



## UNIT: 05

# Printing Workbook Contents

## Learning Outcomes

**By the end of this unit the learner will be able to:**

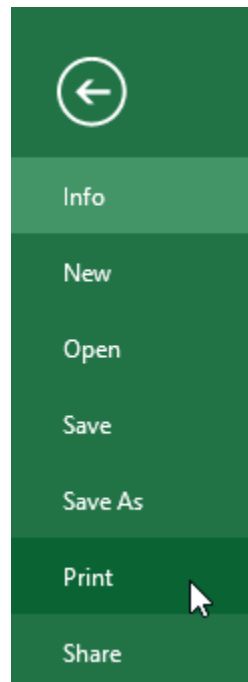
- ✓ **Define the basic page layout for a workbook**
- ✓ **Refine the page layout and apply print options**

## UNIT 05 PRINTING WORKBOOK CONTENTS

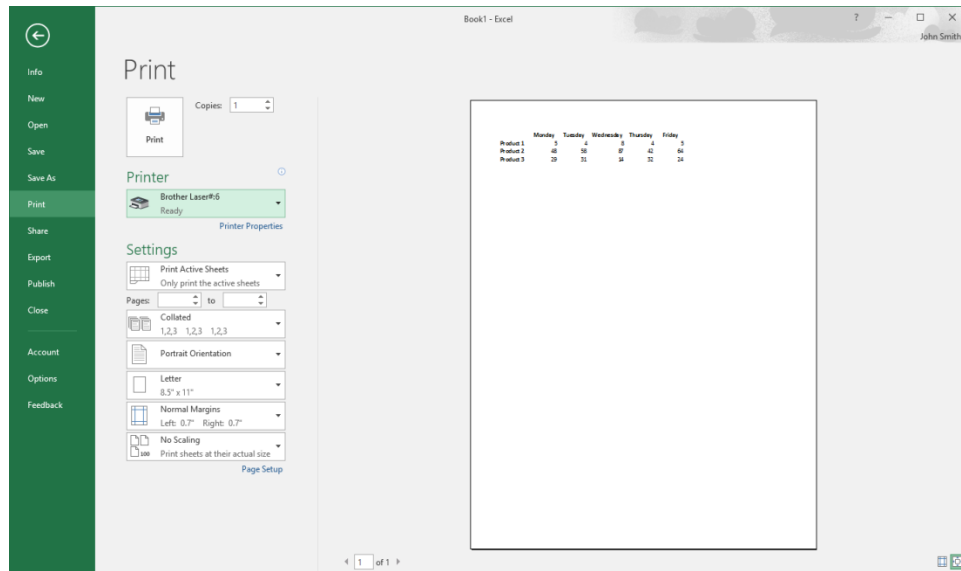
### Define the Basic Page Layout for a Workbook

#### THE PRINT OPTIONS IN BACKSTAGE VIEW

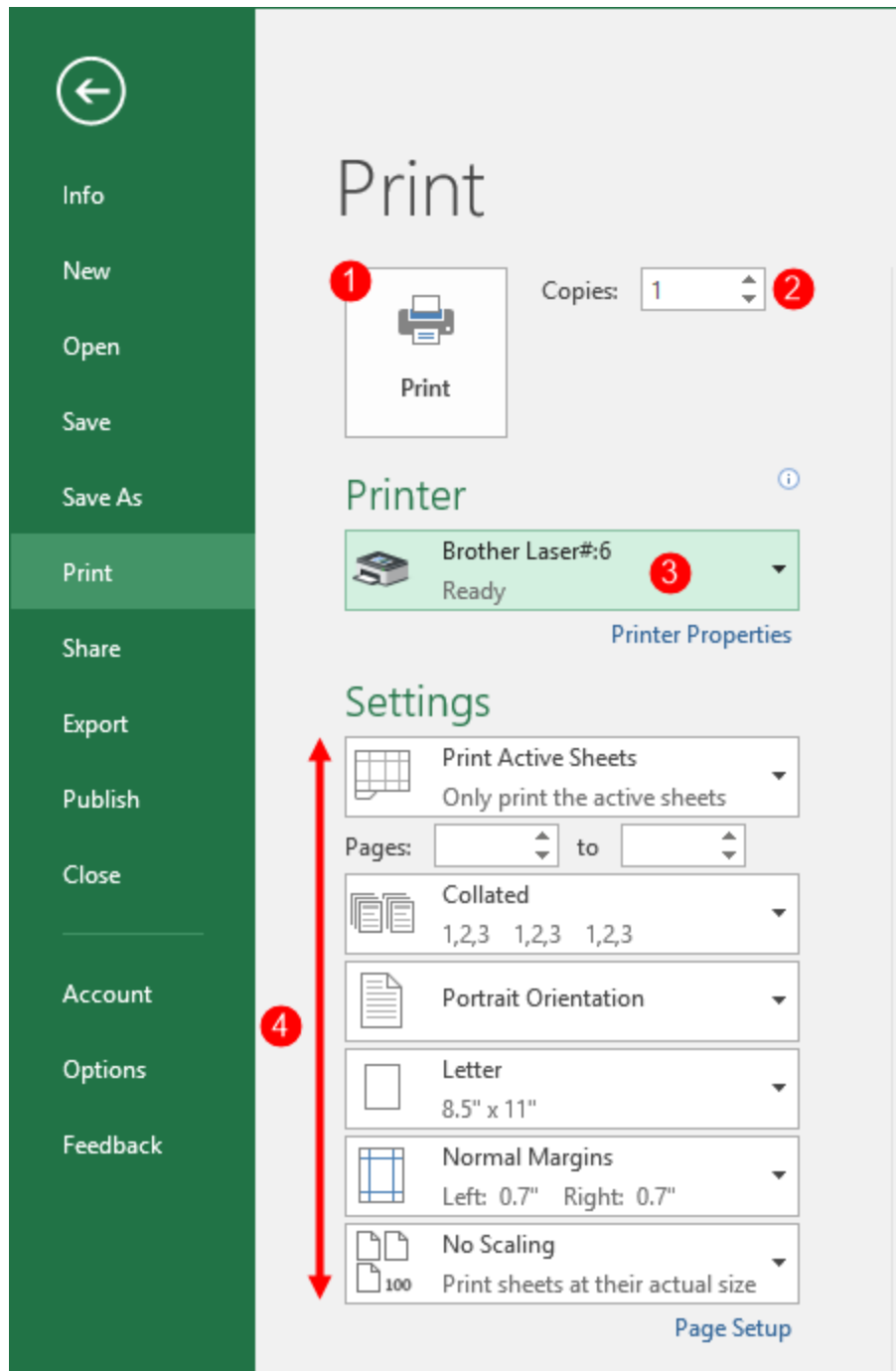
To open the print options in the Backstage view, click File → Print:



With the Print category selected, you will see a preview pane that shows how your worksheet will look on the printed page, as well as a variety of print options:



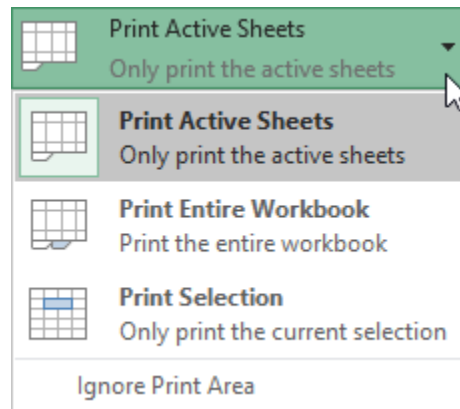
On the left pane of the Print category, you will see the **Print** command **(1)**, which will tell your computer to actually print this document:



Next to it is the **Copies** increment box (2), which you can use to choose the number of copies that you would like to print. Below these options is the **Printer** drop-down command (3) that you can use to choose what printer you would like to print to. Finally, the **Settings** section (4) allows you to choose page ranges, page orientation, paper size, margins, and more.

## Printing Selected Worksheets or a Workbook

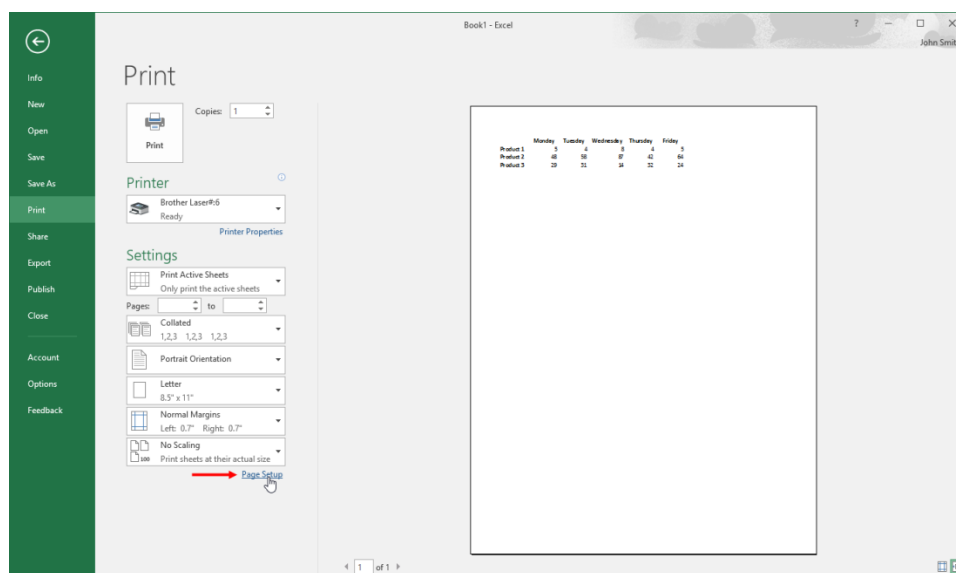
Under the Settings heading in the Print category, you can specify what parts of your workbook you would like to print. By default, **Print Active Sheets** will be selected, so only the currently displayed worksheet will be printed:



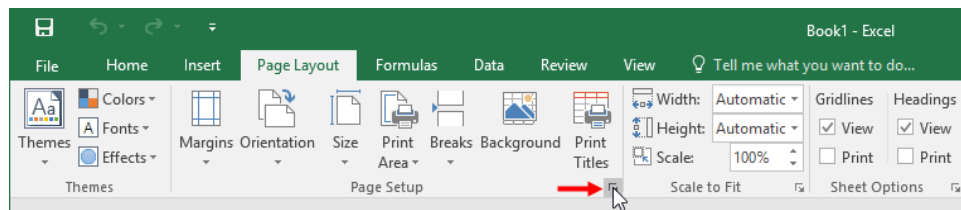
The **Print Entire Workbook** option will print all worksheets within the current workbook. If you click **Print Selection**, you can choose to print only the cells that you have selected.

