

STR-D760Z/DE815G

SERVICE MANUAL

US Model
STR-D760Z/DE815G

Canadian Model
E Model
Australian Model
PX Model
STR-DE815G



Photo : STR-DE815G

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SPECIFICATIONS

Audio power specifications

POWER OUTPUT AND TOTAL HARMONIC DISTORTION

With 8-ohm load, both channels driven, from 20 - 20,000 Hz, rated 100 watts per channel, minimum RMS power, with no more than 0.09 % total harmonic distortion from 250 milliwatts to rated output (USA model only).

Amplifier section

POWER OUTPUT

Stereo mode

Singaporean models :
4 ohms DIN 1 kHz,
100W + 100W
Other models :
8 ohms 20 Hz - 20
kHz, THD 0.09%,
100 W + 100 W

Surround mode

Singaporean models :
(4 ohms DIN 1 kHz)
Front: 100 W + 100 W
Center (only in the
PRO LOGIC mode):
100 W
Rear: 100 W/ch
Other models:
(8 ohms at 1kHz,
THD 0.8%)
Front: 100 W/ch
Center (only in the
PRO LOGIC mode):
100 W
Rear: 100 W/ch

5.1 mode

Singaporean model:
(4 ohms DIN 1 kHz)
Front: 100 W + 100 W
Center: 100 W
Rear: 100 W/ch
Other models:
(8 ohms 20 Hz - 20
kHz, THD 0.09%)
Front: 100 W/ch
Center: 100 W
Rear: 100 W/ch

Dynamic power output (USA and Canadian models only).

155 W + 155 W, 8 ohms
220 W + 220 W, 4 ohms

Harmonic distortion at rated output

Less than 0.09%
(Direct Pass)

Frequency response

PHONO: RIAA
equalization curve
±0.5 dB
CD, TAPE, DAT/MD,
TV, LD, VIDEO 1, 2, :
10 Hz - 50 kHz dB
(Direct Pass)

— Continued on next page —

FM STEREO FM-AM RECEIVER



SONY®

Inputs			
	Sensitivity	Impedance	S/N*
PHONO (MM)	2.5 mV	50 kilohms	75 dB* (A, 2.5 mV)
CD, DAT/MD, LD/DVD	200 mV		
TAPE, VIDEO 1, 2, 3, TV/DBS,	150 mV	50 kilohms	82 dB* (A, 150mV)
5.1 INPUT	200 mV	50 kilohms	82 dB* (A, 150mV)

* '78 IHF

Outputs	REC OUT VIDEO 1, 2 (AUDIO) OUT: Voltage 150 mV, Impedance 10 kilohms WOOFER OUT Voltage: 2 V Impedance: 1 kilohms PHONES: Accepts low and high impedance headphones
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BASS BOOST +10 dB at 70 Hz

FM tuner section

Tuning range	87.5 - 108.0 MHz
Antenna terminals	75 ohms, unbalanced
Sensitivity	Mono: 18.3 dBf, 4.5 µV Stereo: 38.3 dBf, 45 µV
Usable sensitivity	11.2 dBf, 2 µV (IHF)
S/N	Mono: 76 dB Stereo: 70 dB
Harmonic distortion at 1 kHz	Mono: 0.3 % Stereo: 0.5 %
Separation	45 dB at 1 kHz
Frequency response	30 Hz - 15 kHz ^{-0.5} / ₋₂ dB
Selectivity	60 dB at 400 kHz

AM tuner section

Tuning range	With 10 kHz interval* (except for Australia and Singapore) : 530 - 1710 kHz (USA and Canada) 530 - 1610 kHz (other countries) With 9 kHz interval: 531 - 1710 kHz (USA, and Canada) 531 - 1602 kHz (Other countries)
Antenna	Loop antenna
Usable sensitivity	50 dB/m (at 1,000 kHz or 999 kHz)
S/N	54 dB (at 50 mV/m)
Harmonic distortion	0.5 % (50 mV/m, 400 kHz)
Selectivity	At 9 kHz: 35 dB At 10 kHz: 40 dB

Video section

Inputs	VIDEO 1, 2, TV: 1 Vp-p 75 ohms
Outputs	VIDEO 1, 2, MONITOR: 1 Vp-p 75 ohms
General System	Tuner section: PLL quartz-locked digital synthesizer system Preamplifier section: Low-noise NF type equalizer Power amplifier section: Pure-complimentary SEPP

Power requirements

Australian model:
240 V AC, 50 Hz
USA, Canadian models:
120 V AC, 60 Hz
Singaporean, Malaysia models:
230 V AC, 50/60 Hz
Other models:
120/220/240 V AC, 50/60 Hz

Power consumption

USA model: 280 W
Canada model: 480 VA
Malaysia, Singaporean models:
240 W
Other models: 280 W

AC outlets

Australian and Singaporean, Malaysia models:
1 switched, total 100 W
Other models:
2 switched, total 120 W

Dimensions

17 x 6 ¹/₈ x 14 ¹/₄ inches
(430 x 155 x 360 mm)

Mass (Approx.)

Singaporean, Malaysia models:
11.5 kg (25 lb 6 oz)
except Singaporean, Malaysia models:
10.5 kg (23 lb 2 oz)

Supplied accessories

FM wire antenna (1)
AM loop antenna (1)
Remote commander (remote) (1)
(remote for USA and Canada: RM-H501)
(Remote for other countries: RM-VR101)
Size AA (R6) batteries (2)
IR repeater (1)
Video Cable (1)
(USA and Canadian models only)
Control S cable for TV (1)
(USA and Canadian models only)

Design and specifications are subject to change without notice.

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Notes on chip component replacement

- Never reuse a disconnected chip component.
- Notice that the minus side of a tantalum capacitor may be damaged by heat.

SAFETY-RELATED COMPONENT WARNING !!

COMPONENTS IDENTIFIED BY MARK $\triangle$ OR DOTTED LINE WITH MARK $\triangle$ ON THE SCHEMATIC DIAGRAMS AND IN THE PARTS LIST ARE CRITICAL TO SAFE OPERATION. REPLACE THESE COMPONENTS WITH SONY PARTS WHOSE PART NUMBERS APPEAR AS SHOWN IN THIS MANUAL OR IN SUPPLEMENTS PUBLISHED BY SONY.

ATTENTION AU COMPOSANT AYANT RAPPORT À LA SÉCURITÉ!!

LES COMPOSANTS IDENTIFIÉS PAR UNE MARQUE $\triangle$ SUR LES DIAGRAMMES SCHÉMATIQUES ET LA LISTE DES PIÈCES SONT CRITIQUES POUR LA SÉCURITÉ DE FONCTIONNEMENT. NE REMPLACER CES COMPOSANTS QUE PAR DES PIÈCES SONY DONT LES NUMÉROS SONT DONNÉS DANS CE MANUEL OU DANS LES SUPPLÉMENTS PUBLIÉS PAR SONY.

SAFETY CHECK-OUT

After correcting the original service problem, perform the following safety checks before releasing the set to the customer:

Check the antenna terminals, metal trim, “metallized” knobs, screws, and all other exposed metal parts for AC leakage. Check leakage as described below.

LEAKAGE

The AC leakage from any exposed metal part to earth Ground and from all exposed metal parts to any exposed metal part having a return to chassis, must not exceed 0.5 mA (500 microamperes). Leakage current can be measured by any one of three methods.

1. A commercial leakage tester, such as the Simpson 229 or RCA WT-540A. Follow the manufacturers' instructions to use these instruments.
2. A battery-operated AC milliammeter. The Data Precision 245 digital multimeter is suitable for this job.
3. Measuring the voltage drop across a resistor by means of a VOM or battery-operated AC voltmeter. The “limit” indication is 0.75 V, so analog meters must have an accurate low-voltage scale. The Simpson 250 and Sanwa SH-63Trd are examples of a passive VOM that is suitable. Nearly all battery operated digital multimeters that have a 2V AC range are suitable. (See Fig. A)

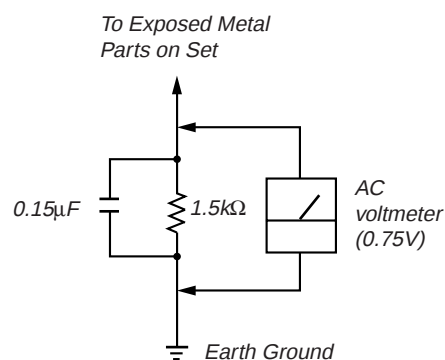
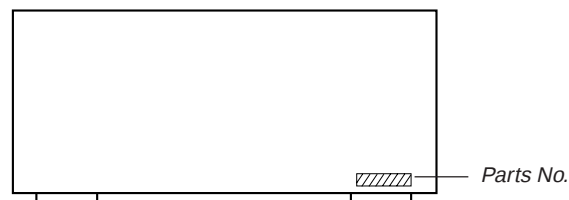


Fig. A. Using an AC voltmeter to check AC leakage.

MODEL IDENTIFICATION

— BACK PANEL —



Parts No.	Model
4-989-884-6□	D760Z : US model
4-989-884-0□	DE815G : US model
4-989-884-1□	DE815G : Canadian model
4-989-884-2□	DE815G : E, PX model
4-989-884-3□	DE815G : Singapore, Malaysia model
4-989-884-4□	DE815G : Australian model

SECTION 1

SERVICING NOTE

ALL CLEAR

Mode which erases all the user memories registered in this unit and sets to setting at shipment.

Procedure:

1. With the power turned OFF, press the **[POWER]** button while pressing the **[MODE]** button, **[AUDIO FUNCTION >]** and **[VIDEO FUNCTION >]** button simultaneously to turn ON the power.
2. ALL CLEAR ! will be displayed on the fluorescent indicator tube, and ALL CLEAR will be executed.

FACTORY SET

Mode which sets the memory of the unit to the setting of adjustment and check at factory. (Not used for servicing.)

Procedure:

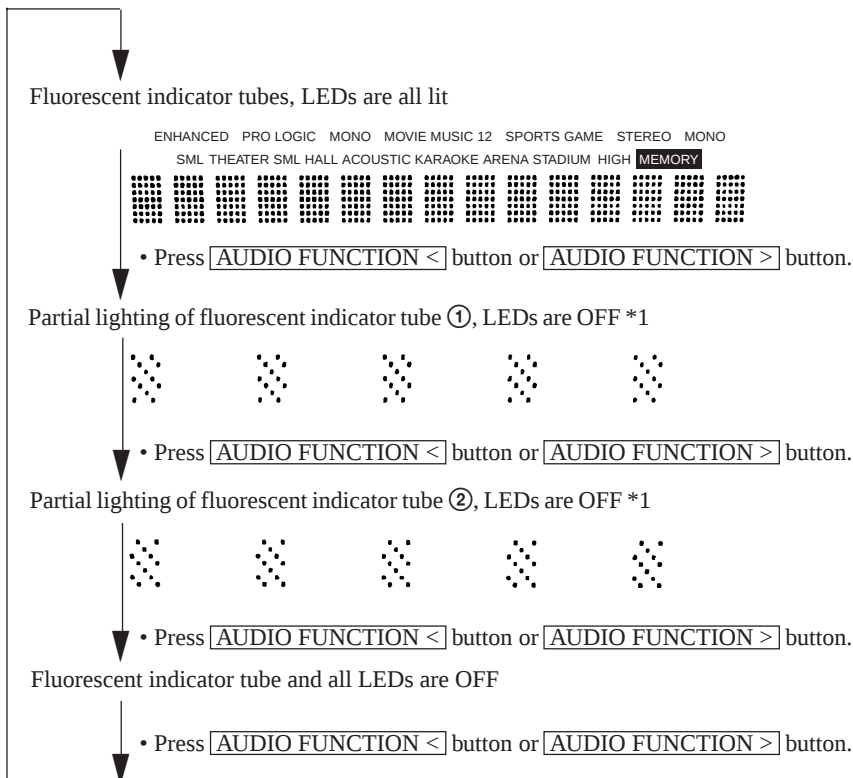
1. With the power turned OFF, press the **[POWER]** button while pressing the **[MODE]** button and **[AUDIO FUNCTION >]** button simultaneously to turn ON the power.
2. FACTORY SET will be displayed on the fluorescent indicator tube, and FACTORY SET will be executed.

Note: In case you return the unit to the customer, do not perform FACTORY SET. If you do it, perform ALL CLEAR.

Fluorescent indicator tube, LED all lit mode

Procedure:

1. With the power turned OFF, press the **[POWER]** button while pressing the **[MODE]** button and **[VIDEO FUNCTION >]** button simultaneously to turn ON the power.
2. The fluorescent display tubes and LEDs will all light up. Release the buttons in the order of **[VIDEO FUNCTION >]**, and **[MODE]**.
3. The Fluorescent indicator tube display changes as follows by pressing the **[AUDIO FUNCTION <]**, **[AUDIO FUNCTION >]**. (Pressing the other buttons will exit this mode.)



*1 Those other than the POWER LED go OFF.

4. To exit the mode, press the POWER button to turn OFF the power.

Adjustment of OSD Screen Position

The position of the screen can be adjusted freely to correct the deviation of the OSD screen caused by the monitor type that users are using.

1. Move the cursor of the remote commander supplied as an accessory, and display the OSD screen.
2. Click the SET UP of the OSD screen.
3. Next click TV SET.
4. Next click GRAPHIC POSITION SET.
5. The screen for adjusting the OSD screen position will be displayed. Adjust the position with the remote commander supplied as an accessory.
6. Click EXIT to end.

AM Tuning Step 9 kHz/10 kHz Selection

Method:

1. Turn ON the power, set the AUDIO FUNCTION to AM, and turn OFF the power.
2. While pressing the **[TUNING +]** button or **[PRESET TUNING +]** button, press the **[POWER]** button.
3. "AM 9K STEP" or "AM 10k STEP" will be displayed on the FL display tube.

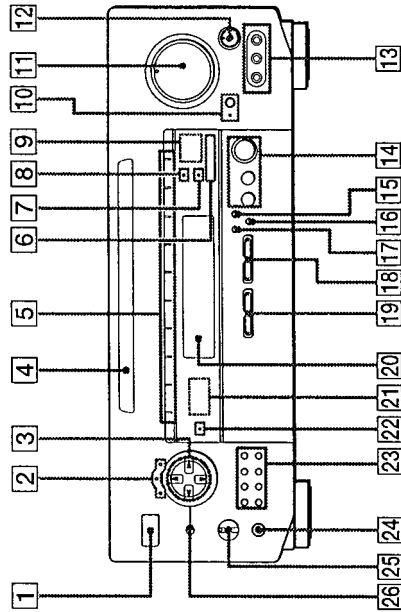
Key Check Mode

Method:

1. With the power OFF, while pressing the **[MODE]** button and **[AUDIO FUNCTION <]** button together, press the **[POWER]** button.
2. "KEY TEST [24]" will be displayed on the FL display tube.
3. The [XX] number is counted down each time a button other than **[POWER]** is pressed until it becomes [00]. (Buttons pressed once will not be counted again when pressed another time.)
4. When the number becomes [00], press the **[POWER]** button and exit the mode.

Front Panel Descriptions

You can control the receiver using the front panel instead of the remote. For details of the operations, see the pages in parenthesis.

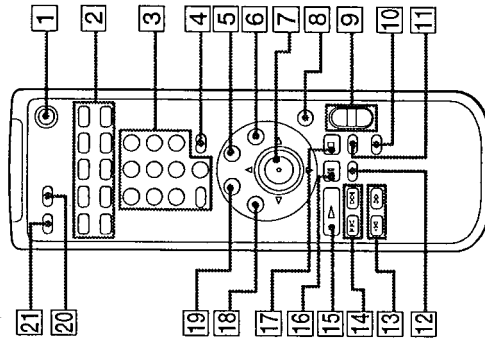


- 1 POWER switch
- 2 SUR indicator (47)
- 3 TONE indicator (46)
- 4 INDEX indicator (48)
- 5 Digital Processing Controls
- 6 IR emitter (4)
- 7 FUNCTION indicators
- 8 5.1 INPUT indicator (44)
- 9 DIRECT PASS indicator (44)
- 10 LEARNING SENSOR indicator
- 11 IR sensor (15)
- 12 BASS BOOST button and indicator (44)
- 13 MASTER VOLUME control (44)
- 14 BALANCE control (44)
- 15 VIDEO 3 input jacks (10)
- 16 SOUND FIELD buttons (46)
- 17 SOUND FIELD ON/OFF button
- 18 SOUND FIELD GENRE button
- 19 SOUND FIELD MODE button
- 20 SET UP button (47)
- 21 5.1 INPUT button (44)
- 22 DIRECT PASS button (44)
- 23 AUDIO FUNCTION selector (44)
- 24 VIDEO FUNCTION selector (44)
- 25 Display
- 26 IR receptor (4)
- 27 STANDBY indicator (except for USA and Canadian models)
- 28 Tuner operation buttons (45)
- 29 TUNING (+/-) buttons
- 30 PRESET (+/-) buttons
- 31 FM MODE button
- 32 FM/AM button
- 33 SHIFT button
- 34 DISPLAY button
- 35 PHONES jack (44)
- 36 SPEAKERS selector (9)
- 37 DPC MODE button (46, 48)

Remote Descriptions

USA and Canada (RM-H501)

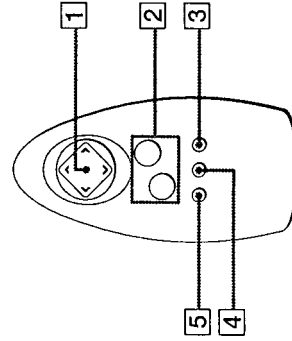
Although the direction control button lets you perform almost all of the receiver operations, for certain operations, you can also control the receiver using the other (short-cut) buttons. For details of the operations, see the pages in parenthesis.



- 1 WIDE MODE (23)
- 2 DISC SKIP
- 3 MULTI-CD : Press repeatedly to skip between discs
- 4 <</>> buttons
- 5 CD : searches tracks (Forward or backward)
- 6 Tape, MD, VCR, LD : fast forwards or rewinds
- 7 <</>> buttons
- 8 CD, MD, LD : skips tracks
- 9 <</>> buttons
- 10 CD, Tape, MD, LD, VCR : starts play
- 11 00
- 12 CD, Tape, MD, LD, VCR : pauses play or record (also starts recording with components in record standby)
- 13 <</>> buttons
- 14 CD, Tape, MD, LD, VCR : stops play
- 15 VCR MENU : displays the menu of the connected VCR
- 16 GUI : displays this unit's on-screen display.
- 17 5.1 INPUT button (44)
- 18 SLEEP (39)

Other countries (RM-VR101)

Although the direction control button lets you perform almost all of the receiver operations, for certain operations, you can also control the receiver using the other (short-cut) buttons. For details of the operations, see the pages in parenthesis.

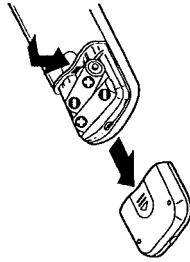


- 1 Direction control button (13)
- 2 VOL +/- (20)
- 3 ALL OFF
- 4 TV / VIDEO
- 5 TV : switches TV's input mode.
- 6 FLASHER (49)

Using the Remote

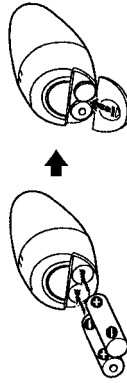
Inserting batteries into the remote (USA and Canada)

Insert two size AA (R6) batteries with the + and - on the battery compartment. When using the remote, point it at the remote sensor on the receiver.



Inserting batteries into the remote (other countries)

- 1 Open the cover on the bottom of the remote.
- 2 Insert two size AA (R6) batteries with correct polarity (+/-), then close the cover.



Notes on the remote

Battery life

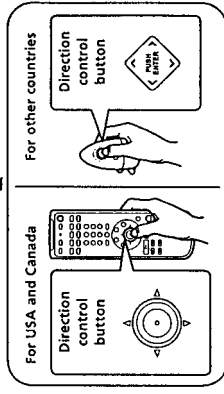
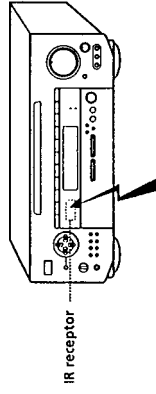
Under normal use, the batteries should last for about 6 months. When the remote no longer operates the processor, replace both batteries with new ones.

Notes

- Do not leave the remote in an extremely hot or humid place.
- Do not use a new battery with an old one.
- Do not expose the remote sensor to direct sunlight or lighting apparatuses. Doing so may cause a malfunction.
- If you don't use the remote for an extended period of time, remove the batteries to avoid possible damage from battery leakage and corrosion.

Turning on the receiver and bringing up the on-screen display on your TV (or monitor)

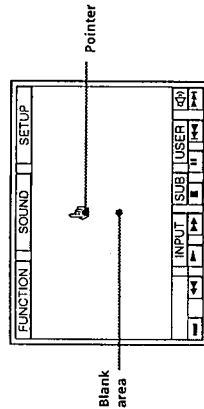
To turn on the receiver, point the remote at the IR emitter, and then press the direction control button on the remote once or twice. To bring up the on-screen display, turn on your TV and set it to the appropriate video input. If you register the IR code of your TV (see "Registering a TV (or Monitor)" on page 14), you can turn on your TV automatically whenever you turn on the receiver.



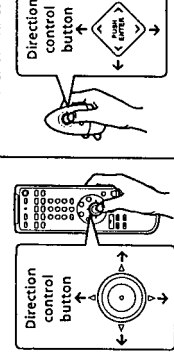
How to use the remote

The supplied remote lets you perform almost all of the receiver operations.

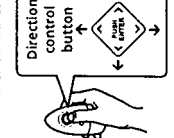
This section describes how to use the direction control button. For certain operations, you can also control the receiver using the other (short-cut) buttons instead of the direction control button. For details, see page 43.



For USA and Canada



For other countries



1 Press the direction control button on the remote once to recall the on-screen display.

2 Press repeatedly (or hold down) the corner of the direction control button (↔, ↗, ↘, ↙) in the direction you want to move the pointer (hand-shaped icon) on the on-screen display.

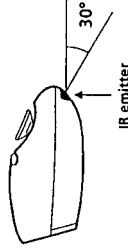
3 To "click" on an item, position the pointer so that it is on one of the on-screen items, then press and quickly release the center of the direction control button (indicated by "PUSH ENTER").

To make the on-screen display disappear

Position the pointer in the blank area, and press the center of the direction control button.

Notes on handling the remote (except for USA and Canada)

- Do not cover the IR emitter on the remote when operating the remote.



- Hold the remote with its direction control button facing up, as shown below.



Registering a TV (or Monitor)

You must register the IR code of your TV (or monitor) in order to turn on your TV automatically whenever you turn on the receiver.

IR code registration is unnecessary in the following case

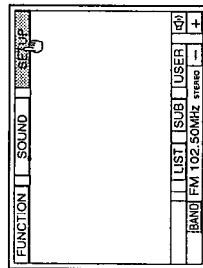
If your TV is a Sony product that can be controlled by an infrared remote, and it is connected to the receiver by its VIDEO 1 video input jack, you do not need to register its IR code.

Registering IR codes

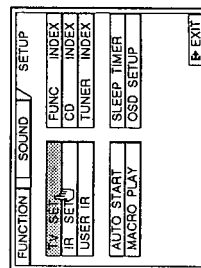
1 Turn on the receiver and the TV.

Make sure the input selector on the TV is set to the video input.

2 Click SETUP in the main menu.

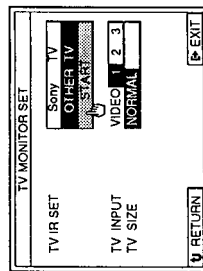


3 Click TV SET.

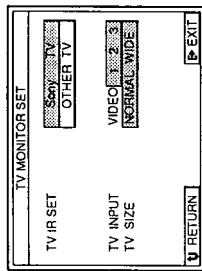


5 Cover the IR sensor on the TV to prevent accidental operation. Otherwise, the on-screen display may be turned off during the registration procedure.

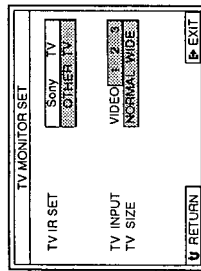
6 Click START.



- 4 • Sony TV
 - 1 Click Sony TV.
 - 2 Click VIDEO 1, 2 or 3 to select the video input of the TV that is connected to the receiver.
 - 3 If your TV type is a wide screen type (screen ratio: 16 x 9), click WIDE. The IR codes are automatically registered and registration is complete.



- Non-Sony TV
 - 1 Click OTHER TV.
 - 2 Click VIDEO 1, 2 or 3 to select the video input of the TV that is connected to the receiver.
 - 3 If you are using a wide TV, click WIDE.
 - 4 Go to step 5.

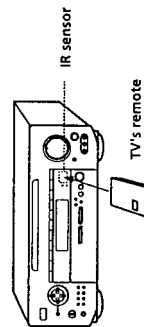
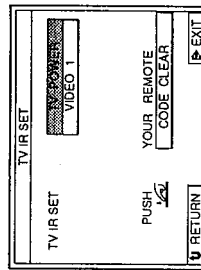


- 7 When "PUSH YOUR REMOTE" appears in the on-screen display, press the button on the TV's remote that corresponds to the highlighted control button (e.g., POWER).

- If your TV's remote has an independent input selector button (e.g., VIDEO 1) Register the IR code of this button when the VIDEO 1 button appears. When you turn on the receiver, the TV switches to the video input automatically.

- If your TV does not have an independent input selector button or has a cyclic input selector button Do not register an IR code of the input selector button. The TV's input cannot be switched automatically when you turn on the receiver.

Switch the TV to the video input manually. If you registered an IR code for the VIDEO 1 button, erase the VIDEO 1 code following the steps in "To erase a specific IR code" below.



When registering the IR code, be sure to do the following; otherwise, the IR code may not be registered correctly.

- Point the remote at the IR sensor on the receiver from a distance of less than 1.2 inches (3 cm).
- Hold down the button on the remote for about 5 seconds until the instruction "RELEASE YOUR REMOTE" appears.
- Keep the remote pointed horizontally at the IR sensor until the code is registered.

- 8 Repeat step 7 for the remaining buttons that appear in the on-screen display. If "NG" is displayed, an IR code was not registered correctly. In this case, repeat step 7 again.

To return to the main menu
Click EXIT.

To return to a previous menu
Click RETURN.

To exchange from a non-Sony TV to a Sony TV
Connect the receiver's MONITOR OUT jack to the VIDEO 1 input jack of the Sony TV. Follow the registration steps 1 to 3, then click SONY TV in step 4. Click VIDEO 1, 2, 3 and/or WIDE to specify VIDEO 1 and/or WIDE if necessary.

Note

Some IR codes may not have been successfully registered, even if "RELEASE YOUR REMOTE" appears on the TV screen. In this case, try registering the IR code again. If the IR code still cannot be registered, follow the procedure described in "Registering Desired Components (User IR setting)" on page 33.

Erasing TV IR codes

Click CODE CLEAR in the TV IR set menu that appears when you click START.

- To erase a specific IR code
 - 1 Click SINGLE IR CODE CLEAR. "SELECT CLEAR CODE KEY" appears.
 - 2 Click the button you want to clear. "Are you sure?" appears.
 - 3 Click YES to erase the code. To cancel erasing, click NO.

To erase another code repeat steps 2 and 3.
- To erase all the TV IR codes
 - 1 Click TV IR CODE CLEAR. "Are you sure?" appears.
 - 2 Click YES to erase the codes. "CODE CLEAR" appears in the display. To cancel erasing, click NO.

Registering Audio and Video Components

You must register the IR code of your audio/video component to control your component using the on-screen display.

IR code registration is unnecessary in the following case

If your audio/video component is a Sony product that can be controlled by an infrared remote, and it is connected to the jacks shown in the following table, you do not need to register the IR code.

Receiver jacks	Component to be connected
VIDEO 1	Sony VTR 3 (VHS)
VIDEO 2	Sony VTR 1 (BETA)
VIDEO 3	Sony VTR 2 (8 mm)
LD/DVD	Sony LD player
TV/DBS	Sony DBS receiver (USA, Canada and Australia only)
DAT/MD	Sony DAT deck
CD	Sony CD player (CD 1)
TAPE	Sony Tape deck
MONITOR	Sony TV (via its VIDEO 1 jack)

The following cases require registration of Sony products

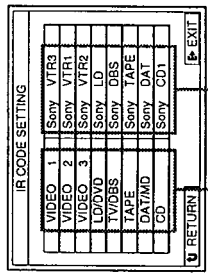
- When connecting a Sony MD deck to the DAT/MD jacks.
- When connecting a Sony audio product with CONTROL-A1 compatibility.
- When connecting a Sony product to jacks other than those specified in the previous table (e.g., when connecting a Sony LD player to the VIDEO 3 jacks).
- When exchanging a non-Sony audio or video component with a Sony product.

Notes

- If your VCR has a COMMAND CODE selector switch (for VTR1, VTR2, or VTR3), set the switch to the applicable setting. If your VCR has a built-in StarSight tuner, you must set the COMMAND CODE selector switch to VTR 3.
- If your CD changer has a COMMAND MODE selector switch (for CD 1, CD 2, or CD 3), normally it should be set to "CD 1." However, if your CD changer has VIDEO OUT terminals, set the command mode to "CD 2" or "CD 3" ("CD 3" should be used only when making CONTROL-A1 connections).

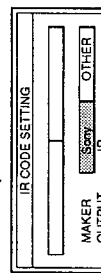
Registering IR codes

- Click **SETUP** in the main menu.
- Click **IR SET**.
- Click the name of the receiver's jack you want.



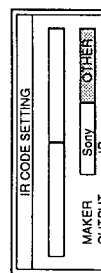
Receiver's jacks
Connected component

- Sony product
Click Sony.
The IR codes are automatically registered and registration is complete.

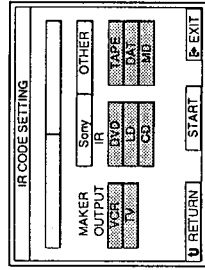


To take advantage of CONTROL-A1 compatible audio components, such as multi-disc CD players, click CONTROL-A1 to select CONTROL-A1.

- non-Sony product
Click OTHER.



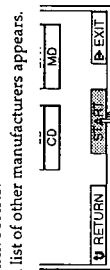
- Click the respective component.



- If the component is not a VCR or laser disc player

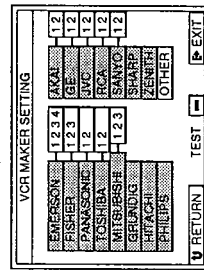
- Cover the IR sensor on the component to prevent accidental operation during the registration procedure.
- Click **START**, then go to step 6.

- If the component is a VCR or laser disc player:
1 Click **START**.



- Click the manufacturer of the component you want.

The IR codes for that component are automatically registered.



- If the manufacturer is not listed, cover the IR sensor on the component to prevent accidental operation during the registration procedure, click **OTHER**, then go to step 6.

- Click **TEST**.

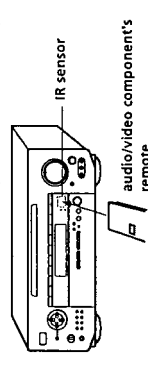
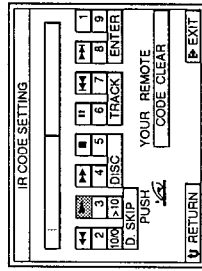
If the selected component turns on, the IR codes have been registered. The registration is complete.

If the component does not turn on:
Click the number button beside the manufacturer's name to select another number, then click **TEST** again.

If the component still does not turn on:
Cover the IR sensor on the component to prevent accidental operation during the registration procedure is complete, click **OTHER**, then go to step 6.

- When "PUSH YOUR REMOTE" appears, press the button on your audio/video component's remote that corresponds to the control button highlighted.

After you have registered all the IR codes, the IR CODE SETTING menu reappears.



When registering the IR code, be sure to do the following; otherwise, the IR code may not be registered correctly.

- Point the remote at the IR sensor on the receiver from a distance of less than 2 inches (5 cm).
- Hold down the button on the remote for about 5 seconds until the instruction "RELEASE YOUR REMOTE" appears.
- Keep the remote pointed horizontally at the IR sensor until the code is registered.

- Repeat steps 3 to 6 to register IR codes from other components.

(continued)

To return to the main menu

Click EXIT.

To return to a previous menu

Click RETURN.

To register special IR codes that do not appear as on-screen controls

See "Registering Desired Components (User IR setting)" on page 33.

Notes

- If the IR codes do not operate as expected, perform the registration operation(s) again to make sure the IR codes are registered correctly. If the IR code still cannot be registered, see "Registering Desired Components (User IR setting)" on page 33.
- If you experience difficulty operating the INPUT, number, or ENTER buttons of a VCR or LD player after automatic registration in step 5, register the IR codes for that component manually as shown in step 6.
- On some other manufacturer's LD players, the **▶▶** and **◀◀** buttons may not operate correctly even after the IR codes are registered in step 5. In this case, register the IR codes for the **▶▶** and **◀◀** buttons manually as shown in step 6.
- If you register a playback source as TOSHIBA 2 or RCA 2, you cannot turn the TV on or off using the receiver's remote (the power will not go on when you click TEST).
- Do not register the same type of component (e.g., an LD player) at several different functions.
- You can register about 200 IR codes, including user IR codes (see page 33); however, depending on the type of codes recorded, the maximum limit may be less than 100. It may be difficult or impossible to register about 200 codes under the following conditions:
 - When registering from remotes with weak batteries.
 - When registering IR codes that have been registered to a programmable remote (e.g., any IR code not originally supplied in the respective remote).
- Keep the IR sensor away from fluorescent light or direct sunlight. Otherwise, the IR codes may not be registered.
- If the AC power cord is disconnected for about two weeks, the registered IR codes will be erased. "ALL CLEAR" will appear on the TV screen the next time you turn on the receiver.
- Some remote controls supplied with audio and video components made by other manufacturers may have a special format. In such cases, it may not be possible for the receiver to learn (or properly execute) their command codes.

Erasing IR codes

Click CODE CLEAR in the IR CODE SETTING menu that appears when you click START.

To erase a specific IR code

- Click SINGLE IR CODE CLEAR.
"SELECT CLEAR CODE KEY" appears.
 - Click the button you want to clear.
"Are you sure?" appears.
 - Click YES to erase the code.
"CODE CLEAR" appears.
- To cancel erasing, click NO.

To erase another code repeat steps 2 and 3.

To erase all the IR codes for the current component

- Click (OTHER CD) CODE CLEAR.

"Are you sure?" appears.

Click YES to erase the codes.

"CODE CLEAR" appears.

To cancel erasing, click NO.

To erase all the IR codes.

- Click ALL IR CODE CLEAR.

"Are you sure?" appears.

Click YES to erase the codes.

"CODE CLEAR" appears.

To cancel erasing, click NO.

Dolby Pro Logic Surround Setup

What is Dolby Pro Logic Surround?

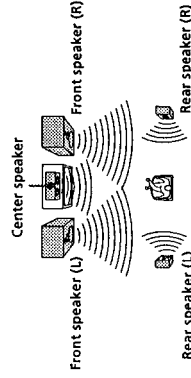
Dolby Pro Logic Surround is a decoding system standardized in TV programs and movies. Dolby Pro Logic Surround improves sound image by using four separate channels. These channels manipulate the sound and enhance the action as it happens on the screen.

Specifying the center mode

To take advantage of Dolby Pro Logic Surround, you should connect at least one pair of rear speakers and/or one center speaker, plus a TV and a VCR. Also, to enjoy a full effect, you need to select the appropriate center mode (WIDE, NORMAL, PHANTOM, or 3 CH LOGIC modes) on the receiver, according to your speaker system.

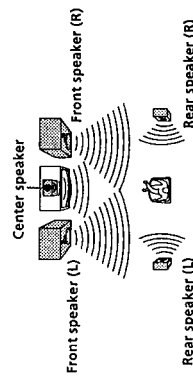
WIDE mode

Select this mode if you have front and rear speakers and a large center speaker. With this mode, you can take full advantage of Dolby Surround sound.



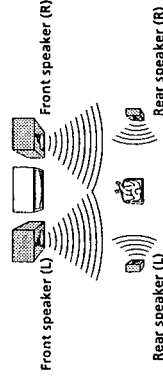
NORMAL mode

Select this mode if you have front and rear speakers and a small center speaker. Since a small speaker cannot produce enough bass, the bass sound of the center channel is output from the front speakers.



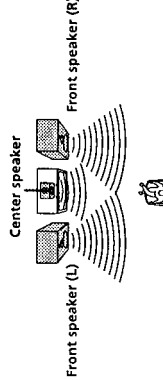
PHANTOM mode

Select this mode if you have front and rear speakers but no center speaker. The sound of the center channel is output from the front speakers.



3 CH LOGIC mode

Select this mode if you have front and center speakers but no rear speakers. The sound of the rear channel is output from the front speakers to let you experience some of the surround sound without using rear speakers.



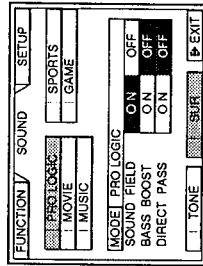
Adjusting the speaker volume

To enjoy Dolby Pro Logic Surround sound, select the appropriate center mode. Then adjust the volume of each speaker using the test tone that the receiver provides. The test tone feature lets you set the volume of your speakers to the same level. (If all of your speakers have equal performance, you do not have to adjust the speaker volume.)

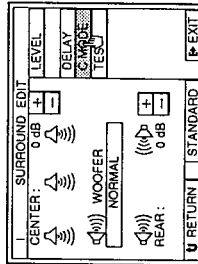
Using the remote lets you adjust the volume level from your listening position.

1 Click SOUND in the main menu.

2 Click PRO LOGIC, then click SUR.



3 Click C MODE repeatedly to display the center mode appropriate for your speaker system (see page 19).



4 Click TEST.

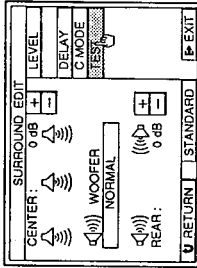
You will hear a test tone from the speakers in the following order. The speaker emitting the test tone is shown in red on the SURROUND EDIT menu.

WIDE, NORMAL: Front (left) → Center → Front (right) → Rear

FRONT (right) → Front (right) → Rear

PHANTOM: Front (left) → Front (right) → Rear

3CH LOGIC: Front (left) → Center → Front (right)



5 Adjust the volume levels so that you hear the test tone from each speaker at the same volume level when you are in your listening position:

- Click CENTER + or - to adjust the level of the center speaker from -15.0 dB to +10.0 dB (1 dB/steps).

During this adjustment, the test tone is emitted from the center speaker.

- Click REAR + or - to adjust the level of the rear speakers from -15.0 dB to +10.0 dB (1 dB/steps).

During this adjustment, the test tone is emitted from both speakers simultaneously.

6 Click TEST when you are done adjusting.

The test tone is turned off.

To return to the main menu

Click EXIT.

To return to a previous menu

Click RETURN.

You can adjust all speakers at one time
Use MASTER VOL on the remote.

Selecting a Component

You can listen to or watch a connected component by clicking on the component in the on-screen display.

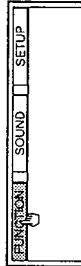
Before you begin, make sure you have:

- Registered the IR codes for the connected components (see pages 14 to 18).
- Turned MASTER VOL on the front panel to the leftmost position (0) to avoid damaging your speakers.
- Set the Auto Play function to ON. (The factory setting is ON, see page 35.)
- Selected the appropriate speaker system (see page 9).
- Set BALANCE on the front panel to the center position.

1 Press the button on the remote once or twice to turn on the receiver.

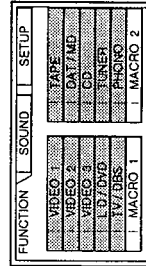
The TV turns on automatically, and the main menu appears. If the TV does not turn on automatically, see pages 14 to 15 to register your TV.

2 Click FUNCTION in the main menu.



3 Click the component you want.

The control buttons appear, then the component turns on and starts playing automatically.



To listen to or watch	Click**
TV programs***, or video tapes	VIDEO 1, VIDEO 2 or VIDEO 3
Laser Discs (LD) or DVD	LD/DVD
TV programs (only for Sony TV with TV OUT jacks) or Digital Broadcasting Satellites (DBS)**	TV/DBS (or TV)**
Digital Audio Tapes (DAT) or MiniDisc (MD)	DAT/MD
Compact Discs (CD)	CD
Radio programs**	TUNER
Records	PHONO**
Analog audio tapes	TAPE

** If you connect the component to jacks other than those specified in the table, click the appropriate one according to your connection (e.g., If you connect the LD player to the VIDEO 3 jacks, click VIDEO 3 to watch the LD).

