Schematic: reComputer Industrial J201

Revision History

DATE	REVISION	DESCRIPTION
Oct. 3 2023	reServer industrial J401 Carrier Board v1.0	Initial Release.
Oct. 16 2023	reServer industrial J401 Carrier Board v1.1	Correct power input reverse protection issue.

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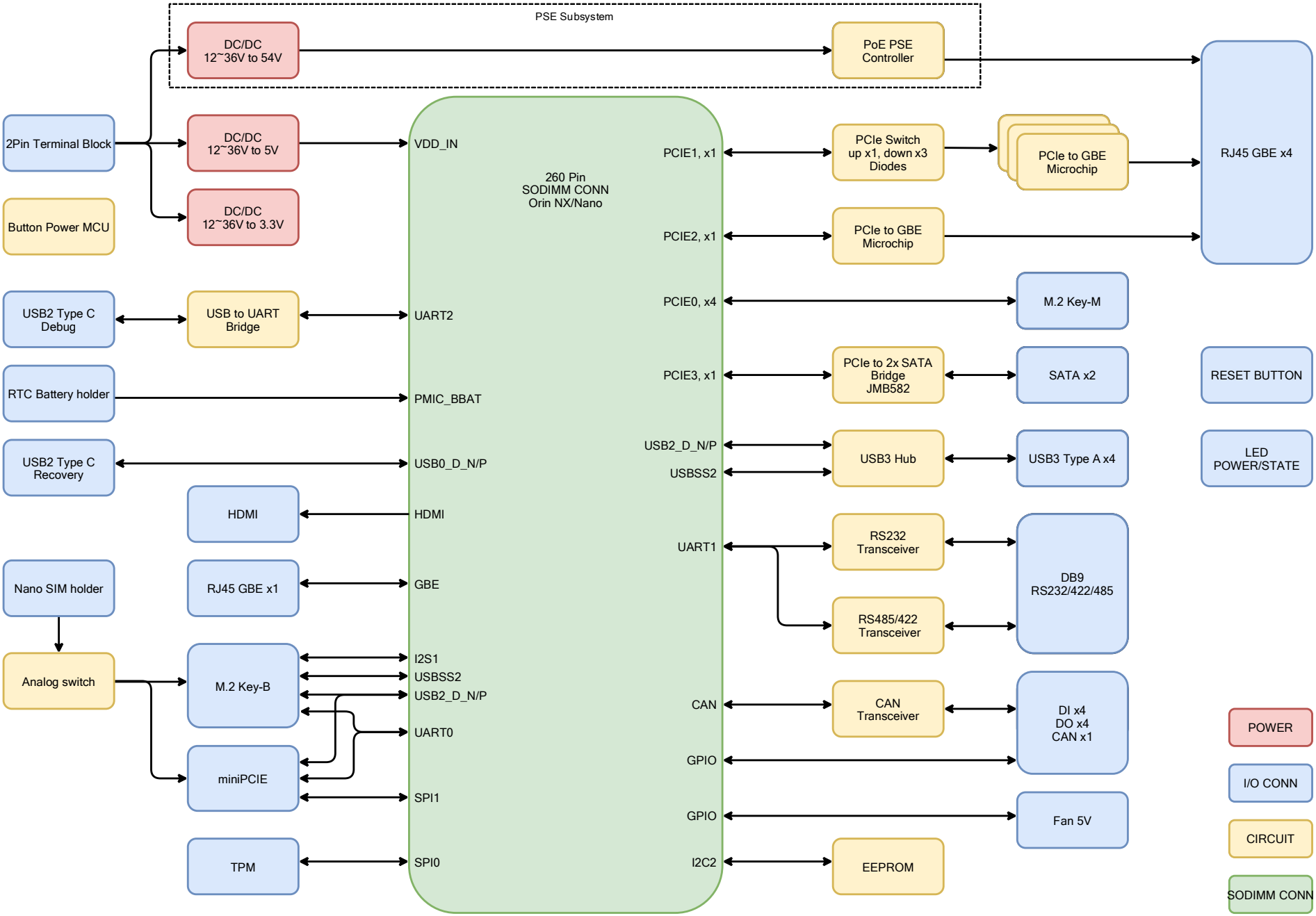

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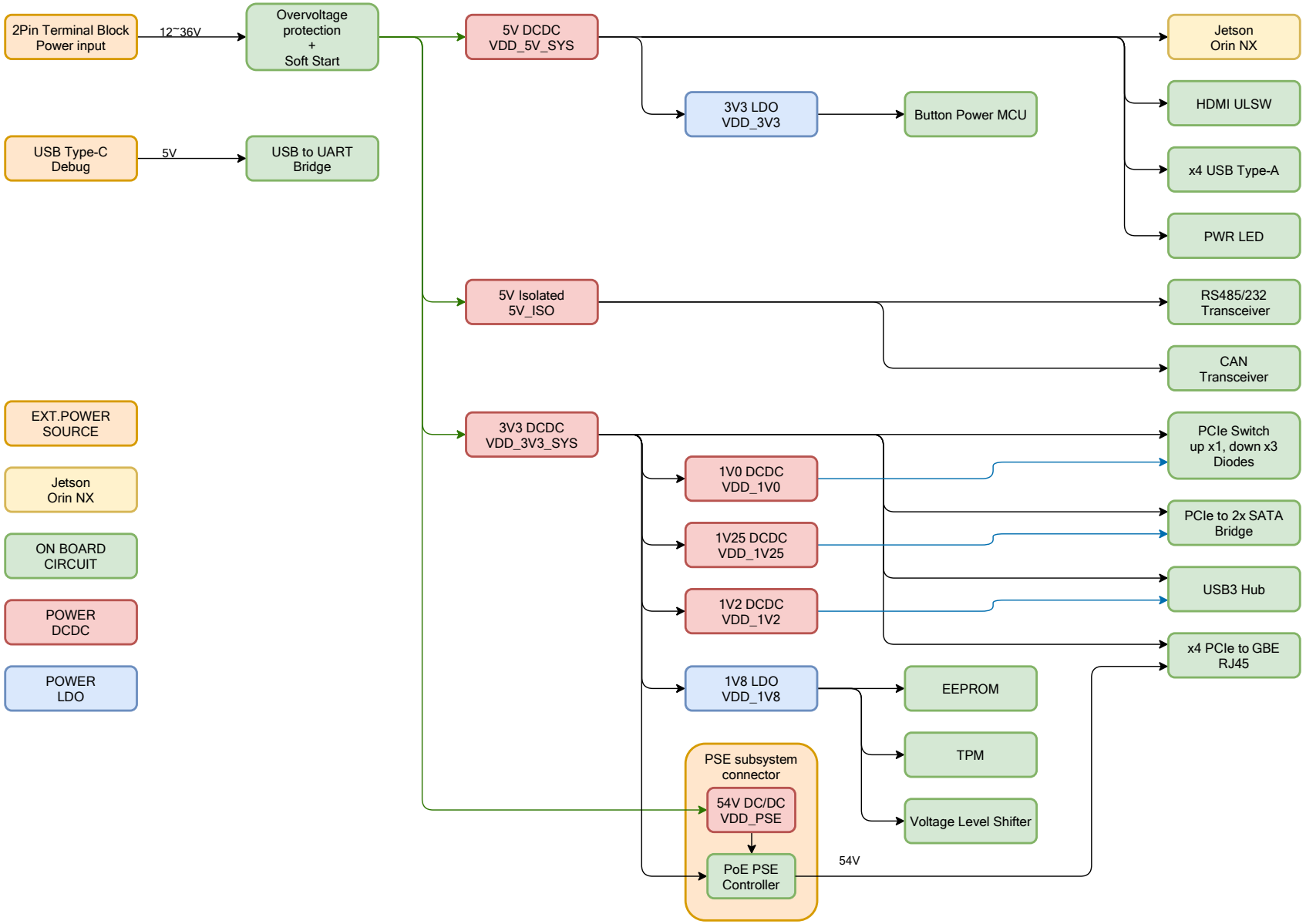

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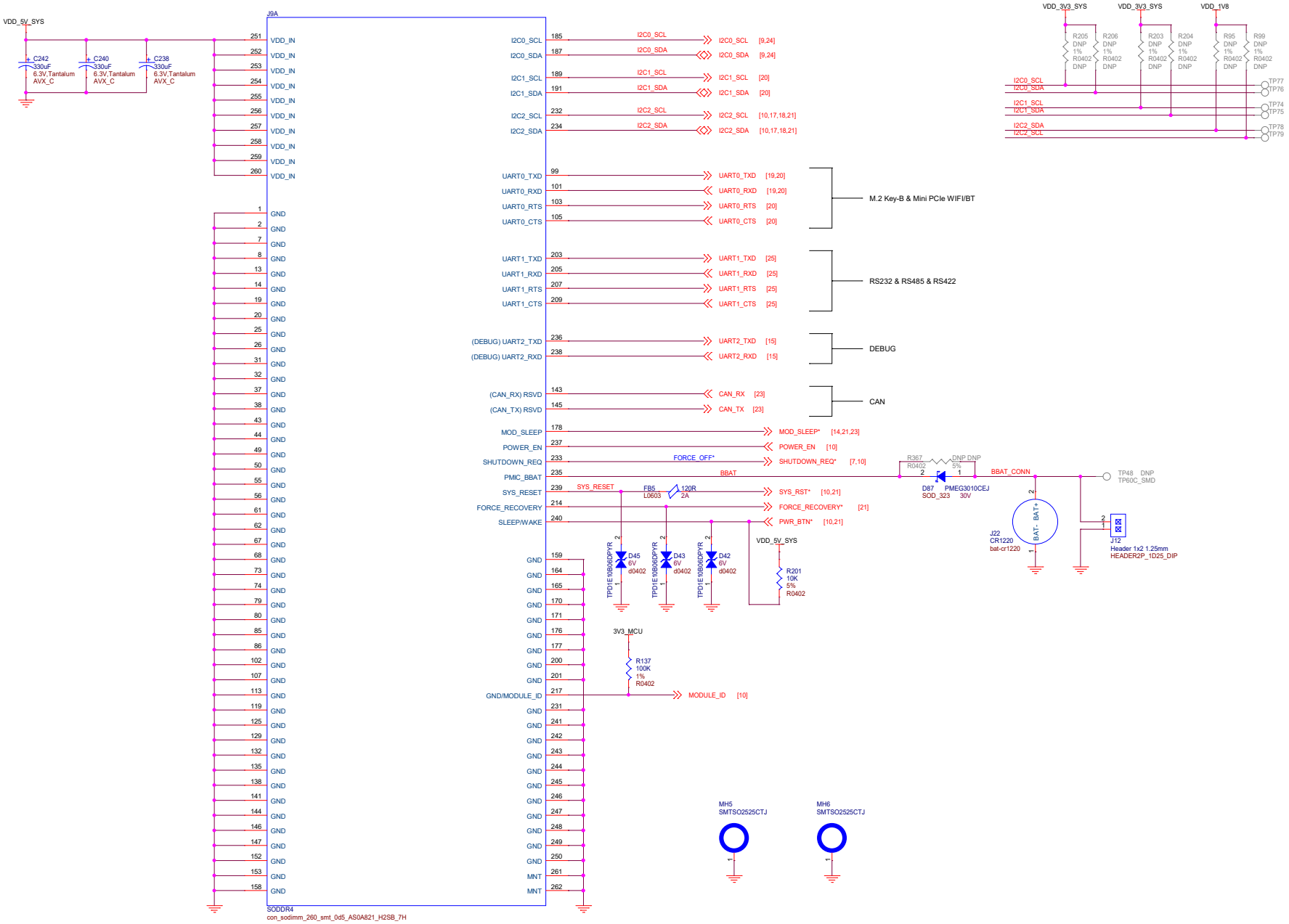
UART, I2C, CAN and GPIOs



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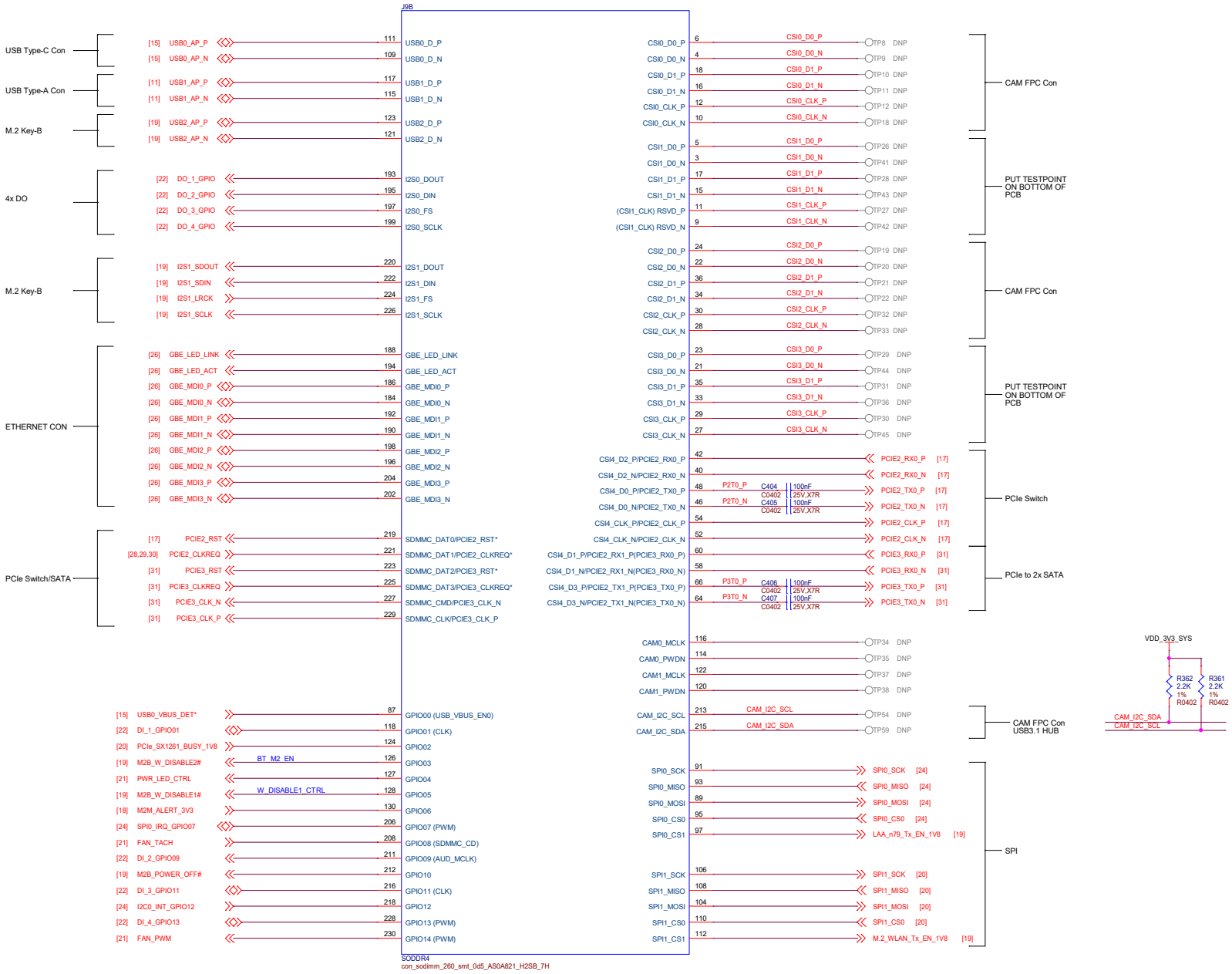
GPIOs, USB2.0, I2S, SPI, GBe and CSI



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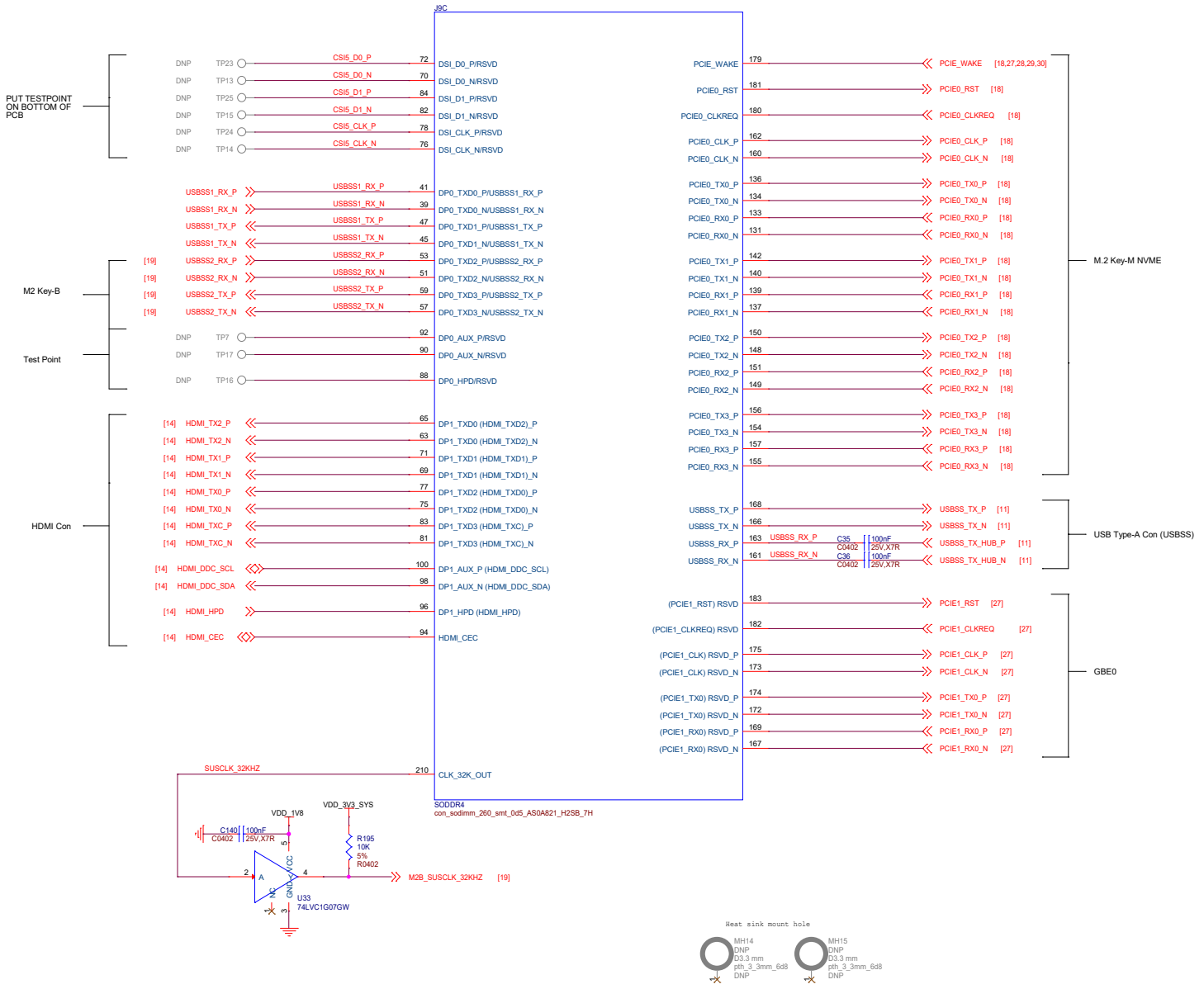
HDMI, DP, DSI, USBSS and PCIe



