

Database changed

mysql> SELECT * FROM Employees;

EmployeeID	Name	Department	Salary	JoiningDate
1	Jal Shah	IT	10000000	2012-10-30
2	Mayank Desai	IT	1000000	2012-10-31
3	Hitanshi Varma	IT	10000000	2013-10-30
4	Dhairya Dalvadeya	R&D	10000	2014-01-15
5	Dhairya Hadvani	R&D	30000	2014-09-14
6	Pavan Shah	Marketing	3000000	2013-04-13
7	Bhakt Talati	Finance	1500000	2015-06-30
8	Chitral Shah	Support	15000	2019-04-04
9	Daksh Chandnani	HR	450000	2018-09-24
10	Kartikeya Dabral	Logistics	400000	2018-10-24
11	Shahrukh Khan	Sales	4000000	2020-05-01
12	Ranbir Kapoor	Sales	4000000	2020-05-01
13	Aayush Jasani	Admin	400000	2024-10-02
14	Ansh Prajapati	Marketing	300000	2024-11-29
15	Jay Variya	Operations	3000000	2025-01-01
16	Harshit Sharma	HR	30000	2025-01-15
17	Virat Kohli	Marketing	3000000	2025-04-25
18	Heet Kotak	Finance	5000000	2020-03-14
19	Henil Goti	R&D	1000000	2023-03-19
20	Mayank Patel	Finance	10000	2019-10-11

20 rows in set (0.00 sec)

mysql> SELECT * FROM Employees WHERE Name LIKE 'A%';

EmployeeID	Name	Department	Salary	JoiningDate
13	Aayush Jasani	Admin	400000	2024-10-02
14	Ansh Prajapati	Marketing	300000	2024-11-29

2 rows in set (0.00 sec)

mysql> SELECT * FROM Employees WHERE Name LIKE '%e';

Empty set (0.00 sec)

mysql> SELECT * FROM Employees WHERE Name LIKE '%ar%';

EmployeeID	Name	Department	Salary	JoiningDate
3	Hitanshi Varma	IT	10000000	2013-10-30
10	Kartikeya Dabral	Logistics	400000	2018-10-24
15	Jay Variya	Operations	3000000	2025-01-01
16	Harshit Sharma	HR	30000	2025-01-15

4 rows in set (0.00 sec)

mysql> SELECT * FROM Employees WHERE Department LIKE 'F%';

EmployeeID	Name	Department	Salary	JoiningDate
7	Bhakt Talati	Finance	1500000	2015-06-30
18	Heet Kotak	Finance	5000000	2020-03-14
20	Mayank Patel	Finance	10000	2019-10-11

3 rows in set (0.00 sec)

mysql> SELECT * FROM Employees WHERE Name LIKE '_____';

Empty set (0.00 sec)

mysql> SELECT * FROM Employees WHERE Department IN('HR','Finance');

EmployeeID	Name	Department	Salary	JoiningDate
7	Bhakt Talati	Finance	1500000	2015-06-30
9	Daksh Chandnani	HR	450000	2018-09-24
16	Harshit Sharma	HR	30000	2025-01-15
18	Heet Kotak	Finance	5000000	2020-03-14
20	Mayank Patel	Finance	10000	2019-10-11

5 rows in set (0.00 sec)

mysql> SELECT * FROM Employees WHERE Salary IN(10000000,1000000,5000000);

EmployeeID	Name	Department	Salary	JoiningDate
1	Jal Shah	IT	10000000	2012-10-30
2	Mayank Desai	IT	1000000	2012-10-31
3	Hitanshi Varma	IT	10000000	2013-10-30
18	Heet Kotak	Finance	5000000	2020-03-14
19	Henil Goti	R&D	1000000	2023-03-19

5 rows in set (0.00 sec)

mysql> SELECT * FROM Employees WHERE EmployeeID IN(1,4,7);

EmployeeID	Name	Department	Salary	JoiningDate
1	Jal Shah	IT	10000000	2012-10-30
4	Dhairya Dalvadeya	R&D	10000	2014-01-15
7	Bhakt Talati	Finance	1500000	2015-06-30