## THE PAGE SETUP DIALOG BOX

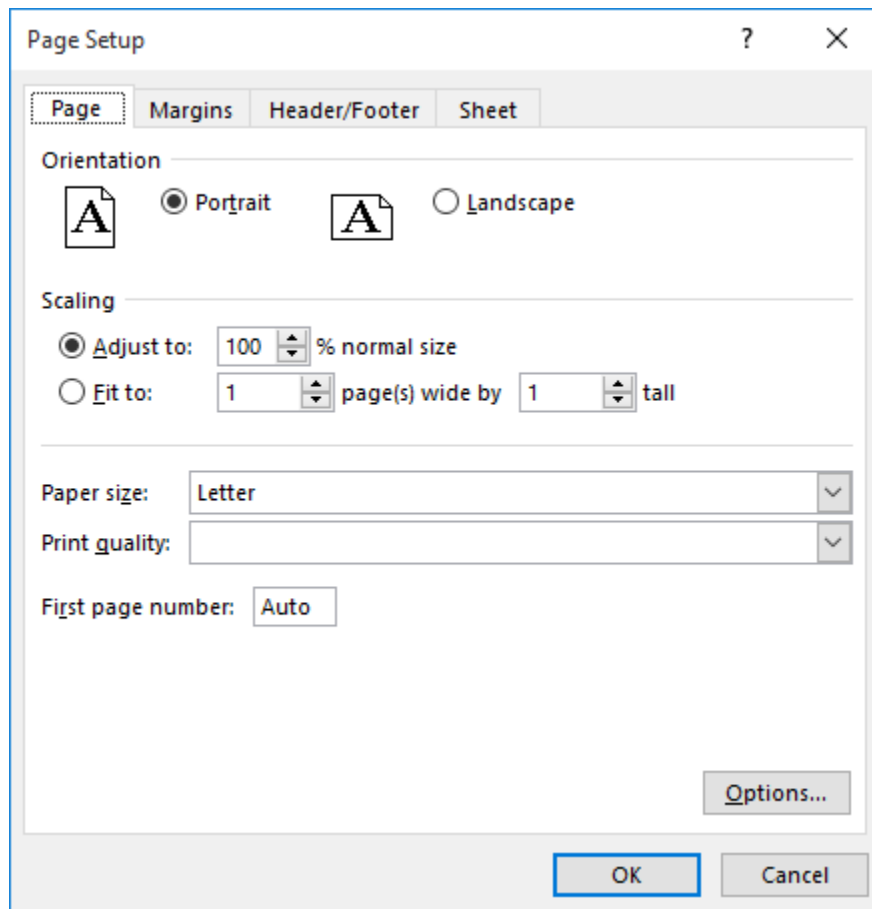
To open the Page Setup dialog box, click the Page Setup link at the bottom of the Settings section in the Print category:



You can also click the option button in the Page Setup group of the Page Layout tab:



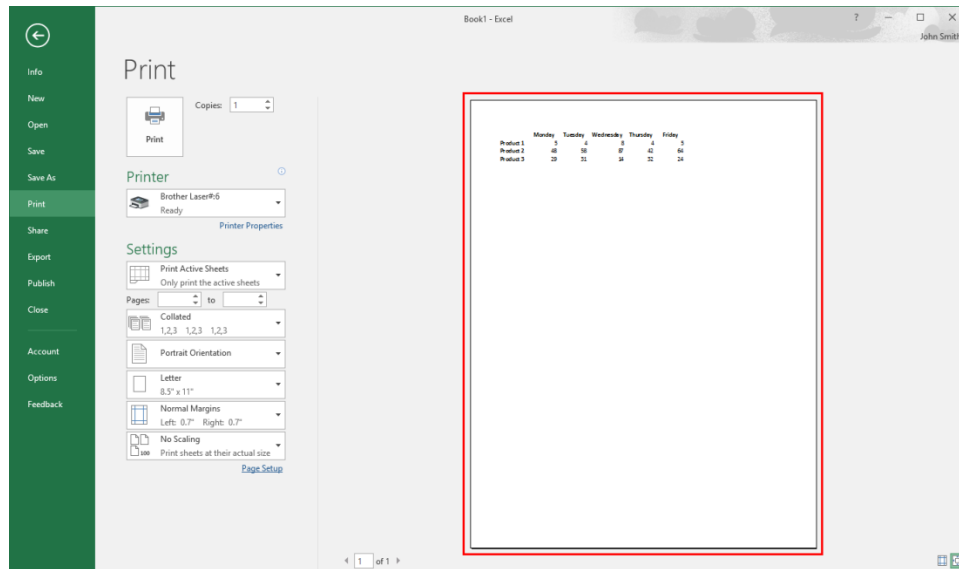
With either command, the Page Setup dialog box will open. This dialog box includes four tabs that provide controls to customize how your workbook is printed:



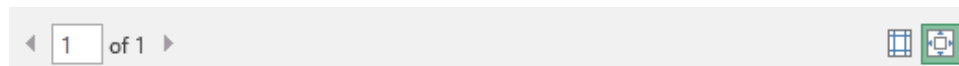
Note that some of the options in this dialog can also be found in the Print category of the Backstage view.

## THE PRINT PREVIEW OPTION

When you click File → Print, you will see a preview of what your printed document will look like on the right-hand side of the screen:

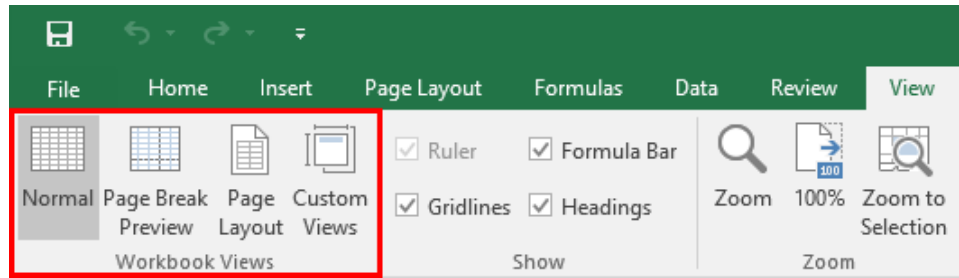


This view provides a scaled-down version of what your document would look like if it were printed with the current settings. You can flip through the pages using the arrows at the bottom of the screen. There are also two commands in the bottom right-hand corner of this view. Click the left command to show/hide margins, or click the right one to zoom to 100%:

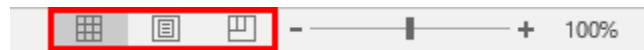


## WORKBOOK VIEWS

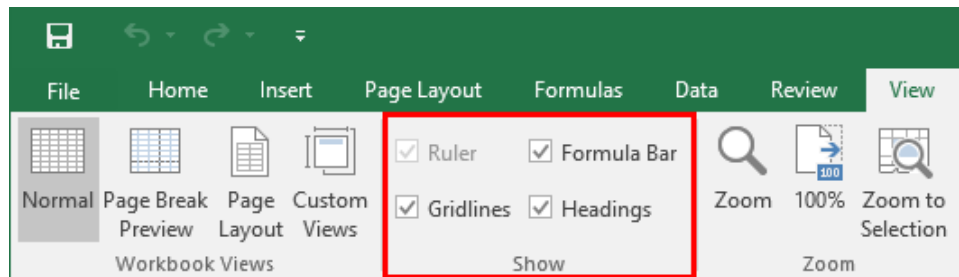
The Workbook Views group on the View tab lets you switch between the different views. When you start Excel, Normal view will be selected:



You can switch between views using the commands on the status bar as well. From left to right, you can switch between Normal, Page Layout, and Page Break Preview views:

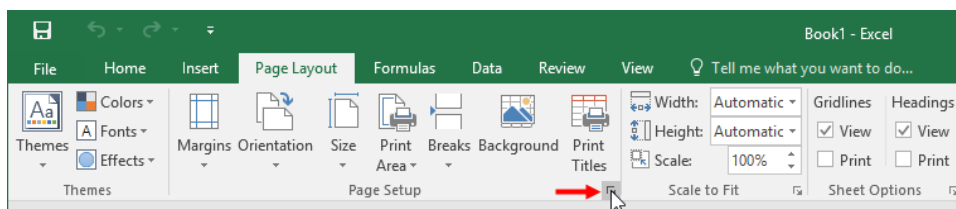


You can also adjust which elements of the worksheet will be visible by checking or unchecking the commands in the Show group of the View tab:

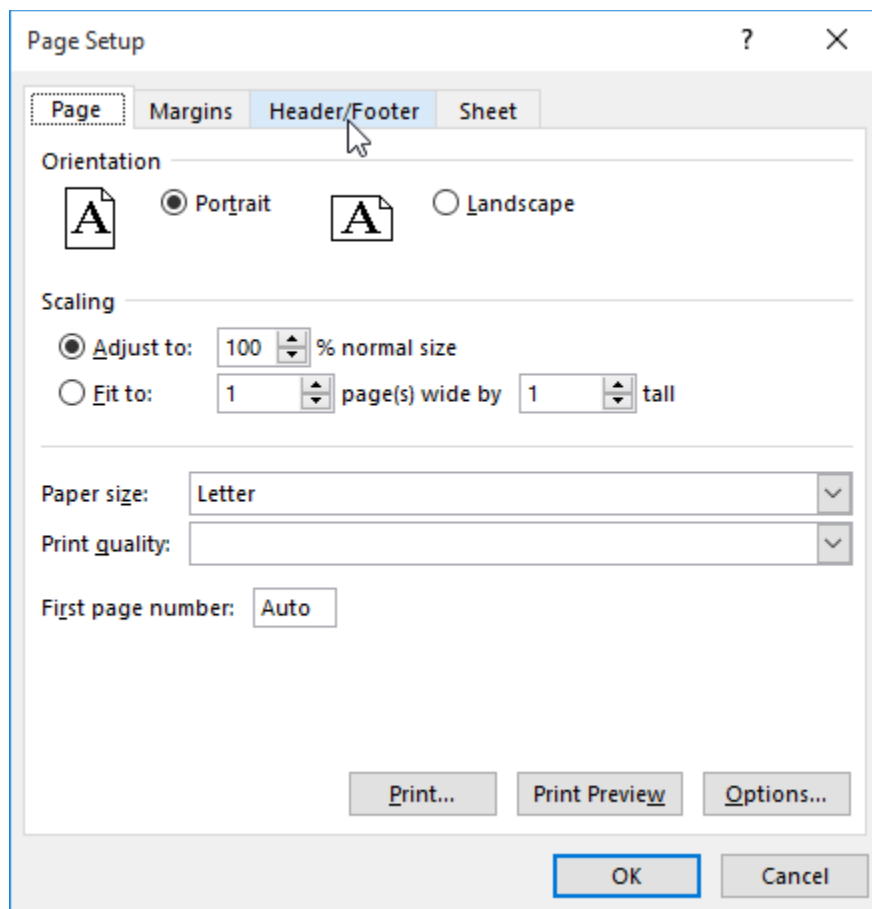


## HEADERS AND FOOTERS

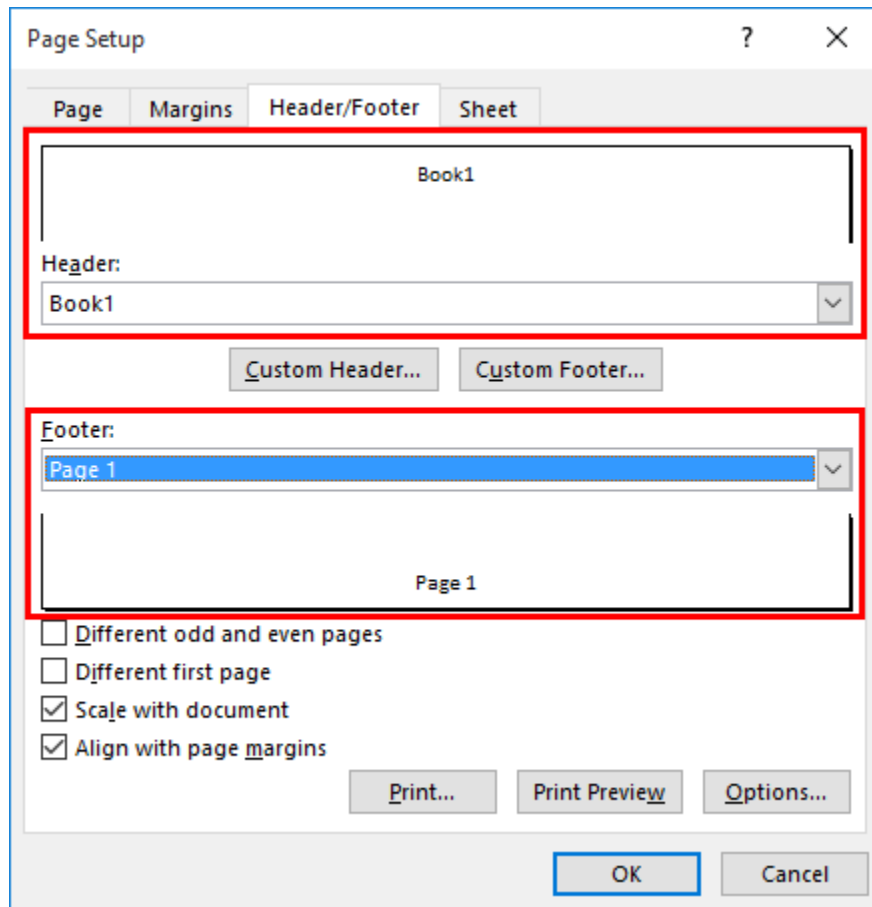
To begin creating headers and footers, click the option button in the Page Setup group of the Page Layout tab:



The Page Setup dialog will open. Then, click the Header/Footer tab:



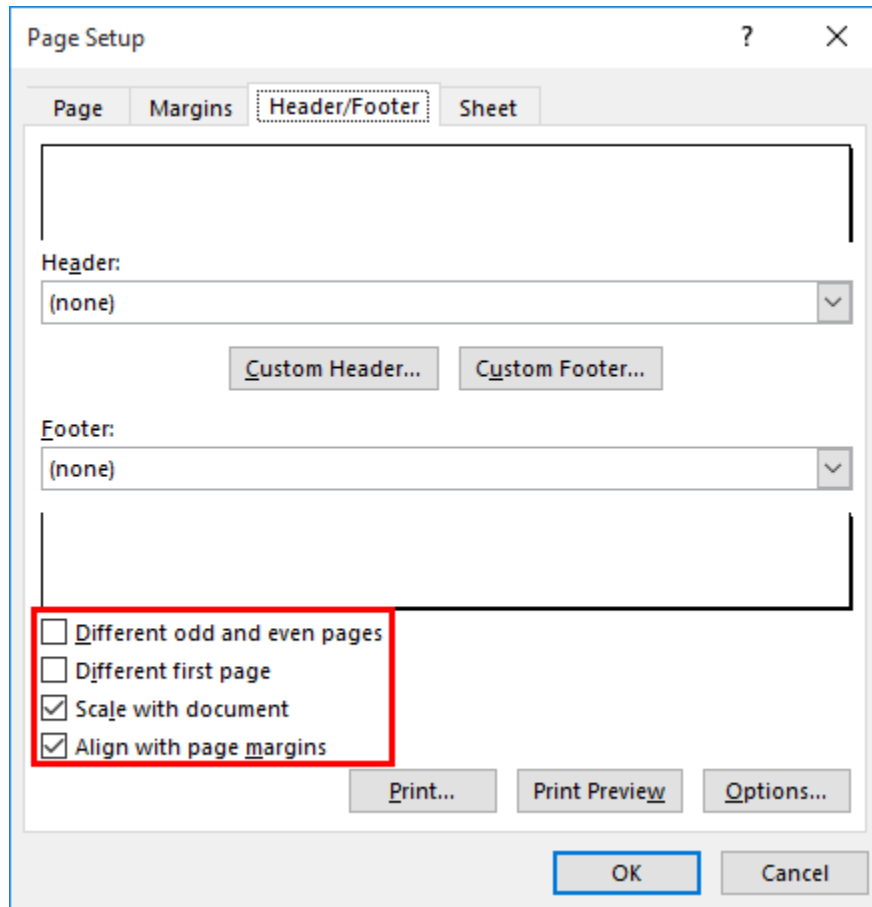
Here you can choose a variety of headers and footers from the appropriate menus. In this example, we have chosen the file name (Book1) as the header and the page number for the footer:



Click OK to create your header and/or footer.

## HEADER AND FOOTER SETTINGS

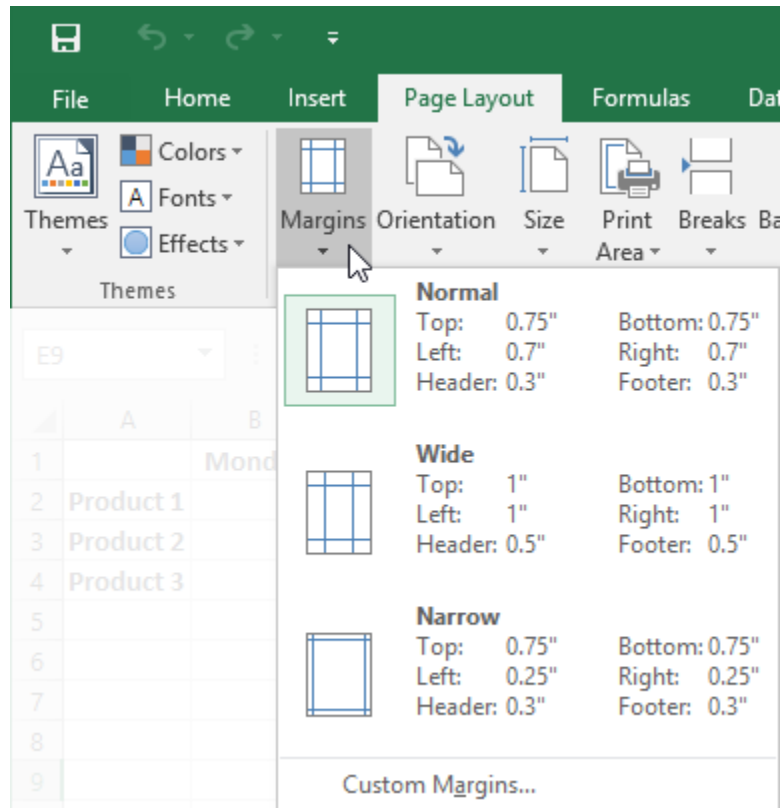
In addition to basic header and footer settings, the Header/Footer tab on the Page Setup dialog also includes more detailed settings. You can find these settings near the bottom of the tab:



These options are all fairly self-explanatory; they allow you to set different footers for odd and even pages as well as the first page. You can also set alignment and scaling options.

