

SERVICE MANUAL

MODEL: BEATMIX



SPECIFICATION

FUNCTION

- Play/Pause-----To control a play or pause mode of its belonging deck
Loop In/Loop Out-----To set an in and out point for loop playback
TRAX A/B-----For track navigation and loading a track to a deck for play
CUE MIX-----For adjusting the mixing ratio between Master Out and Cue for headphone
PHONES-----For adjusting the volume of the monitoring channel
MASTER-----For adjusting the total volume output
GAIN-----For adjusting the output volume of its belonging channel
HIGH-----For adjusting the high frequency of the sound
MID-----For adjusting the middle frequency of the sound
LOW-----For adjusting the low frequency of the sound
JOG MODES-----To activate a mode for operating the jog wheel according to user's operation
PITCH BEND-----To temporarily change the speed of the playing track
SHIFT-----Use it to activate the second mapping of certain buttons
><-----To switch the CUE point
CUP-----To do a fast return to CUE point and then instant play
CUE-----To return to a CUE point and pasue on this CUE
1-2-3-----Hot Cues
LOOP <SIZE>-----For changing the length of a loop playback
FX SEL-----Use it to coose a sound effect
FX ON-----Use it to switch on a sound effect
PARAM2-----Use it to adjust the parameter of the sound effect
BEAT MASH-----Smart Loop
FILTER-----Use it to adjust the high pass or low pass of the filyer effect
AUTO LOOP-----For choosing a beat value to start Auto Loop

STANDARD

Output level-----1.0±0.2 Vms(1 KHz 0dB)
S/N Ratio-----More than 80dB
Frequency response----20Hz~20KHz±2dB
Dynamic range-----More than 70dBb
Channel separation-----More than 70dB
Channel balance-----±1dB
Harmonic distoryion-----Less than 0.05%

DISASSEMBLY PROCEDURES

1.REMOVAL OF FIXED HOLDER(Fig. 1)

- (A) TAKE OUT THE 21 PCS KNOB AND THE 5 PCS VR CAP FROM THE FIXED HOLDER.
- (B) TAKE OUT THE 15 PCS SCREW FROM THE BOTTOM CHASSIS.
- (C) TAKE OUT THE 1 PC CONNECTOR AND TAKE OUT THE FRONT PCB FROM THE BOTTOM CHASSIS.
- (D) TAKE OUT THE 1 PC CONNECTOR AND TAKE OUT THE MAIN PCB FROM THE BOTTOM CHASSIS.

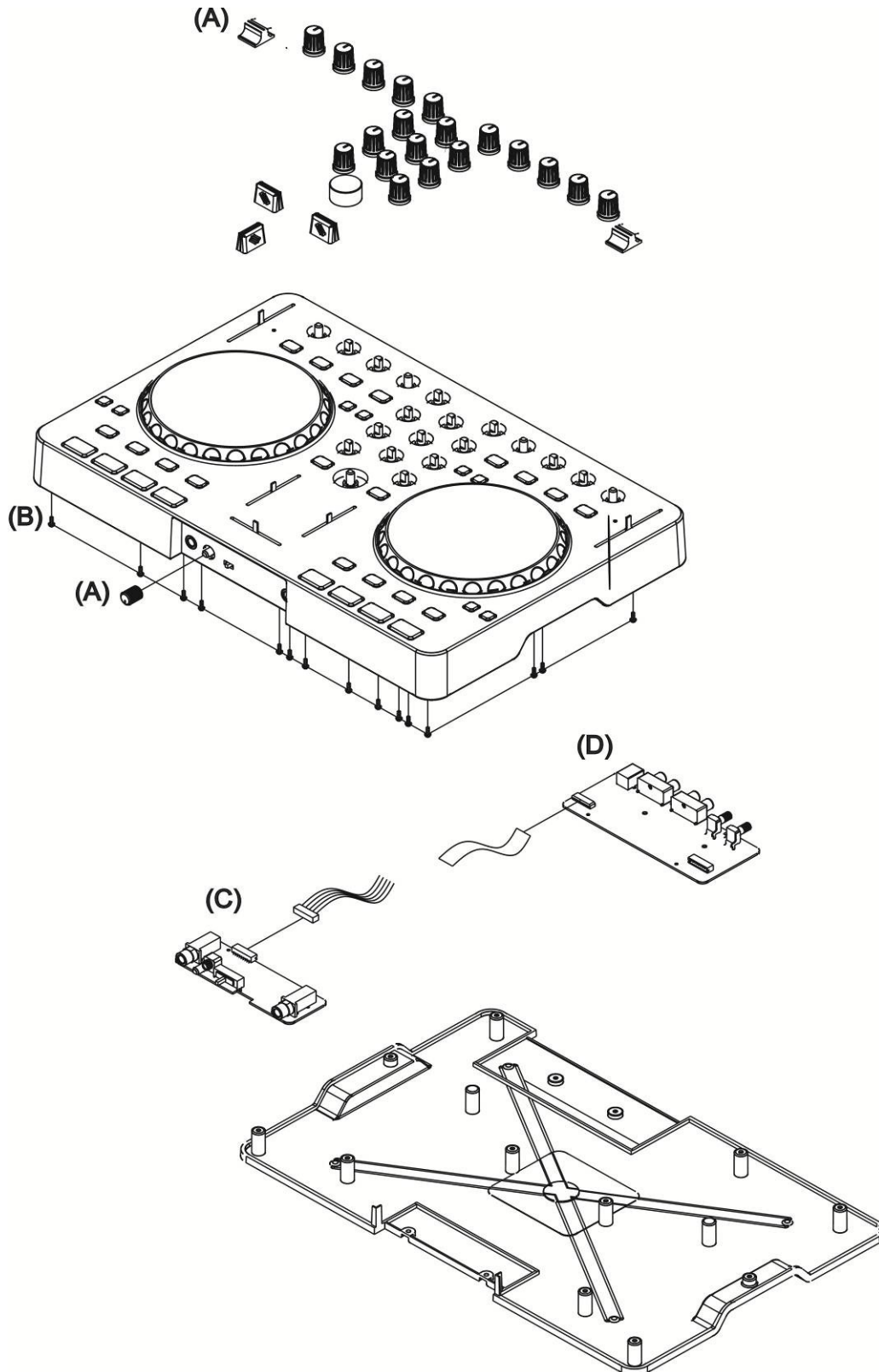


Fig.1

DISASSEMBLY PROCEDURES

2.REMOVAL OF FUNCTION PCB ASS'Y (Fig.2)

