**Assignment 5**

**1- Basic SQL Queries:**

a.Write a SQL query to retrieve all columns from a table named employees.

* 1. b. Write a SQL query to retrieve the emp\_id, emp\_name, and dept\_id from the employees table, where the location is 'Cairo'.

Answer:

1. SELECT\*FROM employees
2. SELECT emp\_id, emp\_name, dept\_id

FROM employees

WHERE location = ‘Cairo’;

* 1. **2- DISTINCT Keyword:**
  2. Write a SQL query that displays distinct dept\_id values from the employees table.

Answer:

SELECT DISTINCT dept\_id

FRPM employees;

* 1. **3- Data Definition Language (DDL):**
  2. a. Write a SQL query to create a table students with the following columns: ID (Primary Key), First\_Name (not null), Last\_Name (default 'Unknown'), Address (default 'N/A'), City (default 'N/A'), and Birth\_Date.
  3. b. Write a SQL query to drop the students table.

Answer:

1. CREATE TABLE students (

ID INT PRIMARY KEY,

First\_Name VARCHAR(50) NOT NULL,

Last\_Name VARCHAR(50) DEFAULT ‘Unknown’,

Address VARCHAR(100) DEFAULT ‘N/A’,

City VARCHAR(5) DEFAULT ‘N/A’,

Birth\_Date DATE

);

1. DROP TABLE students;

* 1. **4- Data Manipulation Language (DML):**
  2. a. Write a SQL query to insert the following values into the students table: ('Ahmed', 'Ali', 'Downtown', 'Cairo', '1995-01-01').
  3. b. Write a SQL query to update the Address of the student with Last\_Name = 'Ahmed' to 'Garden City'.

Answer:

1. INSERT INTO student (First\_Name, Last\_Name, Address, City, Birth\_Date)

VALUES (‘Ahme’, ‘Ali’, ‘Downtown’, ‘Cairo’, ‘1995-01-01’);

1. UPDATE students

SET Address = ‘Garden City’

WHERE Last\_Name = ‘Ahmed’;

* 1. **5- Transaction Control:**
  2. Write a SQL query to delete the rows from the students table where City is 'Cairo', and then rollback the transaction.

Answer:

BEGIN TRANSACTION;

DELETE FROM students

WHERE City = ‘Cairo’;

ROLLBACK;