samer22 fadytvsat

LCD TV

SCHEMATICS and EXPLODED VIEW

CHASSIS : LA12E

MODEL : 42LV5500 42LV5500-UA

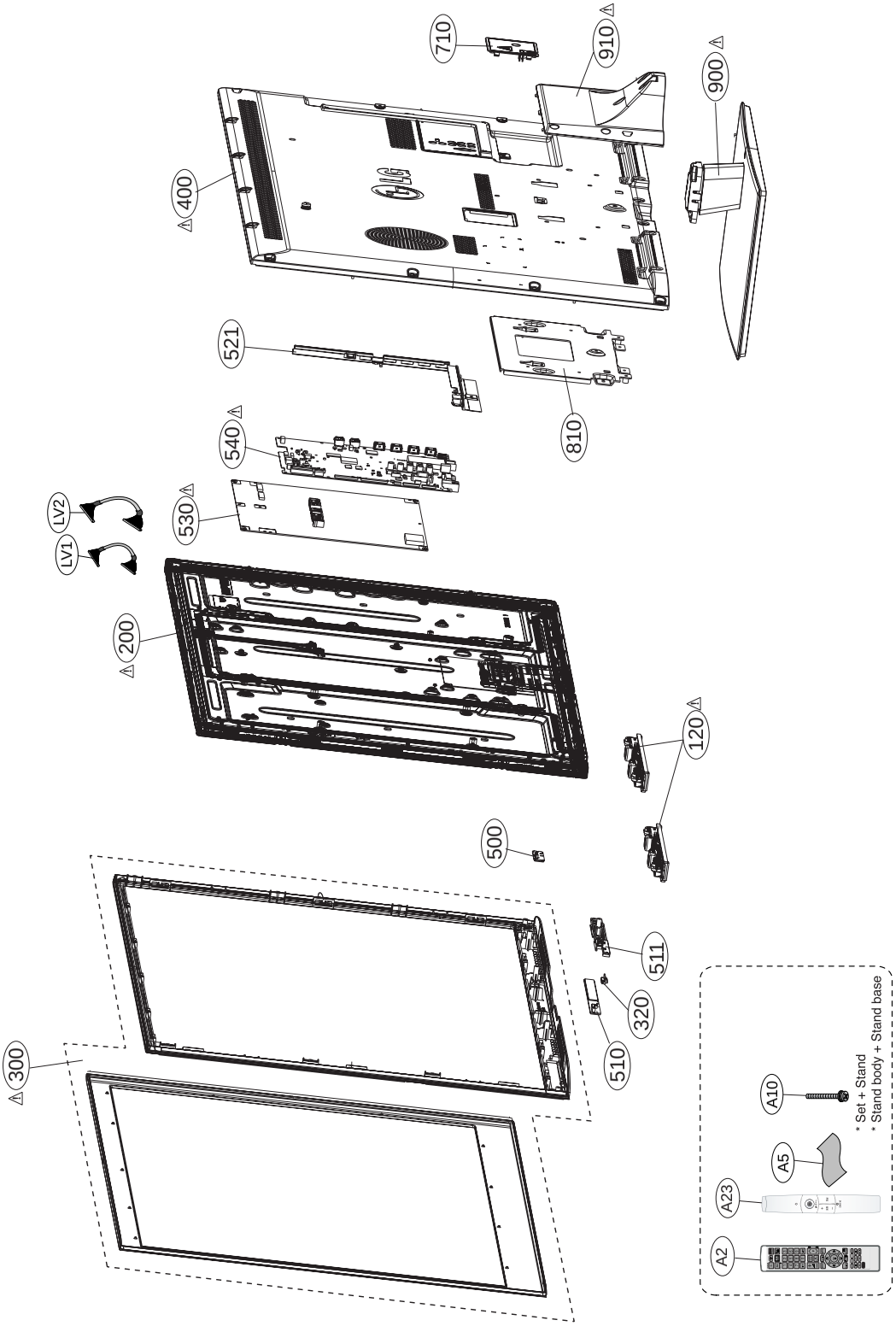
CAUTION
BEFORE SERVICING THE CHASSIS,
READ THE SAFETY PRECAUTIONS IN THIS MANUAL.

Printed in Korea

EXPLODED VIEW

IMPORTANT SAFETY NOTICE

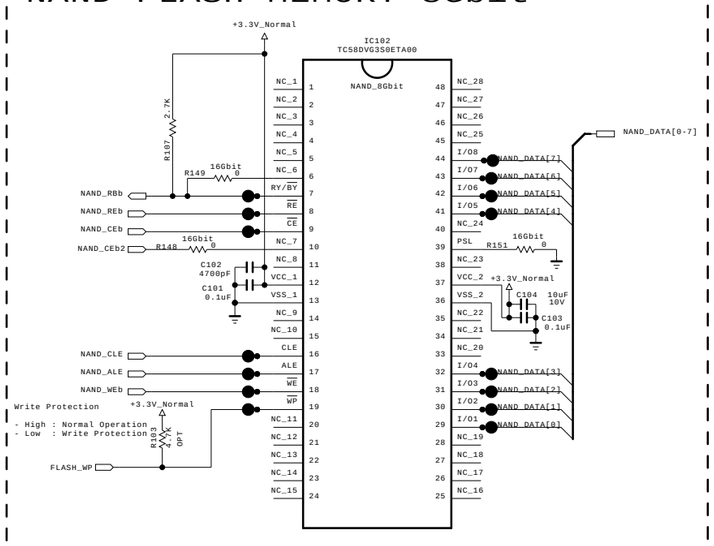
Many electrical and mechanical parts in this chassis have special safety-related characteristics. These parts are identified by ⚠ in the Schematic Diagram and EXPLODED VIEW.
It is essential that these special safety parts should be replaced with the same components as recommended in this manual to prevent X-RADIATION, Shock, Fire, or other Hazards.
Do not modify the original design without permission of manufacturer.



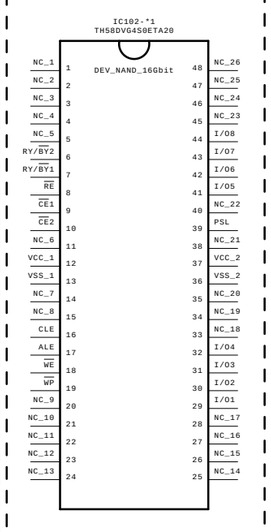
42LV5500 EXPLODED VIEW PARTS LIST

ITEM	PART No	DESCRIPTION
120	EAB62088401	Speaker EN1080C-6795 ND 10W 8OHM 79DB 150HZ 200x25x27
200	EAJ61749101	Panel LC420EUF-SDA1 FHD 42.0INCH 1920X1080 400CD Color 16/9 120Hz with T-CON 10bit(D) Edge 112PKG 10000K (80.2W) LG Display Co. Ltd.
300	ABJ73288707	Ft Frame 42LV5500- . 42" 42LV5500 RS Local BOM
320	MES62378302	MOLD PC EYE 47LW5500 PC 7 PHY 47LW IR Indicator (for C/SKD)
400	ACQ83852512	42LV5500 . 42" 42LV5500 RS Local Back Cover assy
500	EBR72499601	MOTION REMOCON RECEIVER + 3D EMMITER ASSY BARUN ELECTRONICS CO., LTD.
510	EBR72671001	IR+TOUCH ASS'Y CONTROL T.T . LV/LW5500 . LV/LW5500 IR+TOUCH ASS'Y
511	MAZ62829502	MOLD ABS HF380 BRACKET 47LW5500 - ABS, HF-380 Touch PCB Bracket (for C/SKD)
521	MGJ62689302	PRESS EGI 0.5 SHIELD EGI LV5 Side AV Metal Bracket(NTSC)_CSKD of "01"
530	EAY62169801	SMPS LGP4247-11SLPB FREE LGP4247-11SLPB LCD HNE/YUYANG/LGIT/LIENCHANG - H&E CO.,LTD
540	EBR71850702	MAIN M.I LA12E LV5500-UA CKD - (AUSYLHR)
540	EBR73146501	MAIN PAKING LA12E 42LV5500-UA ALL For SKD - (AUSYLJR)
540	EBR71850705	MAIN M.I LA12E LV5500-UA CKD - (AUSYLUR)
710	MAZ62827604	MOLD ABS AF-312 BRACKET 47LW7500 - ABS Cord BRK_Non Flame_C/SKD
800	AGU73528803	SHEET C/SKD of 01 (Insulation assy to attach on module for 42/47)
810	MJH62198002	PRESS H-GI 1.6 GUIDE METAL 47LW7700_Stand guide metal_CSKD
900	AAN73430406	STAND 42/47LV370 - HB, STAND_ASS'Y RS Phantom
910	MJH62197902	MOLD LUPOY Supporter PC 47LW7700_Stand body top_PC + GF 20% BK, CSKD
A1	MFL62882745	PRINTING USER LA01A LG GP3 EN (1) LGEUS
A2	AKB72914042	REMOTE CONTROL LCD LS-Con (LV5500) BB TV for N.AMERICA &CANADA &MEXICO
A3	EAD60817902	AC Power Cord 1.625M 75MM 125V 10A SVT 18AWG 3C BLACK. UL/CSA
A5	MAF60779001	COMPLEX ACCESORY 150*150 0.41t cloth cleaner
A7	EAT60713304	WN8522B2-LF-19 Dongle Only AN-WF100 BCM4323 802.11a/b/g/n
A10	FAB30016104	FAB30016104 MACHINE TYPE D4.0 L12.0 WASHER D8.5 t0.6 SEUNGBO MECHA TECH CO.,LTD
A21	MCK66265801	MOLD ABS XG-568 M3 Remocon ABS M3 Remocon Battery Cover
A23	AKB73295502	MOTION M3_REMOTE CONTROLLER(BAR TYPE) FOR U.S.A(LG)
LV1	EAD61652505	LVDS 455MM 0.50MM 41P WHITE UL20861 Reverse A: 95mm B: 220mm C: 160mm D: 55mm
LV2	EAD61668615	LVDS 365MM 0.50MM 51P WHITE UL20861 reverse Locking A: 95mm B: 180mm C: 125mm D: 55mm

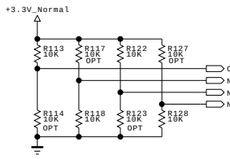
NAND FLASH MEMORY 8Gbit



16Gbit

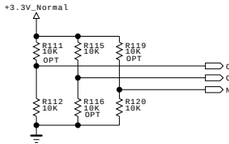


Boot ROM Device Select - (FA4,FAD7,FAD2,FAD1)



0000: ST Micro M25P or compatible Serial Flash
0010: 8-bit 512Mbit 512B page SLC NAND Flash devices
0100: 8-bit 128, 256Mbit 512B page SLC NAND Flash devices
0110: 8-bit 1Gbit 2KB page SLC NAND Flash devices
1000: 8-bit 2Gbit, 4Gbit, 8Gbit 2KB page SLC NAND Flash devices
1010: 8-bit 16Gbit, 32Gbit 4KB page SLC NAND Flash devices (O)
0001: 8-bit 8/16/32Gbit 2KB page MLC NAND Flash devices
0011: 8-bit 16/32Gbit 4KB page MLC NAND Flash devices
0101: 8-bit 32Gbit 8KB page MLC NAND Flash devices
0111: 3B dual IO Serial Flash
1001: BB dual IO Serial Flash
1011: fast Serial Flash > 50Mhz
1100: OneNAND Flash (always 16-bit)
1110: Reserved
1101, 1111: Reserved

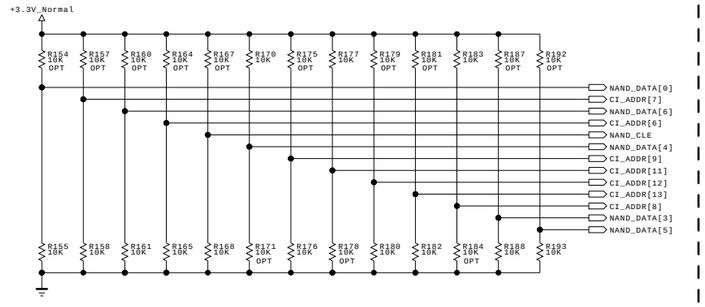
NAND ECC (FA3, FA2, FALE)



000 = ECC disabled
001 = ECC 1-bit repair
010 = ECC 4-bit BCH (O)
011 = ECC 8-bit BCH, 27 byte spare
100 = ECC 12-bit BCH, 27 byte spare
101 = ECC 8-bit BCH, 16 byte spare
110, 111 = Reserved

DUAL COMPONENT	
IC102	1ST : EAN60999801 2ND : T-TC58DVG3S0ETA00
IC102-*1	

Strap Setting



NAND_DATA[0]:
0: System is LITTLE endian (O)
1: System is BIG endian

CI_ADDR[7]:
0: Disable EDID automatic Downloading from Flash (O)
1: Enable EDID automatic Downloading from Flash

NAND_DATA[6] :
0: Disable OSC clock output on chip Pin (O)
1: Enable OSC clock output on chip pin.

CI_ADDR[6]:
0: Host MIPS run at 500 MHz (O)
1: Host MIPS run at 250 MHz

NAND_CLE:
0: Differential Oscillators TVM not bypassed (O)
1: Differential Oscillators TVM bypassed

NAND_DATA[4]:
0: 27MHz TVM Crystal Frequency
1: 54MHz TVM Crystal Frequency (O)

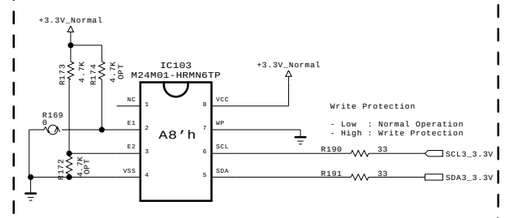
CI_ADDR[9],CI_ADDR[11],CI_ADDR[12],CI_ADDR[13]
TVM Crystal oscillator bias/gain control
0000: 210uA
0001: 390uA
0010: 570uA
0011: 730uA
0100: 890uA (O)
0111: 1290uA
1000: 1416uA
1111: 2196uA
0101, 0110, 1001, 1010, 1011, 1100, 1101, 1110: Reserved

CI_ADDR[8]:
0: RESETOUTb (in On/Off only) stay asserted until software releases them.
1: Fix amount of delay for de-assertion on RESETOUTb (in On/IOff only) at end of RESETb pulse (O)

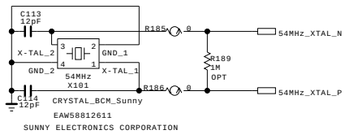
NAND_DATA[3]:
0: MIPS will boot from external flash (O)
1: MIPS will boot from ROM

