

## **Group 4:**

### **Group Members:**

**1.Zahir Ayub Khan(Group Leader)**

**2.Jamal khan**

**3.Nauman Ali**

**4.Syed Shan E Ali**

### **Common Solution By Zahir Ayub Khan:**

#### **Student Transcript:**

```
create table Student (  
ID nchar(30),  
Name varchar(30),  
);  
  
create table Transcript (  
Subject nchar(30),  
GPA nchar(30),  
ID nchar(30),  
);  
  
INSERT INTO Student (ID, Name)  
VALUES ('Sp17-bse-001', 'ahmad khan');  
  
INSERT INTO Student (ID, Name)  
VALUES ('Sp17-bse-002', 'Hassan ali');  
  
INSERT INTO Student (ID, Name)  
VALUES ('Sp17-bse-003', 'Bilal Khan');  
  
INSERT INTO Student (ID, Name)  
VALUES ('Sp17-bse-004', 'Rana Noon');  
  
INSERT INTO Student (ID, Name)  
VALUES ('Sp17-bse-005', 'Zoya Yusufzai');  
  
INSERT INTO Student (ID, Name)  
VALUES ('Sp17-bse-006', 'Zain Ahmad');  
  
INSERT INTO Student (ID, Name)  
VALUES ('Sp17-bse-007', 'Ghulam mujtaba');  
  
INSERT INTO Student (ID, Name)  
VALUES ('Sp17-bse-008', 'Hamza ali khan');
```

```

INSERT INTO Student (ID, Name)
VALUES ('Sp17-bse-009', 'Ali Joiya');

INSERT INTO Student (ID, Name)
VALUES ('Sp17-bse-010', 'Alex markovich');

INSERT INTO Transcript(Subject,GPA,ID)
VALUES ('Math','2.3','Sp17-bse-001');

INSERT INTO Transcript(Subject,GPA,ID)
VALUES ('English','3.3','Sp17-bse-002');

INSERT INTO Transcript(Subject,GPA,ID)
VALUES ('Database system','2.7','Sp17-bse-003');

INSERT INTO Transcript(Subject,GPA,ID)
VALUES ('OOP','3.7','Sp17-bse-004');

INSERT INTO Transcript(Subject,GPA,ID)
VALUES ('Islamic studies','3.0','Sp17-bse-005');

INSERT INTO Transcript(Subject,GPA,ID)
VALUES ('CA','2.0','Sp17-bse-006');

INSERT INTO Transcript(Subject,GPA,ID)
VALUES ('Advance OOP','2.7','Sp17-bse-007');

INSERT INTO Transcript(Subject,GPA,ID)
VALUES ('statistics','2.3','Sp17-bse-008');

INSERT INTO Transcript(Subject,GPA,ID)
VALUES ('Cal1','2.3','Sp17-bse-009');

INSERT INTO Transcript(Subject,GPA,ID)
VALUES ('SQE','2.7','Sp17-bse-010');

/* Above work is Zahir Ayub Khan. Work Below Is Jamal khan*/

```

```

create database StudentTranscriptDB
use StudentTranscriptDB

```

```

create table Student(
StudentId nchar(30),
Name(30))

insert into Student(StudentId,Name) values
('fa20-bcs-001','ali')
insert into Student(StudentId,Name) values
('fa20-bcs-002','Aftab')
insert into Student(StudentId,Name) values
('fa20-bcs-003','Ammar')
insert into Student(StudentId,Name) values
('fa20-bcs-004','Mohsin')

```

```

insert into Student(StudentId,Name) values
('fa20-bcs-005','Zubair')
insert into Student(StudentId,Name) values
('fa20-bcs-006','Daniyal')
insert into Student(StudentId,Name) values
('fa20-bcs-007','Usman')
insert into Student(StudentId,Name) values
('fa20-bcs-008','Abbass')
insert into Student(StudentId,Name) values
('fa20-bcs-009','Saddique')
insert into Student(StudentId,Name) values
('fa20-bcs-010','Umar')

```

```

create table Transcript(
CourseName nchar(30),
GPA float(30),
StudentId nchar(30)
);

