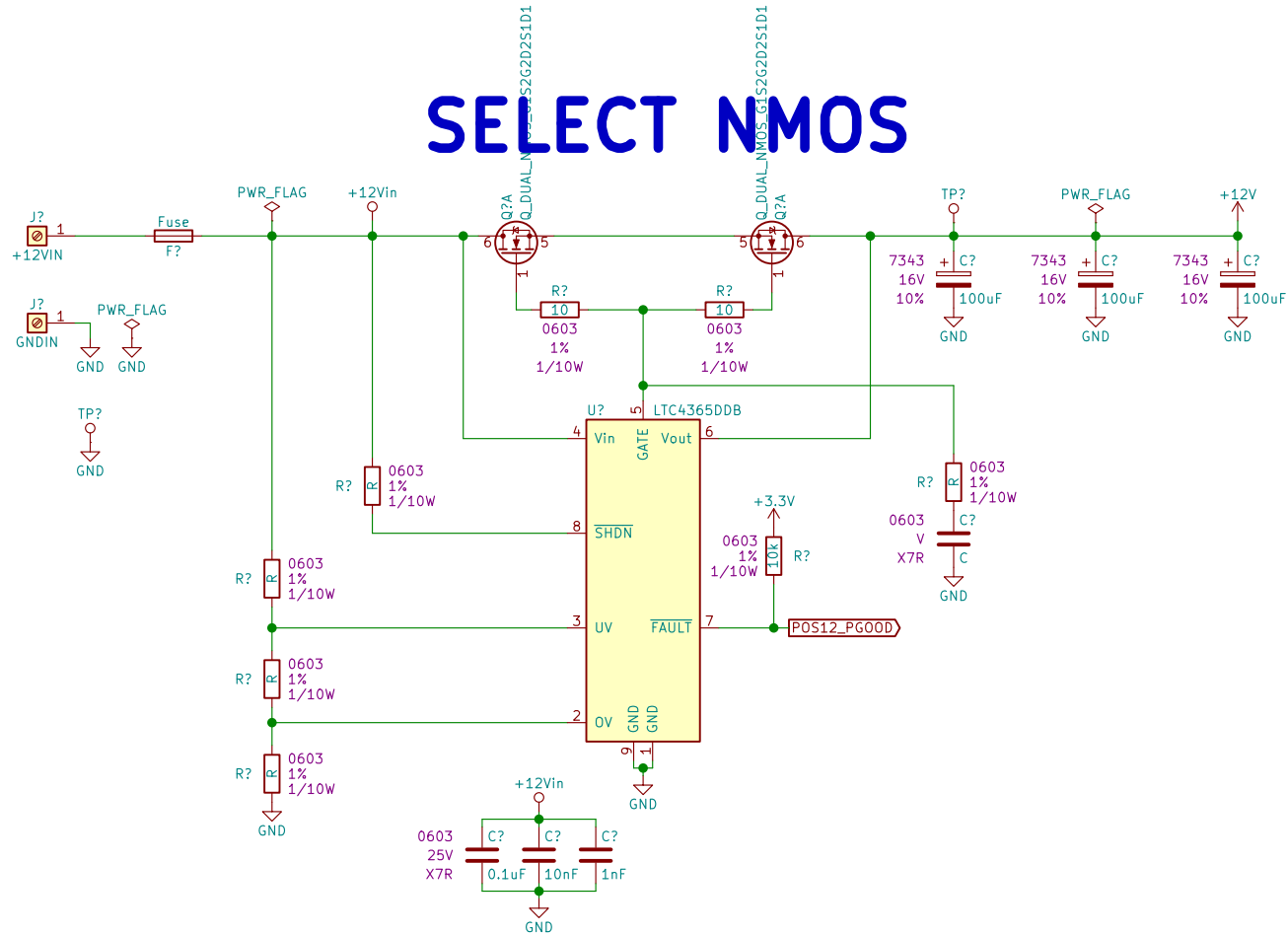


|   |   |  |   |  |   |  |
|---|---|--|---|--|---|--|
|   | 1 | 2  | 3   | 4  | 5 |  |
| A |   | <div>Power Input</div> <div>Power_Input.sch</div> <div>POS3P3_Power Supply</div> <div>POS3P3_Power_Supply.sch</div>  |   | <div>External SRAM</div> <div>External_SRAM.sch</div> <div>External Flash 1</div> <div>External_Flash_1.sch</div> <div>External Flash 2</div> <div>External_Flash_2.sch</div> <div>External Flash 3</div> <div>External_Flash_3.sch</div> <div>External Flash 4</div> <div>External_Flash_4.sch</div> <div>External Flash 5</div> <div>External_Flash_5.sch</div> <div>External Flash 6</div> <div>External_Flash_6.sch</div> <div>External Flash 7</div> <div>External_Flash_7.sch</div> <div>External Flash 8</div> <div>External_Flash_8.sch</div> <div>Status LEDs 1</div> <div>Status_LEDs_1.sch</div> <div>Panel_Data_Level Shifters 1</div> <div>Panel_Data_LevelShifters_1.sch</div> <div>Panel_Data_Level Shifters 2</div> <div>Panel_Data_LevelShifters_2.sch</div> <div>Panel_Data_Level Shifters 3</div> <div>Panel_Data_LevelShifters_3.sch</div> | A |  |
| B |   | <div>Microcontroller Programming</div> <div>Microcontroller_Programming.sch</div> <div>WiFi Module</div> <div>Wi-Fi_Module.sch</div> <div>USB_UART Isolation</div> <div>USB_UART_Isolation.sch</div> <div>USB_UART Bridge</div> <div>USB_UART_Bridge.sch</div>   |   |  | B |  |
| C |   | <div>Panel_Data Connectors</div> <div>Panel_Data_Connectors.sch</div> <div>Panel Power Connectors</div> <div>Panel_Power_Connectors.sch</div> <div>Microcontroller Power</div> <div>Microcontroller_Power.sch</div> <div>Microcontroller A</div> <div>Microcontroller_A.sch</div> <div>Microcontroller B</div> <div>Microcontroller_B.sch</div>  |   |  | C |  |
| D |   | <div>To Do List:</div> <div>* Add +5V LED Power Supply (~80 to 90A)</div> <div>* External oscillator for Micro?</div> <div>* Mechanical sheet</div> <div>* Design Power Input Circuit, add fusing</div> <div>* Decide on input power supply (AC/DC)</div> <div>* Add more power input connectors, match to AC/DC output connectors. Might need beefy Weurth shanks</div> <div>* Add status LEDs, PGOOD stuff</div> <div>* +3.3V Power Supply (~2A)</div> <div>* +5V Monitoring/+3.3V Monitoring/Input Monitoring? Temperature sensors?</div> <div>* Add AUX +5V input if we mess up +5V supply</div> <div>* Wi-Fi Module</div> <div>* Evaluate Micro AVDD/AVSS filter</div> <div>* Select panel connector bulk caps, match with other tantalums on board for BOM scrubbing?</div> <div>* Power pushbutton? vs set on app?</div> <div>* Brightness encoder? vs set on app?</div> <div>* Time of flight IC?</div> <div>* Add graphical items to certain sheets (ESD warning, heat, etc)</div> <div>* Add MU Logo to each sheet</div> <div>* Add Titles to each sheet</div> <div>* Add relevant design notes/routing notes to sheets</div> <div>* Add test points sheet</div> <div>* Re-order sheets</div> <div>* Wire everything to Micro</div> <div>* Assign Refdes's</div> <div>* Draw custom footprints</div> <div>* Assign footprints</div> <div>* Run ERC, resolve errors</div> <div>* Add firmware notes sheet</div> <div>* Add COM port settings to USB sheet</div> <div>* Generate netlist</div> <div>* Generate BOM</div> | <div></div> <div>Sheet: /</div> <div>File: LED_Display_Controller.sch</div> <div>Title:</div> <div>Size: A</div> <div>Date:</div> <div>KiCad E.D.A. kicad (5.0.0)</div> <div>Rev:</div> <div>Id: 1/25</div> | D  |   |  |
|   | 1 | 2  | 3   | 4  | 5 |  |