3 rows in set (0.00 sec)

```
mysql> SELECT * FROM Employees WHERE Department NOT IN('IT','Finance');
```

EmployeeID	Name	Department	Salary	JoiningDate
4	Dhairya Dalvadeya	R&D	10000	2014-01-15
5	Dhairya Hadvani	R&D	30000	2014-09-14
6	Pavan Shah	Marketing	3000000	2013-04-13
8	Chitral Shah	Support	15000	2019-04-04
9	Daksh Chandnani	HR	450000	2018-09-24
10	Kartikkeya Dabral	Logistics	400000	2018-10-24
11	Shahrukh Khan	Sales	4000000	2020-05-01
12	Ranbir Kapoor	Sales	4000000	2020-05-01
13	Aayush Jasani	Admin	400000	2024-10-02
14	Ansh Prajapati	Marketing	300000	2024-11-29
15	Jay Variya	Operations	3000000	2025-01-01
16	Harshit Sharma	HR	30000	2025-01-15
17	Virat Kholi	Marketing	3000000	2025-04-25
19	Henil Goti	R&D	1000000	2023-03-19

14 rows in set (0.00 sec)

```
mysql> SELECT * FROM Employees WHERE YEAR(JoiningDate) IN (2019,2021,2022);
```

EmployeeID	Name	Department	Salary	JoiningDate
8	Chitral Shah	Support	15000	2019-04-04
20	Mayank Patel	Finance	10000	2019-10-11

2 rows in set (0.00 sec)

```
mysql> SELECT * FROM Employees WHERE Salary BETWEEN 5000000 AND 6500000;
```

EmployeeID	Name	Department	Salary	JoiningDate
18	Heet Kotak	Finance	5000000	2020-03-14

1 row in set (0.00 sec)

```
mysql> SELECT * FROM Employees WHERE JoiningDate BETWEEN '2020-01-01' AND '2021-12-31';
```

EmployeeID	Name	Department	Salary	JoiningDate
11	Shahrukh Khan	Sales	4000000	2020-05-01
12	Ranbir Kapoor	Sales	4000000	2020-05-01
18	Heet Kotak	Finance	5000000	2020-03-14

3 rows in set (0.00 sec)

```
mysql> SELECT * FROM Employees WHERE EmployeeID BETWEEN 3 AND 6;
```

EmployeeID	Name	Department	Salary	JoiningDate
3	Hitanshi Varma	IT	10000000	2013-10-30
4	Dhairya Dalvadeya	R&D	10000	2014-01-15
5	Dhairya Hadvani	R&D	30000	2014-09-14
6	Pavan Shah	Marketing	3000000	2013-04-13

```
mysql> SELECT * FROM Employees WHERE Salary NOT BETWEEN 5000000 AND 6500000;
```

EmployeeID	Name	Department	Salary	JoiningDate
1	Jal Shah	IT	10000000	2012-10-30
2	Mayank Desai	IT	1000000	2012-10-31
3	Hitanshi Varma	IT	10000000	2013-10-30
4	Dhairya Dalvadeya	R&D	10000	2014-01-15
5	Dhairya Hadvani	R&D	30000	2014-09-14
6	Pavan Shah	Marketing	3000000	2013-04-13
7	Bhakt Talati	Finance	1500000	2015-06-30
8	Chitral Shah	Support	15000	2019-04-04
9	Daksh Chandnani	HR	450000	2018-09-24
10	Kartikkeya Dabral	Logistics	400000	2018-10-24
11	Shahrukh Khan	Sales	4000000	2020-05-01
12	Ranbir Kapoor	Sales	4000000	2020-05-01
13	Aayush Jasani	Admin	400000	2024-10-02
14	Ansh Prajapati	Marketing	300000	2024-11-29
15	Jay Variya	Operations	3000000	2025-01-01
16	Harshit Sharma	HR	30000	2025-01-15
17	Virat Kholi	Marketing	3000000	2025-04-25
19	Henil Goti	R&D	1000000	2023-03-19
20	Mayank Patel	Finance	10000	2019-10-11

19 rows in set (0.00 sec)

```
mysql> SELECT * FROM Employees WHERE JoiningDate BETWEEN '2019-03-01' AND '2022-03-01';
```