```

```

insert into Transcript (CourseName,GPA,StudentId) values
('Database Systems','1.3','fa20-bcs-001')
insert into Transcript (CourseName,GPA,StudentId) values
('Database Systems','1.3','fa20-bcs-002')
insert into Transcript (CourseName,GPA,StudentId) values
('Database System','2.7','fa20-bcs-003')
insert into Transcript (CourseName,GPA,StudentId) values
('Database Systems','3.3','fa20-bcs-004')
insert into Transcript (CourseName,GPA,StudentId) values
('Database System','4.0','fa20-bcs-005')
insert into Transcript (CourseName,GPA,StudentId) values
('Operating Systems','2.7','fa20-bcs-006')
insert into Transcript (CourseName,GPA,StudentId) values
('Database Systems','2.0','fa20-bcs-007')
insert into Transcript (CourseName,GPA,StudentId) values
('Database Systems','3.7','fa20-bcs-008')
insert into Transcript (CourseName,GPA,StudentId) values
('Operating Systems','2.5','fa20-bcs-009')
insert into Transcript (CourseName,GPA,StudentId) values
('Database Systems','3.0','fa20-bcs-010')

```

```

Select Count(*) As [Number of std]
FROM [StudentTranscriptDB].[dbo].[Transcript]

```

```

Group By CourseName

```

```

Select CourseName, AVG(GPA) As [AVG GPA]
FROM [StudentTranscriptDB].[dbo].[Transcript]

```

```

Group By CourseName

```

## Dream Home:

```
select * from branch;
INSERT into Branch (branchNo, street, city, postcode) VALUES ('B005',
'H#88 j-13/3', 'ABT', '54000');
INSERT into Branch (branchNo, street, city, postcode) VALUES ('B006',
'H#77 k-14/6', 'KARI', '56000');
INSERT into Branch (branchNo, street, city, postcode) VALUES ('B007',
'H#89 m-11/7', 'QUA', '63000');
INSERT into Branch (branchNo, street, city, postcode) VALUES ('B008',
'H#69 I-10/2', 'ISL', '52200');
INSERT into Branch (branchNo, street, city, postcode) VALUES ('B009',
'H#35 I-61/2', 'HAR', '73000');
INSERT into Branch (branchNo, street, city, postcode) VALUES ('B0010',
'H#66 I-01/5', 'MUL', '32100');
INSERT into Branch (branchNo, street, city, postcode) VALUES ('B0011',
'H#99 I-11/3', 'ABT', '53300');
INSERT into Branch (branchNo, street, city, postcode) VALUES ('B0012',
'H#12 I-10/2', 'SWA', '57700');
INSERT into Branch (branchNo, street, city, postcode) VALUES ('B0013',
'H#19 I-13/6', 'KARI', '56600');
INSERT into Branch (branchNo, street, city, postcode) VALUES ('B0014',
'H#35 I-62/2', 'HAR', '73800');
INSERT into Branch (branchNo, street, city, postcode) VALUES ('B0015',
'H#66 I-02/5', 'MUL', '23700');
INSERT into Branch (branchNo, street, city, postcode) VALUES ('B0016',
'H#99 I-17/3', 'ABT', '81900');
INSERT into Branch (branchNo, street, city, postcode) VALUES ('B0017',
'H#12 I-80/6', 'SWA', '65100');
INSERT into Branch (branchNo, street, city, postcode) VALUES ('B0018',
'H#19 I-93/6', 'KARI', '89100');
```

