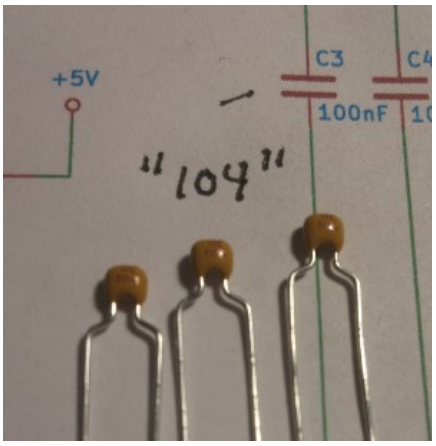
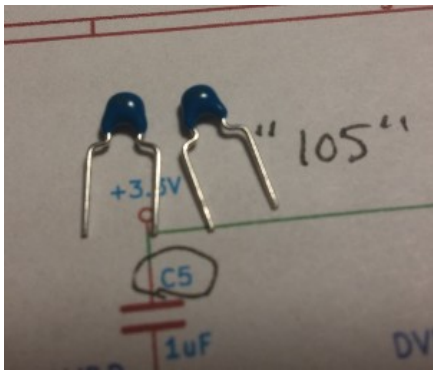
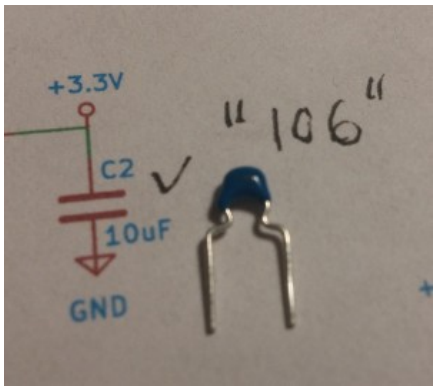
Blinky Color POV Parts



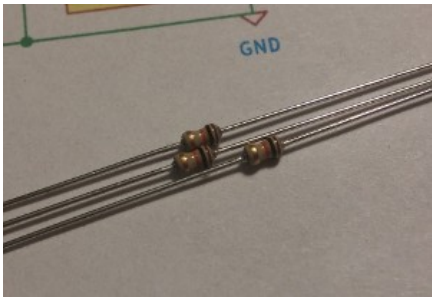
100nF Capacitor
(C1, C3, C4, C6)



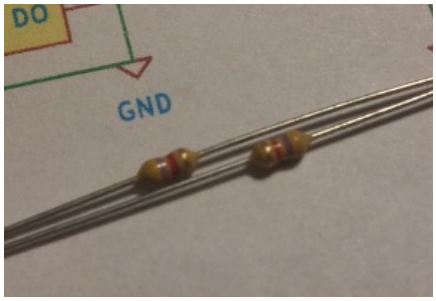
1uF Capacitor(C5, C7, C8)
Need 3 of these



10uF Capacitor (C2)

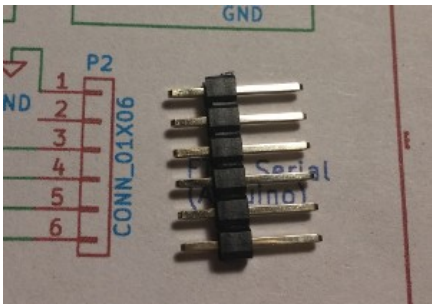


10k Resistor (R1, R4, R5)

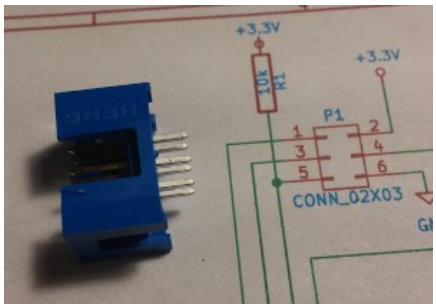


4.7k Resistor (R2, R3)

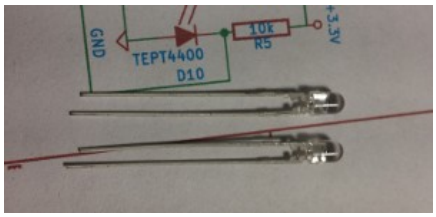
LED (D1-D8)



