

TC-SD1

SERVICE MANUAL

AEP Model
UK Model
E Model



Manufactured under license from Dolby Laboratories Licensing Corporation.

"DOLBY" and the double-D symbol  are trademarks of Dolby Laboratories Licensing Corporation.

Model Name Using Similar Mechanism	TC-PX100
Tape Transport Mechanism Type	TCM-ACLM572

SPECIFICATIONS

Recording system	4-track 2-channel stereo
Frequency response	(DOLBY NR OFF) 30 – 14,000 Hz (± 3 dB), using Sony TYPE I cassettes 30 – 15,000 Hz (± 3 dB), using Sony TYPE II cassettes 30 – 15,000 Hz (± 3 dB), using Sony TYPE IV cassettes
Input	TAPE IN (phono jacks): impedance 47 kilohms
Output	TAPE OUT (phono jacks): voltage 500 mV impedance 47 kilohms

General

Power requirements	220 – 230 V AC, 50/60 Hz
European countries model:	220 – 240 V AC, 50/60 Hz
Other models:	12 W
Power consumption	Approx. 190 × 91 × 315 mm (w/h/d)
Dimensions	incl. projecting parts and controls
Mass	Approx. 3.2 kg
Supplied accessories:	Audio connecting cords (2) System cable (1)

Design and specifications are subject to change
without notice.

STEREO CASSETTE DECK



SONY®

TABLE OF CONTENTS

1. GENERAL	3
2. DISASSEMBLY	
2-1. Case, Front Panel	4
2-2. Mechanism Deck (TCM-ACLM572)	5
2-3. Control Board, Dolby Board	5
2-4. Power Trans Board, AC Select SW Board, Power Board	6
2-5. Tray Assembly	6
2-6. Mechanism Chassis Block	7
2-7. Capstan Reel Motor (M902)	7
3. DIAGRAMS	
3-1. Circuit Boards Location	8
3-2. Schematic diagram — Display Section —	9
3-3. Printed Wiring Board — Display Section —	11
3-4. Printed Wiring Board — Main Section —	16
3-5. Schematic Diagram — Main Section —	21
3-6. IC Block Diagrams	25
3-7. IC Pin Function Description	27
4. MECHANICAL ADJUSTMENT	29
5. ELECTRICAL ADJUSTMENT	29
6. EXPLODED VIEWS	
6-1. Case, Front Panel Section	33
6-2. Chassis Section	34
6-3. Mechanism Deck Section-1 (TCM-ACLM572)	35
6-4. Mechanism Deck Section-2 (TCM-ACLM572)	36
6-5. Mechanism Deck Section-3 (TCM-ACLM572)	37
7. ELECTRICAL PARTS LIST	38

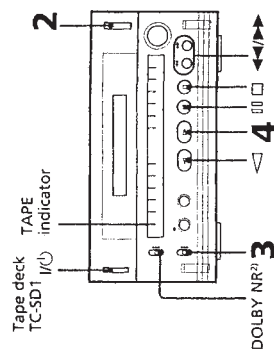
SAFETY-RELATED COMPONENT WARNING!!

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.

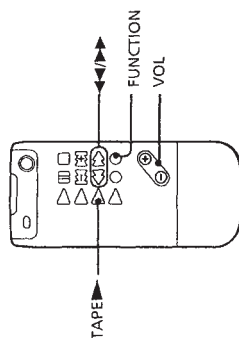
Playing a tape

You can use any type of tape, TYPE I (normal), TYPE II (CrO₂) or TYPE IV (metal) since the tape deck automatically detects the tape type (ATS¹⁾).

¹⁾ ATS: Automatic Tape Selection.



The remote supplied with the CMT-SD1/SD3

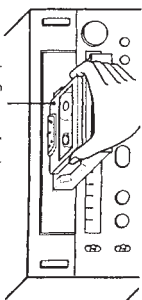


²⁾ This tape deck is able to switch between Dolby B-type and C-type noise reduction systems.

1 Press I/O on the CMT-SD1/SD3 to turn on the CMT-SD1/SD3 component system.
The tape deck turns on automatically.

2 Press $\triangle$ on the tape deck to open the cassette tray and insert a recorded tape.
Press $\triangle$ again to close the cassette tray.

With the side you want to play facing up



3 Set DIRECTION to $\rightleftarrows$ to play one side, $\rightarrow$ to play both sides once, and $\leftrightarrow$ to play both sides continuously.

4 Press $\triangle$.

Press $\triangle$ to play the bottom side.
The function switches to "TAPE" automatically, then the tape starts playing.

³⁾ The tape deck stops automatically after repeating the sequence five times.

To play a tape using the CMT-SD1/SD3 component system

Do the following operations in step 4:

- 1 Press FUNCTION until "TAPE" appears in the display.
- 2 Press TAPE $\triangle$ on the remote.
To play the bottom side, press TAPE $\triangle$ again on the remote.

Tips

- When you press I/O on the tape deck while the CMT-SD1/SD3 is power on, only the tape deck turns on/off. Press I/O on the CMT-SD1/SD3 to turn on the CMT-SD1/SD3 component system.
- The TAPE indicator lights up in red when a cassette is inserted and goes off when no cassette is inserted.
- You can switch from another source to the tape deck just by pressing $\triangle$ or $\triangleleft$ (Automatic Source Selection).
- To start playing automatically from the beginning of the tape after fast winding (Auto Play), press $\triangle$ while holding down $\triangleleft$ (for the top side) or $\triangleright$ while holding down $\triangleright$ (for the bottom side).
- When listening to tapes recorded in Dolby NR, set DOLBY NR to "B" or "C".
- Using the timer function on the CMT-SD1/SD3, you can wake up to music at a preset time. For details, refer to "Wake up to music" in the CMT-SD1/SD3 component system Operating Instructions. When you set the Wake-up timer, DOLBY NR must be set on the tape deck.

Note

The AMS feature may not work in the following cases:

- the blank space between tracks is four seconds or less.
- the sound source recorded on the right channel is different from that on the left channel as with a KARAOKE tape.
- low volume or low sound continues for a long time.
- the TV is too close to the tape deck.

Other operations

To	Press
Stop playing	$\square$ (or $\blacksquare$).
Pause	$\square$ (or $\blacksquare$).
Fast-forward	Press again to resume playing. $\square$, then $\triangleright\triangleright\triangleright$ (or $\triangleright\triangleright\triangleright$) for the top side. $\square$, then $\triangleright\triangleright\triangleright$ (or $\triangleright\triangleright\triangleright$) for the bottom side.
Rewind	$\square$, then $\triangleleft\triangleleft\triangleleft$ (or $\triangleleft\triangleleft\triangleleft$) for the top side. $\square$, then $\triangleleft\triangleleft\triangleleft$ (or $\triangleleft\triangleleft\triangleleft$) for the bottom side.
Find the succeeding track (AMS ^{**})	$\triangleleft$ (or $\triangleleft\triangleleft$) for the top side. $\triangleleft$ (or $\triangleleft\triangleleft$) for the bottom side.
Find the preceding track (AMS ^{**})	$\triangleright$ (or $\triangleright\triangleright$) for the top side. $\triangleright$ (or $\triangleright\triangleright$) for the bottom side.
Remove the cassette	$\triangle$ on the tape deck.
Adjust the volume	Turn VOLUME on the CMT-SD1/SD3 (or VOL $\odot$ / $\ominus$).

• Use the remote supplied with the CMT-SD1/SD3.

^{**}The Automatic Music Sensor (AMS) feature detects a blank space of more than four seconds between tracks to locate tracks quickly.

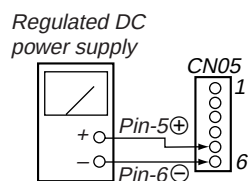
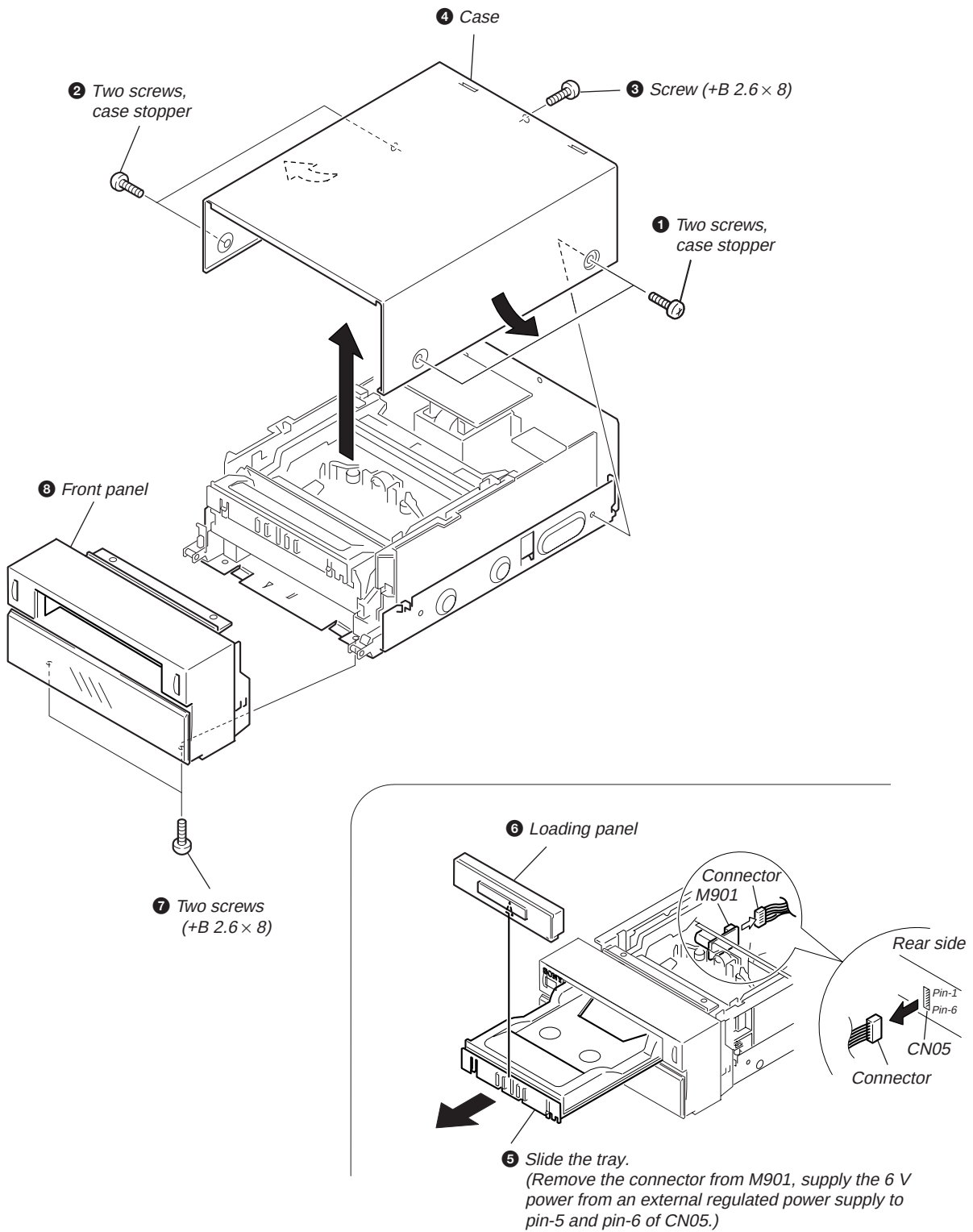
SECTION 1 GENERAL

This section is extracted from instruction manual.

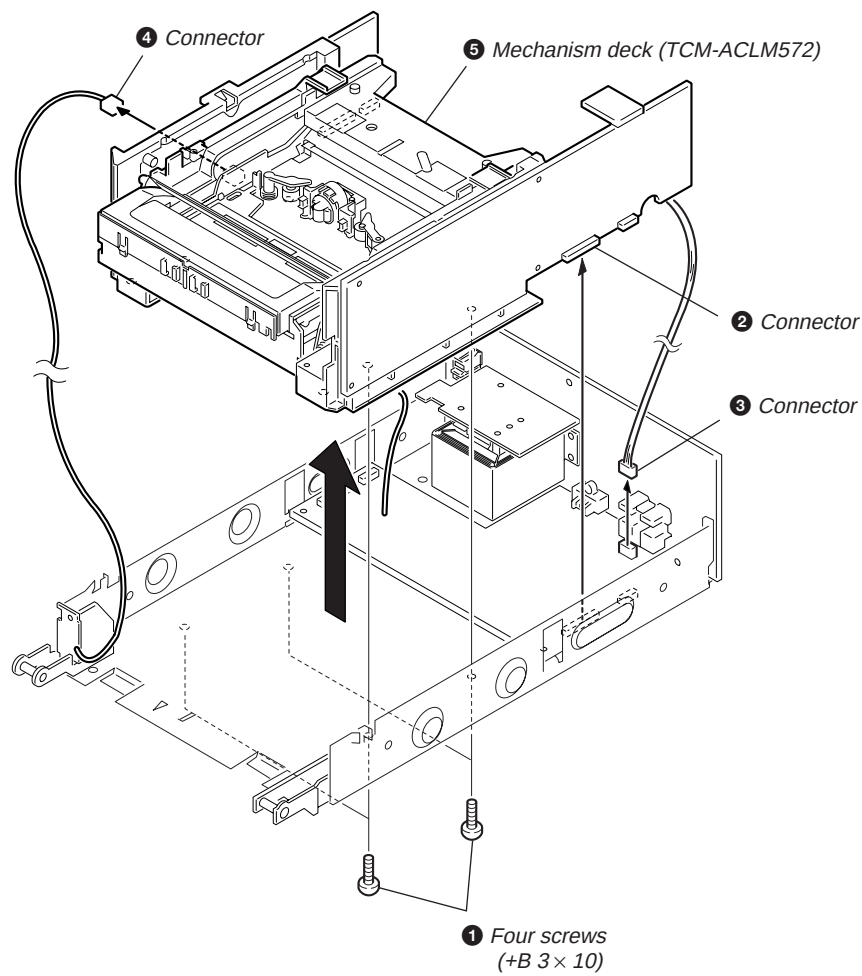
SECTION 2 DISASSEMBLY

Note : Follow the disassembly procedure in the numerical order given.

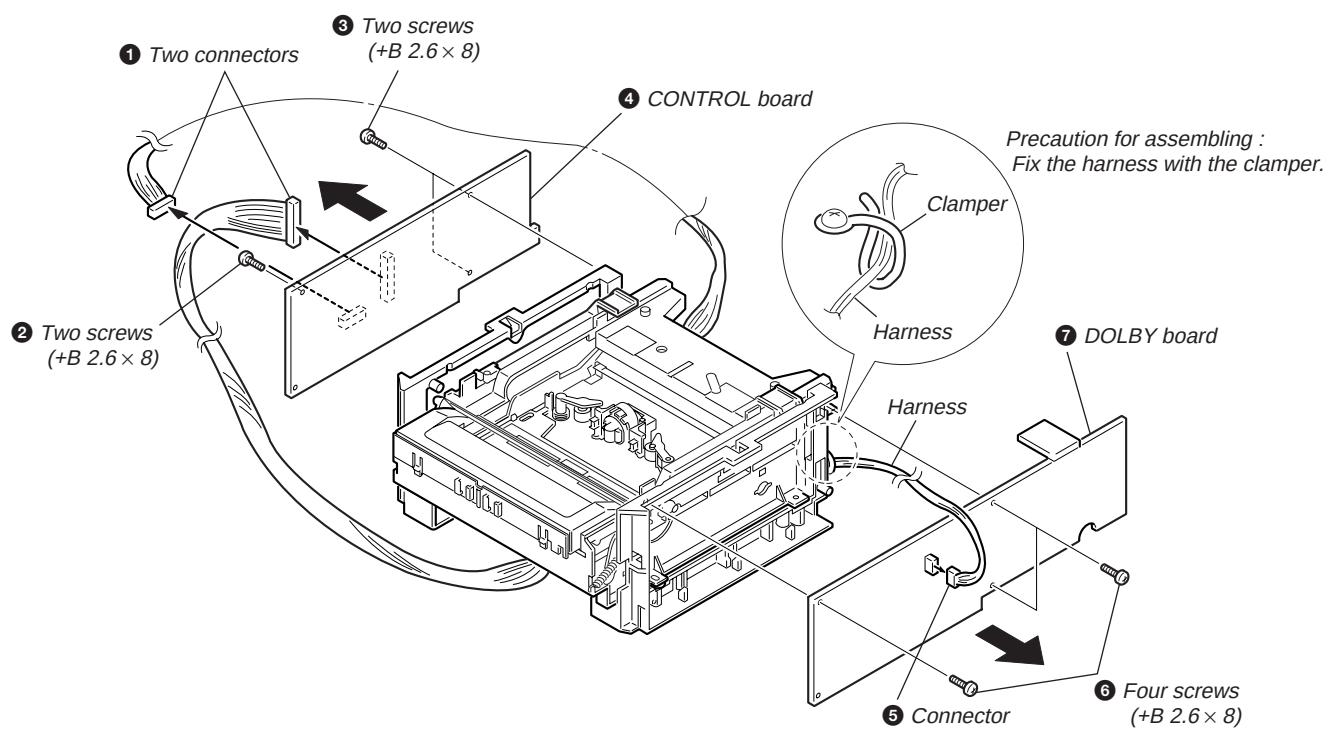
2-1. CASE, FRONT PANEL



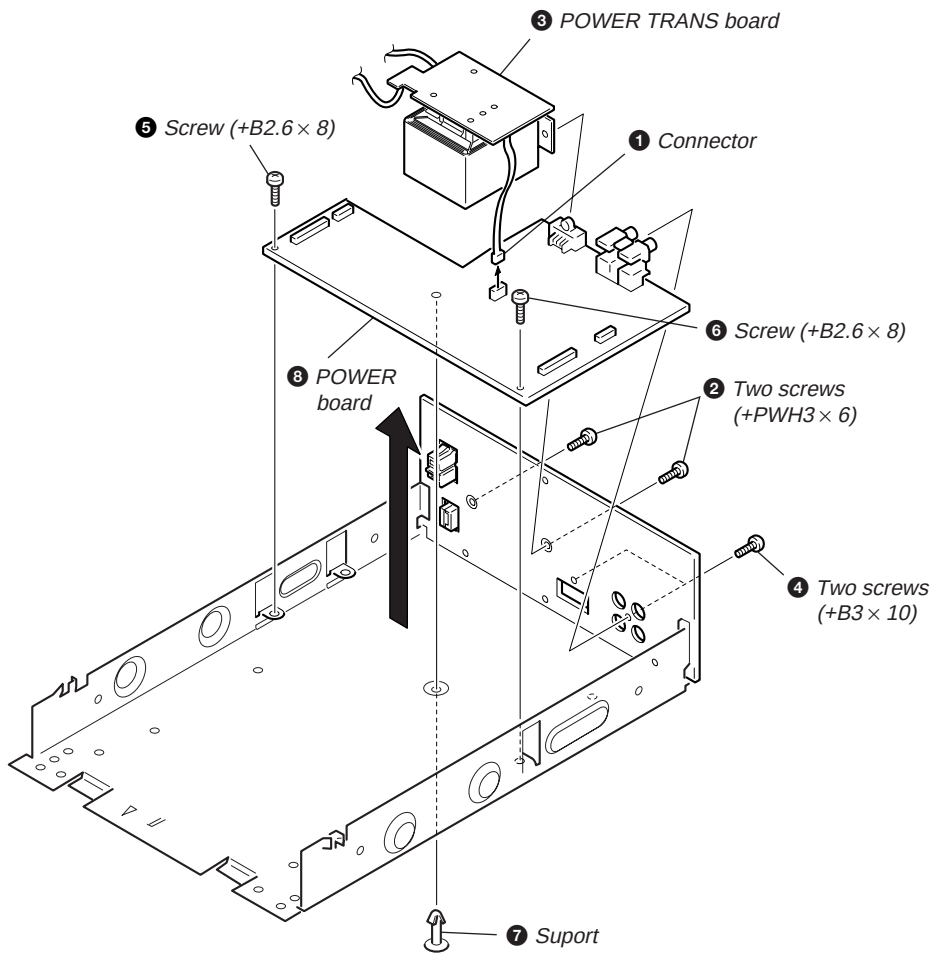
2-2. MECHANISM DECK (TCM-ACLM572)



