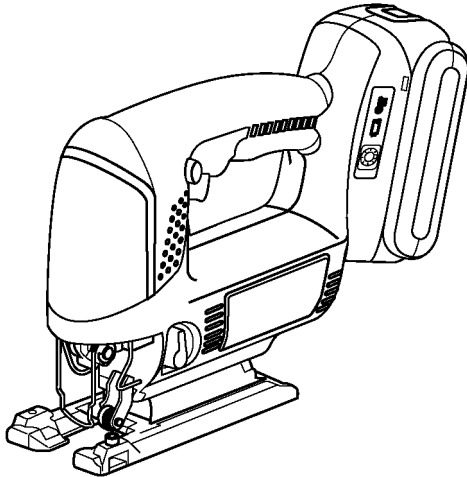


Service Manual

Cordless Jigsaw

Model No. **EY4541**

Europe
Oceania



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.

IMPORTANT SAFETY NOTICE


There are special components used in this equipment which are important for safety. These parts are marked by  in the Schematic Diagrams, Circuit Board Diagrams, Exploded Views and Replacement Parts List. It is essential that these critical parts should be replaced with manufacturer's specified parts to prevent shock, fire or other hazards. Do not modify the original design without permission of manufacturer.

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Panasonic

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1 Warning

Caution:

- Pb free solder has a higher melting point than standard solder; Typically the melting point is 50 - 70°F (30 - 40°C) higher. Please use a soldering iron with temperature control and adjust it to 750 ± 20°F (400 ± 10°C). In case of using high temperature soldering iron, please be careful not to heat too long.
- Pb free solder will tend to splash when heated too high (about 1100°F / 600°C).

