Code No. : 20502 E Sub

Sub. Code: CMCA 11

B.C.A. (CBCS) DEGREE EXAMINATION, NOVEMBER 2023.

First Semester

Computer Application - Core

PROGRAMMING IN C

(For those who joined in July 2021-2022 onwards)

Time: Three hours

Maximum: 75 marks

PART A — $(10 \times 1 = 10 \text{ marks})$

Answer ALL questions.

Choose the correct answer:

- 1. Functions in C Language are always
 - (a) Internal
- (b) External
- (c) model
- (d) enumerate
- 2. The scanf() is a predefined function in header file.
 - (a) stdlib. H
- (b) ctype. H
- (c) stdio. H
- (d) stdarg. h

- 7. Which of the following can never be sent by call-by-value?
 - (a) Variable
 - (b) Array
 - (c) Structures
 - (d) Both Array and Structures
- 8. What is the maximum number of arguments that can be passed in a single function?
 - (a) 127
- (b) 253
- (c) 361
- (d) 1000
- 9. What does tmpfile() returns when it could not create the file?
 - (a) stream and NULL
 - (b) only stream
 - (c) only NULL
 - (d) does not return anything
- 10. Which of the following cannot be a structure member?
 - (a) Another structure
 - (b) Function
 - (c) Array
 - (d) None of the mentioned
 - Page 3 Code No.: 20502 E

- Which for loop has range of similar indexes of 'i' used in for (i = 0;i < n; i++)?
 - (a) for (i = n; i > 0; i-)
 - (b) for $(i = n; i \ge 0; i-)$
 - (c) for (i = n-1; i > 0; i-)
 - (d) for (i = n-1; i > -1; i-)
- The value obtained in the function is given back to main by using ______ keyword.
 - (a) return
- (b) static
- (c) new
- d) volatile
- 5. Which type of conversion is NOT accepted?
 - (a) From char to int
 - (b) From float to char pointer
 - (c) From negative int to char
 - (d) From double to char
- 6. Which of the following is a ternary operator?
 - (a) &&
- (b) >>=
- (c) ?:
- (d) ->

Page 2 Code No.: 20502 E

PART B — $(5 \times 5 = 25 \text{ marks})$

Answer ALL questions, choosing either (a) or (b).

Each answer should not exceed 250 words.

11. (a) What are the mathematical functions in C? Explain.

Or

- (b) Elaborate the concept of identifier and the rules to be followed for forming an identifier.
- 12. (a) Write a note on GOTO statement with example.

Or

- (b) How will you writing a character in C? Give example.
- 13. (a) Write down the reading strings from terminal in C with example.

Or

- (b) How will you declare and initialize string variables? Explain.
- 14. (a) Elaborate the need for user defined functions.

Or

(b) Describe the no argument and no return values to function in C.

Page 4 Code No. : 20502 E [P.T.O.]

15. (a) Explain the accessing the address of variables in pointers.

Or

(b) Mention the pointer increments and scale factor.

PART C - (5 × 8 = 40 marks)

Answer ALL questions, choosing either (a) or (b).

Each answer should not exceed 600 words.

16. (a) Illustrate the bitwise operator used in C language.

Or

- (b) Determine the assigning values of variables with example.
- 17. (a) Differentiate between do while and while loop statement in C.

Or

- (b) Illustrate the ELSE IF ladders with example.
- (a) How to initialization the elements in multidimensional array? Explain.

Or

(b) What are the various types of string handling functions? Explain with example.

Page 5 Code No.: 20502 E

19. (a) Elaborate the scope and life time of variables in functions.

Or

- (b) Explain the handling of non integer function In C language.
- 20. (a) Elaborate the purpose of pointer expressions.

Or

(b) How will you accessing a variable through its pointers? Explain.

Page 6 Code No.: 20502 E