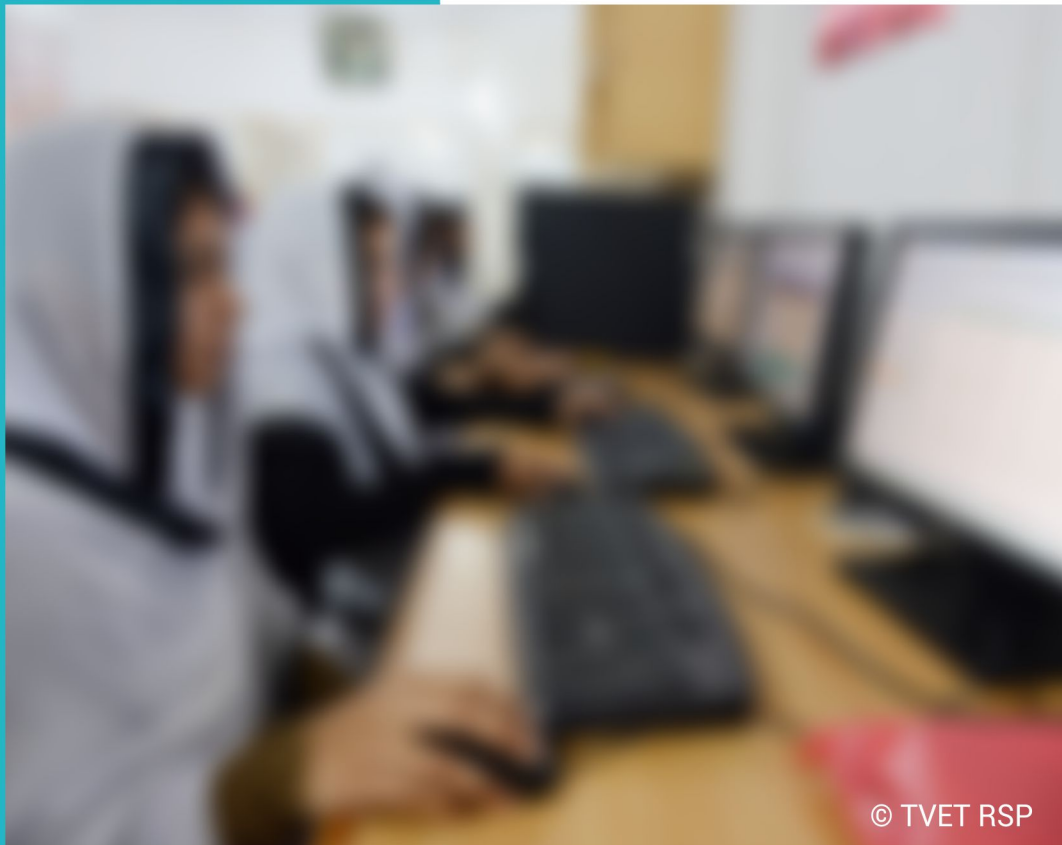


# COMPUTER OPERATOR



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## LEARNING GUIDE

National Vocational Certificate Level 2

Version 1 - July 2013



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Islamic Republic of Pakistan  
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NAVTTC

**Published by**

National Vocational and Technical Training Commission  
Government of Pakistan

**Headquarter**

Plot 38, Kirthar Road, Sector H-9/4, Islamabad, Pakistan  
[www.navttc.org](http://www.navttc.org)

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Zusammenarbeit (GIZ) GmbH

**Layout & design**

SAP Communications

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This document has been produced with the technical assistance of the TVET Reform Support Programme, which is funded by the European Union, the Embassy of the Kingdom of the Netherlands, the Federal Republic of Germany and the Royal Norwegian Embassy and has been commissioned by the German Federal Ministry for Economic Cooperation and Development (BMZ). The Deutsche Gesellschaft für Internationale Zusammenarbeit (GIZ) GmbH in close collaboration with the National Vocational and Technical Training Commission (NAVTTTC) as well as provincial Technical Education and Vocational Training Authorities (TEVTAs), Punjab Vocational Training Council (PVTC), Qualification Awarding Bodies (QABs) and private sector organizations.

**Document Version**

July, 2013  
Islamabad, Pakistan

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## Foreword

The National Vocational & Technical Training Commission (NAVTTTC) developed a National Skills Strategy (NSS) after extensive research and consultation with experts and stakeholders including policy makers and representatives from Industry, Academia and the Provincial Government departments dealing with technical and vocational training. The strategy aims at establishing a regime that facilitates competency-based and demand-driven training and assessment.

NAVTTTC has developed competency-based training programs with the technical support of TVET Reform Support Programme (TVET-RSP), which is funded by the European Union, the Kingdom of the Netherlands, the Federal Republic of Germany and the Royal Norwegian Embassy. The Programme has been commissioned by the German Federal Ministry for Economic Cooperation and Development (BMZ) and is being implemented by the Deutsche Gesellschaft für Internationale Zusammenarbeit (GIZ) GmbH in close collaboration with NAVTTTC. These vocational training programs have been approved by the National Curriculum Review Committee (having representation from all over the country from TEVTAs and industry) for implementation in Public and Private Training institutions.

The purpose of developing competency-based training programs is to equip the learners with modern skills and knowledge for each of the trades to meet the requirements of local as well as international markets. These training programs include competency standards, qualification, curriculum, assessment material and teaching & learning material that will aid in implementation of competency-based and demand driven training in the country.

This Teaching and Learning Material is part of the competency based training program exclusively developed to support the implementation of CBT curricula. This Material is intended for the use of learners undertaking training in *National Vocational Certificate Level-2 in Information Technology (Computer Operator)* under the guidance of experts and appropriate trainers. This Teaching and Learning Material has been designed in consultation with industry, academia and researchers to ensure that the material is relevant and current.

On behalf of the Federal Government/NAVTTTC, I wish to express my sincere appreciation and gratitude to all subject matter experts, industry representatives and TVET-RSP experts who have diligently contributed in producing this valuable Teaching and Learning Material.

**Executive Director**  
National Vocational & Technical Training Commission  
(NAVTTTC)



# Introduction

A computer operator performs simple and routine tasks to carry out different functions and operations in an organization. The major responsibilities includes typing of documents, creating letters and memos, sending and receiving emails, maintain accounting data, and maintaining backups.

The National Vocational & Technical Training Commission (NAVTTTC) has developed a national qualification entitled, "National Vocational Certificate Level-2 in Information Technology (Computer Operator)". Relevant industry and employers were consulted in the design and validation processes in order to come up with a national qualification that fulfills the requirements of the sector in general and the occupation in particular.

This Teaching and Learning Material (TLM) is developed based on competency standards and curriculum of the Computer Operator national qualification. It carries a learning volume of 80 credits and includes eight learning modules which are as under:

- Module 1: Maintain Computer System
- Module 2: Prepare Word Documents
- Module 3: Prepare Spreadsheets
- Module 4: Prepare Presentation
- Module 5: Prepare In-page documents
- Module 6: Manage e-mail / internet
- Module 7: Manage Information System
- Module 8: Identify and peruse new business opportunities in the field of Computer (ICT)

This TLM provides support for more effective training and productive learning. Each of the learning modules contains learning outcomes and information regarding learning elements in the form of knowledge, skills and attitudes. At the end of every learning module are Frequently Asked Questions (FAQs) and Test Yourself which will help learners in self-assessment before proceeding to modular or final assessment.

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# Module 1: Maintain Computer System

## Learning Outcomes

After completion of this learning module, you will be able to:

- Install Operating System
- Configure Peripheral Devices
- Install Peripheral Devices
- Install software Applications
- Update / Upgrade software Applications
- Un install Software Applications
- Perform Windows Scan
- Format External Mass Storage
- Troubleshoot Basic Software Errors
- Troubleshoot Basic Hardware Faults
- Configure Basic Internet Connectivity



# Learning Unit 1: Install Operating System

## Overview

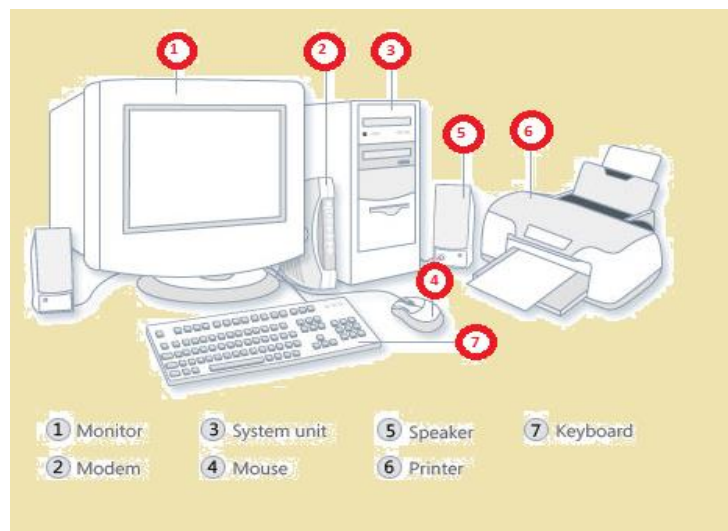
Computer consists of two main parts Hardware and Software. In software, system software (Operating system) is main software which control and manage the computer and all the devices attached to it. This learning unit covers the procedure of installing, operating system; describes different types of operating systems, precautions and hardware requirements for installing Operating system. After completion of this learning unit, you will be able to demonstrate the procedure for installing Operating System and describes the different types of operating system and computer parts.

### Operating System

Operating system is the soul of a computer. It controls/ manages all the working of computer and devices attached.

## 1. Basic Parts of Computer System

A computer is an electronic device which takes input from the user, processes it and gives output. Computer consists of several parts like CPU, Mouse, Keyboard monitor, LCD, Printer, and Speakers.



### Remember

The word computer comes from a Latin word "Compute" which means to calculate. So it is also called a calculating device

### Basic Parts of a Computer

These parts may be different according to the system. Like in laptops, touchpad replaces mouse, built in speakers in LCD and built in laptop.

### Basic Components of Computer System

There are three basic components of computer system. CPU or system unit, Input unit and Output unit.

#### 1. CPU or System Unit

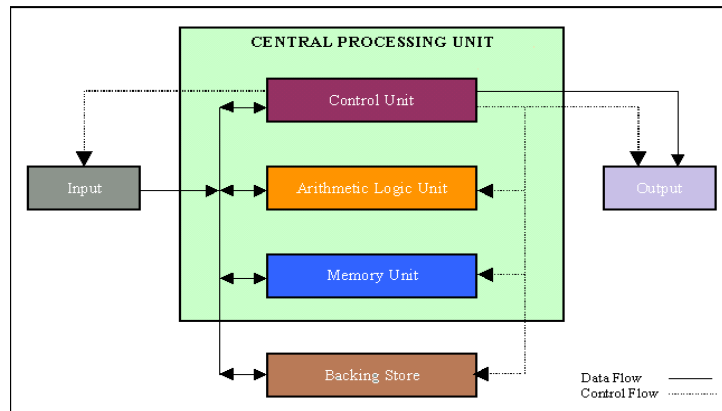
**System unit** is a base for computer system. That commonly known as CPU (Central Processing Unit). The **central processing unit** is "brain" of computer , which consists of the following three main parts:



**Remember**

There are three basic components of computer system input unit, output unit and system unit.

- 1.1 **Memory Unit:** consists of primary memory and secondary memory. In primary memory, RAM (Random Access Memory which is primary memory that loads the required data and erase it at the time of shutdown/restart. In secondary memory which store information on disc drives / devices permanently this can be used in future again and again.
- 1.2 **Control Unit:** it controls all the devices (peripheral devices) which attached to the computer.
- 1.3 **ALU (Arithmetic Logic Unit):** It is also called Microprocessor which is the brain of the computer, which deals with all the arithmetic (additions, multiplication, subtractions) and logical operations (greater, less then, equal etc.) of the computer.



**Main Parts of CPU**

**2. Input Unit**

Input unit /devices are used for giving input to the computer for processing. There are many types of input devices like keyboard, mouse and scanner.

**3. Output Unit**

Output unit/ devices are used for giving and display output to the user. There are many types of output devices like printer, speaker and monitor.

**2. Hardware and Software**

**Remember**

Hardware is tangible elements and software is intangible elements of computer. Hardware and Software are depends on each other.

Following are the two major elements of the computer.

**1. Hardware**

Hardware is the physical parts of Computer that can be seen or touched. This includes the computer casing, monitor, keyboard, and mouse. It also includes all the parts inside the computer casing, such as the hard disk drive, motherboard, video card, LAN card and many others.

**2. Software**

The set of instructions given to the computer to perform a task is called software.

**Computer software** or **software** is any set of machine-readable instructions that directs a computer's processor

to perform specific operations. The two main types of software are System Software and Application software. Following are the two main types of software.

**2.1 System software:** System software is computer software designed to operate and control the computer hardware and to provide a platform for running application software it includes software like operating system Language Software, device drivers

**2.2 Application Software** includes Word processing software, Spreadsheet software, Database software, Education software, entertainment software and many more.

### 3. Types of Operating Systems

#### Operating System

An operating system (OS) is a set of programs contains instructions that work together to coordinate all the activities among computer hardware resources. Most operating systems perform similar functions that include starting and shutting down a computer, providing a user interface, managing programs, managing memory, coordinating tasks, configuring devices, establishing an Internet connection, monitoring performance, providing file management and other utilities, and automatically updating itself and certain utility programs.

#### Types of Operating Systems

Operating systems usually preinstalled on the computer when it is purchased. Mostly people use the operating System that preinstalled on their computer, but it is possible to upgrade or even reinstall new operating systems. The most common operating systems for personal computers are :

Microsoft Windows, Apple Mac OS X, and Linux, Unix etc.

#### 1. Microsoft Windows

Microsoft created the Windows operating system in themid-1980s. Over the years, there have been many different versions of Windows, but the most popular ones are **Windows 7** (released in 2009), Windows**Vista** (2007) and **Windows XP** (2001). Windows is very compatible and user friendly which makes it the most popular operating system in the world. If you're buying a new computer or upgrading to a new version of Windows, you can choose from several different editions of Windows, including Home, Premium, Professional, and Ultimate.

#### 2. Apple Mac OS X

Mac OS is a line of operating systems created by **Apple Inc.** It is also preinstalled on all new **Macintosh computers**, or Macs. All of the recent versions are known as **Mac OS X (pronounced Mac O-S Ten)**, and their specific version names are **Lion (released in 2011)**, **Snow Leopard (2009)** and **Leopard (2007)**. Apple also offers a version called **Mac OS X Server**, which is designed to operate on servers. The Apple operating system does have some disadvantages, primarily in regard to software and hardware compatibility.

#### Do you know!

Who is the founder of Apple Company and who is the owner of Microsoft Company??

#### 3. Linux

Linux operating system is developed on a kernel, based on Unix. It is known as one of the most secure platforms, yet Linux is often viewed as more complex. Linux (**pronounces LINN-ux**) is a family of open source operating systems, which means that they can be **modified and distributed** by anyone around the world. This is very different from proprietary software like **Windows**, which can only be modified by the company that owns it

(**Microsoft**). The advantages of Linux are that it is free, and there are many different distributions (versions) that can choose from. Each version has a different look and feel, and the most popular ones include **Ubuntu**, **Mint**, **Red Hat** and **Fedora**. Linux is named after Linus Torvalds, who created the Linux kernel in 1991.

## 4. Basic Difference between Operating Systems

There are many differences among these operating systems. These are according to their work.

### Single-Tasking and Multi-Tasking

#### Remember

Windows is a Multi-tasking operating system.

A single-tasking system can only run one program at a time, while a multi-tasking operating system allows more than one program to be running in concurrency. This is achieved by time-sharing, dividing the available processor time between multiple processes which are each interrupted repeatedly in time-slices by a task scheduling subsystem of the operating system. Multi-tasking may be characterized in pre-emptive and co-operative types.

### Single-User and Multi-User

Single-user operating systems have no facilities to distinguish users, but may allow multiple programs to run in tandem. A multi-user operating system extends the basic concept of multi-tasking with facilities that identify processes and resources, such as disk space, belonging to multiple users, and the system permits multiple users to interact with the system at the same time.

### Distributed

A distributed operating system manages a group of distinct computers and makes them appear to be a single computer. In distributed computing that are linked and communicated to each other. Computers work in groups in distributed system.

### Embedded

Embedded operating systems are designed to be used in embedded computer systems. They are designed to operate on small machines like PDAs with less autonomy. They are able to operate with a limited number of resources. They are very compact and extremely efficient by design. Windows CE and Minix 3 are some examples of embedded operating systems.

### Real-Time

A real-time operating system is an operating system that guarantees to process events or data within a certain short amount of time. A real-time operating system may be single- or multi-tasking, but when multitasking, it uses specialized scheduling algorithms so that a deterministic nature of behavior is achieved. An event-driven system switches between tasks based on their priorities or external events while time-sharing operating systems switch tasks based on clock interrupts.

## 5. Precautions to be taken before Installing Windows

Before installing any operating system, Following precautions must be followed for safety and security of important data / software's.

1. Regularly take backup of your computer system data.
2. Check the prefix for Installation of new Operating system.
3. Check the compatibility issue before installing windows.
4. Create check points/restore points.

### Remember

Windows can also be installed using bootable Flash drive or through using network share.

## System Requirements for Windows 7

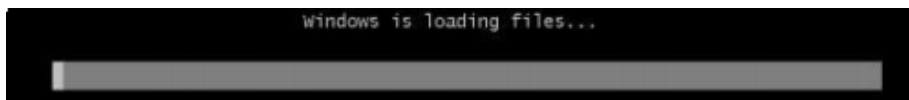
For installing windows 7 we need:

- 1 gigahertz (GHz) or faster for 32-bit (x86) or 64-bit (x64) processor.
- 1 gigabyte (GB) RAM (32-bit) or 2 GB RAM (64-bit).
- 16 GB available hard disk space for (32-bit) or 20 GB for (64-bit).
- DirectX 9 graphics device with WDDM 1.0 or higher driver.

## 6. Installation of Operating System

### Step by Step Windows Installation

1. Boot/Start Computer From Window 7, bootable DVD or Bootable USB Flash
2. Press **Esc, F10, F2 or Delete** key from Keyboard depending upon your Manufacturer.
3. If prompted, **Press any key to Boot from CD/DVD.....**” then press Any key
4. The obvious place to start in Win 7 is with the installation process.



**Loading Files into RAM**

### Do you know!

F2 key is used for entering setup of the computer system.

5. Then switch from a DOS-looking progress bar to a Windows-looking progress bar



6. Get the first Windows 7 install screen. After picking an install language, get to the main install kick-off window.



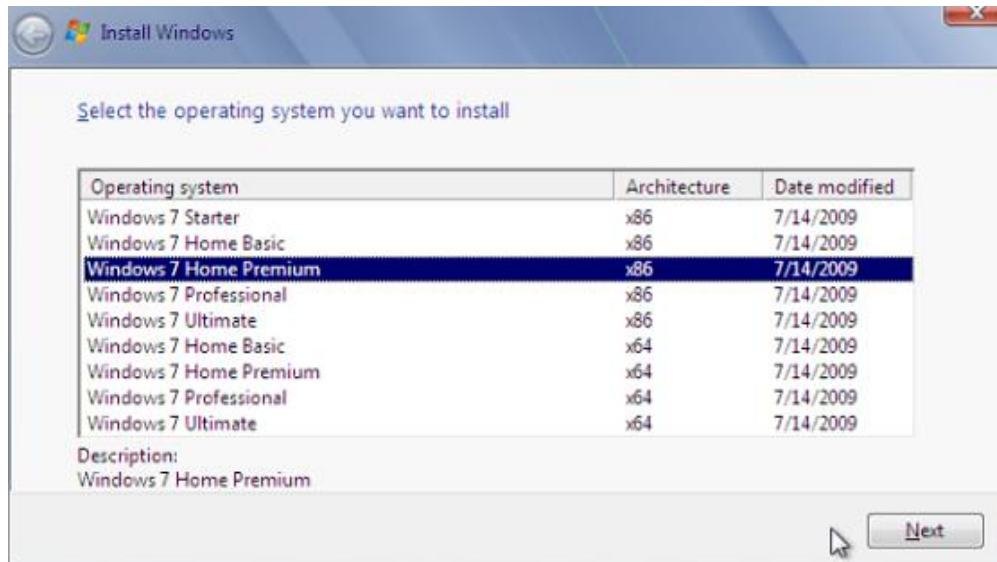
**Select Language and Start**

### Select Version of Window 7

- X86 means 32-bit (older technology)
- X64 means 64-bit (newer technology).

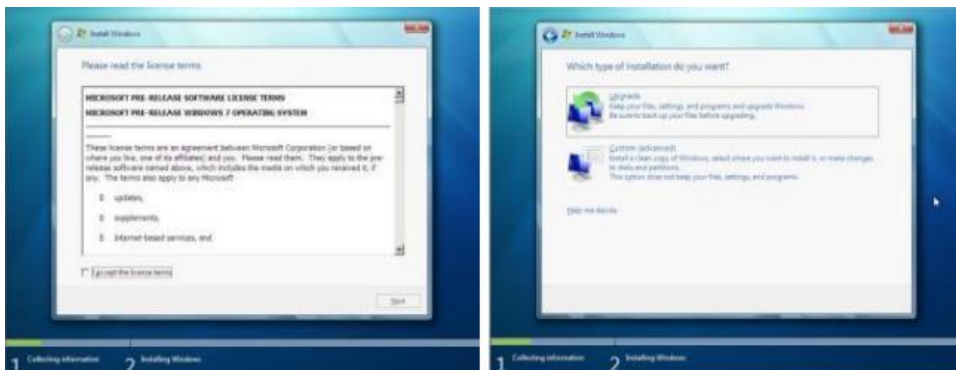
#### Do you know!

The key difference: 32-bit processors are perfectly capable of handling a limited amount of RAM, and 64-bit processors are capable of utilizing much more.



### Select Windows Version

7. Click "I accept the license terms".



### Upgrade or Custom

#### Upgrade VS Custom

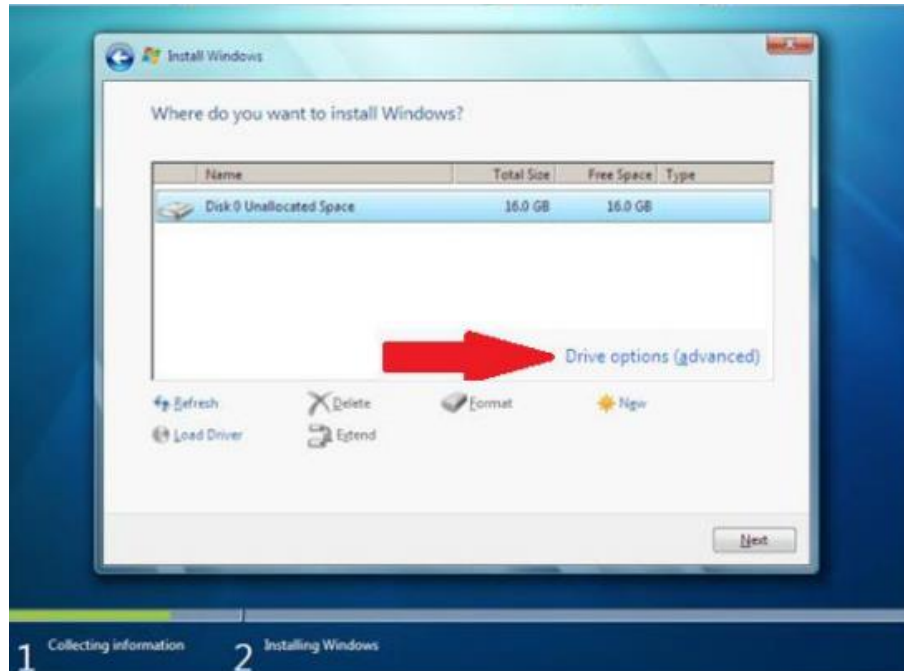
##### Upgrade

- Keep Files, Setting, Programs of Old Window
- Available only on Existing Version of Window
- Can be upgraded to newer or Higher Version
- Cannot change Partition

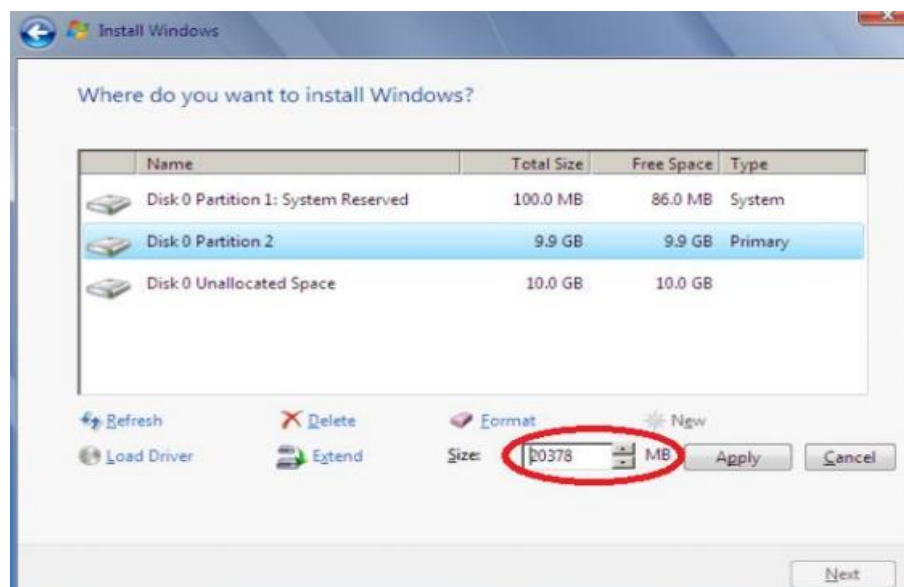
##### Custom

- Does not keep Files, Setting, Programs of Old Window
- Install a fresh / New copy of Window
- Any version can be installed
- Can change Partition

8. Choose Custom option.
9. Click on the link Drive options (advanced), it shows managing hard disk partitions.



### Drive Option



### Select Drive Size

10. If wants to create a new partition on unallocated space then give the size of the drive and click on apply.
11. Click Next.

Now the installation will begin.



### Installing Windows

At this point the windows will install features, updates and finally it will complete the installation.



### User Name

12. Now type the username in the box and click Next.





### Remember

Password can also be applied using control panel through user accounts and control settings.

### Password

13. Type, Retype password and hint in the boxes and click next.



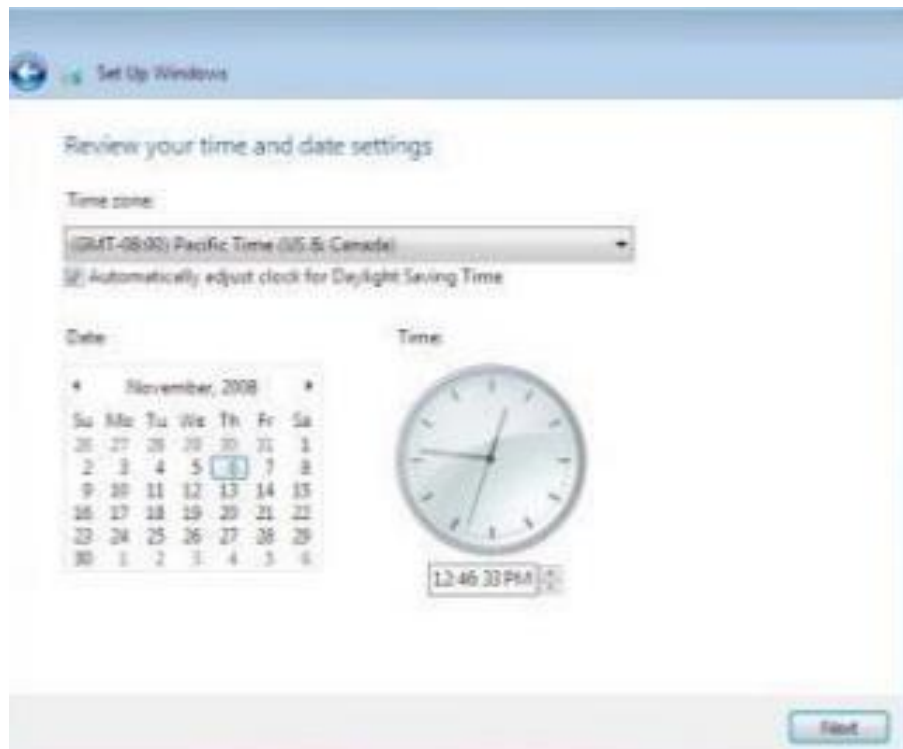
### Asking about Product Key

14. Now it will ask about the Product key. Check the box "Automatically activate windows through online." Windows will automatically activate if you are installing an activated version.



**Do You Know**

We can change date & time after installation of windows.



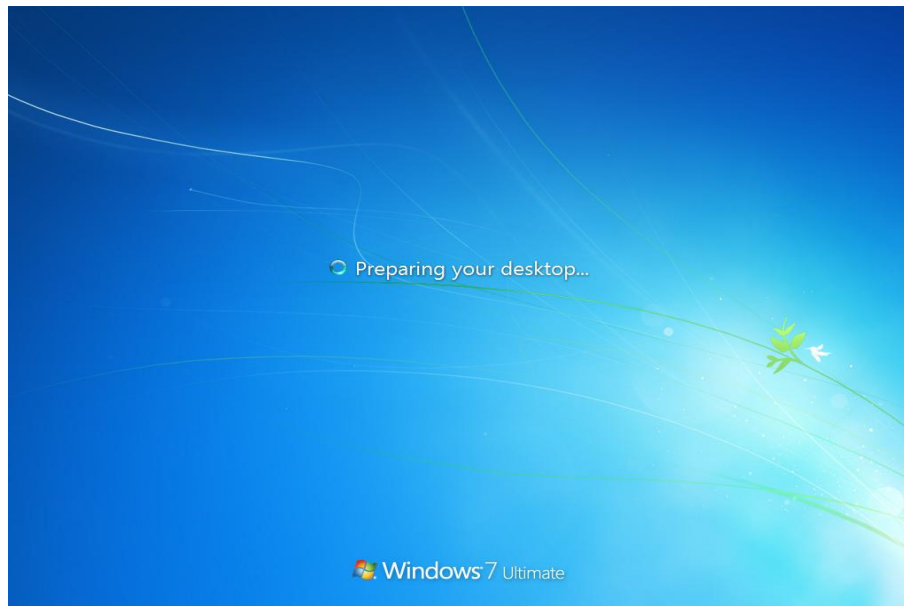
**Set Date and Time**

15. Set Date and time and click Next.



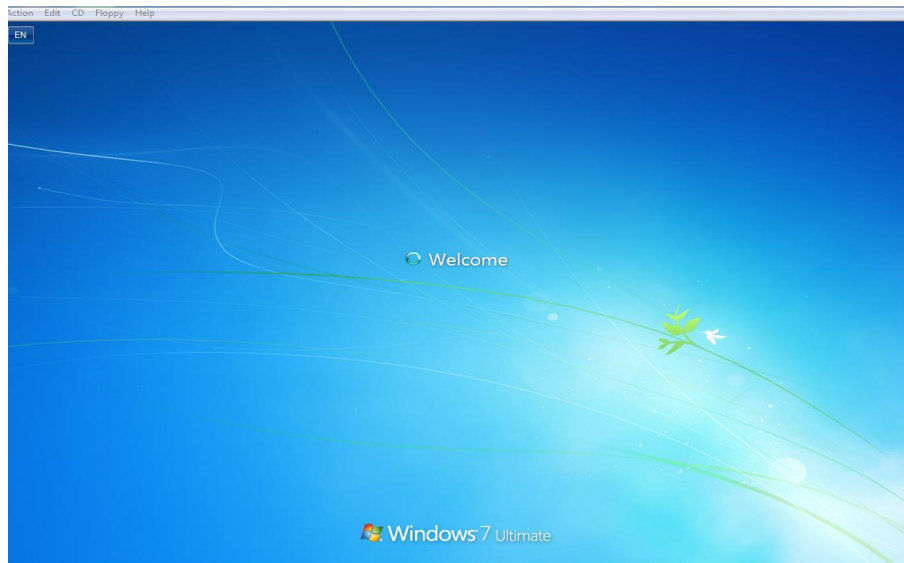
**Select Network**

16. Select the desired network and the windows is installed.



### Preparing Desktop Screen

After completion of all the steps the windows will prepare your desktop.



### Welcome Screen

## Learner's Activity

- What is an operating system?
- Mention the name of the operating system installed in your computer.
- Visit the Microsoft and Apple websites to learn more about each operating system.
- If you have a PC and currently use an older version of Windows, such as Windows 7 starter, upgrade to win 7 ultimate versions.

# Learning Unit 2: Configure Peripheral Devices

## Overview

A **peripheral** is a "device that is used to put information into the computer or get information out of the computer. Peripheral device is generally defined as any auxiliary device such as a computer mouse or keyboard that connects to and works with the computer in some way. Other examples of peripherals are image scanners, tape drives, microphones, loudspeakers, webcams, and digital cameras. This learning unit covers about most commonly used peripheral devices and commonly used communication ports in computer. After completion of this learning you will be able to describe different types of peripheral devices and their use. And most commonly used hardware ports.

## 1. Commonly Used Peripheral Devices

A computer peripheral device is an external device that provides input and output for the computer. There are three types of peripheral devices one is Input that is use for providing input to the computer, second is output that is used for providing output and the last which provides input and output both.

### Some Common Input Devices Include:

- Keyboard
- Mouse
- Scanner
- Microphone
- Joystick

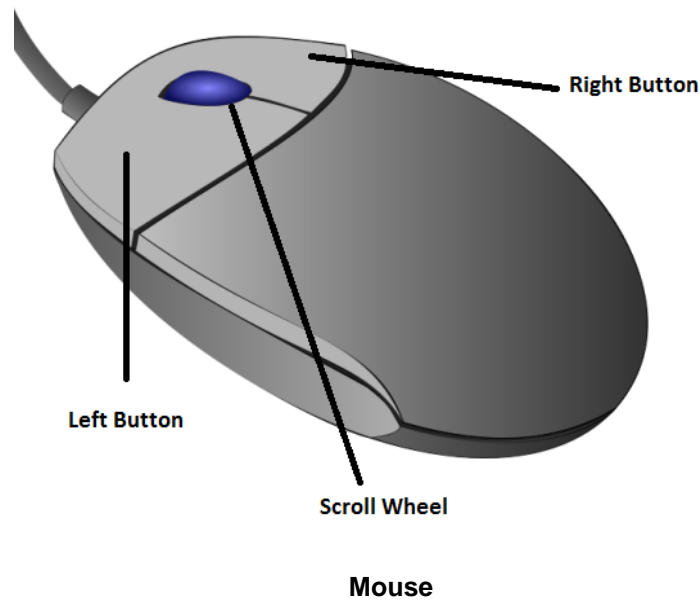
### Peripheral

An external device that provides input to the computer or receives output from the computer is called a peripheral.

### 1. Mouse

A mouse is an input device used to point and select items on the computer screen. A mouse usually has two buttons: A **primary button** (usually the left button) and a **secondary button**. Many mouse also have a wheel between the two buttons, which allows to scroll for ups and down options.

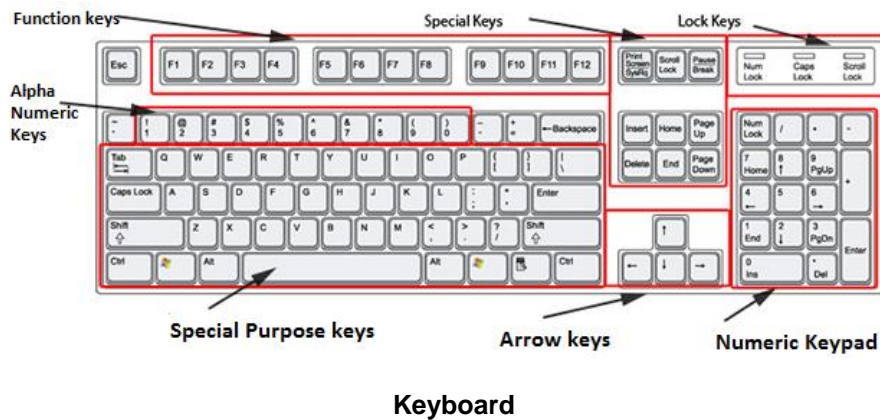
When the mouse move with the hand, a pointer on screen moves in the same direction. When an item wants to select, point to the item and then **click** (press and release) the primary button. Pointing and clicking with mouse is the main way to interact with the computer.



## 2. Keyboard

A keyboard is used for typing text into the computer. There are many types of keys on the keyboard. These are:

- 2.1 Alphanumeric Keys**, used to enter alphabetic and numerical data. (E.g. A, B, C ...1, 2, 3...)
- 2.2 Special Purpose keys**, each key is used for any special purpose like Backspace, Spacebar, Enter key, CTRL, Shift, ALT keys Caps lock and Tab keys.
- 2.3 The function keys**, found on the top row, perform different functions depend on where they are used. (e.g. F1, F2, F3...)
- 2.4** The numeric keypad, located on the right side of most keyboards, allows entering numbers quickly.
- 2.5** The **navigation keys**, such as the arrow keys, allow to move the cursor position within a document or webpage.



## 3. Scanner

A scanner is a device that is used to capture images from photographic prints, posters, magazine pages, and similar sources for computer editing and display. There are many types of Scanners, hand-held, feed-in, and flatbed used for scanning black-and-white only, or color. Very high resolution scanners are used for scanning for high-resolution printing, but lower resolution scanners are adequate for capturing images for computer display.



**Scanner**

#### 4. Microphone

Microphone is an instrument for converting sound waves into electrical energy variations which may then be amplified, transmitted, or recorded.

It is sometimes abbreviated as “**mic**”. A microphone is a peripheral that allows computer users to input audio into their computers.



**Microphone**

#### 5. Joystick

Joystick is a lever that moves in all directions and controls the movement of a pointer or some other display symbol. A joystick is similar to a mouse. With a mouse the cursor stops as we stop moving the mouse. With a joystick, the pointer continues moving in the direction the joystick is pointing. For stopping the pointer, it must return to its upright position. Most joysticks include two buttons called **triggers**.

Joysticks are used mostly for computer games, but they are also used for other systems like in Aero plane.



**Joystick**

**Some Common Output Devices Include:**

- Monitor
- Projector
- Printer
- Speakers

## 1. Monitor

A **monitor** is an output device used to display information in visual form. The portion of the monitor that displays the information is called the **screen**. Like a television screen, a computer screen can show still or moving pictures.

There are two basic types of monitors: **CRT** (cathode ray tube) monitors and the **LCD** (liquid crystal display) monitors. Both types produce sharp images, but LCD monitors have the advantage of being much thin and lighter.



**CRT Monitor**

**LCD Monitor**

## 2. Printer

A printer is an output device used to transfer data from a computer to paper. The two main types of printers' **impact printers** and **non-impact printers**.

**Impact printers** used striking hammer on the inked Ribbon to print on paper, while **non-impact printer** used laser technology for printing.



**Non Impact Printer**

**Impact Printer**

### 3. Projector

A projector or image projector is an optical device that projects moving images onto a surface, commonly a projection screen. Most projectors create an image by shining a light through a small transparent lens, but some newer types of projectors can project the image directly, by using lasers.



**Projector**

### 4. Speaker

Speaker is one of the most common output device used with computer. The purpose of speakers is to produce audio output that can be heard by the listener.



**Speakers**

There are some devices that functions both as input and output devices, such as:

- Hard drives
- CD/DVD ROM Drive
- Modems
- Webcam

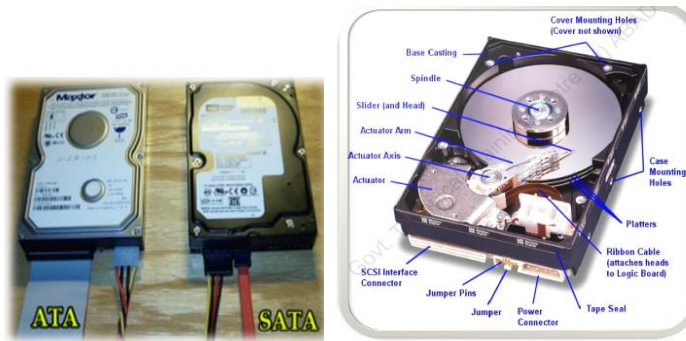
#### 1. Hard Disk Drive

**Hard disk drive** stores information on a **hard disk** which is a rigid platter or stack of platters with a magnetic surface. Because hard disks can hold massive amounts of information, they usually serve as computer's secondary means of storage, because it's a permanent storage holding almost all of the programs and files. The hard disk drive is normally located inside the system unit.

#### Remember

You can store a large amount of data on Hard disk. External hard disks are also available for data backups.





**Hard Disk Drive**

## 2. CD (Compact Disc) and DVD (Digital Video Disc) Drives

### Remember

Periodically back up (copy) your important files to CDs or DVDs because if your hard disk ever fails, you won't lose your data.

CD or DVD drive, usually located on the front of the system unit. CD drives use lasers to read data from a CD; many CD drives can also write (record) data onto CDs.

A DVD drive can do everything that CD drive do, but read DVDs also. Many DVD drives can record data onto blank DVDs. This DVD-RW also called **Combo drive**.

## 3. Modem

Modem is a short for **modulator-demodulator**. A modem is a device that enables a computer to transmit data over telephone or cable lines. A modem converts between these two forms from analog to digital and digital to analog. There are two types of modem **Wired and Wireless**.

### Remember

Periodically back up (copy) your important files to CDs or DVDs because if your hard disk ever fails, you won't lose your data.



**Modem**

## 4. Web Cam

A webcam short for "web camera" is a digital camera that is connected to a computer. It can send live pictures from wherever it's sited to another location through the internet. Many desktop computer screens and laptops come with a built-in camera and microphone, but if it doesn't, separate webcam can connect any time.



Web Cam

**Do you know!**

Any images you make available to others via webcam could remain on the internet forever.

## 2. Different Types of Communication Ports

In computer hardware, a **port** serves as an interface between the computer and other computers or peripheral devices. A port generally refers to the female part of connection. Computer ports have many uses, to connect a monitor, webcam, speakers, or other peripheral devices. These **ports** are connection points or interfaces with other peripheral devices.

**Physical ports/ Communication ports** are used for connecting a computer through a cable and a socket to a peripheral device. Physical **computer ports** list includes:

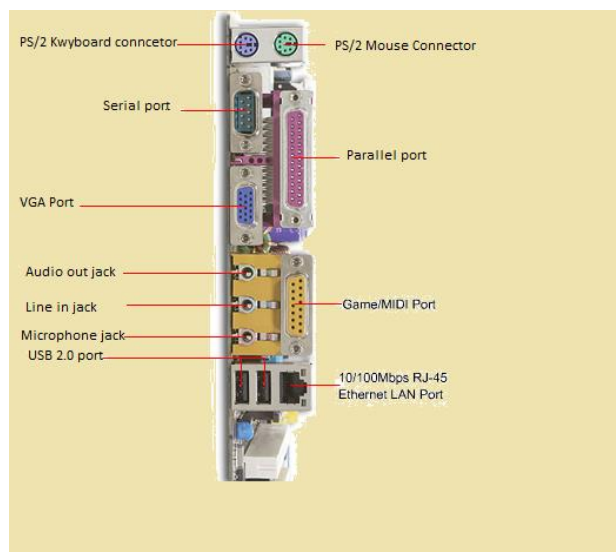
- serial ports ( DB9 socket ),
- USB ports ( USB 2.0 or 3.0 socket / connector ),
- parallel ports ( DB25 socket / connector ),
- Ethernet /**internet ports** (RJ45 socket / connector).
- VGA port (Display port)
- Fire wire (IEEE 1394 interface)
- E-SATA port
- PS/2 port

**Remember**

Communication Ports are the gateway for data between devices and computers.

**Do you know!**

Serial ports transfer data bit by bit and parallel port transfer data byte by byte.



## 1. Serial Ports

Serial port is an electronic communication gateway used for transferring data one bit at a time. Serial port was used almost for all type of information transfer between a computer and other peripheral devices. Nowadays serial port has been replaced with dedicated ports like USB port.

The serial port is also known as COM port and when a device is connected to it you will find it in device manager on port COM1 or COM2.



**Serial Port**

## 2. USB Port

USB port (Universal Serial Bus) is the most useable connection point for data transfer in the world. It was created in the mid-1990s with the intention of replacing all other PC ports like serial port, parallel port, PS/2 port. A standard USB connector is a simple socket with 4 pins: one for power, one for ground and two for data transfer.

 Is used for USB.



**USB Cable & Port**

## 3. Parallel Port

### Do you know!

Ethernet port is also called internet connection port.

Parallel port is used for data transfer between a computer and a peripheral device through a 25 or 36 pin connector. In parallel communication multiple bits are transferred at a time. This port is used for high transmission of data between device and computer.



**Parallel Port (DB25)**

#### 4. Ethernet Port

Ethernet port is a network hardware interface used for data transfer and control between two devices that can support the IP protocol. The Ethernet port speed can vary 10Mbps up to 10Gbps.



**Ethernet Port and Connector**

#### 5. VGA Port

The **VGA** port is used for connecting a computer to a monitor. It was the replacement of MDA, CGA and EGA standards.

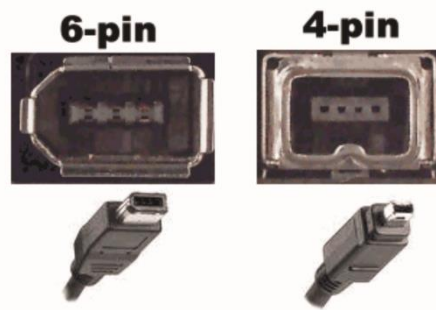
With the development of new and powerful processing units came the need of a new video standard and this is how the VGA port was invented. This new standard brought with **VGA** monitors compatible with 640x480 resolution.



**VGA Cable      VGA Connector**

#### 6. Fire-wire Port

**Fire-wire port** or IEEE 1394 was first developed in 1990 by Apple and worked as a serial bus interface for high speed data transfer. The standard was first introduced on computers in 2000 and became the main data connection port for apple.



Fire-wire Port

### 7. E-SATA Port

An e-SATA is a combined connection for external storage devices. An e-SATA or USB device can be plugged into an e-SATA port. **SATA** is a computer bus interface for connecting host bus adapters to mass storage devices such as hard disk drives and optical drives. e-SATA combines the functionality of an e-SATA and a USB port, and a source of power in a single connector. E-SATA can supply power at 5 V and 12 V.



### 8. PS/2 Port

The PS2 port is used for connecting keyboards and mouse to a computer. Its purpose was to replace the serial keyboard and mouse.

PS2 connector color code:

- Purple – Keyboard
- Green – Mouse



## Learner's Activity

- Define different types of ports colors according to their connectors.
- Plug out all the ports from the computer and connect them again for practice.
- Write the difference between Hardware and software??
- Find out what types of drives are on your computer (CD-ROM, DVD-ROM, etc.).
- Count the number of USB ports on your computer.
- What are some of the peripherals you can use with your computer?



# Learning Unit 3: Install Peripheral Devices

## Overview

Installing and configuring the variety of peripheral devices, including mouse, microphone, scanner, gamepad, camcorder and other devices. This learning unit covers the procedures for installing most commonly used peripheral devices like keyboard, mouse, printer, CD ROM, scanner etc. After completion of this learning unit, you will be able to install and check different peripheral devices.

## 1. Installing Most Commonly Used Peripherals

### Remember

Safety precautions must be followed before installing any Hardware.

There are various types of peripheral devices each of which has different use. A peripheral device is defined as a computer device, such as a keyboard or printer that is not part of the essential computer, memory and microprocessor.

### 1. Installing CD ROM

1.1 Remove the CPU case.



**Removing Cover**

1.2 Remove the drive bay cover where the CR-ROM drive will be inserted.



**Removing Drive Bay Cover**

1.3 Insert the CD-ROM drive inside the drive bay slowly and smoothly.



**Insert Drive**

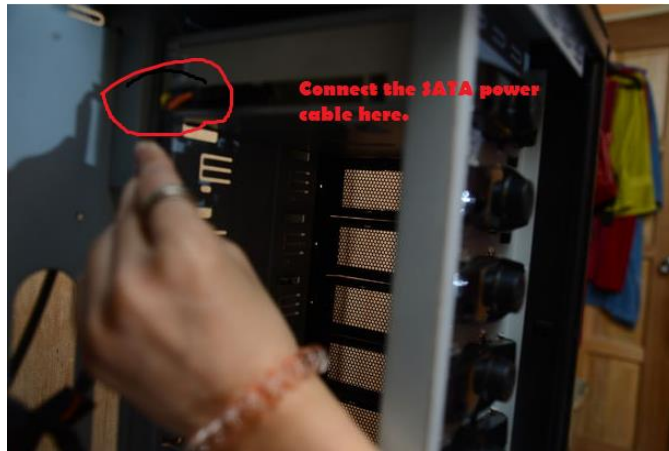
1.4 Fit the CD-ROM drive with the locking mechanism, to let it fix it in its Bay.



**Insert Drive Slowly**

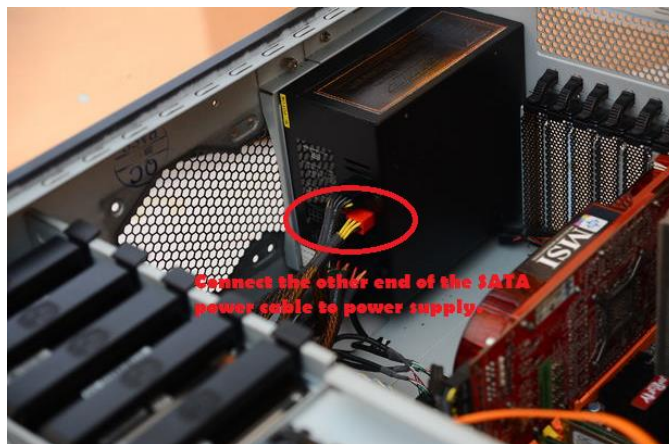
1.5 Connect the SATA power cable to the CD-ROM drive.





**Connect SATA Cable**

1.6 Connect the other end of the SATA power cable to the power supply.



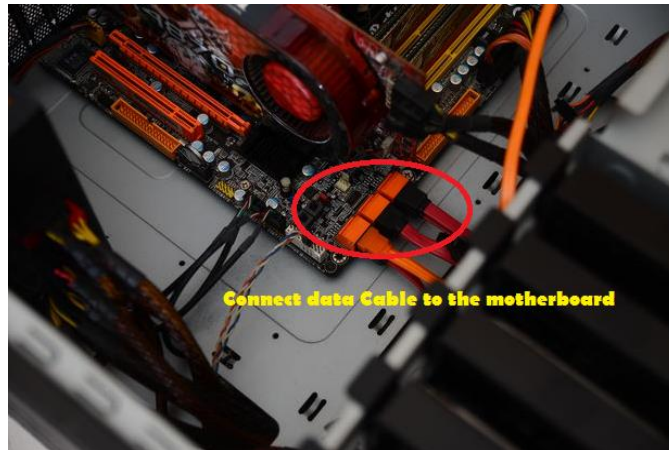
**Connect SATA Cable to Power Supply**

1.7 Connect the SATA data cable to the CD ROM drive.



**Connect Data Cable**

1.8 Connect the other end of the SATA data cable to the motherboard.



**Connect Data Cable to Motherboard**

10. After installing the CD-ROM drive and the cables, close the CPU casing again.

## 2. Installing Keyboard

### Installing PS/2 Keyboard

2.1 Connect the keyboard to the PS/2 port on the back of the computer.

2.2 At the back of the computer there are two PS/2 ports next to each other. Connect the keyboard into the purple connection. If the ports are same color, Look for a small symbol next to the port to identify what one is the keyboard.



**Keyboard PS/2 Port**

### Installing USB Keyboard

Connect the USB keyboard to the USB ports on the back or front of the computer. The computer will automatically (If win 7 installed) detect and install its drivers also.



### Install Software and Drivers

If the keyboard has any special features such as a built on touch pad or special buttons or is wireless, for these features to work properly, the software and drivers for the keyboard must be installed after the computer keyboard has been connected to the computer.

### 3. Installing Mouse

#### PS/2 Mouse

##### Do you know!

Keyboard port color is green and mouse port color is purple.

- 3.1 Connect the mouse to the PS/2 port on the back of the computer.
- 3.2 Connect the mouse into the teal or green connection. Or Look for a small symbol next to the port to identify which one is the mouse.

#### USB Mouse

Connect the USB mouse to the USB ports on the back or front of the computer.



#### 4. Installing a Printer

A printer does not work without driver. If driver is not available then it can be downloading from internet.

#### Connecting the Printer to the Computer

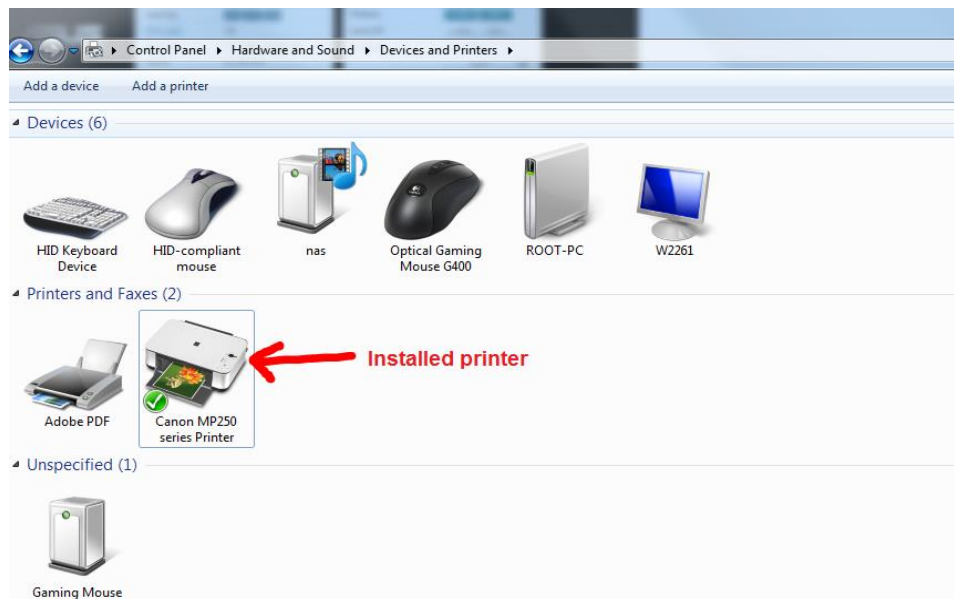
Connect the printer to the computer either using a USB cable, parallel port cable, or SCSI cable and then connect the power plug to a power outlet.

#### Setup Printer and Install Software

1. After everything has been plugged in turn the computer on.
2. Insert the CD that came with the printer. If the CD does not automatically start, open **My Computer**, double-click on the **CD drive**, and then click the **Setup** or Install file.
3. If you have downloaded the drivers, run the downloaded **setup file**.
4. Follow the installation wizard and once completed, the software is installed.

#### Do you know!

If you do not see your printer in the printer's list, your printer is not installed.

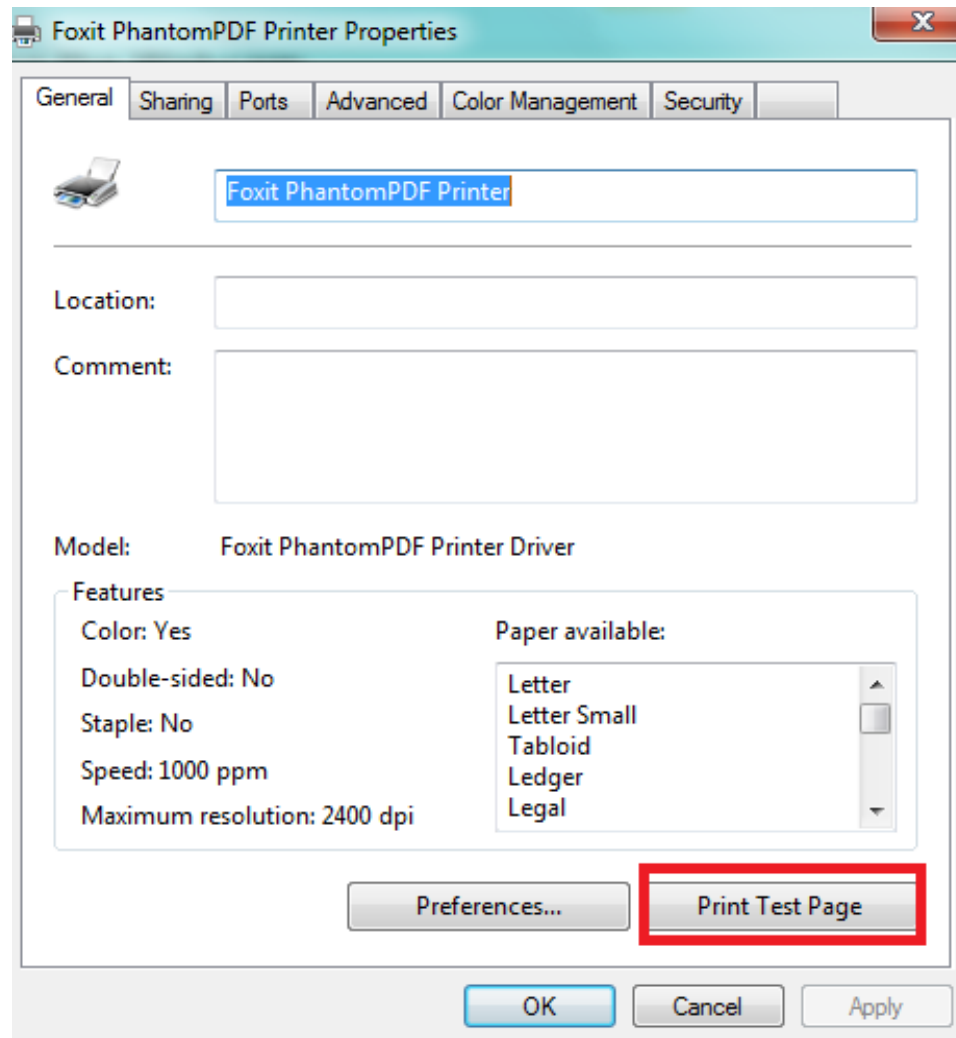


**Installed Printer**

### Testing the Printer

After the printer is installed, Windows is used to print a self-test page to verify the printer is working.

1. Click **Start, Settings**, and open **Control Panel**.
2. Double-click the Printers or **Printers and Fax** icon.
3. Right-click on the Printer wanted to test and click **Properties**. In the Printers **Properties** window, click the **Print Test Page** button.



### Test Print

1. In case of successful installation of printer test page will be printed.

## 2. Installing a Scanner

Before scanning the documents into the computer with a scanner, it needs to install the scanner driver, so that scanner and computer can communicate. Start by connecting the scanner to computer's USB port. **Plug and Play**, a technology that Windows uses to recognize equipment and automatically install and set it up. If a scanner is Plug and Play-enabled, Windows 7 shows a Found New Hardware message in the Taskbar notification. Most Plug and Play devices will then automatically install, the message will change to verify the installation is complete. But now most new peripherals are available with their driver's installation CD.

1. Turn on the scanner.
2. Click the Found New Hardware message, click Yes, This Time Only, and then click Next again.

(You only need to do this step if you don't permit Windows 7 to automatically connect to Windows Update. Otherwise, you don't see the Found New Hardware Wizard.)

3. Insert the driver's CD in CD drive and click next.



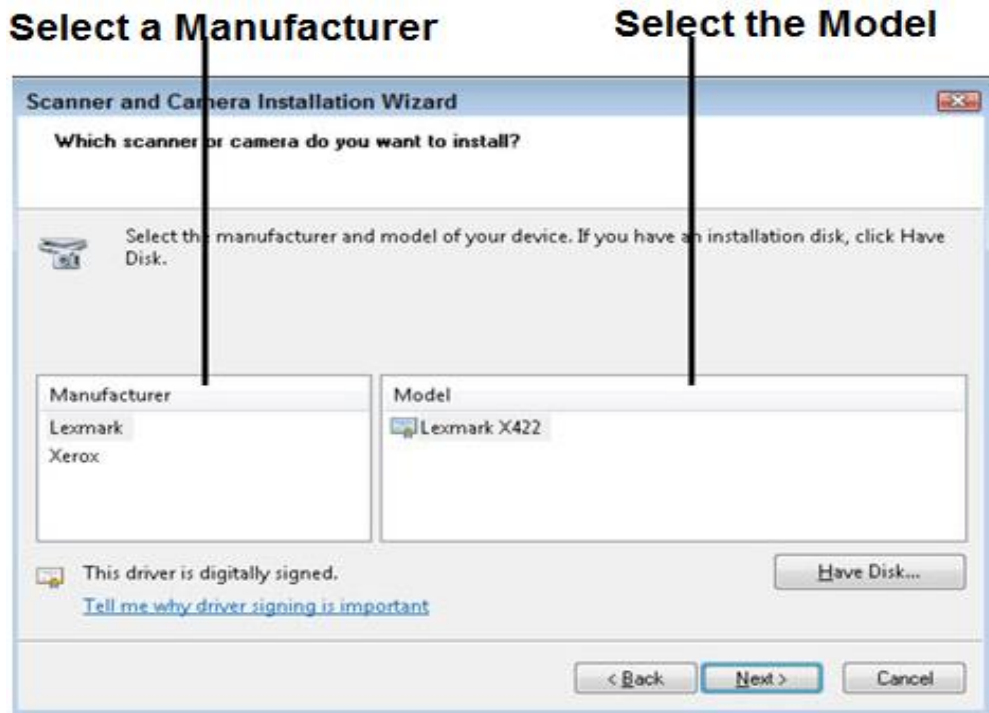
(Windows 7 searches for your scanner driver software and installs it.)

4. Click on start button in search bar type Add Device.
5. Click the Add Device button and then click Next.

(The Scanner and Camera Installation Wizard window appears. When you click Next, the next screen of the wizard appears.)

**Remember**

Installation of web cam manufactured by different companies may differ from these screen shots



**Installing Scanner**

6. Click a Manufacturer in the list on the left and then click a model in the list on the right.

(Now it's just a matter of following the wizard directions based on the model of scanner you choose and whether you have a manufacturer's disc (a CD- or DVD-ROM). If you don't have a disc, Windows can help you download software from the Internet.)

7. Click Finish when the wizard ends
8. Now the installation is complete and scanner is ready to use

**3. Installing a Webcam**

1. Plug the webcam into a USB port of the computer.
2. Wait for the webcam to be installed automatically. Most operating systems will automatically detect and install the necessary software for the webcam. If this doesn't happen, then it may be prompted to search for the webcam drivers. Operating system can usually search online automatically.

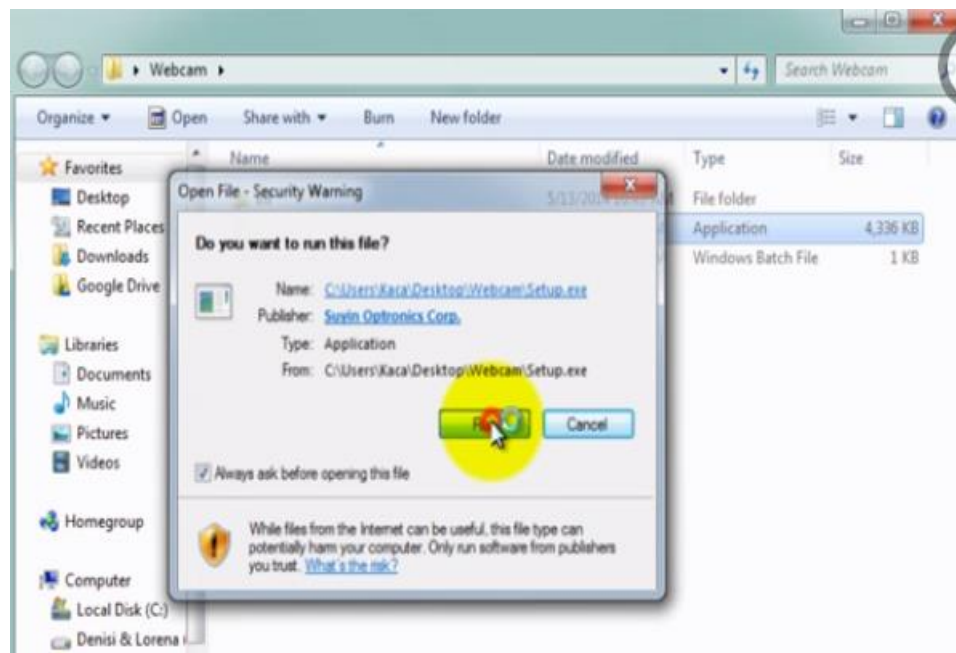
**Installing the Software on the Disc that Came with the Webcam:**

1. Put the CD into the drive. Open the CD ROM drive from My Computer.

2. Double click on the Setup.

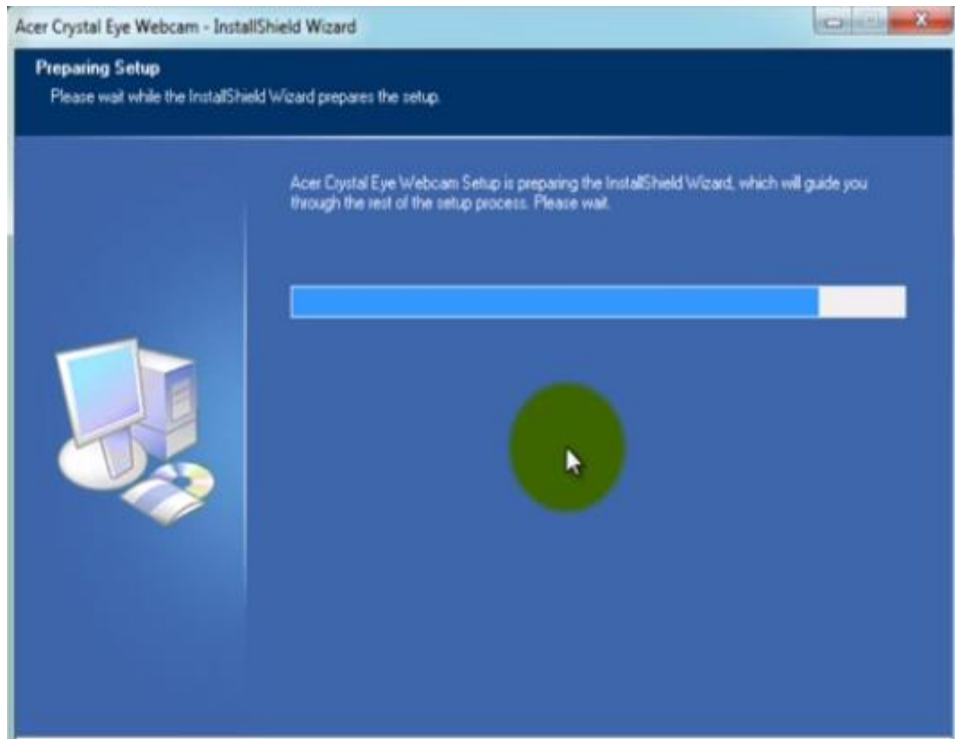


5. A dialogue box will be open. Click on Run.



6. The setup will be installed using wizard. Just click on Next, Next and the driver will be installed.





### Installation Wizard

7. The driver will be installed and the webcam is ready to use.

### Testing the Webcam

1. Open a program that will use your webcam (Skype, yahoo messenger, Hangouts, etc.). This will allow you to see if your webcam is working properly.
2. Open the Video Settings menu. The process for this, varies depending on the program you are using. In Skype, for example, click Tools and select Options. Click "Video settings". You will see an image from your webcam appear in the window.

## Learner's Activity

- Install printer on your computer and print test page.
- Install the driver of webcam and test it using Skype.
- Install the CD ROM drive into your computer. Also remember safety precautions. Like plug out the Computer power cable before installation. And install the drive slowly.

# Learning Unit 4: Install Software Applications

## Overview

### Do you know!

Applications software also called *end-user programs*.

Application software is a type of software that can be used for a variety of tasks. It is not limited to one particular function. This learning unit covers different types of application software and procedure of installing software. After completion of this learning unit you will be able to describe various types of application software and how to install this software.

## 1. Different Software Applications

### Application

An application is a program, or group of programs, that is designed for the end user.

Application software is the software that is used at offices, home and school. Application software consists of programs like word processing, spreadsheets, Database, Graphics software, designed to perform specific tasks for users. Application software are used as a productivity/business tool, to assist with graphics and multimedia projects, that supports home, personal, and educational activities. Specific application software products, called software packages, are available from software vendors. Although application software also is available as shareware, freeware, and public-domain software, these usually have fewer capabilities than retail software packages. It provides many features like formatting text, creating charts, organizing table's data, saving records.

There are many reasons of using these software's.

1. It is very cheap.
2. It is easily available from internet or computer shops.
3. There will be lots of user support available for users like books, user guides, online help and discussion forums.

### Examples and Use of Application Software:

1. **Word Processing Software (Microsoft Word)**  
Used for writing letter, applications, reports, memos etc.
2. **Spreadsheet Software (Microsoft Excel)**  
Used for keeping simple company accounts, Employees salary calculations, simple stock control system.
3. **Database Software: (Microsoft Access)**  
To create/prepare costumers database, Employees database, etc.
4. **Publishing Software ( MS Publisher)**  
Used for designing posters, leaflets, business cards.
5. **Presentation Software (MS PowerPoint)**  
Used for graphically representation of data.
6. **Graphics Software ( Adobe Photoshop, Corel draw)**  
Used for retouching or manipulating images for business or personal use.

### 7. Web Design Software ( PHP, Adobe Dream Viewer)

Develop/create personal or business websites.

### 8. Entertainment Software

Used for entertainment of the users like games and media players.

## 2. Precautions for Installing Application Software

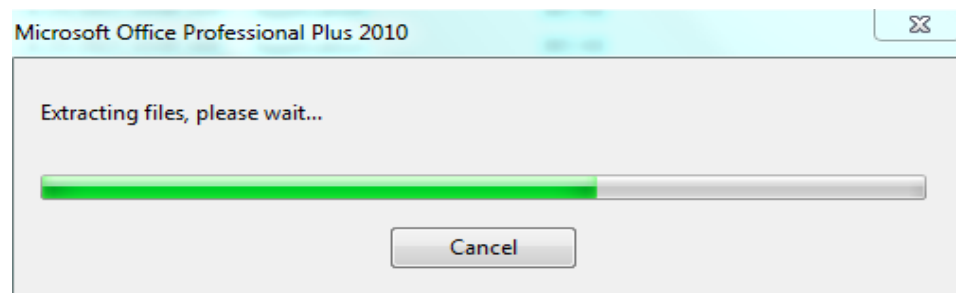
1. Install the software which you really need.
2. Check whether enough disk space or resources to run this software.
3. Check is there any conflicting software on your computer.
4. Always read online reviews about the software.
5. Investigate the software developer or company and their reputation.
6. Check out removal options before installing.
7. Always create System Restore Point before installation.
8. Always select Custom installation.
9. Always uncheck installation of extras.
10. Install to the default directory.
11. Always uncheck installation of 3rd party toolbars, etc.
12. Don't forget to select "Restart later" option at the end.

## 3. Installing Microsoft Office 2010

### Step by Step Installation of Microsoft Office 2010:

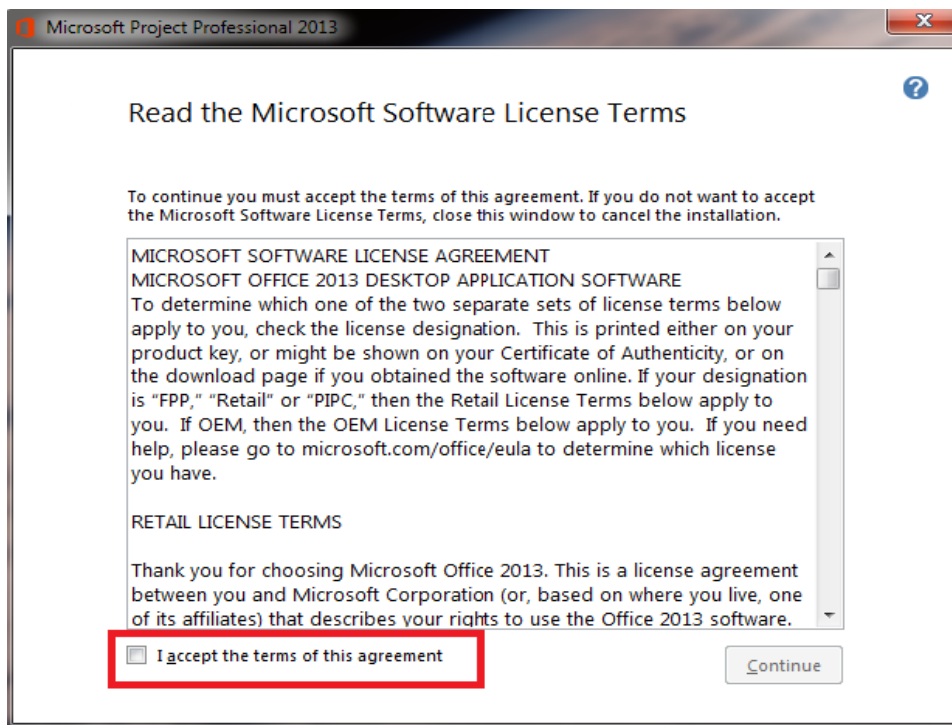
Installation of Microsoft office 2010 is very easy. If you running an earlier version of Office, such as Office 2007 the process will also upgrade you to Office 2010.

1. Insert the office 2010 DVD or double click on the downloaded setup.exe file, you will see the option



### Extracting Files

2. Then a window will appear simply pop a tick in the accept license conditions and click continue.

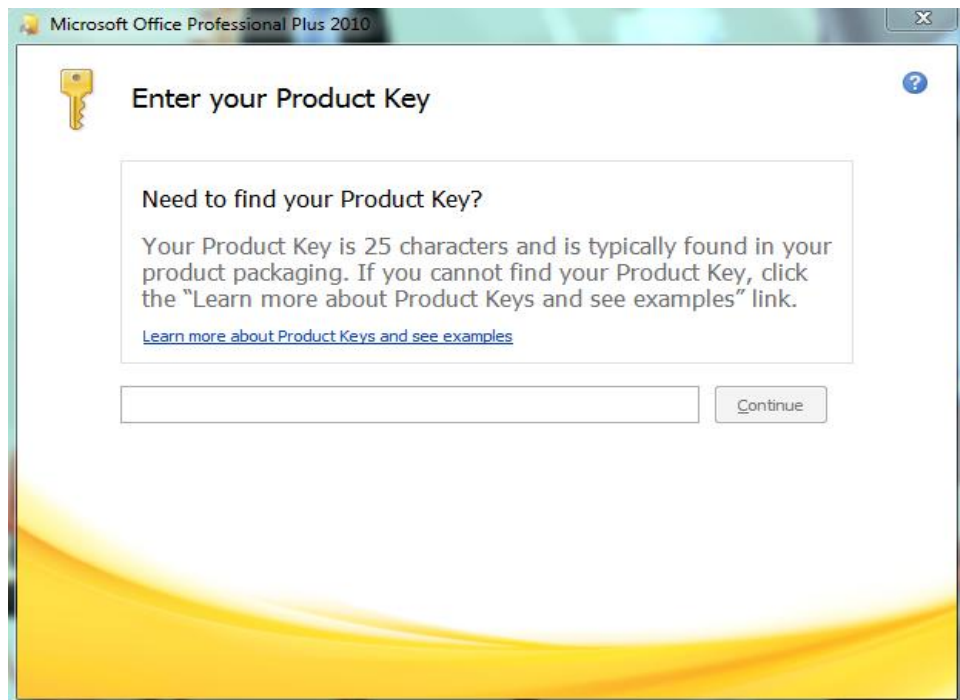


### Accepting License Agreement

3. Then it will ask about the product key.

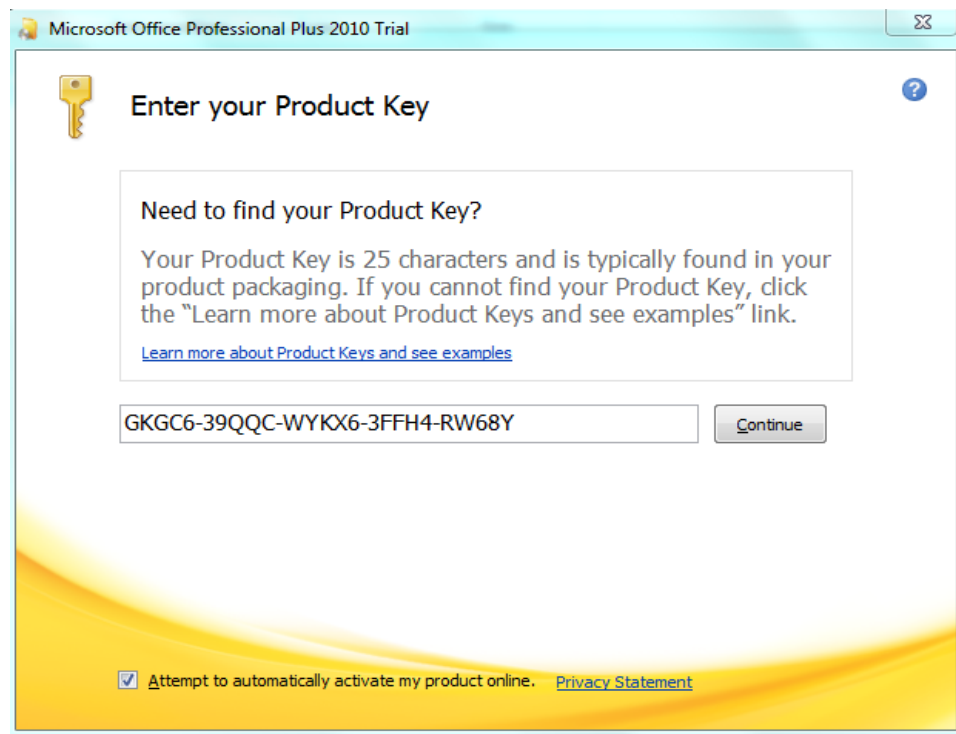
#### Remember

You can also download latest version MS office 2013 trial version of 90 days from Microsoft website.



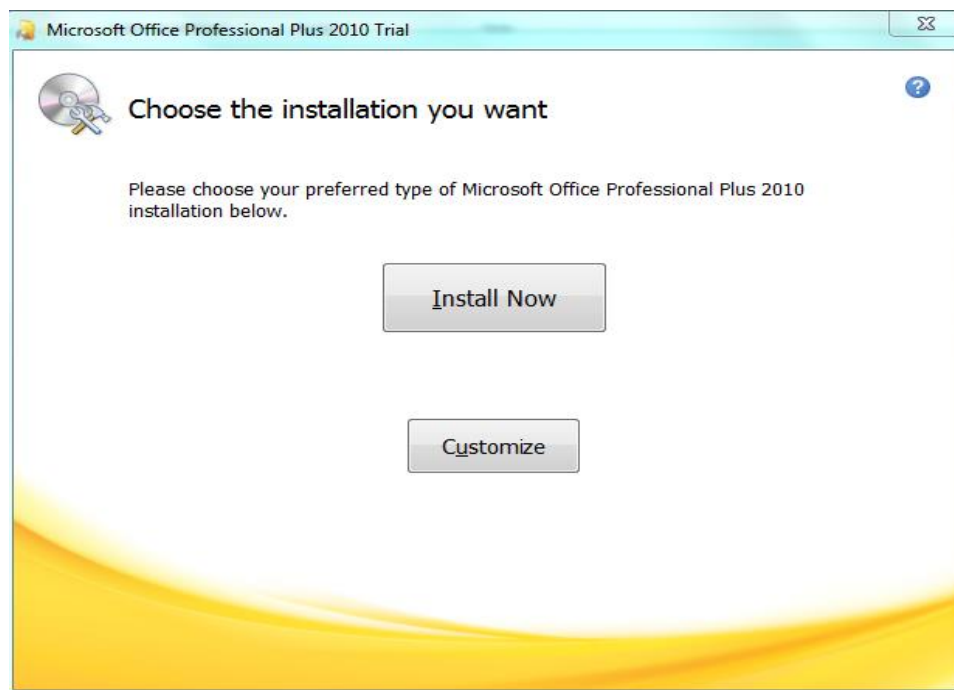
### Asking for Product Key

4. Copy the product key from the text file given in the CD and paste it in the given box. Or if it is a downloaded setup the product key text file will be available with it.



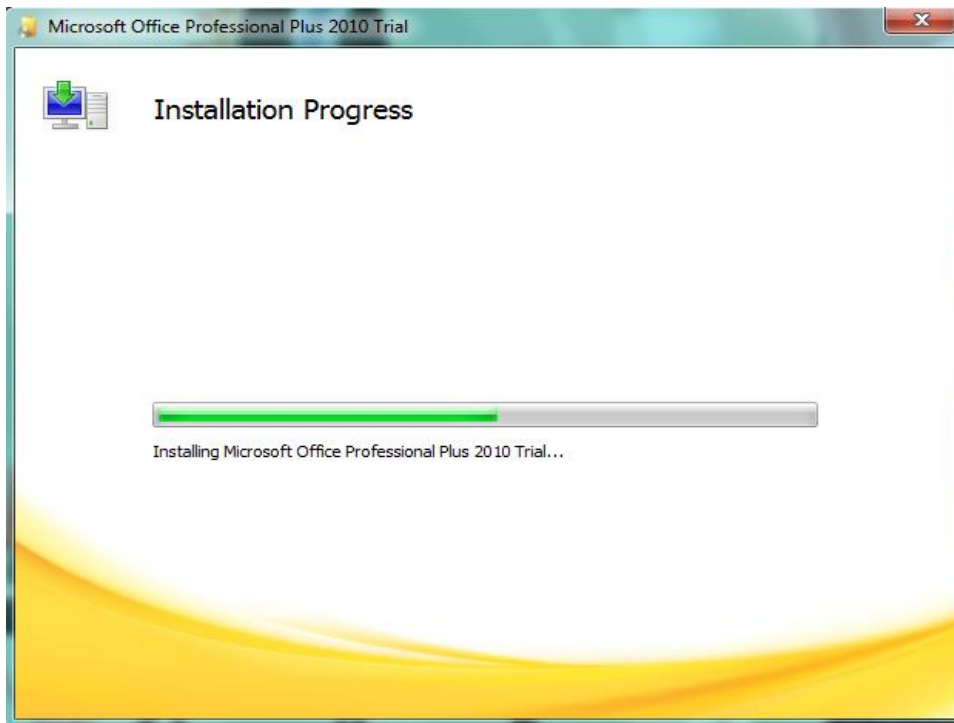
### Giving Product Key

5. You now get the option to run the default install or a custom install as seen below.



### Select Install Now

6. Now the installation process will be start and it will take several minutes for completion of installation.



### Processing Installation

7. After this the completion of installation window will appear.



### Completing Installation

Now the installation is completed and your software is ready to use.

## Learner's Activity

- What are some examples of application software's you have on your computer?
- Install MS Office 2010 using CD/DVD on your computer.
- Install VLC media player on your computer



# Learning Unit 5: Update/ Upgrade Software Application

## Overview

### Remember

Microsoft Office is an office suite of desktop applications.

A software update means to enhance the capability, stability and features of an existing version of the software. Updates usually download free of cost while upgrading means replace an older version of the same product with the newer version. Typically, software upgrades available by software vendors at a discount to prevent users from switching to other products. This learning unit covers the procedure for updating software manually and upgrading a software using CD, searching and downloading software that are available online also describe different versions of software. After completion of this

learning unit you will be able to demonstrate the procedure of installing updates and upgrades manually, automatically or from CD.

## 1. Various Versions of Application Software

### Microsoft Office application Software:

Microsoft Office is an office suite of desktop applications, servers and services for Microsoft's Windows and Apple's OS X operating systems. Over the years, Office applications have grown substantially closer with shared features such as a common spell checker, OLE data integration and Visual Basic for Applications scripting language.

### Version History of Microsoft Office:

#### Microsoft Office for Windows

Microsoft Office for Windows started in October 1990 as a bundle of three applications designed for Microsoft Windows 3.0, Microsoft Word for Windows 1.1.

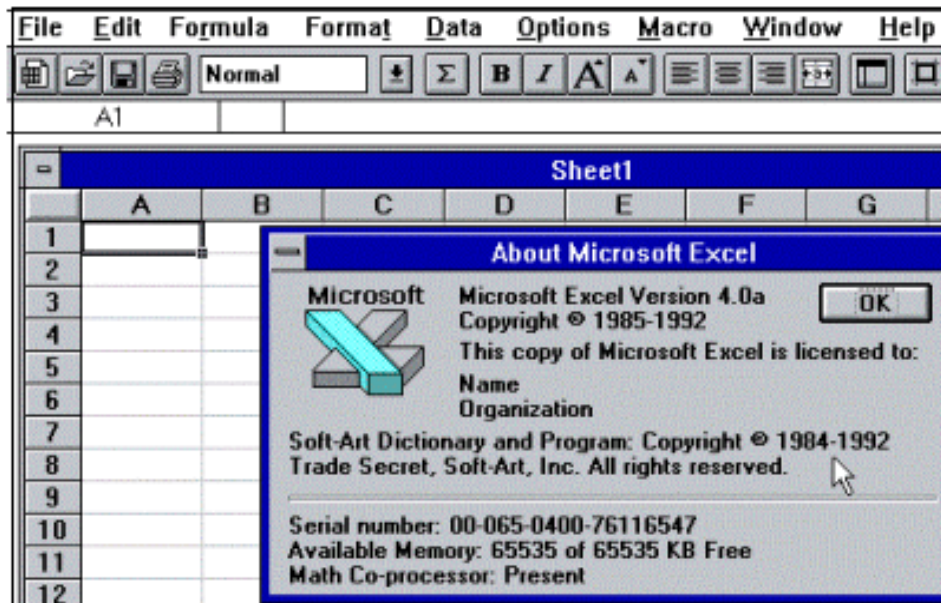
Microsoft Excel for Windows 2.0, and Microsoft PowerPoint for Windows 2.0.

Microsoft Office for Windows 1.5 updated the suite with Microsoft Excel 3.0.

Version 1.6 added Microsoft Mail for PC Networks 2.1 to the bundle.[66]

#### Microsoft Office 3.0

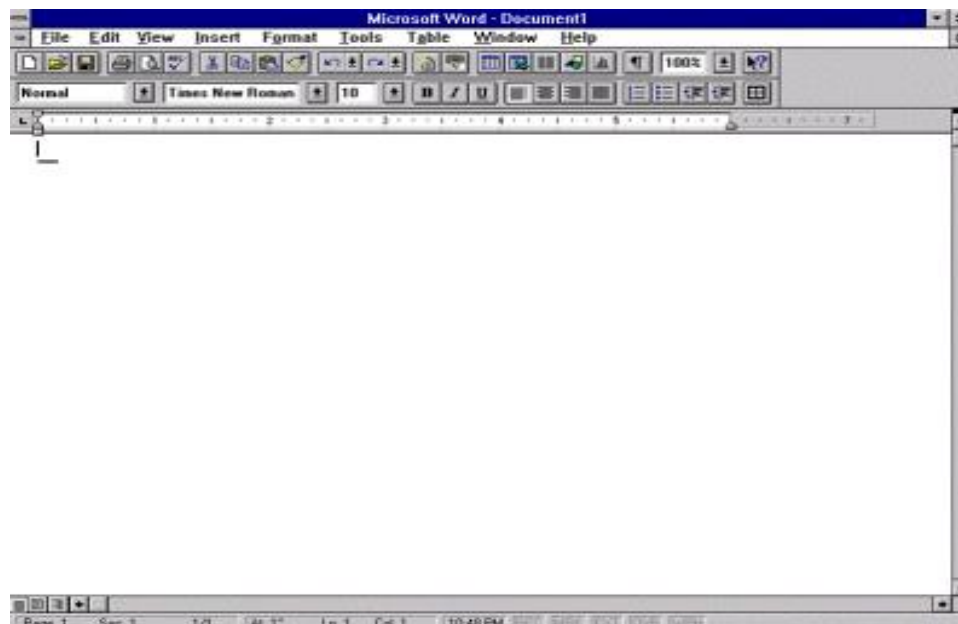
**Microsoft Office 3.0**, also called Microsoft **Office 92**, was released on **30 August 1992**, contained **Word 2.0**, **Excel 4.0**, **PowerPoint 3.0** and Mail 3.0. It was the first version of Office also released on **CD-ROM**. In **1993**, The Microsoft Office Professional was released, which added Microsoft Access 1.1. It was look like this :



Layout of MS Office 3.0

### Microsoft Office 4.X

Microsoft Office 4.0 was released containing **Word 6.0**, **Excel 4.0a**, **PowerPoint 3.0** and **Mail** in 1993. Microsoft Office 4.2 for Windows NT was released in 1994. Microsoft Office 4.2 (**Standard Edition**) and 4.3 (**Professional Edition**) were released as the last 16-bit version and so the last to support Windows 3.x, containing **Word 6.0**, **Excel 5.0**, **PowerPoint 4.0**. Office 4.2 is the **Standard Edition**, 4.3 the **Professional Edition**, which also includes **Access 2.0**.



Layout of MS Office 4.X

### Microsoft Office 95

Office 95 was available in two versions, **Office 95 Standard** and **Office 95 Professional**. The standard version consisted of Word 7.0, Excel 7.0, PowerPoint 7.0, and Schedule+ 7.0. The professional edition contained all of

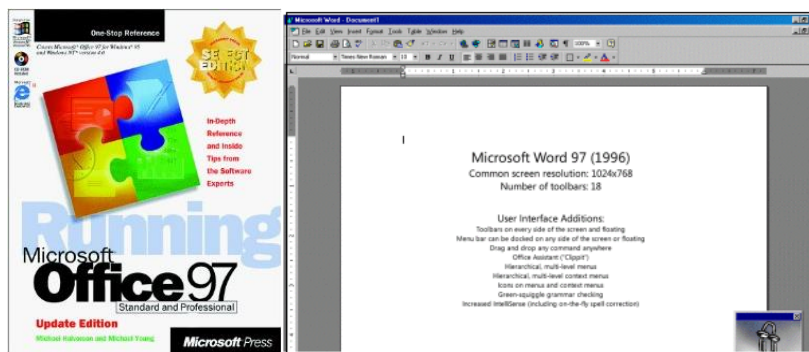
the items in the standard version plus **Microsoft Access 7.0**. If the professional version was purchased in CD-ROM form, it also included Bookshelf.



Layout of MS Office 95

### Microsoft Office 97

Microsoft Office 97 (Office 8.0), included hundreds of new features and improvements, and introduced command bars, menus and toolbars. Office 97 also featured Natural Language Systems and grammar checking. Office 97 was the first version of Office to include the Office Assistant.



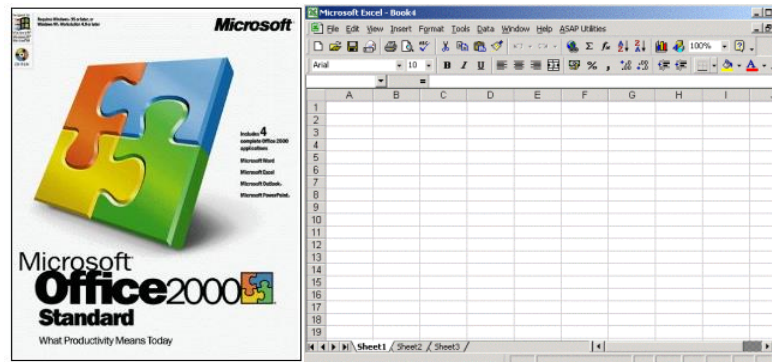
Layout of MS Office 97

### Microsoft Office 2000

**Do you know!**

Office 2000 is the last version to support Windows 95.

Microsoft Office 2000 (Office 9.0) introduced adaptive menus, where little used options were hidden from the user. It also introduced a new security feature, built around digital signatures, to diminish the threat of macro viruses.



Layout of MS Office 2000

### Microsoft Office XP

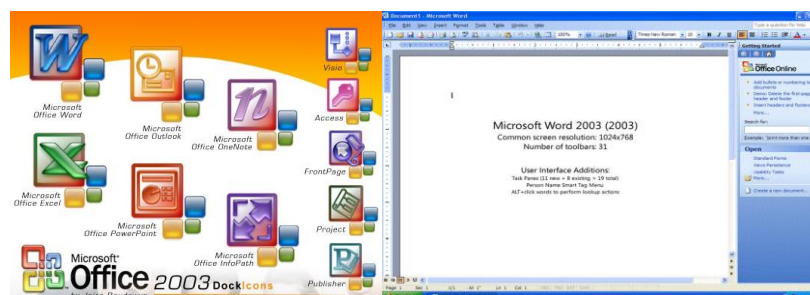
Microsoft Office XP (**Office 10.0 or Office 2002**) was released in conjunction with Windows XP, and was a major upgrade with great enhancements and changes over Office 2000. Office XP introduced the Safe Mode feature, which allows applications such as Outlook to boot when it might otherwise fail. Safe Mode enables Office to detect and either repair or bypass the source of the problem, such as a corrupted registry or a faulty add-in. Smart tag is a technology introduced with Office XP. It was the first version to require Product Activation as an anti-piracy measure, which attracted widespread controversy.



Layout of MS Office XP

### Microsoft Office 2003

Microsoft Office 2003 (Office 11.0) was released in 2003. It featured a new logo. Two new applications made their debut in Office 2003: Microsoft **InfoPath** and **OneNote**.



Layout of MS Office 2003

#### Do you know!

2003 is the last Office version to support Windows 2000.



## Microsoft Office 2007

Microsoft Office 2007 (Office 12.0) was released in 2007. Office 2007's new features include a new graphical user interface called the Fluent User Interface, replacing the menus and toolbars that have been the cornerstone of Office since its inception with a tabbed toolbar, known as the Ribbon; It is the last version to support Windows XP and Server 2003.



Layout of MS Office 2007

## Microsoft Office 2010

Microsoft Office 2010 (Office 14.0, because 13.0 was skipped was finalized on 15 April 2010, The main features of Office 2010 include the backstage file menu, new collaboration tools, a customizable ribbon, protected view and a navigation panel. This is the first version to ship in 32-bit and 64-bit variants. Service Pack 1 for Office 2010 was released on 28 June 2011.

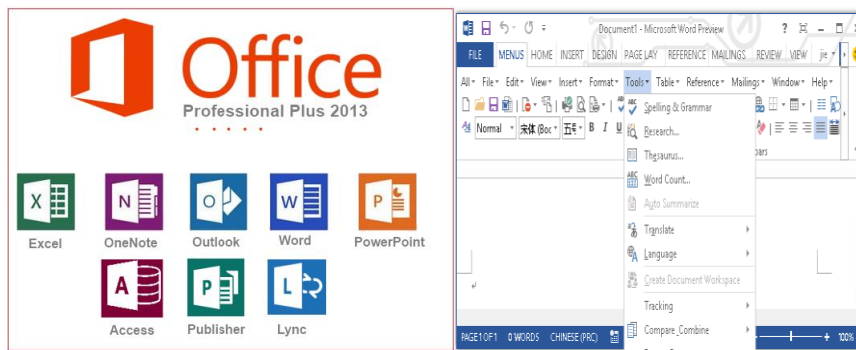


Layout of MS Office 2010

## Microsoft Office 2013

A technical preview of Office 2013 was released on 16 July 2012, the interface is based on Metro, (the interface of Windows Phone and Windows 8). Microsoft Outlook has received the most pronounced changes so far; for example, the Metro interface provides a new visualization for scheduled tasks. PowerPoint includes more templates and transition effects, and OneNote includes a new splash screen. On 16 May 2011, new images of Office 15 were revealed, showing Excel with a tool for filtering data in a timeline, In Word, the capability of inserting video and audio online as well as the broadcasting of documents on the Web were implemented.

On 24 October 2012, Office 2013 Professional Plus was released for download. On 15 November 2012, the 60-day trial version was released for public download.



Layout of office 2013

**Do you know!**

In Ms office 2013 edited documents can be saved as PDF files also.

## 2. Precautions for Installing Updates of Software

It is necessary to take precautions before installing updates or upgrade any software.

1. Install updates from a CD or from any known and familiar/secure source.
2. Check whether it is a spam or legal software.
3. Before installing or upgrading software take a backup of your data to an external source or hard drive/ other drive (e.g. D, E).
4. Check out removal options before installing.
5. Always create System Restore Point.
6. Always select Custom installation.
7. Always uncheck installation of extras.
8. Always uncheck installation of 3rd party toolbars, etc.
9. Don't forget to select "Restart later" option at the end.

## 3. Applications Available Online

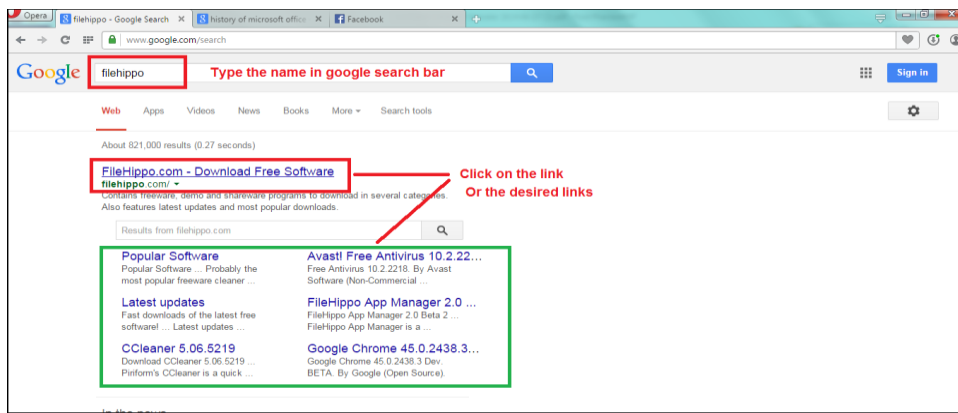
There are millions of software applications available online that can be easily downloadable, also many sites available on Google through which you can download these Software. Most famous of them are Filehippo.com, Google search, Softpedia.com, softonic.com and many more. These are the trusted sites for downloading software applications. There is less chance of malware or spam on it.

### For Searching Online Application Software:

1. Open the browser
2. Click on the address bar and type Google search or you can directly open the filehippo.com by typing [www.filehippo.com](http://www.filehippo.com) OR [www.google.com](http://www.google.com).

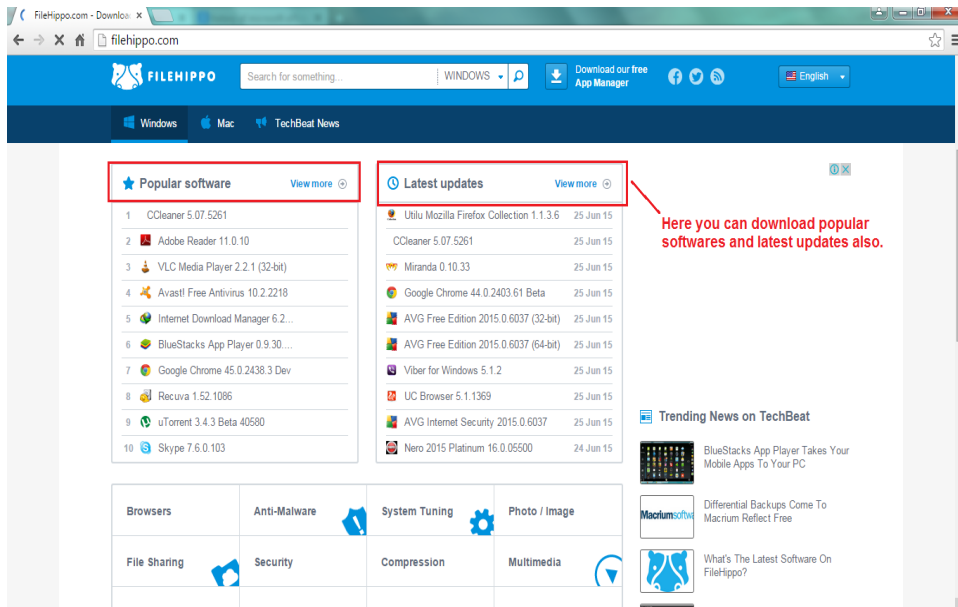
**Remember**

There are many other websites available for downloading software but these may not be trust worthy.



### Searching for Online Applications

- The filehippo.com will be open. Here you can download most popular software and updates also.

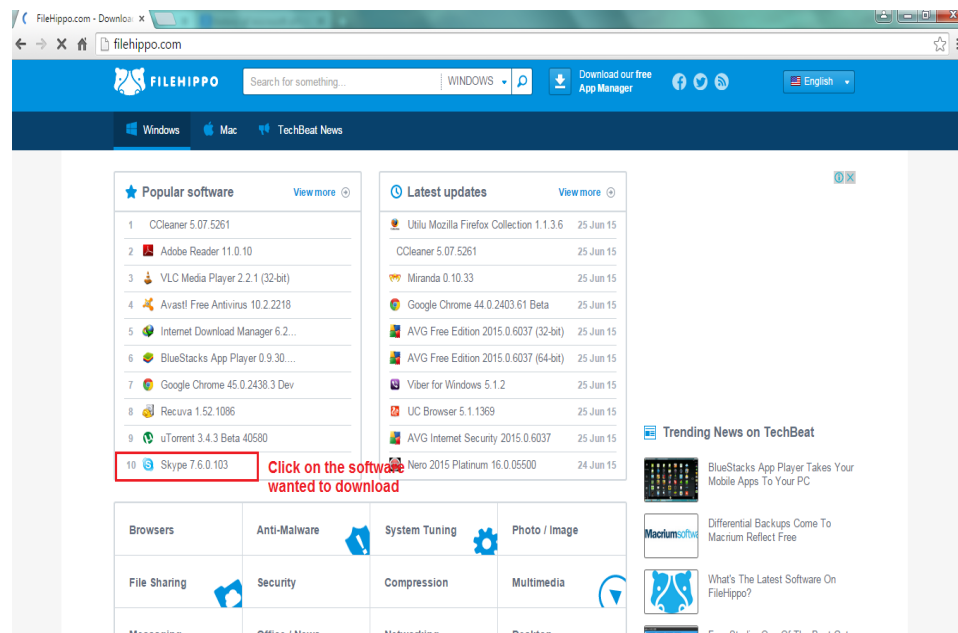


### Checking for Software and Updates

From this website you can download most commonly known software like **fire fox**, **Opera**, **Google chrome**, **VLC media player**, **AVG antivirus**, **Skype**, **Adobe Reader** and many more. You can also search for a specific website by typing the name of the software in its search bar which is given at the top of the page or you can search it in its category that are given below. It is a most popular website for online application software.

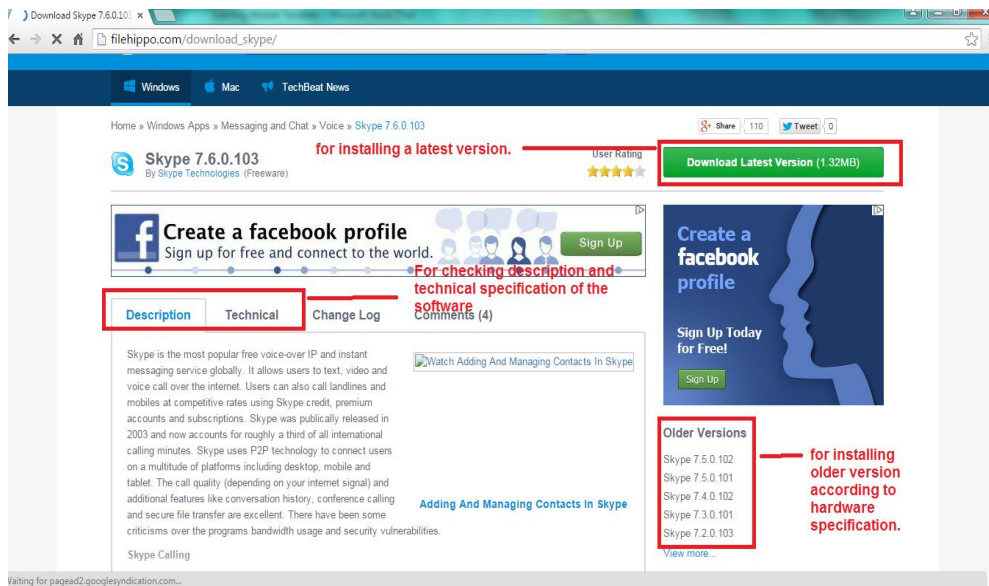
#### Downloading any Application Software Online:

Click on the desired software link that is required. For example download skype.



### Downloading a Software

A page will open here you can download the latest version or older version of the software also can check the specification and technical specifications about the software.



**Remember**

First check the technical description and software vendors then download it.

### Download a Software Latest or Older Version

Download and install the desired software from this website by following these simple steps.



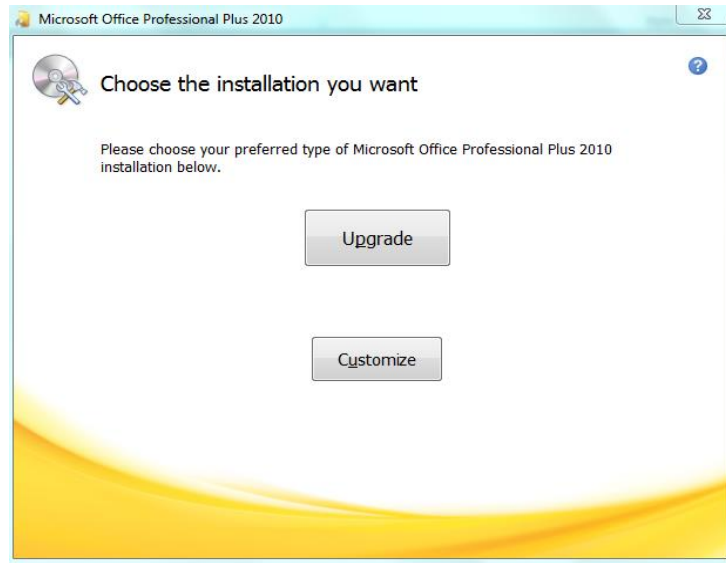
## 4. Upgrading a Software Application through CD

### Remember

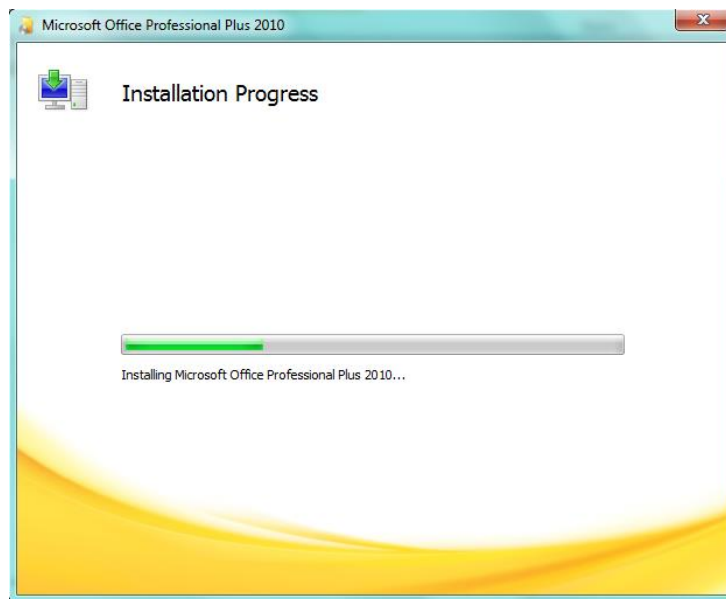
If you can keep both older and newer versions of MS Office at the same time then don't upgrade just install the software?

Upgrading software through a CD/DVD is very easy here you can follow some steps to easily upgrade software. Now we are upgrading MS office 2010 from MS office 2010 Trial version. For this purpose, here are some simple and easy steps to follow:

1. Insert MS office 2010 CD/DVD in the CD/DVD ROM.
2. Run the setup.exe file.
3. A Dialogue box will appear. Check the License agreement box and click Next as like you do in installation process.
4. Now click on Upgrade option.



5. Now the installation will start.



### Installing Updates

6. Now the installation is complete. Click on close button for finishing installation.

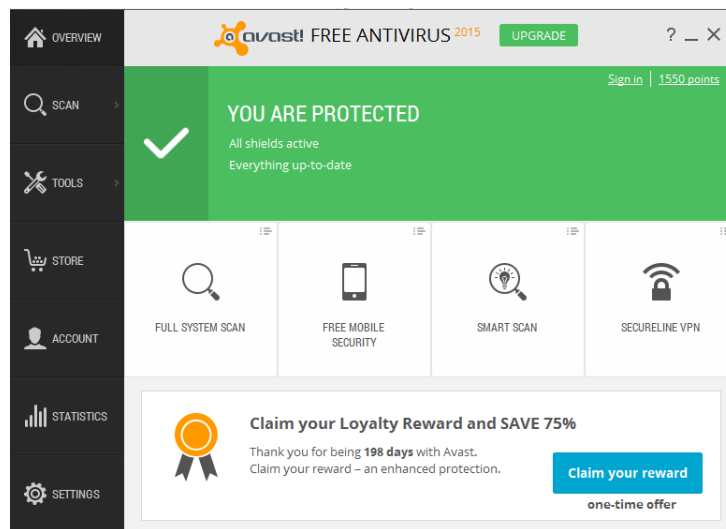


**Installing Updates Completed**

## 5. Installing Updates Manually or Automatically

Software updates can also be installed manually, or automatically. For this purpose open the software which updates wanted to be installed.

Here we are installing updates of Avast antivirus.

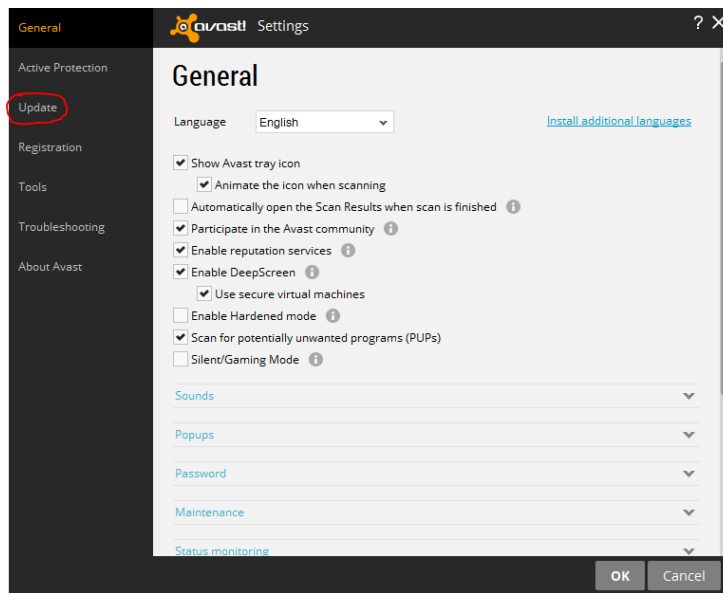


### Remember

Mostly antivirus software available free of cost but it provides limited features.

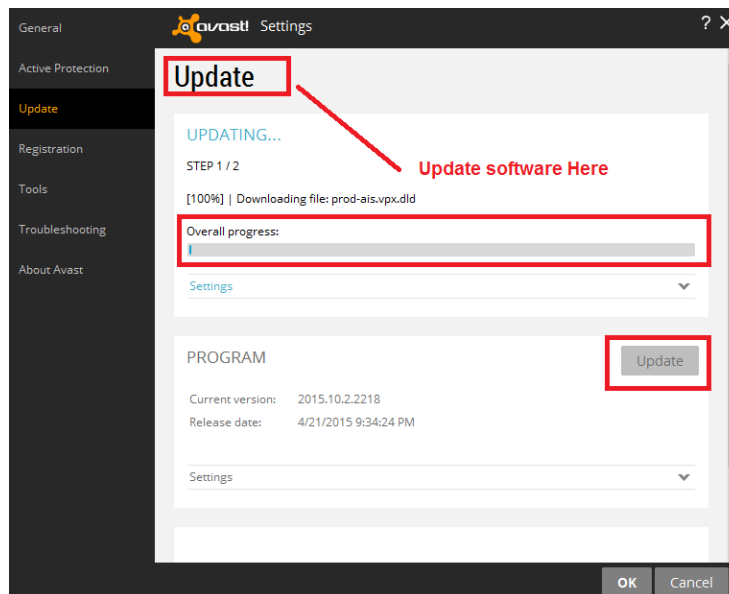
**Opening Avast Antivirus Application**

1. Click on the Settings options. Then click on Updates.



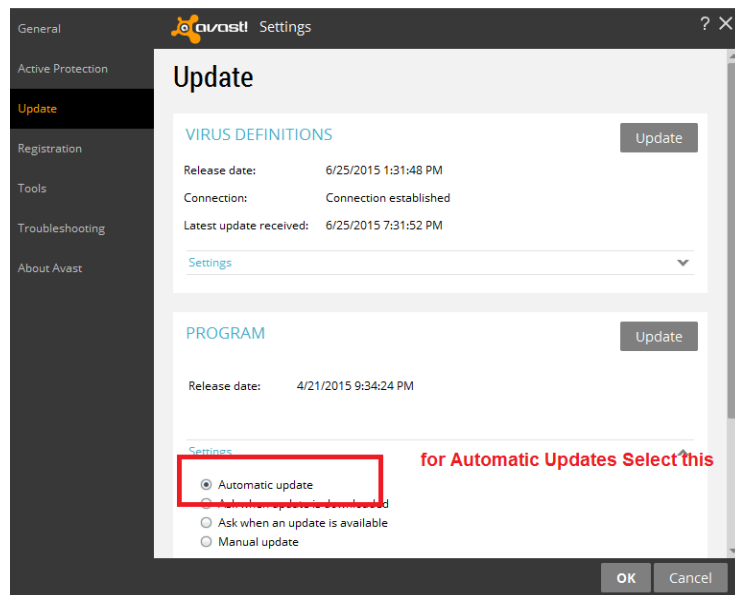
### Selecting Updates Option

2. A window will appear click on Update and the update will be started.



### Updating Software

3. It can also set the option for **Automatic updates** in the settings options.



### Setting Automatic Updates

Every software has its own settings for update but almost they are the same like the above procedure.

## Learner's Activity

- Check out some of the application software online.
- Upgrade any software through CD/DVD on your computer.
- Manually update any software on your computer.
- Install automatic update of any software on your computer.

# Learning Unit 6: Perform Uninstallation of Software

## Overview

The proper way to uninstall a program is to use the uninstall routine that is provided with the program itself. This will remove the files, Windows Registry information, and other configuration from your computer to avoid conflicts in future. This learning unit covers about basic precautions to un-install a software application, how and where to take backup of necessary data files, also demonstrate various features of control panel and the procedure for uninstalling a software from the computer.

### Remember

Don't delete any installed software but always un-install it.

## 1. Necessary Precautions for Uninstalling a Software

Software must be un-installed through a proper way it cannot be removed by deleting its icon from the computer or deleting its folder from windows because a large amount of information regarding configuration left in the Windows Registry as well as files that may be installed in locations other than the program's folder. These files and Registry data may cause conflicts on your computer thus leading to problems.

## 2. Taking Backup of Necessary Files

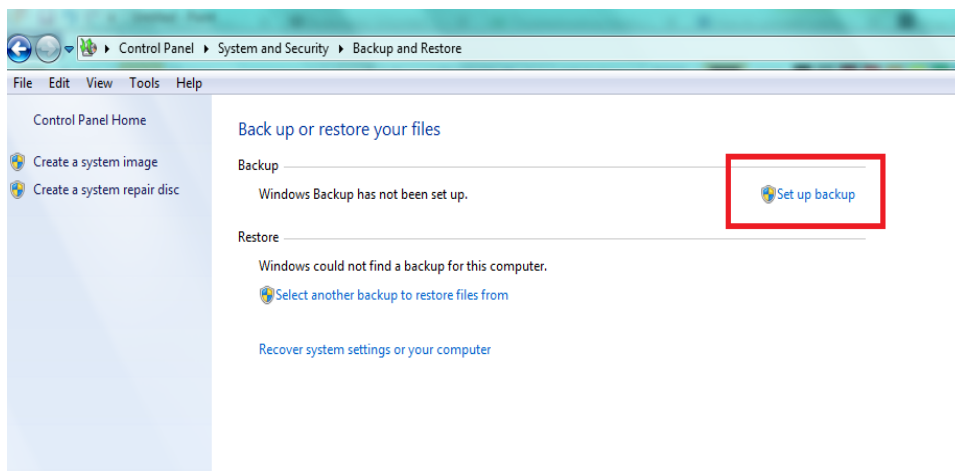
Backup is an important thing for computer users. There are a lot of ways for creating backups it can be created through windows backup or using different types of application software that provide backup facility . There are three common ways of creating backup.

### Do you know!

Some software create temporary files in windows.

### Local Backups

It's important to create local backups to an external drive or another computer. It is a quickest way to create backups.



### Backup

Backup means creating an additional copy of your data for future use.

### Windows Backup Feature

### Online Backup

There are a number of paid online backup services like **Spideroak**, and **Jungledisk**, and there are also some file sync services like **Dropbox** and **SugarSync** that provide backup type of capability. These are all excellent secondary backup services, but probably shouldn't replace a regular backup just because they will take a long time to restore.

## System Image Backups

Rather than simply backing up files, it can create a complete backup of your system that can be restored over top of your system. The only problem with creating these type of backups is that they require a lot of drive space. The best technique is to create an image when your system is up and running and everything is installed, and then you can use it to more easily restore everything rather than reinstalling everything manually.

## What Type of Files should be Backup

The most important files to backup are probably your documents, pictures, music, and other user files, but they are not the only files that you need to backup.

**Documents:** You should backup your entire documents folder all the time.

**Music:** you should back up of your music if you paid lots of money for MP3 downloads, you'll probably be sad to lose them. Make sure to include this folder.

**Pictures & Videos:** The photos might not have actually cost anything, but you'll probably be sadder about losing memories also. So include this folder also in backup.

## Other Files

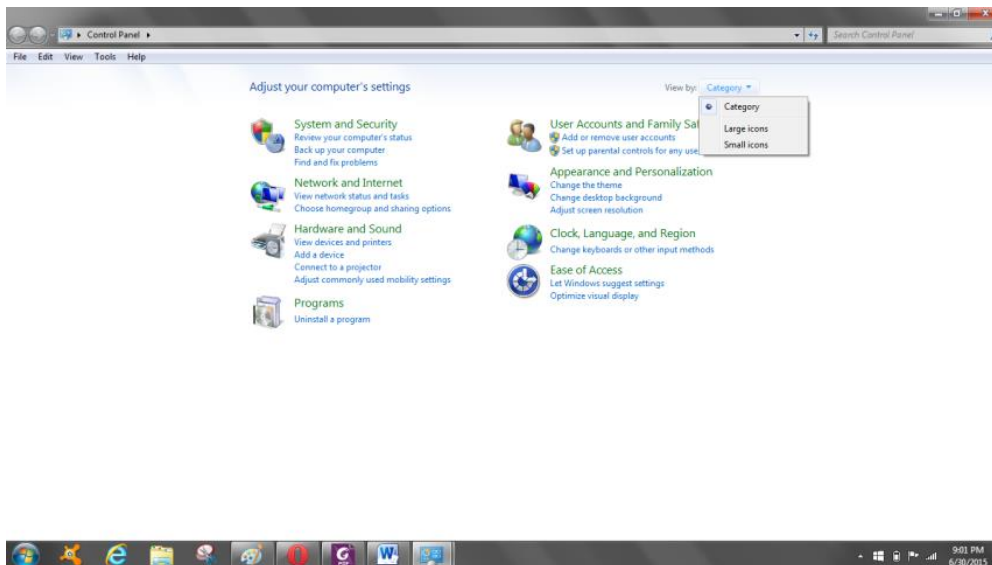
Some other files also have important data like desktop email software, bookmarks and application settings also be backed up for future use.

## 3. Features Available In Control Panel

The Control Panel is a part of the Microsoft Windows which allows users to view, configure and control basic system settings such as adding hardware, adding and removing software, controlling user accounts, and changing accessibility options.

### Features of Control Panel:

There are many features available in control panel which are used for different purposes. There are eight major categories of these features.



### Do you know!

From where in the control panel you can apply password on your account??

## Control Panel Features

### 1. System and Security Category:

This category contains all the tools that are used to perform system, administrative, and security related task.

### 2. Network & Internet Security

The Network and Internet category is the second one in the Control Panel and contains all the tools that are used to check the status of the network, change settings, set preferences for sharing files and computers, configure Internet connections, and much more.

### 3. Hardware and Sound

This category contains all the tools that are used to add and remove printers and other hardware, change system sounds, configure AutoPlay, manage power, update drivers, and more.

### 4. Programs Category

This contains all the tools that are used to uninstall programs or Windows features, manage gadgets, and more.

### 5. User and Family Safety

This contains all the tools that are used to change user account settings and passwords, set up parental controls, manage credentials, and more.

### 6. Appearance and Personalization

**This category contains all the tools that are used to change the appearance of desktop items, apply various desktop themes, screen savers, and customize the Start menu or Taskbar, and more.**

### 7. Clock, Language and Region Settings

The Clock, Language, and Region category is the seventh one in the Control Panel and contains all the tools that are used to change date, time, language, numbers, currency, and more

### Remember

You can apply Parental controls from control panel to prevent children from restricted computer over usage.



## 8. Ease of Access Center

### Do you know!

How many languages are available with windows 7??

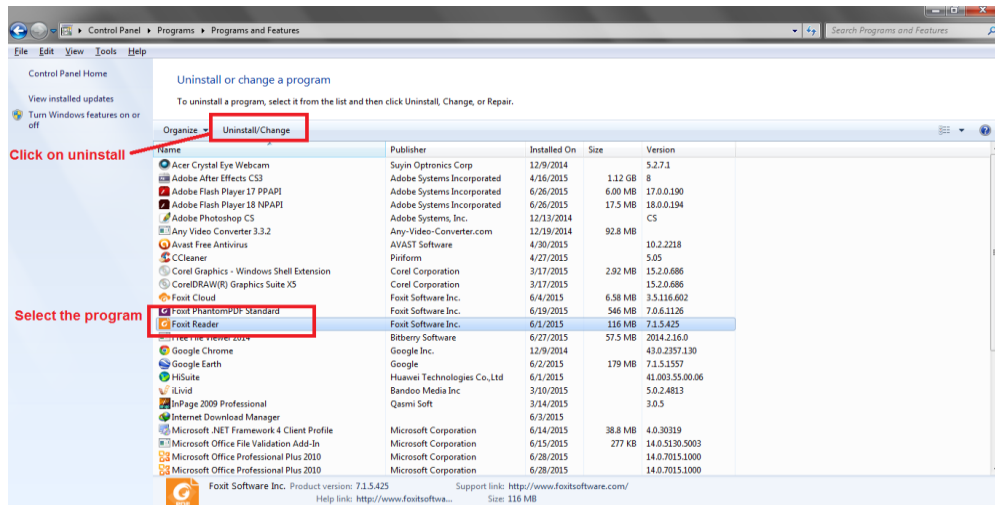
The Ease of Access category is the eighth one in the Control Panel and contains all the tools that are used to adjust your computer settings for vision, hearing, and mobility as well as configure speech recognition to control your computer with voice commands.

## 4. Procedure for Uninstalling a Software

1. Click on **start** button.
2. Click on control panel.
3. Click on programs and features.
4. **Select** a program, and then click **Uninstall**. Some programs include the option to change or repair the program in addition to uninstalling it, but many simply offer the option to uninstall. To change a program, click Change or Repair.

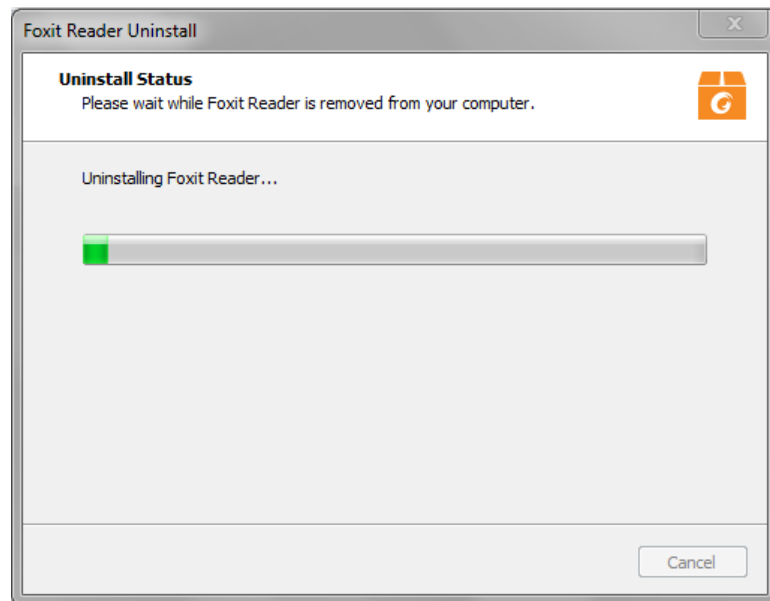
### Remember

Uninstall software using Program and features option from control panel.



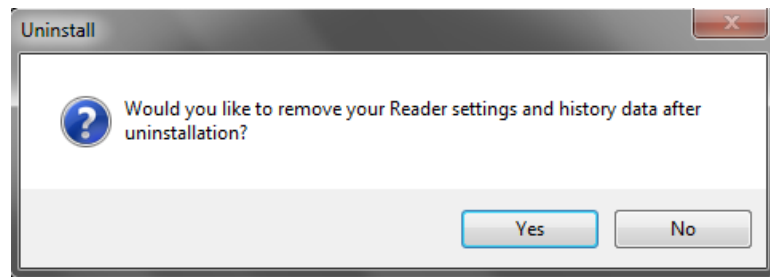
## Uninstalling a Software

5. A dialogue box will appear for uninstallation.

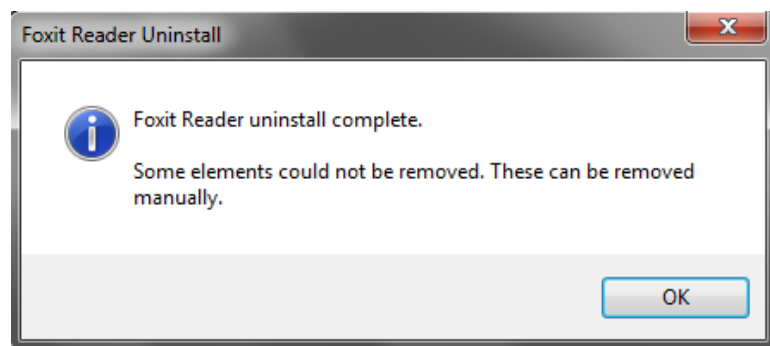


### Completing Uninstalling a Software

6. Then another dialogue box will appear for asking Do you want to remove History.



7. Click on Yes.
8. Then click on OK.



Recheck the Programs and Features window, you will find the updated list without this uninstalled software.

## Learner's Activity

- Count & list the major features that are available in Control panel?
- Change the Date and time of your computer?
- Uninstall any unwanted software from computer?
- Change the background of your computer?
- Check and list the installed hardware in your computer??

# Learning Unit 7: Perform Windows Scan

## Overview

Scanning a computer means detect viruses and malwares from the computer. Computer viruses are small software programs that are designed to spread from one computer to another and to interfere with computer functioning. There are many types of viruses like Trojan horses, direct viruses, overwrite viruses, booting viruses. This learning unit covers windows scanning procedure and various types of virus attack. After completion of this learning unit you will be able to demonstrate different types of viruses, Antivirus software programs and the procedure of scanning to secure your system and data.

### Remember

Keep your virus detection software up to date to avoid from viruses attack.

## 1. Precautions to be taken to Perform Windows Scanning

Before performing windows scan the Users should take reasonable precautions to protect the files on their computers, and to protect data as it transits the Internet.

All users should take the following basic precautions:

- Create back up of important files before scanning.
- Use a registered virus scanner on computer.
- Regularly check for, download, and Install security patches from the vendors of the software.
- Use a backup of electricity, like using UPS or stand by generator so that there is no disturbance of electricity during scanning.
- Always use updated virus scanner, if it is not then update it before scanning.
- Don't open suspicious e-mails, especially attachment without scanning.
- Scan your computer for viruses on a regular basis, such as once per week.
- Create a strong password or phrase.

### Do you know!

Internet surfing and Emails are the main source of viruses so be aware of emails asking for personal information.

## 2. Types of Viruses and Spam

### What is Computer Virus?

Computer viruses are small software programs that are designed to effect the files/programs, spread from one computer to another and to interfere with computer functioning. A virus might corrupt or delete data on the computer, or even erase everything on the hard disk.

Computer viruses are often spread by attachments in e-mail messages or instant messaging. That is why it is essential that never open e-mail attachments unless don't know who it's from.

Viruses can be disguised as attachments of funny images, greeting cards, audio or video files. Computer viruses also spread through downloads on the Internet, or from

### Virus

A computer virus or malware is a commonly used term to describe all types of malicious software including Trojans, worms, adware, and spyware.

USB flash data traveler. They can be hidden in illicit software or other files or programs that might download.

## Most Common Types of Viruses and Other Malicious Programs

### 1. Direct Viruses

The main purpose of this virus is to replicate and take action when it is executed. When a specific condition is met, the virus will go into action and infect files in the directory or folder that are specified in the **AUTOEXEC.BAT** file **PATH**. This batch file is always located in the root directory of the hard disk and carries out certain operations when the computer is booted.

