# Lab No.5

# **Microsoft Excel(Understanding Charts)**

# **OBJECTIVE:**

#### Working with charts:

Creating a chart in Microsoft Office Excel is quick and easy. Excel provides a variety of chart types that you can choose from when you create a chart. Excel offers Pie, Line, Bar, and Column charts to name but a few. Showing data in a chart can make it clearer, more interesting and easier to read. Charts can also help you evaluate your data and make comparisons between different values.

#### **Understanding charts**

• Excel has several different types of charts, allowing you to choose the one that best fits your data. In order to use charts effectively, you'll need to understand how different charts are used.

#### **Types of Charts:**

- Column charts use vertical bars to represent data. They can work with many different types of data, but they're most frequently used for comparing information.
- Line charts are ideal for showing trends. The data points are connected with lines, making it easy to see whether values are increasing or decreasing over time.
- Pie charts make it easy to compare proportions. Each value is shown as a slice of the pie, so it's easy to see which values make up the percentage of a whole.
- Bar charts work just like Column charts, but they use horizontal bars instead of vertical bars.
- Area charts are similar to line charts, except that the areas under the lines are filled in.
- Surface charts allow you to display data across a 3D landscape. They work best with large data sets, allowing you to see a variety of information at the same time.

#### To insert a chart

- Select the cells you want to chart, including the column titles and row labels. These cells will be the source data for the chart.
- From the Insert tab, click the desired Chart command.
- Choose the desired chart type from the drop-down menu.

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1	Sales	2014								_ 1000 /200 /2		
2	ltem1	\$8,000.00							19.9			
З	Item 2	\$4,300.00	\$45,300.00						_ hſ	f		
4	Item3	\$3,400.00	\$3,400.00						1,44,44			
5	Item4	\$5,600.00	\$3,300.00						Ind Mor	e Column	Charts	
6	Item5	\$3,400.00	\$3,200.00									
7	Item6	\$2,400.00	\$23,400.00									
8	Item7	\$3,300.00	\$200.00									
9	ltem8	\$4,500.00	\$3,400.00									

4. The selected chart will be inserted in the worksheet.

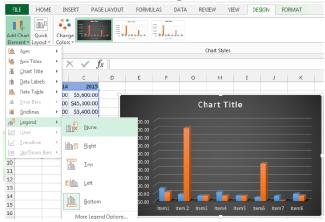
 $\Box$  TIP: If you're not sure which type of chart to use, the Recommended Charts command will suggest several different charts based on the source data.



#### **Chart layout and style:**

After inserting a chart, there are several things you may want to change about the way your data is displayed. It's easy to edit a chart's layout and style from the Design tab.

□ Excel allows you to add chart elements—such as chart titles, legends, and data labels—to make your chart easier to read. To add a chart element, click the Add Chart Element command on the Design tab, then choose the desired element from the drop-down menu.



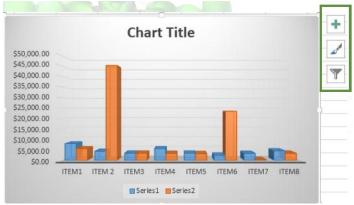
□ To edit a chart element, like a chart title, simply double-click the placeholder and begin typing.

	Chart Title
\$50,000.00	
\$40,000.00	Back Wall
\$30,000.00	
\$20,000.00	
\$10,000.00	
\$0.00	
	Item1 Item2 Item3 Item4 Item5 Item6 Item7 Item8
	Series1 Series2

- If you don't want to add chart elements individually, you can use one of Excel's predefined layouts. Simply click the Quick Layout command, then choose the desired layout from the drop-down menu.
- Excel also includes several different chart styles, which allow you to quickly modify the look and feel of your chart. To change the chart style, select the desired style from the Chart styles group.



TIP: You can also use the chart formatting shortcut buttons to quickly add chart elements, change the chart style, and filter the chart data.



### **Other chart options**

There are lots of other ways to customize and organize your charts. For example, Excel allows you to rearrange a chart's data, change the chart type, and even move the chart to a different location in the workbook.

Sometimes you may want to change the way charts group your data. For example, in the chart below, the Book Sales data are grouped by year, with columns for each genre. However, we could switch the rows and columns so the chart will group the data by genre, with columns for each year. In both cases, the chart contains the same data—it's just organized differently.

- 1. Select the chart you wish to modify.
- 2. From the Design tab, select the Switch Row/Column command.



3. The rows and columns will be switched.

#### To change the chart type

If you find that your data isn't well suited to a certain chart, it's easy to switch to a new chart type. In our example, we'll change our chart from a Column chart to a Line chart.

1. From the Design tab, click the Change Chart Type command.



- 2. The Change Chart Type dialog box will appear.
- 3. The selected chart type will appear.

#### To move a chart

Whenever you insert a new chart, it will appear as an object on the same worksheet that contains its source data. Alternatively, you can move the chart to a new worksheet to help keep your data organized.

1. Select the chart you wish to move.

2. Click the Design tab, then select the Move Chart command.



- 3. The Move Chart dialog box will appear. Select the desired location for the chart.
- 4. Click OK.
- 5. The chart will appear in the selected location.

#### **Printing Workbooks**

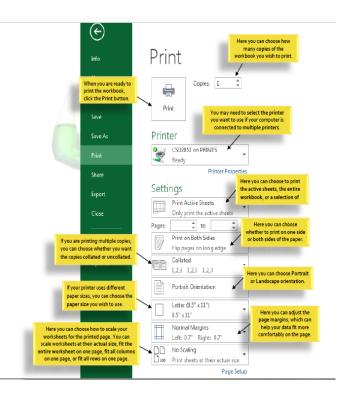
There may be times when you want to print a workbook to view and share your data offline. Once you've chosen your page layout settings, it's easy to preview and print a workbook from Excel using the Print pane.

#### To access the Print pane

1. Select the File tab. Backstage view will appear.



2. Select Print. The Print pane will appear.

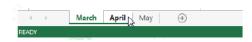


#### **Choosing a print area**

Before you print an Excel workbook, it's important to decide exactly what information you want to print. For example, if you have multiple worksheets in your workbook, you will need to decide if you want to print the entire workbook or only active worksheets. There may also be times when you want to print only a selection of content from your workbook.

### Worksheets are considered active when selected.

1. Select the worksheet you want to print. To print multiple worksheets, click the first worksheet, hold the Ctrl key on your keyboard, then click any other worksheets you want to select.



Navigate to the Print pane.

3. Select Print Active Sheets from the Print Range drop-down menu.



4. Click the Print button.

#### To print the entire workbook

- 1. Navigate to the Print pane.
- 2. Select Print Entire Workbook from the Print Range drop-down menu.

## **Conclusion:**

# <u>Lab Task</u>

### Task No.1

Create a Bar chart of the following data in Microsoft Excel.

Student Name	Marks		
Α	25		
В	40		
С	35		
D	15		
Е	60		

Add title and format it accordingly.

# Task No.2

Implement the following in Microsoft Excel

A	В
Type of Work	% Contribution to 40 Hour Work Week
Administrative	35%
Technical	15%
Customer Interaction	11%
Field Work	30%
Misc	9%

