CS261: HOMEWORK 3
Due 05/19/2017 by 12pm

Submit one file via the TEACH website:

https://secure.engr.oregonstate.edu:8000/teach.php?type=want_auth

General Instructions

In this assignment, you will complete the implementation of a skip list, which consists of singly-linked lists. The header file `skipList.h`, the implementation file `skipList.c`, and makefile are provided to you. Some functions in the implementation file `skipList.c` have been completed. The comments for each function will help you understand what each function should be doing. Complete the remaining functions in `skipList.c`. Note that the function that carries the largest number of points is supposed to merge two skip lists **without repeating data elements**. You should use the available functions to implement more complex ones. DO NOT change the provided functions and the header file. If you have any questions regarding HW3, please email `cs261-001-sp17@engr.orst.edu`.

Provided Files:

- `skipList.h`
- `skipList.c`

Scoring:

1) `void test(void);`   10pts
2) `struct skipLink* skipLinkAdd(struct skipLink * current, TYPE e);`   10pts
3) `void addSkipList(struct skipList *slst, TYPE e);`   20pts
4) `void printSkipList(struct skipList *slst);`   20pts
5) `void mergeSkipList(struct skipList *slst1, struct skipList *slst2);`   40pts

What to turn in

You will submit the completed file `skipList.c`. Please use this file-naming convention. Make sure your code compiles with the provided makefile on the ENGR server. Zero tolerance for compiling errors. Design a number of test examples to thoroughly check for any errors in your code.