

Sort a Linked List

Assignment

Use the linked list template class (defined in LinkedList.h version 2), add a template member function to put the elements in ascending order, i.e. sort the linked list.

To demonstrate your sort function, write a driver program and performs the following:

1. Sort an integer linked list
 - a. Create a linked list which holds integers, and the numbers are not in order
 - b. Display the original list
 - c. Sort the list
 - d. Display the sorted list
2. Sort a linked list of real numbers (i.e. double data type)
Do steps a – d in part 1
3. Sort a linked list of names (use full name)
Do steps a – d in part 1

Sort Method

You can be creative to put the list in order. If you use a method other than the bubble sort or selection sort, you need to document your method well, or submit a pseudo code of your algorithm.

Submission

- LinkedList.h with your sort member function
- Your driver program, with three test cases each. I.e. a test case for integer list, a test case for real number list, and a test case for names.