(A) TAKE OUT THE 12 PCS SCREWS FROM THE CONTROL PCB

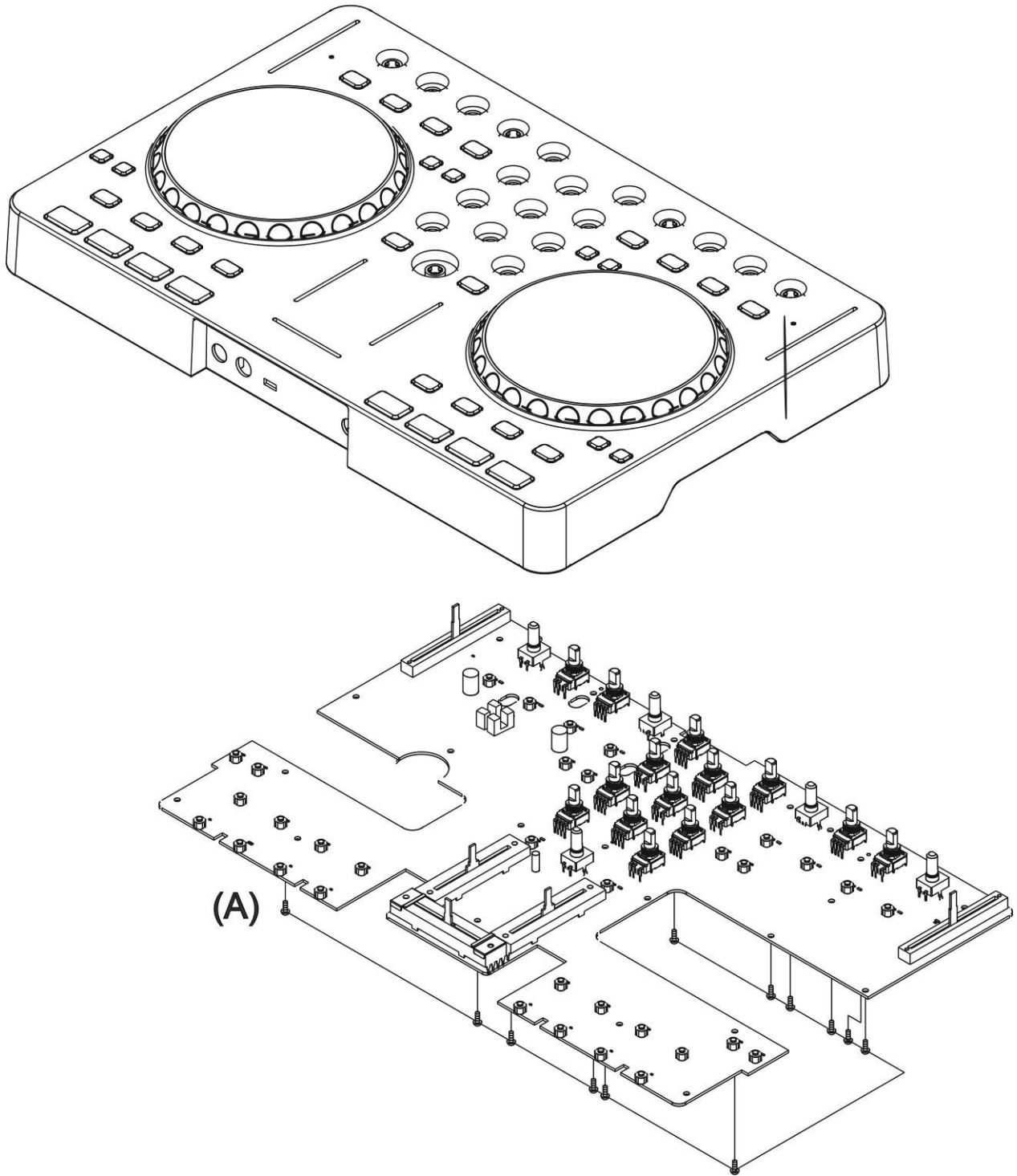
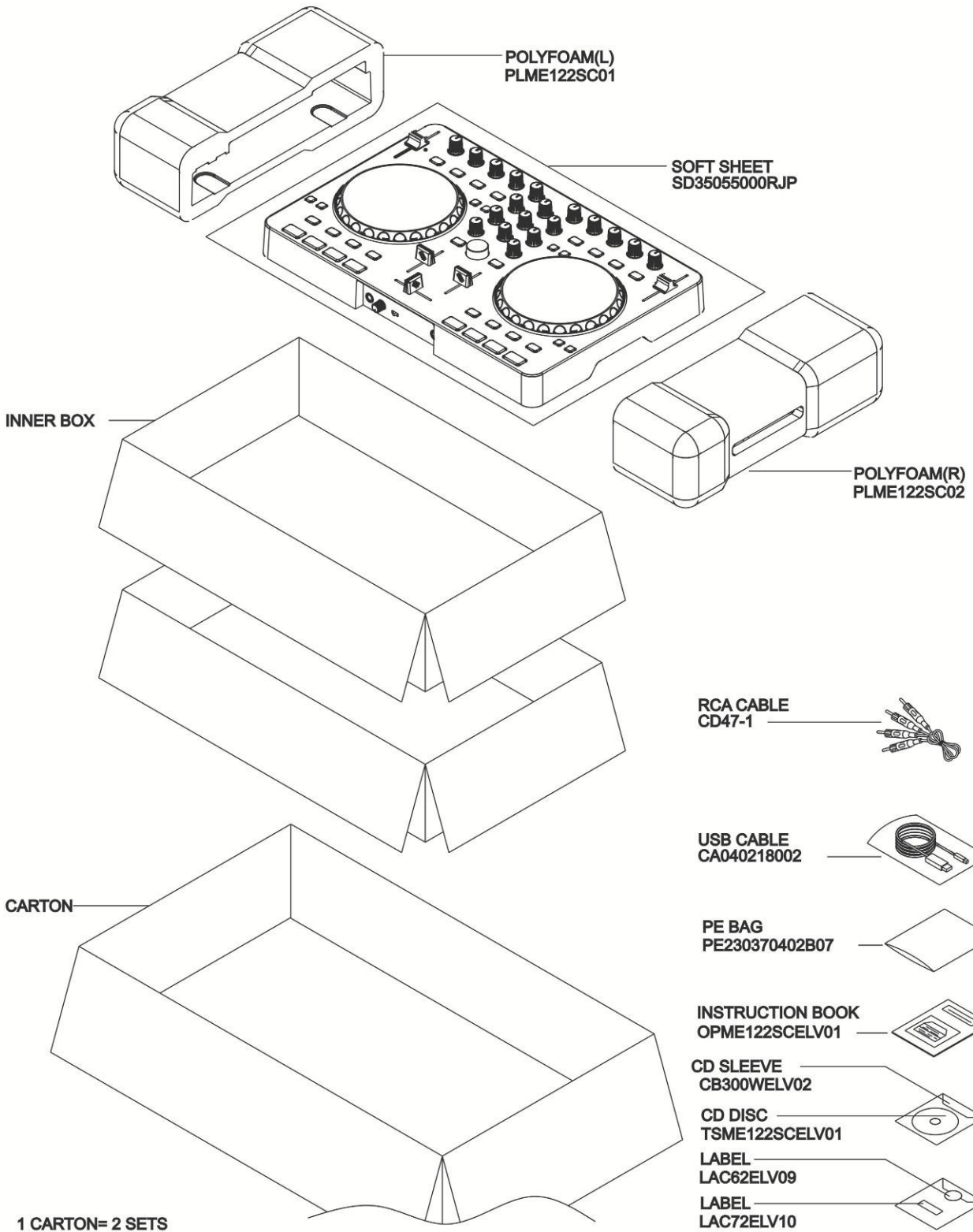
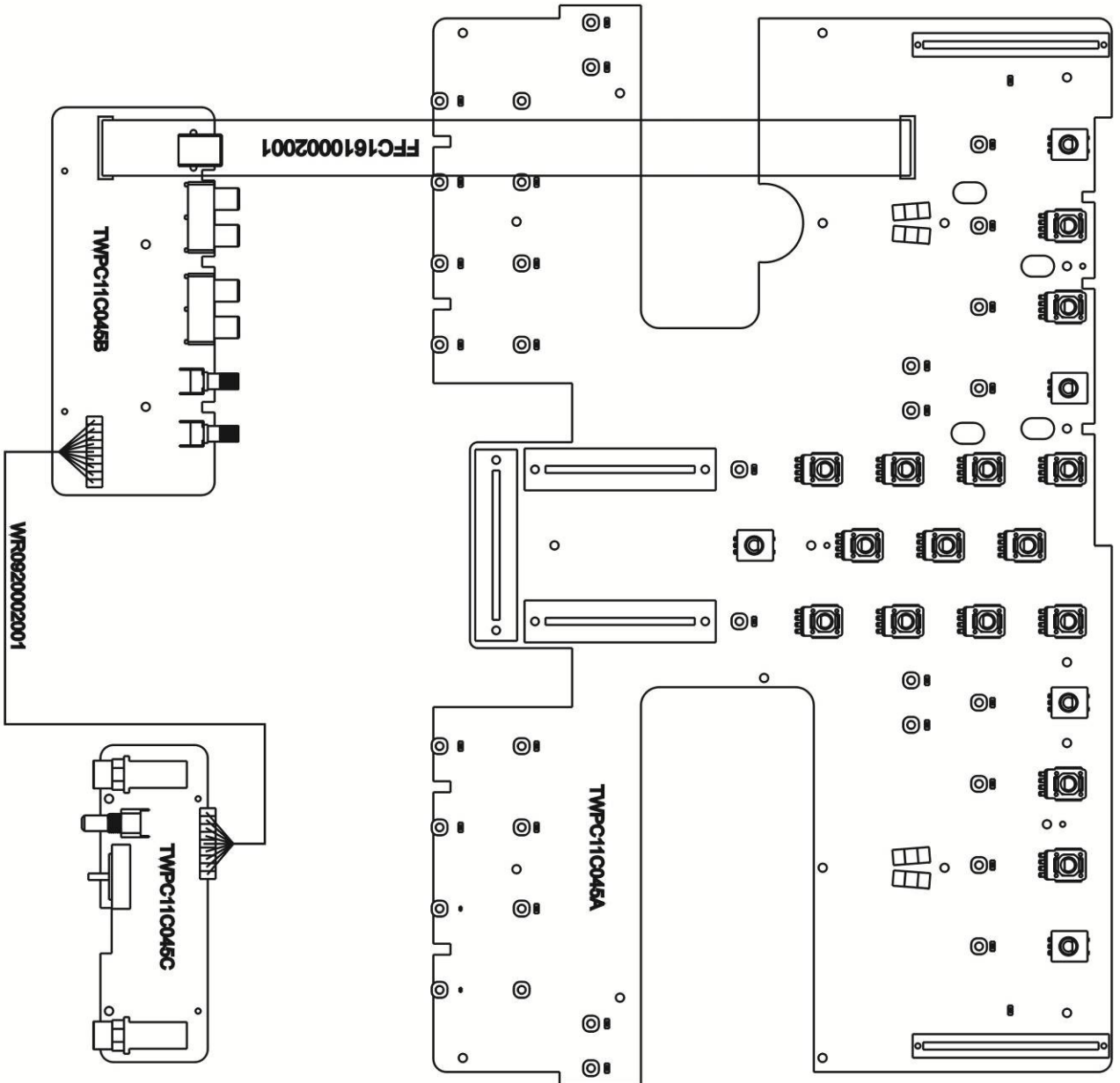


