Rhea Mae Edwards

Assignment #4 Design/Testing

Understanding the Problem

This problem is asking me to take my program that I created for my #3 assignment and expand it by having the program take the user's inputs as command-line arguments. While also having the program for this assignments handle additional user input errors detecting that the strings are correctly an ascii string or a string of binary values, and to detect for any missing options and arguments in the command-line.

Devising a Plan/Design

Define the main function parameters (int argc, char *argv[])

Create on if statement error checking that the user inputted five arguments

When that if statement if false, print an error message and end the program

Set C-styled strings into C++ styled objects

Testing

While putting this program together, used prior knowledge, information learned from lectures, and additional help from my peers. For example, when it came to understanding the concept between C-styled and C++ styled strings and how one can work with them together, which I learned from the lectures, I was able to complete this assignment with less stress due to possible unknowns.

Values Inputted	Expected	Actual Meet Expected
./numbers -b 011010100110010101101110 -a jen	To print out the correct corresponding binary values for the each inputted character of the inputted ascii string and the correct corresponding characters for each set of binary values inputted of the inputted string of binary values.	Yes
./numbers -b 01101001001100wrong -a jen	To print out the error message for an invalid string of binary values and then end program.	Yes
./numbers -b 011010100110010101101110 -a	To print out the error message for an overall invalid command-line of arguments and then end program.	Yes