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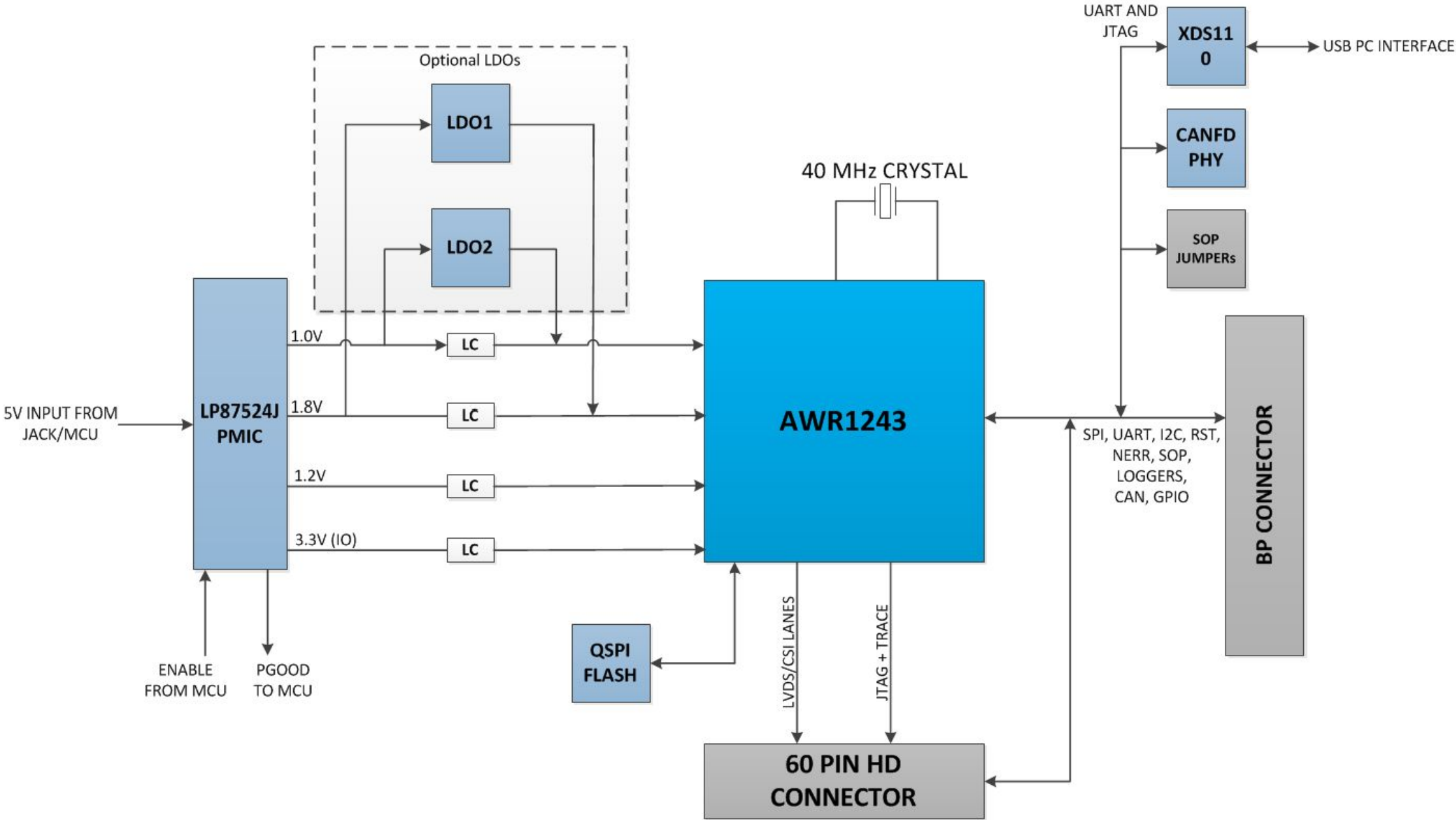
BLOCK DIAGRAM

Revision History

Rev	ECN #	Approved Date	Approved by	Notes
B	1	27/04/2018	Adrian Ozer	Added switch control to move between SPI and CAN interface
B	2	27/04/2018	Adrian Ozer	Enabled by default the 5V supply form the 60pin HD connector
B	3	27/04/2018	Adrian Ozer	Enabled by default the SYNC_IN signal connection to J6 connector
B	4	27/04/2018	Adrian Ozer	Serial flash part number updated to MX25V1635FZNQ
B	5	27/04/2018	Adrian Ozer	Added series resistors on I2C lines
B	6	27/04/2018	Adrian Ozer	Removed the series diode on the NRST signal
B	7	27/04/2018	Adrian Ozer	Enabled by default the LDO bypass option
B	8	27/04/2018	Adrian Ozer	Added variant 002 for AWR1443
B	9	27/04/2018	Adrian Ozer	Added vairant 003 for IWR1443

TABLE OF CONTENTS

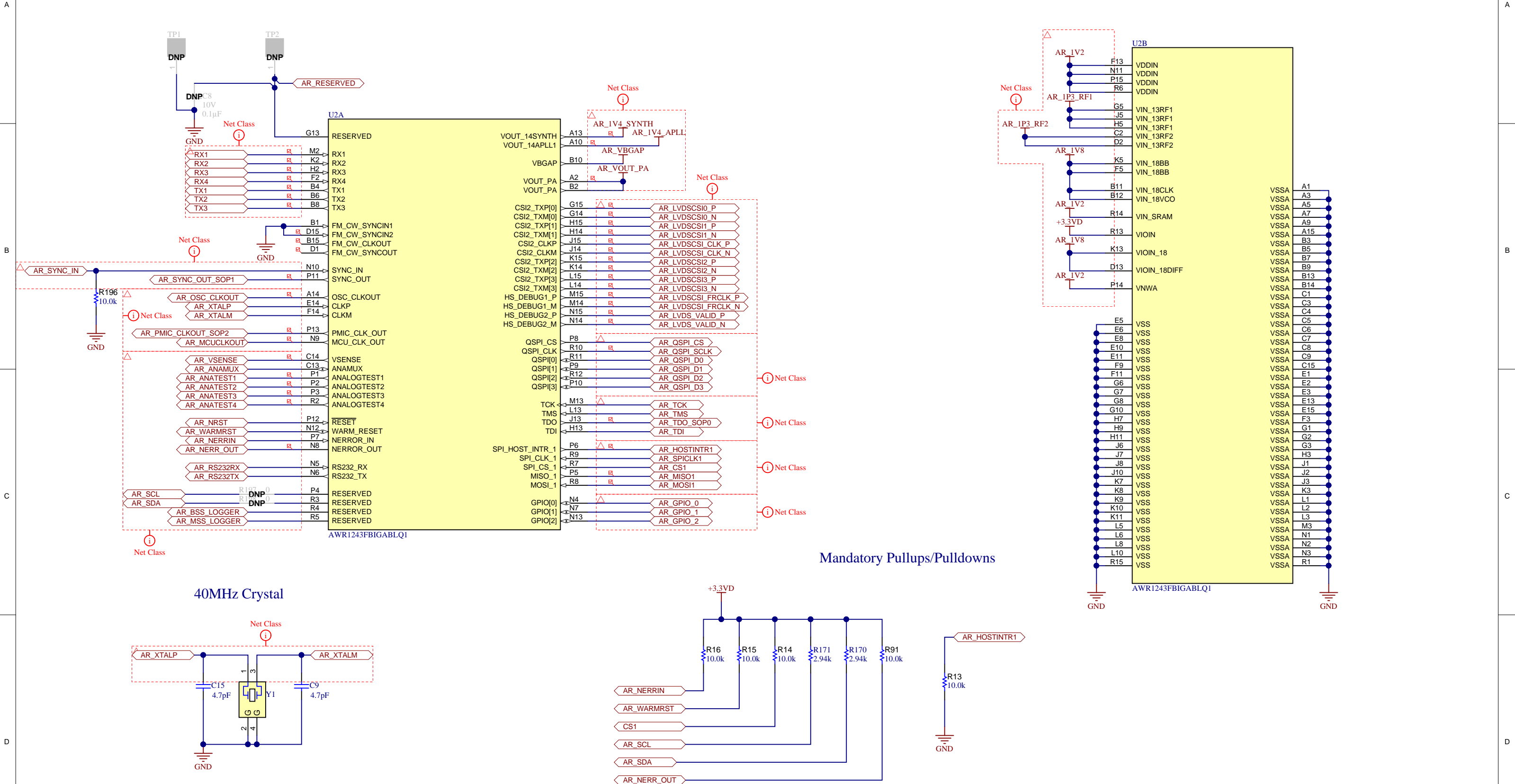
SHEET NO.	SHEET NAME
1	PROC010B_CoverSheet
2	PROC010B_DUT
3	PROC010B_DECOUPLING_CAPS
4	PROC010B_PMIC
5	PROC010B_LC_FILTERING
6	PROC010B_SOP_HEADERS
7	PROC010B_QSPI_Flash
8	PROC010B_Pwr_RST_LEDs
9	PROC010B_LDO
10	PROC010B_HD_Connector
11	PROC010B_LP_Connector
12	PROC010B_XDS110_Interface_1A
13	PROC010B_XDS110_Interface_1B
14	PROC010B_CAN_Interface
15	PROC010B_Tempsensor
16	PROC010B_Hardware