Fig.2

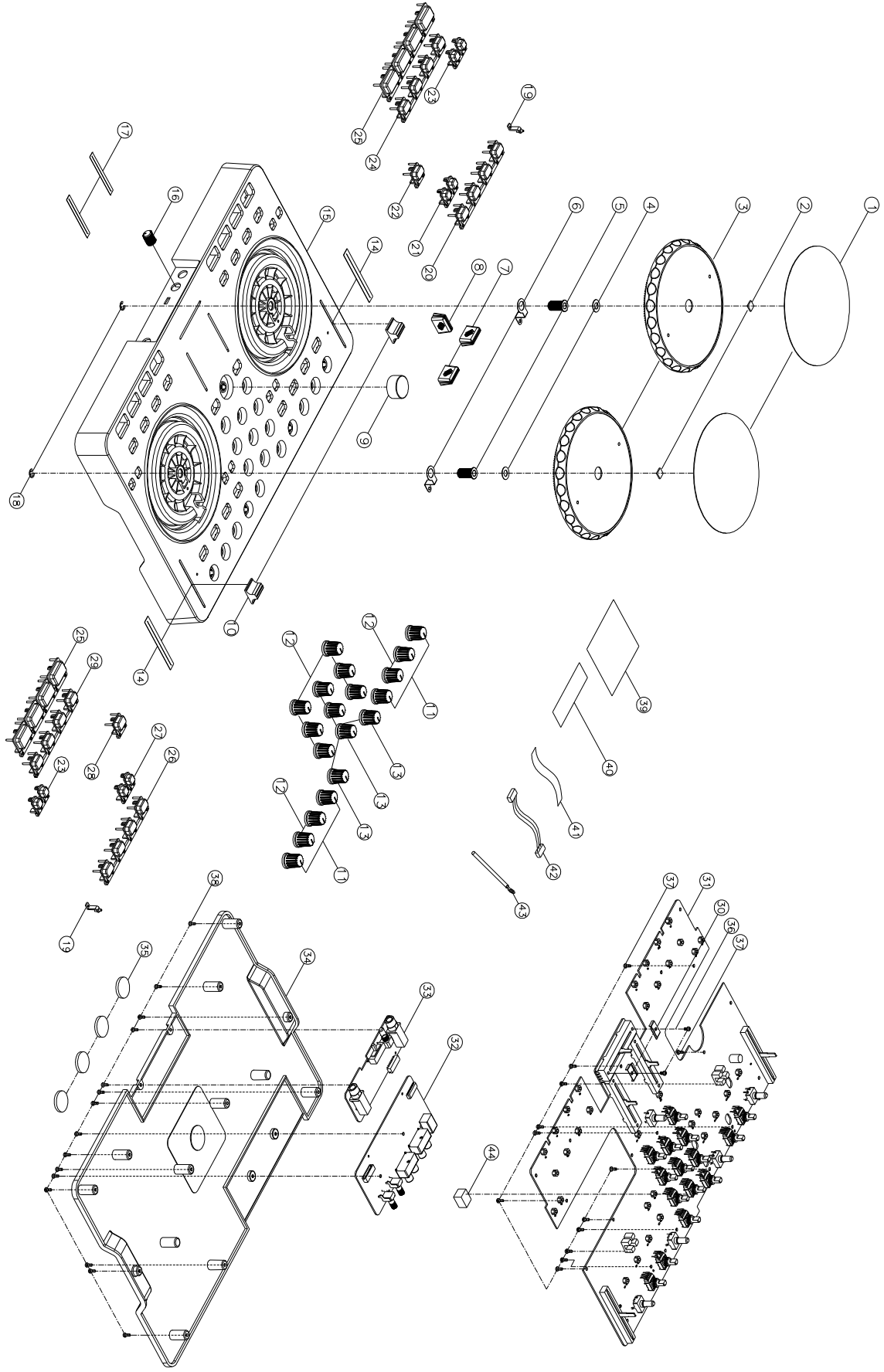
PACKING DIAGRAM



~ ~ ~ WIRING DIAGRAM ~ ~ ~



EXPLODE DRAWING



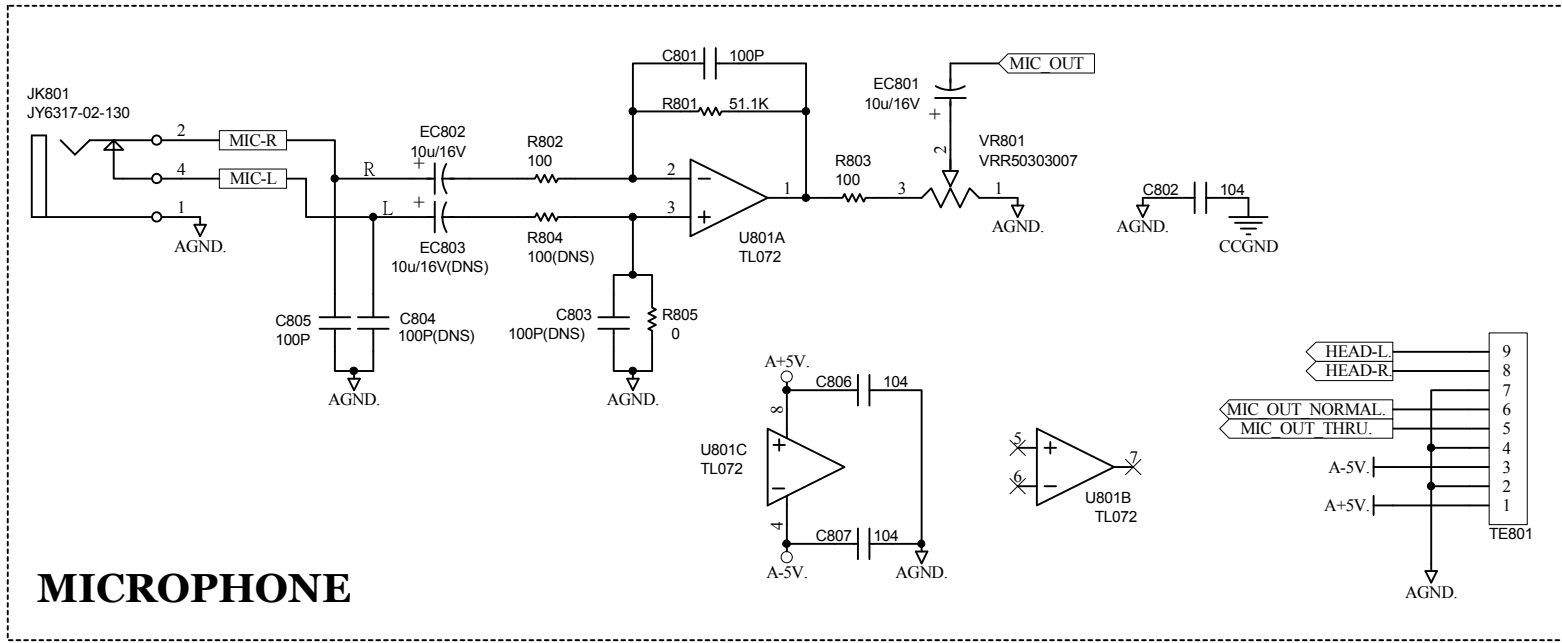
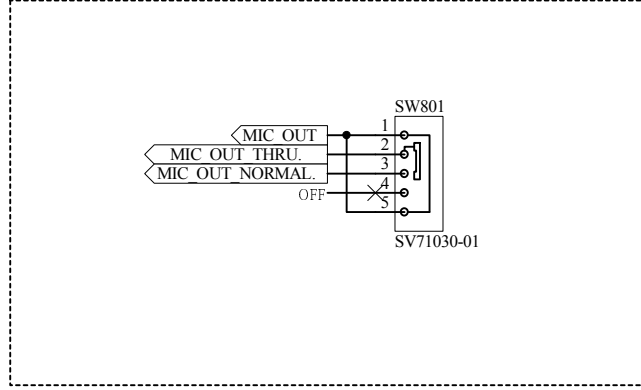
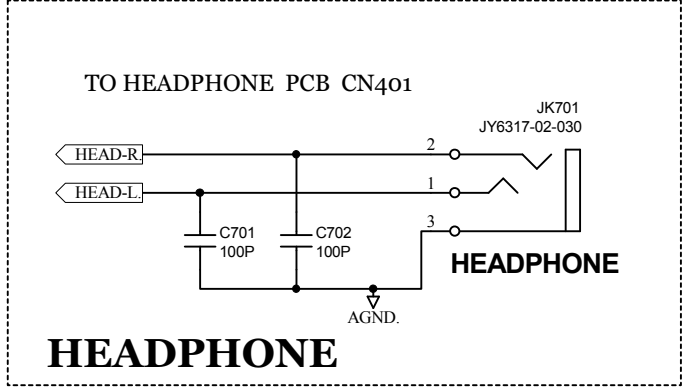
ME122SCELV01 BOM

LEVEL	P/N	DESCRIPTION	QTY	REF
0.1	BACS305	Aluminum Knob	1	9
0.1	BAGL-55A	CABLE CLIP 55L	1	43
0.1	BART-K00701	ROTATE KNOB	1	16
0.1	CA040218001	USB Connector	1	
0.1	CB300WELV02	CD Sleeve	1	
0.1	ERE75	E Ring 5mm	2	18
0.1	FFC1610001001	FFC 16Pin Pitch:1mm Length:100	1	41
0.1	LAC22ELV08	Serial Number Label	1	40
0.1	LAC53ION106	Warning Label	1	39
0.1	LAC62ELV09	Label(SEcurity SERAL)	1	
0.1	LAC62ELV11	Label(EAN Bar Code)	2	
0.1	LAC67MON95	Label	1	
0.1	LAC67MON96	Label	1	
0.1	LAC72ELV10	Softwre Number Label	1	
0.1	MT0701843	Ground Plate	2	6
0.1	MT1105559	Copper	2	5
0.1	NM1106115	Velvet Carpet	2	17
0.1	NM1106118	Velvet Carpet	2	14
0.1	NP311ELV09	Wheel Plate	2	1
0.1	PME122SCELV01	Pack Assembly	1	
..2	CG122SC310ELV01	Inner Box	1	
..2	CT122SC513ELV01	Carton	0.5	
..2	OPME122SCELV01	Instruction Book	1	
..2	PE230370402B07	Poly Bag 230*370mm	1	
..2	PLME122SC01	Poly Foam(L)	1	
..2	PLME122SC02	Poly Foam(R)	1	
..2	SD35055000RJP	Soft Sheet	1	
0.1	PT1104424301	Fixed Holder(Cabinet)-Printing	1	15
..2	PT11044243	Fixed Holder(Cabinet)	1	
0.1	PT1110633901	Button Printing (SHIFT 、 1 、 2 、 3)	1	24
..2	PT11106339	Button	1	
0.1	PT1110633902	Button Printing (1 、 2 、 3 、 SHIFT)	1	29
..2	PT11106339	Button	1	
0.1	PT1110633903	Button Printing (Headphone)	1	20
..2	PT11106339	Button	1	
0.1	PT1110633904	Button Printing (Headphone2)	1	26
..2	PT11106339	Button	1	
0.1	PT1110634001	Button Printing (><)	2	25
..2	PT11106340	Button	2	
0.1	PT1110634101	Button Printing (-,+)	2	23
..2	PT11106341	Button	2	
0.1	PT1110634102	Button Printing	1	21
..2	PT11106341	Button	1	
0.1	PT1110634103	Button Printing	1	27
..2	PT11106341	Button	1	
0.1	PT1110634201	Button Printing (A)	1	22
..2	PT11106342	Button	1	
0.1	PT1110634202	Button Printing (B)	1	28
..2	PT11106342	Button	1	
0.1	PT11106343	Lid	2	19
0.1	PT1110637202	VR Cap	2	7
0.1	PT11106373	Knob	4	11
0.1	PT1110637304	Knob	10	12
0.1	PT1110637305	Knob	5	13
0.1	PT1110638701	VR Cap	1	8
0.1	PT1110641701	VR Cap Printing	2	10
0.1	PT111074301	Wheel Painting	2	3
..2	PT1110743	Wheel	2	
...3	MT1105560	Axis Cap	2	
0.1	PT1130354	Bottom Plate	1	34

0.1	PU008008001	Conbuctive Foam	2	2
0.1	PU008008017	Conbuctive Foam	1	
0.1	RU1110659	Rubber Foot	4	35
0.1	SC0304RINI	Screw M3X4 PPN	2	36
0.1	SC0308RBNI	SCREW M3X8 PRN TAPPING	13	37
0.1	SC0310RBBI	Screw M3X10 PPB Tapping	15	38
0.1	TSME122SCELV01	CD	1	
0.1	WR0920002001	Isolation Cable 9 pin Single R	1	42
0.1	WS1306505	Washer FLAT 13*6.5*0.5MM	2	4
0.1	TWPC11C04501	Control PCB Assembly	1	
..2	PC11C045	Control PCB	1	
..2	TWPC11C045A01	Control PCB Assembly	1	31
...3	AL2-51-4401	TRANSISTOR 2N4401 NPN	6	Q107~112
...3	AL2-51-4403	TRANSISTOR 2N4403 PNP	6	Q101~106
...3	CS103K5003X7R	CERAMIC 0.01uF/50V 10% 0603	10	C118~127
...3	CS104K5003X7R	CERAMIC 0.1uF/50V 10% 0603	30	C101~109,115,128~130,201~203,206~219
...3	CS220J5003NPO	CERAMIC 22pF/50V 5% 0603	2	C111,112
...3	DI1SS302SM	Switch Diode 1SS302 SC-70 High	2	D202,203
...3	DI1SS352SM	Switch Diode 1SS352 High Speed	2	D201,204
...3	DIEN1N4148WSM	Diode SMD	40	D101~105,107~141
...3	DIPH574	Photo Sensor	4	SEN101~104
...3	ECS10616BLE	ECAP 10UF/16V 4*5.7mm SMD Low	1	EC101
...3	ECS22716D8	ECAP 220uF/16V 6.3*7.7mm SMD	2	EC102,103
...3	FCN1T1001602	FCN Down Touch ZIF SMD	1	TE101
...3	IC74AHC14PW	IC 74AHC14PW	2	IC103,104
...3	IC74AHC1G125GW	IC 74AHC1G125GW	1	IC201
...3	IC74HC595	IC 74HC595	1	IC102
...3	IC74HCT04D	IC 74HCT04D SO14	1	IC105
...3	IC74LVC14	IC 74LVC14 SOP-14	2	IC106,108
...3	ICBA033FP	IC BA033FP	1	IC107
...3	ICCD4051BM96	IC CD4051BM96 SOIC-16	3	IC202~204
...3	ICLM358	IC LM358 DUAL OP-AMP SOIC-8	2	IC205,206
...3	ICYHFCR205	IC YHFCR205 (ICPIC18F66J10+Program)	1	IC101
...4	ICPIC18F66J10	IC (PIC18F66J10-I/PT)	1	-
...3	LD1SAV31C0CB01	Red LDE 0603 125°	34	LED101~134
...3	LDKPHM1608QWF-D	Liquid-emitting Diode Whiee SM	2	LED151,152
...3	RS000010J03	RESISTOR 0Ω 5% SMD 0603	9	R107~112,195~197
...3	RS001K10F03	RESISTOR 1K 1% SMD 0603	13	R119,149,155,161,168,175,182,189,190~194
...3	RS001M10F03	RESISTOR1M 1% SMD 0603	5	R121,202,204,207,208
...3	RS004710F03	RESISTOR 47Ω 1% SMD 0603	4	R102~105
...3	RS010010F03	RESISTOR 100Ω 1% SMD 0603	2	R201,205
...3	RS010K10F03	RESISTOR 10K 1% SMD 0603	6	R120,134~138
...3	RS01K510F03	RESISTOR 1.5K 1% SMD 0603	2	R203,206
...3	RS022K10F03	RESISTOR 22K 1% SMD 0603	4	R123,126,129,133
...3	RS02K210F03	RESISTOR 2.2K 1% SMD 0603	3	R101,115,116
...3	RS04K710F03	RESISTOR 4.7K 1% SMD 0603	14	R106,114,117,118,139~148
...3	RS056010F03	RESISTOR 560Ω 1% SMD 0603	40	R122,127,128,132,150~154,156~160,162~167,169~174,176~181,183~188,232,233
...3	SWDC11B20	Switch Rotational Encode 20Pul	5	EN101~105
...3	SWEVQ11L05R	Switch Tact 5mm 160g Horizonta	34	SW101~104,106~111,113~136
...3	TE10200502	5P CONNECTOR	1	(TE102)
...3	VRR10301506	Potentiometer Rotary 10KB 22.5	6	VR202,208,211,214,215,220
...3	VRR50301501	Potentiometer Rotary 50KB Cent	8	VR203,204,207,209,210,212,213,216
...3	VRR50301506	Potentiometer Rotary Volum:50	1	VR201
...3	VRS10304516	Potentiometer Slide 10K 45mm 1	1	VR217
...3	VRS10304519	Potentiometer Slide 10K1B 45mm	2	VR218,219
...3	VRS10306022	Potentiometer Slide 10K1B 60mm	2	VR205,206
...3	XTM10000X6	Crystal 10MHZ 49US SMD Fundame	1	X101
..2	TWPC11C045B01	Main PCB Assembly	1	32
...3	AA822383X	IC AIC1525CX	1	U202
...3	AL2-51-0140	Schottky Barrier Rectifiers Di	1	ZD201