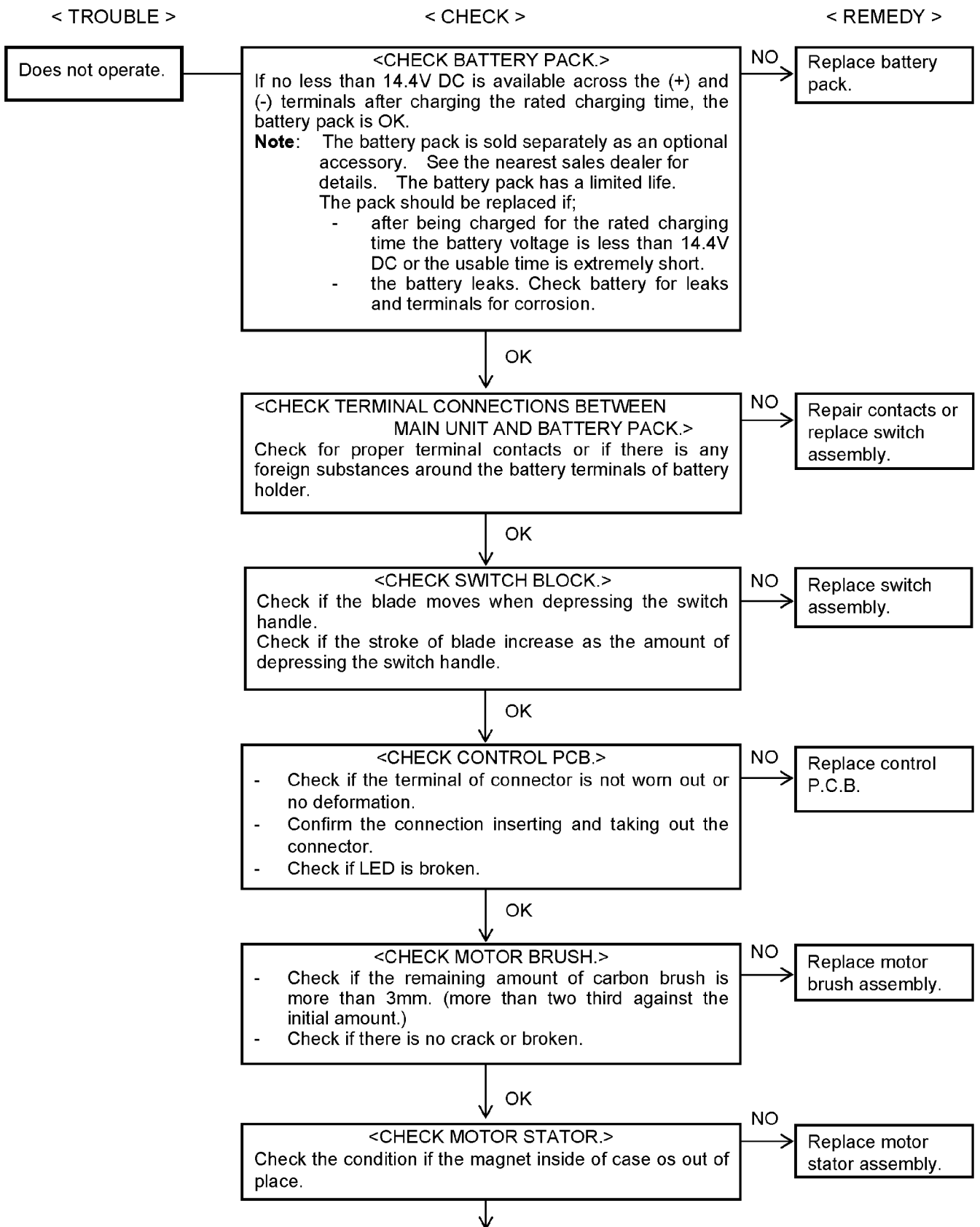
2 Specifications

MAIN UNIT

Motor		14.4V DC
Orbital stroke mode		4 position
Max thickness of mounting blade		1.3 mm (1/16")
Length of strokes		20 mm (25/32")
Strokes per minute		0 – 2400 / min
Maximum cutting capacities	Wood	65 mm (2-9/16")
	Mild steel	6 mm (1/4")
	Aluminum	10 mm (3/8")
Overall length		270 mm (10-5/8")
Weight (with battery pack EY9L40)		2.2 kg (4.8lbs.)

3 Troubleshooting Guide

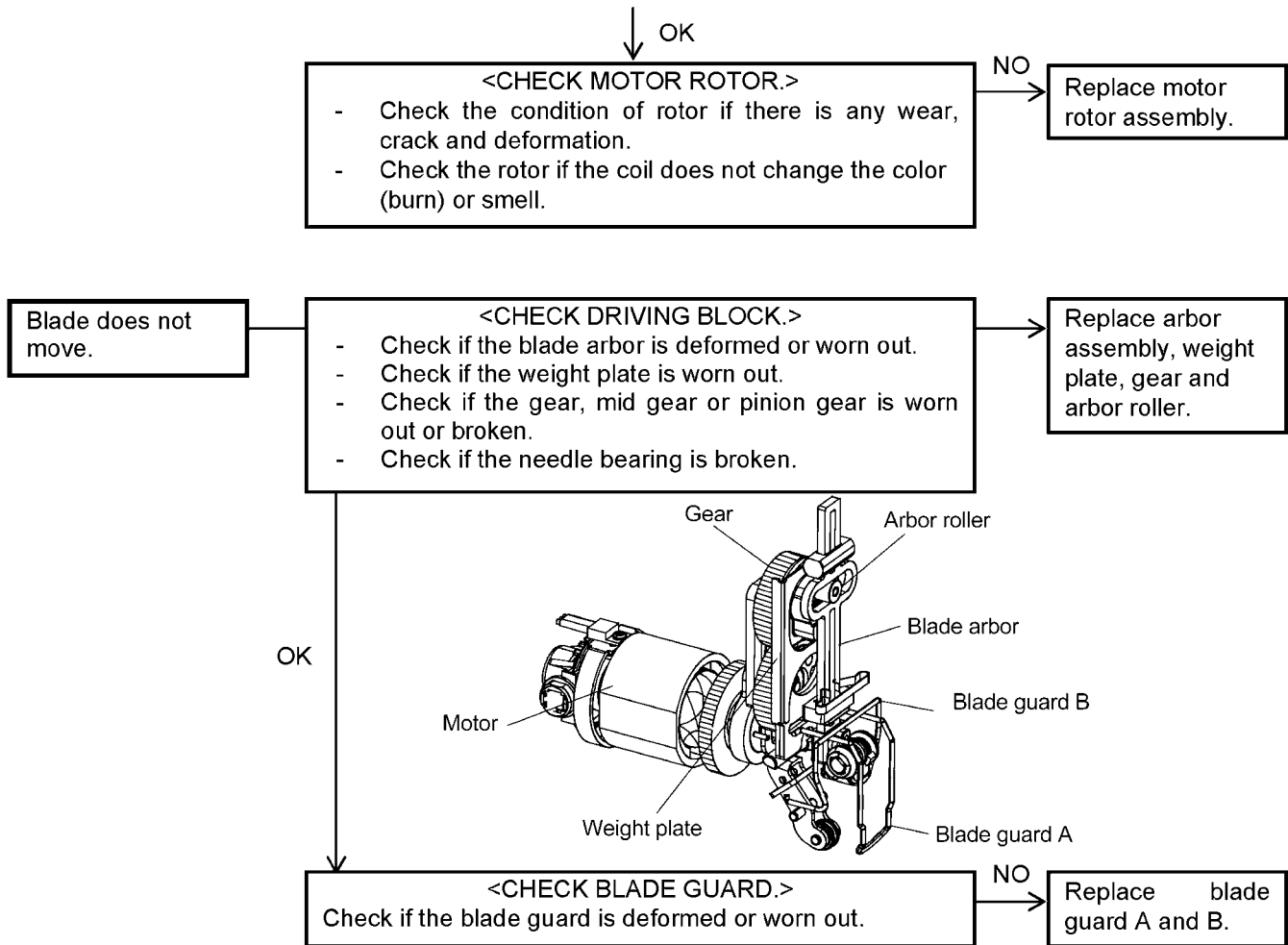
(Refer to Wiring Connection Diagram)



