How a Computer Works

(Second Edition)

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Age range 11+

How a Computer Works (Second Edition) is an updated version of the original book.
Learn more about how a computer works.
How a Computer Works is a full color illustrated guide and reference tool. Packed with stunning graphics this guide brings the inside of a Windows PC to life.
A fascinating and absorbing overview of what's happening inside a computer.
Useful to students or those wishing to learn the mysterious operation of How a Computer Works.
The book delves into the operation of the key components of a personal computer.
The computers key processes are described in short form.
Includes clear diagrams of the main computer parts.
The heart of any computer is the CPU, the book explains with clear graphics the internal operation of an Intel processor.
Includes comprehensive guides to the main components of your computer.
Explains the technologies that make up a computer.
Explains where all the connections on the back go to.

Includes 19 chapters that explain the mystery of these technologies:-

System components,Power On Self Test, BIOS and Drivers.
Plug and Play,Interrupts,CPU,Drives,Motherboard,PCI Bus.
Expansion Cards,Graphics,Ports,Memory,Cooling,Power.
Monitor,Keyboard,Mouse.

If you are going to take apart a computer too look inside.
DISCONNECT THE SYSTEM FROM THE MAINS ELECTRICITY FIRST!

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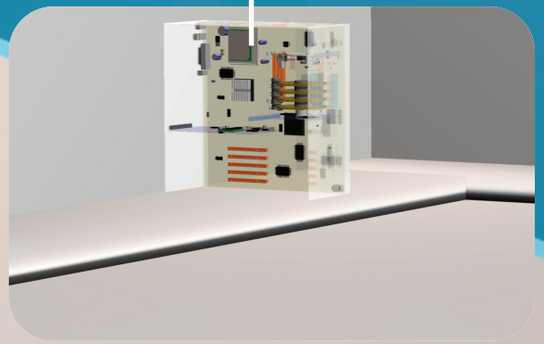
Chapter 1

Introduction.

Computer Tower



Computer System

Personal Computer

The P.C (Personal Computer) allows many tasks to be undertaken, which would otherwise not be possible.
From typing a letter, to surfing the net, the computers versatility has meant many homes and workplaces rely on the computer for everyday tasks.

This book delves into the mysterious world of how the computer actually works, inside those boxes.

Computer Hardware

Although understanding the precise operation of computer hardware requires detailed technical knowledge, understanding the basics of how a computer works does not.

Computer System
The computer system comprises of several boxes.
The main computer is housed in a tower.

Motherboard
Inside the tower is the motherboard and drives.
The drives connect to the motherboard through special ribbon cable.
The cable contains many separate wires moulded into a flat wide cable.

Monitor
The monitor is housed in a separate box, this plugs into the main system tower.

CRT
Today's slim line monitors are a far cry from the old large cumbersome, cathode ray tube (CRT) monitors.