### 2. Overwrite Viruses

#### Remember

One method of computer virus infection is "joke" programs.

This Virus deletes the information contained in the files that it infects, rendering them partially or totally useless once they have been infected.

The only way to clean a file infected by an overwrite virus is to delete the file completely, thus losing the original content.

Examples of this virus include: **Way, Trj.Reboot, Trivial.88.D.**

### 3. Booting Viruses

This type of virus affects the boot sector of a floppy or hard disk. This is a crucial part of a disk, in which information on the disk itself is stored together with a program that makes it possible to boot (start) the computer from the disk.

The best way of avoiding boot viruses is to ensure that floppy disks are write-protected and never start your computer with an unknown floppy disk in the disk drive.

Examples of boot viruses include: **Polyboot.B, AntiEXE.**

### 4. Resident Viruses

This type of virus is a permanent which resides in the RAM memory. From there it can interrupt all of the operations executed by the system: corrupting files and programs that are opened, closed, copied, renamed etc.

Examples include: Randex, CMJ, Meve, and MrKlunky.

### 5. Multipartite Viruses

Multipartite viruses are distributed through infected media and usually hide in the memory. Gradually, the virus moves to the boot sector of the hard drive and infects executable files on the hard drive and later across the computer system.

## 6. Macro Viruses

Macro viruses infect files that are created using certain applications or programs that contain macros. These mini-programs make it possible to automate series of operations so that they are performed as a single action, thereby saving the user from having to carry them out one by one.

Examples of macro viruses: **Relax, Melissa.A, Bablas, O97M/Y2K.**

## 7. Directory Viruses

Directory viruses change the paths that indicate the location of a file. By executing a program (file with the extension .EXE or .COM) which has been infected by a virus, are unknowingly running the virus program, while the original file and program have been previously moved by the virus. Once infected it becomes impossible to locate the original files.

### Do you know!

**Spyware** is computer software that is unknowingly installed on a personal computer to collect information about a user.

## 8. Polymorphic Viruses

Polymorphic viruses encrypt or encode themselves in a different way using different algorithms and encryption keys every time they infect a system.

This makes it impossible for anti-viruses to find them using string or signature searches and also enables them to create a large number of copies of themselves.

Examples include: **Elkern, Marburg, Satan Bug, and Tuareg.**

## 9. File Infectors

This type of virus infects programs or executable files (files with an .EXE or .COM extension). When one of these programs is run, directly or indirectly, the virus is activated, producing the damaging effects it is programmed to carry out. The majority of existing viruses belongs to this category, and can be classified depending on the actions that they carry out.

### Do you know!

**Adware** or advertising-supported software is any software package which automatically plays, displays, or downloads advertisements to a computer after the software is installed on it

## 10. Encrypted Viruses

This type of viruses consists of encrypted malicious code, decrypted module. The viruses use encrypted code technique which make antivirus software hardly to detect them. The antivirus program usually can detect this type of viruses when they try spread by decrypted themselves.

## 11. Companion Viruses

Companion viruses can be considered file infector viruses like resident or direct action types. They are known as companion viruses because once they get into the system they "accompany" the other files that already exist. In other words, in order to carry out their infection routines, companion viruses can wait in memory until a program is run (resident viruses) or act immediately by making copies of themselves (direct action viruses).

## 12. Network Virus

Network viruses rapidly spread through a Local Network Area (LAN), and sometimes throughout the internet. Generally, network viruses multiply through shared resources, i.e., shared drives and folders. When the virus infects a computer, it searches through the network to attack its new potential prey. When the virus finishes infecting that computer, it moves on to the next and the cycle repeats itself.

The most dangerous network viruses are Nimda and SQLSlammer.

### Do you know!

A computer worm is a self-replicating computer program. It uses a network to send copies of itself to other computers on the network.

## 13. Nonresident Viruses

This type of viruses is similar to Resident Viruses by using replication of module. Besides that, Nonresident Viruses role as finder module which can infect to files when it found one (it will select one or more files to infect each time the module is executed).

## 14. Stealth Viruses

Stealth Viruses is some sort of viruses which try to trick anti-virus software by intercepting its requests to the operating system. It has ability to hide itself from some antivirus software programs. Therefore, some antivirus program cannot detect them.

## 15. FAT Viruses

The file allocation table or FAT is the part of a disk used to connect information and is a vital part of the normal functioning of the computer.

This type of virus attack can be especially dangerous, by preventing access to certain sections of the disk where important files are stored. Damage caused can result in information losses from individual files or even entire directories.

### Do you know!

Trojans allow an outside user to copy your files, see your browsing history, or even take remote control of your computer.

## 16. Worms

A worm is technically not a virus, but a program very similar to a virus; it has the ability to self-replicate, and can lead to negative effects on your system and most importantly they are detected and eliminated by antiviruses.

Examples of worms include: **PSWBugbear.B, Lovgate.F, Trile.C, Sobig.D, Mapson.**

## 17. Trojans or Trojan Horses

Another unsavory breed of malicious code (not a virus as well) are Trojans or Trojan horses, which unlike viruses do not reproduce by infecting other files, nor do they self-replicate like worms. These are used to steal user information and sometimes take control of your computer.

## 18. Logic Bombs

They are not considered viruses because they do not replicate. They are not even programs in their own right but rather camouflaged segments of other programs.

Their objective is to destroy data on the computer once certain conditions have been met. Logic bombs go undetected until launched, and the results can be destructive.

## 3. Types of Registered Scanning Software

### Most Commonly Used Registered Antivirus Programs:

There are many types of registered scanning software mentioned below:

#### 1. AntiVir Personal

AntiVir by Avira is a light-weight antivirus program offering fast detection of malware. It supports netbooks and is compatible with Windows 2000, XP, Vista, and Windows 7. The free edition of AntiVir is lacking an important protection- defense against known rogues and malicious URLs. Such web protection is only available to paid customers of AntiVir. Free AntiVir will only protect your browsing if the site you have visited websites has malicious content or when you download a known rogue or malware instead of blocking the rogue/malware sites. AntiVir Premium edition is offering more features and protection.

#### 2. NOD32

NOD32 is a powerful antivirus program that offers real-time protection against online threats. The program includes features such as Social Media Scanner, Exploit Blocker, Advanced Memory Scanner, Anti-Phishing, Antispyware, Device control and Gamer Mode.

#### Remember

Some virus is so dangerous that it make the antivirus software also a virus.

#### 3. Norton

Norton Security is the present name of the famous Norton Antivirus. It combines Norton Antivirus and Norton Internet Security to provide with protection from viruses, Internet threats, identity theft, and financial scams. This application is also available for smartphones, protecting them from unwanted access to our messages, contacts and photos.

#### 4. Avast

Avast provides boot-time scanner, Network Shield, and e-mail. The detection capability of AlwilAvast! is very good and you can install the program in any edition of Windows. The installer of Avast is bundled with Google Chrome browser that is not necessary to continue using the antivirus program. Avast is available as freeware and paid editions. The free edition is lacking script blocker, push updates, the enhanced user interface, repairing of executable infected files, and antivirus tasks creation. The current UI of Avast is not attractive but Alwil, the maker of Avast, is planning to release a better UI in the upcoming v5.



## **5. BitDefender**

Windows Defender is the well-known security tool from Microsoft that protects system and data against spyware and other malicious applications. Formerly named “Microsoft AntiSpyware”, Windows Defender is included by default in the latest 3 Windows editions (Vista, 7 and 8) and can be downloaded and installed separately on Windows XP and Windows 2003.

## **6. KasperSky**

Kaspersky Internet Security protects computer against Internet threats. It also includes the traditional real-time anti-virus scanning. The application provides additional layers of protection during financial transactions, such as online banking and shopping, and also while using payment systems.

## **7. Microsoft Security Essentials**

Microsoft Security Essentials is one of the most popular anti-malware programs. It can be installed for free in a licensed copy of Windows XP, Vista, or Windows 7. In Windows 8, Security Essentials is replaced with Windows Defender. For previous versions, Windows Defender works only as an anti-spyware.

## **8. CalmWin**

Clamwin is the Windows version of ClamAV, the main Linux anti-virus on the market. ClamWin is flawed in many ways: it simply scans instead of offering real-time protection, it doesn't really do non-virus malware and it's not exactly easy to use. Still, having ClamWin around doesn't cost anything, and can never have enough scanning tools.

## **9. McAfee**

McAfee Security Scan Plus, and its predecessor McAfee Security Scan, are free diagnostic tools for systems that allow to simply and easily checking anti-virus software, firewall protection, and web security status on computer. This tool runs as a compliment to any existing security software and does not negatively impact the performance of computer.

## **10. ESET Smart Security**

ESET Smart Security is an anti-virus program with features such as personal firewall and anti-theft. The personal firewall protect data while browsing through a public WiFi hotspot. The anti-theft feature lets you track and locate missing/stolen laptop. Also, the Internet security feature protects from fake sites.

## **11. Malware Bytes**

Malwarebytes Anti-Malware is most popular anti-malware solution. First of all, it's reliable. It's a well-known fact that even security professionals resort to using Malwarebytes Anti-Malware in order to accurately detect, block and remove threats.

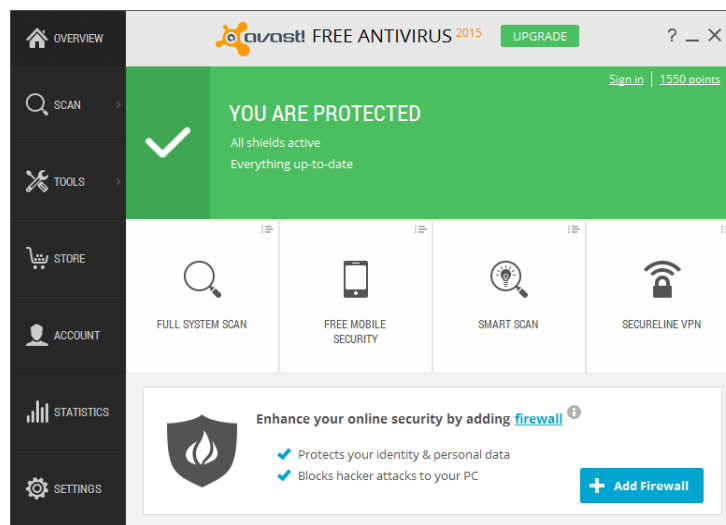
## 12. Symantec Antivirus

Symantec Antivirus provides scalable, secured virus protection for workstations and network servers throughout the enterprise. Enhanced security features plus centralized policy management enable administrators to manage client and server groupings logically. In addition, administrators can create, deploy, and lock down security policies and settings to keep systems up-to-date and properly configured at all times.

## 4. Procedure for Error Free Scanning of Windows

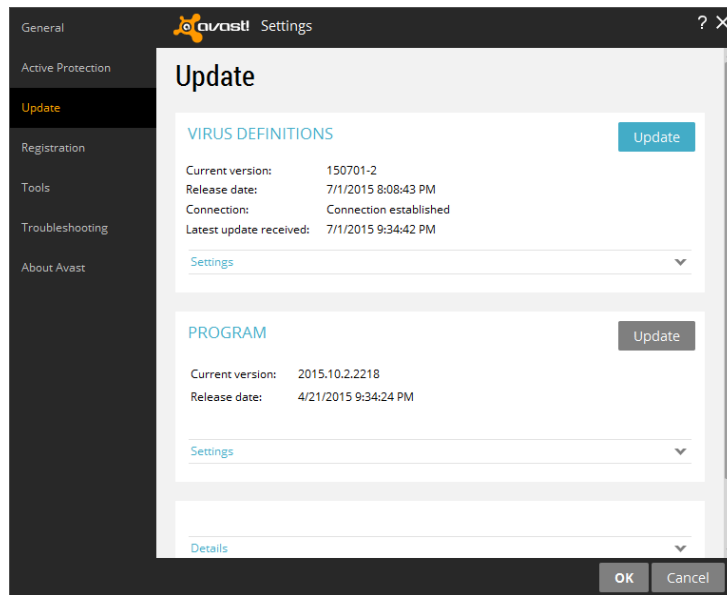
It is very easy to scan windows from viruses.

1. First of all download and install a registered Antivirus program from a trusted website.(Here we are installed Avast )



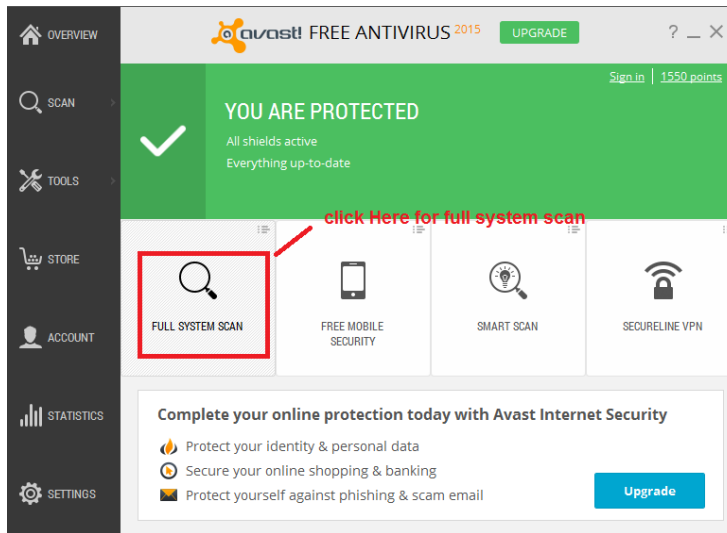
### Download and Install Antivirus

2. Update your anti-virus/anti-malware software installed on your computer.
3. Before running a virus scan or malware scan, it needs to make sure the virus definitions are up to date. These regular updates tell antivirus software how to find and remove the latest viruses from computer.



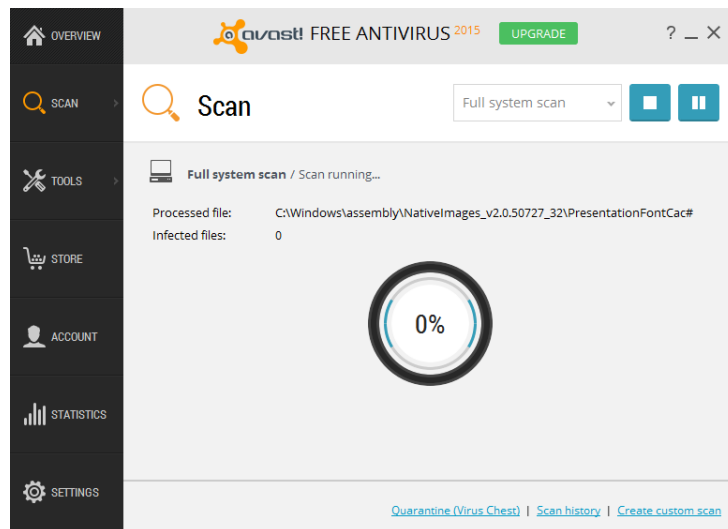
### Update Antivirus and Virus Definition

4. Run a complete virus scan on entire computer. If you have a dedicated malware scanner that does more than look for viruses, run a full scan using that program.



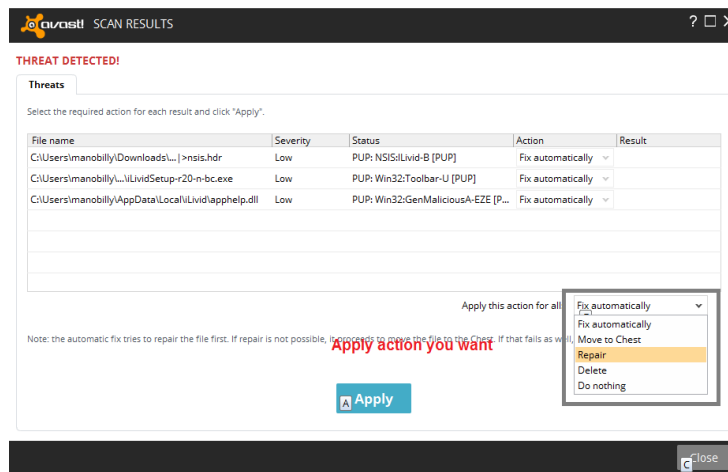
### Perform a Full System Scan

5. This will take time for scanning the whole computer. It depends on your data. If you have large amount of data then it will take several minutes to complete scan process.



### Scanning Process

6. If there is any virus detected then it will shows the virus select and apply the desired operation which you want to apply on viruses.



### Apply Action for Viruses

## Learner's Activity

- Search for installed antivirus software in your computer and write its name.
- Search some of the different free antivirus programs that are available on internet
- Install any latest antivirus and scan your computer from viruses.
- Take backing up your data on computer?

# Learning Unit 8: Format External Mass Storage

## Overview

External Mass storage is the device that is attached to the computer data storage and can be removed easily without opening the computer. Several types of mass storage devices available, including hard drives, optical disks, floppy disks, flash drives, and other pieces of technology such as secure digital (SD) cards (memory cards). Most types of storage devices can be used to store any type of file. This learning unit covers the procedure for formatting external mass storage devices like Flash drive, memory card etc. After completion of this learning unit you will be able to demonstrate the types of mass storage devices and their formatting.

### Remember

Don't plug in your USB storage to any unknown computer, and don't plug any external device to your computer without scanning.

## 1. Precautions for Formatting External Mass Storage

Before formatting any external mass storage device there are some precautions need to follow:

1. Create a backup of your files on external mass storage data at a secure place depends on data size that the drive will carry.
2. Scan the external storage with scanning software for avoiding malware or viruses.
3. Create archives of the device so that large amount of data can compress into a single file for future use after formatting.

### Hard Disk



## 2. External Mass Storage Devices

Several different types of mass storage devices available, including **hard drives**, **optical disks**, **floppy disks**, **flash drives**, and other pieces of technology such as **MP3 players** and **secure digital (SD) cards**. Most types of storage devices can be used to store any type of file, but the ones in MP3 players can only display certain types of file if not connected to a computer. All of the mass storage devices require a computer to function properly, because a computer is needed to move files to and from the storage devices.

### Hard Drives:

Hard drives are the most common types of mass storage devices. Almost every computer has at least one hardware installed inside the CPU casing. The scan disk offer a large amount of memory which can be accessed easily by the user. Universal serial bus (USB) portable hard drives are also available, which offer the storage of a hard drive in a more transportable form. Most hard disk drives use magnetic discs which store data on these magnetic discs.

### Optical Disk



#### Optical Disks:

Optical disks are commonly used storage devices. An optical disk is better known to most people as a compact disk (CD) or digital versatile disk (DVD), which has data "burned" onto it by a laser. Most computers provided with a CD/DVD drive which can also write data onto the optical storage devices.

### Floppy Disk



#### Floppy Disks:

Floppy disks are an older class of mass storage devices, and while some computers can still play them, optical disks are much more popular. The memory of floppy disks is considerably lower than that found on optical disks and hard drives, but they are generally much cheaper to purchase and easily portable. Another advantage of floppy disks is they are universal, but they unfortunately run quite slowly, especially when compared to other devices.

### SD Card



#### SD Cards /Memory Cards:

Most digital cameras and smart phones use SD cards, which can feature a large amount of storage space, at least surpassing that of a CD or DVD. SD cards can usually display photographs and videos when plugged into a digital camera smart phone.

### Flash Drive



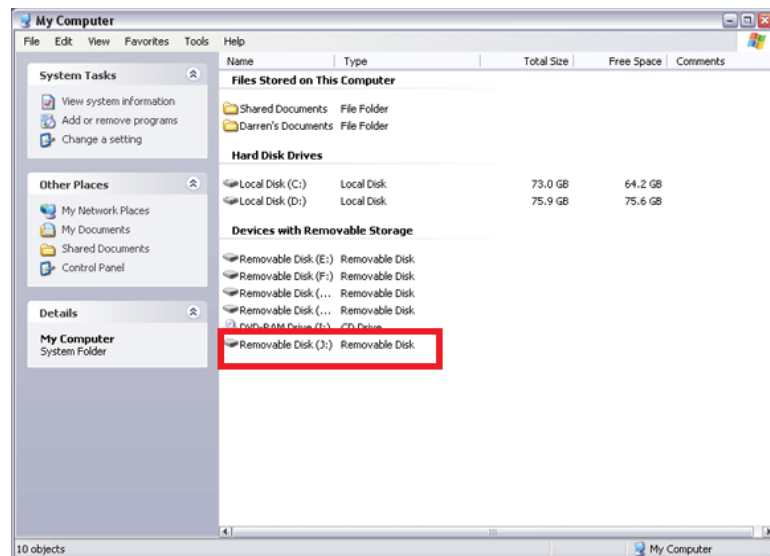
#### Flash Drive:

USB flash drives are often used for the same purposes, for which floppy disks or CDs were used, like for storage, data backup and transfer of computer files. They are smaller, faster, have thousands of times more capacity than floppy, and are more durable and reliable.

## 3. Formatting a Mass Storage Device

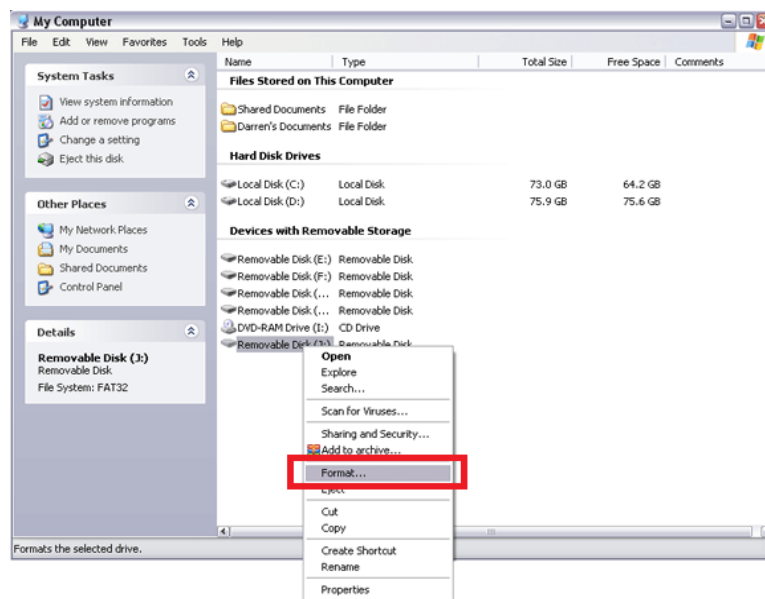
If you want to format your USB flash drive or flash memory card, you can follow these steps:

1. Plug USB flash drive or memory card into the USB slot of computer.  
Normally your system should find it as a removable disk drive automatically.
2. Open "My Computer" and right click the removable disk drive just inserted.



### Selecting USB Drive

- Click "Format" on the menu that pops up.



### Remember

Before formatting of a drive check the drive size if you have connected more than one removable devices.

### Drive Options

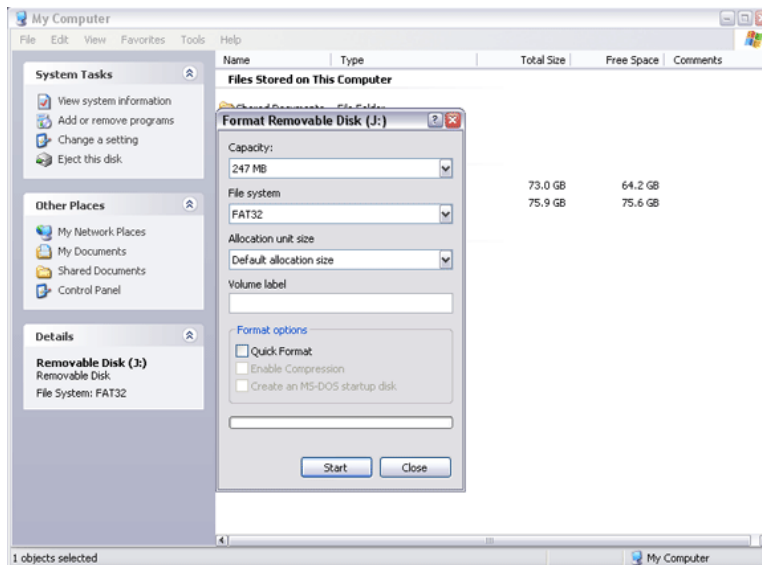
- A dialogue box named "Format Removable Disk" should appear.



## FAT

### File Allocation

**Table** is a primary computer file system for various operating systems, mostly DOS, including DR-DOS, OpenDOS, freeDOS, MS-DOS, Microsoft Windows.



### If you want to Perform Thorough Formatting

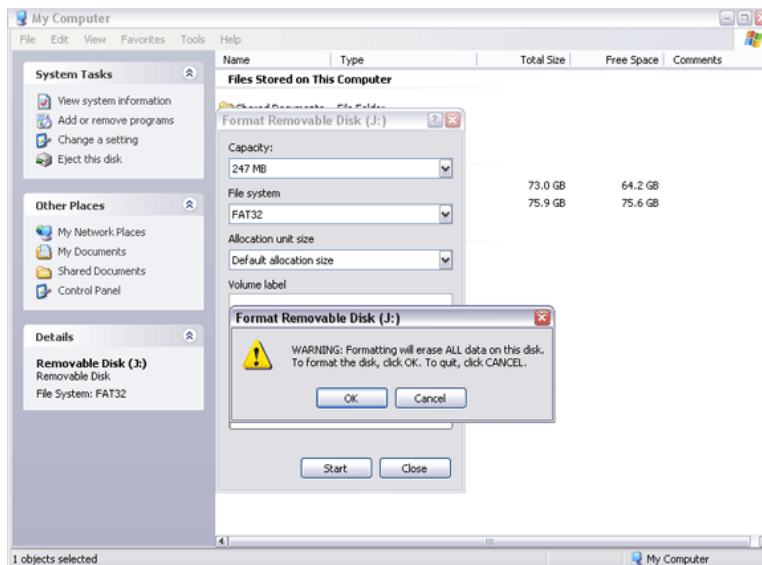
Click the box next to "Quick Format" for quickly formatting the drive. You will still have access to all of the free space after formatting, but the original information will not be securely deleted, meaning it could possibly be retrieved.

## NTFS

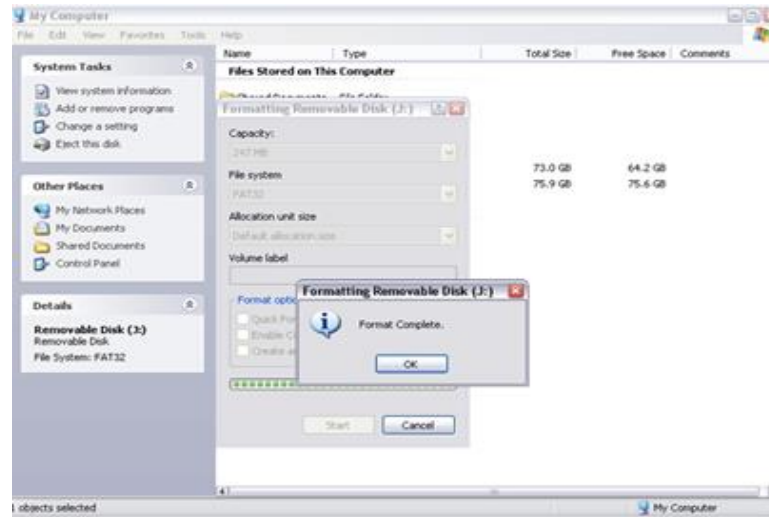
NTFS is the standard file system of Windows NT, including its later versions Windows 2000, Windows XP, Windows Vista, Windows Server 2003, and Windows Server 2008, Windows 7 and Windows 8.

### If you want to Perform Thorough Formatting

5. Select "FAT 32" under the File System and make sure Quick Format is not selected. (If you are not sure, just leave all the selections as default.)
6. Click the "Start" button.
7. A pop-up will inform you that the format action will erase all the data in the flash memory. Make sure you want to erase all data on the disk before you click OK. The formatting process will start once you click "OK".

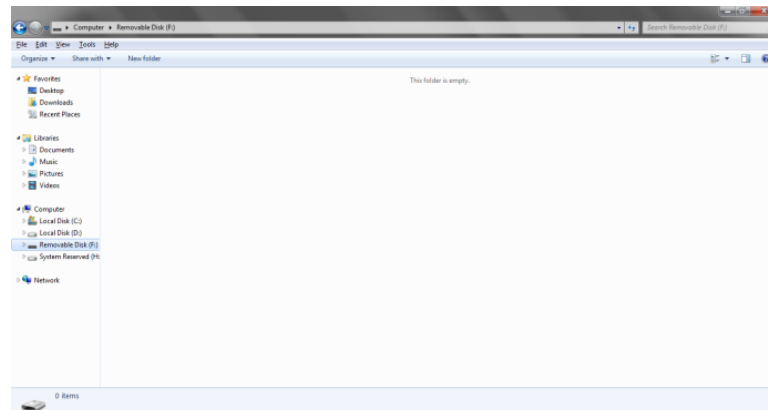


## 8. Formatting will Complete after some Time.

**Remember**

Flash drive is a big source of inserting viruses into the computer. So always scan before opening it.

## 9. Now the Flash drive is ready to use. Check that the drive is empty now.



## Learner's Activity

- Compare different types of external mass storage devices like USB flash, external hard drive.
- Format a USB flash drive.
- Format a SD card /memory card according to given manual steps.

# Learning Unit 9: Troubleshoot Basic Software Errors

## Overview

Software troubleshooting is the process of scanning, identifying, diagnosing and resolving problems, errors and bugs in software. The software troubleshooting process starts with identifying the problem, checking on possible issues that can cause such problems and then working on measures and alternatives to find a solution. This learning unit covers that what is software troubleshooting, describe the general software errors like computer bug, track or path corruption also will demonstrate the precautions about software troubleshooting. After completion of this learning unit, you will be able to describe what is software troubleshooting also will be able to troubleshoot errors in software.

### Remember

Troubleshooting is done for smooth and error free working of computer.

## 1. Software Troubleshooting

Software troubleshooting is generally done to resolve technical problems in software. The software troubleshooting process starts with identifying the problem, checking on possible issues that can cause such problems and then working on measures and alternatives to find a solution.

Typically, issues are resolved by a software developer or tester that reviews and optimizes software, removing bugs and errors from the source code. Software vendors also help in software troubleshooting by publishing periodic updates/patches for software, which can help in ensuring smooth software operation. Software troubleshooting can also be done when software needs to be configured correctly, such as resolving issues due to incorrect installation or restoring software after corruption or file deletion caused by a virus.

### Software Troubleshooting

Software troubleshooting means detecting and removing software errors.

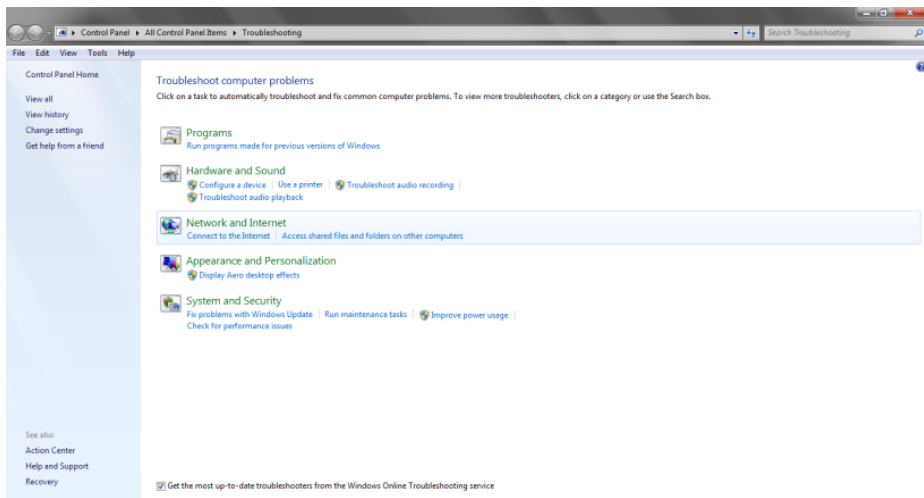
There are many ways of troubleshooting software errors like Windows scan, windows optimizer, compress disk, disk defragmenter using control panel in windows. For troubleshooting common problems using windows:

### Troubleshooting Common Errors in Windows:

Troubleshooting using Control Panel contains several troubleshooting programs that can automatically fix some common problems with computer, such as problems with networking, hardware and devices, using the web, and program compatibility.

Although troubleshooters aren't designed to fix every problem, they are useful to often save your time and efforts.

1. Open Troubleshooting by clicking the **Start** button then clicking **Control Panel**, and then, under **System and Security**, click **Find and fix problems**.



## Troubleshooting Using Windows

Troubleshooters can find and fix a variety of common problems

When you run a troubleshooter, it might ask you some questions or reset common settings as it works to fix the problem. If the troubleshooter fixed the problem, you can close the troubleshooter. If it couldn't fix the problem, you can view several options that will take online to try and find an answer.

## 2. General Software Errors or Bugs

### Remember

Some bugs are so harmful that it corrupts the computer Hard disk tracks and boot sector.

A software bug or error is a problem causing a program to crash or produce invalid output. A bug can be an error, mistake, defect or fault, which may cause failure from expected results.

Most bugs are due to human errors in source code or its design. A program is said to be buggy when it contains a large number of bugs, which affect program functionality and cause incorrect results.

Following are the most common software errors.

### Types of Errors with Examples:

#### User Interface Errors:

User interface errors creates Missing/Wrong Functions, the interface doesn't know what the user expects.it generates Missing or Confusing information, Wrong content in Help text, Inappropriate error messages. Performance issues and Poor responsiveness. It is due to inappropriate use of key board.

#### Boundary Related Errors:

Boundary related errors generate within Boundaries in loop, space, time, memory, mishandling of cases outside boundary.

**Calculation Errors:**

Calculation errors generates due to Bad Logic, Bad Arithmetic, Outdated constants, Calculation errors, Incorrect conversion from one data representation to another, Wrong formula, Incorrect approximation.

**Control Flow Errors:**

Control flow errors generate due to Wrong returning state, Stack underflow/overflow, Failure to block or unblock interrupts, Comparison sometimes yields wrong result, Missing or wrong default and Data Type errors.

**Hardware Produced Errors:**

There Errors generates due to Wrong Device, Device unavailable, Wrong operation or instruction codes.

**Path or Track Corruption of Hard Disk:**

Sometimes hard disk generates errors due to path or track corruption. It is due to some sever type of viruses or hard disk damages. Or when:

1. User switches off (or resets) PC without shutting down properly.
2. User attempts shutdown, but shutdown fails to complete.
3. Power fails, or is accidentally switched off.
4. PC spontaneously resets (e.g. bad power or power supply)
5. Computer crashes or locks up, so that shutdown is impossible

**Simple Solutions to Common Computer Errors:**

Most of the time, problems can be fixed using simple troubleshooting techniques, like closing and reopening the program. It's important to try these simple solutions before resorting to more extreme measures. If the problem still isn't fixed, try other troubleshooting techniques.

**Do you know!**

Restarting a computer when it is slowdown is a good way to enhance its performance.

**Problem: An Application is Running Slowly:**

**Solution 1:** Close and reopen the application.

**Solution 2:** Update the application. To do this, click the **Help** menu and look for an option to check for **Updates**. If don't find this option, another idea is to run an online search for application updates.

**Problem: An Application is Frozen:**

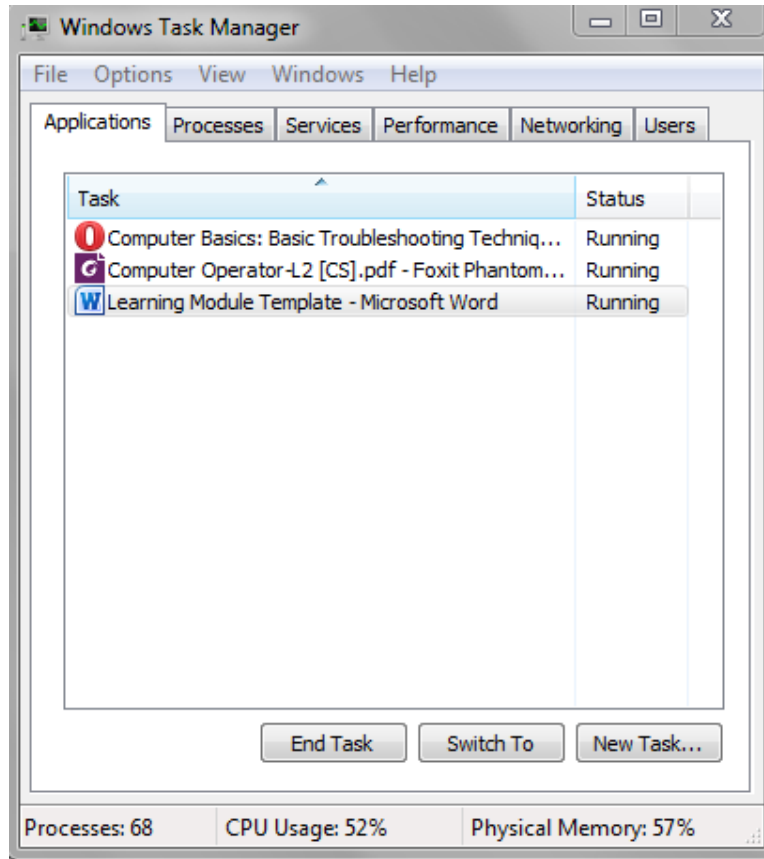
Sometimes an application may become **frozen**. When this happens, you won't be able to close the window or click any buttons within the application.

**Solution 1:** Force quit the application. On a computer, Press (and hold) **Ctrl+Alt+Delete** on keyboard to open the **Task Manager**.

- Select the unresponsive application and click **End task**.

**Remember**

Sometimes computer runs slowly because of low memory space also for example when RAM is not working properly.



**Using Task Manager**

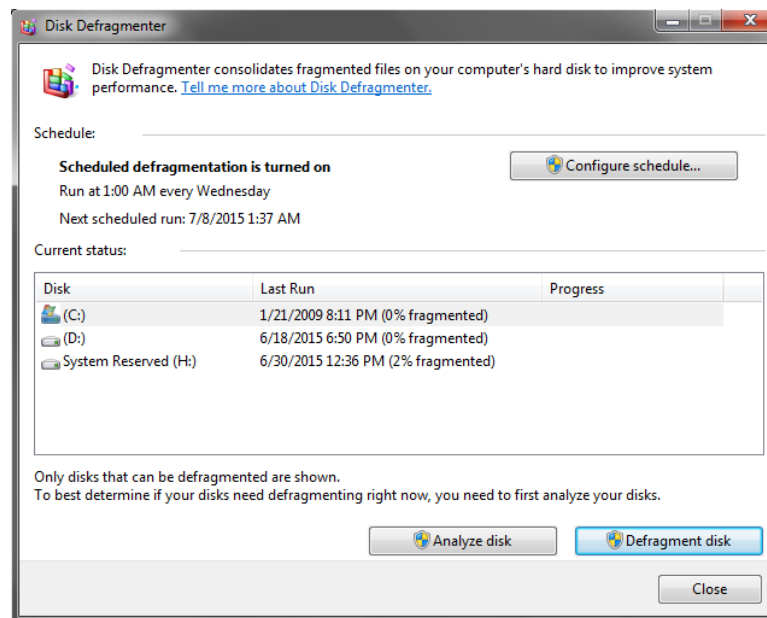
**Solution 2:** Restart the computer. If you are unable to force quit an application, **restarting** computer will close all open apps.

**Problem: All Programs on the Computer Run Slowly:**

**Solution 1:** Run **virus scanner**. It may have **malware** running in the background that is slowing down the system.

**Solution 2:** Computer may be running out of hard drive space. Try **deleting** any files or programs that you don't need.

**Solution 3:** If using a **PC**, run Disk Defragmenter (called **Optimize Drives** in Windows 8). Doing so will make sure all pieces of each file or program are stored close together in your computer, so the computer will be able to access them more quickly.



Disk Defragmenter

### 3. Applying Precautions for Troubleshooting Errors and System Testing and Structural Testing

#### Precautions for Troubleshooting Errors

There are many causes of errors in computer system. Some errors are related Windows operating systems and others just come with everyday use like creating and deleting files, adding and removing programs, and attaching printers, cameras and other devices. To get rid of all these errors you need to apply some precautionary measures :

- **Install updates** of software at regular basis. This will help in reducing errors of computer.
- **Check the devices** before installing and using it because hardware errors also disturb the working of computer.
- Use **Virus scan, anti-malware**, for scanning viruses from computer at regular basis.
- Create **backup** regularly and before **repairing** any software error.
- There are many types of **testing** are used for software checking some of them are used by **software developers** and **analyst** like **system testing** ,**structural testing**. Others can be used by users like windows help etc.
- You can also use web for **online help** if there is a complex type error occur in computer.

#### What is System Testing?

System testing means testing of the entire software. The main purpose of system testing is to detect whether the software meets its requirements or not. System testing is used to verify the working of the whole system all together. System testing involves both functional and nonfunctional testing.

The formation about testing an integrated system to check that it meets or follows requirements that are specified is known as system testing.



### Basic Purpose of System Testing is to:

#### System Testing

System testing is a testing of entire software working and structural testing is about the structure of the software that how it is implemented.

1. Ensure that a system or application meets its specification and any non-functional requirements (such as stability and throughput) also meet the requirements with its users.
2. Comprise a different tests series to fully exercise the computer-based system.
3. Confirm an application's or system accuracy and completeness in performing the designed functions.

### What is Structural Testing:

The structural testing is the testing of the structure of the system or component.

#### Remember

Windows Help and Support is one of the best features for troubleshooting errors.

- In structural testing the testers are required to have the knowledge of the internal implementations of the code. Here the testers require knowledge of how the software is implemented and works.
- During structural testing the tester is concentrating on how the software does it. For example, a structural technique wants to know how loops in the software are working. Different test cases may be derived to exercise the loop once, twice, and many times. This may be done regardless of the functionality of the software.

- Structural testing can be used at all levels of testing. Developers use structural testing in component testing and component integration testing, especially where there is good tool support for code coverage. Structural testing is also used in system and acceptance testing, but the structures are different.

### How to Use Windows Help :

At some point, you're likely to stuck into a computer problem or confusing task. To figure it out, you'll need to know how to get the right help.

- **Using Windows Help and Support:**

Windows Help and Support is the built-in help system for Windows. It's a place to get quick answers to common questions, suggestions for troubleshooting, and instructions for how to do things. If you need help with a program that's not part of Windows, you'll need to consult that program's Help.

- **To Open Windows Help and Support:**

Click the Start button, and then click Help and Support.

### Get the Latest Help Content:

If you're connected to the Internet, make sure Windows Help and Support is set to Online Help. Online Help includes new Help topics and the latest versions of existing topics.

1. Click the Start button, and then click Help and Support.
2. On the toolbar in Windows Help and Support, click Options, and then click Settings.

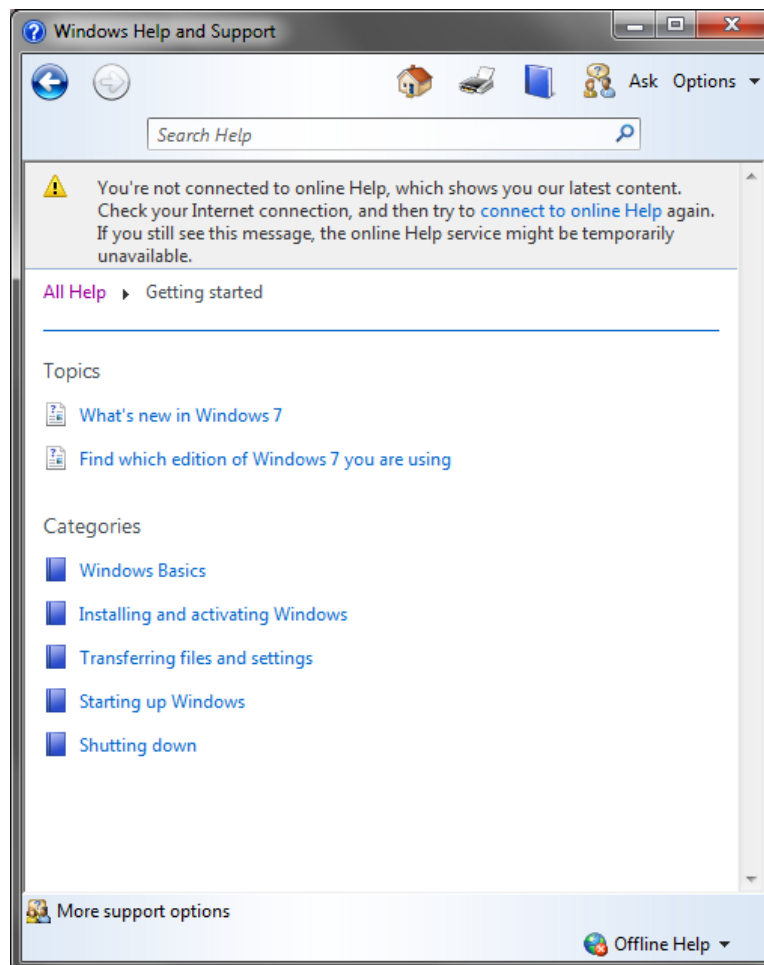
3. Under Search results, select the Improve my search results by using online Help (recommended) check box, and then click OK. The words Online Help will be displayed in the lower-right corner of the Help and Support window when you are connected.

- **Search Help:**

The fastest way to get help is to type a word or two in the search box. For example, to get information about wireless networking, type wireless network, and then press Enter. A list of results appears, with the most useful results shown at the top. Click one of the results to read the topic.

#### Do you know!

You can also access Help by pressing F1. This function key opens Help in almost any program.



### Getting Help with Windows

- **Getting Help with a Program:**  
Almost every program has its own built-in Help system.
  1. To open a program's Help system:
  2. On the **Help menu** of the program, click the first item in the list, such as "**View Help**," "**Help Topics**," or a similar phrase. (This text will vary.)
  3. Click the **Help** button.

#### Remember

Almost every program provides built in Help feature about that specific software.

- **Using Web Resources:**

The web contains a vast amount of information, so there's a good chance that the answer to your question lies somewhere in those billions of webpages.

If you don't find what you need using a general search, consider searching websites that focus on Windows or computer problems. Here are four good places to look:

**Windows Website.** This website provides an online version of all Help topics in this version of Windows, plus instructional videos, in-depth columns, and other useful information.

**Microsoft Help and Support.** Discover solutions to common problems, how-to topics, troubleshooting steps, and the latest downloads

**Microsoft TechNet.** This site includes resources and technical content for information technology professionals.

## Learner's Activity

- Write the steps you will take if a program on a computer is completely unresponsive.
- Write your last initiative to resolve the issue if you've tried everything and the problem still isn't fixed.
- Write the difference between System testing and structural testing?
- Set windows help to troubleshoot the software errors and write the steps you have followed in troubleshooting?

# Learning Unit 10: Troubleshoot Basic Hardware Faults

## Overview

### Remember

Hardware faults occurred due to careless use of computer or mal functioning of software.

There are many types of hardware faults occurs when uses a computer like computer doesn't start due to power cable, mouse or keyboard failure, printer or scanner doesn't work properly. Finding and removing these hardware faults is called Hardware troubleshooting. This learning unit covers the basic hardware faults; it also covers the procedure for defining and troubleshooting of these faults. After completion of this learning unit, you will be able to demonstrate the basic hardware faults and able to troubleshoot and maintain your computer.

## 1. Basic Hardware Faults

### Hardware Troubleshooting

Hardware troubleshooting means founding and removing errors from a computer or device.

Computer is an electronic machine and every machine needs proper maintenance and care if you don't do this the computer hardware faults occur which causes many problems. There are many types of hardware faults occurs due to improper connectivity or failure of the devices.

- A computer doesn't start due to power cable failure or improper connectivity.
- Mouse or keyboard doesn't work properly.
- Printer doesn't start or work.
- Scanner or any other connecting device doesn't work properly.
- Monitor or LCD doesn't give display.
- A hard drive failure occurs.

## 2. Troubleshooting Hardware Faults

### Troubleshooting an Unresponsive Computer:

- First check the cable. Unplug it from the computer and the outlet. Re-plug in both sides and try booting it again.
- Check the wall outlet. Plug something else into the outlet and see if it works.
- Turn off the system and wait 30 seconds and then try again.
- Look at the keyboard for the indicator lights being lit up as the machine boots.
- Sometimes the monitor has something to do with the system acting up. Unplug the power cord from the monitor and the wall and re-plug it. Unplug the cable from the computer to the monitor and re-plug it into the monitor. Try rebooting.
- Listen to identify a beeping series if there is one to report it to the technical help.

### Startup Troubleshooting:

If your computer is making noise or attempting to start up, but there is no video or no display on the monitor. Or there are No power lights on the monitor/computer.

- Check to see if the power cables that are connected properly with computer and monitor.
- Check there is no breakage in power cables of any device.
- Check that power supply is picking the power or not.

### Troubleshooting a Keyboard:

When a Keyboard doesn't respond and gives off a constant beeping noise when booting up then check the following:

- Check the plug to make sure it's connected securely.
- Try unplugging it and re-plugging it again.
- If there is no response, check the indicator light on the keyboard. Is it on. Do the lights respond when pressing the caps lock or the num lock key?
- Check to see if there is a key stuck on the keyboard.

### Troubleshooting a Mouse:

When a mouse is not working properly or the mouse will only move one way, either vertically or horizontally.

- Reboot the computer and check that it corrects the problem. If not, then will be insufficient memory.
- Clean the mouse.

### Troubleshooting a Printer

If the Printer is not printing.

#### Check to See if the Printer Getting Power

If there are no lights or no display on the front of the printer, the printer is not getting electricity or power. Check to make sure the power cable is plugged in both to the wall or power strip and to the back of the printer.

#### Check to See if there is Paper Jam in Printer?

- If the printer has paper in the paper tray, the paper may be jammed or not feeding properly. Take the paper out of the paper tray and check to see that the top piece of paper is not crinkled or bent.
- If the printer is a DeskJet, lifts open the front cover and look to see if a piece of paper is halfway fed through. If there is, remove paper properly from the top and close the printer.
- If the printer is a LaserJet, open the top of the printer and check for paper underneath the toner cartridge. If there is paper there, properly remove it, and place the toner cartridge again.

#### Remember

Always keep your hardware clean and keep it away from dust so it can work properly.

#### Check to See if there Multiple Jobs in the Print Queue

- If the printer is a local printer (i.e., there is a cable running directly from the printer to the computer you are printing from), power off the PC, power off the printer, count to 10, and then turn both the printer and the computer back on again. Sometimes this will allow the printer to start printing again.

### Computer Hang Troubleshooting:

If the cursor is stuck on the or system goes on Halt position or it may hang then do this:

#### Do you know!

F5 Key is used for Refreshing the computer.

- Open Task Manager
- Simultaneously press [Ctrl] [Alt] [Delete] keys. You will see a list of all tasks (programs) currently running. You may notice one program has "Not Responding" instead of "Running" listed next to it. Select this task and click the End Task button.
- Another dialog box will open stating that the program is not responding. Choose End Now to close the program.
- Reboot your computer (Warm Boot)

### Resetting a Computer that is Already Turned On:

- Press [Ctrl] [Alt] [Delete] keys once to open the Task Manager.
- Press [Ctrl] [Alt] [Delete] again to restart the computer.
- Shut down your computer

If you restart your computer and the problem isn't resolved, than attempt to completely shut down the computer by pressing the power button. Let it set for 15-30 seconds then restart the computer.

## 3. Maintenance of Hardware Devices on Regular Basis

Computers are expensive, and with all major purchases you probably want to protect your investment. Luckily, it is not difficult to keep your computer healthy and in good working order. Maintaining a computer involves three things: keeping it physically clean, protecting it from malware, and backing up important files.

### Keep the Computer Physically Clean:

When dealing with computers, dust isn't just unattractive—it can potentially destroy parts of your computer. By cleaning your computer regularly, you can help to keep it working properly and avoid expensive repairs.

#### Cleaning the Keyboard:

- Unplug the keyboard from the USB or PS/2 port. If the keyboard is plugged into the PS/2 port, firstly shut down the computer before unplugging it.
- Turn the keyboard upside down, and gently shake it to remove dirt and dust.
- Blow air to clean between the keys.
- Moisten a cotton cloth or paper towel with rubbing alcohol, and use it to clean the tops of the keys. Do not pour alcohol or any other liquid directly onto the keys.
- Reconnect the keyboard to the computer once it is dry. If you are connecting it to a PS/2 port, you will need to connect it before turning on the computer.

#### Cleaning the Mouse:

- Unplug the mouse from the USB or PS/2 port. If the mouse is plugged into the PS/2 port, you will need to shut down the computer before unplugging it.
- Moisten a cotton cloth with rubbing alcohol, and use it to clean the top and bottom of the mouse.

- If you have a mechanical mouse, remove the tracking ball by turning the ball-cover ring counterclockwise. Then clean the tracking ball and the inside of the mouse with a cotton cloth moistened with rubbing alcohol.
- Removing the tracking ball
- Let all of the parts dry before reassembling and reconnecting the mouse. If you are connecting it to a PS/2 port, you will need to connect it before turning on the computer.

**Remember**

Always unplug the wires from the computer before cleaning the devices and use soft cloth or tissue for dusting.

**Cleaning the Monitor/ LCD:**

- Turn off the computer.
- Unplug the monitor from the power. If using a laptop, unplug the laptop.
- Use a soft clean cloth moistened with water to wipe the screen clean.

**Cleaning Computer and Other Devices:**

From time to time, you should clean your computer case and the sides and back of the monitor to avoid buildup of dust and dirt. Here are a few tips you can use when cleaning these surfaces.

**Do you know!**

Overheating is a big cause of damaging Hardware in computer.

**Cleaning the Computer Case:**

- Dust is computer's main enemy. Use an antistatic wipe to lightly dust the computer casing. Don't use furniture cleaners or strong solvents.
- Use air blower to remove dust stains from computer ports and inner parts of computer every month.
- Spray cleaning solution like ammonia cleaner or glass cleaner on a paper towel.
- A safe cleaning solution for computer surfaces, not computer screens is ammonia diluted with water or glass cleaner comprised mostly of ammonia and water.

**Keep it in Cool Place:**

Don't restrict airflow around computer. A computer can generate a lot of heat, so the casing has fans that keep it from overheating. Avoid stacking papers, books, and other items around the computer.

Many computer desks have an enclosed compartment for the computer case. If you have this type of desk, you may want to position the case so it is not against the back side of the desk.



## Learner's Activity

- Does your computer have any hardware fault? If any remove it and write down the fault and troubleshooting steps.
- Properly clean your devices attached to the computer.
- Unplug the mouse from the computer and clean it.
- Clean your System Unit, Screen, and keyboard and write the steps.
- Troubleshoot a printer if its paper is jammed inside, write the steps.

# Learning Unit 11: Configure Basic Internet Connectivity

## Overview

The term internet means Network of Networks. Internet is used to send and receive email, browse the Web, watch movies, and more. Before accessing the Internet, there are three things needed, an Internet service, a modem, and a web browser. This learning unit covers the basic concept of internet, internet connection types; also it covers the procedure for internet connectivity. After completion of this learning unit, you will be able to demonstrate what is internet, how can you connect or check internet connections in your computer.

## 1. What is Internet

### Internet

Internet is a global networking of computers for communication.

**Network of networks** or **millions of computers** connected together to communicate with each other for sharing data all over the world is called **Internet**. It is a global networking of computers all around the world for sharing data and information with each other. More than 190 countries are linked into exchanges of data, news and opinions. The number of Internet users represents nearly 40 percent of the world's population. The largest number of Internet users by country is **China, United States** and **India**. In **September 2014**, the total number of websites with a unique hostname online exceeded 1 billion. It was first developed by the **Advance Research Project Agency (ARPA)** of U.S government in **1969** for its military purposes, named **ARPA net**. The original aim was to create a network that would allow users of a research computer at one university to "talk to" research computers at other universities. Later on this networking increased and became a global network all over the world called Internet.

## 2. Types of Internet Connections

There are a lot of ways to connect laptops, desktops, mobile phones, gaming consoles and tablets to the Internet. Some of the most widely used Internet connections are described below.

### 1. Wireless Connections:

In wireless Connection Radio frequency bands are used in telephone or cable networks. Wireless connection can be accessed from any location that is within network coverage. Wireless connections are used through modem, which catches the Internet signals and sends them to other devices.

### 2. Broadband Connections:

In broadband connection high-speed Internet connection is provided through **ISP's (internet service providers)**. Broadband Internet uses multiple data channels to send large quantities of information. The term broadband is shorthand for broad bandwidth. Broadband Internet connections such as DSL and cable are considered high-bandwidth connections. Although many DSL connections can be considered broadband, not all broadband connections are DSL.

#### Do you know!

According to Internet Live Stats, as of December 30, 2014 there was an estimated **3,037,608,300** Internet users all over the world.

### 3. Mobile Connections:

Many cell phone and smartphone providers offer voice plans with Internet access. A Mobile Internet connection provides good speed and allows accessing the Internet.

#### Remember

Although dial-up has traditionally been the least expensive option, many ISPs have raised dial-up prices to be the same as broadband. This is intended to encourage people to switch to broadband.

#### 4. Dial-Up Connections:

Dial-up connections require users to link their phone line to a computer to access the Internet. This particular type of connection also referred to as analog does not permit users to make or receive phone calls through their home phone service while using the Internet.

#### 5. Hotspots Connections:

Hotspots are sites that offer Internet access over a wireless local area network (WLAN) through a router that connects to an Internet service provider. Hotspots utilize Wi-Fi technology, which allows electronic devices to connect to the Internet. Hotspots can be phone based or free standing, commercial or free to the public.

### 6. DSL Connections:

DSL stands for Digital Subscriber Line, uses a 2-wire copper telephone line connected to one's home so the user can access the internet and make a call at the same time.

### 7. Satellite Connections:

In many remote areas where broadband connection is not yet offered, a satellite Internet option may be available. Similar to wireless access, satellite connection utilizes a modem.

#### Do you know!

What are the ISP's?? And what are the most common ISP's working in Pakistan?

#### 8. ISDN:

**ISDN (Integrated Services Digital Network)** allows a user to send data, voice and videos over digital telephone lines or standard telephone wires. The installation of an ISDN adapter is required at both ends of the transmission on the part of the user as well as the Internet access provider.

## 3. Connecting to Internet

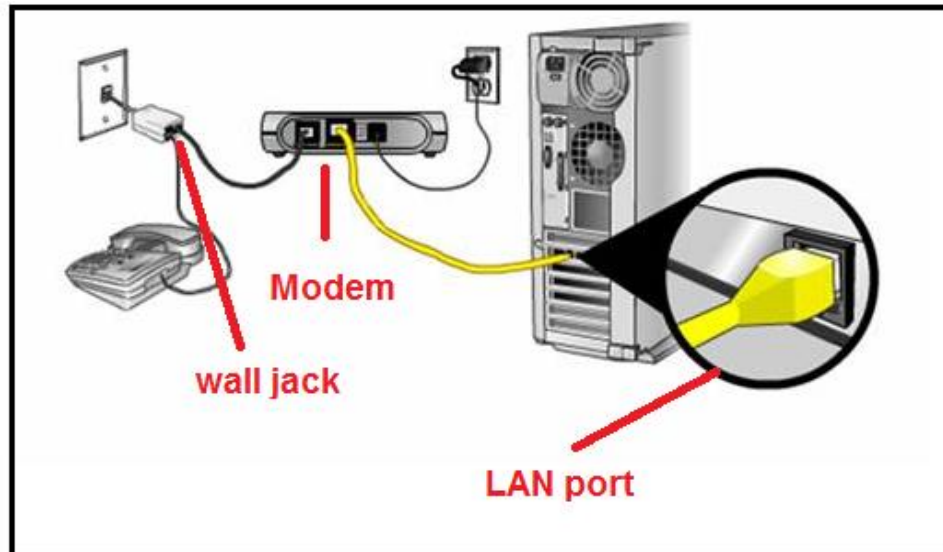
### Setting Up a Broadband (DSL or Cable) Connection:

For set up a Digital Subscriber Line (DSL) or cable connection, first need connection with an Internet service provider (ISP).

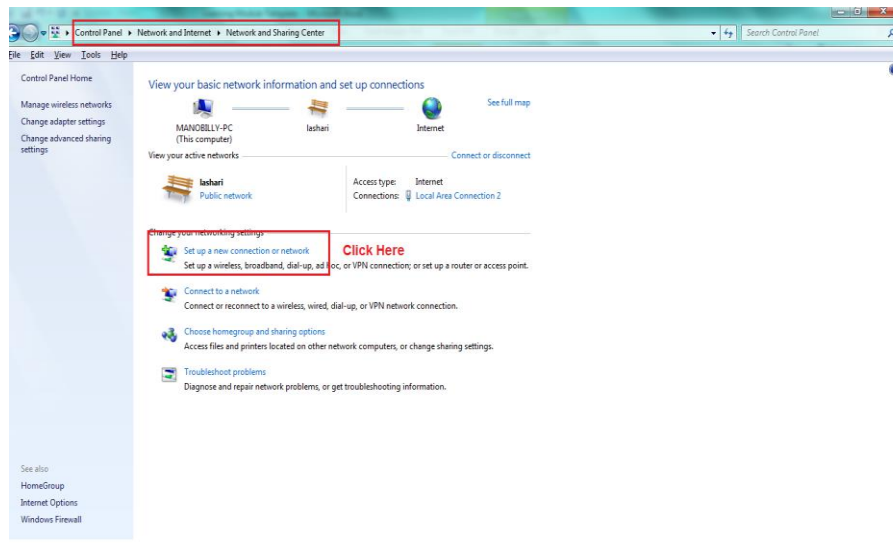
This will need a modem, a router, or a device that combines the two. **(Some ISPs will provide you with these devices; if your ISP doesn't, you'll need to buy them.)**After this follow the steps below.

Plug the device into an electrical outlet.

1. Plug one end of a phone cable into the wide area network (WAN) port of the device, and then plug the other end into the wall jack. The WAN port should be labeled "WAN."
2. Plug one end of an Ethernet cable into the local area network (LAN) port on the device, and then plug the other end into the networking port of the computer. The LAN port should be labeled "LAN".



3. Start (or restart) the computer.
4. Open the Connect to the Internet wizard by clicking the **Start button**, and then click on **Control Panel**. In the search box, type network, click Network and Sharing Center, click **Set up a new connection or network**, and then double-click **Connect to the Internet**.





### Remember

When you connect to a wireless connection through Wi-Fi then this icon  will appear in notification area and when you connect you own wireless modem then  icon will be appear in notification area.

5. Follow the steps in the wizard and the internet connection will be established.

**Viewing and Connecting to Wireless Networks:**

1. Open Connect to a Network by clicking the network  or  in the notification area.
2. In the list of available wireless networks, click a network, and then click Connect.
3. If you have your own wireless modem or Wi-Fi modem like EVO 3G Wingle then directly connect it into the computer USB port. Install its driver which is available with the device. After finishing installation simply browse the internet.
4. Some networks require a network security key or passphrase. For connecting to one of those networks, ask your network administrator or Internet service provider (ISP) for the security key or passphrase.

## Learner's Activity

- Did you use internet before this?
- Research two or more Internet service providers (ISPs), and compare their service packages. What are the different connection speeds offered by each provider?
- Try using a few different web browsers. Do they work differently? Which one was easier to use?
- Do you have any devices (computers, mobile phones, etc.) that can connect wirelessly? Would it make sense to create a wireless network in your home?
- Configure and install broadband DSL connection at your computer.
- Configure a wireless connection at your computer.

## Summary of Module

- An operating system (OS) is a set of programs contains instructions that work together to coordinate all the activities among computer hardware resources.
- A computer peripheral device is an external device that provides input and output for the computer. There are three types of peripheral devices one is Input that is use for providing input to the computer, second is output that is used for providing output and the last is that provides input and output both.
- It is necessary to learn Installing and configuring the variety of peripheral devices, including mouse, microphone, scanner, gamepad, camcorder and other devices.
- Application software is a type of software that can be used for a variety of tasks. It is not limited to one particular function. For example a word processor could be classed as general purpose software as it would allow a user to write a novel, create a restaurant menu or even make a poster.
- A software update means to enhance the capability, stability and features of an existing version of the software. Updates usually download free of cost while upgrading means replace an older version of the same product with the newer version.
- The proper way to uninstall a program is to use the uninstall routine that is provided with the program itself are from control panel. This will remove the files, Windows Registry information, and other configuration from your computer so that there are no conflicts in the future.
- Scanning a computer means detect and remove viruses and malwares from the computer.
- External mass storage is the storage device that is attached to the computer with a network / cable or can be removed without opening the computer case like floppy disk, hard disk, flash drive etc.
- Software troubleshooting is the process of scanning, identifying, diagnosing and resolving problems, errors and bugs in software. It is a process starts with identifying the problem, checking on possible issues that can cause such problems and then working on measures and alternatives to find a solution.
- Hardware troubleshooting means removing hardware faults are issues. A computer should keep clean and maintain at regular basis to avoid faults.
- Internet is used to send and receive email, browse the Web, watch movies, and more. Before accessing the Internet, three things are needed, an Internet service, internet connectivity device, and a web browser.

## Frequently Asked Questions (FAQs)

FAQ 1: What are the common types of Operating system?

Answer Most common types of operating system are Windows, Linux, Unix, Mac OS, Solaris, etc.

FAQ 2: What are the Peripheral devices?

Answer A computer peripheral device is an external device that provides input and output for the computer like keyboard, mouse, LCD, monitor, Printer, scanner web cam etc.

FAQ 3: What is application software?

Answer Application software is the software is used at offices, home and school etc., like word processing, spreadsheets, Database, Graphics software, designed to perform specific tasks for users.

FAQ 4: What is a software update means?

Answer A software update means to enhance the capability, stability and features of an existing version of the software. Updates usually download free of cost while upgrading means replace an older version of the same product with the newer version.

FAQ 5: What is the right way to uninstall a program?

Answer The proper way to uninstall a program is to use the uninstall routine that is provided with the program itself, or from using control panel.

FAQ 6: What does scanning means?

Answer Scanning a computer means detect and remove viruses and malwares from the computer.

FAQ 7: What are computer viruses or bugs?

Answer Computer viruses are small software programs that are designed to spread from one computer to another and to interfere with computer functioning.

FAQ 8: What is external mass storage?

Answer External mass storage is the device that is attached to the computer with a network/ cable and can be removed without opening computer case, like hard disk, USB flash drive, CD, floppy disk etc.

FAQ 9: What is software troubleshooting process?

Answer The software troubleshooting process starts with identifying the problem, checking on possible issues that can cause such problems and then working on measures and alternatives to find a solution.

FAQ 10: What is internet and what are its basic parts for connectivity?

Answer Internet is used to send and receive email, browse the Web, watch movies, and more. Before accessing the Internet, there are things needed, an Internet service, internet connectivity device, and a web browser.



## Test Yourself!

Please mark the correct one from the given options. You can check your answer with the Answer Key at the end of this module.

1. **The most popular operating system for personal computers is \_\_\_\_\_.**

- a. Mac OS
- b. Microsoft windows
- c. Linux
- d. Apple

2. **An application can be installed using \_\_\_\_\_.**

- a. CD
- b. Flash drive
- c. Internet
- d. All a, b & c

3. **Instead of a mouse, many laptops use a (n) \_\_\_\_\_.**

- a. Optical mouse
- b. Touch-pen
- c. Touchpad
- d. Laser pen

4. **Which of the following is a type of monitor port?**

- a. VGA port
- b. Parallel port
- c. Communication port
- d. All

5. **The main circuit board in a computer is called the \_\_\_\_\_.**

- a. RAM
- b. Motherboard
- c. Power supply
- d. None

6. **A mouse can connect to the computer with a \_\_\_\_\_ connection.**

- a. USB
- b. PS/2
- c. Bluetooth
- d. All of the above

7. **To navigate through different folders in Windows, you'll use \_\_\_\_\_.**

- a. Lanucher
- b. Windows explorer
- c. Finder
- d. None



## Answer Key

MCQ Number	Correct Answer
1	b
2	d
3	c
4	d
5	b
6	d
7	d
8	b
9	a
10	d
11	b
12	c
13	b
14	b

# Module 2: Prepare Word Document

## Learning Outcomes

After completion of this learning module learner will be able to:

- Type Document
- Set Up Page in a Word Document
- Edit Word Document
- Format Word Document
- Save Word Document
- Insert in a Word Document
- Import Documents
- Protect Document
- Insert table in a word Document
- Hyperlink data in a word Document
- Perform Mail Merge in the Word Document
- Insert Header /Footer in a word Document
- Insert Section Header in a word Document
- Set Style in Word Document
- Insert Table of contents in word document



# Learning Unit 1: Prepare Word Document

## Overview

In this learning unit you will learn how to open and save file with desired name and location in MS Word and how you can type in the document. After completion of this learning unit you will be able to type speedily and error free in MS Word.

### Do you know!

By Default MS Word Document open with the name "Document1".

## 1. Typing Using Different Keyboard Keys

The keys on their keyboard can be divided into several groups base on function:

- **Typing (Alphanumeric) Keys.** These keys include the letter, number and special character keys on keyboard.
- **Control Keys.** These keys are used separately or in combination with other keys to perform special actions. For example "Ctrl+S" used for Save file and "Ctrl+O" used to open a file.
- **Function Keys.** The function keys are used to perform specific function tasks. They are labeled as F1, F2, F3, and so on, up to F12. The functionality of these keys differs from program to program.
- **Navigation Keys.** These keys are used for moving around in documents or WebPages. They include the arrow keys, Home, End, Page Up, Page Down, Delete, and Insert.
- **Numeric Keypad.** The numeric keypad is used for entering numbers quickly. The keys are grouped together like a calculator or adding machine.

The following *figure 1* shows these keys are mentioned on a typical keyboard.

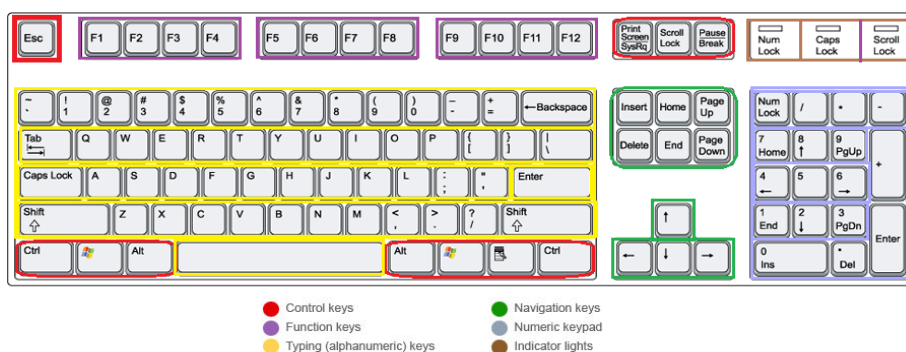


Figure 1

### Typing Text:

When you want to type in MS Word, you'll see a blinking vertical line (|). That's the **cursor**, also called the **insertion point**. It shows that from where the typing will start. You can move the cursor by clicking in the desired location with the mouse, by using the navigation keys, OR through space bar button.

### Remember

Different keyboards may have different layout.

### Remember

If Number Lock is not **ON** then by pressing the keys on numeric pad will do the others things written on the keys

The following table shows the working of **Shift**, **Tab**, **Backspace**, **Enter**, **Caps lock** and **spacebar** key.

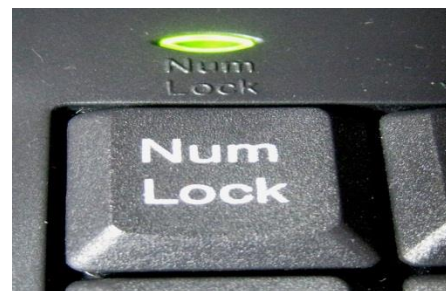
Key name	How to use
<b>Shift</b>	Press Shift in combination with a letter to type an uppercase letter. Press Shift in combination with another key to type the symbol shown on the upper part of that key.
<b>Caps Lock</b>	Press Caps Lock once to type all letters as uppercase. Press Caps Lock again to turn this function off. Your keyboard might have a light indicating whether Caps Lock is on.
<b>Tab</b>	Press Tab to move the cursor several spaces forward. You can also press Tab to move to the next text box on a form.
<b>Enter</b>	Press Enter to move the cursor to the function of the next line. In a dialog box, press Enter to select the highlighted button.
<b>Spacebar</b>	Press the Spacebar to move the cursor one space forward.
<b>Backspace</b>	Press Backspace to delete the one character before the cursor, or the selected text/word.

## 2. Typing By Using Numeric Pad on Keyboard

Typically you use the numbers above the keyboard for entering numerical data. But if you have to enter a lot of numeric values you should know how to use the ten-keys located on the right side of the keyboard.

### Step 1:

On a computer, make sure number lock is on. Press the **Num Lock** button until the corresponding light is on.



### Step 2:

Place your middle finger on the 5 key. Often, there will be a small dimple or ridge on this key so that you can easily find it by feel.



**Step3:**

Place your index finger on the 4 and your ring finger on the 6. This is the "home row" position for ten-key work. Without looking at your hand, practice typing combinations of the home row numbers, 4, 5, and 6.

**Step.4:**

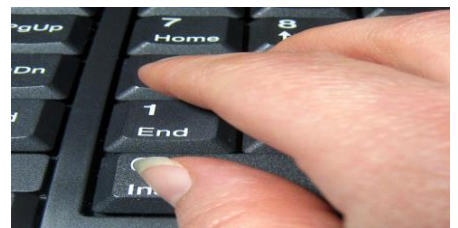
**Work in the numbers above the home row.** Type the 7 with your index finger, the 8 with your middle finger, and the 9 with your ring finger. Bring your fingers back to the home row when you are done with each of these digits.

**Step 5:**

**Work in the numbers below the home row.** Type the 1 with your index finger, the 2 with your middle finger, and the 3 with your ring finger. Return your fingers to the home row when you are done with each of these digits.

**Step 6:**

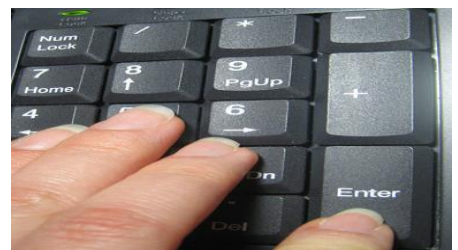
Type the 0 with your thumb.

**Step 7:**

**Learn the decimal point key and work on entering decimal data.** Type the decimal point with the ring finger. Practice typing decimal numbers.

**Step 8:**

Practice by feel the location of the 'enter' key, the + symbol, and the /, \*, and - symbols.



### 3. Using Left, Right, Up, Down Arrow Keys

**Arrow keys** are keyboard keys located at the bottom of the keyboard to the left side of the numeric keypad on computer keyboards. Arrow keys are typically marked with arrows. These four keys are the left arrow (back arrow), up arrow, down arrow, and the right arrow (forward arrow).



**Arrow Keys**



Arrow keys are used in many ways:

- Move the text cursor on the screen.
- Move a character in a computer game.
- Select text. For example, holding down shift and pressing the arrow key in the direction you want to highlight text.
- Move the mouse pointer using the keyboard instead of the mouse.

## 4. Typing Using Keyboard and Mouse

**Step 1:** The main keys on the keyboard are the letter keys. When you type just using these, you get lower-case print, and if you hold down a **'shift key'** at the same time as you type, you'll get UPPER-CASE letters.

**Step 2:** You can move the cursor along this sentence without deleting anything by using the arrow keys or by directly clicking the left button of the mouse.

**Step 3:** Now try typing a sentence:

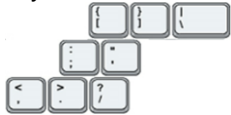
### A QUICK BROWN FOX JUMPS OVER THE LAZY DOG

This is a good sentence to practice because it contains all 26 letters of the English language.

**Step 4:** If you make a mistake in your typing, you can remove it.

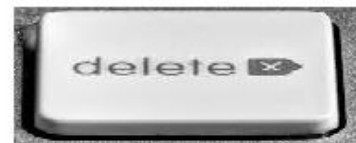
#### Note

Extra symbols will also be found elsewhere on the keyboard:



Pakistan

Pakistan



To delete a letter, place your cursor just after the letter and click. Then press **Backspace** key from keyboard. Or place your cursor just before the letter, click and press **Delete**.

**Step 5:** You can also type using the numbers on the main keyboard located on the row of keys above the top line of letters.

Above these numbers are various symbols, which include '£', '&', '!'. To use these, hold down the **Shift** key while typing. So if you press '7' on its own, you get '7', but if you press '7' while you hold down the 'Shift' key, you get '&'.

Try typing:

Last night I won £2,475,638 on the lottery!

## 5. Typing through Systematic Way

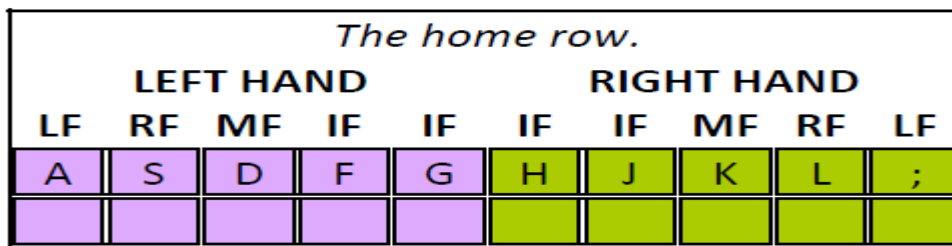
**Touch typing** (also called **touch type** or **touch method** or **touch and type method**) is typing without using the sense of sight to find the keys. Specifically, a touch typist will know their location on the keyboard through muscles memory. Touch typing typically involves placing the eight fingers in a horizontal row along the middle of the keyboard (the *home row*) and having them reach for other keys. Both two-handed touch typing and one hand touch typing are possible.

### Lesson 1:

The **home row** of the keyboard is the most important to the touch-typist.

When at rest the typist's fingers are positioned, lightly, on the **A-S-D-F** keys for the **left hand**, and the **J-K-L-;** keys for the **right hand**.

- The **left index finger** will control the **F** and **G** keys, the **right index finger** will control the **J** and **H** keys.
- The **left middle finger** will control the **D** key, the **right middle finger** will control the **K** key.
- The **left ring finger** will control the **S** key; the **right ring finger** will control the **L** key.
- The **left little finger** will control the **A** key, the **right little finger** will control the **;** key.
- The **spacebar** is controlled by the **right thumb**.



LF = little finger, RF = ring finger, MF = middle finger, IF = index finger

### Remember

Before you begin typing make sure you are sitting up straight, your feet flat on the floor. Keep your elbows close to your body, your wrists straight and your forearms level.

When you are ready to begin, start an exercise and press the key requested. Try not to look at the keyboard. It will be difficult at first but as the exercise progresses you will find it becomes easier and your fingers will begin to move without you consciously deciding which finger is associated with which key

### Lesson 1 Exercise:

#### Exercise 1:

Please type

asdfg hjkl; asdfg hjkl; ;lkjh gfdsa asdfg hjkl; ;lkjh gfdsa ;lkjh gfdsa

#### Exercise 2:

Please type

ah had lag slag ah had lag slag ah had lag slag

**Exercise 3:**

Please type

sad shall salad sad shall salad sad shall salad sad shall

**Exercise 4:**

Please type

ash glad alas ash glad alas ash glad alas ash glad alas

**Exercise 5:**

Please type

all flask half all flask half all flask half all flask half

**Lesson 2:**

The third row of the keyboard is the **Q-W-E-R-T-Y** row.

- The **left index finger** will control the **R** and **T** keys, the **right index finger** will control the **Y** and **U** keys.
- The **left middle finger** will control the **E** key, the **right middle finger** will control the **I** key.
- The **left ring finger** will control the **W** key; the **right ring finger** will control the **O** key.
- The **left little finger** will control the **Q** key, the **right little finger** will control the **P** key.

*The QWERTY row.*

LEFT HAND					RIGHT HAND				
LF	RF	MF	IF	IF	IF	IF	MF	RF	LF
Q	W	E	R	T	Y	U	I	O	P
A	S	D	F	G	H	J	K	L	;

The QWERTY row has mostly used letters. Four of the five vowels, **E-I-O-U** are to be found in this row.

**Lesson 2 Exercises:**

**Exercise 1:**

Please type

qwerty uiop qwerty uiop ; poiuy trewq poiuy trewq qwerty uiop qwerty

**Exercise 2:**

Please type

till quail tight yell; will those feat lake hash till quail tight yell; will

**Exercise 3:**

Please type

if do pit dug wary; quaff law stop lair gate here if do pit dug wary;

**Exercise 4:**

Please type

go her with hit; fight tug quill day saw yippee go her with hit; fight tug

**Lesson 3:**

Once you have mastered the first row of the keyboard, the **Z-X-C-V-B** row, **you will have learned all the alpha keys on the keyboard.**

The **left index finger** will control the **V** and **B** keys, and the **right index finger** will control the **N** and **M** keys.

- The **left middle finger** will control the **C** key, and the **right middle finger** will control the, key.
- The **left ring finger** will control the **X** key, and the **right ring finger** will control the. Key.
- The **left little finger** will control the **Z** key, and the **right little finger** will control the / key.
- The **left shift key** is controlled by the **left little finger** and the **right shift key** is controlled by the **right little finger**.

LEFT HAND					RIGHT HAND				
LF	RF	MF	IF	IF	IF	IF	MF	RF	LF
Q	W	E	R	T	Y	U	I	O	P
A	S	D	F	G	H	J	K	L	;
Z	X	C	V	B	N	M	,	.	/

In start you will find the downward stretching for the new finger positions awkward at first but it soon passes.

**Lesson 3 Exercises**

**Exercise 1:**

Please type

king fan crick, chill block. back abbot. aflame/ mix king fan crick, chill

**Exercise 2:**

Please type

zest win, thump skunk. plain muffin, knight/ exit zest win, thump skunk.

**Exercise 3:**

Please type

daring. choke bishop. admit twine sultan, sing/ roman daring. choke

**Lesson 4:**

The exercises in this lesson focus on practicing the different character keys.

*Lowercase - the shift key is NOT held down.*

LEFT HAND					RIGHT HAND							
LF	LF	RF	MF	IF	IF	IF	IF	MF	RF	LF	LF	LF
	1	2	3	4	5	6	7	8	9	0	-	=
	q	w	e	r	t	y	u	i	o	p	[	]
	a	s	d	f	g	h	j	k	l	;	'	\
`	z	x	c	v	b	n	m	,	.	/		

*UPPERCASE - the shift key IS held down.*

LEFT HAND					RIGHT HAND							
LF	LF	RF	MF	IF	IF	IF	IF	MF	RF	LF	LF	LF
	!	@	#	\$	%	^	&	*	(	)	_	+
	Q	W	E	R	T	Y	U	I	O	P	{	}
	A	S	D	F	G	H	J	K	L	:	"	
~	Z	X	C	V	B	N	M	<	>	?		

LF = little finger, RF = ring finger, MF = middle finger, IF = index finger

**Lesson 4 Exercises****Exercise 1:**

Please type

```
#15 @ $56.80 = 17%, 15*(12+3)=15^2, 2- !=4-2
```

**Exercise 2:**

Please type

```
if(total qty = 0) {echo "you did not order anything"};
```

**Exercise 3:**

Please type

```
if(document. images) && (preload Flag ==)
{for var i=0}
```

**6. Gaining Knowledge about Typing Tutor****Typing Master**

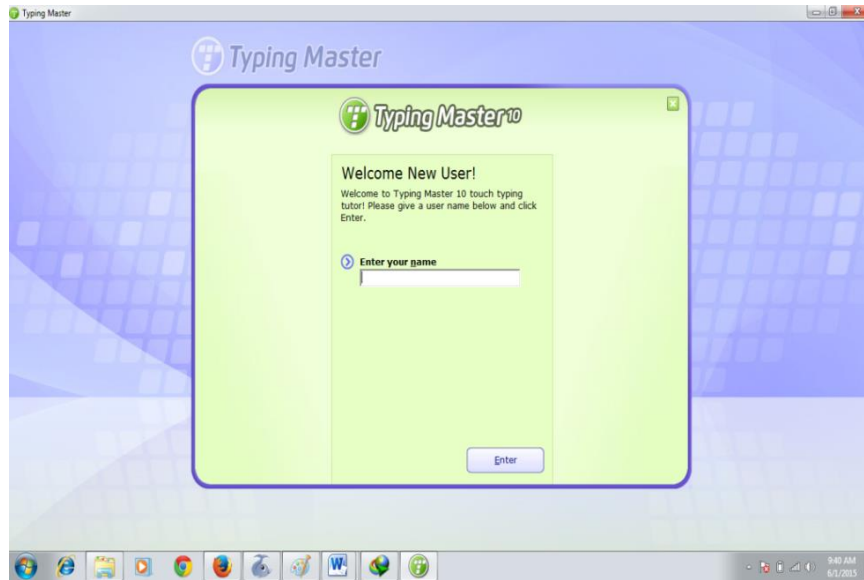
Typing master is a software with a lots of Lessons, Tests and Games to increase the typing speed. It is a well designed software that systematically helps you to increase speed in a friendly way and inform you about the keys that are problematic for you and suggest exercise for those problematic areas.

The procedure to use Typing Mater has the following steps:  
Launch Typing Meter is a handy window that analyze and measures your typing habit on the backend while you are working.

1. Open the Typing Master Software from the all program. Enter the name to start the program.

**Do you know!**

Launch Typing Meter is a handy window that analyze and measures your typing habit on the backend while you are working.



2. **Launch Typing Meter** window will be open, if you want to launch it then just click on **launch** or click **Launch Later**.

### Remember

Typing Meter launcher will not start working until the typing master software is open.



3. On the Next page the Course window will be open from where you can select the desired lesson.



4. After selecting the lesson next page will be open with the information about that lesson and the visual instructions of fingers position. Click on the **Next** button.

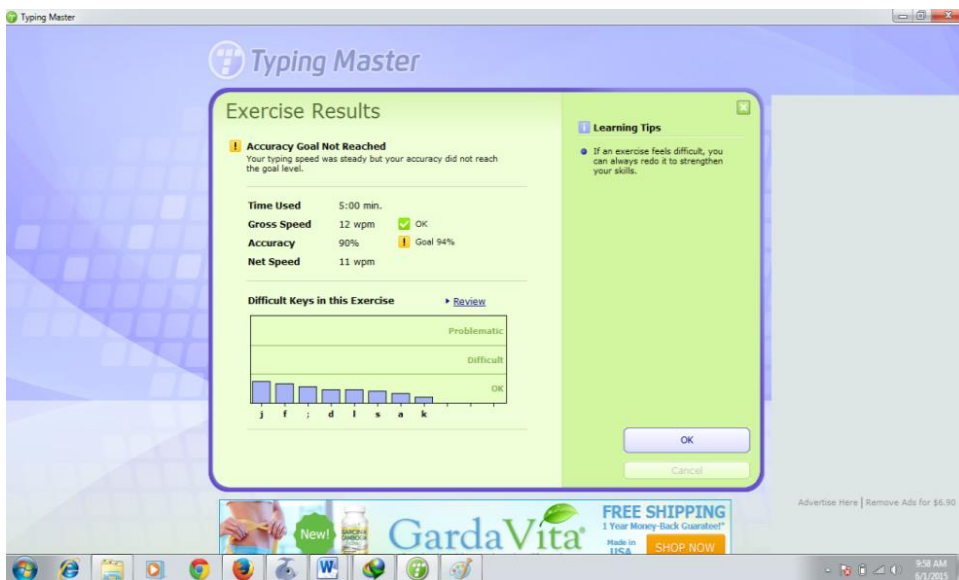


5. Now the Exercise will start with the time. You can also **Pause** the lesson, it will stop counting time of typing speed.





6. As the time will over the Exercise Result will be open with the detail of your typing progress.



## 7. Performing Online Typing Test

To check the performance of typing speed, online tests are available, you can check your typing speed through these exercises. Different websites are available to test the typing speed. Few of them are shown below:

1. Open the web browser.
2. Type the address in URL <http://typing-speed-test.aoeu.eu/?lang=en>
3. The following page will be displayed with the written text to test you speed.

**Speed test**

When you are ready to begin the typing speed test, click the **Start the clock** button, copy the sample text below, and then click the **Stop the clock** button.

Sample text:

Ye who listen with credulity to the whispers of fancy, and pursue with eagerness the phantoms of hope; who expect that age will perform the promises of youth, and that the deficiencies of the present day will be supplied by the morrow, attend to the history of Rasselas, Prince of Abyssinia. Rasselas was the fourth son of the mighty Emperor in whose dominions the father of waters begins his course, whose bounty pours down the streams of plenty, and scatters over the world the harvests of Egypt.

type here

The sample text is taken from [Rasselas, Prince of Abyssinia](#) by Samuel Johnson.

**Important**

Another link to check typing speed is <http://typing-speed-test.aoeu.eu/?lang=en>

4. When you start the test the timer will be start to examine your speed and when you end, the clock will displayed the result on screen.

## Learner's Activity

### Open and Save a Document

1. Open MS word from Microsoft office.
2. Click on the file tab button.
3. Type some text in the document.
4. Click on the save as option to save a file with desired name and location.
5. Type the file name and click on the Save button in the dialogue box.
6. Word file is created in the given location.

# Learning Unit 2: Setup a Page in Word Document

## Overview

### Do you know!

Page layout is the term used to describe how each page of your document will appear when it is printed.

The MS Word page Set-up includes elements such as the page size, margins (Left, right, up, bottom), number of columns, orientations.

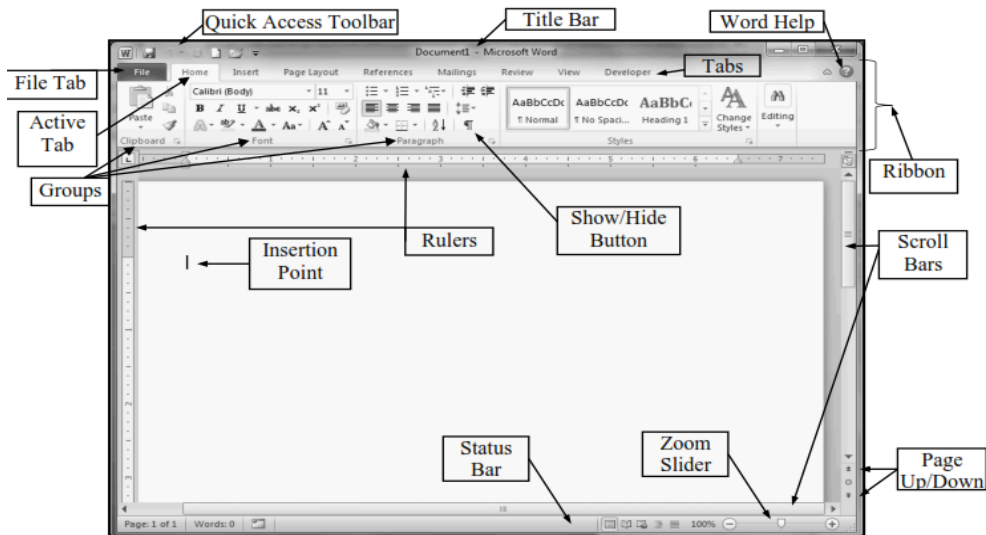
After completion of this learning unit, you will be able to set suitable page size, orientation and columns according to nature of text.

## 1. Components of Page Set-up

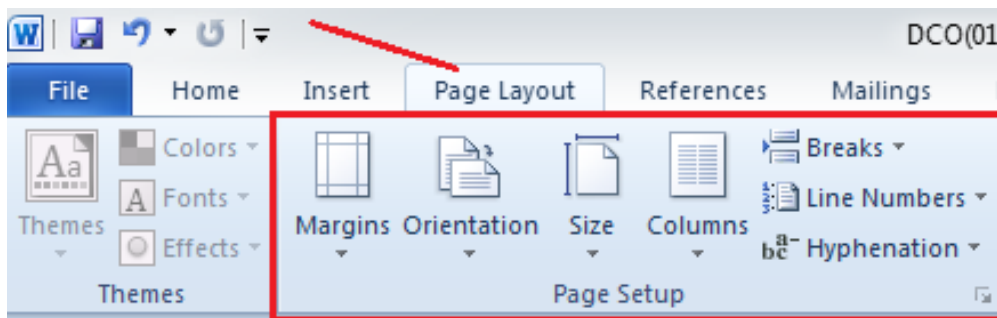
Before start working on the page set-up, the below shown is the picture of interface of MS Word document.

### Do you know!

In MS Word default paper size is US Letter (8.5"x11") or A4 (8.27"x11.69")



To setup a page in MS Word a **Page Layout** tab is available in the Tabs. In page Layout tab a group is available for the page setup as shown in picture below:



In Page Set-up group the following options can be set:

**Margin:****Orientation:**

Paper on which text is printed could have two orientations – portrait and landscape. In portrait orientation, height of the paper is larger than its width whereas in landscape orientation, the width is larger than the height.

**Size:**

Books and magazines are printed in a variety of sizes. Different sizes of paper are required to set the requirement of printing. Microsoft Word allows you to choose a variety of paper sizes for your documents. MS Word offers a large menu of standard paper sizes to choose from and also allows setting of a custom paper size of your own.

**Columns:**

Columns are used in many types of documents, but most commonly used in newspapers, magazines, academic journals, and newsletters. **Columns** can improve document's organization and increase its readability. They also allow you to utilize all of the available space on the page.

**Remember**

Hyphens that you add explicitly by entering the dash character are called hard *hyphens*.

**Breaks:**

Word has several different types of **breaks** you can add to your document to change the layout and pagination. Each type of break serves a different purpose and affects the document in different ways.

- 1) **Page breaks** move text to a new page before reaching the end of a page,
- 2) **Section breaks** create a barrier between parts of the document for formatting purposes.
- 3) **Column breaks** split text in columns at a specific point.

**Hyphenation:**

In word processing, hyphenation refers to splitting a word that would otherwise extend beyond the right margin.

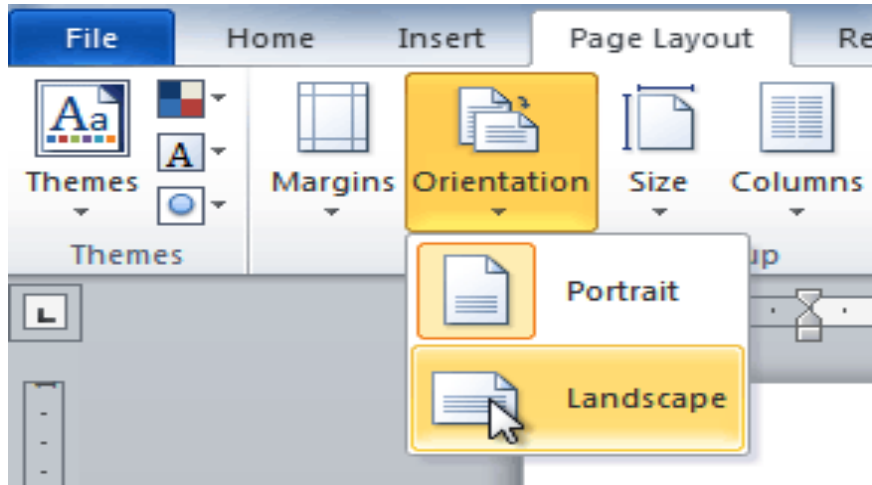
## 2. Selecting Suitable Orientation of a Page

The procedure to Setting up the orientation of a page has following steps:

1. Open MS word document and click on the **Page Layout** tab.

**Do you know!**

Landscape format means the page is oriented horizontally, while portrait format means it is oriented vertically.

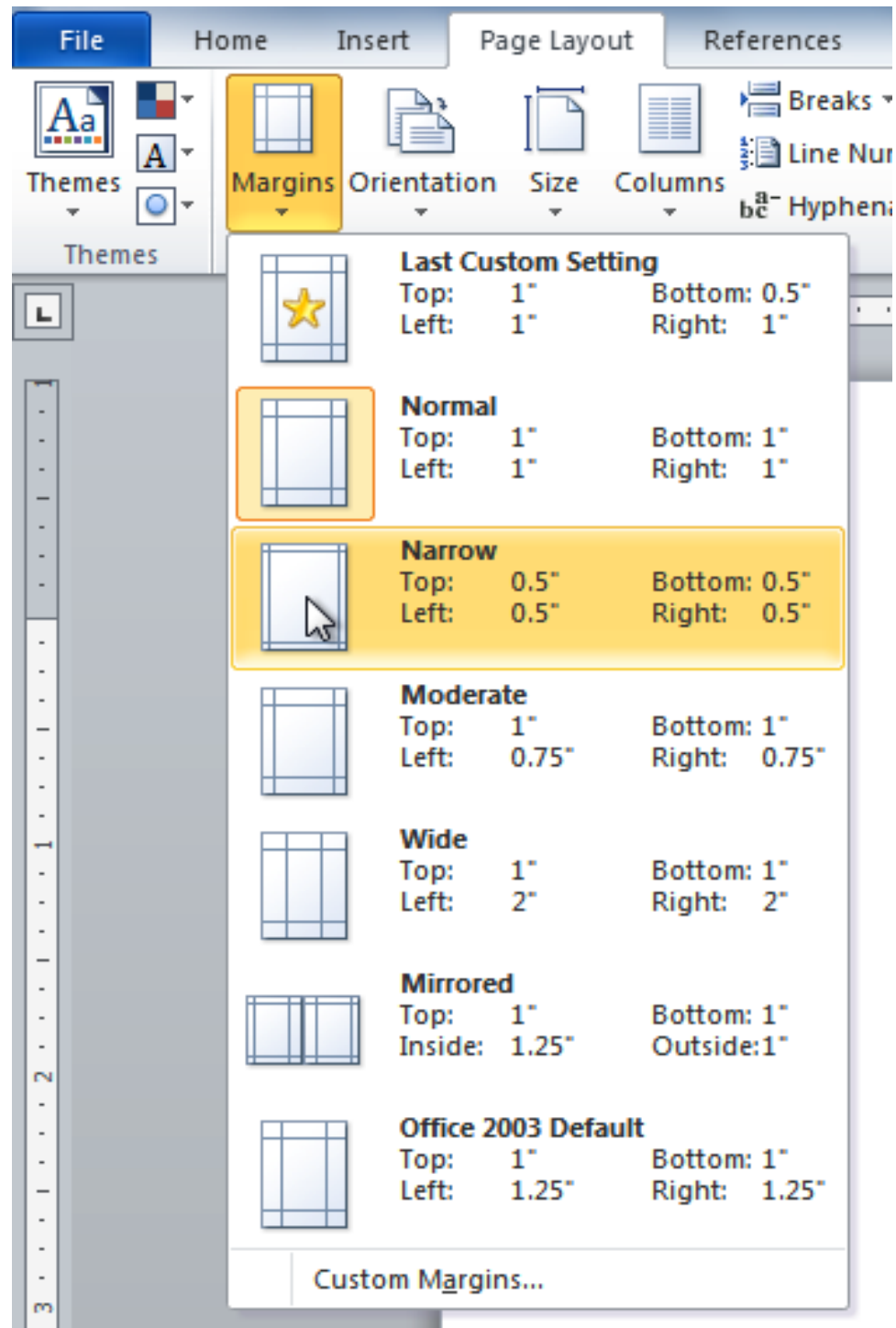


2. Click the Orientation command in the page set-up Group.
3. Click either **Portrait** or **Landscape** to change the page orientation.

### 3. Applying Page Margins

The procedure to Set-up the page Margin has the following steps:

1. Opening the document you wish to modify.
2. Clicking on **Page Layout**, located in the toolbar at the top of the screen.
3. Clicking on the arrow beside Page **Margins** which is located in the Page Setup section.



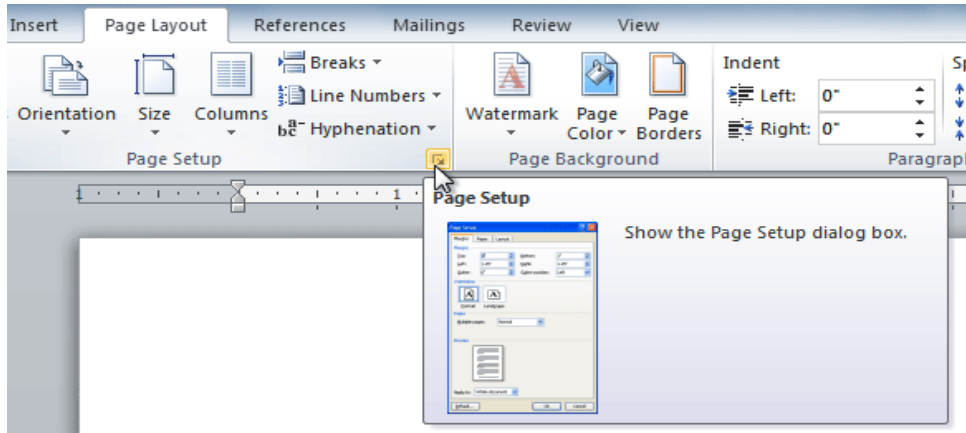
4. Selecting one of the pre-existing margins or customizing your own.
5. Selecting OK.

## 4. Using Custom Margin

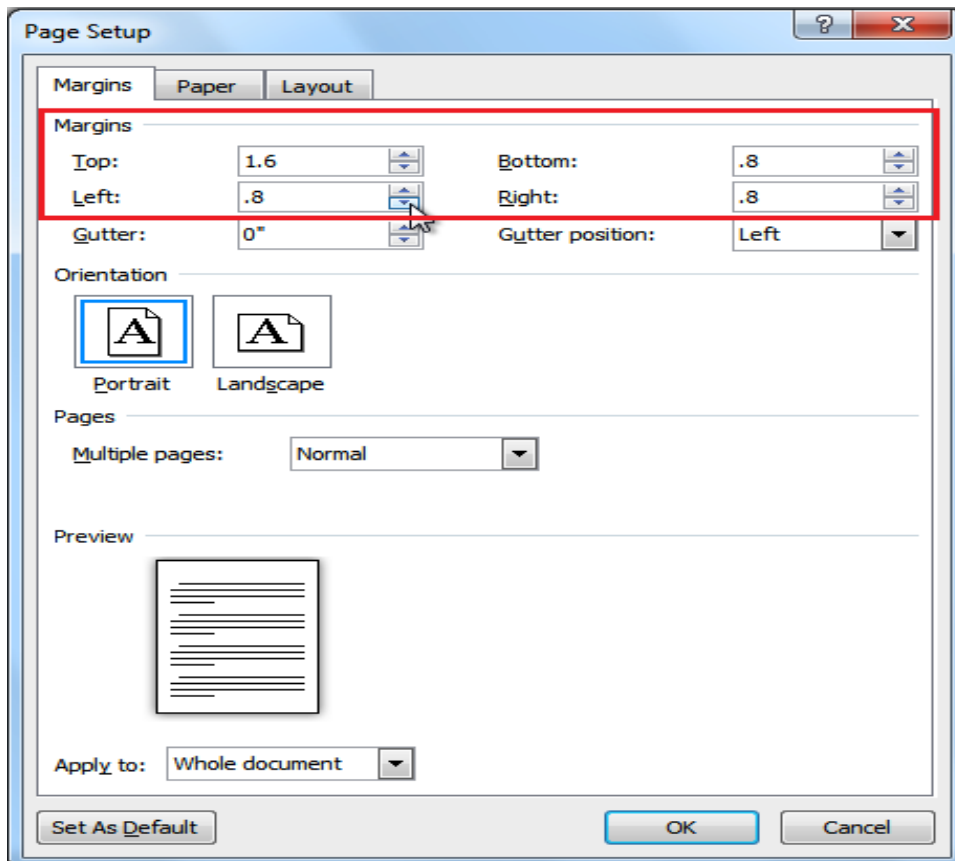
1. From the **Page Layout** tab, click **Margins**.

OR

2. Click the small arrow in the bottom-right corner of the **Page Setup** group. The **Page Setup** dialog box will appear.



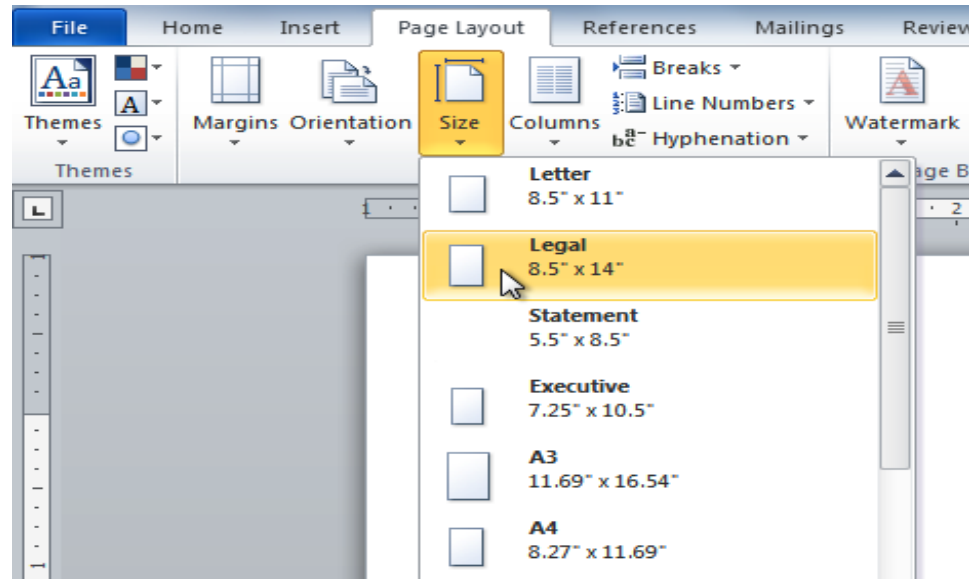
3. Adjust the **margin sizes** for each side of the page (Top, Bottom, Right, Left), and then click **OK**.



## 5. Using Paper Size

The procedure of using different page sizes has the following steps:

1. Select the **Page Layout** tab.
2. Click the **Size** command, and a drop-down menu will appear. The current page size is highlighted. In the picture below **Legal** is being applied. **8.5"×14"** is the width and height of the page.

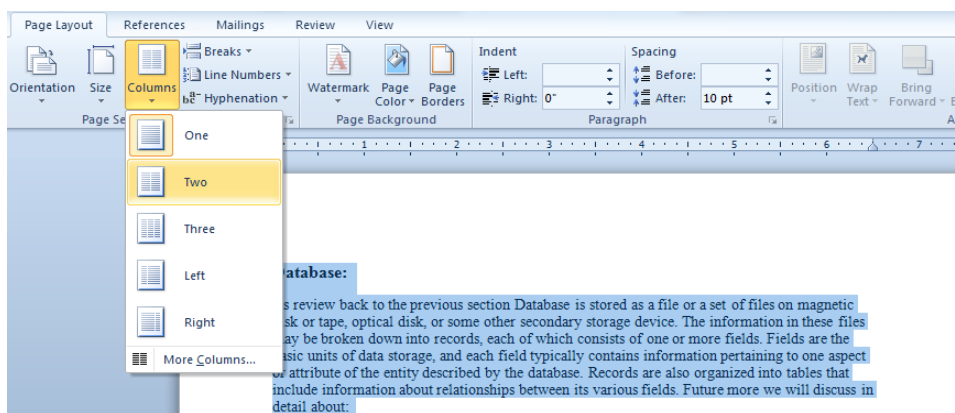


3. Click the **size option** you want. The page size of the document changes.

## 6. Inserting Columns

The procedure to insert the columns in the page has the following steps:

1. Select the text you want to format.
2. Click the **Page Layout** tab.
3. Click the **Columns** command. A drop-down menu will appear.

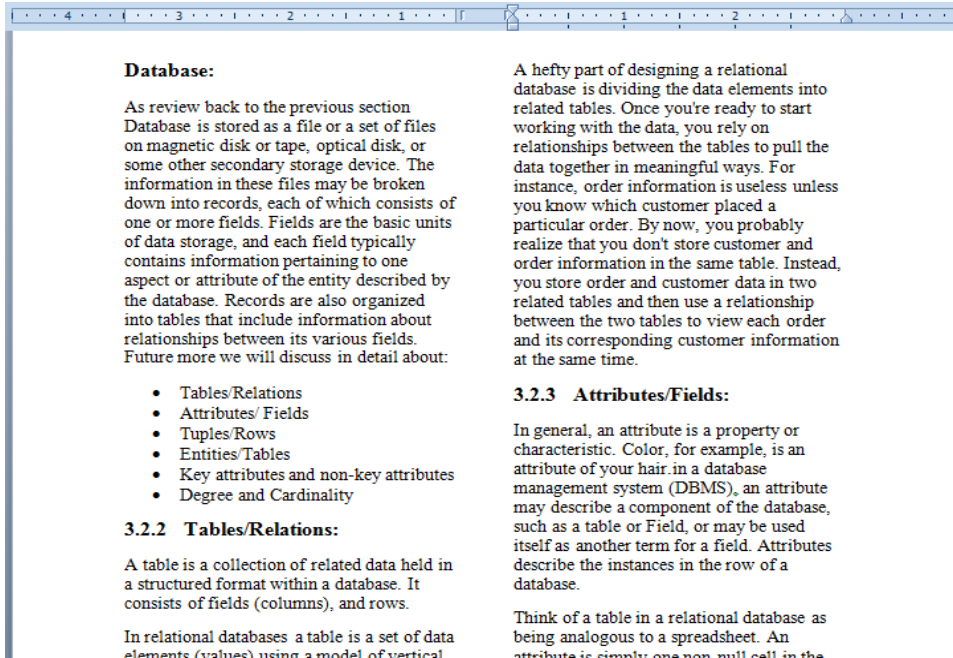


### Do you know!

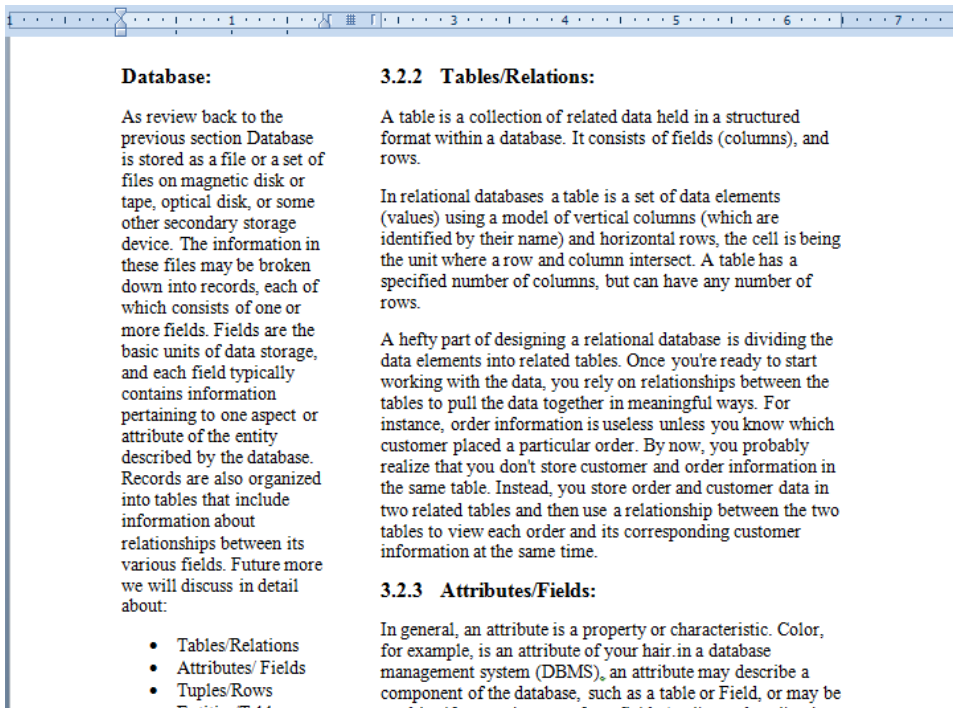
You can remove the columns by clicking the **Columns** Command and selecting **one** for the number of columns.

4. Select the number of columns you want to insert. The text will then format into columns. In the picture below **two** is selected.





5. Same like this different Column Options can be applied. Left Column will be shown like the picture given below.



## Learner's Activity

- Open a **Word document**
- Change the **page orientation**
- Change the **paper size**
- Change the margins to **narrow**
- Adjust the margins using **custom margins**
- Set the page as **two Columns**

## Learning Unit 3: Edit Word Document

### Overview

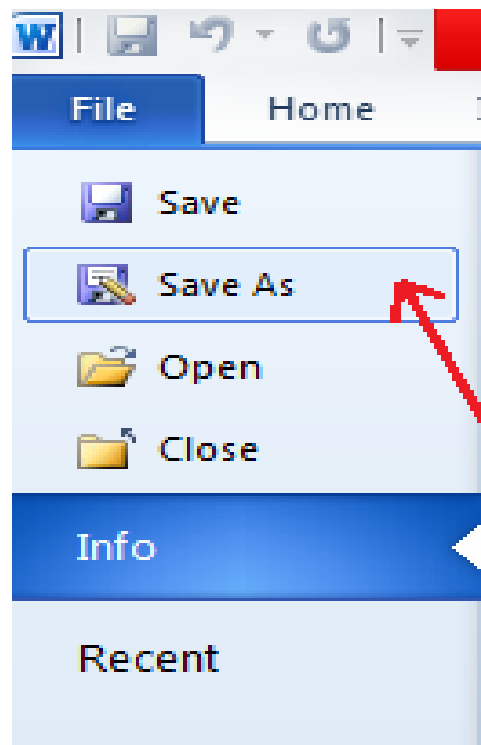
In this learning unit, you will learn the editing in the word document that how you can insert or delete a new word/paragraph and can spell checking through available dictionary. After completion of this learning unit, you will be able to edit word document such as insert or delete text, spell checking, word count etc...

### 1. Perform Save as Function

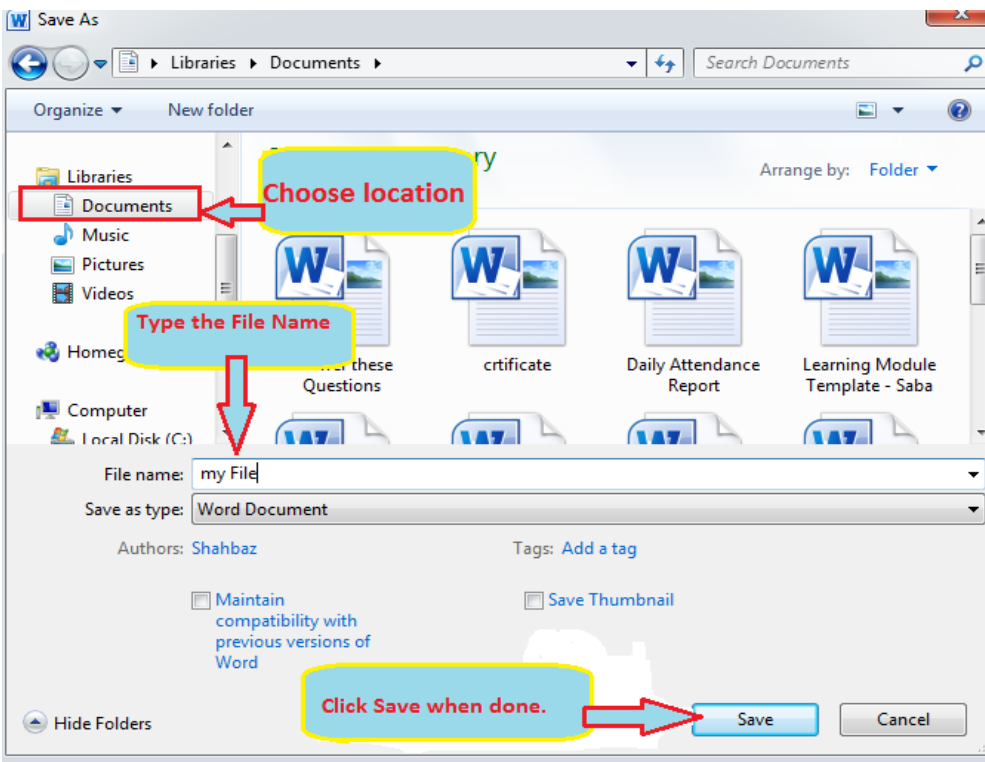
**Save As** function allows you to choose a name and location for your document. It's useful if you've first created a document or if you want to save with different name while keeping the original document.

The procedure to save a word file through Save As function has the following steps:

1. Open the word File
2. Click the **File** tab.
3. Select **Save As**.



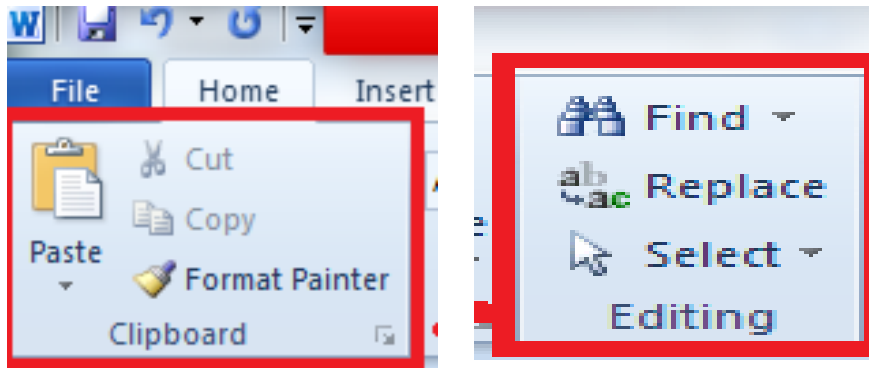
4. The **Save As** dialog box will appear. Select the location where you want to save the document.
5. Enter a name for the document, then click **Save**.

**Do you know!**

In window 7 normally the Word file will be saving in Documents Library.

## 2. Different Features of Editing

Edit menu cannot be find in the Ribbon in MS 2010, because all the toolbars and menus are redesigned and relocated in it. For example, the **Select** function stays in the **Editing** group of **Home** tab; the **Paste** function stays in the **Clipboard** group of **Home** tab.



**Cut:** Removes the selection from the active document and places it on the clipboard. Short Key of Cut command is CTRL+X.

**Copy:** Copies the selected text to the clip board

**Paste:** Paste the contents of the clipboard at the insertion point (cursor) or whatever is selected.

**Clear:** Deletes the selected object or text, but does not place it on the clipboard.

**Select All:** Selects all text and graphics in the active window.

**Find:** Searches for specified text in the active document.

**Replace:** Searches for and replaces specified text and formatting.

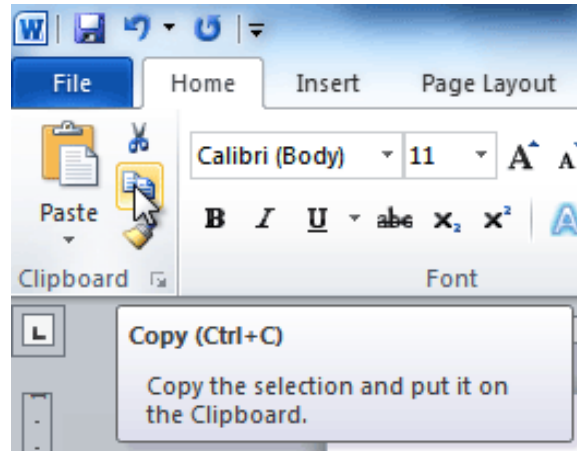
### 3. Copying and Pasting Text

The procedure to Copy and paste the text has following steps:

1. Select the text you want to copy.
2. Click the **Copy** command on the **Home** tab. You can also right-click your document and select **Copy**

#### Remember

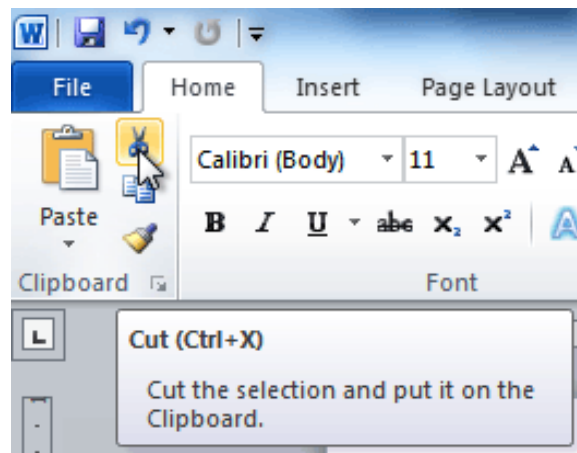
Short Cut key to copy text is CTRL+C. Short Key to paste text is CTRL+V



3. Place your insertion point where you want the text to appear.

### 4. Cutting and Pasting Text

1. Select the text you want to copy.
2. Click the **Cut** command on the **Home** tab. You can also right-click the document and select **Cut**.



3. Place your insertion point where you want the text to appear.

#### Dragging and Dropping Text:

1. Select the text you want to copy.

2. **Click and drag the text** to the location where you want it to appear. The cursor will have a rectangle under it to indicate that you are moving text.

As the popularity of the Internet continues to grow, affordable access is becoming a necessity. WebDen provides people with the ability to access the Internet in a social environment. People of all ages and backgrounds are welcome to enjoy the quirky, upscale, and innovative environment that only WebDen provides. Coffee, entertainment, and the Internet together form an engaging social scene.

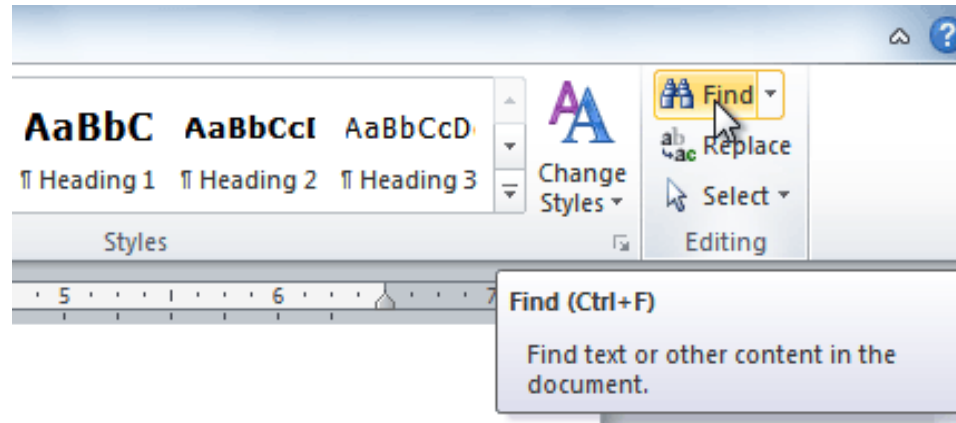
#### Remember

If text **does not appear** in the exact location you want, you can click the **Enter** key on your keyboard to move the text to a new line.

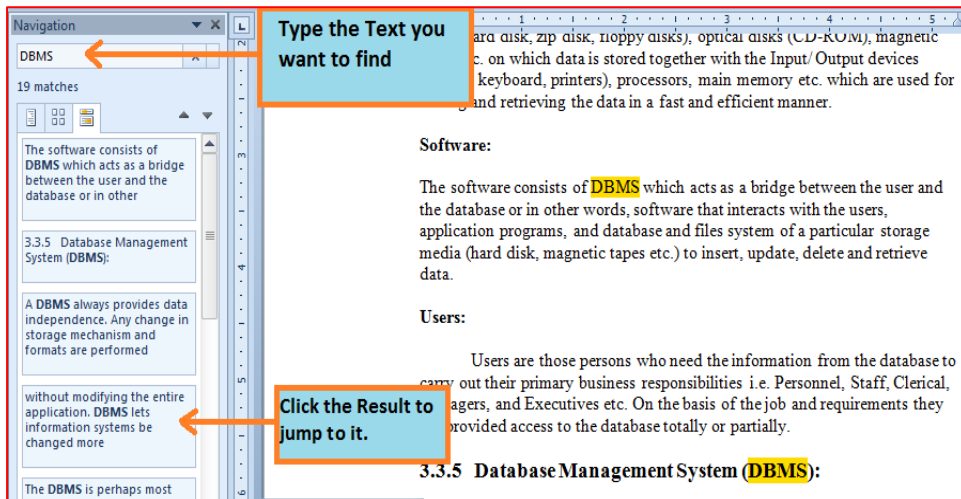
3. Release the mouse button, and the text will appear.

## 5. Finding Text

1. From the **Home** tab, click the **Find** command. The **navigation** pane will appear on the left side of the screen.



2. Type the text you want to find in the field at the top of the navigation pane.
3. If the text is found in the document, it will be highlighted in yellow, and a preview will appear in the navigation pane.



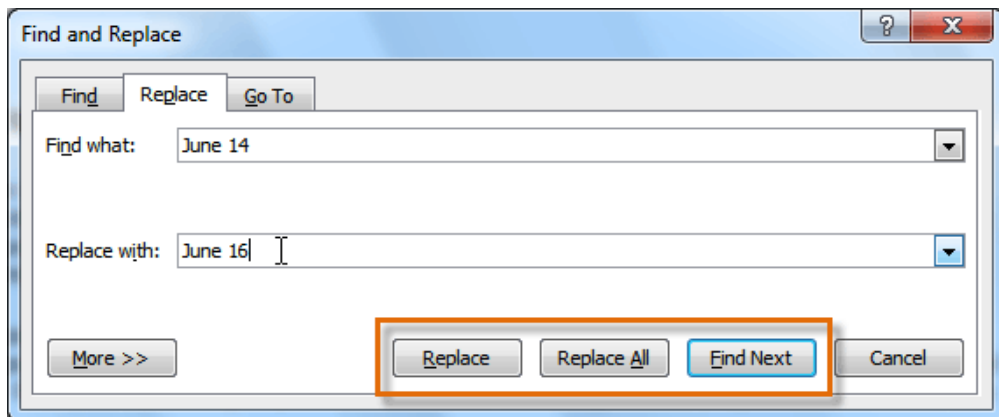
4. When you close the navigation pane, the highlighting will disappear.

## 6. Replacing Text

1. From the **Home** tab, click the **Replace** command. The **Find and Replace** dialog box will appear.

### TIP

When you have your mouse over a tracked change, Word displays the author, date, time and the type of change such as inserted or deleted.



2. Type the text you want to find in the **Find what** field.
3. Type the text you want to replace it with in the **Replace with** field.
4. Click **Find Next** and then **replace** to replace text. You can also click **Replace All** to replace all instances within the document.

## 7. Learning about Track Changes

Word document can be set to mark and track changes you make to a document so that you or another author can later review the changes. When reviewing, you or another author can choose to accept or reject the changes. For each change that is tracked, Word stores the exact modification that was made as well as the name of the author, the date and the time of the change. This information is displayed when you review the revisions.

### Switching On Tracking Changes:

1. Click on the **Review** Tab.
  2. Go to the **Track Changes** options in the **Tracking** Section.
  3. Once click on the **Track Changes** button, it will turn an orange color to indicate that the tracking changes has been turned on.
- Any text that is deleted becomes colored and crossed-through.
  - Any new text that is added is either:
    - 1) colored and inserted within the text
    - OR
    - 2) Shown in the extended right margin in a balloon.
  - Any line of text that contains any edits is indicated by a vertical line in the left margin.

Many businesses do not have the time or resources available to gather and process large quantities of information. Therefore, they may lack information about how their business is performing - for example, how profitable their product lines are or whether customers are making repeat purchases. Using a sophisticated database management system allows you to do this, and the store of data that is built up over time can become increasingly useful and valuable.

**Some of the advantages of using database technology include:**

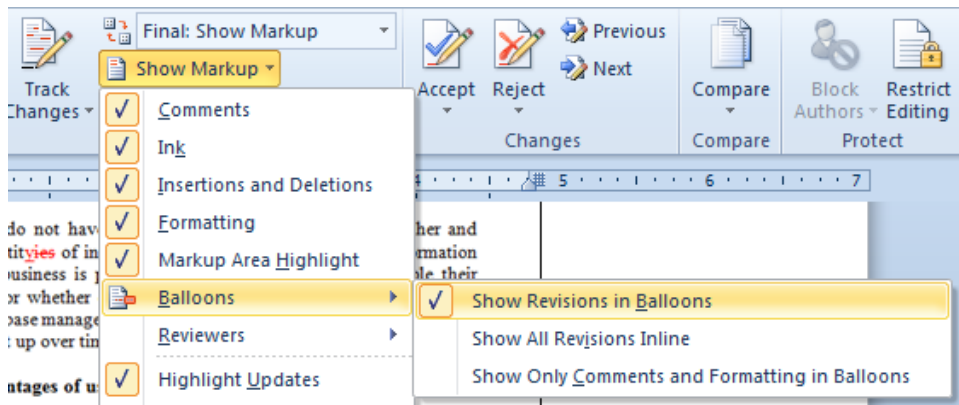
1. Reducing the amount of time spent in managing data.
2. Giving you the ability to analyze data in a variety of ways.
3. Promoting a disciplined approach to data management.
4. Provides a central store of data that can be accessed by multiple users in a controlled manner.
5. Improving the quality and consistency of information.
6. Information can be accessed and updated quickly and efficiently.
- ~~7. Provide Data Security.~~

## 8. Tracking Changes with Balloons

Any new text that is added, when tracking changes is switch on, will either be inserted in line with the text or shown in the extended right margin in a bubble:

1. Go to the **Review** tab and locate the **Tracking** group.
2. Click on the show Markup Button and then click on **Balloons** command button.
3. Select the option you require from the three offered to you.



