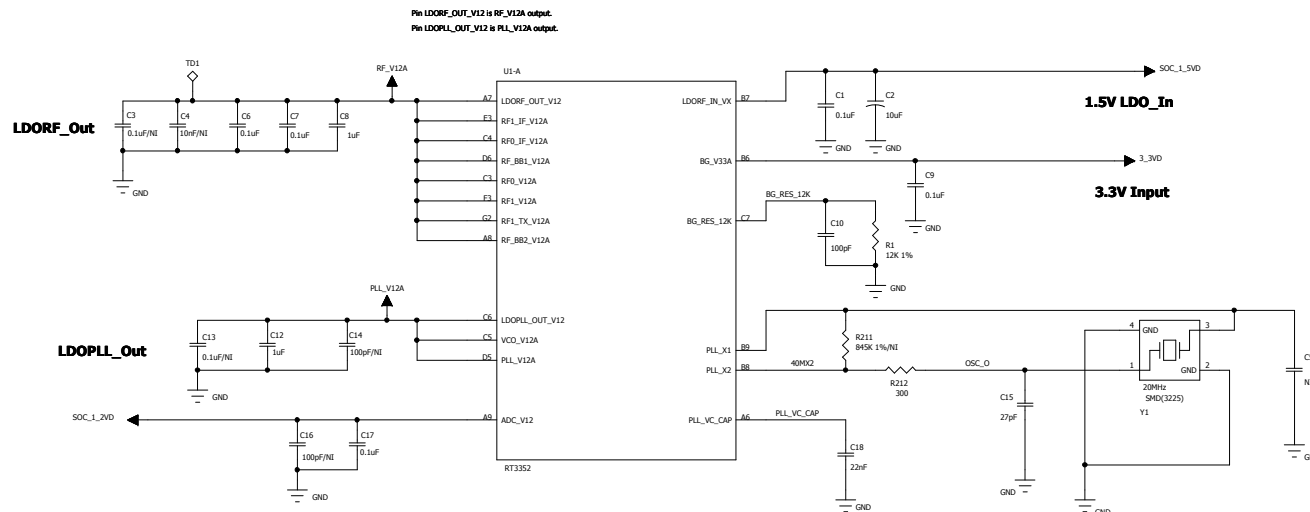


6 5 4 3 2 1

*** CPU_1 ***

REVISION RECORD			
LTR	ECO NO:	APPROVED:	DATE:



COMPANY: SUGA ELECTRONICS LTD.

TITLE: RT3352 Wifi Module (Model SWP23MA-2)

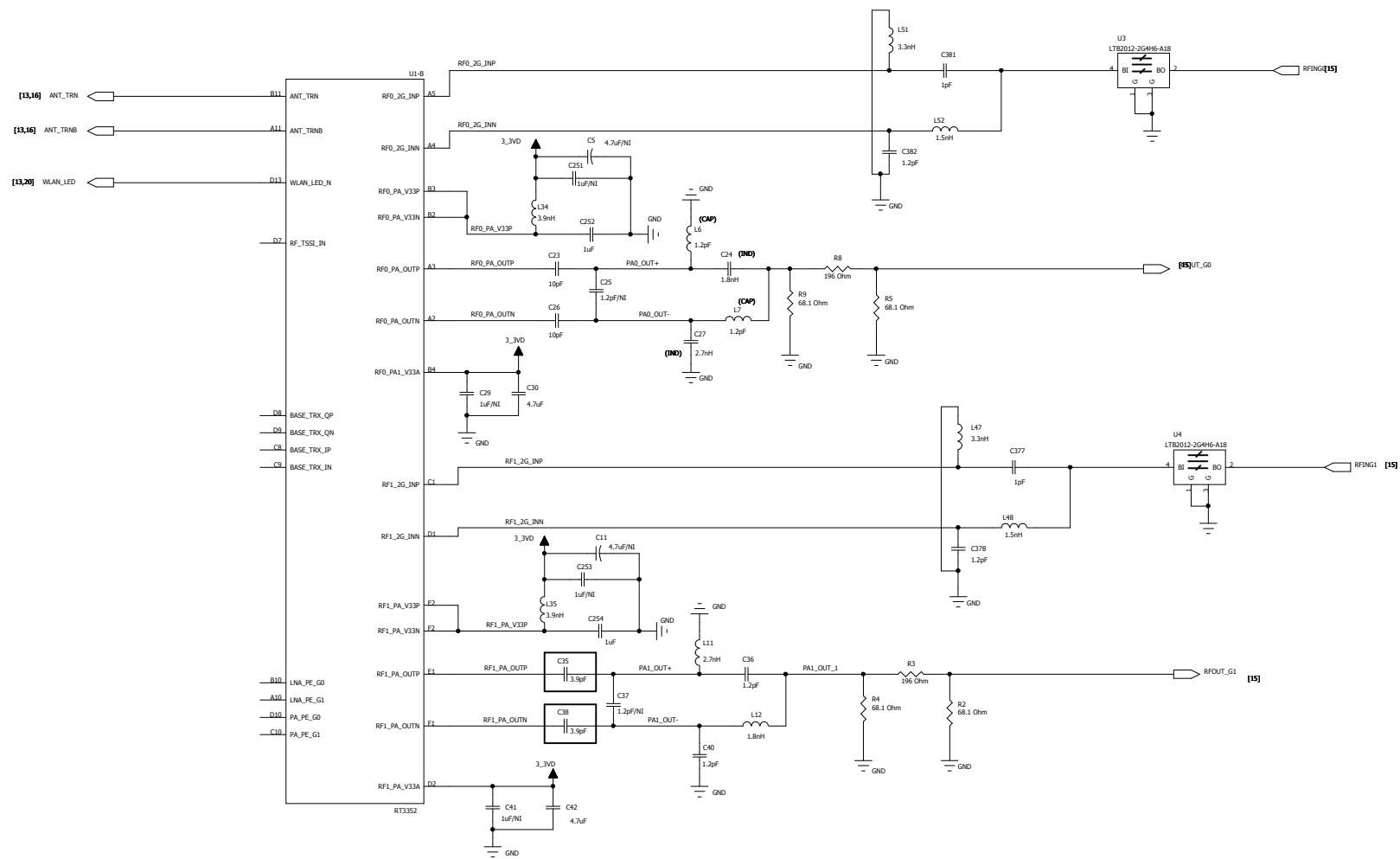
DRAWN: QQ Pei	DATED: Jul 4, 2013
CHECKED: TONY TSANG	DATED: Jul 4, 2013
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

