

JVC

SCHEMATIC DIAGRAMS

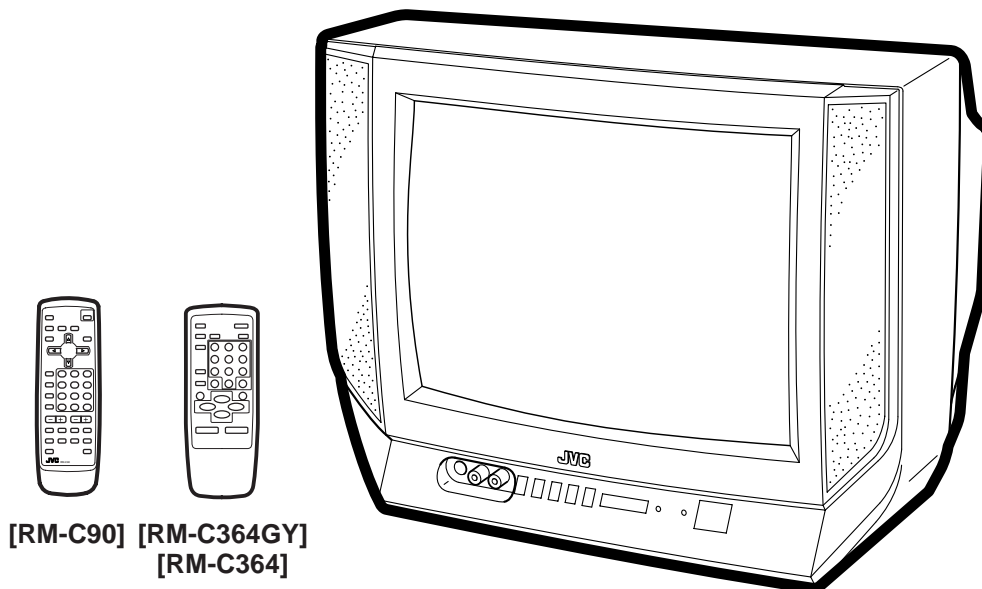
COLOUR TELEVISION

BASIC CHASSIS

CG

AV-14F3 / AV-1435
AV-1435EE / AV-1435TEE
AV-14FMT3 / AV-1438
AV-14FMG3 / AV-14FMG3B
AV-14FMG3/-A

CD-ROM No.SML200207



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SEMICONDUCTOR SHAPES

TRANSISTOR

BOTTOM VIEW	FRONT VIEW				TOP VIEW
					CHIP TR

IC

BOTTOM VIEW	FRONT VIEW			TOP VIEW

CHIP IC

TOP VIEW	

AV-14F3, AV-1435, AV-1435EE
AV-1435TEE, AV-14FMT3, AV-1438
AV-14FMG3, AV-14FMG3B, AV-14FMG3/-A
STANDARD CIRCUIT DIAGRAM

■ NOTE ON USING CIRCUIT DIAGRAMS

1.SAFETY

The components identified by the symbol and shading are critical for safety. For continued safety replace safety critical components only with manufactures recommended parts.

2.SPECIFIED VOLTAGE AND WAVEFORM VALUES

The voltage and waveform values have been measured under the following conditions.

- (1)Input signal : Colour bar signal
- (2)Setting positions of each knob/button and variable resistor : Original setting position when shipped
- (3)Internal resistance of tester :DC 20kΩ /V
- (4)Oscilloscope sweeping time :H ⇒ 20μS/div
:V ⇒ 5mS/div
:Others ⇒ Sweeping time is specified
- (5)Voltage values :All DC voltage values

* Since the voltage values of signal circuit vary to some extent according to adjustments, use them as reference values.

3.INDICATION OF PARTS SYMBOL [EXAMPLE]

- In the PW board :R1209 → R209

4.INDICATIONS ON THE CIRCUIT DIAGRAM

(1)Resistors

- Resistance value

- No unit :[Ω]
K :[K Ω]
M :[M Ω]

- Rated allowable power

- No indication :1/ 16 [W]
Others :As specified

- Type

- No indication :Carbon resistor
OMR :Oxide metal film resistor
MFR :Metal film resistor
MPR :Metal plate resistor
UNFR :Uninflamable resistor
FR :Fusible resistor

* Composition resistor 1/2 [W] is specified as 1/2S or Comp.

