



SERVICE MANUAL

CTM342H

34 cm CTV

SERVICE MANUAL

14" 20" 21" SOLID STATE Color Television Receiver

ART-TECH. TV.

PAL SECAM VERSION
TOSHIBA I²C IC

This manual is the latest at the time of printing, and does not include the modification which may be made after the printing, by the constant improvement of product.

Document : SM - 32PM Date : 5-11-99 Approved by : _____
(Sunny Cheung)

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(PAK FUNG PAN WONG YIM FAI)

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This manual is the latest at the time of
Printing, and does not include the modification
Which may be made after the Printing, by the
Constant improvement of Product.

ITEMS OF MEASUREMENT	STANDARD	UNIT
VIDEO SENS. AT S/N 30db		
L - VHF	≤ 57	dbuv
H - VHF	≤ 57	dbuv
UHF	≤ 60	dbuv
SOUND SENS. AT S/N 30db		
L - VHF	≤ 42	dbuv
H - VHF	≤ 42	dbuv
UHF	≤ 48	dbuv
AGC CHARACTER	≥ 60	db
SELECTIVITY -1.5 MHz	≥ 35	db
+ 8 MHz	≥ 40	db
COLOR SENS.	≤ 45	dbuv
COLOR LOCK - IN RANGE	$\geq \pm 300$	Hz
VERTICAL LOCK - IN RANGE	≥ 6	Hz
HORIZONTAL LOCK - IN RANGE	≥ 400	Hz
MAX BRIGHTNESS	≥ 140	cd / m2
MAX OUTPUT POWER	≥ 1	W
OUTPUT POWER AT 10% THD	≥ 0.7	W
BUZZ	≤ -40	db
AFC RANGE	$\geq +1$	MHz
	≥ -0.5	MHz
MIN. VOL HUM	≤ 20	mV
RESOLUTION HORIZONTAL	≥ 300	LINES
VERTICAL	≥ 400	LINES
LINEARITY DISTORTION VERTICAL	≤ 10	%
HORIZONTAL	≤ 10	%
RASTER DISTORTION	≤ 5	%
REMOTE CONTROL DISTANCE	≥ 5	METER
ANGLE	$\geq \pm 15$	DEGREE
POWER CONSUMPTION (AT NORMAL CONDITION)	≤ 60	WATTS
POWER CONSUMPTION (AT MAX. CONDITION)	≤ 70	WATTS
CONVERGENCE DISLOCATION AT AREA "A"	≤ 0.4	%
AREA "B"	≤ 0.8	%
(see fig.1)		

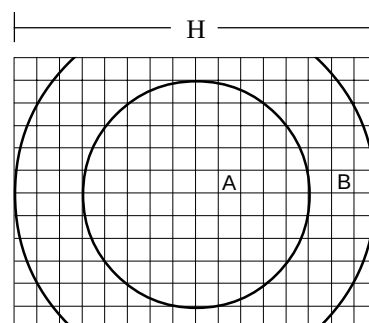


Fig.1

VIDEO INPUT LEVEL : 1.0V P-P $\pm$ 3dB
 AUDIO INPUT LEVEL : 0.5V RMS $\pm$ 3dB

ITEMS OF MEASUREMENT	STANDARD	UNIT
VIDEO SENS. AT S/N 30db		
L - VHF	≤ 57	dbuv
H - VHF	≤ 57	dbuv
UHF	≤ 60	dbuv
SOUND SENS. AT S/N 30db		
L - VHF	≤ 42	dbuv
H - VHF	≤ 42	dbuv
UHF	≤ 48	dbuv
AGC CHARACTER	≥ 60	db
SELECTIVITY -1.5 MHz	≥ 35	db
+ 8 MHz	≥ 40	db
COLOR SENS.	≤ 45	dbuv
COLOR LOCK - IN RANGE	$\geq \pm 300$	Hz
VERTICAL LOCK - IN RANGE	≥ 6	Hz
HORIZONTAL LOCK - IN RANGE	≥ 400	Hz
MAX BRIGHTNESS	≥ 120	cd/m ²
MAX OUTPUT POWER	≥ 1.8	W
OUTPUT POWER AT 10% THD	≥ 1.3	W
BUZZ	≤ -40	db
AFC RANGE	$\geq +1$	MHz
	≥ -0.5	MHz
MIN. VOL HUM	≤ 20	mV
RESOLUTION HORIZONTAL	≥ 300	LINES
VERTICAL	≥ 400	LINES
LINEARITY DISTORTION VERTICAL	≤ 10	%
HORIZONTAL	≤ 10	%
RASTER DISTORTION	≤ 5	%
REMOTE CONTROL DISTANCE	≥ 5	METER
ANGLE	$\geq \pm 15$	DEGREE
POWER CONSUMPTION (AT NORMAL CONDITION)	≤ 70	WATTS
POWER CONSUMPTION (AT MAX. CONDITION)	≤ 85	WATTS
CONVERGENCE DISLOCATION AT AREA "A"	≤ 0.4	%
AREA "B"	≤ 0.8	%
(see fig.2)		

VIDEO INPUT LEVEL : 1.0V P-P $\pm$ 3dB
 AUDIO INPUT LEVEL : 0.5V RMS $\pm$ 3dB

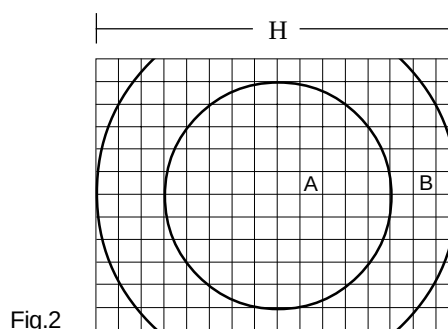


Fig.2

SPECIFICATION

SUPPLY VOLTAGE : AC220V 50Hz $\geq +10\%$ / -20%

MODEL : 14"

SYSTEM :	PAL - I / I	PAL - BG	PAL - I (UK)	PAL - SECAM - BG / DK	PAL - SECAM - BG / DK (HYPER)	PAL - BG (HYPER)	PAL - BG (CATV)	SECAM - L	L'	
CHANNEL L - VHF : H - VHF : UHF :	4 - 13 21 - 69	2 - 4 5 - 12 21 - 69	21 - 69	1 - 5 6 - 12 21 - 69	1 - 5 6 - 12 21 - 69	E2 - S10 E5 - S41 E21 - E69	E2 - S2 E5 - S20 E21 - E69	1 - Q 21 - 69	FB - FC	CH CH CH
VIF FREQUENCY :	38.9	38.9	39.5	38.0	38.9	38.9	38.9	38.9	32.7	MHz
SIF FREQUENCY :	32.9	33.4	33.5	31.5 32.5	32.4 33.4	33.4	33.4	32.4	39.2	MHz
CHROMA IF FREQUENCY :	34.47	34.47	35.07	33.57 33.57	34.47 34.47	34.47	34.47	34.47		MHz
INTER-CARRIER FREQUENCY :	6.0	5.5	6	6.5 5.5	6.5 5.5	5.5	5.5	6.5	6.5	MHz
SCANNING HORIZONTAL : VERTICAL :	15625 LINE 50 Hz									
ANTENNA INPUT IMPEDANCE :										
CRT :										

SPECIFICATION

SUPPLY VOLTAGE : AC220V 50Hz $\geq + 10\%$ / -20%

MODEL : 20" - 21"

SYSTEM :	PAL - I / I	PAL - BG	PAL - I (UK)	PAL - SECAM - BG / DK	PAL - SECAM - BG / DK (HYPER)	PAL - BG (HYPER)	PAL - BG (CATV)	SECAM - L	L'	
CHANNEL L - VHF : H - VHF : UHF :	4 - 13 21 - 69	2 - 4 5 -12 21 - 69	21 -69	1 - 5 6 - 12 21 - 69	1 - 5 6 - 12 21 - 69	E2 - S10 E5 - S41 E21 - E69	E2 - S2 E5 - S20 E21 - E69	1 - Q 21 - 69	FB - FC	CH CH CH
VIF FREQUENCY :	38.9	38.9	39.5	38.0	38.9	38.9	38.9	38.9	32.7	MHz
SIF FREQUENCY :	32.9	33.4	33.5	31.5 32.5	32.4 33.4	33.4	33.4	32.4	39.2	MHz
CHROMA IF FREQUENCY :	34.47	34.47	35.07	33.57 33.57	34.47 34.47	34.47	34.47	34.47		MHz
INTER-CARRIER FREQUENCY :	6.0	5.5	6	6.5 5.5	6.5 6.5	5.5	5.5	6.5	6.5	MHz
SCANNING HORIZONTAL : VERTICAL :	15625 LINE 50 Hz									
ANTENNA INPUT IMPEDANCE :	75 OHM									
CRT :	20" - 21"									

ALIGNMENT INSTRUCTION

I. PLEASE READ BEFORE ATTEMPTING SERVICE

1. Do not connect any antenna plug directly to the tuner socket and do not connect any equipments directly to the TV chassis, otherwise it may be burnt out the TV or equipment, except an isolation transformer is used for main power source or the TV sets.
2. Never disconnect any leads while receiver is in operation.
3. Disconnect all power before attempting any repairs.
4. Do not short any portion of the circuit while power is on.
5. For safety reasons, all parts replaced should be identical (for parts and part numbers see parts list).
6. Before alignment the set must be pre-heated for 30 minutes or more and erase magnetism thoroughly from CRT front chassis frame by erase coil.

II. TEST EQUIPMENT

- | | |
|-------------------------------|--|
| 1. Colour Bar/Dot/Cross Hatch | 5. High Voltage Meter |
| 2. Oscilloscope | 6. Ampere Meter (0.5 Class, DC 3mA Max.) |
| 3. Vacuum Tube Voltmeter | 7. Demagnetizing Coil |
| 4. Volt Ohmmeter | 8. Closed Caption Encoder |
| | 9. High Pot Tester. |

I. B+ ADJUSTMENT

1. Connect a digital voltmeter to B+ and Ground.
2. Set Brightness Contrast to minimum.
3. Adjust Screen Volume on FBT until the picture can just be seen.
4. Adjust VR901 to obtain a reading of $112 \pm 0.5V$ (FOR samsung CRT).

II. AFC ALIGNMENT

1. Disconnect the soldering pad 'F'.
2. Input the signal from Pattern Generator (IF 38.9MHz) colour bar to R101 and GND.
3. Adjust the T101 until the colour bar shows on the screen.
4. Select 'SELF VCO' in D-MODE.
5. Press the AFC button on the handset.
6. About few seconds screen will show AFT OK.

*REMARK: No this factory on Normal R.C.

III. AGC ALIGNMENT

1. Receive CH69 (UHF) and input field strength. TUNER Input Signal $62 \pm 3dB$,
 2. Connect a digital Voltmeter between the TUNER AGC Terminal and Ground.
 3. Select RAGC item, Adjust the value to 3F, and then adjust the AGC value obtain the voltage drop down 0.4V.
- Remark: 1 The drop down voltage should be more than and tends to 0.4V.
2 No observable noise can be seen.

IV. VERTICAL LINEARTY ADJUSTMENT

1. PAL (50Hz) Adjustment
 - (1). Receive Crosshatch Pattern (50Hz).
 - (2). Select VLIS item adjust value to normal regular picture.
2. NTSC (60Hz) Adjustment.
 - (1). Receive Cross hatch Pattern (60Hz).
 - (2). Select VILN item adjust value to normal regular picture.
3. Repeat 1.2. receive Cross hatch 50Hz and 60Hz is same picture.

V. VERTICAL HEIGHT ADJUSTMENT

1. PAL (50Hz) Adjust.
 - (1). Receive Mono scope Pattern (50Hz).
 - (2). Select HITS item adjust value to normal regular picture.
2. NTSC (60Hz).
 - (1). Receive Mono scope Pattern (60Hz).
 - (2). Select HIT item adjust value to normal regular picture.
3. Repeat 1.2. receive Mono Scope Pattern 50Hz and 60Hz is same picture.

1. Receive Cross hatch Pattern
2. Select VSC item adjust value to normal,regular picture.

1. PAL (50Hz) Adjustment
 - (1). Receive Monscope Pattern (50Hz).
 - (2). Select VP50 item adjust value to obtain the picture at center .
2. NTSC (60Hz) Adjustment
 - (1). Receive Monscope Pattern (60Hz).
 - (2). Select VP60 item adjust value to obtain the picture at center.
3. Repeat 1.2. receive Mono Scope Pattern 50Hz and 60Hz is same picture center.

- 1.PAL(50Hz)Adjustment.
 - (1).Receive Mono Scope Pattern (50Hz).
 - (2).Select HPS item adjust value to normal regular Picture.
- 2.NTSC(60Hz)
 - (1).Receive Mono Scope Pattern (60Hz).
 - (2).Select HPOS item adjust value to normal regular Picture.
- 3.Repeat 1. 2. receive Mono Scope Pattern (50Hz) and (60Hz) is Same Picture.

mm

← -5 -4 -3 -2 -1 0 1 2 3 4 5 → mm

LEFT

↑

CENTER OF THE SCREEN

CRT MUST FACE TO EAST

RIGHT

1. SUITABLE FOR 14" OR ABOVE TV.
2. Adjust the centre position must take the upper side of monoscope pattern for standard.
3. Group A: AUSTRALIA, NEW ZEALAND, TAHITI.
4. Group B: HONG KONG, CHINA, AMERICA, CANADA, MALAYSIA, MEXICO.
5. Group C: ENGLAND, ITALY, GERMANY, RUSSIA, SWITZERLAND, JUGOSLAVIA, SPANISH.

If the above countries are not include, please consult to Engineering Dept.

