# SummitSolutions

Excel Automation Training Course

Outline: Most of us who work in Excel do what we call repeatable tasks. Each Day, Week or Month we clean up the same data, merge the same files or create the same report. Each time the process is the same but with different data. Wouldn't it be great if we could get Excel to do most of that repeatable work for us? The good news is that we can, and we don't need to be Computer Programmers to achieve it either!

By combining Excels Advanced Tools of Power Query and Macros (VBA), this course will expose you to the timesaving world of Excel Automation.
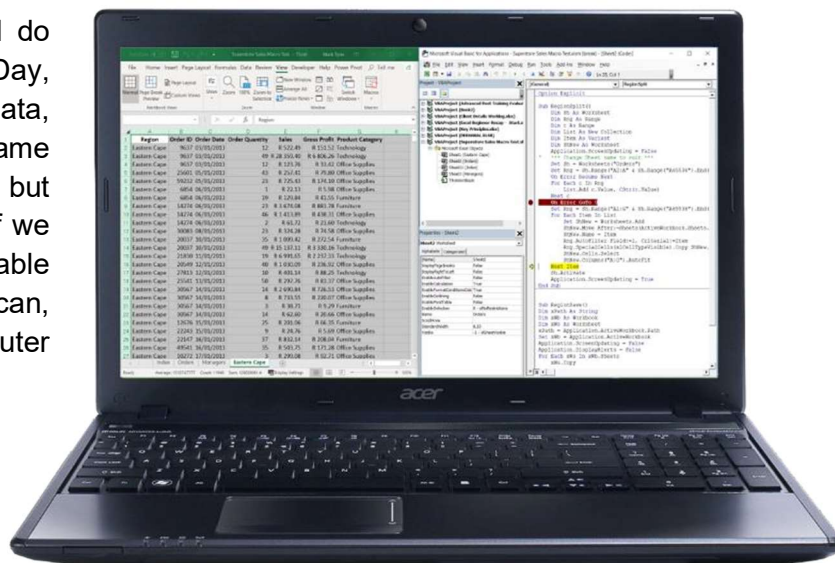
Course Length: 2-day Public Course, 2/3-day Corporate Onsite Training

Pre-requisites: To have completed our Excel Advanced course or scored at least 40/50 on our Pre-Assessment test.

Content Covered:

MACROS - VBA

- **What are Macros and VBA?** – Idea behind creating Macros for repeatable tasks.

- **Recording a Macro** – How to record a Macro and the importance of where to save it.

- **Tips and Tricks on Recording a Macro** so that it can be re-used for the same Dataset Structure, but with different content:
  - Converting Row Sub-Headings into a Data Column
  - Removing blank rows
  - Replacing cell content
  - Removing Filtered Data

- **Stepping through a Macro** – How to step through your code line by line and see the results.

- **Editing a Recorded Macro –** What to look out for and how to make minor edits if and when required. E.g. Removing superfluous code and setting the number of rows used dynamically.

- **VBA Code Snippets –** The good the bad and the ugly of finding suitable code online and how to get it to run against your data.

- **Manipulating VBA Code Snippets –** What to look out for when editing Code Snippets so that it works on your Data.

- **VBA Coding Basics –** Understanding the Basics of how VBA code is put together to better understand how to Edit, Tweak and Add VBA Code if and when required.

    o Objects, Properties and Methods
    o Object Hierarchy and VBA Context
    o Declaring and using Variables
    o Implementing basic loops and If statements

POWER QUERY

- **What is Power Query?** – Idea behind creating a connection to another data source, so that when the source data updates, the Data used in Excel automatically updates on a simple refresh.

    - **Connecting to various Data Sources**

        o Another Excel Spreadsheet
        o CSV / Text File
        o Multiple Tables within the same Workbook
        o Windows Folder – Automatically merges all data within a specific folder
        o Relational DB – Access / MS SQL

    - **Manipulation of Source Data –** Using Power Query to automatically Delete, Merge, Split and Manipulate Connected Data Sources by applying recorded steps. Think of it as an enhanced combination of

        o Text-to-Columns
        o Flash Fill and
        o Filters

      all rolled into one! You have to see this to believe this! There are a few tricky components, but all will be covered in the course.

    - **Working with the Manipulated Data Table –** How to Edit and Add Calculated Fields to the Imported Data Table.

    - **Merging and Appending -** The difference between these two functions, and how to use them to effectively compare Data from two Tables. Sooo much quicker than the traditional methods of using MATCH or VLOOKUP.

    - **Troubleshooting Connection Issues -** Best practices to ensure that if and when a connection is broken, it can be restored to refresh the data once more.

FROM SOURCE TO REPORT

- **Integration with PowerPoint and Word –** Completing the Automation process by linking Tables and Charts to PowerPoint and Word, so that when everything updates, so does the final Report!

- **Report Version Control** - Simple but effective practices of keeping an active current version and saving off old reports that will not update when the source data does**.**

- **VBA or PowerQuery? –** Using a real-life example to summarize when to use which Automation process.

Customer Feedback

"*I would just like to thank Mark for his support over the training sessions, the team are totally pumped at what they learnt and are already putting it into practice which is saving them hours if not days of time*". – ***Patrick Mason, Kerry Ingredients***

excel *(verb) - be exceptionally good at or proficient in an activity or subject.*
May this be the course that enables you to Excel.