NAND_DATA[5]:
0: FLASH MODE (O)
1: BSC_SLAVE(BBS) MODE

NVRAM



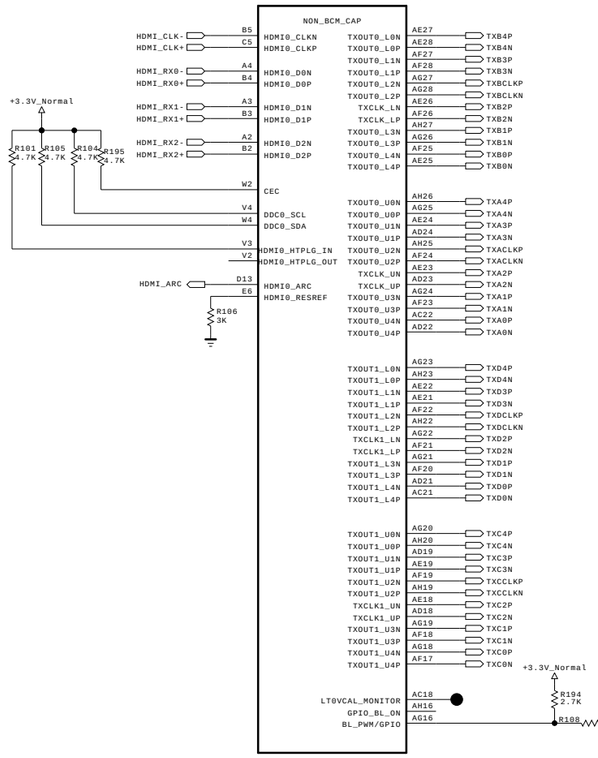
54MHz X-TAL

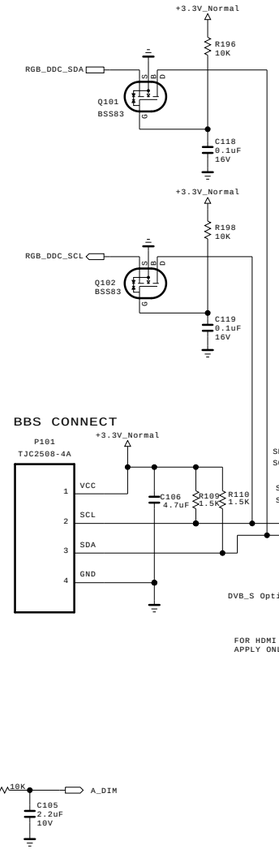


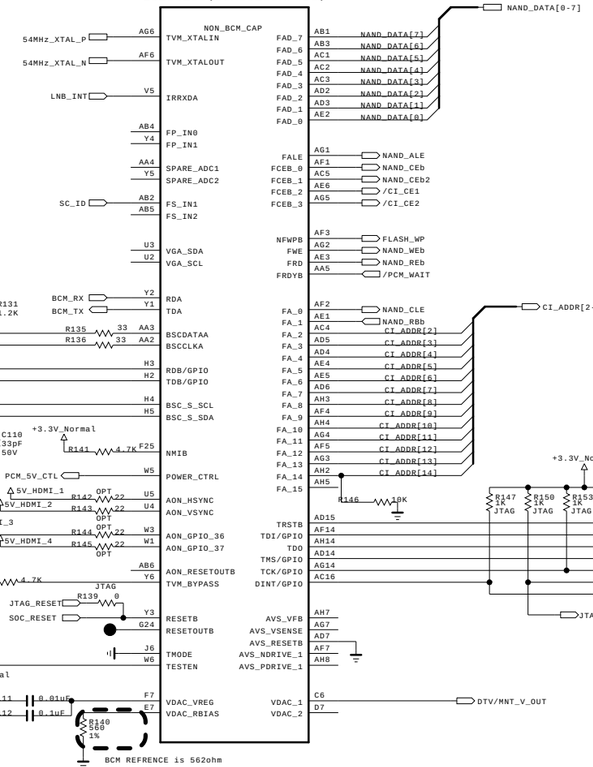
X101-*2 54MHz
CRYSTAL_BCM_Lihom
EAW60763703
LIHOM CO., LTD.

X101-*3 54MHz
CRYSTAL_BCM_KDS
EAW58239604
DAISHINKU CORPORATION.

IC101 LGE35230(BCM35230KFSBG)







BBS CONNECT

THE ⚠ SYMBOL MARK OF THIS SCHEMETIC DIAGRAM INCORPORATES SPECIAL FEATURES IMPORTANT FOR PROTECTION FROM X-RADIATION. FILRE AND ELECTRICAL SHOCK HAZARDS, WHEN SERVICING IF IS ESSENTIAL THAT ONLY MANUFATURES SPECFIED PARTS BE USED FOR THE CRITICAL COMPONENTS IN THE ⚠ SYMBOL MARK OF THE SCHEMETIC.

SECRET
LGElectronics

LG ELECTRONICS

MODEL	BCM35230	DATE	2010.09.18
BLOCK	MAIN & NAND FLASH	SHEET	1 / 57

MODEL OPTION

	NO_FRC	BCM internal FRC	LG FRC2	external URSA5
MODEL_OPT_0	0	0	1	1
MODEL_OPT_1	0	1	0	1

		HIGH	LOW
MODEL_OPT_2		FHD	HD
MODEL_OPT_3		OLED	LCD
MODEL_OPT_4	DDR speed	1333	1600
MODEL_OPT_5	T2 Tuner	Support	Not Support
MODEL_OPT_6	S Tuner	Support	Not Support
MODEL_OPT_7	PHM	Enable	Disable

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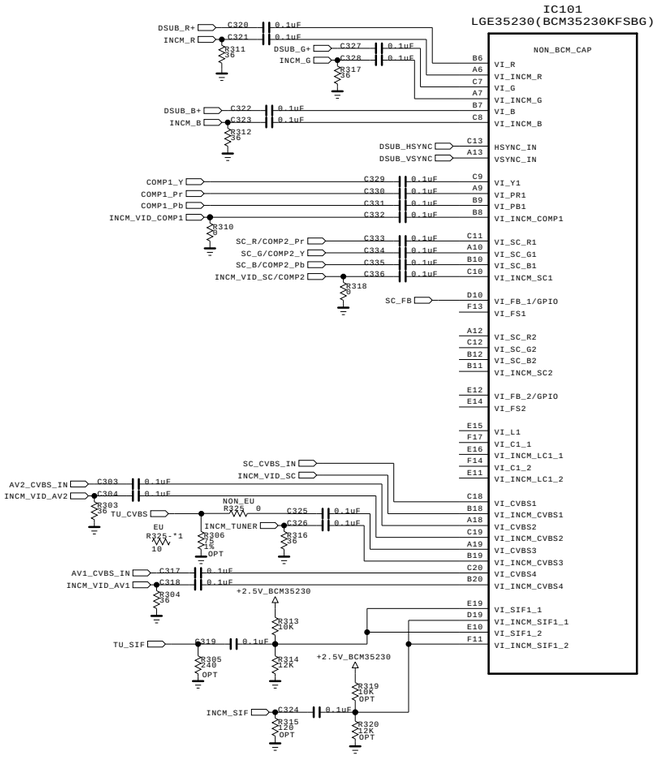
SECRET

LGElectronics

LG ELECTRONICS

MODEL	BCM35230	DATE	
BLOCK	MAIN POWER	SHEET	2 / 50



VIDEO INCM

Near P801	Run Along DSUB_R Trace	INCM_R
Near P801	Run Along DSUB_G Trace	INCM_G
Near P801	Run Along DSUB_B Trace	INCM_B
Near JK1101	Run Along COMP_Y_IN,COMP_Pr_IN,COMP_Pb_IN Trace	INCM_VID_COMP1
Near JK1104	Run Along AV2_CVBS Trace	INCM_VID_AV2
Near TU2101/2 TU2201/2/3	Run Along TUNER_CVBS_IF_P Trace	INCM_TUNER
Near JK1102	Run Along AV1_CVBS Trace	INCM_VID_AV1
Near JK1103 JK2501	Run Along COMP_Y_IN,COMP_Pr_IN,COMP_Pb_IN/SC_R,G,B Trace	INCM_VID_SC/COMP2

BCM35230_with_RGBCAP

IC101-*1
LGE35230

BCM_CAP

B6 VI_R
A6 VI_INCM_R
C7 VI_G
A7 VI_INCM_G
B7 VI_B
C8 VI_INCM_B

C13 HSYNC_IN
A13 VSYNC_IN

C9 VI_Y1
A9 VI_PR1
B9 VI_PB1
B8 VI_INCM_COMP1

C11 VI_SC_R1
A10 VI_SC_G1
B10 VI_SC_B1
C10 VI_INCM_SC1

D10 VI_FB_1/GPIO
F13 VI_FS1

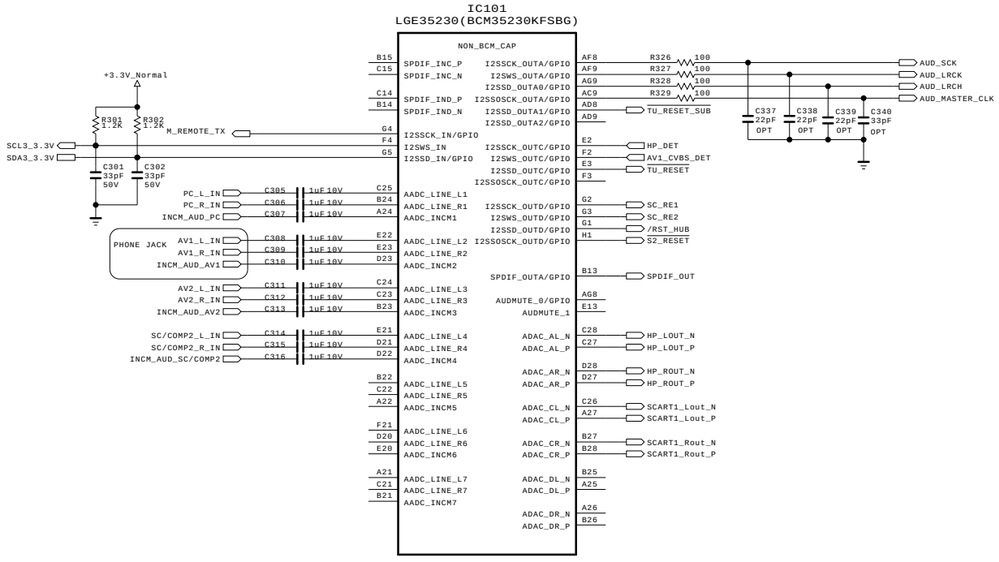
A12 VI_SC_R2
C12 VI_SC_G2
B12 VI_SC_B2
B11 VI_INCM_SC2

E12 VI_FB_2/GPIO
E14 VI_FS2

E15 VI_L1
F17 VI_C1_1
E16 VI_INCM_LC1_1
F14 VI_C1_2
E11 VI_INCM_LC1_2

C18 VI_CVBS1
B18 VI_INCM_CVBS1
A18 VI_CVBS2
C19 VI_INCM_CVBS2
A19 VI_CVBS3
B19 VI_INCM_CVBS3
C20 VI_CVBS4
B20 VI_INCM_CVBS4

E19 VI_SIF1_1
D19 VI_INCM_SIF1_1
E10 VI_SIF1_2
F11 VI_INCM_SIF1_2



AUDIO INCM

Near JK1102	R321 0	Route Between AV1_L_IN & AV1_R_IN Trace	INCM_AUD_AV1
Near JK1103 JK2501	R322 0	Route Between SC/COMP2_L_IN & SC/COMP2_R_IN Trace	INCM_AUD_SC/COMP2
Near JK1104	R323 0	Route Between AV2_L_IN & AV2_R_IN Trace	INCM_AUD_AV2
Near JK801	R324 0	Route Between PC_L_IN & PC_R_IN Trace	INCM_AUD_PC
Near TU2101/2 TU2201/2/3		Route Along With TUNER_SIF_IF_N	INCM_SIF

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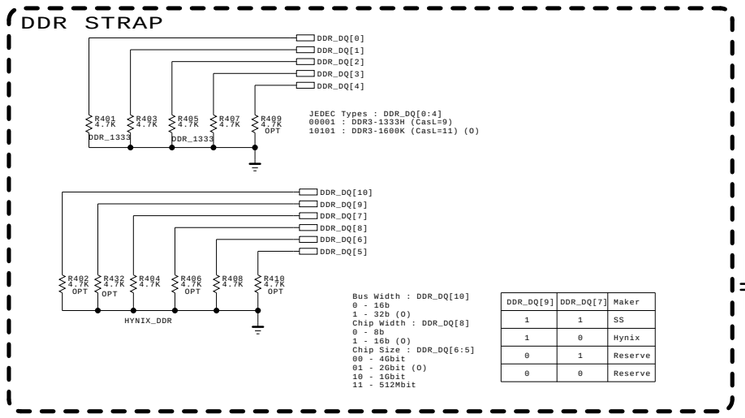
LG ELECTRONICS

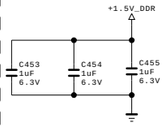
MODEL	BCM35230	DATE	
BLOCK	MAIN AUDIO/VIDEO	SHEET	3 / 50

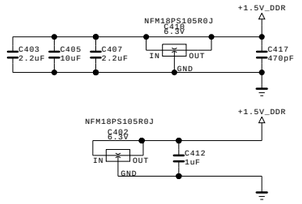
DUAL COMPONENT	
IC401,IC402	1ST : EAN61667501, 2ND : EAN61570701
IC401-*1 IC402-*1	1ST : T-K4B2G1646B_HCK0, 2ND : T-H5TQ2G63BFR-PBC

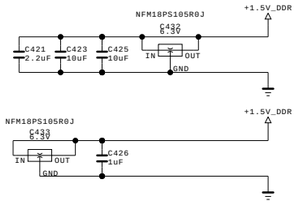
DDR STRAP



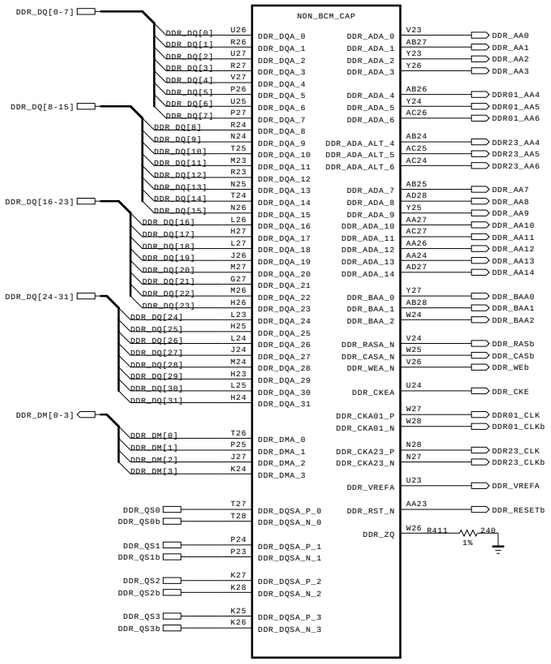
DDR_DQ[9]	DDR_DQ[7]	Maker
1	1	SS
1	0	Hynix
0	1	Reserve
0	0	Reserve