VIII. WHITE BALANCE ALIGNMENT STEP

(Deqauss the picture by deqaussing coil if necessary)

1. Disconnect the any input signal, set the blue black OFF.
2. Enter to D HODE.
3. Adjust the RCUT, GCUT, BCUT value to 80, GDRV, BDRV to 45, BRTS to CO.
4. Adjust the BRIGHT, CONT to min.
5. Adjust the screen VR (on the FBT) until the show cannot just be screen.
6. Connect the VOLT meter '+' to CRT BOARD G2, (-) to GND and get the reading value.
7. Adjust the screen VR lead the reading value reduce $25 \pm 5v$
8. Adjust the BRTS set to F6, and set BRIGHT, CONT to mid.
9. Receive a Black and White Pattern.
10. Select Remote handset direct key (2) and (3) button adjust GCUT and BCUT to minimum value, Press (1) button adjust RCUT to middle value.
11. Press Picture mode, select Brightness and Contrast adjust value to minimum.
12. Press handset direct key (2) button to obtain a yellow line.
13. Press handset direct key (3) button to obtain a white line.
14. Press handset direct key (-/-) button again.
15. Press CH button select GDRV and BDRV item adjust value to make the
16. picture uniformly white ($9300 K \pm 3 JND$).

IX. SUB-BRIGHTNESS ALIGNMENT

1. Receive a Colour Bar Pattern.
2. Press PICTURE mode select BRIGHTNESS, CONTRAST adjust value to minimum.
3. Select BRTS in D-MODE.
4. Adjust value the brightness bar can just be seen.

X. FOCUS ALIGHMENT

1. Set the Brightness and Contrast to middle position.
2. Receive a Monoscope Pattern.
3. Adjust focus control to obtain sharpest picture.

XI. HIGH POT TESTING

- 1) Short the L-pole and N-pole of AC line cord.
- 2) Switch on the power switch of the TV Set.
- 3) Connect The High Pot Tester (-) to L and N pole, (+) to the METAL PART of CABINET.

CONDITION SAFETY STD.	TEST SYANDARD	TEST STANDARN FOR PRODUCTION
VDE, SAA	3.0KV 10mA / 1MIN	$\geq 3.5KV \leq 10mA / \geq 10 \text{ SEC.}$
UL	1.0KV 5mA / 1MIN	$\geq 1.25KV \leq 5mA / \geq 1 \text{ SEC.}$

REMARK:

- (1). If no other specity, the strength of input signal should be $70dB \pm 10dB$.
- (2). The HIGH POT TESTER can have $\leq \pm 5\%$ tolerance.

Model: 21 j^a
 Chassis: I²C technology.
 Picture Tube: SAMSUNG, Type:A51KQK99X01, S/N:2090344252

Service Mode Data

Item	Parameter	C o d e			Value SAMSUNG 21 j ^a		
1	RCUT	I			83		
2	GCUT	I			D8		
3	BCUT	I			85		
4	GDRV	I			49		
5	BDRV	I			49		
6	CNTX	A			3A		
7	BRTC	A			47		
8	COLC	A			30		
9	TNTC	A			3A		
10	COLP	A			33		
11	COLS	A			2E		
12	SCNT	A			0E		
13	CNTC	A			2B		
14	CNTN	A			06		
15	BRTX	A			23		
16	BRTN	A			21		
17	COLX	A			25		
18	COLN	A			00		
19	TNTX	A			30		
20	TNTN	A			30		
21	ST3	A			09		
22	SV3	A			09		
23	ST4	A			09		
24	SV4	A			10		
25	SHPX	A			12		
26	SHPN	A			05		
27	TXCX	I			2A		
28	RGCN	I			1E		
29	VM0	N			2C		
30	VM1	N			00		
31	HPOS	I			06		

32	VP50	I			03		
33	HIT	I			16		
34	HPS	I			04		
35	VP60	I			00		
36	HITS	I			02		
37	VLIN	I			0C		
38	VSC	I			08		
39	VLIS	I			FF		
40	DPC	N			00		
41	DPCS	N			00		
42	KEY	N			00		
43	KEYS	N			00		
44	WID	N			00		
45	WIDS	N			00		
46	VCP	N			00		
47	CNR	N			00		
48	HCP	N			00		
49	SBY	A			08		
50	SRY	A			08		
51	RAGC	I			21		
52	AFT	N			27		
53	HAFC	N			00		
54	V25	A			3E		
55	V50	A			4A		
56	BRTS	I			04		
57	VM2	N			30		
58	MOD0	A			00		
59	MOD1	A			12		
60	MOD2	N			00		
61	SELF	N			00		
62	SELF VCO	N			80		
63	SELF AGC	N			69		
64	SELF BRTC	N			75		
65	SELF CNTC	N			23		
66	SELF TNTC	N			00		
67	SELF COL	N			20		
68	LOG0	A			01		
69	LANG	A			00		
70	IF FREQ	A			03		
71	OSD	I			02		
72	OPT	N			04		

SAMSUNG, Type: A51KQK99 X01

Adjustment codes:

- I Data adjustable individually for each unit.
- A Adjustable parameter.Changes need Engineering Department approval.
- N Non adjustable parameter.

Model: 21 j^a
 Chassis: I²C technology.
 Picture Tube: SEG-HITACHI, Type:A51JSY63X13, S/N:SH9E210453

Service Mode Data

Item	Parameter	C o d e			Value HITACHI 21 j ^a		
1	RCUT	I			83		
2	GCUT	I			84		
3	BCUT	I			86		
4	GDRV	I			4A		
5	BDRV	I			43		
6	CNTX	A			3A		
7	BRTC	A			43		
8	COLC	A			30		
9	TNTC	A			3A		
10	COLP	A			30		
11	COLS	A			2F		
12	SCNT	A			0E		
13	CNTC	A			27		
14	CNTN	A			06		
15	BRTX	A			2A		
16	BRTN	A			21		
17	COLX	A			25		
18	COLN	A			00		
19	TNTX	A			30		
20	TNTN	A			30		
21	ST3	A			09		
22	SV3	A			09		
23	ST4	A			09		
24	SV4	A			10		
25	SHPX	A			12		
26	SHPN	A			05		
27	TXCX	I			27		
28	RGCN	I			27		
29	VM0	N			2C		
30	VM1	N			00		
31	HPOS	I			09		

32	VP50	I			03		
33	HIT	I			11		
34	HPS	I			04		
35	VP60	I			01		
36	HITS	I			02		
37	VLIN	I			0C		
38	VSC	I			08		
39	VLIS	I			FF		
40	DPC	N			00		
41	DPCS	N			00		
42	KEY	N			00		
43	KEYS	N			00		
44	WID	N			00		
45	WIDS	N			00		
46	VCP	N			00		
47	CNR	N			00		
48	HCP	N			00		
49	SBY	A			08		
50	SRY	A			08		
51	RAGC	I			1F		
52	AFT	N			40		
53	HAFC	N			00		
54	V25	A			3E		
55	V50	A			4A		
56	BRTS	I			08		
57	VM2	N			30		
58	MOD0	A			00		
59	MOD1	A			12		
60	MOD2	N			00		
61	SELF	N			00		
62	SELF VCO	N			80		
63	SELF AGC	N			69		
64	SELF BRTC	N			75		
65	SELF CNTC	N			23		
66	SELF TNTC	N			00		
67	SELF COL	N			20		
68	LOG0	A			01		
69	LANG	A			00		
70	IF FREQ	A			03		
71	OSD	I			00		
72	OPT	N			04		

SEG-HITACHI, Type:A51JSY63X13

Adjustment codes:

- I Data adjustable individually for each unit.
- A Adjustable parameter.Changes need Engineering Department approval.
- N Non adjustable parameter.

Model: 20 i^a
 Chassis: I²C technology.
 Picture Tube: LG, Type:A48QAD220X06, S/N:C9806005382 S

Service Mode Data

Item	Parameter	C o d e			Value LG 20 i ^a		
1	RCUT	I			0		
2	GCUT	I			65		
3	BCUT	I			64		
4	GDRV	I			55		
5	BDRV	I			4A		
6	CNTX	A			3F		
7	BRTC	A			45		
8	COLC	A			30		
9	TNTC	A			3A		
10	COLP	A			33		
11	COLS	A			2E		
12	SCNT	A			0E		
13	CNTC	A			25		
14	CNTN	A			06		
15	BRTX	A			20		
16	BRTN	A			21		
17	COLX	A			25		
18	COLN	A			00		
19	TNTX	A			30		
20	TNTN	A			30		
21	ST3	A			09		
22	SV3	A			09		
23	ST4	A			09		
24	SV4	A			10		
25	SHPX	A			16		
26	SHPN	A			05		
27	TXCX	I			20		
28	RGCN	I			20		
29	VMO	N			2C		
30	VM1	N			00		
31	HPOS	I			0A		

32	VP50	I			03		
33	HIT	I			05		
34	HPS	I			04		
35	VP60	I			00		
36	HITS	I			01		
37	VLIN	I			0D		
38	VSC	I			07		
39	VLIS	I			FF		
40	DPC	N			00		
41	DPCS	N			00		
42	KEY	N			00		
43	KEYS	N			00		
44	WID	N			00		
45	WIDS	N			00		
46	VCP	N			00		
47	CNR	N			00		
48	HCP	N			00		
49	SBY	A			08		
50	SRY	A			08		
51	RAGC	I			1A		
52	AFT	N			19		
53	HAFC	N			00		
54	V25	A			3E		
55	V50	A			4A		
56	BRTS	I			0A		
57	VM2	N			30		
58	MOD0	A			00		
59	MOD1	A			12		
60	MOD2	N			00		
61	SELF	N			00		
62	SELF VCO	N			80		
63	SELF AGC	N			69		
64	SELF BRTC	N			75		
65	SELF CNTC	N			23		
66	SELF TNTC	N			00		
67	SELF COL	N			20		
68	LOG0	A			01		
69	LANG	A			00		
70	IF FREQ	A			03		
71	OSD	I			06		
72	OPT	N			04		

LG,4828

Adjustment codes:

- I Data adjustable individually for each unit.
- A Adjustable parameter.Changes need Engineering Department approval.
- N Non adjustable parameter.

Model: 14 j^a
 Chassis: I²C technology.
 Picture Tube: SAMSUNG, Type:A34KQV42X02, S/N:7881202225

Service Mode Data

Item	Parameter	C o d e			Value SAMSUNG 14 j ^a		
1	RCUT	I			80		
2	GCUT	I			67		
3	BCUT	I			6D		
4	GDRV	I			4A		
5	BDRV	I			44		
6	CNTX	A			3A		
7	BRTC	A			4C		
8	COLC	A			40		
9	TNTC	A			3A		
10	COLP	A			31		
11	COLS	A			2E		
12	SCNT	A			0E		
13	CNTC	A			24		
14	CNTN	A			0C		
15	BRTX	A			22		
16	BRTN	A			32		
17	COLX	A			25		
18	COLN	A			00		
19	TNTX	A			30		
20	TNTN	A			30		
21	ST3	A			07		
22	SV3	A			07		
23	ST4	A			07		
24	SV4	A			10		
25	SHPX	A			10		
26	SHPN	A			05		
27	TXCX	I			25		
28	RGCN	I			20		
29	VMO	N			2C		
30	VM1	N			00		
31	HPOS	I			11		

342 . Samsung

32	VP50	I			05		
33	HIT	I			14		
34	HPS	I			08		
35	VP60	I			01		
36	HITS	I			00		
37	VLIN	I			0A		
38	VSC	I			08		
39	VLIS	I			FF		
40	DPC	N			00		
41	DPCS	N			00		
42	KEY	N			00		
43	KEYS	N			00		
44	WID	N			00		
45	WIDS	N			00		
46	VCP	N			00		
47	CNR	N			00		
48	HCP	N			00		
49	SBY	A			08		
50	SRY	A			08		
51	RAGC	I			25		
52	AFT	N			40		
53	HAFC	N			00		
54	V25	A			3E		
55	V50	A			4A		
56	BRTS	I			FD		
57	VM2	N			30		
58	MOD0	A			00		
59	MOD1	A			02		
60	MOD2	N			00		
61	SELF	N			00		
62	SELF VCO	N			80		
63	SELF AGC	N			69		
64	SELF BRTC	N			75		
65	SELF CNTC	N			23		
66	SELF TNTC	N			00		
67	SELF COL	N			20		
68	LOG0	A			01		
69	LANG	A			00		
70	IF FREQ	A			03		
71	OSD	I			00		
72	OPT	N			04		

Adjustment codes:

- I Data adjustable individually for each unit.
- A Adjustable parameter.Changes need Engineering Department approval.
- N Non adjustable parameter.

Model: 14 j^a
 Chassis: I²C technology.
 Picture Tube: IRICO, Type:37SX110Y22-DC05, S/N:97020510

Service Mode Data

Item	Parameter	C o d e			Value IRICO 14 j ^a		
1	RCUT	I			82		
2	GCUT	I			CA		
3	BCUT	I			85		
4	GDRV	I			52		
5	BDRV	I			4A		
6	CNTX	A			3F		
7	BRTC	A			3F		
8	COLC	A			30		
9	TNTC	A			3A		
10	COLP	A			30		
11	COLS	A			2E		
12	SCNT	A			0E		
13	CNTC	A			2A		
14	CNTN	A			0C		
15	BRTX	A			22		
16	BRTN	A			36		
17	COLX	A			25		
18	COLN	A			00		
19	TNTX	A			30		
20	TNTN	A			30		
21	ST3	A			07		
22	SV3	A			07		
23	ST4	A			07		
24	SV4	A			10		
25	SHPX	A			10		
26	SHPN	A			05		
27	TXCX	I			25		
28	RGCN	I			20		
29	VMO	N			2C		
30	VM1	N			00		
31	HPOS	I			0B		

32	VP50	I			02		
33	HIT	I			12		
34	HPS	I			04		
35	VP60	I			02		
36	HITS	I			2E		
37	VLIN	I			0B		
38	VSC	I			08		
39	VLIS	I			FF		
40	DPC	N			00		
41	DPCS	N			00		
42	KEY	N			00		
43	KEYS	N			00		
44	WID	N			00		
45	WIDS	N			00		
46	VCP	N			00		
47	CNR	N			00		
48	HCP	N			00		
49	SBY	A			08		
50	SRY	A			08		
51	RAGC	I			24		
52	AFT	N			1E		
53	HAFC	N			00		
54	V25	A			3E		
55	V50	A			4A		
56	BRTS	I			14		
57	VM2	N			30		
58	MOD0	A			00		
59	MOD1	A			02		
60	MOD2	N			00		
61	SELF	N			00		
62	SELF VCO	N			80		
63	SELF AGC	N			69		
64	SELF BRTC	N			75		
65	SELF CNTC	N			23		
66	SELF TNTC	N			00		
67	SELF COL	N			20		
68	LOGO	A			01		
69	LANG	A			00		
70	IF FREQ	A			03		
71	OSD	I			12		
72	OPT	N			04		

Picture Tube: IRIC0, Type:37SX110Y22-DC05, S/N:97020510

Adjustment codes:

- I Data adjustable individually for each unit.
- A Adjustable parameter.Changes need Engineering Department approval.
- N Non adjustable parameter.

