

VAR-MX6CustomBoard v1.02A



CONTENT

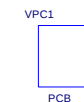
PAGE NO.	SCHEMATIC PAGE
1	Cover
2	Block Diagram
3	VAR-SOM-MX6
4	Display ,Touch
5	USB
6	SATA ,PCIe, G.ETH
7	Peripherals
8	DVK Debug Ethernet & Serial
9	DVK Exp. Connectors
10	Power & Mechanics

Disclaimer:

Schematics are for reference only.
Variscite LTD provides no warranty for the use of
these schematics.
Schematics are subject to change without notice.

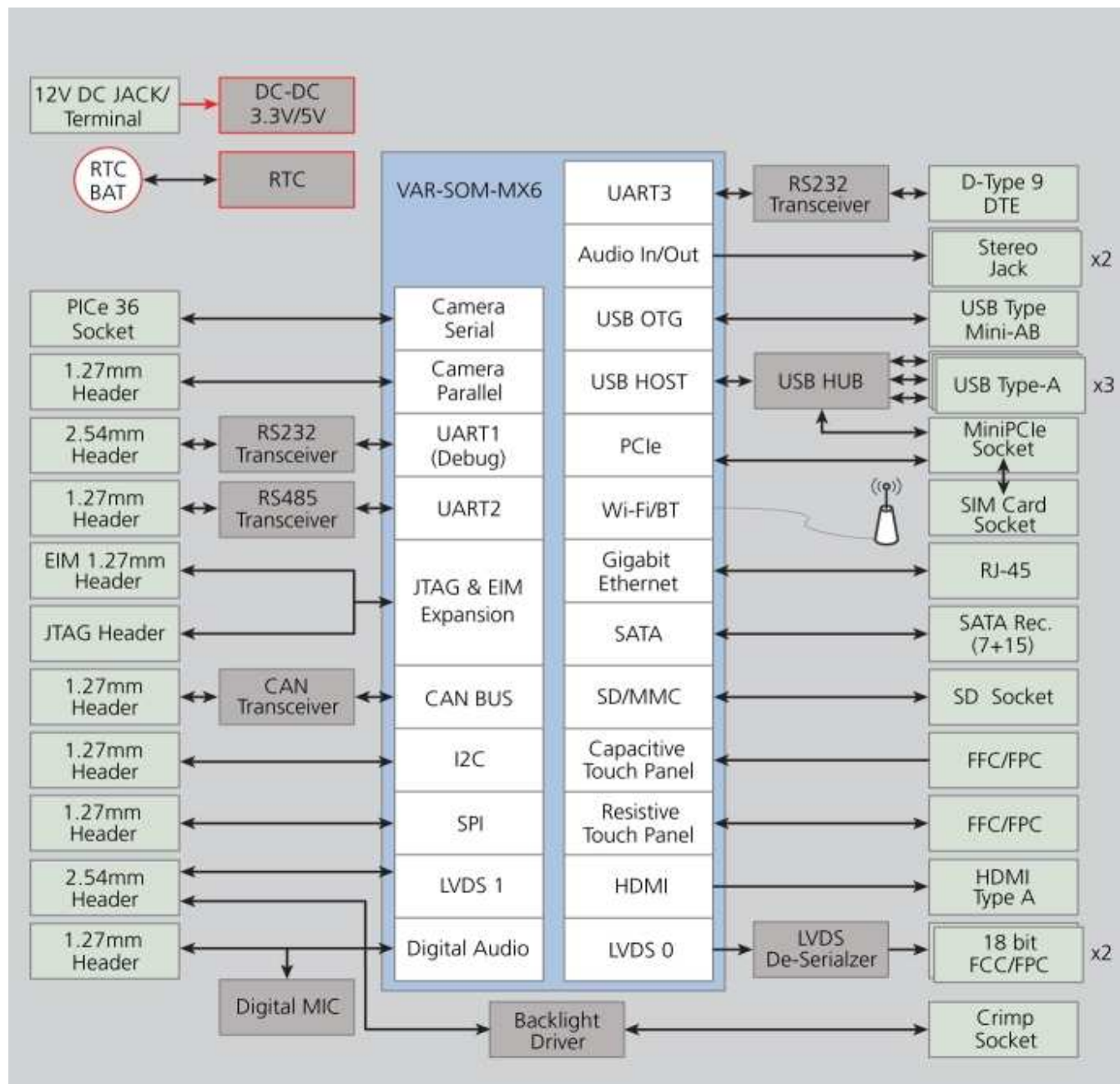
Revision History

Rev 1.02	Initial
Rev 1.02A	U22- NC, short pin 7,8 U16- NC (Accelerometer) SATA Power Limitation Note

