**Video Project 44 Excel 2013 Basics 26: IF Function**

**Goal in video:** Learn about the IF Function

Topics Covered In Video:

1. Logical formulas evaluate to TRUE or FALSE.
   1. Logical Formulas use Comparative Operators
2. Use IF function to put one of two things into a cell or formulas
   1. You can put:

Two Numbers

Two Words (Text)

Two Formulas

Two anything

* 1. **logical\_test** argument gets the Logical Formula that comes out to be TRUE or FALSE
  2. **value\_if\_true** argument is what will go in cell if Logical Formula gets a TRUE
  3. **value\_if\_false** argument is what will go in cell if Logical Formula gets a FALSE

1. Examples:
   1. Logical Formula to see if Hurdle Met
   2. IF function for bonus
   3. Logical Formula to see if two cells are equal
   4. IF Function to see if two cells are equal
   5. Logical formula to check if employee got bonus, then copy it down column
   6. IF Function to put “yes” or “No” in a cell, then copy formula down column
   7. IF Function to put bonus amount or zero in a cell, then copy formula down column

New Keyboard Shortcut:

1. None

**Video Project 45 Excel 2013 Basics 27: VLOOKUP Function**

**Goal in video:** Learn about the VLOOKUP Function

Topics Covered In Video:

1. VLOOKUP retrieves (goes and gets) something from a table and brings it back to the cell
   1. Looking stuff up in tables is one of THE MOST COMMON TASKS. Everyone does it: employee table, commission table, product table, tax table, grade table.
   2. Lookup tables are EVERYWHERE!!!
   3. Most tables are Vertical: meaning: the thing you are looking up in in the first column of the table and the table is orientated VERTICALLY.
2. V means Vertical, so you use VLOOKUP.
3. VLOOKUP: =VLOOKUP( lookup\_value , table\_array , col\_index\_num , [range\_lookup] )
   1. lookup\_value = thing you look at BEFORE you go over to the table.
   2. table\_array = vertical table = VLOOKUP table
   3. col\_index\_num = which column in the table has the thing you want to go and get and bring back to the cell.
   4. [range\_lookup] = Exact Match = FALSE or 0. Approximate Match = TRUE or 1 or omitted.
4. Exact Match:
   1. VLOOKUP will look though each item in the first column of the VLOOKUP table and try to find a match
   2. If VLOOKUP cannot find a match it will be polite and say that it is not available: #N/A!
   3. If you are doing Exact Match use: Data Validation List:
      1. Data Ribbon Tab, Data Tools, Data Validation, Allow textbox = List, Source = first column of VLOOKUP table\_array.
5. Approximate Match:
   1. For Approximate Match the VLOOKUP table MUST be sorted on the first column: Ascending, A to Z, Small to Big.
   2. For Approximate Match VLOOKUP will race through the first column:
      1. If the first value in the table is smaller than the lookup\_value, VLOOKUP returns a Not Available Error: #N/A!
      2. It looks through the first column until it bumps into the first value bigger than it and then jump back one row (it actually does a binary search which is really fast compared to Exact Match).
      3. If the lookup\_value is bigger than the last value, it stops at the last row.
6. New Functions to put “nothing in the cell:
   1. IFNA
   2. IFERROR
   3. The syntax for “nothing” is two double quotes with nothing between them:  
      “”
      1. This is called a “Null Text String”
   4. Both functions (IFNA and IFERROR will run the function, but if there is an error, it will put the Null Text String into the cell.

New Keyboard Shortcut:

1. None