** For details about watching TV or controlling a DBS receiver, see page 22.

** TV/DBS : USA, Canada, and Australia

TV : Other countries

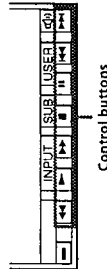
** For details about tuning radio stations, see page 23.

** Control buttons do not appear when you select PHONO.

4 Use MASTER VOL + or - on the remote to adjust the volume.

To adjust the volume of the TV's speakers, use the volume control on the TV.

To operate the selected component, click the control buttons. For details of the functions of the selected component, see the instructions of the selected component. To display other control buttons for the selected component, click SUB.



Control buttons

(continued)

To turn off the selected component

Click in the bottom left corner. To turn on the component, follow steps 1 to 3.

To turn off all components

Press SYSTEM OFF (for USA and Canadian models) or ALL OFF (for other models) on the remote control.

To mute the sound

Click . The icon changes to and turns green. "MUTING" appears in the display on the front panel. To turn the sound back on, click on the icon again.

- For USA and Canada: You can also mute the sound by pressing MUTING on the remote control. "MUTING" appears in the display on the front panel. Press again to restore the sound.

To listen to decoded Dolby Digital (AC-3) program sources

Click FUNCTION, then click 5.1 INPUT. The video signal from the LD/DVD VIDEO IN jack is automatically paired with the audio signals from the 5.1 INPUT jacks. When set to this mode, the receiver functions purely as an amplifier. To adjust the sound of the 5.1 INPUT, use the controls on your Dolby Digital (AC-3) decoder.

To listen to the analog audio signals input to the LD/DVD AUDIO (L and R) jacks, select LD/DVD from the FUNCTION menu.

You can play video and audio components at the same time

Play a video component you want, then play audio component. Make sure the AUTO PLAY function is set to off (see page 35).

Notes

- Components of the same type (e.g., Sony LD player) will be controlled simultaneously by the on-screen controls.
- If a component does not respond, it may be because IR codes from the IR emitter are not fully reaching the component. In this case, connect the extra IR repeater (supplied) and position it facing the component (see "Infrared (IR) Repeater Hookups" on page 6). If the IR repeater is already connected, change the position of the IR repeater or program source.

Watching TV or Video Programs

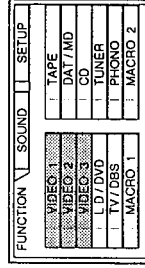
Use the TV tuner built-in to the VCR to watch TV programs; otherwise, the on-screen display will change to a TV program when you switch channels. Also, set the VCR's TV tuner to skip channels where there is no broadcast so that an image is always displayed on the TV screen; otherwise, the on-screen display will be distorted.

Before you begin, make sure you have:

- Connected your TV and VCR to the receiver (see pages 9 to 10).

- 1 Select the appropriate VCR component (e.g., VIDEO 2).

Do not select TV/DBS*. If you select TV/DBS, the Auto Play function (page 35) will not operate the next time you select the VCR.



- 2 Click CH + or - to select the channel you desire.



- TV/DBS: USA, Canada and Australia
- TV: Other countries

If the Auto Play function is set to on (page 35).

Be sure to click to stop playback from the VCR before clicking CH + or -.

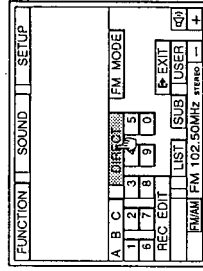
Tuning and Presetting Radio Stations

The receiver lets you directly enter a station's frequency using the number buttons (Direct Tuning). You can also tune a station by scanning stations (Automatic Tuning), and by selecting preset stations (Preset Tuning; see page 25).

- 1 Click FUNCTION in the main menu, then click TUNER.
- 2 Click FM/AM to select FM or AM, then click SUB.

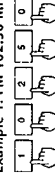


- 3 Click DIRECT.

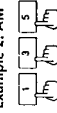


- 4 Click the number buttons to enter the frequency.

Example 1: FM 102.50 MHz



Example 2: AM 1350kHz



- 5 Repeat steps 2 to 4 to receive other stations.



If an FM stereo program is noisy

"STEREO" flashes next to the frequency. Click FM MODE to change to monaural (MONO) reception. There will be no stereo effect, but the reception will improve. To return to the auto stereo mode, click this icon again.



If "STEREO" remains off

Click FM MODE, even when an FM stereo broadcast is received.

If an AM program is noisy

Adjust the direction of the AM loop antenna for optimum reception.

If you cannot tune in a station and the entered numbers are flashing

Make sure you have entered the right frequency. If not, reenter the frequency you want.
If the entered numbers still flash, the frequency is not used in your area.

If you enter a frequency not covered by the tuning interval

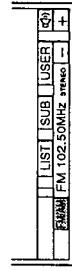
The entered value is automatically rounded up or down to the closest covered value.
Tuning intervals for Direct Tuning are:
FM: 50 kHz intervals
AM: 10 kHz intervals
(except for Australian and Singaporean models)
(to change to 9 kHz intervals, see page 52)
9 kHz intervals

To watch FM simulcast TV programs

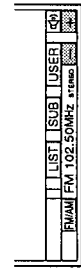
Make sure that you tune in the simulcast program on both the TV (or VCR) and the receiver.

Tuning radio stations by scanning stations (Automatic Tuning)

- 1 Click FUNCTION in the main menu, then click TUNER.
- 2 Click FM/AM to select FM or AM.



- 3 Click + or -.
The frequency indication changes and scanning stops when the receiver tunes in a station. To continue scanning, click + or - again. Click + for a higher station number; click - for a lower one.
When the scanning is finished, the receiver starts scanning again.



Presetting the radio stations

The receiver can store a total of 30 FM or AM stations. You can store up to 10 stations in three different "pages": A, B and C, and recall them later with a simple click. You can also assign names to the preset stations (see page 34).

- 1 Tune in the station you want.
- 2 Click LIST.

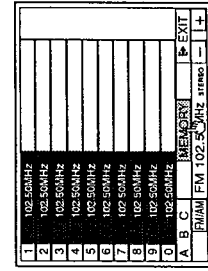


- 3 Click A B C repeatedly to select the page (A, B, or C) you want.

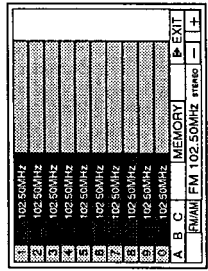


- 4 Click MEMORY.

MEMORY turns red.



- 5 Click the number button (0 to 9) you want.
The number button lights up and the station is stored.



- 6 Repeat steps 1 to 5 to preset up to 30 stations.
You can also use + or - next to the frequency to tune stations from the LIST menu.

To change a preset station

Preset a new station at the number you want to change.
Note
If the AC power cord is disconnected for about 1 week, the preset stations will be cleared. Preset the stations again.

Tuning preset stations (Preset Tuning)

- 1 Click FUNCTION in the main menu, then click TUNER.
- 2 Click LIST.
- 3 Click A B C repeatedly to select the page, then click the number button (0 to 9) of the station you want.

To recall preset stations from the SUB menu
Click SUB, then click A B C repeatedly to select the page, and then click the number button (0 to 9).

Recording

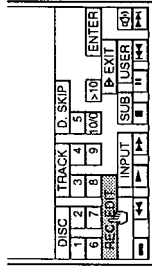
You can control both playback and recording components using the receiver's on-screen display. If necessary, see the instructions of your recording component.

Recording to audio tape or MD

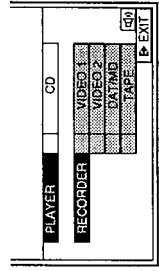
- 1 Click FUNCTION in the main menu.
- 2 Click the playback component you want (e.g., CD).
- 3 Click SUB.



- 4 Click REC EDIT.

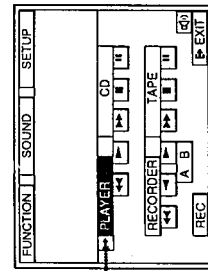


- 5 Click a recording component (e.g., TAPE).



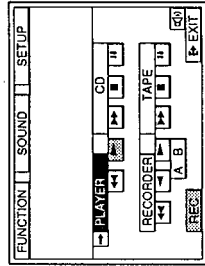
The control buttons for both components appear. "PLAYER" for the playback component, and "RECORDER" for the recording component.
The green arrow indicates the operative component.

green arrow



- 6** Insert a blank tape into the recording component (tape deck, etc.) and adjust the recording level, if necessary.

- 7** Click REC to start recording, then click the play button (▶) on the PLAYER control. Recording starts. Do not click any RECORDER controls while recording. This will cut off the source being recorded.



To stop recording

Click the recording component's ■ control.

To control the recorder after recording

Click RECORDER. RECORDER becomes the operative component and you can use the RECORDER controls to rewind and playback the recording (etc.).

Click PLAYER to operate the playback component.

To return to the main menu

Click EXIT.

Notes

- If you leave the REC EDIT menu by clicking FUNCTION, SOUND, or EXIT, recording continues, but control returns to the PLAYER side, even if you previously clicked RECORDER.
- Some tape decks require that you press the ● REC and ▶ buttons simultaneously to start recording. To perform one-button recording from the on-screen display, be sure to record the recording signal as shown in steps 1 to 7 of "Registering IR codes" (pages 16 to 18).
- Sound input through the 5.1 INPUT jacks cannot be recorded on a recording component.
- When you record on a DAT or MD connected to the DAT/MD REC OUT jacks, sound adjustments do not affect the recording.

■ Recording other components to video tape

- 1 Click FUNCTION in the main menu.
- 2 Click the video playback component you want (VCR 1, VCR 2, LD/DVD, etc.).
- 3 Click REC. (If you selected LD/DVD or TV/DBS* in step 2, click SUB.)

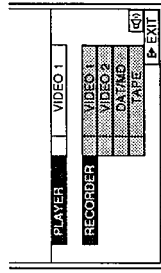


- 4** Click REC EDIT.

If you selected LD/DVD or TV/DBS* in step 2, click REC EDIT in the sub menu.

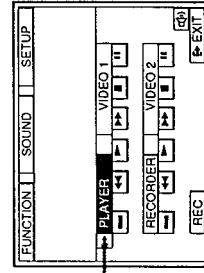


- 5** Click a recording component (e.g., VIDEO 2).



The control buttons for both components appear: "PLAYER" for the playback component, and "RECORDER" for the recording component. The green arrow indicates the operative component.

green arrow



- 6** Insert a blank tape into the recording component (VCR, etc.) and adjust the recording level, if necessary.

- 7** Click REC to start recording, then click the play button (▶) on the PLAYER control. Recording starts. Do not click any RECORDER controls while recording. This will cut off the source being recorded.

To stop recording

Click the recording component's ■ control.

To control the recorder after recording

Click RECORDER. RECORDER becomes the operative component and you can use the RECORDER controls to rewind and playback the recording (etc.).

Click PLAYER to operate the playback component.

To return to the main menu

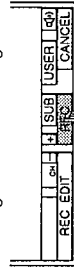
Click EXIT.

■ Recording TV programs to video tape

- 1 Click FUNCTION in the main menu and select a VCR 1 or 2.
- 2 Tune in the TV program on your video deck.
- 3 Click REC.



- 4** Click REC again to start recording.



Using the Pre-programmed Sound Fields

The sound fields let you select a sound characteristic to enhance the type of programs or music you are listening to. To make the most out of this feature, we recommend that you connect center and/or rear speakers.

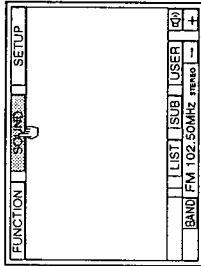
Sound fields	
Genre	Surround effect
PRO LOGIC**	Decodes programs processed with Dolby Surround.
ENHANCED PRO LOGIC	Additional output from rear speakers when decoding Dolby Surround programs.
MOVIE	
CINEMA STUDIO A	Reproduces the sound characteristics of the Sony Pictures Entertainment "Cary Grant Theater" cinema production studio.
CINEMA STUDIO B	Reproduces the sound characteristics of the Sony Pictures Entertainment "Kim Novak Theater" cinema production studio.
THEATER	Adds acoustic reflections of a theater to decoded Dolby Surround signals.
NIGHT THEATER	Compresses the dynamic range for listening at low volume levels.
MONO MOVIE	Creates a theater-like environment from movies with monaural soundtracks.
MUSIC	
SMALL HALL	Reproduces the acoustics of a rectangular concert hall. Ideal for soft acoustic sounds.
LARGE HALL	
JAZZ CLUB	Reproduces the acoustics of a jazz club.
LIVE HOUSE	Reproduces the acoustics of a rock and roll club.
ACOUSTIC**	Reproduces normal 2-channel stereo with equalization (EQ).
SPORTS	
STADIUM	Reproduces the feeling of a large open-air stadium. Great for electric sounds.
GAME	
GAME	Obtains maximum audio impact from video game software.

**1 If you select PRO LOGIC, be sure to adjust the volume level of the center and/or rear speakers to get the most out of the Dolby Pro Logic Surround Sound (see page 19).

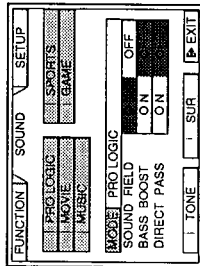
**2 If you select ACOUSTIC, the hookups of the center and/or rear speakers are unnecessary.

Selecting the sound fields

- 1 While playing a component, click SOUND in the main menu.



- 2 Click a sound field genre, then click MODE repeatedly until the mode you want appears. See "Sound fields" chart on page 28.



To turn off the sound fields
Click SOUND FIELD OFF.

You can adjust the bass sound or listen to the music directly in the SOUND FIELD SELECT menu

To increase the bass sound, click BASS BOOST ON. To listen to the music without any audio effects, click DIRECT PASS ON. Click OFF to cancel. Even if you set SOUND FIELD to OFF, these functions are effective.

(continued)

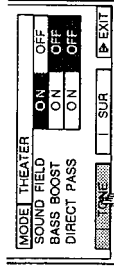
Adjustable sound parameters		Tone parameter		Surround sound parameters		
Genre	Mode	BASS/TREBLE	CENTER level	REAR level	DELAY time	EFFECT level
PRO LOGIC*	PRO LOGIC	●	●	●	●	●
	ENHANCED PRO LOGIC	●	●	●	●	●
	CINEMA STUDIO A	●	●	●	●	●
	CINEMA STUDIO B	●	●	●	●	●
MOVIE	THEATER	●	●	●	●	●
	NIGHT THEATER	●	●	●	●	●
	MONO MOVIE	●	●	●	●	●
	SMALL HALL	●	●	●	●	●
MUSIC	LARGE HALL	●	●	●	●	●
	JAZZ CLUB	●	●	●	●	●
	LIVE HOUSE	●	●	●	●	●
	ACOUSTIC	●	●	●	●	●
SPORTS	STADIUM	●	●	●	●	●
	GAME	●	●	●	●	●

* To get the most out of the PRO LOGIC sound fields, also see the chapter "Dolby Pro Logic Surround Setup" on page 19.

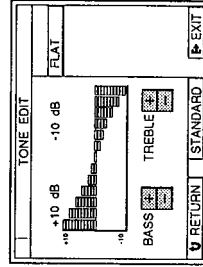
Adjusting the tone parameter

Adjust the tone (bass, midrange or treble) of the front, center and rear speakers for optimum sound. You can adjust the tone of all sound fields.

- 1 While playing a component, click SOUND in the main menu.
- 2 Click a sound field genre, then click MODE repeatedly until the mode you want appears.
- 3 Click TONE.



- 4 Click BASS + or - to adjust the level of the low frequencies and click TREBLE + or - to adjust the level of the high frequencies.



To start adjustment with a flat equalizer curve
Click FLAT.

To reset the tone to the factory settings
Click STANDARD.

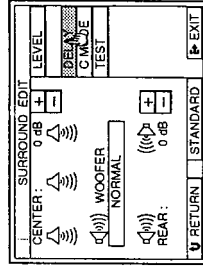
Note

You may hear some noise as you adjust the parameters.

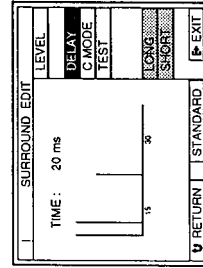
Adjusting the delay time

The delay time is the time lag between the surround sound output from front and rear speakers. You can make the surround sound more effective by delaying the output from the rear speakers. You can select between three different delay times: 15ms, 20ms, and 30ms. For example, if you have placed the rear speakers in a large room or apart from your listening position, you might want to shorten the delay time. **Delay time adjustment is only available for the PRO LOGIC genre.**

- 1 Start playing a component encoded with Dolby surround sound, then click SOUND in the main menu to display the SOUND FIELD SELECT menu.
- 2 Click PRO LOGIC, then click SUR.
- 3 Click DELAY.



- 4 Click SHORT or LONG to adjust the delay time.



To reset the delay time to the factory settings
Click STANDARD.

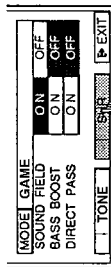
(continued)

Adjusting the effect or speaker levels

Adjust the effect and speaker level parameters to fit your listening situation. See the chart "Adjustable sound parameters" on page 30 for parameters you can adjust in each sound field.

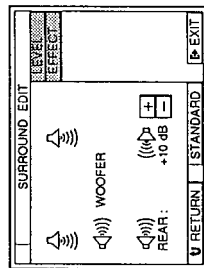
- 1 While playing a component, click SOUND in the main menu to display the SOUND FIELD SELECT menu.

- 2 Click a sound field genre, then click MODE repeatedly until the mode you want appears, then click SUR.

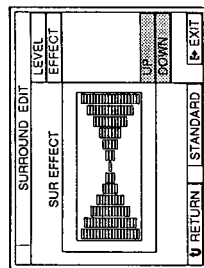


- 4 Click the icon for the parameter you want to adjust.

The parameter chart for your selection appears.



- 5 Click an adjustment icon (UP/DOWN, + / -) to adjust the parameter.



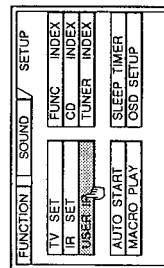
To reset all parameters (except for the delay time) of the current sound field to the factory settings. Click STANDARD.

Hints for adjusting the effect level (EFFECT)
This parameter allows you to adjust the overall presence of the sound field.

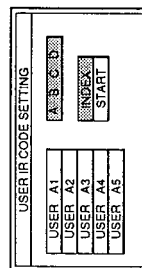
Registering Desired Components (User IR setting)

Use the USER IR CODE SETTING menu to register any IR codes that could not be registered in "Registering Audio/Video components" on page 16. By registering User IR codes, you can control a variety of appliances (such as air conditioners) as well as audio/video components. You can register up to 20 User IR codes.

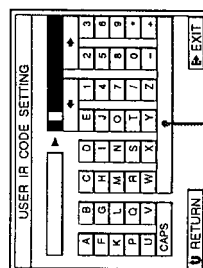
- 1 Click SETUP in the main menu to display the SETUP menu, then click USER IR.



- 2 Click A B C D to select a User IR code page, then click INDEX.



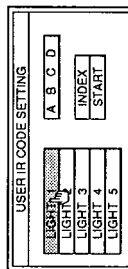
- 3 Create a name for the IR code by clicking each character. The name is automatically stored. To enter a space, click the space bar. To switch between upper and lower case letters, click CAPS. If you made a mistake, click ? or / to move the cursor to the character to be changed, then click the correct character.



Space bar

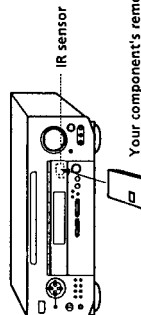
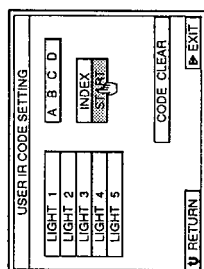
- 4 Click RETURN to go back to the USER IR CODE SETTING menu, then repeat steps 2 to 4 until you enter the names of all the IR codes you want to register.

- 5 Click the name of the first IR code.



- 6 Cover the IR sensor on the respective component to prevent accidental operation during the registration procedure.

- 7 Click START. When "PUSH YOUR REMOTE" appears on the TV screen, press the button you want to register.



When registering the IR code, be sure to do the following; otherwise, the IR code may not be registered correctly.

- Point the remote at the IR sensor on the receiver from a distance of less than 2 inches (5 cm).
- Hold down the button on the remote for about 5 seconds until the instruction "RELEASE YOUR REMOTE" appears.
- Keep the remote pointed horizontally at the IR sensor until the code is registered.

To register a specific IR code

Click the button where the IR code was registered, then click START.

(continued)

Notes

- If the AC power cord is disconnected for about two weeks, the registered IR codes will be cleared. "ALL CLEAR!" will appear on the TV screen the next time you turn on the receiver.
- The power switch on some air conditioners use two independent IR codes, even when there is only one switch. If you cannot turn the air conditioner off with the IR code registered for the on/off switch, repeat the procedure and register the on and off IR codes separately.
- The receiver may not be able to register IR codes with special waveforms produced on some remote controls.

Erasing IR codes

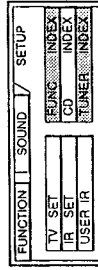
Click CODE CLEAR in the USER IR CODE SETTING menu.

- To erase a specific IR code
 - Click SINGLE IR CODE CLEAR.
 - Click the button you want to clear.
 - "Are you sure?" appears.
 - Click YES to erase the code.
 - "CODE CLEAR" appears.
 - To cancel erasing, click NO.
- To erase another code repeat steps 2 and 3.
- To erase all the User IR codes.
 - Click USER IR CODE CLEAR.
 - "Are you sure?" appears.
 - Click YES to erase the codes.
 - "CODE CLEAR" appears.
 - To cancel erasing, click NO.

Indexing

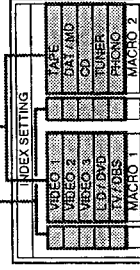
The Index functions let you specify icons for each function button and names up to 8 characters long for each function button and preset radio station.

- Click SETUP in the main menu to display the SETUP menu, then click FUNC INDEX or TUNER INDEX.



- For the function buttons (FUNCTION INDEX)
 - Click the icon to be specified.
 - Click the icon you want from the icon menu, then click RETURN.
 - Click the function button to be specified.

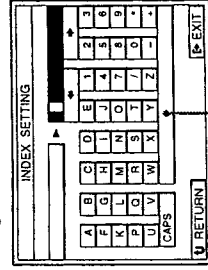
Icons



- For the preset radio stations (TUNER INDEX)
 - Click LIST TUNER to display the list of the preset frequencies
 - Click ABC to select the page, then select the station to be named.



- Create the new name by clicking each character. The name is stored automatically. To enter a space, click the space bar. If you made a mistake, click ← or → to move the cursor to the character to be changed, then click the correct character.

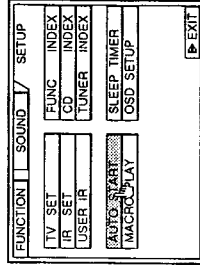


Space bar

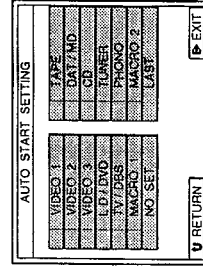
Starting a Component Automatically at Power On (Auto Start)

The Auto Start function lets you set the receiver to start playing a specific component immediately whenever you turn on the receiver.

- Click SETUP in the main menu to display the SETUP menu, then click AUTO START.



- Click the component you want.
 - To start the last-played component automatically when you turn on the receiver, Click LAST.
 - To do a macro automatically when you turn on the receiver, Click MACRO 1 or MACRO 2. Be sure that the Auto Play function is set to on.



To cancel the Auto Start function
Click NO SET in step 2.

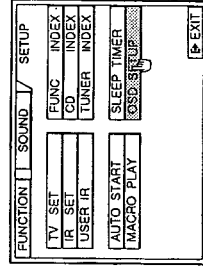
Note

A Macro Play setting containing the ALL OFF command cannot be selected for Auto Start.

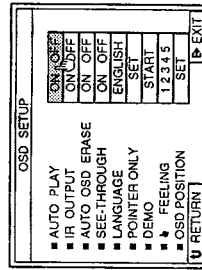
Playing Components Automatically (Auto Play)

The Auto Play function lets you set the receiver to start playing the components immediately after they are selected from the FUNCTION SELECT menu. The receiver comes from the factory with Auto Play set to on.

- Click SETUP in the main menu to display the SETUP menu, then click OSD SETUP.



- Click AUTO PLAY ON or OFF.



Notes

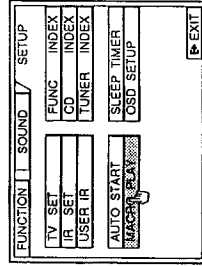
- The Auto Play function does not work when you operate the receiver from the front panel.
- The receiver cancels the automatic playback function of components designed to start playing when they are turned on (such as laser disc and CD players). To activate the auto play function, set the receiver's Auto Play to on.

Starting Several Components in Sequence Automatically (Macro Play)

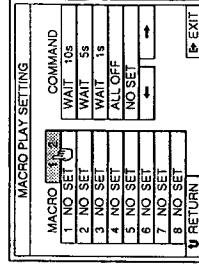
The Macro Play function lets you link several IR codes in a sequential order as a single command. The receiver provides 2 pages (MACRO 1 and 2). You can specify up to 8 of the registered IR codes for each page.

Setting the sequence of IR codes

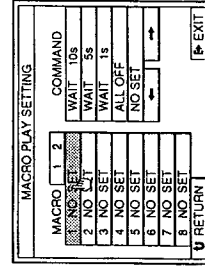
- 1 Click **SETUP** in the main menu to display the **SETUP** menu, then click **MACRO PLAY**.



- 2 Click **MACRO 1** or **2**.



- 3 Click macro step number 1. This is the first IR code in the macro sequence.



- 4 Click **←** or **→** to show the IR codes available for that button. The registered IR codes appear at the right of the screen.

- To specify a time lag between commands Click **←** or **→** repeatedly until the time lag commands (WAIT 10s, WAIT 5s, and WAIT 1s) appear.

- To specify an IR code to turn off all the components Click **←** or **→** repeatedly until **ALL OFF** appears.

- 5 Click the IR code you want.

The name of the IR code appears in the highlighted macro step number and the highlight moves to next macro step number.

- 6 Repeat steps 4 and 5 to enter up to 8 IR codes.

To erase an entered IR code

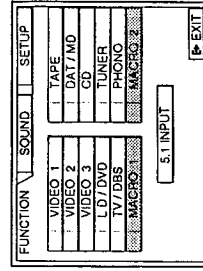
- 1 Click the code you want to erase.
- 2 Click **←** or **→** repeatedly until **NO SET** appears at the right of the screen.
- 3 Click **NO SET**.

Note

The **ALL OFF** command is not available for the Macro Play selected for Auto Start.

Starting a Macro Play

Click **FUNCTION** in the main menu, then click **MACRO 1** or **MACRO 2**. The specified IR codes start automatically.

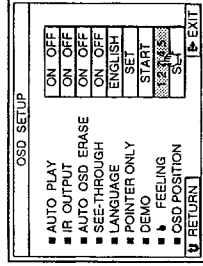


You can start a Macro Play automatically when you turn on the receiver by selecting a Macro Play in the Auto Start function (see page 35).

Adjusting the Sensitivity of the Remote

You can select from five sensitivity levels that determine the speed at which the pointer moves.

- 1 Click **SETUP** in the main menu to display the **SETUP** menu, then click **OSD SETUP**.
- 2 Click **FEELING** 1 to 5 to select the sensitivity level you want. The higher the number, the faster the speed.



- To select the display mode, click **AUTO OSD ERASE** (ON or OFF), **POINTER ONLY** (SET) or **DEMO** (START).

AUTO OSD ERASE: This display mode is useful during LD player operations since it allows you to see chapter numbers that otherwise might be hidden by the control panel. When this mode is on, control panels disappear whenever you click and hold down the direction control button on the remote. When you release the button, the control panel reappears.

POINTER ONLY: This display mode allows you to use the pointer to point to various on-screen items, such as during a presentation (etc.).

When you click **POINTER ONLY SET**, the on-screen display disappears except for the pointer and an **EXIT** button. To freeze the pointer, hold down the direction control button on the remote.

(continued)

DEMO: This display mode activates a program that explains the various functions of the receiver. Note that when the program is running, it replaces previously stored data (such as surround sound parameters) with data from the program. Click **START** to activate the program. To stop the program, click the direction control button on the remote two or three times or turn off the receiver.

- To select the display type, click **SEE-THROUGH** (ON or OFF) and **LANGUAGE** (ENGLISH, FRENCH or GERMAN).
- SEE-THROUGH:** When set to OFF, the display appears in the factory-set color. When set to ON, all menus and control panels are transparent, with only characters and outlines visible, allowing you to see the contents of video programs.

LANGUAGE: This setting lets you specify the language appearing in the on-screen display and the display on the front of the receiver. You can choose between three languages: English, French and German.

- To switch the IR OUTPUT setting Click **IR OUTPUT** ON or OFF. When it is set to OFF, the IR signals are output only from the IR OUT jack on the rear panel. No IR signals will be output from the IR emitter on the front panel. When the IR OUTPUT is set to OFF, "IR OFF" appears in the main menu. Normally, IR OUTPUT should be set to ON.

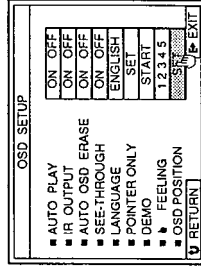
Note

Even if you have selected **SEE-THROUGH ON**, the display changes to the factory set color when there is no video signal being input. When a video signal is input, the display reverts to **SEE-THROUGH ON**.

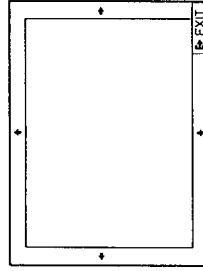
Adjusting the position of the on-screen display

You can adjust the overall position of the on-screen display control panel.

- Click **SETUP** in the main menu to display the **SETUP** menu, then click **OSD SETUP**.
- Click **OSD POSITION SET**.



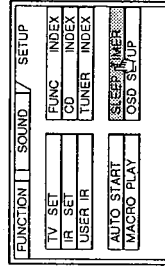
- Click the borders to adjust the position so you can just see the top, bottom, right and left edges of the border.



Using the Sleep Timer

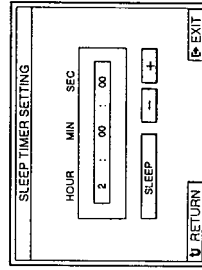
You can set the receiver to turn off automatically at a time you specify.

- Click **SETUP** in the main menu to display the **SETUP** menu, then click **SLEEP TIMER**.



- Click **TIMER** repeatedly to select the length of the sleep timer. Each time you click **TIMER**, the menu changes as follows:

→ 2:00:00 → 1:30:00 → 1:00:00 → 0:30:00 → OFF



"SLEEP" appears in the upper left corner of the main menu.

- You can also freely specify the time

Click + or - to change the sleep time in 1 minute increments. You can specify up to 5 hours.

- You can check the time remaining before the receiver turns off

Click **FUNCTION**, then click **SLEEP**. The remaining time appears in the on-screen display.

For USA and Canada

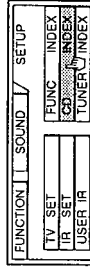
You can also operate the sleep timer by pressing **SLEEP** on the remote. Each time you press **SLEEP**, the time changes as shown in step 2 above. The display dims after you specify the time. To check the time remaining before the receiver turns off, press **SLEEP**.

Operating a CD Changer

Downloading the CD name data in a Sony CD changer with a CTRL A1 jack

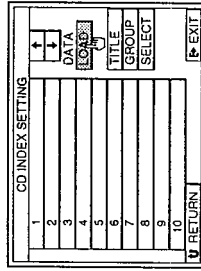
You can download all of the CD name data in a Sony CD changer that is equipped with a CTRL A1 jack, thus saving you the trouble of adding names one by one. Make sure that the **CONTROL A1** connection is complete (see page 7) and the CD changer is registered as a Sony **CONTROL A1** CD in the **IR CODE SETTING** menu (see page 16).

- Click **SETUP** in the main menu to display the **SETUP** menu, then click **CD INDEX**.



- Click **DATA LOAD**.

The CD name data is downloaded and after a few minutes, the downloaded data appears in the **CD INDEX SETTING** menu.



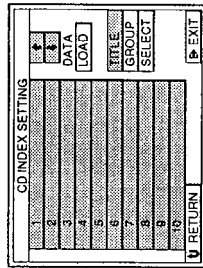
Note

If the characters (# \$; * ä ü) have been recorded in the CD changer, they will appear as blanks in the on-screen display.

Indexing a CD

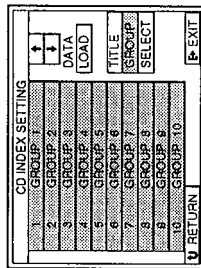
You can specify the names up to 12 characters for each CD (up to 200 discs) or group of discs in a CD changer.

- 1 Click **SETUP** in the main menu, then click **CD INDEX**.

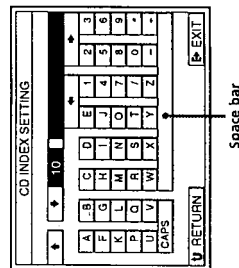


- 2 • To name a disc Click **TITLE**. And then Click $\uparrow$ or $\downarrow$ to display the number of the disc to be named, then click the disc.

- To name a group Click **GROUP**, then click the group to be named.



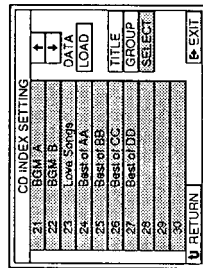
- 3 Create the new name by clicking each character. The name is automatically stored.
To enter a space, click the space bar.
If you made a mistake, click $\leftarrow$ or $\rightarrow$ to move the cursor to the character to be changed, then click the correct character.



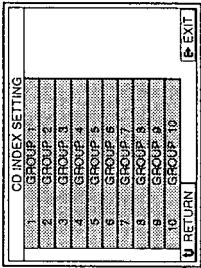
Grouping CDs

You can assign your CDs to one or more groups.

- 1 Click **SETUP** in the main menu, then click **CD INDEX**.
- 2 Click **SELECT**, then click the disc you want to assign to a new group.
If the disc you want does not appear, click $\uparrow$ or $\downarrow$.



- 3 Click the names of the groups to which you want to assign the CD.



- To remove the CD from one or more groups
Click the highlighted group name so that it goes out in step 4.

- You can assign the CD to one or more group
For example, to assign the CD to both "GROUP 1" and "GROUP 4," click both group names in step 4.

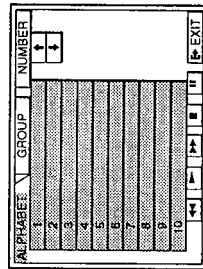
Searching for a CD quickly

- 1 Click **FUNCTION** in the main menu, then click **CD**.

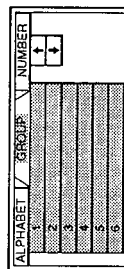
- 2 Click **LIST**.



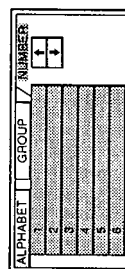
- 3 • To search in alphabetical order
1 Click **ALPHABET** to display the discs in alphabetical order.
2 Click the disc. If the disc you want is not displayed, click $\uparrow$ or $\downarrow$.
Click the disc. If the disc you want is not displayed, click $\uparrow$ or $\downarrow$.



- To search using the group names
1 Click **GROUP**, then click the name of the group in which the CD is located. The CD list for that group appears.
2 Click the disc. If the disc you want is not displayed, click $\uparrow$ or $\downarrow$.



- To search by disc number.
1 Click **NUMBER** to display the discs in numerical order.
2 Click the disc. If the disc you want is not displayed, click $\uparrow$ or $\downarrow$.



Playback starts automatically.

Selecting a Component

For the on-screen operations, see page 21.

- 1 Press **POWER** to turn on the receiver, then press **VIDEO FUNCTION** or **AUDIO FUNCTION** repeatedly until the component you want appears in the display.

VIDEO FUNCTION	
To listen to or watch	Select*
Video tapes	VIDEO 1, VIDEO 2 or VIDEO 3
Laser discs (LD) or DVD	LD/DVD
TV programs or Digital Broadcasting Satellites (DBS)	TV/DBS*

*1 The **FUNCTION** set up (see page 48) allows you to delete the names of components which are not connected. When a function is set to "NO" in the **FUNCTION** set up menu, it cannot be selected.

*2 TV/DBS : USA, Canada and Australia
TV : Other countries

AUDIO FUNCTION	
To listen to or watch	Select*
Digital Audio Tapes (DAT) or MiniDiscs (MD)	DAT/MD
Compact Discs (CD)	CD
Analog audio tapes	TAPE
Radio programs	TUNER
Records	PHONO

* The **FUNCTION** set up (see page 48) allows you to delete the names of components which are not connected. When a function is set to "NO" in the **FUNCTION** set up menu, it cannot be selected.

Selecting a component directly from the remote control (USA and Canada only)

- 1 Press one of the **SYSTEM CONTROL FUNCTION** buttons to select the component you want to use. The receiver and the selected component turn on. The **SYSTEM CONTROL FUNCTION** buttons on the remote are factory-set as follows:

To listen to or watch	Press*
Records	PHONO
Radio programs	TUNER
Compact Discs (CD)	CD
Digital Audio Tapes (DAT) or MiniDiscs (MD)	DAT/MD
Audio tapes	TAPE
TV programs or video tapes	VIDEO 1, VIDEO 2 or VIDEO 3
Laser discs/DVD	LD/DVD
Decoded AC-3 programs	5.1 INPUT

* "NO CONNECTION" is displayed if you select a function that was set to "NO" in the **FUNCTION** set up menu (see page 48).

If the component does not turn on

Press the power switch on the component.

- 2 Start playing.
Refer to "Remote Descriptions" on page 43 for details.

To turn off the components
Press **SYSTEM OFF**. This will also turn off the video and audio components connected to the **SWITCHED AC OUTLET**s on the back of this unit at the same time.

Tuning and Presetting the Radio Stations

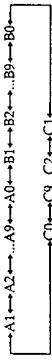
The receiver lets you tune a station by scanning stations (Automatic Tuning), and by selecting preset stations (Preset Tuning).

For the on-screen operations, see pages 23 to 25.

- 1 Press **AUDIO FUNCTION** repeatedly to display "TUNER," then press **FM/AM** to select FM or AM.
- 2 Press **DISPLAY** so that the frequency appears.
- 3 Press **TUNING** + or -.
The frequency indication changes and scanning stops when the receiver tunes in a station. To continue scanning, press + or - again. Press + for a higher station number; press - for a lower one.

Tuning preset stations (Preset Tuning)

- 1 Press **AUDIO FUNCTION** repeatedly to display "TUNER".
- 2 Press **SHIFT** to select a memory page (A, B or C).
- 3 Press **PRESET TUNING** + or - repeatedly to select the station you want. Each time you press the buttons, the preset numbers change as follows:



Note

If the AC power cord is disconnected for about 1 week, the preset stations will be cleared. Preset the stations again.

Recording

For the on-screen operations, see page 25.

- 1 Press VIDEO FUNCTION or AUDIO FUNCTION repeatedly to select the playback component you want to record.
- 2 Insert a blank tape into the recording component and adjust the recording level, if necessary.
- 3 Start recording on the recording component, then start playing the playback component.

To stop recording

Stop both components.

Notes

- Sound input through the 5.1 INPUT jacks cannot be recorded.
- When you record on a DAT or MD connected to the DAT/MD REC OUT jacks, sound adjustments do not affect the recording.

Adjusting the Sound

The adjusted sounds are stored automatically.

To select the sound fields

For the on-screen operations, see page 29.

Press GENRE repeatedly to display the sound fields genres, then press MODE repeatedly to display the sound fields mode. For the list of sound fields, see page 28.

To turn off the sound fields

Press SOUND FIELD ON/OFF.

To adjust the tone parameters

For the on-screen operations, see page 31.

