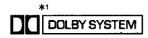
# Service Manual



Stereo Cassette Player

RQ-SX45



#### Colour

(S) ...... Silver Type (K) ...... Black Type (A) ..... Blue Type

#### Areas

(E) ...... Europe. (EB) ..... Great Britain.

\*1 Dolby noise reduction manufactured under license from Dolby Laboratories Licensing Corporation. "Dolby" and the double-D symbol DD are trademarks of Dolby Laboratories Licensing Corporation.

### **AR10 Mechanism Series**

### **Specifications**

### **CASSETTE PLAYER**

Track system: 4 track, 2 channel, stereo

Frequency Range

(Normal/High/Metal): 40 ~ 18,000 Hz Recharging time: About 2 hours

Motor: Electrical governor motor

Tape Speed: 4.8 cm/s

**GENERAL** 

Output jack: PHONES; 50  $\Omega$ 

Power Output: 2.5 mW + 2.5 mW (RMS...max.)

Power Requirement:

**Battery**; DC 1.2 V (included Rechargeable Battery)

Battery; DC 1.5 V (one R6/LR6, AA, UM-3 battery)

**Dimensions (W** $\times$ **H** $\times$ **D):** 108.8 $\times$ 77.3 $\times$ 20.9 mm

Weight: 162 g (with rechargeable battery)

#### **CHARGER**

Input:

For (E) area; AC 120 - 240 V, 50 Hz, 4 W For (EB) area; AC 230 - 240 V, 50 Hz, 4 W

Output:

For (E) area; DC 1.2 V, 340 mA For (EB) area; DC 1.2 V, 350 mA

#### Playing time:

(When used in hold mode, at 25 °C and on flat stable surface,)

Battery(-ies)	Tape playback
Rechargeable battery *2	About 17 hours
Panasonic alkaline battery	About 58 hours
Rechargeable battery *2 and Panasonic alkaline battery	About 72 hours

- \*2 When the rechargeable battery (included) is fully recharged (requires 2 hours ).
- Operating conditions may reduce the operating times shown above

**Note:** Design and specifications are subject to change without notice. Weight and dimensions are approximate.

#### **<u>∧</u>WARNING**

This service information is designed for experienced repair technicians only and is not designed for use by the general public. It does not contain warnings or cautions to advise non-technical individuals of potential dangers in attempting to service a product. Products powered by electricity should be serviced or repaired only by experienced professional technicians. Any attempt to service or repair the product or products dealt with in this service information by anyone else could result in serious injury or death.



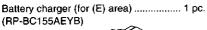
© 1999 Matsushita Electric Industrial Co., Ltd. All rights reserved. Unauthorized copying and distribution is a violation of law.

### ■Contents

	Page
Accessories	2
Hold Function / Batteries	
Basic Play	3
Service Mode	
Mechanism Block Replacement Procedure	7
Operation Checks and Component	
Replacement Procedures	8 – 11
Type Illustration of IC's, Transistors and Diodes	12
Schematic Diagram	12 – 15
Printed Circuit Board Diagram	16, 17
-	

	Page
Block Diagram	18
Check Point of Signal	18
Measurements and adjustments	18
Terminal Function of IC's	19
Replacement Parts List	20, 21
Supply of Rechargeable Battery as Replacement Parts	21
Caution in Use of Rechargeable Battery	21
Cabinet Parts Location	22
Mechanism Parts Location	23
Packaging	24

### ■Accessories





Battery charger (for (EB) area) ...... 1 pc. (RP-BC155AEBY)



Stereo earphones ..... 1 pc. (RFEV322P-KS)



Remote controller ...... 1 pc. (RFEV016P-5S)



Rechargeable battery (with case) ......... 1 pc. (RP-BP62EVS1)



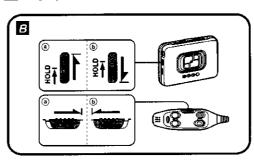
Battery case ...... (RFA1136-H)

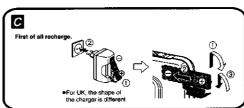


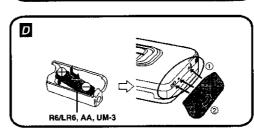
Carring case ...... 1 pc. (RFC0056-K)

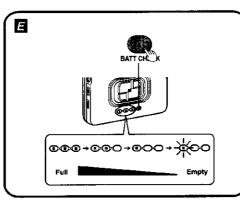


### ■Hold Function / Batteries









Capital letters (A) refer to the main illus-

Circled letters (a, A) refer to the sub-il**lustrations** 

### **HOLD** function

This function prevents the unit from oper-

ating in error.

a To hold

(a) To hold(b) To release (Before operation)

The function on the main unit and the remote control are independent of each

### **Batteries**

#### Rechargeable battery

- ●Use only the included charger when
- recharging.

  Normally 2 hours recharging will give about 17 hours tape playback (at 25°C).

  The rechargeable battery can be re-
- charged about 300 times. When its operation time becomes extremely shortened, that's time for replacing it.

### Notice about the rechargeable battery

The battery is designated recyclable. Please follow your local recycling regula-

#### Dry cell battery

### Battery condition indicators When the battery becomes weak The indicator will flash.

Recharge the rechargeable battery or replace the dry cell battery with a new one.

To confirm the indicators

Press [BATT CHECK].
The [E-F] indicator lamps scroll through twice and then light to indicate

the remaining charge.

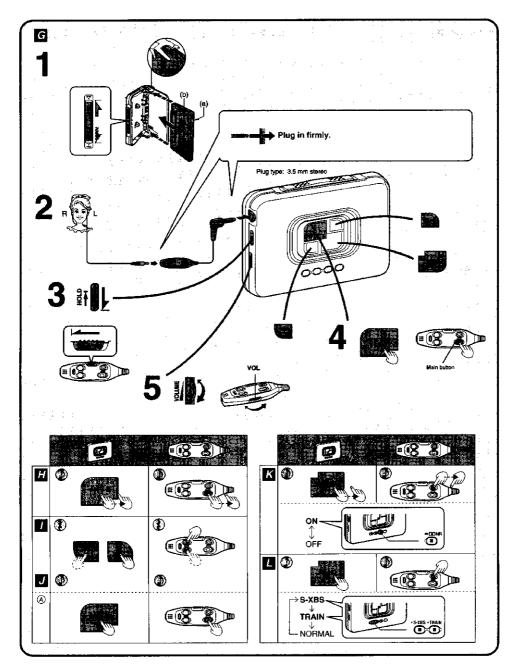
During play, these lamps indicate the Dolby B NR and tone settings (see

■ To extend playback time Install both types of battery (recharge-able and dry cell battery) in the unit.

### Cautions

- Insert the batteries in the correct polarities to avoid leakage and damage to this unit.
- •Remove all the batteries if the set will not be used for a long period of time.
- Do not peel off the plastic covering on the rechargeable battery.
- Do not play your headphones or ear-phones at high volume.
   To avoid product damage, do not ex-
- pose this product to rain, water or other liquids.
- Avoid using or placing this unit near sources of heat. Do not leave it in an automobile exposed to direct sunlight for a long period of time with doors and windows closed.

### **■**Basic Play



#### Epis Jus [jui Press and hold. During playback Press. In the stop mode

### Playing a tape

This unit is equipped with an auto tape select function, so you can use normal, high or metal position tapes.

 Insert the cassette tape.
 Tapeslack is wound automatically when the cover is closed and playback will be ready to start from the forward side.

- (a) Forward side
- (b) Reverse side
  2. Connect the stereo earphones and the remote control.
- 3. Release hold.
- 4. Press [◀►/■] (main unit) or the main button (remote control).
- 5. Adjust the volume.

Before using [VOL] on the remote control, be sure to adjust [VOLUME] on the main unit to the "5-7" position.

To stop playback: Press [◀►/■] (main unit) or the main button (remote control).

Auto-reverse

The tape is played up to 3 times unless manually stopped.