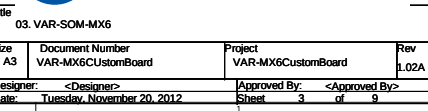


Title 01. Cover			
Size A3	Document Number VAR-MX6CustomBoard	Project VAR-MX6CustomBoard	Rev 1.02A
Designer: Tuesday, November 20, 2012		Approved By: Sheet 1 of 9	

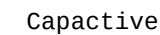
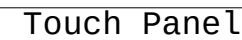
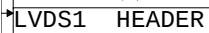
02 - Block Diagram



Title 02. Block Diagram			
Size A3	Document Number VAR-MX6CustomBoard	Project VAR-MX6CustomBoard	Rev 1.02A
Designer Tuesday, November 20, 2012	Approved By Sheet 2 of 9	Approved By	

[illegible]

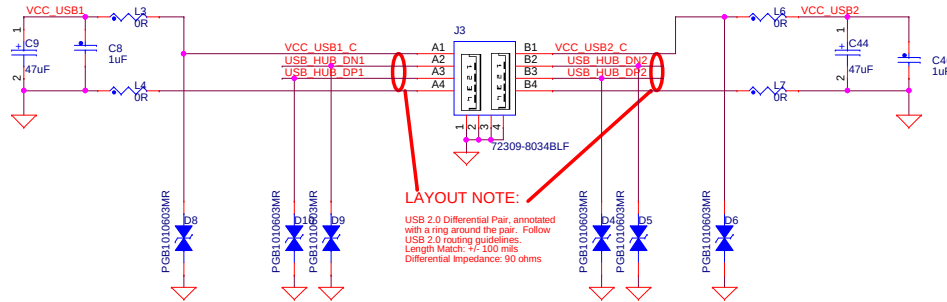
Parallel RGB (LVDS0)	
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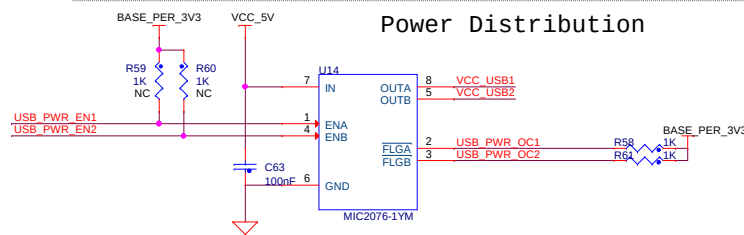
Title 04. Display ,Touch			
Size A3	Document Number VAR-MX6CustomBoard	Project VAR-MX6CustomBoard	Rev 1.02A
Designer: <Designer>		Approved By: <Approved By>	
Date: Tuesday, November 20, 2012		Sheet 4 of 9	

5. USB

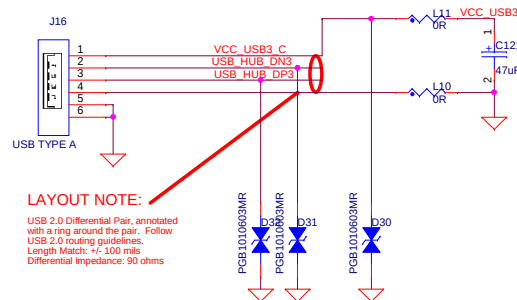
USB PORT 1-2 : 2 x USB 2.0 Host Dual Type A Rear Panel