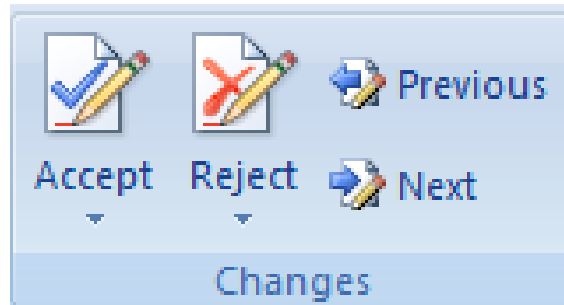


### Accepting/Rejecting Changes:

1. Locate the revision and click anywhere onto it.
2. Alternatively, use the **Next** or **Previous** command buttons to jump to each revision in turn

#### Note

Note, if you do not select any text Word will assign the comment to the word closest to the cursor positioned in your document.



3. To ACCEPT the change click on the **Accept** button.
4. To REJECT the change click on the **Reject** button.

### Showing Markup:

If you find the display of the marks when you are trying to decide whether to accept or reject the changes you can choose different ways to view the proposed changes to your document.

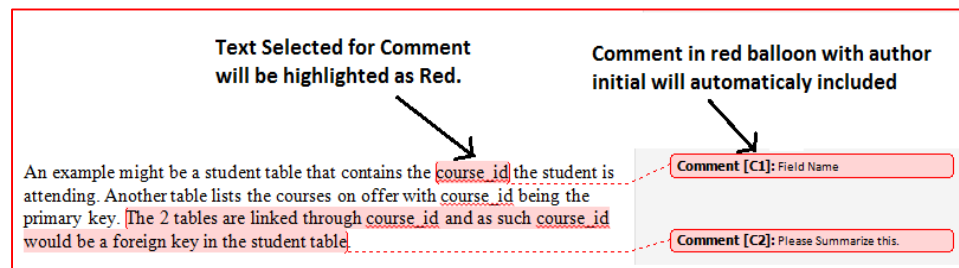
- **Final Showing Markup:** This shows the document with all the proposed changed included.
- **Final:** This shows the document with all the proposed changes included minus the markup
- **Original Showing Markup:** This shows the original document with the proposed changes included with the markup
- **Original:** This shows the documents before any changes were made and without the markup.

**Comments:**

Comments provide you with a useful way to leave notes about parts of the document without any note text of the document text. You could leave notes about text you need to check up on or edit. Also, your proof reader or supervisor could leave notes for you.

**Inserting Comments:**

1. Select the text you wish to write the comment for.
2. Go to the **Review** tab and locate the **Comments** group.
3. Click on the **New Comments** button.

**Deleting Comments:**

1. Right click the comment and then select **Delete Comment**

**To Delete all the Comments in a Document :**

1. Go to the **Review** tab and locate the **Comments** group
2. Click on the lower part of the **Delete** command button
3. Select **delete all comments in document.**

## 9. Editing Options

**Word Count:**

When you type in a document, Word automatically counts the number of pages and words in your document and displays them on the status bar at the bottom of the workspace.



## Count the Number of Pages, Characters, Paragraphs, and Lines

The **Word Count** dialog box displays the number of pages, paragraphs, and lines in your document, and also the number of characters, either including or excluding spaces.

- On the **Review** tab, in the **Proofing** group, click **Word Count**.

### Do you know!

If you don't see the word count in the status bar, right-click the status bars, then click Word Count.

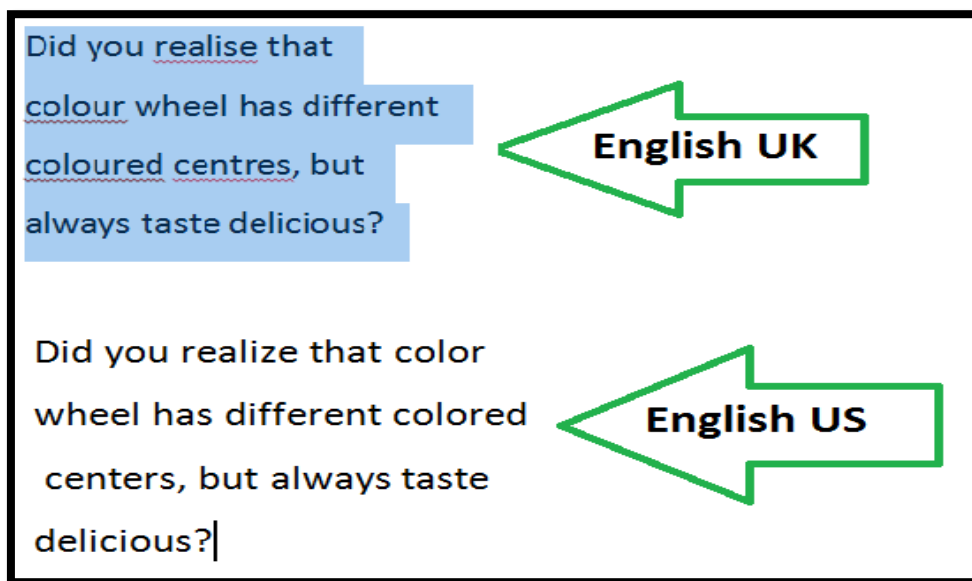


## Set Language:

If you created a document that contains text in different languages, and you want to use the appropriate language dictionaries to check the spelling of each language you have included, then you have to set the proper language.

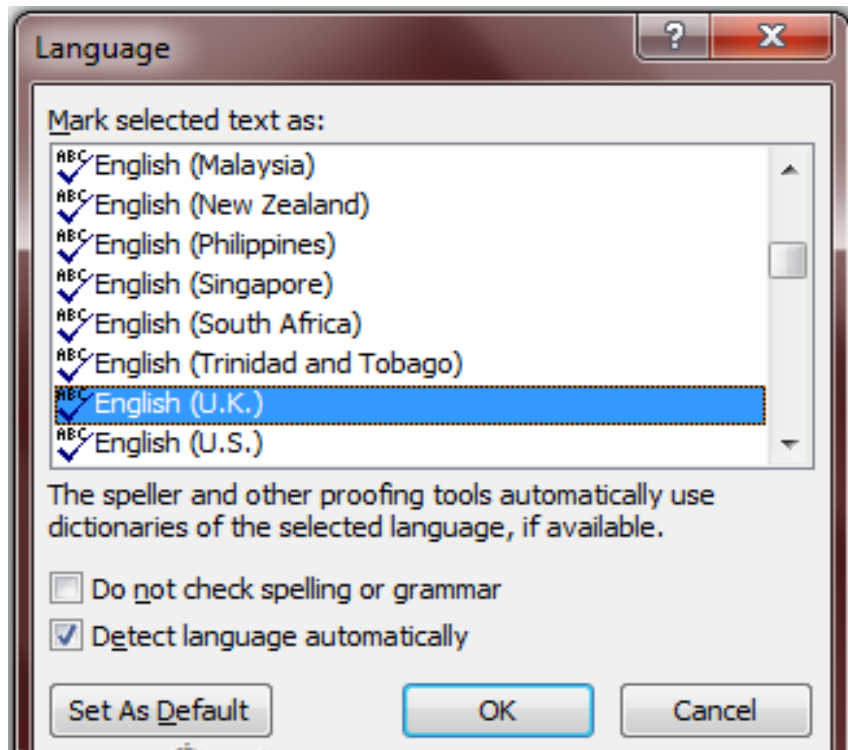
To procedure to set proper language has following steps:

1. Create a **New Word document**, or open an existing document having text in English US and English UK.
2. Select the text for which you'd like to change the proofing language.

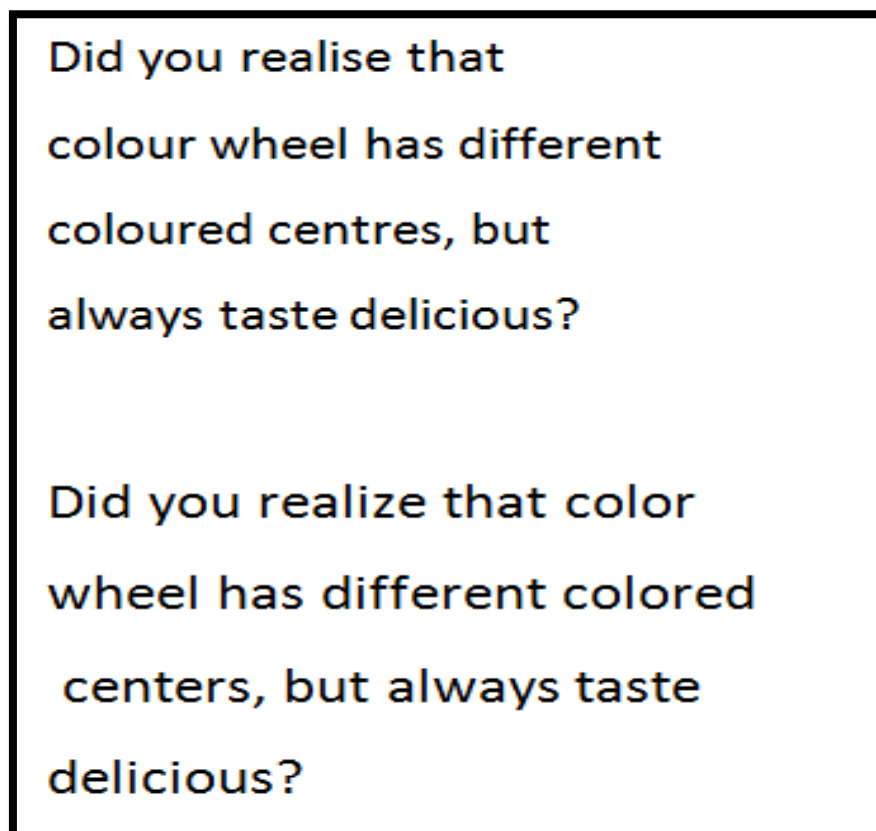


3. From the **Review** ribbon, *Click Language and Set Proofing Language*.

4. Choose **English (U.K.)** or **English (U.S.)** and *Click OK*. U can choose different languages as well.



5. The text will be changed.

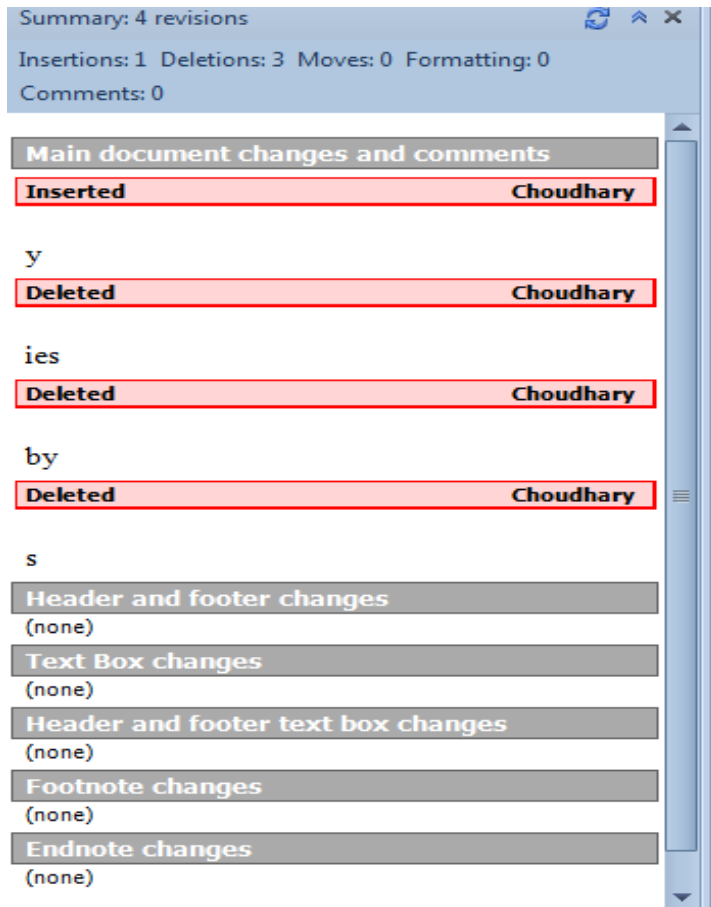


### Reviewing Pane:

The Reviewing Pane displays all of the changes that currently appear in document, the total number of changes, and the number of changes of each type.

#### Note

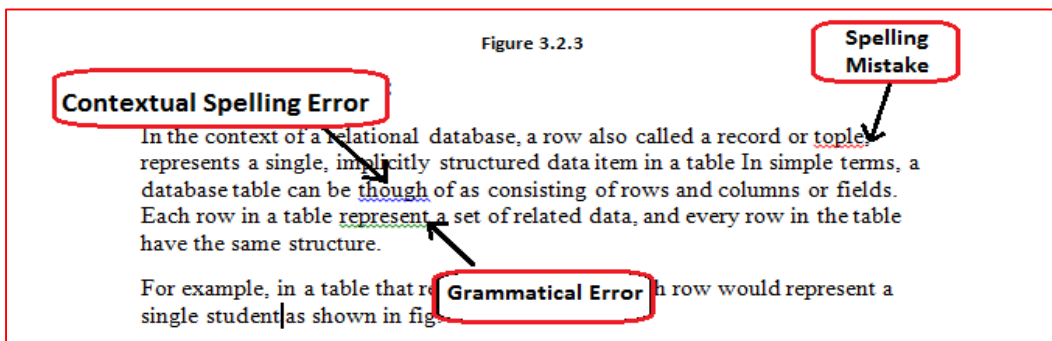
The Reviewing Pane is another way that you can check for any hidden changes and comments before sending on the document to other people.



### Spell Checking:

By default, Word automatically checks document for **spelling and grammar** errors, so you may not even need to run a separate spelling and grammar check. These errors are indicated by **colored wavy lines**.

- The **red line** indicates a misspelled word.
- The **green line** indicates a grammatical error.
- The **blue line** indicates a contextual spelling error. This feature is turned off by default.



Spelling can be checked by right clicking to the end of last character of the word or from **Review tab>Proofing Group>Spelling & Grammar button**.

## 10. Working with Text Editing

### Inserting Text in a File

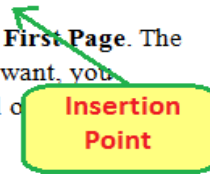
To insert text to your document, use the keyboard or the mouse to position the cursor where you want to add your text. If any text is selected, your typing will over-write the selected text.

The procedure to insert the text in a file has the following steps:

1. Move your mouse to the location where you want text to appear in the document.
2. Click the mouse. The **insertion point** appears.

In some documents, you may not want the first page to show the page number. You can **hide the first page number** without affecting the rest of the pages.

1. Select the **header** or **footer** that contains the page number.
2. From the **Design** tab, place a check mark next to **Different First Page**. The header and footer will disappear from the first page. If you want, you can **type something new** in the header or footer, and it will only appear on the **first page**.



### Note

The whole page/Paragraph can also be deleted by selecting text and pressing backspace key just once.

3. Type the text you want to appear.

### Deleting Text:

1. Place the **insertion point** next to the text you want to delete.
2. Press the **Backspace** key on your keyboard to delete text to the **left** of the insertion point.
3. Release the mouse button. You have selected the text. A **highlighted box** will appear over the selected text.

## Learner's Activity

- Open an **existing Word document**
- Turn on **Track Changes**
- **Delete** some text
- **Add** some text
- Change some of the **text formatting**
- Experiment with the **Display for Review** command
- **Accept** all of the changes
- Review the document

# Learning Unit 4: Format Word Document

## Overview

### Remember

Text to Table option is only available in the insert menu when text is selected.

In this learning unit you will learn about the formatting of body text and headings such as font styles, colors, alignment and page number. After completion of this learning unit, you will be able to format the paragraphs and pages according to the requirements.

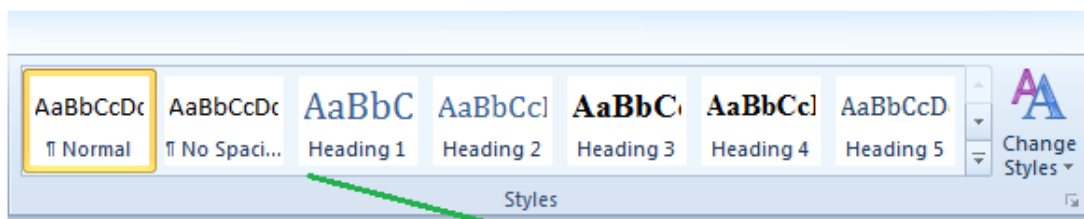
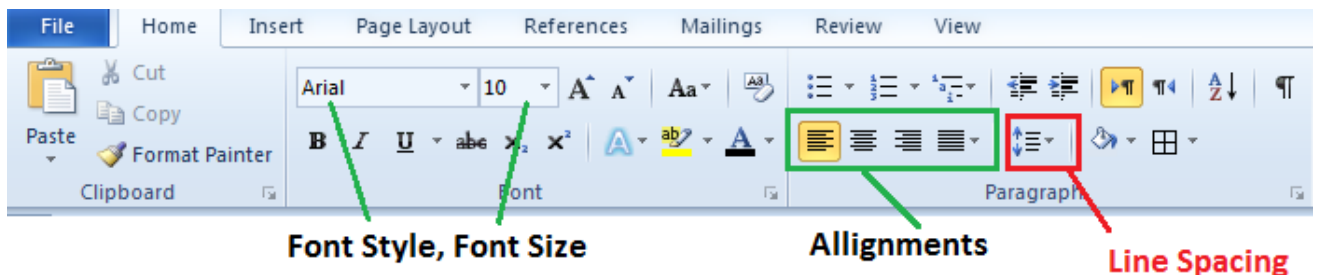
## 1. Features of Formatting

### Do you know!

The selected Table is converted into Text. Each row gets converted into a paragraph. The text in each cell of the row gets separated by tabs.

To create and design effective documents, you need to know how to **format text**. Formatted text can emphasize important information and help to organize document.

In Word, there are several options for adjusting the font of text, including **size**, **color**, and inserting special symbols. You can also adjust the **alignment** of the text to change how it is displayed on the page. The text formatting toolbar is given below with the options related to text formatting.



## 2. Formatting Text

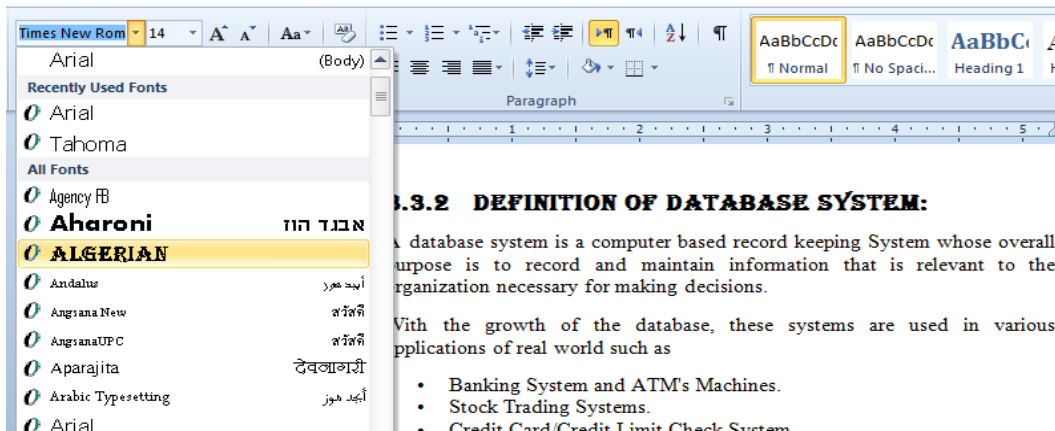
### 1) Changing Font Style:

The procedure to change the font style has the following steps:

1. Select the text you want to modify.



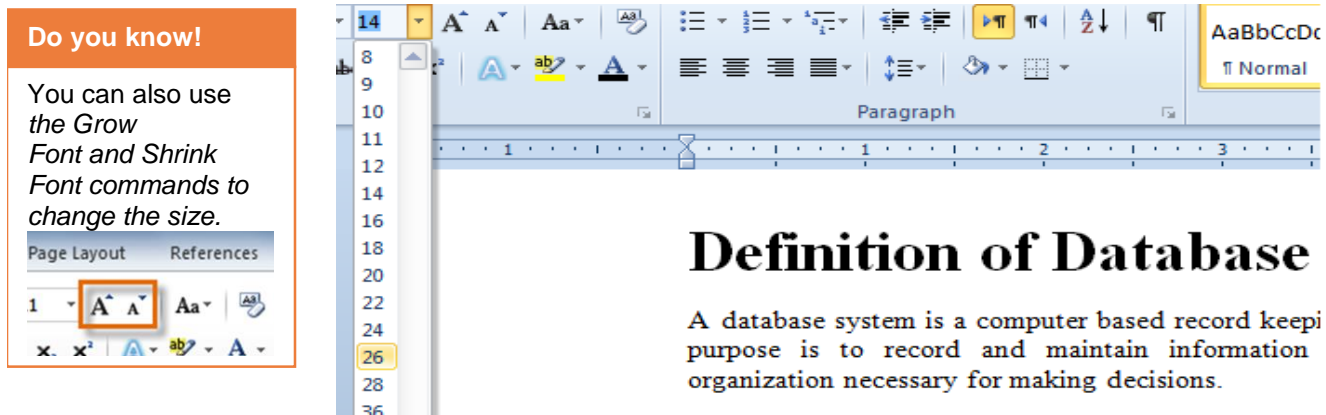
2. Click the **drop-down arrow** next to the **Font** box on the **Home** tab. The **Font** drop-down menu appears.
3. Move the mouse pointer over the various fonts. A live preview of the font will appear in the document.



4. Select the appropriate font style... The font will change in the document.

## 2) Changing Font Size:

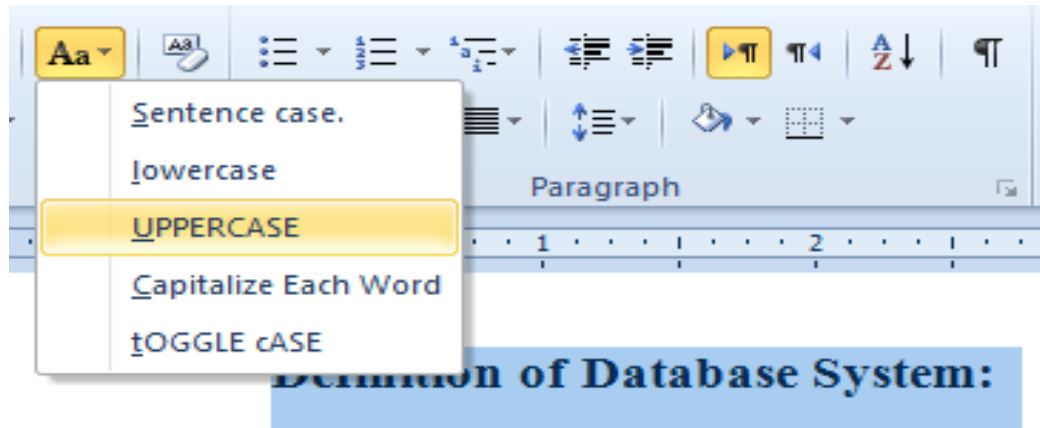
1. Select the text you want to modify.
2. Click the **drop-down arrow** next to the **Font Size** box on the **Home** tab. A drop-down menu appears.
3. Select the desired font size from the menu.



## 3) Change Case:

You can change the text from upper case to Lower Case or vice versa from the **Change Case** option.

- 1) Select the Desired text.
- 2) Click the **drop-down arrow** of **change case box** (next to shrink font option).



A database system is a computer based re

3) Select the desired case.

## DEFINITION OF DATABASE SYSTEM:

A database system is a computer based record keeping Sy

### 3. Paragraph Setting

Many options are available in MS Word for Paragraph setting.

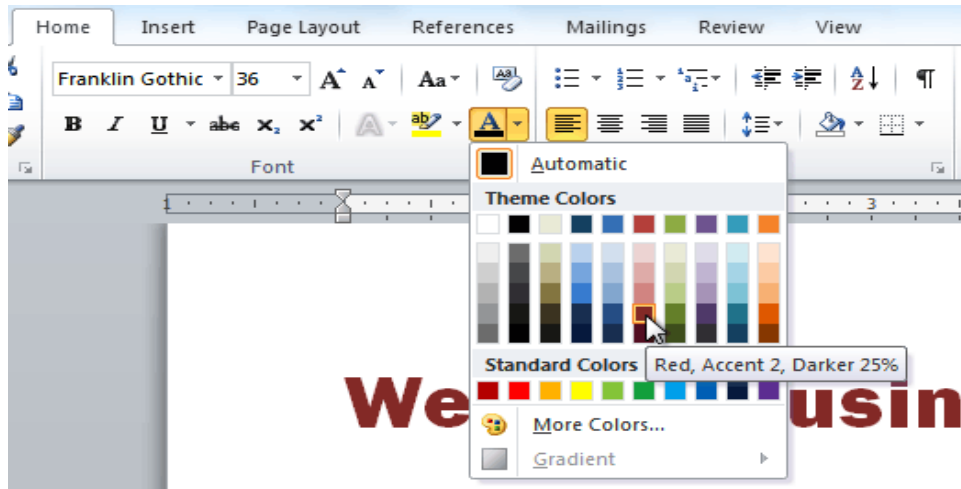
#### 1) Changing Font Color:

The procedure to change the font color has the following steps:

1. Select the text you want to modify.
2. Click the **Font Color** drop-down arrow on the **Home** tab. The **Font Color** menu appears.
3. Move the mouse pointer over the various font colors. A live preview of the color will appear in the document.
4. Select the font color you want to use. The font color will change in the document.

#### Do you know!

More colors can be used from the **More Color** option at the bottom of the list.



**Remember**

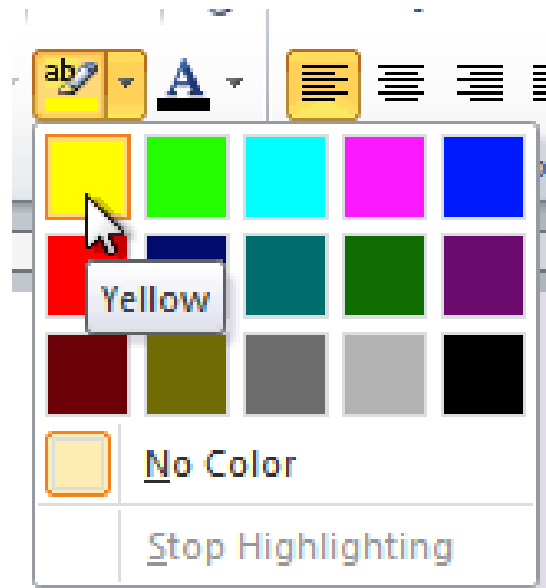
To remove the text Highlight effects click the option No Color.

**Do you know!**

Mostly these options are used to make a heading. To remove effect of these commands select the text and click the options once again.

**Highlighting Text:**

The text can also be highlighted from the **Text Highlight Color** Option located in the **Font Group**.

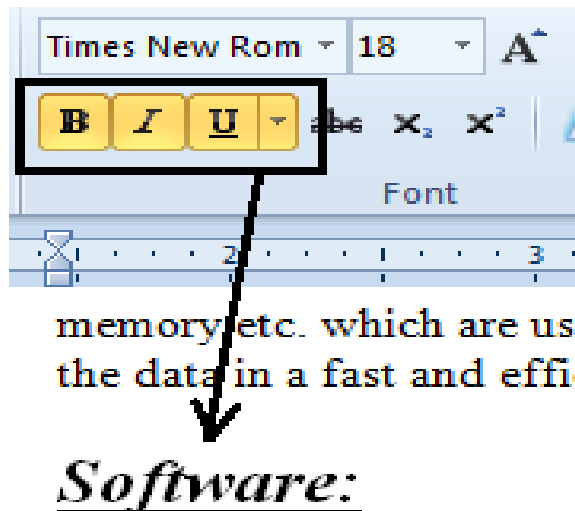


**Hardware:**

**The hardware consists of the secondary storage** devices such as magnetic disks (hard disk, zip disk, floppy disks), optical disks (CD-ROM), magnetic tapes etc. on which data is stored together with the Input/ Output devices (mouse, keyboard, printers), processors, main memory etc. which are used for storing and retrieving the data in a fast and efficient manner.

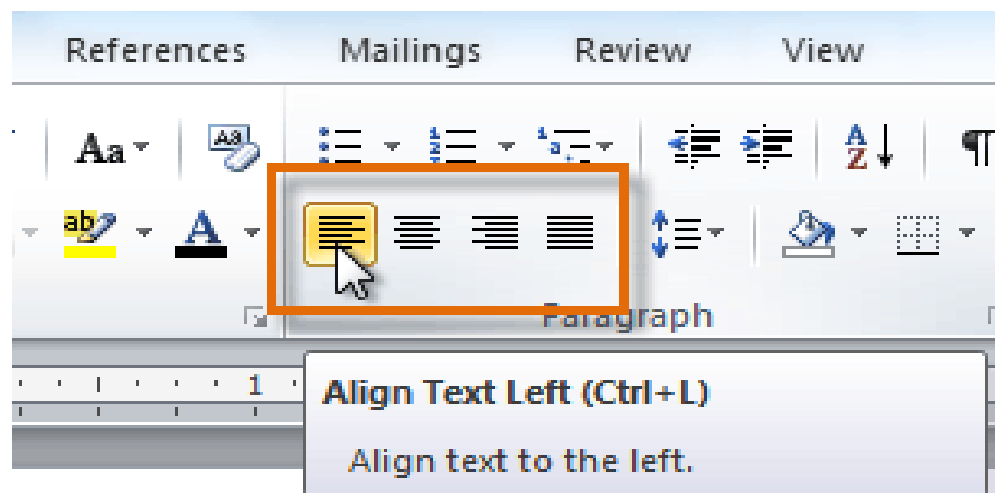
#### 4. Using Bold, Italic and Underline Command

1. Select the text you want to modify.
2. Click the **Bold**, *Italic*, or Underline command in the **Font** group on the Home tab.



#### Changing Paragraph Alignment:

1. Select the text you want to modify.
2. Select one of the four **alignment options** from the **Paragraph** group on the **Home** tab.
  - **Align Text Left:** Aligns all selected text to the left margin
  - **Center:** Aligns text an equal distance from the left and right margins
  - **Align Text Right:** Aligns all selected text to the right margin
  - **Justify:** Aligns text equally on both sides and lines up equally to the right and left margins; used by many newspapers and magazines



#### Remember

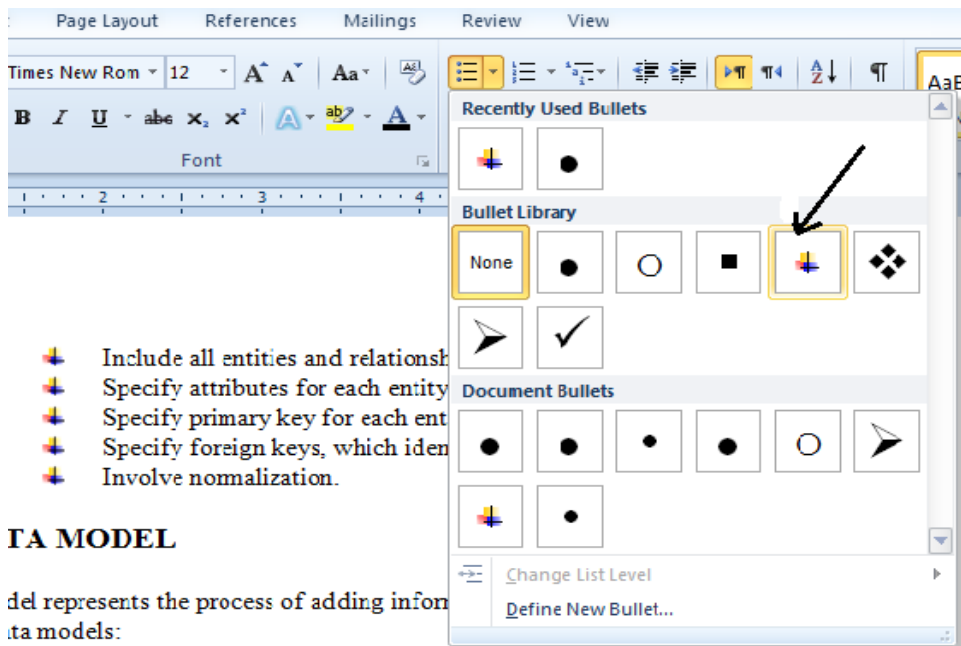
When you're editing a list, and press **Enter** to start a new line, the new line will automatically have a bullet or number. When you've reached the end of your list, press **Enter** twice to return to normal formatting.

### Using Bullets and Numbering:

When you want to organize lists in Word, you can format them as either **bulleted** or **numbered** lists. Word offers a variety of bullet options that allows to customize lists to suit your needs.

The procedure to create a bulleted list has following procedure:

1. Select the text you want to format as a list.
2. Click the **Bullets** or **Numbering** drop-down arrow on the **Home** tab.



3. Select the bullet or numbering style you want to use, and it will appear in the document.
4. To remove numbers or bullets from a list, select the list, then click the **Bullets** or **Numbering** commands.

### Multilevel List:

Multilevel lists allow you to create an **outline** with **multiple levels**.

You can then use the **Multilevel List** command to choose the types of bullets or numbering that are used.

The procedure to use multilevel list have the following steps:

1. Select the text you want to format as a multilevel list.
2. Click the **Multilevel List** command on the **Home** tab.
3. Click the bullet or numbering style you want to use. It will appear in the document.
4. Position your cursor at the end of a list item, then press the **Enter** key to add an item to the list.
1. To change the level of list place the **insertion point** at the beginning of the line.

- ❖ Sporting Equipment
  - Baseball
    - Baseball glove
    - Baseballs
    - Bats
    - Baseball helmets
  - Basketball
    - Basketballs
  - Golf
    - Golf clubs
    - Golf balls

2. Press the **Tab** key to increase the level.

- ❖ Sporting Equipment
  - Baseball
    - Baseball glove
    - Baseballs
    - Bats
    - Baseball helmets
  - Basketball
    - Basketballs
  - Golf
    - Golf clubs
    - Golf balls

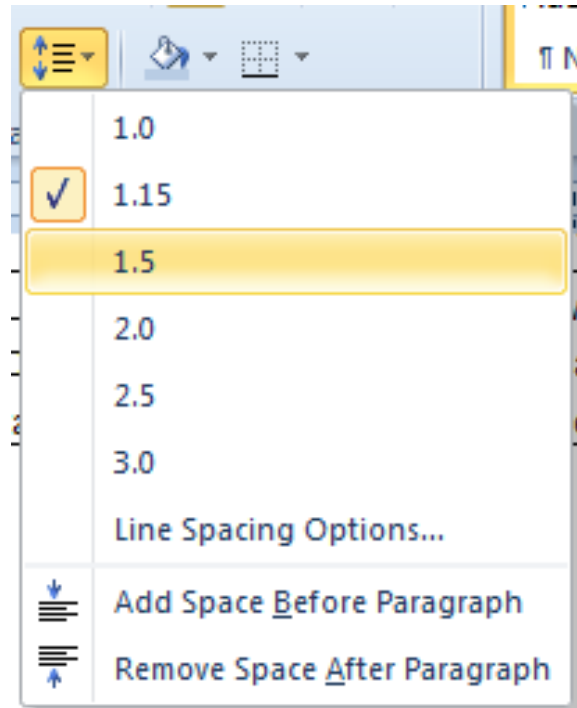
#### Note

Already applied line spacing option appears with the ✓ sign on the left side of spacing value.

3. Hold **Shift** and press **Tab** to decrease the level.

### Setting Line Spacing of a Paragraph:

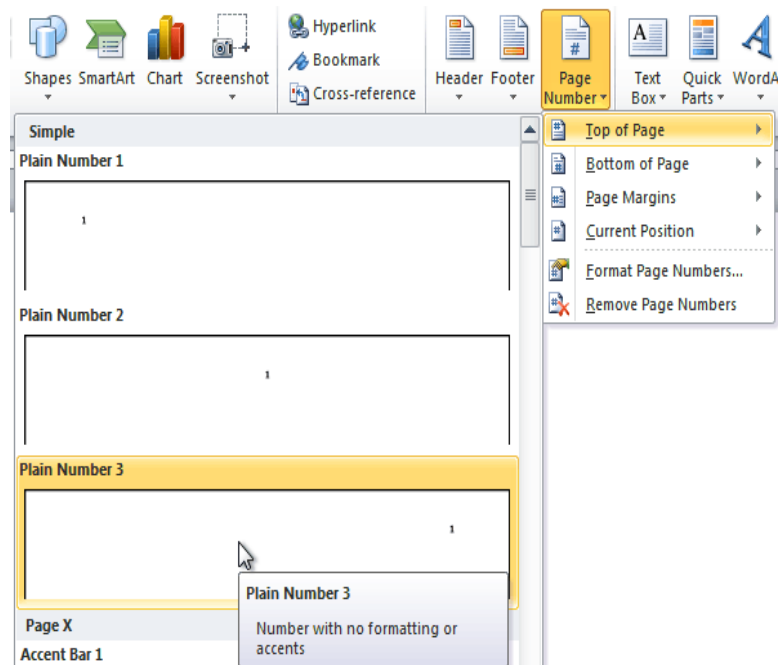
Line spacing refers to the distance between the lines in a paragraph. Different line spacing options are available in the **paragraph** group of **Home** tab. Line spacing of a paragraph can be adjust by clicking on the appropriate value from the drop down command on **line spacing** option.



## 5. Adding Page Numbers

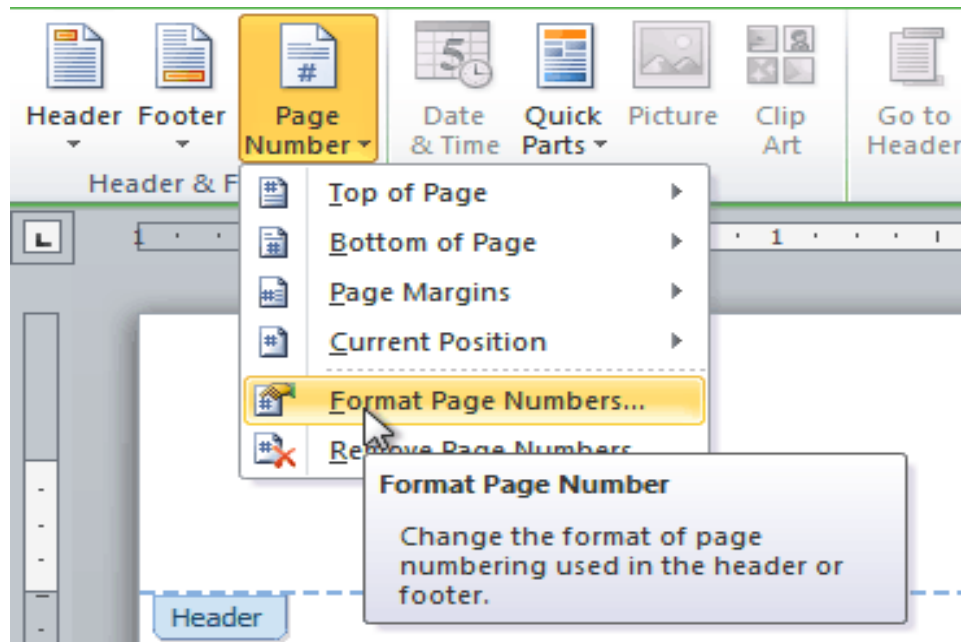
The procedure to insert the **page number** in the document has the following steps:

1. From the **Insert** tab, click **Page Number**. A drop-down menu will appear.
2. Select the desired **page number style** and it will appear in your document.

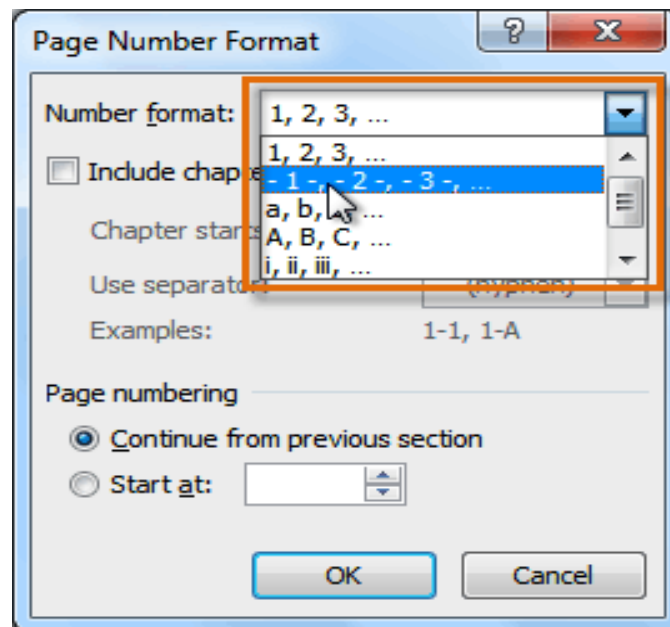


## Formatting Page Numbers

1. Select the **header** or **footer** that contains the page number.
2. From the **Design** tab, select the Page Number command.
3. Click **Format Page Numbers**.

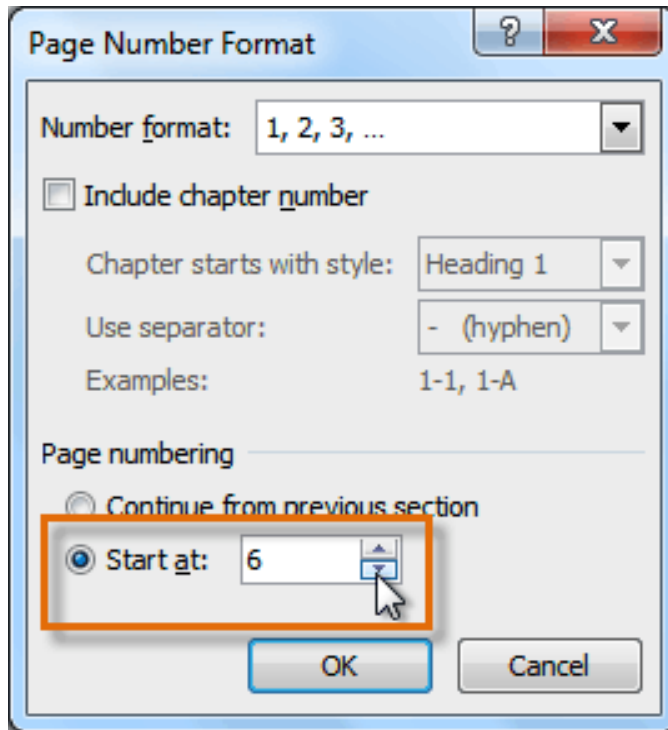


4. From the dialog box, select the desired **Number format**.



5. Next to **Start at**, enter the number you want the page numbers to start with.





## 6. Separate Heading in the Text

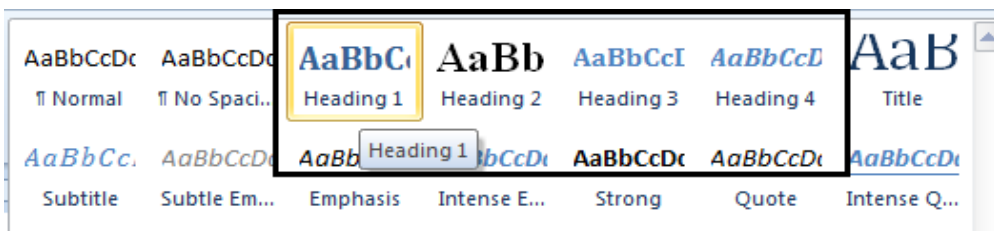
The most easy and best way to add heading in the word document is to use Styles. You can use the Built-In styles available in **Styles** Group in **Home** tab or can customize your own styles.

To use the Built-In styles for heading has the following steps:

1. Select the Text you want to make as Heading.
2. Click the proper styles of Heading.

### Do you know!

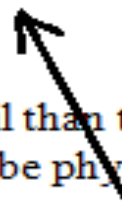
You can customize any give styles according to your requirement by right clicking on the style and selecting the Modify option.



3. The style will be applied on the selected text.

## LOGICAL DATA MODEL

This model contains more detail than t regard to how information will be phys Logical data models:

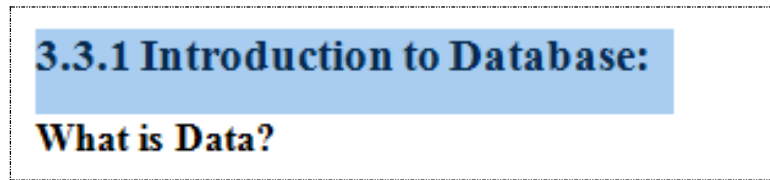


### Using Appropriate Styles of Font:

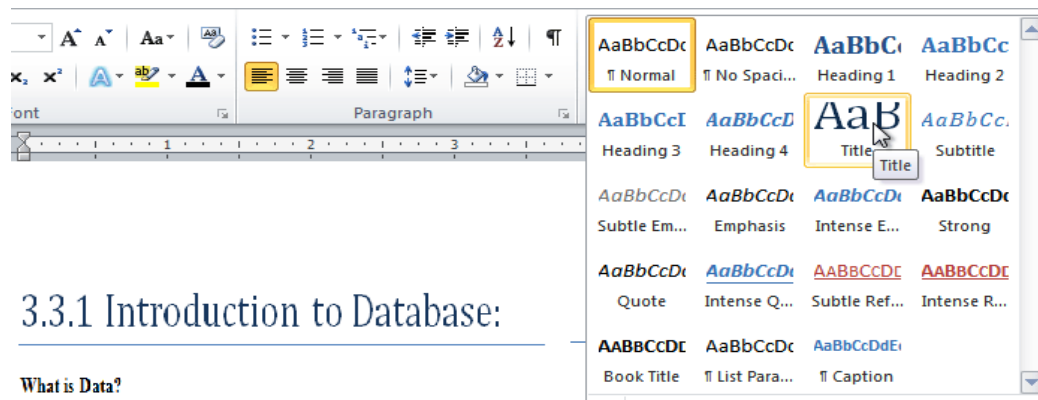
Styles and themes are powerful tools in Word that can help you easily create professional-looking documents. A **style** is a predefined combination of font style, color, and size of text that can be **applied to selected text**.

#### Applying a Style:

1. Select the text you want to format.



2. In the **Style** group on the **Home** tab, However each style to see a live preview in the document.
3. Select the style you want. The selected text appears formatted in the style.



#### To apply a Style Set:

**Style sets** include a combination of title, heading, and paragraph styles. Style sets allow you to **format all of the elements of your document** at once, rather than formatting your title and headings separately.

1. Click the **Change Styles** command on the Ribbon. A drop-down menu will appear.
2. From the drop-down menu, select **Style Set**.

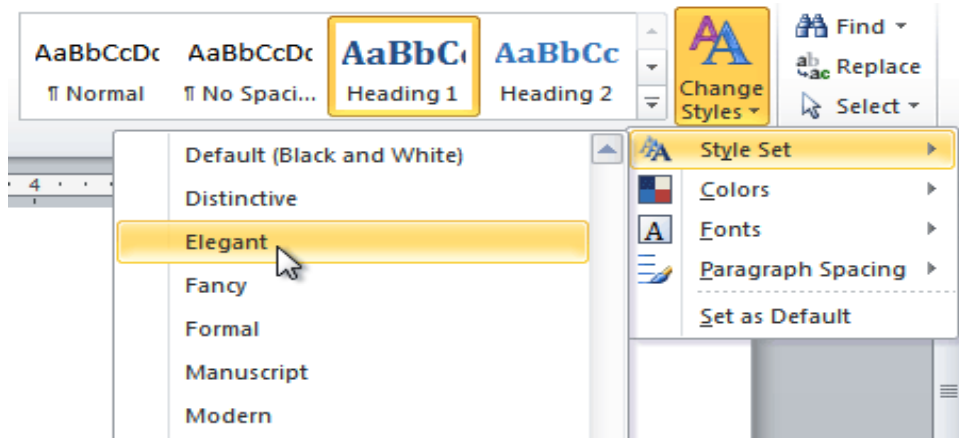


Figure 2. 1

3. Select the Style Set you want and the change will be reflected in the entire document.

### 3.1 OVERVIEW OF DATABASE SYSTEM

## 3.3.1 INTRODUCTION TO DATABASE:

#### What is Data?

Raw facts and figures that are collected from different sources for some specific purpose are called Data. Data is made up of text, numbers, images which can be processed or stored by a computer. In order to understand it, it needs to be processed to become Information.

#### Information:

- Knowledge of facts about something or someone is called information.
- Final product created from the raw data after processing is called Information.

Information is valuable because it can affect behavior, a decision or an outcome.

#### Database:

Often abbreviated DB, a database is basically a collection of information organized in such a way that a computer program can quickly select desired piece of data. You can think of a database as an electronic filing system.

The databases can be regarded as a kind of electronic filing cabinet; that is, it is a container for a collection of computerized data files. Telephone Directory, Bus, Train Time table, Personal address Book, legal records of insurance companies is examples of Database.

Databases are organized by

- Fields

## Learner's Activity

- Open an **existing Word document**. Write some text on the page
- Change the **font size** of text to “12”
- Change the **font style** of some text to “Arial”
- Change the **font color** of some text
- Make a heading of the paragraph and set its alignment to **Centre** and **underline** it
- Try various cases using the **Change Case** command
- Try the four **alignment** commands
- Set the line spacing to “1.15”
- Apply bulleted text

# Learning Unit 5: Save Word Document

## Overview

### Remember

Files with same names cannot be saved at a same location in the computer.


In this learning unit you will learn that how to save a file with different name and location. After completion of this learning, you will be able to save files with different methods on different storage locations.

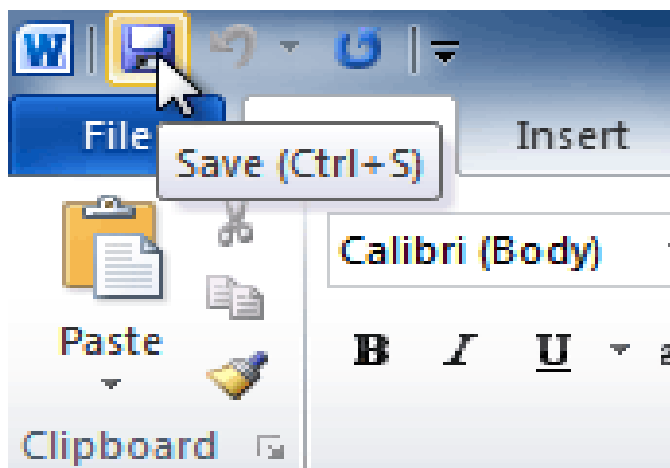
## 1. Method of Saving a File

When you make a new document you will need to save it so that in future you can open and edit it. Word offers many ways to save a document.

### Save a File through Short Key:

The procedure to save a document for the first time through CTRL+S has the following steps:

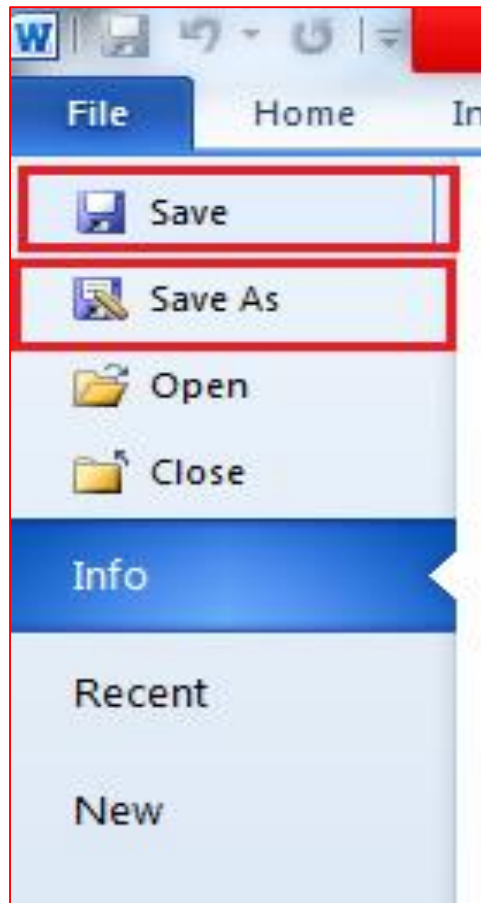
1. Click the **Save** command  on Quick access toolbar or press the **CTRL+S** from the keyboard.



2. The **“Save As”** dialogue box will be appears on the screen. Select the location where you want to Save the Document.
3. Enter the name and press **“Save”** button.
5. The file will be saved

### Save a file through File Tab:

A File can also Save by clicking on the File tab and selecting the option Save or Save as.



## 2. Storage Device

When data is entered and processed in a computer, it needs to be stored on any storage device in computer. You can store data permanently on the computer hard disk or any other storage device.

A storage device is any computing hardware that is used for storing, porting and extracting data files and objects. It can hold and store information both temporarily and permanently.

## 3. Memory and Its Capacity Unit

Memory unit is:

- The amount of data that can be stored in the storage unit.
- That in which storage capacity is expressed in terms of Bytes.

Following are the storage units:

Reno.	Unit	Description
1	Bit (Binary Digit)	Bit is the smallest memory unit in computer. 1 character takes space of 1 bit.

2	Nibble	A group of 4 bits is called nibble.
3	Byte	A group of 8 bits is called byte. A byte is the smallest unit which can represent a data item or a character.
4	Word	A computer word, like a byte, is a group of fixed number of bits processed as a unit which varies from computer to computer but is fixed for each computer. The length of a computer word is called word-size or word length and it may be as small as 8 bits or may be as long as 96 bits. A computer stores the information in the form of computer words.

Some higher storage units are as follows:

Sr.No.	Unit	Description
1	Kilobyte (KB)	1 KB = 1024 Bytes
2	Megabyte (MB)	1 MB = 1024 KB
3	Gigabyte (GB)	1 GB = 1024 MB
4	Terabyte (TB)	1 TB = 1024 GB

#### 4. Difference between Save and Save as Option

**Save** and **Save As** option works same when you are saving a file for the first time. Both save the file with a name and a selected location. When you have to save the changes in existing document “**Save**” button is used.

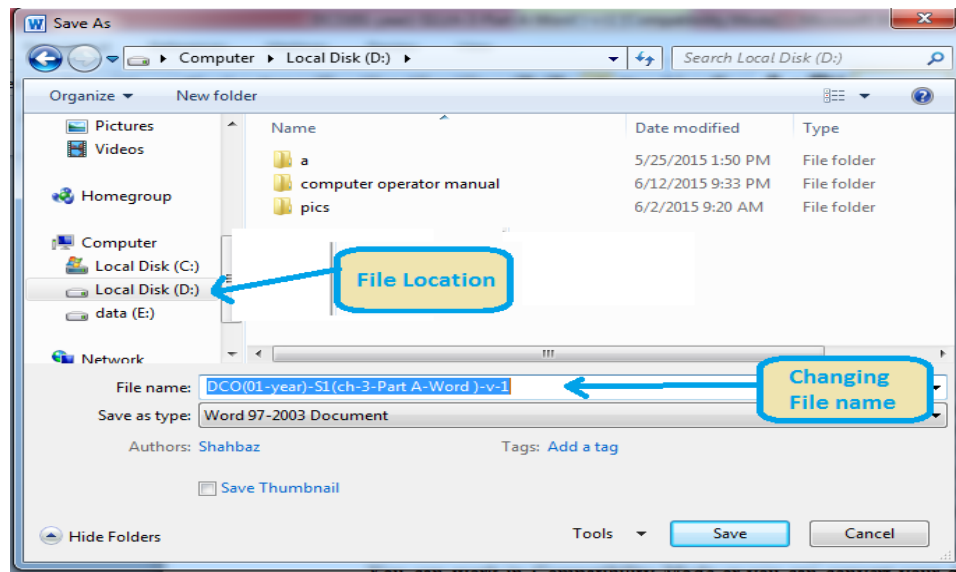
While “**Save As**” option is used to save the file with different name and a location.

##### Save a File with “Save As” Option:

“**Save As**” command used to save a revised document to a new name or location, keeping the original file as it was before revisions. For example you want to save an existing file with new name “**MS Word**” and in “**Local Disk (D :)**”.

The procedure to save a file has the following steps:

1. Left click on the **File** Tab.
2. Click the option “**Save As**”.
3. A small window will appear. Change the location and name of the file and press **save** button.

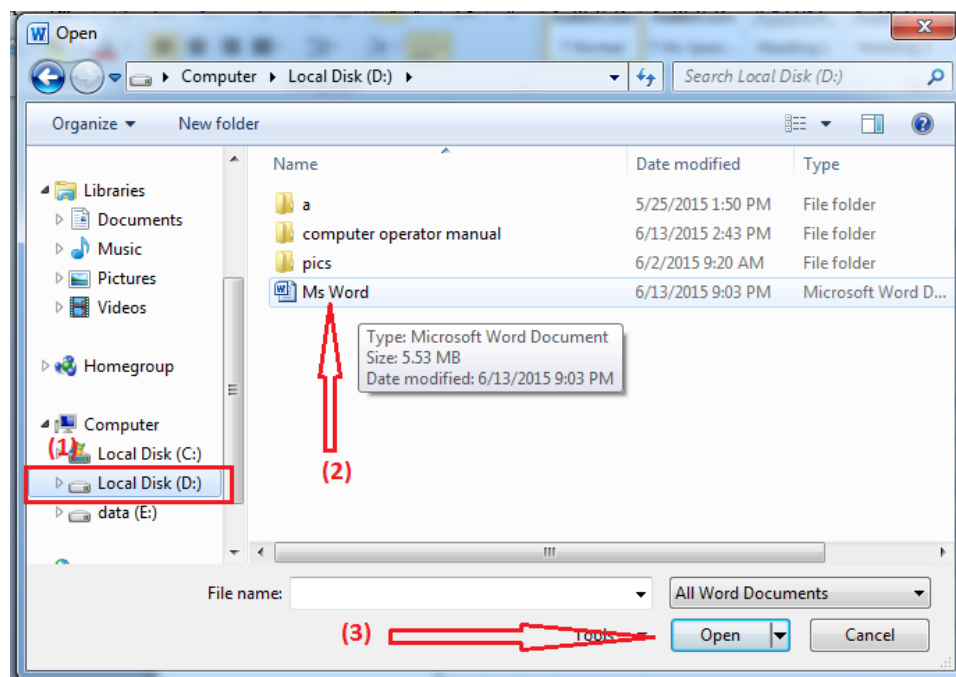


4. File will be saved in the **Local Disk (D :)** with the name **“MS Word”**.
5. Close the file.

Saved file can be open by clicking on the file menu and selection close option.

To open the saved file from the storage device has the following steps:

1. Open the Microsoft Word.
2. Click on the **File** tab and then click the **Open** option.
3. Small window will appear on the screen, select the location from the left side pane, where file has been saved.





4. The file will be open.

**Save a file with Save Option:**

When you open an existing document and make any changes in it. The changes made in the document can be save by clicking on the **Save** option from the **File** tab. Save option just save the changes in the document.

## Learner's Activity

- Open a New Document, save it with the name **Computer Operator** and locate the File on the **Desktop**
- Open this document again. Write a paragraph in it and save changes in it

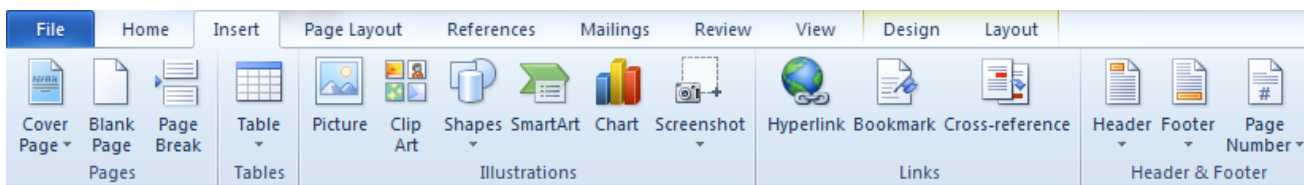
# Learning Unit 6: Insert in a Word Document

## Overview

In this learning unit you will learn to insert different types of objects in the document. After completion of this learning unit you will be able to insert pictures, clipart, charts, header footer and tables in your document.

## 1. Objects in the Word File

Different objects are available that you can insert in the MS Word Document. These options can be opened from the Insert tab.



## 2. Inserting Objects

Adding clip art, shape and pictures to your document can be a great way to illustrate important information or add decorative accents to existing text.

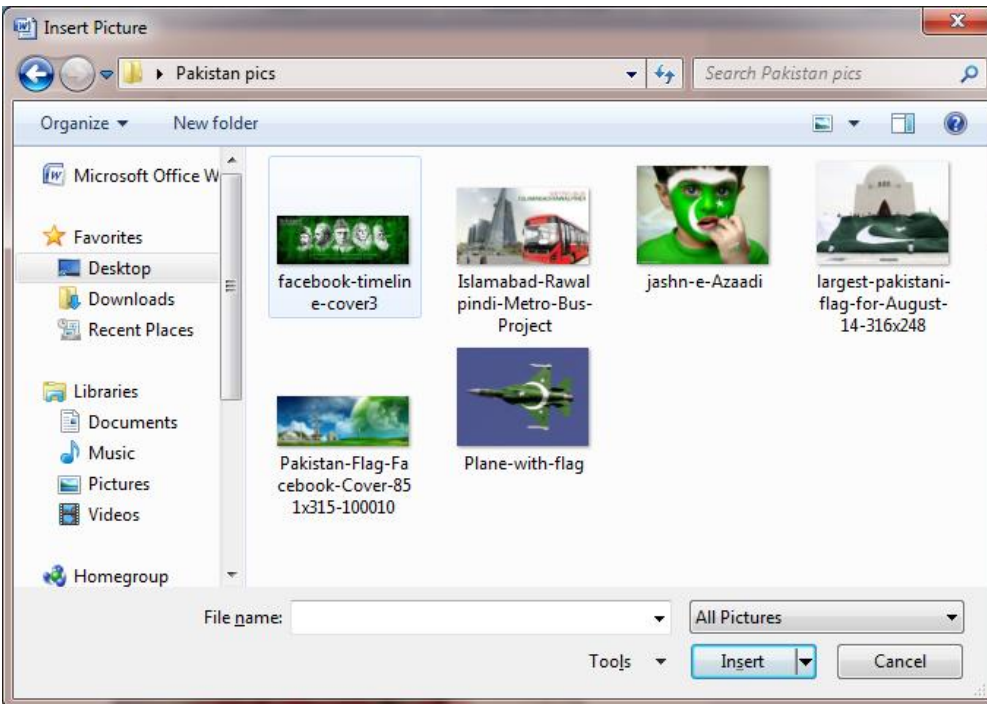
### Inserting Pictures:

The procedure to insert a picture has the following steps:

1. Place the cursor where you want to insert the picture.
2. Select the Insert tab.
3. Click the Picture command in the Illustrations group. The Insert Picture dialog box appears.



4. Select the desired image file, and then click Insert to add it to your document.

**TIP**

By dragging the middle size handlers on all the sides, image can be re-size vertically or horizontally.

- To resize an image, click and drag one of the corner sizing's handles. The image will change size while keeping the same proportions.

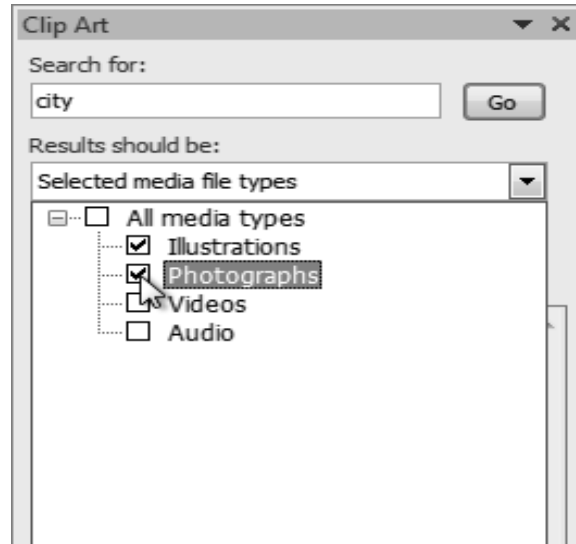
**Inserting Clip Art:**

There are built-in clip art images for just about every topic.

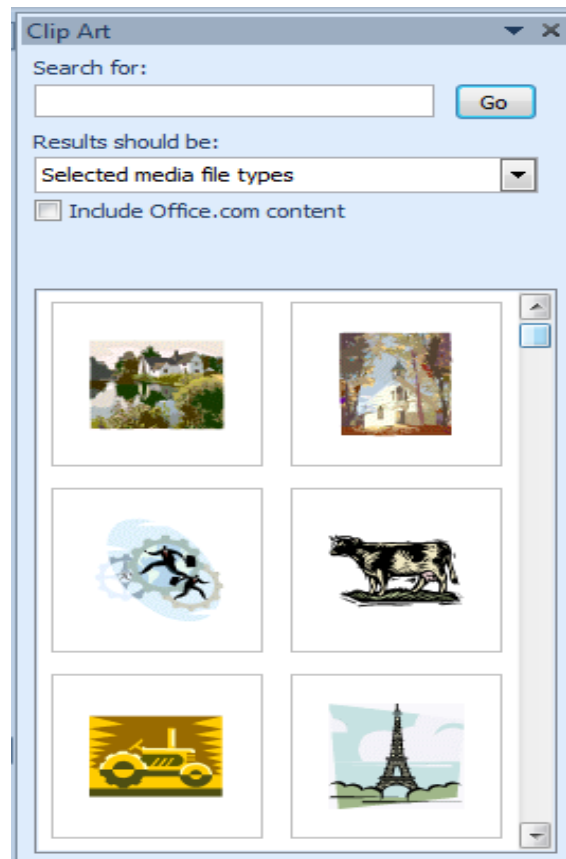
The procedure of inserting Clip Art in the document has following steps:

1. Select the Insert tab.
2. Click the Clip Art command in the Illustrations group of Insert tab.

- The clip art options appear in the task pane to the right of the document.



- Enter keywords in the Search for: fields that are related to the image you want to insert.
- Deselect any types of media you do not want to see and click button Go.
  - The Clip Art menu will be displayed.

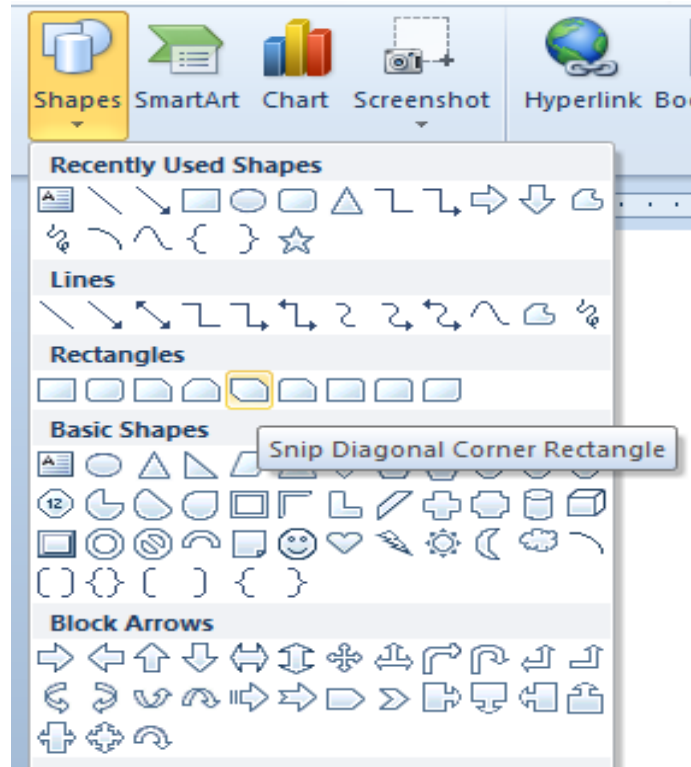


- Left Click on the Clip art that you want to insert. The image will be displayed on the page.

### Inserting Shape:

Word's large shape collection allows you to organize and design the image you want. The procedure to insert the shapes in the document has the following steps:

1. Select the Insert tab.
2. Click the Shapes command.



#### Remember

You can add text to any shape by right clicking in the shape and selecting the option "Add Text".

3. Select a shape from the drop-down menu.
4. Click and drag the mouse until the shape is drawn.

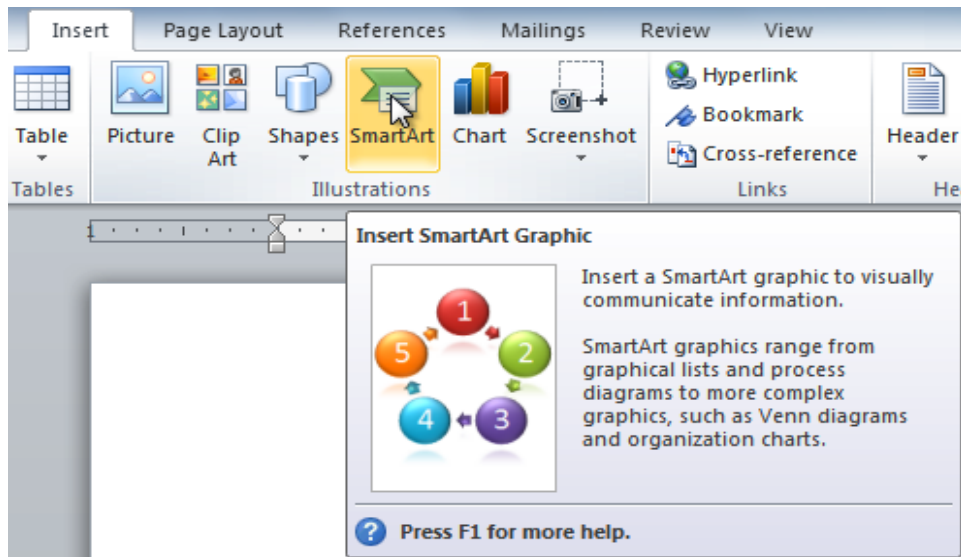


5. Release the mouse button.

### Inserting Smart Art:

Smart Art allows you to visually communicate information rather than simply using text.

1. Place the insertion point in the document where you want the graphic to appear.
2. Select the Insert tab.
3. Select the Smart Art command in the Illustrations group. A dialog box appears.



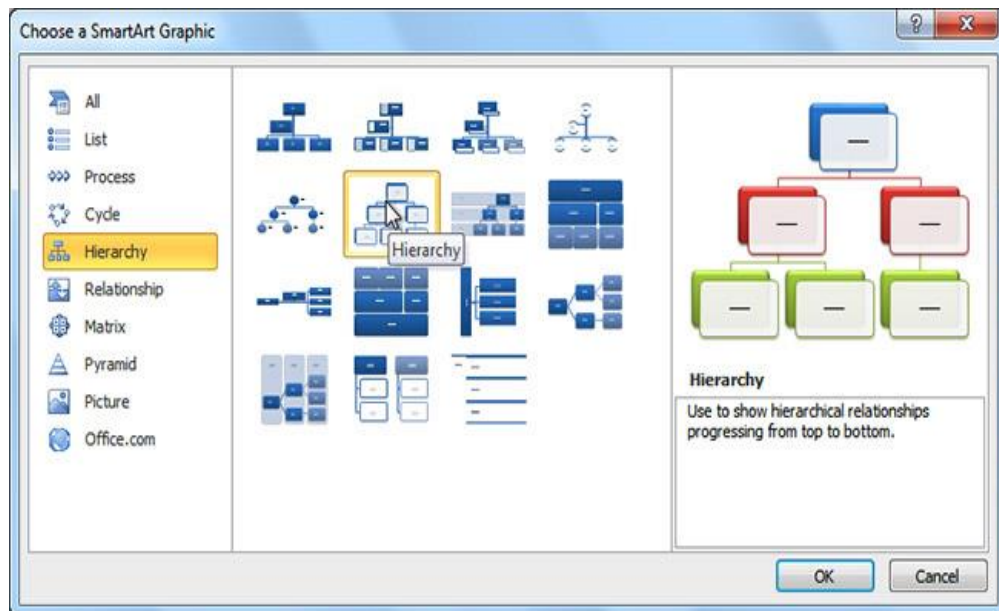
4. Select a category to the left of the dialog box, and review the Smart Art graphics that appear in the center.
5. Select the desired Smart Art graphic, and then click **OK**.

**Do you know!**

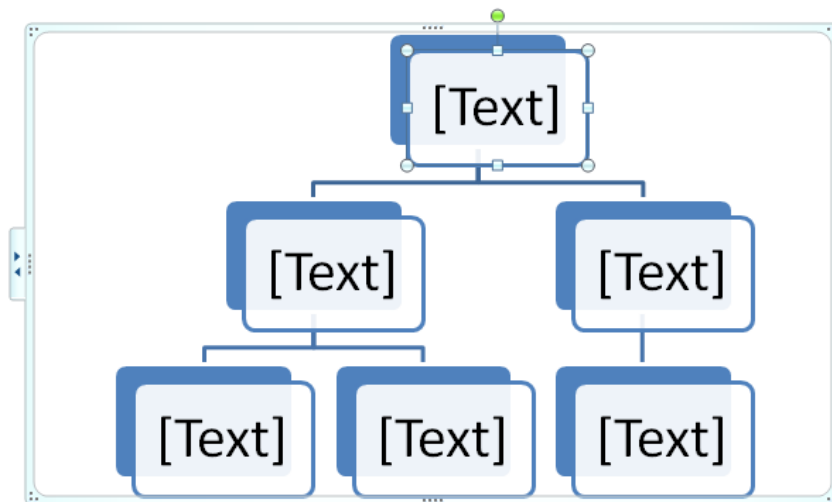
You can add shape (*Before, after, above below*) by right clicking the shape and selecting the Add Shape option.

**Remember**

Any shape can be deleted by selecting the shape and pressing the **Delete** key from the keyboard.



6. The selected smart Art graphic will be displayed on the page.



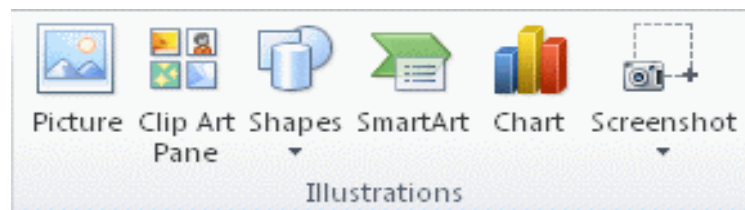
7. Click in the shapes and type the text.

### Inserting Chart:

In Microsoft Word, you can insert many types of data charts and graphs, such as column charts, line graphs, pie charts, bar charts, area graphs, scatter graphs etc.

The procedure of inserting a graph in the document has the following steps:

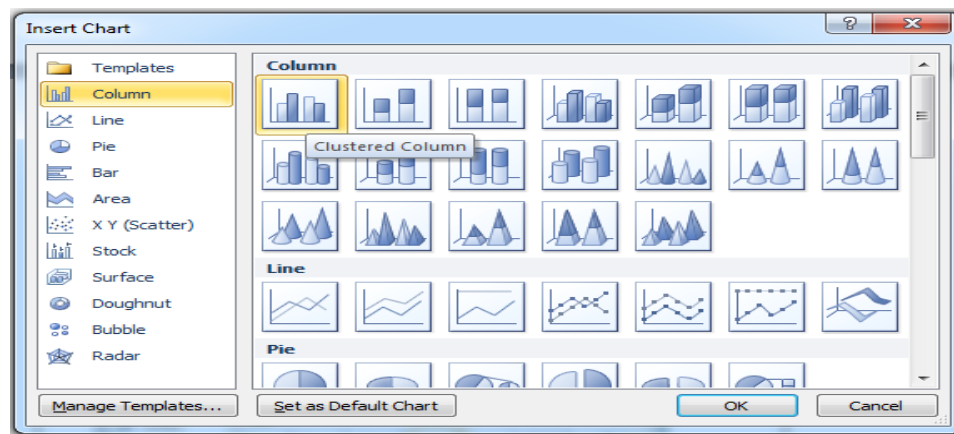
1. On the Insert tab, in the Illustrations group, click Chart.



### Important

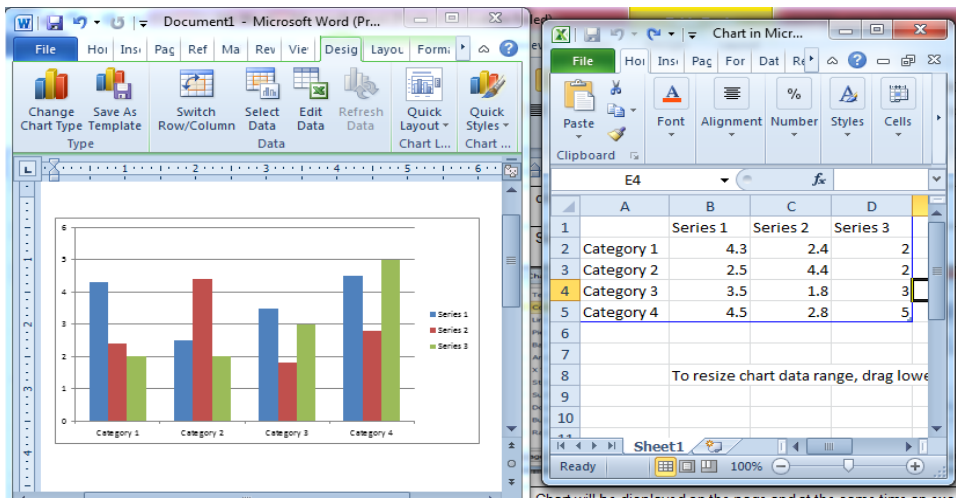
Once Chart is created you can edit the values by selecting the chart and clicking the chart Tool tab>Design>Edit Data.

2. In the Insert Chart dialog box, click the arrows to scroll through the chart types.
3. Select the type of chart that you want and then click OK.



4. Chart will be displayed on the page and at the same time an excel sheet will be open with dummy values.



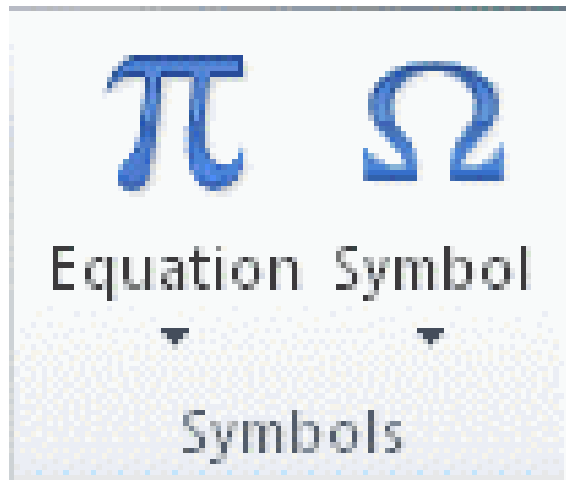


5. Enter the values in the excel sheet, the chart will automatically adjust according to the values.
6. When data is entered in excel sheet close it.

### Adding Symbols and Equations:

You can type mathematical equations in MS word Document. These can include fractions, integrals, matrices, mathematical symbols, etc.

1. On the **Insert tab**, in the **Symbols** group, click the arrow next **Equation**.



2. Click the equation that you want, or click **Insert New Equation** to type an equation.

### Symbols:

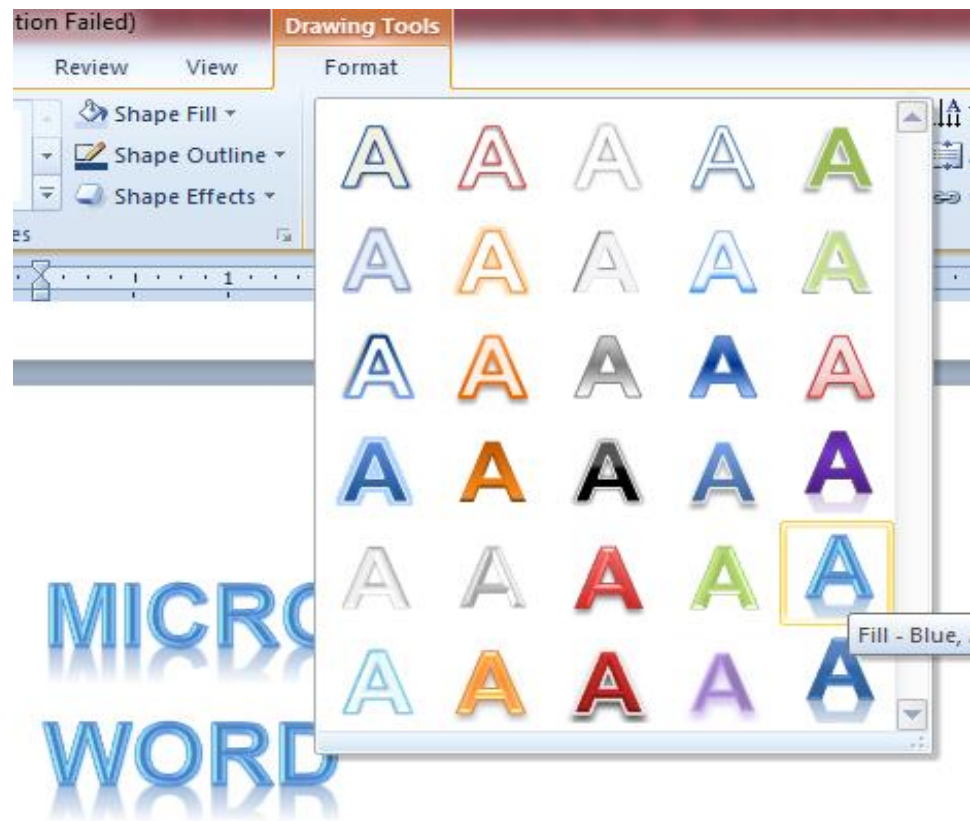
You can use the Symbol dialog box to insert symbols that are not on your keyboard, as well as Unicode characters.

### Word Art:

You can add effects to the text inside the text box, which is known as WordArt.

A **quick style** will automatically apply several effects to your text at once. You can then refine the look of your text by adding or modifying text effects.

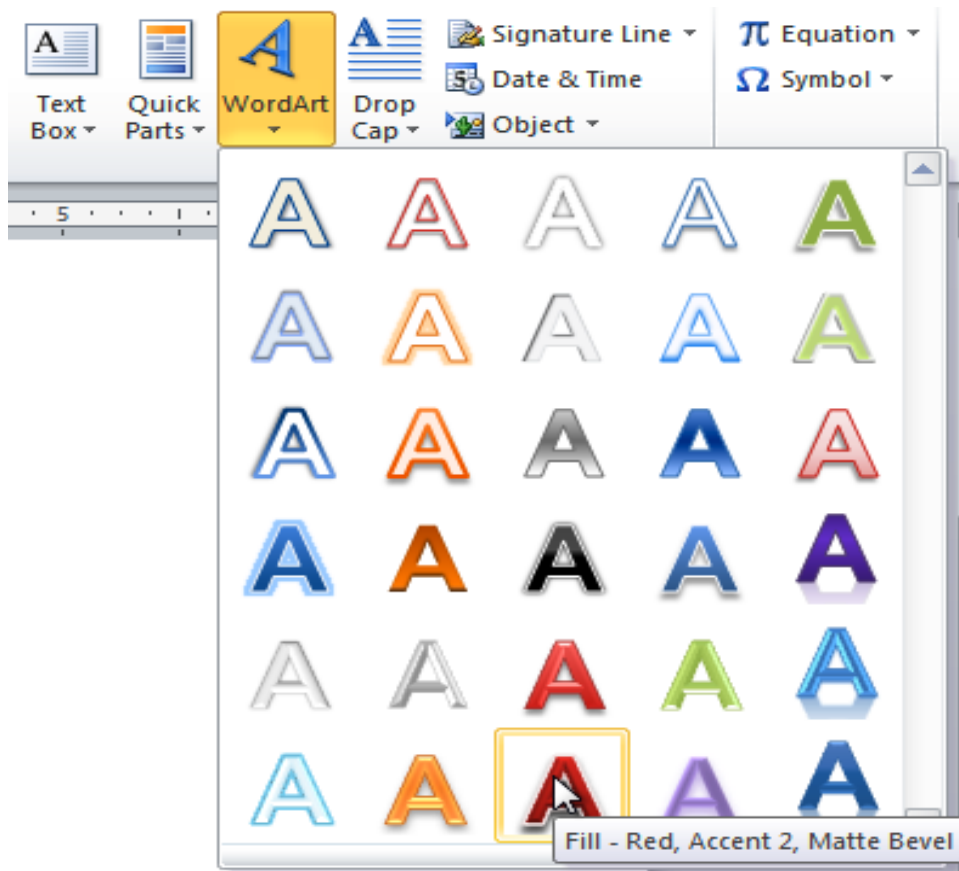
1. Select the text box, or select some text inside of the text box. The Format tab will appear.
2. Click the Format tab.
3. Click the Quick Styles command in the WordArt Styles group. A drop-down menu will appear.



### Converting Simple Text to Word Art:

Text that is formatted as WordArt, it needs to be inside of a **text box**. However, there's a shortcut that allows you to convert text into WordArt even if it's not in a text box.

1. Select the text you want to convert.
2. Click the **Insert** tab.
3. Click the WordArt command. The Quick Styles drop-down menu will appear.



**More Insert Option:**

More Insert options are available in MS Word as Insert Table, Cover page, Blank Page, Header, Footer, Hyperlink, Bookmark etc.



## Learner's Activity

1. Create a **new** Word document
2. Insert a **shape**
3. Change the shape to a **different shape**
4. Change the **fill color**
5. Change the **outline color**
6. Try various **shadow effects**

# Learning Unit 7: Import Document

## Overview

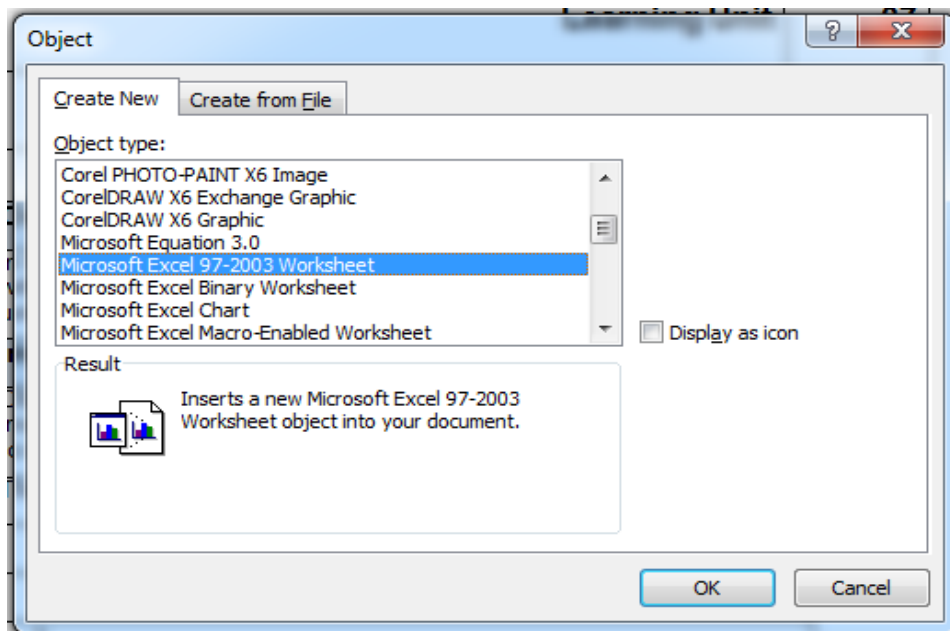
In this learning unit you will learn how to import data of different formats within the document from computer or online. After completion of this learning unit you will be able to import different types of data with different resources.

## 1. Importing in Word File

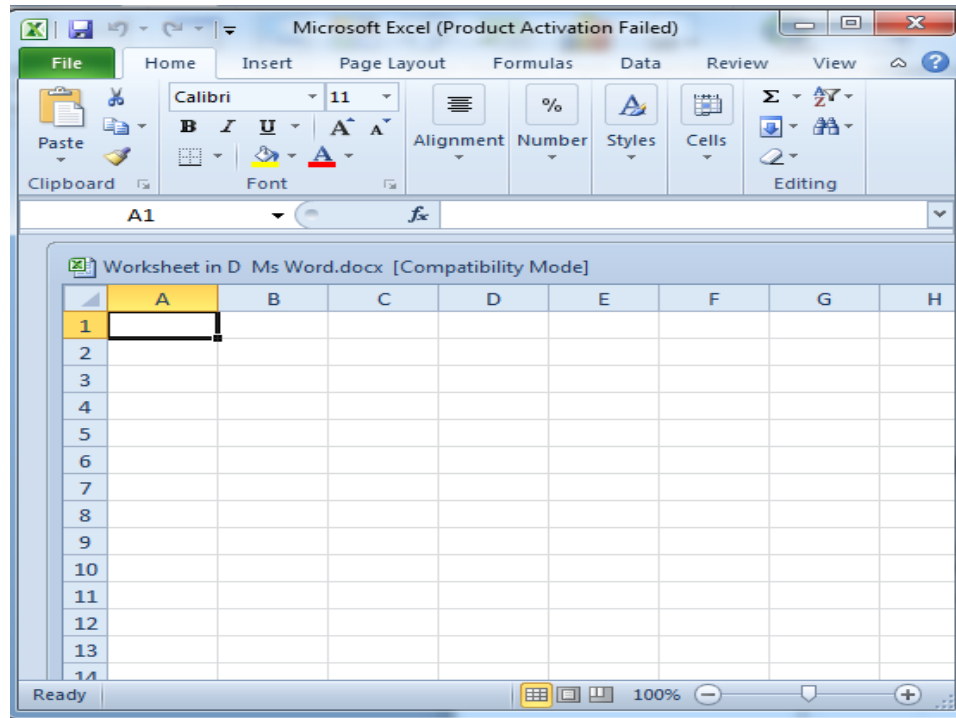
Object Linking and Embedding (or OLE for short) is a technique used to insert data from one program into another. You'll create a simple spreadsheet to illustrate the process, and place it in to Word document.

The process to embed an object in MS Word has the following steps:

1. Open MS Word file.
2. Select the **Insert** ribbon, choose **Object**.



3. A dialogue box will be open, select the format in which you want to embed the file.
4. For example choose the **MS Excel worksheet** and click **Ok**.
5. An blank Excel Sheet will be open,



6. Enter the data in the Excel sheet and close it. Data will be automatically added in the MS Word sheet.

Sr.#	Name	FatherName	Class	Section	Marks Obtained
1	sadia	Hamid	7th	B	78
2	hamna	Ali	7th	C	89
3	rida	Iqbal	8th	B	87
4	abida	Ameen	7th	C	87
5	hiba	Shahid	8th	A	90
6	haram	Javed	9th	B	67
7	abiha	Sajid	9th	A	70

7. Similarly you can add different format objects in the MS Word Sheet.

## 2. Using References for Imported Material

A bibliography is a list of all of the sources you have used (whether referenced or not) in the process of researching your work. In general, a bibliography should include:

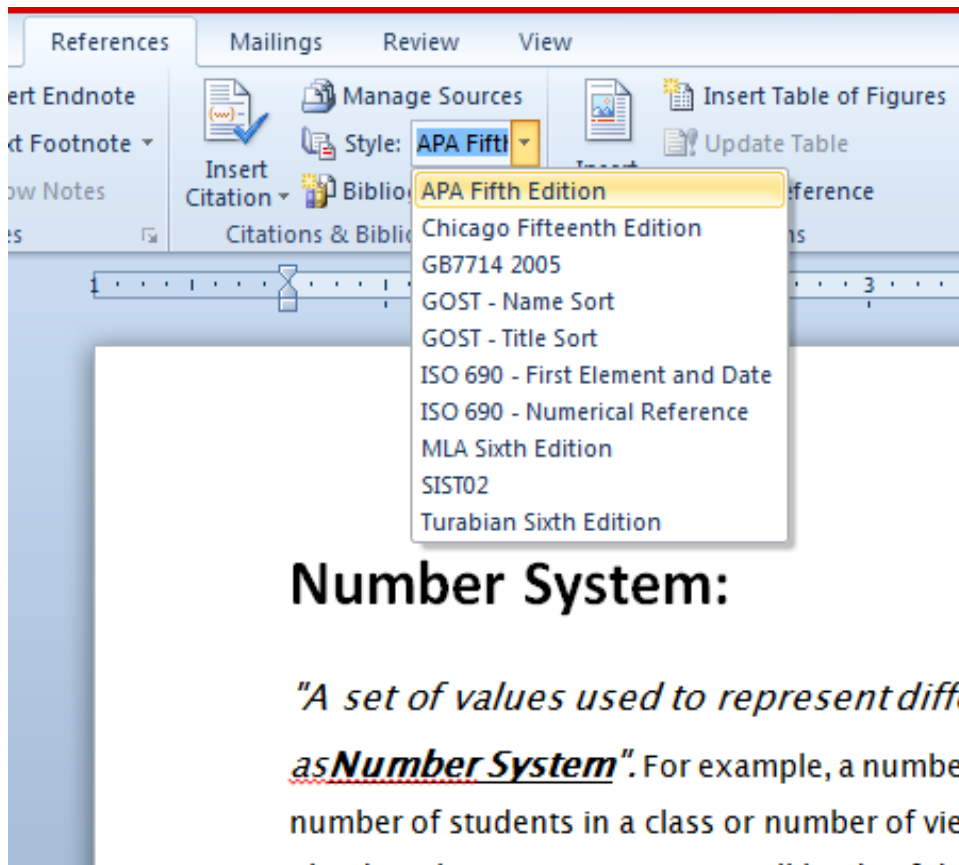
- the authors' names
- the titles of the works
- the names and locations of the companies that published your copies of the sources

- the dates your copies were published
- the page numbers of your sources (if they are part of multi-source volumes)

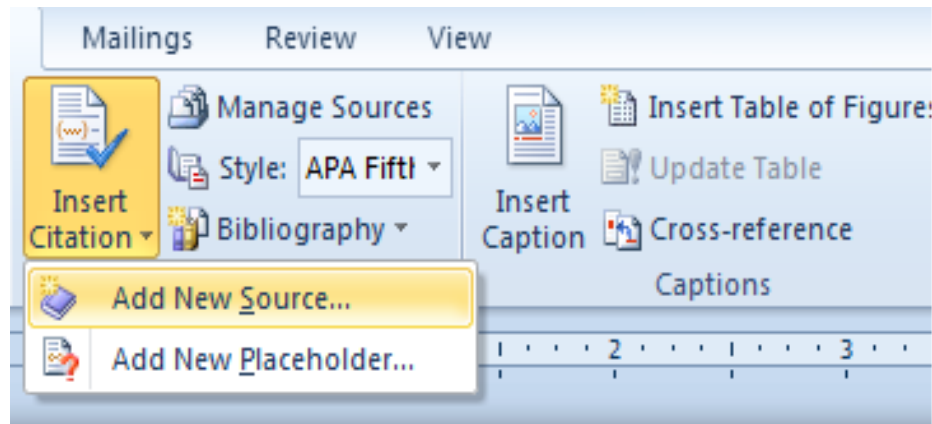
To insert a bibliography using the Bibliography tool, you must first enter references and sources.

The procedure to insert Bibliography has the following steps:

1. Open your document in Microsoft Word 2010 and click on the References tab.
2. Place your cursor where you want the citation inserted. Select your style of references in the **Style** menu,



3. Click on the **Insert Citation** button to produce the drop-down menu shown below, and select **Add New Source**



## Number System:

*"A set of values used to represent different numbers in a particular system"*

4. A **Create Source** window will appear. Choose the source type from the drop-down menu. Enter the source information in the fields provided and click **OK**.

5. Note that a reference has been entered. Follow Steps again to insert your remaining references.



## Number System:

*"A set of values used to represent different quantities is known as **Number System**".* For example, a number system can be used to represent the number of students in a class or number of viewers watching a certain TV program etc. The digital computer represents all kinds of data and information in binary numbers. It includes audio, graphics, video, text and numbers. The total number of digits used in a number system is called its base or radix. The base is written after the number as subscript such as  $51210_{10}$ . (Sinha, 2004)

# Learning Unit 8: Protect the Word Document

## Overview

In this learning unit you will learn how to protect the document by restricting its formatting and its editing. After completion of this learning unit you will be able to protect your document through password and applying restrictions.

## 1. Limiting Formatting of Word Document

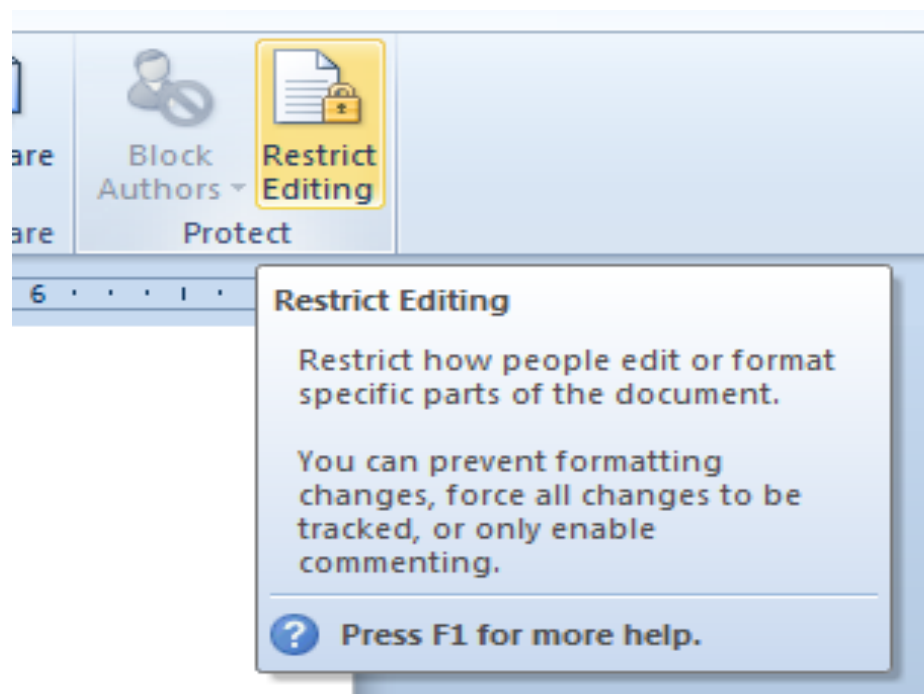
Restricting and protecting a document ensures that you have the complete authority over its progress.

If you want that other reviewers suggest changes and make comments to a document, at that time it may possible that you want to restrict them from making editing and changing the formatting.

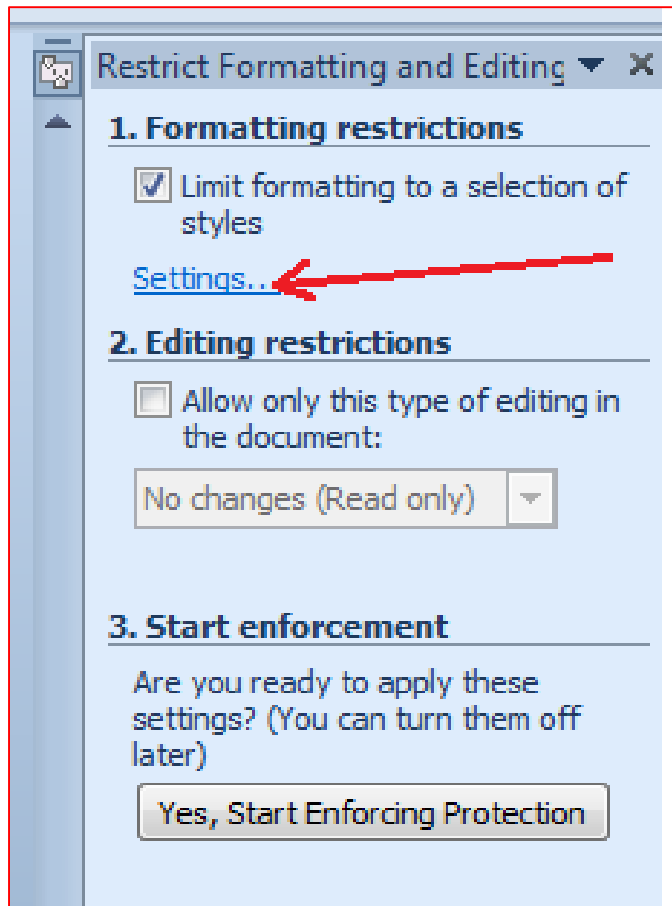
Word allows you to restrict all or some of the themes and styles, as well as permitting reviewers to change some of the themes and styles.

The procedure of applying restrictions on the document has the following steps:

1. Click “**Restrict Editing**” in the “**Protect**” group of the “**Review**” tab.



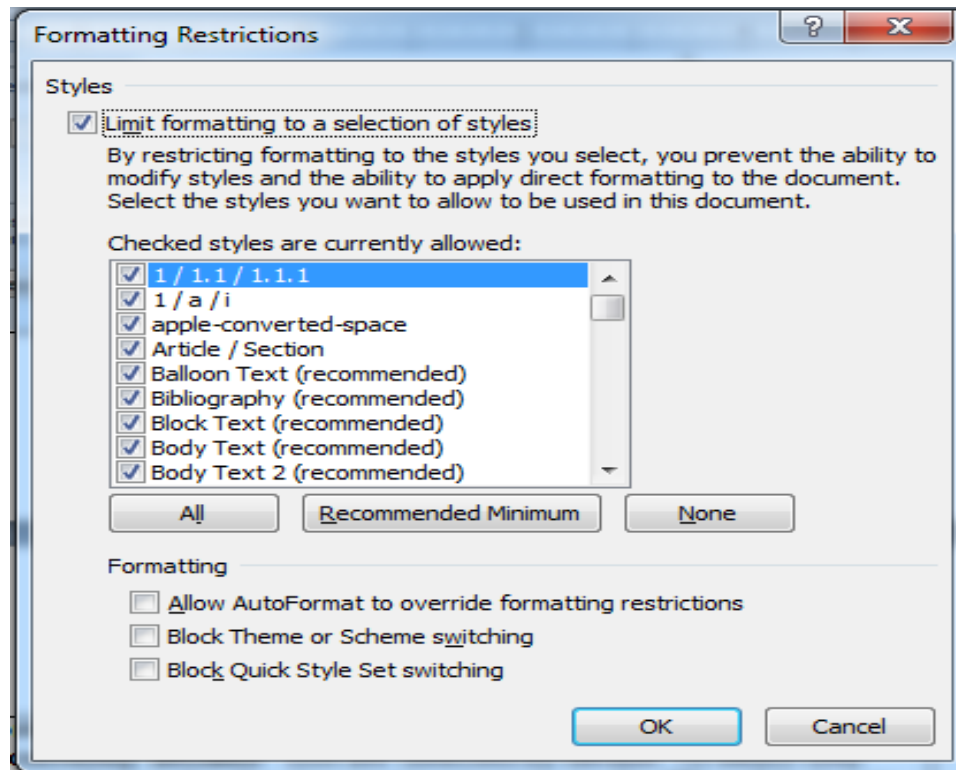
2. The “**Restrict Editing**” pane displays to the right of the main text.
3. In the “**Formatting restrictions**” section, select “Limit formatting to a selection of styles,” and click the “Settings...” link.



### Remember

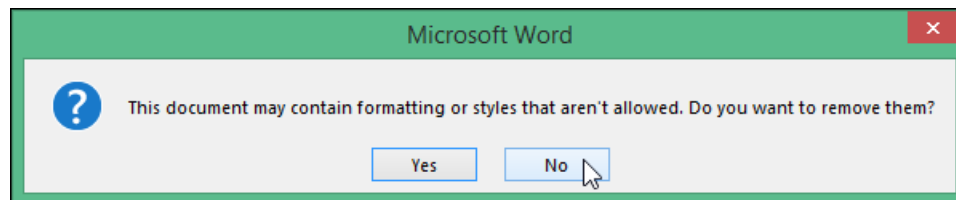
Before these restrictions can be applied, you must start enforcing protection

On the “**Formatting Restrictions**” dialog box, all styles in the “**Checked styles are currently allowed**” box are selected by default. To select only certain styles to be used in the document, you can use the “**None**” button to de-select all the styles and then select the ones you want to allow. You can also use Word’s recommended minimum styles to allow by clicking “**Recommended Minimum.**” Choose additional restrictions in the “**Formatting**” section at the bottom of the dialog box, if desired, and click “**OK**” when done.



The following dialog box displays asking if you want to remove styles that are not allowed. We recommend you do not. It may turn out that you want to use these styles in the document in the future. Other reviewers will not be able to change them or apply them.

Click “No” to keep the styles that are not allowed in your document.



## 2. Restrict Editing in a Document

You can restrict the type of editing reviewers can perform on a document.

1. On the “**Restrict Editing**” pane, select the “**Allow only this type of editing in the document**” check box.
2. Select an option from the drop-down list to indicate the type of editing that you want to allow in your document. You can allow other reviewers to only **track changes**, **enter comments**, or **fill in forms**. You can even restrict the document such that other people can only read it and make no changes.
3. If you want users to edit portion of the document content then select the content and under **Exceptions (options)**, select the users you want to give permission of editing. If you want to add users for this, click **more users**.

### Do you know!

When someone will try to edit the document, Restrict Formatting *and Editing* bar will appear, but they can find the regions which they can edit.

**Note**

A password is not necessary and does not fully protect the document (the document is not encrypted). It simply helps to prevent people from turning off the formatting and editing restrictions.

A quick style will automatically apply several effects to your text at once. You can then refine the look of your text by adding or modifying text effects.

1. Select the text box, or select some text inside of the text box. The Format tab will appear.
2. Click the Format tab.
3. Click the Quick Styles command in the WordArt Styles group. A drop-down menu will

**Exceptions (optional)**

Select parts of the document and choose users who are allowed to freely edit them.

Groups:

Everyone

More users...

Once you've restricted formatting and editing for the document as desired, you must tell Word to start enforcing the protection for it to take effect. In the **"Start enforcement"** section of the **"Restrict Editing"** pane, click **"Yes, Start Enforcing Protection"**.

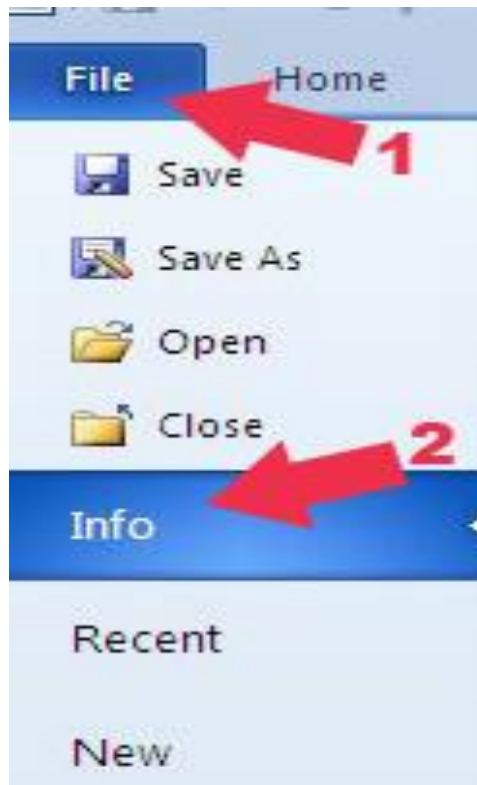
Passphrase can be entered to make your document password protected. If you want to encrypt document and allow authorized users to remove protection when they want, then **enable User authentication**. Click **OK** and save the document.



### 3. Saving a Document with a Password

The procedure to save a word document by assigning a password has following steps:

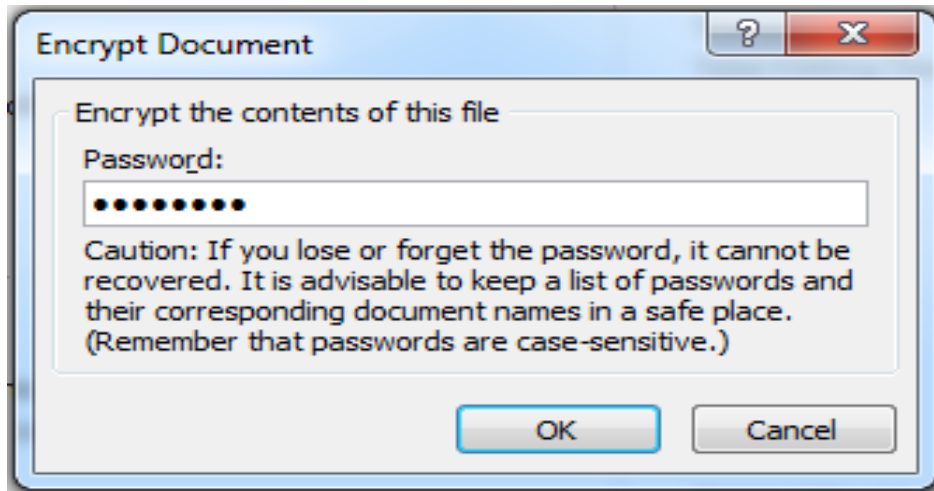
1. **Open Microsoft Word 2010** document. Click on **File Tab**.
2. Click on **Info** option.



3. Click on the **Protect Document** button under **Permissions** tab.
4. Select the Encrypt with Password option.



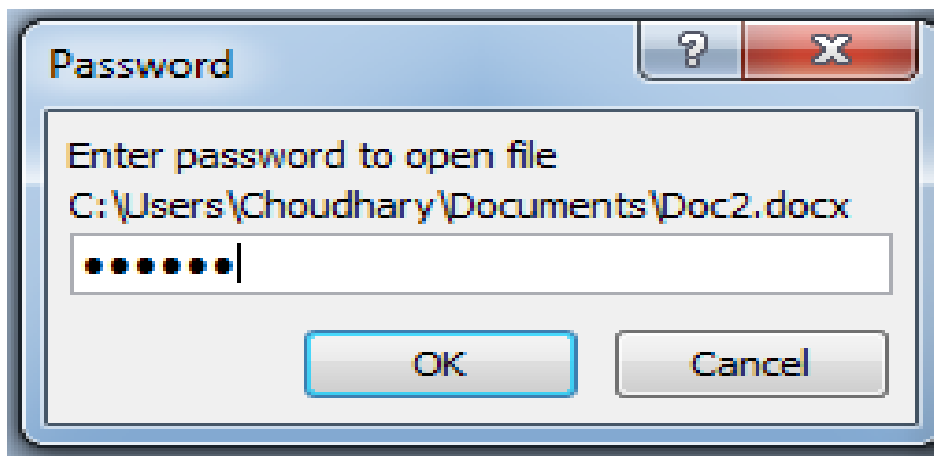
5. A window will pop up asking you to put in the desired password. **Set a Password** for Word document and click "OK" button.



6. It'll again ask to "Re-enter password", so type it again and click "OK" button.
7. After password protecting your document, save the changes by **pressing CTRL+S** Buttons from your keyboard or go to File Tab of your document and click Save option.

#### 4. Opening a Password Protected Document

To open your password protected document, simply double click the document and a pop up box will appear and prompt you to enter the password. Simply enter the password that you have set-up for this file and click "OK".



# Learning Unit 9: Insert Table in a Word Document

## Overview

In this learning unit you will learn how to insert tables from different methods in your document and its formatting. After completion of this learning unit you will be able to make tables and format tables.

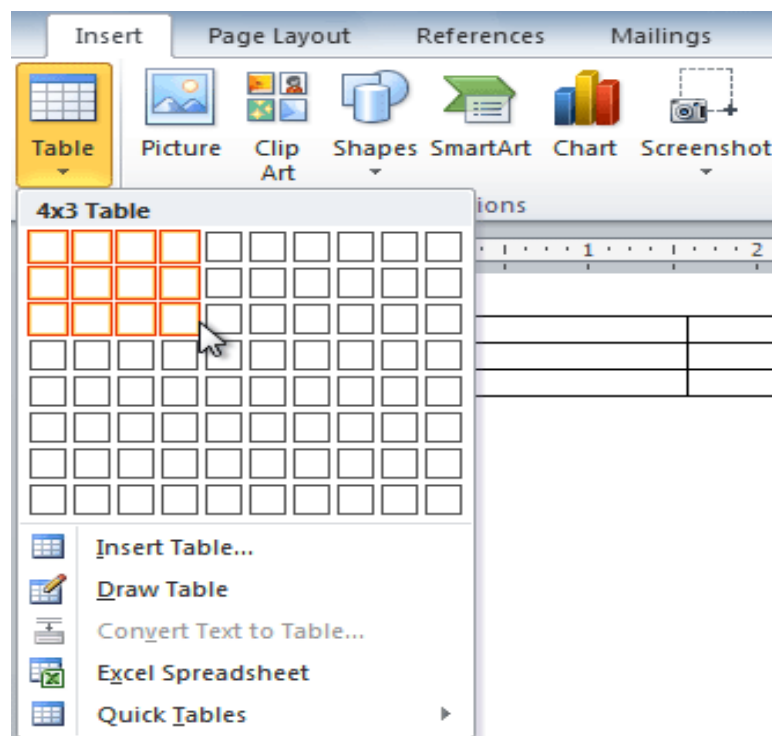
## 1. Inserting Table

A **table** is a grid of cells arranged in **rows** and **columns**. Tables can be customized and are useful for various tasks such as presenting text information and numerical data.

### Inserting a Blank Table:

The procedure to insert a blank table in MS Word has following steps:

1. Place your insertion point in the document where you want the table to appear.
2. Select the **Insert** tab.
3. Click the **Table** command.
4. Hover your mouse over the diagram squares to select the number of **columns** and **rows** in the table.



5. Click your mouse, and the table appears on the page.



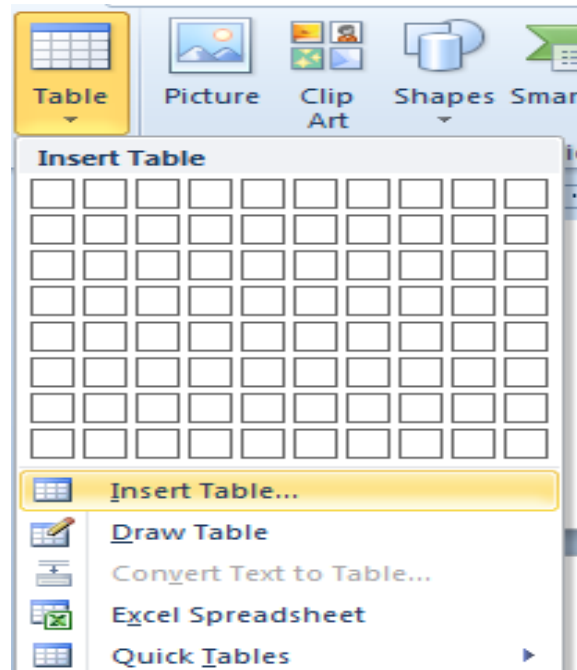
## 2. Inserting Table through Different Options

Table can be inserted from the Insert Table option located in the table tool and from draw table option.

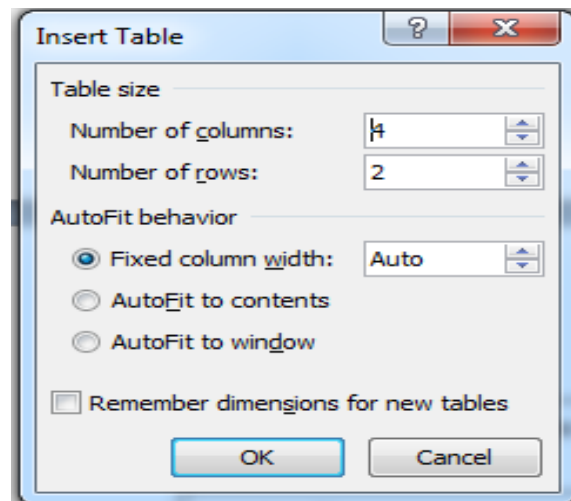
### Inserting Table through Dialogue Box:

The procedure to insert the table through **Insert Table** tool has the following steps:

1. Place the cursor where you want to add table.
2. Click on the **Insert** tab and then click on the arrow of **Table**.



3. Select the option **Insert Table....** A dialogue box will appear.

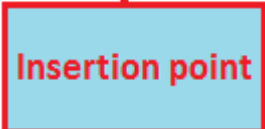


4. Set the number of **Rows** and **Columns** and click **OK**.
5. Table will be inserted on the page.

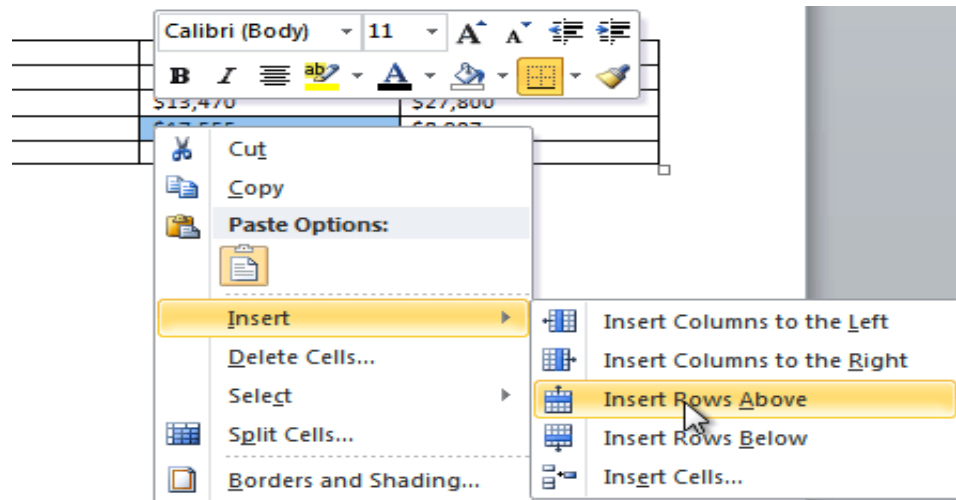
**Inserting a Row OR Column:**

1. Place the insertion point in a row **below** the location where you want to add a row.

<u>Sr.No</u>	<u>Name of Student</u>	<u>Class</u>	<u>Section</u>
1	Saba	8 <sup>th</sup>	B
2	<u>Rida</u>	8 <sup>th</sup>	C



2. Right-click the mouse. A menu appears.
3. Select **Insert** → **Insert Rows Above**.



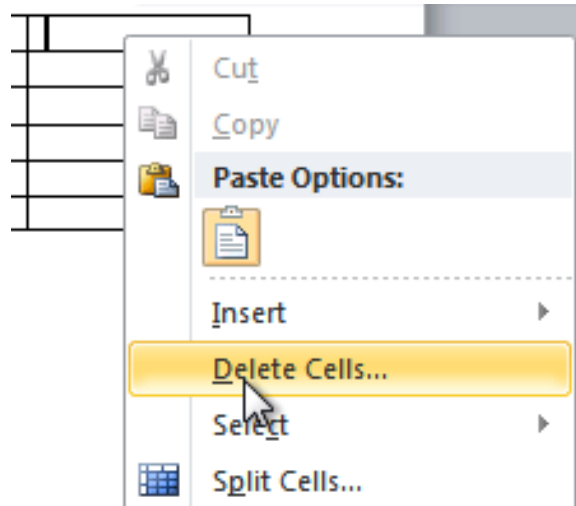
4. A new row appears **above** the insertion point.

<u>Sr.No</u>	<u>Name of Student</u>	<u>Class</u>	<u>Section</u>
1	Saba	8 <sup>th</sup>	B
2	<u>Rida</u>	8 <sup>th</sup>	C

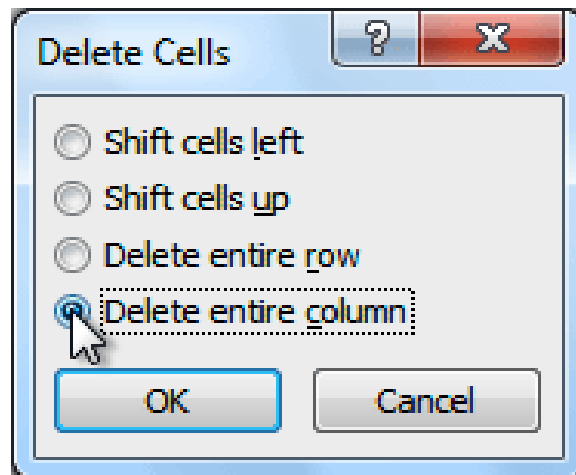
### Deleting Row or Column:

The procedure to delete a row/column has the following steps:

1. Select the row or column.
2. Right-click your mouse. A menu will appear.
3. Select **Delete Cells**.



4. Select **Delete entire row** or **Delete entire column**, then click **OK**.

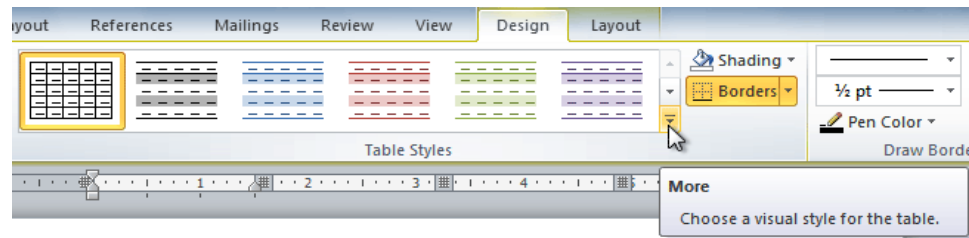


### Formatting of A Table:

Once you have make the table different formatting can be applies on the table.

#### Setting Table Style:

1. Click on the table. The **Design** tab will appear on the Ribbon.
2. Select the **Design** tab and locate the **Table Styles**.
3. Click the **More** drop-down arrow to see all of the table styles.



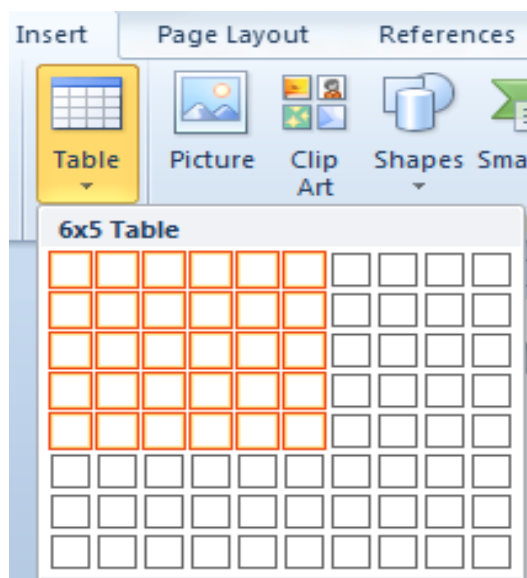
4. Hover the mouse over the various styles to see a live preview.
5. Select the desired style. The table style will appear in the document.

Sr.#	Name of Student	Class	Section
1	Saba	8 <sup>th</sup>	B
2	Fatima	7 <sup>th</sup>	B
3	Rida	8 <sup>th</sup>	C

### 3. Inserting Table with Five Rows and Six Columns

To insert the table in the document follow these steps:

1. Open word file and click on the point where you want to insert the table.
2. Click on the **Insert** tab and click on the down arrow of **Table** Option.
3. Hover the mouse to the Six boxes vertically and 5 boxes horizontal and click.



#### Important

Tab button can be used to jump from one cell to other for entering text.

4. Table will be inserted on the page.
5. Click in the each cell and write some text.

Sr.#	Name of Student	Class	Section	Group	Teacher Name
1	Saba	8 <sup>th</sup>	B	Science	<u>Riffat</u>
2	Fatima	7 <sup>th</sup>	B	Science	<u>Sadia</u>
3	<u>Rida</u>	8 <sup>th</sup>	C	Science	<u>Rahila</u>
4	<u>Hamna</u>	6 <sup>th</sup>	B	Science	<u>Sumaira</u>

6. To apply the style on the table click anywhere in the table, the **Table Tools** ribbon will be displayed on the title bar.
7. Select any table style from the **Table Style** tab.

Sr.#	Name of Student	Class	Section	Group	Teacher Name
1	Saba	8 <sup>th</sup>	B	Science	<u>Riffat</u>
2	Fatima	7 <sup>th</sup>	B	Science	<u>Sadia</u>
3	<u>Rida</u>	8 <sup>th</sup>	C	Science	<u>Rahila</u>
4	<u>Hamna</u>	6 <sup>th</sup>	B	Science	<u>Sumaira</u>

## Learner's Activity

- Make a table with 6 Columns and 5 Rows
- Enter the values in it
- Apply a border of Green color on table with shaded Heading Row
- Practice to merge two Columns and again split it

# Learning Unit 10: Hyperlink Data in a Word Document

## Overview

### Important

Hyperlinks have two basic parts: the address of the webpage, email address, or other location they are linking to; and the display text (or image).

In this learning unit you will learn how to associate data as a hyperlink in the document. After completion of this learning unit you will be able to access data using hyperlink.

## 1. Hyperlink in the Word File

### Important

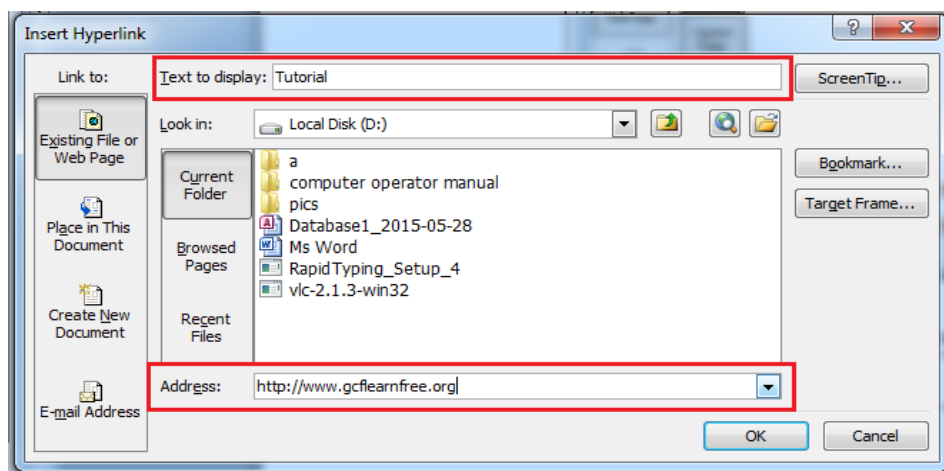
To follow a hyperlink in Word, hold down the **Control** key and click the hyperlink.

The procedure to insert a hyperlink has the following steps:

1. Select the text or image you want to make a hyperlink.
2. Right-click the selected text or image, then click **Hyperlink**. You can also right-click in a blank area of the document and click **Hyperlink**.
3. The **Insert Hyperlink** dialog box will open. You can also get to this dialog box from the **Insert tab** by clicking **Hyperlink**.
4. If you selected text, the words will appear in the **Text to display:** field at the top. You can change this text if you want.
5. Type the address you want to link to in the **Address:** field.

### TIP

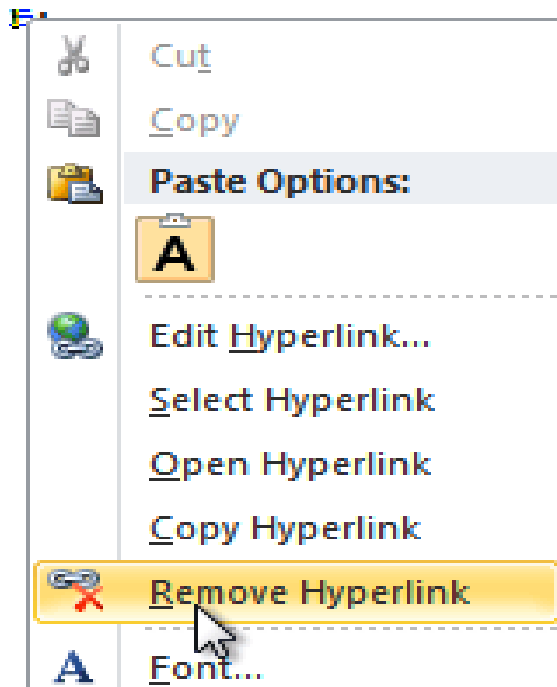
After you create a hyperlink, you should **test** it. If you have linked to a website, your web browser should automatically open and display the site.



6. Click OK. The text or image you selected will now be a hyperlink.

**Removing a Hyperlink:**

1. Right-click the hyperlink.
2. Click **Remove Hyperlink**.

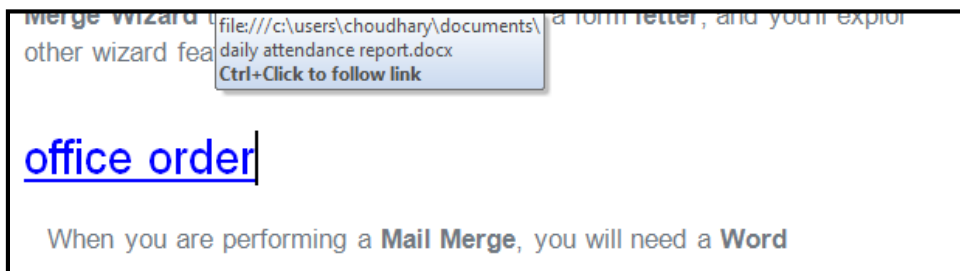


## 2. Opening and Closing of Hyperlinked Data

When a hyperlink is created in the document you can open it to see the attached document/website.

The procedure to open and close the hyperlink data has the following step:

1. Open the document in which hyperlink is created.
2. Press Ctrl+Click button to follow the link behind the hyperlink.



### Important

Bookmark names can contain letters, digits, and the underscore character ( \_ ), but they must begin with a letter and cannot contain a space.

