

**TB222080W**

**Reg. No : .....**

**Name : .....**

**B. Sc. / B. Voc. DEGREE (C.B.C.S.) EXAMINATION, MARCH 2023**

**2022 Admissions Regular & 2021 Admissions Supplementary / Improvement And 2020, 2019 And 2018 Admissions  
Supplementary**

**SEMESTER II - CORE COURSE (COMPUTER APPLICATIONS)**

**(Common for Computer Application & SWD)**

**CA2B04B18 - OBJECT ORIENTED PROGRAMMING USING C++**

**Time : 3 Hours**

**Maximum Marks : 80**

**Part A**

**I. Answer any Ten questions. Each question carries 2 marks**

**(10x2=20)**

1. Define Pointer?
2. Write the situations where inline expansion may not work?
3. Define Dynamic binding?
4. Discuss nesting of member functions?
5. Enumerate the different memory management operators used in C++?
6. Give the syntax for declaring a friend function.
7. List out the operators that cannot be overloaded using Friend function.
8. List the operators which cannot be overloaded.
9. Define virtual function?
10. Define visibility modes in C++?
11. Differentiate between `ios :: nocreate` & `ios :: noreplace`.
12. Define streams.

**Part B**

**II. Answer any Six questions. Each question carries 5 marks**

**(6x5=30)**

13. Distinguish between entry control loop and exit control loop.
14. Differentiate between structure and array.
15. Distinguish between private and public access specifiers in C++.
16. Explain the concept of constructors with default arguments.
17. List the operators which can be overloaded.
18. Explain the need of virtual functions?
19. Explain the importance of 'protected' visibility mode with sample code?
20. Describe the use of 'this' pointer with an example.
21. Describe the various approaches by which we can detect the end-of-file condition successfully.

**Part C**

**III. Answer any Two questions. Each question carries 15 marks**

**(2x15=30)**

22. Describe the different operators used in C++.
23. Define a class string and overload any two relational operators using instances of string.

24. Write a C++ program to implement multiple inheritance.
25. Explain, with an example, how you would create space for an array of objects using pointers?