

# Audio/Arduino Club – Soldering for n00bs

Oct 19 & Oct 26, 2017

Some soldering videos

<https://www.youtube.com/watch?v=lpkkfK937mU>

<http://www.eevblog.org/video/EEVblog183-SolderingTutorialPart2-480x272.m4v>

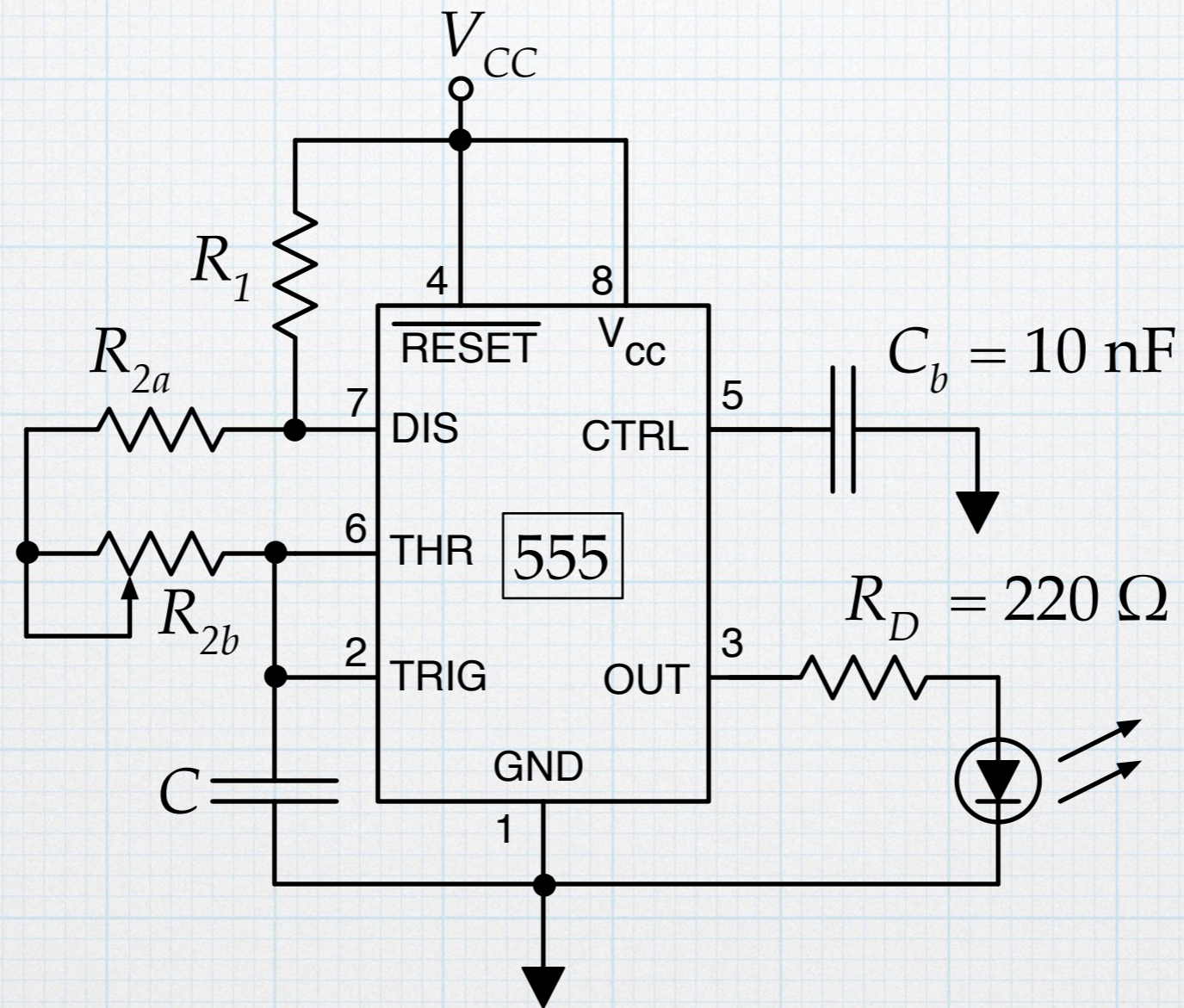
<http://www.eevblog.org/video/EEVblog180-SolderingTutorialPart1-480x272.m4v>

# 555 timer

[https://en.wikipedia.org/wiki/555\\_timer\\_IC](https://en.wikipedia.org/wiki/555_timer_IC)

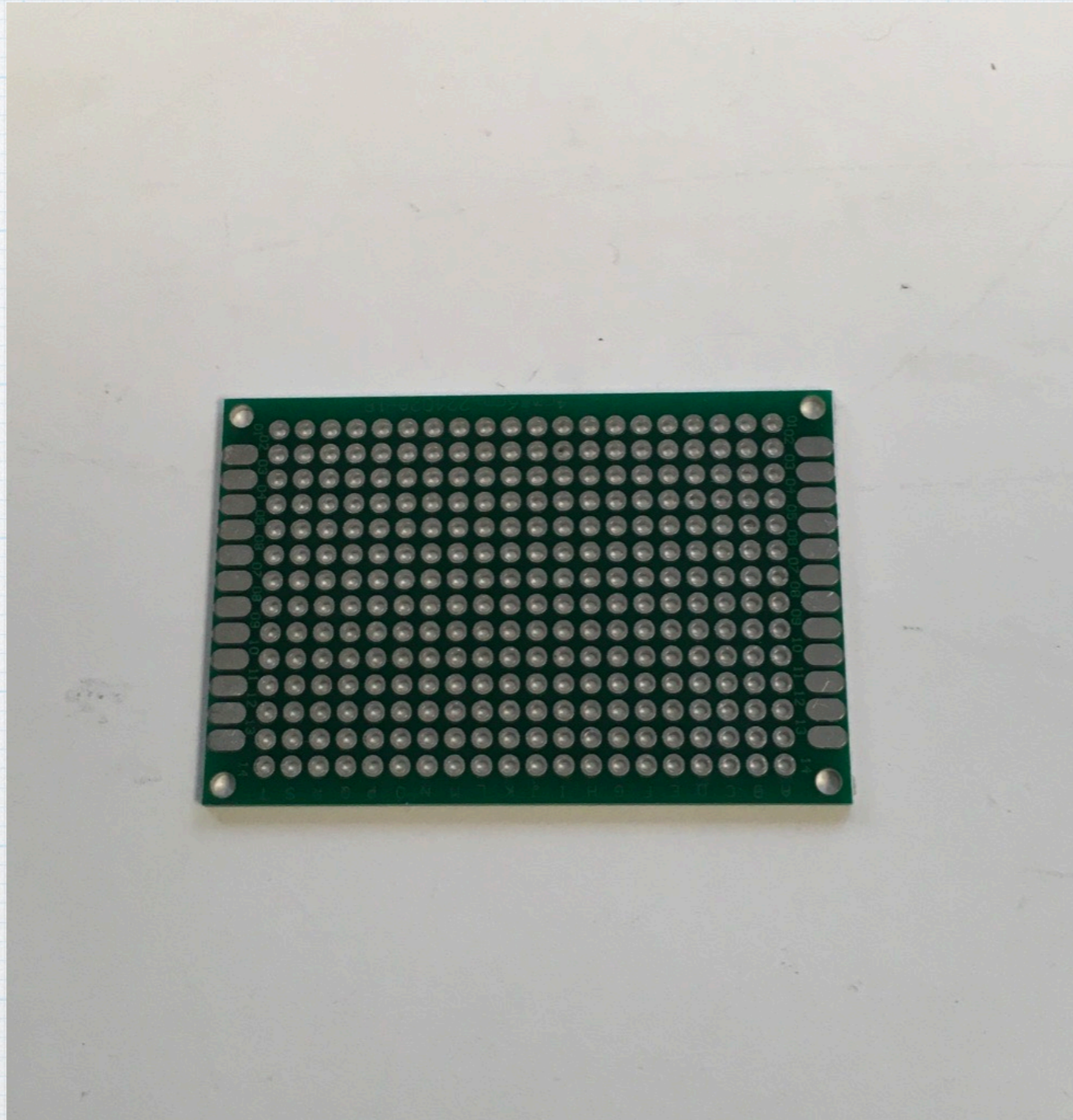
<http://www.555-timer-circuits.com>

# The circuit

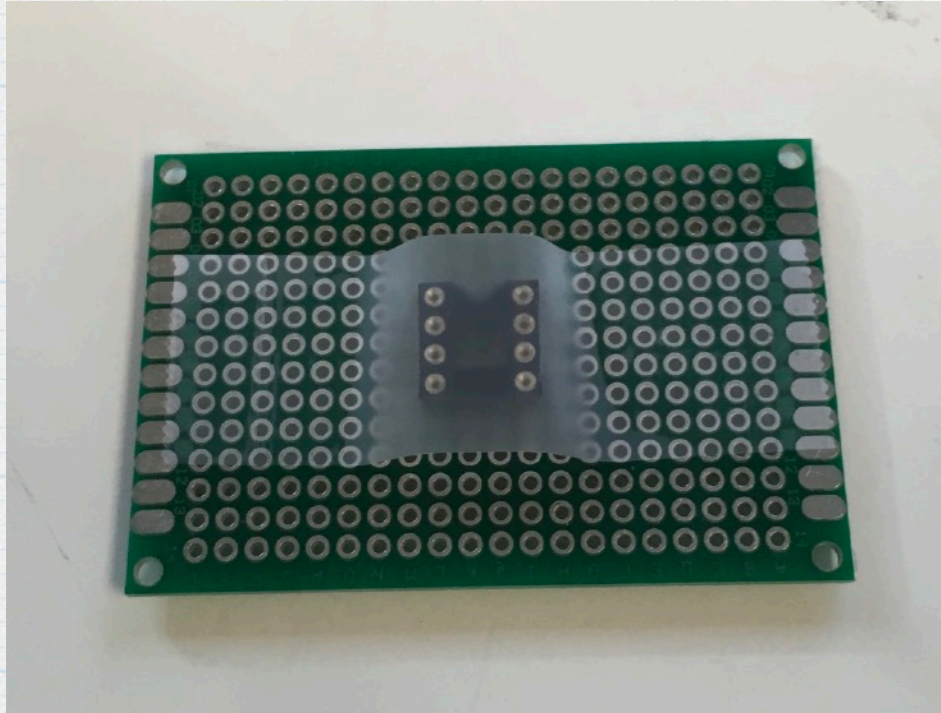


# Starting out

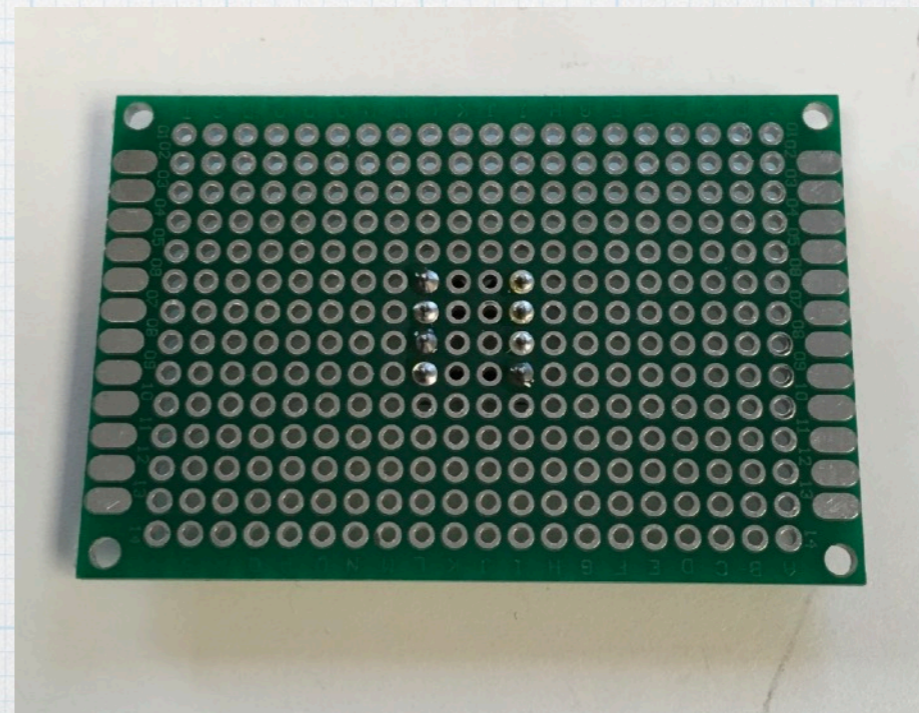
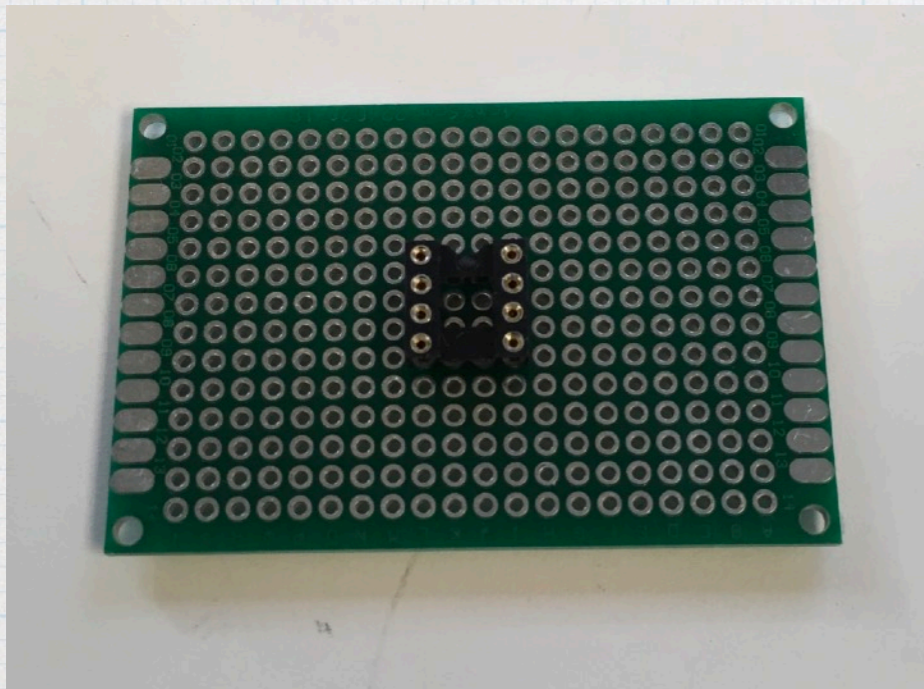
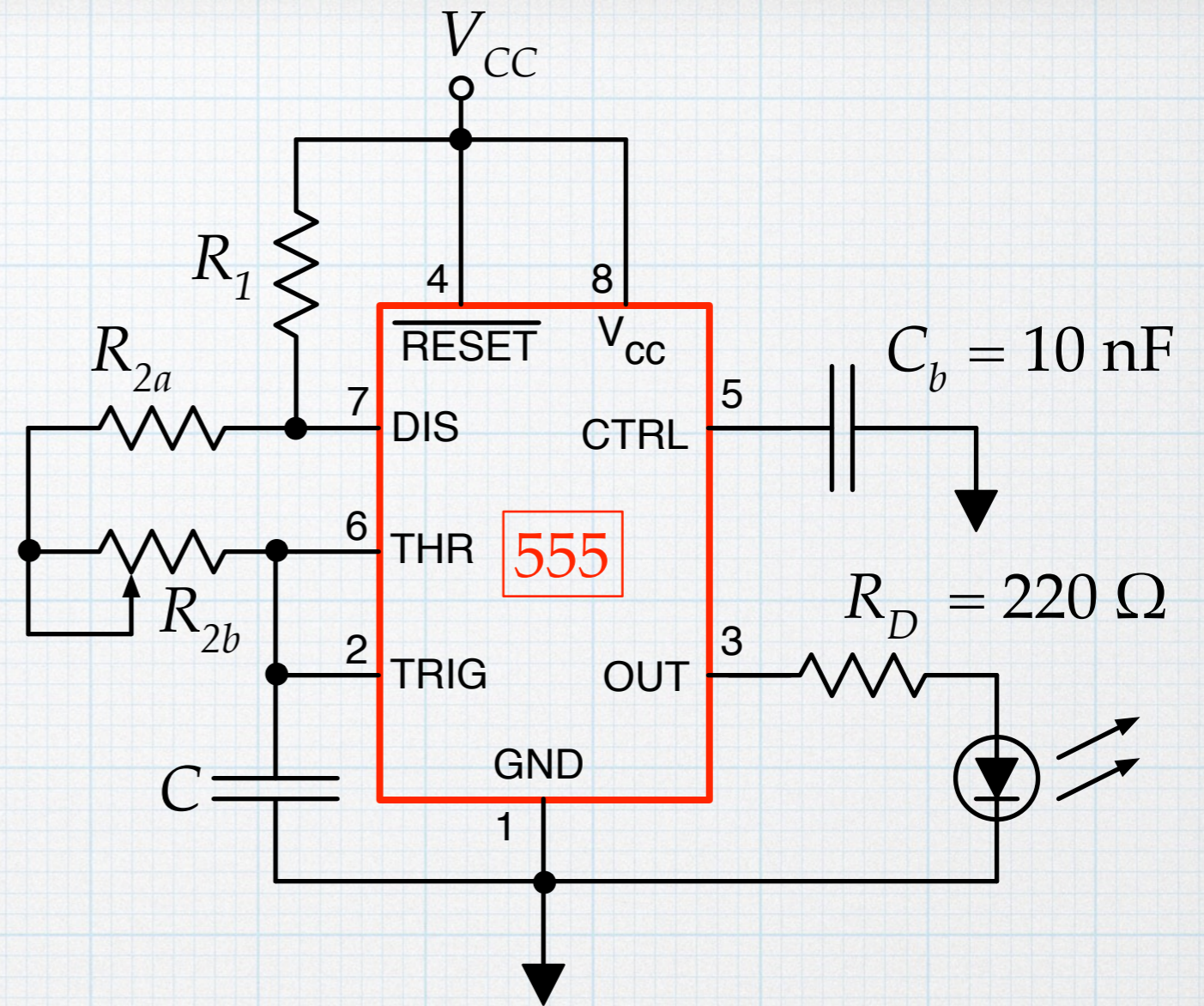
60 mm x 40 mm perf-board with plated through holes.



