

SAFETY PRECAUTIONS

SERVICE WARNING

Only qualified service technicians who are familiar with safety checks and guidelines should perform service work. Before replacing parts, disconnect power source to protect electrostatically sensitive parts. Do not attempt to modify any circuit unless so recommended by the manufacturer. When servicing the receiver, use an isolation transformer between the line cord and power receptacle.

GENERAL GUIDELINES

Perform a final SAFETY CHECK before returning receiver to customer. Check repaired area for poorly soldered connections, and check entire circuit board for solder splashes. Check board wiring for pinched wires or wires contacting any high wattage resistors. Check that all control knobs, shields, covers, grounds, and mounting hardware have been replaced. Be sure to replace all insulators and restore proper lead dress.

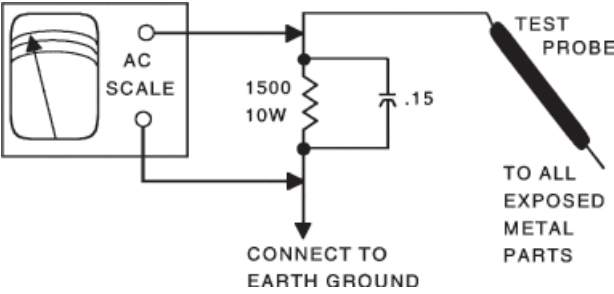
SAFETY CHECKS — FIRE AND SHOCK HAZARD

Cold Leakage Checks for Receivers with Isolated Ground

Unplug the AC cord, connect a jumper across the plug prongs, and turn the power switch on (if applicable). Use an ohmmeter to measure the resistance between the jumped AC plug and any exposed metal cabinet parts such as antenna screw heads, control shafts, or handle brackets. Exposed metal parts with a return path should measure between 1M ohms and 5.2M ohms. Parts without a return path must measure infinity.

Hot Leakage Current Check

Plug the AC cord directly into an AC outlet. DO NOT use an isolation transformer. Use a 1500 ohms, 10W resistor in parallel with a .15µF capacitor to connect between any exposed metal parts on the receiver and a good earth ground. (See figure below.) Use an AC voltmeter with at least 5000 ohms per volt sensitivity to measure the voltage across the resistor. Check all exposed metal parts and measure voltage at each point. Voltage measurements should not exceed .75VAC, 500µA. Any value exceeding this limit constitutes a potential shock hazard and must be corrected. If the AC plug is not polarized, reverse the AC plug and repeat exposed metal part voltage measurement at each point.



POWER CONSUMPTION

Power Consumption: 120VAC 60Hz  
Standby Power: <1W

Note: Use an appropriate sized Variac and/or Isolation Transformer during servicing.

The listing of any available replacement part herein in no case constitutes a recommendation, warranty, or guarantee by SAMS Technical Publishing, as to the quality and suitability of such replacement part. The numbers of the listed parts have been compiled from information furnished to SAMS Technical Publishing, by the manufacturers of the specific type of replacement part listed.

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QUICKFACT FROM PHOTOFACT<sup>®</sup> Technical Service Data  
LCD SERIES

SET 5583

MODEL L37WD12 (CHASSIS IFC130L)

RCA

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RCA  
MODEL L37WD12 (CHASSIS IFC130L)  
with JSK3220-007 POWER SUPPLY



Representative Model

Essential Coverage For Servicing

LCD Receivers...

- Component Locations
- Parts list
- Placement chart
- Power Supply Schematic

Coverage includes these additional models and chassis:

Model	Chassis
L37WD12YX1	IFC130L
L37WD12YX5	IFC130L



AUGUST 2010 SET 5583

Do not use lead based solder for repair.

For a Complete List of Manuals,  
Visit [www.samswebsite.com](http://www.samswebsite.com)

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MISCELLANEOUS ADJUSTMENTS

Entering Factory Service Menu

Turn the TV OFF, press the Volume down key on the remote and the Volume down key on the TV’s keyboard simultaneously for approximately 10 seconds until the TV turns ON. When the menu is displayed use the Up/Down keys on the remote to select an item and use the Left/Right keys to adjust values. Press the “Clear” key or select “Go Back” on the remote to exit the Factory Service Menu.

**Note:** Record original values before adjusting any values.

To Exit Factory Service Menu

Press the “Clear” key or select “Go Back” on the remote to exit the Factory Service Menu.

Video Adjustments

All Alignments require a Color TV Analyzer or DVD Color Alignment disk.  
Enter the Factory Service Menu.  
Select Video from the menu.  
Select one of the following sub menus for adjustments:  
Cut Off  
White Point  
Brightness  
Scaling Color  
Scaling Tint  
Peak White

**Note:** Record original values before adjusting any values.

Select any of the following Inputs and Video Standards to check or align.

RCA	NTSC
YprPb	SDTV (480i)
	HDTV (720p)
	HDTV (1080i)
VGA	VESA (DMT 1060p)
	HD VIDEO (720p)
HDMI	HDTV (720p)
FAV (CVBS)	SDTV (480i)

Text Contrast/Preset for Vid are preset at the Factory and no alignment is necessary.  
Audio/W218 1<sup>st</sup> Page/W218 2<sup>nd</sup> Page/SAA7117AE/PW2300 Menus are preset at the Factory.  
Other than the Factory Reset, no alignment is necessary.

To Exit Factory Service Menu

Press the “Clear” key on the remote.

Factory Reset

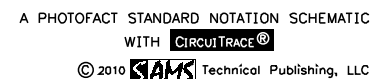
With the TV on, enter the Factory Service Menu.  
Select W218 1<sup>st</sup> Page from the menu then select Factory Reset.  
Press the Left or Right Arrow keys to activate Factory Reset.  
The screen will briefly go blank, than return to normal.  
All customer adjustments will be returned to a default setting and channel memory erased.

Exit: Press the “Clear” key on the remote.

