

MICROSOFT EXCEL

MICROSOFT EXCEL



Conditional Formatting

Contents

- Introduction
 - Understanding conditional formatting
 - To create a conditional formatting rule
- Conditional Formatting Presets
 - To use preset conditional formatting
- Removing Conditional Formatting
 - To remove conditional formatting
- Practice

Introduction

- ▶ Let's say you have a worksheet with thousands of rows of data. It would be extremely difficult to see patterns and trends just from examining the raw information. Similar to charts and sparklines, **conditional formatting** provides another way to visualize data and make worksheets easier to understand.

Understanding conditional formatting

- Conditional formatting allows you to automatically apply formatting—such as **colors**, **icons**, and **data bars**—to one or more cells based on the **cell value**. To do this, you'll need to create a **conditional formatting rule**. For example, a conditional formatting rule might be: **If the value is less than \$2000, color the cell red**. By applying this rule, you'd be able to quickly see which cells contain values less than \$2000.

	A	B	C	D	E
2	Salesperson	May	June	July	August
3	Albertson, Kathy	\$3,799.00	\$557.00	\$3,863.00	\$1,117.00
4	Allenson, Carol	\$18,930.00	\$1,042.00	\$9,355.00	\$1,100.00
5	Altman, Zoey	\$5,725.00	\$3,072.00	\$6,702.00	\$2,116.00
6	Bittiman, William	\$1,344.00	\$3,755.00	\$4,415.00	\$1,089.00
7	Brennan, Michael	\$8,296.00	\$3,152.00	\$11,601.00	\$1,122.00
8	Carlson, David	\$3,945.00	\$4,056.00	\$3,726.00	\$1,135.00
9	Collman, Harry	\$8,337.00	\$4,906.00	\$9,007.00	\$2,113.00
10	Counts, Elizabeth	\$3,742.00	\$521.00	\$4,505.00	\$1,024.00
11	David, Chloe	\$7,605.00	\$3,428.00	\$3,973.00	\$1,716.00

Creating a conditional formatting rule

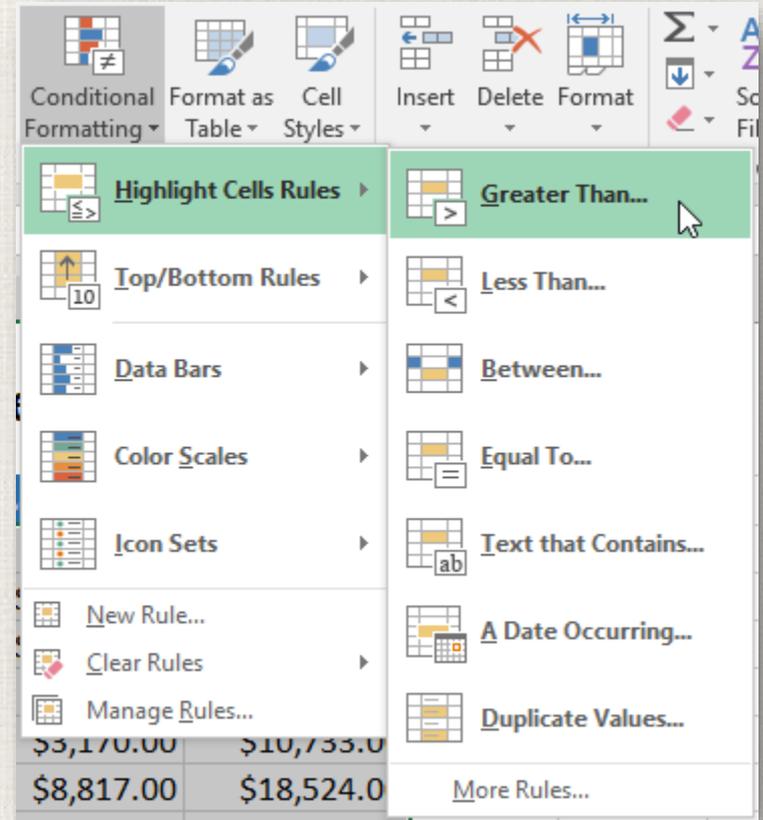
In our example, we have a worksheet containing sales data, and we'd like to see which salespeople are meeting their monthly sales goals. The sales goal is \$4000 per month, so we'll create a conditional formatting rule for any cells containing a value higher than 4000.

