

# BCA SEM-I 2023-2024

# COMPUTER FUNDAMENTALS AND ORGANIZATIONS – UNIT 2 - COMPUTER ORGANIZATION

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#### **CONSIST OF 3 MAJOR COMPONENTS**

- 1. Central Processing Unit (CPU)
  - 2. Main Memory / Memory
- 3. Input/Output (I/O) Components



#### 1. CENTRAL PROCESSING UNIT

Consists of two major components or two basic blocks.

### a. Control Unit

Contains set of registers and set of circuits which generates control signals so that the instructions to be generated by the CPU should be interpreted and corresponding functionality should be delivered.

# b. Arithmetic Logic Unit (ALU)

Performs Arithmetic or Logical operations within a CPU.

Ex. of Arithmetic operations:

Addition, Subtraction, etc.

Ex. Of Logical Operations:

Using AND, OR and NOT gates



#### 2. MAIN MEMORY / MEMORY

Instructions
and
Data
is stored temporarily.

These instructions and data are stored in locations.

Locations have a sequenced address.



## 3. Input/Output (I/O) Components

Consists of Input Module and Output Module.

# a. Input Module

Collection of subcomponents which takes data or instruction from users and converts into signals which system can understand interpret.

## b. Output Module

Responsible for giving output result.



#### **REFERENCES**

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