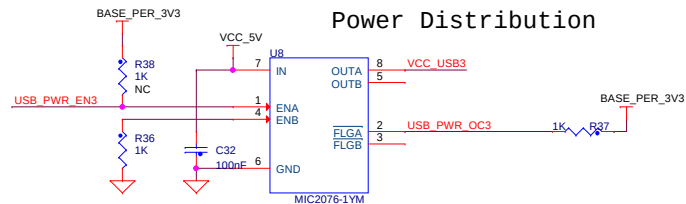
Power Distribution



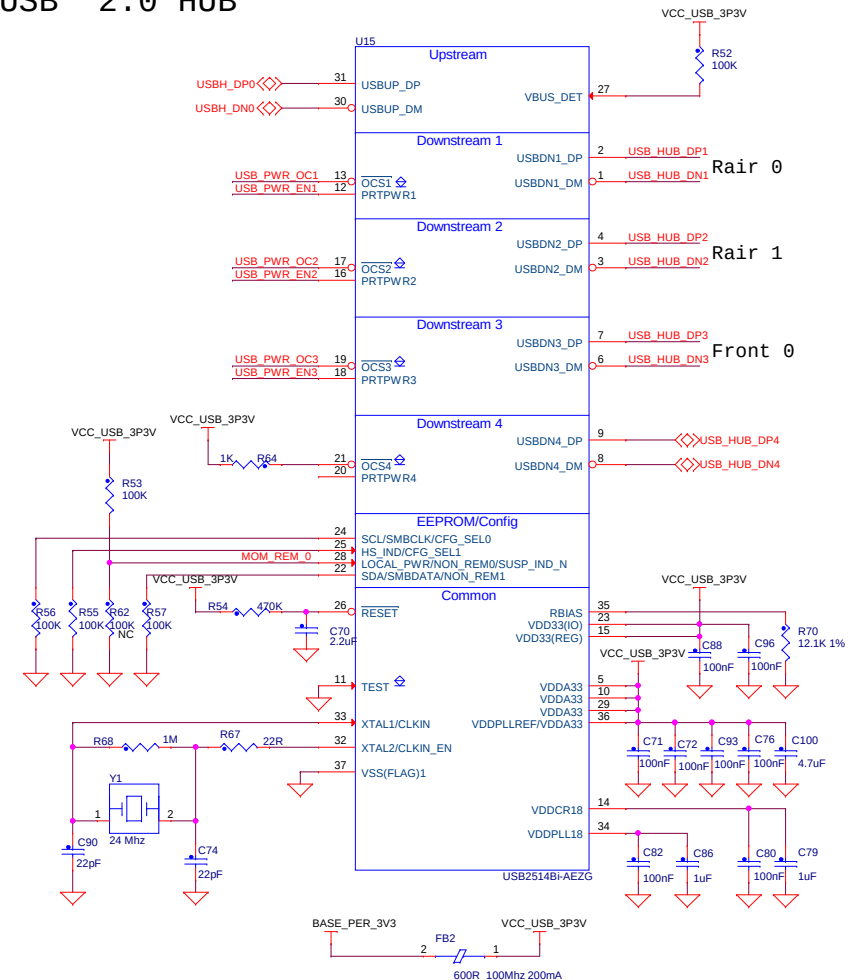
USB PORT 3 : 1 x USB 2.0 Type A Front Panel