- 1 Start playing a component, then select the sound field you want to adjust.
- 2 Press DPC MODE repeatedly until the TONE indicator lights up.
- 3 Use digital processing control buttons ($\wedge$ / $\vee$) to select BASS or TREBLE.

Bass adjustment

Initial setting is : 0 dB

Treble adjustment

Initial setting is : 0 dB

- 4 Use digital processing control buttons ($\wedge$ / $\vee$) to adjust the tone level. You can adjust the level ± 10 dB in 2 dB steps.

- 5 Repeat steps 3 and 4 to make all necessary adjustments.

To turn off the equalizer or tone adjustments without erasing them

Press DIRECT PASS to turn the tone parameter off or on.

Customizing the Receiver Operations

The menu operations allow you to customize various aspects of the receiver to suit your listening environment, your speakers, your components, and your personal preferences.

- 1 Press SET UP.
"SET UP" appears in the display.
- 2 Press SET UP repeatedly to display one of the following menus:

CENTER MODE
DISPLAY set up
FUNCTION hook up

- 3 Use digital processing control buttons ($\wedge$ / $\vee$) to select the parameter you want.
- 4 Use digital processing control buttons ($\wedge$ / $\vee$) to adjust the parameter.
- 5 Repeat steps 2 and 4 to make all necessary adjustments.
- 6 Press SET UP twice to exit the set up mode.

Note

Certain menu items may not be available for adjustment depending on the current settings and menu modes. Unavailable items appear dimmed when shown in the display.

Surround (SUR) parameters

Surround effect level

It lets you adjust the "presence" of the current surround effect.

See page 32 for details.

Delay time (Dolby Surround mode only)

Initial setting is : DELAY 20

It lets you adjust the delay time of the Dolby Pro Logic surround sound.

See page 31 for details.

Rear speaker level

Initial setting is : REAR SP 0 dB

Lets you adjust level of the rear speakers.

See page 20 for details.

Center speaker level

Initial setting is : CENT-SP 0 dB

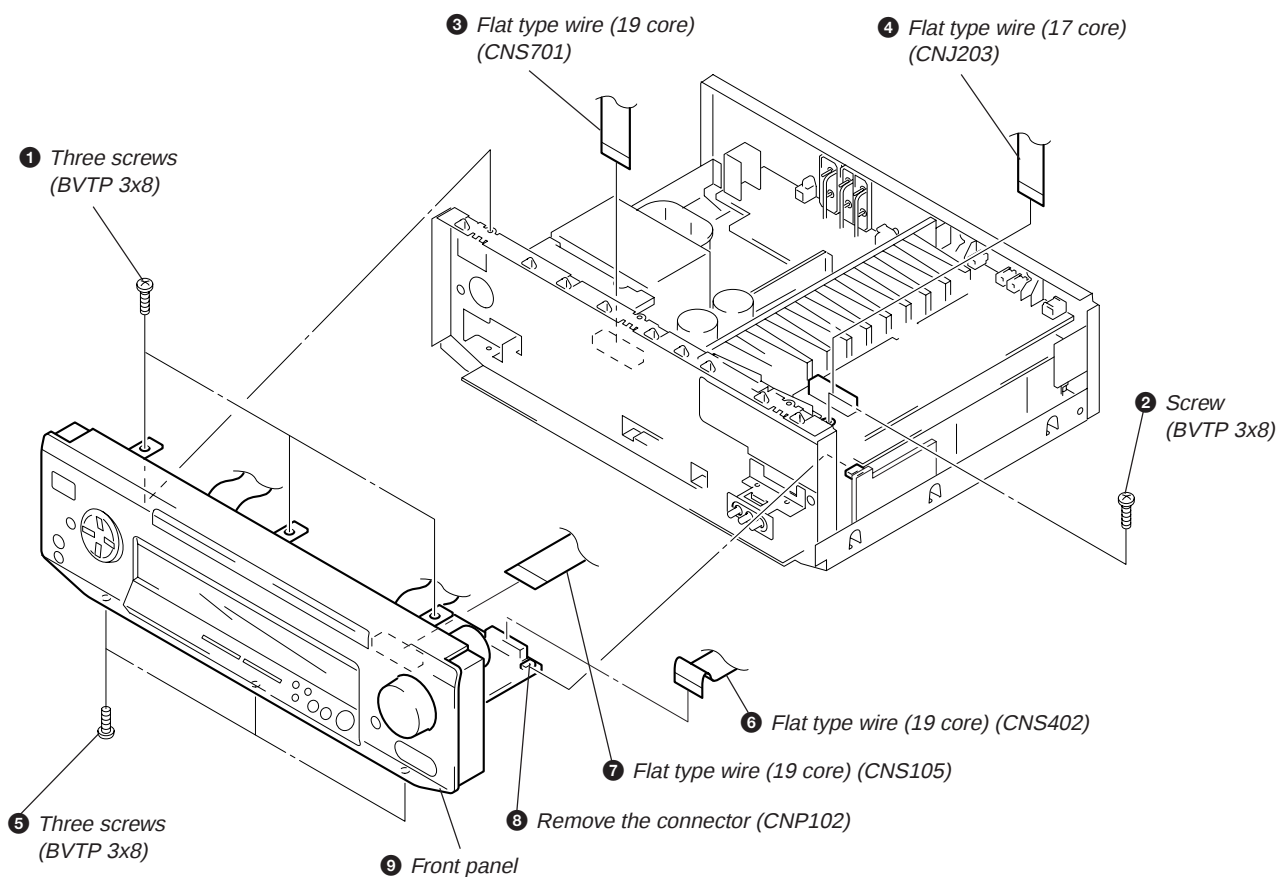
Lets you adjust the level of the center speaker.

See page 20 for details.

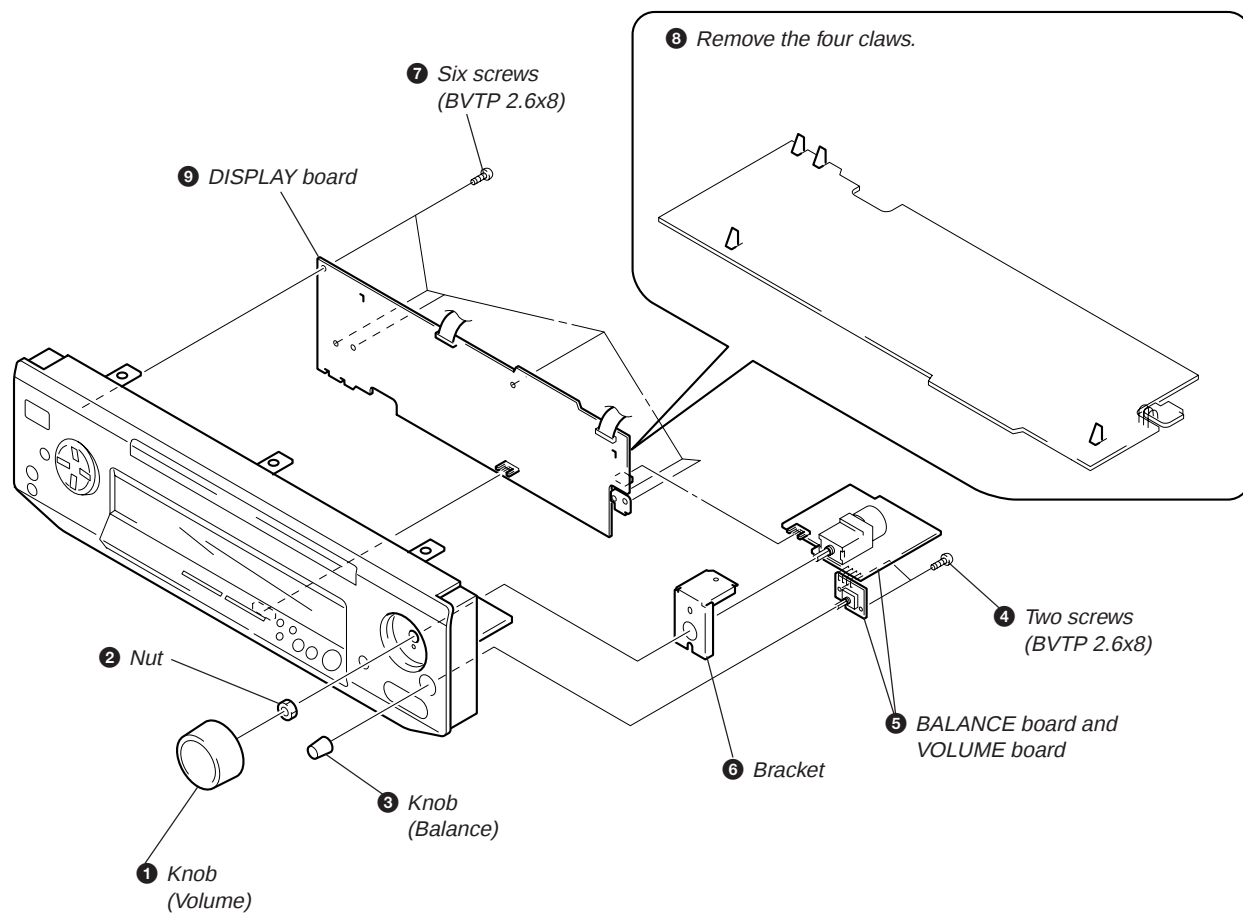
(continued)

SECTION 3 DISASSEMBLY

3-1. FRONT PANEL



3-2. BALANCE BOARD, DISPLAY BOARD AND VOLUME BOARD



SECTION 4 ELECTRICAL ADJUSTMENT

TUNER SECTION

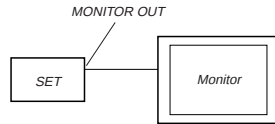
No adjustment is needed due to a tuner unit (TU401).

OSD SECTION

OSD Width Adjustment

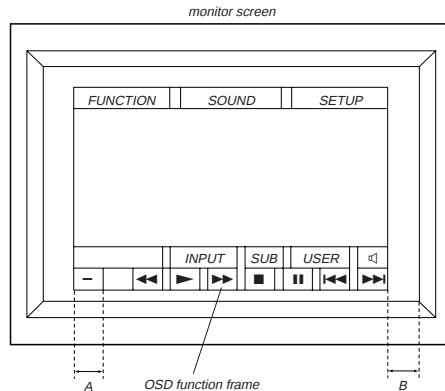
Note: Perform "ALL CLEAR" before this adjustment.
(Refer to Servicing note on page 4)

Connection:



Procedure:

1. Press the [POWER] button and turn ON the power.
2. The OSD function frame will be displayed on the monitor. This screen will disappear in a few seconds automatically when the input of codes using the remote commander stops. If it disappears during adjustments, move the cursor of the remote commander supplied as an accessory. The screen will appear again.
3. While watching the monitor screen, adjust CT201 of the S.VIDEO board so that the following adjustment standard is satisfied.



Adjustment standard:

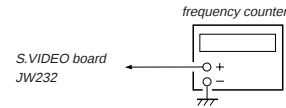
Adjust so that the width B becomes one and a half times of width A.
 $1.5A = B$

NOTE:

Extra margin is provided in this adjustment in consideration of the deviation of the screen according to the type of monitor used. Consequently, the user is able to adjust the position of the screen freely. (For details, refer to "Adjustment of OSD Screen Position" in 1. Servicing note. Refer to page 4.)

OSD Color burst Adjustment

Connection:



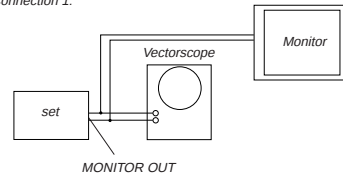
Procedure:

1. Without anything connected to the external input terminal, press the [POWER] button and turn ON the power.
2. Adjust CT202 of the S.VIDEO board so that the reading on the frequency counter becomes $3.579545 \text{ MHz} \pm 10 \text{ MHz}$. (US, CND, E, PX models) or $4.433619 \text{ MHz} \pm 10 \text{ MHz}$. (SP, MY, AUS models)
 - Abbreviation
 - CND : Canadian model
 - SP : Singapore model
 - MY : Malaysia model
 - AUS : Australian model

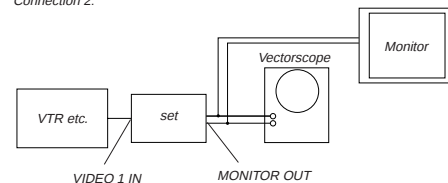
OSD Picture Adjustment

Connection:

Connection 1:



Connection 2:

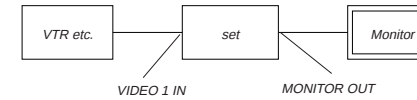


Procedure 1:

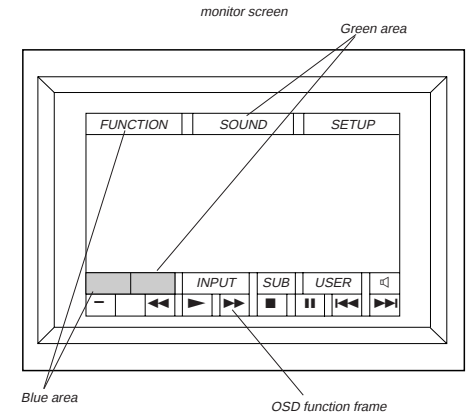
1. Without anything connected to the external input terminal (connection 1), press the [POWER] button and turn ON the power.
2. Check that the OSD function frame screen is displayed on the monitor. If no OSD function frame screen is displayed, move the cursor button of the remote commander provided to display the screen.
3. Observe the vectorscope, and adjust RV201 of the S.VIDEO board so that the light dots converge in the BLUE area.
4. Connect a dynamic picture video device to the external input terminal (VIDEO 1 IN jack) of this unit (Connection 2).
5. Press the [VIDEO FUNCTION] button and set the input source to VIDEO 1.
6. Move the cursor of the remote commander provided, and display the OSD function frame.
7. Observe the vectorscope. Check that the light dots in the BLUE range and the light dots adjusted at 3 are coinciding.
8. If they do not coincide, disconnect the external video device, and adjust RV201 of the S.VIDEO board again.
9. If the light dots when an external video device is connected and not connected coincide, it indicates the end of the adjustment.

Procedure 2: (When no vectorscope is used)

Connection:



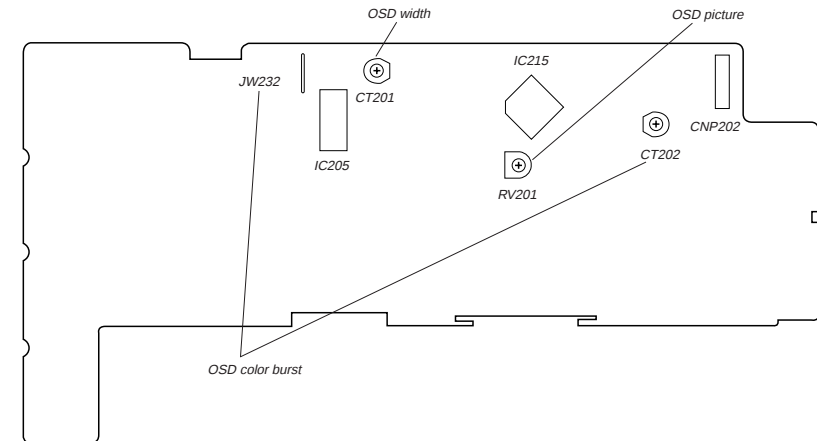
1. Connect a dynamic picture video device to the VIDEO 1 IN jack of the unit.
2. Press the [VIDEO FUNCTION] button, and set the input source to VIDEO 1.
3. Move the cursor of the remote commander provided, and display the OSD function frame.
4. Take note of the blue and green screens at the bottom left of the OSD function frame.
5. Disconnect the video device connected at 1.
6. Adjust RV201 of the S.VIDEO board so that the blue and green parts at the bottom left of the OSD function frame to the same color as the images checked at 4.



Note) Perform this adjustment when disconnecting the external video device. If the external video device is connected, there is no meaning in performing this adjustment due to the use of the color burst of the external device instead of the internal sync signal.

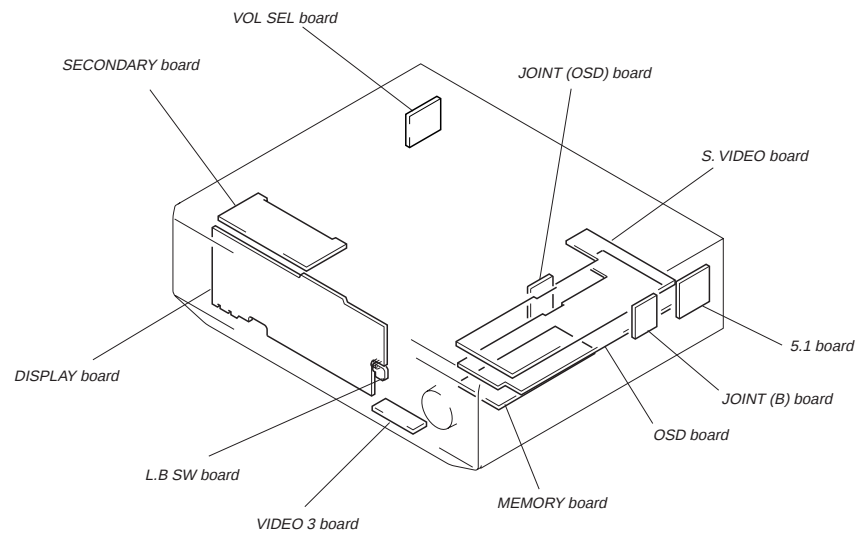
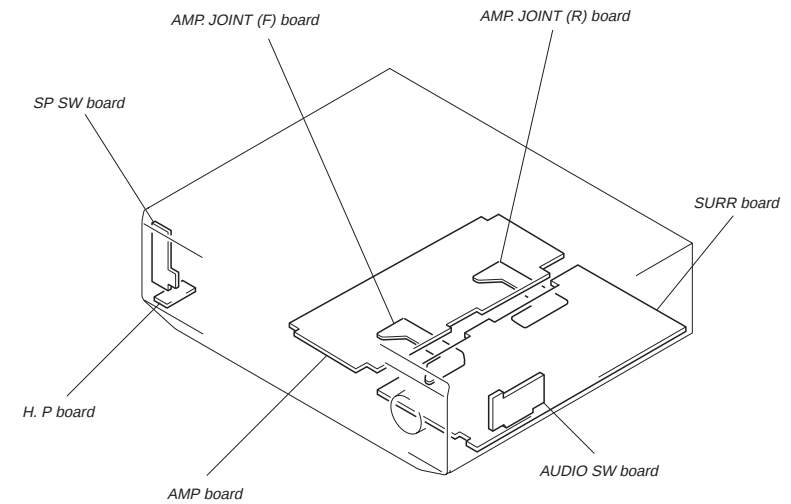
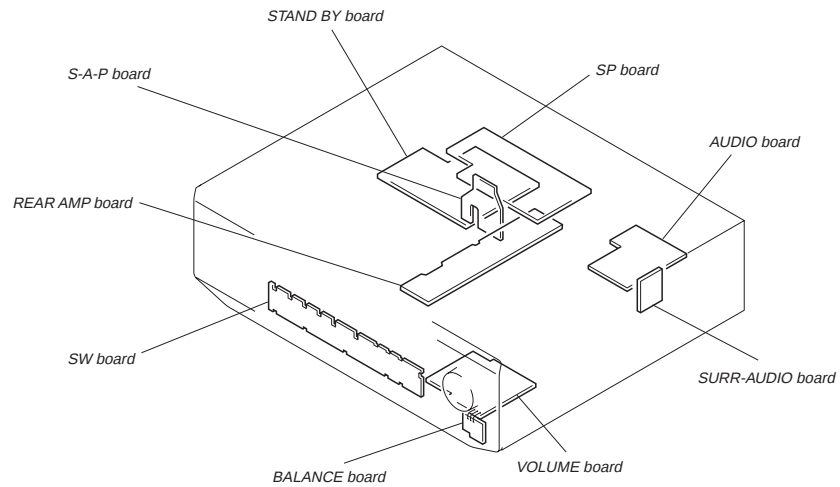
Adjustment Location

[S.VIDEO BOARD] (Component side)



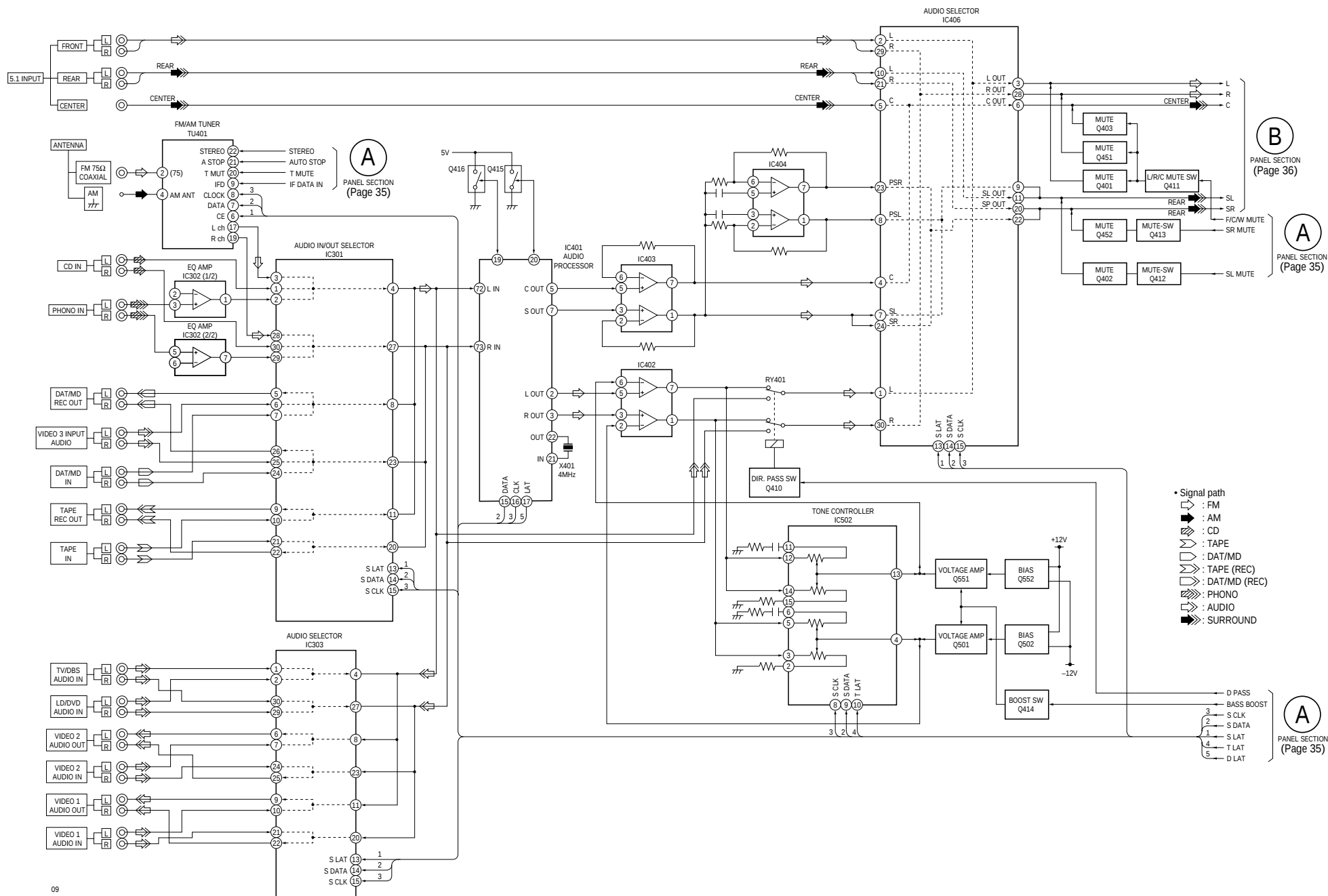
SECTION 5 DIAGRAMS

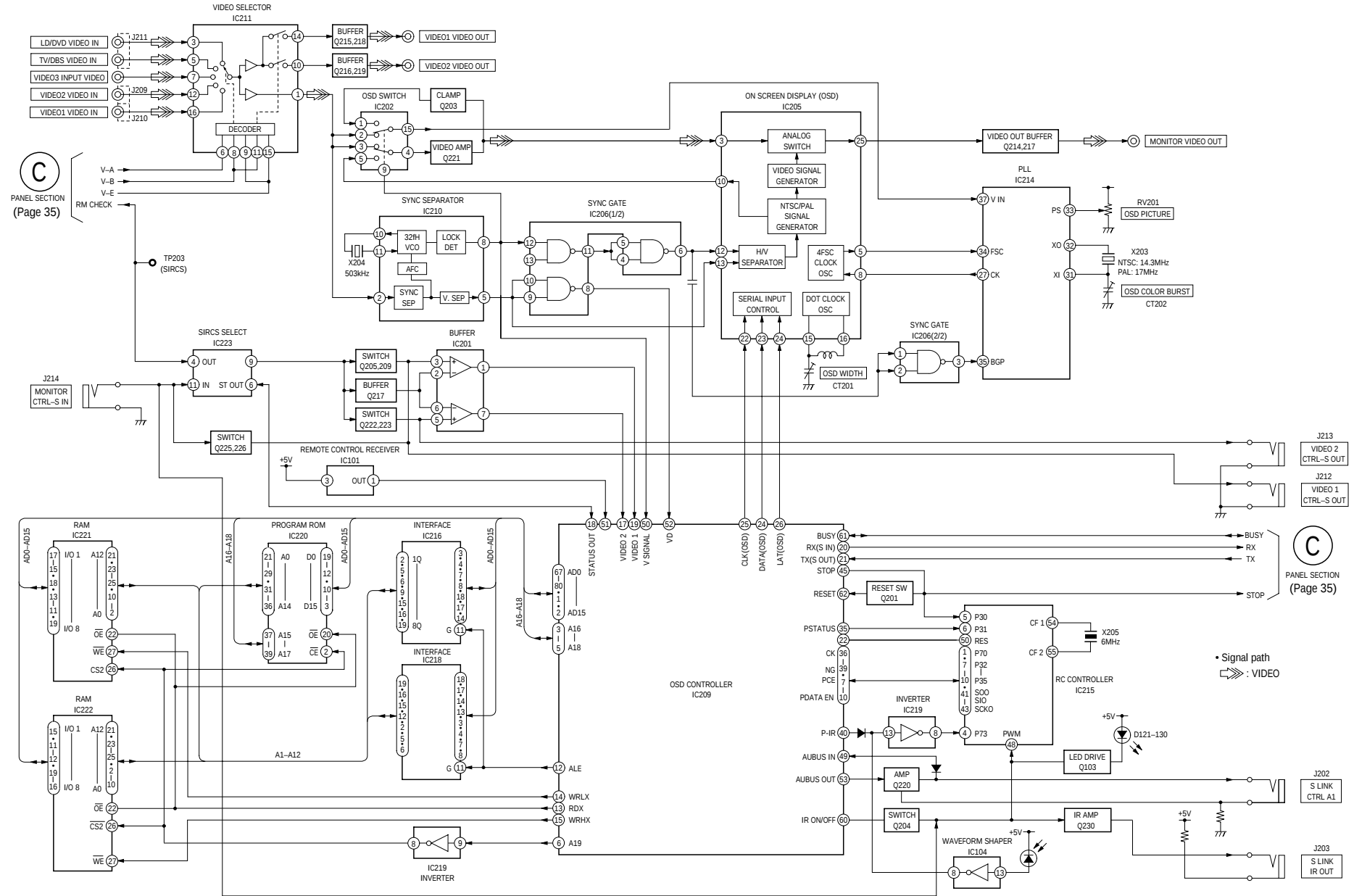
5-1. CIRCUIT BOARDS LOCATION



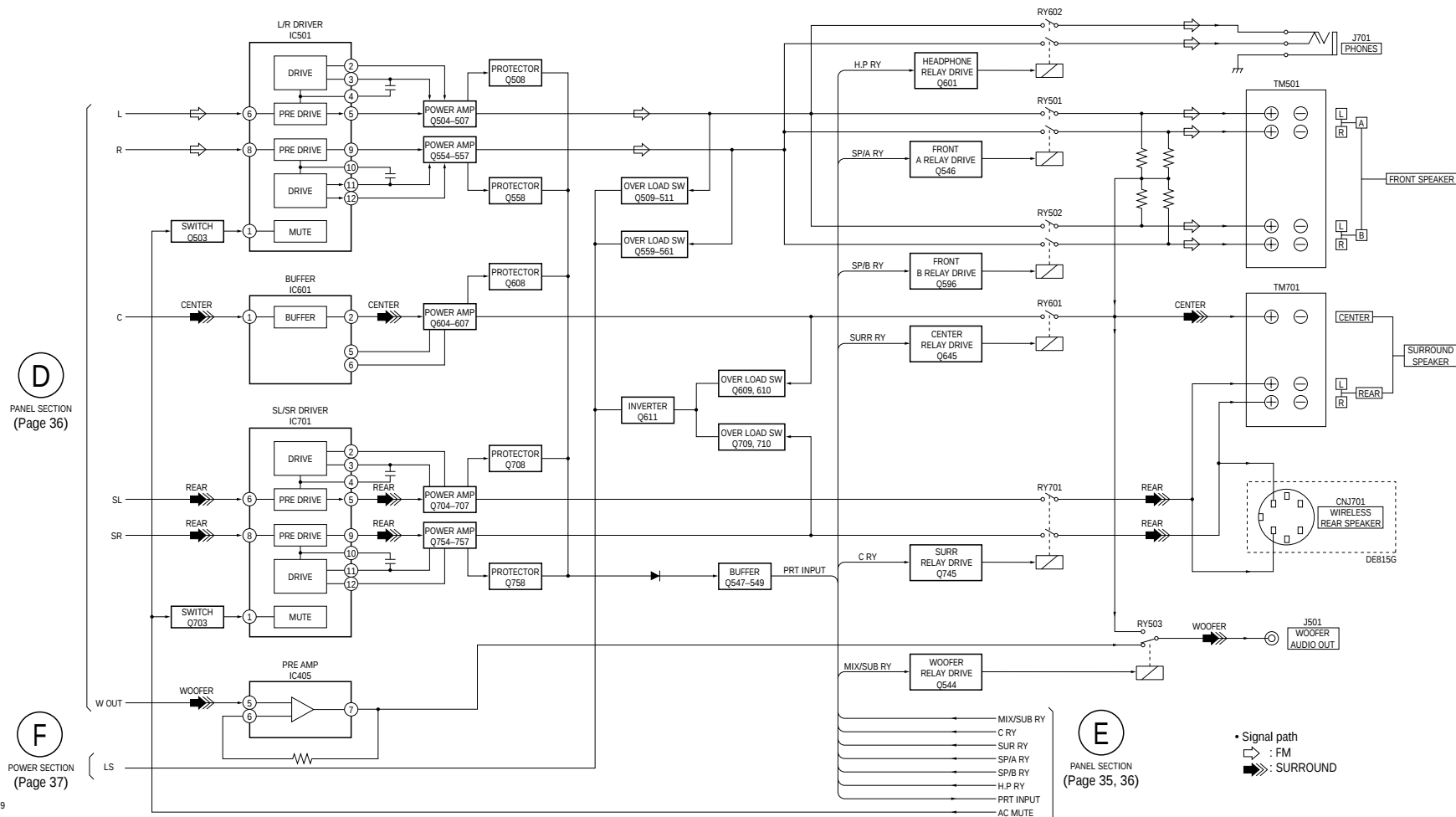
5-2. BLOCK DIAGRAMS

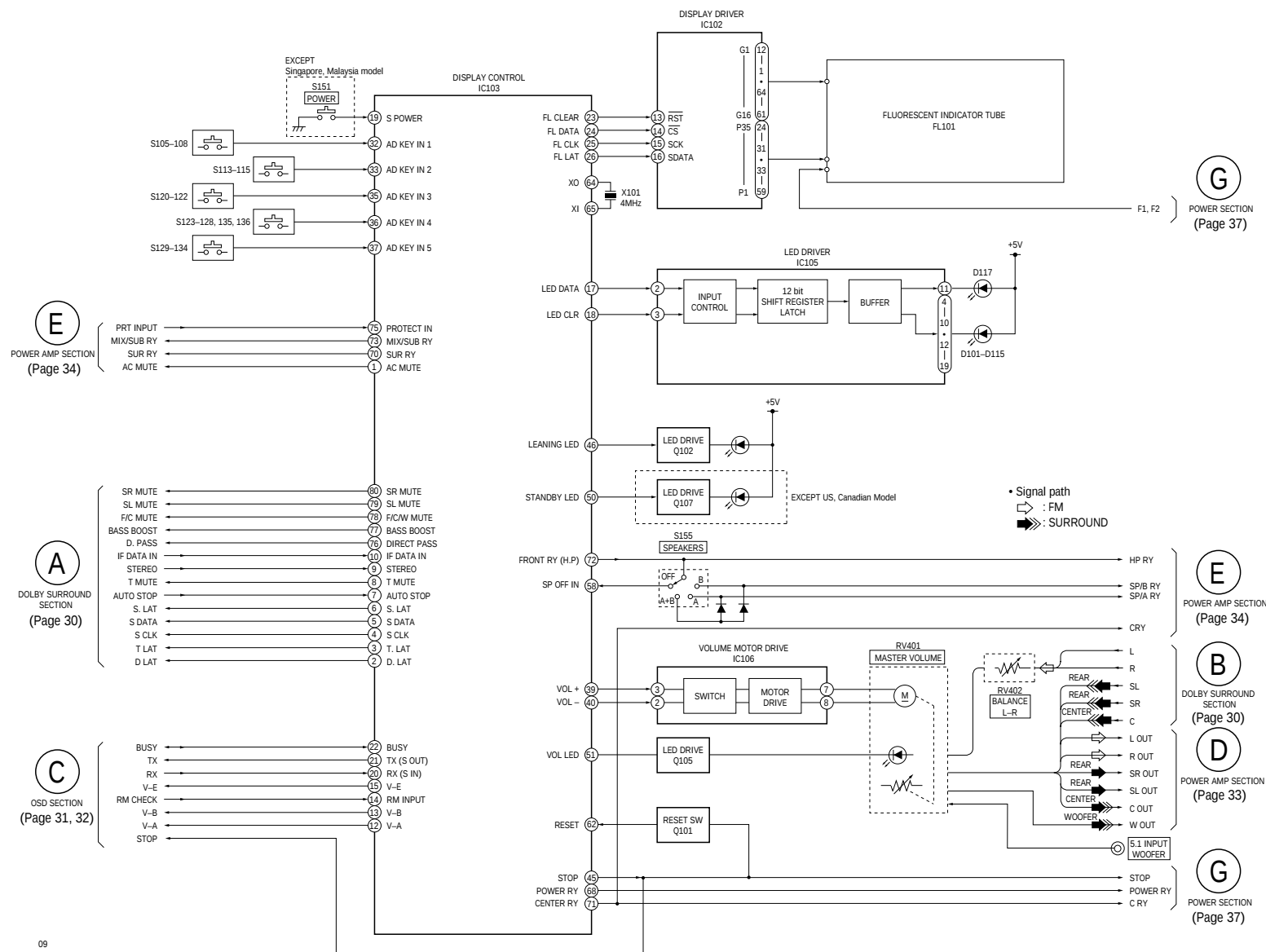
— DOLBY SURROUND SECTION —



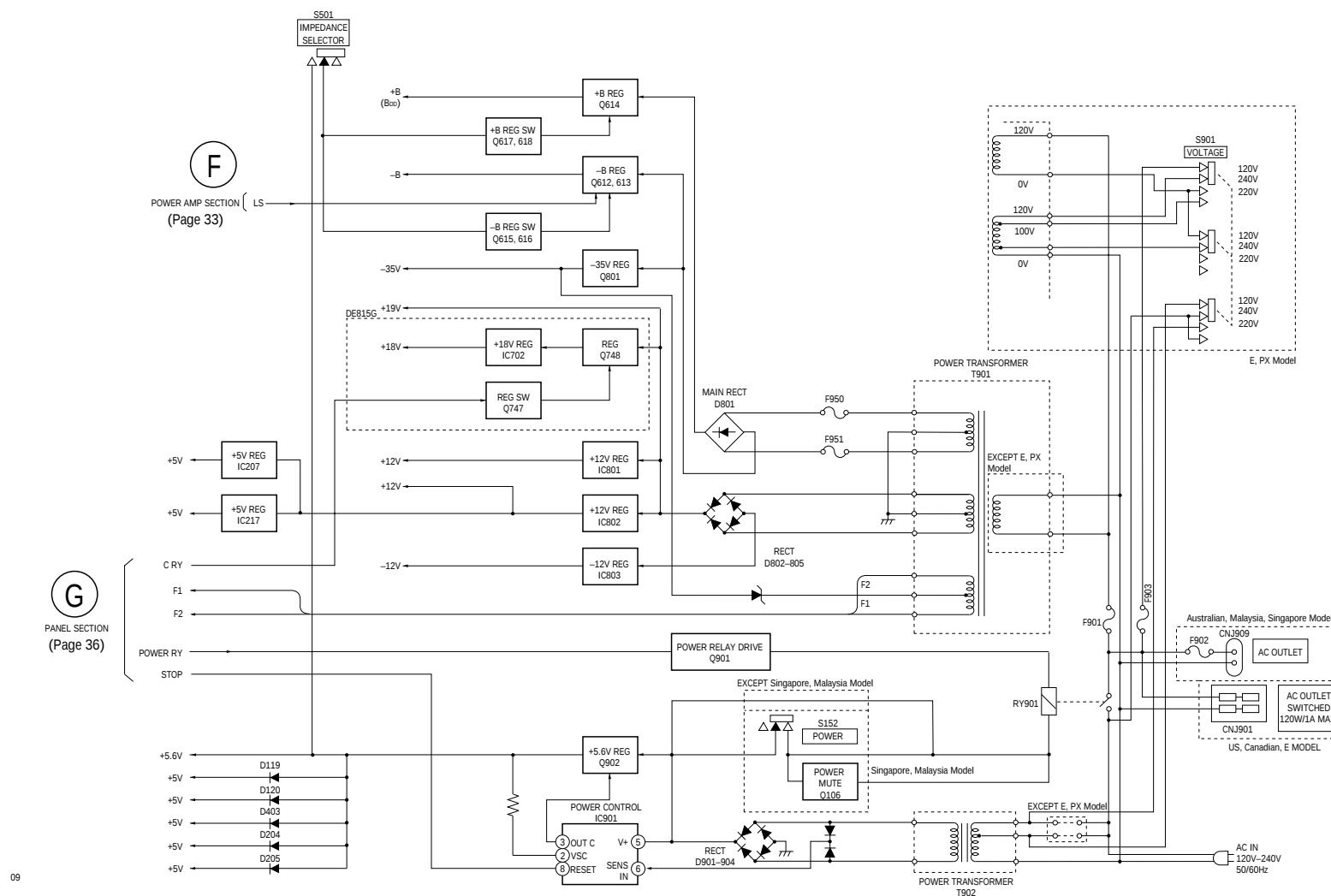


— POWER AMP SECTION —





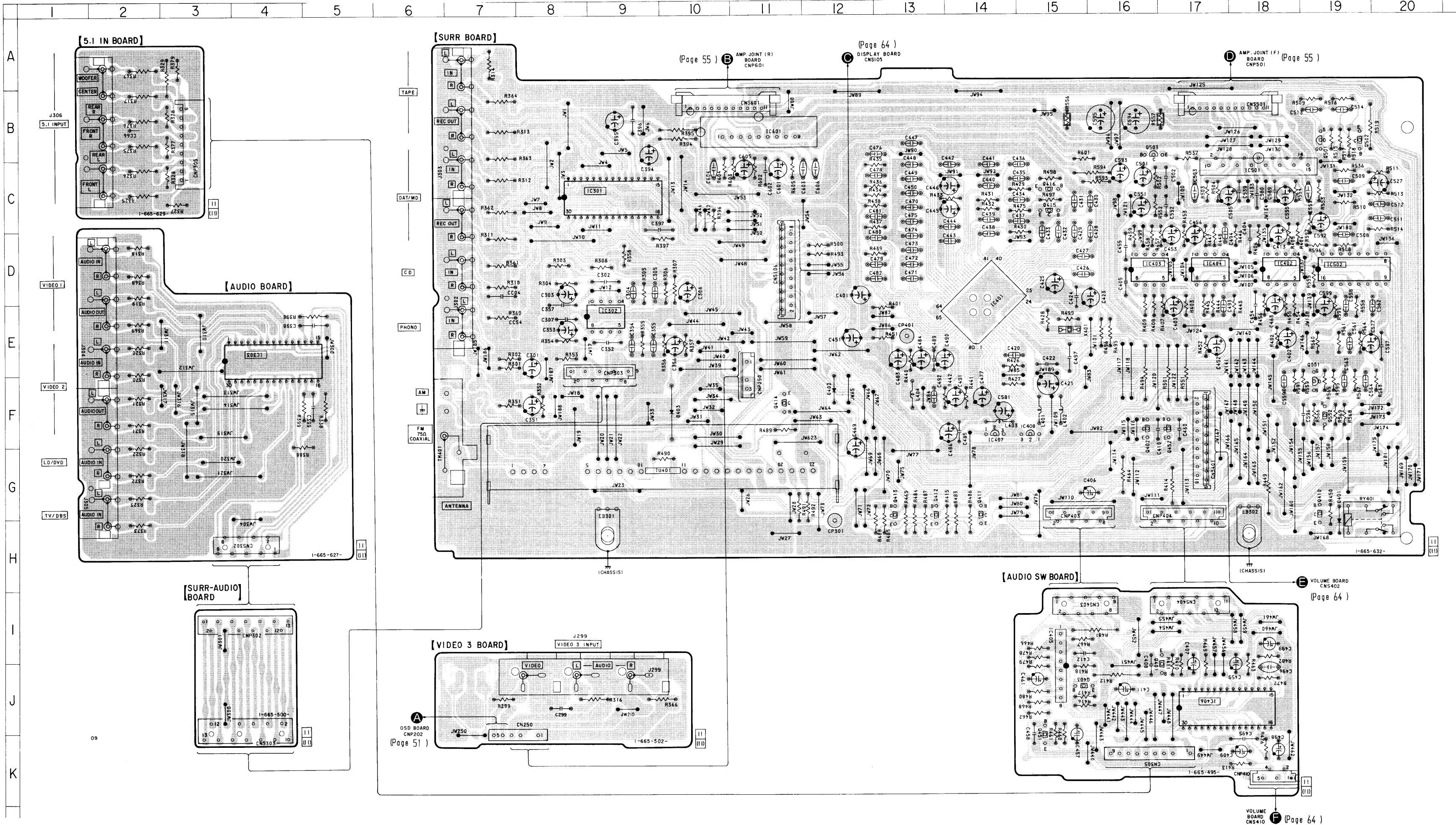
— POWER SECTION —



5-3. PRINTED WIRING BOARD — DOLBY SURROUND SECTION —
• See page 27 for Circuit Boards Location.