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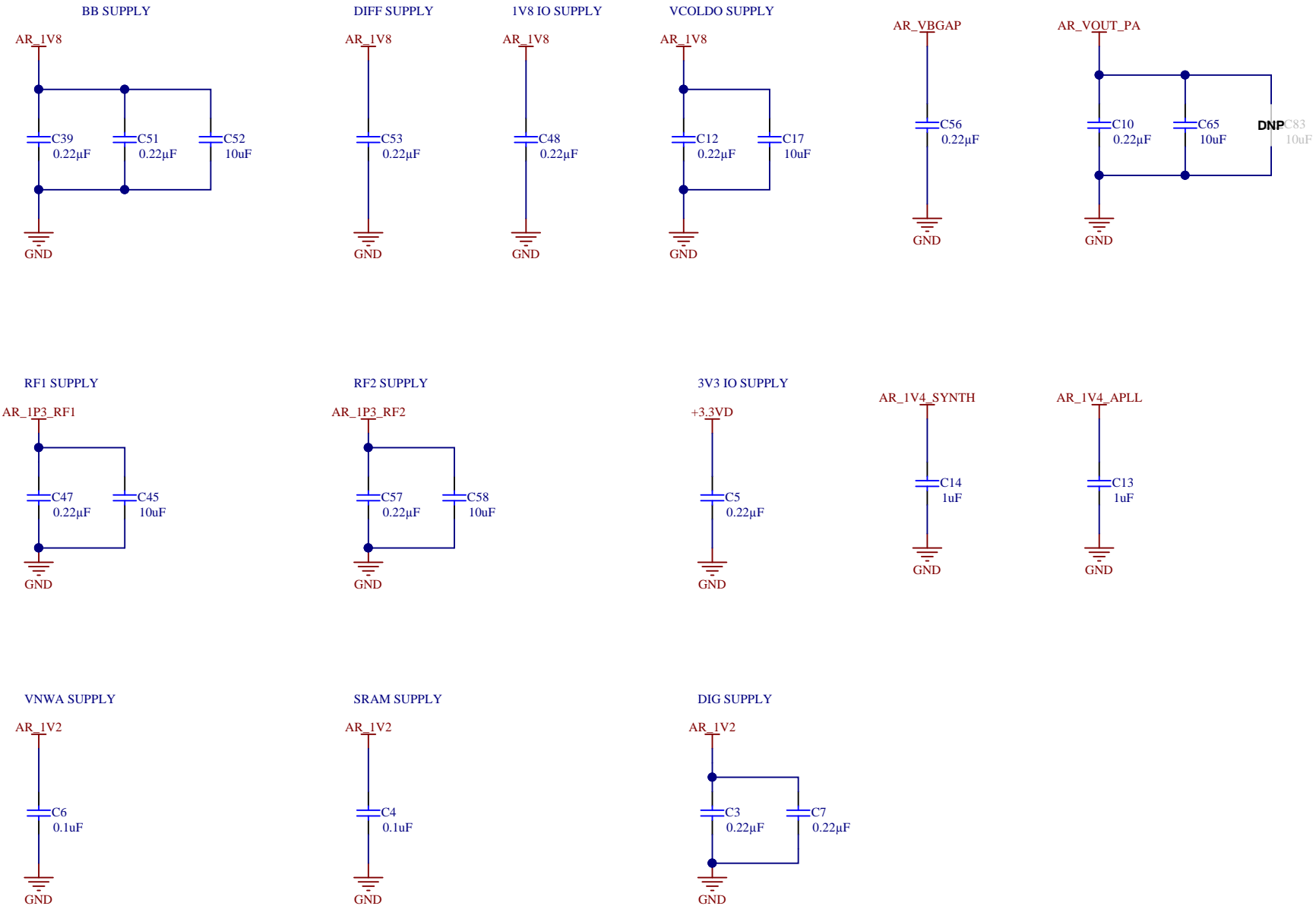
Orderable: AWR1243BOOST	Designed for: Public Release	Mod. Date: 9/4/2018
TID #: N/A	Project Title: PROC010	
Number: PROC010	Rev: B	Sheet Title:
SVN Rev: Not in version control	Assembly Variant: 001	Sheet: 1 of 16
Drawn By: Adrian Ozer	File: PROC010B_CoverSheet.SchDoc	Size: B
Engineer: Adrian Ozer	Contact: http://www.ti.com/support	

DUT REFERENCE




Mandatory Pullups/Pulldowns

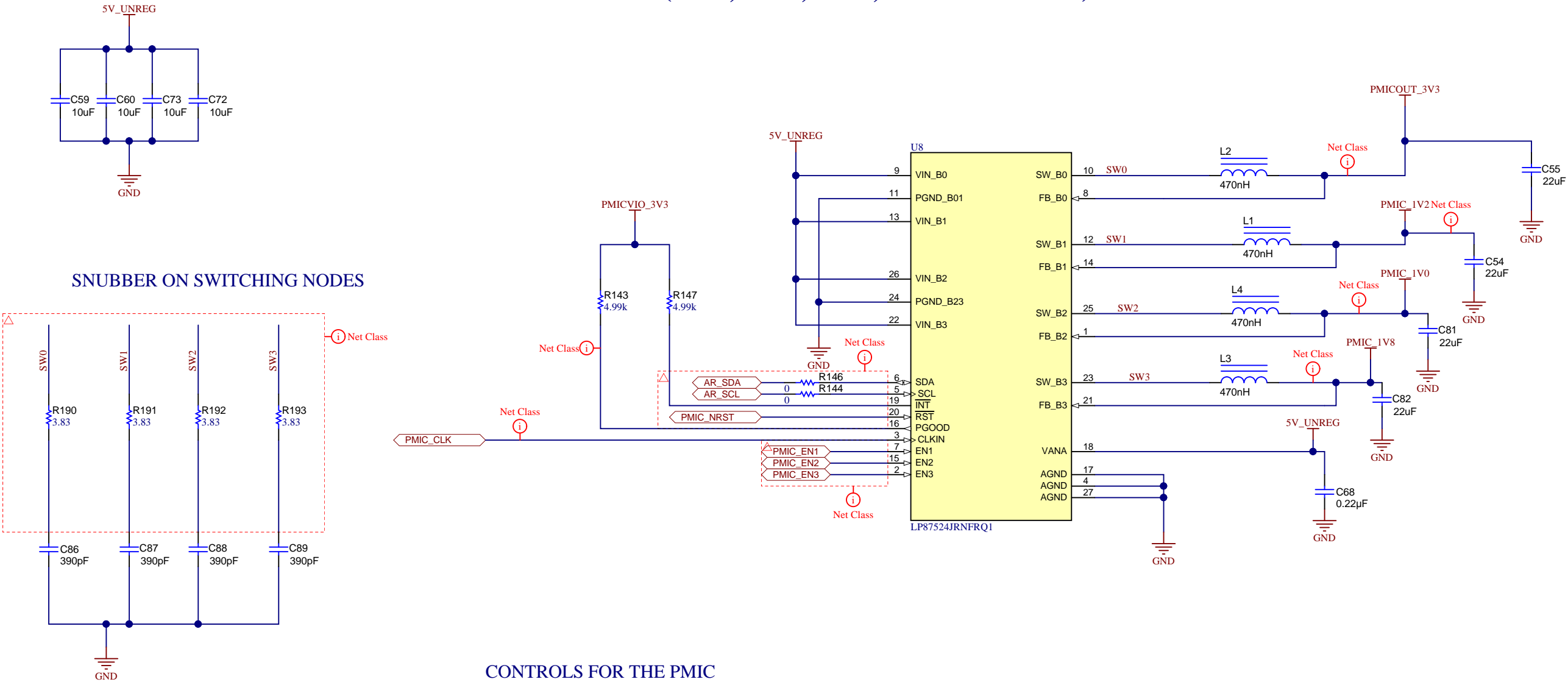
DECOUPLING CAPS REFERENCE



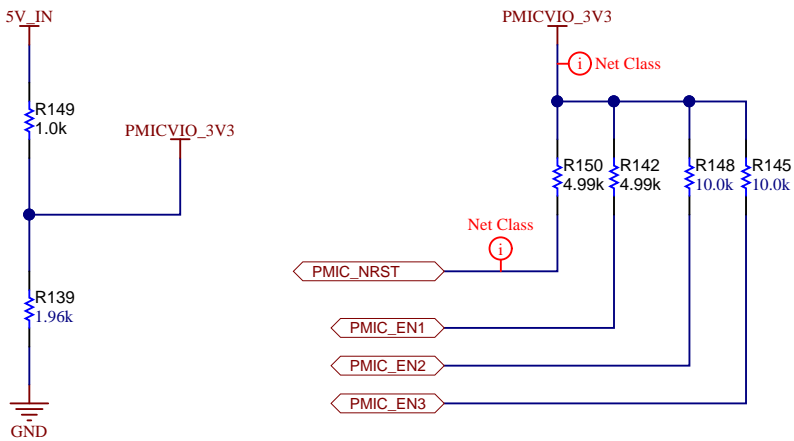
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Orderable: AWR1243BOOST	Designed for: Public Release	Mod. Date: 9/4/2018	
TID #: N/A	Project Title: PROC010		
Number: PROC010	Rev: B	Sheet Title:	
SVN Rev: Not in version control	Assembly Variant: 001	Sheet: 3 of 16	
Drawn By: Adrian Ozer	File: PROC010B_Decoupling_Caps_Reference_Sch.Dwg	Size: B	
Engineer: Adrian Ozer	Contact: http://www.ti.com/support		http://www.ti.com © Texas Instruments 2018

