

this operation is applied on  
Salesdb

Syntax:



## RULES OF SET OPERATORS

#1 RULE | ORDER BY can be used only once

#2 RULE | Same Number of Columns

#3 RULE | Matching Data Types

#4 RULE | Same Order of Columns

#5 RULE | First Query Controls Aliases

#6 RULE | Mapping Correct Columns

All the rules

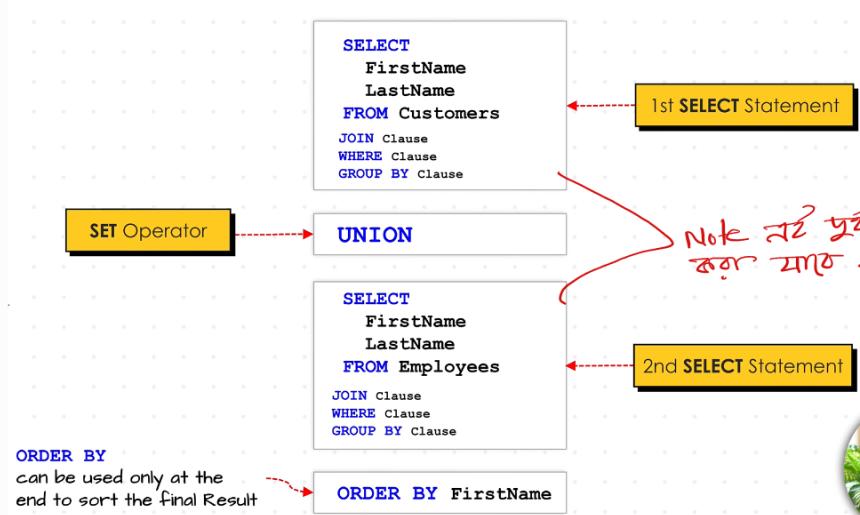
=> Some of the errors might occurs for violating the rules

### #1 RULE | SQL CLAUSES

- SET Operator can be used almost in all clauses

WHERE | JOIN | GROUP BY | HAVING

- ORDER BY is allowed only once at the end of query



### #2 RULE | NUMBER OF COLUMNS

The number of columns in each query must be the same

```
SELECT FirstName, LastName  
FROM Sales.Customers  
UNION  
SELECT FirstName, LastName  
FROM Sales.Employees
```



If two table's column are not same it will through an error.

#3 Data type of the selected table's column must be same otherwise it will show error

```
SELECT FirstName, (varchar)
      LastName (varchar)
   FROM Sales.Customers
UNION
SELECT FirstName, (varchar)
      LastName (varchar)
   FROM Sales.Employees
```

	FirstName	LastName
1	Anna	Adams
2	Carol	Baker
3	Frank	Lee
4	Jossef	Goldberg
5	Kevin	Brown
6	Mark	Schwarz
7	Mary	NULL
8	Michael	Ray

```
SELECT CustomerID INT
      LastName
   FROM Sales.Customers
UNION
SELECT FirstName, VARCHAR
      LastName
   FROM Sales.Employees
```

mismatch in the data type.

## #4 RULE | ORDER OF COLUMNS

The order of the columns in each query must

```
SELECT LastName, VARCHAR
      CustomerID
   FROM Sales.Customers
UNION
SELECT EmployeeID INT
      LastName
   FROM Sales.Employees
```

## #5 RULE | COLUMN ALIASES

The column names in the result set are determined by the column names specified in the first query.

SQLQuery6.sql - D:\8QBU\Youtube (53) \* SQLQuery5.sql - D:\8QBU\Youtube (62) \*

```

SELECT
CustomerID AS ID,
LastName
FROM Sales.Customers

```

**1st query controls column names**

UNION

```

SELECT
EmployeeID,
LastName
FROM Sales.Employees

```

6.2.3 final output to head  
line 6.2.1 1st query to select (21 to 1)  
or, 6.2.6 change 20 to 21 is just  
query to AS after change  
20 to 21

Results Messages

ID	LastName
1	Goldberg
2	Lee
3	Brown
4	NULL
5	Ray
6	Schwarz
7	Adams
8	Baker

## #6 RULE | CORRECT COLUMNS

- Even if all rules are met and SQL shows no errors, the result may be incorrect.

- Incorrect column selection leads to inaccurate results.

SELECT  
FirstName,  
LastName  
FROM Sales.Customers

UNION

```

SELECT
LastName,
FirstName
FROM Sales.Employees

```

Results Messages

	FirstName	LastName
1	NULL	Mary
2	Anna	Adams
3	Baker	Carol
4	Brown	Kevin
5	Jossef	Goldberg
6	Kevin	Brown
7	Lee	Frank
8	Mark	Schwarz
9	Mary	NULL
10	Ray	Michael