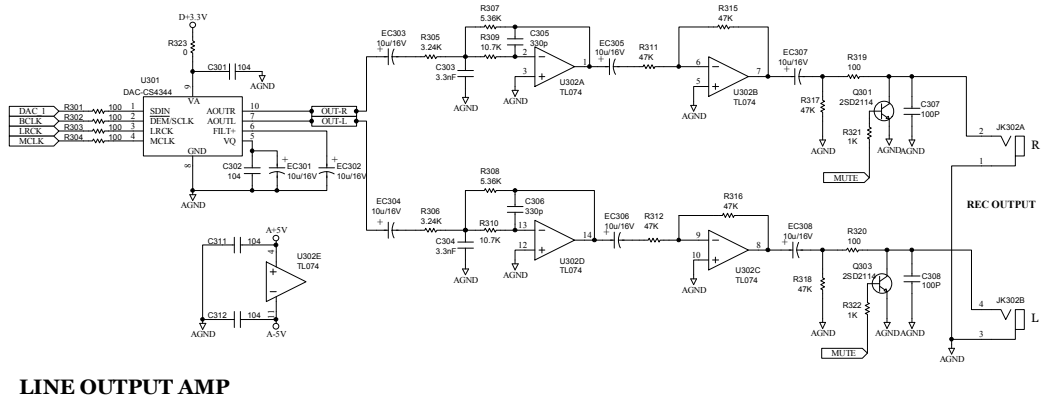
...3	AL2-61-7223	IC NJU7223DL1-33 3.3V TO-252	1	U201
...3	AL2-71-0074	IC TL074 QUAD OPAMP SOP-14	2	U302,303
...3	AL2-75-4344	IC CS4344-CZZ 24bit 192KHz Ste	2	U301,401
...3	AL2-85-0403	IC TPS60403	1	U203
...3	CS101J5003NPO	CERAMIC 100pF/50V 5% 0603 NPO	5	C307,308,313,314,504
...3	CS102K5003X7R	CERAMIC 1nF/50V 10% 0603 X7R	1	C505
...3	CS104K5003X7R	CERAMIC 0.1uF/50V 10% 0603 X7	34	C221,222,224,228~230,301,302,311,312,319,320,401,402,411,412,501,508,511~521,601~603,605,606
...3	CS105K1603X7R	CERAMIC 1uF/16V 10% 0603 X7R	1	C226
...3	CS152K5003X7R	CERAMIC 1.5nF/50V 10% 0603 X7	2	C407,408
...3	CS270J5003NPO	CERAMIC 27pF/50V 5% 0603 NPO	2	C502,503
...3	CS300J5003NPO	CERAMIC 30pF/50V 5% 0603 NPO	2	C506,507
...3	CS331J5003NPO	CERAMIC 330pF/50V 5% 0603 NPO	4	C305,306,315,316
...3	CS332J5003X7R	CERAMIC 3.3nF/50V 5% 0603 X7R	4	C303,304,317,318
...3	CS472K5003X7R	CERAMIC 4.7nF/50V 10% 0603 X7	2	C509,510
...3	CS475K1606X7R	CERAMIC 4.7uF/16V 10% 1206 X7	4	C220,223,225,227
...3	CS681J5003NPO	CERAMIC 680pF/50V 5% 0603 NPO	2	C405,406
...3	DIEN1N4148WSM	Diode SMD	2	D501,502
...3	ECS10616B	Capacitor Electrolytic 10uF/16	21	EC301~314,401~406,602
...3	ECS10616BLE	ECAP 10UF/16V 4*5.7mm SMD Low	2	EC501,601
...3	ECS22716D8	ECAP 220uF/16V 6.3*7.7mm SMD	1	EC502
...3	ECS47535B	Capacitor Electrolytic 4.7uF/35V	1	EC201
...3	FCN1T1001602	FCN Down Touch ZIF SMD	1	FCN101
...3	FSMSMD200	Fuse PTC MSMD200 8V/2A SMD	1	F201
...3	ICG696L293T1UF	IC G696L293T1UF	1	U103
...3	ICLP2985-50DBVR	IC LP2985-50DBVR SOT23-5	1	U601
...3	ICNJM4556AM	IC NJM4556AM	1	U402
...3	ICPCM1808PWR	IC PCM1808PWR	1	U602
...3	ICTUSB3200	IC TUSB3200 USB Streaming Cont	1	U101
...3	ICYHFCRC192	IC YHFCRC192 (AL2-69-2464+Program)SOIC8	1	U102
...4	AL2-69-2464	IC 24C64	1	-
...3	JK0SCU201RFNO	USB Connector	1	JK201
...3	RJ2008HP-11F15A	2PIN RCA JACK	2	JK301,302
...3	RS000004J06	RESISTOR 0Ω 5% SMD 1206	1	R228
...3	RS000008J05	RESISTOR 0Ω 5% SMD 0805	1	R229
...3	RS000010J03	RESISTOR 0Ω 5% SMD 0603	35	R323,421,704,706~709,711,712,714,715,720~740,746~748
...3	RS001K10F03	RESISTOR 1K 1% SMD 0603	6	R321,322,325,327,419,420
...3	RS003310F03	RESISTOR 33Ω 1% SMD 0603	2	R417,418
...3	RS004710F03	RESISTOR 47Ω 1% SMD 0603	4	R742~745
...3	RS010010F03	RESISTOR 100Ω 1% SMD 0603	19	R301~304,319,320,324,326,401~404,601~605,705,719
...3	RS010K10F03	RESISTOR 10K 1% SMD 0603	5	R225,226,411,412,703
...3	RS01K510F03	RESISTOR 1.5K 1% SMD 0603	1	R716
...3	RS03K410F03	RESISTOR 3.4K 1% SMD 0603	2	R407,408
...3	RS03K910F03	RESISTOR 3.9K 1% SMD 0603	1	R713
...3	RS047K10F03	RESISTOR 47K 1% SMD 0603	16	R311,312,315~318,328~333,340,341,415,416
...3	RS04K310F03	RESISTOR 4.3K 1% SMD 0603	2	R307,308
...3	RS04K710F03	RESISTOR 4.7K 1% SMD 0603	6	R334,336,606,607,701,702
...3	RS100K10F03	RESISTOR 100K 1% SMD 0603	2	R405,406
...3	RS10K710F03	RESISTOR 10.7K 1% SMD 0603	4	R309,310,335,337
...3	RS18K210F03	RESISTOR 18.2K 1% SMD 0603	2	R409,410
...3	RS27R410F03	RESISTOR 27.4Ω 1% SMD 0603	2	R717,718
...3	RS3K2410F03	RESISTOR 3.24K 1% SMD 0603	4	R305,306,338,339
...3	RS560K10F03	RESISTOR 560K 1% SMD 0603	2	R501,502
...3	RS6K6510F03	RESISTOR 6.65K 1% SMD 0603	2	R413,414
...3	TE622000901	9P CONNECTOR	1	(TE301)
...3	TR2SA1036KRM	TRANSISTOR 2SA1036K PNP	1	Q501
...3	TR2SD2114KSM	TRANSISTOR 2SD2114K NPN	6	Q301,303~305,401,402
...3	VRR10302010	Poten tiometer Rotary Volume:1	2	VR101,102
...3	XTM06000X6	Crystal 6MHZ 49US SMD Fundamen	1	XTM1
..2	TWPC11C045C01	Front PCB Assembly	1	33

...3	AL2-71-0072	IC TL072CDR Low-Noise Jfet-Inp	1	U801
...3	CS101J5003NPO	CERAMIC 100pF/50V 5% 0603 NPO	4	C701,702,801,805
...3	CS104K5003X7R	CERAMIC 0.1uF/50V 10% 0603 X7	3	C802,806,807
...3	ECS10616B	Capacitor Electrolytic 10uF/16V	2	EC801,802
...3	JY6317-02-030	Earphone base W/NUT	1	JK701
...3	JY6317-02-130	MIC JACK	1	JK801
...3	RS000010J03	RESISTOR 0Ω 5% SMD 0603	1	R805
...3	RS010010F03	RESISTOR 100Ω 1% SMD 0603	2	R802,803
...3	RS51K110F03	RESISTOR 51.1K 1% SMD 0603	1	R801
...3	SWSV71030-01	SWITCH	1	SW801
...3	TE612000901	9P CONNECTOR	1	(TE801)
...3	VRR50303007	VR 50KA	1	VR801



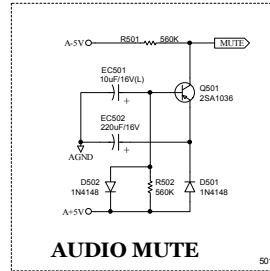
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Size A4	Number	Revision
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File Name:	Design By :	