- To change sides
- To wind the tape
- Tape Program Sensor (TPS) Press to skip 1, 2 or 3 tracks

Play begins on the other side if the end of the tape is reached during this operation.

(A) To switch to playback

### ☑ DOLBY B NR

Light [ ■ □□ NR] to reduce noise to 1/3 on tapes recorded with Dolby B NR.

Dolby noise reduction manufactured under license from Dolby Laboratories Licensing Corporation. "DOLBY" and the double-D symbol DD are trademarks of Dolby Laboratories Licensing Corporation.

### Changing the tone

S-XBS: Boosts the low frequency

•If sound distortion occurs, turn down the

volume

TRAIN: Cuts down the audible level

of sound which may disturb those around you.

NORMAL: Normal sound.

### **■** Service Mode

The RQ-SX45 has a Service mode designed to help identify faulty parts in the event of an error. This mode is especially useful when servicing is carried out.

#### **Items Required**

Stereo earphones

• Rechargeable battery or dry cell (R6/LR6, AA,UM-3) housed in case







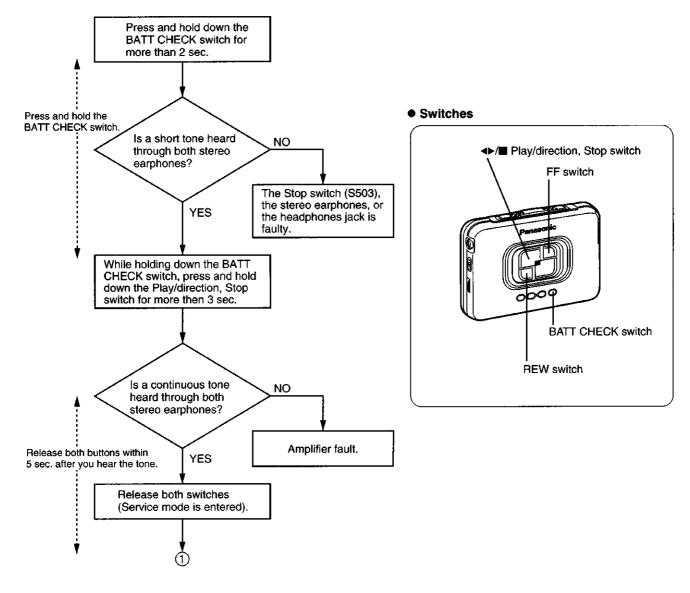
#### **Service Mode Functions**

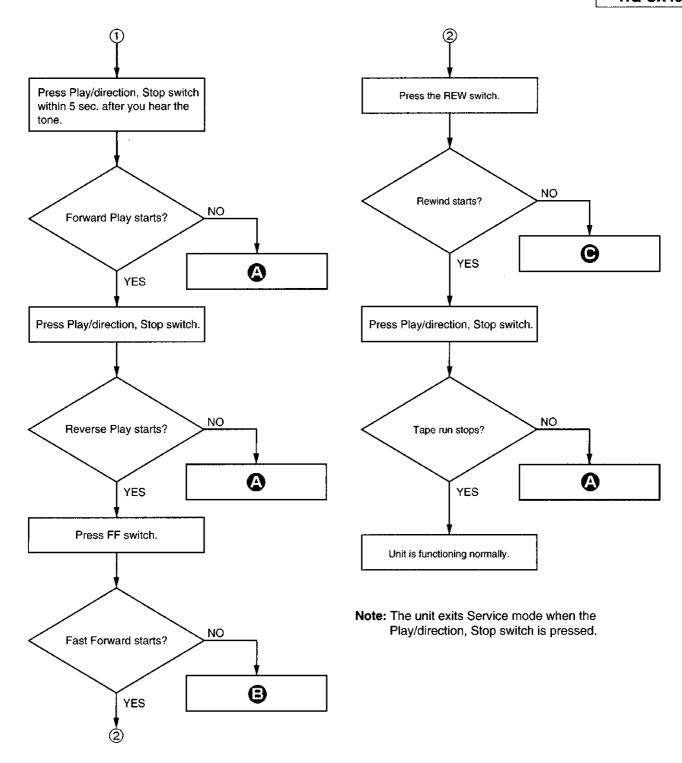
- (1) Unit and stereo earphones test ...... This checks for problems existing in the unit or stereo earphones.
- (2) Amplifier test ...... This test should be run if an "amplifier failure" occurred during test (1) above.

### (1) Unit and Stereo Earphones Test

#### Preparations:

- 1. Plug the stereo earphones into the headphones jack.
- 2. Insert a fully-charged rechargeable battery or a dry cell (R6/LR6, AA, UM-3) (housed in battery case).
- 3. Insert a cassette tape.





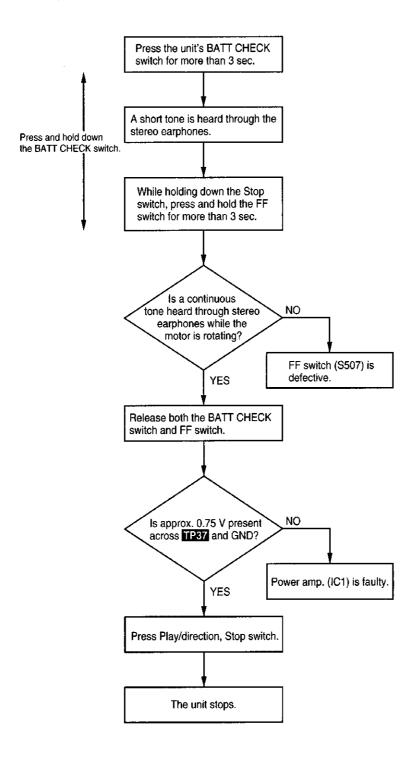
### Troubleshooting

Step	Symptom	Fault Location
A	Playback, reverse or stop fails if Play/direction, Stop switch is pressed.	S505 or motor may be faulty.
<b>3</b>	Fast Forward fails to start if FF switch is pressed.	S507 may be defective.
Θ	Rewind fails to start if REW switch is pressed.	S506 may be defective.

### (2) Amplifier Test

This test is required if the amplifier is found to be malfunctioning through (1) Unit and Stereo Earphones Test.

Preparations: See (1) Unit and Stereo Earphones Test.



Note: The unit exits Service mode when the Play/direction, Stop switch is pressed.

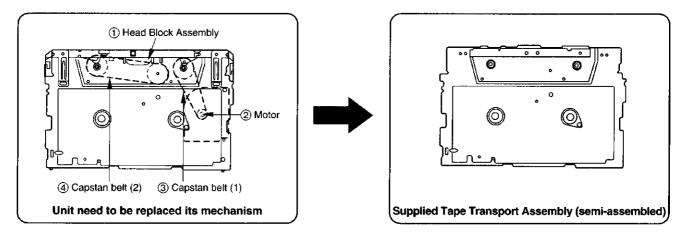
### **■** Mechanism Block Replacement Procedure

#### **Replacing the Tape Transport Assembly**

The tape transport mechanism is supplied semi-assembled.

Configuration: Tape transport mechanism excluding the head block assembly, capstan motor and capstan belts (1) and (2).

When replacing the Tape Transport Assembly, first remove the 1 head block assembly, 2 motor and 3 capstan belts (1) and 4 (2) from the assembly to be replaced, then install these parts ( $\textcircled{1} \sim \textcircled{4}$ ) onto the replacement assembly supplied. (For details of the dismantling procedure, see "Disassembly Required until Operation Test and Major Component Replacement Procedures".)



Note: After replacing, perform tape speed adjustment.

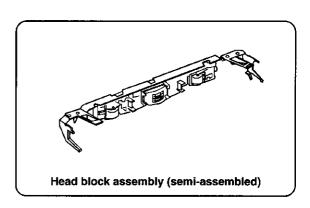
### Replacing the head block assembly

The head block assembly is supplied semi-assembled.

Configuration: Head block assembly with head arm spring and pinch roller arm assembly (F) and (R).

