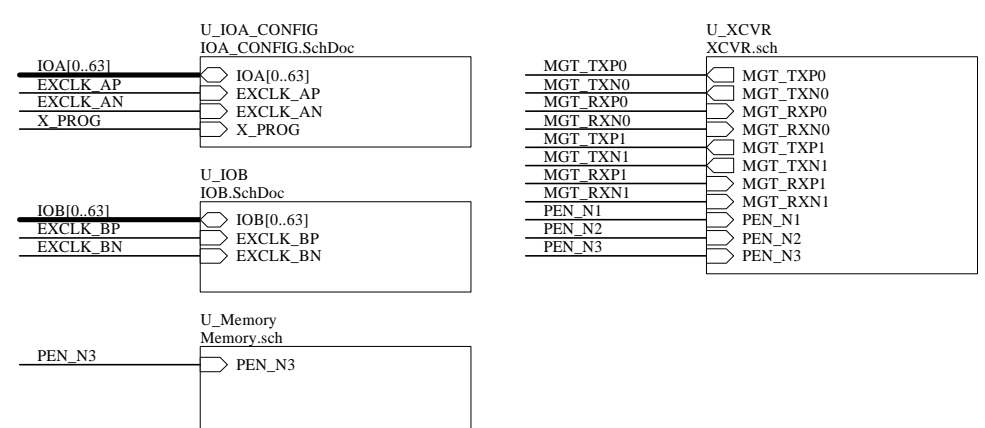


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UltraScale	0.95V	2703	1543
UltraScale Speed Grade -3	1.0V	3303	2802
UltraScale+	0.85V	2703	3303
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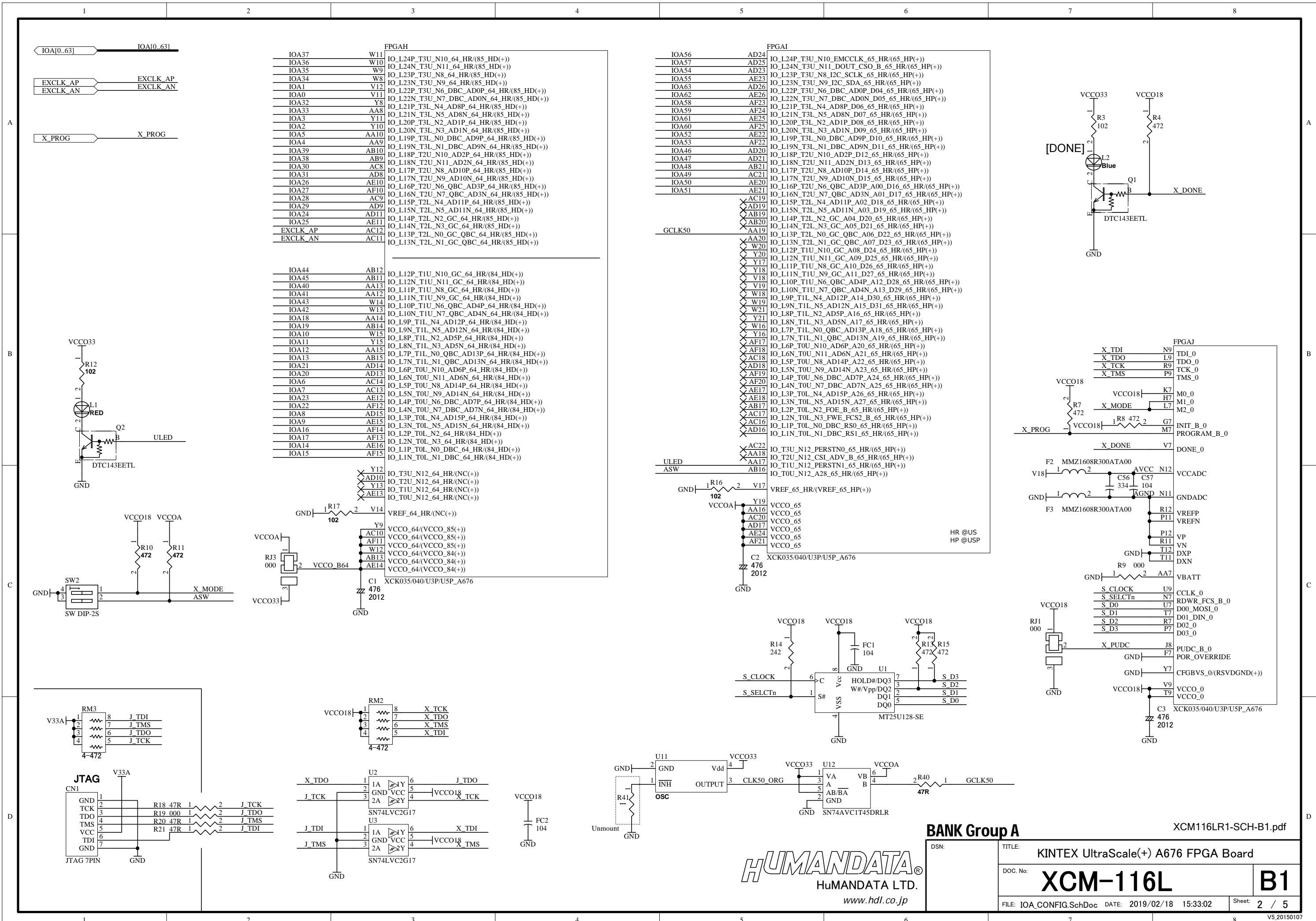
CNA				CNB			
IO	IO	IO	IO	IO	IO	IO	IO
EXCLK_AP	11	CK	12	EXCLK_AN	11	CK	12
MGT_TXP0	13	TXP	14	MGT_RXP1	13	RXP	14
MGT_TXN1	15	TXN	16	MGT_RXN1	15	RXN	16
IOA0	17	IO	18	IOA32	17	IO	18
IOA1	19	IO	20	IOA33	19	IO	20
IOA2	21	IO	22	IOA34	21	IO	22
IOA3	23	IO	24	IOA35	23	IO	24
IOA4	25	IO	26	IOA36	25	IO	26
IOA5	27	IO	28	IOA37	27	IO	28
IOA6	29	IO	30	IOA38	29	IO	30
GND	G	GND	G	GND	G	GND	G
IOA7	31	IO	32	IOA39	31	IO	32
IOA8	33	IO	34	IOA40	33	IO	34
IOA9	35	IO	36	IOA41	35	IO	36
IOA10	37	IO	38	IOA42	37	IO	38
IOA11	39	IO	40	IOA43	39	IO	40
IOA12	41	IO	42	IOA44	41	IO	42
IOA13	43	IO	44	IOA45	43	IO	44
IOA14	45	IO	46	IOA46	45	IO	46
IOA15	47	IO	48	IOA47	47	IO	48
IOA16	49	IO	50	IOA48	49	IO	50
GND	G	GND	G	GND	G	GND	G
IOA17	51	IO	52	IOA49	51	IO	52
IOA18	53	IO	54	IOA50	53	IO	54
IOA19	55	IO	56	IOA51	55	IO	56
IOA20	57	IO	58	IOA52	57	IO	58
IOA21	59	IO	60	IOA53	59	IO	60
IOA22	61	IO	62	IOA54	61	IO	62
IOA23	63	IO	64	IOA55	63	IO	64
IOA24	65	IO	66	IOA56	65	IO	66
IOA25	67	IO	68	IOA57	67	IO	68
IOA26	69	IO	70	IOA58	69	IO	70
GND	G	GND	G	GND	G	GND	G
IOA27	71	IO	72	IOA59	71	IO	72
IOA28	73	IO	74	IOA60	73	IO	74
IOA29	75	IO	76	IOA61	75	IO	76
IOA30	77	IO	78	IOA62	77	IO	78
IOA31	79	IO	80	IOA63	79	IO	80



