COA unit-1

1. Define the terms computer organization, computer design, and computer architecture?
2. Draw the block diagram of digital computer and explain about each of its components?
3. Explain about bus and memory transfer with neat diagram?
4. Discuss about various types of computer instructions?
5. Explain about various types of micro-operations?
6. Discuss about Register Transfer language, Register Transfer?
7. Explain about Arithmetic logic shift unit?
8. Explain in detail about timing and control? 9.Draw the flowchart of instruction cycle and explain about it?
10.Explain about Various Memory Reference Instructions?
11. Discuss about the Input – Output and
Interrupt?

COA unit-2 important questions
1. Differentiate between hardwired control and microprogrammed control?
2. Discuss about micro program example?
3. Discuss about various instruction formats?
4. Explain about various addressing modes?
5. Explain about data transfer and manipulation instructions?
6. Discuss about program control instructions?
7. Differentiate between Control memory and main memory?
8. Explain about Address sequencing?
9. Explain in detail about design
of control unit?
10. Explain about General Register Organization?

OA unit-3
1. Discuss about data types of digital computer?
2. Explain about R's, (R-1)complements with examples?
3. Explain about fixed point representation?
4. Explain about floating point representation?
5. Explain about addition and subtraction algorithm?
6. Discuss about booths algorithm with an example?
7. Explain about various number systems?
8. Convert the following .
    A) 41.6875 into binary number
    B) 110 .110 into decimal number
    C) F4 into decimal
9. How many ways are in order to represent signed binary numbers?
10. Explain about multiplication Algorithms for fixed point numbers?
11.Explain about the Division Algorithm?
12. Discuss about various Floating – point Arithmetic operations?
13. Discuss about Decimal Arithmetic unit?
14. Write about various Decimal Arithmetic operations?

Forms

COA unit-4 important questions.
1. Write about input-output interface?
2. Discuss about asynchronous data transfer modes?
3. Explain about priority interrupt, DMA?
4. Discuss about memory hierarchy?
5. Explain about associate memory and cache memory?
6. Explain about the programmed I/O and Interrupt initiated I/O?
7. Differentiate between Main Memory and Auxiliary memory?

COA unit-5 important questions.
1. Differentiate between CISC and RISC?
2. Explain about various pipeline conflicts?
3. Discuss about Array processor?
4. Write about the characteristics of multiprocessors?
5. Explain interconnection structures?
6. Discuss about Interprocessor arbitration?
7. Explain about interprocessor communication and synchronization?
8. Discuss about cache coherence problem? And it's solutions?
9. Discuss about Parallel Processing?
10. Explain about Arithmetic Pipeline?
11. Explain about Instruction
Pipeline? RISC Pipeline?
12. Discuss about Vector Processing?