Bridges to Computing

Light Seeking Robot
What is a robot?

»A robot is a machine that can perform tasks and can interact with their environment through sensors and effectors.
»You can program your machine to do what you want it to do.
The purpose of this experiment is to make a Robot that can find its way out of a dark room.
Application in the “Real World”

» The purpose of this idea was thinking about a little children. For example, if children have this robot and there is a fire in the next room and the electricity goes out the robot can lead them out the room

» The other application is that the robot can guide a fire man from a smoky room and can help a lost person in danger get out out the dark room
Improvements

» I need to make the robot recognize when it is outside the box
» I could program the robot to use a camera to get out of the room
» I can improve the robot programming so he always does what I program it to do no matter the conditions
Problems faced

» First, I needed to repeat a set of commands so I used the “jump” command
» Second, I had trouble connecting the commands with wires in the program
» Third, I had trouble finding the command that waits for light reading to increase by a certain value before moving to the next command
» Fourth problem that I had was that the robot was not detecting the light as expected