



M 365 Excel Class Video 01: Introduction to Excel by excelisfun

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Download files and save to folder

1. Right-click file link
2. Click on Save As
3. In the Save As Dialog box, create a folder where you can save all class files. Cylt + Shift + N is keyboard to create a new folder
4. Save files to the folder that you created

Conventions used for the Excel files

A	B	C	D	E	F	G	H	I
2	Data Set and Formula Fill Colors:							
3								
4	Column Headers = Dark Blue Fill and White Font	Employee	Sales (\$)	Commission Paid		Commission Rate		Commission Rate
5		Sioux Coolinator	59,697.09	1,462.58		2.45%		2.45%
6		Chantel Williams	84,789.88	2,077.35				
7		Miki Pham	63,051.45	1,544.76				
8		Tyrone Vince	95,750.64	2,345.89				
9		Gigi Thomas	80,943.42	1,983.11				
10								
11		Data = No Fill Color		Cells with Formulas =				
12								
13								
14	Sheet Tab Fill Colors:							
15								
16	Yellow = Information							
17	Blue = You work on this sheet							
18	Red = Answer (Example of completed work)							
19	HW => Everything after this sheet is practice (HW)							
20								
21								
22								
23								
24	Excel Table Object will use this color coding:							
25								
26		Date	SalesRep	Sales (\$)				
27	Column Headers = Blue Fill & White Font Color	5/10/23	Chantel	1,605				
28		4/29/23	Tyrone	3,677				
29		3/29/23	Jim	4,272				
30		6/20/23	Jo	5,308				
31		5/3/23	Chantel	6,745				
32		4/8/23	Chantel	4,532				
33		1/14/23	Tyrone	3,152				

Structure and Layout of Excel Workbook File

D20

Name Box

Formula Bar

Excel Layout:

3	Column Headers = Letters, like Column D, 16,384 columns
4	Row Headers = Numbers, like row 20, 1,048,576 rows
5	Cells = Intersection of Column and Row, like cell D20, 16,384*1,048,576 = 17,179,869,184 cells
6	Horizontal & Vertical Scroll Bars & Buttons = Expose more rows or columns of cells
7	Worksheets = Sheet = All The Cells
8	Sheet Tab Names = Name of Sheet, like the name of this sheet "Structure"
9	Active Sheet is the Worksheet that is Selected
10	Double-click Sheet Tab to rename. ALWAYS name a sheet so that it communicates the purpose of the sheet. DO NOT use default names Sheet1, Sheet2
11	Right-click Sheet Tab, Tab Color to add color to Sheet Tab
12	Workbooks = All Worksheets (later we will see that a workbook can contain other objects like a Data Model or Query)
13	File = Workbook, like this workbook file that is named "01-M365ExcelClass.xlsx"
14	Ribbon Tabs = contains commands.
15	Keyboard to show or hide Ribbon: Ctrl + F1 (toggle)
16	Quick Access Toolbar = QAT = contains commands
17	Right-click features in Ribbon Tabs, Add To QAT
17	Right-click QAT to move below or above Ribbon

Navigate to new Worksheets:

- 1) Click Sheet Tab = Activates a Worksheet
- 2) Worksheet Scroll Arrow exposes more Worksheets without moving Active Worksheet
- 3) ... icons selects next hidden worksheet to make it the Active Worksheet
- 4) Activate dialog box (right-click Worksheet Scroll Arrows)
- 5) Keyboard to Move Active Sheet = Ctrl + PageDown (Right) or PageUp (Left)

TetativeClassOutline Topics Conventions Structure Keyboards Keyboards (an) Cursors

Keyboards and Keyboard Shortcuts



Keyboard Shortcuts are Fast! Some useful Keyboard Shortcuts:

Jump to end of current region => **Ctrl + Arrow**

Highlight to end of current region => **Ctrl + Shift + Arrow**

Sum Function => **Alt + =**

Open Format Cells dialog box if cell or range is selected => **Ctrl + 1**

Open Chart Format Task Pane if chart is selected => **Ctrl + 1**

Many, many more that we will learn in class ...

Entering Data & Formulas into Cells:

Ctrl + Enter = Puts the content into active cell and keeps active cell selected. Use this when your goal is to put the content into the active cell and immediately do something to the active cell, like copy or format it.