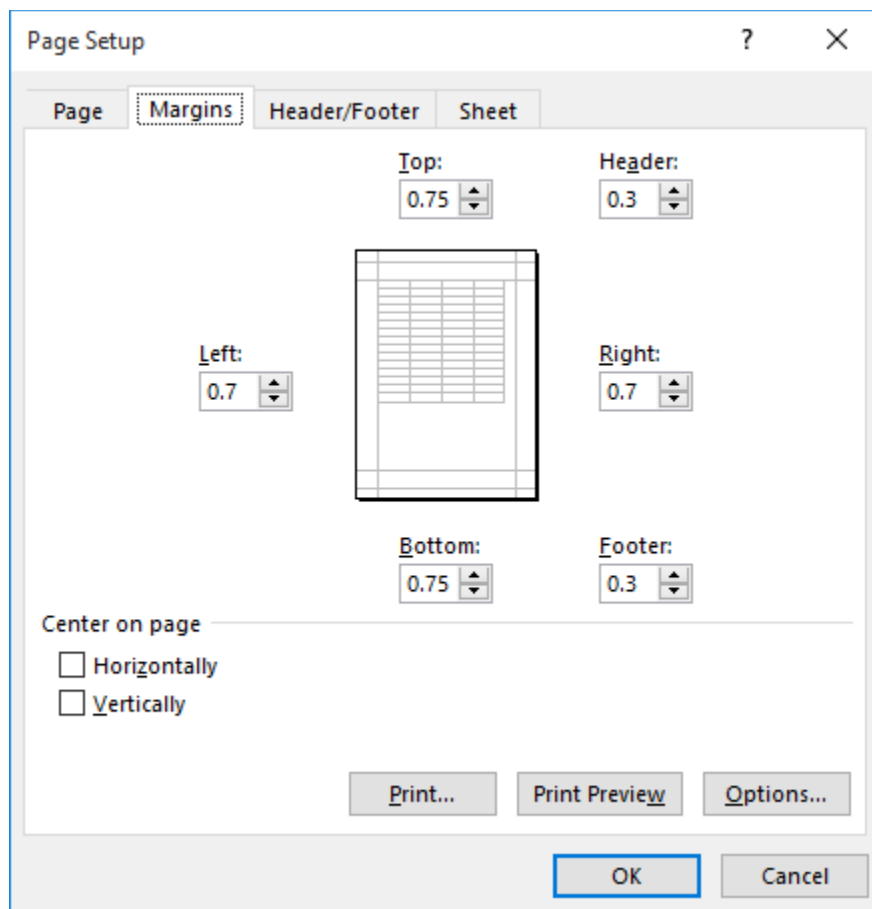
## PAGE MARGINS

If you click Page Layout → Margins, you will see a menu which usually has three preset margin options:



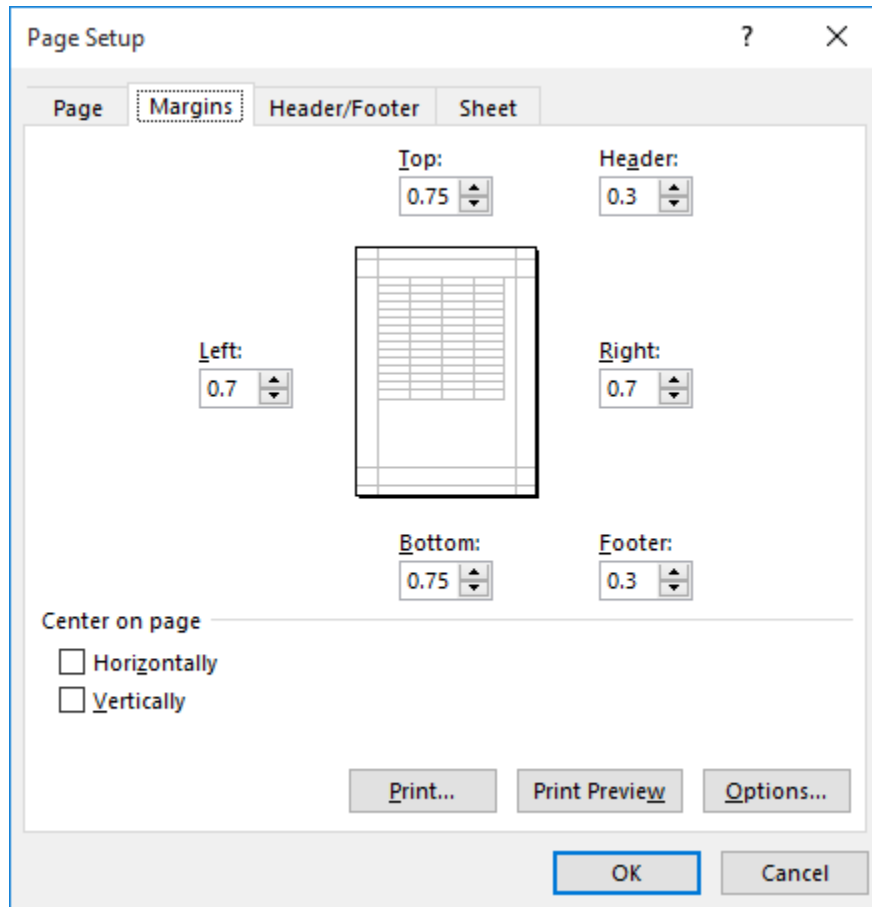
Just click an option to apply it. For more options, click the Custom Margins command. Alternatively, you can click the option button in the Page Setup group and click the Margins tab.

With either command, the Margins tab of the Page Setup dialog will be displayed:



## MARGINS TAB OPTIONS

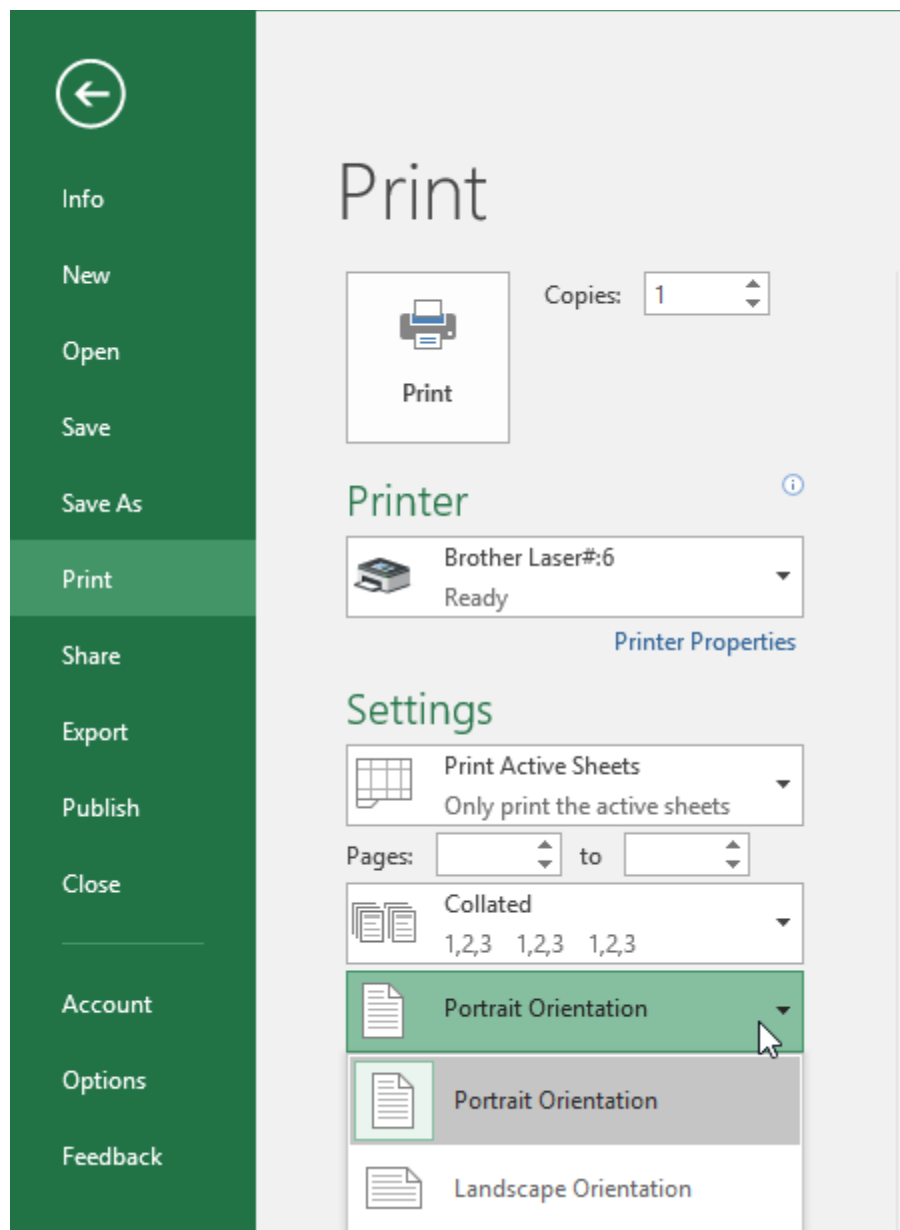
On the Margins tab of the Page Setup dialog box, you can manually set the margin sizes for the current worksheet. Additionally, you can set text alignment on the page as well as header/footer margins:



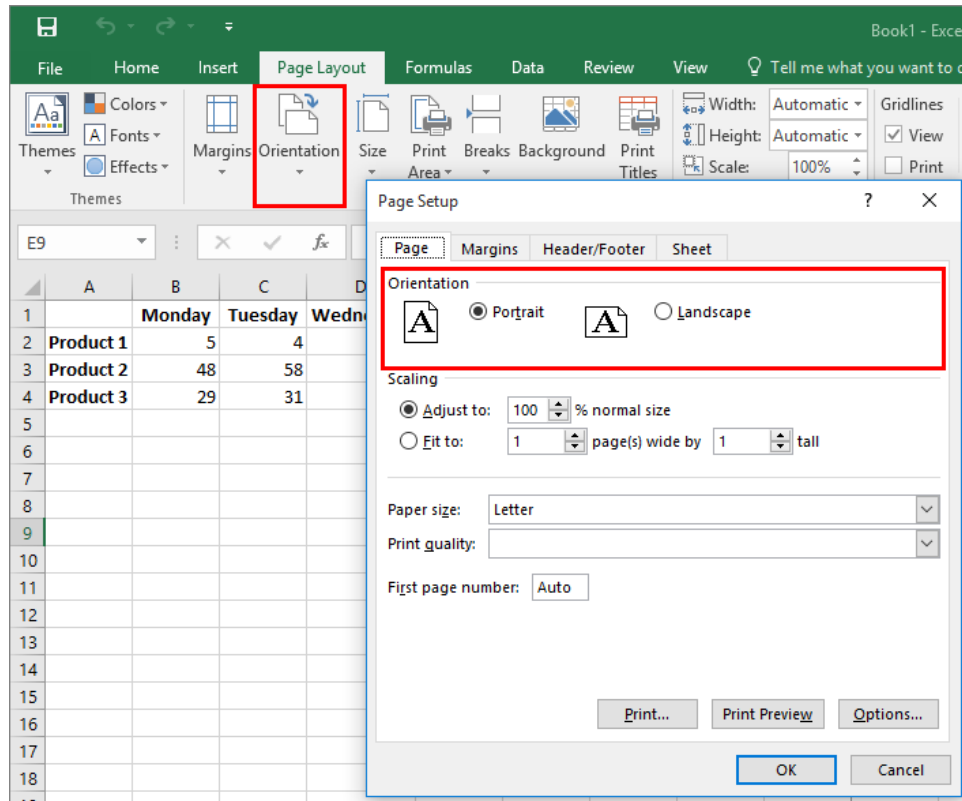
## PAGE ORIENTATION

The final print option that we will examine is page orientation. This setting allows you to choose whether your worksheet will be printed with the long side vertically (portrait) or horizontally (landscape).