The head arm spring and pinch roller arm assembly (F) and (R) will also be supplied separately from the head block assembly.

Note: The head block assembly requires no azimuth adjustment.

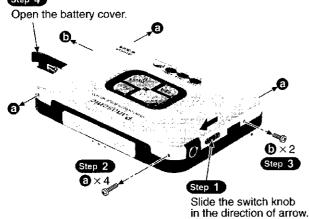


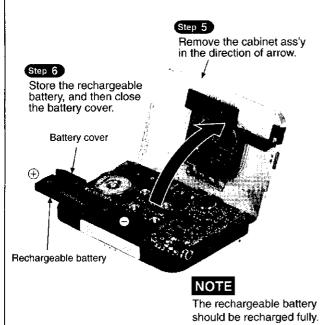
### ■ Operation Checks and Component Replacement Procedures

- NOTE 1. This section describes procedures for checking the operation of the major printed circuit boards and replacing the main components.
  - 2. For reassembly after operation checks or replacement, reverse the respective procedures. Special reassembly procedures are described only when required.
  - 3. Select item from the following index when checks or replacement are required.

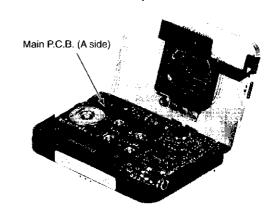
Contents	Page.
1. Checking for the main P.C.B	• 8,9.
2. Replacement for the motor and capstan belt. • • • • • • • • • • • • • • • • • • •	9,10.
3. Replacement for the cassette lid ass'y.	- 10.
4. Replacement for the head bloack ass'y.	• 11

## 1. Checking for the main P.C.B. (Checking for the main P.C.B. (A side))

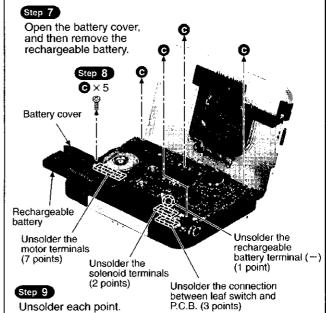


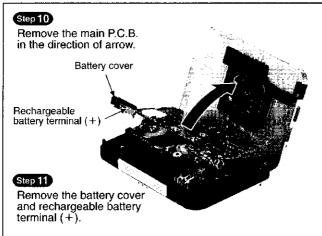


· Check the main P.C.B. (A side) as shown below.

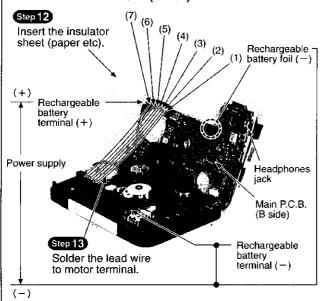


(Removal for checking the main P.C.B. (B side))





· Check the main P.C.B. (B side) as shown below.



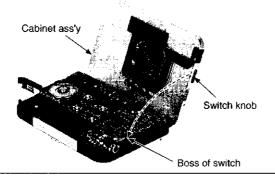
#### ■Operation Checks

Confirm that the beeper sounds once by headphones when depressing the BATT CHECK button more than 3 sec. under above condition, and then depress the BATT CHECK button and FF button at same time more than 3 sec., so the FF mode will be operated.

Depress the PLAY/DIRECTION/STOP (◀▶/ ■) button, and then that operation will be stopped.

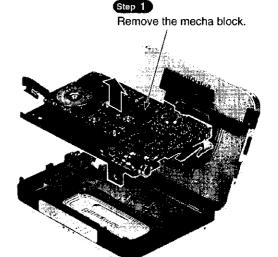
#### Notice for installing the cabinet ass'y

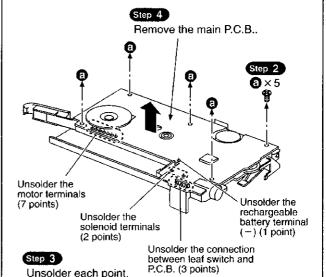
1. Make sure the boss of switch are fit in the switch knob when assembling.



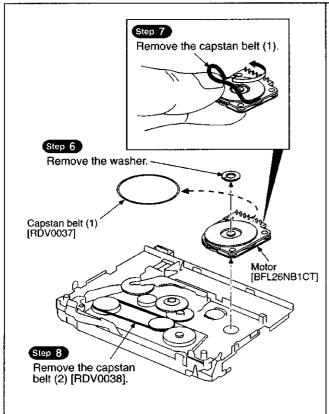
### 2. Replacemet for the motor and capstan belt

· Follow the Step 1 ~ Step 4 of the item 1 on page 8.



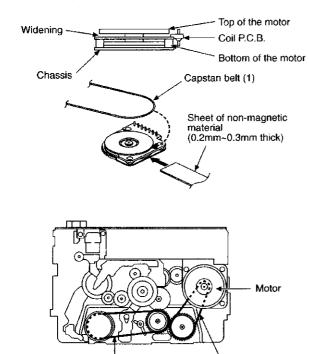


Unsolder each point.

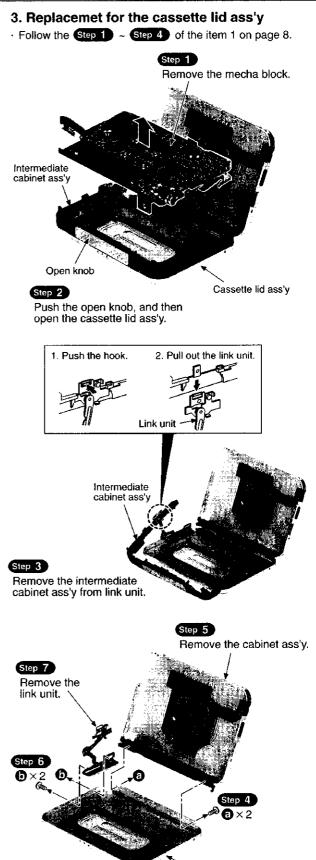


### Installing the capstan belt (1)

-When install the capstan belt (1) to motor, push up the motor by insert the non-magnetic material sheet between bottom of the motor and the chassis, and install the capstan belt (1) between top of the motor and the coil P.C.B..

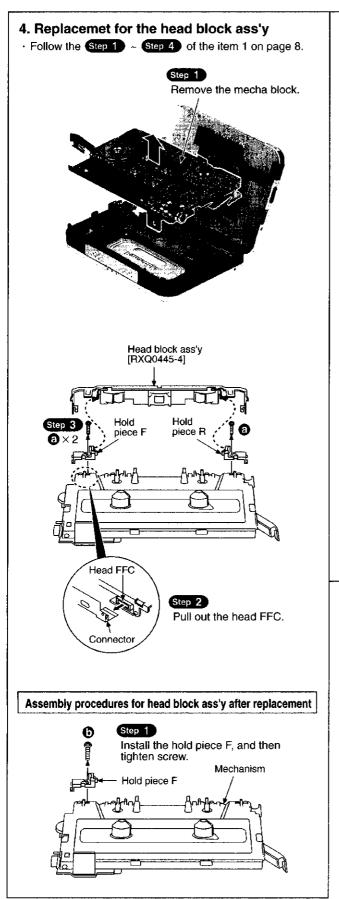


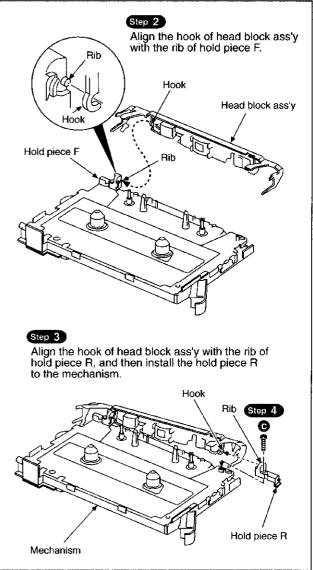
Capstan belt (2)



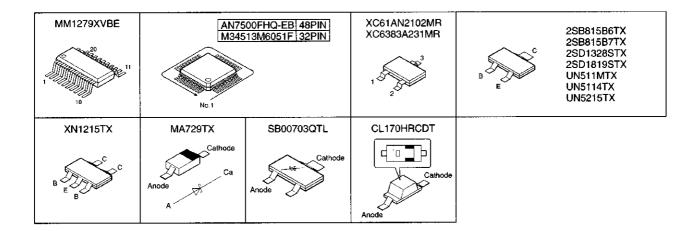
Cassette lid ass'y

Capstan belt (1)





### ■ Type Illustration of IC's, Transistors and Diodes



### **■**Schematic Diagram

(This schematic diagram may be modified at any time with development of new technology.)