• Semiconductor Location

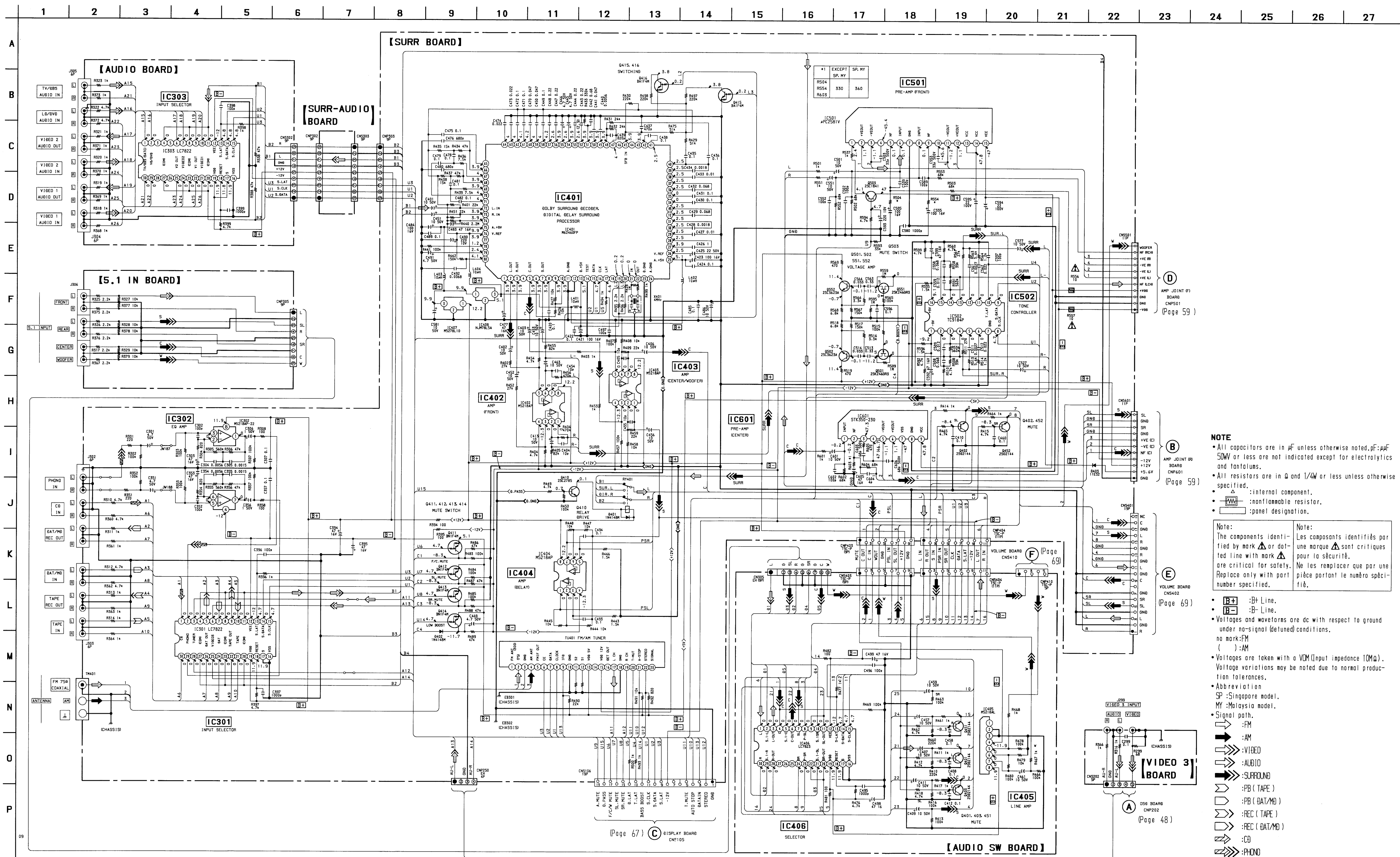
Ref. No.	Location
D401	G-19
D402	F-12
D403	F-10
IC301	C-9
IC302	E-9
IC303	E-4
IC401	E-14
IC402	D-18
IC403	D-16
IC404	D-17
IC405	I-15
IC406	J-17
IC407	F-14
IC408	F-15
IC501	C-18
IC502	D-19
IC601	B-11
Q401	J-16
Q402	G-16
Q403	J-15
Q410	G-19
Q411	G-14
Q412	G-13
Q413	G-13
Q414	F-11
Q415	C-15
Q416	C-15
Q451	K-15
Q452	G-17
Q501	B-19
Q502	B-19
Q503	B-16
Q551	E-19
Q552	F-19



Note:

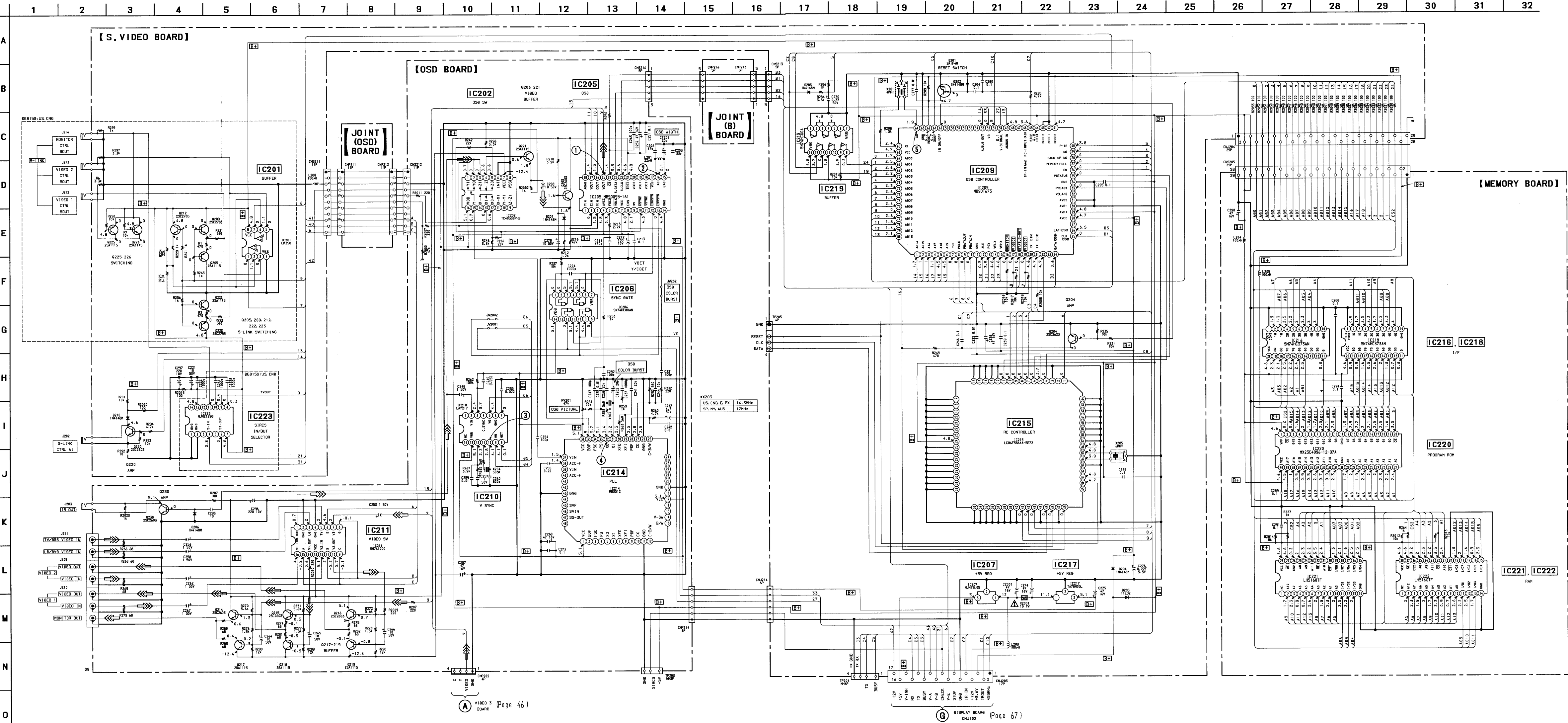
- — : parts extracted from the component side.
- ■ : Pattern from the side which enable seeing.

5-4. SCHEMATIC DIAGRAM — DOLBY SURROUND SECTION —
• See page 70 for IC Block Diagrams.

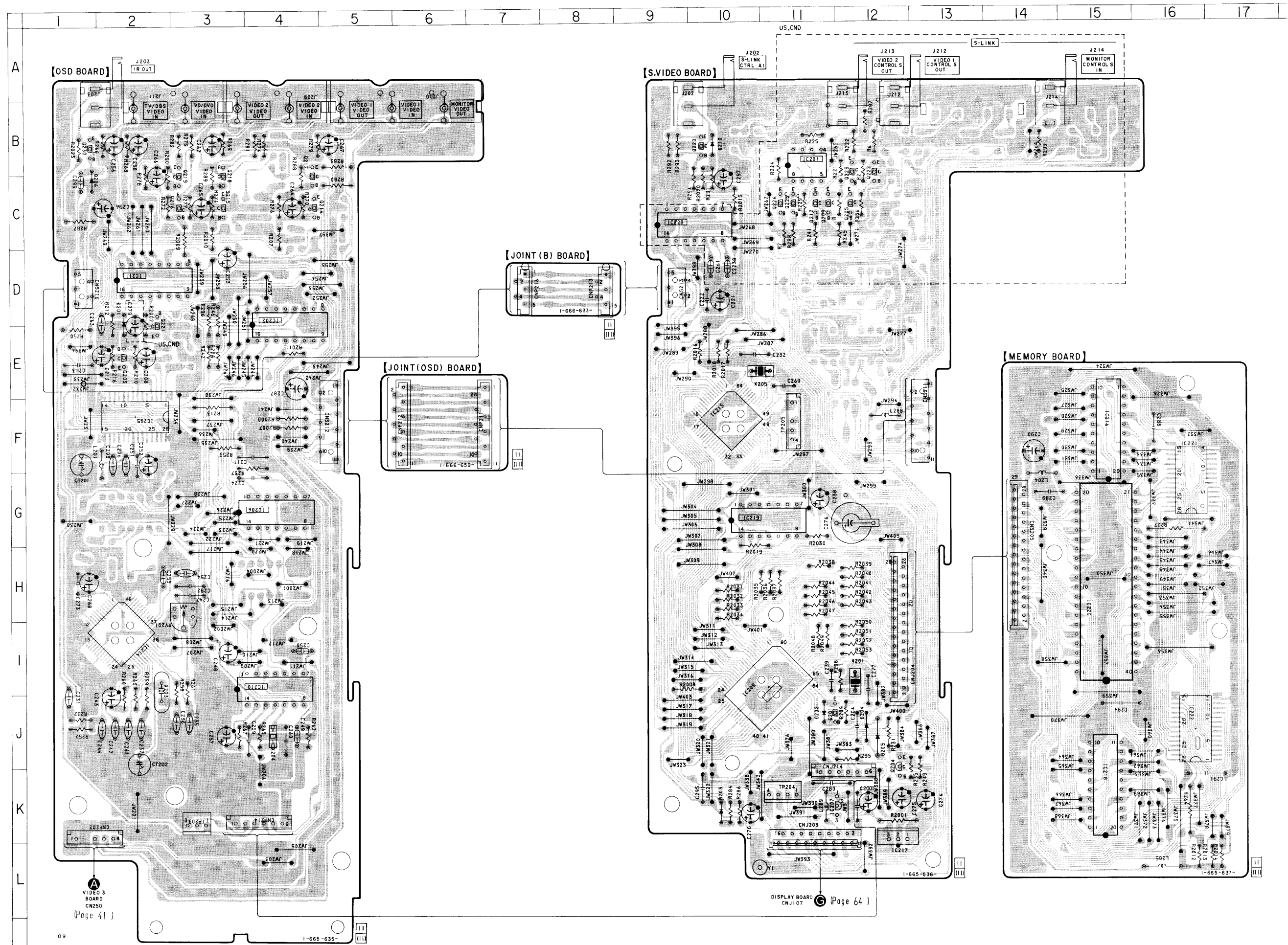


5-5. SCHEMATIC DIAGRAM — OSD SECTION —

- See page 72 for IC Block Diagrams.
- See page 77 for IC Pin Functions.



5-6. PRINTED WIRING BOARD — OSD SECTION —
• See page 27 for Circuit Boards Location.



• Semiconductor Location

Ref. No.	Location
D201	D-2
D202	J-11
D203	K-10
D204	J-12
D205	J-12
D206	C-1
D210	B-10
IC201	B-11
IC202	D-4
IC205	F-2
IC206	G-4
IC207	K-11
IC209	J-10
IC210	I-4
IC211	D-2
IC214	I-2
IC215	F-10
IC216	F-15
IC217	L-12
IC218	K-15
IC219	G-10
IC220	H-15
IC221	F-16
IC222	J-16
IC223	C-9
Q201	J-11
Q203	E-2
Q204	K-12
Q205	C-12
Q209	C-11
Q212	C-11
Q214	C-5
Q215	C-3
Q216	C-3
Q217	B-4
Q218	C-3
Q219	C-3
Q220	B-10
Q221	D-2
Q222	C-12
Q223	C-12
Q225	C-11
Q226	C-11
Q230	B-1

Note:
• — : parts extracted from the component side.
• : Pattern from the side which enable seeing.
• Abbreviation
CND : Canadian model.

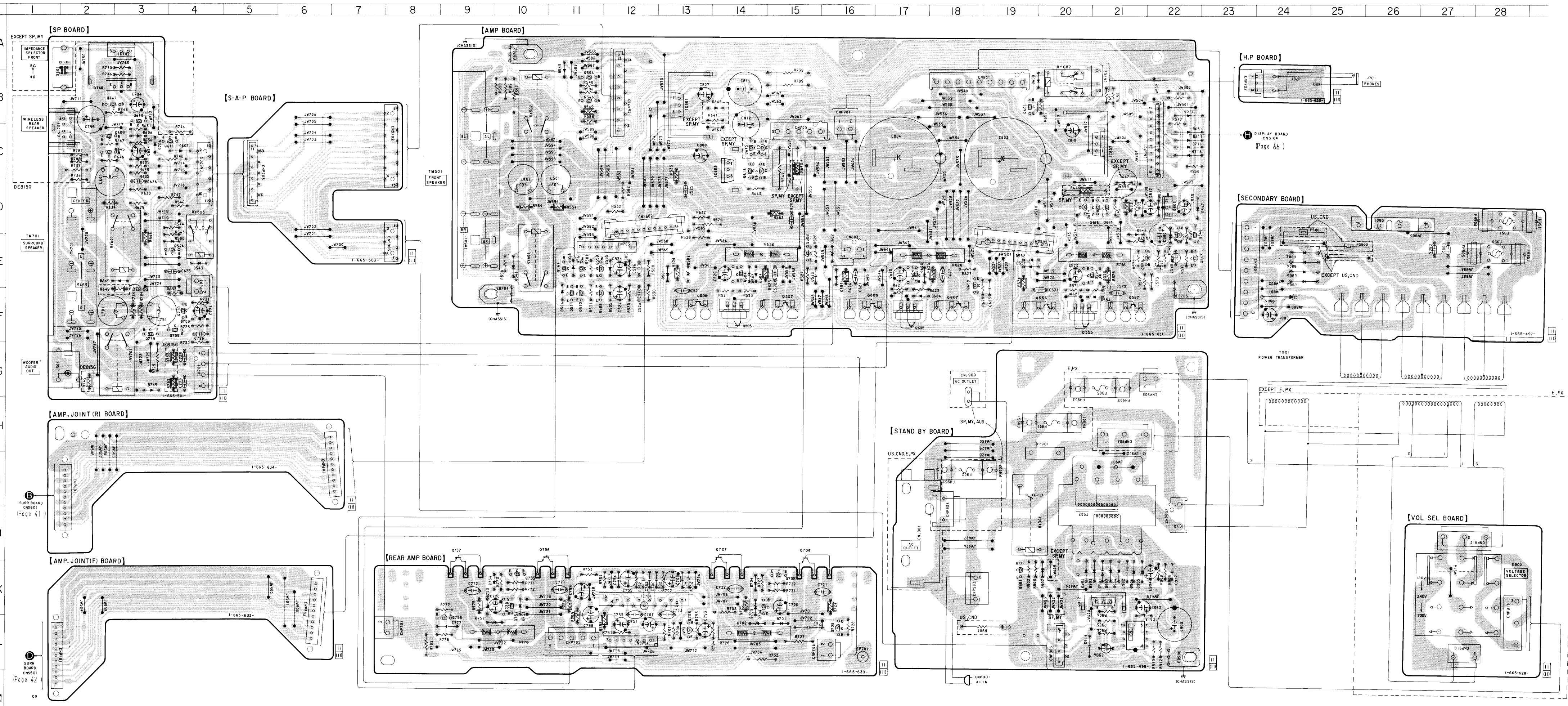
5-7. PRINTED WIRING BOARD — POWER AMP SECTION —
• See page 27 for Circuit Boards Location.

• Semiconductor Location

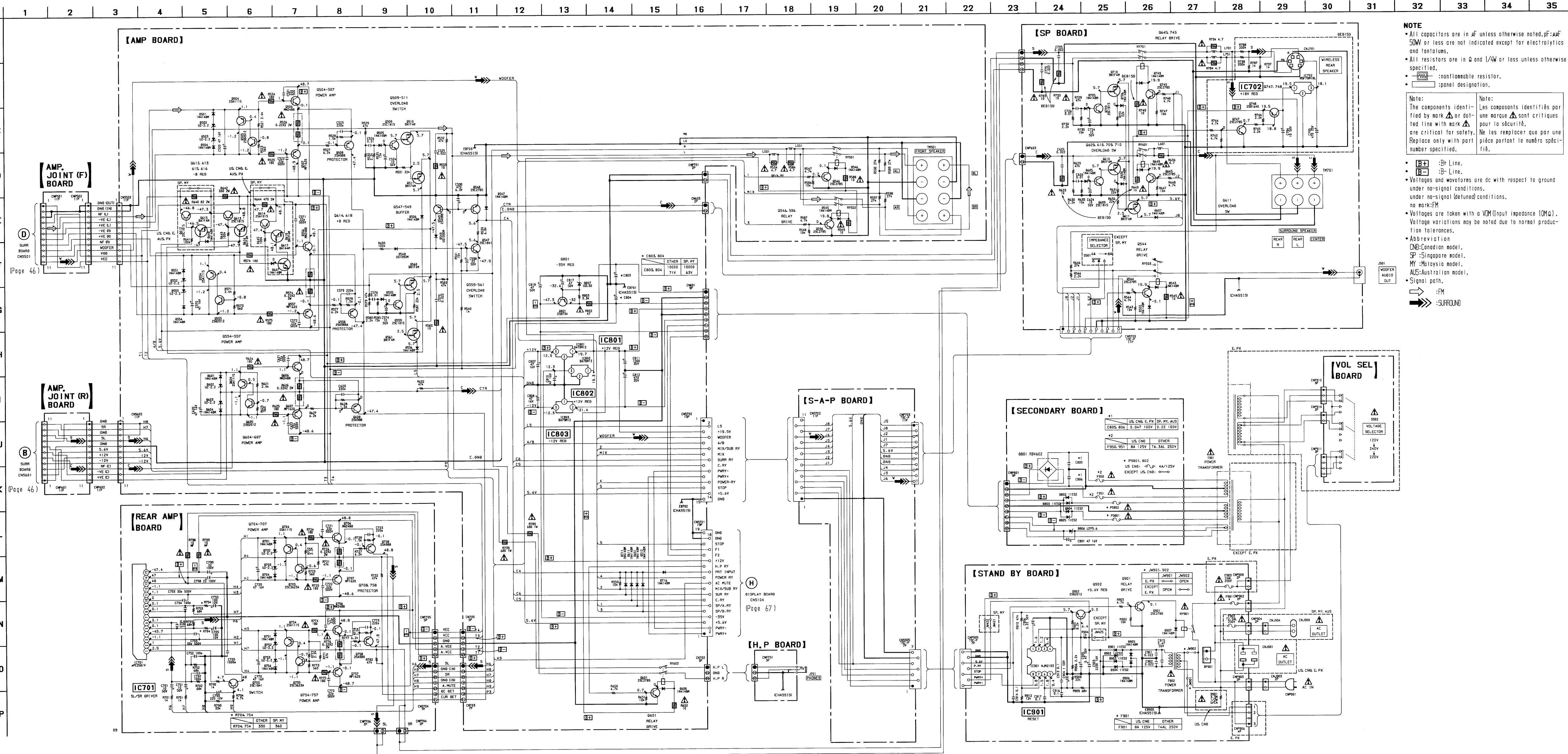
Ref. No.	Location	Ref. No.	Location
D500	E-4	IC801	B-13
D501	E-13	IC802	C-21
D502	E-13	IC803	C-14
D503	E-14	IC901	L-21
D504	E-14		
D505	F-12	Q504	E-14
D506	F-11	Q505	F-14
D512	B-22	Q506	F-13
D543	E-4	Q507	F-15
D545	B-11	Q508	E-15
D546	E-10	Q509	F-11
D547	D-23	Q510	F-11
D548	D-21	Q511	F-11
D549	E-22	Q544	E-4
D551	E-19	Q546	B-11
D552	E-19	Q547	E-23
D553	E-21	Q548	E-22
D554	F-21	Q549	E-22
D555	E-12	Q554	E-21
D556	E-11	Q555	F-21
D601	E-16	Q556	F-20
D602	E-16	Q557	F-21
D603	E-17	Q558	E-21
D604	F-18	Q559	E-11
D605	C-3	Q560	E-11
D606	C-3	Q561	E-11
D607	C-4	Q596	B-11
D608	B-19	Q601	B-19
D611	C-22	Q604	E-17
D647	C-21	Q606	F-17
D648	B-14	Q607	F-18
D649	E-2	Q608	E-18
D651	C-22	Q609	C-3
D701	L-15	Q610	B-3
D702	L-14	Q611	C-4
D703	K-14	Q612	C-14
D704	K-14	Q613	C-14
D705	F-4	Q614	D-20
D706	C-3	Q615	C-14
D711	C-22	Q616	C-14
D716	C-22	Q617	D-21
D749	G-3	Q618	D-21
D751	K-10	Q645	C-3
D752	L-9	Q703	K-13
D753	K-9	Q704	K-15
D754	K-9	Q705	K-15
D801	D-26	Q706	J-15
D802	E-24	Q707	J-14
D803	E-24	Q708	L-16
D804	E-24	Q709	F-4
D805	E-24	Q710	F-4
D806	F-24	Q745	F-3
D807	D-22	Q747	B-2
D901	K-20	Q748	B-2
D902	K-21	Q754	K-10
D903	K-21	Q755	K-10
D904	K-21	Q756	K-10
D905	K-21	Q757	J-9
D906	K-21	Q758	L-9
D907	K-20	Q801	D-22
		Q901	K-19
IC701	K-12	Q902	K-20
IC702	A-3		

Note:

- : parts extracted from the component side.
- : Pattern from the side which enable seeing.
- Abbreviation
- CND : Canadian model.
- SP : Singapore model.
- MY : Malaysia model.
- AUS : Australian model.



5-8. SCHEMATIC DIAGRAM — POWER AMP SECTION —
• See page 73 for IC Block Diagrams.

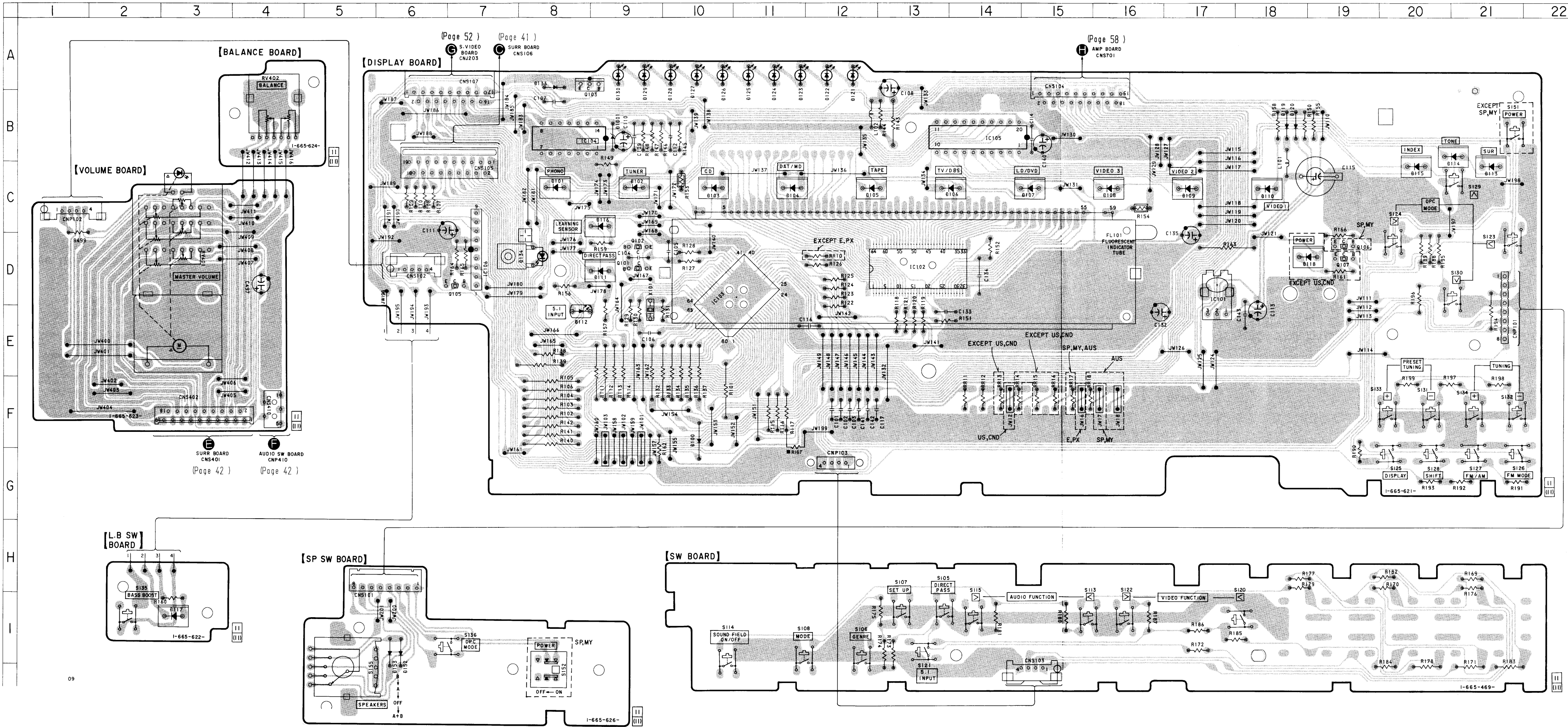


5-9. PRINTED WIRING BOARD — PANEL SECTION —
• See page 27 for Circuit Boards Location.

• Semiconductor Location

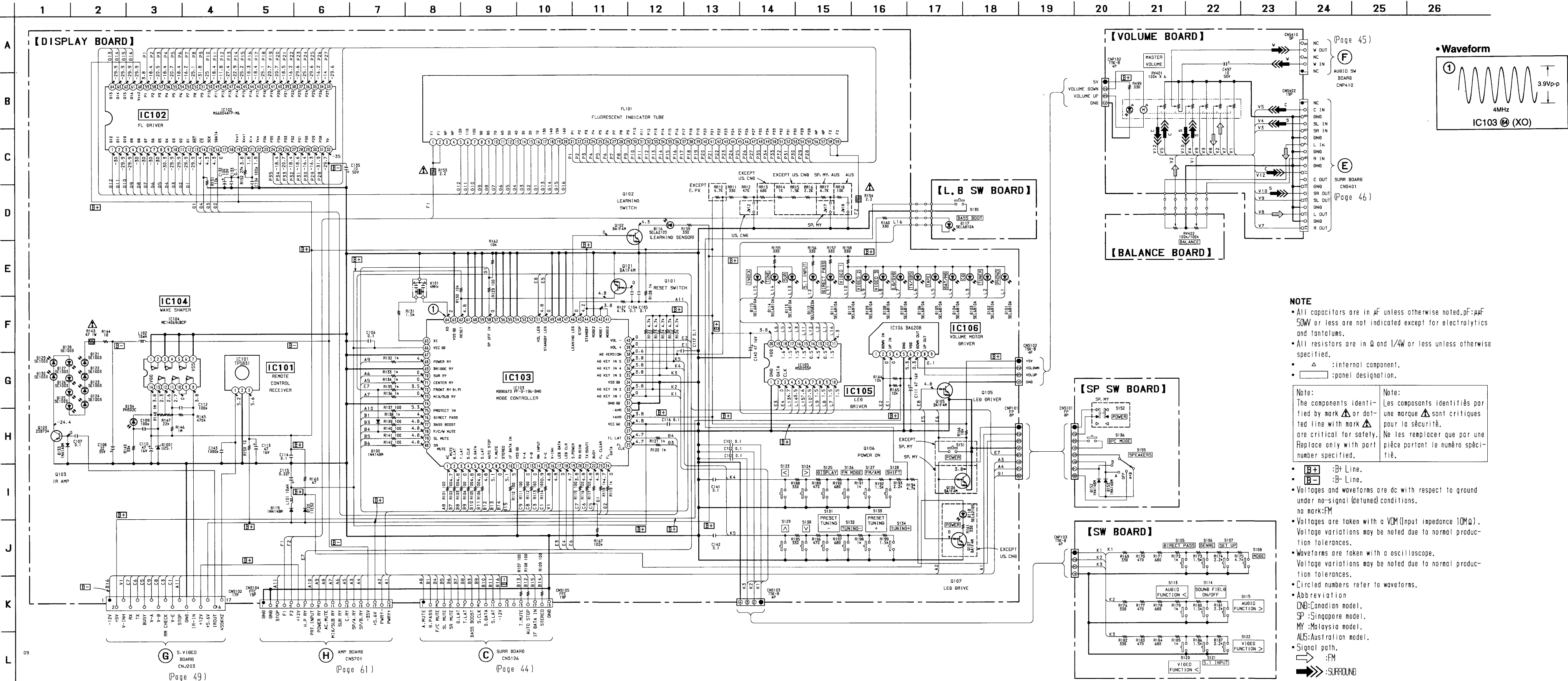
Ref. No.	Location
D100	F-10
D101	C-8
D102	C-9
D103	C-10
D104	C-11
D105	C-12
D106	C-14
D107	C-15
D108	C-16
D109	C-17
D110	C-18
D111	D-9
D112	E-8
D113	C-21
D114	C-21
D115	C-20
D116	C-9
D117	I-3
D118	D-19
D119	B-18
D120	B-18
D121	B-12
D122	B-12
D123	B-11
D124	B-11
D125	B-11
D126	B-10
D127	B-10
D128	B-10
D129	A-9
D130	A-9
D133	A-8
D134	D-8
D152	J-6
D153	J-6
D1001	B-9
IC101	D-17
IC102	D-13
IC103	D-10
IC104	B-8
IC105	B-14
IC106	D-7
Q101	D-9
Q102	D-9
Q103	A-8
Q105	D-7
Q106	D-19
Q107	D-19

Note:
• — : parts extracted from the component side.
• ■ : parts mounted on the conductor side.
• △ : internal component.
• ▨ : Pattern of the rear side.
• Abbreviation
CND : Canadian model.
SP : Singapore model.
MY : Malaysia model.
AUS : Australian model.



5-10. SCHEMATIC DIAGRAM — PANEL SECTION —

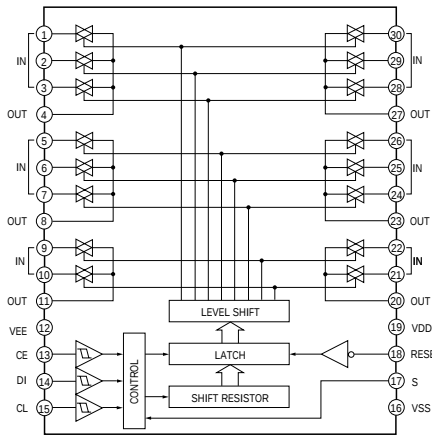
- See page 74 for IC Block Diagrams.
- See page 75 for IC Pin Functions.