< TROUBLE >

< CHECK >

< REMEDY >



3.1. Trial Operation (after checking Troubleshooting Guide.)

3.1.1. ASSEMBLY

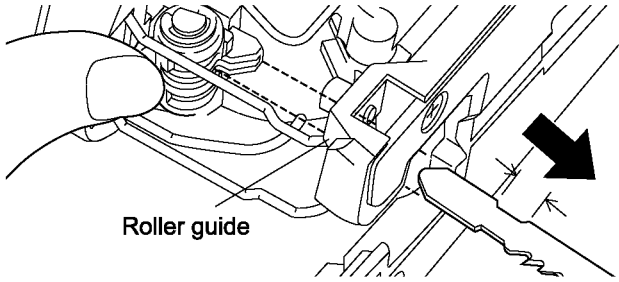
- Confirm if there is NO gap between Housing A and B by pinching the lead wires.
- Confirm if there is NO deformation on the battery terminals.
- Confirm all screws are tightened firmly.

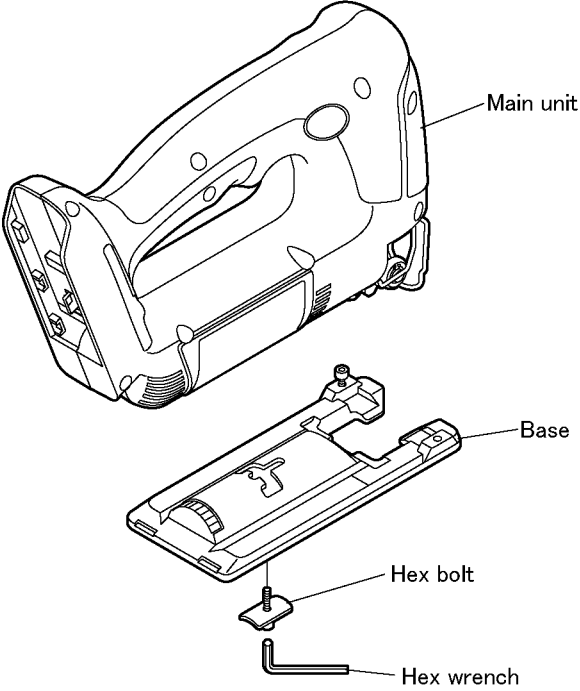
3.1.2. Operation

- Check if the switch turns ON and OFF smoothly.
- Check if the blade strokes properly.
- Cut concrete panel <(t) 12mm X (w) 300mm> as trial.
- Check if the orbital works properly.
- Check if there is no metallic sound, abnormal sound or abnormal vibration.
- Check the speed control and braking.
- Confirm if the LED lights on.

