

ALTERA CYCLONE II EP2C70 Development & Education BOARD

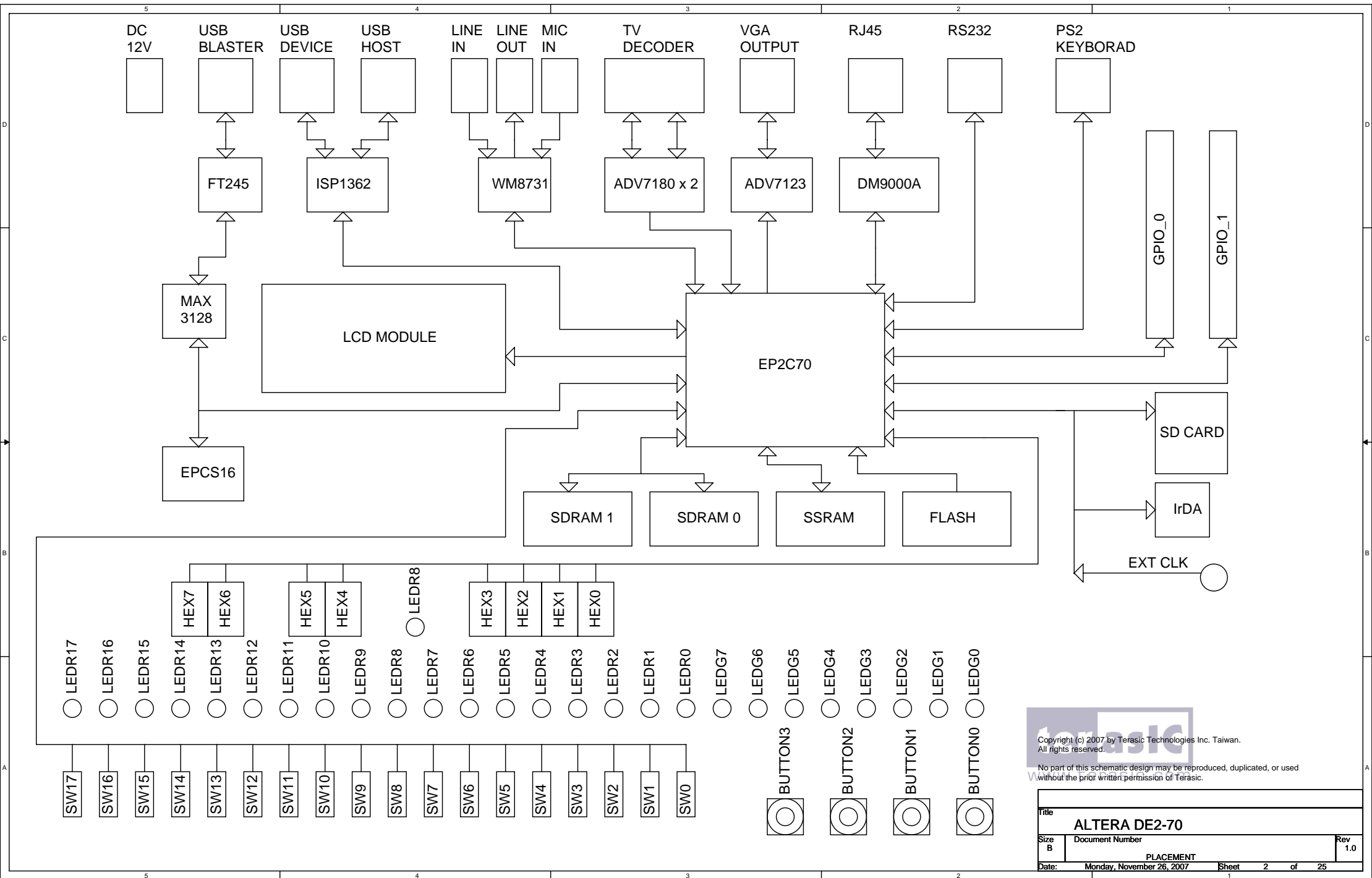
SCHEMATIC	CONTENT	PAGE
TOP	COVER PAGE , TOP	01 ~ 03
MEMORY	SDRAM , SSRAM , FLASH , SD CARD	04 ~ 06
DISPLAY	LCD , LED , 7SEGMENT	07 ~ 08
IN/OUT	CLOCK, IrDA, PS2 , RS232 , BUTTON , SWITCH , CONNECTOR	09 ~ 13
ETHERNET	DM9000A	14 ~ 14
VIDEO	ADV7123, ADV7180	15 ~ 16
AUDIO	WM8731	17 ~ 17
USB DEVICE	ISP1362	18 ~ 18
FPGA	Cyclone II EP2C70 BANK1..BANK8 , POWER , CONFIG	19 ~ 23
POWER	POWER 1.2V, 1.8V, 3.3V, 5V	24 ~ 24
USB BLASTER	USB BLASTER	25 ~ 25



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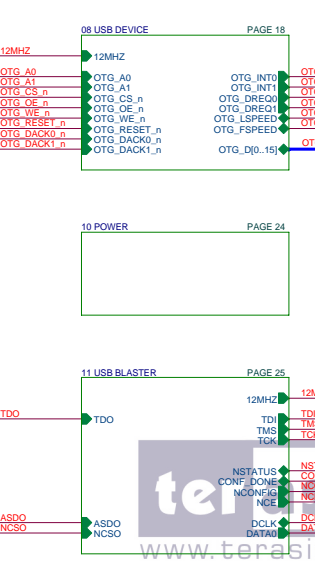
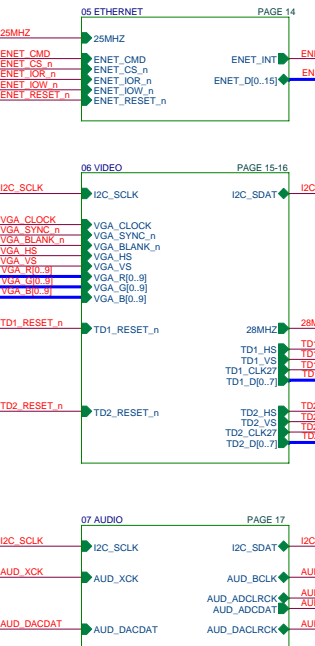
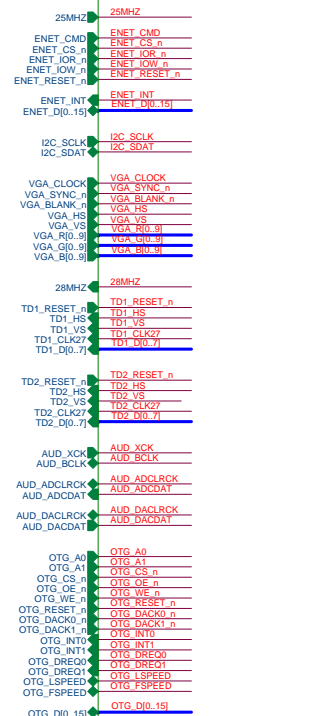
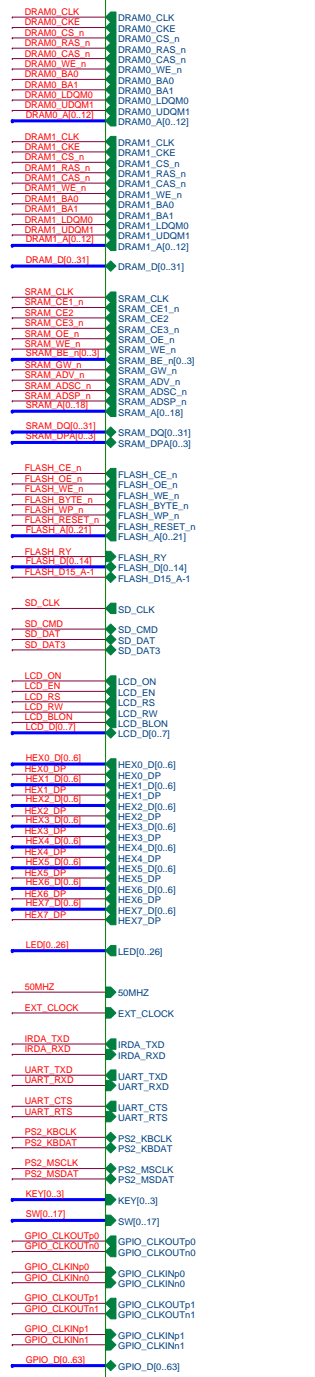
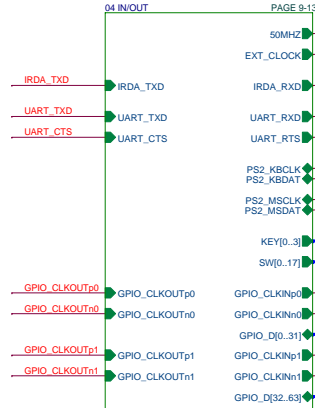
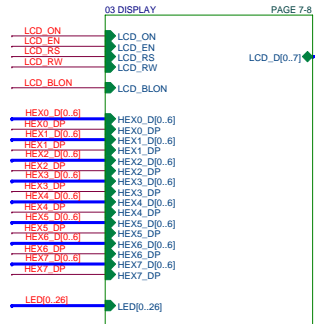
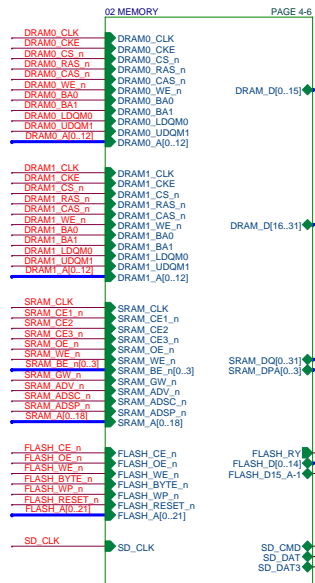
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Title		
ALTERA DE2-70		
Size	Document Number	Rev
B	COVER PAGE	1.0
Date:	Monday, November 26, 2007	Sheet 1 of 25

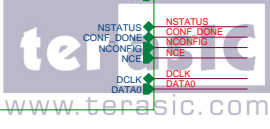



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Size	Document Number				Rev
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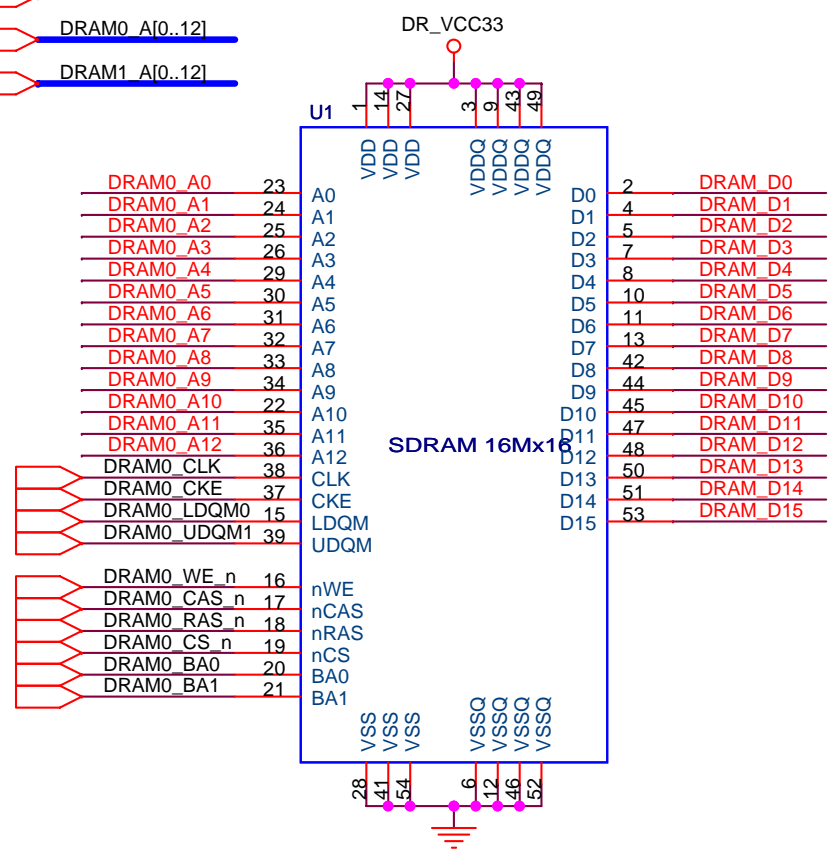