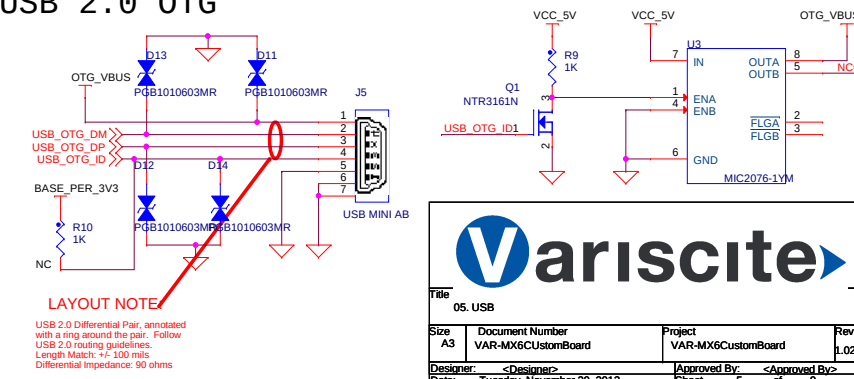
Power Distribution



USB 2.0 HUB



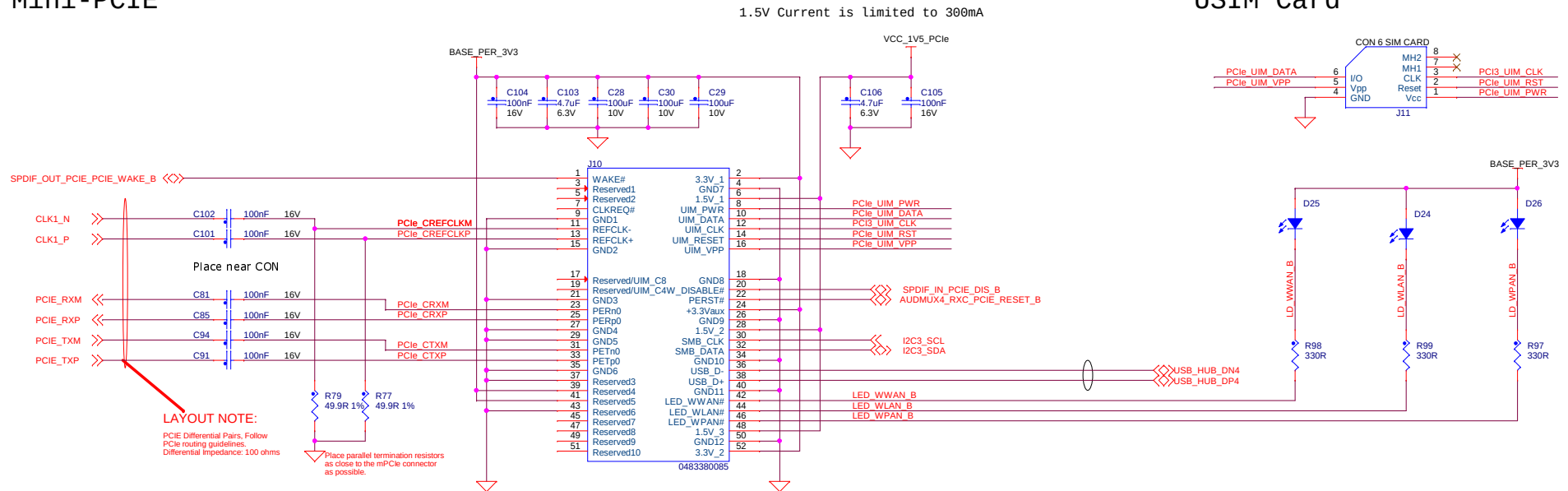
USB 2.0 OTG



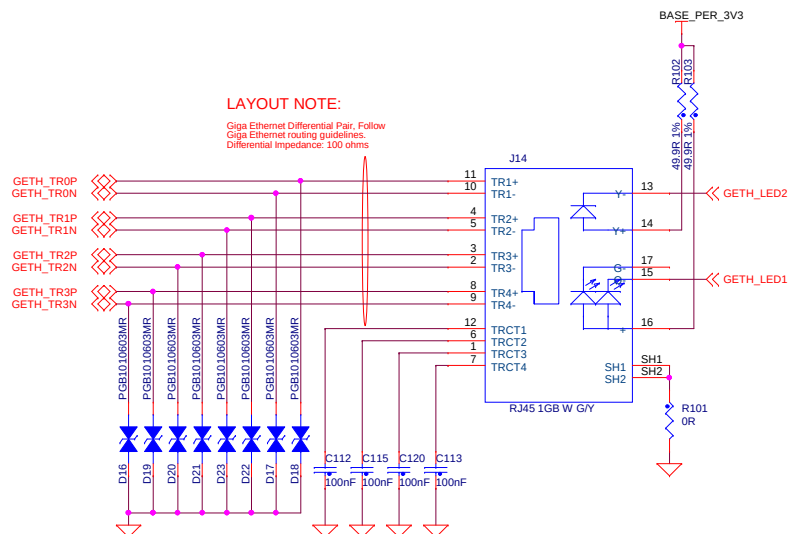
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Size	Document Number	Project	Rev
A3	VAR-MX6CustomBoard	VAR-MX6CustomBoard	1.02A
Designer	<Designer>	Approved By	<Approved By>
Date	Tuesday, November 20, 2012	Sheet	5 of 9

06. SATA ,PCie, G.ETH

Mini-PCIE



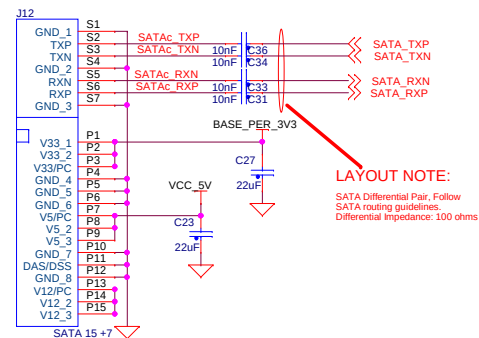
Giga Ethernet



SATA

Customboard's 5V power supply is limited to 3A, shared with Board's USB and SATA devices. Do not connect devices which exceed current limitation.