4 Disassembly and Assembly Instructions

4.1. How to Disassemble the Blade.

Ref. No. 1A	Procedure 1A	Removal of blade.
 <p>Roller guide</p>		<p>WARNING: To reduce the risk of injury, always remove battery pack before removing/installing the blade.</p> <ol style="list-style-type: none">1. Lift up the blade attach/remove lever.2. Pull out the blade. <p>CAUTION: Be careful to avoid cutting your hands on the blade.</p>

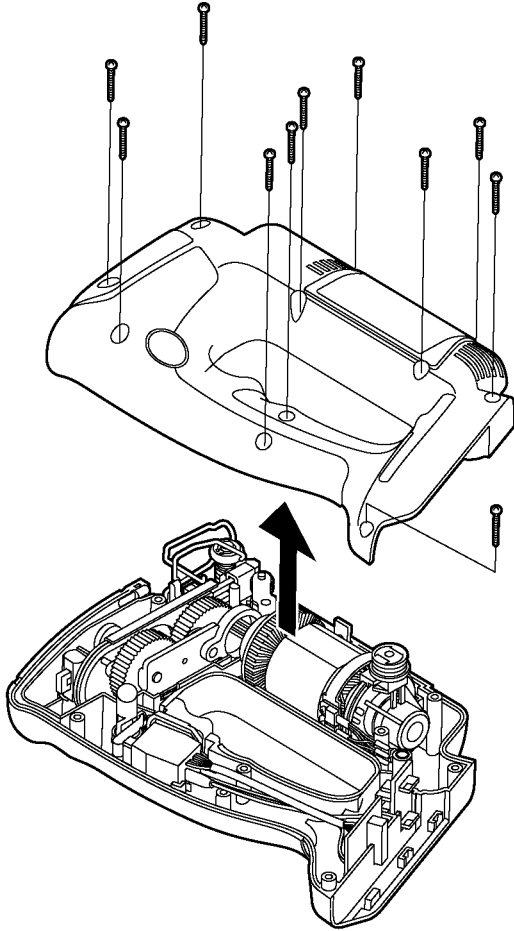
Ref. No. 1B	Procedure 1A → 1B	Removal of base.
 <p>Main unit</p> <p>Base</p> <p>Hex bolt</p> <p>Hex wrench</p>		<ol style="list-style-type: none">1. Use the provided hex wrench to loosen the base fixing screw. <p>NOTE: Keep the hex wrench in the storage slot on the tool's body when not using it.</p> <ol style="list-style-type: none">2. Remove the hex bolt and base.

Ref. No. 1C

Procedure 1A → 1B → 1C

Removal of the housing.