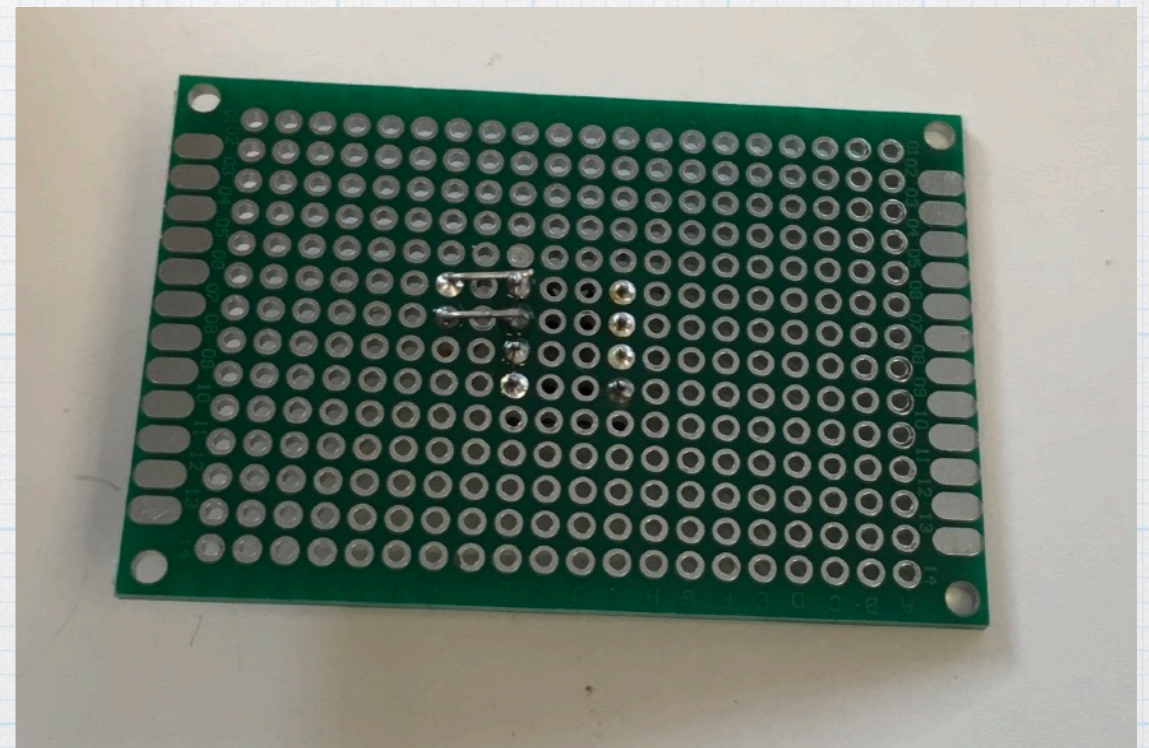
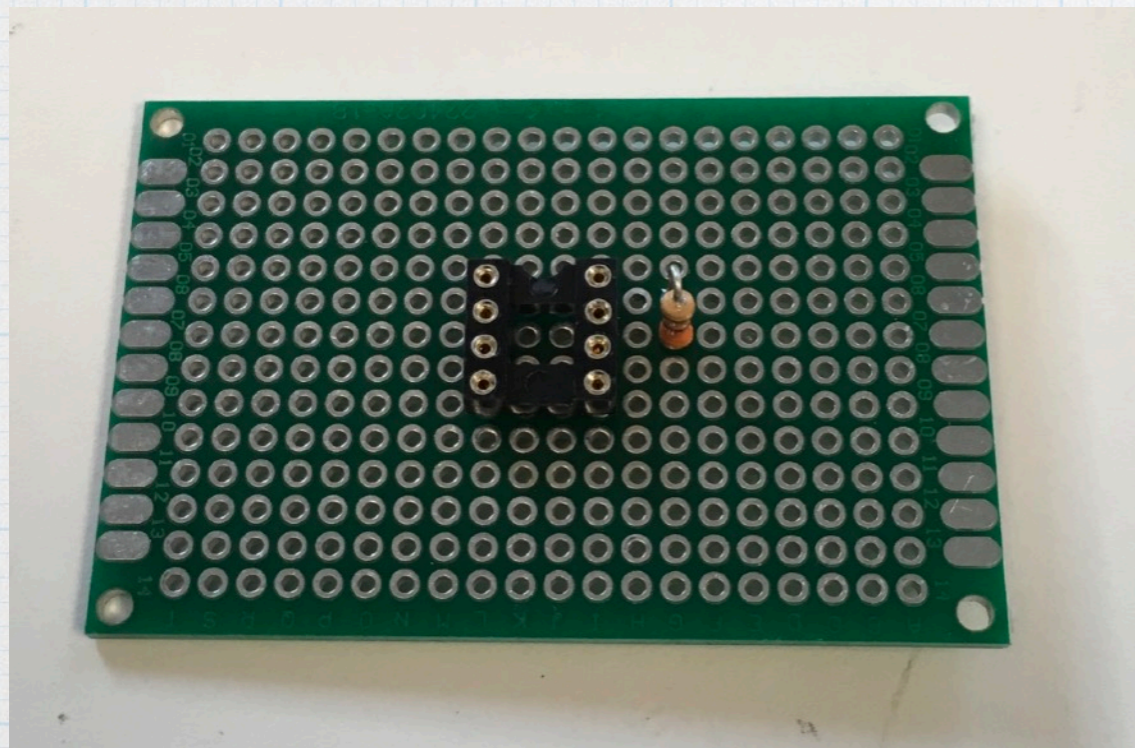
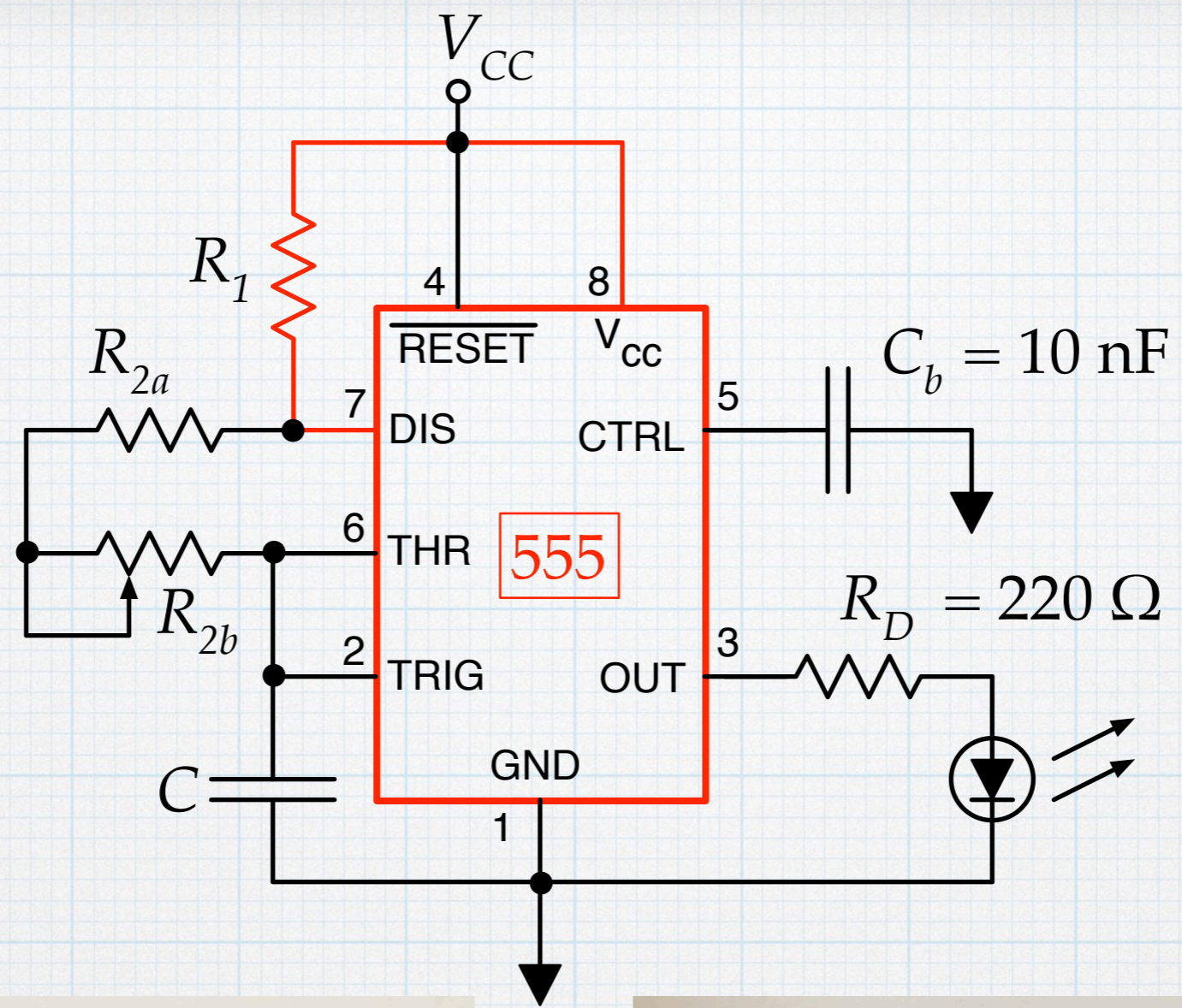
# Socket for 555



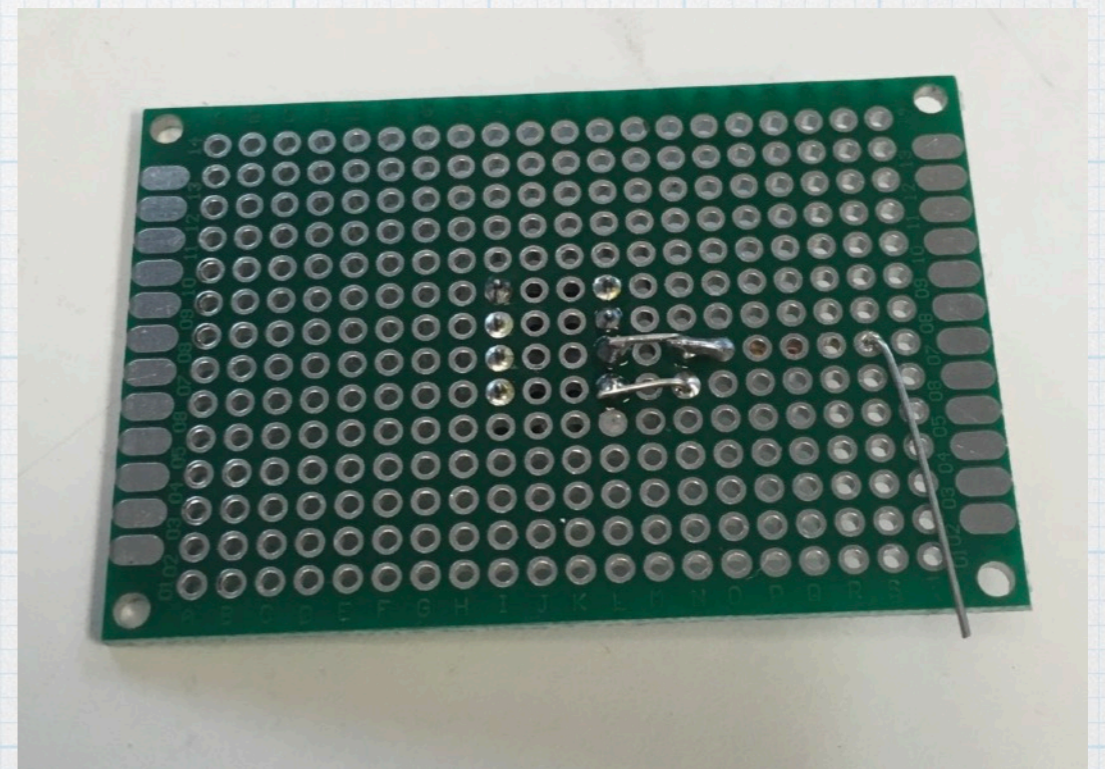
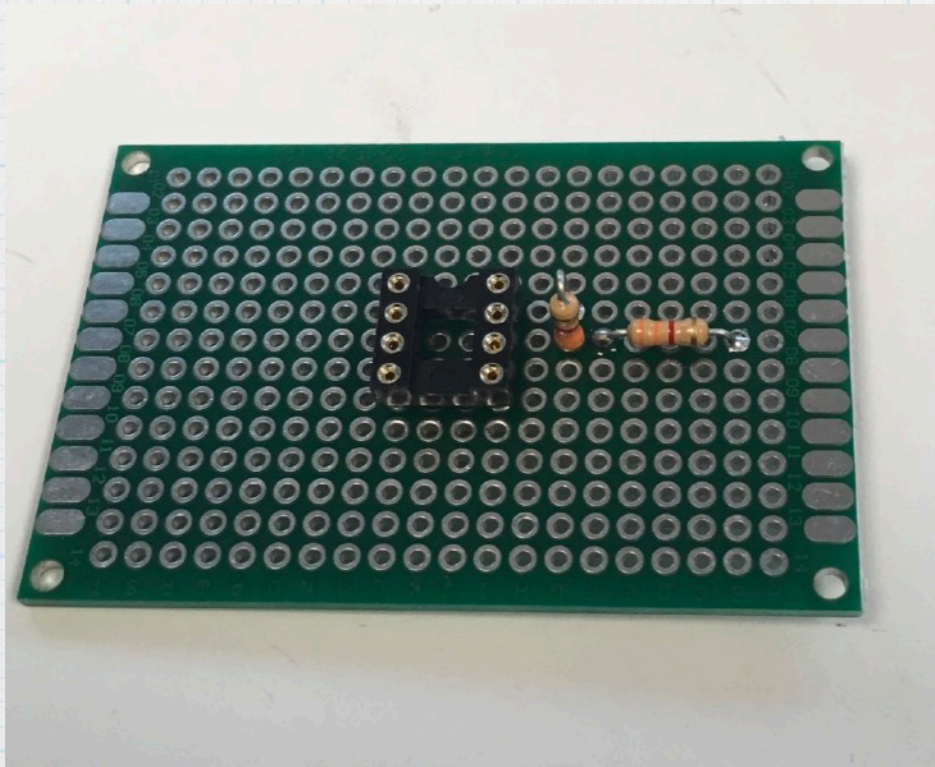
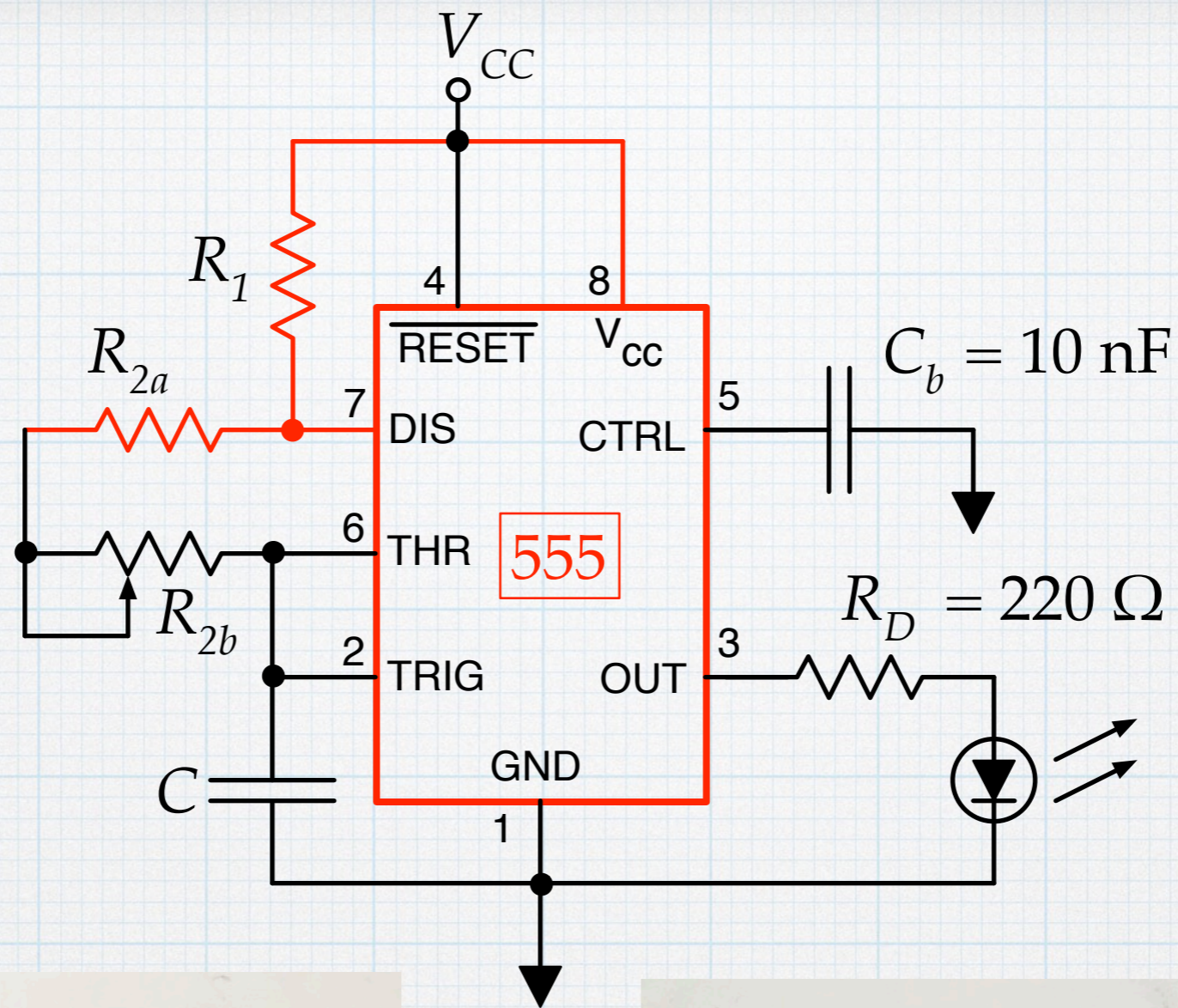
Tape it in place, unless you have a helper or 4 arms.