1. Select the **desired cells** for the conditional formatting rule.

	A	B	C	D	E	F	G
1		Westbrook Parker Sales Data					
2	Salesperson	May	June	July	August	September	October
3	Albertson, Kathy	\$3,799.00	\$557.00	\$3,863.00	\$1,117.00	\$8,237.00	\$8,690.00
4	Allenson, Carol	\$18,930.00	\$1,042.00	\$9,355.00	\$1,100.00	\$10,185.00	\$18,749.00
5	Altman, Zoey	\$5,725.00	\$3,072.00	\$6,702.00	\$2,116.00	\$13,452.00	\$8,046.00
6	Bittiman, William	\$1,344.00	\$3,755.00	\$4,415.00	\$1,089.00	\$4,404.00	\$20,114.00
7	Brennan, Michael	\$8,296.00	\$3,152.00	\$11,601.00	\$1,122.00	\$3,170.00	\$10,733.00
8	Carlson, David	\$3,945.00	\$4,056.00	\$3,726.00	\$1,135.00	\$8,817.00	\$18,524.00
9	Collman, Harry	\$8,337.00	\$4,906.00	\$9,007.00	\$2,113.00	\$13,090.00	\$13,953.00
10	Counts, Elizabeth	\$3,742.00	\$521.00	\$4,505.00	\$1,024.00	\$3,528.00	\$15,275.00
11	David, Chloe	\$7,605.00	\$3,428.00	\$3,973.00	\$1,716.00	\$4,839.00	\$13,085.00
12	Davis, William	\$5,304.00	\$1,562.00	\$2,945.00	\$1,176.00	\$9,642.00	\$13,714.00
13	Dumlao, Richard	\$9,333.00	\$2,779.00	\$7,549.00	\$1,101.00	\$5,850.00	\$15,065.00
14	Farmer, Kim	\$1,103.00	\$3,470.00	\$3,862.00	\$1,040.00	\$10,024.00	\$18,389.00
15	Ferguson, Elizabeth	\$1,333.00	\$1,913.00	\$4,596.00	\$1,126.00	\$5,503.00	\$10,686.00
16	Flores, Tia	\$12,398.00	\$2,883.00	\$2,142.00	\$2,014.00	\$13,547.00	\$21,983.00
17	Ford, Victor	\$3,251.00	\$4,931.00	\$8,283.00	\$1,054.00	\$9,543.00	\$11,967.00
18	Hodges, Melissa	\$4,624.00	\$4,798.00	\$8,420.00	\$1,389.00	\$10,468.00	\$12,677.00
19	Jameson, Robinson	\$2,552.00	\$4,459.00	\$2,248.00	\$1,058.00	\$6,267.00	\$14,982.00
20	Kellerman, Frances	\$4,281.00	\$4,172.00	\$11,074.00	\$1,282.00	\$2,365.00	\$9,380.00

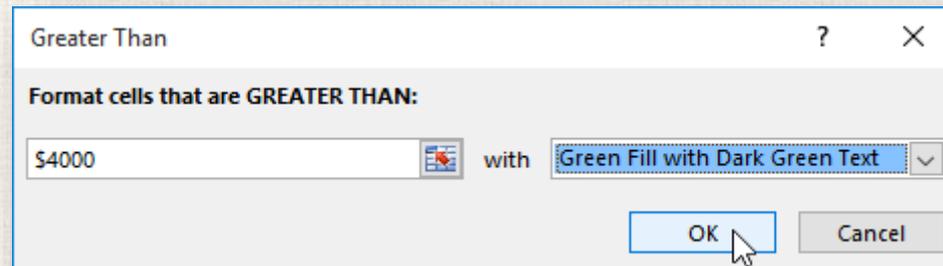
Creating a conditional formatting rule

- From the **Home** tab, click the **Conditional Formatting** command. A drop-down menu will appear.
- Hover the mouse over the desired **conditional formatting type**, then select the **desired rule** from the menu that appears. In our example, we want to **highlight cells** that are **greater than** \$4000.



Creating a conditional formatting rule

4. A dialog box will appear. Enter the **desired value(s)** into the blank field. In our example, we'll enter 4000 as our value.
5. Select a **formatting style** from the drop-down menu. In our example, we'll choose **Green Fill with Dark Green Text**, then click **OK**.



Creating a conditional formatting rule

6. The conditional formatting will be applied to the selected cells. In our example, it's easy to see which salespeople reached the \$4000 sales goal for each month.

