

Key Points Summary

Grade 5

Introduction

The computer is an electronic device capable of solving problems by accepting data (Input), performing operations on the data (Process), and giving a result (Output).

Input

Input is the raw data given to the computer using input devices like the keyboard, mouse and scanner.

Process

The raw data is manipulated to generate information.

Output

The information generated is known as output.

The Input-Process-Output (IPO) cycle

The three terms 'input', 'process' and 'output' are interrelated.

Computer Networks

The word 'network' may be defined as a collection of computers connected together for the purpose of sharing information and resources. For example, sharing one printer among ten computers through a network is an example of resource sharing. These interconnected computers may be within a local area or may cross different cities or countries.

Advantages of networking

Computer networking is needed for the following reasons.

1. **Limited resources:** Instead of connecting a printer to all the computers separately, you can connect it to the main network. In this way, every computer can share the printer.
2. **Sharing information:** Information is centralised and can be made available to all the computers connected to a network.
3. **Lower costs:** It reduces cost, as an input device like a scanner and an output device like a printer can be easily shared.

Components of a computer network

The different parts of a computer network are shown on a diagram on the next page.

1. Workstations: The individual computers connected to a network to share data and information are called workstations or terminals.

2. Server: The main computer

that controls the functioning of the entire network is called the server. It can be compared to a manager of a company who manages all the work and communicates with the executives.

3. Communication channels:

These are used to connect the computers in the network to allow the computers to communicate with each other. These channels can be cables, fiber optics, radio waves or satellites.

4. Modem: This stands for modulator demodulator. A modem is an

electronic device which allows one computer to send information to another through standard telephone wires and over long distances.

6. Bluetooth: A system for connecting electronic devices, such as mobile phones and computers, to each other and to the internet using radio signals. To use this technology, a Bluetooth device is used. For example, Bluetooth mobile phone headsets.