# Conditional Formatting

8.1 Conditional formatting

In Excel, conditional formatting allows you to highlight cells with a specific colour based on their value. We can put conditions on the cell's content and format the data based on the given conditions. Conditions can be less than, greater than, duplicate values, unique values, etc. This feature is very helpful in the analysis purpose.

To access the conditional formatting, go to Home > Style > Conditional Formatting. When you click on the drop-down icon after the Conditional formatting there will be some predefined formatting for highlighting, data bars, colour scales, icon sets, etc.
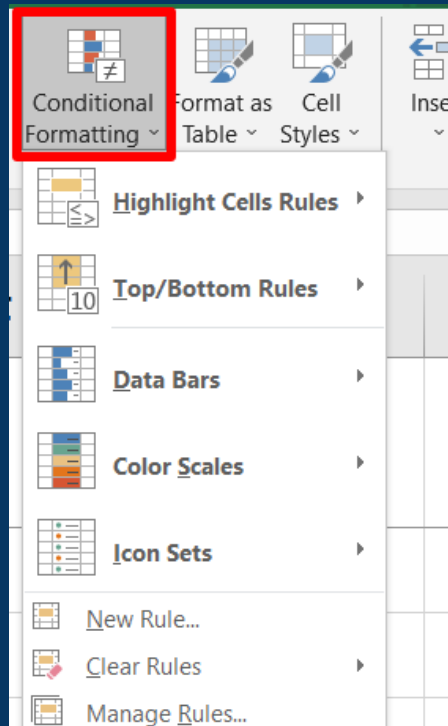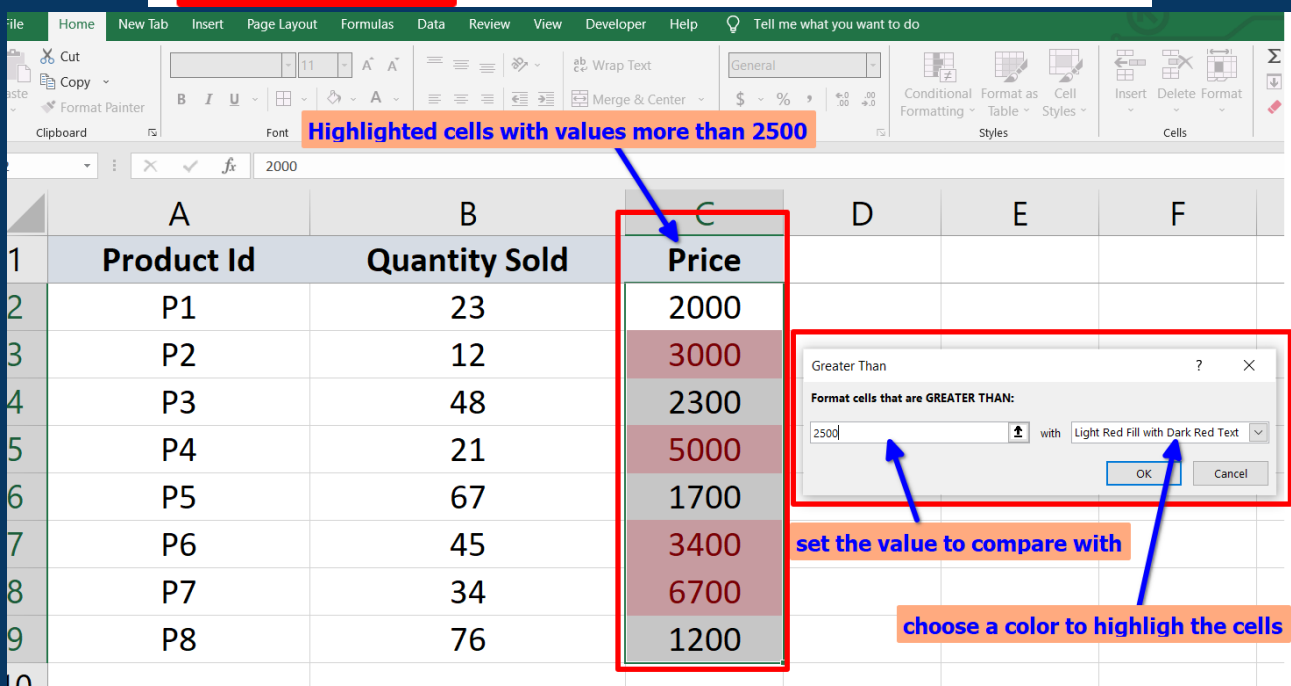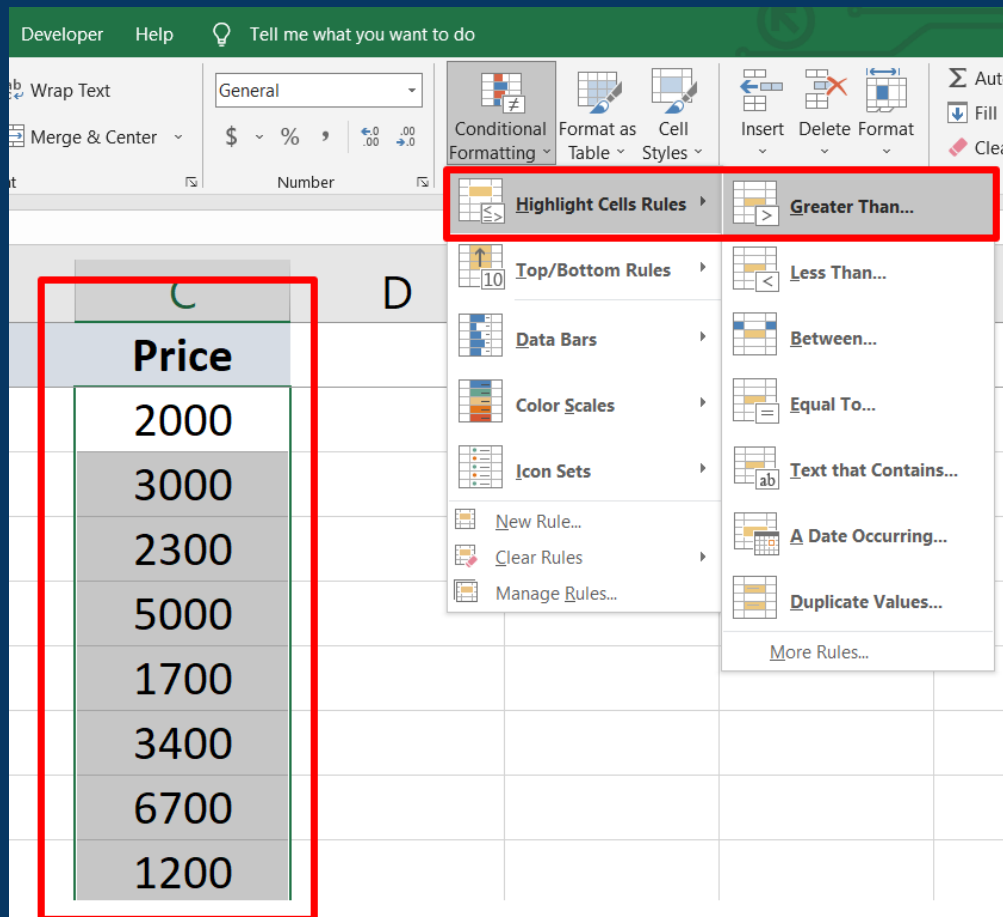