	A	B	C	D	E	F	G
1			Westbrook Parker Sales Data				
2	Salesperson	May	June	July	August	September	October
3	Albertson, Kathy	\$3,799.00	\$557.00	\$3,863.00	\$1,117.00	\$8,237.00	\$8,690.00
4	Allenson, Carol	\$18,930.00	\$1,042.00	\$9,355.00	\$1,100.00	\$10,185.00	\$18,749.00
5	Altman, Zoey	\$5,725.00	\$3,072.00	\$6,702.00	\$2,116.00	\$13,452.00	\$8,046.00
6	Bittiman, William	\$1,344.00	\$3,755.00	\$4,415.00	\$1,089.00	\$4,404.00	\$20,114.00
7	Brennan, Michael	\$8,296.00	\$3,152.00	\$11,601.00	\$1,122.00	\$3,170.00	\$10,733.00
8	Carlson, David	\$3,945.00	\$4,056.00	\$3,726.00	\$1,135.00	\$8,817.00	\$18,524.00
9	Collman, Harry	\$8,337.00	\$4,906.00	\$9,007.00	\$2,113.00	\$13,090.00	\$13,953.00
10	Counts, Elizabeth	\$3,742.00	\$521.00	\$4,505.00	\$1,024.00	\$3,528.00	\$15,275.00
11	David, Chloe	\$7,605.00	\$3,428.00	\$3,973.00	\$1,716.00	\$4,839.00	\$13,085.00
12	Davis, William	\$5,304.00	\$1,562.00	\$2,945.00	\$1,176.00	\$9,642.00	\$13,714.00
13	Dumlao, Richard	\$9,333.00	\$2,779.00	\$7,549.00	\$1,101.00	\$5,850.00	\$15,065.00
14	Farmer, Kim	\$1,103.00	\$3,470.00	\$3,862.00	\$1,040.00	\$10,024.00	\$18,389.00
15	Ferguson, Elizabeth	\$1,333.00	\$1,913.00	\$4,596.00	\$1,126.00	\$5,503.00	\$10,686.00
16	Flores, Tia	\$12,398.00	\$2,883.00	\$2,142.00	\$2,014.00	\$13,547.00	\$21,983.00
17	Ford, Victor	\$3,251.00	\$4,931.00	\$8,283.00	\$1,054.00	\$9,543.00	\$11,967.00
18	Hodges, Melissa	\$4,624.00	\$4,798.00	\$8,420.00	\$1,389.00	\$10,468.00	\$12,677.00
19	Jameson, Robinson	\$2,552.00	\$4,459.00	\$2,248.00	\$1,058.00	\$6,267.00	\$14,982.00
20	Kellerman, Frances	\$4,281.00	\$4,172.00	\$11,074.00	\$1,282.00	\$2,365.00	\$9,380.00

Creating a conditional formatting rule

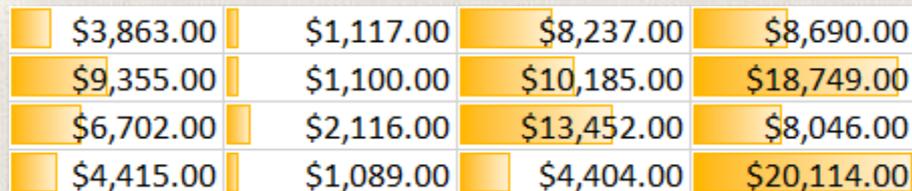
- You can apply multiple conditional formatting rules to a cell range or worksheet, allowing you to visualize different trends and patterns in your data.

	A	B	C	D	E	F	G
1							Westbrook Parker Sales Data
2	Salesperson	May	June	July	August	September	October
3	Albertson, Kathy	\$3,799.00	\$557.00	\$3,863.00	\$1,117.00	\$8,237.00	\$8,690.00
4	Allenson, Carol	\$18,930.00	\$1,042.00	\$9,355.00	\$1,100.00	\$10,185.00	\$18,749.00
5	Altman, Zoey	\$5,725.00	\$3,072.00	\$6,702.00	\$2,116.00	\$13,452.00	\$8,046.00
6	Bittiman, William	\$1,344.00	\$3,755.00	\$4,415.00	\$1,089.00	\$4,404.00	\$20,114.00
7	Brennan, Michael	\$8,296.00	\$3,152.00	\$11,601.00	\$1,122.00	\$3,170.00	\$10,733.00
8	Carlson, David	\$3,945.00	\$4,056.00	\$3,726.00	\$1,135.00	\$8,817.00	\$18,524.00
9	Collman, Harry	\$8,337.00	\$4,906.00	\$9,007.00	\$2,113.00	\$13,090.00	\$13,953.00
10	Counts, Elizabeth	\$3,742.00	\$521.00	\$4,505.00	\$1,024.00	\$3,528.00	\$15,275.00
11	David, Chloe	\$7,605.00	\$3,428.00	\$3,973.00	\$1,716.00	\$4,839.00	\$13,085.00
12	Davis, William	\$5,304.00	\$1,562.00	\$2,945.00	\$1,176.00	\$9,642.00	\$13,714.00
13	Dumlao, Richard	\$9,333.00	\$2,779.00	\$7,549.00	\$1,101.00	\$5,850.00	\$15,065.00
14	Farmer, Kim	\$1,103.00	\$3,470.00	\$3,862.00	\$1,040.00	\$10,024.00	\$18,389.00
15	Ferguson, Elizabeth	\$1,333.00	\$1,913.00	\$4,596.00	\$1,126.00	\$5,503.00	\$10,686.00
16	Flores, Tia	\$12,398.00	\$2,883.00	\$2,142.00	\$2,014.00	\$13,547.00	\$21,983.00
17	Ford, Victor	\$3,251.00	\$4,931.00	\$8,283.00	\$1,054.00	\$9,543.00	\$11,967.00
18	Hodges, Melissa	\$4,624.00	\$4,798.00	\$8,420.00	\$1,389.00	\$10,468.00	\$12,677.00
19	Jameson, Robinson	\$2,552.00	\$4,459.00	\$2,248.00	\$1,058.00	\$6,267.00	\$14,982.00
20	Kellerman, Frances	\$4,281.00	\$4,172.00	\$11,074.00	\$1,282.00	\$2,365.00	\$9,380.00