#### Notes:

◆ S11-1 : Cassette half detect switch. (IN...ON, OUT...OFF)

• S11-2 : Tape select switch. (NORMAL...ON, METAL/CrO2...OFF)

• S500 : FWD/REV/STOP detect switch in "FWD" position.

S502: HOLD switch in "OFF" position.

S503: Battery condition check switch. (BATT CHECK)

• S505 : Playback/direction, Stop switch. (◀▶ / ■)

• \$506 : REW switch. (REW)

• \$507 : FF switch. (FF)

• S508 : Sound select / DOLBY B NR switch. (SOUND SEL)

● VR1 : Volume control VR. (VOLUME)

• VR601: Tape speed adjustment VR.

• DC voltage measurements are taken with electronics voltmeter from negative terminal of battery. No mark...Fast Forward (FF) mode

Current consumption of tape playback (FWD)

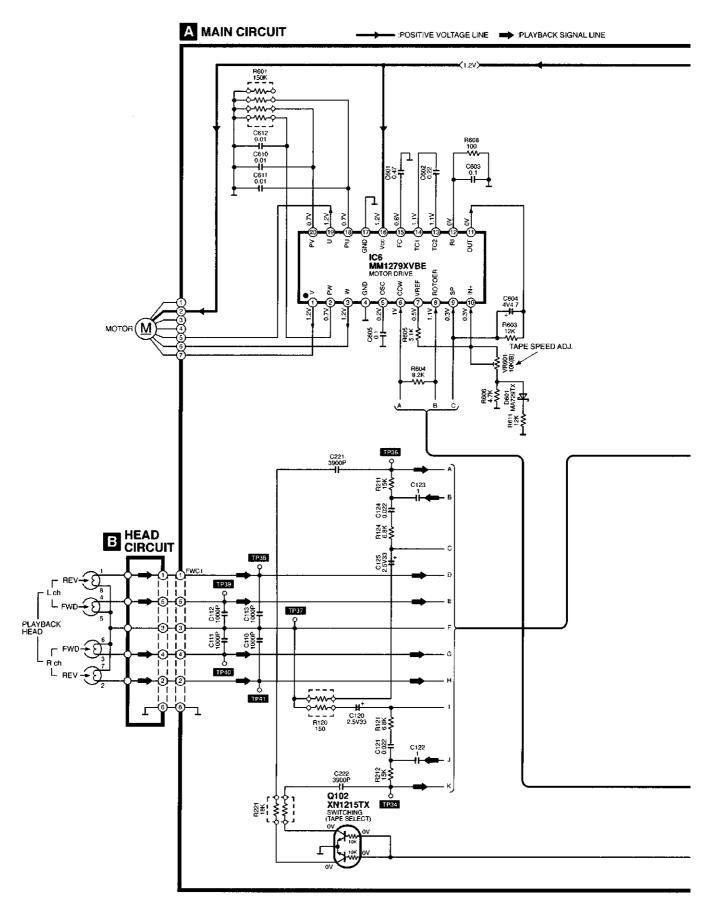
Volume VR MAX ...... 41 mA

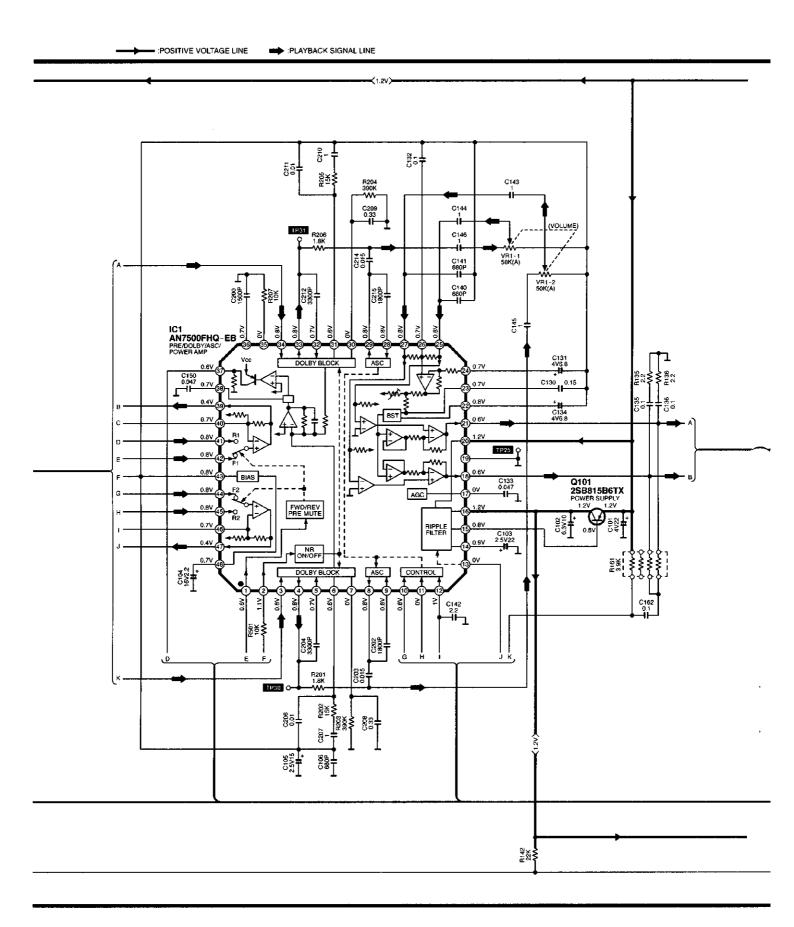
MIN ...... 36 mA

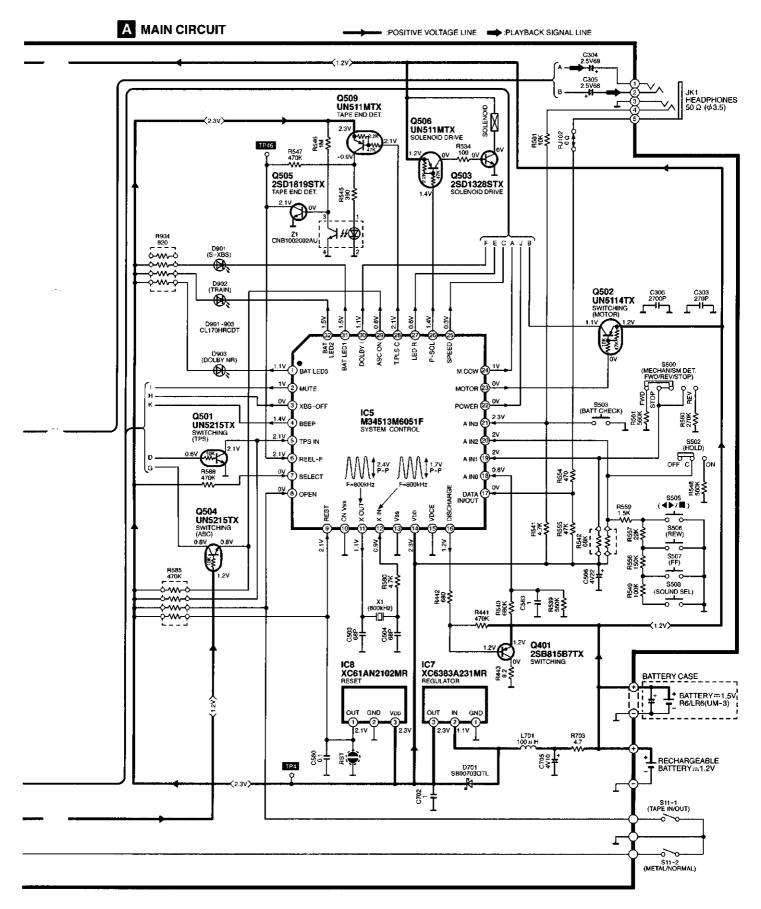
• Signal line

: Positive voltage line

=== : Playback signal line

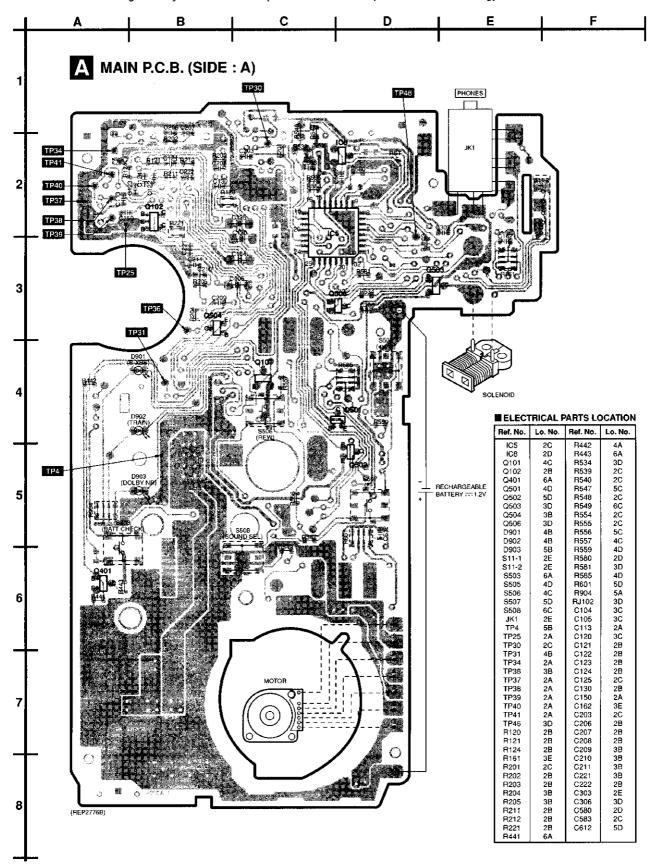


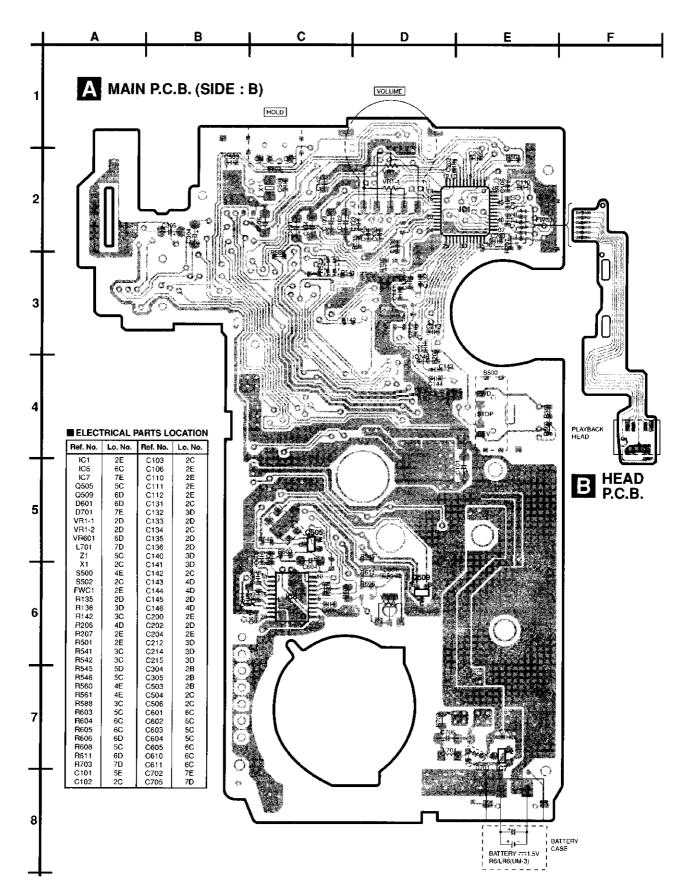




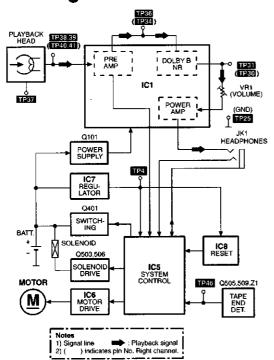
### ■ Printed Circuit Board Diagram

• This circuit board diagram may be modified at any time with the development of new technology.





