

G-1/606/21

Roll No.....

I Semester Examination, April-2021

DCA

DCA-103

Paper III

(Programming in 'C' Language)

Time : 3 Hours]

[Maximum Marks : 100

Note : Attempt *one* question from each unit. All questions carry equal marks.

Unit-I

1. (a) What is 'C' ? Write various features of 'C'.
- (b) Explain simple Input and Output statement in C language.

Or

- (a) What is Data Type ? Explain various types of Primitive Data Types.
- (b) Write a sample C program and also write steps for running that program.

Unit-II

2. (a) What is Assignment Operator ? Explain types of Assignment Operators with examples.
- (b) Explain use of Relational and Boolean Operators with suitable example.

Or

- (a) What do you mean by Expression ? Explain types of Expression.

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[2]

- (b) Write program to calculate Ram's gross salary.

If Ram's basic salary is input through the keyboard. His dearness allowance is 40% of basic salary and house rent allowance is 20% of basic salary.

Unit-III

3. (a) Explain Decision Control structure with its types.
(b) What is Array ? Explain types of Array with suitable example.

Or

- (a) Write program to perform addition of two integer matrix.
(b) Explain switch statement with suitable example.

Unit-IV

4. (a) What is function ? Explain various components of function.
(b) Explain structure within structure with suitable example.

Or

- (a) What is Recursive Function ? Explain with suitable example program.
(b) Explain user defined and library function with suitable example.

Unit-V

5. (a) What is pointer ? Explain declaration and initialization of pointer variable with example.
(b) What is Pointer Arithmetic ? What are the various Arithmetic operation performed with pointer ?

Or

- (a) Explain how to pass an Array to a function with example.

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- (b) Write short notes on the following with respect to pointer :

- (i) Address operator (&),
(ii) * (Asterisk symbol),
(iii) Array of pointer.

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