

# Practical 06 – Example 06

## **Data Manipulation (12 marks)**

### **Important Notes:**

- 1. Bring the following to the practical session:
  - a. The Practical Textbook and/or the lecture notes for the exercise class in which the exercise was explained
- 2. SQL scripts are what is marked
  - a. Scripts which run and perform what they are supposed to do get full marks
  - b. Scripts which do not run will be marked on their own merit
- 3. Please refer to Hotek Chapter 9, as well as the class notes (07SQLCh09.pdf) on ClickUP for examples on generic structures as well as specific code.

#### CONTEXT:

The practical example is based on the Northwind database. Run the **northwind.sql** script to create and populate the database.

## Queries - Northwind

- Make use of PIVOT to indicate the number of orders per employee based on the EmployeeID.
  - Refer to the employees as ([1],[2],[3],[4],[5],[6],[7],[8],[9])
  - All orders should be displayed per OrderID PIVOTED with employees.
- Write one query that indicates the number of Orders per Employee based on the CustomerID and EmployeeID.
  - Refer to employees as ([1],[2],[3],[4],[5],[6],[7],[8],[9])
  - The count for each order per customer should be displayed as a PIVOT related to the aforementioned employees.
- 3. Adapt the query in question 2 Write one query that indicates the number of Orders per Employee based on the CustomerID and EmployeeID.
  - Refer to employees as [1] as [Nancy], [2] as [Andrew], [3] as [Janet],
    [4] as [Margaret], [5] as [Steven], [6] as [Michael], [7] as [Robert], [8] as [Laura], [9] as [Anne]
  - The count for each order per customer should be displayed as a PIVOT related to the aforementioned employees.