Model: 14 j^a
 Chassis: I²C technology.
 Picture Tube: Orion, Type:A34JLL90X32

Service Mode Data

Item	Parameter	C o d e			Value Orion 14 j ^a		
1	RCUT	I			7E		
2	GCUT	I			94		
3	BCUT	I			6D		
4	GDRV	I			40		
5	BDRV	I			41		
6	CNTX	A			3F		
7	BRTC	A			4C		
8	COLC	A			33		
9	TNTC	A			3A		
10	COLP	A			29		
11	COLS	A			2E		
12	SCNT	A			0E		
13	CNTC	A			20		
14	CNTN	A			0C		
15	BRTX	A			22		
16	BRTN	A			32		
17	COLX	A			25		
18	COLN	A			00		
19	TNTX	A			30		
20	TNTN	A			30		
21	ST3	A			07		
22	SV3	A			07		
23	ST4	A			07		
24	SV4	A			10		
25	SHPX	A			10		
26	SHPN	A			05		
27	TXCX	I			25		
28	RGCN	I			20		
29	VM0	N			2C		
30	VM1	N			00		
31	HPOS	I			0C		

32	VP50	I			00		
33	HIT	I			12		
34	HPS	I			03		
35	VP60	I			01		
36	HITS	I			03		
37	VLIN	I			0C		
38	VSC	I			09		
39	VLIS	I			02		
40	DPC	N			00		
41	DPCS	N			00		
42	KEY	N			00		
43	KEYS	N			00		
44	WID	N			00		
45	WIDS	N			00		
46	VCP	N			00		
47	CNR	N			00		
48	HCP	N			00		
49	SBY	A			08		
50	SRY	A			08		
51	RAGC	I			25		
52	AFT	N			13		
53	HAFC	N			00		
54	V25	A			3E		
55	V50	A			4A		
56	BRTS	I			15		
57	VM2	N			30		
58	MOD0	A			00		
59	MOD1	A			02		
60	MOD2	N			00		
61	SELF	N			00		
62	SELF VCO	N			80		
63	SELF AGC	N			69		
64	SELF BRTC	N			75		
65	SELF CNTC	N			23		
66	SELF TNTC	N			30		
67	SELF COL	N			20		
68	LOG0	A			01		
69	LANG	A			00		
70	IF FREQ	A			03		
71	OSD	A			00		
72	OPT	N			04		

Orion, Type:A34JLL90X32

Adjustment codes:

- I Data adjustable individually for each unit.
- A Adjustable parameter.Changes need Engineering Department approval.
- N Non adjustable parameter.

TB1238N Adjustment in D-Mode

Show the D-Mode Items information

Mode	For PAL	For NTSC	Remark
D	RCUT	RCUT	R CUTOFF
	GCUT	GCUT	G CUTOFF
	BCUT	BCTU	B CUTOFF
	GDRV	GDRV	G DRIVE
	BDRV	BDRV	B DRIVE
	CNTX	CNTX	SUB CONTRAST MAX
	BRTC	BRTC	SUB BRIGHT CENTER
	COLC	COLC	SUB COLOR CENTER for NTSC
	TNTC	TNTC	SUB TINT CENTER
	COLP		SUB COLOR CENTER for PAL (DIFFERENCE)
	COLS		SUB COLOR CENTER for SECAM
	SCNT	SCNT	Y-SUB CONTRAST
	CNTC	CNTC	SUB CONTRAST CENTER
	CNTN	CNTN	SUB CONTRAST MINIMUM
	BRTX	BRTX	SUB BRIGHT MAX (DIFFERENCE)
	BRTN	BRTN	SUB BRIGHT MIN (DIFFERENCE)
	COLX	COLX	SUB COLOR MAX (DIFFERENCE)
	COLN	COLN	SUB COLOR MIN
	TNTX	TNTX	SUB TINT MAX (DIFFERENCE)
	TNTN	TNTN	SUB TINT MIN (DIFFERENCE)

Mode	For PAL	For NTSC	Remark
D	ST3	ST3	SUB SHARP CENTER NTSC3.58 in TV
	SV3	SV3	SUB SHARP CENTER NTSC3.58 in VIDEO
	ST4	ST4	SUB SHARP CENTER other color system in TV
	SV4	SV4	SUB SHARP CENTER other color system in VIDEO
	SHPX		SUB SHARPNESS MAX points from Center value
	SHPN		SUB SHARPNESS MIN points from Center value
	TXCX		RGB Contrast data at MAX data of user contrast
	RGCN		RGB Contrast data at MIN data of user contrast
	VM0		VCD mode data 0 (Setting Data of TB1238) Bit 7: F-ID, Bit 6: CW-SW, Bit 5,4: BAL Start Point Bit 3,2: ABL-Gain Bit 1: WPS Bit 0: ID-SW
	VM1		VCD mode data 1 (Setting Data of TB1238) Bit 7: No use , Bit 6: N-COM, Bit 5-1: V-Mute Timing Bit 0: BLK V-Mute Timing = 200ms + 8ms * Data
	HPOS		50Hz Horizontal Phase
	VP50		50Hz Vertical Phase
	HIT		50Hz Vertical Amplitude
	HPS	HPS	Shift data of 50Hz / 60 Hz Horizontal Phase
	VP60	VP60	60Hz Vertical Phase
	HITS	HITS	Shift data of 50Hz / 60Hz Vertical Amplitude
	VLIN		V-LINEARITY
	VSC		V-S CORRECTION
	VLIS	VLIS	Shift data of 50Hz / 60Hz V-LINEARITY
	DPC		
	DPCS		
	KEY		
	EKYS		
	WID		
	WIDS		
	VCP		
	CNR		
	HCP		
	SBY		SECAM B-Y
	SRY		SECAM R-Y
	RAGC	RAGC	RF AGC adjustment
	AFT		PIF VCO adjustment
	HAFC		1/2 AFC data adjustment
	V25		Volume output data at 25%
	V50		Volume output data at 50%
	BRTS		SUB Brightness (DIFFERENCE)
	VM2		
	MOD0		
	MOD1		
	MOD2		
	SELF		
	SELF VCO		
	SELF AGC		
	SELF BRTC		
	SELF CNTC		
	SELF TNTC		
	SELF COL		
	LOGO		
	LANG		
	IF FREQ		
	OSD		
	OPT		

MOD0

SYS	DATA
PAC SECAM TEXT CCD NTSC	46
PAC SECAM NTSC TEXT	42
PAC SECAM NTSC CCD	44
PAC NTSC TEXT CCD	06
PAC NTSC TEXT	02
PAC NTSC CCD	04
PAL NTSC	00
PAL SECAM NTSC	40

TABLE 1.

MOD1

PROGRAM	VIDEO	DATA
50	TV—VIDEO	00
100	TV —VIDEO	02
50	TV—VIDEO 1—VIDEO 2	10
100	TV—VIDEO 1—VIDEO 2	12

TABLE 2.

MOD2

SOUND	SYSTEM	DATA
BG or DK or I		00
DK . I		0A
BG . DK		0C
BG . I		06

TABLE 3.

LOGO

NO LOGO	00
TEAC	01
ROWA	02

TABLE 4.

LANG

ENGLISH	00
ENGLISH OR FRANCAIS	01

TABLE 5.

IF FREQ

MHz	DATA
39.5	02
38.9	03
38.0	04

TABLE 6.

For 14j "

VOLTAGE TABLE FOR TRANSISTOR (ONLY FOR REFERENCE)							
SYMBOL	B (V)	C (V)	E (V)	SYMBOL	B (V)	C (V)	E (V)
Q101	1.3	9.0	0.6	Q507	0	9.0	0.1
Q102	3.6	8.9	2.9	Q508	0.5	0	1.2
Q103	4.3	8.9	3.7	Q601	5.0	5.1	4.5
Q104	2.8	0	3.5	Q603	0.6	0	0
Q105	6.3	8.9	5.5	Q604	0	5.1	0
Q106	1.4	0	2.1	Q605	0	4.9	0
Q201	17.5	1.1	17.2	Q606	-0.8	4	0
Q202	0.6	0	0	Q801	3.0	2.3	2.3
Q203	16	15.3	15.3	Q803	0.67	0	0
Q301	0.1	22.8	0	Q901	8.8	11.9	8.2
Q401	0.3	14.9	0	Q902	5.1	-0.05	1.6
Q402	-0.2	106.0	0	Q903	0	1.1	0
Q403	5.5	7.7	4.9	Q904	-2.5	296.7	0
Q501	9.0	107	8.5	Q905	0.6	0	0
Q502	9.0	108.7	8.5	Q906	109.4	110	110
Q503	9.0	105.3	8.5	Q907	110	110	109.3
Q504	2.6	8.5	2.1	Q108	3.1	5.1	2.4
Q505	2.6	8.5	2.1	Q109	5.1	8.9	4.5
Q506	2.7	8.5	2.3	Q110	5.9	9.0	5.2

NOTE: VOLTAGE ARE TAKEN UNDER TUNED CONDITION WITH

CONTRAST	:	Maximum Position
BRIGHTNESS	:	Maximum Position
COLOR	:	Maximum Position
SIGNAL INPUT	:	70dB $\pm$ 10dB
CHANNEL SETTING	:	The Last Channel of UHF High
SIGNAL PATTERN	:	Colour Bar

FOR 20" ~ 21"

VOLTAGE TABLE FOR TRANSISTOR (ONLY FOR REFERENCE)							
SYMBOL	B (V)	C (V)	E (V)	SYMBOL	B (V)	C (V)	E (V)
Q101	1.3	9.0	0.6	Q603	0.6	0	0
Q102	3.6	8.9	2.9	Q604	0	5.1	0
Q103	4.3	8.9	3.7	Q605	0	4.9	0
Q104	2.8	0	3.5	Q606	-0.8	4	0
Q105	6.3	8.9	5.5	Q901	8.8	11.9	8.2
Q106	1.4	0	2.1	Q902	5.1	-0.05	1.6
Q108	3.1	5.1	2.4	Q903	0	1.1	0
Q109	5.1	8.9	4.5	Q904	-2.5	296.7	0
Q110	5.9	9.0	5.2	Q905	0.6	0	0
Q201	17.5	1.1	17.2	Q906	109.4	110	110
Q202	0.6	0	0	Q907	110	110	109.3
Q203	16	15.3	15.3	Q001	0	8.9	GND
Q301	0.1	22.8	0				
Q401	0.3	14.9	0				
Q402	-0.2	106.1	0				
Q403	5.5	7.7	4.9				
Q501	9.0	107	8.5				
Q502	9.0	108.7	8.5				
Q503	9.0	105.7	8.5				
Q504	2.6	8.5	2.1				
Q505	2.6	8.5	2.1				
Q506	2.7	8.5	2.3				
Q507	0	9.0	0.1				
Q508	0.5	0	1.2				
Q601	5.0	5.1	4.5				
Q801	3.0	2.3	2.3				
Q803	0.67	0	0				

NOTE: VOLTAGE ARE TAKEN UNDER TUNED CONDITION WITH

CONTRAST	:	Maximum Position
BRIGHTNESS	:	Maximum Position
COLOR	:	Maximum Position
SIGNAL INPUT	:	70dB $\pm$ 10dB
CHANNEL SETTING	:	The Last Channel of UHF High
SIGNAL PATTERN	:	Colour Bar

VOLTAGE TABLE FOR IC (ONLY FOR REFERENCES) (FOR 1P.TEXT)					
PIN NO. SYMBOL	IC101	IC601	IC801	IC802	IC302
1	5	GND	5	0	2.6
2	3.6	4.7	2	0	NC
3	8.9	5	3.6	0	2.5
4	2.5	0	0	0	2.5
5	0	0	GND	5	2.5
6	0.4	0	5	4	2.5
7	0	5	2.2	0	4.6
8	4.5	5	2.4	1.6	NC
9	4.2	5	2.5	0	4.9
10	2.3	0	5	0	NC
11	2.5	5	GND	1.1	0
12	0	5	NC	GND	2.9
13	0	2.6	5	5	3.3
14	2.6	NC	GND	NC	2.5
15	2.4	5	0.2	3.2	2.6
16	2.6	5	0.2	2.9	NC
17	9	NC	0.2	NC	0.7
18	2.9	NC	2.6	0	4.9
19	2.7	NC	1.6	0	2.7
20	2.8	NC	GND		NC
21	5.3	GND	NC		1.4
22	4	0	2.5		
23	4.8	0	NC		
24	1	0	2.9		
25	1.8	0	3.2		
26	5	4	NC		
27	5	4.9	NC		
28	9	5	NC		
29	5.2	5	NC		
30	1.6	GND	NC		
31	4.8	2.2	NC		
32	1.9	2.2	NC		
33	GND	0.2	NC		
34	1.2	0.2	NC		
35	2.9	5	NC		
36	5.2	4.8	NC		
37	2.5	5	NC		
38	2.5	3.2	NC		
39	2.9	0.3	NC		
40	7	0	NC		
41	1.6	0			
42	GND	5			
43	3.2				
44	2.3				
45	2.9				
46	4.9				
47	3.7				
48	4				
49	GND				
50	8				
51	8				
52	8.8				
53	4.6				
54	5.8				
55	8.8				
56	5.5				