/\* Above work is Zahir Ayub Khan. Work Below Is Jamal khan\*/

```
create database DreamHome;
use Dreamhome;
create table Branch(branchNo varchar(20) NOT NULL PRIMARY KEY, street varchar(50)
NOT NULL, city varchar(50) NOT NULL,
postcode varchar(20) NOT NULL);
```

```
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0019', 'X#11 Y-11/1', 'ABBOTTABAD', '22500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0020', 'X#77 Y-22/2', 'MANSERA', '23400');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0021', 'X#89 Y-33/3', 'PESHAWER', '24500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0022', 'X#69 Y-44/4', 'MARDAN', '26500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0023', 'X#35 Y-55/5', 'KOHAT', '27500');
```

```

INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0024', 'X#66 Y-66/6', 'NOWSHERA', '28500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0025', 'X#99 Y-77/7', 'SWABI', '29500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0026', 'X#12 Y-88/8', 'ISLAMABAD', '31500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0027', 'X#19 Y-99/9', 'RAWALPINDI', '32500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0028', 'X#35 Y-12/1', 'LAHORE', '33500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0029', 'X#66 Y-13/2', 'KARACHI', '34500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0030', 'X#99 Y-14/3', 'MULTAN', '35500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0031', 'X#12 Y-15/4', 'HYDERABAD', '36500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0032', 'X#19 Y-16/5', 'OKHARA', '37500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0033', 'X#35 Y-12/1', 'LAHORE', '8000');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0034', 'X#66 Y-13/2', 'KARACHI', '9000');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0035', 'X#99 Y-14/3', 'MULTAN', '11000');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0036', 'X#12 Y-15/4', 'HYDERABAD', '15000');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0037', 'X#19 Y-16/5', 'OKHARA', '34500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0038', 'X#35 Y-12/1', 'LAHORE', '1000');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0039', 'X#66 Y-13/2', 'KARACHI', '19000');

```

## Update And Delete:

```

create table Student (
ID nchar(30),
Name varchar(30),
);

```

```

create table Transcript (
Subject nchar(30),
GPA nchar(30),
ID nchar(30),
);

```

```

INSERT INTO Student (ID, Name)
VALUES ('Sp17-bse-001', 'ahmad khan');

```

```

INSERT INTO Student (ID, Name)
VALUES ('Sp17-bse-002', 'Hassan ali');

```

```

INSERT INTO Student (ID, Name)
VALUES ('Sp17-bse-003', 'Bilal Khan');

INSERT INTO Student (ID, Name)
VALUES ('Sp17-bse-004', 'Rana Noon');

INSERT INTO Student (ID, Name)
VALUES ('Sp17-bse-005', 'Zoya Yusufzai');

INSERT INTO Student (ID, Name)
VALUES ('Sp17-bse-006', 'Zain Ahmad');

INSERT INTO Student (ID, Name)
VALUES ('Sp17-bse-007', 'Ghulam mujtaba');

INSERT INTO Student (ID, Name)
VALUES ('Sp17-bse-008', 'Hamza ali khan');

INSERT INTO Student (ID, Name)
VALUES ('Sp17-bse-009', 'Ali Joiya');

INSERT INTO Student (ID, Name)
VALUES ('Sp17-bse-010', 'Alex markovich');


INSERT INTO Transcript(Subject,GPA,ID)
VALUES ('Math','2.3','Sp17-bse-001');

INSERT INTO Transcript(Subject,GPA,ID)
VALUES ('English','3.3','Sp17-bse-002');

INSERT INTO Transcript(Subject,GPA,ID)
VALUES ('Database system','2.7','Sp17-bse-003');

INSERT INTO Transcript(Subject,GPA,ID)
VALUES ('OOP','3.7','Sp17-bse-004');

INSERT INTO Transcript(Subject,GPA,ID)
VALUES ('Islamic studies','3.0','Sp17-bse-005');

INSERT INTO Transcript(Subject,GPA,ID)
VALUES ('CA','2.0','Sp17-bse-006');

INSERT INTO Transcript(Subject,GPA,ID)
VALUES ('Advance OOP','2.7','Sp17-bse-007');

INSERT INTO Transcript(Subject,GPA,ID)
VALUES ('statistics','2.3','Sp17-bse-008');

INSERT INTO Transcript(Subject,GPA,ID)
VALUES ('Cal1','2.3','Sp17-bse-009');

INSERT INTO Transcript(Subject,GPA,ID)
VALUES ('SQE','2.7','Sp17-bse-010');

UPDATE Transcript
Set GPA='2.7'
WHERE ID='Sp17-bse-001';

```

```
UPDATE Transcript
Set GPA='1.7'
WHERE ID='Sp17-bse-006';
```

```
UPDATE Transcript
Set GPA='2.3'
WHERE ID='Sp17-bse-010';
```

```
DELETE FROM Transcript WHERE ID='Sp17-bse-009';
DELETE FROM Transcript WHERE ID='Sp17-bse-008';
```

```
/* Above work is Zahir Ayub Khan. Work Below Is Jamal khan*/
```

```
create database StudentTranscriptDB
use StudentTranscriptDB
```

```
create table Student(
StudentId nchar(30),
Name(30))
```

```
insert into Student(StudentId,Name) values
('fa20-bcs-001','ali')
insert into Student(StudentId,Name) values
('fa20-bcs-002','Aftab')
insert into Student(StudentId,Name) values
('fa20-bcs-003','Ammar')
insert into Student(StudentId,Name) values
('fa20-bcs-004','Mohsin')
insert into Student(StudentId,Name) values
('fa20-bcs-005','Zubair')
insert into Student(StudentId,Name) values
('fa20-bcs-006','Daniyal')
insert into Student(StudentId,Name) values
('fa20-bcs-007','Usman')
insert into Student(StudentId,Name) values
('fa20-bcs-008','Abbass')
insert into Student(StudentId,Name) values
('fa20-bcs-009','Saddique')
insert into Student(StudentId,Name) values
('fa20-bcs-010','Umar')
```

```
create table Transcript(
CourseName nchar(30),
GPA float(30),
StudentId nchar(30)
);
```

```
insert into Transcript (CourseName,GPA,StudentId) values
('Database Systems','1.3','fa20-bcs-001')
insert into Transcript (CourseName,GPA,StudentId) values
('Database Systems','1.3','fa20-bcs-002')
insert into Transcript (CourseName,GPA,StudentId) values
```

```

('Database System','2.7','fa20-bcs-003')
insert into Transcript (CourseName,GPA,StudentId) values
('Database Systems','3.3','fa20-bcs-004')
insert into Transcript (CourseName,GPA,StudentId) values
('Database System','4.0','fa20-bcs-005')
insert into Transcript (CourseName,GPA,StudentId) values
('Operating Systems','2.7','fa20-bcs-006')
insert into Transcript (CourseName,GPA,StudentId) values
('Database Systems','2.0','fa20-bcs-007')
insert into Transcript (CourseName,GPA,StudentId) values
('Database Systems','3.7','fa20-bcs-008')
insert into Transcript (CourseName,GPA,StudentId) values
('Operating Systems','2.5','fa20-bcs-009')
insert into Transcript (CourseName,GPA,StudentId) values
('Database Systems','3.0','fa20-bcs-010')

```

```

DELETE FROM Transcript WHERE StudentId='fa20-bcs-008';
select * from Transcript

```

```

UPDATE Transcript set GPA='3.3'WHERE StudentId='fa20-bcs-010';
select * from Transcript

```

```

DELETE FROM Transcript WHERE StudentId='fa20-bcs-002';
select * from Transcript

```

```

UPDATE Transcript set GPA='3.3'WHERE StudentId='fa20-bcs-004';
select * from Transcript

```

```

DELETE FROM Transcript WHERE StudentId='fa20-bcs-001';
select * from Transcript

```

```

UPDATE Transcript set GPA='1.3'WHERE StudentId='fa20-bcs-003';
select * from Transcript

```

```

DELETE FROM Transcript WHERE StudentId='fa20-bcs-006';
select * from Transcript

```

```

UPDATE Transcript set GPA='0'WHERE StudentId='fa20-bcs-009';
select * from Transcript