DSN: TITLE: KINTEX UltraScale(+) A676 FPGA Board

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FPGAH

IOA37	W11	IO_L24P_T3U_N10_64_HR(85_HD(+))
IOA36	W10	IO_L24N_T3U_N11_64_HR(85_HD(+))
IOA35	W9	IO_L23P_T3U_N8_64_HR(85_HD(+))
IOA34	W8	IO_L23N_T3U_N9_64_HR(85_HD(+))
IOA1	V12	IO_L22P_T3U_N6_DBC_AD0P_64_HR(85_HD(+))
IOA0	V11	IO_L22N_T3U_N7_DBC_AD0N_64_HR(85_HD(+))
IOA32	Y8	IO_L21P_T3L_N4_AD8P_64_HR(85_HD(+))
IOA33	AA8	IO_L21N_T3L_N5_AD8N_64_HR(85_HD(+))
IOA3	Y11	IO_L20P_T3L_N2_AD1P_64_HR(85_HD(+))
IOA2	Y10	IO_L20N_T3L_N3_AD1N_64_HR(85_HD(+))
IOA5	AA10	IO_L19P_T3L_N0_DBC_AD9P_64_HR(85_HD(+))
IOA4	AA9	IO_L19N_T3L_N1_DBC_AD9N_64_HR(85_HD(+))
IOA39	AB10	IO_L18P_T2U_N10_AD2P_64_HR(85_HD(+))
IOA38	AB9	IO_L18N_T2U_N11_AD2N_64_HR(85_HD(+))
IOA30	AC8	IO_L17P_T2U_N8_AD10P_64_HR(85_HD(+))
IOA31	AD8	IO_L17N_T2U_N9_AD10N_64_HR(85_HD(+))
IOA26	AE10	IO_L16P_T2U_N6_QBC_AD3P_64_HR(85_HD(+))
IOA27	AF10	IO_L16N_T2U_N7_QBC_AD3N_64_HR(85_HD(+))
IOA28	AC9	IO_L15P_T2L_N4_AD11P_64_HR(85_HD(+))
IOA29	AD9	IO_L15N_T2L_N5_AD11N_64_HR(85_HD(+))
IOA24	AD11	IO_L14P_T2L_N2_GC_64_HR(85_HD(+))
IOA25	AE11	IO_L14N_T2L_N3_GC_64_HR(85_HD(+))
EXCLK_AP	AC12	IO_L13P_T2L_N0_GC_QBC_64_HR(85_HD(+))
EXCLK_AN	AC11	IO_L13N_T2L_N1_GC_QBC_64_HR(85_HD(+))

IOA44	AB12	IO_L12P_T1U_N10_GC_64_HR(84_HD(+))
IOA45	AB11	IO_L12N_T1U_N11_GC_64_HR(84_HD(+))
IOA40	AA13	IO_L11P_T1U_N8_GC_64_HR(84_HD(+))
IOA41	AA12	IO_L11N_T1U_N9_GC_64_HR(84_HD(+))
IOA43	W14	IO_L10P_T1U_N6_QBC_AD4P_64_HR(84_HD(+))
IOA42	W13	IO_L10N_T1U_N7_QBC_AD4N_64_HR(84_HD(+))
IOA18	AA14	IO_L9P_T1L_N4_AD12P_64_HR(84_HD(+))
IOA19	AB14	IO_L9N_T1L_N5_AD12N_64_HR(84_HD(+))
IOA10	W15	IO_L8P_T1L_N2_AD5P_64_HR(84_HD(+))
IOA11	Y15	IO_L8N_T1L_N3_AD5N_64_HR(84_HD(+))
IOA12	AA15	IO_L7P_T1L_N0_QBC_AD13P_64_HR(84_HD(+))
IOA13	AB15	IO_L7N_T1L_N1_QBC_AD13N_64_HR(84_HD(+))
IOA21	AD14	IO_L6P_T0U_N9_AD6P_64_HR(84_HD(+))
IOA20	AD13	IO_L6N_T0U_N11_AD6N_64_HR(84_HD(+))
IOA6	AC14	IO_L5P_T0U_N8_AD14P_64_HR(84_HD(+))
IOA7	AC13	IO_L5N_T0U_N9_AD14N_64_HR(84_HD(+))
IOA23	AE12	IO_L4P_T0U_N6_DBC_AD7P_64_HR(84_HD(+))
IOA22	AF12	IO_L4N_T0U_N7_DBC_AD7N_64_HR(84_HD(+))
IOA8	AD15	IO_L3P_T0L_N4_AD15P_64_HR(84_HD(+))
IOA9	AE15	IO_L3N_T0L_N5_AD15N_64_HR(84_HD(+))
IOA16	AF14	IO_L2P_T0L_N2_64_HR(84_HD(+))
IOA17	AF13	IO_L2N_T0L_N3_64_HR(84_HD(+))
IOA14	AE16	IO_L1P_T0L_N0_DBC_64_HR(84_HD(+))
IOA15	AF15	IO_L1N_T0L_N1_DBC_64_HR(84_HD(+))

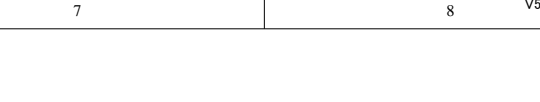
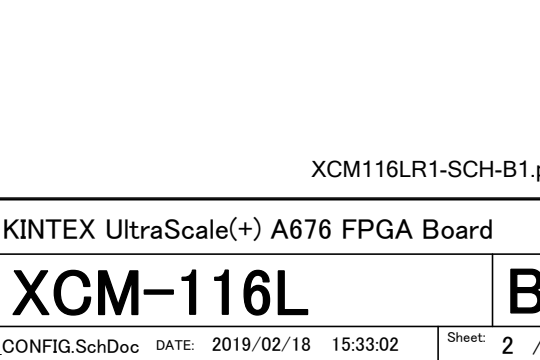
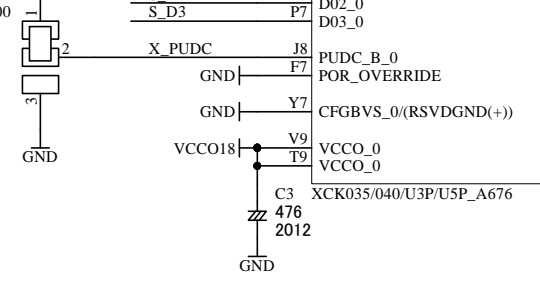
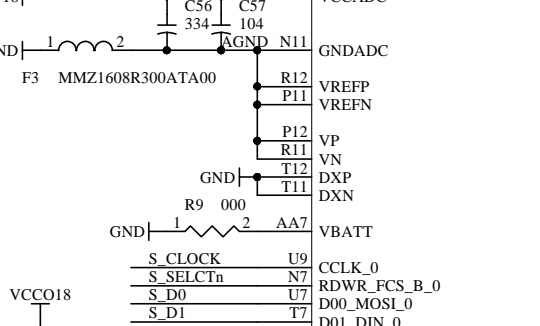
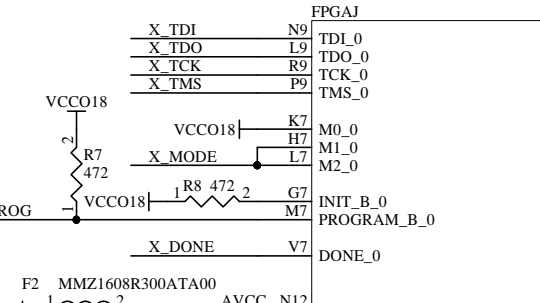
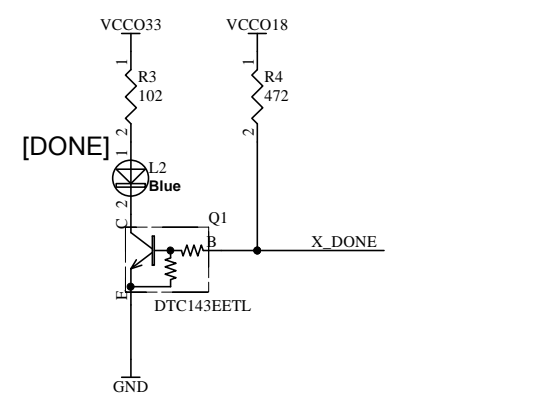
Y12	IO_T3U_N12_64_HR(NC(+))
AD10	IO_T2U_N12_64_HR(NC(+))
Y13	IO_T1U_N12_64_HR(NC(+))
AE13	IO_T0U_N12_64_HR(NC(+))
Y14	VREF_64_HR(NC(+))
Y9	VCCO_64/(VCCO_85(+))
AC10	VCCO_64/(VCCO_85(+))
AF11	VCCO_64/(VCCO_85(+))
W12	VCCO_64/(VCCO_84(+))
AB13	VCCO_64/(VCCO_84(+))
AE14	VCCO_64/(VCCO_84(+))