NOTE : VOLTAGE ARE TAKEN UNDER TUNED CONDITION WITH
 SHARP : Maximum Position
 CONTRAST : Maximum Position
 BRIGHTNESS : Maximum Position
 COLOR : Maximum Position
 SIGNAL INPUT : 70dB $\pm$ 10dB
 CHANNEL SETTING : The Last Channel of UHF High
 SIGNAL PATTERN : Colour Bar

VOLTAGE TABLE FOR IC (ONLY FOR REFERENCES) (FOR 1P.TEXT)					
PIN NO. SYMBOL	IC401	IC402	IC201	IC901	IC301
1	GND	12.2	2	11.2	8.8
2	12.7	GND	2.1	GND	0
3	24.4	9	GND	5	0
4	0.9		5.2		0
5	0.9		GND		GND
6	24.3		7.5		10.4
7	1.2		15.3		0
8					0
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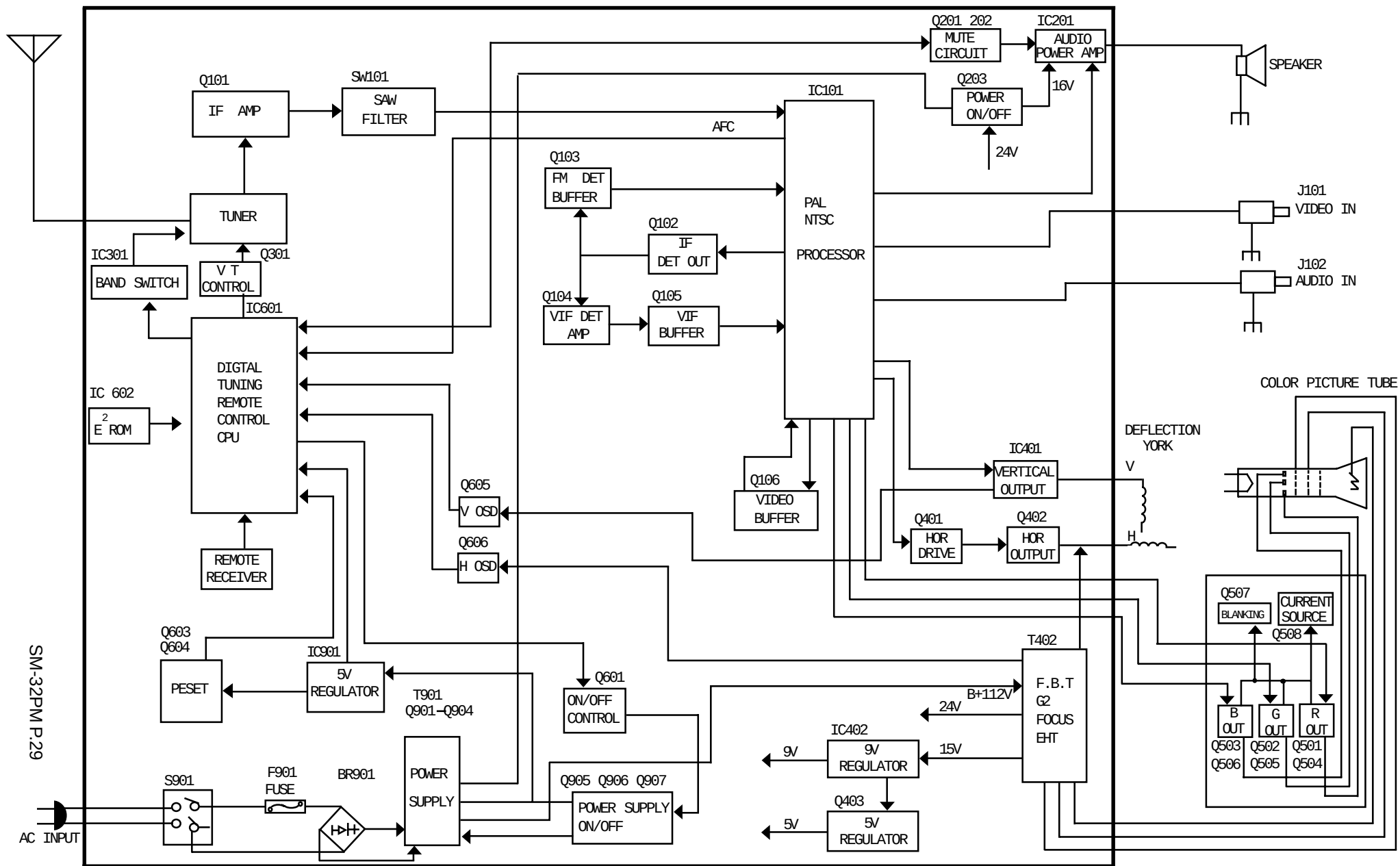
NOTE : VOLTAGE ARE TAKEN UNDER TUNED CONDITION WITH

CONTRAST : Maximum Position
 BRIGHNESS : Maximum Position
 COLOR : Maximum Position
 SIGNAL INPUT : 70dB $\pm$ 10dB
 CHANNEL SETTING : The Last Channel of UHF High
 SIGNAL PATTERN : Colour Bar

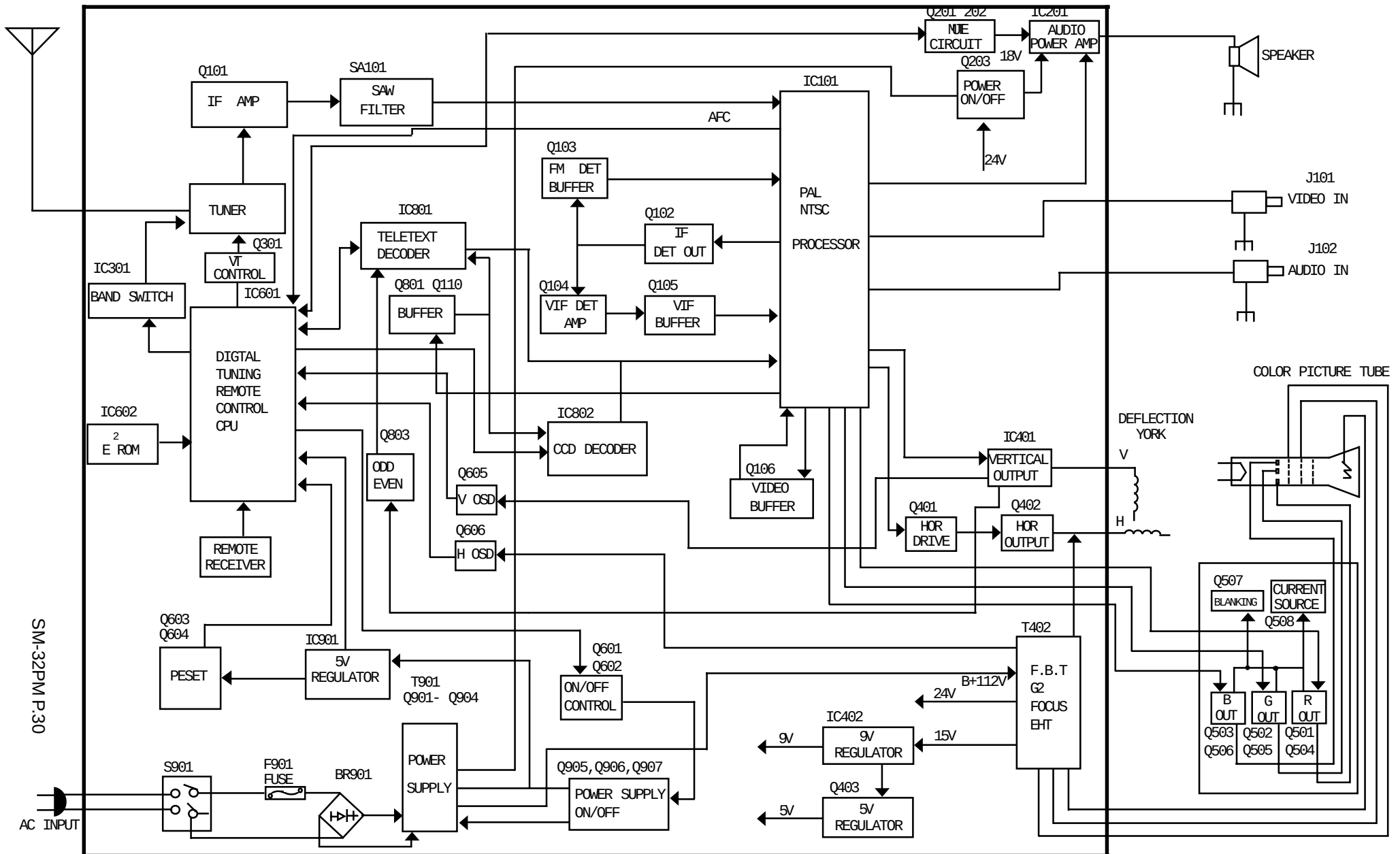
VOLTAGE TABLE FOR IC (ONLY FOR REFERENCES) (FOR 1P.TEXT)					
PIN NO.	SYMBOL	IC001	IC602		
1		GND	GND		
2		GND	GND		
3		2.4	GND		
4		4.4	GND		
5		0	5		
6		GND	5		
7		GND	0		
8		GND	5		
9		0			
10		0			
11		0			
12		4.4			
13		1.7			
14		4.4			
15		NC			
16		9			
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NOTE : VOLTAGE ARE TAKEN UNDER TUNED CONDITION WITH

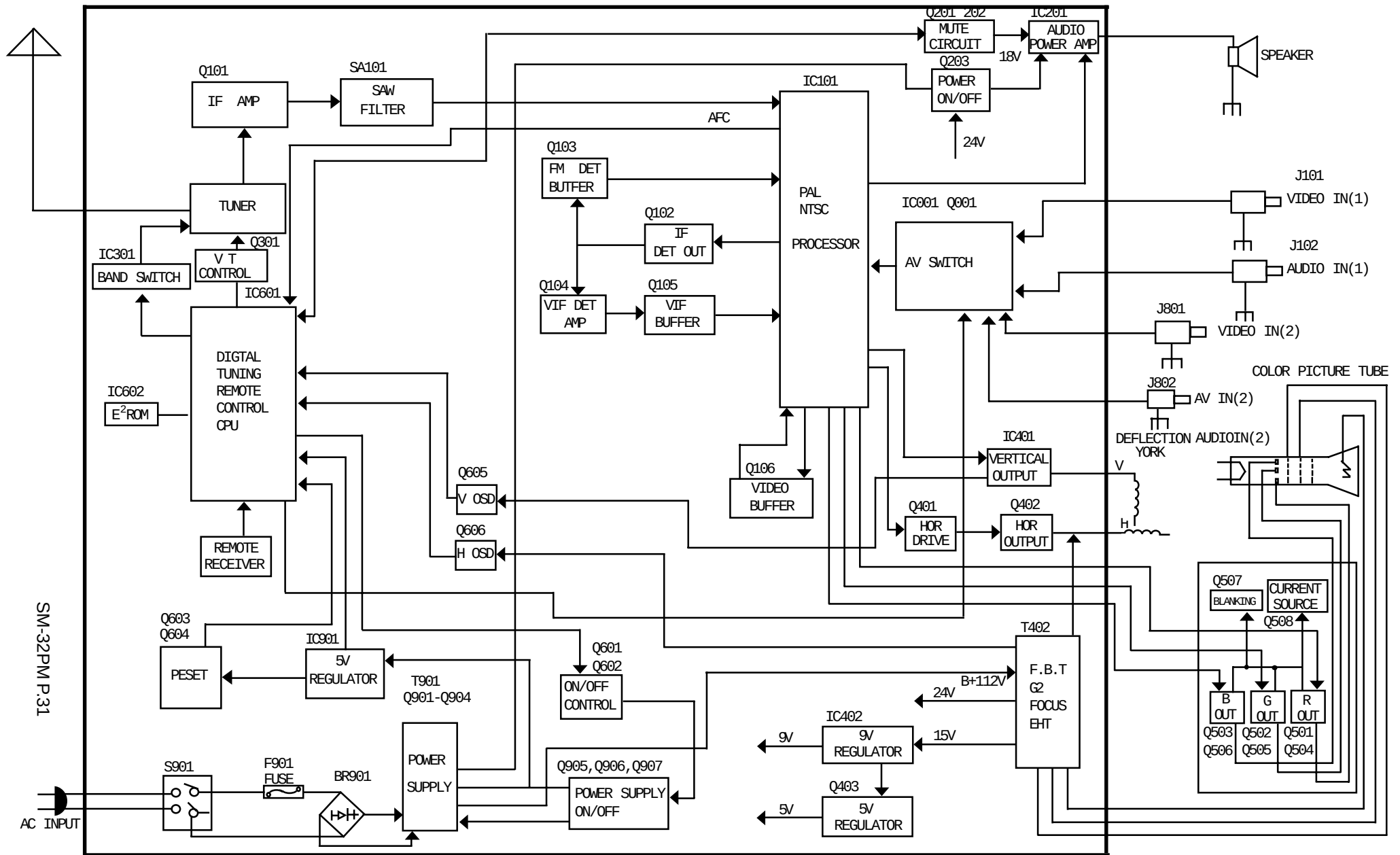
CONTRAST : Maximum Position
 BRIGHNESS : Maximum Position
 COLOR : Maximum Position
 SIGNAL INPUT : 70dB $\pm$ 10dB
 CHANNEL SETTING : The Last Channel of UHF High
 SIGNAL PATTERN : Colour Bar