### **■ Block Diagram**



### **■** Check Point of Signal

CHECK	TEST POINT	
	FWD Lch	TP39
HEAD	FWD Rch	TP40
Į.	REV Lch	TP38
PRE AMP.	REV Rch	TP41
	VREF	TP37
	Lch	TP36
PRE OUT	Rch	TP34
	GND	TP25
DOLBY OUT	Lch	TP31
<b>↓</b>	Rch	TP30
VOLUME VR	GND	TP25
	L¢h	HEADPHONES JACK
POWER AMP.	Rch	HEADPHONES JACK
	GND	HEADPHONES JACK
DC CONVERTER	2.4V OUTPUT	TP4
	GND	TP25
TAPE END PULSE	FWD PULSE	TP46
	GND	TP25

### **■**Measurements and Adjustments

### Adjustment Instructions

READ CAREFULL	V REFORE	ATTEMPTING	ADJUSTMENTS

1. Set volume control to maximum.

3. Release the hold state.

2. Set Dolby NR switch to OFF.

4. Set power source voltage to 1.25V ~ 1.35V DC.

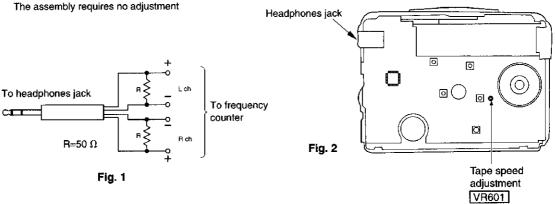
#### Control Positions and Equipment Used

1. Frequency counter

#### ◆Tape Section

ITEM	TEST TAPE	MEASUREMENT	ADJUSTMENT	PROCEDURE
· · · - · · ·	1201 1111 2	POINT	POINT	
Tape speed adjustment	QZZCWAT (3 kHz, –10 dB)	Connect the frequency counter to headphones jack (50 Ω) (Refer to Fig.1)	VR601 (Refer to Fig.2)	Playback the central part of the tape and adjust VR601 so that the tape speed is as follows.  Forward: 3015 ± 15 Hz  Reverse: 2975 ~ 3055 Hz  Make sure that the frequency range in within ±6th Hz for between "Forward" and "Reverse" mode.