SCHEMATIC COMPONENT LOCATION GUIDE									
B1	A12	CS32	B19	IC9	D21	R27	C12	RS18	E18
B4	D15	CS4	A21	IC10	E17	R28	B14	RS19	C21
BD1	A11	CS43	A19	IC11	D23	R29	A15	RS2	A17
C1	E9	CS44	C18	IC12	D18	R30	B10	RS20	E23
C2	C13	CS45	B19	IC17	C23	R31	A15	RS21	E21
C3	A14	CS55	B17	IP610	B2	R32	E9	RS22	E21
C4	C14	CS7	B19	IP620	E3	R33	E10	RS23	E22
C5	A15	CS8	B19	IP630	D2	R34	C10	RS24	E22
C17	B10	CS9	B20	L2	A11	R35	C10	RS25	E23
C18	B9	CX1	A10	LF1	A10	R36	C10	RS26	E24
C19	C11	CX3	A10	LF2	A10	R37	B10	RS27	C24
C20	C10	CX4	A11	LP600	A2	R38	C10	RS28	D24
C21	B10	CY1	C15	LP610	A5	R39	B11	RS29	C24
C22	B11	CY4	E19	LS1	A18	R40	D10	RS3	A20
C23	D10	D1	A12	LS2	A19	R41	D10	RS30	C20
C24	D9	D2	C12	LS3	B18	R42	C11	RS31	C20
C25	D10	D3	C12	LS4	C18	R43	B11	RS32	E20
C26	D12	D4	A13	LS6	B19	R44	A15	RS33	E21
C27	D11	D5	D14	LS9	C21	R45	C11	RS34	C24
C28	D11	D6	B15	P1	A1	R46	C11	RS35	C24
C31	E10	D7	B14	Q1	E12	R52	A9	RS37	E20
C32	D17	D17	C17	Q2	B13	R53	D13	RS38	E21
C33	C18	D23	C19	Q3	B11	R54	E11	RS4	A20
C36	D18	D24	E12	Q4	A14	R55	E11	RS43	D23
C40	C9	D28	D14	Q5	C11	R56	E10	RS44	E21
C44	D19	D29	D19	Q6	B11	R57	B10	RS45	D22
C48	B9	D30	D19	Q7	C13	R58	E10	RS46	E22
CP602	A3	D36	C12	Q8	C11	R59	E9	RS47	D22
CP610	A4	D37	D12	Q9	D11	R60	D17	RS53	C22
CP611	B3	DP601	B2	Q10	D14	R64	C18	RS54	C22
CP612	A3	DP611	A3	Q11	B14	R65	C18	RS55	D23
CP613	C3	DP612	A3	Q12	E9	R66	C18	RS57	C21
CP614	E1	DP613	A3	Q13	C19	R67	E16	RS58	C23
CP615	D2	DP614	A3	Q14	D14	R68	E16	RS60	D22
CP616	A6	DP615	B4	QS1	E23	R72	E10	RS61	B18
CP617	B5	DP616	A5	QS2	C24	R73	D18	RS65	A20
CP618	E3	DP617	C3	QS3	D24	R75	D18	RS67	A20
CS1	A17	DS10	C23	R1	E9	R76	D19	RS68	A20
CS10	E18	DS11	D23	R2	B9	R77	D19	RS77	B17
CS11	E18	DS12	C20	R3	B10	R78	A15	RS78	B17
CS13	E24	DS15	D23	R4	B9	R80	D18	RS82	B19
CS14	E22	DS16	D22	R5	E9	R81	D12	RS83	C19
CS15	C24	DS17	B21	R6	B9	R82	D9	RS84	B19
CS16	C19	DS18	A21	R7	B10	R87	D13	RS85	C19
CS17	B19	DS2	A17	R8	B9	R88	C11	RS87	C18
CS18	D24	DS23	E21	R9	A10	R89	C11	RS89	C20
CS19	C22	DS3	B17	R10	A10	RP601	B1	RS90	D22
CS2	A19	DS4	A17	R11	B9	RP602	B1	SP600	A2
CS20	C22	DS5	B17	R12	B10	RP611	A4	SP600	B2
CS21	C22	DS6	C19	R13	B9	RP612	C2	T1	A16
CS21	C22	DS7	C19	R14	B9	RP613	C3	T2	C19
CS22	D22	DS8	B20	R15	A10	RP614	D1	T3	C13
CS22	D22	DS9	B19	R16	B9	RP615	D3	THR1	B11
CS23	D22	F1	A9	R17	E13	RP616	D3	TP601	B1
CS24	D22	F2	E12	R18	B11	RP617	D4	TVSZ4	C19
CS25	C20	FP610	A2	R19	E13	RP618	E4	TVSZ6	B10
CS26	C21	IC1	B10	R21	B11	RS1	A17	Z1	B11
CS27	C21	IC2	E14	R22	C13	RS10	B20	Z2	D12
CS28	C21	IC3	E17	R23	C12	RS11	B20	Z3	E10
CS29	E20	IC4	D20	R24	C12	RS12	E18	ZNR1	A9
CS3	A19	IC6	E20	R25	C13	RS14	C21	ZS2	B21
CS30	D22	IC8	C22	R26	C12	RS17	E18	ZS3	A21
CS31	D22								

