BE Semester- IV (ATKT IT) Question Bank
Microprocessor Architecture & Programming
All questions carry equal marks (10 marks)

Q.1	Draw and explain 8085 microprocessor architecture.
Q.2	Explain Microprocessor System with Bus organization.
Q.3	Explain Memory and Input / Output operations of 8085 microprocessor.
Q.4	Draw and explain 8085 pin diagram in detail.
Q.5	Write a short note on Address, Data and Control Bus.
Q.6	Explain the classification of instructions set in brief.
Q.7	Explain 80286 architecture with diagram.
Q.8	Explain architecture of 80386 with diagram.
Q.9	Explain architecture of 80486 with diagram.
Q.10	Explain Multiplexing and Demultiplexing of Buses.
Q.11	Explain Instruction with an example : PUSH, POP
Q.12	Draw and explain 8086 architecture with segmentation.
Q.13	Write down the steps for Debugging of a Program.
Q.14	Write a programme to add two 8 bit numbers.
Q.15	Write a programme to subtract two 8 bit numbers.
Q.16	Write a programme to add two 16 bit numbers.
Q.17	Write a programme to subtract two 16 bit numbers.
Q.18	Write a programme to add 5 numbers of an array.
Q.19	Write down the concept of RISC System.
Q.20	Differentiate RISC vs. CISC.
Q.21	Explain Instruction with an example: ADD, ADC, SUB, INC
Q.22	What is an addressing mode? List and explain addressing modes supported by the 8086.
Q.23	Write down short note on: Features of Pentium Processor.
Q.24	Explain protected modes operation in 80286 including memory segmentation.
Q.25	Explain protected modes operation in 80386 including memory segmentation.
Q.26	Explain Operating modes in 80286/386.
Q.27	What is descriptor? Describe descriptor table in detail.
Q.28	What is a selector? Give its different fields and explain its role.
Q.29	Explain stack and subroutine.
Q.30	Explain in brief Paging mechanism with page tables and directories
Q.31	What is multitasking? Clear the concept of timesharing with proper illustration.
Q.32	What is BIU? Discuss the functions of the BIU.
Q.33	What is EU? Discuss the functions of the EU.
Q.34	What is a segment? Explain the segmentation in 8086 and list the

	advantages of having segmentation.
Q.35	What are the looping instructions? Explain them with their meaning.
Q.36	What is paging? What is the role of the control registers in the paging system?
Q.37	Draw and explain the task state segment.
Q.38	List the major features of the 80286 and 80386 processor.
Q.39	Compare the 8086, 80286, 80386 and 80486 microprocessors for their major features.
Q.40	What is a segment descriptor? Give its format and discuss esch field in brief.