**Scoring Rubric for Project 6: Insertion Sorting a Linked List**

*Due 10/31/2019 @ 3:30 pm*

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| Student Name: Lauren Childers |

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|  | **Score** | **Maximum** |
| **Execution (50 pts):** | | |
| Program compiles without errors (warnings are okay) | 50 | **50** |
| **Implementation (45 pts):** | | |
| Implements the LinkedList class to be a friend of the Node class and contain only one pointer “head” | 4 | **5** |
| Implements a member function of LinkedList to do the insertion sort: implementation designs can vary, but some operations should be encapsulated in helper functions and it should be quadratic time | 3 | **15** |
| Implements the “big three”: copy constructor, copy assignment operator, and destructor for the LinkedList class | 12.5 | **15** |
| Plots the execution time vs. N for the vector and linked list | 0 | **5** |
| Describes the similarity or difference observed in the performance of the InsertionSort algorithm for a vector vs. Linked List | 0 | **5** |
| **Style (5 pts):** | | |
| The driver and functions are easy to follow based on the use of comments | 3 | **3** |
| Easily identifiable variable names | 2 | **2** |
| **Total (100 pts):** | 74.5 | **100** |

Notes:

In your copy constructor, you should assign currentCopy = list.head. Otherwise you won’t be following the pointers in the list you are trying to copy from.

You only need a head pointer in your LinkedList class.

Your insertion sort function just quits in the middle and doesn’t exit the function.