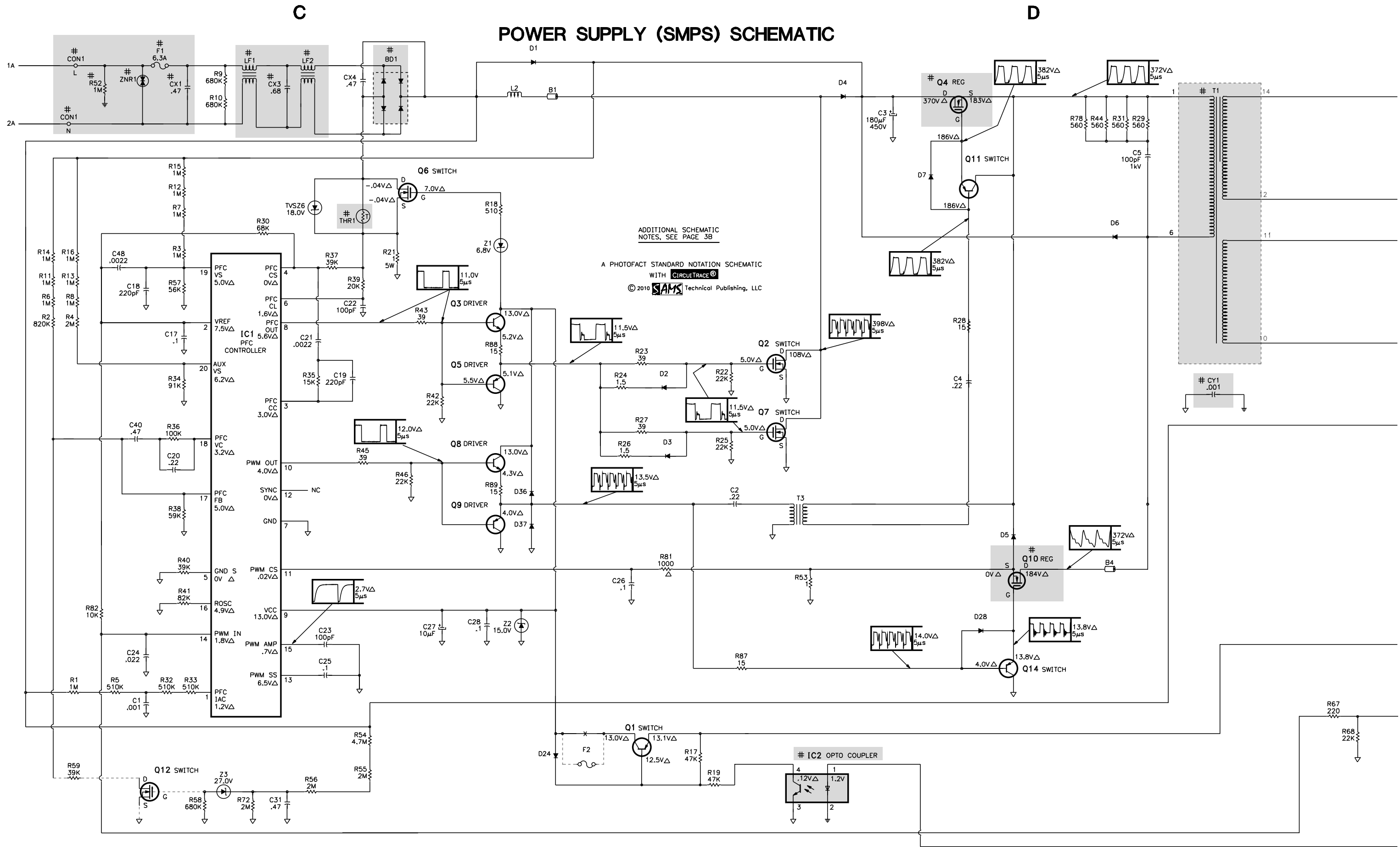
**A**

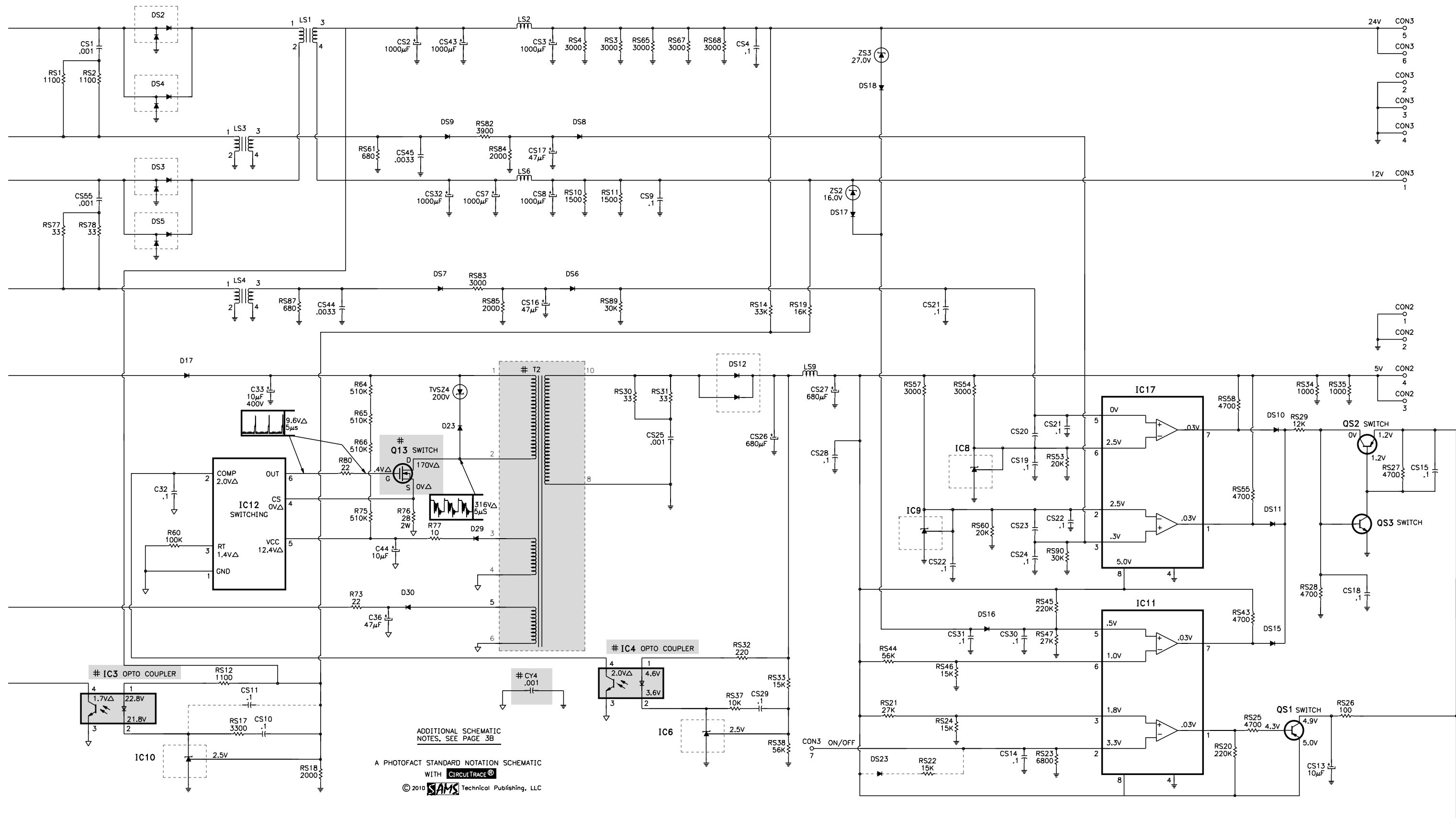
## E



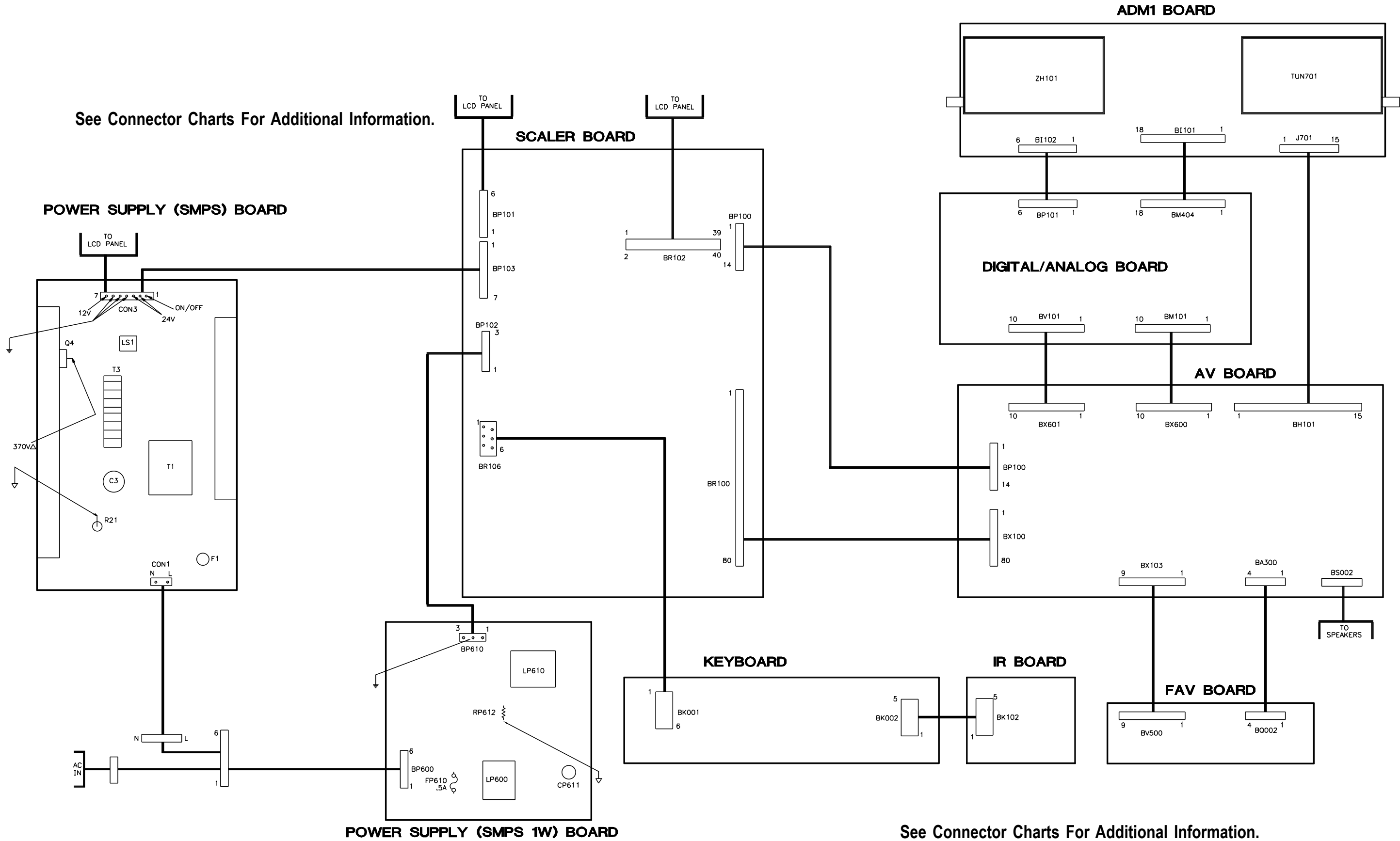
# For SAFETY use only equivalent replacement part,  
see parts list,

- ✗ Circuitry not used in some versions.
- Circuitry used in some versions.
- ⏏ Ground
- ⏏ Chassis ground
- ▽ Common tie point
- △ Taken from common tie point
- 3 Schematic **CIRCUITRACE®** Voltage source tie point.
- A — Cabling: Heavy lines reduce use of multiple lines.  
Waveforms and voltages are taken from ground, unless otherwise noted.  
Waveforms taken with triggered scope and colorbar signal.  
Waveform voltage is peak to peak, Timebase is per division, Waveforms shown at 10 divisions.  
Supply voltages maintained as seen at input.  
Voltages measured with digital meter and a 100Q $\mu$ V RF signal, with colorbar pattern applied to antenna terminal.  
Controls adjusted for normal operation.  
Capacitors are 50 volts or less, 5% or greater unless noted.  
Capacitor values are in microfarads unless noted.  
Electrolytic capacitors are 50 volts or less, 20% or greater unless noted.  
Resistors are less than 1W, 5% or greater unless noted.  
Value in ( ) used in some versions.  
Measurements with switching as shown unless noted.  
Rated voltage shown on zener diodes.