- ## Highlight Cells Rules:
    This rule applies colour formatting to cells that fulfill specified criteria that you specify or choose from a list of predefined rules. When you select a rule, a dialogue box will appear, allowing you to set the numbers to compare against as well as choose any colour you want.

    Suppose there is the table that we have and we have to highlight the cells based on some predefined rules.

    1 - Highlighting cells of the price column with values more than 2500.

2 - Highlighting cells of quantity sold column with values less than 40.

3 - Highlighting cells with duplicate values.
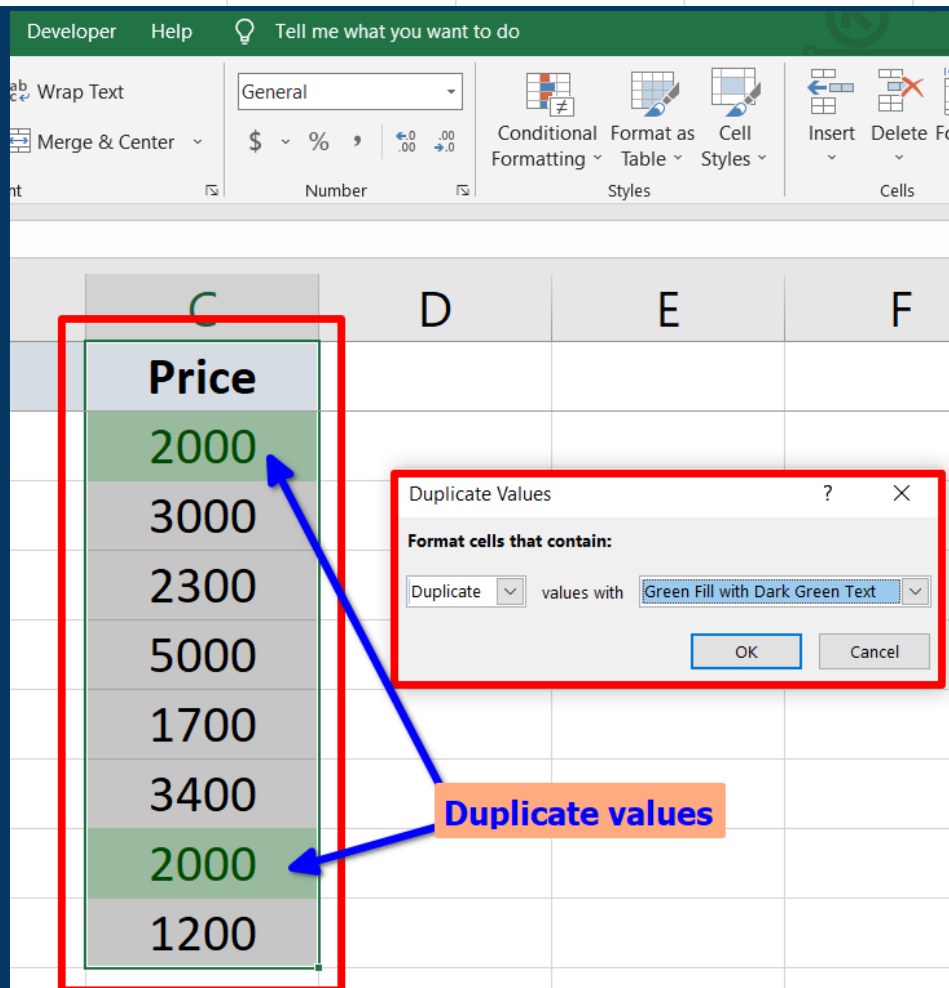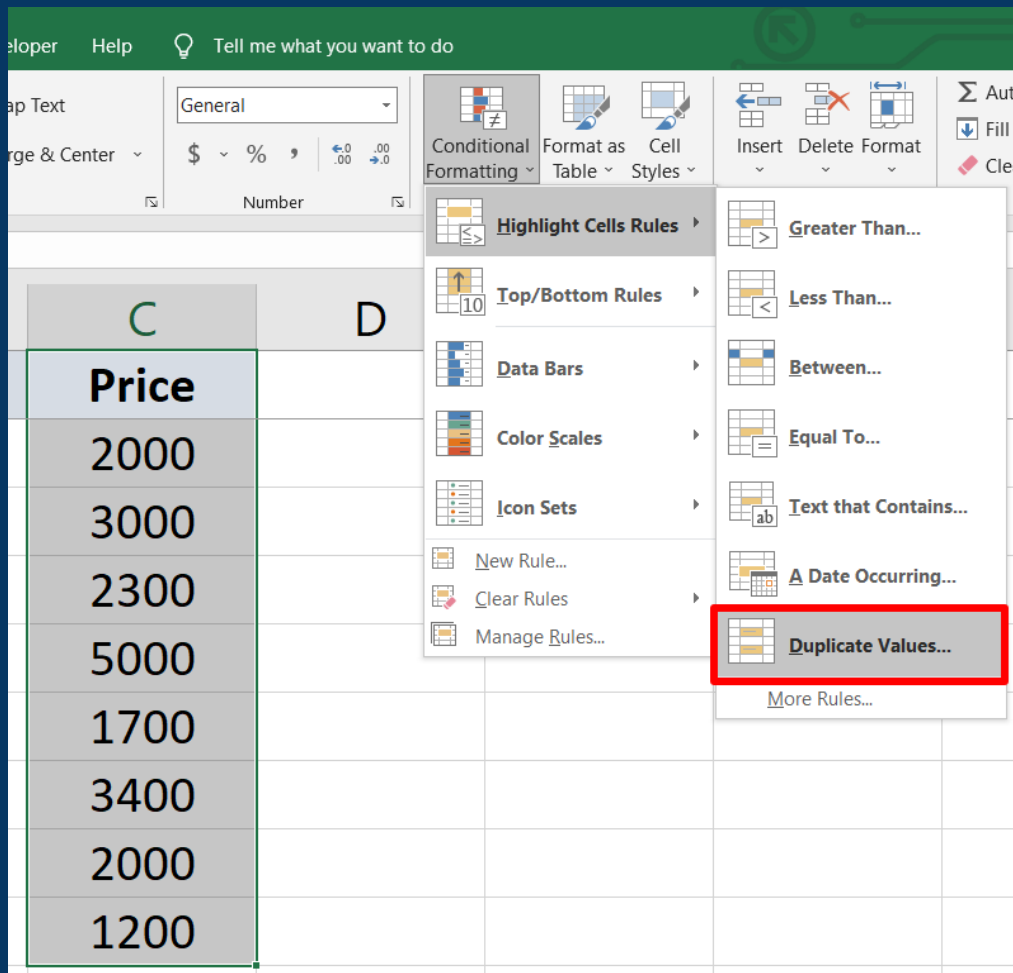
Similarly, you can use other rules for highlighting cells.
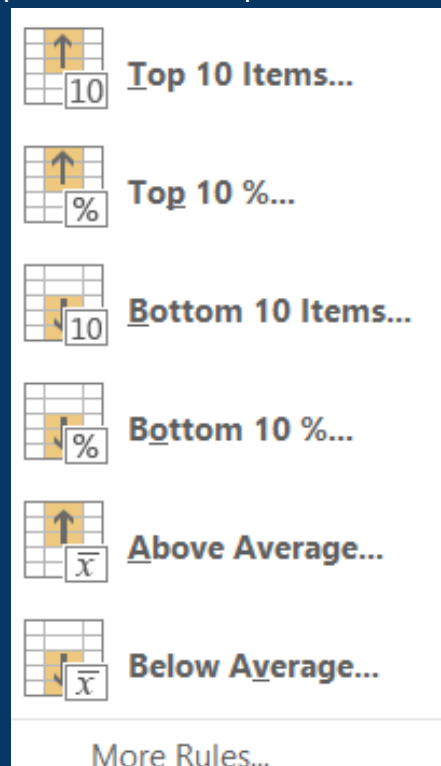
- ## **Top/Bottom Rules:**

  This option is used when you want to highlight the cells that come under the top or bottom 10%. Similarly, you can find the values that come below or average.
  Below are some rules present in the Top/Bottom rules:

  Suppose I want to see the top 3 products having the highest prices. Then you can select the top 10 items from the rules and from the dialog box you can decrease the number of items from 10 to 3.
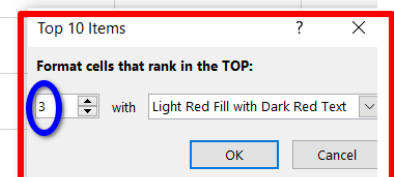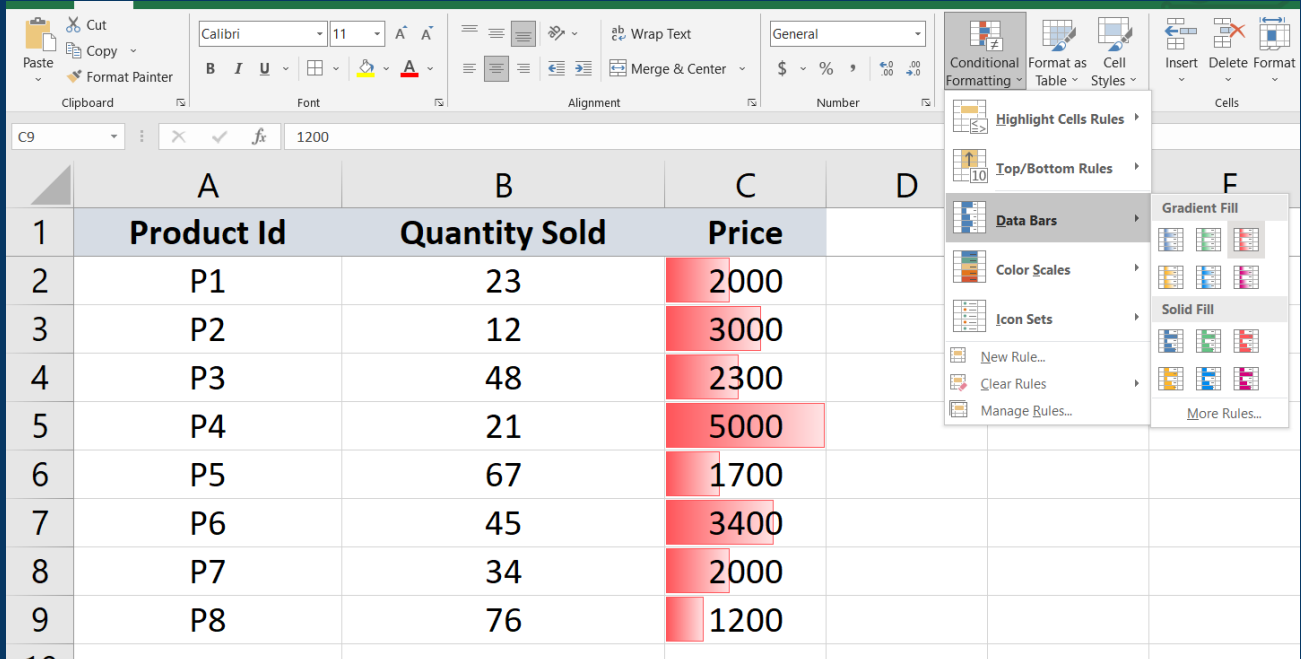

  P2, P4, and P6 are the top 3 products having the highest price. Similarly, you can find the top 5 products whose prices are the lowest and also try other options as well.

- ## **Data Bars:**
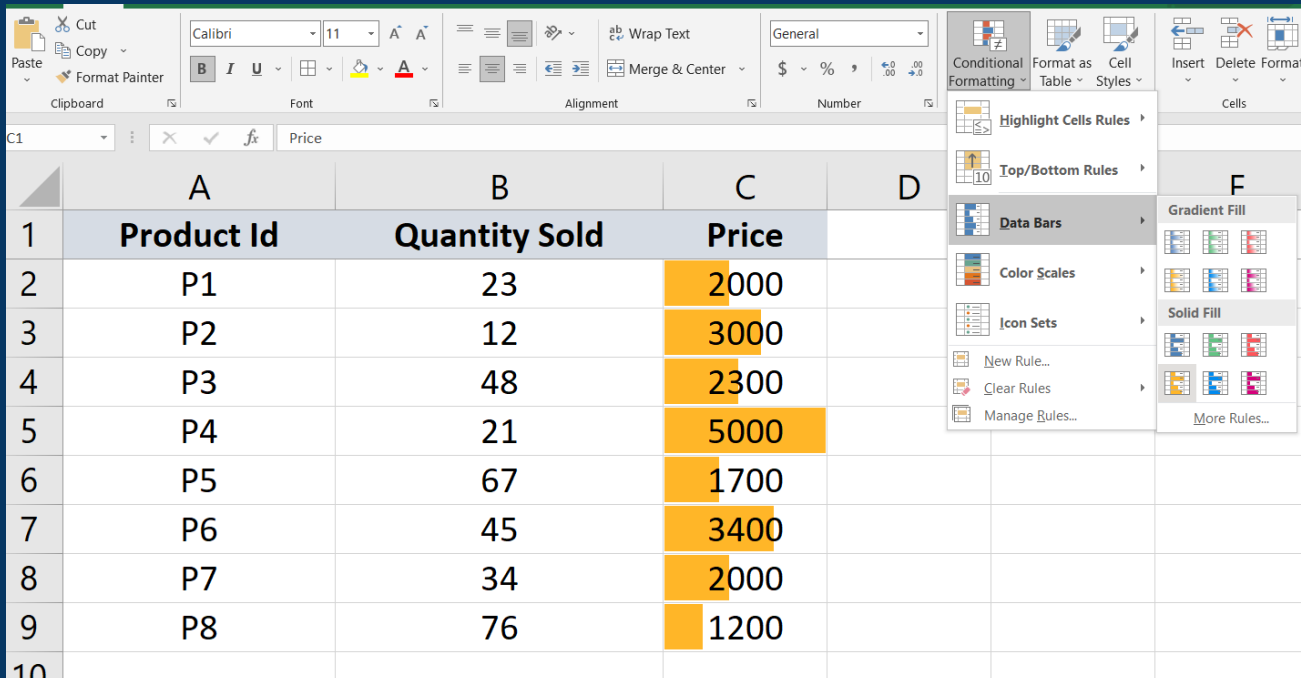
In Excel, data bars are used to visualize a range of cells. A higher value is represented by a longer bar. There are two ways to fill color: solid fill and gradient fill.

Gradient fill:

Solid fill:

- ## Color scales
  Color scales alter the colour of each cell in proportion to its value. A two- or three-color gradient is used in each colour scale. The greatest values are green, the average values are yellow, and the lowest values are red in the Green-Yellow-Red colour scale.

	A	B	C
	Product Id	**Quantity Sold**	**Price**
	P1	23	2000
	P2	12	3000
	P3	48	2300
	P4	21	5000
	P5	67	1700
	P6	45	3400
	P7	34	2000
	P8	76	1200

- ## Icon sets

  Icon sets assign each cell a specific icon based on its value.