(2)Capacitors

- Capacitance value

- 1 or higher :[pF]
less than 1 :[μF]

- Withstand voltage

- No indication :DC50[V]
Others :DC withstand voltage [V]
AC indicated :AC withstand voltage [V]

* Electrolytic Capacitors

47/50[Example]:Capacitance value [μF]/withstand voltage[V]

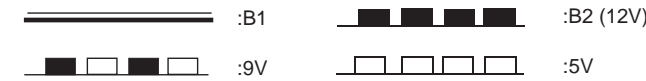
- Type

- No indication :Ceramic capacitor
MM :Metalized mylar capacitor
PP :Polypropylene capacitor
MPP :Metalized polypropylene capacitor
MF :Metalized film capacitor
TF :Thin film capacitor
BP :Bipolar electrolytic capacitor
TAN :Tantalum capacitor

(3)Coils

- No unit :[μH]
Others :As specified

(4)Power Supply

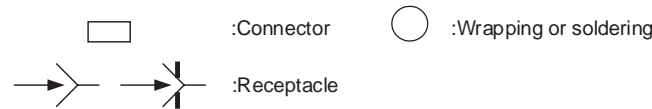


* Respective voltage values are indicated

(5)Test point

- :Test point :Only test point display

(6)Connecting method



(7)Ground symbol

- :LIVE side ground
 :ISOLATED(NEUTRAL) side ground
 :EARTH ground
 :DIGITAL ground

5.NOTE FOR REPAIRING SERVICE

This model's power circuit is partly different in the GND. The difference of the GND is shown by the LIVE : () side GND and the ISOLATED(NEUTRAL) : () side GND. Therefore, care must be taken for the following points.

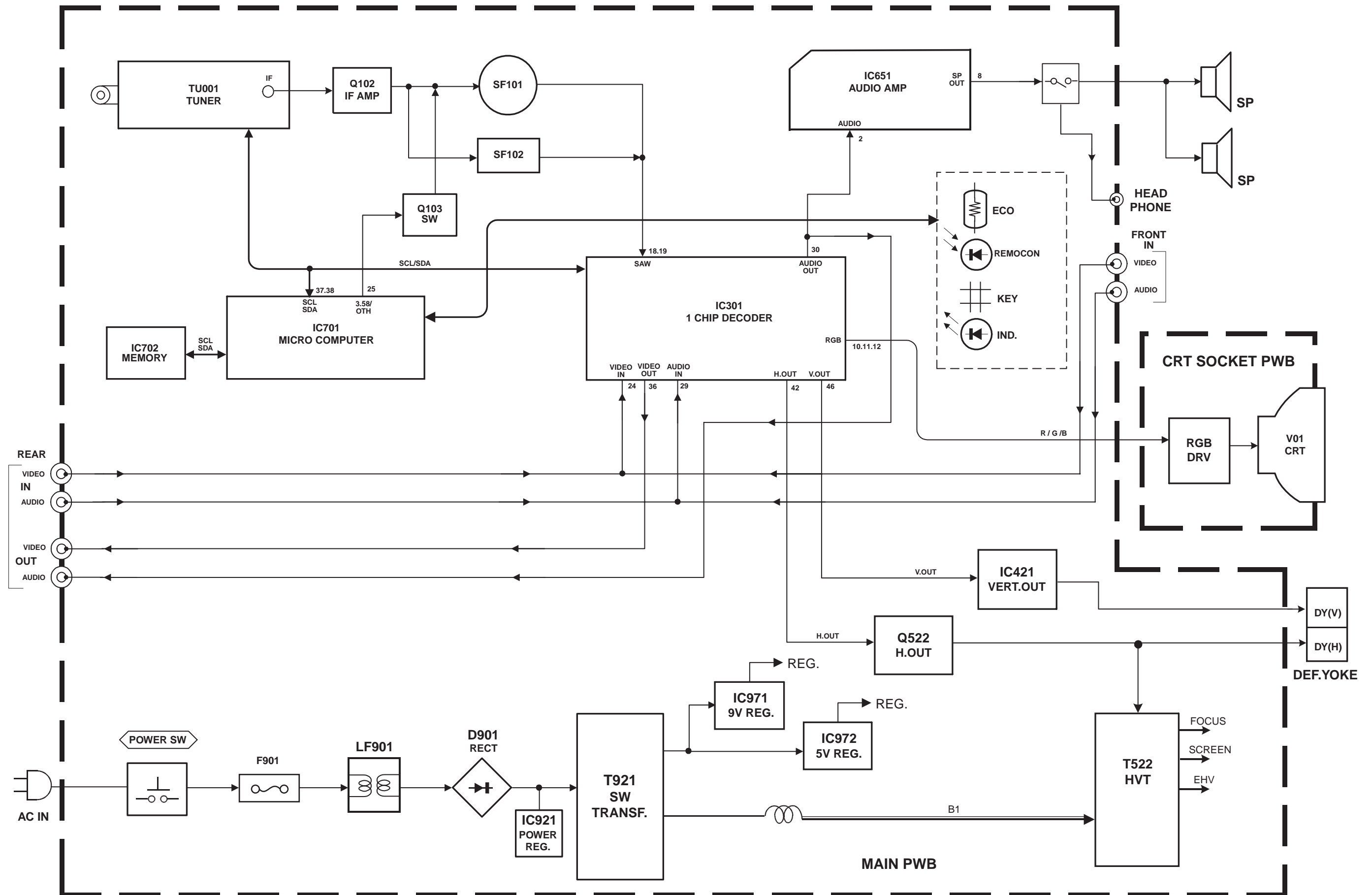
- (1)Do not touch the LIVE side GND or the LIVE side GND and the ISOLATED(NEUTRAL) side GND simultaneously. If the above caution is not respected, an electric shock may be caused. Therefore, make sure that the power cord is surely removed from the receptacle when, for example, the chassis is pulled out.
- (2)Do not short between the LIVE side GND and ISOLATED(NEUTRAL) side GND or never measure with a measuring apparatus measure with a measuring apparatus (oscilloscope, etc.) the LIVE side GND and ISOLATED(NEUTRAL) side GND at the same time. If the above precaution is not respected , a fuse or any parts will be broken.

