

Two marks

1. What are the main features of booth's algorithm?
2. Give the IEEE standard double precision floating point format
3. What are the major characteristics of a pipeline?
4. Explain the role of cache memory in pipeline?
5. Define Data hazard and list the types of data hazard.
6. What is control store?
7. What are the two key aspects of machine instructions influence instruction sets?
8. How do you solve Instruction hazards?
9. Give the IEEE standard floating point format of single precision and double precision numbers?
10. Explain multiply and divide rule?
11. Infer the meaning of pipeline bubble.
12. Discuss the problems faced in instruction pipeline.
13. What is meant by Overflow?
14. Rephrase the sequence of steps involved in execution of Add (R3), R1.
15. Define pipelining
16. What do you mean by Bit-pair encoding?
17. What is control hazard? give example.
18. Write the advantages and disadvantages of floating point.
19. How can we speed up the multiplication process?
20. Write the Add/subtract rule for floating point numbers.

Part B

1. What is bit pair re-coding algorithm? Explain with example in detail.
2. Explain in detail about the floating point addition operation with suitable diagram.
3. Explain the multiplication algorithm for negative number with suitable example.
4. Discuss in detail about integer division of non-restoring method in detail with example
5. How do you apply the hardwired control method for generating the control signals.
6. Analyze the basic organization of a Micro programmed control unit and the generation of control signals using micro program.
7. Define pipeline and explain the different types of pipeline hazards with suitable examples
8. What is data hazard? How do you overcome it?
9. Identify the hazards of conditional branches in pipelines? How do you resolve it.
10. Classify the categories of hazard and infer how each category of hazard is solved with suitable diagram.
11. Examine about data path and control consideration in detail.