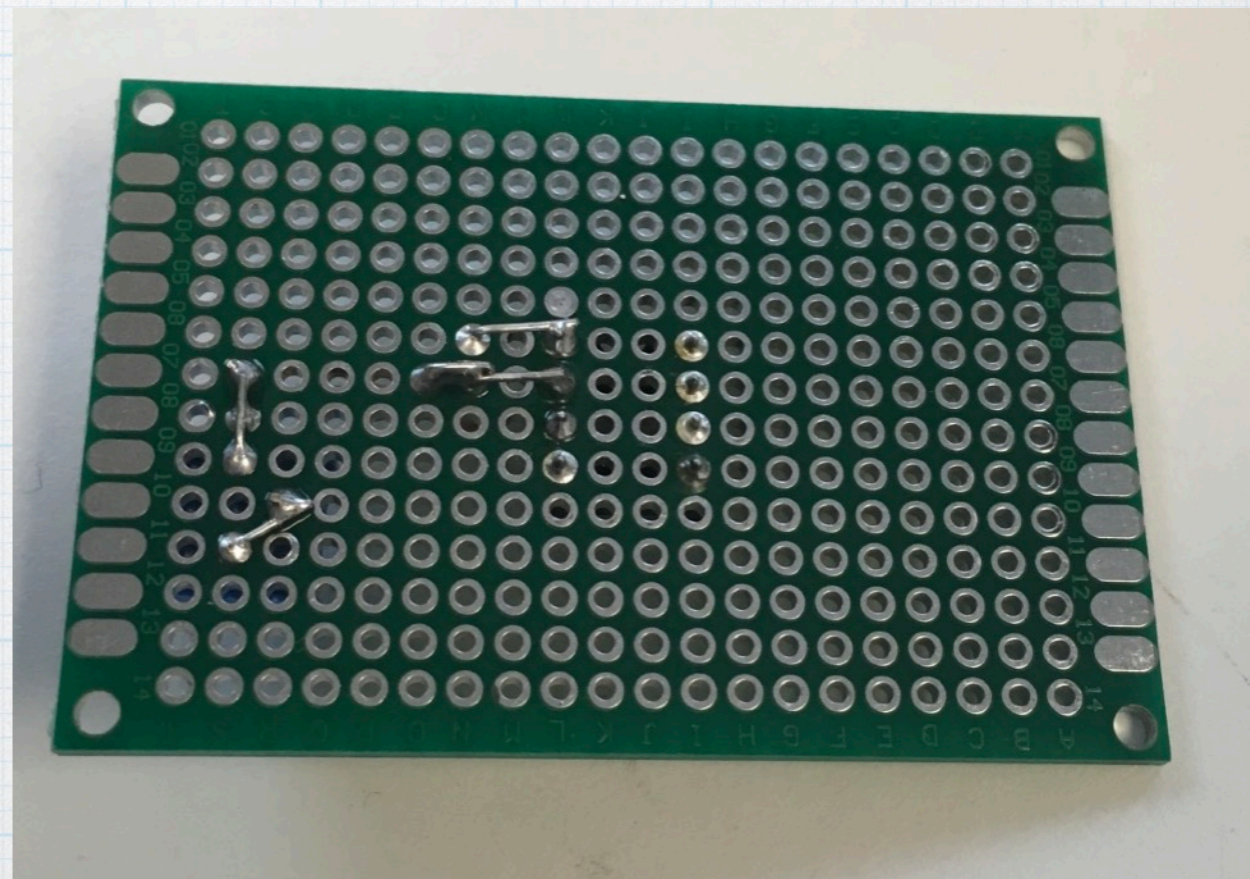
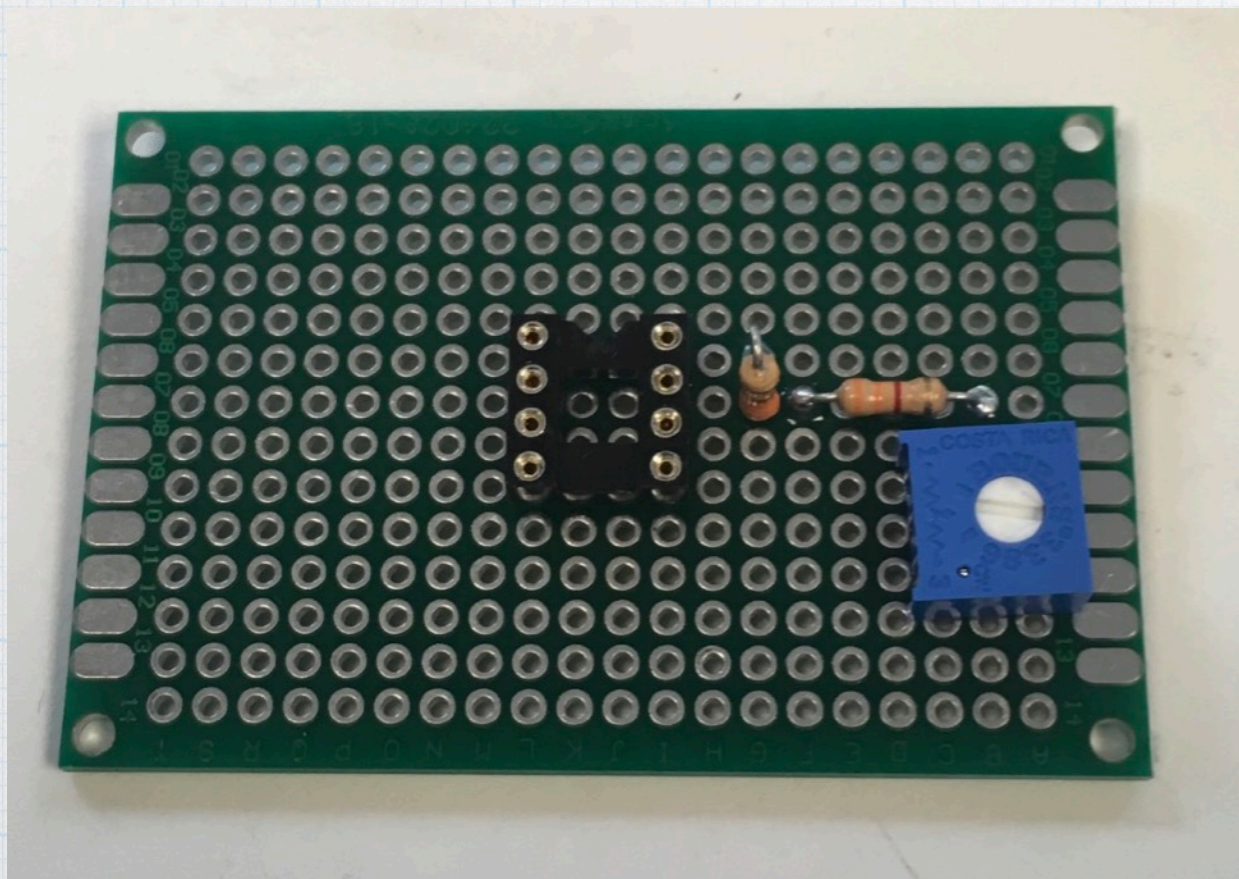
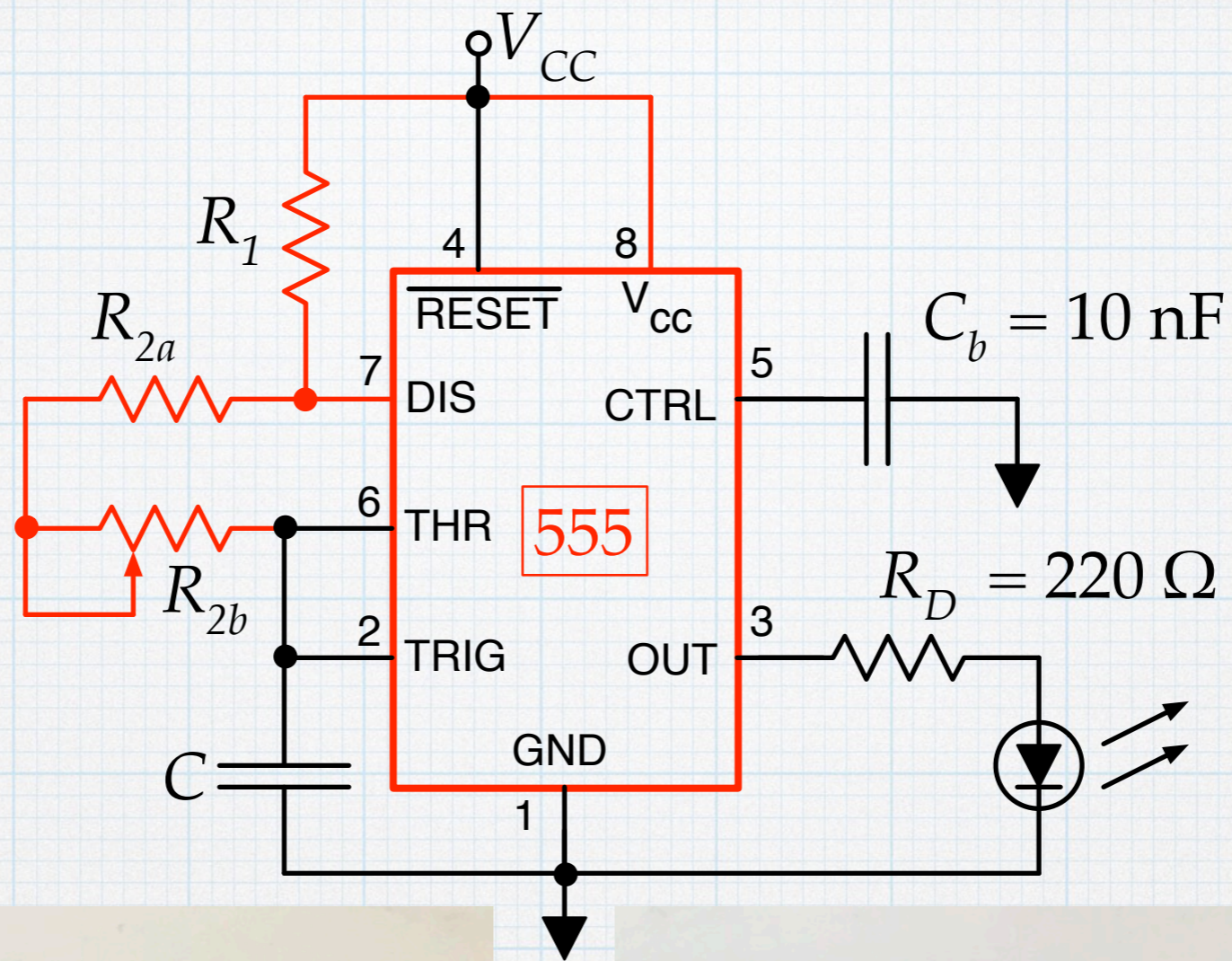
$R_1$



$R_{2a}$

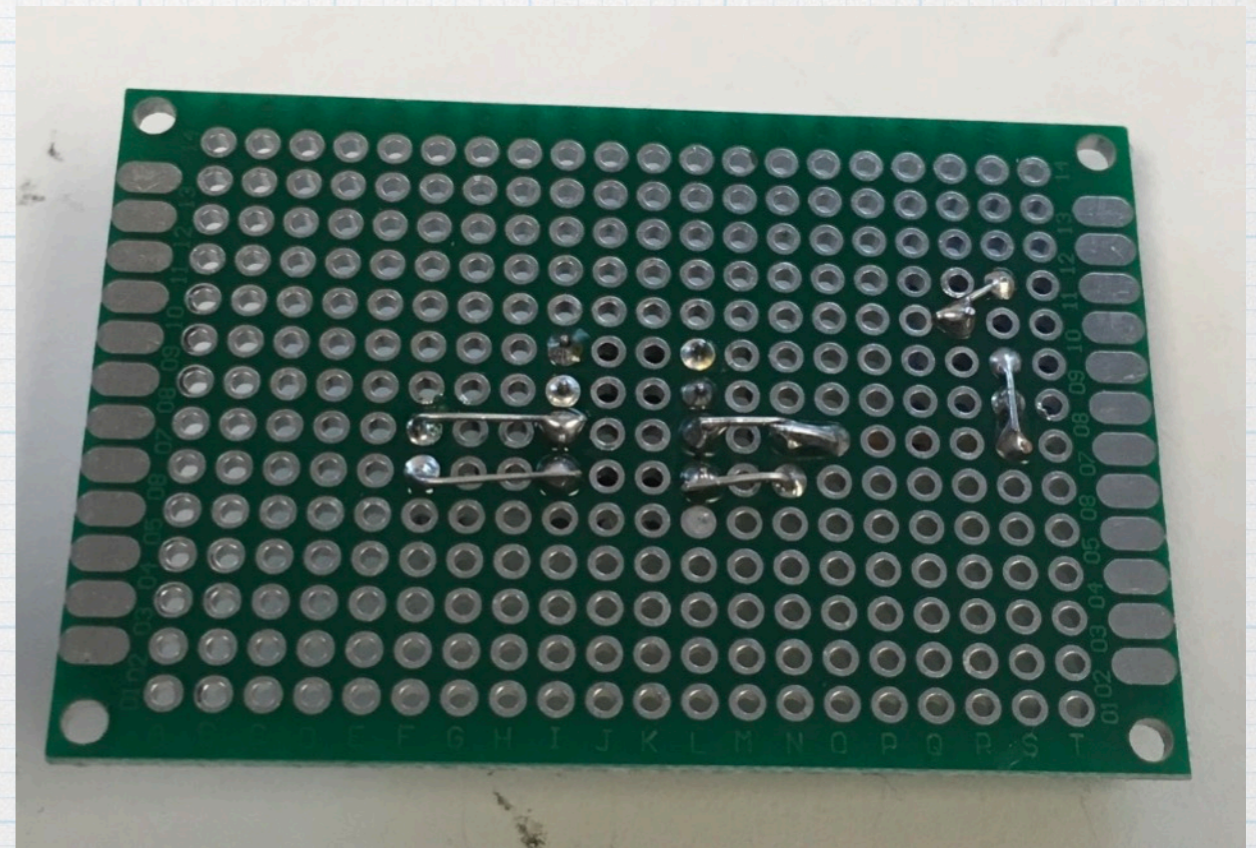
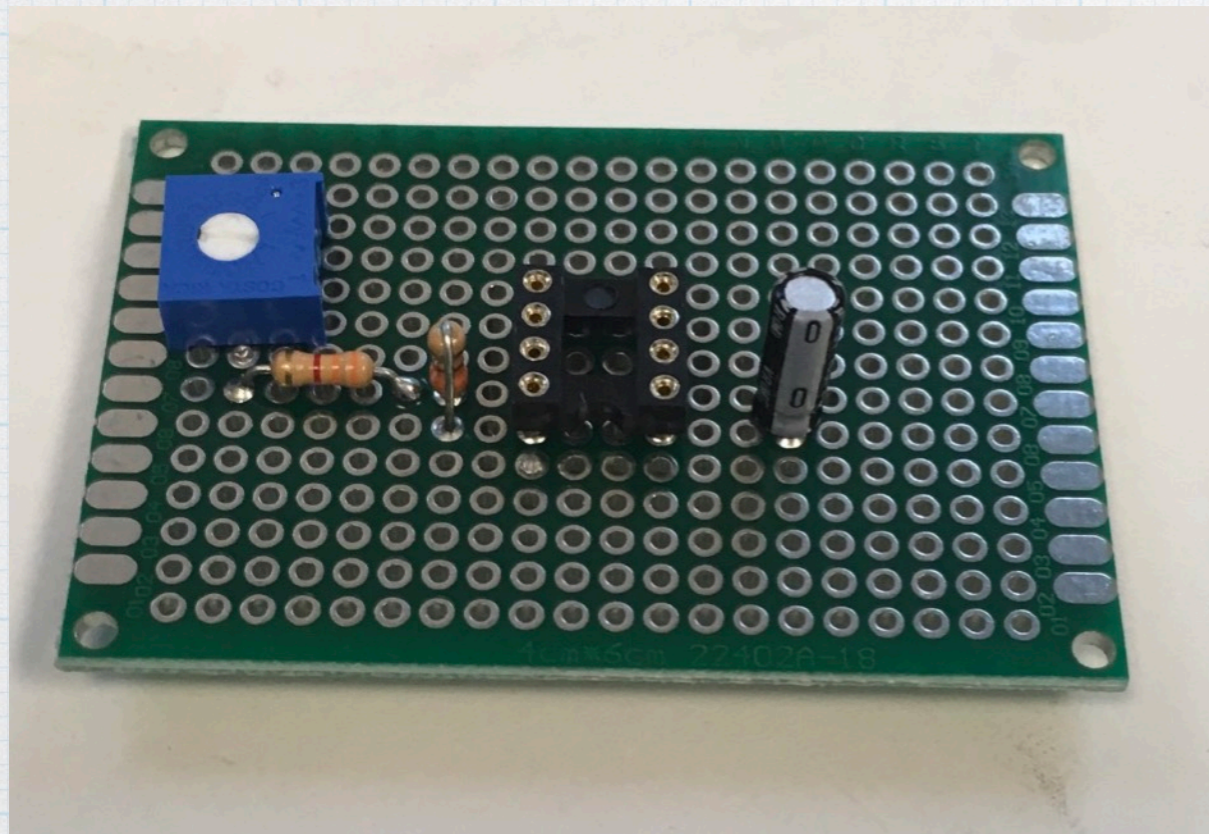
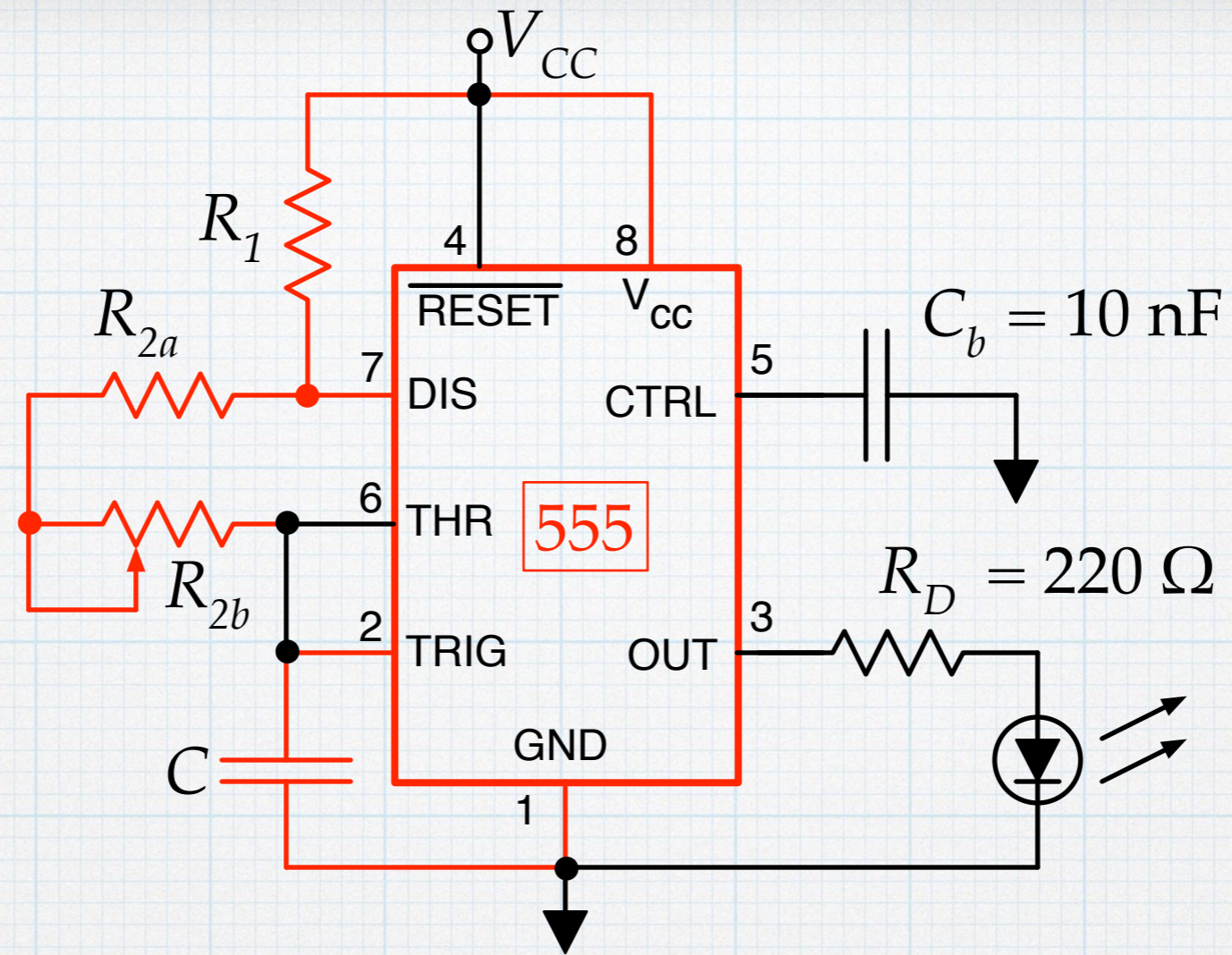


