

CDP-915/915E

SERVICE MANUAL

AEP Model
CDP-915

UK Model
CDP-915E



Photo : CDP-915E

Model Name Using Similar Mechanism	CDP-911/911E
CD Mechanism Type	CDM25B-5BD10B
Base Unit Type	BU-5BD10B
Optical Pick-up Type	KSS-240A

SPECIFICATIONS

Compact disc player

Laser	Semiconductor laser
Wavelength	780 – 790 nm
Frequency response	2 Hz to 20 kHz ± 0.3 dB
Signal-to-noise ratio	More than 116 dB
Dynamic range	More than 100 dB
Harmonic distortion	Less than 0.0024%
Channel separation	More than 110 dB

Outputs

LINE OUT (FIXED) (phono jacks)	Output level 2 V (at 50 kilohms) Load impedance over 10 kilohms
LINE OUT (VARIABLE) (phono jacks)	Output level max. 2 V (at 50 kilohms) Load impedance over 50 kilohms
DIGITAL OUT (OPTICAL) (optical output connector)	Wave length 660 nm Output level -18 dBm
PHONES (stereo phone jack)	Output level max. 28 mW Load impedance 32 ohms

General

Power requirements	CDP-915 (Continental European model): 220 V – 230 V AC, 50/60 Hz CDP-915E (UK model): 240 V AC, 50 Hz
Power consumption	16 W
Dimensions (approx., including projections)	430 x 110 x 355 mm (w/h/d) (17 x 4 $\frac{5}{16}$ x 14 inches)
Mass (approx.)	CDP-915: 4.9 kg (10 lbs 13 oz) CDP-915E: 5.4 kg (11 lbs 15 oz)

Remote commander

Remote control system	Infrared control
Power requirements	3 V DC with two R6 (size AA) batteries
Dimensions (approx., including projections)	62 x 18 x 175 mm (w/h/d) (2 $\frac{1}{2}$ x $\frac{23}{32}$ x 7 inches)
Mass (approx.)	130 g (4.6 oz)

Supplied accessories

Audio cord	(1) (2 phono plugs – 2 phono plugs)
Remote commander	(1)
Sony SUM-3 (NS) batteries	(2)

Design and specifications are subject to change without notice.

COMPACT DISC PLAYER
SONY®

The laser component in this product is capable of emitting radiation exceeding the limit for Class 1.

CLASS 1 LASER PRODUCT
LUOKAN 1 LASERLAITE
KLASS 1 LASERAPPARAT

This appliance is classified as a CLASS 1 LASER product. The CLASS 1 LASER PRODUCT MARKING is located on the rear exterior.

The following caution label is located inside of the unit.

CAUTION	: INVISIBLE LASER RADIATION WHEN OPEN. AVOID EXPOSURE TO BEAM.
ADVARSEL	: USYNLIG LASERSTRÅLING VED ÅBNING NÅR SIKKERHEDSAFBRYDERE ER UDE AF FUNKTION. UNDGÅ UDSÆTTELSE FOR STRÅLING.
VARO!	: AVATTAESSA JA SUOJALUKITUS OHITETTAESSA OLET ALTTIINA LASERSATEILYLLE.
VARNING	: LASERSTRÅLING NÅR DENNA DEL ÄR ÖPPNAD OCH SPÄRREN ÄR URKOPPLAD.
ADVARSEL	: USYNLIG LASERSTRÅLING NÅR DEKSEL ÅPNES UNNGÅ EKSPONERING FOR STRÅLEN

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.

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SAFETY-RELATED COMPONENT WARNING !!

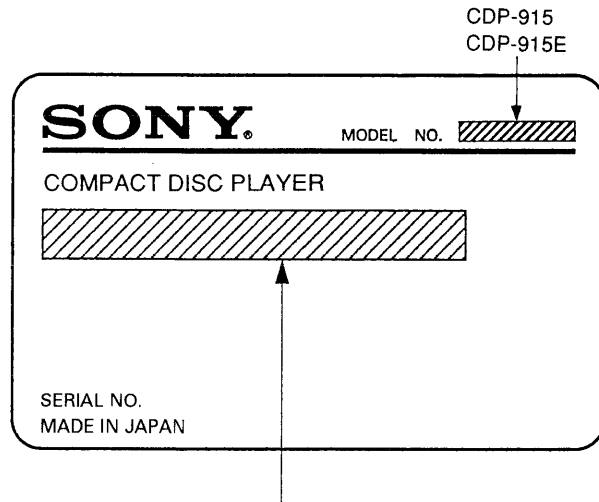
COMPONENTS IDENTIFIED BY MARK Δ OR DOTTED LINE WITH MARK Δ ON THE SCHEMATIC DIAGRAMS AND IN THE PARTS LIST ARE CRITICAL TO SAFE OPERATION. REPLACE THESE COMPONENTS WITH SONY PARTS WHOSE PART NUMBERS APPEAR AS SHOWN IN THIS MANUAL OR IN SUPPLEMENTS PUBLISHED BY SONY.

SECTION 1

SERVICING NOTE

MODEL IDENTIFICATION

— SPECIFICATION LABEL —



AEP, German MODEL : AC220—230V, 50/60Hz, 16W
 UK MODEL : AC240V, 50Hz

NOTES ON HANDLING THE OPTICAL PICK-UP BLOCK OR BASE UNIT

The laser diode in the optical pick-up block may suffer electrostatic break-down because of the potential difference generated by the charged electrostatic load, etc. on clothing and the human body.

During repair, pay attention to electrostatic break-down and also use the procedure in the printed matter which is included in the repair parts.

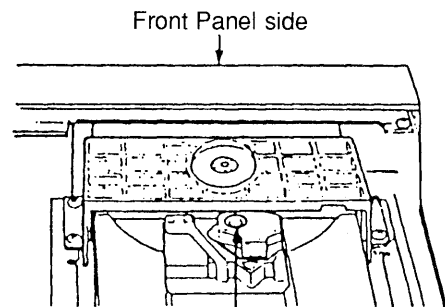
The flexible board is easily damaged and should be handled with care.

NOTES ON LASER DIODE EMISSION CHECK

The laser beam on this model is concentrated so as to be focused on the disc reflective surface by the objective lens in the optical pick-up block. Therefore, when checking the laser diode emission, observe from more than 30 cm away from the objective lens.

LASER DIODE AND FOCUS SEARCH OPERATION CHECK

1. Make POWER switch on with no disc inserted and disc table closed.
2. Confirm that the following operation is performed while observing the objective lens.



- ① Confirm that laser beam is spread.
- ② Up and down motion of the objective lens. (3 times)

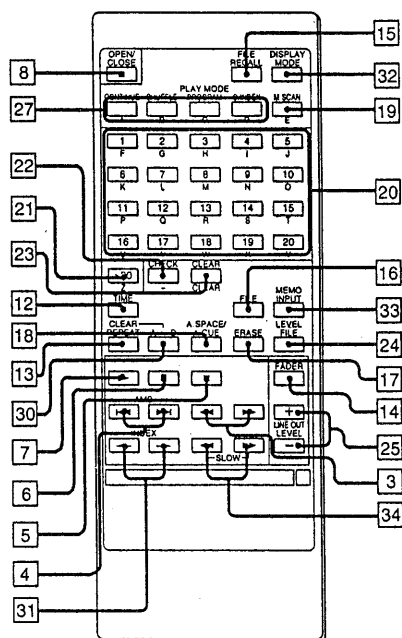
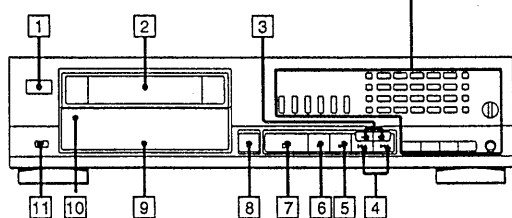
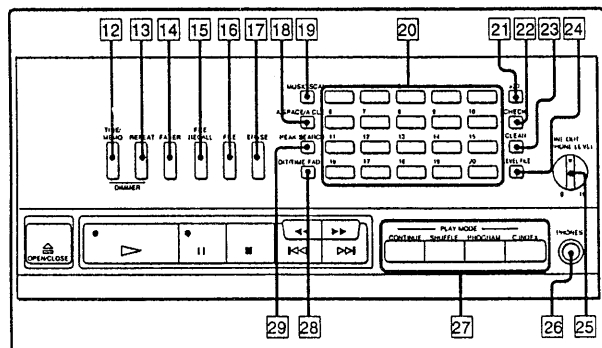
SECTION 2 GENERAL

This section is extracted from instruction manual.

Identifying the Parts

Refer to the pages indicated in parentheses for details.

Front Panel/Remote Commander



- 1 POWER switch (16)
- 2 Disc tray (16)
- 3 ◀◀/▶▶ (manual search) buttons (22, 42, 72, 74, 76)
- 4 ◀◀/▶▶/I (AMS*) buttons (20, 22, 46, 50, 56, 64, 72)
- 5 ■ (stop) button (16)
- 6 || (pause) button and indicator (16)
- 7 ▶ (play) button and indicator (16)
- 8 ▲ OPEN/CLOSE button (16)
- 9 Display (16)
- 10 Remote sensor
- 11 TIMER switch (92)
- 12 TIME/MEMO button (18, 26, 34)
(TIME button on the remote commander)
- 13 REPEAT button (38, 40, 80)
- 14 FADER button (42)
- 15 FILE RECALL button (84, 88)
- 16 FILE button (74, 76, 82, 86)
- 17 ERASE button (70, 74, 80, 84, 88, 90)
- 18 A.SPACE/A.CUE button (24)
- 19 MUSIC SCAN button (36)
(M.SCAN button on the remote commander)
- 20 Numeric buttons (20, 24, 28, 30, 32, 46, 50, 56, 64, 72, 78, 80, 82, 86)
- 21 >20 (over 20) button (20)
- 22 CHECK (program check) button (34, 80)
- 23 CLEAR (program clear) button (28, 32, 34, 54)
- 24 LEVEL FILE button (90)
- 25 LINE OUT PHONE LEVEL control and indicator (12, 16, 90)
(LINE OUT LEVEL +/- buttons on the remote commander)
- 26 PHONES jack
- 27 PLAY MODE buttons
CONTINUE button (16, 26, 30, 60, 88)
SHUFFLE button (26, 28, 30, 60, 88)
PROGRAM button (32, 46, 50, 82, 84)
C.INDEX button (76, 78, 80)
- 28 EDIT/TIME FADE button (56, 58, 64)
- 29 PEAK SEARCH button (66)
- 30 A ↔ B button (40)
(only on the remote commander)
- 31 —/— INDEX buttons (22)
(only on the remote commander)
- 32 DISPLAY MODE button (18)
(only on the remote commander)
- 33 MEMO INPUT button (72)
(only on the remote commander)
- 34 ◀◀/▶▶ SLOW buttons (22)
(only on the remote commander)

* AMS is the abbreviation of Automatic Music Sensor.

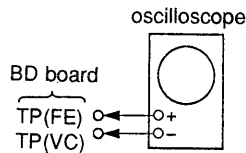
SECTION 3

ELECTRICAL BLOCK CHECKING

Note :

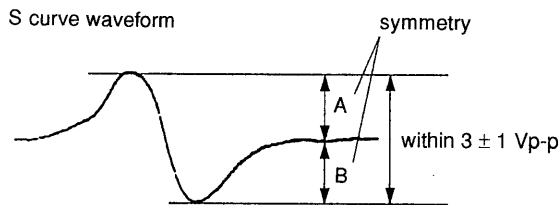
1. CD Block basically constructed to operate without adjustment. Therefore, check each item in order given.
2. Use YEDS-18 disc (3-702-101-01) unless otherwise indicated.
3. Use the oscilloscope with more than $10M\Omega$ impedance.
4. Clean an object lens by an applicator with neutral detergent when the signal level is low than specified value with the following checks.

S Curve Check



Procedure :

1. Connect oscilloscope to test point TP (FE) on BD board.
2. Connect between test point TP (FEI) and TP (VC) by lead wire.
3. Turned Power switch on.
4. Put disc (YEDS-18) in and turned Power switch on again and actuate the focus search. (actuate the focus search when disc table is moving in and out.)
5. Check the oscilloscope waveform (S curve) is symmetrical between A and B. And confirm peak to peak level within 3 ± 1 Vp-p.

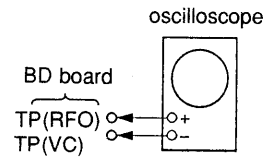


6. After check, remove the lead wire connected in step 2.

Note :

- Try to measure several times to make sure than the ratio of A : B or B : A is more than 10 : 7.
- Take sweep time as long as possible and light up the brightness to obtain best waveform.

