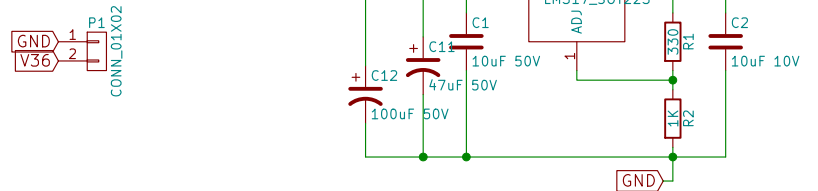


Main Power Input
Assuming 36V Input
LM317 can handle up to 40V

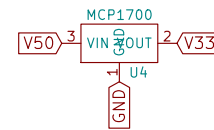
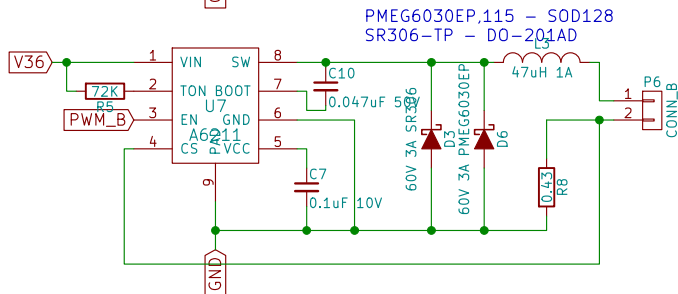
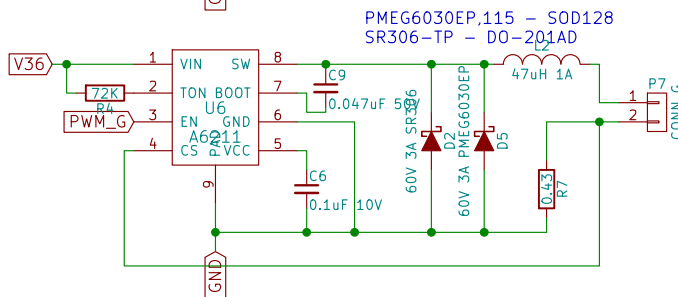
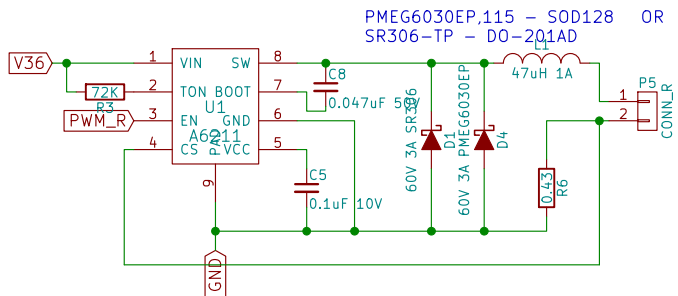


$$330/1000 = 5.04V$$

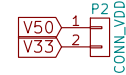
$$330/560 = 3.37V$$

$$V_{out} = 1.25V * (1 + R2/R1) + I_{Adj}R2$$

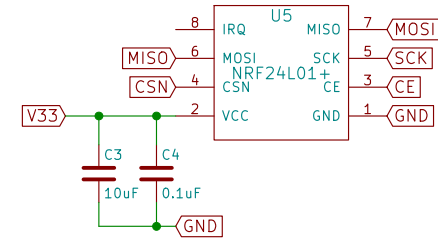
A6211 Logic HIGH is >1.8V, so no level shifting is needed



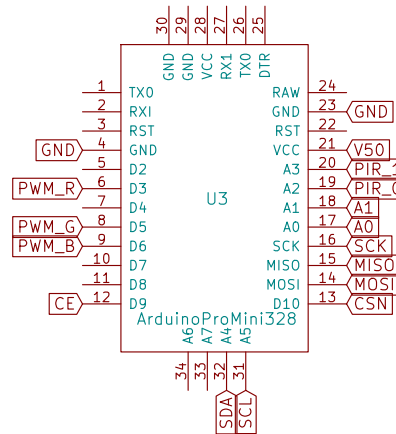
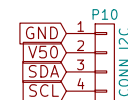
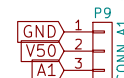
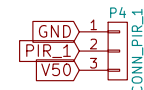
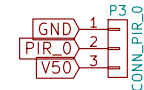
Bridge V50 to V33
If LM317 output is
3.3V instead of 5.0V



Bluetooth Module
uses the SPI interface
requires 3.3V voltage supply
pins are 5V tolerant though



PIR Sensor 5-20V Input
3.3V Digital Output



Matthew Swarts

D.O.P.E.

Sheet: /

File: ZenGardenStar_RevA.sch

Title: ZenGardenStar

Size: A4 Date: 2017-03-13

KiCad E.D.A. kicad 4.0.4-stable

Rev: A

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