◇ Since the circuit diagram is a standard one, the circuit and circuit constants may be subject to change for improvement without any notice.

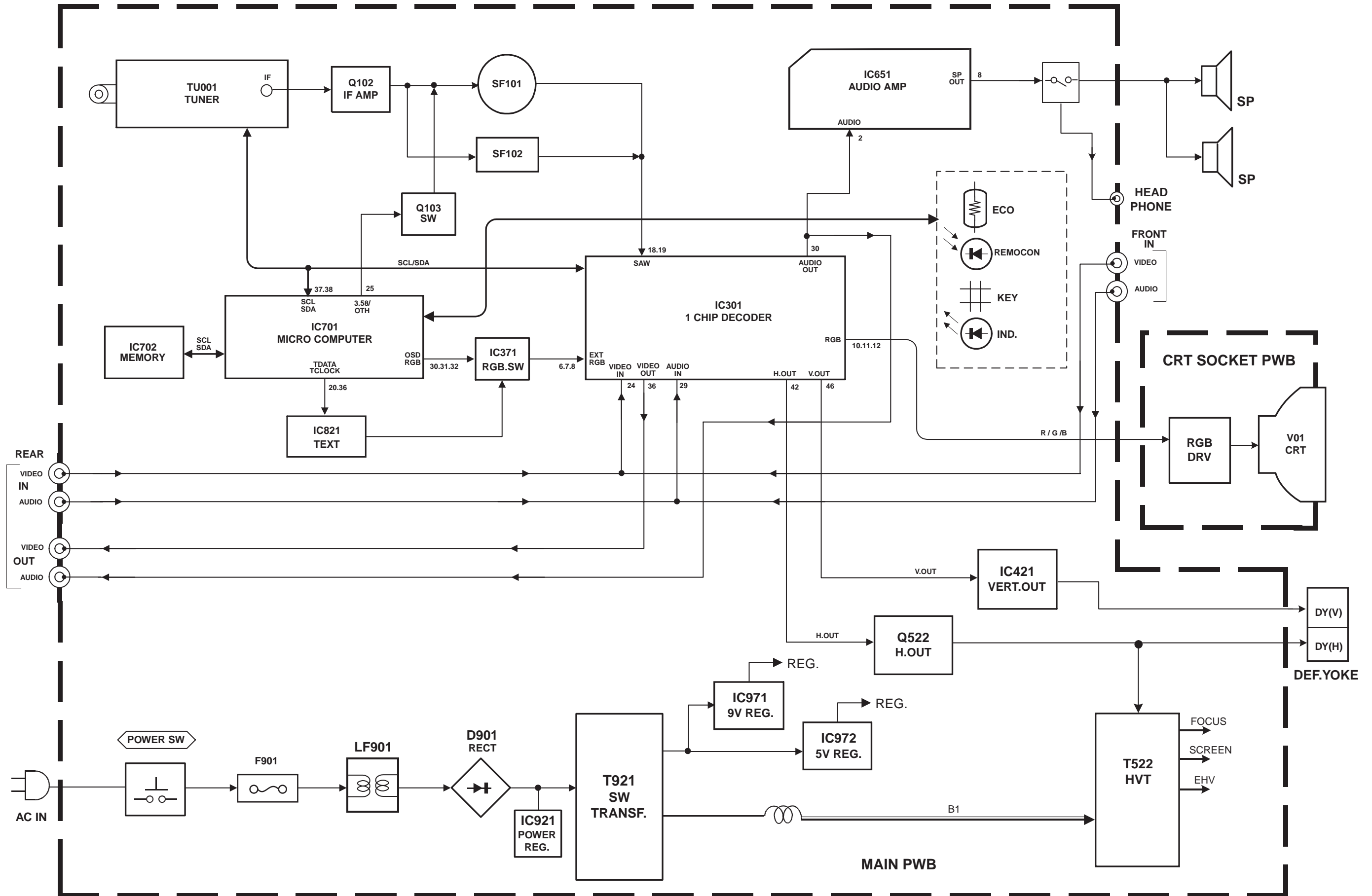
NOTE

◇ Due improvement in performance, some part numbers show in the circuit diagram may not agree with those indicated in the part list.
When ordering parts, please use the numbers that appear in the Parts List.

BLOCK DIAGRAM [AV-14F3, AV-1435, AV-1435EE, AV-14FMG3, AV-14FMG3/-A, AV-14FMG3B, AV-1438]



BLOCK DIAGRAM [AV-14FMT3, AV-1435TEE]



CIRCUIT DIAGRAMS MAIN PWB CIRCUIT DIAGRAMS (1/2)
[AV-14F3, AV-1438, AV-1435, AV-1435EE, AV-14FMG3, AV-14FMG3/-A, AV-14FMG3B]

MAIN PWB (1/2)

SCG-1401A-H2
(AV-14F3)

SCG-1418A-H2
(AV-1435EE)

SCG-1420A-H2
(AV-1435)

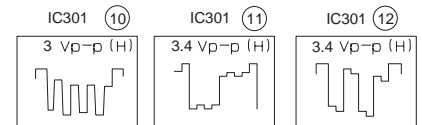
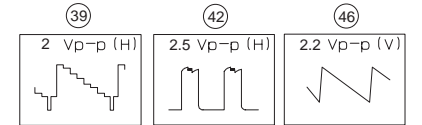
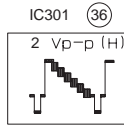
SCG-1421A-H2
(AV-14FMG3)
(AV-14FMG3-A)
(AV-14FMG3B)

SCG-1440A-H2
(AV-1438)

NOTE
*1: 2SD601A/QR-X
*2: 2SB709A/QR-X
*3: UN2212-X
*4: MA111-X
*5: MTZJ9.1B-T2
*6: MTZJ9.1C-T2
*7: MTZJ12C-T2
*8: UN2112-X
*9: QOR0621-002Z
*10: 2SC5083/L-P/T

