Seat No.: _____   Enrolment No.

GUJARAT TECHNOLOGICAL UNIVERSITY

BE - SEMESTER– IV (Old) EXAMINATION – WINTER 2019

Subject Code: 140705   **Date: 17/12/2019**

Subject Name: Object Oriented Programming with C++

Time: 10:30 AM TO 01:00 PM   **Total Marks: 70**

Instructions:
1. **Attempt all questions.**
2. **Make suitable assumptions wherever necessary.**
3. **Figures to the right indicate full marks.**

Q.1	**(a)**	Difference between object oriented programming and procedure oriented programming in Detail.	**07**
	(b)	Describe, with examples, the uses of enumeration data types.	**07**
Q.2	**(a)**	Explain type conversion from basic type to class type and class type to basic type with example.	**07**
	(b)	What do you mean by function overloading? Explain it with example.	**07**
		OR	
	(b)	Explain the inline function and default arguments with example.	**07**
Q.3	**(a)**	Describe various operators in C++.	**07**
	(b)	Explain static data member and static member function with suitable example	**07**
		OR	
Q.3	**(a)**	What is default constructor? What is the purpose of parameterized constructor? Explain it with example.	**07**
	(b)	What is an operator function? Write a program to overload binary + operator as a member function.	**07**
Q.4	**(a)**	Write a C++ program for bubble sort using template functions.	**07**
	(b)	Discuss friend function and friend class in detail.	**07**
		OR	
Q.4	**(a)**	Write a program which uses command line arguments to display the contents of a file.	**07**
	(b)	What is Inheritance? Explain different types of Inheritance.	**07**
Q.5	**(a)**	Explain pointer to objects in C++. Write a program to demonstrate use of this pointer.	**07**
	(b)	Explain Virtual function and Pure Virtual Function with example.	**07**
		OR	
Q.5	**(a)**	Explain STL with its core components.	**07**
	(b)	What is a stream? Describe various stream classes for console I/O operations.	**07**

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