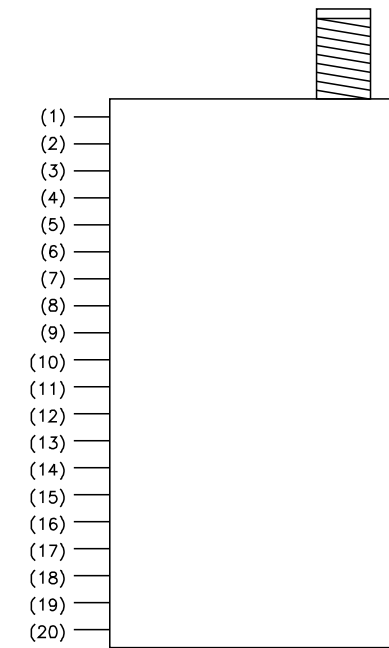
BOARD PLACEMENT CHART



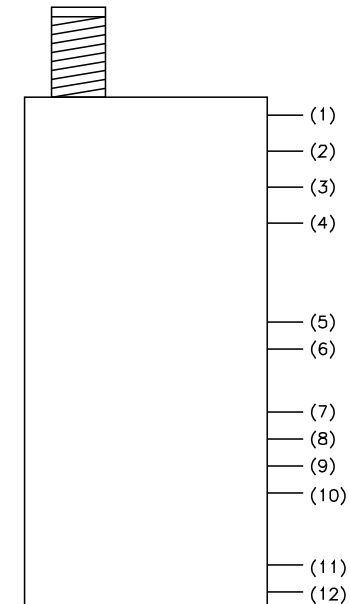
RCA  
MODEL L37WD12 (CHASSIS IFC130L)

## TUNER INFORMATION

## TUN701 Terminal Guide



PIN	Description	Voltage
1	RF-AGC	2.5V
2	BC	NC
3	5V	5.0V
4	VT	-
5	SDA	3.3V
6	SCL	3.3V
7	5V	NC
8	IF OUT	1.9V
9	NC	-
10	IF AGC	2.5V
11	IF1	1.0V
12	IF2	1.0V



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CONNECTOR VOLTAGE CHART

ADM1 BOARD

DIGITAL/ANALOG BOARD

BI101						BI102		
PIN	PIN ID	Voltage	PIN	PIN ID	Voltage	PIN	PIN ID	Voltage
1	GND	0V	10	SCL SYS	3.3V	1	3.3VP	3.2V
2	LINK RESET#	3.2V	11	GND	0V	2	GND	0V
3	GND	0V	12	LINK VALID	3.1V	3	5VR	5.0V
4	I2C TUN ON	0V	13	GND	0V	4	GND	0V
5	GND	0V	14	LINK SYNC	0V	5	1.8VR	1.8V
6	LINK INT#	3.2V	15	GND	0V	6	GND	0V
7	GND	0V	16	LINK DATA	1.5V			
8	SDA SYS	3.3V	17	GND	0V			
9	GND	0V	18	LINK CLK	1.5V			

BP101			BM101		
PIN	PIN ID	Voltage	PIN	PIN ID	Voltage
1	3.3VP	3.2V	1	I2C1 CLK	3.3V
2	GND	0V	2	I2C1 DATA	3.3V
3	5VR	5.0V	3	GND	0V
4	GND	0V	4	RESET	3.3V
5	1.8VR	1.8V	5	NC	0V
6	GND	0V			

J701					
PIN	PIN ID	Voltage	PIN	PIN ID	Voltage
1	GND	0V	6	GND	0V
2	NC	0V	7	GND	0V
3	NC	0V	8	SIF	4.2V
4	ASCL SYS	3.2V	9	AUDIO	2.1V
5	ASDA SYS	3.2V	10	GND	0V

BM404			BV101		
PIN	PIN ID	Voltage	PIN	PIN ID	Voltage
1	GND	0V	10	SCL SYS	3.3V
2	LINK RESET#	3.2V	11	GND	0V
3	GND	0V	12	LINK VALID	3.1V
4	I2C TUN ON	0V	13	GND	0V
5	GND	0V	14	LINK SYNC	0V
6	LINK INT#	3.2V	15	GND	0V
7	GND	0V	16	LINK DATA	1.5V
8	SDA SYS	3.3V	17	GND	0V
9	GND	0V	18	LINK CLK	1.5V

AV BOARD

IR BOARD

KEY BOARD

BH101			BP100			BS002		
PIN	PIN ID	Voltage	PIN	PIN ID	Voltage	PIN	PIN ID	Voltage
1	GND	0V	1	24V	23.9V	1	L SPEAKER OUT	11.8V
2	NC	0V	2	24V	23.9V	2	L SPEAKER OUT	11.8V
3	NC	0V	3	GND	0V	3	GND	0V
4	ASCL SYS	3.2V	4	24V	23.9V	4	GND	0V
5	ASDA SYS	3.2V	5	GND	0V	5	R SPEAKER OUT	11.8V
6	GND	0V	6	GND	0V	6	R SPEAKER OUT	11.8V
7	GND	0V	7	12V UA	11.8V			
8	SIF	4.2V	8	12V UA	11.8V			
9	AUDIO	2.1V	9	12V UA	11.8V			
10	GND	0V	10	GND	0V			
11	NC	0V	11	GND	0V			
12	24V	23.9V	12	GND	0V			
13	CVBS	5.0V	13	6.5V	6.4V			
14	GND	0V	14	12V	11.8V			
15	6.5V	6.4V						

BK102			BK002			BK001		
PIN	PIN ID	Voltage	PIN	PIN ID	Voltage	PIN	PIN ID	Voltage
1	GND	0V	1	GND	0V	1	6.5V	6.1V
2	REMOTE	4.7V	2	REMOTE	4.7V	2	R LED	3.3V
3	5V	4.9V	3	5V	4.9V	3	GND	0V
4	G LED	2.4V	4	G LED	2.4V	4	R	4.4V
5	R LED	0.6V	5	R LED	0.6V	5	5V STBY	4.9V
						6	TV KEY/ON	2.0V

FAV BOARD

BX103			BX601			BX600		
PIN	PIN ID	Voltage	PIN	PIN ID	Voltage	PIN	PIN ID	Voltage
1	GND	0V	1	Y/CV	0V	1	I2C1 CLK	3.3V
2	R IN FCB	0V	2	GND	0V	2	I2C1 DATA	3.3V
3	L IN FCB	0V	3	PR/C	0V	3	GND	0V
4	GND	0V	4	GND	0V	4	RESET	3.3V
5	NC	0V	5	PB	0V	5	NC	0V
6	FCB CHROMA IN	0V	6	GND	0V	6	GND	0V
7	GND	0V	7	GND	0V	7	GND	0V
8	NC	0V	8	L IN ADM1	0V	8	12V	12.0V
9	FCB CVBS/Y IN	0V	9	GND	0V	9	12V	12.0V
			10	R INADM1	0V	10	NC	0V

BV500			BQ002		
PIN	PIN ID	Voltage	PIN	PIN ID	Voltage
1	GND	0V	6	FCB CHROMA IN	0V
2	R IN FCB	0V	7	GND	0V
3	L IN FCB	0V	8	NC	0V
4	GND	0V	9	FCB CVBS/Y IN	0V
5	NC	0V			

See Placement Chart for connector locations.

See Placement Chart for connector locations.

