

How to Refresh All Functions in ActiveFactory Workbook

Legacy Tech Note

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SUMMARY

In ActiveFactory Workbook, the array size of a function does not automatically resize when cells recalculate. The refresh function provided by the ActiveFactory workbook library provides a routine that will automatically resize an array for you.

This technote provides an example on how to run a macro to refresh all functions within a workbook.

SITUATION

Application Versions

- ActiveFactory Workbook 9.0 and later.
- Microsoft Excel 2007 and later.

Solution

1. Open Excel. Use the new workbook as a template.

With MS Excel 2007, you must enable the **Developer** tab to insert buttons.

2. Click the Medallion (upper left) and click **Excel Options** (Figure 1 below).



Figure 1: Click Excel Options

3. Click the **Show Developer Tab in the Ribbon** option.

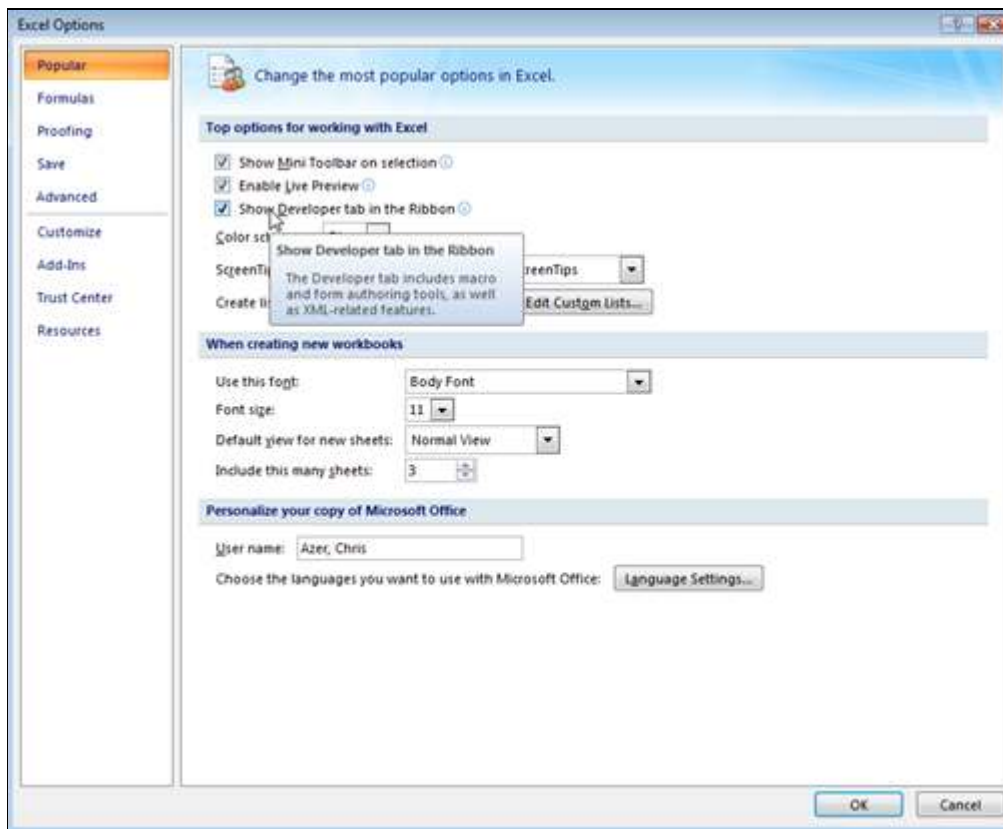


Figure 2: Enable the Developer Tab in Microsoft Excel 2007 from Excel Options

4. Click **OK** to save your changes.

5. From the main menu, click **Developer > Insert > Form Controls**. Insert a Button Form control that will be used to refresh all functions (Figure 3 below).