**BLOCK DIAGRAM
FOR '14' MODEL**

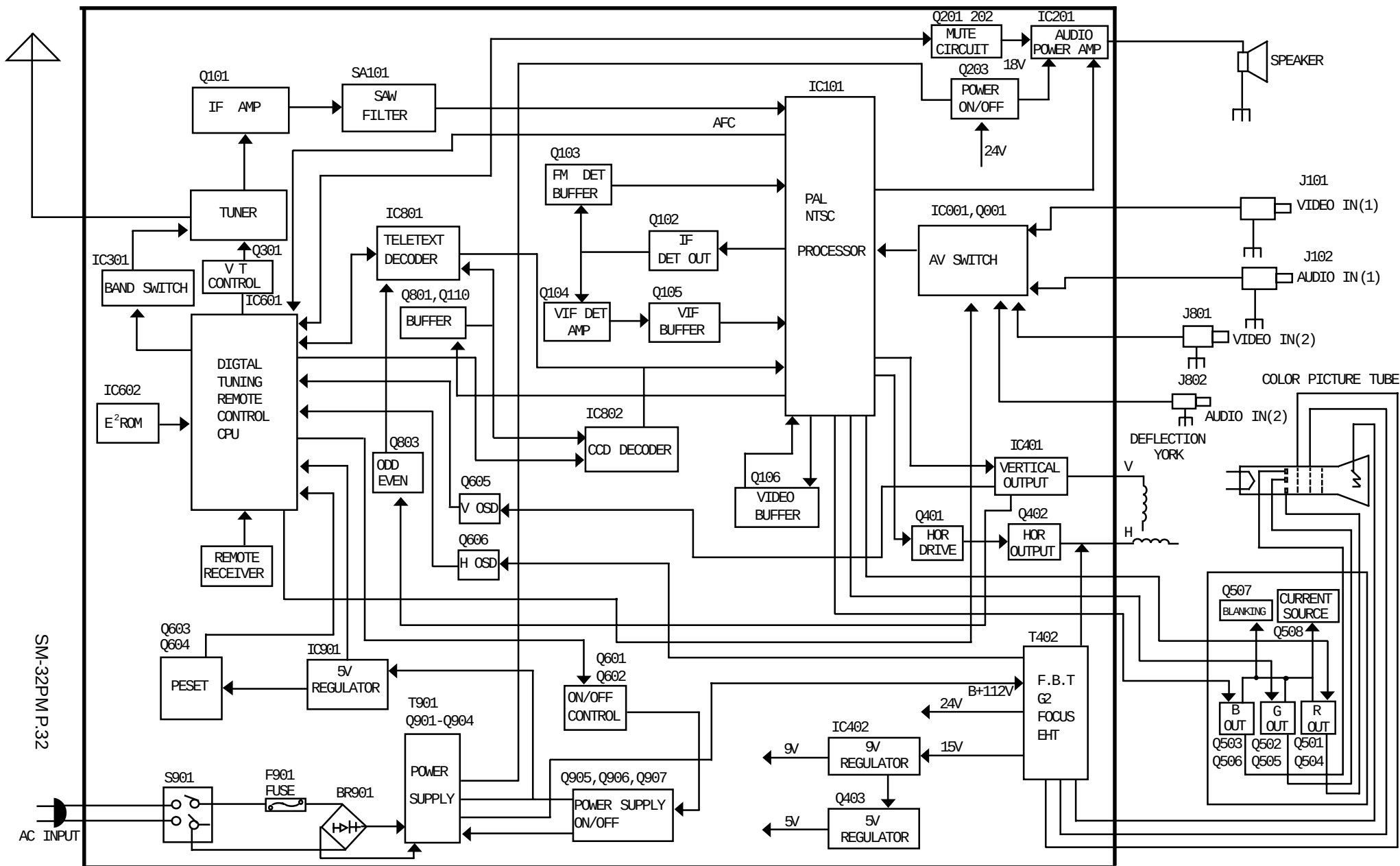


**BLOCK DIAGRAM
FOR '14' MODEL W TELETEXT & CCD**



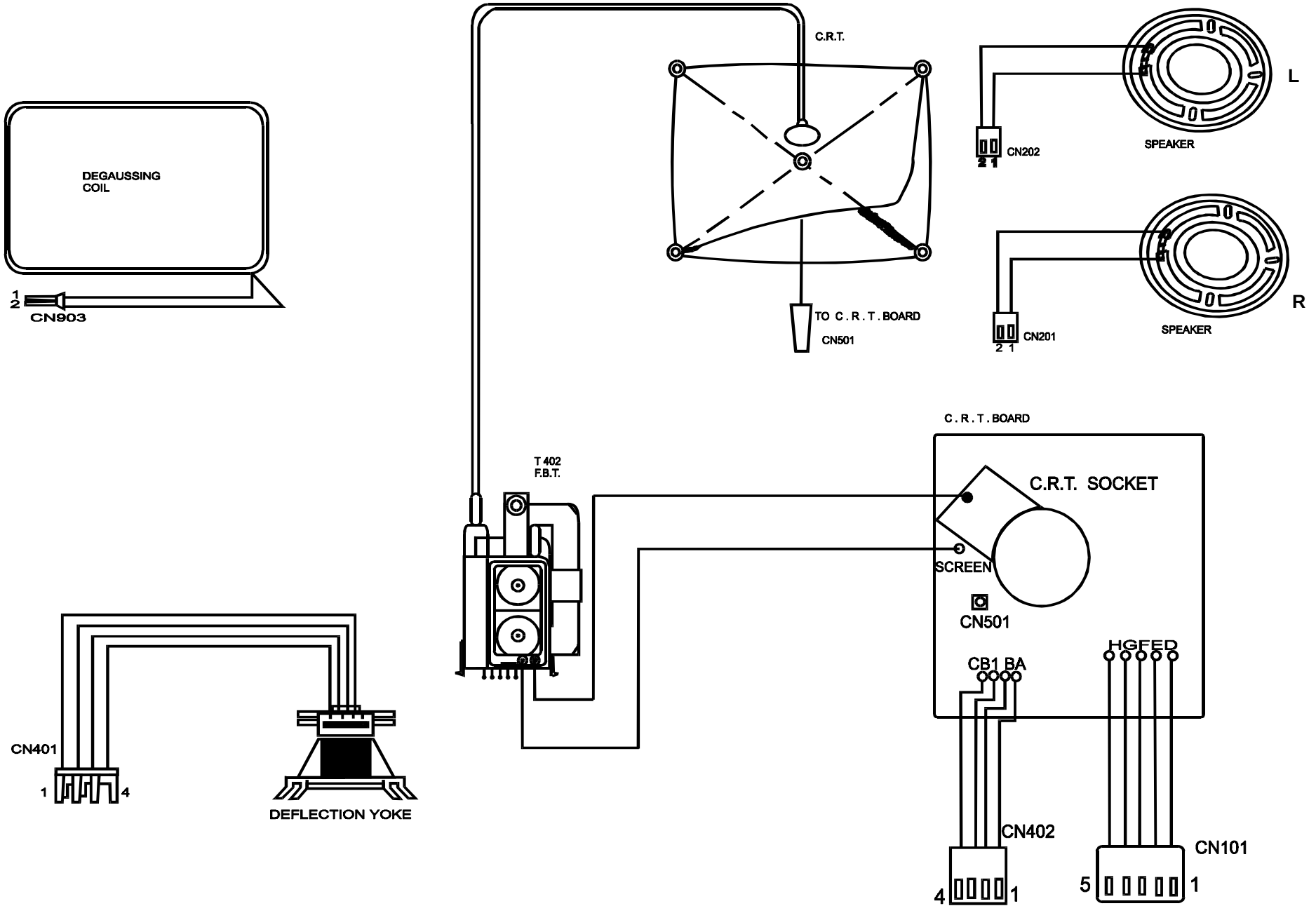
BLOCK DIAGRAM

FOR 20",21" MODEL



**BLOCK DIAGRAM
FOR 20",21" MODEL W TELETEXT & CCD**

WIRING DIAGRAM



PART_NO	DESC	QTY	LOCATION
155-R63311-07-03	REMOTE CONTROL		
107-800455-4G	RESONATOR 455 KHZ ET455Z PO	1	CF701
	CARBON FILM RESISTOR 2.2 OHM		
113-229105-17	1/4W +-5%	1	R701
	CARBON FILM RESISTOR 5.6K OHM		
113-562005-17	1/16W +-5%	1	R703
	CARBON FILM RESISTOR 6.8K OHM		
113-682005-17	1/16W +-5%	1	R702
	CERAMIC CAP. 100 PF 50V +-10%		
123-101350-60	(SL TYPE) "SMART GOOD"	2	C701,702
	ELECT CAP. 10 MFD 16V +-20%		
127-106042-0T	{TAPING} "NANTONG"	1	C703
130-134148-01	SILICON DIODE IN4148	7	D701-707
	INFRARED EMITTER EL-1L1		
130-600101-0G	KODENS HI "GUANG ZHOU	1	LED701
131-232001-00	TRANSISTOR 2SC2001L NEC	1	Q701
133-119028-14	I.C. TC9028AF-023 TOSHIBA	1	IC701
172-726000-99	BARE WIRE 54MM	0	W701
190-R63314-02	REMOTE P.C.B.(050199)	1	
	SELF-TAPPING SCREW 2.6 X 8 P/T		
516-260408-10	(HARDEN)	2	FOR HANDSET
774-R63301-00	BATTERY SPRING (+VE)	1	
774-R63302-00	BATTERY SPRING (-VE)	1	
774-R63303-00	BATTERY SPRING (+-VE)	1	
	POLYBAG 4" X 11" X 0.04MM W/RE-		
810-041104-13	CYCLING MARK	1	FOR HANDSET
849-R63301-00	KEY PAD {FULL 40 KEYS}	1	
	DIAL KEY PLATE - W/CCD/TXT/SYS		
892-R63330-01	(TOSHIBA lýC)(13 KEYS)	1	
	HANDSET TOP CAB.- MATT BLK W/		
900-R63302-55	SILVER 8001C S.S.{TOSHIBA lýC}	1	
	HANDSET BOTTOM CABINET -		
902-R63302-03	MATT BLACK SPRAYED	1	
	REMOTE BATTERY DOOR - TEAC		
910-R63301-0W	DESIGN {RC-747}{CT-M342H}(BLK)	1	
	VOLUME/CHANNEL KNOB -		
973-R63301-00	MOULDED BLACK	1	
	CRT 14" (SOUTHERN HEMISPHERE)		
002-114000-46	SAMSUNG	1	
	TUNER 38.9MHZ(BG) WSP{9V} #ENV		
003-131302-01	59D04F2E "MATSUSHITA" L.JACK	1	TUNER
102-372007-02	TANK COIL 45 MHZ KHIC-842607	1	T101
	FIXED INDUCTIVE COIL 1UH 10%		
105-109103-16	AL0305-1R0K "BOLUO DUIWANG"	1	L201
	SOUND TRAP CERAMIC FILTER		
107-105500-66	5.5MHZ WEI HAW	1	CF102

PART_NO	DESC	QTY	LOCATION
107-305500-16	SOUND BYPASS CERAMIC FILTER 5.5MHZ WEI HAW	1	CF101
107-738916-00	SAW FILTER TSF-5316 SANYO	1	SAW101
113-102005-17	CARBON FILM RESISTOR 1K OHM 1/16W +-5%	1	R159
113-103101-67	METAL FILM RESISTOR 10K OHM 1/4W +-1%	2	R306,305
113-151105-17	CARBON FILM RESISTOR 150 OHM 1/4W +-5%	1	R209
113-222005-17	CARBON FILM RESISTOR 2.2K OHM 1/16W +-5%	1	R158
113-332005-17	CARBON FILM RESISTOR 3.3K OHM 1/16W +-5%	1	R157
113-560005-17	CARBON FILM RESISTOR 56 OHM 1/16W +-5%	1	R162
113-750005-17	CARBON FILM RESISTOR 75 OHM 1/16W +-5%	1	R132
123-103370-90	CERAMIC CAP. 0.01 MFD 50V +80 -	2	C101,212
123-222466-50	CERAMIC CAP. 0.0022 MFD 400VAC +-20% ECKDNA222ME	1	C912
127-477042-0T	ELECT CAP. 470 MFD 16V +-20%	1	C145
131-231815-0A	{TAPING} "NANTONG"	2	Q108,109
160-102255-27	TRANSISTOR 2SC1815 TOSHIBA PIN CONNECTOR 2 PINS PLUG STRAIGHT (UL) (S.H.S)	1	CN202A
161-123502-00	STEREO HEADPHONE JACK 5 PIN 3.5MM #CK3-3.5 "CONIC"	1	EP201
161-381802-23	I.C. SOCKET 18 PINS "TRI-MARK"	1	FOR IC802
161-384002-00	I.C. SOCKET 40 PINS #2227227-40	1	FOR IC801
162-110010-00	ANTENNA MATCHING TRANSFORMER (300 OHM TO 75	1	
166-162030-0E	SPEARKER 3" 16 OHM 2W - 4W #Y60201A (AS300BU) "DONGTAI"	1	
171-550084-D1	7' SAA APP. LINE CORD W/PLUG E- CUTTING 45MM,15MM PVC HOLDER	1	
172-726000-99	BARE WIRE 54MM	0.3	R102,CN201,CN201 A,D304,C619
177-655123-02	FLAT CABLE 2 PIN L=120MM AWG26 UL2468	1	CN203 `1' TO CN204 `1', `2'TO`2'
177-655243-02	2 PIN FLAT CABLE WIRE L=240MM	1	FROM `CN202' `1'TO`G', `2'TO`G1'
179-105026-00	UL PVC TUBE 5 mm	0.4	400MM FOR SPK. WIRE
179-403080-00	SHRINKABLE TUBE	0	40MM FOR SOLDERING LUG

