

# Excel Basic

## What do I need?

Learners should be able to read and write in English. ABET or equivalent knowledge is essential for attending this course. They should be familiar with using a mouse and keyboard. They should be comfortable in the Windows environment and be able to use Windows to manage information. Learners should have completed Computer Literacy or possess equivalent knowledge prior to attending this course.

## How long is the course?

2 Days

## Who should attend?

The course is designed for learners who have no previous experience in Excel. This thorough and slow paced course will provide the learner with the basic foundational skills required to work in Excel.

### Getting started with Excel

- What are spreadsheets?
- Start Excel
- Understand the screen layout
- Create a new spreadsheet
- Save a file
- Understand and use save as
- Open and close an existing file
- Move around the worksheet effectively
- Select cell ranges, columns and rows
- Enter data into cells
- Use Excel's help options
- Exit Excel

### Modify worksheet data

- Move and copy data
- Insert and delete columns and rows

### Formatting a worksheet

- Align cell data
- Change font size and type
- Add borders and colours to cells
- Adjust column width and row height

### Basic calculations

- Use Autosum to total lists of values
- Create basic arithmetic formulas

### Printing workbook contents

- Adjust page setup options
- Print preview and print a spreadsheet

### Graphically display data

- Create a chart
- Modify and print a chart

# Excel Intermediate

## What do I need?

Learners should be familiar with using a mouse and keyboard. They should be comfortable in the Windows environment and be able to use Windows to manage information. Specifically learners should be able to launch and close applications; navigate to information stored on the computer; and manage files and folders. Learners should have some knowledge of Excel or spreadsheets.

## How long is the course?

2 Days

## Who should attend?

This course is designed for people who need to gain the necessary skills to create, edit, format, and print Excel worksheets to an Intermediate skill level.

### Getting started with Excel

- Start Excel
- Understand the screen layout
- Create a new spreadsheet
- Save a file
- Understand and use save as
- Open and close an existing file
- Move around the worksheet effectively
- Select cell ranges columns and rows
- Enter data into cells
- Use find & replace
- Use Excel's help options
- Exit Excel

### Modify worksheet data

- Use autofill effectively
- Move and copy data
- Insert and delete columns and rows

### Formatting a worksheet

- Align cell data
- Change font size and type
- Add borders and colours to cells
- Adjust column width and row height
- Format cells to enhance a spreadsheet
- Apply cell styles

### Basic calculations

- Use autosum to total lists of values
- Create basic arithmetic formulas

### Printing workbook contents

- Adjust page setup options
- Add headers and footers
- Print preview and print a spreadsheet
- Set and clear print areas

### Modifying a workbook

- Insert and rename sheets
- Move and delete sheets
- Use templates

### Enhancing basic formulas

- Use logical operators in formulas
- Absolute & relative references
- Insert functions into formulas
- Display formulas on screen and edit formulas
- Use manual calculation

### Managing workbooks

- Hide and unhide columns and rows
- Insert, remove and adjust page breaks
- Repeat heading rows at top of each page
- Freeze and unfreeze panes
- Use windows and tiles
- Create named ranges
- Use range names in formulas
- Use the compatibility checker

### Graphically display data

- Insert & modify SmartArt graphics
- Insert autoshapes, clipart & pictures
- Modify autoshapes, clipart & pictures
- Create a chart
- Modify and print a chart

### Customise the environment

- Customise the Quick Access Toolbar
- Customise the Status Bar
- Excel options

# Excel Bridging Workshop

## What do I need?

Learners should have a working knowledge of Excel or spreadsheets. Learners should be familiar with using a mouse and keyboard. They should be comfortable in the Windows environment and be able to use Windows to manage information. Specifically learners should be able to launch and close applications; navigate to information stored on the computer; and manage files and folders.

## How long is the course?

1 Day

## Who should attend?

This workshop is designed for people who are currently working in Excel that need to fill knowledge gaps in Excel to an Intermediate skill level, prior to attending an advanced course. It is also suited to learners who are transitioning from earlier versions of Excel.

### Elements of the Excel environment

- Identifying the user interface elements
- Identify the ribbon components
- Use contextual tabs
- Use Excel galleries
- Customise the Excel interface

### Modify worksheet data

- Use autofill effectively move and copy data
- Insert and delete columns and rows

### Formatting a worksheet

- Format cells to enhance a spreadsheet

### Basic calculations

- Use Autosum to total lists of values
- Basic arithmetic formulas

### Printing workbook contents

- Adjust page setup options
- Add headers and footers
- Print preview and print a spreadsheet

### Modifying a workbook

- Insert and rename sheets
- Move and delete sheets

### Enhancing basic formulas

- Use logical operators in formulas
- Use absolute cell references in formulas
- Insert functions into formulas
- Display formulas on screen and edit formulas

### Managing workbooks

- Hide and unhide columns and rows
- Insert, remove and adjust page breaks
- Repeat heading rows at top of each page
- Freeze and unfreeze panes
- Use windows and tiles
- Create and use named ranges

### Graphically display data

- Create a chart
- Modify and print a chart

# Excel Advanced Level 1: Data Management

## What do I need?

Learners should already have knowledge of Excel, including how to create, edit, format and print worksheets to an Intermediate level.