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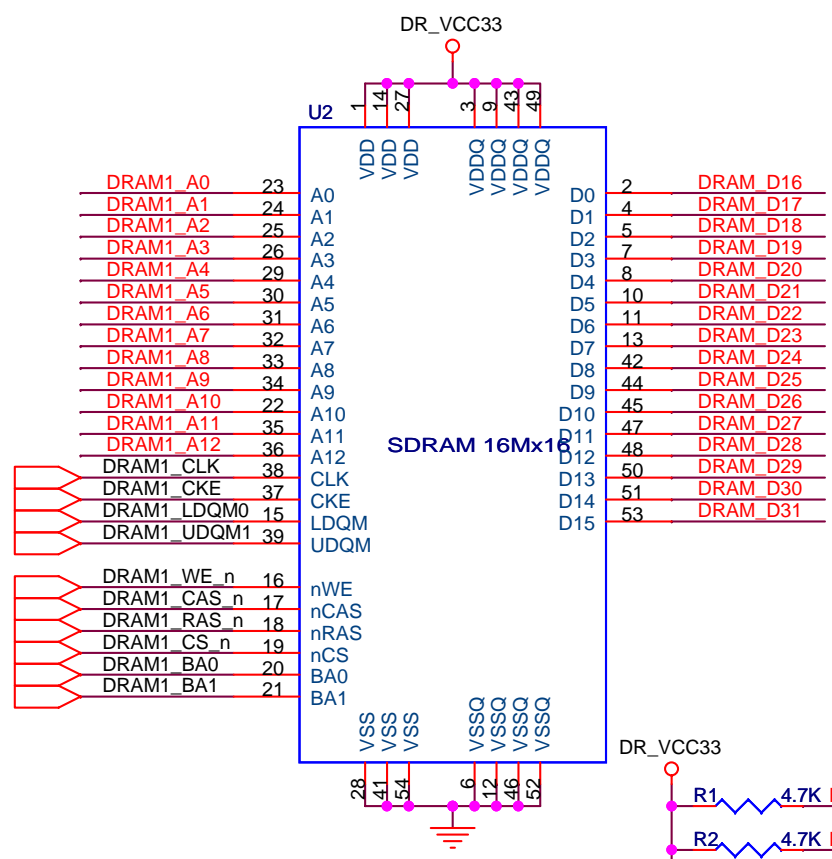


File	ALTERA DE2-70		
Size	Document Number	Rev	
C	TOP LEVEL	1.0	
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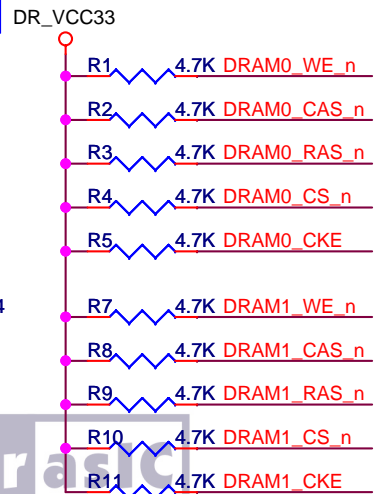
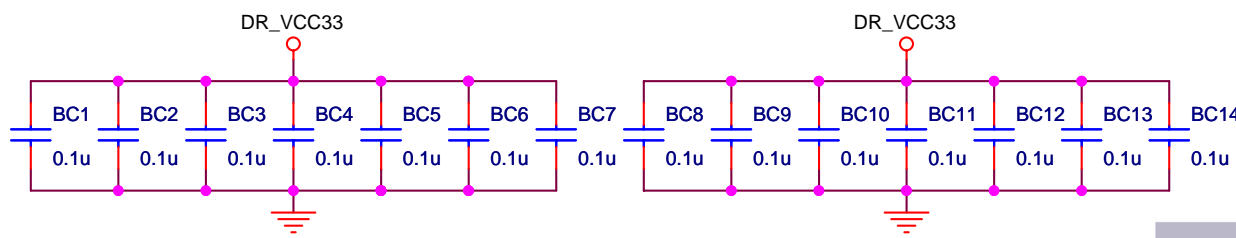
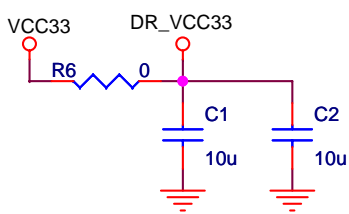
 DRAM D[0..31]
 DRAM0 A[0..12]
 DRAM1 A[0..12]



SDRAM0



SDRAM1

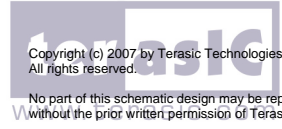
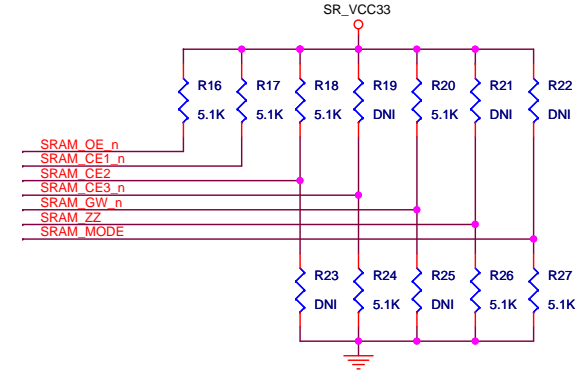
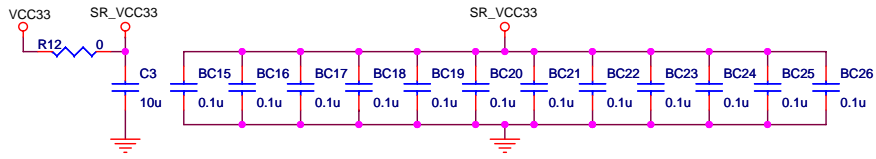
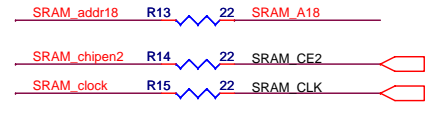
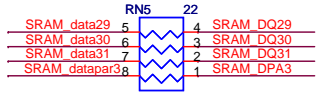
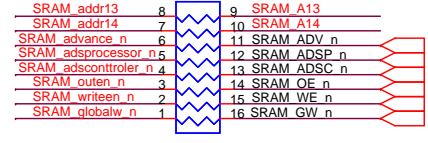
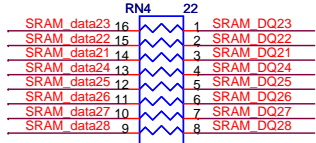
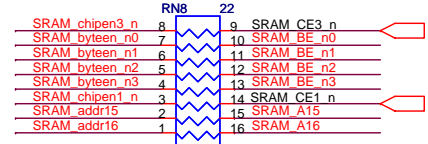
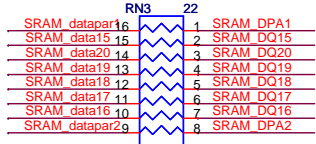
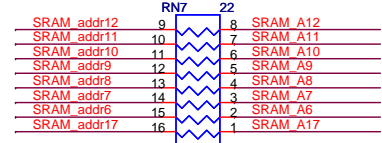
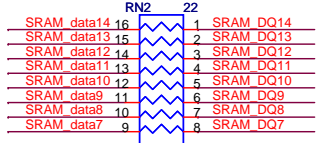
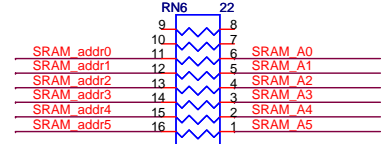
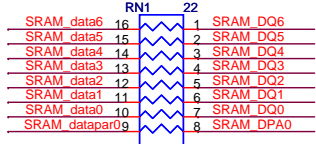
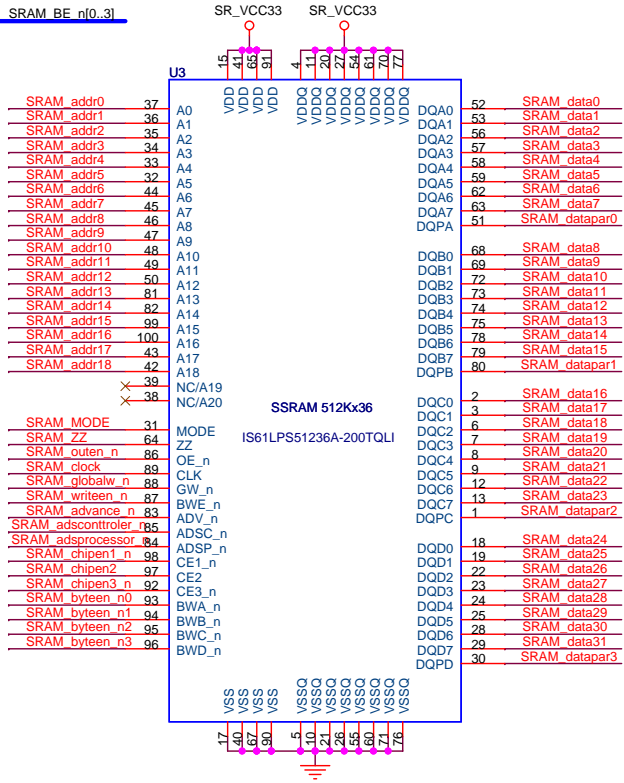


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Title		
ALTEA DE2-70		
Size A	Document Number SDRAM	Rev 1.0
Date:	Monday, November 26, 2007	Sheet 4 of 25

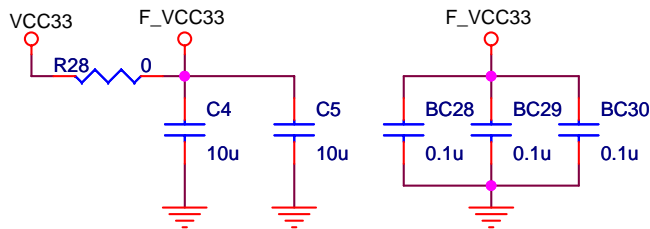
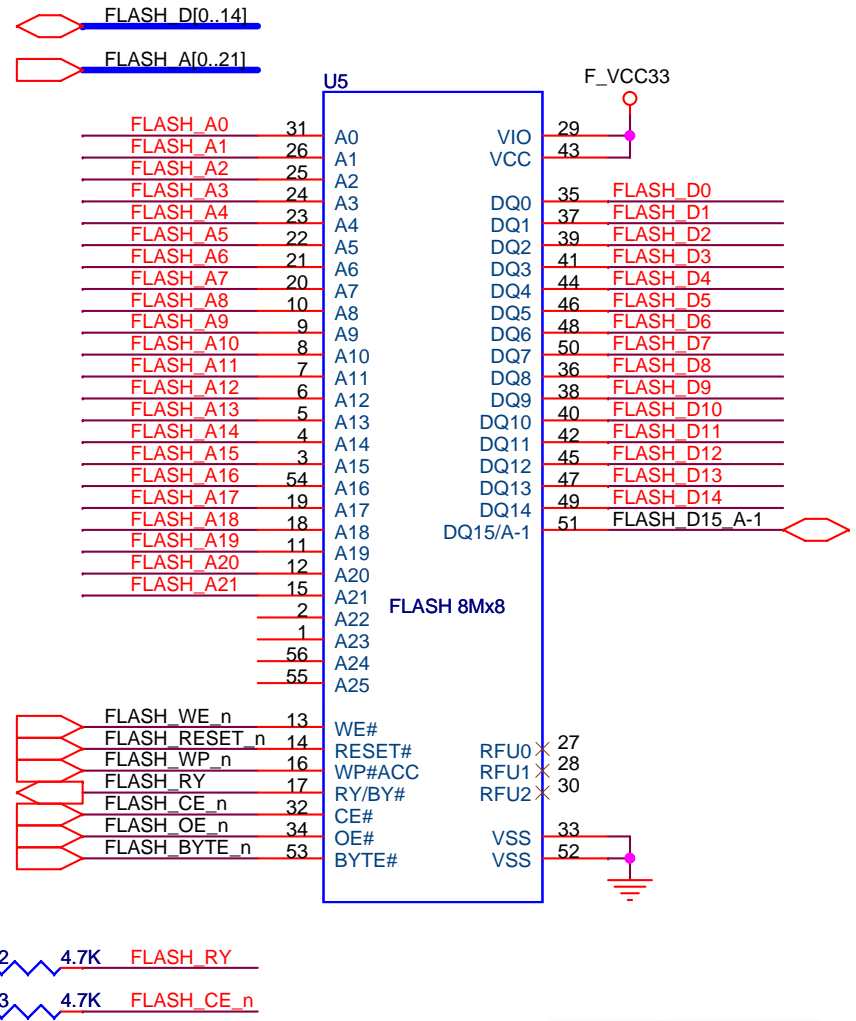
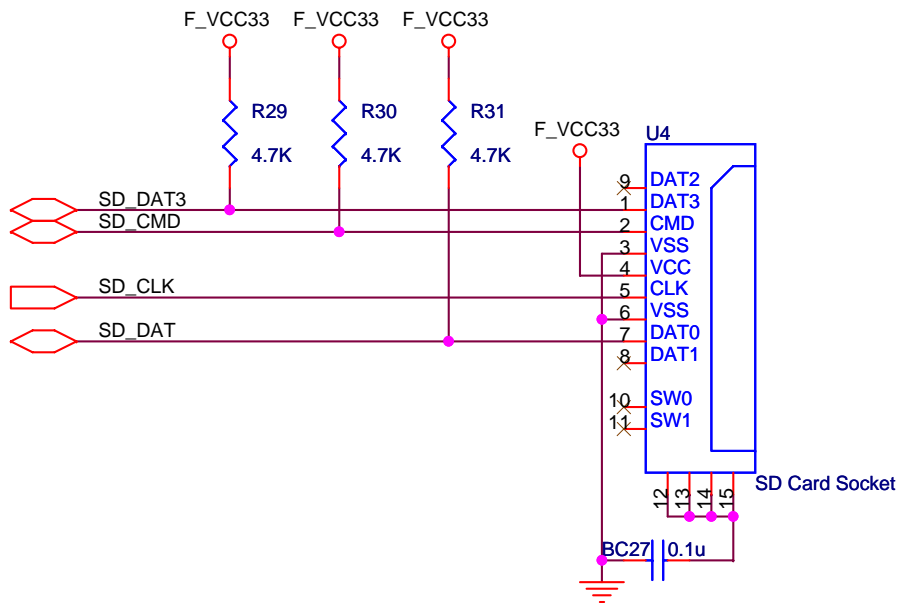
- SRAM DQ[0..31]
- SRAM DPA[0..3]
- SRAM A[0..18]
- SRAM BE_n[0..3]