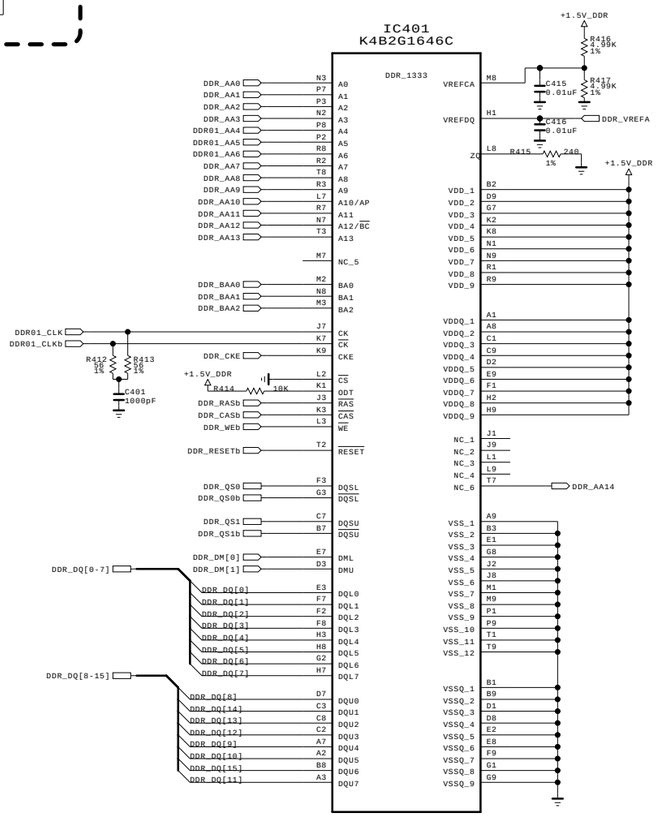




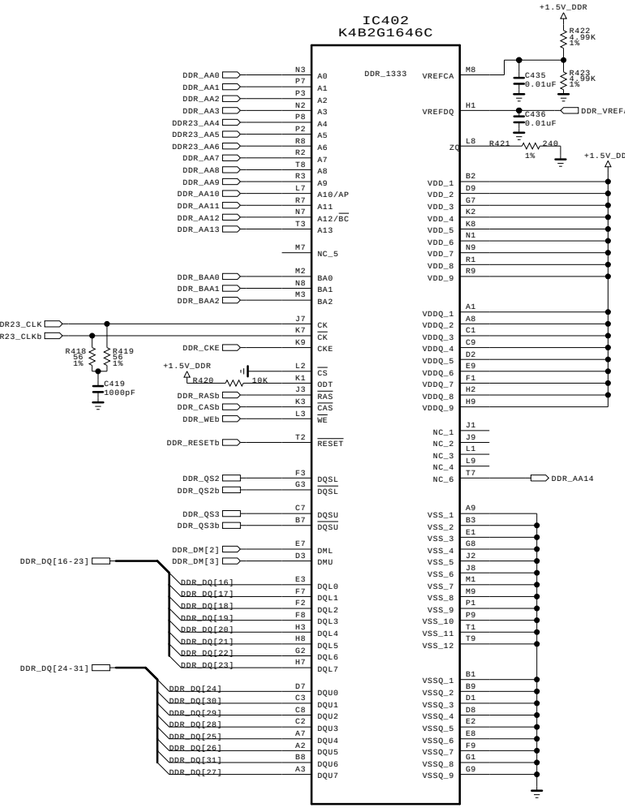
IC101
LGE35230(BCM35230KFSBG)

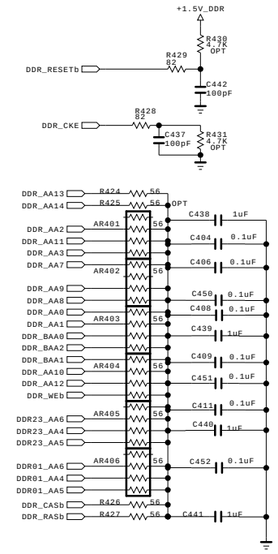


IC401
K4B2G1646C



IC402
K4B2G1646C





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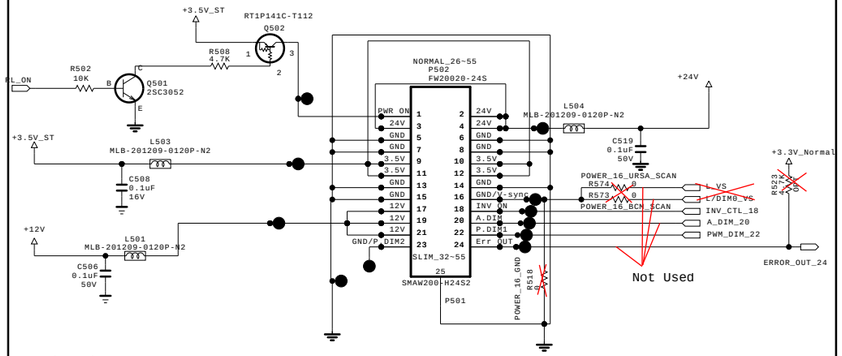
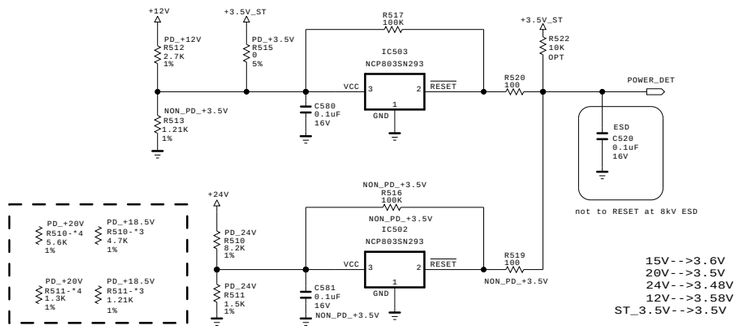
MODEL	BCM35230	DATE	
BLOCK	MAIN DDR	SHEET	4 / 50

FROM LIPS & POWER B/D

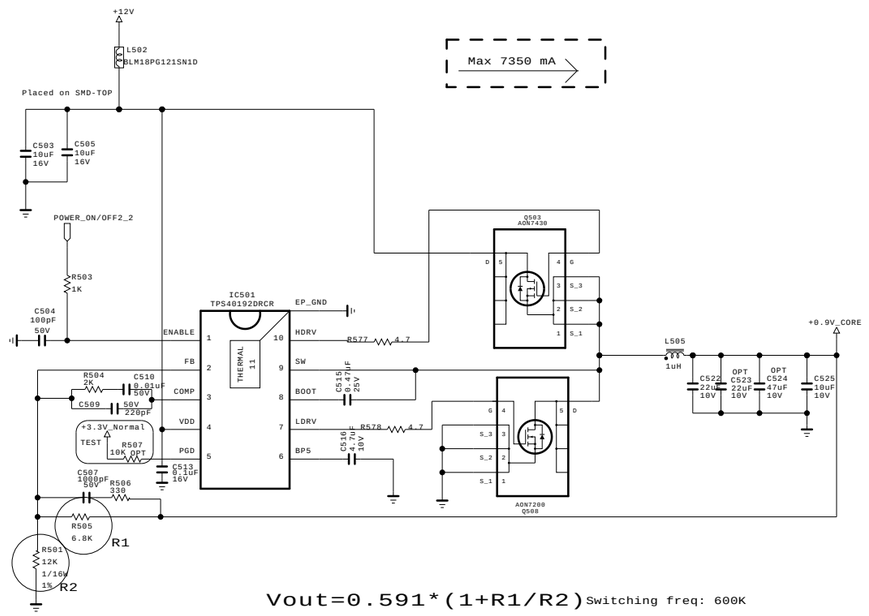


#16/#20/#23
LD - GND OR USE
LE(N.L.D.) - OPEN
LE(L.D.) - USE

Power_DET

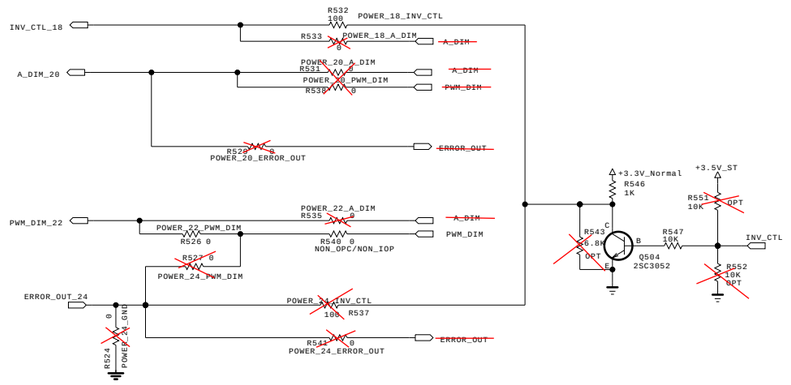


+0.9V_CORE_BCM35230



DUAL COMPONENT	
Q501,Q504, Q505,Q506	1ST : 0TRIY80001A 2ND : 0TR387500AA
Q502	1ST : 0TRIH80004A, 2ND : EBK61012501, 3RD : 0TR102009AM
Q507	1ST : EBK60752501, 2ND : EBK61011501
IC502,IC503	1ST : EAN61151001, 2ND : EAN60670101

OS Module OPT

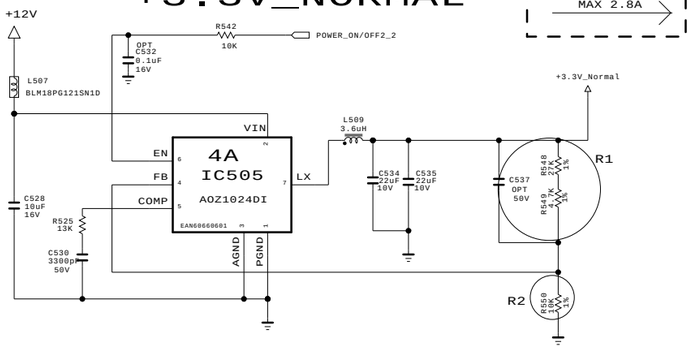


<OS MODULE PIN MAP>

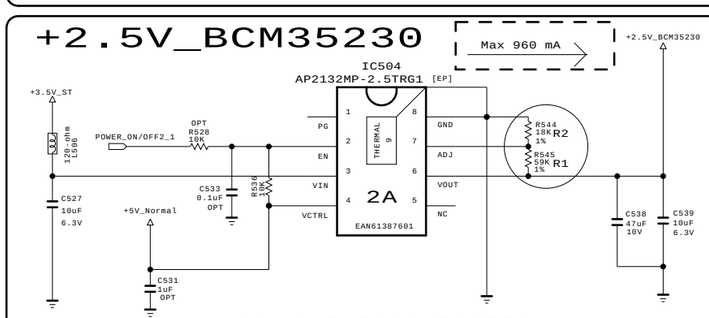
PIN No	LGD	CMO(09)	AUO	SHARP
18	INV_ON	A-DIM	INV_ON	INV_ON
20	V4:VBR-A V5:NC	NC	Err_out	Err_out
22	PWM_DIM	PWM_DIM	A-DIM	PWM_DIM
24	Err_out LED:GND	INV_ON	PWM_DIM	GND

CHECK PWR/MODULE PIN MAP

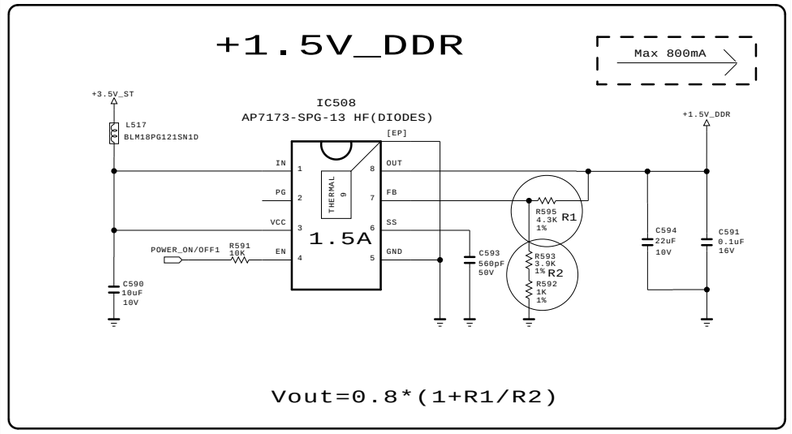
+3.3V_NORMAL



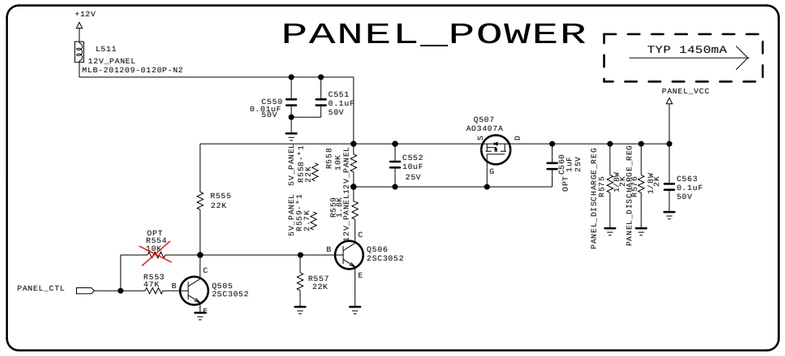
+2.5V_BCM35230



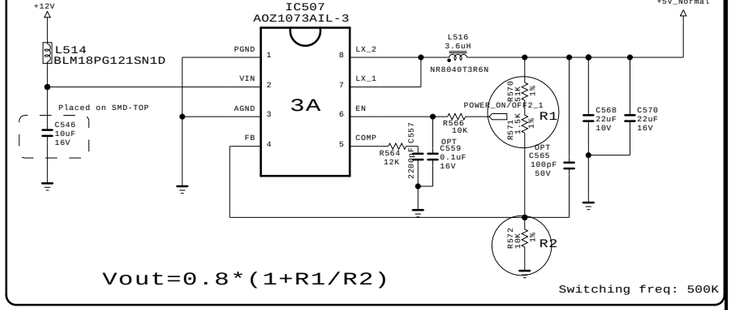
+1.5V_DDR



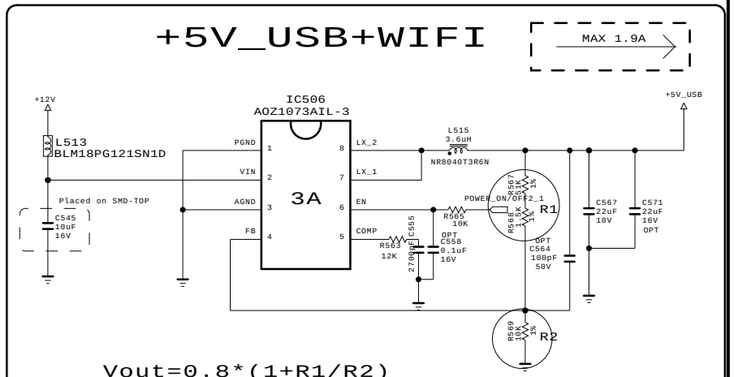
PANEL_POWER



+5V_Normal



+5V_USB+WIFI



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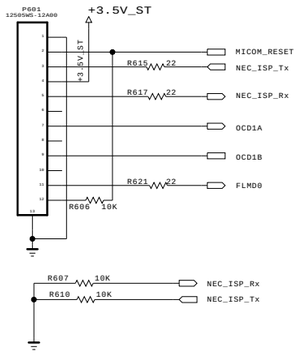
SECRET
LGElectronics

LG ELECTRONICS

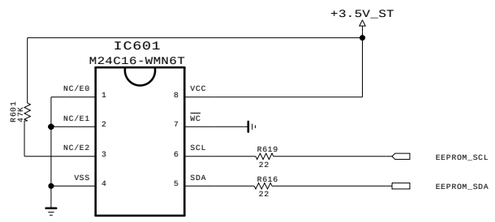
MODEL	BCM35230	DATE	
BLOCK	POWER	SHEET	5 / 58

