Parts of CPU (System Unit)

System unit

It is where all your computer peripherals are attached such as mouse, keyboard, monitor, speakers and etc. It is composed of 6 basic components of system unit, namely; motherboard, processor, ram, hard drive, video card and power supply. It is often called as CPU but it is not, the CPU (central processing unit) is the processor itself.

Motherboard

A motherboard (sometimes alternatively known as the mainboard, system board, baseboard, planar board or logic board,[1] or colloquially, a mobo) is the main printed circuit board (PCB) found in general purpose microcomputers and other expandable systems. It holds and allows communication between many of the crucial electronic components of a system, such as the central processing unit (CPU) and memory, and provides connectors for other peripherals. Unlike a backplane, a motherboard usually contains significant sub-systems such as the central processor, the chipset's input/output and memory controllers, interface connectors, and other components integrated for general purpose use.

Processor

A central processing unit (CPU) is the electronic circuitry within a computer that carries out the instructions of a computer program by performing the basic arithmetic, logical, control and input/output (I/O) operations specified by the instructions. The computer industry has used the term "central processing unit" at least since the early 1960s.[1] Traditionally, the term "CPU" refers to a processor, more specifically to its processing unit and control unit (CU), distinguishing these core elements of a computer from external components such as main memory and I/O circuitry.[2]

The form, design, and implementation of CPUs have changed over the course of their history, but their fundamental operation remains almost unchanged. Principal components of a CPU include the arithmetic logic unit (ALU) that performs arithmetic and logic operations, processor registers that supply operands to the ALU and store the results of ALU operations, and a control unit that orchestrates the fetching (from memory) and execution of instructions by directing the coordinated operations of the ALU, registers and other components.

Memory

The computer memory is a temporary storage area. It holds the data and instructions that the Central Processing Unit (CPU) needs. Before a program can be run, the program is loaded from some storage medium into the memory. This allows the CPU direct access to the program. Memory is needed in all computers.

A computer is usually an electrical device, which understands only electricity on and electricity off. This is expressed by using two symbols – 0 and 1 – which are called binary digits or bits. Numbers and text characters are represented as

codes, which are made up of combinations of 0s and 1s. Simple character codes are called ASCII (the American Standard Code for Information Interchange), and Unicode. In ASCII, eight bits – any combination of 0s and 1s – form one character or symbol. For example, the letter A is denoted by the code 01000001. The basic working unit of the computer's memory is a group of eight bits, which is called a byte.

Hard Disk Drive

A hard disk drive (HDD), hard disk, hard drive or fixed disk is a data storage device that uses magnetic storage to store and retrieve digital information using one or more rigid rapidly rotating disks (platters) coated with magnetic material. The platters are paired with magnetic heads, usually arranged on a moving actuator arm, which read and write data to the platter surfaces. Data is accessed in a random-access manner, meaning that individual blocks of data can be stored or retrieved in any order and not only sequentially. HDDs are a type of non-volatile storage, retaining stored data even when powered off.

Video Card

A video card (also called a display card, graphics card, display adapter or graphics adapter) is an expansion card which generates a feed of output images to a display (such as a computer monitor). Frequently, these are advertised as discrete or dedicated graphics cards, emphasizing the distinction between these and integrated graphics. At the core of both is the graphics processing unit (GPU), which is often erroneously used to refer to the video card as a whole.

