**DDL Commands & Syntax**

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In this article, we will discuss the overview of DDL commands and will understand DDL commands like create, alter, truncate, drop. We will cover each command syntax with the help of an example for better understanding. Let’s discuss it one by one.

**Overview :**  
Data Definition Language(DDL) is a subset of SQL and a part of [DBMS(Database Management System)](https://www.geeksforgeeks.org/dbms/). DDL consist of Commands to commands like CREATE, ALTER, TRUNCATE and DROP. These commands are used to create or modify the tables in SQL.

**DDL Commands :**  
In this section, We will cover the following DDL commands as follows.

1. Create
2. Alter
3. truncate
4. drop

Let’s discuss it one by one.

**Command-1 :**  
**CREATE :**  
This command is used to create a new table in SQL. The user has to give information like table name, column names, and their datatypes.

**Syntax –**

CREATE TABLE table\_name

(

column\_1 datatype,

column\_2 datatype,

column\_3 datatype,

....

);

**Example –**  
We need to create a table for storing Student information of a particular College. Create syntax would be as below.

CREATE TABLE Student\_info

(

College\_Id number(2),

College\_name varchar(30),

Branch varchar(10)

);

**Command-2 :**  
**ALTER :**  
This command is used to add, delete or change columns in the existing table. The user needs to know the existing table name and can do add, delete or modify tasks easily.

**Syntax –**  
Syntax to add a column to an existing table.

ALTER TABLE table\_name

ADD column\_name datatype;

**Example –**  
In our Student\_info table, we want to add a new column for CGPA. The syntax would be as below as follows.

ALTER TABLE Student\_info

ADD CGPA number;

**Command-3 :**  
**TRUNCATE :**  
This command is used to remove all rows from the table, but the structure of the table still exists.

**Syntax –**  
Syntax to remove an existing table.

TRUNCATE TABLE table\_name;

**Example –**  
The College Authority wants to remove the details of all students for new batches but wants to keep the table structure. The command they can use is as follows.

TRUNCATE TABLE Student\_info;

**Command-4 :**  
**DROP :**  
This command is used to remove an existing table along with its structure from the Database.

**Syntax –**  
Syntax to drop an existing table.

DROP TABLE table\_name;

**Example –**  
If the College Authority wants to change their Database by deleting the Student\_info Table.

DROP TABLE Student\_info;

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#### DML (Data Manipulation Language) :

DML statements are used for managing data with in schema objects.  
DML are of two types –

1. **Procedural DMLs** : require a user to specify what data are needed and how to get those data.
2. **Declerative DMLs** (also referred as **Non-procedural DMLs**) : require a user to specify what data are needed without specifying how to get those data.

Declarative DMLs are usually easier to learn and use than procedural DMLs. However, since a user does not have to specify how to get the data, the database system has to figure out an efficient means of accessing data.

**Some Commands :**

SELECT: retrieve data from the database

INSERT: insert data into a table

UPDATE: update existing data within a table

DELETE: deletes all records from a table, space for the records remain

Example of SQL query that finds the names of all instructors in the History department :

select instructor.name

from instructor

where instructor.dept\_name = 'History';

The query specifies that those rows from the table instructor where the dept\_name is History must be retrieved and the name attributes of these rows must be displayed.

#### TCL (Transaction Control Language) :