EmployeeID	Name	Department	Salary	JoiningDate
8	Chitral Shah	Support	15000	2019-04-04
11	Shahrukh Khan	Sales	4000000	2020-05-01
12	Ranbir Kapoor	Sales	4000000	2020-05-01
18	Heet Kotak	Finance	5000000	2020-03-14
20	Mayank Patel	Finance	10000	2019-10-11

5 rows in set (0.00 sec)

```
mysql> Use Jai;
Database changed
mysql> Create Table Student(RollNo INT PRIMARY KEY,
    -> Name VARCHAR(100),
    -> Age INT,
    -> Department VARCHAR(100));
Query OK, 0 rows affected (0.04 sec)

mysql> SELECT * FROM Student;
Empty set (0.02 sec)

mysql> ALTER TABLE Student ADD Email VARCHAR(100);
Query OK, 0 rows affected (0.05 sec)
Records: 0 Duplicates: 0 Warnings: 0

mysql> SELECT * FROM Student;
Empty set (0.00 sec)

mysql> ALTER TABLE Student MODIFY Age SMALLINT;
Query OK, 0 rows affected (0.06 sec)
Records: 0 Duplicates: 0 Warnings: 0

mysql> SELECT * FROM Student;
Empty set (0.00 sec)

mysql> Create Table Course(CourseID INT PRIMARY KEY,
    -> CourseName VARCHAR(100) UNIQUE,
    -> Credits INT CHECK(Credits>0));
Query OK, 0 rows affected (0.05 sec)

mysql> SELECT * FROM Course;
Empty set (0.00 sec)

mysql> ALTER TABLE Student DROP COLUMN Email;
Query OK, 0 rows affected (0.04 sec)
Records: 0 Duplicates: 0 Warnings: 0

mysql> SELECT * FROM Course;
Empty set (0.00 sec)

mysql> DROP TABLE Course;
Query OK, 0 rows affected (0.02 sec)

mysql> SELECT * FROM Course;
ERROR 1146 (42S02): Table 'jai.course' doesn't exist
mysql> TRUNCATE TABLE Student;
Query OK, 0 rows affected (0.03 sec)

mysql> TRUNCATE TABLE Student;
Query OK, 0 rows affected (0.03 sec)

mysql> SELECT * FROM Student;
Empty set (0.00 sec)
```

```

mysql> INSERT INTO Student VALUES(101,"Jal",18,"CSD");
Query OK, 1 row affected (0.01 sec)

mysql> INSERT INTO Student VALUES(102,"Aditya",20,"CSE");
Query OK, 1 row affected (0.01 sec)

mysql> INSERT INTO Student VALUES(103,"Manan",19,"IT");
Query OK, 1 row affected (0.01 sec)

mysql> SELECT * FROM Student;
+-----+-----+-----+-----+
| RollNo | Name  | Age  | Department |
+-----+-----+-----+-----+
| 101    | Jal   | 18   | CSD        |
| 102    | Aditya | 20   | CSE        |
| 103    | Manan | 19   | IT         |
+-----+-----+-----+-----+
3 rows in set (0.00 sec)

mysql> UPDATE Student SET Department="CSE"
-> WHERE RollNo=101;
Query OK, 1 row affected (0.02 sec)
Rows matched: 1 Changed: 1 Warnings: 0

mysql> SELECT * FROM Student;
+-----+-----+-----+-----+
| RollNo | Name  | Age  | Department |
+-----+-----+-----+-----+
| 101    | Jal   | 18   | CSE        |
| 102    | Aditya | 20   | CSE        |
| 103    | Manan | 19   | IT         |
+-----+-----+-----+-----+
3 rows in set (0.00 sec)

mysql> DELETE FROM Student WHERE Age < 18;
Query OK, 0 rows affected (0.00 sec)

mysql> SELECT * FROM Student;
+-----+-----+-----+-----+
| RollNo | Name  | Age  | Department |
+-----+-----+-----+-----+
| 101    | Jal   | 18   | CSE        |
| 102    | Aditya | 20   | CSE        |
| 103    | Manan | 19   | IT         |
+-----+-----+-----+-----+
3 rows in set (0.00 sec)

mysql> SELECT * FROM Student WHERE Department = "IT";
+-----+-----+-----+-----+
| RollNo | Name  | Age  | Department |
+-----+-----+-----+-----+
| 103    | Manan | 19   | IT         |
+-----+-----+-----+-----+
1 row in set (0.00 sec)

mysql> SELECT Name,Department FROM Student;
+-----+-----+
| Name  | Department |
+-----+-----+
| Jal   | CSE        |
| Aditya | CSE        |
| Manan | IT         |
+-----+-----+
3 rows in set (0.00 sec)

mysql> SELECT * FROM Student ORDER BY Age DESC;
+-----+-----+-----+-----+
| RollNo | Name  | Age  | Department |
+-----+-----+-----+-----+
| 102    | Aditya | 20   | CSE        |
| 103    | Manan | 19   | IT         |
| 101    | Jal   | 18   | CSE        |
+-----+-----+-----+-----+
3 rows in set (0.00 sec)

mysql> SELECT * FROM Student WHERE Name LIKE 'A%';
+-----+-----+-----+-----+
| RollNo | Name  | Age  | Department |
+-----+-----+-----+-----+
| 102    | Aditya | 20   | CSE        |
+-----+-----+-----+-----+
1 row in set (0.00 sec)

mysql> SELECT * FROM Student WHERE Age BETWEEN 18 AND 25;
+-----+-----+-----+-----+
| RollNo | Name  | Age  | Department |
+-----+-----+-----+-----+
| 101    | Jal   | 18   | CSE        |
| 102    | Aditya | 20   | CSE        |
| 103    | Manan | 19   | IT         |
+-----+-----+-----+-----+
3 rows in set (0.00 sec)

mysql> CREATE TABLE Library(BookID INT,Title VARCHAR(100),Author VARCHAR(100),Price INT);
Query OK, 0 rows affected (0.03 sec)