RF Level Check

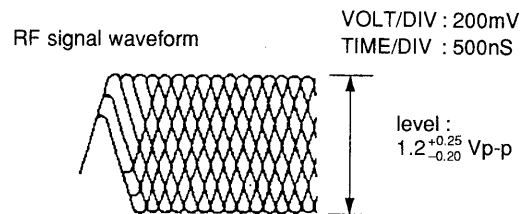


Procedure :

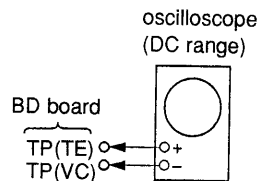
1. Connect oscilloscope to test point TP (RFO) on BD board.
2. Turned Power switch on.
3. Put disc (YEDS-18) in and playback.
4. Confirm that oscilloscope waveform is clear and check RF signal level is correct or not.

Note :

Clear RF signal waveform means that the shape “◇” can be clearly distinguished at the center of the waveform.

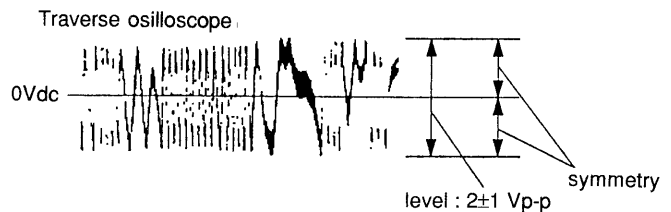


E-F Balance Check



Procedure :

1. Turned Power switch on.
2. Connect test point TP (ADJ : IC327 ⑥ PIN) on MAIN board to ground and TP(TEI : IC101 ②⑦ PIN) to TP (VC) with lead wire.
3. Connect oscilloscope to test point TP (TEO) on BD board.
4. Put disc (YEDS-18) in and playback.
5. Confirm that the oscilloscope waveform is symmetrical on the top and bottom in relation to 0Vdc, and check.

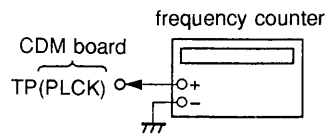


6. Remove the lead wire connected in step 1.

RF Free-run Frequency Check

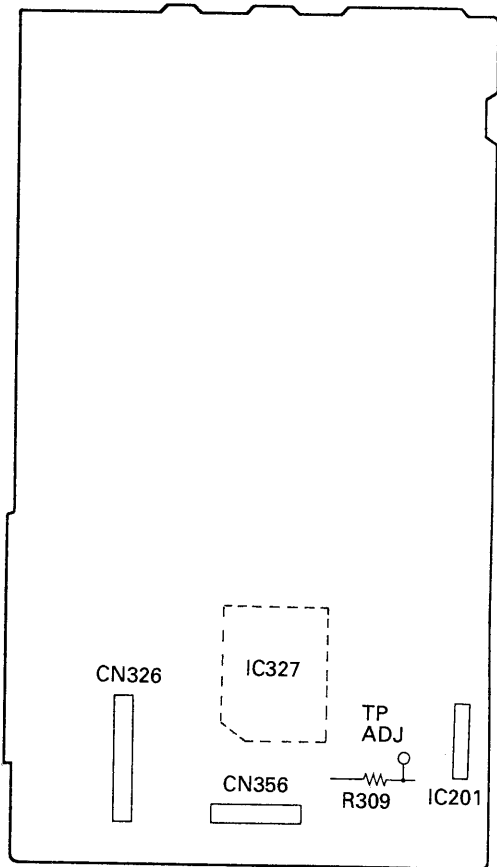
Procedure :

- 1. Connect frequency counter to test point (PLCK : IC101 ⑤3 PIN) with lead wire.



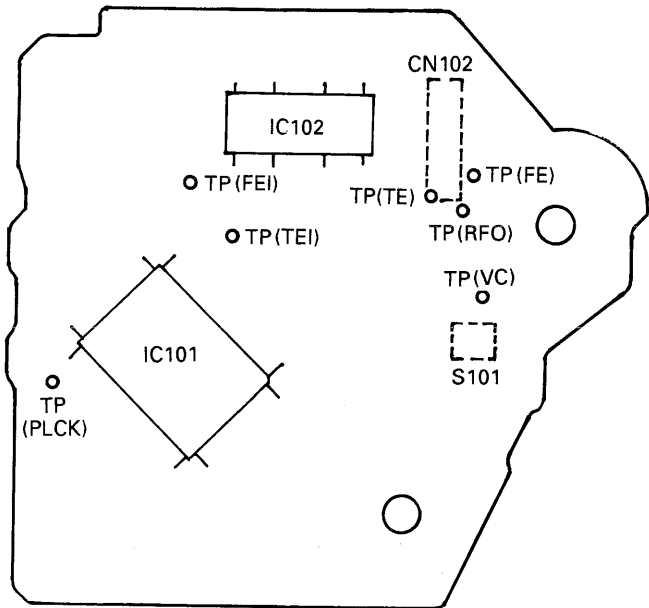
- 2. Turned Power switch on.
- 3. Confirm that reading on frequency counter is 4.3218MHz.

[MAIN BOARD] — Component Side —



Adjustment Location :

[BD BOARD] — Conductor Side —



SECTION 4

DIAGRAMS

4-1. IC PIN FUNCTIONS

• IC301 (CXD2567M)

Pin No.	Symbol	I/O	Description
1	Vss	—	Power supply pin (GND).
2	SYSM	I	System mute input. "H": active.
3	ATT	I	CTL "L": ATT data input. CTL "H": EMP input.
4	SHIFT	I	CTL "L": shift clock input. CTL "H": FS32 input.
5	LATCH	I	CTL "L": latch clock input. CTL "H": FS48 input.
6	CTL	I	Pull-down within IC. "H": direct input mode. "L": serial transfer mode.
7	INIT	I	Re-synchronizes at rising edge of this signal.
8	BCKI	I	BCK input.
9	DATAI	I	Data input.
10	LRCKI	I	LRCK input.
11	TEST	I	Test pin. Normally fixed to "L".
12	Vss	—	Power supply pin (GND).
13	128Fs	O	128 Fs clock output.
14	INVI	I	Inverter input.
15	INVO	O	Inverter output.
16	INVO2	O	Inverter output.
17	MCLK	I	Master clock input (f=512 Fs).
18	VDD	—	Power supply pin (+5V).
19	BCKO	O	BCK output.
20	DL	O	Lch data output.
21	DR	O	Rch data output.
22	LRCKO	O	LRCK output.
23	FLGL	O	Lch ϕ mute flag output.
24	FLGR	O	Rch ϕ mute flag output.

• **IC327 Main System Controller (M37451M8-381FP)**

Functions effected by the captioned controller include IC101 (Digital signal processing, servo) and loading motor control, data exchange with IC401 (sub system controller).

Pin No.	Pin Name	I/O	Description
1	NC	—	No connection.
2	NC	—	No connection.
3	CNIN (SENSE)	I	Input of SENSE signal for COUT count from IC101 (CXD2515Q).
4	QINT	O	Command pulse output to sub system controller (IC401).
5	M/F	I/O	Master/File command select input and output with sub system controller (IC401).
6	SACK	O	Command acknowridge output to sub system controller (IC401).
7	MREQ	I	Command request input from sub system controller (IC401).
8 to 11	CMD3 to CMD0	I/O	Input and output of data exchange with sub system controller (IC401).
12	CLK	O	Data clock signal output to IC101 (CXD2515Q).
13	XLT	O	Data latch pulse signal output to IC101 (CXD2515Q).
14	DATA	O	Data signal output to IC101 (CXD2515Q).
15	ATT (DATA)	O	Attenuator data output to IC301 (CXD2567M).
16	SHIFT (CLK)	O	Attenuator data clock output to IC301 (CXD2567M).
17	LATCH (XLT)	O	Attenuator data latch pulse output to IC301 (CXD2567M).
18	LDON	O	Laser ON/OFF control output to optical pick-up block.
19	SCOR	I	Sub-code sync (S0+S1) detection input from IC101 (CXD2515Q).
20	NC	—	No connection.
21	NC	—	No connection.
22	NC	—	No connection.
23	NC	—	No connection.
24	NC	—	No connection.
25	CNVSS	—	Ground terminal. (GND)
26	$\overline{\text{RESET}}$	I	Reset signal input. "L": RESET
27	NC	—	No connection.
28	XIN	I	Clock signal input. (10MHz)
29	XOUT	O	Clock signal output.
30	NC	—	No connection.
31	NC	—	No connection.
32	GND	—	Ground terminal. (GND)
33	NC	—	No connection.
34	MUTE	O	Muting signal output.
35	WE	O	Write enable output to IC325 (RAM).
36 to 40	A12 to A8	O	Address signal output to IC325 (RAM).

Pin No.	Pin Name	I/O	Description
41	NC	—	No connection.
42 to 49	A7 to A0	O	Address signal output to IC325 (RAM).
50 to 57	D7 to D0	I/O	Input and output of data signal with IC325 (RAM).
58	SENS	I	Input of SENSE signal for COUT count from IC101 (CXD2515Q).
59	GFS	I	GFS signal input from IC101 (CXD2515Q). "L": NG, "H": OK
60	FOK	I	FOK signal input from IC101 (CXD2515Q). "L": NG, "H": OK
61	ADJ	I	Test mode terminal. GFS is no longer monitored during PLAY, PAUSE or SEARCH, while not stopping even with GFS remaining still at "L" (NG).
62	AFADJ	I	Test mode terminal. It is possible to check the interface between the sub system controller (IC401) and this controller (IC327).
63	INSW	I	Input of S152 (Loading in switch).
64	OUTSW	I	Input of S151 (Loading out switch).
65	VLEVEL	I	Level input of remote control volume (RV901).
66	VOLUP	O	Output of volume up control to remote control volume (RV901).
67	VOLDWN	O	Output of volume down control to remote control volume (RV901).
68	DAVREF	—	Input terminal of reference voltage to D/A input port.
69	ADVREF	—	Input terminal of reference voltage to A/D input port.
70	AVSS	—	Ground terminal. (GND)
71	AVCC	—	Power supply terminal. (+5V)
72	VCC	—	Power supply terminal. (+5V)
73	VSS	—	Ground terminal. (GND)
74	SCLK	O	Calculation readout clock output to IC101 (CXD2515Q).
75	SQCLK	O	Subcode Q data readout clock output to IC101 (CXD2515Q).
76	VOLLED	O	Control output to remote control volume LED (D901).
77	SUB Q	I	Subcode Q data input from IC101 (CXD2515Q).
78	LODIN	O	Output to rotate M151 (loading motor) in the loading in direction. *1
79	LODOUT	O	Output to rotate M151 (loading motor) in the loading out direction. *1
80	NC	—	No connection.

*1 Loading motor control

	IN	OUT	BRAKE
LODIN ⑦⑧	"H"	"L"	"H"
LODOUT ⑦⑨	"L"	"H"	"H"

• **IC401 Sub System Controller (MSC62408-103GS-V1K)**

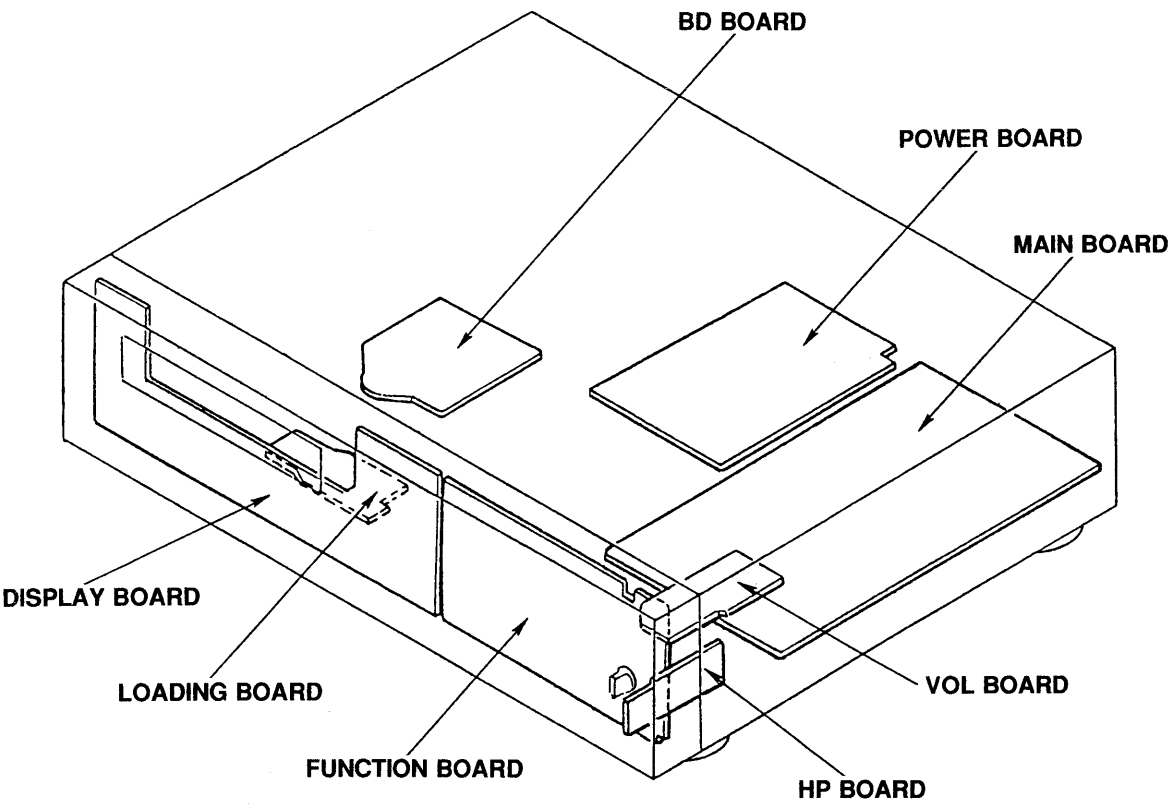
Functions effected by the captioned controller include fluorescent indicator tube (FLD401) drive control, key IN/OUT control and data exchange with IC327 (main system controller).