RCA

MODEL L37WD12 (CHASSIS IFC130L)



## CONNECTOR VOLTAGE CHART Continued

## POWER SUPPLY(SMPS) BOARD

CON1			CON3		
PIN	PIN ID	Voltage	PIN	PIN ID	Voltage
1	L	AC IN	1	12V	11.9V
2	N	AC IN	2	GND	0V
			3	GND	0V
			4	GND	0V
			5	24V	23.9V
			6	24V	23.9V
			7	DC OUTPUT ON/OFF	3.3V

## POWER SUPPLY (SMPS 1W) BOARD

BP610			BP600		
PIN	PIN ID	Voltage	PIN	PIN ID	Voltage
1	5V STBY	4.9V	1	AC 3	AC IN
2	GND	0V	2	AC 3	AC IN
3	RELAY ON/OFF	3.3V	3	NC	0V
			4	AC 4	AC OUT
			5	NC	0V
			6	AC 4	AC OUT

## SCALER BOARD

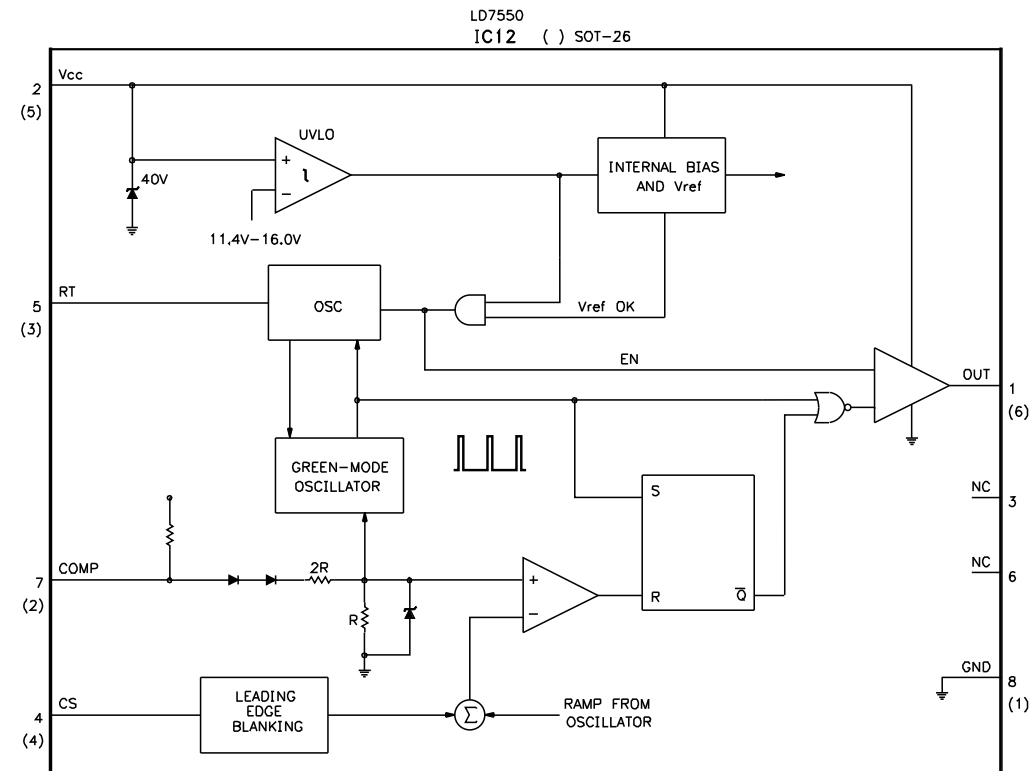
BP101			BP103			BR106			BR100								
PIN	PIN ID	Voltage	PIN	PIN ID	Voltage	PIN	PIN ID	Voltage	PIN	PIN ID	Voltage	PIN	PIN ID	Voltage	PIN	PIN ID	Voltage
1	V ON OFF/VS ON	3.3V	1	12V	11.9V	1	6.5V	6.1V	1	I2C0 DATA	3.2V	28	GND	0V	55	NC	0V
2	VBRI/ACD	2.7V	2	GND	0V	2	R LED	3.3V	2	I2C0 CLK	3.2V	29	AV3/F CHROMA IN	0V	56	GND	0V
3	GND	0V	3	NC	0V	3	GND	0V	3	I2C1 DATA	2.7V	30	YC SEL CTRL2	3.2V	57	CVBS AV2 OUT2	1.1V
4	NC	0V	4	GND	0V	4	IR	4.4V	4	I2C1 CLK	2.7V	31	AV3/F CHROMA IN	0V	58	GND	0V
5	NC	0V	5	NC	0V	5	5V STBY	4.9V	5	I2C2 DATA	3.2V	32	YC SEL CTRL1	0V	59	AV2 CVBS/Y IN	0V
6	NC	0V	6	24V	23.9V	6	TV KEY/ON	2.0V	6	I2C2 CLK	3.2V	33	Y AV IN	0V	60	GND	0V
			7	DC SUPPLY ON/OFF	3.3V				7	PCMDATA0	0V	34	CVBSIN AV3 CTRL	0V	61	AV1 BLUE	0V
									8	LRCLK	0V	35	C AV IN	0V	62	GND	0V
									9	LINE O/P L	0V	36	CVBSOUT AV2 CTRL	0V	63	AV1 PIN8 IN	0V
									10	BCLK	0V	37	SL TUNER CVBS	0V	64	GND	0V
									11	GND	0V	38	GND	0V	65	AV1 GREEN	0V
									12	LINE O/P R	0V	39	GND	0V	66	GND	0V
									13	DVI L IN	0V	40	GND	0V	67	AV1 RED/C IN	0V
									14	GND	0V	41	MA TUNER CVBS	0.8V	68	GND	0V
									15	DVD R IN	0V	42	GND	0V	69	AV1 PIN16	0V
									16	MASTER MUTE	0V	43	YC DVD SEL CTRL	0V	70	GND	0V
									17	CR L IN	0V	44	GND	0V	71	NC	0V
									18	RESETAUDIO	3.2V	45	AV2 BLUE	0V	72	GND	0V
									19	CRR IN	0V	46	GND	0V	73	AV1 CVBS/Y IN	0V
									20	AUDIO STBY	0V	47	AV2 PIN8 IN	0.06V	74	GND	0V
									21	GND	0V	48	GND	0V	75	CVBSOUT AV1 CTRL	0V
									22	GND	0V	49	AV2 GREEN	0V	76	GND	0V
									23	VGA L IN	0V	50	GND	0V	77	COMPL IN	0V
									24	GND	0V	51	AV2 RED/C IN	0V	78	GND	0V
									25	VGA R IN	0V	52	GND	0V	79	COMPR IN	0V
									26	GND	0V	53	AV2 PIN16	0V	80	GND	0V
									27	GND	0V	54	GND	0V			

BR102			BP102			BP100		
PIN	PIN ID	Voltage	PIN	PIN ID	Voltage	PIN	PIN ID	Voltage
1	GND	0V	21	TXB2+	0.02V	1	5V STBY	4.9V
2	TXA0-	1.2V	22	GND	0V	2	GND	0V
3	TXA0+	1.1V	23	GND	0V	3	RELAY ON/OFF	3.3V
4	TXA1-	1.2V	24	TXB3-	0.04V			
5	TXA1+	1.1V	25	TXBC+	0.02V		BP100	
6	TXA2-	1.1V	26	GND	0V	PIN	PIN ID	Voltage
7	TXA2+	1.2V	27	TXB3+	0.02V	1	24V	23.9V
8	GND	0V	28	TXBC-	0.04V	2	24V	23.9V
9	GND	0V	29	VCC PANEL	5.1V	3	GND	0V
10	TXAC-	1.1V	30	VCC PANEL	5.1V	4	24V	23.9V
11	TXA3+	1.2V	31	TEMP SEL	5.1V	5	GND	0V
12	TXA3-	1.2V	32	VCC PANEL	5.1V	6	GND	0V
13	TXAC+	1.1V	33	TEMP SEL	5.1V	7	12V UA	11.8V
14	GND	0V	34	VCC PANEL	5.1V	8	12V UA	11.8V
15	GND	0V	35	GND	0V	9	12V UA	11.8V
16	TXB0-	0.05V	36	GND	0V	10	GND	0V
17	TXB0+	0.02V	37	DDSEL2	0V	11	GND	0V
18	TXB1-	0.04V	38	DDSEL1	3.2V	12	GND	0V
19	TXB1+	0.02V	39	I2C2 CLK	0V	13	6.5V	6.4V
20	TXB2-	0.04V	40	I2C2 DATA	0V	14	12V	11.8V

