- Assignment 3 Testing
  - The main thing I gathered from the output of the implementation was what variables I had to use and which numbers were fixed. It really laid the foundation for solving the problem. Once I knew the numbers the user had to input, and the outputs I could tell the basic structure of the program.
  - Once I finished the program, I went ahead and tested it for a number of different functions, with different inputs, such as bounds and number of trapezoids / rectangles. One notable one I used was the function 5x+3, integrated from 1-5. I did the integration by hand and came up with 72, and then when ahead and used different numbers of rectangles to get a number increasingly closer to 72, as shown in the table below.

Number of rectangles	**Answer**
10	68
100	72.72
1000	71.96
1000000	72.0007

  - I also tested the summation and integration with trapezoid features, with different functions and numbers and checked them against my calculator and they did fine.
  - I did have trouble with using more rectangles/trapezoids than the bounds of the function, where it would go into an infinite loop because it was comparing an int to a double, but other than that almost everything else worked.
  - Finally I tested erroneous inputs into all the prompts, and they all caught errors and prompted the user to enter a new correct number.