FPGA1

IOA56	AD24	IO_L24P_T3U_N10_EMCCLK_65_HR(65_HP(+))
IOA57	AD25	IO_L24N_T3U_N11_DOUT_CSO_B_65_HR(65_HP(+))
IOA54	AD23	IO_L23P_T3U_N8_I2C_SCLK_65_HR(65_HP(+))
IOA55	AE23	IO_L23N_T3U_N9_I2C_SDA_65_HR(65_HP(+))
IOA63	AD26	IO_L22P_T3U_N6_DBC_AD0P_D04_65_HR(65_HP(+))
IOA62	AE26	IO_L22N_T3U_N7_DBC_AD0N_D05_65_HR(65_HP(+))
IOA58	AF23	IO_L21P_T3L_N4_AD8P_D06_65_HR(65_HP(+))
IOA59	AF24	IO_L21N_T3L_N5_AD8N_D07_65_HR(65_HP(+))
IOA61	AE25	IO_L20P_T3L_N2_AD1P_D08_65_HR(65_HP(+))
IOA60	AF25	IO_L20N_T3L_N3_AD1N_D09_65_HR(65_HP(+))
IOA52	AE22	IO_L19P_T3L_N0_DBC_AD9P_D10_65_HR(65_HP(+))
IOA53	AF22	IO_L19N_T3L_N1_DBC_AD9N_D11_65_HR(65_HP(+))
IOA46	AD20	IO_L18P_T2U_N10_AD2P_D12_65_HR(65_HP(+))
IOA47	AD21	IO_L18N_T2U_N11_AD2N_D13_65_HR(65_HP(+))
IOA48	AB21	IO_L17P_T2U_N8_AD10P_D14_65_HR(65_HP(+))
IOA49	AC21	IO_L17N_T2U_N9_AD10N_D15_65_HR(65_HP(+))
IOA50	AE20	IO_L16P_T2U_N6_QBC_AD3P_A00_D16_65_HR(65_HP(+))
IOA51	AE21	IO_L16N_T2U_N7_QBC_AD3N_A01_D17_65_HR(65_HP(+))
XAC19	IO_L15P_T2L_N4_AD11P_A02_D18_65_HR(65_HP(+))	
XAD19	IO_L15N_T2L_N5_AD11N_A03_D19_65_HR(65_HP(+))	
XAB19	IO_L14P_T2L_N2_GC_A04_D20_65_HR(65_HP(+))	
XAB20	IO_L14N_T2L_N3_GC_A05_D21_65_HR(65_HP(+))	
XAA19	IO_L13P_T2L_N0_GC_QBC_A06_D22_65_HR(65_HP(+))	
XAA20	IO_L13N_T2L_N1_GC_QBC_A07_D23_65_HR(65_HP(+))	
XW20	IO_L12P_T1U_N10_GC_A08_D24_65_HR(65_HP(+))	
XY20	IO_L12N_T1U_N11_GC_A09_D25_65_HR(65_HP(+))	
XY17	IO_L11P_T1U_N8_GC_A10_D26_65_HR(65_HP(+))	
XY18	IO_L11N_T1U_N9_GC_A11_D27_65_HR(65_HP(+))	
XY19	IO_L10P_T1U_N6_QBC_AD4P_A12_D28_65_HR(65_HP(+))	
XY18	IO_L10N_T1U_N7_QBC_AD4N_A13_D29_65_HR(65_HP(+))	
XW18	IO_L9P_T1L_N4_AD12P_A14_D30_65_HR(65_HP(+))	
XW19	IO_L9N_T1L_N5_AD12N_A15_D31_65_HR(65_HP(+))	
XW21	IO_L8P_T1L_N2_AD5P_A16_65_HR(65_HP(+))	
XY21	IO_L8N_T1L_N3_AD5N_A17_65_HR(65_HP(+))	
XW16	IO_L7P_T1L_N0_QBC_AD13P_A18_65_HR(65_HP(+))	
XY16	IO_L7N_T1L_N1_QBC_AD13N_A19_65_HR(65_HP(+))	
XAF17	IO_L6P_T0U_N10_AD6P_A20_65_HR(65_HP(+))	
XAF18	IO_L6N_T0U_N11_AD6N_A21_65_HR(65_HP(+))	
XAC18	IO_L5P_T0U_N8_AD14P_A22_65_HR(65_HP(+))	
XAD18	IO_L5N_T0U_N9_AD14N_A23_65_HR(65_HP(+))	
XAF19	IO_L4P_T0U_N6_DBC_AD7P_A24_65_HR(65_HP(+))	
XAF20	IO_L4N_T0U_N7_DBC_AD7N_A25_65_HR(65_HP(+))	
XAE17	IO_L3P_T0L_N4_AD15P_A26_65_HR(65_HP(+))	
XAE18	IO_L3N_T0L_N5_AD15N_A27_65_HR(65_HP(+))	
XAB17	IO_L2P_T0L_N2_FOE_B_65_HR(65_HP(+))	
XAC17	IO_L2N_T0L_N3_FWE_FCS2_B_65_HR(65_HP(+))	
XAC16	IO_L1P_T0L_N0_DBC_RS0_65_HR(65_HP(+))	
XAD16	IO_L1N_T0L_N1_DBC_RS1_65_HR(65_HP(+))	
XAC22	IO_T3U_N12_PERSTN0_65_HR(65_HP(+))	
XAA18	IO_T2U_N12_CSL_ADV_B_65_HR(65_HP(+))	
XAA17	IO_T1U_N12_PERSTN1_65_HR(65_HP(+))	
AB16	IO_T0U_N12_A28_65_HR(65_HP(+))	