3. The linked document/ Website will be open.
4. Close the opened window of the linked page, the page having the hyperlink will be displayed.



### 3. Bookmark, Cross Reference, Hyperlink

#### **Bookmark:**

Bookmark specifies the location of a point or of a block of text or other content within a document.

#### **Cross Reference:**

If you are writing a long document, you may want to include references from one part to another. To avoid having to update pagination, headings or figure numbers, you can use Word's cross-reference feature. Since Word inserts cross-references as hyperlinks, you can also use them to jump to the target. Cross-references are limited to a specific number of forms: the text, paragraph (or footnote/endnote) number, or page number of the cross-referenced location, while hyperlink can display any text you want. Cross-references are internal only and hyperlinks can refer to an external document

# Learning Unit 11: Perform Mail Merge in a Word Document

## Overview

In this learning unit you will learn how to use mail merge function. After completion of this learning unit you will be able to perform mail merge function according to available data.

## 1. Purpose of Mail Merge Function

Mail Merge is a powerful tool for writing and sending a personalized letter or e-mail to many different people at the same time. You can also use it to create envelopes or labels with each recipient's information. Mail Merge imports data from another source such as Excel and then uses that data to replace placeholders throughout your message with the relevant information for each individual you are messaging. You can use it to quickly create personalized messages for hundreds of people at once.

## 2. Mail Merge Function Using given Data

Mail merge mainly consists of two files, the **Main Document** and the **Data Source**. The Main Document contains the information that will remain the same in each record, and the Data Source contains all the variable information, in the form of *fields*. This is the information that will change in the Main Document when the merge is completed. Along with the information that remains the same, the Main Document also contains merge fields, which are references to the fields in the Data Source.

If you have an existing file and you want to use mail merge, then follow these steps:

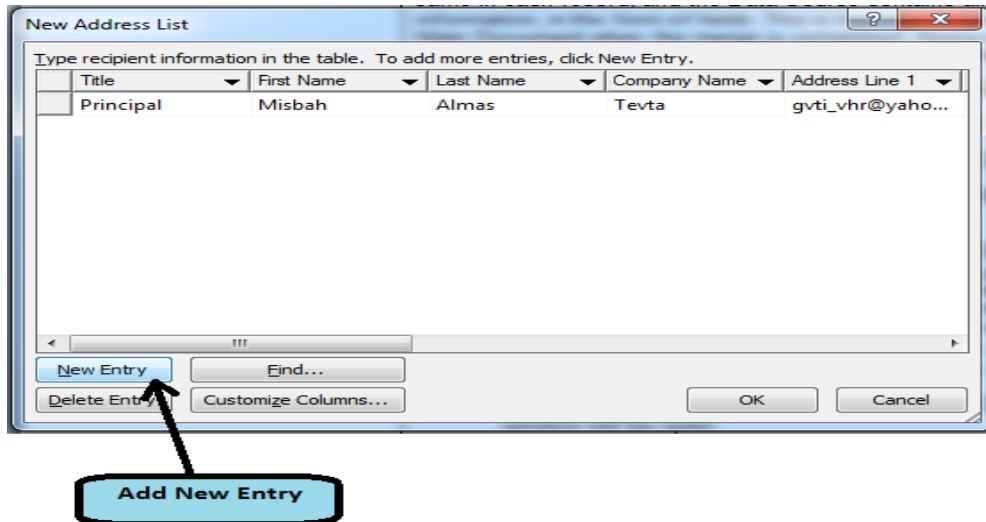
1. Go to the Mailings Option to start the Mail Merge.
2. Click on the mail merge option and select the document type (select Normal Word Document).
3. Now click on the **Select Recipients** to select the recipient. There are 3 options available for this step:
  - **Create New List:** to create new list of recipient click on this option. This sets up the name, mailing address etc. of the recipients and then stored in a Word table, which can easily be transferred to an Excel Data Source later if required.
  - **Use Existing Field:** Let's you browse to and open a word, Excel, Access or text file Data Source.
  - **Select from Outlook Contacts...** Use an Outlook or Outlook address book as the Data Source.
4. Select **Create New List** option to create a list of recipient. A new window will be open. Enter the values with required fields and click "OK".

### Remember

When you save the main document at this point, you are also saving the data source and attaching the data source to the main document.

**Note**

This electronic postage option requires that you have a postage software program installed on your computer.

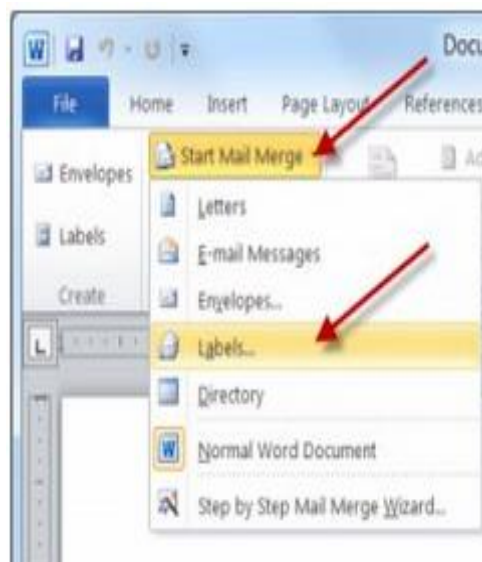


5. Click **OK** to return to the main document.
6. Save the main document.
7. Type the name that you want to give to your main document, and then click Save.

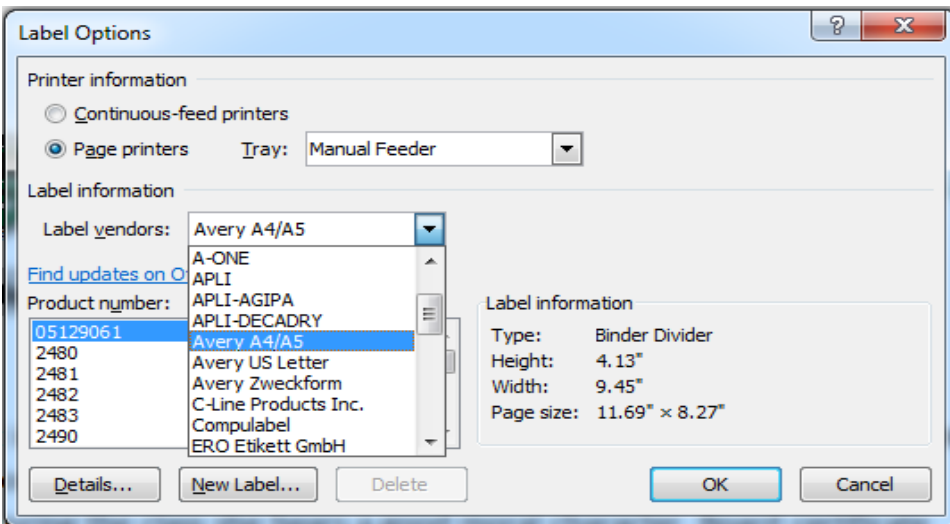
### 3. Making Labels and Address Books

The procedure to make labels has the following steps:

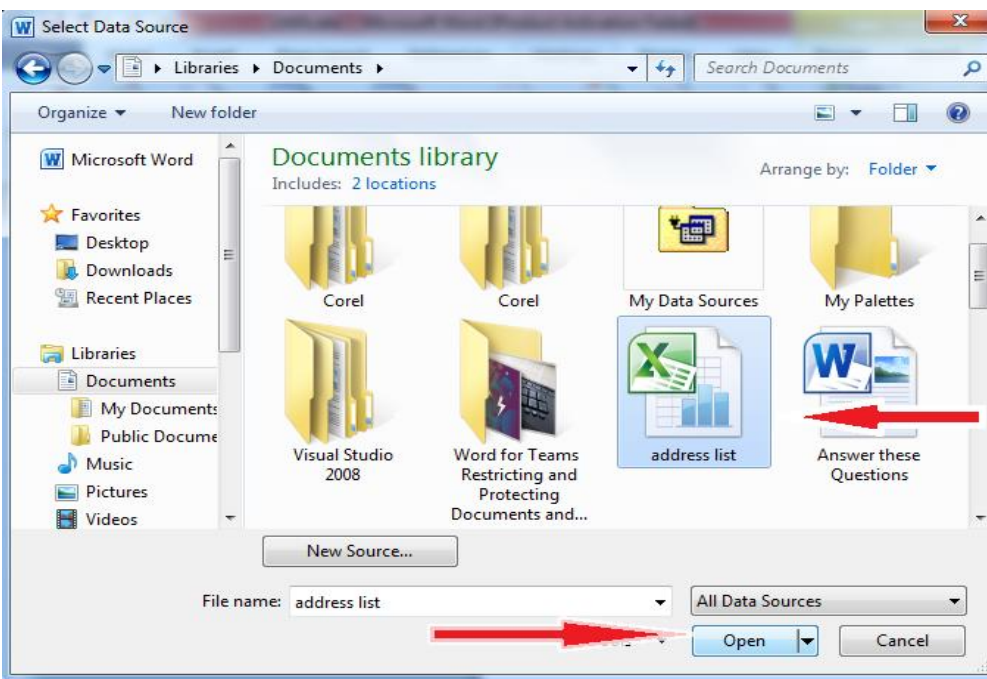
1. To start the mail merge for labels, you should have a list of all the addresses. Make a list in Excel sheet including all fields that you want to add in label and save it.
2. Open Ms Word 2010 and click on the **Mailings** tab.
3. Click on Start Mail Merge and then select Labels.



4. When you click on Labels, a Label Options window opens. Go ahead and select the Label vendors.



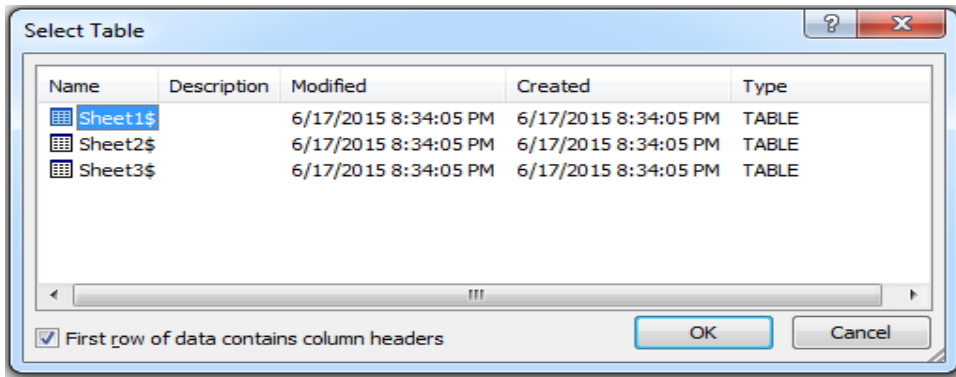
5. Then select the labels you want and click **OK**.
6. Select Recipients and then select Use Existing List and use the excel sheet of address list.
7. Point to the location where the excel spreadsheet is located.



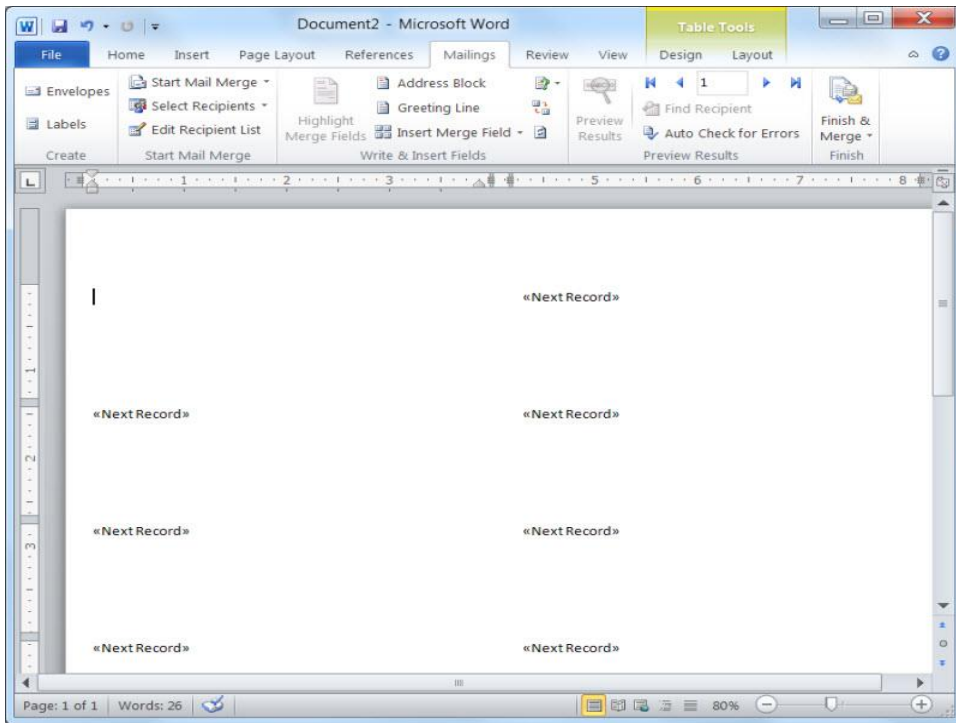
### Important

Please check the check mark next to the first row of data that contains column headers. You should have column headers otherwise you will only see A, B, C, etc. and it will be very difficult for you to figure out which column is the first name and which one is the zip code.

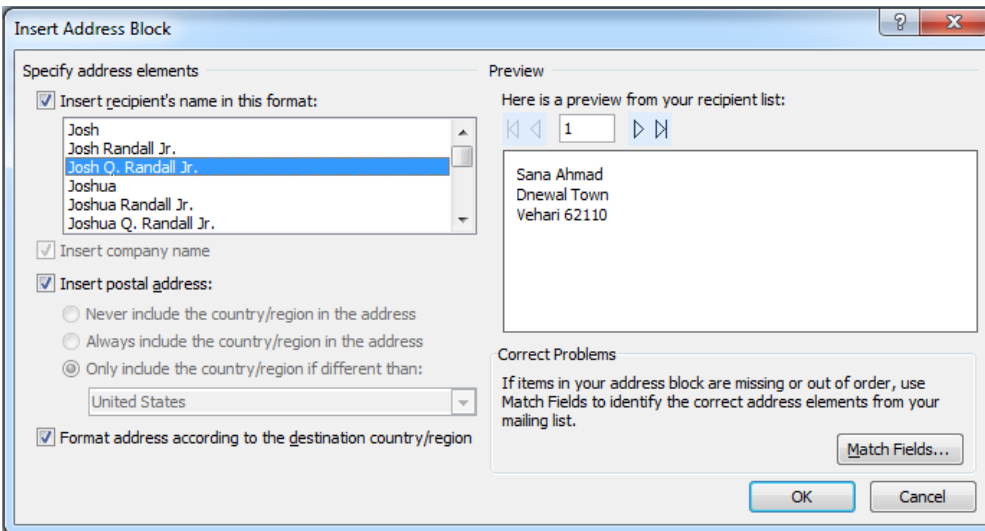
8. Select the appropriate Table.



9. After you click **OK**, your Word 2010 document should look like this. You should see each separate label.



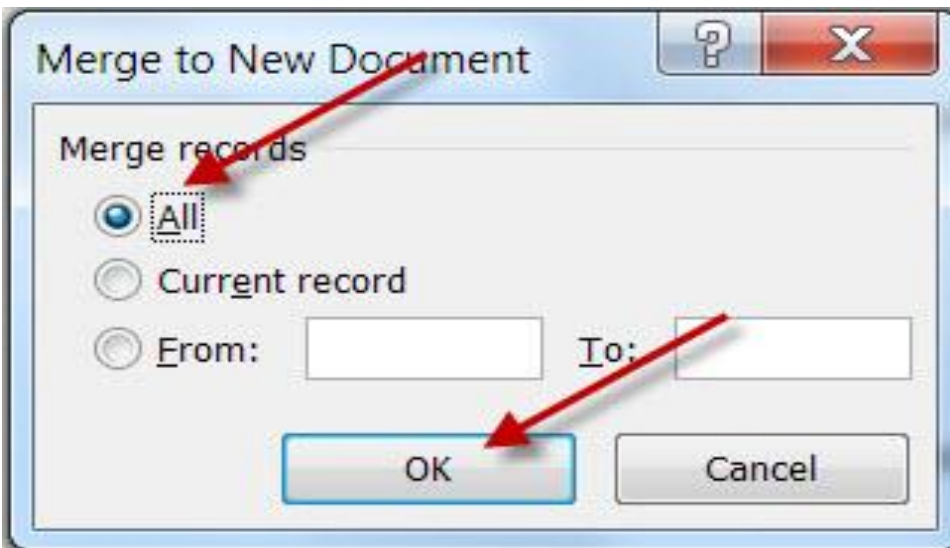
10. Now click on the Address Block to specify address elements and then click **OK**.



### Important

Make sure that your cursor is where you want to insert the information from your data source before you Add field Codes.

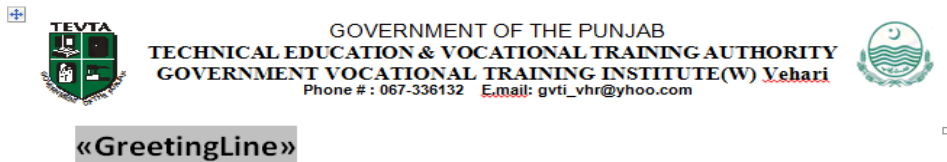
11. Now you can see **Address Block** on your first label. Then click on **Update Labels** option in **Write & Insert Field** Group, to apply changes on all labels.
12. Now click on **Finish & Merge!** But before you print the documents, click on Edit Individual Documents.
13. Make sure all is selected and click OK. This will make sure all of your records from the spreadsheet are being added to the mail merge.



## 4. Different Attributes of Mail Merge

1. Open the word Document and type the text or graphics want to include in your letter.
2. Select the **Letter** type from **Mail Merge** Option.
3. Select **Use existing list** from the **Select Recipient** option.
4. Add the field codes where you want the variable information to appear. In the **Mail Merge** task pane, you have four options:
5. **Address block**: Use this option to insert a formatted address.
  - **Greeting line**: Use this option to insert a formatted salutation.
  - **Electronic postage**: Use this option to insert electronic postage.

- **More items:** Use this option to insert individual merge fields. When you click **More Items**, the **Insert Merge Field** dialog box appears. The below diagram show the field codes that we enter

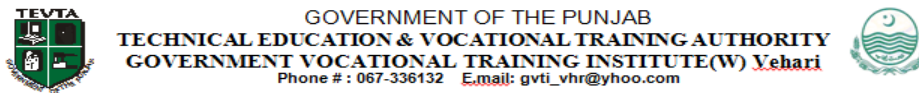


**Certificate:**

It is certified that «First\_Name» D/O «Last\_Name» has completed 6 Month Computer Course (CCA) from" April to August 2014". She got **91/100** marks. During the class she bears a good moral character. Board certificate issuance is under process.

«AddressBlock»

6. When you finish editing the main document, click **Save** or **Save As** on the **File** menu.
7. Click on the **Preview Results** option in the **Preview Result** tab. **Preview Result** option allows you to preview your merged data.



**Dear principal Almas,**

**Certificate:**

It is certified that misbah D/O **Almas** has completed 6 Month Computer Course (CCA) from" April to August 2014". She got **91/100** marks. During the class she bears a good moral character. Board certificate issuance is under process.

**principal misbah Almas**

**TEVTA**

**gvti\_vhr@yahoo.com**

**Changing the Format of Merge Data:**

To format merged data, you must format the merge fields in the main document. Don't format the data in the Data source because the formatting can not retained when you merge the data in main document. To change the format of the merged data, follow these steps:

1. In the main document, select the field that contains the information that you want to format, including the enclosing merge field characters (<< >>).
2. Select the option that you want in the **Font** group on the **Home** tab.



## 5. Procedure of Mail Merge

If you have to send a thanks letter to your friends using mail merge option firstly you have to write a thanks giving letter. After writing letter start Mail Merge.

The procedure to start a mail merge has the following steps:

1. To start your mail merge, click on the **Mailings** tab, then click on the **Start Mail Merge** icon and select **Letters**.


Sana & Ahmad  
Main Danewal Road,  
Vehari.62110.

Please accept my sincere thanks for a gift. Word  
Cannot express the joy that I feel remembering that  
you shared the beginning of our new life a together.  
We appreciate the generosity and thoughtfulness.  
Thanks you for your sharing in joy.

Sana & Ahmad.

2. Next, click on the **Select Recipients** icon and select **Use Existing List**.
3. Select the **Sheet1\$** option, make sure the check box is checked next to **First row of data contains column headers**, and then click **OK**.
4. Next, position your cursor to a location where we are going to insert the salutation and type in **Dear <space>**.

Sana & Ahmad  
Main Danewal Road,  
Vehari.62110.

Dear| 

Please accept my sincere thanks for a gift. Word  
Cannot express the joy that I feel remembering that  
you shared the beginning of our new life a together.  
We appreciate the generosity and thoughtfulness.  
Thanks you for your sharing in joy.

Sana & Ahmad.

5. Now you can insert merge fields. You can do it automatically by clicking **Address Block** or **Greeting Line** option. With your cursor being located right after "Dear", click on the **Insert Merge Field Option**.



6. Select Salutation and first-name field .Your merge field should now appear in your document.

Sana & Ahmad  
Main Danewal Road,  
Vehari-62110.

Dear «Salutation» «First\_Name»

7. Same like this you can add different fields on the letter and can format them.
8. To see the actual address in your letter you need to finish the merge. To do so, make sure you are in the **Mailings** tab, click on the **Finish & Merge** option and select **Edit Individual Documents**.

<p>Sana &amp; Ahmad Main Danewal Road, Vehari-62110.</p> <p>Dear Miss Sana</p> <p>Please aCCePt my sinCere thanks for a gift. WJord Cannot express the joy that I feel remembering that you shared the beginning of our new life a together. WJe appreciate the generosity and thoughtfulness.</p> <p>Thanks you for your sharing in joy.</p> <p>Sana &amp; Ahmad.</p>	<p>Sana &amp; Ahmad Main Danewal Road, Vehari-62110.</p> <p>Dear Miss Rida</p> <p>Please aCCePt my sinCere thanks for a gift. WJord Cannot express the joy that I feel remembering that you shared the beginning of our new life a together. WJe appreciate the generosity and thoughtfulness.</p> <p>Thanks you for your sharing in joy.</p> <p>Sana &amp; Ahmad.</p>
--	--

## Learner's Activity

- Write an Invitation Letter for wedding
- Make a list of Recipient in excel
- Also use Label for each recipient
- Use Greeting line or insert fields in letter

# Learning Unit 12: Insert Header/Footer in a Word Document

## Overview

### Do you know!

You can format the text in the header section and can insert shapes.

In this learning unit you will learn how to use header and footer in the document. After completion of this learning unit you will be able to insert header, footer and page number in the document.

## 1. Purpose of Header and Footer

**Header:** Header is the text included in the top margin of the page separated from the main body of the text. A header usually includes information such as the title of the book, the author and/or the name of the chapter reading. It may also include the page numbers. A header used continuously throughout the document is known as a running header, in publishing. The left hand page (verso) includes the title and the right hand page (recto) includes the title of the subsection or the chapter. In academic writing, the header may contain the name of the author and the page title.

**Footer:** Footer is the bottom margin of the page which is separated from the main body of the text. Like the header, the footer may also run throughout the document and it is usually reserved for the page numbers. Any annotations to the main text may also be included at the bottom of the page as a reference, which is called a footnote. The page footer is different from the footnotes. Footnotes are relevant only to the text of the specific page.

## 2. Inserting Header & Footer

The procedure to insert header and footer in the document has following steps:

1. Open the MS Word document.
2. Place the cursor on the upper portion of the page outside the margin and double click.
3. The thin, dashed blue line in the bottom of your header, and everything above is the area where you can type your header text.
4. Type the text that you want to add in the header.
5. Double Click on the page to close the header section. The header will be applied on all the pages of the document.

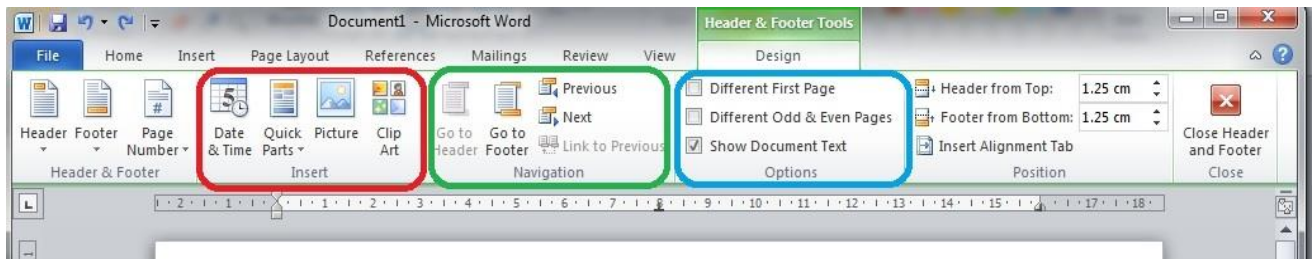
The footer can also be applied on the lower part of the page outside the margin.

## 3. Difference between Header & Footer

- The header is the top most portions separated from the main body containing text for general information about the text.
- The footer is the equivalent to the header which is placed at the bottom of the page, and it is usually reserved for the page numbers and the footnotes to the main text.

### Design Tab of Header Footer:

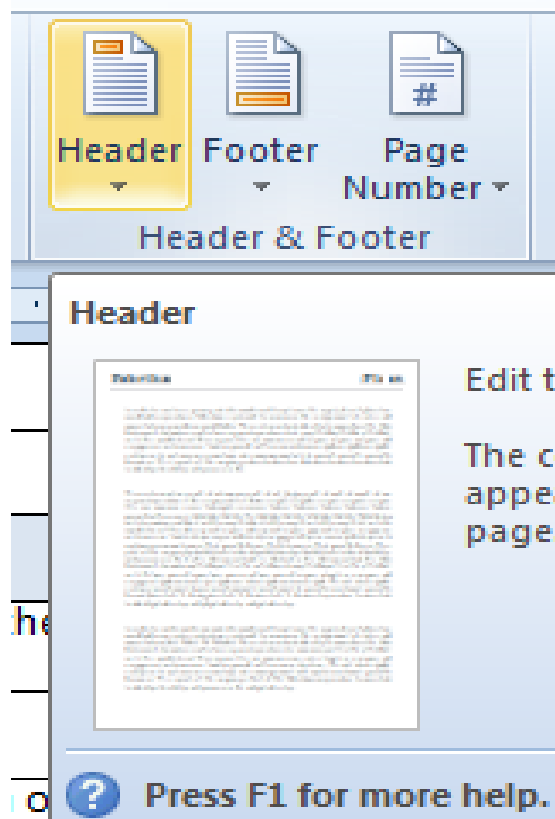
When you click to insert header/Footer option, the following design tab of Header/Footer opens.



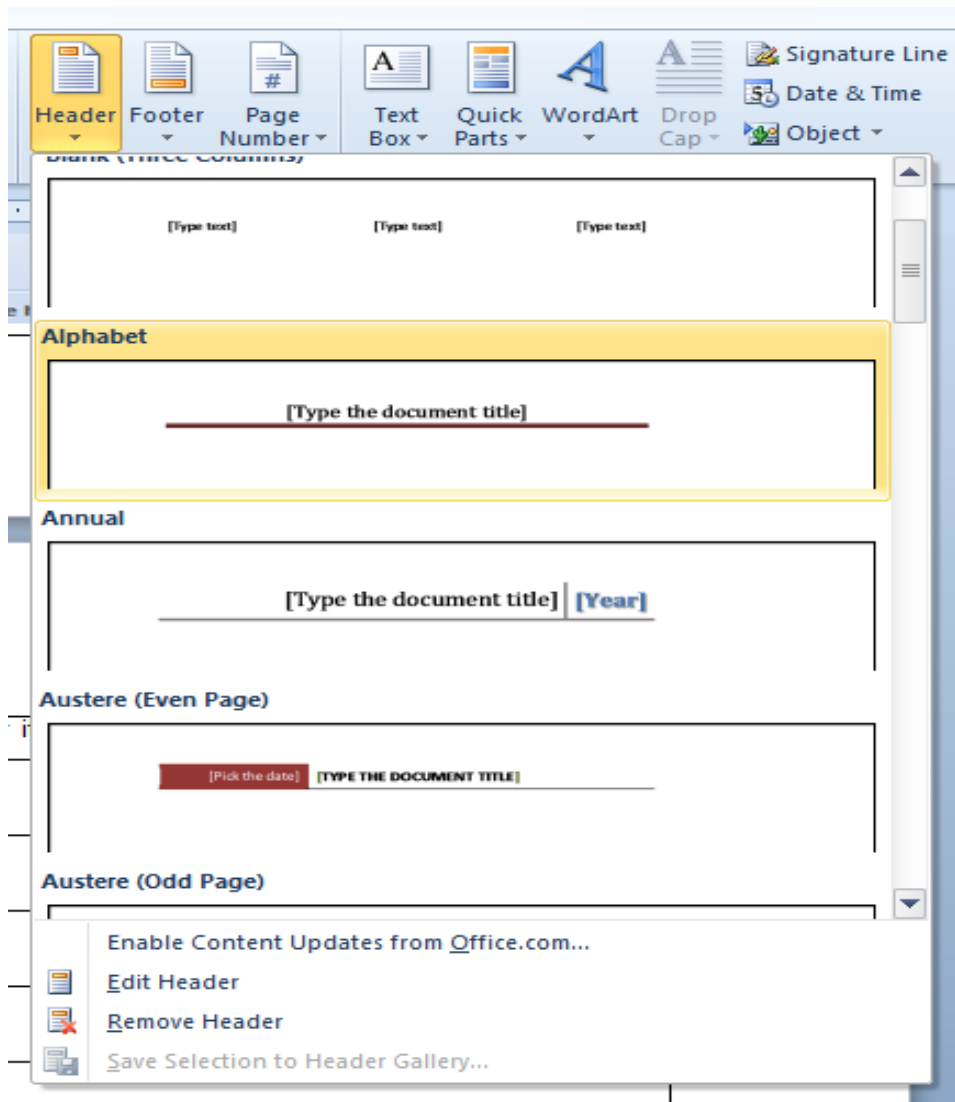
From this tab you can insert pictures, clipart, date & time etc in header/ Footer. And different options can be adjust through this.

#### 4. Procedure of Inserting Header and Footer

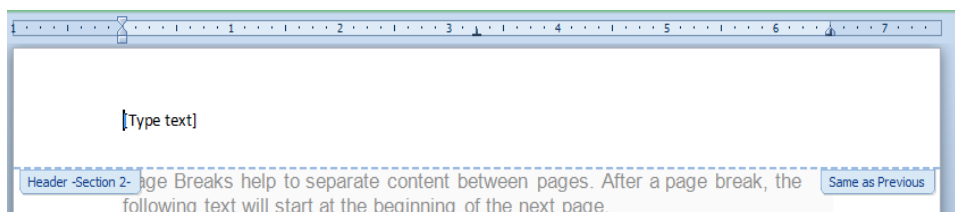
1. To set up a header and footer for your document, click on the Insert tab at the top of Word. Now locate the Header & Footer panel:



2. Click on the Header item and you'll see a drop down list appear:



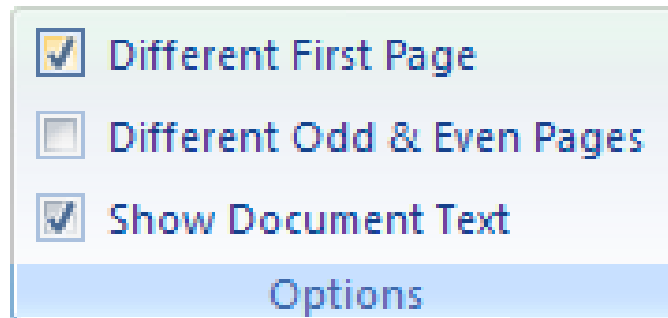
3. The items on the list are Headers that are built in to Microsoft Word. There are some nice Headers on the list,
4. To create your own header select the first item on the list, Blank. The top of your page will then look like this:



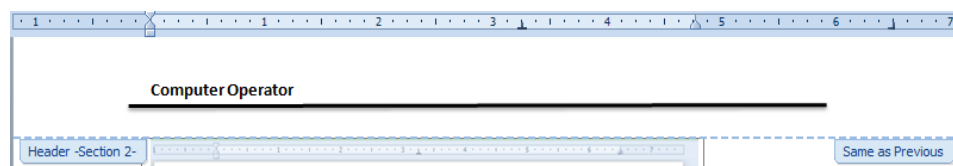
5. Notice that a new tab has appeared - the **Design** tab. The panels on the tab are: **Header & Footer**, **Insert**, **Navigation**, **Options**, **Position**, and **Close**.
6. The thin, dashed blue line is the bottom of your header, and everything above is the area where you can type your header text (or insert images).

There is already a selected area with the words "Type text" in it. However, this is the first page in document. You don't want any header on the first page, as it doesn't look very good. You want the headers to start on page two.

So have a look at the **Design tab**, and locate the Options panel. Left click inside the check box next to **Different First Page**:



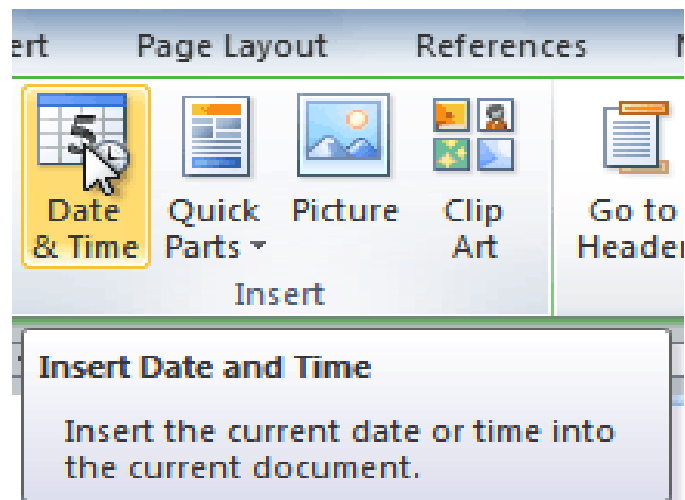
- Now type the text that you want to write in the Header. You can add shapes and change formatting of text in header.



- At the last, click the **close Header Footer** button in the design tab.

## 5. Inserting Page Number and Date in Footer

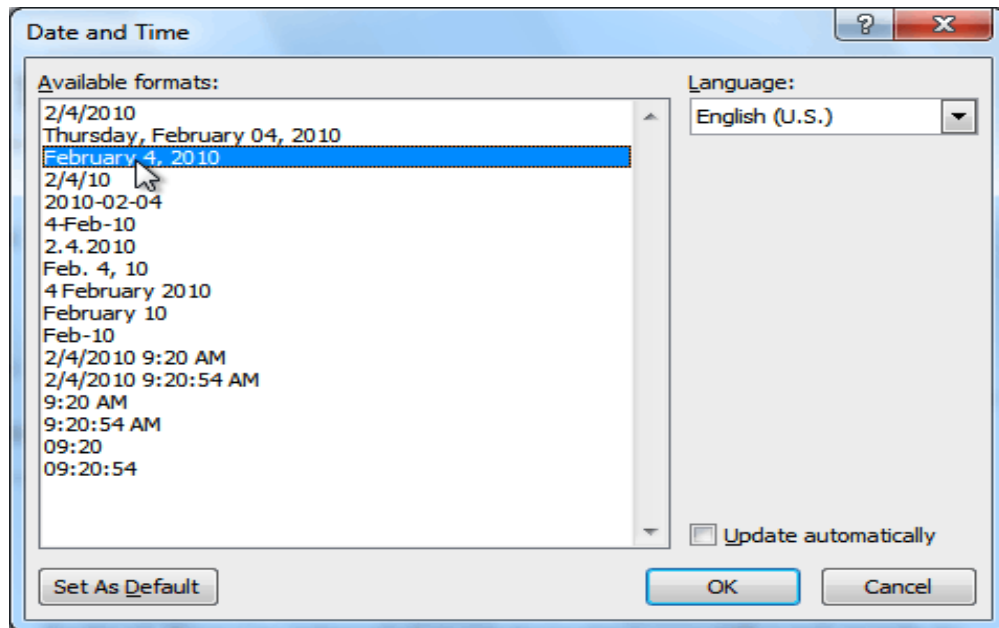
- Double-click** anywhere on the header or footer to **unlock** it. The **Design** tab will appear.
- From the **Design** tab, click the **Date & Time** command.



- Select a **date format** in the dialog box that appears.

**Important**

If you're unable to select **Different First Page**, it may be because an object within the header or footer is selected. Click in an **empty area** within the header or footer to make sure nothing is selected.

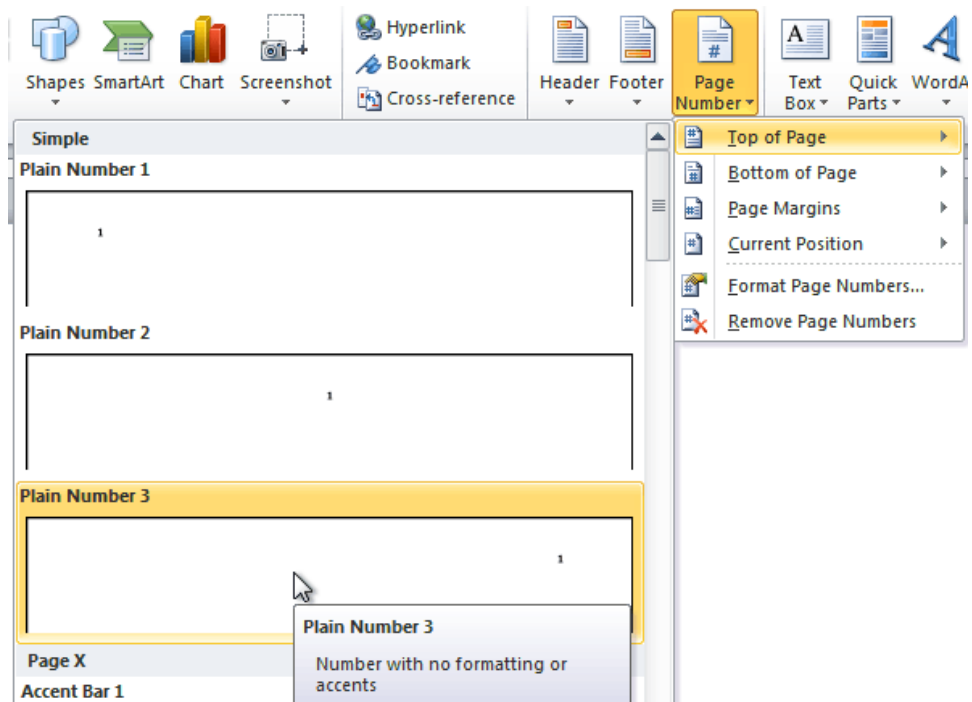


4. Place a check mark in the **Update Automatically** box if you would like it to always reflect the current date. Otherwise, it will not change when the document is opened at a later date.
5. Click **OK**. The date and time now appears in the document.

**Page Number:**

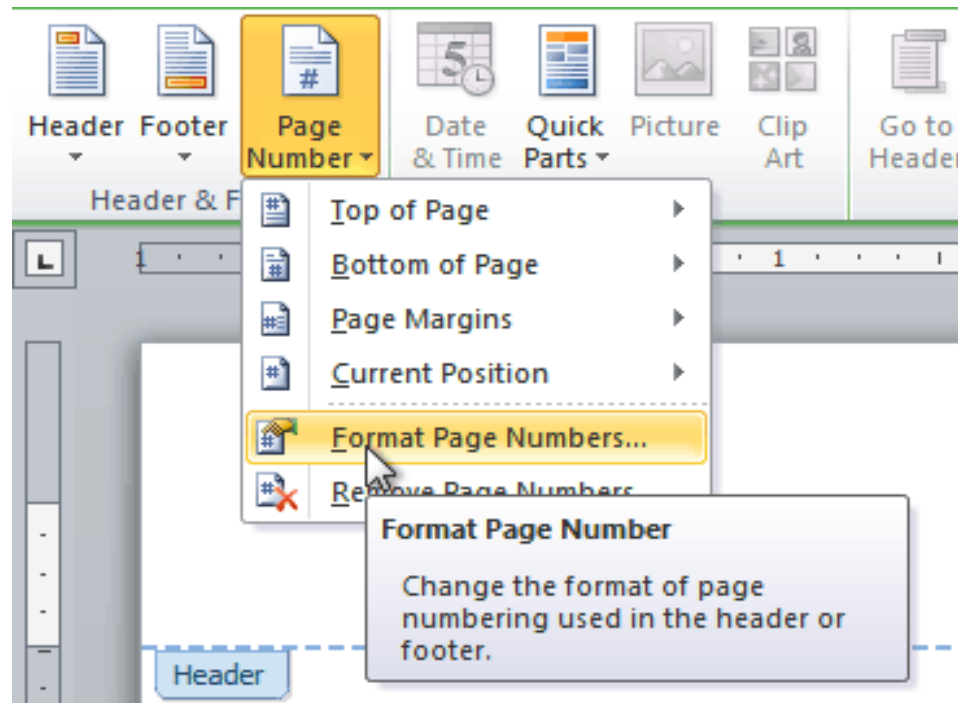
Word can automatically label each page with a page number and place it in a **header, footer, or side margin**.

1. From the **Insert** tab, click **Page Number**. A drop-down menu will appear.
2. Select the desired **page number style** and it will appear in your document.

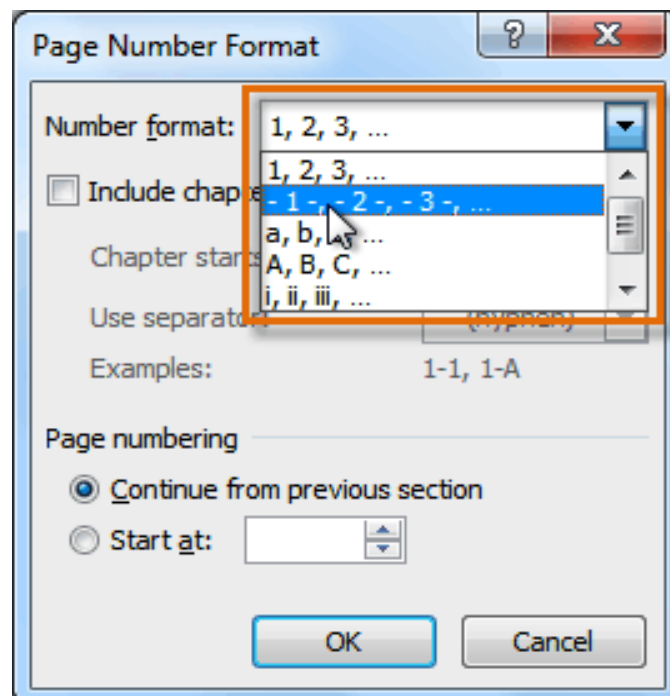


**Format Page Numbers:**

1. Select the **header** or **footer** that contains the page number.
2. From the **Design** tab, select the Page Number command.
3. Click **Format Page Numbers**.



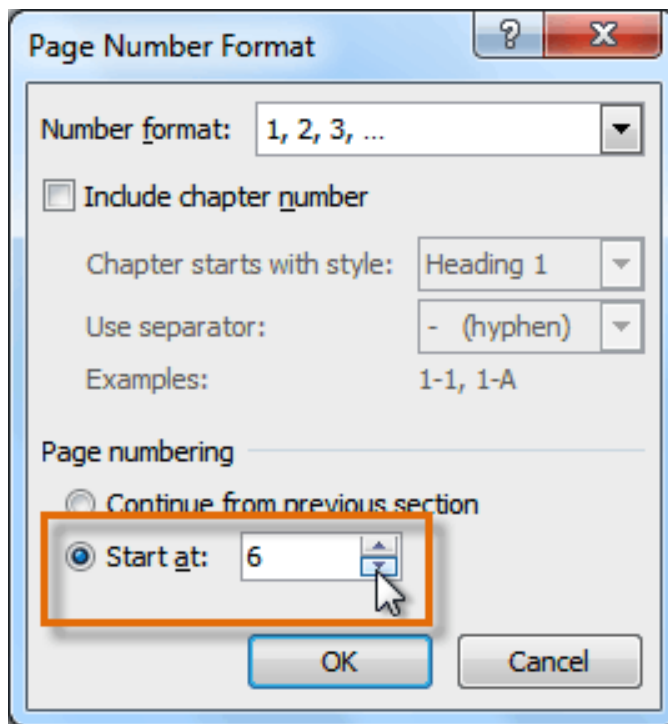
4. From the dialog box, select the desired **Number format**.

**Do you know!**

If you've created a page number in the **side margin**, it's still considered part of the header or footer. You won't be able to select the page number unless the **header or footer is selected**.



- Next to **Start at**, enter the number you want the page numbers to start with.



## Learner's Activity

1. Create a **new** Word document.
2. Create a blank **header**.
3. Add your name in the **header** of a document and draw a line under this.
4. **Right-align** the text in the header.
5. Select a **built-in footer** with date and page Number.
6. Don't show page number on front page.

# Learning Unit 13: Insert Section Break in a Word Document

## Overview

In this learning unit you will learn about the concept and usage of Section Break. After completion of this learning unit you will be able to use section break in the document and usage of its attributes.

## 1. Purpose of Section Break

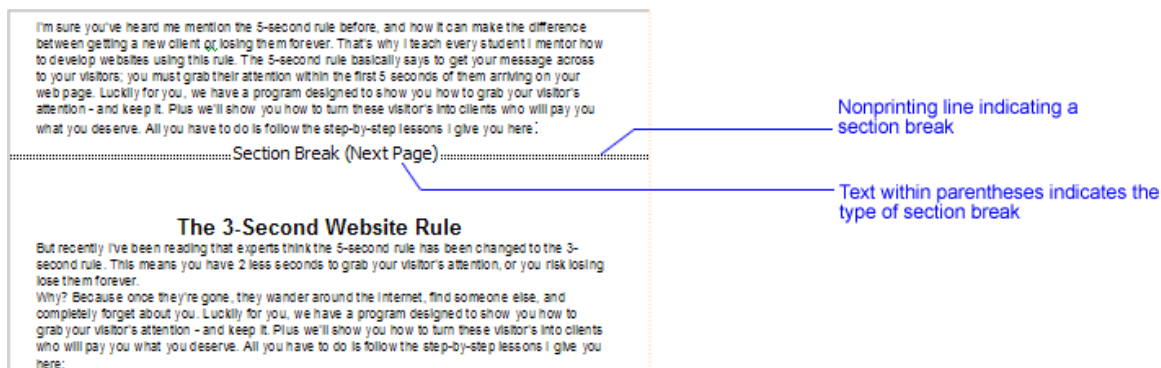
### Section Break

A section break stores the section formatting for the text above it, and also means the end of the section containing the text above the section break.

**Section Breaks:** create a barrier between parts of the document for formatting purposes.

Section breaks in Microsoft Word 2010 can be used for following purposes

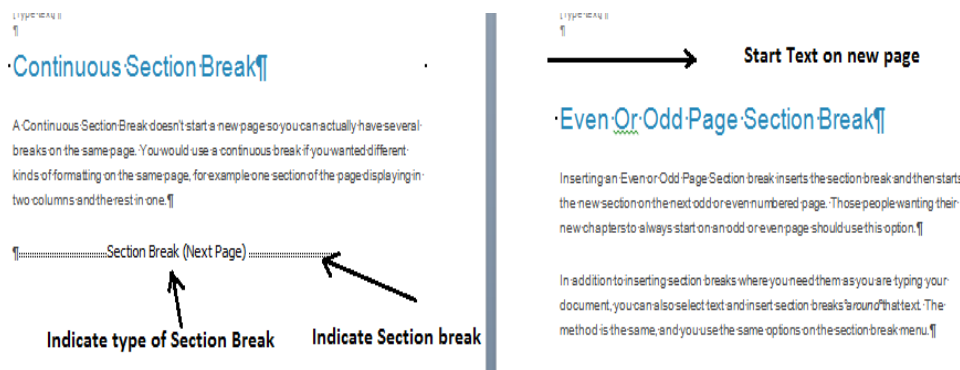
- Use page numbering that starts at 1 for each section of your document (for example, different chapters in the same document).
- Display text in two columns for only a portion of your document and then return to the default one column afterwards.
- Display different header and footer information for different parts of your document.



## 2. Inserting Section Break in a Word Document

The procedure to divide the page into section has the following steps:

1. Position the insertion point in the position where you want to start a new section.
2. On the **page layout menu**, click **Break**.  
The **Break dialog** box is displayed.
3. Under **Section break types**, click the option that describes where you want the next section to begin.
4. Click **OK**.



### Important

You will have to switch to **Normal** view (or enable the **Show/Hide** button (¶) in any other view) before you can visibly see the positions of each section break.

## 3. Difference between Section Break and Page Break

**Page Breaks:** help to separate content between pages. After a page break, the following text will start at the beginning of the next page. It tells the printing device where to end the current page and begin the next.

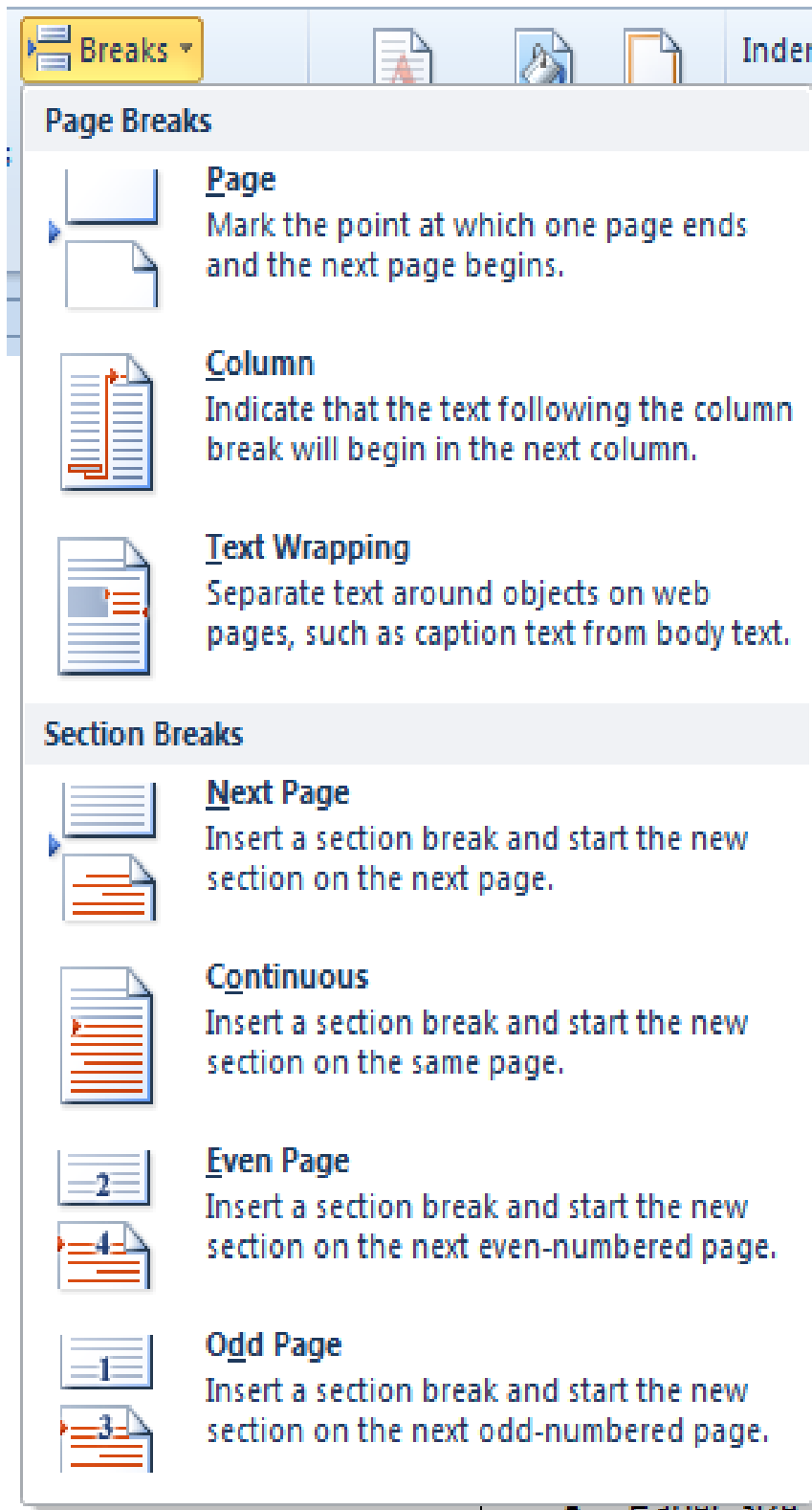
**Section Breaks:** split your document into sections, enabling you to have different formatting for each section:

Section properties include the following settings:

- Page Orientation (Portrait/Landscape)
- Margins
- Columns
- Line Numbering
- Vertical Alignment
- Headers & Footers
- Page Numbering
- Paper Size
- Paper Source.

### Different Attributes of Break

When you click the **Break** command to insert a section break, **Word** displays the **Break** dialog box, which offers you a number of options. The **Break** tab in the **page layout** has the following options:

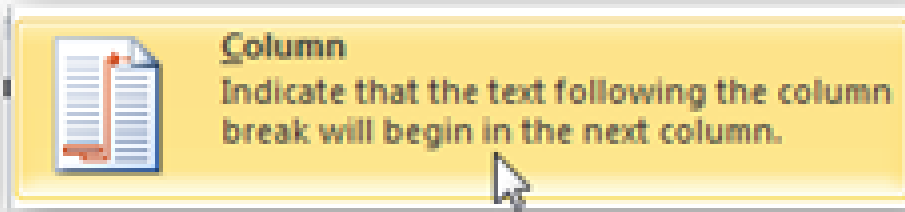


**Page Breaks:**

Only start you on the next page, all formatting will be kept the same from your original page to your new one. Use this when you want to just start typing on a new page but want all the formatting same.

**Column Break:**

If you've formatted your document with columns (such as a newsletter), you know that your text will automatically flow from one column to the other. You can also insert your own column breaks if you want which gives you more control over the formatting of your document.



**Remember**

**Paper size and page orientation** settings on adjacent sections which are separated by **Continuous** section break remain the same. Two or more section can be different in line spacing, margin setting and number of columns.

**Text Wrapping:**

Select the text beside the picture, and select *Text Wrapping*. This will let you keep this text together with consistent formatting, and will flow the rest of the document around this section.

**Next Page:**

If you choose this option, word breaks the page before the insertion point but shift the contents to the Next page.

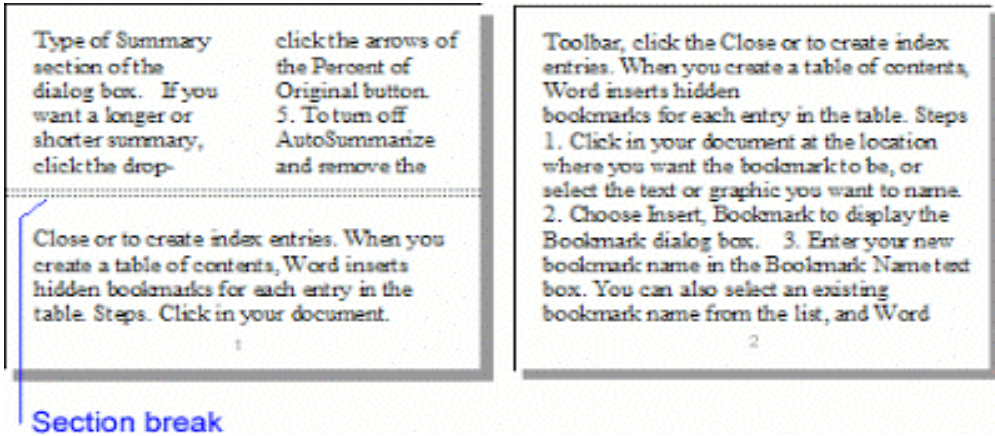


**Continuous:**

If you choose this option, or if **Word** automatically applies it, **Word** inserts a section break before the insertion point and then begins the new section on the same page.

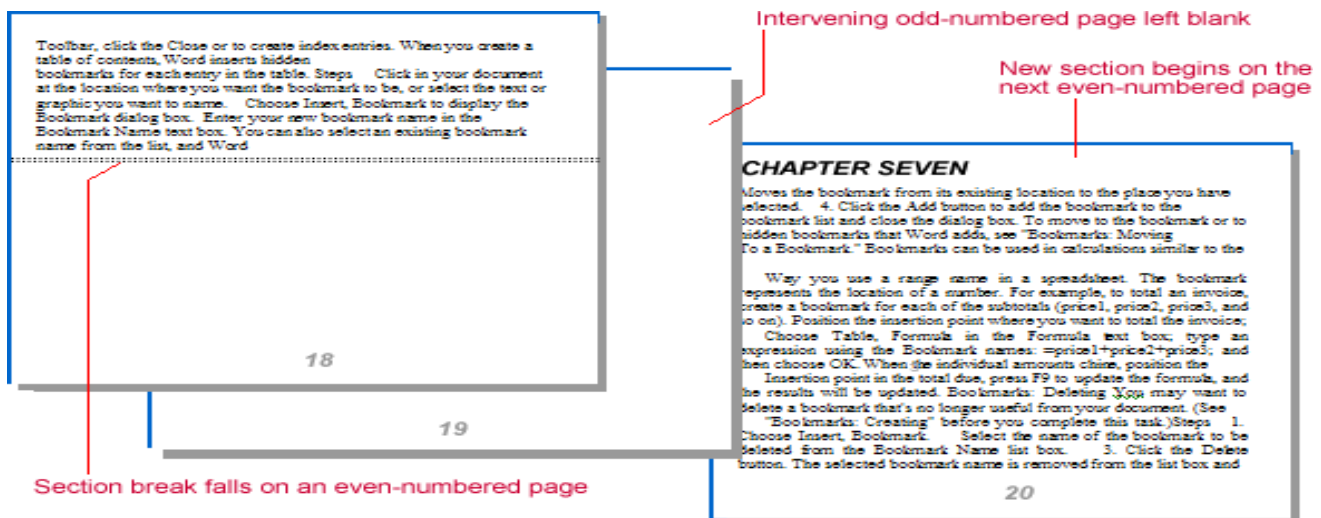
**Note**

This type of section break is most ideal for use for chapters (or other major sections such as *Appendix*, *Index*, *Glossary*, etc) that begin on even-numbered pages.



**Even Page:**

Choosing this option, Word inserts the section break (the double-dotted line) before the insertion point (in Print Layout view), and begins the new section on the next even-numbered page.



**Odd Page:**

It has all the effects and uses as the **Even page** option, **EXCEPT** that the new section begins on the next **odd-numbered** page.

**4. Using Breaks**

The procedure to use any break command in your document has the following steps:

1. Open the document.
2. Place the pointer on the insertion point where the break is required.
3. Select **page layout** tab and click the **break** command down arrow and select the required break.
4. The break will be applied on the document.

# Learning Unit 14: Set Style in a Word Document

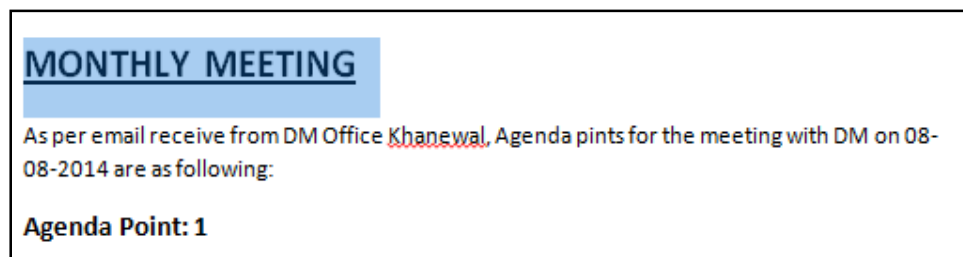
## Overview

In this learning unit you will learn how to apply appropriate styles in your document and how you can edit the styles given in the word Document. After completion of this learning unit the student will be able to set styles on the document according to the requirement.

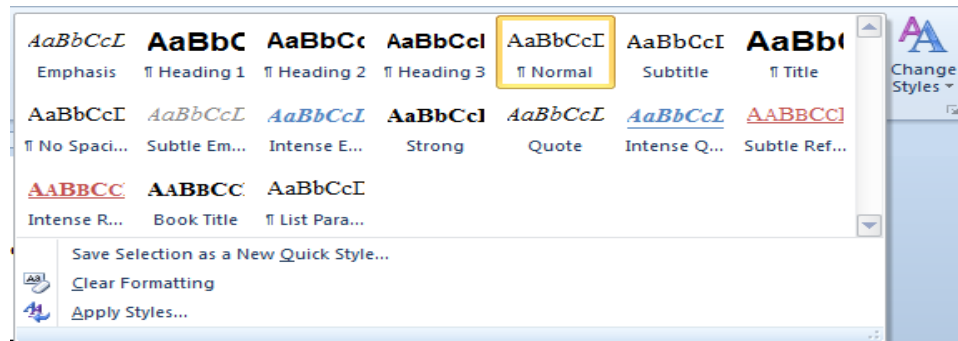
## 1. Setting Styles on the Document

The procedure to set the styles on the document has the following steps:

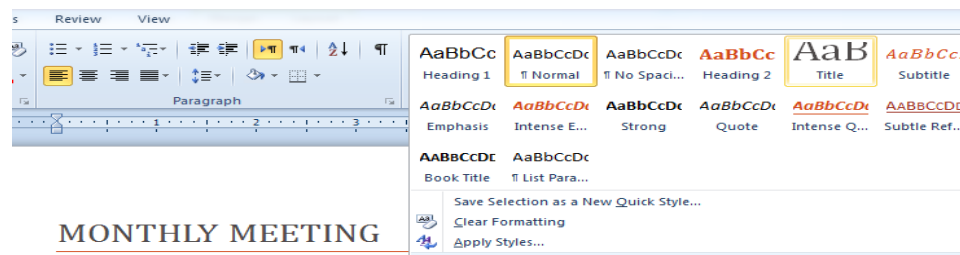
1. Select the text you want to format



2. In the **Style** group on the **Home** tab, hover over each style to see a live preview in the document. Click the **More** drop-down arrow to see additional styles.



3. Select the style you want. The **selected text appears formatted** in the style.



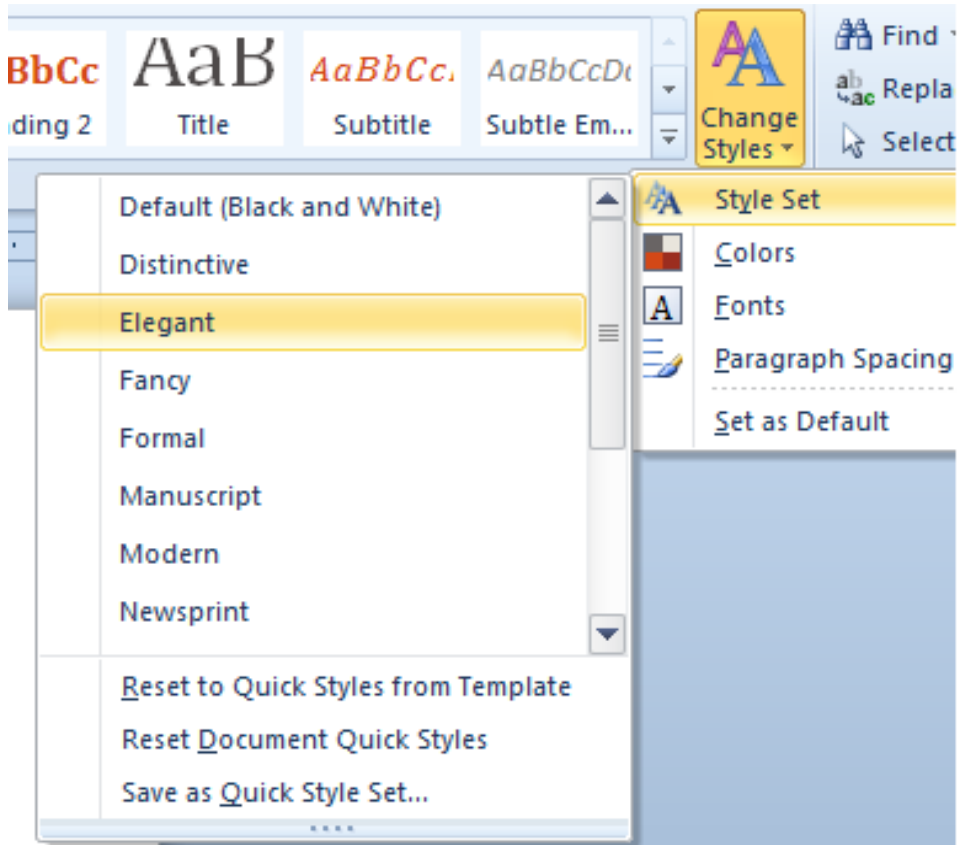


### Applying Set Styles:

**Style sets** include a combination of title, heading, and paragraph styles. Style sets allow you to **format all of the elements of your document** at once, rather than formatting your title and headings separately.

The procedure to apply set styles has the following steps:

1. Select the text.
2. Click the **Change Styles** command on the Ribbon. A drop-down menu will appear.
3. From the drop-down menu, select **Style Set**.



4. Select the **Style Set** you want and the change will be reflected in the entire document.

## MONTHLY MEETING

As per email receive from DM Office Khanewal, Agenda pints for the meeting with DM on 08-08-2014 are as following:

### Agenda Point: 1

1. Banners have been displayed at different points in the premises of Institute.
2. Pamphlet & handbills have been distributed in local newspapers.
3. Door to Door campaign through staff members.

### Agenda Point: 2

In this regard it is stated that a new 06-month trade of fashion designing course have been proposed to start in coming session 2014-15, due to the reason the infrastructure is available for this course

### Agenda Point: 3

Certificate attached with.

### Agenda Point: 4

It is stated that all observation regarding internal audits have been resolved, No pending para or observation.

### Agenda Point: 5

Copies attached

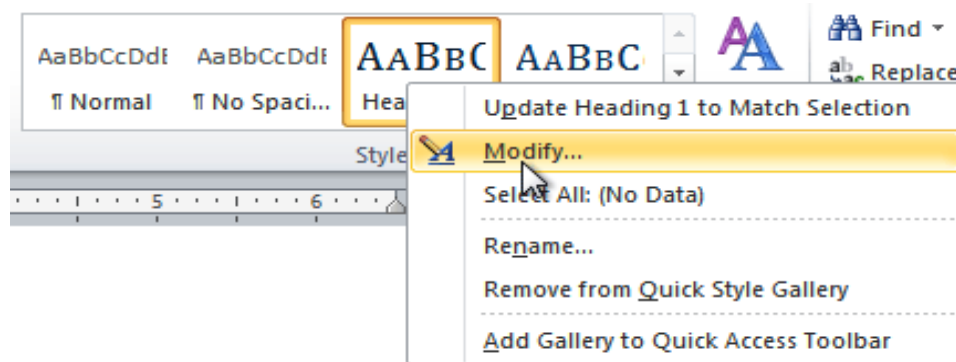
## 2. Purpose of Setting Styles and its Utilities

Styles and themes are powerful tools in Word that can help you easily create professional-looking documents. A **style** is a predefined combination of font style, color, and size of text that can be **applied to selected text**. A **theme** is a set of formatting choices that can be applied to an **entire document** and includes theme colors, fonts, and effects.

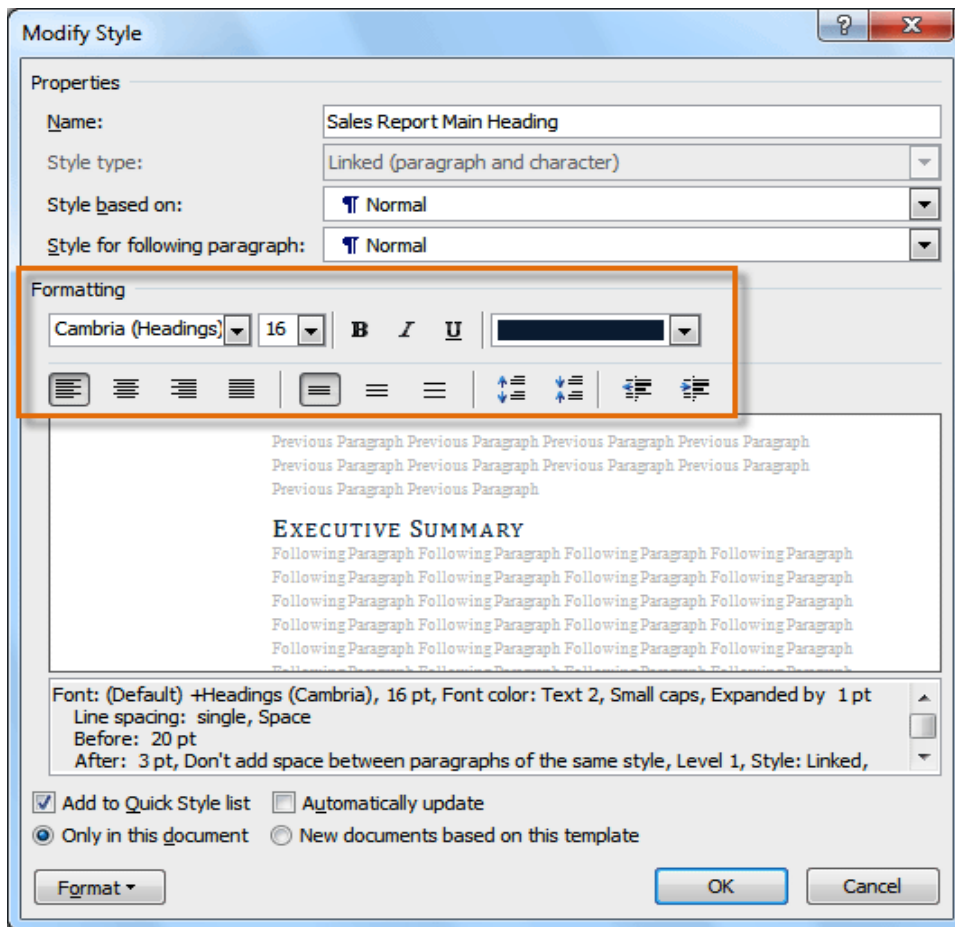
Different options are available to set and modify styles in the style group.

### Modify Style:

- Any given style can be modified by right clicking on the style and select modify.



- Make the desired changes to the formatting. If you want, you can also change the name of the style.

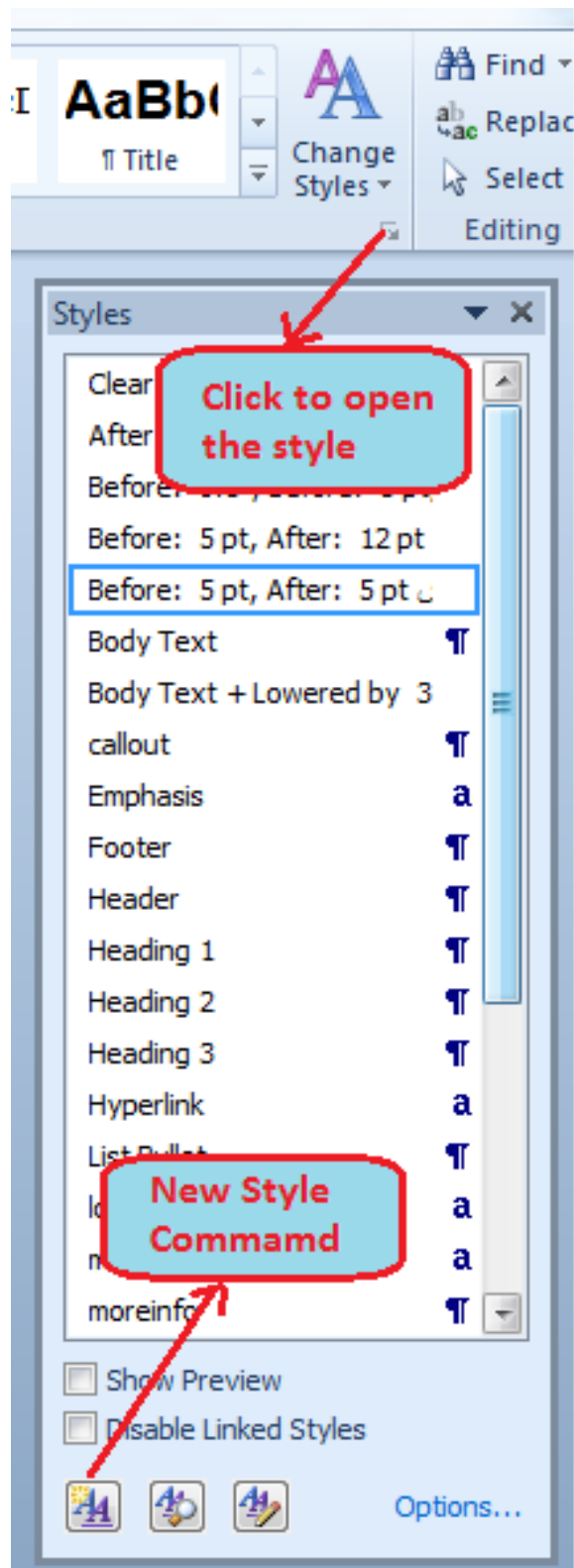


- Click **OK** to apply the modifications to the style.

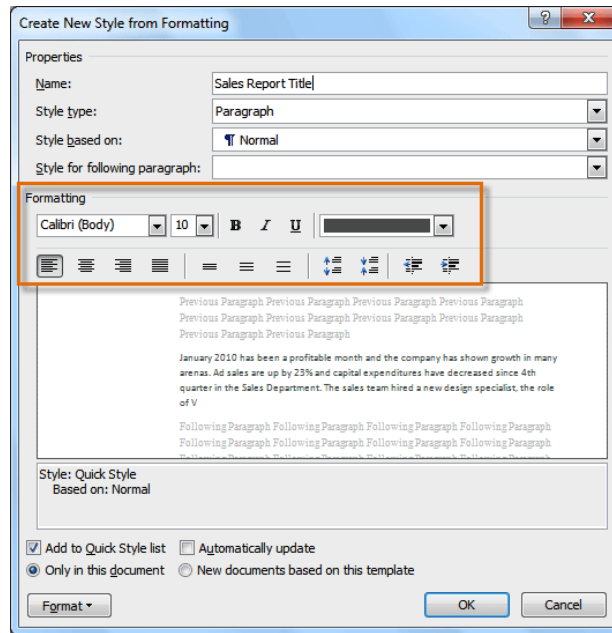
### Create New Style:

To create new style in the document follow these steps:

1. Click the **arrow** in the bottom-right corner of the Styles group. This opens the **Styles** task pane.



2. Select the **New Style** button at the bottom. A dialog box will appear.
3. Enter a name for the style, and set the text formatting the way you want.



4. Click **OK**, and the new style will appear in the task pane.

### Applying different styles on Document:

Apply different styles on the document to see the difference between them.

1. In the below diagram **Fancy** style from **set style** has been applied.

**Note**

After applying a specific style you can change its font and color from change style tab.

### MONTHLY MEETING

As per email receive from DM Office *Khanewal*, Agenda pints for the meeting with DM on 08-08-2014 are as following:

#### **Agenda Point: 1**

1. Banners have been displayed at different points in the premises of Institute.
2. Pamphlet & handbills have been distributed in local newspapers.
3. Door to Door campaign through staff members.

#### **Agenda Point: 2**

In this regard it is stated that a new 06-month trade of fashion designing course have been proposed to start in coming session 2014-15, due to the reason the infrastructure is available for this course

#### **Agenda Point: 3**

Certificate attached with.

#### **Agenda Point: 4**

It is stated that all observation regarding internal audits have been resolved, No pending para or observation.

#### **Agenda Point: 5**

Copies attached

#### **Agenda Point: 6**

Copies attached

#### **Agenda Point: 7**

## Learner's Activity

1. Open an existing Word document
2. Apply several different styles to different parts of your document
3. Apply a style set to your entire document
4. Modify an existing style

# Learning Unit 15: Insert Table of Contents in a Word Document

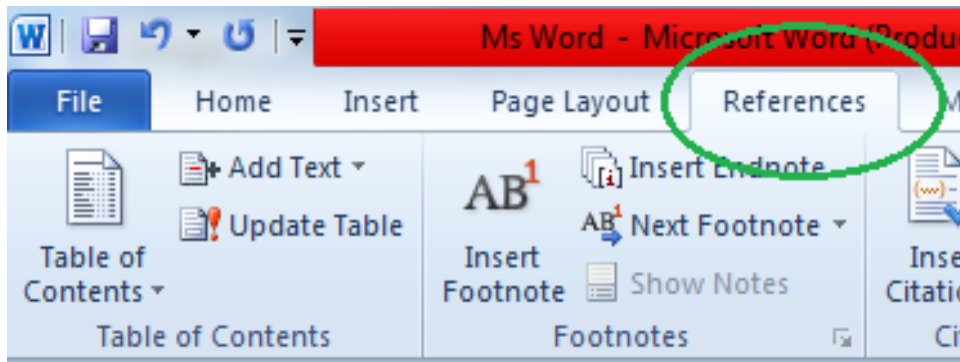
## Overview

In this learning unit you will learn how to insert table of contents in the file. After completion of this learning unit you will be able to insert table of contents from different available options.

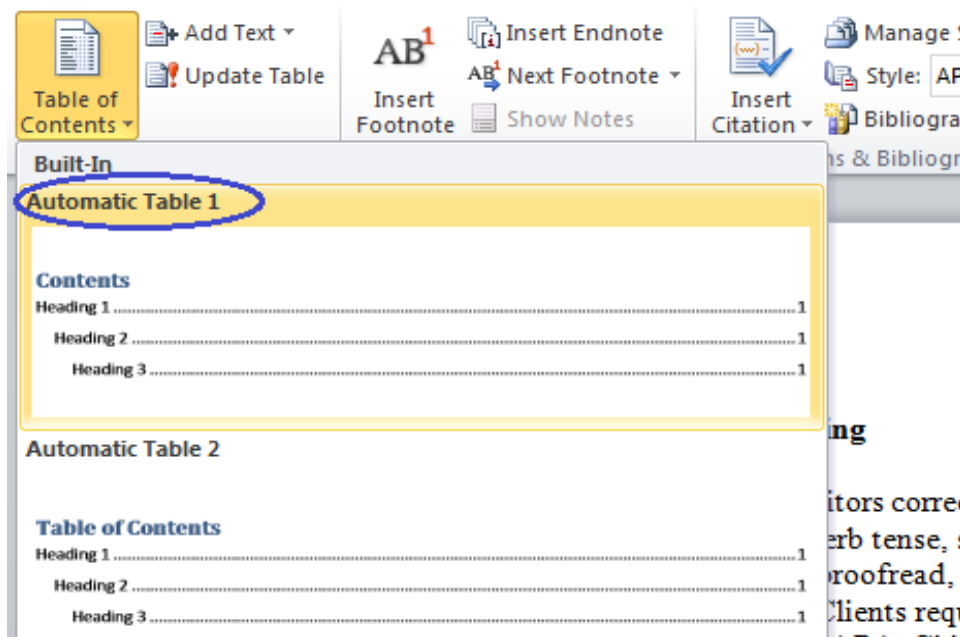
## 1. Inserting Table of Contents in File

The procedure of inserting table of contents has the following steps:

1. Open the existing document and click on the **References** tab at the top of the screen.



2. Place your cursor at the beginning of the document. This is the place where the table of contents will be inserted. Click on the Table of Contents icon and select Automatic Table 1



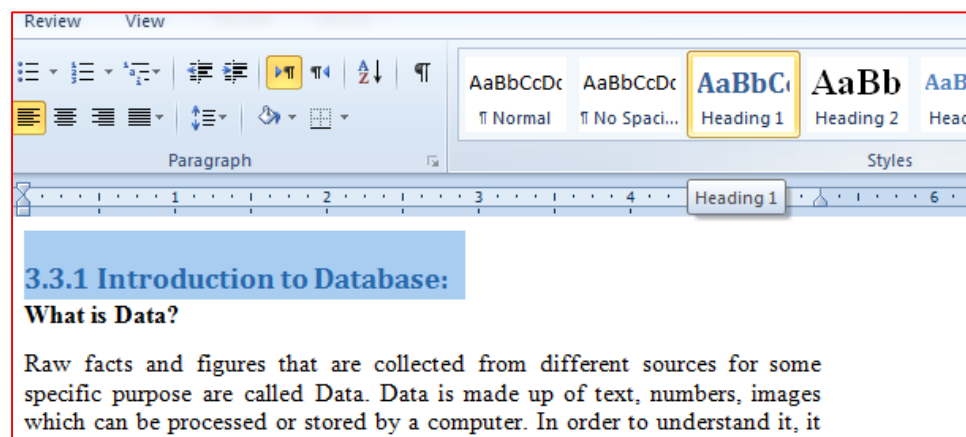
3. Notice that a table of contents has been inserted at the head of your document.

Diploma In Information Technology using MS Access)	Semester-1 (CH-3: Database Management system)
<b>Contents</b>	
3.3.1 Introduction to Database:.....	2
3.3.2 Definition of Database System:.....	3
3.3.3 Properties and Benefits of Database System:.....	4
3.3.4 Components of Database System:.....	4
3.3.5 Database Management System (DBMS):.....	6
3.3.6 What is RDBMS? .....	6
3.2 INTRODUCTION TO RDBMS .....	7
3.3 RELATIONSHIP AND ITS TYPES.....	10
3.4 RELATIONAL DATA INTEGRITY.....	13

## 2. Insert Table of Contents using Headings

The procedure to insert table of contents using heading toolbar has the following steps:

1. Open existing Word document.
2. Select the heading and apply heading style from the **styles** group in **Home** tab.



3. Same like that apply heading styles on all the heading that you want to add in table of contents.
4. Click where you want to add table of contents.
5. Click on the **Table of Contents** icon and select Automatic Table 1.
6. Notice that a table of content has been added in the document.



## Contents

3.3.1 Introduction to Database: .....	5
3.3.2 Definition of Database System:.....	6
3.3.3 Properties and Benefits of Database System:.....	7
3.3.4 Components of Database System:.....	7
3.3.5 Database Management System (DBMS):.....	9
3.3.6 What is RDBMS? .....	9
3.2 INTRODUCTION TO RDBMS .....	10
3.2.1 Database:.....	10
3.2.2 Tables/Relations:.....	10
3.2.3 Attributes/Fields: .....	11
3.2.4 Tuples/Rows: .....	11
3.2.5 Entities/ Tables:.....	12
3.2.6 Key Attributes and Non Key Attributes.....	12
3.2.7 Degree and Cardinality: .....	13

## 3. Purpose of Using Table of Content

### Remember

If you don't like the way the heading styles look (eg, you want a different font or font size or color), don't format the text directly. Instead, modify the heading style.

A table of contents makes it easy for you, your collaborators, and viewers to quickly navigate to a section of your document. Each item in your table of contents links to the titled sections of your document that use the heading styles.

Creating a table of contents in a Microsoft Word document is a two-step process. First, identify the text that you want to appear in the Table of Contents. Second, tell Word to insert the Table of Contents. Having created your Table of Contents, you can then customize it in several ways, to suit your needs.

You cannot generate any automatic tables without first using styles effectively throughout your document. If you want an automatic table of contents you need to label all of your chapter titles and front matter headings (e.g. "Dedication" and "Acknowledgements") in the style Heading 1. All major headings within your chapters should be labeled Heading 2. All subheadings should be labeled Heading 3, and so on.

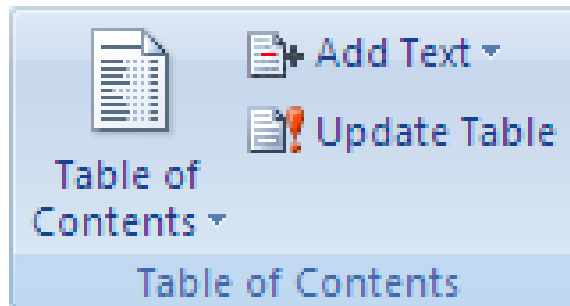
Microsoft Word can scan your document and find everything in the Heading 1 style and put that on the first level of your table of contents, put any Heading 2's on the second level of your table of contents, and so on.

## 4. Features of Table of Content

### Update Table of Content:

If you added or removed headings or other table of contents entries in your document, you can quickly update the table of contents.

1. On the **References** tab, in the **Table of Contents** group, click **Update Table**.



2. Click **Update page numbers only** or **Update entire table**.

### Delete a table of contents:

1. On the **References** tab, in the **Table of Contents** group, click **Table of Contents**.
2. Click **Remove Table of Contents**.

## Summary of Module

- Touch is typing without using the sense of sight to find the keys. Used to increase the typing speed.
- Formatting of text Include the size, style, alignment of the text.
- The MS Word page Set-up includes elements such as the page size, margins (Left, right, up, bottom), number of columns, orientations.
- Restricting and protecting a document ensures that you have the complete authority over its progress. Data can restrict for formatting and editing in MS Word.
- Word document can be set to mark and track changes you make to a document so that you or another author can later review the changes.
- Through Insert tab pictures, clip Art, shapes, smart Art etc. can be add in the document.
- Word document can be save using Save, Save As options in the File tab and using short Key CTRL+S.
- Tables can add in the document to locate the images in their exact locations. Word tables are the perfect easy way to display complex visual information in a page easily.
- Adding hyperlinks to your document can help readers quickly access contact information, other parts of the document and any additional information online that you want to share.
- Mail Merge is a powerful tool for writing and sending a personalized letter or e-mail to many different people at the same time.
- Header is the text included in the top portion of the page separated from the main body of the text.  
Footer is the bottom portion of the page which is separated from the main body of the text.
- Section Breaks: create a barrier between parts of the document for formatting purposes.
- Style sets include a combination of title, heading, and paragraph styles. Style sets allow you to format all of the elements of your document at once, rather than formatting your title and headings separately.

## Frequently Asked Questions (FAQS)

FAQ 1: What do you mean by touch typing?

Answer Touch type is the ability of typing without looking at the keyboard. While using touch-typing, all fingers are used instead of just a few fingers and it increases speed dramatically.

FAQ 2: Write names of Page Orientation?

Answer Portrait and Landscape.

FAQ 3: What is the Shortcut Key to Save a file?

Answer CTRL+S, is used to save a file.

FAQ 4: Which color indicates the spelling mistake in Word document?

Answer Red color wavy line below the text indicates the spelling mistake.

FAQ 5: Can we embed a file of other format in MS Word Document?

Answer Yes, files with different file formats can be embedded in the MS Word document by using Object button in the Insert Tab.

FAQ 6: Why we use comments in the MS Word file?

Answer Comments provide useful way to leave notes about parts of the document.

FAQ 7: For which purpose Bookmark is used?

Answer Bookmark is used to locate a specific point in the document. Using bookmark you can directly jump to a point within the document.

FAQ 8: What is Smart Art?

Answer Smart Art allows you to visually communicate information rather than simply using text.

FAQ 9: From which tab you can apply page number on the document?

Answer Through Insert tab>Header & Footer group, page number option is available.

FAQ 10: Can you automatically add table of Contents in the Word File?

Answer Yes, you can add table of contents in the document from reference tab.

## Test Yourself!

Please mark the correct one from the given options. You can check your answer with the Answer Key at the end of this module.

1. **Landscape is \_\_\_\_\_?**
  - a. A font style
  - b. Page Layout
  - c. Paper Size
  - d. Page Orientation
  
2. **To use Mail Merge, you will need a \_\_\_\_\_.**
  - a. Heading Style
  - b. Stamp Field
  - c. Recipient List
  - d. Navigation Pane
  
3. **To add text to the top of every page, you should use a \_\_\_\_\_.**
  - a. Right Margin
  - b. Footer
  - c. Header
  - d. Left Margin
  
4. **In Word 2010, WordArt is always inside a \_\_\_\_\_.**
  - a. Text Box
  - b. List box
  - c. Column
  - d. Table
  
5. **Shortcut Key to copy the selected text is \_\_\_\_\_.**
  - a. CTRL+S
  - b. CTRL+C
  - c. CTRL+V
  - d. CTRL+Z
  
6. **The Columns command is located on the \_\_\_\_\_ tab.**
  - a. Insert
  - b. Page Layout
  - c. Home
  - d. Review
  
7. **You can change the font size with the \_\_\_\_\_.**
  - a. Font Size Box
  - b. Shrink Font Command
  - c. Grow Font Command
  - d. All of the Above

**8. To save an edited document while keeping the original version, use \_\_\_\_\_.**

- |   |        |   |         |
|---|--------|---|---------|
| a | Save   | b | Save AS |
| c | ALT+F4 | d | Close   |

**9. To use more than one type of Margin and number of columns within a document, you should use \_\_\_\_\_.**

- |   |               |   |            |
|---|---------------|---|------------|
| a | Section Break | b | Page Break |
| c | Even Break    | d | Odd Break  |

**10. The \_\_\_\_\_ wavy line indicates a contextual spelling error.**

- |   |      |   |        |
|---|------|---|--------|
| a | Blue | b | Green  |
| c | Red  | d | Yellow |

## Answer Key

MCQ Number	Correct Answer
1	d
2	c
3	c
4	a
5	b
6	b
7	d
8	b
9	a
10	a

# Module 3: Preparing Spreadsheet

## Learning Outcomes

After completion of this learning module, you will be able to:

- Create workbook
- Insert Sheet
- Apply Basic formulas/ Functions
- Create Chart / Graphs
- Filter Data
- Format Cells
- Edit Worksheet
- Insert Page break
- Split Cells
- Merge Cells





# Learning Unit 1: Create Workbook

## Overview

This learning unit covers the procedure for creating workbook and spreadsheet, the basic concept of Spreadsheets, types of spreadsheets in Excel and procedure for creating workbook in Excel. After completion of this learning unit You will be able to explain the types and uses of worksheets and the procedure of creating a worksheet.

### Remember

Each Workbook is a collection of Worksheets, Each worksheet is a collection of rows and columns.

## 1. Using Electronic Spreadsheet Program

A **spreadsheet** is a very interactive computer application for organization, analysis, manipulation and storage of data in tables. It is **an electronic document in which data is arranged in the rows and columns of a grid and can be manipulated and used in calculations**. What makes a spreadsheet software program unique is its ability to calculate values using mathematical formulas in cells.

## 2. Types and Uses of Excel Sheets

Most spreadsheet editing is now performed using computer software, such as Microsoft Excel or Apple Numbers. There are certain types of spreadsheets commonly used to provide versatility in work.

### 1. Two-Dimensional Spreadsheets

Two-dimension spreadsheets consist of "cells"-a box holding one piece of data-arranged in rows and columns like a table.

### 2. Three-Dimensional Spreadsheets

Modern spreadsheet applications allows for more than one two-dimensional sheets effectively stacking related spreadsheets on top of each other and introducing a third dimension.

### 3. Arithmetic Spreadsheets

Spreadsheets often utilize arithmetic functions, such as automatically adding up all the values of one particular column. These functions are necessary for budget and invoice spreadsheets.

### 4. Logical Spreadsheets

Some spreadsheets utilize logic functions, rather than arithmetic functions, to allow for deductive or inductive reasoning.

## 5. Object-Oriented Spreadsheets

### 3. Creating a Workbook

Instead of using two-dimensional cells, some spreadsheets are organized by objects, which are variables with a number of attributes attached. This allows the data to be viewed, analyzed and mapped in a number of different ways.

#### Uses of Spreadsheets

Here are some of the most commonly uses of spreadsheets.

1. Spreadsheets are used for **simple lists** and **complex numerical calculations**.
2. Spreadsheets change the information into detailed **graphs** to show a **visual representation of the data**.
3. Spreadsheets provide many **sorting** options to **filter information**.
4. Spreadsheet software is very **versatile** and can be used for both very simple and very complex tasks. Adding or deleting items from a list, so the lists can be used many times.
5. The **management of more complex data**, such as **earnings, expenses, budgets** and other **accounting**, is also made easier.
6. Spreadsheet Software includes **features** that can calculate **complicated math**, including everything from basic **addition** and **subtraction** to **percentages**, taxes and multi-step problems. This makes spreadsheets essential for **businesses**, self-employed people and anyone who needs to keep an account of expenses and income.
7. Spreadsheet software also includes **graphs** and **charts** from the data provided within the table. This is good for **presentations**, such as **business meetings** and **research projects**, and offers a fresh view of the data. These graphs and charts are customizable and can be specific or general depending on the settings and options chosen.
8. The information generated in a spreadsheet can easily be incorporated into **electronic presentations, web pages**, or printed off in **report** form.

## Creating a new workbook

To create a new workbook, there are three different ways

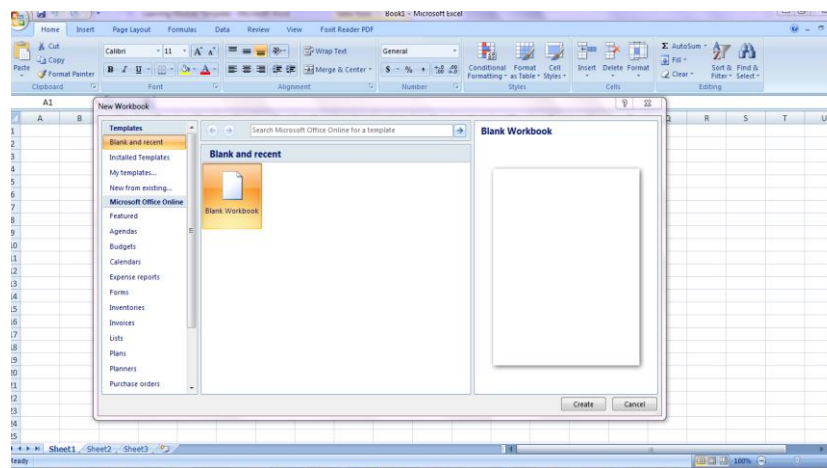
1. It can open through a blank workbook.
2. It can also base a new workbook on an existing workbook.
3. Or it can create by using any other template.

### Do you know!

Keyboard shortcut, to quickly create a new, blank workbook, press CTRL+N.

### 1. Opening a new, Blank Workbook

- Open MS Excel Software by double clicking on its icon.
- Click the **File** tab.
- Click **New**.
- Under **Available Templates**, double-click **Blank Workbook**.



### Creating New workbook

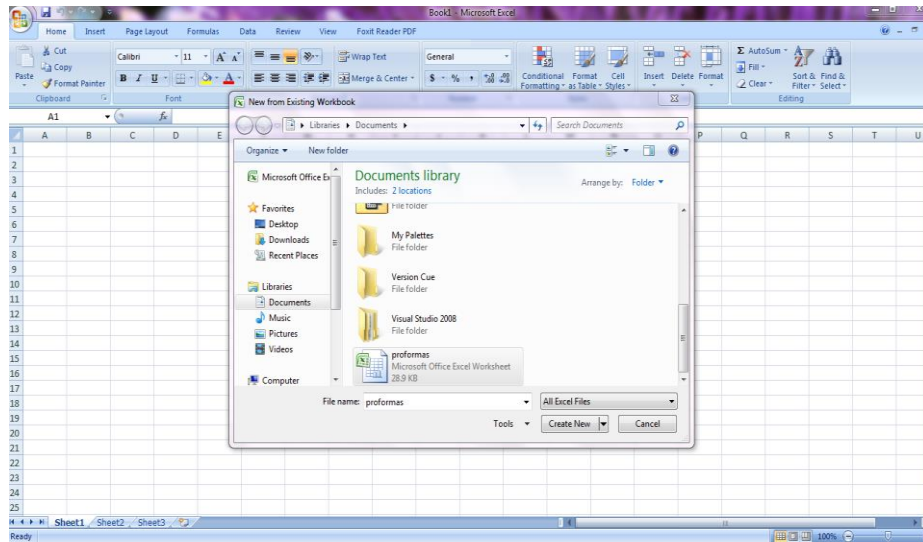
It can also add and remove worksheets as needed.

### 2. Creating a New Workbook on an Existing Workbook

1. Click the **File** tab.
2. Click **New**.
3. Under **Templates**, click **New from existing**.
4. In the **New from Existing Workbook** dialog box, browse to the drive, folder, or Internet location that contains the workbook that wanted to open.
5. Click the workbook, and then click **Create New**.

**Remember**

Every workbook in Ms Excel contains 3 worksheets by default.



**Creating Workbook with existing one**

**3. Creating a new Workbook on a Template**

1. Click the **File** tab.
2. Click **New**.

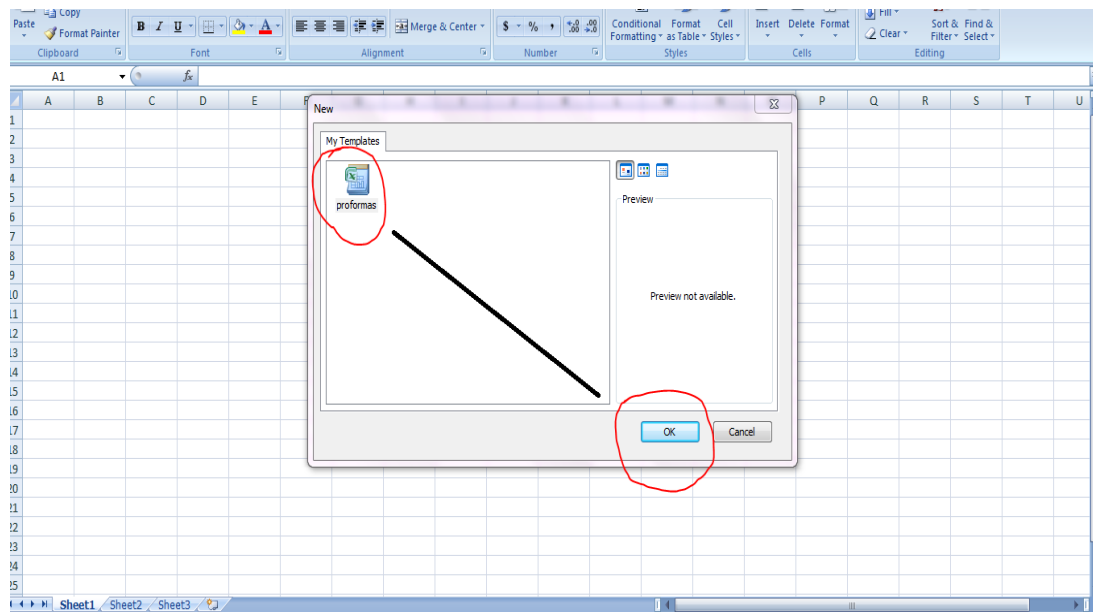
**Do one of the following:**

**1. To use one of the Sample Templates**

- Provided with Excel, under **Available Templates**, click **Sample Templates** and then double-click the template that is needed.
- **To use a recently used template,**
- Click **Recent Templates**, and then double-click the template that wanted to open.

**2. To use your own Template**

- On the **My Templates**, and then on the **Personal Templates** tab in the **New** dialog box, double-click the template that you want.



**Creating with own Template**

# Learning Unit 2: Insert Sheet

## Overview

### Remember

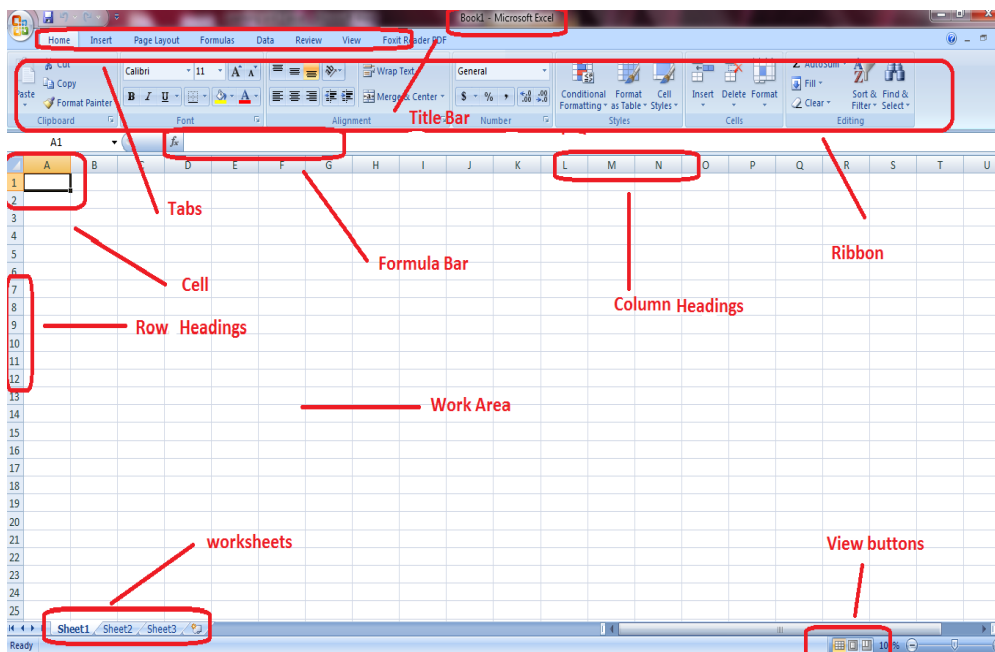
Every workbook in Ms Excel contains 3 worksheets by default.

A worksheet or sheet is a single page in a workbook created with an electronic spreadsheet program such as Excel. A worksheet is used to store, manipulate, and display data. Each worksheet is composed of a very large number of cells which are the basic place for data in a file or workbook. This learning unit covers the procedure for describing different parts of a worksheet area and how to insert a new worksheet in Excel. After completion of this Learning Unit you will be able to describe different parts of spreadsheet work area, and to demonstrate the procedure of inserting new worksheet in Excel.

## 1. Main parts of Spreadsheet Work Area

### The Excel Window

Many items on the Excel screen are standards in most of the Microsoft software programs like Word, PowerPoint, and previous versions of Excel, while some elements are specific to Excel.

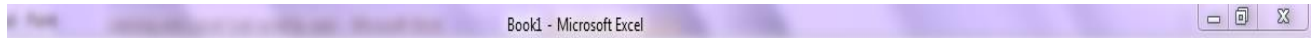


**Main Parts of Excel Sheet**

### 1. Workbook

It is also called a spreadsheet, the workbook is a unique file created by Excel.

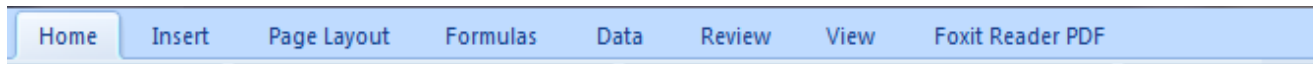
## 2. Title Bar



### Title Bar

The title bar displays both the application name and the spreadsheet file name.

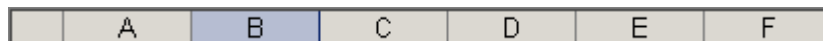
## 3. Menu Bar



### Menu Bar, Tabs

The menu bar displays all of the menus available for use in Excel. The contents of any menu can be displayed by left-clicking the menu name.

## 4. Column Headings



### Column Headings

Each Excel spreadsheet contains 256 columns. Each column is named by a letter or combination of letters.

## 5. Row Headings



### Row Headings



By default number of rows in office 2010, It Consists 65,536 rows in Each spreadsheet.

### 6. Name Box



**Name Box**

It will show the address of the current selection or active cell.

### 7. Formula Bar



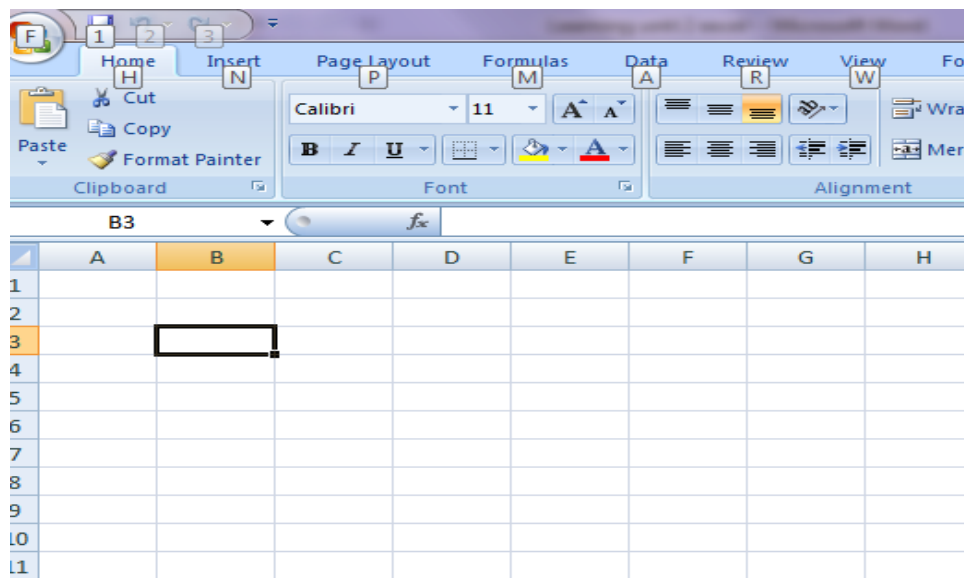
**Formula Bar**

The formula bar displays information entered in the current or active cell. The contents of a cell can also be edited in the formula bar.

### 8. Cell

#### Do you know!

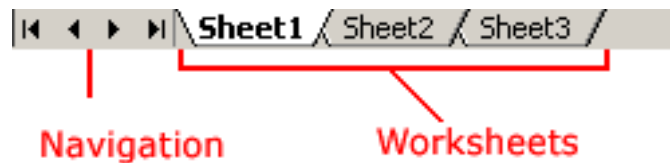
Press **Shift+F11** Keys and you will see a new blank sheet similar to above sheet is opened.



**Cell in Excel sheet**

A cell is an intersection of a row and column. Each cell has a unique cell address. Like, In the picture above, the cell address of the selected cell is B3. The heavy border around the selected cell is called the cell pointer.

## 9. Navigation Buttons and Sheet Tabs



### Navigation Buttons and Work Sheets

Navigation buttons allows moving to another worksheet in an Excel workbook. They are used to display the first, previous, next, and last worksheets in the workbook.

## 10. Workbooks and Worksheets

A **workbook** automatically shows in the workspace when Microsoft Excel opened. Each workbook contains three **worksheets**. A worksheet is a grid of cells consisting of 65,536 rows and 256 columns.

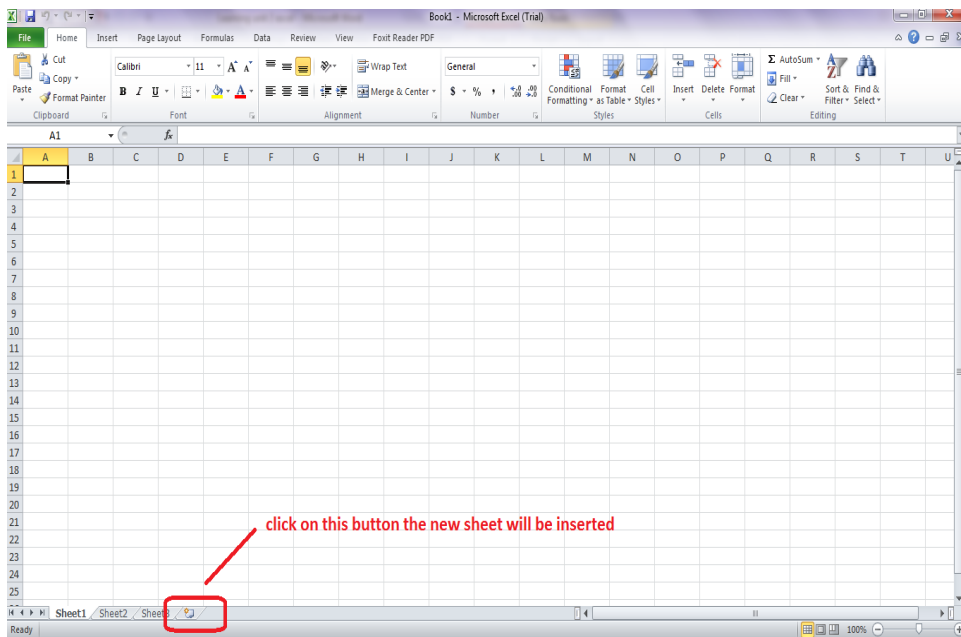
## 2. Basics of Creating a Spreadsheet

### Creating New Worksheet

When Microsoft Excel starts, three new blank sheets always open. But if the user wanted to start another new worksheet while working on another worksheet, or closed already opened worksheet and want to start a new worksheet. Here are the steps to create a new worksheet:

#### 1. Creating New Worksheet in After Previous:

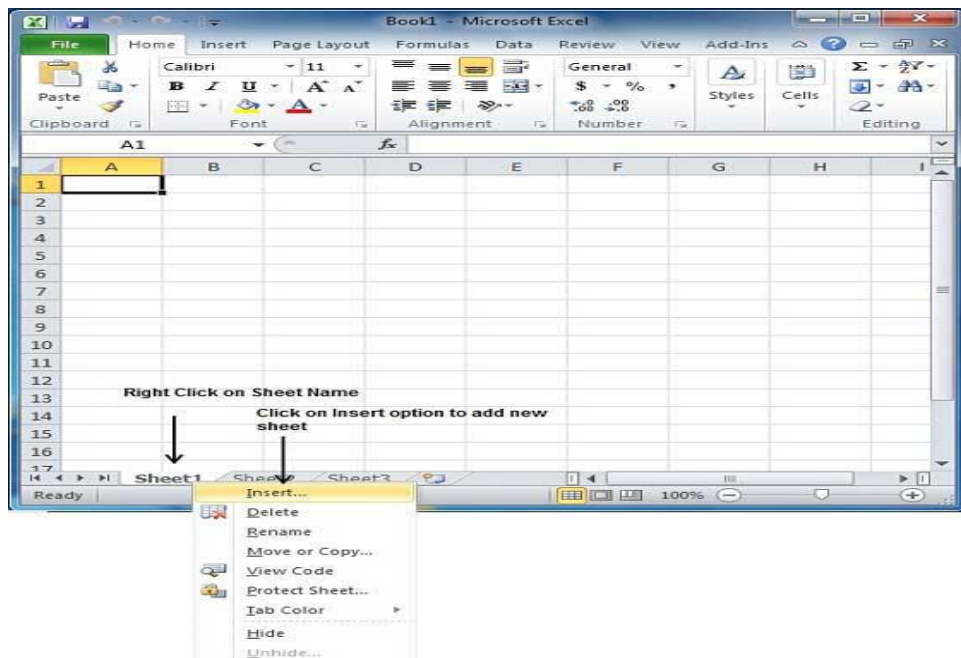
1. Click on the button mentioned below in figure. The new sheet will be inserted. In this method a new sheet will be inserted after the previous sheet.



### Inserting New Worksheet in a Sequence

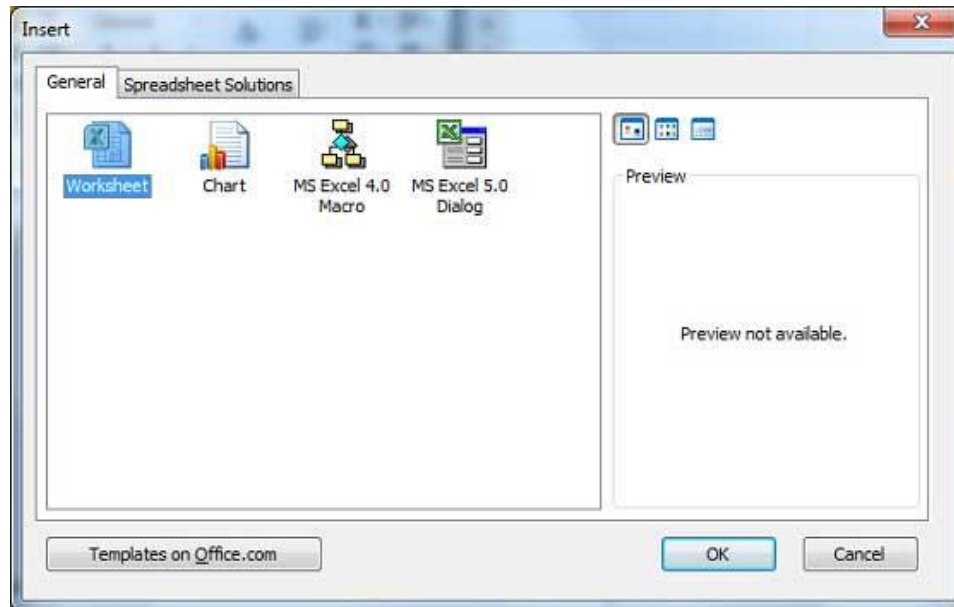
## 2. Creating new Spreadsheet on a Specific Place:

1. Right Click the **Sheet Name** and select **Insert** option.



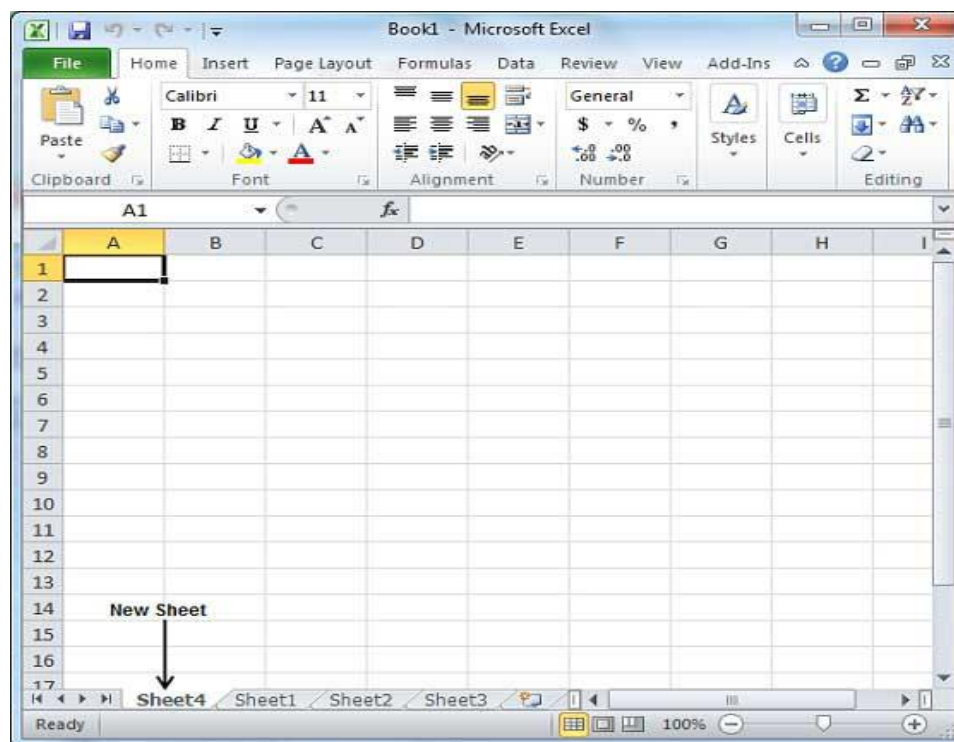
### Creating Worksheet at a Specific Place

2. Now the Insert dialog will appeared with select **Worksheet** option as selected from the general tab. Click **Ok** button



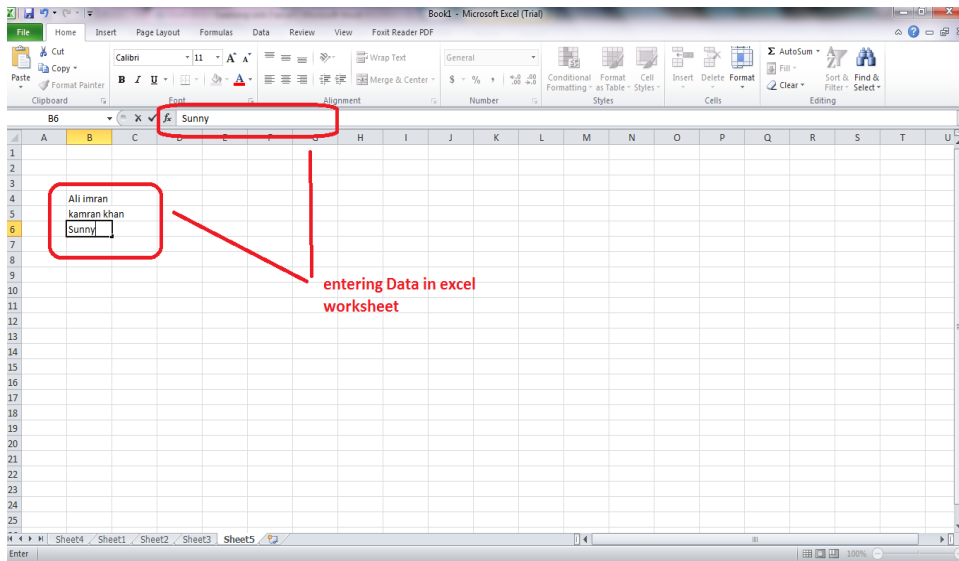
### Select New Worksheet

The new worksheet will be created.



### Newly Created Sheet

### 3. Entering Data in MS Excel Worksheet



#### Entering Data in Cell

It is very easy to enter data in a worksheet.

- Click on the cell where the data will be inserted.
- Type the data in cell or it can also be typed in formula bar.
- The data will be inserted in the desired cell.

# Learning Unit 3: Apply Basic Formulas and Functions

## Overview

There are a lot of formulas and functions used in Excel for calculations it is necessary to understand the basic difference of these to concepts. A formula is a statement written and calculated by a user and A function is a built-in code designed to calculate specific values. MS Excel is used for creating both formulas and functions. This learning unit covers basic concept of creating Formulas and functions and how to use these Formulas and Functions in Excel. After completion of this learning unit you will be able to demonstrate the procedure to apply different types of formulas and functions in an Excel sheet.

### Remember

It is important to understand how to **create simple formulas** and **use of cell references**, to maximize the capabilities of Excel.

## 1. Basics of Creating Formulas

In Excel, each cell can contain one formula. When formula is entered in a cell, Excel calculates the result of that formula and displays the result of that calculation. When entering a formula, make sure Excel knows that what is want to do. Start a formula by typing the = (equals) sign, then the rest of the formula. If the equal sign doesn't type the first, then Excel will assume that the user is typing either a number or a text. A formula can start either with a plus (+) or minus (-) symbol.

### Formula

A formula is a statement written and calculated by a user. Formulas can be as simple or as complex as the user wants. A formula may contain values, references to cells, defined names, and functions.

All formulas must start with the equal sign. Like “=B4\*C4”

### Function

A function is a code designed to calculate specific values and is used inside formulas.

Functions are typed along with parentheses at both sides, where in the arguments (if any) are listed in between. There are different types of functions are available in excel like Sum, IF, Average, Max, Min.

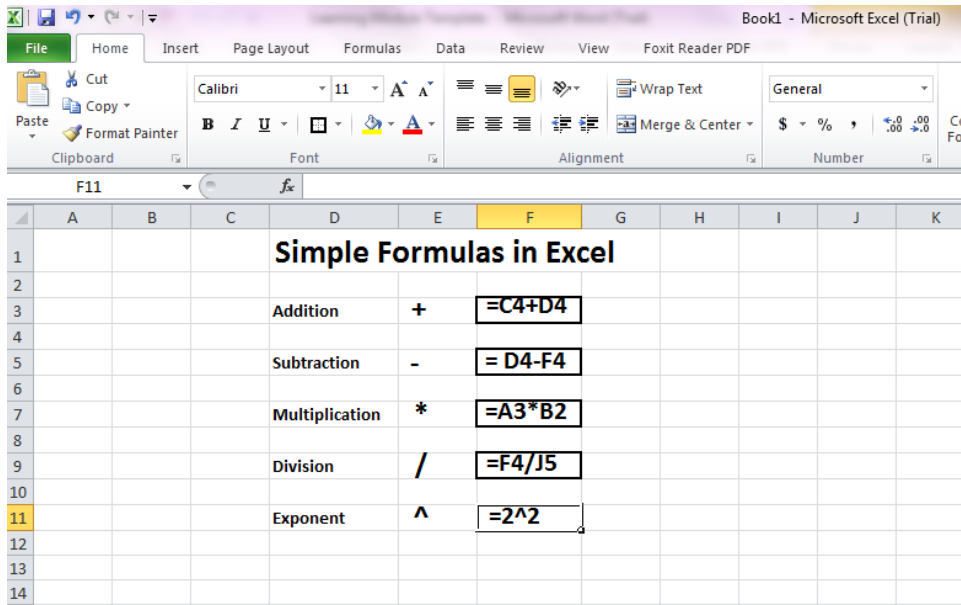
“=SUM( F4:G4) “

### Creating Formulas

There are different methods used for creating or inserting formulas in Excel. It can insert through predefined formulas, using cell references or it can create through using point and click method.

Excel uses different standard operators for equations, such as

- a **plus sign** for addition ( + )
- **minus sign** for subtraction ( - )
- **asterisk** for multiplication ( \* )
- **forward slash** for division ( / )
- **caret** for exponents ( ^ )



### Using Basic Formulas

**To Create a Simple Formula in Excel:**

1. Select the cell where the answer will appear.
2. Type the **equal sign (=)**.
3. Type in the formula that is wanted to be calculates.

	A	B	C	D	E
1	<b>Total cost per Item</b>				
2	<b>Total No. of LCD's</b>	<b>750</b>			
3	<b>price per item</b>	<b>3000</b>			
4	<b>total Cost /LCD</b>	<b>=3000/750</b>			
5					
6					
7					
8					
9					
10					
11					

### Creating Simple Formula

- Press **Enter**. The formula will be calculated, and the value will be displayed in the cell.

	A	B	C	D
1	<b>Total cost per Item</b>			
2	<b>Total No. of LCD's</b>	<b>750</b>		
3	<b>price per item</b>	<b>3000</b>		
4	<b>total Cost /LCD</b>	<b>4</b>		
5				
6				
7				
8				

#### Do you know!

If the result of a formula is too large to be displayed in a cell, it may appear as **hash or number signs (#####)** instead of a value.

### Creating Simple Formula

Sometimes ##### sign appears when a formula is calculated. This means the column is not wide enough to display the cell content. Just Increase **the column width** to show the cell content.

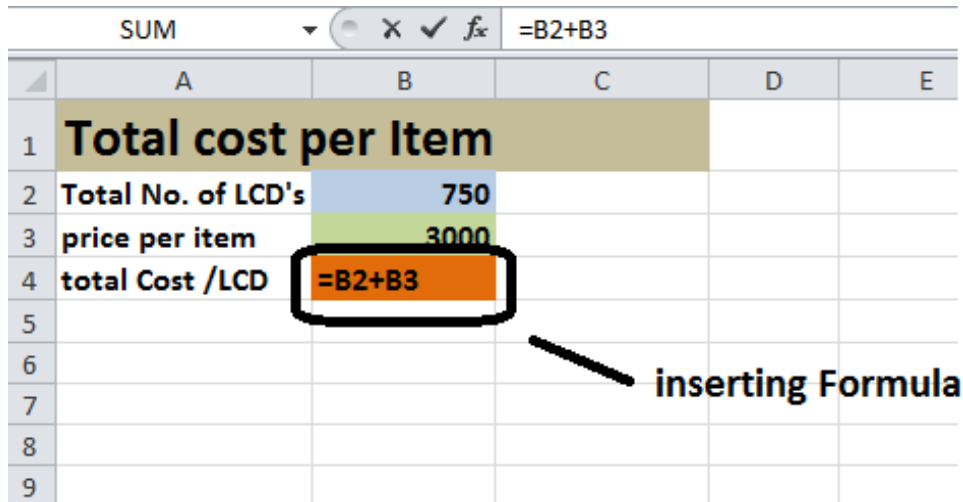
- **Creating formulas with cell references**

The cell where the formula being applied contains a cell address, it is called a **cell reference**. Creating a formula with cell references is useful because it can update data in worksheet without having to rewrite the values in the formula.



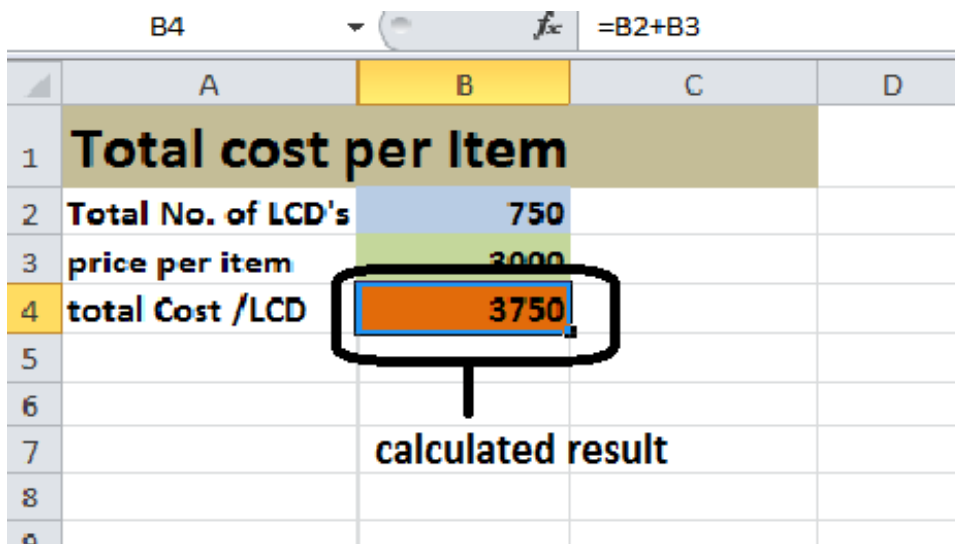
**To create a formula using cell references:**

1. Select the cell where the answer will appear.
2. Type the **equals sign (=)**.
3. Type the cell address that contains the first number in the equation.
4. Type the desired operator in formula. For example, Addition **+** sign.
5. Type the cell address that contains the second number.



**Inserting Formula Using Cell Reference**

6. Press **Enter**. The formula will be calculated, and the value will be displayed in the cell.



**Using Cell Reference**

- **Creating a formula using point-and-clicking:**

In this method the formula will be added through point and click. In this method after inserting equal sign cell reference will be included in formula by clicking on the desired cell.

1. Select the cell where the answer will appear.
2. Type the **equals sign (=)**.
3. Click the **first cell** to be included in the formula which is wanted to be included.
4. Type the operator according to formula. For example, type the **multiplication sign (\*)**.
5. Click the **next cell** in the formula.

SUM		fx		=B3*C3		
	A	B	C	D	E	F
1	Rate list for Amina's Clothing per dress stitching					
2	Item	Hours	Rate			
3	Long shirt	3	500			
4	total	=B3*C3				
5						
6						
7						
8						
9						
10						

### Using Point and Click

6. Press **Enter**. The formula will be calculated, and the value will be displayed in the cell.

C4		fx		=B3*C3		
	A	B	C	D	E	F
1	Rate list for Amina's Clothing per dress stitching					
2	Item	Hours	Rate			
3	Long shirt	3	500			
4		Total	1500			
5						
6						
7						
8						
9						
10						
11						

### Using Point and Click method

- **Editing a Formula:**

1. Click on the cell that is wanted to be edit.

2. Insert the cursor in the **formula bar**, and edit the formula as desired. Or it can also edit by **double-clicking the cell to view and edit the formula directly** from the cell.
3. Press **Enter**.
4. The new value will be displayed in the cell.

	A	B	C	D	E	F
1		Rate list for Amina's Clothing per dress stitching				
2	Item	Hours	Rate			
3	Long shirt	3	500			
4		Total	=B3*C3			
5						
6						
7						
8						
9						
10						
11						

### Using Formula Bar

## 2. Using Functions in Excel

### Basic functions

A **function** is a **predefined built-in formula** that performs calculations in a particular order using specific values. One of the major benefits of functions is that they can save time because we do not have to write the formula. Excel has hundreds of functions.

A Function has different parts. To use these functions correctly, It is necessary to understand the different **parts of a function** and how to create **arguments** in functions to calculate values and cell references.

#### The parts of a function:

Each function in Excel has a specific order called **syntax** It is necessary to understand the order of the function to work correctly. The basic syntax to create a formula with a function is :

- insert an **equals sign (=)**
- **function name** (SUM, for example, is the function name for addition),
- **Argument**. Contains the information about formula to calculate, such as a range of cell references.

A	B	C	D	E
Rate list for Amina's Clothing per dress stitching				
Item	Hours	Rate		
Long shirt	3	500		
	Total	=SUM(B3:C3)		

Diagram illustrating the parts of the formula `=SUM(B3:C3)`:

- Equal sign**: Points to the `=` symbol.
- Function**: Points to the `SUM` function name.
- Arguments**: Points to the range `B3:C3` enclosed in parentheses.

## A Function's Parts

### Working with arguments:

Arguments must be enclosed in **parentheses**. Individual values or cell references inside the parentheses are separated by **commas**.

- **Colons** create a reference to a range of cells.

