cis1.5-spring2007-sklar, lab IV, part 2

instructions

- This is the second part of the lab/homework assignment for unit IV.

- The entire assignment will be worth 9 points: the first part is worth 5 points and the second part is worth 4 points. **Both parts together are due on Monday April 23** and must be submitted by email, as below:

  1. Create a mail message addressed to *sklar@sci.brooklyn.cuny.edu* with the subject line **cis1.5 hw4**.
  2. Attach ONLY the **.cpp** files for each part, as outlined below.
     DO NOT ATTACH THE **.cbp** (CodeBlocks Project) files!
  3. Failure to follow these instructions will result in points being taken away from your grade. The number of points will be in proportion to the extent to which you did not follow instructions... (which can make it a lot harder for me to grade your work — grrrr!)

character arrays and controlling a robot.

For this assignment, you will write a program that generates an array of characters and writes that array to a file. You can make your own software design decisions about whether you want to write separate functions to do each step of if you want to do all the steps inside the `main()`.

- Define a character array to store 25 values. *(0.5 points)*

- Refer back to your **roomba** programs, and have your program prompt the user for input as follows:

  - enter F to make the robot go forward
  - enter B to make the robot go backward
  - enter R to make the robot turn right
  - enter L to make the robot turn left
  - enter Q to quit the program

  The program should let the user enter as many commands as s/he wants to (F, B, R, or L), but no more than 25.
  Each time the user enters a command, you should store that value in the character array.
  (2 points)

- When the user is finished entering commands (i.e., s/he enters Q), then your program should open a file for writing, write all the values you stored in your character array to the file, and then close the file.
  (1.5 points)

Compile, build and run your program to make sure it works as you expect it to.

I will then show you how to use your program's output file to control the robots I'll bring to the lab.