You will find this setting in the Print category of Backstage view:



You can also find this command on the Page tab of the Page Setup dialog and on the Page Layout tab:

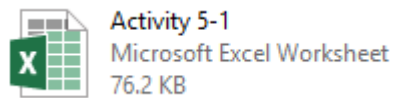


## ACTIVITY 5-1

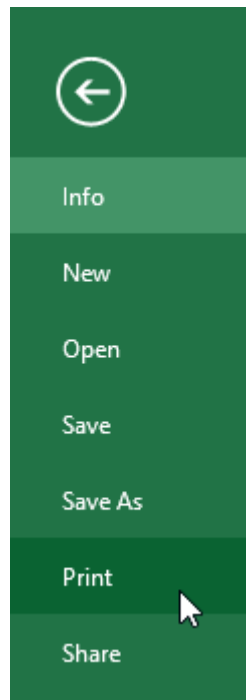
### Previewing a Workbook Before Printing

A large workbook that you have been working with needs to be printed out. Before you do so, you need to ensure that everything will fit on the printed pages.

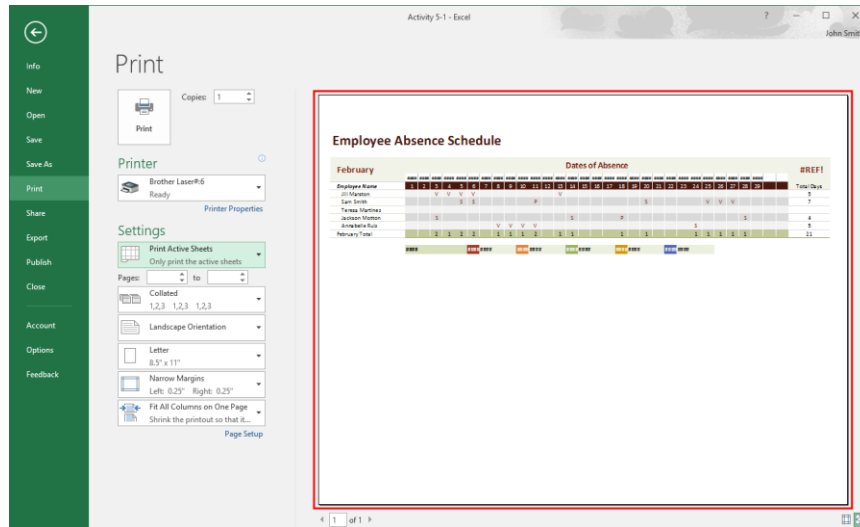
1. Open Excel 2016 and open Activity 5-1 from your Exercise Files folder:



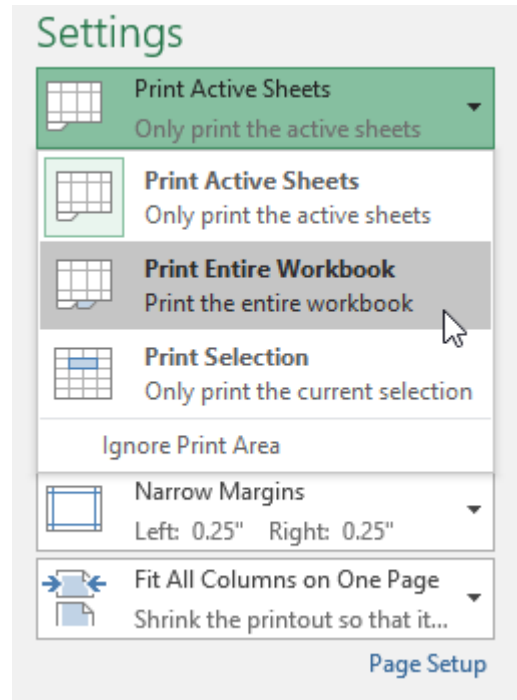
2. Click File → Print:




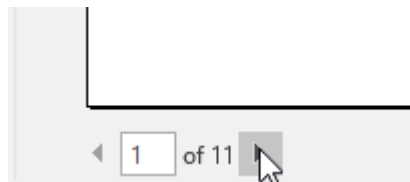
- With the Print category now open in the Backstage view, you will see a preview of the current worksheet:



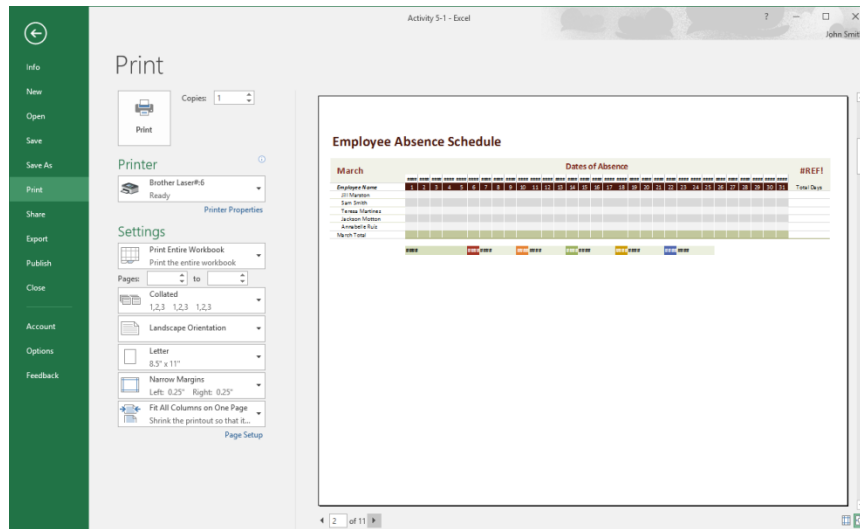
- Right now only the currently displayed worksheet will be printed. Within the Settings section, click Print Active Sheets → Print Entire Workbook:



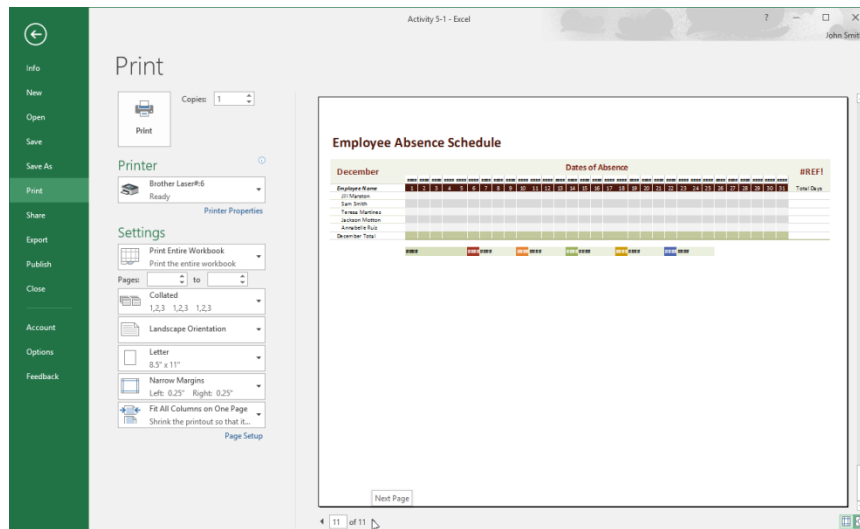
- In the bottom left-hand corner of the preview area, click the Next Page button (  ):



- The second worksheet in the workbook will now be displayed:



- Click the Next Page button repeatedly until you have seen a preview of each worksheet in the current workbook:

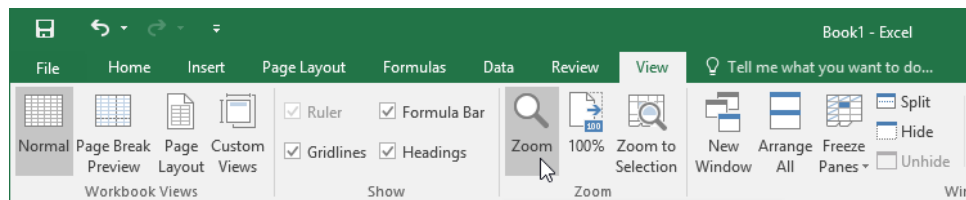


8. Close Microsoft Excel 2016 without saving any changes that you may have made to the current workbook.

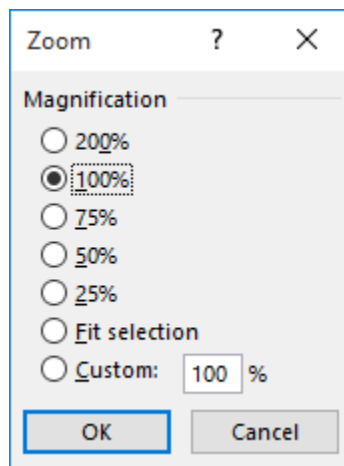
## Refine the Page Layout and Apply Print Options

### ZOOM OPTIONS

You can adjust the zoom settings for your worksheet so that you can enlarge or reduce the amount of information that is displayed on the screen at once. To either increase or reduce the zoom level, click View → Zoom:

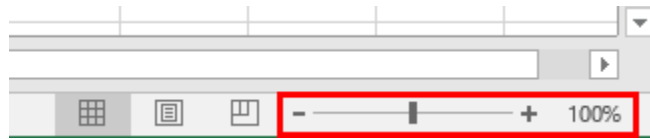


The Zoom dialog will open with options to choose from a variety of zoom presets. You can also enter a custom zoom level into the Custom text box:



Click OK to apply your zoom settings.