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Title		
ALTERA DE2-70		
Size	Document Number	Rev
B	SSRAM	1.0
Date:	Monday, November 26, 2007	Sheet 5 of 25

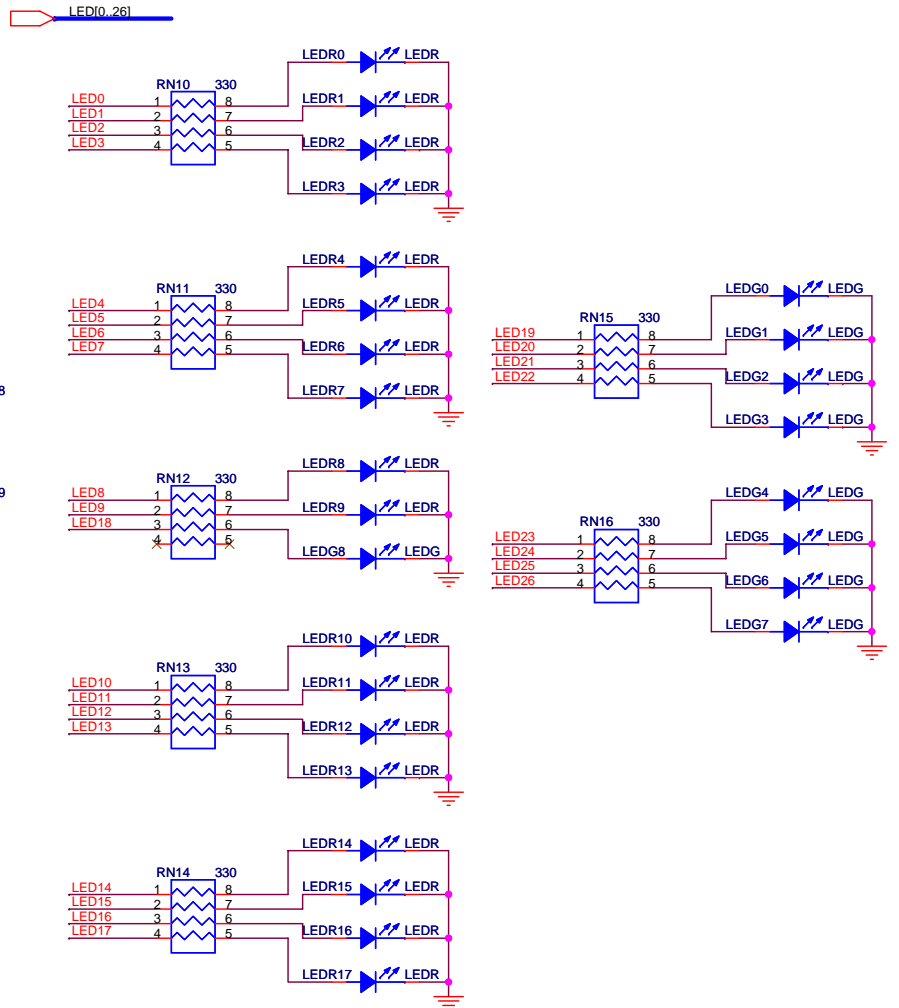
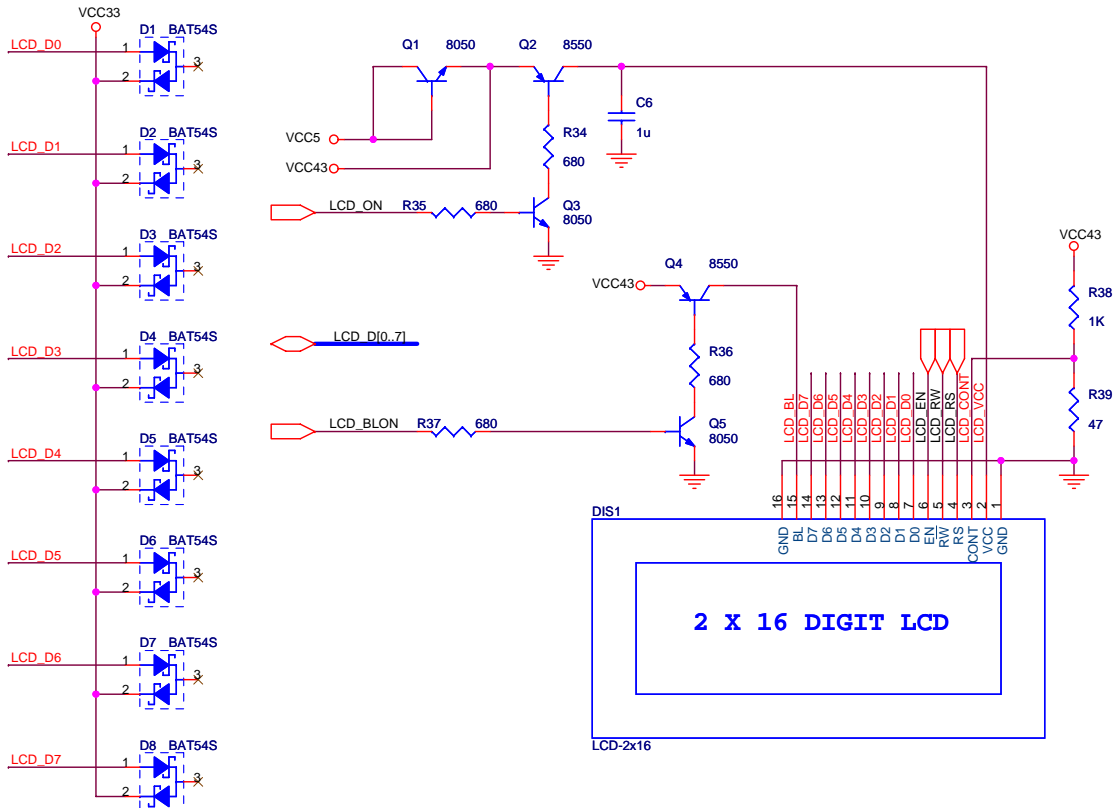


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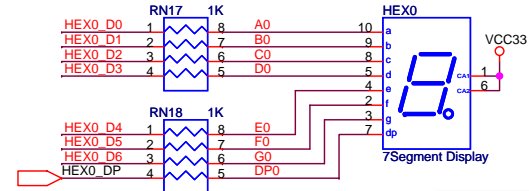
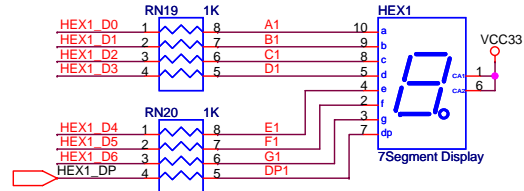
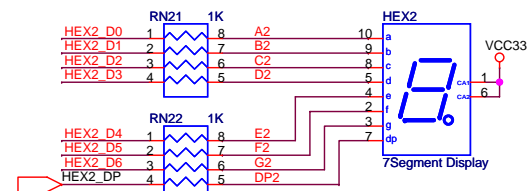
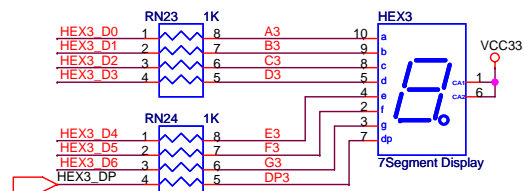
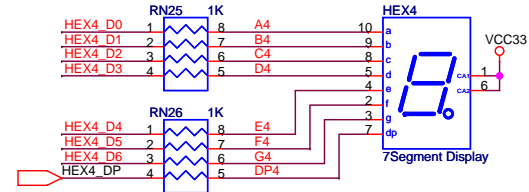
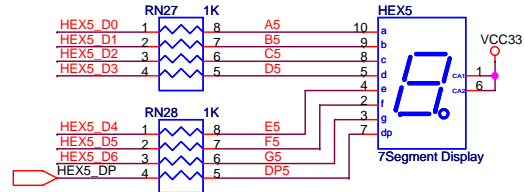
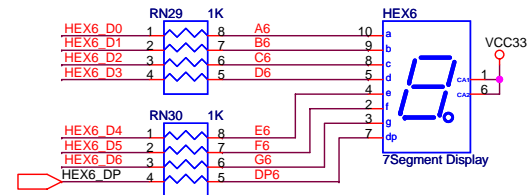
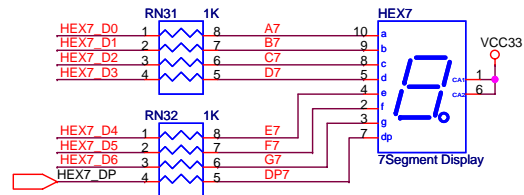


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Title		
ALTERA DE2-70		
Size A	Document Number FLASH and SD Card	Rev 1.0
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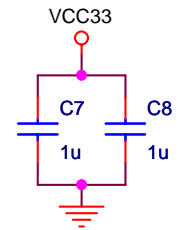
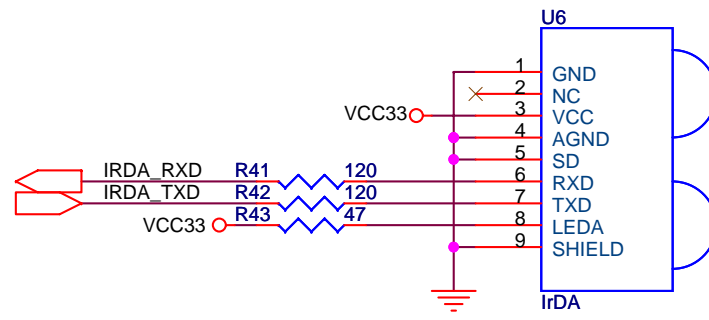
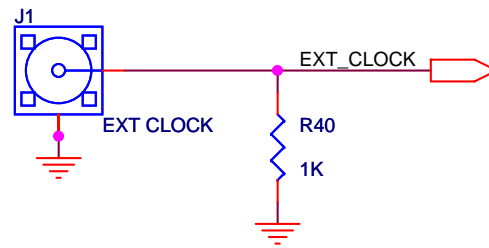
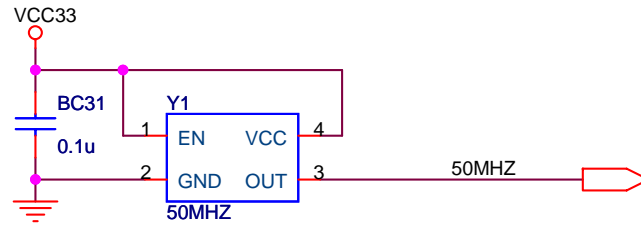


- ▶ HEX0_D[0..6]
- ▶ HEX1_D[0..6]
- ▶ HEX2_D[0..6]
- ▶ HEX3_D[0..6]
- ▶ HEX4_D[0..6]
- ▶ HEX5_D[0..6]
- ▶ HEX6_D[0..6]
- ▶ HEX7_D[0..6]



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ALTERA DE2-70		
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B	7 SEGMENT	1.0
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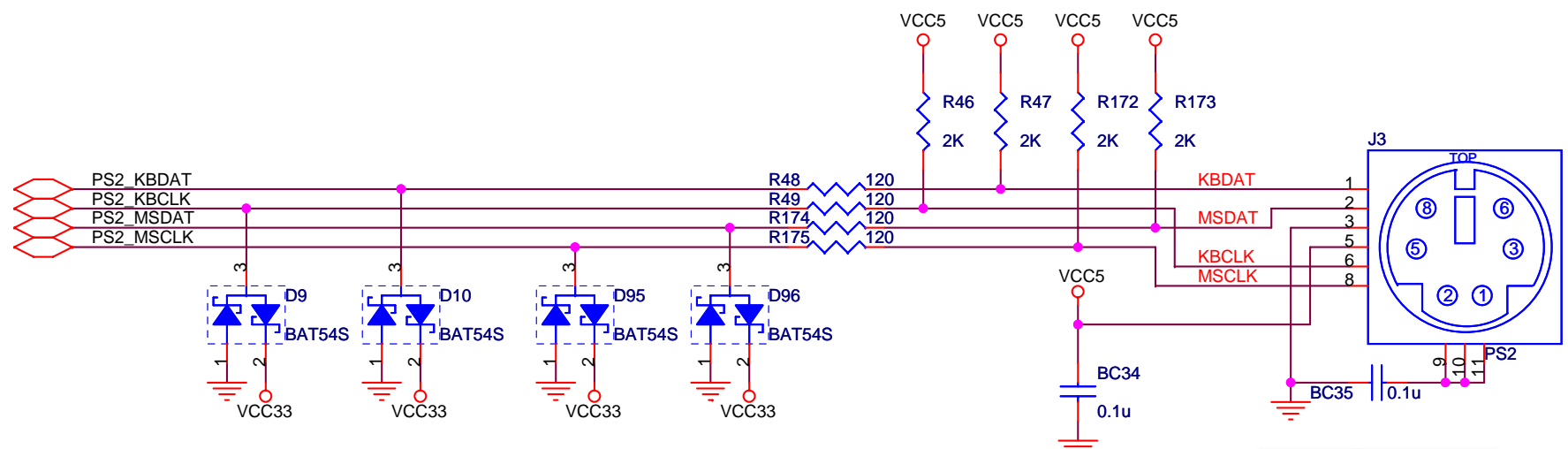
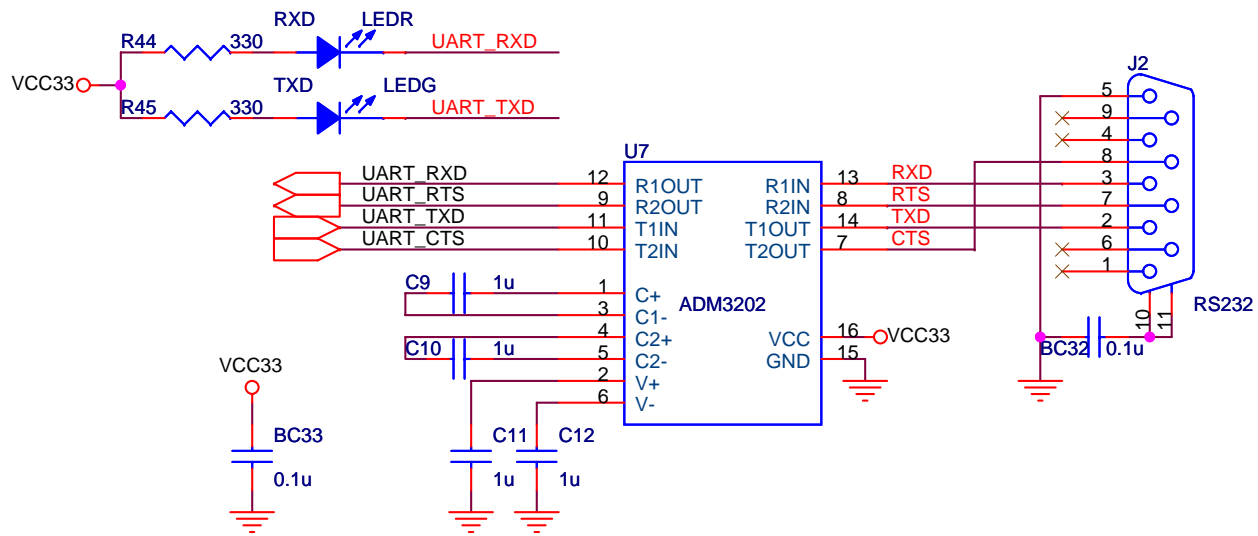