$R_{2b}$

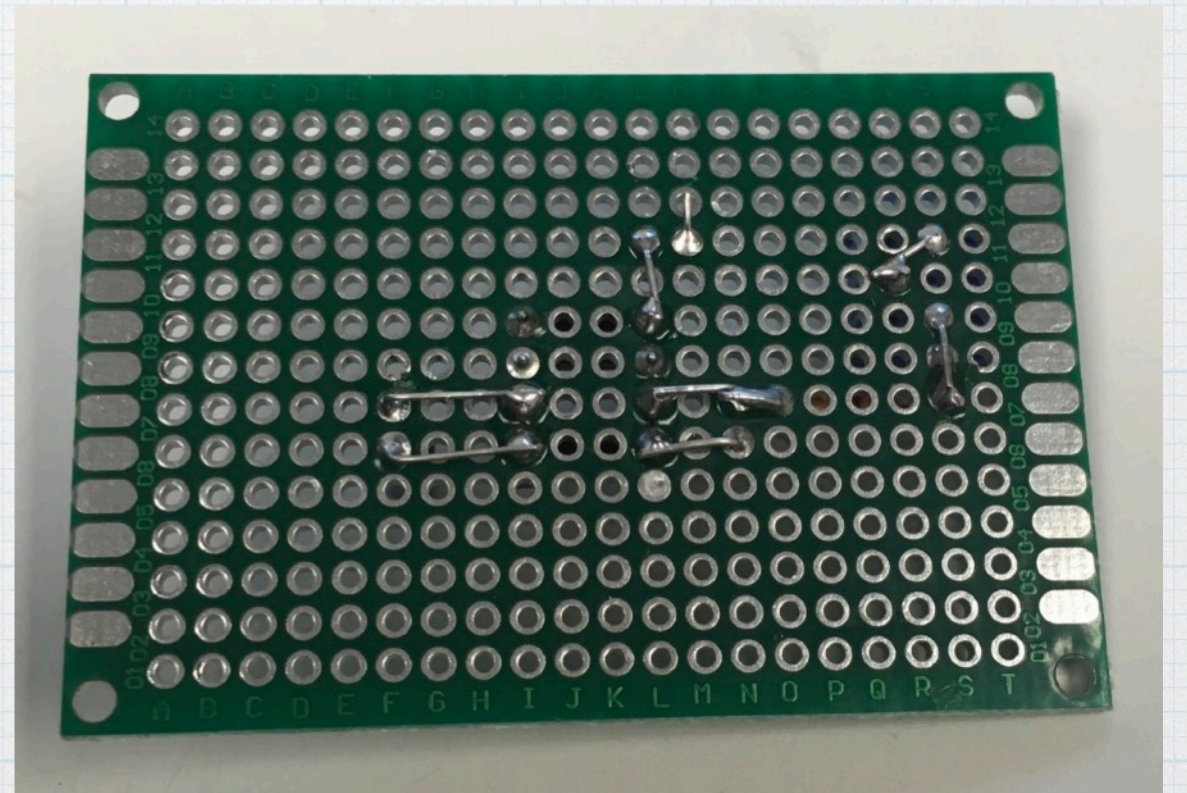
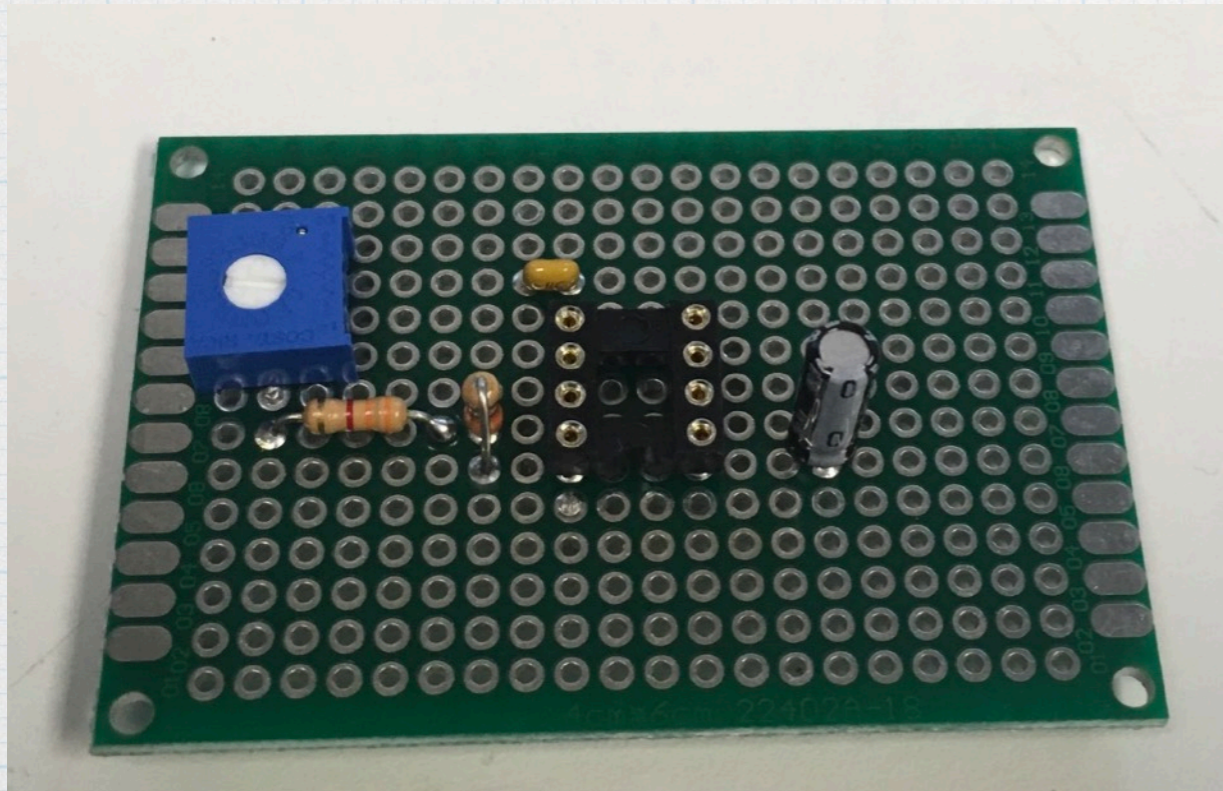
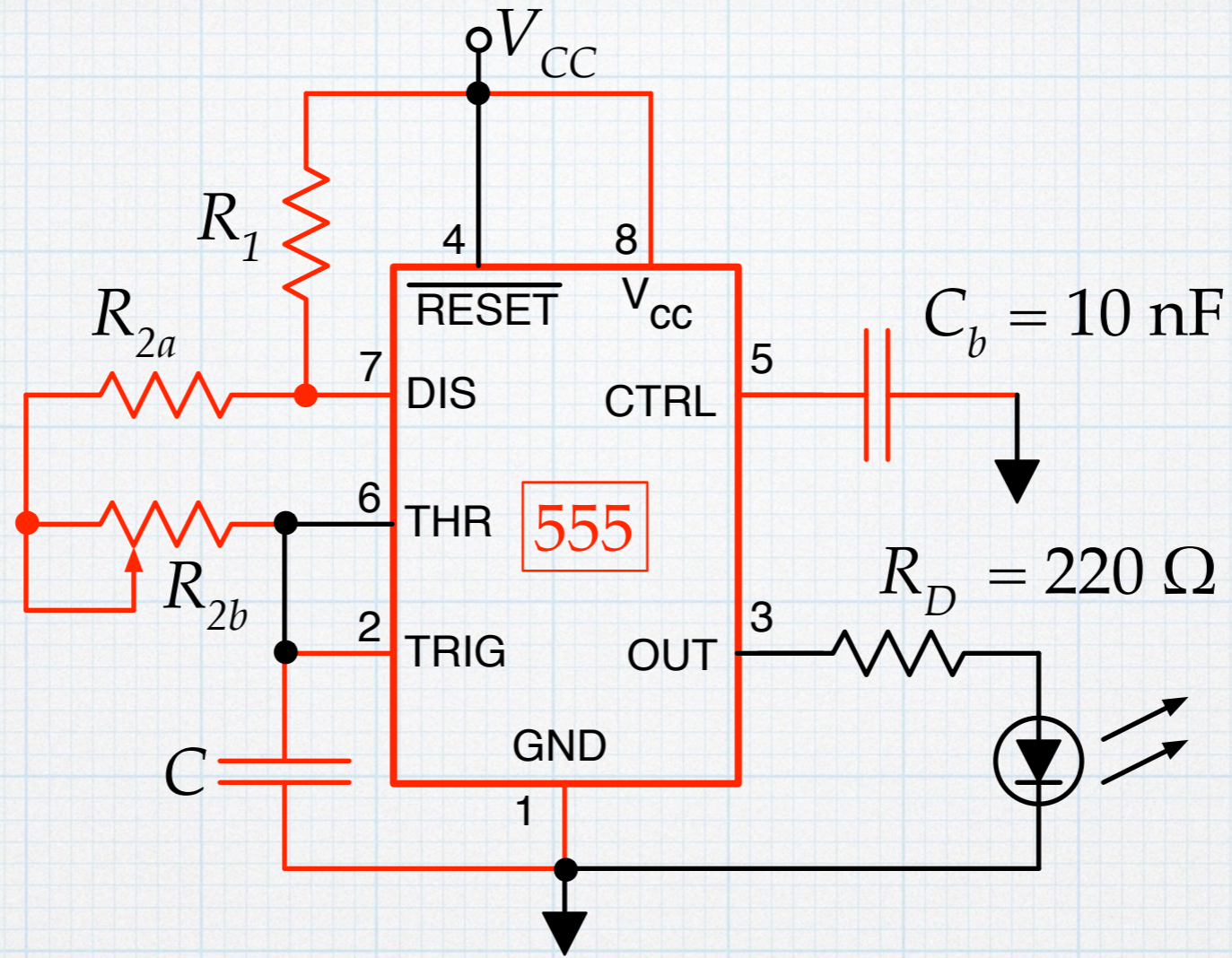




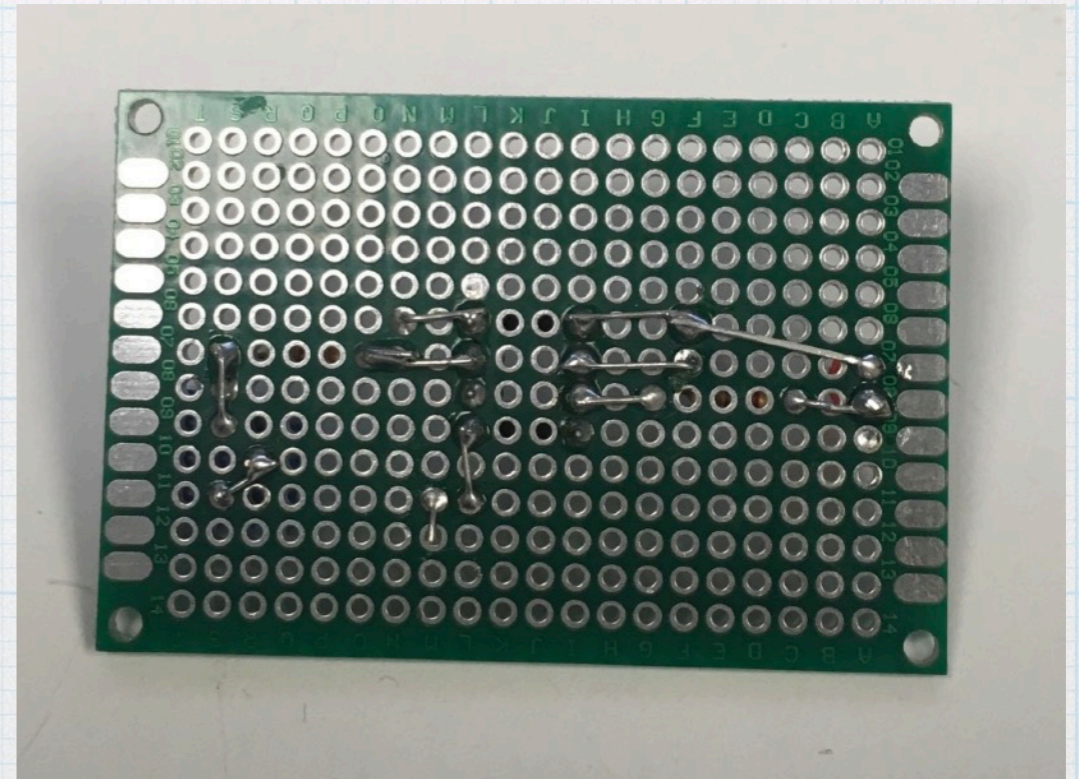
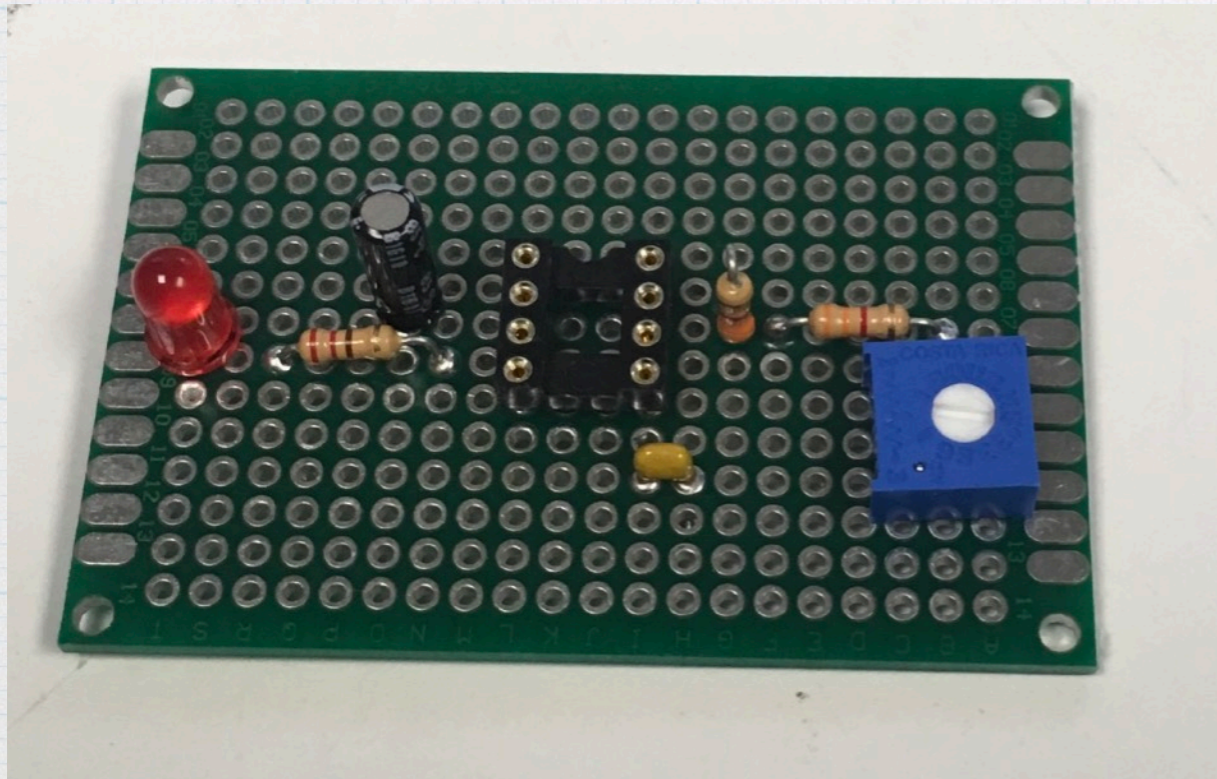
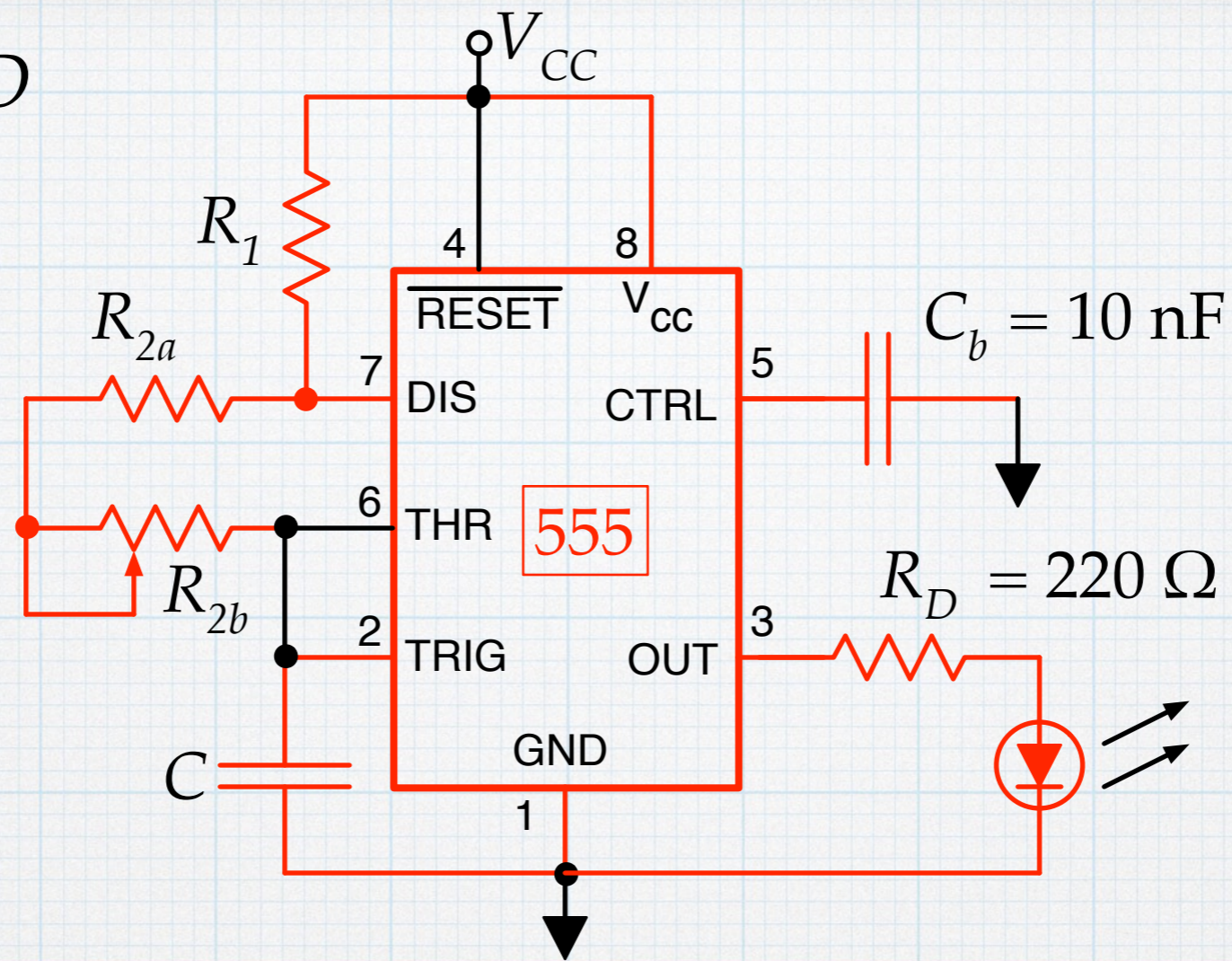
C