CODE:	SIZE: A2	DRAWING NO:	REV: V4.1.1
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*** CPU_2, RF ***

REVISION RECORD			
LTR	ECO NO.	APPROVED:	DATE:



COMPANY: SUGA ELECTRONICS LTD.

TITLE: RT3352 Wifi Module (Model SWP23MA-2)

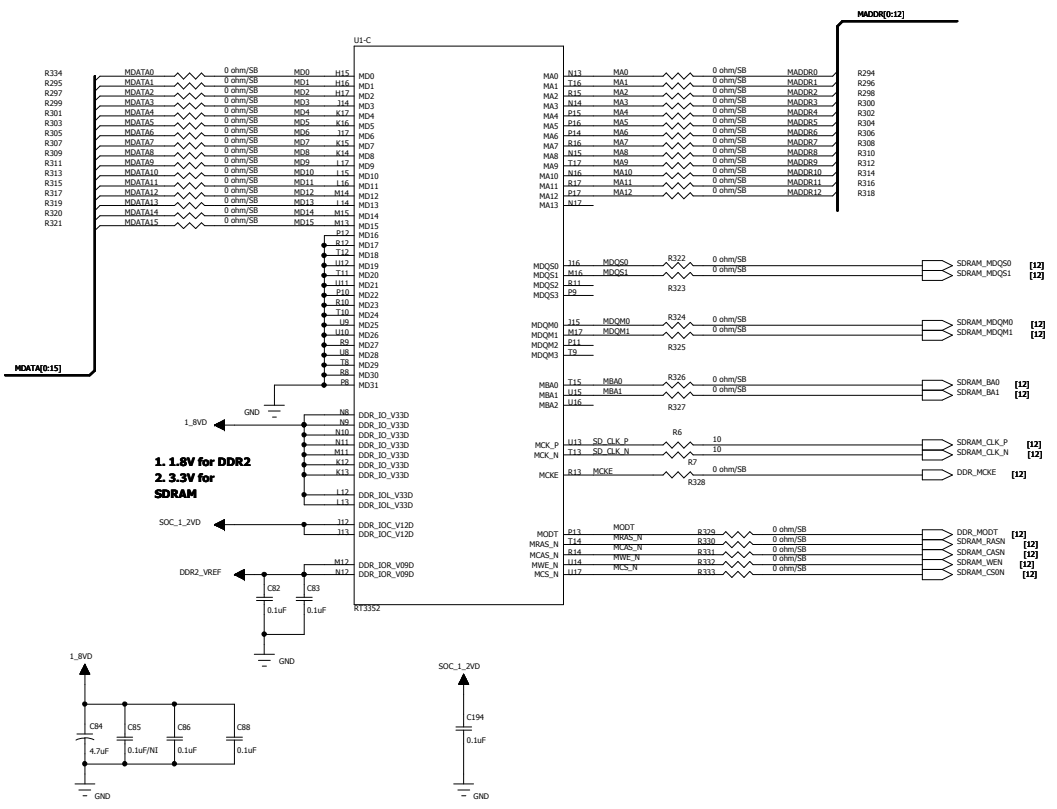
DRAWN: QQ Pei	DATED: Jul 4, 2013
CHECKED: TONY TSANG	DATED: Jul 4, 2013
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

CODE:	SIZE: A2	DRAWING NO:	REV: V4.1.1
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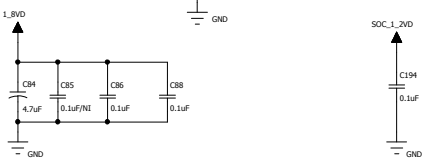
6 5 4 3 2 1

*** CPU_3, DDR I/F ***

REVISION RECORD			
LTR	ECO NO.	APPROVED:	DATE:



1. 1.8V for DDR2
2. 3.3V for SDRAM



COMPANY: SUGA ELECTRONICS LTD.			
TITLE: RT3352 Wifi Module (Model SWP23MA-2)			
DRAWN: QQ Pei	DATED: Jul 4, 2013	CODE:	SIZE: A2
CHECKED: TONY TSANG	DATED: Jul 4, 2013	DRAWING NO:	REV: V4.1.1
QUALITY CONTROL:	DATED:		
RELEASED:	DATED:		
SCALE:			SHEET: 4 of 21