PART_NO	DESC	QTY	LOCATION
186-624500-11	HI-WATT SUPER HEAVY DUTY 1.5V 0% MERCURY 3A ER03X	2	
190-931302-07	SENSOR P.C.B.	1	FOR OPT601,LED601 CN202A `1' TO SPK. `+', `2' TO SPK. `-'
191-200044-10	2 PIN SOCKET ASS'Y L=440MM SELF-TAPPING SCREW 3 X 8 W/B/T (HARDEN)	1	FOR SPK. WIRE
515-303408-10	GIFT BOX - TEAC DESIGN {CT- M342H} W/O HANDLE	1	
610-931301-88			2PC R/L SIDES CTN,1PC ON R/LABEL,1PC
663-230164-99	SERIAL NO.LABEL - TEAC DESIGN RATING LABEL - TEAC DESIGN {CT- M342H} {240V}	4	WARRANTY CARD
669-881301-5U	INSTRUCTION MANUAL-TEAC DESIGN {CT-M342H} (100P.)	1	
670-931300-2B		1	STUCK ON "PAGE 6/9" OF EACH I/M
678-931301-25	I/MANUAL LABEL A - TEAC DESIGN	1	STUCK ON "PAGE 7/9" OF EACH I/M
678-931301-26	I/MANUAL LABEL B - TEAC DESIGN SCREEN STICKER - TEAC DESIGN {CT-M342H}	1	ATTACH TO THE TOP OF SCREEN
678-931306-20	TOTAL CARE LAEBL - TEAC (B) DESIGN	1	STUCK ON BACK CABINET
678-931315-07		1	
690-942039-02	WARRANTY CARD -TEAC (C)	1	
693-931301-22	EAN CODE LABEL - TEAC DESIGN {CT-M342H}	2	STUCK ON L & R SIDES FO EACH CTN.
750-063102-01	35MM SOLDERING LUG OD:7 ID:3.2 LEG:4X35MM	1	FOR SPK. CONNECTOR
800-931305-00	POLYFOAM (1)	1	
800-931306-00	POLYFOAM (2)	1	
800-931307-00	POLYFORM (3)	1	
800-931308-00	POLYFOAM (4)	1	
810-091504-13	POLYBAG 9" X 15" X 0.04MM W/ RE- CYCLING P.E.MARK	1	FOR I/MANUAL
810-303004-61	POLYBAG 30"X30"X0.04MM W/PUNCH TEAC DESIGN (CT-M341	1	FOR UNIT
826-221505-00	FOAM SHEET 22" X 15" X 0.5MM	1	FOR UNIT
884-881303-01	JACK PLATE - W/AV IN/WHITE SS PRESET PLATE - TEAC DESIGN {W/HEADPHONE JACK}	1	FOR REAR CAB.
884-931325-02		1	
889-931302-00	COVER PLATE (PAL)	1	FOR REAR CAB.

PART_NO	DESC	QTY	LOCATION
889-931304-00	COVER PLATE - W/O BAND SW. AND TACT SW. HOLE	1	FOR REAR CAB.
900-931301-10	FRONT CABINET (A) - METALLIC GREY (8403C) SPRAYED	1	
902-931308-U1	REAR CAB.-METALLIC GREY{8403C}	1	
917-931301-00	W/SINGLE SPEAKER {181 TUNER}	1	
919-931302-40	REMOTE LENS (A-A) TRANSLUCENT	1	
	PRESET DOOR (A-A) -TEAC DESIGN	1	
	{CT-M342H} METALLIC GREY 8403C	1	
930-931302-14	FRONT PANEL (A-B) (PAL) - TEAC	1	FOR REAR CAB.
986-931301-06	DESIGN METALLIC GREY (8403C)	1	
	NAME PLATE - TEAC DESIGN	1	
991-931301-05	POWER KNOB (A-A) - METALLIC GREY {8403C}	1	
180-9313T1-35-CP	COMPLETE PCB		
001-214190-10	14" FLYBACK P.X'FORMER JF0501- 1903 "SHEKOU JEWEL" (BIG SIZE)	1	T402
008-550151-05	DEGAUSSING COIL 40T (W/FIVE LAYERS OF TAPE)	1	
012-102340-0B	SEMI-FIXED RES. WI06-2AL-1K "SHENZHEN YUNGJIANG"	1	VR901
101-191009-96	HORIZONTAL DRIVE	1	
101-288820-95	TRANSFORMER (R1009)	1	T401
	LINE FILTER 70MH	1	L901
101-414214-94	SWITCHING POWER	1	
	TRANSFORMER HL4025B	1	T901
105-109103-16	FIXED INDUCTIVE COIL 1UH 10%	1	
	AL0305-1R0K "BOLUO DUIWANG"	1	L101
105-201106-02	CHOKER COIL 200UH 10% CH9012- 201K (ELEC PRODUCT)	1	L902
105-330101-02	FIXED INDUCTIVE COIL 33uH +-10 %	1	L601
105-399103-08	FIXED INDUCTIVE COIL 3.9 UH +- 10% (WITTIS)	1	L801
105-479103-16	FIXED INDUCTIVE COIL 4.7UH 10%	1	
	AL0305-4R7K "BOLUO DUIWANG"	1	L301
105-560103-16	FIXED INDUCTIVE COIL 56UH +-10%	1	
105-569103-08	AL0305 "BOLUO DUIWANG"	1	L102
105-650152-29	FIXED INDUCTIVE COIL 5.6UH +-10%	1	L103
	LINEARITY COIL 65UH TW52-03	1	L401
105-829103-08	FIXED CONDUCTOR COIL 8.2 UH +- 10% AXIAL	1	L104
113-100005-17	CARBON FILM RESISTOR 10 OHM 1/16W +-5%	2	R602,802
113-100105-42	FUSING RESISTOR 10 OHM 1/4W +- CARBON FILM RESISTOR 100 OHM	1	R428
113-101005-17	1/16W +-5%	1	R117

PART_NO	DESC	QTY	LOCATION
			R124,146,145,401,402,601,606,607,646,311,303
113-102005-17	CARBON FILM RESISTOR 1K OHM 1/16W +-5%	11	
113-102005-17	CARBON FILM RESISTOR 1K OHM 1/16W +-5%	8	R614,615,633,634,635,636,637,638
113-102005-17	CARBON FILM RESISTOR 1K OHM 1/16W +-5%	3	R808,320,806
113-102105-17	CARBON FILM RESISTOR 1K OHM 1/4W +-5%	2	R525,156
113-102205-12	CARBON FILM RESISTOR 1K OHM 1/2W +-5%	1	R436
113-103005-17	CARBON FILM RESISTOR 10K OHM 1/16W +-5%	8	R109,123,122,151,206,432,433,641
113-103005-17	CARBON FILM RESISTOR 10K OHM 1/16W +-5%	7	R643,649,648,644,301,307,308
113-103005-17	CARBON FILM RESISTOR 10K OHM 1/16W +-5%	4	R816,661,135,824
113-103101-67	METAL FILM RESISTOR 10K OHM 1/4W +-1%	1	R803
113-103105-17	CARBON FILM RESISTOR 10K OHM 1/4W +-5%	2	R908,928
113-103205-12	CARBON FILM RESISTOR 10K OHM 1/2 +-5%	2	R419,434
113-104005-17	CARBON FILM RESISTOR 100K OHM 1/16W +-5%	1	R208
113-104205-12	CARBON FILM RESISTOR 100K OHM 1/2W +-5%	2	R431,921
113-104305-75	METAL OXIDE FILM RESISTOR 100K OHM 1W +-5%	1	R931
113-109405-42	NON-FLAMMABLE FUSE RESISTOR 1 OHM 2W +-5%	1	R501
113-113005-12	CARBON FILM RESISTOR 11K OHM 1/16W +-5%	2	R621,624
113-120305-75	METAL OXIDE FILM RESISTOR 12 OHM 1W +-5%	1	R912
113-120405-75	METAL OXIDE FILM RESISTOR 12 OHM 2W +-5%	1	R919
113-121005-17	CARBON FILM RESISTOR 120 OHM 1/16W +-5%	1	R104
113-122005-17	CARBON FILM RESISTOR 1.2K OHM 1/16W +-5%	3	R656,657,658
113-122205-12	CARBON FILM RESISTOR 1K2 OHM 1/2W +-5%	3	R517,518,519
113-123005-17	CARBON FILM RESISTOR 12K OHM 1/16W +-5%	2	R143,820

PART_NO	DESC	QTY	LOCATION
113-124005-17	CARBON FILM RESISTOR 120K OHM 1/16W +-5%	2	R112,413
113-150105-17	CARBON FILM RESISTOR 15 OHM 1/4W +-5%	1	R521
113-151005-17	CARBON FILM RESISTOR 150 OHM 1/16W +-5%	1	R412
113-151405-75	METAL OXIDE FILM RESISTOR 150 OHM 2W +-5%	1	R160
113-152005-17	CARBON FILM RESISTOR 1.5K OHM 1/16W +-5%	4	R127,129,613,814
113-153005-17	CARBON FILM RESISTOR 15K OHM 1/16W +-5%	1	R630
113-181105-17	CARBON FILM RESISTOR 180 OHM 1/4W +-5%	1	R148
113-182105-17	CARBON FILM RESISTOR 1.8K OHM 1/4W +-5%	1	R906
113-183405-75	METAL OXIDE FILM RESISTOR 18K OHM 2W +-5%	3	R502,503,504
113-184205-12	CARBON FILM RESISTOR 180K OHM 1/2W +-5%	1	R418
113-189305-75	METAL OXIDE FILM RESISTOR 1.8 OHM 1W +-5%	1	R407
113-202605-75	METAL OXIDE FILM RESISTOR 2K OHM 5W +-5%	1	R417
113-204005-17	CARBON FILM RESISTOR 200K OHM 1/16W +-5%	1	R403
113-221005-17	CARBON FILM RESISTOR 220 OHM 1/16W +-5%	4	R114,119,429,180
113-222005-17	CARBON FILM RESISTOR 2.2K OHM 1/16W +-5%	3	R133,645,144
113-222105-17	CARBON FILM RESISTOR 2.2K OHM 1/4W +-5%	1	R925
113-223005-17	CARBON FILM RESISTOR 22K OHM 1/16W +-5%	5	R204,817,622,625,8 23
113-223105-17	CARBON FILM RESISTOR 22K OHM 1/4W +-5%	1	R424
113-224005-17	CARBON FILM RESISTOR 220K OHM 1/16W +-5%	1	R304
113-229105-17	CARBON FILM RESISTOR 2.2 OHM 1/4W +-5%	2	R202,138
113-229105-42	FUSING RESISTOR 2.2 OHM 1/4W +- CARBON FILM RESISTOR 2.2 OHM	1	R163
113-229205-12	1/2W +-5%	1	R116
113-229405-75	METAL OXIDE FILM RESISTOR 2.2 OHM 2W +-5%	1	R903

PART_NO	DESC	QTY	LOCATION
113-270405-75	METAL OXIDE FILM RESISTOR 27 OHM 2W +-5%	1	R913
113-271005-17	CARBON FILM RESISTOR 270 OHM 1/16 W +-5%	5	R121,164,165,166,181
113-271105-17	CARBON FILM RESISTOR 270 OHM 1/4W +-5%	3	R603,604,155
113-272005-17	CARBON FILM RESISTOR 2.7K OHM 1/16W +-5%	2	R147,655
113-272105-17	CARBON FILM RESISTOR 2.7K OHM 1/4W +-5%	1	R523
113-272205-12	CARBON FILM RESISTOR 2.7K OHM 1/2W +-5%	3	R416,409,920
113-273005-17	CARBON FILM RESISTOR 27K OHM 1/16W +-5%	2	R804,174
113-303005-17	CARBON FILM RESISTOR 30K OHM 1/16W +-5%	1	R110
113-330005-17	CARBON FILM RESISTOR 33 OHM 1/16W +-5%	1	R106
113-331005-17	CARBON FILM RESISTOR 330 OHM 1/16W +-5%	2	R118,126
113-331105-17	CARBON FILM RESISTOR 330 OHM 1/4W +-5%	1	R909
113-332005-17	CARBON FILM RESISTOR 3.3K OHM 1/16W +-5%	2	R801,807
113-332105-17	CARBON FILM RESISTOR 3.3K OHM 1/4W +-5%	1	R905
113-333005-17	CARBON FILM RESISTOR 33K OHM 1/16W +-5%	5	R618,619,642,312,313
113-334305-75	METAL OXIDE FILM RESISTOR 330K OHM 1W +-5%	1	R914
113-338405-75	METAL OXIDE FILM RESISTOR 0.33 OHM 2W +-5%	1	R916
113-339505-75	METAL OXIDE FILM RESISTOR 3.3 OHM 3W +-5%	1	R201
113-390405-75	METAL OXIDE FILM RESISTOR 39 OHM 2W +-5%	1	R930
113-390605-75	METAL OXIDE FILM RESISTOR 39 OHM 5W +-5%	1	R917
113-392005-17	CARBON FILM RESISTOR 3.9K OHM 1/16W +-5%	3	R809,810,811
113-393005-17	CARBON FILM RESISTOR 39K OHM 1/16W +-5%	1	R207
113-470005-17	CARBON FILM RESISTOR 47 OHM 1/16W +-5%	1	R609

