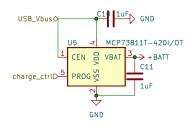
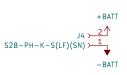


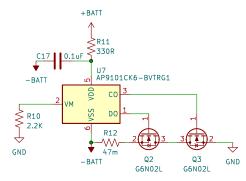
LP904040 85mA/450mA Battery Charger



LP904040 Battery

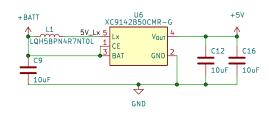


Battery Management System

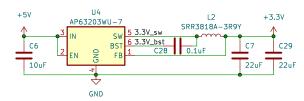


R12 acts like a 50 milliohm resistor; the traces add about 3 milliohms

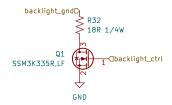
Battery to 5V 700mA



5V to 3.3V 2A Supply



LCD Backlight 100mA Driver



For R32, I actually put a 39 ohm and 27 ohm resistor in parallel to make a 15.95 ohm resistor; this gives us a max current of 119 mA which is still within spec for our display.

Q1 can be any old NMOS, so you can use a G6N02L to match Q2 and Q3 if you like — looks like the pinout is the same.

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Sheet

File: usb_power_supply.kicad_sch

Title: TI-83x Power Supply

Size: USLetter	Date: 2022-10-04	Rev: A
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