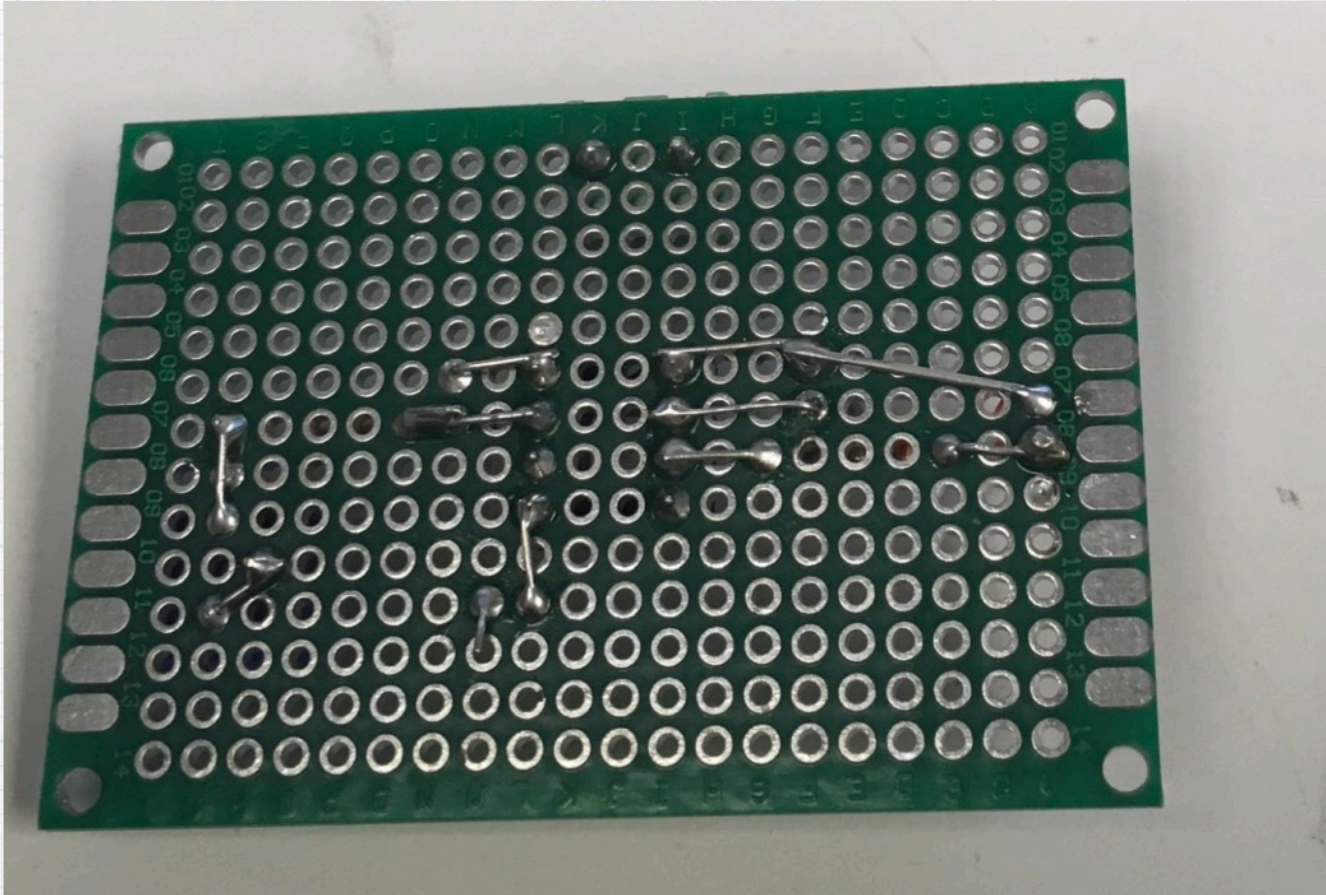
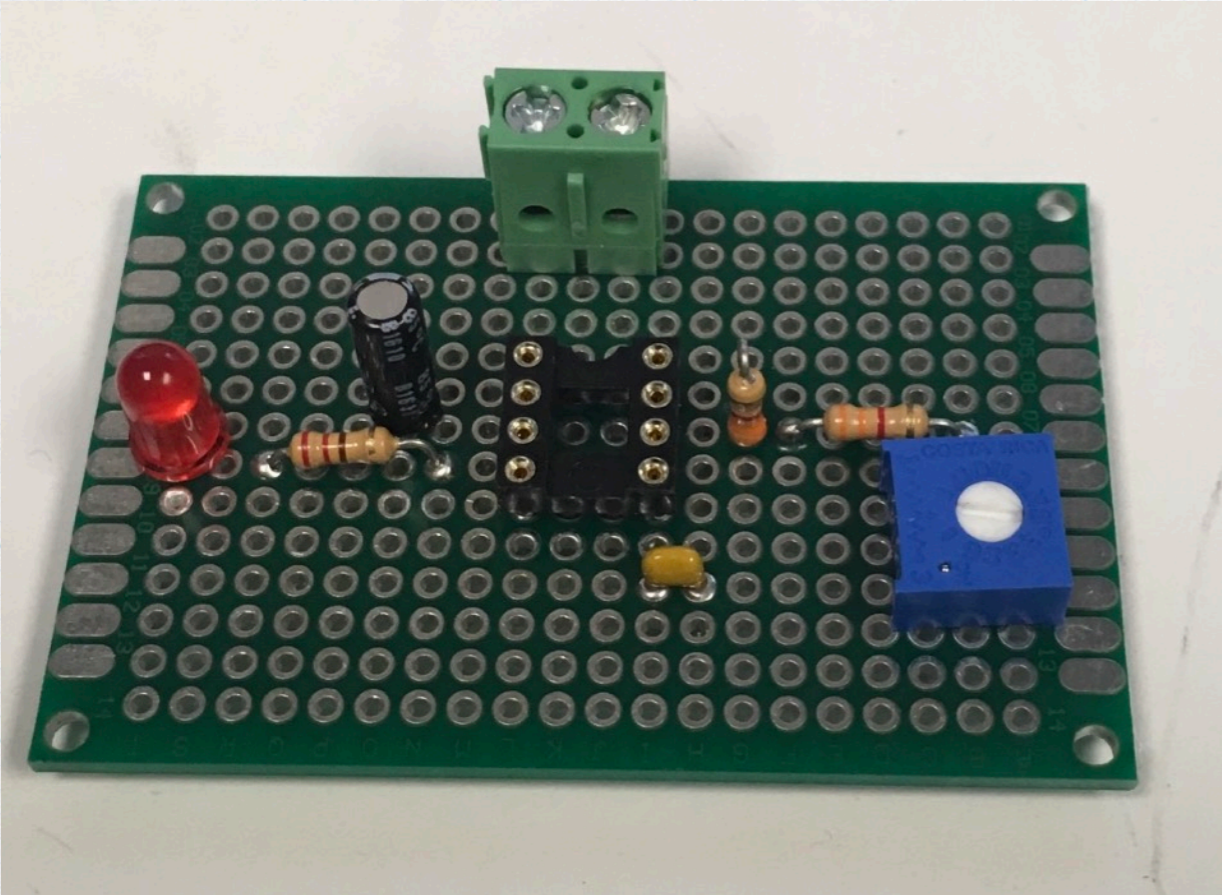
$C_b$



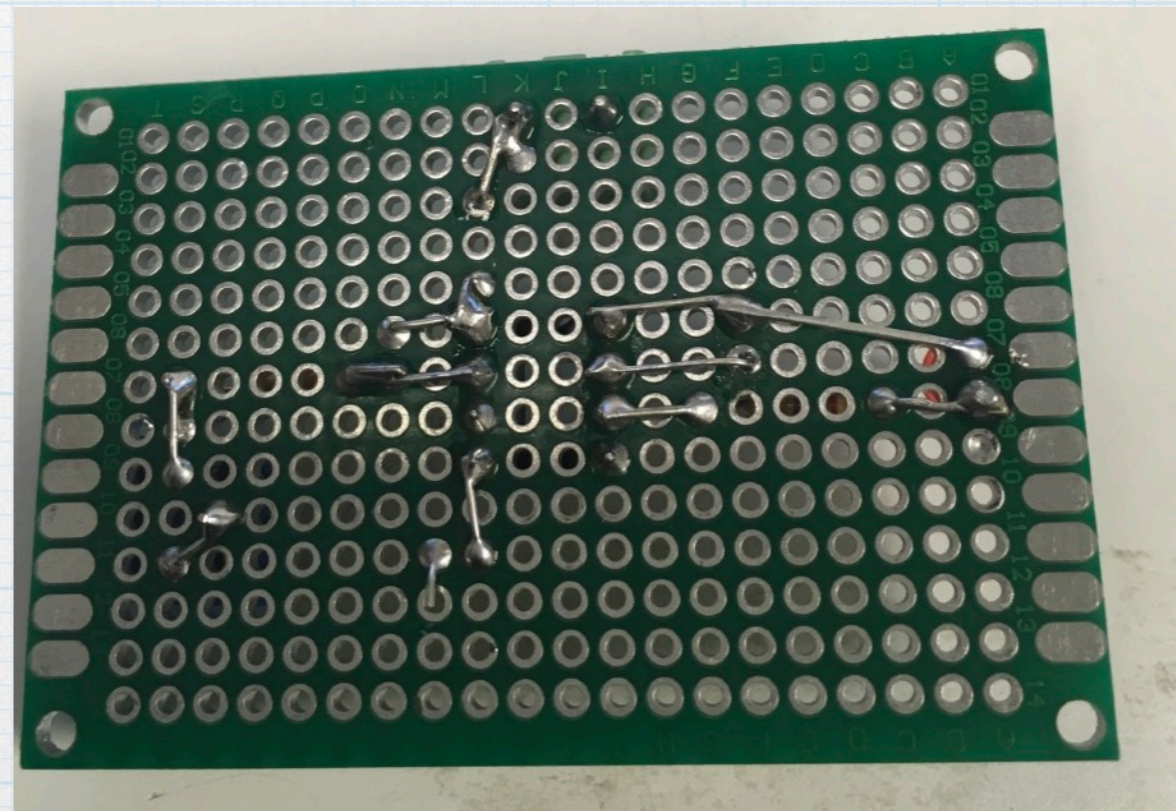
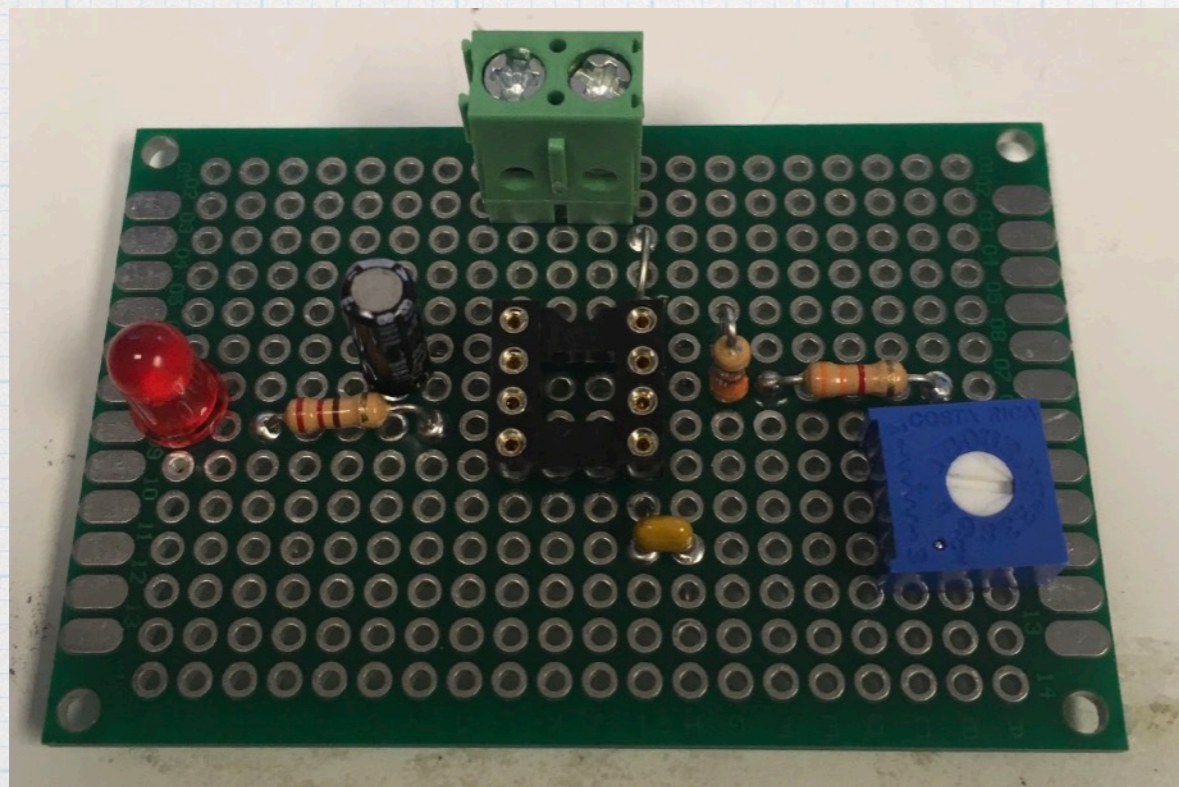
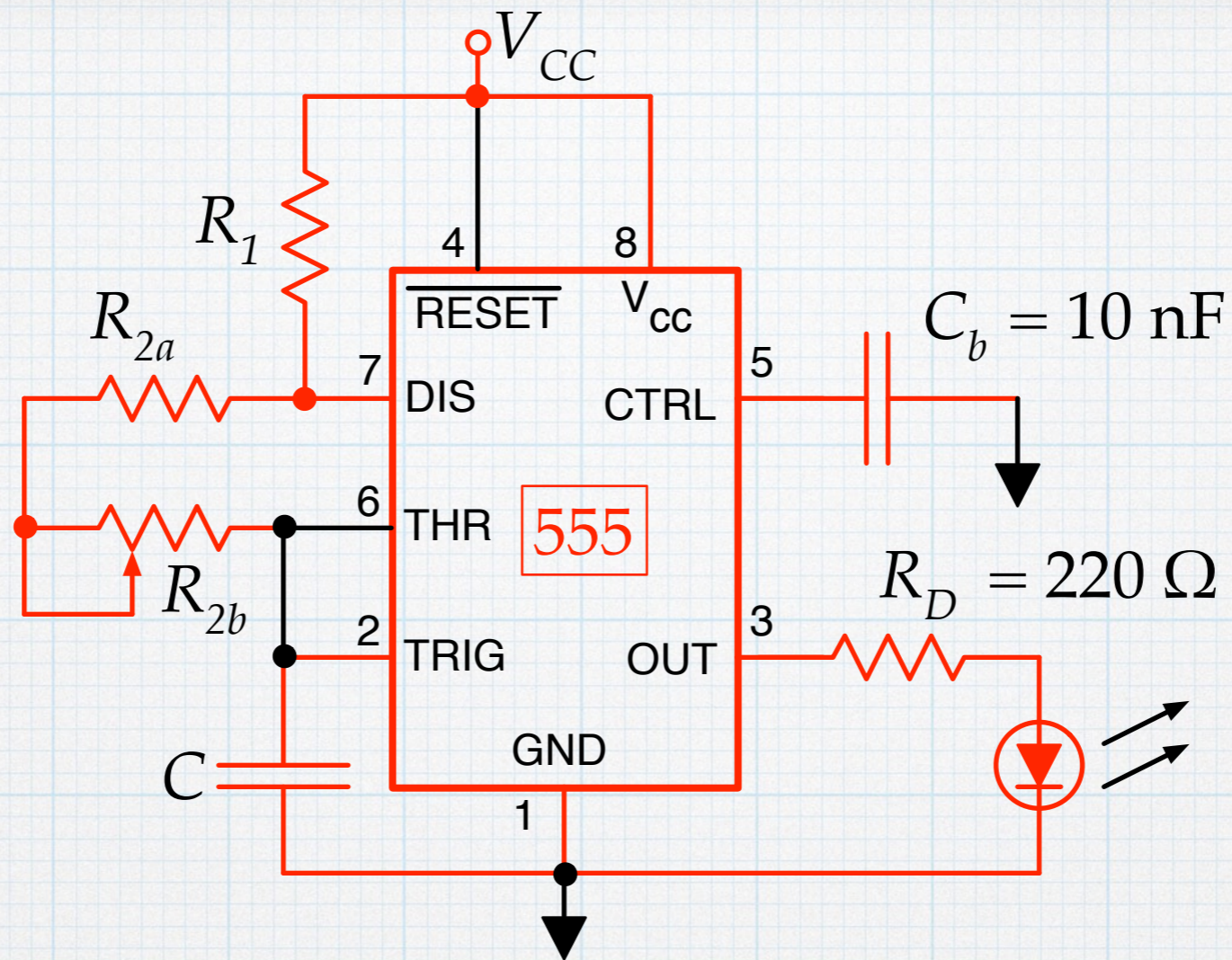
# LED and $R_D$



