K2GEVM

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REV	D
VER	1.5

Project : K2G EVM	Designed for TI by Mistral Solutions Pvt Ltd	Title	TABLE OF CONTENTS		
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REVISION HISTORY

VER #	DATE	DESCRIPTION OF CHANGES	AUTHOR
0.1	12th OCT 2015	QSPI Buffer Removed (U148,C823,R916) ,R463 Mounted Over Voltage Protection Circuit Added in Page 50	Mistral Design Team
0.2	19th OCT 2015	AA19,AB19,Y20,W19,D2,L2,G3,F18,H2,AA18,Y19,Y14,H5 and M5 balls of the processor renamed R737 added R176,R184,R191,R198 changed to pull down R197,R190,R183,R175 changed to pull up	Mistral Design Team
0.3	28th OCT 2015	R927 added b/w SOC and BMC Net "SOC_BAWCLKSEL" renamed as "RSV6_TOGGLE"	Mistral Design Team
0.4	29th OCT 2015	Nets BAW_ATEST, VDDA_BAW, VDD18_BAW are renamed as RSV7_ATEST, VDDA_0V9 ,VDD18_1V8	Mistral Design Team
0.5	4th NOV 2015	"M5" & "H5" pins of processor moved to corresponding power domain symbol parts " M5 " pin of processor tied directly to CVDD1 FB18,C186,C526 Removed Tittle block updated as per customer request	Mistral Design Team
0.6	11th NOV 2015	U142 replaced with TXS0108EPWR R58 made DNI	Mistral Design Team
0.7	16th NOV 2015	R769 R562,R764 are made DNI due to internal pull up/down in TPD12S016	Mistral Design Team
0.8	8th DEC 2015	Customer comments updated	Mistral Design Team
1.0	11th DEC 2015	Beta ECR/ECN implemented Baselined schematics	Mistral Design Team
1.1	18th JAN 2016	R374 and R370 mounted	Mistral Design Team
1.2	4th MAR 2016	R431 and R442 value changed to 200E	Mistral Design Team
1.3	23rd MAR 2016	VCNTL[0:5] pin names of U1-32 renamed as RSV[13:18]	Mistral Design Team
1.4	28th MAR 2016	Hided VCNTL[0:5] net labels of U1-32	Mistral Design Team
1.5	12th APR 2016	SOC pin names updated as per datasheet ' SPRS932A-DECEMBER 2015-REVISED FEBRUARY 2016 '	Mistral Design Team

Project :
K2G EVM

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Title REVISION HISTORY
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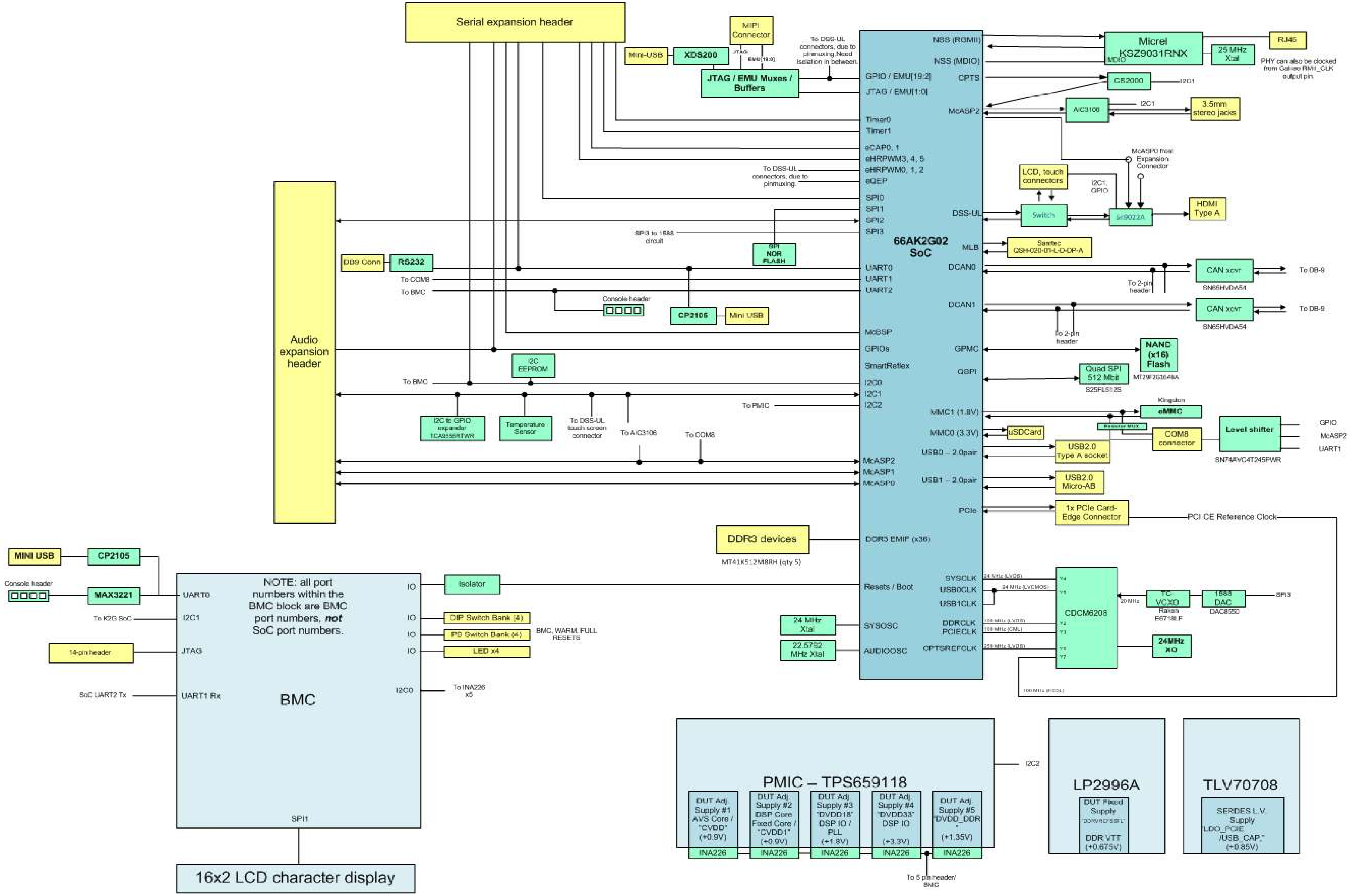
BLOCK DIAGRAM - K2GEVM



Project :	Designed for TI by Mistral Solutions Pvt Ltd	Title	BLOCK DIAGRAM - K2G EVM
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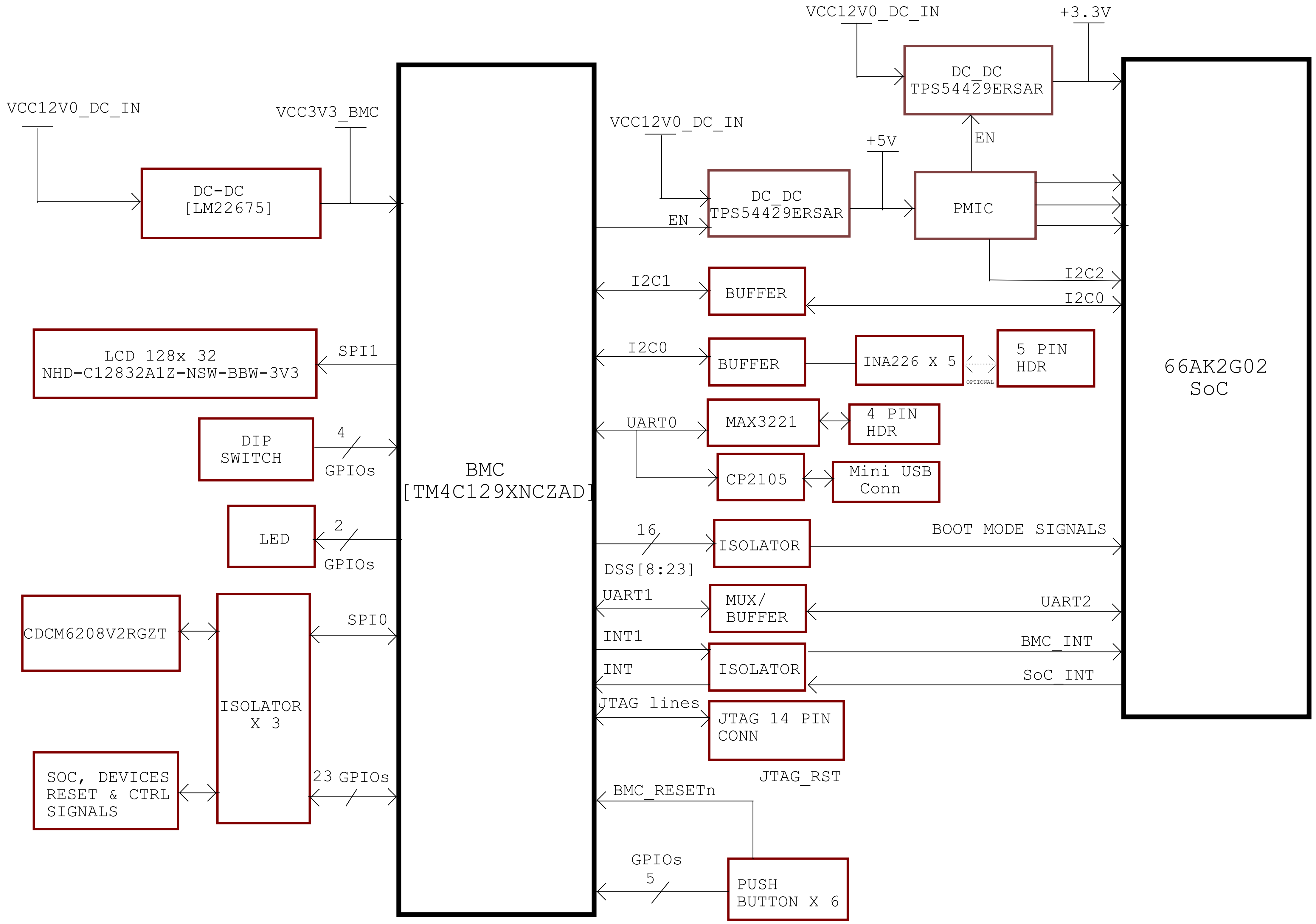
BLOCK DIAGRAM - BMC



Project :

K2G EVM

Designed for TI by Mistral Solutions Pvt Ltd

Title BLOCK DIAGRAM - BMC

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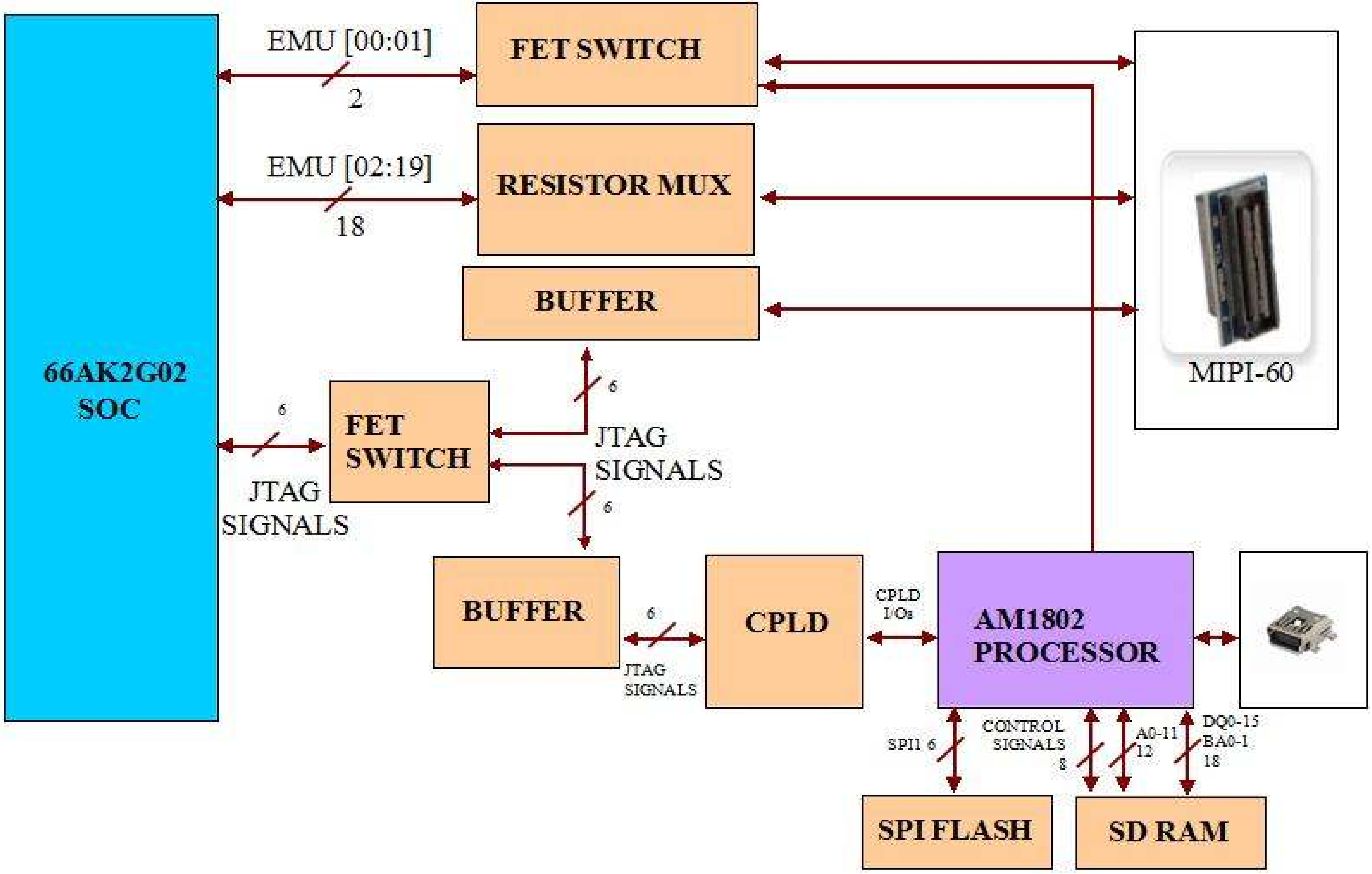
BLOCK DIAGRAM - XDS200



Project :

K2G EVM

Designed for TI by Mistral Solutions Pvt Ltd

Title BLOCK DIAGRAM - XDS200

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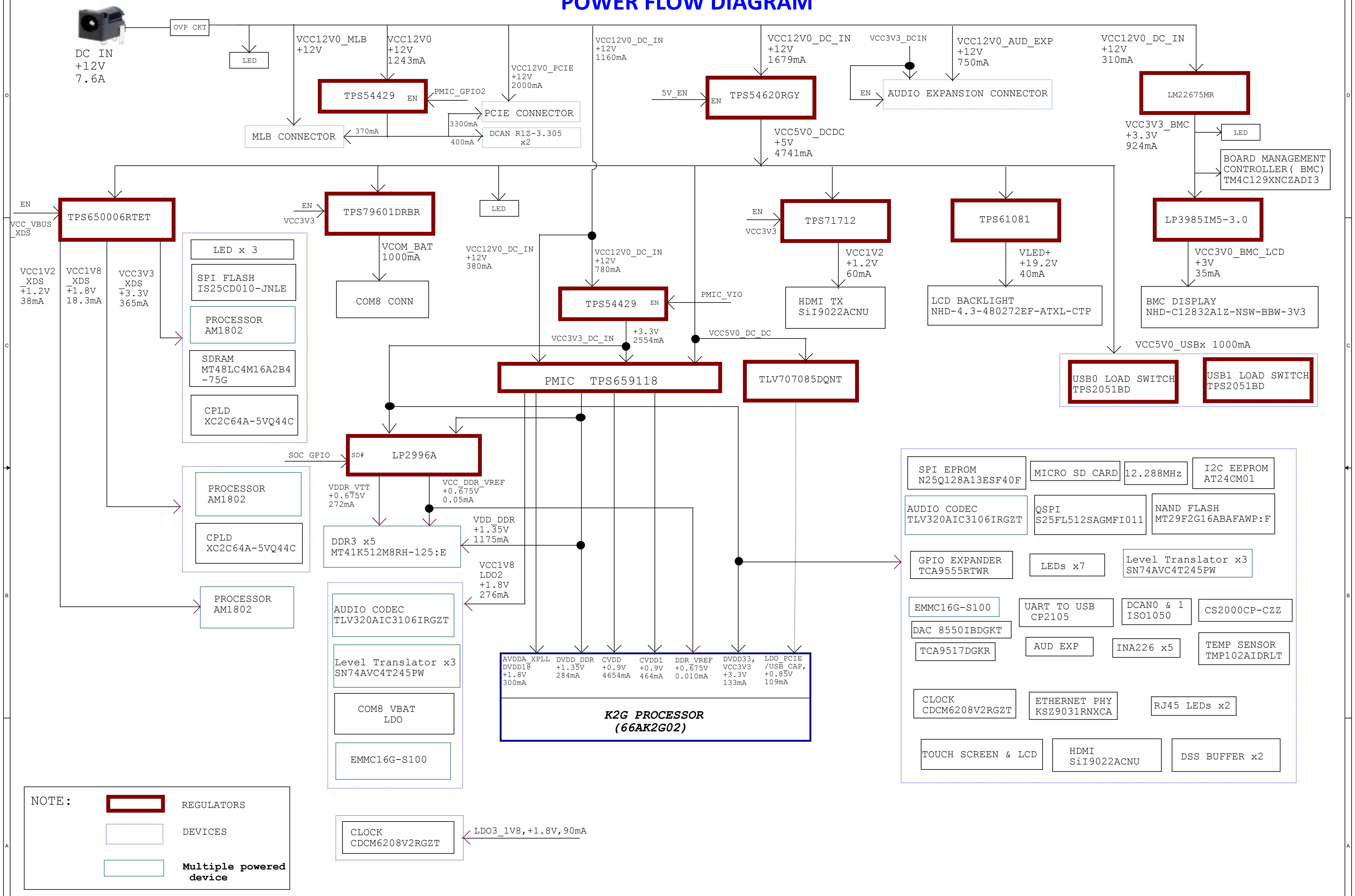
POWER FLOW DIAGRAM



Project :	Designed for TI by Mistral Solutions Pvt Ltd	Title	POWER FLOW DIAGARAM
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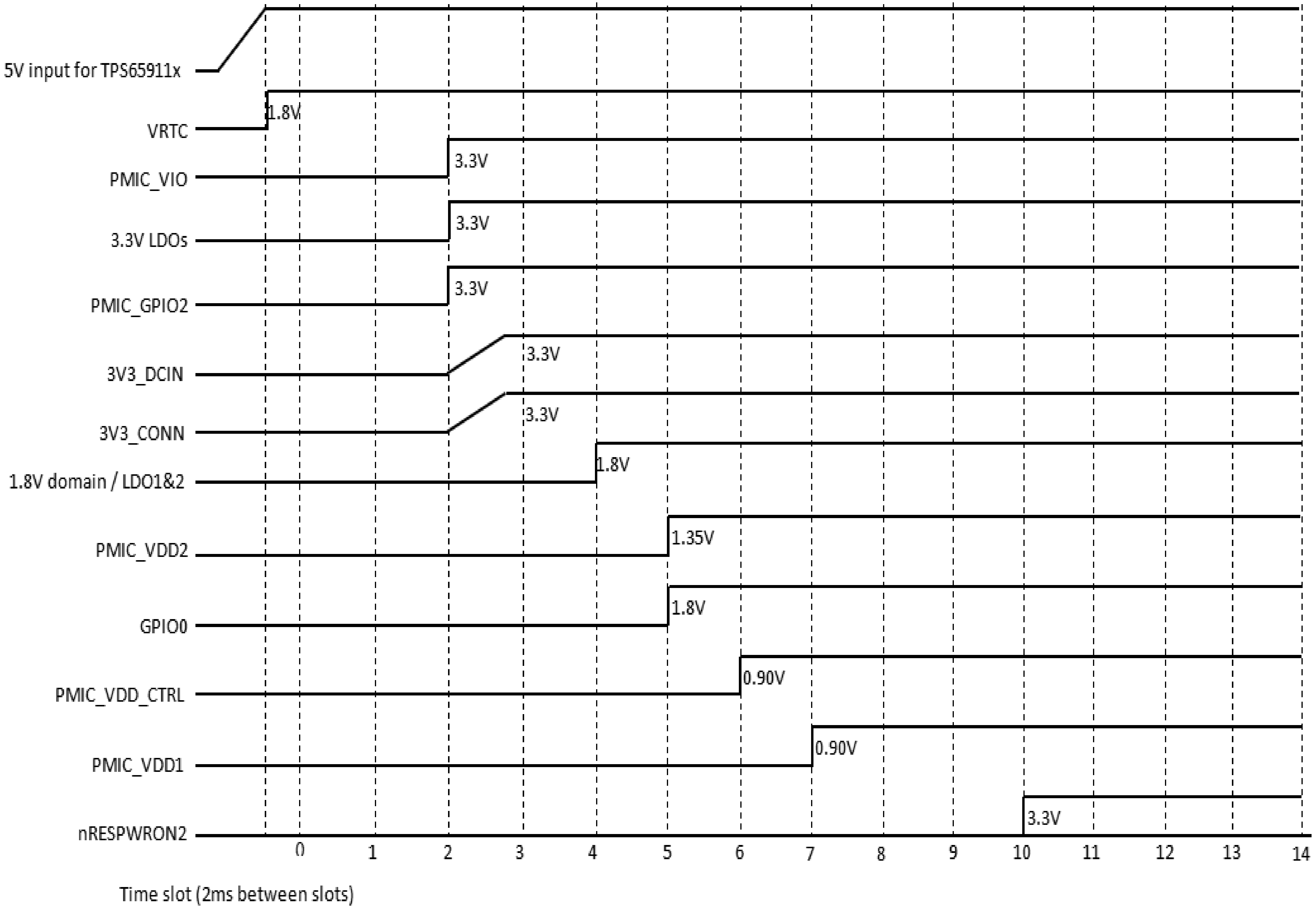
BOARD POWER UP SEQUENCE



Project :
K2G EVM

Designed for TI by Mistral Solutions Pvt Ltd

Title BOARD POWER SEQUENCE DIAGARAM
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SoC I2C ADDRESS TABLE

I2C0 DEVICES	**7 BIT ADDRESS**
EEPROM	0x50 (PAGE 0)
	0x51 (PAGE 1)
BMC	0x0 (PROGRAMMABLE)
SERIAL EXPANSION CONNECTOR	TBD
PCIe CONNECTOR	TBD

I2C2 DEVICES	**7 BIT ADDRESS**
PMIC	0x2D (GENERAL PURPOSE) TBD
	0x12 (VOLTAGE SCALING) TBD

I2C1 DEVICES	**7 BIT ADDRESS**
HDMI TRANSMITTER	0x3B
	0x3F
	0x62
AUDIO CODEC	0x1B
TOUCH SCREEN	0x70 (WRITE)
	0x71 (READ)
I/O EXPANDER	0x20
TEMPERTURE SENSOR	0x48
MLB CONNECTOR	TBD
AUDIO EXPANSION CONNECTOR	0x4A,0x4B,0x4C,0x4D
CLOCK GENREATOR (CS2000CP-CZZ)	0x4F

BMC I2C ADDRESS TABLE

BMC I2C0 DEVICES	**7 BIT ADDRESS**
PMBUS	0x40 : 3.3V
	0x41 : CVDD
	0x42 : CVDD1
	0x43 : 1.8V
	0x44 : DVDD_DDR

BMC I2C1 DEVICES	**7 BIT ADDRESS**
PROCESSOR	ALWAYS MASTER

McASP CONFIGURATION

McASP PORT	DEVICES	DEVICE MODE
McASP0	DAC- PCM1690 x2	SLAVE
	I2S HEADER	MASTER
McASP1	ADC- PCM1865 x2	SLAVE
McASP2	HDMI TRANSMITTER (DEFAULT)	SLAVE
	AUDIO CODEC AIC3106	
	DIR9001(DEFAULT)	MASTER
	COM8	

Project :

K2G EVM

Designed for TI by Mistral Solutions Pvt Ltd

Title I2C TREE

Size C

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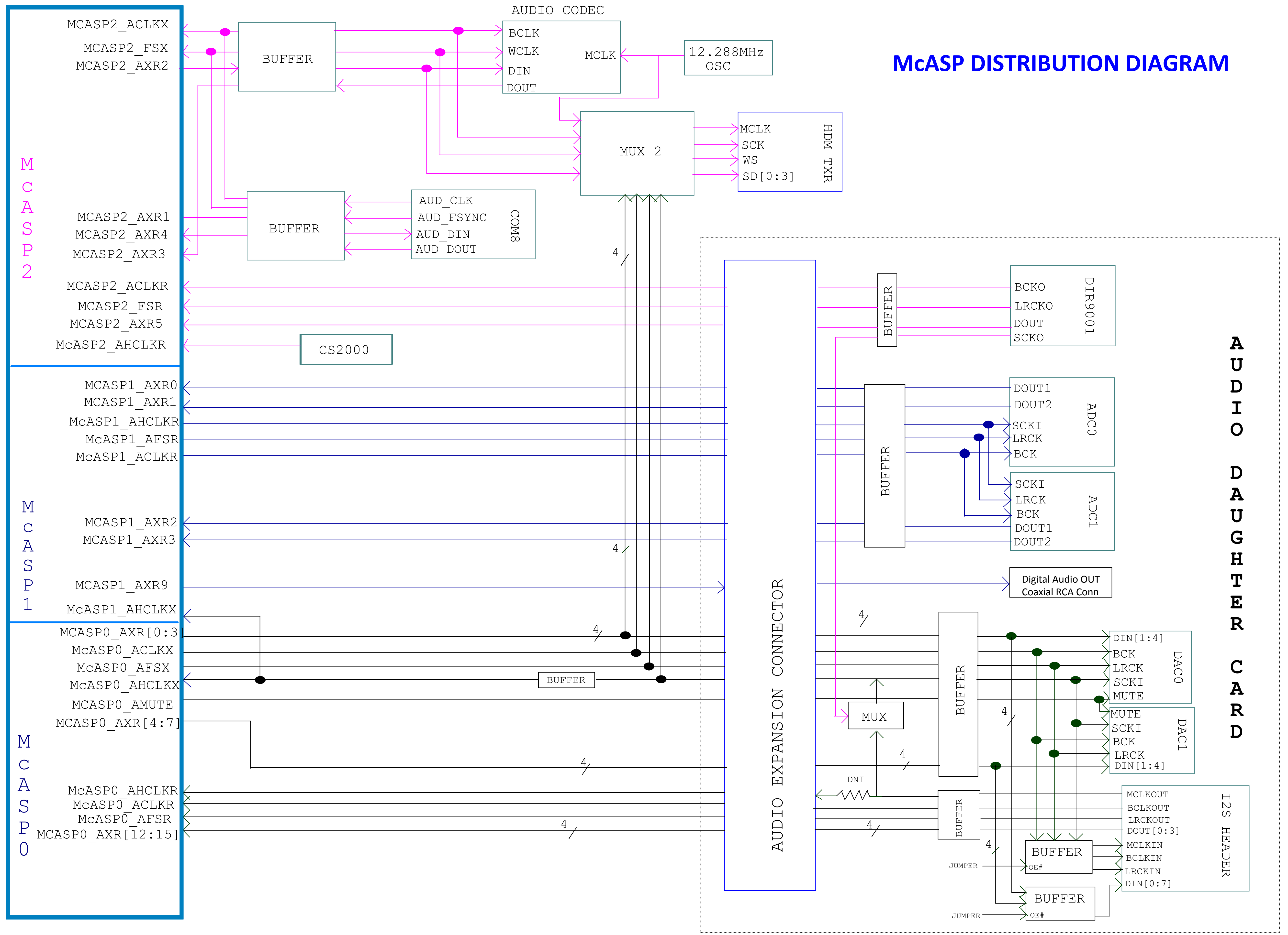
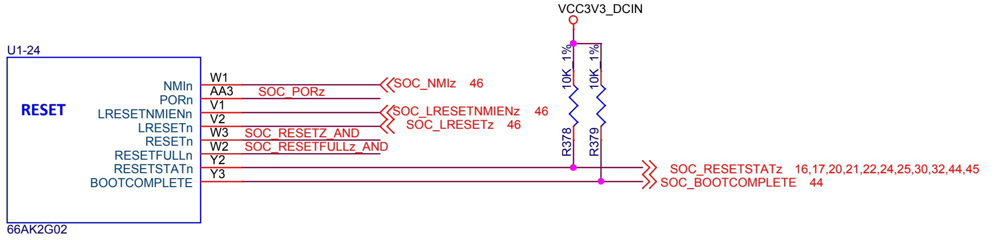
McASP DISTRIBUTION DIAGRAM

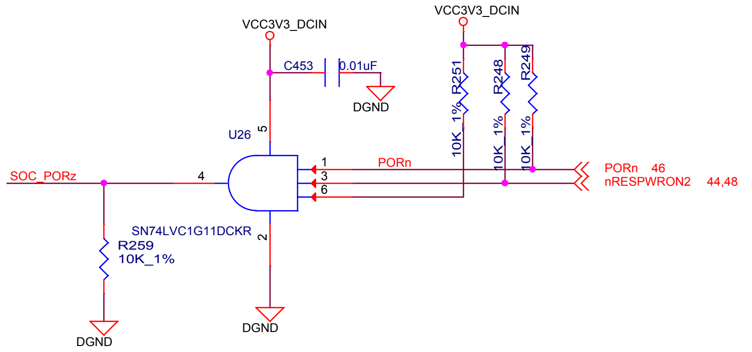


Project : K2G EVM	Designed for TI by Mistral Solutions Pvt Ltd Texas Instruments Mistral	Title MCASP TREE Size C Document Number MS_TI_K2GEVM_SCH_REVD Rev D Date: Wednesday, April 13, 2016 Sheet 9 of 50

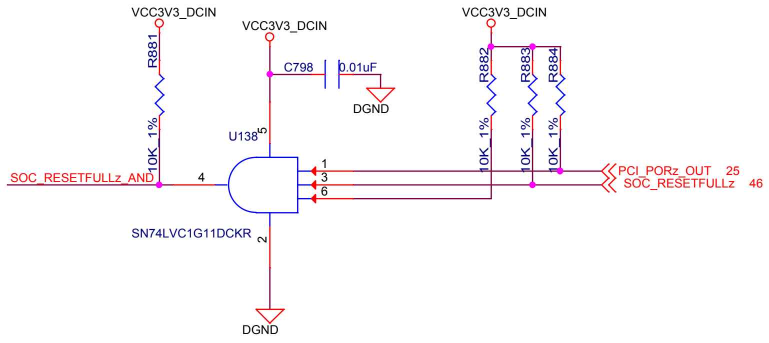
SoC RESET



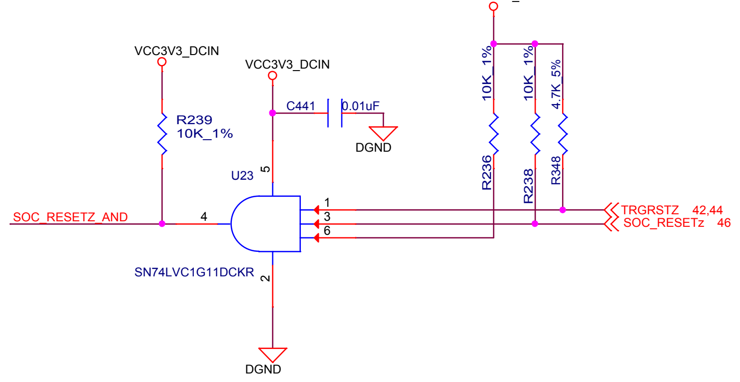
POWER ON RESET



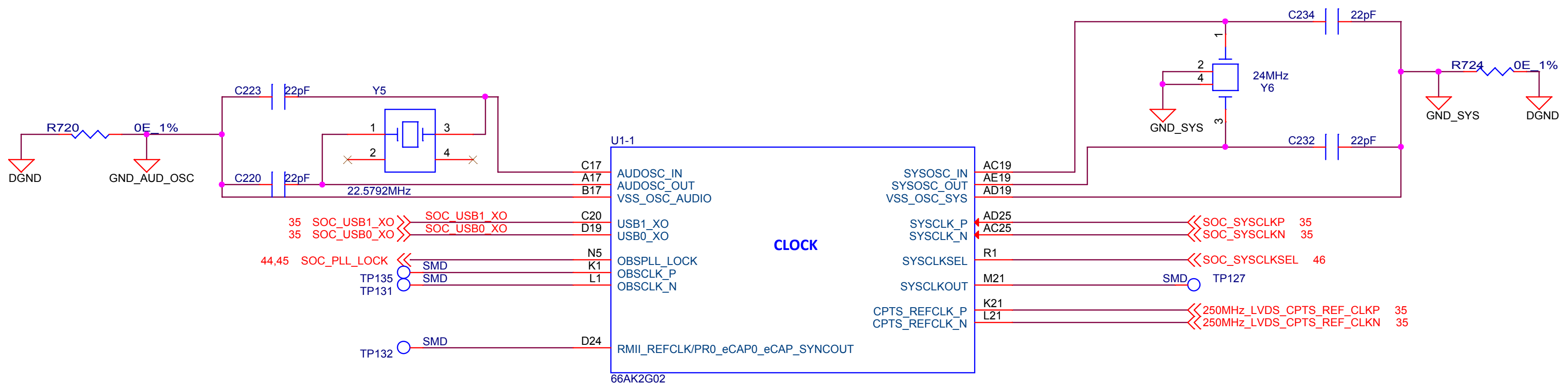
FULL RESET



WARM RESET



SoC CLOCK



Project :
K2G EVM

Designed for TI by Mistral Solutions Pvt Ltd

Title SOC CLOCK & RESET

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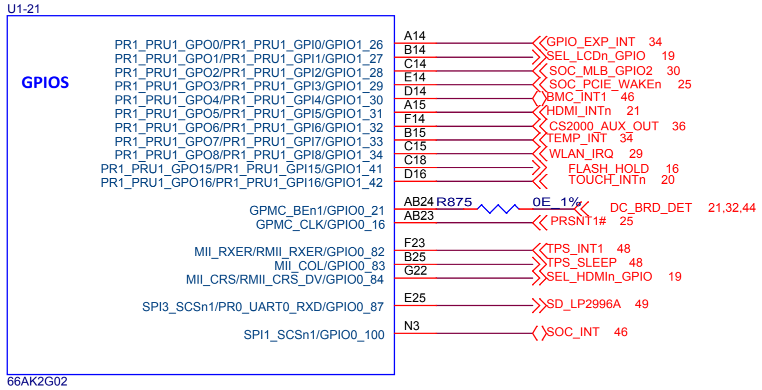
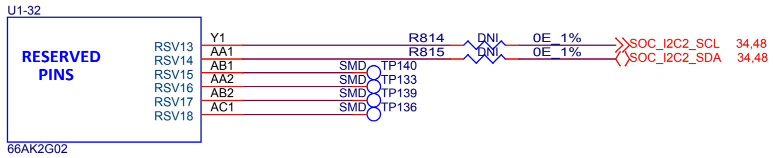
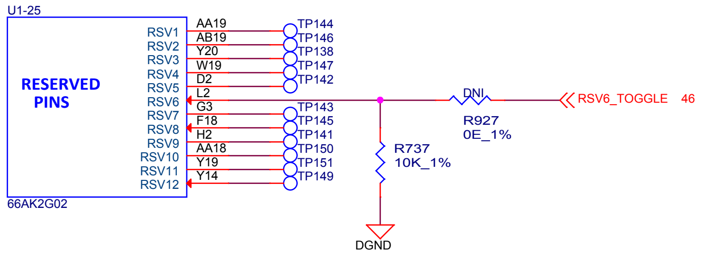
SoC GPIOs



RESERVED PINS





Project :

K2G EVM

Designed for TI by Mistral Solutions Pvt Ltd

TEXAS INSTRUMENTS MISTRAL

Title SOC GPIO, SMART REFLEX & TEST OUT

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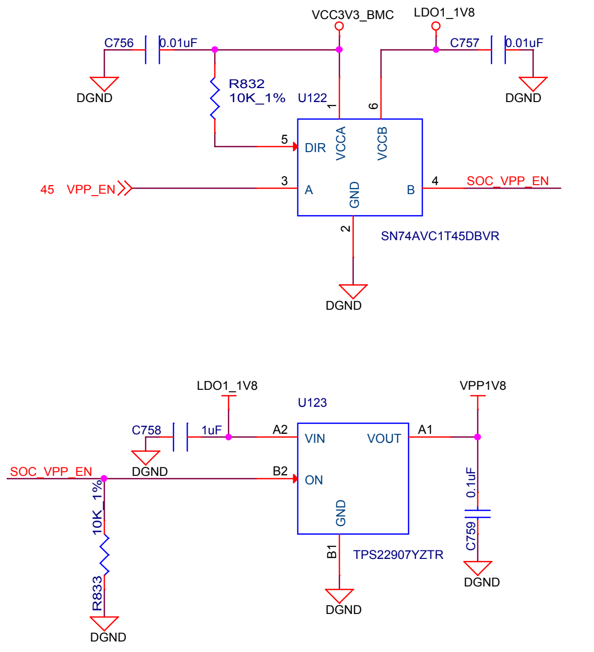
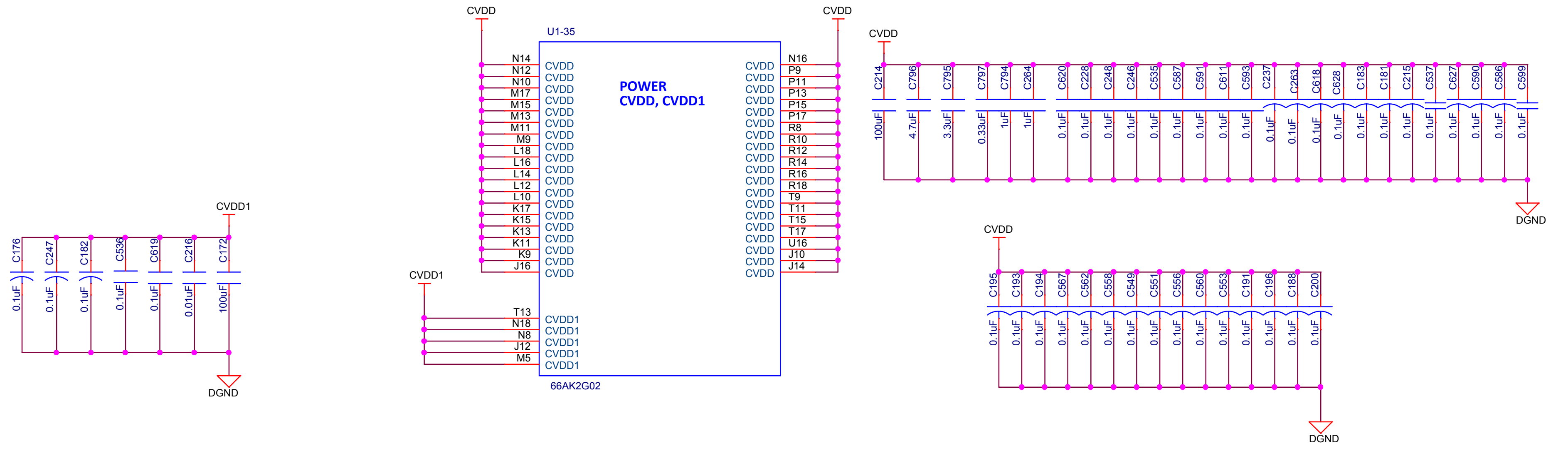
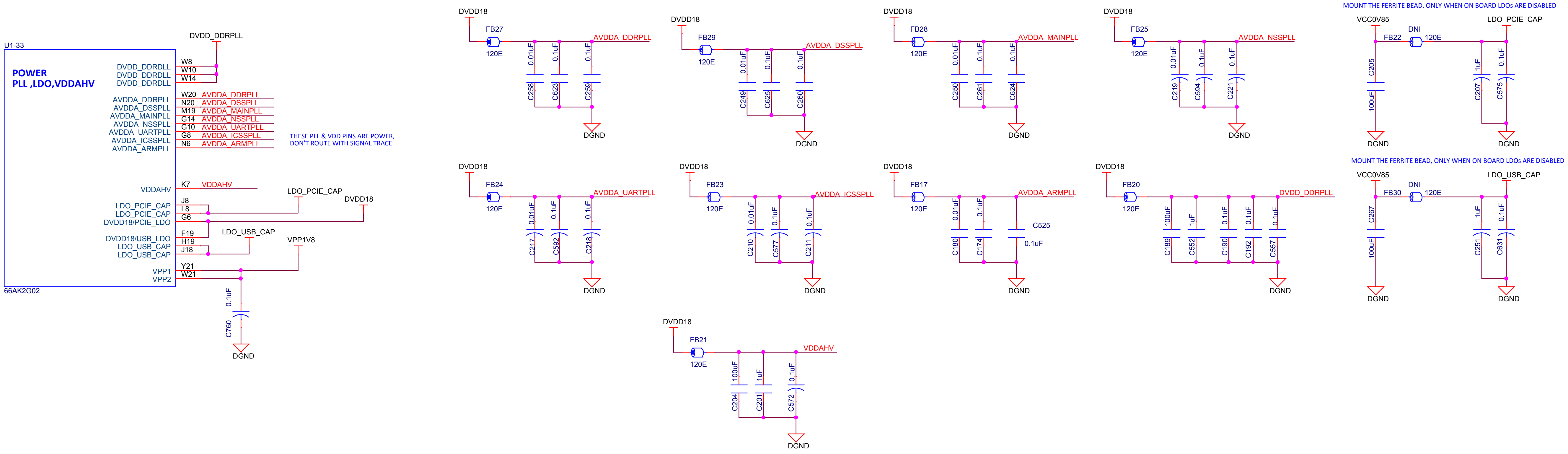
VPP POWER GENERATION



SoC POWER -CVDD,CVDD1



SoC POWER - PLL



Project :	Designed for TI by Mistral Solutions Pvt Ltd	Title	SOC POWER - CVDD,CVDD1 & PLL
K2G EVM	TEXAS INSTRUMENTS / MISTRAL	Size: C	Document Number: MS_TI_K2GEVM_SCH_REVD — Rev: D
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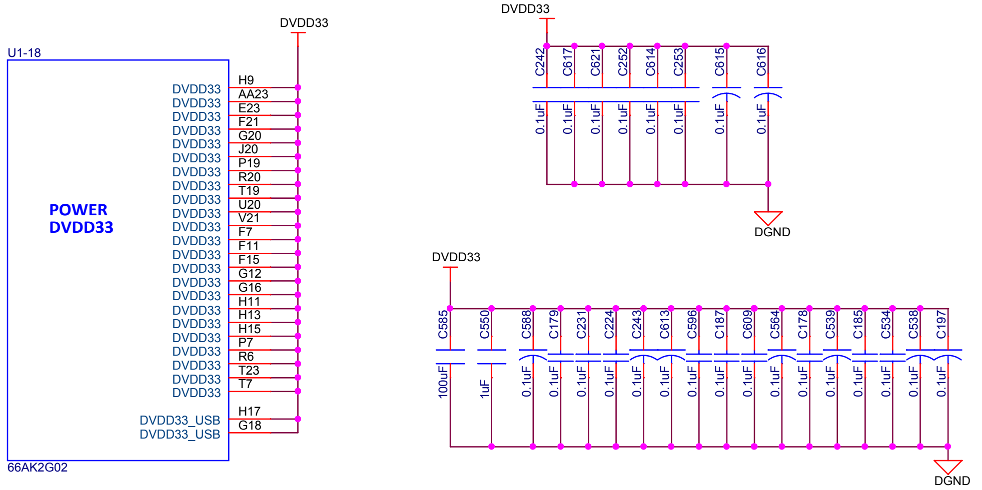
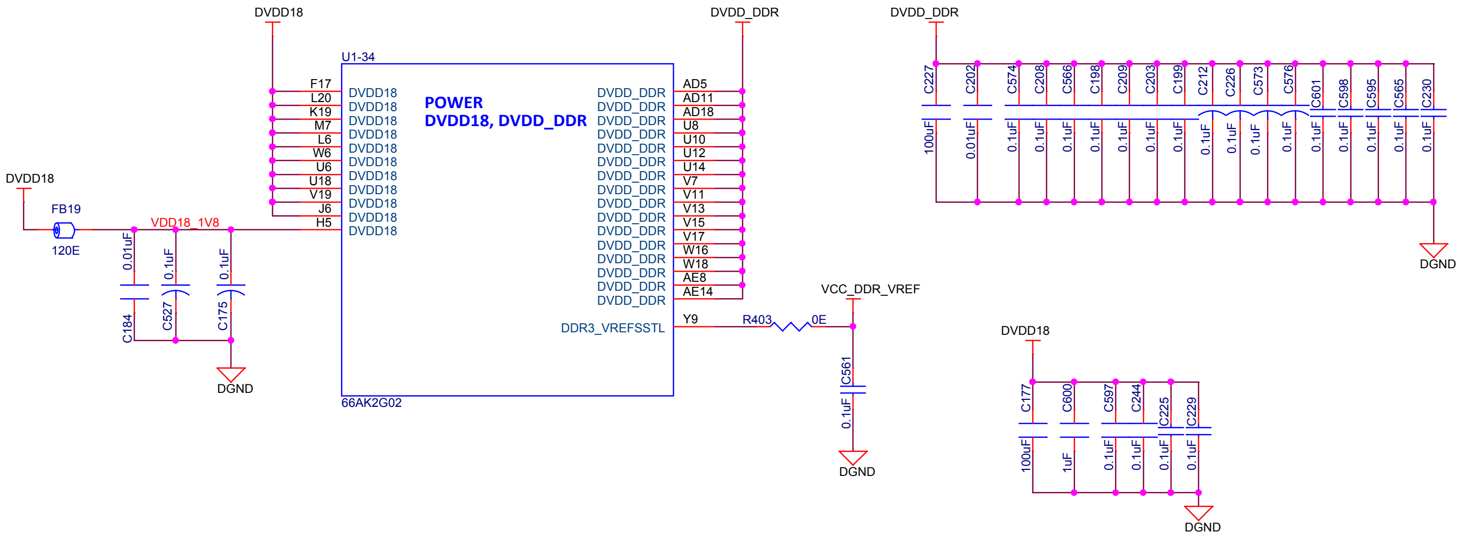
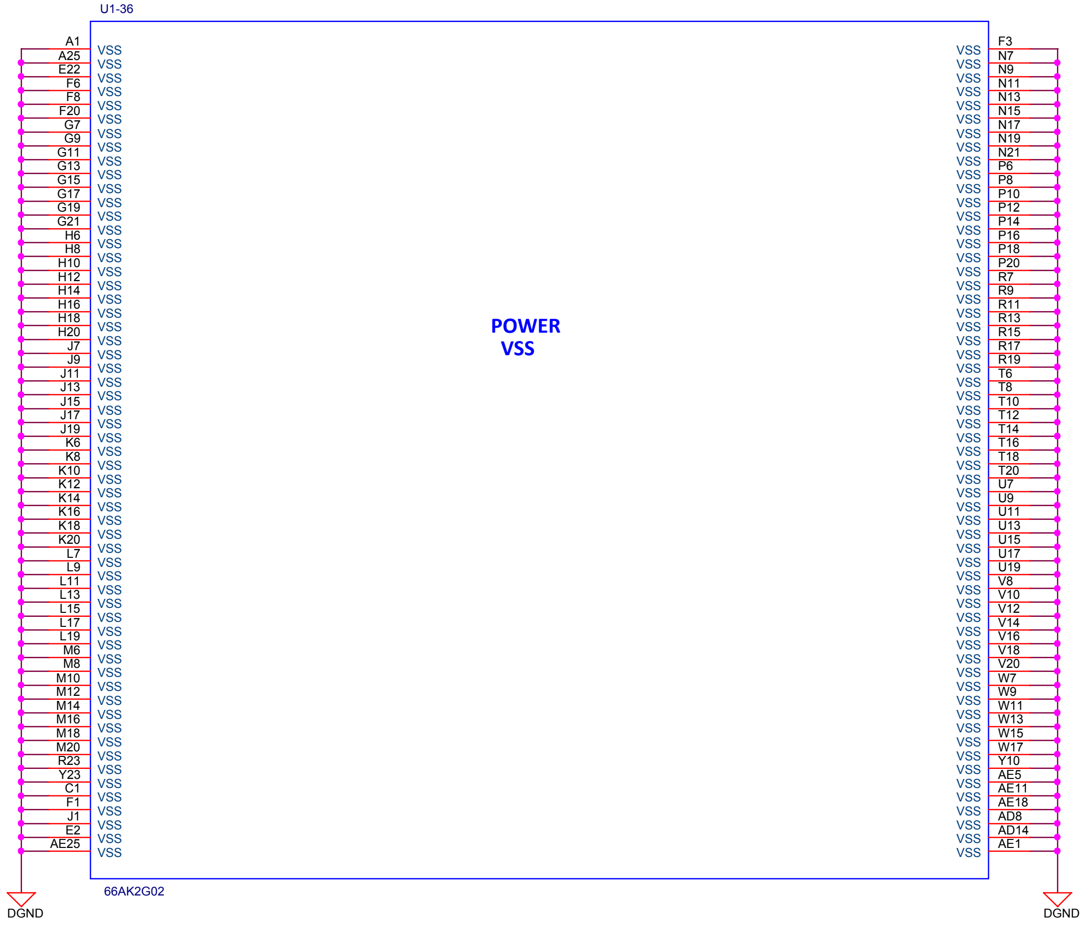
SoC POWER - DVDD33



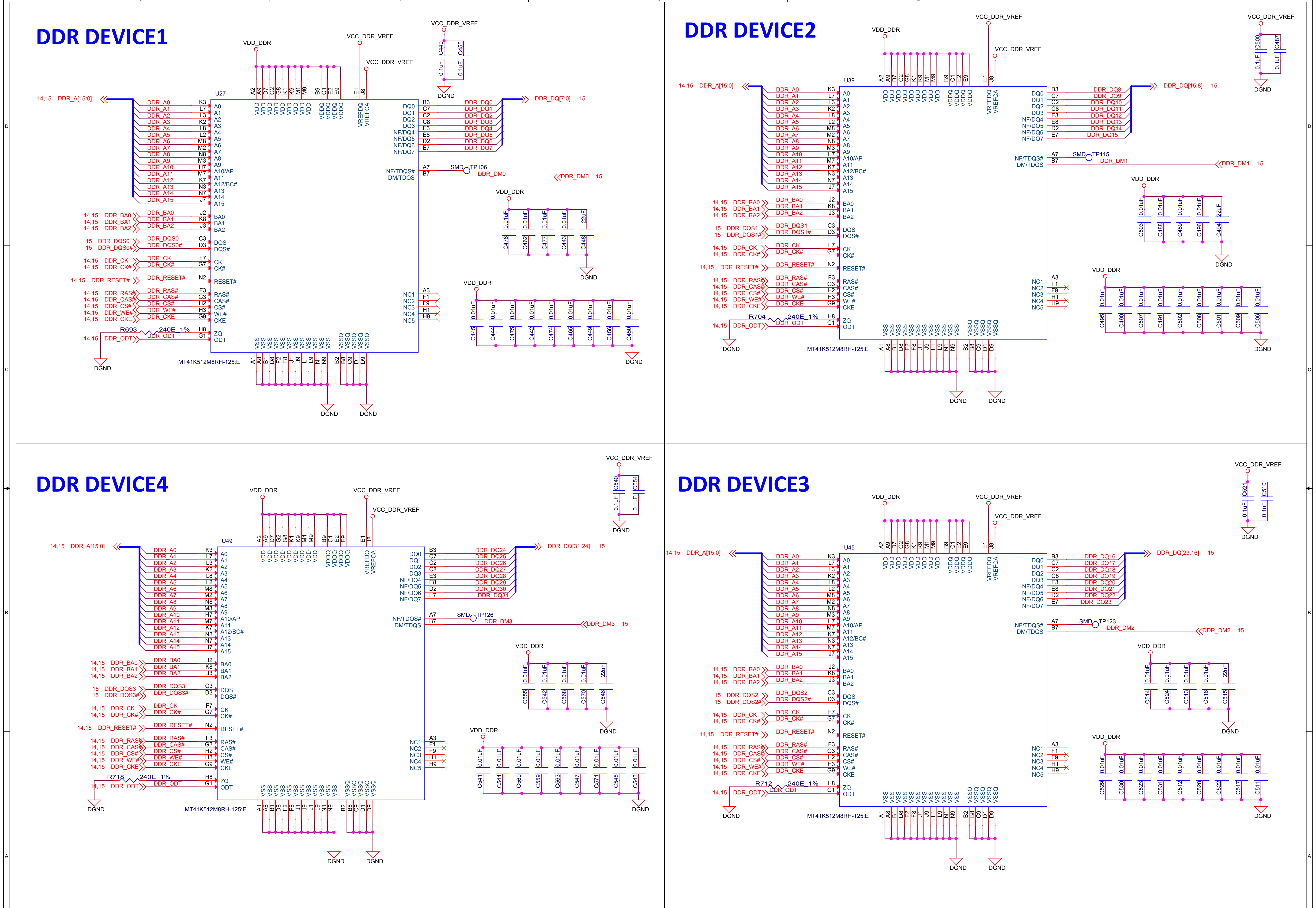
SoC POWER - DVDD18, DVDD_DDR



SoC POWER - VSS



Project : K2G EVM	Designed for TI by Mistral Solutions Pvt Ltd Texas Instruments MISTRAL	Title SOC POWER - DVDD33, DVDD18, DVDD_DDR & VSS Size C Document Number MS_TI_K2GEVM_SCH_REVD Rev D Date: Thursday, April 14, 2016 Sheet 13 of 50



Project :

K2G EVM

Designed for TI by Mistral Solutions Pvt Ltd

TEXAS INSTRUMENTS

MISTRAL

Title	DDR3L DEVICES	
Size	Document Number	Rev
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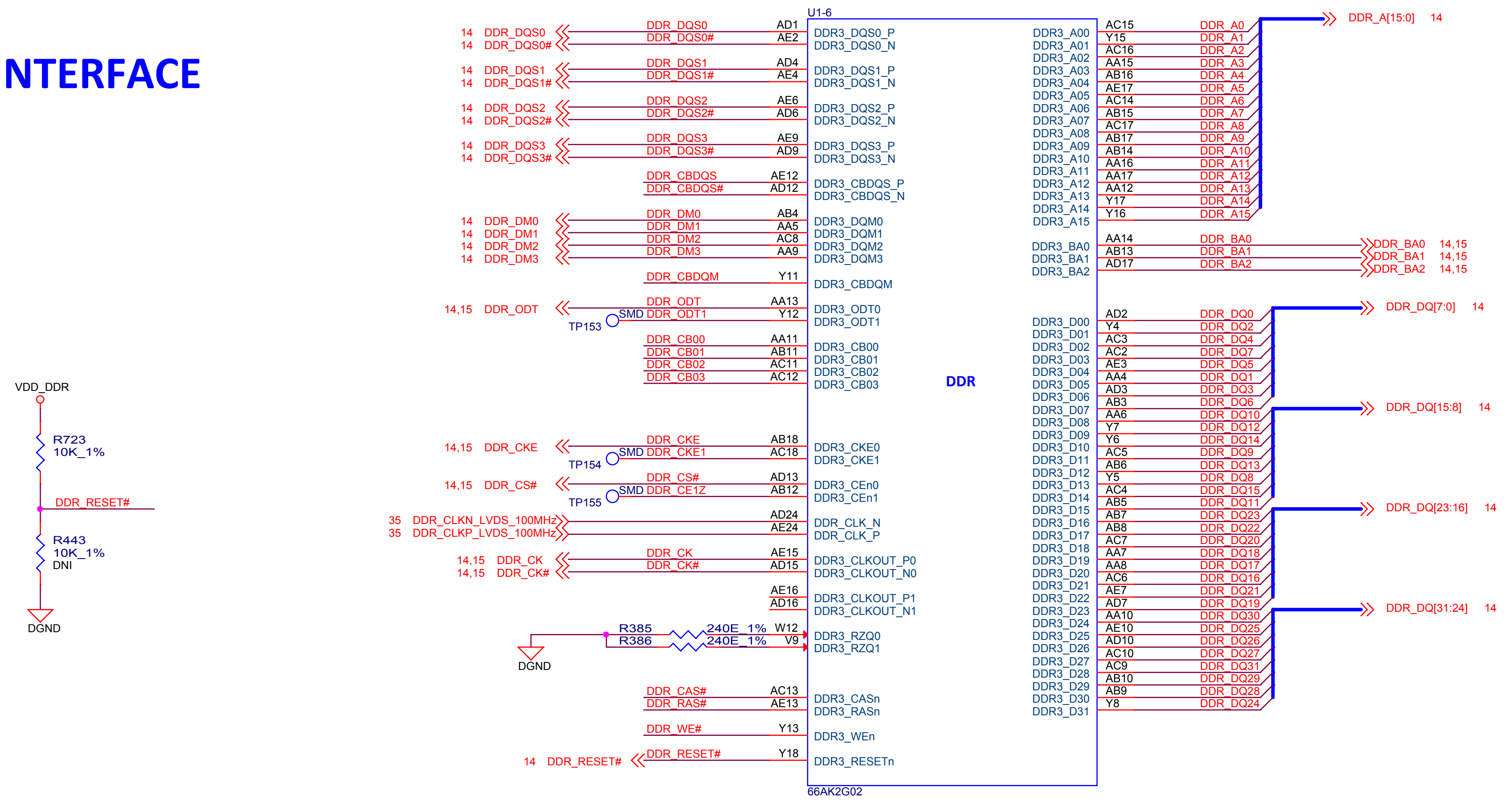
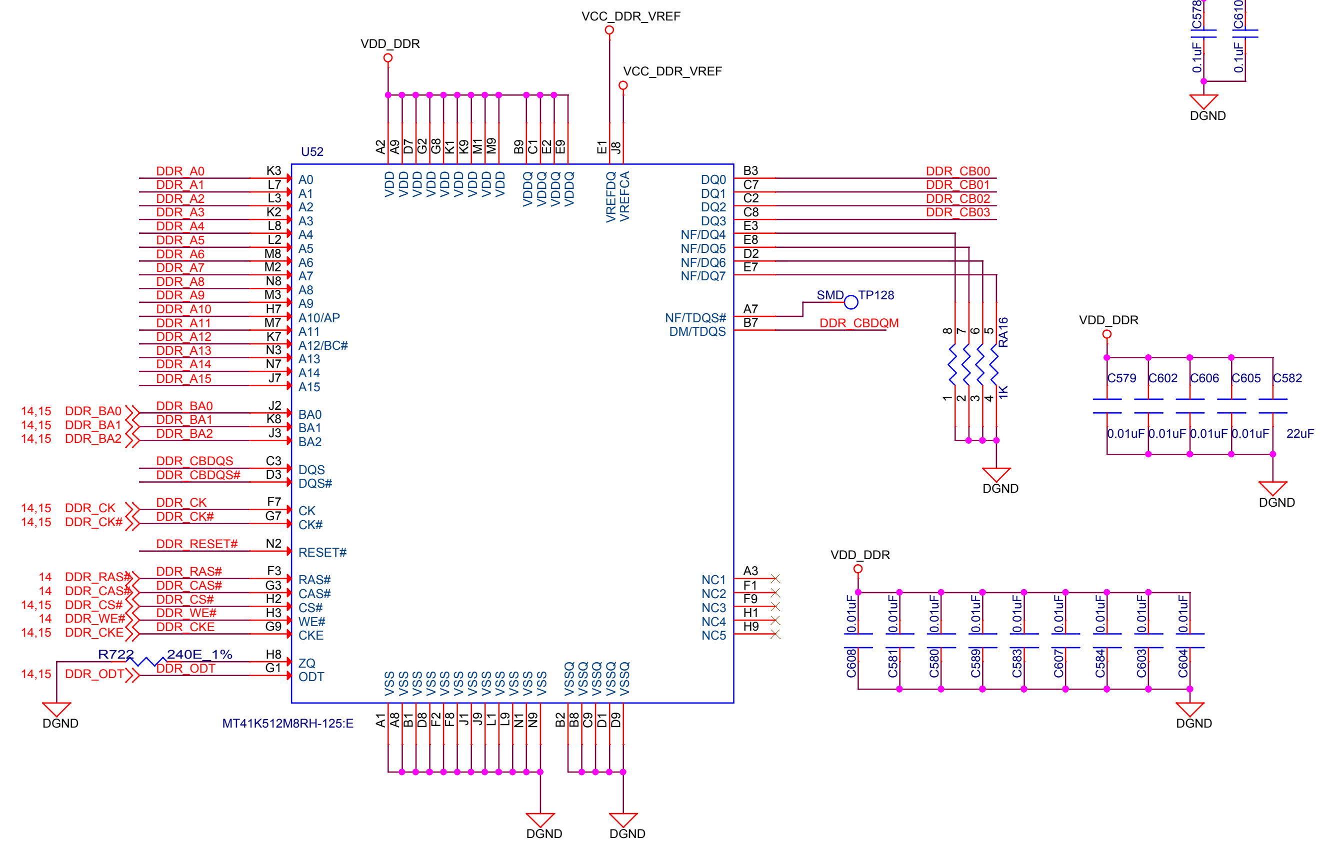
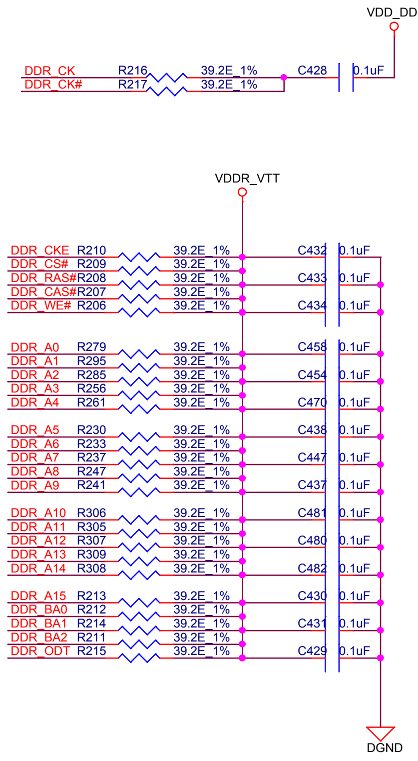
SoC DDR INTERFACE



ECC DEVICE



DDR TERMINATION



Project :	Designed for TI by Mistral Solutions Pvt Ltd	Title	SOC DDR MODULE, ECC & TERMINATION
K2G EVM		Size C	Document Number MS_TI_K2GEVM_SCH_REVD	Rev D
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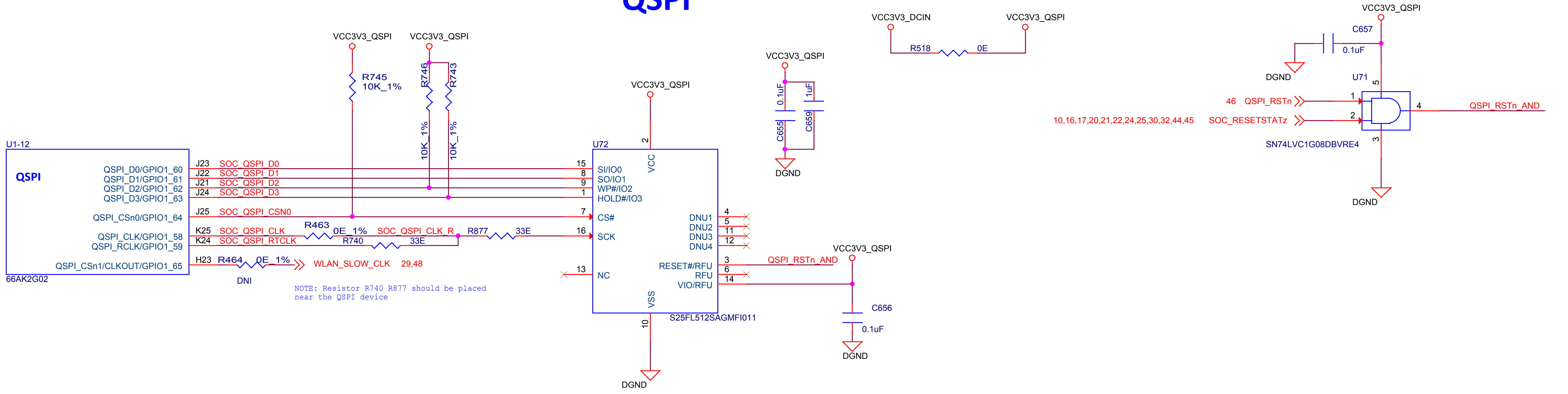
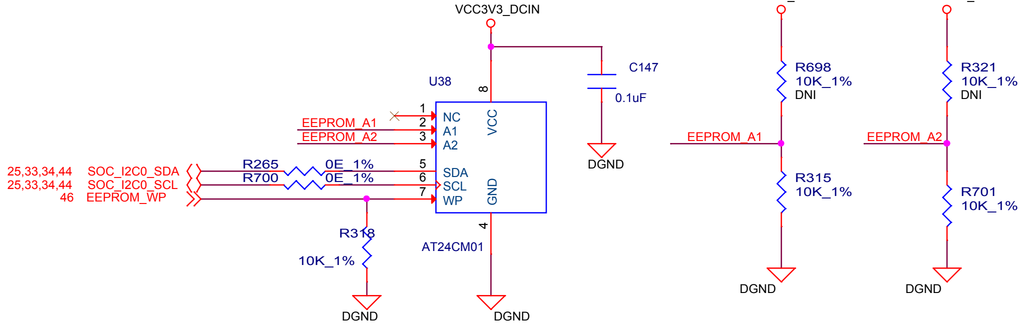
QSPI

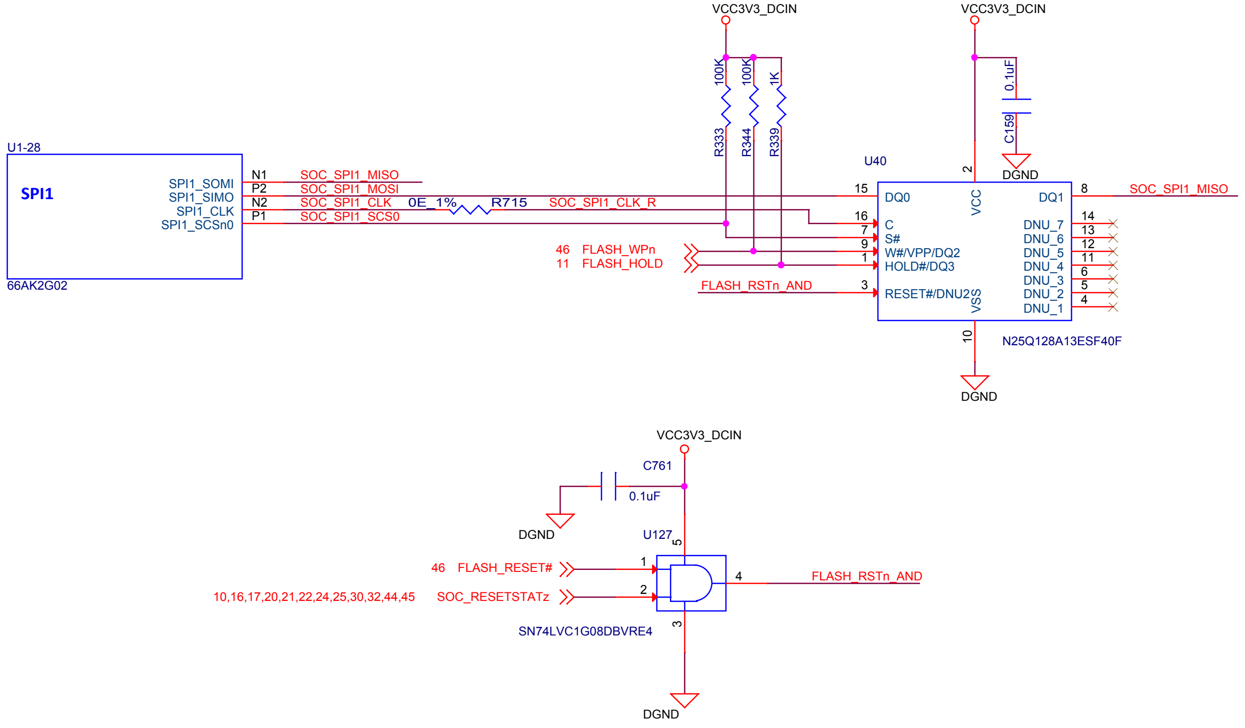


I2C EEPROM FLASH



I2C ADDRESS: 0x50 (PAGE 0), 0x51 (PAGE 1)

SPI NORFLASH



Project :

K2G EVM

Designed for TI by Mistral Solutions Pvt Ltd

Title QSPI, I2C & SPI EEPROM FLASH

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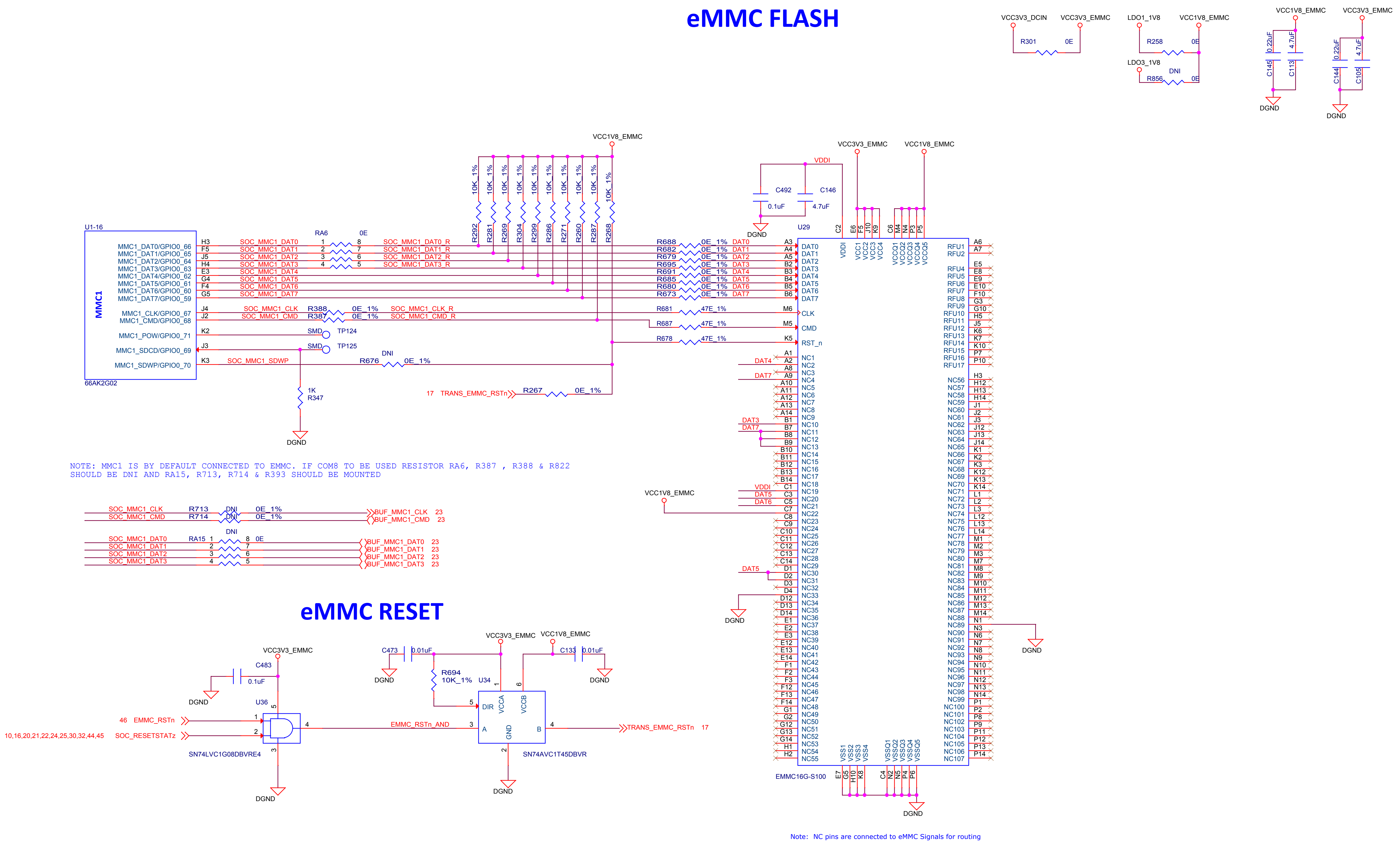
eMMC FLASH



NOTE: MMC1 IS BY DEFAULT CONNECTED TO EMMC. IF COM8 TO BE USED RESISTOR RA6, R387 , R388 & R822 SHOULD BE DNI AND RA15, R713, R714 & R393 SHOULD BE MOUNTED

eMMC RESET

Note: NC pins are connected to eMMC Signals for routing

Project :	Designed for TI by Mistral Solutions Pvt Ltd	Title	EMMC FLASH
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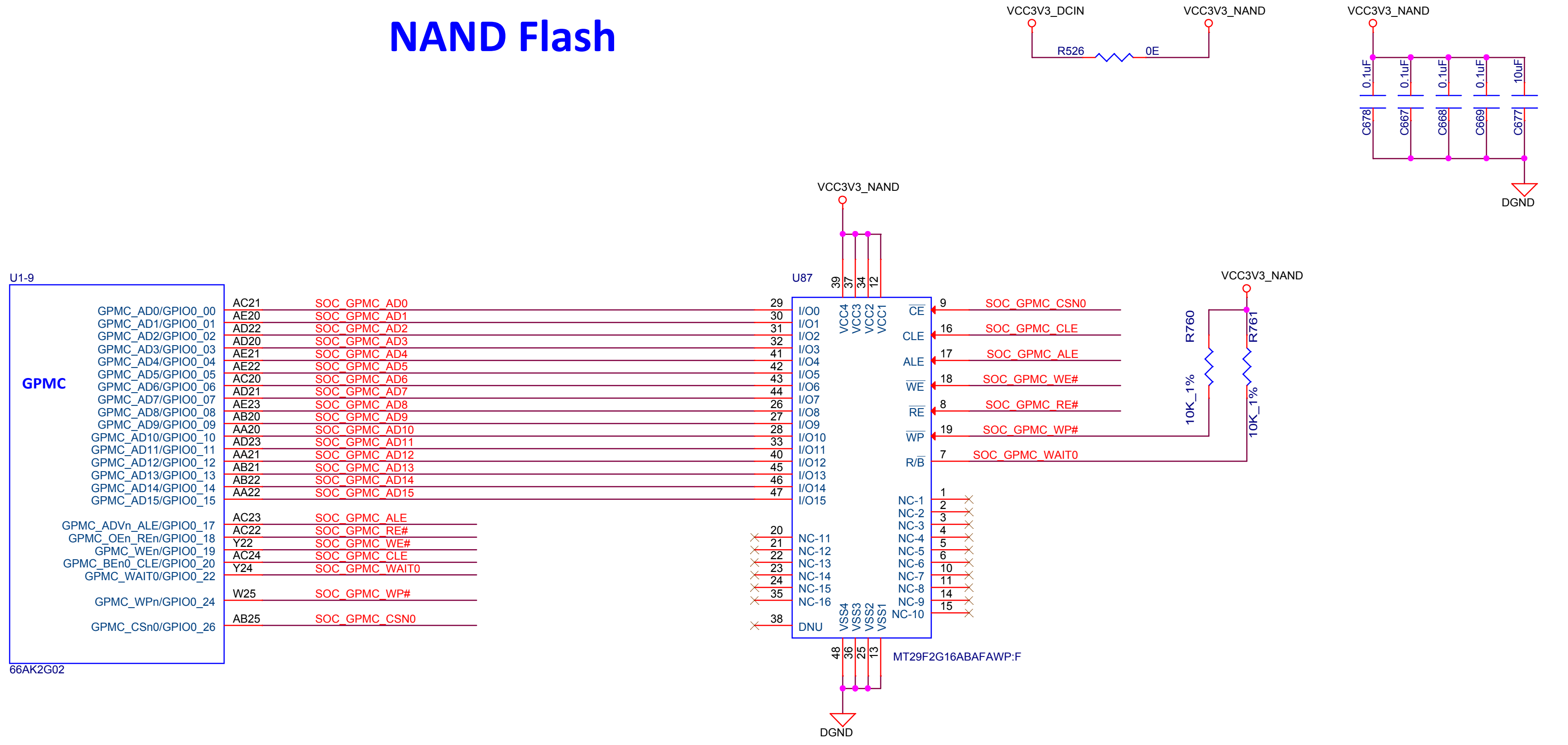
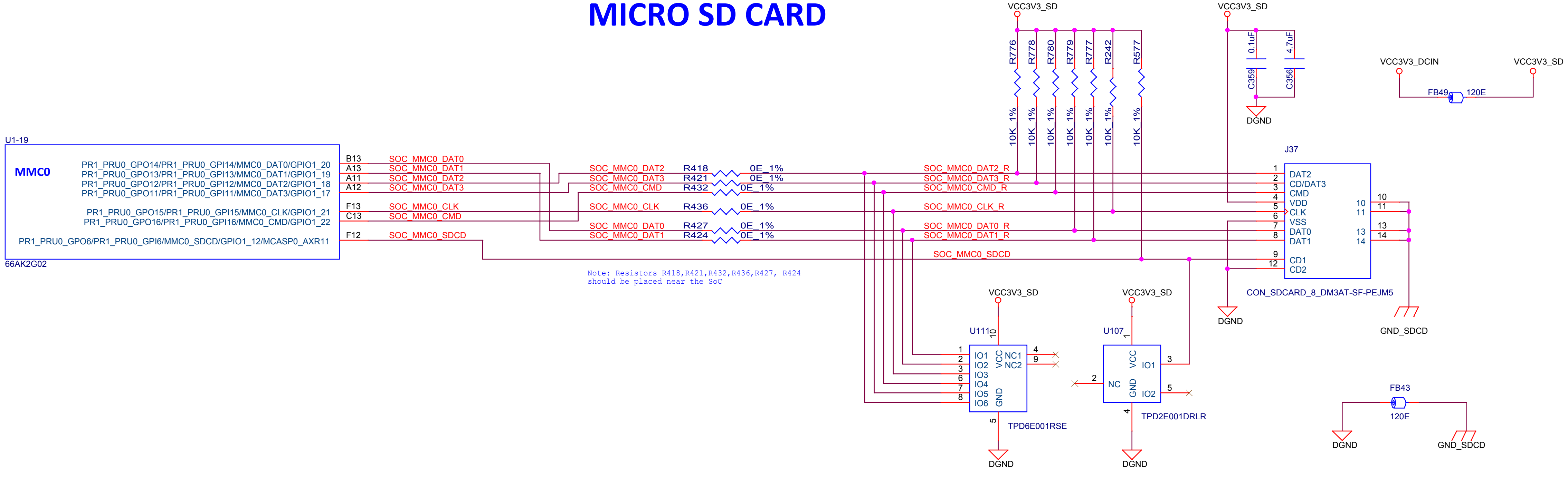
NAND Flash



MICRO SD CARD



Note: Resistors R418,R421,R432,R436,R427, R424 should be placed near the SoC

Project :

K2G EVM

Designed for TI by Mistral Solutions Pvt Ltd

Texas Instruments

MISTRAL

Title NAND FLASH & SD CARD

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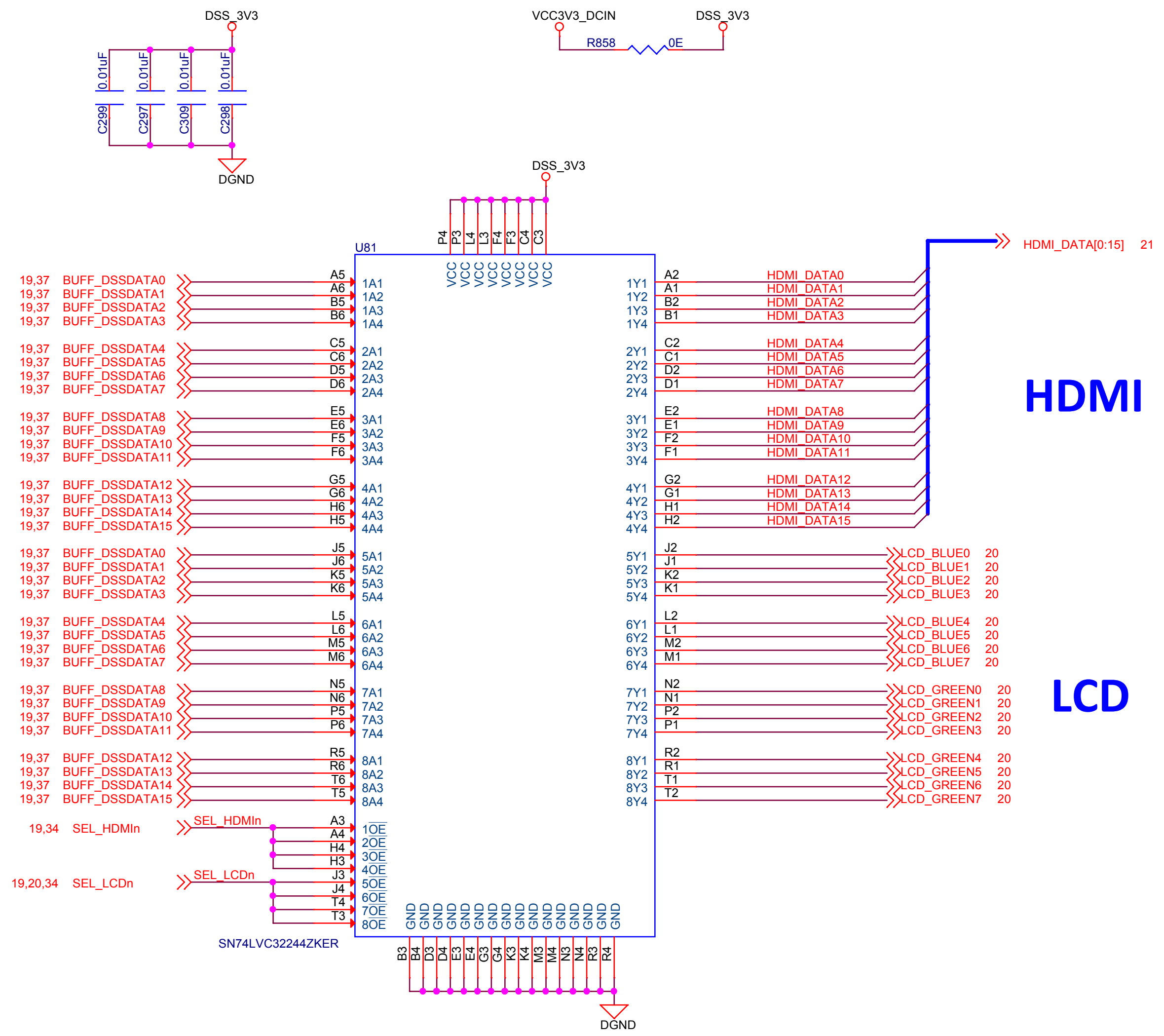
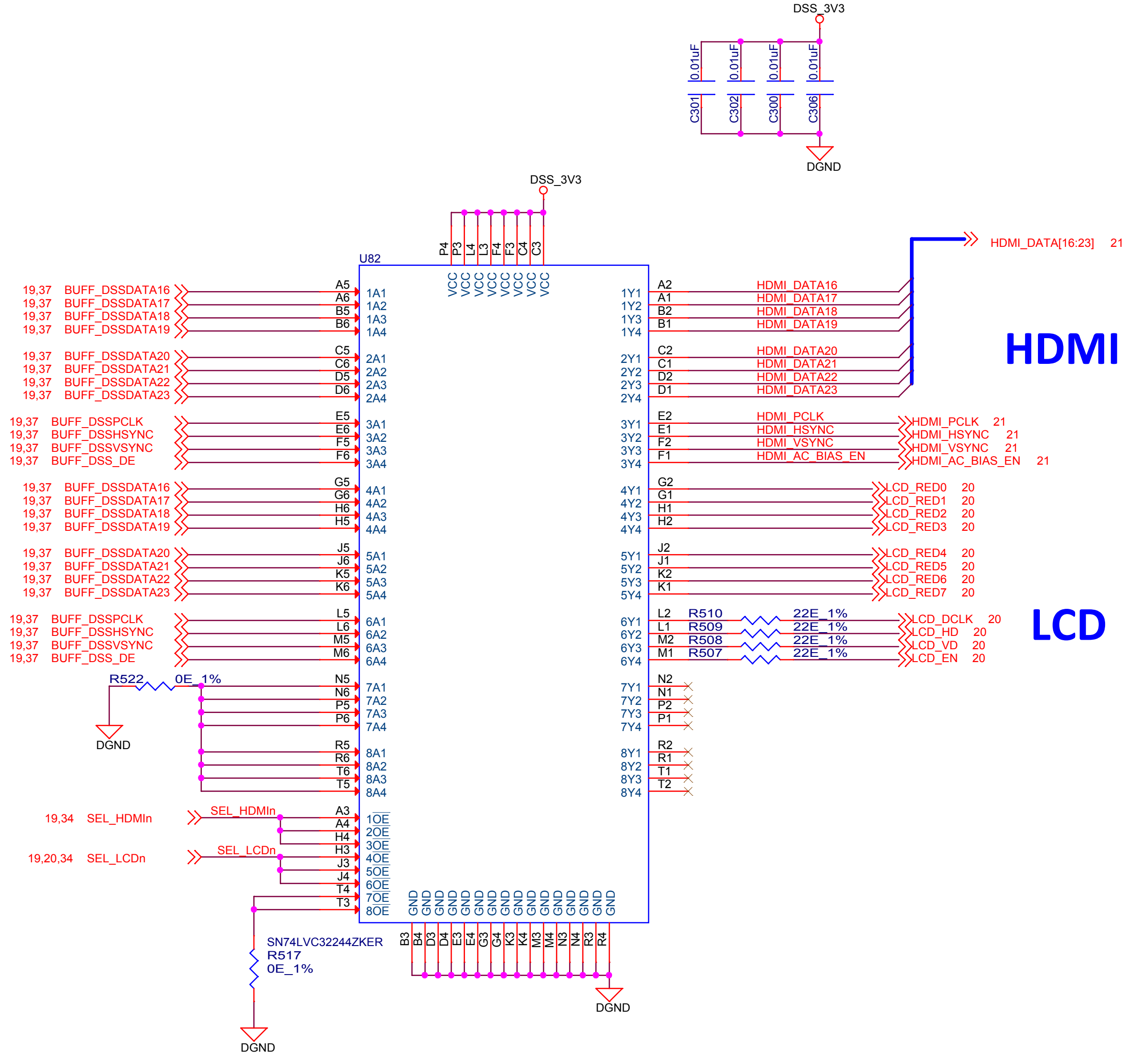
DSS BUFFER 1



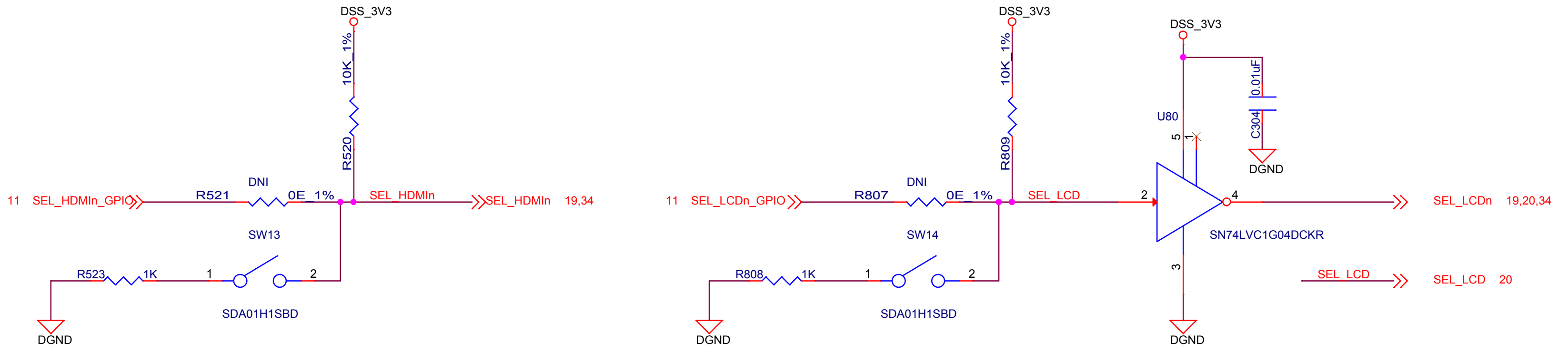
DSS BUFFER 2



SELECTION LCD AND HDMI

HDMI/LCD SWITCH SELECTION

SW14	SW13	DEVICE
ON	ON	HDMI ON
OFF	OFF	LCD ON
OFF	ON	NOT VALID
ON	OFF	NOT VALID



Project :	Designed for TI by Mistral Solutions Pvt Ltd	Title DSS BUFFER SECTION
K2G EVM		Size C · Document Number MS_TI_K2GEVM_SCH_REVD · Rev D
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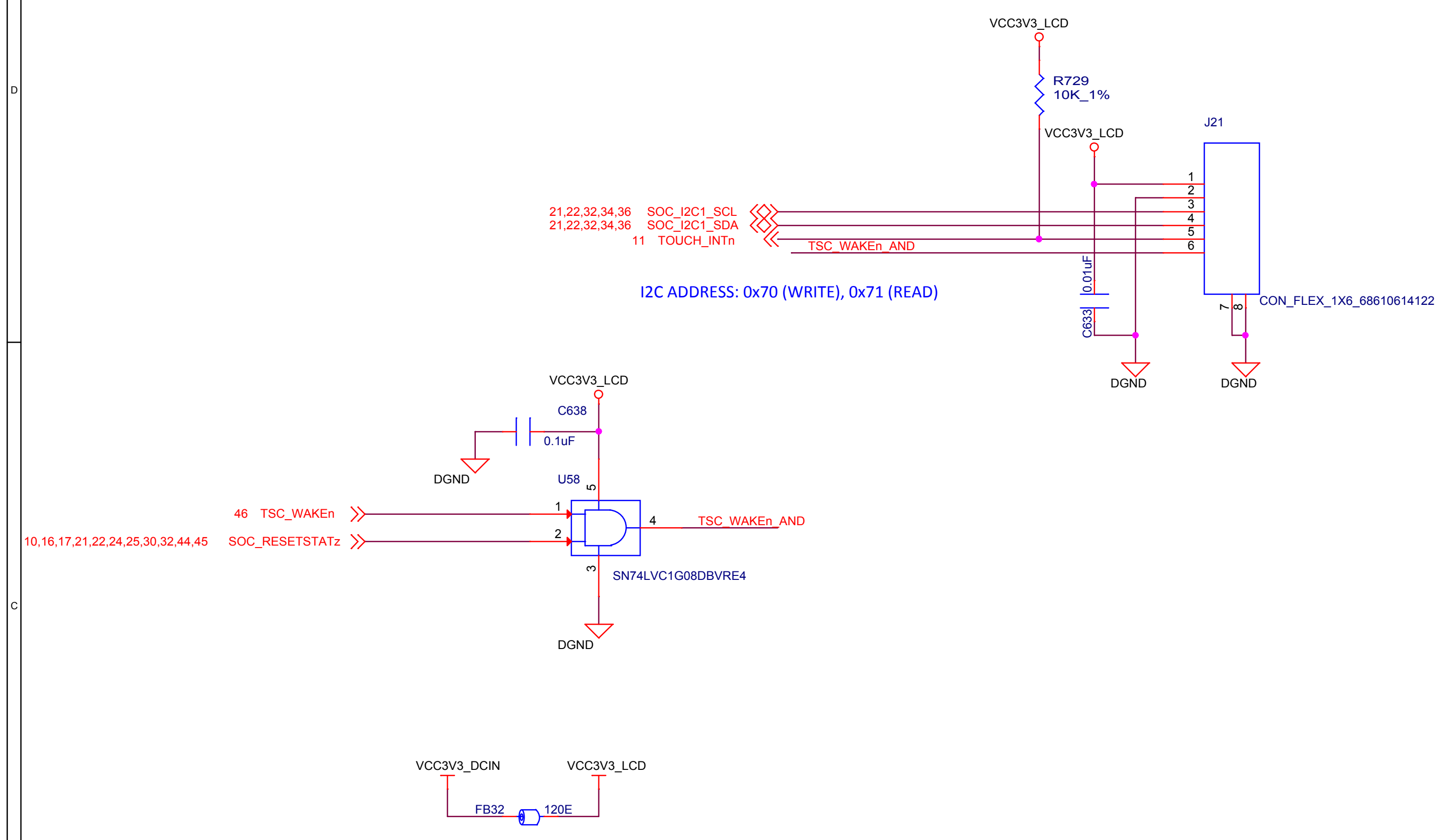
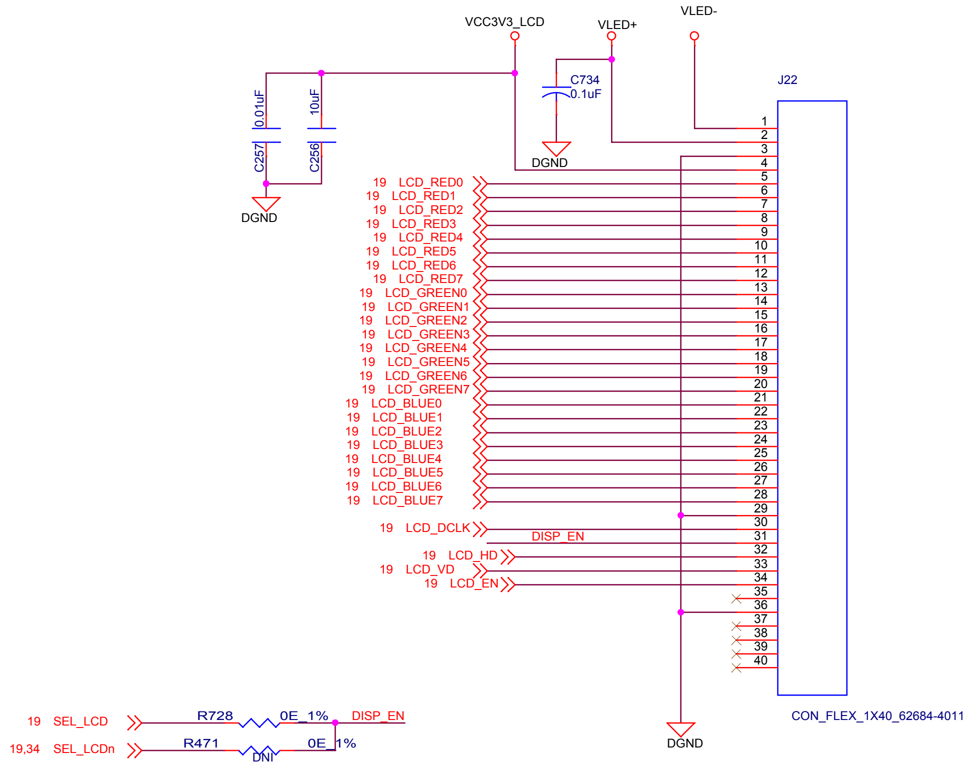
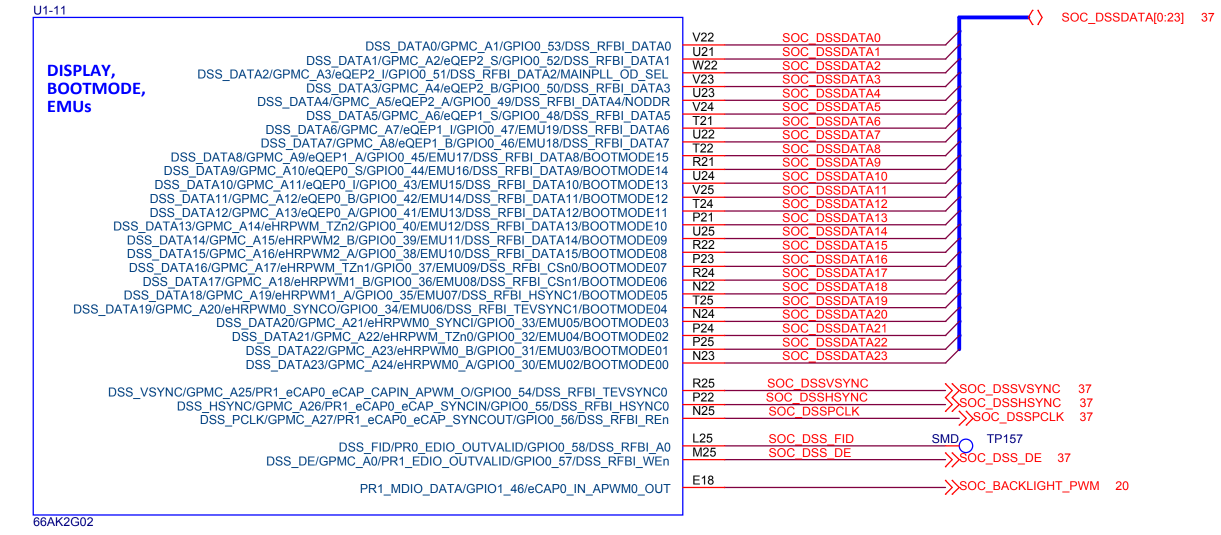
TOUCH SCREEN CONNECTOR



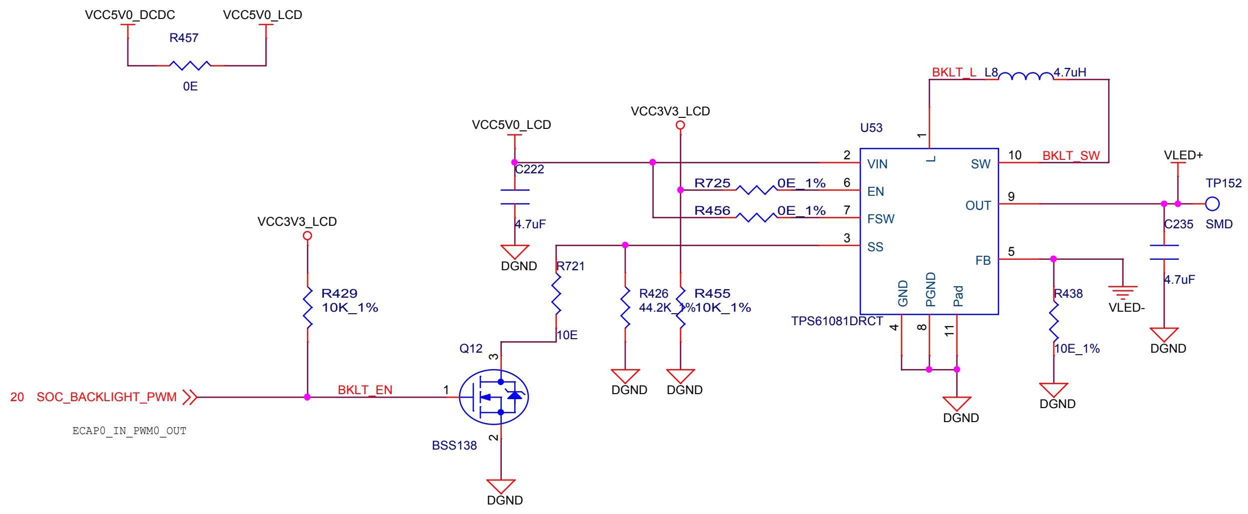
LCD CONNECTOR



SOC DSS



BACKLIGHT POWER



Project :

K2G EVM

Designed for TI by Mistral Solutions Pvt Ltd

Texas Instruments

MISTRAL

Title	LCD & TOUCH SCREEN
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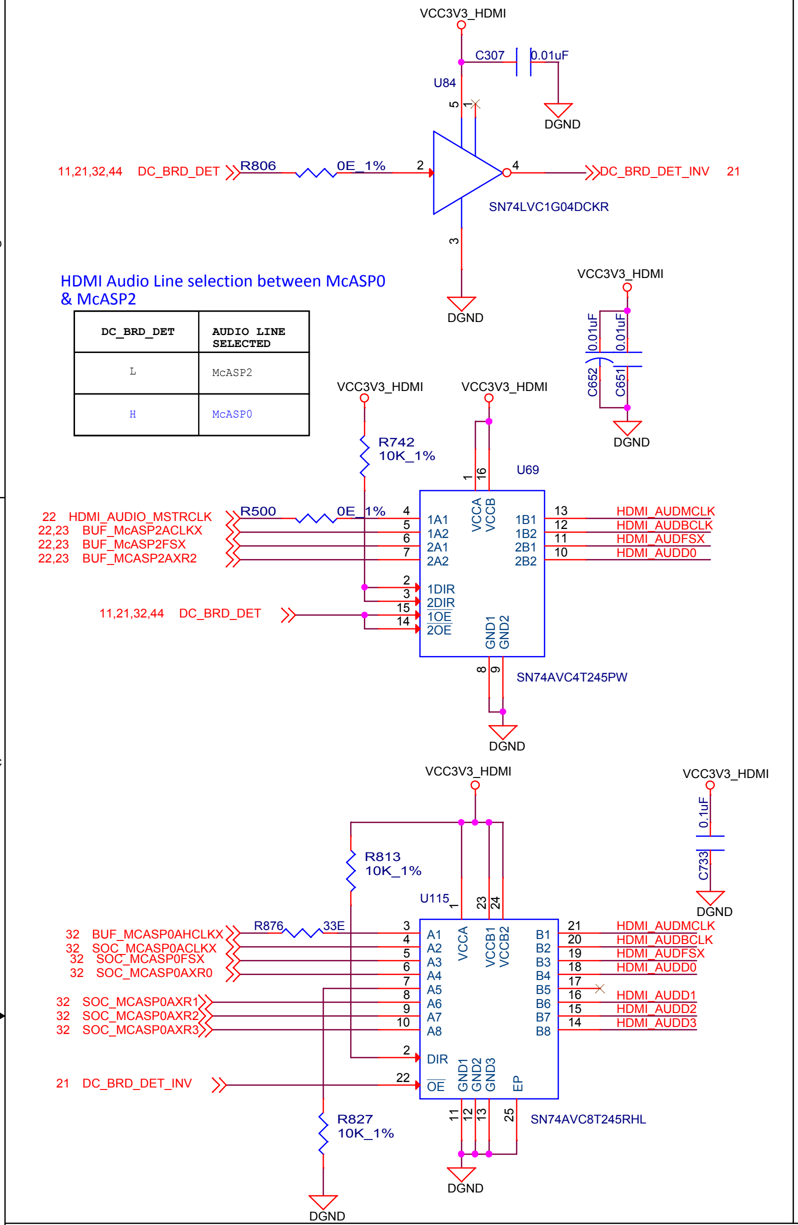
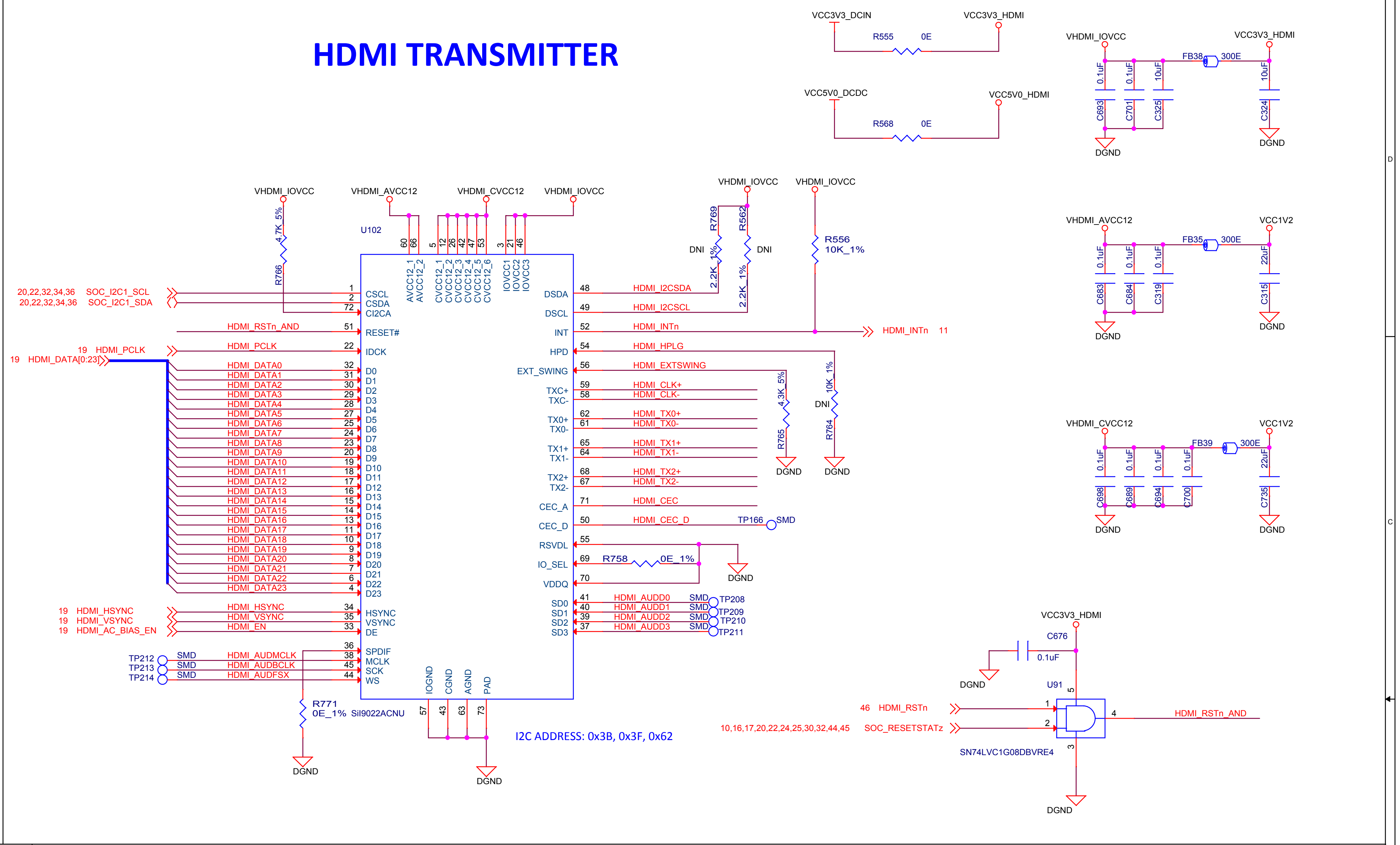


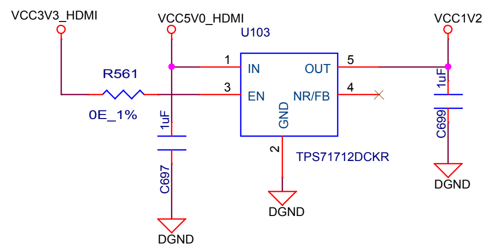
HDMI Audio Line selection between McASP0 & McASP2

DC_BRD_DET	AUDIO LINE SELECTED
L	McASP2
H	McASP0

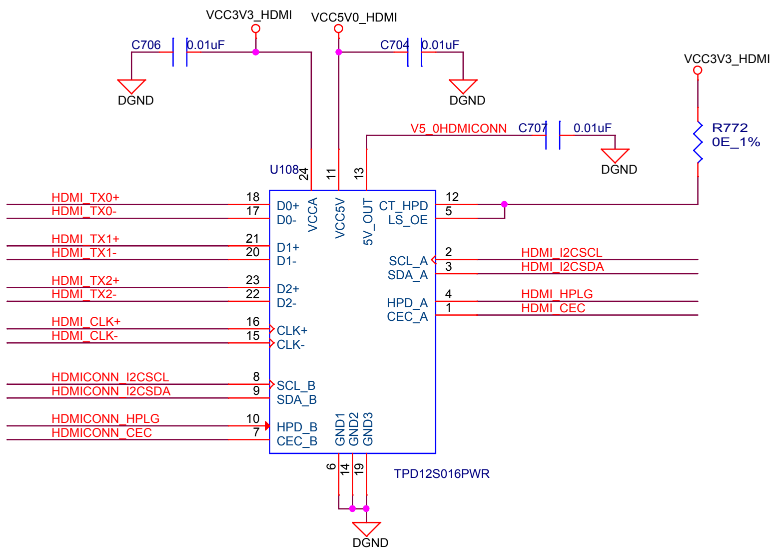
HDMI TRANSMITTER



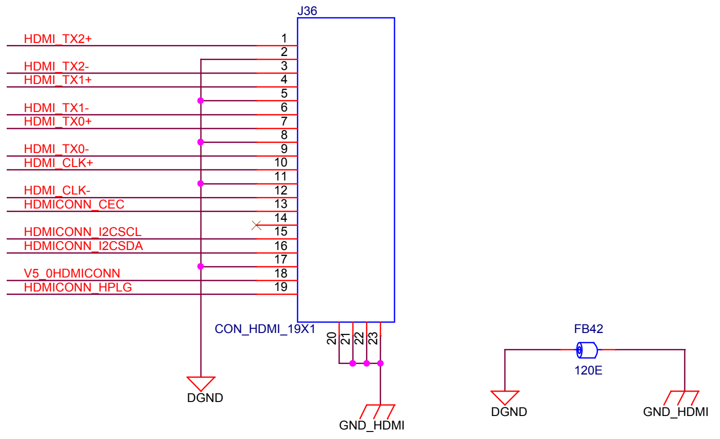
HDMI 1.2V GENERATION



HDMI ESD DEVICE



HDMI CONNECTOR



NOTE:
TPD12S016PWR has integrated pullup or pulldown resistors on the
I2C and HPD lines hence no external pullup or pulldown required.

Project :	Designed for TI by Mistral Solutions Pvt Ltd	Title	HDMI TRASMITTER
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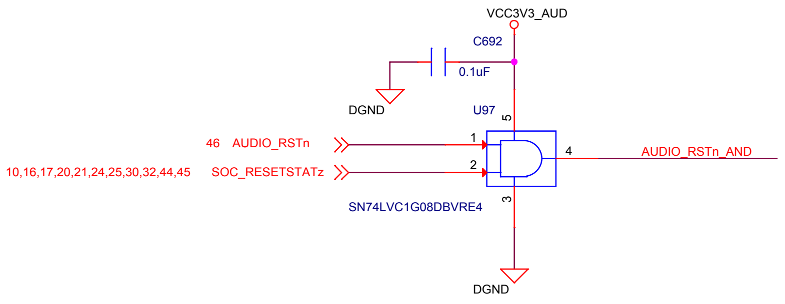
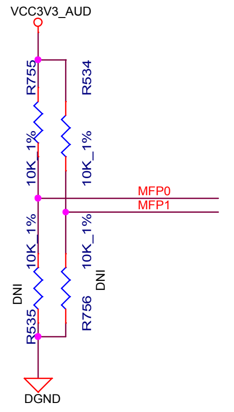
AUDIO CODEC RESET

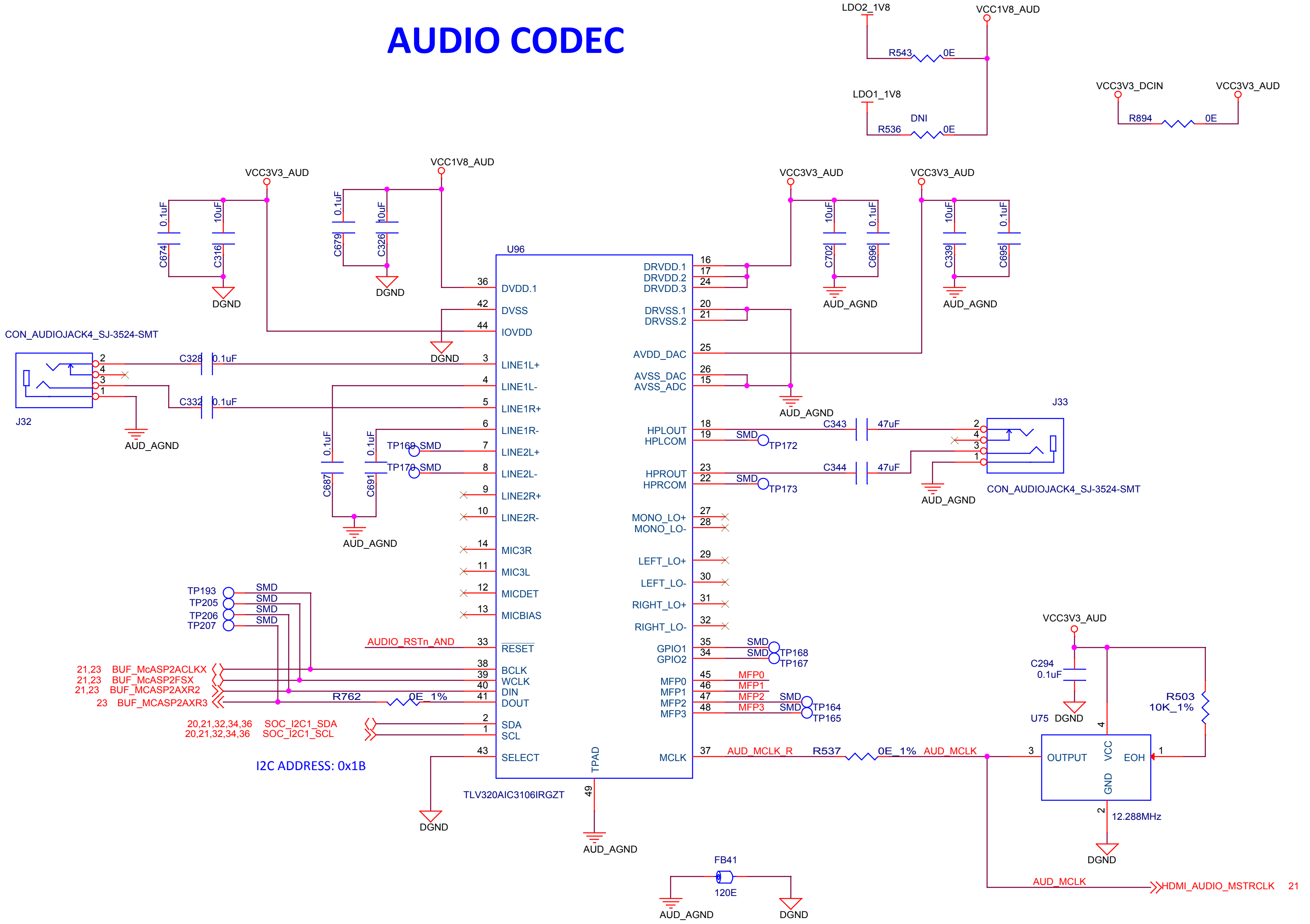


CODEC I2C ADDRESS SELECTION

MFP0	MFP1	ADDRESS
L	L	1A
L	H	1B
H	L	1C
H	**H**	**1D**



AUDIO CODEC



Project :

K2G EVM

Designed for TI by Mistral Solutions Pvt Ltd

Title AUDIO CODEC

Size C
Document Number MS_TI_K2GEVM_SCH_REVD
Rev D

Date: Wednesday, April 13, 2016
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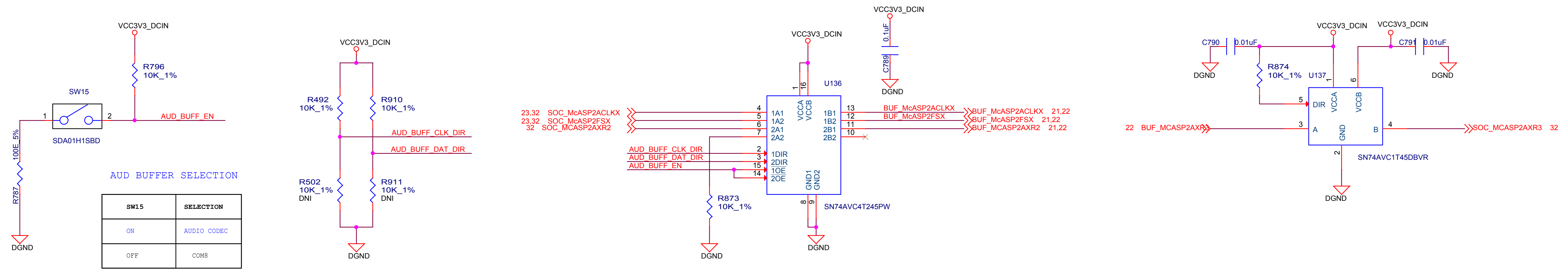
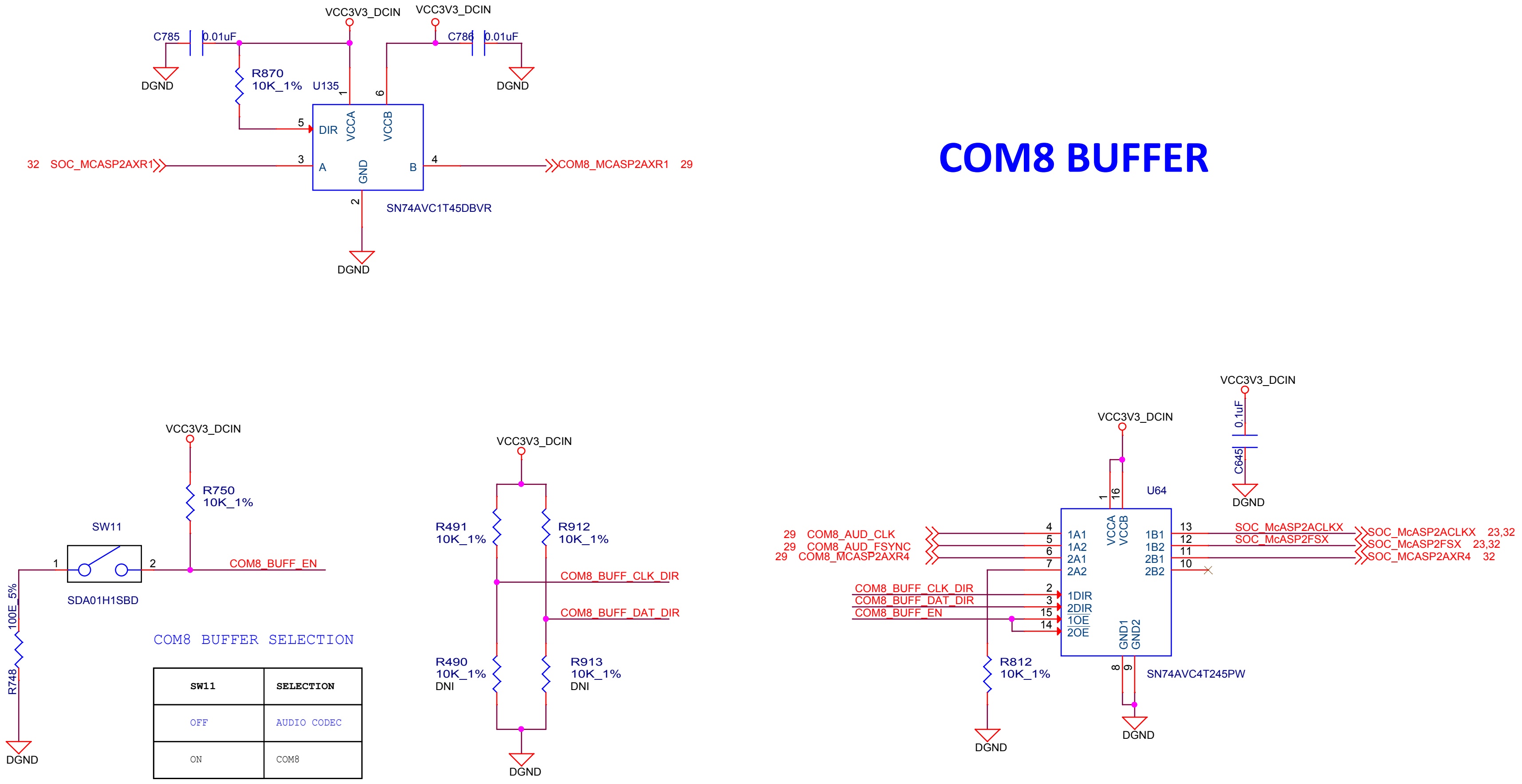
AUDIO BUFFER



AUD BUFFER SELECTION

SW15	**SELECTION**
ON	AUDIO CODEC
OFF	COM8

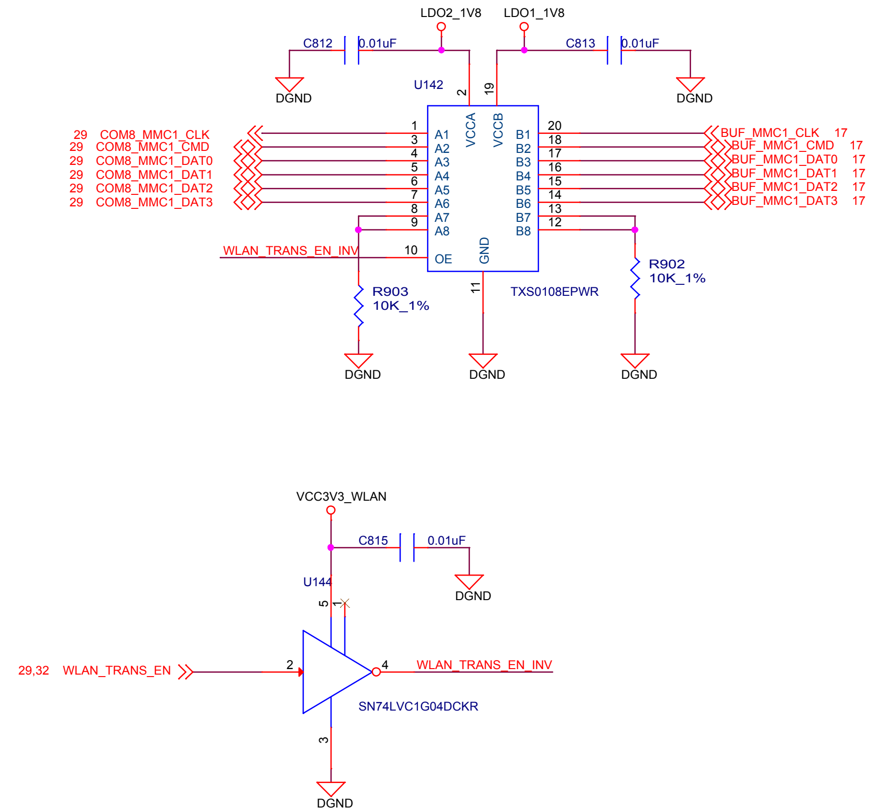
COM8 BUFFER



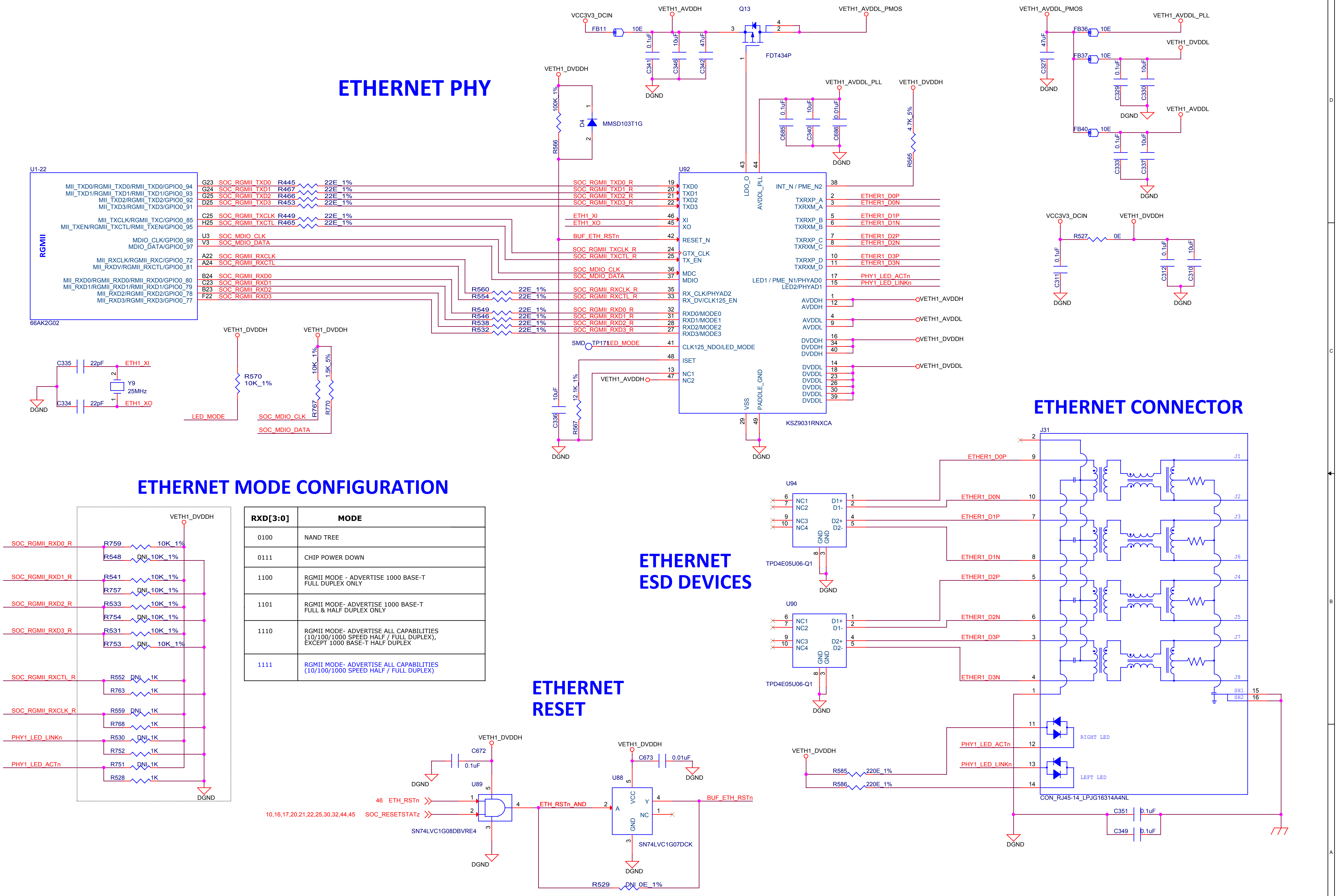
COM8 BUFFER SELECTION

SW11	**SELECTION**
OFF	AUDIO CODEC
ON	COM8

COM8 SDIO BUFFER



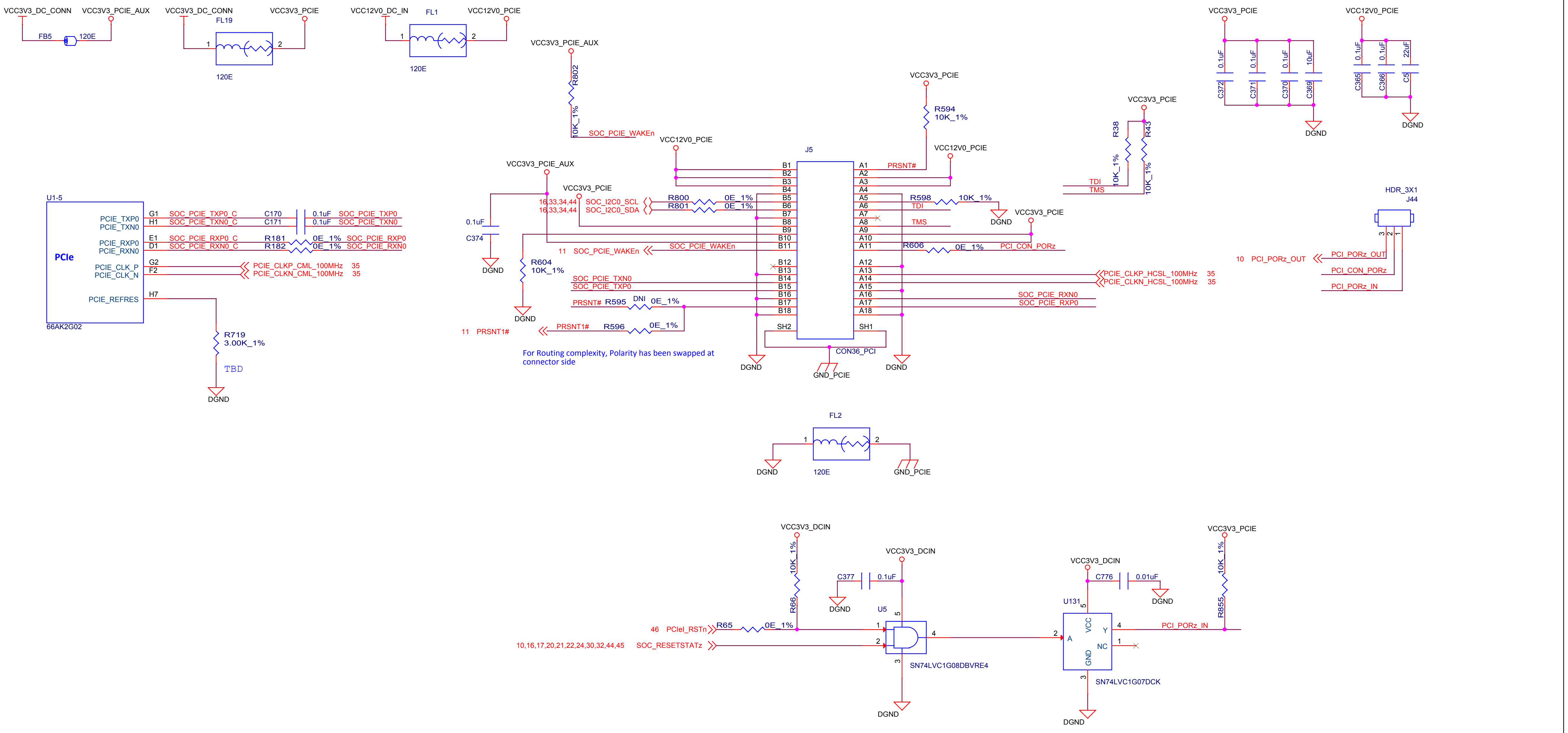
Project :	Designed for TI by Mistral Solutions Pvt Ltd	Title	MCASP2 BUFFERS FOR COM8 , HDMI& AUDIO CODEC		
K2G EVM		Size	Document Number		Rev
		C	MS_TI_K2GEVM_SCH_REVD		D
		Date:	Wednesday, April 13, 2016	Sheet	23 of 50



RXD[3:0]	MODE
0100	NAND TREE
0111	CHIP POWER DOWN
1100	RGMII MODE - ADVERTISE 1000 BASE-T FULL DUPLEX ONLY
1101	RGMII MODE- ADVERTISE 1000 BASE-T FULL & HALF DUPLEX ONLY
1110	RGMII MODE- ADVERTISE ALL CAPABILITIES (10/100/1000 SPEED HALF / FULL DUPLEX), EXCEPT 1000 BASE-T HALF DUPLEX
1111	RGMII MODE- ADVERTISE ALL CAPABILITIES (10/100/1000 SPEED HALF / FULL DUPLEX)

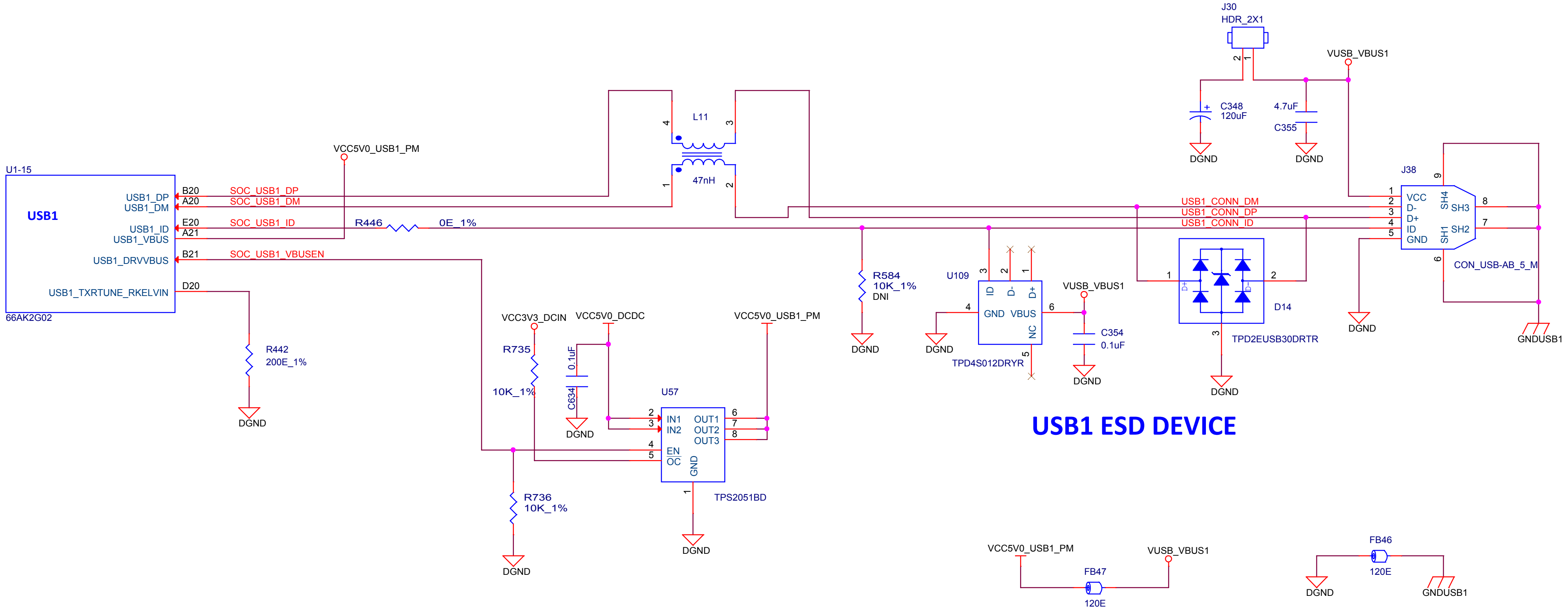
Project : K2G EVM	Designed for TI by Mistral Solutions Pvt Ltd Texas Instruments MISTRAL	Title ETHERNET PHY Size C Document Number MS_TI_K2GEVM_SCH_REVD Rev D Date: Thursday, April 14, 2016 Sheet 24 of 50

PCI EXPRESS x1 CONNECTOR

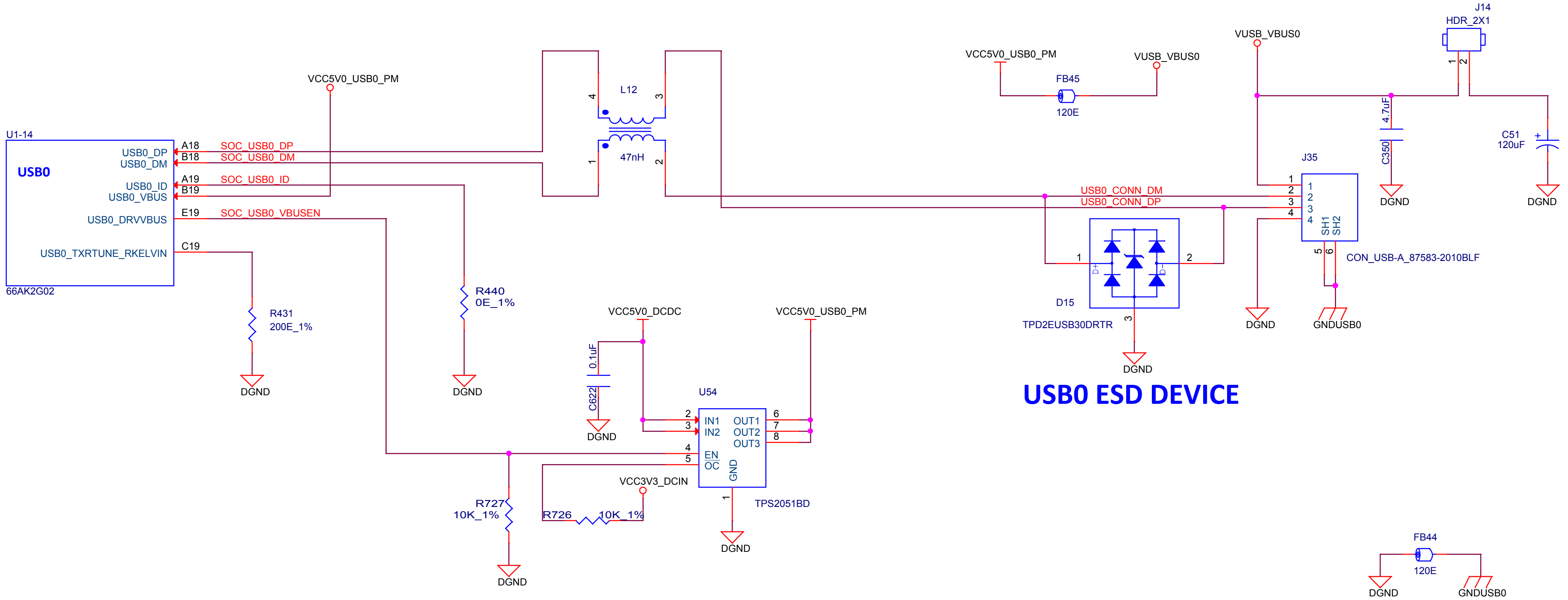


Project :	Designed for TI by Mistral Solutions Pvt Ltd	Title PCIe x1 CONNECTOR
K2G EVM	TEXAS INSTRUMENTS MISTRAL	Size C; Document Number MS_TI_K2GEVM_SCH_REVD; Rev D
		Date: Thursday, April 14, 2016; Sheet 25 of 50

USB1 DUAL ROLE

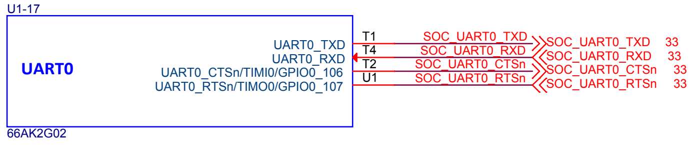


USB0 HOST

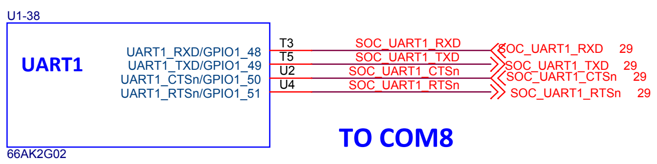


Project :	Designed for TI by Mistral Solutions Pvt Ltd	Title	USB DUAL ROLE & HOST			
K2G EVM		Size	Document Number			Rev
		C	MS_TI_K2GEVM_SCH_REVD			D
		Date:	Thursday, April 14, 2016	Sheet	26 of	50

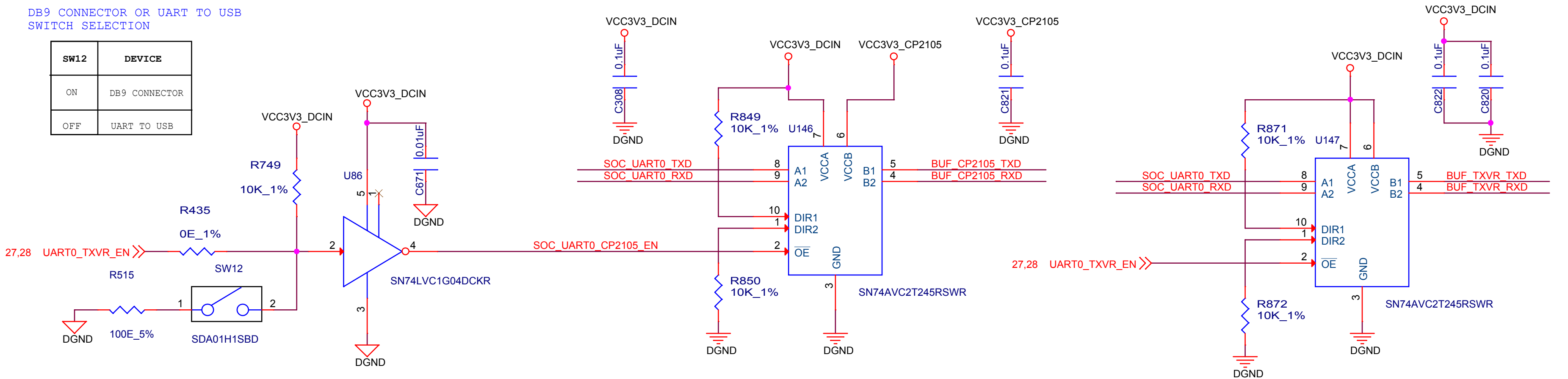
SoC UART0



SoC UART1

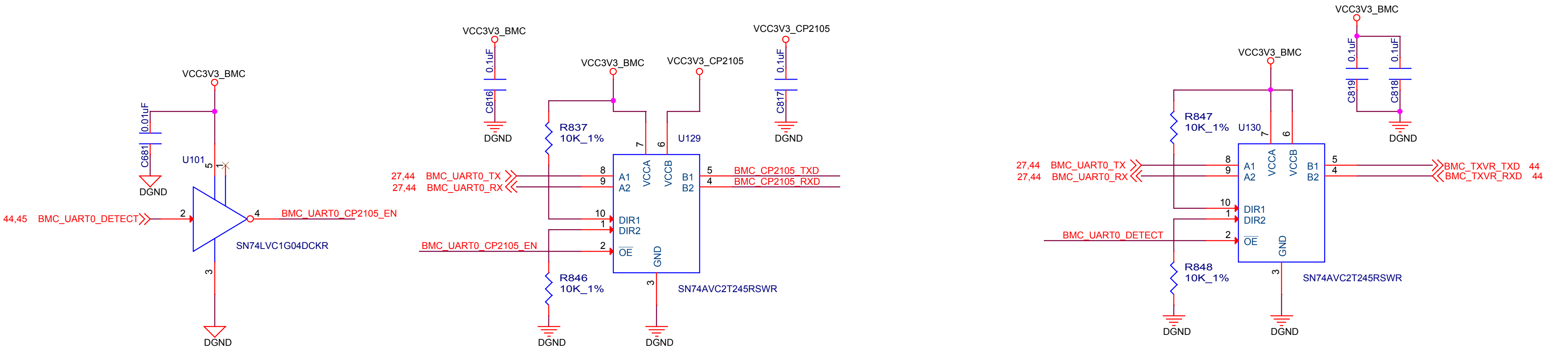


SoC_UART0 MUX: CP2105 or DB9



SW12	DEVICE
ON	DB9 CONNECTOR
OFF	UART TO USB

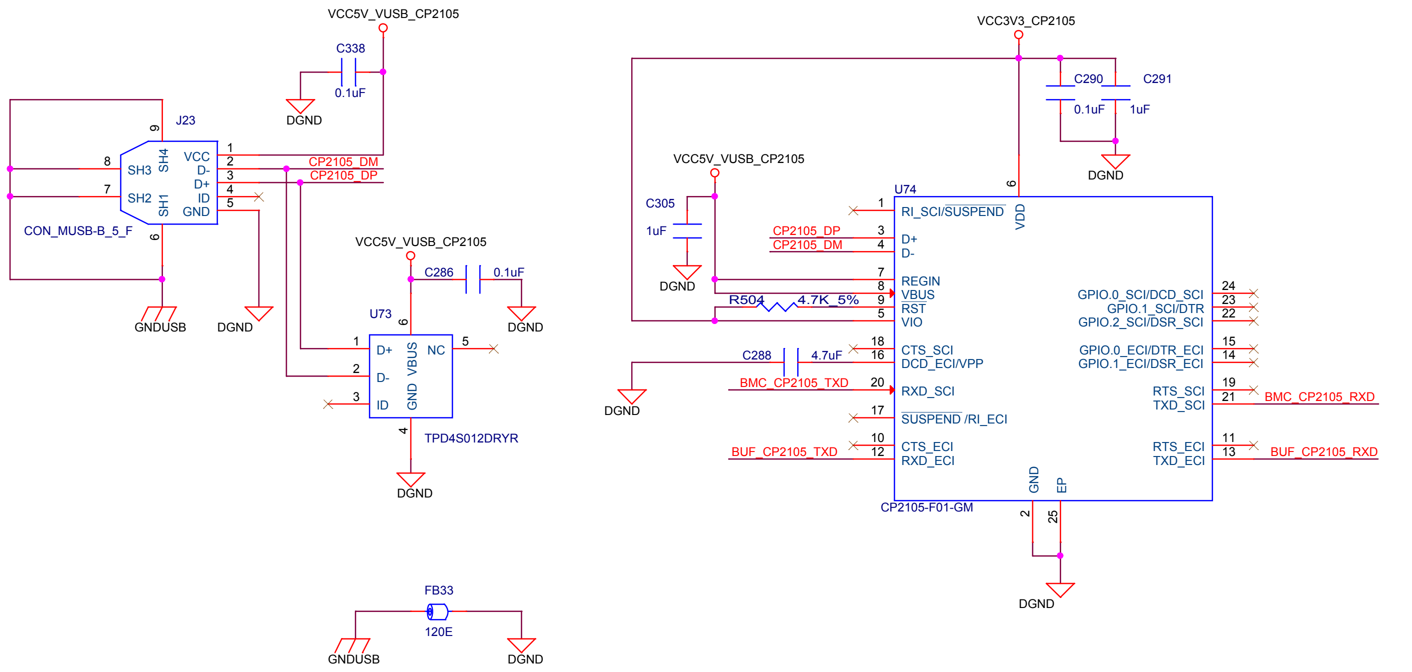
MUX BETWEEN BMC UART0 TO USB & 4 PIN HDR



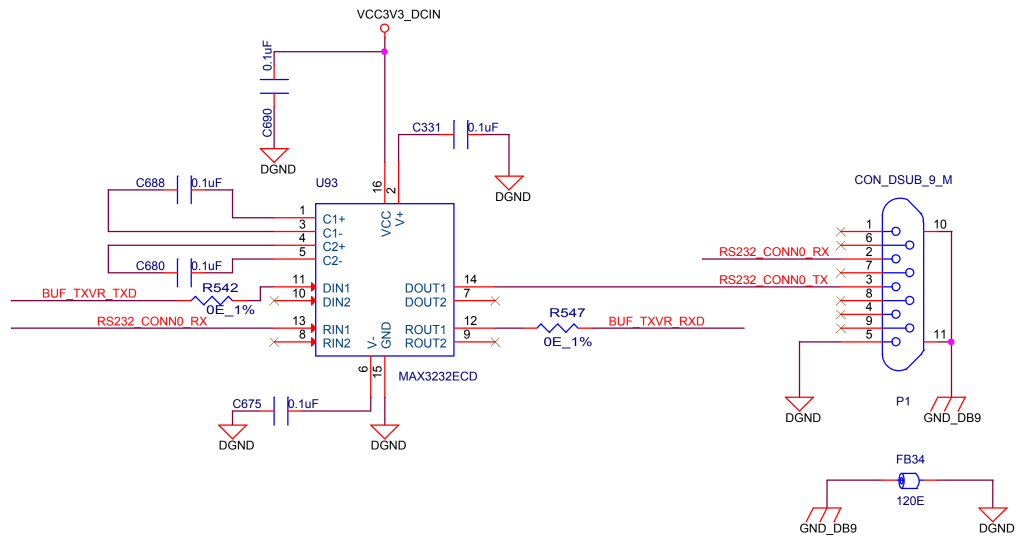
SoC_UART0 MUX SELECTION

SOC_UART0_CP2105_EN	SoC_UART0 Connected to
L	CP2105 (USB-to-UART)
H	UART TRANSCIEVER DB9 CONNECTOR

SoC UART0 & BMC CONSOLE OVER USB

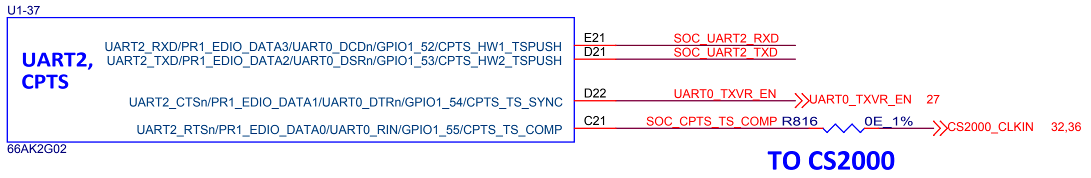


UART0 DB9 CON

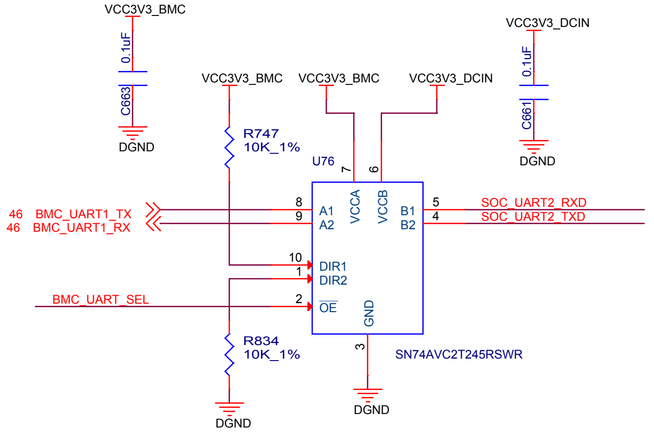


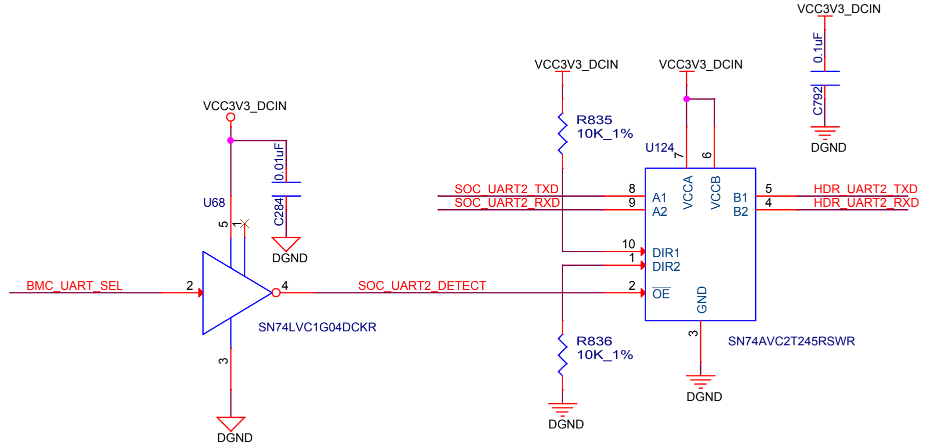
Project :	Designed for TI by Mistral Solutions Pvt Ltd	Title	UART 0,1,& 2
K2G EVM		Size C	Document Number MS_TI_K2GEVM_SCH_REVD	Rev D
		Date: Thursday, April 14, 2016	Sheet 27 of 50

SoC UART2

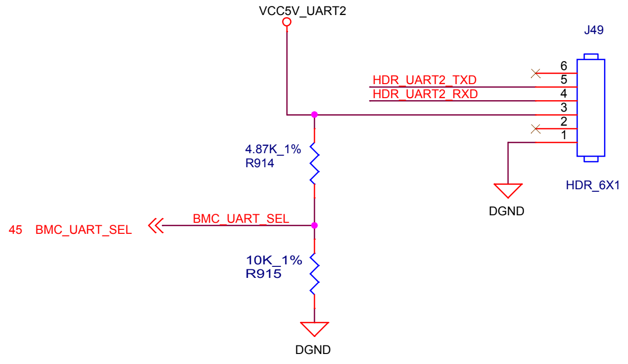


SoC UART2 MUX - BMC or UART2 Header





UART2 HEADER



SoC_UART2 MUX SELECTION

BMC_UART_SEL	SoC_UART2 Connected to
L	BMC
H	UART2 HEADER (J49)

Project :

K2G EVM

Designed for TI by Mistral Solutions Pvt Ltd

Title	UART2		
Size	Document Number		Rev
C	MS_TI_K2GEVM_SCH_REVD		D
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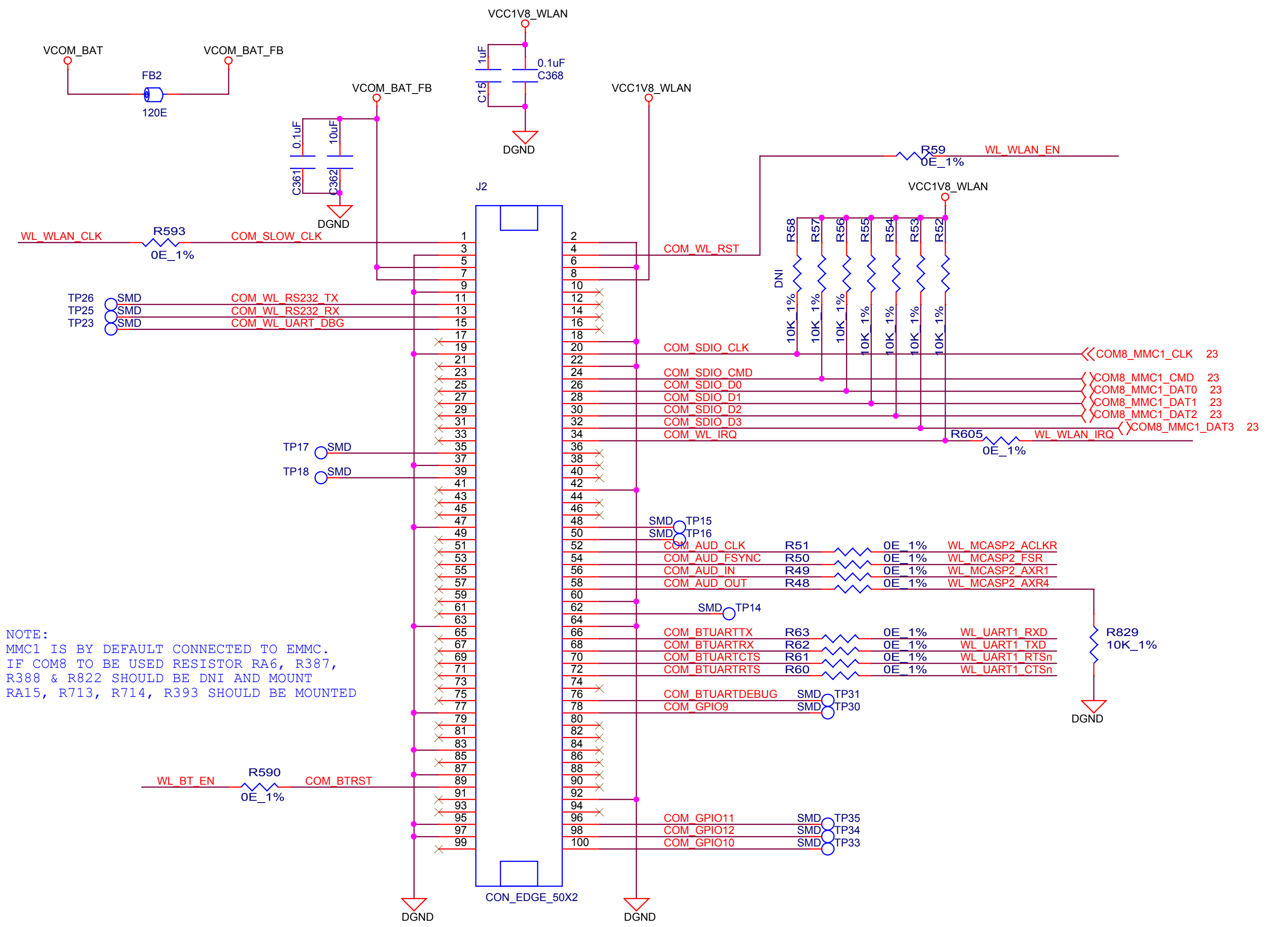
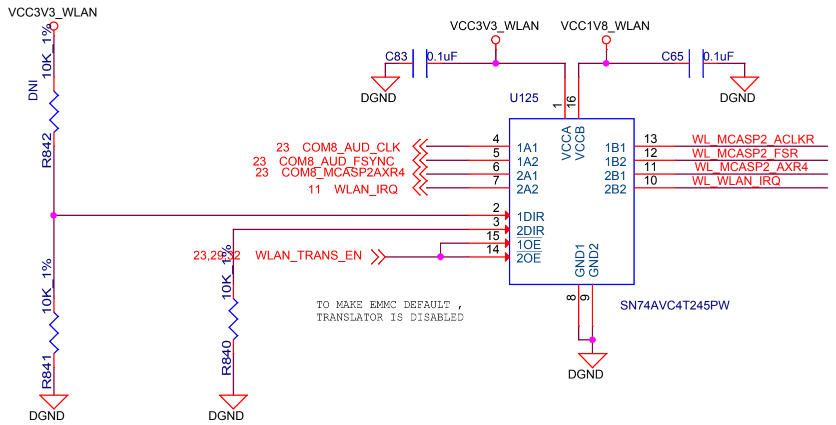
COM8 CONNECTOR



NOTE:
MMC1 IS BY DEFAULT CONNECTED TO EMMC.
IF COM8 TO BE USED RESISTOR RA6, R387,
R388 & R822 SHOULD BE DNI AND MOUNT
RA15, R713, R714, R393 SHOULD BE MOUNTED

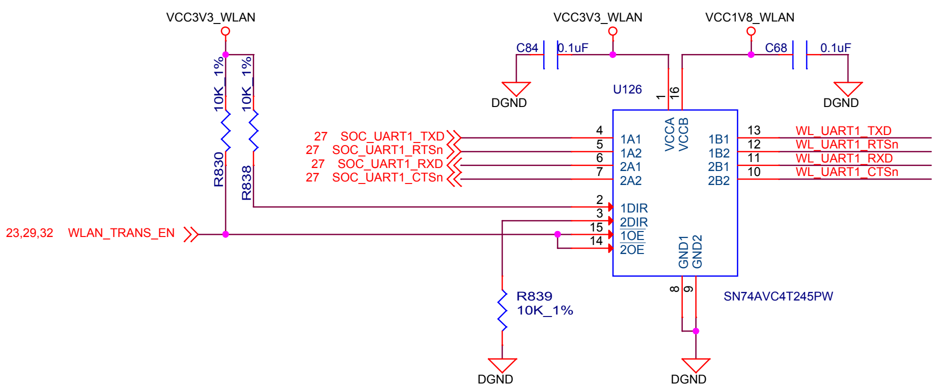
CONNECTION ON COM8 IS FOLLOWED AS PER
AM437x GP EVM. THESE ARE GPIOS ARE NOT USED
IN AM437x GP EVM, SO WE PROVIDED AS TEST POINTS

COM8 LEVEL TRANSLATOR1

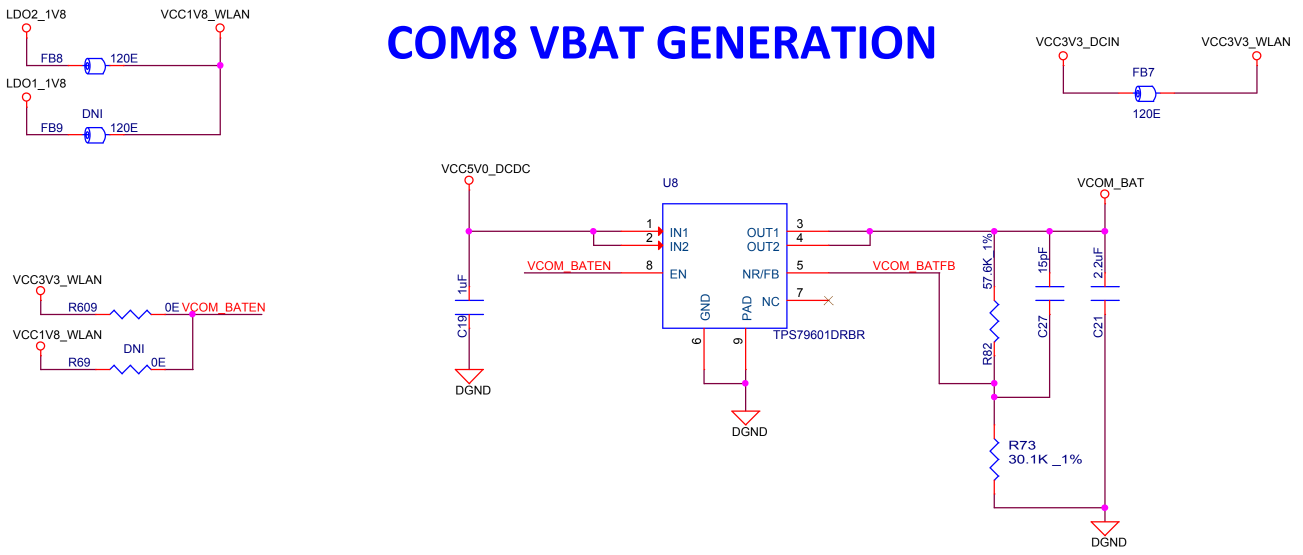


TO MAKE EMMC DEFAULT ,
TRANSLATOR IS DISABLED

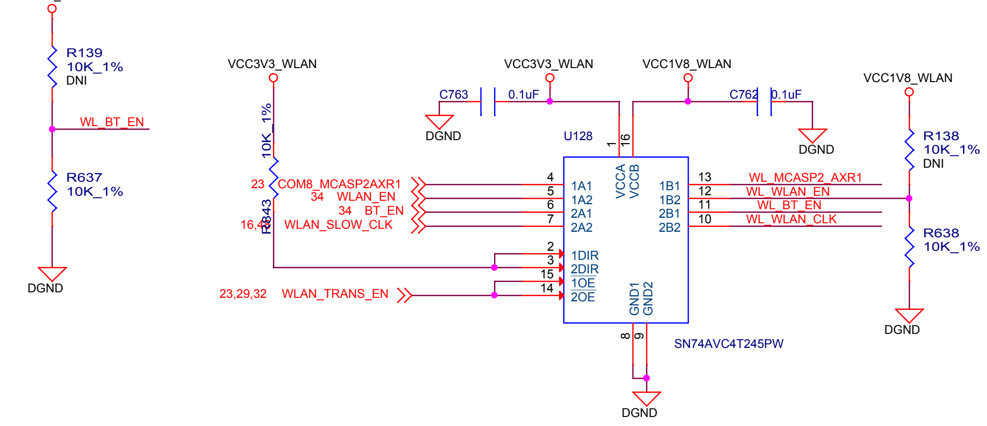
COM8 LEVEL TRANSLATOR2



COM8 VBAT GENERATION



COM8 LEVEL TRANSLATOR3



Project :	Designed for TI by Mistral Solutions Pvt Ltd	Title	COM8 CONNECTOR		
K2G EVM		Size	Document Number		Rev
		C	MS_TI_K2GEVM_SCH_REVD		D
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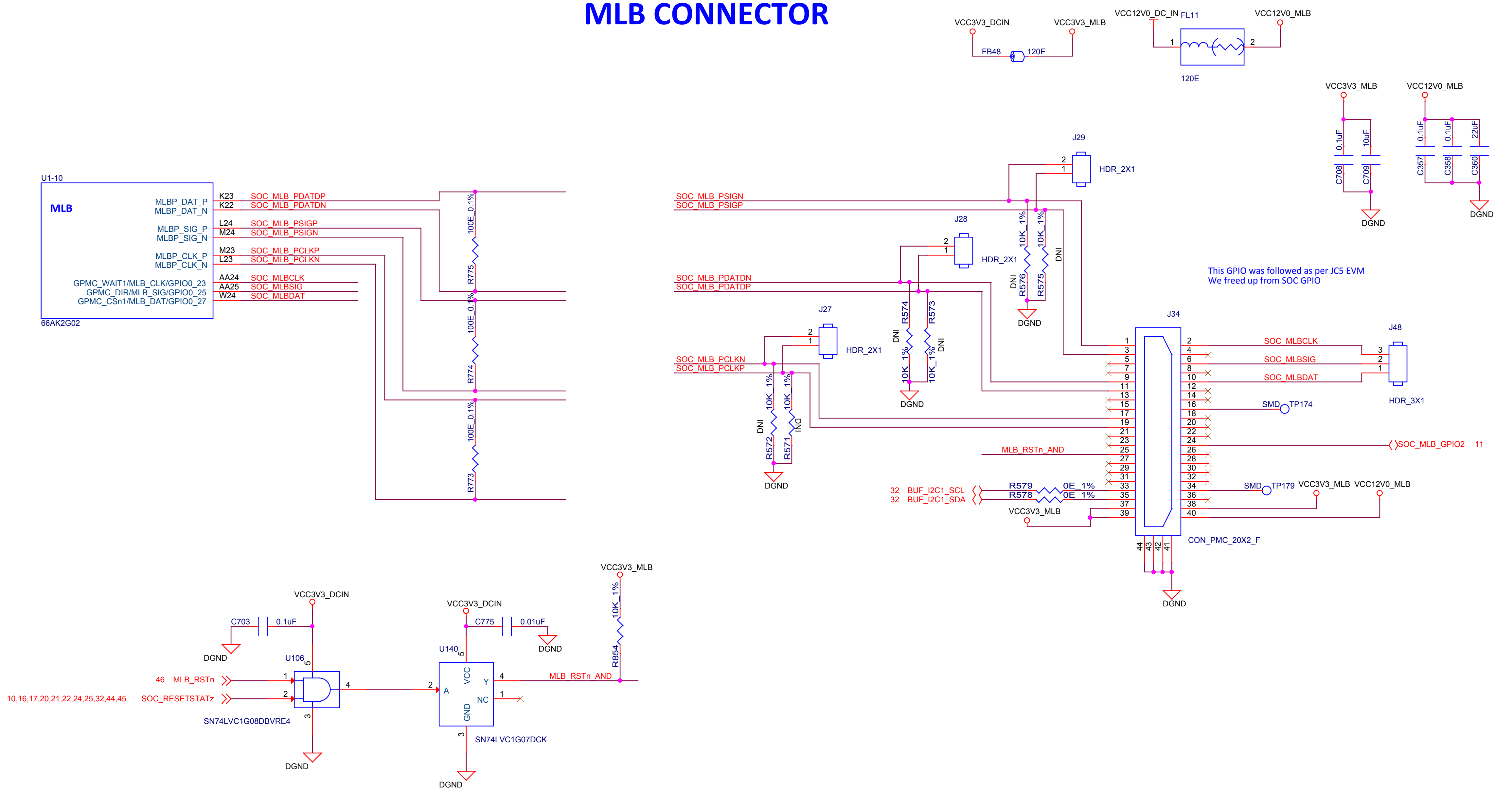
MLB CONNECTOR



Project :	Designed for TI by Mistral Solutions Pvt Ltd	Title	MLB CONNECTOR		
K2G EVM	TEXAS INSTRUMENTS MISTRAL	Size C	Document Number MS_TI_K2GEVM_SCH_REVD		Rev D
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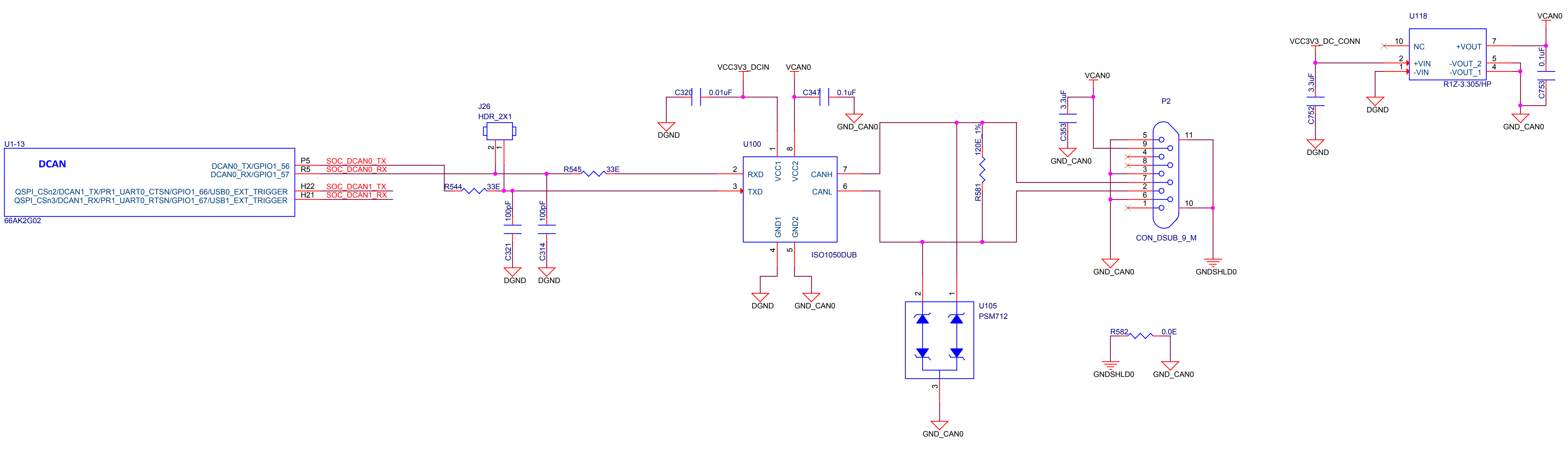
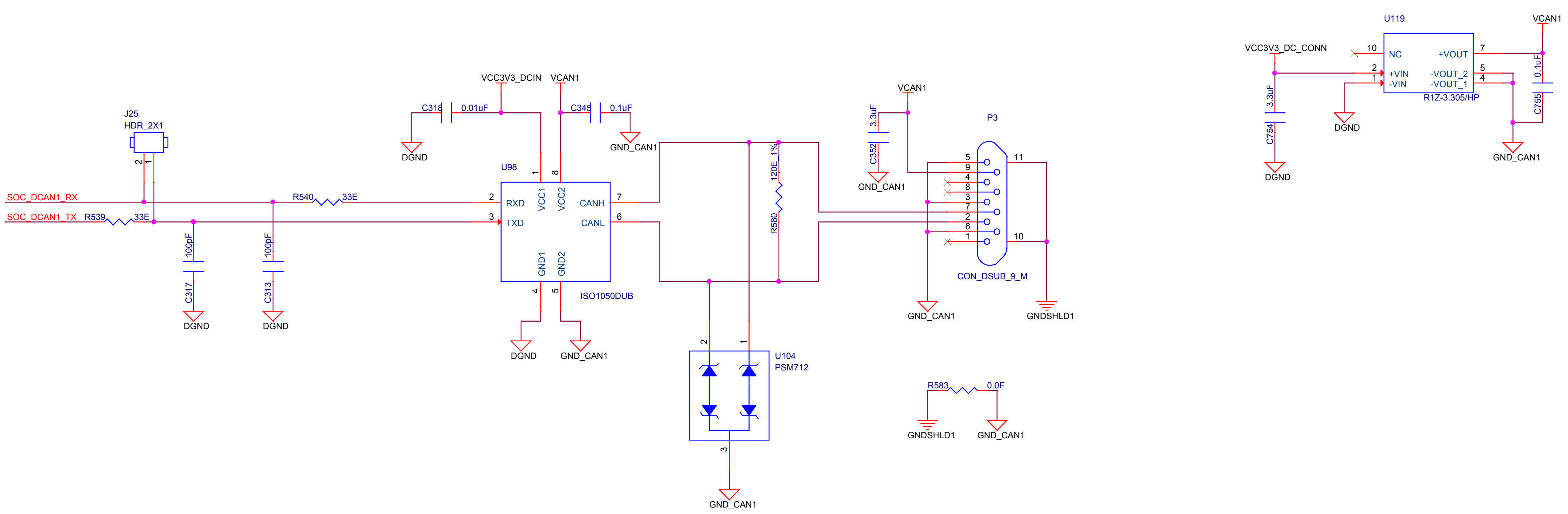
DCAN0

DCAN0 POWER



DCAN1

DCAN1 POWER



Project :

K2G EVM

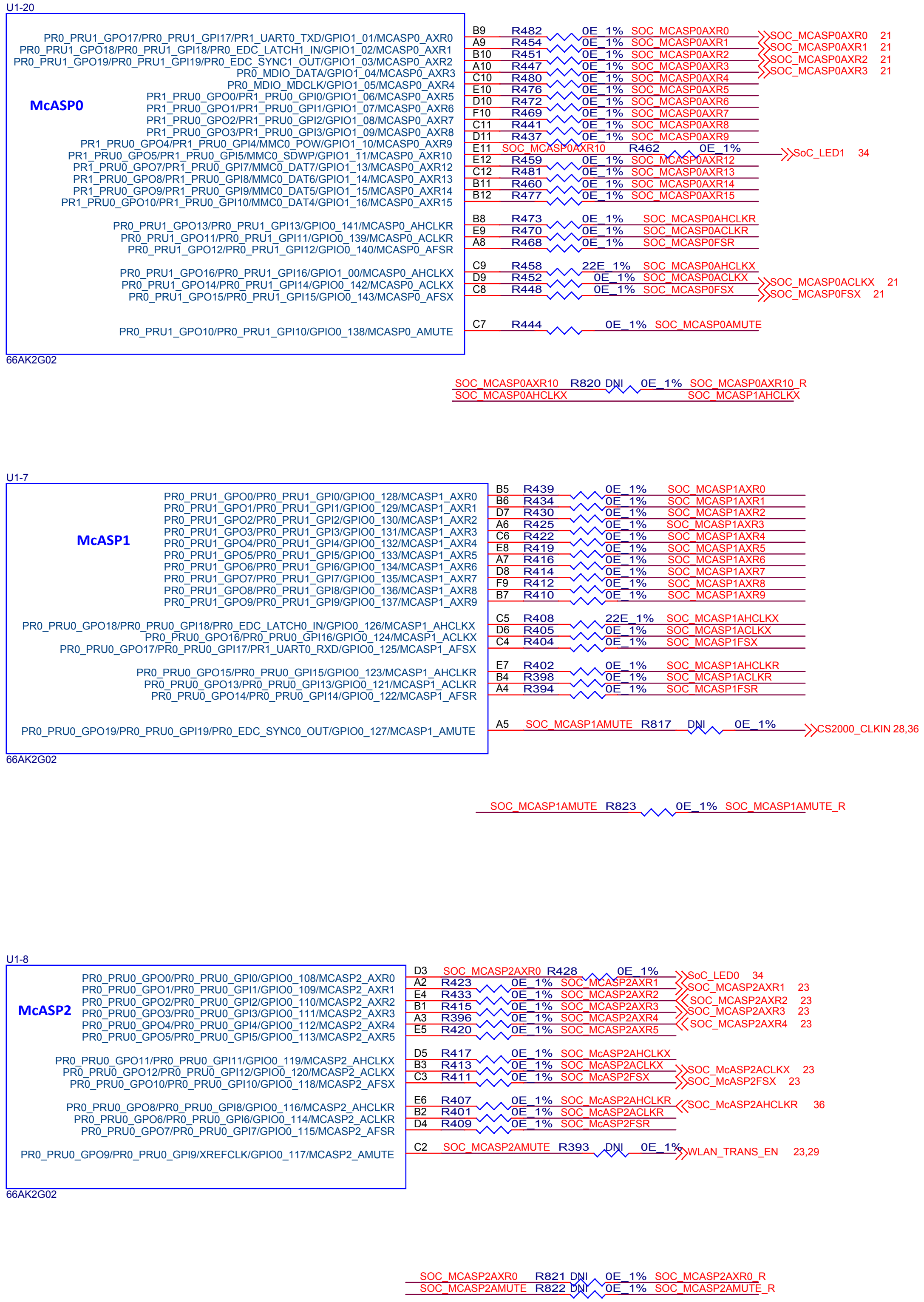
Designed for TI by Mistral Solutions Pvt Ltd

TEXAS INSTRUMENTS

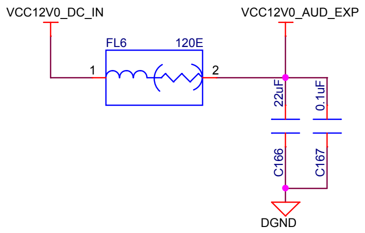
MISTRAL

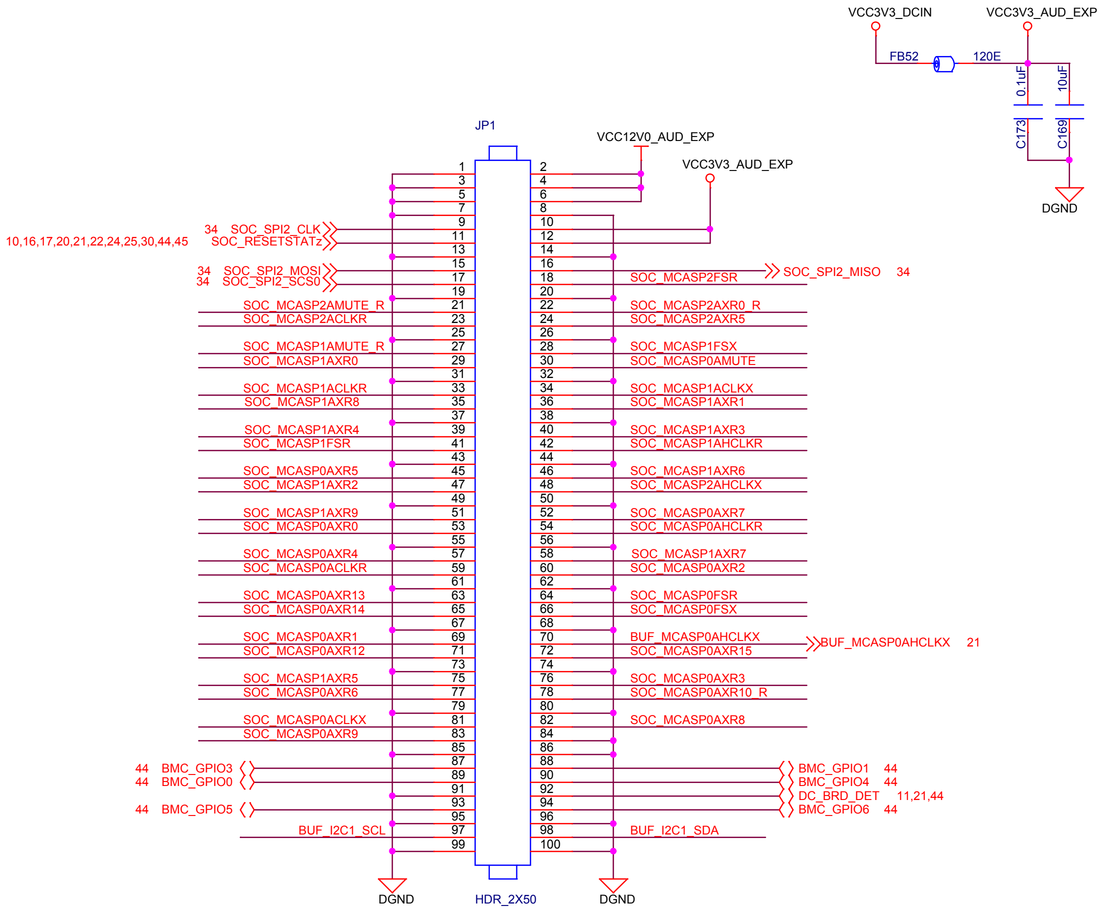
Title	DCAN CONNECTOR	
Size C	Document Number MS_TI_K2GEVM_SCH_REVD	Rev D
Date:	Thursday, April 14, 2016	Sheet 31 of 50

SOC MCASP



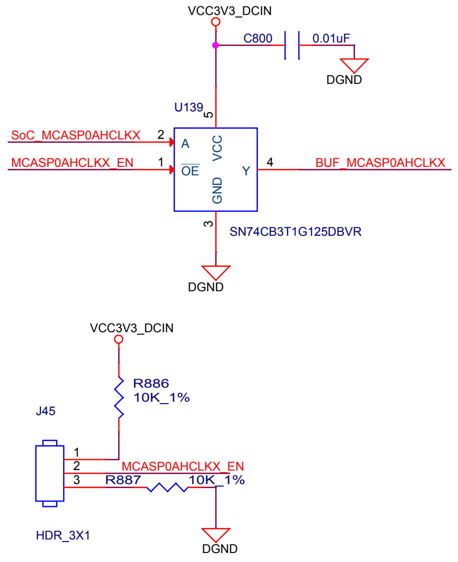
AUDIO EXP CONNECTOR



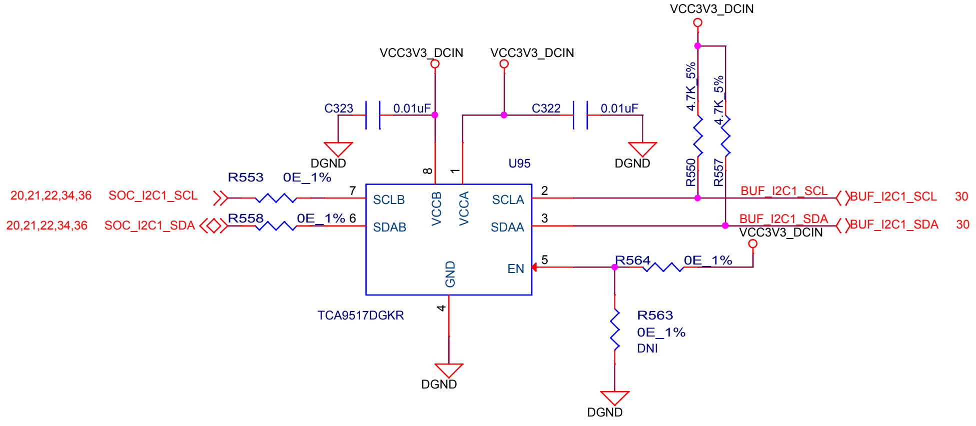


SOC SIGNAL	GPIOs ON AUDIO CARD
SOC_MCASP0AXR8/GPIO1_09	DIR_RST#
SOC_MCASP0AXR9/GPIO1_10	PCM1690_RST#
SOC_McASP0_AMUTE	DAC0_AMUTEI#, DAC1_AMUTEI#
SOC_MCASP1AXR4/GPIO0_132	McASP_CLK_SEL
SOC_MCASP1AXR6/GPIO0_134	DIR_AUDIO#
SOC_MCASP1AXR7/GPIO0_135	DIR_EMPH
SOC_MCASP1AXR8/GPIO0_136	DIR_ERROR
SOC_MCASP1AXR5/GPIO0_133	DIR_CLKST
SOC_MCASP1ACLKX/GPIO0_124	DIR_FSOUT0
SOC_MCASP1FSX / GPIO0_125	DIR_FSOUT1
SOC_SPI2_MOSI / GPIO0_105	I2SHDR_GPIO0
SOC_SPI2_MISO / GPIO0_104	I2SHDR_GPIO1

McASP0AHCLKX_BUFFER



I2C BUFFER



Project :

K2G EVM

Designed for TI by Mistral Solutions Pvt Ltd

Title AUDIO EXP CONNECTOR

Size	Document Number	Rev
C	MS_TI_K2GEVM_SCH_REVD	D

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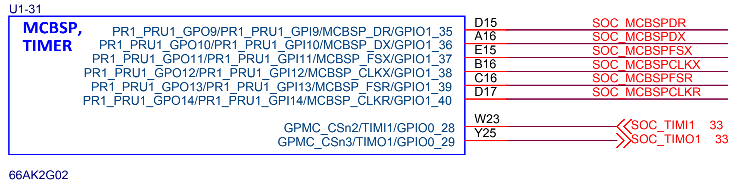
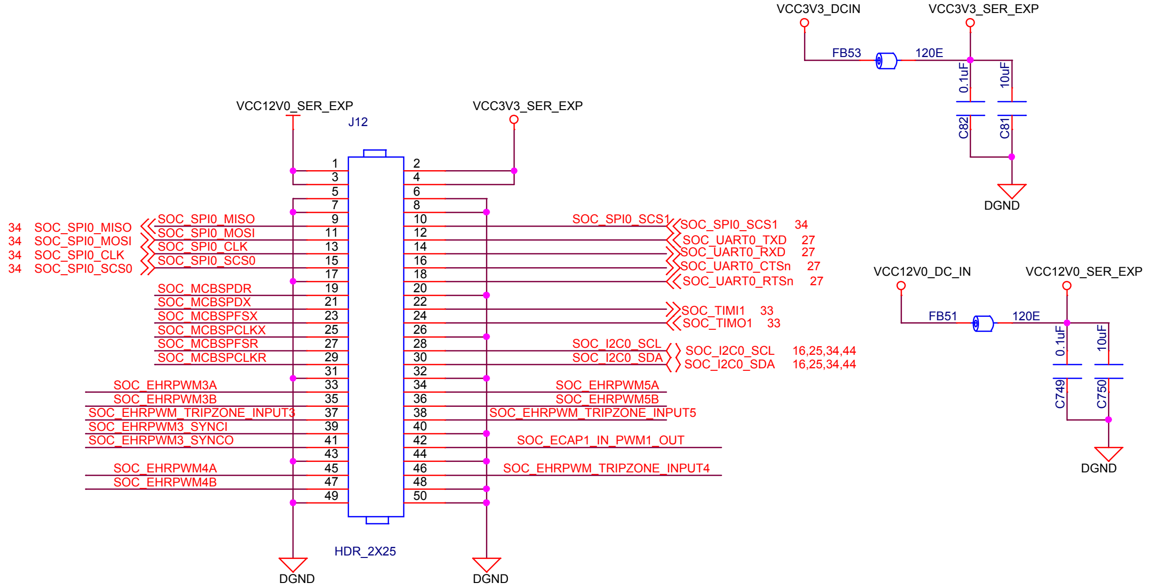
SoC McBSP



SERIAL EXPANSION CONNECTOR



SoC PWM

Project :
K2G EVM

Designed for TI by Mistral Solutions Pvt Ltd

Title SERIAL & EHRPWM EXP CONNECTOR
Size C
Document Number MS_TI_K2GEVM_SCH_REVD
Rev D
Date: Thursday, April 14, 2016
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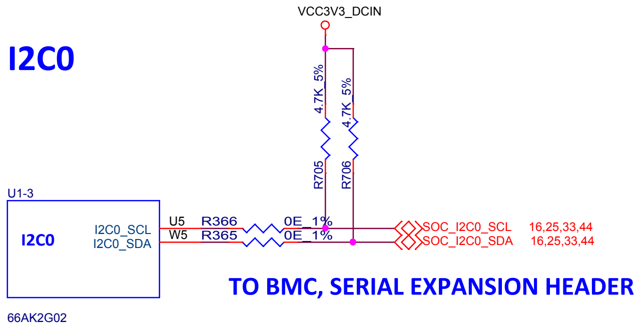
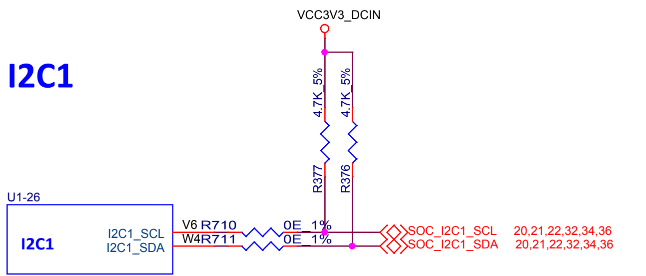
SoC I2C

I2C0



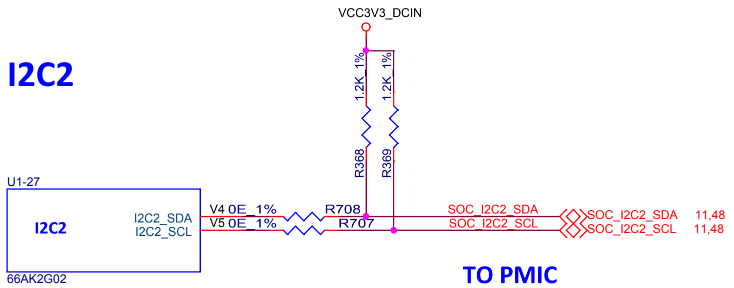
TO BMC, SERIAL EXPANSION HEADER

I2C1



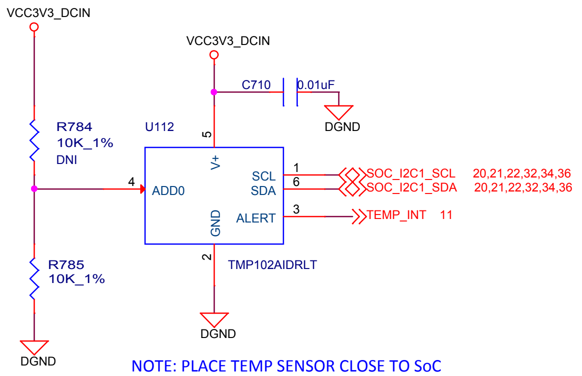
TO HDMI TX, TOUCH SCREEN, AIC3106 ,
AUDIO & MLB EXP HEADER

I2C2



TO PMIC

TEMPERATURE SENSOR

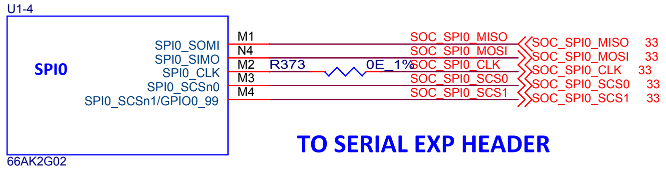


NOTE: PLACE TEMP SENSOR CLOSE TO SoC

I2C ADDRESS: 0x48

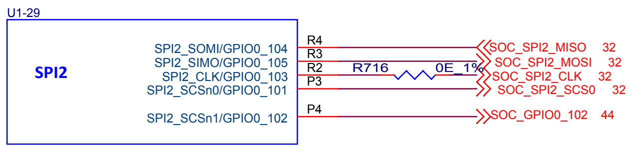
SoC SPI

SPI0



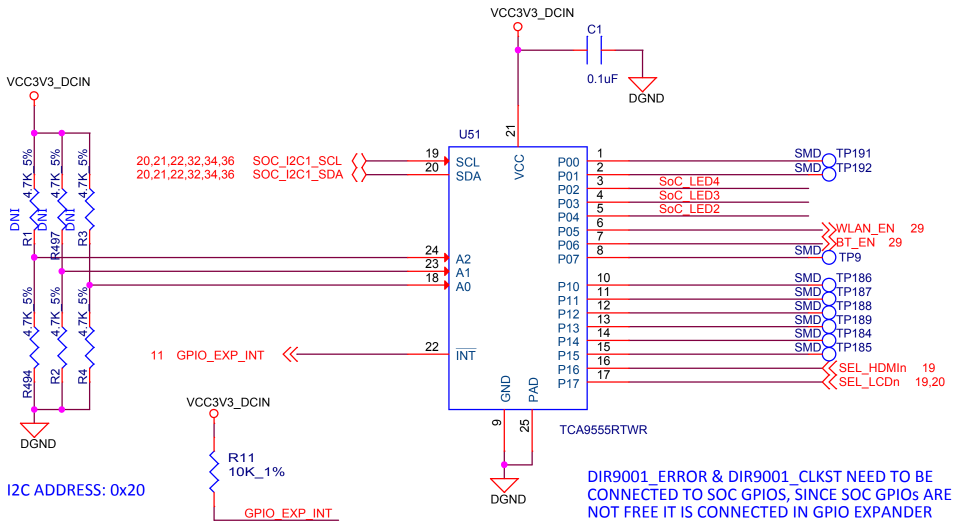
TO SERIAL EXP HEADER

SPI2



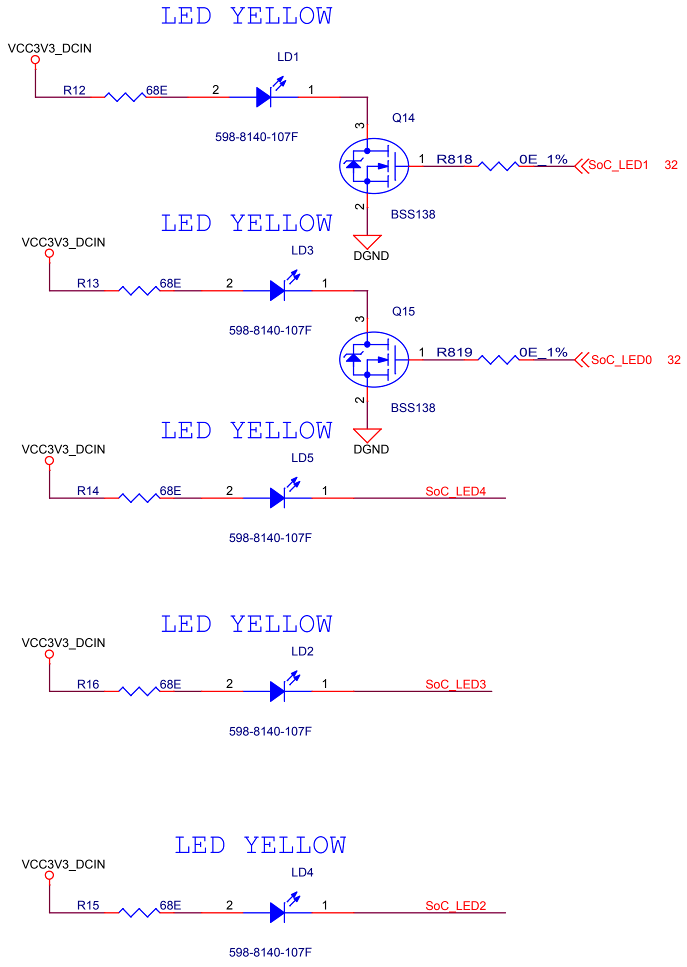
TO AUDIO EXP HEADER

GPIO EXPANDER & LEDs



I2C ADDRESS: 0x20

DIR9001_ERROR & DIR9001_CLKST NEED TO BE
CONNECTED TO SOC GPIOS, SINCE SOC GPIOs ARE
NOT FREE IT IS CONNECTED IN GPIO EXPANDER



Project :	Designed for TI by Mistral Solutions Pvt Ltd	Title	SERIAL CONTROL INTERFACE			
K2G EVM	TEXAS INSTRUMENTS MISTRAL	Size	Document Number			Rev
		C	MS_TI_K2GEVM_SCH_REVD			D
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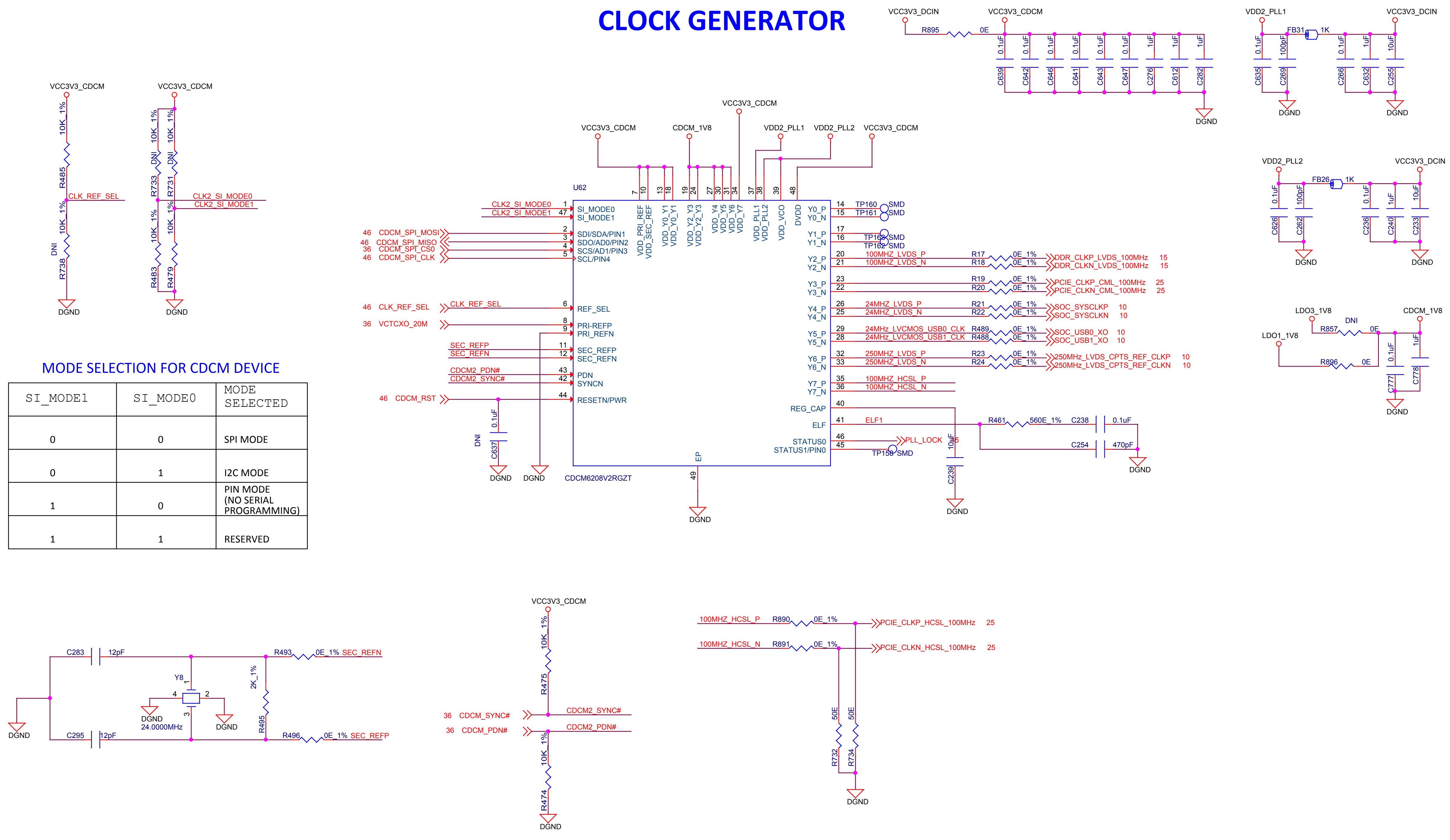
CLOCK GENERATOR



MODE SELECTION FOR CDCM DEVICE

SI_MODE1	SI_MODE0	MODE SELECTED
0	0	SPI MODE
0	1	I2C MODE
1	0	PIN MODE (NO SERIAL PROGRAMMING)
1	1	RESERVED

Project :	Designed for TI by Mistral Solutions Pvt Ltd	Title	CLOCK DISTRIBUTION 1
K2G EVM	TEXAS INSTRUMENTS MISTRAL	Size C	Document Number MS_TI_K2GEVM_SCH_REVD, Rev D
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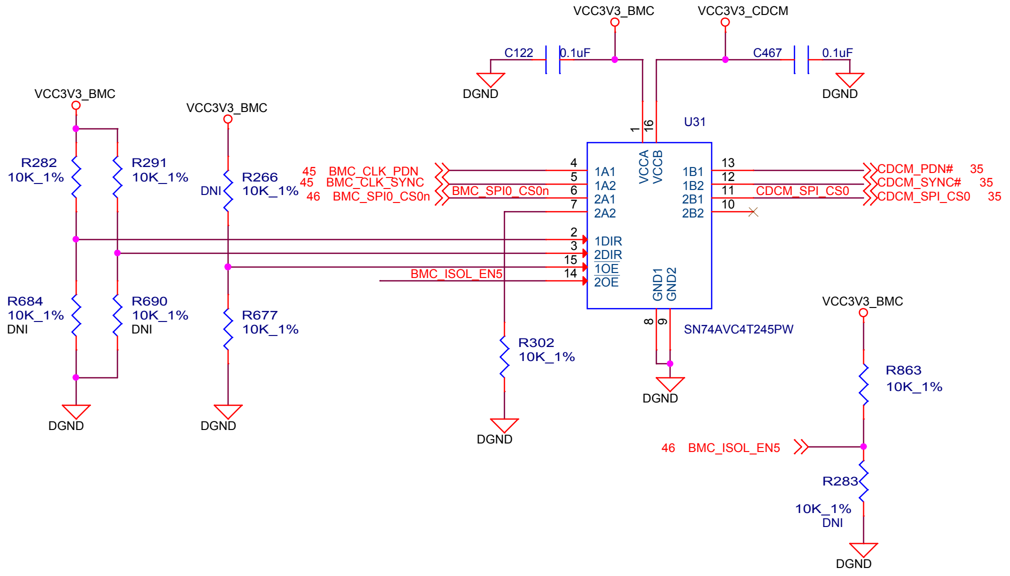
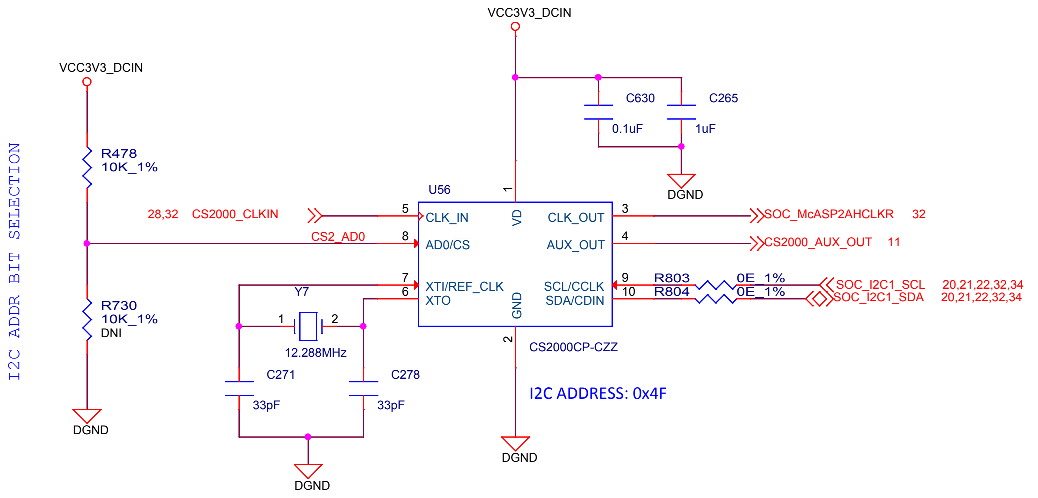
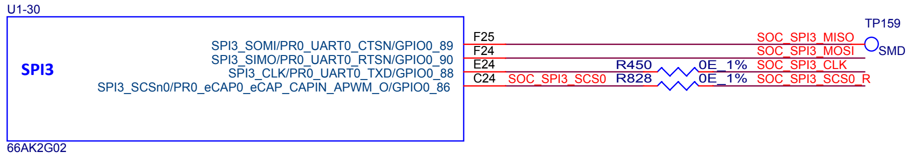
BMC ISOLATOR 5



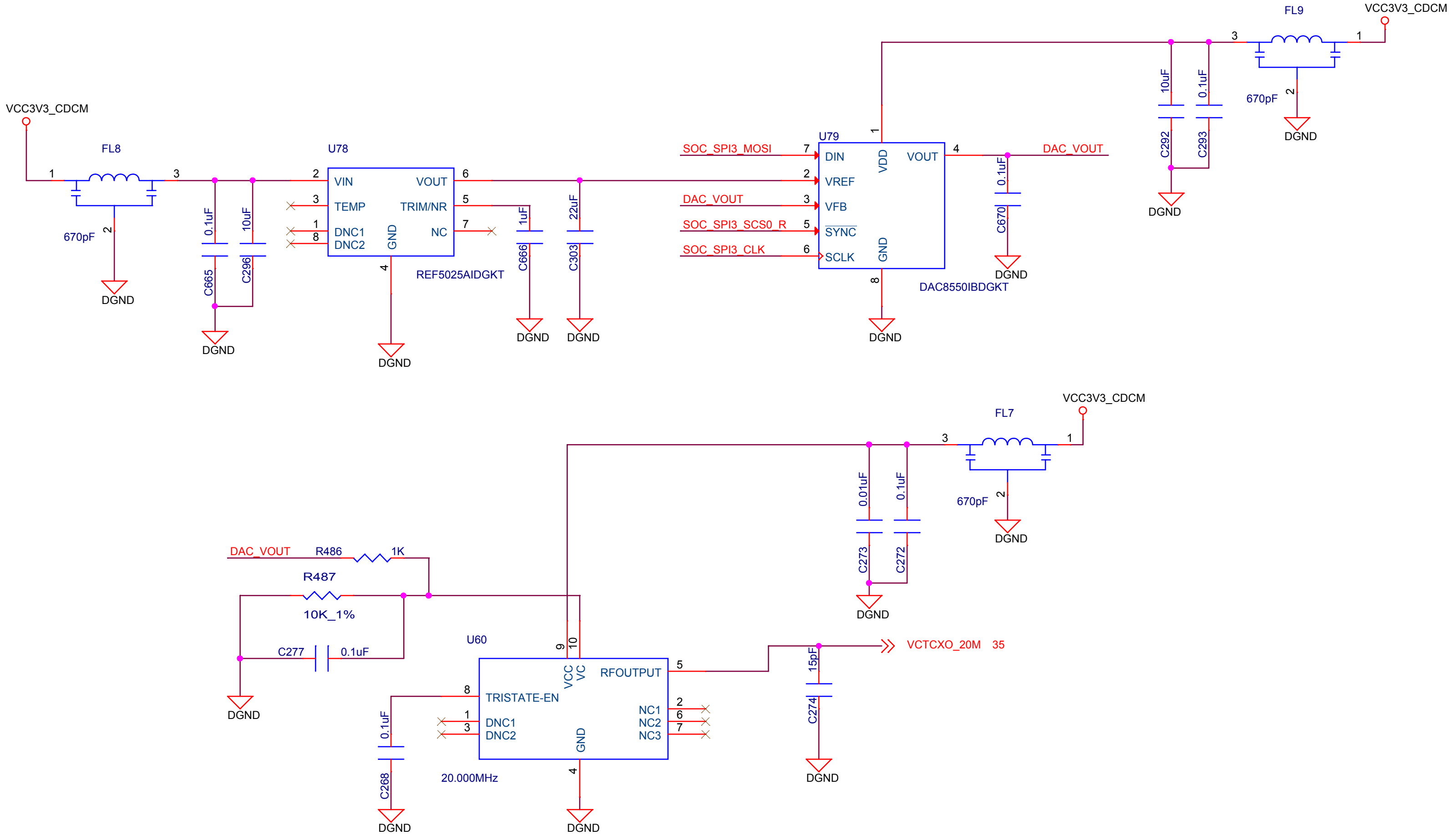
GENERATOR - AUDIO CLOCK DOMAIN



SoC SPI3



AVB CLOCK GENERATOR- 1588 CLOCK DOMAIN



Project :

K2G EVM

Designed for TI by Mistral Solutions Pvt Ltd

TEXAS INSTRUMENTS

MISTRAL

Title	CLOCK DISTRIBUTION 2		
Size	Document Number		Rev
C	MS_TI_K2GEVM_SCH_REVD		D
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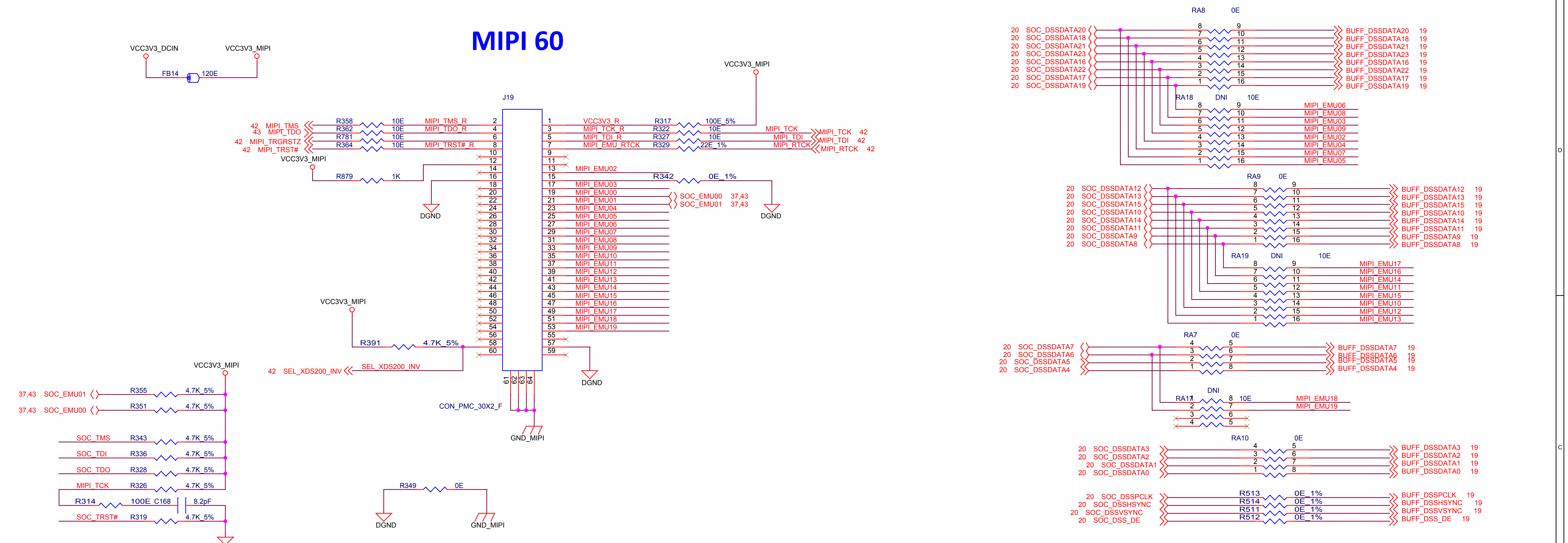
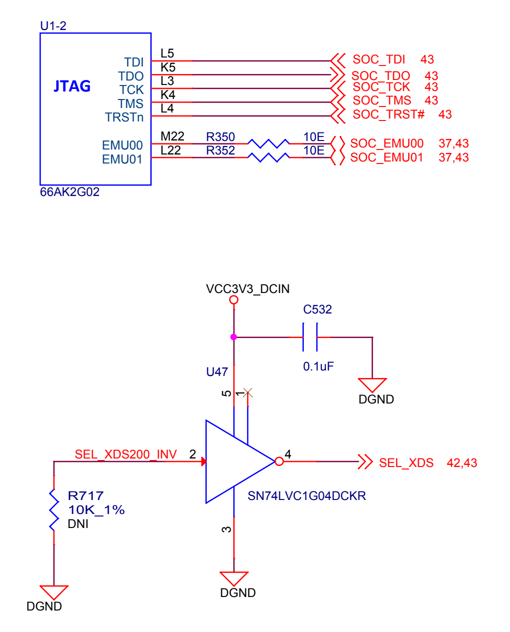
MIPI 60

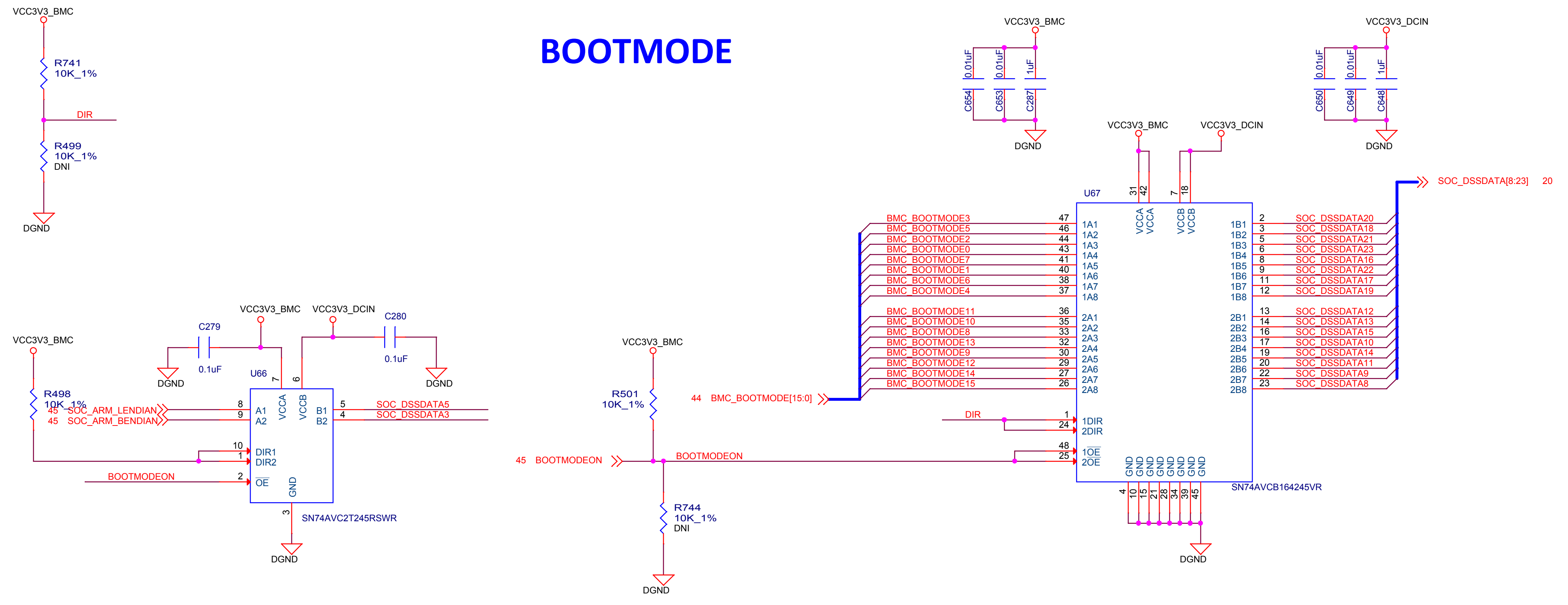


Res MUX between Display and JTAG TRACE Functionality
-For display, install RA7, RA8 & RA9 . DNI RA17,RA18 & RA19
-For TRACE, install RA17, RA18 & RA19. DNI RA7, RA8 & RA9

SoC JTAG



BOOTMODE



Project : K2G EVM

Designed for TI by Mistral Solutions Pvt Ltd

TEXAS INSTRUMENTS

MISTRAL

Title EMU & MIPI60 CONNECTOR

Size C

Document Number MS_TI_K2GEVM_SCH_REVD

Rev D

Date: Thursday, April 14, 2016

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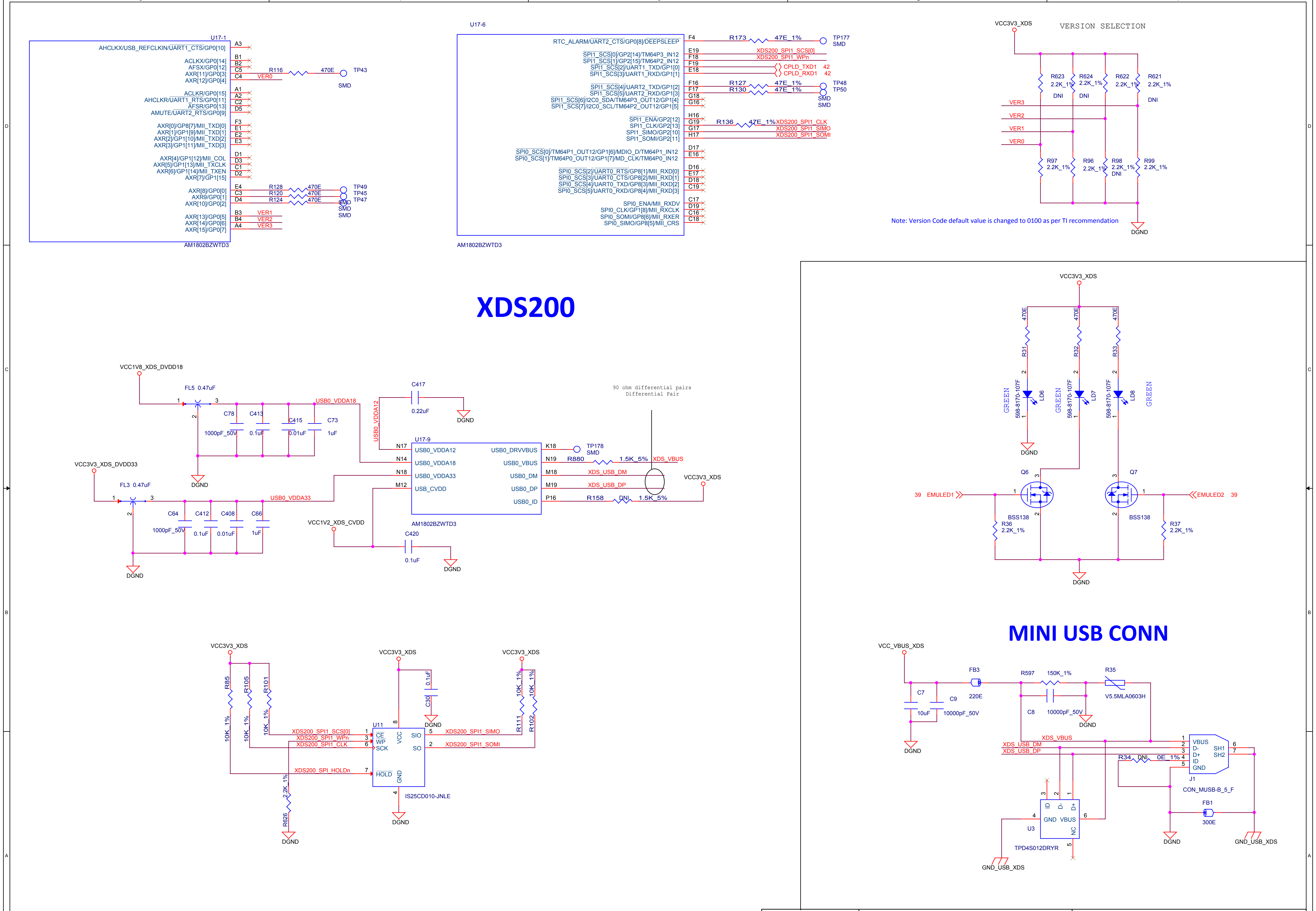

Project :

K2G EVM

Designed for TI by Mistral Solutions Pvt Ltd

Texas Instruments

MISTRAL

Title XDS200

Size C

Document Number MS_TI_K2GEVM_SCH_REVD

Rev D

Date: Wednesday, April 13, 2016

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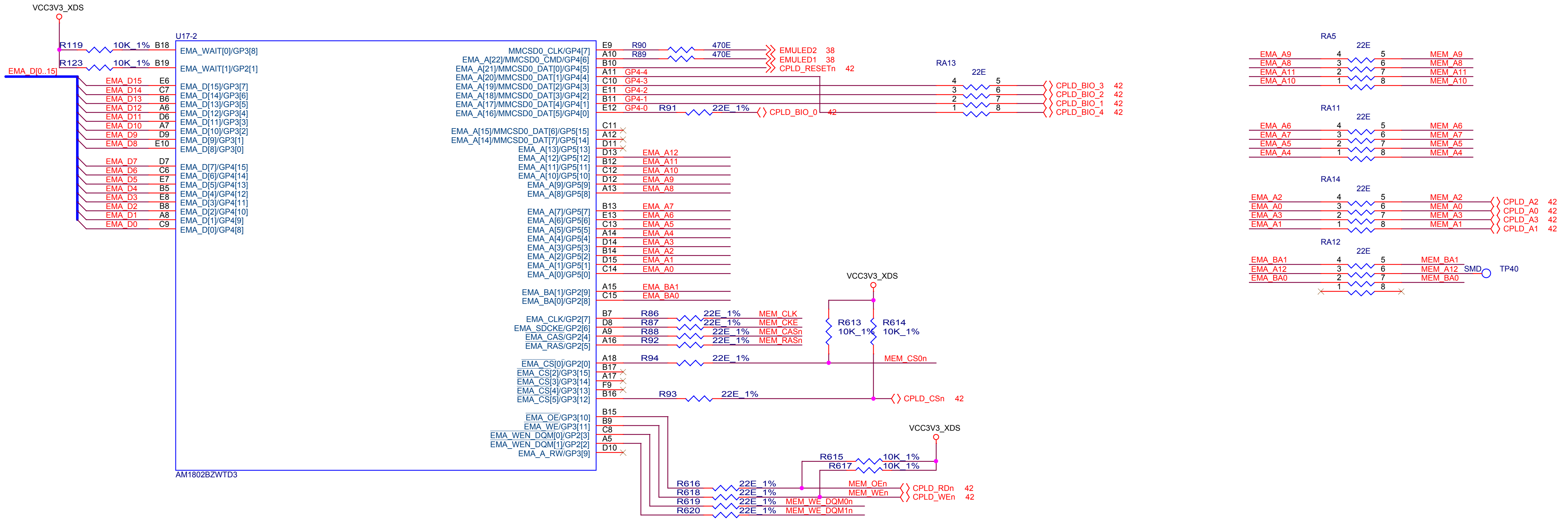
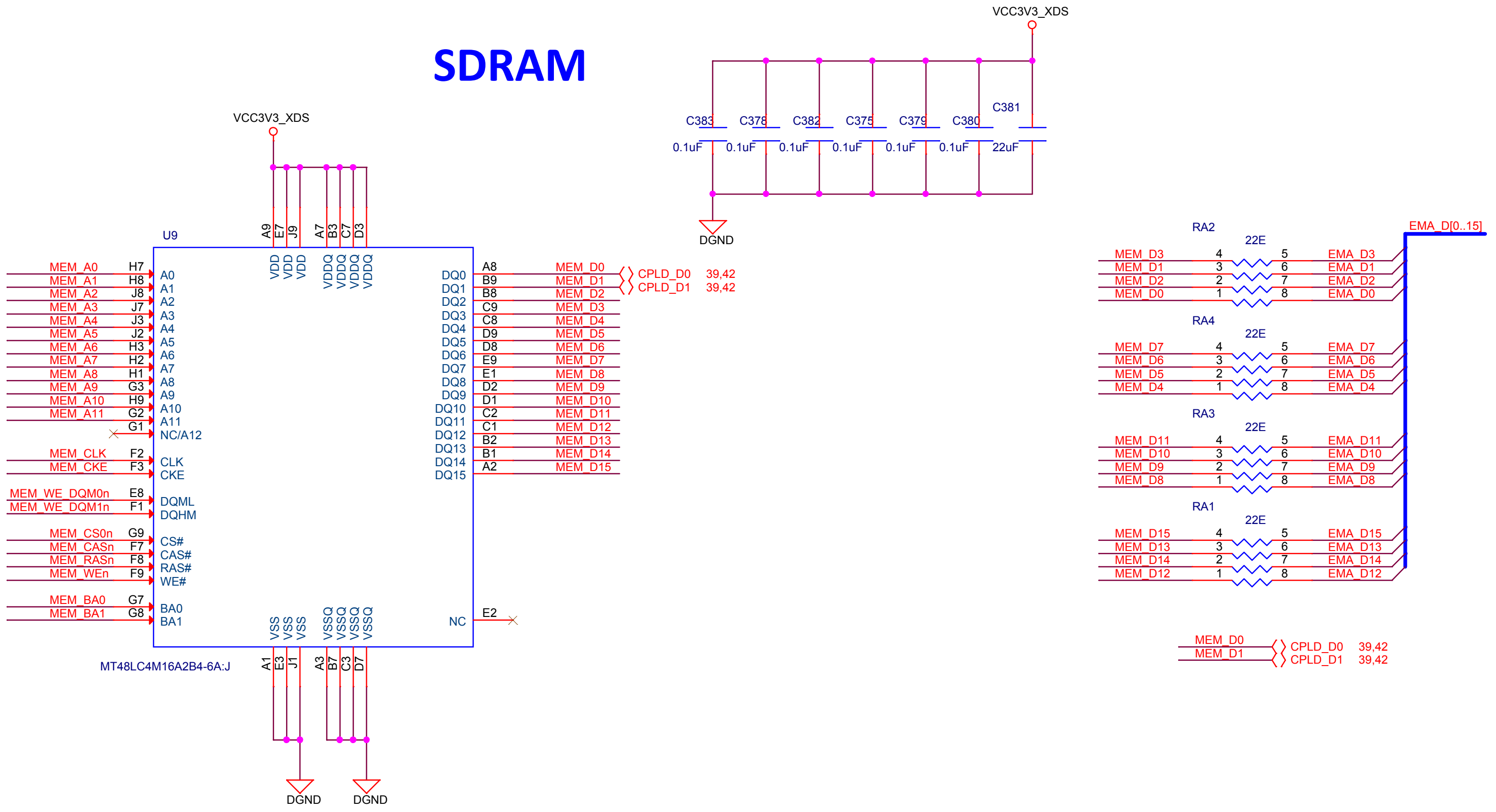
XDS200



SDRAM



Project : K2G EVM

Designed for TI by Mistral Solutions Pvt Ltd

Title JTAG_XDS200_2

Size C

Document Number MS_TI_K2GEVM_SCH_REVD

Rev D

Date: Wednesday, April 13, 2016

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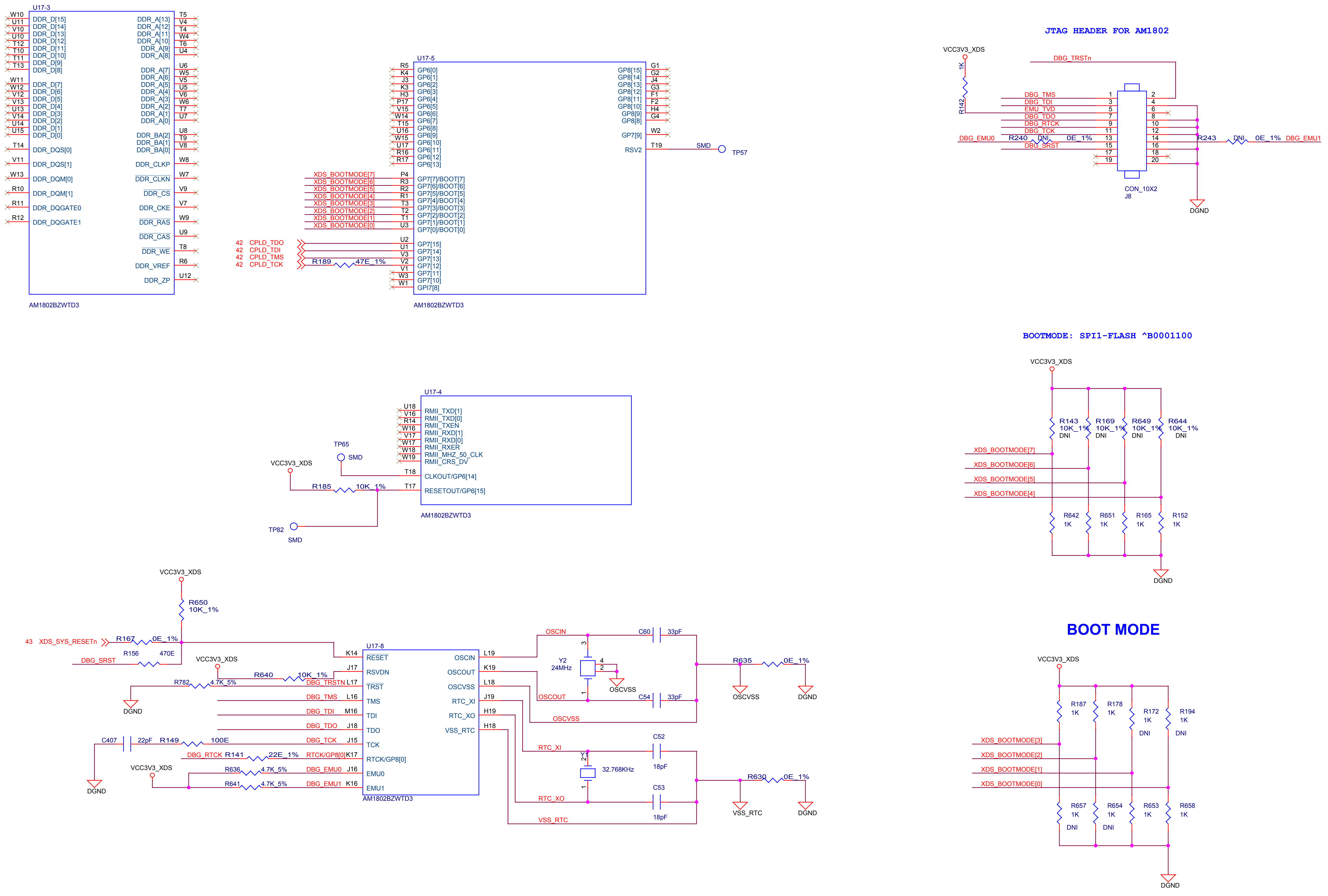
XDS200



Project : K2G EVM	Designed for TI by Mistral Solutions Pvt Ltd	Title	JTAG_XDS200_3	
		Size C	Document Number MS_TI_K2GEVM_SCH_REVD	Rev D
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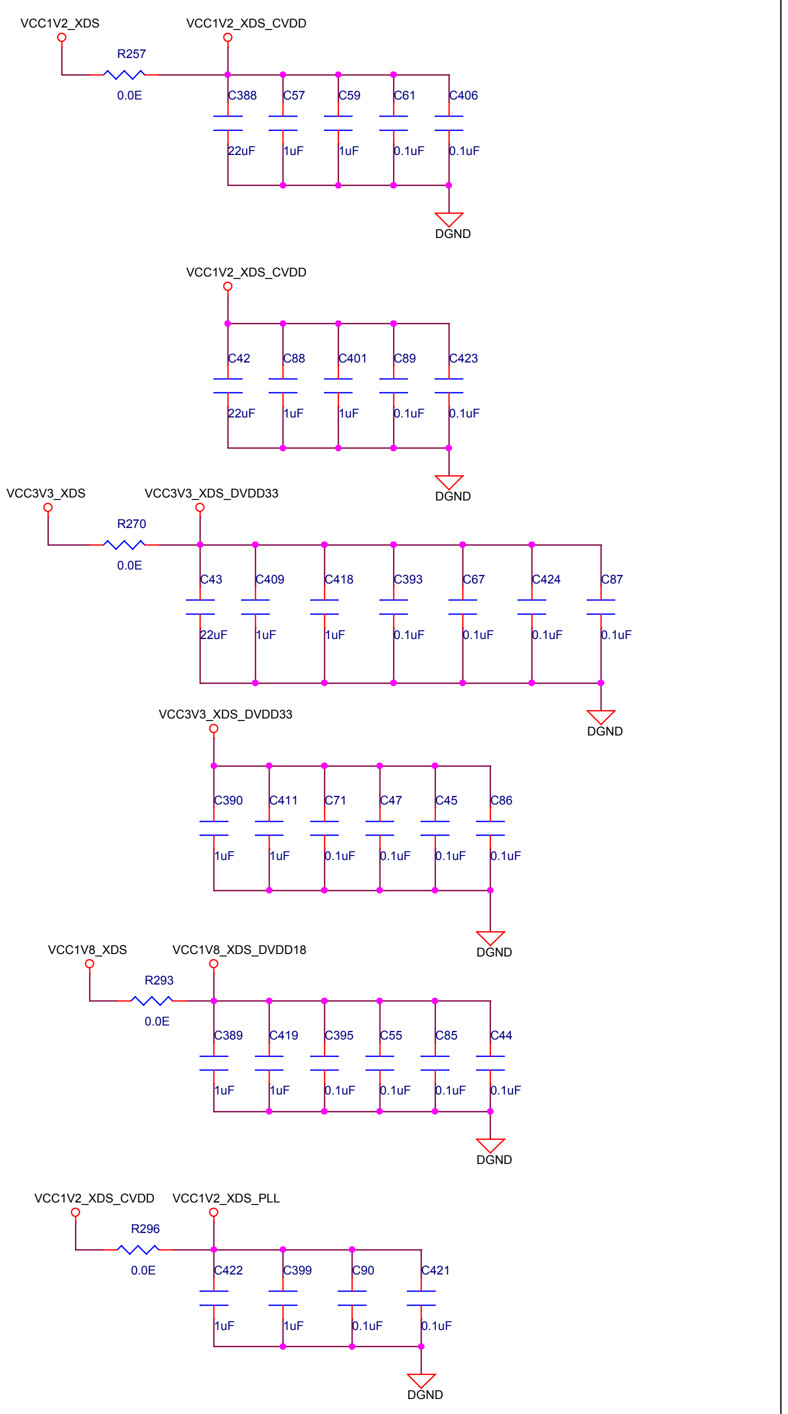
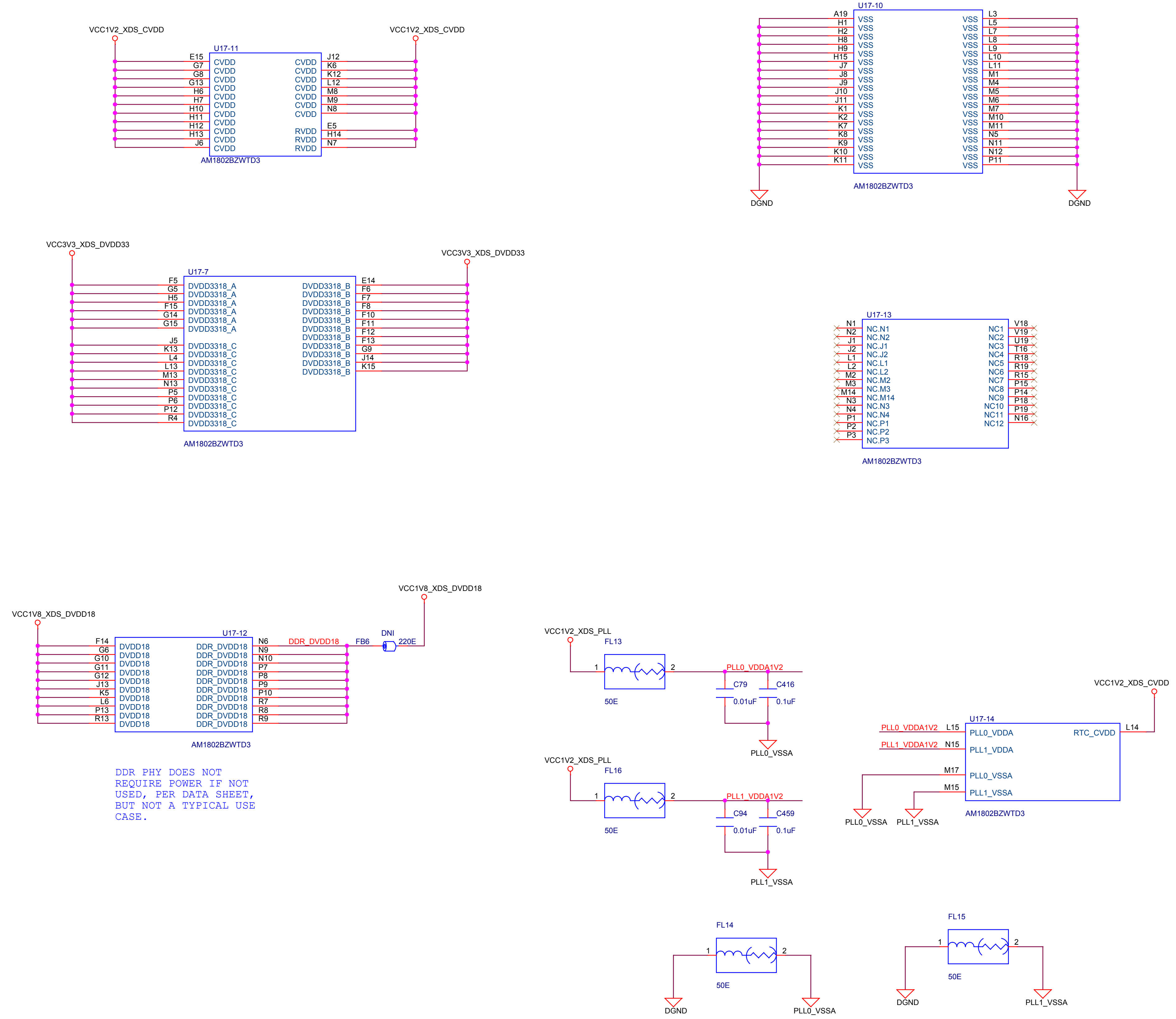
XDS200 DECAPS



XDS200



DDR PHY DOES NOT
REQUIRE POWER IF NOT
USED, PER DATA SHEET,
BUT NOT A TYPICAL USE
CASE.

Project : K2G EVM	Designed for TI by Mistral Solutions Pvt Ltd	Title JTAG_XDS200_4
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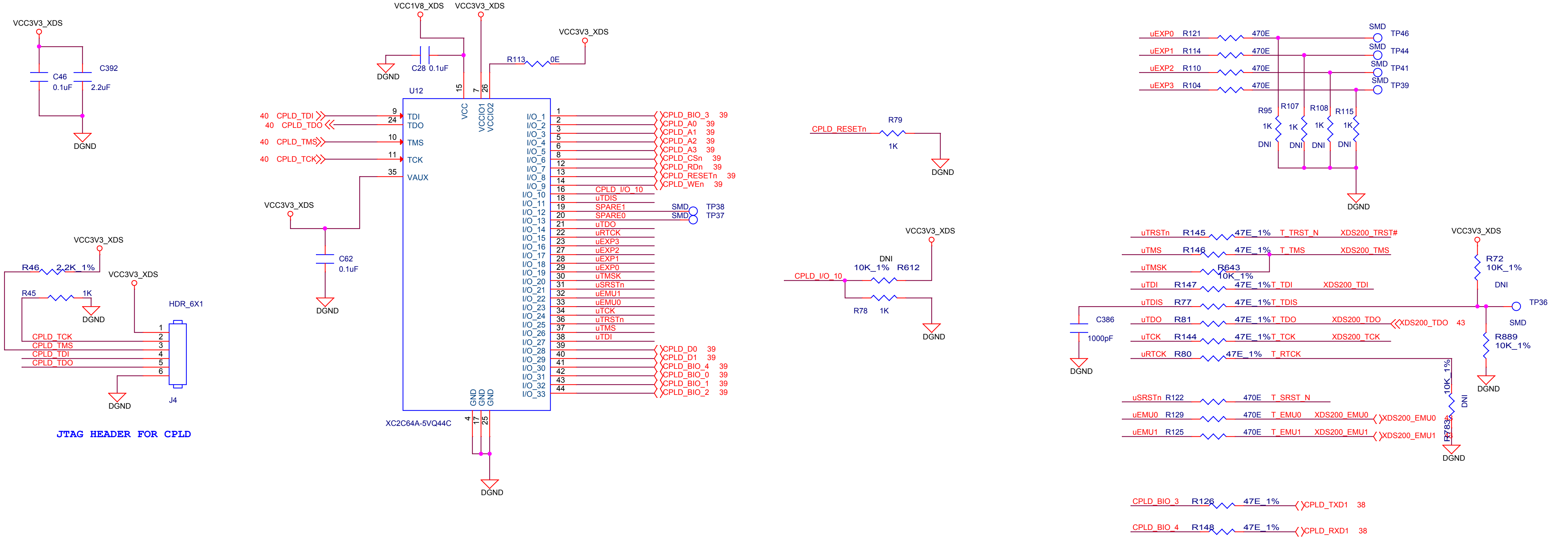
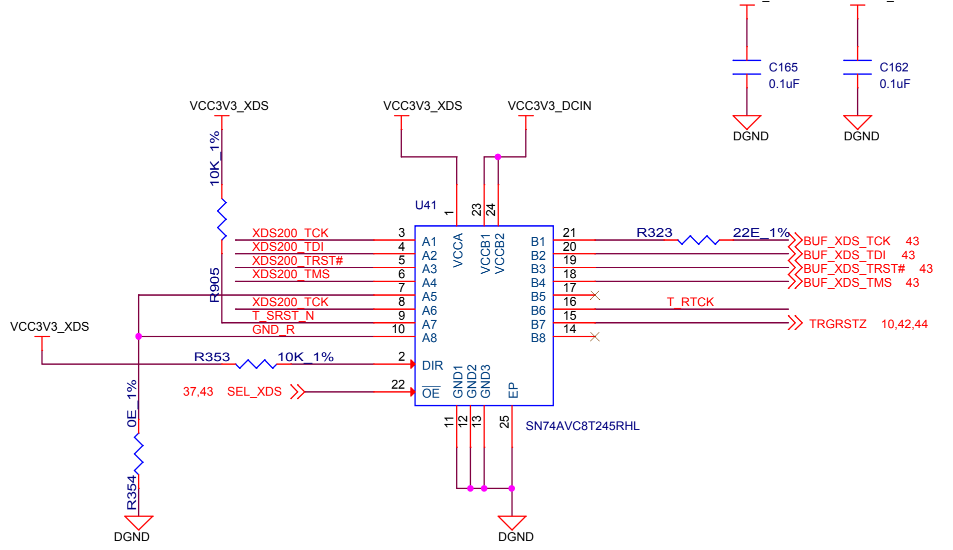
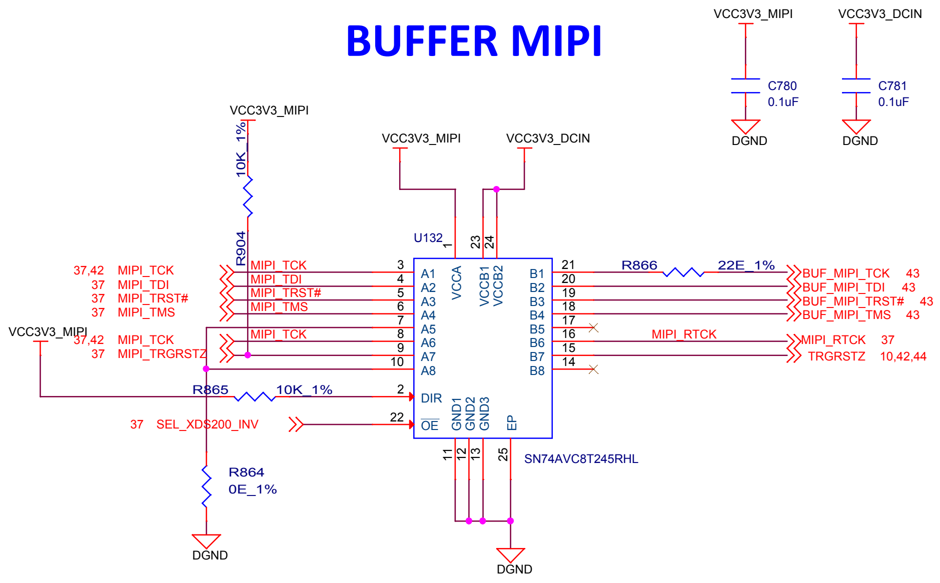
XDS200 CPLD



BUFFER XDS200



BUFFER MIPI



Project : K2G EVM	Designed for TI by Mistral Solutions Pvt Ltd	Title JTAG_XDS200_CPLD
		Size C — Document Number MS_TI_K2GEVM_SCH_REVD — Rev D
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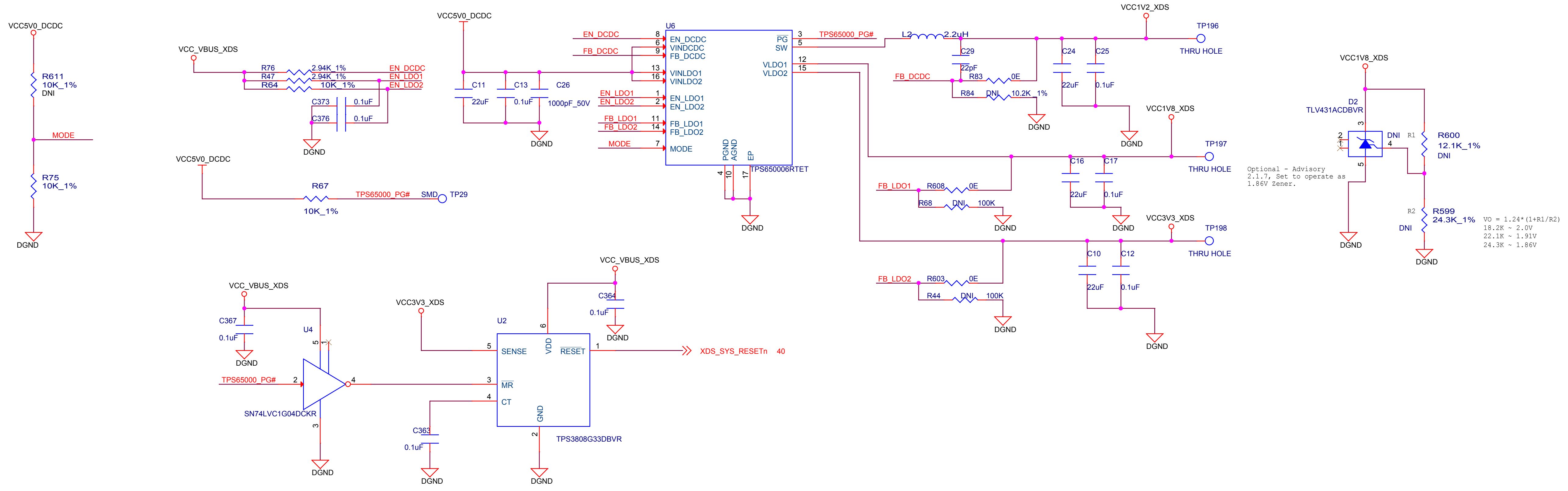
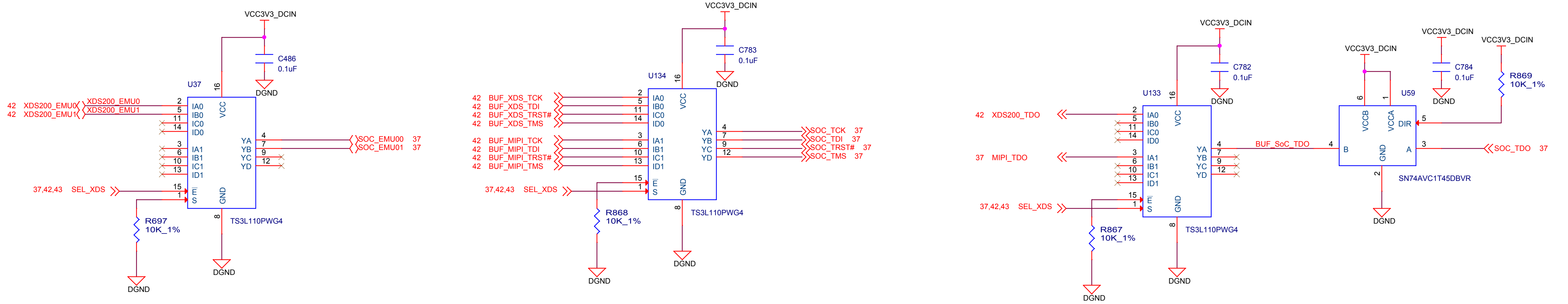
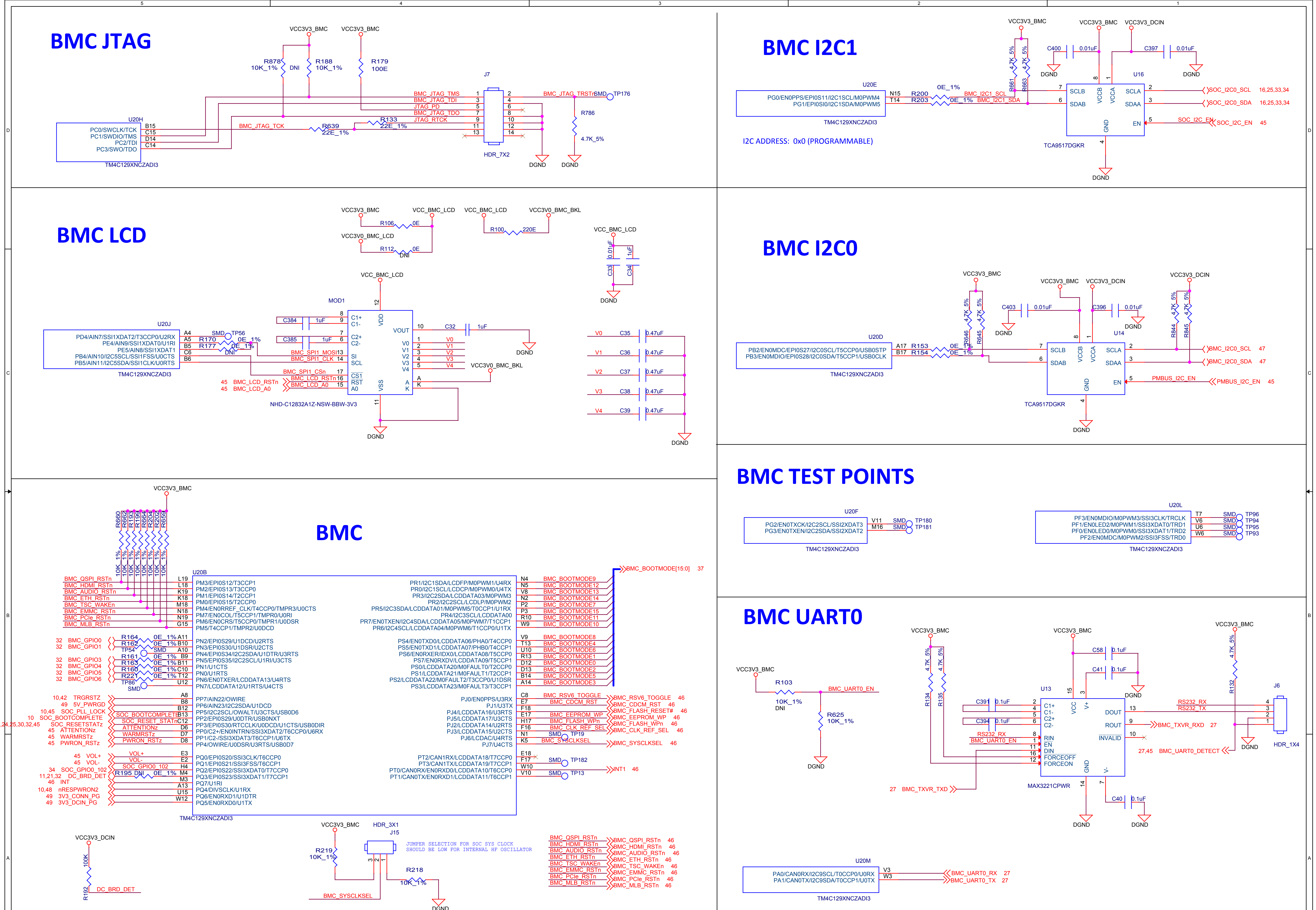
XDS200 POWER



JTAG FET SWITCH



Project :	Designed for TI by Mistral Solutions Pvt Ltd	Title XDS200 POWER
K2G EVM	Texas Instruments Mistral	Size C Document Number MS_TI_K2GEVM_SCH_REVD Rev D
		Date: Wednesday, April 13, 2016 Sheet 43 of 50



Project :	Designed for TI by Mistral Solutions Pvt Ltd	Title	BOARD MANAGEMENT CONTROL_1
K2G EVM	TEXAS INSTRUMENTS MISTRAL	Size C	Document Number MS_TI_K2GEVM_SCH_REVD · Rev D
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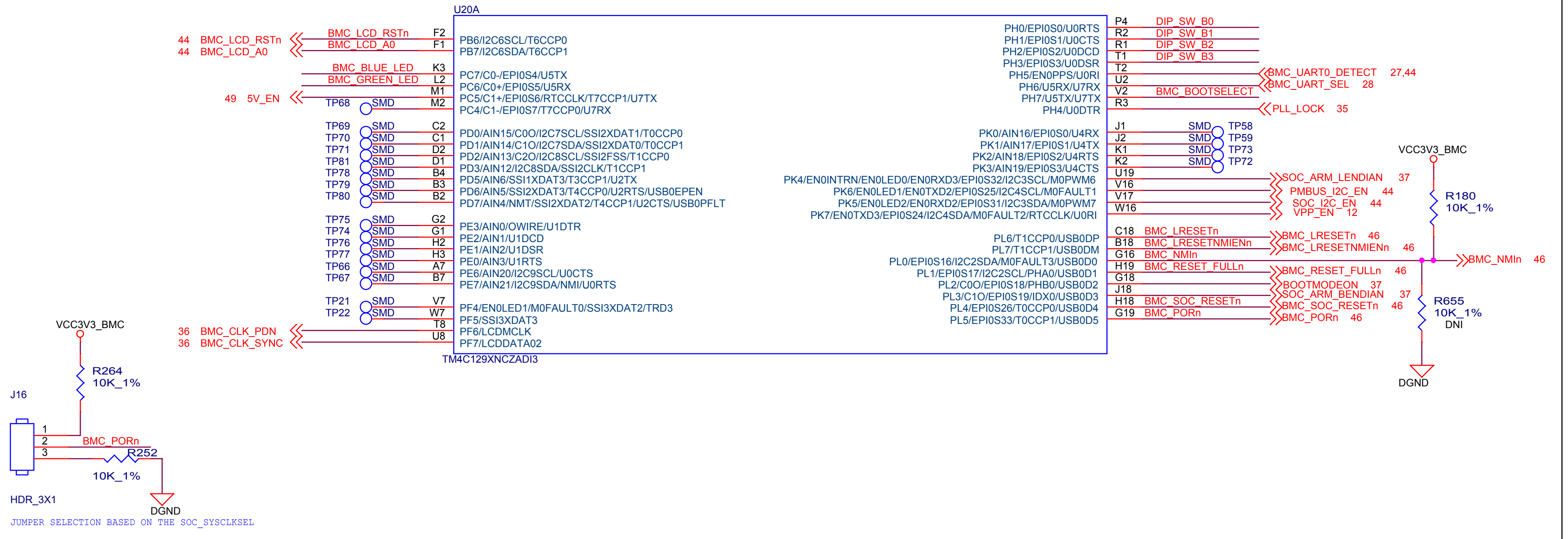
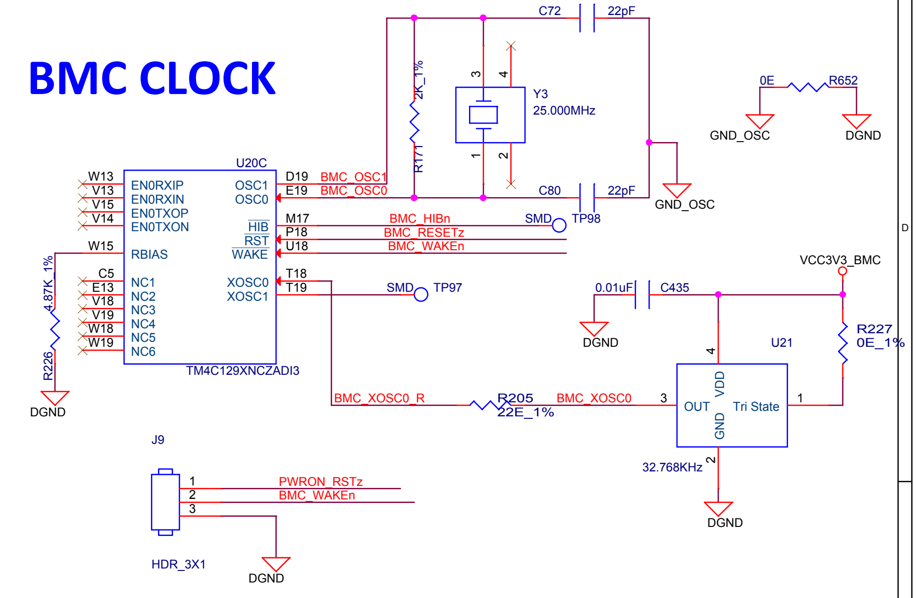
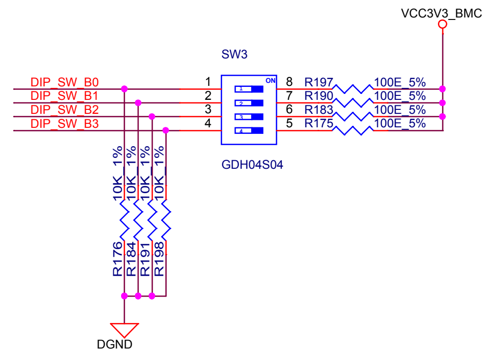
BMC



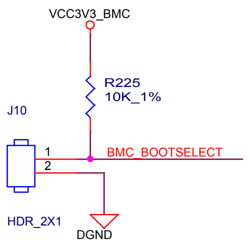
BMC CLOCK



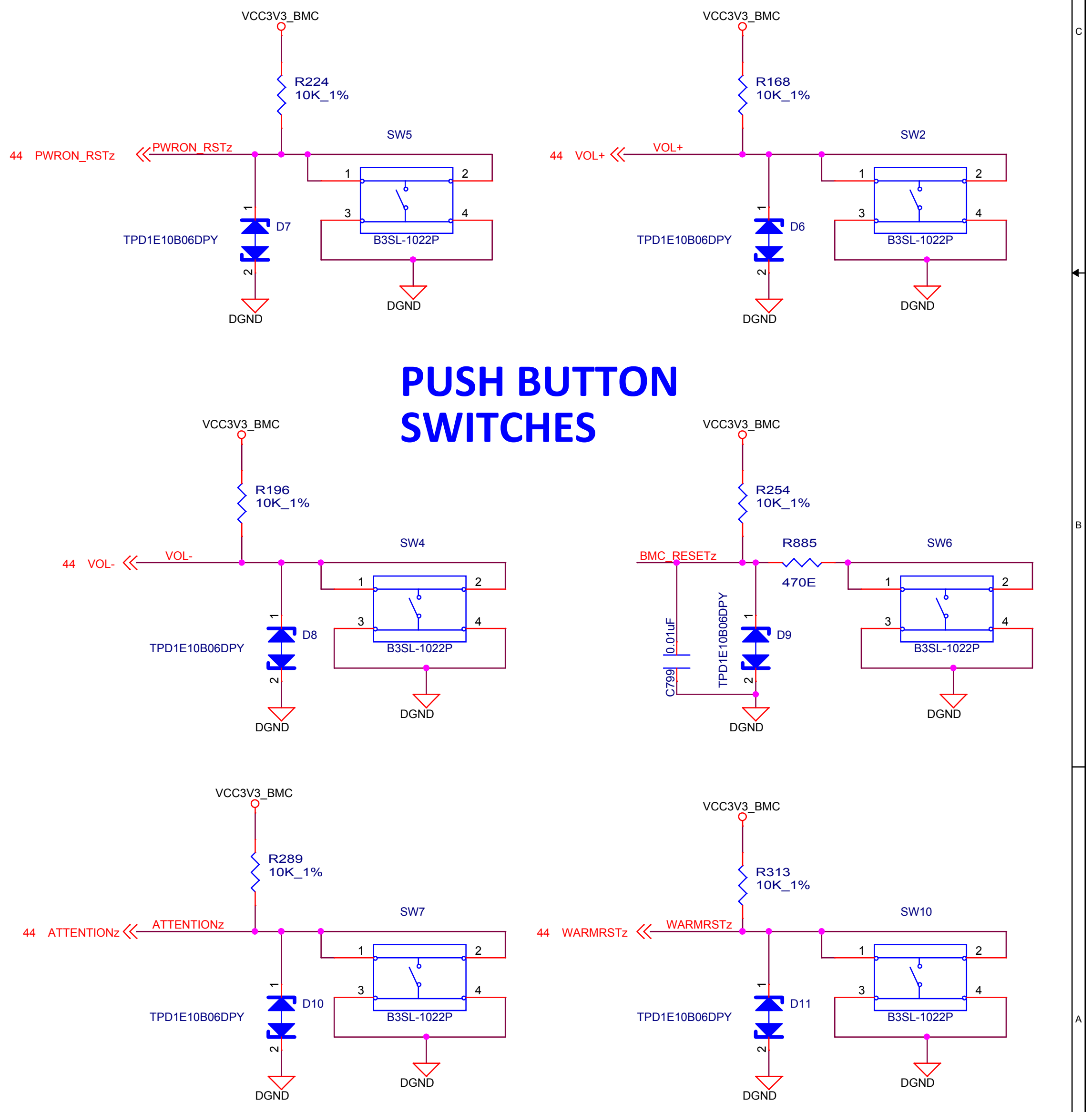
DIP SWITCH



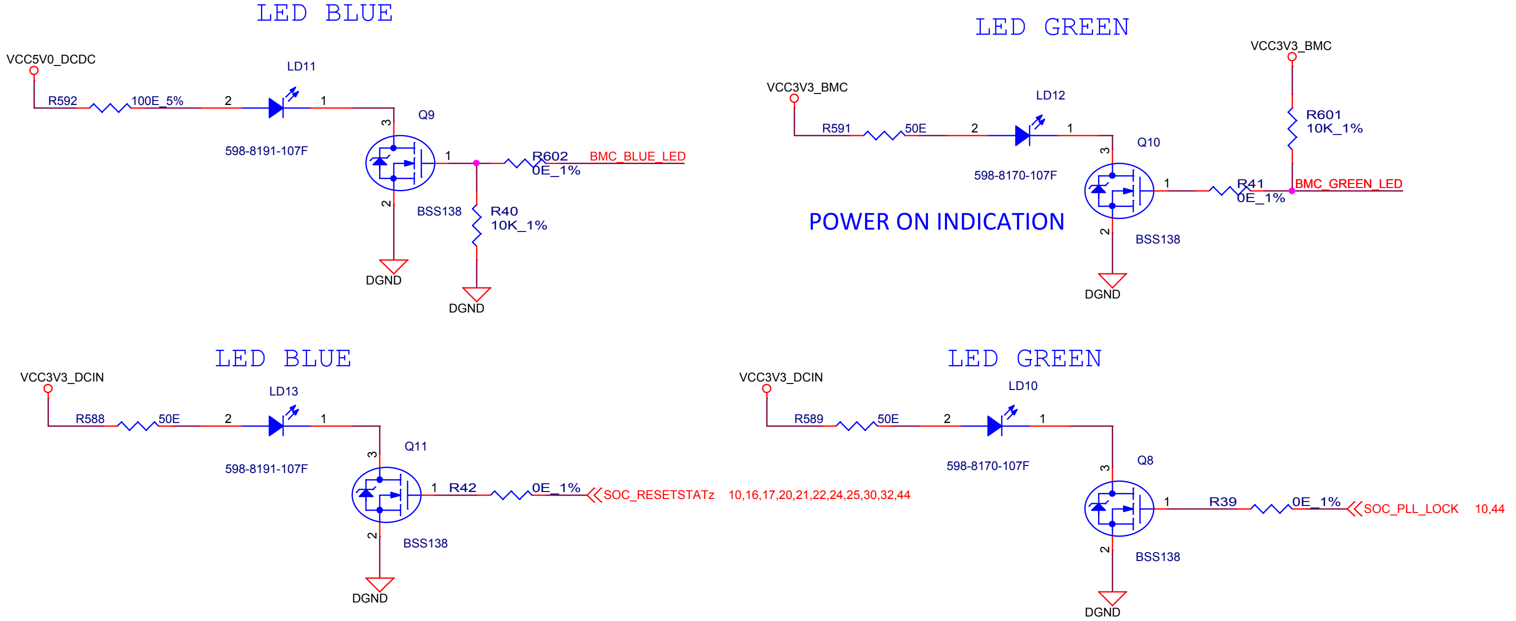
BMC BOOT SELECT



PUSH BUTTON SWITCHES



LEDS



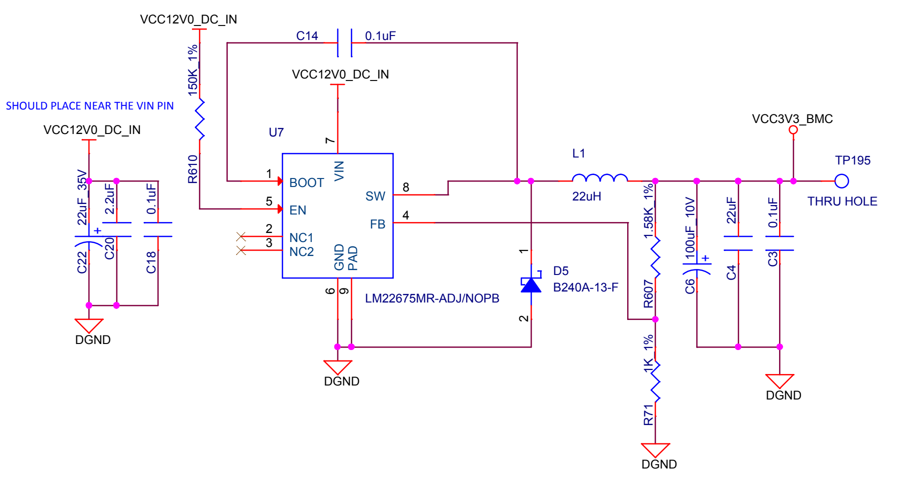
Project :