Conditional formatting presets

Excel has several predefined styles—or **presets**—you can use to quickly apply conditional formatting to your data. They are grouped into three categories:

- ➔ **Data Bars** are horizontal bars added to each cell, much like a **bar graph**.



A 4x4 grid of cells illustrating the Data Bars preset. Each cell contains a numerical value and a horizontal yellow bar. The bars vary in length, representing the relative magnitude of the values. The values are as follows:

\$3,863.00	\$1,117.00	\$8,237.00	\$8,690.00
\$9,355.00	\$1,100.00	\$10,185.00	\$18,749.00
\$6,702.00	\$2,116.00	\$13,452.00	\$8,046.00
\$4,415.00	\$1,089.00	\$4,404.00	\$20,114.00

Conditional formatting presets

- **Color Scales** change the color of each cell based on its value. Each color scale uses a **two- or three-color gradient**. For example, in the **Green-Yellow-Red** color scale, the **highest** values are green, the **average** values are yellow, and the **lowest** values are red.

\$3,863.00	\$1,117.00	\$8,237.00	\$8,690.00
\$9,355.00	\$1,100.00	\$10,185.00	\$18,749.00
\$6,702.00	\$2,116.00	\$13,452.00	\$8,046.00
\$4,415.00	\$1,089.00	\$4,404.00	\$20,114.00

- **Icon Sets** add a specific icon to each cell based on its value.

▼ \$3,863.00	▼ \$1,117.00	▬ \$8,237.00	▬ \$8,690.00
▬ \$9,355.00	▼ \$1,100.00	▬ \$10,185.00	▲ \$18,749.00
▼ \$6,702.00	▼ \$2,116.00	▬ \$13,452.00	▬ \$8,046.00
▼ \$4,415.00	▼ \$1,089.00	▼ \$4,404.00	▲ \$20,114.00