```

```
mysql> INSERT INTO Library VALUES(1001,"Mahabharat","Ved Vyasa",100);
Query OK, 1 row affected (0.01 sec)

mysql> INSERT INTO Library VALUES(1002,"Ramayan","Valmiki",150);
Query OK, 1 row affected (0.01 sec)

mysql> INSERT INTO Library VALUES(1003,"A Suitable Boy","Vikram Seth",900);
Query OK, 1 row affected (0.01 sec)

mysql> INSERT INTO Library VALUES(1004,"The Guide","R. K. Narayan",500);
Query OK, 1 row affected (0.01 sec)

mysql> INSERT INTO Library VALUES(1005,"Tales of Mayank","Mayank Desai",10);
Query OK, 1 row affected (0.01 sec)
```

```
mysql> SELECT * FROM Library;
```

BookID	Title	Author	Price
1001	Mahabharat	Ved Vyasa	100
1002	Ramayan	Valmiki	150
1003	A Suitable Boy	Vikram Seth	900
1004	The Guide	R. K. Narayan	500
1005	Tales of Mayank	Mayank Desai	10

```
5 rows in set (0.00 sec)
```

```
mysql> UPDATE Library SET Price = Price * 1.10 WHERE Price < 300;
Query OK, 3 rows affected (0.01 sec)
Rows matched: 3 Changed: 3 Warnings: 0
```

```
mysql> SELECT * FROM Library;
```

BookID	Title	Author	Price
1001	Mahabharat	Ved Vyasa	110
1002	Ramayan	Valmiki	165
1003	A Suitable Boy	Vikram Seth	900
1004	The Guide	R. K. Narayan	500
1005	Tales of Mayank	Mayank Desai	11

```
5 rows in set (0.00 sec)
```

```
mysql> DELETE FROM Library WHERE Author = "Mayank Desai";
Query OK, 1 row affected (0.01 sec)
```

```
mysql> SELECT * FROM Library;
```

BookID	Title	Author	Price
1001	Mahabharat	Ved Vyasa	110
1002	Ramayan	Valmiki	165
1003	A Suitable Boy	Vikram Seth	900
1004	The Guide	R. K. Narayan	500

```
4 rows in set (0.00 sec)
```