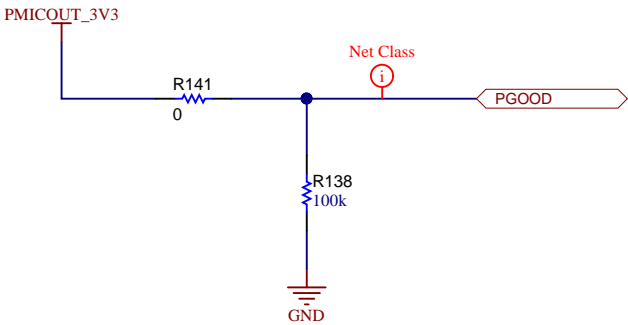
PMIC (3.3V, 1.2V, 1.8V,2.3V OUTPUTS) REFERENCE

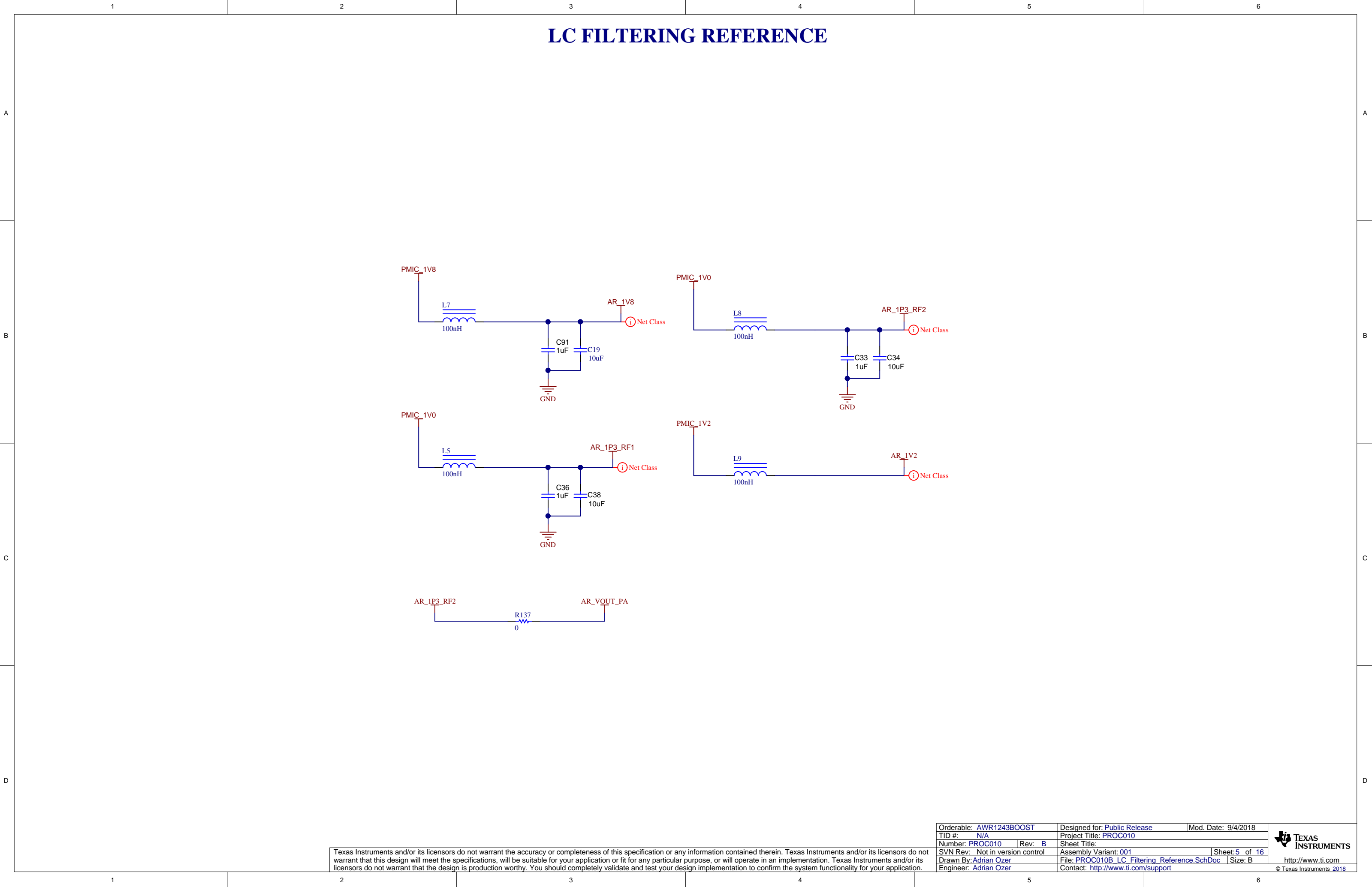


CONTROLS FOR THE PMIC

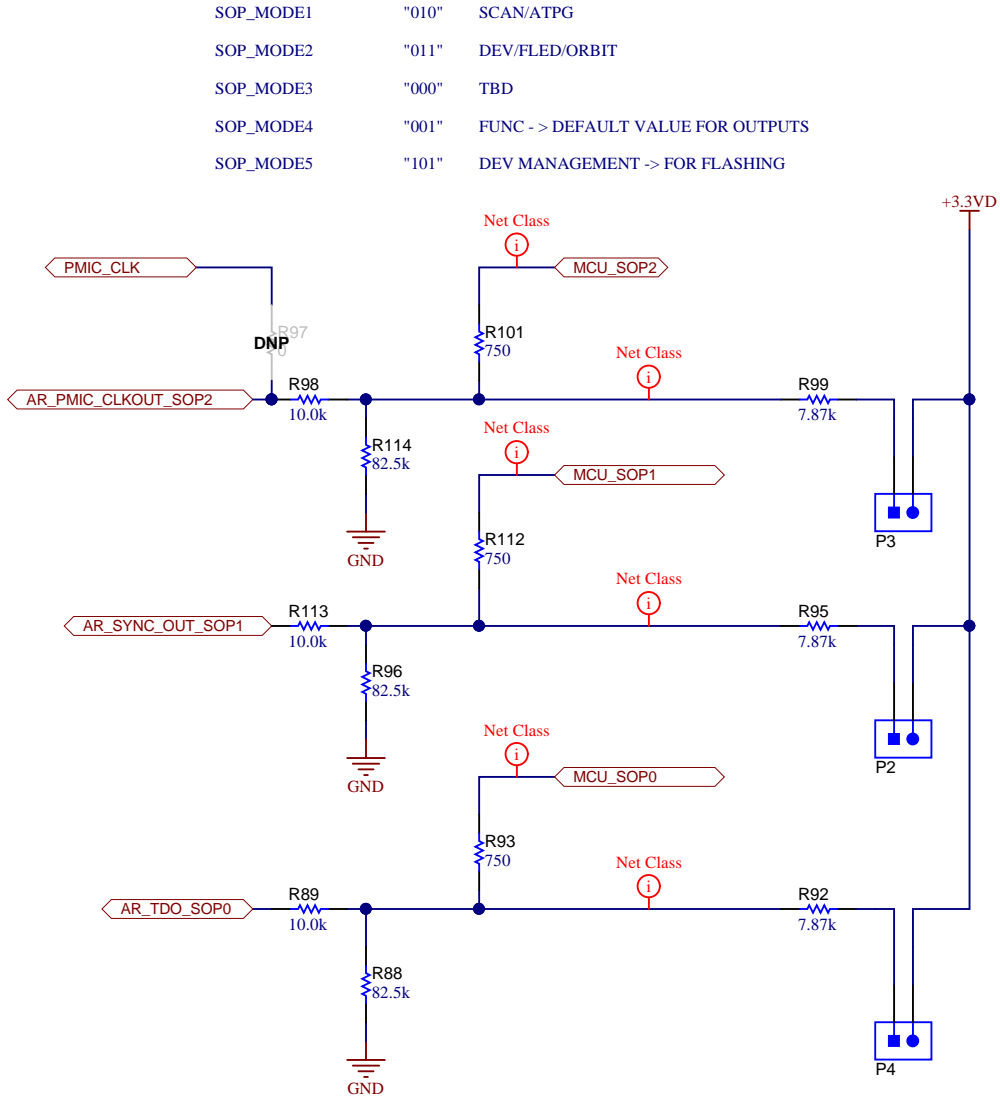


THE 3V3 OUTPUT FROM PMIC IS USED AS PGOOD.