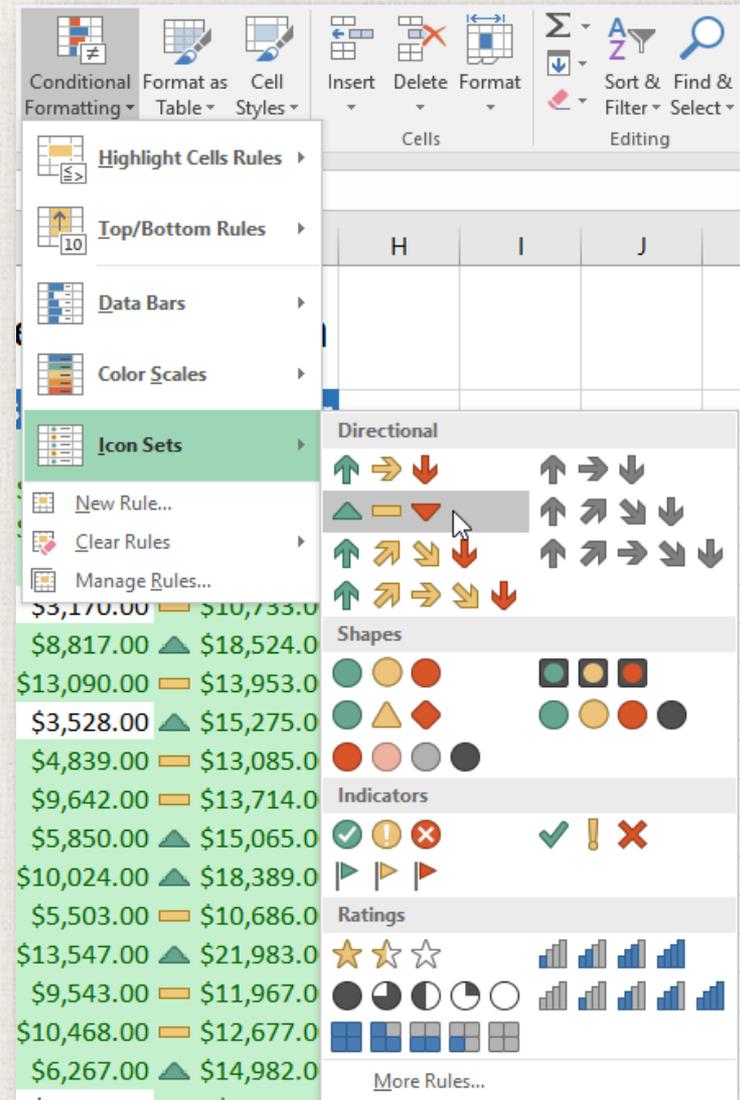
Using preset conditional formatting

1. Select the **desired cells** for the conditional formatting rule.

	A	B	C	D	E	F	G
1	 Westbrook Parker Sales Data						
2	Salesperson	May	June	July	August	September	October
3	Albertson, Kathy	\$3,799.00	\$557.00	\$3,863.00	\$1,117.00	\$8,237.00	\$8,690.00
4	Allenson, Carol	\$18,930.00	\$1,042.00	\$9,355.00	\$1,100.00	\$10,185.00	\$18,749.00
5	Altman, Zoey	\$5,725.00	\$3,072.00	\$6,702.00	\$2,116.00	\$13,452.00	\$8,046.00
6	Bittiman, William	\$1,344.00	\$3,755.00	\$4,415.00	\$1,089.00	\$4,404.00	\$20,114.00
7	Brennan, Michael	\$8,296.00	\$3,152.00	\$11,601.00	\$1,122.00	\$3,170.00	\$10,733.00
8	Carlson, David	\$3,945.00	\$4,056.00	\$3,726.00	\$1,135.00	\$8,817.00	\$18,524.00
9	Collman, Harry	\$8,337.00	\$4,906.00	\$9,007.00	\$2,113.00	\$13,090.00	\$13,953.00
10	Counts, Elizabeth	\$3,742.00	\$521.00	\$4,505.00	\$1,024.00	\$3,528.00	\$15,275.00
11	David, Chloe	\$7,605.00	\$3,428.00	\$3,973.00	\$1,716.00	\$4,839.00	\$13,085.00
12	Davis, William	\$5,304.00	\$1,562.00	\$2,945.00	\$1,176.00	\$9,642.00	\$13,714.00
13	Dumlao, Richard	\$9,333.00	\$2,779.00	\$7,549.00	\$1,101.00	\$5,850.00	\$15,065.00
14	Farmer, Kim	\$1,103.00	\$3,470.00	\$3,862.00	\$1,040.00	\$10,024.00	\$18,389.00
15	Ferguson, Elizabeth	\$1,333.00	\$1,913.00	\$4,596.00	\$1,126.00	\$5,503.00	\$10,686.00
16	Flores, Tia	\$12,398.00	\$2,883.00	\$2,142.00	\$2,014.00	\$13,547.00	\$21,983.00
17	Ford, Victor	\$3,251.00	\$4,931.00	\$8,283.00	\$1,054.00	\$9,543.00	\$11,967.00
18	Hodges, Melissa	\$4,624.00	\$4,798.00	\$8,420.00	\$1,389.00	\$10,468.00	\$12,677.00
19	Jameson, Robinson	\$2,552.00	\$4,459.00	\$2,248.00	\$1,058.00	\$6,267.00	\$14,982.00
20	Kellerman, Frances	\$4,281.00	\$4,172.00	\$11,074.00	\$1,282.00	\$2,365.00	\$9,380.00

Using preset conditional formatting

2. Click the **Conditional Formatting** command. A drop-down menu will appear.
3. Hover the mouse over the **desired preset**, then choose a **preset style** from the menu that appears.