1. Loosen 11 housing screws.
2. Hold the housing A and take the housing B up vertically.

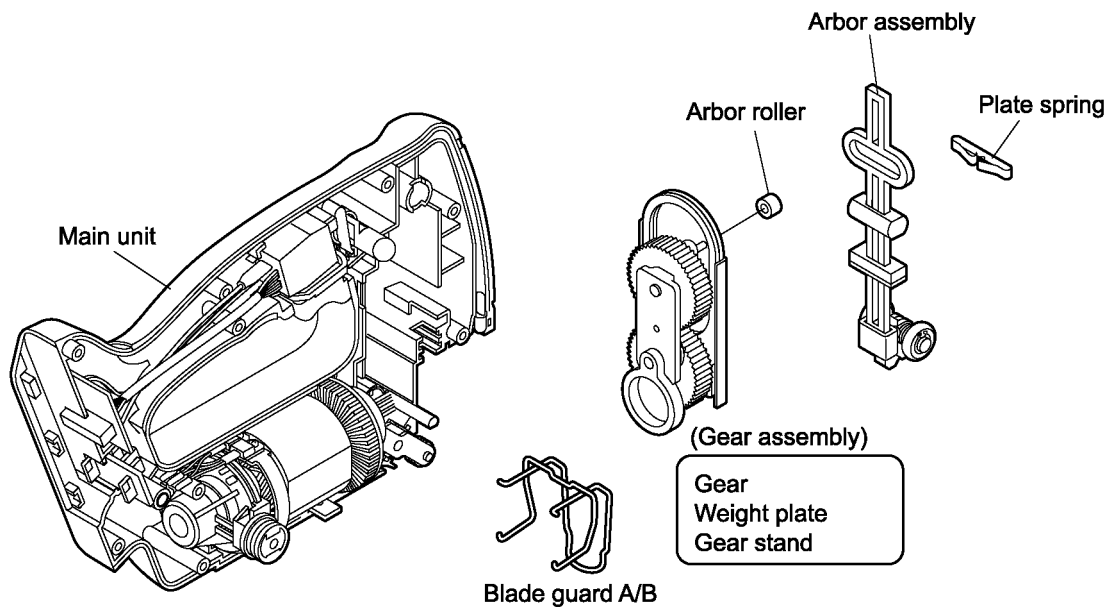


Ref. No. 1D

Procedure 1A → 1B → 1C → 1D

Removal of driving block.

1. Take out the arbor assembly together with the plate spring.
2. Remove the arbor roller.
3. Remove the gear assembly including the gear, weight plate and gear stand.



Ref. No. 1E	Procedure 1A → 1B → 1C → 1D → 1E	Removal of the switch.
<p>Side closed terminal</p> <p>Brush holder assembly</p> <p>Red</p> <p>Black</p> <p>Pin</p> <p>Brush assembly</p> <p>Switch assembly</p> <p>Switch lock lever</p> <p>Spring</p> <p>Lock cover</p> <p>Red</p> <p>Black</p>		<p>1. Pull out the lead wires from the side closed terminal. (for reassembly)</p> <p>1. Connect the same color of lead wires (black or red) from switch and brush assembly with the side closed terminals.</p>

