# **Question Bank**

**Class-: SYCSE** 

**Subject:** Computer Organization

Revised Syllabus- 2017-18 P-II

#### **Unit-1 Introduction**

### **2 Marks Questions**

- 1. Write the twos complement of -3 and -6.
- 2. What is the use of Booth's algorithm?
- 3. Write the 1's complement and 2's complement respectively of the following nos: 9,6,-42,-27
- 4. Draw the flow chart of Booth's algorithm.
- 5. What is Computer Organization?
- 6. What is Computer Architecture?
- 7. Minuend is 2 & subtrahend is -3. Perform the 2's complement subtraction.
- 8. What is A, M, Q and Q0 in Booth's algorithm?.

### 7/8 Marks Questions

- 1. Write short note on Booth's algorithm.
- 2. Multiply 7 with 5 with the help of Booth's algorithm.

#### **Unit-2 Processor**

## 2 Marks Questions

- 1. Draw the diagram of CPU with internal bus.
- 2. Draw the diagram of processor organization.
- 3. What is instruction cycle, machine cycle and T-state?.
- 4. Draw the architecture of Pentium IV processor.

#### 7 Marks Questions

- 1. Draw the diagram of processor organization and explain it in detail.
- 2. Draw the diagram of processor organization. Explain the processor's operation in detail.

### **Unit-3 Control Unit Design**

### 2 Marks Questions

- 1. Write the long form of RISC and CISC.
- 2. Write any 2 differences between RISC and CISC
- 3. Write any 2 diferrences between Hardwired Control Unit and Microprogrammed Control Unit.

### 7 Marks Questions

- 1. Explain microprogrammed control unit in detail.
- 2. Explain Hardwired control unit in detail.
- 3. Differentiate between RISC and CISC.

## **Unit-4 Memory Organization**

## 2 Marks Questions

1. Enlist different mapping techniques of cache memory.

- 2. Enlist different replacement algorithms of cache memory.
- 3. Draw memory hierarchy.
- 4. What are the different levels of cache memory.
- 5. What is cache hit and cache miss?
- 6. What is the principle of Locality of Reference (cache memory)?

### 7 Marks Questions

- 1 Write short note on Cache memory.
- 2. Write short note on virtual memory.
- 3. Explain Cache memory mapping with main memory.

## **Unit-5 Pipelining**

### **2 Marks Questions**

- 1. What are the different pipelining hazards?
- 2. What is stalling?
- 3. Define pipelining.

#### 7 Marks Questions

- 1. What is pipelining? Explain all the hazards of pipelining.
- 2. What is pipelining? What are the different advantages and disadvantages of pipelining?

### **Unit-6 Advanced Processors**

### **2 Marks Questions**

- 1. Write any 2 features of Intel Core 2 Duo.
- 2. Write any 2 features of Dual Core.

3. List diffrenet Processors.

# 7 Marks Questions

1. Compare intel Core 2 Duo, Dual Core & Core i3 processors.