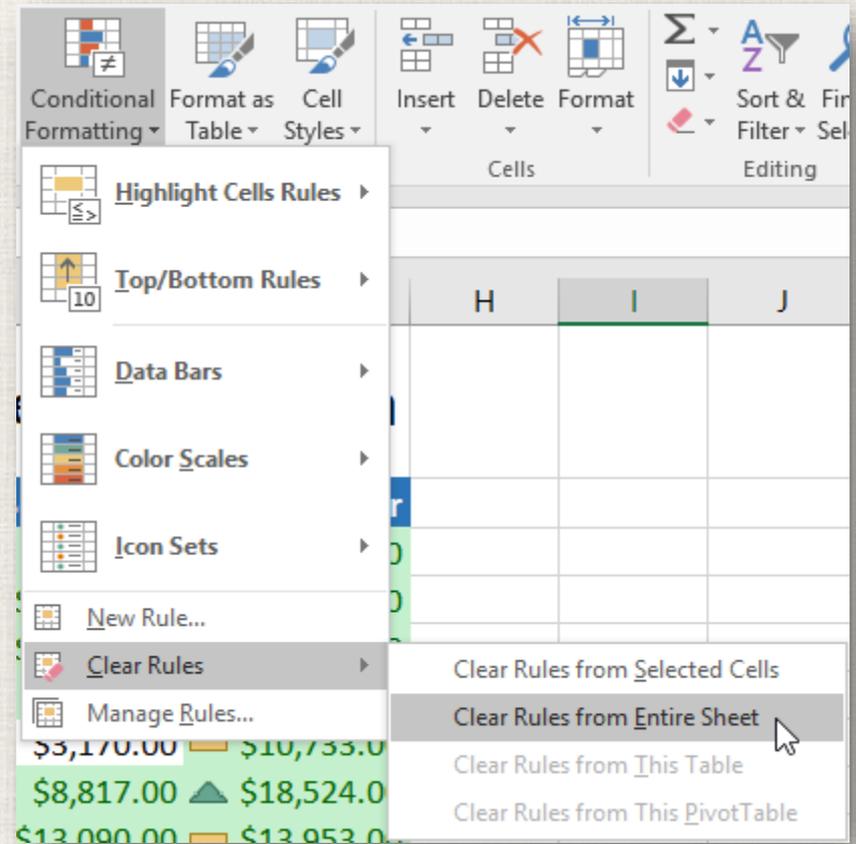
Using preset conditional formatting

4. The conditional formatting will be applied to the selected cells.

	A	B	C	D	E	F	G
1	 Westbrook Parker Sales Data						
2	Salesperson	May	June	July	August	September	October
3	Albertson, Kathy	▼ \$3,799.00	▼ \$557.00	▼ \$3,863.00	▼ \$1,117.00	▬ \$8,237.00	▬ \$8,690.00
4	Allenson, Carol	▲ \$18,930.00	▼ \$1,042.00	▬ \$9,355.00	▼ \$1,100.00	▬ \$10,185.00	▲ \$18,749.00
5	Altman, Zoey	▼ \$5,725.00	▼ \$3,072.00	▼ \$6,702.00	▼ \$2,116.00	▬ \$13,452.00	▬ \$8,046.00
6	Bittiman, William	▼ \$1,344.00	▼ \$3,755.00	▼ \$4,415.00	▼ \$1,089.00	▼ \$4,404.00	▲ \$20,114.00
7	Brennan, Michael	▬ \$8,296.00	▼ \$3,152.00	▬ \$11,601.00	▼ \$1,122.00	▼ \$3,170.00	▬ \$10,733.00
8	Carlson, David	▼ \$3,945.00	▼ \$4,056.00	▼ \$3,726.00	▼ \$1,135.00	▬ \$8,817.00	▲ \$18,524.00
9	Collman, Harry	▬ \$8,337.00	▼ \$4,906.00	▬ \$9,007.00	▼ \$2,113.00	▬ \$13,090.00	▬ \$13,953.00
10	Counts, Elizabeth	▼ \$3,742.00	▼ \$521.00	▼ \$4,505.00	▼ \$1,024.00	▼ \$3,528.00	▲ \$15,275.00
11	David, Chloe	▬ \$7,605.00	▼ \$3,428.00	▼ \$3,973.00	▼ \$1,716.00	▼ \$4,839.00	▬ \$13,085.00
12	Davis, William	▼ \$5,304.00	▼ \$1,562.00	▼ \$2,945.00	▼ \$1,176.00	▬ \$9,642.00	▬ \$13,714.00
13	Dumlao, Richard	▬ \$9,333.00	▼ \$2,779.00	▼ \$7,549.00	▼ \$1,101.00	▼ \$5,850.00	▲ \$15,065.00
14	Farmer, Kim	▼ \$1,103.00	▼ \$3,470.00	▼ \$3,862.00	▼ \$1,040.00	▬ \$10,024.00	▲ \$18,389.00
15	Ferguson, Elizabeth	▼ \$1,333.00	▼ \$1,913.00	▼ \$4,596.00	▼ \$1,126.00	▼ \$5,503.00	▬ \$10,686.00
16	Flores, Tia	▬ \$12,398.00	▼ \$2,883.00	▼ \$2,142.00	▼ \$2,014.00	▬ \$13,547.00	▲ \$21,983.00
17	Ford, Victor	▼ \$3,251.00	▼ \$4,931.00	▬ \$8,283.00	▼ \$1,054.00	▬ \$9,543.00	▬ \$11,967.00
18	Hodges, Melissa	▼ \$4,624.00	▼ \$4,798.00	▬ \$8,420.00	▼ \$1,389.00	▬ \$10,468.00	▬ \$12,677.00
19	Jameson, Robinson	▼ \$2,552.00	▼ \$4,459.00	▼ \$2,248.00	▼ \$1,058.00	▼ \$6,267.00	▲ \$14,982.00
20	Kellerman, Frances	▼ \$4,281.00	▼ \$4,172.00	▬ \$11,074.00	▼ \$1,282.00	▼ \$2,365.00	▬ \$9,380.00

