No. of Printed Pages : 3

## BACHELOR OF COMPUTER APPLICATIONS (BCA) (Pre-Revised)

**Term-End Examination** 

27000

December, 2018

## CS-72 : C++ AND OBJECT ORIENTED PROGRAMMING

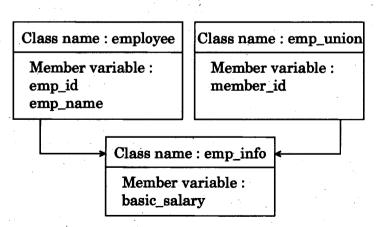
Time : 2 hours

Maximum Marks : 60

**CS-72** 

- Note: Question number 1 is compulsory. Attempt any three questions from the rest. All program codes must be in C++ programming language only.
- 1. (a) Write a program to implement the inheritance as shown in the figure given below. Write member functions to accept and display data.

10



**CS-72** 

1

P.T.O.

	(b)	Explain open() and close() functions of file handling with the help of an example.	5
	(c)	Compare operator overloading and function overloading with the help of examples.	5
	(d)	What are Virtual Functions ? Why are they needed ? What are Pure Virtual Functions ?	6
	(e)	Explain Class and Object with the help of examples.	4
2.	(a)	Write a program to interchange two integer values by using call by reference.	5
	(b)	Explain overloading of constructors with suitable example.	5
3.	(a)	What is UML and why is it used ?	3
	(b)	Design a Use-Case diagram for placing an order online at an e-commerce website.	7
4.	(a)	What is the difference between Static binding and Run-time binding ?	5
	<b>(b)</b>	Differentiate between prefix and postfix operators with the help of an example for each.	5
CS-72		2	

· · **5.** Explain the following :

- (a) 'this' pointer
- (b) friend functions
- (c) new and delete operators
- (d) iostream.h file