## How long is the course?

2 Days

## Who should attend?

This course targets individuals who need the skills necessary to sort and filter data, create PivotTables and PivotCharts, incorporate multiple data sources, import and export data, analyse data, and work with Excel database functions.

### Databases - what they are and how they work

- Create databases and lists
- Use data form
- Sort data in a list
- Filter data in a list
- Use comparison criteria for filters
- Work with a filtered list

### Use data management tools

- Summarise data in a list using subtotals
- Use nested subtotals
- Group and outline data in lists
- Data consolidation
- Excel tables
- Name manager

### Data validation

- Apply data validation
- Circle invalid data
- Remove validation circles

### Manage workbooks and worksheets

- Work with sheets
- Group and ungroup sheets
- Create & use custom views

### Import and export data

- Import external data
- Adjust connection properties

### Add-in programs

- View installed add-ins
- Manage add-ins

### What if analysis

- Goal seek
- Solver
- Scenario manager

### PivotTables

- Create a PivotTable
- Consolidate data from multiple ranges
- Customise a PivotTable
- Create a formula in a PivotTable
- PivotCharts

### Use text functions and tools

- Search, Left, Mid and Right functions
- Upper, Lower and Proper functions
- Trim and Len functions
- Convert text to columns

### Use lookup functions

- Vlookup
- Hlookup
- Lookup

### Use database functions

- Daverage
- Dcount
- Dcounta
- Dmax
- Dmin
- Dsum

# Excel Advanced Level 2: Complex Formulas

## What do I need?

Learners should already have knowledge of Excel, including how to create, edit, format and print worksheets to an Intermediate level.

## How long is the course?

2 Days

## Who should attend?

This course is for individuals who need the skills necessary to enhance spreadsheet functionality. Attendees will learn how to create advanced formulas, macros, templates, charts and how to secure worksheets and workbooks.

### Modifying workbooks and worksheets

- Compare side by side
- Save workbooks as a workspace
- Create a template

### Advanced formatting techniques

- Custom number formatting
- Conditional formatting

### Annotate with cell comments

- Insert a comment
- Show/hide comments
- Print comments

### Paste special

- Transpose rows and columns
- Paste link

### Creating advanced formulas

- Relative, absolute and mixed references
- 3-d formulas
- Logical functions
- Math & trig functions
- Statistical functions
- Date and time functions
- Financial functions
- Engineering functions
- Nesting functions
- Information functions
- Array formulas
- Handle errors in formulas

### Formula auditing

- Trace precedent cells
- Trace dependent cells

### Named ranges

- Use the name manager
- Define names for cells and cell ranges

### Add-in programs included with Excel

- Load an add-in program
- Uninstall an add-in program

### Track changes

- Activate track changes
- Review tracked changes
- View change history
- Deactivate track changes

### Create and manipulate charts

- Change the way data is plotted
- Add a trendline to a data series
- Create a chart template
- Add sparklines to a worksheet

### Protect worksheets and workbooks

- Find and remove hidden data
- Password protect a workbook
- Protect worksheet elements
- Remove protection

### Control elements of the Excel interface

- Adjust Excel options
- Customise the Quick Access Toolbar
- Customise the Ribbon

### Macros

- Record and run macros
- Edit a macro
- Delete a macro

# Excel Master Class

## What do I need?

The learner would have completed an Excel Intermediate and Advanced course or at least worked daily in the application for at least 3 years.

## How long is the course?

3 Days

## Overview

A three-day intense course focusing on a three Phase Method: INPUT, PROCESSING, OUTPUT. This course takes a learner from INPUT (Importing of data correctly) PROCESSING (Evaluating and Analysing Data) OUTPUT (Reporting of Analysed Data). The course allows for interactive spreadsheets and to master advanced analysis techniques such as Charting and Pivoting. You will be introduced to new features of Excel and reporting in PowerPoint.