K2G EVM

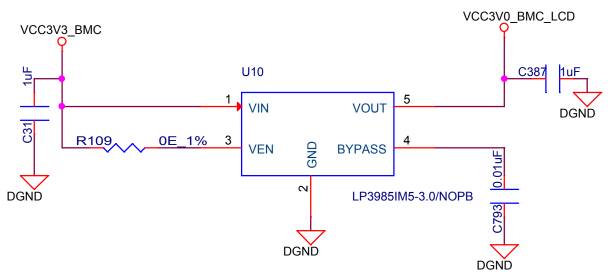
Designed for TI by Mistral Solutions Pvt Ltd

Title	BOARD MANAGEMENT CONTROL_2				
Size	Document Number				Rev
C	MS_TI_K2GEVM_SCH_REVD				D
Date:	Wednesday, April 13, 2016	Sheet	45	of	50

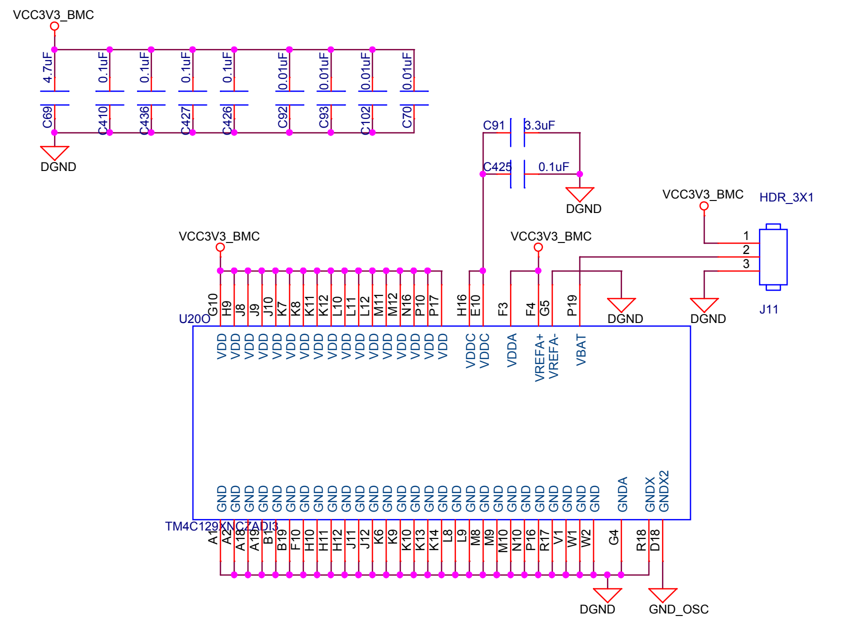
BMC 3.3V GENERATOR

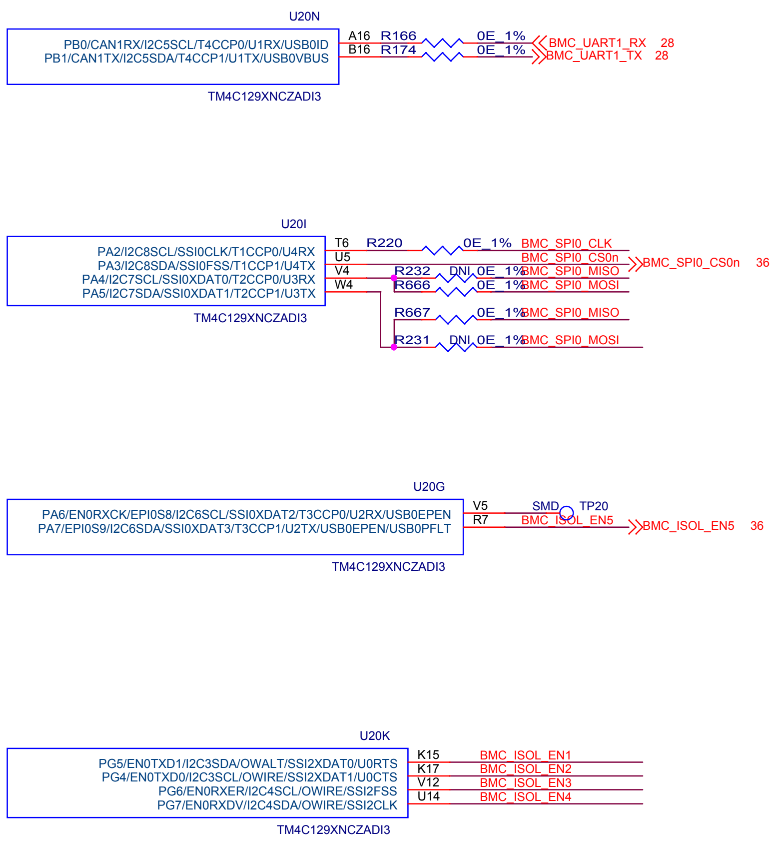


BMC LCD 3V GENERATOR

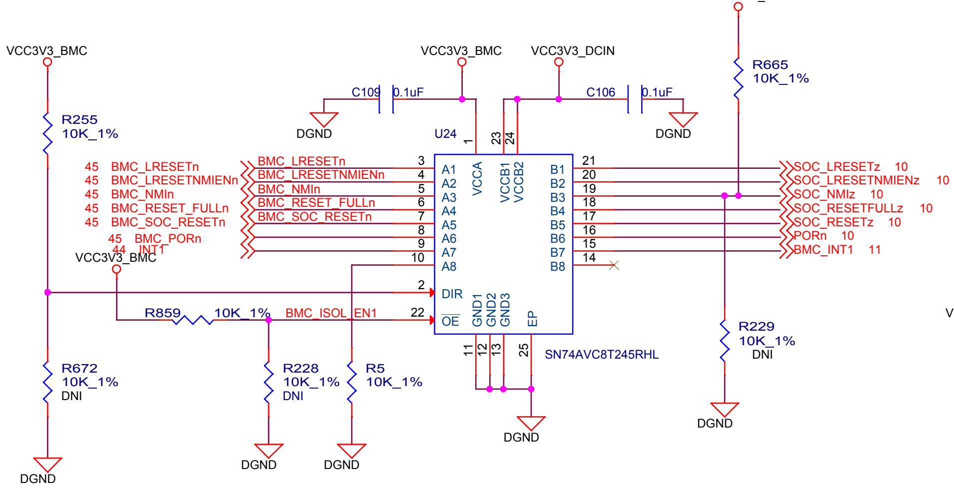


BMC POWER

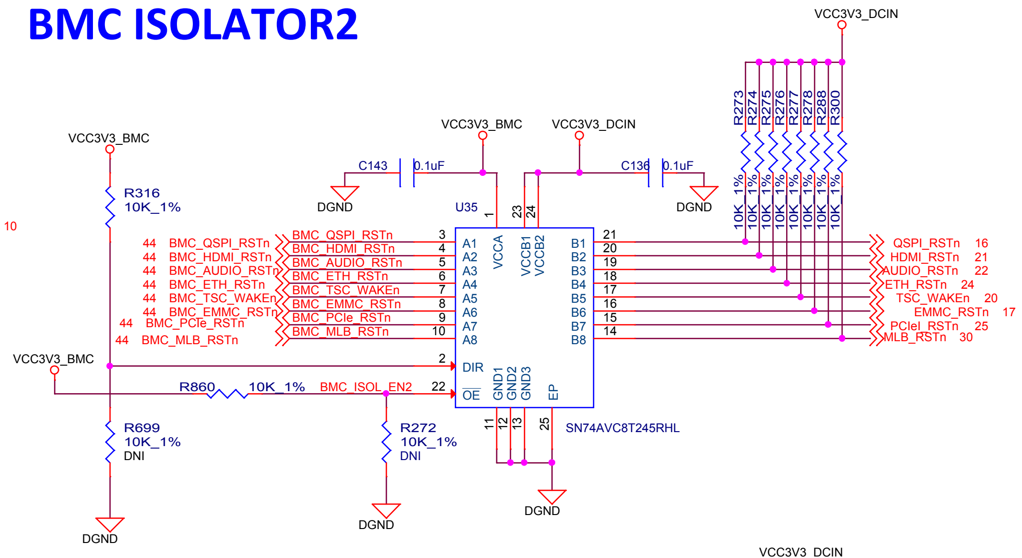




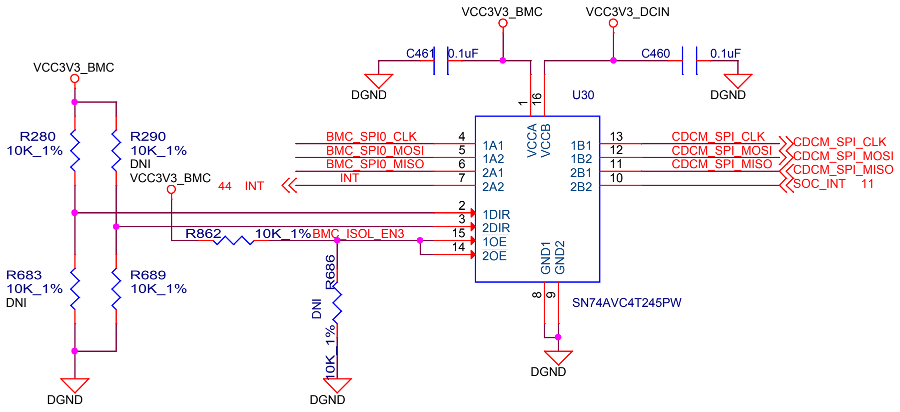
BMC ISOLATOR1



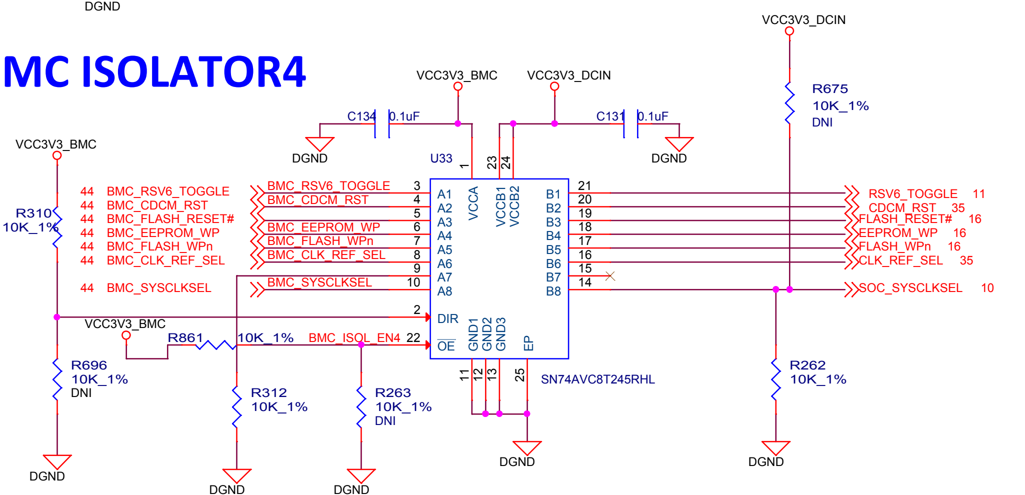
BMC ISOLATOR2



BMC ISOLATOR3



BMC ISOLATOR4



Project : K2G EVM	Designed for TI by Mistral Solutions Pvt Ltd	Title	BOARD MANAGEMENT CONTROL_3
		Size C	Document Number MS_TI_K2GEVM_SCH_REVD	Rev D
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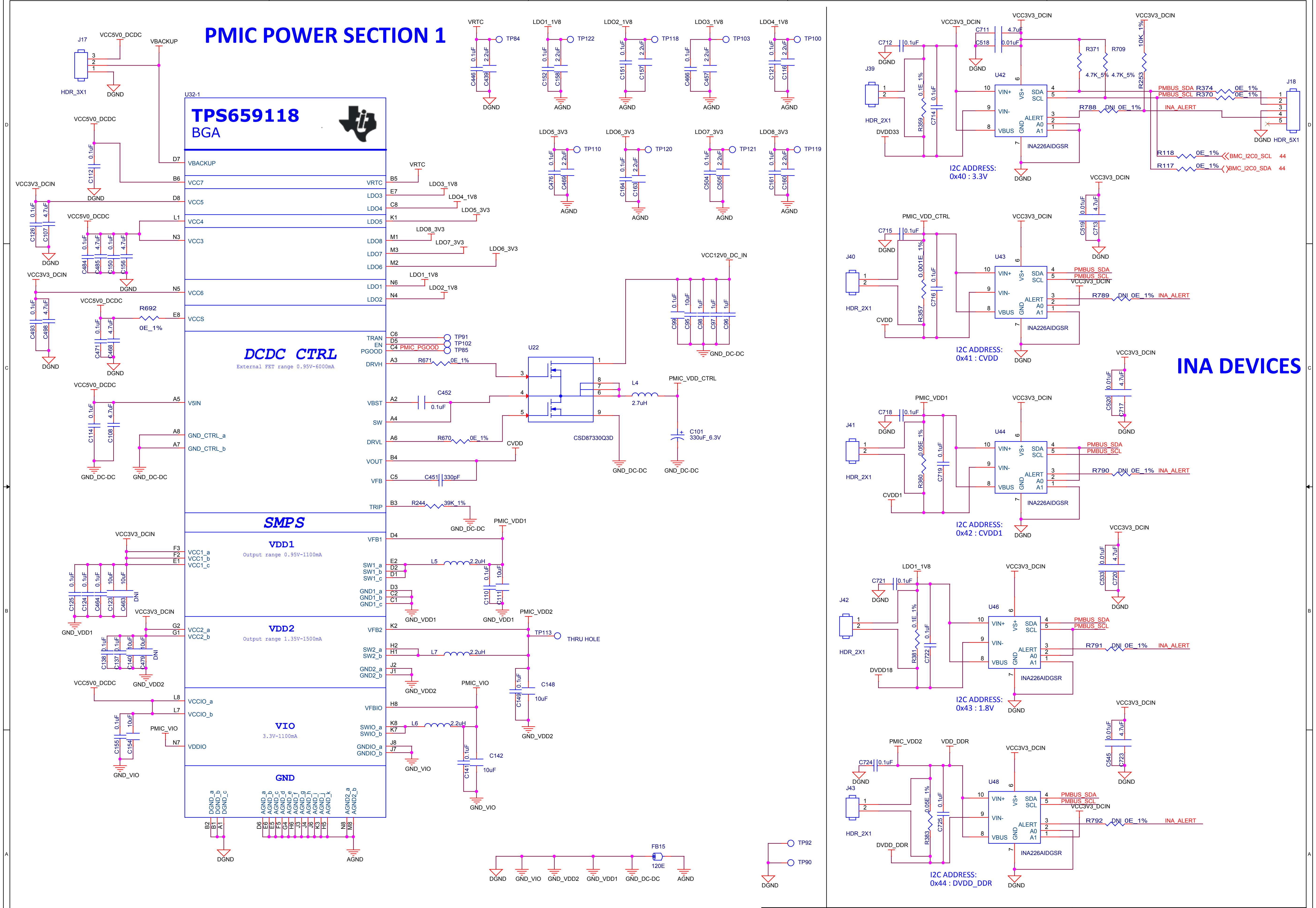
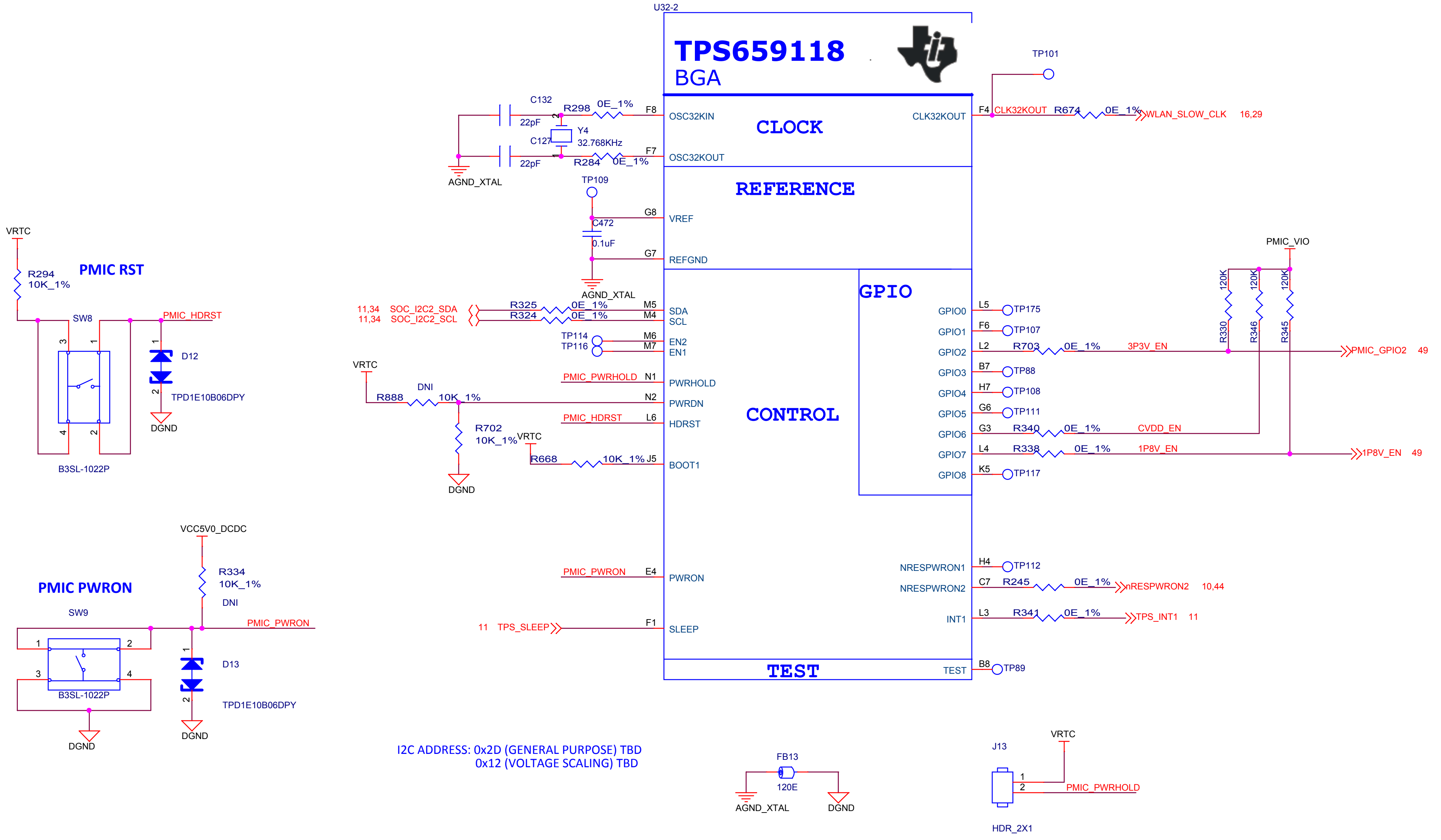


Project : K2G EVM	Designed for TI by Mistral Solutions Pvt Ltd	Title: PMIC POWER CIRCUIT 1
		Size: C
		Document Number: MS_TI_K2GEVM_SCH_REVD
		Rev: D
		Date: Wednesday, April 13, 2016
		Sheet 47 of 50

PMIC POWER SECTION 2



I2C ADDRESS: 0x2D (GENERAL PURPOSE) TBD
0x12 (VOLTAGE SCALING) TBD

Project :
K2G EVM

Designed for TI by Mistral Solutions Pvt Ltd

Title	PMIC POWER CIRCUIT 2
Size	C
Document Number	MS_TI_K2GEVM_SCH_REVD
Rev	D
Date:	Wednesday, April 13, 2016
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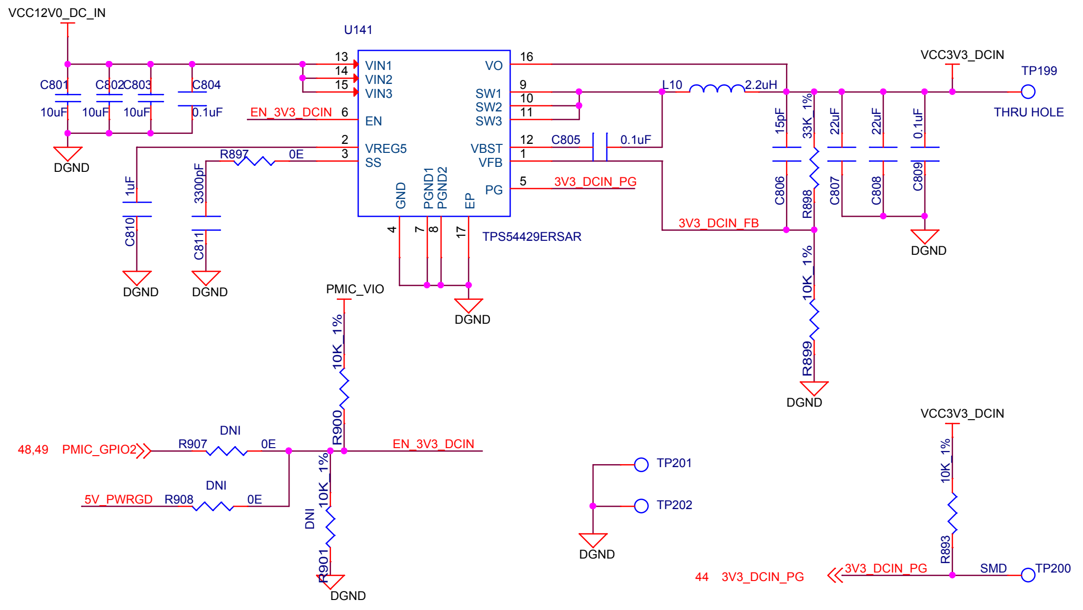
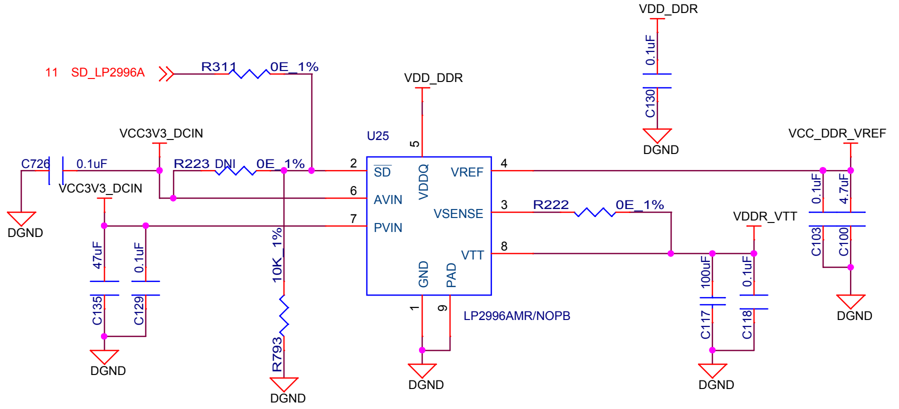
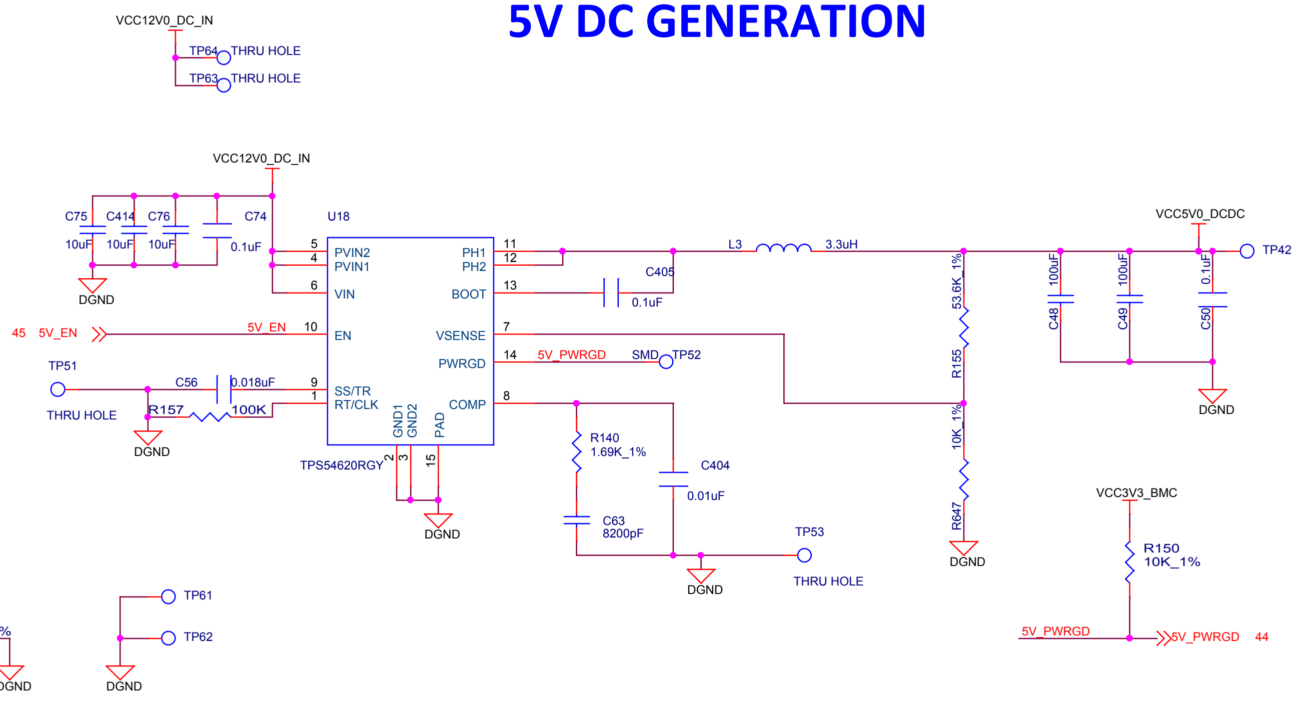
3.3V DC



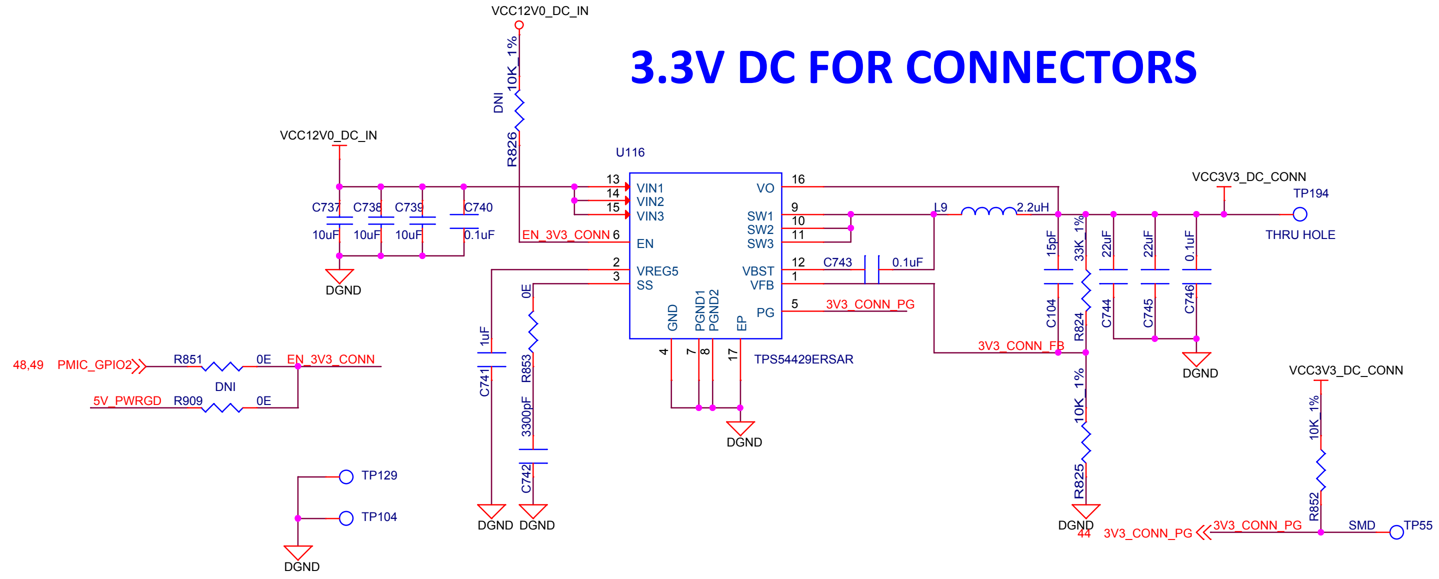
DDR VTT & VREF GENERATION



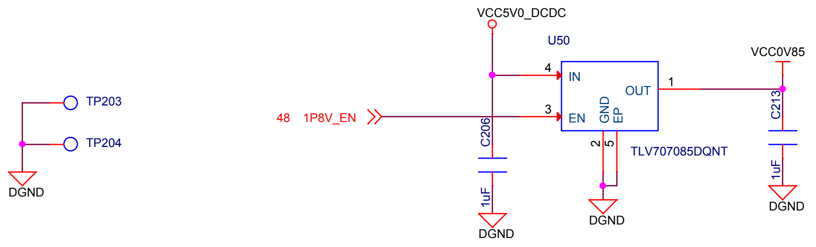
5V DC GENERATION



3.3V DC FOR CONNECTORS



0.85V OPTIONAL LDO FOR PCIE & USB MODULES



Project : K2G EVM

Designed for TI by Mistral Solutions Pvt Ltd

Title DDR3L POWER

Size	Document Number	Rev
C	MS_TI_K2GEVM_SCH_REVD	D

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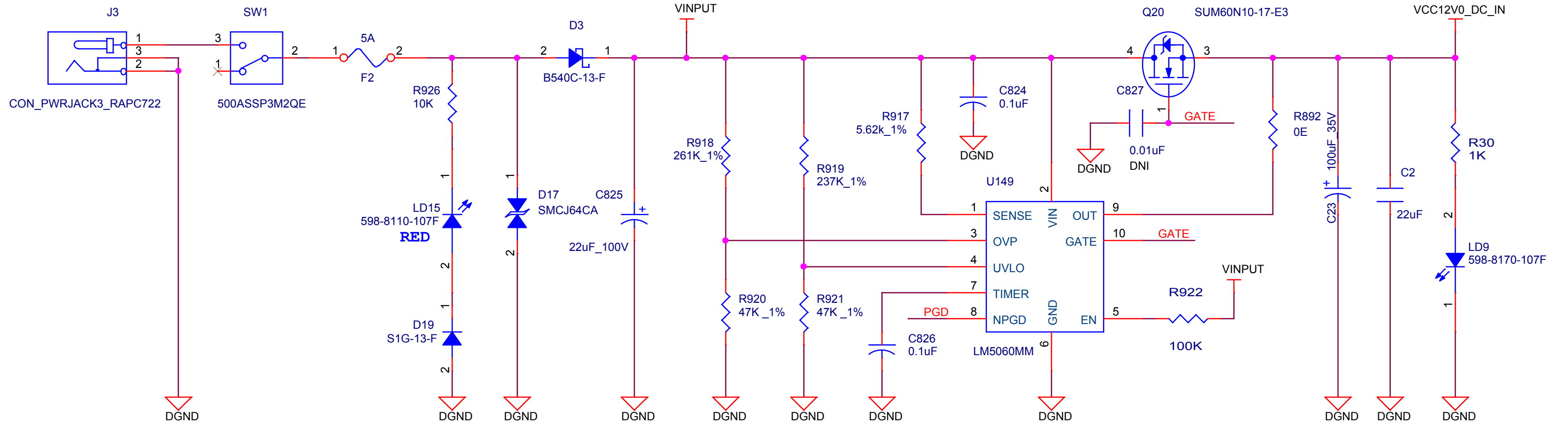
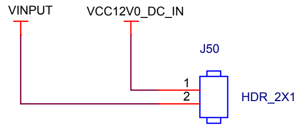
OVER VOLTAGE PROTECTION CIRCUIT



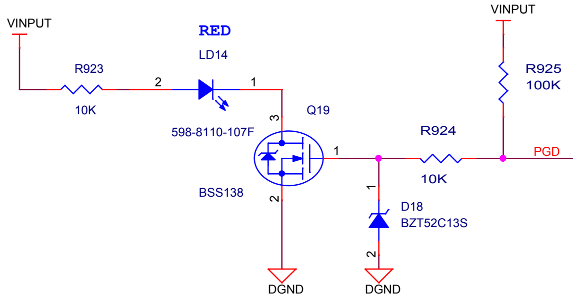
Note:-

Vinput nominal = 12V
I input max = 5A

Condition	LED Status(LD15)
Reverse Voltage	ON



Fault Indication



Condition	LED Status(LD14)
VINPUT between 11 to 13V & Current below 5A	OFF
VINPUT above 13V or below 11V & Current above 5A	ON

Note:-

When fault is indicated ,set to proper voltage and power cycle the board.

Project : K2G EVM	Designed for TI by Mistral Solutions Pvt Ltd TEXAS INSTRUMENTS MISTRAL	Title OVER VOLTAGE PROTECTION Size C Document Number MS_TI_K2GEVM_SCH_REVD Rev D Date: Wednesday, April 13, 2016 Sheet 50 of 50

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