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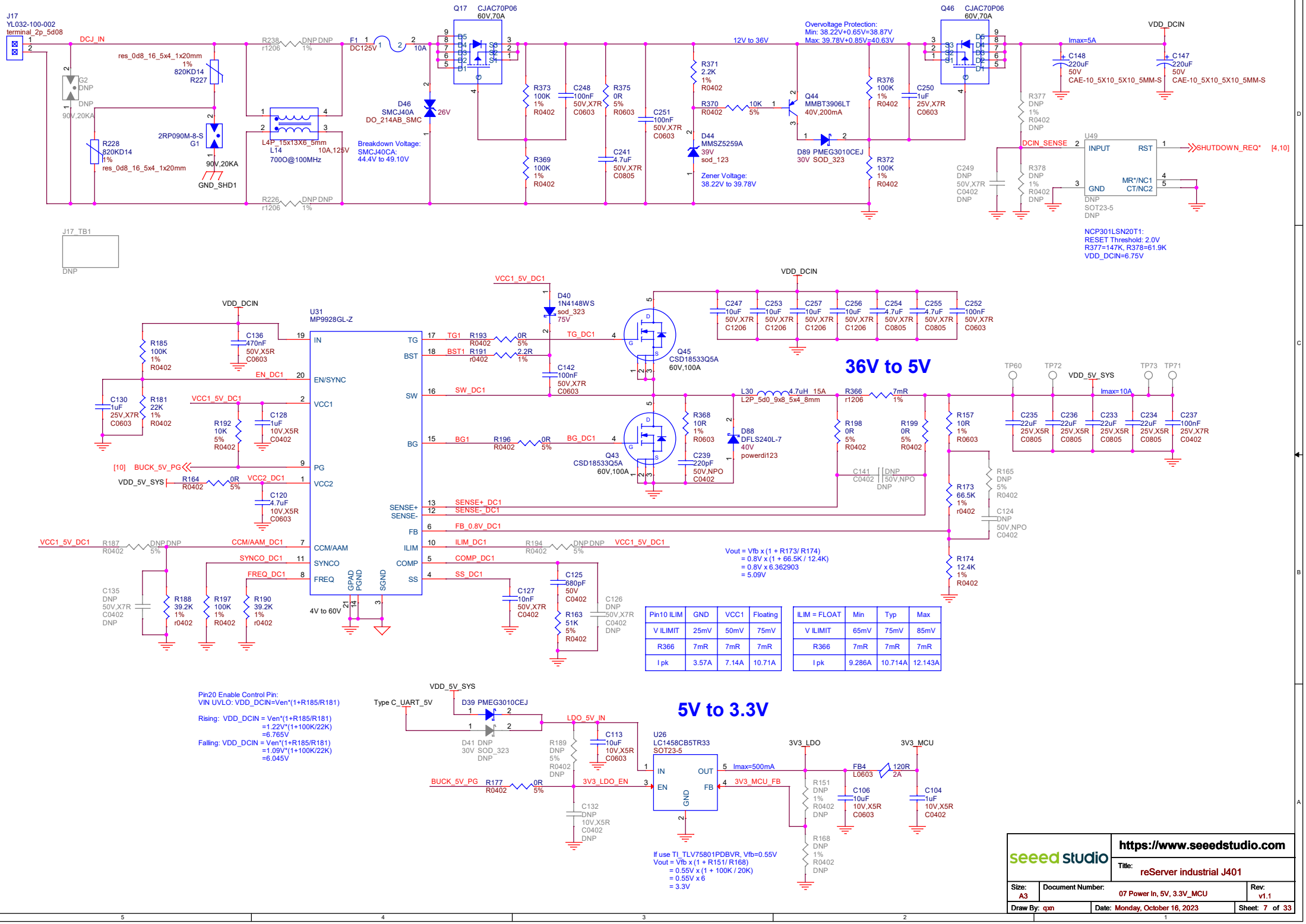
J17
YL032-100-002
terminal_2p_5d08
DCJ_IN
res_0d8_16_5x4_1x20mm
820KD14
R227
R238
DNP DNP
r1206
F1
DC125V
10A
Q17
CJAC70P06
60V,70A
Overvoltage Protection:
Min: 38.22V+0.65V=38.87V
Max: 39.78V+0.85V=40.63V
12V to 36V
Q46
CJAC70P06
60V,70A
VDD_DCIN
Imax=5A
C148
220uF
50V
CAE-10_5X10_5X10_5MM-S
C147
220uF
50V
CAE-10_5X10_5X10_5MM-S
2RP090M-8-S
G1
90V,20KA
GND_SHD1
L4P_15x13X6_5mm
L14
700O@100MHz
10A,125V
D46
SMCJ40A
DO_214AB_SMC
26V
Breakdown Voltage:
SMCJ40CA:
44.4V to 49.10V
R373
100K
1%
R0402
C248
100nF
50V,X7R
C0603
R375
0R
5%
R0603
C251
100nF
50V,X7R
C0603
R369
100K
1%
R0402
C241
4.7uF
50V,X7R
C0805
R371
2.2K
1%
R0402
R370
10K
5%
Q44
MMBT3906LT
40V,200mA
D44
MMSZ5259A
39V
sod_123
Zener Voltage:
38.22V to 39.78V
D89 PMEG3010CEJ
30V SOD_323
R376
100K
1%
R0402
C250
1uF
25V,X7R
C0603
R372
100K
1%
R0402
R377
DNP
1%
R0402
DNP
DCIN_SENSE
U49
INPUT
RST
GND
MR*/NC1
CT/NC2
SOT23-5
DNP
SHUTDOWN_REQ*
[4,10]
C249
DNP
50V,X7R
C0402
DNP
R378
DNP
1%
R0402
DNP
NCP301LSN20T1:
RESET Threshold: 2.0V
R377=147K, R378=61.9K
VDD_DCIN=6.75V
J17_TB1
DNP
VDD_DCIN
U31
MP9928GL-Z
VCC1_5V_DC1
D40
1N4148WS
sod_323
75V
Q45
CSD18533Q5A
60V,100A
C247
10uF
50V,X7R
C1206
C253
10uF
50V,X7R
C1206
C257
10uF
50V,X7R
C1206
C256
10uF
50V,X7R
C1206
C254
4.7uF
50V,X7R
C0805
C255
4.7uF
50V,X7R
C0805
C252
100nF
50V,X7R
C0603
36V to 5V
R185
100K
1%
R0402
C136
470nF
50V,X5R
C0603
EN_DC1
C130
1uF
25V,X7R
C0603
R181
22K
1%
R0402
R192
10K
5%
R0402
C128
1uF
10V,X5R
C0402
[10] BUCK_5V_PG
VDD_5V_SYS
R164
0R
5%
R0402
VCC2_DC1
C120
4.7uF
10V,X5R
C0603
TG_DC1
R193
0R
R0402
5%
BST1
R191
2.2R
r0402
1%
C142
100nF
50V,X7R
C0603
SW_DC1
BG1
R196
0R
R0402
5%
BG_DC1
Q43
CSD18533Q5A
60,100A
R368
10R
1%
R0603
C239
220pF
50V,NPO
C0402
D88
DFLS240L-7
40V
powerdi123
L30
4.7uH_15A
L2P_5d0_9x8_5x4_8mm
R366
7mR
r1206
1%
R198
0R
5%
R0402
R199
0R
5%
R0402
C141
C0402
DNP
50V,NPO
DNP
R157
10R
1%
R0603
R173
66.5K
1%
r0402
R165
DNP
5%
R0402
C124
DNP
50V,NPO
C0402
R174
12.4K
1%
R0402
TP60
TP72
VDD_5V_SYS
TP73
TP71
Imax=10A
C235
22uF
25V,X5R
C0805
C236
22uF
25V,X5R
C0805
C233
22uF
25V,X5R
C0805
C234
22uF
25V,X5R
C0805
C237
100nF
25V,X7R
C0402
SENSE_DC1
FB_0.8V_DC1
ILIM_DC1
COMP_DC1
SS_DC1
R187
DNP DNP
5%
CCM/AAM_DC1
SYNCO_DC1
FREQ_DC1
R188
39.2K
1%
r0402
R197
100K
1%
R0402
R190
39.2K
1%
r0402
C135
DNP
50V,X7R
C0402
DNP
4V to 60V
R194
DNP DNP
5%
C127
10nF
50V,X7R
C0402
C125
680pF
50V
C0402
R163
51K
5%
R0402
C126
DNP
50V,X7R
C0402
DNP
Vout = Vfb x (1 + R173/ R174)
= 0.8V x (1 + 66.5K / 12.4K)
= 0.8V x 6.362903
= 5.09V
Pin10 ILIM
GND
VCC1
Floating
V ILIMIT
25mV
50mV
75mV
R366
7mR
7mR
7mR
I pk
3.57A
7.14A
10.71A
ILIM = FLOAT
Min
Typ
Max
V ILIMIT
65mV
75mV
85mV
R366
7mR
7mR
7mR
I pk
9.286A
10.714A
12.143A
Pin20 Enable Control Pin:
VIN UVLO: VDD_DCIN=Ven*(1+R185/R181)
Rising: VDD_DCIN = Ven*(1+R185/R181)
=1.22V*(1+100K/22K)
=6.765V
Falling: VDD_DCIN = Ven*(1+R185/R181)
=1.09V*(1+100K/22K)
=6.045V
VDD_5V_SYS
Type C_UART_5V
D39 PMEG3010CEJ
D41 DNP
30V SOD_323
DNP
LDO_5V_IN
5V to 3.3V
U26
LC1458CB5TR33
SOT23-5
C113
10uF
10V,X5R
C0603
R189
DNP
5%
R0402
DNP
BUCK_5V_PG
R177
0R
R0402
5%
3V3_LDO_EN
C132
DNP
10V,X5R
C0402
DNP
IN
OUT
EN
FB
GND
Imax=500mA
3V3_MCU_FB
3V3_LDO
3V3_MCU
FB4
L0603
120R
2A
C106
10uF
10V,X5R
C0603
C104
1uF
10V,X5R
C0402
R151
DNP
1%
R0402
DNP
R168
DNP
1%
R0402
DNP
If use TI_TLV75801PDBVR, Vfb=0.55V
Vout = Vfb x (1 + R151/ R168)
= 0.55V x (1 + 100K / 20K)
= 0.55V x 6
= 3.3V
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07 Power In, 5V, 3.3V_MCU
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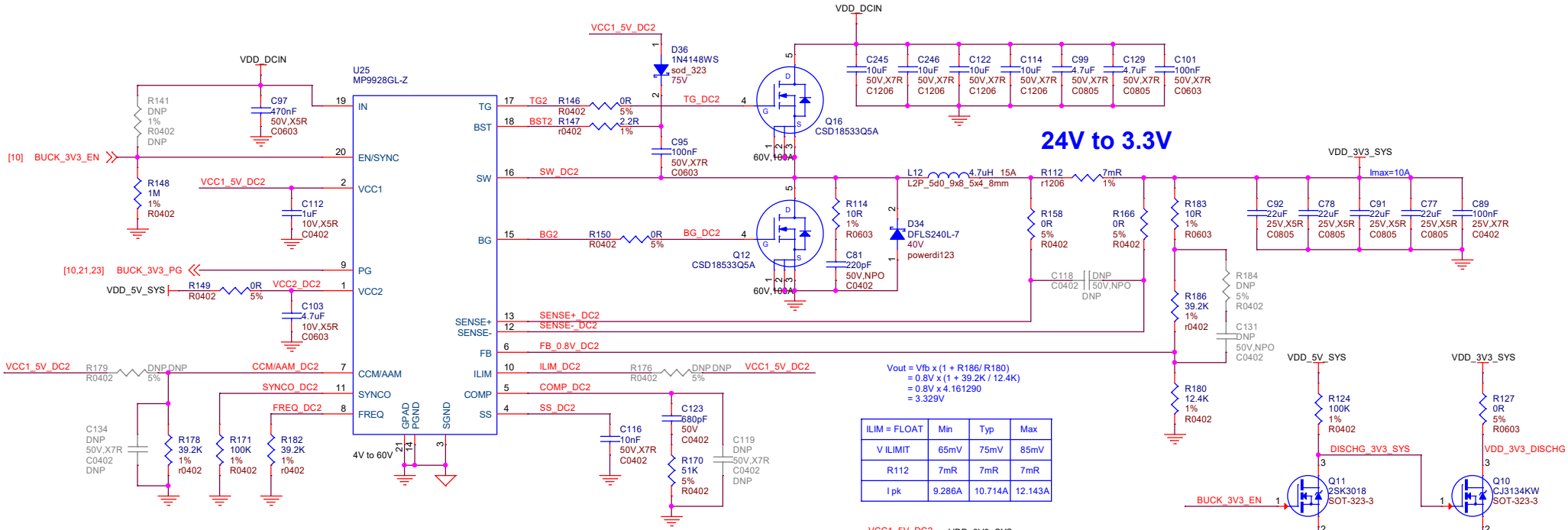

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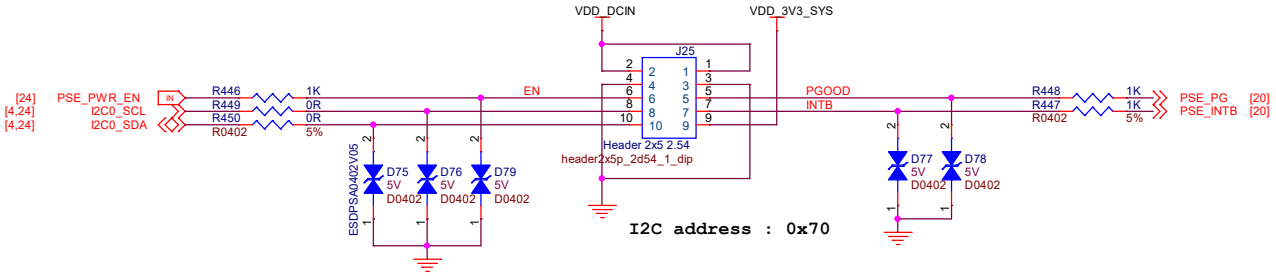

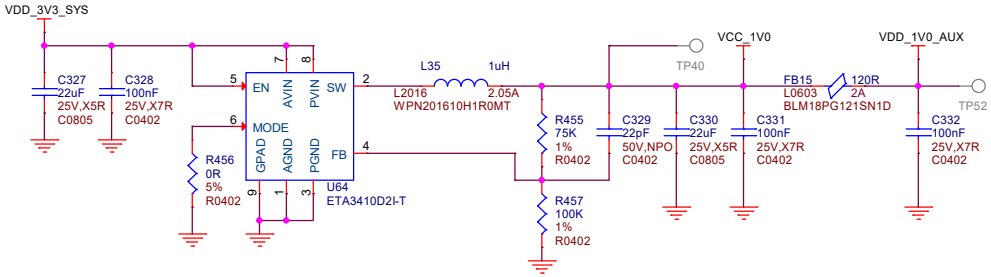

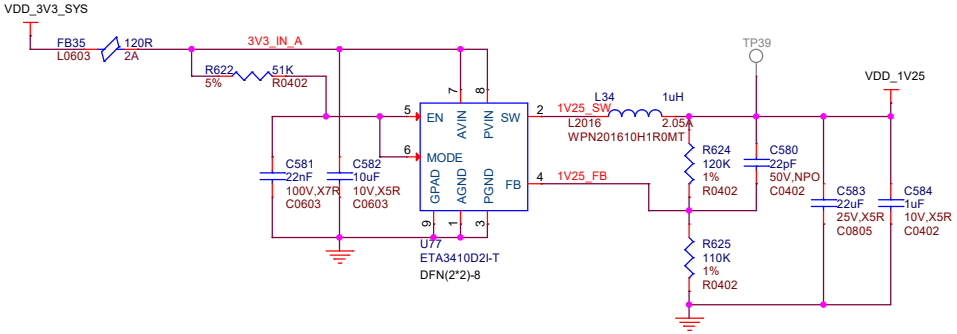

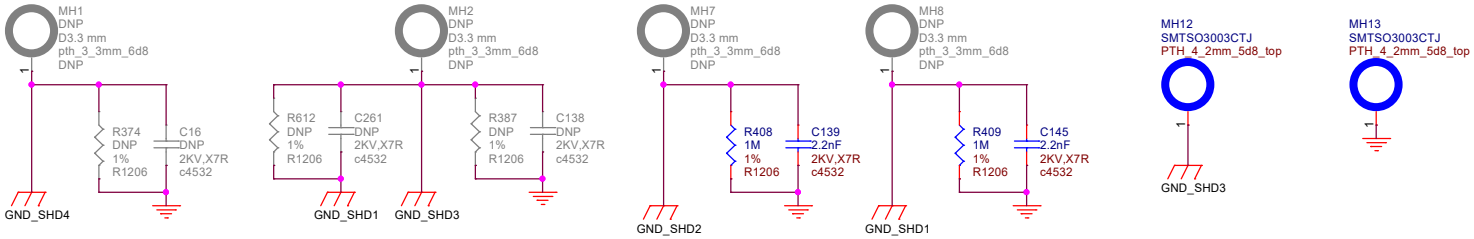

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Button MCU For Power Up

MCU

U23A
RP2040
1 of 2

Project	GPIO20	GPIO23
reComputer J101	1	1
reComputer J202/J201	0	1
reComputer J401	1	0