Enter = Puts the content into active cell and moves the selected cell down by one row. Use this when your goal is to put the content into the active cell and immediately do something in the cell below, like enter more content.

Shift + Enter = Puts the content into active cell and moves the selected cell up by one row. Use this when your goal is to put the content into the active cell and move the selected cell up by one row, like when you need to enter a formula but the worksheet screen does not show the active cell.

Tab = Puts the content into active cell and moves the selected cell to the right by one column. Use this when your goal is to put the content into the active cell and immediately do something in the cell to the right, like enter more content.

Shift + Tab = Puts the content into active cell and moves the selected cell to the right by one column. Use this when your goal is to put the content into the active cell and immediately do something in the cell to the left, like enter more content.

** Shift + Tab moves to left (not right).

Selection keyboards

Ctrl + Shift + Arrow = Selects a range of cell content in the direction of the arrow, stops when it bumps into the first empty cell. Use this when you want to quickly highlight a column or row of cell content. If there is no content when you invoke this keyboard, then this keyboard jumps all the way to the edge of the worksheet.

Ctrl + * (Number Pad) = Ctrl + Shift + 8 (Standard Keys) = Selects the current region, which means everything in all directions from the active cell, up to the first complete row or column of empty cells, or it bumps into the worksheet row numbers or column letters. This is the keyboard shortcut to instantly select a whole table.

Shift + Arrow = Highlights one cell at a time in the direction of the arrow, incrementing slowly on each click of the arrow. The trick is to hold the Shift key and then tap the arrow key, once for each character that you want to select. This is useful when you have a small selection to make within a larger block of cells.

Navigation Keys

Ctrl + Home = Jumps the active cell to cell A1. This is convenient when you want to jump to the very top of the worksheet.

Ctrl + End = Jumps the active cell to last cell used in entire worksheet. You can use this to jump to the very bottom of your work area.

Ctrl + Arrow = Jumps the active cell to last cell with content, in the direction of the arrow, stopping when it bumps into the first empty cell. This keyboard is great when you want to jump to the last bit of data in a row or a column.

Ctrl + . (period or Decimal key) = Jumps the active cell to next corner in a selected range. This keyboard only jumps between the four corners of a selected range. It is useful for navigating the four corners of a large table.

Ctrl + Backspace = Jumps the screen back to the active cell. This keyboard works whether or not the active cell is in edit mode or the cell is just selected. It is a great keyboard when the active cell is off screen, but you need to instantly jump back to the active cell.

Other Keyboards

F2 = put cell in edit mode.

F4 = Toggles between the different types of cell references in a formula.

F7 = Spell Check.

F9 = Evaluate Formula Element.

Ctrl + C = Copy.

Ctrl + V = Paste.

Ctrl + X = Cut.

Ctrl + Shift + Arrow = Select everything up to the first empty cell.

Alt + = (Equal Sign) = Insert SUM function into cell.

Ctrl + Backspace = Jump Back to Active Cell.

Shift + Enter = Puts the content into active cell and moves the selected cell up by one row.

Alt, N, V, T = Open Create PivotTable dialog box.

Alt, N, V = Open Create PivotTable dialog box if you do not have a Power BI Account or you are not logged in.

Alt, P, S, P = Open Page Setup dialog box.

Alt, A, M = Remove Duplicates.

Alt, A, D, M = Open Data Model.

Right-Click Key, B, V = Convert Excel Table to Range.

Alt, "Position of Item in QAT" = Invoke button from QAT based on position of button in QAT.

Ctrl + F1 = Toggles Tabs in Ribbon to Show or Hide.

Laptop Keyboards:

Fx (Fn) + F12 = Save As when keyboards require the Fx Function Key.

Fx (Fn) + Esc = Sets the option on your laptop so that you can access the F keys directly without using the Fx (Fn) key.

F Key Keyboards:

F1 = Opens Help Task Pane.

Ctrl + F1 = Toggles the Ribbon between Collapsed and Showing.

Alt + F11 = Insert new Default Chart on the Active Worksheet.

F2 = Puts Cell in Edit Mode.

F3 = Opens Paste Name dialog Box (When Defined Names exist).

Ctrl + F3 = Opens Defined Name Manager dialog box.

