

(Time: 3 Hours)

[Total Marks: 80]

**N.B. (1) Question No. 1 is Compulsory.**(2) Attempt any **three** questions from the remaining **five** questions.(3) Answers to **sub-questions** should be **grouped** and written **together**.

- Q.1 Answer ANY FOUR out of FIVE questions. 20**
- (a) Inline function
  - (b) Dynamic memory allocation
  - (c) Classes and Objects
  - (d) Access Modifiers
  - (e) Static binding
- Q.2 (a) Explain types of inheritance with example 10**
- (b) Explain types of pointers in C++ 10**
- Q.3 (a) Write a C++ program to design a class cricketer with appropriate attributes and methods. Create an array of cricketer objects and display the details of each cricketer. 10**
- (b) Write a program to illustrate exception handling in C++. 10**
- Q.4 (a) Explain different types of file pointer in C++. 10**
- (b) Explain the conversion of class object to primitive type using suitable example. 10**
- Q.5 (a) What is operator overloading? How do you overload binary operators? Explain with the help of example. 10**
- (b) Explain how to read and write data to a text file. 10**
- Q.6 (a) Explain the concept of virtual function and virtual destructor with a suitable example. 10**
- (b) Explain use of copy constructor with an example. 10**
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