

## Computer Science 3310 Program 5 Bonus Option

For a 50 point bonus submit a revised version of your program 5 solution that produces correct answers and is implemented using the Java API class *Hashtable* for the hash table (rather than as an array of linked lists). Some implications of using *Hashtable* are the following.

- The class uses its own internal hashing scheme, so the *hash* method is no longer used.
- The hash table implementation details are hidden (i.e. it doesn't necessarily use chaining), so the output information of "longest chain" is no longer needed.
- There are several possible ways of algorithmically specifying the way to produce the "top n" list---some of them require very little code if the Java libraries are exploited to their fullest.

Note that I do not necessarily expect you to complete this without talking to me. You should feel free to ask me questions and come talk to me one-on-one as you might do on any regular assignment.

Note also that partial credit is possible. However, that is based on a properly functioning program that doesn't necessarily take full advantage of the API (i.e. if some of the algorithms are excessively complicated, I may deduct up to 20% from the bonus). No partial credit will be awarded for attempts at code that do not produce correct results.

### PROGRAM DEADLINES

April 28, 11:00 P.M.

Deadline for submitting completed program, including all documentation. No late submissions accepted. Submission should conform to the requirements discussed in the **Programming Standards** handout (exceptions noted below). You will only need to send your application program which should be named *WordCount.java*. Use the *submit* command with an assignment number of 6. Note that no test plan nor paper copy of the submitted program is required.