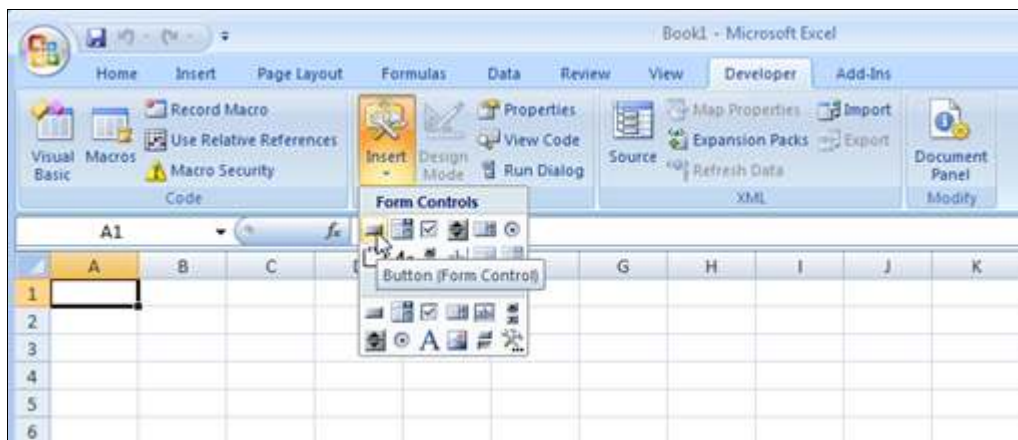


Figure 3: Insert a Button Form Control Onto the Worksheet

6. After adding a button to the form, you are prompted to assign a new macro to this button.
7. Click **New** to assign the new macro.
8. Add the following code to the workbook source as shown in Figure 4 (below):

```
Sub RefreshAllFormulas()
Dim i As Integer
Dim CurCell As Object
Dim lastCellFx As Object
```

```
MousePointer = fmMousePointerHourGlass
Total = 0
```

```
For i = 1 To ActiveWorkbook.Sheets.Count
Subtotal = 0
On Error Resume Next
Sheets(i).Activate
Selection.SpecialCells(xlCellTypeFormulas, 23).Select
For Each CurCell In Selection
If lastCellFx.Formula <> CurCell.Formula Then
CurCell.Activate
mnuRefreshSelection
Set lastCellFx = CurCell
End If
Next CurCell
Next i
```

```
MousePointer = fmMousePointerDefault
Sheets(1).Activate
End Sub
```