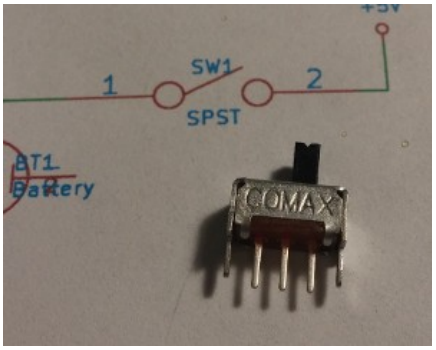
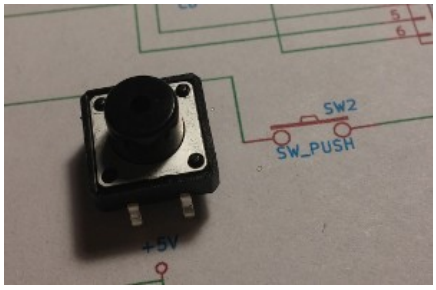
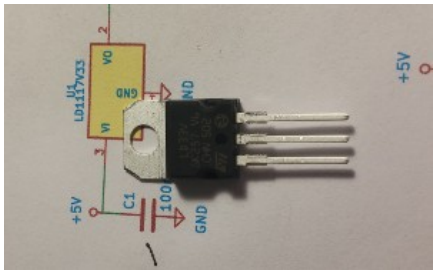
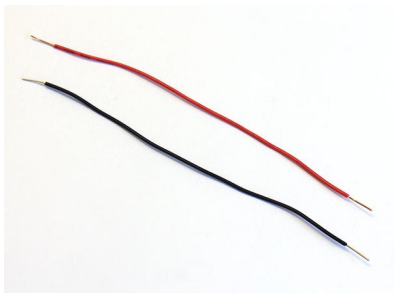
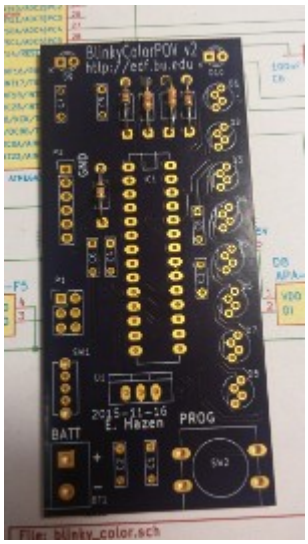
Connector (Optional) P2