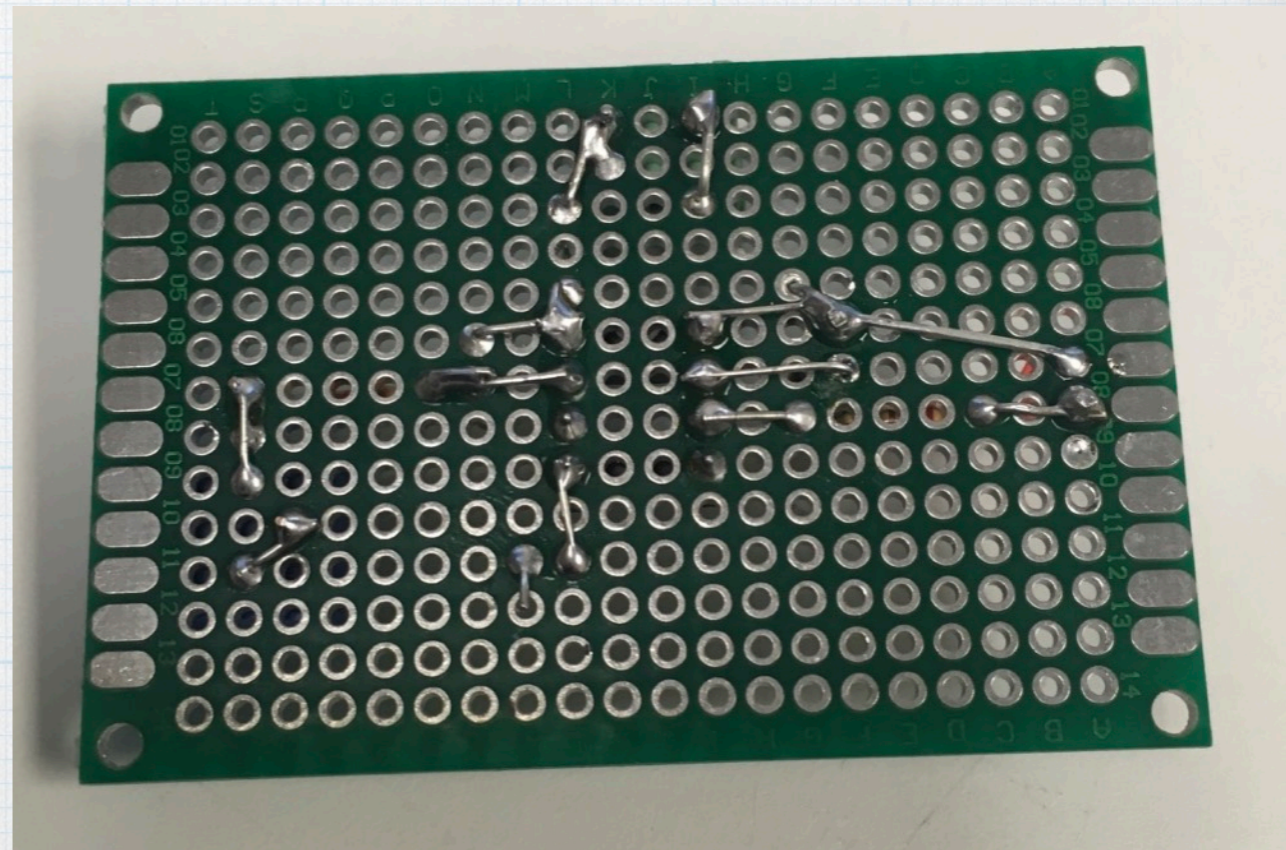
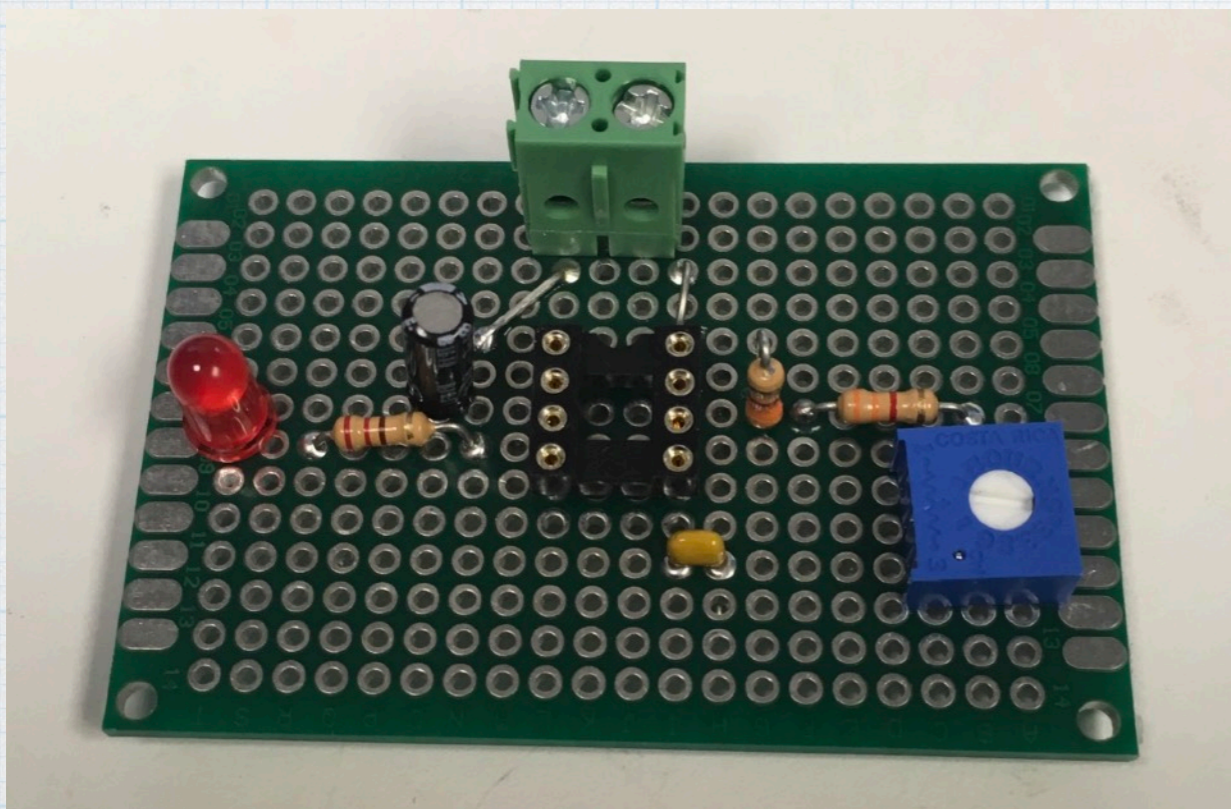
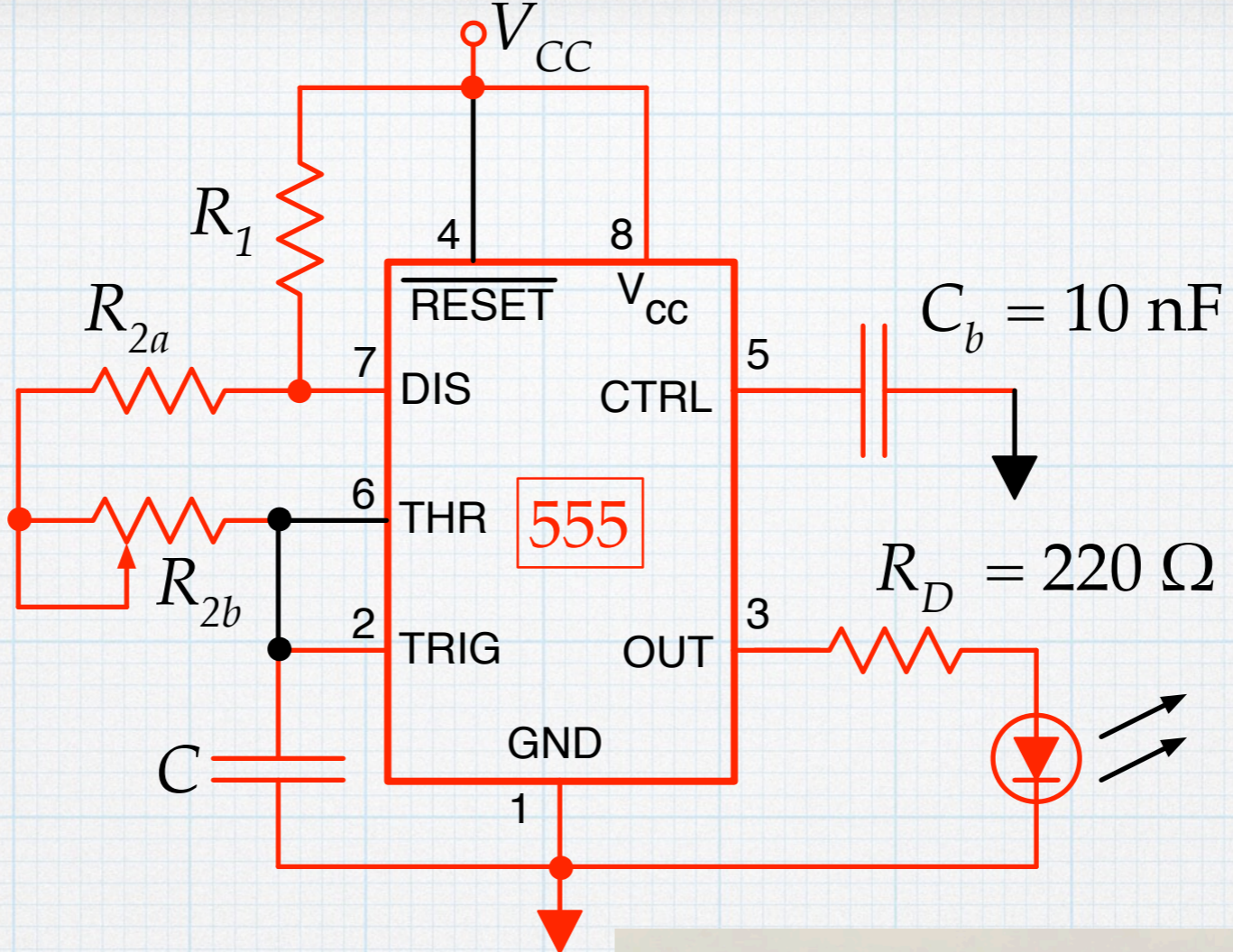
# connector for battery (power)



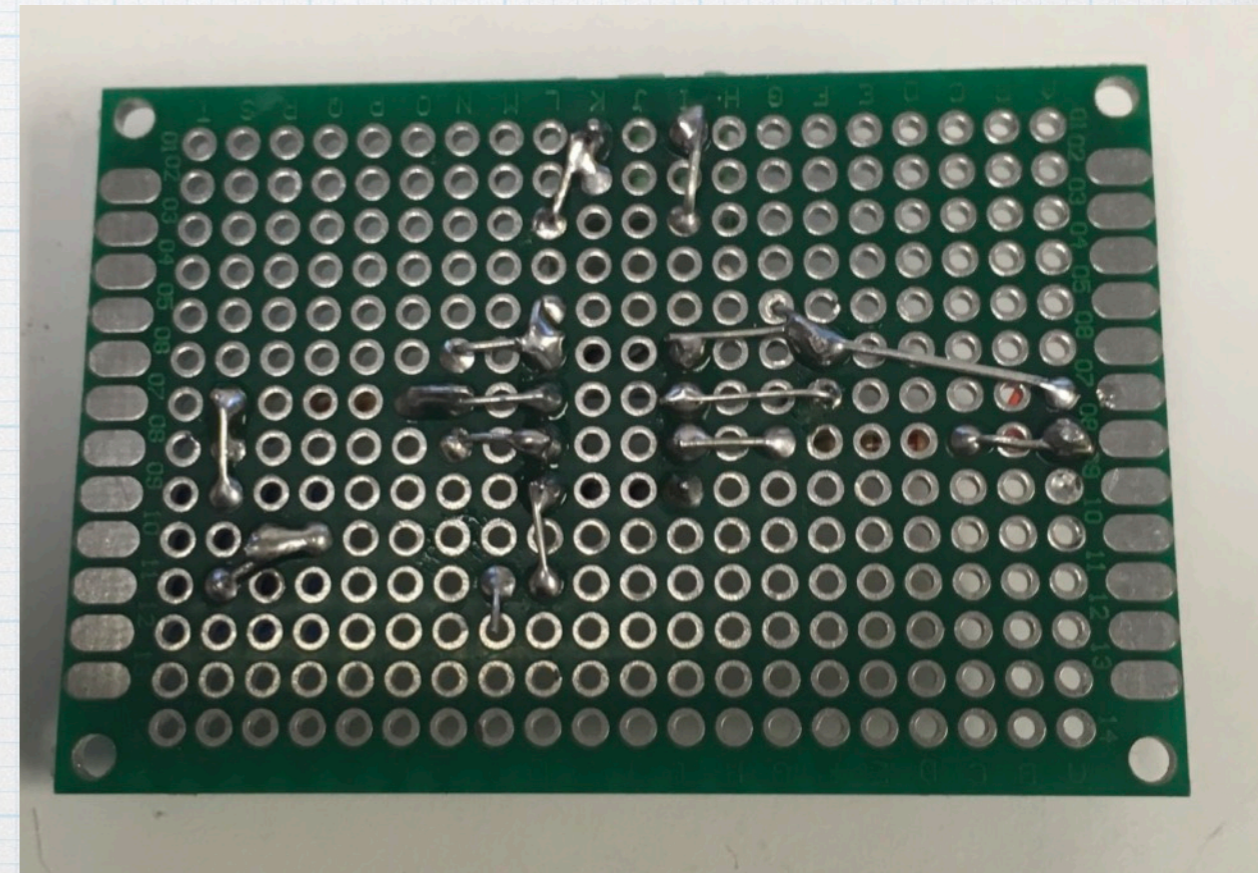
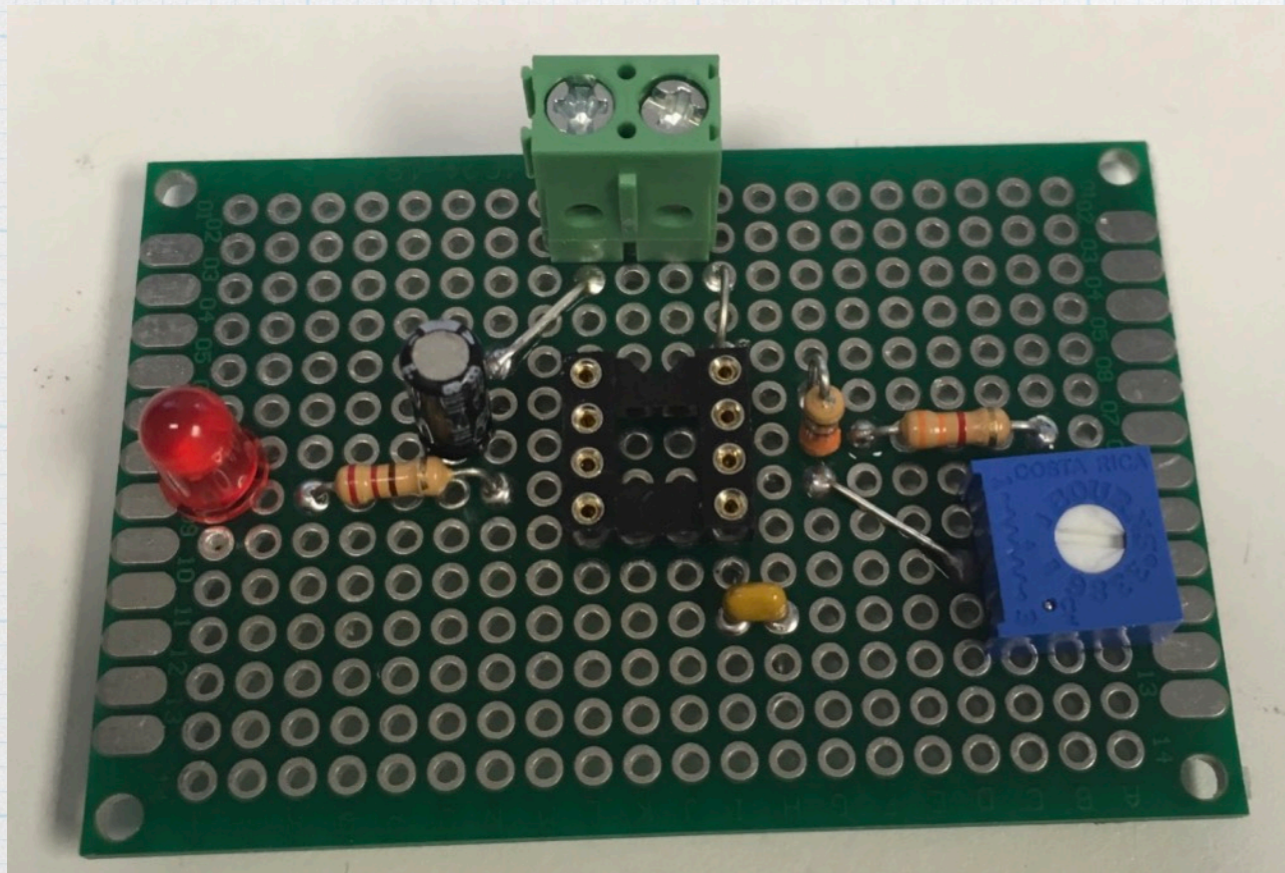
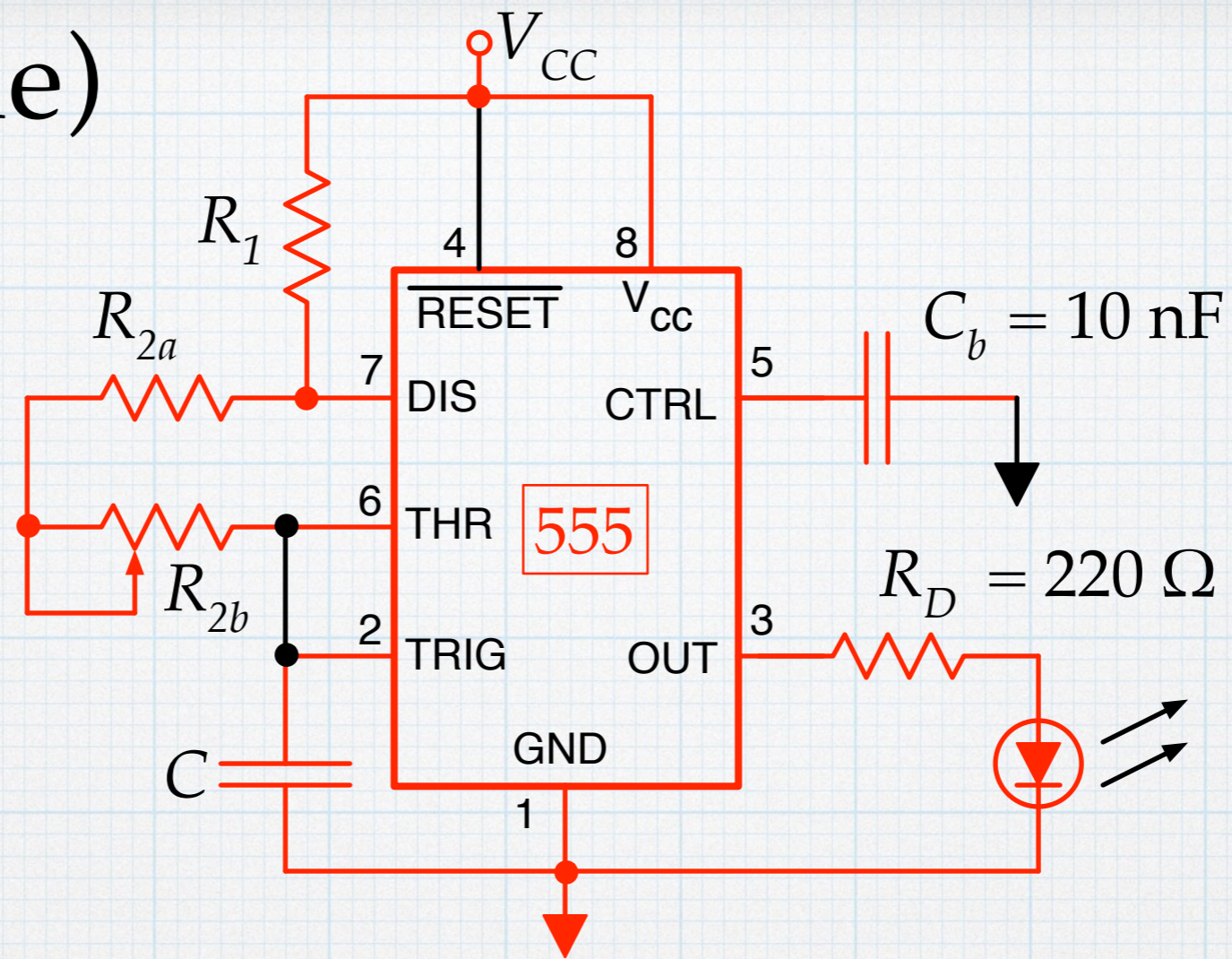
$V_{CC}$