If you want to apply formatting that is not present in the predefined rules then you can create your own rule from the New Rule option available in the conditional formatting.
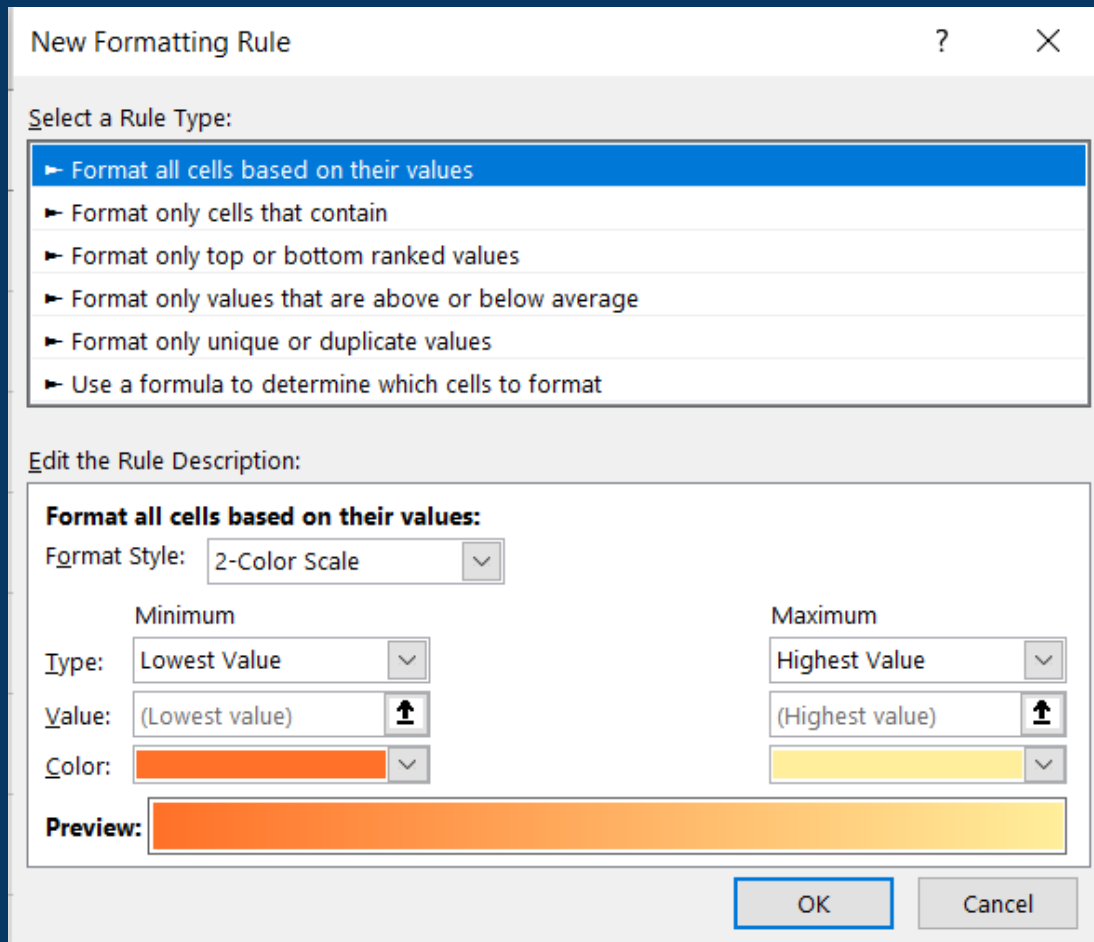
8.2 Clearing conditional formatting

Unless you delete conditional formatting explicitly, it stays in place once it's been applied. We can clear the formatting we have applied from the conditional formatting.

To get rid of conditional formatting, do the following:

- Select the cells from which conditional formatting should be removed.
- Go to Conditional formatting > Clear Rules > Clear Rules from Selected Sheets.
- Select Clear Rules from Entire Sheet to remove conditional formatting from the entire worksheet.

8.3 Using table and styles

Table Style

Applying a predefined table style to your worksheet data allows you to format it quickly. When you use a predefined table design, however, an Excel table for the given data is immediately constructed. You can convert a table back to a regular range if you don't want to work with your data in a table but want to maintain the table-style formatting. To apply the table styles, click on the drop down icon after the Format as Table in styles group under the Home tab. You will see three options for styles to select from: Light, Medium and Dark.