VDD_DCIN	MCU_ADC2
12V	1.279V
19V	1.709V
24V	1.871V
27V	1.942V

VDD_DCIN	FORCE_OFF*
12V	1.984V
19V	2.316V
24V	2.452V
27V	2.516V

U23B
RP2040
2 of 2

QSPI Flash

U28
GD25Q40ETIGR
4Mbit

U27
DNP
4Mbit
DNP

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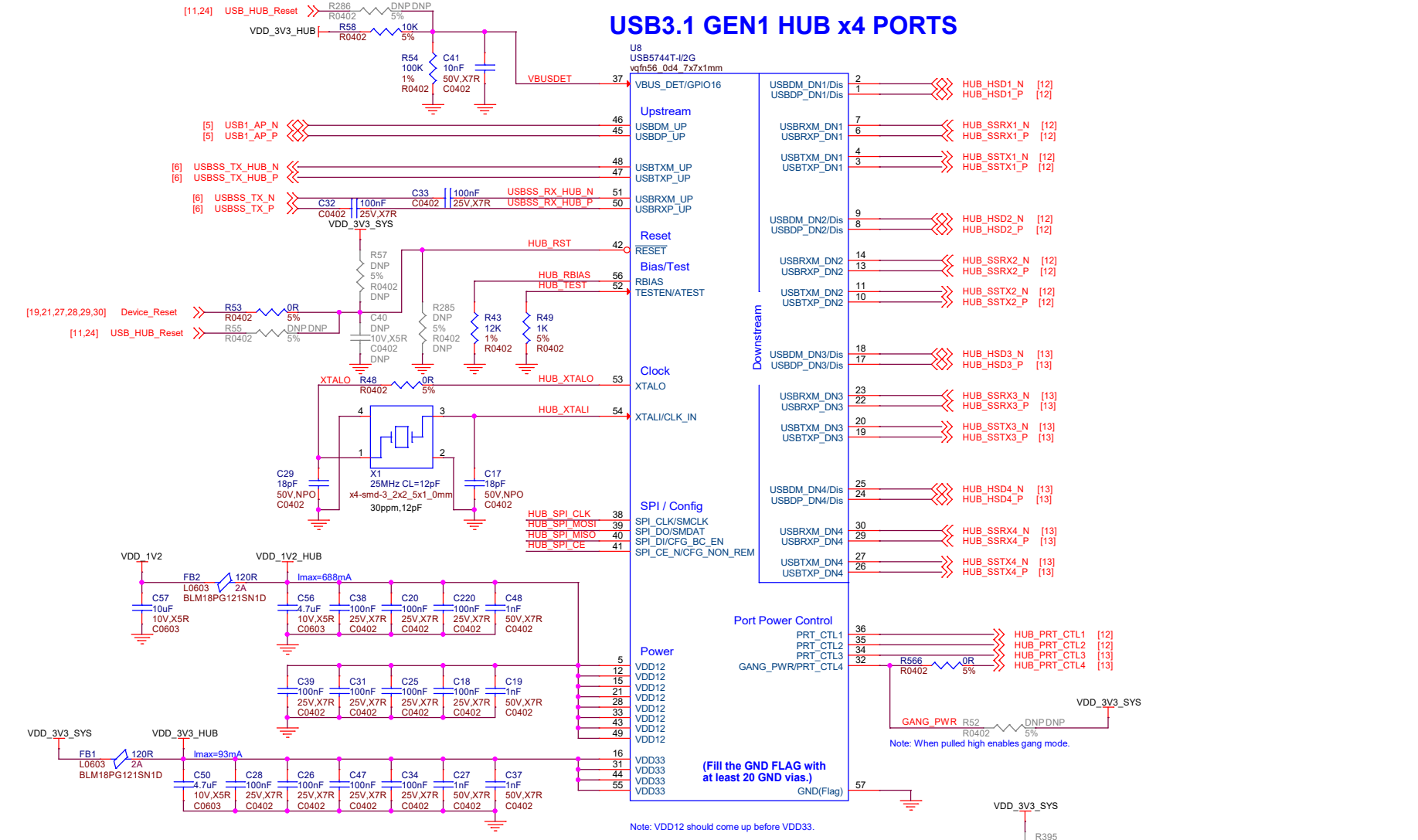
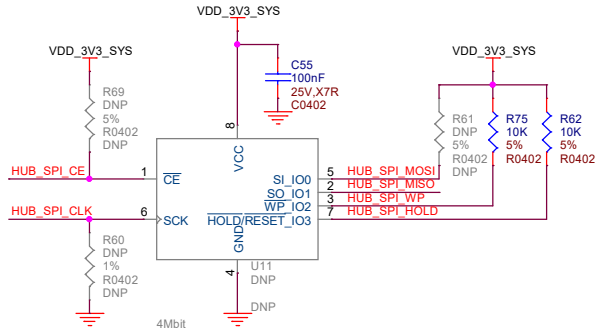
USB3.1 GEN1 HUB x4 PORTS





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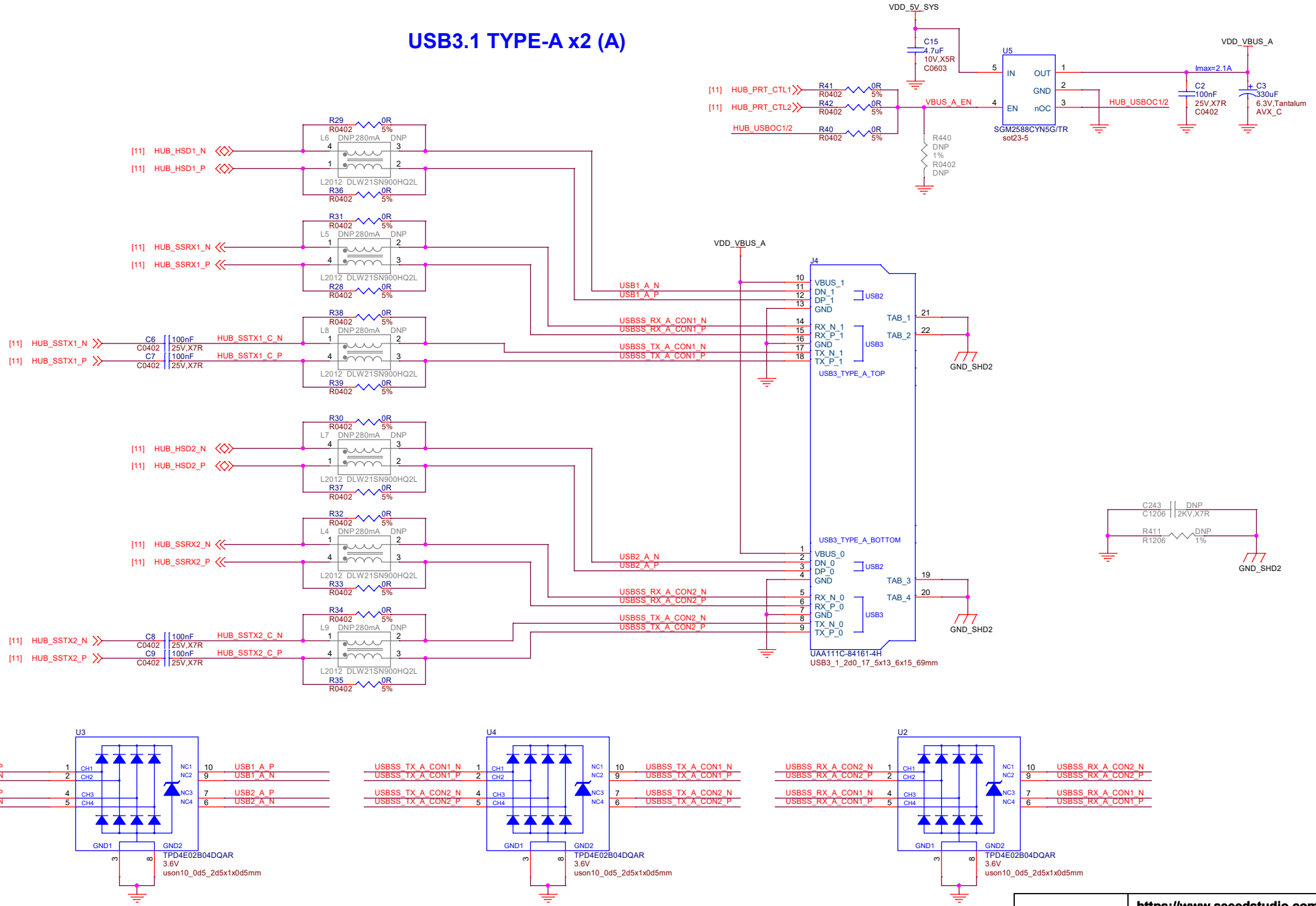
USB3.1 TYPE-A x2 (A)



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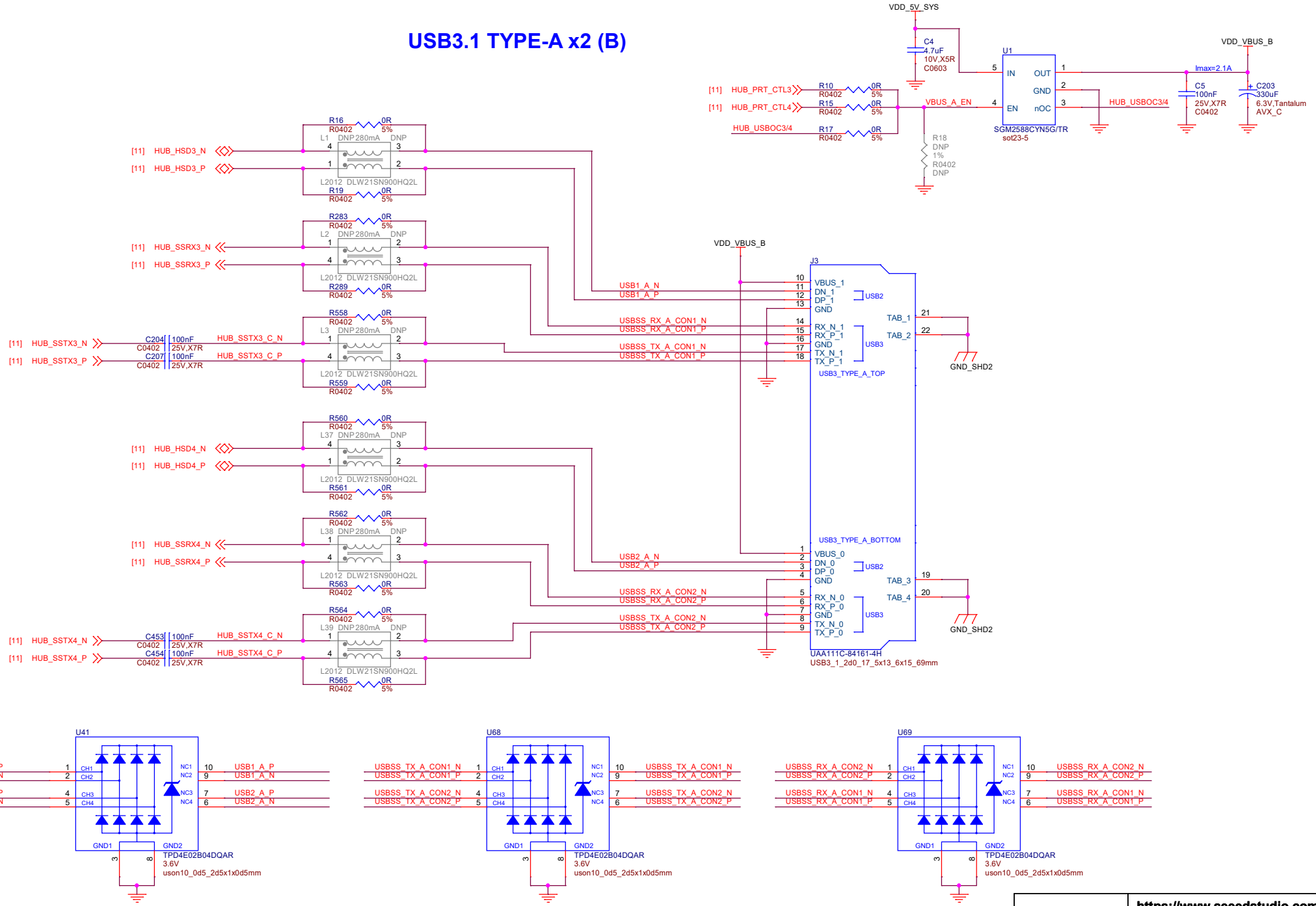
USB3.1 TYPE-A x2 (B)



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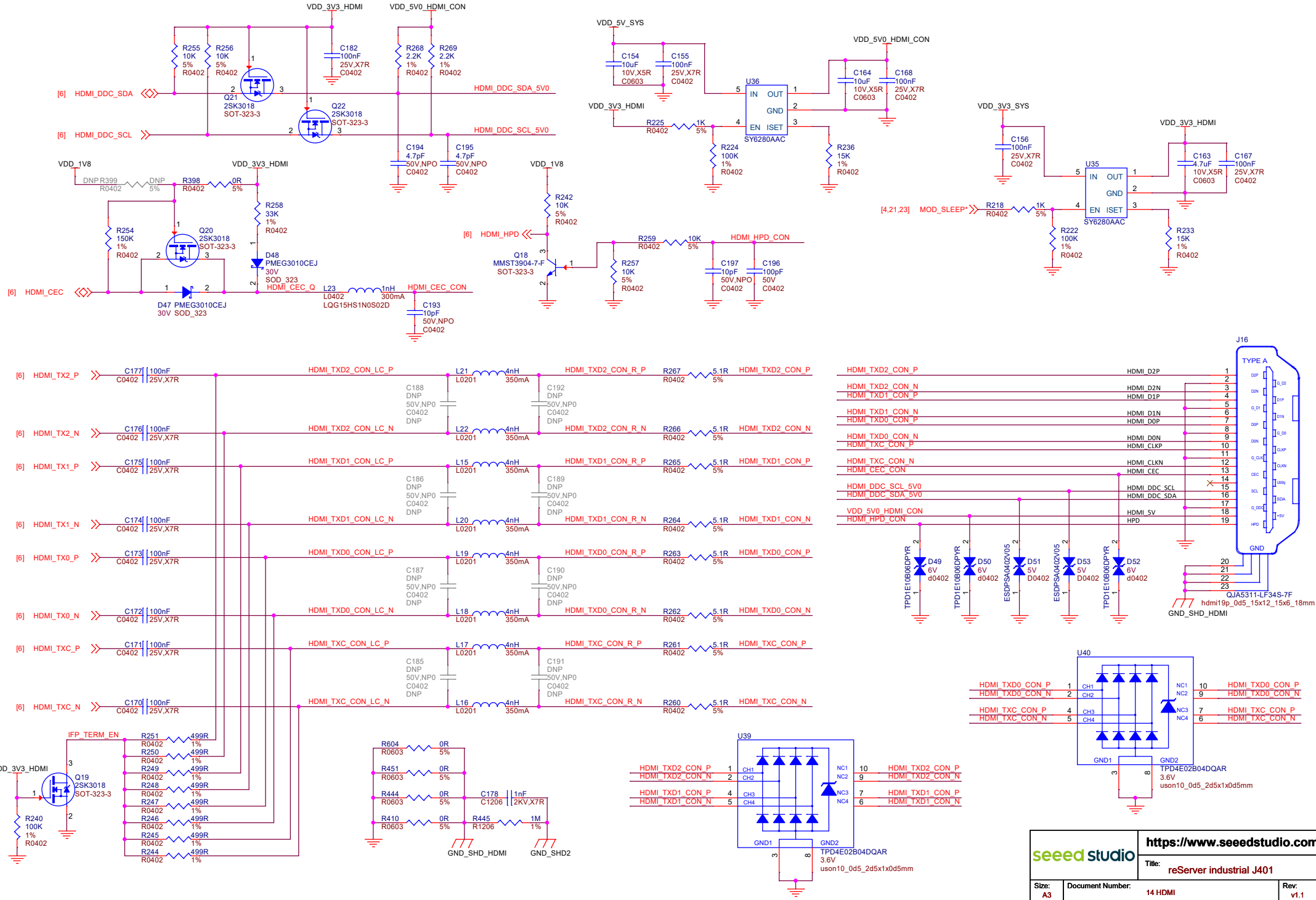
HDMI Connector



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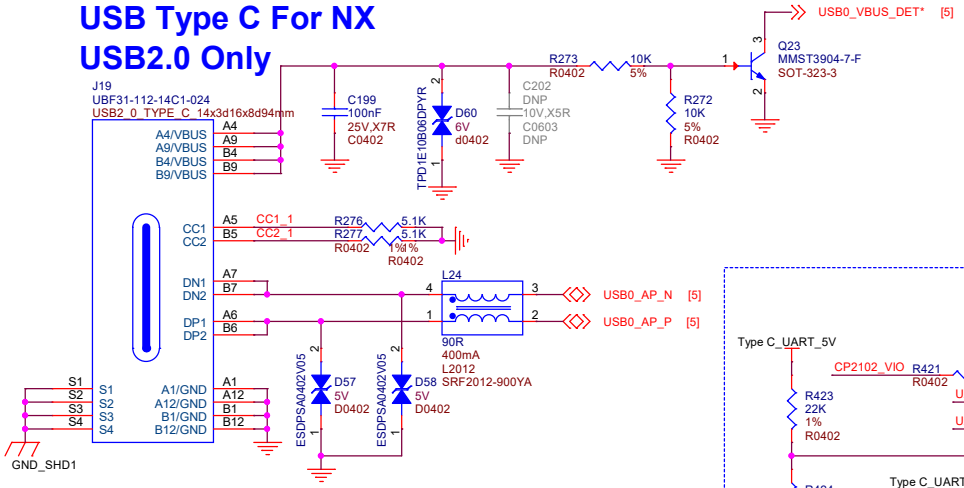
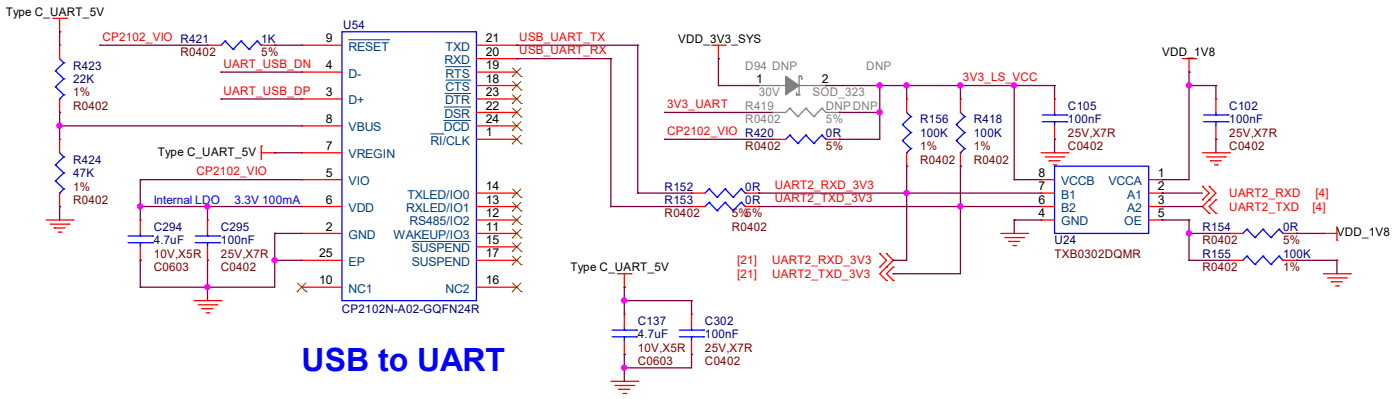
USB Type C For NX
USB2.0 Only

