How can I overlay two histograms in Excel?

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To overlay two histograms in Excel, follow these steps:
1. Select the data for both histograms and click on the "Insert" tab.
2. Click on the "Column" chart option and select the first histogram.
3. Right-click on the chart and click on "Select Data."
4. Click on "Add" under the "Legend Entries (Series)" section.
5. In the "Series name" field, enter a name for the second histogram.
6. In the "Series values" field, select the data for the second histogram.
7. Click on "OK" to add the second histogram to the chart.
8. To overlay the histograms, right-click on the second histogram and select "Change Series Chart Type."
9. Choose the "Clustered Column" option and click on "OK."
10. The two histograms will now be overlaid on the same chart. You can adjust the formatting and labels as needed.

Overlay Two Histograms in Excel

A histogram is a plot that can be used to quickly visualize the distribution of values in a dataset.

This tutorial provides a step-by-step example of how to overlay two histograms in a single plot in Excel.

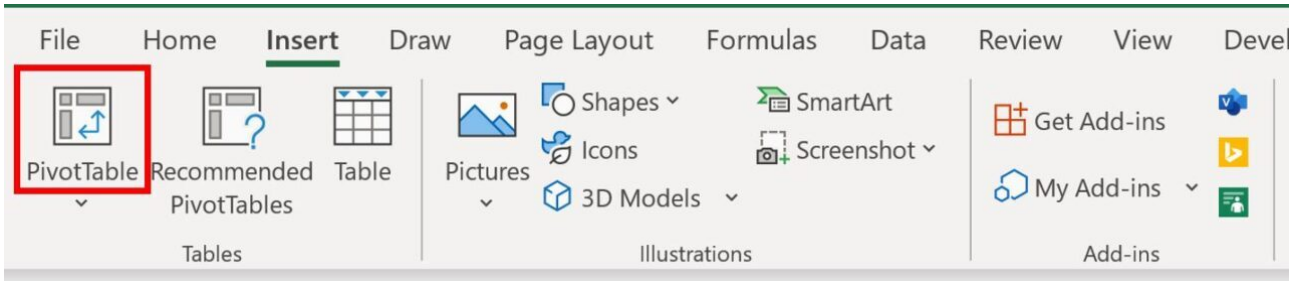
Step 1: Enter the Data

First, let's enter the following data that shows the gender and exam scores for 20 students in a class:

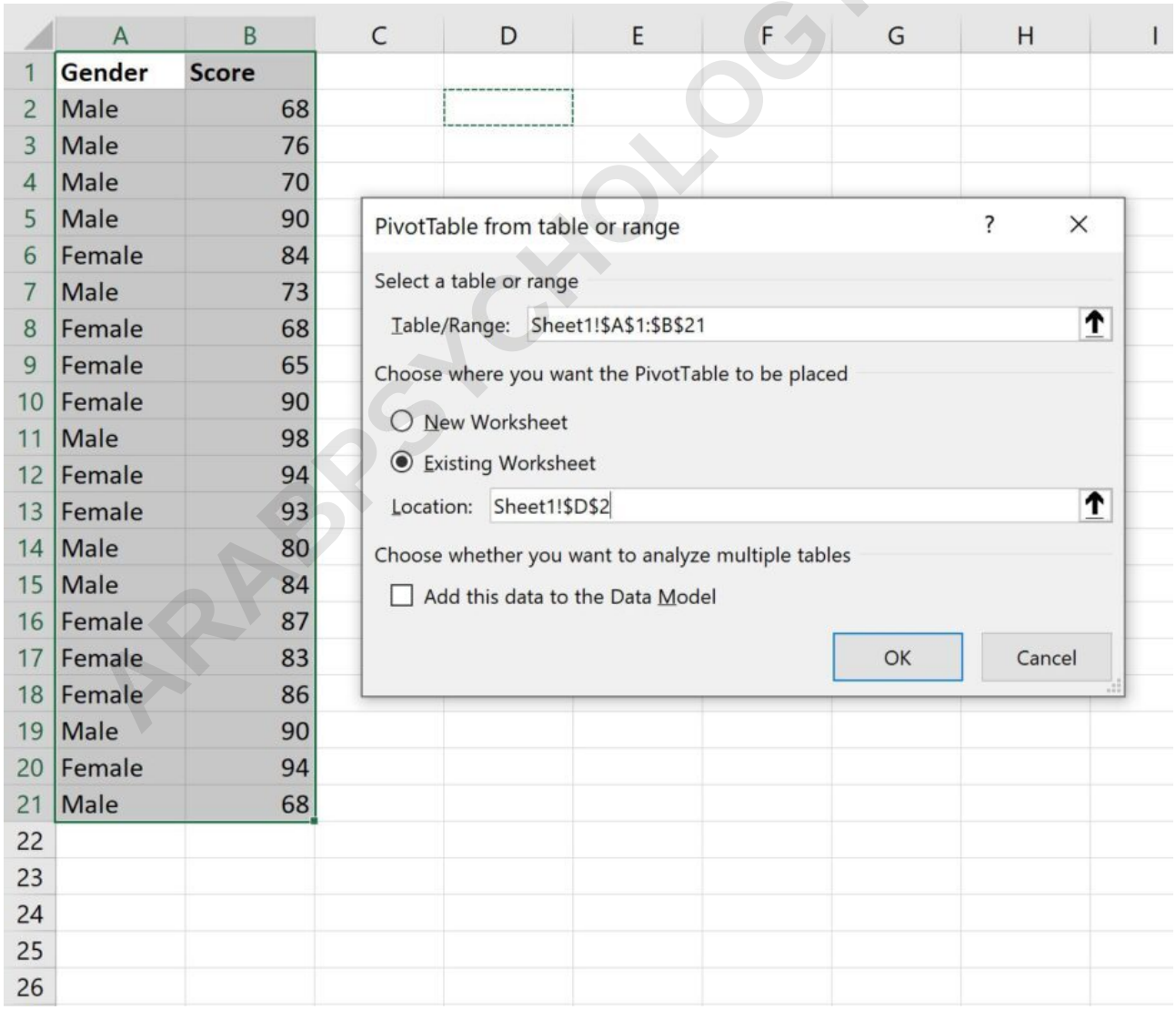
	A	B	C	D	E	F
1	**Gender**	**Score**				
2	Male	68				
3	Male	76				
4	Male	70				
5	Male	90				
6	Female	84				
7	Male	73				
8	Female	68				
9	Female	65				
10	Female	90				
11	Male	98				
12	Female	94				
13	Female	93				
14	Male	80				
15	Male	84				
16	Female	87				
17	Female	83				
18	Female	86				
19	Male	90				
20	Female	94				
21	Male	68				
22						
23						
24						