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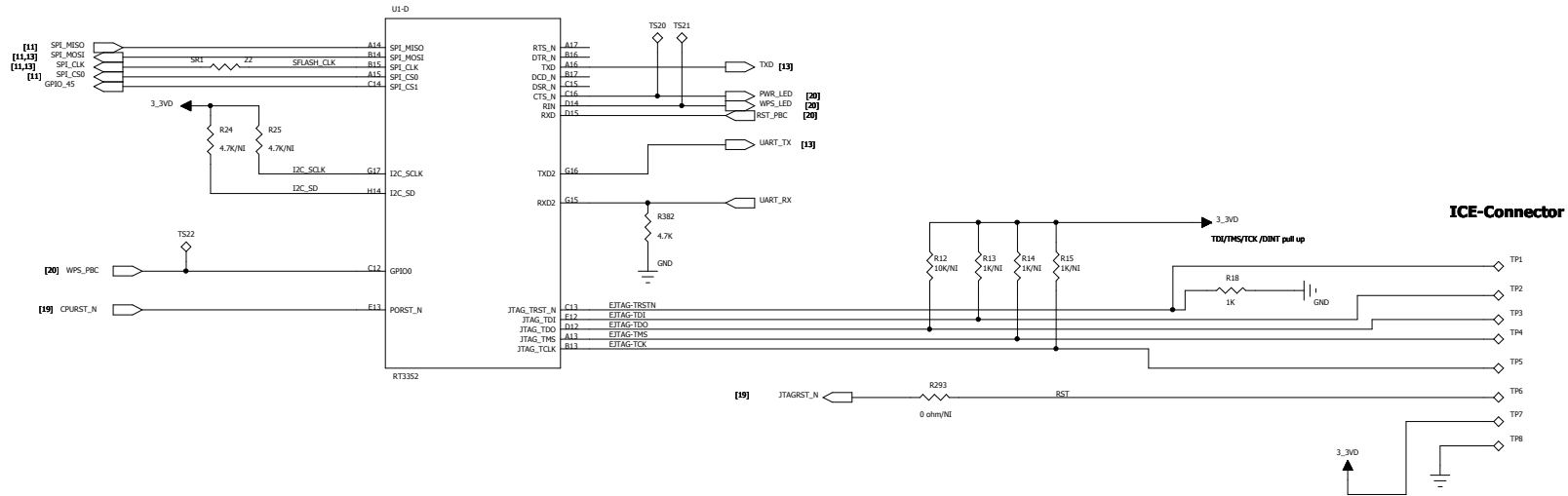
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*** CPU_4 ***

REVISION RECORD			
LTR	ECO NO:	APPROVED:	DATE:



COMPANY: SUGA ELECTRONICS LTD.

TITLE: RT3352 Wifi Module (Model SWP23MA-2)

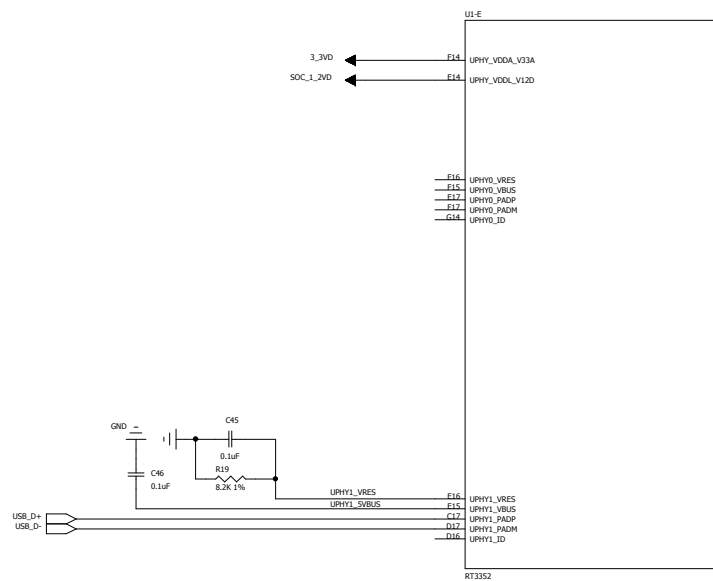
DRAWN: QQ Pei	DATED: Jul 4, 2013
CHECKED: TONY TSANG	DATED: Jul 4, 2013
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

CODE:	SIZE: A2	DRAWING NO:	REV: V4.1.1
SCALE:			SHEET: 5 OF 21

6 5 4 3 2 1

*** CPU_5, USB I/F ***

REVISION RECORD			
LTR	ECO NO:	APPROVED:	DATE:



COMPANY: SUGA ELECTRONICS LTD.

TITLE: RT3352 Wifi Module (Model SWP23MA-2)

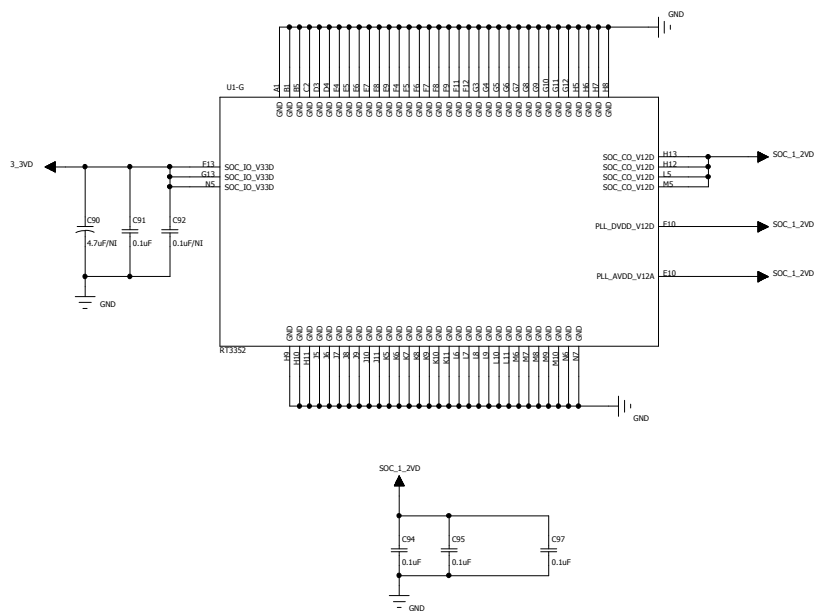
DRAWN: QQ Pei	DATED: Jul 4, 2013
CHECKED: TONY TSANG	DATED: Jul 4, 2013
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