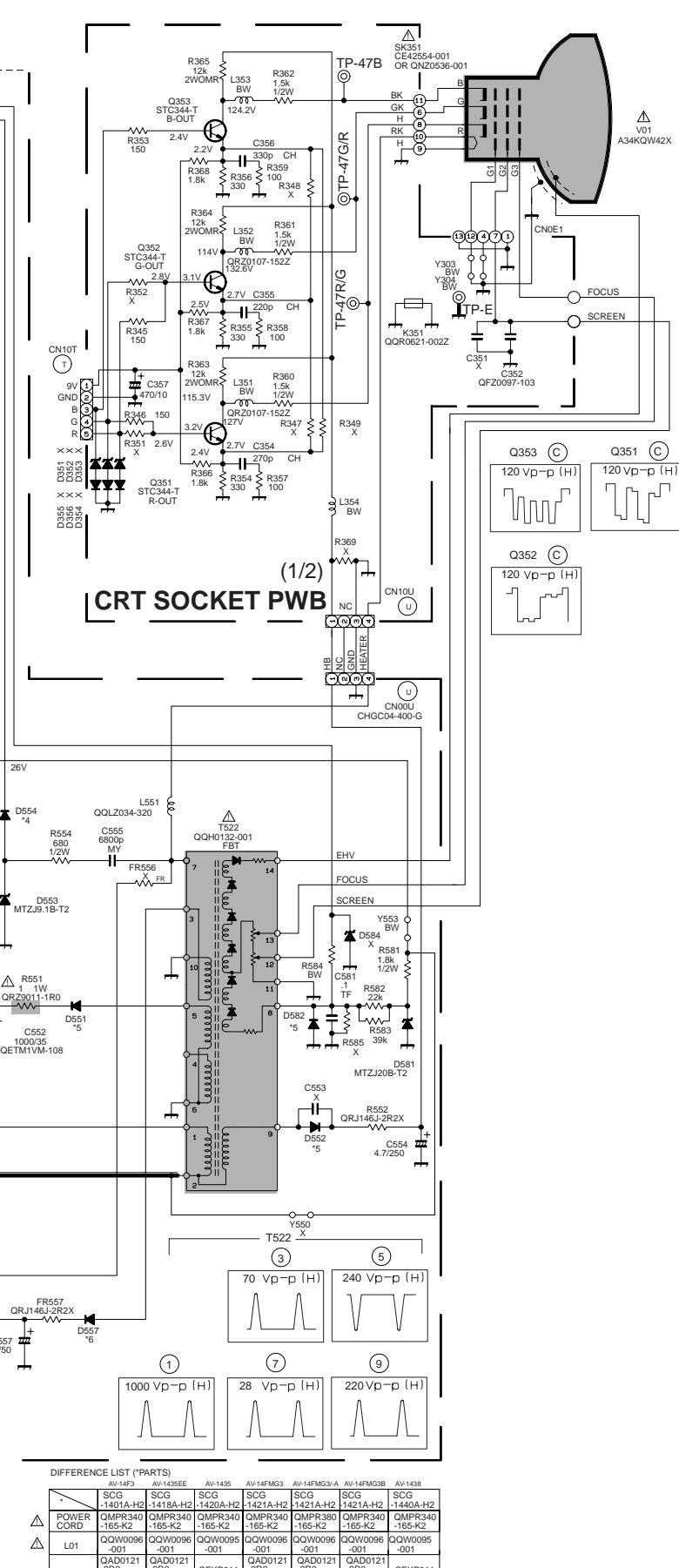