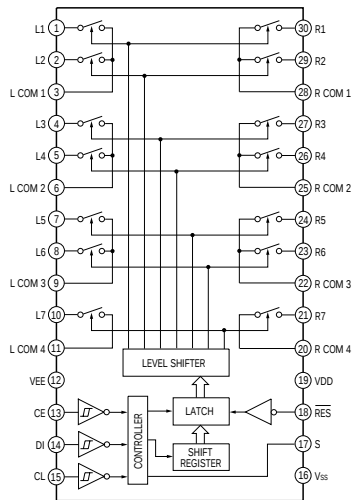
5-11. IC BLOCK DIAGRAMS

• DOLBY SURROUND Section

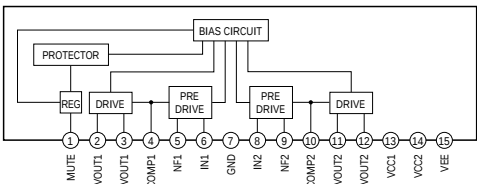
IC301, 303 LC7822



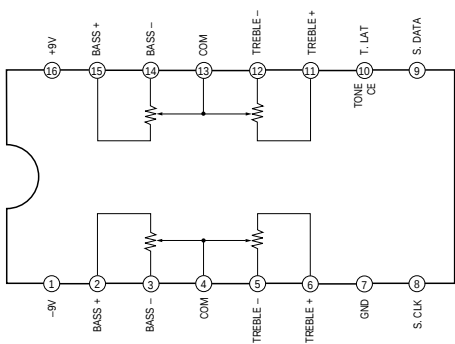
IC406 LC7823



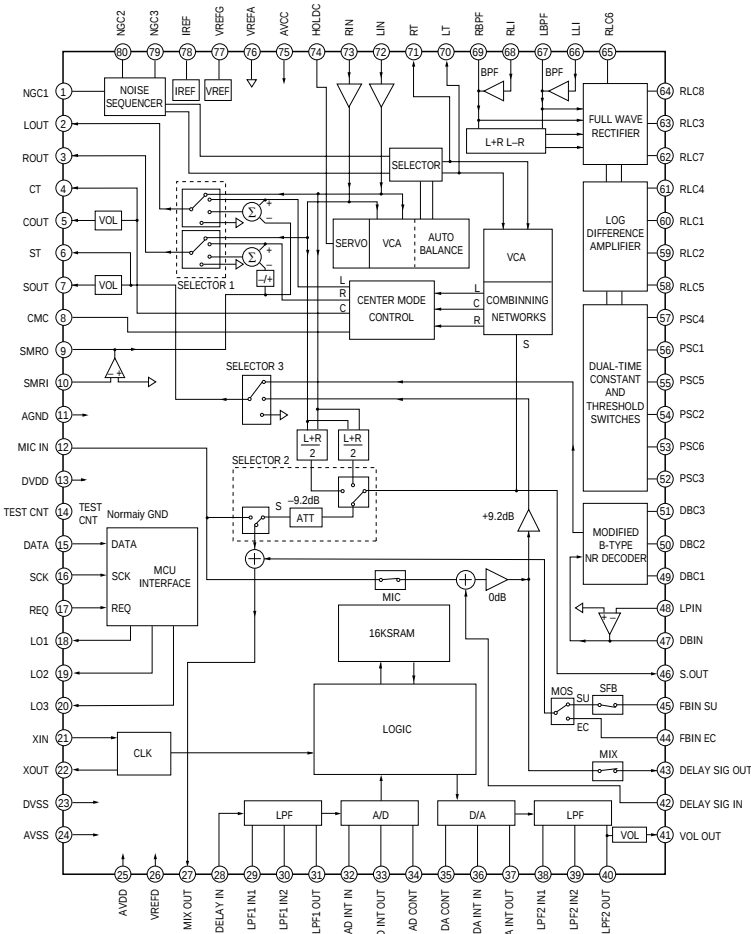
IC501 uPC2581V



IC502 TC9184P

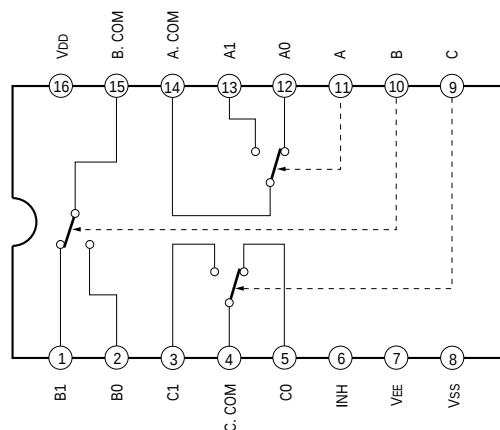


IC401 M62460FP

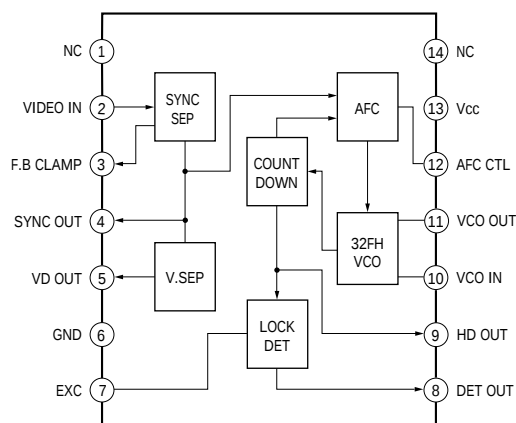


• OSD Section

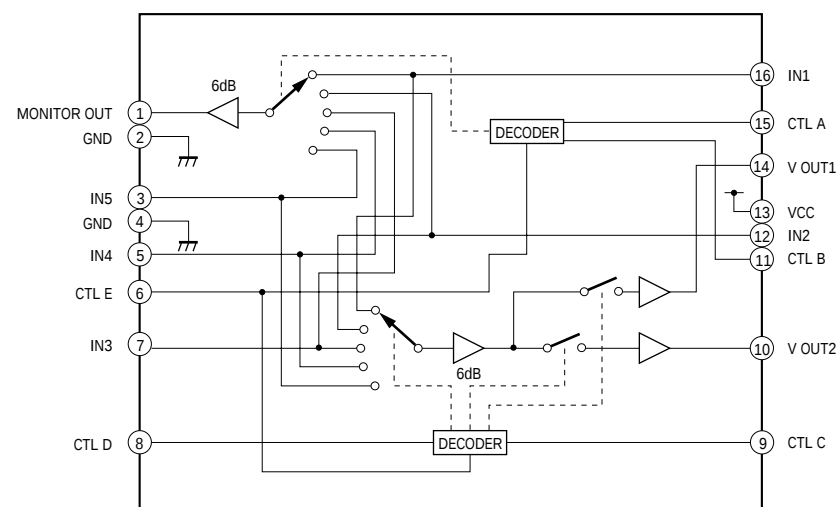
IC202 uPD4053BC



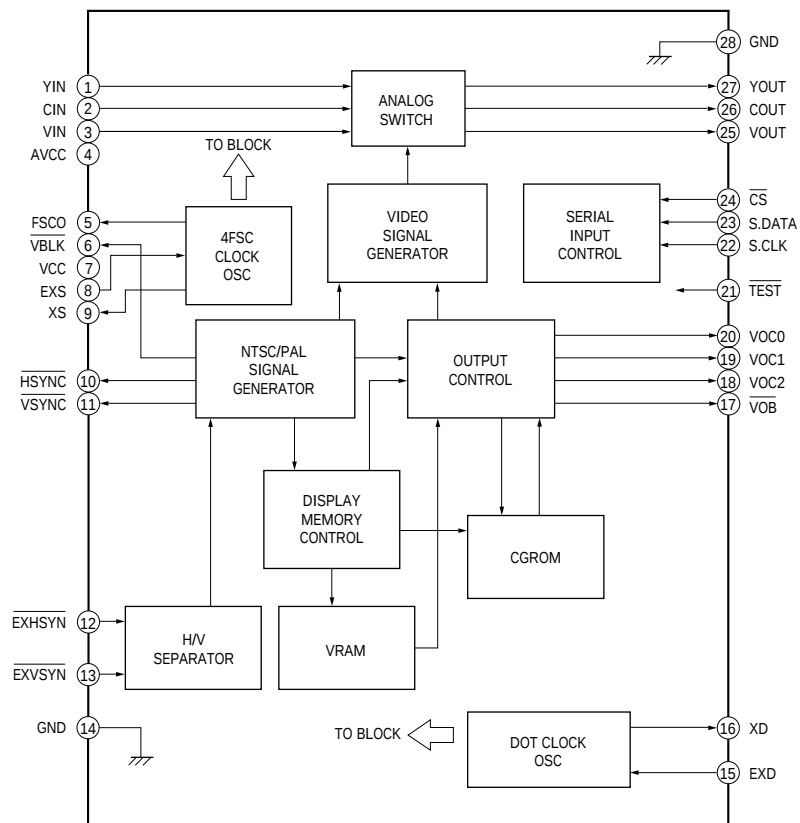
IC210 LA7217



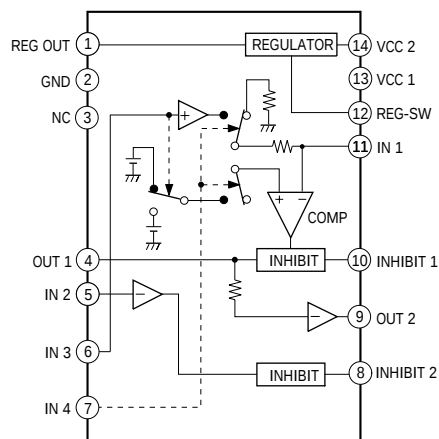
IC211 SN761200



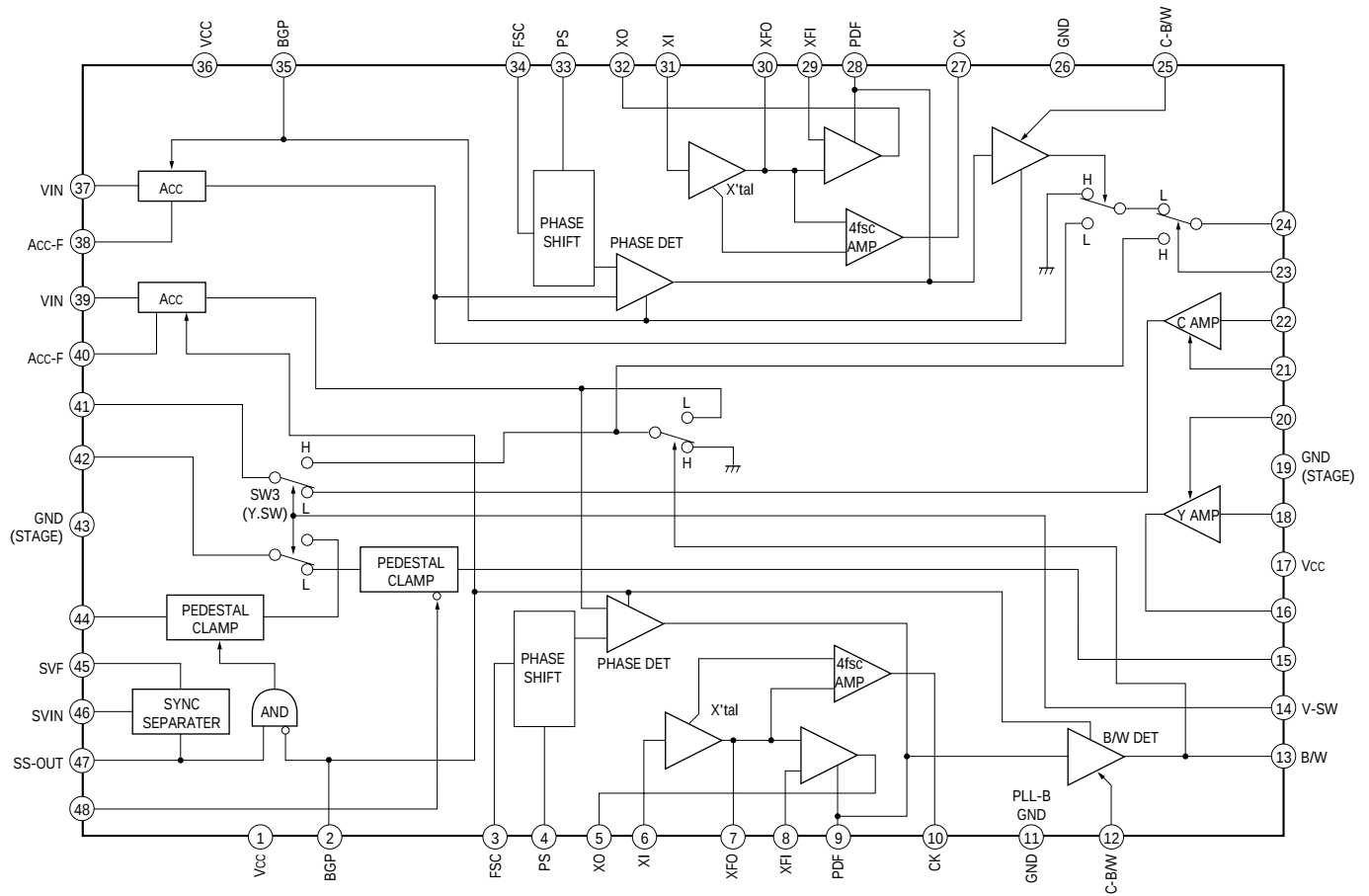
IC205 MB90095PF-186-BND



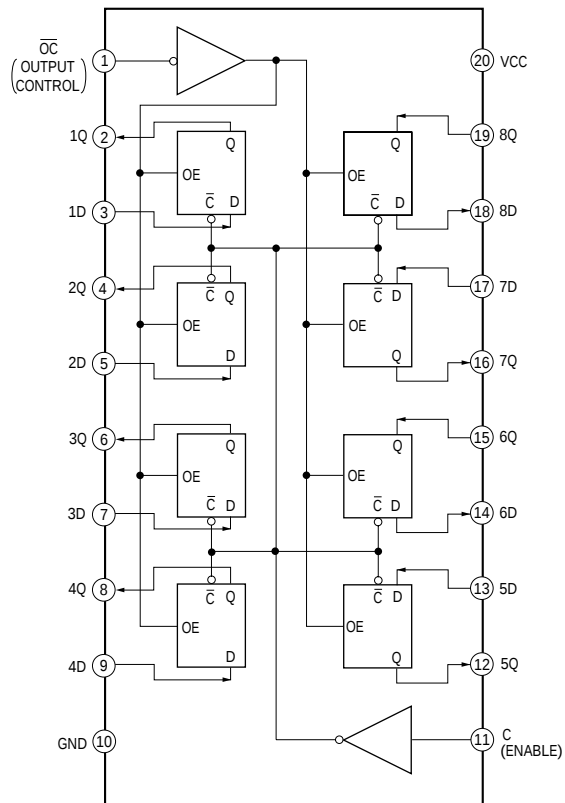
IC223 NJM2129D



IC214 MB3512PFQ

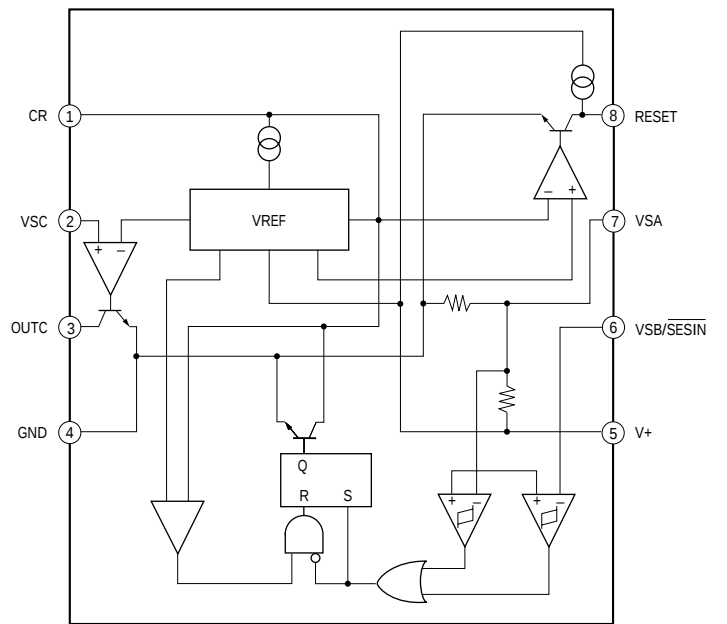


IC216, 218 SN74HC373AN



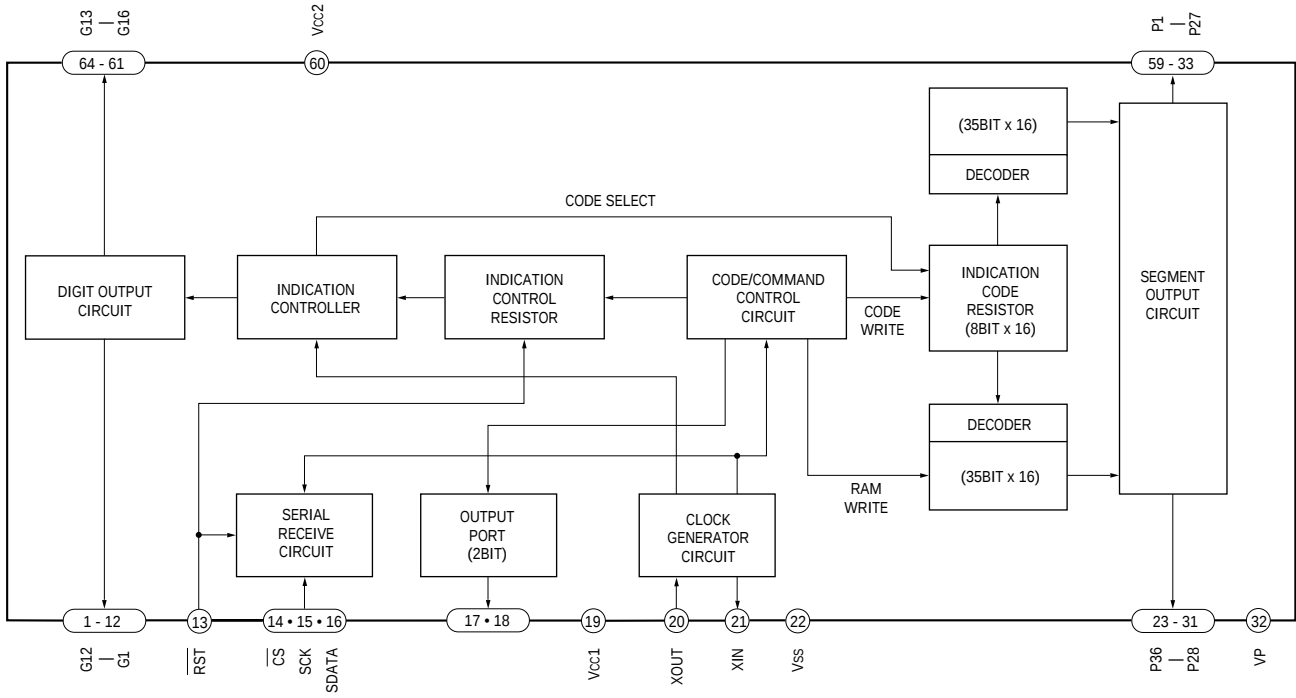
• POWER AMP Section

IC901 NJM2103D



• PANEL Section

IC102 M66004AFP-M6



5-12. IC PIN FUNCTIONS

• IC103 Mode Controller (MB90673PF-G-216-BND)

Pin No.	Pin Name	I/O	Function
1	AC MUTE	O	Mute signal output to Rear power amp
2	D. LAT	O	Latch output to Dolby surround processor
3	T. LAT	O	Latch output to Tone controller
4	S. CLK	O	Serial clock output to Dolby surround processor
5	S. DATA	O	Serial data output to Dolby surround processor
6	S. LAT	O	Latch output to PLL
7	AUTO STOP	I	Auto-stop signal input from tuner
8	T. MUTE	O	Mute signal output to tuner
9	STEREO	I	Stereo-ID input from tuner
10	IF DATA IN	I	Serial data input from tuner
11	VSS (D)	–	Ground
12	V–A	O	VIDEO CONTROL A signal output
13	V–B	O	VIDEO CONTROL B signal output
14	RM INPUT	I	SIRCS input
15	V–E	O	VIDEO CONTROL E signal output
16	V–INH	O	D760Z: Video inhibit signal output DE815G: Not used
17	LED DATA	O	Serial data output to LED driver
18	LED CLR	O	Serial clock output to LED driver
19	S. POWER	I	Input of power key
20	RX (SIN)	I	Serial data input from OSD controller (U–ART0)
21	TX (SOUT)	O	Serial data output from OSD controller (U–ART0)
22	BUSY	I/O	Serial clock input/output with OSD controller (U–ART0)
23	FL CLEAR	O	Clear signal output to FL driver
24	FL DATA	O	Serial data output to FL driver
25	FL CLK	O	Serial clock output to FL driver
26	FL LAT	O	Chip select output to FL driver
27	—	–	Ground
28	VCC (A)	–	+5V power supply
29	+AVR	I	Reference voltage input +5V (AD)
30	–AVR	I	Reference voltage input 0V (Ground)
31	GND (D)	–	Ground
32	AD KEY IN 1	I	Key input 1 (AD)
33	AD KEY IN 2	I	Key input 2 (AD)
34	VSS (D)	–	Ground
35	AD KEY IN 3	I	Key input 3 (AD)
36	AD KEY IN 4	I	Key input 4 (AD)
37	AD KEY IN 5	I	Key input 5 (AD)
38	AD VERSION	I	AD version setting input
39	VOL +	O	Volume motor control signal output
40	VOL –	O	Volume motor control signal output

Pin No.	Pin Name	I/O	Function
41	MODE 0	I	Mode setting pin (Fixed at “H”)
42	MODE 1	I	Mode setting pin (Fixed at “H”)
43	MODE 2	I	Mode setting pin (Fixed at “L”)
44	STANDBY	I	Standby signal input of hardware
45	STOP	I	STOP signal input
46	LEANING LED	O	DE815G: LEARNING LED drive signal output D760Z: Not used
47	—	—	Ground
48	—	—	Ground
49	CTRA IN	I	CONTROL–A serial input (Not used)
50	STANDBY LED	O	STANDBY LED drive signal output
51	VOL LED	O	VOLUME LED drive signal output
52	S-OUT	O	M–BUS output (Not used)
53	CTA OUT	O	CONTROL–A serial output (Not used)
54	VIDEO 1 (MBUS)	I	M–BUS (VIDEO 1) input (Not used)
55	VIDEO 2 (MBUS)	I	M–BUS (VIDEO 2) input (Not used)
56	TV (MBUS)	I	M–BUS (TV) input (Not used)
57	—	—	Ground
58	SP OFF IN	I	Speaker ON/OFF signal input
59	—	—	Ground
60	—	—	Ground
61	—	—	Ground
62	RESET	I	Reset input “L” reset
63	VSS (D)	—	Ground
64	XO	O	Clock output (4MHz)
65	XI	I	Clock input (4MHz)
66	VCC (D)	—	+5V power supply
67	—	—	Ground
68	POWER RY	O	Main power relay switching output
69	BRIDGE RY	—	Ground
70	RUR RY	O	Surround relay switching output
71	CENTER RY	O	Center speaker switching output
72	FRONT RY (H.P)	O	Front speaker switching output
73	MIX/SUB RY	O	MIX/SUB switching output
74	—	—	Ground
75	PROTECT IN	I	Protector signal input
76	DIRECT PASS	O	Direct pass replay drive signal output
77	BASS BOOST	O	Bass boost switching signal output
78	F/C/W/ MUTE	O	Front/Center/Woofer line mute signal output
79	SL MUTE	O	Rear Lch line mute signal output
80	SR MUTE	O	Rear Rch line mute signal output

• IC205 OSD (MB90095PF-G-186-BND)

Pin No.	Pin Name	I/O	Function
1	YIN	I	Luminous signal input for superimpose displays (Not used)
2	CIN	I	Chroma signal input for superimpose displays (Not used)
3	VIN	I	Composite signal input for superimpose displays
4	AVCC	–	Power supply (+5V) (Analog)
5	FSCO	O	Color burst phase signal output
6	VBLK	O	Vertical blanking period output (Not used)
7	VCC	–	Power supply (+5V)
8	EXS	I	External circuit of the clock generator for color burst signals (US, Canadian, E, PX: 14.3MHz) (Singapore, Malaysia, Australian: 17MHz)
9	XS	O	External circuit of the clock generator for color burst signals (US, Canadian, E, PX: 14.3MHz) (Singapore, Malaysia, Australian: 17MHz) (Not used)
10	HSYNC	O	H. SYNC/COMPOSIT SYNC signal output
11	VSYNC	O	V. SYNC signal output (Not used)
12	EXHSYN	I	External H. SYNC signal input
13	EXVSYN	I	External V. SYNC signal input
14	GND	–	Ground
15	EXD	I	External circuit of the display dot clock generator
16	XD	O	External circuit of the display dot clock generator
17	VOB	O	Character and background period signal output (Not used)
18	VOC 2	O	Chroma signal output (Not used)
19	VOC 1	O	Chroma signal output (Not used)
20	VOC 0	O	Chroma signal output (Not used)
21	TEST	I	Test pin
22	S. CLK	I	Shift clock input for serial transmission
23	S. DATA	I	Serial data input
24	CS	I	Chip select input
25	VOUT	O	Composite video signal output
26	COUT	O	Chroma signal output (Not used)
27	YOUT	O	Luminous signal output (Not used)
28	AGND	–	Ground (Analog)

- Abbreviation
OSD: On Screen Display

• IC209 OSD Controller (MB90672PF-G-125-BND)

Pin No.	Pin Name	I/O	Function
1, 2	AD14, AD15	I/O	Address bus and data bus input/output
3 to 6	A16 to A19	O	Address bus output
7	PCE	O	Chip Enable output to RC controller (For communication using personal computers)
8	PCLK	O	Clock output to RC controller (For communication using personal computers)
9	PDATA OUT	O	Data output to RC controller (For communication using personal computers)
10	PDATA IN	I	Data input from RC controller (For communication using personal computers)
11	GND	–	Ground
12	ALE	O	Address latch enable output
13	RDX	O	Read strobe output to data bus
14	WRLX	O	Write strobe output to data bus
15	WRHX	O	
16	MONITOR	I	Control–S input (Monitor) (Not used)
17	VIDEO 2	I	Control–S input (VIDEO 2)
18	STATUS–OUT	O	Control–S status output
19	VIDEO 1	I	Control–S input (VIDEO 1)
20	RX (SIN)	I	Serial data input from mode control (U–ART0 reception)
21	TX (SOT)	O	Serial data output to mode control (U–ART0 transmission)
22	P PRES	O	Reset output (For communication using personal computers)
23	TEST 1	O	Test port
24	DATA (OSD)	O	Serial data output to OSD
25	CLK (OSD)	O	Serial clock output to OSD
26	LAT (OSD)	O	Latch output to OSD
27	—	–	Not used
28	AVCC	–	Power supply (+5.6V)
29	AVR +	–	Power supply (+5V)
30	AVR –	–	Ground
31	AVSS	–	
32	VOLA/D	I	Volume control signal input (Not used)
33	PREADY	I	Learning code reception ready signal input “L” : nothing
34	GND	–	Ground
35	PSTATUS	I	Infrared rays transmission data status signal input from to RC controller
36	OK	I	Learning OK signal input from RC controller
37	MEMORY FULL	I	Memory full signal input from RC controller
38	BACK UP NG	I	Back up NG signal input from RC controller
39	NG	I	Learning NG signal input from RC controller
40	P–IR	I	Input to the integral calculus circuit of the remote control reception signal

• Abbreviation

RC: Remote commander

Pin No.	Pin Name	I/O	Function
41	MODE 0	I	Mode setting (Fixed at “H”)
42	MODE 1	I	Mode setting (Fixed at “L”)
43	MODE 2	I	Mode setting (Fixed at “L”)
44	HSTX	I	Hardware standby (Fixed at “H”)
45	STOP	I	Request input of reset interrupt
46	IR-IN (A6)	I	IR sensor remote control input (Not used)
47	—	—	Not used
48	—	—	Not used
49	AUBUS IN	I	S-LINK control A1 signal input
50	V. SIGNAL	I	H-sync switching signal input
51	SIRCS-IN	I	SIRCS signal input
52	VD	I	PAL: 60 [flame/s]/ NTSC: 50 [flame/s] signal detect VD input
53	AUBUS OUT	O	S-LINK control A1 signal output
54	V-MUT	O	To control output into monitor (Not used)
55	—	O	Image mute output (Not used)
56	—	—	Not used
57	—	—	Not used
58	—	—	Not used
59	—	—	Not used
60	IR ON/OFF	O	IR remote control ON/OFF output “H” off
61	BUSY	O	Input/output to communicate with the display control
62	RESET	I	Reset signal input
63	GND	—	Ground
64	XO	O	Clock (4 MHz)
65	XI	I	Clock (4 MHz)
66	VCC	—	Power supply (+5.6V)
67 to 100	AD00 to AD13	I/O	Address bus and data bus input/output

• IC215 RC Controller (LC86F5864A-5E72)

Pin No.	Pin Name	I/O	Function
1	P70/INT0	I	Chip enable input from OSD controller
2	P71/INT1	I	Chip enable input (For on-board) (Not used)
3	P72/INT 2/TOIN	I	Not used (Connector to ground)
4	P73/INT 3/TOIN	I	SIRCS signal input
5	P30	I	Power supply normality signal input
6	P31	O	Infrared rays transmission data status signal output to OSD controller “L” nothing
7	P32	O	Learning NG signal output to OSD controller
8	P33	O	Back-up NG signal output to OSD controller
9	P34	O	Memory-full signal output to OSD controller
10	P35	O	Learning OK signal output to OSD controller
11	P36	O	Data reception ready signal output to OSD controller
12	P37	O	Not used (Connected to ground)
13	P40	O	Not used (Connected to ground)
14	P41	O	Not used (Connected to ground)
15	P42	O	Not used (Connected to ground)
16	P43	O	Not used (Connected to ground)
17	P44	O	Not used (Connected to ground)
18	P45	O	Not used (Connected to ground)
19	P46	O	Not used (Connected to ground)
20	P47	O	Not used (Connected to ground)
21	P50/SDA	O	Not used (Connected to ground)
22	P51/SCL	O	Not used (Connected to ground)
23	VSS2	–	Ground
24	VDD2	–	+5V power supply
25	P20/SDA	O	Not used (Connected to ground)
26	P21/SCL	O	Not used (Connected to ground)
27	P22/TXD	O	Not used (Connected to ground)
28	P23/PXD	O	Not used (Connected to ground)
29	P24/UCLK	O	Not used (Connected to ground)
30	P25	O	Not used (Connected to ground)
31	P26	O	Not used (Connected to ground)
32	P27	O	Not used (Connected to ground)
33	P00	O	Not used (Connected to ground)
34	P01	O	Not used (Connected to ground)
35	P02	O	Not used (Connected to ground)
36	P03	O	Not used (Connected to ground)
37	P04	O	Not used (Connected to ground)
38	P05	O	Not used (Connected to ground)
39	P06	O	Not used (Connected to ground)
40	P07	O	Not used (Connected to ground)

Pin No.	Pin Name	I/O	Function
41	P10/SOO	O	Serial data output to OSD controller
42	P11/SIO/SB0	I	Serial data input to OSD controller
43	P12/SCKO	I	Serial clock input from OSD controller
44	P13/SO1	–	Ground
45	P14/SI1	I	Serial data input (For on-board) (Not used)
46	P15/SCK1	I	Serial clock input (For on-board) (Not used)
47	P16/BUZ	O	Not used
48	P17/PWM	O	SIRCS signal output (Carrier = PWM output)
49	TEST1	O	Open
50	RES	I	Reset input “L” reset
51	XT1/P74	–	Not used (Connected to +5V)
52	XT2	–	Not used (Connected to +5V)
53	VSS1	–	Ground
54	CF1	I	Clock input (6MHz)
55	CF2	O	Clock output (6MHz)
56	VDD1	–	+5V power supply
57	P80/AN0	I	Not used (Connected to ground)
58	P81/AN1	I	Not used (Connected to ground)
59	P82/AN2	I	Not used (Connected to ground)
60	P83/AN3	I	Not used (Connected to ground)
61	P84/AN4	I	Not used (Connected to ground)
62	P85/AN5	I	Not used (Connected to ground)
63	P86/AN6	I	Not used (Connected to ground)
64	P87/AN7	I	Not used (Connected to ground)

SECTION 6 EXPLODED VIEWS

NOTE:

- Items marked "*" are not stocked since they are seldom required for routine service. Some delay should be anticipated when ordering these items.
- The mechanical parts with no reference number in the exploded views are not supplied.
- Hardware (# mark) list and accessories and packing materials are given in the last of this parts list.

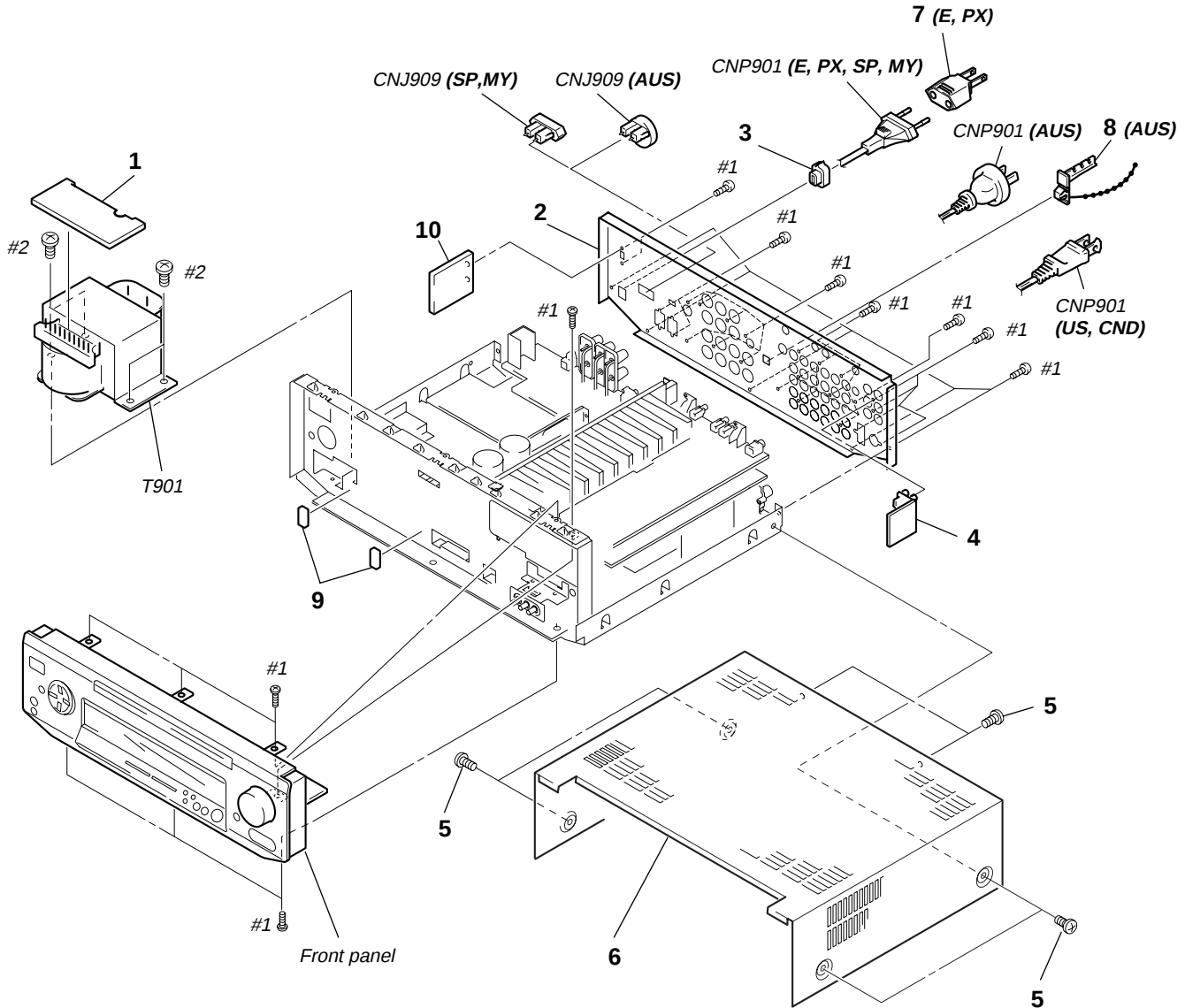
- Abbreviation
CND : Canadian model
SP : Singapore model
MY : Malaysia model
AUS : Australian model

The components identified by mark Δ or dotted line with mark Δ are critical for safety.
Replace only with part number specified.

Les composants identifiés par une marque Δ sont critiques pour la sécurité.

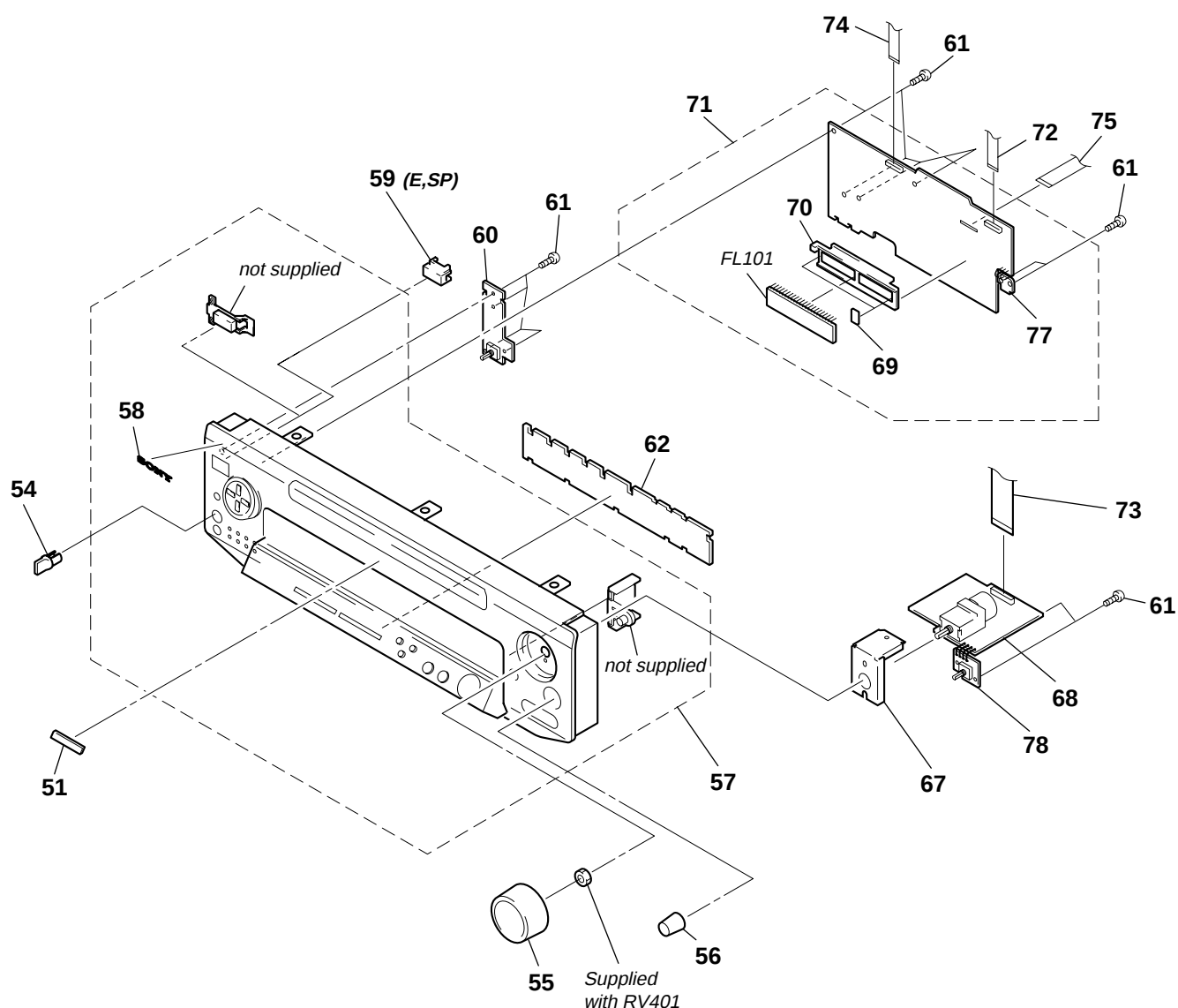
Ne les remplacer que par une pièce portant le numéro spécifié.