# SELECT NMOS

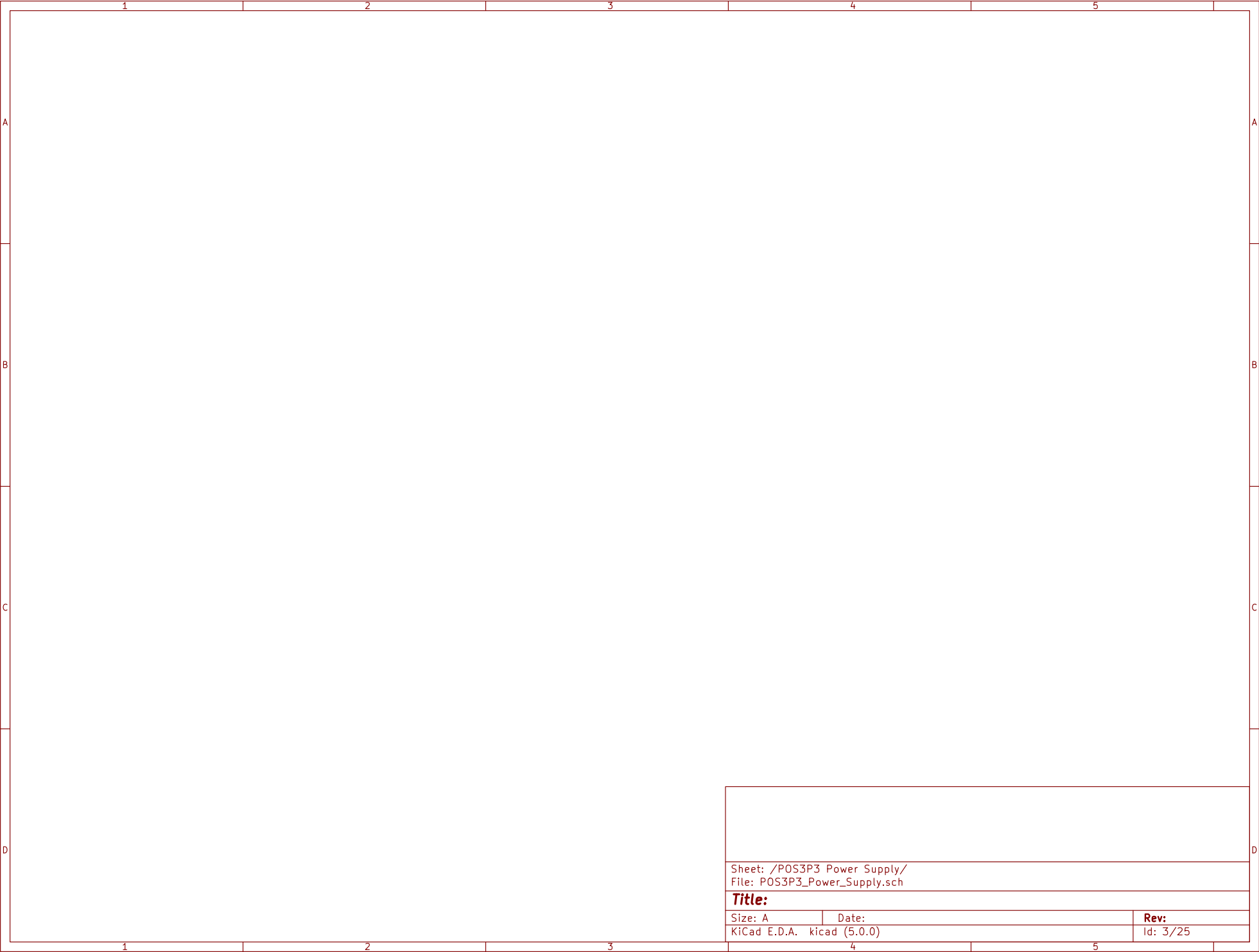


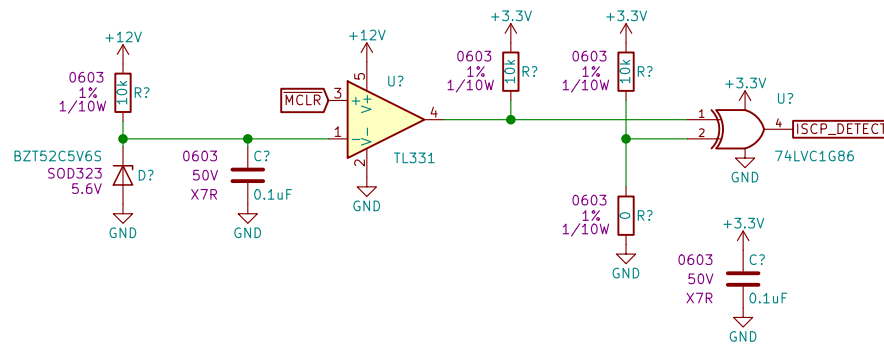
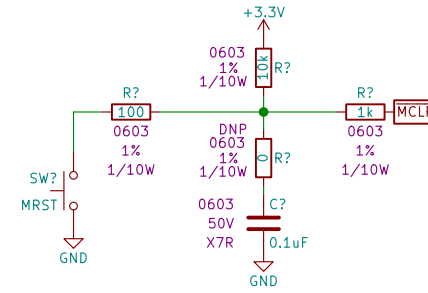
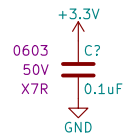
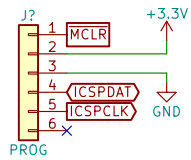
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## Title:

Size: A Date:  
KiCad E.D.A. kicad (5.0.0)

Rev:  
Id: 2/25





Sheet: /Microcontroller Programming/  
File: Microcontroller\_Programming.sch

**Title:**

Size: A Date:  
KiCad E.D.A. kicad (5.0.0)

Rev:  
Id: 4/25

|   |  |  |  |  |   |  |  |  |  |   |  |  |  |  |   |  |  |  |  |   |  |  |  |  |   |
|---|--|--|--|--|---|--|--|--|--|---|--|--|--|--|---|--|--|--|--|---|--|--|--|--|---|
| 1 |  |  |  |  | 2 |  |  |  |  | 3 |  |  |  |  | 4 |  |  |  |  | 5 |  |  |  |  |   |
| A |  |  |  |  |   |  |  |  |  |   |  |  |  |  |   |  |  |  |  |   |  |  |  |  | A |
| B |  |  |  |  |   |  |  |  |  |   |  |  |  |  |   |  |  |  |  |   |  |  |  |  | B |
| C |  |  |  |  |   |  |  |  |  |   |  |  |  |  |   |  |  |  |  |   |  |  |  |  | C |
| D |  |  |  |  |   |  |  |  |  |   |  |  |  |  |   |  |  |  |  |   |  |  |  |  | D |
| 1 |  |  |  |  | 2 |  |  |  |  | 3 |  |  |  |  | 4 |  |  |  |  | 5 |  |  |  |  |   |

Sheet: /WiFi Module/  
File: Wi-Fi\_Module.sch

Title:

Size: A

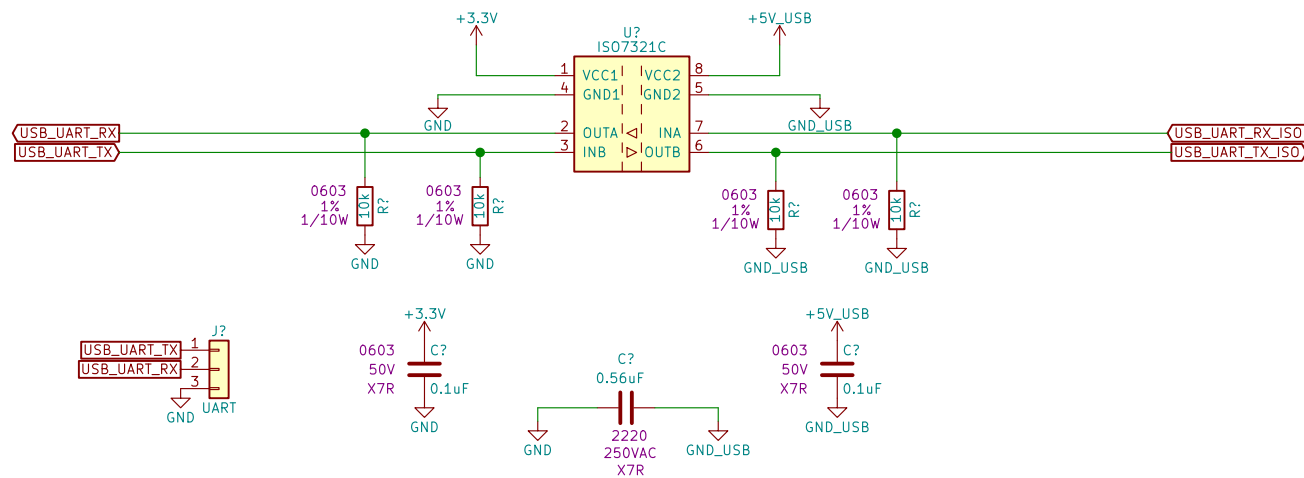
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Id: 5/25

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|--|--|--|--|--|----------|--|--|--|--|--|--|--|--|--|--|--|--|--|--|------|--|--|--|--|
| Sheet: /WiFi Module/<br>File: Wi-Fi_Module.sch |  |  |  |  |          |  |  |  |  |  |  |  |  |  |  |  |  |  |  |      |  |  |  |  |
| Title:   |  |  |  |  |          |  |  |  |  |  |  |  |  |  |  |  |  |  |  |      |  |  |  |  |
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| KiCad E.D.A. kicad (5.0.0)                     |  |  |  |  | Id: 5/25 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |      |  |  |  |  |