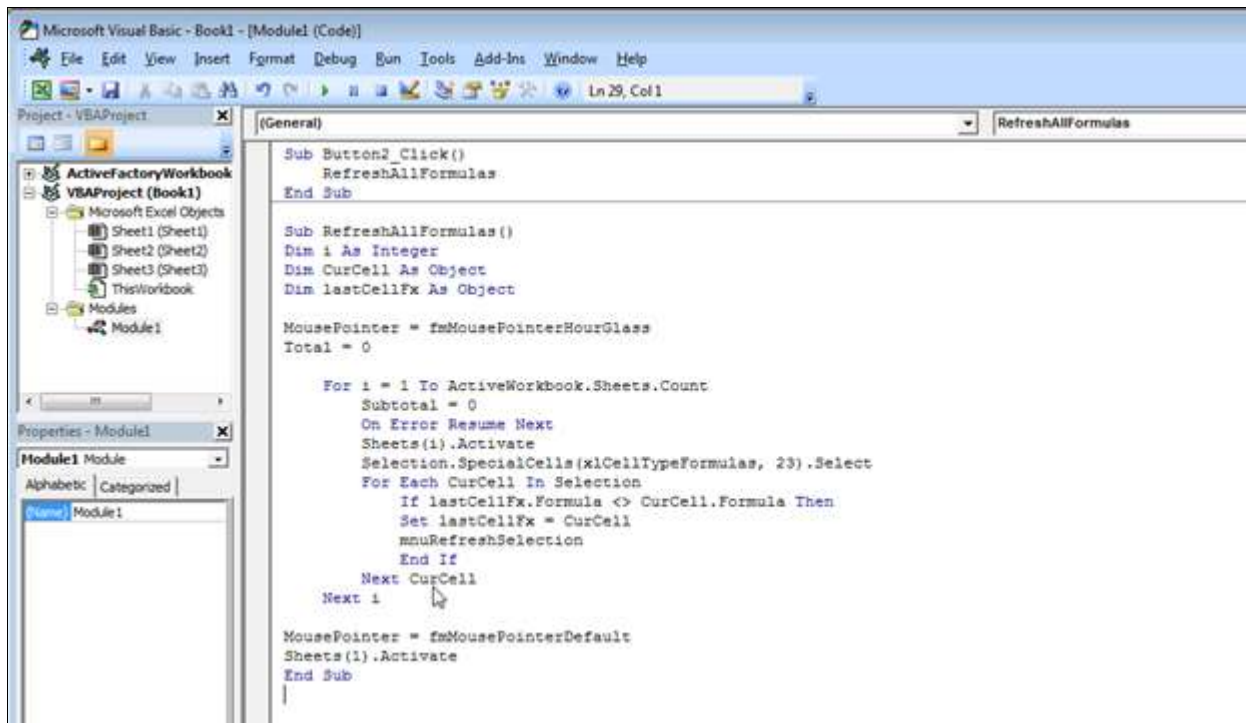


Figure 4: VB Script Editor

Note: Do *not* call the **mnuRefreshSelection** function from the SheetCalculate Event in order to automate this function. Doing so within Excel creates a Race Condition (infinite calculation loop).

6. With the macro for the button, add the line to call this function **RefreshAllFormulas**.
7. In the VBA editor, click **Tools/References**.
8. Browse for the reference **ActiveFactoryWorkbook** and click it.

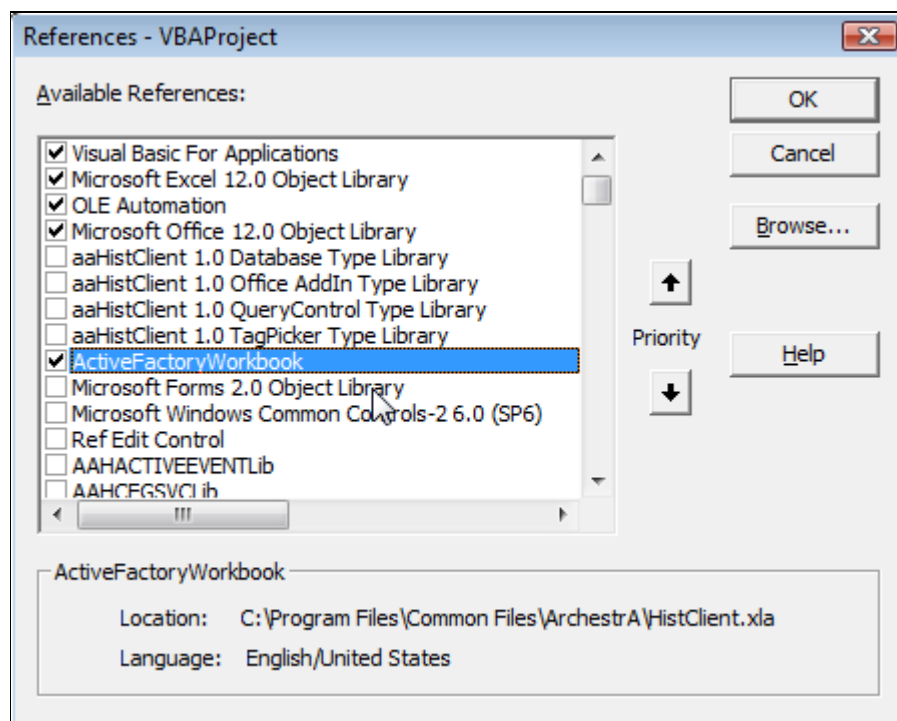


Figure 5: VBAProject References

8. Click **OK** to save your changes and close the editor.

Now whenever you make dynamic changes to the start- and end time of a function, you can click on the button you created in order to resize all arrays.