Pin No.	Pin Name	I/O	Description
1	SCAN6	O	Key scan control signal output.
2	TIMER	I	Timer switch (S402) control input.
3 to 9	KEY0 to KEY6	I	Key signal input.
10 to 13	CMD0 to CMD3	I/O	Input and output of data exchange with main system controller (IC327).
14	M.REQ	O	Command request output to main system controller (IC327).
15	S.ACK	I	Command acknowledge input from main system controller (IC327).
16	M/F	I/O	Input and output of master/file command select signal for main system controller (IC327).
17	RMIN	I	Sircs signal input from remote control receiver (IC402).
18	997X/ES	I	Model selection port. The equipment is fixed at "H".
19	Q.INT	I	Command pulse input from main system controller (IC327).
20	RESET	I	Reset signal input. "L": RESET.
21	TEST	I	Not in use with the model. The equipment is fixed at "L".
22	—	—	No connection.
28	PAUSE	O	LED drive output of PAUSE indicator.
29	PLAY	O	LED drive output of PLAY indicator.
30	OSC1	I	Clock signal input. (4.19MHz)
31	OSC0	O	Clock signal output.
32	Vss	—	Ground terminal. (GND)
33 to 44	T0 to T11	O	Grid drive signal output to fluorescent indicator tube (FLD401).
45 to 48	S28 to S25	O	Segment drive signal output to fluorescent indicator tube (FLD401).
49	VFLT	I	Input terminal of voltage (+32V) for fluorescent indicator tube (FLD401).
50 to 73	S24 to S1	I	Segment drive signal output to fluorescent indicator tube (FLD401).
74	VDD	—	Power supply terminal. (+5V)
75 to 80	SCAN0 to SCAN5	O	Key scan control signal output.

OPTICAL PICK-UP BLOCK (KSS-240A)



4-3. CIRCUIT BOARDS LOCATION



4-4. PRINTED WIRING BOARD

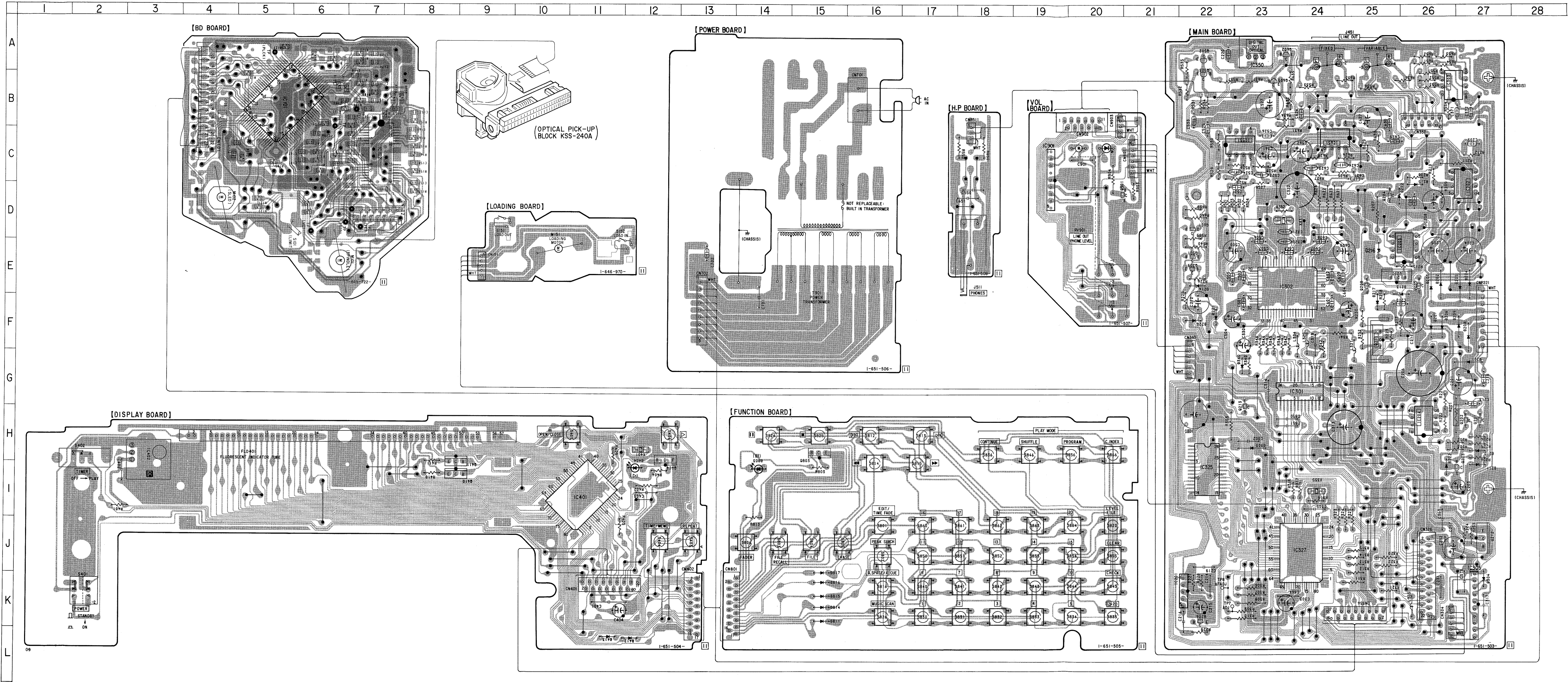
- See page 14 Circuit Boards Location.
- See page 26 Semiconductor Lead Layouts.

• Semiconductor Location

Ref. No.	Location	Ref. No.	Location
D201	G-27	IC204	H-26
D202	E-26	IC301	G-24
D203	E-26	IC302	E-24
D204	E-27	IC303	B-26
D205	E-27	IC305	K-27
D206	F-26	IC325	I-22
D207	F-26	IC327	J-24
D208	F-27	IC350	A-23
D209	F-27	IC401	I-11
D210	H-27	IC402	H-3
D211	I-27	IC551	C-23
D212	D-26	IC651	C-24
D213	E-26	IC901	C-19
D214	E-22		
D215	C-26	Q201	H-27
D216	E-25	Q202	H-27
D217	E-25	Q203	H-27
D220	F-22	Q204	D-25
D221	F-22	Q205	E-26
D222	H-26	Q206	K-22
D303	H-23	Q208	E-25
D304	K-27	Q209	E-22
D340	G-23	Q210	E-26
D404	I-12	Q211	F-25
D412	L-12	Q212	J-27
D413	L-11	Q213	G-23
D803	I-14	Q404	I-12
D811	K-15	Q410	I-9
D814	K-15	Q411	I-9
D815	K-15	Q501	E-22
D816	K-15	Q502	A-22
D817	J-15	Q503	A-22
		Q601	D-22
IC101	B-5	Q602	A-24
IC102	C-7	Q603	B-23
IC201	K-22	Q803	H-15
IC202	D-27	Q901	D-21
IC203	E-26		

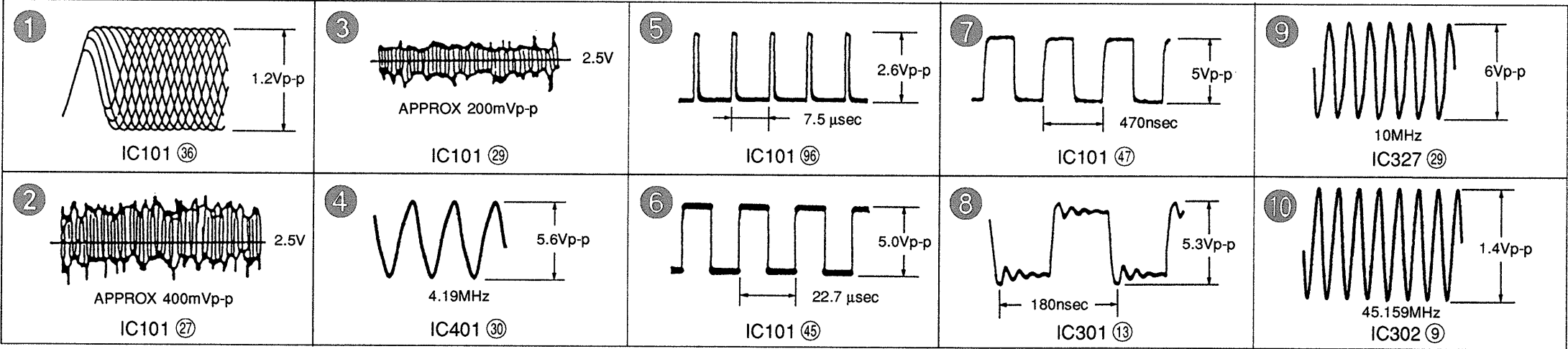
Note:

- : parts extracted from the components side.
- : Through hole.
- ▨ : Pattern on the side which is seen.
- ▩ : Pattern of the rear side.



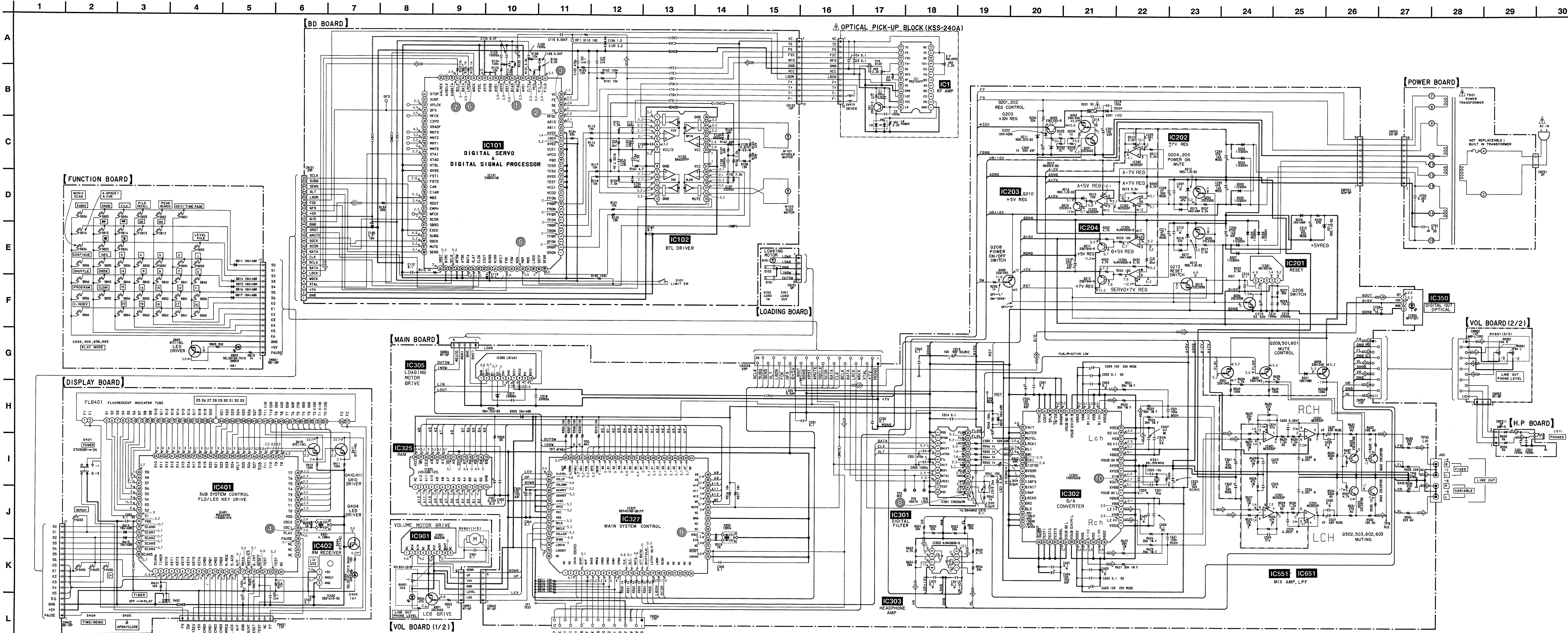
4-5. SCHEMATIC DIAGRAM
• See page 7 IC Pin Functions.
• See page 23 IC Block Diagrams.