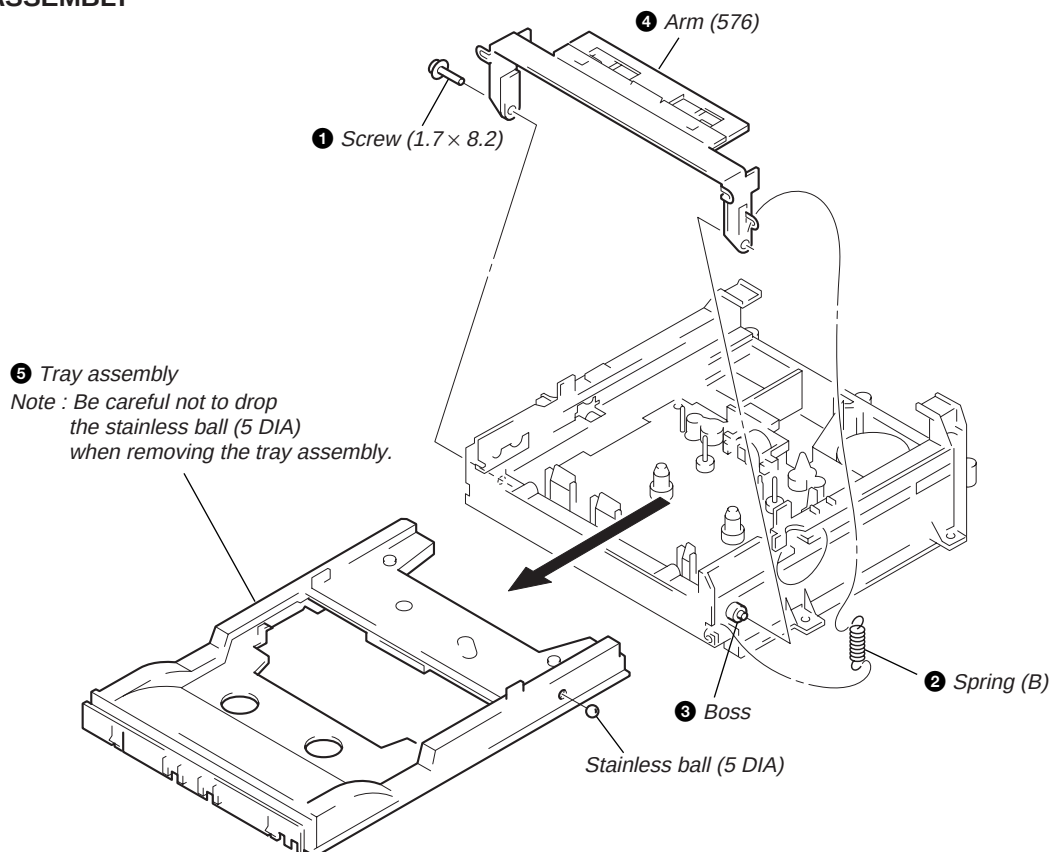
2-3. CONTROL BOARD, DOLBY BOARD



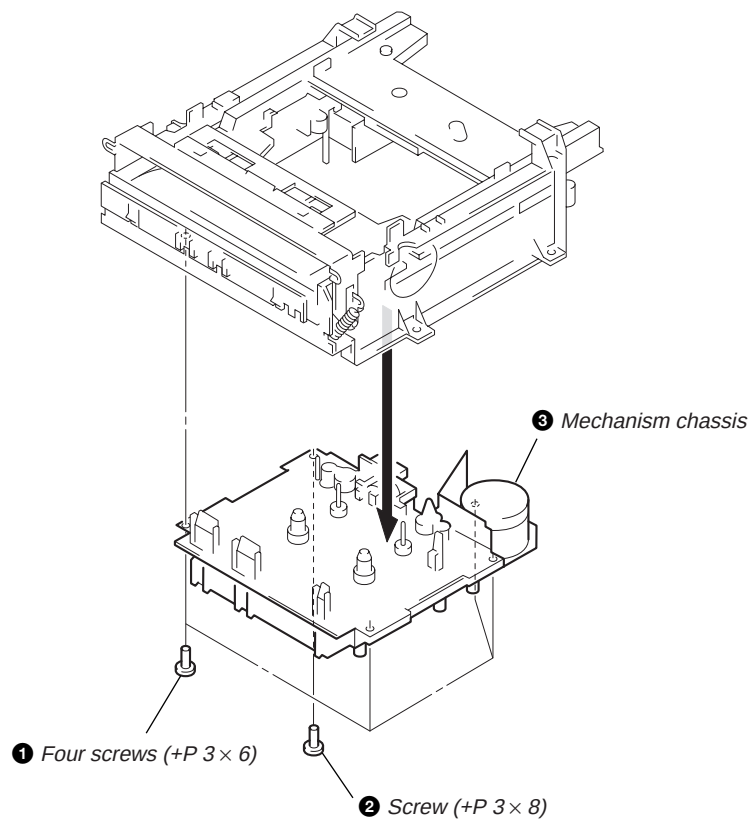
2-4. POWER TRANS BOARD, AC SELECT SW BOARD, POWER BOARD



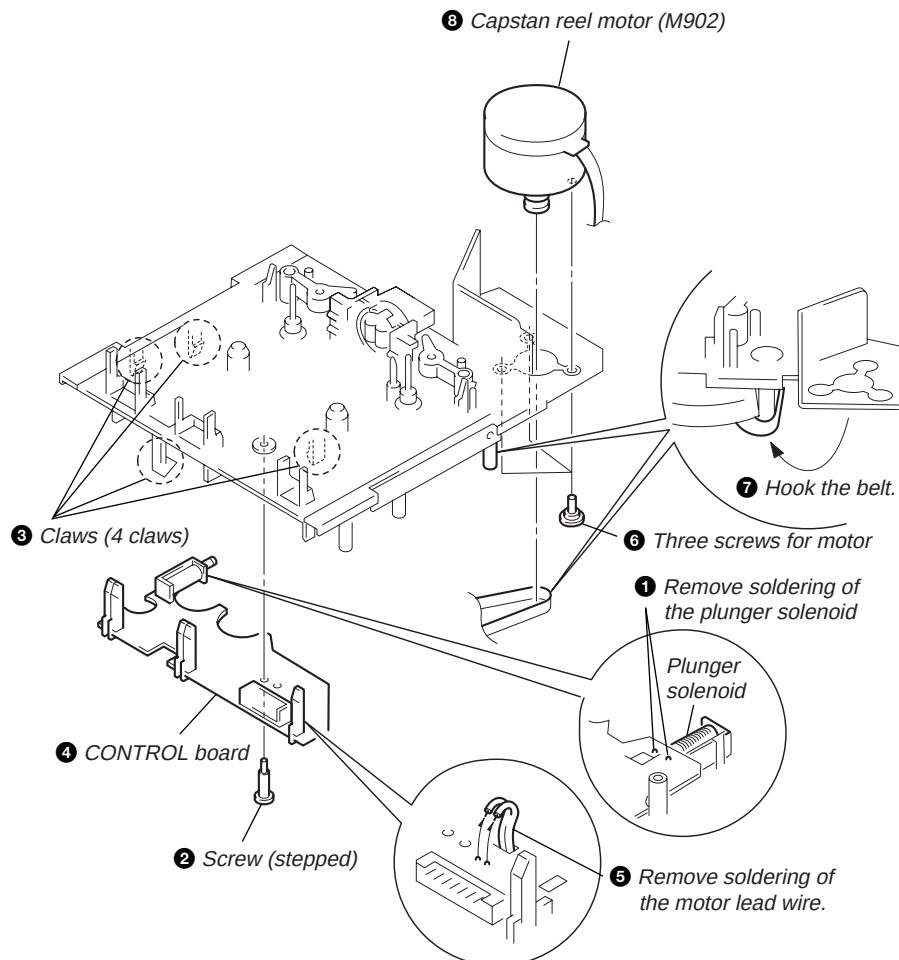
2-5. TRAY ASSEMBLY



2-6. MECHANISM CHASSIS BLOCK

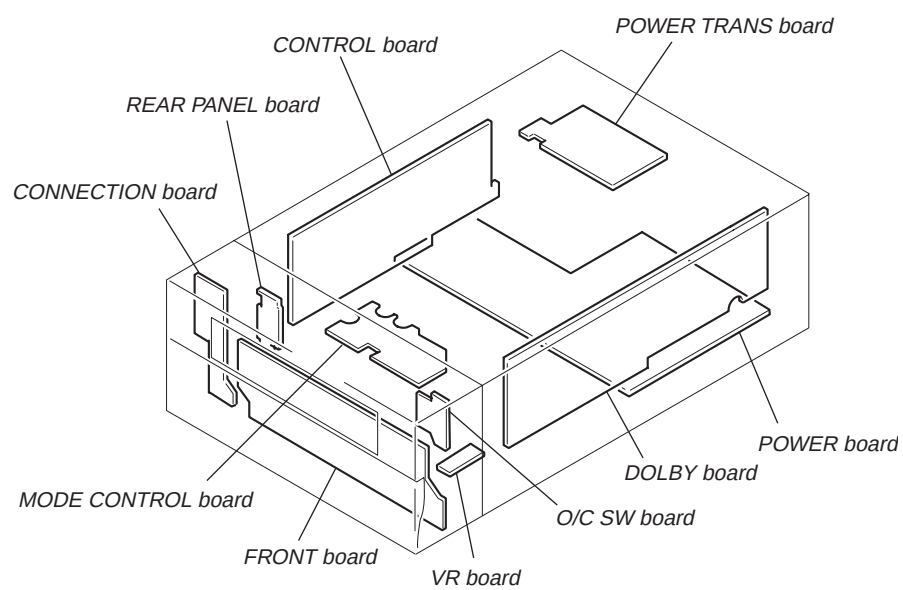


2-7. CAPSTAN REEL MOTOR (M902)

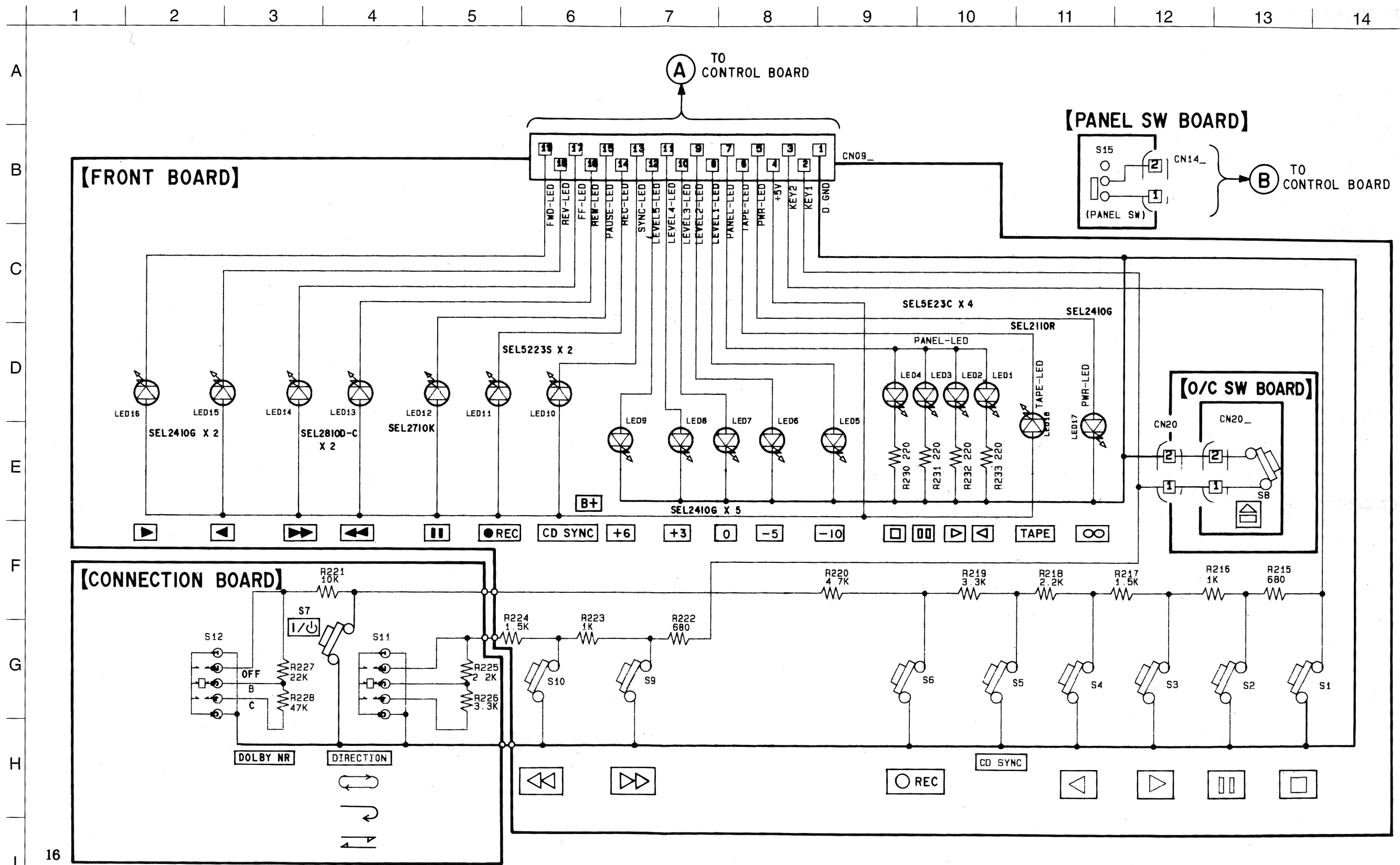


SECTION 3 DIAGRAMS

3-1. CIRCUIT BOARDS LOCATION



3-2. SCHEMATIC DIAGRAM — DISPLAY SECTION —



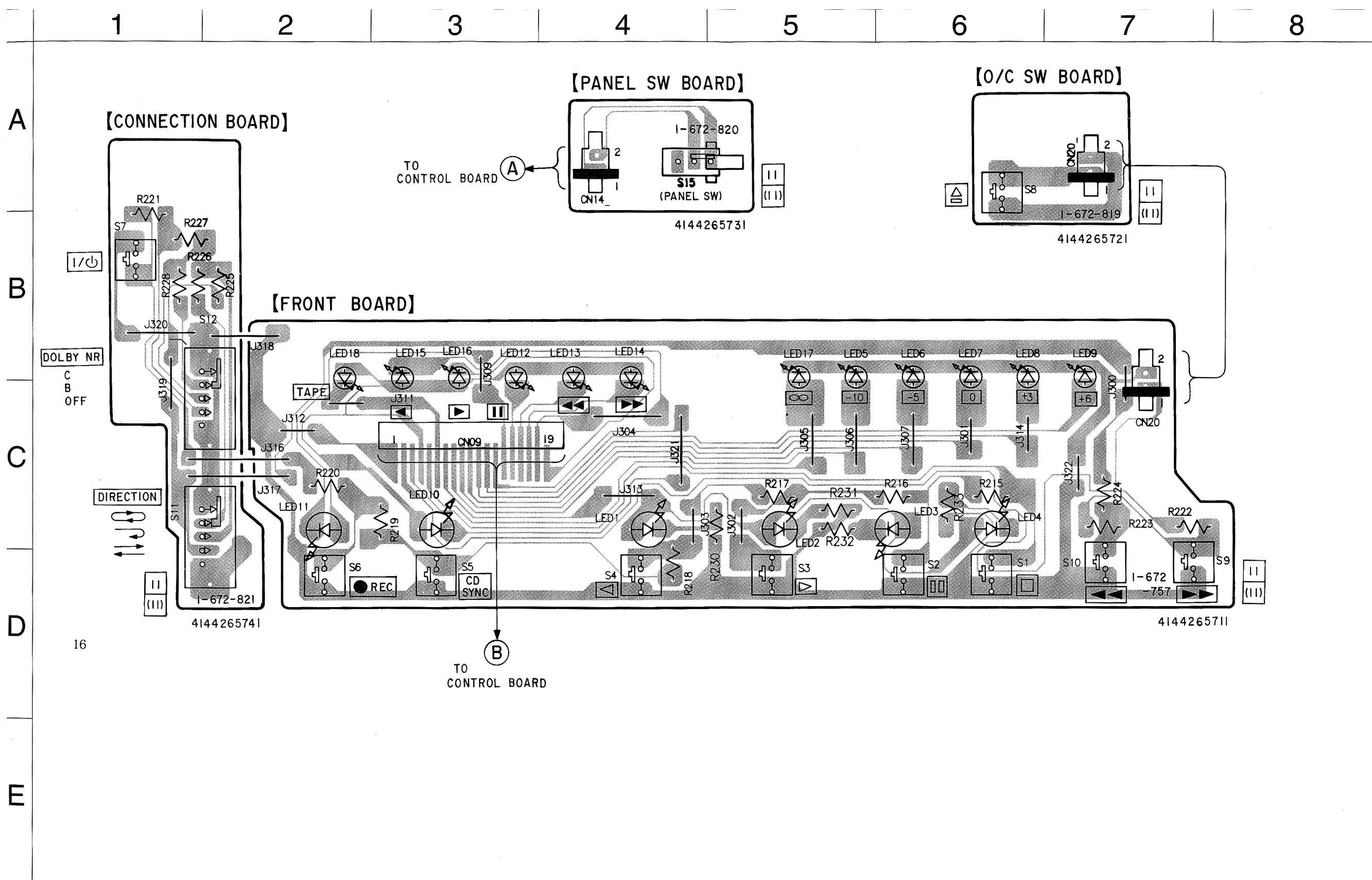
Note on Schematic Diagram:

- All resistors are in Ω and $\frac{1}{4}$ W or less unless otherwise specified.
- : panel designation.
- **Note:** The components identified by mark $\triangle$ or dotted line with mark $\triangle$ are critical for safety. Replace only with part number specified.
- **[B+]** : B+ Line.

