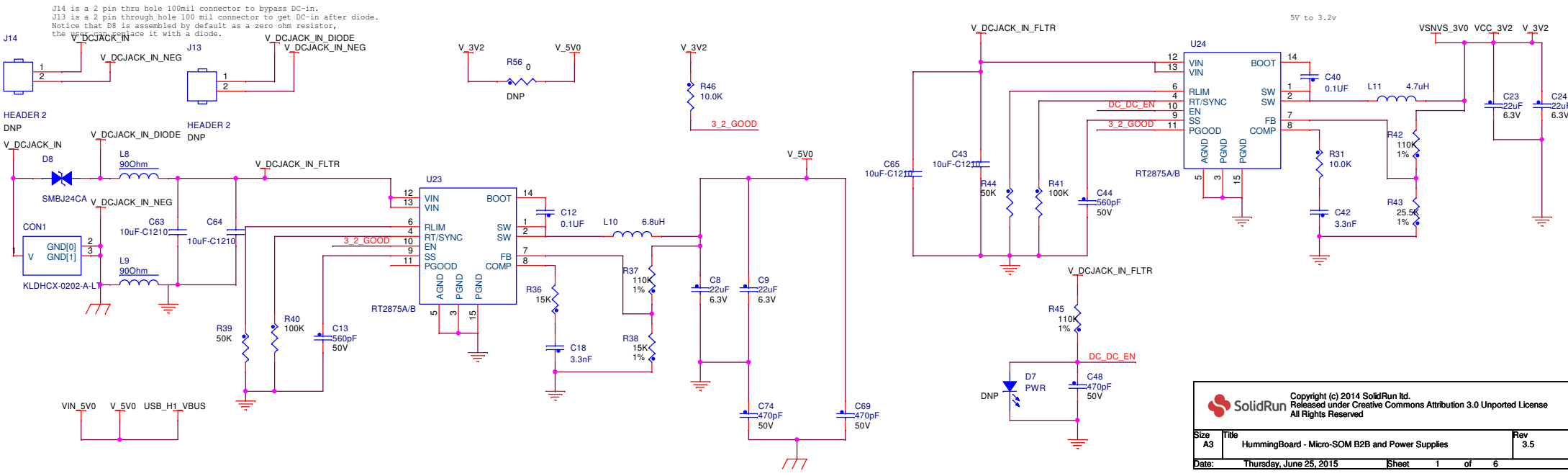


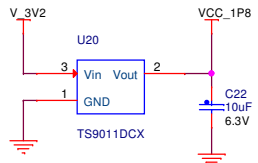
Place around four corners of SOM
Can be mainly used as GND to GND coupling capacitors for EMI

MECH_X_Y is a mechanical hole that the hole size is X mm and padstack is Y mm.
J15, J16 and J17 are M2.5
J18, J19 and J27 are M1.8

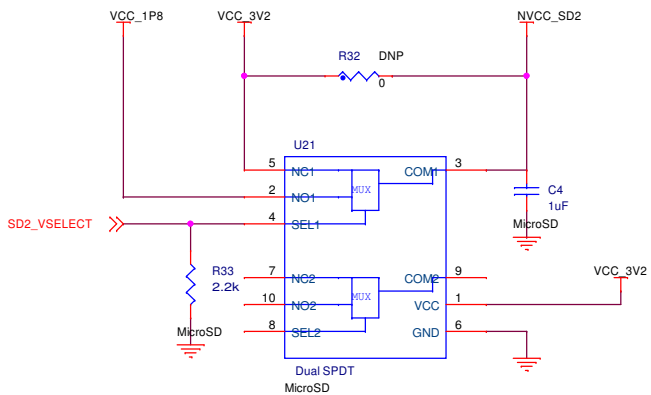
J27 is a new mechanical hole for MicroSOM rev 1.4 and newer



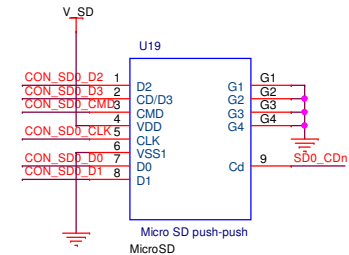
SDIO 3.3v / 1.8v switch circuitry



LDO input capacitor is shared with USB hub filter

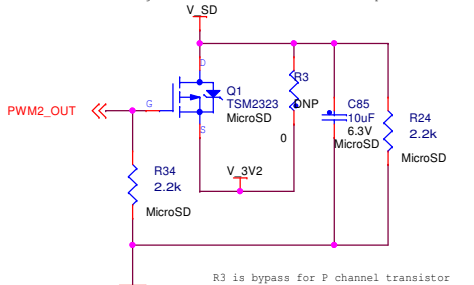


micro SD connectors (assembly option of push-push type and hinged type)



- SD2_DATA0 <>> CON_SD0_D0
- SD2_DATA1 <>> CON_SD0_D1
- SD2_DATA2 <>> CON_SD0_D2
- SD2_DATA3 <>> CON_SD0_D3
- SD2_CMD <>> CON_SD0_CMD
- SD2_CLK <>> CON_SD0_CLK
- SD2_CD_B <>> SD0_Cdn

micro SD power on/off
Change C85 to be 1uF instead of 10uF to prevent in-rush



R3 is bypass for P channel transistor

GPIO pin mapping -

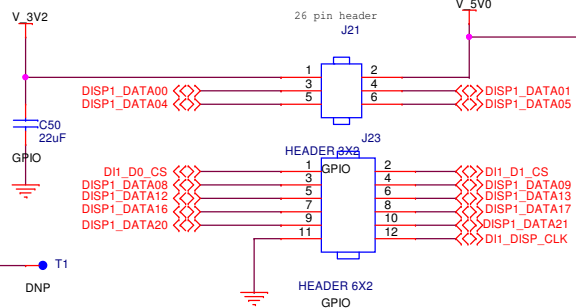
| Pin | GPIO |
|-----|--------|
| 7 | (1, 1) |
| 11 | (3, 9) |
| 12 | (3, 8) |
| 13 | (3, 7) |
| 15 | (3, 6) |
| 16 | (7, 2) |
| 18 | (7, 3) |
| 22 | (3, 3) |

SPI and I2C can be also muxed to be GPIO

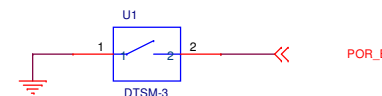
- MX6_ONOFF <>> T5 DNP
- PMIC_ON_REQ <<< T6 DNP
- PMIC_STBY_REQ <<< T7 DNP

- WDOG1_B <>> T1 DNP
- GPIO7 <>> T2 DNP
- EIM_WAIT <<< T3 DNP

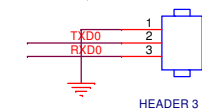
DNP



RESET button

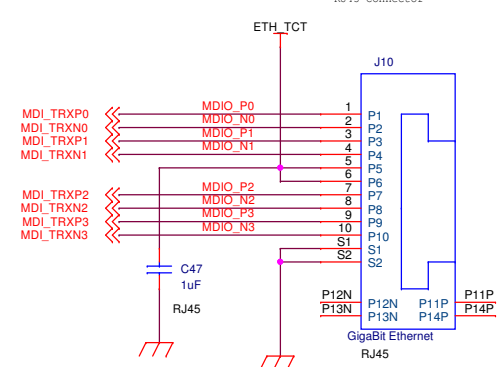


UART buffer (notice either U17 or U3 is assembled)



HEADER 3
UART

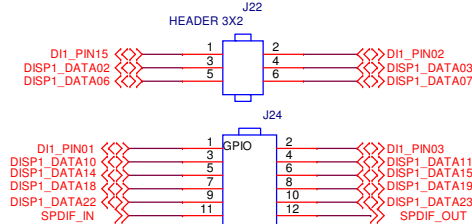
RJ45 Connector



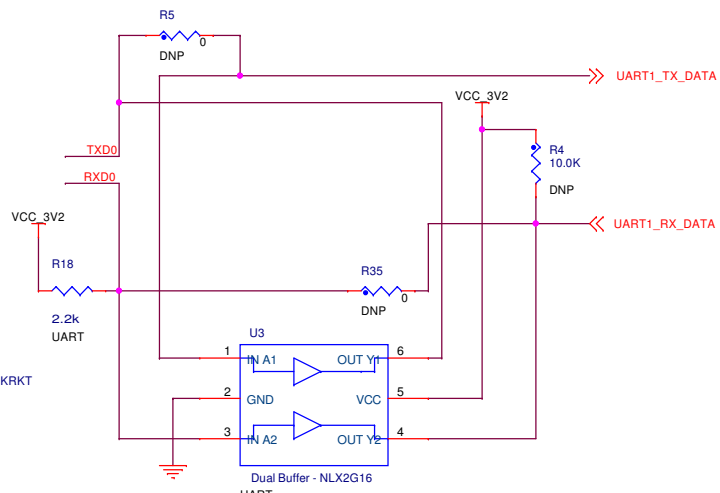
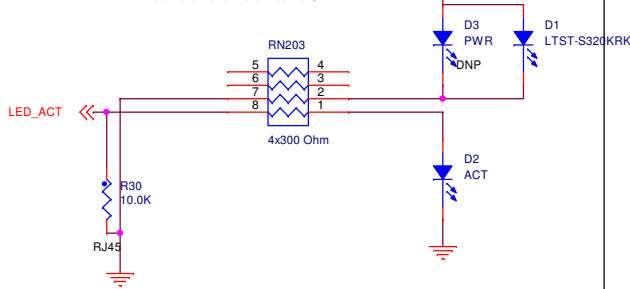
- TAMPER <>> T8 DNP
- USB_OTG_ID <>> T9 DNP

DNP

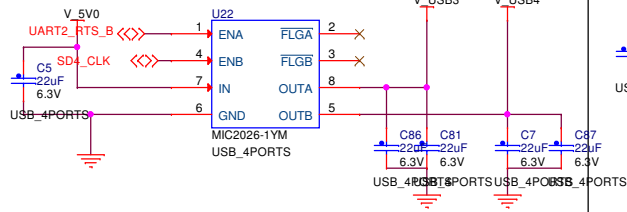
DNP



LEDs, Power and Ethernet ACT/Link



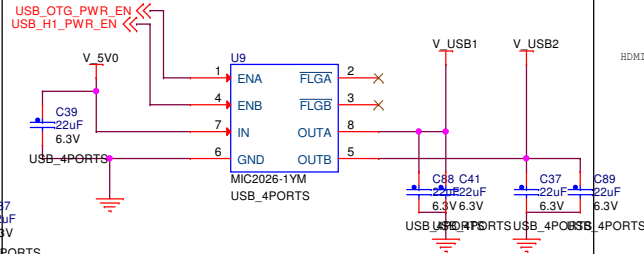
Dual USB header
 Notice dual USB header is current limited to 350mA both channels
 USB current limiter



GPIO pin mapping -

| Pin | GPIO |
|----------|---------|
| OTG(ENA) | (3, 22) |
| H1(ENB) | (1, 0) |

USB current limiter

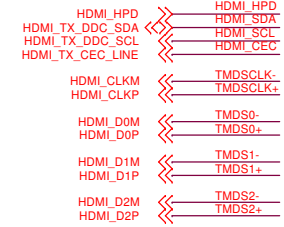
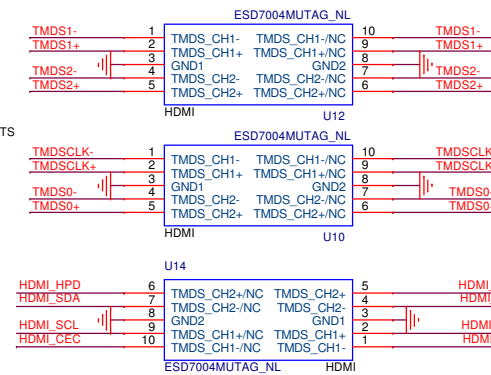


GPIO pin mapping -

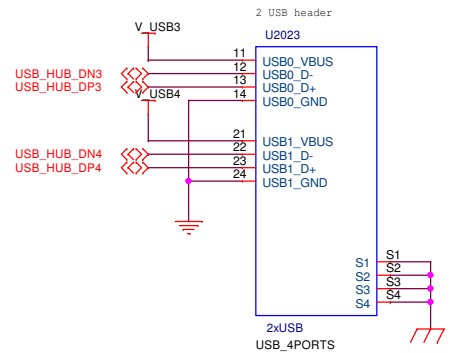
| Pin | GPIO |
|----------|---------|
| OTG(ENA) | (3, 22) |
| H1(ENB) | (1, 0) |

HDMI out

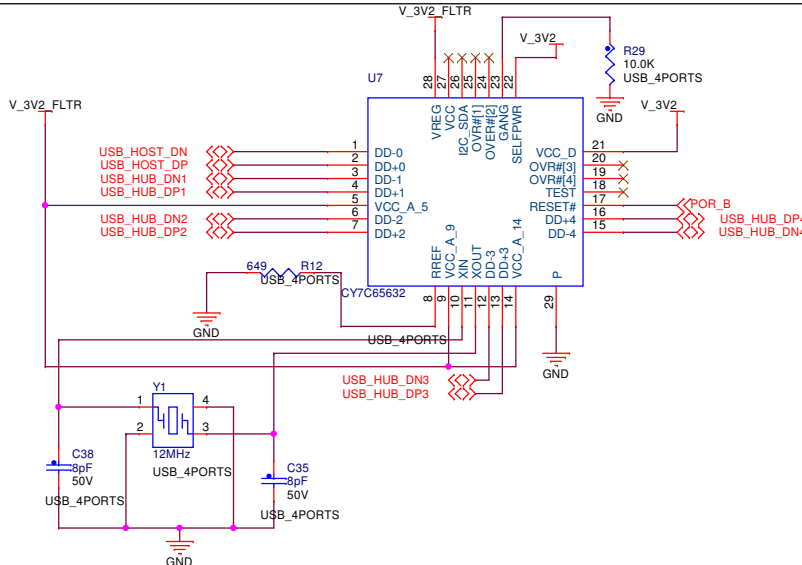
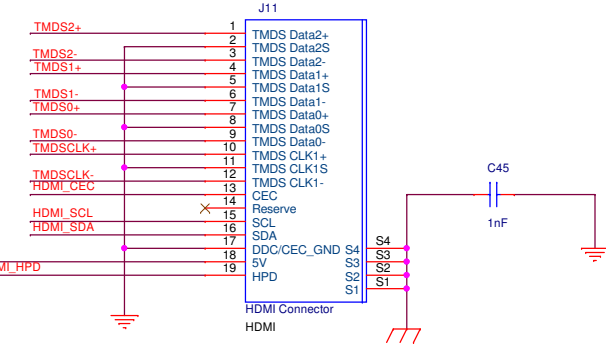
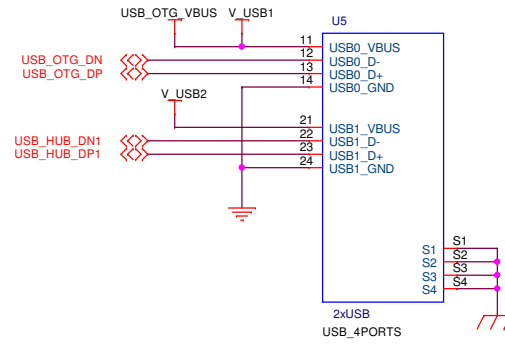
HDMI ESD protection



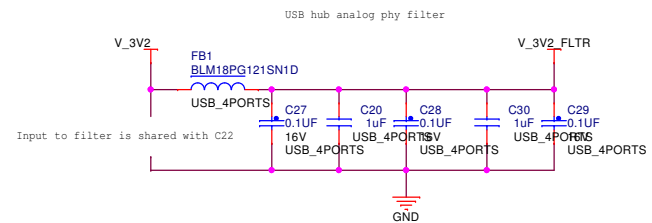
Dual USB connector front

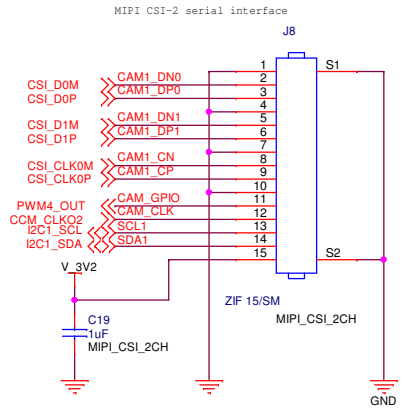


Dual USB connector back

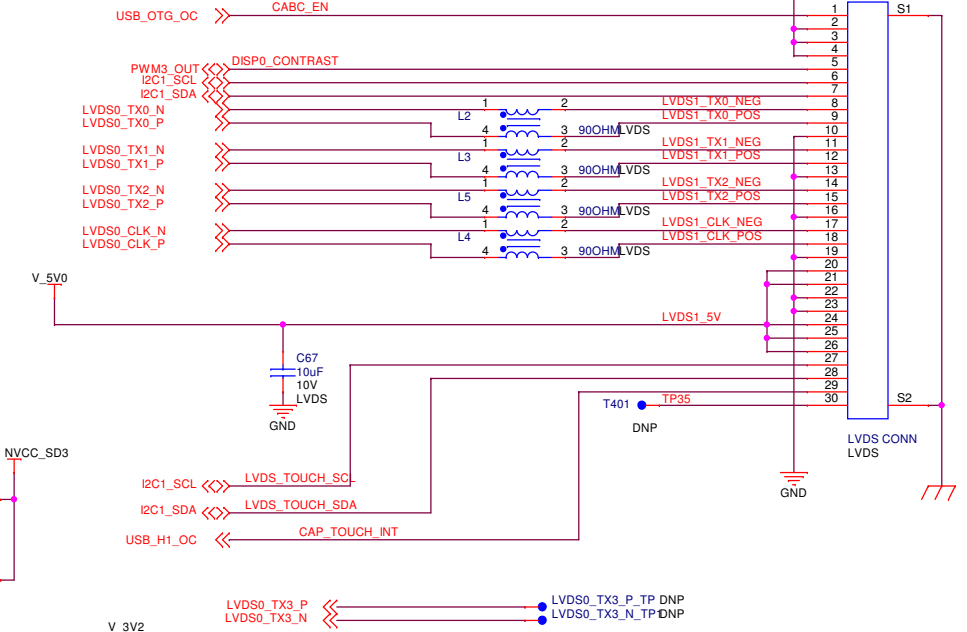
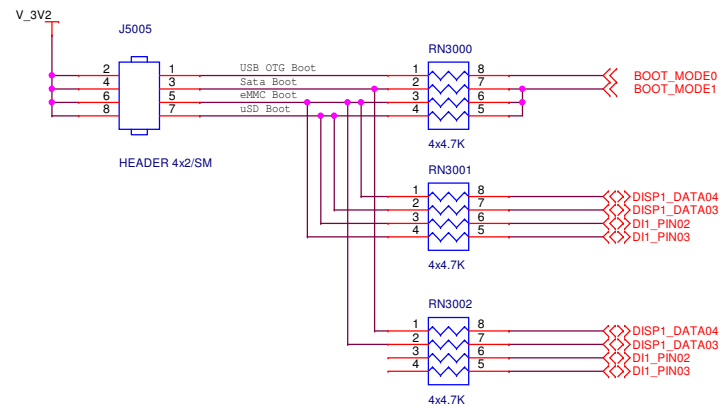
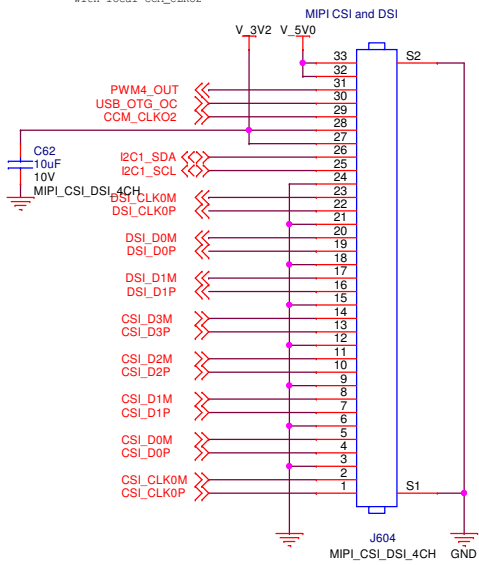


1 to 4 USB HUB.
 The HUB outputs goes to -
 1. Lower USB port in the HummingBoard pro configuration.
 2. Dual USB header.
 3. mini PCIe connector





USE Same signals as WandBoard in case moved to SOM
 In case this is copied to the SOM, replace CCM_CLKO1
 with local CCM_CLKO2



Since there isn't a standard LVDS out connector,
 this design uses the Freescale Sabre SD LVDS display.