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ALTERA DE2-70		
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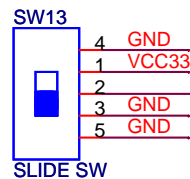
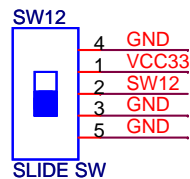
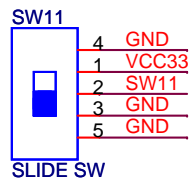
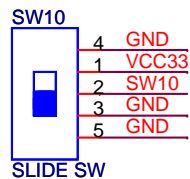
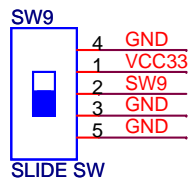
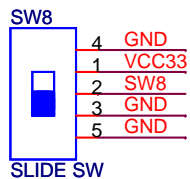
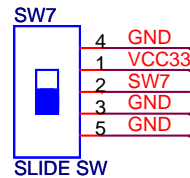
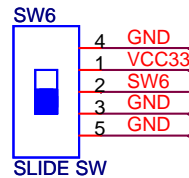
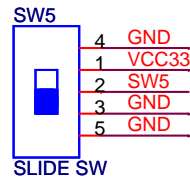
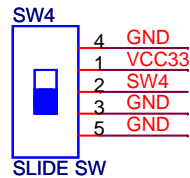
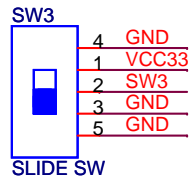
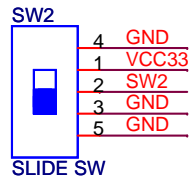
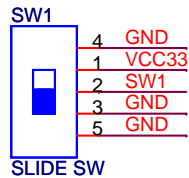
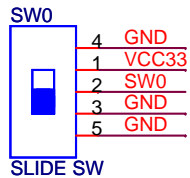
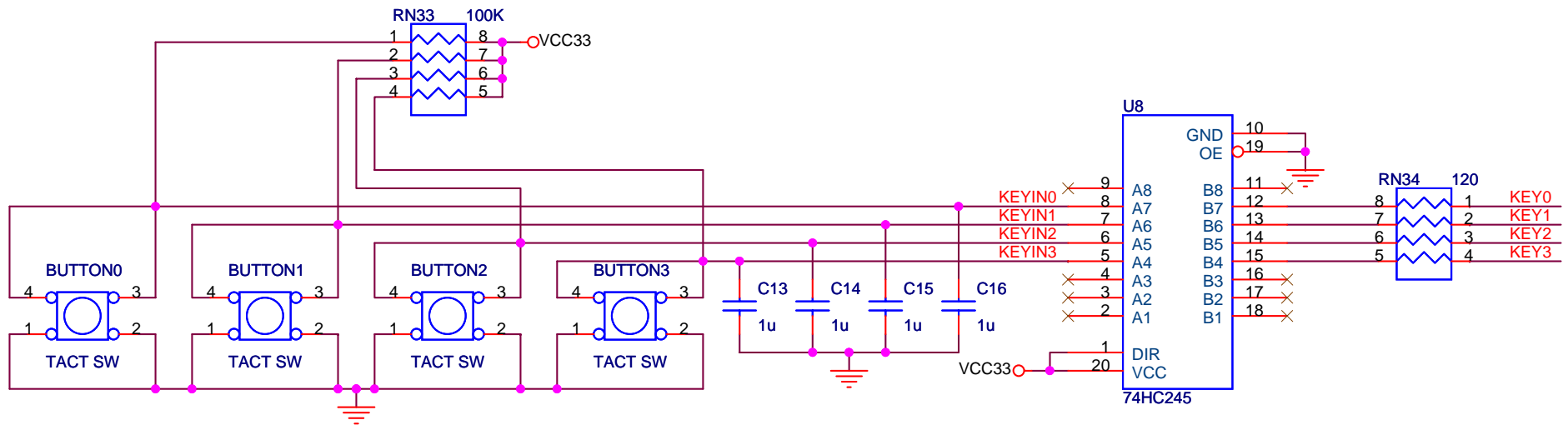


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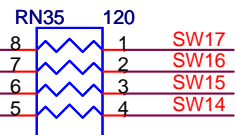
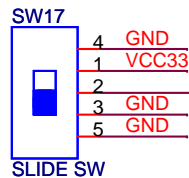
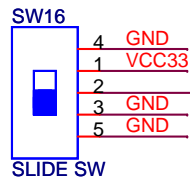
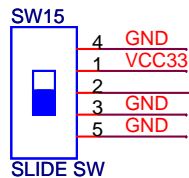
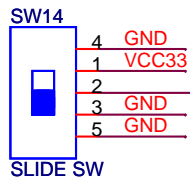


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Title		
ALTERA DE2-70		
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A	PS2 AND RS232	1.0
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R50 120 SW13



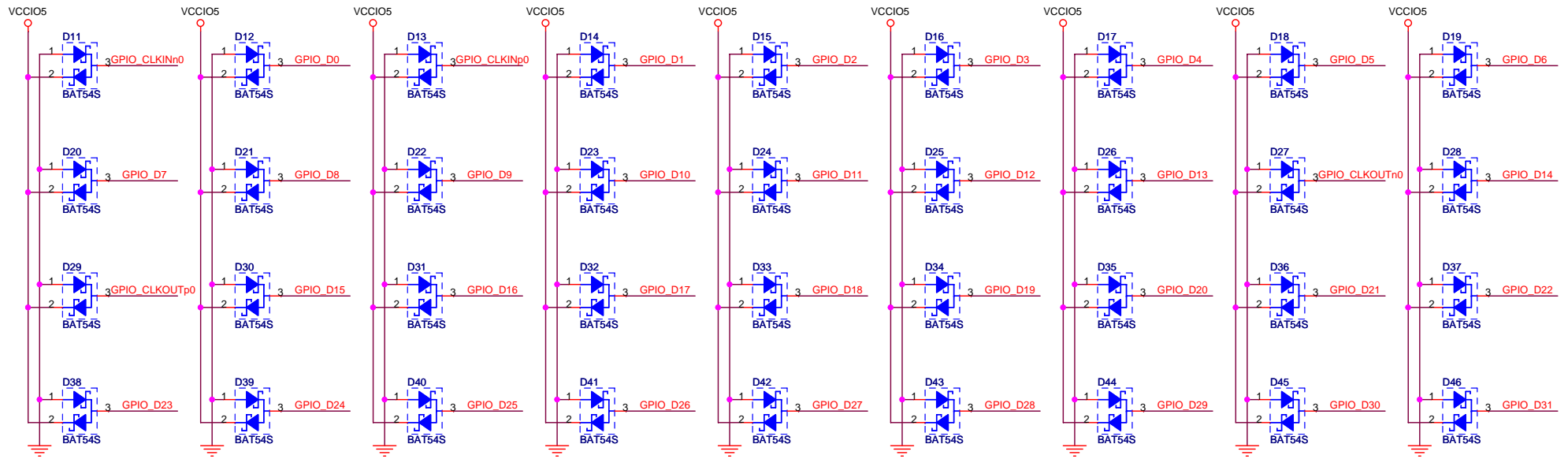
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SW[0..17]



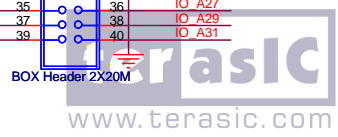
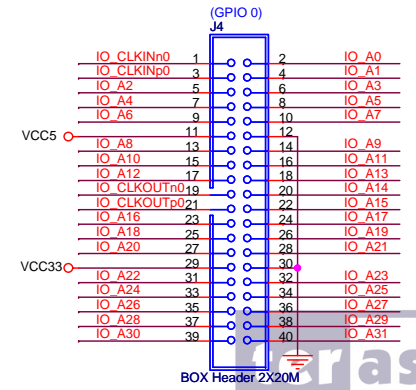
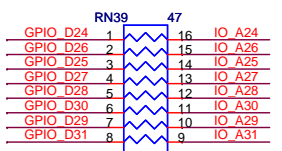
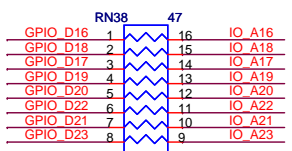
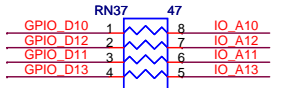
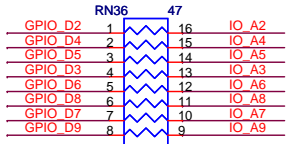
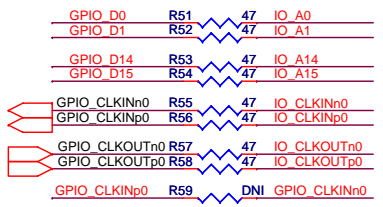
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Title		
ALTEA DE2-70		
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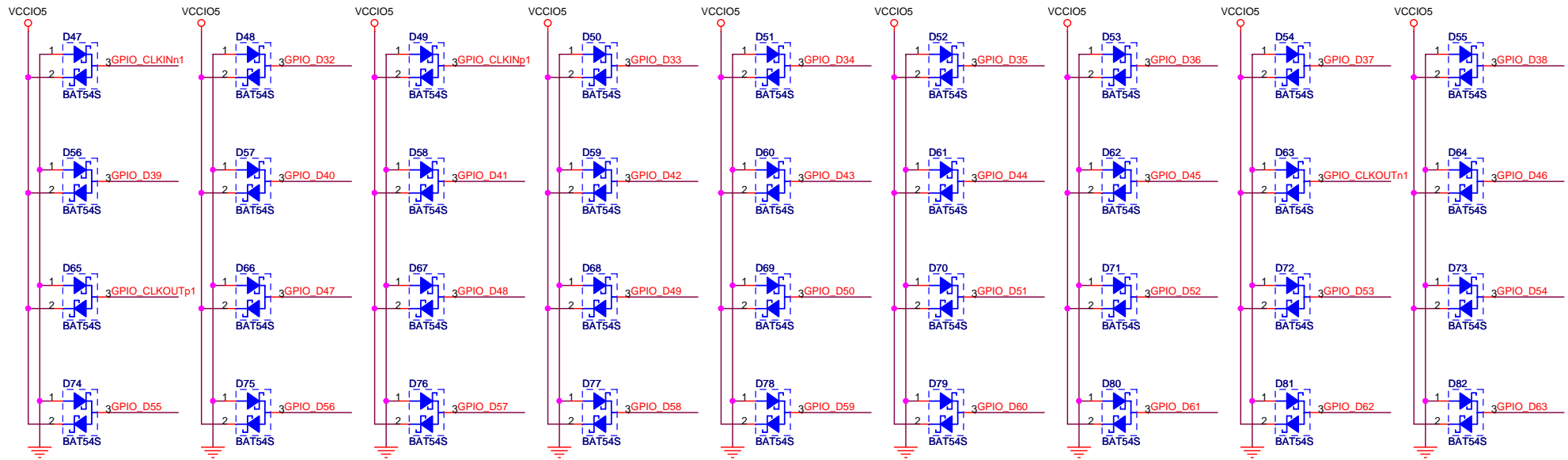
GPIO_D10..31