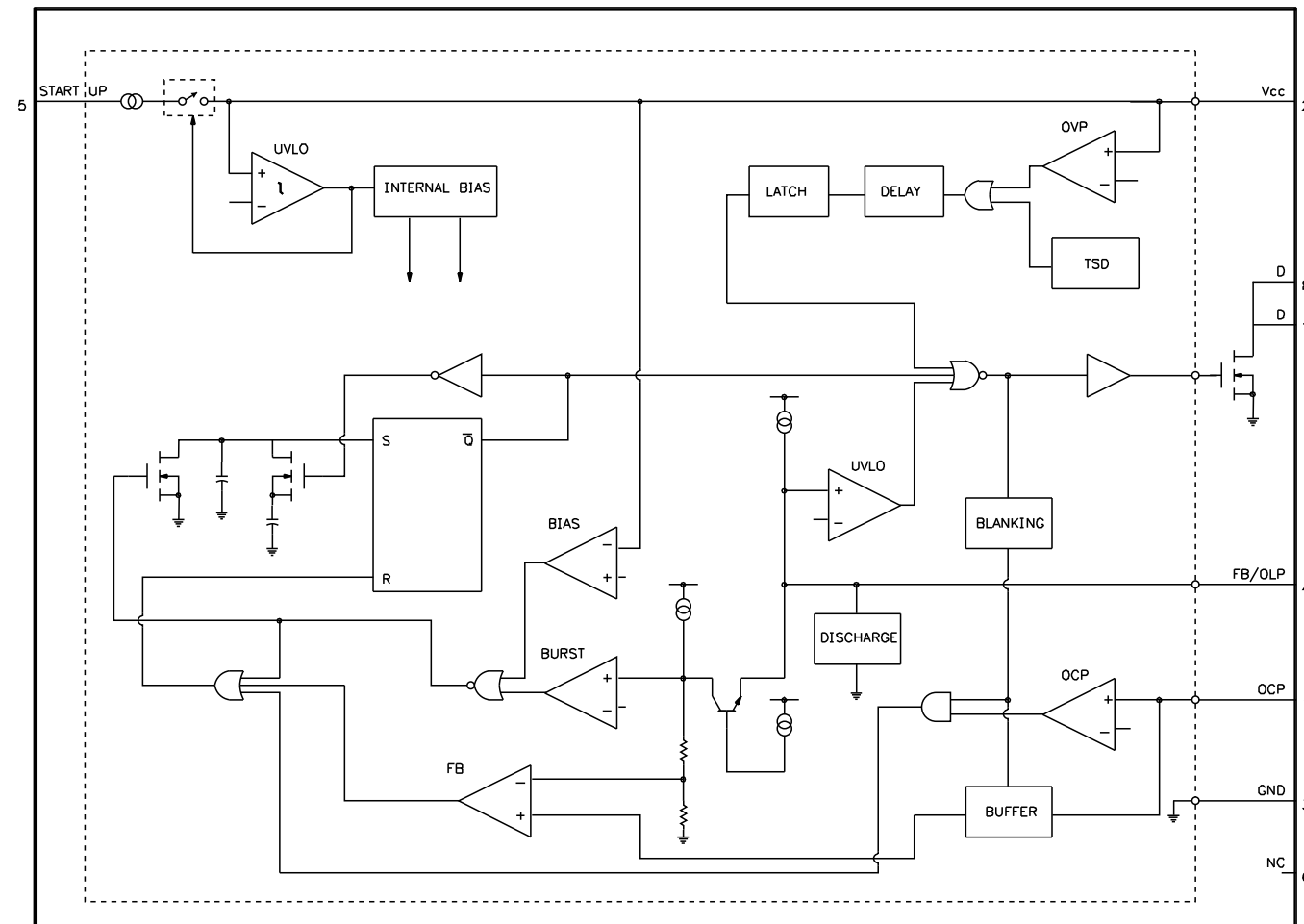
**See Placement Chart for connector locations.**

**See Placement Chart for connector locations.**

## IC FUNCTIONS



STR-A6159  
IP610



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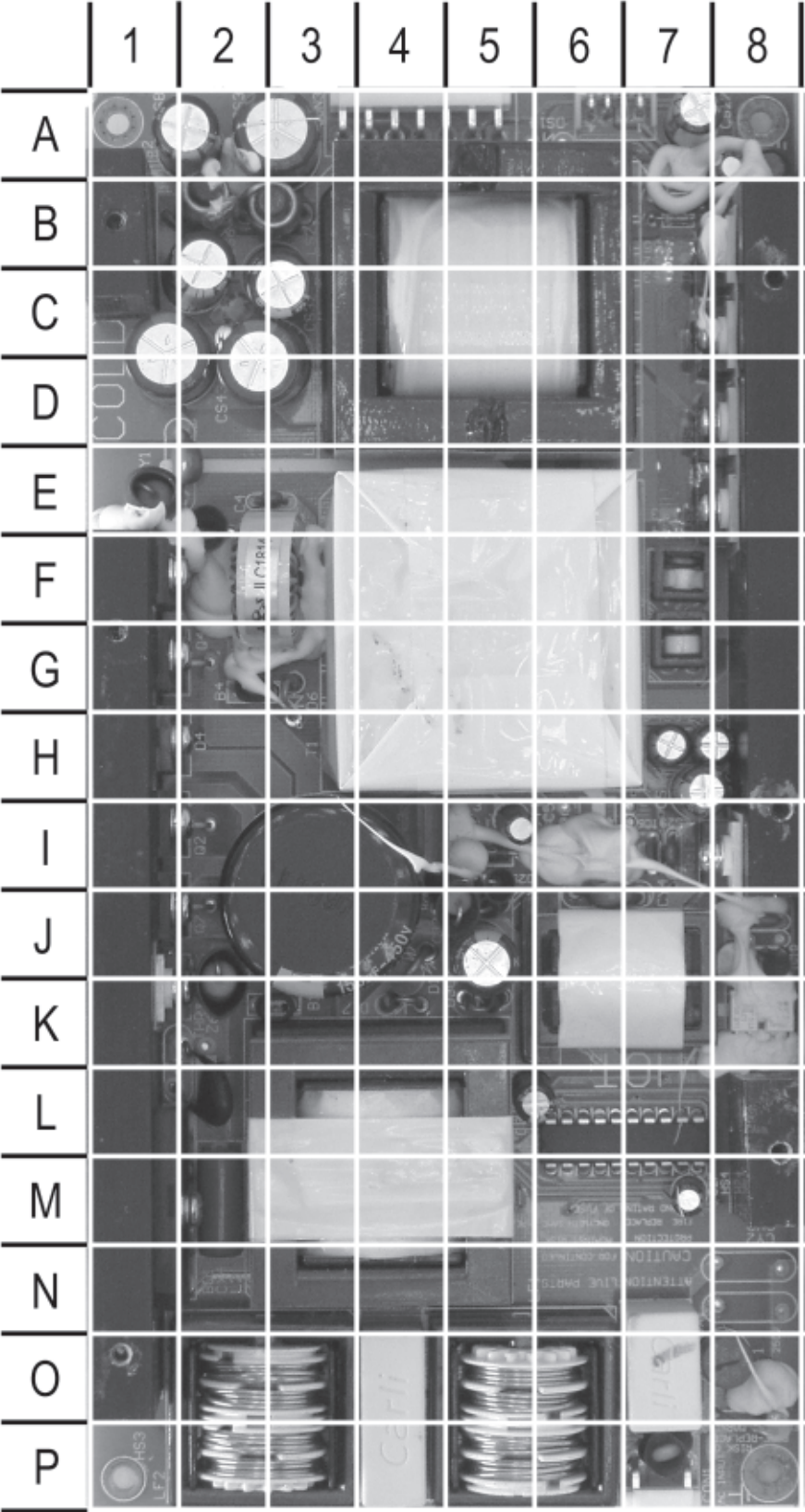
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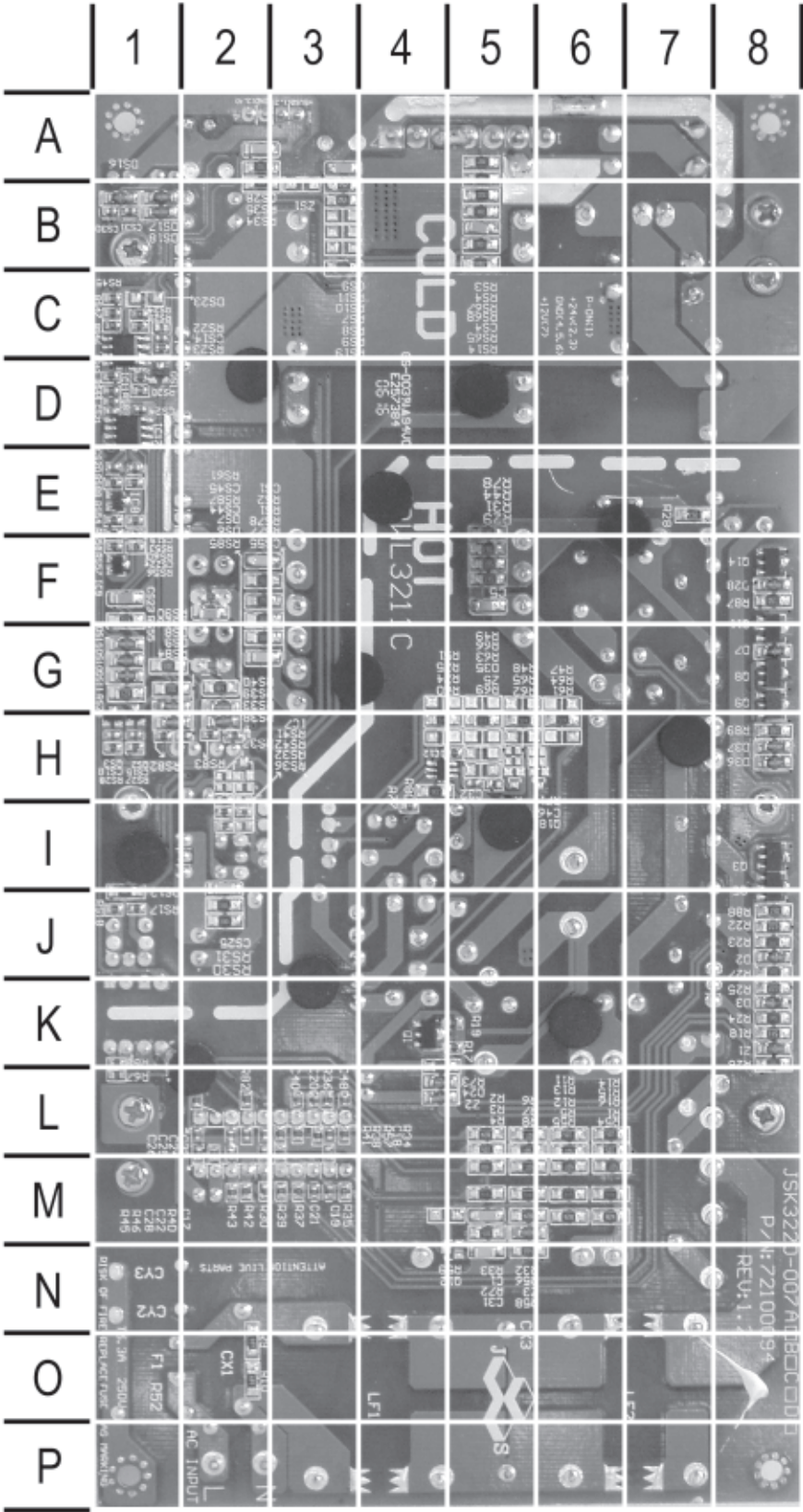
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POWER SUPPLY (SMPS) BOARD TOP