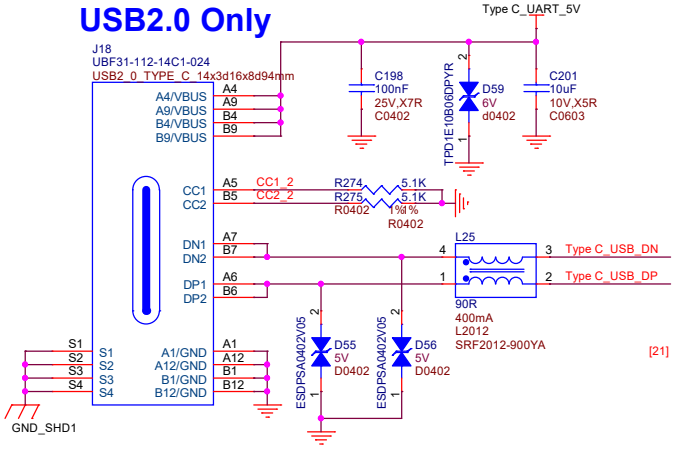


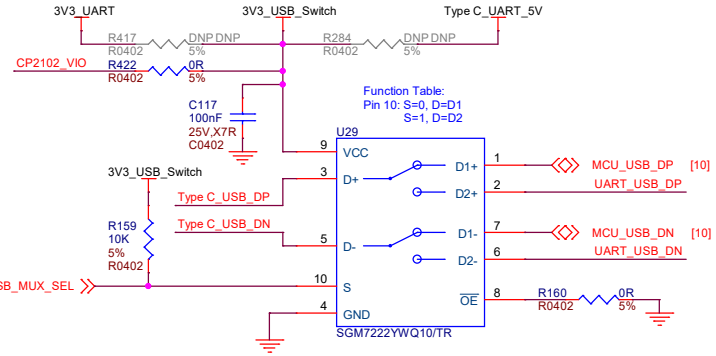
Option 1: CP2102N



USB to UART

USB Type C For Debug UART & RP2040
USB2.0 Only





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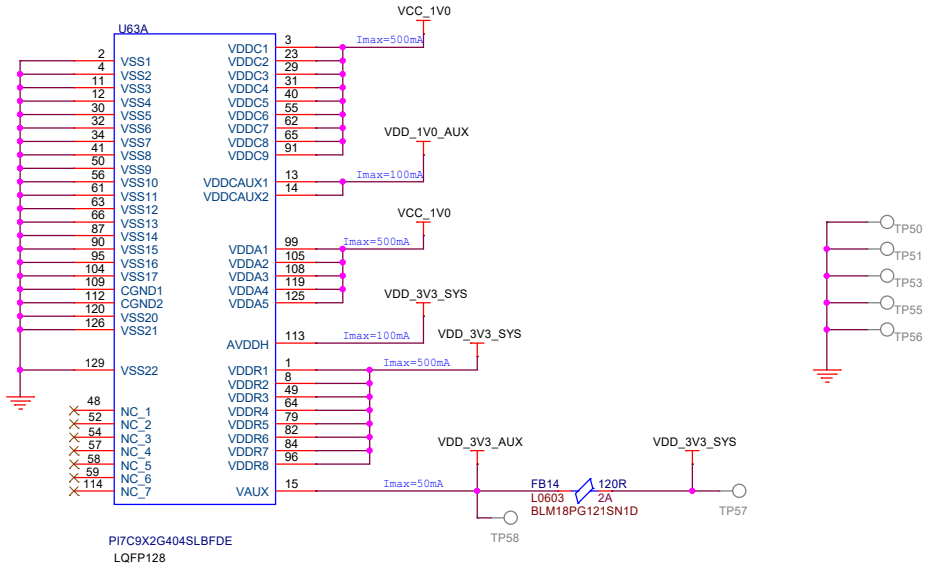
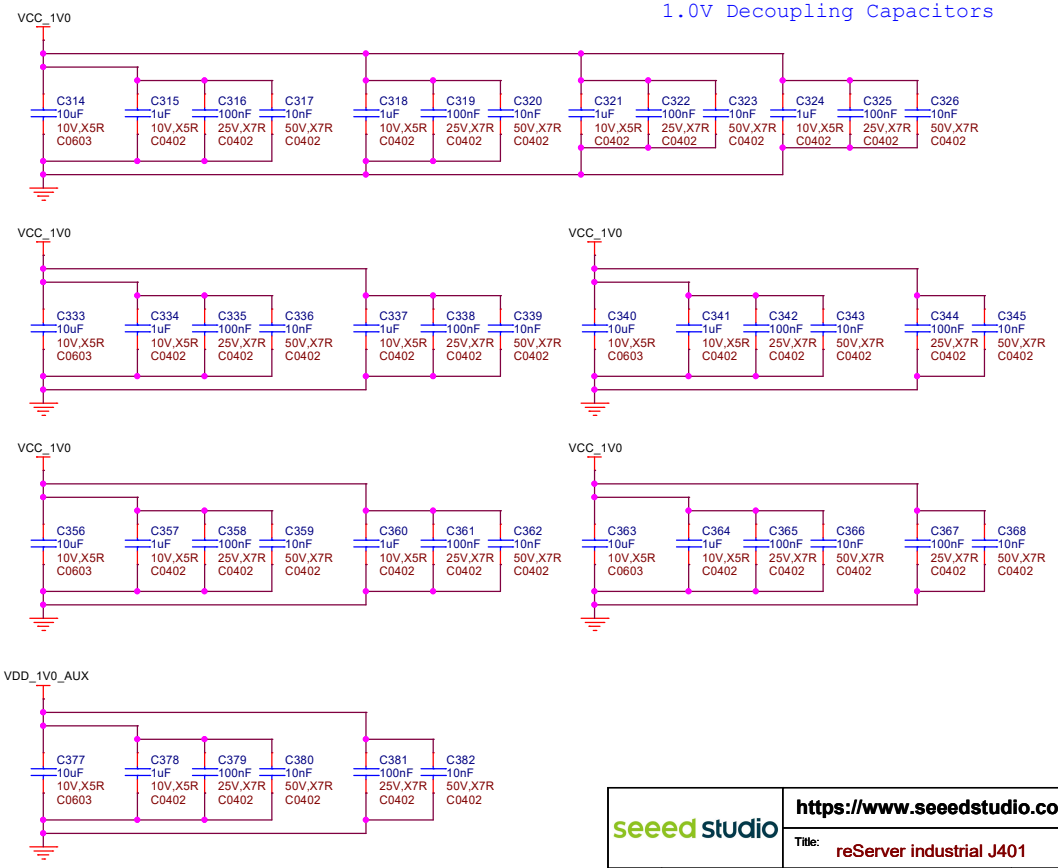
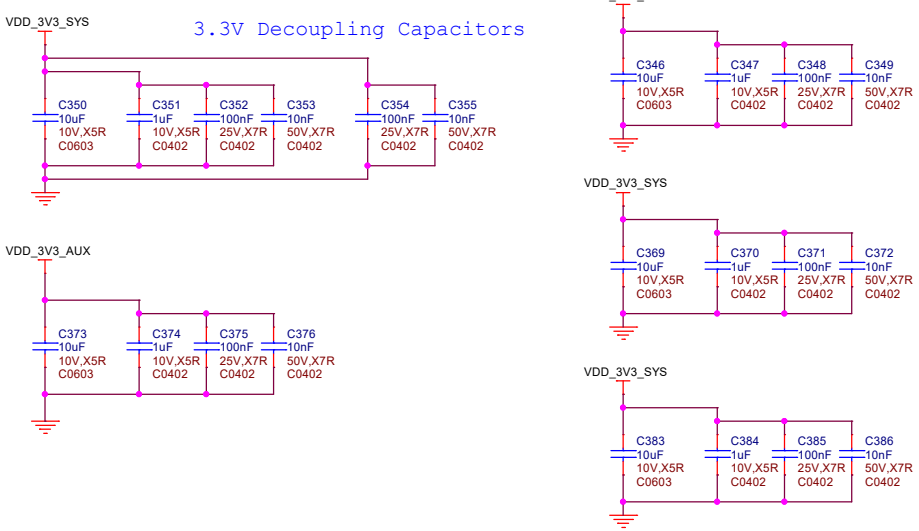
PCIe switch power



1.0V Decoupling Capacitors



3.3V Decoupling Capacitors



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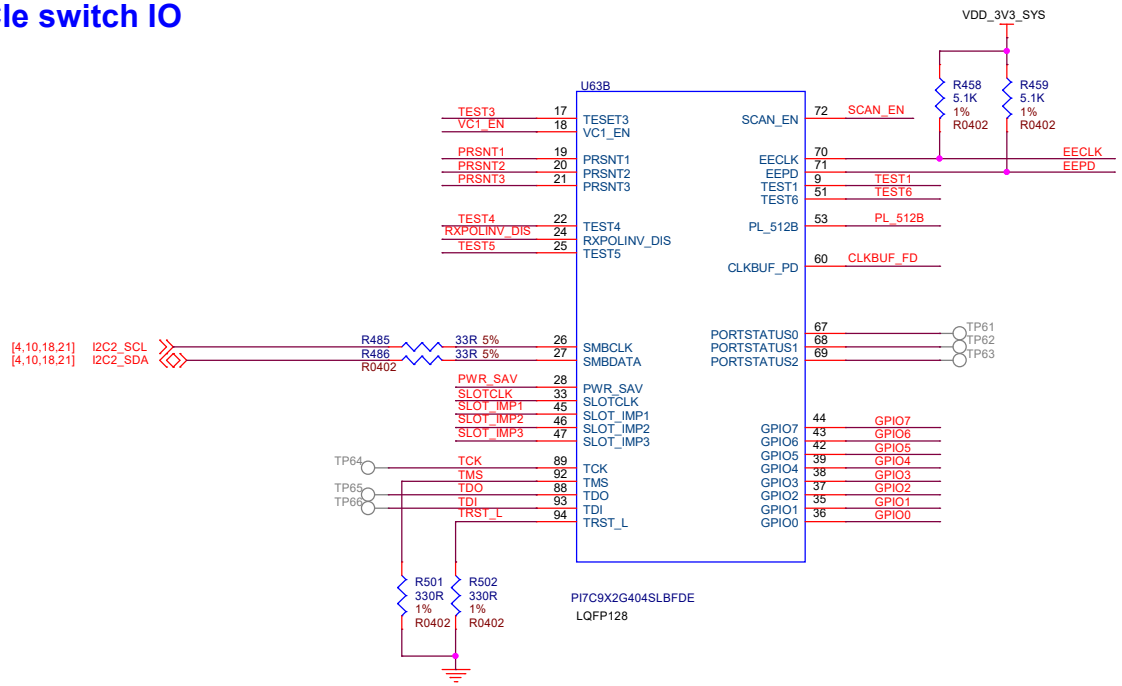
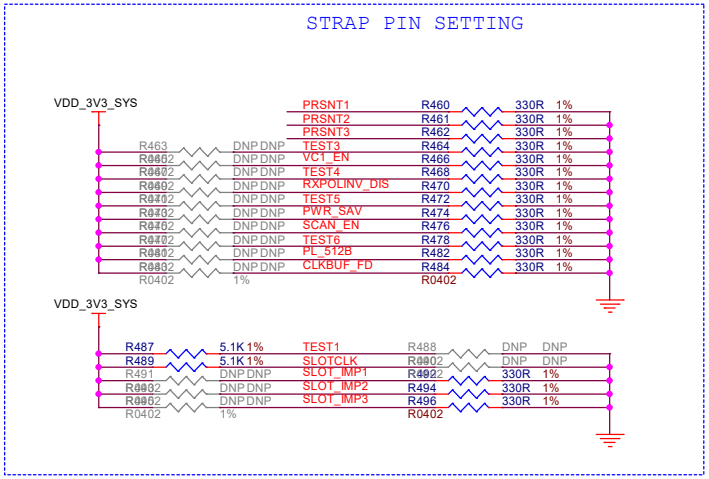
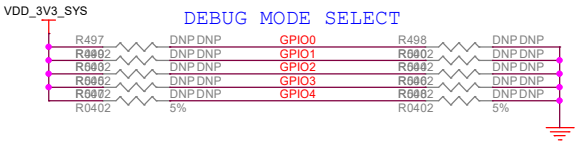
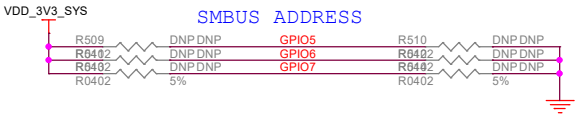
PCIe switch IO



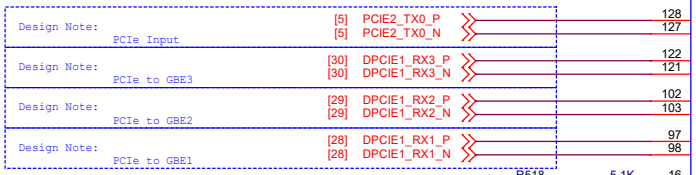




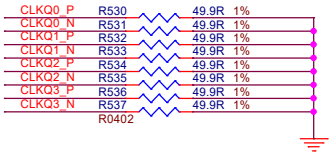


BIT	SMBus Address
0	GPIO[5]
1	GPIO[6]
2	GPIO[7]
3	1
4	0
5	1
6	1

Design Note: CM4 has AC coupling capacitors for CLK and PCIe_TX signals



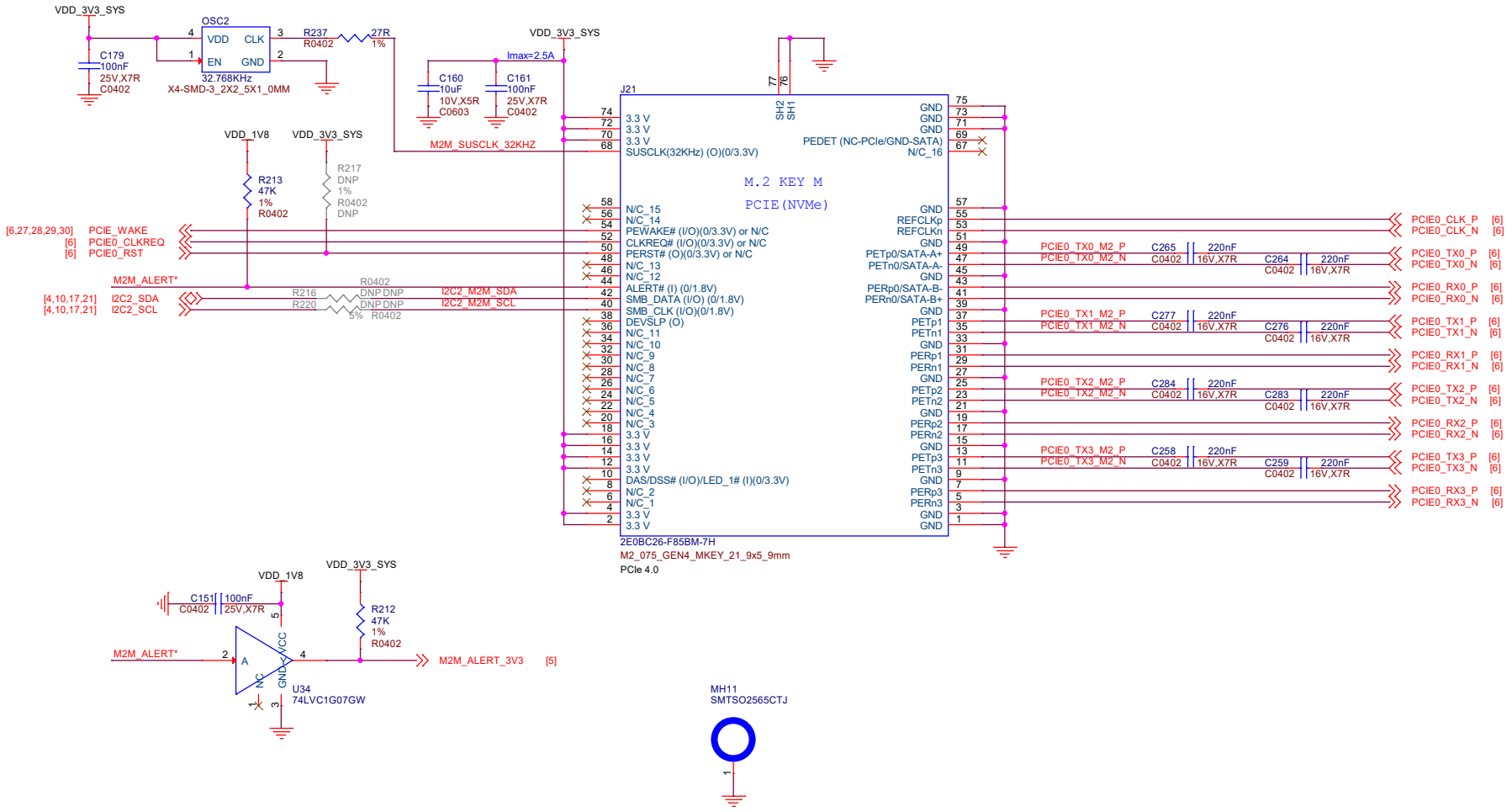
Clock Output Termination Resistors



Layout Note: Put these resistors near to the end point

seeed studio	https://www.seeedstudio.com		
	Title: reServer industrial J401		
Size: A3	Document Number: 17 PCIe Switch IO		Rev: v1.1
Draw By: qxn	Date: Monday, October 16, 2023		Sheet: 17 of 33

M.2 KEY-M (NVME)



