;
+-------+--------------+------+----------+--------+--------+
| empno | ename        | job  | dept     | deptno | sal    |
+-------+--------------+------+----------+--------+--------+
|     1 | sanjivkannaa | SDE  | software |      1 | 100.10 |
|     2 | sri vignesh  | SDE  | software |      1 | 200.10 |
+-------+--------------+------+----------+--------+--------+
rollback;

select * from emp;
+-------+--------------+------+----------+--------+--------+
| empno | ename        | job  | dept     | deptno | sal    |
+-------+--------------+------+----------+--------+--------+
|     1 | sanjivkannaa | SDE  | software |      1 | 100.10 |
+-------+--------------+------+----------+--------+--------+
```

Q2

```
#creating table
create table product (barcode varchar(10), pname varchar(10), price int, quantityinstock int);

create table sale (saleid int, deliveryaddress varchar(30), creditcard int);


create table saleitem (saleid int, barcode varchar(10), quantity int);

#insert data
insert into product values ("aaaa", "phone", 100000, 9);

insert into product values ("bbbb", "laptop", 90000, 8);


insert into sale values (1, "address1", 1234567890);

insert into sale values (2, "address2", 1234567891);


insert into saleitem values (1, "aaaa", 1);

insert into saleitem values (2, "bbbb", 2);
```

1

```
delimiter //
create trigger updateavailablequantity
    -> after insert
    -> on saleitem
    -> for each row begin
    -> update product
    -> set product.quantityinstock = product.quantityinstock - NEW.quantity
    -> where NEW.barcode = product.barcode;
    -> end;
    -> //

select * from product//
+---------+--------+--------+-----------------+
| barcode | pname  | price  | quantityinstock |
+---------+--------+--------+-----------------+
| aaaa    | phone  | 100000 |               9 |
| bbbb    | laptop |  90000 |               8 |
+---------+--------+--------+-----------------+

insert into saleitem values (1, "aaaa", 1);//

select * from product//
+---------+--------+--------+-----------------+
| barcode | pname  | price  | quantityinstock |
+---------+--------+--------+-----------------+
| aaaa    | phone  | 100000 |               8 |
| bbbb    | laptop |  90000 |               8 |
+---------+--------+--------+-----------------+
```

2

```
delimiter //
create procedure spinsertproduct (in barcode_ varchar(10), in pname_ varchar(10), in price_
int, in quantity_ int)
    -> begin
    ->     start transaction;
    ->     insert into product values (barcode_, pname_, price_, quantity_);
    ->     if price_ <= 0 or quantity_ < 0 then rollback;
    ->     end if;
    -> end;
    -> //
delimiter ;

call spinsertproduct("cccc", "tablet", 0, 10);

call spinsertproduct("cccc", "tablet", 10, 0);

select * from product;
+---------+--------+--------+-----------------+
| barcode | pname  | price  | quantityinstock |
+---------+--------+--------+-----------------+
| aaaa    | phone  | 100000 |              10 |
| bbbb    | laptop |  90000 |               9 |
+---------+--------+--------+-----------------+

call spinsertproduct("cccc", "tablet", 10000, 10);
```

```
select * from product;
+---------+--------+--------+-----------------+
| barcode | pname  | price  | quantityinstock |
+---------+--------+--------+-----------------+
| aaaa    | phone  | 100000 |              10 |
| bbbb    | laptop |  90000 |               9 |
| cccc    | tablet |  10000 |              10 |
+---------+--------+--------+-----------------+
```

3

```
delimiter //
create function spreturn1 (quantity_ int, barcode_ varchar(10))
    -> returns int deterministic
    -> begin
    -> return (select quantity_*price as total_price from product where barcode=barcode_);
    -> end;
    -> //

select spreturn1(2, "aaaa");
    -> //
+----------------------+
| spreturn1(2, "aaaa") |
+----------------------+
|               200000 |
+----------------------+
```