Data Manipulation

Data manipulation refers to the process of adjusting data to make it organised and easier to read.

Data manipulation language, or DML, is a programming language that adjusts data by inserting, deleting and modifying data in a database such as to cleanse or map the data. <u>SQL</u>, or Structured Query Language, is a language that communicates with databases. When using SQL- data change statements for data manipulation, <u>four functions</u> can occur, namely:

- Select
- Update
- Insert
- Delete

These commands tell the database where to select data from and what to do with it.

Here's how it works:

- **SELECT:** The select statement allows users to pull a selection from the database to work with. You tell the computer what to SELECT and FROM where.

- **UPDATE:** To change data that already exists, you will use the UPDATE statement. You can tell the database to update certain sets of information and the new information that should be input, either with single records or multiple records at a time.

- **INSERT:** You can move data from one location to another by using the INSERT statement.

- **DELETE:** To get rid of existing records within a table, you use the DELETE statement. You tell the system where to delete from and what files to get rid of.

Since SQL does not allow you to import or export data from outside sources, some providers can store data and give you the tools to manipulate data for your business needs.