

Mock Test - 03

Mid-Term Examination 2024-25

BCA – I Semester

Subject Code: BCA107

Subject: C Programming

Time: 02:00 Hrs

Maximum Marks: 25

NOTE: Attempt all three sections.

SECTION – A

(2/3 Marks each)

1. How do you declare an floating point variable and initialize it with a value in C? (2 marks)
2. Explain the difference between float and double data types in C. Provide an example. (3 marks)

SECTION – B

(4 Marks each)

Attempt any two questions.

1. Write a C program to check whether a given number is even or odd.
2. Write a C program that takes the radius of a circle as input and calculates the area and circumference.
3. Write a C program to print the following pattern:

```
*****
****
 ***
 **
 *
```

SECTION – C

(6 Marks each)

Attempt any two questions.

1. Explain the difference between if-else and switch statements in C. Provide an example for both.

2. What are the advantages of modular programming in C? Write a C program that uses a function to calculate the factorial of a number.
3. Write a C program to calculate the area of square, and use comments to explain each part of your program. Also, mention the importance of comments in C programs.