XAC19	IO_L15P_T2L_N4_AD11P_A02_D18_65_HR(65_HP(+))
XAD19	IO_L15N_T2L_N5_AD11N_A03_D19_65_HR(65_HP(+))
XAB19	IO_L14P_T2L_N2_GC_A04_D20_65_HR(65_HP(+))
XAB20	IO_L14N_T2L_N3_GC_A05_D21_65_HR(65_HP(+))
XAA19	IO_L13P_T2L_N0_GC_QBC_A06_D22_65_HR(65_HP(+))
XAA20	IO_L13N_T2L_N1_GC_QBC_A07_D23_65_HR(65_HP(+))
XW20	IO_L12P_T1U_N10_GC_A08_D24_65_HR(65_HP(+))
XY20	IO_L12N_T1U_N11_GC_A09_D25_65_HR(65_HP(+))
XY17	IO_L11P_T1U_N8_GC_A10_D26_65_HR(65_HP(+))
XY18	IO_L11N_T1U_N9_GC_A11_D27_65_HR(65_HP(+))
XY19	IO_L10P_T1U_N6_QBC_AD4P_A12_D28_65_HR(65_HP(+))
XY18	IO_L10N_T1U_N7_QBC_AD4N_A13_D29_65_HR(65_HP(+))
XW18	IO_L9P_T1L_N4_AD12P_A14_D30_65_HR(65_HP(+))
XW19	IO_L9N_T1L_N5_AD12N_A15_D31_65_HR(65_HP(+))
XW21	IO_L8P_T1L_N2_AD5P_A16_65_HR(65_HP(+))
XY21	IO_L8N_T1L_N3_AD5N_A17_65_HR(65_HP(+))
XW16	IO_L7P_T1L_N0_QBC_AD13P_A18_65_HR(65_HP(+))
XY16	IO_L7N_T1L_N1_QBC_AD13N_A19_65_HR(65_HP(+))
XAF17	IO_L6P_T0U_N10_AD6P_A20_65_HR(65_HP(+))
XAF18	IO_L6N_T0U_N11_AD6N_A21_65_HR(65_HP(+))
XAC18	IO_L5P_T0U_N8_AD14P_A22_65_HR(65_HP(+))
XAD18	IO_L5N_T0U_N9_AD14N_A23_65_HR(65_HP(+))
XAF19	IO_L4P_T0U_N6_DBC_AD7P_A24_65_HR(65_HP(+))
XAF20	IO_L4N_T0U_N7_DBC_AD7N_A25_65_HR(65_HP(+))
XAE17	IO_L3P_T0L_N4_AD15P_A26_65_HR(65_HP(+))
XAE18	IO_L3N_T0L_N5_AD15N_A27_65_HR(65_HP(+))
XAB17	IO_L2P_T0L_N2_FOE_B_65_HR(65_HP(+))
XAC17	IO_L2N_T0L_N3_FWE_FCS2_B_65_HR(65_HP(+))
XAC16	IO_L1P_T0L_N0_DBC_RS0_65_HR(65_HP(+))
XAD16	IO_L1N_T0L_N1_DBC_RS1_65_HR(65_HP(+))

Y19	VCCO_65
AA16	VCCO_65
AC20	VCCO_65
AD17	VCCO_65
AE24	VCCO_65
AF21	VCCO_65



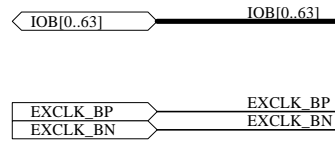
**BANK Group A**

DSN: TITLE: KINTEX UltraScale(+) A676 FPGA Board

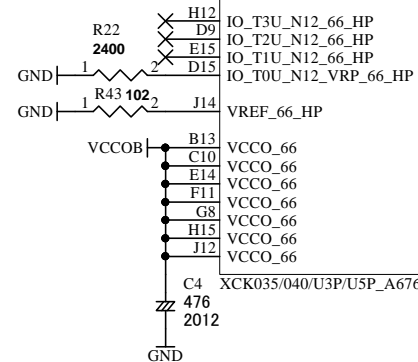
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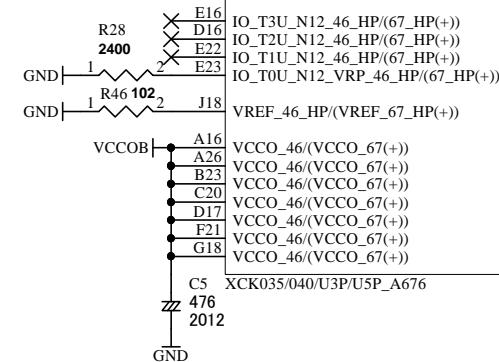




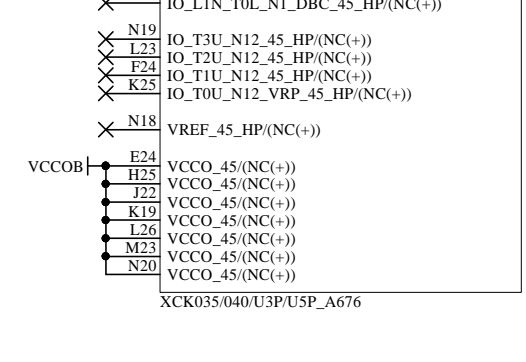
FPGA	
IOB54	G10
IOB55	G9
IOB26	J11
IOB27	H11
IOB52	G11
IOB53	F10
IOB24	J10
IOB25	J9
IOB63	F9
IOB62	F8
IOB11	H9
IOB10	H8
IOB45	B10
IOB44	A10
IOB59	E8
IOB58	D8
IOB47	C11
IOB46	B11
IOB56	C9
IOB57	C8
IOB61	E11
IOB60	D11
EXCLK_BP	E10
EXCLK_BN	D10
IOB16	E13
IOB17	E12
IOB22	G12
IOB23	F12
IOB19	F14
IOB18	F13
IOB31	J13
IOB30	H13
IOB15	G15
IOB14	F15
IOB29	H14
IOB28	G14
IOB48	A13
IOB49	A12
IOB12	C12
IOB13	B12
IOB2	B14
IOB3	A14
IOB42	D13
IOB43	C13
IOB0	B15
IOB1	A15
IOB51	D14
IOB50	C14



FPGA	
IOB6	H17
IOB7	H18
IOB9	E17
IOB8	E18
IOB21	H16
IOB20	G16
IOB39	F18
IOB38	F19
IOB41	G17
IOB40	F17
IOB35	G19
IOB34	F19
IOB37	C17
IOB36	B17
IOB5	C16
IOB4	B16
IOB33	B19
IOB32	A19
IOB33	A17
IOB32	A18
IOB33	D18
IOB32	C18
IOB33	D19
IOB32	C19
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IOB32	E21
IOB33	C21
IOB32	C22
IOB33	B21
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IOB32	A20
IOB33	A22
IOB32	A23
IOB33	C26
IOB32	B26
IOB33	D24
IOB32	C24
IOB33	D23
IOB32	C23
IOB33	B24
IOB32	B25
IOB33	D25
IOB32	D26
IOB33	A24
IOB32	A25