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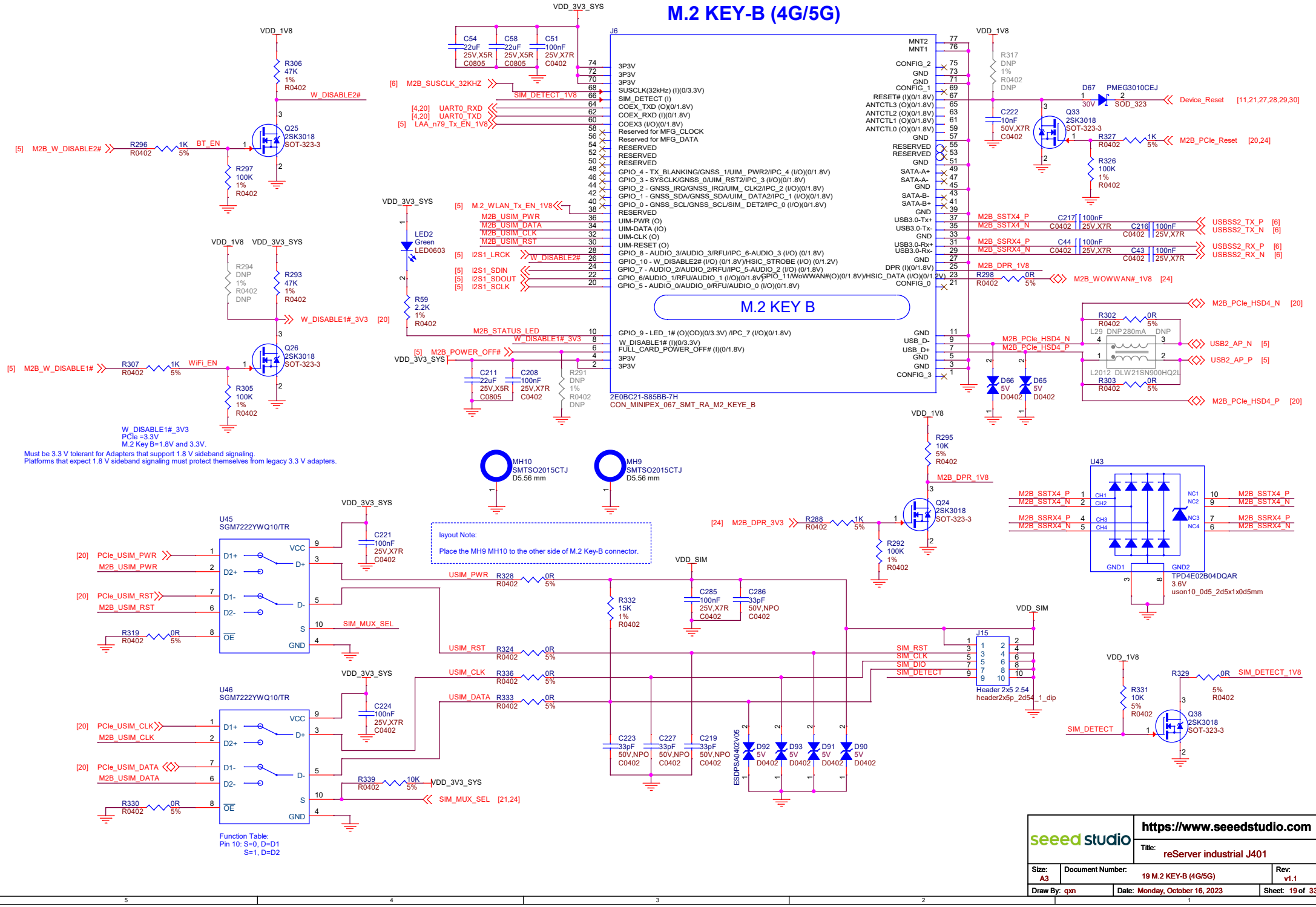
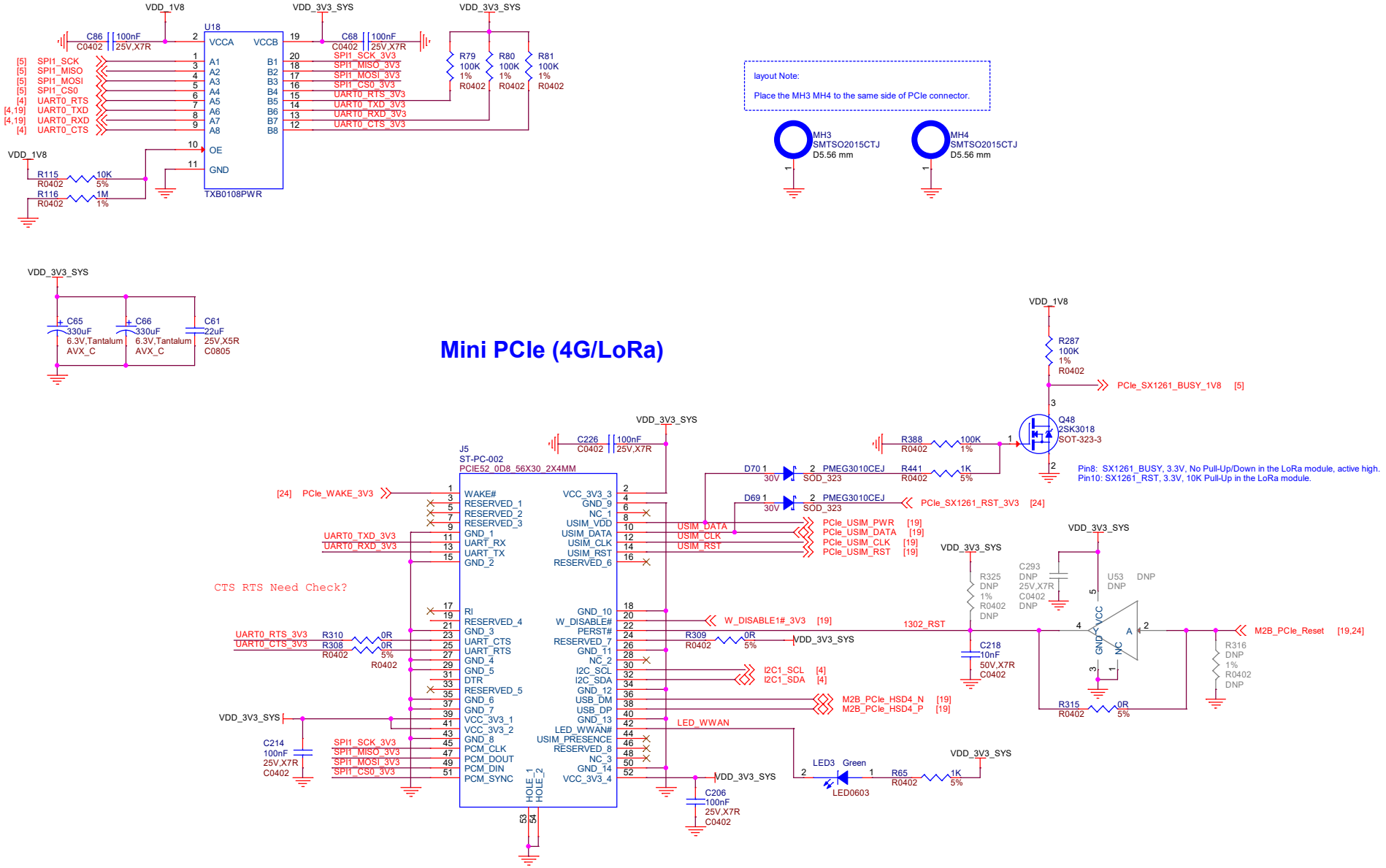
	Title: reServer industrial J401	
Size: A3	Document Number: 18 M.2 KEY-M (NVME)	Rev: v1.1
Draw By: qxn	Date: Monday, October 16, 2023	Sheet: 18 of 33

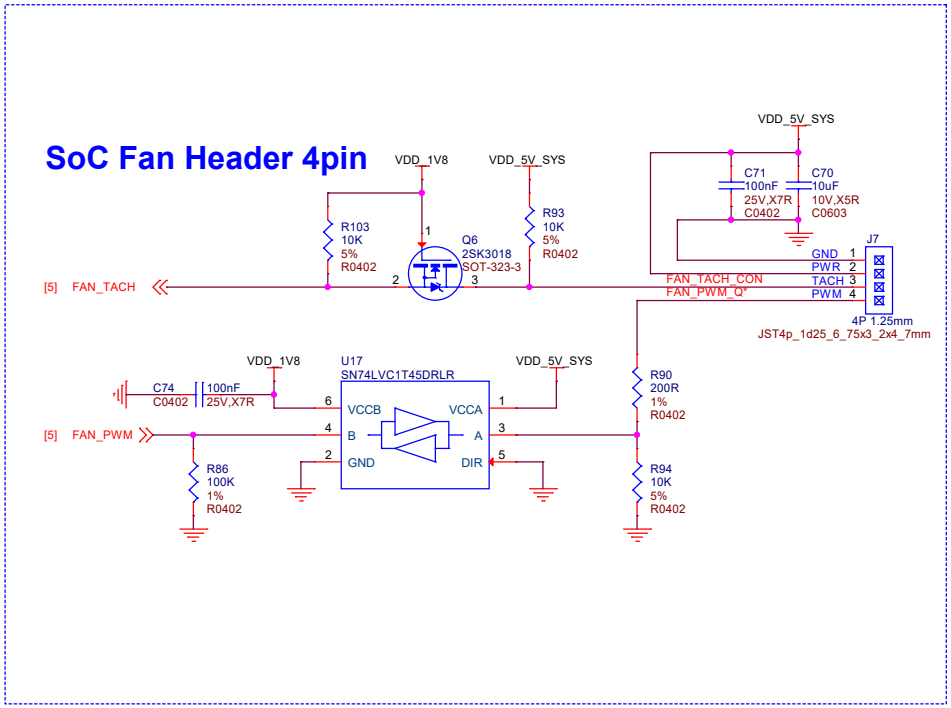
M.2 KEY-B (4G/5G)

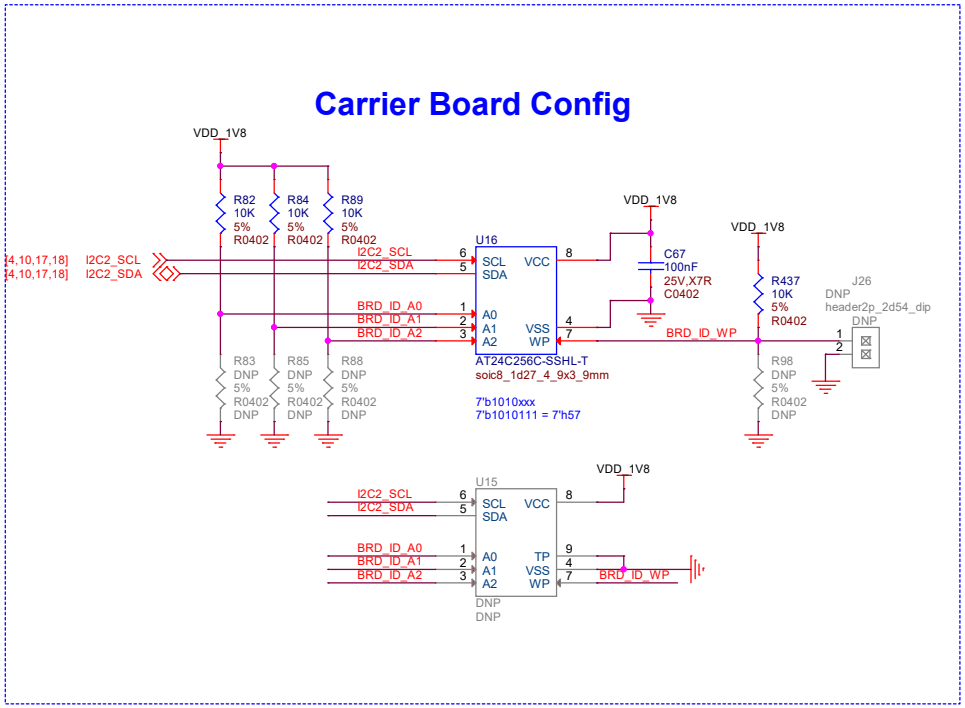


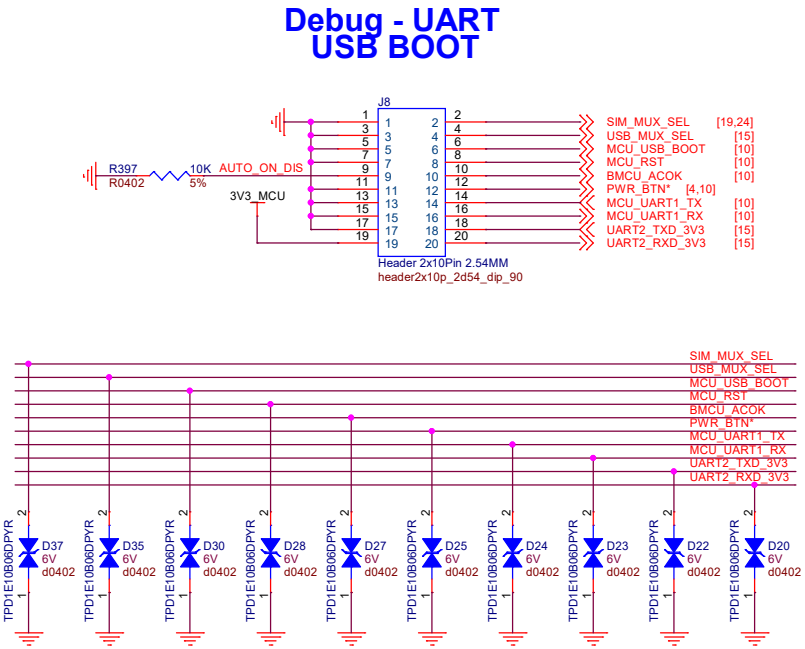
seeed studio	https://www.seeedstudio.com		
	Title: reServer industrial J401		
Size: A3	Document Number: 19 M.2 KEY-B (4G/5G)		Rev: v1.1
Draw By: qxn	Date: Monday, October 16, 2023		Sheet: 19 of 33

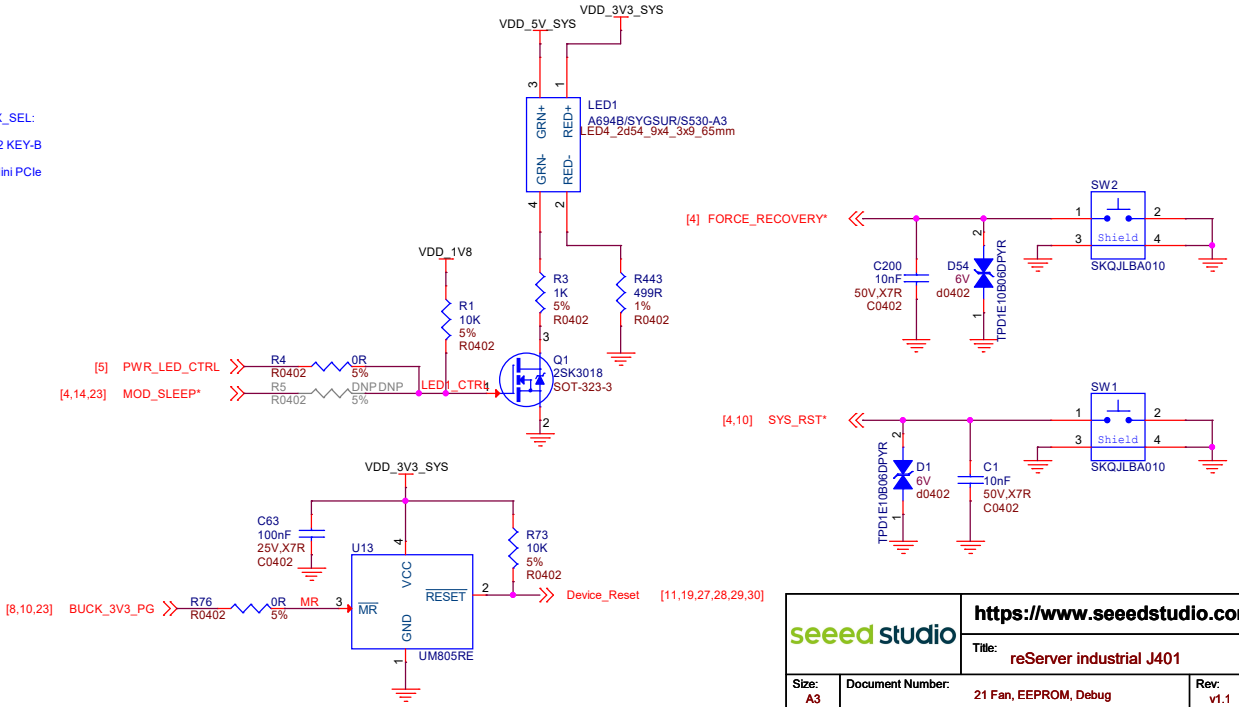


seeed studio	https://www.seeedstudio.com	
Title: reServer industrial J401		
Size: A3	Document Number: 20 Mini PCIe (4G/LoRa)	Rev: v1.1
Draw By: qxn	Date: Monday, October 16, 2023	Sheet: 20 of 33



