

SENG1120/6120 – Data Structures

Marking sheet – Assignment 01 – Sem 2, 2018

STUDENT NAME: Zhang,Zemu

MARKED BY: TP

STUDENT NUMBER: c3310315

DEMO:

1. Program compiles and works correctly with the files provided (each incorrectly printed line will attract a 3-mark penalty)
2. Implementation of `order()`.
 - For SENG1120 students, add 1.0 bonus marks if implemented correctly.
 - For SENG6120 students, remove 1.0 marks if not implemented correctly.

A: Total (15 /15.0) B: Bonus for `order()` (1 /1.0)

REMOVE MARKS IF:

- Code leads to memory leaks during execution or there are no destructors (0 /-2.0)
- Lack of macroguards (0 /-1.0)
- Lack of `const` qualifiers (-1 /-1.0)
- Lack of documentation in the code (-1 /-2.0)
- Use of `Student` unnecessarily in the code, i.e. other than in the `typedef` statement (-1 /-2.0)
- Declaration of temporary variables as member variables of the class (0 /-1.0)
- Lack of use of dynamic memory allocation in `Node` or `LinkedList` (0 /-15.0)
- Use of `friend` qualifier (0 /-2.0)
- Violation of encapsulation / information hiding (e.g. use of global variables) (-2.5 /-5.0)

C: Total deductions (-5.5 / 30.0)

FINAL MARK [MAX (0, A+B-C)]: 10.5

Comments:

Perfect output and ordering. Some issues with the coding in your submission however. Insufficient `const` (none). Insufficient comments (pre and post as a minimum in your header, and single line comments in your cpp). Student object has been used in `LinkedList` and `Node` (no `typedef`). Public functions `LinkedList.getTail()`, and `.getHead()` return `Node*`, exposing the datastructure and violating information hiding. These classes are also very specific to the assignment, and there are only methods that support the requirements of the assignment. This will make it very hard to scale your application (such as expanding it for use in assignment 2). No marks lost for this of course, however just noting that you can make future work easier on yourself if you do a little extra work at the start. Plan ahead!