FPGA	
IO_L24P_T3U_N10_46_HP(67_HP(+))	H17
IO_L24N_T3U_N11_46_HP(67_HP(+))	H18
IO_L23P_T3U_N8_46_HP(67_HP(+))	E17
IO_L23N_T3U_N9_46_HP(67_HP(+))	E18
IO_L22P_T3U_N6_DBC_AD0P_46_HP(67_HP(+))	H16
IO_L22N_T3U_N7_DBC_AD0N_46_HP(67_HP(+))	G16
IO_L21P_T3L_N4_AD8P_46_HP(67_HP(+))	F18
IO_L21N_T3L_N5_AD8N_46_HP(67_HP(+))	F19
IO_L20P_T3L_N2_AD1P_46_HP(67_HP(+))	G17
IO_L20N_T3L_N3_AD1N_46_HP(67_HP(+))	F17
IO_L19P_T3L_N0_DBC_AD9P_46_HP(67_HP(+))	G19
IO_L19N_T3L_N1_DBC_AD9N_46_HP(67_HP(+))	F19
IO_L18P_T2U_N10_AD2P_46_HP(67_HP(+))	C17
IO_L18N_T2U_N11_AD2N_46_HP(67_HP(+))	B17
IO_L17P_T2U_N8_AD10P_46_HP(67_HP(+))	C16
IO_L17N_T2U_N9_AD10N_46_HP(67_HP(+))	B16
IO_L16P_T2U_N6_QBC_AD3P_46_HP(67_HP(+))	B19
IO_L16N_T2U_N7_QBC_AD3N_46_HP(67_HP(+))	A19
IO_L15P_T2L_N4_AD11P_46_HP(67_HP(+))	A17
IO_L15N_T2L_N5_AD11N_46_HP(67_HP(+))	A18
IO_L14P_T2L_N2_GC_46_HP(67_HP(+))	D18
IO_L14N_T2L_N3_GC_46_HP(67_HP(+))	C18
IO_L13P_T2L_N0_GC_QBC_46_HP(67_HP(+))	D19
IO_L13N_T2L_N1_GC_QBC_46_HP(67_HP(+))	C19
IO_L12P_T1U_N10_GC_46_HP(67_HP(+))	D20
IO_L12N_T1U_N11_GC_46_HP(67_HP(+))	D21
IO_L11P_T1U_N8_GC_46_HP(67_HP(+))	E20
IO_L11N_T1U_N9_GC_46_HP(67_HP(+))	E21
IO_L10P_T1U_N6_QBC_AD4P_46_HP(67_HP(+))	C21
IO_L10N_T1U_N7_QBC_AD4N_46_HP(67_HP(+))	C22
IO_L9P_T1L_N4_AD12P_46_HP(67_HP(+))	B21
IO_L9N_T1L_N5_AD12N_46_HP(67_HP(+))	B22
IO_L8P_T1L_N2_AD5P_46_HP(67_HP(+))	B20
IO_L8N_T1L_N3_AD5N_46_HP(67_HP(+))	A20
IO_L7P_T1L_N0_QBC_AD13P_46_HP(67_HP(+))	A22
IO_L7N_T1L_N1_QBC_AD13N_46_HP(67_HP(+))	A23
IO_L6P_T0U_N10_AD6P_46_HP(67_HP(+))	C26
IO_L6N_T0U_N11_AD6N_46_HP(67_HP(+))	B26
IO_L5P_T0U_N8_AD14P_46_HP(67_HP(+))	D24
IO_L5N_T0U_N9_AD14N_46_HP(67_HP(+))	C24
IO_L4P_T0U_N6_DBC_AD7P_46_HP(67_HP(+))	D23
IO_L4N_T0U_N7_DBC_AD7N_46_HP(67_HP(+))	C23
IO_L3P_T0L_N4_AD15P_46_HP(67_HP(+))	B24
IO_L3N_T0L_N5_AD15N_46_HP(67_HP(+))	B25
IO_L2P_T0L_N2_46_HP(67_HP(+))	D25
IO_L2N_T0L_N3_46_HP(67_HP(+))	D26
IO_L1P_T0L_N0_DBC_46_HP(67_HP(+))	A24
IO_L1N_T0L_N1_DBC_46_HP(67_HP(+))	A25



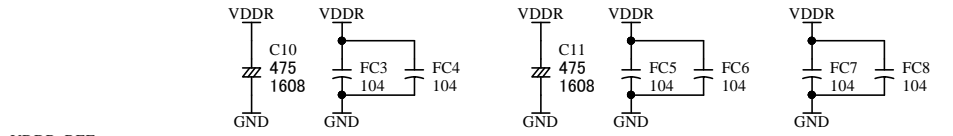
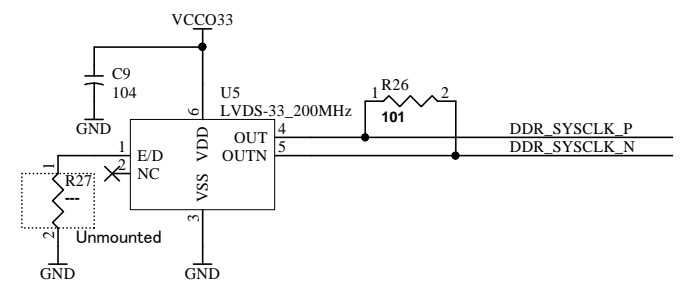
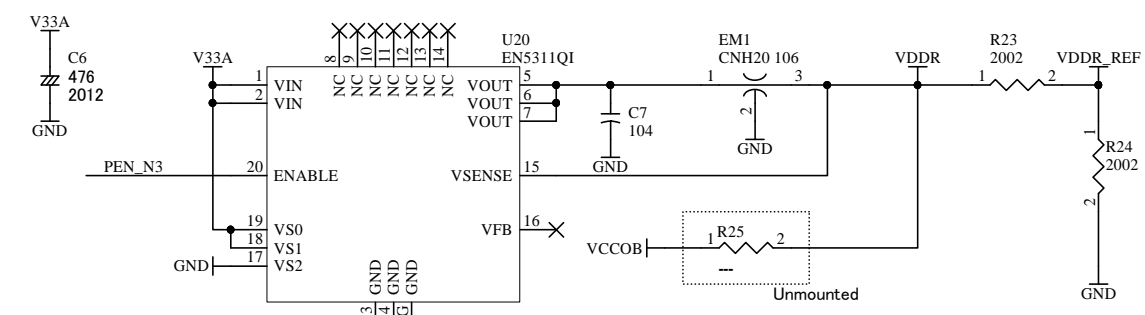
**BANK Group B**