SOP HEADERS REFERENCE



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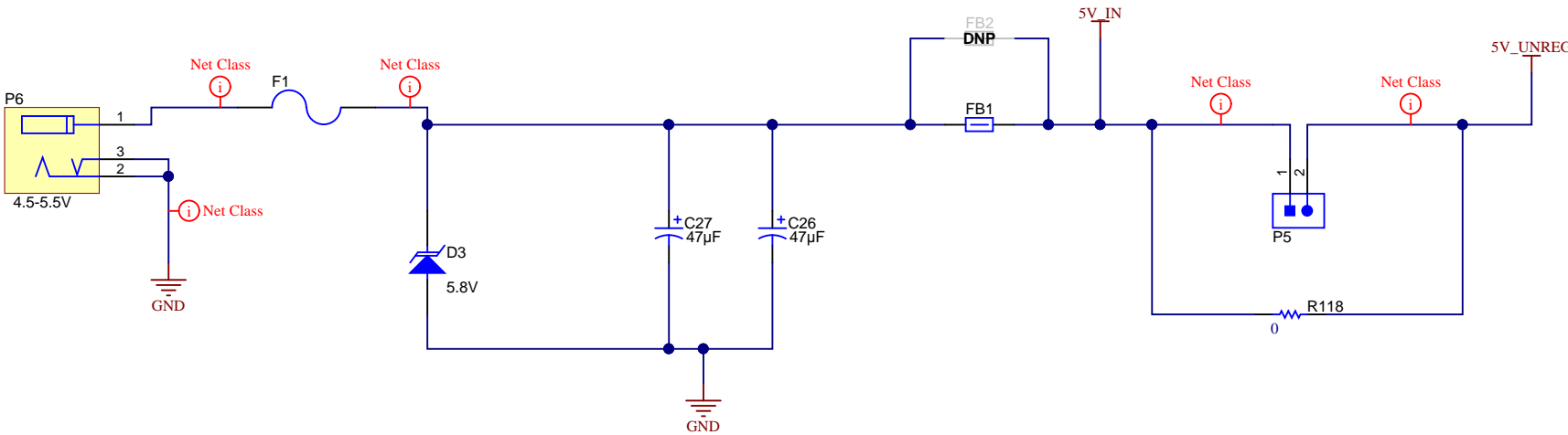
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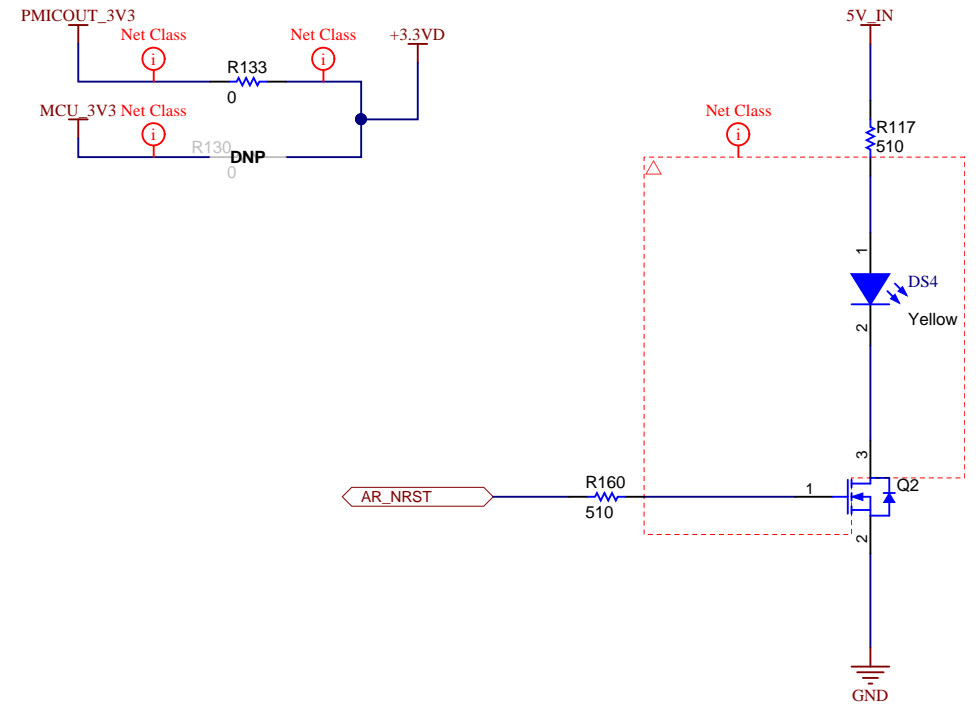
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POWER SUPPLY CONNECTOR

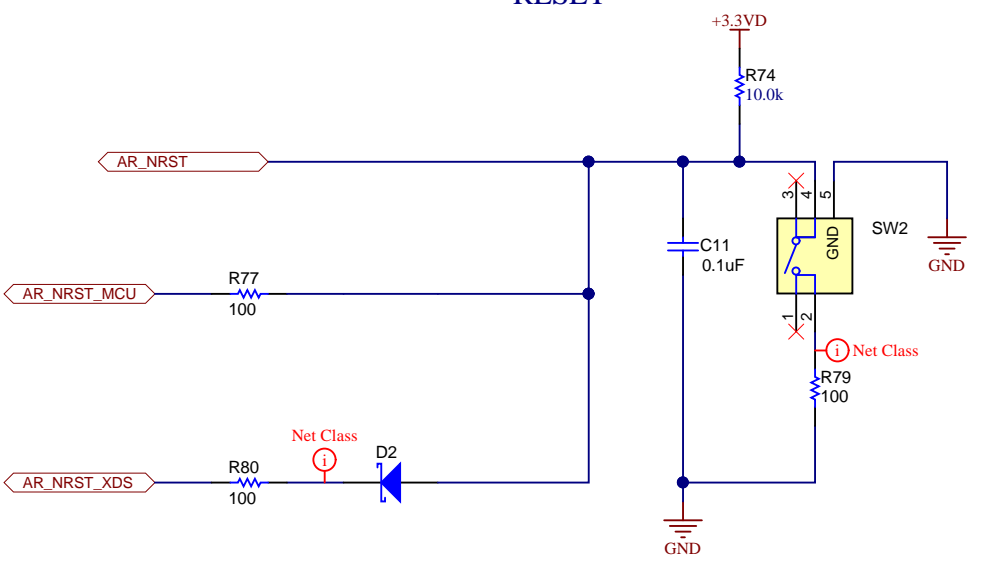


3P3 SUPPLY FROM PMIC OR FROM THE MCU

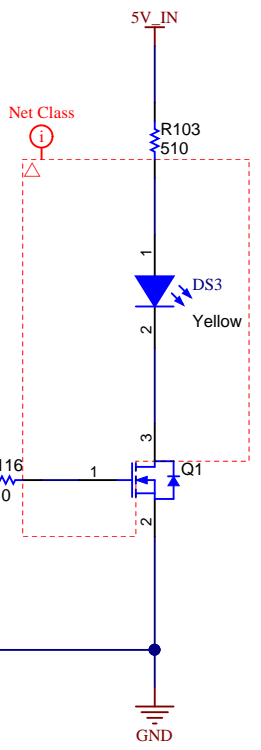
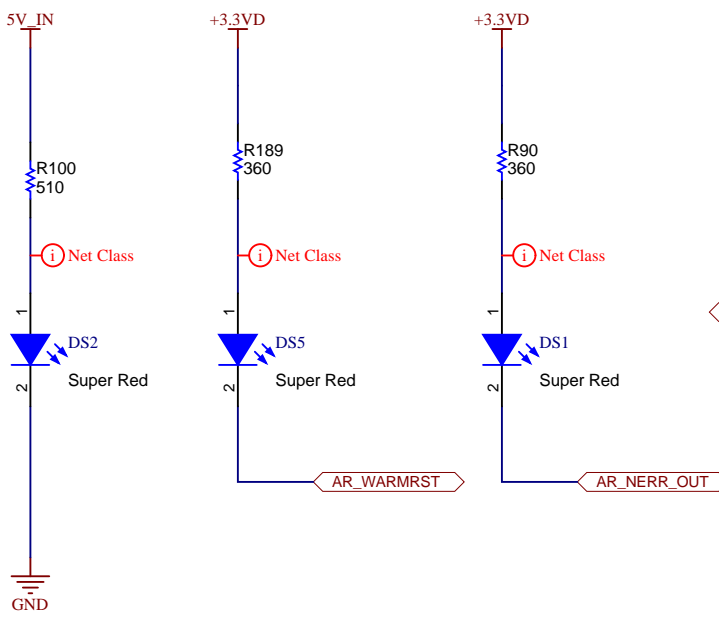


RESET AND LEDS

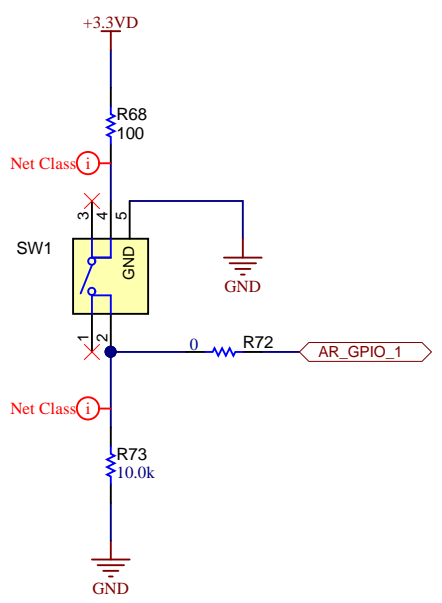
RESET



INDICATION LEDS



TRIGGER GPIO



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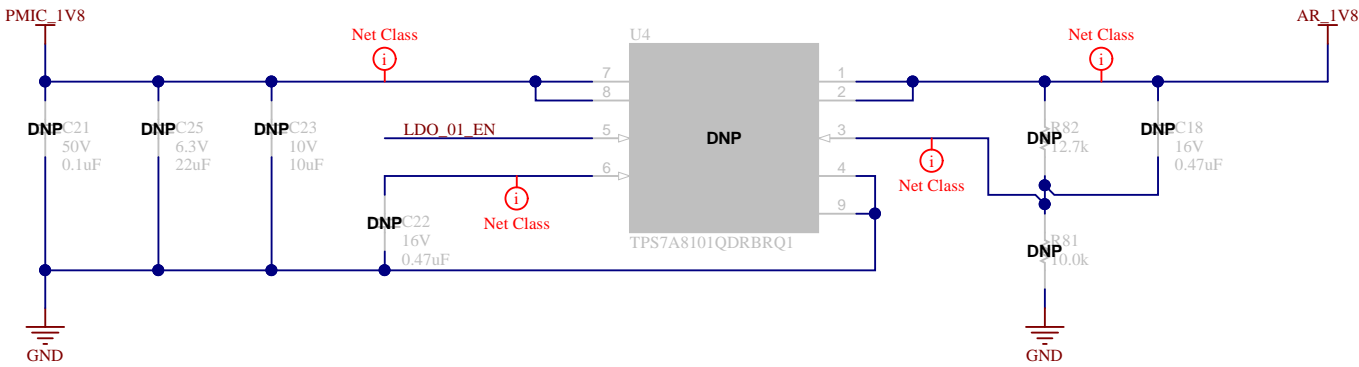
B

