

SQL Command Categories & Data Types

SQL Command Categories

- 1 DDL – CREATE, ALTER, DROP, TRUNCATE, RENAME
- 2 DML – INSERT, UPDATE, DELETE
- 3 DQL – SELECT
- 4 DCL – GRANT, REVOKE
- 5 TCL – COMMIT, ROLLBACK, SAVEPOINT

SQL Data Types (Used While Creating Tables)

1. Numeric Data Types

- 1 INT / INTEGER – Whole numbers
- 2 SMALLINT – Small whole numbers
- 3 BIGINT – Large whole numbers
- 4 DECIMAL(p,s) – Exact decimal values
- 5 FLOAT / DOUBLE – Approximate decimal values

2. Character / String Data Types

- 1 CHAR(n) – Fixed-length string
- 2 VARCHAR(n) – Variable-length string
- 3 TEXT – Large text data

3. Date and Time Data Types

- 1 DATE – Stores date (YYYY-MM-DD)
- 2 TIME – Stores time
- 3 DATETIME – Stores date and time
- 4 TIMESTAMP – Stores date and time with timezone info

4. Boolean Data Type

- 1 BOOLEAN / BOOL – TRUE or FALSE

5. Binary / Miscellaneous Data Types

- 1 BLOB – Binary Large Object
- 2 ENUM – List of predefined values

Example CREATE TABLE Statement

```
CREATE TABLE Employee (
    emp_id INT PRIMARY KEY,
    name VARCHAR(50),
    salary DECIMAL(10,2),
    joining_date DATE
);
```