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CS 362

Random Testing Quiz

Development

In order to help develop the tester, I had to create code for inputChar() and inputString() functions so that they would cover a majority of the cases listed in the testme function. The conditions for completion was that inputChar had to receive the character values of [, (, { , , a , x , } ,) ,] in that order over subsequent tests. Finally once all of those values have been hit and the integer stage variable reaches 9, the function must receive an input string of “reset” for the function to print out the error message. To do this, while maintaining the randomness of the test, created a char * to a string “[({ ax})]” which contains each of the target characters required to be output. Then, I had the function inputChar() return a random character from the string. For inputString(), I created an integer flag that acts as a Boolean and has a 50% chance of returning the correct string or an incorrect string. With these two function implementations, I was able to print out the error message while having line coverage of 97.06% and branch coverage of 100%.