

Simple Instructions for using Microsoft Excel

The goal of these instructions is to familiarize the user with the basics of Excel. These directions will cover data entry, formatting, formulas and functions, and graphs.

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You'll need:

A computer with Microsoft Excel installed.

Follow these step-by-step instructions for entering data in Excel

Step 1: From the desktop or from your 'Start' menu, open **Microsoft Excel**.

Step 2: Click on the cell where you want to insert data

Step 3: Type the data in to the cell

Step 4: Press the **ENTER** key on the keyboard or use the mouse to click on another cell.

There are two main types of data that people enter into Excel: Text and Numbers. For some practice with entering data, follow these next steps listed:

*Note: By default, text data will be left-aligned within the cell and number data will be right-aligned.

Scenario: Suppose you are a teacher who needs an effective way to organize your student's grades on various assignments. You decide to use an Excel spreadsheet to accomplish this.

1.) In cells A1-A16, enter the following text in order starting at the top of the column, moving downward: **Student, Heather A., Ryan A., Jack C., Colleen D., Phil E., Sara F., Tom G., Paulene G., Tim H., Dan I., Brian K., Forrest L., Morgan M., Danielle N., Beatrice S., and Class Average**

2.) In cells B1-B16, enter the following text and numbers in order starting at the top of the column, moving downward: **Test 1, 81, 55, 35, 87, 76, 78, 90, 67, 70, 92, 84, 80, 72, 81, and 55.**

3.) In cells C1-C16, enter the following text and numbers in order starting at the top of the column, moving downward: **Test 2, 88, 56, 48, 91, 78, 86, 91, 87, 76, 95, 87, 88, 74, 84, and 58.**

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4.) In cells D1-D16, enter the following text and numbers in order starting at the top of the column, moving downward: **Test 3, 93, 57, 55, 93, 80, 94, 97, 90, 79, 98, 92, 89, 77, 88, and 61.**

5.) In cell E1, enter **Final Grade**, and in cell F1, enter **Pass/Fail**.

-Data for columns E and F will be entered later in the Formulas and Functions section.

*Note: Feel free to enter some of the data horizontally along the row, instead of vertically down the column, to get practice with the different keyboard functions.

Follow these instructions to format a document in Excel

From the desktop or from your 'Start' menu, open **Microsoft Excel**.

Formatting Data

There are many different options in Microsoft Excel to format numbers, text, and the cells themselves. These instructions will cover some of the more basic and widely-used formatting options available:

Changing the Font

Font commands will allow you to change the style, size, or color of the text you wish to alter:

Style

1.) Select the cells you wish to modify.

-In this case, please select all data.

2.) To change the font style of the cells as well as the row and column headers, click on the **PAGE LAYOUT** tab at the top of the page

3.) Click the drop-down arrow next to the **FONT** command in the upper left corner of the screen

4.) Scroll over the various fonts and choose "**Office Classic 2-Arial-Arial**"

*Note: to change the font of **ONLY** the cells and not the row and column headers, complete the same directions just given, only under the **HOME** tab at the top of the page.

Size

1.) Select the cells you wish to modify

-In this case, please select cells A1-F1 (Column Headers).

2.) Under the **HOME** tab at the top of the page, locate the drop-down arrow next to the font size command

3.) Click on the drop-down arrow

4.) Scroll over the various font sizes and choose size **12**.

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Color

- 1.) Select the cells you wish to modify
-In this case, select cells A1-F1 again.
- 2.) Under the **HOME** tab at the top of the page, locate the drop-down arrow next to the font color command.
- 3.) Click on the drop-down arrow
- 4.) Scroll over the various font colors and click on the desired color

Follow these instructions to align text in Excel

From the desktop or from your 'Start' menu, open **Microsoft Excel**.

Horizontal

- 1.) Select the cells you wish to modify
-In this case, please select all cells.
- 2.) Under the **HOME** tab, you can one of the three horizontal alignment commands
 - **ALIGN TEXT LEFT**: aligns text to the left of the cell
 - **CENTER**: aligns text to the center of the cell
 - **ALIGN TEXT RIGHT**: aligns text to the right of the cell

Vertical

- 1.) Select the cells you wish to modify
-In this case, please select all cells.
- 2.) Under the **HOME** tab, select one of the three vertical alignment commands
 - **TOP ALIGN**: Aligns text to the top of the cell
 - **MIDDLE ALIGN**: Aligns text to the middle of the cell
 - **BOTTOM ALIGN**: Aligns text to the bottom of the cell

-In our example, we used Middle alignment for both Horizontal and Vertical.