TOP GRIDTRACE LOCATION GUIDE							
B1	K3	CS29	I7	DS2	E8	LS9	A8
B4	G2	CS3	A3	DS3	C8	Q2	I1
BD1	M1	CS32	C3	DS4	D8	Q4	G1
C2	G2	CS43	D1	DS5	B8	Q6	K1
C3	J3	CS7	C2	F1	O8	Q7	J1
C4	E2	CS8	A2	F2		Q10	F1
C27	M7	CX1	O7	IC1	L6	Q13	I4
C33	J5	CX3	P4	IC2	K8	R21	K2
C36	L5	CX4	M2	IC3	K8	R52	O8
C44	I5	CY1	E2	IC4	I6	R53	E1
CON1	P7	CY4	J6	IC6	I7	R76	J5
CON2	A6	D1	J4	IC10	I8	T1	G5
CON3	A3	D4	H1	L2	M4	T2	K6
CS10	J8	D5	E2	LF1	P5	T3	F2
CS13	A8	D6	G3	LF2	P2	THR1	L2
CS16	H7	D17	K4	LS1	C5	Z4	J5
CS17	H7	D23	I5	LS2	B3	ZNR1	P7
CS2	D2	D29	I5	LS3	F7	ZS2	B7
CS26	H7	D30	K5	LS4	G7	ZS3	B7
CS27	A7	DS12	I8	LS6	B2		

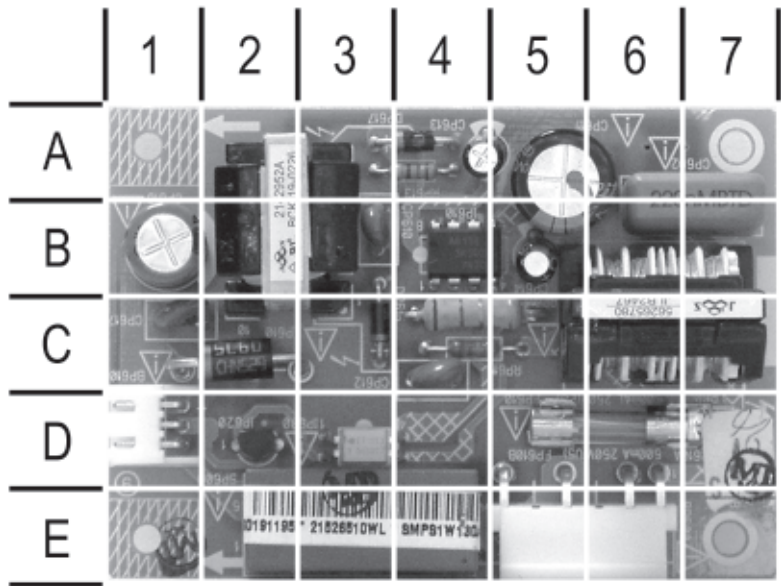
POWER SUPPLY (SMPS) BOARD BOTTOM



BOTTOM, GRIDTRACE LOCATION GUIDE									
C1	M5	D28	F8	R13	L6	R66	H5	RS37	I2
C5	F5	D36	H8	R14	L6	R67	L1	RS38	I2
C17	L3	D37	H9	R15	L6	R68	K1	RS4	A5
C18	L3	DS10	G1	R16	M6	R72	M5	RS43	D1
C19	M3	DS11	G1	R17	K5	R73	L5	RS44	D2
C20	L3	DS15	G1	R18	K8	R75	H4	RS45	C1
C21	M3	DS16	B1	R19	K5	R77	I4	RS46	C1
C22	L2	DS17	B1	R22	J8	R78	E5	RS47	C1
C23	L2	DS18	B1	R23	J8	R80	I4	RS53	E1
C24	L2	DS6	H2	R24	K8	R81	L2	RS54	E1
C25	L2	DS7	G2	R25	K8	R82	L2	RS55	G1
C26	L2	DS8	G1	R26	K8	R87	F8	RS57	F1
C28	L2	DS9	H1	R27	J8	R88	J8	RS58	F1
C31	N5	IC8	E1	R28	E7	R89	H8	RS60	F1
C32	H5	IC9	F1	R29	E5	RS1	F2	RS61	F2
C40	L3	IC11	C1	R30	M2	RS10	B3	RS65	B5
C48	L3	IC12	H4	R31	F5	RS11	B3	RS67	B5
CS1	F2	IC17	D1	R32	M5	RS12	J1	RS68	B5
CS14	C1	Q1	K4	R33	M5	RS14	B5	RS77	G2
CS15	H1	Q3	I8	R34	L3	RS17	J1	RS78	F2
CS18	H1	Q5	I8	R35	M3	RS18	J1	RS82	H1
CS19	E1	Q8	G8	R36	L3	RS19	B3	RS83	H2
CS20	E1	Q9	G8	R37	M3	RS2	F2	RS84	H2
CS21	D1	Q11	G8	R38	L3	RS20	D1	RS85	H2
CS22	E1	Q14	F8	R39	M3	RS21	C1	RS87	G2
CS23	F1	Q81	D1	R40	L3	RS22	C1	RS89	D1
CS24	D1	Q82	H1	R41	L3	RS23	C1	RS90	G1
CS25	I2	Q83	H2	R42	M2	RS24	C1	Z1	K8
CS28	A2	R1	M6	R43	M2	RS25	D1	Z2	L4
CS30	B1	R2	L5	R44	F5	RS26	G1	Z3	M5
CS31	B1	R3	L5	R45	L2	RS27	H1		
CS4	B5	R4	M5	R46	L2	RS28	H1		
CS44	G2	R5	M6	R54	M6	RS29	G1		
CS45	F2	R6	L5	R55	M6	RS3	A5		
CS55	G2	R7	L5	R56	M5	RS30	J2		
CS9	A3	R8	M5	R57	L3	RS31	J2		
D2	J8	R9	O2	R58	N5	RS32	I2		
D3	K8	R10	O2	R60	H5	RS33	I2		
D7	G8	R11	L6	R64	H6	RS34	B2		
D24	L4	R12	M6	R65	H5	RS35	A2		