There are other options also one to create a new table style and the other one to create a new pivot table style.
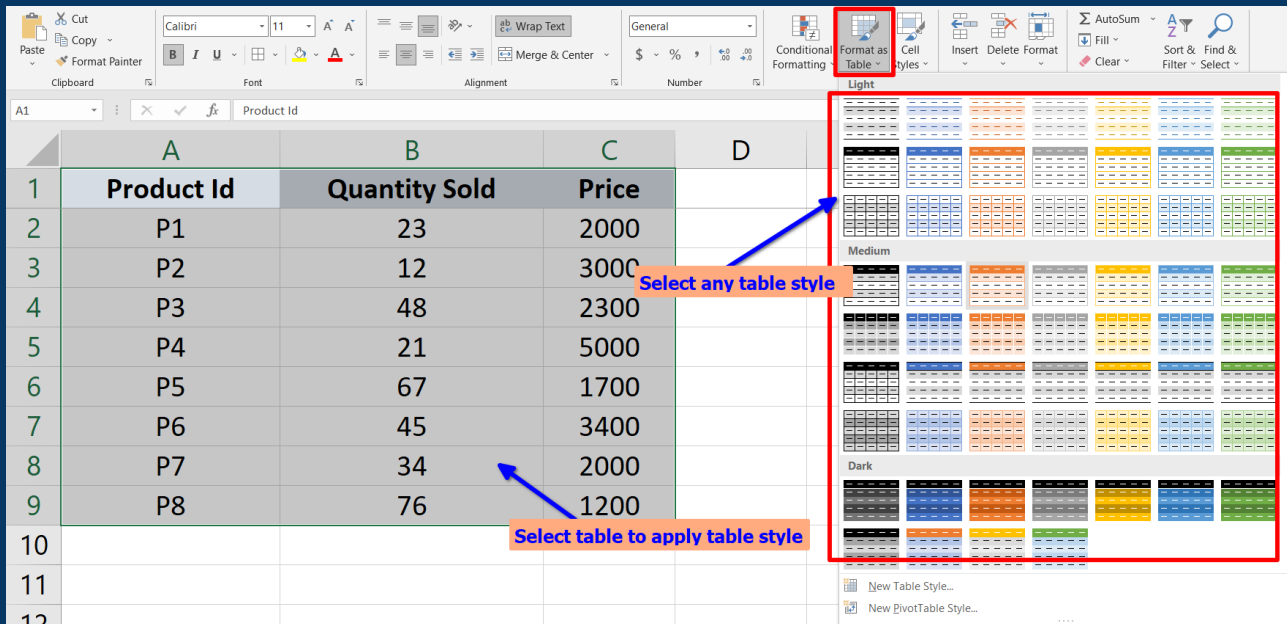
When you click on any style, the below dialog box will appear in which you have to mention the table range that means the first cell of the table and the last cell of the table separated by ":".
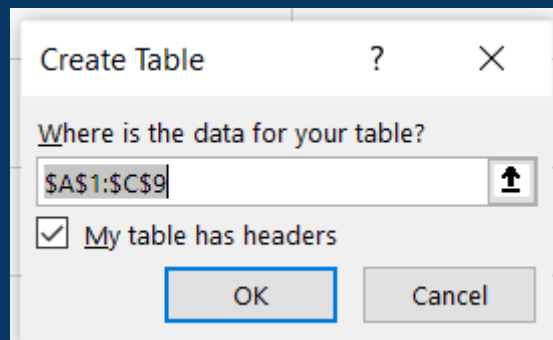
When you click Ok, the table style selected will get applied on the table range you have given.

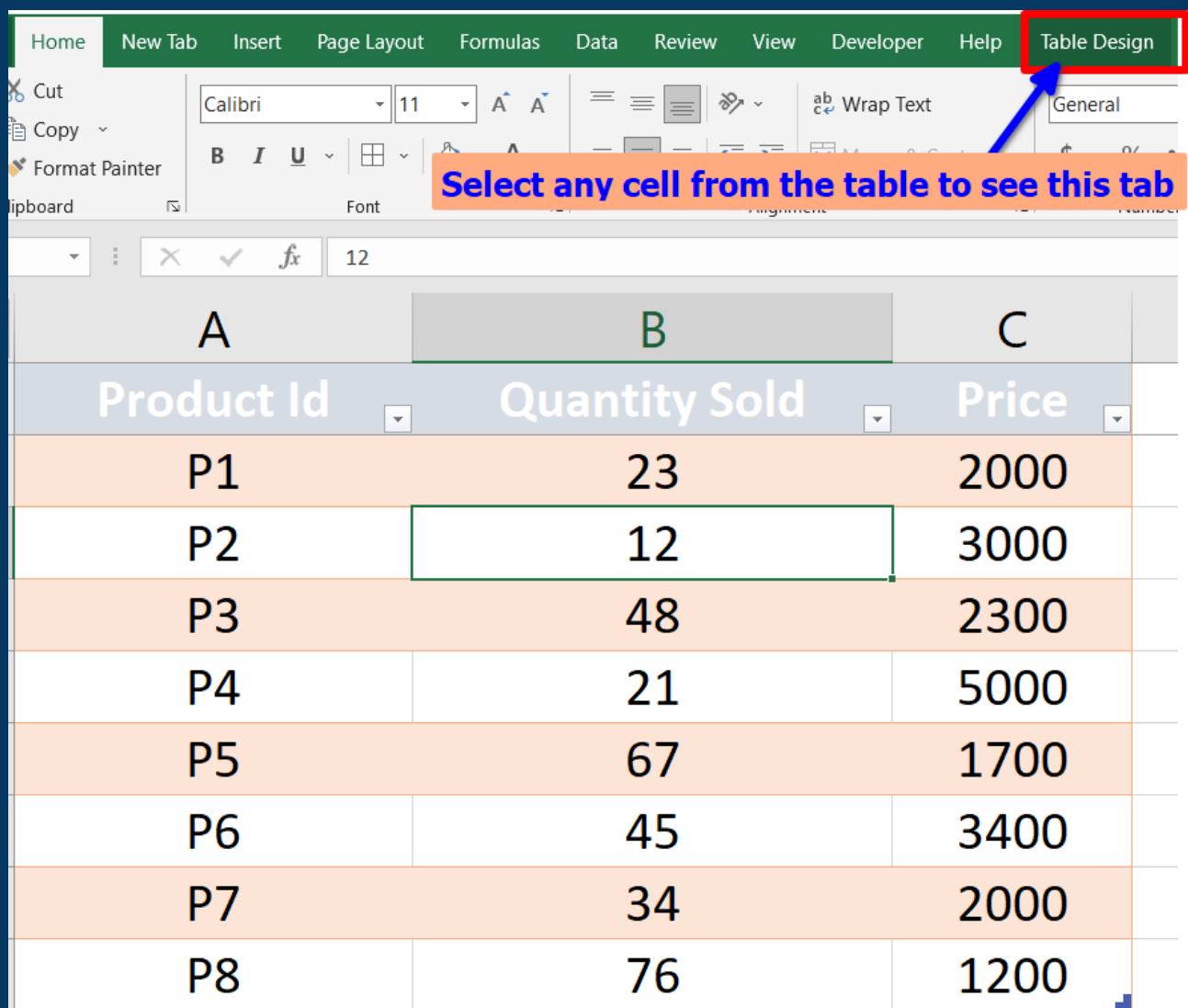| A	B	C
Product Id	Quantity Sold	Price
P1	23	2000
P2	12	3000
P3	48	2300
P4	21	5000
P5	67	1700
P6	45	3400
P7	34	2000
P8	76	1200

After converting the range of cells to an excel table, you can also modify the table whenever you want. To modify the table, you can simply click on any cell in the table and you will see a new tab "Table Design" on the ribbon. The Table Design tab has all the groups and commands that will help you make changes in the table.