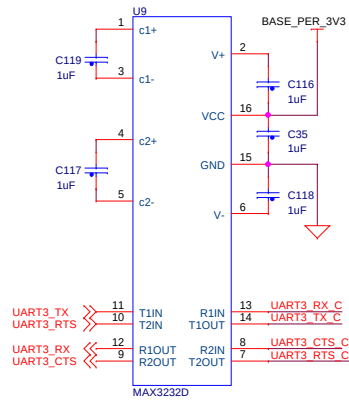
SATA Connector - Receptacle



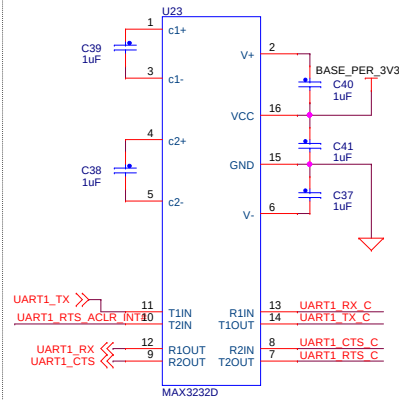
Variscite			
Title: 06. SATA ,PCie, G.ETH			
Size: A3	Document Number: VAR-MX6CustomBoard	Project: VAR-MX6CustomBoard	Rev: 1.02A
Designer: <Designer>	Approved By: <Approved By>		Sheet: 6 of 9
Date: Thursday, November 22, 2012			

07. Peripherals

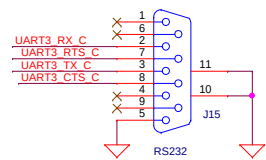
UART3 - RS232 DTE



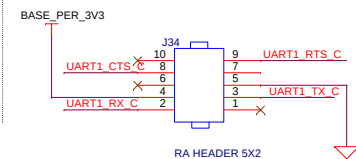
UART1- RS232 Debug



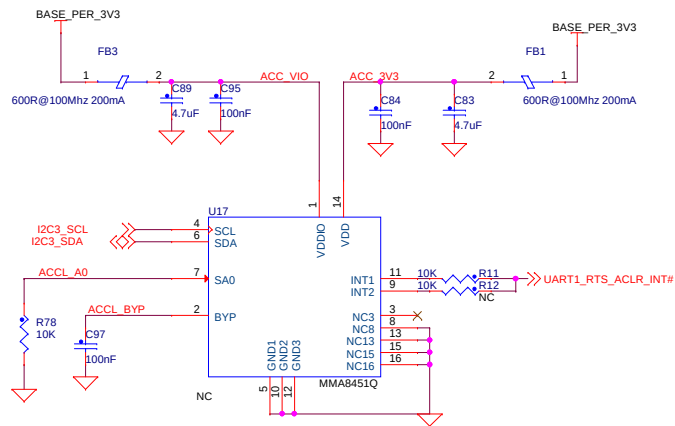
D-Type - Male



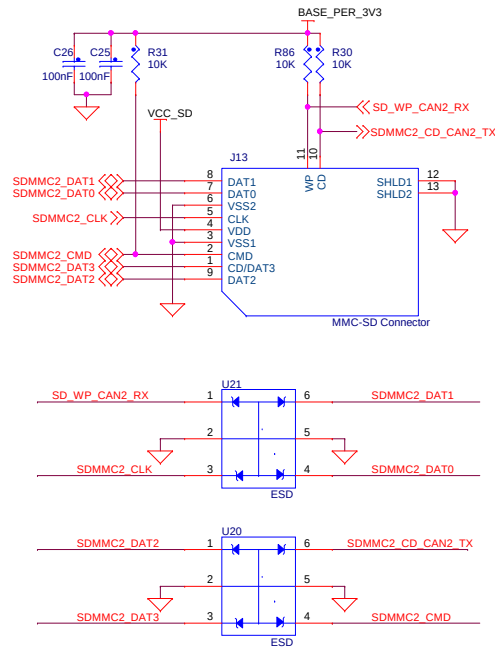
Header



Accelerometer



SD-Card

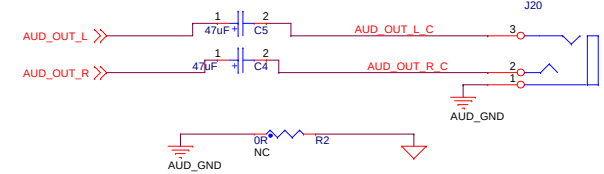


AUDIO

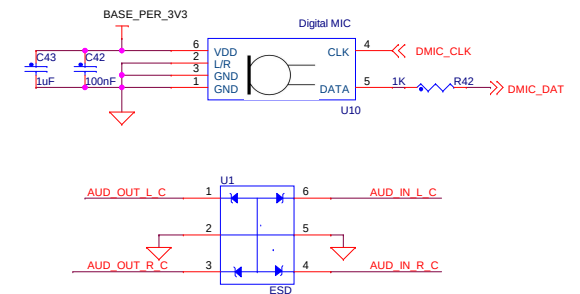
Line In



Headphone OUT

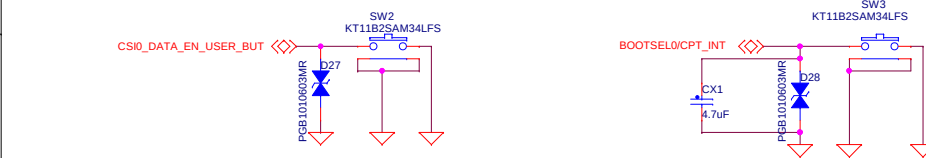


Digital Microphone

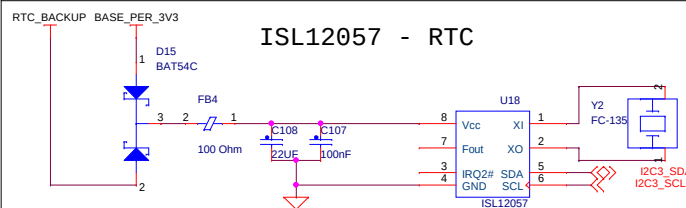


USER

Sys-boot



ISL12057 - RTC

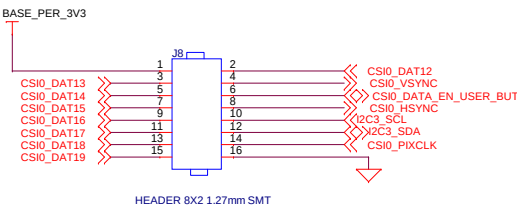


Title 07. Peripherals			
Size A3	Document Number VAR-MX6CustomBoard	Project VAR-MX6CustomBoard	Rev 1.02A
Designer <Designer>	Approved By <Approved By>	Date Tuesday, November 20, 2012	
Sheet 7		of 9	

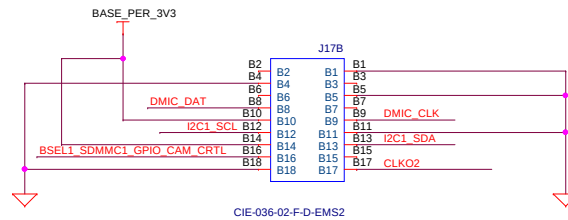
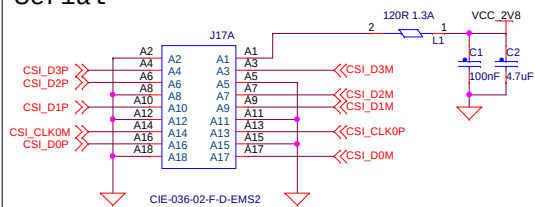
08. DVK Exp. Connectors

Camera Interface

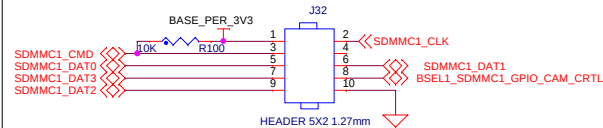
Parallel



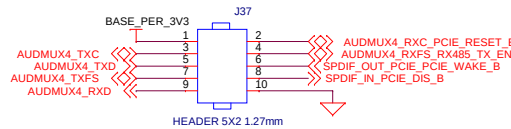
Serial



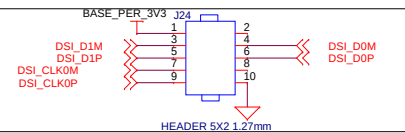
SD/MMC



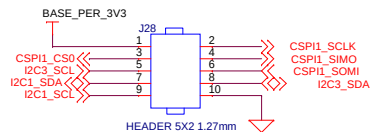
Digital AUDIO (AUDMUX4 /SPDIF)



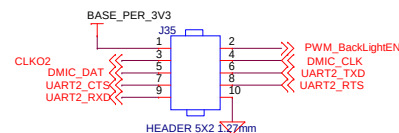
DSI



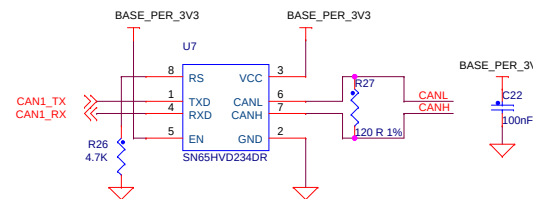
SPI/I2C



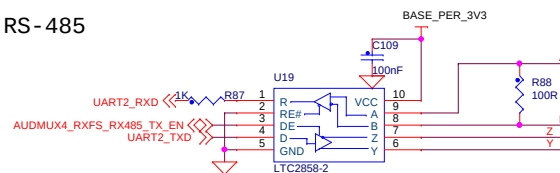
MISC



CAN TRX

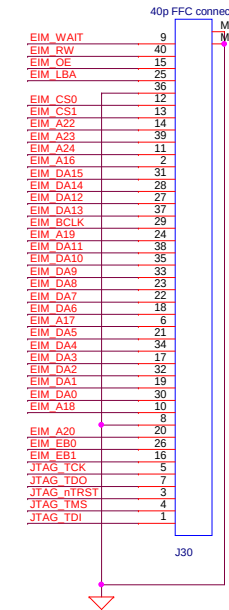


RS-485

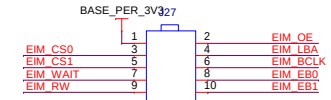


EMI & JTAG Fanout

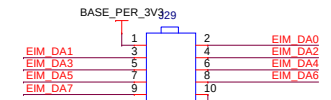
VAR-SOM-MX6 Expansion



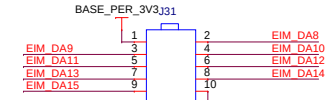
CPU BUS



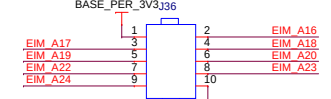
EMI 0



EMI 1

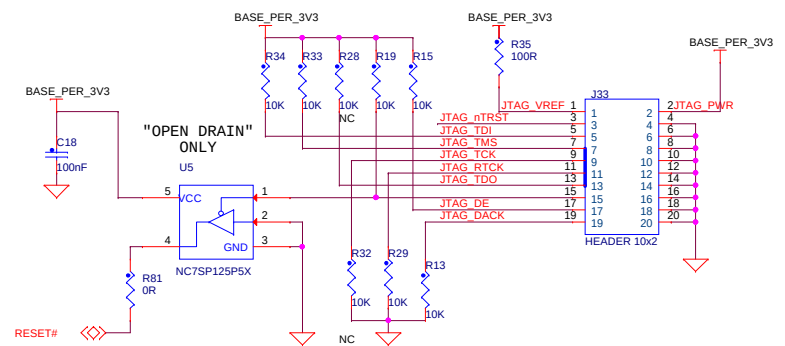


EMI 2

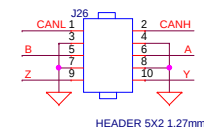


EMI 3

JTAG Connector



Header

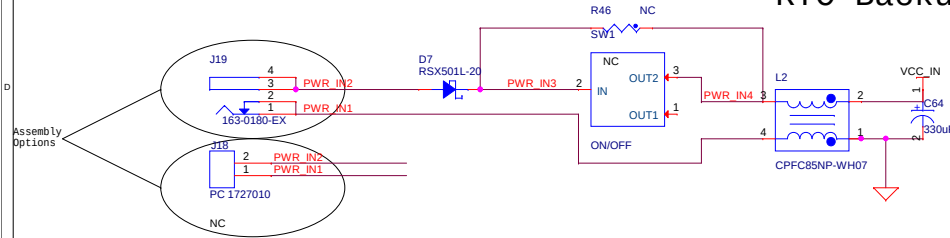


Title 08. DVK Exp. Connectors			
Size A3	Document Number VAR-MX6CustomBoard	Project VAR-MX6CustomBoard	Rev 1.02A
Designer Date:	<Designer> Tuesday, November 20, 2012	Approved By Sheet	<Approved By> 8 of 9