You can also adjust the zoom level with the zoomslider on the status bar:

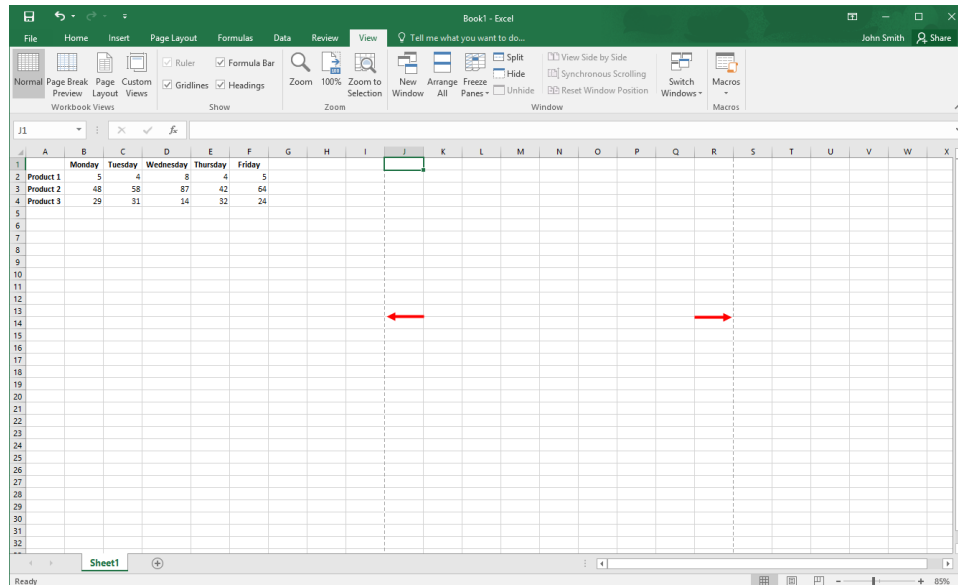


Remember that zoom is measured by percentages, so 200% would be the equivalent of zooming in 2X.

## PAGE BREAKS

Page breaks are used to identify where a new page begins and another ends. Excel will determine automatically where page breaks appear based upon the paper size that you selected and its orientation, but you can modify these breaks and add your own.

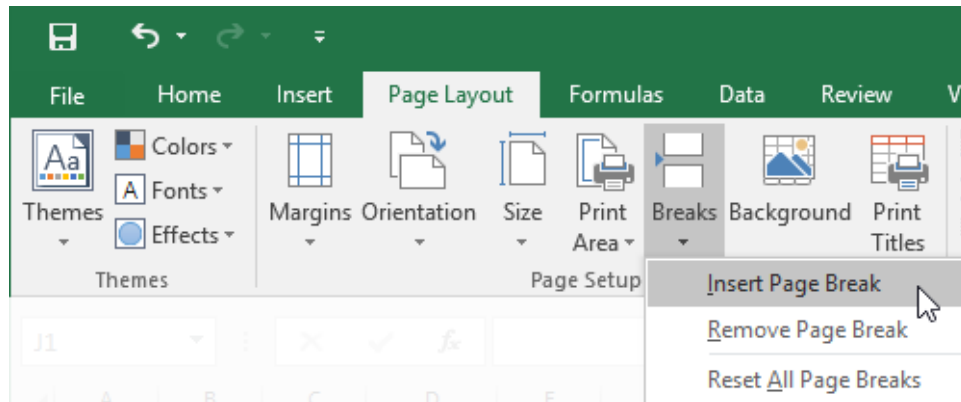
When viewing your workbook, page breaks are identified by thin vertical dashed lines:



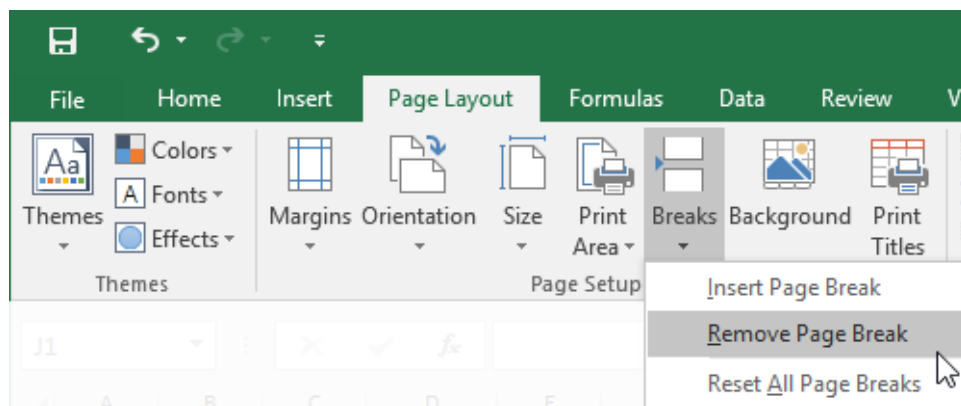
Note that such page breaks may only be displayed after you have viewed a print preview of the current workbook.

## PAGE BREAK OPTIONS

To insert a manual page break, first click on the cell where you want the page break to be placed. (A vertical page break will be added to the left of the selected cell and a horizontal page break will be added to the top of it.) Next, click Page Layout → Breaks → Insert Page Break:



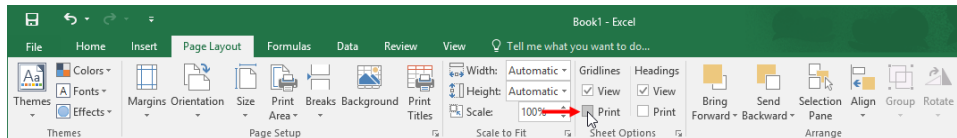
To remove a page break, click to select the cell that is either to the immediate right or bottom of the break. Next, click Page Layout → Breaks → Remove Page Break:



Clicking the Reset All Page Breaks option in this menu will remove all manual page breaks on the current worksheet.

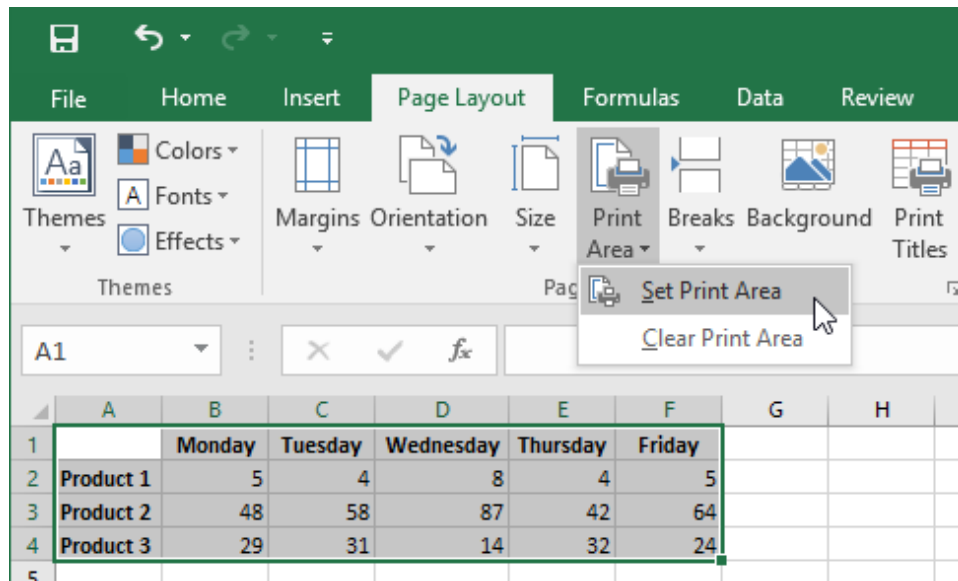
## Gridlines

Gridlines refer to the thin horizontal and vertical lines that divide a worksheet into rows and columns. Such gridlines are very useful in helping to separate data from one another and facilitate the readability of your worksheets. For this reason, it is generally a good idea to include gridlines in your printout. To do this, click the Page Layout tab and check the Print checkbox under the Gridlines header in the Sheet Options group:



## THE PRINT AREA

The print area feature allows you to choose exactly what area of your spreadsheet to print. To begin, select the range of cells that you want to print. Next, click Page Layout → Print Area → Set Print Area:

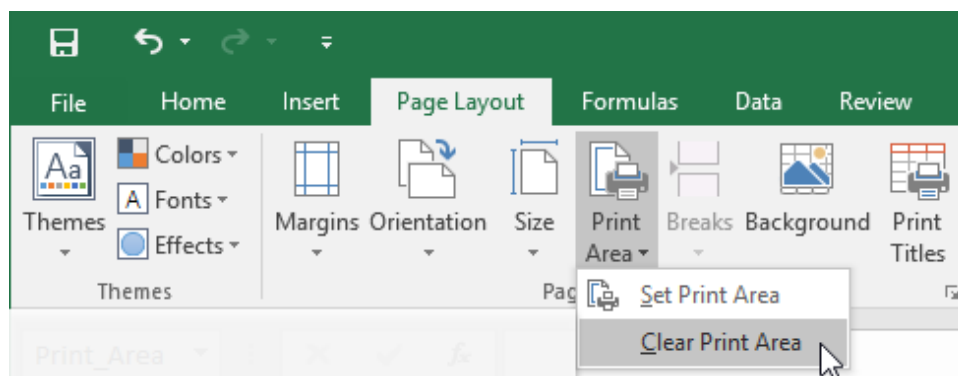


Once the print area is set, it will be surrounded by page break lines that are solid rather than dashed:

	A	B	C	D	E	F
1		Monday	Tuesday	Wednesday	Thursday	Friday
2	Product 1	5	4	8	4	5
3	Product 2	48	58	87	42	64
4	Product 3	29	31	14	32	24

## Removing the Print Area

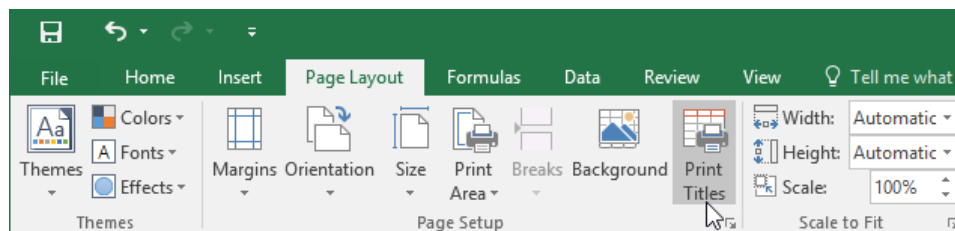
To clear a print area, select the area in question. Then, click Page Layout → Print Area → Clear Print Area:



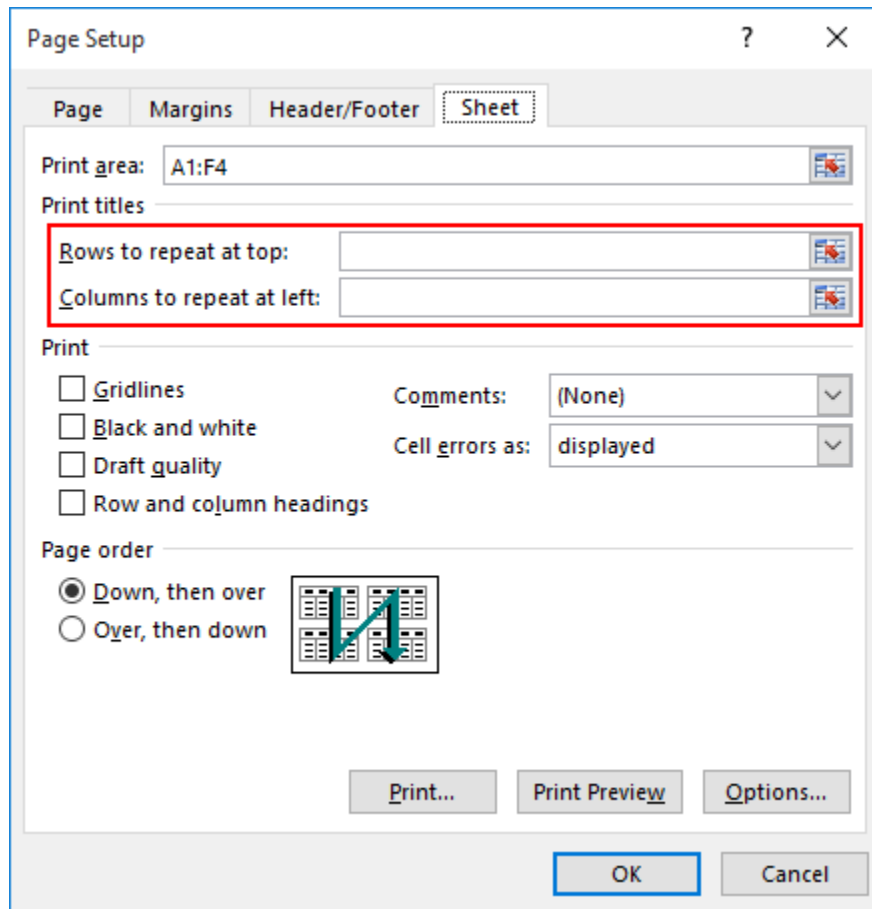
## PRINT TITLES

If you are working with a worksheet that will span multiple pages when printed, you have the option to have the row and column titles repeat. This ensures that each page has the appropriate title that identifies each row and column so you do not end up with just a page of data and no labeling information.

To access the print title options, click Page Layout → Print Titles:



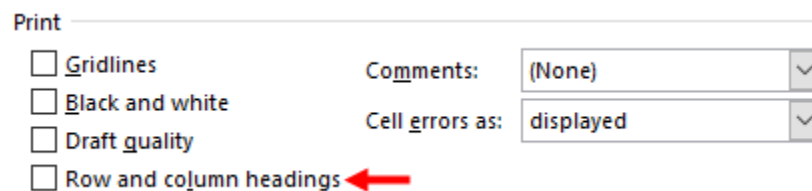
The Page Setup dialog will now be open to the Sheet tab. Using the “Rows to repeat at top” and “Columns to repeat at left” text boxes, you can choose exactly what cells you want repeated:



Note that this tab also includes options to print gridlines, choose a print area, and much more.

### Print Row and Column Headings

The Sheet tab of the Page Setup dialog also includes the “Row and column headings” checkbox:

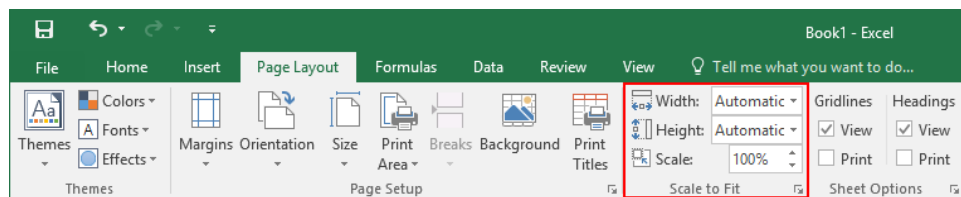


By enabling this option you can print the alphabetic column headers and numeric row headers along with your worksheet. This option is disabled by default.

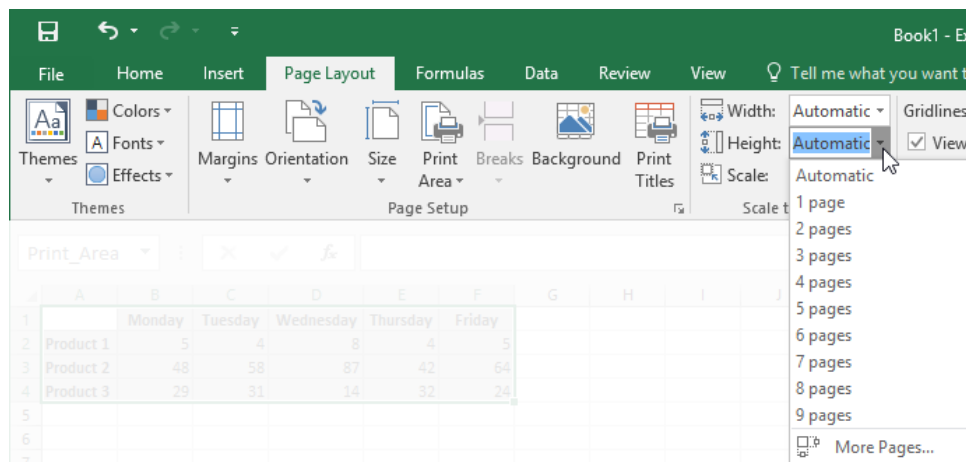
### SCALING OPTIONS

If you find that the worksheet you want to print will span too many pages, you can choose to restrict the printout to a set number of pages. This will cause Excel to scale the size of your pages down in order to fit them onto the chosen number of pages. Alternatively, you can also choose to increase the scale so that your worksheet will appear larger (and possibly more readable) on the page, but take up more printed pages as a result.

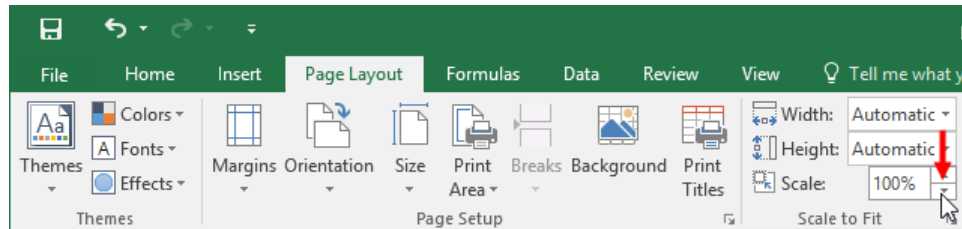
All of these scaling options are found on the Page Layout tab, within the “Scale to Fit” group:



Clicking either the Width or Height drop-down menus will allow you to choose the number of pages that you want the printout to span in those directions:



The Scale increment box, on the other hand, allows you to scale the content of your worksheets up or down:



## ACTIVITY 5-2

### Refining the Page Layout and Applying Print Options

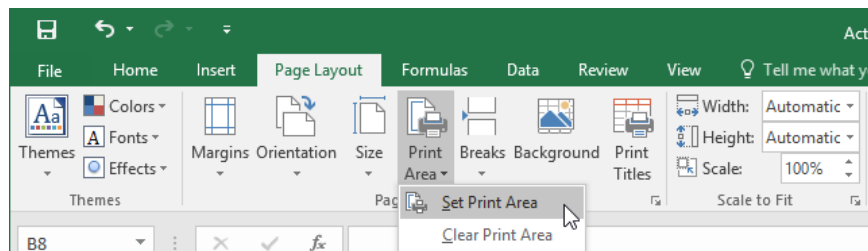
You need to print off a worksheet that shows budget information, but you would like to split it up between four pages. Additionally, a page break must appear between Quarter 2 and Quarter 3. All pages also need title information for each row and column.