POWER SUPPLY (SMPS 1W) BOARD



POWER SUPPLY ( SMPS 1W) GRIDTRACE LOCATION GUIDE							
BP600	E5	CP617	C1	FP610	D6	RP613	A4
BP610	D1	CP618 *	D3	IP610	B4	RP614 *	B5
CP602	A7	DP601 *	E3	IP620	D2	RP615 *	E2
CP610	B3	DP611 *	A7	IP630	D3	RP616 *	D2
CP611	A5	DP612 *	B6	LP600	C6	RP617 *	E2
CP612	C4	DP613 *	A6	LP610	B2	RP618 *	E2
CP613	A4	DP614 *	A6	RP601 *	D2	SP600	E3
CP614	B5	DP615	C3	RP602 *	D2	TP601 *	D2
CP615 *	B4	DP616	C2	RP611	C4		
CP616	B1	DP617	A4	RP612	C4		

\* located on other side of board.

Important Parts Information

- Parts not listed in the parts list are commonly available at your local electronics parts retailer.
- The parts listed here are those not usually available from a well-stocked supply cabinet or bin.
- On the parts lists, safety items are marked with a # to remind you that only exact replacements are recommended for these items.
- When ordering parts, state the model number, part number, and description.



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MODEL L37WD12 (CHASSIS IFC130L)

PARTS LIST

Item No.	Type No.	Mfr. Part No.	Notes
# <b>BD1</b>	D15XB60	-	Bridge Rectifier
D1	1N5406	-	-
D2, 3	1N4148	-	-
D4	1806	-	-
D5, 6	BYV26C	-	-
D7	1N4148	-	-
D17	UF4007	-	Ultra Fast Rectifier
D23	UF4007	-	Ultra Fast Rectifier
D24	1N4148	-	-
D28	1N4148	-	-
D29, 30	DIN4937	-	-
D36, 37	1N4148	-	-
DP601	1N4148W	-	-
# <b>DP611, 12, 13, 14</b>	FS1MI	-	Marking Code: R7
DP615	FUF4005	-	-
DP616	SR560	-	-
DP617	RGP15G	-	-
DS2	20150CT	-	Dual Diode
DS3	2010DN	-	Dual Diode
DS4	20150CT	-	Dual Diode
DS5	2010DN	-	Dual Diode
DS6, 7, 8, 9	1N4148	-	-
DS10, 11	1N4148	-	-
DS12	MBR10100CT	-	Dual Diode
DS15, 16, 17, 18	1N4148	-	-
DS23	1N4148	-	-
IC1	TDA16888	-	-
# <b>IC2, 3, 4</b>	PC817C	-	-
IC6	KA431AZ	-	-
IC8, 9	AS431M	-	-
IC10	KA431AZ	-	-
IC11	LM393	-	-
IC12	LD7550B	-	-
IC17	LM393	-	-
IP610	STR-A6159	-	-
# <b>IP620</b>	TL431	-	-
# <b>IP630</b>	TCET1103G	-	-
Q1	2SB1132	-	-
Q2	13N50C	-	MOS-FET
Q3	2SD1664	-	-
# <b>Q4</b>	13N50C	-	MOS-FET
Q5	2SB1132	-	-
Q6	RF3205	-	MOS-FET
Q7	13N50C	-	MOS-FET
Q8	2SD1664	-	-
Q9	2SB1132	-	-
# <b>Q10</b>	13N50C	-	MOS-FET
Q11	2SB1132	-	-
Q12	-	-	MOS-FET
# <b>Q13</b>	8N60C	-	MOS-FET
Q14	2SB1132	-	-
QS1	BT3906	-	-
QS2	BT3906	-	-
QS3	BT3904	-	-
TP601	BC848B	-	-
Z1	6.8V 1/2W	-	-
Z2	15V 1/2W	-	-
Z3	27V 1/2W	-	-
Z4	P6KE200	-	200V Transient Voltage Suppressor
Z6	P6KE18A	-	18V Transient Voltage Suppressor
# <b>ZNR1</b>	PVR07D 470K	-	-
ZS2	16V 1/2W	-	-
ZS3	27V 1/2W	-	-

Item No.	Function/Rating	Mfr. Part No.	Notes
C5	100pF 1KV	-	-
# <b>CP602</b>	.22	-	-
# <b>CP611</b>	47µF	-	-
CP612	.001 1KV	-	-
# <b>CP616</b>	470µF	-	-
# <b>CX1</b>	.47	-	-
# <b>CX3</b>	.68	-	-
# <b>CY1</b>	.001	-	-
# <b>CY4</b>	.001	-	-
# <b>F1</b>	Fuse	-	6.3A 125V
# <b>FP610</b>	Fuse	-	500mA 250V
L2	Inductor	-	JLC4219
# <b>LF1, 2</b>	Filter	-	JLB2859
# <b>LP600</b>	Filter	-	-
# <b>LP610</b>	Switching Transformer	-	SMT-STBY8
LS1	Inductor	-	JLC5008
LS2	Inductor	-	JLC0510
LS3	Inductor	-	JLB0931
LS4	Inductor	-	JLB0931
LS6	Inductor	-	JLC0510
LS9	Inductor	-	JLC0657
P1	AC Power Cord	270462	Polarized
R21	1 5% 5W	-	-
# <b>R52</b>	1M 5%1/2W	-	-
# <b>RP612</b>	1.2 5% 2W	-	-
# <b>SP600</b>	Relay	-	Power
# <b>THR1</b>	Thermistor	-	NTC5D-9
# <b>T1</b>	Transformer	-	BCK50298S
# <b>T2</b>	Transformer	-	BCK190284
T3	Transformer	-	JLC1814
	Panel LCD (1)	-	37” LPL LC37OW
	Panel LCD (2)	-	37” LC37OWX1-SLO1 R=Y
	PC Board (2)	274372	Analog
	PC Board (1)	272089	AV & Scaler
	PC Board (2)	274390	Digital
	PC Board	271707	Digital & Analog QAM
	PC Board (1)	271703	FAV IFC130A 01
	PC Board (1)	271704	KB & IR V6 IFC13
	PC Board (2)	274391	Key
	PC Board (2)	274393	Power
	PC Board (2)	274392	Side AV
	PC Board	272062	SMPS, JSK 3220-007B
	PC Board (1)	271705	SMPS 1W
	PC Board	271708	US ADM1-T
	Speaker	274378	LS-TV 10W 8ohm
	Speaker	274369	LS-TV 8W 8ohm
	Transmitter	271706	Remote R130TA1 RC

# For SAFETY use only equivalent replacement part.  
Use Lead Free Solder

- (1) L37WD12YX1  
(2) L37WD12YX5

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MODEL L37WD12 (CHASSIS IFC130L)