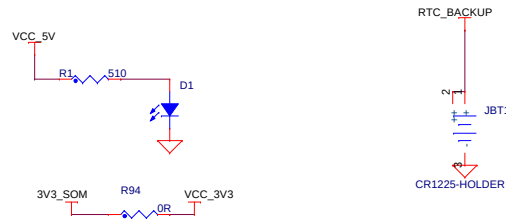
09. Power & Mechanics

VCC-IN - 7.5- 12V

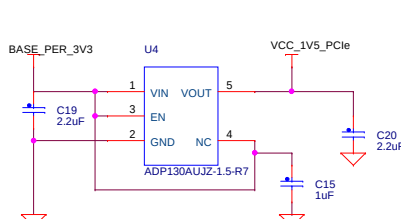
RTC Backup Battery



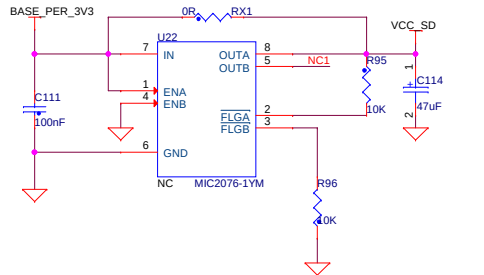
Main Power LED



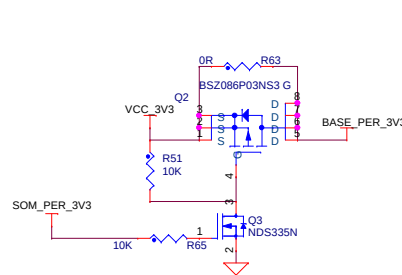
PCIe 1V5 300mA



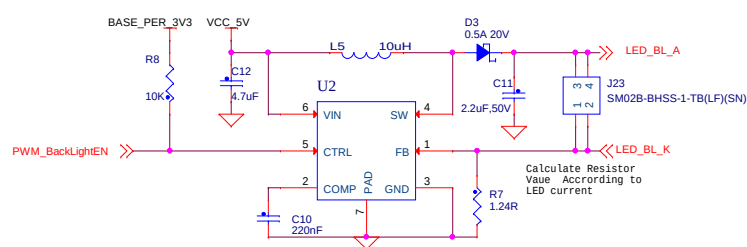
SD Power Control



Peripherals Power Control



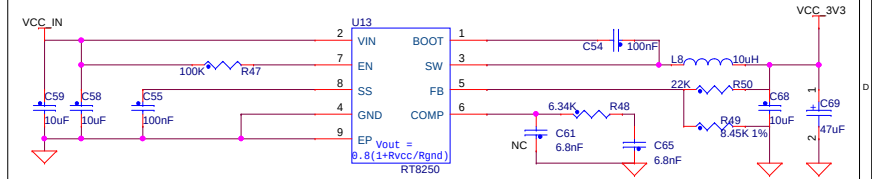
LCD Backlight



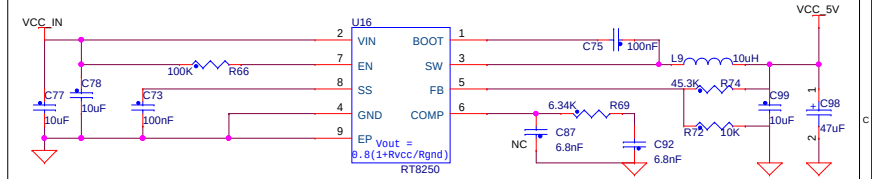
2 X SOM Holes 4 X Chassis Holes



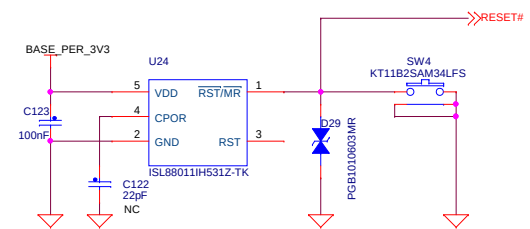
3.3V Digital 3A



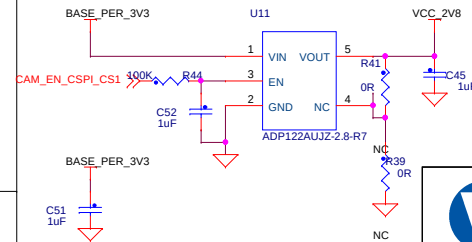
5V Digital 3A



Reset



CMOS Sensor 2.8V



Title 09. Power & Mechanics			
Size A3	Document Number VAR-MX6CustomBoard	Project VAR-MX6CustomBoard	Rev 1.02A
Designer Date:	<Designer> Tuesday, November 20, 2012	Approved By Sheet	<Approved By> 9 of 9