9. Open Excel 2016 and open Activity 5-2 from your Exercise Files folder:

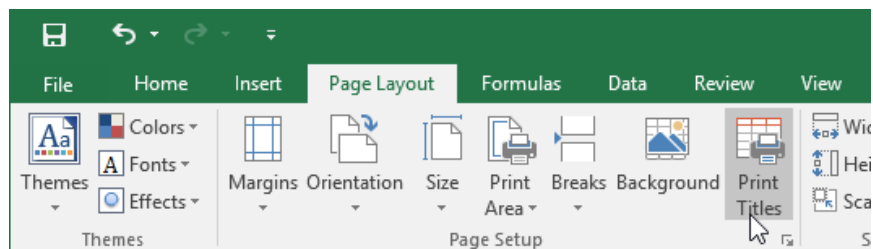




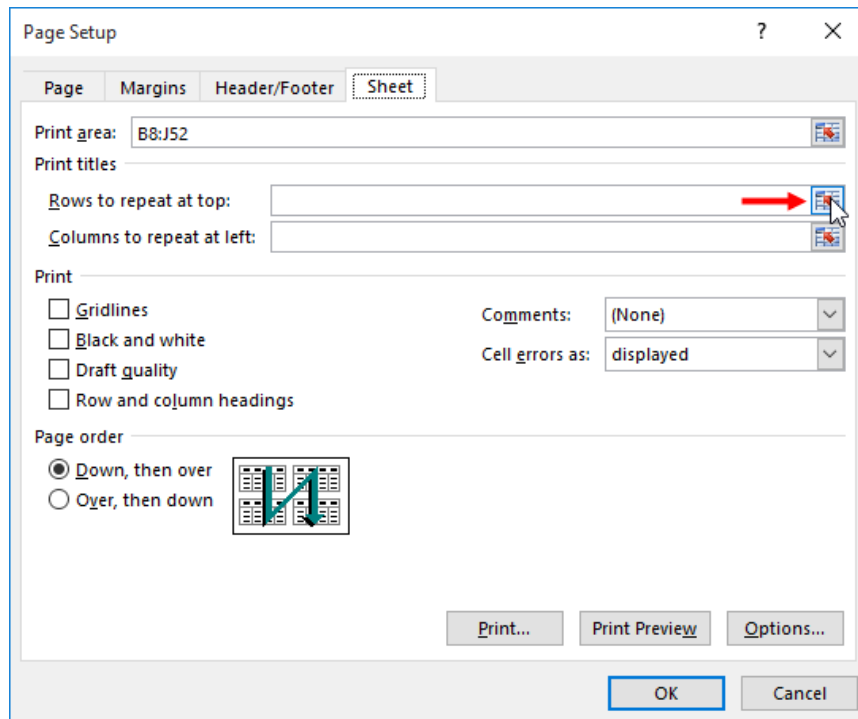
12. Click Page Layout → Print Area → Set Print Area:



13. Next, with the previously selected cell range still selected, click Page Layout → Print Titles:



14. The Page Setup dialog will now be open to the Sheet tab. Click the cell selector button on the far right of the “Rows to repeat at top” text box:

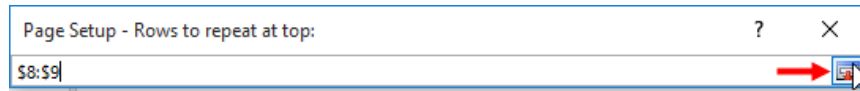


15. Your worksheet will now be shown. Click and drag to select rows 8 and 9:

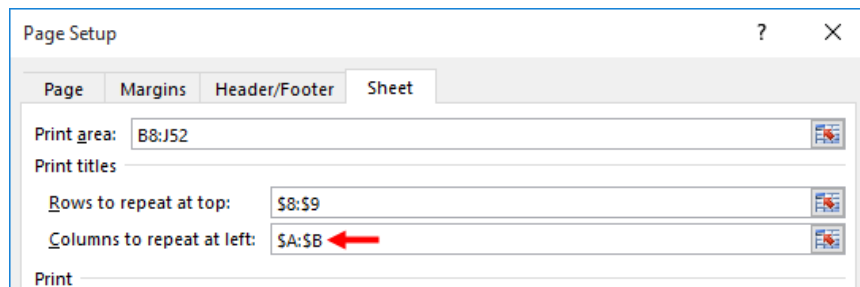
The screenshot shows an Excel worksheet titled 'Quarterly Marketing Budget' for the period ending 12/31/2009. The worksheet is displayed in a grid format with columns A through S and rows 1 through 14. The data is organized into a table with columns for Quarter 1, Quarter 2, Quarter 3, and Quarter 4, and rows for various marketing expenses. The table is as follows:

	Quarter 1	Quarter 2	Quarter 3	Quarter 4
	Expenses	% Total	Expenses	% Total
Print	\$10,000	11.6%	\$12,000	12.4%
Radio	10,000	11.6%	11,000	11.3%
Television	25,000	29.1%	28,000	28.9%
Direct Mail	30,000	34.9%	32,000	33.0%
Point of Purchase	5,000	5.8%	6,000	6.2%

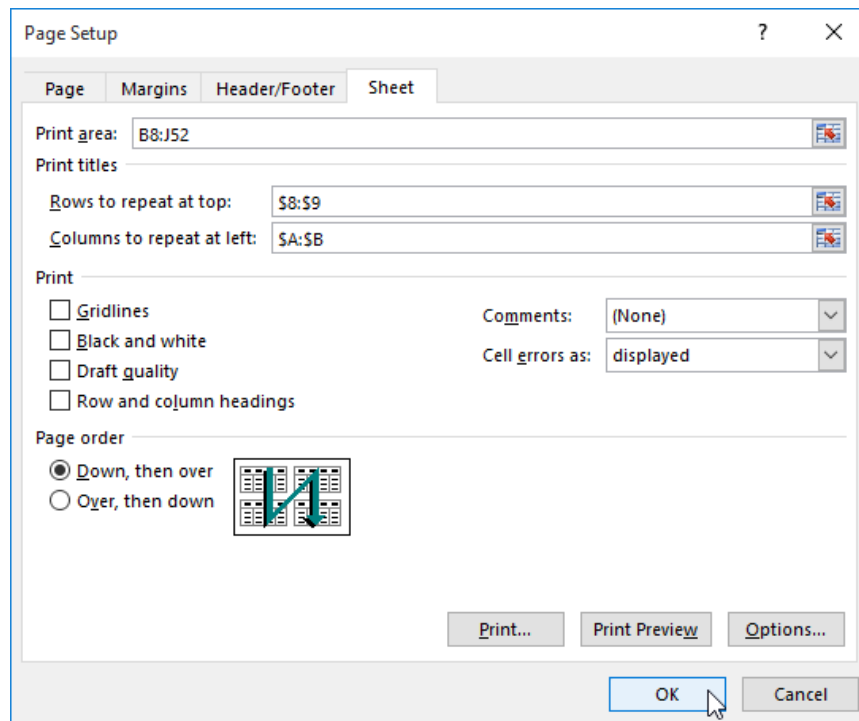
16. In the cell selector dialog, click the cell selector button to return to the Page Setup dialog box:



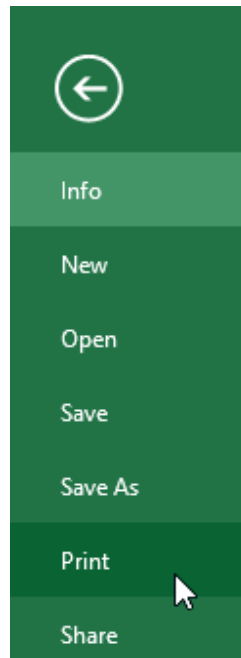
17. Back at the Page Setup dialog, click inside the "Columns to repeat at left" text box and type "\$A:\$B":



18. In the Page Setup dialog, click OK to apply the new settings:



19. Click File → Print:



20. Examine the preview portion of this screen. You will see that the current worksheet has been divided into four pages. Each page has both column and row titles:

	Quarter 1		Quarter 2	
	Expenses	% Total	Expenses	% Total
Print	\$12,000	11.0%	\$12,000	12.4%
Radio	10,000	11.0%	11,000	11.3%
Television	20,000	20.0%	20,000	20.8%
Direct Mail	30,000	34.9%	32,000	33.0%
Point of Purchase	5,000	5.8%	6,000	6.2%
Co-op	5,000	5.8%	7,000	7.2%
Other	1,000	1.2%	2,000	1.9%
<b>Total</b>	<b>\$80,000</b>	<b>100.0%</b>	<b>\$92,000</b>	<b>100.0%</b>
<b>Sales Promotion</b>				
Trade Shows	\$2,000	10.0%	\$3,000	54.5%
Sales Force Promotion	10,000	70.0%	2,000	35.4%
Other	1,000	7.0%	100	0.1%
<b>Total</b>	<b>\$13,000</b>	<b>16.0%</b>	<b>\$5,000</b>	<b>5.4%</b>
<b>G&amp;A</b>				
Capital	\$100,000	27.0%	\$110,000	28.4%
Management	200,000	54.0%	210,000	54.3%
Telephone	40,000	11.0%	41,000	10.2%
Travel	10,000	4.1%	10,000	4.1%
Supplies	5,000	2.2%	5,000	2.2%
Other	1,000	0.3%	1,000	0.3%
<b>Total</b>	<b>\$366,000</b>	<b>81.0%</b>	<b>\$387,000</b>	<b>81.2%</b>
<b>HR Development</b>				
Videos	\$1,000	2.7%	\$1,000	2.7%
Workshops	20,000	54.1%	20,000	54.1%
Tuition/Seminars	15,000	40.8%	15,000	40.8%
Other	1,000	2.7%	1,000	2.7%
<b>Total</b>	<b>\$37,000</b>	<b>8.2%</b>	<b>\$37,000</b>	<b>8.2%</b>
<b>Sales Force</b>				
Motivational Programs	\$1,000	0.9%	\$1,000	0.9%
Recruiting	2,000	1.1%	2,000	1.1%
Salaries and Benefits	150,000	81.9%	150,000	81.9%
Telephone	20,000	10.9%	20,000	10.9%
Training	10,000	5.4%	10,000	5.4%
Other	1,000	0.5%	1,000	0.5%
<b>Total</b>	<b>\$184,000</b>	<b>28.8%</b>	<b>\$184,000</b>	<b>24.8%</b>
<b>Market Research</b>				

- 21.** Save your work as Activity 5-2 Complete and close Microsoft Excel 2016.