• Waveforms



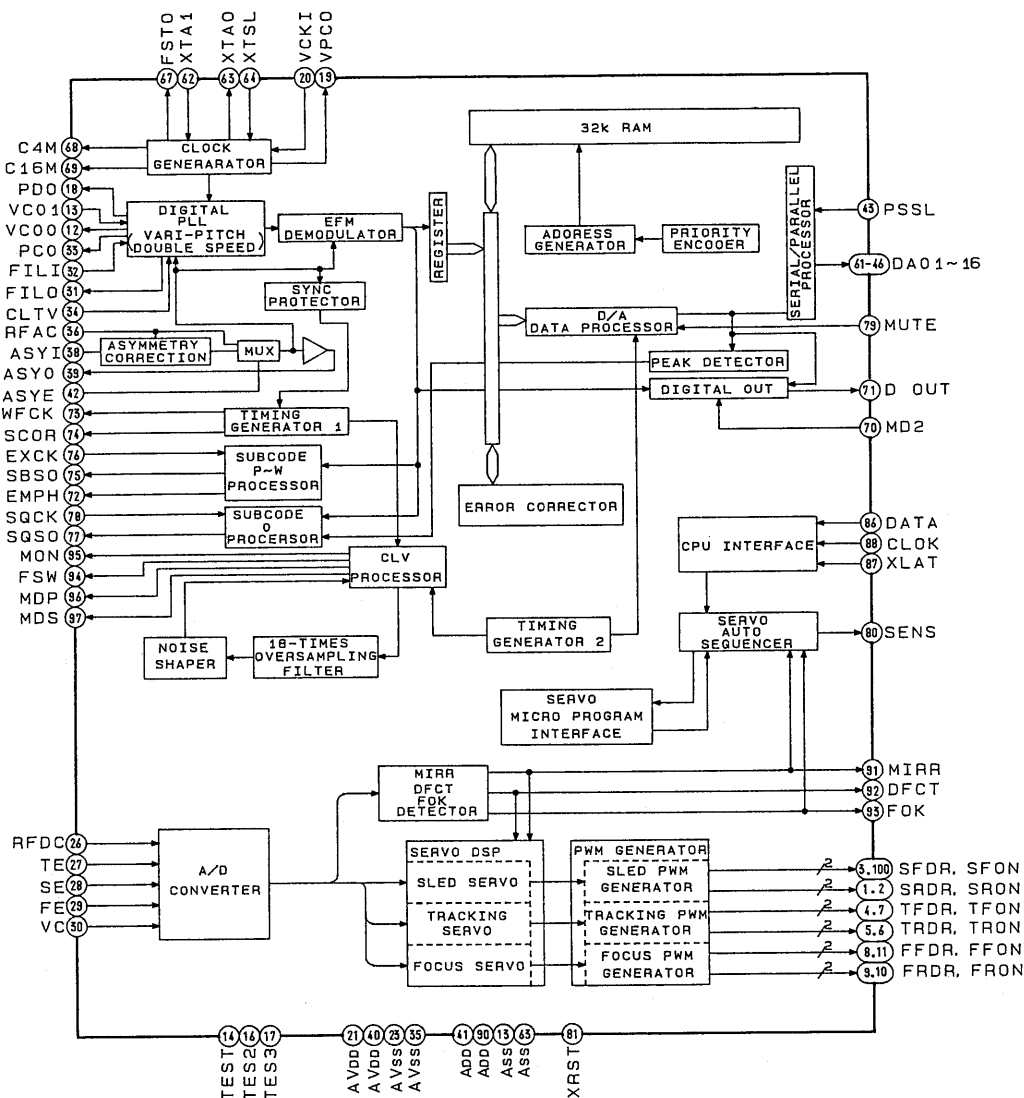
Note:
• All capacitors are in μF unless otherwise noted. pF , μF , 50WV or less are not indicated except for electrolytics and tantalums.
• All resistors are in Ω and 1/4W or less unless otherwise specified.
• % : indicates tolerance.
• Δ : internal component.
• $\square$: fusible resistor.
• $\square$: 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.

• — : B+ Line
• ---- : B- Line
• Voltage and waveforms are dc with respect to ground in play mode.
• * : can not be measured.
• Voltages are taken with a VOM (input impedance 10M 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.
• $\Rightarrow$: CD
• $\Rightarrow$: digital out