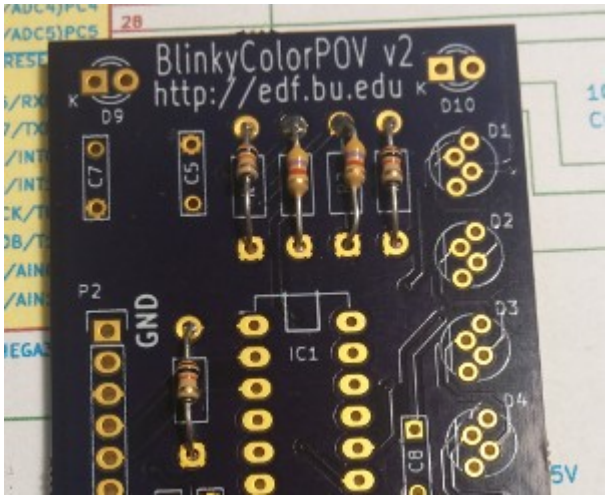
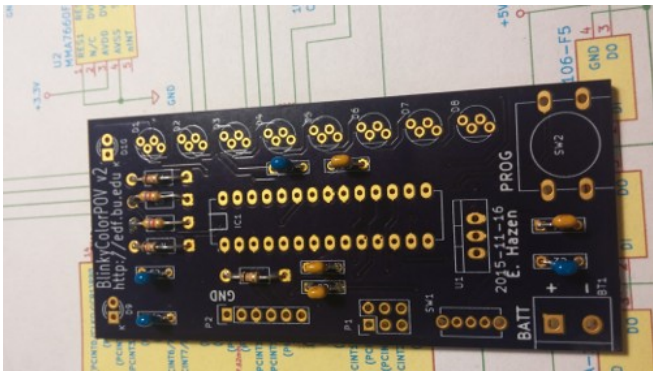
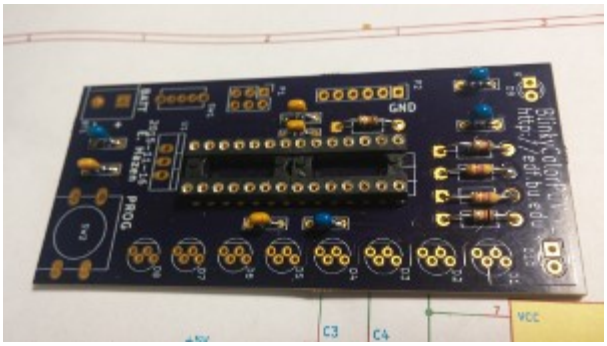
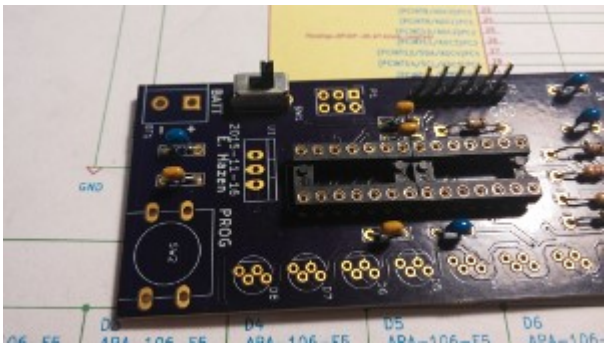
Connector (Optional) P1

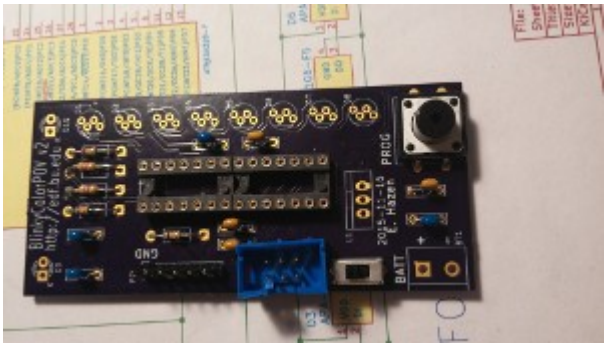
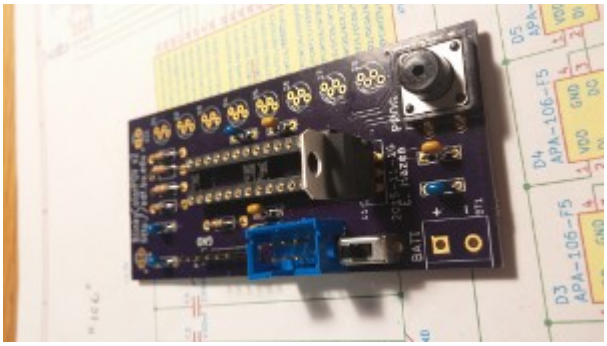
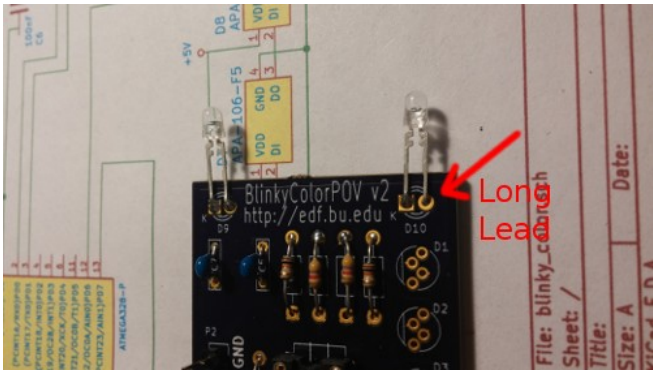
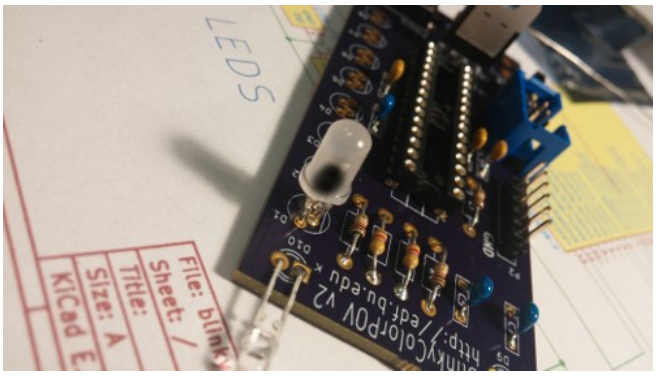