For Example

- **AVERAGE ( H4:K4)**

### Using Simple Functions:

#### Creating a basic function in Excel:

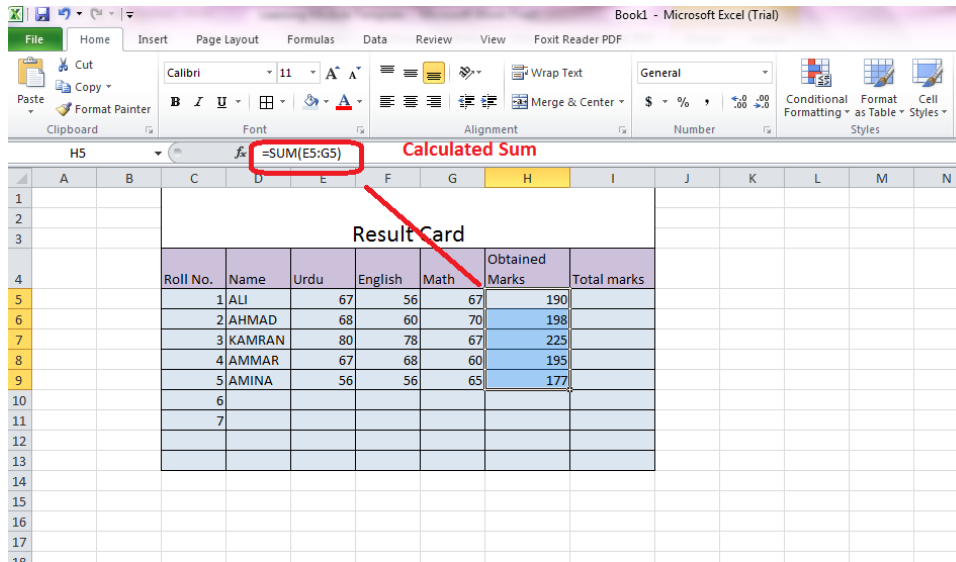
1. Select the cell where the answer will appear.
2. Type the **equals sign (=)**, then enter the **function name (SUM, for example)**.

The screenshot shows the Excel interface with the formula bar containing `=SUM`. A tooltip for the `SUM` function is visible, stating: "Adds all the numbers in a range of cells".

Result Card						
Roll No.	Name	Urdu	English	Math	Obtained Marks	Total marks
1	ALI	67	56	67	=SUM	
2	AHMAD	68	60	70		
3	KAMRAN	80	78	67		
4	AMMAR					
5	AMINA					
6						
7						

## Creating Basic Function

3. Enter the **argument** inside the parentheses.



## Using SUM Function

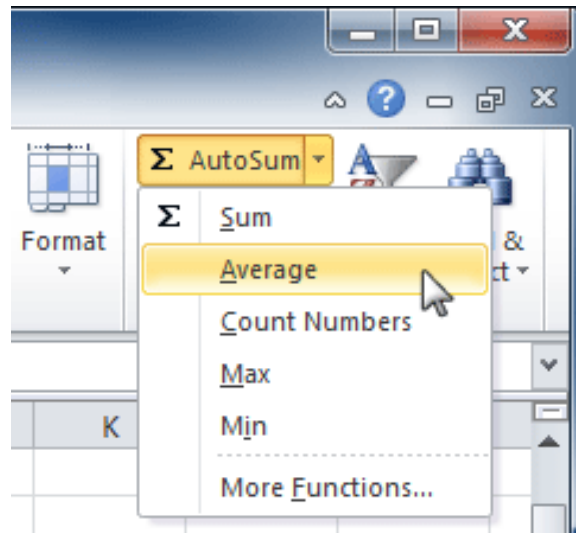
4. Press **Enter**, and the result will appear.

## Using AutoSum to Select Common Functions:

The **AutoSum** command allows to automatically returning the results for a range of cells for common functions like SUM and AVERAGE.

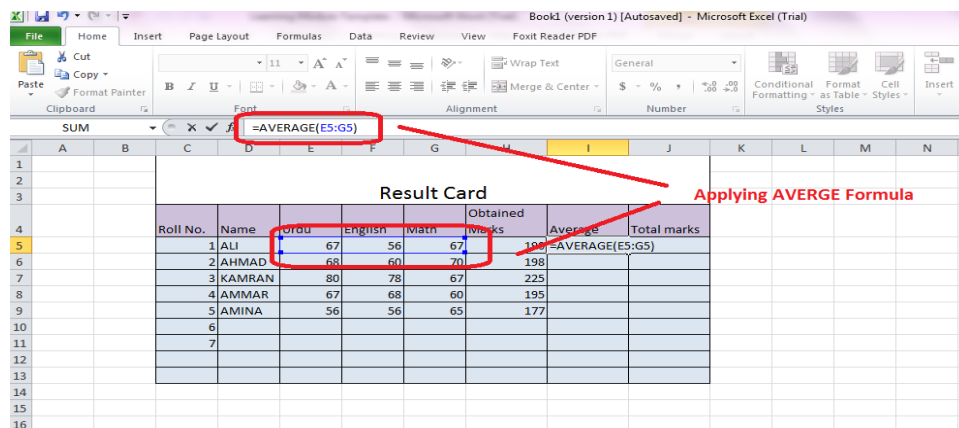
## Using AVERAGE Function:

1. Select the cell where the answer will appear.
2. Click the **Home** tab.
3. In the **Editing** group,
4. Click the **AutoSum** drop-down arrow and select the function you want (**Average**, for example).



### Using Auto Sum Function

5. A formula will appear in the selected cell. If logically placed, AutoSum will select your cells.




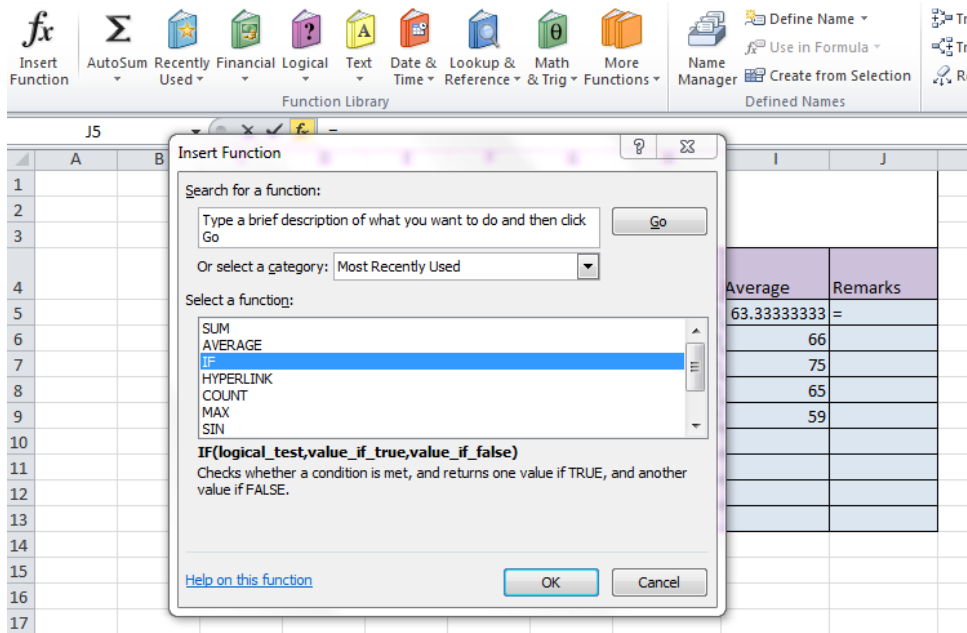
### Using AVERAGE Function

6. Press **Enter**, and the result will appear.

### Using Complex Functions:

#### Using IF Function:

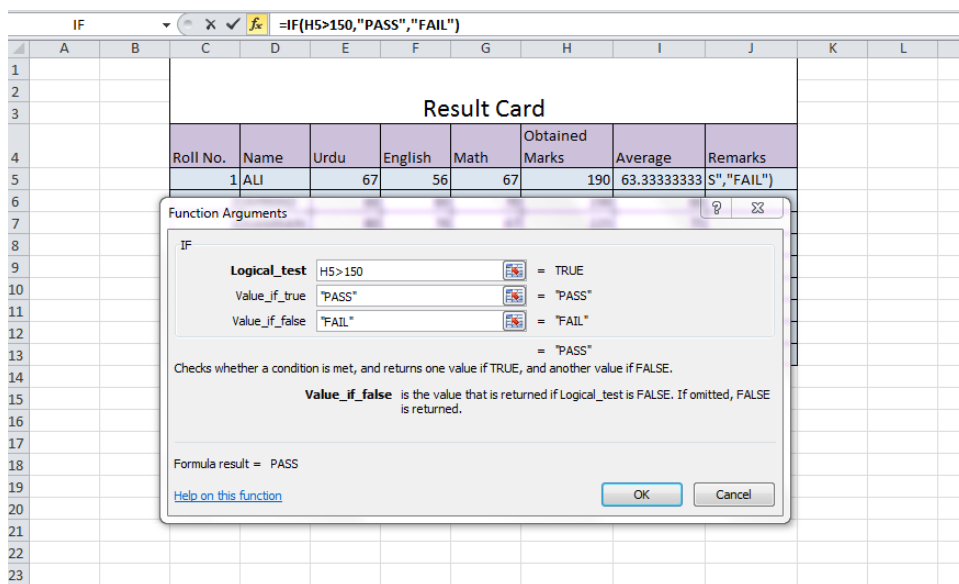
- Select the cell where the function will be applied.
- Click on  button or go on **Formulas tab**, then **Insert Function**.
- Select the **IF functions** from the list.



### Using IF Function

- Click **OK** button.

After Clicking OK a window will appear.



### Using IF Function

- Give the **logical test**, then **True** or **False** conditions in the given boxes.
- Click **OK** the function will be applied.

# Learning Unit 4: Create Chart / Graphs

## Overview

This learning unit covers the procedure for creating different types of charts. After completion of this learning unit You will be able to describe different types of Charts/ Graphs and to describe the procedure of creating and modifying these charts and their elements and also using of sparklines in Excel.

## 1. Charts/Graphs and their Use in Excel

A **chart** is a tool that is used in Excel to present **data graphically**. A chart, also called a graph, is a graphical representation of data, in which the data is represented by symbols, such as bars in a bar chart, lines in a line chart, or slices in a pie chart. A chart can represent numeric data, functions or some kinds of qualitative structure and provides different information. There are many types of chart / Graphs used in Excel.

### Do you know!

Charts are (called graphs in math class) visual representations of worksheet data.

A chart is a visual representation of data. By using elements such as columns, or lines, a chart displays series of numeric data in a graphical format.

### Excel Chart Types

MS Excel has different types of charts as shown in the picture below.

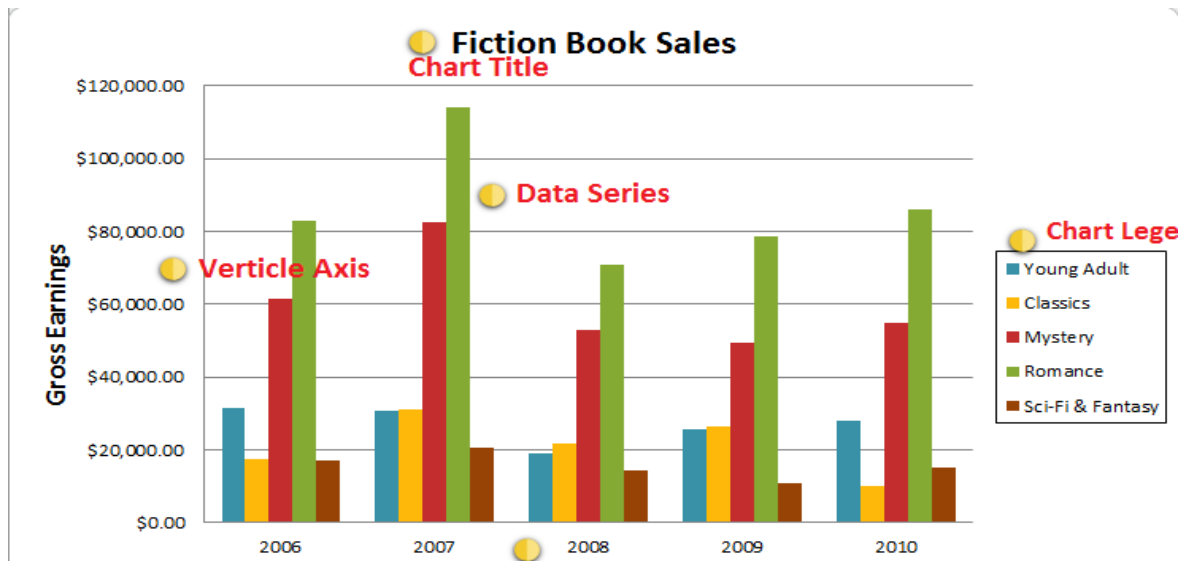


### Chart Types

#### Identifying the Elements of a chart

A chart consists of different parts. These are:





Elements of a Chart

### 1. Chart Title

A chart Title describes what the chart is illustrating.

### 2. Vertical Axis

The **vertical axis** is also known as the **y axis**. It is the **vertical** part of the chart. IN the above picture, a **column** chart, the vertical axis measures the **height** or **value** of the columns, so it is also called the **value axis**. However, in a **bar** chart, the **horizontal axis** would be the value axis.

### 3. Horizontal Axis

The **horizontal axis** is also known as the **x axis**. It is the **horizontal** part of the chart. In the above picture, the horizontal axis identifies the **categories** in the chart, so it is also called the **category axis**. However, in a **bar** chart, the **vertical axis** would be the category axis.

### 4. Data Series

The **data series** consists of **related data points** in a chart. If there are multiple data series in the chart, each will have a different color or style. **Pie** charts can only have one data series. In the above picture, the green columns represent the **Romance** data series.

### 5. Legend

The **legend** identifies which **data series** represents through which color. For many charts it is **necessary**, but for some charts it may not be necessary and can be deleted. In the above picture, the legend allows viewers to identify the different **book genres** in the chart.

## 2. Creating a Chart in Excel

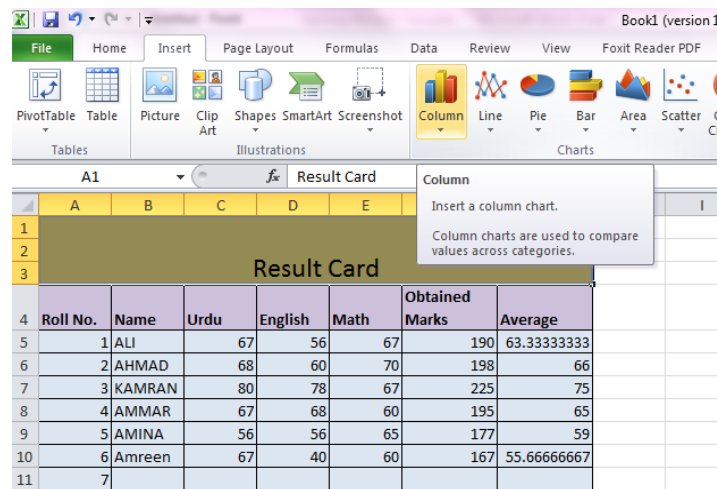
### Creating a Chart

1. Select the **cells** that are wanted to chart, including the **column titles** and **row labels**. These cells will be the **source data** for the chart.

Result Card							
Roll No.	Name	Urdu	English	Math	Obtained Marks	Average	
1	ALI	67	56	67	190	63.33333333	
2	AHMAD	68	60	70	198	66	
3	KAMRAN	80	78	67	225	75	
4	AMMAR	67	68	60	195	65	
5	AMINA	56	56	65	177	59	
6	Amreen	67	40	60	167	55.66666667	
7							

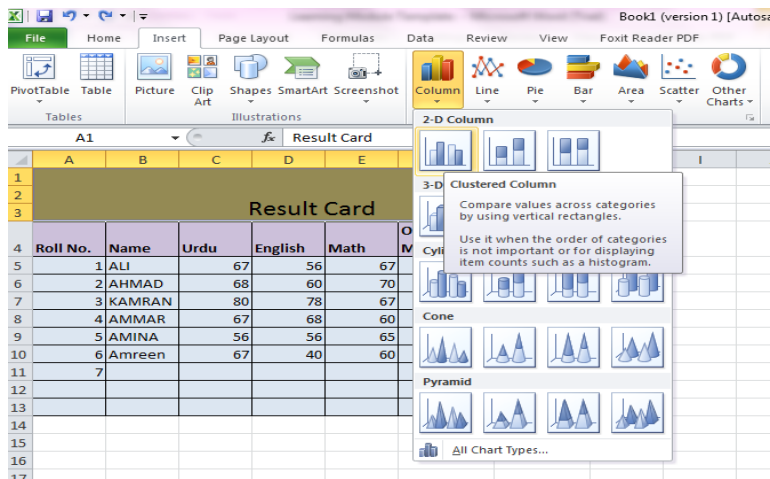
### Creating Chart

2. Click the **Insert** tab.
3. In the **Charts** group, select the desired **chart**.



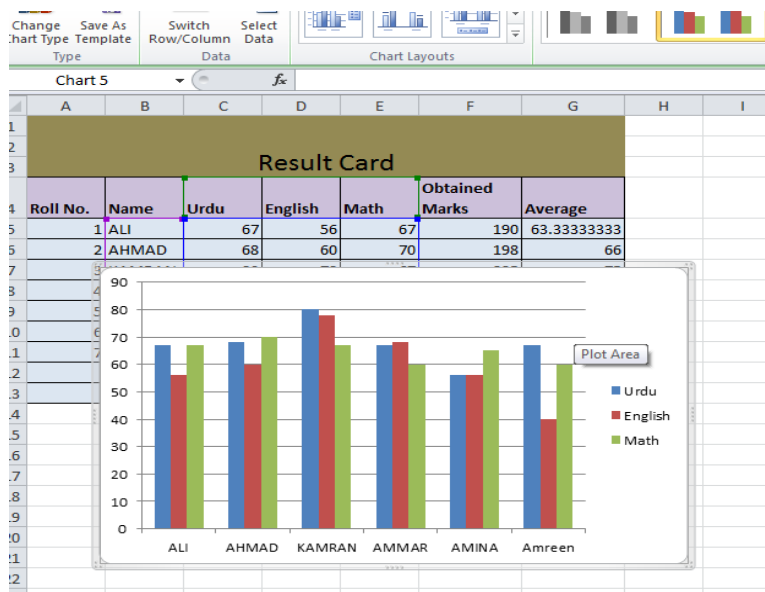
### Selecting Chart

4. Select the desired **chart type** from the drop-down menu (**Clustered Column**, for example).



### Selecting a Chart type

5. The chart will appear in the worksheet.



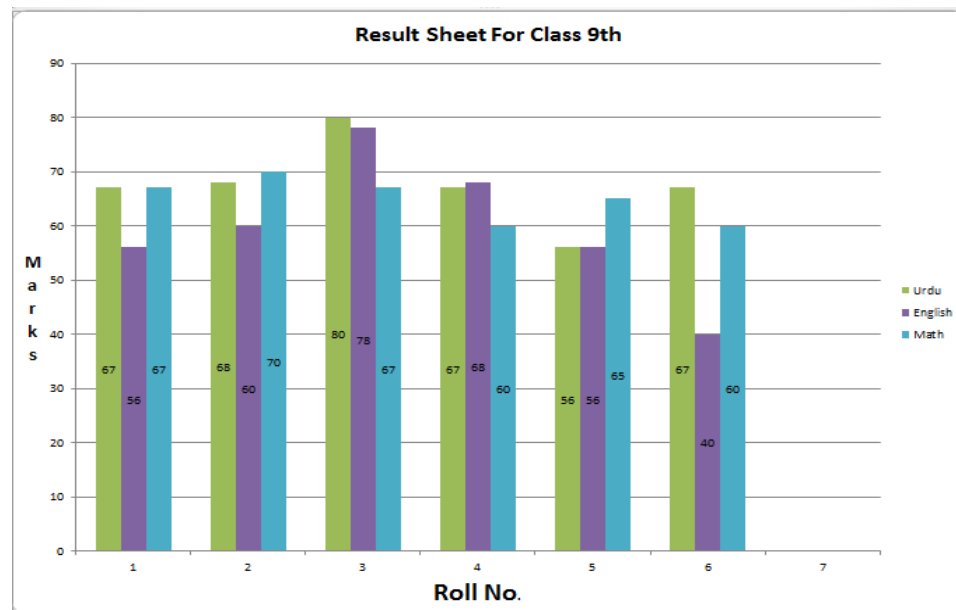
### Inserting Chart

#### Using Different Charts in Excel

The steps for creating a basic **column chart** in Excel are:

- Select the data which wanted to be in the chart. Insert row and column headings but not the title for the data table.
- Click on the **Insert tab** of the **Ribbon**.
- In the **Charts** box of the ribbon, click on the **Insert Column Chart** icon to open the drop down list of available chart types.
- Hover mouse pointer over a chart type to read a description of the chart.
- Click on the desired chart.

A plain, unformatted chart that displays only the columns, representing the selected series, a default chart title, a legend, and axes values, will be added to the current worksheet.



Column Chart

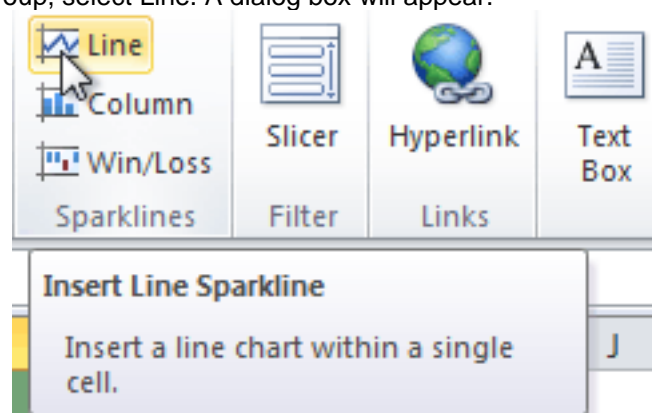
### Working with Sparklines in Excel

Sparkline is a New feature in Microsoft Excel 2010. A sparkline is a small type of chart in a worksheet cell that provides a visual representation of data. Sparklines are used to show trends in a series of values, such as seasonal increases or decreases, economic cycles, or to highlight maximum and minimum values. It is necessary to position a sparkline near to its data for best impact.

### Creating Sparklines

Generally, there is one sparkline for each row, but it can create as many as needed in any location. Just like with formulas, it is usually very easy to create a single sparkline and then use the fill handle to automatically create sparklines for the remaining rows.

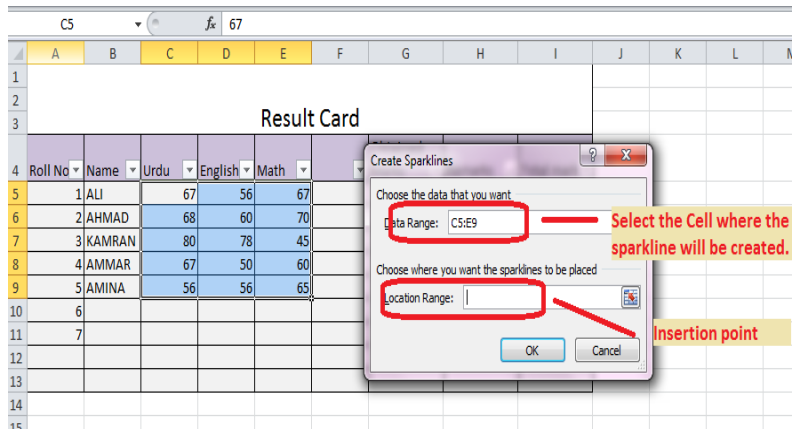
1. Select the cells where sparklines will be applied.
2. Click the **Insert** tab.
3. In the Sparklines group, select Line. A dialog box will appear.



Inserting Sparklines

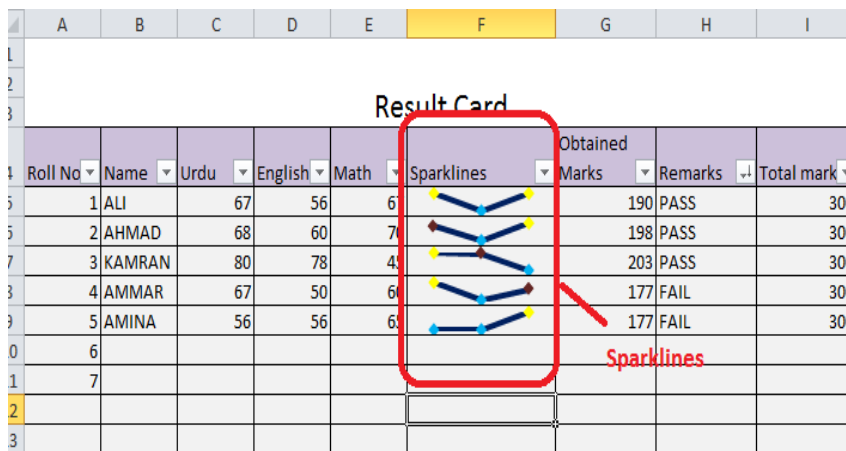
4. Make sure the insertion point is next to Location Range.

5. Click the on the desired cell.



### Insertion Point of Sparklines

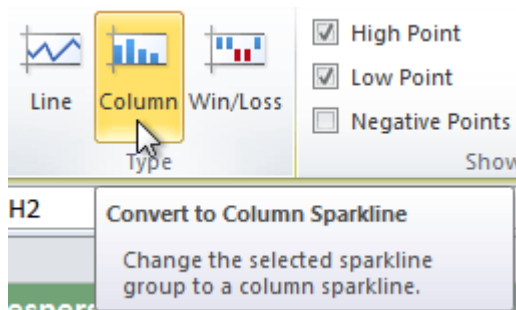
6. Click OK. The sparkline will appear.



### Inserting Sparkline

#### Changing the Sparkline Type

1. Select the **Sparkline** that is wanted to change.
2. Locate the **Type** group in the **Design** tab.
3. Select the desired **type**.



## Changing Sparkline Style

- The Sparkline will update to reflect the new type.



## Column Type Sparkline

### 3. Modifying Chart Elements

When a Chart is inserted the **Chart Tools**, **Format tab** in Excel 2010 contains command buttons that make it easy to format any selected chart element. Excel gives a choice of methods for selecting individual chart elements.

#### Selecting Individual Chart Elements:

- Click the element directly in the chart to select it.
- Use the ScreenTip that appears at the mouse pointer to identify the chart object.
- Click the name of the chart element.
- On the **Chart Elements drop-down** list in the Current Selection group on the Format tab.
- After selection of an element, it can cycle through and select the other chart elements by pressing any of the arrow keys.

English	Math	Obtained Marks	Remarks	Total mark
65	70	135		135
70	75	145		145
75	80	155		155
80	85	165		165
85	90	175		175

**Result Card of 9th Class**

Y-axis: Marks (0 to 90)  
X-axis: Roll No. (1 to 9)  
Legend: Urdu (Green), English (Blue), Math (Red)

## Modifying Elements of a Chart

When an element is selected in the chart itself a selection handle appear around it and its name appears in the Chart Elements box on the Format tab.

## 1. Changing in any Chart Element Using Chart Tool Format Tab

After select a chart element, can be made any of the following changes to it:

- Format the element by selecting the appropriate command button.
- In the Shape Styles group or by clicking the **Format Selection button** to open **the Format dialog box** and use its options to make the desired changes.

## 2. Moving Chart Element

It is easy to move any element of a chart by select and drag the element.

- Move the element within the chart by positioning the arrow head pointer over the element and then dragging it around. With some elements, such as the legend, selection handles are used to resize or re orient the object.

## 3. Removing any Chart Element

It is very easy to Remove the element from the chart by pressing the Delete key.

- Select any element in the chart which is wanted to be removed.
- Press the **delete** key from the key board.

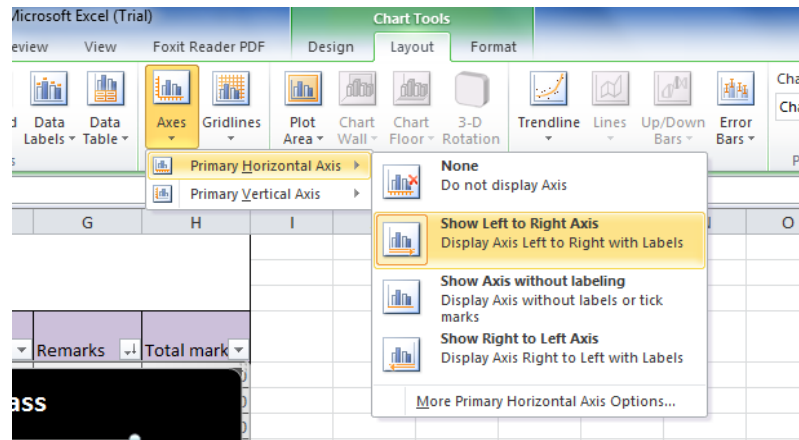
## 4. Changing the Display of Chart Axes

The chart axes can easily be modified. There are two axes on a chart.

- **Vertical Axes**
- **Horizontal Axes.**

### Modifying Horizontal Axes

1. Select **the horizontal Axes.**
2. Under the **chart tools** group, click on **Layout tab.**
3. Click on **Axes drop down button.**
4. Click on second option **Primary horizontal Axes.**
5. Select and apply the desired option from the **sub menu** (For example, **show axes left to right**).

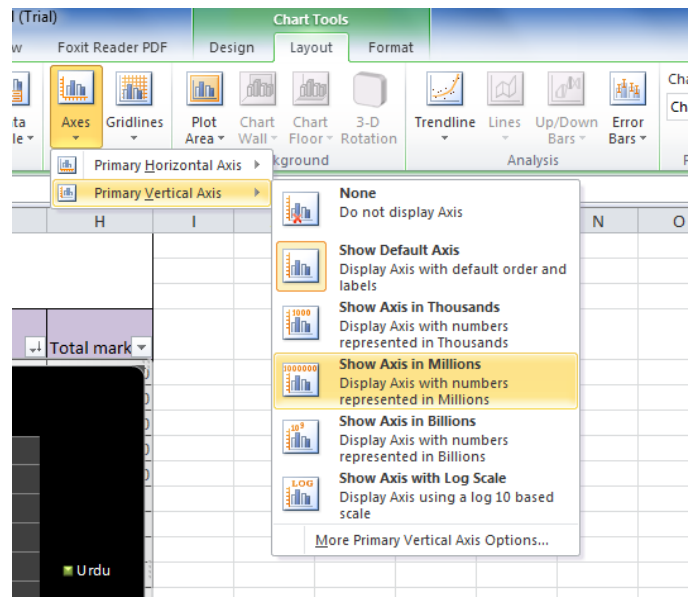


### Modifying Horizontal Axes

6. Axes will be changed.

### Modifying Vertical Axes

1. Select the **Vertical Axes**.
2. Under the **chart tools** group, click on **Layout** tab.
3. Click on **Axes** drop down button.
4. Click on second option **Primary vertical Axes**.
5. Select and apply the desired option from the **sub menu** (For example, **show axis in Million**).



#### Do you know!

Only one title can be added to a chart. If you want to use a second title or a subtitle, you can draw a text box on the chart, and move it to the location that you want.

### Modifying Vertical Axes



6. Axes will be changed.

## 5. Adding Data Labels to a Chart

The data labels are added to an Excel chart to help identify the values shown in each data point of the data series. Excel provides several options for data labels formatting.

Use the following steps to add data labels to series in a chart:

1. Click anywhere on the chart that is wanted to modify.
2. On the **Chart Tools Layout** tab, click the **Data Labels button** in the **Labels** group.

A menu of data label placement options appears:

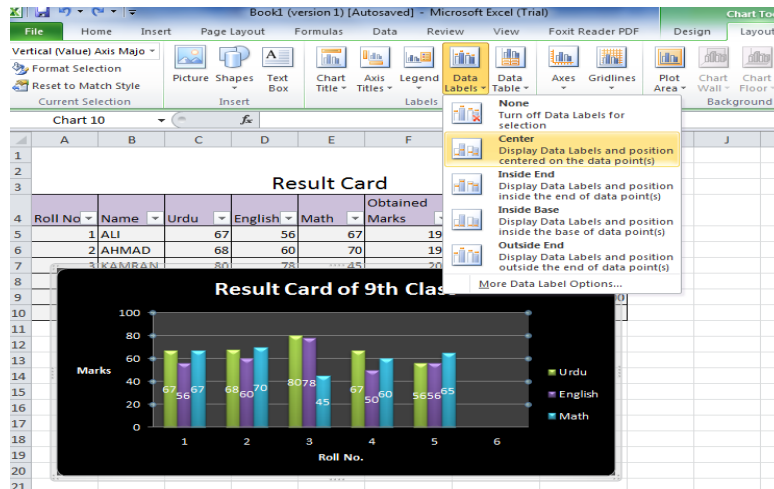
- **None:** This is the default choice; it means you don't want to display data labels.
- **Center:** This is used to position the data labels in the middle of each data point.
- **Inside End:** This option is used to position the data labels inside the end of each data point.
- **Inside Base:** This is used to position the data labels inside the base of each data point.
- **Outside End:** This is used to position the data labels outside the end of each data point.

## 6. Applying Data Labels

### Do you know!

To quickly remove a legend or a legend entry from a chart, select it, and then press DELETE.

- Select the place where data label wanted to be placed.
- On the **Chart Tools Layout tab**, click **Data Labels** and then **More Data Label Options**.
  - The Format Data Labels dialog box will appear. It can use the options on the **Label Options, Number, Fill, Border Color, Border Styles, Shadow, Glow and Soft Edges, 3-D Format, and Alignment tabs** to customize the appearance and position of the data labels.
- A label can be changed to show the Series Name, the Category Name, or the Value.
- Customize and change any additional options and then click Close.



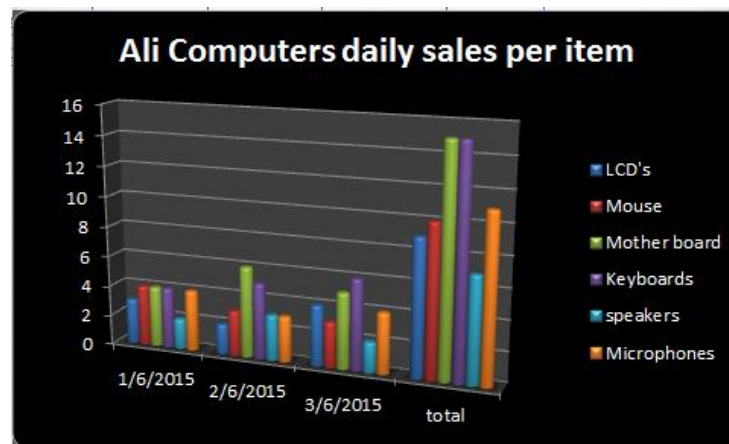
### Remember

When you click one of the display options, the legend moves, and the plot area automatically adjusts, to accommodate it. If you move and size the legend by using the mouse, the plot area does not automatically adjust.

## Data Labels

### 7. Adding or Removing Titles in a Chart

For making a chart easy to understand, titles can be added to it, such as a chart title and axis titles, to any type of chart. Axis titles are generally available for all axes that can be displayed in a chart. Some chart types (such as radar charts) have axes, but they do not display axis titles. Chart types that do not have axes (such as pie and doughnut charts) cannot display axis titles either.



### Adding Chart Title

A chart and axis titles can also be linked to corresponding text in worksheet cells by creating a reference to those cells. Linked titles are automatically updated in the chart when the text is changed in corresponding worksheet. A chart titles can be removed if it does not need.

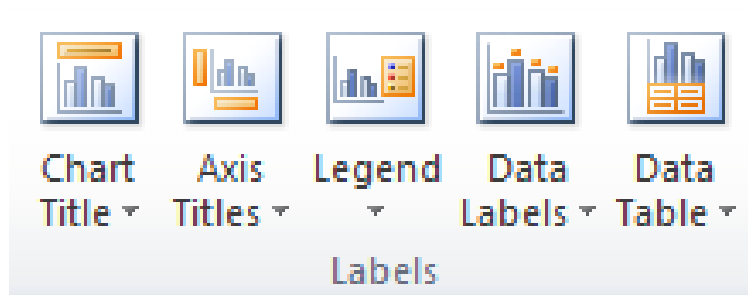
## 8. Adding a Chart Title Manually

1. Click at the chart to which the Title wanted to add.
2. **Chart Tools**, the **Design**, **Layout**, and **Format** tabs will appear.
3. On the **Layout** tab, in the **Labels** group, click on **Chart Title**.
4. Click on **Centered Overlay Title** or **Above Chart**.
5. In the **Chart Title** text box, type the text that is wanted to be added.

## 9. Adding a Legend to a Chart

### Show or hide a legend

1. Click the chart in which the legend is wanted to show or hide.
2. Click on **Chart Tools**, **Design**, **Layout**, and then **Format** tabs.
3. On the **Layout** tab, in the **Labels** group, click **Legend**.



4. Do one of the following:
5. To hide the legend, click **None**.
6. To display a legend, click the display option that is want.

### Modifying Legend Entries on the Worksheet


1. Click the cell that contains the name of the data series that appears as an entry in the chart legend.
2. Type the new name, and then press ENTER.
3. The new name will automatically appear in the legend on the chart.

# Learning Unit 5: Filter Data

## Overview

Filtering is a technique used in Excel to pick up a specific data that is required. Filtering data in a spreadsheet means to set conditions so that only certain data is displayed. It is done to make it easier to focus on specific information in a large database or table of data. This learning unit covers that what is filter and what are its uses in Excel also it will cover the procedures of applying filter using different methods. After completion of this learning unit you will be able to apply filter using more than one column, using Auto filter applying and reapplying a filter.

### Do you know!

A Filter button  means that a filter is applied.

## 1. Filtering Data

Filters are used to narrow down the data in a worksheet and hide parts of it from view. It may sound a little like grouping, filtering is different because it allows us to qualify and display only the data that is of interest. For example, you could filter a list of Students to view only those who get the marks in between 300 and 340 out of 500. You could also filter a list of Employees who got the salary above 30,000. Filters can be applied in different ways to improve the performance of a worksheet. It can filter text, dates, and numbers. It can use even more than one filter to further narrow the results.

### Remember

To see more items in the list, drag the handle in the bottom-right corner of the filter gallery to enlarge it.

## 2. Filtering Data by more than One Column

Data can be filtered from different columns in Excel. For this purpose there is an Advance filter option is provided under the DATA tab. For creating filter from using different columns do the following:

1. Create the criteria field in an area, like in the example given below

	A	B	C	D	E	F	G	H
1	product	order	total price	name				
2	Keyboards	<30						
3	LCD's			Ali				
4	speakers		>1000					
5								
6	Ali Computer Shop Daily sale per item							
7	product	order	total price	name				
8	LCD's	30	4000	Ali				
9	Mouse	40	200	Ali				
10	Mother board	23	5000	Nadeem				
11	Keyboards	35	300	Ahmad				
12	speakers	25	1500	Ali				
13	Microphones	46	1000	Ahmad				
14								
15								
16								

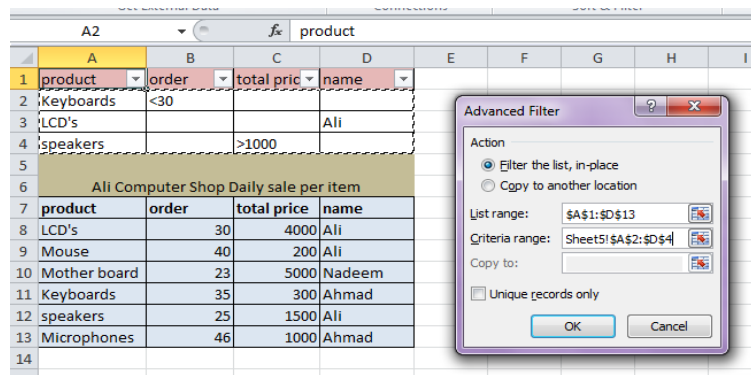
*Note: A red arrow points to the criteria field in row 2, column B, with the text "Set your Conditions".*

### Advance Filtering

2. Select the data range that want to filter, and click **Data** tab then **Advanced**.



3. In the **Advanced Filter** dialog box, click  button beside **Criteria range** to select the criteria.



### Giving Criteria Range

4. Then click **OK**, and it displays the filtered results.

	A	B	C	D
1	product	order	total price	name
9	Mouse	25	2000	Ali
12	speakers	25	1500	Ali

### Advance Filter Result

## 3. Using Auto Filter and three types of Filters


Using AutoFilter, you can create three types of filters: **by a list values**, **by a format**, or **by criteria**. Each of these filter types is mutually exclusive for each range of cells or column table. For example, you can filter by cell color or by a list of numbers, but not by both; you can filter by icon or by a custom filter, but not by both.

### Using Auto Filter:


1. Click inside a table, and then choose **Filter** in the **Sort & Filter** group of the **Data** tab

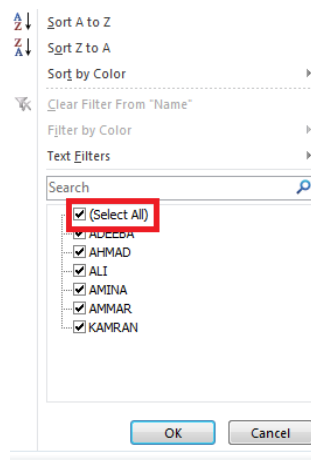
Roll No	Name	Urdu	English	Math	Obtained Marks	Remarks	Total mark
---------	------	------	---------	------	----------------	---------	------------

### Filtering Data

1. Click OK.
2. In the table header, the filtering arrow changes to this icon  that indicates a filter is applied.


### Selecting from a list of values

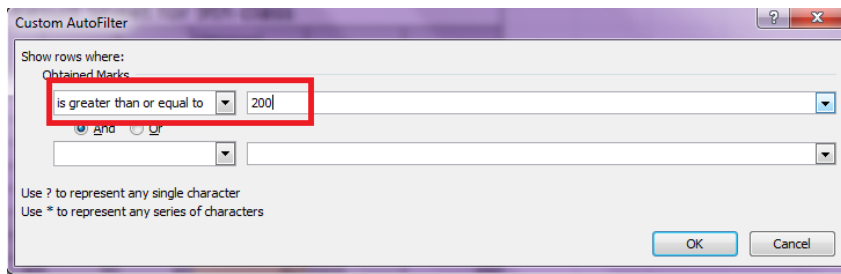
3. Click the arrow  in the table header of the column that is wanted to filter.
4. In the list of text or numbers, uncheck the (Select All) box at the top of the list.
5. Check the boxes of the items that is wanted to show in the table.



### Select List of Values

#### Filtering by Criteria:

1. Click the arrow  in the table header of the column that is wanted to filter.
2. Click **Number Filters**, if the column has numbers.
3. Pick the desired filtering option, and then enter filtering conditions.
4. For example, to show numbers that is above a certain amount, pick **Greater Than Or Equal To**, and then enter the number in the box.




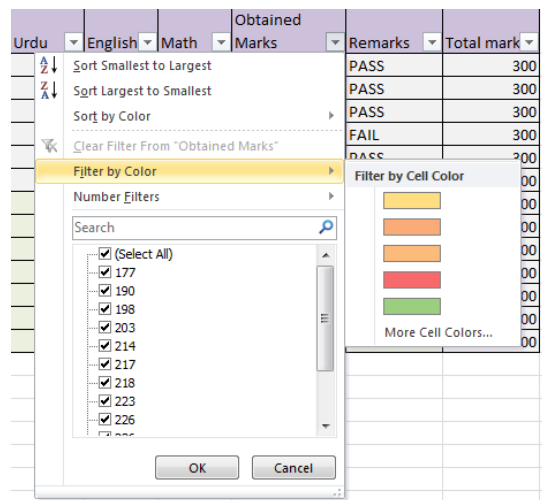
### Customized Auto Filter

(To filter by two conditions, enter filtering conditions in both sets of boxes, and pick **And** for both conditions to be true, and **Or** for either of the conditions to be true.)

### Filtering by Format

Filters can also be applied on colors if there is used of Conditional formatting.

1. Click the arrow  of the column that has color formatting or conditional formatting applied.
2. Click **Filter by Color** and then pick the cell color, font color, or icon wanted to filter by.





### Applying Filter by Color

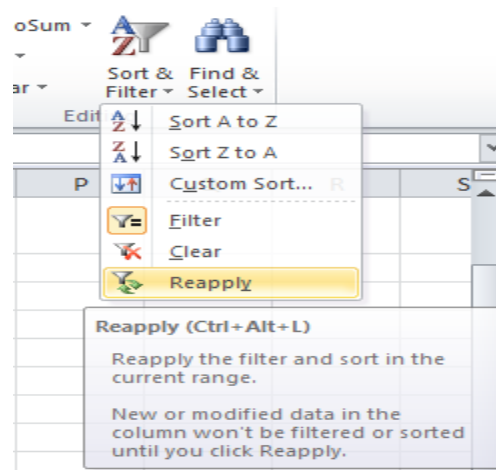
## 4. Reapplying a Filter

Once data have filtered or sorted in a range of cells or table column, it can either reapply a filter or sort to get up-to-date results, or clear a filter to redisplay the entire data. For example if the date and time change the data in filter data will also be changed.

### Reapplying a filter

Determine if a filter is applied, note the icon in the column heading:

1. A drop-down arrow Filter drop-down arrow  means that filtering is enabled but not applied.
2. A Filter  icon means that a filter is applied.



### Remember

Filter and sort criteria are saved with the workbook so that you can reapply both the filter and sort each time that you open the workbook.

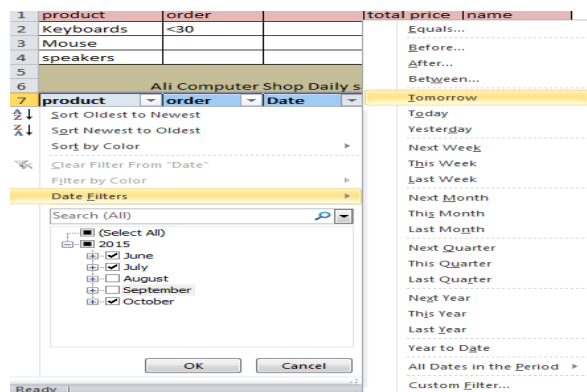
### Reapplying a Filter

When a filter is reapply, different results appear for the following reasons:

Data has been added, modified, or deleted to the range of cells or table column.

### Date and Time Filter:

The filter is a dynamic date and time filter, such as Today, This Week, or Year to Date.



### Changing in Date or Time Filter



Ali Computer Shop Daily sale per item				
product	order	Date	total price	name
LCD's	30	6/4/2015	4000	Ali
Mouse	25	7/5/2015	2000	Ali
speakers	25	9/2/2015	1500	Ali
Microphones	46	10/3/2015	1000	Ahmad

### Changing in Date or Time Filter

# Learning Unit 6: Format Cell

## Overview

Formatting a cell means changing the style size alignment of a cell. Cell formats allows changing the way cell data appears in the spreadsheet. It is important to keep in mind that it only alters the way the data is presented, and does not change the value of the data. This unit covers the procedure of formatting a cell, adding or deleting a column or a row. After completion of this Unit, you will learn how to change the **color** and **style** of **text** and **cells**, **align text**, and apply special formatting to **numbers** and **dates**.

### Do you know!

Keyboard shortcut, to quickly create a new, blank workbook, press CTRL+N.

## 1. Adding or Removing Columns and Rows

Sometimes it is necessary to remove or add some of the columns or rows before or after the specific location.

### Inserting a table row or column

Do one of the following:

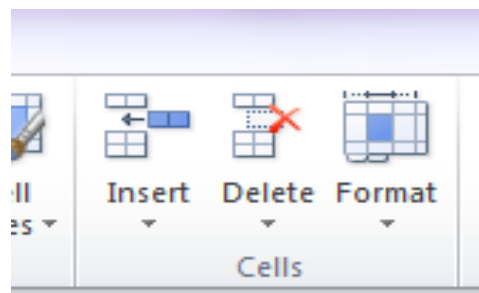
#### To insert one or more table rows.

Select one or more table rows above which it is wanted to insert one or blank table rows.

#### To insert one or more table columns.

Select one or more table columns to the left or right of which it is wanted to insert one or more blank table columns.

1. On the **Home** tab, in the **Cells** group, click the arrow next to **Insert**.



Inserting Rows and Columns

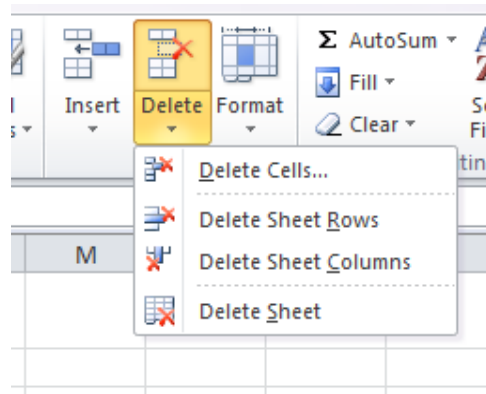
Do one of the following:

1. To insert table rows, click **Insert Table Rows Above**.
2. To insert a table row below the last row, click **Insert Table Row Below**.
3. To insert table columns, click **Insert Table Columns to the Left**.
4. To insert a table column to the right of the last column.
5. Click **Insert Table Column to the Right**.

### Deleting rows or columns:

1. Select one or more table rows or table columns that wanted to delete.

- On the **Home** tab, in the **Cells** group, click the arrow next to **Delete**, and then click **Delete Table Rows** or **Delete Table Columns**.



Deleting rows and Columns

## 2. Editing Contents of a Cell

### Inserting, deleting, or replacing cell contents

#### 1. Insert characters:

Click on the cell where wants to insert text, and then type the new characters.

#### 2. Delete characters:

Click in the cell where wants to delete the text, and then press **BACKSPACE**, or select the characters and then press **DELETE**.

#### 3. Replace specific characters:

Select the text and then type the new text.

#### 4. Cancel or undo edits:

Press **ESC** to cancel any edits that made to the cell contents.

#### 5. Adjusting Cell Contents:

Sometimes, a cell might display #####. This can occur when the cell contains a number or a date and the width of its column cannot display all the characters that its format requires. Then the cell will display #####. To see the entire contents of the cell with its current format, It is necessary to increase the width of the column.

A	B	C	D	E
Ali Computer Shop Daily sale per item				
product	order	Date	total price	name
LCD's	30	#####	4000	Ali
Mouse	25	#####	2000	Ali
Mother board	23	#####	5000	Nadeem
Keyboards	35	#####	3000	Ahmad
speakers	25	#####	1500	Ali
Microphones	46	#####	1000	Ahmad

Adjusting Cells

## 6. Changing the width of a column:

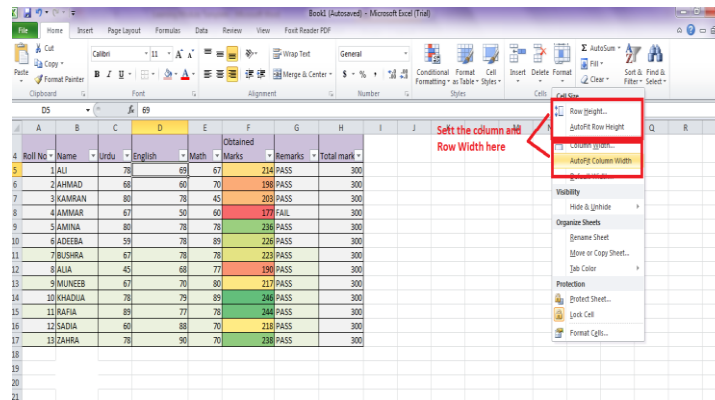
1. Click on the desired cell to change the column width.
2. On the **Home** tab, in the **Cells** group, click **Format**.
3. Under **Cell Size**, do one of the following:

### To fit all text in the cell

4. Click **AutoFit Column Width**.

### To specify a larger column width.

5. Click **Column Width**, and then type the width that wants in the **Column width** box.



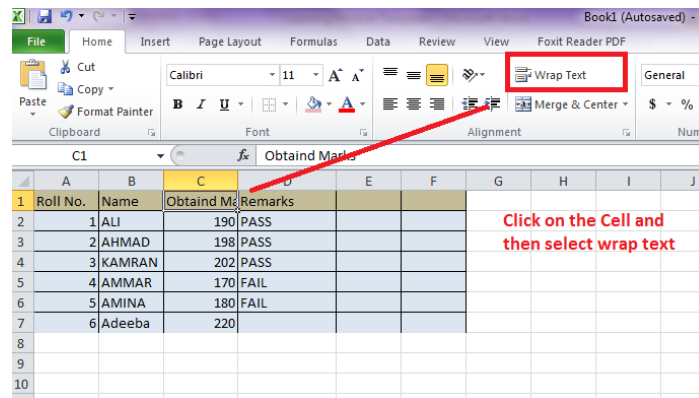
### Do you know!

If you want to appear text on multiple lines in a cell. Wrap the text in cell.

## Sett Column and Rows Width

## 7. Wrapping text in a cell

1. Click the cell in which you want to wrap the text.
2. On the **Home** tab, in the **Alignment** group, click **Wrap Text**.



## Wrap Text

## Clearing the Contents of a Cell

Simply Select the cell and press the delete key the contents will be delete.

# Learning Unit 7: Edit Worksheet

## Overview

Each Excel workbook contains at least one or more worksheets. If you want to work with a large amount of related data, use worksheets to help organize the data and make it easier to work with. This learning unit covers the procedure of editing like copying, pasting, moving the worksheet data. After completion of this learning unit you will be able to describe to add, delete, copy, and move worksheets also will describe the procedure of splitting a worksheet, applying grammar check and many more.

## 1. Editing Worksheet

Editing a worksheet means changing the contents of the worksheet like copy, paste or moving the data so that it can be easy to read.

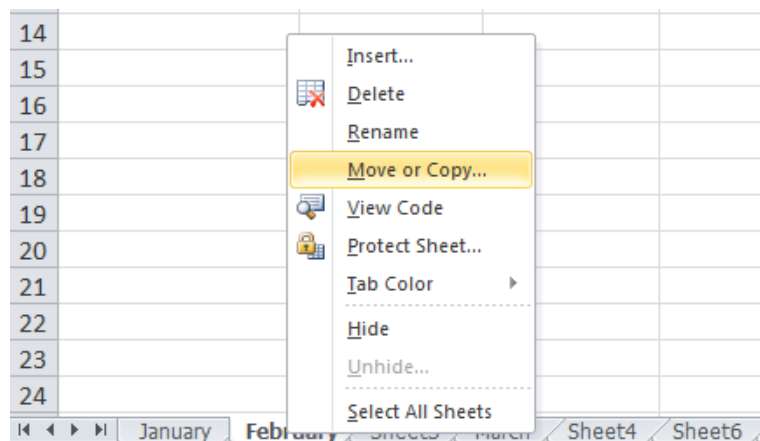
### Copy, Paste, Move a Sheet

#### 1. Copying or Moving a Worksheet

A worksheet can be moved or copied to other location. If an extra copy required then the worksheet will be copied to the same workbook or a New workbook. Like this worksheet can also be moved to the New workbook or at the same workbook.

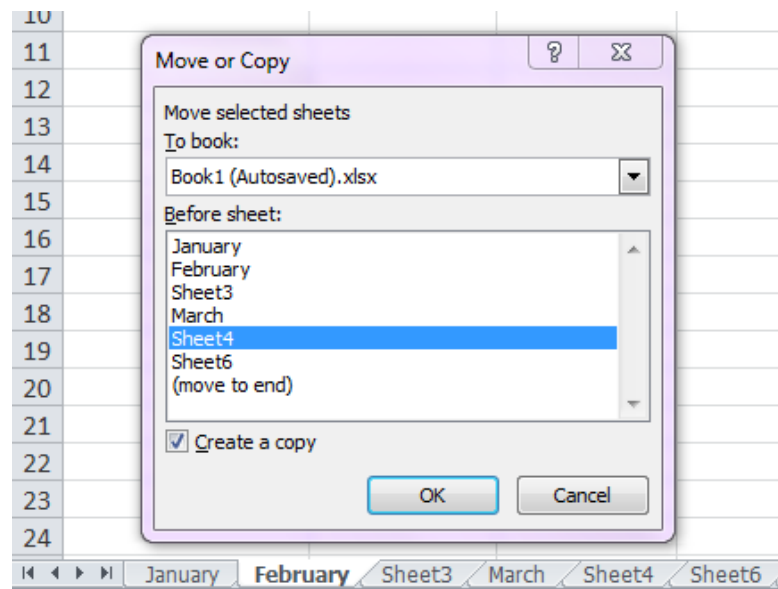
For copying a worksheet

1. **Right click** on the desired worksheet which wanted to be copied.
2. Click on **copy or move** option.
3. A dialogue box will appear.



**Copying or Moving a Worksheet**

4. Check the option, create a **copy**.

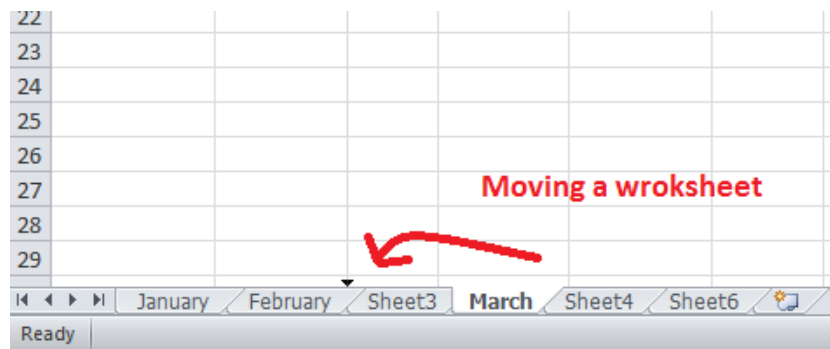


### Copying or Moving a Worksheet

5. Select the location of the worksheet where wanted to be copied.
6. Click **OK**.

### 2. Moving a worksheet using Drag and Drop

1. Click the worksheet wants to move.
2. Drag the worksheet icon until a small black arrow ▼ appears where the worksheet to be moved.



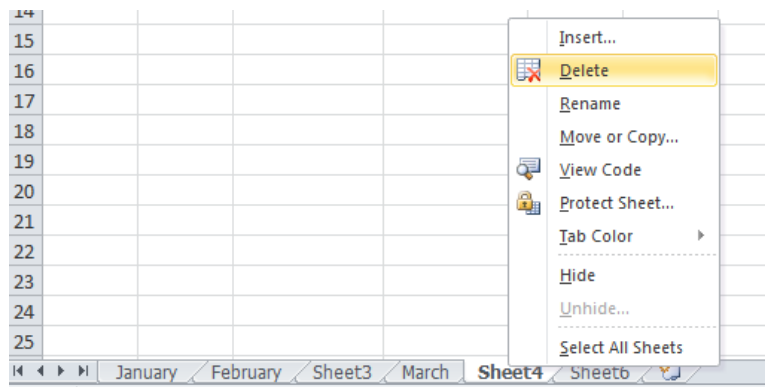
### Moving a Worksheet

3. Release mouse, and the worksheet will be moved.

### 3. Deleting a Worksheet

For deleting any extra r un necessary worksheet.

1. Right click on the desired worksheet which is wanted to be removed.
2. Click on delete option.
3. The worksheet will be removed.



Deleting a Worksheet

## 2. Editing Worksheet Contents

### Moving or copying cells and cell contents

#### Remember

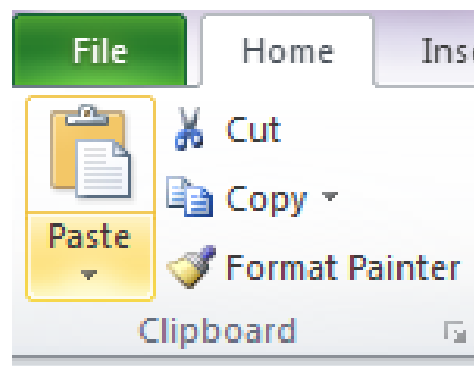
You can move the contents by selecting the contents than drag and drop them.




**Cut**, **Copy**, and **Paste** commands are used in Microsoft Office Excel to move or copy entire cells or their contents. Or it can also copy specific contents or attributes from the cells. For example, it can copy the resulting value of a formula without copying the formula itself, or it can copy only the formula.

#### 1. Move or copy entire cells

Excel moves or copies the entire cell, including formulas and their resulting values, cell formats, and comments.

1. Select the cells that want to move or copy.
2. On the **Home** tab, in the **Clipboard** group, do one of the following:



3. To move cells, click Cut .
4. Also can press CTRL+X. Keyboard shortcut
5. To copy cells, click Copy .
6. Can also press CTRL+C.
7. Select the upper-left cell of the paste area.
8. On the Home tab, in the Clipboard group, click Paste .
9. Can also press CTRL+V.



## 2. Relative and Absolute Cell Reference.

By default, a cell reference is relative. For example, when you refer to cell A4 from cell C4, you are actually referring to a cell that is two columns to the left, and in the same row (4). A formula that contains a relative cell reference changes as you copy it from one cell to another.

As an example, if you copy the formula  $=A2+B2$  from cell C2 to D2, the formula in D2 adjusts downward by one row and becomes  $=A3+B3$ . If you want to maintain the original cell reference in this example when you copy it, you make the cell reference absolute by preceding the columns (A and B) and row (2) with a dollar sign (\$). Then, when you copy the formula ( $=\$A\$2+\$B\$2$ ) from C2 to D2, the formula stays exactly the same.

## 3. Applying Undo and Redo Option:

Sometimes it needs to go back one step or repeat some step at this situation use Undo and Redo commands or buttons.

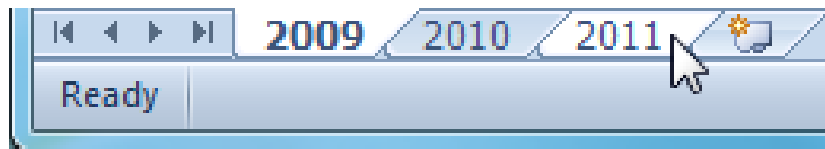
1. For **Undo** Press CTRL+Z or press  button on Quick Access tool bar.
2. For **Redo** an action press CTRL+Y or  button on Quick Access tool bar.

## 4. Checking Spelling and Grammar in Worksheet:

Press F7 or Click on Review tab then click on Spelling and Grammar option.

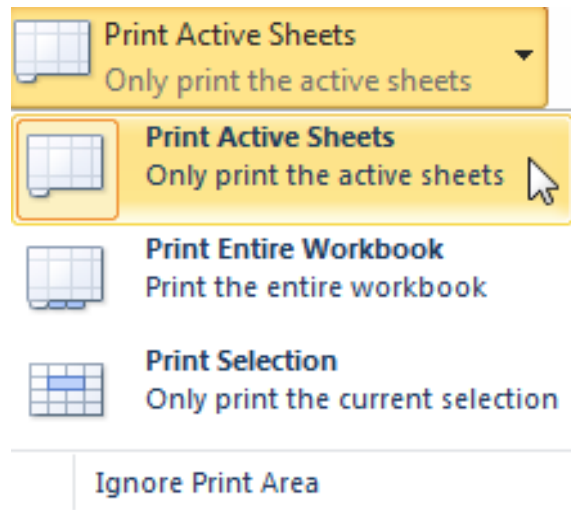
### Using Printing Command:

1. Select the worksheet that wants to be print. To print multiple worksheets, click the first worksheet, hold down the **Ctrl key**, then click the other worksheets wanted to select.



2. Click the **File** tab.
3. Select **Print** to access the **Print pane**.
4. Select **Print Active Sheets** from the **print range** drop-down menu.



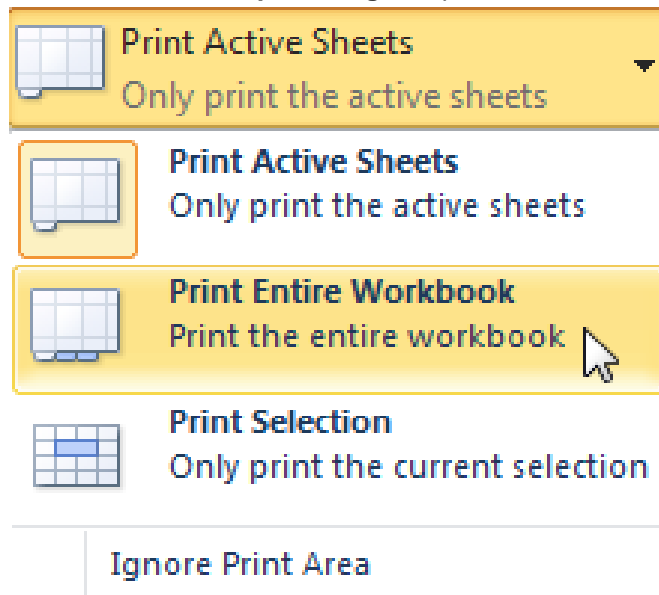


**Print Active Worksheet**

5. Click the **Print** button.

**5. Print the Entire Workbook:**

1. Click the **File** tab.
2. Select **Print** to access the **Print pane**.
3. Select **Print Entire Workbook** from the **print range** drop-down menu.

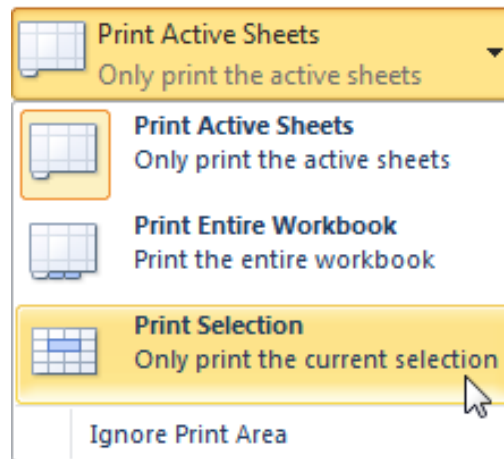


**Print Entire Workbook**

4. Click the **Print** button.

**6. Print a Selection or Set the Print Area:**

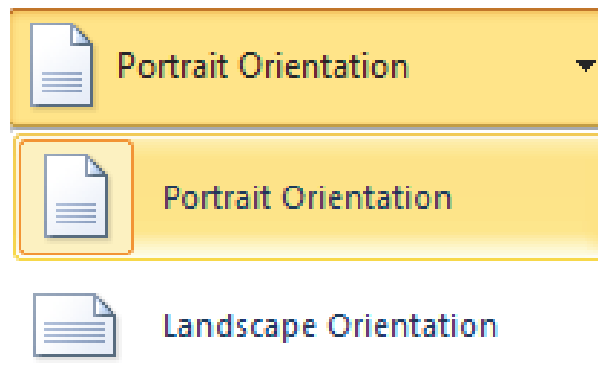
1. Select the cells that want to print.
2. Click the **File** tab.
3. Select **Print** to access the **Print pane**.
4. Select **Print Selection** from the **print range** drop-down menu.



### Printing a Worksheet

#### Changing Page Orientation:

1. Click the **File** tab.
2. Select Print to access the Print pane.
3. Select Portrait Orientation or Landscape Orientation from the orientation drop-down menu.

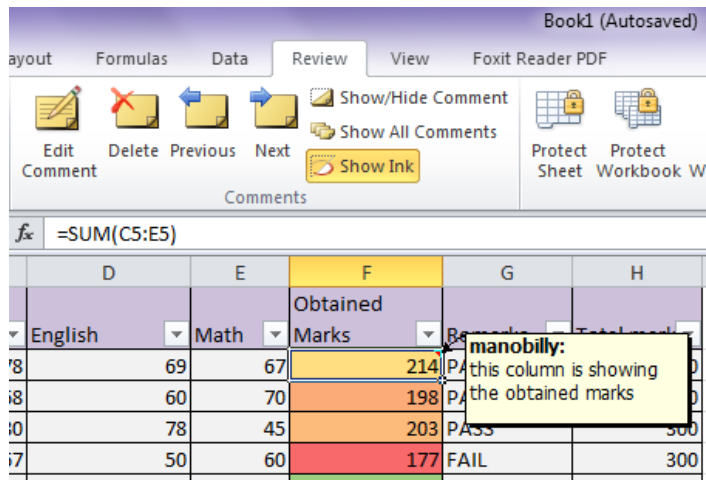


### Changing Page Orientation

#### 7. Adding a Comment on a Cell:

A comment can be added to a cell for its description.

1. Click on Review tab. Then click on new Comment.
2. A comment will be added to the cell.
3. Write the description of the cell in the comment box.



### Adding a Comment

- For removing a comment click on Delete comment option.

### 8. Adding Currency and Percent Symbols:

For adding currency or % percent signs with the data change the type of data as **accounting** or **Percentage** under the **Numbers Groups** on the Home tab.














	D	E
	Prices	Profit
8	\$ 69.00	6700.00%
8	\$ 69.00	6700.00%
0	\$ 69.00	6700.00%
7	\$ 69.00	6700.00%
0	\$ 69.00	6700.00%

### Adding Currency or Percentage Signs

## 3. Formatting a Worksheet

Formatting means changing the color, size, style, of a worksheet contents. For changing the contents of a worksheet is defined in previous lessons also.

- Write the text in the worksheet.
- Select the text and change the font style, font size color etc.
- Apply changes .and save the worksheet.

	A	B	C	D	E	F	G	H	
1	Result Sheet for 9th class								
2									
3									
4	ROLL NO.	NAME	URDU	ENGLISH	MATH	OBTAINED MARKS	REMARKS	TOTAL MARKS	
5	1	ALI	78		69	67	214	PASS	300
6	2	AHMAD	68		60	70	198	PASS	300
7	3	KAMRAN	80		78	45	203	PASS	300
8	4	AMMAR	67		50	60	177	FAIL	300
9	5	AMINA	80		78	78	236	PASS	300
10	6	ADEEBA	59		78	89	226	PASS	300
11	7	BUSHRA	67		78	78	223	PASS	300
12	8	ALIA	45		68	77	190	PASS	300
13	9	MUNEEB	67		70	80	217	PASS	300
14	10	KHADIJA	78		79	89	246	PASS	300
15	11	RAFIA	89		77	78	244	PASS	300
16	12	SADIA	60		88	70	218	PASS	300
17	13	ZAHRA	78		90	70	238	PASS	300

### Formatting a Worksheet

# Learning Unit 8: Insert Page Breaks

## Overview

Page breaks are used to view the preview of a page where the page breaks when the page is printed. This Learning unit covers the procedure for inserting, deleting, moving page breaks. After completion of this learning unit you will be able to describe the page breaks, insertion deletion and moving page breaks.

## 1. Using Page Break Preview

### Do you know!

Page breaks are used to view the preview of a page where the page breaks when the page is printed.

Page breaks are dividers that divide a worksheet into separate pages for printing. Ms Excel insert automatic page breaks based on the paper size, margin settings, scale options, and the positions of any manual page breaks that are inserted. To print a worksheet with the exact number of pages, adjust the page breaks in the worksheet before print it.

Using Page Break Preview Option :

1. Select the worksheet or the area which is wanted to be print.
2. On the View Tab, click on Page Break Preview button.
3. Set the rulers if the print is out of area.
4. Click ok.

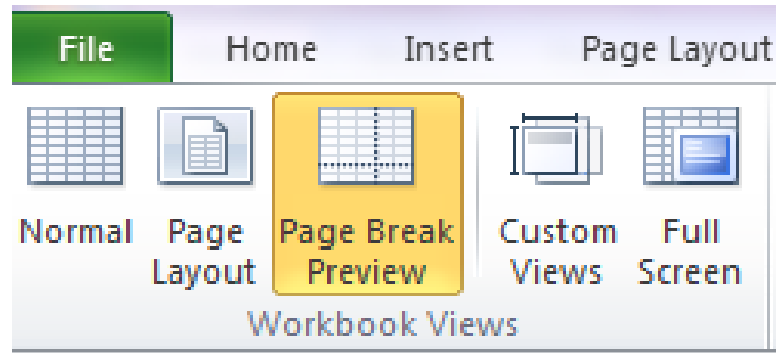
Ro	Name	Urdu	English	Math	Obtained Marks	Remarks	Total marks
1	ALI	78	69	67	214	PASS	300
2	AHMAD	68	60	70	198	PASS	300
3	KAMRAN	80	78	45	203	PASS	300
4	AMMAR	67	50	60	177	FAIL	300
5	AMINA	80	78	78	236	PASS	300
6	ADEEBA	59	78	89	226	PASS	300
7	BUSHRA	67	78	78	223	PASS	300
8	ALIA	45	68	77	190	PASS	300
9	MUNEEB	67	70	80	217	PASS	300
10	KHADIJA	78	79	89	246	PASS	300
11	RAFIA	89	77	78	244	PASS	300
12	SADIA	60	88	70	218	PASS	300
13	ZAHRA	78	90	70	238	PASS	300

### Using Page Break Preview

## 2. Inserting a Page Break

### Insert a Page Break

1. Select the worksheet that you want to modify.
2. On the **View** tab, in the **Workbook Views** group, click **Page Break Preview**.



3. Click **OK**.

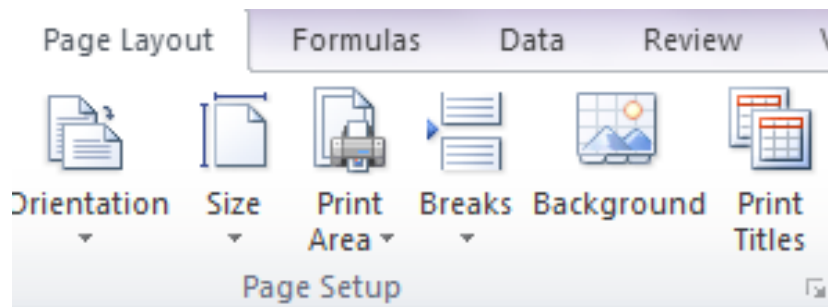
### To Insert a Horizontal Page Break:

Select the row below where wanted to insert the page break.

### To Insert a Vertical Page Break:

Select the column to the right of where you want to insert the page break.

4. On the **Page Layout** tab, in the **Page Setup** group, click **Breaks**.



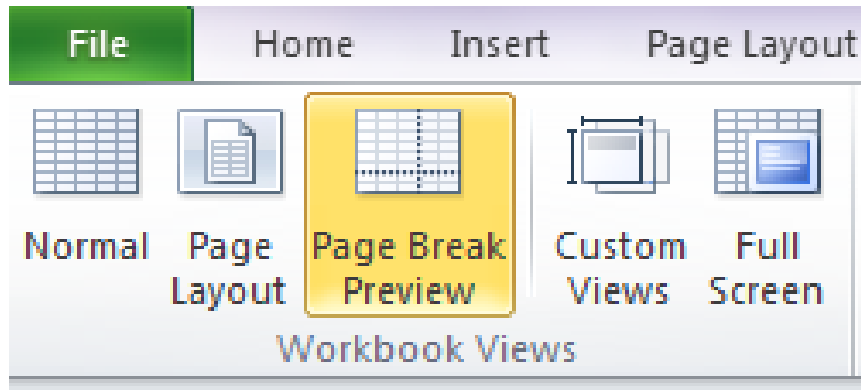
### Inserting Page Breaks

5. Click **Insert Page Break**.

## 3. Working with Page Breaks

### 1. Moving a Page Break

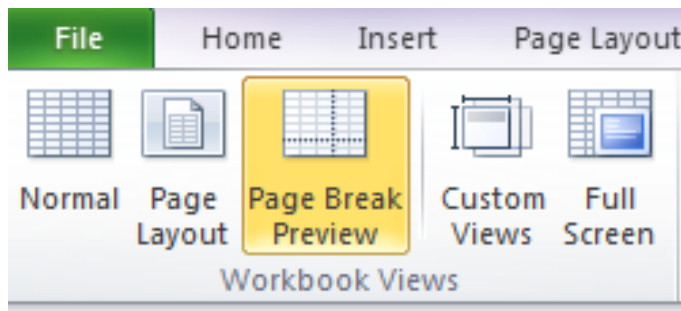
1. Click the **File** tab.
2. Select the worksheet that wants to print.
3. On the **View** tab, in the **Workbook Views** group, click **Page Break Preview**.



4. To move a page break, drag the page break to a new location.

## 2. Deleting a Page Break:

1. Select the worksheet that wants to print.
2. On the **View** tab, in the **Workbook Views** group, click **Page Break Preview**.



### Using Page Break Preview

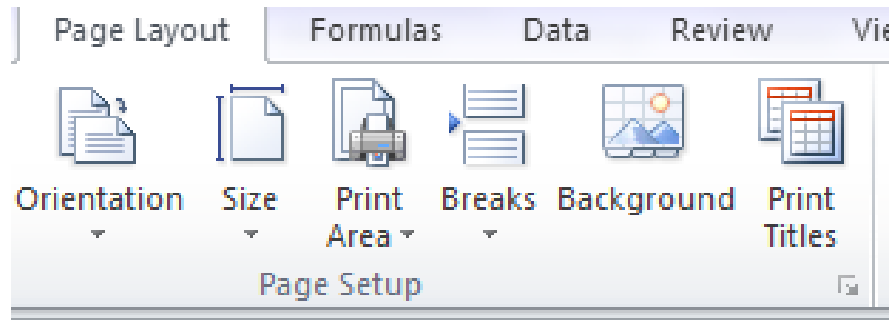
#### To Delete a Vertical Page break

Select the column to the right of the page break that wanted to delete.

#### To Delete a Horizontal Page Break

Select the row below the page break that you want to delete.

3. On the **Page Layout** tab, in the **Page Setup** group, click **Breaks**.



### Inserting Page Breaks

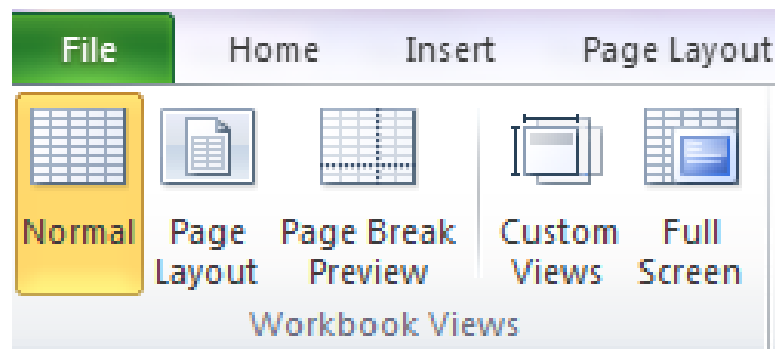
4. Click **Remove Page Break**.

### 3. Resetting all Page Breaks:

1. Click the worksheet that wants to print.
2. On the **View** tab, in the **Workbook Views** group, click **Page Break Preview**.
3. Click **OK**.
4. On the **Page Layout** tab, in the **Page Setup** group, click **Breaks**.
5. Click **Reset All Page Breaks**.

### 4. Returning to Normal View

For returning to Normal view after finishing work with the page breaks, on the **View** tab, in the **Workbook Views** group, click **Normal**.



### Returning to Normal View

### 5. Display or Hide Page Breaks in Normal View

1. Click on the **File** tab.

Click on the **View** Tab, and then Click on **Normal View**.



# Learning Unit 9: Split Cells

## Overview

Splitting means separate text or cells into two or more parts. One of many features of Microsoft Office Excel is the ability to merge or unmerge cells within a worksheet. When working in Excel, you can use the tools to split data among two or more cells within a chart or spreadsheet. This is a very good feature in Ms Excel. This learning unit covers the procedure for splitting the column text into separate columns. After completion of this learning unit you will be able to demonstrate the procedure of splitting text of a column into two different columns.

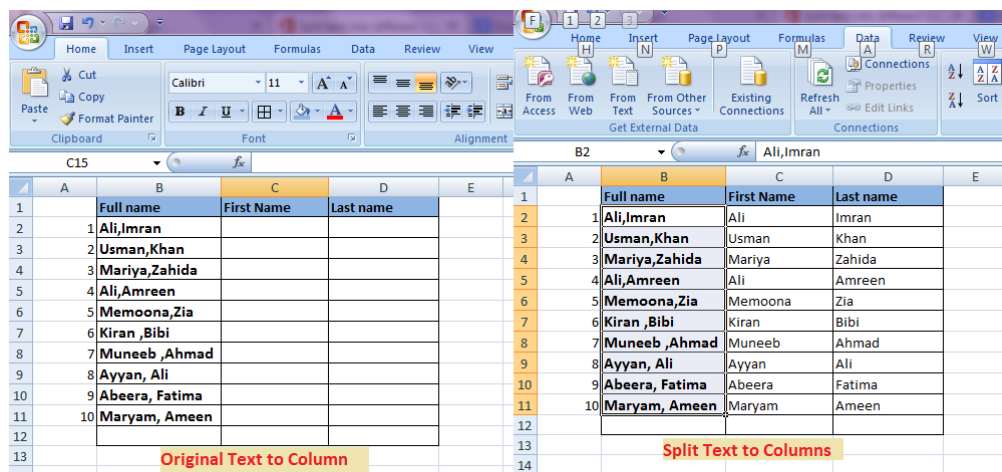
## 1. Spreading the Column's Data

Split cells spread the text across multiple cells. This is the opposite of concatenate, where it can combine text from two or more cells into one cell.

### Splitting Text to Columns:

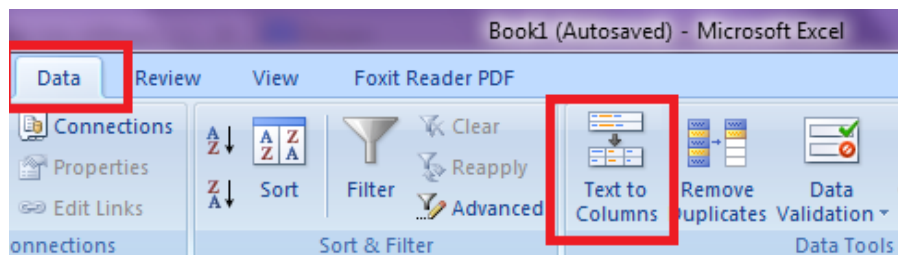
#### Do you know!

Splitting is used to split your worksheet to view multiple parts of worksheet at once.



### Splitting Columns

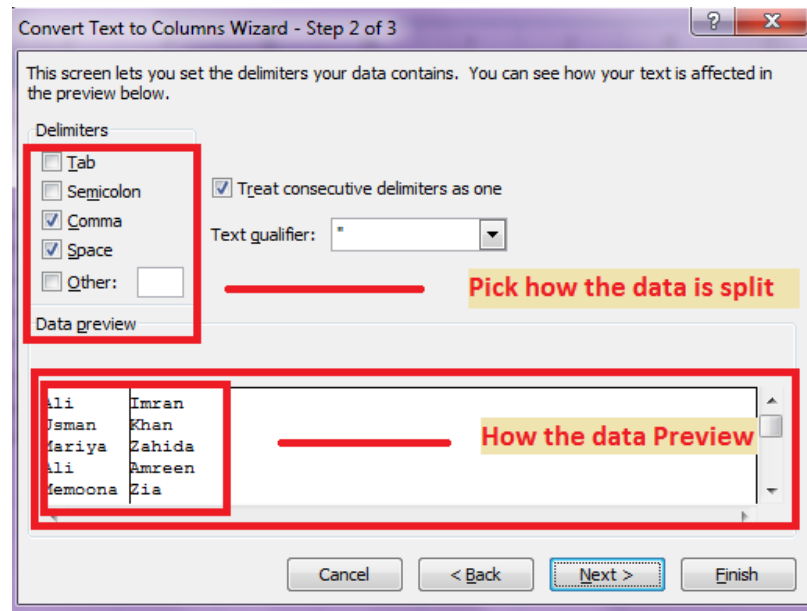
1. Select the column of the data.
2. Click on **DATA** tab.
3. Click on **Text to Column** that contains the text wants to split.



### Text to Column

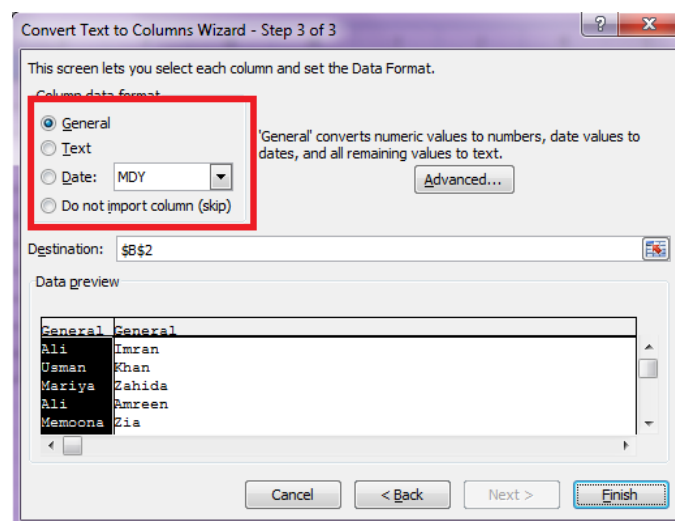
4. It starts the **Convert Text to Columns Wizard**.
5. Click **Delimited**, than **Next**.

- Check **Space**, and uncheck the rest of the boxes.




### Splitting Data

- Click **Next**.
- In this step, pick the format for the new columns, select the format, such as **Text**.




### Selecting Data Format

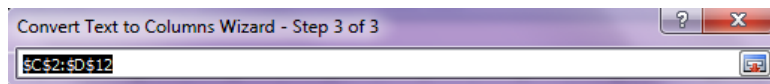
## 2. Collapse the Dialogue Box

- Click the  button to the right of the **Destination** box to collapse the dialog box.
- Select the cells in the workbook where wanted to paste the split data. (For example, if you are dividing a full name into a first name column and a last name column, select the appropriate number of cells in two adjacent columns.)

C2		fx Ali,Imran		
	A	B	C	D
1		<b>Full name</b>	<b>First Name</b>	<b>Last name</b>
2	1	Ali,Imran		
3	2	Usman,Khan		
4	3	Mariya,Zahida		
5	4	Ali,Amreen		
6	5	Memoona,Zia		
7	6	Kiran ,Bibi		
8	7	Muneeb ,Ahmad		
9	8	Ayyan, Ali		
10	9	Abeera, Fatima		
11	10	Maryam, Ameen		

**Selecting Column to Paste Data**

3. Click the  button to expand the dialog box, and then click **Finish**.



**Expand Button**

B2		fx Ali,Imran		
	A	B	C	D
1		<b>Full name</b>	<b>First Name</b>	<b>Last name</b>
2	1	Ali,Imran	Ali	Imran
3	2	Usman,Khan	Usman	Khan
4	3	Mariya,Zahida	Mariya	Zahida
5	4	Ali,Amreen	Ali	Amreen
6	5	Memoona,Zia	Memoona	Zia
7	6	Kiran ,Bibi	Kiran	Bibi
8	7	Muneeb ,Ahmad	Muneeb	Ahmad
9	8	Ayyan, Ali	Ayyan	Ali
10	9	Abeera, Fatima	Abeera	Fatima
11	10	Maryam, Ameen	Maryam	Ameen
12				

**Split Data**

# Learning Unit 10: Merge Cells

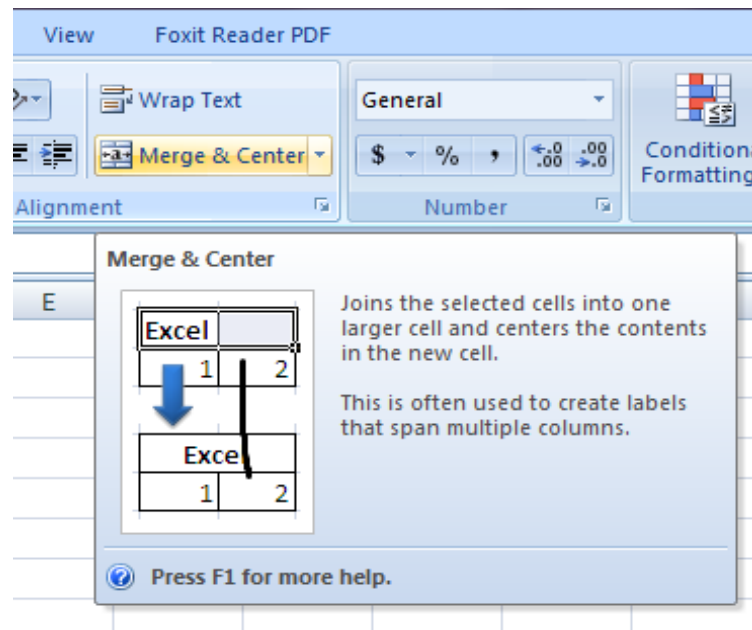
## Overview

Merging means creating a big cell by merging vertical or horizontal rows and columns. This learning unit covers the procedure for merging and un merging the cells. After completion of this learning unit you will be able to demonstrate the procedure of merging and un merging the cells in Excel.

## 1. Merging Cells

When the cells merge into two or more adjacent horizontal or vertical cells, the cells become one larger cell that is displayed across multiple columns or rows. In the following example, using the **Merge & Center** command centers the text in the merged cell.

1. On the **Home** tab, in the **Alignment** group, click **Merge and Center**.



**Merging Cells**

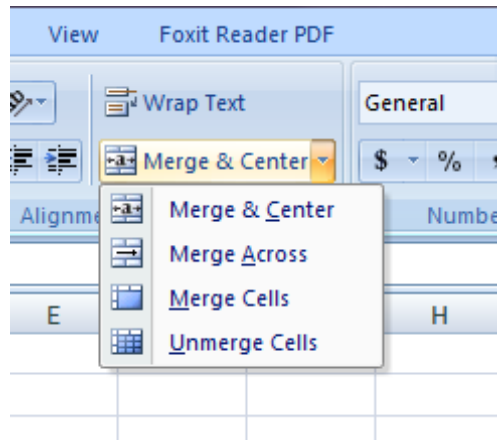
The cells will be merged in a row or column, and the cell contents will be centered in the merged cell.

### To Merge Cells without Centering

2. Click the arrow next to **Merge and Center**, and then click **Merge Across** or **Merge Cells**.

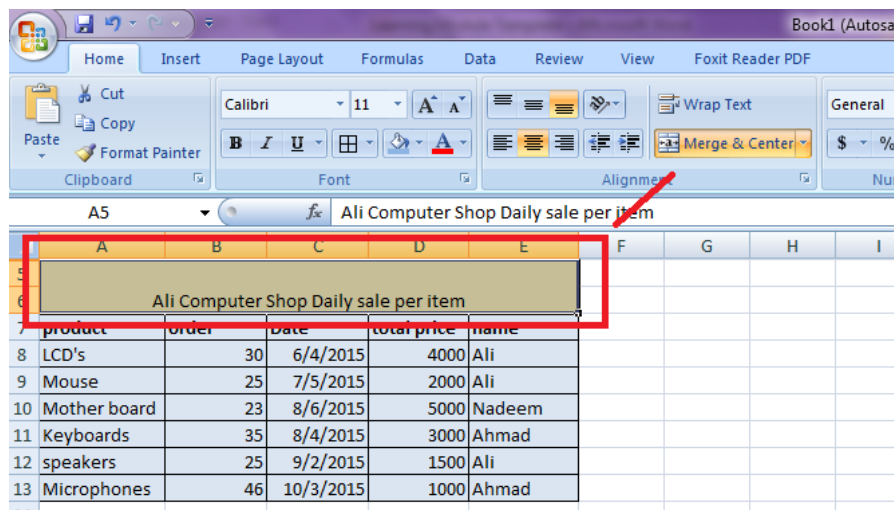
### Remember

If the **Merge and Center** button is unavailable, the selected cells might be in Edit mode, or the cells might be inside an Excel table. To cancel Edit mode, press ENTER



### Merging Cells


- To change the text alignment in the merged cell, select the cell, and then click any of the alignment buttons in the **Alignment** group on the **Home** tab.

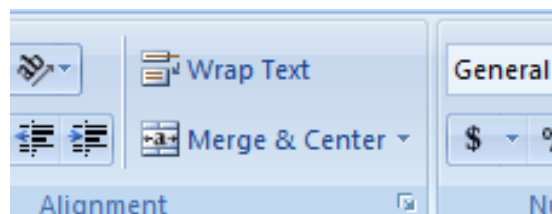



### Merge Cells

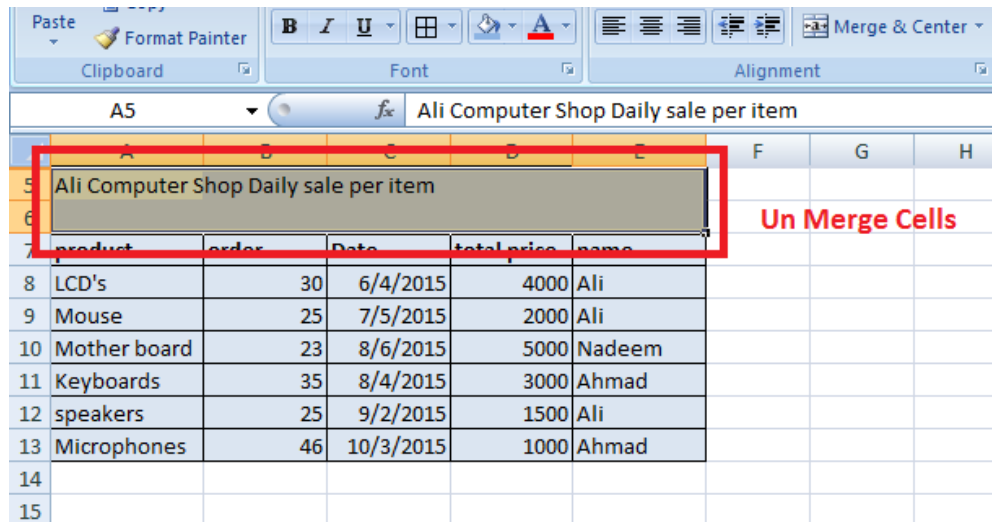
## 2. Un Merging the Cells

For splitting a merged cell, it must be selecting it first.

- Select the merged cell that wants to unmerge.
- When the cells are select a merged cell, the **Merge and Center** button  also appears selected in the **Alignment** group on the **Home** tab.



- For splitting the merged cell, click **Merge and Center** , or click the arrow next to **Merge and Center**, and then click **Unmerge Cells**.
- Or Press CTRL+Z for undo.



**Merge Cells**

## Learner's Activities

### Creating New Worksheet

<b>Description</b>	This learning activity consists of an interactive session in the class about creating a new worksheet inserting data in worksheet modifying data in worksheet and learns about different parts of a worksheet.
<b>Time</b>	40 minutes.
<b>Purpose</b>	To highlight the procedure for creating a new work sheet and modification of a worksheet elements.
<b>Instructions for Learner</b>	<ol style="list-style-type: none"><li>1. Ask learners how to create a new workbook.</li><li>2. Ask learners how to insert a new worksheet in a workbook.</li><li>3. Ask learners are they able to create their own worksheet at any specific place.</li><li>4. Ask the learners are they able to modify the elements of a worksheet.</li></ol>

### Creating Chart Data in Worksheet

<b>Description</b>	This learning activity consists of an interactive session in the class about creating charts data in worksheet modifying data in charts and learns about to change different elements of a chart.
<b>Time</b>	40 minutes.
<b>Purpose</b>	To highlight the procedure for creating a chart using data and then change the elements of this chart.
<b>Instructions for Learner</b>	<ol style="list-style-type: none"><li>1. Ask learners how to create a chart.</li><li>2. Ask learners how to modify the chart elements.</li><li>3. Ask learners are they able to create their own modified chart.</li></ol>

## Summary of Module

- Spreadsheet is an electronic document in which data is arranged in the rows and columns of a grid and can be manipulated and used in calculation
- Each worksheet is composed of a very large number of cells which are the basic place for data in a file or workbook.
- A formula is statement written and calculated by a user and A function is a built-in code designed to calculate specific values
- A chart is a visual representation of data. By using elements such as columns, or lines, a chart displays series of numeric data in a graphical format.
- Filtering is a technique used in Excel to pick up a specific data that is required used in a spreadsheet to set conditions so that only certain data is displayed
- Spreadsheets that are not formatted can be difficult to read. Formatted text and cells draw attention to specific parts of the spreadsheet and make the spreadsheet more visualized and easy to understand
- Editing a worksheet means copying, pasting, moving a worksheet or its contents.
- Page breaks are used to view the preview of a page where the page breaks when the page is printed.
- Splitting means separate text or cells into two parts. One of many features of Microsoft Office Excel is the ability to merge or unmerge cells within a worksheet. When working in Excel, you can use the tools to split data among two or more cells within a chart or spreadsheet.
- When the cells merge into two or more adjacent horizontal or vertical cells, the cells become one larger cell that is displayed across multiple columns or rows



## Frequently Asked Questions (FAQs)

FAQ 1: What is the Difference between workbook and worksheet?

Answer Workbook is a collection of worksheets.

FAQ 2: What is a Ribbon?

Answer A Ribbon is a Combination of Groups and commands.

FAQ 3: What is the shortcut key to insert new worksheet?

Answer Shift+F11.

FAQ 4: What is a Formula?

Answer A formula is a statement which calculates the value of a cell.

FAQ 5: What is a Function?

Answer A Function is a predefined formula.

FAQ 6: What is a Chart?

Answer A chart is a graphical representation of data.

FAQ 7: What are sparkline?

Answer A sparkline is a small type of chart that provides a visual representation of data.

FAQ 8: What does Merge Cells means?

Answer Merging means to combine two or more cells in a row or column.

FAQ 9: What is Formatting a Cell?

Answer Formatting a cell means to change the cell color, size, style, alignment etc.

FAQ 10: What is the benefit of a filter?

Answer Filter is used to narrow down the data in a worksheet.

## Test Yourself!

Please mark the correct one from the given options. You can check your answer with the Answer Key at the end of this module.

1. **Shortcut key to save a worksheet:**
  - a. CTRL+S
  - b. CTRL+S+/  
c. CTRL+Y
  - d. None
2. **For Undo an Action:**
  - a. CTRL+Y
  - b. CTRL+Z
  - c. CTRL+U
  - d. None
3. **For merging two or more cells together, use the \_\_\_\_\_ command.**
  - a. Wrap Text
  - b. Merge and Center
  - c. Auto Sum
  - d. None
4. **When a formula contains the address of a cell, it is called a \_\_\_\_\_.**
  - a. Address Book
  - b. Group
  - c. Cell address
  - d. Cell Reference
5. **Worksheets can be \_\_\_\_\_.**
  - a. Name
  - b. Color Coded
  - c. Rename
  - d. All
6. **A cell reference that does not change when copied or filled is called a \_\_\_\_\_.**
  - a. Absolute reference
  - b. Relative Reference
  - c. Concrete Reference
  - d. None
7. **If you want to arrange your data alphabetically then used \_\_\_\_\_.**
  - a. Sort
  - b. Filter
  - c. Alphabetize
  - d. None
8. **To automatically group and summarize the data, you can use the \_\_\_\_\_ command.**
  - a. Auto Group
  - b. Group
  - c. Sub total
  - d. Combine
9. **Use \_\_\_\_\_ to narrow down the data in your worksheet or hide parts of it from view.**
  - a. Borders
  - b. Functions
  - c. Filters
  - d. All
10. **Shortcut key For Redo:**
  - a. CTRL+Z
  - b. CTRL+R
  - c. CTRL+Y
  - d. None

## Answer Key

MCQ Number	Correct Answer
1	a
2	b
3	b
4	d
5	d
6	a
7	a
8	a
9	c
10	c

# Module 4: Prepare Presentation

## Learning Outcomes

After completion of this learning module, you will be able to:

- Prepare Slide Master
- Insert Slide
- Design Slide
- Apply Animation
- Apply Sound Effects
- Format Slide



# Learning Unit 1: Prepare Master Slide

## Overview

Slide Master is a special feature in PowerPoint that allows quick modifications of the slides and sliding layouts in presentation. This learning unit covers the procedure for preparing the Slide Master. After completion of this learning unit, you will be able to demonstrate the procedure for preparing Slide Master orientation and layout of the Slide Master.

### Remember

Every presentation contains at least one slide master.

## 1. Slide Master

A slide master is the top slide that stores information about the theme and slide layouts of a presentation. It includes the **background, color, fonts, effects, and positioning**. By using Slide Master, affects can be added in every slide. Individual slide layouts can also be modified using this feature.

## 2. Key Benefits of Using Slide Master

The key benefits of using slide master is:

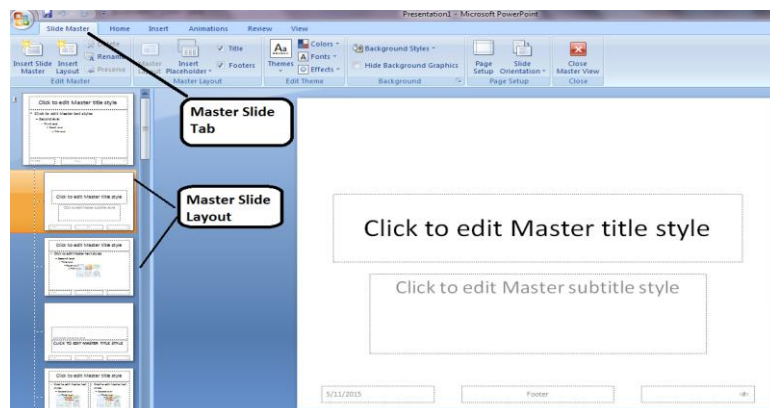
- **Modifying backgrounds:** Using slide master watermark or logos can be added to every slide in a presentation or modify the background graphics of an existing PowerPoint theme.
- **Customizing text formatting:** Using Slide Master, Text formatting can be done in all slides at once rather than formatting text on each slide.
- **Creating unique slide layouts:** Using slide master customized layouts of slides can be possible.

## 3. Creating and Editing a Slide Master

### Creating a Slide Master:

#### Insert a New Slide Layout:

1. Click on the View tab of the ribbon.
2. Click on the Slide Master button
3. Navigate to **Slide Master View**, From the **Slide Master** tab.
4. Click the **Insert Layout** command.



Inserting Slide Master

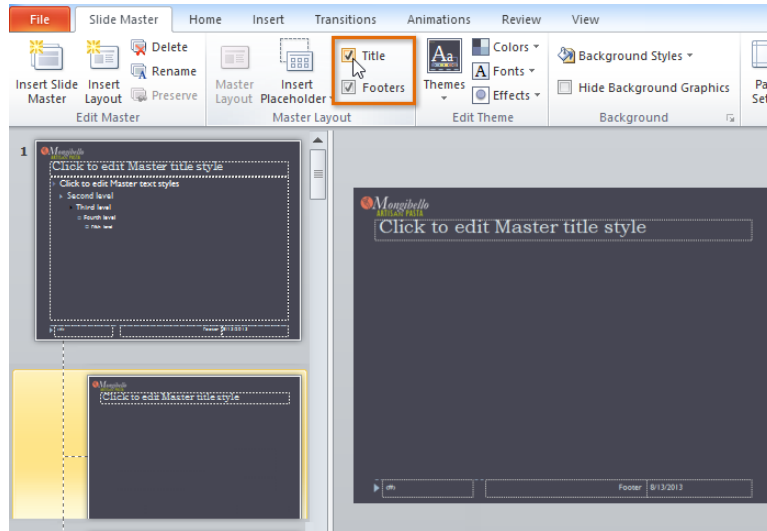
## Customizing the Slide Master

Customizing means changing in pattern and layout of a slide.

### 1. Inserting a New Placeholder

#### Do you know!

Placeholders are the boxes with the dotted borders contain contents.

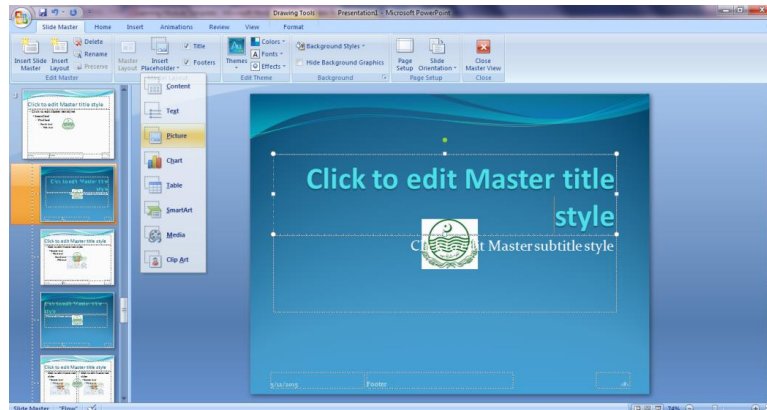


#### Inserting a New Placeholder

1. Click the **bottom half** of the **InsertPlaceholder** command, and then select the desired placeholder type.

#### Do you know!

Placeholder is the area where you can add objects, pictures, charts, textboxes etc.



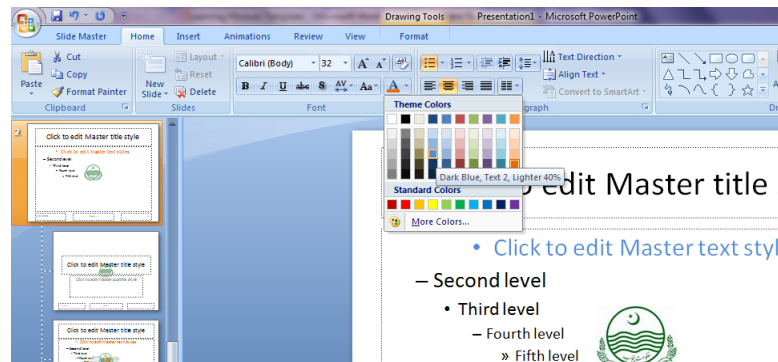
#### Adding Placeholder

2. Click and drag to draw the **placeholder** on the slide. The user can add more placeholders required.

### 2. Changing text color/alignment on Slide Master:

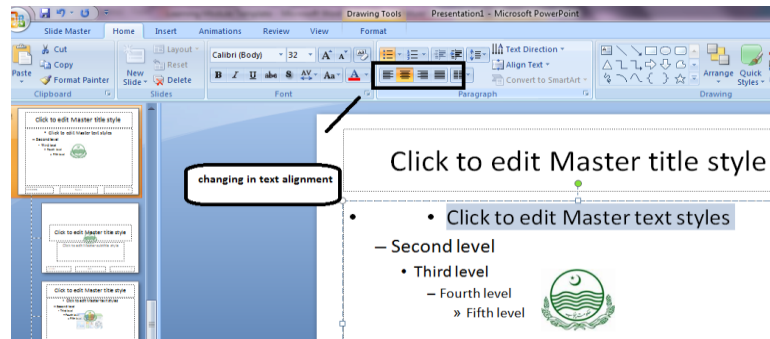
1. Select the **View** tab from the **Menu Bar**.
2. Click the **Slide Master View** command in the Presentation Views group. The Slide Master tab will appear active.
3. Select the **slide master** for all slides, if it is not currently selected.
4. Select the text you want to modify, and format it how you want.

5. Select the **Home tab**. The slide master and supporting layouts will remain in the slide task pane on the left because Slide Master View is the current view.
6. Click the **Font Color** command in the **Font group**.
7. Hover over each font option to display a live preview on the Slide Master.



### Changing Color of a Text in Slide Master

8. Select a **font color** from the **menu options**. The font color change will appear on all the slides in the task pane on the left.
9. Click an **alignment** command to change the alignment of the selected text.



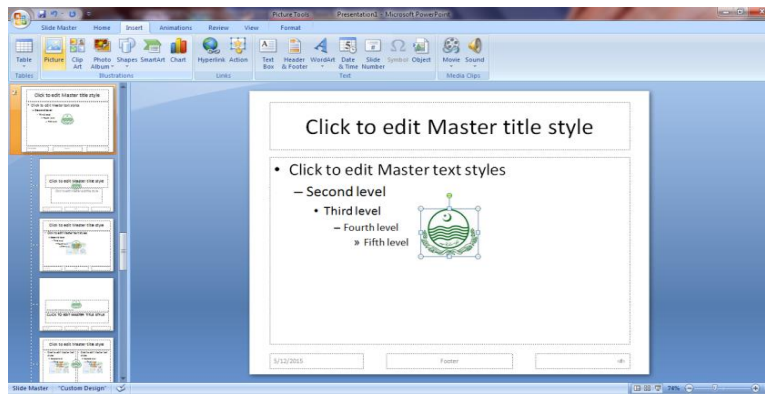
### Changing Text Alignment

10. Click the Slide Show view or **Normal view** command at the bottom of the window to exit **Slide Master View** and see the changes in the presentation slides.

### 3. Inserting Logos & Pictures on Slides:

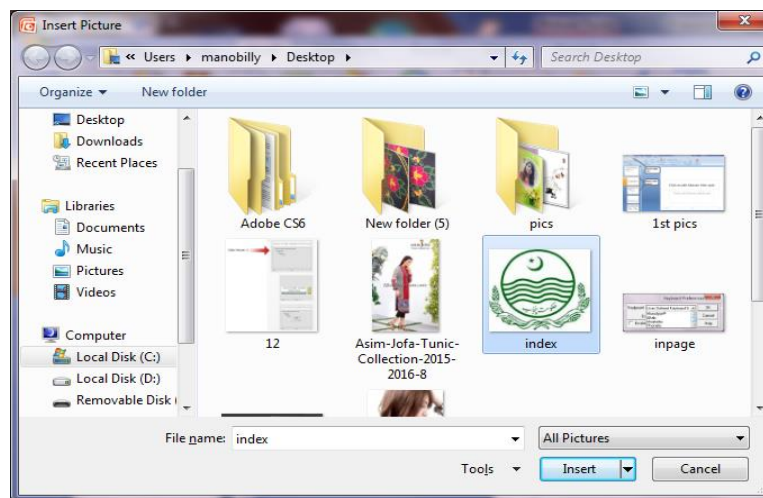
1. Select the **View tab** from **Menu Bar**
2. Click the **Slide MasterView** command in the Presentation Views group. The **Slide Master tab** will appear active.
3. Select the **slide master** for all slides, if it is not currently selected.
4. Select the **Insert tab**.
5. Click the **Picture** command in the Illustrations group. The **Insert Picture** dialog box will appear.





### Inserting a Picture or Logo in a Slide

6. Locate the picture file on the computer.
7. Select the **picture file**.
8. Click **Insert**. The picture will appear on the slide master.

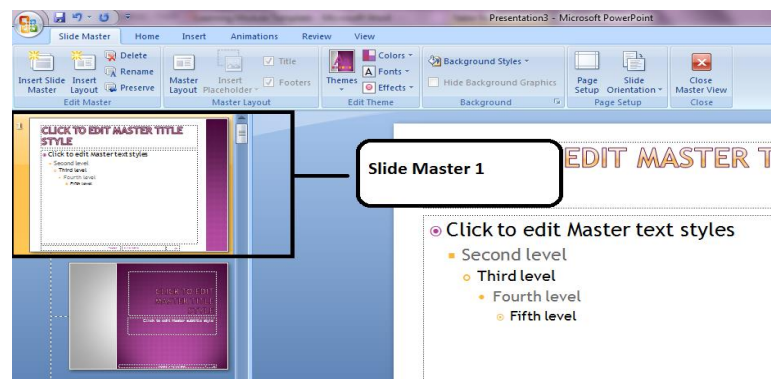


### Locating Pictures

9. Click the **picture** and while holding down the mouse button, drag it to the desired location on the slide. Release the mouse button.
10. The picture will be inserted.

## 4. Use of Multiple Slide Master in a Presentation

To add more than one theme in presentation, it requires multiple slide masters. Each slide master represents each theme. For example, in the image that follows.



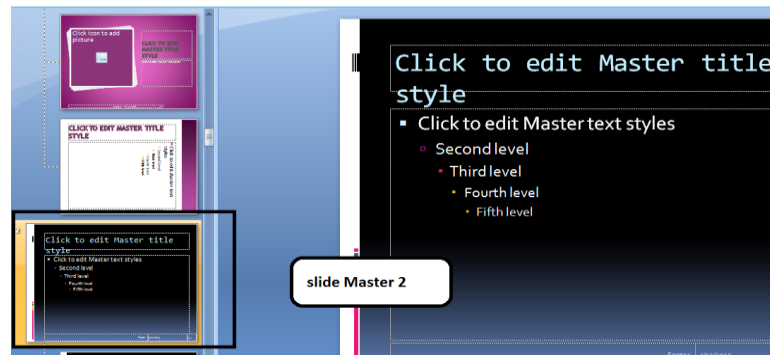
Slide Master 1

**Do you know!**

A slide master can be reuse to another presentation by copying and pasting it.

**Adding another Slide Master to a Presentation**

1. On the **View tab**, click **Slide Master**.
2. On the **Slide Master tab**, do one of the following:
3. From the Edit Theme group, click **Themes**, and then under **Built-in**, select a theme.
4. From the **Edit Master group**, click Insert Slide Master.



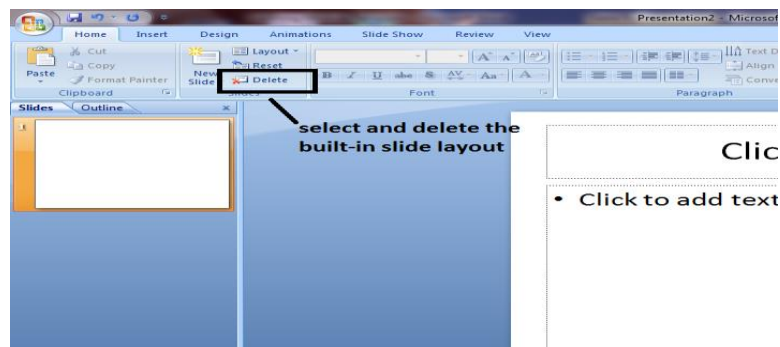
Slide Master 2

In the above image there are two different layouts applied in the same presentation.

**5. Removing Built-in Slide Layouts**

To remove the default layout/built-in layout follow these steps:

1. Select the slide which is to remove.
2. Click on delete button.
3. The slide will be deleted.



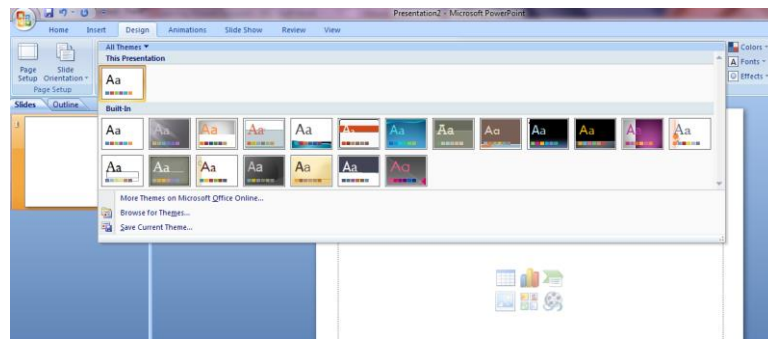
Removing a Slide

## 6. Applying Theme to a Presentation

To apply a built in theme on a presentation following are the steps:

### 1. Applying a Built-in Theme

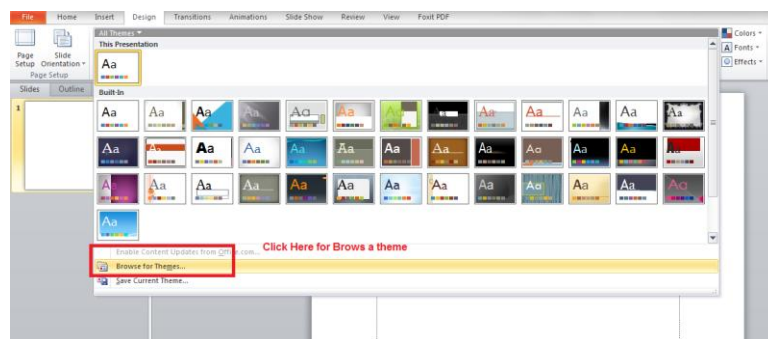
1. Click on the **Design** Tab.
2. Select **Built-In**, click the desired theme.
3. The selected theme will be applied.



Applying Built-in Theme

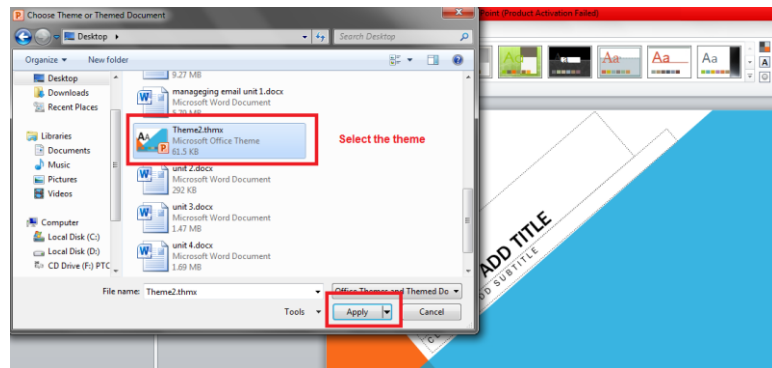
### 2. Applying a Customized Theme

1. Click on the **Design** tab.
2. Click Browse for **Themes**
3. Locate the desired theme.



Browsing a Customized Theme

4. Select themed document stored in a different location.



### Applying a Customized Theme

### 3. Downloading a Theme from Office Online

1. To download free themes from **Office Online**
2. Click More **Themes** on Microsoft Office Online.
3. Select the desired theme and apply.



### Browsing a Theme Online

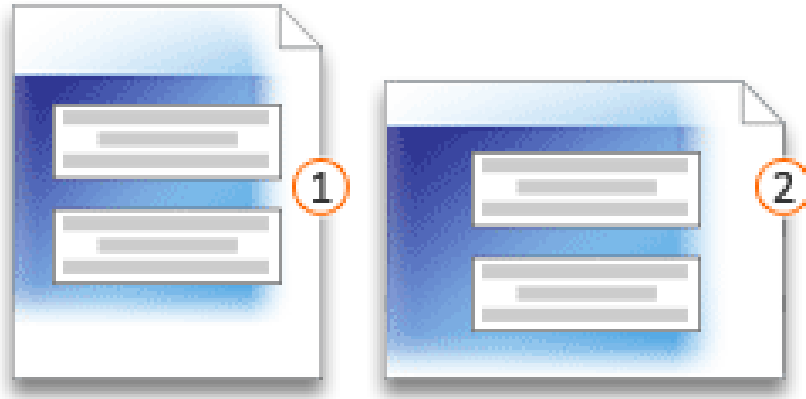
## 7. Applying Page Orientation Settings

Changing the orientation of all slides

1. A presentation can have only one orientation (either landscape or portrait).

### Remember


By default orientation of a page is landscape.



① Portrait page orientation    ② Landscape page orientation

Changing all the slides in a presentation to portrait orientation:

3. Click **Page Setup** from the **File** menu

4. Click **Portrait** . Under **Orientation**.

# Learning Unit 2: Insert Slide

## Overview

This learning unit covers the procedure of inserting slides using different methods in a presentation. After completion of this unit you will be able to demonstrate the procedure for adding slides in a presentation.

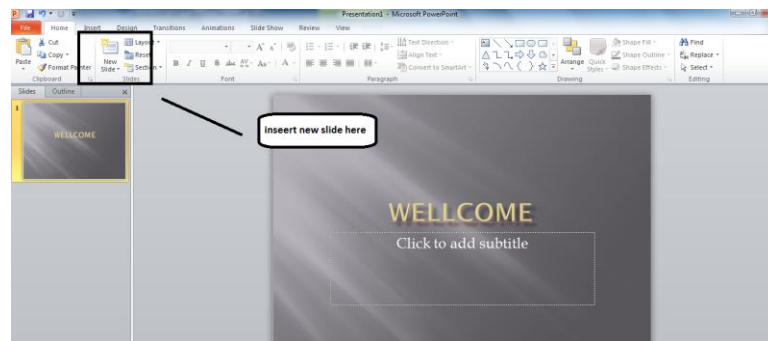
## 1. Add One or More Slides in a Presentation

One or more slides can be added in a presentation easily. Following are the steps:

1. Open Ms Power point.
2. Under the **Home** tab.
3. Click on **New slide**.
4. Select the desired layout of a slide.
5. The slide will be inserted.

### Remember

Duplicate slide can be added by copy and paste the existing slide again.

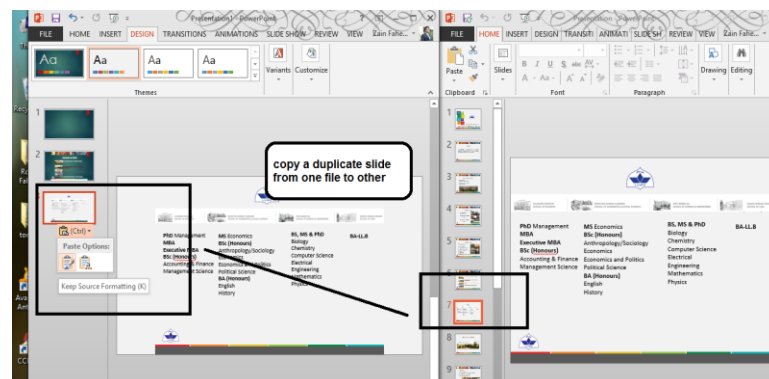


Inserting a New Slide

## 2. Inserting Duplicate Slide to/from other File

A duplicate slide can also be added from any other file with same format.

1. Open both files (source and destination).
2. Click on the slide which wanted to be added on other file.
3. Click and drag the slide and drop it to the destination slide.
4. Save the slide with source file formatting.



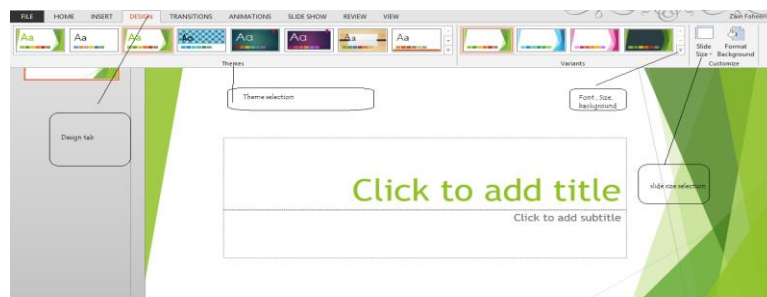
# Learning Unit 3: Design Slide

## Overview

This learning unit will cover the procedure for designing a slide. After completion of this learning unit, you will be able to demonstrate the procedure to design slide and change the design, color, fonts, effects and background etc.

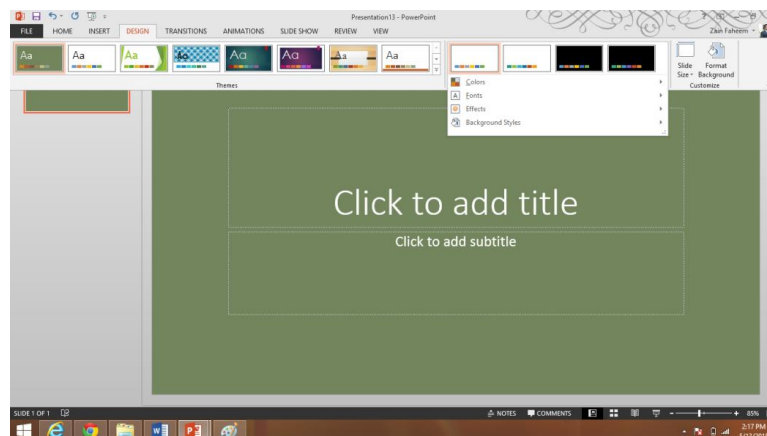
## 1. Creating a Slide Design Template

1. Insert a slide in a blank document
2. Click the **Design** Tab from the **main menu**
3. The design templates have different options.



### Creating a Slide Template

4. Click the **theme** and choose appropriate theme from the available list or add new theme from the saved file.
5. For creation of new theme select **customize Background** option and choose on choice background form the list.
6. Click the **variant** option.
7. Click **Font** and select appropriate Font
8. Click **Color** and select suitable color scheme
9. Click **Background** styles and select desired background
10. Click **Effect** and select appropriate effect
11. Click **size** of the Slide ,it shows two options ,choose one option

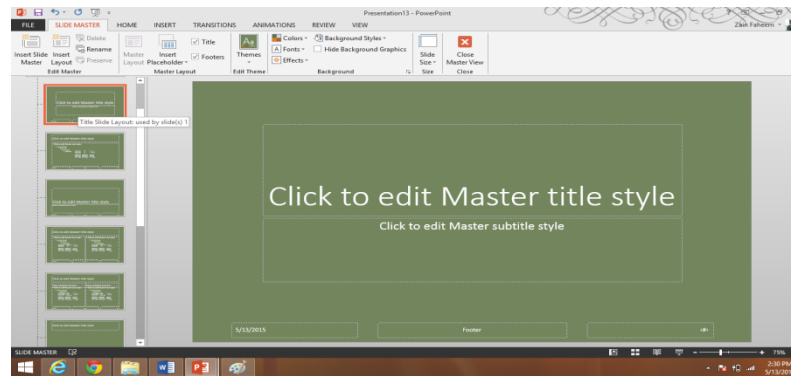


### Inserting New Slide Design

12. Newly created slide deign is shown in the task pane.

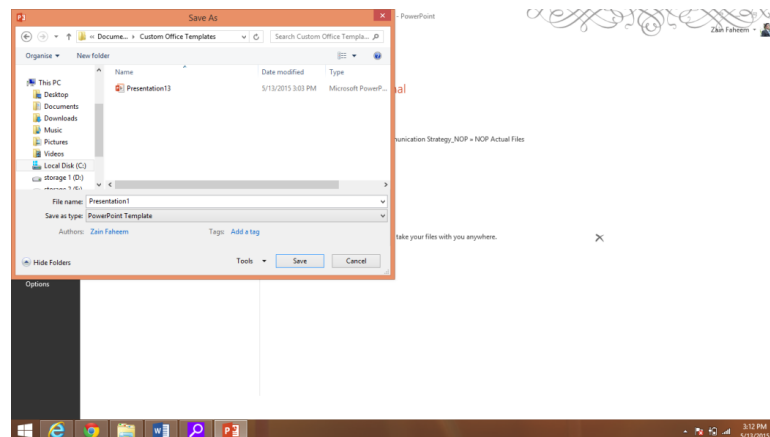
## 2. Switching to Slide Master

1. Click **Slide Master** from the **view tab** on the **menu bar**.
2. The designed slide template is copied to the **Slide Master**
3. This design is automatically applied to all Slides.



## 3. Save as a New Template

1. To save the new template click **File** from the main Menu
2. Select **Save as** option
3. Click  **brows**
4. Click presentation template folder in MS office
5. Select **design template** as the file type
6. Click **save**



Save as a New Template

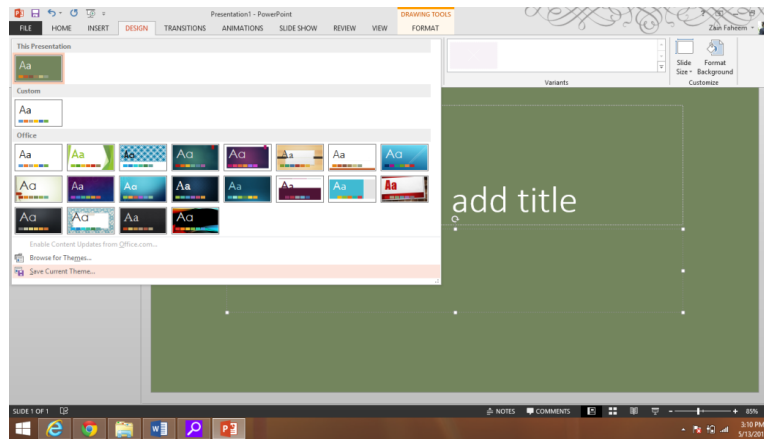
## 4. Save the template in Design Template Folder

1. Open the power point presentation.
2. Open blank slide.
3. Click **design** from **Main menu**.
4. Click **Browse** from themes, select file template saved.
5. Open the saved template that is selected as a design for new presentation.



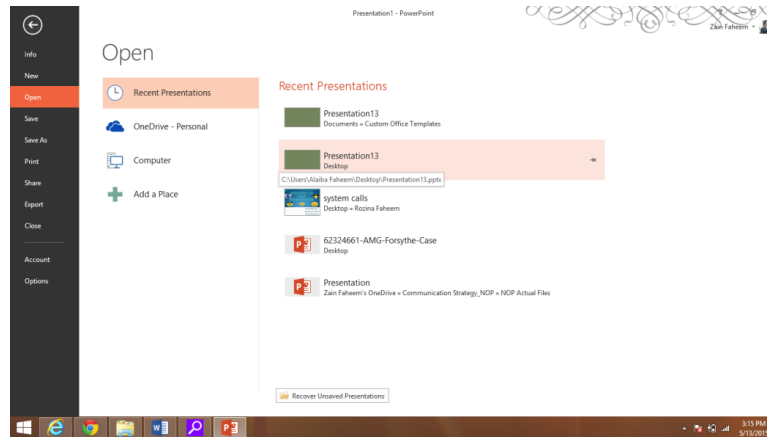
## Remember

When you create a presentation, and then save it as a PowerPoint template file, save it to the template folder



## 5. Save Template in New Presentation Task Pane

1. Click the **new** from file menu
2. Click **recent presentation**
3. Newly created Save template is selected in new presentation



## Save the Template in Templates Folder

# Learning Unit 4: Apply Animation

## Overview

Animations are visual effects applied to individual items on the slide such as graphics, titles or bullet points. Animation can help to make a PowerPoint presentation more dynamic, visually interesting, automation and to grab the audience's attention. The most common types of animation effects include entrances, exits, emphasis and motion paths

## 1. Meaning and Usage of Animation

Animations in MS Power point refers to the way that items, such as text boxes, bullets, or images move onto a slide during a slideshow.

### Types of Animations:

- **Entrance effects:** Make an object fade gradually into focus, fly onto the slide from an edge, or bounce into view.
- **Exit effects:** Making an object fly off of the slide, disappear from view, or spiral off of the slide.
- **Emphasis effects:** Making an object shrink or grow in size, change color, or spin on its centre.
- **Motion Paths:** Make an object move up or down, left or right, or in a star or circular pattern (among other effects).