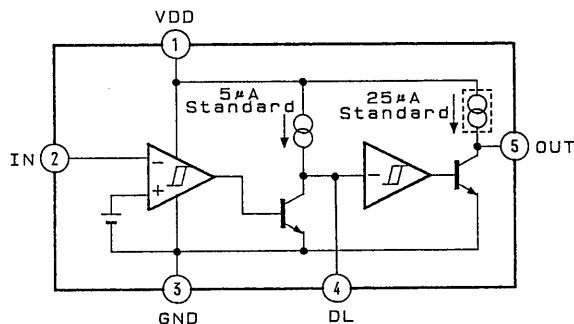


4-6. IC BLOCK DIAGRAMS

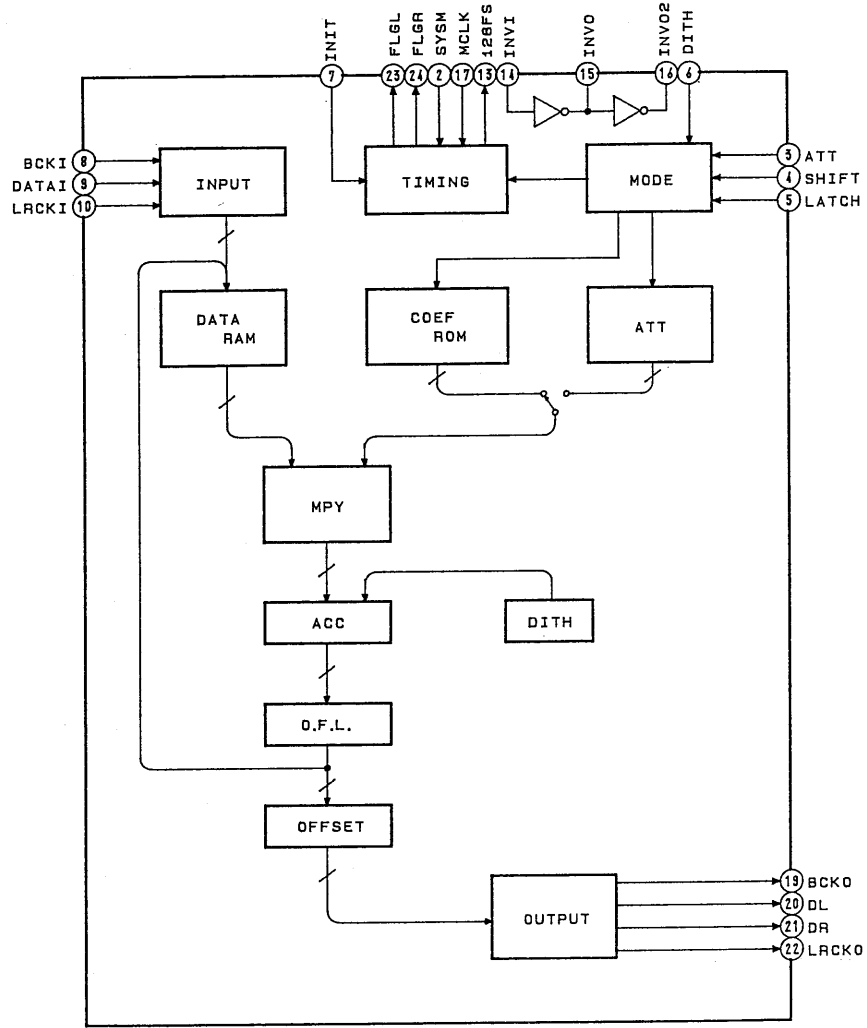
IC101 CXD2515Q



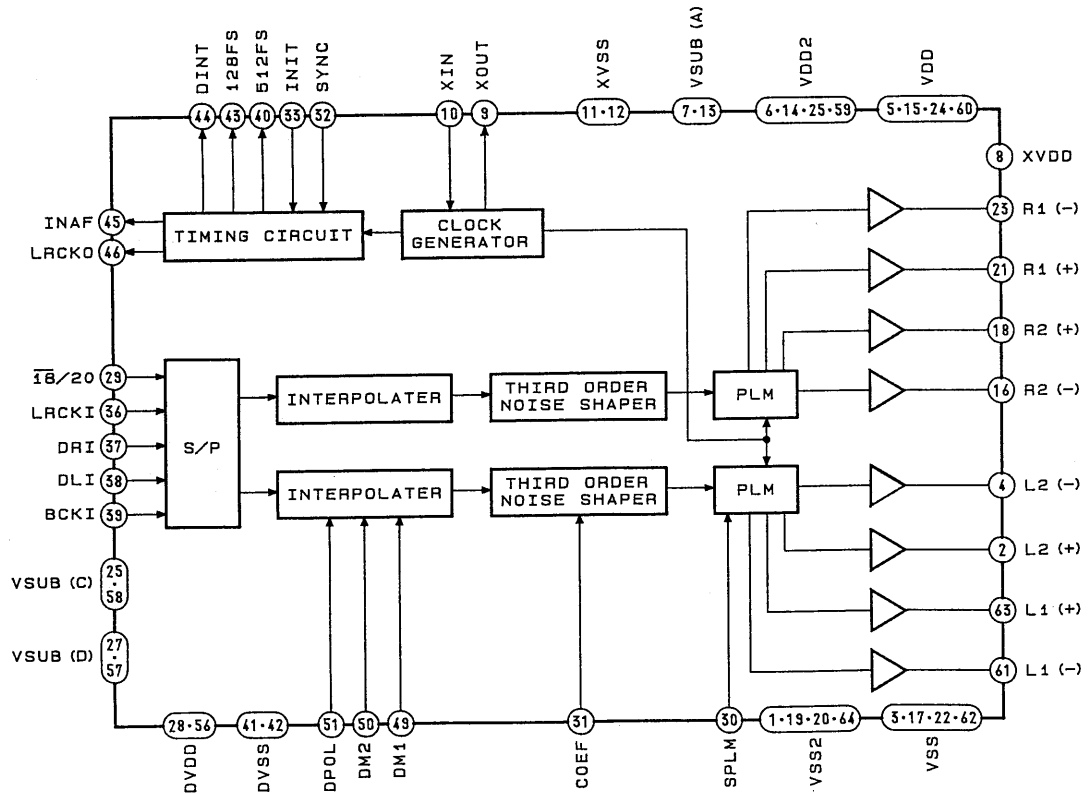
IC201 M51957AL



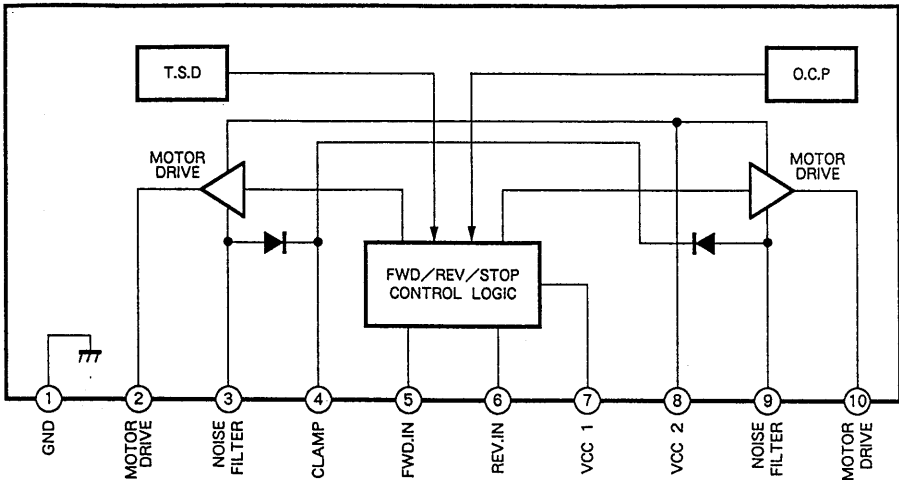
IC301 CXD2567M



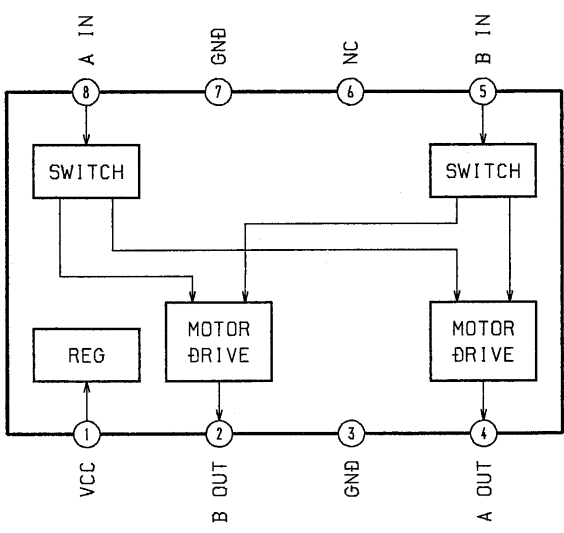
IC302 CXD2562Q



IC305 LB1641

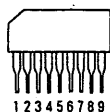


IC901 BA6208

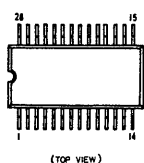


4-7. SEMICONDUCTOR LEAD LAYOUTS

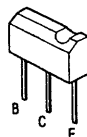
BA6208



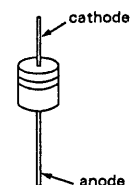
LH5160N-10L



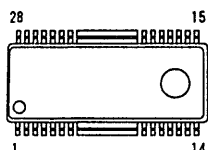
DTC114EL



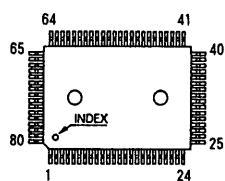
**RD4.7ES-B3
RD5.1JS-B1
RD8.2ES-B2
RD33ES-B3
11EQS04**



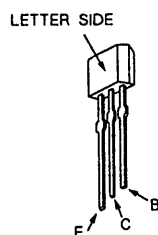
BA6297AFP



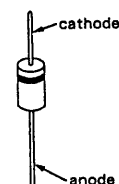
**M37451M8-381FP
MSC62408-103GS-V1K**



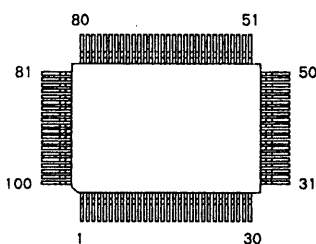
DTC144ES



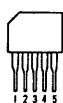
**1N4148M
11E2**



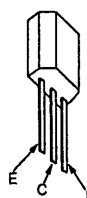
CXD2515Q



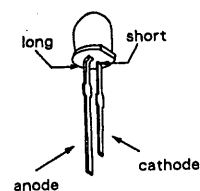
M51957AL



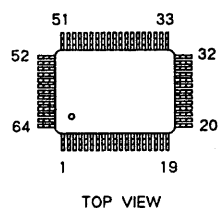
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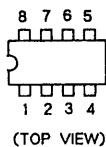
**SEL2510C-D
SEL2810A**



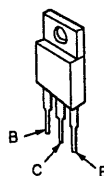
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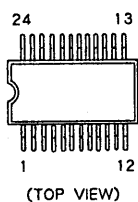
**NE5532P
NJM4580D-D**



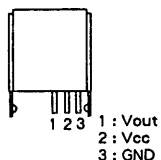
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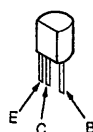
CXD2567M



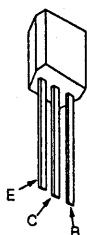
SBX1610-59



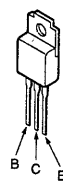
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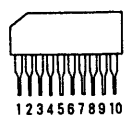
**DTA114ES
DTA144ES
DTC114ES**



2SD1944-K



LB1641



SECTION 5

EXPLODED VIEWS

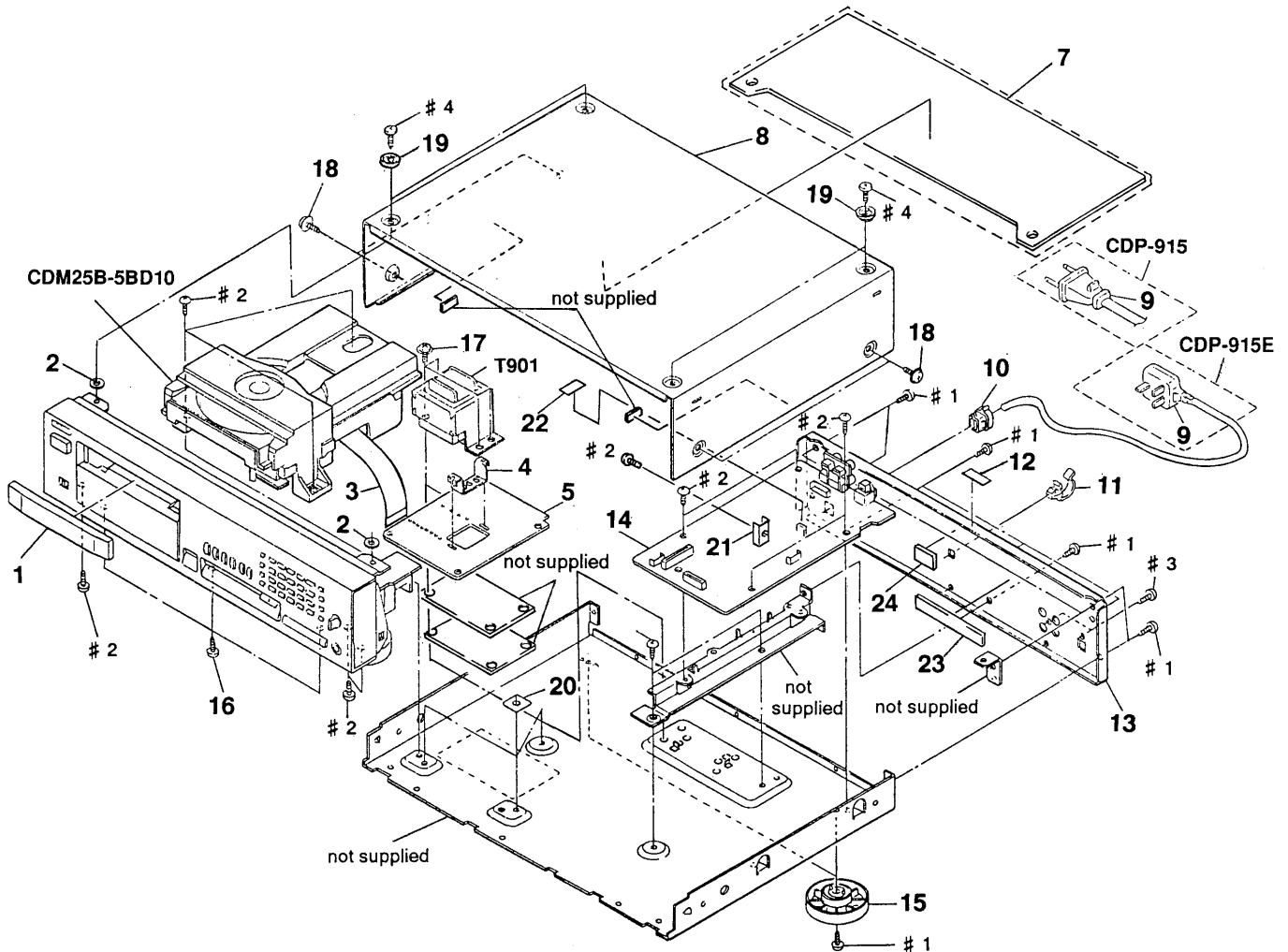
NOTE:

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

- 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.

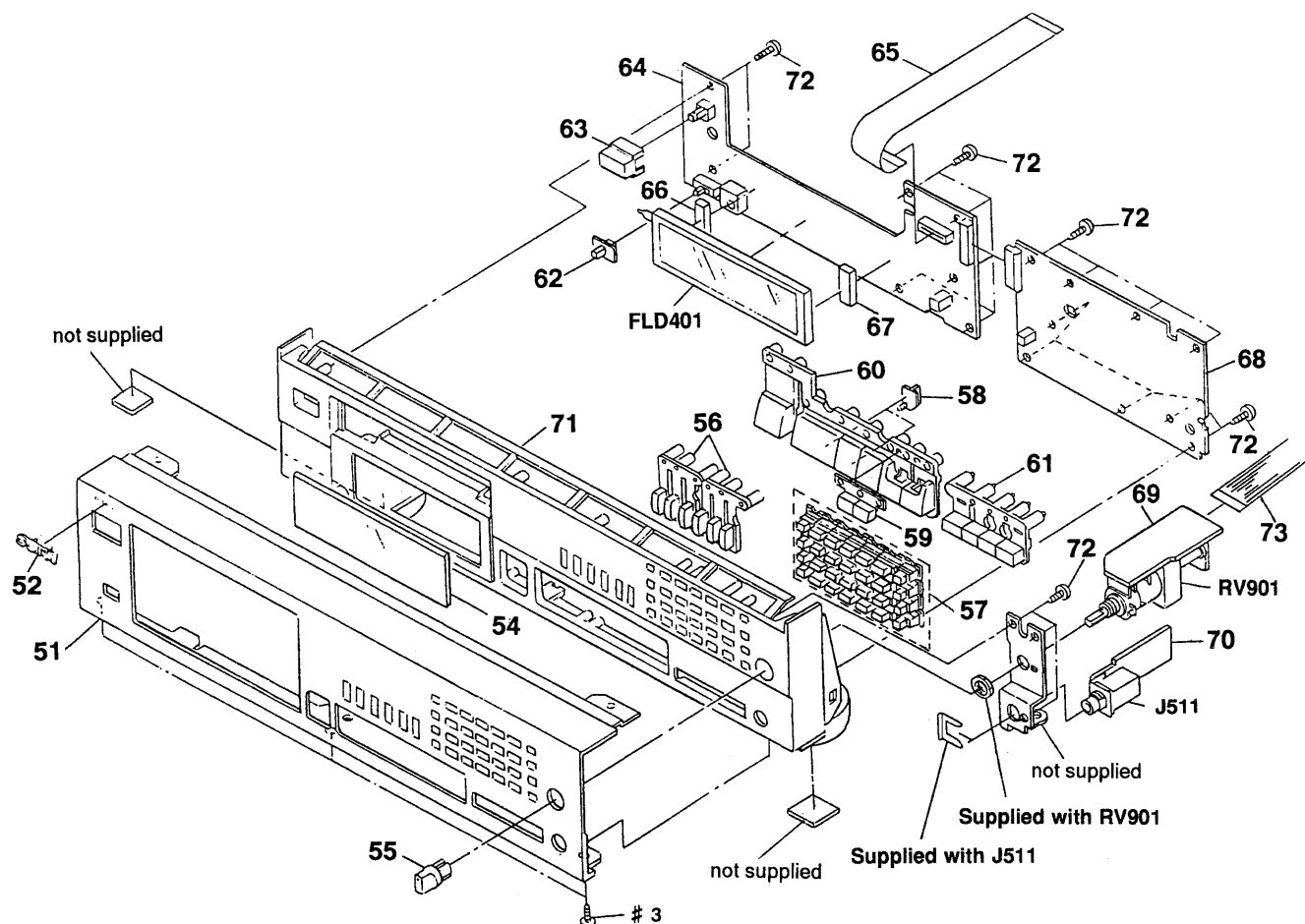
The components identified by mark or dotted line with mark are critical for safety. Replace only with part number specified.

