M 26750

Reg. No. : ....

Name : ....

First Semester M.C.A. (Reg./Sup./Imp.) Degree Examination, February 2015

(2013 and Earlier Admn.)

MCAC 1.2 : PROGRAMMING AND PROBLEM SOLVING USING "C"

Time : 3 Hours

Max. Marks : 80

Instructions : *Answer **any five** questions.*
*Each question carries **16** marks.*

1. a) Explain the importance of programming concepts using flowchart and algorithms for any problem solving methods with suitable example.　　8

   b) Describe the various primitive data types in 'C' programming.　　8

2. a) List out the access modifiers and data type conversions in 'C' programming explain with suitable examples.　　8

   b) Explain the working of switch statement with a flowchart and a suitable example.　　8

3. a) Define recursion. Write a recursive programme for finding factorial of a number using points.　　8

   b) Develop an algorithm to find the sum of the digits a number till the sum reduces to a single digit.　　8

4. a) Write a program for finding maximum and minimum of a given array of 'N' number.　　8

   b) Explain the following methods of passing parameter to a function with suitable examples.　　8

   i) Pass by value

   ii) Pass by reference.

5. a) Define preprocessor. How to distinguish Macro and preprocessor in 'C' programming ? Explain with suitable examples.　　8

   b) What are the merits of dynamic memory allocation functions ? Briefly explain any three of them.　　8

6. a) Define booting process. Explain the very essential files require for booting process.   **8**

   b) Distinguish the various characteristics feature of dialog boxes and error boxes.   **8**

7. a) What is data file ? Explain the various file handling operations with suitable examples.   **8**

   b) Write a program to copy the contents of one file to another file.   **8**

8. Write short notes on the following :   **(4×4=16)**

   a) Bit wise operations

   b) TSR projects

   c) Structure and union

   d) Multiple indirection.

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