Follow these instructions to work with dates and numbers in Excel

Open an existing Word document or start a new document and type your text.

- 1.) Select the cells you wish to modify
- 2.) Under the **HOME** tab, find the formatting section labeled **NUMBERS**
- 3.) Click on the drop-down arrow and select the number format you want (some frequently used examples include Currency, Time, Date, Percentage, Fraction, etc.)

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Follow these instructions to enter a table in Excel

Open an existing Excel document or start a new document

Returning to our previous example from the instructions regarding data entry, follow these steps to further format the data and text you entered:

- 1.) Use your mouse to highlight all the cells containing text or number data
- 2.) Click on the **INSERT** tab at the top of the page and select **TABLE**
- 3.) Make sure you click on the box (you will see a checkmark appear) stating that the table has headers
- 4.) Click on the **OK** button to finalize the formatting

*Note: Feel free to also format other aspects of your spreadsheet discussed above such as the style, size, and color of the font to fit your own preferences.

Follow these instructions to work with formulas and functions in Excel

Open an existing Excel document or start a new document.

Once you have a column of numbers, there are several different calculations you can do with these.

Average and Sum

1. Type in **Class Average** in cell A17 and change the font color to red.
2. Select the cell in which you want the average to appear. In this case, B17
3. Type **=average(**
4. Click and drag over the cells that you want to be averaged. In this case, B2-B16.
5. A moving border will appear around all the cells that are going to be averaged. When you have the right cells selected, hit **ENTER**.
6. Repeat steps 1-5 for columns C and D.
7. Change font color of B17, C17, and D17 to red to match A17.

*Note: If you want to add the total of a row or column, you can follow the same steps but instead of the word 'average' insert the word 'sum' so when you select the cell you want the sum to be in, you will type **=sum(**

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Follow these instructions for rounding numbers in Excel

Open or start a new Excel document if you do not already have one open.

You can go back and format the cells to make them currency or to round them to 2 decimal points.

1. Right click on the cell that has the average in it, as averages typically have many decimal points.
2. Click **Format Cells...**
3. On the left box, select **Number**
4. On the right side, make sure the box after **Decimal Places:** says **2**

Follow these instructions to use formulas to extend to multiple rows and columns

Open an existing Excel document or start a new document.

In order to extend a formula over multiple cells, first type the formula in one cell. In this case, we will put the average in column E.

1. In cell E2 type **=average(**
2. Click and drag to select cells B2 C2 and D2
3. Hit **ENTER**
4. The formula should have extended throughout all of column E to insert the average of each student and the class average.
5. Select cells E2-E17 and format the cells so that they are rounded to 2 decimal places.

Follow these instructions to create a graph in Excel

Start a new document in Word and type your text.

Line Graph

1. Highlight data and titles required.
-In this case, select columns A-D up to cell 16 in each. Data from Test 1, Test 2, and Test 3 for each student should be highlighted.
2. Click on **INSERT** on the ribbon.

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3. Select **Line** from the Charts section.
4. Click which line graph type is needed
5. After the line graph shows up, click on the graph and move it to desired place on the spreadsheet.
-In this case, the line graph will be moved to the right of the scatterplot graph.

Bar Graph

1. Highlight data and titles required.
-In this case, select B17-E17. The Class Averages for Test 1, Test 2, Test 3 and Final Grade should be highlighted.
2. Click on **INSERT** on the ribbon.
3. Select **Bar** from the Charts section.
4. Click which bar graph type needed.

How to Add Titles to graphs

1. Select a graph by clicking on it.
-In this case, click on the scatterplot graph.
2. A **“Chart Tool”** bar should appear at the top center of the screen.
3. Click on the **Layout** tab.
4. Click on the **Chart Title** box.
5. Select which type of title is needed.
-In this case, choose **Above Chart**
6. A text box should appear above the selected graph.
7. Fill in text box with your title
-In this case, type in **Class Grades** as the title.

Axis Titles:

1. Click on **Axis Titles** box
-In this case, the bar graph will be used.
2. Select which type of title is needed.
 - a. **Primary Horizontal Axis Title** is for the X axis
-In this case, select **Title Below Axis**
 - b. **Primary Vertical Axis Title** is for the Y axis
-In this case, select **Horizontal Title**
3. A text box should appear next to the Y or X axis of the selected graph

4. Fill in text box with your title

-In this case, the title for the X axis will be **Grade**, and the title for the Y axis will be **Class Average**.