Ctrl + Shift + F3 = Opens Create (Defined Names) From Selection dialog box.

Shift + F3 = When Cell is in Edit Mode, opens Insert Function dialog box.

Alt + F3 = selects Name Box in Formula Bar.

F4 = Repeats Last Action.

F4 = When Cell is in Edit Mode, toggles between the different types of Cell References in a formula.

F4 = When in the VBA Editor Window, opens Properties Pane.

F5 = Opens Go To dialog box.

F6 = Activates Sheet Tab so you can use the Right-Click Key.

F7 = Spell Check.

F8 = Toggles Select Range between two clicks.

Shift + F8 = Toggles Select Noncontiguous Range option.

Alt + F8 = Opens up Run Macro dialog box.

F9 = Evaluate Key = Calculates all worksheets in all open workbooks.

F9 = When Cell is in Edit Mode and a Formula Element is selected, it will evaluate the Formula Element.

Shift + F9 = Calculates the active worksheet.

Ctrl + Alt + F9 = Calculates all worksheets in all open workbooks, regardless of whether they have changed since the last calculation.

F10 = Shows Alt Key Keyboard Screen Tips.

F11 = Insert new Default Chart as a new Worksheet.











Shift + F11 = Insert new Worksheet.

Ctrl + F11 = Insert new Excel 4.0 Macro Worksheet.

Alt + F11 = Opens VBA Editor Window.

F12 = Opens Save As dialog box.

Mouse Cursors in Excel

Selection Cursor:		Used to select a cell or range of cells in worksheet or formula.
Move Cursor:		Used to move a cell or range of cells.
Fill Handle:		Allows you to increment data or copy cell content such as text or formulas.
Angry Rabbit (Cross Hair) Cursor:		Grab Fill Handle to increment data or copy cell content.
Change Column Width Cursor:		Changes width of column.
Change Row Height Cursor:		Changes height of row.
Selection Row or Column Cursor		Selects entire row or column.
Select Command Button		Selects commands buttons and other objects.
I Beam Cursor		Allows you to click in a cell that is in Edit Mode.
Insertion Point Cursor		Shows position where you can type when in cell is in Edit Mode.

Data and Alignment in Worksheet

	A	B	C	D	E	F	G	H	I	J	K
1											
2		Data Types in Excel	Default Alignment	Example1	Example2		** In Excel Dates and Times are Numbers				
3		Text	Left	Excel		43.69	12/24/2022	8:00:00AM			
4		Numbers	Right	43		43.69	12/24/22	8:00 AM			
5		Logical/Boolean (TRUE or FALSE)	Center and All CAPS	TRUE	FALSE						
6		Errors	Center	#DIV/0!	#VALUE!						
7		Empty Cells				<<<== Not really a Data Type, but it is a "thing" in Excel that can sometimes cause problems.					
8						<<<== Refer to Empty Cells as "Empty Cells", not blanks.					
9		Why is Default Alignment important:									
10		Answer: It helps to track down errors.									
11		Example 1: We download these numbers from company web site:					Example 2: We download these numbers from company database:				
12											
13			Sales				Sales				
14			326.82	<<<== Excel sees these as Numbers			326.82	<<<== Excel sees these as Text			
15			446.39				446.39				
16			474.74				474.74				
17			233.21				233.21				
18			488.01				488.01				
19		Total	1969.17			Total	0				
20											
21											
22											
23											
24		Important Rule for entering data: 1) Don't use Alignment. Always keep Default Alignment.									
25											
26		Common mistake made in the working world:									
27											
28		Date	Units Purchased	Cost	Units Sold	Price	Running Balance				
29		Balance Forward:								159	
30		1/5/22			48	\$25.50				111	
31		1/6/22	144	\$11.55						255	
32		1/7/22			190	\$24.35				65	
33		1/7/22	39		24	\$27.00				80	
34		1/8/22	192							272	
35											
36											
37											
38			SUM:								
39			231								
40											

What Excel Does do?