### There are many uses of animation in PowerPoint.

- Animation move individual options onto or off of the slide.
- Can reveal points on slides in a staggered way (i.e. one bullet displayed at a time) to keep the audience focused only on the point.
- Can automate the presentation so it runs on its own.
- Can use animation to focus on important points, to control the flow of information.
- Can increase viewer interest in presentation.
- Can communicate messages or ideas more effectively.

#### Remember

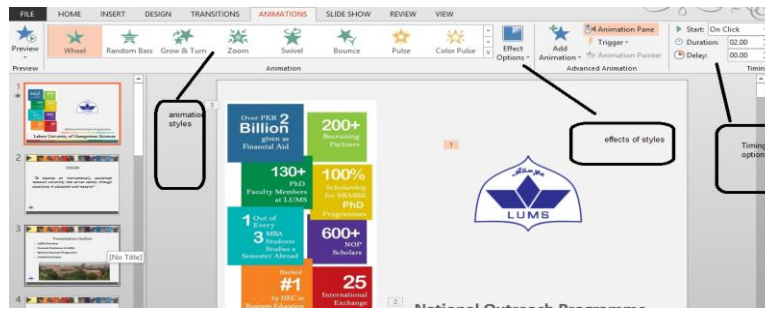
Too much animation can be distracting.

## 2. Applying an Animation to Slides

1. Select the **text** or **object** to apply animation
2. Click the **Animations** tab from main menu
3. Click an animation effect from the **Animation** group gallery.
4. Click the **More** arrow to see more options
5. Animation Applied to the object.
6. Click **Effect Options** and select the effect to, how animation have effects.
7. To specify the timing of the effects, on the **Animations** tab, use the commands in the **Timing** group.

**Do you know!**

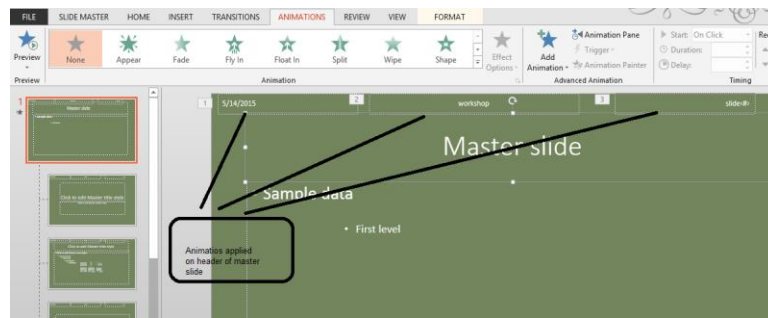
Previously selected an animation for an element on the page, the animation will be shown automatically.



**Apply Animation to Slide Master**

Apply the animation to the Slide Master and it will appear on all slides.

1. Open presentation in PowerPoint
2. Click **Slide Master** from the **View** tab
3. Click the main text box that contains the bulleted list On the Slide Master.
4. Click the **Animations** tab.
5. Select the animation that for the list.
6. Click **Custom Animation**,
7. Click **Add Effect**, click **Entrance**, and then click **Blinds**.
8. Click the **View** tab, and then click **Normal**.

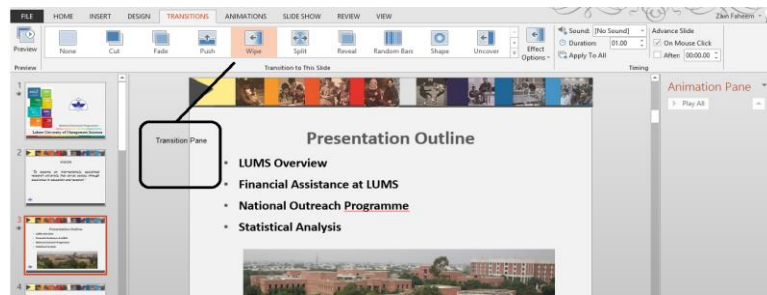


**Animations Applied to Slide Master reflects in all the Slide**

**Applying Transition to a Slide**

Slide transitions are like the effects used in films to change from scene to scene.

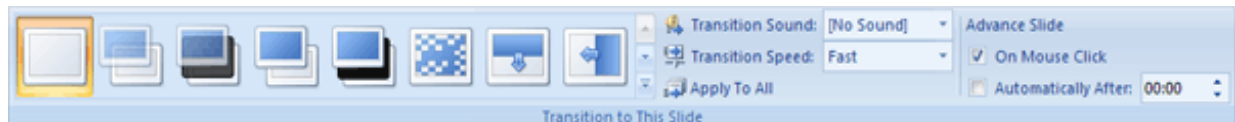
1. Select the Slide
2. Choose an effect from the **Transition gallery** In the **Animations tab** under the **Transition to This Slide group**.
3. Use the arrow to scroll through the options. PowerPoint will show a preview of the transition when mouse is over a gallery item.



### Applying Transition to a Slide

To set the speed of a transition,

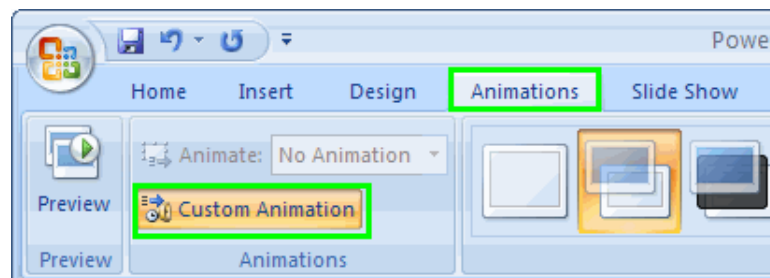
1. Select a speed from the **Transition Speed** pull-down menu.
2. To apply transition settings to all of your slides, click **Apply to All**.
3. To set the clicking option
4. Clicking the mouse of the "**On Mouse Click**" option is checked.



### 3. Perform Custom Animation on one Slide

A custom animation allows you to consider the objects or the text boxes in a slide, one at a time, and to animate them as desired by the person not as given in the software.

1. Select the slide to which the animation is to be applied.
2. Select the **Animations** tab and the **Animation Pane** button from the **Main menu**. The **Animation Pane** appears on the right side of the screen.



Click on an element of the slide that is to be animated.

For example, select a title, bulleted list, or graphic.

5. Click **Add Effect**.

A menu appears with a list of effect categories.

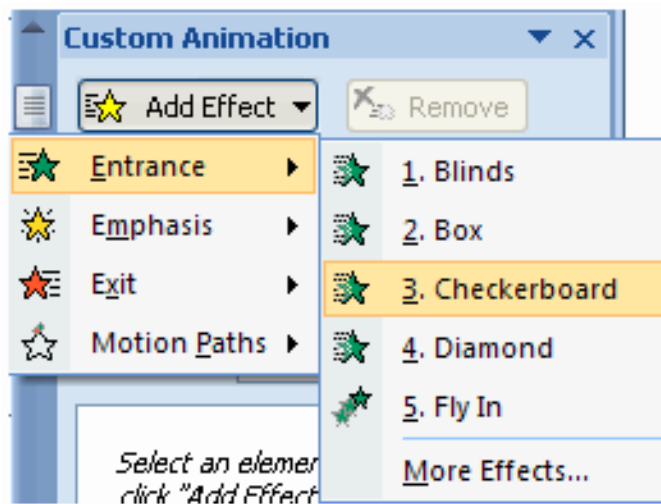
6. Entrance effects control how the element enters the slide.
7. Emphasis effects make the element do something after it enters the slide.
8. Exit effects control how it leaves the slide.
9. Motion paths allow you to specify where the element travels on the slide.

#### Do you know!

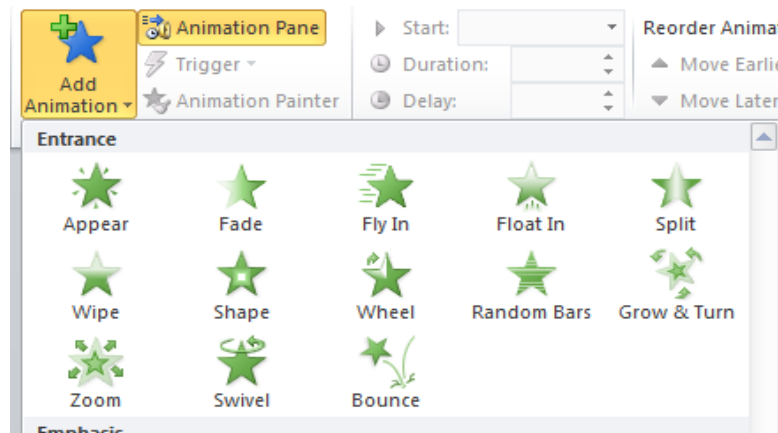
Quick method to change speed of PowerPoint animation set the precise speed of next slides.

**Remember**

Animation pane allows viewing and managing all the effects on the current slide.



10. Select one of the effects. Details about the effect appear in the **Animation Pane**.
11. In the **Start** field, use the drop-down menu to select an event which will trigger the animation.
12. In the **Direction** field, use the drop-down menu to select a direction for the animation. The significance of the direction depends on animation type.
13. In the **Speed** field, use the drop-down menu to select a speed for the animation.



## 4. Applying Custom Animation to all Slides

To apply a custom animation to all slides

1. Click the **Slide Master**.
2. Click custom Animation
3. Custom Animation will be applied to all slides

# Learning Unit 5: Apply Sound Effects

## Overview

Sound is the special feature in Power point to make a presentation more attractive and effective. This learning unit covers the procedure of applying different types of sounds on a presentation. After completion of this unit you will be able to demonstrate the uses of sounds its types and procedure of applying sound effects in your presentation.

### Remember

Sounds can be added from a CD or a recorded voice.

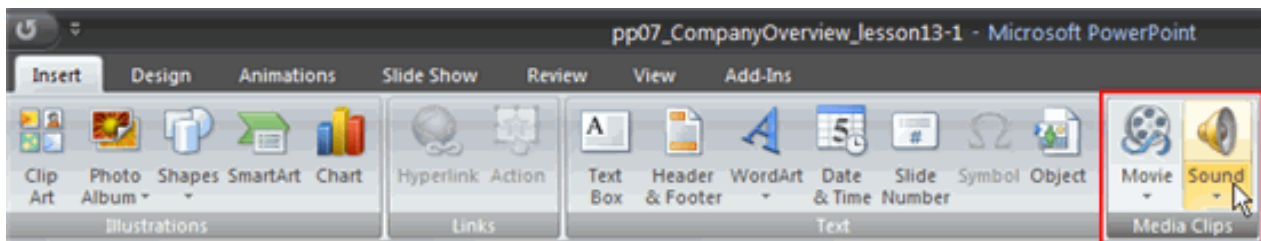
## 1. Using Sound Effects in Presentation

PowerPoint allows adding sound in a presentation using different methods. This can be done by using a **sound file from computer**, choosing from hundreds of sounds available through the **clip organizer**, or playing tracks from an **audio CD** or from a recorded voice. **Customized** and **Built –in** sound effects can be added to a presentation.

Sound can be added from three different sources.

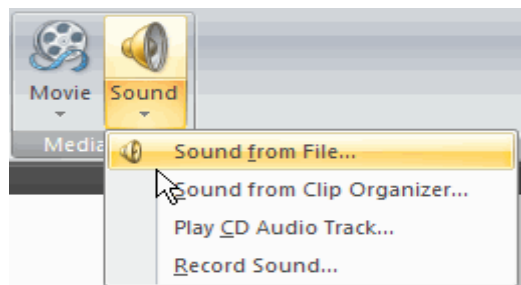
### Inserting a Sound File from Computer:

1. Select the slide where the sound will be added.
2. Select the **Insert** tab.
3. Click the drop-down arrow on the **Sound** command in the Media Clips group.



### Inserting Sound Clip

4. Select **Sound from File** from the menu. The Insert Sound dialog box will appear.

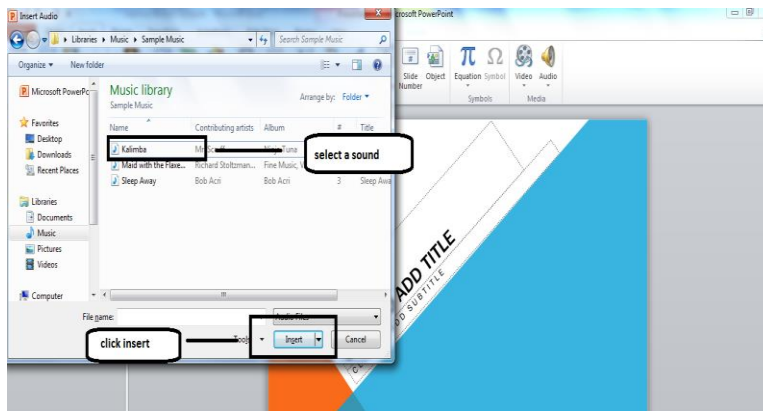


### Selecting Sound from File

5. Locate the sound file on computer.
6. Select the file.

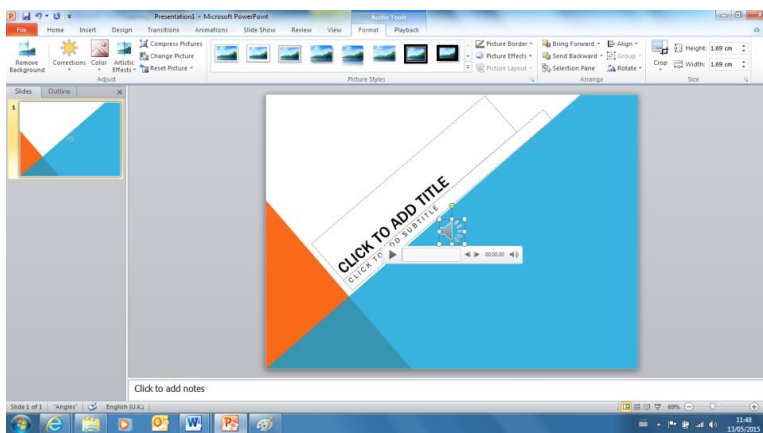
**Remember**

To repeat a sound until you stop it, or to play it for the duration you need to specify to options.



**Selecting File**

8. Click **OK**. A sound icon and a dialog box will appear.

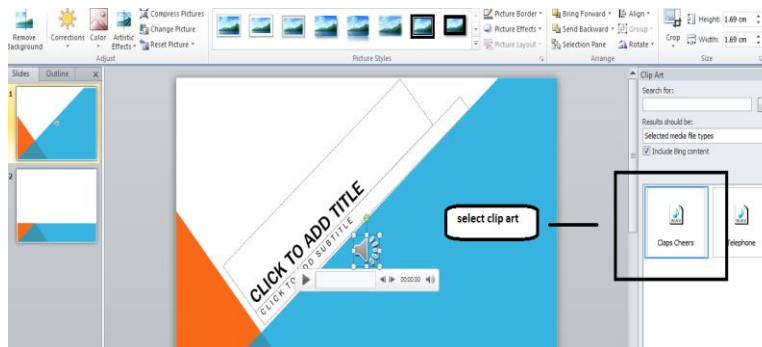


**Inserting a Sound File from Clip Art**

**Do you know!**

You can add a song a clip or a recorded voice to your presentation.

1. Select the **Insert** tab from Menu bar.
2. Click the drop-down arrow on the **Sound** command in the Media Clips group.
3. Click on **Clip art audio** option.
4. Select any of the **clip media** from the list like **claps cheers, telephone** etc.

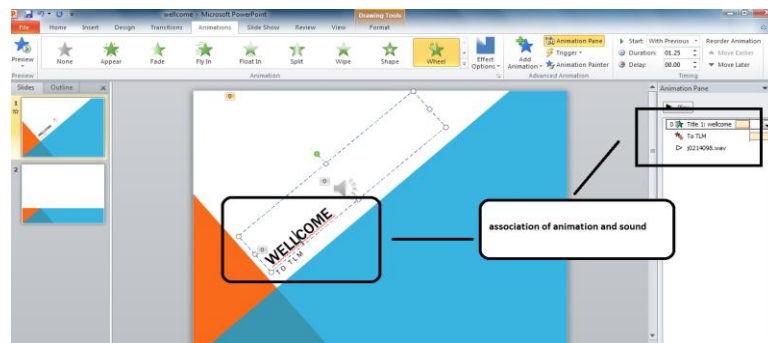




## 2. Association of Animation with a Sound Effects

A sound can also be added to any animation also. For example if you want to play a sound at any specific animation you can easily applied a sound to it. For this purpose following are the steps.

1. Select the desired object.
2. Click on **Animation tab**.
3. Apply the desired **animation** on the selected object.
4. Then click on **Insert tab**.
5. Click on **Audio** button. Select the desired method through which sound will be applied.
6. Select the **sound**.
7. A sound icon will appear on slide.
8. Set the properties for its application on slide from the **playback** tab on **Menu bar**.
9. The sound will be added to animation.



Association of Animation and Sound

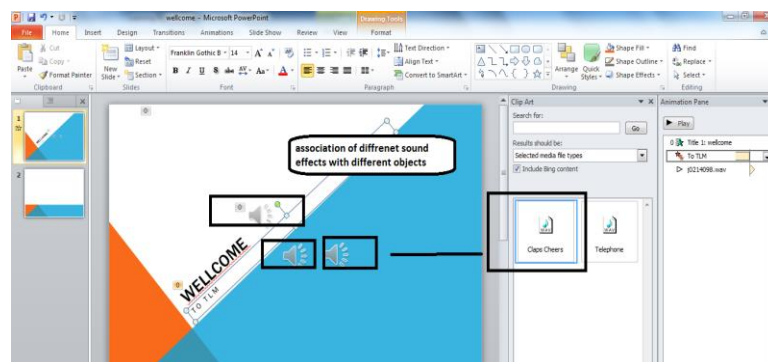
## 3. Association of Different Sound Effects with Different Slides

In power point different sound effects can be added to different objects. For example you can add different sound effects at each slide in a presentation.

1. On a **slide** select the **object** at which sound will be added.
2. Click on **insert** tab then click **sound button**.
3. Select the method through which you want to add sound.
4. Select the and apply it.
5. Repeat the steps for all the desired objects at which the sound will be added.
6. Set the properties of the sound from **playback** tab on **Menu bar**.

**Do you know!**

Sounds can be associate with different objects in a presentation.



Association of Animation with Different Sound





# Learning Unit 6: Format Slide Master

## Overview

Formatting in slide is changing the color, size, style, design of slide. This unit will cover the procedure of formatting a Slide Master. After completion of this, You will be able to demonstrate the procedure of formatting a Slide Master in different ways.

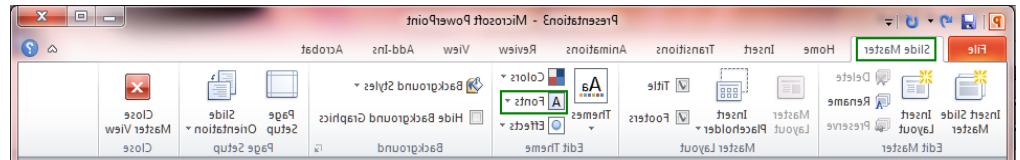
## 1. Formatting Master Title

### Formatting Master Title Text

#### Remember

Formatting relates to the objects properties like changing the size, color, font, style and alignments of a text or objects.

1. Click on the **master title** style to select it.
2. From the **Slide Master** tab, select the **Fonts dropdown** in the Edit Theme area.



3. Select the desired font, **font style**, **font size**, **effects**, and **color**.
4. Click OK when finished selecting the font attributes for the title style.
5. Click elsewhere on the slide to deselect the title style and view the font formatting.
6. Repeat the steps as needed.
7. Select each text style and follow steps 2 through 6 to format the appearance of the text.

## 2. Formatting Slide

### Opening Slide Master

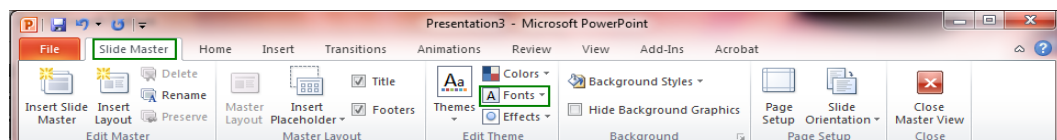
1. From the **menu**, select the **View** tab.
2. Select **Slide Master**.



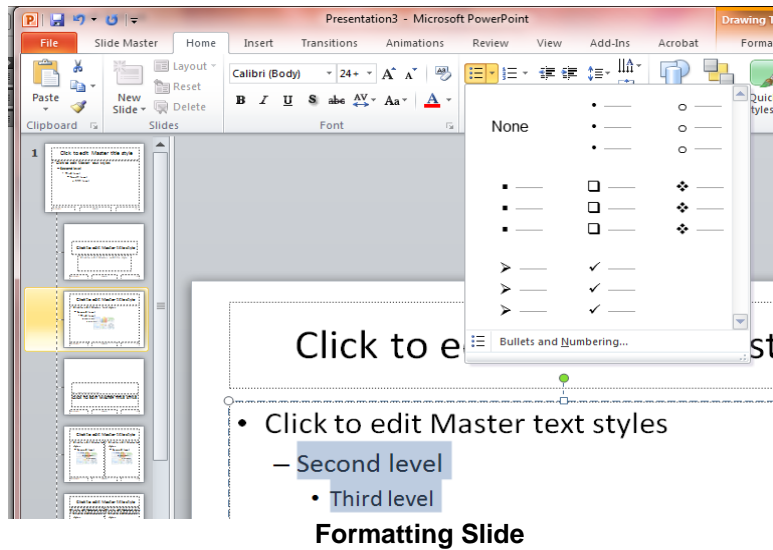
3. A new **Slide Mastertab** will automatically appear.

### Formatting Text

1. Click on the master title style to select it.
2. From the **Slide Master** tab, select the **Fonts dropdown**.



3. Select the desired font, font style, font size, effects, and color.
4. Click **OK**.
5. Repeat the steps as needed.
6. To change the **bullets** for each level of text, click on the text to select it and from the **Home tab**, expand the **Bullets and Numbering** menus.



**Do you know!**  
You can change the type of bullets like images or any other format from symbol according to your need.

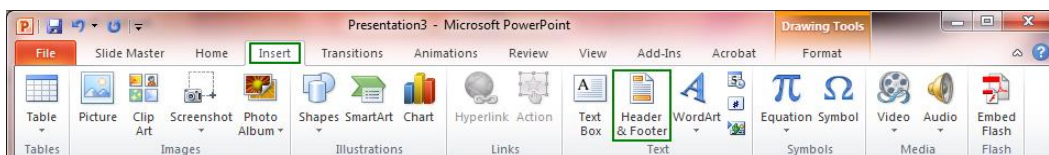
### Moving and Resizing Text Areas

1. Click on a **text area**. A **border** appears with resize handles.
2. To resize the **text area**, click and drag a resize handle while keeping the mouse clicked. A **dotted line** shows the new size of the area.
3. To move the **text area**, move the mouse pointer over the text area. The mouse pointer becomes a four-headed arrow.
4. Click and drag the text area to a new location.

### Working with Footers and Special Placeholders

The Slide Master contains **placeholders** for date/time, **slide number**, and **footer**. These can be moved around, resized, and reformatted.

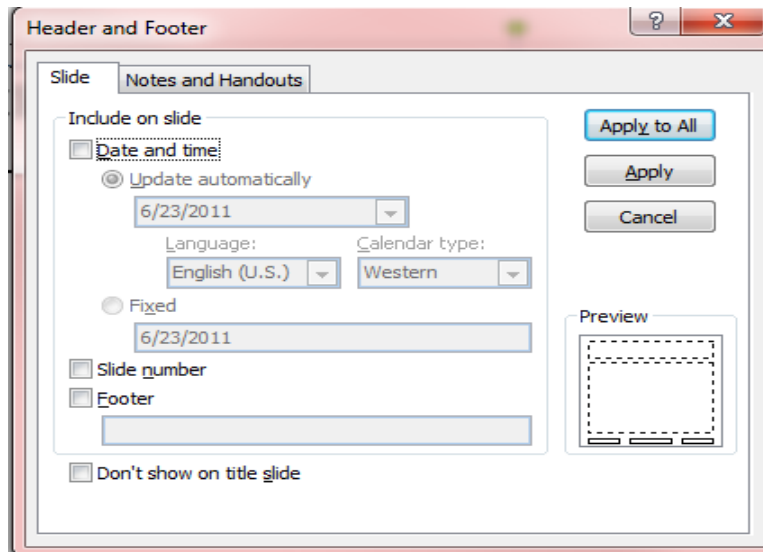
1. From the **Menu bar**, select the **Insert tab**.
2. Then select **Header and Footer**.



3. The Header and Footer box appear.

**Do you know!**

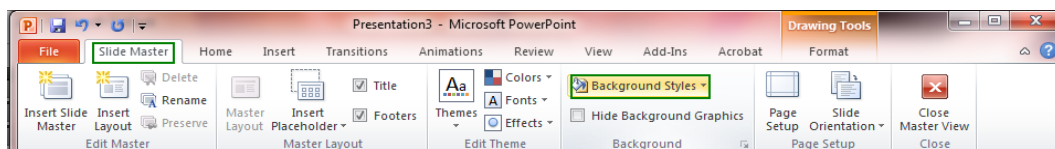
Header footer can be applied by double clicking on the header or footer place.



4. Click on the **Slide number** check box if the slides wanted to be numbered.
5. Type text in the **Footer** box if it desired.
6. Click the **Don't show on title slide** check box if it does not want the placeholders to appear on the title slides.
7. By default, the date/time does not appear even though the placeholder is turned on. This is because **Fixed** is the default setting and the **Fixed** box is blank.
8. To make the date/time appear, type the date in the **Fixed** box or click Update automatically to set up an automatic date/time on each slide. Click the drop down menu to select the desired date/time format.
9. Click **Apply to All** to apply the footers and placeholders to all slides.

**Changing the Background**

1. From the menu bar, select the **Slide Master** tab.
2. Then select **Background >Background Styles**.dropdown menu. The Background window appears.

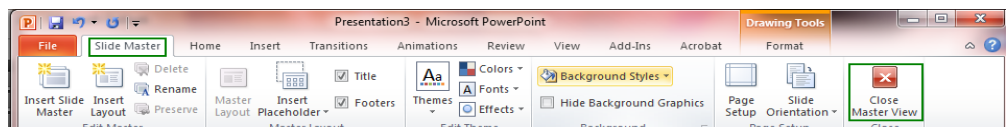


3. Select a predefined color.
4. Color selections can be previewed before applying.
5. Click to apply the background selection to the slide master.

**Return to Normal view****Remember**

Normal view is where you will work most frequently to create your slides.

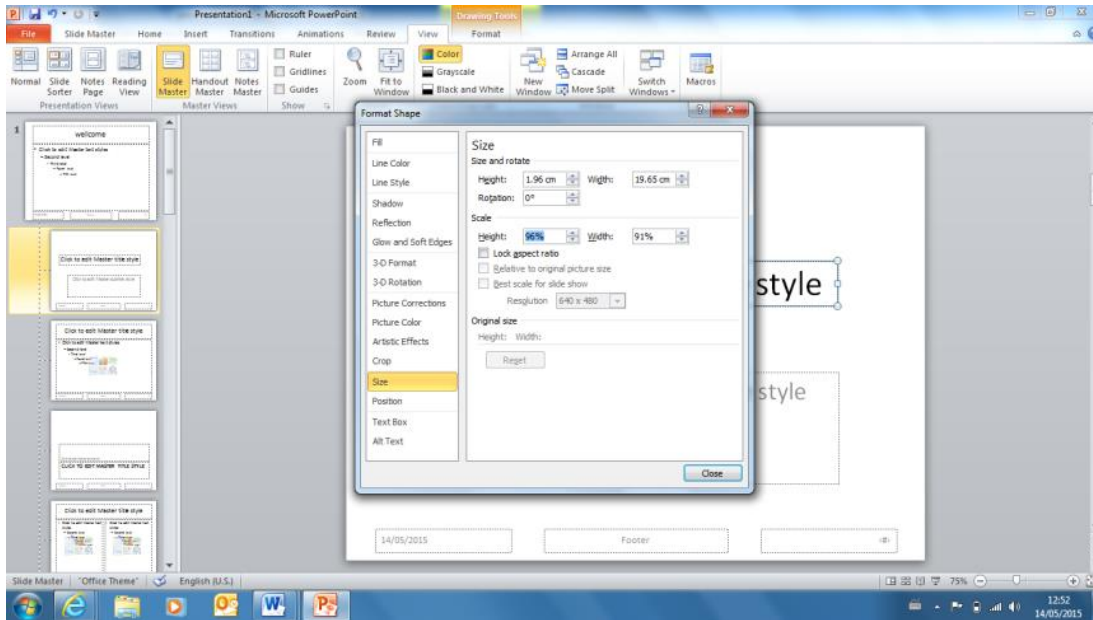
1. After defining slide master formats, return to the normal view. **Close Master View** from the ribbon.



### 3. Delete or Change Properties of a Slide Format

A slide formatting can also be customized. For example if you want to change the size of a text box or color of a text then you can customize its properties.

1. Select the object.
2. Right click then go to the **Size and position** option.
3. Change the desired properties.
4. Click ok.



**Change the Properties of Slide Format**

## Learner's Activities

**Description** This learning activity consists of an interactive session in the class about the importance of Slide Masters and how to apply and customize these Slide Master view in PowerPoint presentation

**Time** 40 minutes.

**Purpose** To highlight the importance of Slide Masters and their use in PowerPoint.

**Instructions for Learner**

1. Ask learners how to apply customize Slide Master.
2. Ask learners are they able to add another slide to a Slide Master from other presentation.
3. Ask learners are they able to create their own Slide Master.

**Description** This learning activity consists of an interactive session in the class about Custom animation and transition to apply effects on presentation for making it more attractive and effective.

**Time** 40 minutes.

**Purpose** To highlight the importance of animation and transition in PowerPoint.

**Instructions for Learner**

1. Ask learners how to apply customize animation.
2. Ask learners are they able to apply animation and transition to slides.

## Summary of Module

- Microsoft PowerPoint is the software that incorporates with images, sounds, videos, text, and charts to create an interactive presentation.
- A slide master is the top slide that stores information about the theme and slide layouts of a presentation. It includes the background, color, fonts, effects, and positioning.
- Most PowerPoint presentations are created from a template, which includes a background color or images, fonts and slide layouts.
- A design template is created so that even though different slide types can have different layouts and graphics.
- Animation can help to make a PowerPoint presentation more dynamic, visually interesting, automation and to grab the audience's attention.
- Sound is the special feature in PowerPoint to make a presentation more attractive and effective.
- Formatting in slide is changing the color, size, style, design of slide.
- Transitions are the motion effects that add movements to the slide show when it is viewed.
- Animations can be applied to text, images, shapes, and graphics so they play in slide show.
- A PowerPoint template is a pattern of a slide or group of slides that contains layouts, themes, colors, theme fonts, theme effects, background styles and contents also.

## Frequently Asked Questions (FAQs)

FAQ 1: Name the different tabs in PowerPoint?

Answer File, Home, Insert, Design, Animation, Slideshow, Review, and View

FAQ 2: What is the Ribbon in PowerPoint?

Answer The Ribbon consists of tabs, Each Ribbon has group of commands.

FAQ 3: What is slide master view?

Answer Slide master view allows to quickly modifying the slide layouts in presentation.

FAQ 4: What is animation?

Answer Animation is a set of effects which can be applied to objects in PowerPoint so that they will animate in the slide show.

FAQ 5: What are the methods of applying sound effects in a presentation?

Answer There are three methods to add sound in a presentation.  
1. Insert from File, 2. Insert from record sound 3. Insert from a CD audio track.

FAQ 6: What is a slide in a presentation?

Answer Slide is a single page of a presentation created with software such as PowerPoint.

FAQ 7: What is a slide show?

Answer Slide show is a collection of pages arranged in a sequence that contain text, images for presenting to the audience using a display device like projector.

FAQ 8: What are the charts in PowerPoint?

Answer PowerPoint includes many types of charts for graphically representation of data i.e. Line chart, Pie chart, scatter chart, etc.

FAQ 9: What is the extension of PowerPoint file?

Answer The extension of PowerPoint files are .ppt and .pptx

FAQ 10: What is the shortcut key for playing a slide show?

Answer The shortcut key for playing a slide show is F5.



## Test Yourself!

Please mark the correct one from the given options. You can check your answer with the Answer Key at the end of this module.

1. **To insert logo in the same position on every slide, automatically, Insert it on the \_\_\_\_\_.**
  - a. Handout Master
  - b. Notes master
  - c. Slide master
  - d. All of the above.
2. **Special effects used to introduce slides in a Slideshow are called \_\_\_\_\_.**
  - a. Effects
  - b. Custom animation
  - c. Transitions
  - d. Present animation
3. **What is the shortcut key for saving a PowerPoint presentation?**
  - a. CTRL+R
  - b. CTRL+S
  - c. CTRL+O
  - d. None
4. **PowerPoint presentations are widely used as \_\_\_\_\_.**
  - a. Note outlines for teachers
  - b. Project presentation by students.
  - c. Communication of planning.
  - d. All of the above.
5. **To add more text to a slide add \_\_\_\_\_.**
  - a. Text box.
  - b. Contents control
  - c. Picture box
  - d. None
6. **A theme includes all of the following except \_\_\_\_\_.**
  - a. Fonts
  - b. Clip art
  - c. Colors
  - d. effects
7. **An images can be added to the presentation from the \_\_\_\_\_ tab.**
  - a. Insert
  - b. View
  - c. Home
  - d. File
8. **A \_\_\_\_\_ is the motion effect on slide when one slide changes to another in a slide show.**
  - a. Transition
  - b. Animation
  - c. sound
  - d. None
9. **A presentation can be presented by selecting the \_\_\_\_\_ view at the bottom of the PowerPoint window.**
  - a. Reading View
  - b. Normal view
  - c. Slide show
  - d. None
10. **All of the following is a type of animation except \_\_\_\_\_?**
  - a. Entrance
  - b. Equation
  - c. Emphasis
  - d. Exit

## Answer Key

MCQ Number	Correct Answer
1	c
2	c
3	b
4	d
5	a
6	b
7	a
8	a
9	c
10	b

# Module 5: Prepare In-Page Documents

## Learning Outcomes

After completion of this learning module, you will be able to:

- Set Keyboard Preferences
- Layout Page
- Toggle Between Languages
- Insert Columns



# Learning Unit 1: Set Keyboard Preferences

## Overview

From keyboard preference you can either select one of the predefined keyboards (Monotype, Farsi, Kashmiri, Kurdish, Aftab, Muqtadra, Phonetic, Farsi, and Arabic) or make your own keyboards (up-to eight User Defined Keyboards). Predefined Keyboards cannot be modified whereas you can modify User Defined Keyboard according to your need. In this learning unit, you will learn how to set the keyboard preferences.

### Do you know!

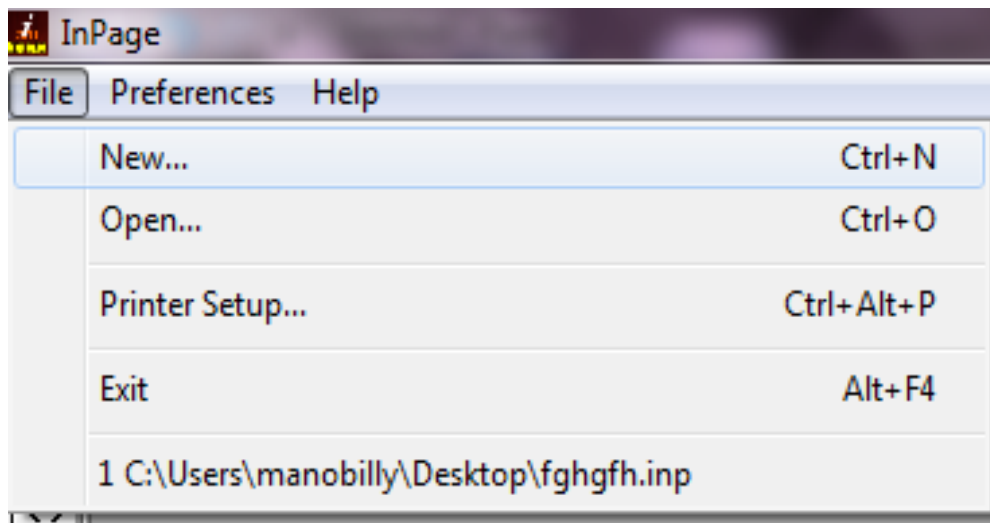
By Default the keyboard is set to Phonetic.

## 1. Method to Switch between Different Input Languages

Using the “**keyboard preferences**” menu item, you can select from one of the predefined keyboards or from a list of eight **User defined Keyboards** and modify it as per your requirements.

## 2. Setting Keyboard Preferences

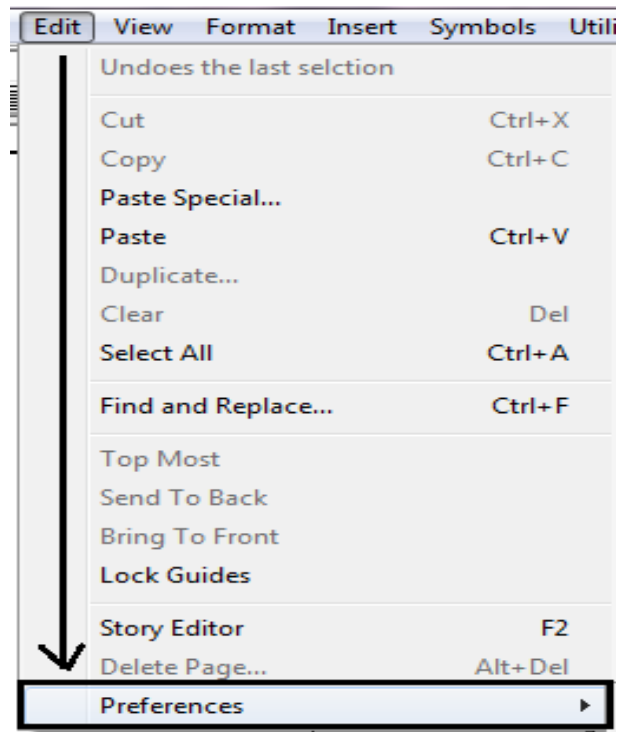
The procedure of setting keyboard preferences has the following steps:



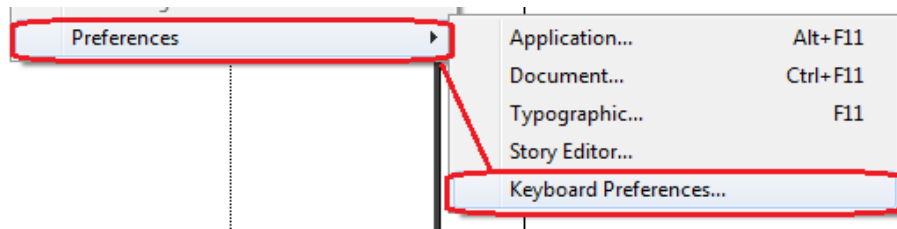
### Do you know!

There is a support of up to Eight User Defined Keyboards in In-Page Professional whereas other versions of In-Page have support for only one. User Defined Keyboard.

1. Open the new In-page file.



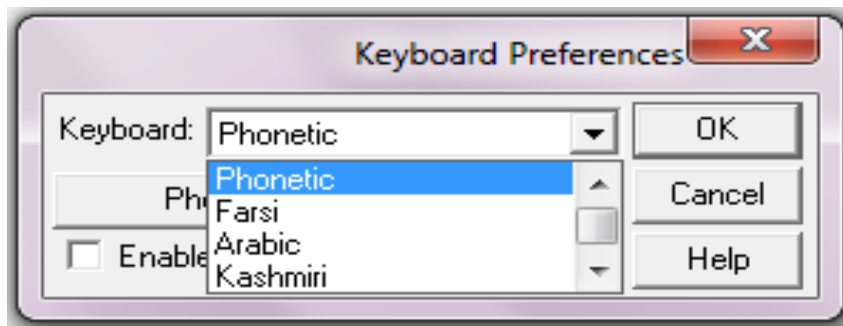
2. Click on the “**Edit Menu**” from Menu bar.



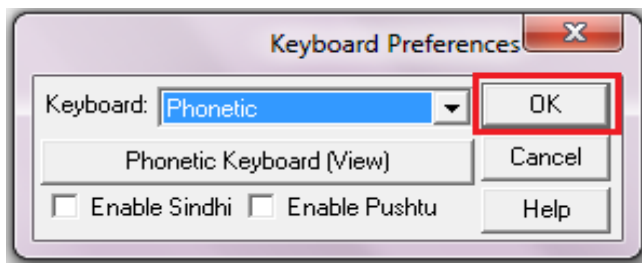
3. Click on the option “**Preferences**” and then select the keyboard preferences.

**Remember**

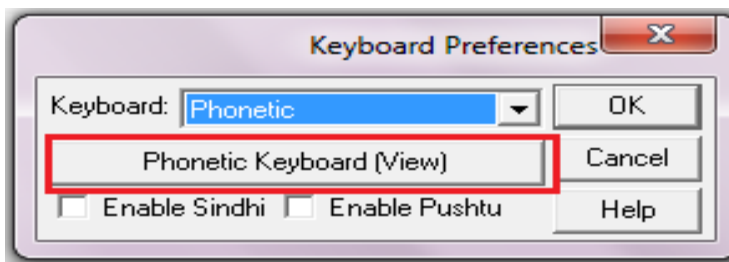
You can find out which language is currently enabled by looking at the language information in the bottom right of your In-Page window.



4. Select the **Keyboard** from the combo box



5. Click on “OK” button.

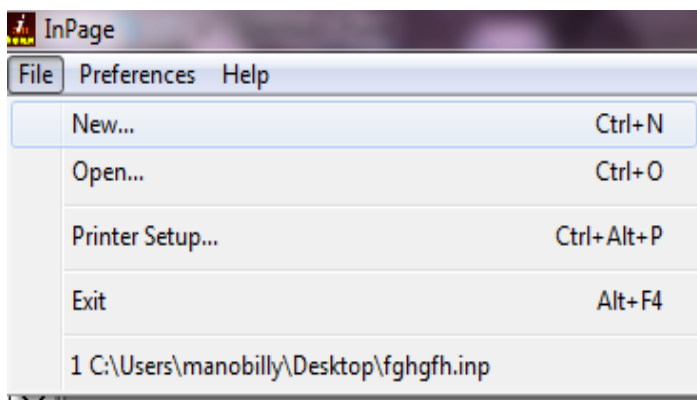


6. If you have selected one of the fixed keyboards, you can use the **View** button under the combo box to view or print the selected keyboard.

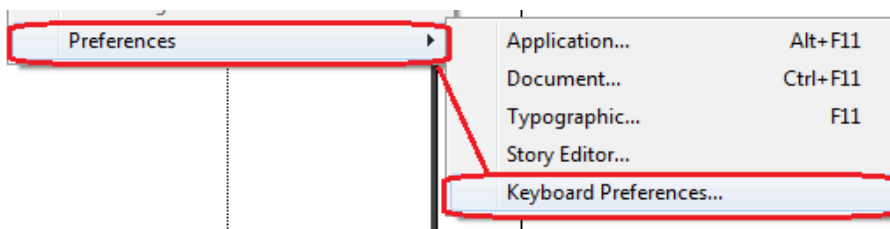
### 3. Key Positions of Selected Keyboard Preferences

The difference between key positions of any keyboard preferences can be illustrated by the following steps.

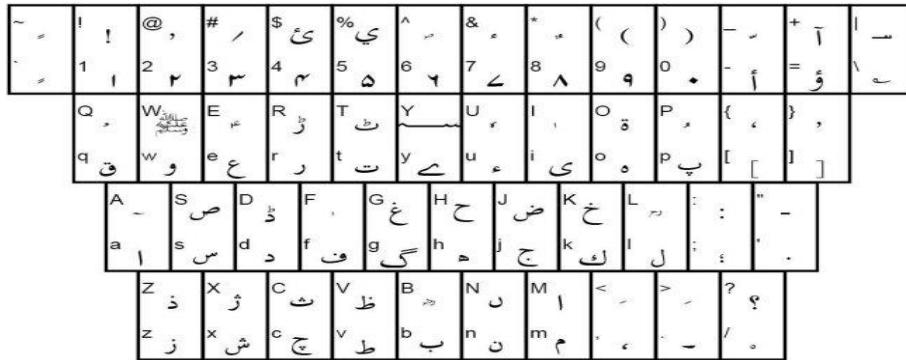
#### Setting up Phonetic Keyboard:



1. Open the new In-Page file.

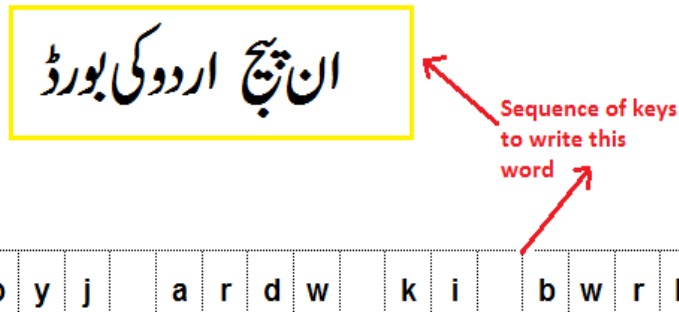


- Set the Keyboard preferences to **Phonetic**.



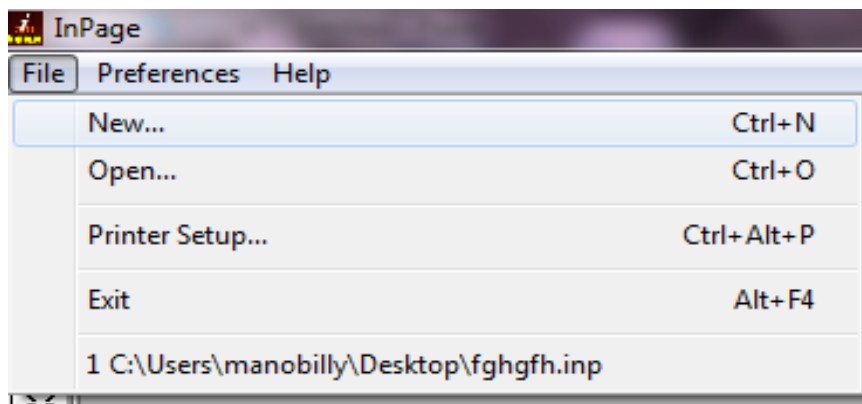
- Phonetic keyboard has the following key positions.

### Phonetic Keyboard key position



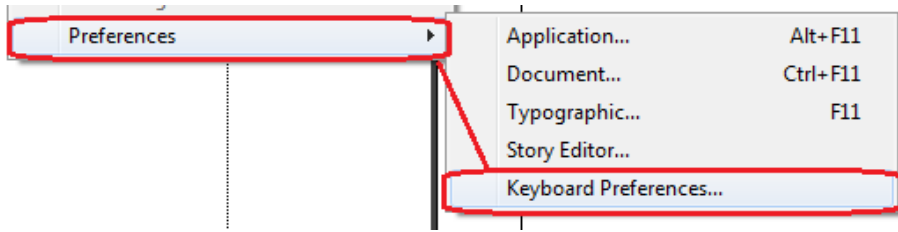
- Type “**INPAGE URDU KEYBOARD**” in Urdu language. Above example shows the key positions in the phonetic keyboard.

#### Setting up Monotype Keyboard:

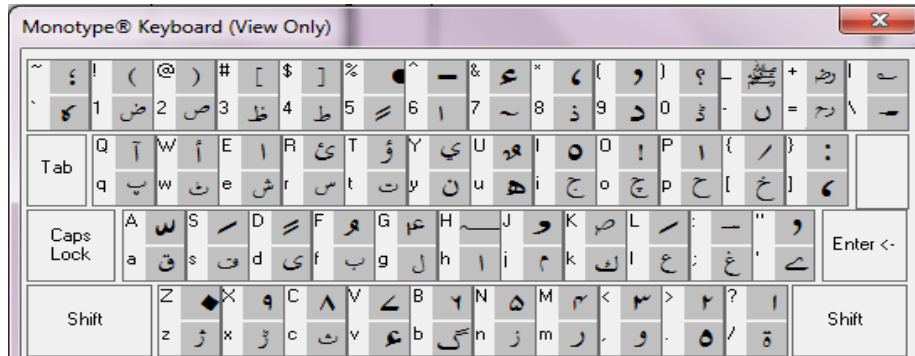


- Open the new In-Page file.





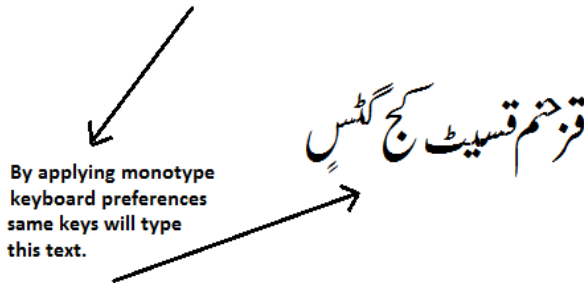
2. Set the Keyboard preferences to **Monotype**.



3. Monotype keyboard has the following key positions.

### Montotype keyboard key positions

a n p y j a r d w k i b w r D



4. Press the same keys as used in phonetic keyboard. Above example shows the difference between key positions in the Monotype keyboard.

# Learning Unit 2: Page Layout

## Overview

Page layout includes formatting of page such as page size, margin, orientation and page number. After completion of this learning unit you will be able to demonstrate the different page sizes and page margins in the In-page file and could exhibit to add page numbering in the file.

## 1. Specifying Page Layout and Paragraph Formatting Attributes on Text

### Specify Page layout:

The dialog box that appears by clicking “**New**” button allows you to enter values for your document. The attributes that can be set in this dialog are

### Page Size:

You can select one of the standard pages sizes from the page Size Combo Box. If a custom size is desired, then you need to enter the Page Width and Page Height.

### Page Margins:

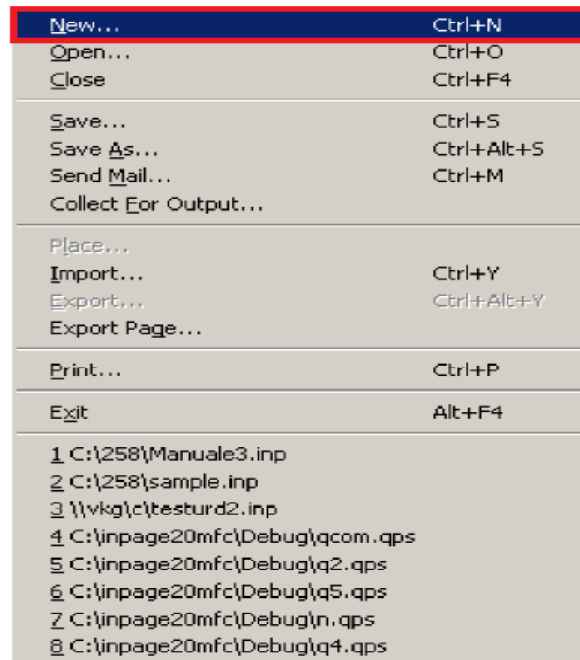
Specify the page margins distances from the respective Box boundary.

### Page Orientation:

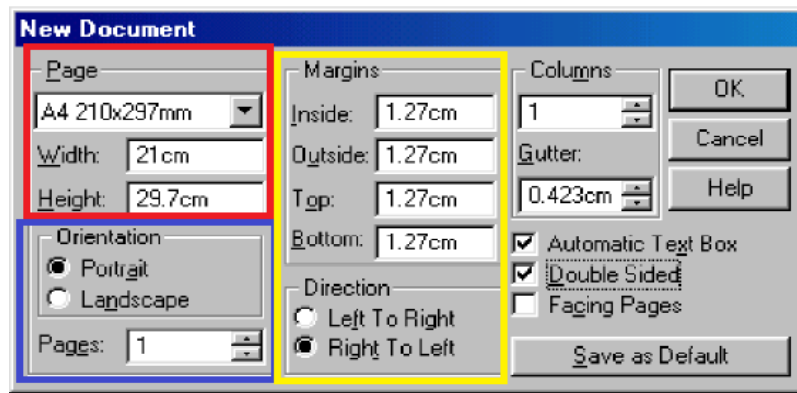
The pages in the document can either be in a Portrait mode or in a Landscape mode. In Portrait mode, the width and height that you specify are taken such, whereas in the Landscape mode, the widths and heights are interchanged.

The procedure of specifying page layout has the following steps:

1. Choose the **New** menu item from the **File menu**.



2. A New Document dialog is displayed. You can specify the page size, orientation, margins etc. Or you can just let the default settings work for you.



3. Click on **OK** button.
4. A new document with the specified attributes is created.

## 2. Adding Page Number in File


Selecting this option inserts a page number field at the insertion point.

This option is available only if insertion point is in Title Text box. If you are in text Edit mode inside a normal text box, this menu item appears grayed.

### Remember

Anything what we write on master page is also shown on all pages of the Document.

The procedure of adding page number has the following steps:

1. Open the document to which you want to insert Footer.
2. Now click on Master Page option on the left corner of the page.
3. By clicking on Master page a blank page will be open.
4. Make a title text box at the desired location on the page.
5. Go to Text Edit Mode by choosing the IBEAM tool  and clicking on this title text box
6. Choose the Page Number menu item from the Insert menu.
7. Then click on the master page button again.
8. If you are inserting a page number inside a title text box on a master page, then the page number gets inserted as "#" character in master page.

## Paragraph Formatting Attributes

### Paragraph Setting:

Paragraph Attributes are a collection of attributes that get applied to the paragraph as a whole. Unlike the character attributes which get applied to selected characters, paragraph attributes get applied to the whole paragraph(s) lying inside the selection. Therefore if paragraph attribute is applied when the cursor is blinking then these attributes get applied paragraph in which the cursor is blinking.

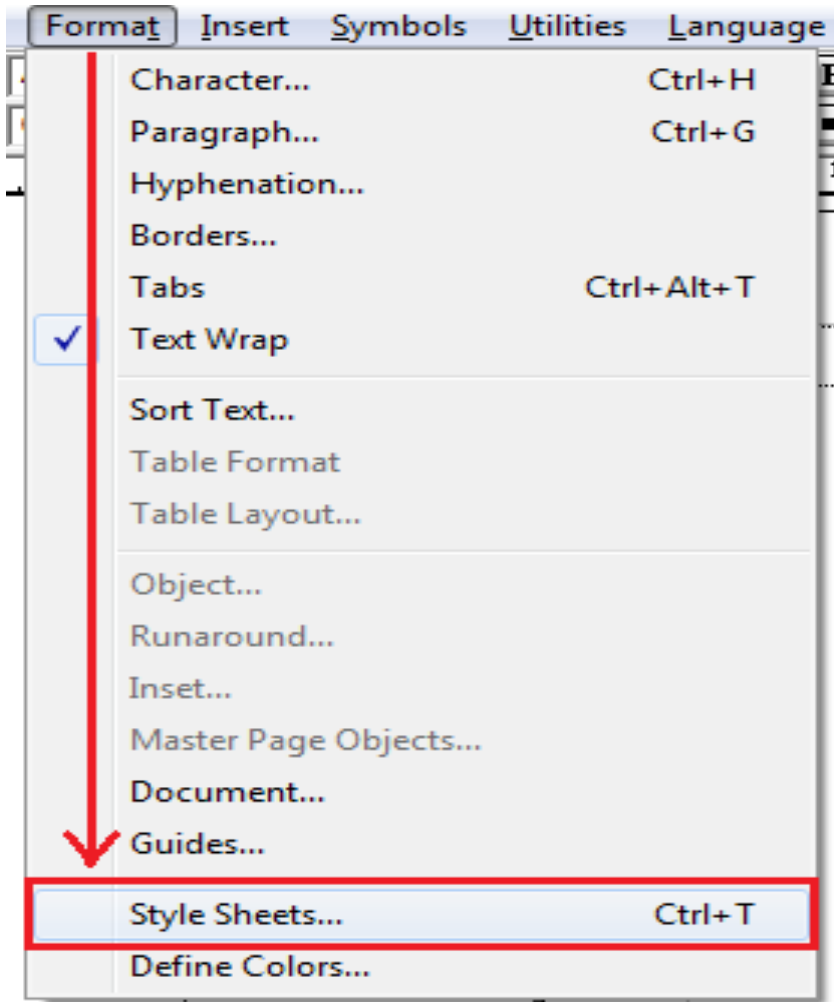
The Paragraph Attributes are as follows:

- **Style Sheet Name Combo Box:** All the defined Style Sheets appear in this combo box. You can define new style sheets by selecting the Define Style Sheets menu item from the Format menu. On selecting a Style Sheet from this combo box, the style sheet is applied to the selected paragraph.

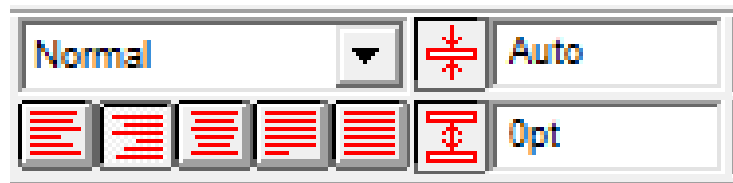
### Defining New Style Sheet

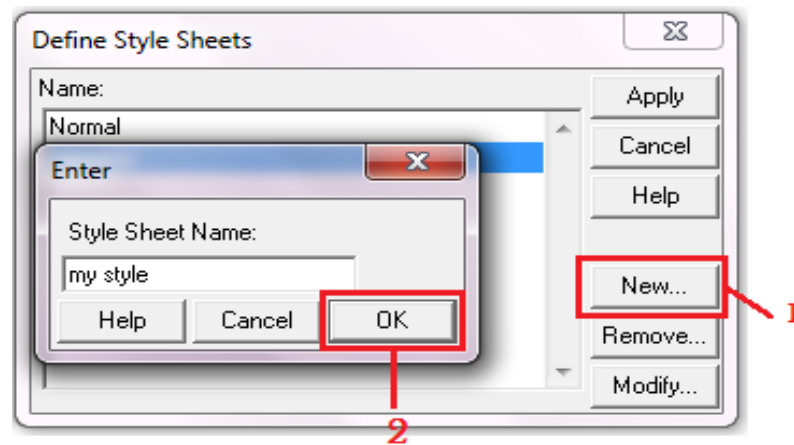
The procedure to define a new style sheet has the following steps:

9. Click on style sheet in the format menu.

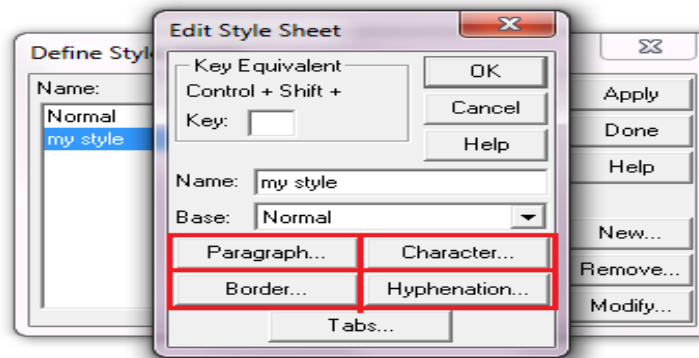


10. Make a New style sheet and define the name of your Style sheet.





11. Click the "OK" button.
12. Now define the styles of paragraph, characters, border and hyphenation according to our choice and click "OK".



## Aligning Paragraph

The paragraph can be aligned in the following styles:

- **Start Align** aligns the text on left side of the frame for horizontal line direction and on top of the frame for vertical line direction.
- **End Align** aligns the text on right side of the frame for horizontal line direction and on bottom of the frame for vertical line direction.
- **Center Align** aligns the text between the frame edges.
- **Full Align** justifies the text between the frame edges. The last line of the paragraph remains start aligned.fdsa432;
- **Forced Align** justifies all lines of the text between the frame edges.

### Line Height Edit Box:

You can specify the line height (Auto by default) which sets line height of each line of text in the paragraph to this value.

### Inter Line Spacing Edit Box:

Specifies the gap between lines.

**Changing Point Size:**

To change the point size of the selected text, you need to enter the new point size in the Size combo box either in the ribbon or in the Format Character dialog.

**Borders:**

You can apply borders before and after a paragraph (much like as Remember paragraphs. The Borders can also be given a line pattern style (whether dotted, dashed, dash-dotted etc.), its thickness and color can also be specified.

**Hyphenation:**

Hyphenation allows you to hyphenate English words at the end of the line of text in a paragraph. In-Page gives us the capability to specify the density of hyphenation in a paragraph.

# Learning Unit 3: Toggle Between Languages

## Overview

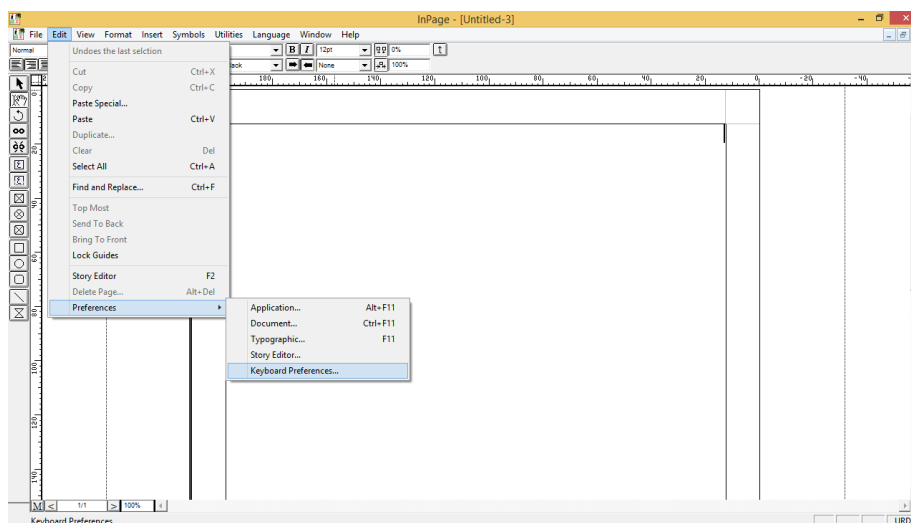
In-page supports several languages such as Urdu, Arabic, Pushtu, Sindhi, Farsi, Kashmiri. If other languages are enabled from the in-page setup then a short cut key (Ctrl + Space) can be used to switch between the languages. After completion of this learning unit you will be able to Perform toggle between different languages.

## 1. How to Enable Optional Languages

Following steps to be followed to enable the optional languages support such as Pushtu and Sindhi.

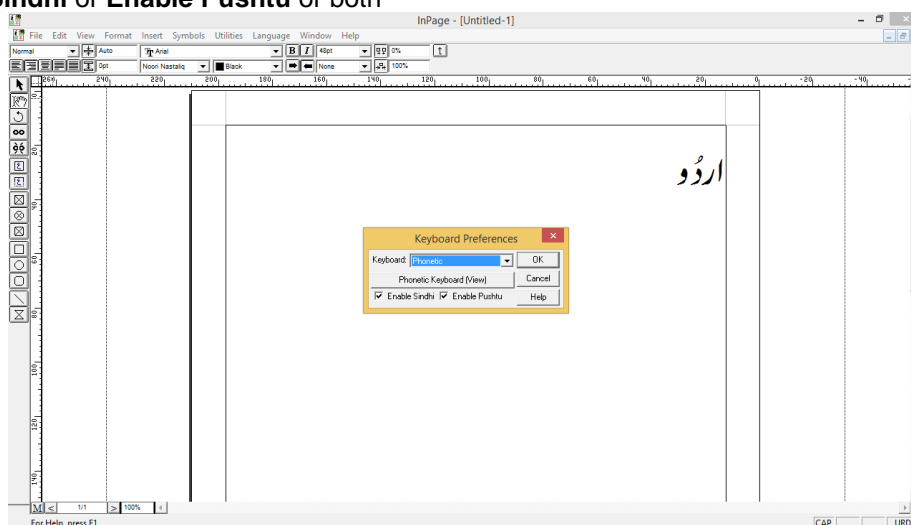
### Step 1:

In the Menu bar click **EDIT** then **PREFERENCES** and then **KEYBOARD PREFERENCES**



### Step 2:

Check **Enable Sindhi** or **Enable Pushtu** or both



## 2. How to Toggle between Languages

You can toggle between English and Urdu by pressing Ctrl+Space. Also you can choose the menu item Toggle Language from the Language menu. If you have enabled Sindhi and Pushtu, then this command switches amongst English, Urdu, Sindhi and Pushtu.

Corresponding to the current language its name is displayed in the task bar on the bottom right corner of InPage frame window.

## 3. Switching Amongst the Languages

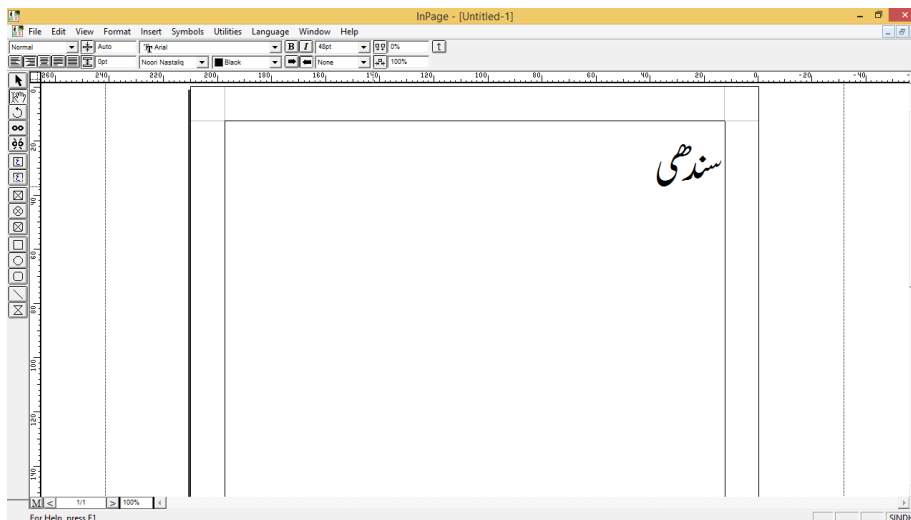
### Step 1:

Urdu is enabled in the lower right corner. Press Ctrl+Space to change the language



### Step 2:

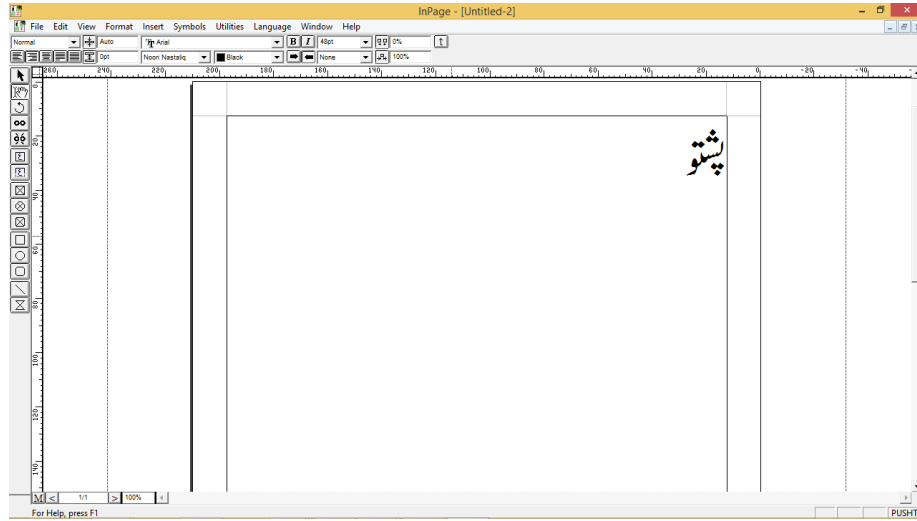
Sindhi is enabled in the lower right corner. Press Ctrl+Space to change the language.



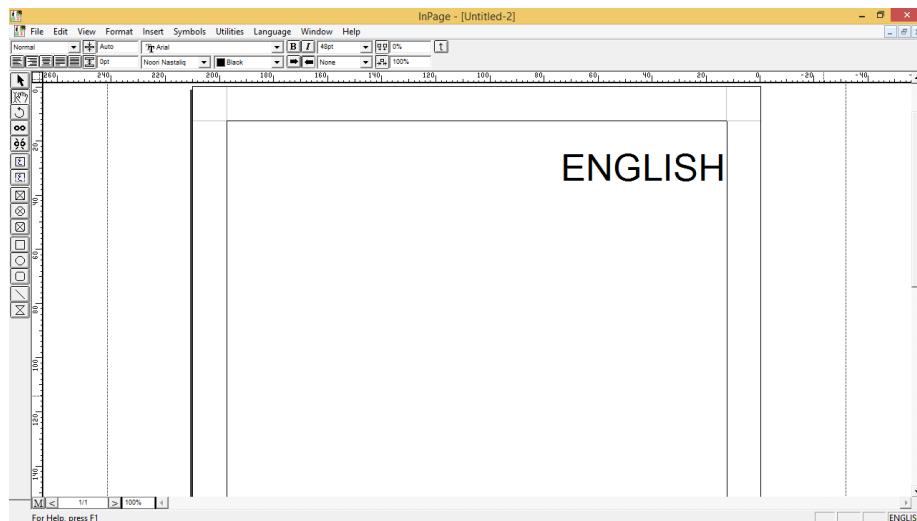


**Step 3:**

Pushtu is enabled in the lower right corner. Press Ctrl+Space to change the language

**Step: 4**

English is enabled in the lower right corner. Press Ctrl+Space to change the language.



## Learning Unit 4: Insert Column

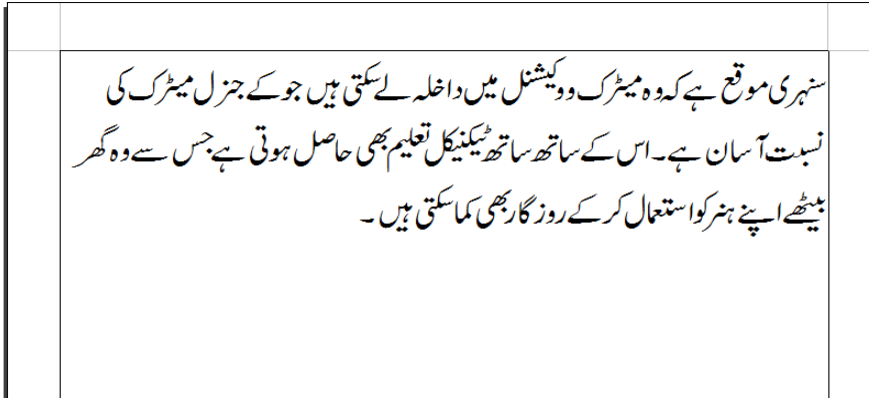
### Overview

Column is an important feature in the In-page software. It is used to manage the text in a specific portion of the page or text and can be aligned properly using columns. After completion of this learning unit you will be able to use columns and its supporting options in In-page.

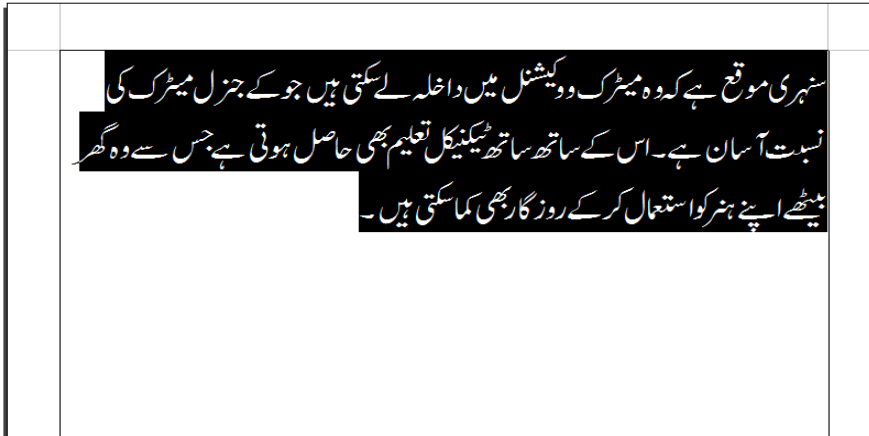
### 1. Selecting Text and Inserting in Table

The procedure to convert the text in a table has the following steps:

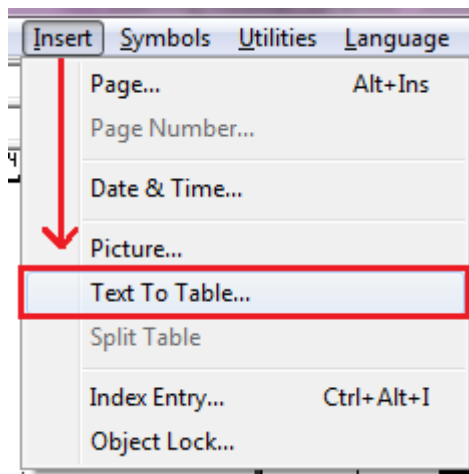
1. Open the In-page file and type the text.



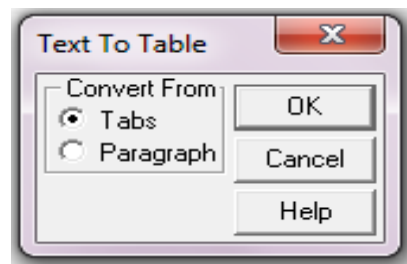
2. Select the whole text by pressing “CTRL+A” key from keyboard.



3. Click on **Insert Menu** and select **Text to Table** Option.



4. A Dialog box will appear select **Tabs** or **Paragraph**.



5. Click on **OK** button.
6. The table will be created on the paragraph.

## 2. Inserting Specific Text in the Column

A portion of the text can be selected to insert in a table. The procedure to insert specific text in the column has the following steps:

1. Place the cursor on the page where you want to create columns.
2. Now Click on **Insert Menu** and select the **Table** option.
3. In appearing dialog box select the **number of the rows** and **number of columns** of the table. For example 3 columns and 1 row in the table.
4. Now Click on **Ok** button.
5. Finish.
6. Now select the text that you want to insert in column 1 and paste it.
7. Repeat step – 6 for other columns.

Sample file using column is as follows

طالبات جن کو میٹرک مشکل لگتی ہے یا وہ جو کہ وہ میٹرک ووکیشنل میں داخلہ لے سکتی ہیں اس کے ساتھ ساتھ ٹیکنیکل تعلیم بھی حاصل کسی وجہ سے میٹرک میں رہ جاتی ہیں ان کے جو کے جنرل میٹرک کی نسبت آسان ہے۔ ہوتی ہے۔	اس کے ساتھ ساتھ ٹیکنیکل تعلیم بھی حاصل
لیے نہری موقع ہے	
اس کے ساتھ ساتھ ٹیکنیکل تعلیم بھی حاصل ہوتی ہے جس سے وہ گھر بیٹھے اپنے ہنر کو استعمال کر کے روزگار بھی کما سکتی ہیں۔	

## Learner's Activity

**Description** This learning activity consists of an interactive session in the class about the selection of keyboard and language urdu phenotic , alignment and page setup.

**Time** 40 minutes.

**Purpose** To defined the step by step procedure of urdu inpage.

**Instructions for Learner**

1. Ask learners how to select the page setup
2. Ask the learner how to select the language and keyboard.

## Summary of Module

- Inpage is a program that is used to compose Urdu, Arabic, Farsi, Sindhi, Pushtu in computer. It is a very comprehensive program. This program is used to compose Urdu and other Pakistani languages with all fonts and facilities.
- Inpage comes with eight predefined and eight user-defined key-boards. Predefined Keyboards cannot be modified whereas you can modify User Defined Keyboard according to your need. In the Inpage software Ctrl+Space command switches between the Input languages. Windows languages can be switched by Alt+Shift.
- Page layout is the term used to describe how each page of your document will appear when it is printed. Inpage page layout has several important options such as margins, columns, portrait, landscape etc.

## Frequently Asked Questions (FAQS)

FAQ 1: From where I can download INPAGE software?

Answer In-page Urdu is a very popular Urdu desktop publishing software. While its original version is not available for download, many clone copies are available. These look and work like In-page Urdu but may have some bugs or viruses. Use at your own risk.

FAQ 2: Does In-page works under windows 7?

Answer In-page works under almost all versions of windows including windows xp, windows 2000, windows 7 and windows 8.

FAQ 3: Can I save my files as PDF?

Answer Yes, In-Page can save a file or pages in pdf format by Primopdf software tool.

FAQ 4: Can I copy contents from in-page and paste it to MS word?

Answer Yes, In-page contents can be shifted to ms word through In-page Unicode convertor software.

FAQ 5: How do I convert Urdu image files like\*.jpg,\*.BMP,\*.PNG in to an in-page file?

Answer It is not possible to convert image files to in-page files at this time. It falls in to the realm of OCR (Optical Character Recognition) and currently there is no software that can do the job.

FAQ 6: Can I use In-page for mathematical equations?

Answer Yes, you can use In-Page to inter mix mathematical equations with urdu/english text. These equations will need to be entered in MS Windows compatible software which supports equation. One such package is Microsoft's Equation Editor.

FAQ 7: Can I print inpage documents?

Answer Yes, Printing can be carried out on any of the MS Windows compatible printers. You first need to choose the printer using Printer Setup dialog.

FAQ 8: Can I draw a line in the inpage document?

Answer Yes, you can draw a line by Select the Line Tool from the Tools Bar. Now click with the CROSS cursor in the document Area and while keeping the mouse pressed, drag the mouse. The Ribbon shows the two end points of the line.

FAQ 9: Can I draw a line at any angle in the inpage document?

Answer Yes, you can draw lines at any angle, keep the SHIFT key pressed while creating or resizing the line.

FAQ 10: Can I draw tables in the Inpage documents?

Answer Yes, you can draw tables of any number of columns and rows by clicking on table from the insert menu.

## Test Yourself!

Please mark the correct one from the given options. You can check your answer with the Answer Key at the end of this module.

- 1. There are \_\_\_\_\_ number of user-defined keyboards in the Inpage.**
  - a. 2
  - b. 4
  - c. 6
  - d. 8
  
- 2. Windows input languages can be switched by the short-cut-key command!**
  - a. Alt + Control
  - b. Control + Space
  - c. Alt + Shift
  - d. Control + Shift
  
- 3. Inpage input languages can be switched by the short-cut-key command!**
  - a. Alt + Control
  - b. Control + Space
  - c. Alt + Shift
  - d. Control + Shift
  
- 4. Copy and Paste option is available in the \_\_\_\_\_ Menu.**
  - a. File
  - b. Edit
  - c. Format
  - d. Insert
  
- 5. Preferences options is available in the \_\_\_\_\_ Menu.**
  - a. File
  - b. Edit
  - c. Format
  - d. Insert
  
- 6. \_\_\_\_\_command will replace the current occurrence of the found text. It will also find and select the next occurrence of the same word(s).**
  - a. Find Text
  - b. Replace With
  - c. Replace and Find
  - d. Replace All
  
- 7. \_\_\_\_\_Specify the gap between columns.**
  - a. Margins
  - b. Direction
  - c. Gutter
  - d. Columns



8. \_\_\_\_\_ is similar to Cut but the difference is that Copy does not delete the selected text or selected object(s) from the document.

a Clear

b Copy

c Undo

d Delete

9. Text to table and Table to text options are available in the \_\_\_\_\_ Menu.

a File

b Edit

c Insert

d Format

10. Text to table option is only available when \_\_\_\_\_.

a Text is in the clip board

b Text is selected

c Table is selected

d Table is in the clip board

## Answer Key

MCQ Number	Correct Answer
1	d
2	c
3	b
4	b
5	b
6	c
7	c
8	b
9	c
10	b

# Module 6: Manage E-mail / Internet

## Learning Outcomes

After completion of this learning module, you will be able to:

- Configure Email Account
- Sort Out Email
- Manage Address Book
- Achieve Email Data
- Perform Browsing
- Download Data
- Send and Receive Emails



# Learning Unit 1: Configure Email Account

## Overview

Email stands for electronic mail. It is like a message sending over the internet using email address. In this learning unit, you will learn how to configure internet email service in Microsoft Outlook software and how to send and receive email. After completion of this learning unit, you will be able to properly configure MS Outlook, send and receive messages and you will also be able to identify problems during configuration of MS outlook email.

### Remember

To configure MS Outlook, an Email address must be created already.

## 1. Configuring Email Account

### What is Email?

Email stands for '**electronic mail**'. It is used for sending Electronic message/Letter through internet. An email address is required to send or receive email, and that address is unique to the user. Email can be accessed in two ways, either from web browsers or desktop applications. Some companies provides facility for email like yahoo, google,these are called email service providers. For using this facility it is required to create an email address.

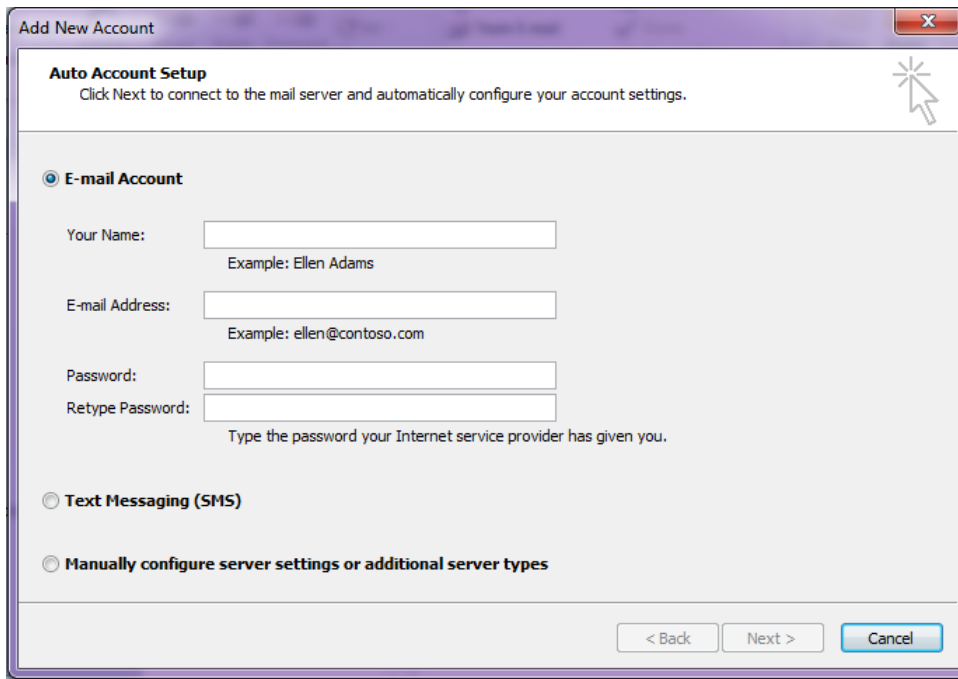
### Configuring Email Account Using MS Outlook:

Hotmail.com is windows live email address which is created by microsoft corporation.For adding and configuring a windows live id / hotmail id just follow these steps:

1. Open MS outlook application From MS Office.
2. Enter user name, e-mail address, and password.

### Outlook 2010

Outlook 2010 is a personal information manager included in the Microsoft Office 2010 suite, which is commonly used in the workplace.

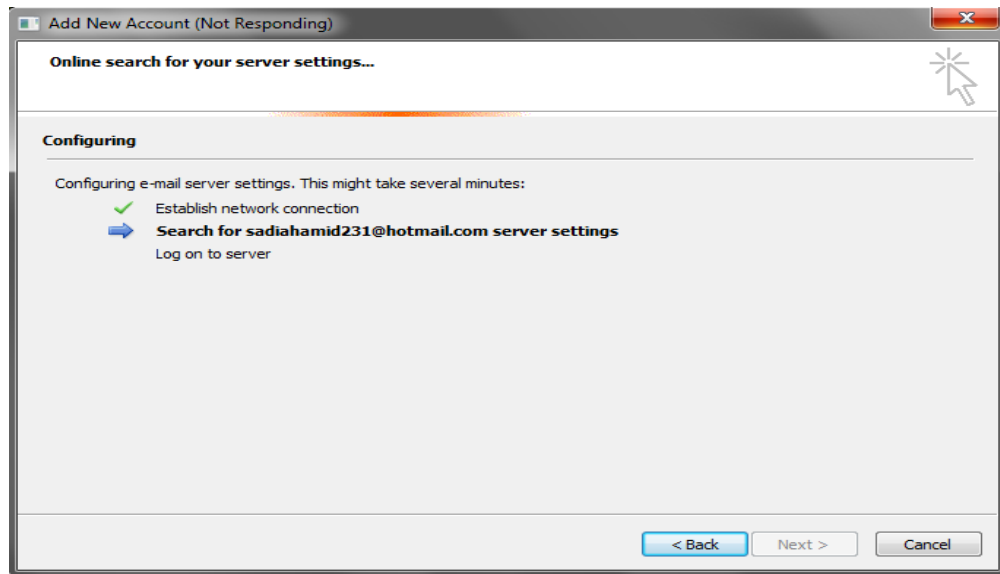


### Entering Required Data in Outlook

3. Click **Next**.
4. A dialogue box will appear of configuration email.

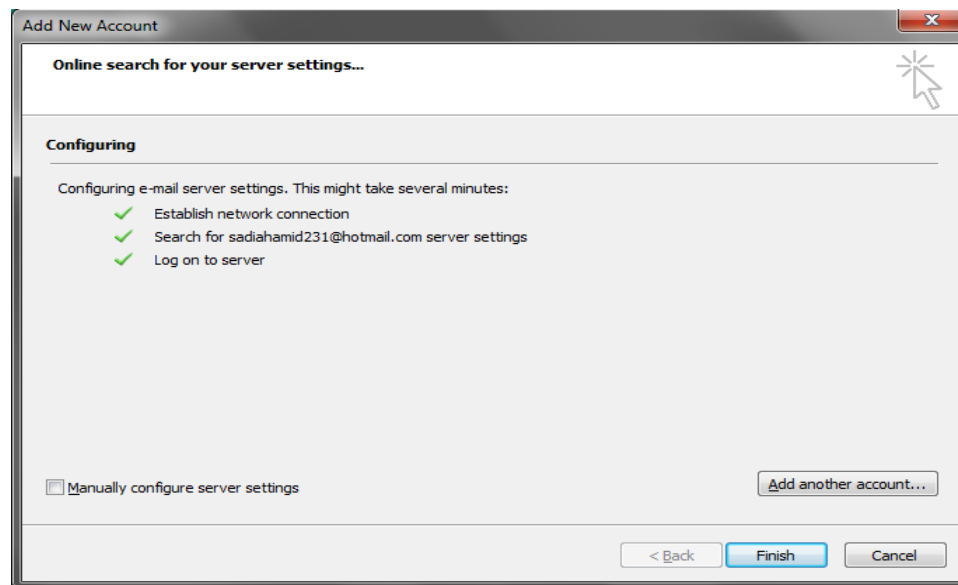
#### Do you know!

The **tabbed Ribbon system** was introduced in Outlook 2010 to replace traditional menus. The **Ribbon** contains multiple tabs, each with several groups of commands.



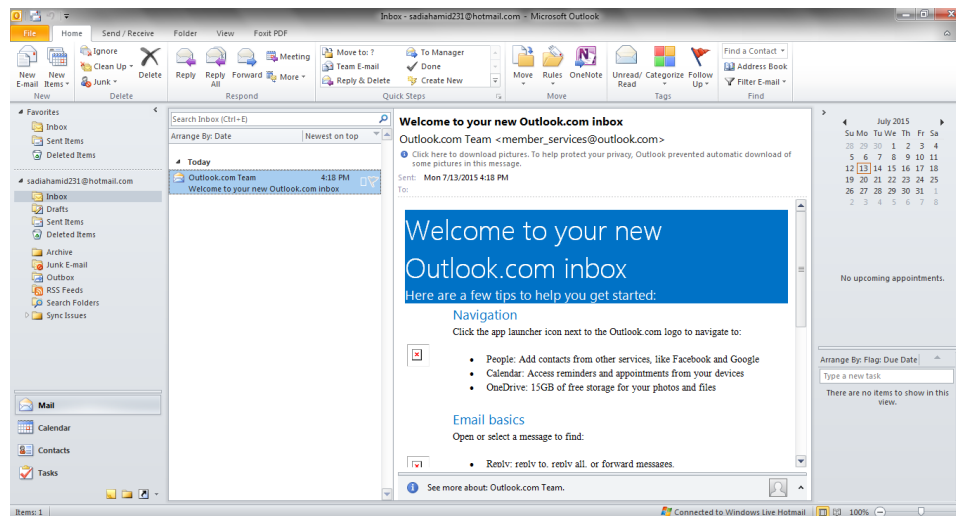
### Configuring Outlook

5. After completion of the configuration process click Finish.



### Finish Configuring Outlook

6. The account will be configured and the welcome screen will be appeared.

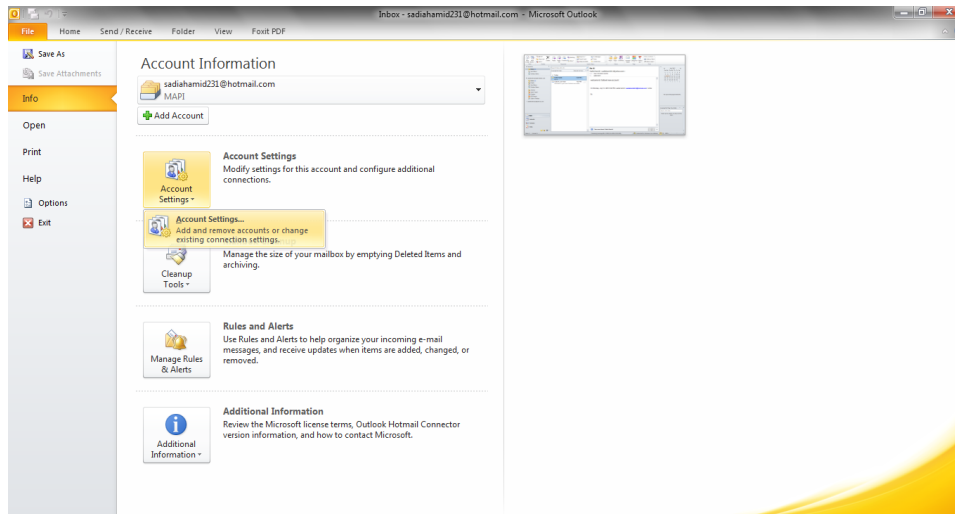


### Welcome Screen of Outlook

This is the easiest way of configuring email using MS outlook.

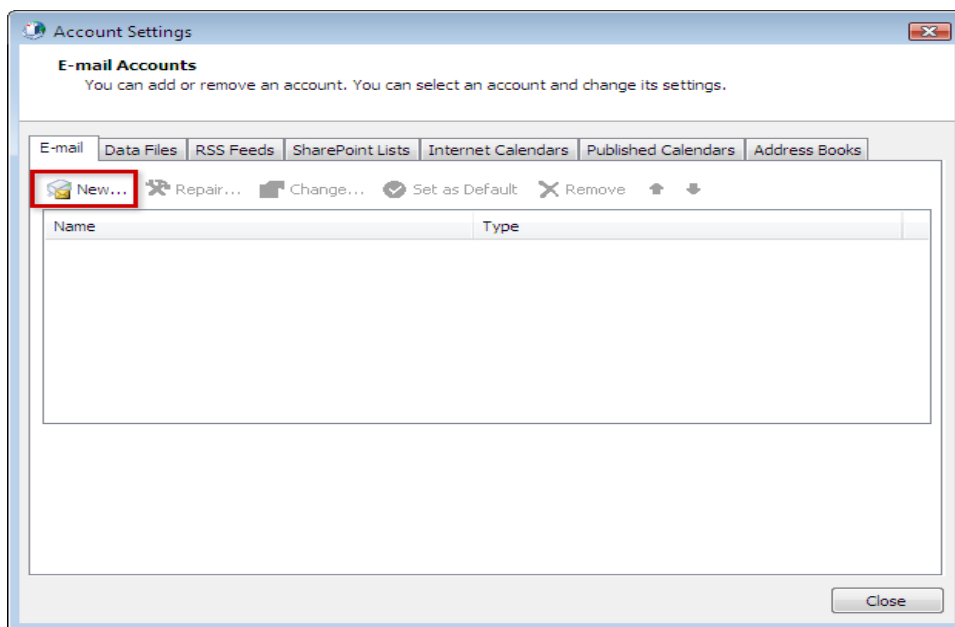
#### Adding an Account in MS Outlook:

1. Start **MS Outlook**.
2. Click on the **File** tab.
3. In the **Info** category, click **Account Settings**, and then click **Account Settings** in the dropdown.



### Account Settings of Outlook

4. On the **Email** tab, click **New**.



### Adding an Account

5. Click to select the **Email Account** option, and then click **Next**.
6. In the **Add New Account** dialog box, to configure the new email account automatically, configure the following settings in the Email Account section under Auto Account Setup:
7. In the Your Name box, type user **full name**.
8. In the Email Address box, type **e-mail address**.
9. In the Password box, type the password.



- In the Retype Password box, retype the password, and then click Next to begin the Auto Account Setup process.

**Add New Account**

**Auto Account Setup**  
Click Next to connect to the mail server and automatically configure your account settings.

**E-mail Account**

Your Name:   
Example: Ellen Adams

E-mail Address:   
Example: ellen@contoso.com

Password:

Retype Password:   
Type the password your Internet service provider has given you.

**Text Messaging (SMS)**

**Manually configure server settings or additional server types**

< Back    Next >    Cancel

### Remember

Some ISPs require the full email address to be entered into the **User Name** field

### Adding an Account

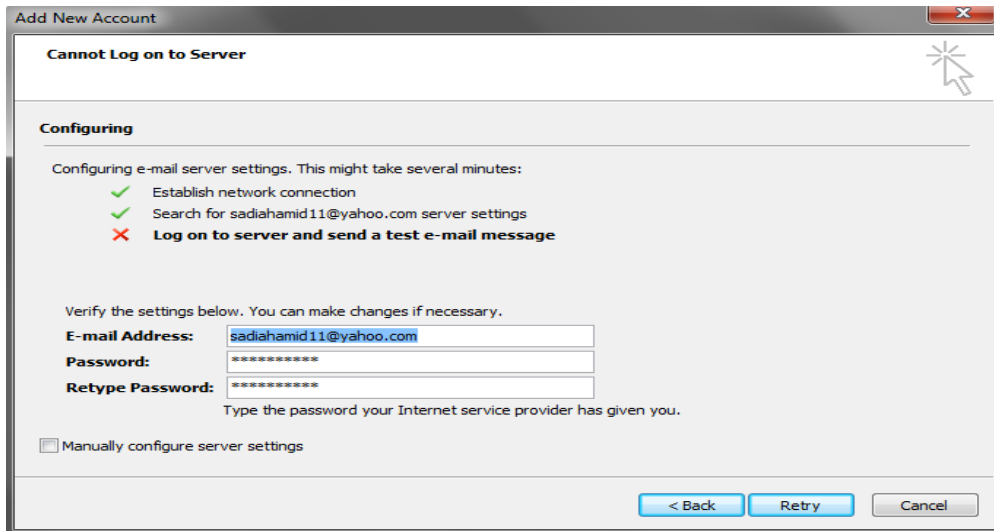
- Outlook will then try to automatically configure account. After successful configuration, the confirmation messages will appear that the **account is created successfully**.
- Click **Finish**, and then click **Close** to complete the account setup.

### Testing Email Configuration:

If a problem occur during configuration of Outlook as shown in the picture below than it means that email is not configured successfully. It is necessary to configure Outlook manually.

**Remember**

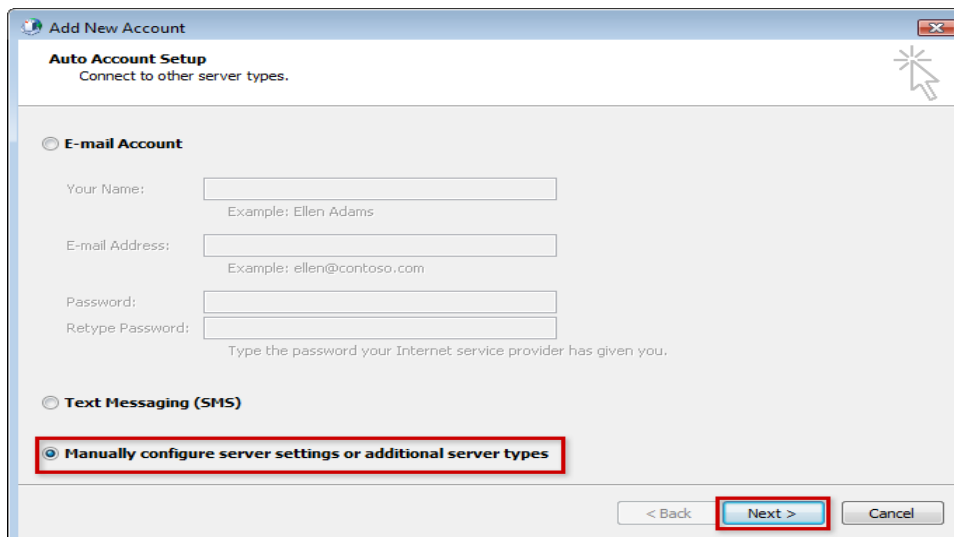
If wanted Outlook to automatically enter email password, make sure that the "Save this password in your password list" check box is selected.



**Configuration Fails**

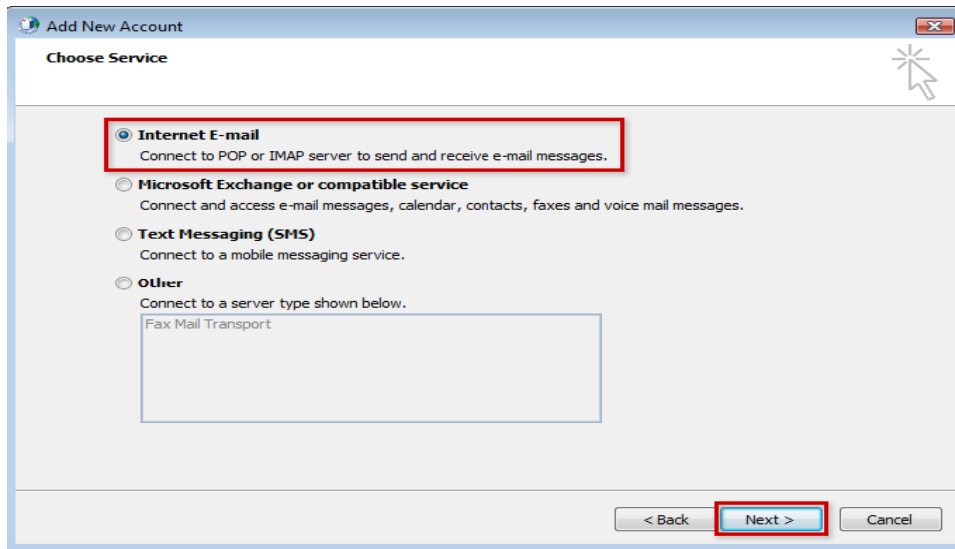
For manually configuration of Outlook mail follow these steps:

1. Add New Account dialog box
2. Click the **Manually configure server settings or additional server types** check box, and then click **Next**.



**Manually Configuration of Email**

3. Click Internet Email, and then click **Next**.

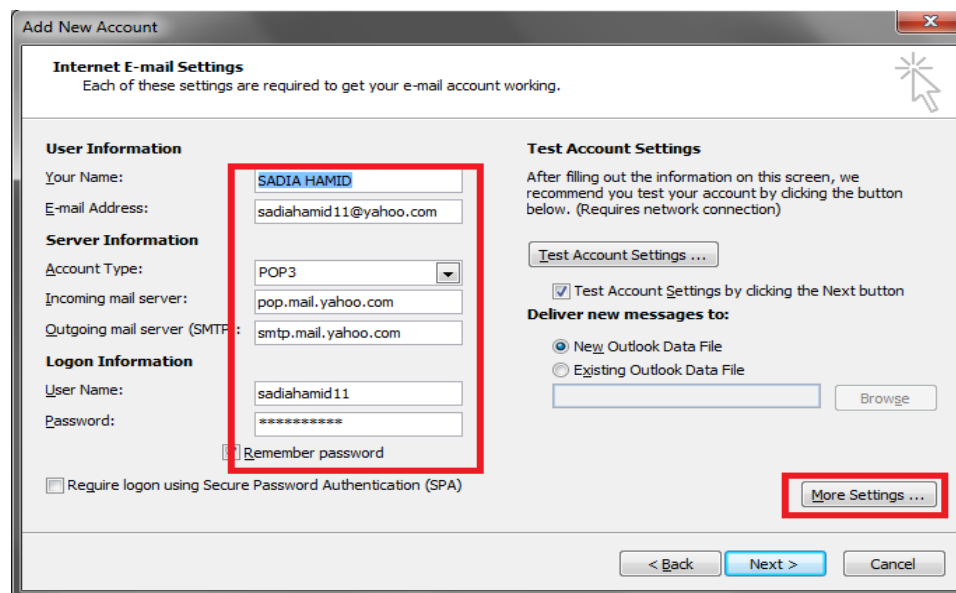


### Remember

Yahoo or Gmail id on Outlook needs manual configuration for setting incoming and outgoing ports.

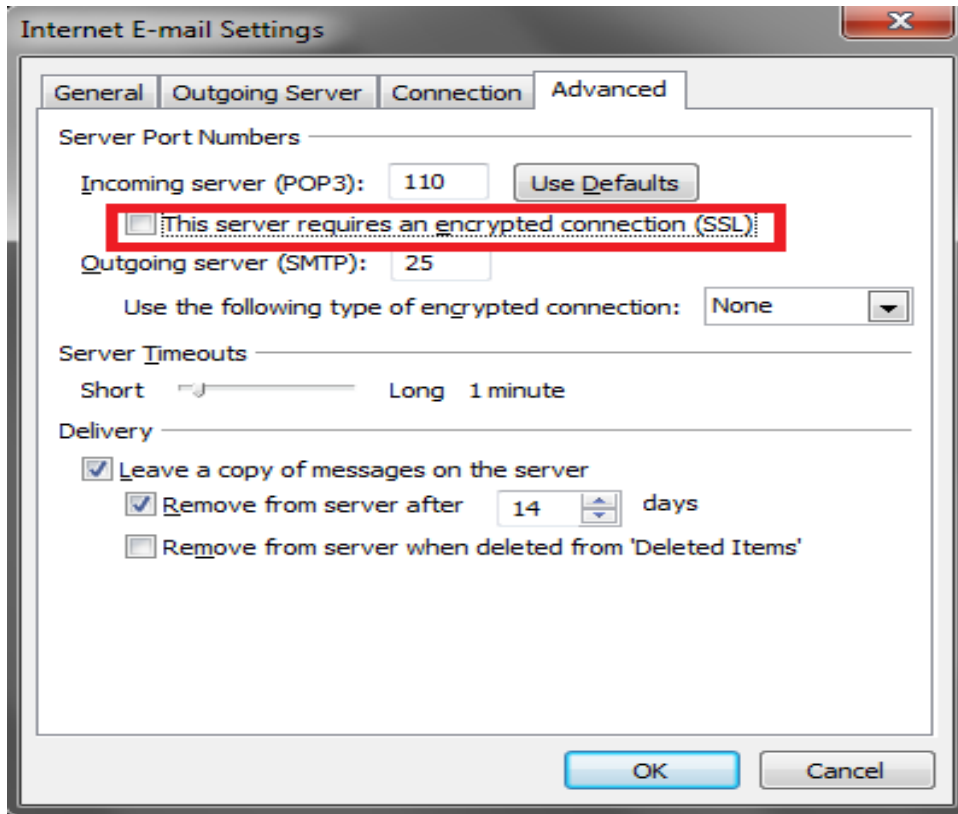
## Manually Configuration of Email

4. Click on More information button.



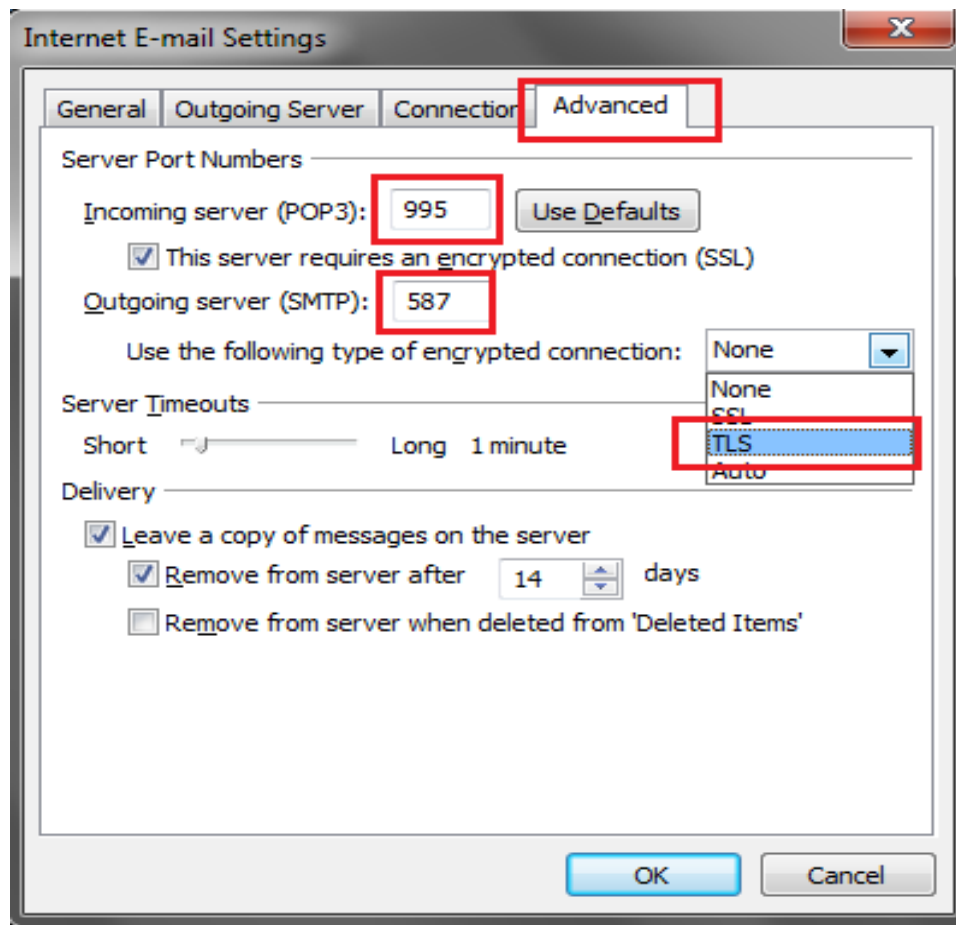
## More Information

5. Select the **Outgoing Server** tab from the top of the new window that opens.
6. Check the box for My outgoing server (SMTP) requires authentication and ensure that Use same settings as my incoming mail server is selected.
7. Next, click the **Advanced** tab at the top of the window.



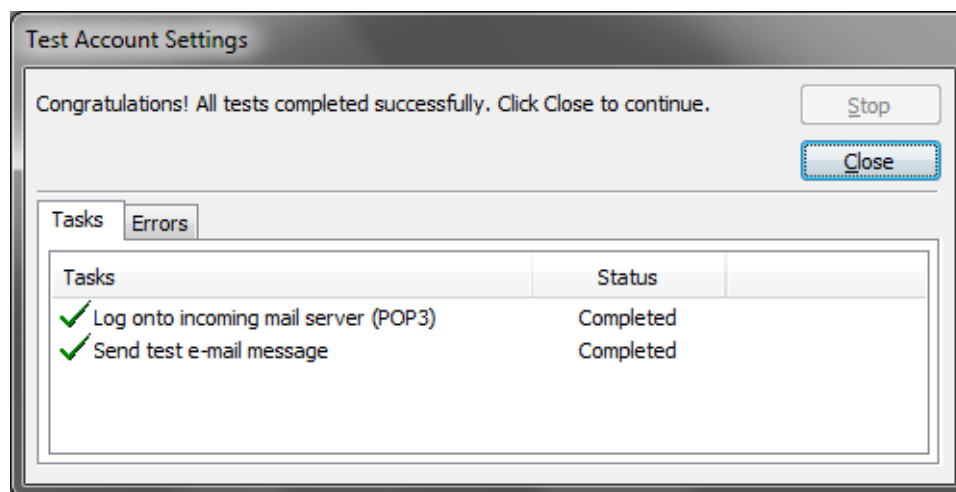
**Check this Option**

8. Enter port 995 as the Incoming server (POP3) port and ensure that SSL is chosen from the Use the following type of encrypted connection drop-down box.
9. Enter port 587 as the Outgoing server (SMTP) port and choose TLS from the drop-down box next to Use the following type of encrypted connection.
10. Click the OK button to save settings.



### Setting Properties

11. After this a test email message will be send. If the test is successful, click the Close button.

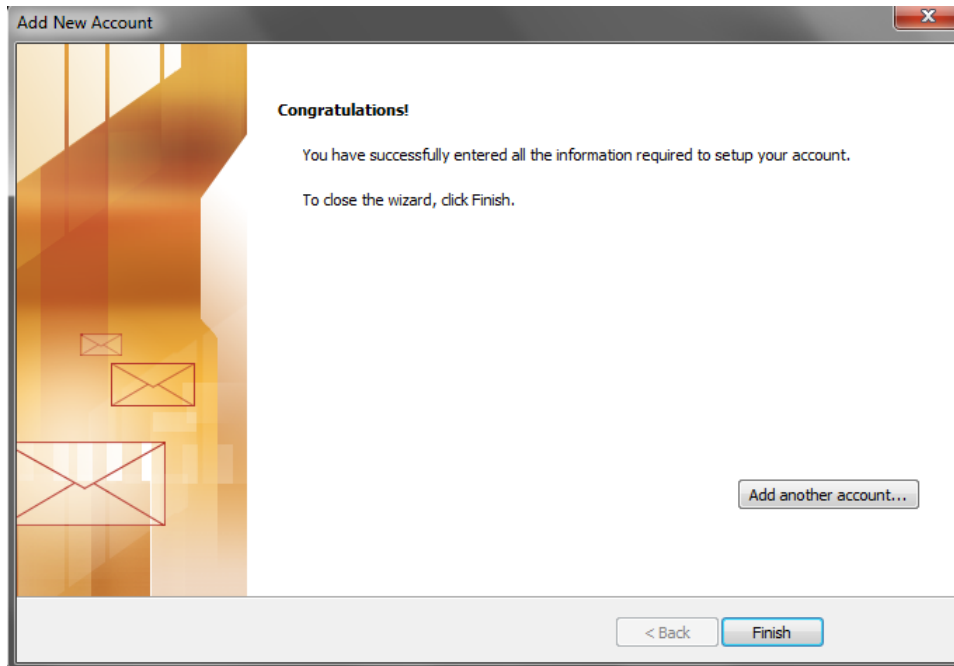


### Test Account Settings

12. The email will be configured successfully now.

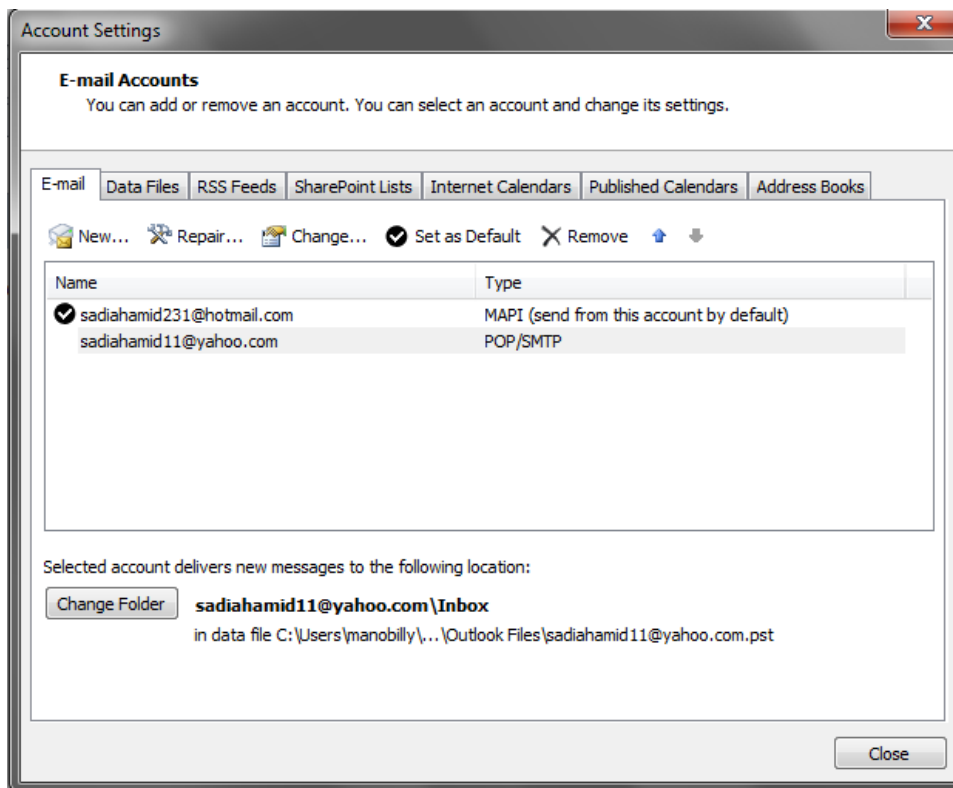
**Do you know!**

Gmail uses **Incoming port: 993** and **outgoing port: 587** for outlook configuration.



**Adding New Account Screen**

Now here a user can see configured email ids.



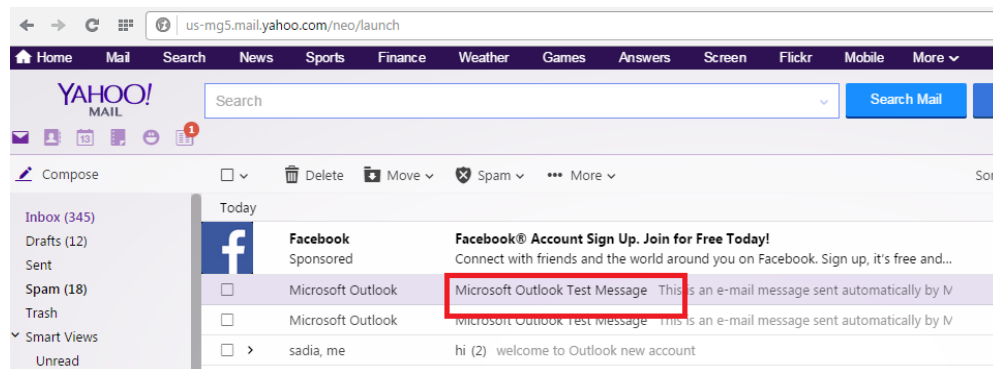
**Configured Emails**

## 2. Sending and Retrieving Test Messages

### Sending and Retrieving Test Message:

For testing newly configured email on outlook open MS Outlook.

1. Click on New Email button on the left corner.
2. Type the sender's (it may be your second email id) email address for checking whether the emails are forwarded or not.
3. Send and check the email on other email account.
4. Also check if a test message is sent to the configured email address or not.

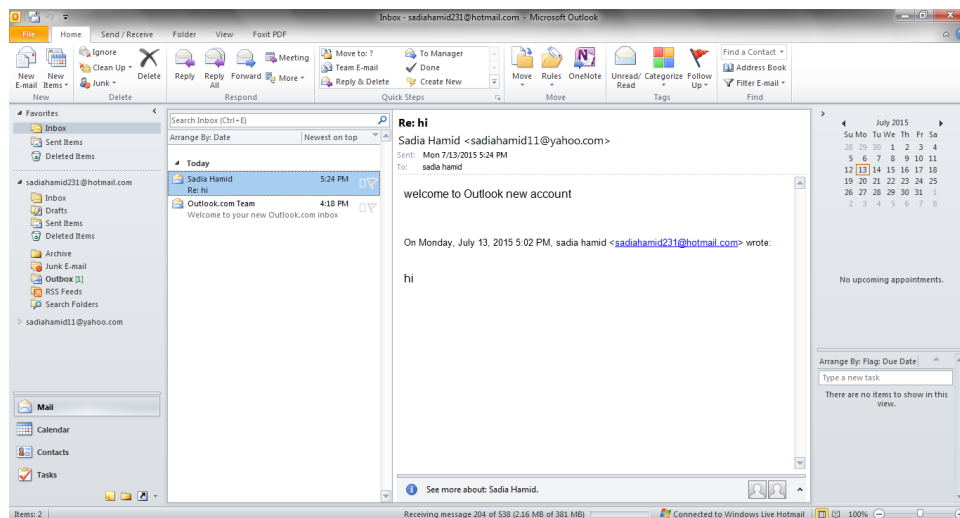


### Do you know!

Adding a Gmail account will not import other Google services, such as your Gmail contacts or Google Calendar.

### Checking Test Email Send

5. Now send an email from any id to check for whether the newly configured email account is receiving emails or not.



### Checking Test Email Received

## Learner's Activity

- Open MS Outlook
- Configure Outlook.com /Hotmail account on MS Outlook.
- Now add and configure a Yahoo id on MS Outlook account.
- If a problem occur than configure it manually according to the given procedure in manual.
- Check the email through send and receive emails using this email account.



# Learning Unit 2: Sort Out Email

## Overview

Sorting means arranging something in a way so that it can retrieve easily. MS Outlook emails can be sorted based on the Date, Account, Attachments, Flags, subjects and Size as per requirements for ease. In this learning unit you will learn how to sort email by the account through which they were received using various applications.

After completion of this learning unit you will be able to sort out emails received from different accounts.

### Do you know!

By default, the messages are date wise sorted i.e. latest mail first.

## 1. Sorting Emails and its Benefits

### Sorting Out Emails:

There are several features that can help manage and organize messages, one of them is sorting. There are many benefits of sorting emails in Outlook.

### Benefits of Sorting Emails:

- If it is needed to find a particular email from a certain person than sorting is helpful in searching mails by a specific person.
- If wanted to have emails sorted by date received with the most recent at the top than sorting is a best technique.
- If it is needed to sort emails, received to a particular Account.

### Methods of Sorting Emails in Outlook:

Outlook downloads email into the Inbox, which fills up inbox quickly. Finding what is needed when is needed it can become a frustrating task, but with a few easy-to-implement sorting techniques, even the crowded Inbox can be handled.

### Sorting

Sorting is a technique for arranging data in ascending or descending order.

#### 1: Click to Sort

The **click-a-header** sort behavior in Outlook is probably a common method of sorting. With the Inbox (or any mail folder) open, simply click a column header (From, To, Subject, Received, and so on) to sort by the data in that column. Click a second time to toggle between ascending and descending order.

### Sort Mail by who it is From:

If there is a mail in the folder there will be people's names in the column. These names are the names of the people who have sent you email.

1. If left click the **From** column name the mail will be sorted by name alphabetically in descending order.

The Z's will be at the top of the list and the A's will be at the end of the list.

2. For sorting the mail by name in ascending order, left click the From column name again.

Now the A's are at the top of the list and the Z's are at the bottom of the list.

### Sort Email by Subject:

The Subject column is the next to the From column.

#### Do you know!



This button is used from the column for sorting data in ascending or descending order.

1. Left click the Subject column label and the emails will be sorted in descending order.

For multiple emails on the same date with the same Subject the last one received that date is at the top of the list.

2. For sorting by Subject in ascending order, left click the Subject column label again.

The emails are now sorted in ascending order with the A's first and Z's last.

### Sort Mail by Date Received:

1. Left click the **Received** column label and the mail will be sorted in descending with the most recently received mail at the top of the list.
2. Left click the Received column label again and the mail will be sorted in ascending order with the most recently received mail at the top of the list

### Sort Mail by Account Name:

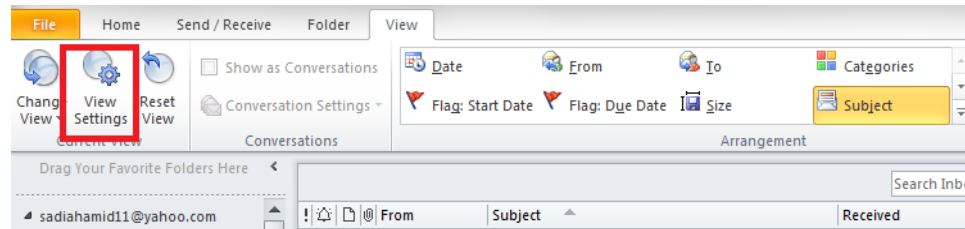
1. Left click the Account column label and the mail will be sorted by Account name in descending order.
2. Left click the Account column label again and the mail will be sorted by Account name in descending order

Sorting mail by the column labels in Folder view is an easy way to find emails based on the From, Subject, Received and Account columns.

### Sorting Emails by the Account, Received:

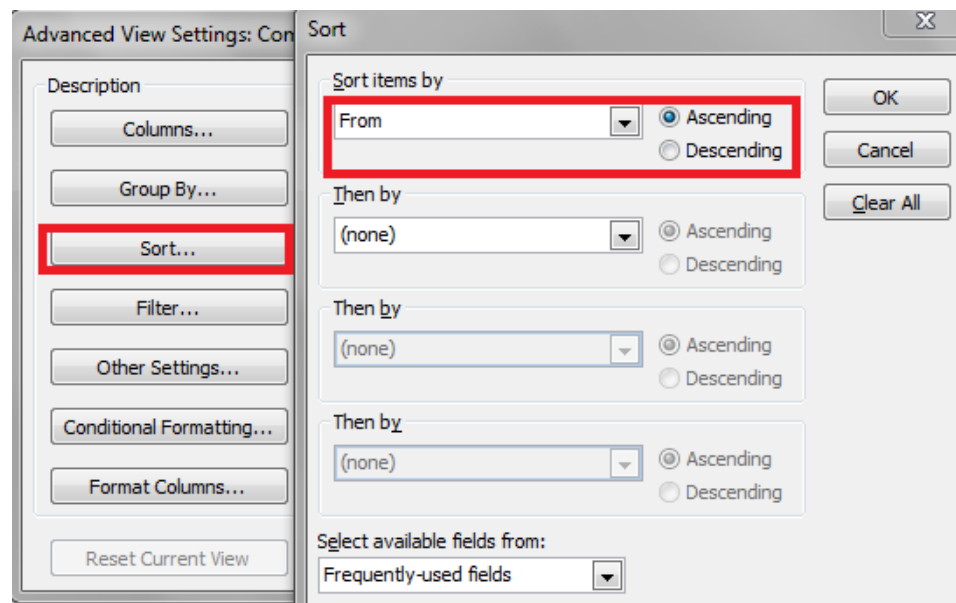
For sorting emails by the account through which they were received:

1. First click on view tab.
2. Then click on View settings.



### View Settings in Outlook

3. A dialogue box will appear. Click on sort button
4. Another dialogue box will appear here the properties for sort can be set.
5. Click on first drop down menu select the From and then click Ok.



### Account

Then all emails in the selected folder are sorted by email senders automatically.

From	Subject	Received	Size	Categories
000webhost L...	Free hosting in India!	Fri 3/27/2015 11:...	12 KB	
From: 000webhost.com (6 items, 6 unread)				
000webhost...	70% Independence Day Promotion	Tue 7/7/2015 6:...	13 KB	
000webhost...	Up to 70% Easter Discount	Wed 4/8/2015 9:...	13 KB	
000webhost...	How is your website?	Sun 3/29/2015 3:...	10 KB	
000webhost...	Account gvtiwjampur.comlu.com is ready!	Thu 3/26/2015 1:...	14 KB	
000webhost...	Welcome to 000webhost.com	Thu 3/26/2015 1:...	12 KB	
000webhost...	Confirm your registration	Thu 3/26/2015 1:...	11 KB	
From: Abdul Mateen (1 item, 1 unread)				
Abdul Mateen	Re: [TEVTA - Microsoft IT Trainers Group] Today i had dinner with umar f...	Mon 11/17/201...	29 KB	
From: Abdul Razzaq (5 items, 5 unread)				
Abdul Razzaq	Re: [We Demand Extremists Free Pakistan] New photo	Mon 12/22/201...	30 KB	
Abdul Razzaq	Re: [We Demand Extremists Free Pakistan] New photo	Mon 12/22/201...	30 KB	
Abdul Razzaq	Re: [We Demand Extremists Free Pakistan] New photo	Mon 12/22/201...	30 KB	
Abdul Razzaq	Re: [We Demand Extremists Free Pakistan] New photo	Mon 12/22/201...	31 KB	
Abdul Razzaq	Re: [We Demand Extremists Free Pakistan] New photo	Mon 12/22/201...	30 KB	
From: Adobe Creative Cloud (1 item, 1 unread)				
Adobe Creati...	Creative Cloud: Please verify your email address	Thu 4/16/2015 9:...	23 KB	
From: Afzaal Hamdani (1 item, 1 unread)				

### Sorted Emails in Ascending Order through Account

## Learner's Activity

1. Sort emails in Ascending Order
  - Data Wise
  - Subject Wise
2. Sort emails in Descending Order
  - By Account Name

# Learning Unit 3: Manage Address Book

## Overview

### Outlook Address Book

The Outlook Address Book is a collection of address books or address lists, created from Outlook contact folders.

Managing address book is very necessary in MS Outlook. The Microsoft Outlook Address Book is a container that includes the main Contacts folder and any others added. This learning unit covers the procedure for sending email using addresses in address book, copying, customizing, moving, importing and exporting contacts in address book, setting up a personal address book and importing contacts from personal address book to contacts in outlook. After completion of this learning unit you will be able to understand the functionality of address book in MS Outlook.

## 1. Sending a Message Using Address Book

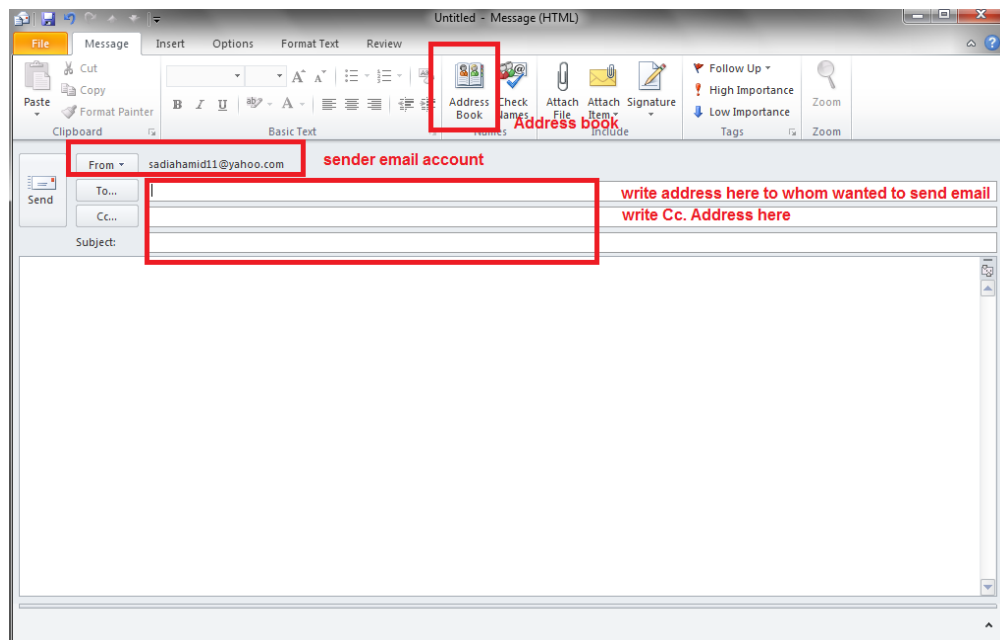
For sending a message from names in MS outlook do the following

### Sending Email

1. In MS Outlook **Mail**, click on the **Home** tab
2. In the New group, click **New E-mail**.
3. A window will be appear.

### Do you know!

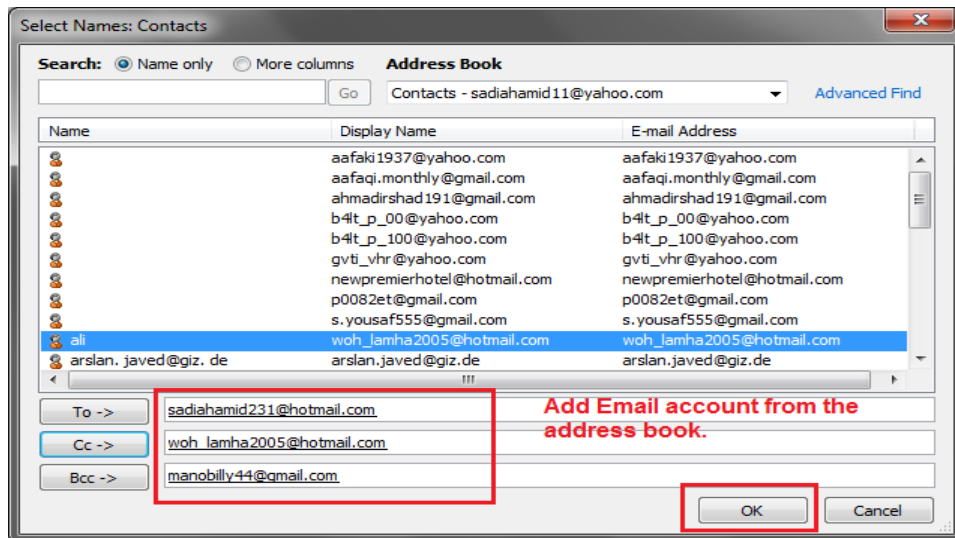
**Cc** means carbon copy and **Bcc** means **blind carbon copy**. For emailing, you use Cc when you want to copy others publicly and Bcc when you want to do it privately. Any recipients on the Bcc line of an email are not visible to others on the email.