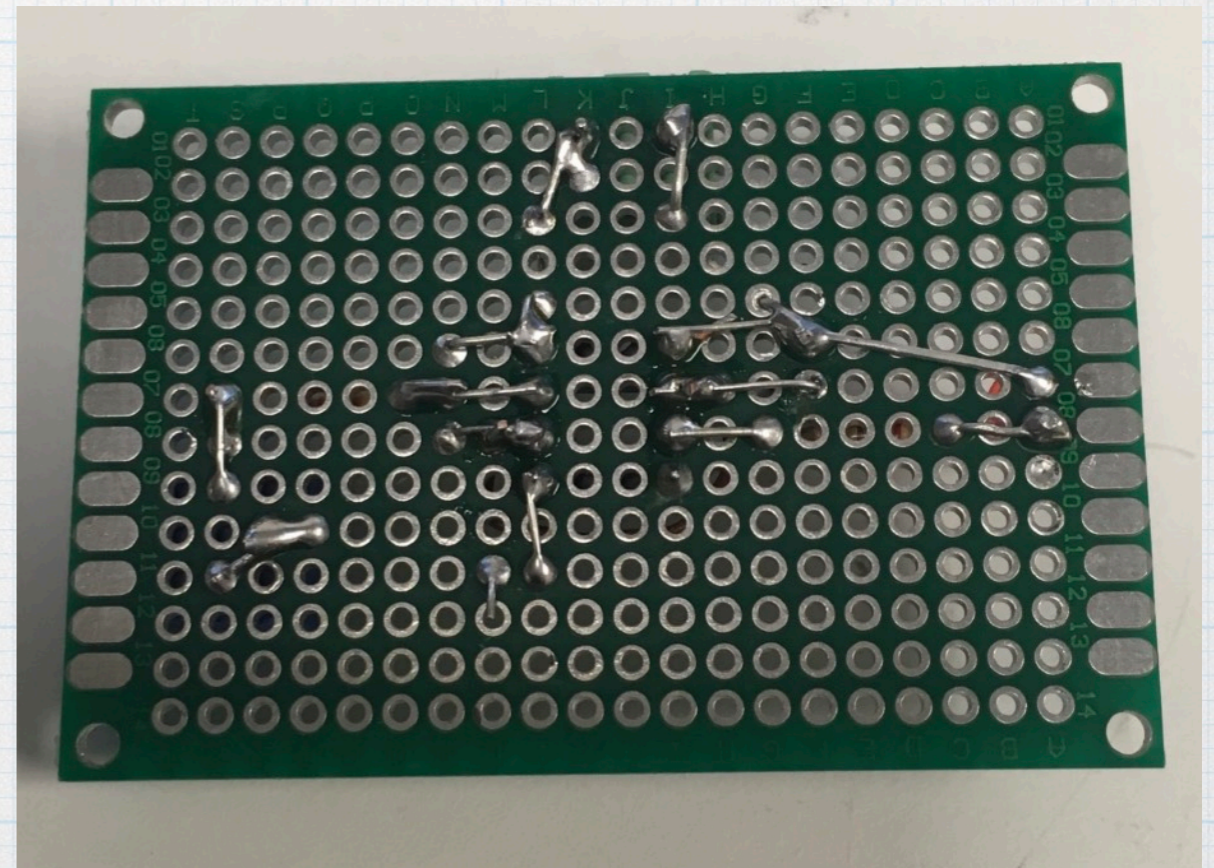
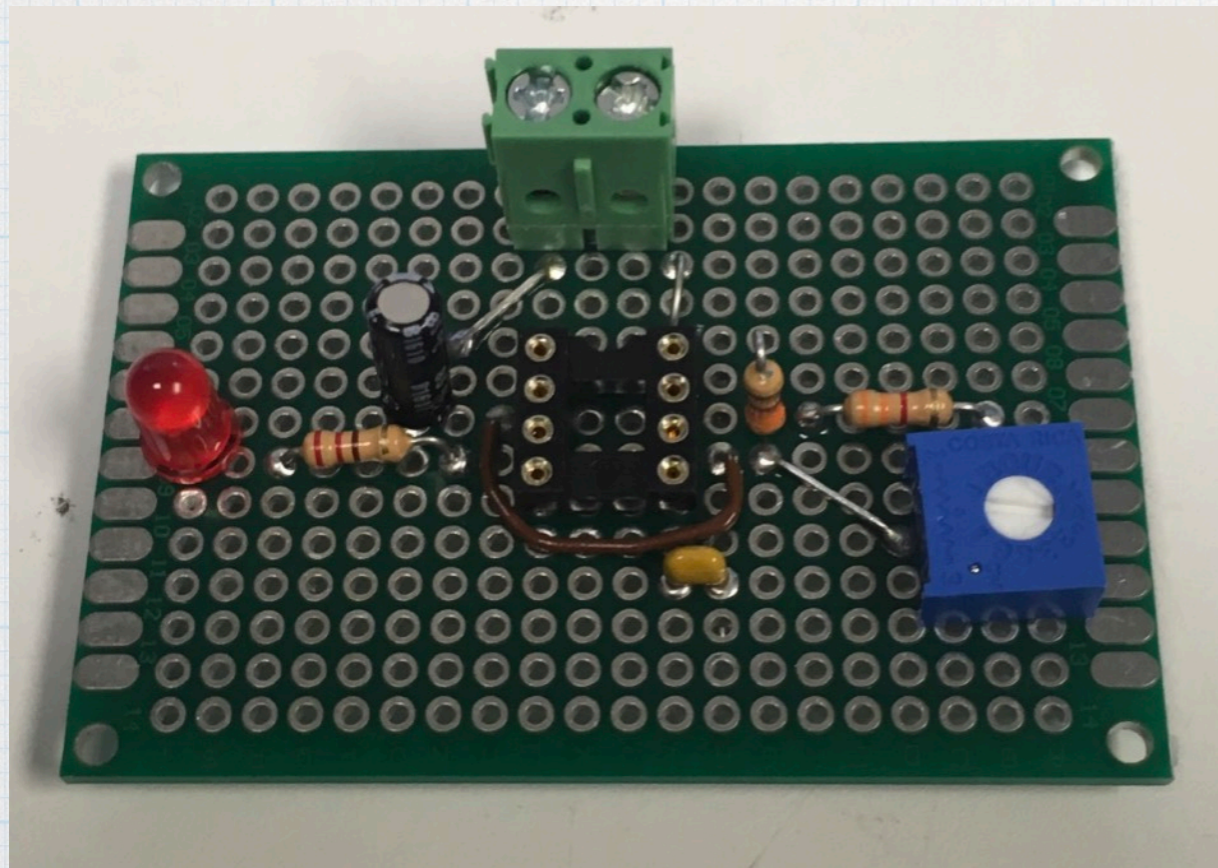
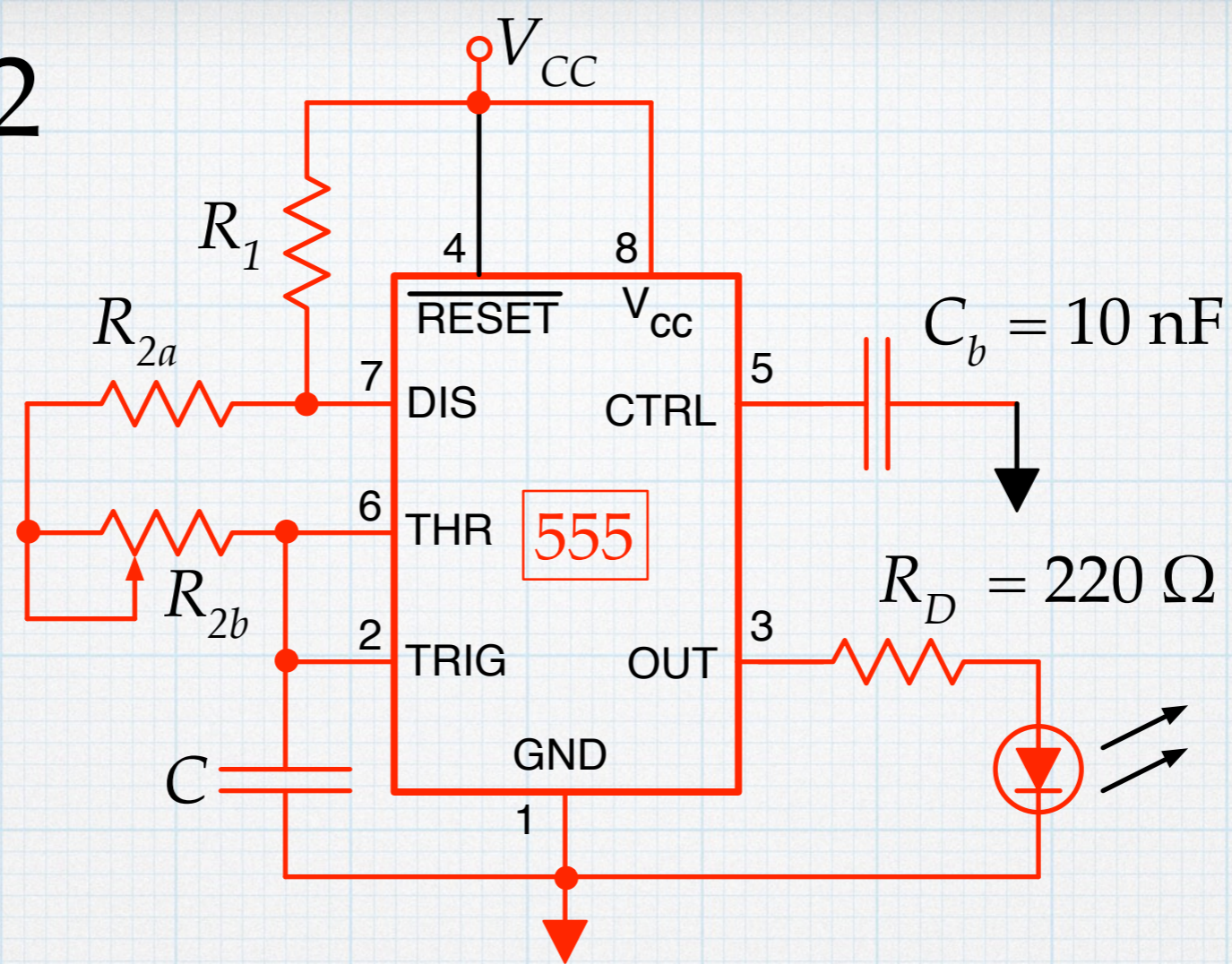
# Ground



# $R_{2b}$ (other side)

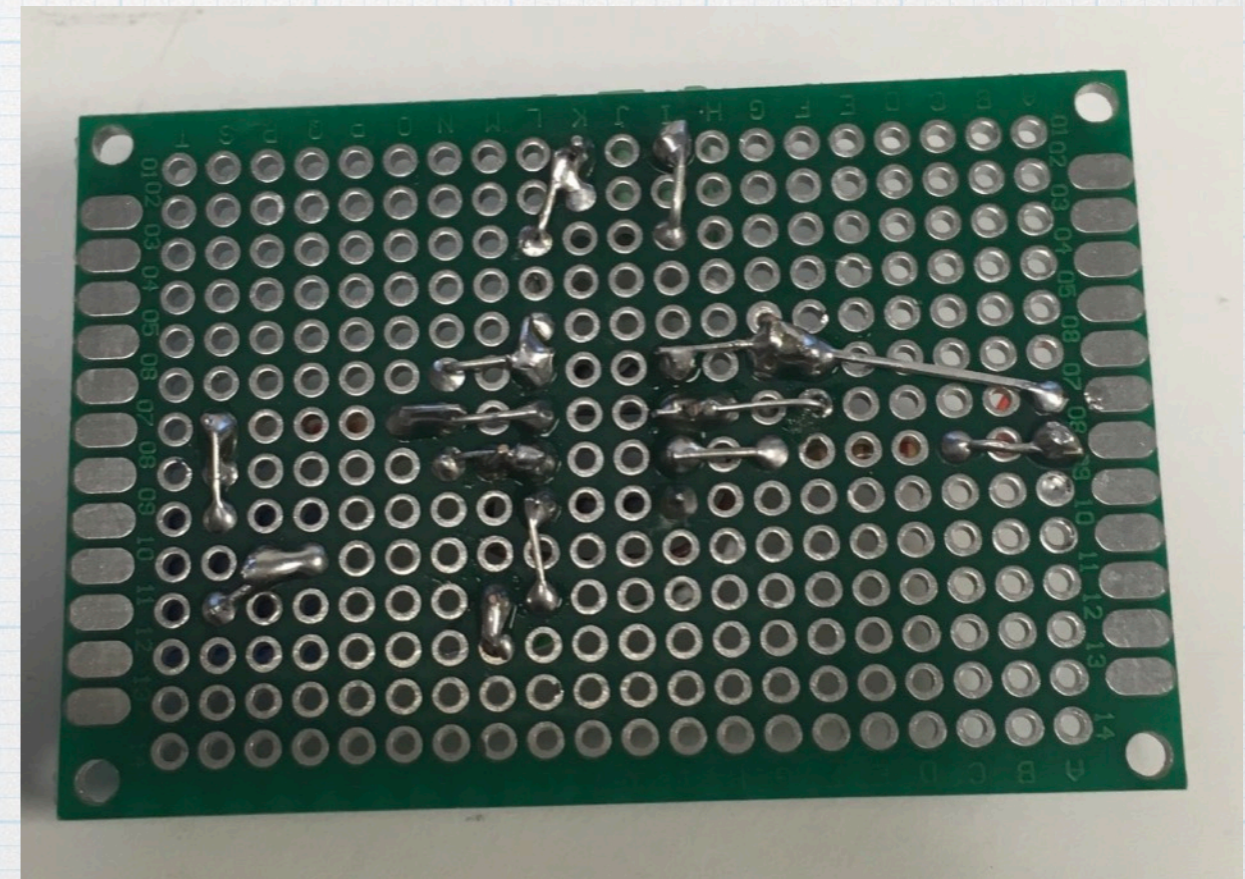
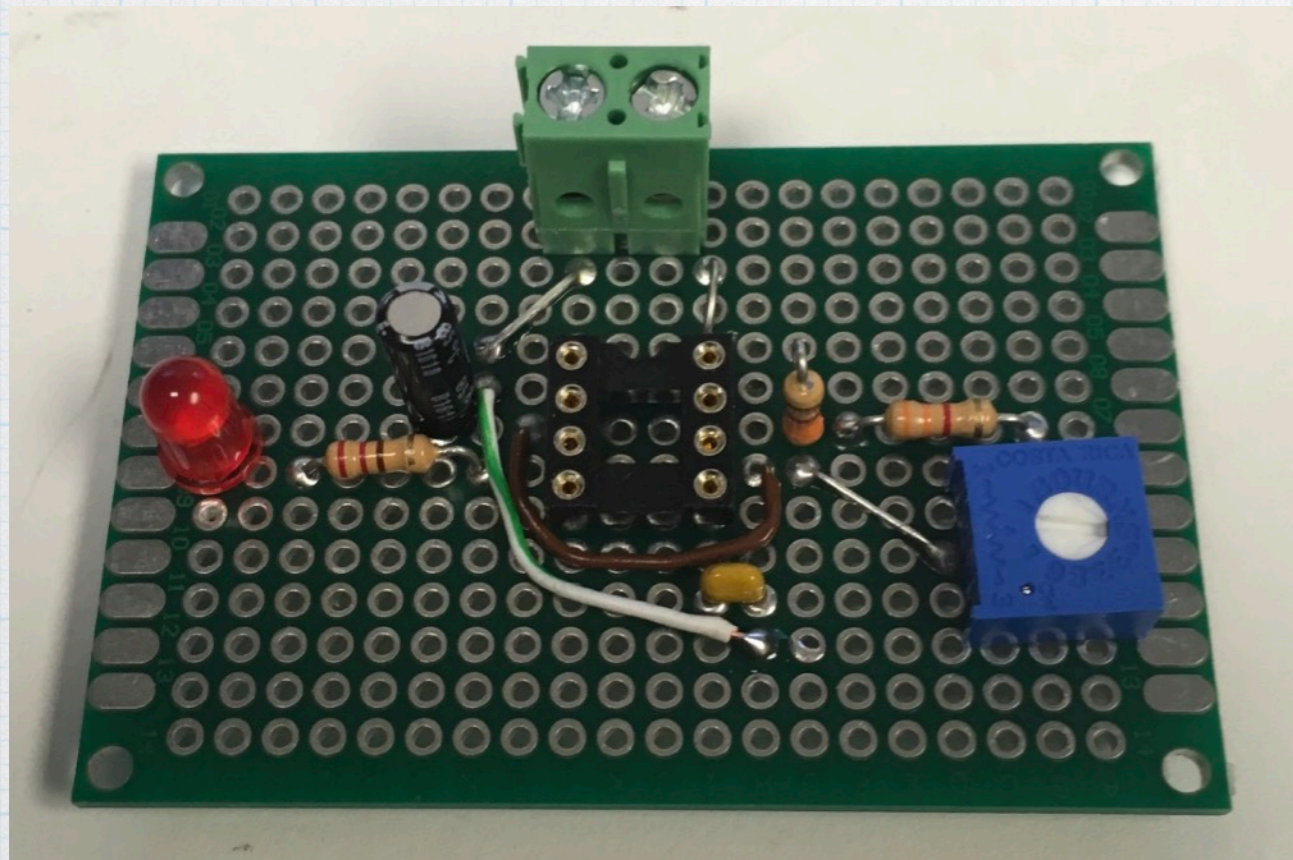
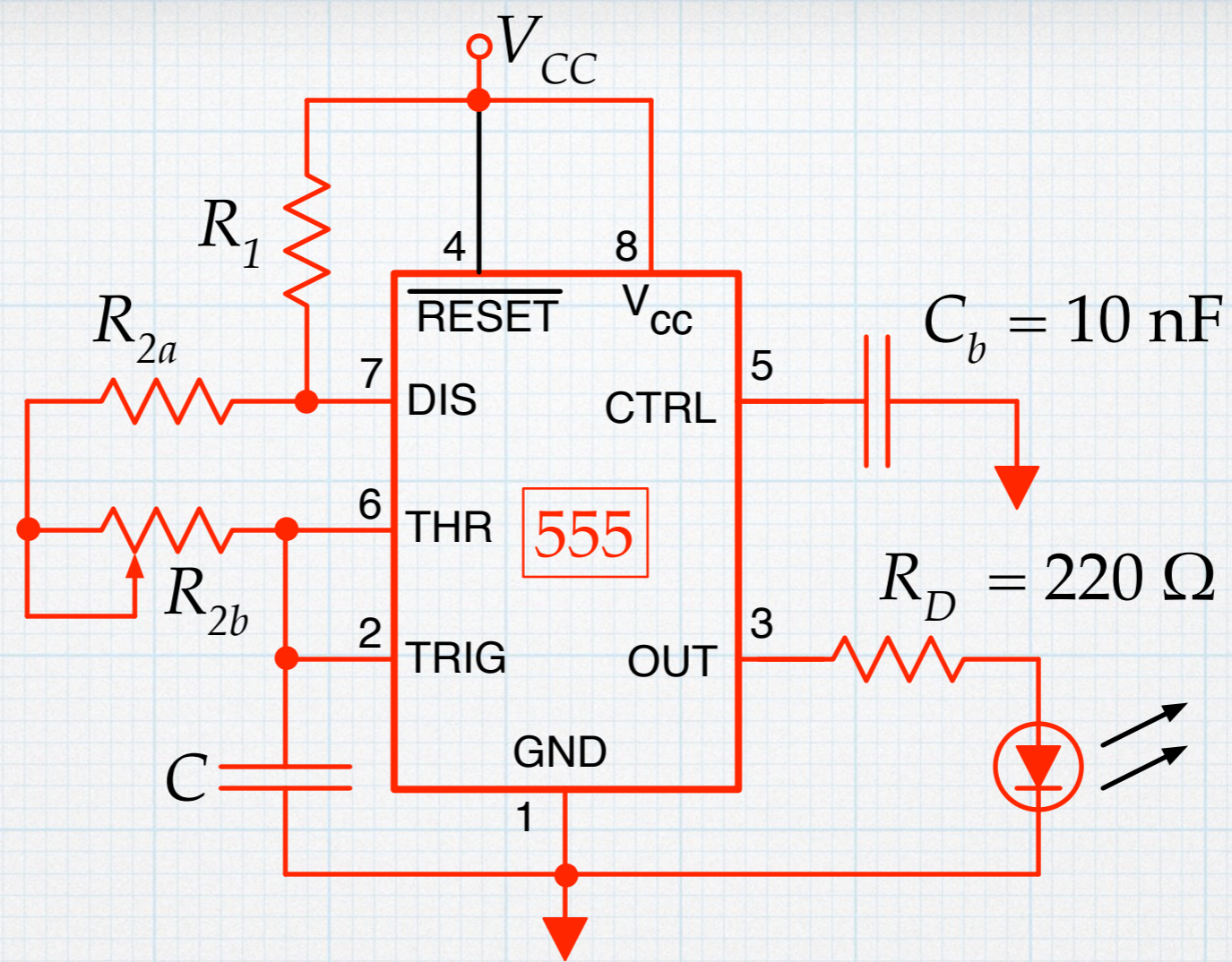


