

Subject : I. T. - Elective-II a) Programming with STL

Day : Thursday
Date : 09/06/2016



Time : 02.00 P.M. TO 05.00 P.M.
Max Marks : 80 Total Pages : 1

N.B.:

- 1) Answer all questions in the **SAME** answer book.
 - 2) Answer any **FOUR** questions from **SECTION-I**.
 - 3) Answer any **TWO** questions from **SECTION-II**.
 - 4) Figures to the right indicate **FULL** marks.
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SECTION-I

- Q.1.** List different iterator categories. Explain bidirectional iterator in brief. (12)
- Q.2.** What is adapter? Illustrate the deque adapter. (12)
- Q.3.** Compare associative container with sequential container. Discuss the usage of multiset container. (12)
- Q.4.** Develop and implement class template similar to vector template of STL. (12)
- Q.5.** Bring out the difference between mutating and non-mutating algorithms. List the any five non-mutating algorithm and illustrate usage of it. (12)
- Q.6.** Illustrate the extractors and insertors with code. (12)
- Q.7.** Write short note on the following (**Any THREE**) (12)
 - a)** Allocators
 - b)** Exception Handling in C++.
 - c)** List
 - d)** Function objects

SECTION-II

- Q.8.** Write a STL program to maintain the database of students with his/her height. Sort the entire data according to height by using STL algorithm. Also find whether particular students height is bellow or above average height. (16)
- Q.9** Write your own class template vector, use the same to implement a queue. (16)
- Q.10.** Develop and implement an algorithm based on STL's Map. To find five top students in university examination based on their marks. (16)

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