Creating New Email in Outlook

4. Click on the Address Book a dialogue box will be appear.

(Here the receiver's email accounts, Cc. and Bcc. email Accounts can be added from the Address book



### Remember

You must exit and restart Outlook to use the address book that you added.

### Adding Email Account from Address Book

5. Click on the first text field and select an account from the address book who will receive email.
6. Click on the second field Cc. to add an email account.
7. Click on third field Bcc. To add an email account.
8. Click on OK button.
9. Then enter the subject of email, write the text in body of email attach files if any and click on Send button at the top left corner of the window.

The mail will be sent.

## 2. Specifying the Default Address Book

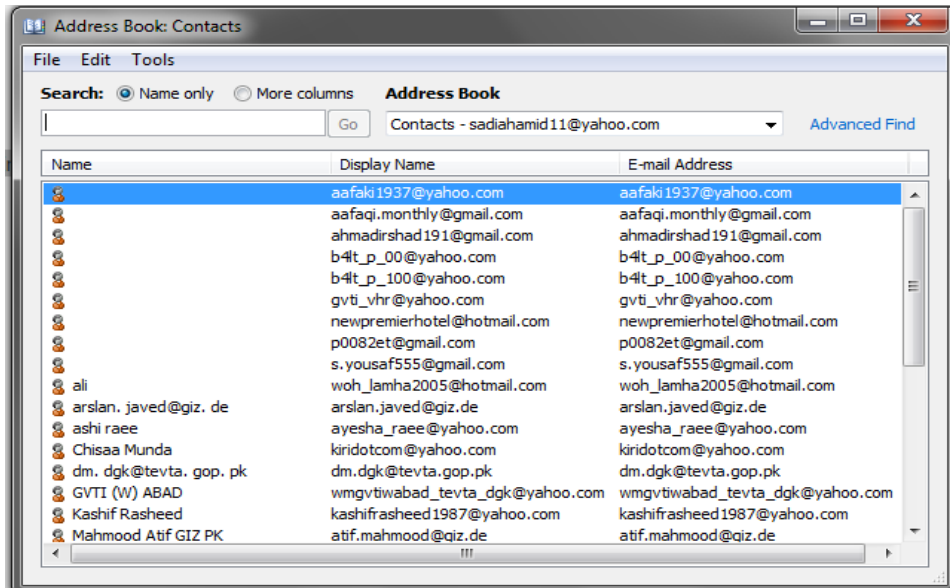
Sometimes address book cannot be found due to the default selection of address book. You can change the default address book.

To change the default Address Book, do the following:

1. On the Home tab, in the Find group, click the Address Book or click Ctrl+Shift+B).
2. In the Address Book dialog box, Click on Tools than Options to open the Addressing dialog box.

### Remember

You can also open the Address Book by clicking Address Book on the Tools menu when you are sending an email.

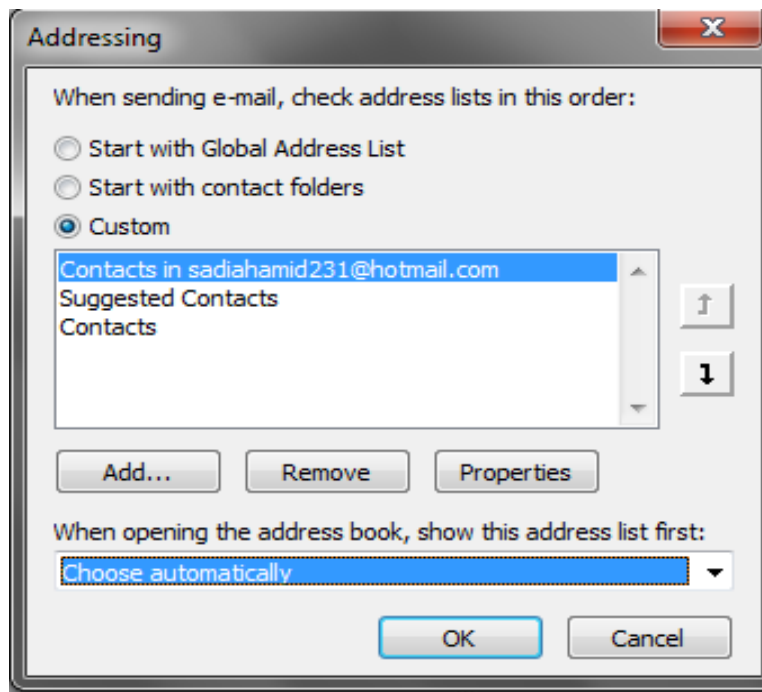


**Address book Dialogue Box**

3. From the drop-down list labeled **when opening the address book**, show this address list first, **select the desired address book**.
4. Select Custom option then select the desired address book which is wanted to show by default in Outlook.
5. Select the option” **Choose Automatically**” and click OK.

**Remember**

The **Display Name** is created based on how you type the contact's name in the **Full Name** box.



**Addressing Dialogue Box**



### 3. Copying Contacts from Personal Address Book to Outlook

Outlook automatically updates its address book whenever it is updated / upgraded to latest version otherwise it can be imported manually.

To import address book manually follow these steps:

1. Start Outlook 2010.
2. Click the **File** menu.
3. Click **Open**, and then click **Import**. The Import and Export Wizard opens.
4. Click **Import from another program or file**, and then click **Next**.
5. Click **Personal Address Book**, and then click **Next**.
6. Click **Browse**, locate the Personal Address Book that wanted to import, and then click **OK**.
7. Click **Next**.
8. Click **Finish** to import the Personal Address Book.

### 4. Changing Appearance of Names in Address Book

The appearance of address name can be changed by selecting the display format of last name, first name.

#### Change to Last Name, First Name Format:

A user can change the name format for the contacts in the main Microsoft Outlook Contact folder or any contact folders that is created. These folders are listed in the Outlook Address Book. However, you cannot change the name format for names in the Global Address List (GAL).

1. Click the **File** tab.
2. Click **Account Settings**, and then click **Account Settings**.
3. On the **Address Books** tab, in the **Name** list, click **Outlook Address Book**, and then click **Change**.
4. Under **Outlook Address Books**, click the address book that is wanted to change the contact display format for.
5. Under **Show names by**, click **File As (Ali, Khan)**.
6. Click **Close** on the **Microsoft Outlook Address Book** and **Account Settings** dialog boxes.
7. Exit and restart Outlook.

#### Global Address List (GAL)

To display this address book, you must use a Microsoft Exchange Server account. The GAL contains the names and e-mail addresses of everyone.

### Change Individual Contacts to Last Name, First Name Format:

After changing the name format for existing contacts in the Outlook Address Book, the change applies to future entries that are created. However, if all the contacts are not updated you must change the format for each contact by following steps:

1. In **Contacts**, double-click a contact that does not appear in the last name, first name format.
2. In the open contact, in the **File as** box, click the name in the last name, first name format.
3. On the **Contact** tab, in the **Actions** group, click **Save & Close**.
4. Repeat for each contact not displayed in the correct name format.

## 5. Including or Excluding Contacts Folder from Address Book

### Including Contact to an Address Book:

1. On the **Tools** menu, click **Account Settings**.
2. On the **Address Books** tab, click **New**.
3. You are prompted to select one of two types of address books. To add the type of address book that you want, follow these steps:

### Adding an Address Book by Using an Internet Directory Service (LDAP):

1. Click **Internet Directory Service (LDAP)**, and then click **Next**.
2. In the **Server name** box, type the name of the server that was provided by your Internet service provider or system administrator.
3. If the server that you specified is password-protected, select the **This server requires me to log on** check box, and then type your user name and password.
4. Click **More Settings**.
5. Under **Display Name**, type the name for the LDAP address book that you want to be displayed in the **Address Book** list in the **Address Book** dialog box.
6. Under **Connection Details**, type the port number provided by your Internet service provider (ISP) or system administrator.
7. Click the **Search** tab, and then change the server settings as needed. The Search Time-Out setting specifies the number of seconds that Outlook spends searching the LDAP directory to resolve names in a message. You can also limit the number of names listed in the Address Book after a successful search for a name.
8. Under **Search Options**, if the **Search base** box is empty, type the distinguished names that were provided by your administrator.
9. Click **OK**, click **Next**, and then click **Finish**.

### Add an Additional Address Book

1. Click **Additional Address Books**, and then click **Next**.
2. Click the address book that you want to add, and then click **Next**.

#### Remember

You can delete this export file after your contacts are imported into Outlook.

### Removing an Address Book:

1. On the **Tools** menu, click **Account Settings**.
2. On the **Address Books** tab, click the address book that you want to remove.
3. Click **Remove**.
4. Click **Finish**.

## 6. Moving Contacts from one Contact Folder to another

### Transferring contacts between Outlook and other mail account:

To Import contacts from yahoo mail to Outlook, follow these steps:

1. Log on to yahoo mail account.
2. In the left column, click **Contacts**.
3. At the top of the contacts section, click **More actions**, and then click **Export**.
4. Under **which contacts do you want to export**, click a contact group or **All Contacts**.
5. Under **Which export format**, click **Outlook CSV (for importing into Outlook or another application)**.
6. Click **Export**.
7. When prompted to download the export file, click **Save**.
8. Choose a location on computer to temporarily save the file. The default file name is google.csv. Click **Close**.
9. Go to Outlook.
10. Click the **File** tab.
11. Click **Open**.
12. Click **Import**.
13. Click **Import from another program or file**, and then click **Next**.
14. Click **Comma Separated Values (DOS)**, and then click **Next**.
15. In the **Import a File** box, browse to find the file downloaded in step 8, and then double-click the file.

16. Click one of the following:

- Replace duplicates with items imported
- Allow duplicates to be created
- Do not import duplicate items

17. Click **Next**.

18. In the folder list, click the contacts folder where wanted the imported contact information to go, and then click **Next**.

19. Click **Finish**.

### Exporting Contacts from Outlook to other mail account:

Before exporting contacts from Outlook, it is helpful to understand the difference between the Outlook Address Book and Outlook Contacts. Both are part of Outlook. However, the Address Book is a compilation of the different address lists that might store in Outlook, such as LDAP Internet directories, the global address list (GAL), or other third-party address books. Contacts are only one of the address lists included in an Address Book. Only contacts can be exported directly from Outlook to yahoo mail or any other configured email account.

1. Click the **File** tab.

2. Click **Options**.

3. Click **Advanced**.

1. Under **Export**, click **Export**.

1. In the **Import and Export Wizard**, click **Export to a file**, and then click **Next**.

2. Click **Comma Separated Value (DOS)**, and then click **Next**.

3. In the folder list, click the contacts folder wanted to export, and then click **Next**.

4. Choose a location on computer to temporarily save the file.

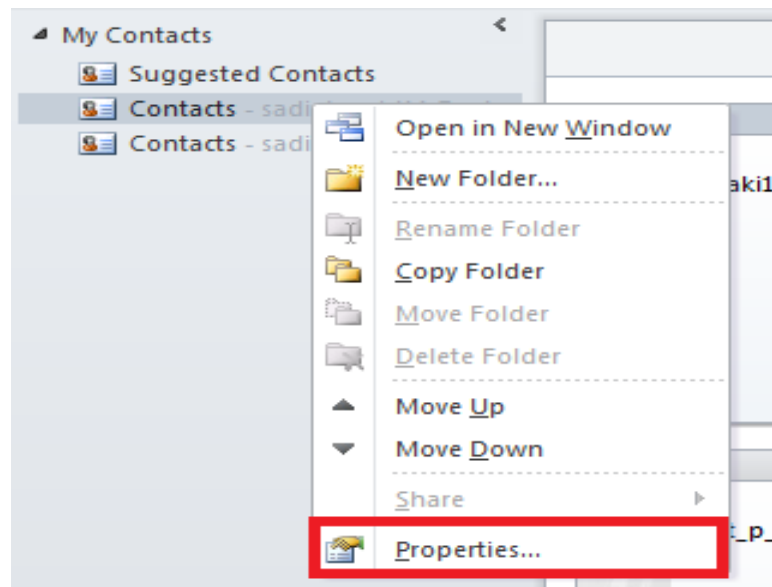
5. Type a name for the exported file, and then click **Next**.

6. Click **Finish**.

## 7. Setting Up Personal Address Book as the Place to Store Addresses

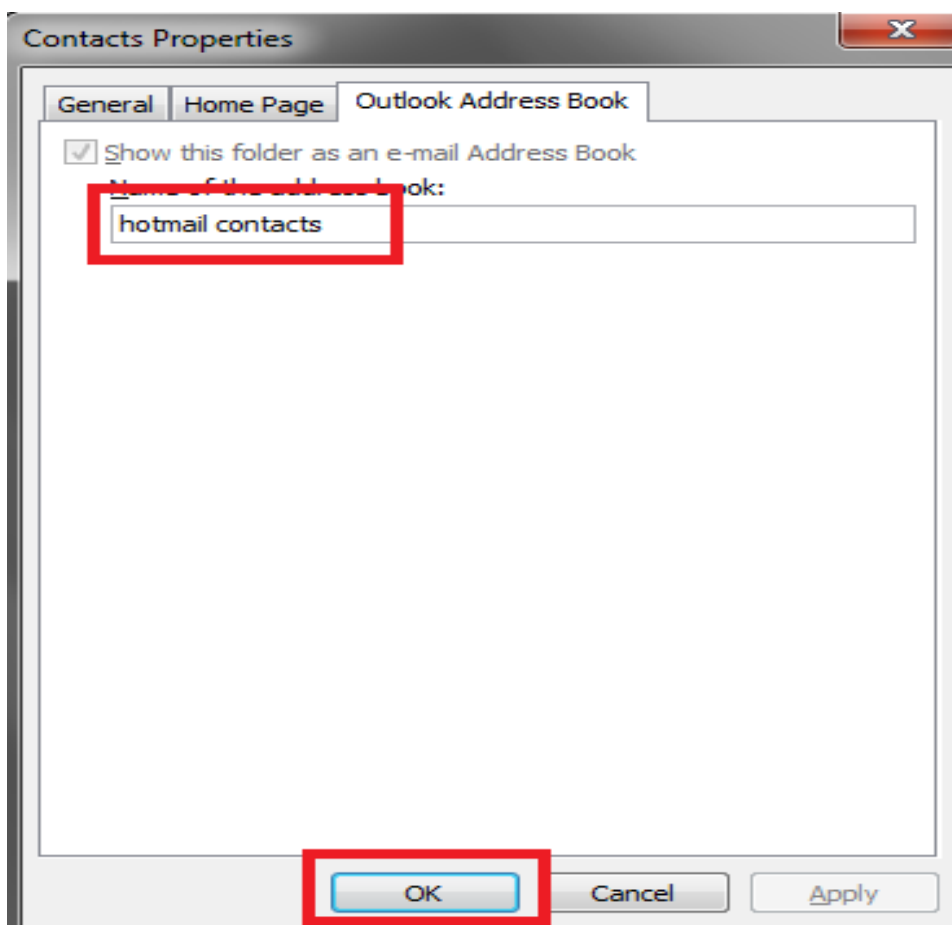
In case of large Contact List, you can easily create a personal Address Book from these entries.

1. Right click over the Contact List (do not open)



### Adding Personal Address Book

2. Select Properties



#### Remember

When you add or edit a contact record, the personal address book is automatically updated.

#### Do you know!

NK2Edit is a downloadable Windows-based application that enables users to revise or modify their device's 'AutoComplete' function to suit their personal preferences or needs.

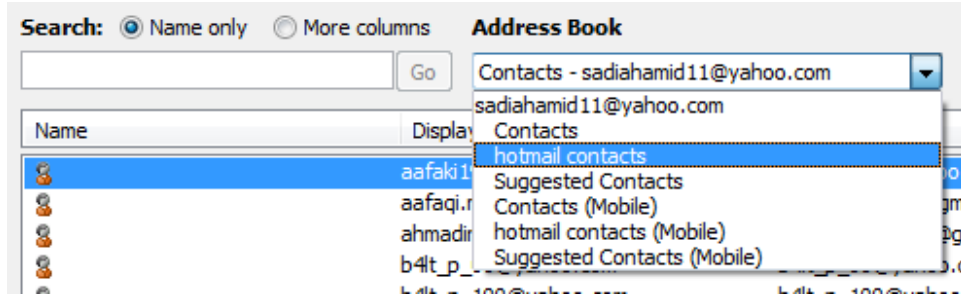
### Adding Personal Address Book

1. Click Outlook Address Book tab.

2. Check the "Show this folder as an e-mail Address Book" option.
3. Type in the name for this new Address Book.
4. Click Apply
5. OK to save the settings

Now a new Address Book list that will show up when search for email names/addresses.

1. Click New E-mail
2. Click on To button
3. From the Address Book list.
4. Click Personal List option.
5. Search for names in the List.



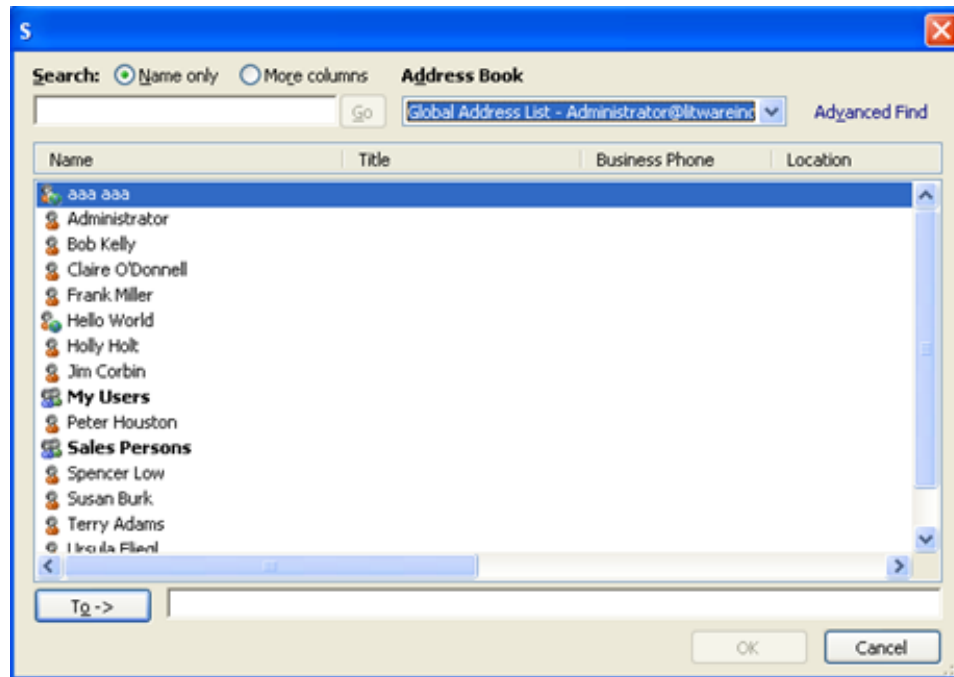
**Adding New Address List**

## 8. Importing Contacts from a Personal Address Book to Contacts

NK2Edit allows to easily importing the email addresses stored in address book of Outlook directly into NK2 file.

In order to use this feature

1. Go to Action Tab in NK2Edit than Add Records from Address Book, or simply press Ctrl+F6. The address book window of Outlook will be displayed:



### Opening Address Book

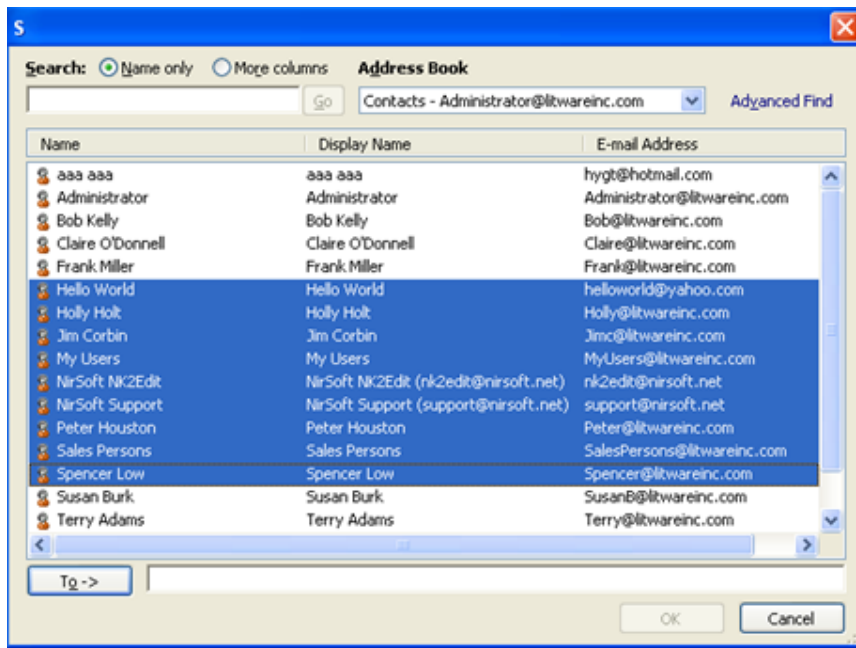
2. In the 'Search' section, choose 'Name Only' to view all addresses.

or alternatively, choose 'More Columns' and then type a search string.

In the 'Address Book' combo-box, choose the desired address book.

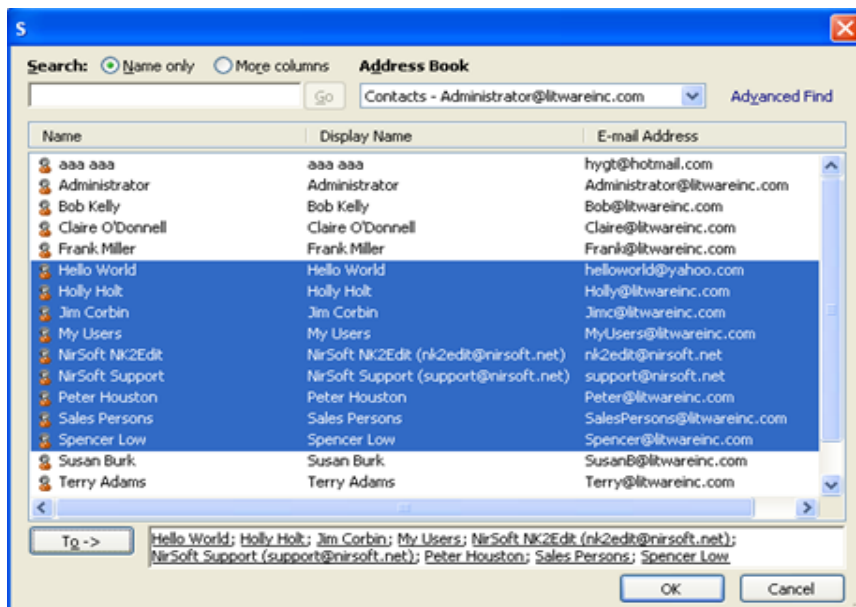
For non-Exchange profiles, only choose 'Contacts'. For Exchange profiles, other address books may also be available, like **'Global Address List'** and **'Personal Address Book'**.

3. After choosing the desired address book, select multiple addresses to add into NK2 file, by holding down the Shift or Ctrl key and selecting the desired addresses with the UP/Down arrow keys.



### Searching Contacts by Name

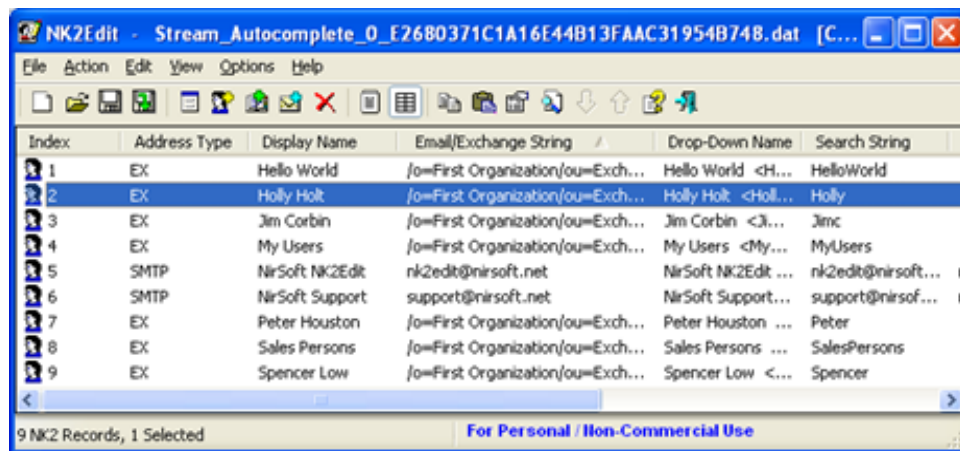
4. Press the 'To' button in order to add the selected addresses to the list.



### Adding Selected Addresses to the List

5. After that, press the 'Ok' button, and then the addresses list will be added into current NK2 file:





### Adding Selected Addresses to NK2 File

## Learner's Activity

- Import contact list of your yahoo account to Contacts folder.
- Create a personal address list in contacts.
- Send email to anyone of the contacts of the list.
- Delete any of the contacts list from the contacts folder.

# Learning Unit 4: Archive Email Data

## Overview

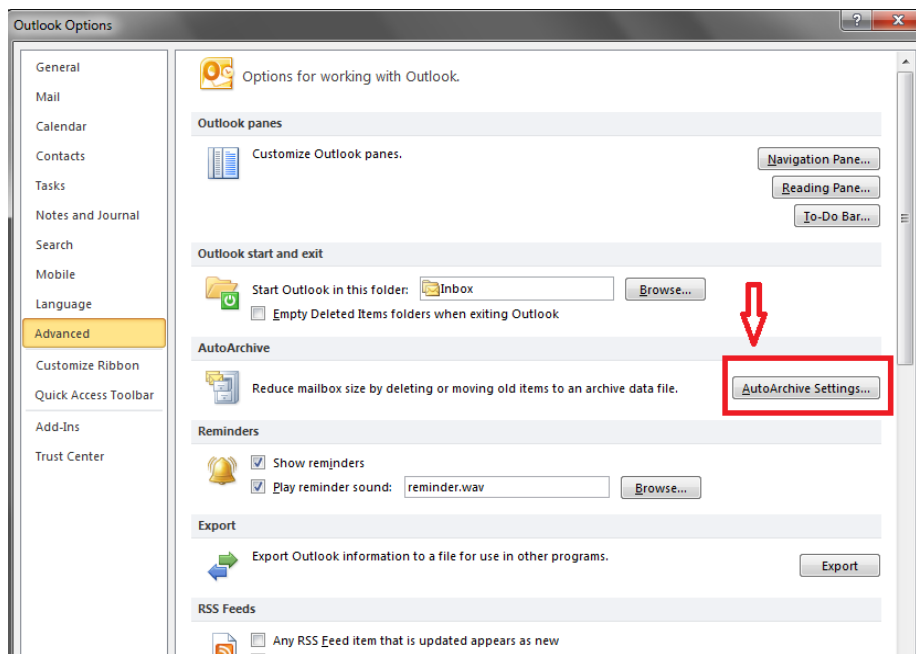
An archive can include a simple list of files or files organized under a directory or catalog structure depending on how a particular program supports archiving. In this learning unit you will cover learn archiving emails for compressing the size of main personal folder and data file (PST) small and manageable. After completion of this learning unit you will be able to create archive of emails in outlook at regular basis for back up and future use and retrieving of emails from this archived file.

## 1. Archiving Old Mails in Outlook & Keeping Main PST File Small Using Auto Archive

Microsoft Outlook allows individuals to archive items to free up space in their inbox. They are saved in Outlook data file format, or ".pst" it can either set up an automatic archive feature or manually archive emails and items regularly.

For achieving emails automatically do the following.

1. Click on the **file** tab.
2. Choose the "**Options**" button.
3. Click "**Advanced**" and go to "**AutoArchive Settings**."



### Archive

An archive is a collection of computer files that have been packaged together for backup, to transport to some other location, for saving away from the computer so that more hard disk storage can be made available, or for some other purpose.

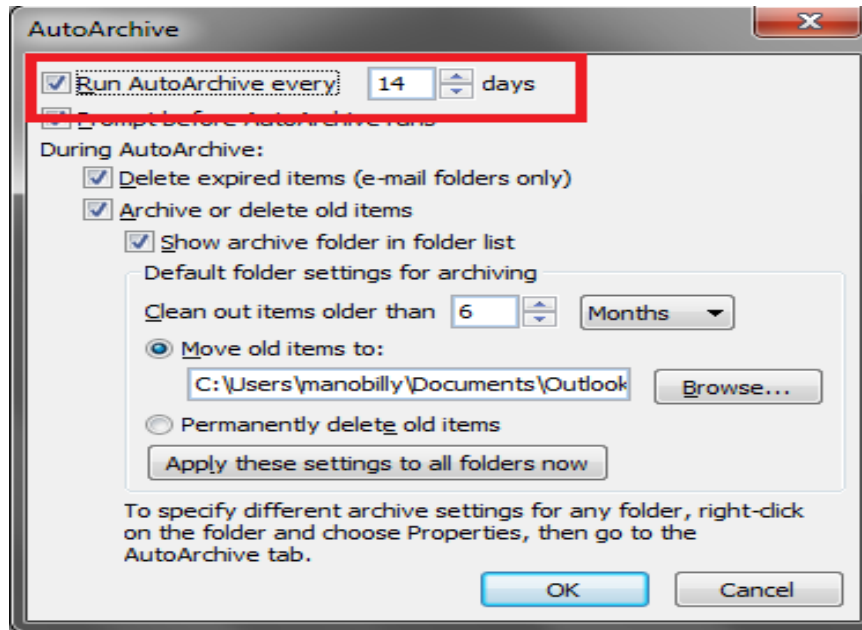
### Auto Archive Emails

4. A dialogue box will be open.
5. Choose the frequency with which wanted to run **AutoArchive**.
6. Type a number in the section that says "**Run AutoArchive every \_\_\_ days.**"

If wanted to turn **AutoArchive off**, type a zero for the number of days.

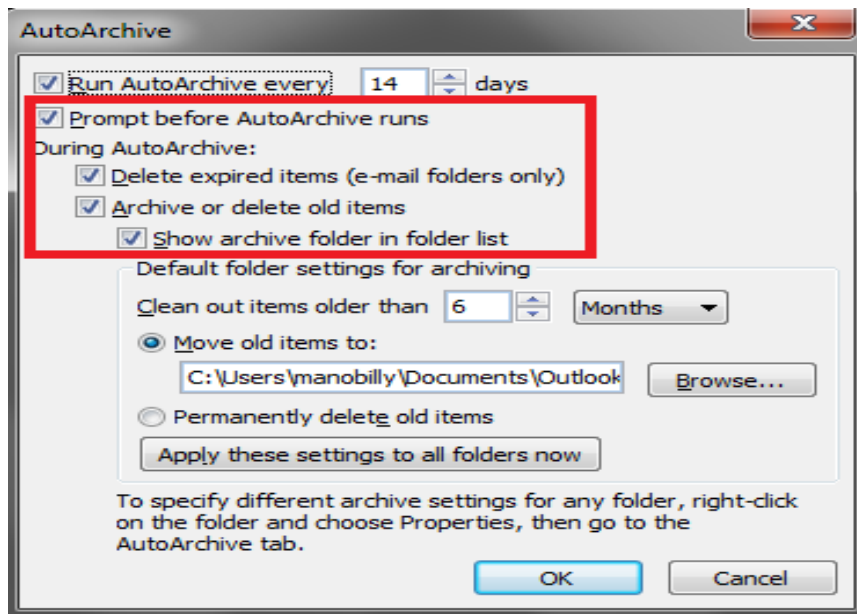
**Remember**

The pst-file is also known as Personal Folders and Outlook Data File.



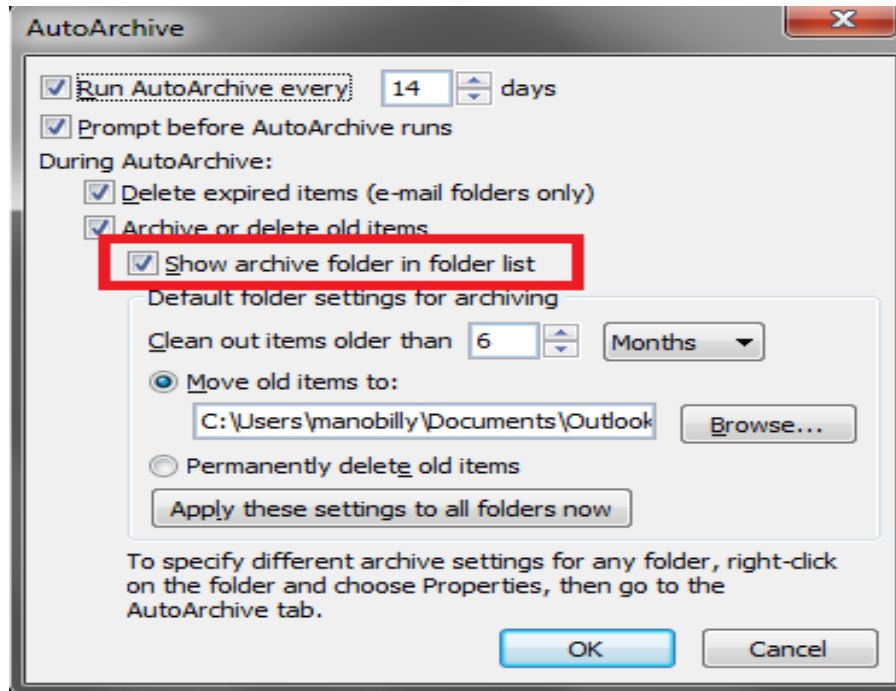
**Auto Archive Emails**

7. **Choose additional options.** For example,
- Choose to delete the archived messages automatically.
  - Choose prompt before “Auto-archive Runs” to prompt the user when it is time to run.



**Auto Archive Emails**

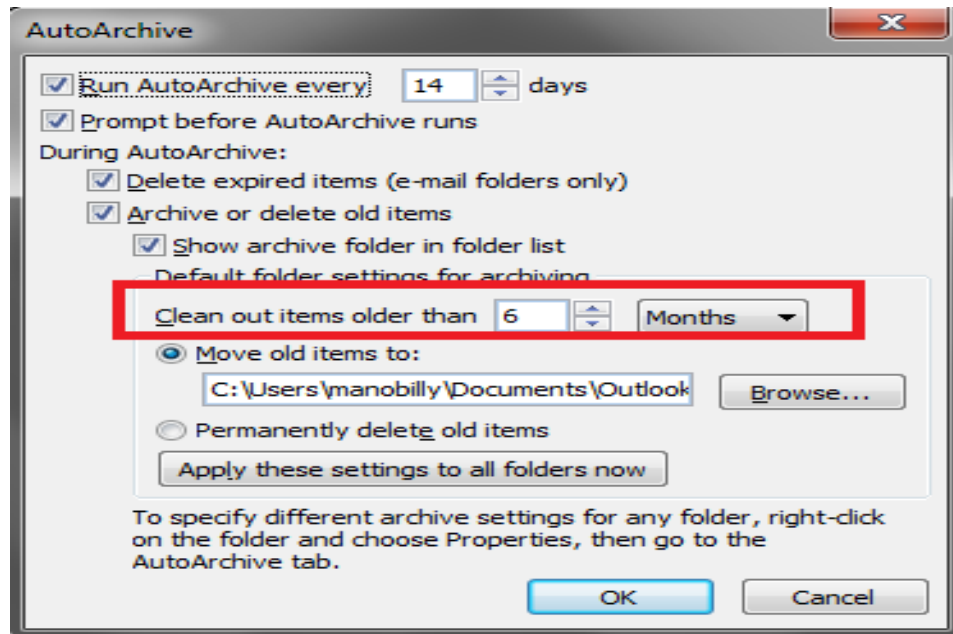
8. Enable the box to **show archive folder in folder list**. This will allows accessing archived items more quickly.

**Do you know!**

Auto Archive, which is turned on by default, automatically moves old items to an archive location at scheduled intervals.

**Auto Archive Emails**

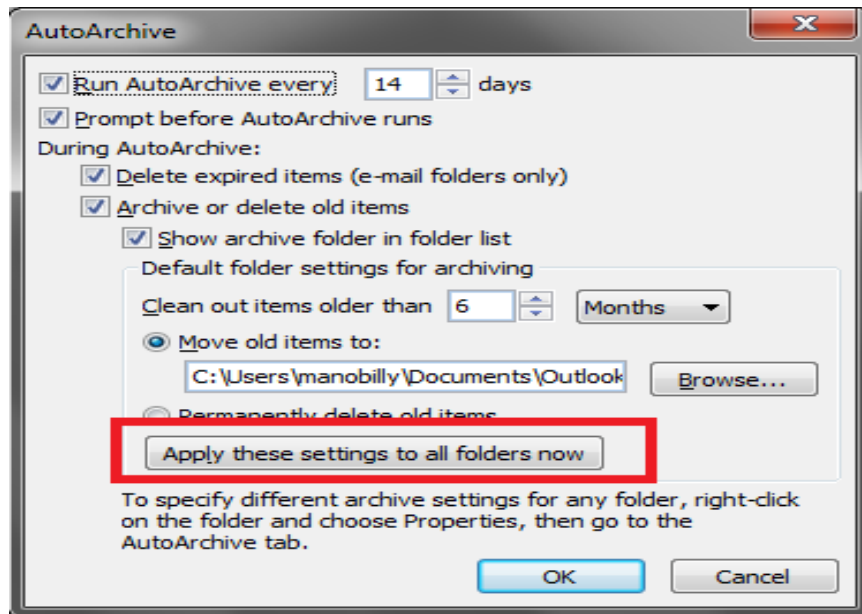
9. Decide how old the items have to be in order to be archived. Choose this under "Clean up items older than months."

**Auto Archive Emails**

10. Decide whether it is wanted to apply these settings to all folders. Check the box, if so.

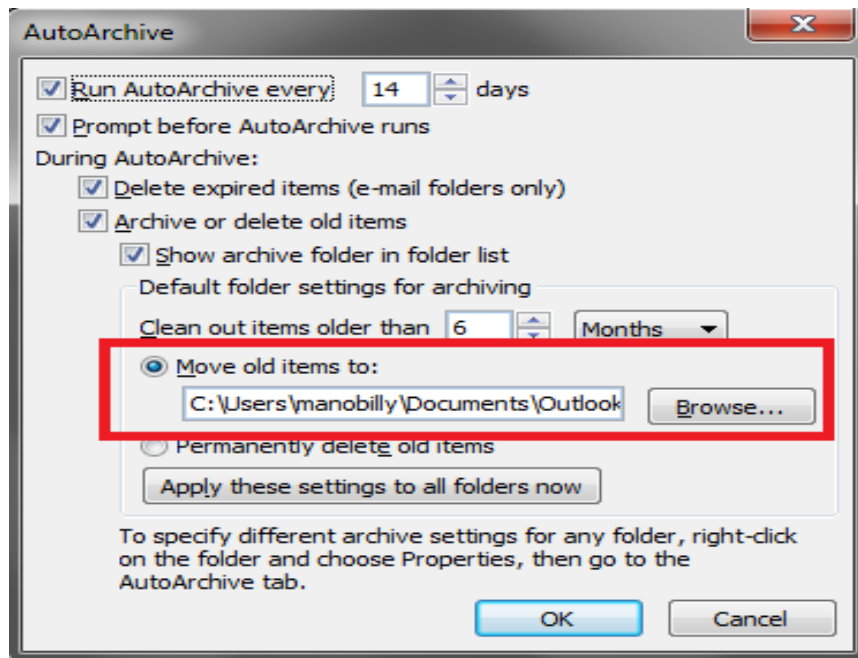
**Remember**

Upgrading to Outlook 2010 or Outlook 2013 will not move your PST-files to the new location.



**Auto Archive Emails**

11. Select the location where wanted the archived items to be stored. Use the browser to change from the default file.

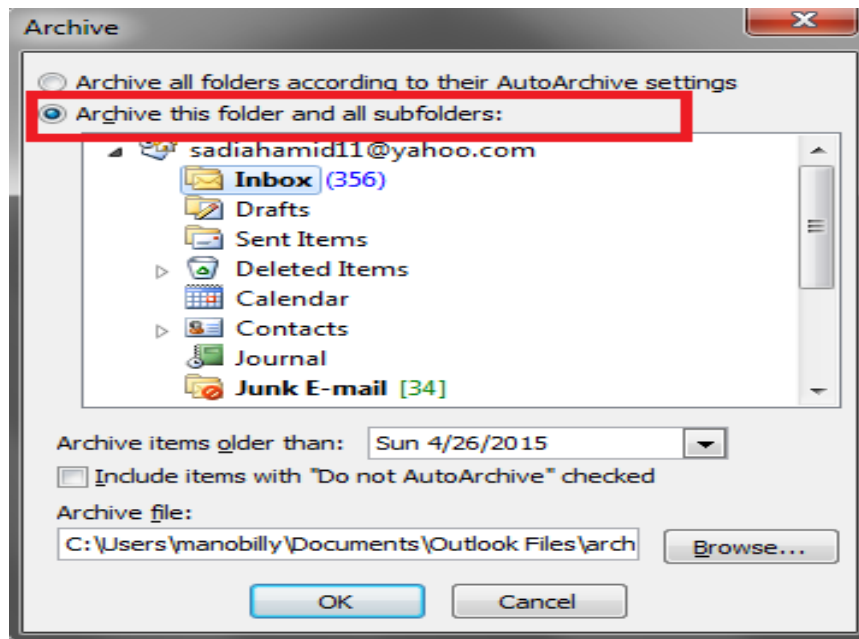


**Auto Archive Emails**

12. Click "OK" to begin Auto-Archive program. It will automatically run according to the number of days specified by the user.

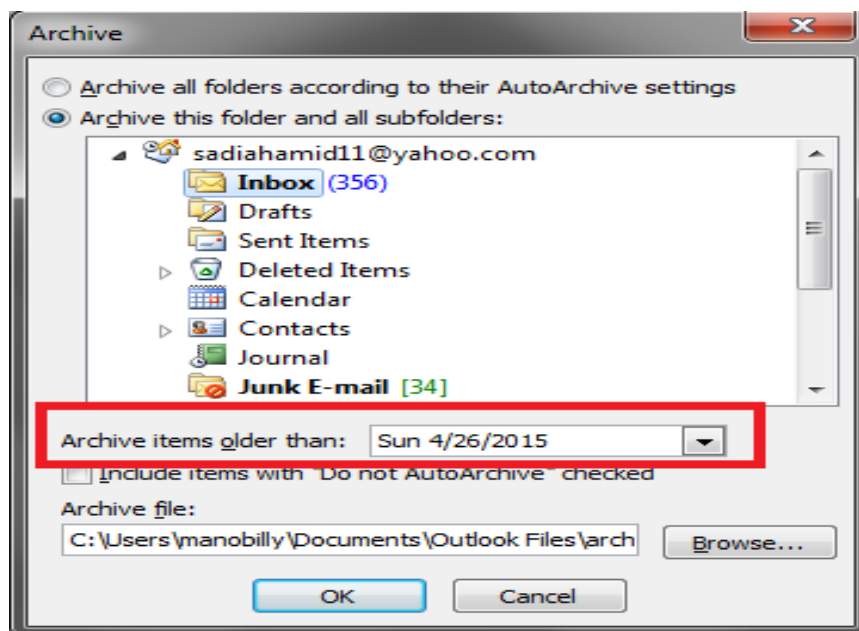
## 2. Creating Archive of Old Messages Separate from Main PST File

1. Click on the "Archive" option.
2. Select the **archive this folders and all sub folders**, in the dialog box.



### Creating Archive Mails

3. Choose the folder would like to save and archive in the browser window.
4. Choose a date when Outlook will decide items should be archived.

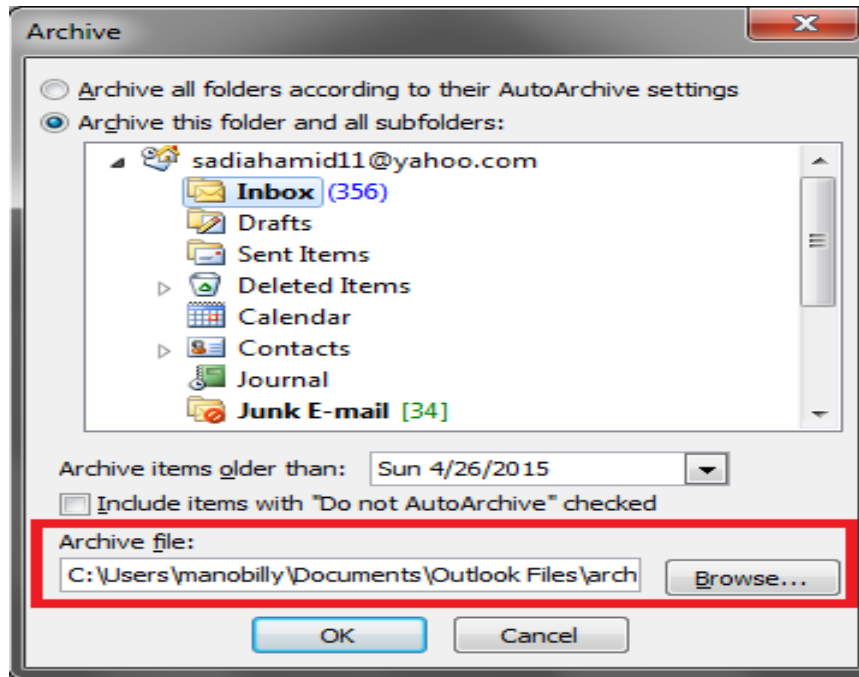


### Creating Archive Mails

5. Select the location of the archive file.

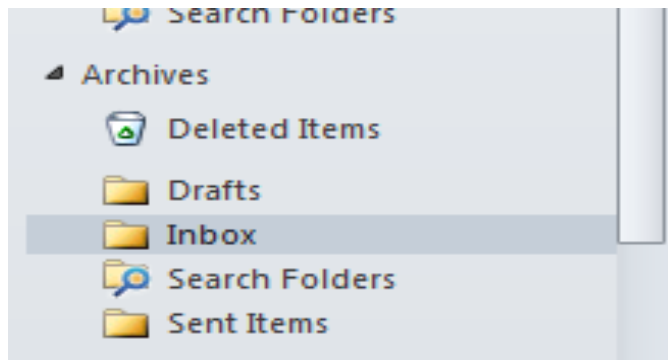
**Do you know!**

Outlook automatically creates another archive file for items in the folder and location specified.



**Creating Archive**

6. Click **OK**. The Archive will be created.



**Archive Mail Folder**

### 3. Retrieving Messages from an Archived PST File after Closing

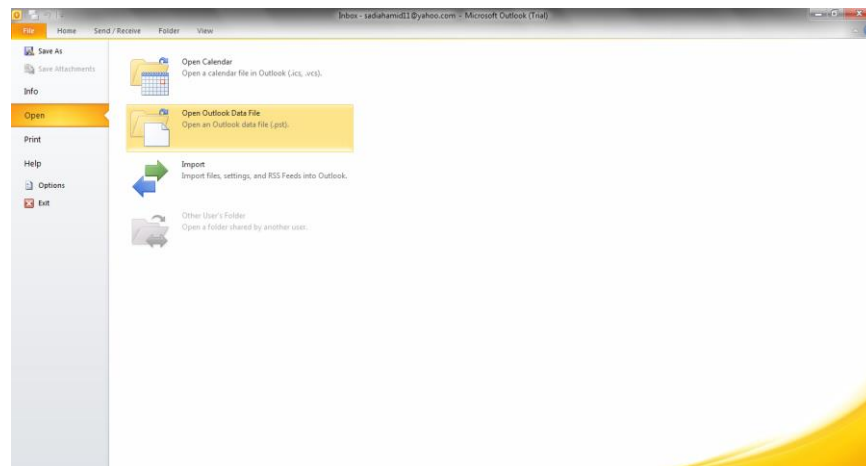
There are 3 ways to retrieve the data from archives.

- Moving individual items from a .pst file into their original folder or a new one.
- Copy the e-mail back to the original folder.
- Copying e-mail to a new folder.

**Opening a .Pst File:**

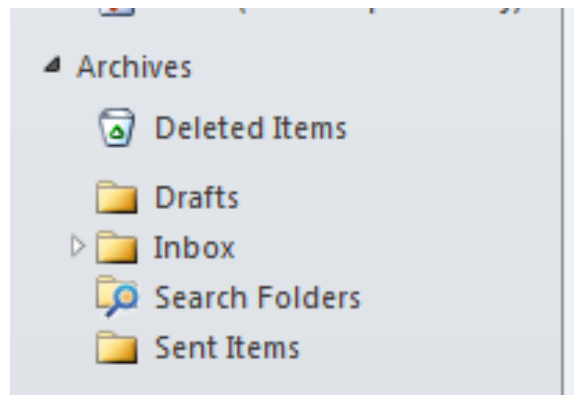
1. On the **File** tab, click **Open**.
2. Click **Open Outlook Data File (.pst)**.





### Importing PST File

3. Choose the PST file and click **OK**.
4. The folders from the PST file will now appear in the folder sidebar.



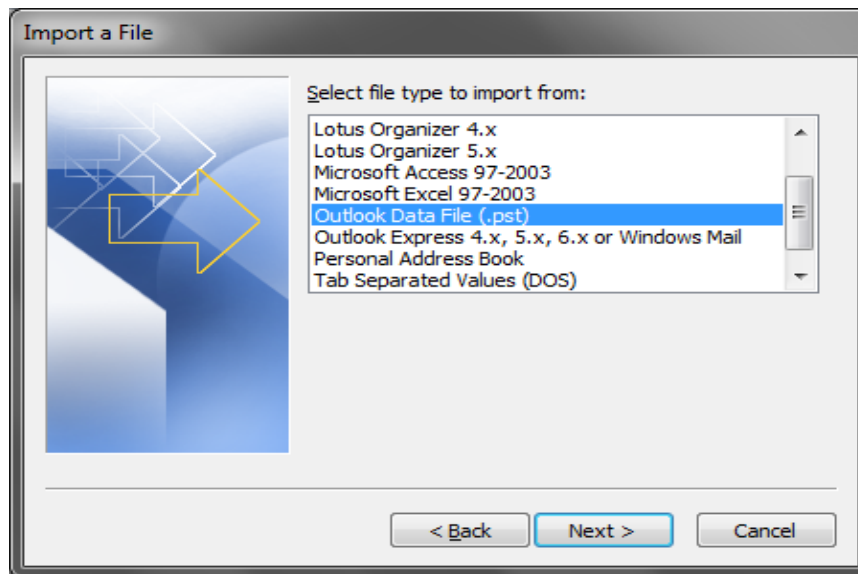
### Archive Emails Folder

#### 1. Retrieving / Copying all Archived Items from a .PST File Back into their Original Folder:

1. On the **File** tab, click Open.
2. Click **Import**.
3. Click **Import from another program or file**. Click Next.
4. Click **Outlook Data File (.pst)**. Click **Next**.

#### Remember

Never try to open a pst-file by overwriting an existing pst-file. Doing so will corrupt your mail profile and could lead to countless of "weird" issues.

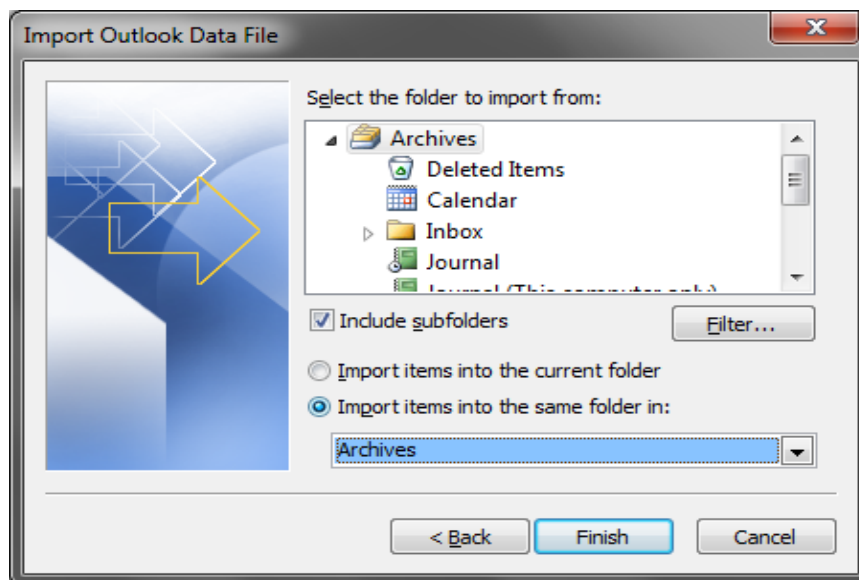


### Importing Archived Emails

5. Click **Browse** and choose the file wish to import.
6. Click the folder to import from. Select the Include subfolders check box if the folder that is importing has subfolders wanted to import as well.
7. Select one of the destination options:
  - **Import items into the current folder** - this imports the data into the folder currently selected.
  - **Import items into the same folder in** - this imports the data into the destination folder of the same name as the source folder, e.g., from Inbox to Inbox.
8. Click **Finish**.

#### Do you know!

While making a copy of the pst-file will effectively backup your Outlook data, it will not include any mail account configuration settings (mail profile), templates or signatures.

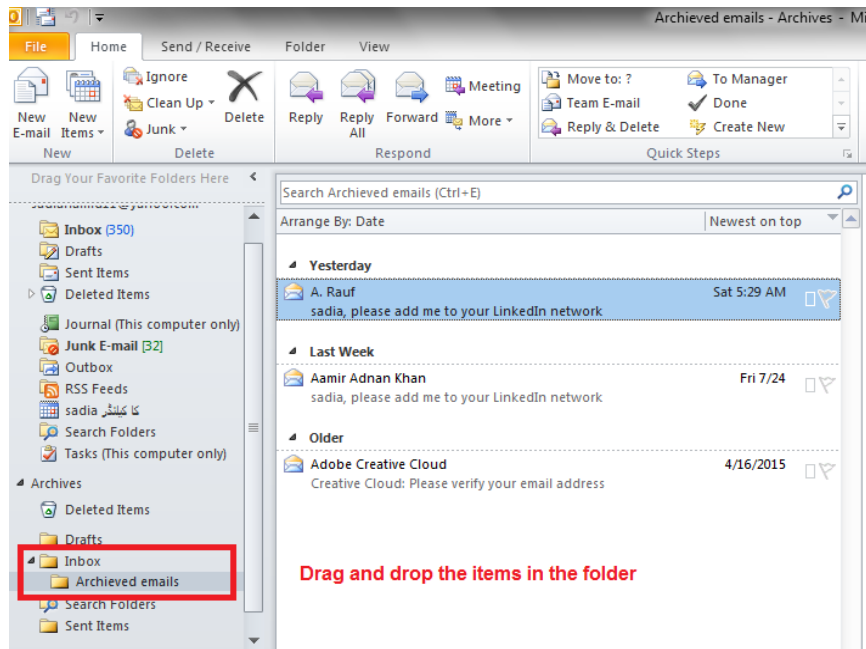


### Importing Archived Emails

## 2. Moving Individual Items from a .PST File into their Original Folder or a New One

1. On the **File** tab, click Open.

2. Click **Open Outlook Data File (.pst)**.
3. Choose the **PST** file and click OK.
4. The folders from the PST file will now appear in the folder sidebar.
5. Click the folder containing the items want to move.
6. Select the items want to move, and then drag them into their original folders in the Folder List.



### Remember

If you receive an error message that "the .pst is already in use," there may be some size or corruption issues with the .pst file.

### Moving Archived Mails to other Folder

#### 3. Copying all Archived Items from a .PST File Back into a New Folder:

In Outlook, create a new folder to copy the archived items to.

1. On the **File** tab, click **Open**.
2. Click **Import**.
3. Click **Import from another program or file**. Click **Next**.
4. Click **Outlook Data File (.pst)**. Click **Next**.
5. Click **Browse** and choose the file wanted to import.
6. **Select Import items into the current folder**.
7. Click **Finish**.

## Learner's Activity

- Create an Auto archive of your emails in outlook.
- Create an archive of emails manually.
- Retrieve emails using different archiving methods.

# Learning Unit 5: Perform Browsing

## Overview

A **search engine** is a software program available through the internet that searches documents and files for keywords and returns the results of any files containing those keywords. In this learning unit you will learn how to use search engines to browse the data such as pictures, books, PowerPoint presentations and articles. After completion of this learning unit you will be able to perform browsing in manner that exact information is browsed and data can be fetched.

## 1. Search Engines

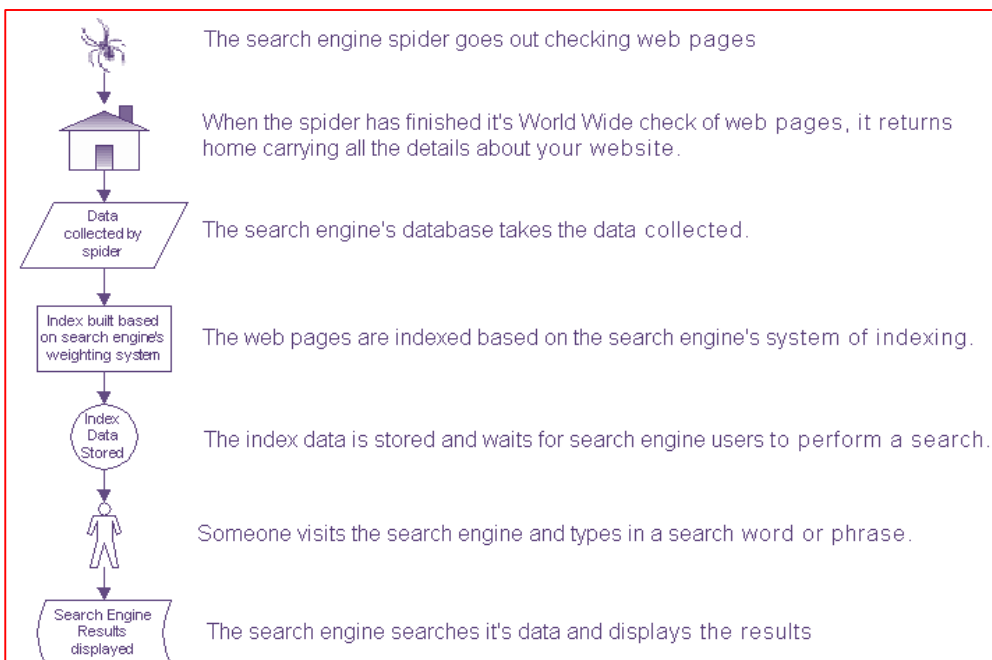
A **Web Search Engine** is a software program that is designed to search for information on the World Wide Web. The search results are generally presented in a line of results often referred to as search engine result pages (SERPs). The information may be a mix of web pages, images, and other types of files.

There are 3 parts to a search engine:

1. The search engines use robots (also known as spiders) to search the internet for websites.
2. The results of the spiders' travels are put in a database which is then indexed based on words found and where these words were found.
3. The users of search engines search for words or phrases related to what they are looking for and the search engine index returns related sites.

### Search Engine

**Search engines** are a program that search documents for specified keywords and returns a list of the documents where the keywords were found.



### Web Browser

A browser is a software application used to locate, retrieve and display content on the World Wide Web, including Web pages, images, video and other files. i.e. Internet Explorer

### Different Types of Search Engines:

Although the term "search engine" is often used to describe crawler-based search engines, human-powered directories, and everything in between.

### Crawler-Based:

#### Keyword

A word used by a search engine in its search for relevant Web pages is known as Keyword.

Crawler-based search engines such as **Google, Yahoo and Bing**, compile their listings automatically. They "crawl" or "spider" the web and people search through their listings.

Crawler-based search engines are good when you have a specific search topic in mind and can be efficiently search the relevant topic. However, when the search topic is general, crawler-base search engines may return with hundreds of thousands of irrelevant responses to simple search requests, including lengthy documents in which your keyword appears only once.

### Human-powered directories:

Such as the **Yahoo Directory, open directory** and **look Smart**, depend on human editors to create their listings. Webmasters submit an address, title, and a brief description of their site, and then editors review the submission.

## 2. Browsing the Data Using Keywords

### Keyword:

#### Do you know!

There are many other web browsers like Mozilla Firefox, Opera, Google Chrome etc.

Keywords are words or phrases that describe content. They can be used as metadata to describe images, text documents, database records, and Web pages. A user may "tag" pictures or text files with keywords that are relevant to their content. Later on, these files may be searched using keywords, which can make finding files much easier.

### Browsing data using keywords:

Keywords are used on the web in two different ways:

- As search terms for search engines.
- Words that identify the content of the website.

### Search Engine Search Term:

Whenever you search for data using a search engine. You type keywords that tell the search engine what to search for. For example, if you are searching for Mobile phones, you may enter "Mobile Phones" as your keywords. The search engine will then return Web pages with content relevant to your search terms. The more specific keywords you use, the more specific and useful the results will be. Therefore, if you are searching for a mobile of specific company, you may enter something like "Samsung Mobile Phones" to get more accurate results.

**Web Page Description Term:**

Keywords can also describe the content of a Web page using the keyword meta tag. The purpose of the keywords meta tag is to help search engines identify and organize Web pages.

### 3. Performing Browsing On Different Search Engines

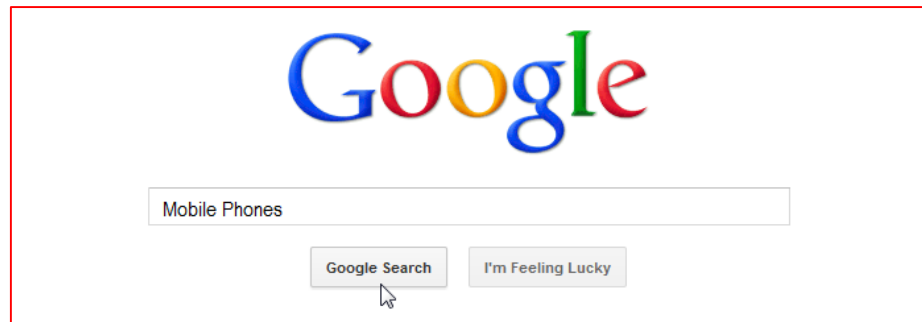
With a few basic search strategies, you can find almost anything online. It doesn't matter if you're using **Google**, **Yahoo!**, **Bing**, or some other type of search engines; most of the techniques are same.

Google is most common **search engine** on the Internet.

**Browsing using the Google:**

The steps are used to search data using Search Engine.

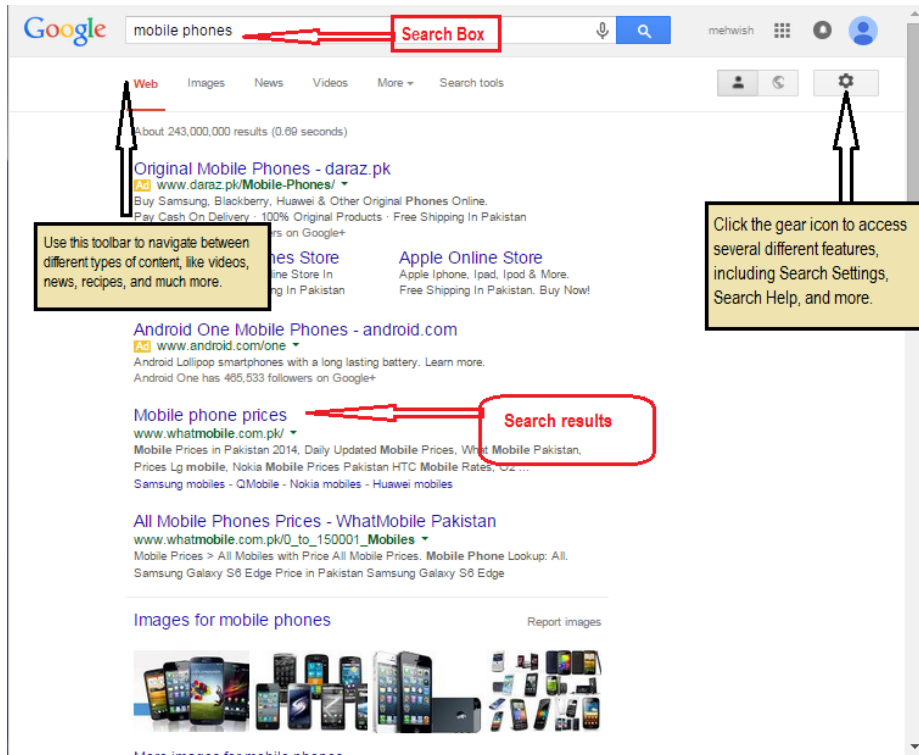
1. Go to Google's homepage at **Google.com**. From there, conducting a search is straightforward. Just type your search terms in the box, then click the Google Search button or press Enter on your keyboard.



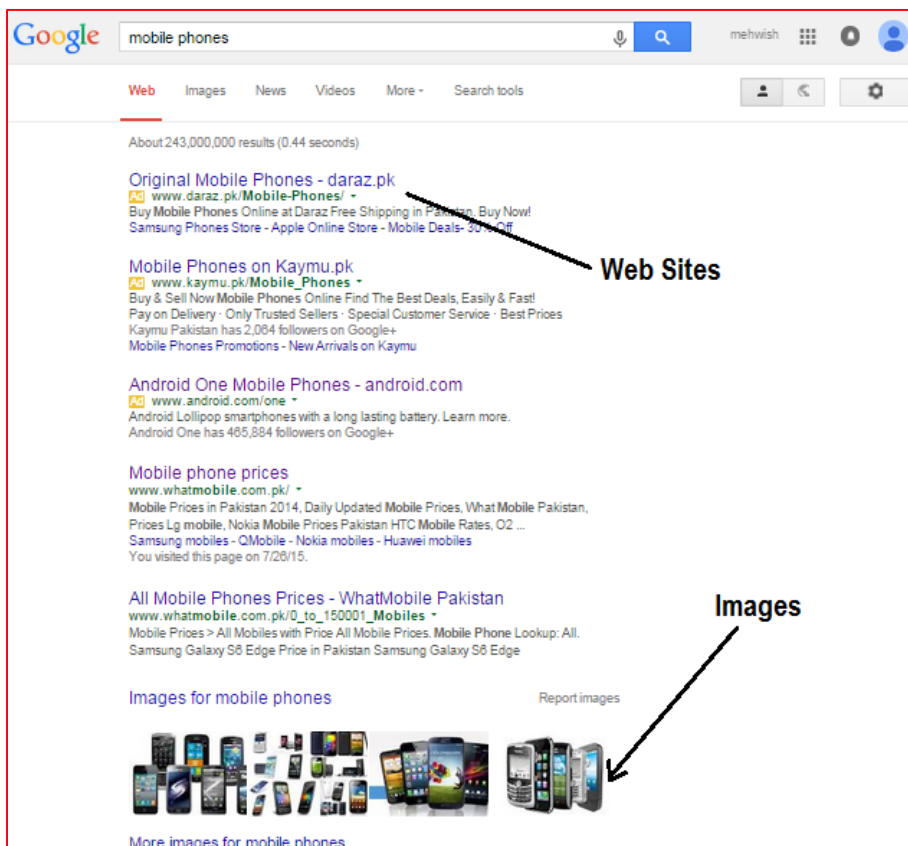
2. The web page will be open with the expected result.

**Important**

The read links will be shown in Purple color while link that you did not check will be displayed in Blue.



3. After you've searched, you'll get a page full of results. Some of these will be matching pages from across the web. You might get news or image results mixed in, as you can see below:





- Google doesn't know exactly what you want, when you enter keywords, the results you get are its best guess. There are ways you can help it make better guesses. At the lower part of page you can see the options of related searches where you can get the best Keywords for your search.

**In the news**

**FY15: Mobile phone imports clock in at \$630m**  
 The Express Tribune - 2 days ago  
 In a sign that the rising demand for portable broadband will continue to drive mobile phone ...

[More news for mobile phones](#) **News**

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**Free classifieds ads for Mobile Phones in Pakistan**  
 olx.com.pk > All Ads > Mobiles & Tablets ▾  
 OLX Pakistan offers online local classified ads for **Mobile Phones** - Post your classified ad for free in various categories like mobiles, tablets, cars, bikes, laptops, ...

**Free classifieds ads for Mobile Phones in Karachi - OLX ...**  
 olx.com.pk > Karachi > Mobiles & Tablets ▾  
 OLX Karachi offers online local classified ads for **Mobile Phones** - Post your classified ad for free in various categories like mobiles, tablets, cars, bikes, laptops, ...

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**Searches related to mobile phones** → **Keywords options related to your search**

- mobile phones prices
- samsung mobile phones
- compare mobile phones
- nokia mobile phones
- sony ericsson mobile phones
- htc mobile phones
- history of mobile phones
- lg mobile phones

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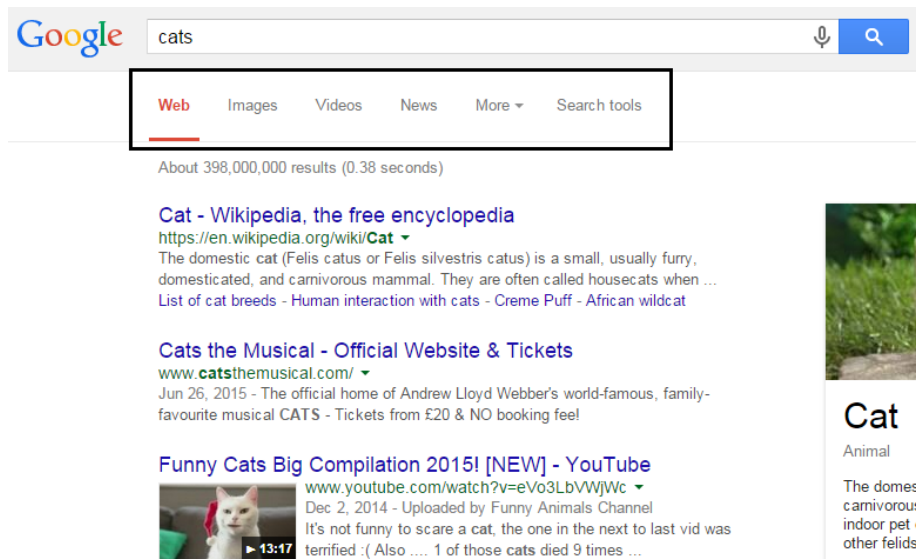
**More Searches related to this topic**

**Google** >  
 1 2 3 4 5 6 7 8 9 10 Next

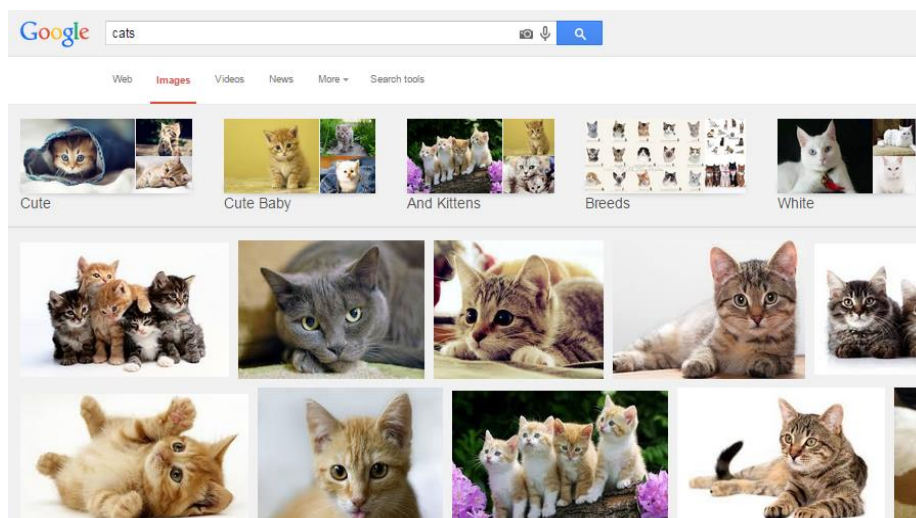
#### 4. Perform Browsing of Different Objects

Different categories are available to search some specific type of data as **images, power point slides** books etc.

In the Google search Engine you can navigate between different types of contents using the option available on the upper side of the search bar.



1. To search the images of “Cats” write the keyword **Cat** in the Search bar and click the Images button on the upper side of search Results as shown in the picture above.



2. Similarly you can search videos, News and many other objects using the tabs.

To search the powerpoint slides follow these steps:

1. Type the keywords that you want to search out on web and along with keywords, type **“.ppt”** that will show the type of search we want to do.
2. In the result, the mostly searches will be displayed in the powerpoint format as shown in the picture below:

Google

parts of computer.ppt

Web Videos Images News More Search tools

About 7,260,000 results (0.44 seconds)

[PPT] Computer Parts.ppt  
www.uen.org/.../downloadFile.cgi?...Computer\_Parts.ppt..Computer\_Pa...  
There are many parts that work together to make a computer work. Hardware. Physical parts of the computer, including processor and memory chips, ...  
You visited this page on 7/26/15.

[PPT] Parts of the Computer ppt.ppt  
www.vml.k12.la.us/.../Computer%20Program/Computer%20teaching%...  
Parts of the Computer. By: Olivia Krause. Kaplan Elementary / Summer 2008. Monitor. A monitor is the computer. screen you look at and work on. A monitor ...

Parts of a Computer - SlideShare  
www.slideshare.net/sheafox/parts-of-a-computer-1354384  
Apr 27, 2009 - The parts of a computer slideshow for grades 3-4. Includes a quiz and activity. ... basics of computer system ppt. Suaj. 84,397. Types and ...

Computer hardware component. ppt - SlideShare  
www.slideshare.net/nsihag/computer-hardware-component-ppt  
Nov 4, 2012 - Transcript of "Computer hardware component. ppt". 1. Computer Hardware Components; 2. Computer Hardware components Motherboard ...

[PPT] Chapter 3: Computer Hardware Components: CPU, Me...  
cs-people.bu.edu/smonica/useful\_stuff/lectures/cs101/ppts/ch3.ppt  
What is the typical configuration of a computer sold today? The Computer ... Input:

### Remember

The document with specific format can be search through the Advance Search option on the main page of the Goole.com.

3. Click on the links to get the powerpoint slides online.

Similarly any type of data can be search out through the buttons available on the Google search engine.

## Learner's Activity

- Browse the Pictures of Computer Parts on the Internet.
- Search the PowerPoint Slides on the Topic “**Storage Devices**”.
- Search for the Articles on the **Child Labor**.

# Learning Unit 6: Download Data

## Overview

When you search out the data on the web you must want to copy the files from the web to the computer. In this learning unit you will learn that what is downloading and its types and how data can be save from the internet to the computer with some specific path. After completion of this learning unit you will be able to download data from the internet with the proper precautions for downloading.

## 1. Downloading and Its Different Types

### Download:

In computer network downloads means to receive data from the remote system to the local computer. The most commonly downloaded files are software, updates, game, demos, music, images, video files and documents.

While downloading files and viewing websites, you'll meet up with many file formats. Most are common and used frequently, others required special programs to open or use. Here, we have a list of the file types, along with the applications.

1. **.AVI, .MP4** (Audio/Video sound file format.
2. **.EXE** Executable Files
3. **.DOC/.DOCX** Microsoft Word Document.
4. **.JPG /.JPEG/.GIF** File format most commonly used for Pictures.
5. **.PDF** Portable Document Format
6. **.RAR/.Zip** This is a compressed file format similar to the popular .zip format.
7. **.TXT** file The most basic of files, it's just some text.

### Downloading

Downloading is the transmission of data from one computer to another computer or from web page to another computer.

### Do you know!

After downloading, to open the Specific type of file, softwares related to these files types must be installed on Computer.

## 2. Saving a File with Proper Path

If you want to save a file from the internet to a computer in the required folder, follow these steps:

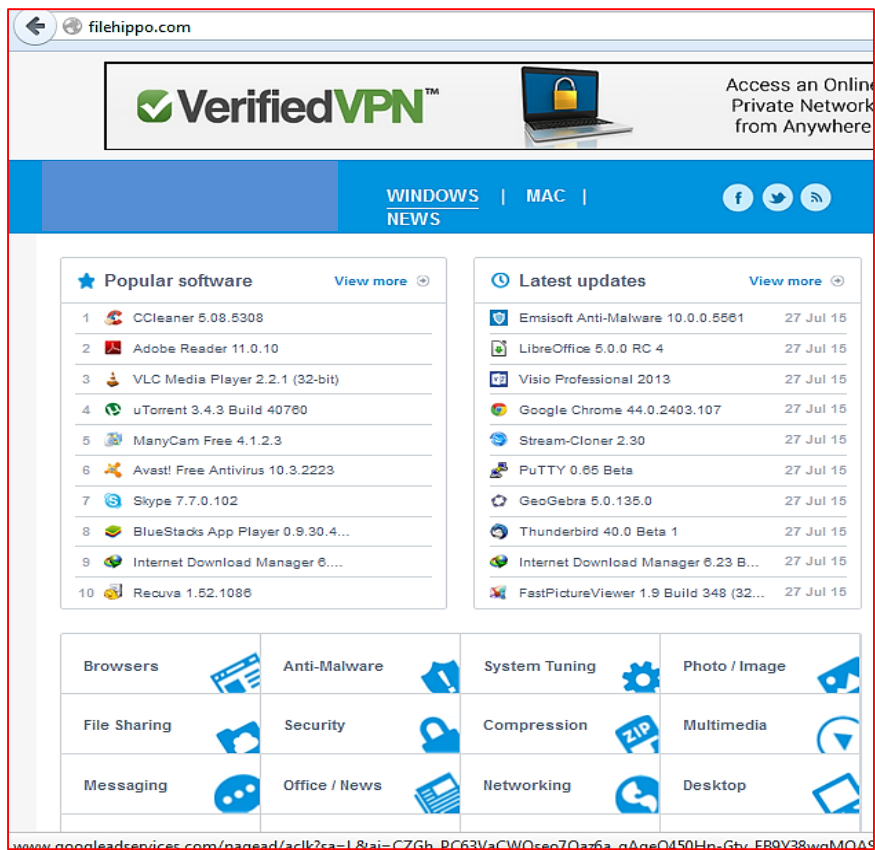
1. Right Click on the required file and select **Save Target As / Save Image As option**. Or when it prompts you for a download click the browse button to find a desired location of file where it is saved.
2. When the next window pops up, you can see where the file has already been chosen to be downloaded. You can easily change this download path by finding your folder or the folder that you want to place the download in. Start from the top and click on My Computer. This shows all possible locations to save a file. When you find the proper location, click the **Accept** or **Save** button in the corner of the window.
3. The file will be saved in the destination folder.

## 3. Step Wise Procedure of Downloading Data

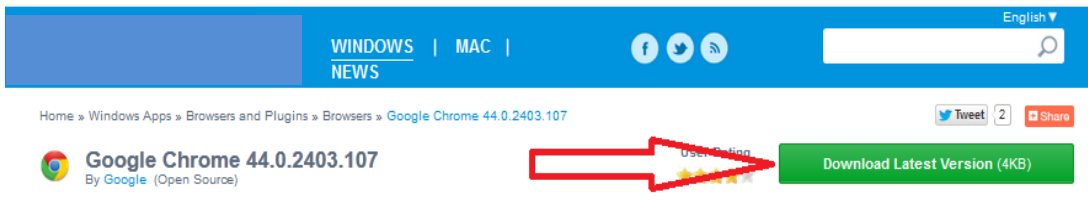
The method you need to use to choose where the downloaded file is saved is depends on which internet browser you are using.

For example if you want to download a program from the internet and you are using the **Mozilla Firefox** than follow these steps to save the file with the required location on your computer.

1. Write search words on the search engine about which topic you want to download data or type the Website name from where the data is required.

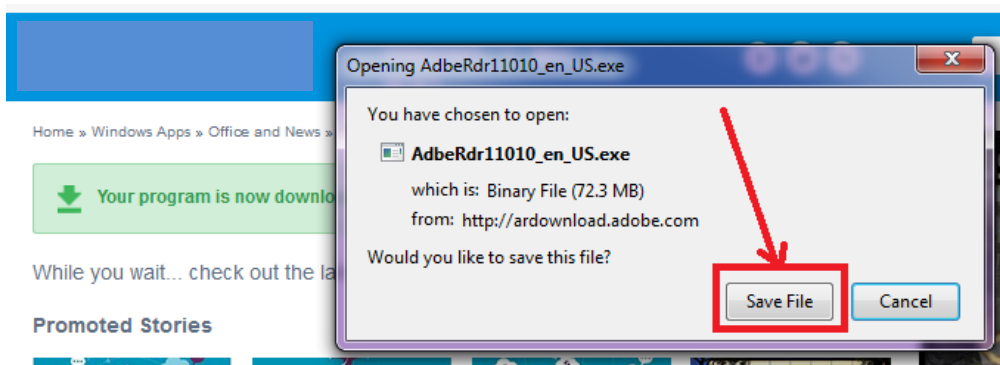


2. Click on the program that you want to download. The Next page will be open with the download option.

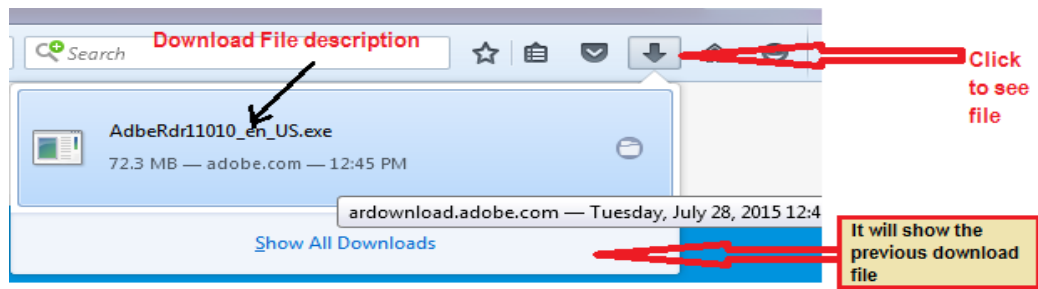


3. Click on the **Download Latest Version** Option. The small window will open to ask for save file.

**Remember**  
By Default the file will be saved in the Download folder



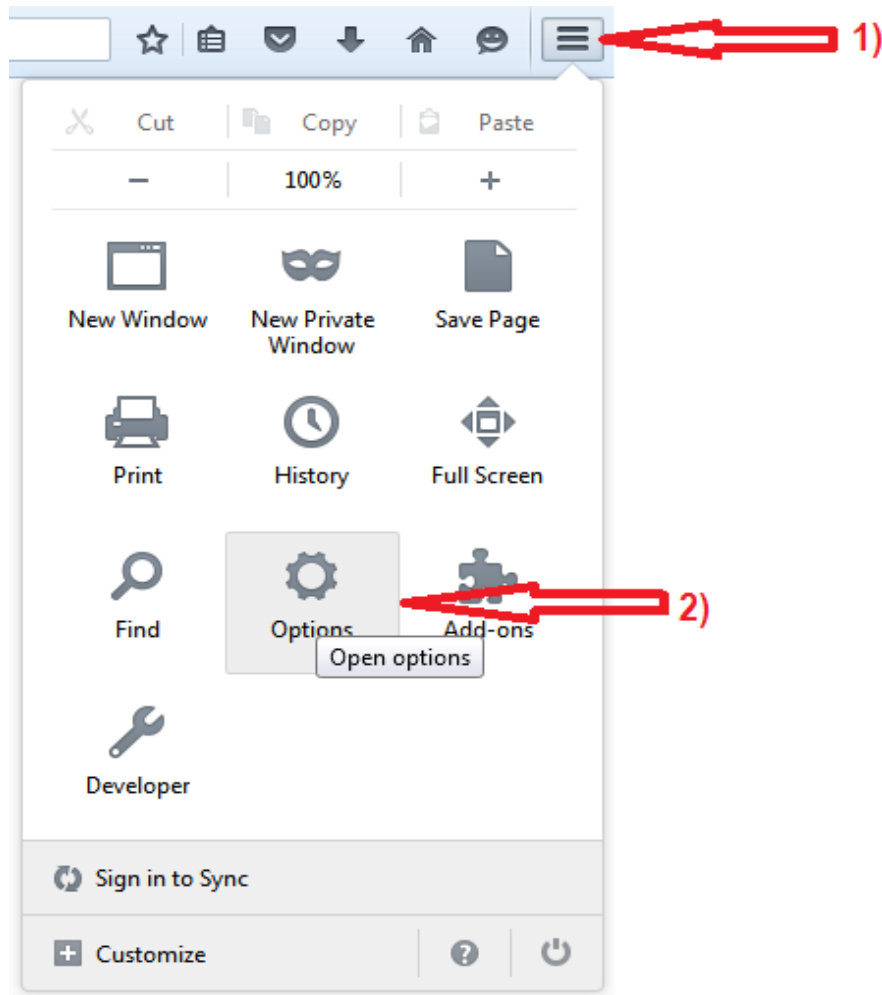
4. Click on the Save file. The file will be automatically downloaded and after completion of downloading a green arrow will be shown on the upper right side of the Browser as shown in the picture below. Click on the Arrow to see your download file



5. Click on the downloaded file to open it. To open the folder where file is located, right click on the file and click **Open Containing Folder**.

To change the destination folder of the downloaded file, follow these steps:

1. Open Mozilla Firefox and click on the Open Menu button on the upper right side of the page
2. Click on the Option Button to change setting.



3. On the Download tab Click the browse button to change the location where file will be automatically save.

**Downloads**

Save files to  Downloads Browse...

Always ask me where to save files

4. Close the window. Changes will automatically apply.

## 4. Precaution taken while Downloading

One of the easiest ways **malware**, **spyware**, and **adware** can access your computer is through downloads; therefore, it's important to take precautions when downloading content to your computer, whether it is a software program, the latest pop song, or a cool game. There are two things that provide the best defense against infected downloads: your **computer's security programs** and **your own judgment**. This is why it's important to make sure all of your **security programs are up to date** and that your **firewall is turned on**.

### Download only from trusted sites:

You should only download from well-established sites you trust. CNET is one reputable site where you can download files that have been checked for malware, spyware, or adware.

### Save downloads:

It is best that when prompted you must save a file on hard Disk instead of Running it. This gives your security programs time to check downloads before you open them.

### Check license agreements and privacy statements:

Before installing any download, read the **license agreement** and **privacy statement** carefully to make sure you are not agreeing to allow spyware or adware.

### Avoid illegal downloads:

When you illegally download **copyrighted material** like music, books, software, games, and videos, you are violating federal laws, which can lead to fines and even jail time.

You should be aware that law agencies do respond to the misuse of copyrighted material on the Internet, so it is best to obey the laws.



## Learner's Activity

- Download and install “**Google Chrome**” on your Computer.
- Download “**Media Player Classic**” software on the Desktop.

# Learning Unit 7: Send and Receive Emails

## Overview

### Remember

CTRL+N is the keyboard shortcut for opening a new email.

It is important to learn sending emails and how to deal with the newly received emails in outlook. In this learning unit you will learn how to send and Receive emails with proper precautions. After completion of this learning unit you will be able to send and receive emails.

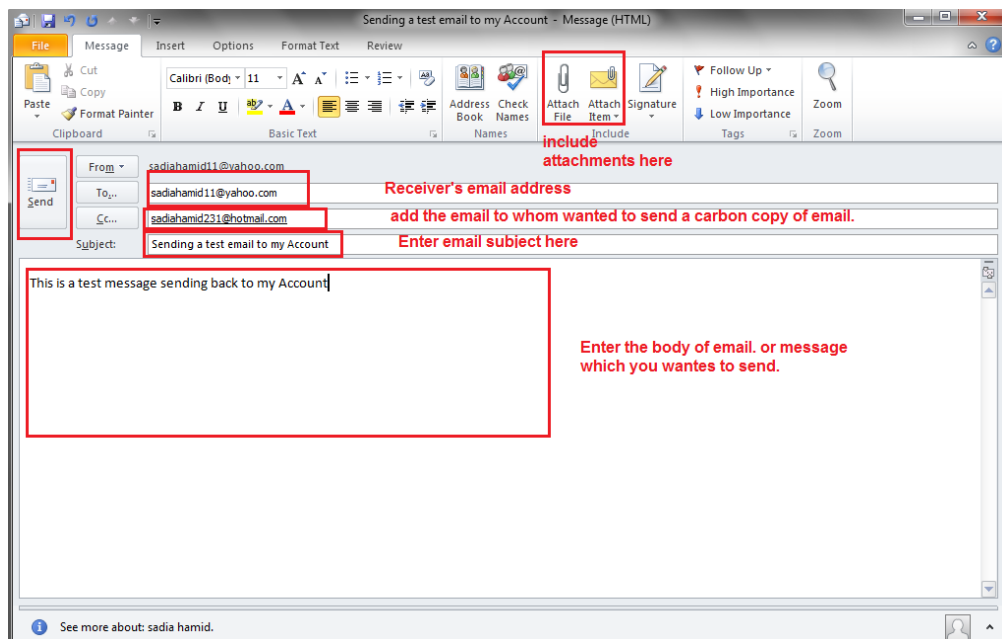
## 1. Sending and Receiving Emails Using Outlook

### Sending an Email:

1. Click on **New Email** command on the **Home** tab Ribbon.
2. A window will appear.

### Do you know!

You can also press CTRL+ENTER to send an email using keyboard.

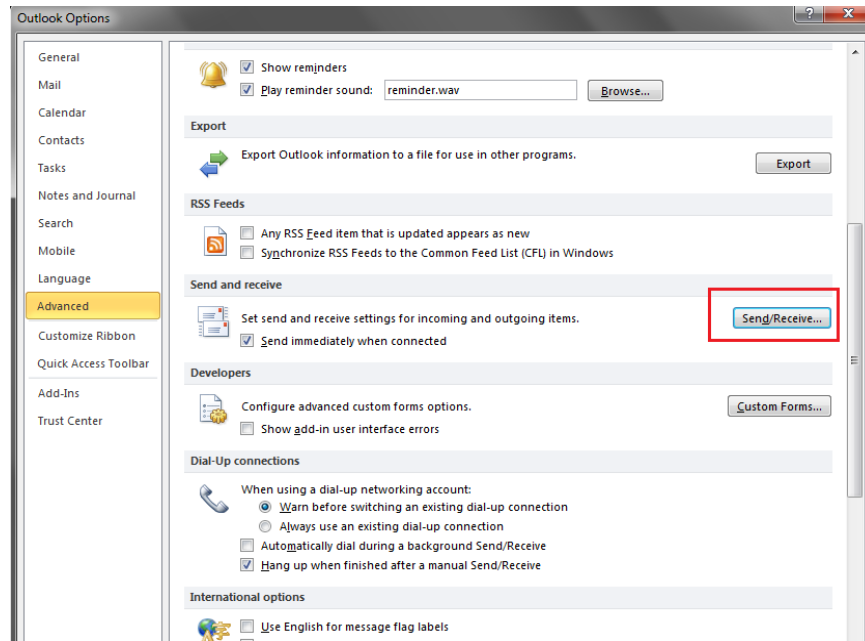


3. Click on the **"TO"** button and select the **Recipient's account** from the address book or type and check it manually.
4. Click on **Cc.** button to enter the email account of the person to whom wanted to send a carbon copy of email.
5. Click on **Bcc.** Button to enter email account of the person to whom wanted to send a Blind carbon copy of email.
6. Enter the subject of email in the **subject** text field. The subject must be concise and clear.
7. Enter the text in the **body** of email. After entering the body text if there is spelling **mistakes** in the text than **right click** on the text or press **F7** and select the appropriate word.
8. If there is any **attachment** to send with the email then click on attach file and browse the file from its location and attach it with the email.
9. After completion of these steps click on **Send** button or
10. Click **CTRL+ ENTER** to send using keyboard.

## Sending And Receiving Emails Automatically:

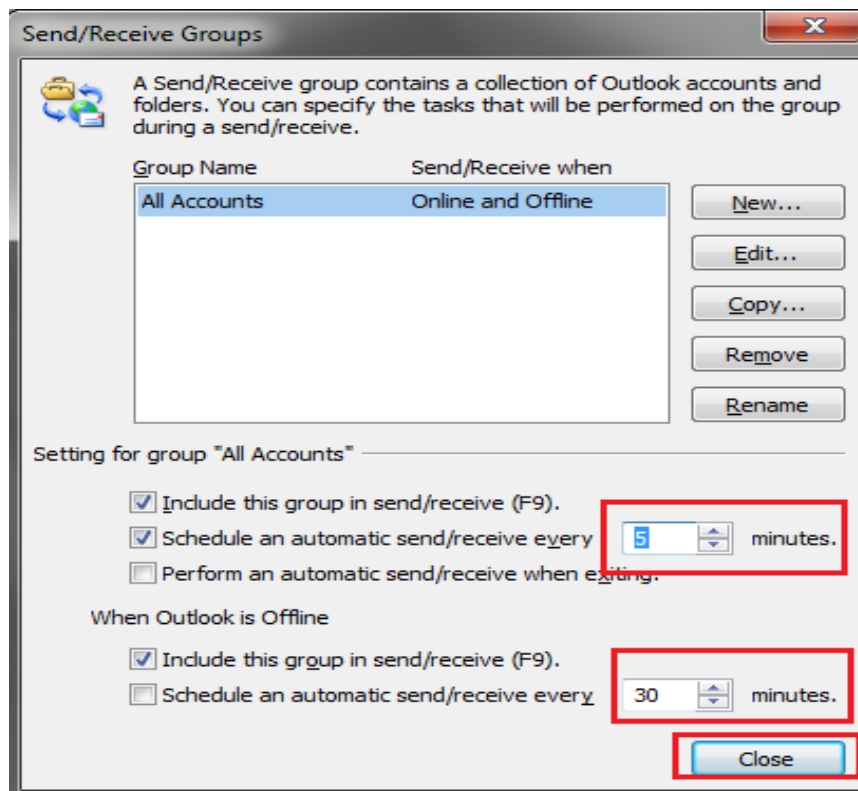
The emails can send and receive automatically. To schedule Auto Send/Receive in Outlook 2010,

1. Click on the **File** tab then **Options**.
2. Click on **Advanced** and scroll down to Send and receive and click on the Send/Receive button.



### Send/Receive Emails

3. In the Send/Receive Groups window under Setting for group **“All Accounts”** check the box **Schedule an automatic send/receive every...minutes**. It is set to 30 minutes by default and it can change the minutes to. If the user busy and wanted to keep up with the messages go as low as every one minute.



### Send/Receive Emails

- It can also get to the Send/Receive groups by selecting Send/Receive tab on the Ribbon and then Define Send/Receive Groups.

## 2. Sending Emails Using Keyboard in Outlook

### Do you know!

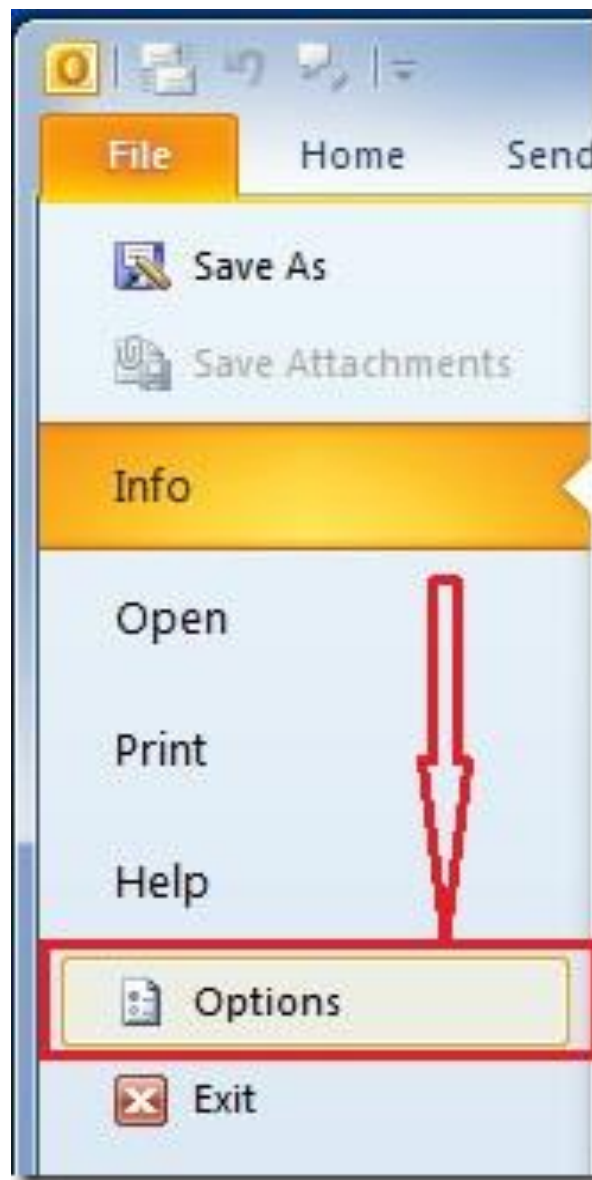
By Default automatic spelling & grammar mistakes option is disabled in MS Outlook.

- Use **Alt+Tab** to switch to Outlook.
- If looking at anything other than one of mail folders (like Calendar or Contacts), hit **Ctrl+Shift+M** to open a new mail message, otherwise just hit **Ctrl+N**.
- Now this is a blank email, with cursor placed in the To: field. Type the recipient's name (and if Outlook is connected to Microsoft Exchange Server and emailing somebody in organization, type their name and hit **Ctrl+K**, which will verify their address).
- Use the **TAB** key to navigate between the **CC:** **BCC:** and **Subject** fields, filling in as necessary.
- Hit **TAB** to enter the main text area of the email, type the body of message.
- Use the **TAB** key to navigate, making changes as needed.
- Once you're ready to send, hit **Ctrl+Enter**.

## 3. Using Spell Check and Attachment

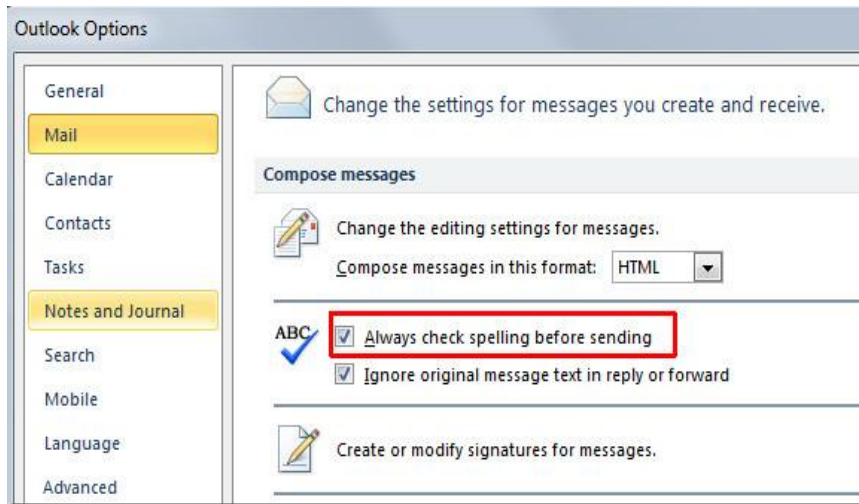
Outlook 2010 has a built-in proofreading feature which can check emails for spelling & grammar mistakes before you send them. To enable automatic spelling and grammar mistake option follow these steps:

- Launch Outlook 2010 and On **File** menu, click **Options**.

**Remember**

To Invoke the **Spellcheck** utility use **F7 key**.

2. This will open **Outlook Options** dialog, from left sidebar.
3. Click **Mail** from main window.
4. Under **Compose messages** section, enable **Always Check spelling before Sending** option.
5. Click OK in Outlook Options window. Now before sending emails, Outlook will always perform a spelling check.



**Adding Attachment:**

Files can be attached to an email message. Other Outlook items, such as messages, contacts, or tasks can be added with messages that you send.

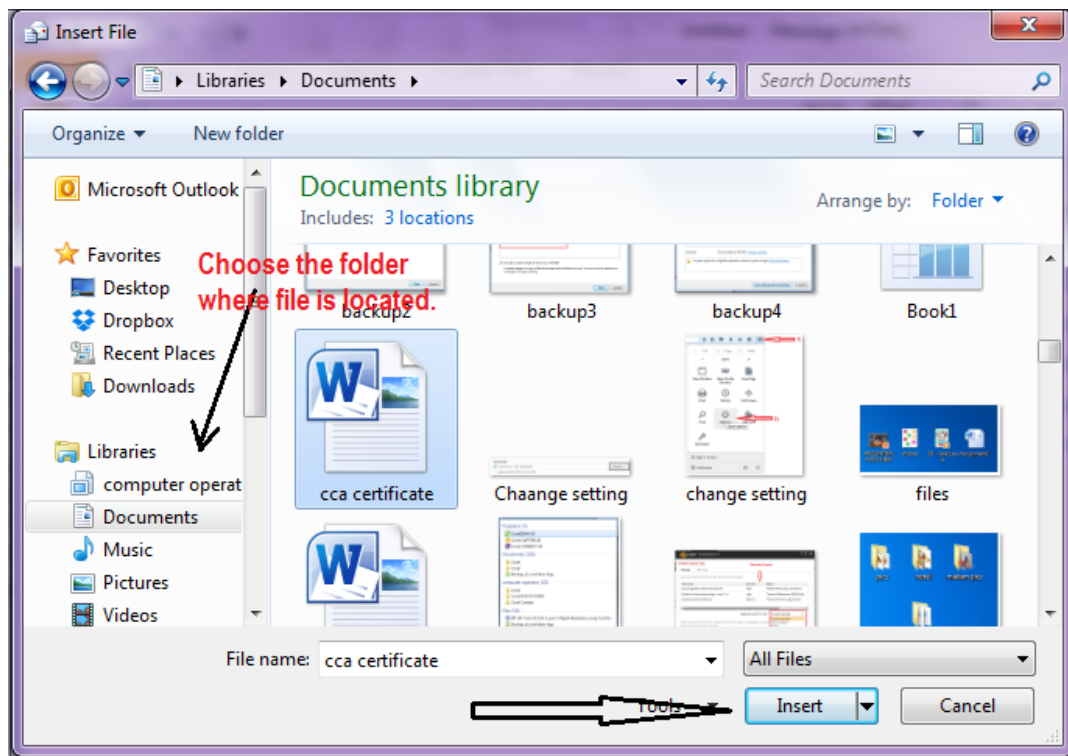
1. Create a message, or for an existing message, click **Reply**, **Reply All**, or **Forward**.
2. In the message window, on the **Message** tab, in the **Include** group, click **Attach File**.

**Do you know!**

While composing a message, you can also drag files from folders on your computer and drop them on the message window.



3. A dialogue box will be appeared as shown in picture below. Choose the path where file is located, select the file and click the **insert** button



4. File will be attached. Now mail is ready to send. Click on the Send Button.

## Learner's Activity

- Create a New email.
- Enter the Recipient's account from the address book.
- Enter Cc. account in Cc. field.
- Enter the text in in the body and check the spellings and grammar mistakes.
- Add an attachment with the mail.
- Configure the Send and Receive emails automatically after 10 minutes.



## Summary of Module

- An email is an Electronic mail that sends and receives messages electronically. Email can be accessed in two ways, either from web browsers or desktop applications.
- Sorting means arranging something in a way so that it can retrieve easily. In Ms Outlook emails can be sorted so that searching any specific email become easy. Emails can sorted based on the Date, Account, Attachments, Flags, subjects and Size.
- The Microsoft Outlook Address Book is a container that includes the main Contacts folder and any others added. It's used most often when click the To button on an open message.
- An archive email is a collection of computer files that have been packaged together for backup, to take them to some other location, for saving away from the computer so that more hard disk storage can be made available, or for some other purpose.
- A web browser is considered a software application that allows people to access, retrieve and view information on the internet. The information that may be "browsed" can be in the form of text content on a web page, an image, video, audio etc. The most popular web browsers currently in use are Firefox, Google Chrome, Internet Explorer, Opera and Safari.
- The main purpose of a search engine is to search for information on the Internet. They are software programs that search for websites based on keywords that the user types in.
- Downloading Means copying a file from a remote server computer to local computer. Using browser a user can download files from the main servers to their computer.
- Sending and Receiving emails automatically using outlook can be configured so that emails can be send and receive at the time when the user is busy.

## Frequently Asked Questions (FAQs)

FAQ 1: What is an Email Address??

Answer An email address is a unique address that is required to send or receive email, and that address is created by the user itself.

FAQ 2: What are the methods of sorting emails in outlook?

Answer Emails can be sort by mails received from, sort by Date, Sort by subject, sort email account.

FAQ 3: What is address book?

Answer The Outlook Address Book is a collection of address books or address lists, created from Outlook contact folders.

FAQ 4: What is an archive?

Answer An archive is a collection of computer files that have been packaged together for backup, to transport to some other location, for saving away from the computer so that more hard disk storage can be made available, or for some other purpose.

FAQ 5: What is the difference between search engines and browsers?

Answer A browser is a software program installed on computer locally. There are many browsers such as Internet Explorer, Firefox, Safari, and Opera, etc. A browser is used to access various websites and web pages. A search engine is also a software program that searches for some particular document when specific keywords are entered by the user like google search yahoo search etc.

FAQ 6: What is downloading?

Answer Downloading a file means copying a file from the internet to the computer.

FAQ 7: What is POP3 server in outlook?

Answer Post Office Protocol 3 (POP3) servers hold incoming e-mail messages until you check your e-mail, at which point they're transferred to your computer. POP3 is the most common account type for personal e-mail. Messages are typically deleted from the server when you check your e-mail.

FAQ 8: What is IMAP server?

Answer Internet Message Access Protocol (IMAP) servers let you work with e-mail messages without downloading them to your computer first. You can preview, delete, and organize messages directly on the e-mail server, and copies are stored on the server until you choose to delete them. IMAP is commonly used for business e-mail accounts.

FAQ 9: What is SMTP server?

Answer Simple Mail Transfer Protocol (SMTP) servers handle the sending of your e-mail messages to the Internet. The SMTP server handles outgoing e-mail, and is used in conjunction with a POP3 or IMAP incoming e-mail server.

FAQ 10: Where archive files located?

Answer The location of the archive Outlook Data File (.pst) varies depending on the version of Microsoft Windows you have on your computer when you create the archive.

## Test Yourself!

Please mark the correct one from the given options. You can check your answer with the Answer Key at the end of this module.

1. **One of the biggest changes to Outlook 2010 from previous versions is the addition of the \_\_\_\_\_.**
  - a. Ribbon
  - b. View pane
  - c. Quick Access toolbar
  - d. Office button
2. **You'll navigate to commonly used features in Outlook like Print Preview and Help from \_\_\_\_\_.**
  - a. the File menu
  - b. Backstage view
  - c. the Navigation pane
  - d. None
3. **Which one among the following can only be done successfully if Outlook has online status:**
  - a. Creating an appointment
  - b. Creating an event
  - c. Scheduling a meeting
  - d. All
4. **You can add existing contacts to an email message by \_\_\_\_\_.**
  - a. clicking To: in the Compose window
  - b. using the Address Book
  - c. typing a contact's name
  - d. B, C both
5. **If you want to reply to a group of people, click the \_\_\_\_\_ command.**
  - a. Reply
  - b. Reply to All
  - c. Forward
  - d. Signature
6. **Most folders you create will be nested within the \_\_\_\_\_ folder.**
  - a. Drafts
  - b. Inbox
  - c. Deleted items
  - d. Outbox
7. **Before you can import contacts to Outlook, you'll need to \_\_\_\_\_.**
  - a. sync them from your network
  - b. export them from another email client
  - c. upload them to the cloud
  - d. None

**8. If you want to send messages to multiple people at the same time, you can create a \_\_\_\_\_ for quick access.**

- a. Contact Team
- b. Contact Group
- c. Contact Network
- d. None

**9. A browser is a web \_\_\_\_\_.**

- a. application
- b. Plug in.
- c. widgets
- d. Add in.

**10. Which of the following web site is used to search other websites by typing keywords?**

- a. Social Networks
- b. Web browser
- c. Search Engines
- d. None

## Answer Key

MCQ Number	Correct Answer
1	b
2	a
3	d
4	d
5	b
6	b
7	b
8	b
9	a
10	c



# Module 7: Manage Information System

## Learning Outcomes

After completion of this learning module, you will be able to:

- Perform Data Entry
- Manage File / Folder
- Perform Scanning
- Maintain Office Record
- Perform Printing
- Search File/Folder
- Convert Files





# Learning Unit 1: Perform Data Entry

## Overview

**Raw data** is **data** that has not been processed for use. In this learning unit, you will learn the techniques of using keyboard for different software packages, how to organize data in useful information and how you can process a data for making decisions. After completion of this learning unit, you will be able to process raw data into useful information.

## 1. Organizing Raw Data

### Data

The data you collect from different resources is in a raw format. Some examples of raw data are:

- Completed hardcopy surveys
- Field notes
- Audio recordings of interviews or focus groups
- Video recordings of observations

Typically, raw data is difficult to understand.

### Information

- Knowledge of facts about something or someone is called information.
- The information is the processed data into desired format that is easy to understand.

Information is valuable because it can affect behavior, a decision or an outcome.

### Entering and Organizing Data:

Whether you have collected quantitative or qualitative data, it is important that you enter the data in a logical format that can be easily understood and analyzed. The data can be easily managed through computer.

- For quantitative data, use Microsoft Excel or another spreadsheet software package to enter your data into an electronic format.
- For example, if you administered a survey to parents and students, you would probably be best served to create one data spreadsheet for the parent survey and another spreadsheet for the student survey.
- For qualitative data, type all the data into a word processing program such as Microsoft Word.
- Also make sure that each participant is assigned to a unique participant ID and responses are organized by survey item/question. Below is an example of what your data spreadsheet may look like.

#### Remember

Before you are being entering, develop a system to organize your data

Participant ID	Q1. Birth Date	Q2. Gender	Q3. City	Q4. Summer program	Q5. Program Satisfaction
1	21/9/96	0	1	0	99
2	1/9/1998	1	2	1	3
3	5/6/1995	1	3	1	3
4	8/9/1998	0	2	1	99
5	10/5/1999	0	3	0	0
6	18/9/99	1	2	1	6
7	23/7/92	1	2	0	9
8	15/8/90	0	5	1	8
9	18/9/20	1	4	0	3
10	23/7/93	0	4	1	3
11	15/8/91	1	1	0	3
12	18/9/96	0	1	1	3
13	23/7/94	0		1	2
14	15/8/92	1		0	2

**Data Spread Sheet**

The code book is your data key/legend, so it is important to keep it in a safe place where you can access it easily and frequently.

**Remember**

The process of entering qualitative data can be very tedious and time-consuming, so it is important that you plan accordingly.

<b>Student Summer Program Survey Code Book</b>
<b>Participant ID:</b> range 001-022
<b>Q1-Birthdate:</b> mm/dd/yyyy
<b>Q2-Gender:</b> 0=Male 1=Female
<b>Q4- Program City:</b> City Name
<b>Q5-Did you participate in the Summer Program?</b> 0=No 1=Yes
<b>Q6-How satisfied were you with the Summer Program experience?</b> 1=Very Dissatisfied 2=Dissatisfied 3=Satisfied 4=Very Satisfied 99= Not Applicable

Use a similar organizational approach for qualitative data.

- Create a file for each interview, observation site, focus group, etc.
- Within each file, organize the data by question, time intervals, and/or topic (depending on what method makes the most sense).
- Excel/Spreadsheet also can be used for qualitative survey, allocate every column will with spreadsheet field i.e. sr#, name, question1, question 2 etc.

**Cleaning Data**

Checking data for errors is commonly called “cleaning.” Cleaning data is critical because “dirty” data can severely influence your results.

Three most commonly used in cleaning methods are:

- Spot-checking

- Eye-balling
- Logic checks

The best practice is to use all three approaches so that you are sure you have caught all possible errors.

## 2. Data Processing for Making Useful Decisions

An ongoing process of analyzing and evaluating information to inform important educational decisions and actions are called Data-based Decision making.

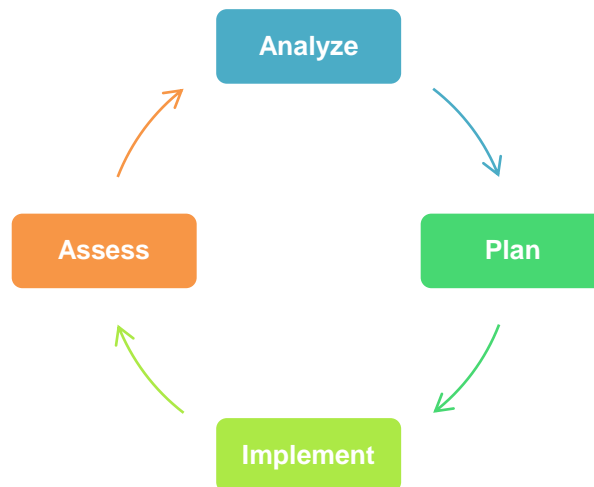
The purpose of data-based decision making is to review:

- Systems
- Practices
- Tools

### The Process

When data analysis is viewed as one step in a system, its use will become integral to the workings of the organization. Without a process, data analysis can be only an event. Time is spent in viewing and analyzing data, but there is no intended result other than to comment on what is observed.

The following four-step process uses data as an integral part of Decision Making cycle.



### Decision Making Cycle

#### 1. Analyze

Data analysis is a foundational part of the improvement cycle. Data provides evidence, successes and challenges of a system. The Five W's (who, what, when, where, why) provide a summary of analysis components.

#### 2. Plan

Planning is not about what people want to do, or what they think they might want to focus on, but what the data tell them they need to do to increase the achievement of the students. Long- and short-term improvement goals are established.

Generating plans to reach goals requires the involvement of teachers and administrators at the school and district levels. At each level, plans need to be created that reflect the data. Classroom, school, and district plans should be mutually supportive.

The planning form can be typed into a table so that the sections can expand to meet the needs of the group.

### 3. Implement

Plan implementation requires the involvement of all parties who are reflected in and affected by the plan. District staff should be knowledgeable and supportive. School staff should be clear on their key roles in the plan and its implementation. The involvement and support of students and parents is essential for the greatest impact on achievement.

### 4. Assess

Assessment takes a variety of forms and is ongoing. Types and times of assessments are identified during the planning process. The goal is to assess the effectiveness of the plan throughout implementation. These assessment tools create a focus to evaluate the key components of the plan.

#### Important

For keyboard shortcuts in which you press two or more keys at the same time, the keys to press are separated by a plus sign (+).

#### Decision-Making

Data are key to an effective cycle of continuous improvement. The focus is continuous growth in student achievement. Through data analysis and discussion, district weaknesses are identified. These provide the improvement targets. The use of an improvement cycle supplies a process by which plans can be created and implemented to support the elimination of identified challenges.

## 3. Skills Related To Keyboarding In Different Software

Keyboard skills are necessary to operate computer efficiently. You can avoid reaching for the mouse if you are familiar with keyboard shortcuts. The following are some important keyboard shortcuts that you can use in different software packages:

#### Ctrl+N

Open a new file quickly.

#### Ctrl+X

Cut- Removes the selection from the active document and places it on the clipboard.

#### Ctrl+O

Opens a previously saved document.

#### Ctrl+C

Copies the selection to the clipboard

#### Ctrl+W

Closes the active window, but does not Exit Software.

#### Ctrl+V

Paste - Inserts the contents of the clipboard at the insertion point (cursor) or whatever is selected.

**Ctrl+S**

Saves the active document with its current file name, location and format.

**Ctrl+A**

Selects all on the active document/Workbook etc

**Ctrl+P**

Prints the active file, also gives the opportunity to change print options

**Ctrl+F**

Find /Searches for specified text in the active document

**Alt+F4**

Exit /Closes Microsoft Software.

**Ctrl+B**

Bold - Formats selected text; make text bold, or remove bold formatting

**Ctrl+Z**

Undo the last action. This selection can be repeated several times.

**Ctrl+I**

Italic - Formats selected text; make text italic or remove italic

**Ctrl+Y**

Redo - After an action has been undone, it can be reinstated in the document.

**Ctrl+U**

Underline - Formats selected text; make text underlined or remove underline.

**Print Screen**

Copy a picture of the selected window to the Clipboard.

**ALT+TAB**

Switch to the other window

**Microsoft Office Basic Shortcut keys:**

Switch to the previous window.

**ALT+SHIFT+TAB**

Close the active window.

**CTRL+W or CTRL+F4**

Restore the size of the active window after you maximize it.

**ALT+F5**

Move to a task pane from another pane in the program window (clockwise direction). You may need to press F6 more than once.

**F6**

Move to a task pane from another pane in the program window (counterclockwise direction).

**SHIFT+F6**

When more than one window is open, switch to the next window.

**CTRL+F6**

Switch to the previous window.

**CTRL+SHIFT+F6**

Maximize or restore a selected window.

**CTRL+F10**

Copy a picture of the screen to the Clipboard.

**ALT+PRINT SCREEN**

## 4. Typing Techniques to Enter Data

### Typing Master

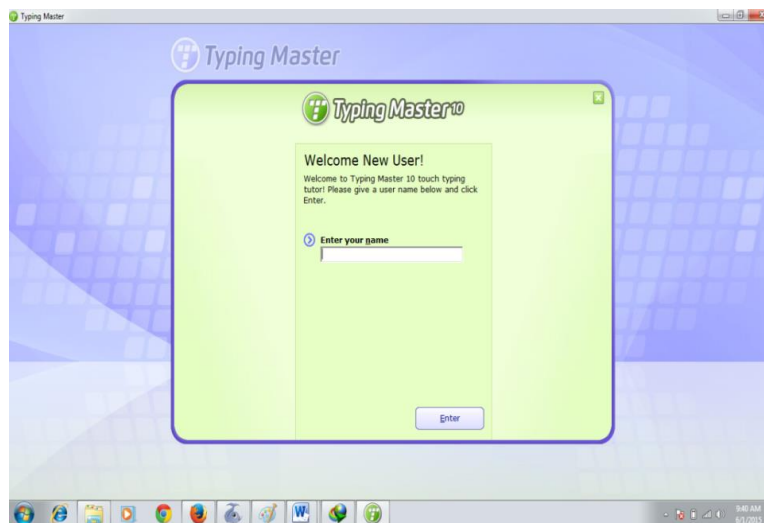
Typing master is a software with a lots of Lessons, Tests and Games to increase the typing speed. It is a well designed software that systematically helps you to increase speed in a friendly way and inform you about the keys that are problematic for you and suggest exercise for those problematic areas.

The procedure to use Typing Mater has the following steps:

1. Open the Typing Master Software from the all program. Enter the name to start the program.

**Remember**

Once you added your name it remains save for the future use.



2. On the Next page the Course window will be open from where you can select the desired lesson.



### Remember

You can directly practice the keys that you feel needs to be more perfection.

- After selecting the lesson next page will be open with the information about that lesson and the visual instructions of fingers position. Click on the **Next** button.



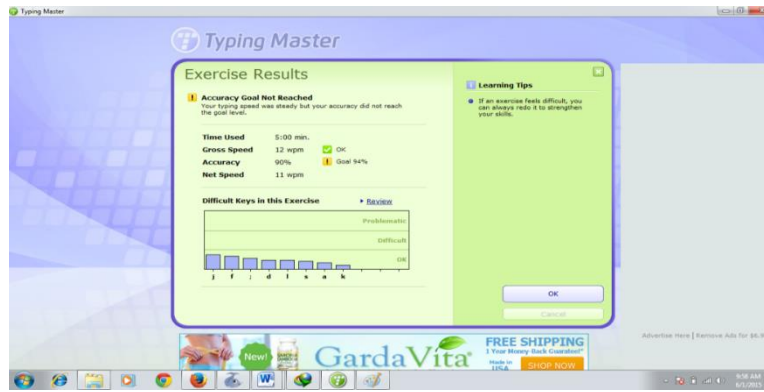
- Now the Exercise will start with the time. You can also **Pause** the lesson, it will stop counting time of typing speed.



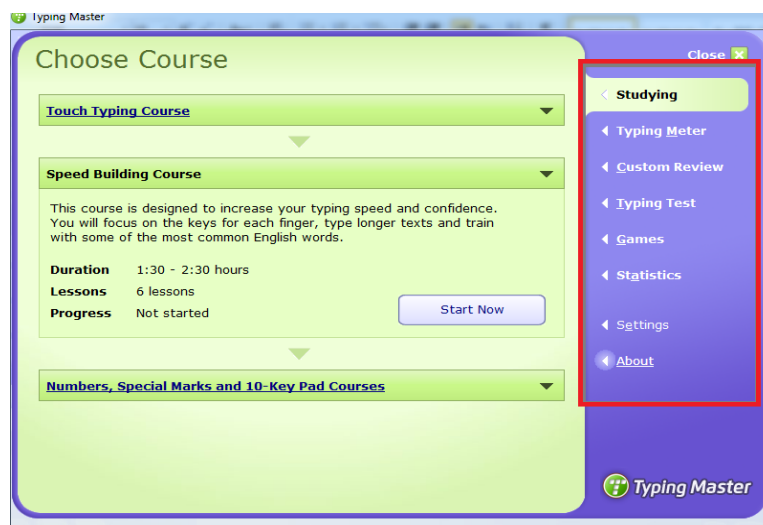
- As the time will over the Exercise Result will be open with the detail of your typing progress.

**Note**

The major focus of typing test result is speed and accuracy



When you start the Typing master by giving name you can select the category in which you want to enter. For example you can select studying, Typing Test, Games etc according to your level / interest .



This type of typing software helps you to improve typing speed for data entry.



# Learning Unit 2: Manage File and Folder

## Overview

Most of the operating systems provide much flexible options to organize your data. In this learning unit you will learn how to arrange file / folders in libraries and data can easily be search out and the techniques to naming and arranging files in the folders. After completion of this learning unit you will be able to organize your files and folders on the storage devices.

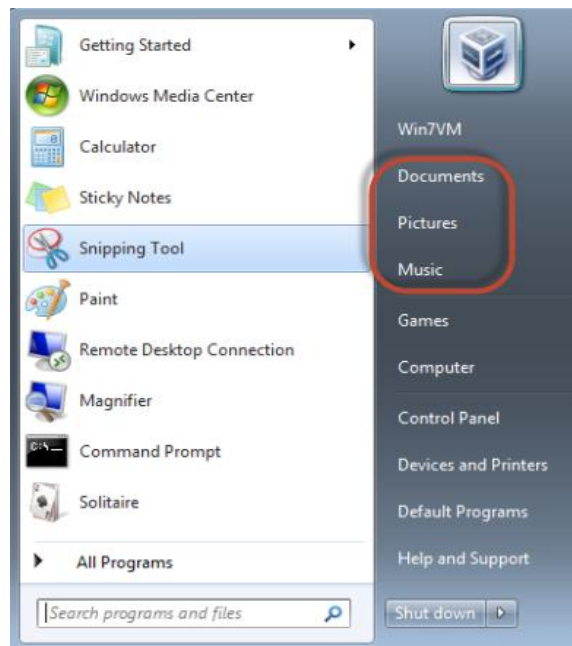
## 1. Customizing the Document Library

Libraries are the most useful features in Windows. It can help you to organize your files and folders very efficiently. By using libraries, you can easily build a system so that you can always find what you want within seconds. It is not limited to this, but you can also sort, tag or edit files and folders with just a few clicks.

In Windows 7 default libraries include two standard folders: the user folder specific to each library and the public folder specific to it. For example, the Documents library includes your **user's Documents** folder and the **Public Documents** folder, the Music library includes your **user's Music** folder and the **Public Music** folder and so on. By default, you have the Documents, Music, Pictures and Videos libraries. Three of them can be found, by default, on the upper right side of the Start Menu in Windows 7.

### Do you know!

A library is a virtual collection of folders on your system. A library is a reference to one or more folders on your computers and the files found inside.



### Do you know!

Libraries can also be accessed in the navigation pane of *Windows Explorer*.

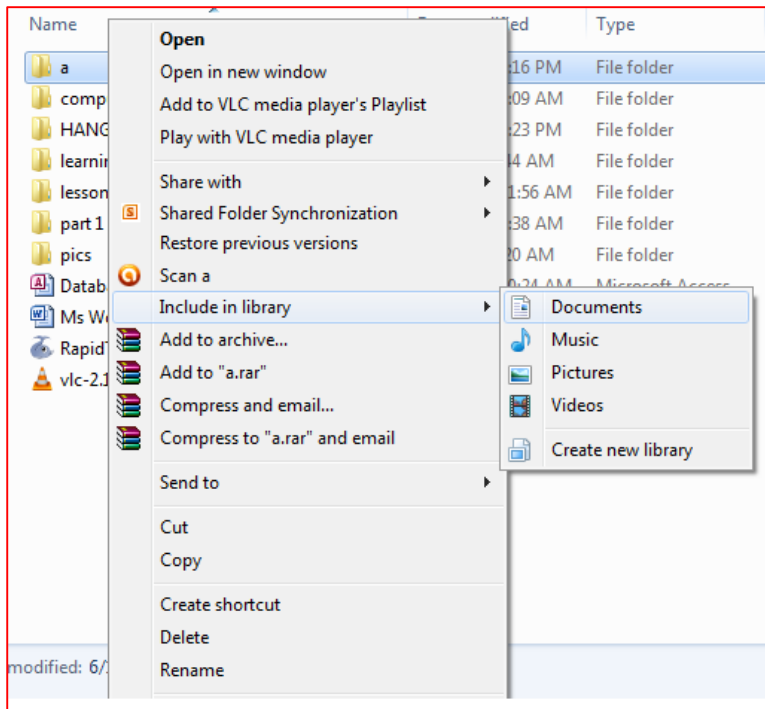
## 2. Adding File /Folders in the Existing Library

If you have documents stored in a folder other than My Documents, and you need to add it to the Documents Library. There are a couple of ways you can use.

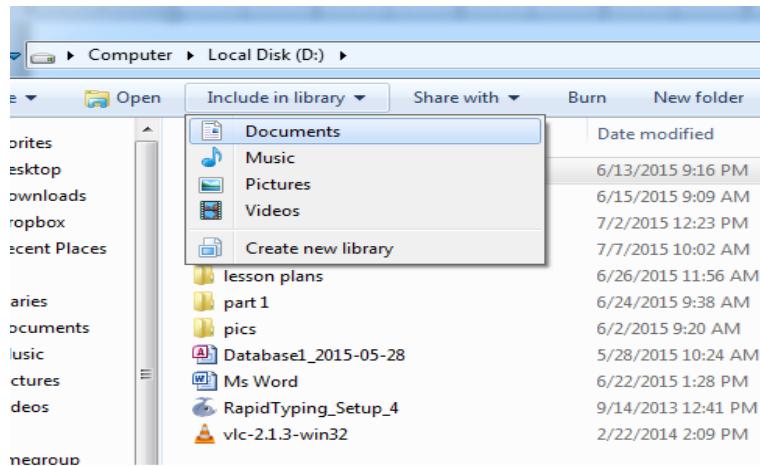
1. Right-click on a folder and select ***Include in library*** from the context menu.
2. Choose the Documents Library.

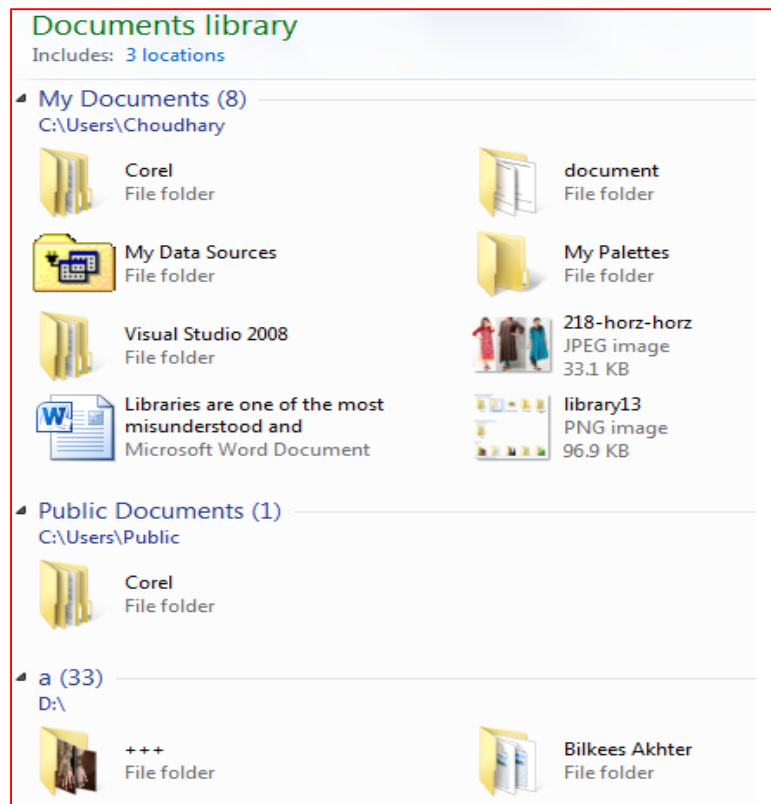
**Remember**

When you add a folder to a library, that folder is still in its original location.



Or when you have the folder containing your documents open, select *Include in library* and choose the library to put them in from the dropdown.





