Create Trigger

```sql
Select * from Test1

Select * from Test2
```

Id	Value
1	X
2	X
3	X

Id	Value

```sql
Create Trigger trForInsert on Test1 For Insert
as
Begin
        Insert into Test2 values ('YYYY')
End


Insert into Test1 values ('X')


Select * from Test1

Select * from Test2
```

Id	Value
1	X
2	X
3	X
4	X

Id	Value
1	YYYY

```
Select SCOPE_IDENTITY()
(No column name)
4
Above value for the first table


Select @@IDENTITY
(No column name)
1
This column number for trigger table( Test2)


Select * from Test2
Id      Value
1       YYYY
```

SCOPE_IDENTITY() - returns the last identity value that is created in the same session and in the same scope.

@@IDENTITY - returns the last identity value that is created in the same session and across any scope.

IDENT_CURRENT('TableName') - returns the last identity value that is created for a specific table across any session and any scope.

For Example

```
In one session
Insert into Test2 values ('zzzz')
```

And Another session

```sql
Insert into Test2 values ('zzzz')

Select SCOPE_IDENTITY()
```

(No column name)

2

```sql
Select @@IDENTITY
```

(No column name)

2

```sql
Select IDENT_CURRENT('Test2')
```

(No column name)

3

Adding Unique Key Constraint

```sql
Alter Table tblPerson

Add Constraint UQ_tblPerson_Email Unique(Email)
```


general syntax-

Alter Table Table_Name

Add Constraint Constraint_Name Unique(Column_Name)


```sql
Delete from tblPerson

Select * from tblPerson
```

ID Name	Email	GenderId	Age


```sql
Insert into tblPerson values(1,'tom','t@s.com',1,NULL)

Select * from tblPerson
```

ID	Name	Email	GenderId	Age
1	tom	t@s.com	1	NULL

```
Insert into tblPerson values(2,'tom','t@s.com',1,NULL)
```

```
Select * from tblPerson
```

It will gives error because Email is unique in this and we are trying to
duplicate value

Drop Unique Constraint

```
Alter Table tblPerson
```

```
Drop COnstraint UQ_tblPerson_Email
```

When we drop this Constraint then we will be able to insert duplicate email

```
Insert into tblPerson values(2,'tom','t@s.com',1,NULL)
```

```
Select * from tblPerson
```

ID	Name	Email	GenderId	Age
1	tom	t@s.com	1	NULL
2	tom	t@s.com	1	NULL

Select Command

```
Select * from tblPerson
```

ID	Name	Email	GenderId	Age
1	tom	t@s.com	1	NULL
2	tom	t@s.com	1	NULL

```
SELECT [ID] ,[Name] ,[Email] ,[GenderId]
      ,[Age]
  FROM [dbo].[tblPerson]


GO
```

ID	Name	Email	GenderId	Age
1	tom	t@s.com	1	NULL

```
2      tom     t@s.com        1       NULL
```

```sql
ALTER TABLE tblPerson

ADD City int NULL

Select * from tblPerson
```

```
ID      Name    Email  GenderId        Age     City

1       tom     t@s.com        1       NULL    NULL

2       tom     t@s.com        1       NULL    NULL
```

```sql
ALTER TABLE tblPerson

DROP COLUMN City;

ALTER TABLE tblPerson

ADD City varchar(20) NULL

Select * from tblPerson
```

```
ID      Name    Email  GenderId        Age     City

1       tom     t@s.com        1       NULL    NULL

2       tom     t@s.com        1       NULL    NULL
```

```sql
Insert into tblPerson values(3,'john','john@s.com',1,45,'london')

Insert into tblPerson values(4,'manis','maneesh@s.com',1,22,'lucknow')

Insert into tblPerson values(5,'tom','tom@s.com',1,56,'newyork')

Insert into tblPerson values(6,'marry','marry@s.com',1,29,'london')

Select * from tblPerson
```

```
ID      Name    Email  GenderId        Age     City

1       tom     t@s.com        1       NULL    NULL

2       tom     t@s.com        1       NULL    NULL

3       john    john@s.com     1       45      london

4       manis   maneesh@s.com  1       22      lucknow

5       tom     tom@s.com      1       56      newyork

6       marry   marry@s.com    1       29      london
```

```
Select Distinct City from tblPerson
```

City

NULL

london

lucknow

newyork

```
Select Distinct Name,City from tblPerson
```

Name	City
john	london
manis	lucknow
marry	london
tom	NULL
tom	newyork

Where Command

```
Select * from tblPerson Where City='london'
```

ID	Name	Email	GenderId	Age	City
3	john	john@s.com	1	45	london
6	marry	marry@s.com	1	29	london

```
Select * from tblPerson Where City<>'london'
```

ID	Name	Email	GenderId	Age	City
4	manis	maneesh@s.com	1	22	lucknow
5	tom	tom@s.com	1	56	newyork

```
Select * from tblPerson Where City!='london'
```

ID	Name	Email	GenderId	Age	City
4	manis	maneesh@s.com	1	22	lucknow

5	tom	tom@s.com	1	56	newyork

In Operator

```
Select * from tblPerson Where Age In (22,29,45)
```

ID	Name	Email	GenderId	Age	City
3	john	john@s.com	1	45	london
4	manis	maneesh@s.com	1	22	lucknow
6	marry	marry@s.com	1	29	london

Between Operator

```
Select * from tblPerson Where Age Between 22 And 30
```

ID	Name	Email	GenderId	Age	City
4	manis	maneesh@s.com	1	22	lucknow
6	marry	marry@s.com	1	29	london

Like Operator And Wildcard(%)

```
Select * from tblPerson Where City Like 'l%'
```

ID	Name	Email	GenderId	Age	City
3	john	john@s.com	1	45	london
4	manis	maneesh@s.com	1	22	lucknow
6	marry	marry@s.com	1	29	london

```
Select * from tblPerson Where Email Like '%@%'
```

ID	Name	Email	GenderId	Age	City
1	tom	t@s.com	1	NULL	NULL
2	tom	t@s.com	1	NULL	NULL
3	john	john@s.com	1	45	london
4	manis	maneesh@s.com	1	22	lucknow
5	tom	tom@s.com	1	56	newyork

```
6       marry   marry@s.com   1      29      london
```

```
Select * from tblPerson Where Email Not Like '%@%'
```

```
ID      Name    Email  GenderId      Age     City
```

```
Select * from tblPerson Where Email Like '_@_.com'
```

ID	Name	Email	GenderId	Age	City
1	tom	t@s.com	1	NULL	NULL
2	tom	t@s.com	1	NULL	NULL

```
Select * from tblPerson Where Name Like '[Mj]%'
```

ID	Name	Email	GenderId	Age	City
3	john	john@s.com	1	45	london
4	manis	maneesh@s.com	1	22	lucknow
6	marry	marry@s.com	1	29	london

```
Select * from tblPerson Where Name Like '[^Mj]%'
```

ID	Name	Email	GenderId	Age	City
1	tom	t@s.com	1	NULL	NULL
2	tom	t@s.com	1	NULL	NULL
5	tom	tom@s.com	1	56	newyork

And and Or operator

```
Select * from tblPerson Where (City='london' or City='lucknow')
And Age>30
```

ID	Name	Email	GenderId	Age	City
3	john	john@s.com	1	45	london

Order By

```
Select * from tblPerson order by Name
```

ID	Name	Email	GenderId	Age	City
3	john	john@s.com	1	45	london
4	manis	maneesh@s.com	1	22	lucknow
6	marry	marry@s.com	1	29	london
5	tom	tom@s.com	1	56	newyork
1	tom	t@s.com	1	NULL	NULL
2	tom	t@s.com	1	NULL	NULL

```
Select * from tblPerson order by Name Desc
```

ID	Name	Email	GenderId	Age	City
1	tom	t@s.com	1	NULL	NULL
2	tom	t@s.com	1	NULL	NULL
5	tom	tom@s.com	1	56	newyork
6	marry	marry@s.com	1	29	london
4	manis	maneesh@s.com	1	22	lucknow
3	john	john@s.com	1	45	london

```
Select * from tblPerson order by Name Desc,Age Asc
```

ID	Name	Email	GenderId	Age	City
1	tom	t@s.com	1	NULL	NULL
2	tom	t@s.com	1	NULL	NULL
5	tom	tom@s.com	1	56	newyork
6	marry	marry@s.com	1	29	london
4	manis	maneesh@s.com	1	22	lucknow
3	john	john@s.com	1	45	london

Top Command

```
Select Top 2 * from tblPerson
```

ID	Name	Email	GenderId	Age	City

| 1 | tom | t@s.com | 1 | NULL | NULL |
| 2 | tom | t@s.com | 1 | NULL | NULL |

```
Select Top 50 PERCENT * from tblPerson
```

ID	Name	Email	GenderId	Age	City
1	tom	t@s.com	1	NULL	NULL
2	tom	t@s.com	1	NULL	NULL
3	john	john@s.com	1	45	london

```
Select Top 2 * from tblPerson order By Age Desc
```

ID	Name	Email	GenderId	Age	City
5	tom	tom@s.com	1	56	newyork
3	john	john@s.com	1	45	london

Group By Command

```
Delete from tblPerson
```

```
Select * from tblPerson
```

ID	Name	Email	GenderId	Age	City

```
ALTER TABLE tblPerson
ADD Salary int NULL
Insert into tblPerson values(1,'john','john@s.com',1,45,'london',45000)
Insert into tblPerson values(2,'raju','maneesh@s.com',1,22,'lucknow',56000)
Insert into tblPerson values(3,'john','john@s.com',1,45,'london',70000)
Insert into tblPerson values(4,'manis','maneesh@s.com',1,22,'lucknow',40000)
Insert into tblPerson values(5,'tom','tom@s.com',1,56,'newyork',45000)
Insert into tblPerson values(6,'marry','marry@s.com',2,29,'london',36000)
```

```
Select * from tblPerson
```

ID	Name	Email	GenderId	Age	City	Salary
1	john	john@s.com	1	45	london	45000
2	raju	maneesh@s.com	1	22	lucknow	56000
3	john	john@s.com	1	45	london	70000
4	manis	maneesh@s.com	1	22	lucknow	40000
5	tom	tom@s.com	1	56	newyork	45000
6	marry	marry@s.com	2	29	london	36000

Aggregate Function

```
Select Sum(Salary) from tblPerson
```

(No column name)

292000

```
Select Min(Salary) from tblPerson
```

(No column name)

36000

```
Select City, Sum(Salary) As TotalSalary from tblPerson
Group By City
```

City	TotalSalary
london	151000
lucknow	96000
newyork	45000