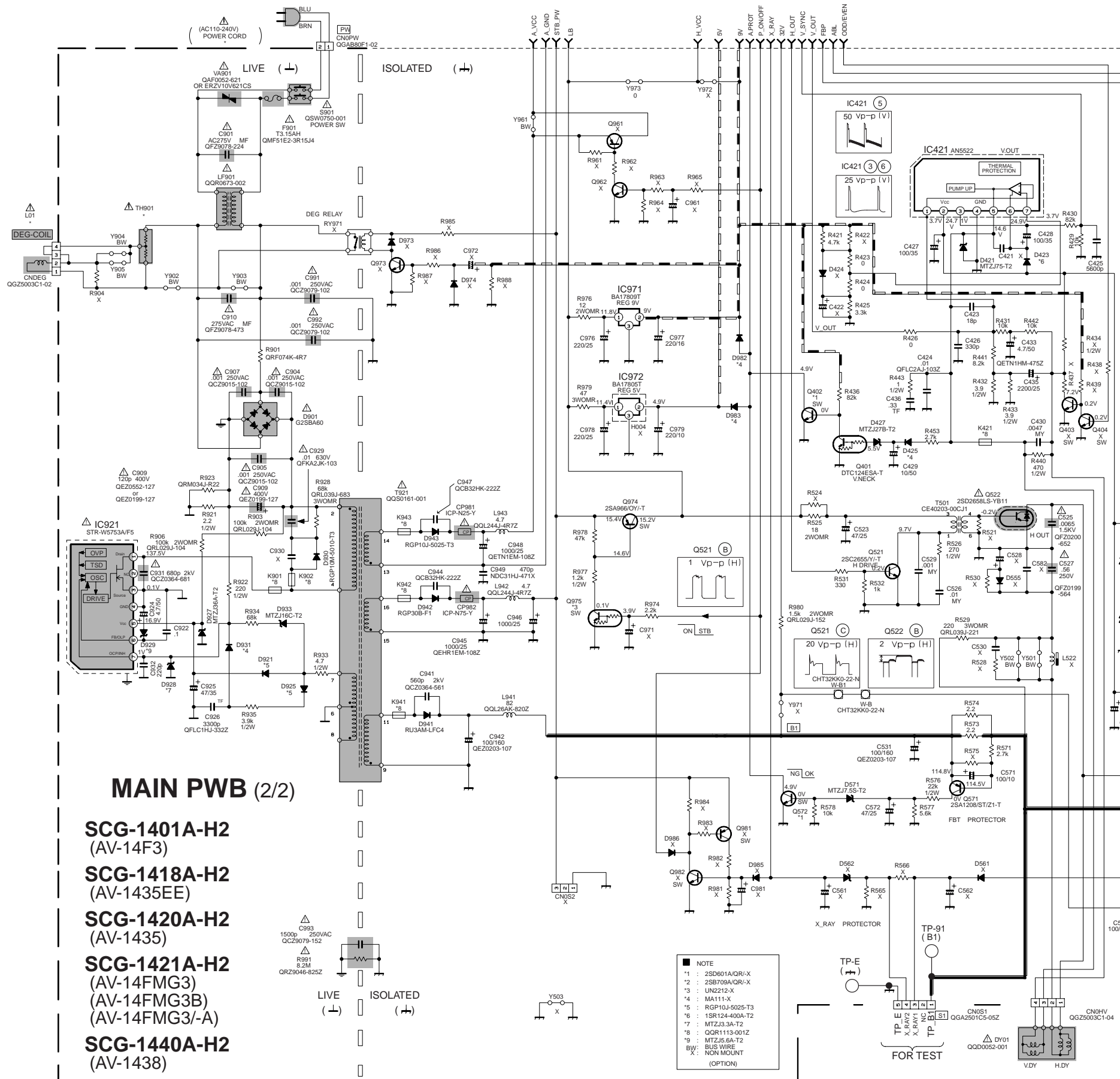
DIFFERENCE LIST(PARTS)