5-1. CABINET SECTION



Ref. No.	Part No.	Description	Remark	Ref. No.	Part No.	Description	Remark
1	4-962-733-21	PANEL, LOADING		* 14	A-4673-052-A	MAIN BOARD, COMPLETE (915E)	
2	4-955-939-31	WASHER (CASE)		15	4-956-885-11	FOOT (F58175S2W) (915)	
3	1-696-760-11	WIRE (FLAT TYPE) (23 CORE)		15	X-4941-014-1	FOOT ASSY (915E)	
4	4-952-197-01	PLATE (TR), GROUND		16	3-703-685-21	SCREW (+BV 3X8)	
* 5	1-651-506-11	POWER BOARD		17	4-957-184-01	SCREW (TRANSFORMER), STEP	
* 7	4-929-571-01	REINFORCEMENT (CASE) (915E)		18	3-704-366-01	SCREW (CASE) (M3X8)	
8	4-934-008-01	CASE		19	4-928-025-11	ESCUTCHEON (TOP PLATE)	
9	1-575-651-21	CORD, POWER (915)		20	4-959-062-01	SHEET (CDM)	
9	1-696-571-11	CORD, POWER (915E)		* 21	4-941-237-11	HEAT SINK	
* 10	3-703-244-00	BUSHING (2104), CORD		22	3-831-441-XX	CUSHION	
* 11	4-949-235-01	HOOK		* 23	4-959-077-01	DAMPER	
12	9-911-835-XX	CUSHION, F		* 24	4-959-121-01	DAMPER	
* 13	4-964-449-21	PANEL, BACK (915)		T901	1-426-637-11	TRANSFORMER, POWER	
* 13	4-964-449-31	PANEL, BACK (915E)					
* 14	A-4673-048-A	MAIN BOARD, COMPLETE (915)					

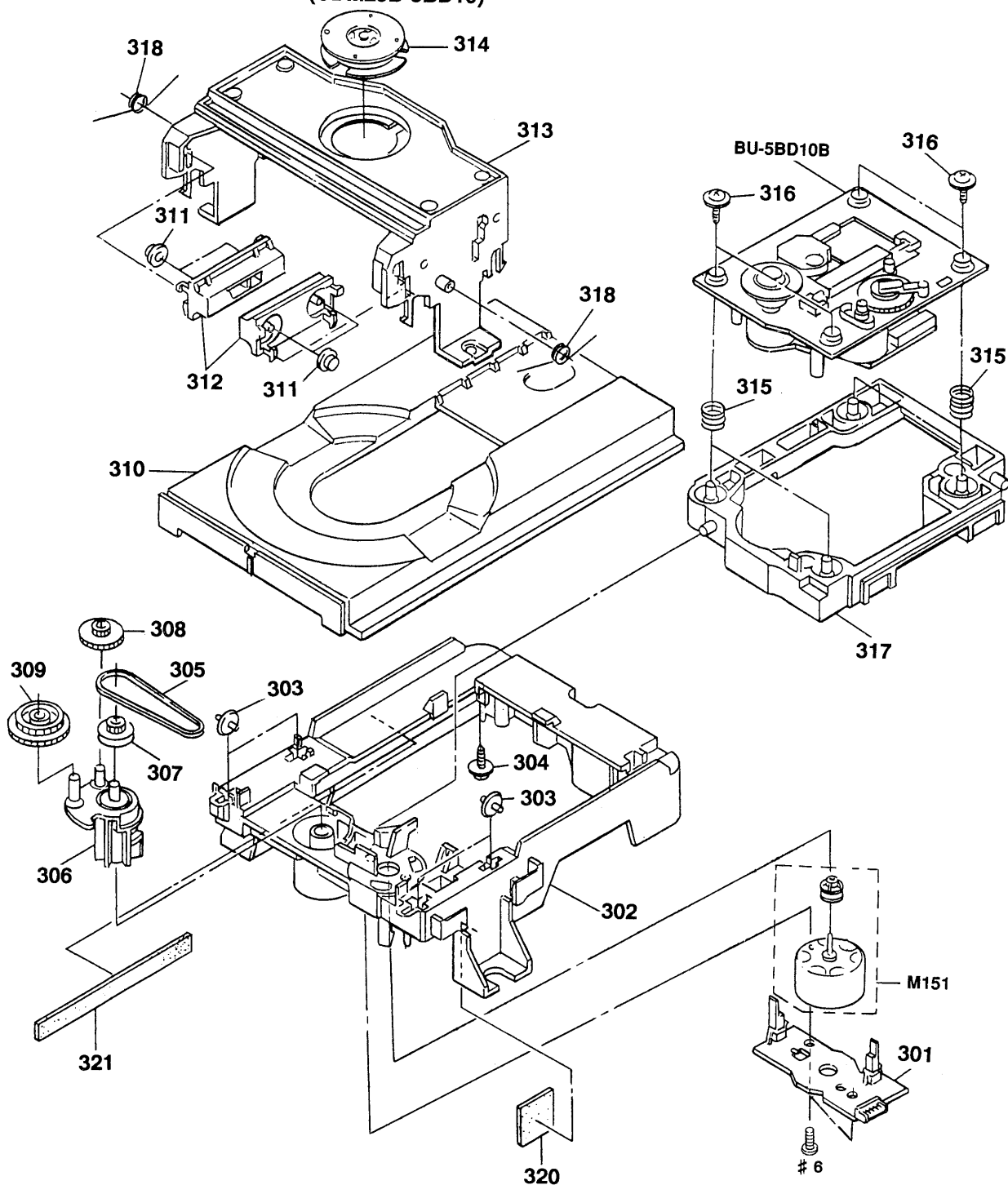
5-2. FRONT PANEL SECTION



Ref. No.	Part No.	Description
51	4-962-237-31	PANEL, FRONT (915)
51	4-962-237-41	PANEL, FRONT (915E)
52	4-942-568-01	EMBLEM (NO. 5), SONY
54	4-955-929-31	PLATE, INDICATION
55	A-4660-389-A	KNOB (HP) ASSY
56	4-955-934-11	BUTTON (FILE)
57	4-955-935-11	BUTTON (20 KEY)
58	4-956-834-01	INDICATOR (DIA. 2)
59	4-955-932-11	BUTTON (MMS)
60	4-956-835-01	BUTTON (PLAY-IND)
61	4-956-833-01	BUTTON (MODE 4)
62	4-922-518-11	KNOB (TIMER)
63	4-947-034-01	BUTTON (POWER)
* 64	A-4673-046-A	DISP BOARD, COMPLETE
65	1-696-967-11	WIRE (FLAT TYPE) (17 CORE)

Ref. No.	Part No.	Description	Remark
66	4-956-836-01	HOLDER (L)	
67	4-956-837-01	HOLDER (R)	
* 68	A-4673-047-A	FUNCTION BOARD, COMPLETE	
* 69	1-651-507-11	VOL BOARD	
* 70	1-651-508-11	H.P. BOARD	
71	X-4943-372-1	BASE ASSY, PANEL (915)	
71	X-4943-514-1	BASE ASSY, PANEL (915E)	
72	4-951-620-01	SCREW (2.6X8), +BVTP	
73	1-751-712-11	WIRE (FLAT TYPE) (11 CORE)	
FLD401	1-517-128-11	INDICATOR TUBE, FLUORESCENT	
J511	1-568-519-41	JACK, LARGE TYPE (PHONES)	
RV901	1-238-776-11	RES, VAR, CARBON 10KX3	
		(LINE OUT/PHONE LEVEL)	

5-3. CD MECHANISM SECTION (CDM25B-5BD10)

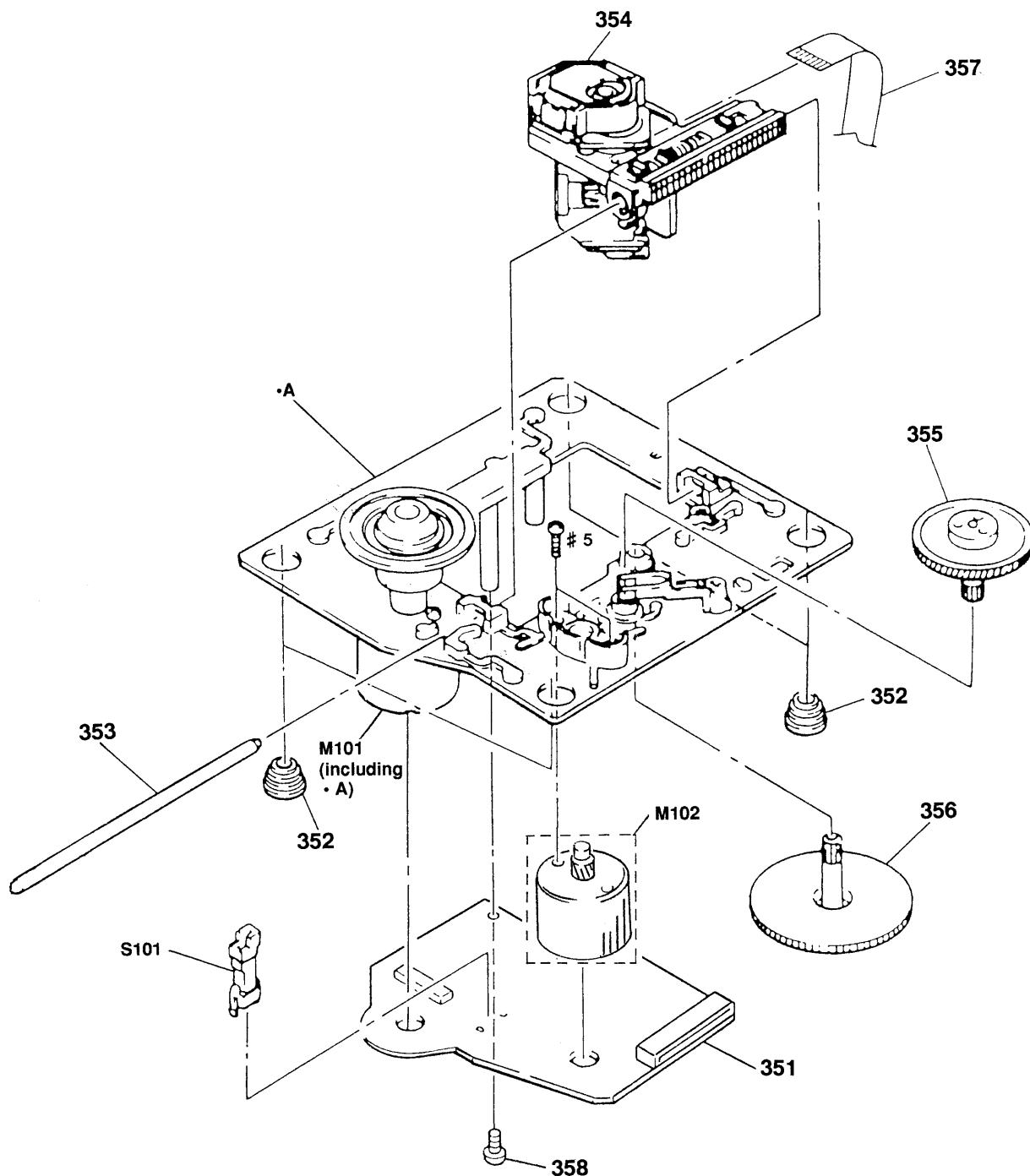


Ref. No.	Part No.	Description
* 301	1-646-970-11	LOADING BOARD
* 302	4-954-190-01	BASE (MD)
303	4-954-193-01	ROLLER (A)
* 304	4-917-583-21	BRACKET, YOKE
305	4-927-649-01	BELT
306	4-933-109-01	CAM
307	4-927-651-01	PULLEY (S)
308	4-927-628-01	GEAR (C)
309	4-933-107-01	GEAR (PL)
310	4-954-191-01	TABLE, DISK
311	4-954-194-01	ROLLER (B)

Ref. No.	Part No.	Description
312	4-954-199-01	PLATE, SLIDE
* 313	4-954-192-01	HOLDER (M)
* 314	1-452-538-11	MAGNET
315	4-959-996-01	SPRING (932), COMPRESSION
316	4-933-134-01	SCREW (+PTPH M2.6X6)
317	4-933-129-01	HOLDER (BU)
318	4-954-195-01	SPRING, TORSION
320	4-959-121-01	DAMPER
321	4-959-077-01	DAMPER
M151	A-4604-363-A	MOTOR (L) ASSY (LOADING)

Remark

5-4. OPTICAL PICK-UP BLOCK SECTION (BU-5BD10B)



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
* 351	A-4649-432-A	BD BOARD, COMPLETE
352	4-951-940-01	INSULATOR (BU)
353	4-917-565-01	SHAFT, SLED
Δ 354	8-848-144-11	OPTICAL PICK-UP KSS-240A
355	4-917-567-01	GEAR (M)
356	4-917-564-01	GEAR (P), FLATNESS

Remark	Ref.No.	Part No.	Description
	357	1-575-001-11	WIRE, FLAT TYPE (12 CORE)
	358	4-951-620-01	SCREW (2.6X8), +BVTP
	M101	X-4917-523-3	MOTOR ASSY (SPINDLE)
	M102	X-4917-504-1	MOTOR ASSY (SLED)
	S101	1-572-085-11	SWITCH, LEAF (LIMIT)