Select any cell from the table to see this tab

A	B	C
Product Id	Quantity Sold	Price
P1	23	2000
P2	12	3000
P3	48	2300
P4	21	5000
P5	67	1700
P6	45	3400
P7	34	2000
P8	76	1200

Table design tab:
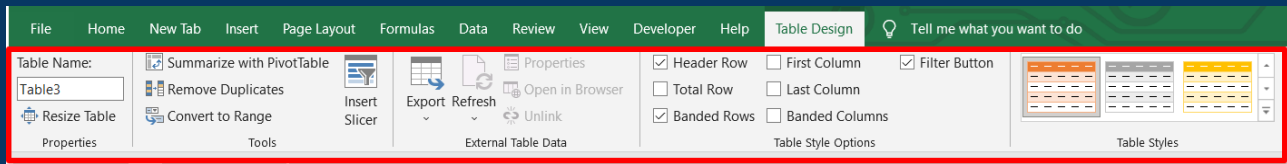
Properties: From this group you can set the name for your table and also resize the table if you have new columns or rows.

Tools: In this group, there are commands to remove the duplicates, convert to range, summarize with pivot table and also to insert slicer. Summarize with PivotTable will allow you to create a pivot table based on the table. You can select what will be your column, rows and values for the pivot table.

External Table Data: Using this group, you can export any external table and save in the excel to modify it and apply various features of the excel.

Table Style Options: This group contains different checkboxes to add different styles to your table.

Table Style: This group allows you to change the table style.

Cell Style

A cell style is a collection of several styles or properties that we can use in Excel cells. Instead of employing several formatting styles independently, we should use a single style to implement a variety of formats at the same time. A cell style is a quick and easy technique to adjust the sheet's appearance.

A cell style can combine preferences for the following six attributes:
- Fonts
- Number Format
- Patterns
- Borders
- Alignment
- Protection

The various formats can be combined into a single cell style. For example, we can design a style that contains font colour, cell backdrop colour, italic font style, cell border, and number format settings. When we need to employ a mixture of formatting, we may easily apply them all by picking the style we developed rather than applying each format individually. It allows us to swiftly apply numerous formats with a few clicks and gives consistency to the worksheet's overall appearance.

