



Central University of Himachal Pradesh
(Established under Central Universities Act 2009)
PO Box: 21, Dharamshala, District Kangra, Himachal Pradesh-176215

Name of Programme of Study: _____, Roll No: _____

(To be filled by the Student)

MID Term Examination
Semester: First

Name of the Course: Object Oriented Programming

Time: 1½ Hours

Date: 03/02/2023

Course Code: MCA 534
Maximum Marks: 40

Note:

1. Answer Sections A, B & C in the answer book provided.
2. Comply with the instructions given in the Main Answer Book carefully.

SECTION - A

MULTI CHOICE QUESTIONS

(10x1=10 Marks)

1. Answer all the following TEN questions with ONE mark each.

- 2) What is class?
- 3) What is default access qualifier of a class in C++?
- 4) What will be the output of following code?

```
int i, j;
for ( i = 1, j = 30; i < j; i++, j = j - 2);
std::cout << i;
```

$i = 14 - 30$
 $i < j$
 $i = 14, j = 28$

- 5) Define inheritance.
- 6) List all storage classes supported in C++.
- 7) Define type casting?
- 8) What is the use of new operator in C++?
- 9) What is an inline function?
- 10) Write any four keywords used in C++.

$i = 14 - 30$
 $i < j$
 $i = 14, j = 28$
 $i = 14, j = 28$
 $i = 14, j = 28$
 $i = 14, j = 28$
 $i = 14, j = 28$
 $i = 14, j = 28$
 $i = 14, j = 28$
 $i = 14, j = 28$

SECTION - B SHORT ANSWER QUESTIONS

(2x5=10 Marks)

Answer any Two out of the following SIX questions. Each question carries FIVE marks.

2. Write a program to find the sum of following series:

$10 \ 5 \ 5$

$$S = 5 + 10 + \dots + N$$

Where N is input by user.

3. Write general syntax of switch statement. Also give an example.
4. Discuss the concept of recursion using an example.
5. What is a function? Explain the concept of function with default arguments using an example.
6. Discuss how member functions of a class are defined outside and inside a class using an example.
7. Write a program using else if ladder to calculate the total amount for following:

Units	Price per unit
1-100	0.50
101-200	0.60
201-300	0.90
301-400	1.35
400+	2.35

SECTION - C

LONG ANSWER ESSAY TYPE QUESTIONS

(2x10=20 Marks)

Answer any Two out of the following FOUR questions. Each question carries TEN marks.

8. Explain different basic data types supported in C++.
9. What is looping? Explain different types of loops supported in C++ using suitable example.
10. What do you mean by function overloading? Explain using an example.
11. What is a constructor? Discuss its types using suitable example.