Database Testing using Selenium (Continued) - SQL Statements

SQL Statements: In this session, I will explain how to practice SQL statements:

Practice Website: Follow the below steps:

- Step#1: Click here to visit an online tool provided by W3Schools for practicing SQL online.
- Step#2: View the list of tables available in their database for practice on the right side of the page.

SQL Statements: The following are the different SQL statements we need to practice at the above practice website:

- **Select -** Used to retrieve the data from the Database tables
    - Type the statement '**Select * from Customers;**' into the SQL Statement field to retrieve all the data stored in the Customers table and click on 'Run SQL >>' button to execute
    - Retrieve data only from the specified columns say CustomerID, ContactName & Country in the specified table by typing the statement '**Select CustomerID, ContactName, Country from Customers;**' into the SQL Statement field and click on 'Run SQL >>' button to execute
    - Retrieve data of the customers who stay in London
        - All Columns - **Select * from Customers where City='London';**
        - Selected Columns - **Select CustomerName, City, Country from Customers where City='London';**
    - Retrieve data of the customers who's customer id is 53
        - Its not require to surround the numerical values by '' (Only text values should be surrounded by '')
            - **Select * from Customers where CustomerID = 53;**
- **Order By** - Used to sort the results in ascending or descending order
    - All the data in the table will be retrieved and displayed in descending order of the Country - Select * from Customers **order by** Country **DESC;**
    - All the data in the table will be retrieved and displayed in ascending order of the Country - Select * from Customers **order by** Country **ASC;**
- **Insert Into** - Used to add new data into the Data base table
    - Inserting a new complete record into the existing table - **Insert Into** Customers **values**(92,'Arun Motoori','QAFox','Silicion Valley','Hyderabad',500081,'India');
    - Inserting a new record with partial columns data into the existing table - **Insert Into** Customers(CustomerID,CustomerName,City,Country) **values**(93,'Ravi Kiran','Hyderabad','India');
- **Update** - Used to modify the existing records in a Database table
    - Update the CustomerName and City in the Customers table using the CustomerId - **Update** Customers **Set** CustomerName='Arun Motoori',City='Hyderabad' where CustomerID = 1;
- **Delete** - Used to delete the existing records in a Data base table
    - Delete a Customer details from Customers table whose CustomerId is 2 - **Delete** from Customers where CustomerID=1;
    - To delete the complete table, we can use - **_Delete_** from Customers;
    - Restore back the complete Customer table by selecting 'Restore Database' option provided by the website
- And many other commands
    - So far explained commands will be enough for understanding/practicing the Database Testing using Selenium
    - If you still want to practice more on SQL, refer to the below website:
        - https://www.w3schools.com/sql/