If you want to use cell styles:
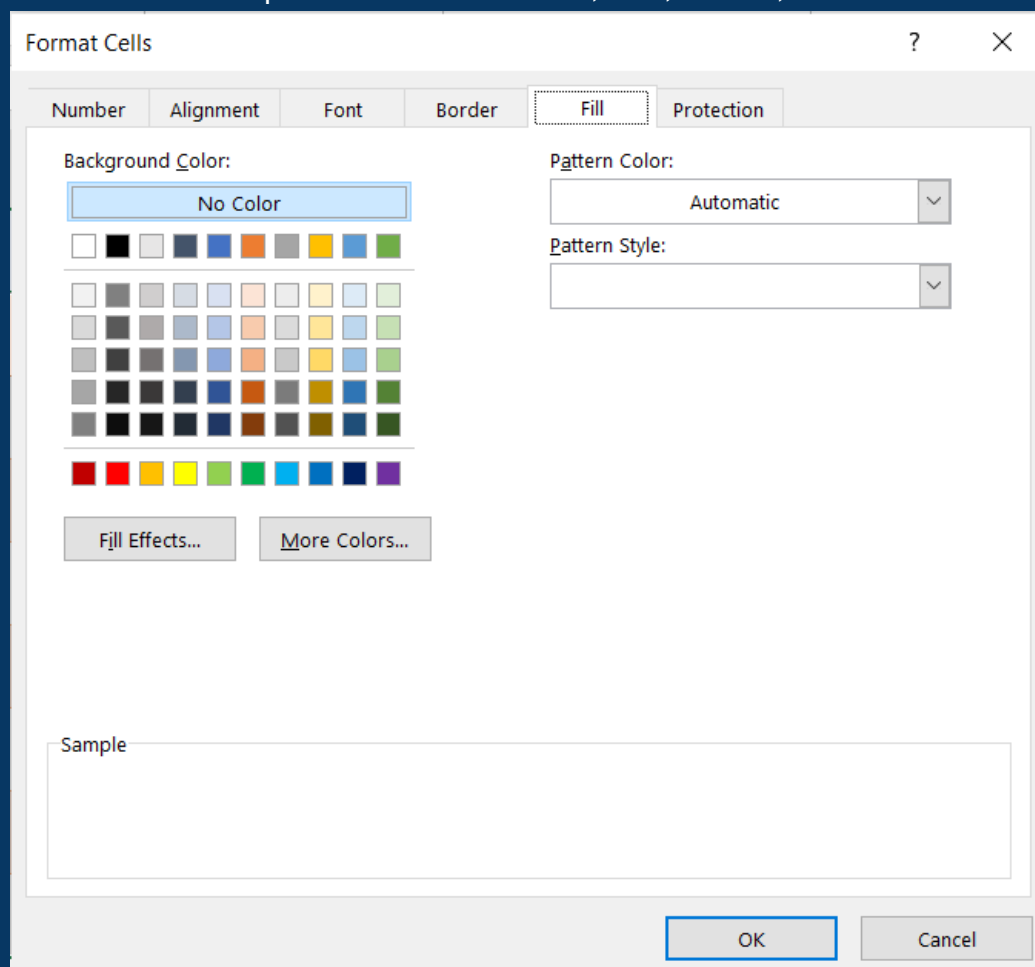
1. Go to Home > Styles > Cell Styles.
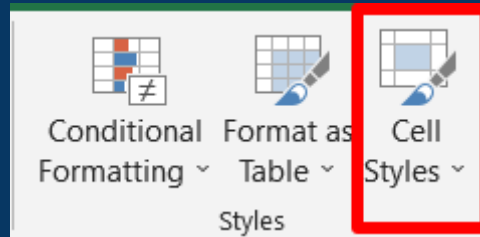
2. Click on the drop down icon to see the various predefined styles.
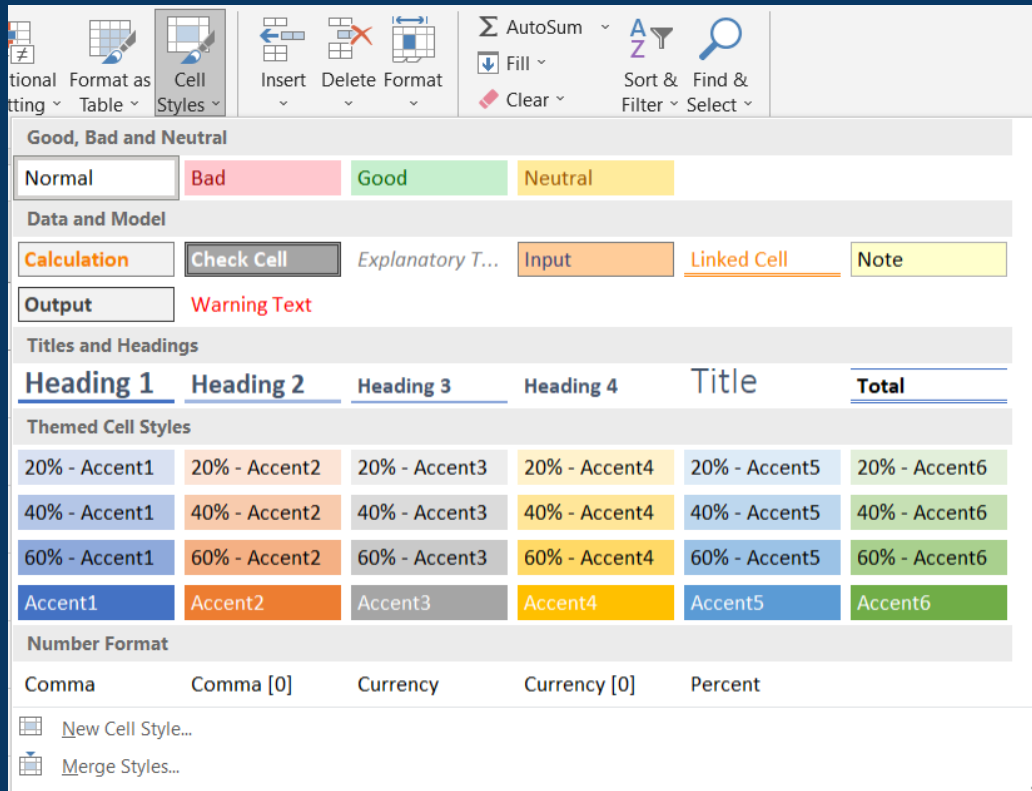
3. Select any style you want.
4. You can also create your custom cell style with the option New cell style. Excel displays the existing applied style settings in the next panel. At the top of the window, next to the 'Style name,' we can give our style a name. After we've given our custom style a name, we'll need to define formatting preferences by clicking the 'Format' option.
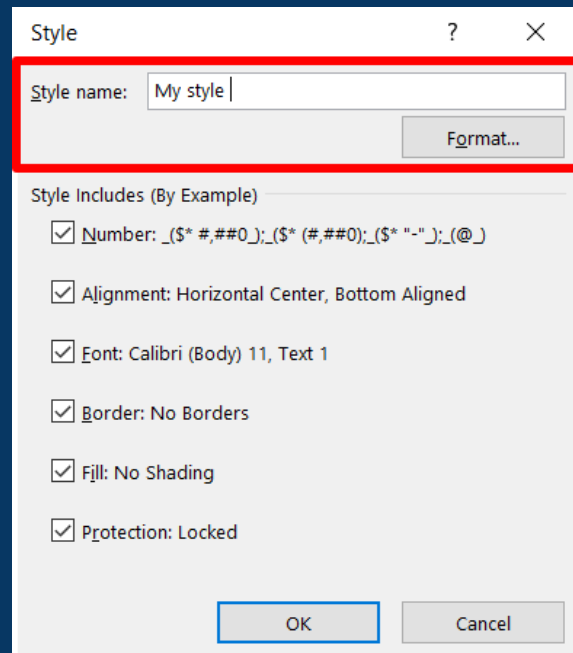
The Format Cells dialogue box appears after clicking the Format button in the Style window. We must go through all of the tabs in the Format Cells dialogue box and select the desired options such as number, font, border, and so on.

After selecting the desired options from the various sections, we must click the OK button. It will take us back to the Style window once more. We can access the custom style by heading to Home > Cell Styles > Custom after we've created it.

5. Merge styles option is used when we want to use the custom cell style in another workbook. The custom cell style we generate is only saved in the workbook in which

it was created. As a result, we must merge cell styles in order to apply the same style across several workbooks, as the applied style is normally copied from one workbook to the next.

If we want to remove or clear the cell styles then we can do so by clicking on the Cell Styles under the styles group of the Home tab and select Normal.