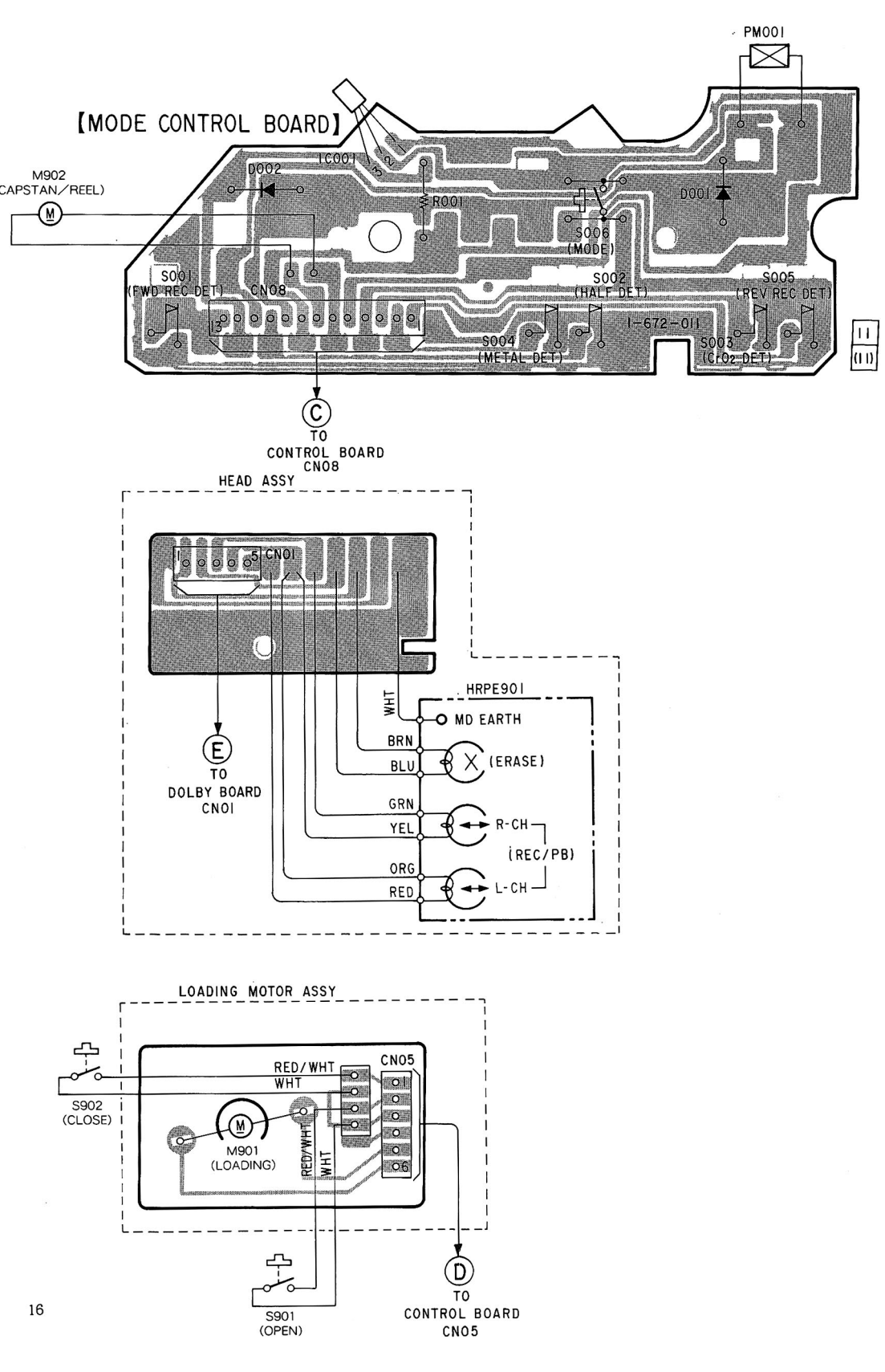
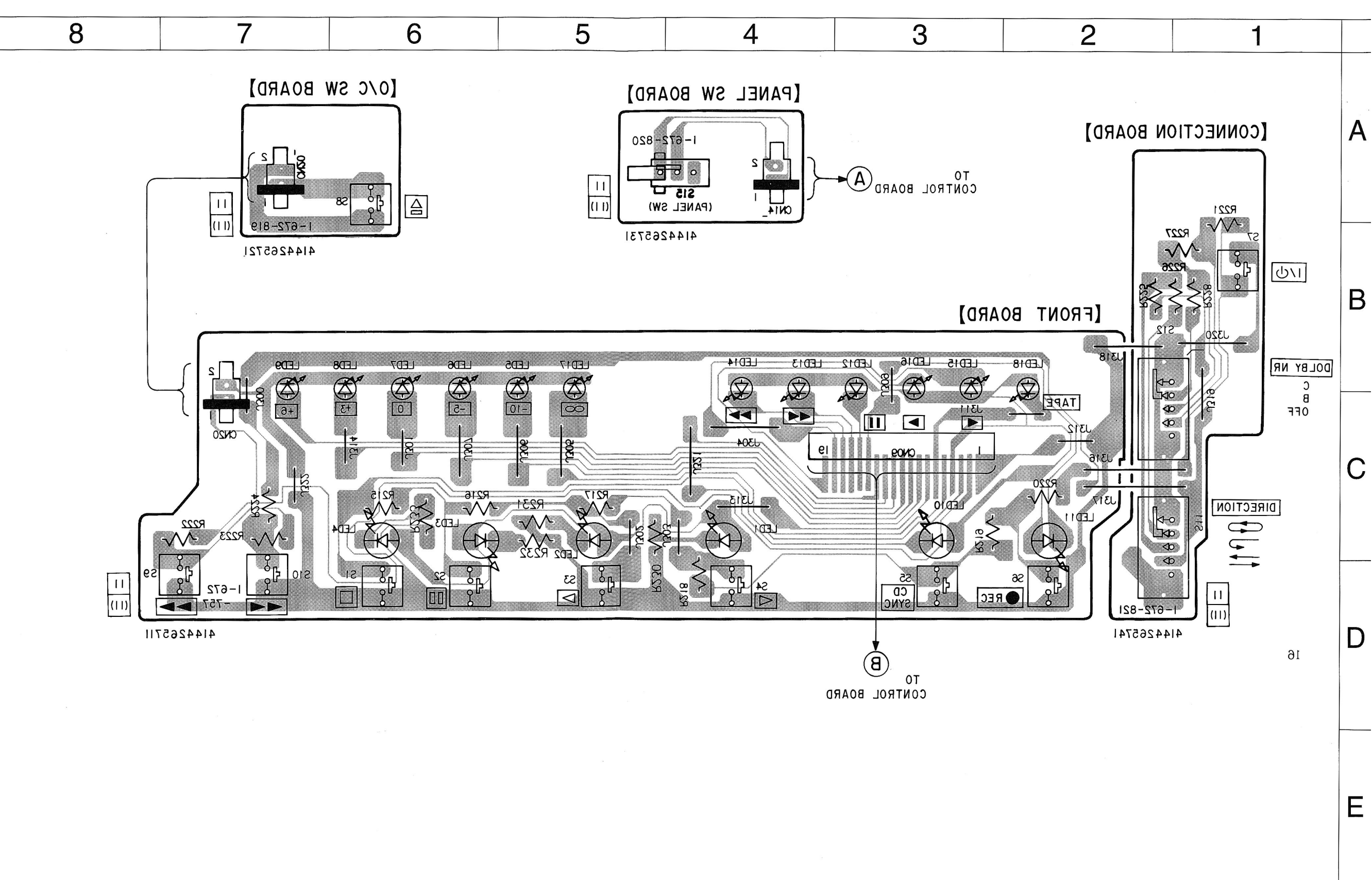
3-3. PRINTED WIRING BOARD — DISPLAY SECTION —

COMPONENT SIDE

- Refer to page 8 for Circuit Boards Location.
- Refer to page 24 for MODE CONTROL board Schematic Diagram.



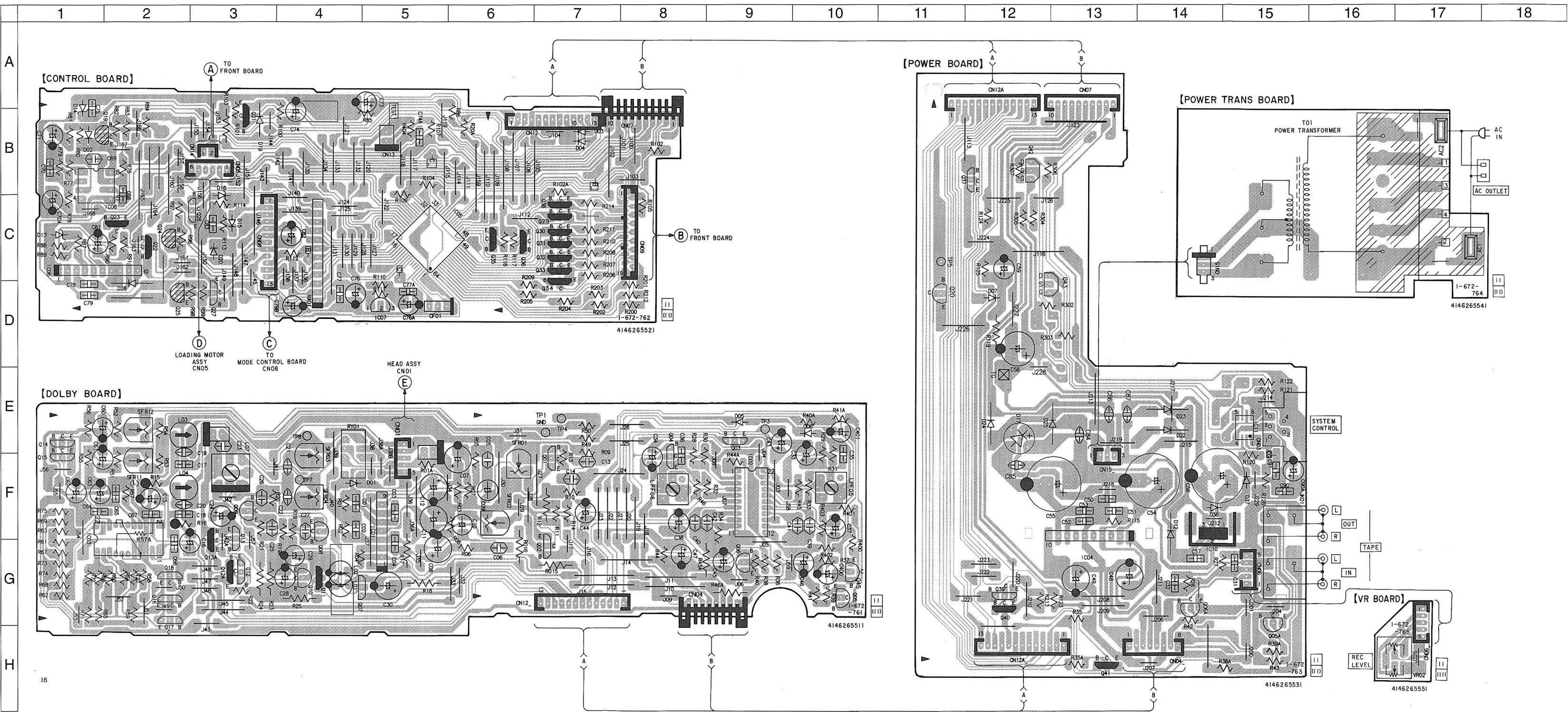
CONDUCTOR SIDE



Note on Printed Wiring Board:
 • — : parts extracted from the conductor side.
 • : Pattern of the rear side.

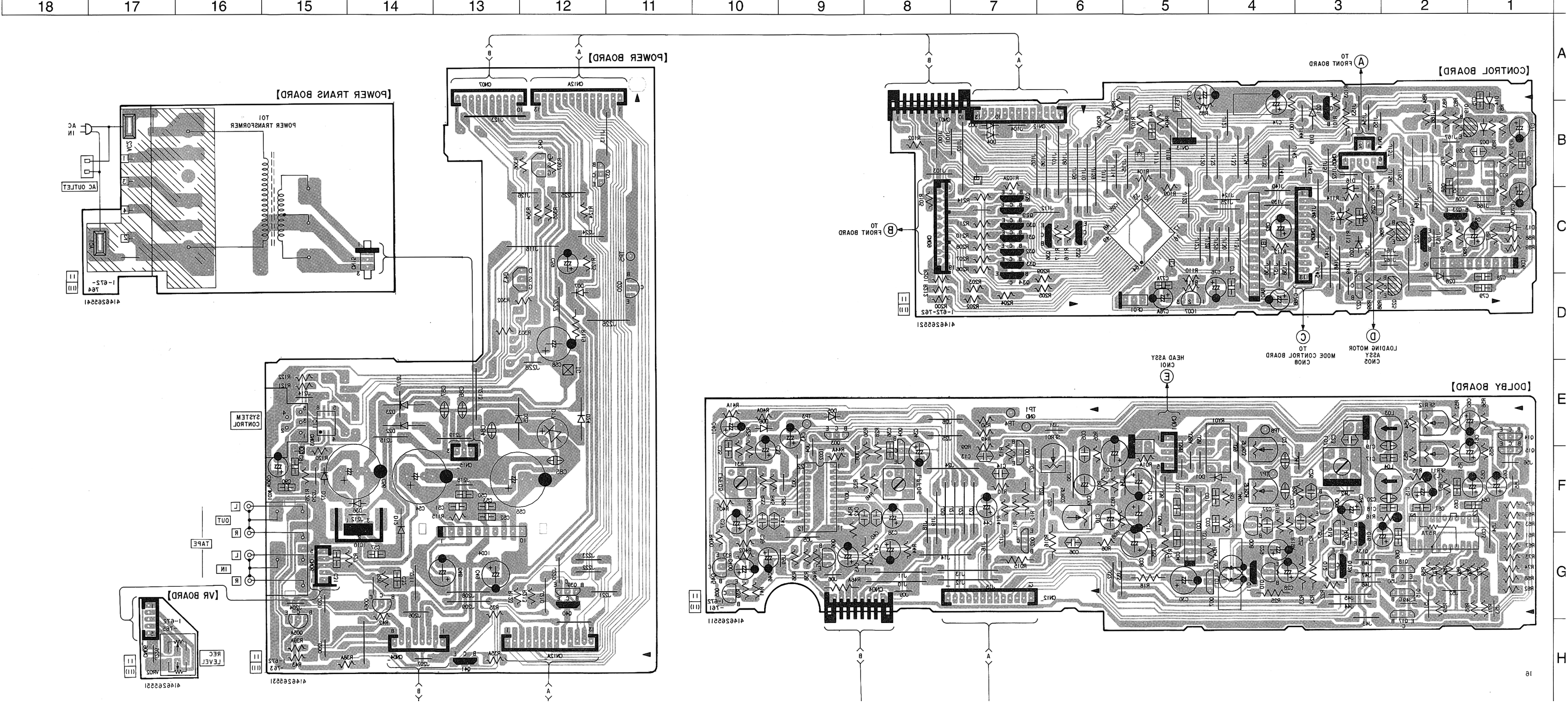
3-4. PRINTED WIRING BOARD — MAIN SECTION —

COMPONENT SIDE • Refer to page 8 for Circuit Boards Location.



Note on Printed Wiring Board:
• : parts extracted from the conductor side.
• : Pattern of the rear side.

CONDUCTOR SIDE



3-5. SCHEMATIC DIAGRAM — MAIN SECTION —

• Refer to page 25 for IC Block Diagrams. • Refer to page 27 for IC Pin Function Description. • Refer to page 15 for MODE CONTROL board Printed Wiring Board.