NEC MICOM

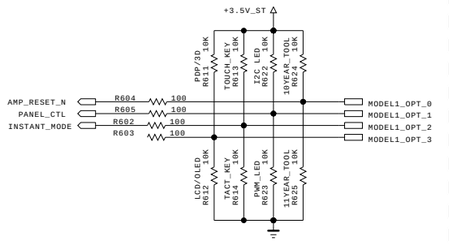
For Debug



EEPROM for Micom



MICOM MODEL OPTION

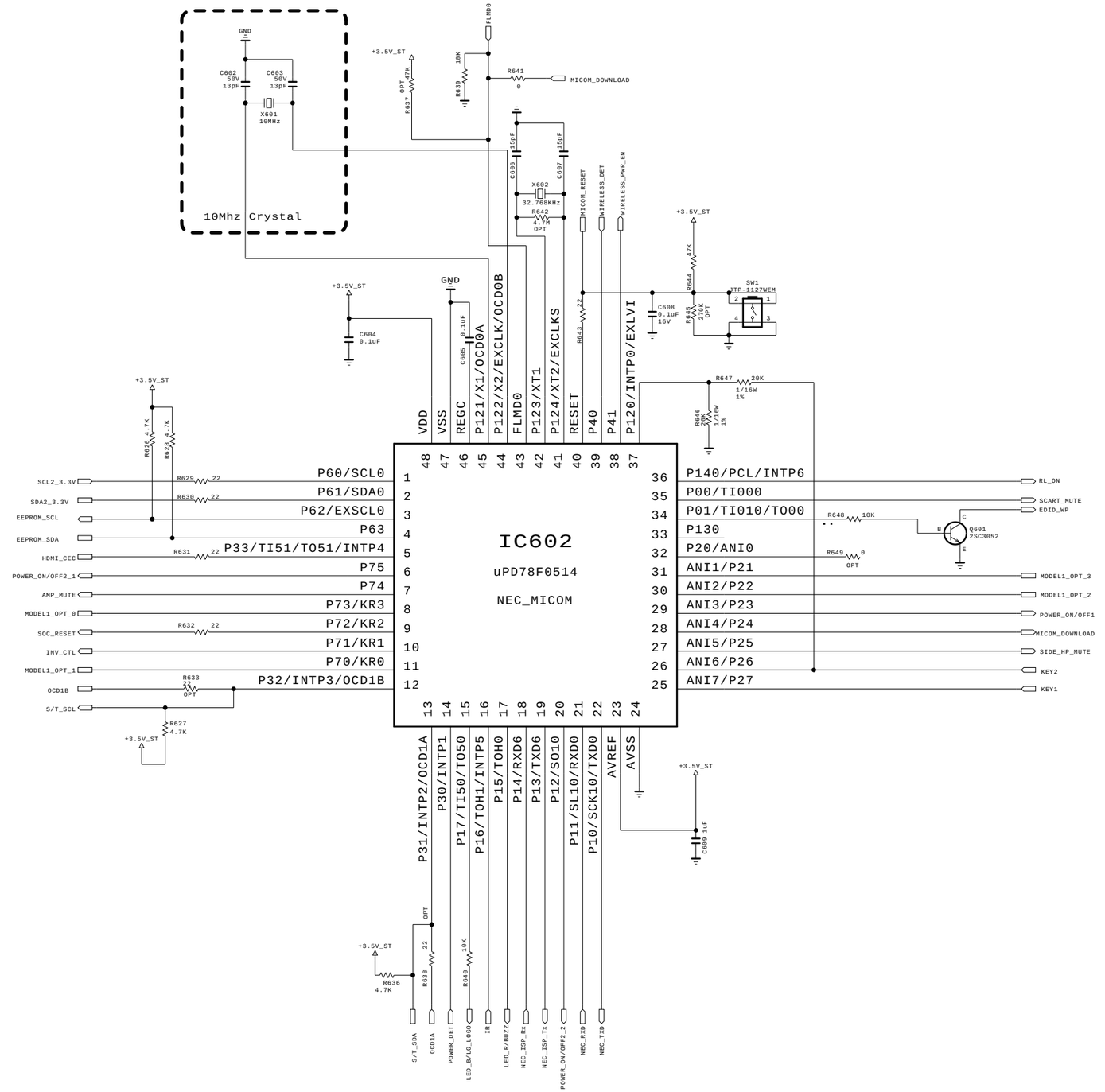


MODEL OPTION

PIN NAME	PIN NO.	HIGH	LOW
MODEL_OPT_0	8	10YEAR_TOOL (10 SENSOR)	11YEAR_TOOL (11 SENSOR)
MODEL_OPT_1	11	I2C_LED	PWM_LED
MODEL_OPT_2	30	TOUCH_KEY	TACT_KEY
MODEL_OPT_3	31	PDP/3D	LCD/OLED

	LCD	PDP	OLED	3D
MODEL_OPT_3	0	1	0	1

	LOW	LOW_SMALL	TBD	HIGH
MODEL_OPT_1	0	0	1	1
MODEL_OPT_2	0	1	0	1



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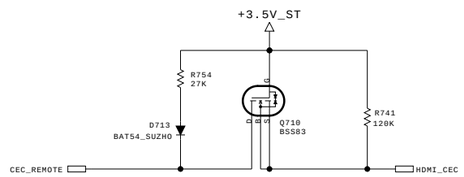
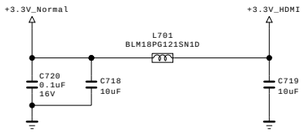
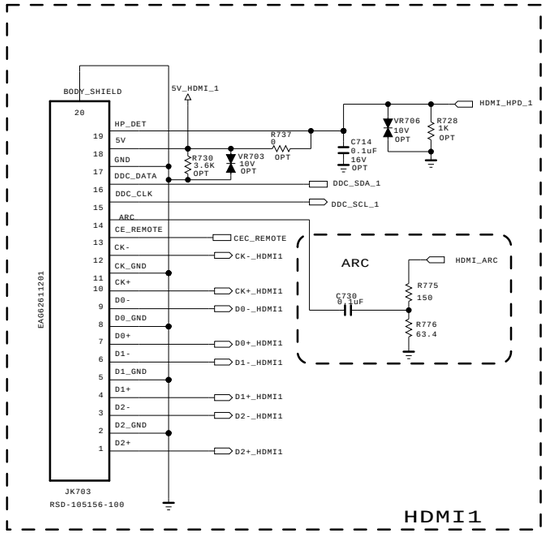
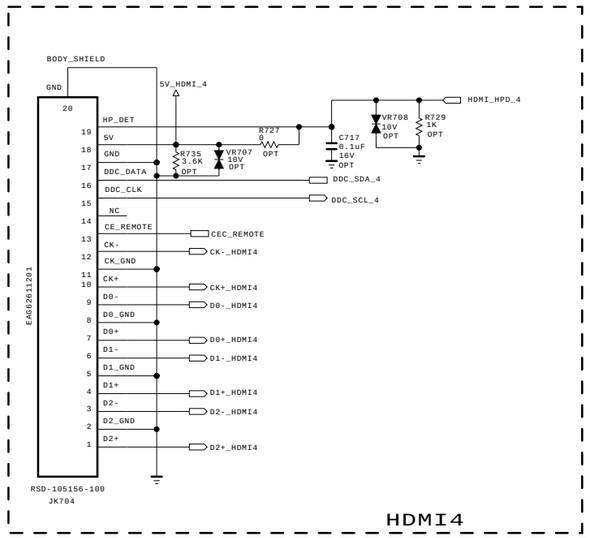
DUAL COMPONENT	
D707,D708 D710,D711	1ST : 0DD184009AA 2ND : 0DSIH00028A
D713	1ST : T-BAT54_SUZHO, 2ND : 0DSON00138A

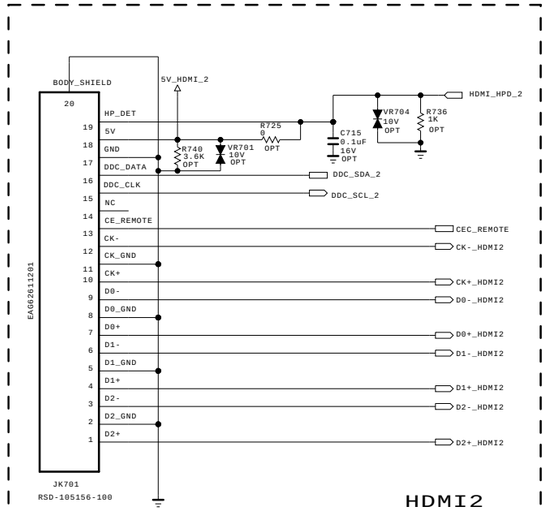
* HDMI CEC

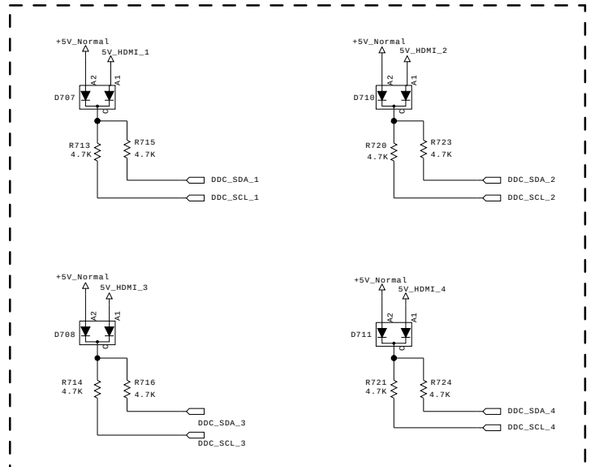


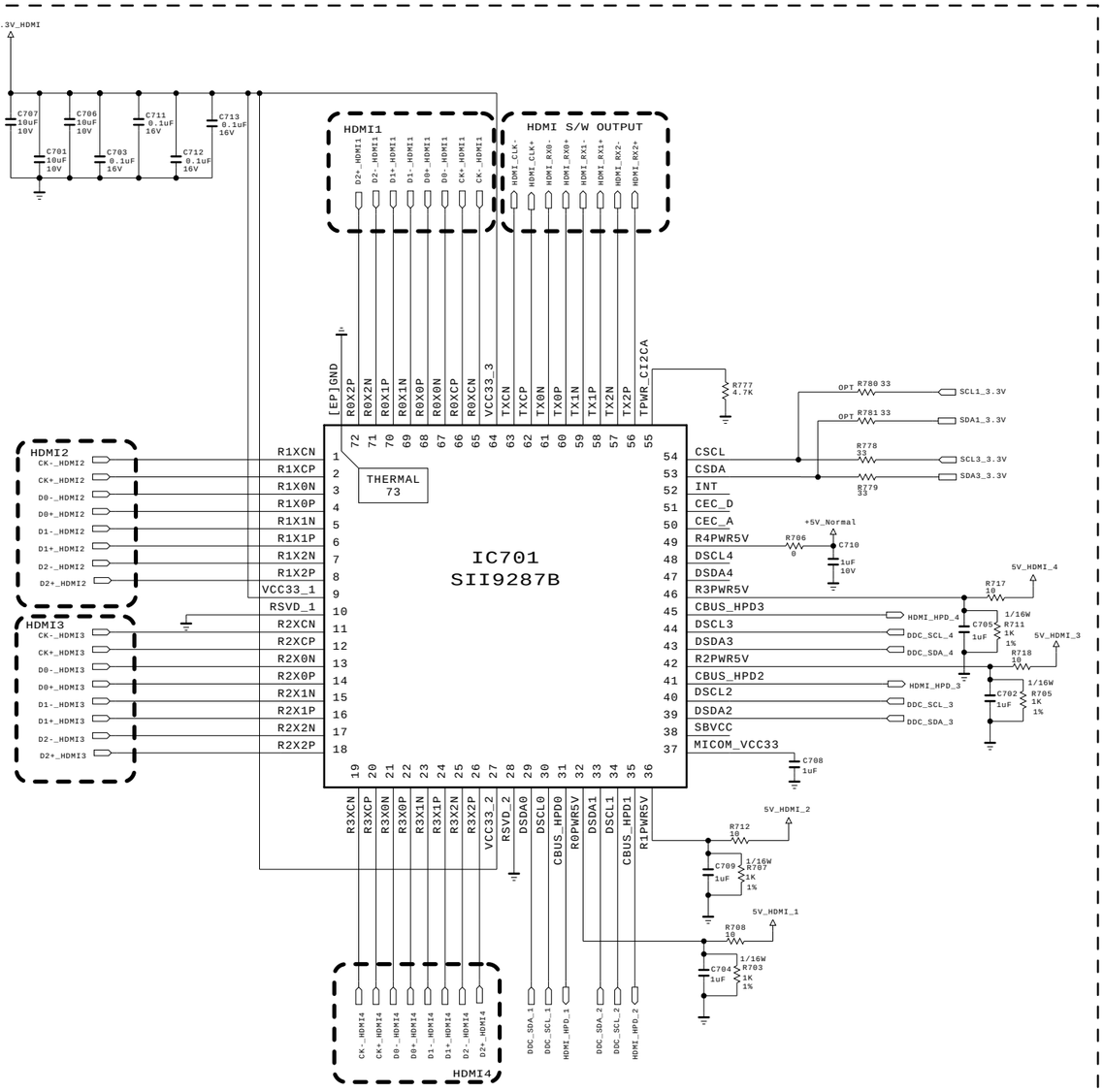












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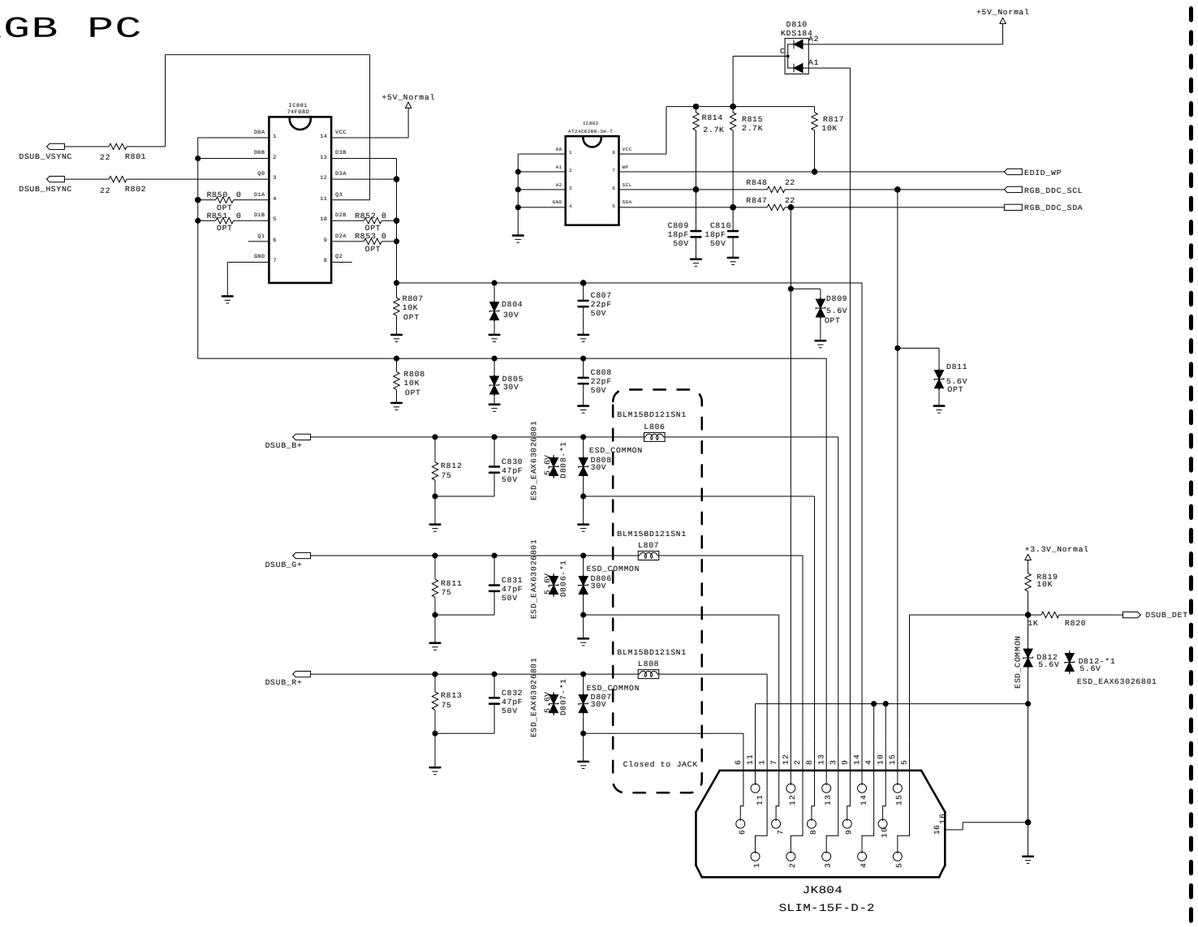
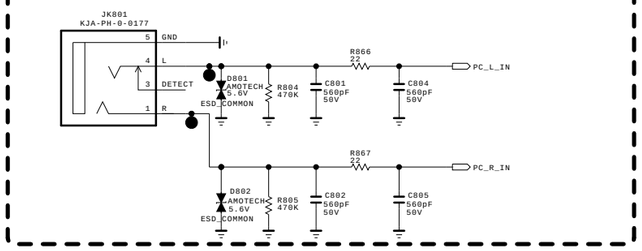
RGB/ PC AUDIO/ SPDIF/ EARPHONE/ RS232C