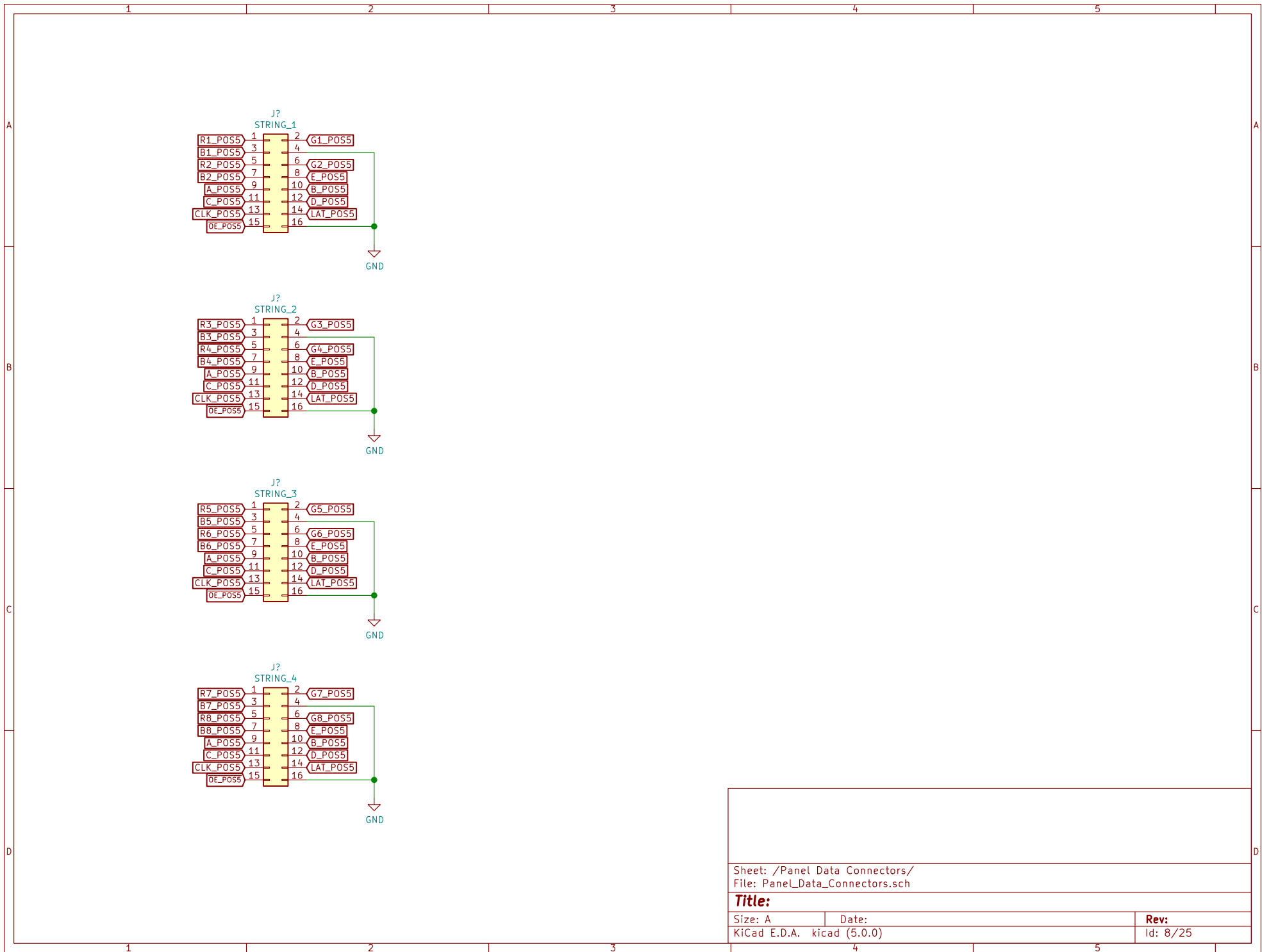
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Size: A Date:  
KiCad E.D.A. kicad (5.0.0)

**Rev:**  
Id: 6/25





Sheet: /Panel Data Connectors/  
File: PanelData\_Connectors.sch

**Title:**

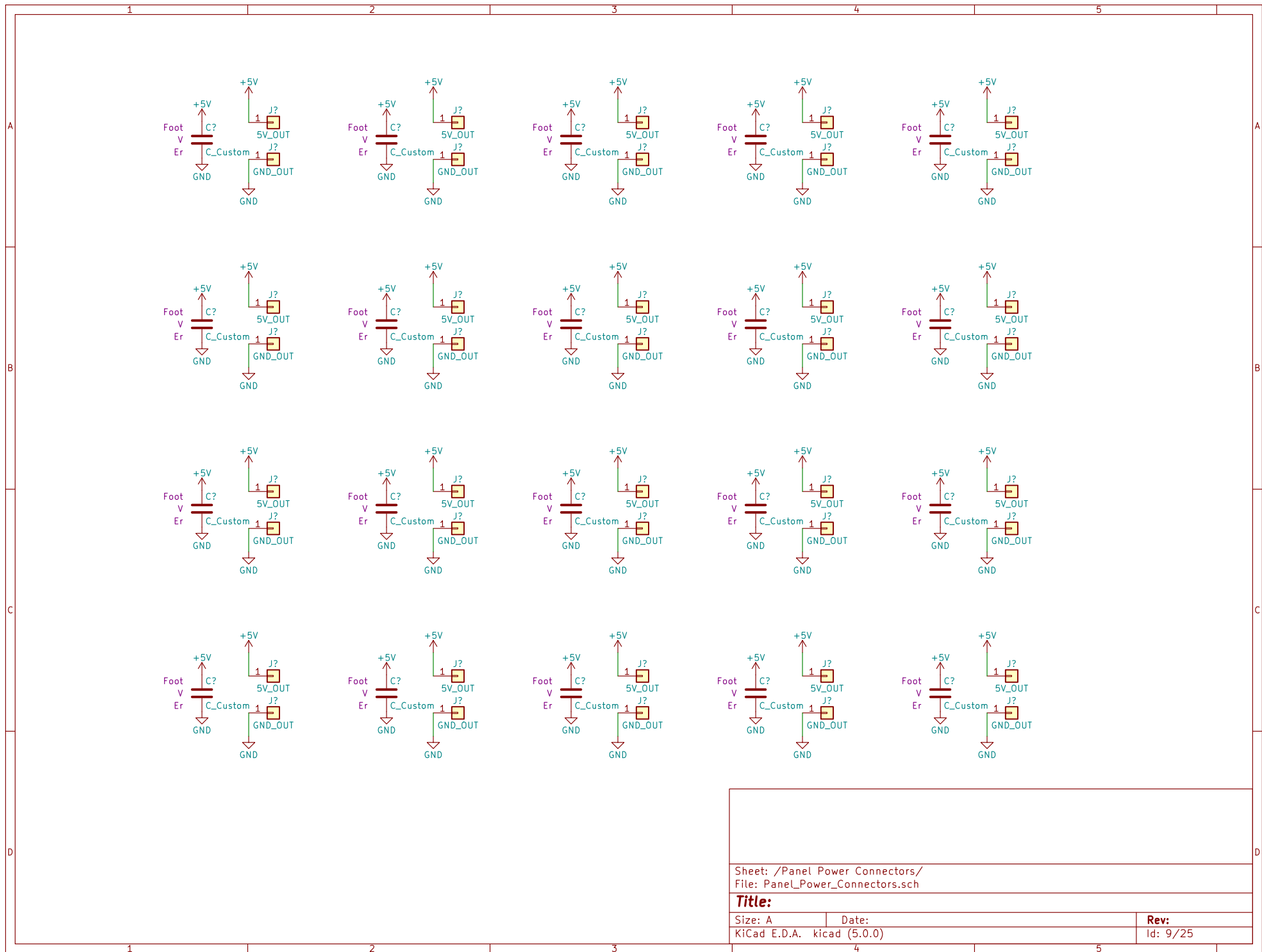
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KiCad E.D.A. kicad (5.0.0)