### Foundational understanding

Navigating the interface  
Setting up and entering data correctly into Excel  
Formatting and custom format data  
Creating custom lists  
Fixing errors in spreadsheets using flash fill (2013/2016)

### Importing and exporting data

Import and export data into Excel from different file formats  
Remove duplicates  
Text to columns

### Formula and functions

Basic formulas and functions  
Absolute versus relative cell referencing  
Creating and using name ranges  
3D formulas to link spreadsheets  
Text functions  
Date and time functions  
Logical functions  
Lookup and reference functions  
Nested functions

### Conditional formatting

Highlight cell rules  
Top/bottom rules  
Data bars  
Color scales icon sets  
Using a formula to apply formats  
Manage rules

### Understanding excel tables

Setup and format of table range  
Apply table styles and options  
Using Autofilter custom views  
Adding new data in table  
Creating formulas  
Working with a total row  
Utilising freeze panes

### Charts

Creating a chart  
Adding chart elements, applying styles and colour schemes  
Working with different chart types  
Secondary axis charting  
Charts and sparklines

### Applying advanced functionality

Data validation  
Creating macros  
Working with form controls – working with functions and assigning macros  
Allow users to edit ranges  
Protect worksheets and workbooks

### PivotTable and PivotCharts

Creating PivotTables  
Number formatting techniques  
Designing report layout  
Filtering labels and values  
Summarise data - SUM, AVERAGE, MINIMUM, MAXIMUM, COUNT  
Inserting formulas  
Date analysis  
Copying PivotTables  
Creating PivotCharts  
Showing report filter pages  
Linking PivotTables and PivotCharts in PowerPoint  
Conditional formatting with PivotTables  
Creating and formatting PivotCharts  
Adding chart elements  
Moving and sizing PivotCharts

### Reporting and dashboards

Building a dashboard  
Building chart based & table dashboards  
linking tables & charts in PowerPoint

# Excel Dashboard Reporting

**What do I need?**

Learners should have successfully completed Excel training to an advanced level or have working knowledge of the advanced features of Excel.

**How long is the course?**

1 Day

**Who should attend?**

This course will enable you to create quality Dashboard reports in Excel. Dashboard reports present business information as a clear, concise picture that is easy to read, understand and update. A variety of results can be condensed into a single page for comparison purposes, simplifying and reducing the time taken to report on organisational performance.

**You will learn to:**

Display data from any number of sources, of any kind, using virtually any design...all in one report.

Create mini-charts for dashboard reporting.

Generate figures that use both charts and worksheets.

Use Excel's Camera tool.

Funnel data into Dashboard reports.

Use spreadsheet databases for Dashboard reporting.

**You will also discover:**

How formulas in any number of high-quality Excel reports can link to general-purpose Excel databases, or to Excel-friendly OLAP databases.

How, by using the proper techniques, Excel users can update their reports in seconds...rather than minutes, or hours....

How to create publication-quality Excel reports.

How to change the reports quickly, to respond to changing information needs.



# Excel PivotTable and Dashboard Reporting

## What do I need?

Learners should have successfully completed Excel courses to an intermediate level or possess the equivalent knowledge. Learners should be able to create, edit, format and print worksheets. They should also have the ability to create mathematical formulas and formulas using basic functions (SUM, AVERAGE, COUNT, MAX, MIN). It is important that the learner is working on Microsoft Office 2013 or higher.

## How long is the course?

2 Days

## Who should attend?

This course is aimed at learners who need to analyse information utilising PivotTables as the foundation for Dashboard reports. Dashboard reports present business information as a clear, concise picture that is easy to read, understand, and update. A variety of results can be condensed into a single page for comparison purposes, simplifying and reducing the time taken to report on organisational performance.

## Preparation of Source Data

- Databases - What they are and how they work
- Entering information correctly into Excel
- Setting up a database table in Excel
- Custom formats
- Using FlashFill
- Using format as table
- Using conditional format
- Creating Sparklines

## PivotTables

- Understand the layout of a PivotTable
- Create a PivotTable
- Navigate the PivotTable field lists Modify design options of a PivotTable
- Using analysis tools to analyse the information in different ways
- Customise a PivotTable
- Create a formula in a PivotTable
- Using Slicers

## PivotCharts

- Create PivotCharts
- Format PivotCharts
- Edit PivotCharts
- Move and size PivotCharts
- Using chart options to change the design and layout of the chart

## Dashboard

- Overview of what a dashboard is
- Create a Dashboard with PivotTables and Charts
- Create a Dashboard with PivotCharts, Slicers and Timelines
- Using PowerView to display charts
- An introduction into using PowerPivots





# Excel PivotTable Workshop

## What do I need?

Learners should already have knowledge of the basics of Excel, including how to create, edit, format and print basic worksheets. Learners should have successfully completed Excel courses to an intermediate level or possess the equivalent knowledge.

## How long is the course?

½ Day

## Who should attend?

This course targets the learner who desires to gain the skills necessary to sort and filter data, create PivotTables and PivotCharts. Learners are welcome to bring their own material, for facilitated hands-on application in the afternoon, if required.