Removing conditional formatting

1. Click the **Conditional Formatting** command. A drop-down menu will appear.
2. Hover the mouse over **Clear Rules**, and choose which rules you want to clear. In our example, we'll select **Clear Rules from Entire Sheet** to remove all conditional formatting from the worksheet.



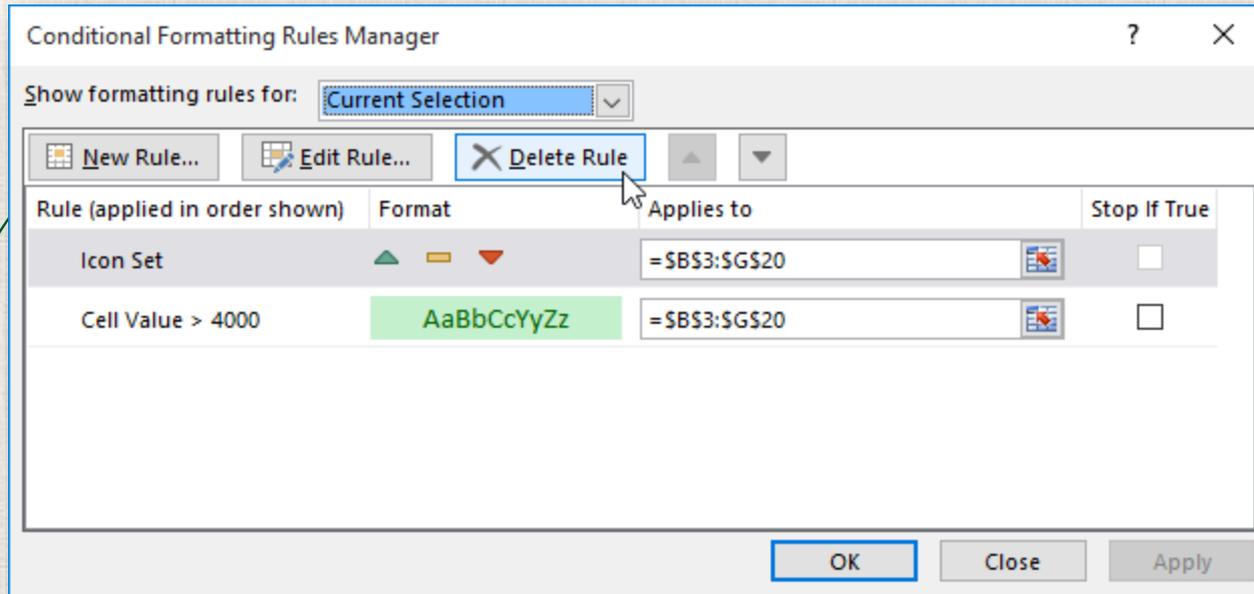
Removing conditional formatting

3. The conditional formatting will be removed.

	A	B	C	D	E	F	G
1			Westbrook Parker Sales Data				
2	Salesperson	May	June	July	August	September	October
3	Albertson, Kathy	\$3,799.00	\$557.00	\$3,863.00	\$1,117.00	\$8,237.00	\$8,690.00
4	Allenson, Carol	\$18,930.00	\$1,042.00	\$9,355.00	\$1,100.00	\$10,185.00	\$18,749.00
5	Altman, Zoey	\$5,725.00	\$3,072.00	\$6,702.00	\$2,116.00	\$13,452.00	\$8,046.00
6	Bittiman, William	\$1,344.00	\$3,755.00	\$4,415.00	\$1,089.00	\$4,404.00	\$20,114.00
7	Brennan, Michael	\$8,296.00	\$3,152.00	\$11,601.00	\$1,122.00	\$3,170.00	\$10,733.00
8	Carlson, David	\$3,945.00	\$4,056.00	\$3,726.00	\$1,135.00	\$8,817.00	\$18,524.00
9	Collman, Harry	\$8,337.00	\$4,906.00	\$9,007.00	\$2,113.00	\$13,090.00	\$13,953.00
10	Counts, Elizabeth	\$3,742.00	\$521.00	\$4,505.00	\$1,024.00	\$3,528.00	\$15,275.00
11	David, Chloe	\$7,605.00	\$3,428.00	\$3,973.00	\$1,716.00	\$4,839.00	\$13,085.00
12	Davis, William	\$5,304.00	\$1,562.00	\$2,945.00	\$1,176.00	\$9,642.00	\$13,714.00
13	Dumlao, Richard	\$9,333.00	\$2,779.00	\$7,549.00	\$1,101.00	\$5,850.00	\$15,065.00
14	Farmer, Kim	\$1,103.00	\$3,470.00	\$3,862.00	\$1,040.00	\$10,024.00	\$18,389.00
15	Ferguson, Elizabeth	\$1,333.00	\$1,913.00	\$4,596.00	\$1,126.00	\$5,503.00	\$10,686.00
16	Flores, Tia	\$12,398.00	\$2,883.00	\$2,142.00	\$2,014.00	\$13,547.00	\$21,983.00
17	Ford, Victor	\$3,251.00	\$4,931.00	\$8,283.00	\$1,054.00	\$9,543.00	\$11,967.00
18	Hodges, Melissa	\$4,624.00	\$4,798.00	\$8,420.00	\$1,389.00	\$10,468.00	\$12,677.00
