

1. What is the difference between truncate, delete, drop?

	<b>DELETE Command</b>	<b>DROP Command</b>	<b>TRUNCATE Command</b>
Language	The DELETE command is Data Manipulation Language Command.	The DROP command is Data Definition Language Command.	The TRUNCATE command is a Data Definition Language Command.
Use	The DELETE command deletes one or more existing records from the table in the database.	The DROP Command drops the complete table from the database.	The TRUNCATE Command deletes all the rows from the existing table, leaving the row with the column names.
Transition	We can restore any deleted row or multiple rows from the database using the ROLLBACK command.	We cannot get the complete table deleted from the database using the ROLLBACK command.	We cannot restore all the deleted rows from the database using the ROLLBACK command.
Memory Space	The DELETE command does not free the allocated space of the table from memory.	The DROP command removes the space allocated for the table from memory.	The TRUNCATE command does not free the space allocated for the table from memory.
Performance Speed	The DELETE command performs slower than the DROP command and TRUNCATE command as it deletes one or more rows based on a specific condition.	The DROP Command has faster performance than DELETE Command but not as compared to the Truncate Command because the DROP command deletes the table from the database after deleting the rows.	The TRUNCATE command works faster than the DROP command and DELETE command because it deletes all the records from the table without any condition.
Integrity	The Integrity	The Integrity	The Integrity

Constraints	Constraints remain the same in the DELETE command.	Constraints get removed for the DROP command.	Constraints will not get removed from the TRUNCATE command.
Permission	DELETE permission is required to delete the rows of the table.	We need ALTER permission on the schema to which the table belongs and CONTROL permission on the table to use the DROP command.	We need table ALTER permission to use the TRUNCATE command.
Syntax	DELETE FROM table_name WHERE condition;	DROP TABLE table_name;	TRUNCATE TABLE table_name;

## 2. What are alias in MySQL?

Aliases in MySQL is used to give a **temporary name** to a table or a column in a table for the purpose of a particular query. It works as a nickname for expressing the tables or column names. It makes the query short and neat.

It is very useful when the table or column name is not user-friendly in real-time. It makes the name of a column more readable. MySQL aliases can exist only for the **duration** of a query.

Ex. - **SELECT** col\_name **AS** 'alias\_name' **FROM** table\_name;

## 3. How do you display even rows of the any table?

The simplest way to find the records with odd or even values is to check the remainder when we divide the column value by 2. A remainder of 0 indicates an even number, while an odd number points to an odd number.

to find rows where a specified column has even values:-

```
SELECT *
FROM table_name
WHERE mod(column_name,2) = 0;
```

4. How can you remove duplicates from a table(distinct and other way) ?

By using distinct -

INNER JOIN

```
Delete col_dup FROM table_name AS t1
```

```
INNER JOIN table_name as t2
```

```
WHERE t1.col_dup < t2.col_dup
```

Other Way -

```
WITH table ([FirstName],
```

```
[LastName],
```

```
[Country],
```

```
DuplicateCount)
```

```
AS (SELECT [FirstName],
```

```
[LastName],
```

```
[Country],
```

```
ROW_NUMBER() OVER(PARTITION BY [FirstName],
```

```
[LastName],
```

```
[Country]
```

```
ORDER BY ID) AS DuplicateCount
```

```
FROM [SampleDB].[dbo].[Employee])
```

```
DELETE FROM table
```

```
WHERE DuplicateCount > 1;
```

5. How you can find 5th max salary?(Do it by all 3 ways)

1st =

```
select * from(
```

```
select ename, sal, dense_rank()
```

```
over(order by sal desc)r from Employee)
```

```
where r=&n;
```

Put n=5;

2nd =

```
select * from Employee ORDER BY `salary` DESC limit 4,1;
```

3rd=

```
SELECT TOP 1 salary
```

```
FROM ( SELECT DISTINCT TOP 5 salary
```

```
FROM Employee
```

```
ORDER BY salary DESC) AS temp
```

```
ORDER BY salary
```