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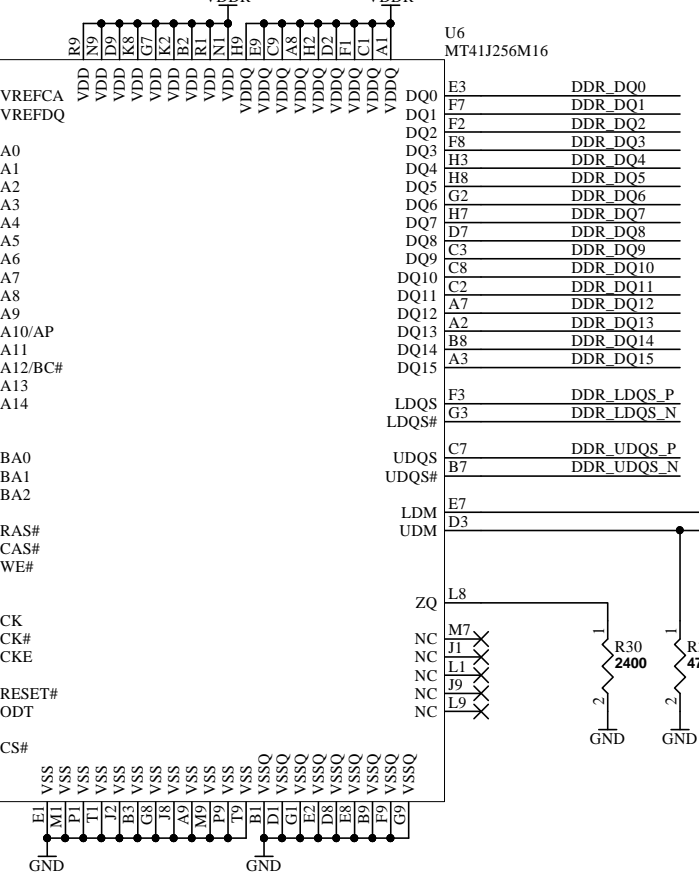
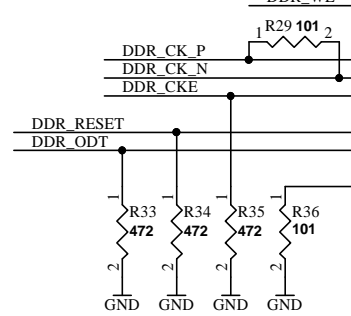


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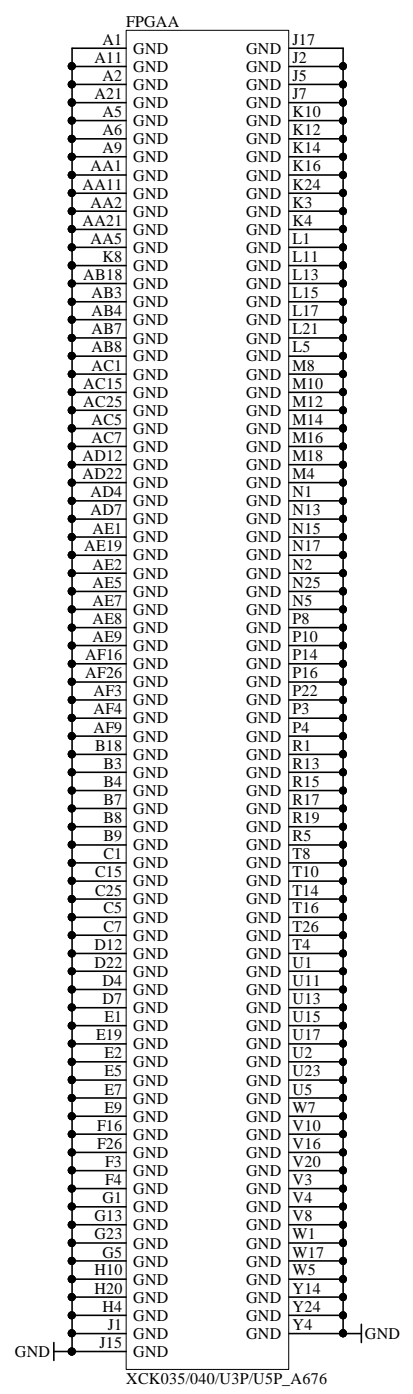
PEN\_N3



DDR_A0	N3	A0
DDR_A1	P7	A1
DDR_A2	P3	A2
DDR_A3	N2	A3
DDR_A4	P8	A4
DDR_A5	P2	A5
DDR_A6	R8	A6
DDR_A7	A6	A7
DDR_A8	T8	A8
DDR_A9	R3	A9
DDR_A10	L7	A10/AP
DDR_A11	R7	A11
DDR_A12	N7	A12/BC#
DDR_A13	T3	A13
DDR_A14	T7	A14
DDR_BA0	M2	BA0
DDR_BA1	N8	BA1
DDR_BA2	M3	BA2
DDR_RAS	J3	RAS#
DDR_CAS	K3	CAS#
DDR_WE	L3	WE#
DDR_CK_P	J7	CK
DDR_CK_N	K7	CK#
DDR_CKE	K9	CKE
DDR_RESET	T2	RESET#
DDR_ODT	K1	ODT
CS#	L2	CS#



DDR_A6	U20	IO_L24P_T3U_N10_44_HP/(64_HP(+))
DDR_RESET	U21	IO_L24N_T3U_N11_44_HP/(64_HP(+))
DDR_A4	P20	IO_L23P_T3U_N8_44_HP/(64_HP(+))
DDR_A14	R20	IO_L23N_T3U_N9_44_HP/(64_HP(+))
DDR_A8	T19	IO_L22P_T3U_N6_DBC_AD0P_44_HP/(64_HP(+))
DDR_A5	T20	IO_L22N_T3U_N7_DBC_AD0N_44_HP/(64_HP(+))
DDR_A9	P18	IO_L21P_T3L_N4_AD8P_44_HP/(64_HP(+))
DDR_A2	P19	IO_L21N_T3L_N5_AD8N_44_HP/(64_HP(+))
DDR_BA2	P21	IO_L20P_T3L_N2_AD1P_44_HP/(64_HP(+))
DDR_BA1	R21	IO_L20N_T3L_N3_AD1N_44_HP/(64_HP(+))
DDR_A7	R18	IO_L19P_T3L_N0_DBC_AD9P_44_HP/(64_HP(+))
DDR_A13	T18	IO_L19N_T3L_N1_DBC_AD9N_44_HP/(64_HP(+))
DDR_A11	P25	IO_L18P_T2U_N10_AD2P_44_HP/(64_HP(+))
DDR_RAS	R25	IO_L18N_T2U_N11_AD2N_44_HP/(64_HP(+))
DDR_A3	P23	IO_L17P_T2U_N8_AD10P_44_HP/(64_HP(+))
DDR_A10	P24	IO_L17N_T2U_N9_AD10N_44_HP/(64_HP(+))
DDR_CK_P	R22	IO_L16P_T2U_N6_QBC_AD3P_44_HP/(64_HP(+))
DDR_CK_N	R23	IO_L16N_T2U_N7_QBC_AD3N_44_HP/(64_HP(+))
DDR_CAS	P26	IO_L15P_T2L_N4_AD11P_44_HP/(64_HP(+))
DDR_ODT	R26	IO_L15N_T2L_N5_AD11N_44_HP/(64_HP(+))
DDR_BA0	T22	IO_L14P_T2L_N2_GC_44_HP/(64_HP(+))
DDR_A0	U22	IO_L14N_T2L_N3_GC_44_HP/(64_HP(+))
DDR_SYSCLK_P	T23	IO_L13P_T2L_N0_GC_QBC_44_HP/(64_HP(+))
DDR_SYSCLK_N	T24	IO_L13N_T2L_N1_GC_QBC_44_HP/(64_HP(+))
DDR_DQ14	V22	IO_L12P_T1U_N10_GC_44_HP/(64_HP(+))
DDR_DQ10	V23	IO_L12N_T1U_N11_GC_44_HP/(64_HP(+))
DDR_DQ8	U24	IO_L11P_T1U_N8_GC_44_HP/(64_HP(+))
DDR_DQ11	V24	IO_L11N_T1U_N9_GC_44_HP/(64_HP(+))
DDR_UDQS_P	U26	IO_L10P_T1U_N6_QBC_AD4P_44_HP/(64_HP(+))
DDR_UDQS_N	V26	IO_L10N_T1U_N7_QBC_AD4N_44_HP/(64_HP(+))
DDR_DQ13	Y25	IO_L9P_T1L_N4_AD12P_44_HP/(64_HP(+))
DDR_DQ15	Y26	IO_L9N_T1L_N5_AD12N_44_HP/(64_HP(+))
DDR_DQ9	W25	IO_L8P_T1L_N2_AD5P_44_HP/(64_HP(+))
DDR_DQ12	W26	IO_L8N_T1L_N3_AD5N_44_HP/(64_HP(+))
DDR_UDM	W23	IO_L7P_T1L_N0_QBC_AD13P_44_HP/(64_HP(+))
DDR_WE	W24	IO_L7N_T1L_N1_QBC_AD13N_44_HP/(64_HP(+))
DDR_DQ2	AC23	IO_L6P_T0U_N10_AD6P_44_HP/(64_HP(+))
DDR_DQ4	AC24	IO_L6N_T0U_N11_AD6N_44_HP/(64_HP(+))
DDR_DQ3	Y23	IO_L5P_T0U_N8_AD14P_44_HP/(64_HP(+))
DDR_DQ1	AA23	IO_L5N_T0U_N9_AD14N_44_HP/(64_HP(+))
DDR_LDQS_P	AA25	IO_L4P_T0U_N6_DBC_AD7P_44_HP/(64_HP(+))
DDR_LDQS_N	AB25	IO_L4N_T0U_N7_DBC_AD7N_44_HP/(64_HP(+))
DDR_DQ5	AA22	IO_L3P_T0L_N4_AD15P_44_HP/(64_HP(+))
DDR_DQ7	AB22	IO_L3N_T0L_N5_AD15N_44_HP/(64_HP(+))
DDR_DQ6	AB26	IO_L2P_T0L_N2_44_HP/(64_HP(+))
DDR_DQ0	AC26	IO_L2N_T0L_N3_44_HP/(64_HP(+))
DDR_LDM	AA24	IO_L1P_T0L_N0_DBC_44_HP/(64_HP(+))
	AB24	IO_L1N_T0L_N1_DBC_44_HP/(64_HP(+))
DDR_CKE	V21	IO_T3U_N12_44_HP/(64_HP(+))
DDR_A1	T25	IO_T2U_N12_44_HP/(64_HP(+))
DDR_A12	U25	IO_T1U_N12_44_HP/(64_HP(+))
GND	Y22	IO_T0U_N12_VRP_44_HP/(64_HP(+))
GND	U19	VREF_44_HP/(VREF_64_HP(+))
VDDR	R24	VCCO_44/(VCCO_64(+))
VDDR	T21	VCCO_44/(VCCO_64(+))
VDDR	U18	VCCO_44/(VCCO_64(+))
VDDR	V25	VCCO_44/(VCCO_64(+))
VDDR	W22	VCCO_44/(VCCO_64(+))
VDDR	AA26	VCCO_44/(VCCO_64(+))
VDDR	H20	VCCO_44/(VCCO_64(+))
VDDR	H4	VCCO_44/(VCCO_64(+))
VDDR	J1	VCCO_44/(VCCO_64(+))
VDDR	J15	VCCO_44/(VCCO_64(+))