```

**Jamal Khan: [FA16-Bcs-087]**

## Update And Delete:

```

create database StudentTranscriptDB
use StudentTranscriptDB

```



```

create table Student(
StudentId nchar(30),
Name(30))

insert into Student(StudentId,Name) values
('fa20-bcs-001','ali')
insert into Student(StudentId,Name) values
('fa20-bcs-002','Aftab')
insert into Student(StudentId,Name) values
('fa20-bcs-003','Ammar')
insert into Student(StudentId,Name) values
('fa20-bcs-004','Mohsin')
insert into Student(StudentId,Name) values
('fa20-bcs-005','Zubair')
insert into Student(StudentId,Name) values
('fa20-bcs-006','Daniyal')
insert into Student(StudentId,Name) values
('fa20-bcs-007','Usman')
insert into Student(StudentId,Name) values
('fa20-bcs-008','Abbass')
insert into Student(StudentId,Name) values
('fa20-bcs-009','Saddique')
insert into Student(StudentId,Name) values
('fa20-bcs-010','Umar')


create table Transcript(
CourseName nchar(30),
GPA float(30),
StudentId nchar(30)
);

insert into Transcript (CourseName,GPA,StudentId) values
('Database Systems','1.3','fa20-bcs-001')
insert into Transcript (CourseName,GPA,StudentId) values
('Database Systems','1.3','fa20-bcs-002')
insert into Transcript (CourseName,GPA,StudentId) values
('Database System','2.7','fa20-bcs-003')
insert into Transcript (CourseName,GPA,StudentId) values
('Database Systems','3.3','fa20-bcs-004')
insert into Transcript (CourseName,GPA,StudentId) values
('Database System','4.0','fa20-bcs-005')
insert into Transcript (CourseName,GPA,StudentId) values
('Operating Systems','2.7','fa20-bcs-006')
insert into Transcript (CourseName,GPA,StudentId) values
('Database Systems','2.0','fa20-bcs-007')
insert into Transcript (CourseName,GPA,StudentId) values
('Database Systems','3.7','fa20-bcs-008')
insert into Transcript (CourseName,GPA,StudentId) values
('Operating Systems','2.5','fa20-bcs-009')
insert into Transcript (CourseName,GPA,StudentId) values
('Database Systems','3.0','fa20-bcs-010')


DELETE FROM Transcript WHERE StudentId='fa20-bcs-008';

```

```

select * from Transcript

UPDATE Transcript set GPA='3.3'WHERE StudentId='fa20-bcs-010';
select * from Transcript

DELETE FROM Transcript WHERE StudentId='fa20-bcs-002';
select * from Transcript

UPDATE Transcript set GPA='3.3'WHERE StudentId='fa20-bcs-004';
select * from Transcript

DELETE FROM Transcript WHERE StudentId='fa20-bcs-001';
select * from Transcript

UPDATE Transcript set GPA='1.3'WHERE StudentId='fa20-bcs-003';
select * from Transcript

DELETE FROM Transcript WHERE StudentId='fa20-bcs-006';
select * from Transcript

UPDATE Transcript set GPA='0'WHERE StudentId='fa20-bcs-009';
select * from Transcript

```

## DreamHome:

```

create database DreamHome;
use Dreamhome;
create table Branch(branchNo varchar(20) NOT NULL PRIMARY KEY, street varchar(50)
NOT NULL, city varchar(50) NOT NULL,
postcode varchar(20) NOT NULL);

```

```

INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0019','X#11 Y-11/1', 'ABBOTTABAD', '22500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0020','X#77 Y-22/2', 'MANSERA', '23400');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0021','X#89 Y-33/3', 'PESHAVER', '24500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0022','X#69 Y-44/4', 'MARDAN', '26500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0023','X#35 Y-55/5', 'KOHAT', '27500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0024','X#66 Y-66/6', 'NOWSHERA', '28500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0025','X#99 Y-77/7', 'SWABI', '29500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0026','X#12 Y-88/8', 'ISLAMABAD', '31500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0027','X#19 Y-99/9', 'RAWALPINDI', '32500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0028','X#35 Y-12/1', 'LAHORE', '33500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0029','X#66 Y-13/2', 'KARACHI', '34500');

```

```

INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0030','X#99 Y-14/3', 'MULTAN', '35500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0031','X#12 Y-15/4', 'HYDERABAD', '36500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0032','X#19 Y-16/5', 'OKHARA', '37500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0033','X#35 Y-12/1', 'LAHORE', '8000');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0034','X#66 Y-13/2', 'KARACHI', '9000');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0035','X#99 Y-14/3', 'MULTAN', '11000');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0036','X#12 Y-15/4', 'HYDERABAD', '15000');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0037','X#19 Y-16/5', 'OKHARA', '34500');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0038','X#35 Y-12/1', 'LAHORE', '1000');
INSERT into Branch (branchNo, street, city, postcode) VALUES
('B0039','X#66 Y-13/2', 'KARACHI', '19000');