Note: The Playback head is supplied on the head arm assembly. (See the Mechanism parts Location)



### ■ Terminal Function of IC's

### • IC5 (M34513M6051F) : Mechanism Control

Pin Terminal III					
No.	Name	1/0	Function		
1	BATT_LED3	0	DOLBY/Battery condition LED drive signal output		
2	MUTE	0	Muting signal output		
3	XBS-OFF	0	S-XBS control signal output		
4	BEEP	0	Beep signal output		
5	TPS IN	-	TPS control signal input		
6	REEL-F	-	FWD reel pulse input		
7	SELECT	1	Remote controller type select signal input		
8	OPEN	1	Cassette tape insert signal input (L=Tape is inserted, H=Tape is not inserted)		
9	REST	ı	Reset signal input		
10	CN Vss	_	GND		
11	X OUT	0	Constal OSC terminal (900kHz)		
12	X IN	1	Crystal OSC terminal (800kHz)		
13	Vss	-	GND		
14	Voo	ı	Power supply		
15	VDCE	ì	GND		
16	DISCHARGE	0	Battery condition detect signal output		
17	DATA IN/OUT	1/0	Remote controller serial data input/output		
18	AINO	-	No used, connected to VDD		
19	AIN1	1	FWD/REV detect signal input		
20	AIN2	_	Operation switch signal input		
21	AIN3	-	BATT CHECK signal input		
22	POWER	0	Power control signal output		
23	MOTOR	0	Motor drive signal output		
24	M.CCW	0	Motor control signal output		
25	SPEED	0	Motor speed control signal output		
26	P-SOL	0	Solenoid drive signal output		
27	LEDR	0	Head switching signal output		
28	T.PLS-C	0	Power control signal output (for photocoupler)		
29	ASCON	_	No used, connected to GND		
30	DOLBY-L	0	DOLBY ON signal output		
31	BATT_LED1	1	XBS/Battery condition LED drive signal output		
32	BATT_LED2	1	ASC/Battery condition LED drive signal output		

### **■** Replacement Parts List

Notes: \* Important safety notice:

Components identified by  $\triangle$  mark have special characteristics important for safety.

Furthermore, special parts which have purposes of fireretardant (resistors), high-quality sound (capacitors), lownoise (resistors), etc. are used.

When replacing any of components, be sure to use only manufacture's specified parts shown in the parts list.

- \* All parts are supplied by MESA.
- \* The marks in Remarks indicates as follow.
- Language of instruction manual.

<IA> : English,Germany,Italian,French,Spanish

<IB>: Swedish, Dutch, Danish, Russian, Polish, Czech

. Specify the areas and colours.

(E) : For Europe. (EB) : For Great Britain.

(S) : For Silver Type.

(K) : For Black Type.

(A) : For Blue Type.

\* A10 \*1 : This item is not attached merchandise, but it is spplied as a replacement parts.

Ref.No.	Part No.	Part Name & Description	Pcs	Remarks
1,61,140.	Fall No.	Fait Name & Description	I Ga	Helilaiks
1	FHD14057-S	SCREW	2	
2	RHD14059-S	SCREW	4	
3	RHQ0032-S	SCREW	2	
4	RYF0503-A	CASSETTE LID UNIT	1	(A)
4	RYF0503-K	CASSETTE LID UNIT	1	(K)
4	RYF0503-S	CASSETTE LID UNIT	1	(S)
4-1	RHQ0062-S	SCREW	2	ζ=/
4-2	RXM0067	LINK UNIT	1	
5	RYK0815B-A	HINGE UNIT	1	(A)
5	FIYK0815B-K	HINGE UNIT	1	(K)
5	RYK0815B-H	HINGE UNIT	1	(S)
6	FIYK0905A-A	CABINET ASS'Y	1	(A)
6	RYK0905A-K	CABINET ASS'Y	1	(K)
6	FIYK0905A-S	CABINET ASS'Y	1	(S)
6-1	RGU1720-S	BUTTON,MECHANISM	11	. ,
6-2	RGV0227-H1	KNOB,HOLD	1	
7	RYQ0258-A	CENTOR ORNAMENT	1	(A)
7	FIYQ0258-K	CENTOR ORNAMENT	1	(K)
7	RYQ0258-H	CENTOR ORNAMENT	1	(S)
8	RHQ0013-1	SCREW	1	
9	RJC99027	R.BATT.TERMINAL(+)	1	
10	RJC99028	R.BATT.TERMINAL(-)	1	
11	RHQ0060-N	SCREW	6	
12	RKK0124-A	BATTERY COVER	1	(A)
12	RKK0124-H	BATTERY COVER	1 1	(K)
12	RKK0124-S	BATTERY COVER	1	(S)
101	BFL26NB1CT	MOTOR	1	
102	XQS14+A2FZ	SCREW	2	
103	RHW40002	WASHER	1	
104	RDV0037	BELT(1)	1	
105	FIDV0038	BELT(2)	1	
106	RXQ0445-4	HEAD BLOCK ASS'Y	1	
106-1	FIXL0130	PINCH ROLLER ARM(F)	1	
106-2	RME0187-1	SPRING	1	
106-3	RXL0131	PINCH ROLLER ARM(R)	1	
107	RFKRQSX75-S	MECHANISM BLOCK ASS'Y	1	
107-1	RMQ0547	HOLD PIESE(F)	1	
107-2	RHD14047	SCREW	2	
107-3	RMQ0548-1	HOLD PIESE(R)	1	
A1	RP-BP62EYS1	RECHARGEABLE BATT.	1	
A1-1	RFA0475-Q	R.BATT CASE	1	
A2	RFA1136-H	BATT.CASE	1	
A3	RFC0056-K	CARRING CASE	1	
A4	RFEV012P-KS	REMOTO CONTROLLER.	1	
A5	RFEV326P-KS	STEREO EARPHONE	1	
<b>Å</b> A6	RP-BC155AEBY	BATT.CHARGER	1	(EB)
<b>⚠ A</b> 6	RP-BC155AEYB	BATT.CHARGER	1	(E)
A7	RQCB0169	SERVICE CENTER LIST	1	
A8	RQT4910-B	INSTRUCTION MANUAL	1	<ia></ia>
A9	RQT4911-E	INSTRUCTION MANUAL	1	<ib>(E)</ib>
A10*1	RKB205ZA-0	EAR PAD	1	

			,, <u>,,,,,,,</u> ,,,,	·
Ref.No.	Part No.	Part Name & Description	Pcs	Remarks
A11	RQA0117	WARRANTY CARD	1	
A12	RFA0574-K	CLIP	1	
	BOOTSOWS	104 0011		
C101	RCST0GY226RU	4V 22U	1	
C102	RCST0JY106TG	6.3V 10U 2.5V 22U	1	
C103	RCST0EY226RG		<u></u>	
C104	RCST1CY225RG	16V 2.2U	1	
C105	RCST0EY156RG	2.5V 15U	1	
C106	ECUV1H681KBV	50V 680P	1	
C110-13	ECUV1H102KBV	50V 1000P	4	
C120	RCST0EY336RG	2.5V 33U	1	
C121	ECUV1C223KBV	16V 0.022U	1	
C122,23	ECUVNA105ZFV	10V 1U	2	
C124	ECUV1C223KBV	16V 0.022U	1	
C125	RCST0EY336RG	2.5V 33U	1	
C130	ECUVNA154KBV	10V 0.15U	1	
C131	RCST0GY685RG	4V 6.8U	1	
C132	ECUVNC104KBV	16V 0.1U	1	
C133	ECUVNC473KBV	16V 0.047U	1	
C134	RCST0GY685RG	4V 6.8U	1	
C135,36	ECUVNC104KBV	16V 0.1U	2	
C140,41	ECUV1H681KBV	50V 680P	2	
C142	ECUVNC225ZFN	50V 2.2U	1	
C143-46	ECUVNA105ZFV	10V 1U	4	
C150	ECUVNC473KBV	16V 0.047U	1	
C162	ECUVNC104ZFV	16V 0.01U	1	
C200	ECUV1H152KBV	50V 1500P	1	-
C202	ECUV1H182KBV	50V 1800P	1	
C202	ECUVNE153KBV	25V 0.015U	1	
C203	ECUV1H332KBV		1	
			_	
C206	ECUVIE103KBV	25V 0.01U	†	
C207	ECUVNA105ZFV	10V 1U	1	
C208,09	ECUVNC334ZFV	16V 0.33U	2	
C210	ECUVNA105ZFV	10V 1U	1	
C211	ECUV1E103KBV	25V 0.01U	1	
C212	ECUV1H332KBV	50V 3300P	1	
C214	ECUVNE153KBV	25V 0.015U	1	
C215	ECUV1H182KBV	50V 1800P	1	
C221,22	ECUV1H392KBV	50V 3900P	2	
C303	ECUV1H271KBV	50V 270P	1	
C304,05	RCST0EY686RG	2.5V 68U	2	
C306	ECUV1H272KBV	50V 2700P	1	
C503,04	ECUV1H680JCV	50V 68P	2	
C506	RCST0GY226RU	4V 22U	1	
C580	ECUVNC104ZFV	16V 0.1U	1	
C583	ECUVNA105ZFV	10V 1U	1	
C601	ECUV0J474KBV	6.3V 0.47U	1	
C602	ECUVNA224KBV	10V 0.22U	1	
C603	ECUVNC104KBV	16V 0.1U	1	
L			_	
C604	RCST0GY475RG	4V 4.7U	1	
C605	ECUVNC104KBV	16V 0.1U	1	
C610	ECUV1E103KBV	25V 0.01U	1	
	ECUV1E103KBV	25V 0.01U	2	
C702	ECUVNA105ZFV	10V 1U	1	
C705	RCST0GY106RG	4V 10U	1	
D601	MA729TX	DIODE	1	
D701	SB00703QTL	DIODE	1	
D901-03	CL170HRCDT	LED	3	
FWC1	RJS2A1606T	FFC CONNECTOR(6P)	1	
IC1	AN7500FHQ-EB	IC	1	
IC5	M34513M6051F	IC	1	
IC6	MM1279XVBE	IC	1	
IC7	XC6383A231MR	IC	1	
IC8	XC61AN2102MR	IC	1	
			Ė	
JK1	RJJ35TK05-C	JACK,HEADPHONE	1	<del></del>
3111				
L701	RLQQ101KT2-D	COIL	1	
L/VI	neggiothiz-D	OOIL		
<u>.</u>	DDK1047	CIET BOY		(4)
P1	RPK1247	GIFT BOX		(A)
P1	RPK1246	GIFT BOX	1	(K)
P1	RPK1245	GIFT BOX	1	(S)
P2	RPQ0575	SPACER	1	
Q101	2SB815B6TX	TRANSISTOR	1	

