1. Your goal in this lab is to use a photoresistor (light dependent resistor) to sense changes in light and turn on a buzzer to make ‘beep’ sounds. Additionally, (a) you will output the analog values read from the analog pin on the Serial console (inside Arduino programming IDE running on your laptop), and (b) turn ON an LED connected to a PWM pin whose intensity will be inversely proportional to the light sensor reading (i.e., the LED will glow more in the dark and remain OFF in bright light).

Hint #1: Photoresistor

Hint #2: Buzzer

Hint #3: PWM

You will have to convert analog values read from the analog pin (connected to the photoresistor) to an appropriate “duty-cycle” to use Arduino’s PWM-mode to control the intensity of the LED (which needs to be connected to a PWM pin).