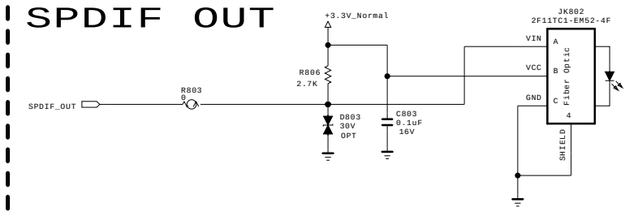
RGB PC



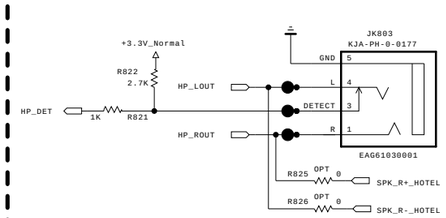
PC AUDIO



SPDIF OUT

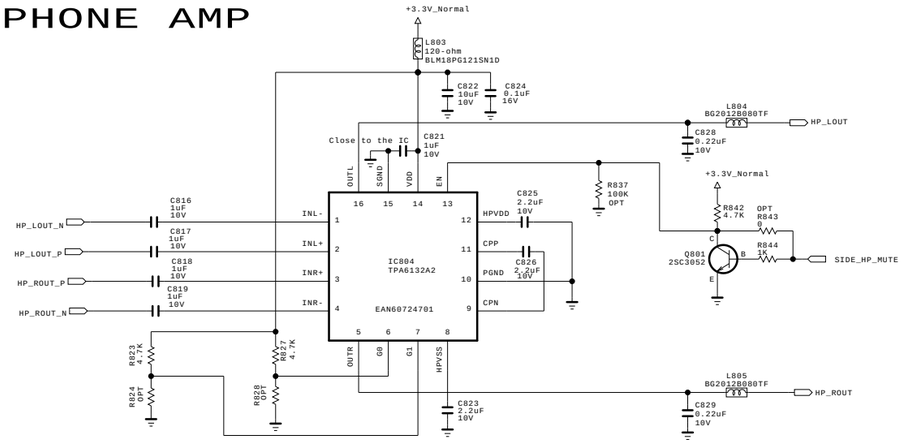


EARPHON JACK

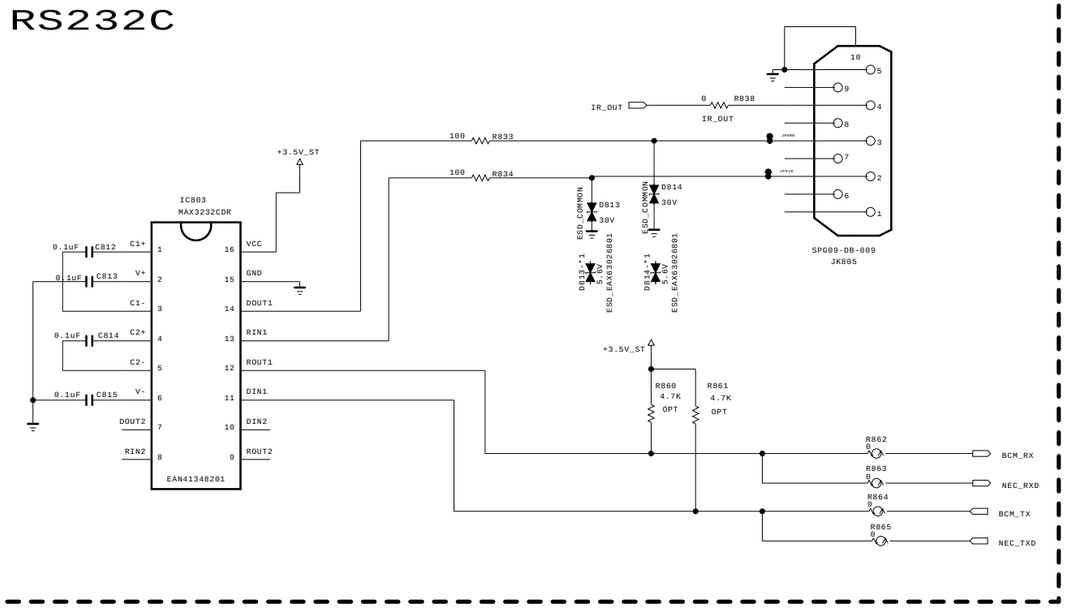


DUAL COMPONENT	
D804,D805,D806 D807,D808,D813 D814	1ST : EAH39491601, 2ND : EAH33945901
D810	1ST : 0DD184009AA, 2ND : 0DSIH00028A
Q801	1ST : 0TRIY80001A, 2ND : 0TR387500AA
IC805	1ST : EAN61151201, 2ND : EAN61130001

EARPHONE AMP



RS232C



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SECRET

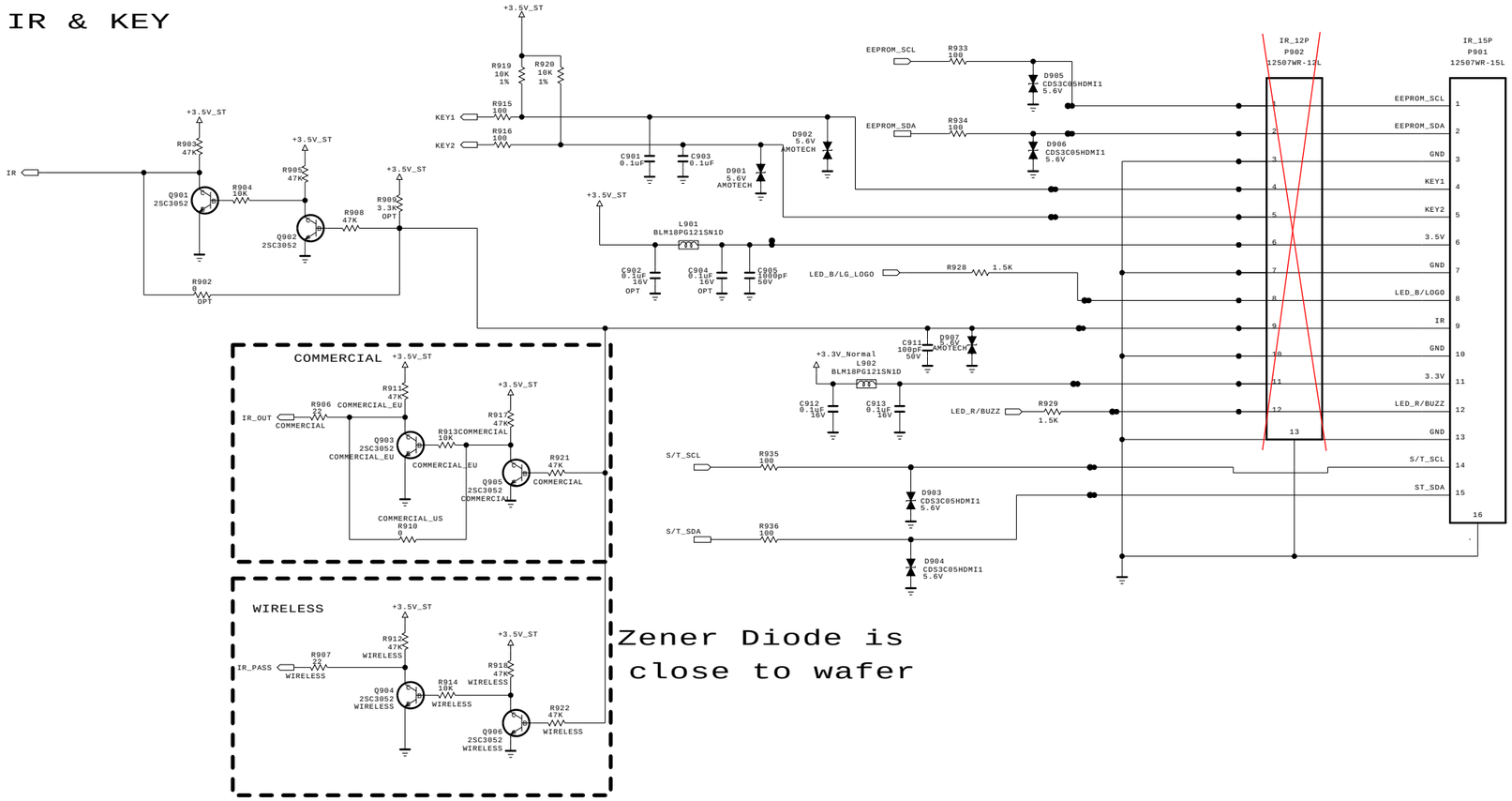
LGElectronics

LG ELECTRONICS

MODEL	BCM35230	DATE	2010.10.21
BLOCK	COMMON JACK	SHEET	8 / 58

DUAL COMPONENT	
Q901,Q902,Q903 Q904,Q905,Q906	1ST : 0TRIY80001A 2ND : 0TR387500AA
D903,D904 D905,D906	1ST : EAH42720601, 2ND : EAH60994401

IR & KEY



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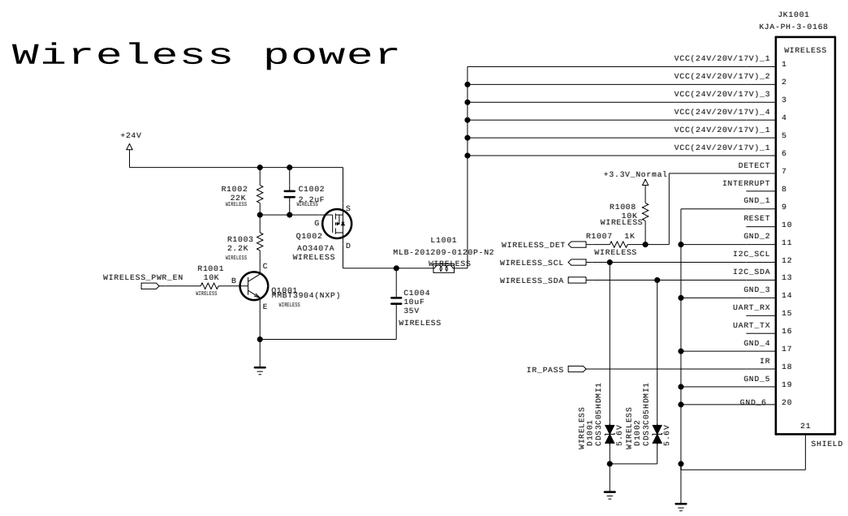
SECRET
LGElectronics

LG ELECTRONICS

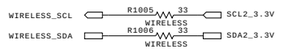
MODEL	BCM35230	DATE	
BLOCK	IR/KEY	SHEET	9 / 50

WIRELESS READY MODEL

DUAL COMPONENT	
D1001,D1002	1ST : EAH42720601 2ND : EAH60994401
Q1001	1ST : EBK61012601, 2ND : 0TRDI80002A
Q1002	1ST : EBK60752501, 2ND : EBK61011501



Wireless I2C connection with I2C_1
Address : 0X20



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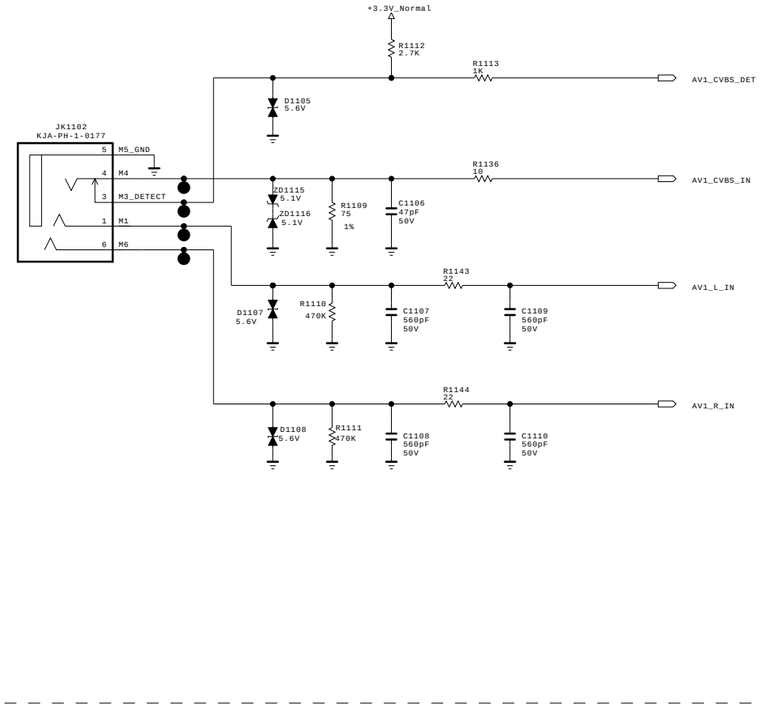
SECRET
LGElectronics