	14F3	1435EE	1435	14FMG3	14FMG3-A	1438
	SCG-1401A-H2	SCG-1418A-H2	SCG-1420A-H2	SCG-1421A-H2	SCG-1440A-H2	
SF102	QAX0666-002	QAX0666-002	QAX0666-002	QAX0731-001	QAX0731-001	
CF161	X	X	X	QAX0642-001Z	QAX0642-001Z	
Q103	X	X	X	*3	*3	
P161	X	X	X	*1	*1	
D102	BW	BW	BW	MA859-T2	MA859-T2	
Y160	X	X	X	BW	BW	
NRS463J-100X	X	X	X	NRS463J-220X	NRS463J-220X	
R114	X	X	X	NRS463J-472X	NRS463J-472X	
R115	X	X	X	NRS463J-222X	NRS463J-222X	
R117	X	X	X	NRS463J-080X	NRS463J-080X	
R118	X	X	X	NRS463J-222X	NRS463J-222X	
R161	X	X	X	NRS463J-102X	NRS463J-102X	
R162	X	X	X	NRS463J-122X	NRS463J-122X	
R163	X	X	X	NRS463J-222X	NRS463J-222X	
R164	X	X	X	NRS463J-221X	NRS463J-221X	
R165	X	X	X	NRS463J-220X	NRS463J-220X	
R166	X	X	X	NRS463J-821X	NRS463J-821X	
C109	X	X	X	NCB31HK-472X	NCB31HK-472X	
C161	X	X	X	NCB31HK-103X	NCB31HK-103X	
C164	X	X	X	NCB31HK-103X	NCB31HK-103X	
C165	X	X	X	NCB31HK-103X	NCB31HK-103X	
C166	X	X	X	NCB31HK-104X	NCB31HK-104X	
IC701	MN18732-87J1	MN18732-87J1	MN18732-87J1	MN18732-87J1	MN18732-87J1	



MAIN PWB CIRCUIT DIAGRAM (2/2)

[AV-14F3, AV-1438, AV-1435, AV-1435EE, AV-14FMG3, AV-14FMG3/-A, AV-14FMG3B]



MAIN PWB CIRCUIT DIAGRAMS (1/2) [AV-14FMT3, AV-1435TEE]

MAIN PWB (1/2)

SCG-1404A-H2
(AV-14FMT3)

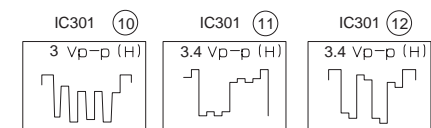
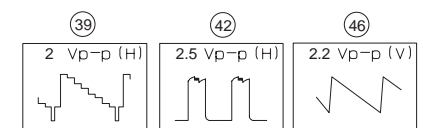
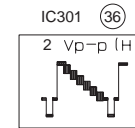
SCG-1419A-H2
(AV-1435TEE)