Remark

BD

DISPLAY FUNCTION

Ref.No.	Part No.	Description	Remark
*	A-4673-046-A	DISPLAY BOARD, COMPLETE *****	
	3-831-441-XX	CUSHION	
	4-956-836-01	HOLDER (L)	
	4-956-837-01	HOLDER (R)	
	< CAPACITOR >		
C401	1-164-159-11	CERAMIC 0.1uF	50V
C402	1-164-159-11	CERAMIC 0.1uF	50V
C403	1-164-159-11	CERAMIC 0.1uF	50V
C404	1-126-154-11	ELECT 47uF	20% 6.3V
	< CONNECTOR >		
* CN401	1-568-836-11	SOCKET, CONNECTOR 17P	
CN402	1-750-199-11	CONNECTOR, BOARD TO BOARD 18P	
	< DIODE >		
D404	8-719-303-02	LED SEL2510C-D (▷)	
D412	8-719-987-63	DIODE 1N4148M	
D413	8-719-987-63	DIODE 1N4148M	
	< FLUORESCENT INDICATOR >		
FLD401	1-517-128-11	INDICATOR TUBE, FLUORESCENT	
	< IC >		
IC401	8-759-258-17	IC MSC62408-103GS-V1K	
IC402	8-741-100-48	IC SBX1610-59	
	< TRANSISTOR >		
Q404	8-729-900-45	TRANSISTOR DTC114EF	
Q410	8-729-900-45	TRANSISTOR DTC114EF	
Q411	8-729-900-45	TRANSISTOR DTC114EF	
	< RESISTOR >		
R401	1-249-429-11	CARBON 10K 5% 1/4W	
R402	1-249-429-11	CARBON 10K 5% 1/4W	
R404	1-249-408-11	CARBON 180 5% 1/4W F	
R405	1-249-417-11	CARBON 1K 5% 1/4W F	
R409	1-247-903-00	CARBON 1M 5% 1/4W	
R410	1-249-441-11	CARBON 100K 5% 1/4W	
R411	1-249-441-11	CARBON 100K 5% 1/4W	
	< SWITCH >		
S401	1-554-118-00	SWITCH, PUSH (1 KEY) (POWER)	
S402	1-570-157-51	SWITCH, SLIDE (TIMER)	
S403	1-554-303-21	SWITCH, TACTILE (REPEAT)	
S404	1-554-303-21	SWITCH, TACTILE (TIME/MENO)	
S405	1-554-303-21	SWITCH, TACTILE (△ OPEN/CLOSE)	
S406	1-554-303-21	SWITCH, TACTILE (▷)	

Ref.No.	Part No.	Description	Remark
	< VIBRATOR >		
X401	1-577-101-11	VIBRATOR, CERAMIC (4.19MHz)	

*	A-4673-047-A	FUNCTION BOARD, COMPLETE *****	
	< CONNECTOR >		
CN801	1-750-190-11	CONNECTOR, BOARD TO BOARD 18P	
	< DIODE >		
D803	8-719-301-49	LED SEL2810A (■)	
D811	8-719-987-63	DIODE 1N4148M	
D814	8-719-987-63	DIODE 1N4148M	
D815	8-719-987-63	DIODE 1N4148M	
D816	8-719-987-63	DIODE 1N4148M	
D817	8-719-987-63	DIODE 1N4148M	
	< TRANSISTOR >		
Q803	8-729-900-45	TRANSISTOR DTC114EF	
	< RESISTOR >		
R803	1-249-412-11	CARBON 390 5% 1/4W F	
R813	1-249-417-11	CARBON 1K 5% 1/4W F	
	< SWITCH >		
S801	1-554-303-21	SWITCH, TACTILE (EDIT/TIME FADE)	
S802	1-554-303-21	SWITCH, TACTILE (PEAK SEARCH)	
S803	1-554-303-21	SWITCH, TACTILE (FILE RECALL)	
S804	1-554-303-21	SWITCH, TACTILE (FILE)	
S805	1-554-303-21	SWITCH, TACTILE (ERASE)	
S806	1-554-303-21	SWITCH, TACTILE (FADER)	
S812	1-554-303-21	SWITCH, TACTILE (◀◀)	
S813	1-554-303-21	SWITCH, TACTILE (▷▷)	
S814	1-554-303-21	SWITCH, TACTILE (◀◀)	
S815	1-554-303-21	SWITCH, TACTILE (▶▶)	
S816	1-554-303-21	SWITCH, TACTILE (A. SPACE/A. CUE)	
S820	1-554-303-21	SWITCH, TACTILE (LEVEL FILE)	
S824	1-554-303-21	SWITCH, TACTILE (■)	
S825	1-554-303-21	SWITCH, TACTILE (■)	
S826	1-554-303-21	SWITCH, TACTILE (MUSIC SCAN)	
S830	1-554-303-21	SWITCH, TACTILE (1)	
S831	1-554-303-21	SWITCH, TACTILE (2)	
S832	1-554-303-21	SWITCH, TACTILE (3)	
S833	1-554-303-21	SWITCH, TACTILE (4)	
S834	1-554-303-21	SWITCH, TACTILE (5)	
S835	1-554-303-21	SWITCH, TACTILE (> 20)	
S836	1-554-303-21	SWITCH, TACTILE (CONTINUE)	

FUNCTION

H.P

LOADING

MAIN

Ref.No.	Part No.	Description	Remark	Ref.No.	Part No.	Description	Remark
S840	1-554-303-21	SWITCH, TACTILE (6)		S152	1-572-086-11	SWITCH, LEAF (LOAD IN)	
S841	1-554-303-21	SWITCH, TACTILE (7)		*****			
S842	1-554-303-21	SWITCH, TACTILE (8)		*	A-4673-052-A	MAIN BOARD, COMPLETE	
S843	1-554-303-21	SWITCH, TACTILE (9)				*****	
S844	1-554-303-21	SWITCH, TACTILE (10)		*	4-941-237-11	HEAT SINK	
S845	1-554-303-21	SWITCH, TACTILE (CHECK)			7-682-547-09	SCREW +BVTT 3X6 (S)	
S846	1-554-303-21	SWITCH, TACTILE (SHUFFLE)					
S850	1-554-303-21	SWITCH, TACTILE (11)					
S851	1-554-303-21	SWITCH, TACTILE (12)					
S852	1-554-303-21	SWITCH, TACTILE (13)					
S853	1-554-303-21	SWITCH, TACTILE (14)					
S854	1-554-303-21	SWITCH, TACTILE (15)					
S855	1-554-303-21	SWITCH, TACTILE (CLEAR)					
S856	1-554-303-21	SWITCH, TACTILE (PROGRAM)					
S860	1-554-303-21	SWITCH, TACTILE (16)					
S861	1-554-303-21	SWITCH, TACTILE (17)					
S862	1-554-303-21	SWITCH, TACTILE (18)					
S863	1-554-303-21	SWITCH, TACTILE (19)					
S864	1-554-303-21	SWITCH, TACTILE (20)					
S866	1-554-303-21	SWITCH, TACTILE (C. INDEX)					

*	1-651-508-11	H. P BOARD					

		< CAPACITOR >					
C550	1-162-294-31	CERAMIC 0.001uF 10% 50V					
C651	1-162-294-31	CERAMIC 0.001uF 10% 50V					
		< JACK >					
J511	1-568-519-41	JACK, LARGE TYPE (PHONES)					
		< RESISTOR >					
R550	1-249-402-11	CARBON 56 5% 1/4W F					
R650	1-249-402-11	CARBON 56 5% 1/4W F					

*	1-646-970-11	LOADING BOARD					

		< CONNECTOR >					
* CN151	1-568-943-11	PIN, CONNECTOR 5P					
		< MOTOR >					
M151	A-4604-363-A	MOTOR (L) ASSY (LOADING)					
		< SWITCH >					
S151	1-572-086-11	SWITCH, LEAF (LOAD OUT)					

MAIN

Ref. No.	Part No.	Description	Remark	Ref. No.	Part No.	Description	Remark
C363	1-164-159-11	CERAMIC	0. 1uF	50V	D211	8-719-110-08	DIODE RD8. 2ES-B2
C364	1-164-159-11	CERAMIC	0. 1uF	50V	D212	8-719-114-30	DIODE RD5. 1JS-B2
C371	1-130-495-00	MYLAR	0. 1uF	5% 50V	D213	8-719-114-30	DIODE RD5. 1JS-B2
C372	1-130-495-00	MYLAR	0. 1uF	5% 50V	D214	8-719-114-30	DIODE RD5. 1JS-B2
C501	1-130-495-00	MYLAR	0. 1uF	5% 50V	D215	8-719-987-63	DIODE 1N4148M
C502	1-162-806-11	CERAMIC	0. 1uF	10% 50V	D216	8-719-114-30	DIODE RD5. 1JS-B2
C503	1-130-495-00	MYLAR	0. 1uF	5% 50V	D217	8-719-987-63	DIODE 1N4148M
C504	1-126-023-11	ELECT	100uF	20% 25V	D220	8-719-987-63	DIODE 1N4148M
C506	1-162-806-11	CERAMIC	0. 1uF	10% 50V	D221	8-719-987-63	DIODE 1N4148M
C507	1-130-495-00	MYLAR	0. 1uF	5% 50V	D222	8-719-987-63	DIODE 1N4148M
C509	1-124-122-11	ELECT	100uF	20% 50V	D303	8-719-987-63	DIODE 1N4148M
C521	1-107-169-00	MICA	100PF	5% 500V	D304	8-719-109-82	DIODE RD4. 7ES-B3
C523	1-101-882-00	CERAMIC	51PF	5% 50V	D340	8-719-987-63	DIODE 1N4148M
C524	1-101-882-00	CERAMIC	51PF	5% 50V			< IC >
C525	1-106-359-00	MYLAR	4700PF	5% 200V	IC201	8-759-636-16	IC M51957AL
C526	1-106-343-00	MYLAR	1000PF	5% 200V	IC202	8-759-900-72	IC NE5532P
C527	1-124-918-11	ELECT	47uF	20% 63V	IC203	8-759-900-72	IC NE5532P
C530	1-130-495-00	MYLAR	0. 1uF	5% 50V	IC204	8-759-710-59	IC NJM4580D-D
C601	1-130-495-00	MYLAR	0. 1uF	5% 50V	IC301	8-752-356-03	IC CXD2567M
C602	1-162-806-11	CERAMIC	0. 1uF	10% 50V	IC302	8-759-044-10	IC CXD2562Q
C603	1-130-495-00	MYLAR	0. 1uF	5% 50V	IC303	8-759-710-59	IC NJM4580D-D
C604	1-126-023-11	ELECT	100uF	20% 25V	IC305	8-759-822-09	IC LB1641
C606	1-162-806-11	CERAMIC	0. 1uF	10% 50V	IC325	8-759-512-81	IC LH5160N-10L
C607	1-130-495-00	MYLAR	0. 1uF	5% 50V	IC327	8-759-267-28	IC M37451M8-381FP
C609	1-124-122-11	ELECT	100uF	20% 50V	IC350	8-749-921-12	IC GP1F32T (DIGITAL OUT OPTICAL)
C621	1-107-169-00	MICA	100PF	5% 500V	IC551	8-759-900-72	IC NE5532P
C623	1-101-882-00	CERAMIC	51PF	5% 50V	IC651	8-759-900-72	IC NE5532P
C624	1-101-882-00	CERAMIC	51PF	5% 50V			< JACK >
C625	1-106-359-00	MYLAR	4700PF	5% 200V	* J451	1-569-443-11	JACK, PIN 4P (LINE OUT) (915)
C626	1-106-343-00	MYLAR	1000PF	5% 200V	J451	1-569-443-21	JACK, PIN 4P (LINE OUT) (915E)
C627	1-124-918-11	ELECT	47uF	20% 63V			< COIL >
C630	1-130-495-00	MYLAR	0. 1uF	5% 50V	L304	1-410-322-11	INDUCTOR 3. 3uH
		< CONNECTOR >			L305	1-410-322-11	INDUCTOR 3. 3uH
* CN304	1-568-954-11	PIN, CONNECTOR 5P			L320	1-410-503-21	INDUCTOR 3. 3uH
* CN326	1-568-839-11	SOCKET, CONNECTOR 23P			L321	1-410-322-11	INDUCTOR 3. 3uH
* CN356	1-568-836-11	SOCKET, CONNECTOR 17P					< TRANSISTOR >
* CN357	1-568-830-11	SOCKET, CONNECTOR 11P			Q201	8-729-900-80	TRANSISTOR DTC114ES
* CN360	1-568-955-11	PIN, CONNECTOR 6P			Q202	8-729-900-61	TRANSISTOR DTA114ES
		< DIODE >			Q203	8-729-926-17	TRANSISTOR 2SD1292-R
D201	8-719-200-02	DIODE 10E2			Q204	8-729-900-89	TRANSISTOR DTC144ES
D202	8-719-210-21	DIODE 11EQS04			Q205	8-729-900-89	TRANSISTOR DTC144ES
D203	8-719-210-21	DIODE 11EQS04			Q206	8-729-900-89	TRANSISTOR DTC144ES
D204	8-719-210-21	DIODE 11EQS04			Q208	8-729-900-65	TRANSISTOR DTA144ES
D205	8-719-210-21	DIODE 11EQS04			Q209	8-729-900-61	TRANSISTOR DTA114ES
D206	8-719-210-21	DIODE 11EQS04			Q210	8-729-104-18	TRANSISTOR 2SC3514
D207	8-719-210-21	DIODE 11EQS04			Q211	8-729-905-67	TRANSISTOR 2SD1944-K
D208	8-719-210-21	DIODE 11EQS04					
D209	8-719-210-21	DIODE 11EQS04					
D210	8-719-113-99	DIODE RD33ES-B3					