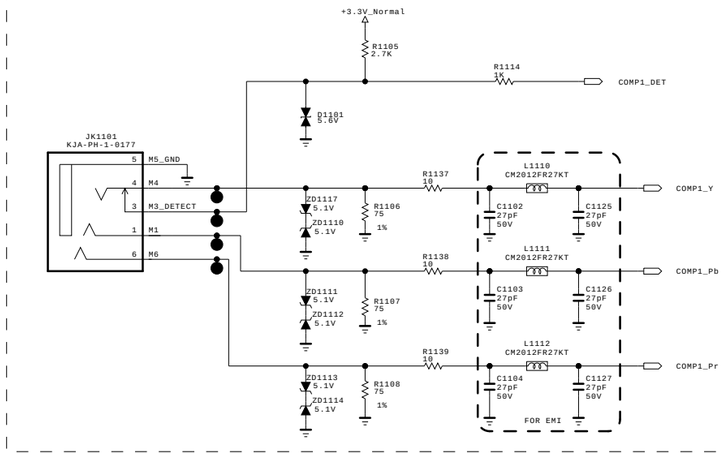
LG ELECTRONICS

MODEL	BCM35230	DATE	
BLOCK	WIRELESS	SHEET	10 / 50

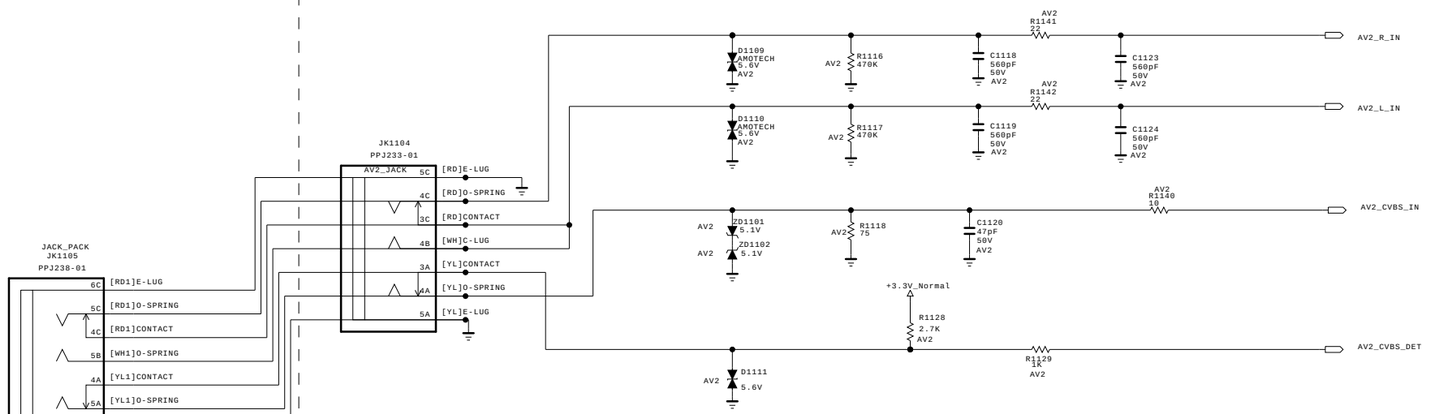
CVBS 1 PHONE JACK



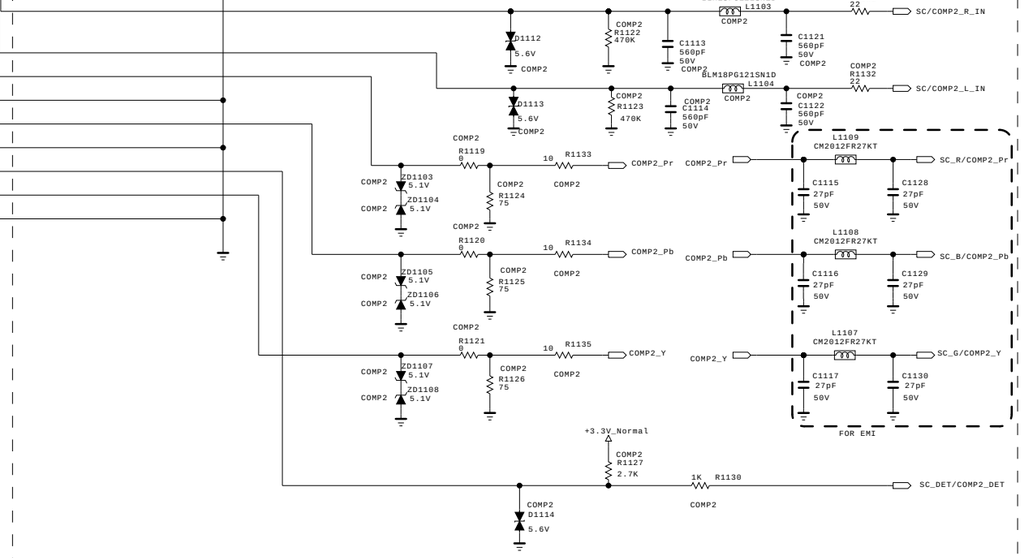
COMPONENT 1 PHONE JACK



CVBS2 REAR JACK



COMP2 REAR JACK



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SECRET

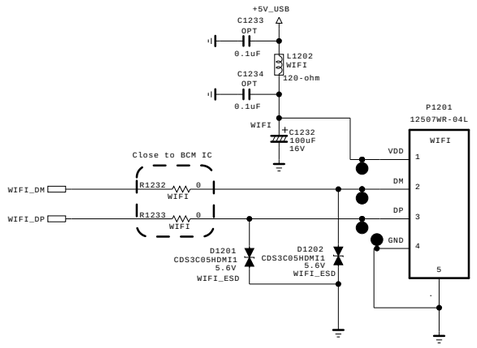
LGElectronics

LG ELECTRONICS

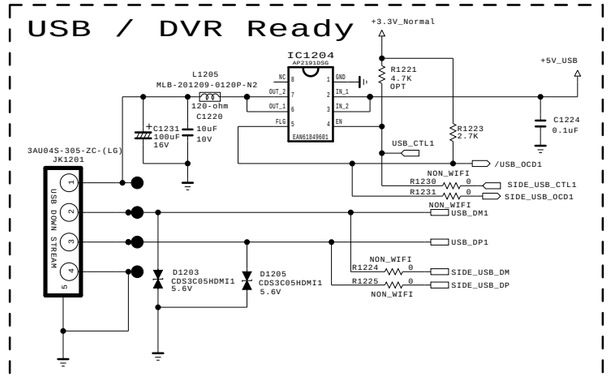
MODEL	BCM35230	DATE	
BLOCK	COMP/AV	SHEET	11 / 50

DUAL COMPONENT	
D1201,D1202 D1203,D1204 D1205,D1206	1ST : EAH42720601 2ND : EAH60994401

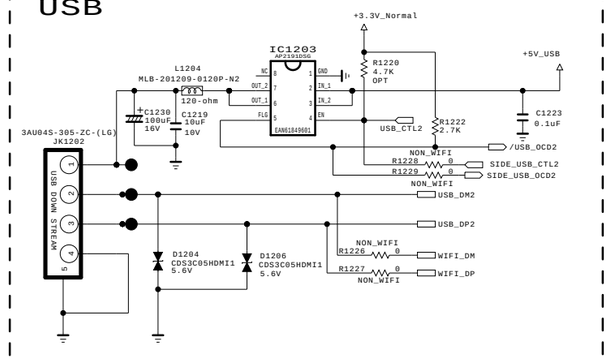
USB_WIFI

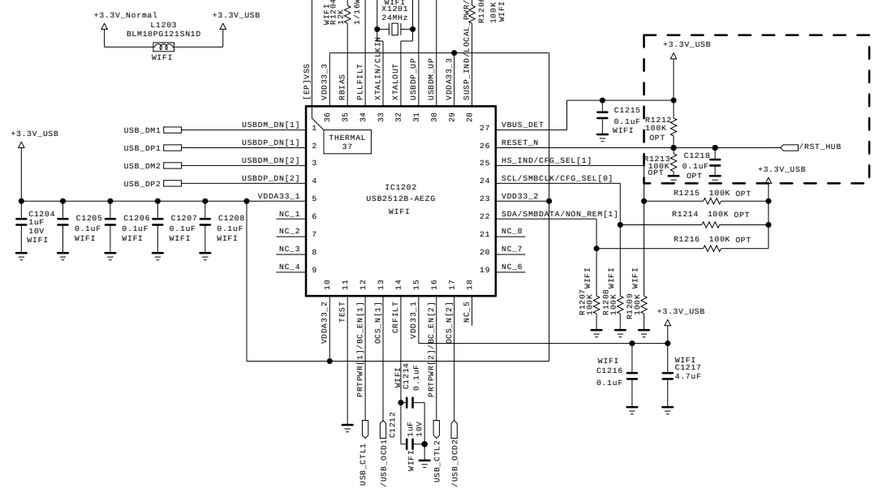


USB / DVR Ready



USB





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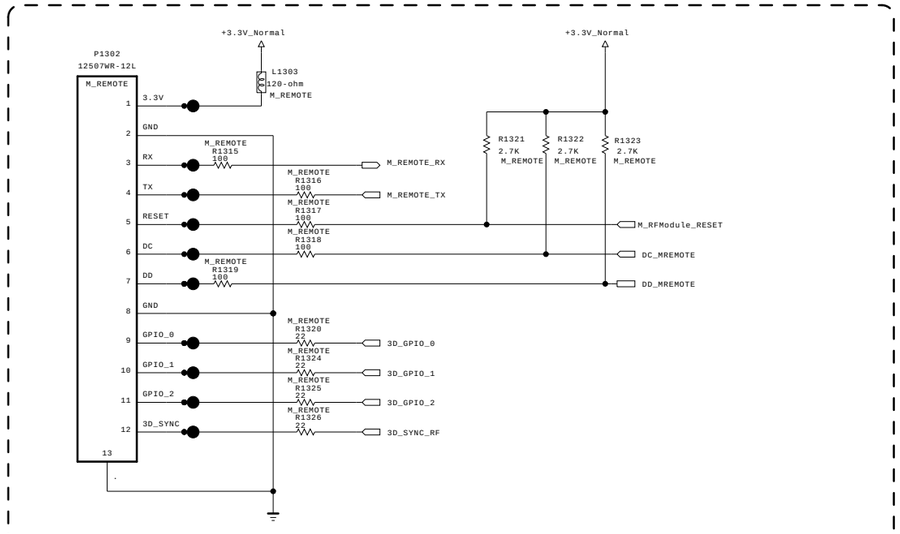
SECRET

LGElectronics

LG ELECTRONICS

MODEL	BCM35230	DATE	
BLOCK	USB + WIFI	SHEET	12 / 50

TI solution M_REMOTE OPTION

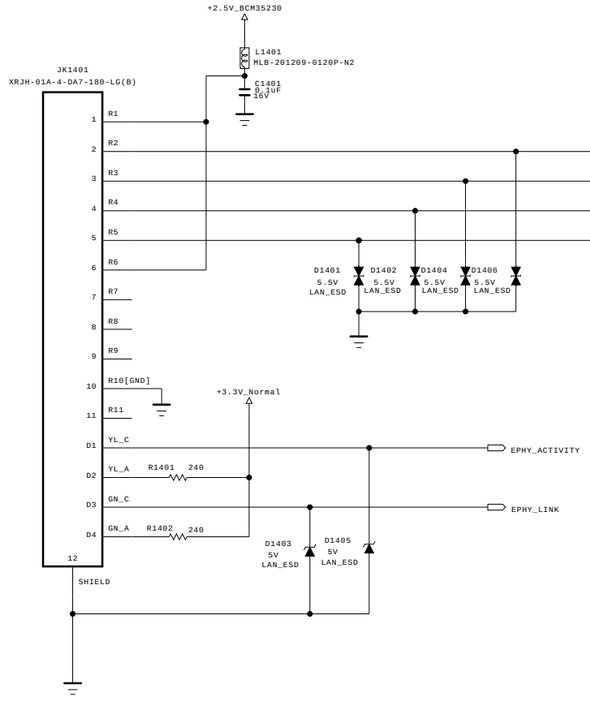


ALL M_REMOTE OPTION

MODEL	BCM35230	DATE	
BLOCK	M_REMOCON	SHEET	13 / 50

Ethernet Block

DUAL COMPONENT	
D1401,D1402 D1403,D1404 D1405,D1406	1ST : EAH42720601 2ND : EAH60994401



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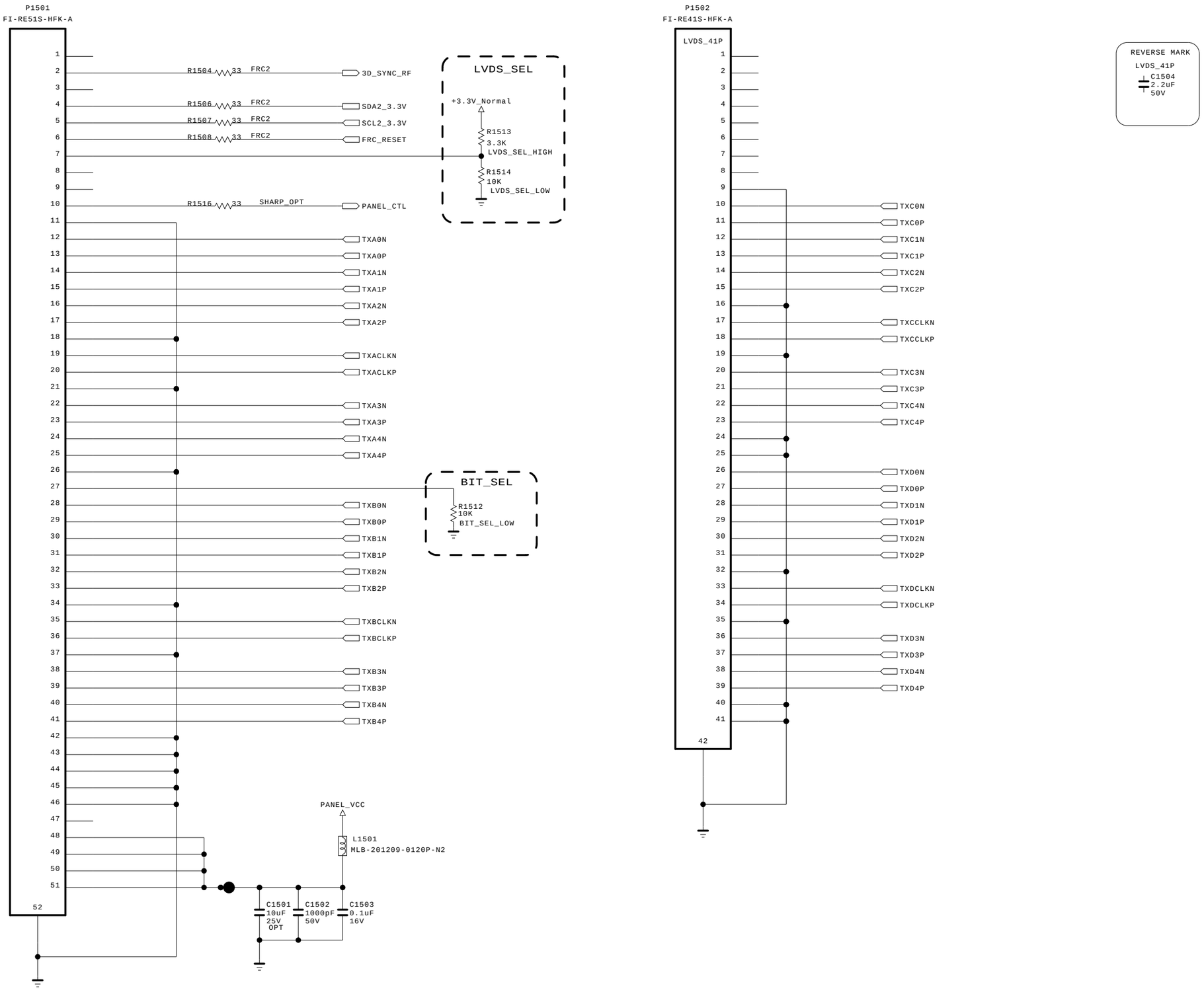
SECRET

LGElectronics

LG ELECTRONICS

MODEL	BCM35230	DATE	
BLOCK	ETHERNET	SHEET	14 / 50

FHD120Hz LVDS output(51pin+41Pin)



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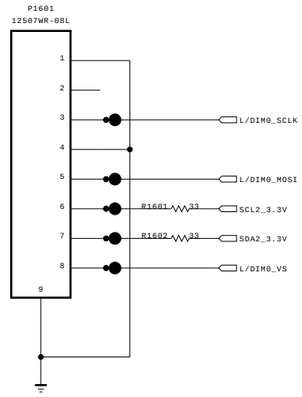
SECRET

LGElectronics

LG ELECTRONICS

MODEL	BCM35230	DATE	2010.11.03
BLOCK	LVDS	SHEET	15 / 50

[Local Dimming Block]

