

Roll No.

Total Pages : 3

1031

BCA/D-15

OBJECT ORIENTED PROGRAMMING USING C++

PAPER: BCA-231

Time: Three Hours

[Maximum Marks: 80]

Note: Attempt five questions in all, selecting one question from each unit. All questions carry equal marks.

Compulsory Question

1. (a) Explain the concept of static data member in C++ with suitable example.
(b) Discuss the concept of parameterized constructors in C++ with suitable example.
(c) What is the purpose of friend function in C++ with suitable example?
(d) Explain various precedence rules for operators in C++ give suitable example.

UNIT-1

- 2 (a) what are the various features of object oriented programming language? explain these features by giving examples in C++.
(b) What is Scope Resolution operator? Explain its purpose in C++ with example.
3. (a) what are the benefit of object oriented programming language? Discuss.
(b) what is the advantage of class over structure in C++? Explain with example.
(c) Differentiate between Nested and Local class in C++.

UNIT-II

4. Define constructor and Destructor. How do they differ from each other in C++? Write the syntax to declare them. Write a program to compute largest among three numbers using constructor and destructor.
5. Discuss with suitable examples:
(a) Formatted/Unformatted I/O Operations in C++
(b) Stream Classes in C++

UNIT-III

6. How do we handle strings in C++? Explain various string handling operations with suitable examples.
7. Explain the following along with their significance and suitable examples.
 - (a) Dynamic Memory Management
 - (b) Passing Parameters of functions
 - (c) This pointer.
8. (a) what is static polymorphism? Differentiate between various types of static polymorphism along with suitable examples.
 - (c) Write short notes on the following:
 - (i) Associativity rules for Operators in C++
 - (ii) Inline functions in C++
9. Explain the concept of operator overloading in C++. Write a program to overload any one unary and any one binary operator in C++.