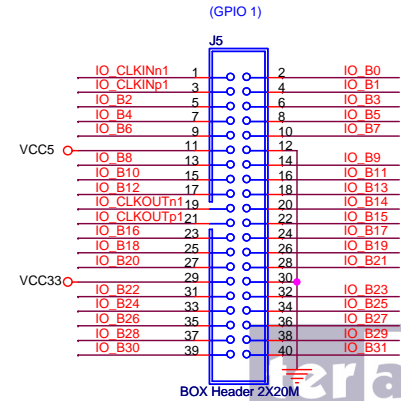
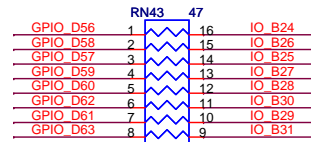
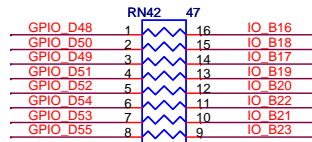
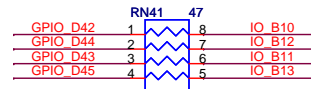
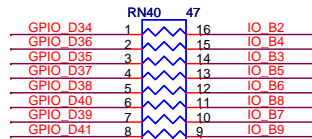
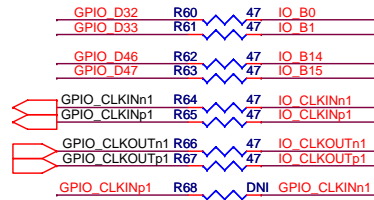
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B	CONNECT A	1.0			
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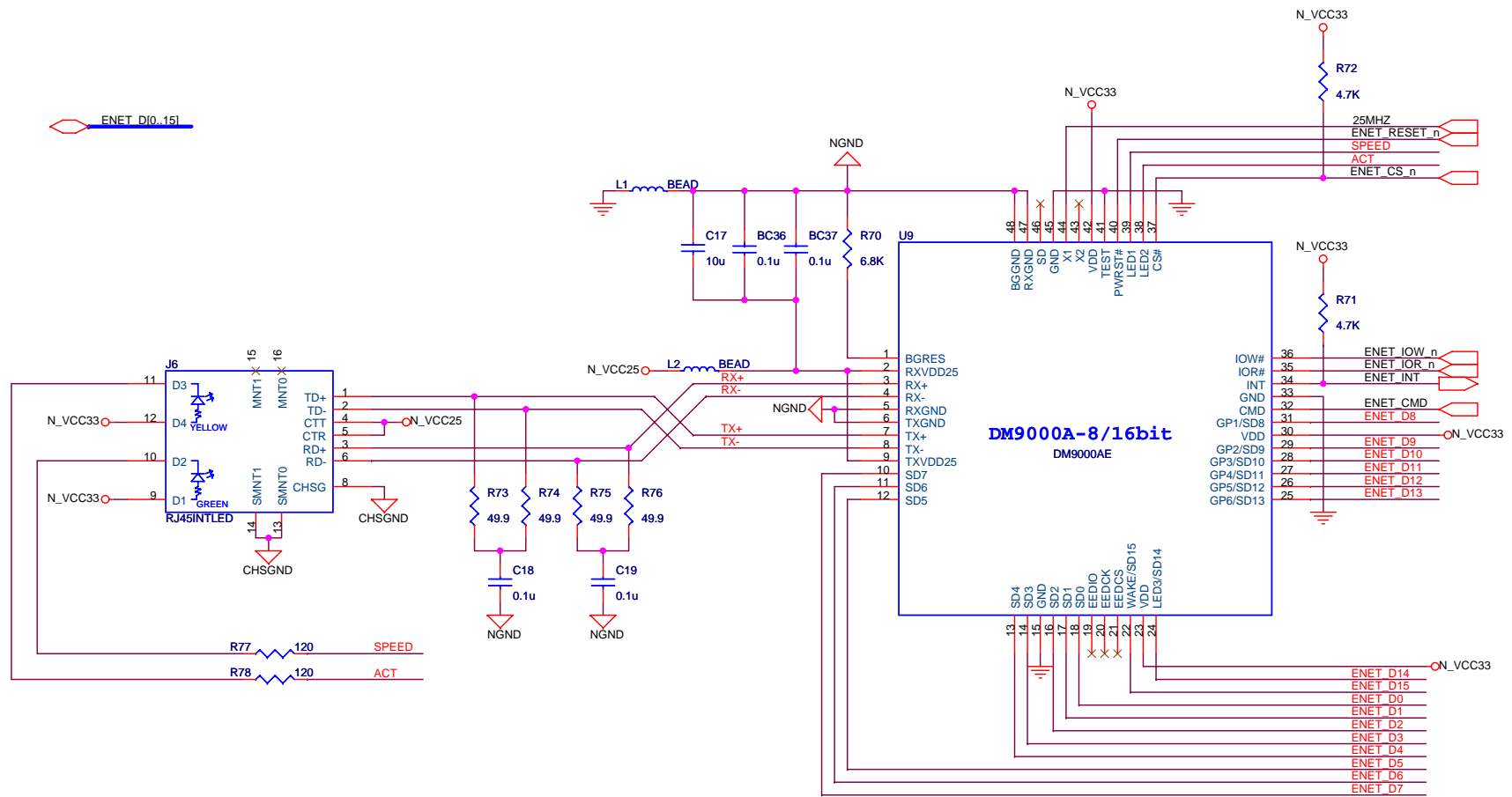
GPIO D[32..63]