Semiconductor Location

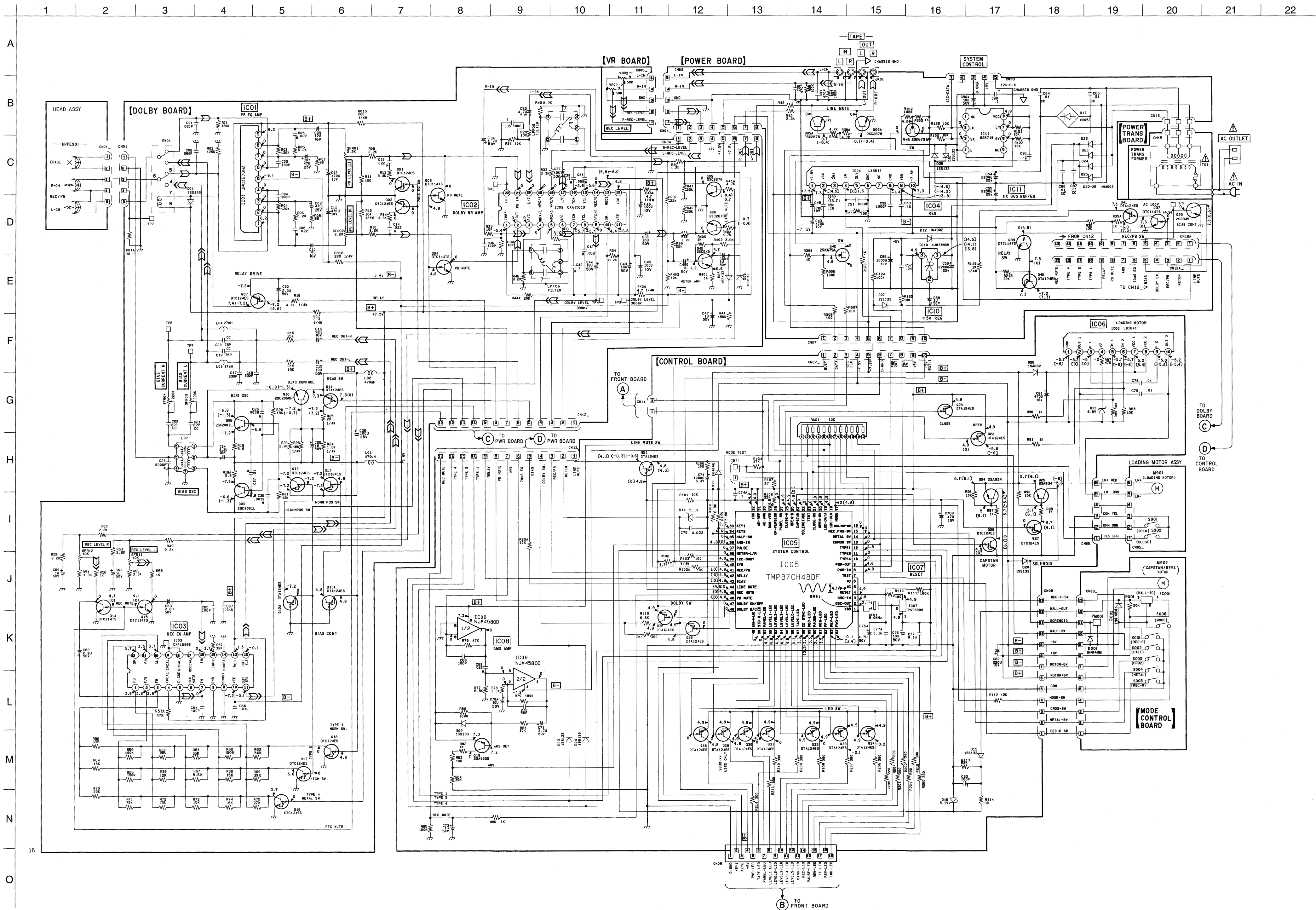
Ref. No.	Location	Ref. No.	Location
D01	F-5	Q06A	C-14
D02	B-1	Q07	G-5
D03	B-7	Q08	G-4
D04	B-7	Q09	F-3
D05	E-9	Q10	G-4
D06	E-10	Q11	G-4
D07	D-12	Q12	G-3
D12	F-14	Q12A	G-3
D13	C-1	Q13	F-3
D14	A-1	Q13A	G-3
D15	C-3	Q14	E-1
D16	B-3	Q15	F-1
D17	E-12	Q16	G-2
D19	B-3	Q17	G-2
D20	C-3	Q18	G-2
D22	E-14	Q19	B-2
D23	E-14	Q20	D-11
D24	E-12	Q21	B-3
D25	E-12	Q22	C-2
D28	D-2	Q23	C-2
D36	F-14	Q24	C-2
D37	F-15	Q25	D-2
		Q26	C-3
IC01	F-5	Q27	D-3
IC02	F-9	Q29	C-7
IC03	F-1	Q30	C-7
IC04	G-13	Q31	C-7
IC05	C-6	Q32	C-7
IC06	C-1	Q33	C-7
IC07	D-5	Q34	D-7
IC08	C-2	Q35	C-6
IC10	G-14	Q36	C-6
IC11	E-15	Q37	B-12
		Q38	C-7
Q01	F-7	Q39	G-12
Q02	G-7	Q40	G-12
Q03	E-9	Q41	H-13
Q04	E-8	Q42	B-12
Q05	G-10	Q43	C-13
Q05A	H-15	Q44	E-14
Q06	G-9	Q45	G-10

Note on Schematic Diagram:

- All capacitors are in μF unless otherwise noted. pF: μF 50 VV or less are not indicated except for electrolytics and tantalums.
- All resistors are in Ω and $\frac{1}{2}$ W or less unless otherwise specified.
- Panel designation.

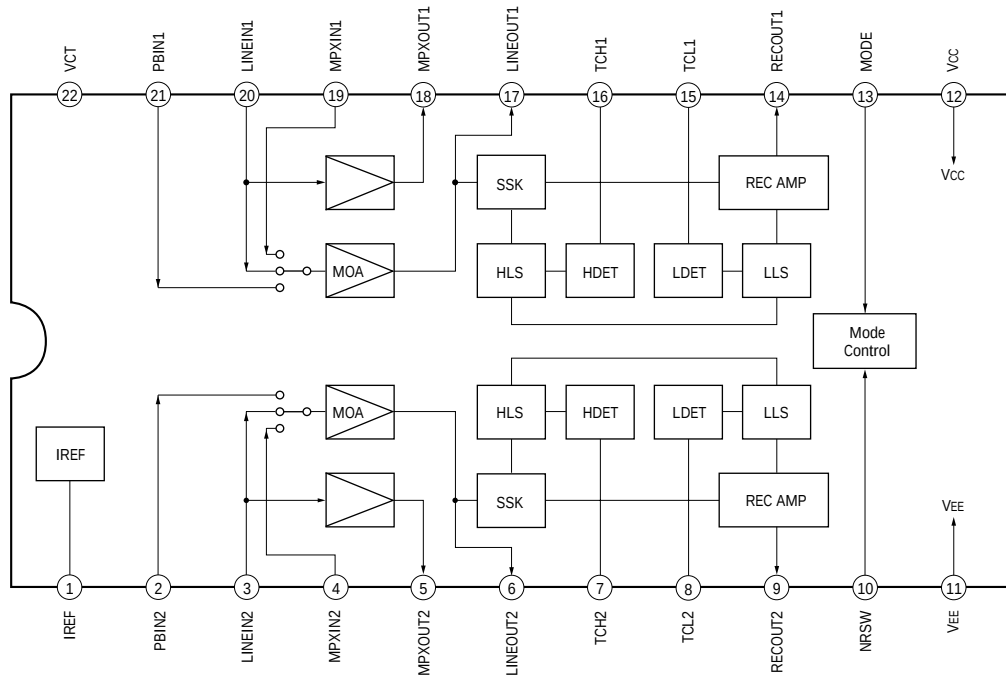
Note: The components identified by mark Δ or dotted line with mark Δ are critical for safety. Replace only with part number specified.

- Δ : B+ Line.
- Δ : B- Line.
- Δ : adjustment for repair.
- Voltages and waveforms are dc with respect to ground under no-signal (detuned) conditions.
- no mark : REC/PB
- () : REC
- < : PB
- [] : STOP
- Voltages are taken with a VOM (Input impedance 10 M Ω). Voltage variations may be noted due to normal production tolerances.
- Waveforms are taken with an oscilloscope. Voltage variations may be noted due to normal production tolerances.
- Circled numbers refer to waveforms.
- Signal path.
- Δ : PB
- Δ : REC

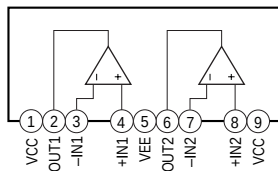


3-6. IC BLOCK DIAGRAMS

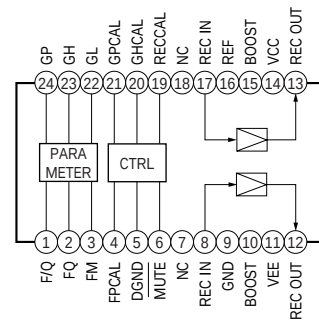
IC02 CXA1561S



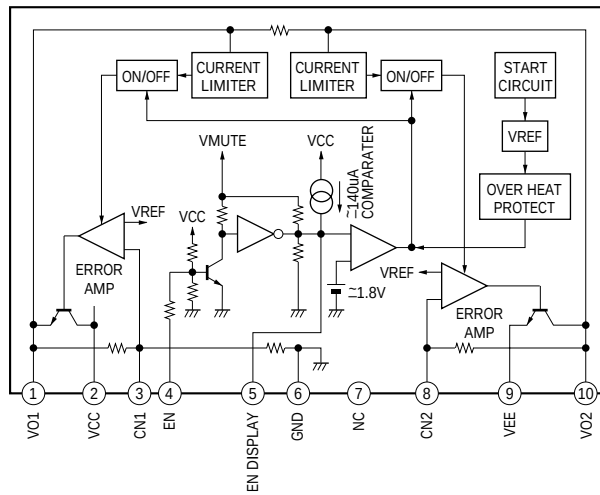
IC01 μPC4570HA



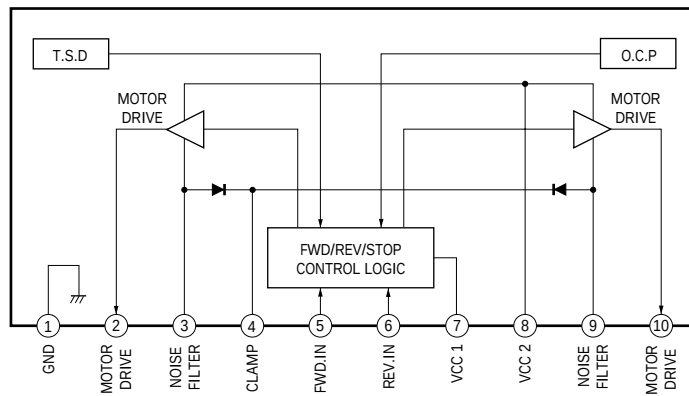
IC03 CXA1598S



IC04 LA5617



IC06 LB1641



3-7. IC PIN FUNCTION DESCRIPTION

• CONTROL BOARD IC05 TMP87CH48DF (SYSTEM CONTROL)

Pin No.	Pin Name	I/O	Description
1	VSS	—	System ground terminal
2	OSC-OUT	O	System clock output (8 MHz)
3	OSC-IN	I	System clock input (8 MHz)
4	RESET	I	Reset input
5	NC	—	No used
6	NC	—	No used
7	TEST	I	Test terminal
8	POWER-IN	I	Primary power supply ON/OFF input
9	POWER-OUT	O	Mechanism, AU power supply ON/OFF output
10	TYPE4	O	Type 4 recording bias selector output
11	TYPE2	O	Type 2 recording bias selector output
12	TYPE1	O	Type 1 recording bias selector output
13	CHROM-SW	I	Tape type 2 input
14	METAL-SW	I	Tape type 4 input
15	REC.FWD-SW	I	Record safety tab input of side A
16	REC.REW-SW	I	Record safety tab input of side A
17	MODE-SW	I	Head sensor input
18	I2C-CLOCK	I/O	I2C clock input/output
19	I2C-DATA	I/O	I2C data input/output
20	OPEN-SW	I	Loader open switch input
21	CLOSE-SW	I	Loader close switch input
22	TEST	I	TEST input
23	SOLENOIDE	O	Solenoid output
24	CAPSTAN	O	Capstan motor output
25	OPEN-M	O	Loader open (motor) output
26	CLOSE-M	O	Loader close (motor) output
27	PANEL-SW	I	Panel switch input
28	OP-VERSION	I	Option TC version input
29	NC	—	No used
30	AD-GND	—	AD ground terminal
31	AD-REF	—	AD reference voltage
32	VCC	—	System power input
33	KEY1	I	Key 1 input
34	KEY2	I	Key 2 input
35	HALF-SW	I	Half switch input
36	AMS-IN	I	AMS input
37	PULSE	I	Pulse input
38	METER-L/R	I	Meter L-CH input
39	I2C-BUSY	I/O	I2C BUSY input/output
40	SYS	—	No used
41	REC/PB	O	REC/PB selector output
42	RELAY	O	RELAY selector output
43	BIAS	O	Bias selector output
44	LINE MUTE	O	LINE mute selector output
45	REC MUTE	O	Record mute selector output

Pin No.	Pin Name	I/O	Description
46	PB MUTE	O	Playback mute selector output
47	DOLBY ON/OFF	O	Dolby ON/OFF output
48	DOLBY B/C	O	Dolby B/C output
49	STB-R-LED	O	No used
50	STB-G-LED	O	Power ON LED (green) output
51	PANEL-LED	O	Panel LED (blue) output
52	LEBEL1-LED	O	Level meter 1 (minimum dB) LED (green) output
53	LEVEL2-LED	O	Level meter 2 LED (green) output
54	LEVEL3-LED	O	Level meter 3 LED (green) output
55	LEVEL4-LED	O	Level meter 4 LED (red) output
56	LEVEL5-LED	O	Level meter 5 (maximum dB) LED (red) output
57	TAPE-LED	O	Tape indicator LED (amber) output
58	CDSYNC-LED	O	CD synchro LED (red) output
59	REC-LED	O	REC LED (red) output
60	PAUSE-LED	O	PAUSE LED (orange) output
61	REW-LED	O	REW LED (amber) output
62	FF-LED	O	FF LED (amber) output
63	REV-LED	O	REV LED (green) output
64	FWD-LED	O	FWD LED (green) output

SECTION 4 MECHANICAL ADJUSTMENT

Precaution

- Clean the following parts with a denatured alcohol-moistened swab:
 record/playback heads pinch rollers
 erase head rubber belts
 capstan idlers
- Do not use a magnetized screwdriver for the adjustments.
- After the adjustments, apply suitable locking compound to the parts adjusted.
- The adjustments should be performed with the rated power supply voltage unless otherwise noted.

• Torque Measurement

Mode	Torque meter	Meter reading
FWD	CQ-102C	31 to 61 g • cm
FWD back tension		2 to 6 g • cm
REV	CQ-102RC	36 to 61 g • cm
REV back tension		2 to 6 g • cm
FF/REW	CQ-201B	61 to 143 g • cm

• Tape Tension

FWD tension	CQ-403A	100 g or more
REV tension	CQ-403R	100 g or more

SECTION 5 ELECTRICAL ADJUSTMENT

Precaution

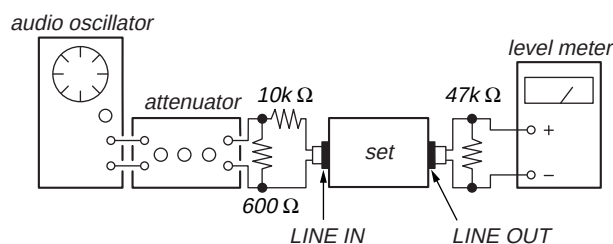
- Perform adjusting on the test mode.
- Demagnetize the record/playback head with a head demagnetizer.
- Do not use a magnetized screwdriver for the adjustments.
- After the adjustments, apply suitable locking compound to the parts adjust.
- The adjustments should be performed with the rated power supply voltage unless otherwise noted.
- The adjustments should be performed in the order given in this service manual. (As a general rule, playback circuit adjustment should be completed before performing recording circuit adjustment.)
- The adjustments should be performed for both L-CH and R-CH.
- Switches should be set as follows.

DOLBY NR OFF
 DIRECTION ⇄

• Standard Recording Position

Adjust the REC LEVEL (VR02) control so that the standard input/output signal level is obtained in the following connection.

— Record Mode —



Standard Input Level

Input terminal	LINE IN
source impedance	10kΩ
input signal level	0.5V (−3.8dB)

Standard Output Level

Output terminal	LINE OUT
load impedance	47kW
output signal level	0.5V (−3.8dB)

0dB = 0.775 V

Test Mode

Turn OFF the main power and insert the shorting plug to the test point CN13 (2P) on the CONTROL board (setting IC05 pin 22 to “L”). Then turn ON the main power which activate the TEST mode. All displays flash once.

If a recording is performed in the TEST mode, the REC MEMORY mode becomes active at the moment of recording so that the tape is rewound by the amount of recording when a tape is rewound after recording.

After adjustment, be sure to remove the shorting plug from the test point CN13 (2P).

Test Tape

Type	Signal	Used for
P-4-A100	10 kHz, −10 dB	Azimuth Adjustment
WS-48B	3 kHz, 0 dB	Tape Speed Adjustment
P-4-L300	315 Hz, 0 dB	PB Level Adjustment

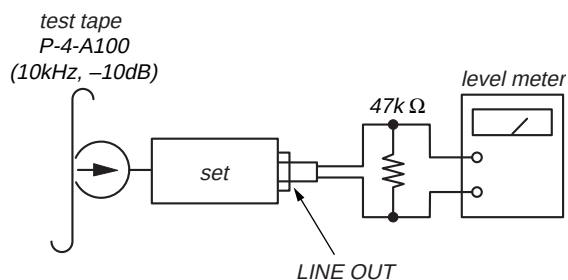
Record/Playback Head Azimuth Adjustment

Note: • Perform this adjustment after the head is turned around.
(If the head is positioned in the FWD direction, turn around the head and start adjustment from the REV mode as described below.)

* When the azimuth adjustment is performed, the azimuth adjustment screw must end up with rotation of tightening direction (i.e. clockwise direction).

