## **EXCEL Step by Step**

Categorical Frequency Table (Qualitative or Discrete Data)

Twenty-five army inductees were given a blood test to determine their blood type. The data set is

A	В	В	AB	O
O	Ο	В	AB	В
В	В	O	A	O
A	Ο	O	O	AB
AB	A	O	В	A

Construct a frequency distribution for the data.

- 1. In an open workbook, select cell A1 and type in all the blood types down column A.
- 2. Type in the variable name **Blood Type** in cell B1.
- 3. Select cell B2 and type in the four different blood types down the column. (In Cell B2 Type A, in B3 type B, in B4 type AB, and in B5 type O).
- 4. Type in the name **Count** in cell C1.
- 5. Select cell C2. From the toolbar, select the Formulas tab on the toolbar.
- 6. Select the Insert Function icon <sup>£</sup>, then select the Statistical category in the Insert Function dialog box.
- 7. Select the Countif function from the function name list.
- 8. In the dialog box, type **A1:A25** in the **Range** box. Type in the blood type "A" in quotes in the **Criteria** box. The count or frequency of the number of data corresponding to the blood type should appear below the input. Repeat for the remaining blood types in cells C3 through C5.
- 9. After all the data have been counted, select cell C6 in the worksheet.
- 10. From the toolbar select Formulas, then AutoSum and type in C2:C5 to insert the total frequency into cell C6.



After entering data or a heading into a worksheet, you can change the width of a column to fit the input. To automatically change the width of a column to fit the data:

- 1. Select the column or columns that you want to change.
- 2. On the Home tab, in the Cells group, select Format.
- 3. Under Cell Size, click Autofit Column Width.