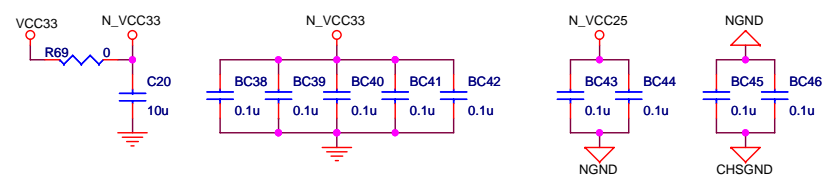
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Title			ALTERA DE2-70		
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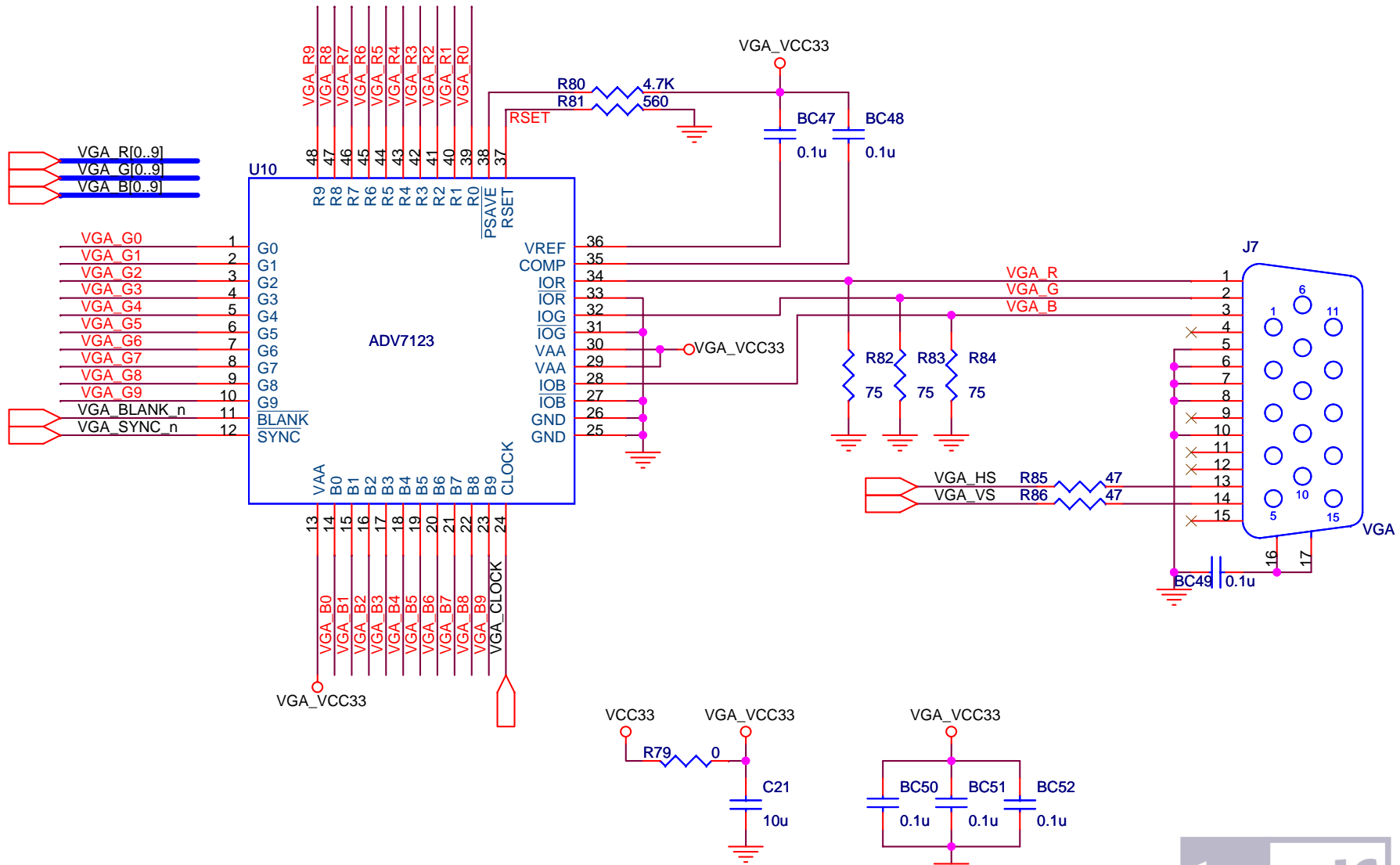
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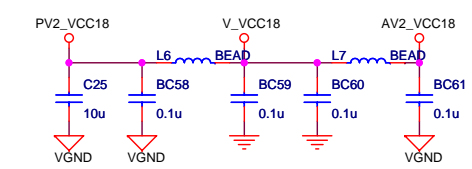
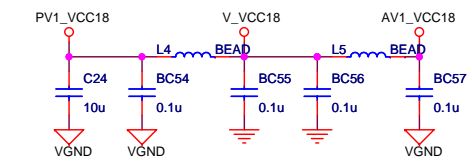
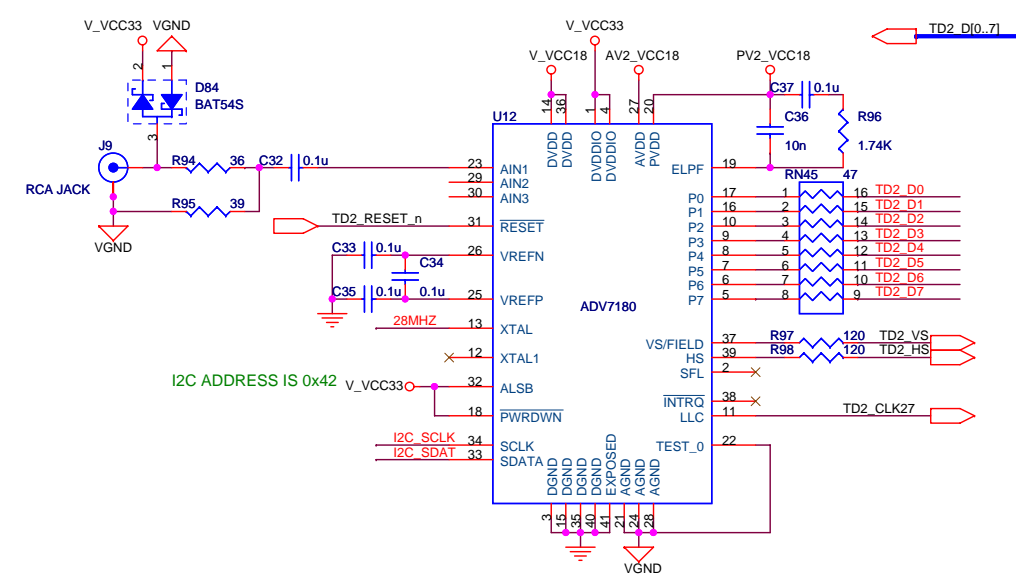
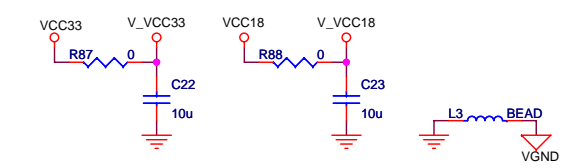
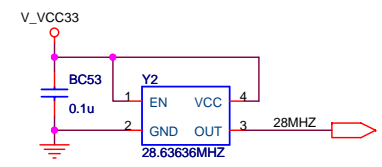
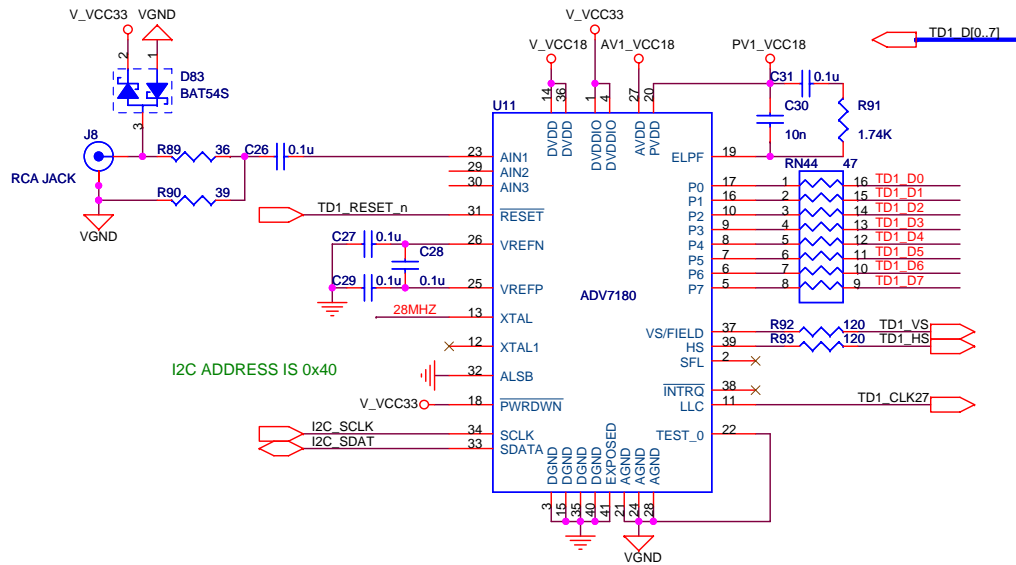
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B	DM9000AE	1.0
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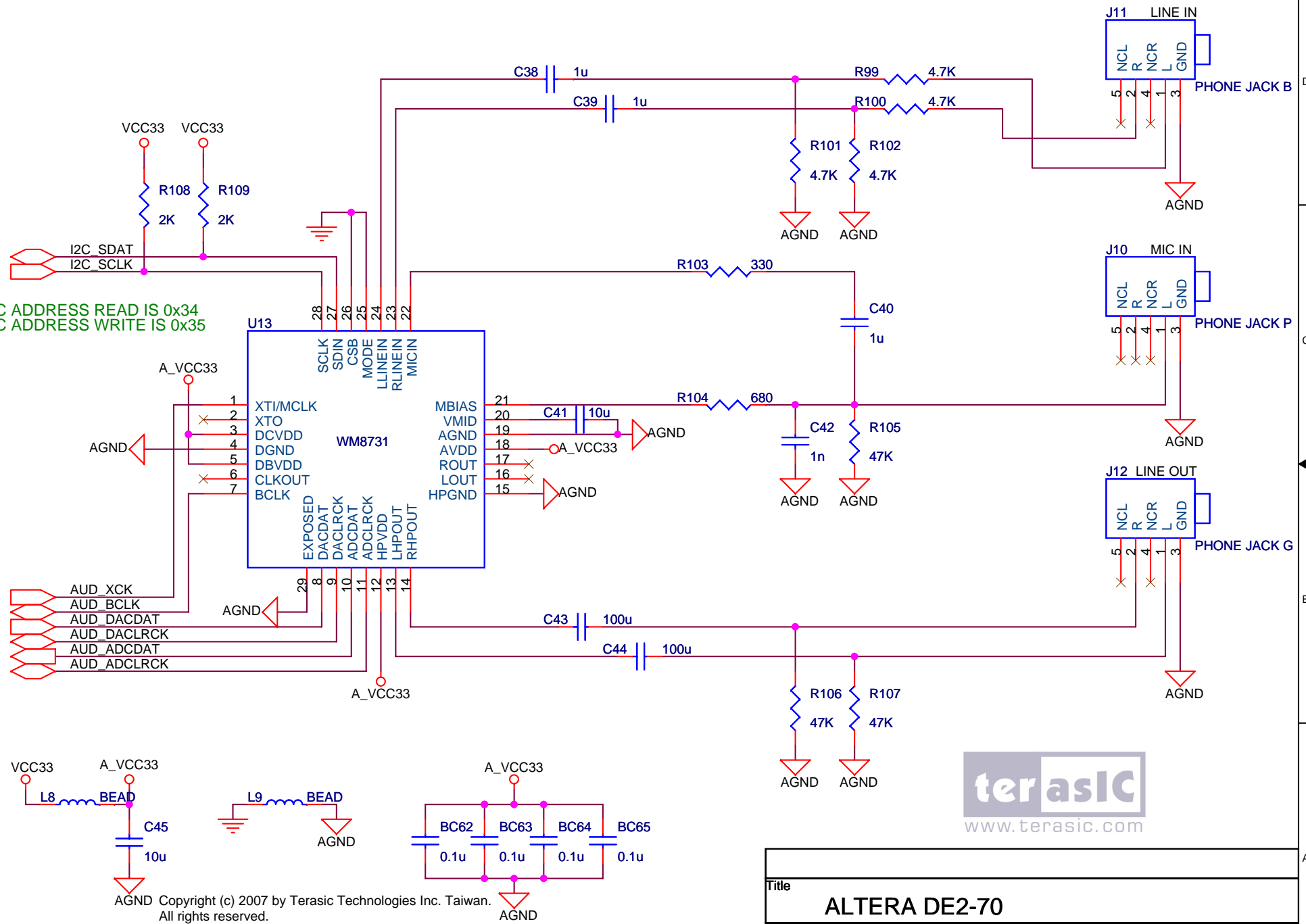
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ALTEA DE2-70		
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A	ADV7123	1.0
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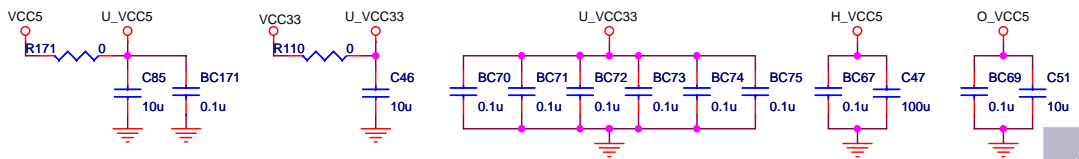
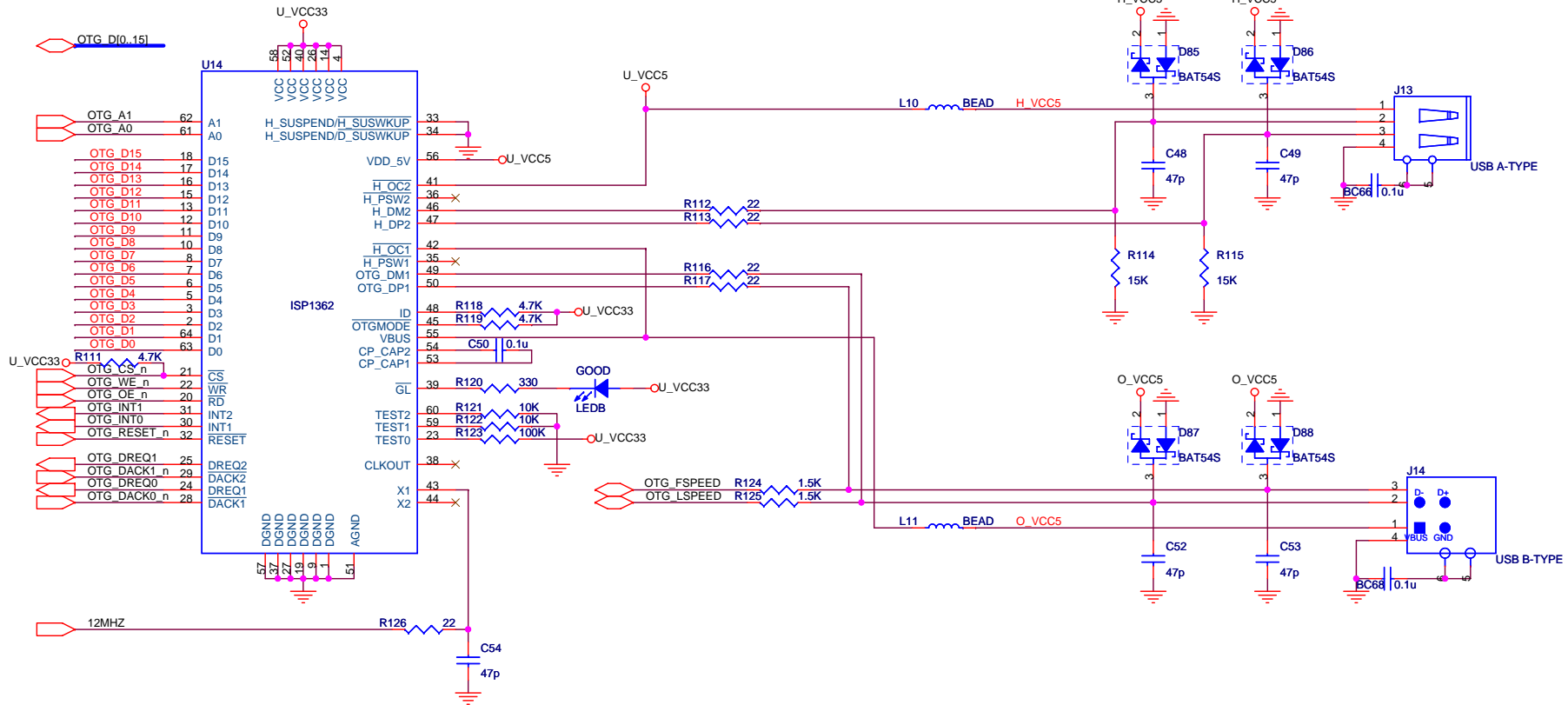
I2C ADDRESS READ IS 0x34
I2C ADDRESS WRITE IS 0x35