Ref.No.	Part No.	Description	Remark			Ref.No.	Part No.	Description	Remark		
Q212	8-729-905-67	TRANSISTOR	2SD1944-K			R317	1-249-429-11	CARBON	10K	5%	1/4W
Q213	8-729-900-89	TRANSISTOR	DTC144ES			R319	1-247-903-00	CARBON	1M	5%	1/4W
Q501	8-729-900-65	TRANSISTOR	DTA144ES			R320	1-249-417-11	CARBON	1K	5%	1/4W F
Q502	8-729-231-55	TRANSISTOR	2SC2878-AB			R321	1-249-417-11	CARBON	1K	5%	1/4W F
Q503	8-729-231-55	TRANSISTOR	2SC2878-AB			R322	1-249-417-11	CARBON	1K	5%	1/4W F
Q601	8-729-900-65	TRANSISTOR	DTA144ES			R323	1-249-417-11	CARBON	1K	5%	1/4W F
Q602	8-729-231-55	TRANSISTOR	2SC2878-AB			R324	1-249-417-11	CARBON	1K	5%	1/4W F
Q603	8-729-231-55	TRANSISTOR	2SC2878-AB			R325	1-249-417-11	CARBON	1K	5%	1/4W F
< RESISTOR >						R340	1-249-441-11	CARBON	100K	5%	1/4W
△R201	1-212-869-00	FUSIBLE	33	5%	1/4W F	R341	1-249-408-11	CARBON	180	5%	1/4W F
R202	1-249-417-11	CARBON	1K	5%	1/4W F	R342	1-249-417-11	CARBON	1K	5%	1/4W F
R203	1-249-417-11	CARBON	1K	5%	1/4W F	R343	1-249-417-11	CARBON	1K	5%	1/4W F
R204	1-249-417-11	CARBON	1K	5%	1/4W F	R344	1-249-417-11	CARBON	1K	5%	1/4W F
R205	1-249-417-11	CARBON	1K	5%	1/4W F	R345	1-249-417-11	CARBON	1K	5%	1/4W F
R206	1-249-435-11	CARBON	33K	5%	1/4W	R346	1-249-417-11	CARBON	1K	5%	1/4W F
R207	1-249-421-11	CARBON	2. 2K	5%	1/4W F	R347	1-249-415-11	CARBON	680	5%	1/4W F
R208	1-249-437-11	CARBON	47K	5%	1/4W	R352	1-249-429-11	CARBON	10K	5%	1/4W
R209	1-249-428-11	CARBON	8. 2K	5%	1/4W F	R521	1-215-459-00	METAL	39K	1%	1/6W
R210	1-249-423-11	CARBON	3. 3K	5%	1/4W F	R522	1-215-459-00	METAL	39K	1%	1/6W
R211	1-249-421-11	CARBON	2. 2K	5%	1/4W F	R523	1-215-459-00	METAL	39K	1%	1/6W
R212	1-249-421-11	CARBON	2. 2K	5%	1/4W F	R524	1-215-459-00	METAL	39K	1%	1/6W
R215	1-247-807-31	CARBON	100	5%	1/4W	R525	1-215-452-00	METAL	20K	1%	1/6W
R217	1-249-421-11	CARBON	2. 2K	5%	1/4W F	R526	1-215-461-00	METAL	47K	1%	1/6W
R218	1-249-437-11	CARBON	47K	5%	1/4W	R527	1-215-452-00	METAL	20K	1%	1/6W
R221	1-249-428-11	CARBON	8. 2K	5%	1/4W F	R528	1-215-461-00	METAL	47K	1%	1/6W
R222	1-249-423-11	CARBON	3. 3K	5%	1/4W F	R529	1-259-432-11	CARBON	1. 5K	5%	1/6W
R223	1-247-807-31	CARBON	100	5%	1/4W	R530	1-259-432-11	CARBON	1. 5K	5%	1/6W
R224	1-247-807-31	CARBON	100	5%	1/4W	R531	1-259-414-11	CARBON	270	5%	1/6W
R225	1-249-413-11	CARBON	470	5%	1/4W F	R532	1-259-410-11	CARBON	180	5%	1/6W
R226	1-249-441-11	CARBON	100K	5%	1/4W	R533	1-259-412-11	CARBON	220	5%	1/6W
R227	1-249-436-11	CARBON	39K	5%	1/4W	R534	1-259-488-11	CARBON	330K	5%	1/6W
R228	1-249-431-11	CARBON	15K	5%	1/4W	R535	1-249-393-11	CARBON	10	5%	1/4W F
R229	1-249-423-11	CARBON	3. 3K	5%	1/4W F	R536	1-259-412-11	CARBON	220	5%	1/6W
R230	1-249-417-11	CARBON	1K	5%	1/4W F	R537	1-249-425-11	CARBON	4. 7K	5%	1/4W F
R251	1-249-425-11	CARBON	4. 7K	5%	1/4W F	R539	1-249-425-11	CARBON	4. 7K	5%	1/4W F
R252	1-249-425-11	CARBON	4. 7K	5%	1/4W F	R540	1-249-441-11	CARBON	100K	5%	1/4W
R253	1-249-425-11	CARBON	4. 7K	5%	1/4W F	R551	1-249-435-11	CARBON	33K	5%	1/4W
R303	1-249-399-11	CARBON	33	5%	1/4W F	R552	1-249-435-11	CARBON	33K	5%	1/4W
R306	1-249-429-11	CARBON	10K	5%	1/4W	R553	1-249-425-11	CARBON	4. 7K	5%	1/4W F
R307	1-249-429-11	CARBON	10K	5%	1/4W	R554	1-249-435-11	CARBON	33K	5%	1/4W
R308	1-249-429-11	CARBON	10K	5%	1/4W	R621	1-215-459-00	METAL	39K	1%	1/6W
R309	1-249-429-11	CARBON	10K	5%	1/4W	R622	1-215-459-00	METAL	39K	1%	1/6W
R310	1-249-429-11	CARBON	10K	5%	1/4W	R623	1-215-459-00	METAL	39K	1%	1/6W
R311	1-249-429-11	CARBON	10K	5%	1/4W	R624	1-215-459-00	METAL	39K	1%	1/6W
R312	1-249-429-11	CARBON	10K	5%	1/4W	R625	1-215-452-00	METAL	20K	1%	1/6W
R313	1-249-429-11	CARBON	10K	5%	1/4W	R626	1-215-461-00	METAL	47K	1%	1/6W
R314	1-249-429-11	CARBON	10K	5%	1/4W	R627	1-215-452-00	METAL	20K	1%	1/6W
R315	1-249-429-11	CARBON	10K	5%	1/4W	R628	1-215-461-00	METAL	47K	1%	1/6W
R316	1-249-429-11	CARBON	10K	5%	1/4W	R629	1-259-432-11	CARBON	1. 5K	5%	1/6W
						R630	1-259-432-11	CARBON	1. 5K	5%	1/6W

MAIN

POWER

VOL

Ref.No.	Part No.	Description	Remark
R631	1-259-414-11	CARBON 270 5% 1/6W	
R632	1-259-410-11	CARBON 180 5% 1/6W	
R633	1-259-412-11	CARBON 220 5% 1/6W	
R634	1-259-488-11	CARBON 330K 5% 1/6W	
R635	1-249-393-11	CARBON 10 5% 1/4W F	
R636	1-259-412-11	CARBON 220 5% 1/6W	
R637	1-249-425-11	CARBON 4.7K 5% 1/4W F	
R639	1-249-425-11	CARBON 4.7K 5% 1/4W F	
R640	1-249-441-11	CARBON 100K 5% 1/4W	
R651	1-249-435-11	CARBON 33K 5% 1/4W	
R652	1-249-435-11	CARBON 33K 5% 1/4W	
R653	1-249-425-11	CARBON 4.7K 5% 1/4W F	
R654	1-249-435-11	CARBON 33K 5% 1/4W	
< VIBRATOR >			
X331	1-579-161-11	VIBRATOR, CRYSTAL (45.159MHz)	
X355	1-577-377-11	VIBRATOR, CERAMIC (10MHz)	

*	1-651-506-11	POWER BOARD	

< CAPACITOR >			
C701	1-164-159-11	CERAMIC 0.1uF 50V	
C702	1-106-343-00	FILM 0.001uF 5% 200V	
< CONNECTOR >			
* CN701	1-580-230-11	PIN, CONNECTOR (PC BOARD) 3P	
* CN702	1-564-512-11	PLUG, CONNECTOR 9P	
< TRANSFORMER >			
△T901	1-425-637-11	TRANSFORMER, POWER	

*	1-651-507-11	VOL BOARD	

< CAPACITOR >			
C901	1-164-159-11	CERAMIC 0.1uF 50V	
< CONNECTOR >			
* CN901	1-568-955-11	PIN, CONNECTOR 6P	
CN902	1-750-743-11	CONNECTOR, FFC/FPC 11P	
CN903	1-506-468-11	PIN, CONNECTOR 3P	
< IC >			
IC901	8-759-962-08	IC BA6208	

Ref.No.	Part No.	Description	Remark
< TRANSISTOR >			
Q901	8-729-900-80	TRANSISTOR DTC114ES	
< RESISTOR >			
R903	1-249-417-11	CARBON 1K 5% 1/4W F	
R904	1-249-413-11	CARBON 470 5% 1/4W F	
< VARIABLE RESISTOR >			
RV901	1-238-776-11	RES, VAR, CARBON 10KX3 (LINE OUT/PHONE LEVEL)	

MISCELLANEOUS			

3	1-696-760-11	WIRE (FLAT TYPE) (23 CORE)	
△9	1-575-651-21	CORD, POWER (915)	
△9	1-696-571-11	CORD, POWER (915E)	
65	1-696-967-11	WIRE (FLAT TYPE) (17 CORE)	
73	1-751-712-11	WIRE (FLAT TYPE) (11 CORE)	
* 314	1-452-538-11	MAGNET	
△354	8-848-144-11	OPTICAL PICK-UP KSS-240A	
357	1-575-001-11	WIRE, FLAT TYPE (12 CORE)	
FLD401	1-517-128-11	INDICATOR TUBE, FLUORESCENT	
M101	X-4917-523-3	MOTOR ASSY (SPINDLE)	
M102	X-4917-504-1	MOTOR ASSY (SLED)	
M151	A-4604-363-A	MOTOR (L) ASSY (LOADING)	
△T901	1-426-637-11	TRANSFORMER, POWER	

ACCESSORIES & PACKING MATERIALS			

1-465-593-11	REMOTE COMMANDER (RM-D991)		
1-558-271-11	CORD, CONNECTION (108cm)		
1-590-925-31	CORD, CONNECTION (100cm) (915E)		
3-707-584-01	COVER, BATTERY (for RM-D991)		
3-758-121-11	MANUAL, INSTRUCTION (ENGLISH, FRENCH, SPANISH, SWEDISH) (915:AEP/915E:UK)		
3-758-121-41	MANUAL, INSTRUCTION (GERMAN, DUTCH, ITALIAN, PORTUGUESE) (915:AEP)		
3-758-121-71	MANUAL, INSTRUCTION (GERMAN) (915:G)		
* 4-956-951-41	INDIVIDUAL CARTON (915)		
* 4-944-761-02	CUSHION		
* 4-956-951-51	INDIVIDUAL CARTON (915E)		

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

<u>Ref. No.</u>	<u>Part No.</u>	<u>Description</u>	<u>Remark</u>
		***** HARDWARE LIST *****	
#1	7-682-548-09	SCREW +BVTT 3X8 (S)	
#2	7-682-547-09	SCREW +BVTT 3X6 (S)	
#3	7-685-646-79	SCREW +BVTP 3X8 TYPE2 N-S	
#4	7-685-546-19	SCREW +BTP 3X8 TYPE2 N-S	
#5	7-621-255-15	SCREW +P 2X3	
#6	7-685-646-11	SCREW +BVTP 3X8	