Approval	Check	Design	REV	DATE	Description



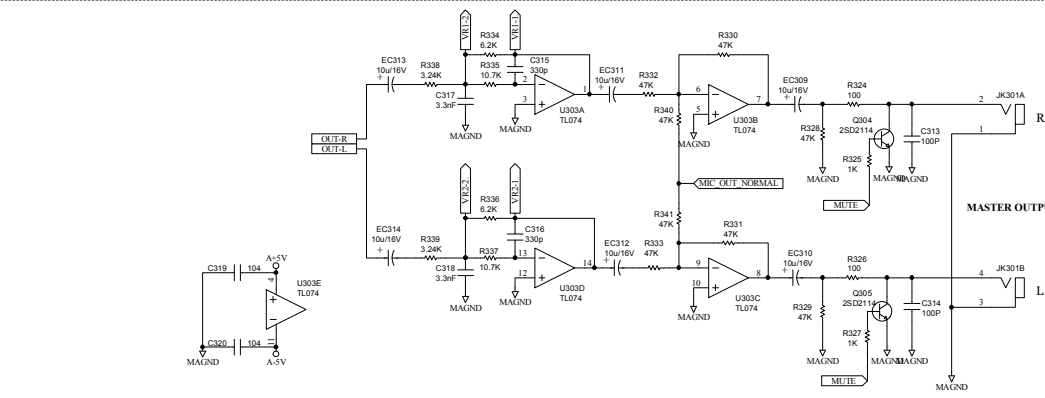
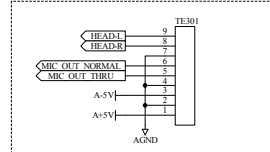
LINE OUTPUT AMP

301



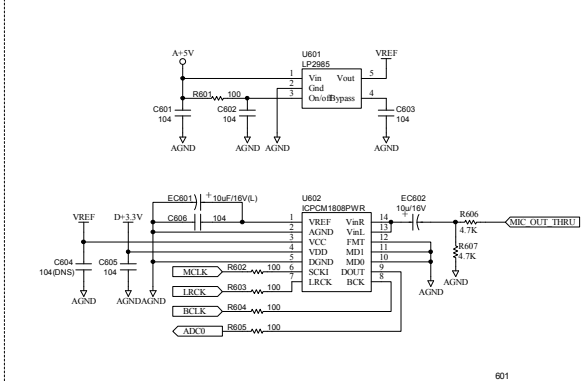
AUDIO MUTE

501

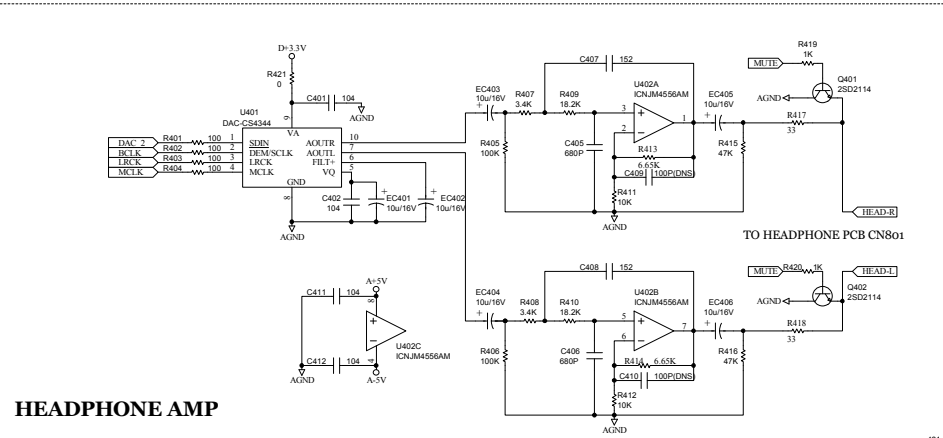


MASTER OUTPUTS

301



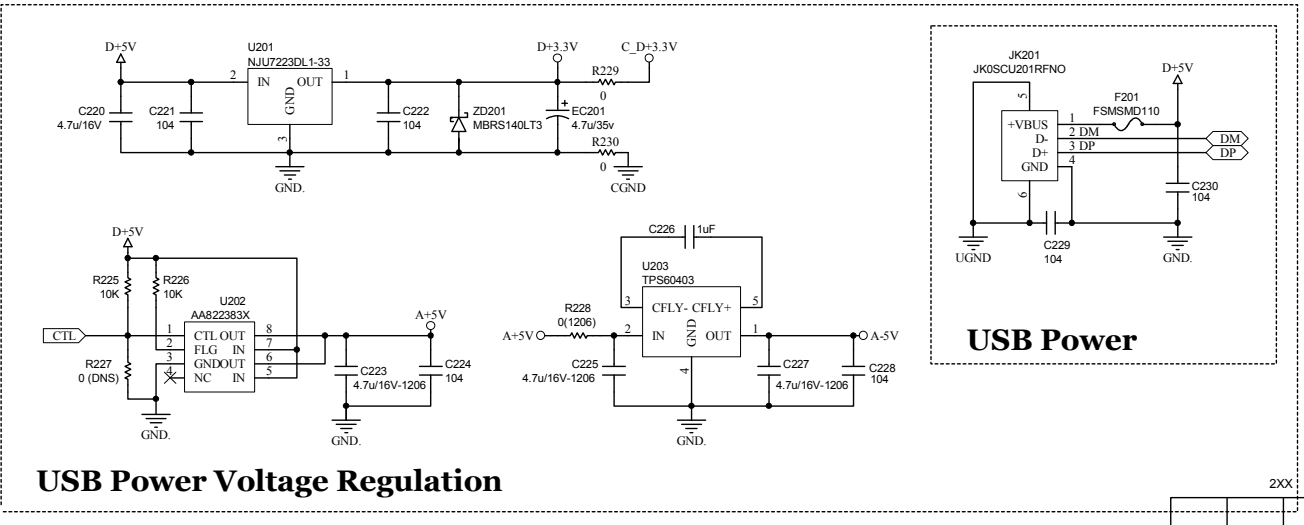
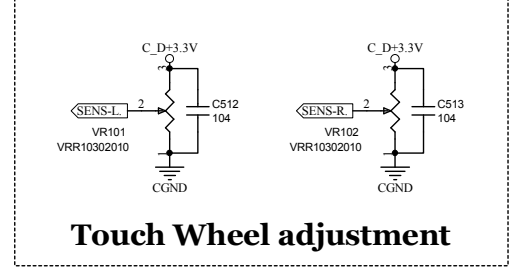
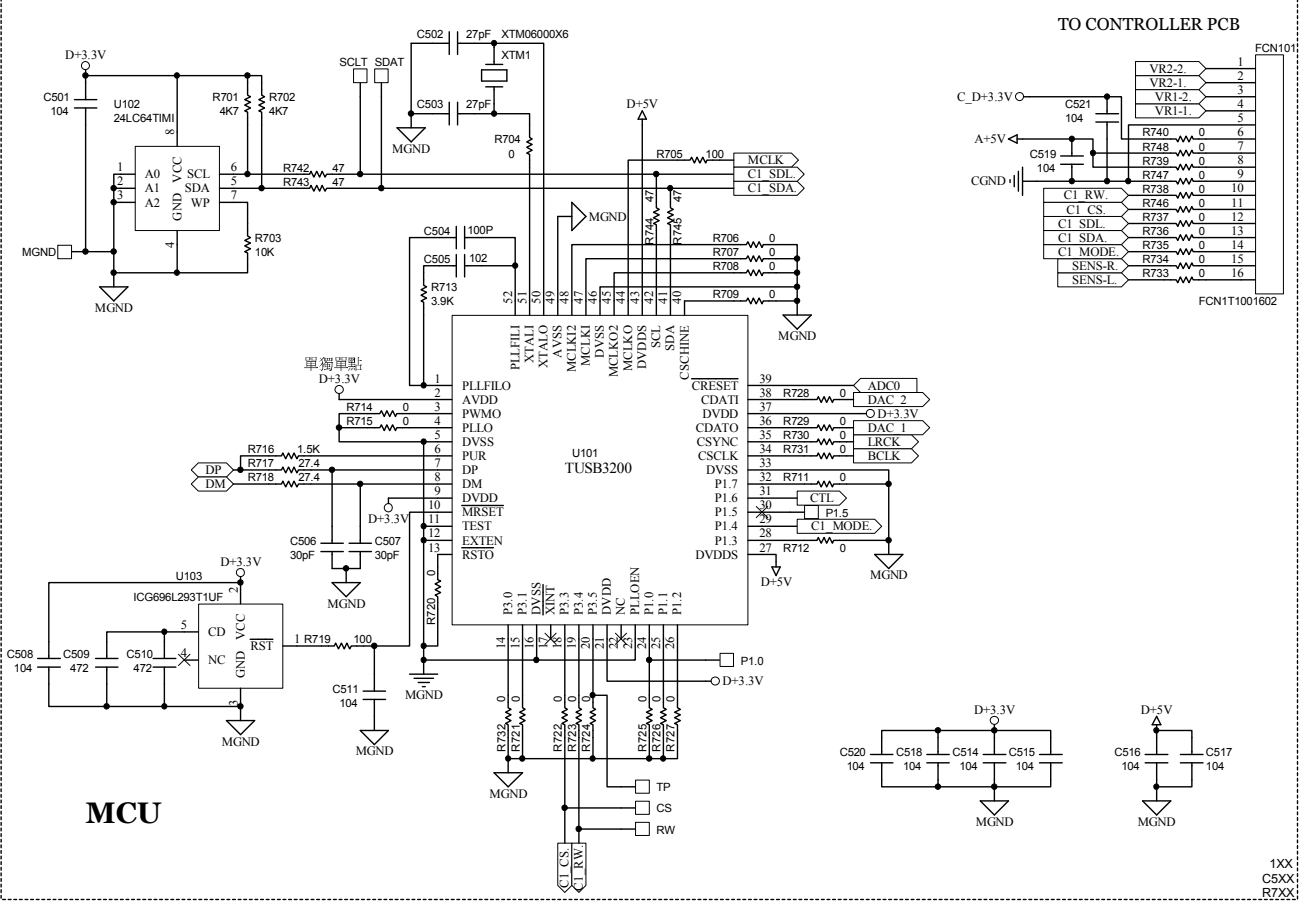
601