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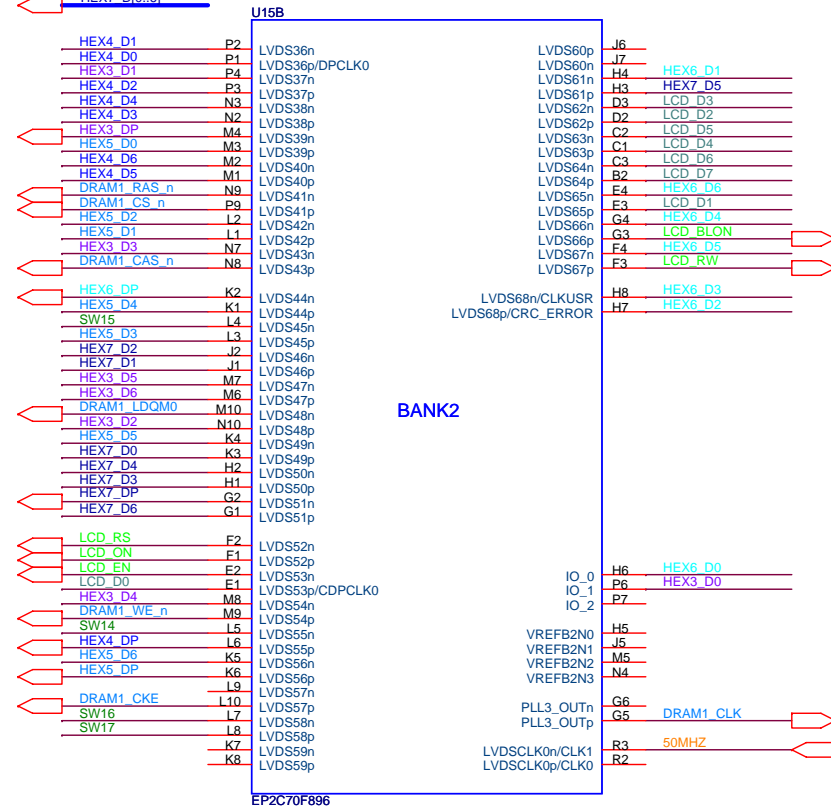
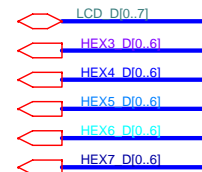
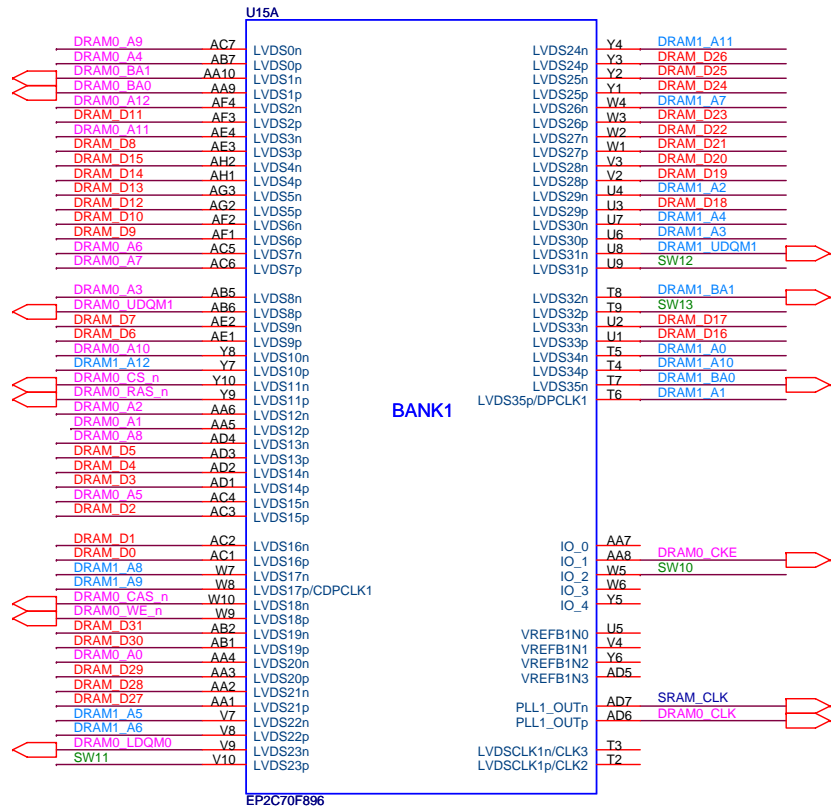
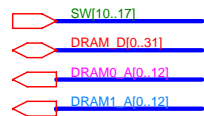
Title		
ALTERA DE2-70		
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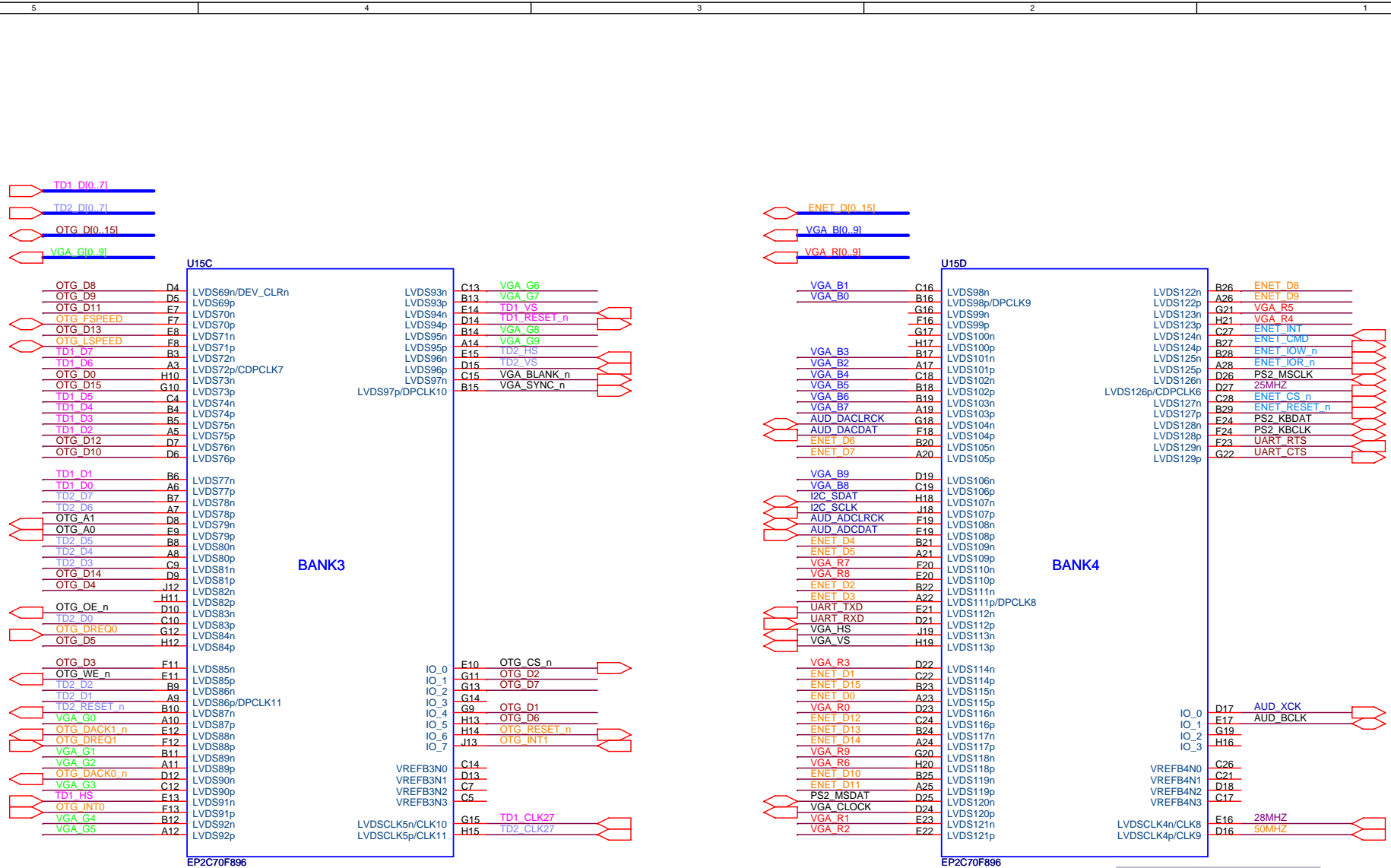
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Title		
ALTEA DE2-70		
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B	ISP 1362	1.0
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terasic
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B	EP2C70 BANK1 AND BANK 2	1.0
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B	EP2C70 BANK3 AND BANK 4	1.0			
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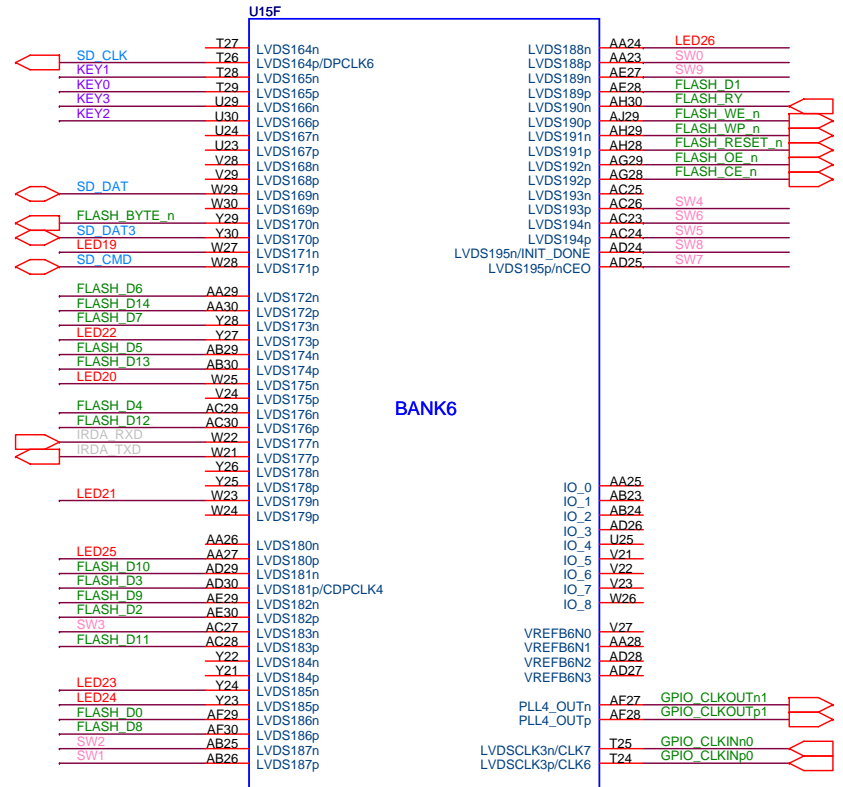
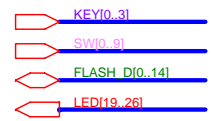
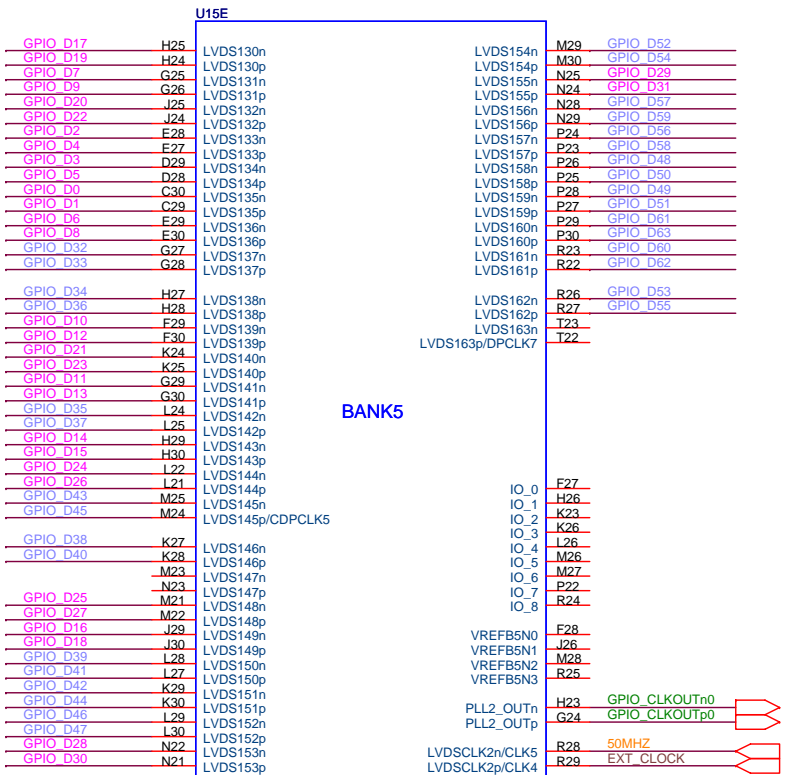
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3