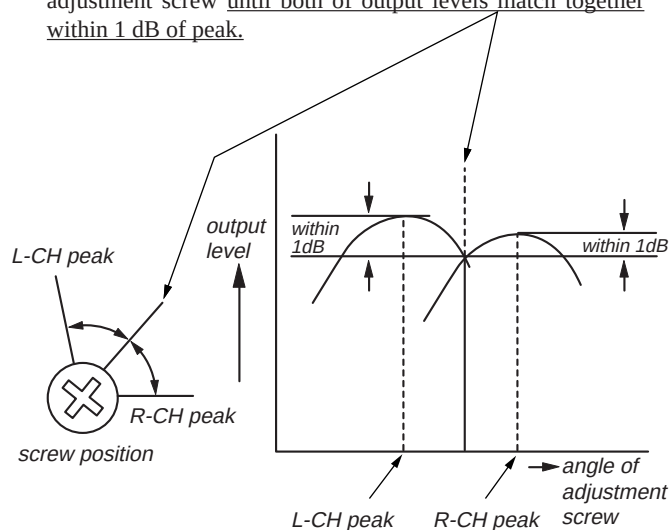
Adjustment procedure :

1. Mode: REV playback



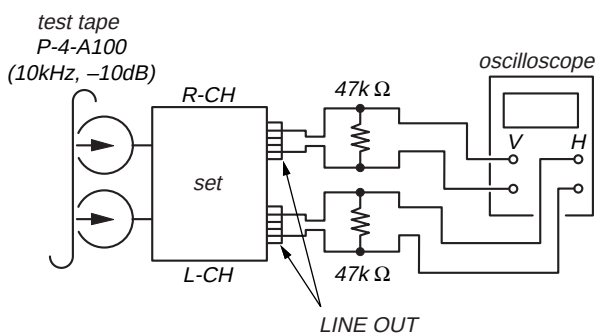
2. Turn the azimuth adjustment screw for the maximum output level of L-CH and R-CH.

If the peak levels do not match for L-CH and R-CH, turn the adjustment screw until both of output levels match together within 1 dB of peak.

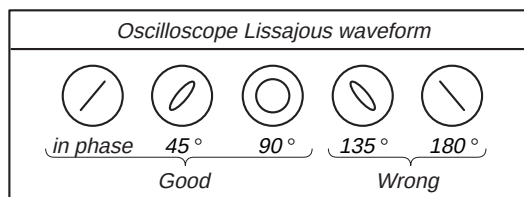


3. Phase Check

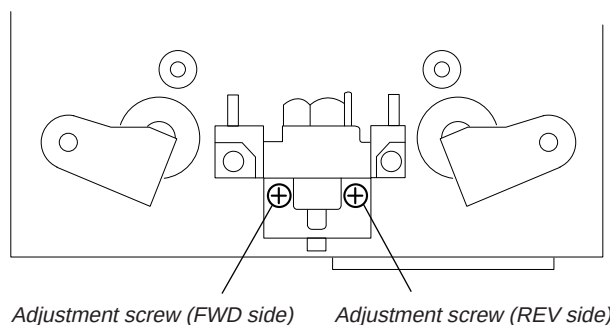
Mode: REV playback



4. Enter the FWD mode and perform steps 1 to 3.
5. Check that the phase difference between L-CH and R-CH is in the range of in-phase to 90°.
6. After adjustment, lock the screw with locking compound.



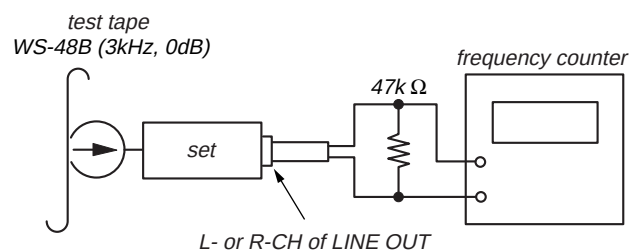
Adjustment Location:



Tape Speed Adjustment

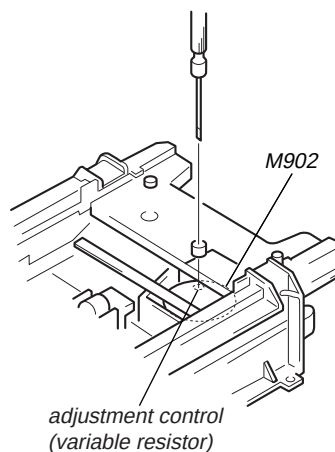
Procedure :

Mode : FWD playback



1. Enter the FWD playback mode, and play back test tape.
2. Adjust the adjustment control (variable resistor) of the motor (M902) until the frequency counter reading becomes 3,000 Hz $\pm$ 90 Hz.
3. Confirm that the tape speed deviation between tape top and tape end is within 3%.

Adjustment location :



Sample Value of Wow and flutter

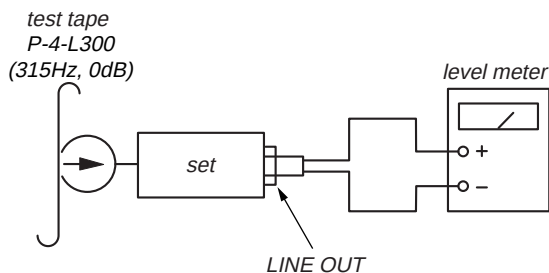
W. RMS (JIS) within 0.3%

(test tape: WS-48B)

Playback Level Adjustment

Procedure :

1. Mode : FWD playback



Adjust SFR01 (L-CH) and SFR02 (R-CH) so that the reading on level meter meets the adjustment limits below.

Adjustment Limits :

LINE OUT level : -7.7 ± 0.5 dB (301.5 to 338.5 mV)

Level difference between channels : within 0.5 dB

Check that the LINE OUT level does not change even if Playback and Stop operations are repeated several times.

Adjustment Location : DOLBY board (Refer to page 32.)

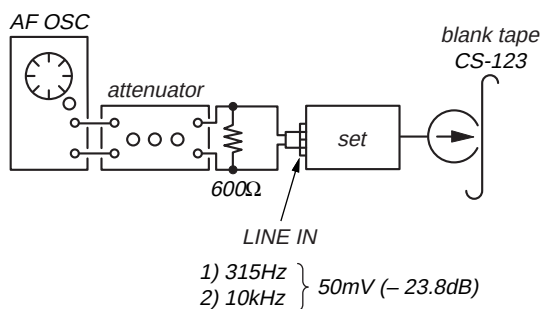
Record BIAS Adjustment

Setting :

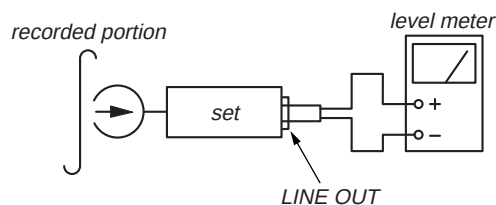
- The REC LEVEL control must be positioned at the standard record level position. (Refer to page 29.)

Procedure :

1. Mode: Record



2. Playback



3. Reproduce the portion of tape which is recorded in step 1. Confirm that the playback level stays within the specified range of the Adjustment Level.
4. If the playback level is outside the specified range, adjust the SFR03 (L-CH) and SFR04 (R-CH), and repeat steps 1 to 3 until the specified range is satisfied.

Adjustment Level : Difference of the playback level between 10 kHz and 315 Hz : $0 \text{ dB} \pm 0.5 \text{ dB}$ when 315 Hz is the reference.

Adjustment Location : DOLBY board (Refer to page 32.)

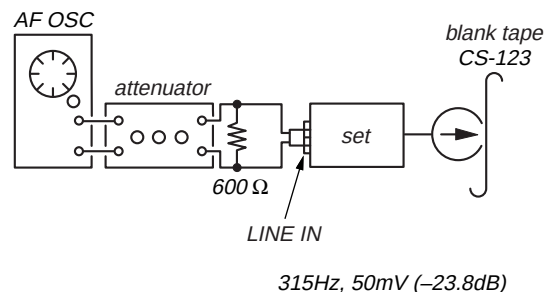
Record Level Adjustment

Setting :

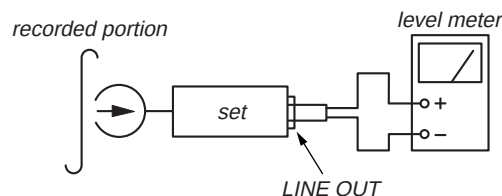
- The REC LEVEL control must be positioned at the standard record level position. (Refer to page 29.)

Procedure :

1. Record



2. Playback



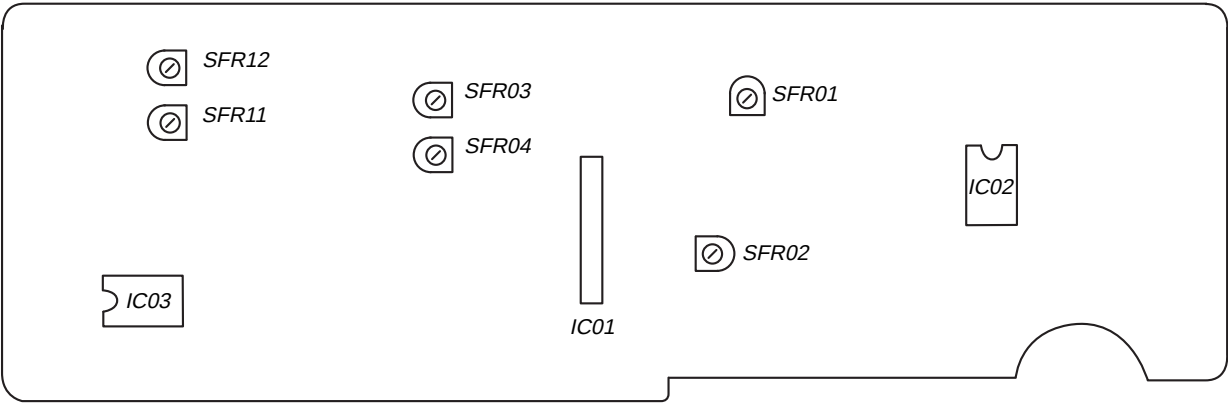
3. Reproduce the portion of tape which is recorded in step 1. Confirm that the playback level stays within the specified range of the Adjustment Level.
4. If the playback level is outside the specified range, adjust the SFR11 (L-CH) and SFR12 (R-CH), and repeat steps 1 to 3 until the specified range is satisfied.

Adjustment Level : $-23.8 \text{ dB} \pm 0.5 \text{ dB}$ (47.3 to 53.1 mV)

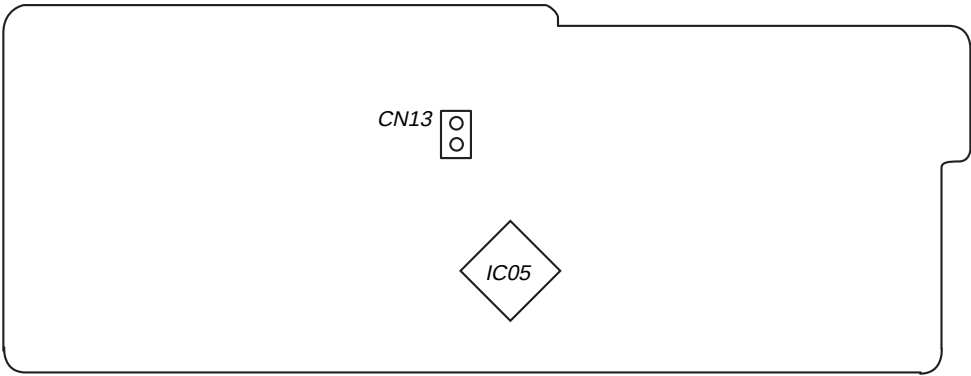
Adjustment Location : DOLBY board (Refer to page 32.)

Adjustment Location:

DOLBY board (Component Side)



CONTROL board (Component Side)



SECTION 6 EXPLODED VIEWS

NOTE:

- -XX, -X mean standardized parts, so they may have some differences from the original one.
- Items marked “*” are not stocked since they are seldom required for routine service. Some delay should be anticipated when ordering these items.

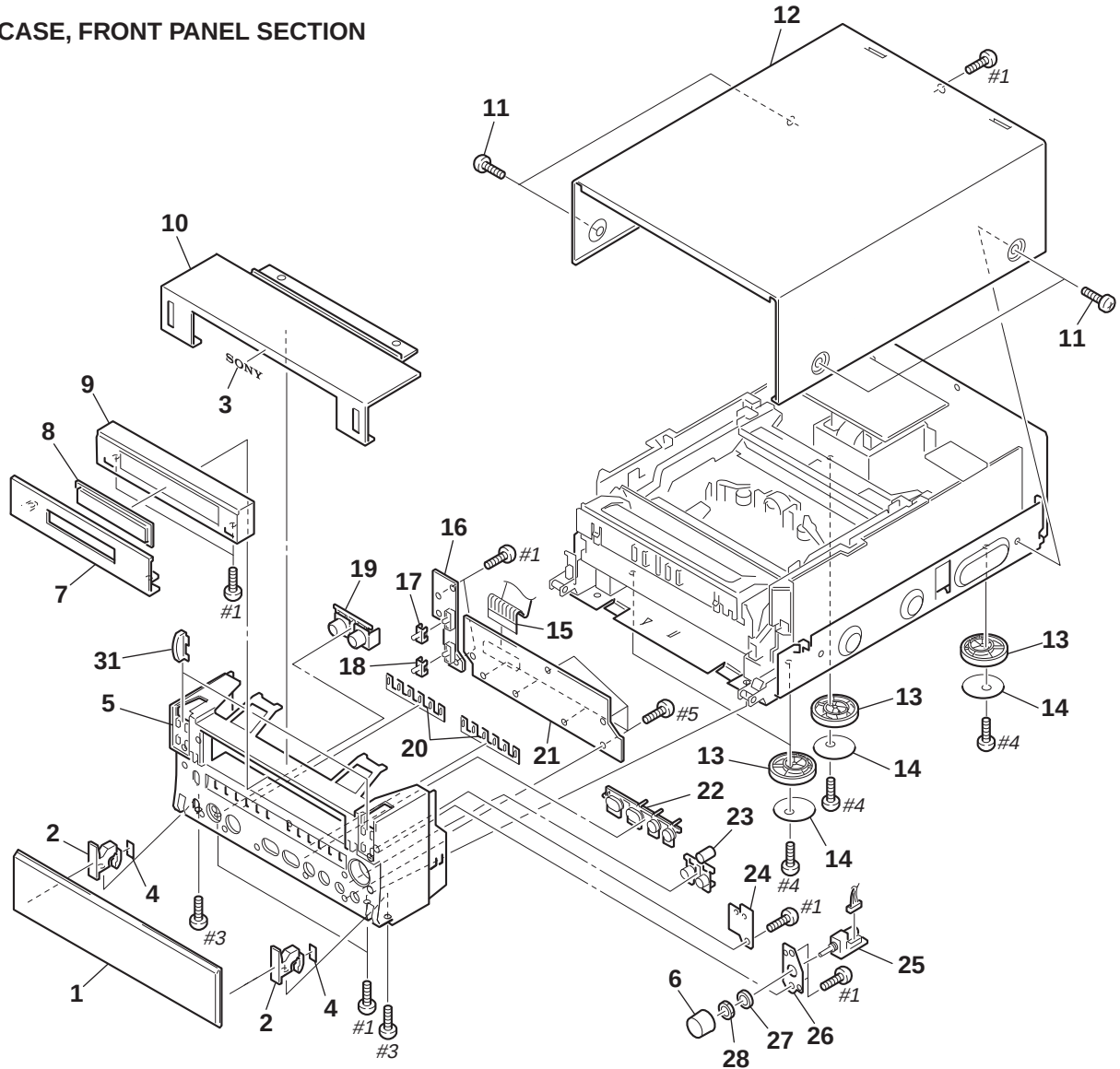
- The mechanical parts with no reference number in the exploded views are not supplied.
- Hardware (# mark) list and accessories and packing materials are given in the last of this parts list.

Abbreviations

HK : Hong Kong
SP : Singapore

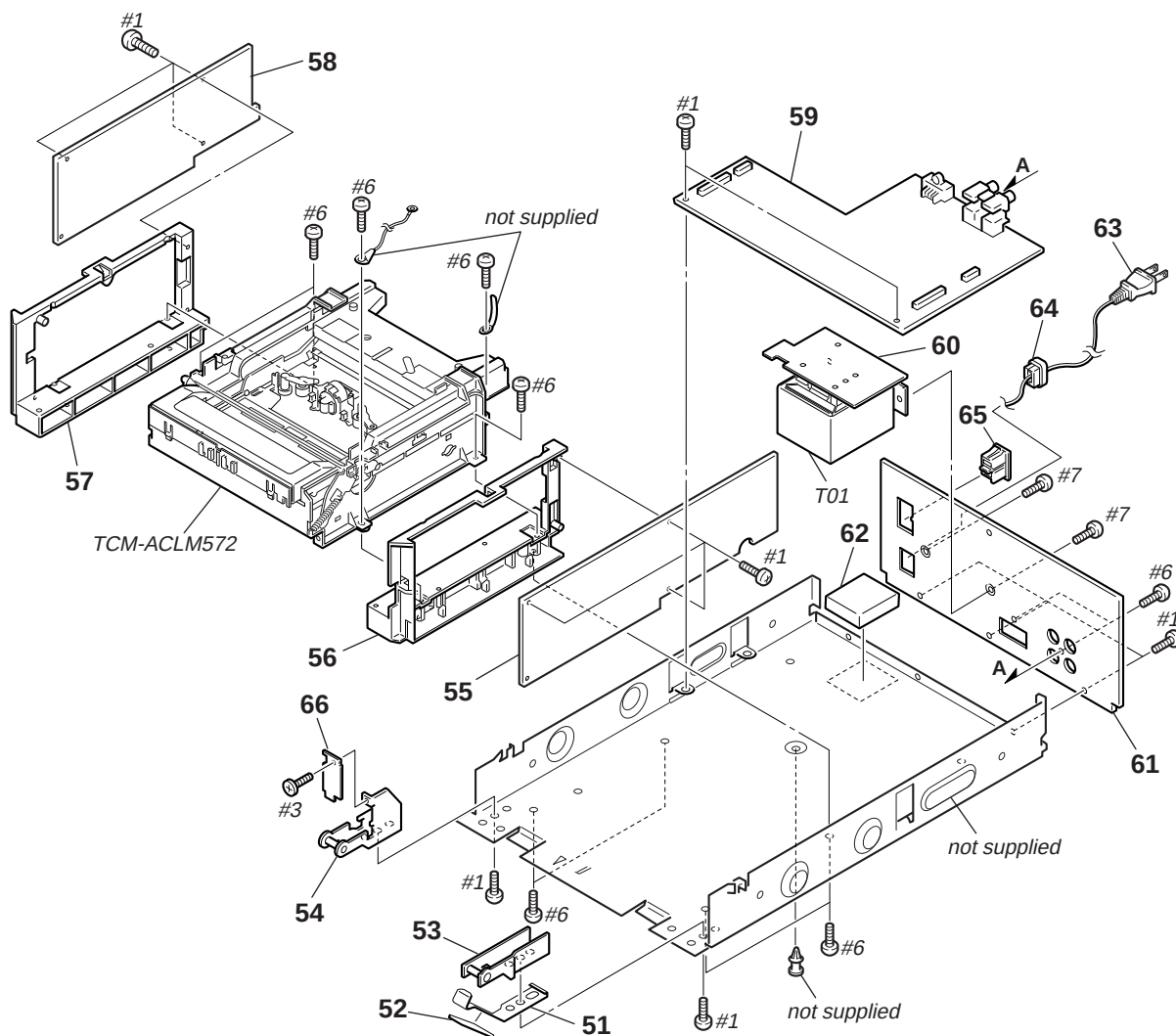
The components identified by mark Δ or dotted line with mark Δ are critical for safety. Replace only with part number specified.