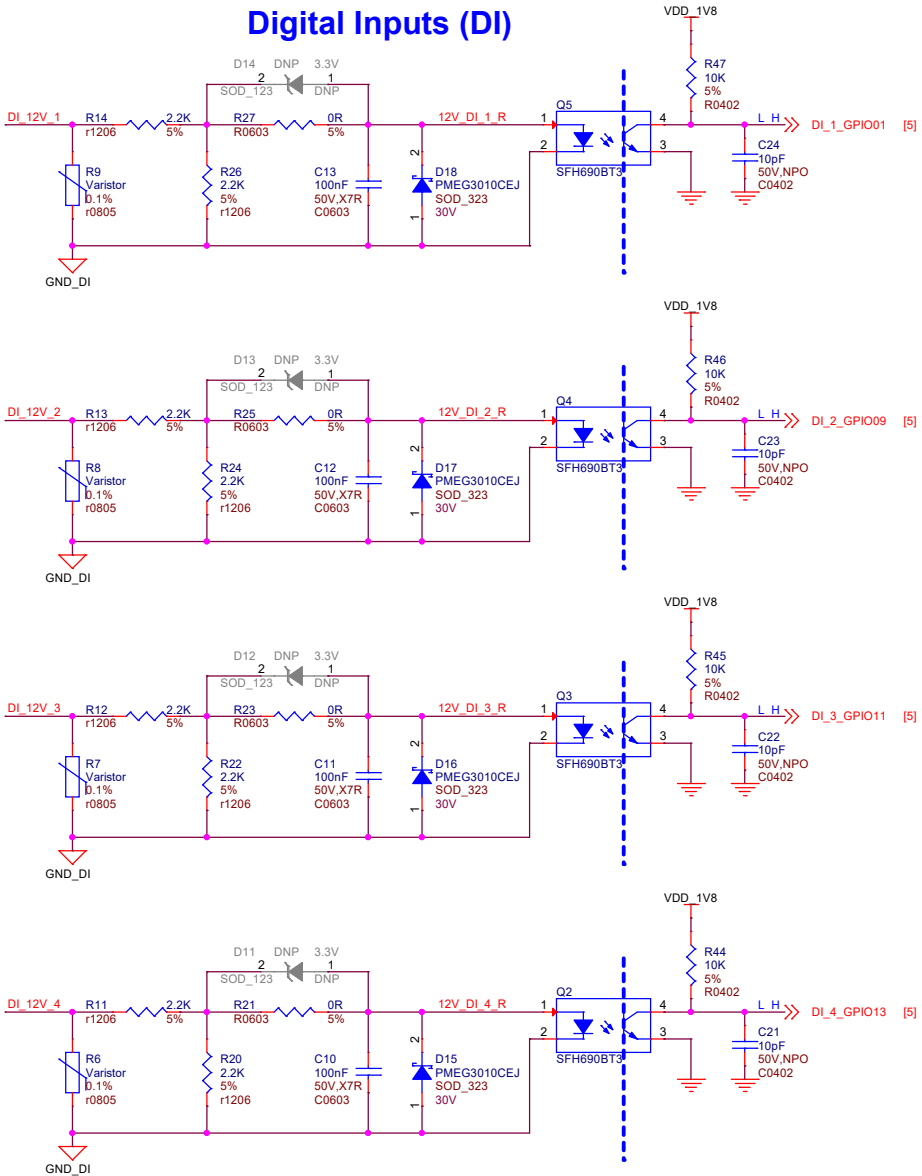




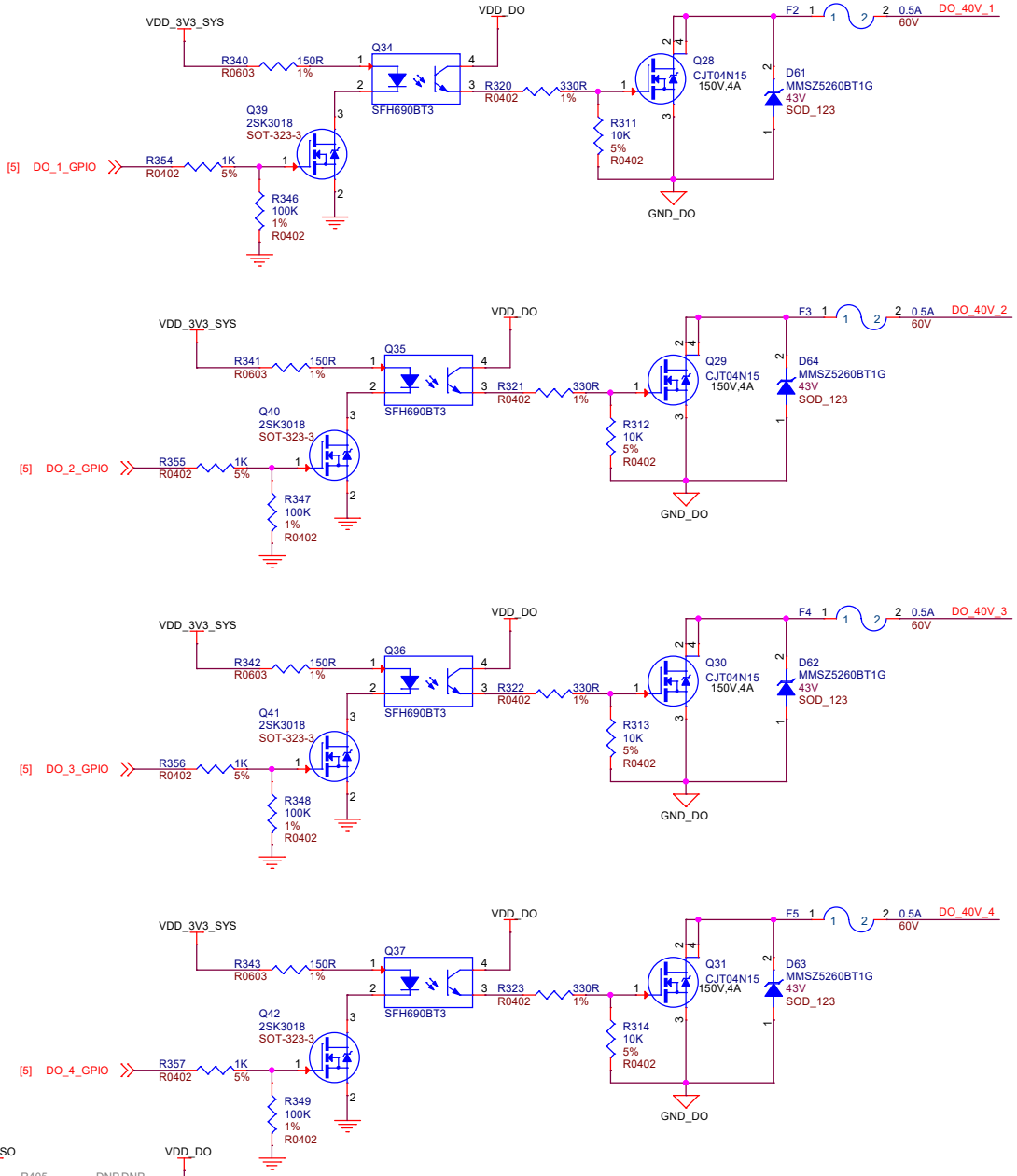


seeed studio	https://www.seeedstudio.com	
	Title: reServer industrial J401	
Size: A3	Document Number: 21 Fan, EEPROM, Debug	Rev: v1.1
Draw By: qxn	Date: Monday, October 16, 2023	Sheet: 21 of 33

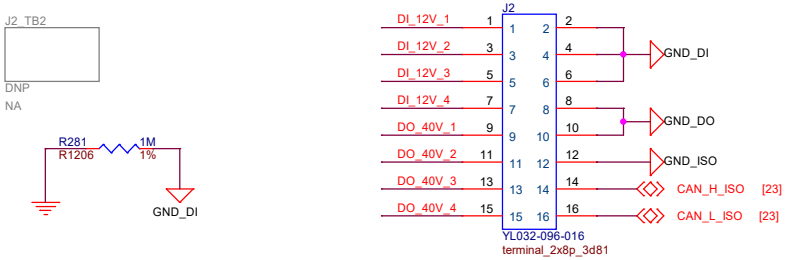
Digital Inputs (DI)

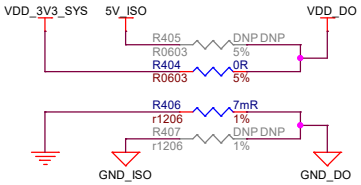


Digital Outputs (DO) rated 40V/0.2A



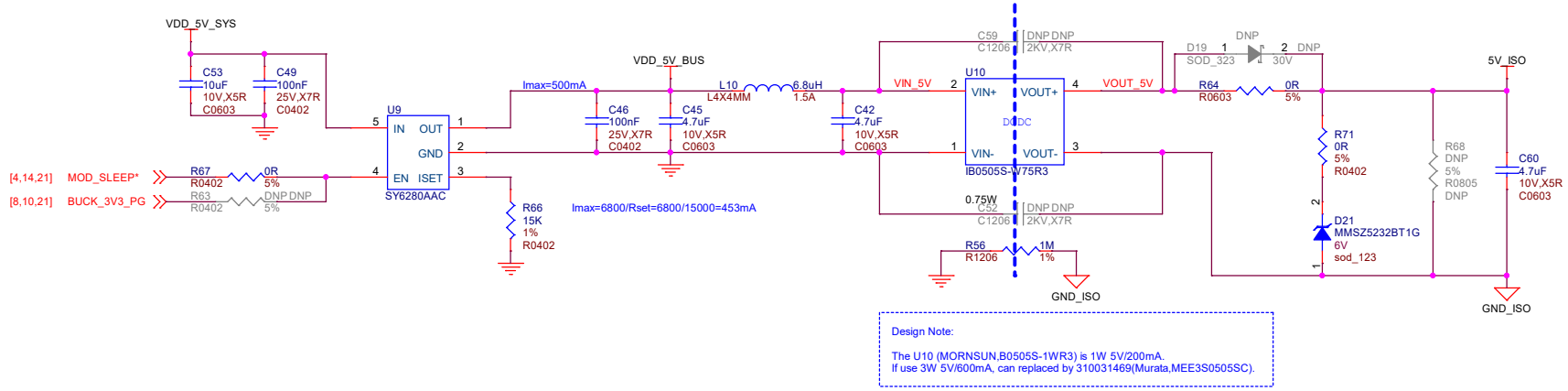
DI & DO & CAN





seeed studio	https://www.seeedstudio.com	
	Title: reServer industrial J401	
Size: A3	Document Number: 22 DI, DO	Rev: v1.1
Draw By: qxn	Date: Monday, October 16, 2023	Sheet: 22 of 33

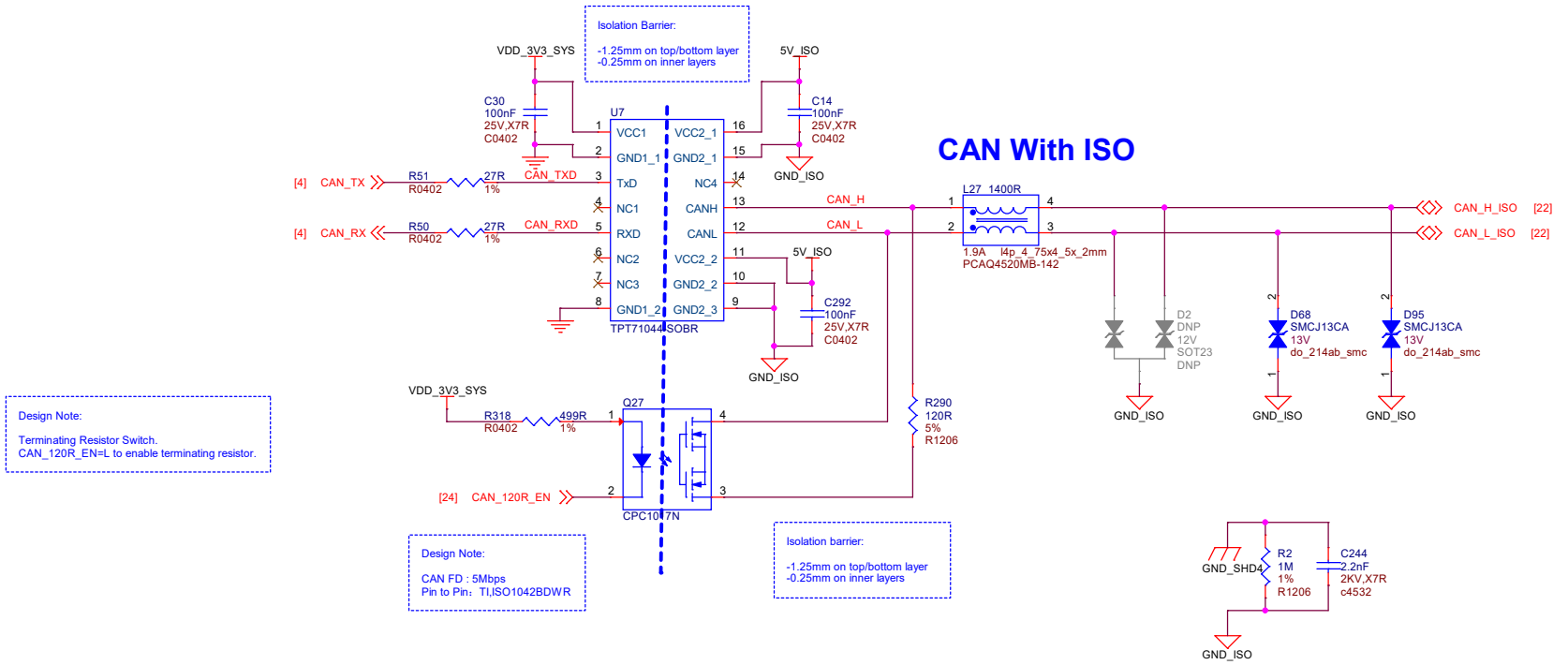
Isolated DCDC 5V to 5V



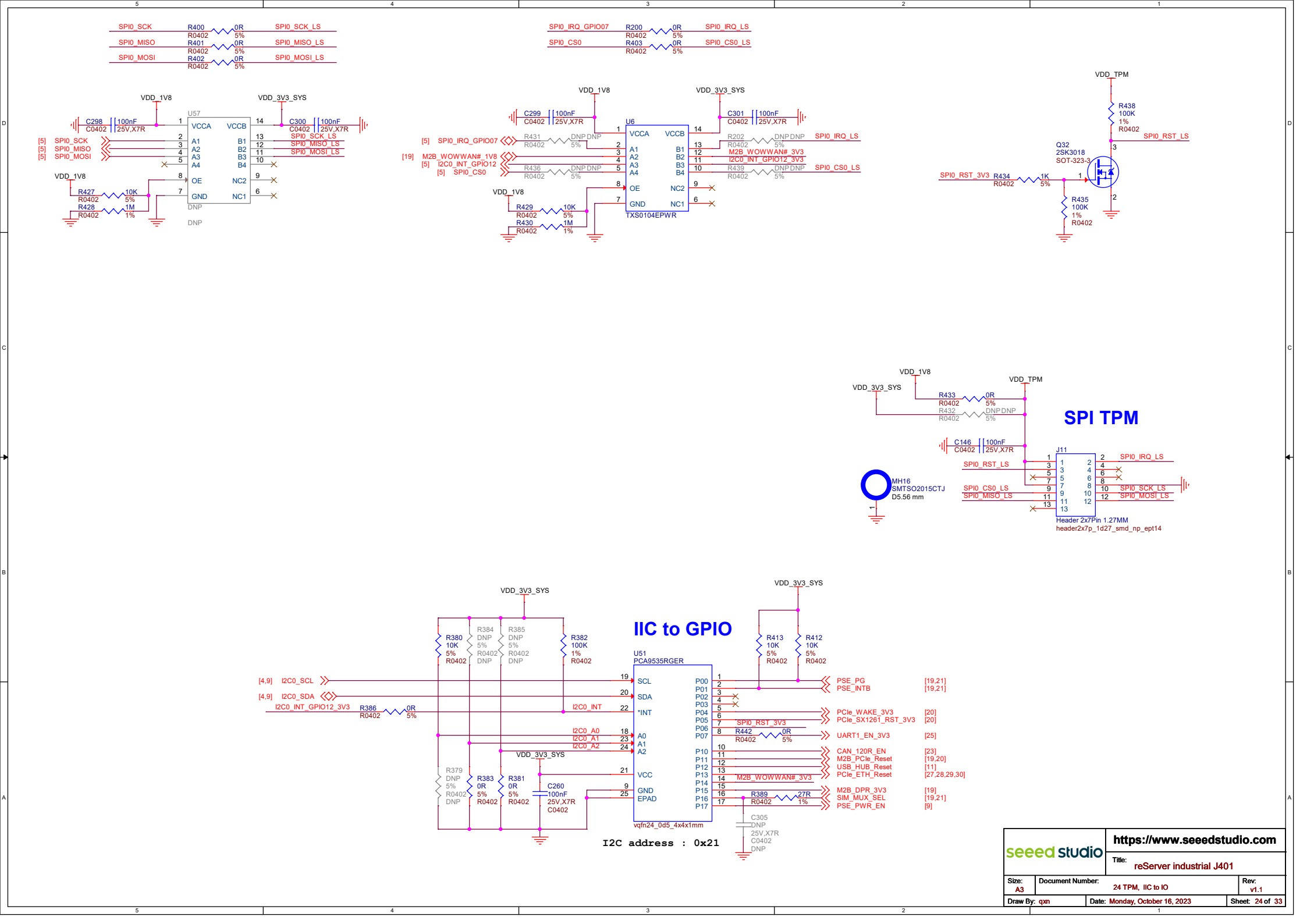
Design Note:

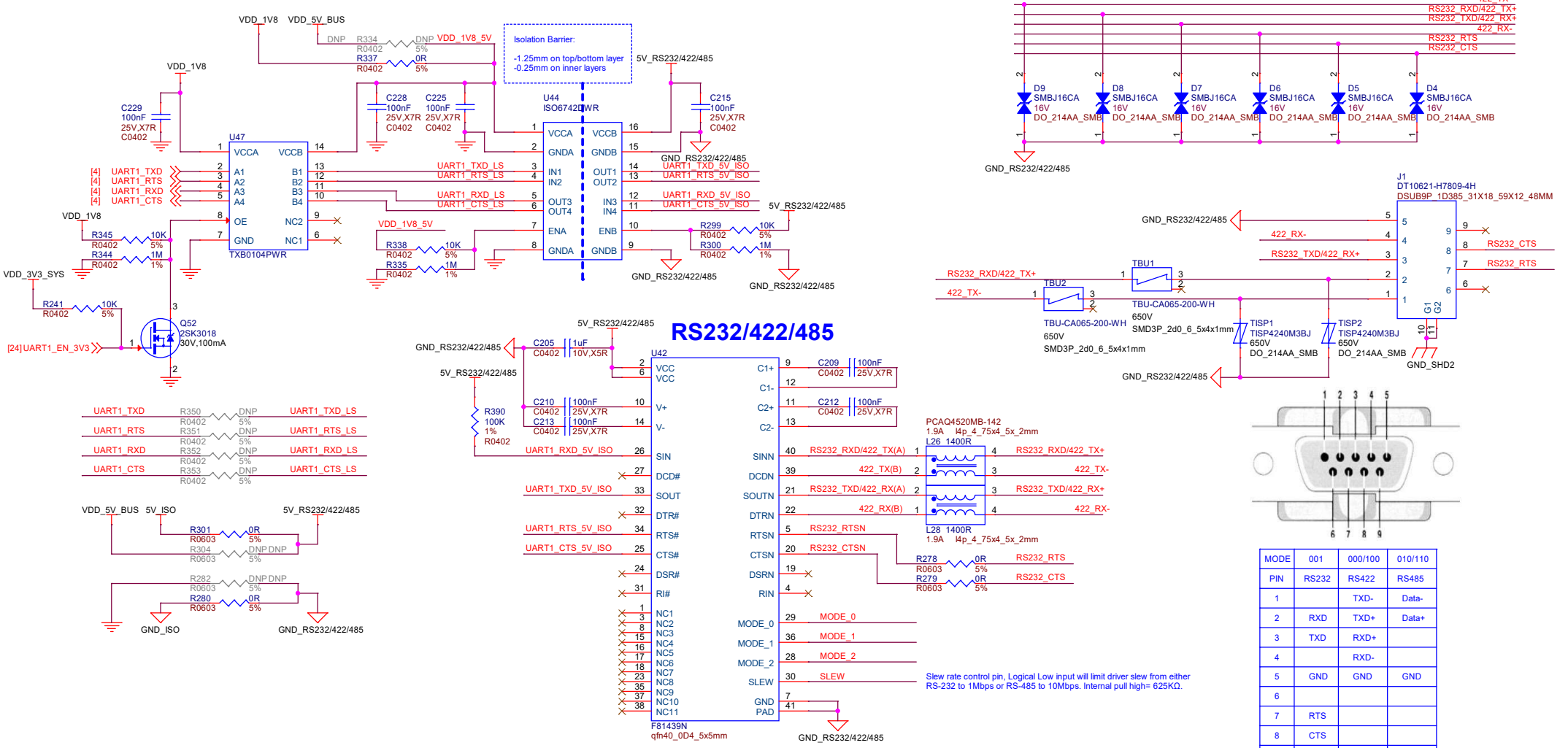
The U10 (MORNSUN,B0505S-1WR3) is 1W 5V/200mA.
If use 3W 5V/600mA, can replaced by 310031469(Murata,MEE3S0505SC).

