**Module 6: Working with Excel Objects**

* **Object Hierarchy in Excel**

Excel is **object-oriented**, meaning everything is treated as an **object** with properties and methods.  
The hierarchy goes like this:

**Application → Workbook → Worksheet → Range → Cell**

Example:

Application.Workbooks("Sales.xlsx").Worksheets("Sheet1").Range("A1").Value

Application = Excel itself

Workbook = Sales.xlsx

Worksheet = Sheet1

Range = Cell A1

* **Workbook Object**

Represents an **Excel file**.  
Example:1

Workbooks.Open "D:\ACTE\1-VBA Macro-Nusrat Jahan\Sales.xlsx"

Example:2

Workbooks("Sales.xlsx").Activate

This activates the workbook named *Sales.xlsx*.

* **Worksheet Object**

Represents a **single sheet** in a workbook.  
Example:

Worksheets("Sheet1").Activate

Activates Sheet1.

* **Range Object**

Represents a **cell or group of cells**.  
Example:

Range("A1:B15").Value = "Hello"

Writes "Hello" in all cells from A11 to B15.

* **Using With…End With**

Used to avoid repeating an object name again and again.

Example:

With Worksheets("Excel Objects").Range("A16")

.Value = "Report"

.Font.Bold = True

.Font.Color = vbRed

End With

👉 Here Range("A16") is written only once.

* **Object Variables**

We can store an object in a variable to reuse it easily.

Example:

Dim ws As Worksheet

Set ws = Worksheets("Sheet1")

ws.Range("A1").Value = "Hello"

ws.Range("A2").Value = "World"

👉 Instead of typing Worksheets("Sheet1") again, we use ws.