Dr. MPS Memorial College of Business Studies
Question Bank
BCA II
OOPs Using C++

1) What do you mean by access specifiers in C++?

2) Define Scope Resolution Operator.

3) What are Inline Functions? What are the advantages of Inline Function?

4) Define Union in C++?

5) What do you mean by Polymorphism?

6) What are pure virtual functions?

7) Define functions. Discuss the concepts of "Pass by value" and "Pass by reference" with help of program in C++.

8) What do you mean by constructor and destructor? Write a program to demonstrate copy constructor and destructor.

9) What are various control and conditional statements available in C++? Explain the use of break and continue statements.

10) Answer briefly :
   a) List various features of object oriented programming language.
   b) Define structure and union.
   c) What is object and class?
   d) What is static member function?
   e) Write a C++ program to swap two numbers without using third variable.
   f) Differentiate union and class.
   g) What is Encapsulation?
   h) Name any 4 C++ compilers
   i) What is Base and Derived Class?
   j) What is the use of static function?
   k) Write down the syntax to create a class and object
   l) What are Local and Global variables?
   m) Discuss the use of Scope resolution operator.
   n) Differentiate early binding and late binding
   o) What is Dynamic Memory Allocation?

11) What is data hiding and encapsulation? How it is implemented using C++? Explain with example.

12) Define Constructor. What are its different types? Explain with suitable example.

13) What is function and operator overloading? Write and explain a C++ program to demonstrate the concept of unary operator overloading.

14) What are friend and inline functions? Explain with example.

15) Why we use Virtual Functions in C++ programs? Explain

16) What do you understand by Pass By Reference? Discuss with C++ program

    a) Differentiate between C and C++.

    b) Write a note on Data Hiding

17) How Function Overloading is possible in C++? Discuss with C++ program?

18) Define a constructor. How will you overload a constructor? Explain with example.

19) Write a short note on Destructor with an example.

20) Define the following:

    a) Class

    b) Inheritance

    c) Polymorphism

    d) Data Abstraction

    e) Data hiding

    f) Friend Classes

    g) Pointers

    h) Constructors

    i) Header files

21) What are the various forms of IF statement? Discuss each of them with the help of flowchart and example

22) What is Function? Name its different categories. Write a program to pass arguments to a function using

    a) Passing by Address

    b) Passing by Reference

23) Differentiate between Private and Public member functions with the help of an example.

24) How does function overloading implement polymorphism? Explain it with example.

25) What is Loop? Explain the different type of loops available in C++

26) What is Class? Explain the different access specifiers that are used in a class with suitable example.

27) What is the difference between call by value and call by reference? Explain with suitable example.

28) Explain the role of class, object, data member, member function and access specifies in C++ with an example.

29) Write a program in C++ to find the product of digits of a given number.

30) What is an Object? How it is different from class?

31) What is OOPs? How it is different from structured programming? Explain the role of Encapsulation, Abstraction, Dynamic Binding in Object-Oriented Programming.

Note: These questions are for your help only. For Deep understanding of the topics, it is suggested to read books thoroughly.