2

1

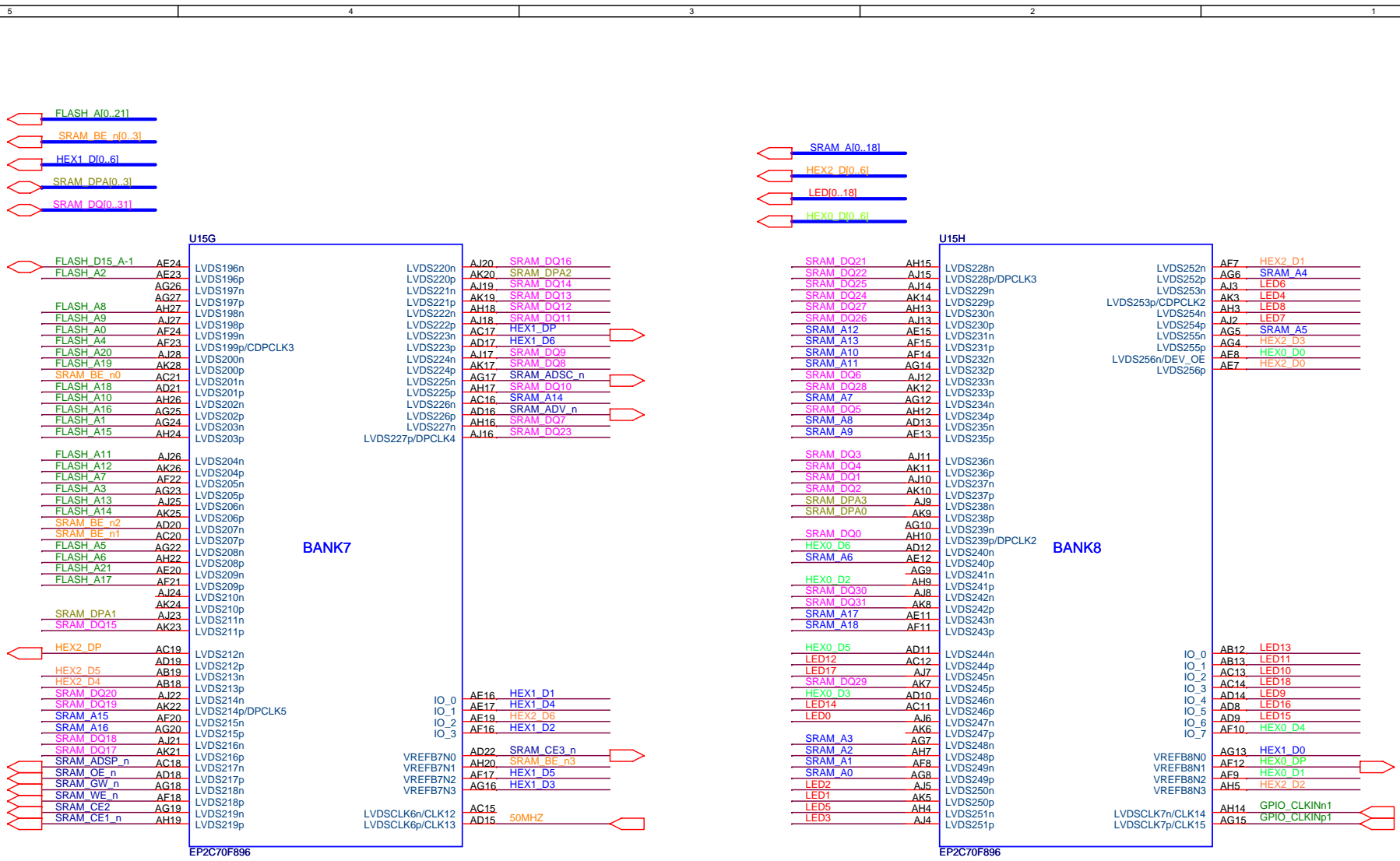
GPIODI0_63i



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Title		
ALTERA DE2-70		
Size	Document Number	Rev
B	EP2C70 BANKS AND BANK 6	1.0
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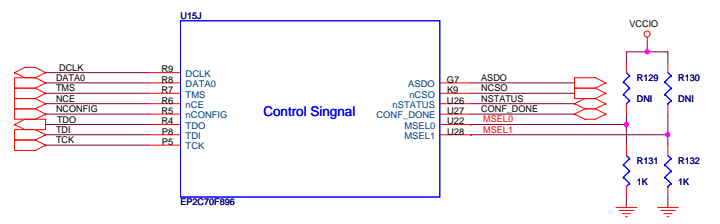
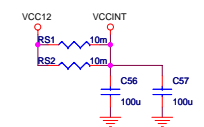
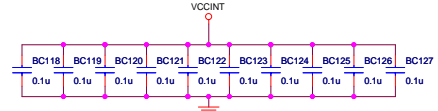
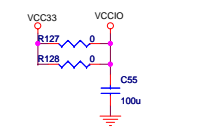
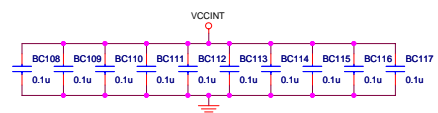
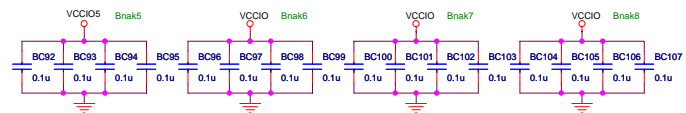
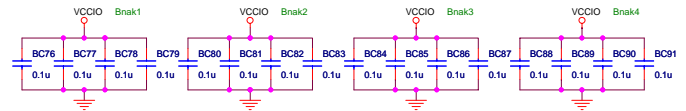
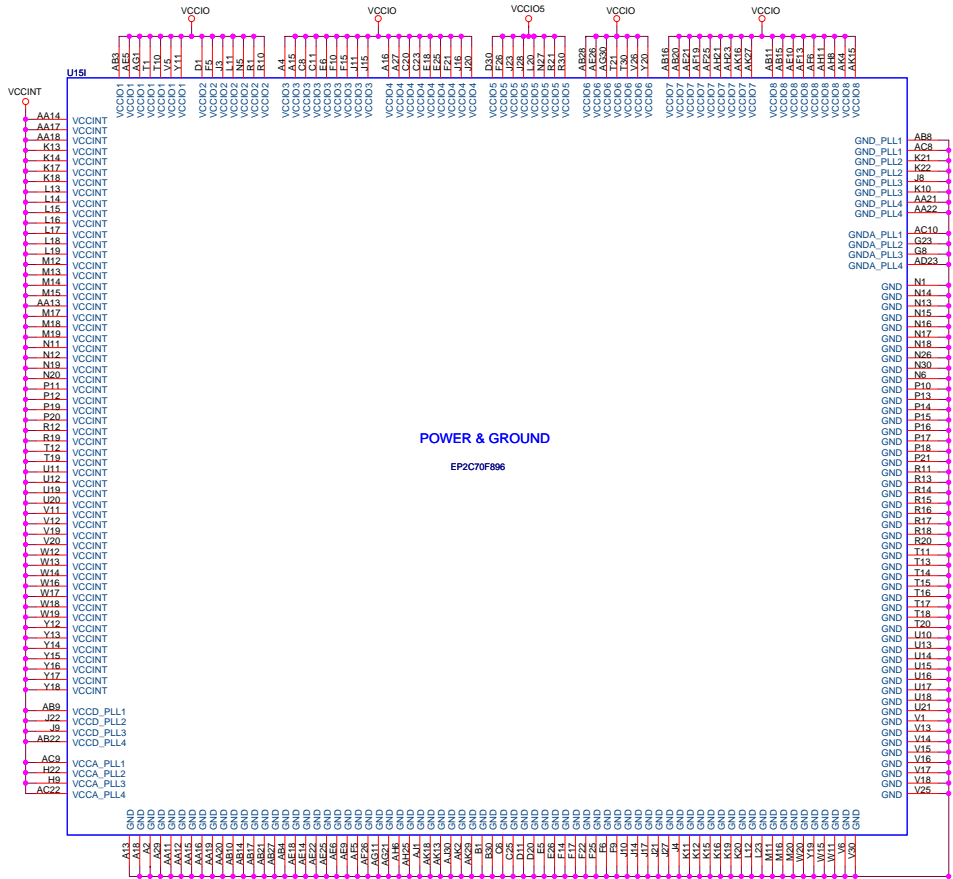




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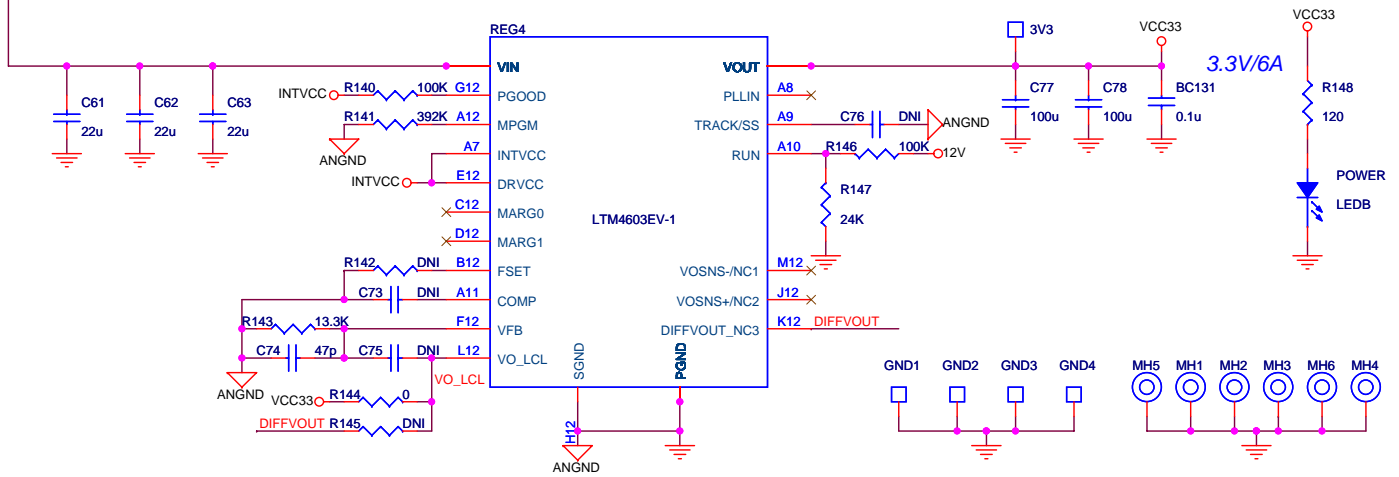
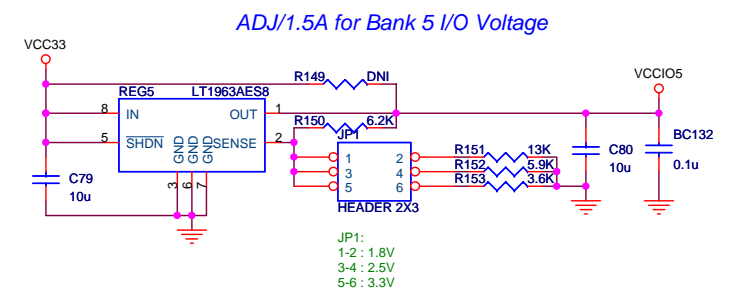
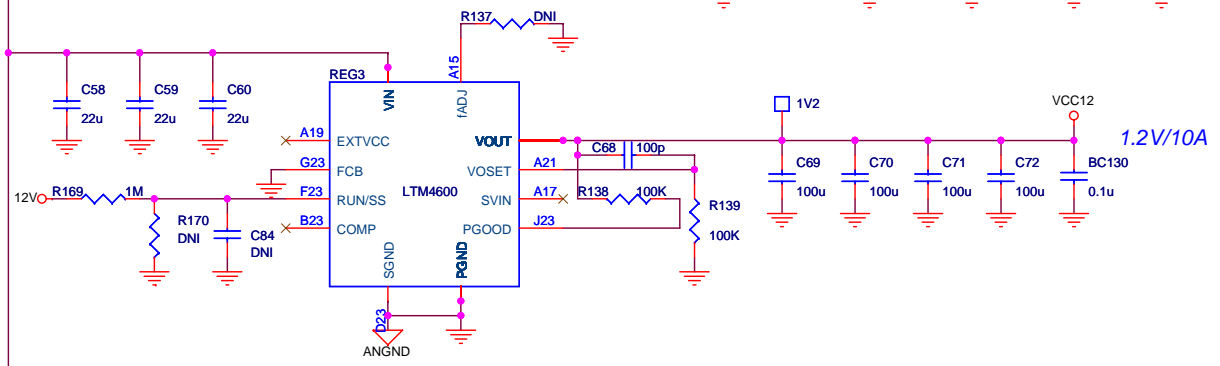
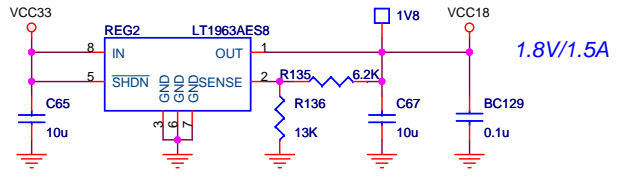
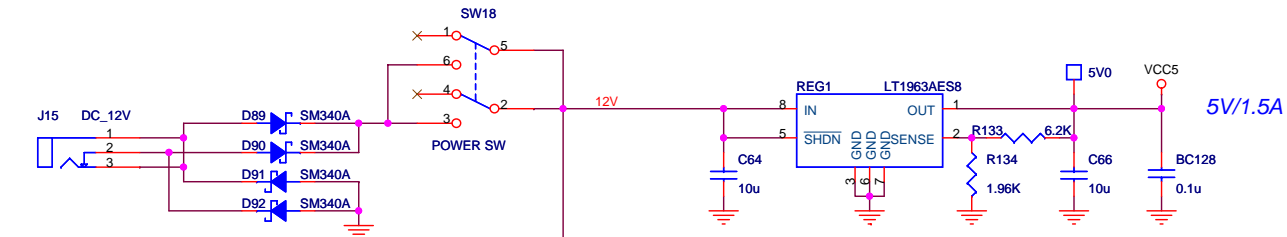
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ALTEA DE2-70		
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B	EP2C70 BANK7 AND BANK 8	1.0
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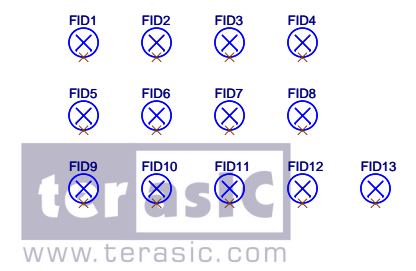
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Title		ALTERA DE2-70	
Size	C	Document Number	EP2C70 POWER AND CONFIG
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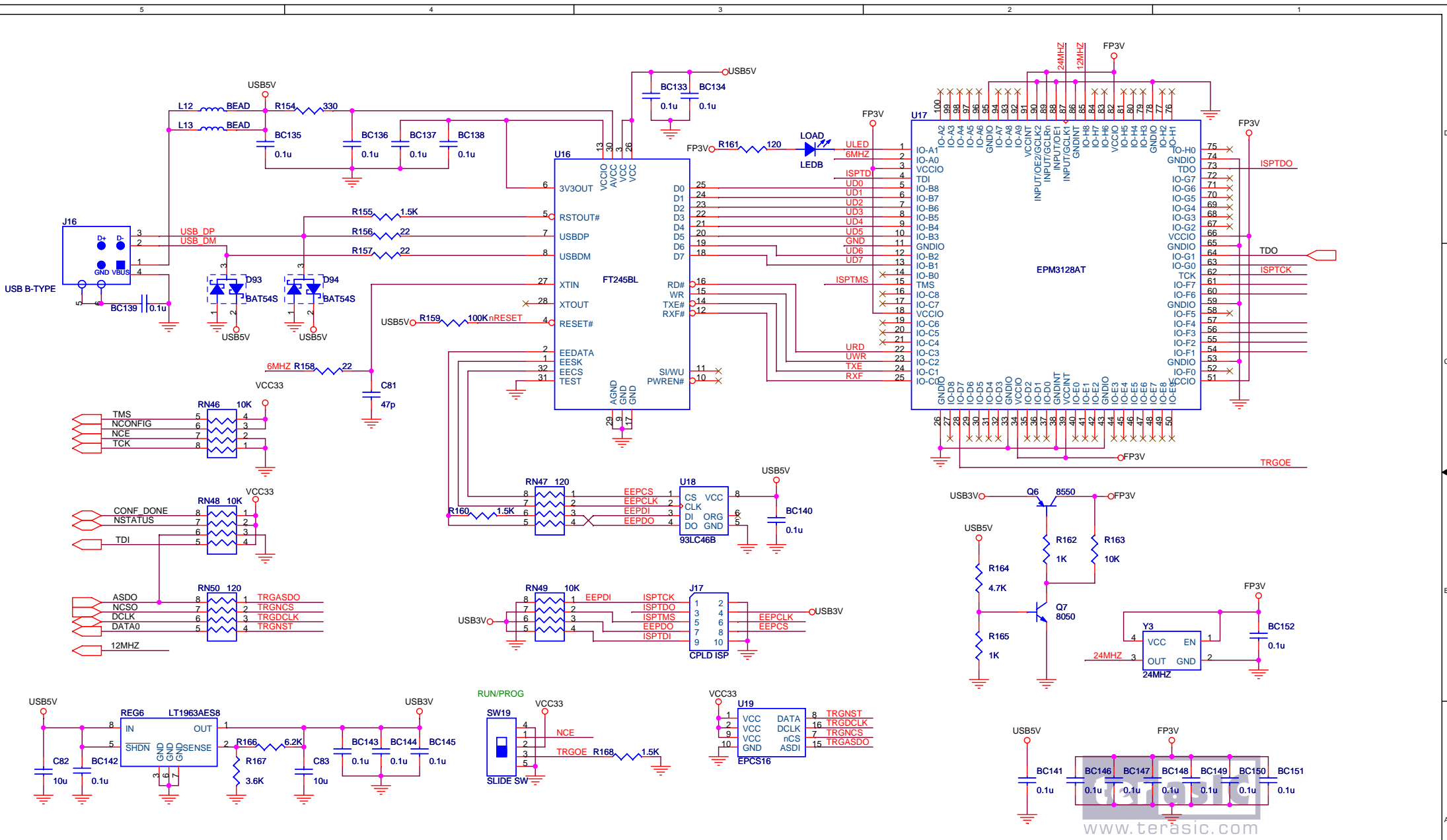


ADJ/1.5A for Bank 5 I/O Voltage

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B	USB BLASTER	1.0
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