CAN With ISO



seeed studio	https://www.seeedstudio.com	
Title: reServer industrial J401		
Size: A3	Document Number: 23 CAN, Isolated 5V	Rev: v1.1
Draw By: qxn	Date: Monday, October 16, 2023	Sheet: 23 of 33


SPI0_SCK R400 0R R0402 5% SPI0_SCK_LS
SPI0_MISO R401 0R R0402 5% SPI0_MISO_LS
SPI0_MOSI R402 0R R0402 5% SPI0_MOSI_LS
SPI0_IRQ_GPIO07 R200 0R R0402 5% SPI0_IRQ_LS
SPI0_CS0 R403 0R R0402 5% SPI0_CS0_LS
VDD_1V8
VDD_3V3_SYS
U57
VCCA VCCB
A1 A2 A3 A4
B1 B2 B3 B4
OE GND
NC1 NC2
DNP
C298 C0402 100nF 25V,X7R
C300 C0402 100nF 25V,X7R
R427 R0402 10K 5%
R428 R0402 1M 1%
U6
TXS0104EPWR
C299 C0402 100nF 25V,X7R
C301 C0402 100nF 25V,X7R
R431 R0402 DNP DNP 5%
R436 R0402 DNP DNP 5%
R429 R0402 10K 5%
R430 R0402 1M 1%
R202 R0402 DNP DNP 5%
R439 R0402 DNP DNP 5%
M2B_WOWWAN#_3V3
I2C0_INT_GPIO12_3V3
[5] SPI0_SCK
[5] SPI0_MISO
[5] SPI0_MOSI
[5] SPI0_IRQ_GPIO07
[19] M2B_WOWWAN#_1V8
[5] I2C0_INT_GPIO12
[5] SPI0_CS0
VDD_TPM
R438 100K 1% R0402
Q32 2SK3018 SOT-323-3
SPI0_RST_3V3 R434 R0402 1K 5%
R435 100K 1% R0402
SPI TPM
R433 R0402 0R 5%
R432 R0402 DNP DNP 5%
C146 C0402 100nF 25V,X7R
J11
Header 2x7Pin 1.27MM
header2x7p_1d27_smd_np_ept14
MH16 SMTSO2015CTJ D5.56 mm
IIC to GPIO
U51
PCA9535RGER
vqfn24_0d5_4x4x1mm
R380 10K 5% R0402
R384 DNP 5% R0402 DNP
R385 DNP 5% R0402 DNP
R382 100K 1% R0402
R413 10K 5% R0402
R412 10K 5% R0402
R386 R0402 0R 5%
R379 DNP 5% R0402 DNP
R383 0R 5% R0402
R381 0R 5% R0402
C260 100nF 25V,X7R C0402
C305 DNP 25V,X7R C0402 DNP
R442 R0402 0R 5%
R389 R0402 27R 1%
SCL SDA *INT
A0 A1 A2
VCC GND EPAD
P00 P01 P02 P03 P04 P05 P06 P07
P10 P11 P12 P13 P14 P15 P16 P17
[4,9] I2C0_SCL
[4,9] I2C0_SDA
I2C0_INT_GPIO12_3V3
I2C0_INT
I2C0_A0
I2C0_A1
I2C0_A2
PSE_PG [19,21]
PSE_INTB [19,21]
PCIe_WAKE_3V3 [20]
PCIe_SX1261_RST_3V3 [20]
UART1_EN_3V3 [25]
CAN_120R_EN [23]
M2B_PCIe_Reset [19,20]
USB_HUB_Reset [11]
PCIe_ETH_Reset [27,28,29,30]
M2B_DPR_3V3 [19]
SIM_MUX_SEL [19,21]
PSE_PWR_EN [9]
I2C address : 0x21
seeed studio
https://www.seeedstudio.com
Title: reServer industrial J401
Size: A3
Document Number: 24 TPM, IIC to IO
Rev: v1.1
Draw By: qxn
Date: Monday, October 16, 2023
Sheet: 24 of 33



MODE	001	000/100	010/110
PIN	RS232	RS422	RS485
1		TXD-	Data-
2	RXD	TXD+	Data+
3	TXD	RXD+	
4		RXD-	
5	GND	GND	GND
6			
7	RTS		
8	CTS		
9			

TABLE 1: Mode Select Configuration for F81439

Pin 29 MODE_0	Pin 36 MODE_1	Pin28 MODE_2	Mode	Status
0	0	0	RS-422 Full Duplex	1T/1R RS-422
0	0	1	Pure RS-232	3T/5R RS-232.
0	1	0	RS-485 Half Duplex	1T/1R RS-485 ,TX ENABLE Low Active
0	1	1	RS-485 Half Duplex	1T/1R RS-485 ,TX ENABLE High Active
1	0	0	RS-422 Full Duplex	1T/1R RS-422 with termination resistor
1	0	1	Pure RS-232	1T/1R RS-232 co-exists with RS485 application without the need for the bus switch IC (for special usage).
1	1	0	RS-485 Half Duplex	1T/1R RS-485 with termination resistor TX ENABLE Low Active
1	1	1	Low Power Shutdown	All I/O pins are High Impedance

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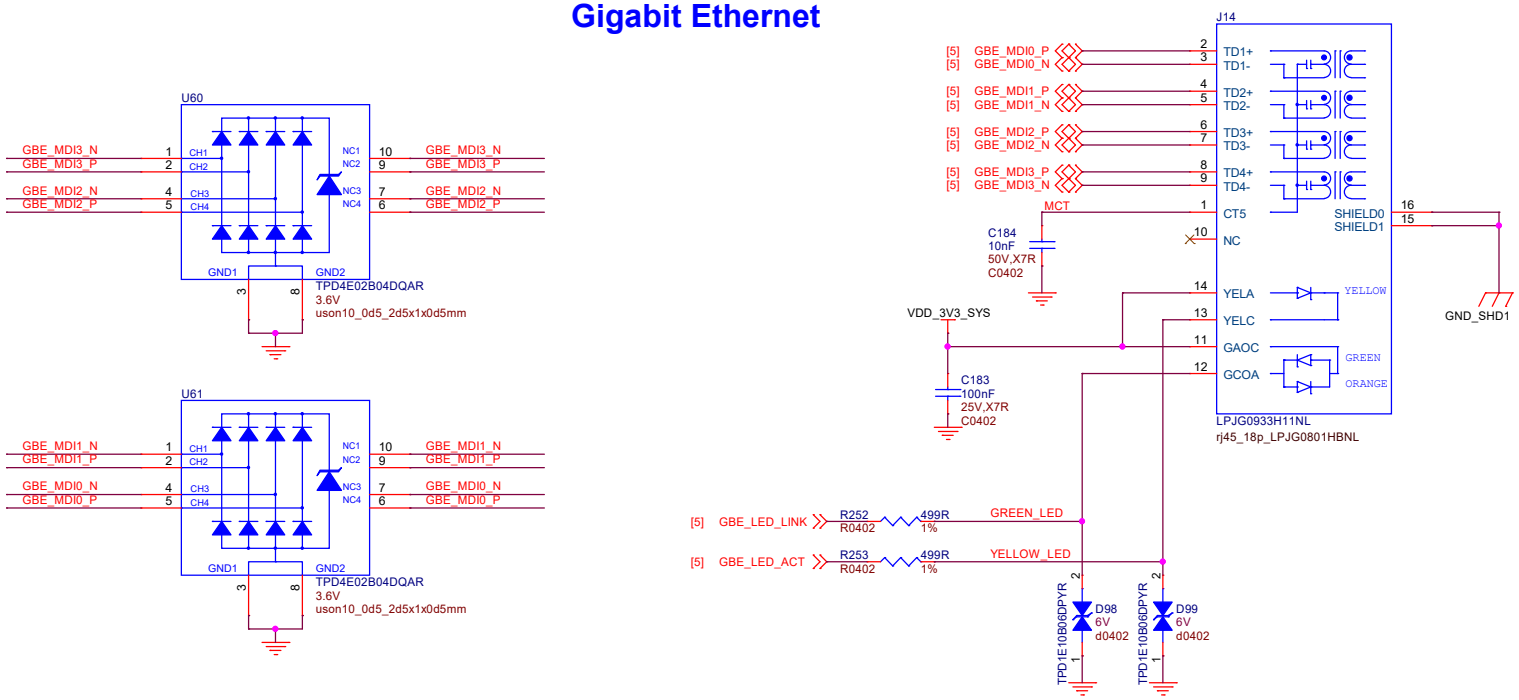
	Title: reServer industrial J401	
Size: A3	Document Number: 25 RS232/422/485	Rev: v1.1
Draw By: qxn	Date: Monday, October 16, 2023	Sheet: 25 of 33

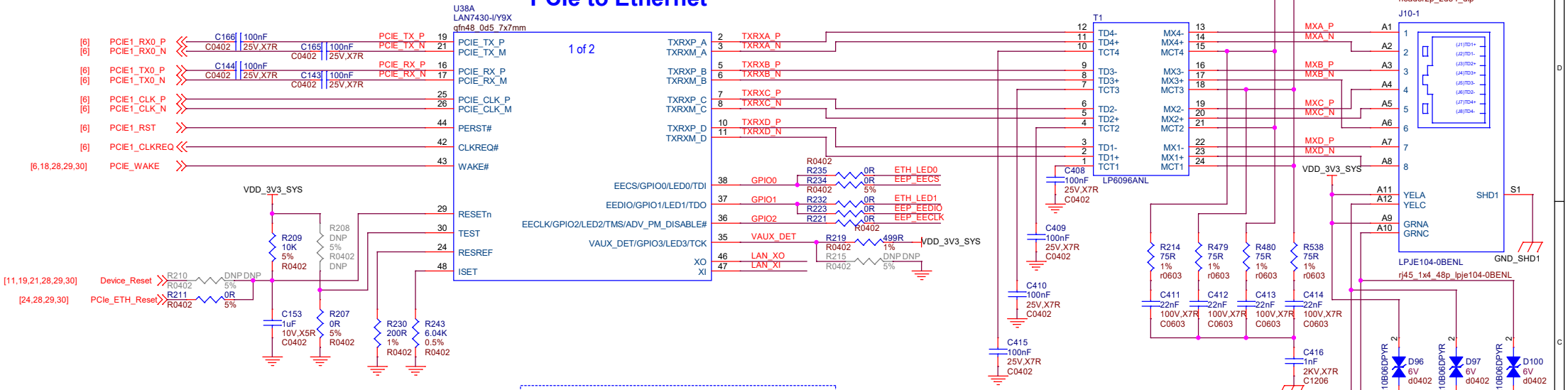
Gigabit Ethernet

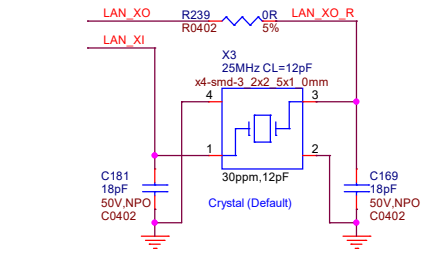


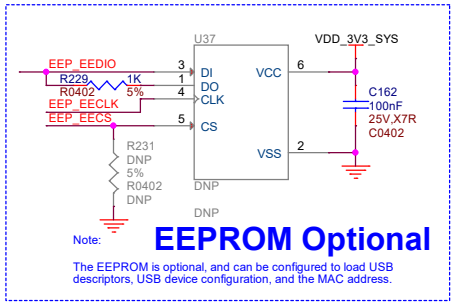
seeed studio	https://www.seeedstudio.com	
	Title: reServer industrial J401	
Size: A3	Document Number: 26 Gigabit Ethernet	Rev: v1.1
Draw By: qxn	Date: Monday, October 16, 2023	Sheet: 26 of 33

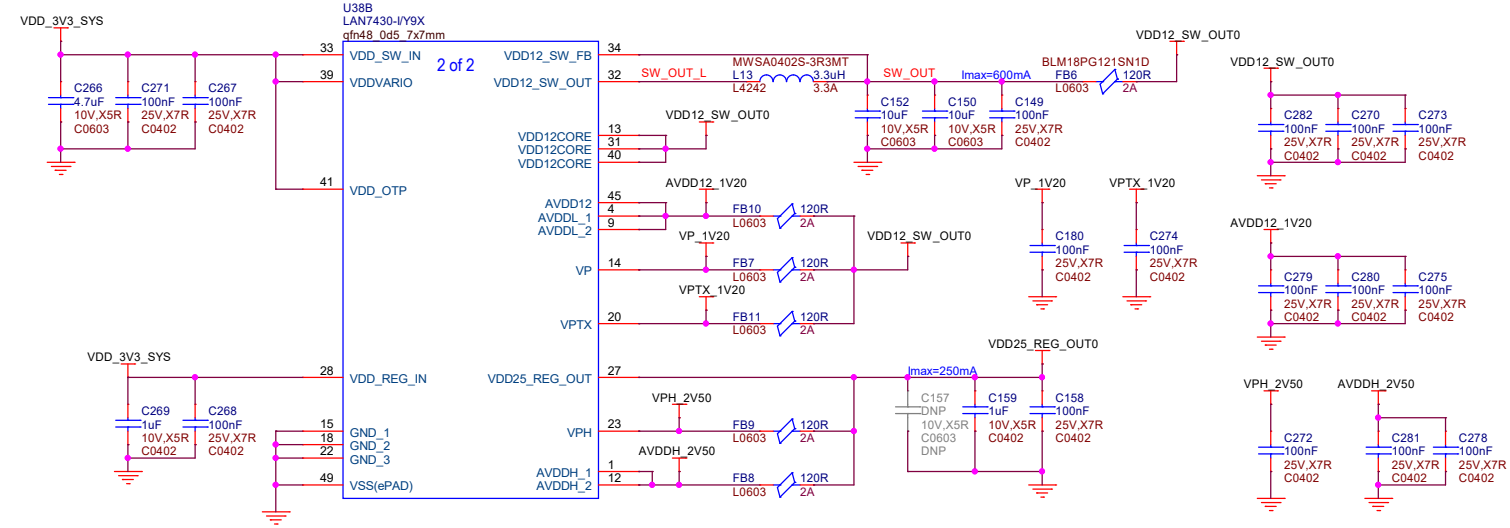
PSE input

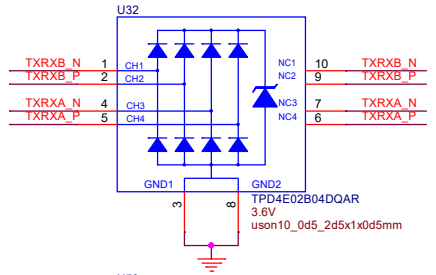
PCIe to Ethernet

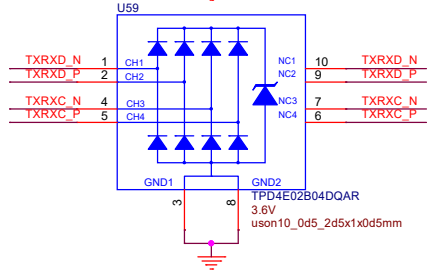








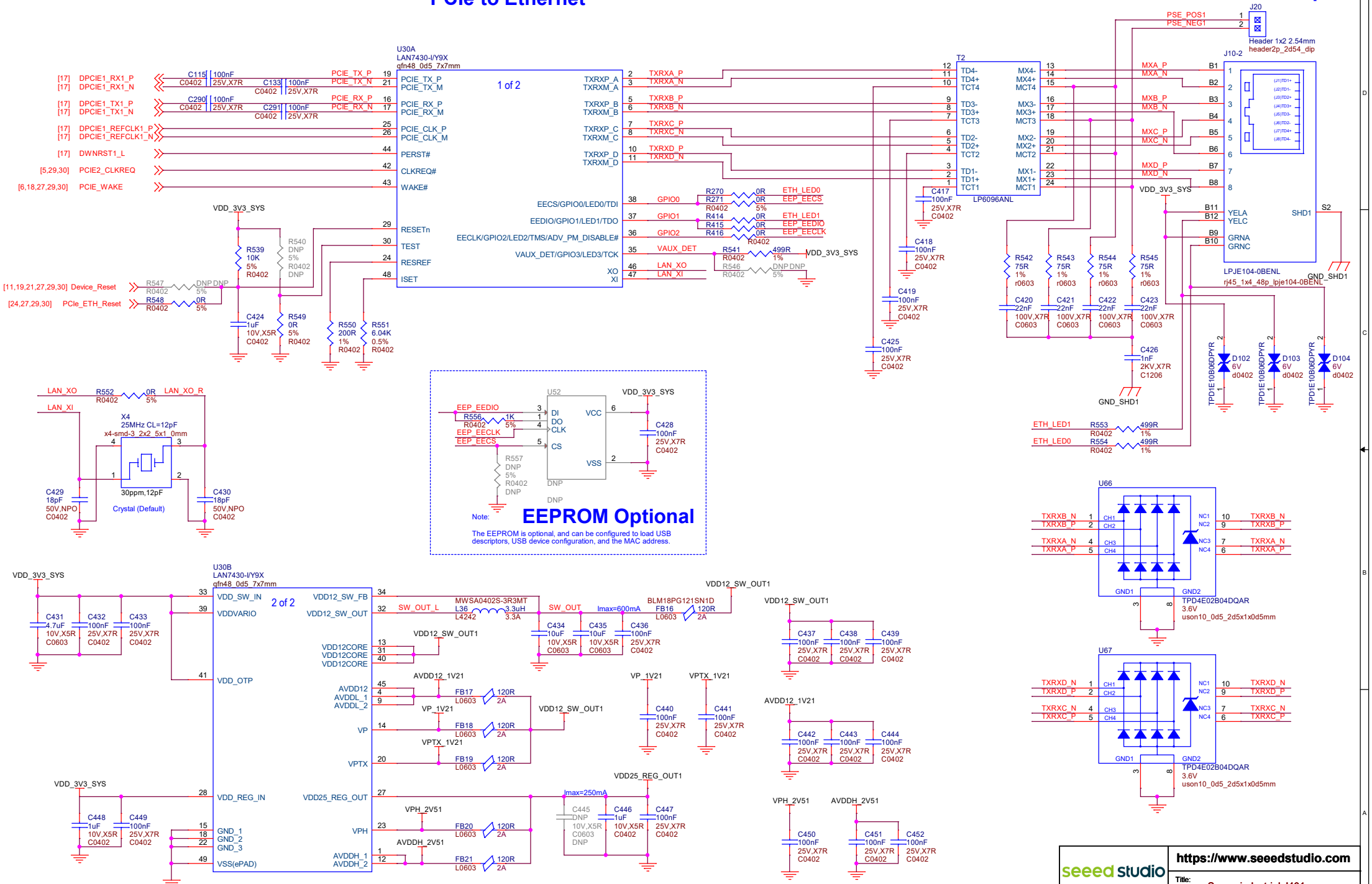




seeed studio	https://www.seeedstudio.com	
	Title: reServer industrial J401	
Size: A3	Document Number: 27 PCIe to GBE0	Rev: v1.1
Draw By: qxn	Date: Monday, October 16, 2023	Sheet: 27 of 33

PCIe to Ethernet

PSE input



seeed studio	https://www.seeedstudio.com		
	Title: reServer industrial J401		
Size: A3	Document Number: 28 PCIe to GBE1		Rev: v1.1
Draw By: qxn	Date: Monday, October 16, 2023		Sheet: 28 of 33

PSE input

PCIe to Ethernet

U48A
LAN7430-I/Y9X
qfn48_0d5_7x7mm
1 of 2

[17] DPCIE1_RX2_P
[17] DPCIE1_RX2_N
C230 C0402 100nF 25V,X7R
C231 C0402 100nF 25V,X7R
PCIE_TX_P 19
PCIE_TX_N 21
PCIE_TX_P
PCIE_TX_M