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LDO

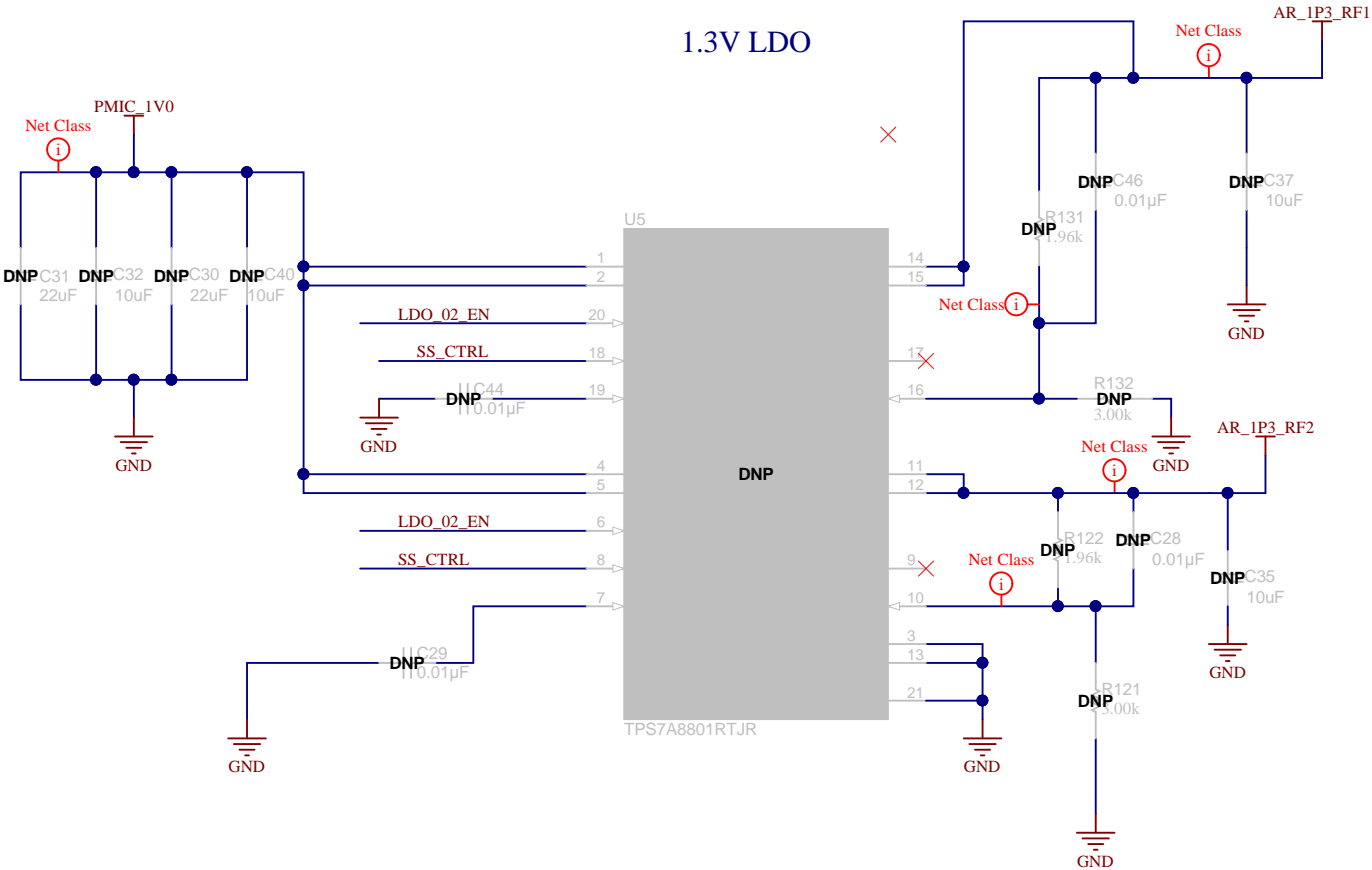
1.8V LDO



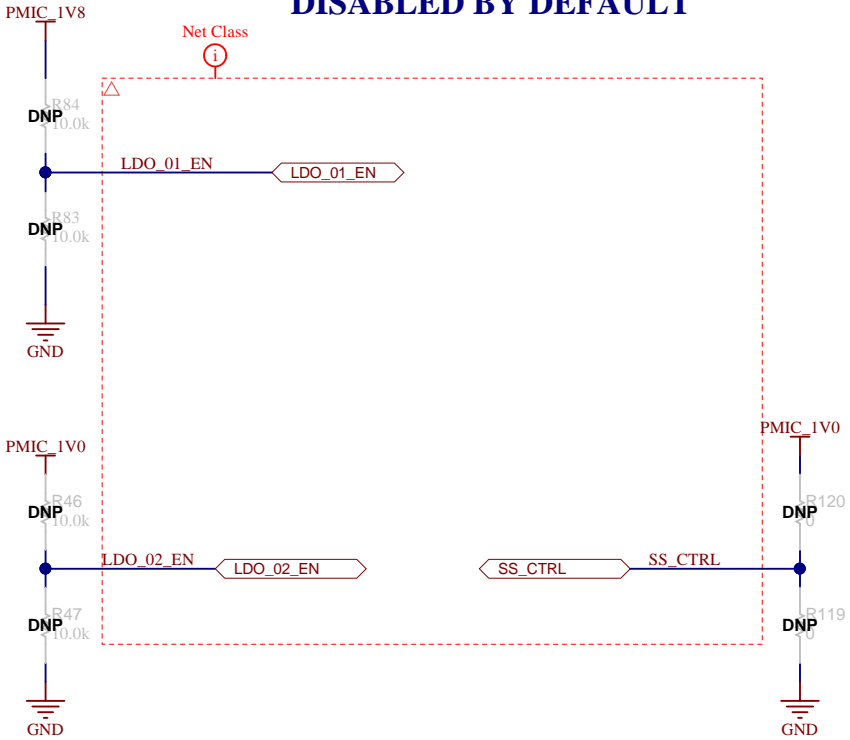
LDOs ARE FOR DEBUG PURPOSES ONLY

DURING LDO OPERATION PMIC_1V8 IS 2.3V AND PMIC_1V0 IS 1.8V

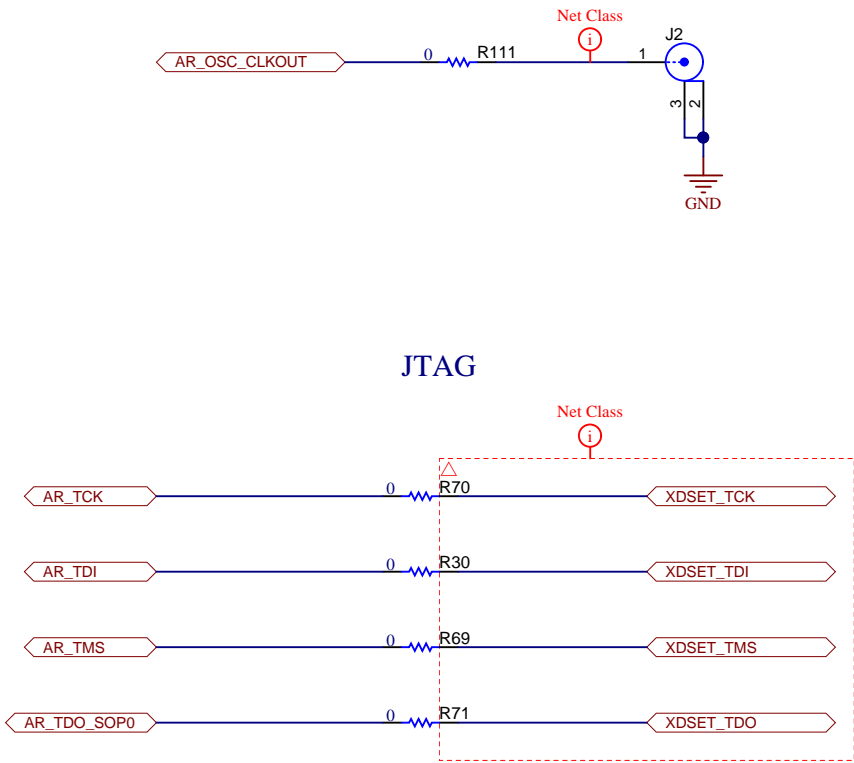
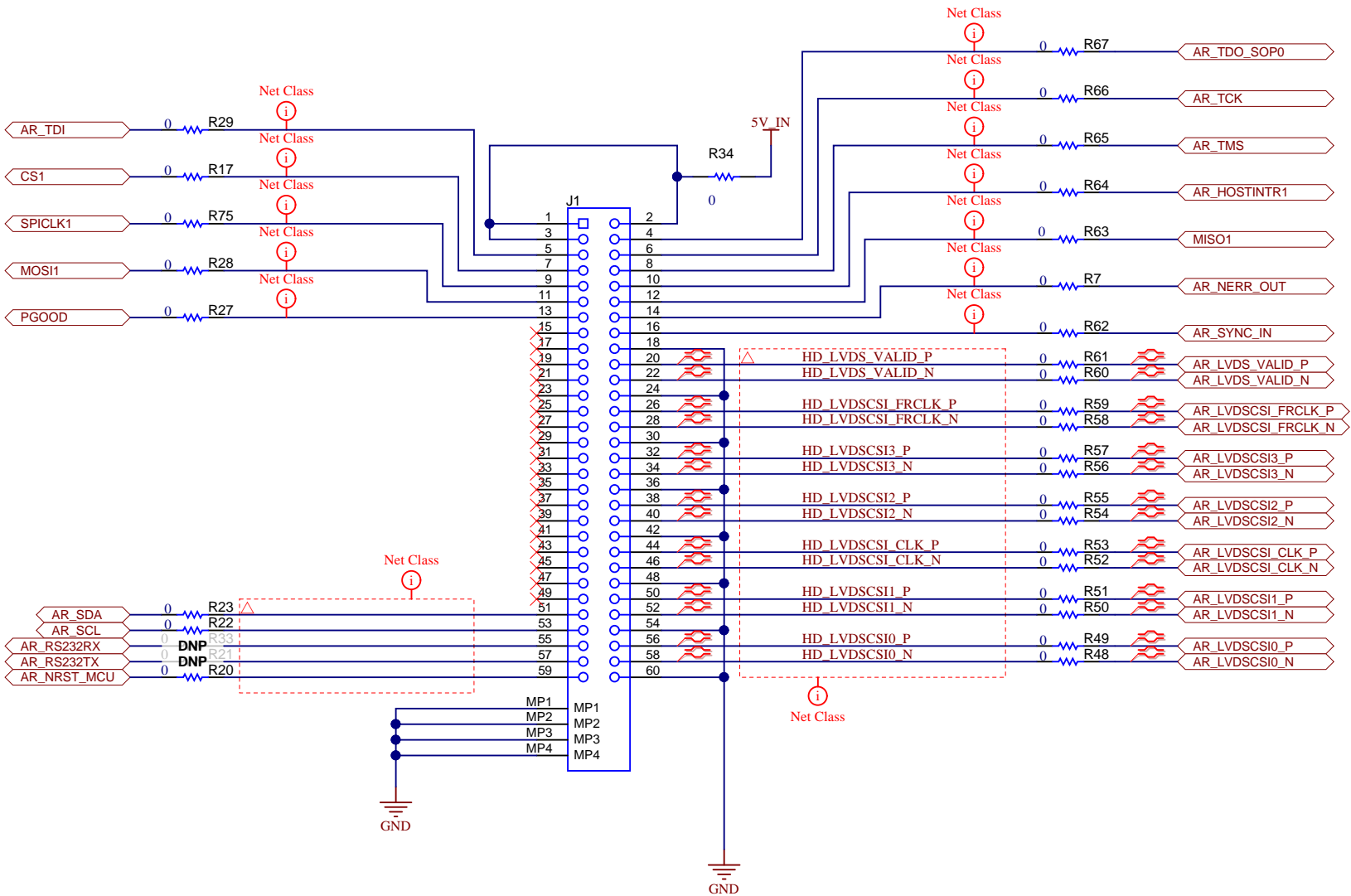
1.3V LDO



DISABLED BY DEFAULT



HD CONNECTOR FOR LVDS/CSI AND JTAG



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Orderable: AWR1243BOOST	Designed for: Public Release	Mod. Date: 9/4/2018
TID #: N/A	Project Title: PROC010	
Number: PROC010	Rev: B	Sheet Title: HD Connector