```

## Student Transcript:

```

create database StudentTranscriptDB
use StudentTranscriptDB

```

```

create table Student(
StudentId nchar(30),
Name(30))

insert into Student(StudentId,Name) values
('fa20-bcs-001','ali')
insert into Student(StudentId,Name) values
('fa20-bcs-002','Aftab')
insert into Student(StudentId,Name) values
('fa20-bcs-003','Ammar')
insert into Student(StudentId,Name) values
('fa20-bcs-004','Mohsin')
insert into Student(StudentId,Name) values
('fa20-bcs-005','Zubair')
insert into Student(StudentId,Name) values
('fa20-bcs-006','Daniyal')
insert into Student(StudentId,Name) values
('fa20-bcs-007','Usman')
insert into Student(StudentId,Name) values
('fa20-bcs-008','Abbass')
insert into Student(StudentId,Name) values
('fa20-bcs-009','Saddique')
insert into Student(StudentId,Name) values
('fa20-bcs-010','Umar')

```

```

create table Transcript(
  CourseName nchar(30),
  GPA float(30),
  StudentId nchar(30)
);

insert into Transcript (CourseName,GPA,StudentId) values
('Database Systems','1.3','fa20-bcs-001')
insert into Transcript (CourseName,GPA,StudentId) values
('Database Systems','1.3','fa20-bcs-002')
insert into Transcript (CourseName,GPA,StudentId) values
('Database System','2.7','fa20-bcs-003')
insert into Transcript (CourseName,GPA,StudentId) values
('Database Systems','3.3','fa20-bcs-004')
insert into Transcript (CourseName,GPA,StudentId) values
('Database System','4.0','fa20-bcs-005')
insert into Transcript (CourseName,GPA,StudentId) values
('Operating Systems','2.7','fa20-bcs-006')
insert into Transcript (CourseName,GPA,StudentId) values
('Database Systems','2.0','fa20-bcs-007')
insert into Transcript (CourseName,GPA,StudentId) values
('Database Systems','3.7','fa20-bcs-008')
insert into Transcript (CourseName,GPA,StudentId) values
('Operating Systems','2.5','fa20-bcs-009')
insert into Transcript (CourseName,GPA,StudentId) values
('Database Systems','3.0','fa20-bcs-010')

Select Count(*) As [Number of std]
FROM [StudentTranscriptDB].[dbo].[Transcript]

Group By CourseName

Select CourseName, AVG(GPA) As [AVG GPA]
FROM [StudentTranscriptDB].[dbo].[Transcript]

Group By CourseName

```

## Lab 7:

*Q1: Print the List of postcodes without any repetition*

*ANS: Select distinct(postcode) from Branch;*

*Q2: Print all fName from Staff without repetition*

*ANS: Select distinct(fName) from Staff;*

*Q3: List all staff with renaming all its columns in results*

ANS: Select staffNo as ID, fName as FirstName, lName as LastName, [position] as Allocation, sex as Gender, DOB as Birth, salary as Wages, branchNo as Branch from Staff;

Q4: List all clients with re-naming all its columns to synonyms.

ANS: SELECT clientNo as StakeHolderID, fName as FirstName, lName as LastName, telNo as PhoneNo, prefType as Preference, maxRent as MaximumRent FROM Client;

Q5: List all staff with a salary greater than 10,000. ANS SELECT salary FROM Staff where salary >10000;

Q6: List all managers and supervisors.

ANS: SELECT [position] FROM Staff Where [position] = 'supervisor' OR [position] = 'manager'

## **LAB 8:**

Q1:

Ans: select staffNo,fName,lName,salary from staff order by salary desc

Q2:

Ans: select propertyNo,type,rooms,rent from PropertyForRent order by type select propertyNo,type,rooms,rent from PropertyForRent order by type,rent desc

Q3:

Ans: select count(\*) as myCount from PropertyForRent where rent<=500

Q4:

Ans: select count(Distinct propertyNo) As myCount from Viewing WHERE viewDate BETWEEN '1-May-04' AND '31-May-04';

Q5:

Ans: select count(staffNo) as myCount,sum(salary) as mySalary from staff where position='Manager'

Q6:

Ans: *select MIN(salary) as myMin, MAX(salary) as myMax, AVG(salary) as myAVG from Staff*

Q7:

Ans: *SELECT staffNo, fName, lName, position, salary FROM Staff WHERE (SELECT AVG(salary) FROM Staff) < salary;*

Q8:

Ans: *select \*from Staff where salary> any(select salary from Staff where branchNo='B003')* Qno9:- Answer *select \*from Staff where salary> all(select salary from Staff where branchNo='B003')*