NOTE

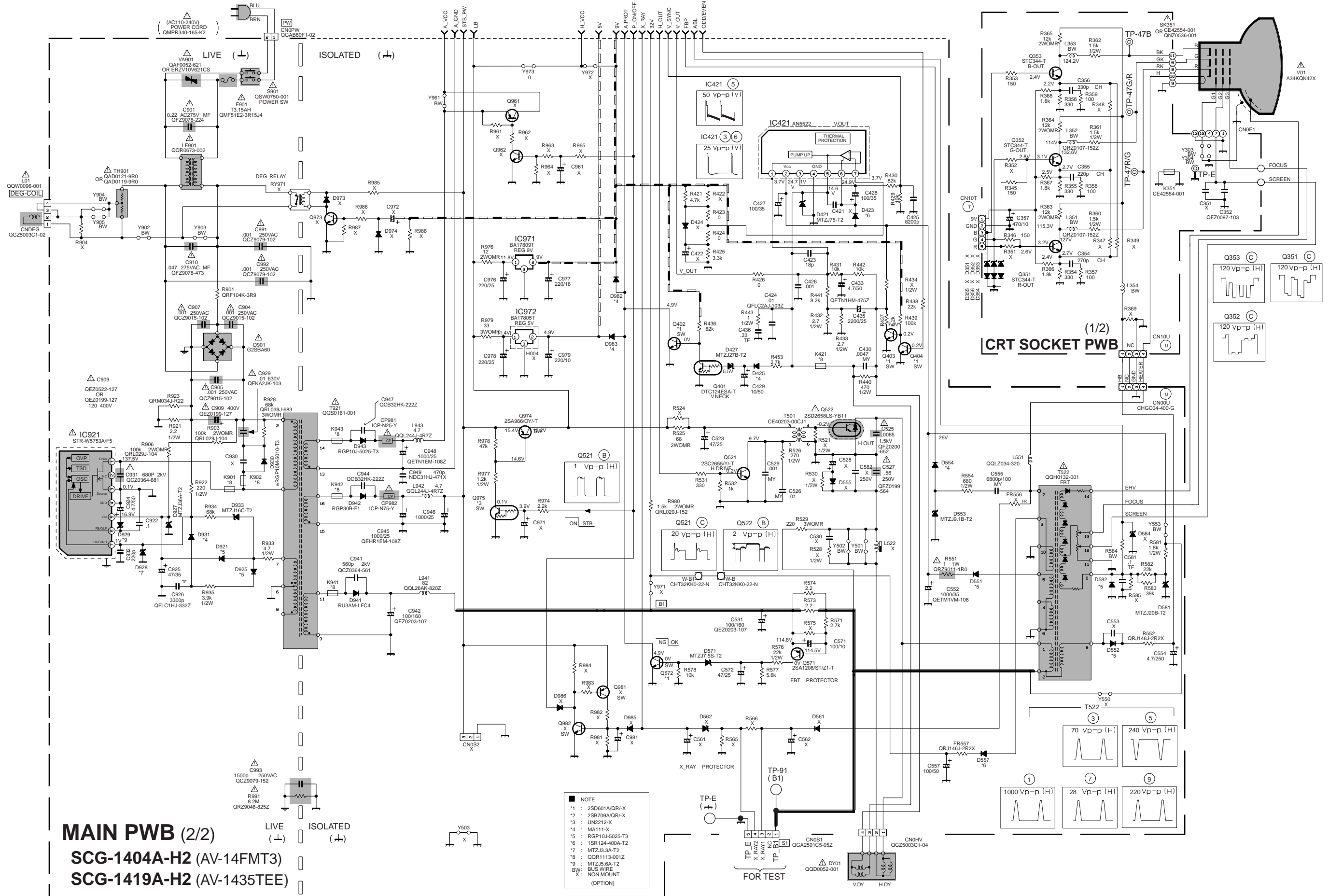
*1:	2SD601A/QR-X
*2:	2SB709A/QR-X
*3:	UN2J12-X
*4:	MA111-X
*5:	MTZJ6.8C-T2
*6:	MTZJ12C-T2
*7:	MTZJ12C-T2
*8:	UN2J12-X
*9:	QOR0621-002Z
*10:	2SC5083L-PI-T

DIFFERENCE LIST(PARTS)

	14FMT3	1435TEE
SCG	SCG-1404A-H2	SCG-1419A-H2
SF102	QAX0731-001	QAX0666-002
CF161	QAX0642-001Z	X
Q103	*3	X
Q161	*1	X
D102	MA569-T2	BW
Y160	BW	X
R112	NRSA63J-220X	NRSA63J-100X
R114	NRSA63J-472X	X
R115	NRSA63J-222X	X
R117	NRSA63J-090X	X
R118	NRSA63J-222X	X
R161	NRSA63J-102X	X
R162	NRSA63J-122X	X
R163	NRSA63J-222X	X
R164	NRSA63J-221X	X
R165	NRSA63J-220X	X
R166	NRSA63J-821X	X
C109	NCB31HK-103X	X
C161	NCB31HK-103X	X
C164	NCB31HK-103X	X
C165	NCB31HK-103X	X
C166	NCB31HK-104X	X
IC701	MN18732-87J1	MN18732-87J1



MAIN PWB CIRCUIT DIAGRAM (2/2) [AV-14FMT3, AV-1435TEE]