HEADPHONE AMP

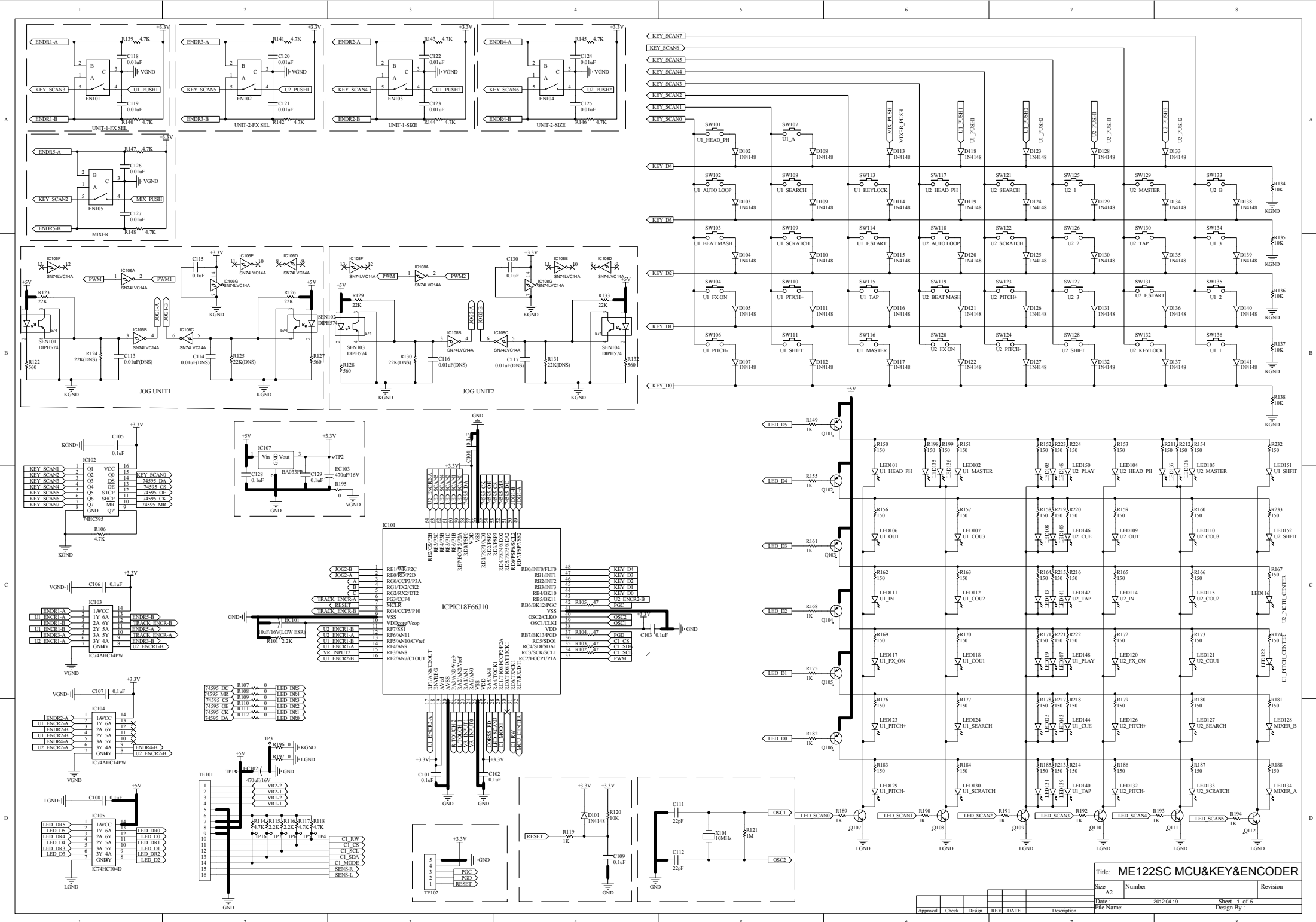
401

Title: ME122SC MAIN2		Revision
Size: A2	Number	
Date: 2012.04.19	Sheet: 4 of 5	Design By:
Approval	Check	Design
REV	DATE	Description



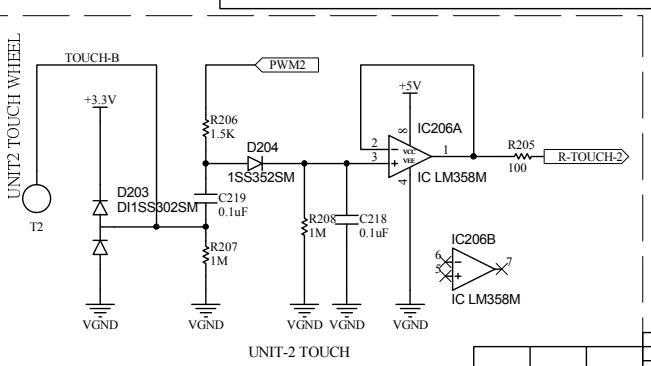
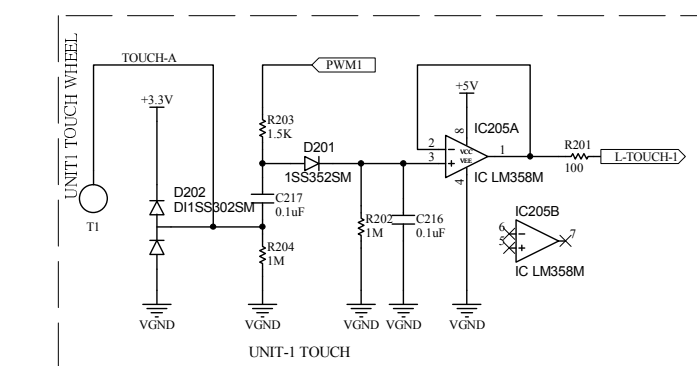
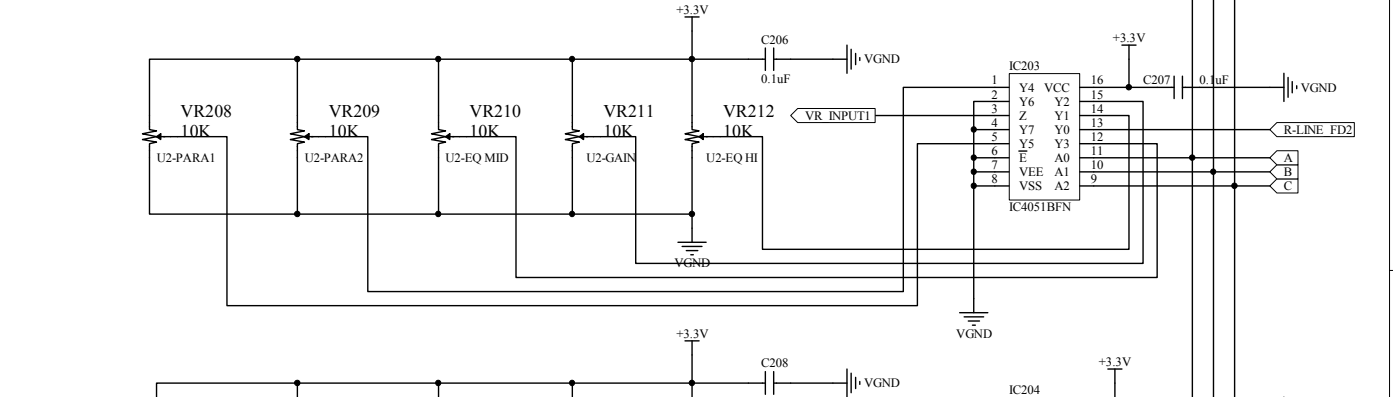
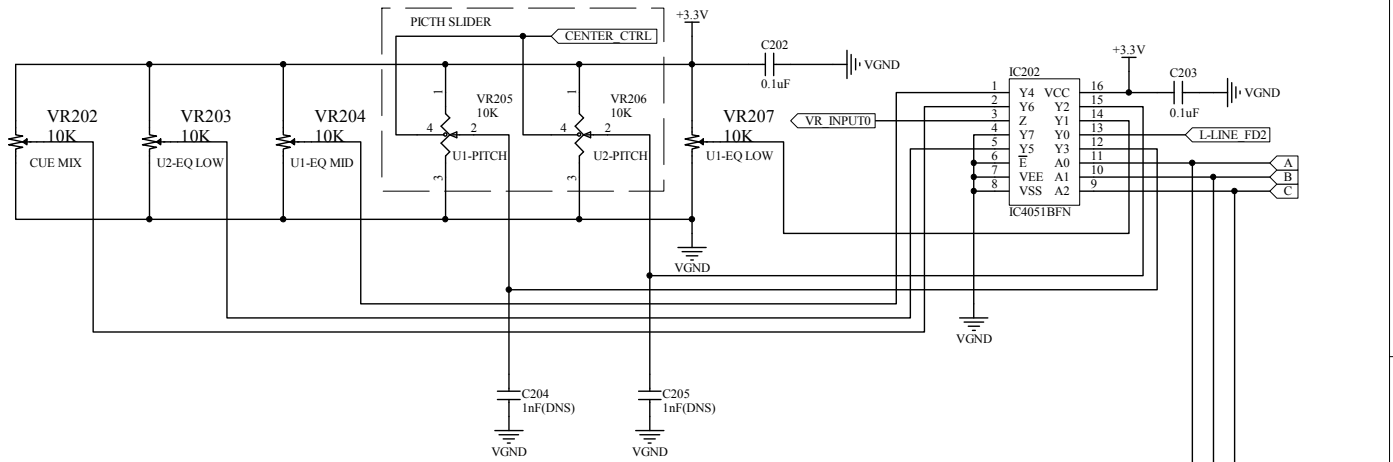
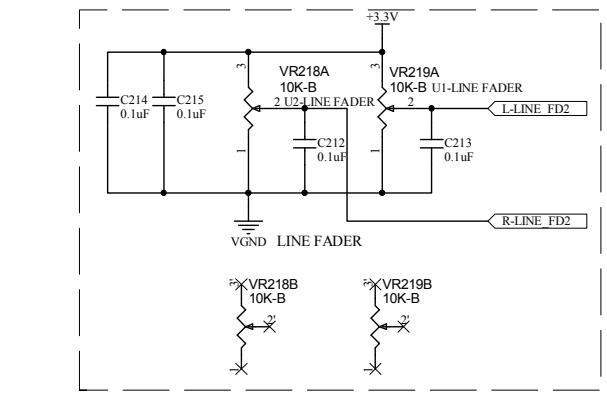
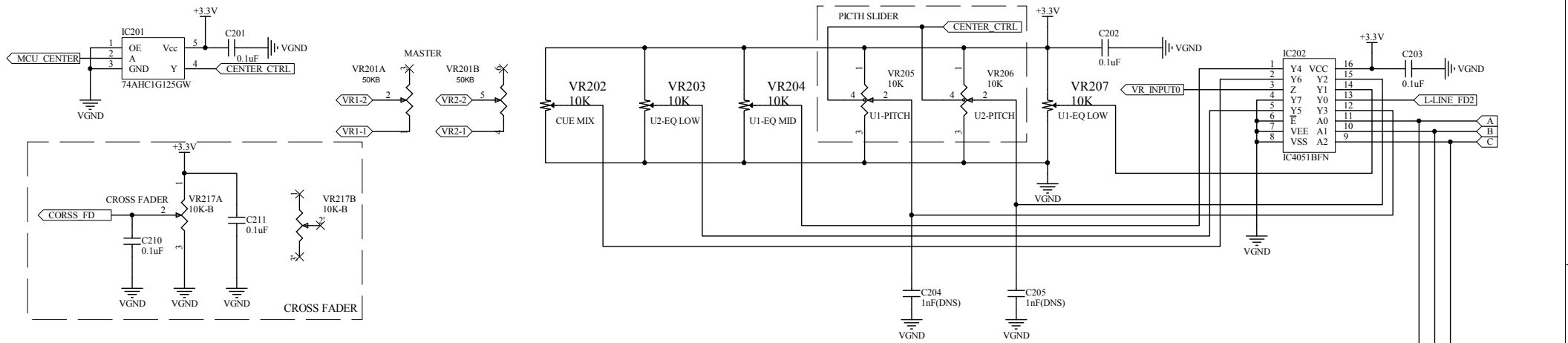
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File Name:			Design By:	