6-1. CASE, FRONT PANEL SECTION



Ref. No.	Part No.	Description	Remarks	Ref. No.	Part No.	Description	Remarks
1	3-033-056-01	WINDOW, GLASS		* 16	A-2007-825-A	CONNECTION BOARD, COMPLETE	
2	4-212-579-11	BRACKET (GLASS)		17	3-033-080-01	DOLBY KNOB	
3	4-942-636-21	EMBLEM (NO.3.5), SONY		18	3-033-078-01	DIRECTION KNOB	
4	4-214-458-01	TAPE		19	4-212-557-01	BUTTON (REC)	
5	3-033-074-01	CHASSIS, FRONT		20	3-033-075-01	LENS	
6	3-033-079-01	REC LEVEL KNOB		* 21	A-2007-817-A	FRONT BOARD, COMPLETE	
7	3-028-756-01	PANEL (AL-TC), LOADING		22	3-033-076-01	BUTTON, PLAY	
8	3-033-054-01	PLATE, LOADING ORNAMENT		23	3-033-077-01	BUTTON, FF	
9	3-033-055-01	LID, LOADING		* 24	A-2007-823-A	O/C SW BOARD, COMPLETE	
10	3-028-755-01	PANEL (AL-TC), FRONT		* 25	1-672-765-11	VR BOARD	
11	3-033-057-01	SCREW, CASE STOPPER		26	3-033-081-01	REC LEVEL BRACKET	
* 12	3-033-052-01	TOP COVER		27	3-033-082-01	VR WASHER 9Q	
* 13	3-033-053-01	FOOT		28	3-033-083-01	NUT, VR	
14	3-033-061-01	FOOT CUSHION		31	4-212-539-02	BUTTON (POWER)	
15	1-773-128-11	WIRE (FLAT TYPE) (19 CORE)					

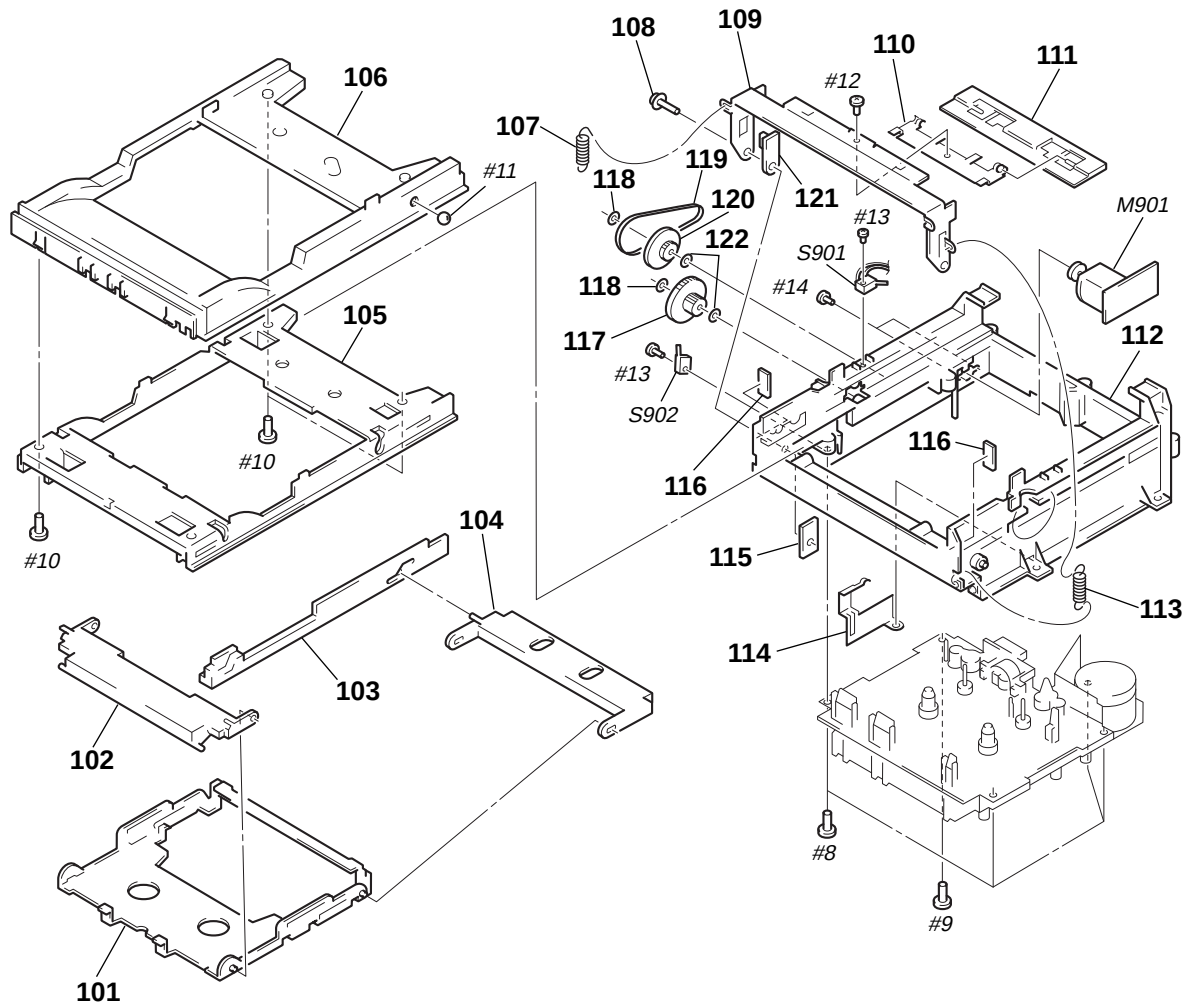
6-2. CHASSIS SECTION



Ref. No.	Part No.	Description	Remarks	Ref. No.	Part No.	Description	Remarks
51	3-033-060-01	SPRING, PLATE		* 59	A-2007-820-A	POWER BOARD, COMPLETE	
52	4-213-692-02	TAPE (SPRING)		* 60	1-672-764-11	POWER TRANS BOARD	
53	X-4950-381-1	BRACKET (R) ASSY		* 61	3-035-607-01	REAR PANEL (AEP, UK)	
54	3-033-050-01	HINGE (L/C), DOOR		* 61	3-035-608-01	REAR PANEL (E, HK, SP)	
* 55	A-2007-818-A	DOLBY BOARD, COMPLETE		* 62	3-033-068-01	CUSHION	
* 56	3-033-063-01	CHASSIS (R), DECK		△ 63	1-555-750-00	CORD, POWER	
* 57	3-033-062-01	CHASSIS (L), DECK		64	3-033-071-01	STOPPER, AC CORD	
* 58	A-2007-819-A	CONTROL BOARD, COMPLETE		△ 65	1-526-794-11	OUTLET, AC	
				* 66	A-2007-824-A	PANEL SW BOARD, COMPLETE	
				△ T01	1-433-657-11	TRANSFORMER, POWER	

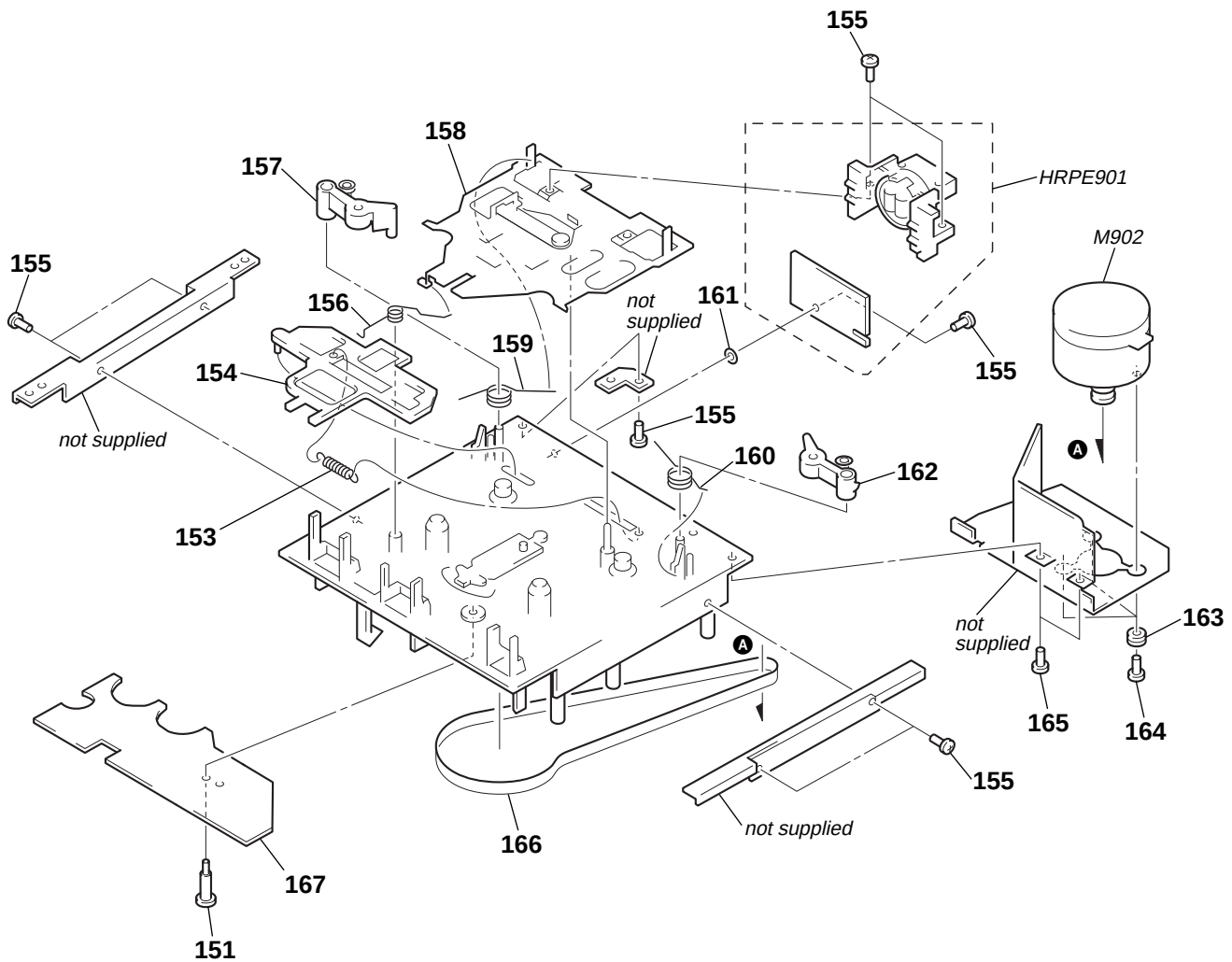
The components identified by mark △ or dotted line with mark △ are critical for safety.
Replace only with part number specified.

6-3. MECHANISM DECK SECTION-1 (TCM-ACLM572)



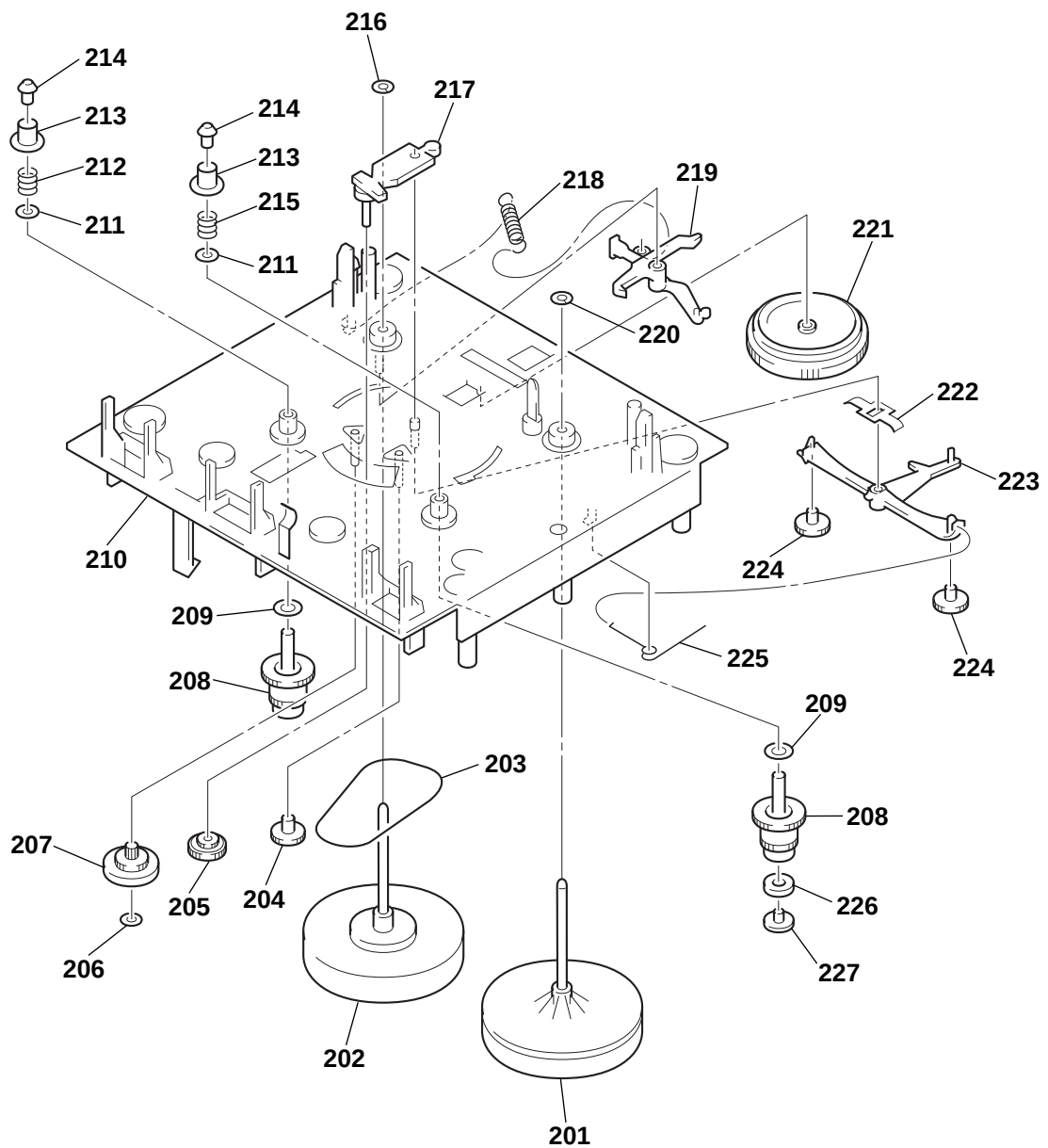
Ref. No.	Part No.	Description	Remarks	Ref. No.	Part No.	Description	Remarks
101	3-017-214-01	HOLDER		114	3-017-234-01	GROUND, PLATE	
102	3-017-215-01	ARM (A)		115	3-017-243-01	NUT	
103	3-017-233-01	RACK, GEAR		116	3-017-242-01	BUFFER	
104	3-017-216-01	ARM (C)		117	3-017-232-01	GEAR (B)	
105	3-017-213-01	CHASSIS		118	3-017-241-01	SCREW (1.6 × 4), SPECIAL	
106	3-017-212-01	TRAY		119	3-017-237-01	BELT (49.2)	
107	3-017-235-01	SPRING (A)		120	3-017-231-01	PULLEY (C)	
108	3-017-244-01	SCREW (1.7 × 8.2), SPECIAL		121	3-017-220-01	ARM	
109	3-017-217-01	ARM (576)		122	3-017-240-01	SCREW (2.1 × 4), SPECIAL	
110	3-017-218-01	RETAINER		M901	3-017-239-01	PULLEY (MOTOR) (LOADING)	
111	3-017-219-01	PLATE		S901	3-017-238-01	LIMITTER (SW MSS-8B) (OPEN)	
112	3-017-211-01	FRAME		S902	3-017-238-01	LIMITTER (SW MSS-8B) (CLOSE)	
113	3-017-236-01	SPRING (B)					

6-4. MECHANISM DECK SECTION-2 (TCM-ACLM572)



Ref. No.	Part No.	Description	Remarks	Ref. No.	Part No.	Description	Remarks
151	3-017-294-01	SCREW (S), SPECIAL		161	3-017-300-01	WASHER, FLAT	
153	3-017-273-01	LEVER (AC), SPRING		162	3-017-255-01	PINCH ROLLER (R)	
154	3-017-270-01	AC, LEVER		163	3-017-296-01	CUSHION (MOTOR)	
155	3-017-279-01	SCREW (M2), SPECIAL		164	3-017-297-01	SCREW (MOTOR)	
156	3-017-274-01	HEAD, SPRING BASE		165	3-017-280-01	SCREW (M2 TAPPING), SPECIAL	
157	3-017-254-01	PINCH ROLLER (F)		166	3-017-285-01	BELT (MAIN)	
158	3-017-253-01	CHASSIS (HEAD)		* 167	1-672-011-11	MODE CONTROL BOARD	
159	3-017-277-01	PINCH (F), SPRING		HRPE901	3-017-303-01	HEAD (REC/PLAY/ERASE)	
160	3-017-278-01	PINCH (R), SPRING		M902	3-017-259-01	PULLEY (MOTOR) (CAPSTAN REEL)	

6-5. MECHANISM DECK SECTION-3 (TCM-ACLM572)



Ref. No.	Part No.	Description	Remarks	Ref. No.	Part No.	Description	Remarks
201	3-017-258-01	FLYWHEEL (R)		214	3-017-262-01	REEL, BUSHING	
202	3-017-257-01	FLYWHEEL (F)		215	3-017-272-01	SPRING (BT)	
203	3-017-284-01	BELT (SUB)		216	3-017-281-01	WASHER, FLAT	
204	3-017-265-01	IDLER, GEAR		217	3-017-256-01	ARM (PLAY)	
205	3-017-305-01	GEAR (P)		218	3-017-275-01	LOCK, SPRING CAM	
206	3-017-283-01	WASHER, FLAT		219	3-017-267-01	LOCK, ARM CAM	
207	3-017-304-01	CLUTCH		220	3-017-282-01	WASHER, FLAT	
208	3-017-263-01	REEL, BASE		221	3-017-264-01	CAM, GEAR	
209	3-017-295-01	WASHER, FLAT		222	3-017-266-01	BASE, LEVER	
210	3-017-252-01	CHASSIS (OS)		223	3-017-268-01	ARM (RF)	
211	3-017-298-01	WASHER (B/T)		224	3-017-269-01	GEAR (RF)	
212	3-017-299-01	SPRING (B/T) (F)		225	3-017-276-01	ARM (RF), SPRING	
213	3-017-288-01	REEL, CAP		226	3-017-293-01	MAGNET, PLATE	
				227	3-017-271-01	CAP (MG)	

CONNECTION

CONTROL

SECTION 7 ELECTRICAL PARTS LIST

NOTE:

- 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.
- -XX, -X mean standardized parts, so they may have some difference from the original one.
- Items marked “*” are not stocked since they are seldom required for routine service. Some delay should be anticipated when ordering these items.
- CAPACITORS:
uF: μ F
- RESISTORS
All resistors are in ohms.
METAL: metal-film resistor
METAL OXIDE: Metal Oxide-film resistor
F: nonflammable
- COILS
uH: μ H
- Abbreviations
HK : Hong Kong
SP : Singapore

- SEMICONDUCTORS
In each case, u: μ , for example:
uA...: μ A..., uPA..., μ PA...,
uPB..., μ PB..., uPC..., μ PC...,
uPD..., μ PD...

