# Intro to Computing - Unit 2

## Looking at computers: Understanding the Parts

#### Your Computer's Hardware

In this unit, we will look at your computer's **hardware**— the physical components of the computer.

- A computer does 4 main things: inputs data, process the data into information, outputs this information, and stores this information.
- The **system unit** is the box that contains the central electronic components RAM, CPU, hard drive, power unit, etc.
- Peripheral devices—monitors, printers, keyboards, speakers, etc. Basically anything attached to the system unit.

#### **Understanding your Computer**

A computer is a data processing device that performs the four major functions listed above.

Computers work only with numbers, not words. So they have their own language to transfer the data into information. This language is called the binary language.

This binary language consists of only 0's and 1's - binary digits... or **bits**. <a href="http://homepage.ntlworld.com/interactive/">http://homepage.ntlworld.com/interactive/</a>

Now, to represent a letter of the alphabet, a number, a character, the computer has to put 8 bits together. These 8 bits are referred to as a **byte**. <a href="http://grownupgeek.com/what-are-bits-and-bytes">http://grownupgeek.com/what-are-bits-and-bytes</a>

For example, the letter 'k' is represented as 01001011.

Ok, so word processing docs, pictures from digital camera, downloaded music are represented by the computer as a series of bit and bytes.

What are some of the terms used to represent data storage? For example, **bit**, **byte**, **kilobyte**, **megabyte**, **etc**.

Why do you need to know about this terminology?

Moving on... your computer uses a combination of software (written instructions) and

hardware (the physical parts that you can touch) to process data into information.

Let's break down the hardware into 4 groups: input devices, output devices, processing components, and storage.

The easiest way to see examples of input and output devices is to do a Google Images search for input and output devices.

**Input Devices** 

**Output Devices** 

### **System Unit**

Inside the system unit, you will find the following: motherboard, CPU, RAM, hard disk drive, expansion slots, and power supply. Read about the system unit on pages 56-63.

http://home.olemiss.edu/~misbook/hm2.htm

Hard Disk Drive –

Ports –

Expansion Cards and Slots –

Motherboard –

CPU –

RAM –