6-1. CASE SECTION



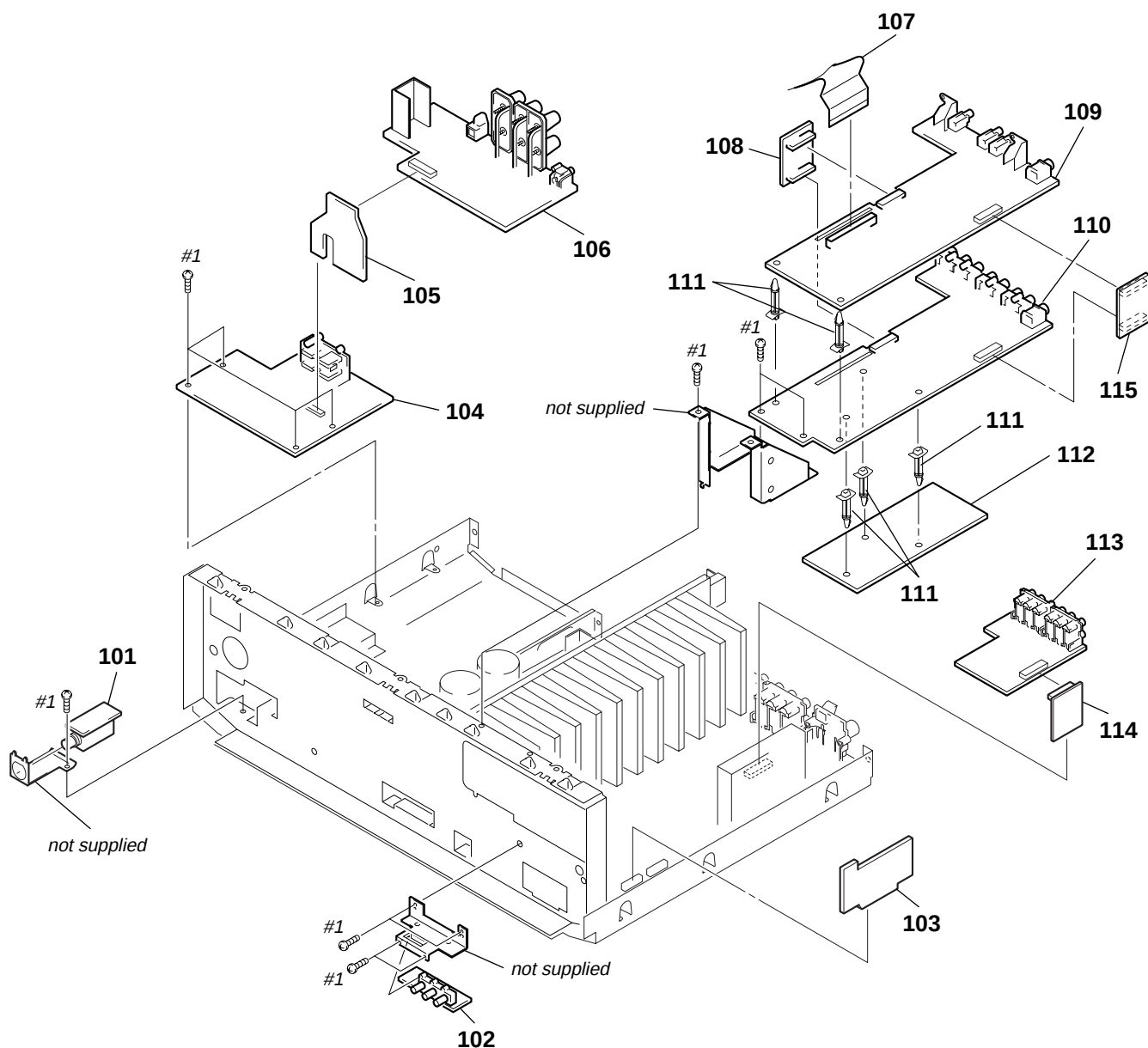
Ref. No.	Part No.	Description	Remark	Ref. No.	Part No.	Description	Remark
* 1	1-665-497-11	SECONDARY BOARD		9	4-985-642-01	CUSHION	
* 2	4-989-884-01	PANEL, BACK (DE815G:US)		* 10	1-665-628-11	VOL SEL BOARD (E,PX)	
* 2	4-989-884-11	PANEL, BACK (DE815G:CND)		Δ CNJ909	1-251-416-11	OUTLET, A.C. (AUS)	
* 2	4-989-884-21	PANEL, BACK (DE815G:E,PX)		Δ CNJ909	1-526-794-11	OUTLET, AC (SP,MY)	
* 2	4-989-884-31	PANEL, BACK (DE815G:SP,MY)		Δ CNP901	1-696-847-11	CORD, POWER (AUS)	
* 2	4-989-884-41	PANEL, BACK (DE815G:AUS)		Δ CNP901	1-769-743-11	CORD, POWER (US,CND)	
* 2	4-989-884-61	PANEL, BACK (D760Z)		Δ CNP901	1-769-744-11	CORD, POWER (E,PX,SP,MY)	
* 3	3-703-244-00	BUSHING (2104), CORD		Δ T901	1-431-314-11	TRANSFORMER, POWER (US)	
* 4	1-665-629-11	5.1 IN BOARD		Δ T901	1-431-315-11	TRANSFORMER, POWER (CND)	
5	3-704-366-01	SCREW (CASE) (M3X8)		Δ T901	1-431-316-11	TRANSFORMER, POWER (AUS)	
* 6	4-982-682-01	CASE (414532)		Δ T901	1-431-317-11	TRANSFORMER, POWER (E,PX)	
Δ 7	1-569-008-11	ADAPTOR, CONVERSION 2P (E,PX)		Δ T901	1-431-318-11	TRANSFORMER, POWER (SP,MY)	
8	4-956-370-12	BAND, PLUG FIXED (AUS)					

6-2. FRONT PANEL SECTION



Ref. No.	Part No.	Description	Remark	Ref. No.	Part No.	Description	Remark
51	4-991-066-01	EMBLEM, VISION TOUCH		* 68	1-665-623-11	VOLUME BOARD	
54	4-957-383-01	KNOB (F14)		* 69	4-921-941-01	CUSHION (FL)	
55	X-4947-074-1	KNOB (R48) ASSY		* 70	4-981-656-01	HOLDER (C), FL INDICATION TUBE	
56	4-980-639-01	KNOB (R14)		* 71	A-4398-122-A	DISPLAY BOARD, COMPLETE (DE815G:US,CND)	
57	X-4948-330-1	PANEL ASSY, FRONT (DE815G:US,CND)		* 71	A-4398-137-A	DISPLAY BOARD, COMPLETE (E,PX)	
57	X-4948-331-1	PANEL ASSY, FRONT (D760Z)		* 71	A-4398-143-A	DISPLAY BOARD, COMPLETE (SP,MY)	
57	X-4948-417-1	PANEL ASSY, FRONT (DE815G:SP,MY)		* 71	A-4398-148-A	DISPLAY BOARD, COMPLETE (AUS)	
57	X-4948-566-1	PANEL ASSY, FRONT (DE815G:AUS)		* 71	A-4398-153-A	DISPLAY BOARD, COMPLETE (D760Z)	
57	X-4948-567-1	PANEL ASSY, FRONT (DE815G:E,PX)		72	1-773-041-11	WIRE (FLAT TYPE) (17 CORE)	
58	3-008-600-11	EMBLEM (5-AR), SONY		73	1-773-108-11	WIRE (FLAT TYPE) (19 CORE)(10cm)	
59	4-980-109-01	BUTTON (P-M) (SP,MY)		74	1-773-117-11	WIRE (FLAT TYPE) (19 CORE)(18cm)	
* 60	1-665-626-11	SP SW BOARD		75	1-773-131-11	WIRE (FLAT TYPE) (19 CORE)(33cm)	
61	4-951-620-01	SCREW (2.6X8), +BVTP		* 77	1-665-622-11	L.B SW BOARD	
* 62	1-665-469-11	SW BOARD		* 78	1-665-624-11	BALANCE BOARD	
* 67	4-989-878-01	BRACKET (VOL)		FL101	1-517-519-11	INDICATOR TUBE, FLUORESCENT	

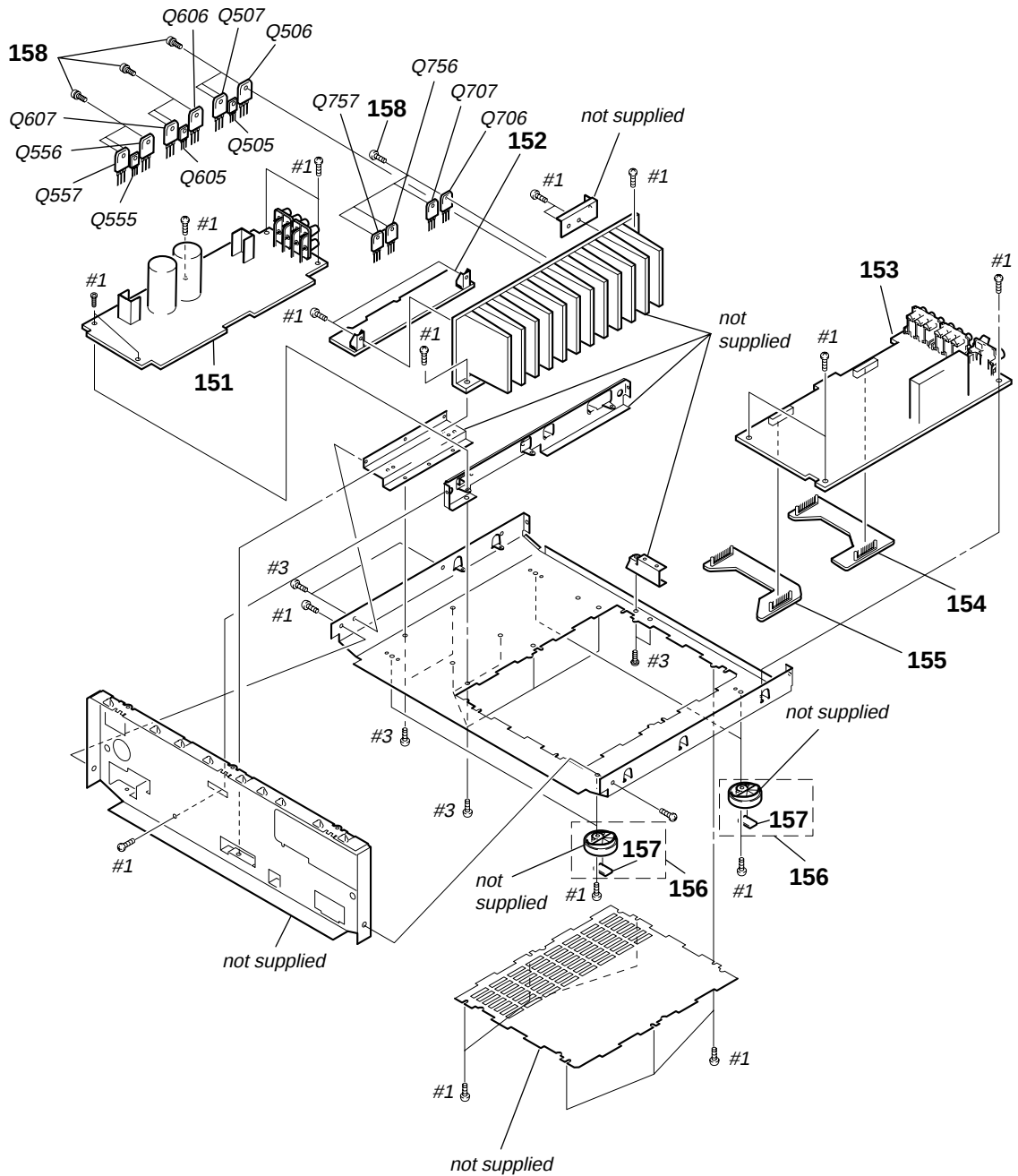
6-3. OSD BOARD SECTION



Ref. No.	Part No.	Description	Remark
* 101	1-665-625-11	H.P BOARD	
* 102	1-665-502-11	VIDEO 3 BOARD	
* 103	1-665-495-11	AUDIO SW BOARD	
* 104	A-4398-127-A	STAND BY BOARD, COMPLETE (US,CND)	
* 104	A-4398-138-A	STAND BY BOARD, COMPLETE (E,PX)	
* 104	A-4398-145-A	STAND BY BOARD, COMPLETE (SP,MY)	
* 104	A-4398-150-A	STAND BY BOARD, COMPLETE (AUS)	
* 105	1-665-503-11	S-A-P BOARD	
* 106	A-4398-129-A	SP BOARD, COMPLETE (EXCEPT D760Z,SP,MY)	
* 106	A-4398-146-A	SP BOARD, COMPLETE (SP,MY)	
* 106	A-4398-154-A	SP BOARD, COMPLETE (D760Z)	
107	1-773-280-11	WIRE (FLAT TYPE) (29 CORE)	

Ref. No.	Part No.	Description	Remark
* 108	1-666-159-11	JOINT (OSD) BOARD	
* 109	A-4398-131-A	S.VIDEO BOARD, COMPLETE (DE815G:US,CND)	
* 109	A-4398-139-A	S.VIDEO BOARD, COMPLETE (EXCEPT DE815G:US,CND)	
* 110	A-4398-130-A	OSD BOARD, COMPLETE (US,CND,E,PX)	
* 110	A-4398-151-A	OSD BOARD, COMPLETE (SP,MY,AUS)	
* 111	3-703-353-07	SUPPORT, PC BOARD	
* 112	A-4398-133-A	MEMORY BOARD, COMPLETE	
* 113	A-4398-116-A	AUDIO BOARD, COMPLETE	
* 114	1-665-500-11	SURR-AUDIO BOARD	
* 115	1-666-632-11	JOINT (B) BOARD	

6-4. CHASSIS SECTION



Ref. No.	Part No.	Description	Remark	Ref. No.	Part No.	Description	Remark
* 151	A-4398-108-A	AMP BOARD, COMPLETE (DE815G:US,CND,E,PX)		158	3-905-609-01	SCREW (TRANSISTOR)	
* 151	A-4398-140-A	AMP BOARD, COMPLETE (SP,MY)		Q505	8-729-209-15	TRANSISTOR 2SD2012	
* 151	A-4398-152-A	AMP BOARD, COMPLETE (D760Z)		Q506	8-749-010-25	IC MN2488-OPY-M	
* 151	A-4398-189-A	AMP BOARD, COMPLETE (AUS)		Q507	8-749-010-26	IC MP1620-OPY-M	
* 152	A-4398-115-A	REAR AMP BOARD, COMPLETE (EXCEPT SP,MY)		Q555	8-729-209-15	TRANSISTOR 2SD2012	
* 152	A-4398-142-A	REAR AMP BOARD, COMPLETE (SP,MY)		Q556	8-749-010-25	IC MN2488-OPY-M	
* 153	A-4398-109-A	SURR BOARD, COMPLETE (US,CND)		Q557	8-749-010-26	IC MP1620-OPY-M	
* 153	A-4398-136-A	SURR BOARD, COMPLETE (E,PX)		Q605	8-729-209-15	TRANSISTOR 2SD2012	
* 153	A-4398-141-A	SURR BOARD, COMPLETE (SP,MY)		Q606	8-749-010-25	IC MN2488-OPY-M	
* 153	A-4398-147-A	SURR BOARD, COMPLETE (AUS)		Q607	8-749-010-26	IC MP1620-OPY-M	
* 154	1-665-634-11	AMP.JOINT (R) BOARD		Q706	8-749-010-25	IC MN2488-OPY-M	
* 155	1-665-633-11	AMP.JOINT (F) BOARD		Q707	8-749-010-26	IC MP1620-OPY-M	
156	X-4947-207-1	FOOT ASSY (F50150S) (EXCEPT US,CND)		Q756	8-749-010-25	IC MN2488-OPY-M	
156	X-4947-208-1	FOOT ASSY (F50150S)(US,CND)		Q757	8-749-010-26	IC MP1620-OPY-M	
157	4-977-358-11	CUSHION (8X12.5)					

SECTION 7

ELECTRICAL PARTS LIST

Note:

The components identified by mark  or dotted line with mark  are critical for safety. Replace only with part number specified.

Les composants identifiés par une
marque  sont critiques pour la
sécurité.
Ne les remplacer que par une
pièce portant le numéro spécifié.

When indicating parts by reference number, please include the board name.

- Due to standardization, replacements in the parts list may be different from the parts specified in the diagrams or the components used on the set.
- Items marked “*” are not stocked since they are seldom required for routine service. Some delay should be anticipated when ordering these items.
- RESISTORS
 - All resistors are in ohms
 - METAL: Metal-film resistor
 - METAL OXIDE: Metal Oxide-film resistor
 - F : nonflammable

- SEMICONDUCTORS
In each case, $u: \mu$, for example:
 $uA...: \mu A..., uPA...: \mu PA..., uPB...: \mu PB...,$
 $uPC...: \mu PC..., uPD...: \mu PD...$
- CAPACITORS
 $uF: \mu F$
- COILS
 $uH: \mu H$
- Abbreviation
CND : Canadian model
SP : Singapore model
MY : Malaysia model
AUS : Australian model

Ref. No.	Part No.	Description	Remark			
*	1-665-629-11	5.1 IN BOARD *****				
		< CONNECTOR >				
CNP305	1-564-524-11	PLUG, CONNECTOR 9P				
		< JACK >				
J306	1-779-355-11	JACK, PIN 6P (5.1 INPUT)				
		< RESISTOR >				
R317	1-249-421-11	CARBON	2.2K	5%	1/4W	F
R325	1-249-421-11	CARBON	2.2K	5%	1/4W	F
R326	1-249-421-11	CARBON	2.2K	5%	1/4W	F
R327	1-249-429-11	CARBON	10K	5%	1/4W	
R328	1-249-429-11	CARBON	10K	5%	1/4W	
R329	1-249-429-11	CARBON	10K	5%	1/4W	
R367	1-249-421-11	CARBON	2.2K	5%	1/4W	F
R375	1-249-421-11	CARBON	2.2K	5%	1/4W	F
R376	1-249-421-11	CARBON	2.2K	5%	1/4W	F
R377	1-249-429-11	CARBON	10K	5%	1/4W	
R378	1-249-429-11	CARBON	10K	5%	1/4W	
R379	1-249-429-11	CARBON	10K	5%	1/4W	

*	A-4398-108-A	AMP BOARD, COMPLETE ***** (DE815G:US,CND,E,PX)				
*	A-4398-140-A	AMP BOARD, COMPLETE (SP,MY) *****				
*	A-4398-152-A	AMP BOARD, COMPLETE (D760Z) *****				
*	A-4398-189-A	AMP BOARD, COMPLETE (AUS) *****				
	7-685-872-09	SCREW +BVTT 3X8 (S)				
		< CAPACITOR >				
C520	1-126-967-11	ELECT	47uF	20%	16V	
C521	1-107-597-11	CERAMIC	22PF	10%	500V	
C522	1-107-597-11	CERAMIC	22PF	10%	500V	
C523	1-162-286-31	CERAMIC	220PF	10%	50V	
C524	1-126-964-11	ELECT	10uF	20%	50V	
C525	1-136-157-00	FILM	0.022uF	5%	50V	
C526	1-136-153-00	FILM	0.01uF	5%	50V	

Ref. No.	Part No.	Description			Remark
C570	1-126-967-11	ELECT	47uF	20%	16V
C571	1-107-597-11	CERAMIC	22PF	10%	500V
C572	1-107-597-11	CERAMIC	22PF	10%	500V
C573	1-162-286-31	CERAMIC	220PF	10%	50V
C574	1-126-964-11	ELECT	10uF	20%	50V
C575	1-136-157-00	FILM	0.022uF	5%	50V
C576	1-136-153-00	FILM	0.01uF	5%	50V
C590	1-126-935-11	ELECT	470uF	20%	6.3V
C598	1-126-965-11	ELECT	22uF	20%	50V
C620	1-126-967-11	ELECT	47uF	20%	16V
C621	1-107-597-11	CERAMIC	22PF	10%	500V
C622	1-107-597-11	CERAMIC	22PF	10%	500V
C623	1-162-286-31	CERAMIC	220PF	10%	50V
C803	1-109-932-11	ELECT	10000uF	20%	71V (EXCEPT SP,MY)
C803	1-117-203-11	ELECT	10000uF	20%	63V (SP,MY)
C804	1-109-932-11	ELECT	10000uF	20%	71V (EXCEPT SP,MY)
C804	1-117-203-11	ELECT	10000uF	20%	63V (SP,MY)
C807	1-126-967-11	ELECT	47uF	20%	16V
C808	1-126-967-11	ELECT	47uF	20%	16V
C810	1-126-967-11	ELECT	47uF	20%	16V
C811	1-126-952-11	ELECT	1000uF	20%	35V
C812	1-126-951-11	ELECT	470uF	20%	35V
C817	1-126-967-11	ELECT	47uF	20%	50V
C818	1-126-967-11	ELECT	47uF	20%	50V
< CONNECTOR >					
CNP701	1-564-320-00	PIN, CONNECTOR (B2P-VH) 2P			
CNP702	1-695-091-11	PIN, CONNECTOR (PC BOARD) 15P			
CNS502	1-770-404-11	HOUSING,CONNECTOR (PC BOARD) 11P			
CNS602	1-770-404-11	HOUSING,CONNECTOR (PC BOARD) 11P			
CNS701	1-569-323-11	SOCKET, CONNECTOR 19P			
< DIODE >					
D501	8-719-987-63	DIODE	1N4148M		
D502	8-719-010-06	DIODE	UZ-2.2BS		
D503	8-719-010-06	DIODE	UZ-2.2BS		
D504	8-719-987-63	DIODE	1N4148M		
D505	8-719-987-63	DIODE	1N4148M		
D506	8-719-987-63	DIODE	1N4148M		
D512	8-719-987-63	DIODE	1N4148M		
D545	8-719-987-63	DIODE	1N4148M		
D546	8-719-987-63	DIODE	1N4148M		
D547	8-719-987-63	DIODE	1N4148M		

Ref. No.	Part No.	Description	Remark	Ref. No.	Part No.	Description	Remark
D548	8-719-815-85	DIODE 1S1585		Q596	8-729-119-79	TRANSISTOR 2SC2785-FEK	
D549	8-719-815-85	DIODE 1S1585		Q601	8-729-119-79	TRANSISTOR 2SC2785-FEK	
D551	8-719-987-63	DIODE 1N4148M		Q604	8-729-119-76	TRANSISTOR 2SA1175-HFE	
D552	8-719-010-06	DIODE UZ-2.2BS		Q605	8-729-209-15	TRANSISTOR 2SD2012	
D553	8-719-010-06	DIODE UZ-2.2BS		Q606	8-749-010-25	IC MN2488-OPY-M	
D554	8-719-987-63	DIODE 1N4148M		Q607	8-749-010-26	IC MP1620-OPY-M	
D555	8-719-987-63	DIODE 1N4148M		Q608	8-729-140-82	TRANSISTOR 2SA988-PAFAEA	
D556	8-719-987-63	DIODE 1N4148M		Q612	8-729-281-53	TRANSISTOR 2SC1815-GR (EXCEPT SP,MY)	
D601	8-719-987-63	DIODE 1N4148M		Q613	8-729-281-53	TRANSISTOR 2SC1815-GR	
D602	8-719-010-06	DIODE UZ-2.2BS		Q614	8-729-201-53	TRANSISTOR 2SA1015-GR (EXCEPT SP,MY)	
D603	8-719-010-06	DIODE UZ-2.2BS		Q615	8-729-900-36	TRANSISTOR DTC124ES (EXCEPT SP,MY)	
D604	8-719-987-63	DIODE 1N4148M		Q616	8-729-900-36	TRANSISTOR DTC124ES	
D608	8-719-987-63	DIODE 1N4148M		Q617	8-729-900-36	TRANSISTOR DTC124ES (EXCEPT SP,MY)	
D611	8-719-987-63	DIODE 1N4148M		Q618	8-729-900-63	TRANSISTOR DTA124ES (EXCEPT SP,MY)	
D647	8-719-987-63	DIODE 1N4148M (EXCEPT SP,MY)		Q801	8-729-140-97	TRANSISTOR 2SB734-34	
D648	8-719-987-63	DIODE 1N4148M (EXCEPT SP,MY)		< RESISTOR >			
D651	8-719-987-63	DIODE 1N4148M		R521	1-247-840-00	CARBON 2.4K 5%	1/4W
D711	8-719-987-63	DIODE 1N4148M		R523	1-249-414-11	CARBON 560 5%	1/4W F
D716	8-719-987-63	DIODE 1N4148M		△R524	1-249-408-11	CARBON 180 5%	1/4W F
D807	8-719-934-22	DIODE HZS30-2L		△R525	1-249-408-11	CARBON 180 5%	1/4W F
< GROUND TERMINAL >				△R526	1-233-352-41	ENCAPSULATED COMPONENT	
* EB701	1-537-738-21	TERMINAL, EARTH		R527	1-247-850-11	CARBON 6.2K 5%	1/4W
* EB702	1-537-738-21	TERMINAL, EARTH		R528	1-249-419-11	CARBON 1.5K 5%	1/4W F
* EB703	1-537-738-21	TERMINAL, EARTH		R529	1-249-437-11	CARBON 47K 5%	1/4W
< IC >				R530	1-249-421-11	CARBON 2.2K 5%	1/4W F
IC801	8-759-391-87	IC BA78M12P		R531	1-249-433-11	CARBON 22K 5%	1/4W
IC802	8-759-391-87	IC BA78M12P		R532	1-249-437-11	CARBON 47K 5%	1/4W
IC803	8-759-604-45	IC M5F79M12		△R533	1-249-393-11	CARBON 10 5%	1/4W F
< COIL >				△R534	1-249-389-11	CARBON 4.7 5%	1/4W F
L501	1-411-906-11	COIL, AIR-CORE (SP,MY)		R535	1-249-431-11	CARBON 15K 5%	1/4W
L501	1-420-872-00	COIL, AIR-CORE (EXCEPT SP,MY)		R539	1-249-427-11	CARBON 6.8K 5%	1/4W F
L551	1-411-906-11	COIL, AIR-CORE (SP,MY)		R540	1-249-417-11	CARBON 1K 5%	1/4W F
L551	1-420-872-00	COIL, AIR-CORE (EXCEPT SP,MY)		R541	1-249-435-11	CARBON 33K 5%	1/4W
< TRANSISTOR >				R542	1-249-429-11	CARBON 10K 5%	1/4W
Q504	8-729-119-76	TRANSISTOR 2SA1175-HFE		R547	1-249-425-11	CARBON 4.7K 5%	1/4W F
Q505	8-729-209-15	TRANSISTOR 2SD2012		R548	1-249-429-11	CARBON 10K 5%	1/4W
Q506	8-749-010-25	IC MN2488-OPY-M		△R549	1-249-393-11	CARBON 10 5%	1/4W F
Q507	8-749-010-26	IC MP1620-OPY-M		R550	1-249-429-11	CARBON 10K 5%	1/4W
Q508	8-729-140-82	TRANSISTOR 2SA988-PAFAEA		R571	1-247-840-00	CARBON 2.4K 5%	1/4W
Q509	8-729-281-53	TRANSISTOR 2SC1815-GR		R573	1-249-414-11	CARBON 560 5%	1/4W F
Q510	8-729-900-63	TRANSISTOR DTA124ES		△R574	1-249-408-11	CARBON 180 5%	1/4W F
Q511	8-729-900-63	TRANSISTOR DTA124ES		△R575	1-249-408-11	CARBON 180 5%	1/4W F
Q546	8-729-119-79	TRANSISTOR 2SC2785-FEK		△R576	1-233-352-41	ENCAPSULATED COMPONENT	
Q547	8-729-140-84	TRANSISTOR 2SC1841-PAFAEA		R577	1-247-850-11	CARBON 6.2K 5%	1/4W
Q548	8-729-119-79	TRANSISTOR 2SC2785-FEK		R578	1-249-419-11	CARBON 1.5K 5%	1/4W F
Q549	8-729-140-82	TRANSISTOR 2SA988-PAFAEA		R579	1-249-437-11	CARBON 47K 5%	1/4W
Q554	8-729-119-76	TRANSISTOR 2SA1175-HFE		R580	1-249-421-11	CARBON 2.2K 5%	1/4W F
Q555	8-729-209-15	TRANSISTOR 2SD2012		R581	1-249-433-11	CARBON 22K 5%	1/4W
Q556	8-749-010-25	IC MN2488-OPY-M		R582	1-249-437-11	CARBON 47K 5%	1/4W
Q557	8-749-010-26	IC MP1620-OPY-M		△R583	1-249-393-11	CARBON 10 5%	1/4W F
Q558	8-729-140-82	TRANSISTOR 2SA988-PAFAEA		△R584	1-249-389-11	CARBON 4.7 5%	1/4W F
Q559	8-729-281-53	TRANSISTOR 2SC1815-GR		R585	1-249-431-11	CARBON 15K 5%	1/4W
Q560	8-729-900-63	TRANSISTOR DTA124ES		R586	1-249-429-11	CARBON 10K 5%	1/4W
Q561	8-729-900-63	TRANSISTOR DTA124ES		R587	1-249-425-11	CARBON 4.7K 5%	1/4W F
				△R588	1-249-393-11	CARBON 10 5%	1/4W F
				R589	1-249-434-11	CARBON 27K 5%	1/4W F
				R590	1-249-434-11	CARBON 27K 5%	1/4W F

The components identified by mark △ or dotted line with mark △ are critical for safety. Replace only with part number specified.

Les composants identifiés par une marque △ sont critiques pour la sécurité. Ne les remplacer que par une pièce portant le numéro spécifié.

AMP

AMP.JOINT (F)

AMP.JOINT (R)

AUDIO

AUDIO SW

Ref. No.	Part No.	Description	Remark
R597	1-249-434-11	CARBON 27K 5%	1/4W F
R598	1-249-434-11	CARBON 27K 5%	1/4W F
R621	1-247-840-00	CARBON 2.4K 5%	1/4W
R623	1-249-414-11	CARBON 560 5%	1/4W F
△ R624	1-249-408-11	CARBON 180 5%	1/4W F
△ R625	1-249-408-11	CARBON 180 5%	1/4W F
△ R626	1-233-352-41	ENCAPSULATED COMPONENT	
R627	1-247-850-11	CARBON 6.2K 5%	1/4W
R628	1-249-419-11	CARBON 1.5K 5%	1/4W F
R632	1-249-437-11	CARBON 47K 5%	1/4W
△ R640	1-216-450-00	METAL OXIDE 82 5%	2W F (EXCEPT SP,MY)
R641	1-249-441-11	CARBON 100K 5%	1/4W (EXCEPT SP,MY)
△ R642	1-215-889-00	METAL OXIDE 330 5%	2W F
R643	1-249-441-11	CARBON 100K 5%	1/4W
△ R644	1-215-890-11	METAL OXIDE 470 5%	2W F (EXCEPT SP,MY)
R645	1-249-441-11	CARBON 100K 5%	1/4W (EXCEPT SP,MY)
R650	1-249-425-11	CARBON 4.7K 5%	1/4W F
R651	1-249-429-11	CARBON 10K 5%	1/4W
△ R652	1-249-393-11	CARBON 10 5%	1/4W F
△ R739	1-215-868-00	METAL OXIDE 680 5%	1W F
△ R789	1-215-868-00	METAL OXIDE 680 5%	1W F
△ R802	1-249-401-11	CARBON 47 5%	1/4W F
R803	1-247-843-11	CARBON 3.3K 5%	1/4W

< RELAY >

RY501	1-515-920-11	RELAY (24V)
RY502	1-515-920-11	RELAY (24V)
RY602	1-515-793-11	RELAY

< TERMINAL >

* TM501 1-537-519-11 TERMINAL BOARD (SP)(FRONT SPEAKER)

* 1-665-633-11 AMP.JOINT (F) BOARD

< CONNECTOR >

CNP501	1-770-553-11	CONNECTOR, BOARD TO BOARD 11P
CNP502	1-770-553-11	CONNECTOR, BOARD TO BOARD 11P

* 1-665-634-11 AMP.JOINT (R) BOARD

< CONNECTOR >

CNP601	1-770-553-11	CONNECTOR, BOARD TO BOARD 11P
CNP602	1-770-553-11	CONNECTOR, BOARD TO BOARD 11P

Ref. No.	Part No.	Description	Remark
*	A-4398-116-A	AUDIO BOARD, COMPLETE *****	
		< CAPACITOR >	
C398	1-162-282-31	CERAMIC 100PF 10%	50V
C399	1-162-294-31	CERAMIC 0.001uF 10%	50V
		< CONNECTOR >	
CNS302	1-695-093-11	SOCKET, CONNECTOR 9P	
		< IC >	
IC303	8-759-805-14	IC LC7822	
		< JACK >	
J304	1-770-015-11	JACK, PIN 6P (VIDEO 1 AUDIO IN/OUT, VIDEO 2 AUDIO IN)	
J305	1-774-411-11	JACK, PIN 6P (VIDEO 2 AUDIO OUT, LD/DVD AUDIO IN,TV/DVS AUDIO IN)	
		< RESISTOR >	
R318	1-249-417-11	CARBON 1K 5%	1/4W F
R319	1-249-417-11	CARBON 1K 5%	1/4W F
R320	1-249-417-11	CARBON 1K 5%	1/4W F
R321	1-249-417-11	CARBON 1K 5%	1/4W F
R322	1-249-425-11	CARBON 4.7K 5%	1/4W F
R323	1-249-417-11	CARBON 1K 5%	1/4W F
R338	1-249-437-11	CARBON 47K 5%	1/4W
R368	1-249-417-11	CARBON 1K 5%	1/4W F
R369	1-249-417-11	CARBON 1K 5%	1/4W F
R370	1-249-417-11	CARBON 1K 5%	1/4W F
R371	1-249-417-11	CARBON 1K 5%	1/4W F
R372	1-249-425-11	CARBON 4.7K 5%	1/4W F
R373	1-249-417-11	CARBON 1K 5%	1/4W F
R388	1-249-437-11	CARBON 47K 5%	1/4W
R398	1-249-417-11	CARBON 1K 5%	1/4W F
R399	1-249-425-11	CARBON 4.7K 5%	1/4W F

*	1-665-495-11	AUDIO SW BOARD *****	
		< CAPACITOR >	
C407	1-126-795-11	ELECT 10uF 20%	50V
C408	1-164-159-11	CERAMIC 0.1uF	50V
C409	1-126-795-11	ELECT 10uF 20%	50V
C411	1-126-795-11	ELECT 10uF 20%	50V
C412	1-164-159-11	CERAMIC 0.1uF	50V
C457	1-126-795-11	ELECT 10uF 20%	50V
C458	1-164-159-11	CERAMIC 0.1uF	50V
C459	1-126-795-11	ELECT 10uF 20%	50V
C461	1-126-795-11	ELECT 10uF 20%	50V
C495	1-162-294-31	CERAMIC 0.001uF 10%	50V
C496	1-164-070-11	CERAMIC 100PF 5%	50V
C498	1-126-786-11	ELECT 47uF 20%	16V
C499	1-126-786-11	ELECT 47uF 20%	16V

The components identified by mark △ or dotted line with mark △ are critical for safety.
Replace only with part number specified.

Les composants identifiés par une marque △ sont critiques pour la sécurité.
Ne les remplacer que par une pièce portant le numéro spécifié.

AUDIO SW

BALANCE

DISPLAY

Ref. No.	Part No.	Description	Remark
		< CONNECTOR >	
CNP410	1-750-180-11	PIN, CONNECTOR (PC BOARD) 5P	
CNS403	1-695-093-11	SOCKET, CONNECTOR 9P	
CNS404	1-695-094-11	SOCKET, CONNECTOR 11P	
		< IC >	
IC405	8-759-634-50	IC M5218AL	
IC406	8-759-805-15	IC LC7823	
		< TRANSISTOR >	
Q401	8-729-922-37	TRANSISTOR 2SD2144S	
Q403	8-729-922-37	TRANSISTOR 2SD2144S	
Q451	8-729-922-37	TRANSISTOR 2SD2144S	
		< RESISTOR >	
R410	1-247-887-00	CARBON 220K 5% 1/4W	
R411	1-249-417-11	CARBON 1K 5% 1/4W F	
R412	1-249-425-11	CARBON 4.7K 5% 1/4W F	
R413	1-249-441-11	CARBON 100K 5% 1/4W	
R416	1-249-441-11	CARBON 100K 5% 1/4W	
R417	1-249-417-11	CARBON 1K 5% 1/4W F	
R418	1-249-425-11	CARBON 4.7K 5% 1/4W F	
R460	1-247-887-00	CARBON 220K 5% 1/4W	
R461	1-249-417-11	CARBON 1K 5% 1/4W F	
R462	1-249-425-11	CARBON 4.7K 5% 1/4W F	
R463	1-249-441-11	CARBON 100K 5% 1/4W	
R466	1-249-441-11	CARBON 100K 5% 1/4W	
R467	1-249-417-11	CARBON 1K 5% 1/4W F	
R468	1-249-417-11	CARBON 1K 5% 1/4W F	
R469	1-249-441-11	CARBON 100K 5% 1/4W	
R476	1-249-425-11	CARBON 4.7K 5% 1/4W F	
R477	1-249-417-11	CARBON 1K 5% 1/4W F	
R478	1-249-441-11	CARBON 100K 5% 1/4W	
R479	1-249-429-11	CARBON 10K 5% 1/4W	
R480	1-249-441-11	CARBON 100K 5% 1/4W	
R481	1-247-807-31	CARBON 100 5% 1/4W	
R482	1-247-807-31	CARBON 100 5% 1/4W	

*	1-665-624-11	BALANCE BOARD	

		< VARIABLE RESISTOR >	
RV402	1-225-447-11	RES, VAR, CARBON 100K/100K (BALANCE)	

Ref. No.	Part No.	Description	Remark
*	A-4398-122-A	DISPLAY BOARD, COMPLETE (DE815G:US,CND)	*****
*	A-4398-137-A	DISPLAY BOARD, COMPLETE (E,PX)	*****
*	A-4398-143-A	DISPLAY BOARD, COMPLETE (SP,MY)	*****
*	A-4398-148-A	DISPLAY BOARD, COMPLETE (AUS)	*****
*	A-4398-153-A	DISPLAY BOARD, COMPLETE (D760Z)	*****
*	4-921-941-01	CUSHION (FL)	
*	4-981-656-01	HOLDER (C), FL INDICATION TUBE	
		< CAPACITOR >	
C101	1-164-159-11	CERAMIC 0.1uF	50V
C102	1-164-159-11	CERAMIC 0.1uF	50V
C103	1-164-159-11	CERAMIC 0.1uF	50V
C104	1-164-159-11	CERAMIC 0.1uF	50V
C105	1-164-159-11	CERAMIC 0.1uF	50V
C106	1-164-159-11	CERAMIC 0.1uF	50V
C107	1-164-159-11	CERAMIC 0.1uF	50V
C108	1-126-796-11	ELECT 22uF 20%	35V
C109	1-162-282-31	CERAMIC 100PF 10%	50V
C110	1-126-786-11	ELECT 47uF 20%	16V
C111	1-126-786-11	ELECT 47uF 20%	16V
C112	1-162-282-31	CERAMIC 100PF 10%	50V
C113	1-126-786-11	ELECT 47uF 20%	16V
C114	1-164-159-11	CERAMIC 0.1uF	50V
C115	1-104-905-11	CAPACITOR 0.22F	5.5V
C116	1-164-159-11	CERAMIC 0.1uF	50V
C117	1-164-159-11	CERAMIC 0.1uF	50V
C132	1-126-177-11	ELECT 100uF 20%	10V
C133	1-164-159-11	CERAMIC 0.1uF	50V
C134	1-162-282-31	CERAMIC 100PF 10%	50V
C135	1-126-795-11	ELECT 10uF 20%	50V
C140	1-126-786-11	ELECT 47uF 20%	16V
C141	1-164-159-11	CERAMIC 0.1uF	50V
C142	1-164-159-11	CERAMIC 0.1uF	50V
C143	1-162-294-31	CERAMIC 0.001uF 10%	50V
		< CONNECTOR >	
CNP101	1-779-365-11	CONNECTOR, PC BOARD (PLUG) 8P	
CNP103	1-779-366-11	CONNECTOR, BOARD TO BOARD 4P	
CNS102	1-770-397-11	HOUSING, CONNECTOR(PC BOARD)4P	
CNS104	1-569-308-11	SOCKET, CONNECTOR (L TYRE) 19P	
CNS105	1-691-650-11	SOCKET, CONNECTOR 19P	
CNS107	1-568-438-11	SOCKET, CONNECTOR 17P	
		< DIODE >	
D100	8-719-987-63	DIODE IN4148M	
D101	8-719-313-45	DIODE SEL6810A-TH10 (PHONO)	
D102	8-719-313-45	DIODE SEL6810A-TH10 (TUNER)	
D103	8-719-313-45	DIODE SEL6810A-TH10 (CD)	
D104	8-719-313-45	DIODE SEL6810A-TH10 (DAT/MD)	
D105	8-719-313-45	DIODE SEL6810A-TH10 (TAPE)	

DISPLAY

Ref. No.	Part No.	Description	Remark
D106	8-719-313-45	DIODE SEL6810A-TH10 (TV/DBS)	
D107	8-719-313-45	DIODE SEL6810A-TH10 (LD/DVD)	
D108	8-719-313-45	DIODE SEL6810A-TH10 (VIDEO 3)	
D109	8-719-313-45	DIODE SEL6810A-TH10 (VIDEO 2)	
D110	8-719-313-45	DIODE SEL6810A-TH10 (VIDEO 1)	
D111	8-719-313-45	DIODE SEL6810A-TH10 (DIRECT PASS)	
D112	8-719-064-63	DIODE SELU5823A-TP15 (5.1 INPUT)	
D113	8-719-313-45	DIODE SEL6810A-TH10 (SUR)	
D114	8-719-313-45	DIODE SEL6810A-TH10 (TONE)	
D115	8-719-313-45	DIODE SEL6810A-TH10 (INDEX)	
D116	8-719-313-43	DIODE SEL6210S-TH10 (LEARNING SENSOR)	
D118	8-719-313-43	DIODE SEL6210S-TH10 (POWER)	(EXCEPT US,CND)
D119	8-719-987-63	DIODE 1N4148M	
D120	8-719-024-99	DIODE 11ES2-NTA2B	
D121	8-719-053-79	DIODE SE1003-C-TP	
D122	8-719-053-79	DIODE SE1003-C-TP	
D123	8-719-053-79	DIODE SE1003-C-TP	
D124	8-719-053-79	DIODE SE1003-C-TP	
D125	8-719-053-79	DIODE SE1003-C-TP	
D126	8-719-053-79	DIODE SE1003-C-TP	
D127	8-719-053-79	DIODE SE1003-C-TP	
D128	8-719-053-79	DIODE SE1003-C-TP	
D129	8-719-053-79	DIODE SE1003-C-TP	
D130	8-719-053-79	DIODE SE1003-C-TP	
D133	8-719-987-63	DIODE 1N4148M	
D134	8-719-118-33	PHOTO DIODE PH302D	
D1001	8-719-010-38	DIODE UZ-5.1BSB	
< FLUORESCENT INDICATOR >			
FL101	1-517-519-11	INDICATOR TUBE, FLUORESCENT	
< IC >			
IC101	8-759-462-46	IC TPS831	
IC102	8-759-442-92	IC M66004AFP-M6	
IC103	8-759-479-58	IC MB90673PF-G-216-BND	
IC104	8-759-240-69	IC TC4069UBP	
IC105	8-759-634-84	IC M50255P	
IC106	8-759-962-08	IC BA6208	
< COIL >			
L101	1-410-509-11	INDUCTOR 10uH	
L102	1-410-509-11	INDUCTOR 10uH	
< TRANSISTOR >			
Q101	8-729-900-36	TRANSISTOR DTC124ES	
Q102	8-729-900-36	TRANSISTOR DTC124ES	
Q103	8-729-140-97	TRANSISTOR 2SB734-34	
Q105	8-729-900-36	TRANSISTOR DTC124ES	
Q106	8-729-900-36	TRANSISTOR DTC124ES (SP,MY)	
Q107	8-729-900-36	TRANSISTOR DTC124ES (EXCEPT US,CND)	
< RESISTOR >			
R101	1-247-807-31	CARBON 100 5%	1/4W
R102	1-247-807-31	CARBON 100 5%	1/4W
R103	1-247-807-31	CARBON 100 5%	1/4W
R104	1-247-807-31	CARBON 100 5%	1/4W

Ref. No.	Part No.	Description	Remark
R105	1-247-807-31	CARBON 100 5%	1/4W
R106	1-247-807-31	CARBON 100 5%	1/4W
R107	1-247-807-31	CARBON 100 5%	1/4W
R108	1-247-807-31	CARBON 100 5%	1/4W
R109	1-247-807-31	CARBON 100 5%	1/4W
R110	1-247-807-31	CARBON 100 5%	1/4W
R111	1-247-807-31	CARBON 100 5%	1/4W
R112	1-247-807-31	CARBON 100 5%	1/4W
R113	1-247-807-31	CARBON 100 5%	1/4W
R114	1-247-807-31	CARBON 100 5%	1/4W
R115	1-247-807-31	CARBON 100 5%	1/4W
R116	1-247-807-31	CARBON 100 5%	1/4W
R117	1-247-807-31	CARBON 100 5%	1/4W
R118	1-249-417-11	CARBON 1K 5%	1/4W F
R119	1-249-417-11	CARBON 1K 5%	1/4W F
R120	1-249-417-11	CARBON 1K 5%	1/4W F
R121	1-249-417-11	CARBON 1K 5%	1/4W F
R122	1-249-425-11	CARBON 4.7K 5%	1/4W F
R123	1-249-425-11	CARBON 4.7K 5%	1/4W F
R124	1-249-425-11	CARBON 4.7K 5%	1/4W F
R125	1-249-425-11	CARBON 4.7K 5%	1/4W F
R126	1-249-425-11	CARBON 4.7K 5%	1/4W F
R127	1-249-425-11	CARBON 4.7K 5%	1/4W F
R128	1-249-417-11	CARBON 1K 5%	1/4W F
R129	1-247-807-31	CARBON 100 5%	1/4W
R130	1-249-429-11	CARBON 10K 5%	1/4W
R131	1-249-419-11	CARBON 1.5K 5%	1/4W F
R132	1-249-417-11	CARBON 1K 5%	1/4W F
R133	1-249-417-11	CARBON 1K 5%	1/4W F
R134	1-249-417-11	CARBON 1K 5%	1/4W F
R135	1-249-417-11	CARBON 1K 5%	1/4W F
R136	1-249-417-11	CARBON 1K 5%	1/4W F
R137	1-247-807-31	CARBON 100 5%	1/4W
R138	1-249-417-11	CARBON 1K 5%	1/4W F
R139	1-247-807-31	CARBON 100 5%	1/4W
R140	1-247-807-31	CARBON 100 5%	1/4W
R141	1-247-807-31	CARBON 100 5%	1/4W
R142	1-247-807-31	CARBON 100 5%	1/4W
△ R143	1-215-861-00	METAL OXIDE 47 5%	1W F
R144	1-249-393-11	CARBON 10 5%	1/4W F
R145	1-247-895-00	CARBON 470K 5%	1/4W
R146	1-247-903-00	CARBON 1M 5%	1/4W
R147	1-249-433-11	CARBON 22K 5%	1/4W
R148	1-247-903-00	CARBON 1M 5%	1/4W
R149	1-249-435-11	CARBON 33K 5%	1/4W
R150	1-249-393-11	CARBON 10 5%	1/4W F
R151	1-249-429-11	CARBON 10K 5%	1/4W
R152	1-249-434-11	CARBON 27K 5%	1/4W
△ R153	1-249-385-11	CARBON 2.2 5%	1/6W F
△ R154	1-249-385-11	CARBON 2.2 5%	1/6W F
R155	1-249-411-11	CARBON 330 5%	1/4W
R156	1-249-411-11	CARBON 330 5%	1/4W
R157	1-249-411-11	CARBON 330 5%	1/4W
R158	1-249-411-11	CARBON 330 5%	1/4W
R159	1-249-411-11	CARBON 330 5%	1/4W
R161	1-249-411-11	CARBON 330 5%	1/4W

(EXCEPT US,CND)

The components identified by mark △ or dotted line with mark △ are critical for safety. Replace only with part number specified.

