

Roll No.

Printed Pages : 2

8402

BT-4 / M-15

PROGRAMMING LANGUAGES

Paper-CSE-204 E

Time allowed : 3 hours]

[Maximum marks : 100

Note : Attempt any five questions by selecting at least one question from each unit. All questions carry equal marks.

Unit-I

1. What are programming languages ? Discuss their types. Also mention the desirable characteristics of a programming language. 20
2. What are different types of errors that might be present in a program ? Explain with the help of C/C++ code. Also discuss various features of C-language. 20

Unit-II

3. Explain the meaning and working and implementation of following composite data structures : 20
 - (a) Structures in C
 - (b) Linked lists in C.
4. Describe the concept of sub-programming by choosing a language of your choice. Distinguish between function and procedure subprograms. Also discuss standard library functions. 20

8402

[Turn over

(4)

Unit-III

5. Differentiate between iterative and recursive procedures. Write recursive and iterative subprogram for a problem of your choice. 20
6. Describe following concepts with illustrations : 10 each
 - (a) Scope (dynamic/static and local/global)
 - (b) Parameter transmission mechanisms.

Unit-IV

7. Describe various mechanisms for storage management like : 10 each
 - (a) static and dynamic structures and
 - (b) heap and stack structures.
8. Present a detailed comparison of C and C++ programming languages. 20

8402