	A	B	C	D	E	F	G	H	I	J														
1																								
2		1) Hold data				2) Make calculations																		
3																								
4		Date	SalesRep	Sales (\$)		Average Sale	\$3,660.16																	
5		5/10/23	Chantel	1,605																				
6		4/29/23	Tyrone	3,677		3) Perform data analysis																		
7		3/29/23	Jim	4,272		Converting data into useful information to gain insight and make decisions																		
8		6/20/23	Jo	5,308																				
9		5/3/23	Chantel	6,745		Report = all the detail																		
10		4/8/23	Chantel	4,532																				
11		1/14/23	Tyrone	3,152		Month	Total Sales (\$)																	
12		1/21/23	Chantel	1,609		Jan	62,630																	
13		1/13/23	Jim	679		Feb	68,069																	
14		1/6/23	Jim	4,829		Mar	58,847																	
15		4/15/23	Chantel	2,981		Apr	112,048																	
16		6/5/23	Tyrone	6,269		May	111,955																	
17		6/18/23	Tyrone	6,948		Jun	186,719																	
18		6/1/23	Tyrone	7,224		Grand Total	600,267																	
19		4/30/23	Chantel	1,856																				
20		4/11/23	Jim	3,939																				
21		6/25/23	Chantel	3,835		Report in a Table																		
22		3/9/23	Jo	2,201																				
23		6/12/23	Jim	6,083		Visualization = quick visual impression																		
24		2/7/23	Jim	67																				
25		4/29/23	Tyrone	6,476		<div data-bbox="657 1066 1490 1430"> <p>Monthly Sales (\$) Trends</p> <table border="1"> <thead> <tr> <th>Month</th> <th>Sales (\$)</th> </tr> </thead> <tbody> <tr> <td>Jan</td> <td>62,630</td> </tr> <tr> <td>Feb</td> <td>68,069</td> </tr> <tr> <td>Mar</td> <td>58,847</td> </tr> <tr> <td>Apr</td> <td>112,048</td> </tr> <tr> <td>May</td> <td>111,955</td> </tr> <tr> <td>Jun</td> <td>186,719</td> </tr> </tbody> </table> </div>					Month	Sales (\$)	Jan	62,630	Feb	68,069	Mar	58,847	Apr	112,048	May	111,955	Jun	186,719
Month	Sales (\$)																							
Jan	62,630																							
Feb	68,069																							
Mar	58,847																							
Apr	112,048																							
May	111,955																							
Jun	186,719																							
26		3/27/23	Tyrone	2,860																				
27		5/23/23	Jo	6,305																				
28		5/3/23	Tyrone	3,621																				
29		6/12/23	Tyrone	6,344																				
30		2/3/23	Chantel	1,797																				
31		1/25/23	Tyrone	2,385																				
32		4/9/23	Jim	2,322																				
33		3/2/23	Jim	1,778																				
34		5/9/23	Jo	3,161																				
35		4/3/23	Jo	1,617																				
36		5/18/23	Tyrone	4,894																				
37		5/22/23	Tyrone	4,069																				
38		4/4/23	Jim	2,321																				
						Chart for visualizing data																		

	A	B	C	D	E	F	G
1							
2		Examples of Calculations:					
3							
4		Goal: Calculate the deduction amount					
5							
6		Gross Pay	2,154.75				
7		Tax Rate	7.65%				
8		Deduction	164.84	=ROUND(C6*C7,2)			
9				Number Formula			
10		Goal: Extract First Name					
11							
12		Full Name	Chantel Mims				
13		First Name	Chantel	=LEFT(C12,SEARCH(" ",C12))			
14				Text Formula			
15		Goal: Did Employee get bonus?					
16							
17		Gross Pay	2,154.75				
18		Bonus Hurdle	2,000.00				
19		Get Bonus?	TRUE	=C17>=C18			
20				Logical (Boolean) Formula			

	A	B	C	D	E	F	G	H
1								
2		Example of Data Analysis		Report with all the detail				
3								
4		Survey Data		Survey Data	Number Responses	% Responses		
5		Yes		No	77	48%		
6		Yes		Somewhat	35	22%		
7		No		Yes	47	30%		
8		Yes		Total	159	100%		
9		No						
10		No		Chart to visualize report and give a quick visual impression				
11		No						
12		Somewhat						
13		Yes						
14		Yes						
15		Yes						
16		Yes						
17		Somewhat						
18		No						
163		Somewhat						
164								

**Data Into Information
to make decisions**

Was Government Response Adequate?

Response	Percentage
No	48%
Somewhat	22%
Yes	30%