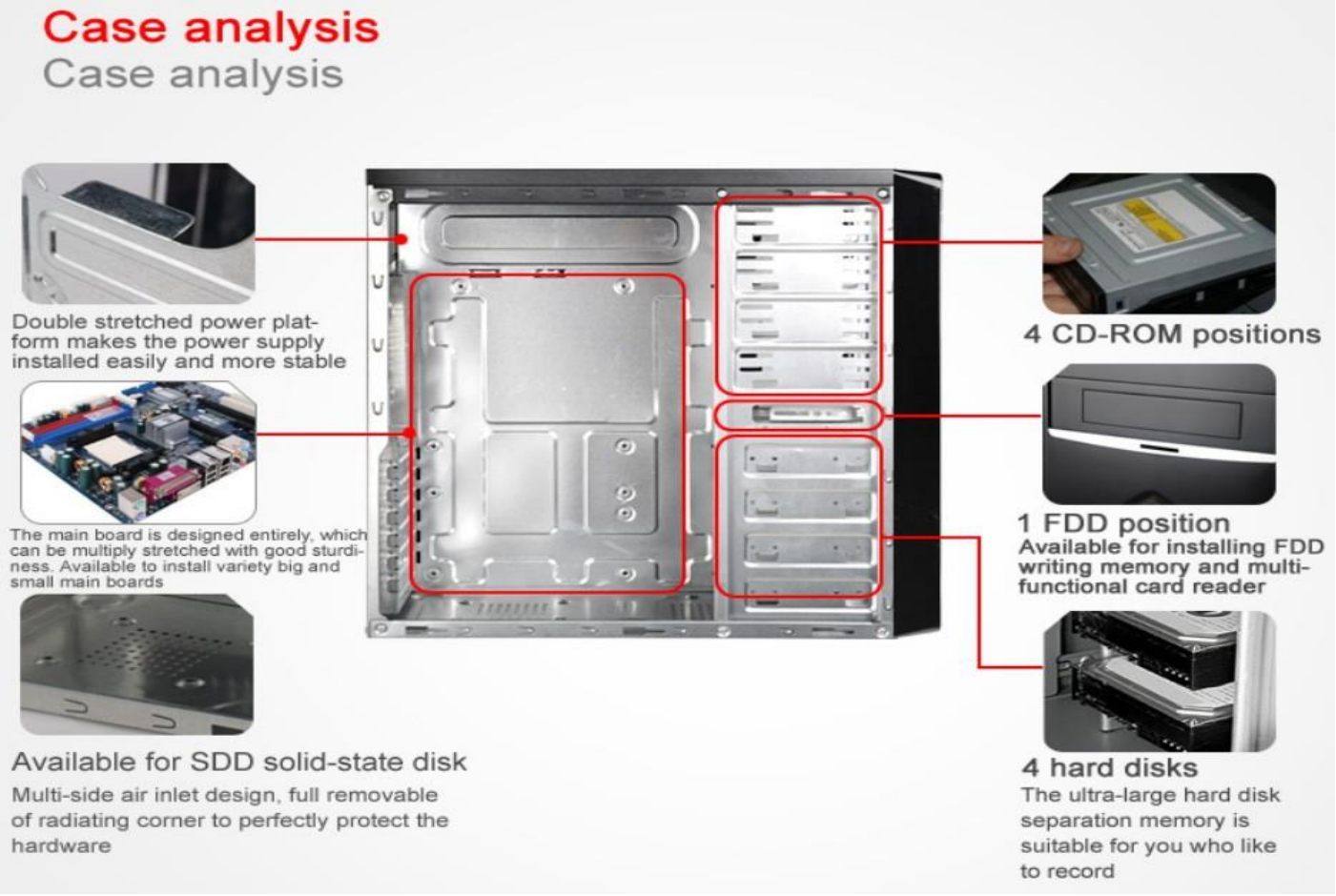
Power Supply

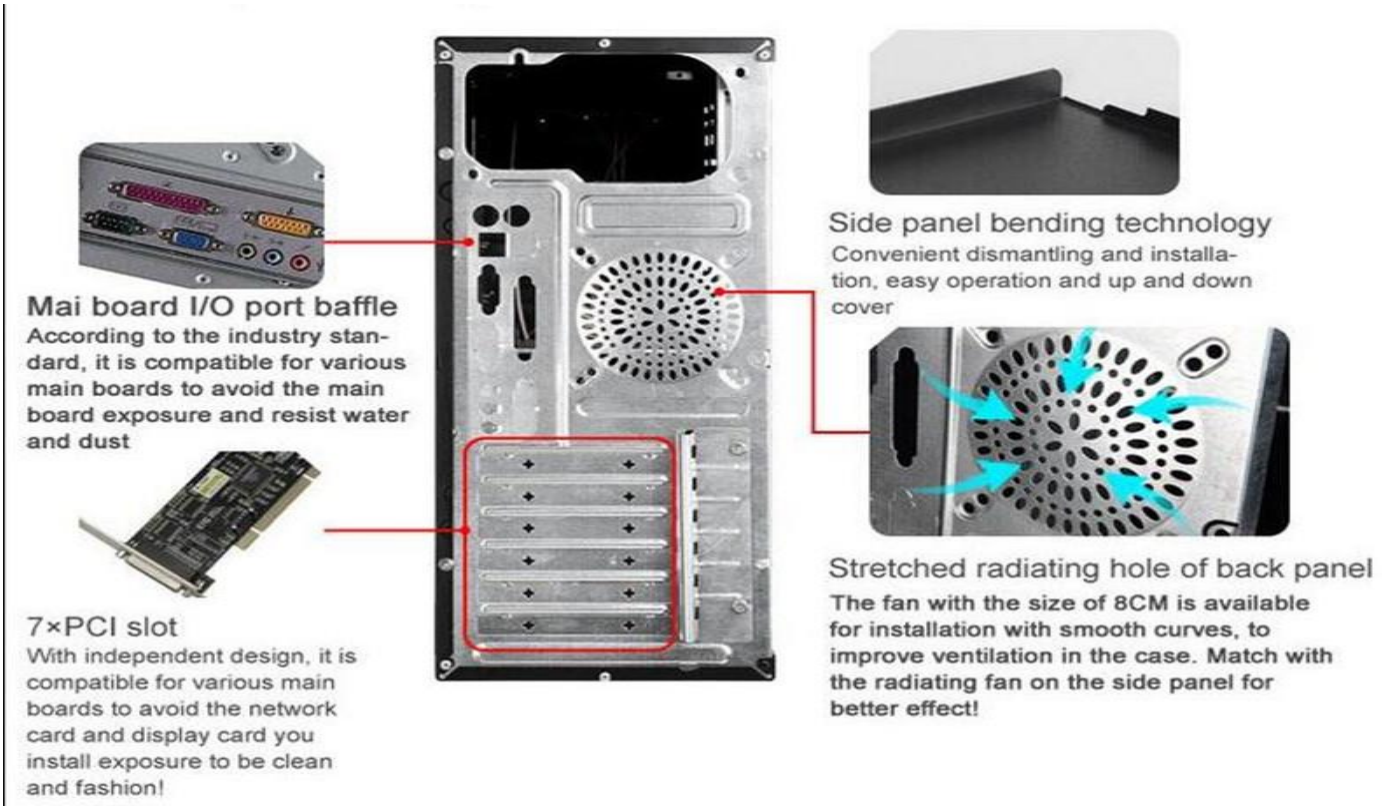
A power supply is an electrical device that supplies electric power to an electrical load. The primary function of a power supply is to convert electric current from a source to the correct voltage, current, and frequency to power the load. As a result, power supplies are sometimes referred to as electric power converters. Some power supplies are separate standalone pieces of equipment, while others are built into the load appliances that they power. Examples of the latter include power supplies found in desktop computers and consumer electronics devices. Other functions that power supplies may perform include limiting the current drawn by the load to safe levels, shutting off the current in the event of an electrical fault, power conditioning to prevent electronic noise or voltage surges on the input from reaching the load, power-factor correction, and storing energy so it can continue to power the load in the event of a temporary interruption in the source power (uninterruptible power supply).

CPU Fan

A computer fan is any fan inside, or attached to, a computer case used for active cooling, and may refer to fans that draw cooler air into the case from the outside, expel warm air from inside, or move air across a heat sink to cool a particular component. Generally these are found in axial and sometimes centrifugal forms. The former is sometimes called a "electric" fan, after the Rotron Vertical line, while the latter may be called a "biscuit blower" in some product literature.

CPU Casing


Case analysis
Case analysis
Double stretched power platform makes the power supply installed easily and more stable
The main board is designed entirely, which can be multiply stretched with good sturdiness. Available to install variety big and small main boards
Available for SDD solid-state disk
Multi-side air inlet design, full removable of radiating corner to perfectly protect the hardware
4 CD-ROM positions
1 FDD position