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

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

Ref. No.	Part No.	Description	Remarks	Ref. No.	Part No.	Description	Remarks
*	A-2007-825-A	CONNECTION BOARD, COMPLETE *****				< CONNECTOR >	
		< RESISTOR >					
R221	1-247-855-11	CARBON 10K 5%	1/4W	* CN05	1-564-708-11	PIN, CONNECTOR (SMALL TYPE) 6P	
R225	1-247-839-11	CARBON 2.2K 5%	1/4W	CN07	1-785-785-11	SOCKET, CONNECTOR 10P	
R226	1-247-843-11	CARBON 3.3K 5%	1/4W	* CN08	1-564-715-11	PIN, CONNECTOR (SMALL TYPE)13P	
R227	1-247-863-11	CARBON 22K 5%	1/4W	CN09	1-568-802-11	SOCKET, CONNECTOR 19P	
R228	1-247-871-11	CARBON 47K 5%	1/4W	CN12	1-785-779-11	SOCKET, CONNECTOR 13P	
		< SWITCH >		CN12A	1-785-780-11	HEADER, PIN 13P	
S7	1-572-647-11	SWITCH, KEY BOARD (POWER)		* CN14	1-564-704-11	PIN, CONNECTOR (SMALL TYPE) 2P	
S11	1-692-505-11	SWITCH, SLIDE (DIRECTION)				< DIODE >	
S12	1-692-505-11	SWITCH, SLIDE (DOLBY NR)		D02	8-719-911-19	DIODE 1SS119	
*****				D03	8-719-911-19	DIODE 1SS119	
*	A-2007-819-A	CONTROL BOARD, COMPLETE *****		D04	8-719-911-19	DIODE 1SS119	
		< CAPACITOR >		D13	8-719-109-97	DIODE RD6.8ES-B2	
C68	1-162-282-31	CERAMIC 100PF 10%	50V	D14	8-719-109-85	DIODE RD5.1ES-B2	
C69	1-137-372-11	FILM 0.022uF 5%	50V				
C70	1-162-217-31	CERAMIC 56PF 5%	50V	D15	8-719-911-19	DIODE 1SS119	
C71	1-126-961-11	ELECT 2.2uF 20%	50V	D16	8-719-109-85	DIODE RD5.1ES-B2	
C73	1-126-960-11	ELECT 1uF 20%	50V	D19	8-719-055-76	DIODE 1N4148	
				D20	8-719-911-19	DIODE 1SS119	
C74	1-126-916-11	ELECT 1000uF 20%	6.3V	D28	8-719-200-02	DIODE 10E2	
C75	1-161-494-00	CERAMIC 0.022uF	25V			< IC >	
C76	1-126-964-11	ELECT 10uF 20%	50V	IC05	8-759-575-34	IC TMP87CH48DF-4B67	
C77	1-164-159-11	CERAMIC 0.1uF	50V	IC06	8-759-822-09	IC LB1641	
C78	1-162-306-11	CERAMIC 0.01uF 20%	16V	IC07	8-759-165-85	IC PST600H-T	
				IC08	8-759-710-59	IC NJM4580D-D	
C79	1-162-306-11	CERAMIC 0.01uF 20%	16V			< TRANSISTOR >	
C81	1-126-935-11	ELECT 470uF 20%	16V	Q19	8-729-119-76	TRANSISTOR 2SA1175-HFE	
C82	1-126-934-11	ELECT 220uF 20%	16V	Q21	8-729-900-63	TRANSISTOR DTA124ES	
C83	1-162-282-31	CERAMIC 100PF 10%	50V	Q22	8-729-900-63	TRANSISTOR DTA124ES	
C70A	1-126-964-11	ELECT 10uF 20%	50V	Q23	8-729-900-63	TRANSISTOR DTA124ES	
				Q24	8-729-993-43	TRANSISTOR 2SA934R	
C74A	1-164-159-11	CERAMIC 0.1uF	50V	Q25	8-729-993-43	TRANSISTOR 2SA934R	
C76A	1-126-963-11	ELECT 4.7uF 20%	50V	Q26	8-729-029-86	TRANSISTOR DTC124ESA	
C76B	1-104-664-11	ELECT 47uF 20%	16V	Q27	8-729-029-86	TRANSISTOR DTC124ESA	
C77A	1-164-159-11	CERAMIC 0.1uF	50V	Q29	8-729-900-63	TRANSISTOR DTA124ES	
				Q30	8-729-900-63	TRANSISTOR DTA124ES	
		< FILTER >		Q31	8-729-900-63	TRANSISTOR DTA124ES	
CF01	1-579-125-11	VIBRATOR, CERAMIC 8MHz		Q32	8-729-900-63	TRANSISTOR DTA124ES	
				Q33	8-729-900-63	TRANSISTOR DTA124ES	
				Q34	8-729-900-63	TRANSISTOR DTA124ES	
				Q35	8-729-900-63	TRANSISTOR DTA124ES	
				Q36	8-729-900-63	TRANSISTOR DTA124ES	
				Q38	8-729-900-63	TRANSISTOR DTA124ES	

Ref. No.	Part No.	Description				Remarks	Ref. No.	Part No.	Description				Remarks	
< RESISTOR >							*	A-2007-818-A	DOLBY BOARD, COMPLETE					

R76	1-249-437-11	CARBON	47K	5%	1/4W									
R77	1-249-427-11	CARBON	6.8K	5%	1/4W	F			< CAPACITOR >					
R78	1-247-843-11	CARBON	3.3K	5%	1/4W									
R79	1-247-879-11	CARBON	100K	5%	1/4W		C01	1-162-292-31	CERAMIC	680PF	10%	50V		
R80	1-247-879-11	CARBON	100K	5%	1/4W		C02	1-162-292-31	CERAMIC	680PF	10%	50V		
							C03	1-162-282-31	CERAMIC	100PF	10%	50V		
R81	1-247-855-11	CARBON	10K	5%	1/4W		C04	1-162-282-31	CERAMIC	100PF	10%	50V		
R82	1-249-417-11	CARBON	1K	5%	1/4W	F	C05	1-137-372-11	FILM	0.022uF	5%	50V		
R83	1-249-432-11	CARBON	18K	5%	1/4W									
R84	1-249-436-11	CARBON	39K	5%	1/4W		C06	1-137-372-11	FILM	0.022uF	5%	50V		
R85	1-247-879-11	CARBON	100K	5%	1/4W		C07	1-104-664-11	ELECT	47uF	20%	25V		
							C08	1-104-664-11	ELECT	47uF	20%	25V		
R86	1-249-417-11	CARBON	1K	5%	1/4W	F	C09	1-107-714-11	ELECT	10uF	20%	16V		
R87	1-249-413-11	CARBON	470	5%	1/4W	F	C10	1-107-714-11	ELECT	10uF	20%	16V		
R88	1-247-855-11	CARBON	10K	5%	1/4W									
R89	1-247-855-11	CARBON	10K	5%	1/4W		C11	1-126-925-11	ELECT	470uF	20%	10V		
R90	1-249-417-11	CARBON	1K	5%	1/4W	F	C12	1-126-925-11	ELECT	470uF	20%	10V		
							C13	1-137-372-11	FILM	0.022uF	5%	50V		
R91	1-249-417-11	CARBON	1K	5%	1/4W	F	C14	1-137-372-11	FILM	0.022uF	5%	50V		
R96	1-247-855-11	CARBON	10K	5%	1/4W		C15	1-126-964-11	ELECT	10uF	20%	50V		
R97	1-249-417-11	CARBON	1K	5%	1/4W	F								
R98	1-247-855-11	CARBON	10K	5%	1/4W		C16	1-107-714-11	ELECT	10uF	20%	16V		
R99	1-249-417-11	CARBON	1K	5%	1/4W	F	C17	1-162-288-31	CERAMIC	330PF	10%	50V		
							C18	1-162-288-31	CERAMIC	330PF	10%	50V		
R100	1-247-807-11	CARBON	100	5%	1/4W		C19	1-107-609-11	CERAMIC	75PF	5%	500V		
R101	1-247-855-11	CARBON	10K	5%	1/4W		C20	1-107-609-11	CERAMIC	75PF	5%	500V		
R102	1-247-847-11	CARBON	4.7K	5%	1/4W									
R103	1-247-807-11	CARBON	100	5%	1/4W		C21	1-107-610-11	CERAMIC	82PF	5%	500V		
R104	1-249-427-11	CARBON	6.8K	5%	1/4W	F	C22	1-107-610-11	CERAMIC	82PF	5%	500V		
							C23	1-136-562-11	FILM	0.0082uF	5%	630V		
R105	1-249-427-11	CARBON	6.8K	5%	1/4W	F	C24	1-126-961-11	ELECT	2.2uF	20%	50V		
R107	1-249-398-11	CARBON	27	5%	1/4W	F	C25	1-137-436-11	FILM	0.0039uF	5%	50V		
R109	1-247-867-11	CARBON	33K	5%	1/4W									
R110	1-247-807-11	CARBON	100	5%	1/4W		C26	1-137-436-11	FILM	0.0039uF	5%	50V		
R111	1-247-879-11	CARBON	100K	5%	1/4W		C27	1-137-370-11	FILM	0.01uF	5%	50V		
							C28	1-126-960-11	ELECT	1uF	20%	50V		
R112	1-249-430-11	CARBON	12K	5%	1/4W		C29	1-104-665-11	ELECT	100uF	20%	25V		
R113	1-249-440-11	CARBON	82K	5%	1/4W		C30	1-126-961-11	ELECT	2.2uF	20%	50V		
R114	1-249-417-11	CARBON	1K	5%	1/4W	F								
R116	1-249-427-11	CARBON	6.8K	5%	1/4W	F	C33	1-126-963-11	ELECT	4.7uF	20%	50V		
R117	1-249-412-11	CARBON	390	5%	1/4W	F	C34	1-126-963-11	ELECT	4.7uF	20%	50V		
							C35	1-162-282-31	CERAMIC	100PF	10%	50V		
R20A	1-247-855-11	CARBON	10K	5%	1/4W		C36	1-162-282-31	CERAMIC	100PF	10%	50V		
R200	1-249-412-11	CARBON	390	5%	1/4W	F	C37	1-126-964-11	ELECT	10uF	20%	50V		
R201	1-249-412-11	CARBON	390	5%	1/4W	F								
R202	1-249-412-11	CARBON	390	5%	1/4W	F	C38	1-126-964-11	ELECT	10uF	20%	50V		
R203	1-249-412-11	CARBON	390	5%	1/4W	F	C39	1-136-165-00	FILM	0.1uF	5%	50V		
							C40	1-136-165-00	FILM	0.1uF	5%	50V		
R204	1-249-409-11	CARBON	220	5%	1/4W	F	C41	1-136-163-00	FILM	0.068uF	5%	50V		
R205	1-249-409-11	CARBON	220	5%	1/4W	F	C42	1-136-163-00	FILM	0.068uF	5%	50V		
R206	1-249-412-11	CARBON	390	5%	1/4W	F								
R207	1-249-412-11	CARBON	390	5%	1/4W	F	C43	1-126-964-11	ELECT	10uF	20%	50V		
R208	1-249-412-11	CARBON	390	5%	1/4W	F	C44	1-126-964-11	ELECT	10uF	20%	50V		
							C45	1-104-665-11	ELECT	100uF	20%	10V		
R209	1-249-412-11	CARBON	390	5%	1/4W	F	C46	1-104-665-11	ELECT	100uF	20%	10V		
R210	1-249-412-11	CARBON	390	5%	1/4W	F	C47	1-126-960-11	ELECT	1uF	20%	50V		
R211	1-249-412-11	CARBON	390	5%	1/4W	F								
R212	1-249-412-11	CARBON	390	5%	1/4W	F	C60	1-126-960-11	ELECT	1uF	20%	50V		
R214	1-249-412-11	CARBON	390	5%	1/4W	F	C61	1-126-960-11	ELECT	1uF	20%	50V		
							C62	1-126-961-11	ELECT	2.2uF	20%	50V		
R404	1-249-437-11	CARBON	47K	5%	1/4W		C63	1-126-961-11	ELECT	2.2uF	20%	50V		
R102A	1-247-855-11	CARBON	10K	5%	1/4W		C64	1-162-282-31	CERAMIC	100PF	10%	50V		
< CIRCUIT BLOCK >							C65	1-162-282-31	CERAMIC	100PF	10%	50V		
RA01	1-234-267-11	CIRCUIT BLOCK, COMPOSITION (10K × 11)					C66	1-162-306-11	CERAMIC	0.01uF	20%	16V		
*****							C67	1-162-306-11	CERAMIC	0.01uF	20%	16V		
							C400	1-126-960-11	ELECT	1uF	20%	50V		
							C401	1-126-960-11	ELECT	1uF	20%	50V		

