Power Query Assignment: Retail Store Sales Analysis

File Name: `retail_store_sales.xlsx`
Second Sheet Name: `Customer Name`

Objective:

Perform the following tasks using Power Query in Excel to analyze retail store sales data. The goal is to enrich the sales data with customer names, calculate total sales, and derive insights from transaction data.

Steps to Complete the Assignment:

1. Add Customer Name to Retail Store Sales Data

- Open **Power Query Editor** by selecting the sales data sheet.
- **Merge Queries**:
  - Go to **Home** > **Merge Queries**.
  - Select `Retail Store Sales` as the first query and `Customer Name` as the second query.
  - Match the **Customer ID** column in both queries to add the **Customer Name**.
  - This will add the **Customer Name** to the sales data.

2. Fill Down Customer Name Column

- If any rows have empty customer names (after merging), **Fill Down** One By One Columns

3. Add a Custom Column for Total Sales

- Calculate the **Total Sales** for each transaction by multiplying **Price Per Unit** by **Quantity**:
  - Go to **Add Column** > **Custom Column**.
  - Use this formula:
  - `= [Price Per Unit] * [Quantity]`
  - Name this column **Total Sales**.

4. Calculate the Total Sales for Each Item

- To find the total sales per item:
  - Go to **Transform** > **Group By**.
  - Group by **Item** and sum the **Total Sales** column.

o   This will give the total sales for each item.

5. Count Transactions Based on Location (In-store vs. Online)

- To count the number of transactions that occurred in-store vs. online:
    o   Go to **Transform** > **Group By**.
    o   Group by **Location** (In-store vs. Online).
    o   Count the number of transactions in each group.

6. Count Transactions Made in 2022

- To count transactions that occurred in **2022**:
    o   Filter the **Transaction Date** column for the year 2022:
        ▪   Go to **Transform** > **Filter Rows**.
        ▪   Filter the date column to include only transactions from **2022**.
    o   Count the number of transactions in the filtered data.

7. Calculate Total Sales for Each Customer

- To find the total sales per customer:
    o   Group the data by **Customer Name**.
    o   Go to **Transform** > **Group By**.
    o   Group by **Customer Name** and sum the **Total Sales** column