[17] DPCIE1_TX2_P
[17] DPCIE1_TX2_N
C232 C0402 100nF 25V,X7R
C296 C0402 100nF 25V,X7R
PCIE_RX_P 16
PCIE_RX_N 17
PCIE_RX_P
PCIE_RX_M

[17] DPCIE1_REFCLK2_P
[17] DPCIE1_REFCLK2_N
25
26
PCIE_CLK_P
PCIE_CLK_M

[17] DWNRST2_L
44
PERST#

[5,28,30] PCIE2_CLKREQ
42
CLKREQ#

PCIE_WAKE
43
WAKE#

[6,18,27,28,30]

TXRXA_P 2
TXRXA_N 3
TXRXA_P
TXRXA_N

TXRXB_P 5
TXRXB_N 6
TXRXB_P
TXRXB_N

TXRXC_P 7
TXRXC_N 8
TXRXC_P
TXRXC_N

TXRXD_P 10
TXRXD_N 11
TXRXD_P
TXRXD_N

GPIO0 38
R358 0R ETH_LED0
R359 0R EEP_EECS
5%
EECS/GPIO0/LED0/TDI

GPIO1 37
R360 0R ETH_LED1
R363 0R EEP_EEDIO
EEDIO/GPIO1/LED1/TDO

GPIO2 36
R364 0R EEP_EECLK
R0402
EECLK/GPIO2/LED2/TMS/ADV_PM_DISABLE#

VAUX_DET 35
R426 499R 1%
R0402
VAUX_DET/GPIO3/LED3/TCK
VDD_3V3_SYS

LAN_XO 46
LAN_XI 47
R571 DNP DNP
R0402 5%
XO
XI

VDD_3V3_SYS
R365 10K 5% R0402
R425 DNP 5% R0402 DNP
29
RESETn
30
TEST
24
RESREF
48
ISET

[11,19,21,27,28,30]
Device_Reset
R572 DNP DNP
R0402 5%
PCIe_ETH_Reset
R573 0R
R0402 5%
[24,27,28,30]

C461 1uF 10V,X5R C0402
R574 0R 5% R0402
R575 200R 1% R0402
R576 6.04K 0.5% R0402

T3
TD4- 12
TD4+ 11
TCT4
TD3- 9
TD3+ 8
TCT3
TD2- 6
TD2+ 5
TCT2
TD1- 3
TD1+ 2
TCT1
LP6096ANL
MX4- 13
MX4+ 14
MCT4
MX3- 16
MX3+ 17
MCT3
MX2- 19
MX2+ 20
MCT2
MX1- 22
MX1+ 23
MCT1

C297 100nF 25V,X7R C0402
C455 100nF 25V,X7R C0402
C456 100nF 25V,X7R C0402
C462 100nF 25V,X7R C0402

PSE_POS2 1
PSE_NEG2 2
J23
Header 1x2 2.54mm
header2p_2d54_dip

J10-3
MXA_P C1
MXA_N C2
MXB_P C3
MXB_N C4
MXC_P C5
MXC_N C6
MXD_P C7
MXD_N C8
VDD_3V3_SYS
C11 YELA
C12 YELC
C9 GRNA
C10 GRNC
SHD1
S3
GND_SHD1
LPJE104-0BENL
rj45_1x4_48p_lpje104-0BENL

R567 75R 1% r0603
R568 75R 1% r0603
R569 75R 1% r0603
R570 75R 1% r0603
C457 22nF 100V,X7R C0603
C458 22nF 100V,X7R C0603
C459 22nF 100V,X7R C0603
C460 22nF 100V,X7R C0603
C463 1nF 2KV,X7R C1206
GND_SHD1

D3 6V d0402
D10 6V d0402
D71 6V d0402
TPD1E10B06DPYR

ETH_LED1 R578 499R 1% R0402
ETH_LED0 R579 499R 1% R0402

LAN_XO R577 0R LAN_XO_R
R0402 5%
LAN_XI
X5
25MHz CL=12pF
x4-smd-3_2x2_5x1_0mm
30ppm,12pF
Crystal (Default)
C466 18pF 50V,NPO C0402
C467 18pF 50V,NPO C0402

U55
EEP_EEDIO
R581 1K 5% R0402
EEP_EECLK
EEP_EECS
R582 DNP 5% R0402 DNP
DI 3
DO 1
CLK 4
CS 5
VCC 6
VSS 2
DNP
VDD_3V3_SYS
C465 100nF 25V,X7R C0402

Note:
EEPROM Optional
The EEPROM is optional, and can be configured to load USB descriptors, USB device configuration, and the MAC address.

U56
TXRXB_N 1
TXRXB_P 2
TXRXA_N 4
TXRXA_P 5
CH1
CH2
CH3
CH4
NC1 10 TXRXB_N
NC2 9 TXRXB_P
NC3 7 TXRXA_N
NC4 6 TXRXA_P
GND1
GND2
TPD4E02B04DQAR
3.6V
uson10_0d5_2d5x1x0d5mm

U70
TXRXD_N 1
TXRXD_P 2
TXRXC_N 4
TXRXC_P 5
NC1 10 TXRXD_N
NC2 9 TXRXD_P
NC3 7 TXRXC_N
NC4 6 TXRXC_P
TPD4E02B04DQAR
3.6V
uson10_0d5_2d5x1x0d5mm

U48B
LAN7430-I/Y9X
qfn48_0d5_7x7mm
2 of 2

VDD_3V3_SYS
C468 4.7uF 10V,X5R C0603
C469 100nF 25V,X7R C0402
C470 100nF 25V,X7R C0402
VDD_SW_IN 33
VDDVARIO 39
VDD_OTP 41

VDD12_SW_FB 34
VDD12_SW_OUT 32
SW_OUT_L
MWSA0402S-3R3MT
L40 3.3uH 3.3A
L4242
SW_OUT
Imax=600mA
BLM18PG121SN1D
FB12 120R 2A
L0603
VDD12_SW_OUT2
C471 10uF 10V,X5R C0603
C472 10uF 10V,X5R C0603
C473 100nF 25V,X7R C0402
VDD12CORE 13
VDD12CORE 31
VDD12CORE 40
VDD12_SW_OUT2
C474 100nF 25V,X7R C0402
C475 100nF 25V,X7R C0402
C476 100nF 25V,X7R C0402

AVDD12 45
AVDDL_1 4
AVDDL_2 9
AVDD12_1V22
FB13 120R 2A L0603
VP_1V22
VP 14
FB22 120R 2A L0603
VPTX_1V22
VPTX 20
FB23 120R 2A L0603
VDD12_SW_OUT2
VP_1V22
C477 100nF 25V,X7R C0402
VPTX_1V22
C478 100nF 25V,X7R C0402
AVDD12_1V22
C479 100nF 25V,X7R C0402
C480 100nF 25V,X7R C0402
C481 100nF 25V,X7R C0402

VDD_3V3_SYS
C485 1uF 10V,X5R C0402
C486 100nF 25V,X7R C0402
VDD_REG_IN 28
GND_1 15
GND_2 18
GND_3 22
VSS(ePAD) 49

VDD25_REG_OUT 27
Imax=250mA
VDD25_REG_OUT2
C482 DNP 10V,X5R C0603 DNP
C483 1uF 10V,X5R C0402
C484 100nF 25V,X7R C0402
VPH 23
VPH_2V52
FB24 120R 2A L0603
AVDDH_1 1
AVDDH_2 12
AVDDH_2V52
FB25 120R 2A L0603
VPH_2V52
C487 100nF 25V,X7R C0402
AVDDH_2V52
C488 100nF 25V,X7R C0402
C489 100nF 25V,X7R C0402

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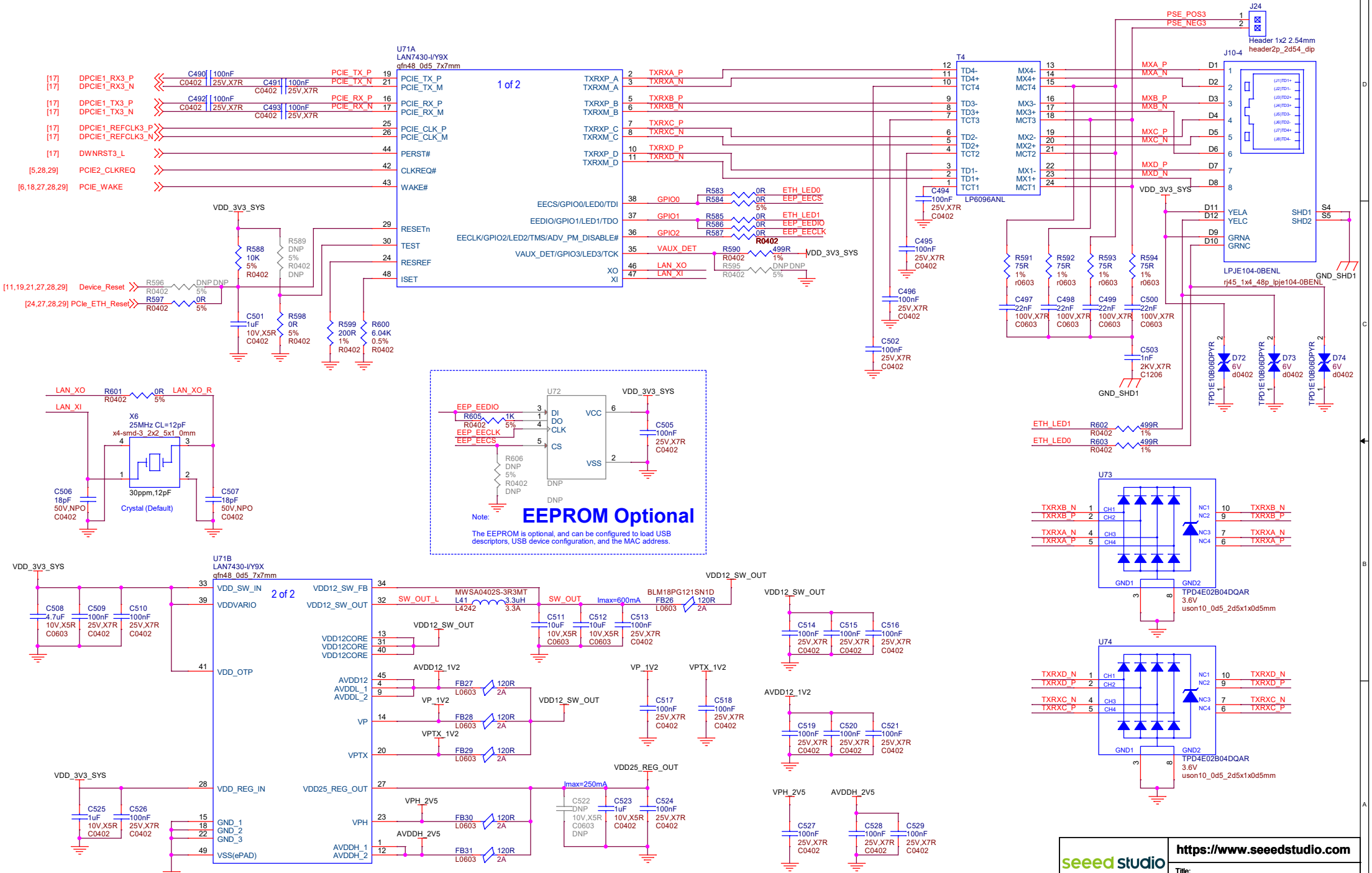
PCIe to Ethernet

PSE input



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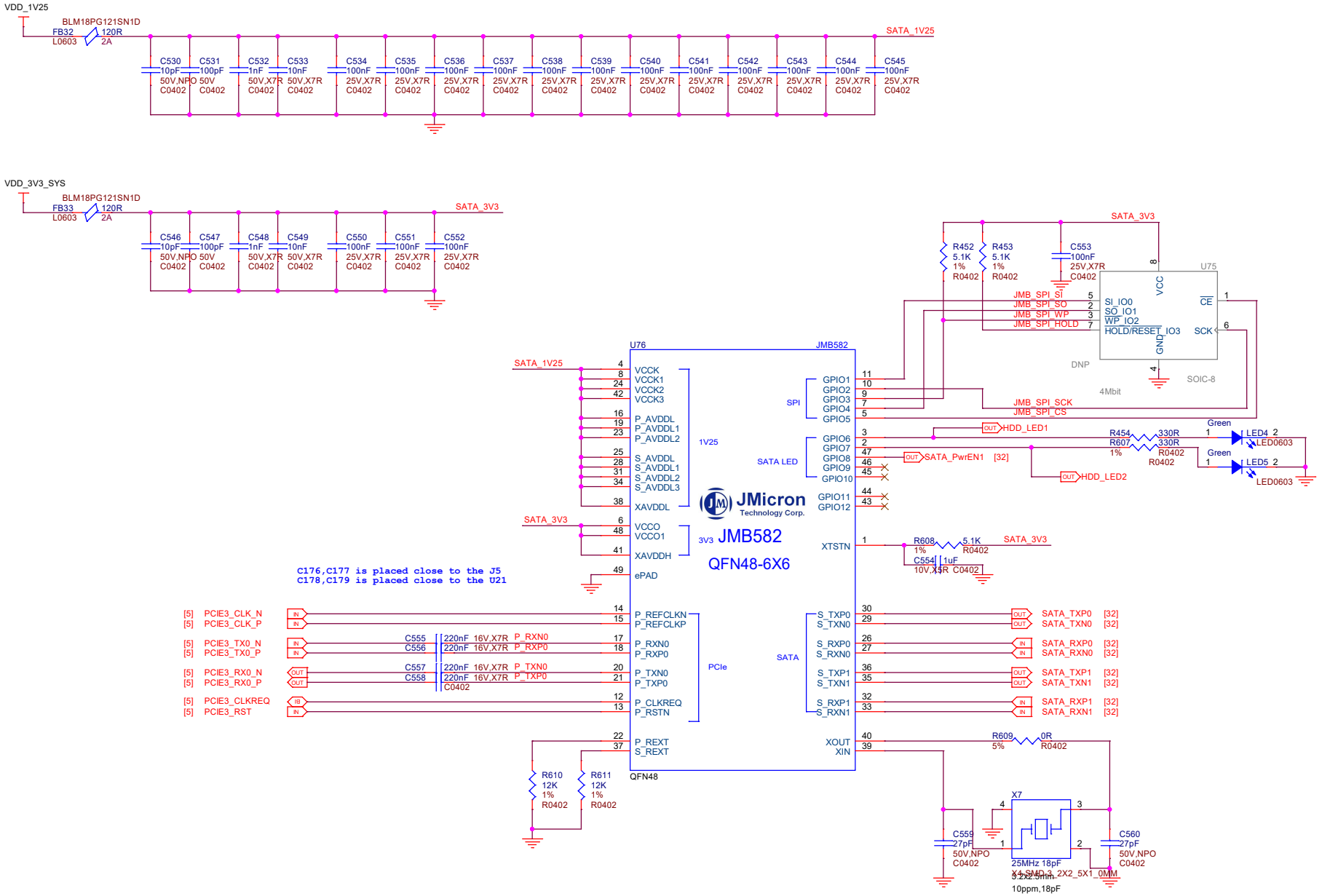
Sata Controller



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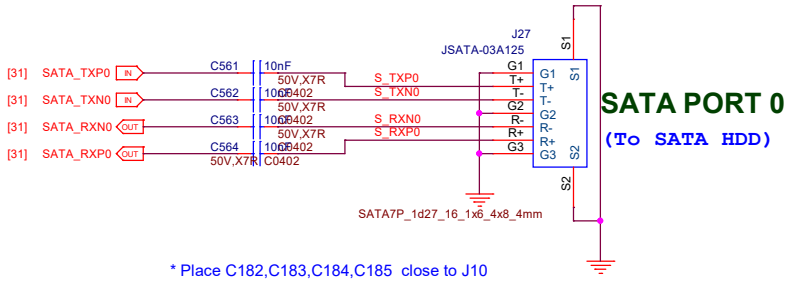
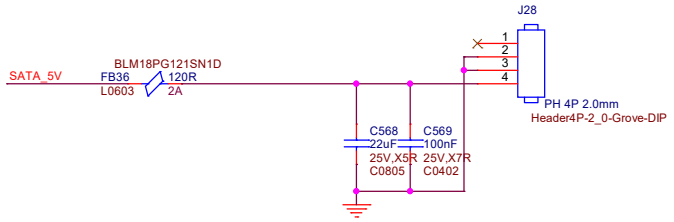
2.5" Sata connector

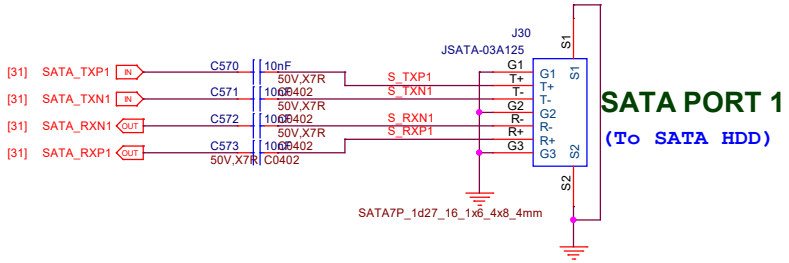


SATA PORT 0

(To SATA HDD)

* Place C182,C183,C184,C185 close to J10

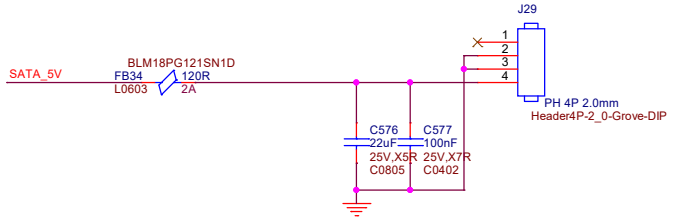


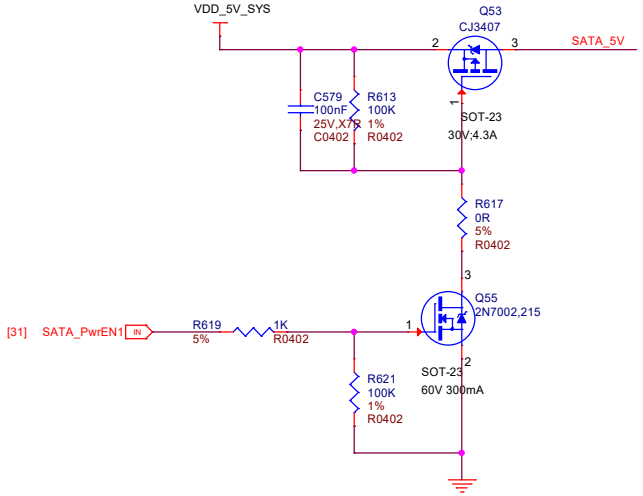


SATA PORT 1

(To SATA HDD)

* Place C190,C191,C192,C193 close to J12





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Size: A3	Document Number: 32 SATA_Connector	Rev: v1.1
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