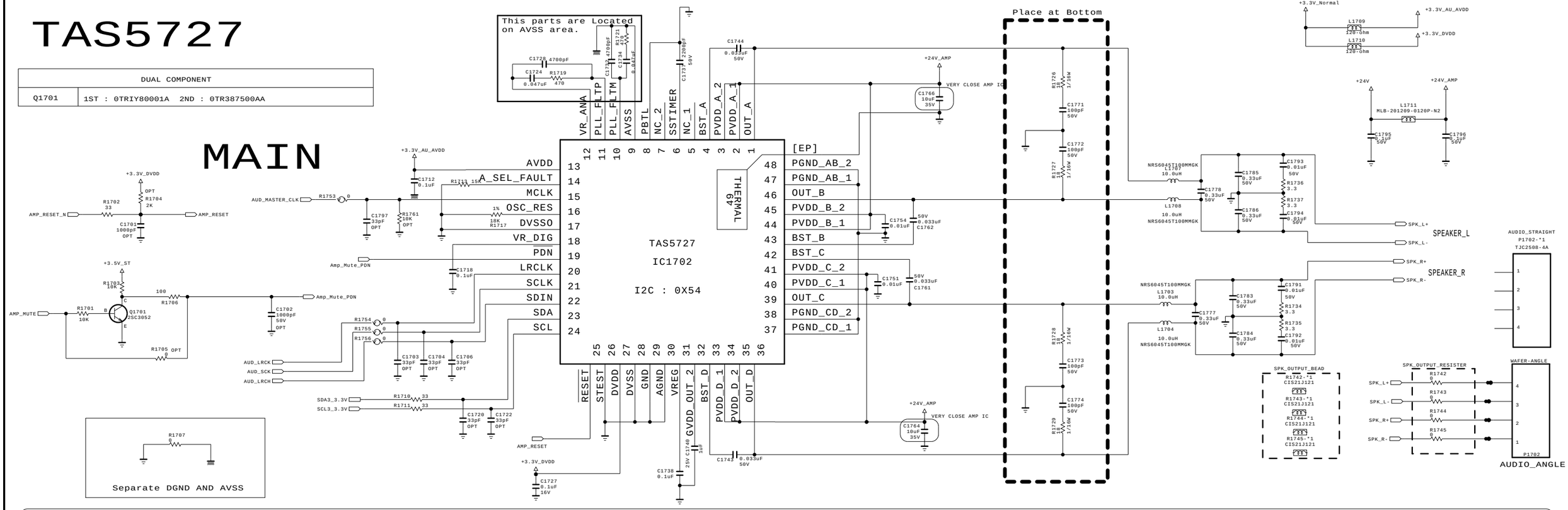


MODEL	BCM35230	DATE	
BLOCK	L_DIMMING	SHEET	16 / 50

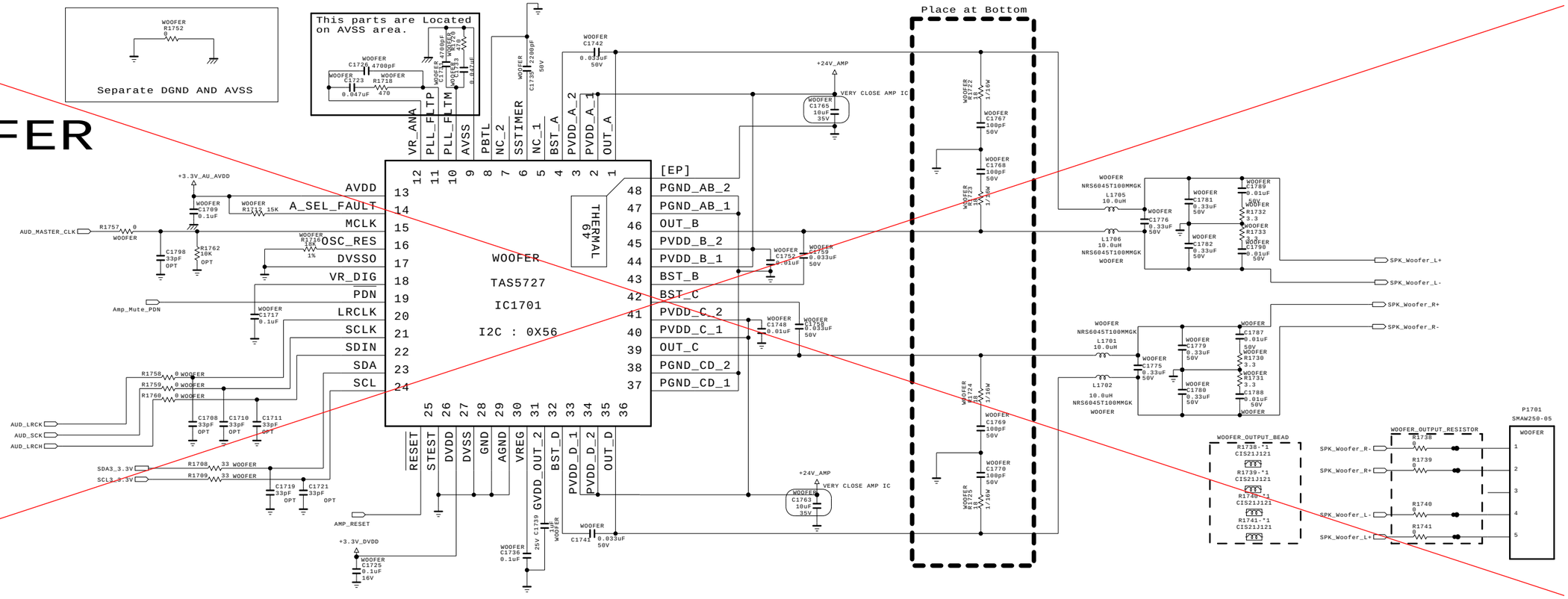
TAS5727

DUAL COMPONENT	
Q1701	1ST : 0TRIY80001A 2ND : 0TR387500AA

MAIN



WOOFER



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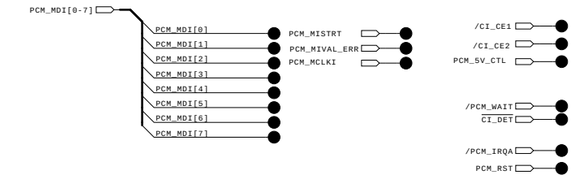
SECRET

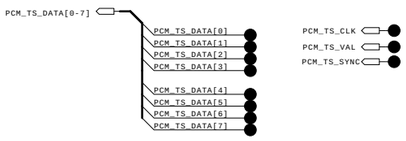
LGElectronics

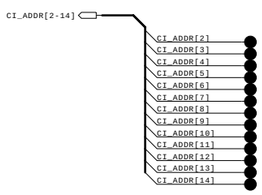
LG ELECTRONICS

MODEL	BCM35230	DATE	
BLOCK	AUDIO[TI]	SHEET	17 / 50

NON CI







MODEL	BCM35230	DATE	
BLOCK	NON CI	SHEET	20 / 50

NON_CHB & CHB TUNER (KOR/USA)

DUAL COMPONENT	
IC2102	1ST : EAN61829801, 2ND : EAN544289201
IC2103	1ST : EAN61507501, 2ND : EAN54428101

NON_CHB_SANYO_TUNER

NON_CHB_TUNER_V_S — TU2101 UFA55AL

1	NC_1
2	NC_2
3	+B[+5V]
4	NC[RF_AGC]
5	AS
6	SCL
7	SDA
8	NC(IF_TP)
9	SIF
10	NC_3
11	VIDEO
12	GND
13	+1.2V
14	+3.3V
15	RESET
16	IF_AGC_CNTL
17	DIF_1
18	DIF_2
19	SHIELD

NON_CHB_TUNER_H_S — TU2101-*1 UDA55AL

1	NC_1
2	NC_2
3	+B[+5V]
4	NC[RF_AGC]
5	AS
6	SCL
7	SDA
8	NC(IF_TP)
9	SIF
10	NC_3
11	VIDEO
12	GND
13	+1.2V
14	+3.3V
15	RESET
16	IF_AGC_CNTL
17	DIF_1
18	DIF_2
19	SHIELD

CHB_TUNER — TU2102 TDSB-H031F

1	SW_CTL1[NC]
2	SW_CTL2[NC]
3	SW_5V
4	S_3.3V
5	S_1.8V
6	TU_SCL
7	TU_SDA
8	M_1.8V
9	M_SIF
10	M_3.3V
11	M_CVBS
12	GND_1
13	SD_1.2V
14	SD_3.3V
15	TU_RESET
16	M_IF_AGC
17	M_DIF[N]
18	M_DIF[P]
19	SD_ERROR
20	SD_SYNC
21	SD_VALID
22	SD_MCL
23	SD_D0
24	NC
25	GND_2
26	GND_3
27	GND_4
28	GND_5
29	GND_6
30	GND_7
31	SD_2.5V[OPT]
32	SD_RESET
33	SIF/NC
34	S_CVBS
35	SD_SCL
36	SD_SDA
37	SHIELD

PIN 25~30 MUST BE SEPARATED TUNER GND

CLOSE TO PIN 25 — R2168 0 CHB; R2169 0 CHB — CLOSE TO PIN 29

close to TUNER — R2102 0 OPT — C2101 0.1uF 16V OPT — RF_SWITCH_CTL

+3.3V_S_TU — R2104 0 OPT — R2107 100K OPT — RF_SWITCH_CTL_2

+5V_TU — C2107 100pF 50V; C2108 0.1uF 16V

+3.3V_S_TU — L2114 BLM18PG121SN1D CHB — C2111 0.1uF 16V OPT — C2117 100pF 50V CHB; C2121 0.1uF 16V CHB — Close to Tuner

+1.8V_S_TU — L2115 CHB BLM18PG121SN1D — C2183 0.1uF 16V — Close to Tuner; C2115 100pF 50V CHB; C2120 0.1uF 16V CHB

close to TUNER — C2118 18pF 50V; C2122 18pF 50V — SCL0_3.3V; SDA0_3.3V

+1.8V_M_TU — L2116 BLM18PG121SN1D CHB — C2124 100pF 50V CHB; C2125 0.1uF 16V CHB; C2127 100uF 16V CHB

+5V_TU — R2134 470 — R2138 82 — TU_SIF; C2129 100pF 50V — Q2104 MMBT3906(NXP) (B R2133 4.7K, C)

+1.26V_TU — R2163 75 OPT; C2103 100pF 50V; C2105 0.1uF 16V; C2106 100uF 16V

+3.3V_DE — C2112 100pF 50V; C2113 0.1uF 16V; C2116 100uF 16V

+3.3V_TU — R2117 100; R2170 100K OPT; C2123 0.1uF 16V — TU_RESET

IF_AGC — R2166 1K; C2177 0.1uF

IF_N; IF_P

Close to Tuner — R2122 33 CHB — CHB_TS_SYNC; R2123 33 CHB — CHB_TS_VAL; R2124 33 CHB — CHB_TS_CLK; R2125 33 CHB — CHB_TS_DATA

+3.3V_TU — L2112 BLM18PG121SN1D CHB — C2128 100pF 50V CHB; C2131 0.1uF 16V CHB; C2134 100uF 16V CHB

+5V_TU — R2139 1K OPT; R2142 220; R2143 220; R2136 0 OPT; R2137 0; R2140 1K OPT; Q2105 MMBT3906(NXP) — TU_CVBS

+3.3V_S_TU — R2121 100 CHB; R2128 100K OPT; C2126 0.1uF 16V CHB — TU_RESET_SUB

+5V_TU — R2112 1K; R2114 220 OPT CHB; R2116 220 CHB; R2161 0 1/16W OPT; R2106 0; R2113 1K OPT; Q2101 MMBT3906(NXP) CHB — CHB_CVBS

close to TUNER — C2102 18pF 50V OPT; C2104 18pF 50V OPT — SCL1_3.3V; SDA1_3.3V

FE_TS_DATA[0] … FE_TS_DATA[7] — FE_TS_DATA[0-7]

RF_BOOSTER_CTL; TS_VAL_ERR; TU_TS_SYNC; TU_TS_CLK; S2_RESET

+5V_Normal — L2104 BLM18PG121SN1D — C2147 0.1uF 16V; C2151 22uF 16V; C2109 0.1uF 16V OPT

+5V_TU — L2101 BLM18PG121SN1D — C2154 22uF 16V; C2157 0.1uF 16V

+3.3V_TU — C2153 0.1uF

+3.3V_S_TU — L2107 MLB-201209-0120P-N2 CHB — C2163 10uF 10V CHB; C2169 0.1uF CHB

+3.3V_M_TU — L2105 MLB-201209-0120P-N2 CHB — C2161 10uF 10V CHB; C2167 0.1uF CHB

+3.3V_DE — L0106 MLB-201209-0120P-N2 — C2162 10uF 10V; C2168 0.1uF

+3.3V_Normal — L2103 MLB-201209-0120P-N2 — C2140 0.1uF 16V; C2141 22uF 16V

+3.3V_TU — C2144 0.1uF 16V; C2149 0.1uF 16V

+3.3V_TU — IC2102 AZ1117BH-1.8TRE1 — IN; CHB; OUT; ADJ/GND — C2176 0.1uF CHB; R2145 CHB; C2142 10uF 10V CHB; C2146 0.1uF 16V CHB

+1.8V_CHB_TU

+1.8V_CHB_TU — C2152 0.1uF CHB — L2108 BLM18PG121SN1D CHB — 120-ohm — C2150 10uF 10V; C2166 0.1uF CHB

+1.8V_S_TU

+1.8V_M_TU — L2109 BLM18PG121SN1D CHB — 120-ohm — C2159 10uF 10V CHB; C2165 0.1uF CHB

IC2103 AZ1117BH-ADJTRE1

+3.3V_TU — L2111 120-ohm — INPUT (3) — OUTPUT (2) — ADJ/GND (1)

C2180 2.2uF 16V; C2178 2.2uF 16V

R2135 220 — R1

C2181 22uF; R2167 4.7 — R2

+1.26V_TU — L2110 BLM18PG121SN1D — C2182 22uF 10V; C2179 0.1uF 50V

VOUT = VREF *(1+R2/R1)

NON_CHB_LGIT_TUNER

NON_CHB_TUNER_V_L — TU2101-*2 TDVJ-H131F

1	NC_1
2	NC_2
3	+B1[5V]
4	RF_AGC
5	MOPLL_AS
6	SCL
7	SDA
8	NC_3
9	SIF
10	NC
11	VIDEO
12	GND
13	+B2[1.2V]
14	+B3[3.3V]
15	RESET
16	IF_AGC
17	DIF_1[N]
18	DIF_2[P]
19	SHIELD

NON_CHB_TUNER_H_L — TU2101-*3 TDVJ-H101F

1	ANT_PWR[OPT]
2	BST_CNTL
3	+B
4	NC[RF_AGC]
5	AS
6	SCL
7	SDA
8	NC(IF_TP)
9	SIF
10	NC
11	VIDEO
12	GND
13	1.2V
14	3.3V
15	RESET
16	IF_AGC_CNTL
17	DIF_1
18	DIF_2
19	SHIELD

THE ⚠ SYMBOL MARK OF THIS SCHEMETIC DIAGRAM INCORPORATES SPECIAL FEATURES IMPORTANT FOR PROTECTION FROM X-RADIATION. FILRE AND ELECTRICAL SHOCK HAZARDS, WHEN SERVICING IF IS ESSENTIAL THAT ONLY MANUFATURES SPECFIED PARTS BE USED FOR THE CRITICAL COMPONENTS IN THE ⚠ SYMBOL MARK OF THE SCHEMETIC.