## Databases - What they are and how they work

### PivotCharts

- Create PivotCharts
- Format PivotCharts
- Edit PivotCharts
- Move and Size PivotCharts

### PivotTables

- Create a PivotTable
- Consolidate data from multiple ranges
- Customise a PivotTable
- Create a formula in a PivotTable
- PivotCharts

# Excel Charts

## What do I need?

Learners should be familiar with using a mouse and keyboard. They should be comfortable in the Windows environment and be able to use Windows to manage information. Specifically, learners should be able to launch and close applications; navigate to information stored on the computer; and manage files and folders. Learners should have knowledge of Excel to an Intermediate level.

## How long is the course?

1/2 Day

## Who should attend?

This course is designed for people who need to gain the necessary skills to create, edit, format, and print charts in Excel. Learners are welcome to bring their own material, for facilitated hands-on application in the afternoon, if required.

### Creating charts

- From non-adjacent selections
- Using one step
- Changing the default chart type

### Embedded chart placement

- Moving and sizing embedded charts
- Deleting an embedded chart

### Customising a chart

- Ways to select chart items
- Chart labels, titles and other text
- Change the display:
  - Chart labels
  - Data labels
  - legends
  - Gridlines
  - Axes
- Display or hide chart items
- Delete chart items
- Change colours, patterns, lines, fills and borders
- Use a picture in a chart
- Change values in a chart
- Add data to a chart

### Plotting data

- Plot data series from rows / columns
- Secondary value axis
- Category and value order
- Data series order
- Control the way empty cells are plotted
- Change the points plotted

### Using dates in charts

### Add a trendline to a data series

### Change the view of a 3D chart

### Custom chart types

- Built in custom charts
- Creating your own custom charts

# Formulas Workshop

## What do I need?

Learners should already have knowledge of Excel, including how to create, edit, format and print worksheets to an Intermediate level...

## How long is the course?

1 Day

## Who should attend?

This course is for individuals who need the skills necessary to enhance spreadsheet functionality. Who want to use advanced formulas.

### Worksheet formulas

Using operators in formulas  
Using percentages in formulas  
Absolute and relative cell referencing

### Worksheet functions in formulas

Using SUM, AVERAGE, MIN, MAX and COUNT  
Correcting errors in formulas

### Named ranges

Create, edit and delete named ranges  
Create named ranges from selections

### 3D references

Create a 3D reference formula  
Name a 3D reference

### Logical operators

Comparison operators  
IF statements  
AND statements  
OR statements

### Date and time functions

TODAY function  
NOW function  
YEAR function  
MONTH function  
NETWORKDAYS function  
EDATE function  
EOMONTH function

### Financial functions

PMT function  
IPMT function  
PPMT function  
PPMT function

### Text functions

SEARCH function  
LEFT, MID & RIGHT functions  
UPPER, LOWER & PROPER functions  
TRIM functions  
LEN functions

### Nesting functions

Valid returns  
Nesting level limits  
Nested IF Functions

### Database functions

DAVERAGE  
DCOUNT  
DCOUNTA  
DMAX  
DMIN  
DSUM

### Lookup functions

VLOOKUP  
HLOOKUP  
LOOKUP

# Visual Basic for Excel

## What do I need?

To ensure success learners should have successfully completed all Excel Levels or possess the equivalent knowledge.

## How long is the course?

3 Days

## Who should attend?

This course targets learners who require knowledge of Excel's underlying programming language - VBA, with a view to extending the functionality of macros, as well as creating functions and automating complex tasks.

### Day 1

#### Understand how VB talks to Excel

Understand automation  
Start Microsoft Excel macros  
Record, run and edit a macro  
Run a macro from Visual Basic  
Step through a macro

#### Understand the VB environment

The code window  
The project explorer  
The properties window  
The immediate window  
The object browser

#### Write Visual Basic statements

Make long statements easier to read  
Create, declare and assign variables  
Use syntax help in Visual Basic  
Exit Visual Basic transpose  
Skip blanks  
Link

### Day 2

#### Work with Excel objects in Visual Basic

Collections, properties, methods and events  
Understand and use workbooks and worksheets  
Understand and define ranges  
Manipulate drawing objects  
Manipulate charts  
Use values and formulas in ranges  
Understand and use relative and absolute references  
Enhance recorded selection  
Simplify selection pairs and groups  
Manipulate pivot tables

### Day 3

#### Control Visual Basic

Use conditional statements  
If... then... else  
Case statements

#### Create loops

For each loops  
For loops  
Do loops

#### Extend Excel and Visual Basic

Input boxes  
Message boxes

#### Work with functions

Using Excel functions in Visual Basic  
Create custom functions  
Add function arguments  
Explore volatile functions

#### Handle errors:

Ignore, check for and trap errors  
Launch macros with events  
Active x controls  
Create custom forms  
Launch a form  
Animate objects  
Package the application