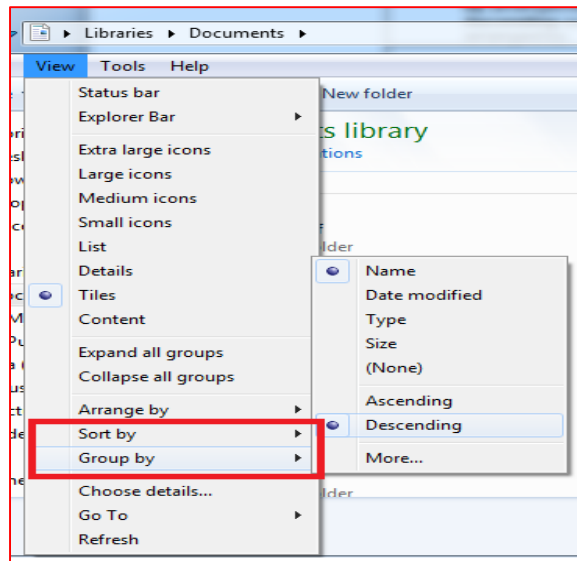
Here look at the Documents library that contains files that are located in different places throughout the hard drive, including some on another partition.

### 3. Customizing the Libraries

Libraries can be customized in many ways. You can view and arrange the files/ folders or you can create your own libraries.

To customize the view of folders/files follow these steps:

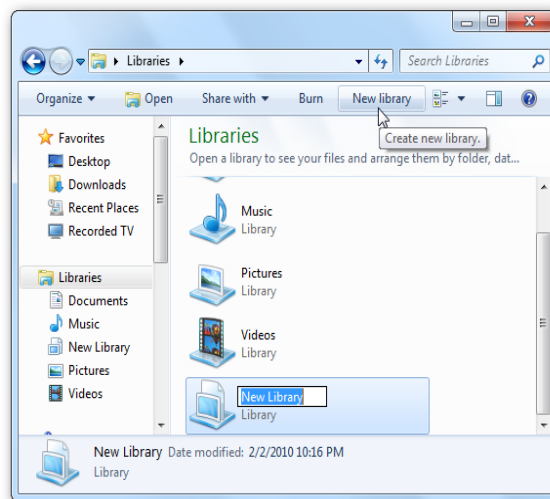
1. Open the required folder or library in windows explorer.
2. Click on the **View Menu Bar** item and select **Group by** arrangement options.
3. Select a field **Name** by **Ascending** or **Descending** order for sorting as per requirement.



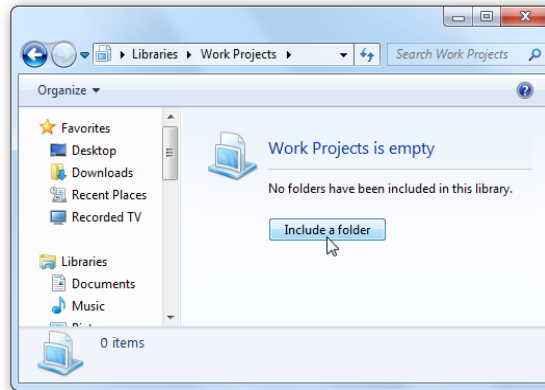
### Creating Own Library

The default libraries are all well and good, but if you really want to take advantage of this feature, you have to create your own.

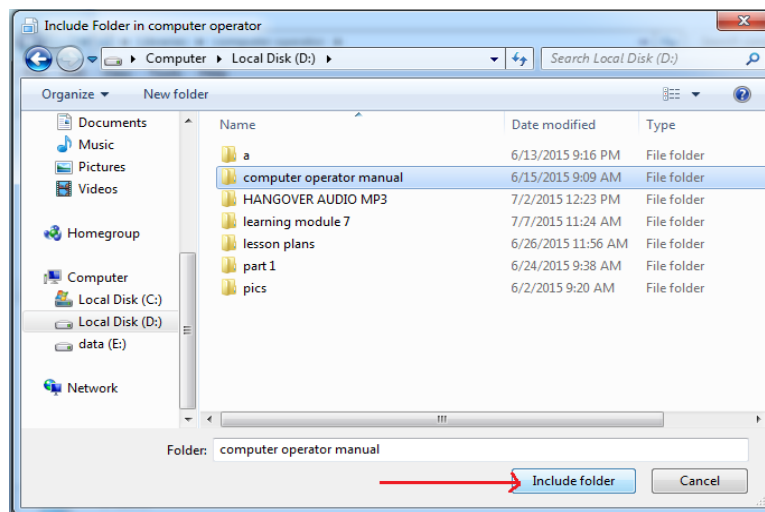
1. In the **libraries** directory click on the **New library** button and give it a name.



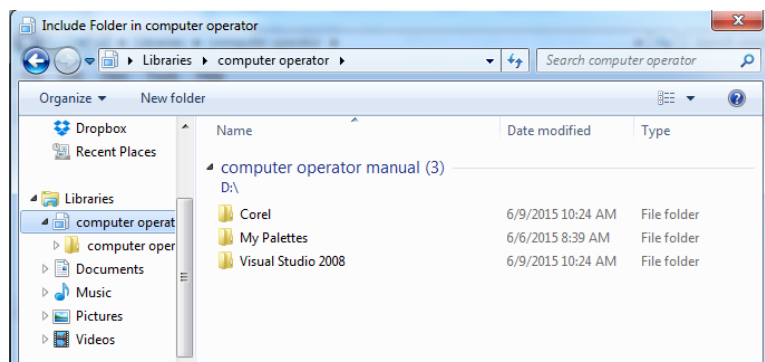
2. The first time you open it you'll be prompted to include a folder.



3. Browse to the location with the files you want to add then click **Include a folder**.



4. Now the files included in that folder will show up in the new library.

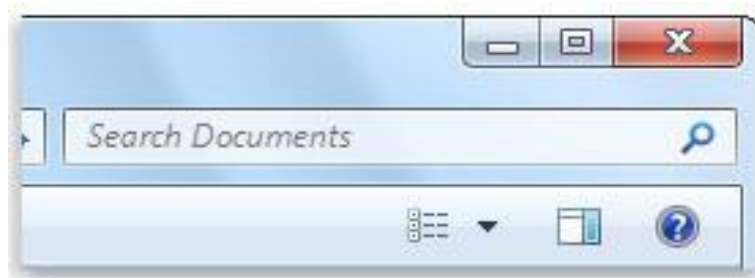


## 4. Finding Files

Windows provide several ways to find files and folders. There isn't only one way to search, you can use different methods for different situations.

### 1. Using the search box in a folder or library:

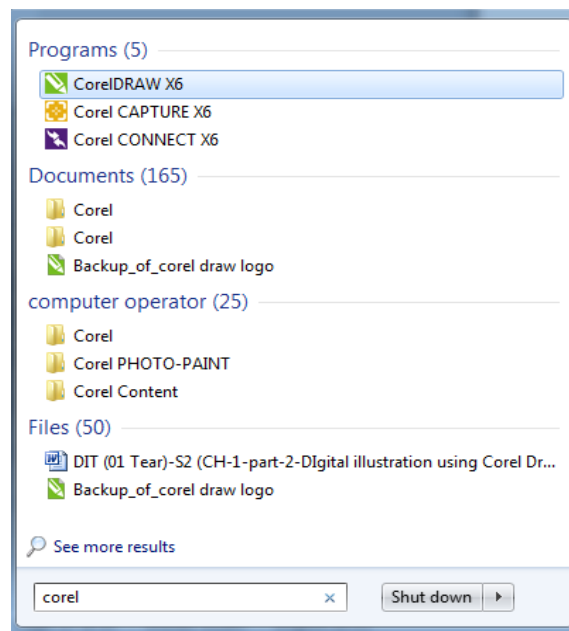
When you're looking for a file that you know is in a particular folder or library, such as Documents or Pictures. Browsing for the file might mean looking through hundreds of files and subfolders. To save time and effort, use the search box at the top of the open window.



**Search Box**

### 2. Using Search Bar in the Start Menu:

You can use the search box on the Start menu to find files, folders, programs, and e-mail messages stored on your computer.



**Using Search Box at Start Button**

## 5. Storing Data on Different Storage Devices

### Difference between File and Folder:

#### File:

There are different types of files each have different extensions and icons. For example, Microsoft Word documents (.doc/.docx), digital photos (.gif/.jpeg), music (.mp3), and videos (.avi) and many more. When you use different applications, you'll often be **view**, **create**, or **edite files**.

Files are usually represented by an **icon**.



**Icons of Different Files**

**Folder:**

Windows uses **folders** to organize files. You can put files **inside a folder**, just like you would put documents inside a real folder. In the image below, you can see some folders on the desktop.



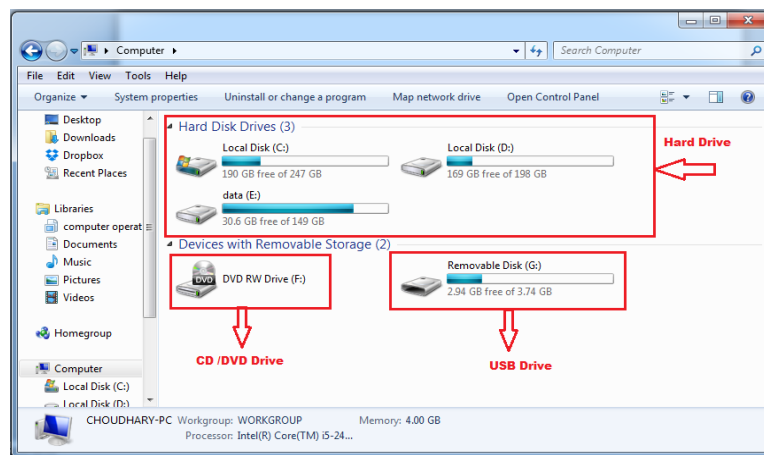
**Icons of Different Folders**

**Remember**

To prevent future copies of files, it's important to make shortcuts of files and folders, not copies

**Storing Files/Folders:**

If you select **Start > Computer** you can see all the different drives available for storing your files.



**Files Storing Drives**

**Copy vs. Move**

Copy leaves the copy of file at original place while move does not.

A folder that's not properly labeled, or is in the wrong place, is just as bad as files all over your computer without a home (folder).

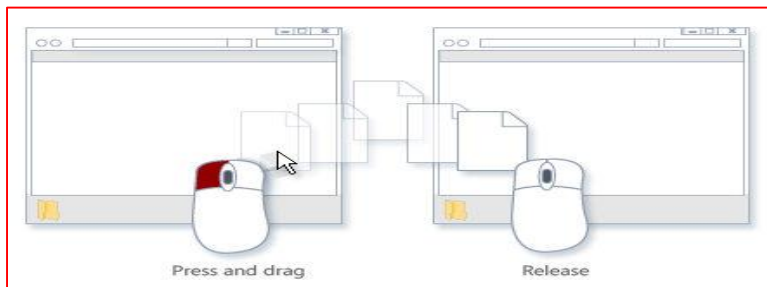
If you want to store your personal data to a specific location within the hard drive or a device attached with the computer you can do it by copying or moving it.

If you want to change where files are stored on your computer. You might want to move files to a different folder, for example, or copy them to removable media (such as CDs or memory cards) to share with another person.

Mostly copy and move files using a method called **drag and drop**.

**Remember**

Don't back up your files to the same hard disk / drive that Windows is installed on.



**Drag and Drop**

When using the **drag-and-drop** method, you might notice that sometimes the file or folder is copied, and at other times it's moved. If you're dragging an item between two folders that are stored on the same hard disk, then the item is moved so that two copies of the same file or folder aren't created in the same location. If you drag the item to a folder that's in a different location (such as a network location) or to removable media like a CD, then the item is copied.

- Start by opening the folder that contains the file or folder you want to move.
- Then, open the folder where you want to move it to in a different window.
- Reduce the sizes and position the windows side by side on the desktop so that you can see the contents of both.
- Next, drag the file or folder from the first folder to the second folder.

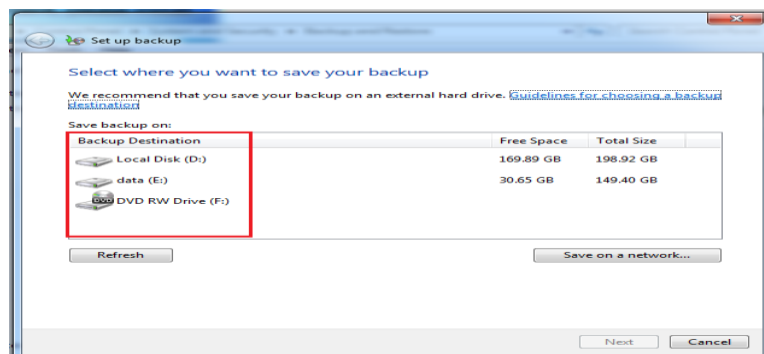
**6. Getting Backup Files**

The procedure to back up your files on the storage device has the following steps:

1. Open Backup and Restore by clicking the **start button > Control Panel > System and Security**, and then clicking **Backup and Restore**.
2. Click on the **Set up Back up** option and follow the steps in the wizard.
3. When you click on the setup Back Up, the window will be open with the options to select the desired location where you want to back up your files.

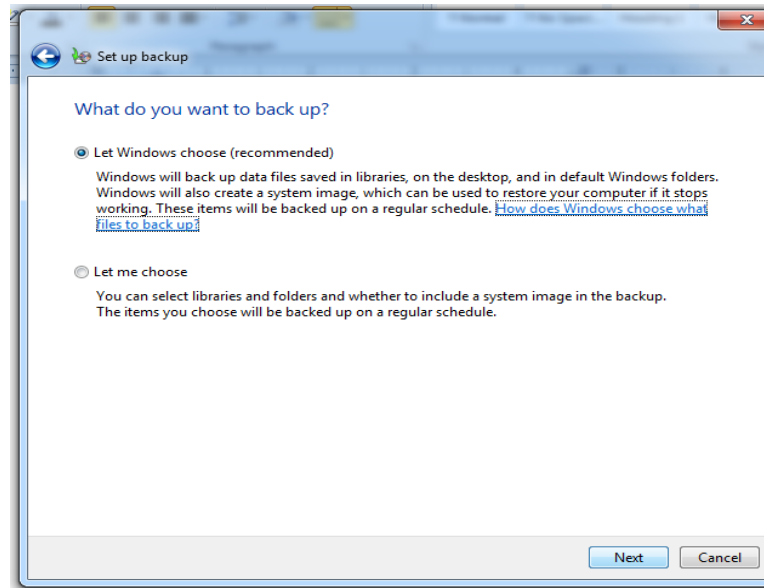
**Important**

Another way to copy or move a file is to drag it from the file list to a folder or library in the navigation pane so you don't need to open two separate windows.





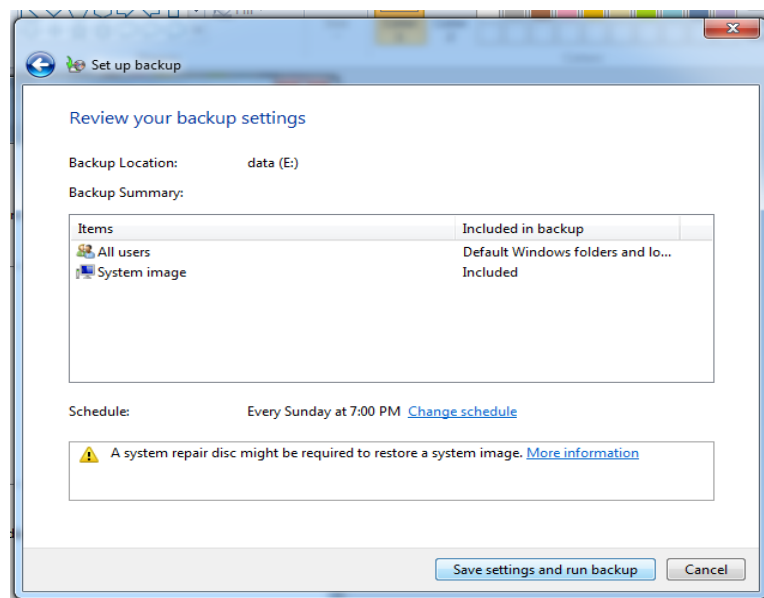
4. Select the Backup Destination and click **Next**.
5. Select the option either you want to back up recommended files/Folders or you want to Backup files of your choice and click Next.



### Do you know!

Some companies provide free web space for backup your files i.e. Google drive, Degoo etc.

6. After selecting the files/Folders you want to backup, **Review Backup** window will appear that shows detail of your Backup. Check your Backup Detail and click **Save Setting and Run Backup**




### Important

When you're browsing for folders, you won't be able to see the individual files in a folder. To view individual files, use the **Browse for files** option.


## Backing Up Files

### Restoring Backup Files:

You can restore backed up versions of files that are lost, damaged, or changed accidentally. You can also restore individual files, groups of files, or all of the files that you've backed up.

1. Open Backup and Restore by clicking the **Start** button , > **Control Panel > System and Maintenance**, and then clicking **Backup and Restore**.

### Option 1:

1. To restore your files, click **Restore my files**.
2. To restore the files of all users, click **Restore all users' files**.  If you're prompted for an administrator password or confirmation, type the password or provide confirmation.

### Option 2:

1. To browse the contents of the backup, click **Browse for files** or **Browse for folders**.
2. To search the contents of the backup, click **Search**, type all or part of a file name, and then click **Search**.

## 7. Naming File and Folder

### Important

If the total length of the file path is more than 200 characters this may cause problems when the files are backed up or moved.

Choose a logical and consistent way to name and organizing your files allows you and others to locate them. Ideally, the best time to think how to name and structure the documents and directories at the time of their creation.

Develop a naming scheme for all kinds of files you create most often and then stick to it. Useful file names must be:

- Consistent.
- Meaningful to you and your colleagues.
- Allow you to find the file easily.

The following are useful elements for a file naming:

- **Vocabulary** – choose a standard vocabulary for file names, so that everyone uses a common language.
- **Punctuation** – decide on conventions for if and when to use punctuation symbols, capitals, hyphens and spaces.
- **Dates** – agree on a logical use of dates so that they display chronologically i.e. YYYY-MM-DD.
- **Order** - confirm which element should go first, so that files on the same theme are listed together and can therefore be found easily.
- **Numbers** – specify the amount of digits that will be used in numbering so that files are listed numerically e.g. 01, 002, etc.

## 8. Keeping File Name Short

Its best practice to keep folder and file names as short and meaningful as possible. The following 3 tips should be follow for file naming:

### File length:

As you create folders and documents a file path is created.

The file path below has **141** characters

```
X:\Philosophy\Dept Management\ Print Accounting Reports\...  
... \Other Print Charging Files\Charging Rates - various calculations\Department costs.xls
```

it could be shortened to **85** characters  
 ...\.Print Charge\Rates\Dept cost.xls

### Repetition:

Unless you are going to email a file externally, you should shorten the name if you want to avoid repeating the folder names in the file name.

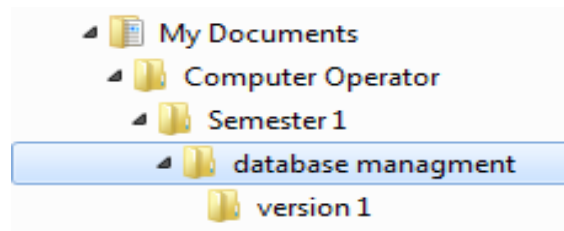
### Abbreviations:

You might find it useful to abbreviate words in file names. It is good practice to use abbreviations in file naming in spite of using full name.

## 9. Structuring Folders

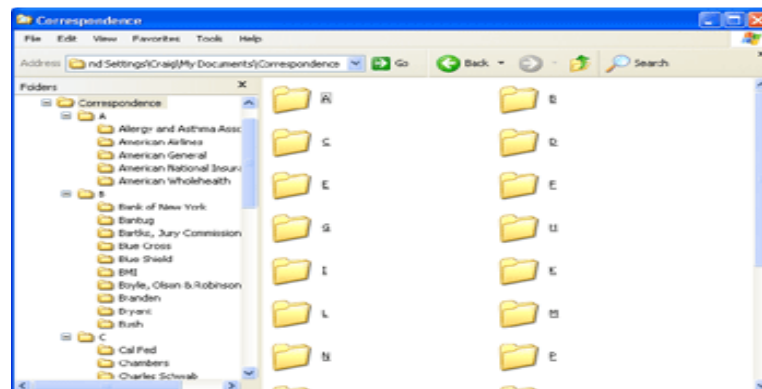
Using single folder for a long topic is not a good choice and also don't use too many folders for data. You should start with a limited number of folders for the broader topics, and then create more specific folders within these.

Let your folders do some of the naming. For example, rather than create a file called **Computer Operator Semester 1 Database management version1.doc**, you can build a structure like:



## 10. Avoid Big Sub Folder

If you need to put so many subfolders in a folder that you can't see all of them at a glance, consider creating an alphabetic menu.



To organize the folder alphabetically the best solution is to sort the folders. To sort the folders follow these steps:

1. Open the folder having folders in it.
2. Right click on the empty space and click on the Sort By option and select Ascending order to arrange folders Alphabetically.
3. The data will be arranged Alphabetically.

# Learning Unit 3: Perform Scanning

## Overview

### Do you know!

The first antivirus programs began appearing in 1987 with the introduction of an antivirus program from G Data Software for the Atari ST

An anti-virus scanner is a component of an anti-virus software package that scans a hard drive for viruses and other harmful items. In this learning unit you will learn how to scan your computer for viruses, Trojan horses, malwares, and worms and how you can update your antiviruses and can completely scan computer from malwares. After completion of this learning unit you will be able to scan/protect your computer from viruses with updated antiviruses etc.

## 1. Scanning Computer Completely

An **antivirus program** is a software utility designed to protect your computer or network against computer viruses. Whenever a virus is detected, the computer displays a warning that what action should be done, often giving the options to remove, ignore, or move the file to the vault.

If a virus infected a computer without an antivirus program, it may delete files, prevent access to files, send spam, spy on you, or perform other malicious actions.

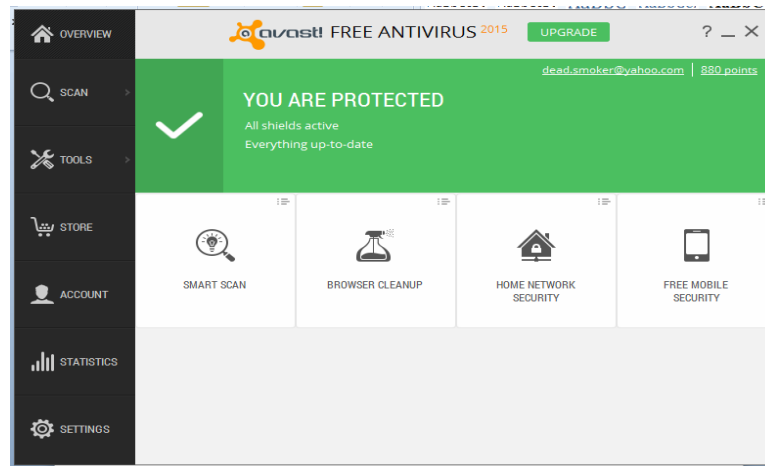
Today, there are dozens of different companies and antivirus products available for computers, servers, and even phones. All new antivirus programs have a feature to schedule times to scan all of the files on your computer for infections or can be manually run to check for viruses.

After installing antivirus in the computer it should automatically start each time you boot your computer. In the picture below **Avast antivirus** is being displayed in the Window Notification Area.



To start the complete scan of computer follow these steps:

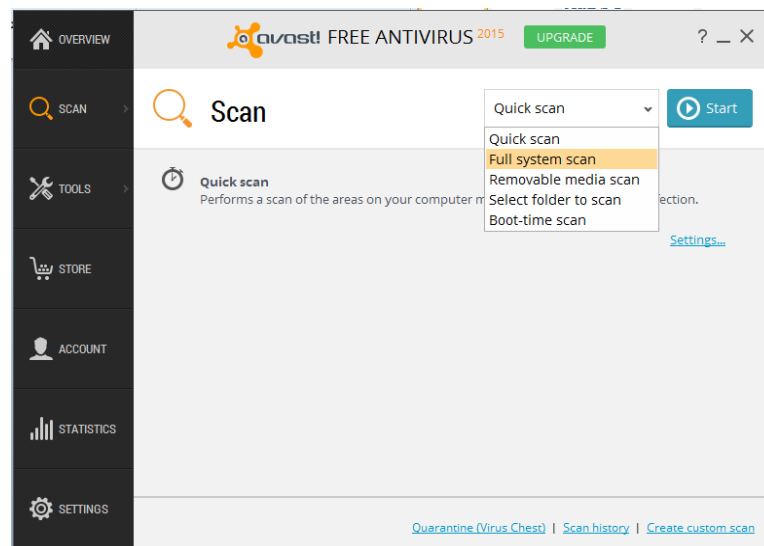
1. Click on the **Avast Antivirus** from the Notification area.
2. Antivirus window will be open.



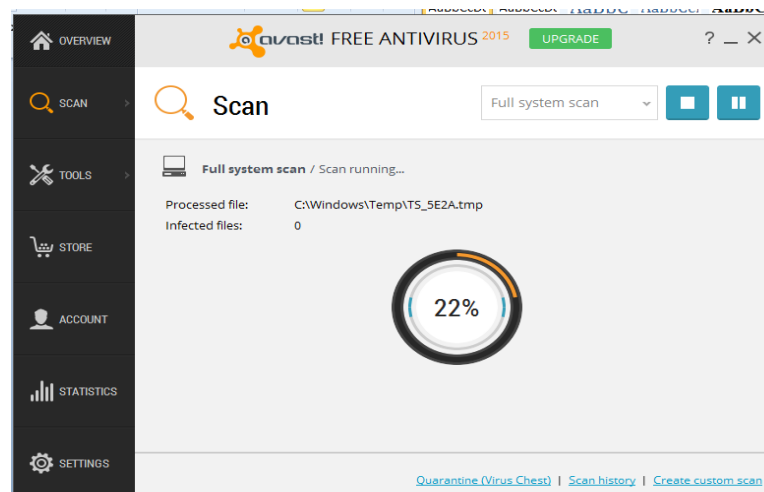
### Important

Other well-known antivirus programs include Norton Antivirus and MAC Fee, and popular free antivirus programs include Avira and AVG.

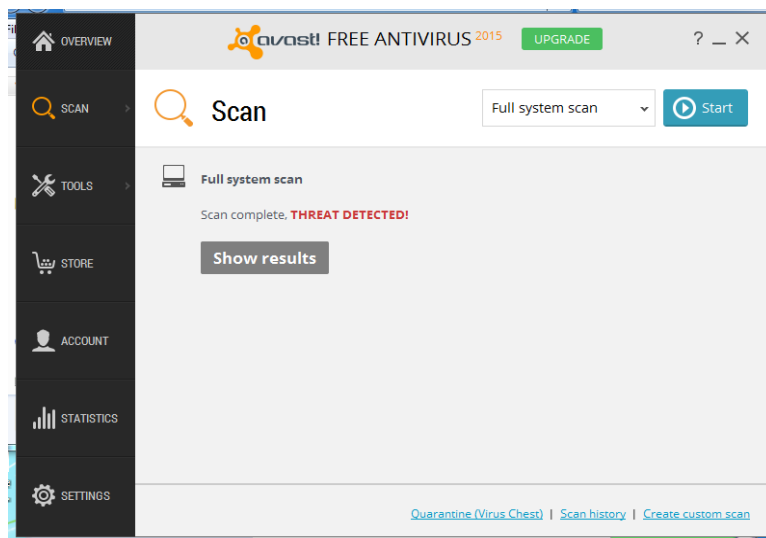
1. Click on the option **Scan>Scan for Viruses**. The following window will be appearing.



2. Select the option **Full system scan** from the drop down menu of **Quick Scan** and click on the **Start** button.
3. The scan will be start.



- After completion of the scan the summary will be displayed.



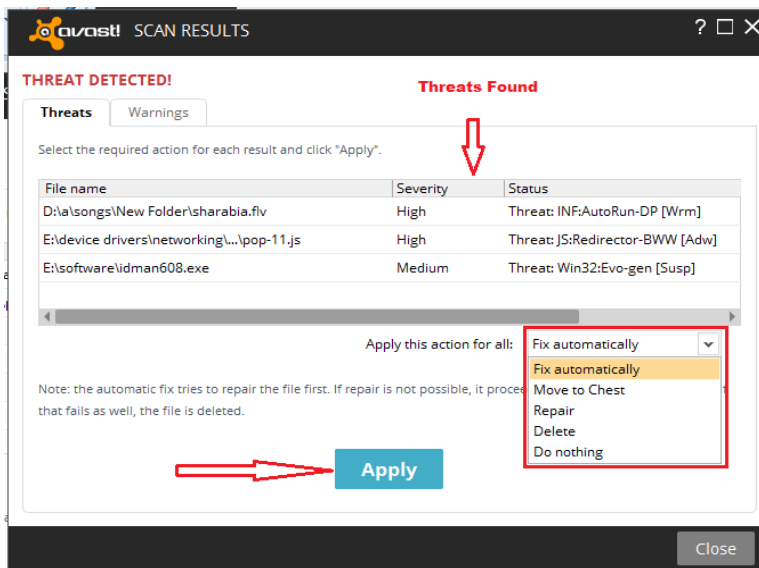
- Click on the Show result option to check the threats.

**Note**

Normally Fix Automatically option is chosen for the threat fixation.

**Remember**

Microsoft releases a new version of the Microsoft Malicious Software Removal Tool every month.



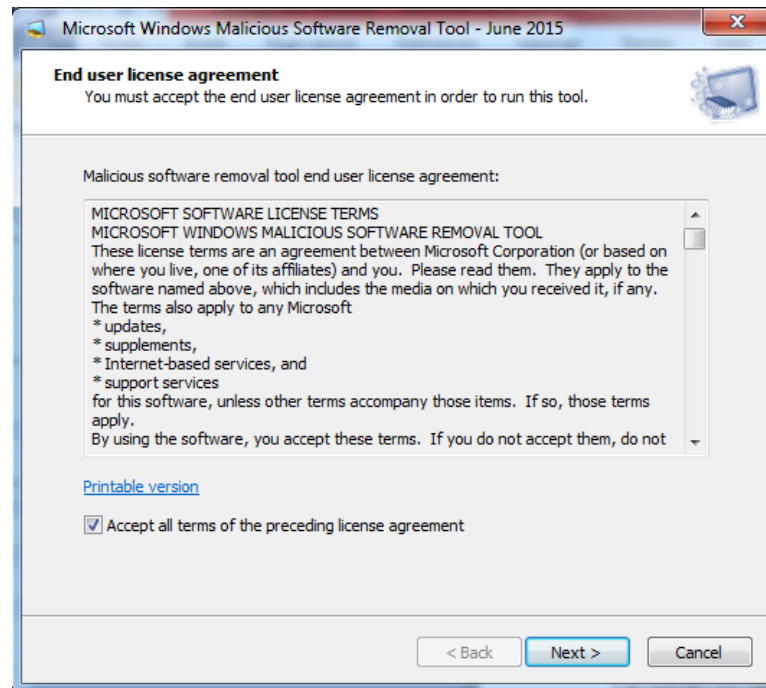
- See the threats that are found and then select the action that you want to perform from the drop down menu and click on the Apply option.
- The selected action will be applied and your scan is complete against viruses ,trojan horses and malwarewares.

## 2. Using Microsoft Windows Malicious Removal Tool

The Microsoft Windows Malicious Software Removal Tool helps remove malicious software from your computers. After you download the tool, the tool runs one time to check your computer for infection by specific prevalent malicious software (including Blaster, Sasser, and Mydoom) and helps remove any infection it finds.

The Microsoft Windows Malicious Software Removal Tool can download from the <http://www.microsoft.com/en-pk/download/malicious-software-removal-tool-details.aspx> website. As downloading complete run Microsoft windows malicious Removal tool and follow instructions:

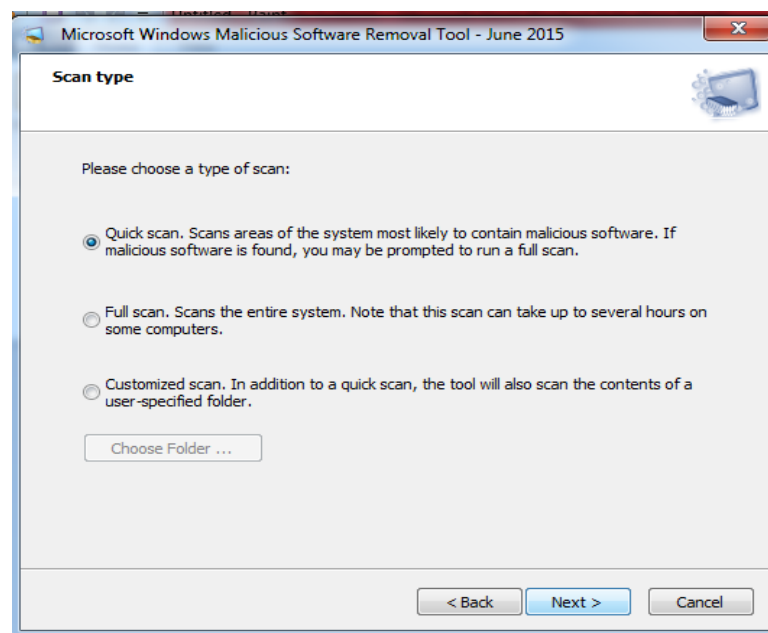
1. Run the setup. The window will appear with the terms and conditions. For installation you have to accept the terms and conditions by checking/clicking the check box. This checked box will enable the next button for you to move forward, click **Next**.



### Important

It runs in "quiet mode", which means it doesn't tell you anything at least as long as it doesn't find any malware to remove.

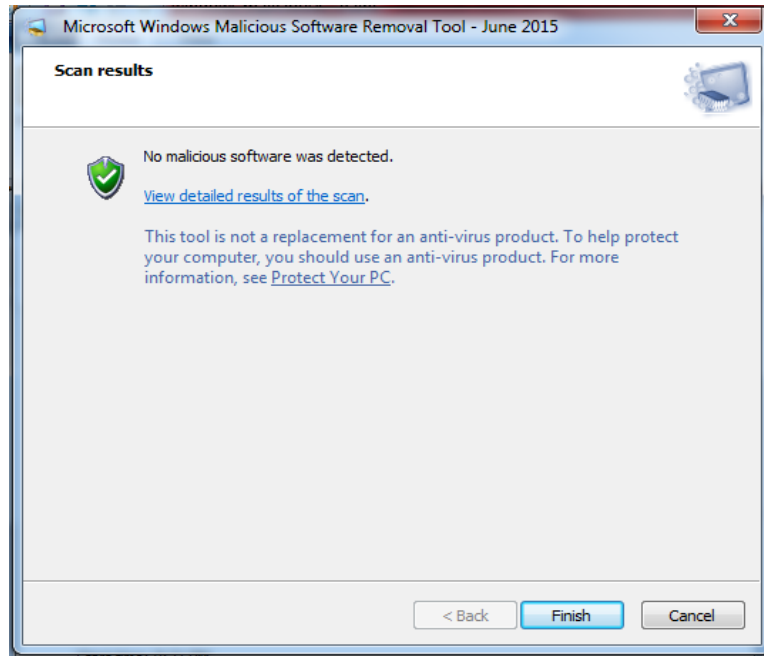
2. Click **Next button** from the next window.
3. Select the type of scan that you want their, click **Next**.
  - **Quick Scan:** will scan those areas of computer where malicious softwares are most likely to be.
  - **Full Scan:** scans the complete system and it takes long time.
  - **Custom Scan:** will scan the selected files in the computer.



4. The Scan will be started and after completion shows the result with possible threats and infections that are found.

**Note**

You can also schedule update task from the **Scheduler** option in Antivirus window.



### 3. Updating Virus Definition

**Do you know!**

Computers become vulnerable to viruses whenever its database becomes outdated. To solve this issue regular updates required.

Every virus or spyware application has unique identification information, known as its signature definition file. Security software uses these files to detect viruses and spyware on your computer.

As new viruses or spyware applications are discovered, your security software updates its databases with the signature files it needs to detect these new threats.

Therefore, computer becomes vulnerable to viruses and spyware whenever its database of virus signature definition files become outdated. But, this issue can be resolved, because:

- By default, virus definition files are automatically updated regularly.
- If you hear of an outbreak and want to get the latest updates immediately, select **Update** option in the main window.

To customize automatic signature update for Avira Antivirus follow these steps:

1. Open the Avira Antivirus Window.
2. Click on the **Scheduler** option on the Left side of the Window.
3. Click on the **+** sign to **insert New job**.
4. Select the job type (Scan,Update) and then set the schedule for update.

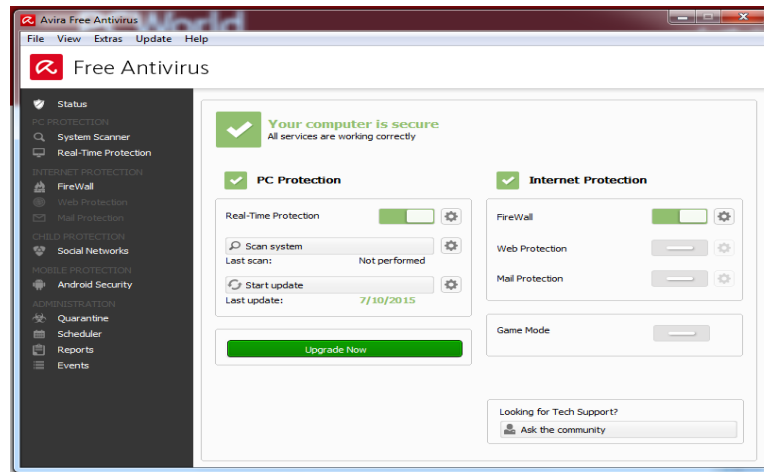
### 4. Updating Antivirus

A feature of most of our programs is their ability to update themselves automatically. If you are connected to the Internet, virus database **updates are downloaded and installed automatically** without any user action. You can also update your software manually. Antivirus software must be updated regularly to stay effective against new viruses.

To update the Antivirus installed in your computer, follow these steps:



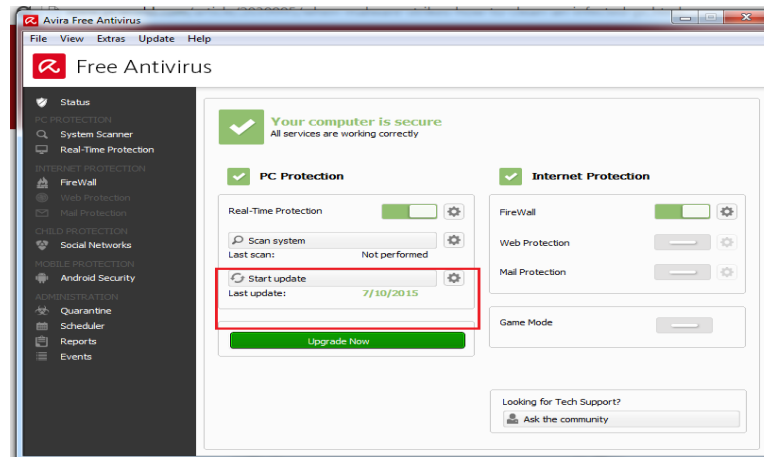
1. Open the Antivirus window installed in your computer from the Notification Area. This window will show the computer status whether it is updated or needs to be updated.



### Remember

If you are not connected to the internet then the antivirus will notify in daily basis for the updates

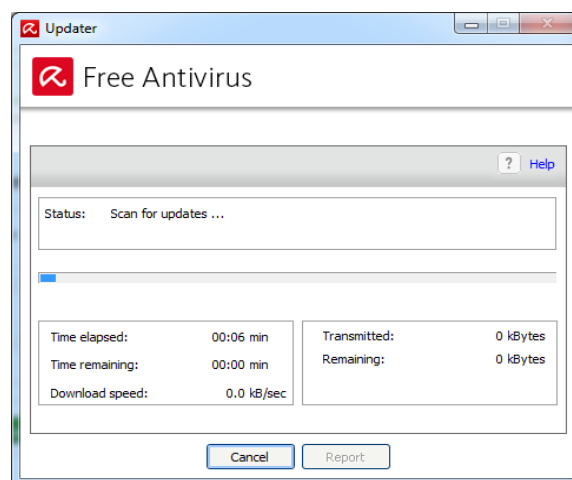
2. Click on the Start Update option as shown in the picture below.



### Important

The Update now option only appears if Windows detects that your antivirus software is out of date. Not all antivirus software reports its status to Windows.

3. The updates will be start downloading and then automatically install.



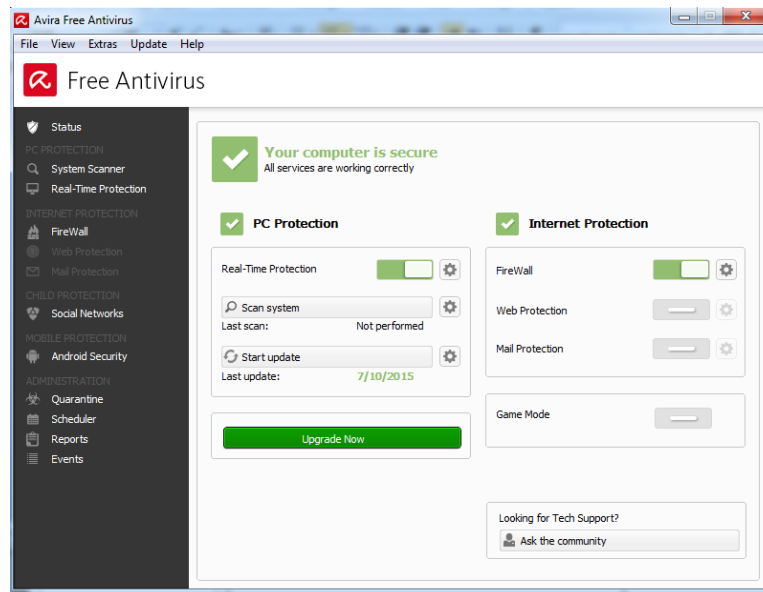
4. After installation of updates the window will show the status of computer as working properly.

## 5. Running Complete Virus Scan

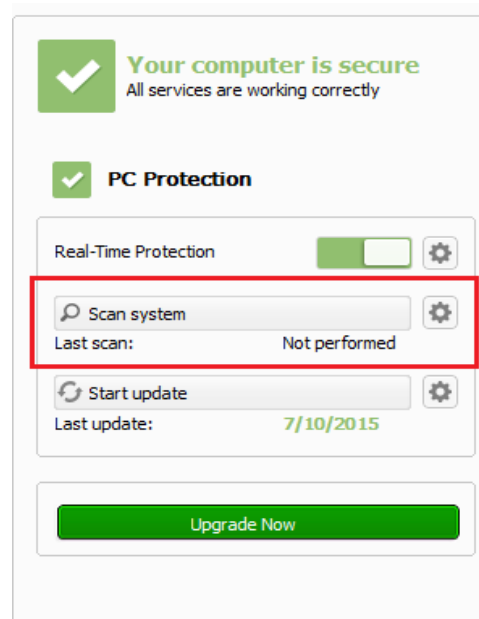
Antivirus is always running on the background. It monitor the processes that are running on system, and ensures that there are no malicious processes running. Whenever you start downloading a new file or open a program or attach any removable device, your antivirus quickly start processing, examine the file and compar it to viruses before allowing it to run. If you download a virus or attach an infected device with computer, antivirus will notice without your scanning. Antiviruses generally run system scans in the background once a week without interrupting you.

If you want to manually complete scan your computer with Avira Antivirus, follow these steps:

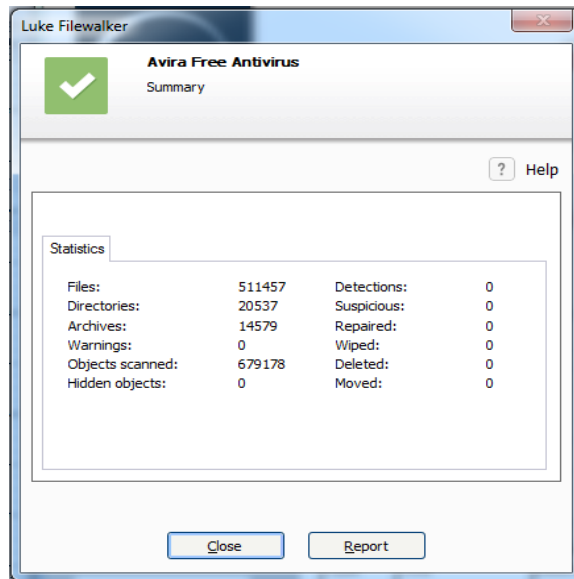
1. Open the Antivirus window installed in your computer.



2. It will show when last status scan was performed. Click on the Scan System.



- The antivirus will start scanning all files of computer including hidden files, directories, archive files etc. after completion it will show you the summary of scan.



- If it finds any malicious it will prompt for actions otherwise Close it, after that check the status of Antivirus.



# Learning Unit 4: Maintain Office Record

## Overview

Office record is a very valuable asset of any organization so it must keep in organized and maintained form. In this learning unit you will learn about the Electronic record management and its backup. How you can access and maintain the records without its physical existence. After completion of this learning unit you will be able to maintain office records.

## 1. Ensuring the Existence of Electronic Record

### Note

A digital record that can be manipulated transmitted or processed by a computer is known as **Electronic Record**.

With the rapid development of computer technology many organisations are shifting from manual to electronic records by use of office automation tools such as word processing, spread sheets, electronic mail and database management software.

In reality few automated systems have implemented paperless environment by eliminating the use of “hard copy” (printed form of the computerized data).

Electronic records are logical and cannot be read directly without the use of computer software and hardware.

As logical entities, electronic records have three attributes: content, context and structure, which can be explained as follows.

**Content:** what the record says.

### Remember

For secure record-keeping records must be protected till they need to be kept, and after that dispose them appropriately.

**Context:** is the background information that helps to explain the meaning of the document. This includes two types of information. Firstly, there is information that identifies the particular document, such as the title, author and date of creation. Secondly, there is information about the creator and the purpose of creation.

**Structure:** relates to both the appearance and arrangement of the content (for example, the layout, fonts, page and paragraph breaks, tables, graphs, charts and so on) and the relationship of the record to other related records in the system (i.e the links).

To ensure that the record is preserved and protected by all means, follow these steps:

1. Do not use computer hard drives (C: drives) to store records or important information. Instead, store records in formally established electronic record-keeping systems or, in the absence of such systems, in secured network drives.
2. Regularly clean up computers and network locations by destroying obsolete records that have met their retention periods.
3. Ensure your computer systems are configured with proper security systems, anti-virus software, password protection, and automatic time out/lock features to restrict access to password holders only.
4. Good record-keeping involves keeping full and accurate documentation about which records were destroyed and which were kept safe.
5. Always check that the website you are using is using secure links.
6. Ensure that no body is looking you during password typing and always logout after finishing work or leaving the seat.
7. Always install antivirus on your computer and be sure that all the softwares are properly updated.

## 2. Managing Electronic Record Backup

Dependable backup procedures protect electronic documents from loss and corruption. Record must be well organized and timely backup has been taken for proper working otherwise many issues can be arise.

Some important points are given below to manage backups.

1. You must back up electronic records on a regular basis to safeguard against loss of information due to equipment malfunctions, human error, or other disaster.
2. Back-up media created for recovery purposes must be stored in another storage facility with constant temperature (below 68 degrees Fahrenheit) and relative humidity controls.
3. Electronic records on magnetic tape or disk must not be stored in metal containers unless the metal is non-magnetic.

### Important

Individual hard drives on PCs are not backed up via the regular network backup procedures and must be backed up regularly by users onto backup drives i.e. Usb flash passport disks.

## 3. Enhancing Ability to Access Record Overtime

There is often a presumption that because information is stored on the computer or on disk or tape, it is somehow automatically preserved for all time. Unfortunately, electronic storage media can easily become unreadable over time due to physical, chemical, or other deterioration. Special care and precautionary measures must be taken to avoid the loss of records stored on electronic media.

The following are general suggestions to enhance the data availability.

- Do not use diskettes for long-term storage of permanent records. Temporary storage on diskettes is acceptable.
- Keep disk and tape drives clean and give them periodic preventative maintenance.
- Keep diskettes and tapes away from strong electrical or magnetic fields.
- Do not touch the recording surfaces of floppy diskettes; do not break open their outer shell.
- Do not allow unauthorised persons to have access to the computer or to the diskettes or tape files and records. Even people with good intentions can enter commands that will delete files or reformat hard disks.
- Keep food and drink away from storage media as well as equipment.
- Store disks and tapes in a vertical position in a storage container (for example a disk box).
- Store diskettes under normal office conditions, taking care to avoid extreme fluctuations in temperature and humidity if possible.
- You must annually read a statistical sample of all electronic media containing permanent or long-term records to identify any loss of information and to discover and correct the cause of data loss.
- Copy data on the tapes to new or re-certified tapes at least once every ten years or more frequently when necessary to prevent the physical loss of data or technological obsolescence of the medium.

# Learning Unit 5: Perform Printing

## Overview

### Remember

Choose paper as per requirement within allowed weight limit of printer.

Printing is process of getting hard copy of a file, image, email or anything which is wanted to print on paper. Printer must be installed on the computer before printing. Printing ink/powder and paper directly affect the printing quality. This learning unit covers the procedure for printing a file on a paper and how to get print on both side of a paper. After completion of this learning unit You will be able to demonstrate the procedure of printing a good quality print of a file.

## 1. Getting Print Out From a PC

- Open any document, webpage, or email for printing.
- Click the File menu, and then click Print.
- In the Print dialog box, change the settings as per requirements i.e paper size, margin, copies, page numbers etc. click Print.

## 2. Handling Problems that Occur While Printing

### Printer

Printer is a device that is used to convert a softcopy result to a hard copy (like Paper).

### Check Before Printing

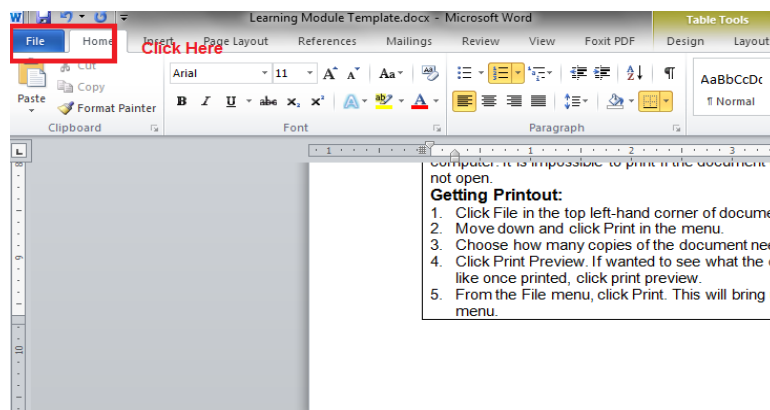
- Before printing any file, check whether the printer is installed, connected with computer and powered on.
  - Also, check type of printer (inkjet or a laser printer).
  - Choose the appropriate paper and ink/Powder.
  - Determine what type of paper size wanted to print on before printing. This paper will need to be loaded into the appropriate slot / tray.
- Determine what is needed, color or black & white prints.
  - Ensure that printing material is open and visible on the computer. It is impossible to print if the document to be printed is not open.

### Getting Printout:

1. Click File in the top left-hand corner of document or file.

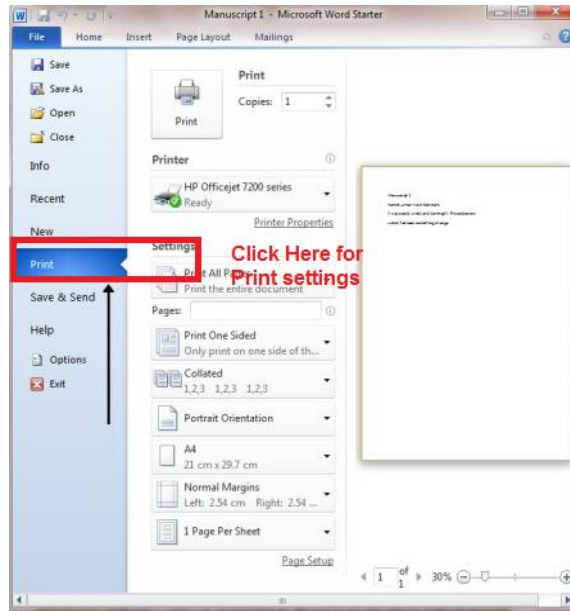
### Do you know!

CTRL + P command prints on by default printer's settings.

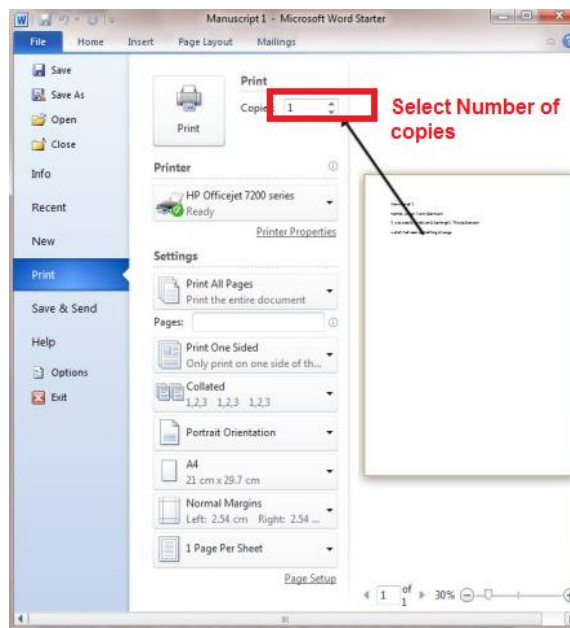


- Getting Printout:**
1. Click File in the top left-hand corner of document
  2. Move down and click Print in the menu.
  3. Choose how many copies of the document need
  4. Click Print Preview. If wanted to see what the d like once printed, click print preview.
  5. From the File menu, click Print. This will bring u menu.

2. Move down and click Print in the menu.



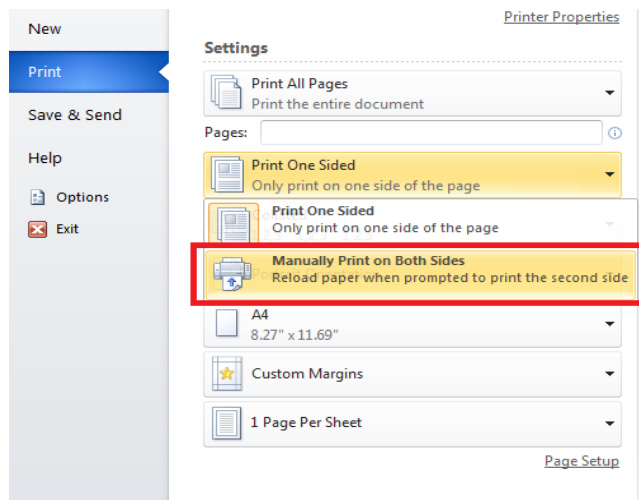
3. Choose how many copies of the document needed.



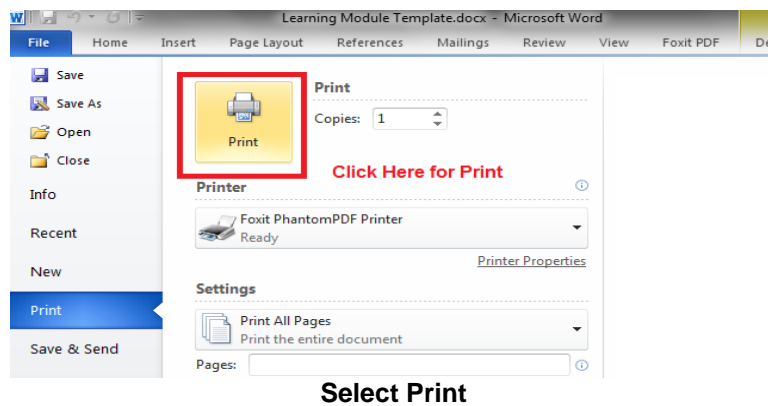
#### Do you know!

You can also print Envelops Labels, Charts and images, Wedding Cards using printer.

4. Click **Print Preview**. To see what the document will look like once printed.
5. Click Properties, Preview, or Advanced. Find the button which will allows accessing the more advanced settings.
6. (This menu will allow changing paper sizes, source, and type, as well as a variety of other options depending on the program using).
7. If wanted to print on both sides of a paper than select the option from settings than Pages and then select Manually print on both sides (This is subject to the printer).



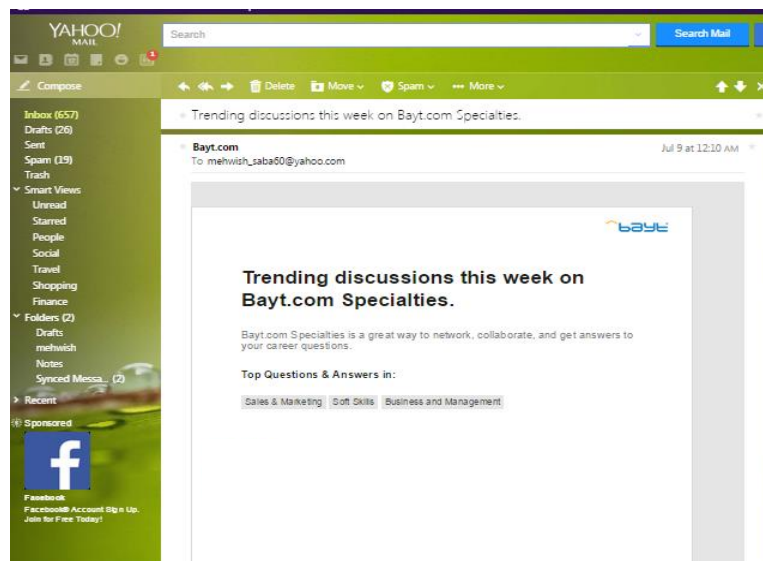
8. Click Ok or Print.



### 3. Printing E-Mail

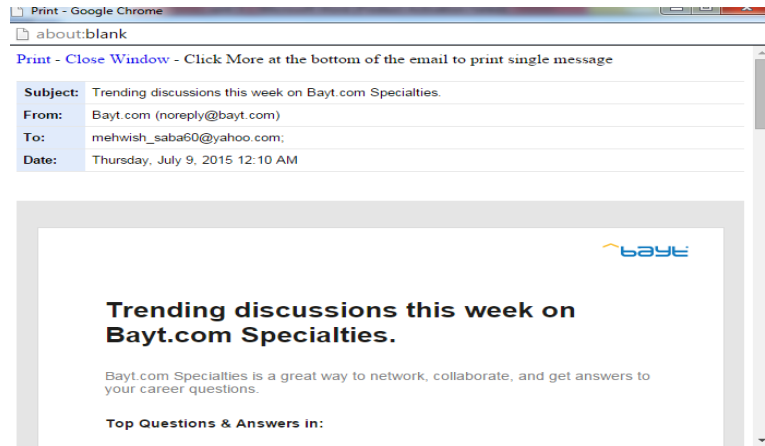
To print an E-Mail follow these steps:

1. Open an E-Mail you want to print out.





2. Press CTRL+P to print E-Mail. A small window will open with the preview of email.



3. Click on the Print button shown in the above button .
4. E-Mail will be printed, you can collect it from out tray of printer.

# Learning Unit 6: Search Files and Folders

## Overview

### Remember

You can search a specific file or folder through navigation but it takes a lot of time for searching a specific file.

Finding files and folders means searching for a specific folder or files in a computer. Windows provides several ways to find files and folders. There isn't one best way to search. You can use different methods for different situations. This learning unit will cover the procedure for searching files and folders using different methods. After completion of this learning unit you will be able to search known and unknown files using wild cards using names of files or folder through start buttons and search tool.

## 1. Methods of Finding Files and Folders

For finding or searching files and folders different methods are provided with windows like:

### 1. Using the search box on the start button.

The search box on the Start menu is used to find files, folders, programs, and e-mail messages stored on computer.

### 2. Using search box in a file, folder or library.

The search box filters the current view based on text that is typed. The search looks for text in the file name and contents; and in the file properties, such as in tags. In a library, the search includes all folders included in the library as well as subfolders within those folders.

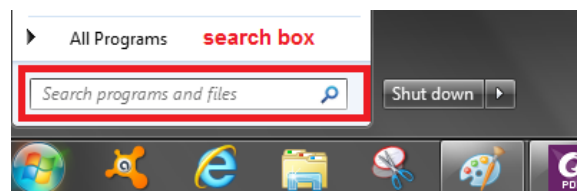
### 3. Expanding a search beyond a specific library or folder.

If it cannot find what is looking for in a specific library or folder, than expand the search to include different locations.

## 2. Use of Search Box to Find Files, Folders and Programs

### Search Box

The search box is one of the most convenient ways to find things on computer. The search box finds programs and all of the folders in personal folder (which includes Documents, Pictures, Music, Desktop, and other common locations). It will also search e-mail messages, saved instant messages, appointments, and contacts etc. saved in computer.



Search Box

### Using Search Box

Open the Start menu and start typing. It doesn't need to click inside the box first. As you type, the search results appear above the search box in the left pane of the Start menu.

A program, file, or folder will appear as a search result if:

- Any word in its title matches or begins with the search term.
- Any text in the actual contents of the file such as the text in a word processing document matches or begins with the search term.
- Any word in a property of the file, such as the author, matches or begins with the search term.
- Click any search result to open it. Or, click the Clear button **X** to clear the search results and return to the main programs list. ( You can also click **See more results** to search your entire computer.)

Besides searching programs, files and folders, and communications, the search box also looks through your Internet favorites and the history of websites you've visited. If any of these webpages include the search term, they appear under a heading called "Files."

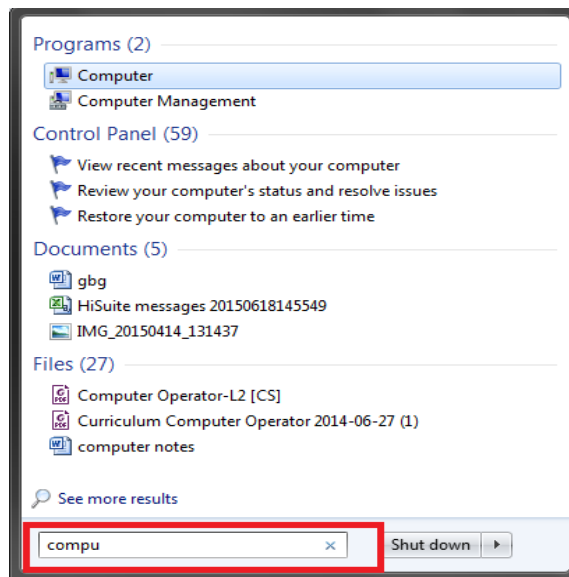
#### Remember

Microsoft has allowed searches using two wildcards, the asterisk (\*) and the question mark (?).

### 3. Finding Files and Folders Using Start Button

Finding an item using the Start menu:

1. Click on the Start button, and then type a word or part of a word in the search box.



**Search Box in Start Button**

2. Search results appear as soon as start typing in the search box. As you type, items that match your text will appear on the Start menu. The search results are based on text in the file name, text in the file, tags, and other file properties.

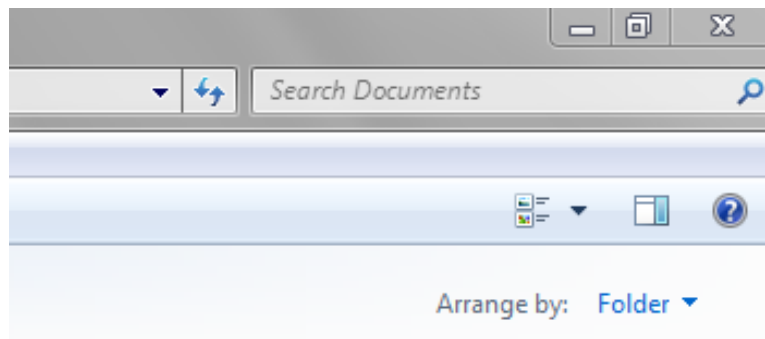
### 4. Finding Known Files and Folders Using Windows Search Box Tool

#### Using the Search Box in a Folder or Library

When looking for a file that someone knows is in a particular folder or library, such as Documents or Pictures. Browsing for the file might mean looking through hundreds of files and subfolders. To save time and effort, use the search box at the top of the open window.

**Do you know!**

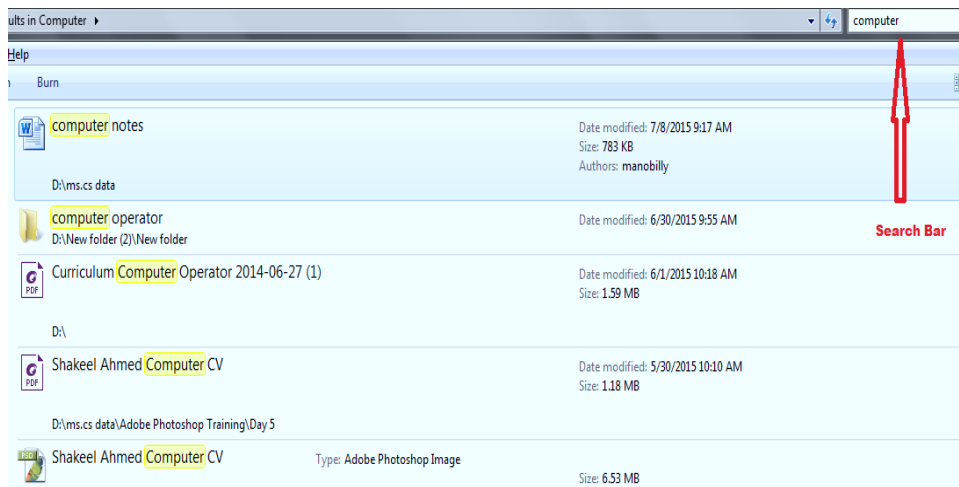
In wildcards the question mark (?) is used to substitute for one letter or symbol that you don't know. The asterisk (\*) is used to substitute for many letters and symbols.



**Search Box in a File and Folder**

**Search for a File or Folder by Using the Search Box:**

Type a word or part of a word in the search box. When done, the contents of the folder or library are filtered to reflect each successive Character typed. When the wanted file is seen stop typing or filter it with other checks that is date, author, size etc.



**Searching a File and Folder**

# Learning Unit 7: Convert Files

## Overview

Sometimes it is necessary to convert a file into another format, like converting an MS word file into a PDF file which is an adobe acrobat file or conversion of a video file into audio file. This conversion can be done using different types of software available on internet. The software can be downloaded and installed. This learning unit covers the procedure for converting a file into a different format like a MS word file to PDF file, demonstrate software types used for file conversion, conversion of a file manually and procedure for converting files using online software are website. After completion of this learning unit you will be able to conversion of files using different methods.

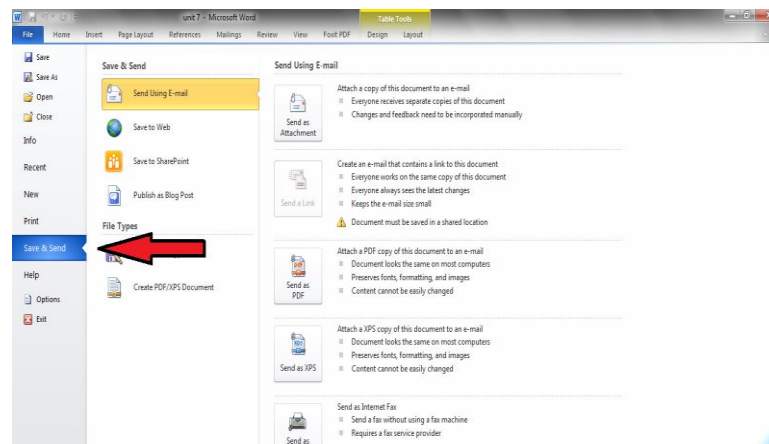
### Remember

Make sure that you have downloaded freeware software for conversion.

## 1. Converting a File into Different Format

A file can be converted into different formats through many ways. It can be converted either manually or using download or online software for example converting a word document file into pdf file. Some software gives the option of saving a file in different format like MS office provided this conversion option. For conversion a word file into pdf follow the steps:

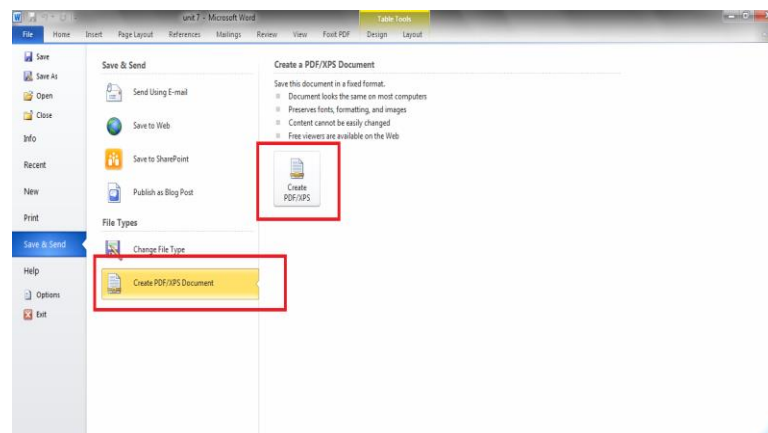
1. Open the file in Office Word 2010.
2. Click the "File" tab and go to Save & Send.



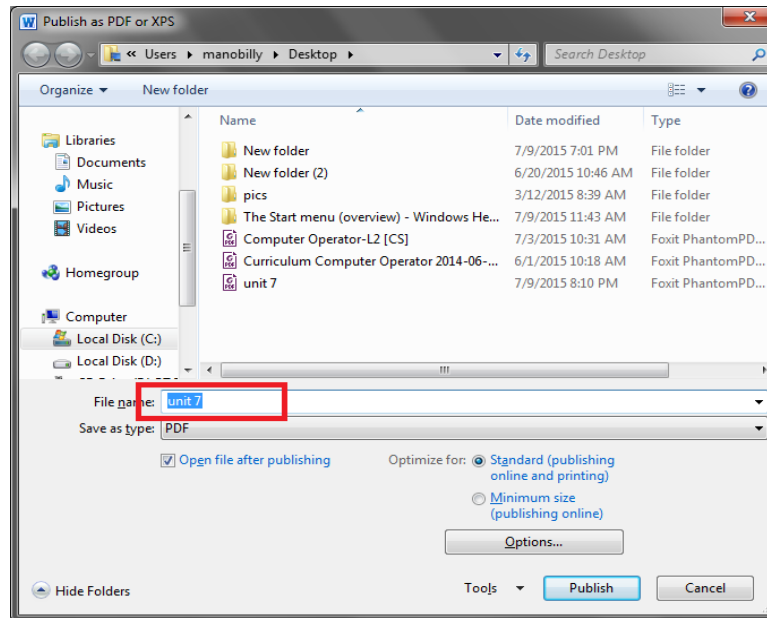
### Do you know!

The Save as PDF/XPS add-in is built in Word 2010, and it can directly save Word 2010 or other parts of 2010 Office suite to PDF format.

3. In the "File Types" field, choose Create PDF or XPS Document.



4. Click "Create a PDF/XPS".
5. In the pop-up dialog box, enter a file name and location.



6. Click Publish.

## 2. Software Used for Converting Files

### Remember

There are many methods for files conversion it depends on user what method he /she is used.

There is a lot of software available for conversion of files to different format. For example converting a word file to pdf, converting a video file to audio, and many more.

### Word to PDF or PDF to word file conversion software

Foxit Phantom and Nitro are the software used for converting word document to PDF file while PDF to Word convertor is software used for PDF to word conversion.

### Audio ,Video file conversion software

Any video convertor, Total video convertor, AVS video convertor is software used for conversion of audio and video files into different formats. Like it can convert an .FLV file into MP4 or MP3 file format.

### Archive file to Zip File conversion software

Express zip software is used to convert archive file to zip file.

### All File 3000 converter software

All File to File Converters 3000 is revolutionary software, which has the ability to convert any file format to almost any format under the sun. With this file conversion software, users can easily convert massive different formatted files to one specific format with fast conversion speed. It has the ability of all different file converter like the PDF converter, Video and Audio converter.

### Universal file convertor Software

Universal Converter offers a complete solution for converting documents into major file formats like PDF, HTML, TIFF, JPEG, PNG, BMP, RAW, EPS, PS and other file formats. One great feature of the Universal Converter is that it provides security features like password protection, water mark and unique copy protection to the documents that are converted. The software also provides a command line interface for converting files and users are enabled to combine multiple files of different formats into a single file and convert it to any desired file format.

## 3. Changing the Extension of a File Manually

A file extension (or simply "extension") is the suffix at the end of a filename that indicates what type of file it is. For example, in the filename "computer.txt," the .TXT is the file extension. A file extensions can also be changed manually for doing this:

### Changing a file extension manually

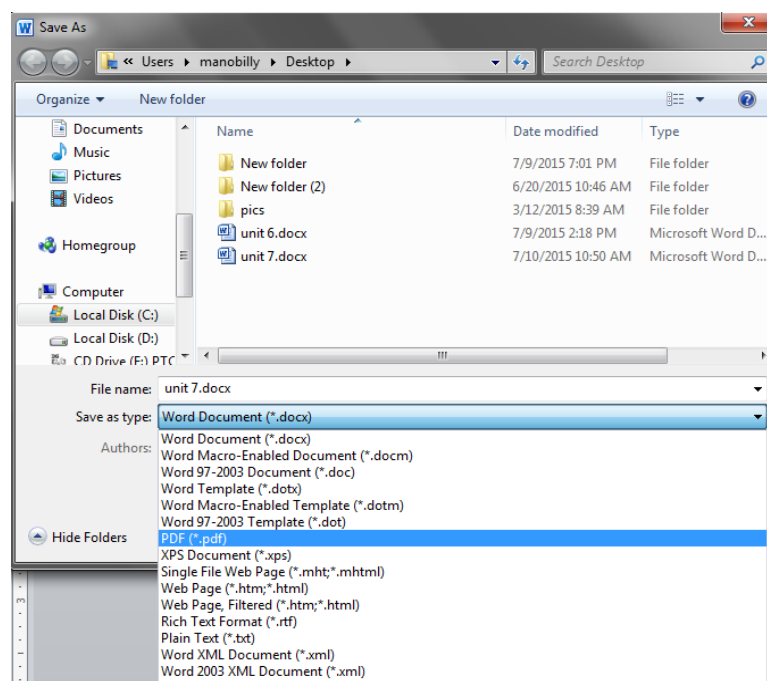
In Windows 7, to change a file extension, first, make sure file extensions are visible using the steps below, then:

1. Open any folder window.
2. Press Alt+T+O (it is letter O, not a zero) to open the Folder Options dialog box.
3. Click the **View** tab.
4. Remove the checkmark beside 'Hide extensions for known file types' and click **OK**.
5. Click the file to select it, and then click once more. Windows automatically selects the filename so that anything that is typed will replace the existing name.
6. Click and select the extension, type the new extension and press Enter.

### Changing a file extension using save as command

A file extension can also be changed using **Save as** command for doing this:

1. Open a file for change extension.
2. Click on File tab then **save as** button. Save as dialogue box will appear.



**Change File Type Using Save as Command**

3. Click on the **save as type** text box and select the type wanted to change or save.
4. Click on OK button.
5. The file extension will be saved as selected type.

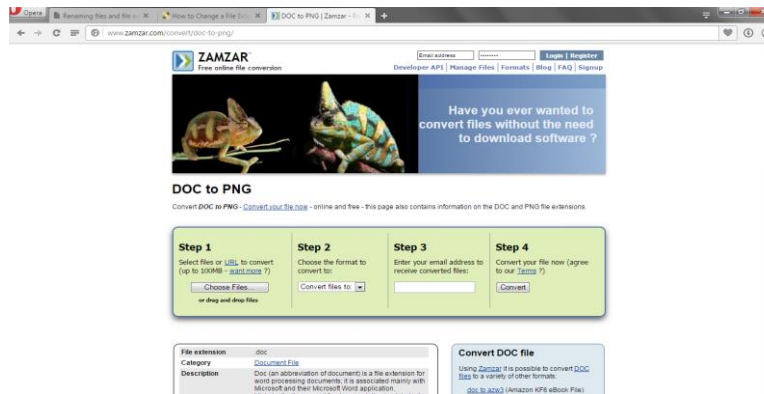
## 4. Using Online Converter for Converting Files

A file can also be converted using online available software. [www.zamzar.com](http://www.zamzar.com) is a website for providing different file formats to convert a file. Here are some steps to follow for conversion:

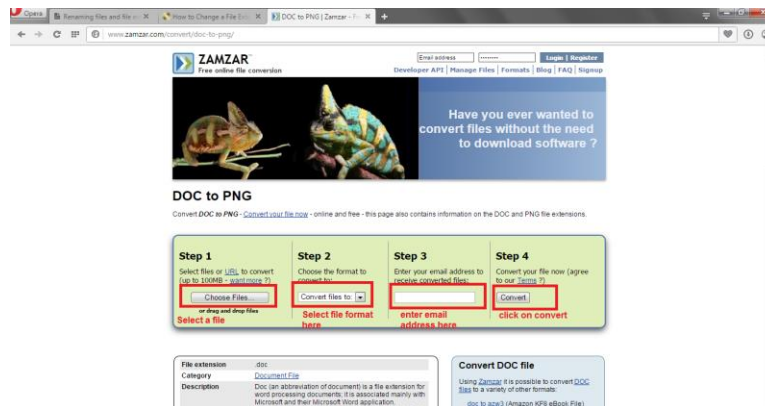
1. Open a web browser
2. Click on address bar and type [www.zamzar.com](http://www.zamzar.com)
3. Click enter button, the website will be open.

### Remember

To change the file extension only does not mean to change of format of file.



Here is different option available.



### Step 1:

Click on first option for selecting a file which is wanted to convert.

### Step 2:

Click on this option for selecting a file format. For converting a .PNG form select PNG.

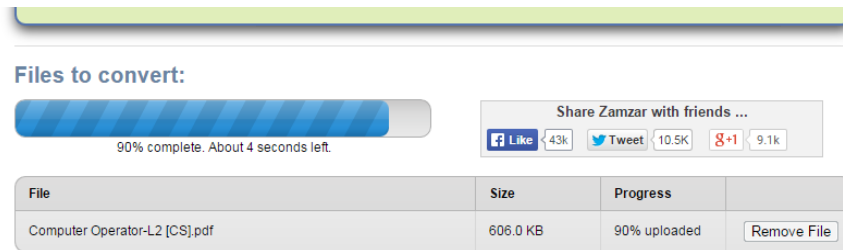
### Step 3:

Enter email address on which the converted file will be sent after conversion.



**Step 4:**

In the last click on Convert button for converting.



The screenshot shows the Zamzar conversion interface. At the top, there is a blue progress bar labeled "Files to convert:" with the text "90% complete. About 4 seconds left." below it. To the right of the progress bar is a sharing section titled "Share Zamzar with friends ..." with buttons for "Like" (43k), "Tweet" (10.5K), and "G+1" (9.1k). Below this is a table with the following data:

File	Size	Progress	
Computer Operator-L2 [CS].pdf	606.0 KB	90% uploaded	<a href="#">Remove File</a>

It will take a few minutes after conversion the file will be sent to the given email address.

## Learner's Activity

<b>Description</b>	This learning activity consists of an interactive session in the class about installing a file conversion and converts a file in different format.
<b>Time</b>	40 minutes.
<b>Purpose</b>	To highlight the procedure for installing a conversion software and conversion of a file.
<b>Instructions for Learner</b>	<ol style="list-style-type: none"><li>1. Ask learners how to download install conversion software.</li><li>2. Ask learners how to convert a file in any other format.</li><li>3. Ask learners are they able to convert a file using online available software for conversion.</li></ol>

## Summary of Module

- Knowledge of facts about something or someone is called information. Information is valuable because it can affect behavior, a decision or an outcome.
- Checking data for errors is commonly called “cleaning.”  
Three most common methods used for data cleaning are:
  1. Spot-checking
  2. Eye-balling
  3. Logic checks
- The following four-step process uses data as an integral part of Decision Making cycle.
  - Analyze
  - Plan
  - Implementation
  - Analysis
- Typing master is software that systematically helps you to increase speed in a friendly way with lots of Lessons, Tests and Games.
- Library helps you to organize your work and make finding easy. In Windows 7 default libraries include two standard folders: the user folder specific to each library and the public folder specific to it.
- An antivirus program is a software utility designed to protect your computer or network against computer viruses. whenever a virus is detected, the computer displays a warning asking what action should be done, often giving the options to remove, ignore, or move the file to the vault.
- Most of the antivirus software have feature of automatic update and can be updated manually as well
- Print out/Hard Copy means physical copy of data on paper. Different printing devices are available for this.
- The search box on the Start menu is used to find files, folders, programs, and e-mail messages stored on computer.
- A file can be converted into different formats through many ways. It can be converted either manually or using download or online software
- A file extension (or simply "extension") is the suffix at the end of a filename that indicates type of file.
- Universal Converter offers a complete solution for converting documents into major file formats like PDF, HTML, TIFF, JPEG, PNG, BMP, RAW, EPS, PS and other file formats.

## Frequently Asked Questions (FAQS)

FAQ 1: Differentiate between files/folders?

Answer File is signal unit of data i.e. program, document etc. while folder is a logical location where these files or other folders exist.

FAQ 2: What is the short key to Find /Search for specified text in the active document

Answer Ctrl+F

FAQ 3: What are the 3 common methods for checking error?

Answer

- Spot-checking
- Eye-balling
- Logic checks

FAQ 4: What are the common folders included in the library?

Answer

- Documents
- Pictures
- Music
- Videos

FAQ 5: Write some names of common storages devices?

Answer

- Hard Disk
- USB
- CD/DVD

FAQ 6: What is the recommended storage device to store backup files?

Answer Backup files can be stores on any storage device expect that where the files are actually stored.

FAQ 7: Define antivirus.

Answer An Antivirus Program is a software utility designed to protect your computer or network against computer viruses.

FAQ 8: What is short key to print an E-mail?

Answer Ctrl+P

FAQ 9: From how many ways a file/Folder can search out?

Answer There are many ways to search any file/folder. Window 7 provides the search boxes for ease.

- Through Search Bar on the opened window.
- Using Search Box in the Start Menu

FAQ 10: What is meant by file extension?

Answer A file extension (or simply "extension") is the suffix at the end of a filename that indicates type of the file.

## Test Yourself!

Please mark the correct one from the given options. You can check your answer with the Answer Key at the end of this module.

1. **A collection of letters, numbers and special characters is called a**
  - a. Folder
  - b. File
  - c. Information
  - d. Data
2. **CD/ DVD are \_\_\_\_\_ device.**
  - a. Temporary Storage Device
  - b. External Storage Device
  - c. Output device
  - d. None of Above
3. **Which statement is true for Viruses?**
  - a. Increase speed of Computer System.
  - b. Corrupt the files in Computer.
  - c. Protect our Computer from malwares.
  - d. None of Above
4. **In “Rapid Typing Tutor.exe” .exe is \_\_\_\_\_ of file.**
  - a. Name
  - b. Extension.
  - c. Version
  - d. None of above
5. **To Exit /Close Microsoft Softwares \_\_\_\_\_ key is used.**
  - a. ALT+F4
  - b. CTRL+C
  - c. ALT+Tab
  - d. ALT+F5
6. **A \_\_\_\_\_ is a virtual collection of files/ folders on your system.**
  - a. File
  - b. Libraries
  - c. Program
  - d. None of these
7. **Foxit Phantom is the software used for converting \_\_\_\_\_ files.**
  - a. Word /PDF Files
  - b. Audio/Videos
  - c. Archive/Zip Files
  - d. None of the Above
8. **In wildcards the \_\_\_\_\_ is used to substitute for one letter or symbol that you don't know.**
  - a. Question Mark (?)
  - b. Asterisk Sign(\*)
  - c. # Sign
  - d. None of Above
9. **A digital record that can be manipulated transmitted or processed by a computer is known \_\_\_\_\_.**
  - a. Paper work
  - b. Electronic record
  - c. Information
  - d. None of Above

## Answer Key

MCQ Number	Correct Answer
1	d
2	b
3	c
4	b
5	a
6	b
7	a
8	a
9	b

# **Module 8: Identify and Peruse New Business Opportunities in the Field of Computer (ICT)**

## **Learning Outcomes**

After completion of this learning module learner will be able to:

- Identify business opportunities in the field of Computer (ICT)
- Develop structure of the new Computer Business
- Communicate new computer business to the customers
- Negotiate arrangements for the new computer business





# Learning Unit 1: Identify Business Opportunities in the Field of Computer (ICT)

## Overview

A business plan lays out a written plan from a marketing, financial and operational viewpoint. Sometimes a business plan is prepared for an established business that is moving in a new direction. In this learning unit you will learn how to identify new business opportunities for new and existing business and learn to face challenges related to business planning, finance, competition, market trend, employment issues etc. after completion of this learning unit you will be able to identify how to start a successful business by improving business plan, market research budgeting and dealing with suppliers and/or customers, proper business places etc.

### Business Plan

A written document that describes in detail how a new business is going to achieve its goals is called **Business Plan**.

## 1. Identifying Business Opportunities

It's incredibly tough to find good business opportunities. The best tactic is to read examples and understand what to look for and where to go to find a successful opportunity. It's never guaranteed, but it's a good (and necessary) place to start. There are a few general things that should always be present with a good opportunity (no matter what type) of business you are going to start.

### 1. The product or service will be according to need:

For a new business when you evaluate an opportunity, ask yourself if there is really need for this product or service. Does the product or service solve the problem for consumers? The best way to see if the people are going to like your product is to take a survey.

### 2. The opportunity will work in your location.

If the opportunity meets the need that's sufficient, but if isn't specific to your location it won't work for you. You also have to think of the economic environment.

### 3. Ensure Resources to make Business Successful:

While it's true that you can start to compile resources once you have acquired or started a business, you should still be considering this at the start. This is more of a personal requirement for an opportunity as opposed to finding one in general. Do you have what it takes to run that type of business right now? Are you going to be able to afford the resources needed to help the business succeed?

If you will not keep in mind this point in start, in the end you need to trust others so that you can focus on the bigger picture of setting the strategy.

### 4. Product and services price is according to market:

You have to consider the market and consider price. Ask yourself whether or not you can provide the product or service at a price the market can handle.

### 5. Timing is suitable in term of Market and Resources:

Timing is everything when evaluating business opportunities. It's also worth noting that even in a down economy there could be a window of opportunity. It's all about considering the above points to decide if the timing is right for your idea.

## 2. Facing Challenges in the Business

### Remember

Remember that the process of entering qualitative data can be very tedious and time-consuming, so it is important that you plan accordingly.

Growing businesses face a range of challenges. As a business grows, different problems and opportunities demand different solutions. Recognizing and overcoming the common pitfalls associated with growth is essential if your business is to continue to grow. The main problems that you have to face during the business development are as follow:

### Keeping Up with the Market:

Market research is not something that you do when you start your business. Business conditions change continuously, so market research should also be continuous to ensure the success of business.

### Problem Solving:

As your business grows, you also need to be alert to new problems and priorities. For example, your business might be increasingly at risk unless you take steps to ensure your intellectual property is properly protected.

If you are focusing on individual marketing campaigns, you might need to devote more resources to developing your brand.

### Money Management:

Money management becomes even more important when cash is flowing into the business and to the owner.

Making the best use of your finances should be a key element in business planning and assessing new opportunities.

### Proper Systematic Way:

Responsibilities and tasks can be delegated as your business grows, but without solid management information systems you cannot manage effectively. The larger your business grows, the harder it is to ensure that information is shared and different functions work together effectively.

## 3. Identify Risk Related to Business

### Risk

The Australian standard defines **risk** as 'the chance of something happening that will have an impact on objectives'.

There are many different types of business risk. Risks can be internal and external to your business. They can also directly or indirectly affect your business's ability to operate. The types of risk you face are specific to your business and its objectives. Some common risk categories are:

- **Regulatory and government policy changes**, such as water restriction, quarantine restrictions, carbon emission restrictions and tax.
- **Property and equipment**, such as damage from natural disasters, burst water pipes, robbery.
- **economic and financial**, such as global financial events, interest rate increases, cash flow shortages, customers not paying, rapid growth and rising costs

- **Market**, such as changes in Consumer preference and increased competition.

You should use this list as a starting point for thinking broadly about the types of risks that could impact your business. People often make the mistake of overlooking things that don't directly impact their business and are therefore unprepared to deal with change. For example, while your business might not be directly affected by a natural disaster, you may still suffer if it affects your suppliers, customers or general location.

Consider how these scenarios could affect your business:

- If your suppliers are affected, you may run out of the products you sell, or the materials you need to make products.
- If your customers are personally affected their priorities may change and you could experience a reduced demand for your products or services.
- If your general location is affected, you and your customers may not be able to access your premises, or your utilities could be affected.

### Risk

The process of identifying risks, assessing risks and developing strategies to manage risks is known as **risk management**.

### Assessing your Business:

Before you begin identifying risks, you need to assess your business. Think about your critical business activities, including your key services, resources and staff, and things that could affect them, such as power failures, natural disaster and illness. Assessing your business will help you work out which aspects you couldn't operate without. You think about the following questions?

- When, where, why and how are risks likely to happen in your business?
- Are the risks internal or external?
- Who might be involved or affected if an incident happens?

### Brainstorm:

Brainstorming with different people, such as your accountant, financial adviser, staff, suppliers and other interested parties, will help you get many different perspectives on risks to your business.

### Consider the Worst Case Scenario:

Thinking about the worst things that could happen to your business can help you deal with smaller risks. The worst case scenario could be the result of several risks happening at once. For example, someone running a restaurant could lose power, which could then cause the food to spoil. If the restaurant owner was unaware of the power outage or the chef decided to serve the food anyway, customers could get food poisoning and the restaurant could be liable and suffer from financial losses and negative publicity.

## 4. Assessing Cost Including Break-Even Point

### Important

Break-even Point =  
 $\frac{\text{Fixed Costs}}{\text{Unit Selling Price} - \text{Variable Costs}}$

Your cost and profit margin is a key piece of information about the health of your business. You'll need it to create a good business plan, monitor your costs, adjust your prices, and as a measurement of how profitable your business is over time. There are two distinct nature of costs that a business has to incur in its normal operational activities:

### Fixed Cost:

These costs stay the same regardless of how many units the company is producing. These include start-up costs, and other capital expenses which do not have to be paid periodically. Rent, insurance, utility bills and repairs are also considered fixed costs. For Example if a company is paying 10000 Rupees rent for a building and decides to design 200 shirts with in a month. Then the monthly fixed cost will be 10000 rupees. The amount will stay the same if even there is no activity and zero shirts are produced.

### Variable Costs:

These costs are directly associated with the number of units produced, and these are recurring in nature, since they have to be paid periodically. As the business produces more and more goods and services, these costs increase proportional. For example, the cost of paint required to design a shirts is 200 rupees. If company designs zero shirt, the total variable cost comes down to 0 ( $10 \times 0$ ). On the other hand, if the company designs 500 shirts, the total variable cost comes down to 10000 ( $500 \times 20$ ). These costs usually include material, labor, direct sales and promotion, storage etc.

### Break-Even Point:

Break-even analysis is an important aspect of a good business plan, since it helps the business determine the cost structures, and the number of units that need to be sold in order to cover the cost or make a profit. Even after a business has been set-up, break-even analysis can be immensely helpful in the pricing and promotion process, along with cost control.



Once the business has reached this point, in sales or units sold, all costs (Fixed and Variable) have been recovered. Beyond this point, every additional unit sold will result in increasing profit for the business.

### **Behavioral Effect:**

The best way to upsell customers is to keep in touch with them. Here are a few ideas to incorporate into your business.

- Contact customers within 7-10 days of a sale
- Conduct an online survey about your customer service
- Invite customers to leave a review on your website, LinkedIn, Google+ local, or Yahoo local listings.
- Send an email newsletter at least monthly (weekly is best).
- Send birthday cards.
- Send holiday cards.
- Ask for feedback on Facebook and Twitter.

## **5. Business Ethics with Customers in Relationship**

In order to build and maintain trust with our customers we have to first develop a strong, company-wide reputation for integrity. We accomplish that through clearly established internal ethical principles. For example, all of our employees are required to take part in annual online training with ethics courses. They also participate in refresher courses throughout the year, covering various ethical practices and of course, all relevant laws.

### **Note**

A company that bases its policies and decisions on deeply rooted ethics will create a culture in which employees are naturally disposed to act ethically, too.

### **Human Resources:**

Ethical human resource policies are vital to creating and maintaining an ethical company culture. Employees who are treated with politeness are more likely to be content with their jobs. When employees feel exploited, they commit unethical behavior such as theft, as well as offenses such as using company resources for personal gain.

### **Product Integrity:**

A company that inspires ethical behavior in its employees will probably provide products and services created with ethical values in mind. For example, a food business that uses optimally fresh ingredients handled in a clean and compliant facility most likely won't have to be dishonest with customers who get sick from eating the company's food.

### **Competitive Integrity:**

It is true that a company's competitors are often seems as enemies, a truly ethical company extends its solid values to the way it treats its competitors as well as its stakeholders. Calling a competitor, pretending to be a customer and asking questions that you will use to create competing products is dishonest.

# Learning Unit 2: Develop Business Plan for the New Computer Business

## Overview

### Partnership

A partnership is an arrangement where parties, known as partners, agree to cooperate to advance their mutual interests.

In this learning unit you will learn to manage all important arrangements to start a new business including finance management, hiring staff, arranging Business policies and necessary arrangement of tools and equipment etc. After completion of this learning unit you will be able to design a proper Business plan keeping in mind all important aspects.

## 1. Studying Business Laws and Regulations

One of the first decisions is to determine the legal form of ownership of an enterprise / business / firm. Few possible options are:

### Do you know!

Partnership Act 1932 deals with the law of Partnerships and firms in Pakistan.

### Sole Proprietor:

A sole proprietorship, also known as the sole trader or simply a proprietorship, is a type of business entity that is owned and run by one person and in which there is no legal distinction between the owner and the business. The owner is in direct control of all elements and is legally accountable for the finances of such business which may include debts, loans, loss etc.

### Partnership:

The partners in a partnership may be individuals, businesses, interest-based organizations, schools and government.

### Limited Company:

In a limited company, the liability of members or subscribers of the company is limited to what they have invested or guaranteed to the company. Limited companies may be limited by shares or by guarantee. The former may be further divided into public companies and private companies. Who may become a member of a private limited company is restricted by law and by the company's rules. In contrast, anyone may buy shares in a public limited company.

Limited companies can be found in most countries, although the detailed rules governing them vary widely. In Pakistan companies may incorporate with Security and Exchange Commission of Pakistan (SECP).

**Incorporation of a Company with Security and Exchange Commission of Pakistan:**

Following are the requirements for registration of a new company under the Companies Ordinance, 1984:

**1. Availability of Name:**

The first step with regard to incorporation of a company is to seek the availability of the proposed name for the company from the registrar.

**2. The following documents are required to be filed with the registrar concerned for registration of a private limited company:-**

1. Copy of national identity card or passport, in case of foreigner, of each subscriber and witness to the memorandum and article of association.
2. Memorandum and articles of association Four printed copies of Memorandum and Articles of Association in case of offline submission and one copy for online submission, duly signed by each subscriber in the presence of one witness
3. Form - 1 Declaration of compliance with the pre-requisites for formation of the company.
4. Registration/filing fee a copy of the original paid Challan in the any branch of MCB Bank Limited or a Bank Draft / Pay Order drawn in favor of the Securities and Exchange Commission of Pakistan of the prescribed amount.
5. Authorization by sponsors The authorization of sponsors in favor of a person to make good the deficiencies, if any, in memorandum and articles of association as may be pointed out by the registrar concerned and to collect the certificate of incorporation.

**3. Additional Requirements for Incorporation Of a Company having objects of providing Security Services**  
In case of security object company nine additional sets of each of the documents at i and ii above along-with the bio-data, four attested photographs of each subscribers and financial position/bank statement of the subscribers (Aggregate wealth should not be less than 1.5 million) is required to be provided. Ministry of Interior grants NOC for a security object company.**4. Documents for incorporation of a Single Member Company**  
Any person may form a single member company and would file with the registrar at the time of incorporation a nomination in the form as set out in Form S1 indicating at least two individuals to act as nominee director and alternate nominee director, of the company in the event of his death. All the requirements for incorporation of a private limited company shall mutatis mutandis apply to a single member company.**5. If the membership of a single member company is transferred to a new member, the company shall, within fifteen days from such transfer, also file with the registrar, a nomination in the form as set out in Form S1.****6. Change in status of a single member company.****Remember**

For the **naming** purpose, an application is to be made and Rs.200/- for online application and Rs. 500/- for offline application is required to be paid for seeking availability certificate for each name.

**How to Get NTN:**

Taxpayer Registration can be obtained by any of the following two ways:

- Apply online at FBR Portal by visiting <https://e.fbr.gov.pk>
- Apply on paper at any of the Taxpayer Facilitation Centre.

Taxpayer registration is available for following three types of persons:

- a. Company.
- b. Association of Persons (AOP)

**Important**

**NTN** is the abbreviation of National Tax Number



c. Individual

For registration of all the above type of persons, there is a single form notified by FBR which can be downloaded.

## 2. Understanding Finance

### Equity Capital

Money that the owner puts into the business is called **equity capital**.

Equity Capital is the owner's investment in the business. Borrowing needed capital for the business is called credit or debt financing.

### Where can equity capital are obtained?

1. Personal savings
2. Friends and relatives
3. Partners. The owner may form a partnership with one or more individuals to obtain equity capital to initiate the business
4. Corporation. It is possible to incorporate the business (as a company or a corporation) and sell stock to raise equity capital

### Where can credit or debt financing be obtained?

1. Banks
2. Finance companies
3. Governments agencies (with loan schemes)
4. Trade credit. Suppliers extending credit terms for equipment, inventory, etc. allow the business to begin generating sales before payment is due
5. Microfinance institutions

### How will the capital be used?

In financing a new business, first determine your specific needs for money. To help determine your money needs, three groups of costs and expenses are examined: start-up costs, operating expenses and personal expenses.

**A. Start-up costs:** expenses that occur once only when starting the business. Once your business is started, you may never have these expenses again. Some examples of start-up costs include:

- Fixtures and equipment
- Initial inventory
- Deposits for rent and utilities
- Business licenses and permits
- Certain legal fees and
- Advertising for the grand opening.

**B. Operating expenses:** until there is enough profit to keep the business running, money will be needed for operating expenses. Examples of operating expenses include inventory, supplies, advertising, payroll, taxes, wages, repairs and depreciation of equipment, insurance, monthly rent and utilities.



- C. Personal expenses:** these include costs that are necessary for you to live. You need money for personal expenses such as rent or mortgage payments, food, transportation, insurance, clothing, utilities, medical bills and entertainment.

### Considerations in Applying for a Business Loan:

Different lending institutions have different procedures which have to be followed by the loan applicant. It is necessary to understand the following factors that are taken into consideration when a banker is appraising a loan application.

- Type of loan
- Purpose of the loan:
- Credit worthiness and integrity of the borrower.
- Capability:
- Repayment period:
- Security:
- Guarantors:
- Business plan:

## 3. Managing Resources for Business Advertisement

Most marketing experts recommend that businesses spend anywhere from 2 to 5 percent of their gross sales on advertising. But if you're still growing your business, you might not have the budget for large advertisement campaigns, or you might be focusing your capital on other areas. You too can take advantage of free ways to reach potential customers and advertise your business.

- Marketing Online
  1. Use Tweeter
  2. Create Facebook Page
  3. Create An account
  4. Create Blog
- Using Local Media
  1. Write Press Releases
  2. Contact Columnist
  3. Work for Charity
- Networking
  1. Build Partnership
  2. Join Community Organization
  3. Host seminars, workshops

## 4. Managing Business

### Market

The **market**, for a business is all the people within a specific geographical area, who need a specific product or service and are willing and able to buy it.

#### 1) Every business sells some type of product or service to people.

Potential customers can be described as:

1. People who need or want the product or service.
2. People who are able to buy the product or service.
3. People who are willing to buy the product or service.

Competition must be considered. If competitors are serving the same market, it must be decided if the market is large enough to support another business. It should also be determined how the product or service is unique and different from that of the competitors.

#### 2) What should entrepreneurs know about potential customers?

1. **Know the customers:** The market can be segmented either by dividing it into meaningful buyer groups or dividing it according to characteristics such as age, sex, marital and family status, employment, income and trends regarding any of these characteristics.
2. **Know what different customer groups want:** By segmenting the marketing into groups, it is easier for entrepreneurs to determine what products or services each group wants or needs.
3. **Know where the customer buys:** Entrepreneurs need to find out where the customers in their market are presently buying.
4. **Know when the customer buys:** By knowing when customers buy (daily, weekly, monthly, yearly, or seasonally).
5. **Know how the customer buys:** Knowing how the customer pays for products and services can help the entrepreneur to determine a credit policy as well as a pricing policy for the business.
6. **Customers with disabilities:** Businesses benefit when they give customers with disabilities an equal opportunity to obtain their goods and services. For example, easy access to buildings benefits people with disabilities, plus others with baby strollers, or doing deliveries, etc..

#### 3) Where can customer information be located?

Customer information can be obtained from trade associations (publications), Chambers of Commerce, government agencies (including local government), newspapers and magazines, the internet, and individual research by conducting a market survey in the community.

#### 4) What is the marketing concept?

Marketing is based on the fact that: (a) business policies and activities should be focused on satisfying customer needs, and (b) profitable sales volume is a primary goal.

When applying the marketing concept, a small business should:

1. Determine the needs of their customers (market research);
2. Analyse their competitive advantages (marketing strategy);
3. Select specific markets to serve (target marketing); and
4. Determine how to best satisfy those needs (marketing mix).

#### 5) What is market research?

A small market research program, based on a questionnaire given to present customers and / or prospective customers, can disclose problems and areas of dissatisfaction that can be easily remedied, or new products or services that could be offered successfully. For example, it is very useful to know what your competitors' strategies are (i.e. how they compete?).

#### 6) What is target marketing?

Owners of small businesses have limited resources to spend on marketing activities. Concentrating their marketing efforts on one or two key market segments is the basis for their target marketing. The major ways for a business to segment its market are:

1. **Geographical segmentation:**
2. **Customer segmentation:**

#### 7) How marketing performances can be evaluated?

The standards of performance need to be established so results can be evaluated against them. Sound data on industry norms and past performance provide a basis for comparing present performance. Owners should evaluate their business performance at least quarterly.

The key questions are:

1. Is the business doing all it can to be customer-oriented?
2. Do employees make sure customers' needs are satisfied?

## 5. Hiring and Waging Staff

Best organization always has the right man on right job and offer wages according to market.

#### Types of Staffing Services:

- **Temporary staffing:** Services supply client companies with workers on a short-term basis, either to fill in for absent employees or to supplement existing staff during particularly busy times.
- **Long-term staffing services:** also known as "**facilities staffing**," specialize in placing employees in long-term assignments, for indefinite periods of time. Project-related assignments, such as those found in the professional and technical sectors, often require long-term staffing.

- **A temp-to-perm staffing service**, offers clients a chance to try out a worker on a temporary basis and to hire that worker later if the client wishes to do so.

### **Staffing Service Sector:**

The staffing services industry is divided into the following sectors:

- Office and clerical.
- Industrial. Professional /Technical

### **Start-Up Cost:**

The staffing industry has higher startup costs than do many other industries--for a couple of reasons.

- A home office isn't usually a reasonable option.
- You'll have to meet payroll immediately, even though your business may have no income for a few months.

**Size:** Obviously, starting out with a small office and few permanent employees costs less than starting out with a larger facility and numerous permanent employees.

**Niche:** Some sectors of the industry are more expensive to operate in than are others. As a rule of thumb, the more highly skilled the job assignments your company handles, the higher your start-up costs will be. There are at least three reasons for this: 1) employee salaries will be higher, 2) the need for a certain image may require a more expensive location, and 3) computer demands (both hardware and software) for testing and training will be greater. The most expensive niche in which to start up appears to be the medical staffing industry.

**Geographical location:** Office rent, employee pay, advertising costs, tax rates and insurance rates all depend on both your area of the country and the city/town distinction.

### **Operations:**

#### **Do you know!**

PSQCA came into operation since 1st December 2000, working with 81 scientists/engineers and 254 supporting staff as self-finance organization

As a general rule, front office work is "people work" and that involves dealing with clients, employees and applicants, either in person, on the phone or at the computer. Your sales staff will usually be out of the office by about 9 a.m. to drum up clients for you, so this section is about the people work those in the office for instance (recruiters, employment counselors, coordinators, etc.) will be doing.

Most staffing services are open from 8 a.m. to 6 p.m., or some close approximation thereof. During that time, you should always have someone at the front desk, ready to greet those who walk in. The majority of people coming through your doors will be applicants, since clients rarely visit and most employees come in only occasionally (for example, to pick up a paycheck).

## 6. Quality Standard

### PSQCA:

The Pakistan Standards and Quality Control Authority, under the Ministry of Science and Technology, is the national standardization body. In performing its duties and functions, PSQCA is governed by the PSQCA Act, 1996. PSQCA has been given the task of not only formulation of Pakistan Standards but is also responsible for promulgation thereof.

PSQCA has also been established to advise the Government on standardization policies, programs and activities to promote industrial efficiency and development, as well as for consumer protection.

### CRCP

Consumer Rights Commission of Pakistan (CRCP) is a rights-based civil initiative registered under the Trust Act, 1882. Established in 1998

## 7. Customer Service Policy from Consumer Rights Commission of Pakistan

CRCP is an independent, non-profit, and non-governmental organization. It largely works through local fund-raising and engaging volunteers. It is not supported by any industry or commercial sector. It is the first national consumer organization in the country, which approaches the issue of consumer protection in comprehensive and holistic terms. Its vision and strategies have significant cross linkages with both market practices and issues of governance.

## 8. Search for Premises

### Specify your Premises Requirement

Drawing up a list of what you need from your premises is a good way to start your search. This list might include the following points:

- size and layout of the premises
- structure and appearance, both internally and externally
- any special structural requirements, such as high ceilings
- facilities and comfort for employees and visitors - including lighting, toilets and kitchen facilities
- utilities, such as power and drainage, water and any special requirements - for example, 3-phase electricity
- access and parking space - for deliveries or customers, including disabled customers

Your choice of premises will also depend on your budget. Whether you rent or buy, costs can include:

- initial purchase costs, including legal costs such as solicitor's fees and professional fees for surveyors
- initial alterations, fitting out and decoration
- any alterations required to meet building, health and safety and fire regulations
- ongoing rent, service and utility charges, including water, electricity and gas

- Business rates.
- continuing maintenance and repairs
- building and contents insurance

### Search For Premises

You can then circulate this specification to estate agents and surveyors that handle commercial properties in your area. Your local authority, Chamber of Commerce or trade association may also be able to help.

Many local authorities maintain a register of available commercial property. It's also worth investigating any grants, loans on preferential terms and incentive schemes set up to tempt small businesses into urban areas, such as grants from inner city renewal projects, or cheaper premises for small businesses in designated areas.

When starting out, you'll need to decide where you will conduct business. If you sell products, this might be deciding where to set up a shop. If you're a professional service provider.

### Fire and Security Protection:

Good electrical and gas safety could help protect premises against fire. Installing fire and burglar alarms also makes sense.

Include **contact details** for those you're likely to have to notify in an emergency such as the emergency services, insurers, municipal services, customers, suppliers, utility companies and neighboring businesses.

## 9. Employer Source of Support

To gear-up a business you must need the support of other people. Chamber of Commerce is a huge platform for this purpose.

### Chamber of Commerce:

Chambers of Commerce is essential to the economic growth of our communities; through making introductions, facilitating projects, maintaining data on the areas served and their economic climates and keeping abreast of pending development projects.

Through an online community members can:

1. **Network, with** fewer members able to attend events, a forum in which they can connect with others (virtually) on their schedule is of great value.
2. **Update your own information**, saving administrations and members' time as business profiles can be updated by members on their schedule.
3. **Promote your business**, an online community allows member businesses to offer each other deal through a secure environment.
4. **Educate yourself**; you are the keeper of important economic information for your area.

In addition you can arrange business parties with other to build relationship.

## 10. Custom Printed T-Shirts Business Plan

### EXECUTIVE SUMMARY

Printing T-shirt (Mind Expression) is an exciting new business that allows people to custom design a shirt (specifically the design on the front or back) any way that they would like.

- **Name of Business:**  
Mind Expression
- **Legal Form:**
- **Partnership**  
Mind Expression is formed on partnership. Partnership is registered as per Partnership Act among the four partners.

### BRIEF DESCRIPTION OF THE BUSINESS IDEA

- **Product:**  
Mind Expression will offer customers a variety of options for creating their own custom shirts. Initially all orders will be for t-shirts only, however in future other style shirts will be entertained.
- **Customer:**  
The first group is customers that desire an already created graphic image to be placed on their shirt.  
The second group are those that prefer custom artwork to be placed on their shirt.
- **Age: 10 – 40**
- **Occupation:**  
Students, Department or Business (Celebrating their special events, for their employees), Player
- **Events:**  
Local Public (celebrating events i.e Birthday, Independence Day, Valentine Day etc.)
- **Employability:**  
Mind expression will be source of employment as well by generating 08 positions. Out of which half will be occupied by the owners / partners and remaining 04 will be open for the market.

### START-UP CAPITAL

Investment	Rs. 0.325 Million
Working capital	Rs. 0.075 Million
<b>Total</b>	<b>Rs. 0.400 Million</b>
<b>(Rs. 0.100 Million / Partner)</b>	



### SOURCE OF CAPITAL:

Partners will manage the all source on their own (on loan) as per share mentioned in the partnership deed.

## START-UP EXPENSES

Item Description	Cost (Rs.)
Legal (Partnership Stamp Paper etc.)	2500
Stationery	5000
Brochures	5000
Computer equipment	50000
Rent	5000
Advance for Shop	15000
Office furniture	30000
Sublimation heat transfer unit	100000
Internet Connection	2500
White Wash	5000
Display Board	5000
Rack	5000
Printer	50000
Cash in Hand	50000
Advertisement	25000
Utility Expense (Installation Charges)	10000
Generator / UPS / Solar Panel	35000
<b>TOTAL</b>	<b>400000</b>

## STRATEGY AND IMPLEMENTATION SUMMARY:

Mind Expression will leverage their two competitive edges to quickly gain market share.



- **Marketing Campaign:**

The marketing campaign will emphasize the ability to completely customize a shirt. Other possible marketing tools are, Boucher, Cable TV, Gifts, Panaflex on Auto Rikshaw etc.

- **Competitive Edge:**

Mind Expression has two competitive edges (uniqueness) that they will use to their advantage to achieve market penetration.

- **Large catalogue of graphics –**
- **Quality of the sublimation –**

- **Market Segmentation**

We segmented their market into two distinct group's i-e **Graphics** and **Network**.

### MONTHLY EXPENSES

Item Description	Cost (Rs.)
Salaries (8000 *4 =32000)	32000
Rent	5000
Utilities	1500
Other	1500
Total	40000

# Learning Unit 3: Marketing the New Computer Business's Services to Customers

## Overview

Start-up **businesses** must be even more careful when it comes to **advertising**. The fact is that most **businesses** spend way too much money **advertising** to get new customers. In this learning unit you will learn how to grasp the new business with communicating the information clearly and passionately to potential customers and how you can advertise your business and can attract your customers by offering promotions and deals. After completion of this learning unit you will find the key points to nourish your business with good communication and behavioral skills and strategies for marketing of business.

## 1. Grasping Vision of New Business

Before starting new business you will see the existing business through the directories available in the market and will find business according to your mind; you will see the case studies of different companies and will decide your business according to availability resources. You will generate an idea what to do according to watching all the factors, Innovative, risk factor and all watching the competitors. Seven C's of Effective Business Communication are described as under:

### 1. Correctness

At the time of encoding, if the encoder has comprehensive knowledge about the decoder of message, it makes the communication an ease. The encoder should know the status, knowledge and educational background of the decoder. Correctness means:

- Use the right level of language
- Correct use of grammar, spelling and punctuation
- Accuracy in stating facts and figures

Correctness in message helps in building confidence.

### 2. Clarity

Clarity demands the use of simple language and easy sentence structure in composing the message. When there is clarity in presenting ideas, it's easy for the receiver/decoder to grasp the meaning being conveyed by the sender/encoder. Clarity makes comprehension easier.

### 3. Conciseness

A concise message saves time of both the sender and the receiver. Conciseness, in a business message, can be achieved by avoiding wordy expressions and repetition. Using brief and to the point sentences, including relevant material makes the message concise. Achieving conciseness does not mean to lose completeness of message. Conciseness saves time.

#### 4. Completeness

By completeness means the message must bear all the necessary information to bring the response you desire. The sender should answer all the questions and with facts and figures. And when desirable, go for extra details. Completeness brings the desired response.

#### 5. Consideration

Consideration demands to put oneself in the place of receiver while composing a message. It refers to the use of You attitude, emphasizes positive pleasant facts, visualizing reader's problems, desires, emotions and his response. Consideration means understanding of human nature.

#### 6. Concreteness

Being definite, vivid and specific rather than vague, obscure and general leads to concreteness of the message. Facts and figures being presented in the message should be specif. Concreteness reinforces confidence.

#### 7. Courtesy

In business, almost everything starts and ends in courtesy. Courtesy means not only thinking about receiver but also valuing his feelings. Much can be achieved by using polite words and gestures, being appreciative, thoughtful, tactful, and showing respect to the receiver. Courtesy builds goodwill.

## 2. Employing Methods of Marketing

**Advertising:** The key to advertising successfully is to generate promising leads in exchange for the money you spend. To do so, it helps to offer a message that not only hits on your target customers, but also showcases the value you can offer them.

- **Social Media**

Social media is about connecting with the people in your niche: customers, potential customers, people who are interested in what you do, or who share similar interests and circles or hubs with you. It's about building relationships and networking, not selling, although that does come as a result. Create an interactive, regularly update site or Blog, or by build informative yet informal profiles on social networking sites like Facebook or Twitter.

- **Offer Gifts, Discount Coupons etc.**

Offer your customers with a gift pack. Make sure your gift bag offering has your website address, business card and additional offers that inspire recipients to follow up or at least check you out. For instance, if you're giving away t-shirts, include a list of celebrities who also wear the shirt they're getting.

- **New Contents**

Content are any articles, information, video, info graphics or stuff people can read, watch or look at that tells them something they didn't know already about your product or service. If you can consistently amaze and thrill readers with new content and new information or entertainment about your product or services, you'll grow quickly!

### 3. Marketing Mix

McCarthy classified all these **marketing tools** under four broad categories:

- Product
- Price
- Place
- Promotion

These four elements are the **basic components of a marketing plan** and are collectively called **4 P's of marketing**. 4 P's pertain more to physical products than services. Below is an illustration for **marketing mix**.



The important thing to note is that all these **four P's (variable) are controllable**, subject to internal and external constraints of marketing environment. Marketers, using different blends of these variables, can target different group of customers having different needs. So, a **customer may call marketing mix “the offering”**.

#### Product

**Product is the actual offering** by the company to its targeted customers which also includes value added stuff. Product may be tangible (goods) or intangible (services). While formulating the marketing strategy, **product decisions** include:

- What to offer?
- Brand name

- Packaging
- Quality
- Appearance
- Functionality
- Accessories
- Installation
- After sale services
- Warranty

### **Price**

**Price includes the pricing strategy** of the company for its products. How much customer should pay for a product? Pricing strategy not only related to the profit margins but also helps in finding target customers. Pricing decision also influence the choice of marketing channels. **Price decisions** include:

- Pricing Strategy (Penetration, Skim, etc.)
- List Price
- payment period
- Discounts
- Financing
- Credit terms

Using price as a weapon for rivals is as old as mankind. But it's risky too. Consumers are often sensitive for price, discounts and additional offers. Another aspect of pricing is that expensive products are considered of good quality.

### **Place (Placement)**

It not only includes the place **where the product is placed**, all those activities performed by the company to ensure the availability of the product to the targeted customers. Availability of the product at the right place, at the right time and in the right quantity is crucial in placement decisions.

**Placement decisions** include:

- Placement
- Distribution channels
- Logistics

- Inventory
- Order processing
- Market coverage
- selection of channel members

### **Promotion**

**Promotion** includes all communication and selling activities to persuade future prospects to buy the product. Promotion decisions include:

- Advertising
- Media Types
- Message
- Budgets
- Sales promotion
- Personal selling
- Public relations
- Direct marketing

### **Limitation of Marketing Mix**

**Marketing mix (4 P's)** was more useful in early 19's when production concept was in and physical products were in larger proportion. Today, with latest marketing concept, marketing environment has become more integrated. So, in order to extend the usefulness of marketing mix, some authors introduced a fifth P and then **seven P's** (People, Packaging, and Process). But the foundation of **Marketing Mix** still stands on the basic 4P's.

### **Data Bank and Record:**

The company will have its own data bank of all the potential customers in PC and maintenance of record register.

# Learning Unit 4: Negotiate Agreements for the New Computer Business

## Overview

Negotiation is a method by which people settle differences. It is a process by which compromise or agreement is reached while avoiding argument and dispute. In this learning unit you will learn the strategies and skills used to negotiate with suppliers, staff and customers that how in a mannered way you can solve your issues with others through negotiation. After completion of this learning unit you will be able to know tactical points to resolve your problems related to suppliers, customers and staff through negotiation.

## 1. Businessman Negotiation

Major Actors with whom Businessman Negotiate:

1. Suppliers
2. Customers
3. Staff / Employees
4. Partners
5. Banker

### Negotiation

**Negotiation** is a dialogue between two or more people or parties intended to reach a mutually beneficial outcome, resolve points of difference, to gain advantage for an individual or collective or to craft outcomes to satisfy various interests.

### Important Negotiation Strategies with Suppliers, Staff and Customer

Here are few important strategies that may be used for negotiations in business with suppliers, staff and customers.

1. **The negotiating process is continual, not an individual event.** Good negotiating outcomes are a result of good relationships and relationships must be developed over time. Because of that, good negotiators are constantly looking for opportunities to enhance the relationship and strengthen their position.
2. **Think positive.** Many negotiators underestimate themselves because they don't perceive the power they have inside of themselves accurately. In most negotiating situations, you have more power than you think. You must believe that the other party needs what you bring to the table as much as you want the negotiation to be a success. Also, be sure that that positivity is visible during the negotiation. Be aware of the tone of your voice and non-verbal body language while interacting with the other party.
3. **Prepare.** Information is crucial for negotiation. Research the history, past problems or any sensitive points of the other party. The more knowledge you have about the situation of the other party, the better position you'll be in to negotiate. The most important part of preparation is Practice! The study of negotiation is like golf or karate. You have to practice to execute well.
4. **Think about the best & worst outcome** before the negotiations begin. Don't be upset if things don't go your way. In these instances, it's a good time to re-evaluate all positions and return to the table. In most cases, as long as you know the highest and lowest expectations of each party a middle ground can usually be reached in the overlapping areas.

**5. Be articulate & build value.** This is key, and it's what separates the good negotiators from the masters. When you have a strong belief in what you're negotiating for, you will shine. Become a master at presenting your thoughts and ideas so that others see the value.

A tip on how to do that well:

- Be direct when presenting a situation. Be clear about what is expected. Discuss ways to apply how it can happen.
- Don't simply talk about what needs to happen. Discuss the consequences – how your solution will be beneficial to the other party.

**6. Give & Take.** When a person gives something up or concedes on part of a negotiation, always make sure to get something in return. Otherwise, you're conditioning the other party to ask for more while reducing your position and value. Maintaining a balance will establish that both parties are equal.

## 2. Issues that can be considered for Negotiation with Suppliers

The following issues can be considered for negotiation with suppliers:

1. Quality
2. Timely Delivery
3. Freight Charges
4. Rate vs Quantity
5. Areas of Mutual Gain
6. Rate of other Suppliers
7. Reference Their Customers
8. Play the High / Low Quality Game

### Essential Negotiations Skills:

- Handle any type of negotiation situation with poise and confidence
- Focus on the relationship-centred aspects of a negotiation
- Recognize and flex with various negotiation styles and what each style
- Improve your ability to reach mutually satisfactory outcomes
- Increase your effectiveness by raising your aspiration level
- Defuse conflict that may arise during heated or drawn-out negotiations
- Understand whether a team-based or individual approach will be more effective



- Reduce deadlocks and adversarial situations
- Evaluate your level of success in past negotiations so as to improve your ability in future discussions
- Increase personal confidence that will spread to other aspects of your job.

### 3. Advantages of Negotiation Other than Profit

- Help in Good working relations with suppliers, customer and staff
- Building Trust with suppliers, customer and staff
- Partnership Approach
- Increasing cooperative environment
- Build loyalty
- Conflict resolution.

### 4. Importance of Emotions in Negotiations

Lot of factors influence the process of negotiation, our emotions being one of the major factors. Emotions can be a barrier to a value-maximizing agreement / business deals. Emotions can hinder the ability of negotiators to reach a wise agreement in a fair and amicable way. Our mood / emotion decide a lot many things.

1. If one is in a happy mood, everything seems perfect and good to him.
2. In a state of anger a mind is not in a position to think constructively.
3. Being positive always helps.
4. Individuals with a positive attitude tend to trust each other better. They take keen interest in the negotiation and actively participate in discussions.
5. Don't try to fool the other person. One should not fake things or manipulate the truth.
6. Avoid being partial. A deal is a deal whether it is with a friend or with a stranger.
7. Don't mix your personal interests with your professional life.

### WRITTEN CONTRACT / AGREEMENT

In common law or in legal systems, a **contract** (or informally known as an **agreement** in some jurisdiction) is an agreement having a lawful object entered into voluntarily by two or more parties, each of whom intends to create one or more legal obligations between them. The elements of a contract are "offer" and "acceptance" by "competent persons" having legal capacity who exchanges "consideration" to create "mutuality of obligation."

### **Key Parts of A Business Contract:**

There are several key parts or elements of a business contract.. The key parts of a business contract do not have to be any specific length. Simple, handwritten and even oral agreements can be enforceable.

#### **Parties**

The first section of a business contract includes the parties. One party is usually the business that is paying for a particular product or service. For example, a small company might be hiring a marketing consulting firm to help it market a new product line. An owner or manager typically includes her name in the payee spot. The other party is the Service Company or supplier. This independent representative or businessperson is the one who is expected to complete the work or provide the products.

#### **Agreement**

The agreement is legally called the consideration, according to "Entrepreneur" online. The agreement could be only a sentence or two in length. It includes a general statement of what the service or product provider is expected to do for the buyer.

#### **Terms**

More detailed information about the deal is included in the terms section of the business contract. This section spells out exactly what services or products are expected from the company doing the work. The terms section also includes the price, details of the payment, the length of the contract and when the services or products will be delivered.

#### **Signatures and Date**

The business contract must be signed by both parties. This indicates that the buyer accepts the payment conditions and the seller agrees to complete the specified work.

## Learner's Activity

<b>Description</b>	This learning activity consists of an interactive session in the class about marketing research like collecting data about any product and services.
<b>Time</b>	40 minutes.
<b>Purpose</b>	To highlight how to analyze marketing products and services.
<b>Instructions for Learner</b>	<ol style="list-style-type: none"><li>1. Ask learners how to do the market research.</li><li>2. Ask learners how to collect the data.</li><li>3. Ask learners are they able to do the SWOT analysis.</li><li>4. Ask learners how to give the recommendations.</li></ol>

## Summary of Module

- A business plan lays out a written plan from a marketing, financial and operational viewpoint. It's incredibly tough to find good business opportunities. The best tactic is to read examples and understand what to look for and where to go to find a successful opportunity.
- There are many different types of business risk. Risks can be internal and external to your business. They can also directly or indirectly affect your business's ability to operate. The types of risk you face are specific to your business and its objectives.
- A risk management plan is an essential part of any business as it helps you to understand potential risks to your business and identify ways to minimize them or recover from their impacts.
- Break-even analysis is an important aspect of a good business plan, since it helps the business determine the cost structures, and the number of units that need to be sold in order to cover the cost or make a profit.
- $$\text{Break-even Point} = \frac{\text{Fixed Costs}}{(\text{Unit Selling Price} - \text{Variable Costs})}$$
- In order to build and maintain trust with our customers we have to first develop a strong, company-wide reputation for integrity. We accomplish that, through clearly established internal ethical principles.
- A sole proprietorship, also known as the sole trader, is a type of business entity that is owned and run by one natural person and in which there is no legal distinction between the owner and the business.
- NTN is the abbreviation of National Tax Number.
- Equity Capital is the owner's investment in the business. Money that the owner puts into the business is called equity capital.
- A small market research program, based on a questionnaire given to present customers and / or prospective customers, can disclose problems and areas of dissatisfaction that can be easily remedied, or new products or services that could be offered successfully.
- The **Pakistan Standards and Quality Control Authority**, under the Ministry of Science and Technology, is the national standardization body. PSQCA came into operation since 1st December 2000, working with 81 scientists/engineers and 254 supporting staff as self-finance organization.
- CRCP is an independent, non-profit, and non-governmental organization. It largely works through local fund-raising and engaging volunteers.
- Chambers of Commerce is essential to the economic growth of our communities; through making introductions, facilitating projects, maintaining data on the areas served and their economic climates and keeping abreast of pending development projects.

- Seven C's of Effective Business Communication are:
  - Correctness
  - Clarity
  - Conciseness
  - Completeness
  - Consideration
  - Concreteness
  - Courtesy
  
- **Marketing Mix** is a combination of marketing tools that a company uses to satisfy their target customers and achieving organizational goals.
  
- Negotiation is a dialogue between two or more people or parties intended to reach a mutually beneficial outcome, resolve points of difference, to gain advantage for an individual or collective or to craft outcomes to satisfy various interests.

## Frequently Asked Questions (FAQS)

FAQ 1: Define Business Plan?

Answer A written document that describes in detail how a new business is going to achieve its goal is called Business Plan.

FAQ 2: Identify Risks related to management of Business.

Answer

- Regulatory and government policy changes
- Property and equipment
- Economic and financial
- Market

FAQ 3: What is Break-Even point?

Answer In economics & business, specifically cost accounting, the break-even point (BEP) is the point at which cost or expenses and revenue are equal: there is no net loss or gain

FAQ 4: What is partnership?

Answer A partnership is an arrangement where parties, known as partner, agree to cooperate to advance their mutual interests.

FAQ 5: What is NTN?

Answer NTN is the abbreviation of National Tax Number.

FAQ 6: Where can credit or debt financing be obtained?

Answer

- Banks
- Finance companies
- Governments agencies
- Trade credit.
- Microfinance institutions

FAQ 7: What is Market?

Answer The market, for a business is all the people within a specific geographical area, who need a specific product or service and are willing and able to buy it.

FAQ 8: What is target Marketing?

Answer Owners of small businesses have limited resources to spend on marketing activities. Concentrating their marketing efforts on one or two key market segments is the basis for their target marketing.

FAQ 9: What is CRCP?

Answer CRCP is an independent, non-profit, and non-governmental organization. It largely works through local fund-raising and engaging volunteers. It is not supported by any industry or commercial sector.

FAQ 10: What are the four basic components of Marketing Plan?

Answer

- Product
- Price
- Place
- Promotion

## Test yourself!

Please mark the correct one from the given options. You can check your answer with the Answer Key at the end of this module.

- 1. A \_\_\_\_\_ lays out a written plan from a marketing, financial and operational viewpoint.**

a. Business Plan	b. Money Management
c. Marketing Strategy	d. Market
  
- 2. The Australian standard defines \_\_\_\_\_ as 'the chance of something happening that will have an impact on objectives'.**

a. Market	b. Partnership
c. Risk	d. None of Above
  
- 3. Expenses that occur once only when starting the business is known as**

a. Personal expense	b. Start-Up Cost
c. Equity Capital	d. None of Above
  
- 4. A \_\_\_\_\_ is an arrangement where parties, known as partners, agree to cooperate to advance their mutual interests.**

a. Agreement	b. Mix Marketing
c. Partnership	d. None of above
  
- 5. A process by which compromise or agreement is reached while avoiding argument and dispute is called.**

a. Marketing	b. Negotiation
c. sole proprietorship	d. None of Above



**6. \_\_\_\_\_ is a combination of marketing tools that a company uses to satisfy their target customers and achieving organizational goals**

- |   |                  |   |               |
|---|------------------|---|---------------|
| a | Marketing Mix    | b | Target Market |
| c | Break-Even Point | d | None of these |

**7. A local association to promote and protect the interests of the business community in a particular place is known as.**

- |   |               |   |                     |
|---|---------------|---|---------------------|
| a | Target Market | b | NTN                 |
| c | A and b       | d | Chamber of Commerce |

**8. \_\_\_\_\_ is the best cheaper way to advertise your business**

- |   |            |   |              |
|---|------------|---|--------------|
| a | Internet   | b | Newspaper    |
| c | Television | d | All of Above |

**9. Break-even Point =**

- |   |  |   |  |
|---|--|---|--|
| a | $\text{Fixed Costs} / (\text{Unit Selling Price} + \text{Variable Costs})$ | b | $\text{Fixed Costs} * (\text{Unit Selling Price} - \text{Variable Costs})$ |
| c | $\text{Fixed Costs} / (\text{Unit Selling Price} - \text{Variable Costs})$ | d | None of Above  |

## Answer Key

MCQ Number	Correct Answer
1	a
2	c
3	b
4	c
5	b
6	a
7	d
8	a
9	c

