



Syllabus

Microprocessor Programing (8086)

- Live Sessions (6 Month)
- Daily Recording provide
- MSBTE Syllabus
- MSBTE Model Solutions
- Exact Question Bank
- Regular Notes
- 100% guaranty of coding
- Completion Certificate

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01.

8086-16 BIT MICROPROCESSOR

- 1.1 8086 Microprocessor: Salient features, pin descriptions
- 1.2 Architecture of 8086: Functional block diagram, register organization
- 1.3 Concept of pipelining
- 1.4 Memory segmentation, Physical memory addresses generation

02.

DATA STRUCTURES IN PYTHON

- 2.1 Program development steps: Problem definition, Algorithm, Flowchart, Initialization checklist, Choosing instructions, Converting algorithm into assembly language program
- 2.2 Assembly Language Programming Tools:
 - Editor
 - Assembler
 - Linker
 - Debugger
- 2.3 Assembler directives

03.

FUNCTIONS, MODULES AND PACKAGES IN PYTHON

- 3.1 Machine language instruction format
- 3.2 Addressing modes
- 3.3 Instruction set:
 - Arithmetic instructions
 - Logical Instructions
 - Data transfer instructions
 - Flag manipulation instructions
 - String operation instructions
 - Program control transfer or branching instructions
 - Process control instructions

04.

ASSEMBLY LANGUAGE PROGRAMMING

- 4.1 Models of 8086 assembly language program
- 4.2 Programming using assembler:
 - Arithmetic operations on hexadecimal and BCD numbers
 - Sum of series
 - Smallest and largest numbers from array
 - Sorting numbers in ascending and descending order
 - Check whether given number is odd or even
 - Check whether given number is positive or negative
 - Block transfer
 - String operations - Length, Reverse, Compare, Concatenation, Copy
 - Count numbers of 'l' and '0' in 16 bit number

05.

PROCEDURE AND MACRO

- 5.1 Procedure: Defining and calling procedure - PROC, ENDP, FAR and NEAR Directives; CALL and RET instructions; Parameter passing methods, Assembly language programs using procedure
- 5.2 Macro: Defining macro, MACRO and ENDM Directives, Macro with parameters, Assembly language programs using macro