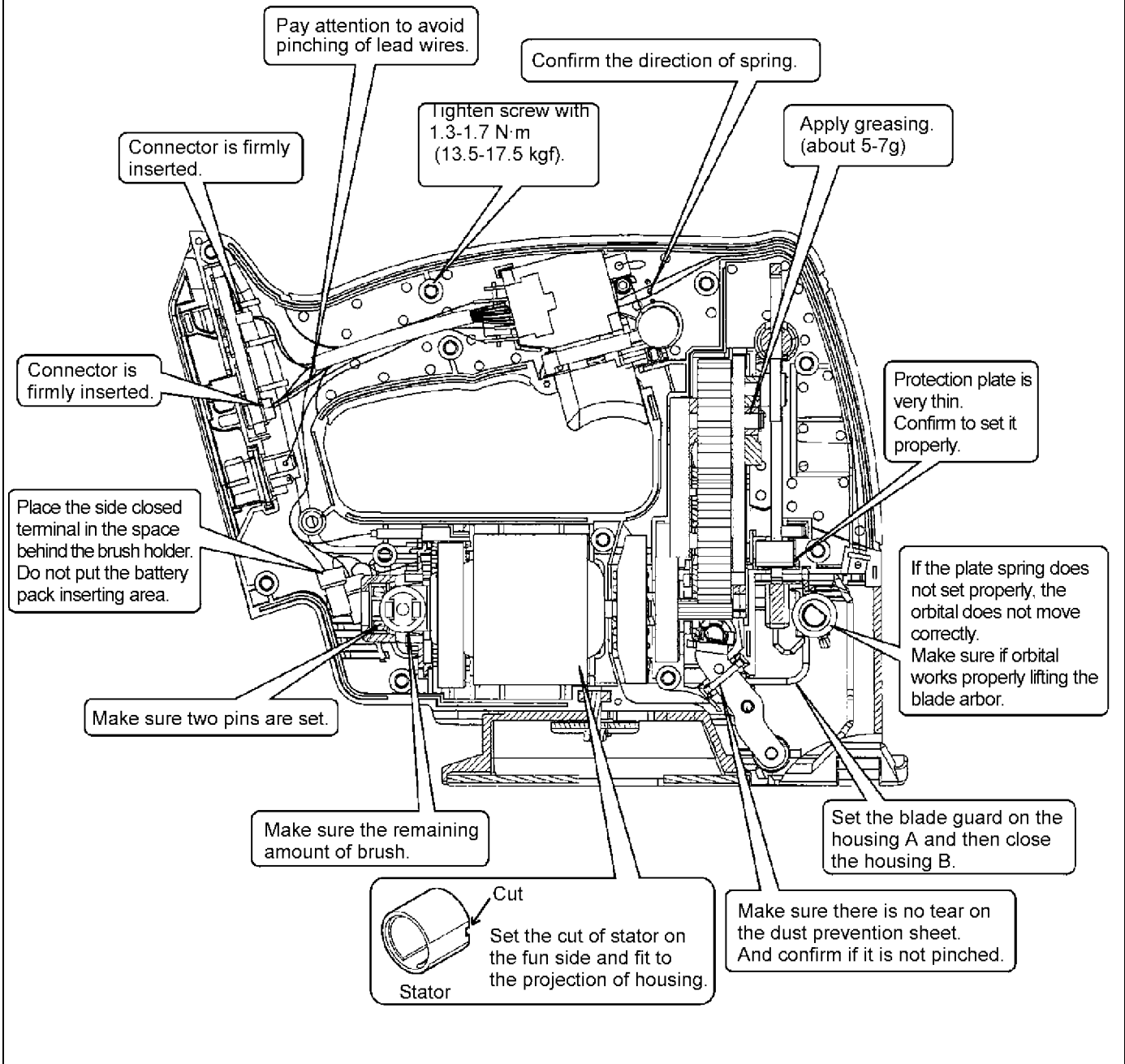
Ref. No. 1F	Procedure 1A → 1B → 1C → 1D → 1E → 1F	Removal of the brush assembly.
<p>Brush assembly</p> <p>Brush holder assembly</p> <p>Rotor assembly</p> <p>Stator assembly</p> <p>Make sure that the pin is on both sides.</p> <p>Replace the new brush if the remaining amount is less than one third (about 3mm).</p> <p>Confirm if the magnet is out of place. And confirm if the metal powder are stuck.</p> <p>Confirm if the color of coil changes to brown, silver or there is any mark of burn out.</p> <p>Confirm if the commutator is worn out.</p>		<p>1. Remove the motor assembly from the housing.</p> <p>2. Take out the rotor assembly from the stator.</p>