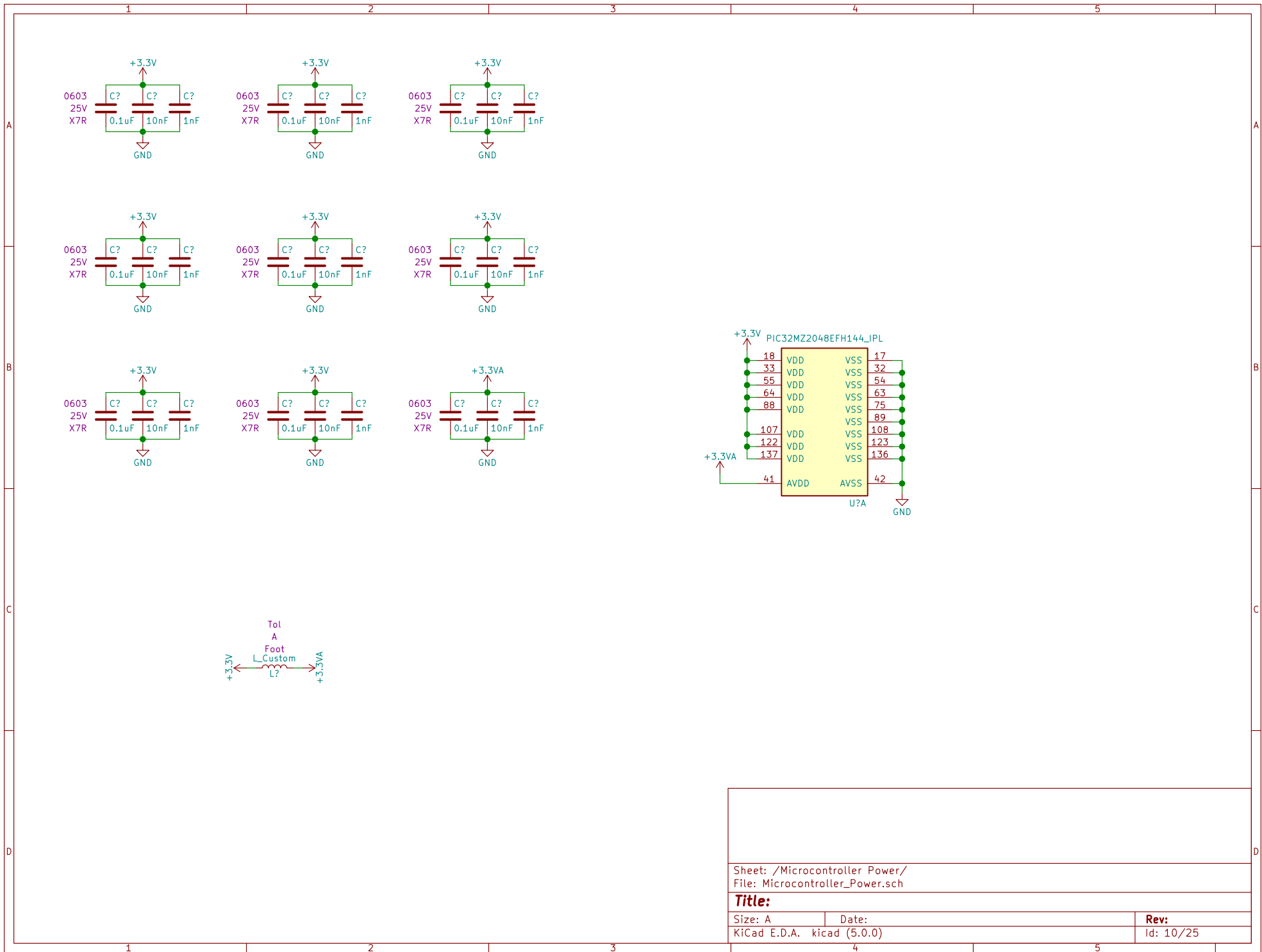
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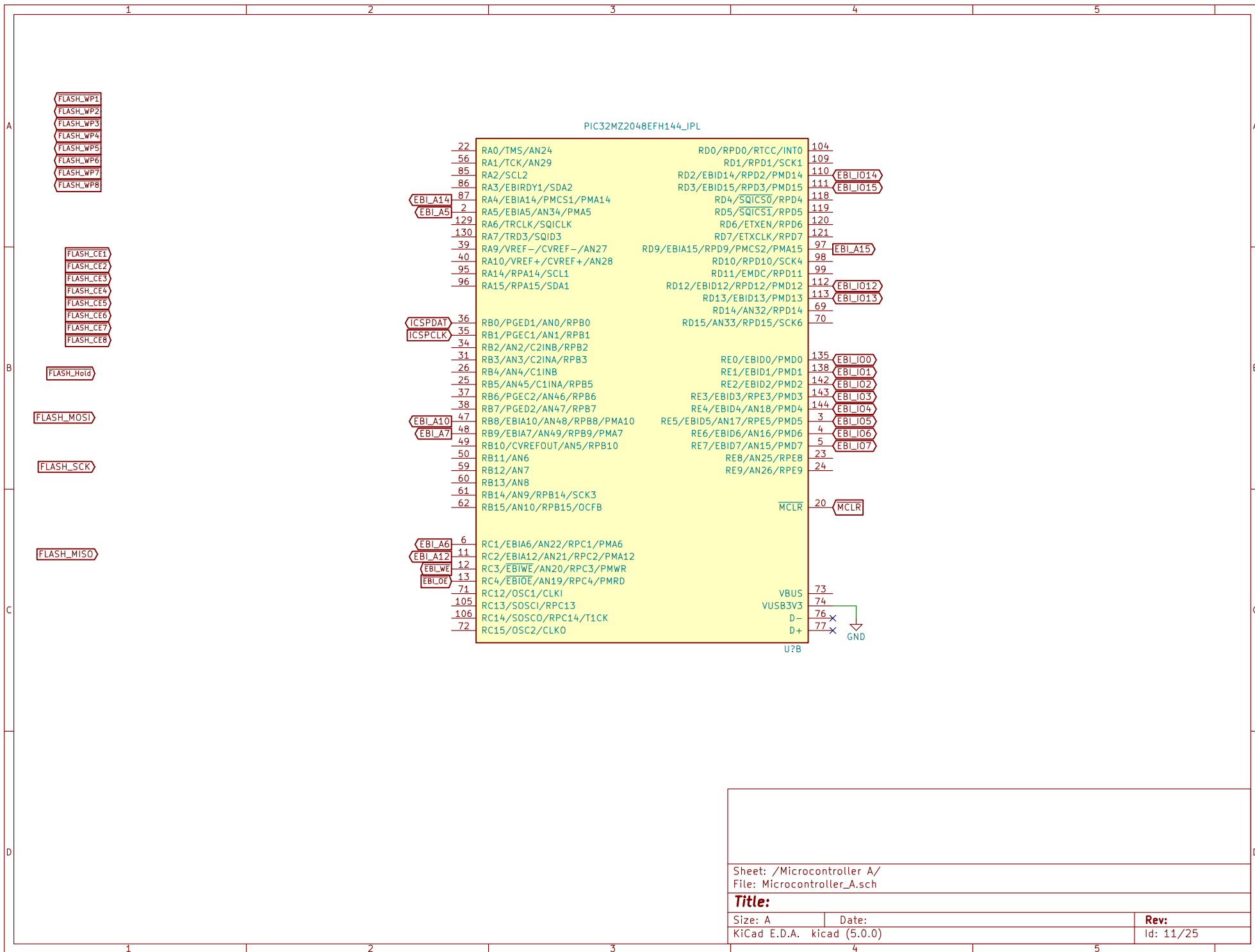
Rev:

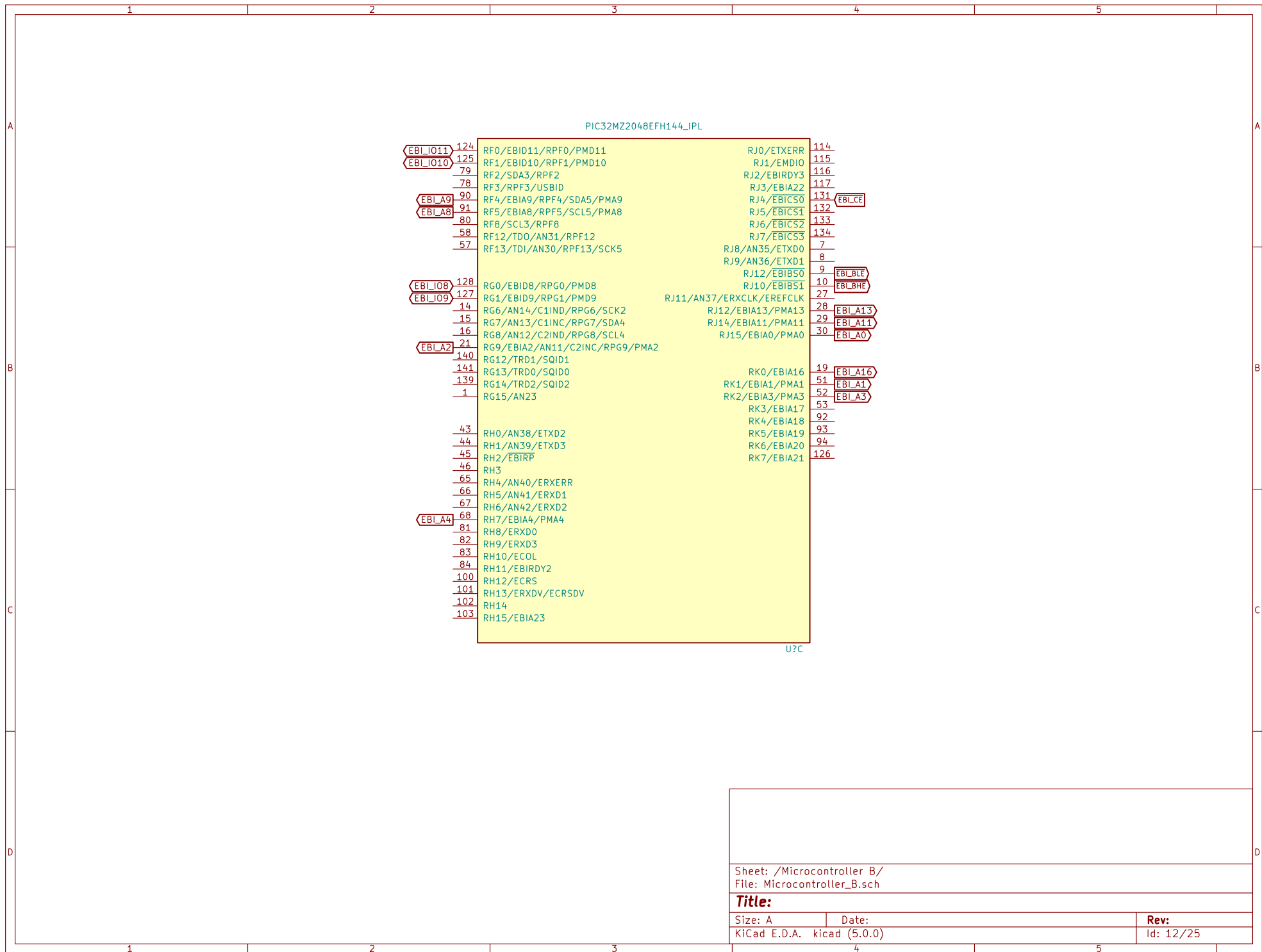
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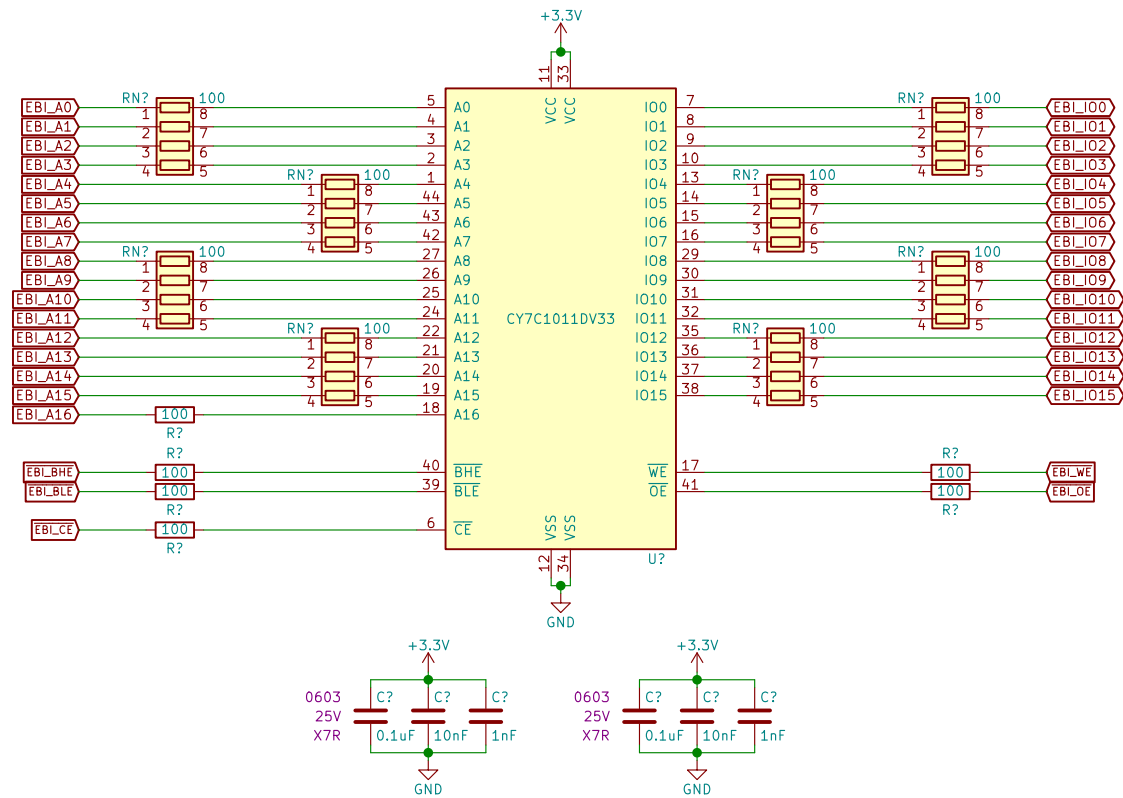