SVN Rev: Not in version control	Assembly Variant: 001	Sheet: 10 of 16
Drawn By: Adrian Ozer	File: PROC010B_HD Connector.SchDoc	Size: B
Engineer: Adrian Ozer	Contact: http://www.ti.com/support	

BP/LP CONNECTOR

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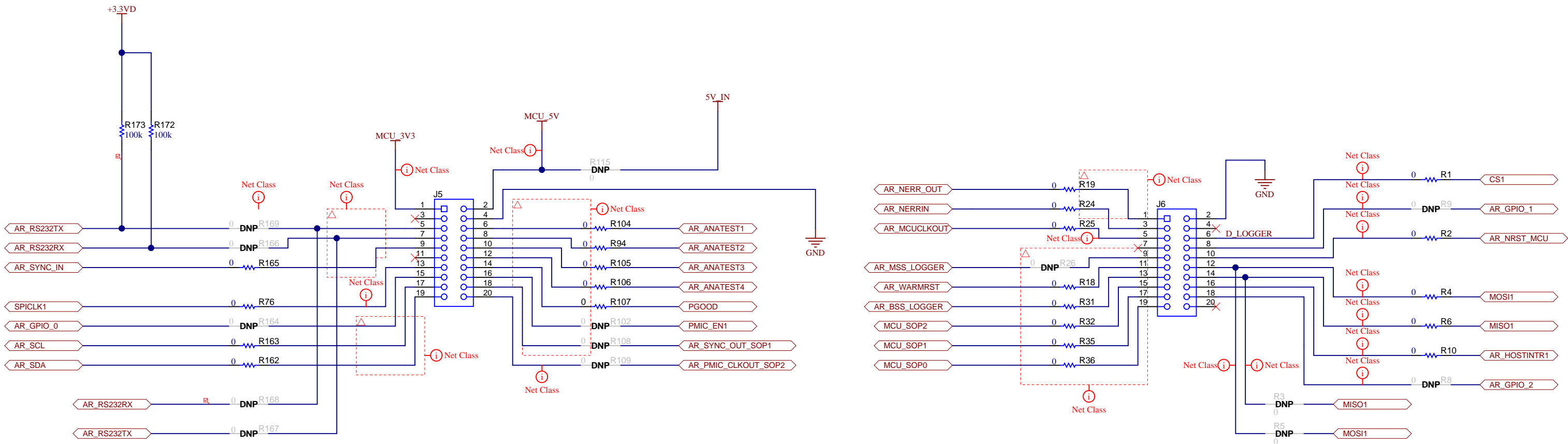
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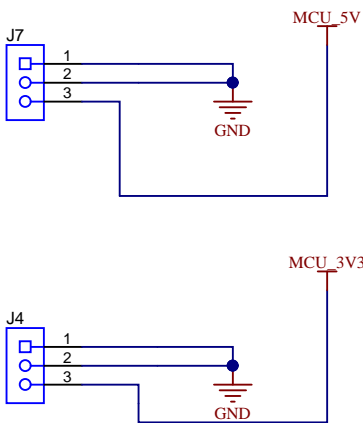
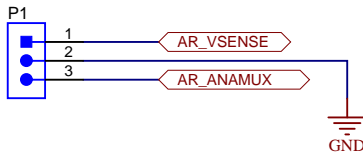
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ANALOG SIGNALS

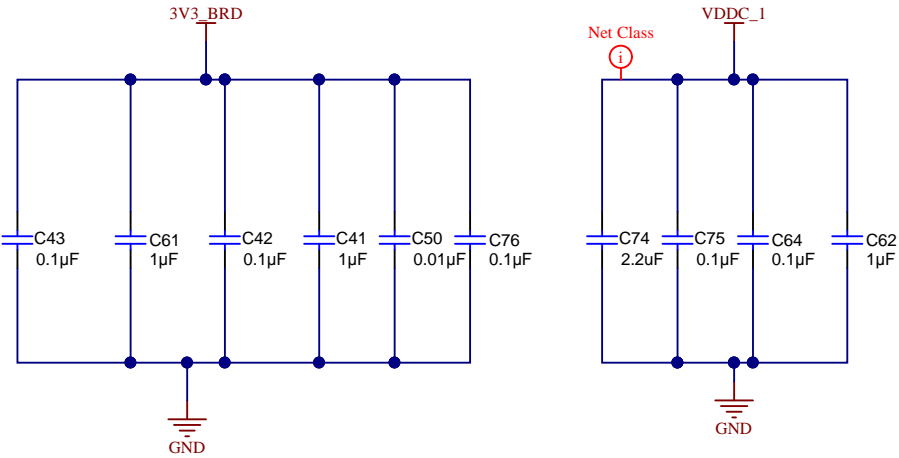
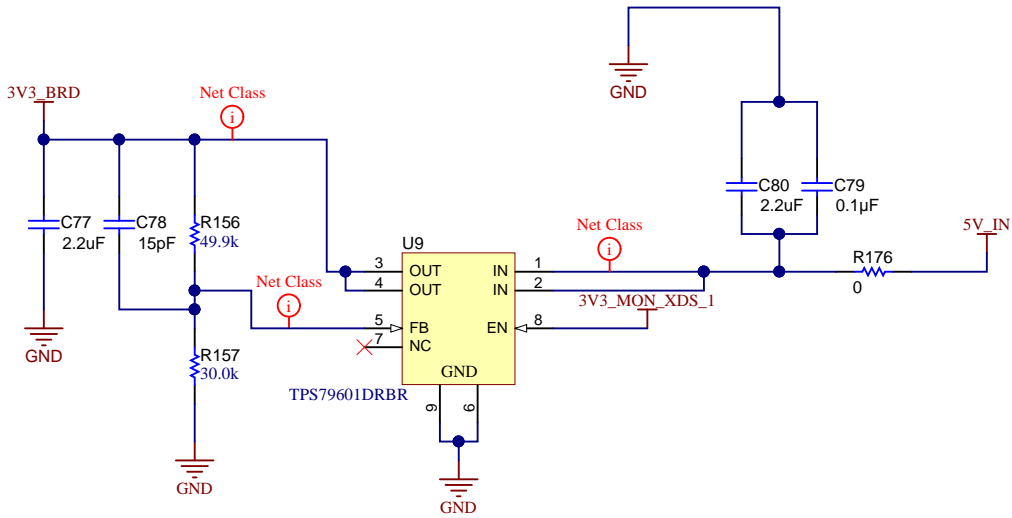