PART_NO	DESC	QTY	LOCATION
113-471005-17	CARBON FILM RESISTOR 470 OHM 1/16W +-5%	3	R105,125,812
113-471205-12	CARBON FILM RESISTOR 470 OHM 1/2W +-5%	1	R408
113-472005-17	CARBON FILM RESISTOR 4.7K OHM 1/16W +-5%	1	R302
113-472105-17	CARBON FILM RESISTOR 4.7K OHM 1/4W +-5%	4	R520,911,631,632
113-473005-17	CARBON FILM RESISTOR 47K OHM 1/16W +-5%	1	R134
113-479605-51	WIRE WOUND CEMENT RES. 4.7 OHM 5W +-5%	1	R902
113-519505-75	METAL OXIDE FILM RESISTOR 5.1 OHM 3W +-5%	1	R427
113-560105-17	CARBON FILM RESISTOR 56 OHM 1/4W +-5%	1	R526
113-561005-17	CARBON FILM RESISTOR 560 OHM 1/16W +-5%	1	R411
113-561105-17	CARBON FILM RESISTOR 560 OHM 1/4W +-5%	3	R505,506,507
113-562005-17	CARBON FILM RESISTOR 5.6K OHM 1/16W +-5%	1	R210
113-563005-17	CARBON FILM RESISTOR 56K OHM 1/16W +-5%	3	R108,404,205
113-565210-99	CARBON COMPOSITION RESISTOR 5.6M OHM 1/2W +-10%	2	R923,924
113-680005-17	CARBON FILM RESISTOR 68 OHM 1/16W +-5%	1	R178
113-681005-17	CARBON FILM RESISTOR 680 OHM 1/16W +-5%	1	R103
113-681105-17	CARBON FILM RESISTOR 680 OHM 1/4W +-5%	2	R524,522
113-681305-75	METAL OXIDE FILM RESISTOR 680 OHM 1W +-5%	1	R423
113-682005-17	CARBON FILM RESISTOR 6.8K OHM 1/16W +-5%	2	R805,323
113-682102-17	CARBON FILM RESISTOR 6.8K OHM 1/4W +-2%	1	R904
113-682105-17	CARBON FILM RESISTOR 6.8K OHM 1/4W +-5%	3	R910,608,612
113-682505-75	METAL OXIDE FILM RESISTOR 6.8K OHM 3W +-5%	1	R161
113-683005-17	CARBON FILM RESISTOR 68K OHM 1/16W +-5%	6	R405,406,173,623,6 26,410
113-688205-42	FUSING RESISTOR 0.68 OHM 1/2W +	2	R421,918

PART_NO	DESC	QTY	LOCATION
113-688305-42	FUSING RESISTOR 0.68 OHM 1W +- CARBON FILM RESISTOR 75 OHM	2	R422,929
113-750005-17	1/16W +-5% CARBON FILM RESISTOR 82 OHM	1	R136
113-820005-17	1/16W +-5% CARBON FILM RESISTOR 820 OHM	2	R101,435
113-821005-17	1/16W +-5% CARBON FILM RESISTOR 820 OHM	1	R169 R508,509,510,511,5
113-821105-17	1/4W +-5% CARBON FILM RESISTOR 8.2K OHM	6	12,513
113-822005-17	1/16W +-5% CARBON FILM RESISTOR 8.2K OHM	1	R822
113-822105-17	1/4W +-5% CARBON FILM RESISTOR 820K OHM	1	R907
113-824005-17	1/16W +-5% CARBON FILM RESISTOR 9.1K OHM	1	R115
113-912105-17	1/4W +-5%	1	R321
114-210200-01	THERMISTOR (NICHICON ZPB53 BL	1	TH901
123-100340-60	CERAMIC CAP. 10PF +-5% 50V (SL	1	C802
123-100340-93	CERAMIC CAP. 10 PF 50V +-5%	1	C605
123-101350-60	CERAMIC CAP. 100 PF 50V +-10% (SL TYPE) "SMART GOOD"	4	C444,616,121,301
123-102350-90	CERAMIC CAP. 0.001 MFD 50V +- 10% (B TYPE)	2	C138,804 C104,105,106,122,1
123-103370-90	CERAMIC CAP. 0.01 MFD 50V +80 - 20%	10	29,141,609,161,402, 443
123-103370-90	CERAMIC CAP. 0.01 MFD 50V +80 -	3	C117,324,320 C132,151,152,153,1
123-104270-90	CERAMIC CAP. 0.1 MFD 25V +80 - 20%	12	59,155,433,434,162, 920,116,817
123-104270-90	CERAMIC CAP. 0.1 MFD 25V +80 - 20%	9	C163,611,801,806,8 07,810,112,620,621
123-120340-93	CERAMIC CAP. 12PF 50V +-5%	1	C124
123-122350-90	CERAMIC CAP. 1200 PF 50V +-10% (B TYPE)	1	C406
123-122550-95	CERAMIC CAP. 1200PF 500V +-10% "YINAN DON'S"	1	C416
123-150340-93	CERAMIC CAP. 15 PF 50V +-5%	1	C803
123-221551-90	CERAMIC CAP. 220 PF 500V +-10% MATSUSHITA	1	C913
123-222850-10	CERAMIC CAP. 0.0022 MFD 2KV +- 10% MATSUSHITA	2	C421,911
123-330340-93	CERAMIC CAP. 33 PF 50V +-5% (NPO)	2	C602,603

PART_NO	DESC	QTY	LOCATION
123-391355-60	CERAMIC CAP. 390PF 50V +-10% (SL TYPE) "CHENGDU WANGMING"	3	C504,505,506
123-470340-60	CERAMIC CAP. 47 PF 50V +-5% (SL	2	C142,143
123-471850-10	CERAMIC CAP. 470 PF 2KV +-10% MATSUSHITA	1	C420
123-472552-90	CERAMIC CAP. 0.0047 MFD 500V +- 10% (B TYPE) SMALL SIZE	3	C903,904,905
123-472552-95	CERAMIC CAP. 0.0047 MFD 500V +- 10% (B TYPE) "YINAN DON'S"	4	C425,426,441,915
123-509340-93	CERAMIC CAP. 5 PF 50V +-5% (NPO)	1	C604
123-821850-10	CERAMIC CAP. 820 PF 2KV +-10% (SL TYPE) MATSUSHITA	2	C501,916
124-224061-03	TANTALIUM CAP. 0.22 MFD 35V +- C208,209,404,617,1	2	C126,130
126-102071-01	MYLAR CAP. 0.001 MFD 50V +-10%	5	31
126-103071-01	MYLAR CAP. 0.01 MFD 50V +-10%	1	C108
126-104071-01	MYLAR CAP. 0.1 MFD 50V +-10% POLYPROPYLENE CAP. 0.1 MFD	6	C148,203,326,327,8 08,910
126-104101-35	100V +-10% "XIAMEN FALA"	1	C423
126-152071-01	MYLAR CAP. 0.0015 MFD 50V +-10%	2	C120,412
126-222071-01	MYLAR CAP. 0.0022 MFD 50V +-10%	1	C125
126-224071-01	MYLAR CAP 0.22 MFD 50V +-10% POLYPROPYLENE CAP. 0.27 MFD	4	C407,303,304,302
126-274201-31	200V +-10%	1	C418
126-333071-01	MYLAR CAP. 0.033 MFD 50V +-10%	2	C321,907
126-472071-01	MYLAR CAP. 0.0047 MFD 50V +-10% METALIZED POLY.CAP. 0.0047 MFD	1	C149
126-472160-45	1600V +-5% "XIAMEN FALA"	1	C422
126-473071-01	MYLAR CAP. 0.047 MFD 50V +-10% METALIZED POLYPROPYLENE CAP.	1	C413
126-473222-41	0.047 MFD 275V +-20% "OKAYA"	1	C902
126-474071-01	MYLAR CAP. 0.47 MFD 50V +-10% METALIZED POLY.CAP. 0.47 MFD	1	C403
126-474222-45	275VAC +-20% "XIAMEN FALA"	1	C901
126-563071-01	MYLAR CAP. 0.056 MFD 50V +-10%	1	C408
126-682071-01	MYLAR CAP. 0.0068 MFD 50V +-10%	1	C809
126-683071-01	MYLAR CAP. 0.068 MFD 50V +-10% ELECT CAP. 1 MFD 50V +-20%	1	C811
127-105072-0T	{TAPING} "NANTONG" ELECT CAP. 1 MFD 160V +-20%	7	C107,123,205,401,3 22,323,136
127-105132-07	"NICHICON" ELECT CAP. 10 MFD 16V +-20%	1	C419
127-106042-0T	{TAPING} "NANTONG"	7	C128,204,146,207,1 37,601,325
127-106072-03	ELECT. CAP. 10 MFD 50V +-20%	2	C446,210

PART_NO	DESC	QTY	LOCATION
127-106104-0D	ELECT CAP. 10 MFD 100V +-20% 105øC "NANTONG"	1	C909
127-106252-08	ELECT CAP. 10 MFD 250V +-20% "JAMICON"	1	C424
127-107042-0D	ELECT CAP. 100 MFD 16V +-20% "NAM TUNG"	9	C111,437,503,154,1 15,133,158,610,805
127-107062-08	ELECT CAP. 100 MFD 35V +-20% "JAMICON"	1	C405
127-107132-07	ELECT. CAP. 100 MFD 160V +-20% "NICHICON"	2	C917,918
127-107402-0H	ELECT CAP. 100 MFD 400V +-20% "SHENZHEN JIGUANG"	1	C906
127-225071-0D	ELECT CAP. 2.2 MFD 50V +-10% (TIME CONSTANT) "NANTONG"	1	C409
127-225072-06	ELECT CAP. 2.2 MFD 50V +-20% {TAPING TYPE}	3	C306,307,308
127-226042-0T	ELECT CAP. 22 MFD 16V +-20% {TAPING} "NANTONG"	4	C127,206,510,618
127-227062-08	ELECT CAP. 220 MFD 35V +-20% "JAMICON"	1	C914
127-228052-0D	ELECT CAP. 2200 MFD 25V +-20% "NAM TUNG"	3	C410,432,202
127-336042-0T	ELECT CAP. 33 MFD 16V +-20% {TAPING} "NANTONG"	3	C165,815,813
127-474072-08	ELECT CAP. 0.47 MFD 50V +-20% "JAMICON"	4	C150,134,512,135
127-475072-0T	ELECT CAP. 4.7 MFD 50V +-20% {TAPING} "NANTONG"	2	C110,427
127-476042-0D	ELECT CAP. 47 MFD 16V +-20% "NAM TUNG"	3	C211,436,608
127-476094-0D	ELECT CAP. 47 MFD 63V +-20% 105øC "NANTONG"	1	C908
127-476094-0D	ELECT CAP. 47 MFD 63V +-20% 105øC "NANTONG"	1	C213
127-477042-0T	ELECT CAP. 470 MFD 16V +-20% {TAPING} "NANTONG"	5	C201,435,511,156,9 21
127-477062-06	ELECT CAP. 470 MFD 35V +-20% {TAPING TYPE}	1	C411
130-130138-00	SILICON DIODE 1SS138 ROHM	2	D506,101
130-130146-00	SILICON DIODE 1SS146 ROHM	3	D501,502,503 D201,202,203,204,4 03,504,505,602,801,
130-134148-01	SILICON DIODE IN4148	12	802,803,804

PART_NO	DESC	QTY	LOCATION
			D805,806,807,808,3
130-134148-01	SILICON DIODE IN4148	7	01,302,809
130-310012-00	RECTIFIER DIODE RU2 SANKEN	1	D405
130-310033-50	DIODE BYD33D	1	D910
130-310095-50	DIODE BYW95B	1	D911
130-310133-50	DIODE BYD33J	3	D907,908,909
130-311441-64	BRIDGE RECTIFIER 1J4B41	1	D901
			D401,402,404,406,9
130-315295-00	RECTIFIER DIODE S5295G TOSHIBA	7	12,913,914
130-410039-01	ZENER DIODE 3.9V	2	ZD102,601
130-410051-01	ZENER DIODE 5.1V 1/2W +-5%	1	ZD106
130-410056-01	ZENER DIODE 5.6V	1	ZD402
130-410082-01	ZENER DIODE 8.2V	1	D905
130-410574-00	ZENER DIODE UPC 574J NEC	1	ZD101
			ZD103,104,105,107,
130-411091-01	ZENER DIODE 9.1V	6	401,906
	LED LAMPS 3MM RED (ROUND)		
130-513144-00	#03144PR "GLORY"	1	LED601
131-170547-02	TRANSISTOR BC547B PHILIPS	2	Q901,903
131-170557-02	TRANSISTOR BC 557B PHILIPS	1	Q902
131-211013-15	TRANSISTOR 2SA1013(O) TOSHIBA	1	Q906
131-211015-00	TRANSISTOR 2SA1015 TOSHIBA	4	Q104,106,201,508
131-231809-0A	TRANSISTOR 2SC1809 ROHM	1	Q101
			Q102,103,105,202,5
			04,505,506,601,603,
131-231815-0A	TRANSISTOR 2SC1815 TOSHIBA	11	604,605
131-231815-0A	TRANSISTOR 2SC1815 TOSHIBA	4	Q606,801,803,110
	NPN-TR 2SC2230A-Y (TOSHI) TO92		
131-232230-00	VCE=180V IC=.1A HFE=120-240	1	Q905
131-232335-30	TRANSISTOR 2SC2335 L/K NEC	1	Q907
			Q401,501,502,503,5
131-232482-0A	TRANSISTOR 2SC2482 TOSHIBA	5	07
131-240400-00	TRANSISTOR 2SD400E/F SANYO	1	Q403
131-241545-00	TRANSISTOR 2SD1545 TOSHIBA	1	Q904
131-241554-00	TRANSISTOR 2SD1554 TOSHIBA	1	Q402
131-241761-00	TRANSISTOR 2SD1761(E) ROHM	1	Q203
131-462369-00	TRANSISTOR PH2369 PHILIPS	1	Q301
133-101238-14	I.C. TB1238AN TOSHIBA	1	IC101
133-102404-31	I.C. M24C04B6 SGS-THOMSON	1	IC602
133-107910-16	IC LA7910 SANYO	1	IC301
133-207805-31	I.C. L7805CV SGS	1	IC901
133-207809-31	REGULATOR 7809 9V SGS	1	IC402
	I.C. TA8213K AUDIO POWER AMP.		
133-208213-14	TOSHIBA	1	IC201
133-208403-14	I.C. TA8403K TOSHIBA	1	IC401