Available for installing FDD writing memory and multi-functional card reader
4 hard disks
The ultra-large hard disk separation memory is suitable for you who like to record


Mai board I/O port baffle
According to the industry standard, it is compatible for various main boards to avoid the main board exposure and resist water and dust
7×PCI slot
With independent design, it is compatible for various main boards to avoid the network card and display card you install exposure to be clean and fashion!
Side panel bending technology
Convenient dismantling and installation, easy operation and up and down cover
Stretched radiating hole of back panel
The fan with the size of 8CM is available for installation with smooth curves, to improve ventilation in the case. Match with the radiating fan on the side panel for better effect!

Computer System

A computer system is a basic, complete and functional computer, including all the hardware and software required to make it functional for any user.It should have the ability to receive user input, process data and with the processed data, create information for future storage and/or output.

A computer system allows users to input, manipulate and store data. Computer systems typically include a computer, monitor, keyboard, mouse and other optional components. All of these components also can be integrated into all-in-one units, such as laptop computers. During the data processing stage, instruction sets, known as programs, are provided to let the system know what to do with the entered system data. Without these programs, the computer would not know how to process data that enters the system, and the data might be discarded. Known as a stored program computer, this type of computer is the most common in use today. It is very flexible, as it can process any task by loading a program from storage. Computer systems can work by themselves or access other devices that are external or connected with other computer systems.

Sample of I/O Devices

Input
(Mouse, Keyboard, Scanner)

Output
(Monitor, Printer, Speakers)