CODE:	SIZE: A2	DRAWING NO:	REV: V4.1.1
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*** CPU_7 ***

REVISION RECORD			
LTR	ECO NO:	APPROVED:	DATE:



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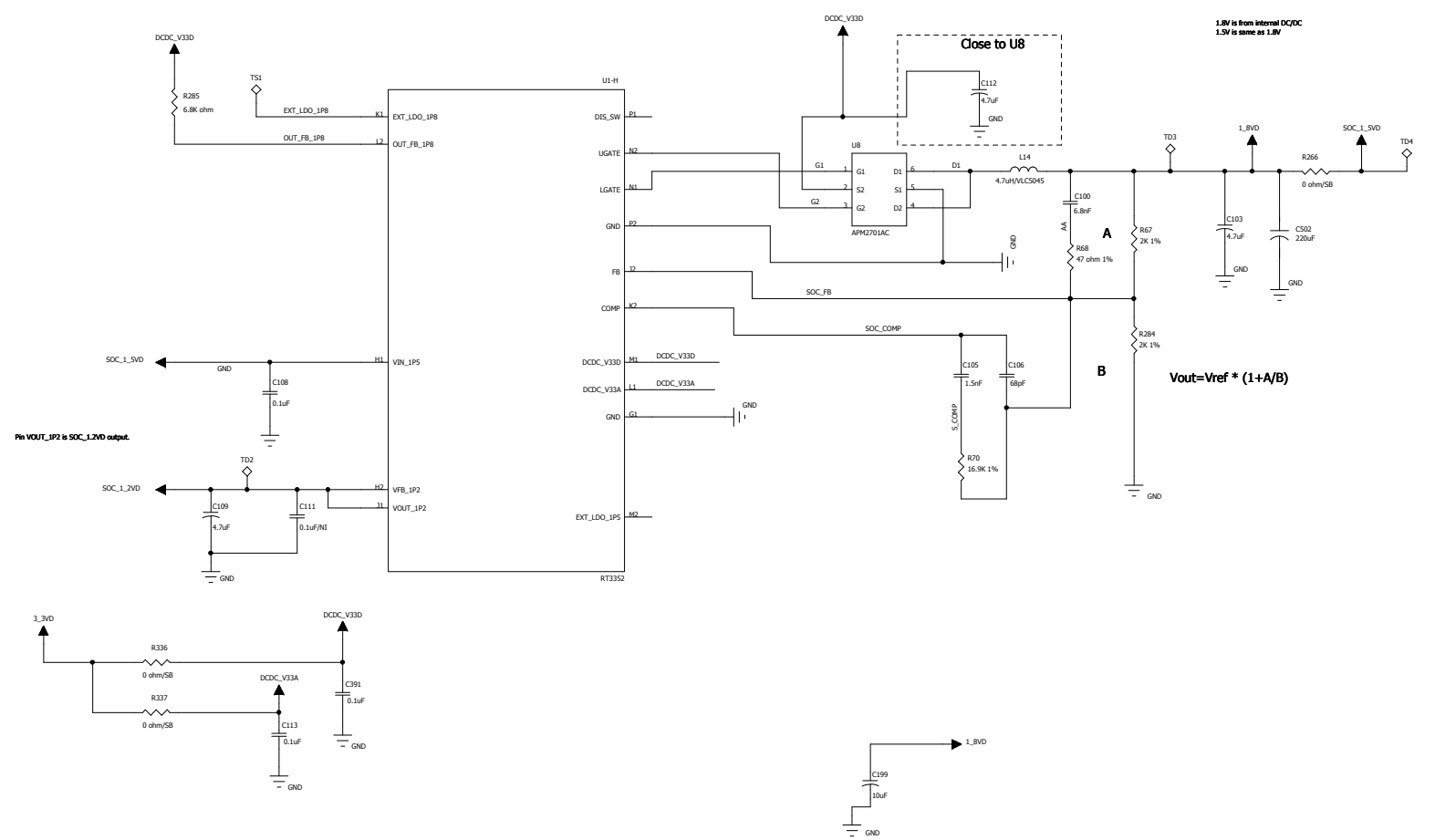
COMPANY: SUGA ELECTRONICS LTD.			
TITLE: RT3352 Wifi Module (Model SWP23MA-2)			
CODE:	SIZE: A2	DRAWING NO:	REV: V4.1.1
SCALE:		SHEET: 8 of 21	

DRAWN: QQ Pei	DATED: Jul 4, 2013
CHECKED: TONY TSANG	DATED: Jul 4, 2013
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

6 5 4 3 2 1

*** CPU_8, DC/DC ***

REVISION RECORD			
LTR	ECO NO.	APPROVED:	DATE:



COMPANY: SUGA ELECTRONICS LTD.