# pin 6 to pin 2

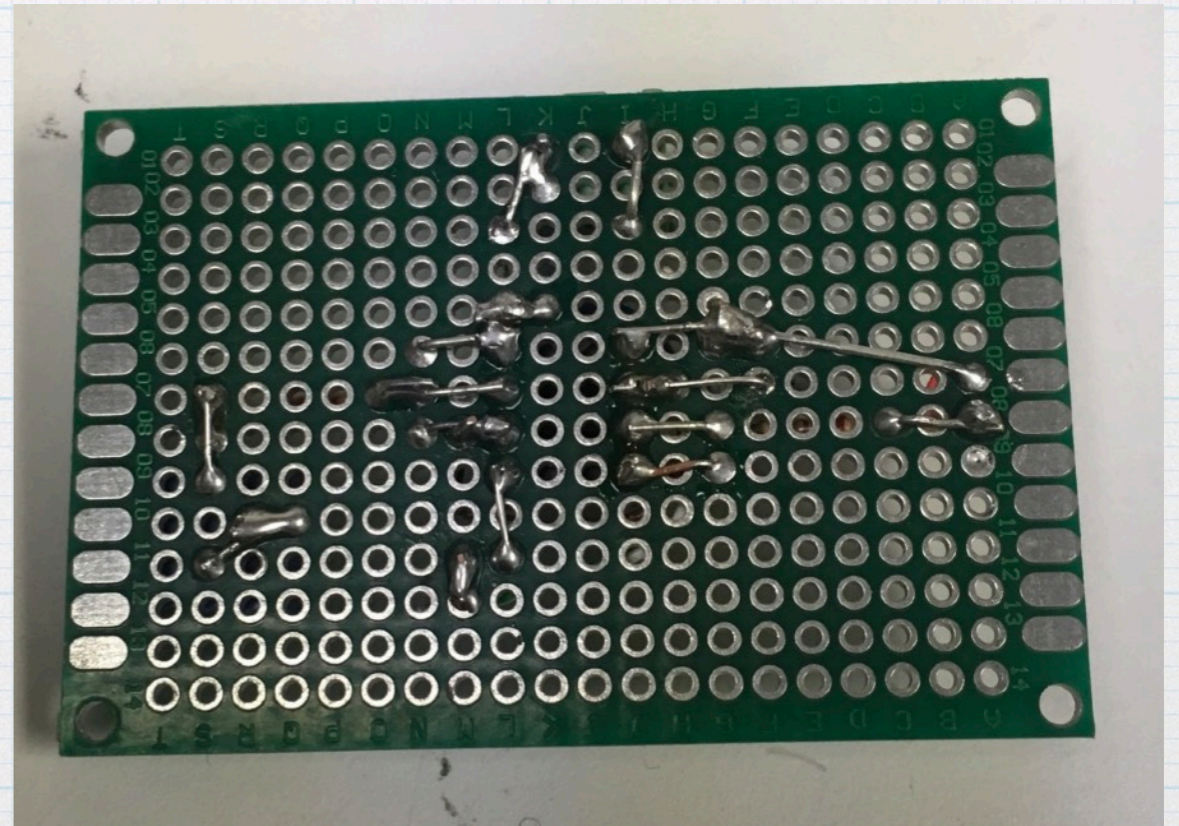
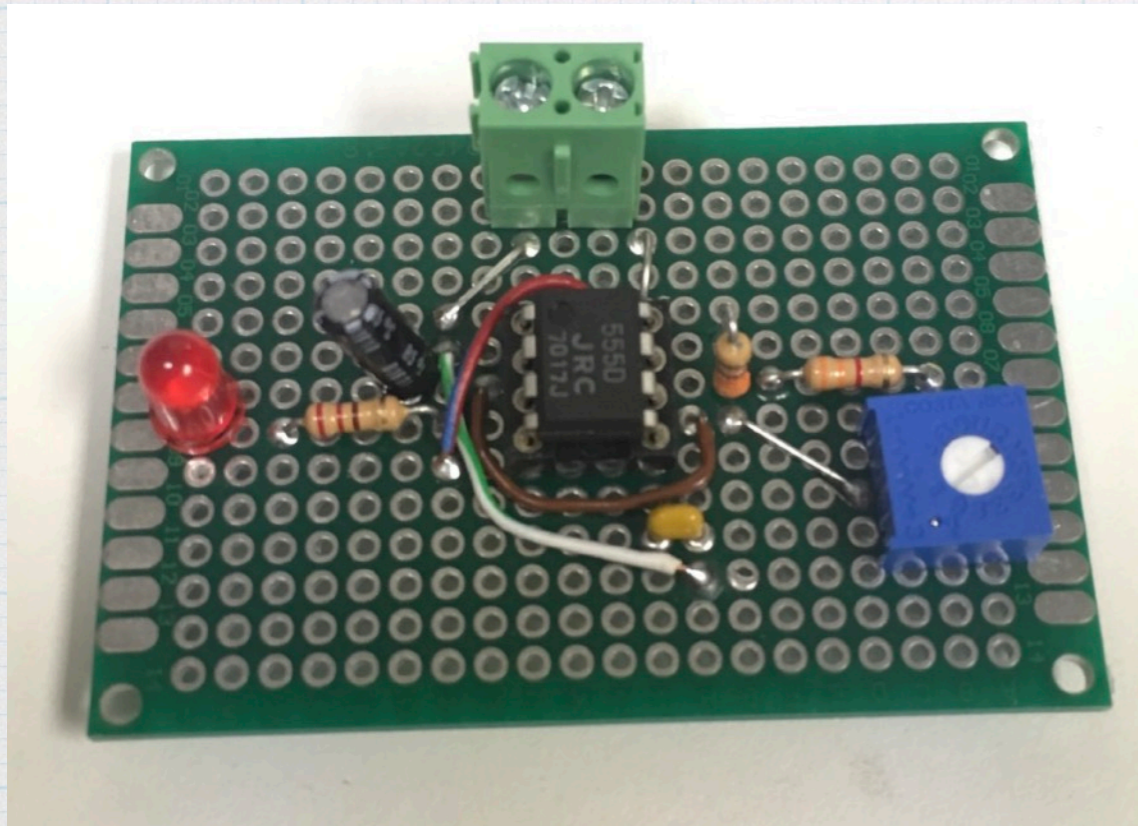
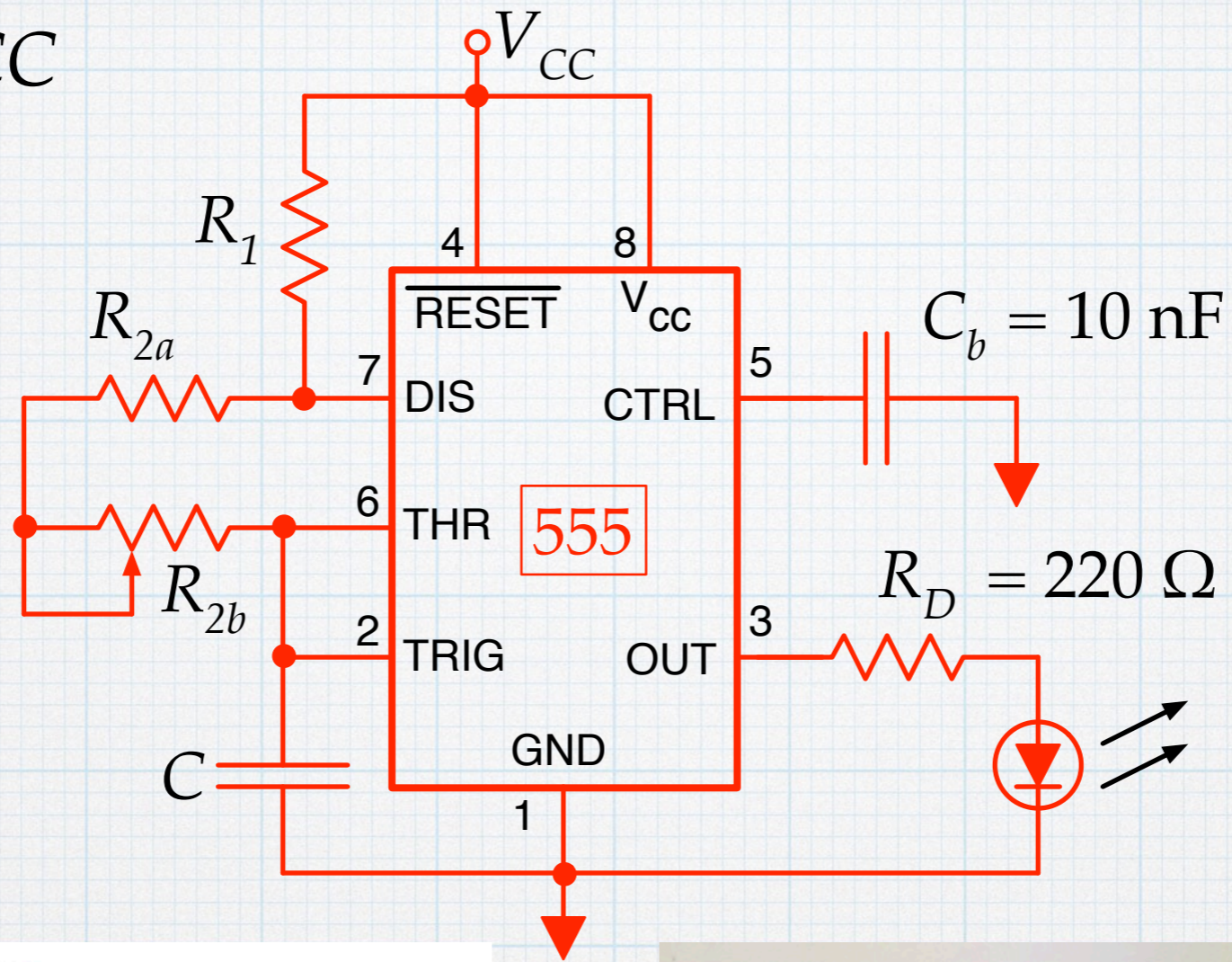




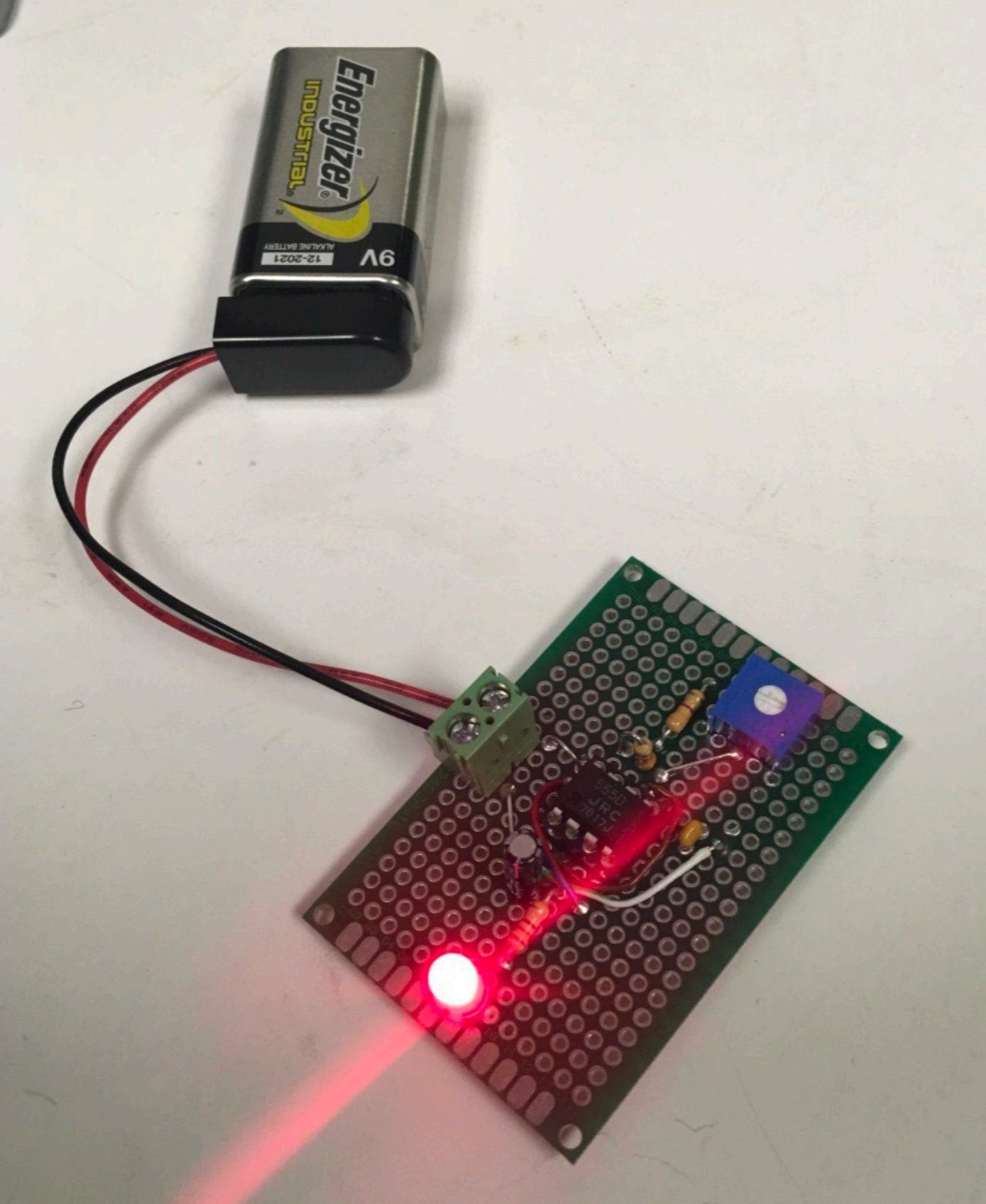
# $C_b$ to ground



# pin 4 to $V_{CC}$



It works!



# blinking 555 timer - the movie