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Orderable: AWR1243BOOST	Designed for: Public Release	Mod. Date: 9/4/2018
TID #: N/A	Project Title: PROC010	
Number: PROC010	Rev: B	Sheet Title: LP Connector
SVN Rev: Not in version control	Assembly Variant: 001	Sheet: 11 of 16
Drawn By: Adrian Ozer	File: PROC010B_LP Connector.SchDoc	Size: B
Engineer: Adrian Ozer	Contact: http://www.ti.com/support	

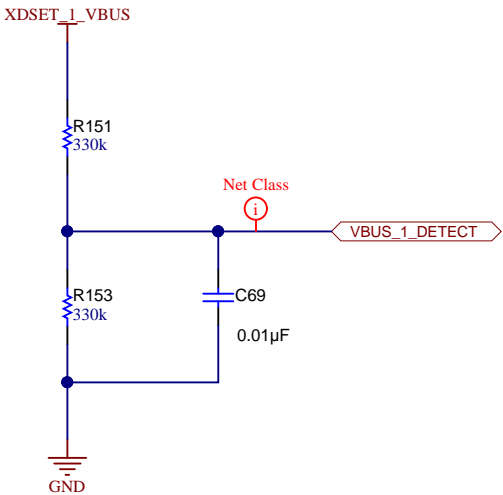
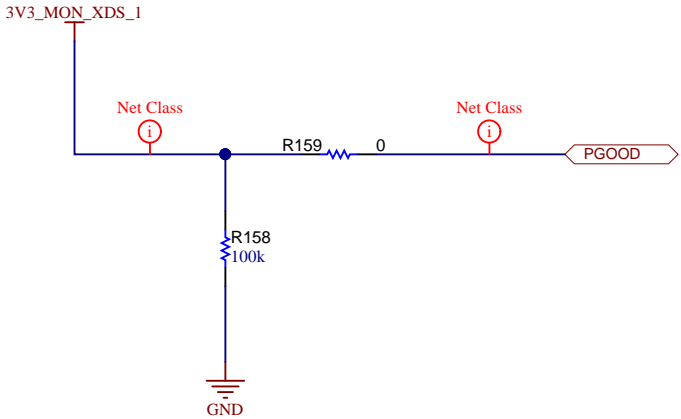
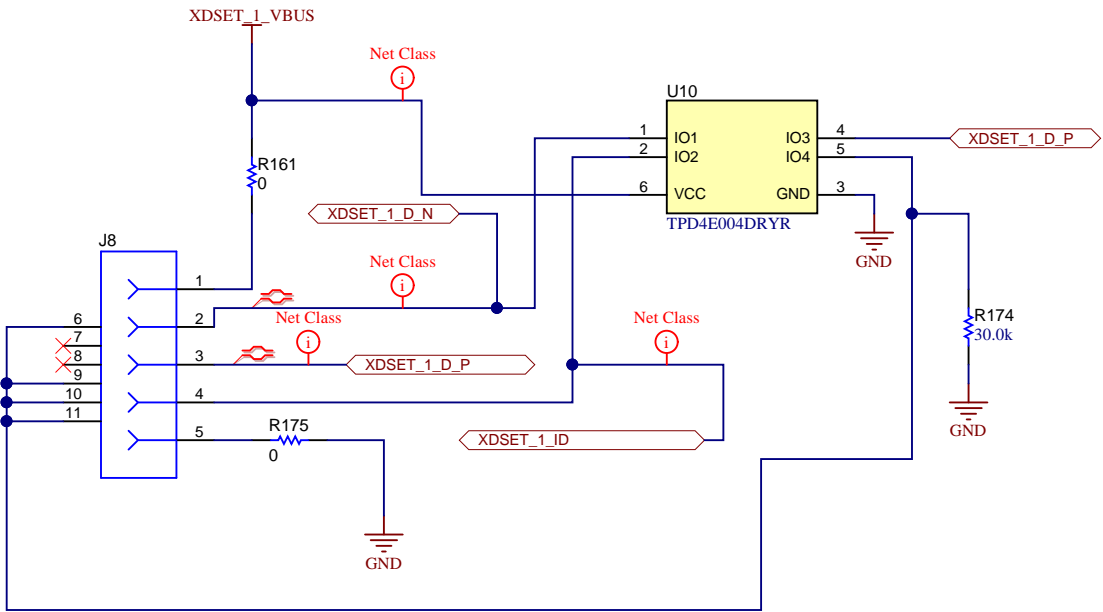
XDS110(1/2)

3.3V LDO FOR PERIPHERALS



BY DEFAULT THE XDS SUPPLY IS DISABLED..
GETS ENABLED ONLY ONCE THE PMIC IS POWERED UP.

USB PORT AND ESD



XDS110(2/2)