Step 2: Create Pivot Table

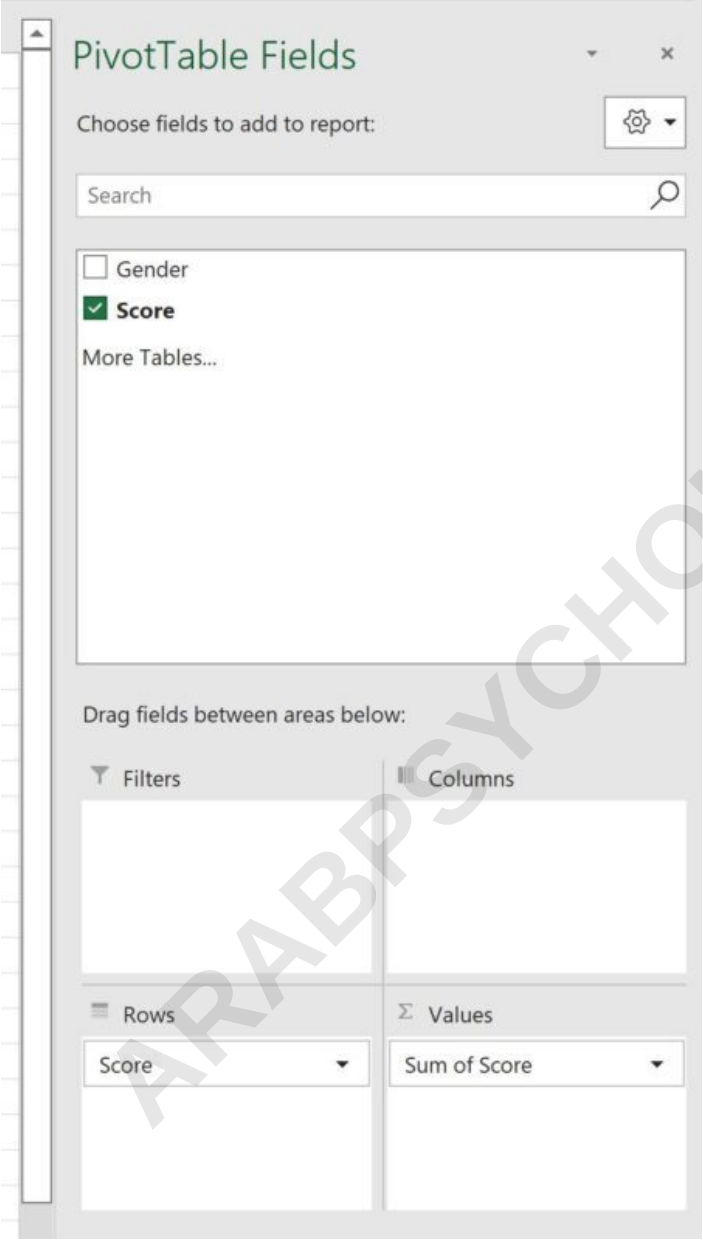
Next, highlight the cells in the range A1:C21, then click the Insert tab along the top ribbon, then click the icon called PivotTable:



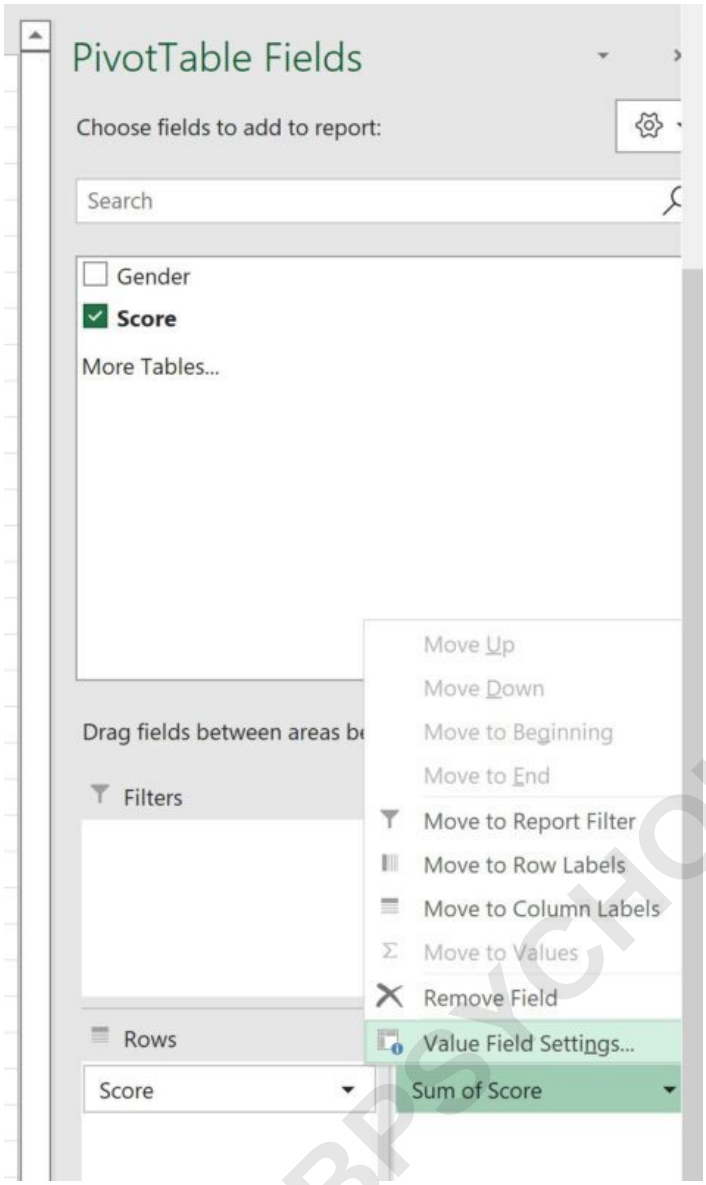
In the window that appears, type the following information and then click OK:



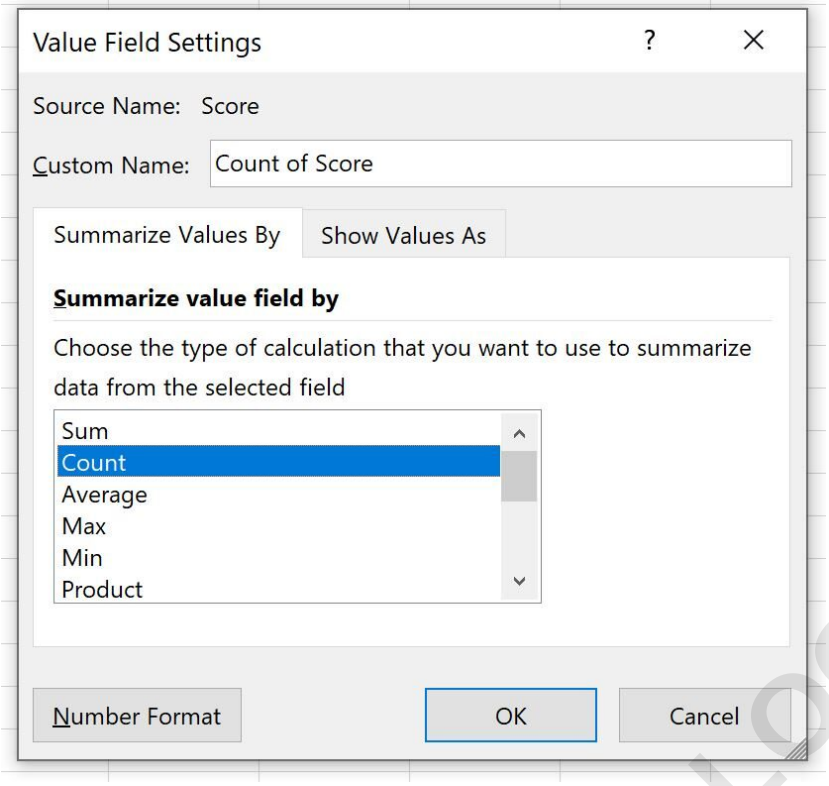
In the PivotTable Fields panel that appears on the right side of the screen, drag the Score variable to both the Rows and Values boxes:



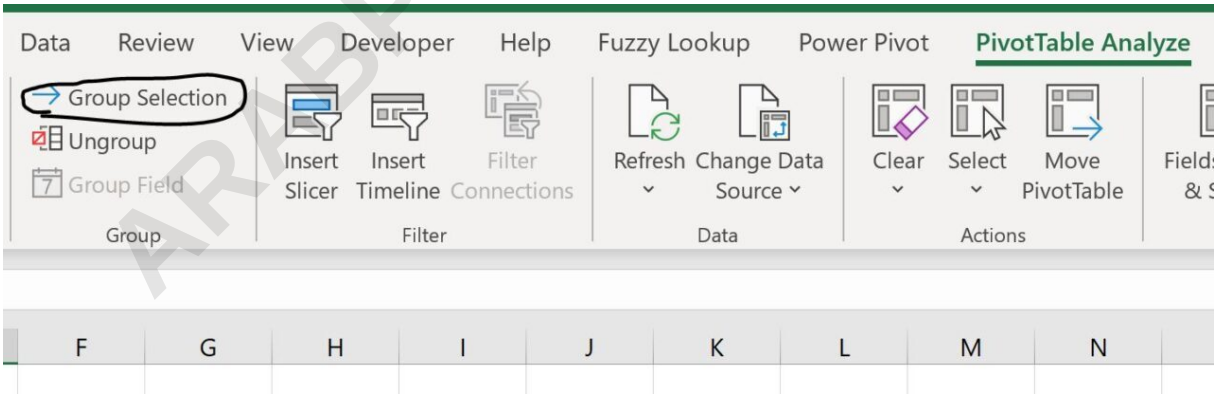
Next, click the Sum of Score dropdown arrow and then click Value Field Settings:



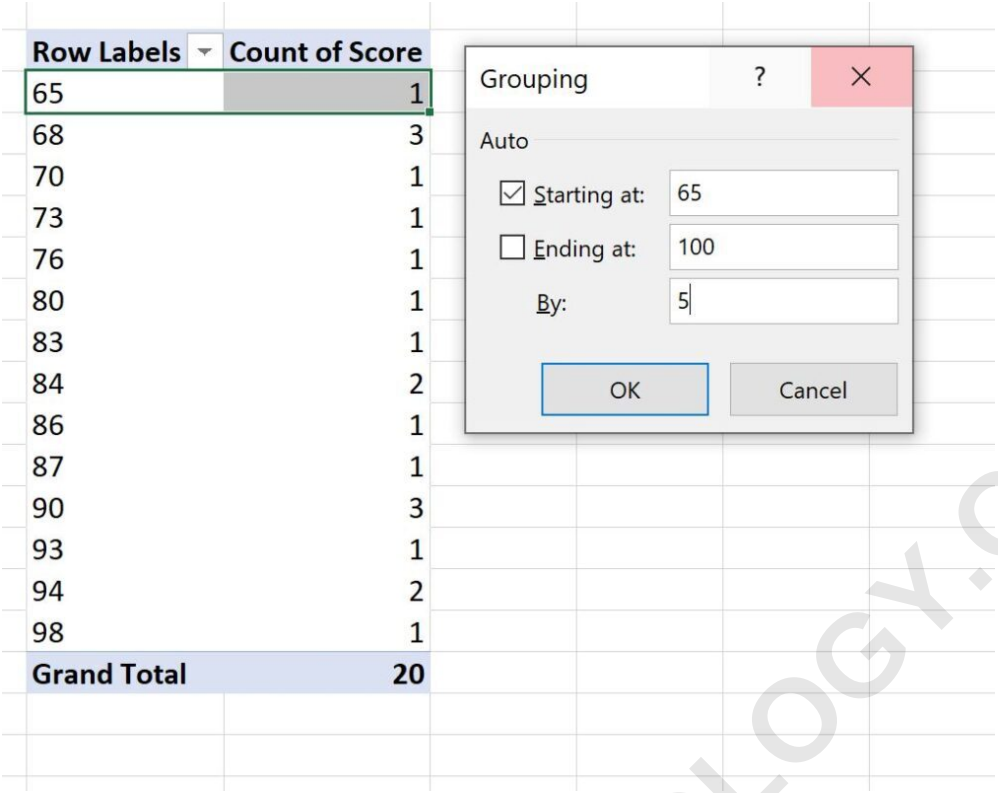
In the new window that appears, click Count and then click OK:



Next, click any value in the pivot table, then click the PivotTable Analyze tab, then click Group Selection:

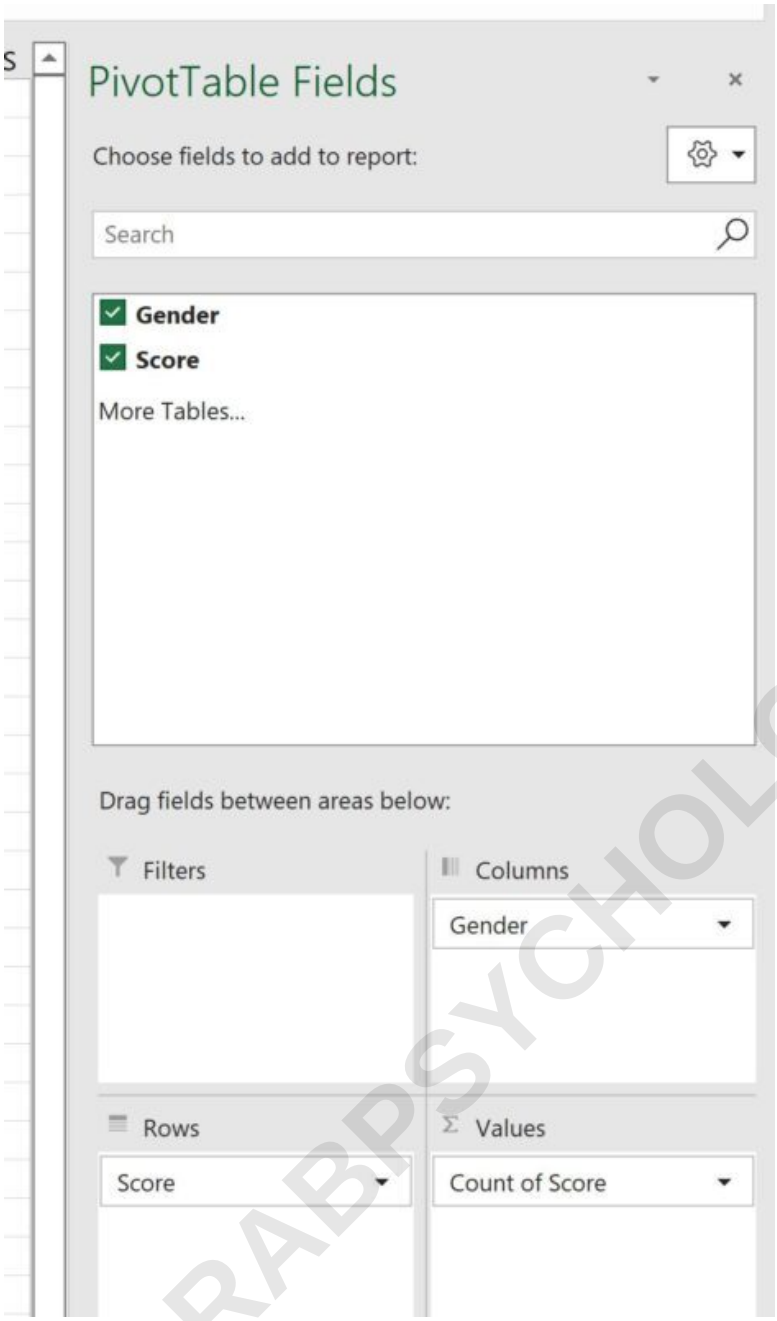


In the new window that appears, group the data Starting at 65, Ending at 100, By 5, then click OK:



Row Labels	Count of Score
65	1
68	3
70	1
73	1
76	1
80	1
83	1
84	2
86	1
87	1
90	3
93	1
94	2
98	1
Grand Total	20

Lastly, drag the Gender variable to the Columns box:

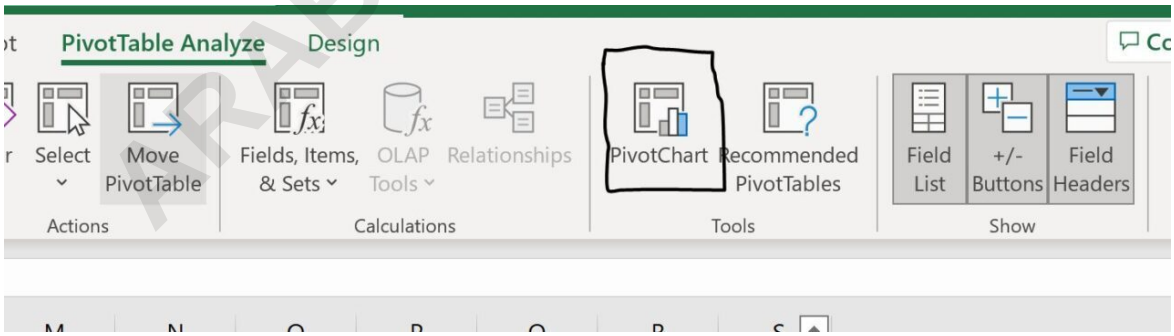


Here's what the updated pivot table looks like:

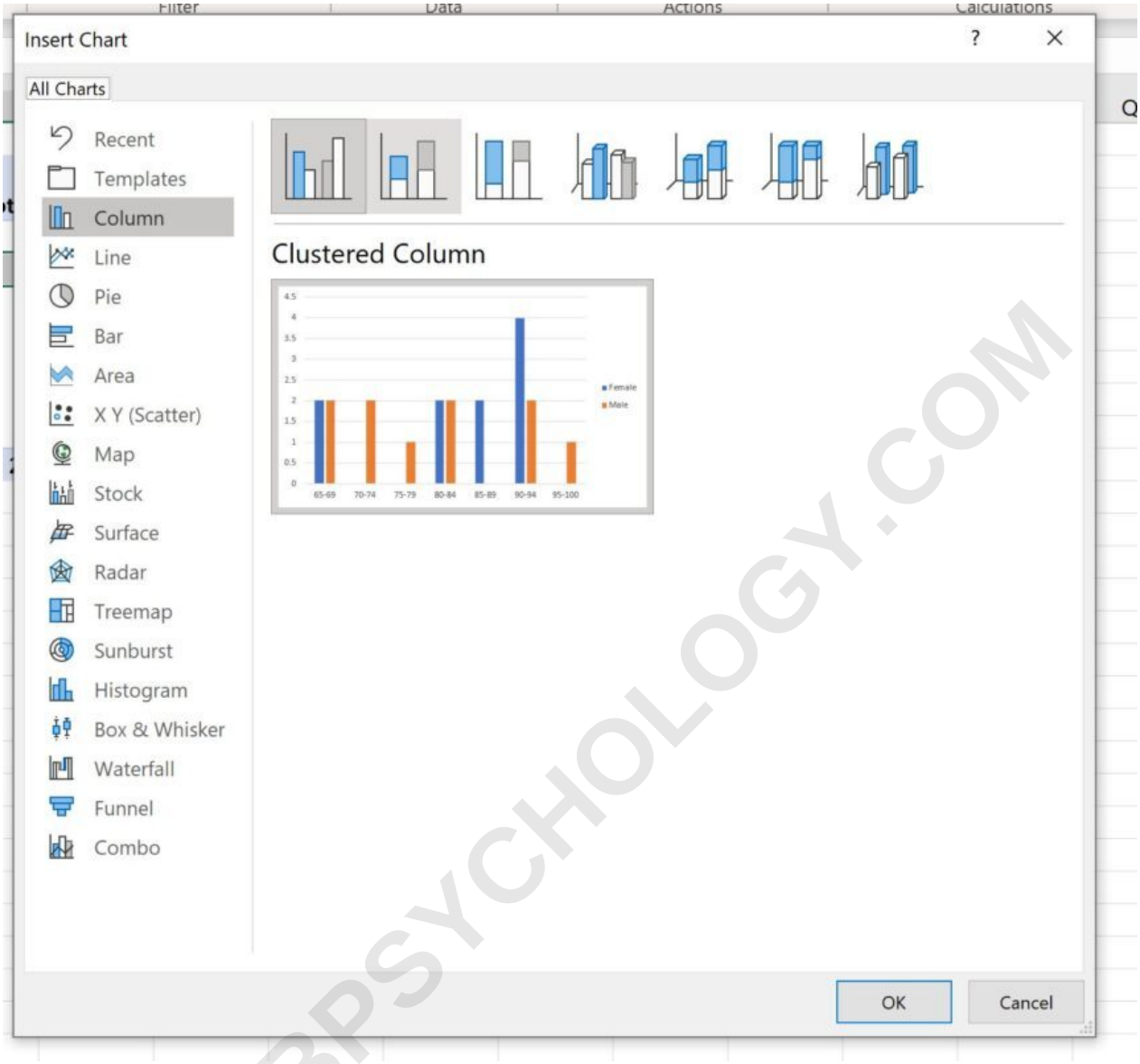
Count of Score	Column Labels		
Row Labels	Female	Male	Grand Total
65-69	2	2	4
70-74		2	2
75-79		1	1
80-84	2	2	4
85-89	2		2
90-94	4	2	6
95-100		1	1
Grand Total	10	10	20