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MGT_TXN0	MGT_TXN0
MGT_RXP0	MGT_RXP0
MGT_RXN0	MGT_RXN0
MGT_TXP1	MGT_TXP1
MGT_TXN1	MGT_TXN1
MGT_RXP1	MGT_RXP1
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PEN_N1	PEN_N1
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PEN_N3	PEN_N3

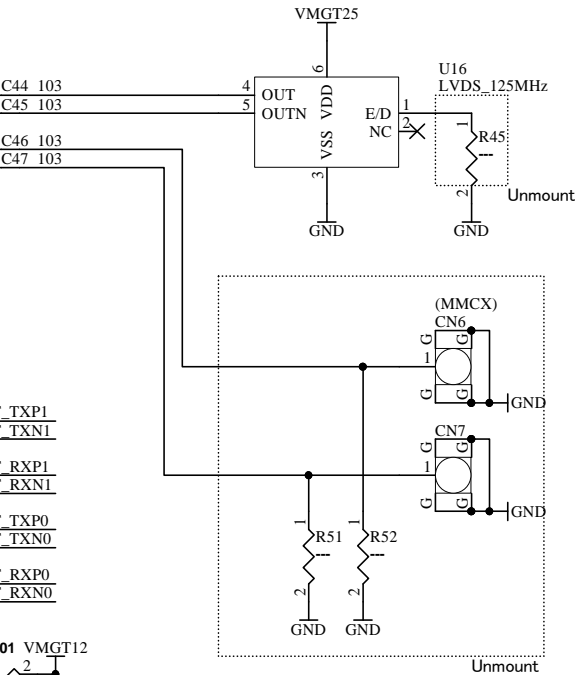
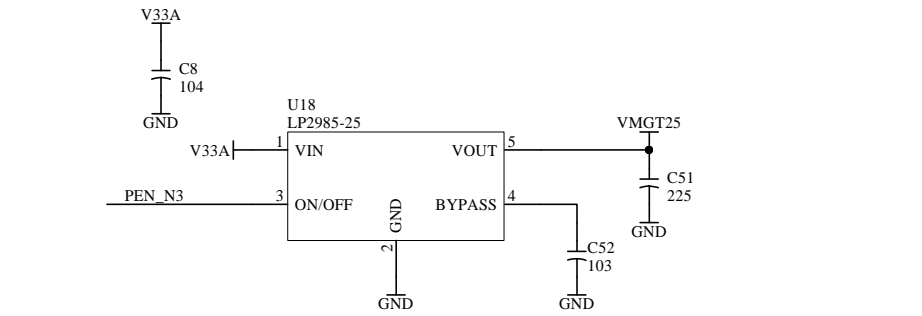
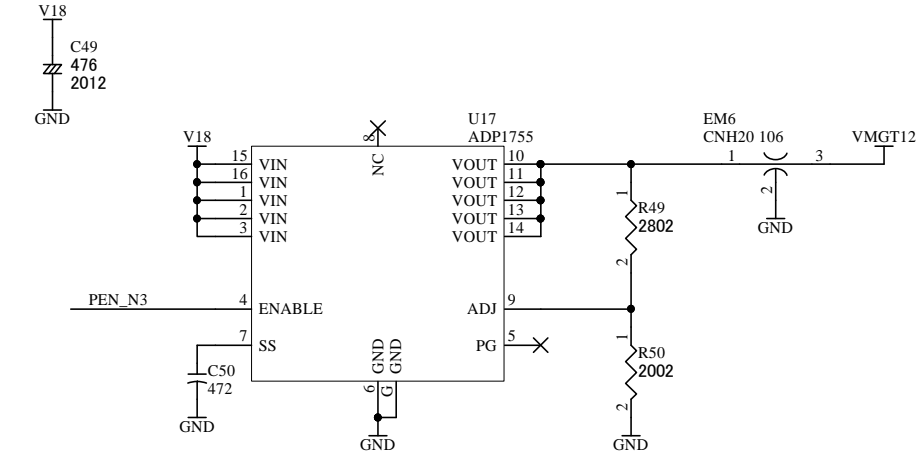
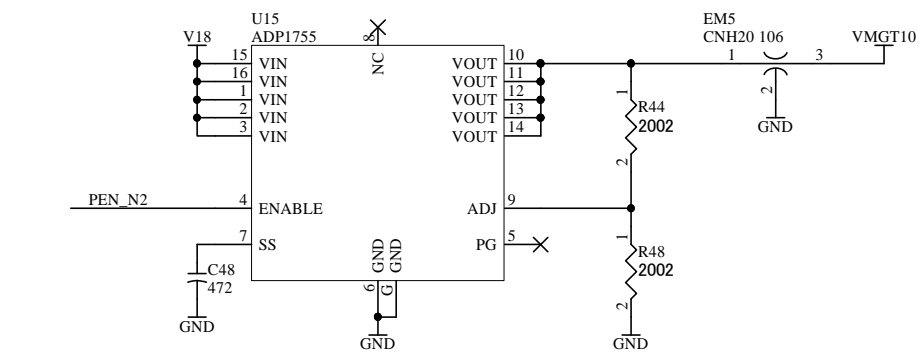
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H5	MGTREFCLK0N_227
F6	MGTREFCLK1P_227
F5	MGTREFCLK1N_227
A8	MGHTXP3_227/(MGTYXP3_227(+))
A7	MGHTXN3_227/(MGTYXN3_227(+))
A4	MGTHRXP3_227/(MGTYRXP3_227(+))
A3	MGTHRXN3_227/(MGTYRXN3_227(+))
B6	MGHTXP2_227/(MGTYXP2_227(+))
B5	MGHTXN2_227/(MGTYXN2_227(+))
B2	MGTHRXP2_227/(MGTYRXP2_227(+))
B1	MGTHRXN2_227/(MGTYRXN2_227(+))
D6	MGHTXP1_227/(MGTYXP1_227(+))
D5	MGHTXN1_227/(MGTYXN1_227(+))
C4	MGTHRXP1_227/(MGTYRXP1_227(+))
C3	MGTHRXN1_227/(MGTYRXN1_227(+))
E4	MGHTXP0_227/(MGTYXP0_227(+))
E3	MGHTXN0_227/(MGTYXN0_227(+))
D2	MGTHRXP0_227/(MGTYRXP0_227(+))
D1	MGTHRXN0_227/(MGTYRXN0_227(+))
T6	MGTREFCLK0P_225
T5	MGTREFCLK0N_225
P6	MGTREFCLK1P_225
P5	MGTREFCLK1N_225
R4	MGHTXP3_225/(MGTYXP3_225(+))
R3	MGHTXN3_225/(MGTYXN3_225(+))
P2	MGTHRXP3_225/(MGTYRXP3_225(+))
P1	MGTHRXN3_225/(MGTYRXN3_225(+))
U4	MGHTXP2_225/(MGTYXP2_225(+))
U3	MGHTXN2_225/(MGTYXN2_225(+))
T2	MGTHRXP2_225/(MGTYRXP2_225(+))
T1	MGTHRXN2_225/(MGTYRXN2_225(+))
W4	MGHTXP1_225/(MGTYXP1_225(+))
W3	MGHTXN1_225/(MGTYXN1_225(+))
V2	MGTHRXP1_225/(MGTYRXP1_225(+))
V1	MGTHRXN1_225/(MGTYRXN1_225(+))
AA4	MGHTXP0_225/(MGTYXP0_225(+))
AA3	MGHTXN0_225/(MGTYXN0_225(+))
Y2	MGTHRXP0_225/(MGTYRXP0_225(+))
Y1	MGTHRXN0_225/(MGTYRXN0_225(+))