Les composants identifiés par une marque △ sont critiques pour la sécurité. Ne les remplacer que par une pièce portant le numéro spécifié.

DISPLAY
H.P
JOINT (B)
JOINT (OSD)
L.B SW
MEMORY

Ref. No.	Part No.	Description			Remark
R162	1-249-429-11	CARBON	10K	5%	1/4W
R163	1-249-401-11	CARBON	47	5%	1/4W F
R164	1-249-429-11	CARBON	10K	5%	1/4W
R165	1-249-429-11	CARBON	10K	5%	1/4W
R166	1-249-429-11	CARBON	10K	5%	1/4W
R167	1-249-441-11	CARBON	100K	5%	1/4W F
R188	1-249-411-11	CARBON	330	5%	1/4W
R189	1-249-413-11	CARBON	470	5%	1/4W F
R190	1-249-415-11	CARBON	680	5%	1/4W F
R191	1-249-417-11	CARBON	1K	5%	1/4W F
R192	1-249-419-11	CARBON	1.5K	5%	1/4W F
R193	1-249-421-11	CARBON	2.2K	5%	1/4W F
R194	1-249-425-11	CARBON	4.7K	5%	1/4W F
R195	1-249-411-11	CARBON	330	5%	1/4W
R196	1-249-413-11	CARBON	470	5%	1/4W F
R197	1-249-415-11	CARBON	680	5%	1/4W F
R198	1-249-417-11	CARBON	1K	5%	1/4W F
R199	1-249-419-11	CARBON	1.5K	5%	1/4W F
RR10	1-249-425-11	CARBON	4.7K	5%	1/4W F
					(EXCEPT E,PX)
RR11	1-249-411-11	CARBON	330	5%	1/4W
RR12	1-249-413-11	CARBON	470	5%	1/4W F
RR13	1-249-415-11	CARBON	680	5%	1/4W F
					(EXCEPT US,CND)
RR14	1-249-417-11	CARBON	1K	5%	1/4W F
					(EXCEPT US,CND)
RR15	1-249-419-11	CARBON	1.5K	5%	1/4W F
					(EXCEPT US,CND)
RR16	1-249-421-11	CARBON	2.2K	5%	1/4W F
					(EXCEPT US,CND)
RR17	1-249-425-11	CARBON	4.7K	5%	1/4W F
					(SP,MY,AUS)
RR18	1-249-429-11	CARBON	10K	5%	1/4W
					(AUS)
		< SWITCH >			
S123	1-762-751-11	SWITCH, TACTILE (<)			
S124	1-762-751-11	SWITCH, TACTILE (>)			
S125	1-762-751-11	SWITCH, TACTILE (DISPLAY)			
S126	1-762-751-11	SWITCH, TACTILE (FM MODE)			
S127	1-762-751-11	SWITCH, TACTILE (FM/AM)			
S128	1-762-751-11	SWITCH, TACTILE (SHIFT)			
S129	1-762-751-11	SWITCH, TACTILE (∧)			
S130	1-762-751-11	SWITCH, TACTILE (∨)			
S131	1-762-751-11	SWITCH, TACTILE (PRESET TUNING -)			
S132	1-762-751-11	SWITCH, TACTILE (TUNING -)			
S133	1-762-751-11	SWITCH, TACTILE (PRESET TUNING +)			
S134	1-762-751-11	SWITCH, TACTILE (TUNING +)			
S151	1-762-751-11	SWITCH, TACTILE (POWER)(EXCEPT SP,MY)			
		< VIBRATOR >			
X101	1-567-819-11	VIBRATOR, CERAMIC (4MHz)			

Ref. No.	Part No.	Description			Remark
*	1-665-625-11	H.P BOARD			*****
		< CONNECTOR >			
* CNP702	1-564-518-11	PLUG, CONNECTOR 3P			
		< JACK >			
J701	1-568-519-41	JACK, LARGE TYPE (PHONES)			

*	1-666-632-11	JOINT (B) BOARD			*****
		< CONNECTOR >			
CNP213	1-750-180-11	PIN, CONNECTOR (PC BOARD) 5P			
CNP216	1-750-180-11	PIN, CONNECTOR (PC BOARD) 5P			

*	1-666-159-11	JOINT (OSD) BOARD			*****
		< CONNECTOR >			
CNP211	1-695-089-11	PIN, CONNECTOR (PC BOARD) 11P			
CNP212	1-695-089-11	PIN, CONNECTOR (PC BOARD) 11P			

*	1-665-622-11	L.B SW BOARD			*****
		< DIODE >			
D117	8-719-313-45	DIODE SEL6810A-TH10 (BASS BOOST)			
		< RESISTOR >			
R160	1-249-411-11	CARBON	330	5%	1/4W
		< SWITCH >			
S135	1-762-751-11	SWITCH, TACTILE (BASS BOOST)			

*	A-4398-133-A	MEMORY BOARD, COMPLETE			*****
		< CAPACITOR >			
C288	1-164-159-11	CERAMIC	0.1uF		50V
C289	1-164-159-11	CERAMIC	0.1uF		50V
C290	1-126-967-11	ELECT	47uF	20%	16V
C291	1-164-159-11	CERAMIC	0.1uF		50V
C294	1-164-159-11	CERAMIC	0.1uF		50V
		< CONNECTOR >			
CNS205	1-779-768-11	SOCKET, CONNECTOR 29P			
		< IC >			
IC216	8-759-916-94	IC SN74HC373AN			
IC218	8-759-916-94	IC SN74HC373AN			

MEMORY

OSD

Ref. No.	Part No.	Description	Remark			
IC220	8-759-459-82	IC MX23C4096-12-97A				
IC221	8-759-289-94	IC LH5160TF				
IC222	8-759-289-94	IC LH5160TF				
< COIL >						
L204	1-410-521-11	INDUCTOR 100uH				
L205	1-410-521-11	INDUCTOR 100uH				
< RESISTOR >						
R227	1-249-417-11	CARBON 1K 5% 1/4W	F			
R264	1-249-417-11	CARBON 1K 5% 1/4W	F			
R2012	1-249-429-11	CARBON 10K 5% 1/4W				
R2013	1-249-429-11	CARBON 10K 5% 1/4W				
R2014	1-249-429-11	CARBON 10K 5% 1/4W				

*	A-4398-130-A	OSD BOARD, COMPLETE (US,CND,E,PX)	*****			

*	A-4398-151-A	OSD BOARD, COMPLETE (SP,MY,AUS)	*****			

< CAPACITOR >						
C203	1-102-518-11	CERAMIC 33PF 5% 50V				
C206	1-102-852-91	CERAMIC 47PF 5% 50V				
C208	1-126-964-11	ELECT 10uF 20% 50V				
C211	1-162-290-31	CERAMIC 470PF 10% 50V				
C212	1-126-933-11	ELECT 100uF 20% 10V				
C213	1-164-159-11	CERAMIC 0.1uF 50V				
C224	1-162-294-31	CERAMIC 0.001uF 10% 50V				
C231	1-102-106-00	CERAMIC 100PF 10% 50V				
C235	1-164-095-11	CERAMIC 0.01uF 10% 16V				
C236	1-102-958-00	CERAMIC 20PF 5% 50V				
C237	1-102-074-00	CERAMIC 0.001uF 10% 50V				
C241	1-102-958-00	CERAMIC 20PF 5% 50V				
C242	1-164-095-11	CERAMIC 0.01uF 10% 16V				
C243	1-126-963-11	ELECT 4.7uF 20% 50V				
C244	1-102-508-91	CERAMIC 10PF 0.5PF 50V				
C247	1-162-282-31	CERAMIC 100PF 10% 50V				
C248	1-126-960-11	ELECT 1uF 20% 50V				
C249	1-136-162-00	FILM 0.056uF 5% 50V				
C250	1-136-157-00	FILM 0.022uF 5% 50V				
C251	1-164-159-11	CERAMIC 0.1uF 50V				
C252	1-126-967-11	ELECT 47uF 20% 16V				
C253	1-126-960-11	ELECT 1uF 20% 50V				
C254	1-102-106-00	CERAMIC 100PF 10% 50V				
C255	1-136-169-00	FILM 0.22uF 5% 50V				
C256	1-126-960-11	ELECT 1uF 20% 50V				
C257	1-126-960-11	ELECT 1uF 20% 50V				
C258	1-126-960-11	ELECT 1uF 20% 50V				
C259	1-162-306-11	CERAMIC 0.01uF 20% 16V				
C260	1-162-293-31	CERAMIC 820PF 10% 50V				
C262	1-126-960-11	ELECT 1uF 20% 50V				
C263	1-102-106-00	CERAMIC 100PF 10% 50V				
C264	1-126-964-11	ELECT 10uF 20% 50V				
C265	1-126-964-11	ELECT 10uF 20% 50V				
C266	1-126-964-11	ELECT 10uF 20% 50V				
C267	1-126-960-11	ELECT 1uF 20% 50V				

Ref. No.	Part No.	Description	Remark			
C268	1-126-967-11	ELECT	47uF	20%	16V	
C273	1-164-159-11	CERAMIC	0.1uF		50V	
C279	1-126-964-11	ELECT	10uF	20%	50V	
C287	1-126-967-11	ELECT	47uF	20%	16V	
C292	1-162-282-31	CERAMIC	100PF	10%	50V	
C293	1-126-964-11	ELECT	10uF	20%	50V	
C296	1-126-923-11	ELECT	220uF	20%	10V	
< CONNECTOR >						
CNP202	1-691-765-11	PLUG (MICRO CONNECTOR) 3P				
* CNP214	1-564-509-11	PLUG, CONNECTOR 6P				
CNS212	1-695-094-11	SOCKET, CONNECTOR 11P				
CNS216	1-750-179-11	SOCKET, CONNECTOR 5P				
< TRIMMER >						
CT201	1-141-227-00	CAP, TRIMMER 20PF				
CT202	1-141-227-00	CAP, TRIMMER 20PF				
< DIODE >						
D201	8-719-987-63	DIODE 1N4148M				
D206	8-719-987-63	DIODE 1N4148M				
< IC >						
IC202	8-759-140-53	IC uPD4053BC				
IC205	8-759-459-81	IC MB90095PF-G-186-BND				
IC206	8-759-916-12	IC SN74HC00AN				
IC210	8-759-341-79	IC LA7217				
IC211	8-759-061-95	IC SN761200				
IC214	8-759-093-25	IC MB3512PFQ				
< JACK >						
J203	1-563-330-11	JACK (IR OUT)				
J209	1-766-400-11	JACK, PIN 2P (VIDEO 2 VIDEO IN/OUT)				
J210	1-766-399-11	JACK, PIN 3P (VIDEO 1 VIDEO IN/OUT, MONITOR OUT)				
J211	1-766-400-11	JACK, PIN 2P (TV/DBS VIDEO IN, LD/DVD VIDEO IN)				
< COIL >						
L201	1-410-513-11	INDUCTOR 22uH				
< TRANSISTOR >						
Q203	8-729-620-05	TRANSISTOR 2SC2603-EF				
Q214	8-729-620-05	TRANSISTOR 2SC2603-EF				
Q215	8-729-620-05	TRANSISTOR 2SC2603-EF				
Q216	8-729-620-05	TRANSISTOR 2SC2603-EF				
Q217	8-729-119-76	TRANSISTOR 2SA1175-HFE				
Q218	8-729-119-76	TRANSISTOR 2SA1175-HFE				
Q219	8-729-119-76	TRANSISTOR 2SA1175-HFE				
Q221	8-729-119-76	TRANSISTOR 2SA1175-HFE				
Q230	8-729-620-05	TRANSISTOR 2SC2603-EF				
< RESISTOR >						
R207	1-249-409-11	CARBON	220	5%	1/4W F	
R210	1-249-424-11	CARBON	3.9K	5%	1/4W F	
R212	1-249-418-11	CARBON	1.2K	5%	1/4W F	
R213	1-249-421-11	CARBON	2.2K	5%	1/4W F	
R216	1-249-437-11	CARBON	47K	5%	1/4W	

Ref. No.	Part No.	Description	Remark	Ref. No.	Part No.	Description	Remark
R226	1-249-433-11	CARBON	22K 5% 1/4W	*	A-4398-115-A	REAR AMP BOARD, COMPLETE (EXCEPT SP,MY)	
R232	1-249-409-11	CARBON	220 5% 1/4W F			*****	
R237	1-249-429-11	CARBON	10K 5% 1/4W				
R242	1-249-433-11	CARBON	22K 5% 1/4W	*	A-4398-142-A	REAR AMP BOARD, COMPLETE (SP,MY)	
R246	1-247-843-11	CARBON	3.3K 5% 1/4W			*****	
R250	1-249-417-11	CARBON	1K 5% 1/4W F			< CAPACITOR >	
R252	1-249-414-11	CARBON	560 5% 1/4W F	C700	1-162-294-31	CERAMIC	0.001uF 10% 50V
R253	1-249-417-11	CARBON	1K 5% 1/4W F	C701	1-126-964-11	ELECT	10uF 20% 50V
R258	1-249-414-11	CARBON	560 5% 1/4W F	C702	1-162-282-31	CERAMIC	100PF 10% 50V
R259	1-249-417-11	CARBON	1K 5% 1/4W F	C703	1-102-233-00	CERAMIC	33PF 10% 500V
R260	1-249-425-11	CARBON	4.7K 5% 1/4W F	C704	1-162-282-31	CERAMIC	100PF 10% 50V
R261	1-249-433-11	CARBON	22K 5% 1/4W	C705	1-126-933-11	ELECT	100uF 20% 10V
R262	1-247-883-00	CARBON	150K 5% 1/4W	C720	1-126-967-11	ELECT	47uF 20% 16V
R263	1-249-414-11	CARBON	560 5% 1/4W F	C721	1-107-597-11	CERAMIC	22PF 10% 500V
R265	1-249-414-11	CARBON	560 5% 1/4W F	C722	1-107-597-11	CERAMIC	22PF 10% 500V
R266	1-249-403-11	CARBON	68 5% 1/4W F	C723	1-162-286-31	CERAMIC	220PF 10% 50V
R267	1-249-424-11	CARBON	3.9K 5% 1/4W F	C751	1-126-964-11	ELECT	10uF 20% 50V
R268	1-249-403-11	CARBON	68 5% 1/4W F	C752	1-162-282-31	CERAMIC	100PF 10% 50V
R269	1-249-403-11	CARBON	68 5% 1/4W F	C753	1-102-233-00	CERAMIC	33PF 10% 500V
R270	1-249-426-11	CARBON	5.6K 5% 1/4W	C754	1-162-282-31	CERAMIC	100PF 10% 50V
R271	1-249-426-11	CARBON	5.6K 5% 1/4W	C755	1-126-933-11	ELECT	100uF 20% 10V
R272	1-249-426-11	CARBON	5.6K 5% 1/4W	C770	1-126-967-11	ELECT	47uF 20% 16V
R274	1-249-403-11	CARBON	68 5% 1/4W F	C771	1-107-597-11	CERAMIC	22PF 10% 500V
R275	1-249-403-11	CARBON	68 5% 1/4W F	C772	1-107-597-11	CERAMIC	22PF 10% 500V
R276	1-249-419-11	CARBON	1.5K 5% 1/4W F	C773	1-162-286-31	CERAMIC	220PF 10% 50V
R277	1-249-419-11	CARBON	1.5K 5% 1/4W F	C793	1-126-923-11	ELECT	220uF 20% 10V
R278	1-249-419-11	CARBON	1.5K 5% 1/4W F	C798	1-128-560-11	ELECT	22uF 20% 100V
R279	1-249-403-11	CARBON	68 5% 1/4W F	C799	1-128-560-11	ELECT	22uF 20% 100V
R280	1-249-403-11	CARBON	68 5% 1/4W F			< CONNECTOR >	
R281	1-249-403-11	CARBON	68 5% 1/4W F				
R282	1-249-403-11	CARBON	68 5% 1/4W F	CNP704	1-564-320-00	PIN, CONNECTOR (B2P-VH) 2P	
R283	1-249-403-11	CARBON	68 5% 1/4W F	*	CNP705	1-564-242-00	PIN, CONNECTOR 5P
R287	1-247-807-31	CARBON	100 5% 1/4W	CNP706	1-564-320-00	PIN, CONNECTOR (B2P-VH) 2P	
R288	1-249-430-11	CARBON	12K 5% 1/4W	CNS704	1-564-510-11	PLUG, CONNECTOR 7P	
R289	1-249-430-11	CARBON	12K 5% 1/4W			< DIODE >	
R290	1-249-430-11	CARBON	12K 5% 1/4W	D701	8-719-987-63	DIODE 1N4148M	
R296	1-247-843-11	CARBON	3.3K 5% 1/4W	D702	8-719-010-06	DIODE UZ-2.2BS	
R2000	1-249-437-11	CARBON	47K 5% 1/4W	D703	8-719-010-06	DIODE UZ-2.2BS	
R2002	1-249-417-11	CARBON	1K 5% 1/4W F	D704	8-719-987-63	DIODE 1N4148M	
R2007	1-249-409-11	CARBON	220 5% 1/4W F	D751	8-719-987-63	DIODE 1N4148M	
R2009	1-249-409-11	CARBON	220 5% 1/4W F	D752	8-719-010-06	DIODE UZ-2.2BS	
R2010	1-249-409-11	CARBON	220 5% 1/4W F	D753	8-719-010-06	DIODE UZ-2.2BS	
R2011	1-249-409-11	CARBON	220 5% 1/4W F	D754	8-719-987-63	DIODE 1N4148M	
R2023	1-249-417-11	CARBON	1K 5% 1/4W F			< IC >	
		< VARIABLE RESISTOR >		IC701	8-759-326-52	IC uPC2581V	
RV201	1-241-766-11	RES, ADJ, CERMET 47K				< TRANSISTOR >	
		< TEST PIN >		Q703	8-729-140-84	TRANSISTOR 2SC1841-PAFAEA	
* TP203	1-560-061-00	PIN, CONNECTOR 3P		Q704	8-729-119-76	TRANSISTOR 2SA1175-HFE	
		< VIBRATOR >		Q706	8-749-010-25	IC MN2488-OPY-M	
X203	1-527-722-00	VIBRATOR, CRYSTAL(14.3MHz)(US,CND,E,PX)		Q707	8-749-010-26	IC MP1620-OPY-M	
X203	1-579-057-11	VIBRATOR, CRYSTAL (17MHz)(SP,MY,AUS)		Q708	8-729-140-82	TRANSISTOR 2SA988-PAFAEA	
X204	1-579-583-11	VIBRATOR, CERAMIC (503kHz)		Q754	8-729-119-76	TRANSISTOR 2SA1175-HFE	
*****				Q755	8-729-141-30	TRANSISTOR 2SC3623A-LK	
				Q756	8-749-010-25	IC MN2488-OPY-M	

REAR AMP

S-A-P

S.VIDEO

Ref. No.	Part No.	Description				Remark
Q757	8-749-010-26	IC MP1620-OPY-M				
Q758	8-729-140-82	TRANSISTOR 2SA988-PAFAEA				
< RESISTOR >						
R701	1-249-417-11	CARBON	1K	5%	1/4W	F
R702	1-249-439-11	CARBON	68K	5%	1/4W	
R703	1-249-439-11	CARBON	68K	5%	1/4W	
R704	1-247-820-11	CARBON	360	5%	1/4W	
					(SP,MY)	
R704	1-249-411-11	CARBON	330	5%	1/4W	
					(EXCEPT SP,MY)	
R721	1-249-437-11	CARBON	47K	5%	1/4W	
R722	1-249-421-11	CARBON	2.2K	5%	1/4W	F
R723	1-249-414-11	CARBON	560	5%	1/4W	F
△ R724	1-249-408-11	CARBON	180	5%	1/4W	F
△ R725	1-249-408-11	CARBON	180	5%	1/4W	F
△ R726	1-233-352-41	ENCAPSULATED COMPONENT				
R727	1-247-850-11	CARBON	6.2K	5%	1/4W	
R728	1-249-419-11	CARBON	1.5K	5%	1/4W	F
R732	1-249-437-11	CARBON	47K	5%	1/4W	
R751	1-249-417-11	CARBON	1K	5%	1/4W	F
R752	1-249-439-11	CARBON	68K	5%	1/4W	
R753	1-249-439-11	CARBON	68K	5%	1/4W	
R754	1-247-820-11	CARBON	360	5%	1/4W	
					(SP,MY)	
R754	1-249-411-11	CARBON	330	5%	1/4W	
					(EXCEPT SP,MY)	
R771	1-249-437-11	CARBON	47K	5%	1/4W	
R772	1-249-421-11	CARBON	2.2K	5%	1/4W	F
R773	1-249-414-11	CARBON	560	5%	1/4W	F
△ R774	1-249-408-11	CARBON	180	5%	1/4W	F
△ R775	1-249-408-11	CARBON	180	5%	1/4W	F
△ R776	1-233-352-41	ENCAPSULATED COMPONENT				
R777	1-247-850-11	CARBON	6.2K	5%	1/4W	
R778	1-249-419-11	CARBON	1.5K	5%	1/4W	F
R782	1-249-437-11	CARBON	47K	5%	1/4W	
R790	1-249-417-11	CARBON	1K	5%	1/4W	F
R793	1-249-435-11	CARBON	33K	5%	1/4W	
R794	1-249-425-11	CARBON	4.7K	5%	1/4W	F
△ R798	1-249-393-11	CARBON	10	5%	1/4W	F
△ R799	1-249-393-11	CARBON	10	5%	1/4W	F

*	1-665-503-11	S-A-P BOARD	*****			
< CONNECTOR >						
CNP703	1-695-089-11	PIN, CONNECTOR (PC BOARD) 11P				
CNS702	1-695-096-11	SOCKET, CONNECTOR 15P				
CNS905	1-695-092-11	SOCKET, CONNECTOR 7P				

Ref. No.	Part No.	Description	Remark			
*	A-4398-131-A	S.VIDEO BOARD, COMPLETE (DE815G:US,CND)	*****			
*	A-4398-139-A	S.VIDEO BOARD, COMPLETE	*****			
		(EXCEPT DE815G:US,CND)				
< CAPACITOR >						
C204	1-164-159-11	CERAMIC	0.1uF		50V	
C221	1-126-964-11	ELECT	10uF	20%	50V	
C222	1-162-294-31	CERAMIC	0.001uF	10%	50V	
C232	1-162-306-11	CERAMIC	0.01uF	20%	16V	
C238	1-126-967-11	ELECT	47uF	20%	16V	
C239	1-164-159-11	CERAMIC	0.1uF		50V	
C246	1-164-159-11	CERAMIC	0.1uF		50V	
C261	1-102-074-00	CERAMIC	0.001uF	10%	50V	
					(DE815G:US,CND)	
C269	1-164-159-11	CERAMIC	0.1uF		50V	
C270	1-124-252-00	ELECT	0.33uF	20%	50V	
C274	1-126-967-11	ELECT	47uF	20%	16V	
C275	1-126-967-11	ELECT	47uF	20%	16V	
C276	1-104-905-11	CAPACITOR	0.22F		5.5V	
C277	1-162-306-11	CERAMIC	0.01uF	20%	16V	
C280	1-164-159-11	CERAMIC	0.1uF		50V	
C295	1-164-159-11	CERAMIC	0.1uF		50V	
C297	1-126-923-11	ELECT	220uF	20%	10V	
C2001	1-126-967-11	ELECT	47uF	20%	16V	
C2238	1-102-074-00	CERAMIC	0.001uF	10%	50V	
					(DE815G:US,CND)	
< CONNECTOR >						
CNJ203	1-568-440-11	SOCKET, CONNECTOR 17P				
CNJ204	1-779-768-11	SOCKET, CONNECTOR 29P				
* CNJ214	1-564-509-11	PLUG, CONNECTOR 6P				
CNS211	1-695-094-11	SOCKET, CONNECTOR 11P				
CNS213	1-750-179-11	SOCKET, CONNECTOR 5P				
< DIODE >						
D202	8-719-987-63	DIODE 1N4148M				
D203	8-719-987-63	DIODE 1N4148M				
D204	8-719-987-63	DIODE 1N4148M				
D205	8-719-024-99	DIODE 11ES2-NTA2B				
D210	8-719-987-63	DIODE 1N4148M				
< IC >						
IC201	8-759-135-80	IC uPC358C (DE815G:US,CND)				
IC207	8-759-708-05	IC NJM78L05A				
IC209	8-759-426-13	IC MB90672PF-G-125-BND				
IC215	8-759-457-57	IC LC86F5864A-5E72				
IC217	8-759-604-35	IC M5F78M05L				
IC219	8-759-917-18	IC SN74HCU04AN				
IC223	8-759-388-26	IC NJM2129D (DE815G:US,CND)				
< JACK >						
J202	1-563-330-11	JACK (S-LINK CTRL A1)				
J212	1-563-330-11	JACK (VIDEO 1 CTRL SOUT)(DE815G:US,CND)				
J213	1-563-330-11	JACK (VIDEO 2 CTRL SOUT)(DE815G:US,CND)				
J214	1-563-330-11	JACK (MONITOR CTRL SOUT)(DE815G:US,CND)				

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Ref. No.	Part No.	Description	Remark	Ref. No.	Part No.	Description	Remark
		< COIL >					
L288	1-410-521-11	INDUCTOR 100uH		R2008	1-249-429-11	CARBON 10K 5%	1/4W
L289	1-410-521-11	INDUCTOR 100uH		R2015	1-247-807-31	CARBON 100 5%	1/4W
		< TRANSISTOR >					
Q201	8-729-900-36	TRANSISTOR DTC124ES		R2016	1-249-429-11	CARBON 10K 5%	1/4W
Q204	8-729-141-30	TRANSISTOR 2SC3623A-LK		R2017	1-249-429-11	CARBON 10K 5%	1/4W
Q205	8-729-119-76	TRANSISTOR 2SA1175-HFE (DE815G:US,CND)		R2018	1-249-429-11	CARBON 10K 5%	1/4W
Q209	8-729-620-05	TRANSISTOR 2SC2603-EF (DE815G:US,CND)		R2019	1-249-429-11	CARBON 10K 5%	1/4W
Q212	8-729-620-05	TRANSISTOR 2SC2603-EF (DE815G:US,CND)		R2020	1-247-807-31	CARBON 100 5%	1/4W
Q220	8-729-620-05	TRANSISTOR 2SC2603-EF		R2031	1-247-807-31	CARBON 100 5%	1/4W
Q222	8-729-119-76	TRANSISTOR 2SA1175-HFE (DE815G:US,CND)		R2032	1-247-807-31	CARBON 100 5%	1/4W
Q223	8-729-620-05	TRANSISTOR 2SC2603-EF (DE815G:US,CND)		R2033	1-247-807-31	CARBON 100 5%	1/4W
Q225	8-729-119-76	TRANSISTOR 2SA1175-HFE (DE815G:US,CND)		R2034	1-247-807-31	CARBON 100 5%	1/4W
Q226	8-729-119-76	TRANSISTOR 2SA1175-HFE (DE815G:US,CND)		R2035	1-247-807-31	CARBON 100 5%	1/4W
		< RESISTOR >					
R1	1-249-413-11	CARBON 470 5% 1/4W F	(DE815G:US,CND)	R2041	1-247-807-31	CARBON 100 5%	1/4W
R2	1-249-413-11	CARBON 470 5% 1/4W F	(DE815G:US,CND)	R2042	1-247-807-31	CARBON 100 5%	1/4W
R6	1-247-843-11	CARBON 3.3K 5% 1/4W	(DE815G:US,CND)	R2043	1-247-807-31	CARBON 100 5%	1/4W
R7	1-249-429-11	CARBON 10K 5% 1/4W	(DE815G:US,CND)	R2044	1-247-807-31	CARBON 100 5%	1/4W
R208	1-249-419-11	CARBON 1.5K 5% 1/4W F		R2045	1-247-807-31	CARBON 100 5%	1/4W
R209	1-249-429-11	CARBON 10K 5% 1/4W		R2046	1-247-807-31	CARBON 100 5%	1/4W
R221	1-249-414-11	CARBON 560 5% 1/4W F	(DE815G:US,CND)	R2047	1-247-807-31	CARBON 100 5%	1/4W
R222	1-249-414-11	CARBON 560 5% 1/4W F	(DE815G:US,CND)	R2048	1-247-807-31	CARBON 100 5%	1/4W
R224	1-249-433-11	CARBON 22K 5% 1/4W	(DE815G:US,CND)	R2049	1-247-807-31	CARBON 100 5%	1/4W
R225	1-249-427-11	CARBON 6.8K 5% 1/4W F	(DE815G:US,CND)	R2050	1-247-807-31	CARBON 100 5%	1/4W
R229	1-249-417-11	CARBON 1K 5% 1/4W F	(DE815G:US,CND)	R2051	1-247-807-31	CARBON 100 5%	1/4W
R231	1-249-417-11	CARBON 1K 5% 1/4W F		R2052	1-247-807-31	CARBON 100 5%	1/4W
R235	1-249-429-11	CARBON 10K 5% 1/4W		R2053	1-247-807-31	CARBON 100 5%	1/4W
R241	1-249-417-11	CARBON 1K 5% 1/4W F	(DE815G:US,CND)			< TEST PIN >	
R245	1-249-417-11	CARBON 1K 5% 1/4W F	(DE815G:US,CND)	* TP204	1-560-062-00	PIN, CONNECTOR 4P	
R249	1-249-413-11	CARBON 470 5% 1/4W F		TP205	1-691-766-11	PLUG (MICRO CONNECTOR) 4P	
R256	1-249-417-11	CARBON 1K 5% 1/4W F	(DE815G:US,CND)			< VIBRATOR >	
R284	1-247-843-11	CARBON 3.3K 5% 1/4W		X201	1-567-819-11	VIBRATOR, CERAMIC (4MHz)	
R286	1-247-903-00	CARBON 1M 5% 1/4W		X205	1-567-776-41	VIBRATOR, CERAMIC (6MHz)	
R291	1-249-429-11	CARBON 10K 5% 1/4W				*****	
R292	1-249-393-11	CARBON 10 5% 1/4W F					
R293	1-249-429-11	CARBON 10K 5% 1/4W					
R294	1-249-425-11	CARBON 4.7K 5% 1/4W F					
R295	1-249-425-11	CARBON 4.7K 5% 1/4W F					
R297	1-247-843-11	CARBON 3.3K 5% 1/4W	(DE815G:US,CND)				
R298	1-249-429-11	CARBON 10K 5% 1/4W	(DE815G:US,CND)				
R299	1-249-417-11	CARBON 1K 5% 1/4W F	(DE815G:US,CND)				
△ R2001	1-215-857-11	METAL OXIDE 10 5% 1W F					

* 1-665-497-11 SECONDARY BOARD

< CAPACITOR >

C801	1-126-967-11	ELECT 47uF 20% 16V	
C805	1-130-781-00	FILM 0.22uF 10% 100V	(SP,MY,AUS)
C805	1-137-420-11	FILM 0.047uF 10% 100V	(US,CND,E,PX)
C806	1-130-781-00	FILM 0.22uF 10% 100V	(SP,MY,AUS)
C806	1-137-420-11	FILM 0.047uF 10% 100V	(US,CND,E,PX)

< CONNECTOR >

* CNP801 1-564-905-11 PIN, CONNECTOR 9P

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SECONDARY

SP

Ref. No.	Part No.	Description	Remark
< DIODE >			
D801	8-719-302-38	DIODE RBV-602-01	
D802	8-719-024-99	DIODE 11ES2-NTA2B	
D803	8-719-024-99	DIODE 11ES2-NTA2B	
D804	8-719-024-99	DIODE 11ES2-NTA2B	
D805	8-719-024-99	DIODE 11ES2-NTA2B	
D806	8-719-014-66	DIODE UZP-5.6B	
< FUSE >			
△ F950	1-532-506-51	FUSE, TIME-LAG (T6.3AL/250V)	(EXCEPT US,CND)
△ F950	1-533-311-11	FUSE (8A/125V) (US,CND)	
△ F951	1-532-506-51	FUSE, TIME-LAG (T6.3AL/250V)	(EXCEPT US,CND)
△ F951	1-533-311-11	FUSE (8A/125V) (US,CND)	
△ PS801	1-533-909-31	FUSE, MICRO (4A/125V)(US,CND)	
△ PS802	1-533-909-31	FUSE, MICRO (4A/125V)(US,CND)	

*	A-4398-129-A	SP BOARD, COMPLETE (EXCEPT D760Z,SP,MY)	*****
*	A-4398-146-A	SP BOARD, COMPLETE (SP,MY)	*****
*	A-4398-154-A	SP BOARD, COMPLETE (D760Z)	*****
< CAPACITOR >			
C624	1-126-964-11	ELECT 10uF 20% 50V	
C625	1-136-157-00	FILM 0.022uF 5% 50V	
C626	1-136-153-00	FILM 0.01uF 5% 50V	
C724	1-126-964-11	ELECT 10uF 20% 50V	
C725	1-136-157-00	FILM 0.022uF 5% 50V	
C726	1-136-153-00	FILM 0.01uF 5% 50V	
C775	1-136-157-00	FILM 0.022uF 5% 50V	
C794	1-126-964-11	ELECT 10uF 20% 50V	(DE815G)
C795	1-126-941-11	ELECT 470uF 20% 25V	(DE815G)
< CONNECTOR >			
CNP603	1-564-320-00	PIN, CONNECTOR 2P	
CNS703	1-695-094-11	SOCKET, CONNECTOR 11P	
CNJ701	1-774-136-11	CONNECTOR, ROUND TYPE 6P	(WIRELESS REAR SPEAKER)(DE815G)
< DIODE >			
D500	8-719-987-63	DIODE 1N4148M	
D543	8-719-987-63	DIODE 1N4148M	
D605	8-719-987-63	DIODE 1N4148M	
D606	8-719-987-63	DIODE 1N4148M	
D607	8-719-987-63	DIODE 1N4148M	
D649	8-719-987-63	DIODE 1N4148M	
D705	8-719-987-63	DIODE 1N4148M	
D706	8-719-987-63	DIODE 1N4148M	
D749	8-719-987-63	DIODE 1N4148M	

Ref. No.	Part No.	Description	Remark
< IC >			
IC702	8-759-605-01	IC M5F78M18L (DE815G)	
< JACK >			
J501	1-770-377-31	JACK, PIN 1P (WOOFER)	
< COIL >			
L601	1-420-872-00	COIL, AIR-CORE (EXCEPT SP,MY)	
L601	1-411-906-11	COIL, AIR-CORE (SP,MY)	
L701	1-420-872-00	COIL, AIR-CORE (EXCEPT SP,MY)	
L701	1-411-906-11	COIL, AIR-CORE (SP,MY)	
L751	1-420-872-00	COIL, AIR-CORE (EXCEPT SP,MY)	
L751	1-411-906-11	COIL, AIR-CORE (SP,MY)	
< TRANSISTOR >			
Q544	8-729-119-79	TRANSISTOR 2SC2785-FEK	
Q609	8-729-281-53	TRANSISTOR 2SC1815-GR	
Q610	8-729-900-63	TRANSISTOR DTA124ES	
Q611	8-729-900-63	TRANSISTOR DTA124ES	
Q645	8-729-119-79	TRANSISTOR 2SC2785-FEK	
Q709	8-729-281-53	TRANSISTOR 2SC1815-GR	
Q710	8-729-900-63	TRANSISTOR DTA124ES	
Q745	8-729-119-79	TRANSISTOR 2SC2785-FEK	
Q747	8-729-119-79	TRANSISTOR 2SC2785-FEK (DE815G)	
Q748	8-729-030-19	TRANSISTOR 2SB1640 (DE815G)	
< RESISTOR >			
R543	1-249-429-11	CARBON 10K 5% 1/4W	
R544	1-249-425-11	CARBON 4.7K 5% 1/4W	F
△ R545	1-249-393-11	CARBON 10 5% 1/4W	F
R546	1-249-421-11	CARBON 2.2K 5% 1/4W	F
R629	1-249-437-11	CARBON 47K 5% 1/4W	
R630	1-249-421-11	CARBON 2.2K 5% 1/4W	F
R631	1-249-433-11	CARBON 22K 5% 1/4W	
R633	1-249-393-11	CARBON 10 5% 1/4W	F
△ R634	1-249-389-11	CARBON 4.7 5% 1/4W	F
R635	1-249-431-11	CARBON 15K 5% 1/4W	
R636	1-249-433-11	CARBON 22K 5% 1/4W	
R646	1-249-434-11	CARBON 27K 5% 1/4W	F
R647	1-249-429-11	CARBON 10K 5% 1/4W	
R648	1-249-425-11	CARBON 4.7K 5% 1/4W	F
R649	1-249-393-11	CARBON 10 5% 1/4W	F
R729	1-249-437-11	CARBON 47K 5% 1/4W	
R730	1-249-421-11	CARBON 2.2K 5% 1/4W	F
R731	1-249-433-11	CARBON 22K 5% 1/4W	
R733	1-249-393-11	CARBON 10 5% 1/4W	F
△ R734	1-249-389-11	CARBON 4.7 5% 1/4W	F
R735	1-249-431-11	CARBON 15K 5% 1/4W	
R737	1-249-429-11	CARBON 10K 5% 1/4W	
R738	1-247-886-11	CARBON 200K 5% 1/4W	(DE815G)
R743	1-249-425-11	CARBON 4.7K 5% 1/4W	F
			(DE815G)