Approval	Check	Design	REV	DATE	Description
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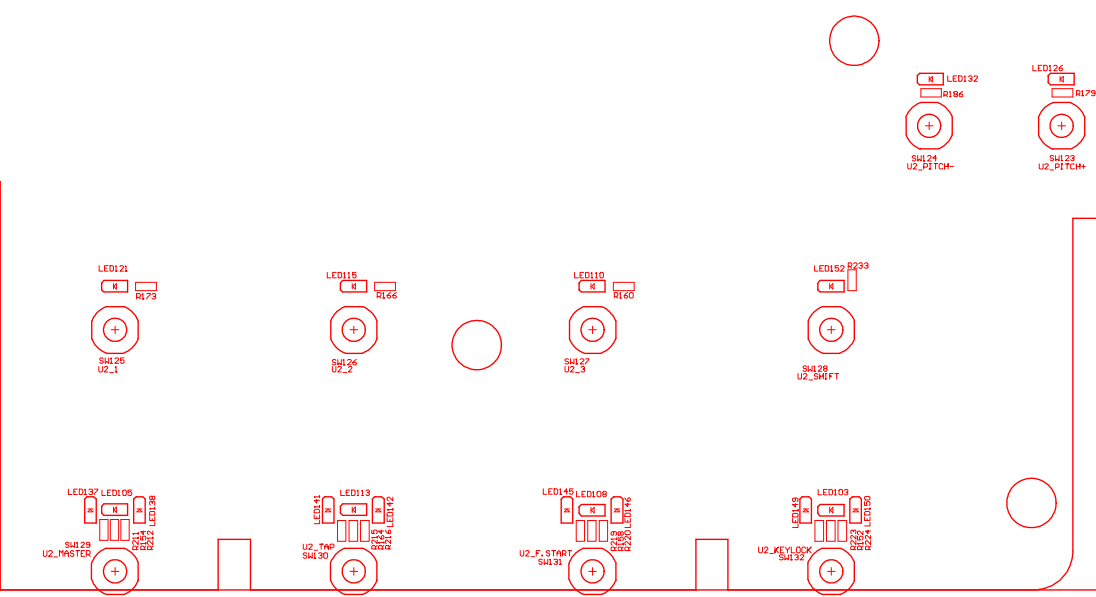
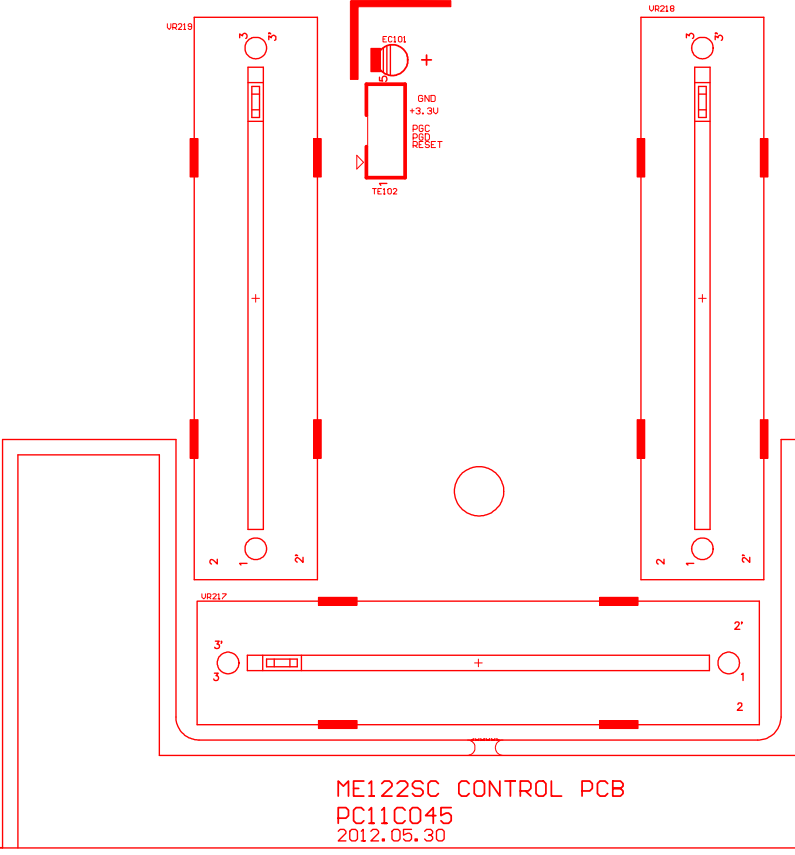
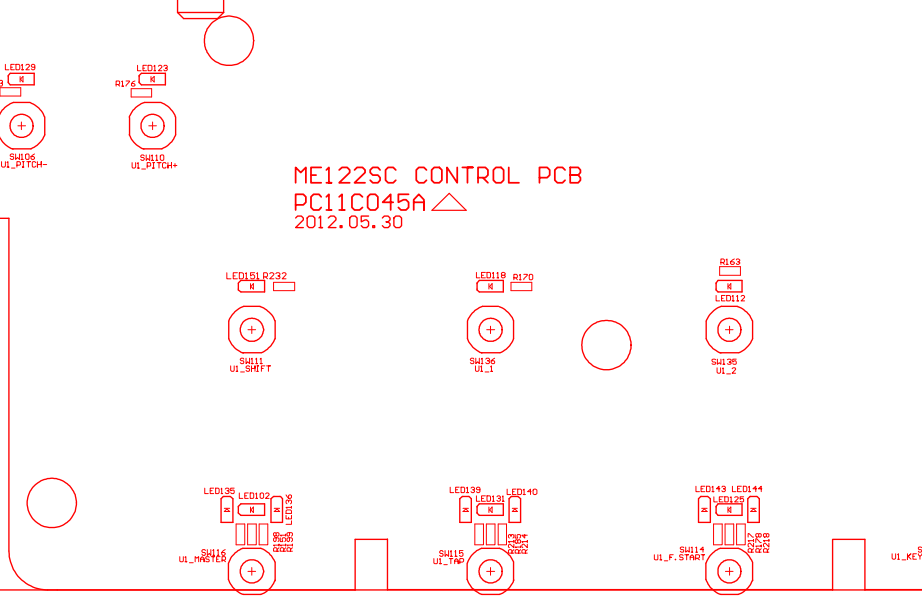
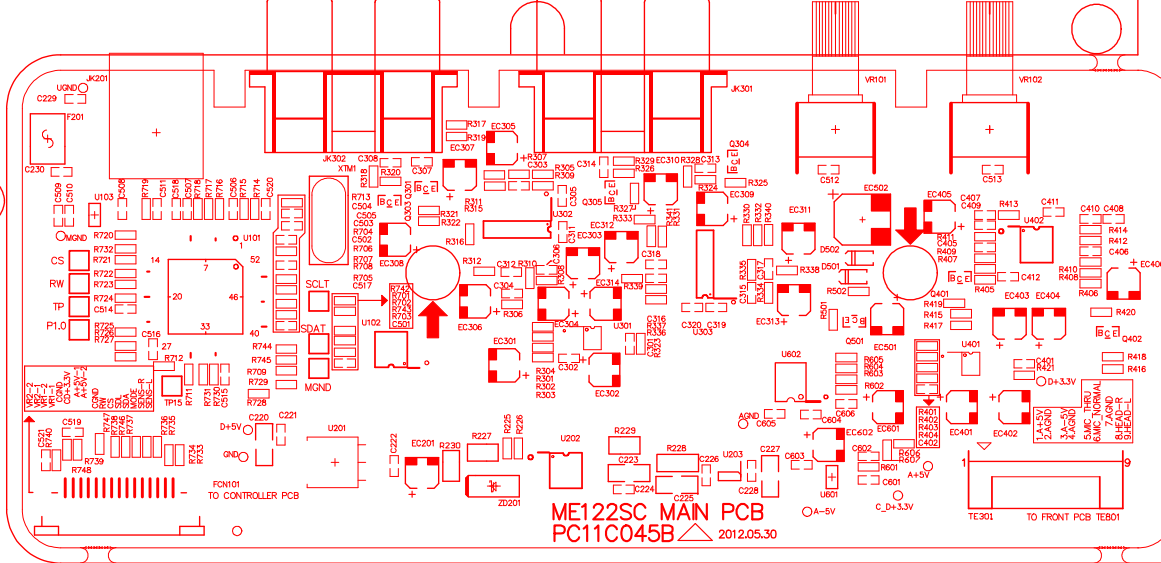
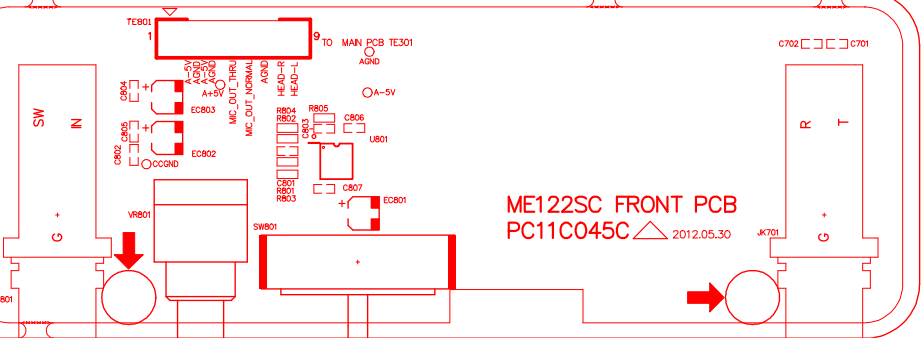
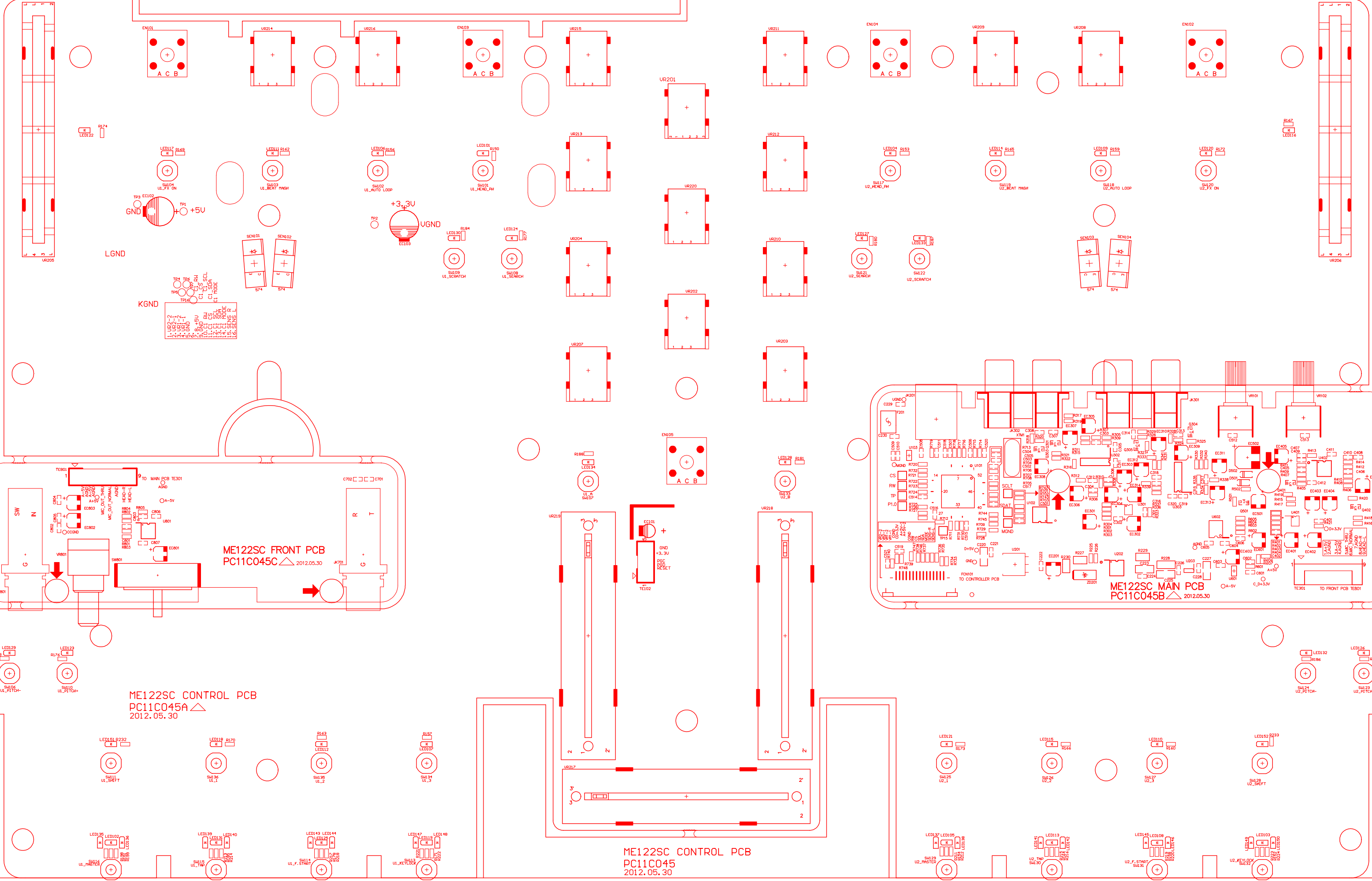
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 Size: A2 Number: Revision:
 Date: 2012.04.19 Sheet: 1 of 5
 File Name: Design By:

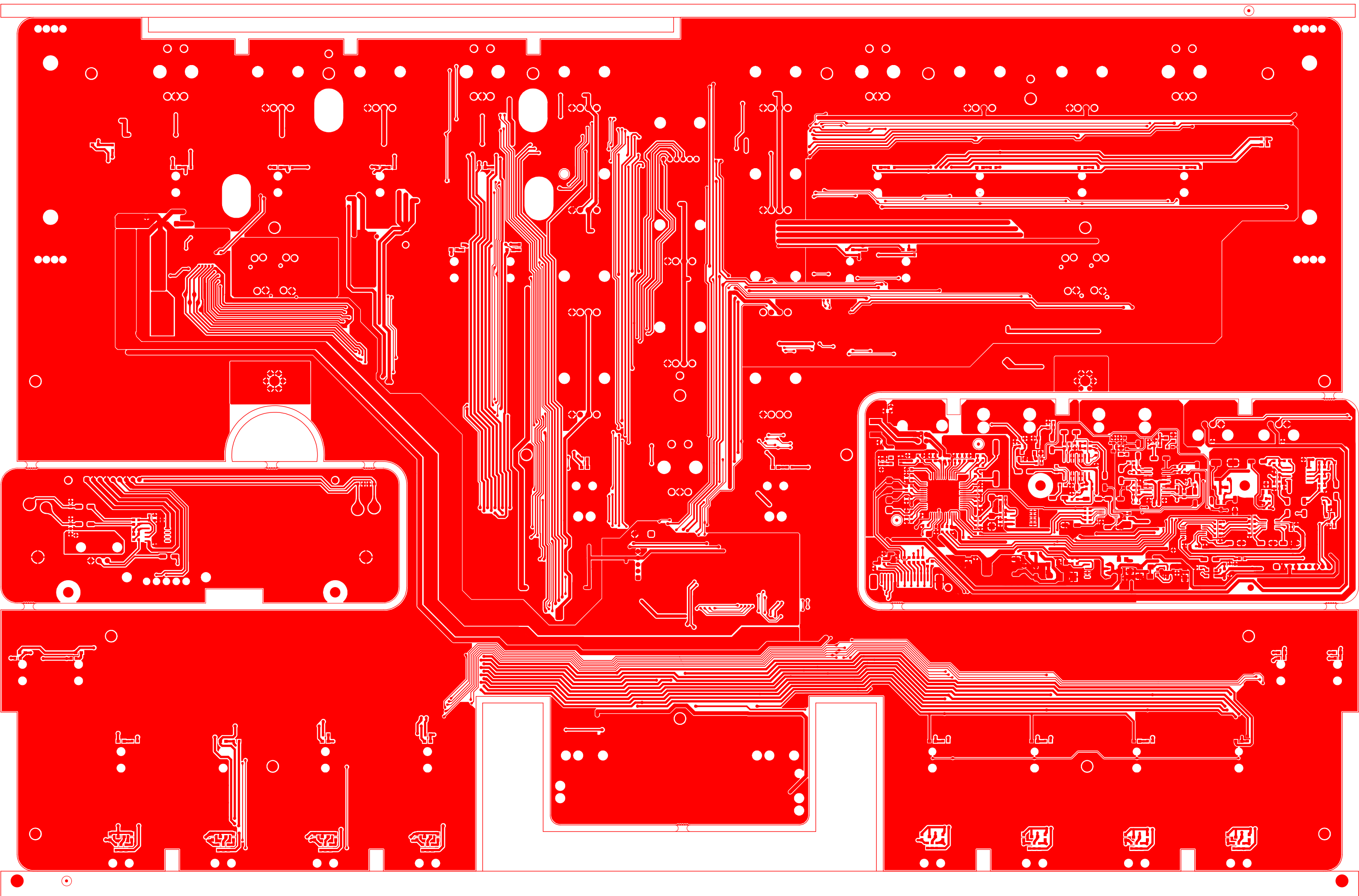
Approval	Check	Design	REV	DATE	Description

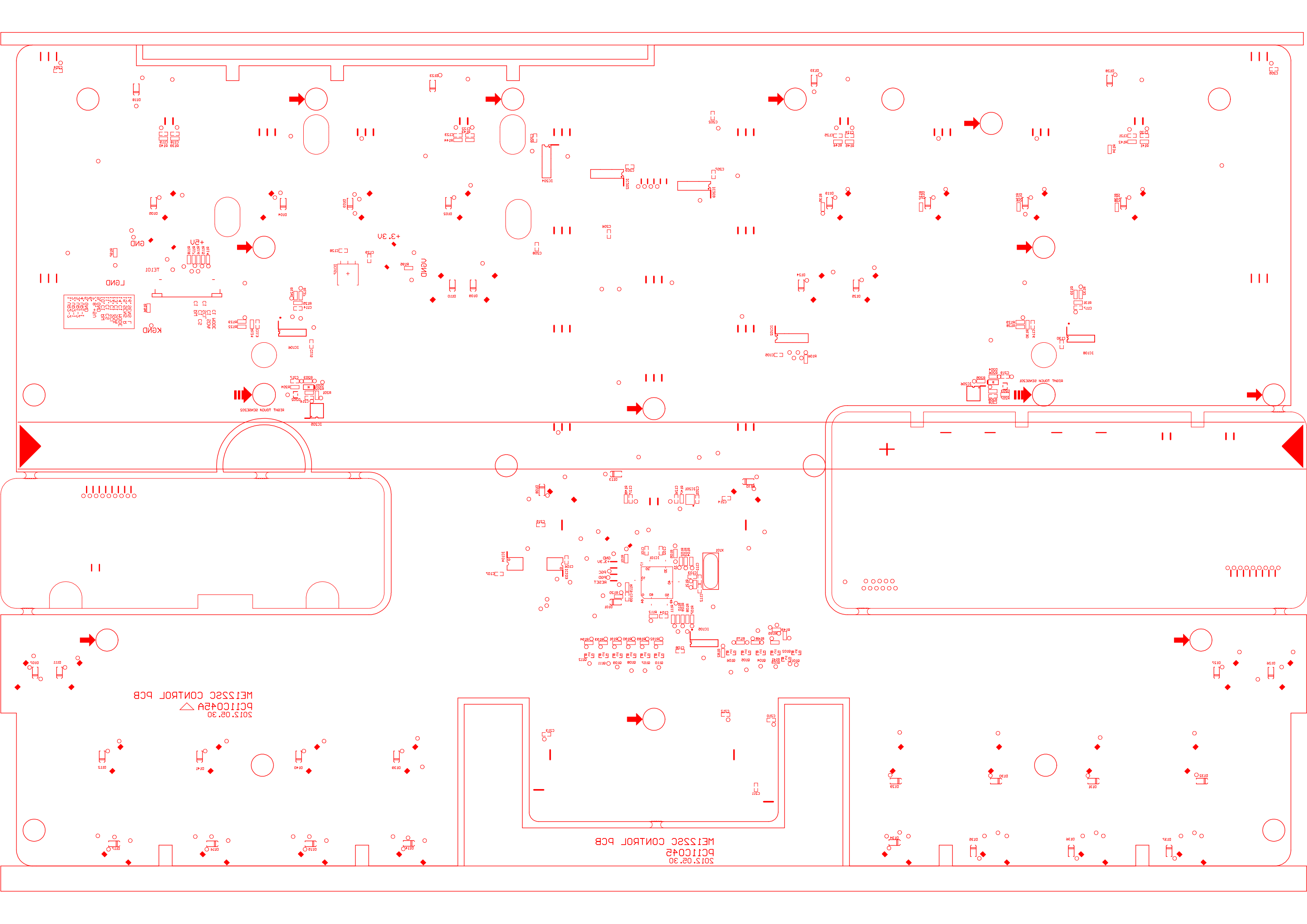


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Date: 2012.04.19	Sheet: 2 of 5	File Name:	Design By:	
Approval:	Check:	Design:	REV:	DATE:
Description:				

Approval:	Check:	Design:	REV:	DATE:	Description:
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CT1400C
CT1400D
CT1400A
CT1400B
CT1400E
CT1400F
CT1400G
CT1400H
CT1400I
CT1400J
CT1400K
CT1400L
CT1400M
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CT1400R
CT1400S
CT1400T
CT1400U
CT1400V
CT1400W
CT1400X
CT1400Y
CT1400Z

ME1333C CONTROL PCB
PC11C042A
S015.02.30

ME1333C CONTROL PCB
PC11C042B
S015.02.30

CT1400C
CT1400D
CT1400A
CT1400B
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CT1400F
CT1400G
CT1400H
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CT1400Q
CT1400R
CT1400S
CT1400T
CT1400U
CT1400V
CT1400W
CT1400X
CT1400Y
CT1400Z

RIGHT LATCH REVERSE
CT1400C
CT1400D
CT1400A
CT1400B
CT1400E
CT1400F
CT1400G
CT1400H
CT1400I
CT1400J
CT1400K
CT1400L
CT1400M
CT1400N
CT1400O
CT1400P
CT1400Q
CT1400R
CT1400S
CT1400T
CT1400U
CT1400V
CT1400W
CT1400X
CT1400Y
CT1400Z

LEFT
GND
KEND

+3.3V
GND

CT1400C
CT1400D
CT1400A
CT1400B
CT1400E
CT1400F
CT1400G
CT1400H
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