Ref.No.	Part No.	Part Name & Description	Pcs	Remarks
Q102	XN1215TX	TRANSISTOR	1	
Q401	2SB815B7TX	TRANSISTOR	1	
Q501	UN5215TX	TRANSISTOR	1	
Q502	UN5114TX	TRANSISTOR	1	
Q503	2SD1328STX	TRANSISTOR	1	
Q504	UN5215TX	TRANSISTOR	1	
Q505	2SD1819STX	TRANSISTOR	1	
Q506	UN511MTX	TRANSISTOR	1	
Q509	UN511MTX	TRANSISTOR	1	
R120	EXBV4V151JV	1/32W 150	1	
R121	ERJ3GEYJ682V	1/16W 6.8K	1	
R124	ERJ3GEYJ682V	1/16W 6.8K	1	
R135,36	ERJ3GEYJ2R2V	1/16W 2.2	2	
R142	ERJ3GEYJ223V	1/16W 22K	1	,
R161	EXBV8V392J	1/32W 3.9K	1	
R201	ERJ3GEYJ182V	1/16W 1.8K	1	
R202	ERJ3GEYJ153V	1/16W 15K	1	
R203,04	ERJ3GEYJ394V	1/16W 390K	2	
R205	ERJ3GEYJ153V	1/16W 15K	1	
R206	ERJ3GEYJ182V	1/16W 1.8K	1	
R207	ERJ3GEYJ103V	1/16W 10K	1	
R211,12	ERJ3GEYJ153V	1/16W 15K	2	
R221	EXBV4V183JV	1/32W 18K	1	
R441	ERJ3GEYJ474V	1/16W 470K	1	
R442	ERJ3GEYJ681V	1/16W 680	1	
R443	ERJ3GEYJ8R2V	1/16W 8.2	1	
R501	ERJ3GEYJ103V	1/16W 10K	1	
R534	ERJ3GEYJ101V	1/16W 100	1	
R539	ERJ6GEYD564V	1/16W 560K	1	
R540	ERJ6GEYD684V	1/10W 680K	1	
R541	ERJ3GEYJ472V	1/16W 4.7K	1	
R542	EXBV4V683JV	1/32W 68K	1	
R545	ERJ3GEYJ391V	1/16W 390	1	
R546	ERJ3GEYJ105V	1/16W 1M	1	
R547	ERJ3GEYJ474V	1/16W 470K	1	
R548	ERJ3GEYJ564V	1/16W 560K	1	
R549	ERJ3GEYJ104V	1/16W 100K	1	
R554	ERJ3GEYJ471V	1/16W 470	1	

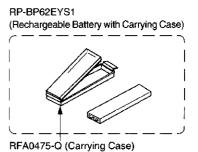
Ref.No.	Part No.	Part Name & Description	Pcs	Remarks
R555	ERJ3GEYJ473V	1/16W 47K	1	
R556	ERJ3GEYJ154V	1/16W 150K	1	
R557	ERJ3GEYJ223V	1/16W 22K	1	
R559	ERJ3GEYJ152V	1/16W 1.5K	1	
R560	ERJ3GEYJ274V	1/16W 270K	1	
R561	ERJ3GEYJ564V	1/16W 560K	1	
R580	ERJ3GEYJ472V	1/16W 4.7K	1	
R581	ERJ3GEYD103V	1/16W 10K	1	
R585	EXBV8V474J	1/32W 470K	1	•
R588	ERJ3GEYJ474V	1/16W 470K	1	
R601	EXBV8V154JV	1/32W 150K	1	
R603	ERJ3GEYJ123V	1/16W 12K	1	
R604	ERJ3GEYJ822V	1/16W 8.2K	1	
R605	ERAS27J512V	1/10W 5.1K	1	
R606	ERJ3GEYJ472V	1/16W 4.7K	1	
R608	ERJ3GEYJ101V	1/16W 100	1	
R611	ERJ3GEYJ123V	1/16W 12K	1	
R703	ERJ6GEYJ4R7V	1/10W 4.7	1	
R904	EXBV8V821J	1/32W 820	1	
RJ102	ERJ3GEY0R00V	CHIP JUMPER	1	
S11	RSH1B011-3U	sw	1	
S500	RSS2A012-1A	sw	1	
S502	RSS2A010-1A	sw	1	
S503	EVQPLMA15	sw	1	
S503	RSG0038-P	sw	1	
S505-08	EVQPLMA15	sw	4	
S508	RSG0038-P	sw	11	
VR1	EVUTUGB15A54	V.R,VOLUME	1	
VR601	EVM1CSX10B14	V.R,TAPE SPEED ADJ.	1	
			T	
Χŧ	RSXZ800KF01T	OSCILLATOR	1	
			T-†-	
Z1	CNB1002002AU	PHOTO SENSOR	1	
		1		
		<u> </u>	1	

### ■ Supply of Rechargeable Battery as Replacement Parts

Please take note of the following points relating to Carrying Case to be used for protection of Rechargeable Battery from shorting.

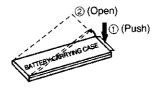
Replacement Parts:

- Rechargeable Battery (RP-BP62EYS1) to be supplied will be provided with Carrying Case (RFA0475-Q).
- No replacement parts will be supplied for Rechargeable Battery without Carrying Case.
- Replacement parts will be supplied for Carrying Case (RFA0475-Q) without Rechargeable Battery.
- To your customers, delivery Rechargeable Battery together with Carrying Case to prevent shorting accidents that may occur when Rechargeable Battery is carried about without Carrying Case.

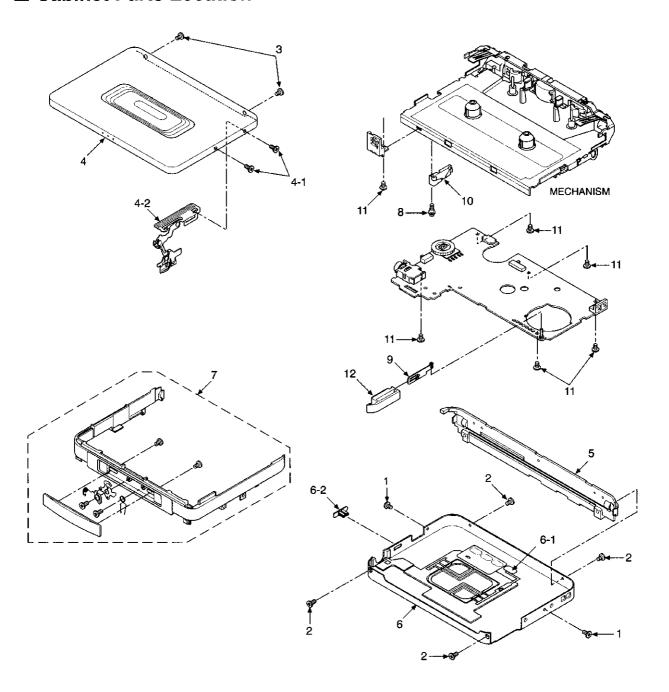


### ■ Caution in Use of Rechargeable Battery

- Take Rechargeable Battery out of Carrying Case and use it.
- Be sure to carry Rechargeable Battery in this Carrying Case. If not, may either heat or ignite by shorting with a metal.



# **■** Cabinet Parts Location

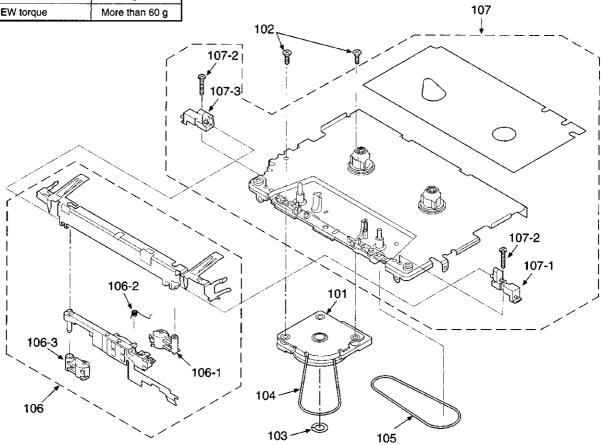


Ref.No.	Part No.	Part Name & Description	Pcs	Remarks
1	RHD14057-S	SCREW	2	
2	RHD14059-S	SCREW	4	
3	RHQ0032-\$	SCREW	2	
4	RYF0503-A	CASSETTE LID UNIT	1	(A)
4	RYF0503-K	CASSETTE LID UNIT	1	(K)
4	RYF0503-S	CASSETTE LID UNIT	1	(S)
4-1	RHQ0062-\$	SCREW	2	
4-2	RXM0067	LINK UNIT	1	
5	RYK0815B-A	HINGE UNIT	1	(A)
5	RYK0815B-K	HINGE UNIT	1	(K)
5	RYK08158-H	HINGE UNIT	1	(S)
6	RYK0905A-A	CABINET ASS'Y	1	(A)
6	RYK0905A-K	CABINET ASS'Y	1	(K)

Ref.No.	Part No.	Part Name & Description	Pcs	Remarks
6	RYK0905A-S	CABINET ASS'Y	1	(S)
6-1	RGU1720-S	BUTTON,MECHANISM	1	
6-2	RGV0227-H1	KNOB,HOLD	1	
7	RYQ0258-A	CENTOR ORNAMENT	1	(A)
7	RYQ0258-K	CENTOR ORNAMENT	1	(K)
7	FIYQ0258-H	CENTOR ORNAMENT	1	(S)
8	RHQ0013-1	SCREW	1	
9	RJC99027	R.BATT.TERMINAL(+)	1	
10	RJC99028	R.BATT.TERMINAL(-)	1	
11	RHQ0060-N	SCREW	6	
12	FIKK0124-A	BATTERY COVER	1	(A)
12	FIKK0124-H	BATTERY COVER	1	(K)
12	RKK0124-S	BATTERY COVER	1	(S)

### **■** Mechanism Parts Location

Wow and flutter	0.3 % (WRMS)
Pressure of pinch roller	110 ± 10 g
Take-up tension	More than 60 g
Playback torque	20 ± 5 g
FE/REW torque	More than 60 g

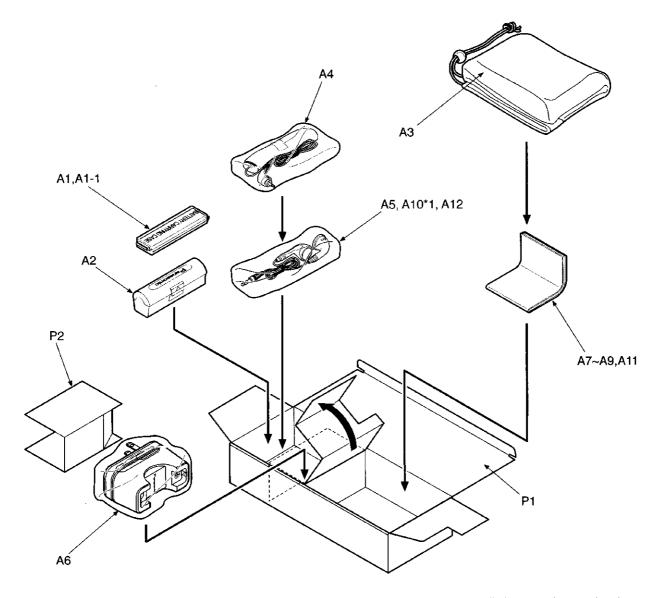


The parts enclosed in the dotted boxes are supplied as a block assembly.
Therefore, they are not supplied a separately except parts indicated with Ref. No.

L	Ref.No.	Part No.	Part Name & Description	Pcs	Remarks
ſ	101	BFL26NB1CT	MOTOR	1	
ſ	102	XQS14+A2FZ	SCREW	2	
Ī	103	RHW40002	WASHER	1	
I	104	RDV0037	BELT(1)	1	
ľ	105	FIDV0038	BELT(2)	1	
I	106	RXQ0445-4	HEAD BLOCK ASS'Y	1	
Г	106-1	RXL0130	PINCH ROLLER ARM(F)	1	

Ref.No.	Part No.	Part Name & Description	Pcs	Remarks
106-2	FIME0187-1	SPRING	1	
106-3	RXL0131	PINCH ROLLER ARM(R)	1	
107	RFKRQSX75-S	MECHANISM BLOCK ASS'Y	1	
107-1	RMQ0547	HOLD PIESE(F)	1	
107-2	RHD14047	SCREW	2	
107-3	RMQ0548-1	HOLD PIESE(R)	1	
			T	

## **■** Packaging



A10\*1:This item is not attached to marchandise, but it is supplied as a replacement parts.

Ref.No.	Part No.	Part Name & Description	Pcs	Remarks
A1	RP-BP62EYS1	RECHARGEABLE BATT.	1	
A1-1	RFA0475-Q	R.BATT.CASE	1	
A2	RFA1136-H	BATT.CASE	1	
A3	RFC0056-K	CARRING CASE	1	
A4	RFEV012P-KS	REMOTO CONTROLLER.	1	
A5	RFEV326P-KS	STEREO EARPHONE	1	
<b>Æ</b> A6	RP-BC155AEBY	BATT.CHARGER	1	(EB)

Ref.No.	Part No.	Part Name & Description	Pcs	Remarks
./∆ A6	RP-BC155AEYB	BATT.CHARGER	1	(E)
A7	RQCB0169	SERVICE CENTER LIST	1	
A8	RQT4910-B	INSTRUCTION MANUAL	1	<ia></ia>
A9	RQT4911-E	INSTRUCTION MANUAL	1	<ib>(E)</ib>
A10*1	RKB205ZA-0	EAR PAD	1 !	
A11	RQA0117	WARRANTY CARD	1	
A12	RFA0574-K	CLIP	1	