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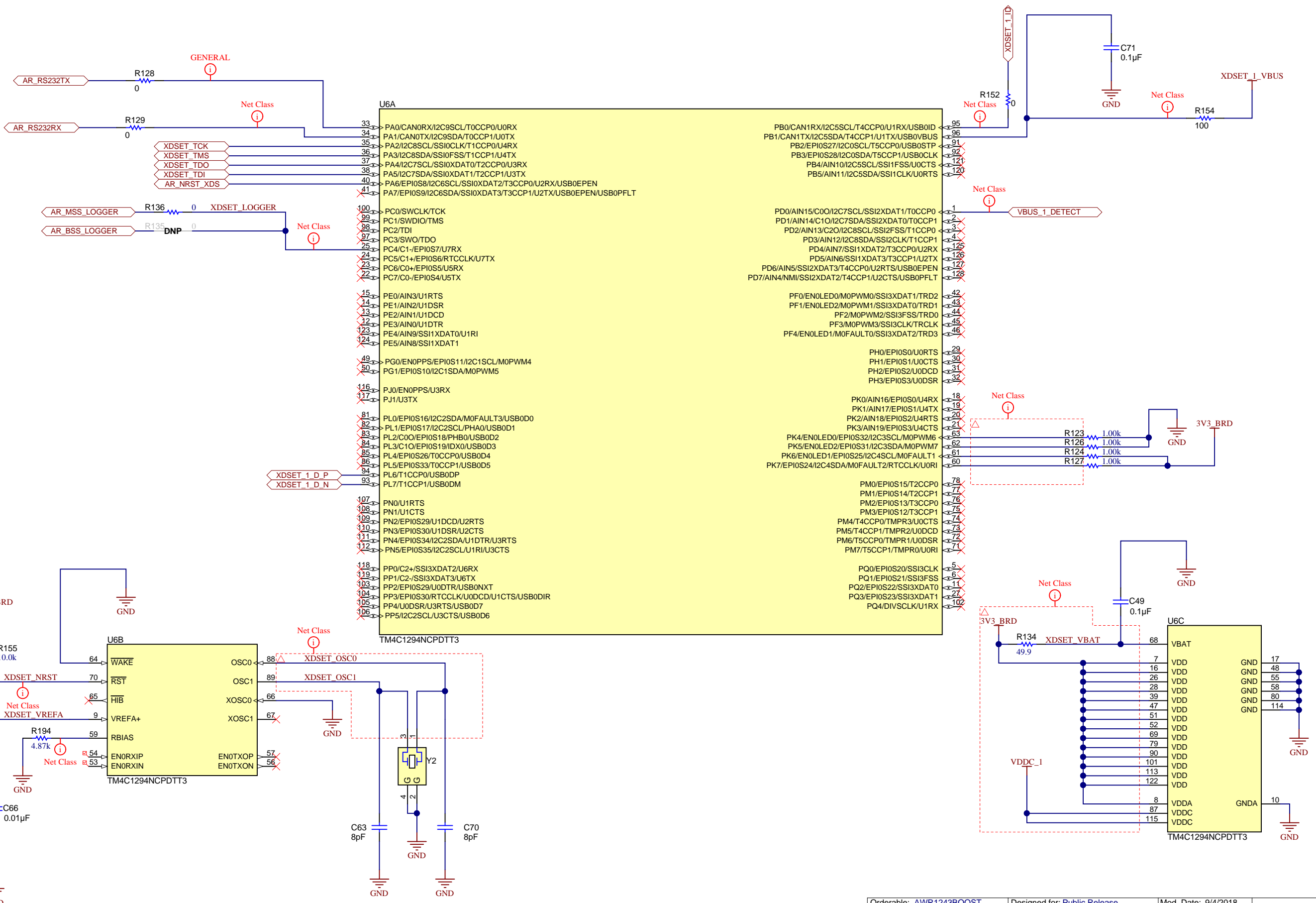
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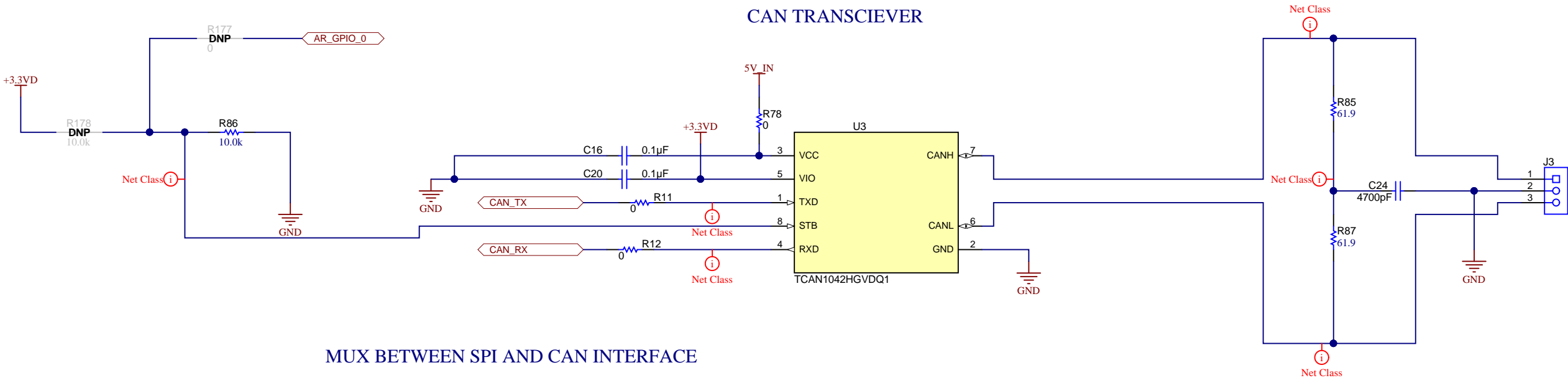
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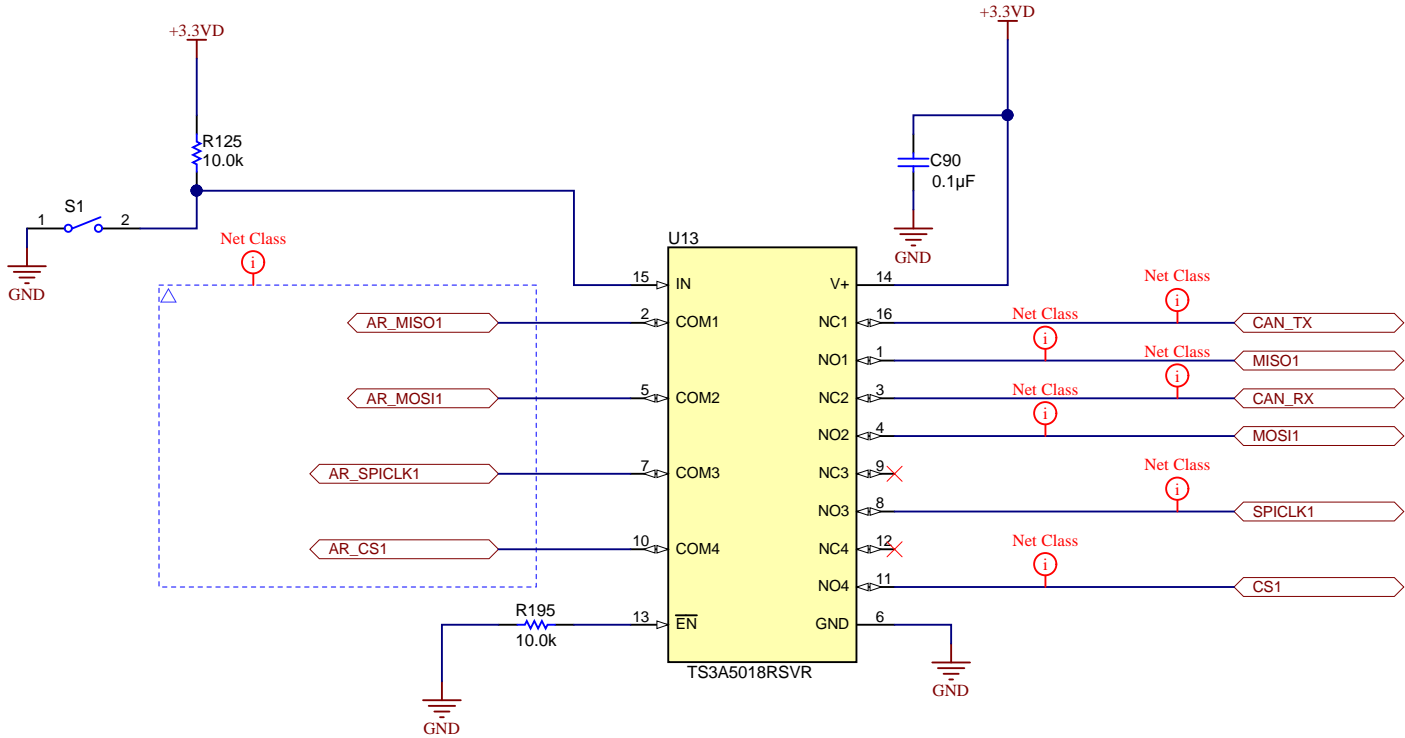


CAN INTERFACE

CAN TRANSCIEVER



MUX BETWEEN SPI AND CAN INTERFACE

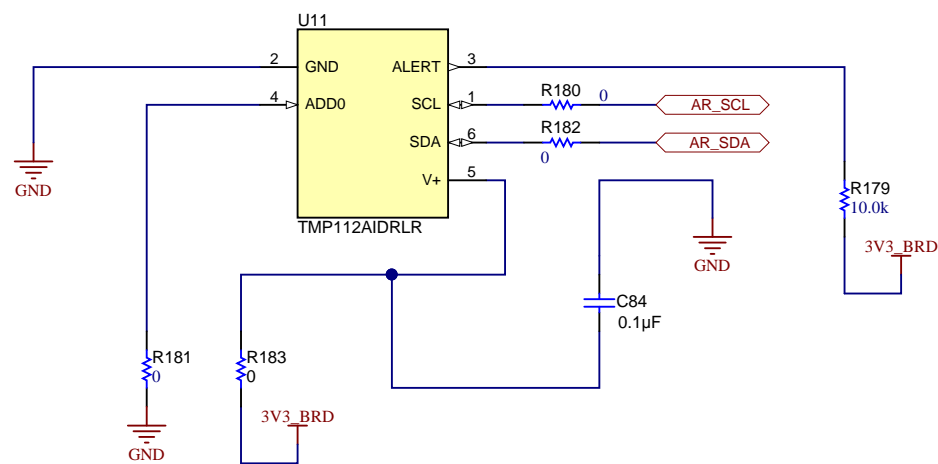


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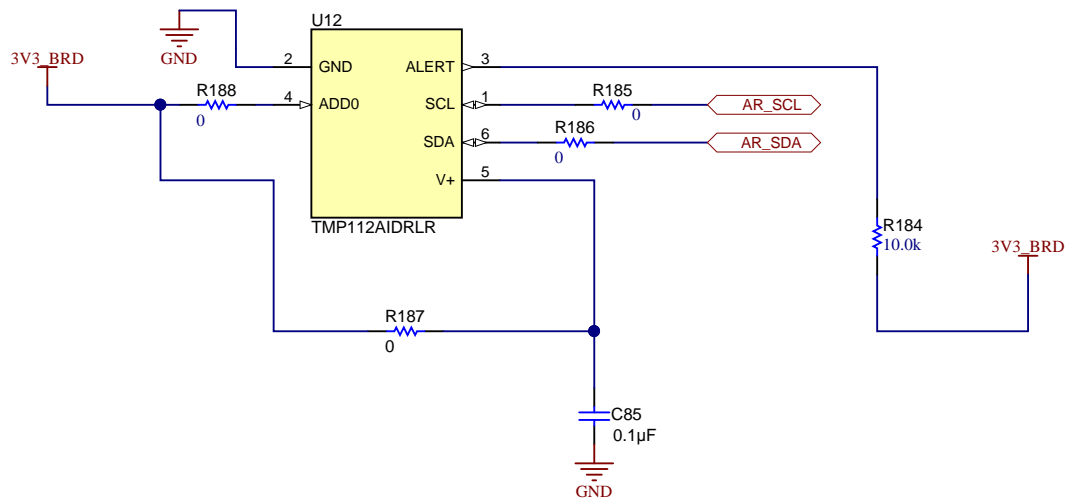
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Number: PROC010	Rev: B	Sheet Title: CAN Interface
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Drawn By: Adrian Ozer	File: PROC010B_CAN Interface.SchDoc	Size: B
Engineer: Adrian Ozer	Contact: http://www.ti.com/support	

ONBOARD TEMP SENSORS

DEFAULT I2C ADDRESS 0X48
TEMP SENSOR CLOSE TO PMIC



DEFAULT I2C ADDRESS 0X49
TEMP SENSOR AWAY FROM PMIC



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Orderable: AWR1243BOOST		Designed for: Public Release		Mod. Date: 9/4/2018	
TID #: N/A		Project Title: PROC010			
Number: PROC010		Rev: B		Sheet Title: Tempsensor	
SVN Rev: Not in version control		Assembly Variant: 001		Sheet: 15 of 16	
Drawn By: Adrian Ozer		File: PROC010B_Tempsensor.SchDoc		Size: B	
Engineer: Adrian Ozer		Contact: http://www.ti.com/support			