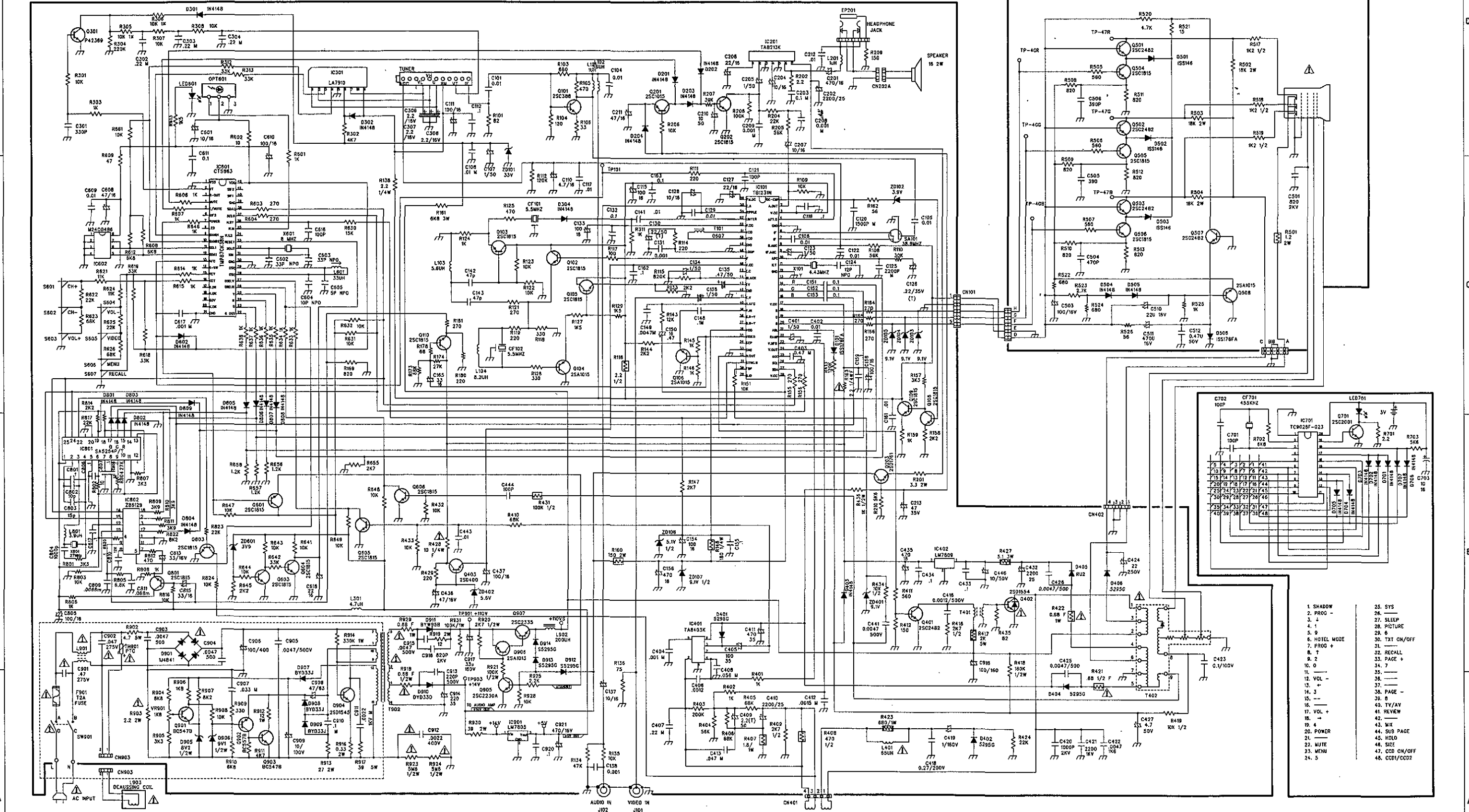
PART_NO	DESC	QTY	LOCATION
133-328738-14	I.C. TMP87CM38KS-3663 W/CCD & TXT TOSHIBA REMOTE RECEIVER GP1U281R	1	IC601
136-501281-00	"SHARP-ROXY"	1	OPT601
137-270000-30	CRYSTAL 27 MHZ HOORAY	1	X801
137-443618-20	CRYSTAL 4.43 MHz "TEC"	1	X101
137-800000-20	CRYSTAL 8.0 MHZ KITRONICS	1	X601
146-100002-13	TACT SWITCH KSM0634A HDK POWER SWITCH PS5E-B "CHINA LANDMARK"	7	S601,602,603,604,6 05,606,607
146-100006-14	LANDMARK"	1	S901
160-101001-08	PIN CONNECTOR 1 PIN PLUG	3	CN501,901,902
160-102805-08	PIN CONNECTOR 2 PIN PLUG	1	CN903
160-104805-08	PIN CONNECTOR 4 PIN PLUG	1	CN401
160-105255-27	PIN CONNECTOR 5 PINS WAFER 2.5 RCA JACK HYJ-032-03BB BLACK	1	CN101
161-470002-00	"MING FUNG" RCA JACK HYJ-032-03BY YELLOW	1	J102
161-470003-00	"MING FUNG"	1	J101
161-540003-03	CRT SOCKET GZS8-6-4A UL 1007 TOP COAT WIRE #26 60MM	1	W063 TO SHIELD
172-626006-40	BLACK 5 x 5 mm UL 1007 TOP COAT WIRE AWG 26	1	CAN COVER Q904 LUG TO MAIN
172-626008-40	80MM BLACK 10 X 10 MM	1	PCB `L' W002-009,011- 061,063-074,077- 078,080-085,088-
172-726000-99	BARE WIRE 54MM	5.8	098 W099-104,106- 109,501-
172-726000-99	BARE WIRE 54MM	0	505,D507,R111
172-830120-99	FLAT BRIDED WIRE	0.8	FOR CRT GROUND 20-BR901, 20-D911, 20-D405, 20-R926,
179-001010-00	OIL SLEEVING 1 mm DIA.	0.1	10-D406 L=120MM- AC LINE CORD, 120MM- TWO 1PIN SOCK
179-105000-00	UL PVC TUBE 5mm DIA	0.2	ASS L=50MM FOR AC
179-110500-00	UL PVC TUBE 11MM DIA.	0.1	LINE CORD 60MM FOR AC LINE,60MM FOR TWO 1 PIN SOCK
179-403080-00	SHRINKABLE TUBE	0.1	ASS'Y
182-222000-03	FUSE T2A 250V	1	F901

PART_NO	DESC	QTY	LOCATION
190-931305-00	CRT P.C.B. (190698) (NARROW	1	
190-931329-P1	MAIN P.C.B. (050799)REV4	1	
191-100034-10	1 PIN SOCKET ASS'Y L=220MM (DOUBLE INSOLATION) BLACK	1	CRT GND TO CN501
191-101016-10	1 PIN DOUBLE INSOLATION WIRE AWG 18 L=340MM BLUE	1	FROM CN901 TO `A' ON MAIN P.C.B.
191-101017-10	1 PIN DOUBLE INSOLATION WIRE AWG 18 L=340MM BROWN	1	FROM CN902 TO `B' ON MAIN P.C.B.
191-401038-10	4 PIN SOCKET ASS'Y L=360MM (FLAT CABLE) UL2468 #26	1	CN402`1'TO CRT PCB `A`,`2'TO`B`,`3'TO`B 1`,`4'TO`C'
191-501027-10	5 PIN SOCKET ASS'Y L=360MM (FLAT CABLE) #26 UL2468	1	FROM MAIN PCB CN101 `1'TO`D', `2'TO`E', `3'TO`F'
191-501027-10	5 PIN SOCKET ASS'Y L=360MM (FLAT CABLE) #26 UL2468	0	`4'TO`G', `5'TO`H' ON CRT PCB
504-305008-10	MACHINE SCREW 3 X 8 B/M (WHITE) SELF-TAPPING SCREW 4 X 25 B/T	1	FOR IC201 MTG. REAR CAB. TO
514-400425-10	(HARDEN) SELF-TAPPING SCREW B/T 5 X 35	6	FRONT CAB.
514-500435-10	HEAD DIA. =8.5MM (MAX)(HARDEN) SELF-TAPPING SCREW 3 X 10	4	4 FOR CRT MTG. FOR
515-303310-10	W/P/A (HARDEN) SELF-TAPPING SCREW 3 X 8 W/B/T	3	IC401,402,Q402
515-303408-10	(HARDEN) SELF-TAPPING SCREW 3 X 8 P/A	1	1 FOR SPK. WIRE FOR 781-882103-01
516-300308-10	(HARDEN) SELF-TAPPING SCREW 3 X 12 W/A	2	TO HEAT SINK (A) MTG.
517-303312-10	W/H=7MM (HARDEN)	1	FOR IC901 MTG. 2-R423, 2-L401, 3-
540-017040-01	EYELET 1.7 X 4 MM	7	T901 `1`,`6`,`7' 2-T402`1`,`2`,1- Q402`C',4-POWER SWITCH
540-020030-01	EYELET 2 X 3 MM	12	A1,B2,C2,D1
540-020030-01	EYELET 2 X 3 MM	0	4-L901, 1-Q904`C'
540-025040-01	BRASS EYELET 2.5X4MM	2	2-C906 FOR TWO DOUBLE
580-101004-00	STAND OFF TWIST TIE #ST-3	1	INSULATION WIRE 1-FBT, 2-CRT PCB, 1-CN402, 1-CN101,
580-101261-01	CABLE TIE L=100MM	17	3-POWER SWITCH 8-DEGAUSSING
580-101261-01	CABLE TIE L=100MM	0	COIL MTG.

PART_NO	DESC	QTY	LOCATION
622-882802-00	FELT L240 X W17 X T0.5MM W/TAPE FIBER (FOR SHIELD PLATE)	4	FRO REAR CAB.
631-932001-00	(SAMSUNG TUNER)	1	
728-931302-00	SENSOR P.C.B. SUPPORT SPRING FOR C.R.T. MOUNTING 5.2 X 42 X 0.6MM	2	FOR SNESON PCB
744-881301-00	TEST PIN:TOTAL LENGTH 18.6mm	1	TP101 ON MAIN
746-063101-00	THK:0.8mm	1	P.C.B. A.B.C.D. ON MAIN
746-063101-01	AC LINE CORD PIN	4	P.C.B.
750-063101-00	SOLDERING LUG LEG:8X4MM 35MM SOLDERING LUG OD:7 ID:3.2	1	FOR Q904 FOR
750-063102-01	LEG:4X35MM	2	SPK.CONNECTOR FOR DEGAUSSING
750-892002-00	DEGAUSSING COIL LUG	4	COLD
766-686801-00	FUSE HOLDER	2	FOR FB901 FOR POWER
777-881301-00	SPRING IN 10 X L12	1	KNOB
779-882001-01	IRON HEAT SINK (D)	1	IC901
779-931302-00	IRON HEAT SINK	1	FOR IC201
781-882102-05	ALUMIMIUM HEAT SINK (A)	1	FOR Q904 FOR
781-931302-01	ALUMINIUM HEAT SINK	1	IC401,IC402,Q402
783-931304-02	SHIELD CAN	1	
783-931305-06	SHIELD CAN COVER "NEW"	1	
783-932002-00	SHIELD PLATE (SAMSUNG TUNER) POLYBAG 5" X 22" X 0.04MM W/RE-	1	FOR AC LINE
810-052204-14	CYCLING MARK {P/O MAT}	1	CORD
834-230802-00	RUBBER WASHER OD=23, ID=8, T=2	4	FOR CRT MTG.
840-011024-21	PAD CORD L240 X W10 X T1 MM W/TAPE	4	FOR BETWEEN FRONT CAB. & CRT MAIN P.C.B. (1- UNDER POWER TRANSFORMER
840-051020-11	RUBBER PAD (UL 94VO)	5	T502) FOR MAIN PCB (1- BETWEEN HEAT
840-051020-11	RUBBER PAD (UL 94VO)	0	SINK A.B.,2-FBT.) 1-BETWEEN FBT. & HEAT SINK (FOR SHEKOU JEWEL
840-051020-11	RUBBER PAD (UL 94VO)	0	FBT.)
929-931302-00	LED HOLDER BLACK ABS	1	FOR LED

PART_NO	DESC	QTY LOCATION	
939-942101-00	POWER KNOB ADAPTOR	1	FOR POWER SWITCH
948-881302-00	DEGAUSSING COIL MTG. CLIP	4	
954-882804-00	HIGH VOLTAGE CABLE SPACER	1	FOR FLYBACK
954-931301-00	STUD POST BLACK ABS	4	FOR FRONT CAB.

REVISION RECORD		
NO.	DESCRIPTION	DATE



CTM362H

COMPANY: ART-TECH PROJECT ENGINEERING LTD.	
SYSTEM: PAL BG IP TEXT AV/IN CDD HEADPHONE JACK HOTEL LOCK	
DRAWN: ZHANG CAI FANG	DATED: 120799
CHECKED: PAK FUNG PAN	DATED: 120799
QUALITY CONTROL: DATED:	
RELEASED: DATED:	
DOC: 931329-02	160-931329-P1
CODE: AO	DRAWING NO: REV:
SCALE:	SHEET: OF