19	Jameson, Robinson	\$2,552.00	\$4,459.00	\$2,248.00	\$1,058.00	\$6,267.00	\$14,982.00
20	Kellerman, Frances	\$4,281.00	\$4,172.00	\$11,074.00	\$1,282.00	\$2,365.00	\$9,380.00

Removing conditional formatting

- ➔ Click **Manage Rules** to edit or delete **individual** rules. This is especially useful if you've applied **multiple rules** to a worksheet.



Practice

- Open our **practice workbook**.
- Click the **Grades** worksheet tab in the bottom-left of the workbook.
- Select cells **B3:J17**.
- Let's say you're the teacher and want to easily see all of the grades that are below passing. Apply **Conditional Formatting** so it **Highlights Cells** containing values **Less Than 70** with a **light red fill**.
- Now you want to see how the grades compare to each other. Under the **Conditional Formatting** tab, select the **Icon Set** called **3 Symbols (Circled)**. **Hint:** The names of the icon sets will appear when you hover over them.
- Using the Manage Rules feature, remove the **light red fill**, but keep the **icon set**.

Solution

First Quarter Grades													
Student Name	Unit 1 Quiz 1	Unit 1 Test	Unit 2 Quiz 1	Unit 2 Quiz 2	Unit 2 Test	Unit 3 Quiz 1	Unit 3 Test	1st Quarter Project	Midterm				
Jackson Love	70	75	88	90	72	69	75	93	85				
Priya Patel	97	100	92	95	96	68	95	92	93				
Sharia Clemmons	95	97	45	79	83	95	94	100	92				
Ming Lu	91	93	89	95	97	84	85	88	99				
Sadie Carter	86	84	93	89	94	77	88	87	86				
Jensen Howard	54	70	87	72	85	65	74	94	70				
Tyriq Hilton	77	85	76	90	68	72	78	94	87				
Maria Saldana	100	96	93	87	88	87	92	95	95				
Kyle Jacobs	90	89	91	93	94	88	95	88	95				
John Feinstein	89	67	84	87	85	80	90	93	95				
Carter Zhou	75	68	82	83	85	84	66	50	68				
Jose Marco Hernandez	93	87	86	91	93	95	82	99	85				
Betsy Michaels	90	95	80	73	76	71	88	85	77				
Dexter Cooper	62	71	76	84	80	85	87	93	68				
Quanisha Johnson	100	98	86	89	93	95	96	97	92				



THE END

THE END