Ref. No.	Part No.	Description	Remarks	Ref. No.	Part No.	Description	Remarks
< CONNECTOR >				R11	1-247-855-11	CARBON 10K 5%	1/4W
* CN01	1-564-707-11	PIN, CONNECTOR (SMALL TYPE) 5P		R12	1-247-855-11	CARBON 10K 5%	1/4W
CN04	1-785-778-11	SOCKET, CONNECTOR 8P		R13	1-247-843-11	CARBON 3.3K 5%	1/4W
< DIODE >				R14	1-247-843-11	CARBON 3.3K 5%	1/4W
D01	8-719-911-19	DIODE 1SS119		R15	1-249-431-11	CARBON 15K 5%	1/4W
D05	8-719-911-19	DIODE 1SS119		R16	1-249-431-11	CARBON 15] 5%	1/4W
D06	8-719-911-19	DIODE 1SS119		R17	1-249-387-11	CARBON 3.3 5%	1/4W F
< IC >				R18	1-247-847-11	CARBON 4.7K 5%	1/4W
IC01	8-759-112-93	IC UPC4570HA-1		R19	1-249-390-11	CARBON 5.6 5%	1/4W F
IC02	8-752-060-46	IC CXA1561S		R20	1-249-432-11	CARBON 18K 5%	1/4W
IC03	8-752-070-69	IC CXA1598S		R21	1-249-432-11	CARBON 18K 5%	1/4W
< COIL >				R22	1-249-424-11	CARBON 3.9K 5%	1/4W F
L01	1-414-223-11	INDUCTOR 470uH		R23	1-249-432-11	CARBON 18K 5%	1/4W
L02	1-414-223-11	INDUCTOR 470uH		R24	1-249-420-11	CARBON 1.8K 5%	1/4W F
L03	1-410-780-11	INDUCTOR 27mH		R25	1-247-838-11	CARBON 2K 5%	1/4W
L04	1-410-780-11	INDUCTOR 27mH		R28	1-247-855-11	CARBON 10K 5%	1/4W
L07	1-429-316-11	TRANSFORMER, BIAS OSCILLATION (BIAS)		R29	1-247-855-11	CARBON 10K 5%	1/4W
< FILTER >				R30	1-247-855-11	CARBON 10K 5%	1/4W
LPF05	1-236-087-11	FILTER, LOW PASS		R31	1-247-855-11	CARBON 10K 5%	1/4W
LPF06	1-236-087-11	FILTER, LOW PASS		R32	1-247-843-11	CARBON 3.3K 5%	1/4W
< TRANSISTOR >				R33	1-247-843-11	CARBON 3.3K 5%	1/4W
Q01	8-729-029-86	TRANSISTOR DTC124ESA		R34	1-249-428-11	CARBON 8.2K 5%	1/4W F
Q02	8-729-029-86	TRANSISTOR DTC124ESA		R36	1-247-863-11	CARBON 22K 5%	1/4W
Q03	8-729-029-68	TRANSISTOR DTC114TSA		R37	1-247-863-11	CARBON 22K 5%	1/4W
Q04	8-729-029-68	TRANSISTOR DTC114TSA		R38	1-249-418-11	CARBON 1.2K 5%	1/4W F
Q05	8-729-231-55	TRANSISTOR 2SC2878-AB		R39	1-249-418-11	CARBON 1.2K 5%	1/4W F
Q06	8-729-231-55	TRANSISTOR 2SC2878-AB		R40	1-247-863-11	CARBON 22K 5%	1/4W
Q07	8-729-029-86	TRANSISTOR DTC124ESA		R41	1-247-863-11	CARBON 22K 5%	1/4W
Q08	8-729-142-46	TRANSISTOR 2SC2001-LK		R44	1-247-883-00	CARBON 150K 5%	1/4W
Q09	8-729-142-46	TRANSISTOR 2SC2001-LK		R45	1-249-428-11	CARBON 8.2K 5%	1/4W F
Q10	8-729-140-96	TRANSISTOR 2SD774-34		R46	1-249-428-11	CARBON 8.2K 5%	1/4W F
Q11	8-729-900-63	TRANSISTOR DTA124ES		R49	1-247-839-11	CARBON 2.2K 5%	1/4W
Q12	8-729-029-86	TRANSISTOR DTC124ESA		R50	1-247-839-11	CARBON 2.2K 5%	1/4W
Q13	8-729-029-86	TRANSISTOR DTC124ESA		R51	1-247-839-11	CARBON 2.2K 5%	1/4W
Q14	8-729-029-68	TRANSISTOR DTC114TSA		R52	1-247-839-11	CARBON 2.2K 5%	1/4W
Q15	8-729-029-68	TRANSISTOR DTC114TSA		R53	1-247-843-11	CARBON 3.3K 5%	1/4W
Q16	8-729-029-86	TRANSISTOR DTC124ESA		R54	1-247-843-11	CARBON 3.3K 5%	1/4W
Q17	8-729-029-86	TRANSISTOR DTC124ESA		R55	1-249-417-11	CARBON 1K 5%	1/4W F
Q18	8-729-029-86	TRANSISTOR DTC124ESA		R56	1-249-417-11	CARBON 1K 5%	1/4W F
Q45	8-729-194-57	TRANSISTOR 2SC945-P		R57	1-249-436-11	CARBON 39K 5%	1/4W
Q12A	8-729-900-63	TRANSISTOR DTA124ES		R58	1-249-431-11	CARBON 15K 5%	1/4W
Q13A	8-729-900-63	TRANSISTOR DTA124ES		R59	1-247-879-11	CARBON 100K 5%	1/4W
< RESISTOR >				R60	1-249-439-11	CARBON 68K 5%	1/4W
R01	1-247-881-00	CARBON 120K 5%	1/4W	R61	1-247-867-11	CARBON 33K 5%	1/4W
R02	1-247-881-00	CARBON 120K 5%	1/4W	R62	1-247-883-00	CARBON 150K 5%	1/4W
R03	1-247-881-00	CARBON 120K 5%	1/4W	R63	1-249-438-11	CARBON 56K 5%	1/4W
R04	1-247-881-00	CARBON 120K 5%	1/4W	R64	1-249-432-11	CARBON 18K 5%	1/4W
R05	1-247-850-11	CARBON 6.2K 5%	1/4W	R65	1-247-883-00	CARBON 150K 5%	1/4W
R06	1-247-850-11	CARBON 6.2K 5%	1/4W	R66	1-249-430-11	CARBON 12K 5%	1/4W
R07	1-249-404-00	CARBON 82 5%	1/4W F	R67	1-247-849-11	CARBON 5.6K 5%	1/4W
R08	1-249-404-00	CARBON 82 5%	1/4W F	R68	1-249-431-11	CARBON 15K 5%	1/4W
R09	1-247-839-11	CARBON 2.2K 5%	1/4W	R69	1-249-436-11	CARBON 39K 5%	1/4W
R10	1-247-839-11	CARBON 2.2K 5%	1/4W	R70	1-247-863-11	CARBON 22K 5%	1/4W
				R71	1-247-876-11	CARBON 75K 5%	1/4W
				R72	1-247-876-11	CARBON 75K 5%	1/4W
				R73	1-249-431-11	CARBON 15K 5%	1/4W
				R74	1-249-431-11	CARBON 15K 5%	1/4W
				R75	1-249-434-11	CARBON 27K 5%	1/4W
				R01A	1-249-393-11	CARBON 10 5%	1/4W F
				R015	1-249-409-11	CARBON 220 5%	1/4W F

DOLBY

FRONT

MODE CONTROL

Ref. No.	Part No.	Description	Remarks	Ref. No.	Part No.	Description	Remarks
R016	1-249-409-11	CARBON	220 5% 1/4W F	< RESISTOR >			
R19A	1-249-390-11	CARBON	5.6 5% 1/4W F	R215	1-247-827-11	CARBON 680 5% 1/4W	
R40A	1-247-847-11	CARBON	4.7K 5% 1/4W	R216	1-249-417-11	CARBON 1K 5% 1/4W F	
R400	1-247-903-00	CARBON	1M 5% 1/4W	R217	1-247-835-11	CARBON 1.5K 5% 1/4W	
R401	1-249-417-11	CARBON	1K 5% 1/4W F	R218	1-247-839-11	CARBON 2.2K 5% 1/4W	
R402	1-249-424-11	CARBON	3.9K 5% 1/4W F	R219	1-247-843-11	CARBON 3.3K 5% 1/4W	
R403	1-247-855-11	CARBON	10K 5% 1/4W	R220	1-247-847-11	CARBON 4.7K 5% 1/4W	
R41A	1-247-847-11	CARBON	4.7K 5% 1/4W	R222	1-247-827-11	CARBON 680 5% 1/4W	
R44A	1-247-862-11	CARBON	20K 5% 1/4W	R223	1-249-417-11	CARBON 1K 5% 1/4W F	
R45A	1-249-389-11	CARBON	4.7 5% 1/4W F	R224	1-247-835-11	CARBON 1.5K 5% 1/4W	
R46A	1-249-389-11	CARBON	4.7 5% 1/4W F	R230	1-249-409-11	CARBON 220 5% 1/4W F	
R57A	1-247-871-11	CARBON	47K 5% 1/4W	R231	1-249-409-11	CARBON 220 5% 1/4W F	
< RELAY >				R232	1-249-409-11	CARBON 220 5% 1/4W F	
RY01	1-755-294-11	RELAY		R233	1-249-409-11	CARBON 220 5% 1/4W F	
< VARIABLE RESISTOR >				< SWITCH >			
SRF01	1-238-598-11	RES, ADJ, CARBON 2.2K (PB LEVEL L)		S1	1-572-647-11	SWITCH, KEY BOARD (STOP)	
SRF02	1-238-598-11	RES, ADJ, CARBON 2.2K (PB LEVEL R)		S2	1-572-647-11	SWITCH, KEY BOARD (PAUSE)	
SRF03	1-241-768-11	RES, ADJ, CARBON 220K (BIAS CURRENT L)		S3	1-572-647-11	SWITCH, KEY BOARD (PLAY)	
SRF04	1-241-768-11	RES, ADJ, CARBON 220K (BIAS CURRENT R)		S4	1-572-647-11	SWITCH, KEY BOARD (REV)	
SRF11	1-238-600-11	RES, ADJ, CARBON 10K (REC LEVEL L)		S5	1-572-647-11	SWITCH, KEY BOARD (CD SYNC)	
SRF12	1-238-600-11	RES, ADJ, CARBON 10K (REC LEVEL R)		S6	1-572-647-11	SWITCH, KEY BOARD (REC)	
*****				S9	1-572-647-11	SWITCH, KEY BOARD (FF)	
*****				S10	1-572-647-11	SWITCH, KEY BOARD (REW)	
*****				*****			
* A-2007-817-A FRONT BOARD, COMPLETE				* 1-672-011-11 MODE CONTROL BOARD			
*****				*****			
< CONNECTOR >				3-017-287-01 TERMINAL (RP)			
CN09	1-785-783-11	CONNECTOR, FFC/FPC 19P		< DIODE >			
< LED >				D001	8-719-911-19	DIODE 1N4148M	
LED1	8-719-072-76	LED SEL5E23C-TP15 (REV)		D002	8-719-911-19	DIODE 1N4148M	
LED2	8-719-072-76	LED SEL5E23C-TP15 (PLAY)		< IC >			
LED3	8-719-072-76	LED SEL5E23C-TP15 (PAUSE)		IC001	3-017-289-01	PLATE, ROTARY DETECTION	
LED4	8-719-072-76	LED SEL5E23C-TP15 (STOP)		< PLUNGER SOLENOID >			
LED5	8-719-304-83	LED SEL2410G (-10)		PM001	3-017-292-01	SOLENOID	
LED6	8-719-304-83	LED SEL2410G (-5)		< SWITCH >			
LED7	8-719-304-83	LED SEL2410G (0)		S001	3-017-290-01	DETECT, SWITCH (FWD REC)	
LED8	8-719-812-41	LED TLR124 (+3)		S002	3-017-290-01	DETECT, SWITCH (HALF)	
LED9	8-719-812-41	LED TLR124 (+6)		S003	3-017-290-01	DETECT, SWITCH (CrO2)	
LED10	8-719-058-04	LED SEL5223S-TP15 (CD SYNC)		S004	3-017-290-01	DETECT, SWITCH (METAL)	
LED11	8-719-058-04	LED SEL5223S-TP15 (REC)		S005	3-017-290-01	DETECT, SWITCH (REV REC)	
LED12	8-719-300-97	LED SEL2710K (PAUSE)		S006	3-017-291-01	MODE, SWITCH (MODE)	
LED13	8-719-311-60	LED SEL2810D-C (REW)		< RESISTOR >			
LED14	8-719-311-60	LED SEL2810D-C (FF)		R001	1-247-862-11	CARBON 20K 5% 1/4W	
LED15	8-719-304-83	LED SEL2410G (REV)		*****			
LED16	8-719-304-83	LED SEL2410G (PLAY)		*****			
LED17	8-719-304-83	LED SEL2410G (∞)		*****			
LED18	8-719-812-41	LED TLR124 (TAPE)		*****			

O/C SW

PANEL SW

POWER

POWER TRANS

Ref. No.	Part No.	Description	Remarks
*	A-2007-823-A	O/C SW BOARD, COMPLETE *****	
		< SWITCH >	
S8	1-572-647-11	SWITCH, KEY BOARD (EJECT) *****	
*	A-2007-824-A	PANEL SW BOARD, COMPLETE *****	
		< SWITCH >	
S15	1-771-612-11	SWITCH, DETECTION (PANEL SW) *****	
*	A-2007-820-A	POWER BOARD, COMPLETE *****	
		< CAPACITOR >	
C31	1-162-290-31	CERAMIC 470PF 10% 50V	
C32	1-162-290-31	CERAMIC 470PF 10% 50V	
C48	1-126-925-11	ELECT 470uF 20% 10V	
C49	1-126-925-11	ELECT 470uF 20% 10V	
C50	1-164-159-11	CERAMIC 0.1uF 50V	
C51	1-162-294-31	CERAMIC 0.001uF 10% 50V	
C52	1-162-294-31	CERAMIC 0.001uF 10% 50V	
C53	1-164-159-11	CERAMIC 0.1uF 50V	
C54	1-126-943-11	ELECT 2200uF 20% 25V	
C55	1-126-943-11	ELECT 2200uF 20% 25V	
C56	1-126-943-11	ELECT 2200uF 20% 25V	
C57	1-162-306-11	CERAMIC 0.01uF 20% 16V	
C58	1-126-926-11	ELECT 1000uF 20% 10V	
C59	1-126-960-11	ELECT 1uF 20% 50V	
C84	1-102-129-00	CERAMIC 10000PF 10% 50V	
C85	1-102-129-00	CERAMIC 10000PF 10% 50V	
C86	1-102-129-00	CERAMIC 10000PF 10% 50V	
C87	1-102-129-00	CERAMIC 10000PF 10% 50V	
C90	1-164-159-11	CERAMIC 0.1uF 50V	
C91	1-164-159-11	CERAMIC 0.1uF 50V	
C90A	1-124-261-00	ELECT 10uF 20% 50V	
		< CONNECTOR >	
* CN03	1-566-856-11	SOCKET, CONNECTOR 5P (SYSTEM CONTROL)	
CN04	1-785-781-11	HEADER, PIN 8P	
CN06	1-564-707-11	PIN, CONNECTOR (SMALL TYPE) 5P	
CN07	1-785-782-11	HEADER, PIN 10P	
* CN15	1-564-706-11	PIN, CONNECTOR (SMALL TYPE) 4P	
CN12A	1-785-780-11	HEADER, PIN 13P	
		< DIODE >	
D07	8-719-991-33	DIODE 1SS133T-77	
D12	8-719-031-85	DIODE 1N4002L	
D17	8-719-073-77	DIODE W005M	
D22	8-719-031-85	DIODE 1N4002L	
D23	8-719-031-85	DIODE 1N4002L	
D24	8-719-031-85	DIODE 1N4002L	
D25	8-719-031-85	DIODE 1N4002L	
D36	8-719-991-33	DIODE 1SS133T-77	
D37	8-719-991-33	DIODE 1SS133T-77	

Ref. No.	Part No.	Description	Remarks
		< IC >	
IC04	8-759-288-53	IC LA5617	
IC10	8-759-604-35	IC M5F78M05L	
IC11	8-759-549-81	IC P82B715TD.112	
		< JACK >	
JK01	1-785-822-11	JACK, PIN (TAPE)	
		< TRANSISTOR >	
Q20	8-729-119-78	TRANSISTOR 2SC403SP-51	
Q37	8-729-029-68	TRANSISTOR DTC114TSA	
Q39	8-729-029-68	TRANSISTOR DTC114TSA	
Q40	8-729-900-63	TRANSISTOR DTA124ES	
Q41	8-729-900-63	TRANSISTOR DTA124ES	
Q42	8-729-012-83	TRANSISTOR 2SK679A	
Q43	8-729-012-83	TRANSISTOR 2SK679A	
Q05A	8-729-231-55	TRANSISTOR 2SC2878-AB	
Q06A	8-729-231-55	TRANSISTOR 2SC2878-AB	
		< RESISTOR >	
R26	1-247-879-11	CARBON 100K 5% 1/4W	
R27	1-247-879-11	CARBON 100K 5% 1/4W	
R35	1-247-855-11	CARBON 10K 5% 1/4W	
R42	1-247-839-11	CARBON 2.2K 5% 1/4W	
R43	1-247-839-11	CARBON 2.2K 5% 1/4W	
R115	1-247-855-11	CARBON 10K 5% 1/4W	
R119	1-247-713-11	CARBON 1K 5% 1/4W	F
R120	1-247-855-11	CARBON 10K 5% 1/4W	
R121	1-247-855-11	CARBON 10K 5% 1/4W	
R122	1-247-855-11	CARBON 10K 5% 1/4W	
R123	1-249-417-11	CARBON 1K 5% 1/4W	F
R124	1-247-879-11	CARBON 100K 5% 1/4W	
R125	1-247-855-11	CARBON 10K 5% 1/4W	
R126	1-247-855-11	CARBON 10K 5% 1/4W	
R213	1-247-863-11	CARBON 22K 5% 1/4W	
R302	1-247-879-11	CARBON 100K 5% 1/4W	
R303	1-249-417-11	CARBON 1K 5% 1/4W	F
R304	1-249-417-11	CARBON 1K 5% 1/4W	F
R305	1-247-879-11	CARBON 100K 5% 1/4W	
R306	1-247-807-11	CARBON 100 5% 1/4W	
R307	1-247-807-11	CARBON 100 5% 1/4W	
R35A	1-249-417-11	CARBON 1K 5% 1/4W	F
R38A	1-247-847-11	CARBON 4.7K 5% 1/4W	
R39A	1-247-847-11	CARBON 4.7K 5% 1/4W	

*	1-672-764-11	POWER TRANS BOARD *****	
		< TRANSFORMER >	
△ T01	1-433-657-11	TRANSFORMER, POWER *****	

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

Ref. No.	Part No.	Description	Remarks	Ref. No.	Part No.	Description	Remarks
*	1-672-765-11	VR BOARD *****				***** HARDWARE LIST *****	
		< VARIABLE RESISTOR >		#1	7-685-534-19	SCREW +B 2.6 × 8 (TYPE2)	
VR02	1-225-749-11	RES, VAR, CARBON 50K/50K (REC LEVEL)		#3	7-685-533-19	SCREW +B 2.6 × 6 (TYPE2)	
*****				#4	7-685-535-19	SCREW +B 2.6 × 10 (TYPE2)	
		MISCELLANEOUS *****		#6	7-685-547-19	SCREW +B 3 × 10 (TYPE2)	
15	1-773-128-11	WIRE (FLAT TYPE) (19 CORE)		#7	7-682-903-11	SCREW +PWH 3 × 6	
△ 63	1-555-750-00	CORD, POWER		#8	7-685-645-79	SCREW +P 3 × 6 TYPE2 NON-SLIT	
△ 65	1-526-794-11	OUTLET, AC		#9	7-685-146-11	SCREW +P 3 × 8 TYPE2 NON-SLIT	
HRPE901	3-017-303-01	HEAD (REC/PLAY/ERASE)		#10	7-685-132-19	SCREW +P 2.6 × 5 TYPE2 NON-SLIT	
M901	3-017-239-01	PULLEY (MOTOR) (LOADING)		#11	7-671-157-01	BALL, STAINLESS (5 DIA)	
M902	3-017-259-01	PULLEY (MOTOR)(CAPSTAN REEL)		#12	7-627-551-18	SCREW,PRECISION +P 1.4 × 2	
S901	3-017-238-01	LIMITTER (SW MSS-8B)(OPEN)		#13	7-685-105-19	SCREW +P 2 × 8 TYPE2 NON-SLIT	
S902	3-017-238-01	LIMITTER (SW MSS-8B)(CLOSE)		#14	7-621-772-10	SCREW +P 2 × 4	
*****				The components identified by mark △ or dotted line with mark △ are critical for safety. Replace only with part number specified.			
		ACCESSORIES & PACKING MATERIALS *****					
1-790-441-11		CABLE, IC CONNECTOR 5P (SYSTEM CABLE)					
3-020-441-01		BRACKET (PATCH CORD)(AUDIO CABLE)					
3-864-773-11		MANUAL, INSTRUCTION (ENGLISH)					
3-864-773-21		MANUAL, INSTRUCTION (FRENCH/SPANISH) (AEP, UK, E, SP)					
3-864-773-31		MANUAL, INSTRUCTION (GERMAN/DUTCH/ SWEDISH/ITALIAN/PORTUGUESE) (AEP, UK)					
3-864-773-41		MANUAL, INSTRUCTION (CHINESE) (E, HK, SP)					