SECRET

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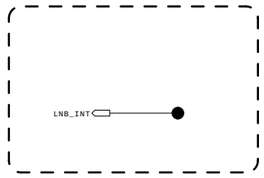
LG ELECTRONICS

MODEL	BCM35230	DATE	
BLOCK	ATSC_TUNER	SHEET	21 / 50

Non_DVB-S2 LNB Part_Allegro



THE ⚠ SYMBOL MARK OF THIS SCHEMETIC DIAGRAM INCORPORATES
SPECIAL FEATURES IMPORTANT FOR PROTECTION FROM X-RADIATION.
FILRE AND ELECTRICAL SHOCK HAZARDS, WHEN SERVICING IF IS
ESSENTIAL THAT ONLY MANUFATURES SPECFIED PARTS BE USED FOR
THE CRITICAL COMPONENTS IN THE ⚠ SYMBOL MARK OF THE SCHEMETIC.

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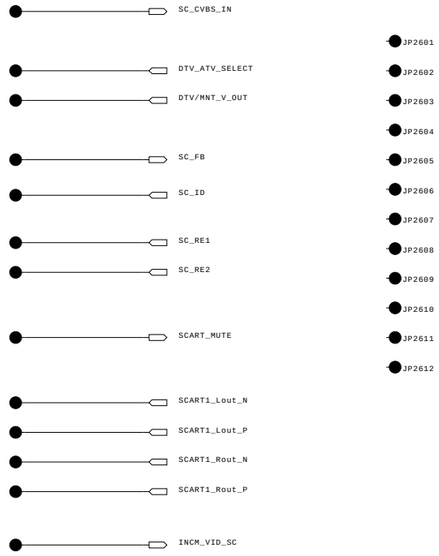
LG ELECTRONICS

MODEL	BCM35230	DATE	
BLOCK	NON LNB	SHEET	24 / 50



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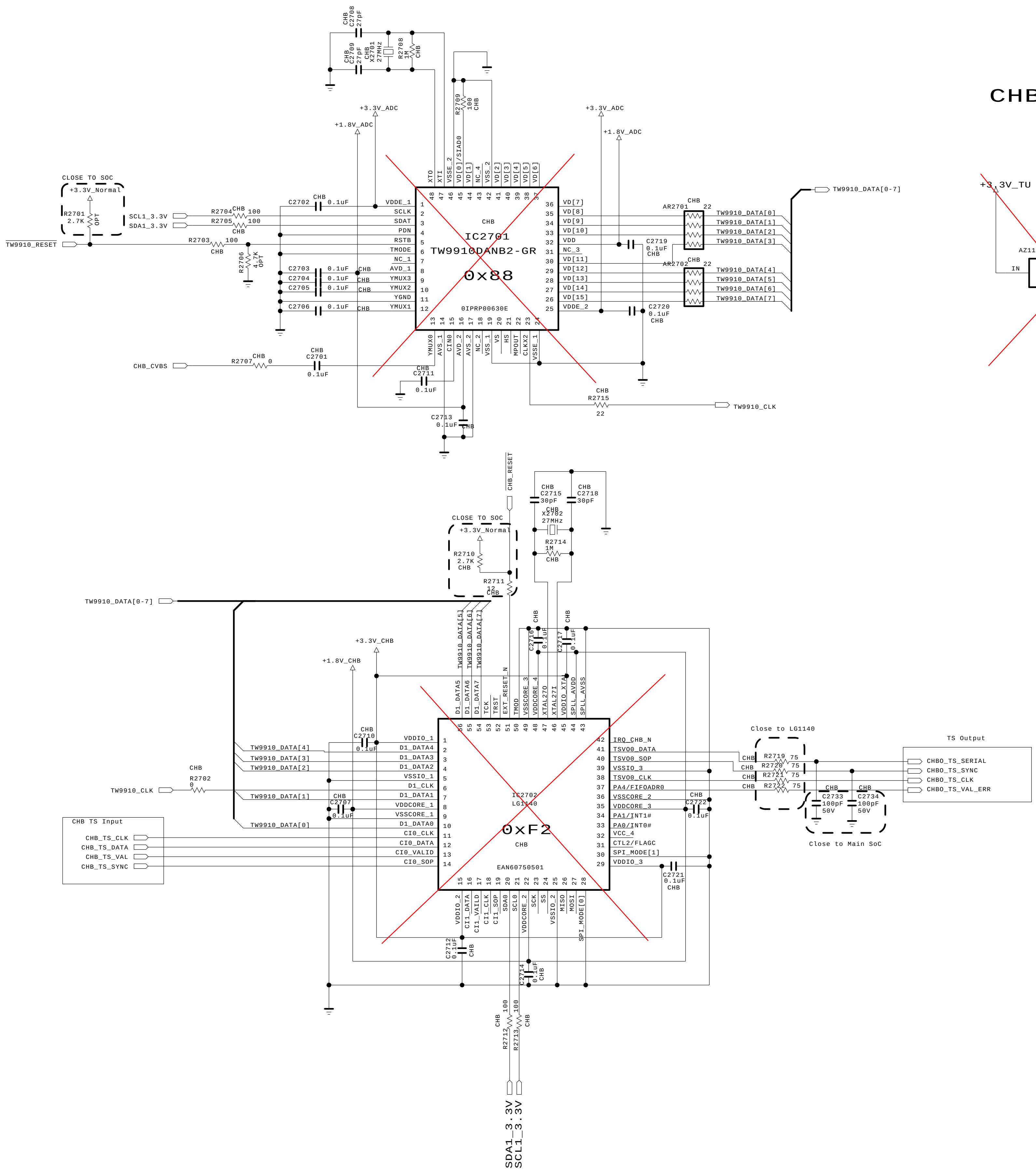
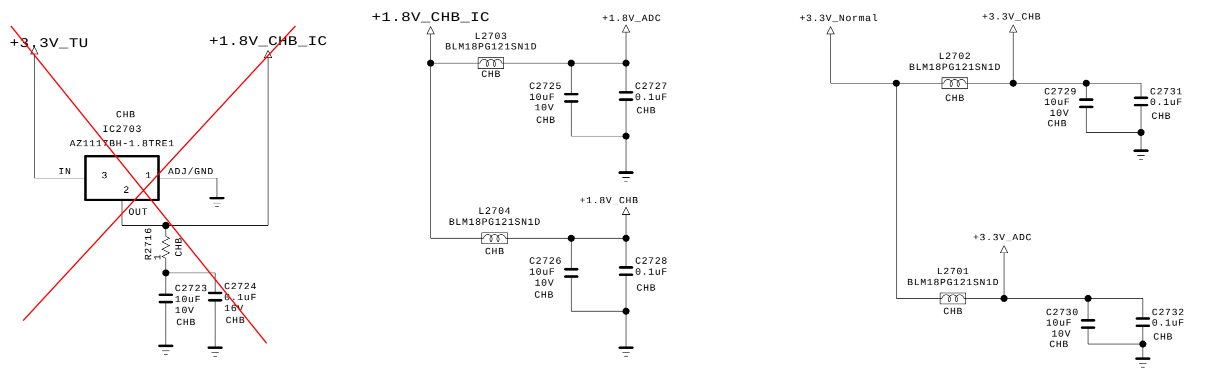
MODEL	BCM35230	DATE	
BLOCK	NON SCART	SHEET	26 / 50

CHANNEL BROWSER

DUAL COMPONENT	
IC2703	1ST : EAN61829801 2ND : EAN54428201



CHB OPTION



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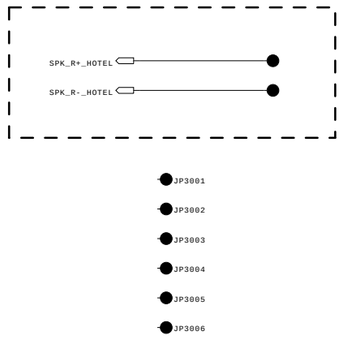
LG ELECTRONICS

MODEL	BCM35230	DATE	
BLOCK	CHB	SHEET	27 / 50

NON CHINA HOTEL



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LG ELECTRONICS

MODEL	BCM35230	DATE	
BLOCK	NON CHINA HOTEL	SHEET	30 / 50

THE ⚠ SYMBOL MARK OF THIS SCHEMETIC DIAGRAM INCORPORATES SPECIAL FEATURES IMPORTANT FOR PROTECTION FROM X-RADIATION. FILRE AND ELECTRICAL SHOCK HAZARDS, WHEN SERVICING IF IS ESSENTIAL THAT ONLY MANUFATURES SPECFIED PARTS BE USED FOR THE CRITICAL COMPONENTS IN THE ⚠ SYMBOL MARK OF THE SCHEMETIC.

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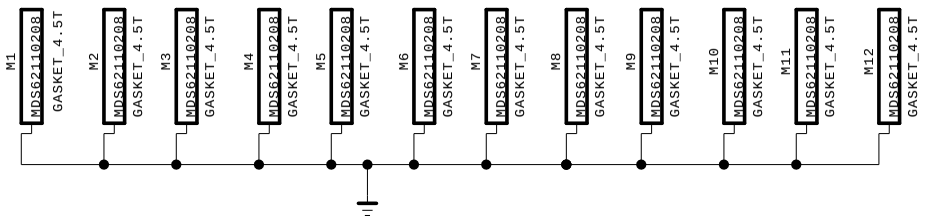
LG ELECTRONICS

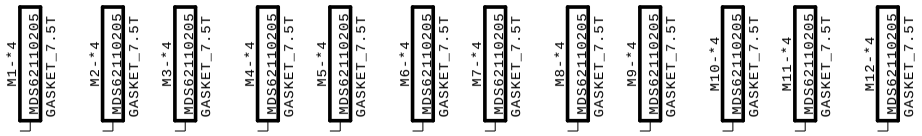
MODEL	BCM35230	DATE	
BLOCK	NON URSA	SHEET	36 / 50

SMD GASKET

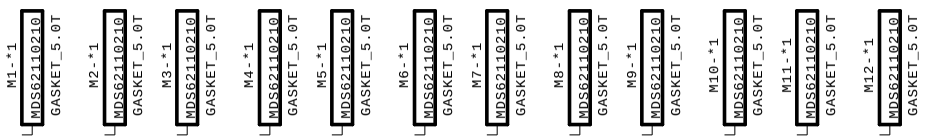
SMD GASKET 4.5T



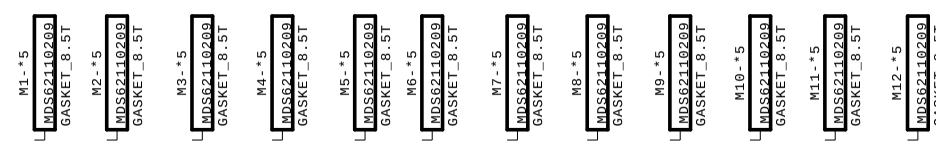
SMD GASKET 7.5T



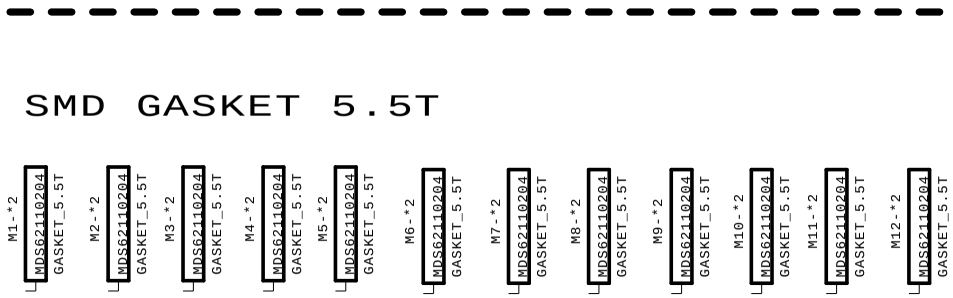
SMD GASKET 5.0T



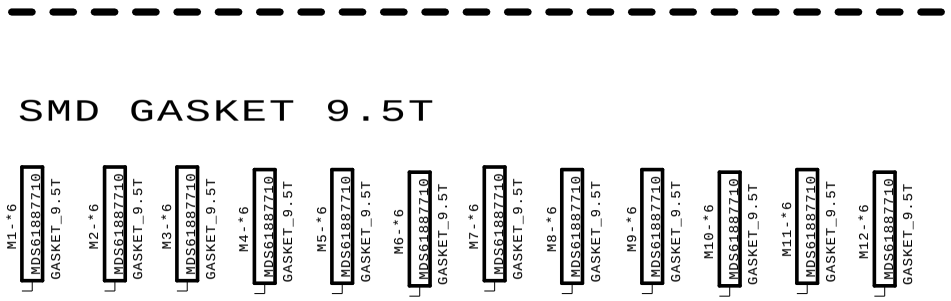
SMD GASKET 8.5T



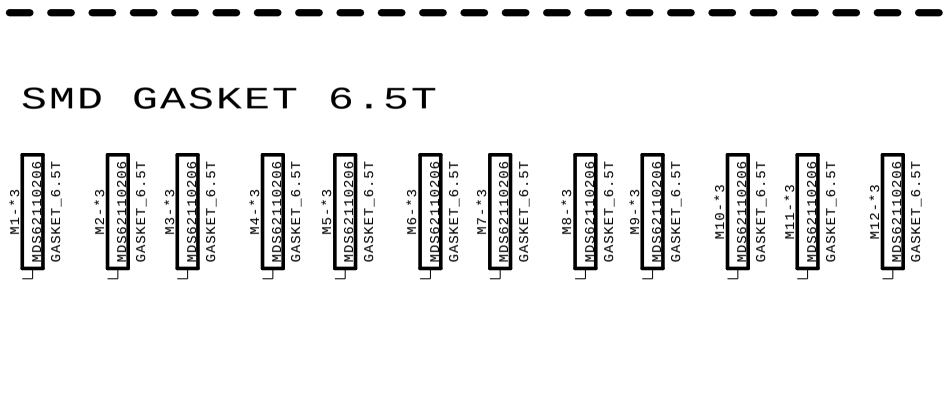
SMD GASKET 5.5T

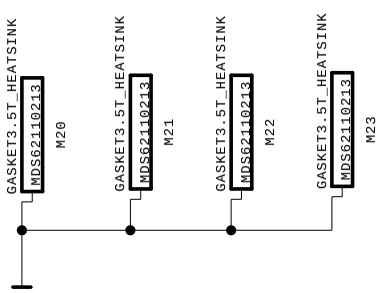


SMD GASKET 9.5T



SMD GASKET 6.5T





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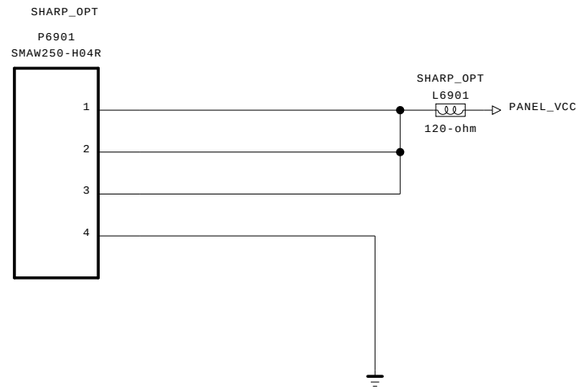
MODEL	BCM35230	DATE	2010. 09. 18
BLOCK	SMD GASKET	SHEET	56 / 56



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LG ELECTRONICS

MODEL		DATE	
BLOCK		SHEET	/


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