TITLE: RT3352 Wifi Module (Model SWP23MA-2)

DRAWN: QQ Pei	DATED: Jul 4, 2013
CHECKED: TONY TSANG	DATED: Jul 4, 2013
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

CODE:	SIZE: A2	DRAWING NO:	REV: V4.1.1
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*** CPU_9, none ***

REVISION RECORD			
LTR	ECO NO.	APPROVED:	DATE:

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DRAWN:	QQ Pei	DATED:	Jul 4, 2013
CHECKED:	TONY TSANG	DATED:	Jul 4, 2013
QUALITY CONTROL:		DATED:	
RELEASED:		DATED:	

COMPANY:				SUGA ELECTRONICS LTD.							
TITLE:								RT3352 Wifi Module (Model SWP23MA-2)			
CODE:		SIZE:		DRAWING NO:			REV:				
		A2					V4.1.1				
SCALE:								SHEET: 10 of 21			

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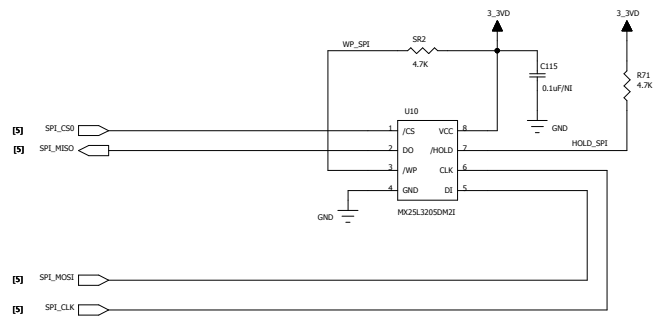
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*** MEMORY_1, SPI Flash ***

REVISION RECORD			
LTR	ECO NO:	APPROVED:	DATE:



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COMPANY: SUGA ELECTRONICS LTD.			
TITLE: RT3352 Wifi Module (Model SWP23MA-2)			

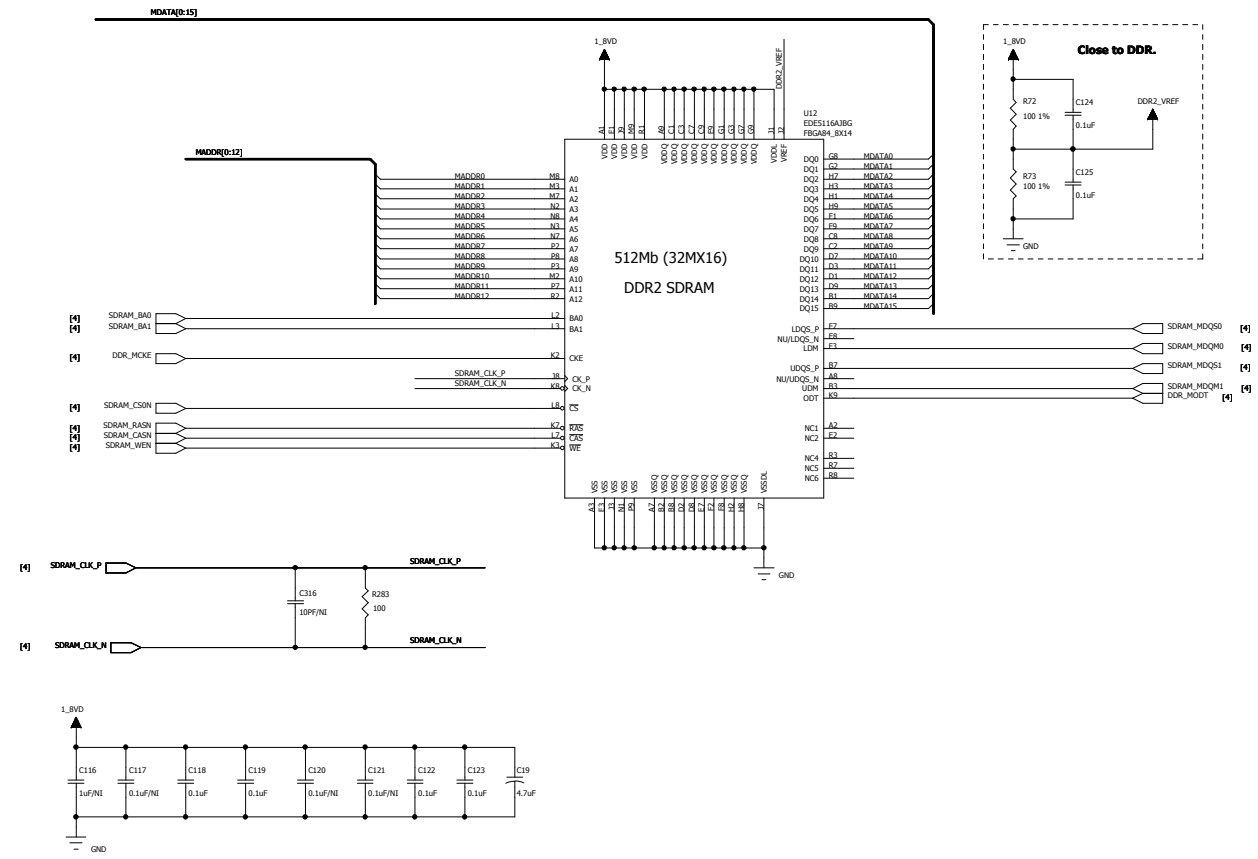
DRAWN: QQ Pei	DATED: Jul 4, 2013
CHECKED: TONY TSANG	DATED: Jul 4, 2013
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