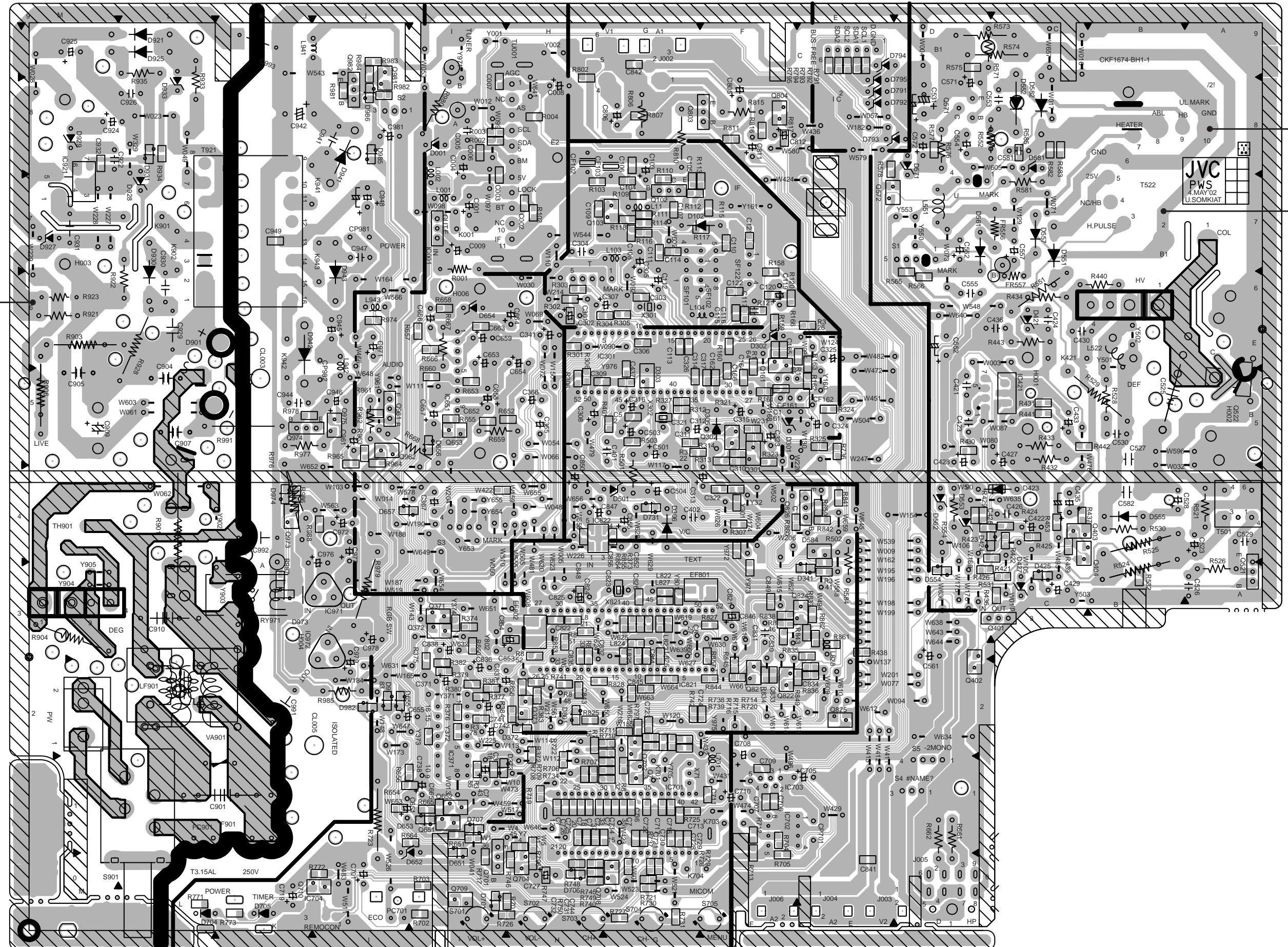
AV-14F3 / AV-1435
AV-1435EE / AV-1435TEE
AV-14FMT3 / AV-1438
AV-14FMG3 / AV-14FMG3B

AV-14F3 / AV-1435
AV-1435EE / AV-1435TEE
AV-14FMT3 / AV-1438
AV-14FMG3 / AV-14FMG3B

PATTERN DIAGRAMS MAIN PWB PATTERN

FRONT

(T)



TP-E
(H)

TP-91
(B1)



VICTOR COMPANY OF JAPAN, LIMITED

HOME AV NETWORK BUSINESS UNIT. 12, 3-chome, Moriya-cho, Kanagawa-ku, Yokohama, Kanagawa-prefecture, 221-8528, Japan