M6	MGTREFCLK0P_226
M5	MGTREFCLK0N_226
K6	MGTREFCLK1P_226
K5	MGTREFCLK1N_226
G4	MGHTXP3_226/(MGTYXP3_226(+))
G3	MGHTXN3_226/(MGTYXN3_226(+))
F2	MGTHRXP3_226/(MGTYRXP3_226(+))
F1	MGTHRXN3_226/(MGTYRXN3_226(+))
J4	MGHTXP2_226/(MGTYXP2_226(+))
J3	MGHTXN2_226/(MGTYXN2_226(+))
H2	MGTHRXP2_226/(MGTYRXP2_226(+))
H1	MGTHRXN2_226/(MGTYRXN2_226(+))
L4	MGHTXP1_226/(MGTYXP1_226(+))
L3	MGHTXN1_226/(MGTYXN1_226(+))
K2	MGTHRXP1_226/(MGTYRXP1_226(+))
K1	MGTHRXN1_226/(MGTYRXN1_226(+))
N4	MGHTXP0_226/(MGTYXP0_226(+))
N3	MGHTXN0_226/(MGTYXN0_226(+))
M2	MGTHRXP0_226/(MGTYRXP0_226(+))
M1	MGTHRXN0_226/(MGTYRXN0_226(+))

Y6	MGTREFCLK0P_224
Y5	MGTREFCLK0N_224
V6	MGTREFCLK1P_224
V5	MGTREFCLK1N_224
AB6	MGHTXP3_224/(MGTYXP3_224(+))
AB5	MGHTXN3_224/(MGTYXN3_224(+))
AB2	MGTHRXP3_224/(MGTYRXP3_224(+))
AB1	MGTHRXN3_224/(MGTYRXN3_224(+))
AC4	MGHTXP2_224/(MGTYXP2_224(+))
AC3	MGHTXN2_224/(MGTYXN2_224(+))
AD2	MGTHRXP2_224/(MGTYRXP2_224(+))
AD1	MGTHRXN2_224/(MGTYRXN2_224(+))
AD6	MGHTXP1_224/(MGTYXP1_224(+))
AD5	MGHTXN1_224/(MGTYXN1_224(+))
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AF2	MGTHRXP0_224/(MGTYRXP0_224(+))
AF1	MGTHRXN0_224/(MGTYRXN0_224(+))

AF7	MGTREFCLK0P_224
AF8	MGTREFCLK0N_224
AA6	MGHTXP3_224/(MGTYXP3_224(+))
AC6	MGHTXN3_224/(MGTYXN3_224(+))
AE6	MGTHRXP3_224/(MGTYRXP3_224(+))
C6	MGTHRXN3_224/(MGTYRXN3_224(+))
E6	MGHTXP2_224/(MGTYXP2_224(+))
G6	MGHTXN2_224/(MGTYXN2_224(+))
L6	MGTHRXP2_224/(MGTYRXP2_224(+))
N6	MGTHRXN2_224/(MGTYRXN2_224(+))
R6	MGHTXP1_224/(MGTYXP1_224(+))
U6	MGHTXN1_224/(MGTYXN1_224(+))
AC2	MGTHRXP1_224/(MGTYRXP1_224(+))
AD3	MGTHRXN1_224/(MGTYRXN1_224(+))
C2	MGHTXP0_224/(MGTYXP0_224(+))
D3	MGHTXN0_224/(MGTYXN0_224(+))
G2	MGTHRXP0_224/(MGTYRXP0_224(+))
H3	MGTHRXN0_224/(MGTYRXN0_224(+))
L2	MGHTXP3_224/(MGTYXP3_224(+))
M3	MGHTXN3_224/(MGTYXN3_224(+))
R2	MGTHRXP2_224/(MGTYRXP2_224(+))
T3	MGTHRXN2_224/(MGTYRXN2_224(+))
W2	MGHTXP1_224/(MGTYXP1_224(+))
Y3	MGHTXN1_224/(MGTYXN1_224(+))

J6	MGTVCCAUX_227/(MGTYCCAUX_227(+))
W6	MGTVCCAUX_227/(MGTYCCAUX_227(+))



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