Sheet: /External SRAM/  
File: External\_SRAM.sch

**Title:**

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KiCad E.D.A. kicad (5.0.0)

**Rev:**  
Id: 13/25



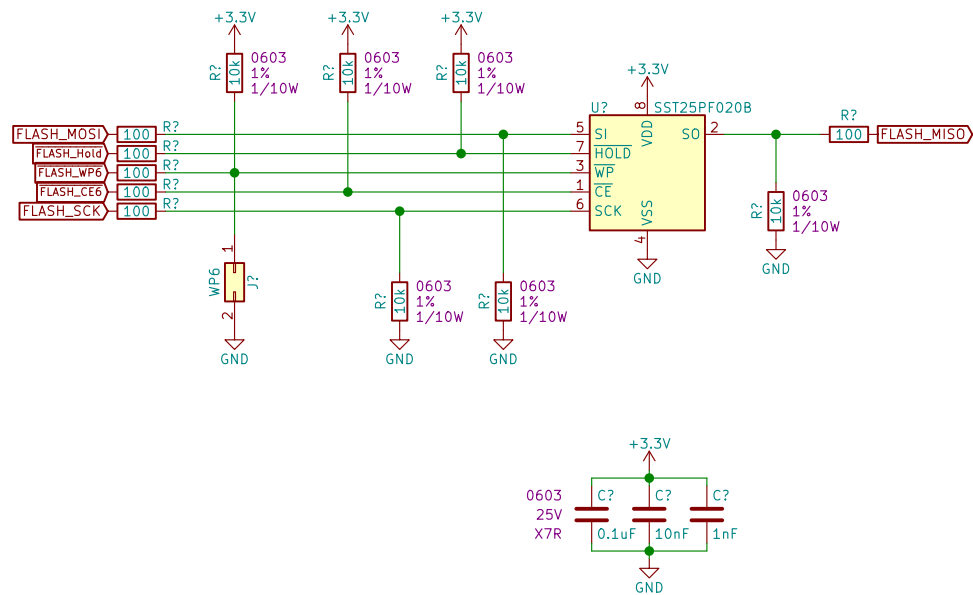












Sheet: /External Flash 6/  
File: External\_Flash\_6.sch

**Title:**

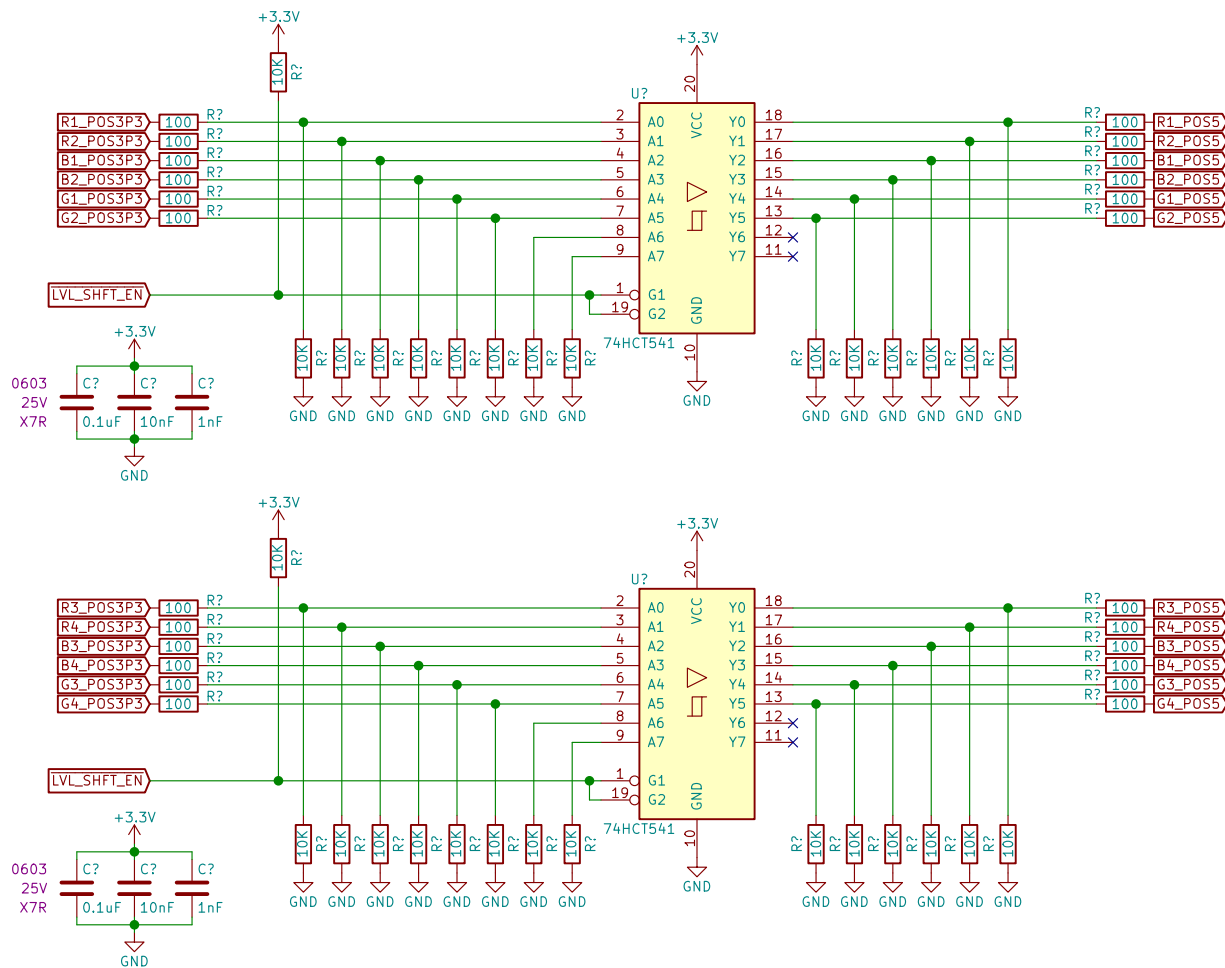
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**Rev:**  
Id: 19/25







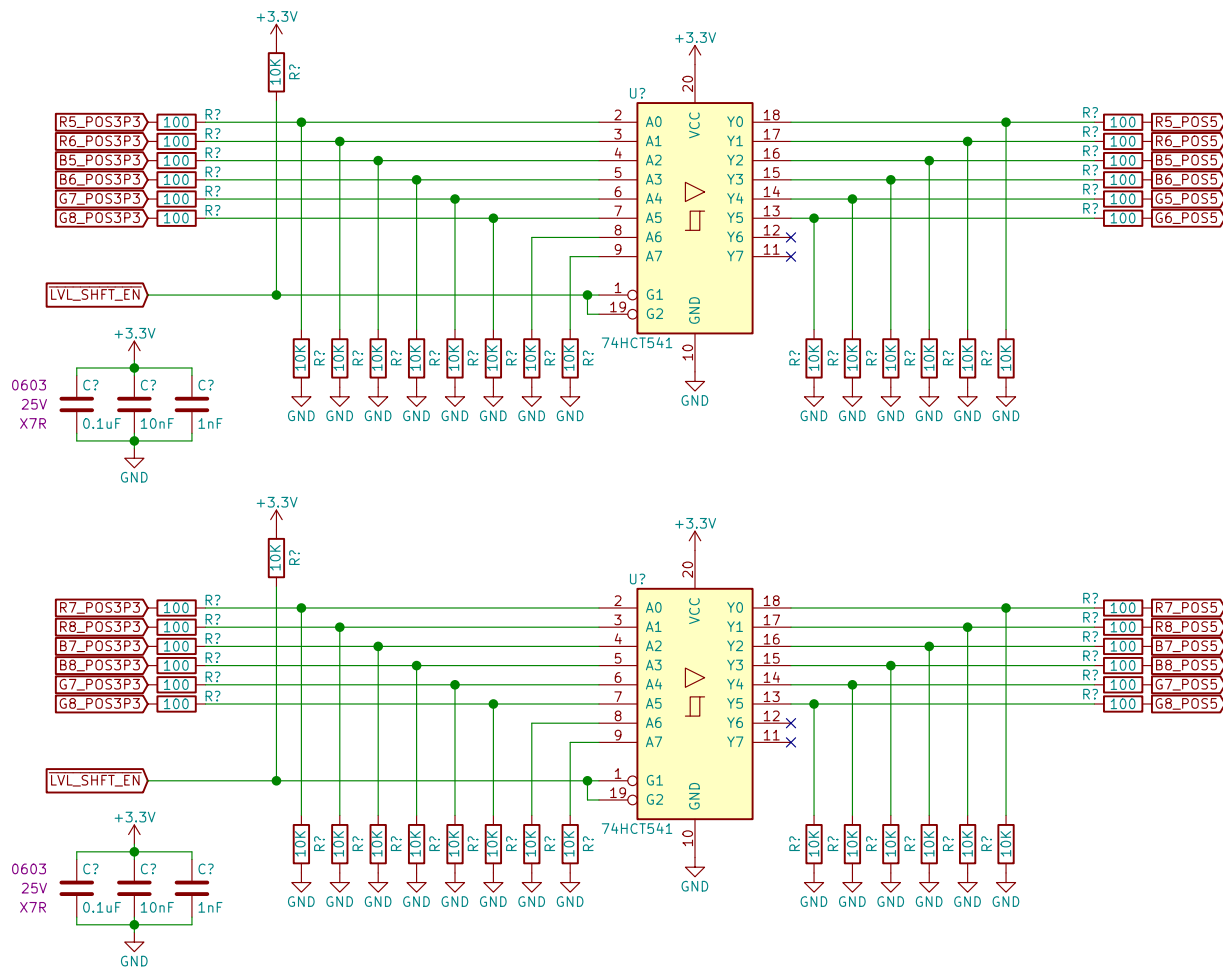


Sheet: /Panel Data Level Shifters 1/  
File: PanelData\_LevelShifters\_1.sch

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Size: A Date:  
KiCad E.D.A. kicad (5.0.0)

**Rev:**  
Id: 23/25



Sheet: /Panel Data Level Shifters 2/  
File: PanelData\_LevelShifters\_2.sch

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Size: A  
KiCad E.D.A. kicad (5.0.0)

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Rev:  
Id: 25/25