CODE:	SIZE: A2	DRAWING NO:	REV: V4.1.1
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*** MEMORY_2, DDR ***

REVISION RECORD			
LTR	ECO NO.	APPROVED:	DATE:



COMPANY: SUGA ELECTRONICS LTD.			
TITLE: RT3352 Wifi Module (Model SWP23MA-2)			
CODE:	SIZE: A2	DRAWING NO:	REV: V4.1.1
SCALE:		SHEET: 12 of 21	

DRAWN: QQ Pei	DATED: Jul 4, 2013
CHECKED: TONY TSANG	DATED: Jul 4, 2013
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

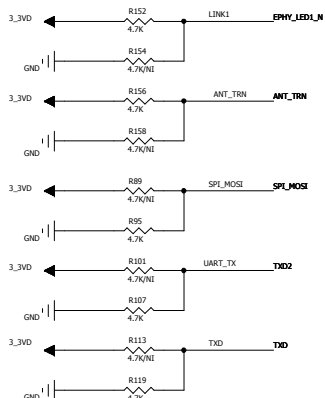
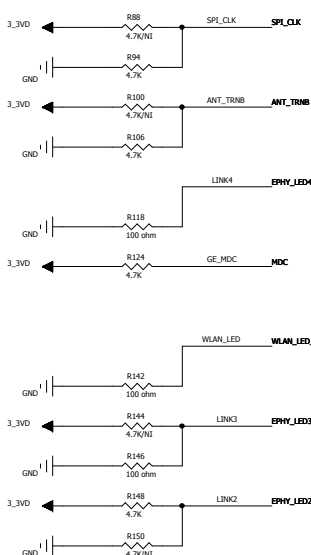
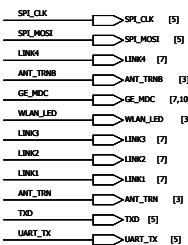
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*** MEMORY_3, Boot Option ***

REVISION RECORD			
LTR	ECO NO.	APPROVED:	DATE:



RT3352 Boot Up Strapping

Pin Name	Description	Value=0	Value=1
SPI_CLK	XTAL_FREQ_HI	20MHz	40MHz
ANT_TRNB	Big Endian	Little Endian	Big Endian
EPHY_LED4_N	DRAM_FROM_EE	from boot strapping	from EEPROM
MDC	DRAM_TYPE	SDRAM	DDR2
WLAN_LED_N	DRAM_TOTAL_WIDTH	16	32
{EPHY_LED3_N, EPHT_LED2_N}	DRAM_SIZE	INIC/AP(SDR)/AP(DDR2) 00: 2MB/8MB/32MB 01: 8MB/16MB/64MB 10: 16MB/32MB/128MB 11: 32MB/64MB/256MB	
EPHY_LED1_N	DRAM_WIDTH	SDRAM(DDR2) 0: 16(8) 1: 32(16)	
ANT_TRN	CPU_CLK_SEL	384MHz	400MHz
{SPI_MOSI, TXD2, TXD}	CHIP_MODE[2:0]	000 : AP 001 : INIC-USB 010 : INIC-RGMII 011 : INIC-MII 100 : INIC-RVMII 101 : Reserved 110 : SCAN 111 : TEST/DEBUG	

COMPANY: SUGA ELECTRONICS LTD.			
TITLE: RT3352 Wifi Module (Model SWP23MA-2)			
DRAWN: QQ Pei	DATED: Jul 4, 2013	CODE:	REV: V4.1.1
CHECKED: TONY TSANG	DATED: Jul 4, 2013	SIZE: A2	DRAWING NO:
QUALITY CONTROL:	DATED:	SHEET: 13 of 21	
RELEASED:	DATED:	SCALE:	

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*** WLAN_1, none ***

REVISION RECORD			
LTR	ECO NO.	APPROVED:	DATE:

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DRAWN:	QQ Pei	DATED:	Jul 4, 2013
CHECKED:	TONY TSANG	DATED:	Jul 4, 2013
QUALITY CONTROL:		DATED:	
RELEASED:		DATED:	

COMPANY:				SUGA ELECTRONICS LTD.			
TITLE:							
RT3352 Wifi Module (Model SWP23MA-2)							
CODE:	SIZE:	DRAWING NO:			REV:		
	A2				V4.1.1		
SCALE:						SHEET: 14	21

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*** WLAN_2, none ***

REVISION RECORD			
LTR	ECO NO.	APPROVED:	DATE:

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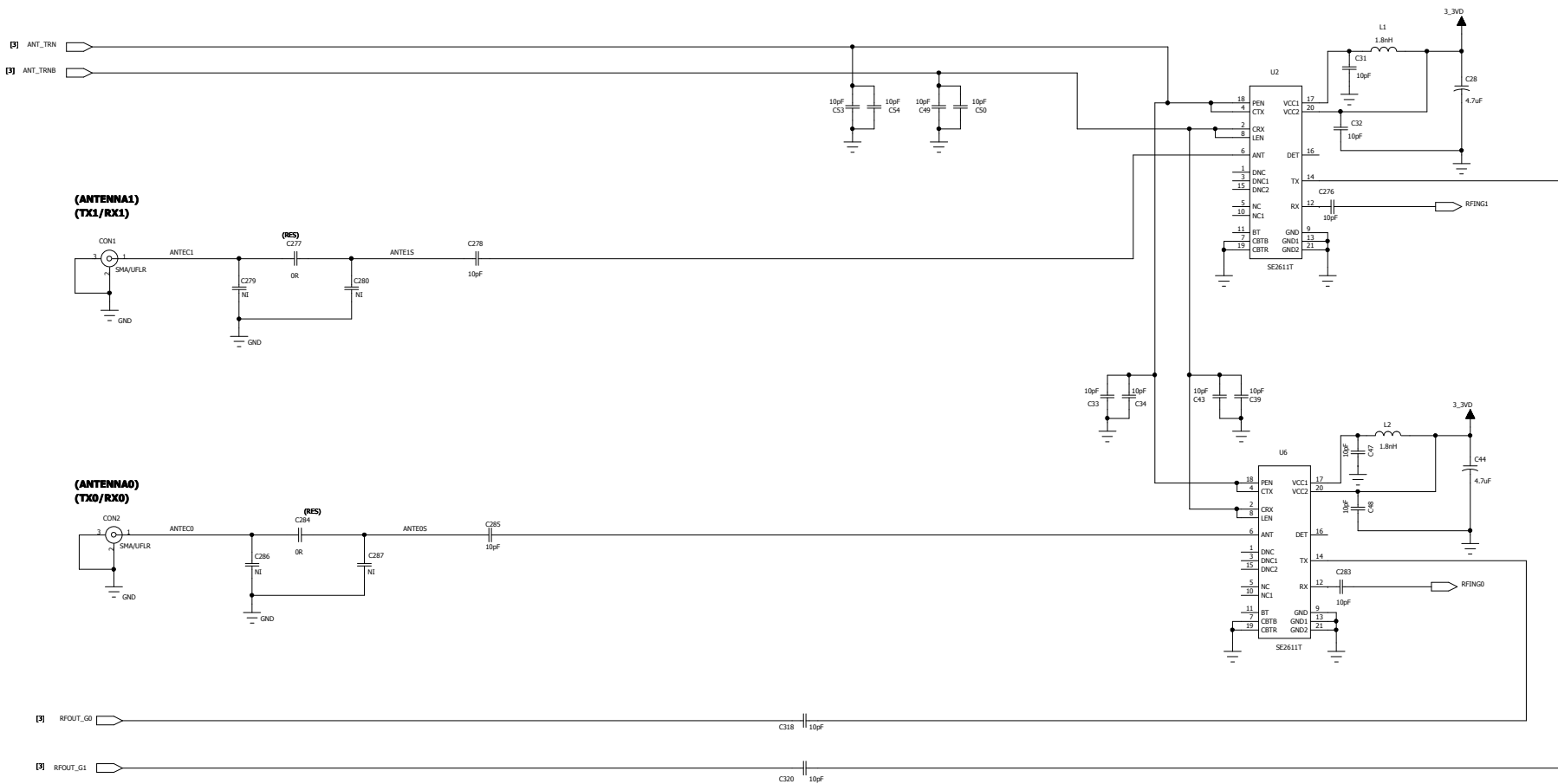
DRAWN:	QQ Pei	DATED:	Jul 4, 2013
CHECKED:	TONY TSANG	DATED:	Jul 4, 2013
QUALITY CONTROL:		DATED:	
RELEASED:		DATED:	

COMPANY:				SUGA ELECTRONICS LTD.			
TITLE:							
RT3352 Wifi Module (Model SWP23MA-2)							
CODE:	SIZE:	DRAWING NO:			REV:		
	A2				V4.1.1		
SCALE:						SHEET: 15 of 21	

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*** WLAN_3 ***

REVISION RECORD			
LTR	ECO NO.	APPROVED:	DATE:



COMPANY: SUGA ELECTRONICS LTD.

TITLE: RT3352 Wifi Module (Model SWP23MA-2)

CODE:	SIZE: A2	DRAWING NO:	REV: V4.1.1
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SCALE: SHEET: 16 of 21

DRAWN: QQ Pei	DATED: Jul 4, 2013
CHECKED: TONY TSANG	DATED: Jul 4, 2013
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

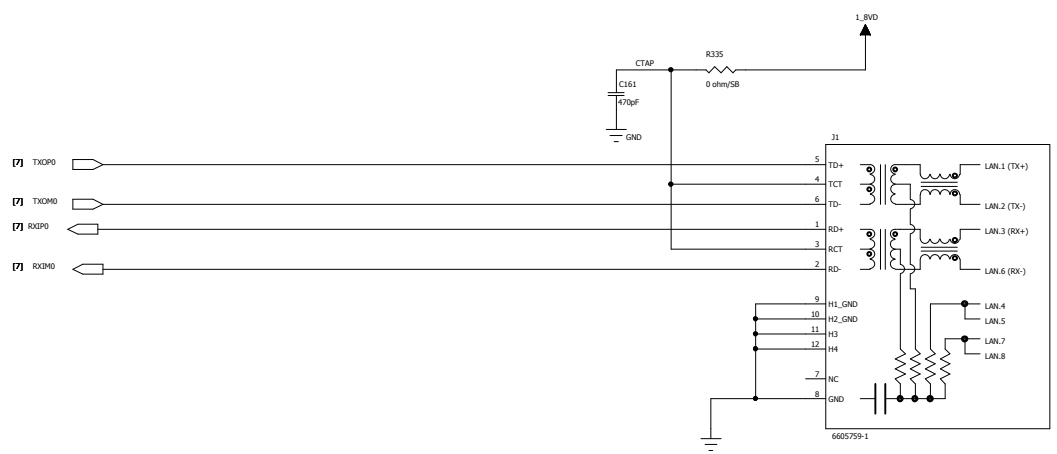
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*** ETHERNET_1 ***

REVISION RECORD			
LTR	ECO NO:	APPROVED:	DATE:



COMPANY: SUGA ELECTRONICS LTD.

TITLE: RT3352 Wifi Module (Model SWP23MA-2)

DRAWN: QQ Pei	DATED: Jul 4, 2013
CHECKED: TONY TSANG	DATED: Jul 4, 2013
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

CODE:	SIZE: A2	DRAWING NO:	REV: V4.1.1
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*** ETHERNET_2, none ***

REVISION RECORD			
LTR	ECO NO.	APPROVED:	DATE:

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DRAWN: QQ Pei		DATED: Jul 4, 2013		COMPANY: SUGA ELECTRONICS LTD.			
CHECKED: TONY TSANG		DATED: Jul 4, 2013		TITLE: RT3352 Wifi Module (Model SWP23MA-2)			
QUALITY CONTROL:		DATED:		CODE:	SIZE: A2	DRAWING NO:	REV: V4.1.1
RELEASED:		DATED:		SCALE:			SHEET: 18 of 21

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*** LED ***

REVISION RECORD			
LTR	ECO NO.	APPROVED:	DATE:

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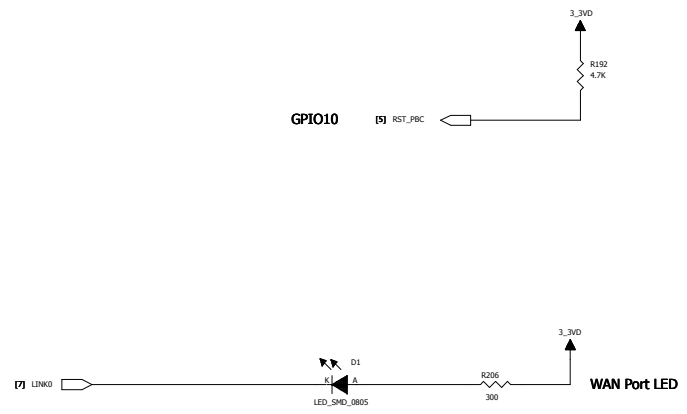
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COMPANY: SUGA ELECTRONICS LTD.

TITLE: RT3352 Wifi Module
(Model SWP23MA-2)

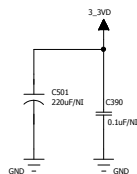
DRAWN: QQ Pei	DATED: Jul 4, 2013
CHECKED: TONY TSANG	DATED: Jul 4, 2013
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

CODE:	SIZE: A2	DRAWING NO:	REV: V4.1.1
SCALE:			SHEET: 19 of 21

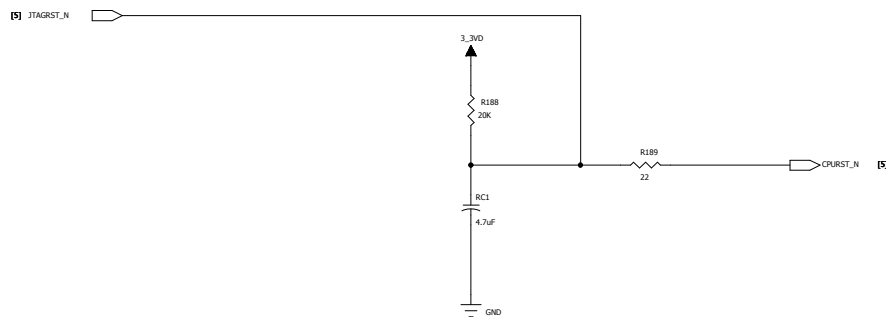
6 5 4 3 2 1

*** POWER ***

REVISION RECORD			
LTR	ECO NO.	APPROVED:	DATE:



Reset Circuit



COMPANY: SUGA ELECTRONICS LTD.

TITLE: RT3352 Wifi Module (Model SWP23MA-2)

DRAWN: QQ Pei	DATED: Jul 4, 2013
CHECKED: TONY TSANG	DATED: Jul 4, 2013
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

CODE:	SIZE: A2	DRAWING NO:	REV: V4.1.1
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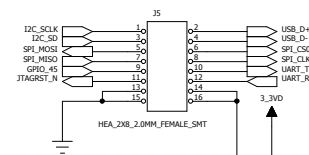
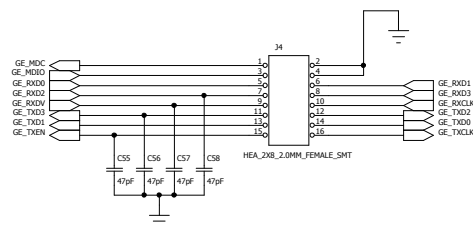
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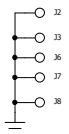
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*** CONNECTOR ***

REVISION RECORD			
LTR	ECO NO.	APPROVED:	DATE:



*** SHIELD LOCATOR PINS ***



COMPANY: SUGA ELECTRONICS LTD.

TITLE: RT3352 Wifi Module (Model SWP23MA-2)

DRAWN: QQ Pei	DATED: Jul 4, 2013
CHECKED: TONY TSANG	DATED: Jul 4, 2013
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

CODE:	SIZE: A2	DRAWING NO:	REV: V4.1.1
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