(FOR THE CANDIDATES ADMITTED DURING THE ACADEMIC YEAR 2020 ONLY)

20UMS6E4 / 20UMA6E4

REG.NO. :

N.G.M.COLLEGE (AUTONOMOUS) : POLLACHI

END-OF-SEMESTER EXAMINATIONS : MAY - 2023

COURSE NAME: B.Sc.-MATHEMATICS **MAXIMUM MARKS: 70**

SEMESTER: VI **TIME : 3 HOURS**

PART - III
OBJECT ORIENTED PROGRAMMING WITH C++

SECTION - A (10 X 1 = 10 MARKS)

ANSWER THE FOLLOWING QUESTIONS.
MULTIPLE CHOICE QUESTIONS. (K1)

1. The constants in C++ are also known as_____.
   a) Pre-Processor b) Literals c) Constant d) Parameter
2. In C++ functions are also called_____.
   a) Definitions b) Concepts c) Methods d) Organizers
3. Which of the following is not a type of constructor in C++?
   a) Default Constructor c) Copy Constructor
   b) Parameterized Constructor d) Friend Constructor
4. What is the correct example of a binary operator?
   a) ++ b) -- c) * d) +
5. The Pointers which are not initialized in a program are called_____.
   a) Void Pointer b) Null Pointer c) Base Pointer d) Object Pointer

ANSWER THE FOLLOWING IN ONE (OR) TWO SENTENCES. (K2)

6. What is C++?
7. What is the size of empty class?
8. When is Constructor executed?
9. What is virtual inheritance in C++?
10. How are compile time polymorphisms implemented in C++?

SECTION – B (5 X 4 = 20 MARKS)

ANSWER EITHER (a) OR (b) IN EACH OF THE FOLLOWING QUESTIONS. (K3)

11. a) Write a short note on input operator.

(OR)

b) Explain operators in C++.

12. a) Discuss the main function.

(OR)

b) How to define member functions?

(CONTD…..2)

13. a) Explain friendly functions.

(OR)

b) Write a short note on copy constructor.

14. a) Define operator overloading.

(OR)

b) Write a short note on virtual functions.

15. a) Write rules for Virtual Functions.

(OR)

b) What are the applications of This Pointer.

SECTION - C (4 X 10 = 40 MARKS)
ANSWER ANY FOUR OUT OF SIX QUESTIONS
(16th QUESTION IS COMPULSORY AND ANSWER ANY THREE QUESTIONS
(FROM Qn. No : 17 to 21) (K4 (Or) K5)

16. Explain control structures in C++.

17. Explain : (i) Tokens (ii) Keywords (iii) Identifiers and Constants

18. Discuss function Prototyping.

19. Explain Destructors with an example.

20. Write rules for overloading operators.

21. Explain Pointers to Object.

****

ETHICAL PAPER