Step 3: Overlay Two Histograms in Plot

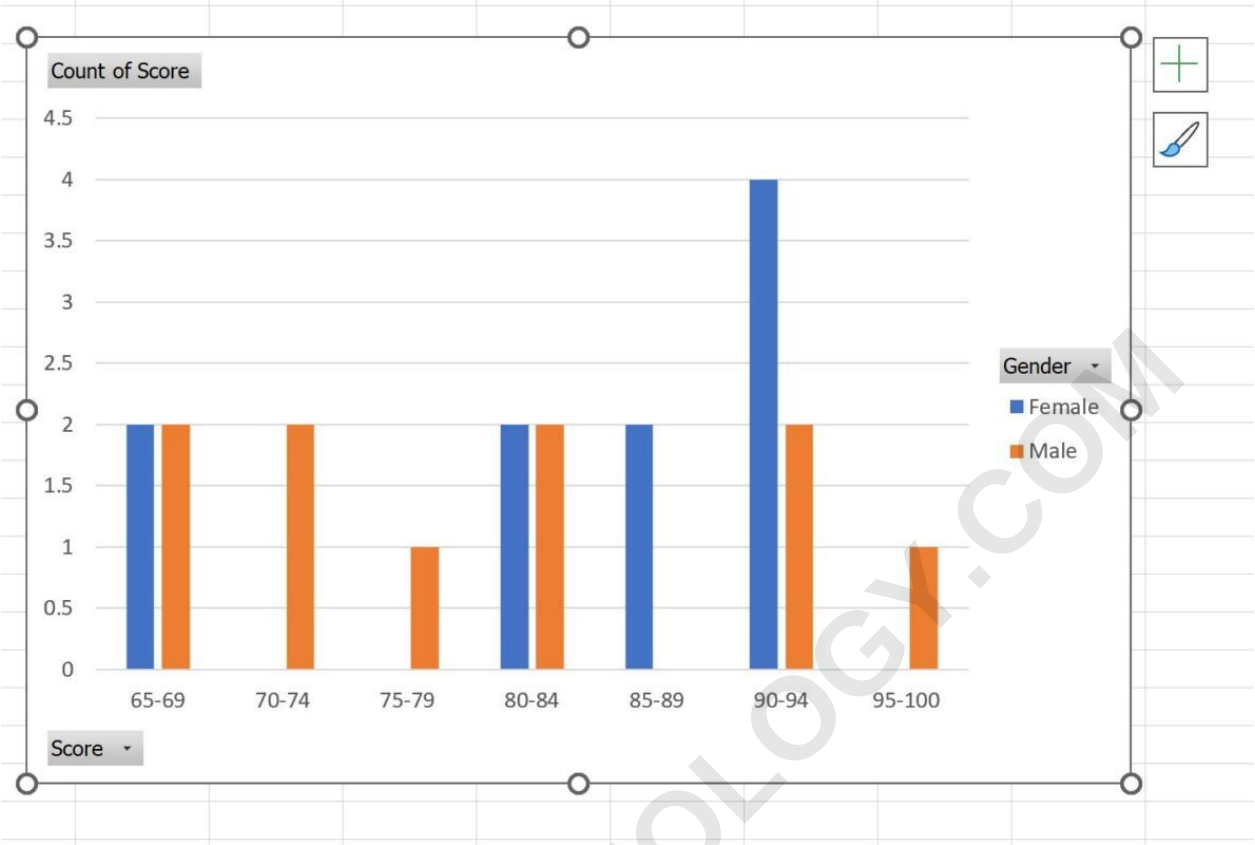
Next, click the PivotTable Analyze tab, then click the icon called PivotChart:



In the new window that appears, choose Clustered Column as the chart type and then click OK:



The following chart will appear:



The blue bars display the frequency of exam scores for the Females and the orange bars display the frequencies for the Males.

For example, we can see:

Two females and two males scored between 65-69.Zero females and two males scored between 70-74.Zero females and one male scored between 75-79.

And so on.

The following tutorials explain how to perform other common tasks in Excel: