

Thermal Camera

https://github.com/drewsum/Thermal_Camera

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Sheet: /

File: Thermal_Camera.kicad_sch

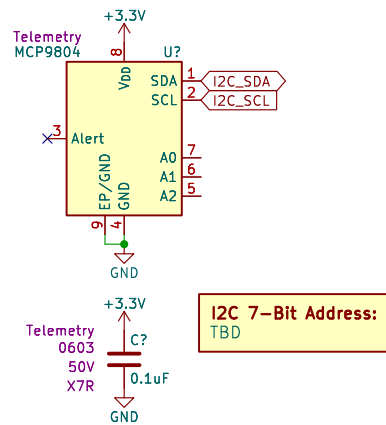
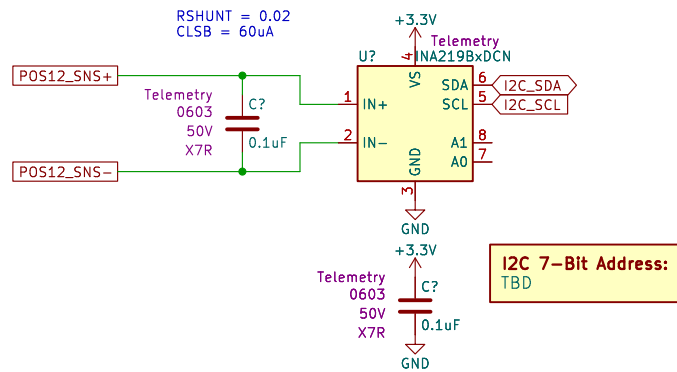
Title: Thermal Camera

Size: A Date: 2023-11-12

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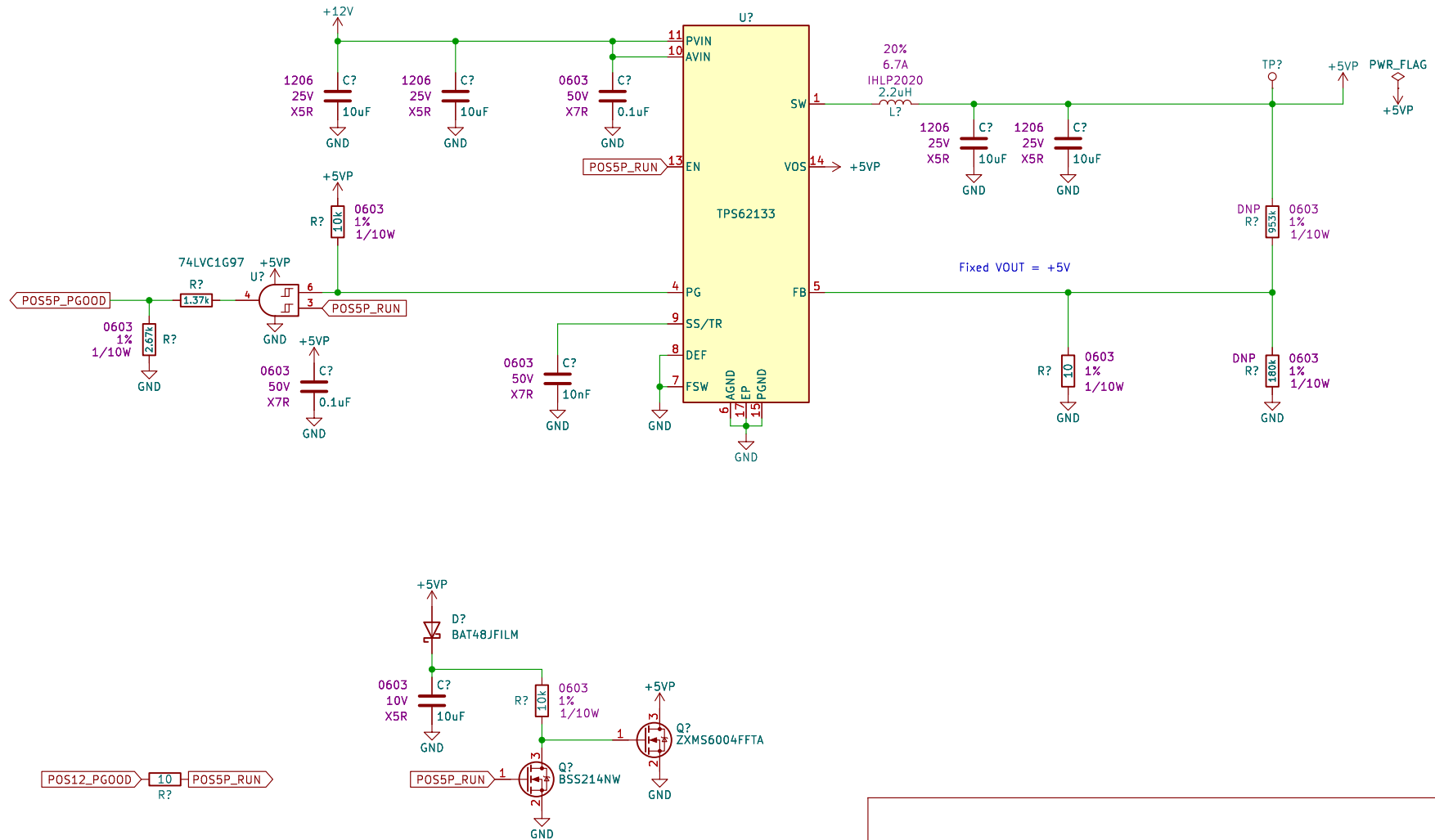
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File: POS12_Telemetry.kicad_sch

Title: Thermal Camera

Size: A Date: 2023-11-12
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CHANGE TO +3.3V



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Sheet: /POS3P3 Power Supply/

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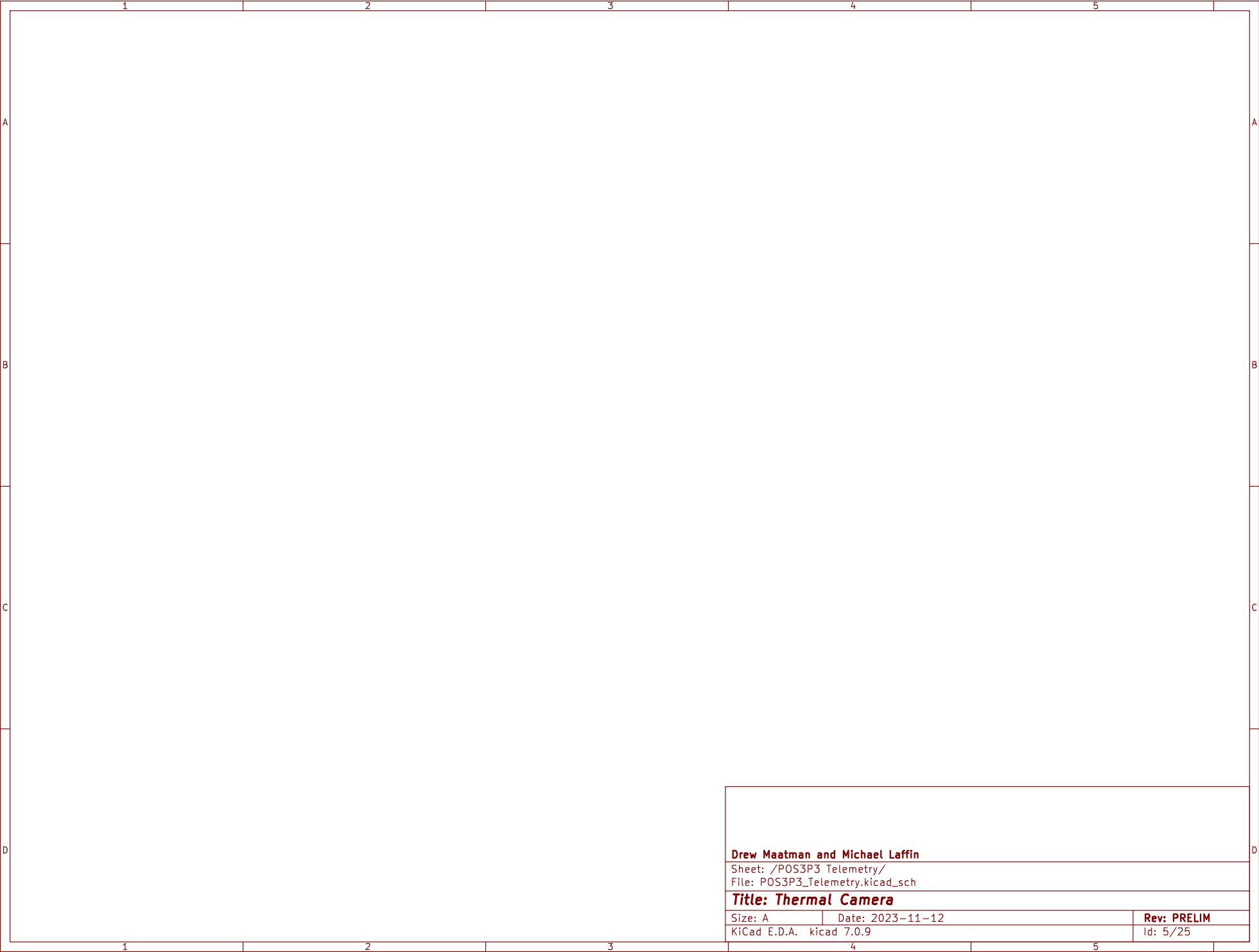
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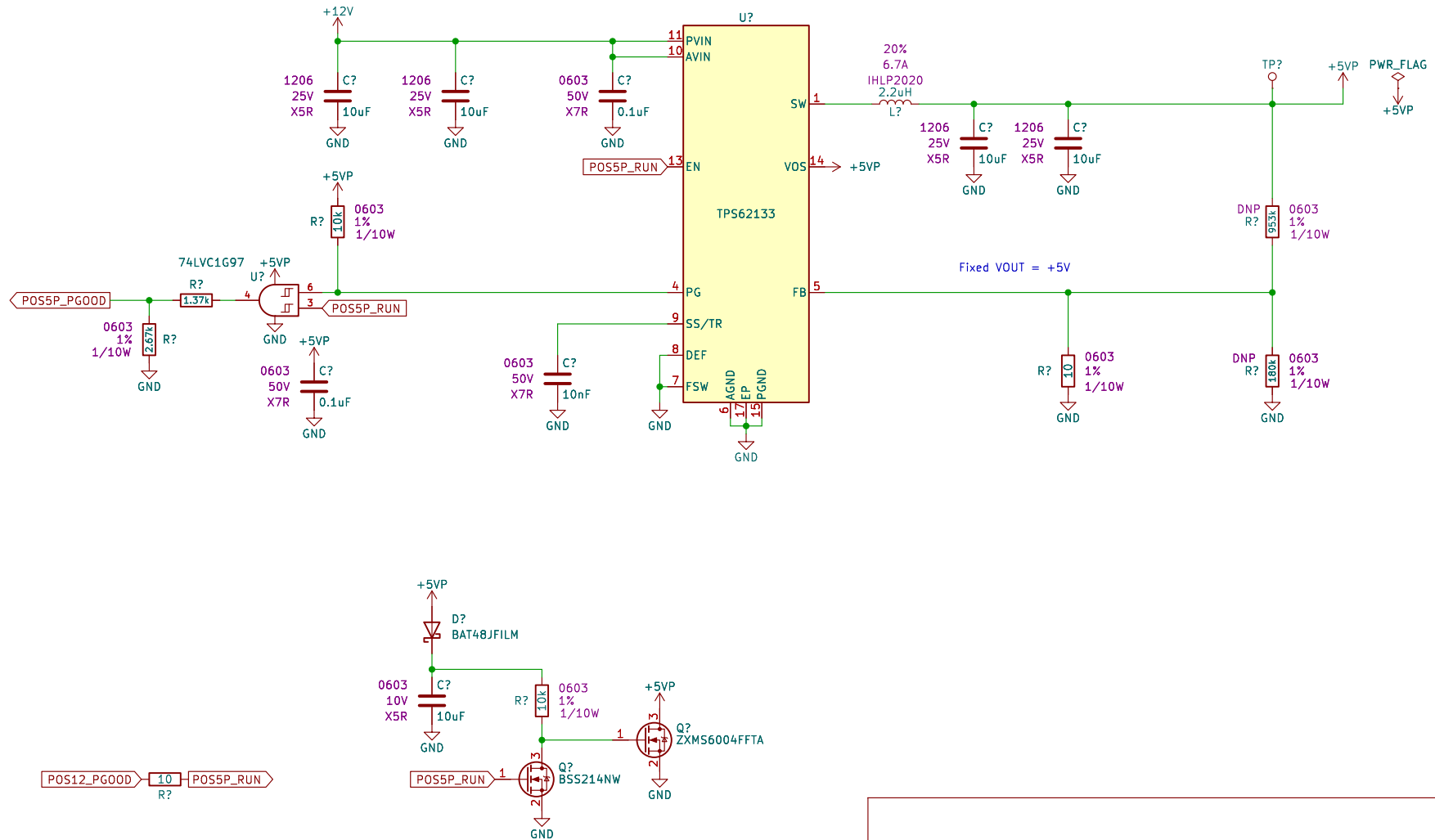
KiCad E.D.A. kicad 7.0.9

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CHANGE TO +1.8V



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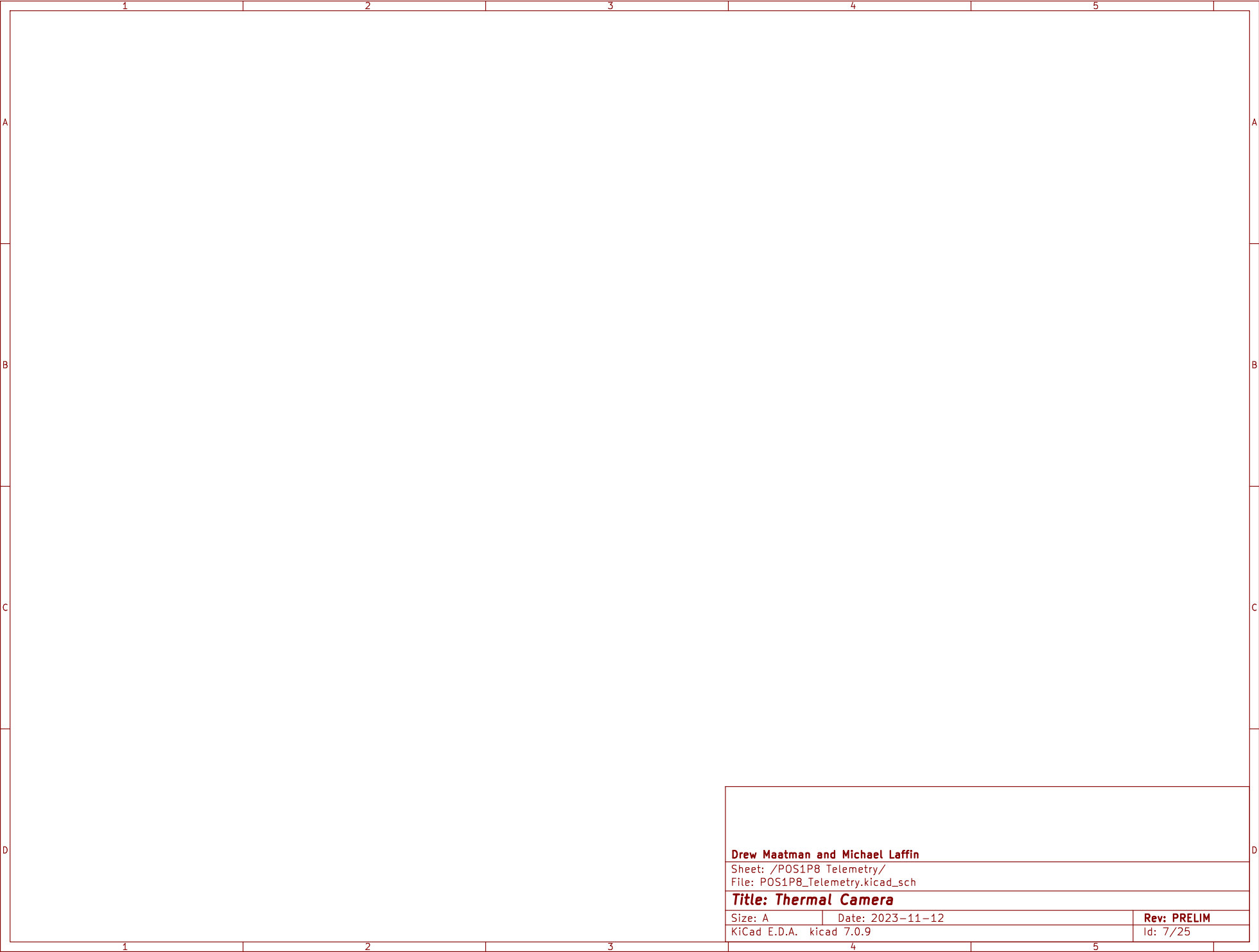
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Sheet: /POS1P8 Telemetry/ File: POS1P8_Telemetry.kicad_sch		
Title: Thermal Camera		
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D

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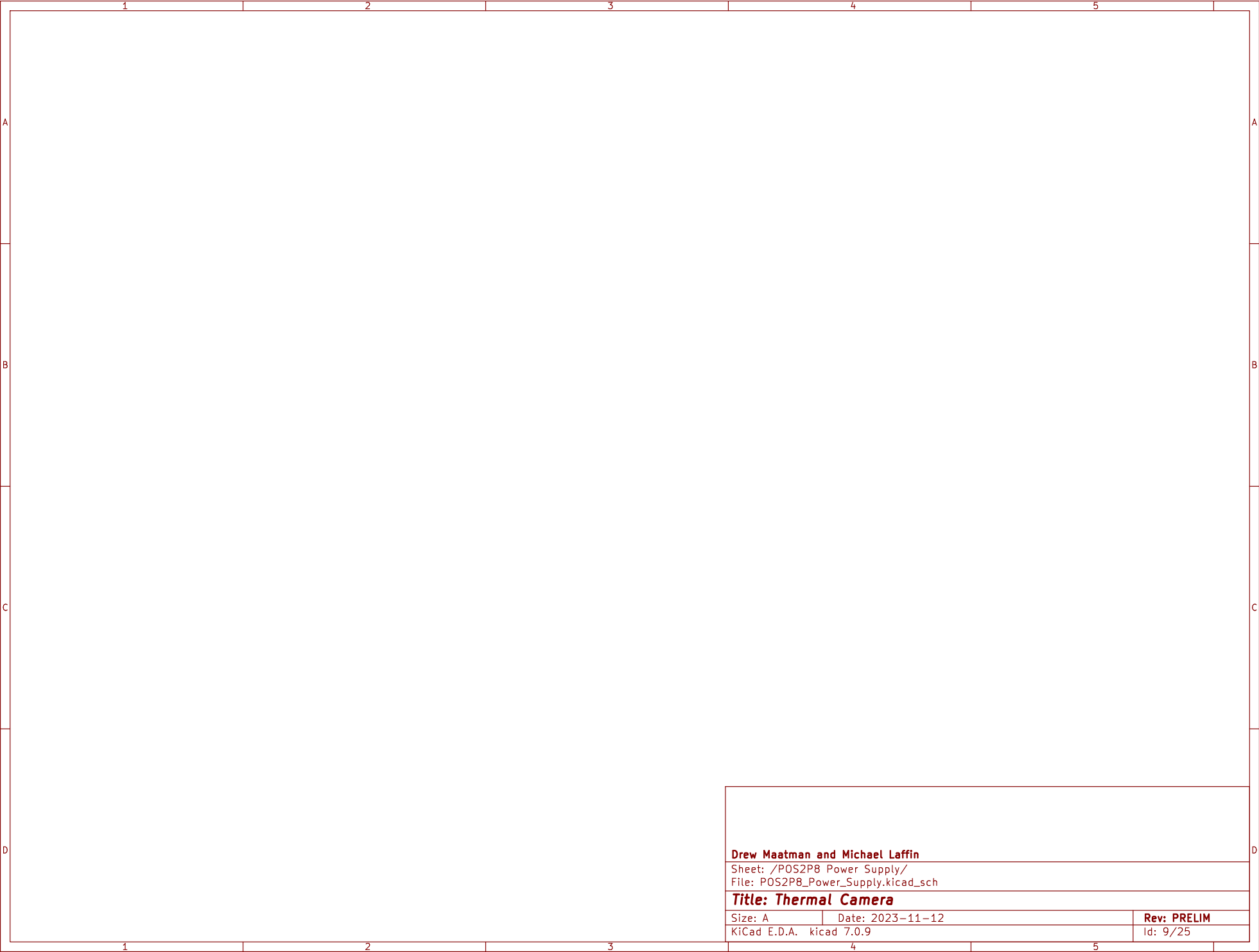
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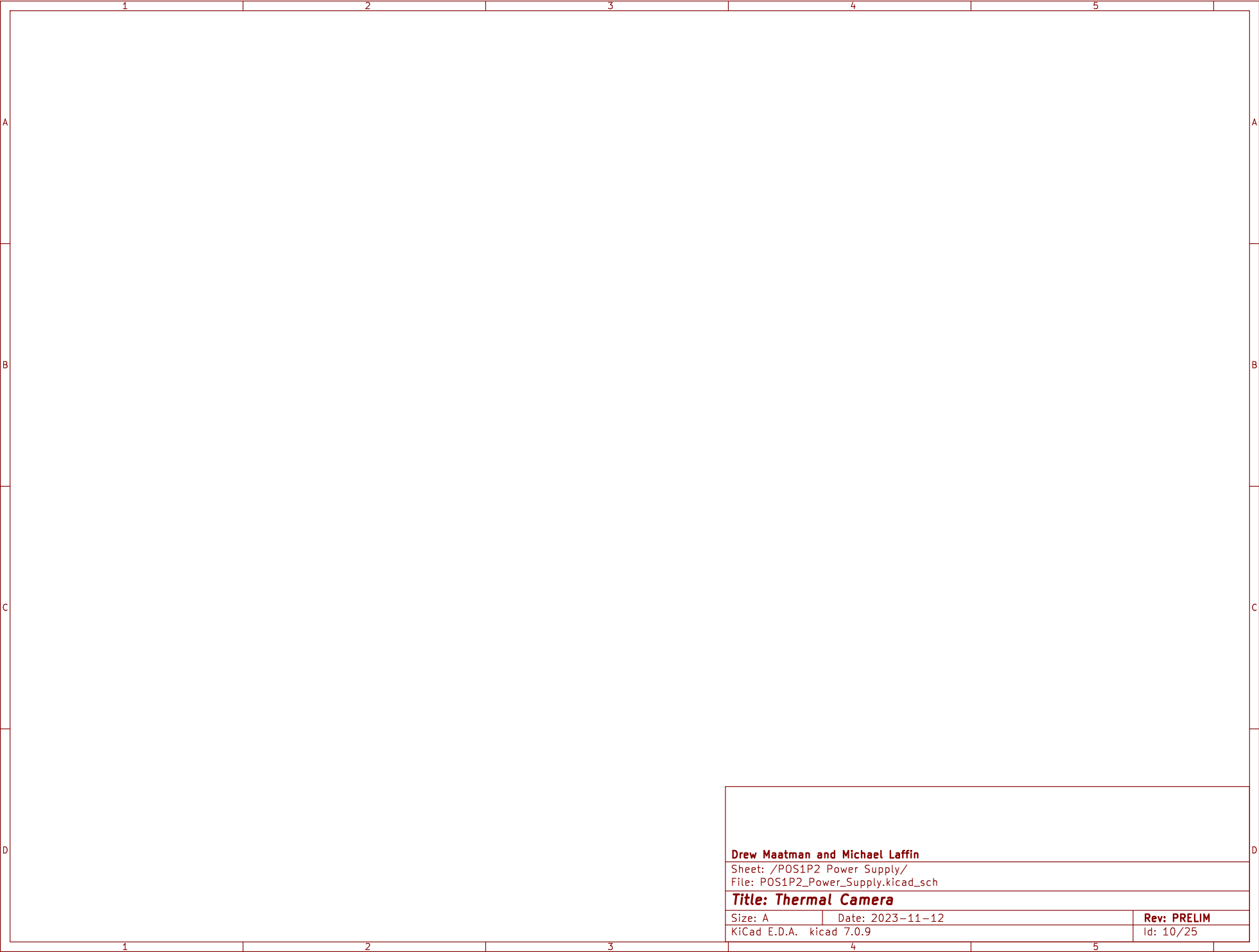
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Size: A	Date: 2023-11-12	Rev: PRELIM
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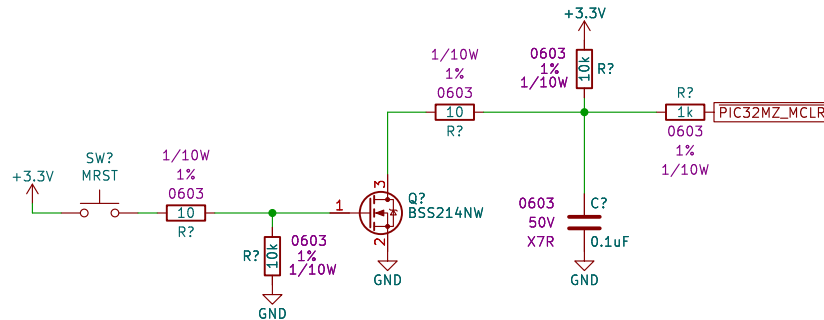
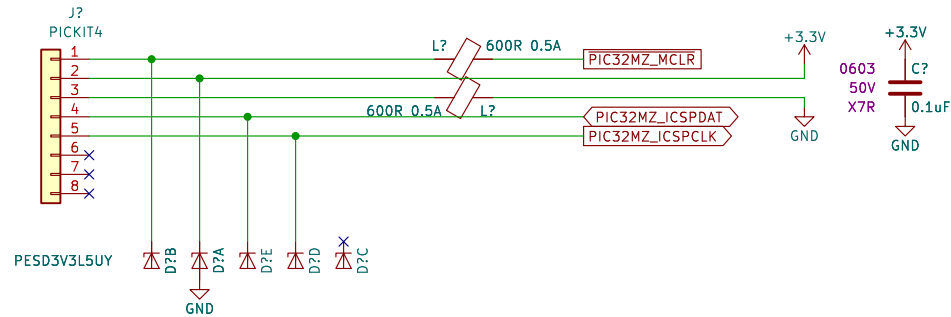




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C																									C
D																									D
1					2					3					4					5					

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Sheet: /Battery Management/		
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Title: Thermal Camera		
Size: A	Date: 2023-11-12	Rev: PRELIM
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COPIED FROM PIC32MZ EF FIX FOR PIC32MZ DA CONSIDER REMOVING BEADS



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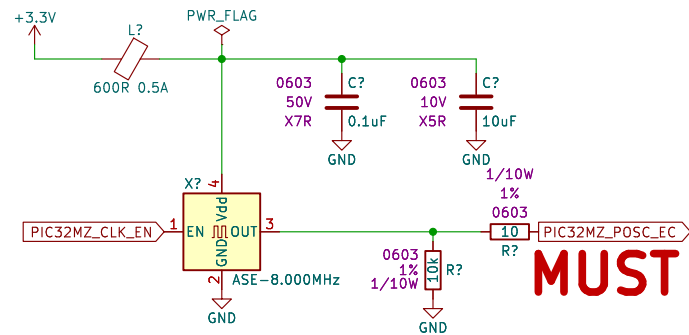
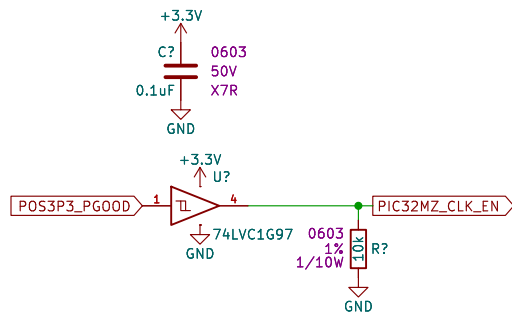
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Title: Thermal Camera

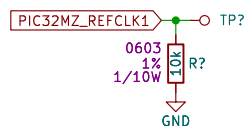
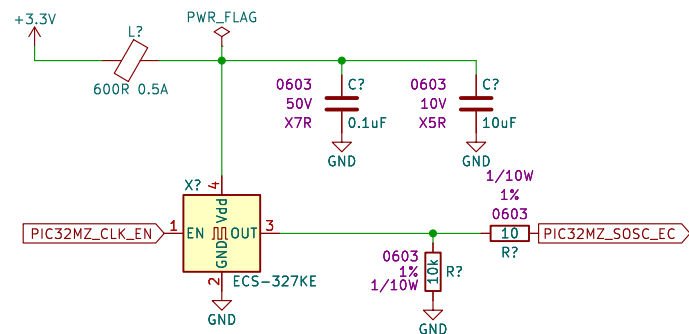
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KiCad E.D.A. kicad 7.0.9

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COPIED FROM PIC32MZ EF FIX FOR PIC32MZ DA



MUST BE 24MHZ



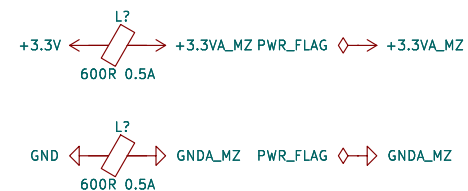
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Sheet: /PIC32MZ DA Clocking/
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Title: Thermal Camera

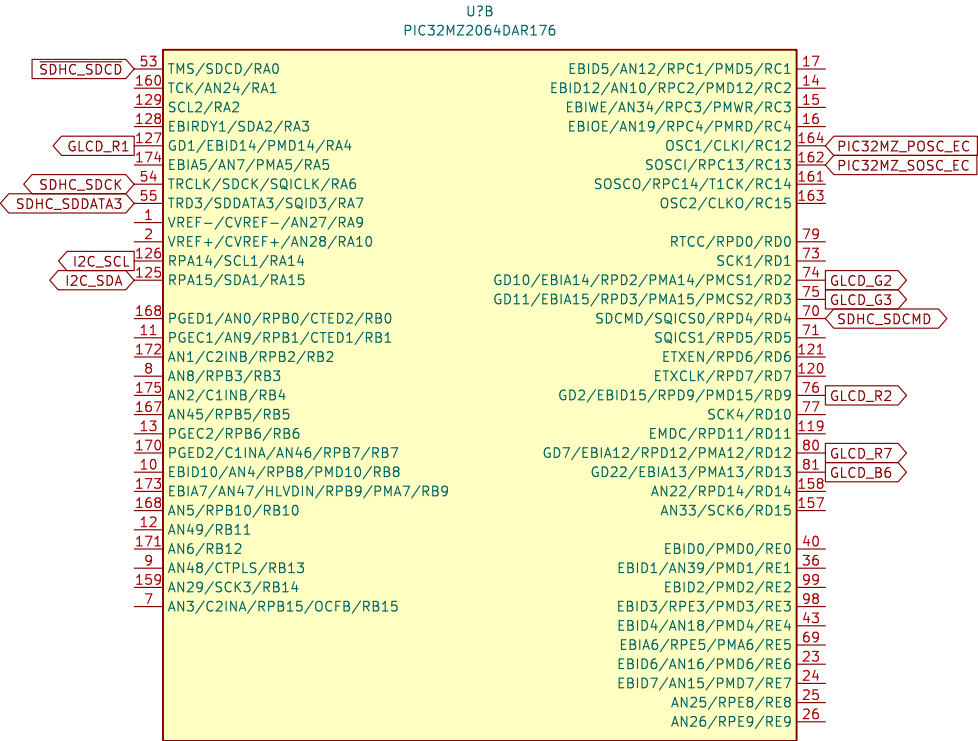
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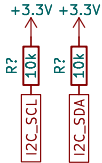


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See TABLE 36-1:RGB COLOR MAPPING for Graphic LCD Pin Mapping



DOUBLE CHECK
SOSC PIN



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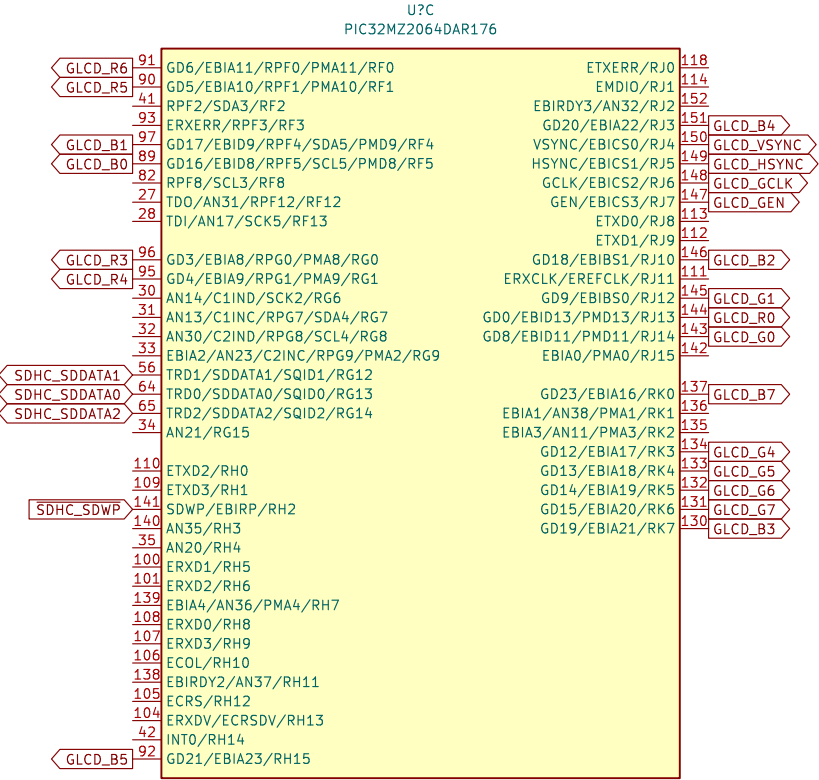
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File: PIC32MZ_DA_1.kicad_sch

Title: Thermal Camera

Size: A Date: 2023-11-12
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See TABLE 36-1:RGB COLOR MAPPING for Graphic LCD Pin Mapping



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Sheet: /PIC32MZ DA 2/
File: PIC32MZ_DA_2.kicad_sch

Title: Thermal Camera

Size: A Date: 2023-11-12
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SDHC_SDDATA1
SDHC_SDDATA0
SDHC_SDDATA2

SDHC_SDCLK

SDHC_SDCMD

SDHC_SDWPE

SDHC_SDCKE
SDHC_SDDATA3

SD CARD, SQI FLASH

SQI FLASH may not be able to be broken out
when PIC is configured for SDHC:
CONSIDER OPTIONS FOR SUPPORTING EITHER

BREAK OUT A SPI TO SD CARD AS INSURANCE

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Sheet: /External Storage/
File: External_Storage.kicad_sch

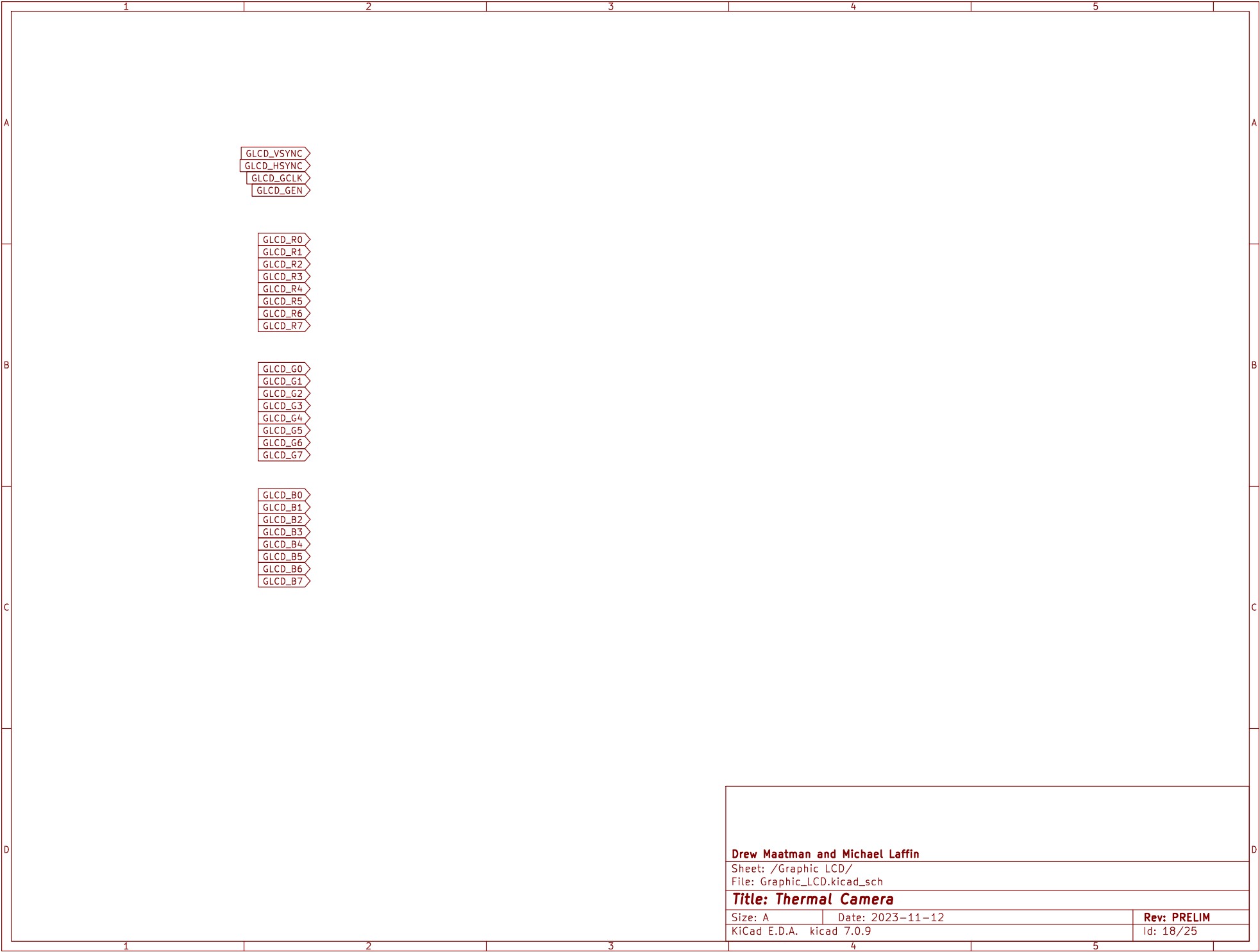
Title: Thermal Camera

Size: A Date: 2023-11-12

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Sheet: /Graphic LCD/
File: Graphic_LCD.kicad_sch

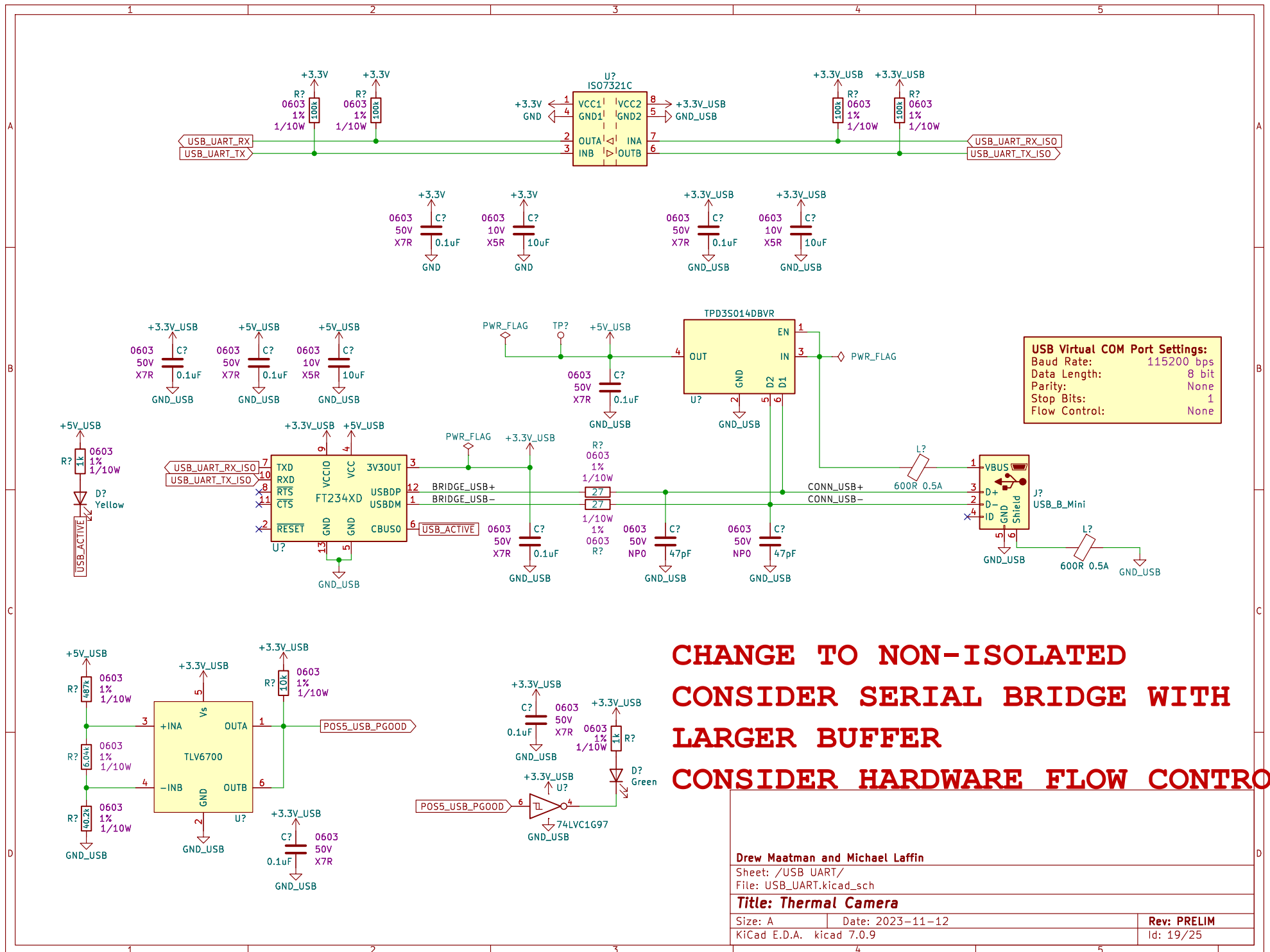
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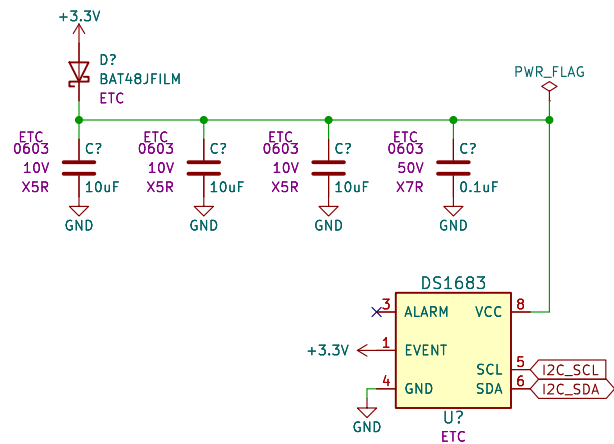
Size: A Date: 2023-11-12

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I2C 7-Bit Address:
0x6B

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Sheet: /Elapsed Time Counter/
File: Elapsed_Time_Counter.kicad_sch

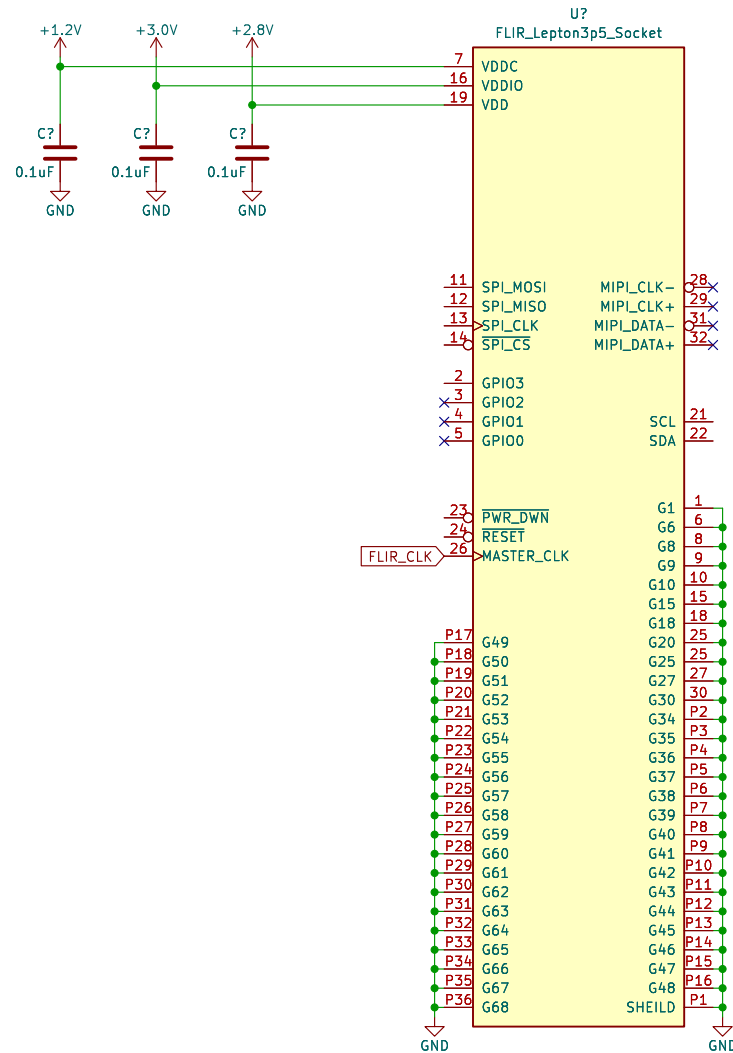
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CAUTION: +3.0V I/O

Power Supply Considerations:
VDDC: 1.20V (1.14V min, 1.26V max), 50mVpp max ripple, 110mA max draw
VDD: 2.80V (2.72V min, 2.88V max), 30mVpp max ripple, 16mA max draw
VDDIO: 2.8V min, 3.1V max, 50mVpp max ripple, 310mA max draw



See FLIR document #110-0144-04 for I2C register map



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Sheet: /FLIR Lepton Sensor/
File: FLIR_Lepton_Sensor.kicad_sch

Title: Thermal Camera

Size: A	Date: 2023-11-12
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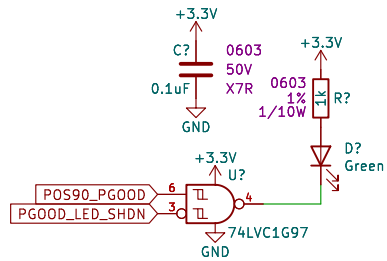
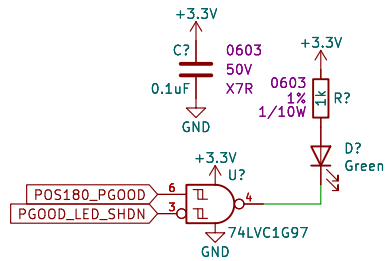
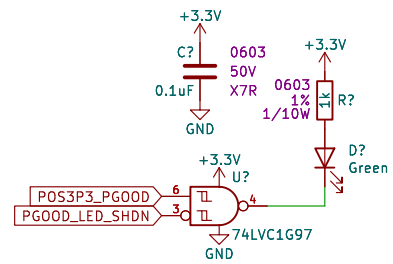
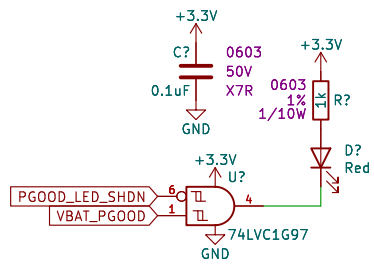
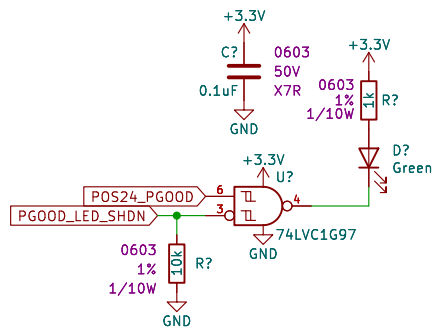
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Sheet: /USB HS Port/		
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Sheet: /PGOOD LEDs/

File: PGOOD_LEDS.kicad_sch

Title: Thermal Camera

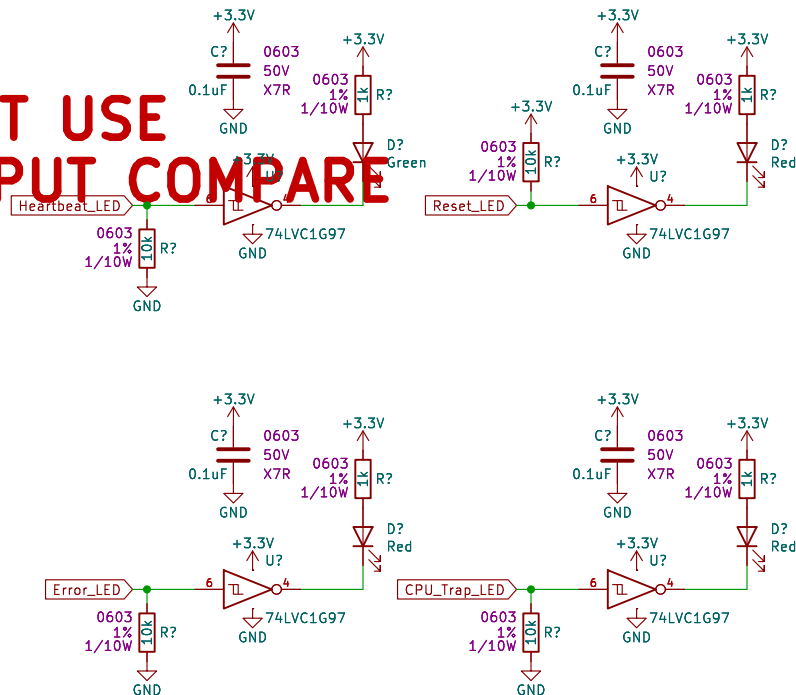
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**MUST USE
OUTPUT COMPARE
PIN**



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Sheet: /Status_LEDs/

File: Status_LEDs.kicad_sch

Title: Thermal Camera

Size: A Date: 2023-11-12

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