Light sensors (D9, D10)

 Switch (SW1)	 Push button (SW2)	 Voltage regulator (U1)
 Battery Case	 Red and Black Wires	 IC Socket
 Circuit Board		

Directions.....

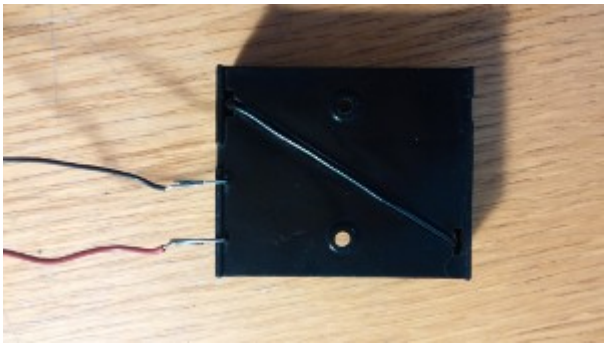
1. Solder in the resistors R2 and R3 are 4.7k Yellow, Violet, Red, Gold R1, R4 and R5 are 10k Brown, Black, Orange, Gold	
2. Solder in the capacitors C2 is 10uF “106” C5, C7, C8 are 1uF “105” C1, C3, C4, C6 are 0.1uF “104”	
3. Solder in the IC socket IC1 Be sure the notch is the same way up as the mark on the board!	
4. Solder in the power switch SW1	

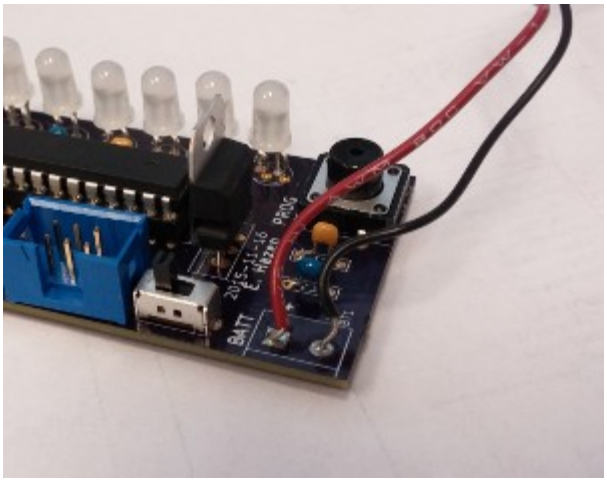
5. Solder in the Programming Button PROG	
6. Solder in the voltage regulator U1 Make sure it goes the right way around, with the metal tab towards U2	
7. Solder in the light sensors They have to go the right way around The long lead goes in the round pad The short lead goes in the square pad Bend them so they stick out and are about the same length, as shown	
8. Solder in the LEDs These are tricky. They have 4 leads. The side with the black dot goes up towards the top of the board (where the light sensors are)	

9. Attach the wires to the battery holder

Solder the red and black wires to the battery holder as shown. Be sure the red wire is connected to the pin near the corner.

Solder the other end of the wires into the circuit board. The red wire goes into the “+”hole





You're done!

Inspect your work carefully, and get your helper to check it out, too.

Then, go ask for batteries and a microcontroller and you're ready to try out your BlinkyColorPOV!