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SP

SP SW

STAND BY

Ref. No.	Part No.	Description	Remark	Ref. No.	Part No.	Description	Remark
R744	1-249-425-11	CARBON	4.7K 5% 1/4W F (DE815G)	*	A-4398-127-A	STAND BY BOARD, COMPLETE (US,CND) *****	
R745	1-249-421-11	CARBON	2.2K 5% 1/4W F (DE815G)	*	A-4398-138-A	STAND BY BOARD, COMPLETE (E,PX) *****	
R746	1-249-421-11	CARBON	2.2K 5% 1/4W F (DE815G)	*	A-4398-145-A	STAND BY BOARD, COMPLETE (SP,MY) *****	
R747	1-249-429-11	CARBON	10K 5% 1/4W				
R748	1-249-425-11	CARBON	4.7K 5% 1/4W F				
△R749	1-249-393-11	CARBON	10 5% 1/4W F	*	A-4398-150-A	STAND BY BOARD, COMPLETE (AUS) *****	
R783	1-249-393-11	CARBON	10 5% 1/4W F (DE815G)		7-685-872-09	SCREW +BVTT 3X8 (S)	
△R784	1-249-389-11	CARBON	4.7 5% 1/4W F			< CAPACITOR >	
R787	1-249-429-11	CARBON	10K 5% 1/4W (DE815G)				
R788	1-247-886-11	CARBON	200K 5% 1/4W (DE815G)	C901	1-161-494-00	CERAMIC	0.022uF 25V
		< RELAY >		C902	1-161-494-00	CERAMIC	0.022uF 25V
RY503	1-515-793-11	RELAY		C903	1-126-768-11	ELECT	2200uF 20% 16V
RY601	1-515-920-11	RELAY (24V)		C904	1-126-960-11	ELECT	1uF 20% 50V
RY701	1-515-920-11	RELAY (24V)		C905	1-126-959-11	ELECT	0.47uF 20% 50V
		< SWITCH >		C906	1-124-464-11	ELECT	0.22uF 20% 50V
S501	1-692-196-11	SWITCH, SLIDE (IMPEDANCE SELECTOR) (EXCEPT SP,MY)		C913	1-164-159-11	CERAMIC	0.1uF 50V
		< TERMINAL >		C914	1-164-159-11	CERAMIC	0.1uF 50V
* TM701	1-537-882-11	TERMINAL BOARD 6P (SURROUND SPEAKERS)		C917	1-164-159-11	CERAMIC	0.1uF 50V
*****						< CONNECTOR >	
*	1-665-626-11	SP SW BOARD *****		△CNJ901	1-540-060-11	OUTLET, AC (POLAR)(AC OUTLET) (US,CND,E,PX)	
		< CONNECTOR >		CNP903	1-564-321-00	PIN, CONNECTOR 2P	
* CNS101	1-695-808-11	CONNECTOR, PC BOARD 8P		* CNP904	1-580-230-21	PIN, CONNECTOR (PC BOARD) 2P (SP,MY,AUS)	
		< DIODE >		CNP905	1-695-087-11	PIN, CONNECTOR (PC BOARD) 7P	
D152	8-719-987-63	DIODE 1N4148M		* CNP906	1-564-687-11	PIN, CONNECTOR 3P (E,PX)	
D153	8-719-987-63	DIODE 1N4148M		CNP908	1-564-320-00	PIN, CONNECTOR (B2P-VH) 2P (E,PX)	
		< SWITCH >				< DIODE >	
S136	1-762-751-11	SWITCH, TACTILE (DPC MODE)		D901	8-719-024-99	DIODE 11ES2-NTA2B	
S152	1-554-118-00	SWITCH, PUSH (1 KEY)(POWER)(SP,MY)		D902	8-719-024-99	DIODE 11ES2-NTA2B	
S155	1-762-268-11	SWITCH, ROTARY (SPEAKERS)		D903	8-719-024-99	DIODE 11ES2-NTA2B	
*****				D904	8-719-024-99	DIODE 11ES2-NTA2B	
				D905	8-719-987-63	DIODE 1N4148M	
				D906	8-719-987-63	DIODE 1N4148M	
				D907	8-719-987-63	DIODE 1N4148M	
						< GROUND TERMINAL >	
				* EB900	1-537-738-21	TERMINAL, EARTH	
						< FUSE >	
				△F901	1-532-504-51	FUSE TIME-LAG (T4.6AL/250V)(EXCEPT US,CND)	
				△F901	1-533-311-11	FUSE (8A/125V)(US,CND)	
				△F902	1-532-464-51	FUSE TIME-LAG (T2.5AL/250V)(SP,MY,AUS)	
				△F903	1-532-504-51	FUSE TIME-LAG (T4.0AL/250V)(E,PX)	
						< FUSE HOLDER >	
				FH901	1-533-217-31	HOLDER, FUSE	
				FH902	1-533-217-31	HOLDER, FUSE (SP,MY,AUS)	
				FH903	1-533-217-31	HOLDER, FUSE (E,PX)	
				FH951	1-533-217-31	HOLDER, FUSE	
				FH952	1-533-217-31	HOLDER, FUSE (SP,MY,AUS)	
				FH953	1-533-217-31	HOLDER, FUSE (E,PX)	

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STAND BY

SURR

Ref. No.	Part No.	Description	Remark			
< IC >						
IC901	8-759-333-83	IC NJM2103D				
< TRANSISTOR >						
Q901	8-729-119-79	TRANSISTOR 2SC2785-FEK				
Q902	8-729-209-15	TRANSISTOR 2SD2012				
< RESISTOR >						
△ R901	1-202-725-00	SOLID	3.3M	10%	1/2W	(US,CND)
R902	1-249-429-11	CARBON	10K	5%	1/4W	
R903	1-249-425-11	CARBON	4.7K	5%	1/4W	F
R904	1-249-417-11	CARBON	1K	5%	1/4W	F
R905	1-249-428-11	CARBON	8.2K	5%	1/4W	F
R906	1-249-421-11	CARBON	2.2K	5%	1/4W	F
R908	1-249-433-11	CARBON	22K	5%	1/4W	
R909	1-249-439-11	CARBON	68K	5%	1/4W	
R910	1-249-437-11	CARBON	47K	5%	1/4W	
R912	1-249-430-11	CARBON	12K	5%	1/4W	
< RELAY >						
△ RY901	1-515-999-11	RELAY, POWER				
< TRANSFORMER >						
△ T902	1-429-236-11	TRANSFORMER, POWER (EXCEPT US,CND)				
△ T902	1-431-477-11	TRANSFORMER, POWER (US,CND)				

*	A-4398-109-A	SURR BOARD, COMPLETE (US,CND)	*****			
*	A-4398-136-A	SURR BOARD, COMPLETE (E,PX)	*****			
*	A-4398-141-A	SURR BOARD, COMPLETE (SP,MY)	*****			
*	A-4398-147-A	SURR BOARD, COMPLETE (AUS)	*****			
< CAPACITOR >						
C301	1-126-963-11	ELECT	4.7uF	20%	50V	
C302	1-162-282-31	CERAMIC	100PF	10%	50V	
C303	1-126-967-11	ELECT	47uF	20%	16V	
C304	1-130-480-00	MYLAR	0.0056uF	5%	50V	
C305	1-106-347-00	MYLAR	1500PF	5%	200V	
C306	1-126-960-11	ELECT	1uF	20%	50V	
C307	1-164-159-11	CERAMIC	0.1uF		50V	
C351	1-126-963-11	ELECT	4.7uF	20%	50V	
C352	1-162-282-31	CERAMIC	100PF	10%	50V	
C353	1-126-967-11	ELECT	47uF	20%	16V	
C354	1-130-480-00	MYLAR	0.0056uF	5%	50V	
C355	1-106-347-00	MYLAR	1500PF	5%	200V	
C356	1-126-960-11	ELECT	1uF	20%	50V	
C357	1-164-159-11	CERAMIC	0.1uF		50V	
C394	1-126-967-11	ELECT	47uF	20%	16V	
C395	1-126-967-11	ELECT	47uF	20%	16V	
C396	1-162-282-31	CERAMIC	100PF	10%	50V	

Ref. No.	Part No.	Description	Remark			
C397	1-162-294-31	CERAMIC	0.001uF	10%	50V	
C401	1-126-964-11	ELECT	10uF	20%	50V	
C402	1-126-964-11	ELECT	10uF	20%	50V	
C403	1-126-964-11	ELECT	10uF	20%	50V	
C404	1-162-199-31	CERAMIC	10PF	5%	50V	
C405	1-162-199-31	CERAMIC	10PF	5%	50V	
C406	1-126-964-11	ELECT	10uF	20%	50V	
C410	1-164-159-11	CERAMIC	0.1uF		50V	
C413	1-126-964-11	ELECT	10uF	20%	50V	
C420	1-136-165-00	FILM	0.1uF	5%	50V	
C421	1-126-933-11	ELECT	100uF	20%	16V	
C422	1-164-159-11	CERAMIC	0.1uF		50V	
C423	1-126-933-11	ELECT	100uF	20%	16V	
C424	1-164-159-11	CERAMIC	0.1uF		50V	
C425	1-126-965-11	ELECT	22uF	20%	50V	
C426	1-136-177-00	FILM	1uF	5%	50V	
C427	1-136-153-00	FILM	0.01uF	5%	50V	
C428	1-130-474-00	MYLAR	0.0018uF	5%	50V	
C429	1-136-163-00	FILM	0.068uF	5%	50V	
C430	1-136-165-00	FILM	0.1uF	5%	50V	
C431	1-136-165-00	FILM	0.1uF	5%	50V	
C432	1-136-163-00	FILM	0.068uF	5%	50V	
C433	1-136-153-00	FILM	0.01uF	5%	50V	
C434	1-130-474-00	MYLAR	0.0018uF	5%	50V	
C435	1-136-165-00	FILM	0.1uF	5%	50V	
C436	1-136-165-00	FILM	0.1uF	5%	50V	
C437	1-130-467-00	MYLAR	470PF	5%	50V	
C438	1-136-165-00	FILM	0.1uF	5%	50V	
C439	1-130-470-00	MYLAR	820PF	5%	50V	
C440	1-130-480-00	MYLAR	0.0056uF	5%	50V	
C441	1-136-161-00	FILM	0.047uF	5%	50V	
C442	1-136-175-00	FILM	0.68uF	5%	50V	
C443	1-136-169-00	FILM	0.22uF	5%	50V	
C444	1-136-169-00	FILM	0.22uF	5%	50V	
C445	1-126-963-11	ELECT	4.7uF	20%	50V	
C446	1-126-963-11	ELECT	4.7uF	20%	50V	
C447	1-136-169-00	FILM	0.22uF	5%	50V	
C448	1-136-169-00	FILM	0.22uF	5%	50V	
C449	1-136-165-00	FILM	0.1uF	5%	50V	
C450	1-136-161-00	FILM	0.047uF	5%	50V	
C451	1-126-964-11	ELECT	10uF	20%	50V	
C452	1-126-964-11	ELECT	10uF	20%	50V	
C453	1-126-964-11	ELECT	10uF	20%	50V	
C454	1-162-199-31	CERAMIC	10PF	5%	50V	
C455	1-162-199-31	CERAMIC	10PF	5%	50V	
C456	1-126-964-11	ELECT	10uF	20%	50V	
C460	1-164-159-11	CERAMIC	0.1uF		50V	
C463	1-126-964-11	ELECT	10uF	20%	50V	
C469	1-126-963-11	ELECT	4.7uF	20%	50V	
C470	1-136-161-00	FILM	0.047uF	5%	50V	
C471	1-136-165-00	FILM	0.1uF	5%	50V	
C472	1-136-165-00	FILM	0.1uF	5%	50V	
C473	1-136-157-00	FILM	0.022uF	5%	50V	
C474	1-136-157-00	FILM	0.022uF	5%	50V	
C475	1-136-165-00	FILM	0.1uF	5%	50V	
C476	1-130-469-00	MYLAR	680PF	5%	50V	
C477	1-126-967-11	ELECT	47uF	20%	16V	
C478	1-136-165-00	FILM	0.1uF	5%	50V	

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Ref. No.	Part No.	Description	Remark	Ref. No.	Part No.	Description	Remark
C479	1-136-165-00	FILM	0.1uF 5% 50V	CNP403	1-695-088-11	PIN, CONNECTOR (PC BOARD) 9P	
C480	1-130-469-00	MYLAR	680PF 5% 50V	CNP404	1-695-089-11	PIN, CONNECTOR (PC BOARD) 11P	
C481	1-136-165-00	FILM	0.1uF 5% 50V	CNS106	1-569-323-11	SOCKET, CONNECTOR 19P	
C482	1-136-165-00	FILM	0.1uF 5% 50V				
C483	1-126-967-11	ELECT	47uF 20% 16V	CNS401	1-569-323-11	SOCKET, CONNECTOR 19P	
				CNS501	1-770-404-11	HOUSING,CONNECTOR (PC BOARD) 11P	
C484	1-126-933-11	ELECT	100uF 20% 16V	CNS601	1-770-404-11	HOUSING,CONNECTOR (PC BOARD) 11P	
C485	1-164-159-11	CERAMIC	0.1uF 50V			< DIODE >	
C486	1-126-964-11	ELECT	10uF 20% 50V	D401	8-719-987-63	DIODE 1N4148M	
C489	1-164-159-11	CERAMIC	0.1uF 50V	D402	8-719-987-63	DIODE 1N4148M	
C490	1-126-923-11	ELECT	220uF 20% 10V	D403	8-719-024-99	DIODE 11ES2-NTA2B (EXCEPT AUS)	
				D403	8-719-200-82	DIODE 11ES2 (AUS)	
C491	1-126-963-11	ELECT	4.7uF 20% 50V			< GROUND TERMINAL >	
C492	1-106-363-00	MYLAR	6800PF 5% 200V	* EB301	1-537-738-21	TERMINAL, EARTH	
C493	1-136-165-00	FILM	0.1uF 5% 50V	* EB302	1-537-738-21	TERMINAL, EARTH	
C494	1-136-165-00	FILM	0.1uF 5% 50V			< IC >	
C497	1-162-282-31	CERAMIC	100PF 10% 50V	IC301	8-759-805-14	IC LC7822	
				IC302	8-759-636-74	IC M5218AP-22	
C501	1-126-964-11	ELECT	10uF 20% 50V	IC401	8-759-392-97	IC M62460FP	
C502	1-162-282-31	CERAMIC	100PF 10% 50V	IC402	8-759-634-51	IC M5218AP	
C503	1-107-601-11	CERAMIC	33PF 5% 500V	IC403	8-759-634-51	IC M5218AP	
C505	1-126-933-11	ELECT	100uF 20% 16V				
C508	1-136-163-00	FILM	0.068uF 5% 50V	IC404	8-759-634-51	IC M5218AP	
				IC407	8-759-189-27	IC M5278L10-TP	
C509	1-136-154-00	FILM	0.012uF 5% 50V	IC408	8-759-708-05	IC NJM78L05A	
C511	1-106-353-00	MYLAR	0.0027uF 5% 50V	IC501	8-759-326-52	IC uPC2581V	
C512	1-136-157-00	FILM	0.022uF 5% 50V	IC502	8-759-462-99	IC TC9184P	
C513	1-136-171-00	FILM	0.33uF 5% 50V				
C514	1-136-159-00	FILM	0.033uF 5% 50V	IC601	8-749-011-16	IC STK350-230	
						< JACK >	
C527	1-126-964-11	ELECT	10uF 20% 50V	J302	1-774-411-11	JACK, PIN 6P	
C539	1-162-282-31	CERAMIC	100PF 10% 50V			(PHONO IN, CD IN, DAT/MD RECOU)	
C551	1-126-964-11	ELECT	10uF 20% 50V	J303	1-770-015-11	JACK, PIN 6P (DAT/MD IN, TAPE RECOU/IN)	
C552	1-162-282-31	CERAMIC	100PF 10% 50V			< COIL >	
C553	1-107-601-11	CERAMIC	33PF 5% 500V	L401	1-410-509-11	INDUCTOR 10uH	
				L402	1-410-509-11	INDUCTOR 10uH	
C555	1-126-933-11	ELECT	100uF 20% 16V	L403	1-410-509-11	INDUCTOR 10uH	
C558	1-136-163-00	FILM	0.068uF 5% 50V	L404	1-410-509-11	INDUCTOR 10uH	
C559	1-136-154-00	FILM	0.012uF 5% 50V			< TRANSISTOR >	
C561	1-106-353-00	MYLAR	0.0027uF 5% 50V	Q402	8-729-922-37	TRANSISTOR 2SD2144S	
C562	1-136-157-00	FILM	0.022uF 5% 50V	Q410	8-729-119-79	TRANSISTOR 2SC2785-FEK	
				Q411	8-729-900-63	TRANSISTOR DTA124ES	
C563	1-136-171-00	FILM	0.33uF 5% 50V	Q412	8-729-900-63	TRANSISTOR DTA124ES	
C564	1-136-159-00	FILM	0.033uF 5% 50V	Q413	8-729-900-63	TRANSISTOR DTA124ES	
C577	1-126-964-11	ELECT	10uF 20% 50V				
C580	1-162-294-31	CERAMIC	0.001uF 10% 50V	Q414	8-729-900-63	TRANSISTOR DTA124ES	
C581	1-126-964-11	ELECT	10uF 20% 50V	Q415	8-729-900-36	TRANSISTOR DTC124ES	
				Q416	8-729-900-36	TRANSISTOR DTC124ES	
C589	1-162-282-31	CERAMIC	100PF 10% 50V	Q452	8-729-922-37	TRANSISTOR 2SD2144S	
C592	1-126-967-11	ELECT	47uF 20% 16V	Q501	8-729-202-67	TRANSISTOR 2SK246-GR3	
C593	1-126-923-11	ELECT	220uF 20% 10V				
C594	1-128-560-11	ELECT	22uF 20% 100V	Q502	8-729-141-30	TRANSISTOR 2SC3623A-LK	
C595	1-128-560-11	ELECT	22uF 20% 100V	Q503	8-729-140-84	TRANSISTOR 2SC1841-PAFAEA	
				Q551	8-729-202-67	TRANSISTOR 2SK246-GR3	
C596	1-164-159-11	CERAMIC	0.1uF 50V	Q552	8-729-141-30	TRANSISTOR 2SC3623A-LK	
C597	1-162-282-31	CERAMIC	100PF 10% 50V				
C599	1-126-967-11	ELECT	47uF 20% 16V				
C601	1-126-964-11	ELECT	10uF 20% 50V				
C602	1-162-282-31	CERAMIC	100PF 10% 50V				
C603	1-102-989-00	CERAMIC	68PF 5% 500V				
C604	1-164-040-11	CERAMIC	4PF 0.25PF 50V				
C605	1-126-967-11	ELECT	47uF 20% 16V				
C606	1-102-989-00	CERAMIC	68PF 5% 500V				
		< CONNECTOR >					
CNP250	1-691-765-11	PLUG (MICRO CONNECTOR) 3P					
CNP303	1-695-088-11	PIN, CONNECTOR (PC BOARD) 9P					

SURR

Ref. No.	Part No.	Description				Remark	Ref. No.	Part No.	Description				Remark
< RESISTOR >							R441	1-249-441-11	CARBON	100K	5%	1/4W	
							R442	1-247-883-00	CARBON	150K	5%	1/4W	
R301	1-249-409-11	CARBON	220	5%	1/4W	F	R443	1-249-431-11	CARBON	15K	5%	1/4W	
R302	1-249-441-11	CARBON	100K	5%	1/4W		R444	1-249-429-11	CARBON	10K	5%	1/4W	
R303	1-249-441-11	CARBON	100K	5%	1/4W								
R304	1-249-416-11	CARBON	820	5%	1/4W	F	R445	1-249-429-11	CARBON	10K	5%	1/4W	
R305	1-247-897-11	CARBON	560K	5%	1/4W		R446	1-249-419-11	CARBON	1.5K	5%	1/4W	F
							R447	1-249-429-11	CARBON	10K	5%	1/4W	
R306	1-249-437-11	CARBON	47K	5%	1/4W		R448	1-249-429-11	CARBON	10K	5%	1/4W	
R307	1-249-441-11	CARBON	100K	5%	1/4W		R449	1-249-425-11	CARBON	4.7K	5%	1/4W	F
R308	1-247-807-31	CARBON	100	5%	1/4W								
R310	1-249-425-11	CARBON	4.7K	5%	1/4W	F	R450	1-249-441-11	CARBON	100K	5%	1/4W	
R311	1-249-417-11	CARBON	1K	5%	1/4W	F	R451	1-249-433-11	CARBON	22K	5%	1/4W	
							R452	1-249-434-11	CARBON	27K	5%	1/4W	
R312	1-249-425-11	CARBON	4.7K	5%	1/4W	F	R453	1-249-417-11	CARBON	1K	5%	1/4W	F
R313	1-249-417-11	CARBON	1K	5%	1/4W	F	R454	1-249-425-11	CARBON	4.7K	5%	1/4W	F
R314	1-249-417-11	CARBON	1K	5%	1/4W	F							
R351	1-249-409-11	CARBON	220	5%	1/4W	F	R455	1-249-440-11	CARBON	82K	5%	1/4W	
R352	1-249-441-11	CARBON	100K	5%	1/4W		R456	1-247-895-00	CARBON	470K	5%	1/4W	
							R457	1-249-441-11	CARBON	100K	5%	1/4W	
R353	1-249-441-11	CARBON	100K	5%	1/4W		R458	1-249-429-11	CARBON	10K	5%	1/4W	
R354	1-249-416-11	CARBON	820	5%	1/4W	F	R459	1-249-433-11	CARBON	22K	5%	1/4W	
R355	1-247-897-11	CARBON	560K	5%	1/4W								
R356	1-249-437-11	CARBON	47K	5%	1/4W		R464	1-249-417-11	CARBON	1K	5%	1/4W	F
R357	1-249-441-11	CARBON	100K	5%	1/4W		R465	1-249-425-11	CARBON	4.7K	5%	1/4W	F
							R475	1-247-872-11	CARBON	51K	5%	1/4W	
R358	1-247-807-31	CARBON	100	5%	1/4W		R483	1-249-441-11	CARBON	100K	5%	1/4W	
R360	1-249-425-11	CARBON	4.7K	5%	1/4W	F	R484	1-249-441-11	CARBON	100K	5%	1/4W	
R361	1-249-417-11	CARBON	1K	5%	1/4W	F							
R362	1-249-425-11	CARBON	4.7K	5%	1/4W	F	R485	1-249-441-11	CARBON	100K	5%	1/4W	
R363	1-249-417-11	CARBON	1K	5%	1/4W	F	R486	1-249-437-11	CARBON	47K	5%	1/4W	
							R487	1-249-437-11	CARBON	47K	5%	1/4W	
R364	1-249-417-11	CARBON	1K	5%	1/4W	F	R488	1-249-437-11	CARBON	47K	5%	1/4W	
R394	1-247-807-31	CARBON	100	5%	1/4W		R489	1-249-437-11	CARBON	47K	5%	1/4W	
R395	1-247-807-31	CARBON	100	5%	1/4W								
R396	1-249-417-11	CARBON	1K	5%	1/4W	F	R490	1-249-433-11	CARBON	22K	5%	1/4W	
R397	1-249-425-11	CARBON	4.7K	5%	1/4W	F	R491	1-249-429-11	CARBON	10K	5%	1/4W	
							R492	1-249-416-11	CARBON	820	5%	1/4W	F
R401	1-249-433-11	CARBON	22K	5%	1/4W		R493	1-249-417-11	CARBON	1K	5%	1/4W	F
R402	1-249-434-11	CARBON	27K	5%	1/4W		R494	1-249-417-11	CARBON	1K	5%	1/4W	F
R403	1-249-417-11	CARBON	1K	5%	1/4W	F							
R404	1-249-425-11	CARBON	4.7K	5%	1/4W	F	R495	1-249-421-11	CARBON	2.2K	5%	1/4W	F
R405	1-249-440-11	CARBON	82K	5%	1/4W		R496	1-249-421-11	CARBON	2.2K	5%	1/4W	F
							R497	1-247-887-00	CARBON	220K	5%	1/4W	
R406	1-247-895-00	CARBON	470K	5%	1/4W		R498	1-247-887-00	CARBON	220K	5%	1/4W	
R407	1-249-441-11	CARBON	100K	5%	1/4W		R499	1-249-417-11	CARBON	1K	5%	1/4W	F
R408	1-249-429-11	CARBON	10K	5%	1/4W								
R409	1-249-433-11	CARBON	22K	5%	1/4W		R500	1-249-417-11	CARBON	1K	5%	1/4W	F
R414	1-249-417-11	CARBON	1K	5%	1/4W	F	R501	1-249-417-11	CARBON	1K	5%	1/4W	F
							R502	1-249-439-11	CARBON	68K	5%	1/4W	
R415	1-249-425-11	CARBON	4.7K	5%	1/4W	F	R503	1-249-439-11	CARBON	68K	5%	1/4W	
R426	1-249-429-11	CARBON	10K	5%	1/4W		R504	1-247-820-11	CARBON	360	5%	1/4W	
R427	1-249-429-11	CARBON	10K	5%	1/4W								(SP,MY)
R428	1-247-903-00	CARBON	1M	5%	1/4W								
R429	1-247-872-11	CARBON	51K	5%	1/4W		R504	1-249-411-11	CARBON	330	5%	1/4W	
													(EXCEPT SP,MY)
R430	1-247-887-00	CARBON	220K	5%	1/4W		R508	1-249-436-11	CARBON	39K	5%	1/4W	
R431	1-247-864-11	CARBON	24K	5%	1/4W		R509	1-247-903-00	CARBON	1M	5%	1/4W	
R432	1-247-864-11	CARBON	24K	5%	1/4W		R510	1-249-425-11	CARBON	4.7K	5%	1/4W	F
R433	1-247-891-00	CARBON	330K	5%	1/4W		R511	1-249-434-11	CARBON	27K	5%	1/4W	
R434	1-249-437-11	CARBON	47K	5%	1/4W								
							R513	1-249-426-11	CARBON	5.6K	5%	1/4W	
R435	1-249-431-11	CARBON	15K	5%	1/4W		R514	1-249-418-11	CARBON	1.2K	5%	1/4W	F
R436	1-247-852-11	CARBON	7.5K	5%	1/4W		R515	1-249-441-11	CARBON	100K	5%	1/4W	
R437	1-249-437-11	CARBON	47K	5%	1/4W		R516	1-247-843-11	CARBON	3.3K	5%	1/4W	
R438	1-249-431-11	CARBON	15K	5%	1/4W		R517	1-247-883-00	CARBON	150K	5%	1/4W	
R439	1-247-852-11	CARBON	7.5K	5%	1/4W								
							R518	1-249-427-11	CARBON	6.8K	5%	1/4W	F
R440	1-259-880-11	CARBON	2.2M	5%	1/4W		R519	1-249-413-11	CARBON	470	5%	1/4W	F

SURR

SURR-AUDIO

SW

VIDEO 3

Ref. No.	Part No.	Description	Remark	Ref. No.	Part No.	Description	Remark
R536	1-247-897-11	CARBON	560K 5% 1/4W	*	1-665-500-11	SURR-AUDIO BOARD	
R537	1-249-417-11	CARBON	1K 5% 1/4W F			*****	
R551	1-249-417-11	CARBON	1K 5% 1/4W F			< CONNECTOR >	
R552	1-249-439-11	CARBON	68K 5% 1/4W				
R553	1-249-439-11	CARBON	68K 5% 1/4W	CNP302	1-695-088-11	PIN, CONNECTOR (PC BOARD) 9P	
R554	1-247-820-11	CARBON	360 5% 1/4W (SP,MY)	CNS303	1-695-093-11	SOCKET, CONNECTOR 9P	
R554	1-249-411-11	CARBON	330 5% 1/4W (EXCEPT SP,MY)			*****	
R555	1-249-419-11	CARBON	1.5K 5% 1/4W F	*	1-665-469-11	SW BOARD	
△R556	1-249-393-11	CARBON	10 5% 1/4W F			*****	
△R557	1-249-393-11	CARBON	10 5% 1/4W F			< CONNECTOR >	
R558	1-249-436-11	CARBON	39K 5% 1/4W				
R559	1-247-903-00	CARBON	1M 5% 1/4W	CNS103	1-770-397-11	HOUSING, CONNECTOR(PC BOARD)4P	
R560	1-249-425-11	CARBON	4.7K 5% 1/4W F			< RESISTOR >	
R561	1-249-434-11	CARBON	27K 5% 1/4W	R169	1-249-411-11	CARBON	330 5% 1/4W
R563	1-249-426-11	CARBON	5.6K 5% 1/4W	R170	1-249-413-11	CARBON	470 5% 1/4W F
R564	1-249-418-11	CARBON	1.2K 5% 1/4W F	R171	1-249-415-11	CARBON	680 5% 1/4W F
R565	1-249-441-11	CARBON	100K 5% 1/4W	R172	1-249-417-11	CARBON	1K 5% 1/4W F
R566	1-247-843-11	CARBON	3.3K 5% 1/4W	R173	1-249-419-11	CARBON	1.5K 5% 1/4W F
R567	1-247-883-00	CARBON	150K 5% 1/4W	R174	1-249-421-11	CARBON	2.2K 5% 1/4W F
R568	1-249-427-11	CARBON	6.8K 5% 1/4W F	R175	1-249-425-11	CARBON	4.7K 5% 1/4W F
R569	1-249-413-11	CARBON	470 5% 1/4W F	R176	1-249-411-11	CARBON	330 5% 1/4W
R591	1-247-897-11	CARBON	560K 5% 1/4W	R177	1-249-413-11	CARBON	470 5% 1/4W F
R592	1-249-425-11	CARBON	4.7K 5% 1/4W F	R178	1-249-415-11	CARBON	680 5% 1/4W F
R593	1-249-435-11	CARBON	33K 5% 1/4W	R179	1-249-417-11	CARBON	1K 5% 1/4W F
R594	1-249-425-11	CARBON	4.7K 5% 1/4W F	R180	1-249-419-11	CARBON	1.5K 5% 1/4W F
R595	1-247-903-00	CARBON	1M 5% 1/4W	R181	1-249-421-11	CARBON	2.2K 5% 1/4W F
R596	1-249-419-11	CARBON	1.5K 5% 1/4W F	R182	1-249-411-11	CARBON	330 5% 1/4W
R599	1-249-425-11	CARBON	4.7K 5% 1/4W F	R183	1-249-413-11	CARBON	470 5% 1/4W F
R601	1-249-417-11	CARBON	1K 5% 1/4W F	R184	1-249-415-11	CARBON	680 5% 1/4W F
R602	1-249-439-11	CARBON	68K 5% 1/4W	R185	1-249-417-11	CARBON	1K 5% 1/4W F
R603	1-247-820-11	CARBON	360 5% 1/4W (SP,MY)	R186	1-249-419-11	CARBON	1.5K 5% 1/4W F
R603	1-249-411-11	CARBON	330 5% 1/4W (EXCEPT SP,MY)	R187	1-249-421-11	CARBON	2.2K 5% 1/4W F
R604	1-249-439-11	CARBON	68K 5% 1/4W			< SWITCH >	
R605	1-249-413-11	CARBON	470 5% 1/4W F	S105	1-762-751-11	SWITCH, TACTILE (DIRECT PASS)	
		< RELAY >		S106	1-762-751-11	SWITCH, TACTILE (GENRE)	
RY401	1-515-614-11	RELAY		S107	1-762-751-11	SWITCH, TACTILE (SET UP)	
		< TERMINAL >		S108	1-762-751-11	SWITCH, TACTILE (MODE)	
				S113	1-762-751-11	SWITCH, TACTILE (AUDIO FUNCTION <)	
TM401	1-694-265-11	TERMINAL BOARD, ANT (ANTTENA)	(US,CND,E,PX)	S114	1-762-751-11	SWITCH, TACTILE (SOUND FIELD ON/OFF)	
TM401	1-694-266-11	TERMINAL BOARD, ANT (ANTENNA)(SP,MY,AUS)		S115	1-762-751-11	SWITCH, TACTILE (AUDIO FUNCTION >)	
		< TUNER >		S120	1-762-751-11	SWITCH, TACTILE (VIDEO FUNCTION <)	
TU401	1-233-592-11	ENCAPSULATED COMPONENT (US,CND)		S121	1-762-751-11	SWITCH, TACTILE (5.1 INPUT)	
TU401	1-233-654-11	ENCAPSULATED COMPONENT (E,PX,SP,MY)		S122	1-762-751-11	SWITCH, TACTILE (VIDEO FUNCTION >)	
TU401	1-693-377-11	TUNER (AUS)				*****	
		< VIBRATOR >		*	1-665-502-11	VIDEO 3 BOARD	

						< CAPACITOR >	
X401	1-567-819-11	VIBRATOR, CERAMIC (4MHz)		C299	1-164-159-11	CERAMIC	0.1uF 50V
						< JACK >	
				J299	1-779-868-11	JACK, PIN 3P (VIDEO 3 INPUT)	

The components identified by mark △ or dotted line with mark △ are critical for safety. Replace only with part number specified.

Les composants identifiés par une marque △ sont critiques pour la sécurité. Ne les remplacer que par une pièce portant le numéro spécifié.

VIDEO 3

VOL SEL

VOLUME

Ref. No.	Part No.	Description	Remark			
< RESISTOR >						
R299	1-249-403-11	CARBON	68	5%	1/4W	F
R316	1-249-417-11	CARBON	1K	5%	1/4W	F
R366	1-249-417-11	CARBON	1K	5%	1/4W	F

*	1-665-628-11	VOL SEL BOARD (E,PX)				

< CONNECTOR >						
CNP910	1-564-321-00	PIN, CONNECTOR 2P				
* CNP911	1-564-687-11	PIN, CONNECTOR 3P				
* CNP912	1-564-687-11	PIN, CONNECTOR 3P				
< SWITCH >						
△ S902	1-571-437-11	SWITCH, POWER VOLTAGE CHANGE (VOLTAGE SELECTOR)				

*	1-665-623-11	VOLUME BOARD				

< CAPACITOR >						
C497	1-126-964-11	ELECT	10uF	20%	50V	
< CONNECTOR >						
CNP102	1-770-388-11	PIN, CONNECTOR (PC BOARD) 4P				
CNS402	1-569-323-11	SOCKET, CONNECTOR 19P				
CNS410	1-750-179-11	SOCKET, CONNECTOR 5P				
< RESISTOR >						
R499	1-249-411-11	CARBON	330	5%	1/4W	
< VARIABLE RESISTOR >						
RV401	1-225-445-11	RES, VAR, CARBON 100KX6 (MASTER VOLUME)				

MISCELLANEOUS						

△ 7	1-569-008-11	ADAPTOR, CONVERSION 2P (E,PX)				
72	1-773-041-11	WIRE (FLAT TYPE) (17 CORE)				
73	1-773-108-11	WIRE (FLAT TYPE) (19 CORE)(10cm)				
74	1-773-117-11	WIRE (FLAT TYPE) (19 CORE)(18cm)				
75	1-773-131-11	WIRE (FLAT TYPE) (19 CORE)(33cm)				
107	1-773-280-11	WIRE (FLAT TYPE) (29 CORE)				
△ CNJ909	1-251-416-11	OUTLET, A.C. (AUS)				
△ CNJ909	1-526-794-11	OUTLET, AC (SP,MY)				
△ CNP901	1-696-847-11	CORD, POWER (AUS)				
△ CNP901	1-769-743-11	CORD, POWER (US,CND)				
△ CNP901	1-769-744-11	CORD, POWER (E,PX,SP,MY)				
△ F901	1-532-504-51	FUSE TIME-LAG (T4.6AL/250V)(EXCEPT US,CND)				
△ F901	1-533-311-11	FUSE (8A/125V)(US,CND)				
△ F902	1-532-464-51	FUSE TIME-LAG (T2.5AL/250V)(SP,MY,AUS)				
△ F903	1-532-504-51	FUSE TIME-LAG (T4.0AL/250V)(E,PX)				
△ F950	1-532-506-51	FUSE, TIME-LAG (T6.3AL/250V) (EXCEPT US,CND)				

Ref. No.	Part No.	Description	Remark
△ F950	1-533-311-11	FUSE (8A/125V) (US,CND)	
△ F951	1-532-506-51	FUSE, TIME-LAG (T6.3AL/250V)	(EXCEPT US,CND)
△ F951	1-533-311-11	FUSE (8A/125V) (US,CND)	
FL101	1-517-519-11	INDICATOR TUBE, FLUORESCENT	
Q505	8-729-209-15	TRANSISTOR 2SD2012	
Q506	8-749-010-25	IC MN2488-OPY-M	
Q507	8-749-010-26	IC MP1620-OPY-M	
Q555	8-729-209-15	TRANSISTOR 2SD2012	
Q556	8-749-010-25	IC MN2488-OPY-M	
Q557	8-749-010-26	IC MP1620-OPY-M	
Q605	8-729-209-15	TRANSISTOR 2SD2012	
Q606	8-749-010-25	IC MN2488-OPY-M	
Q607	8-749-010-26	IC MP1620-OPY-M	
Q706	8-749-010-25	IC MN2488-OPY-M	
Q707	8-749-010-26	IC MP1620-OPY-M	
Q756	8-749-010-25	IC MN2488-OPY-M	
Q757	8-749-010-26	IC MP1620-OPY-M	
△ T901	1-431-314-11	TRANSFORMER, POWER (US)	
△ T901	1-431-315-11	TRANSFORMER, POWER (CND)	
△ T901	1-431-316-11	TRANSFORMER, POWER (AUS)	
△ T901	1-431-317-11	TRANSFORMER, POWER (E,PX)	
△ T901	1-431-318-11	TRANSFORMER, POWER (SP,MY)	

ACCESSORIES & PACKING MATERIALS			

1-475-133-11	REMOTE COMMANDER (RM-H501)(US,CND)		
1-475-138-11	REMOTE COMMANDER (RM-VR101)		
	(E,PX,SP,MY,AUS)		
1-475-324-11	RAY-CATCHER UNIT (WITH PLUG)		
1-501-594-11	ANTENNA (FM)(DE815G:SP,MY,AUS)		
1-501-721-11	ANTENNA (LOOP)		
1-751-619-11	CORD, CONNECTION (VIDEO 1.5m)		
	(D760Z/DE815G:US,CND)		
1-777-172-11	CORD, CONNECTION (CONTROL A1 1m)		
	(DE815G:US,CND)		
3-810-765-11	MANUAL,COMMONNESS INSTRUCTION		
	(ENGLISH)(US,AUS)		
3-810-765-21	MANUAL,COMMONNESS INSTRUCTION		
	(ENGLISH,FRENCH,GERMAN,SPANISH,DUTCH,SWEDISH,ITALIAN,PORTUGUESE,CHINESE)		
	(CND,E,PX,SP,MY)		
4-983-536-01	COVER, BATTERY (For RM-H501)		
4-995-439-01	COVER, BATTERY (For RM-VR101)		

HARDWARE LIST			

#1	7-685-646-79	SCREW +BVTP 3X8 TYPE2 TT(B)	
#2	7-685-881-09	SCREW +BVTT 4X8 (S)	
#3	7-685-872-09	SCREW +BVTT 3X8 (S)	
The components identified by mark △ or dotted line with mark △ are critical for safety. Replace only with part number specified.		Les composants identifiés par une marque △ sont critiques pour la sécurité. Ne les remplacer que par une pièce portant le numéro spécifié.	

STR-D760Z/DE815G

SONY

SERVICE MANUAL

US Model

STR-D760Z/DE815G

Canadian Model

E Model

Australian Model

PX Model

STR-DE815G

SUPPLEMENT-1

File this supplement with the service manual.

Subject: MANUAL INSTRUCTION ADDITION

(ECN-TA702183)

Page	FORMER				NEW			
	<u>Ref. No.</u>	<u>Part No.</u>	<u>Description</u>	<u>Remark</u>	<u>Ref. No.</u>	<u>Part No.</u>	<u>Description</u>	<u>Remark</u>
102	*** ACCESSORIES & PACKING MATERIALS ***				*** ACCESSORIES & PACKING MATERIALS ***			
			not used			3-860-819-11	MANUAL, INSTRUCTION (ENGLISH)	
			not used			3-860-819-21	MANUAL, INSTRUCTION (FRENCH)(CND,E,SP,PX)	
			not used			3-860-819-31	MANUAL, INSTRUCTION (SPANISH, CHINESE)	
							(E,SP,MY,PX)	

• Abbreviation

CND : Canadian model

SP : Singapore model

MY : Malaysian model