Ref. No. 1G

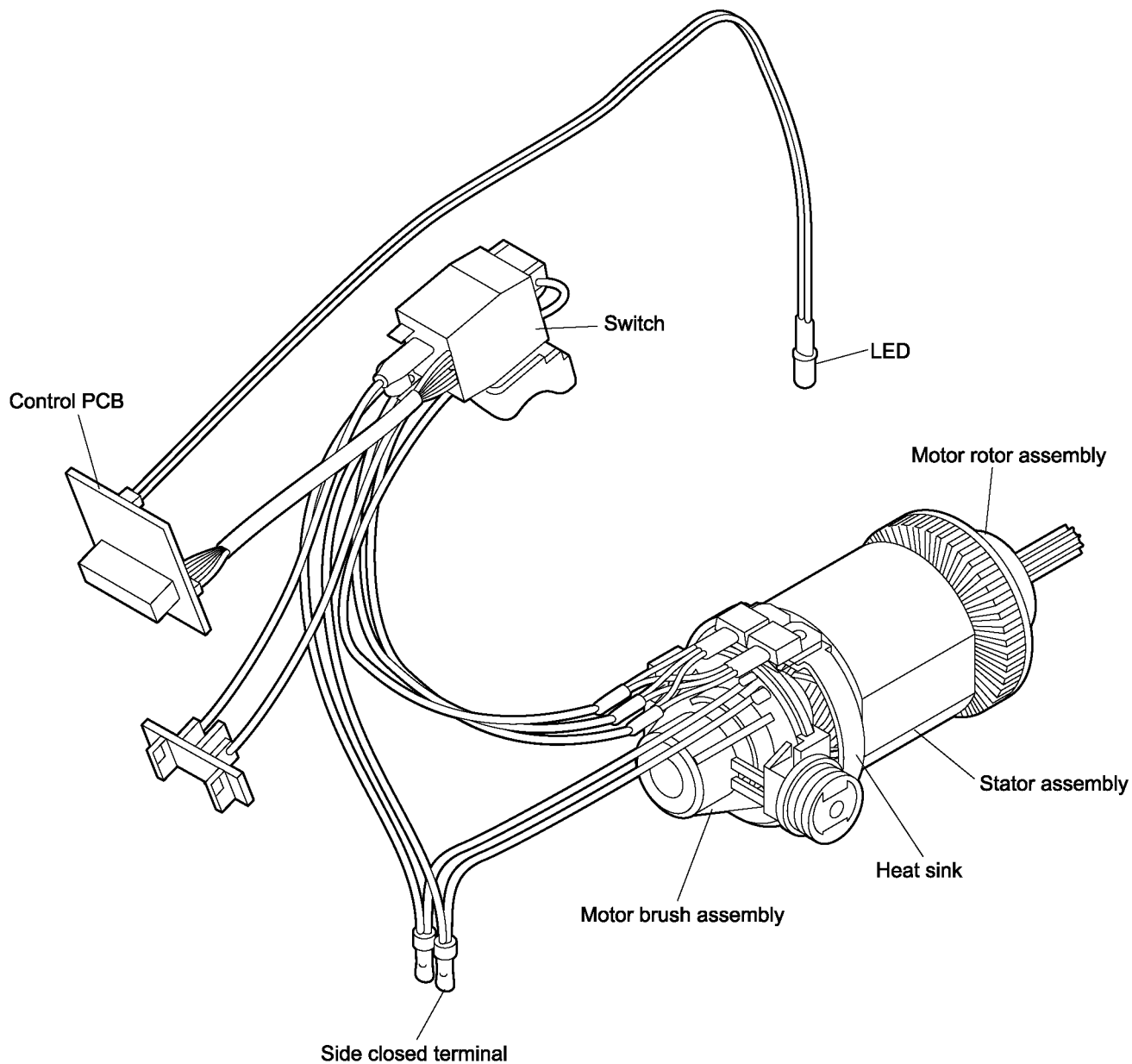
Procedure 1A → 1B → 1C → 1D → 1E → 1F → 1G

Assembly of main unit.

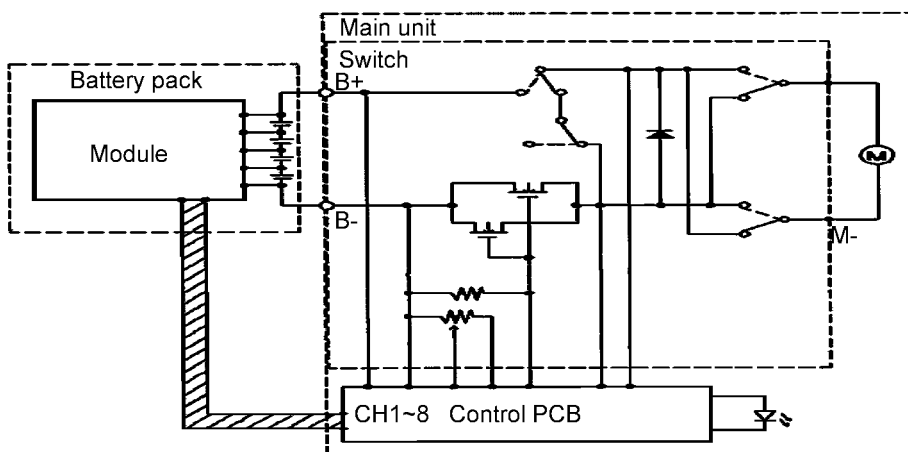
1. Press fit the lead wire firmly.
2. Close the housing A and B.



5 Wiring Connection Diagram

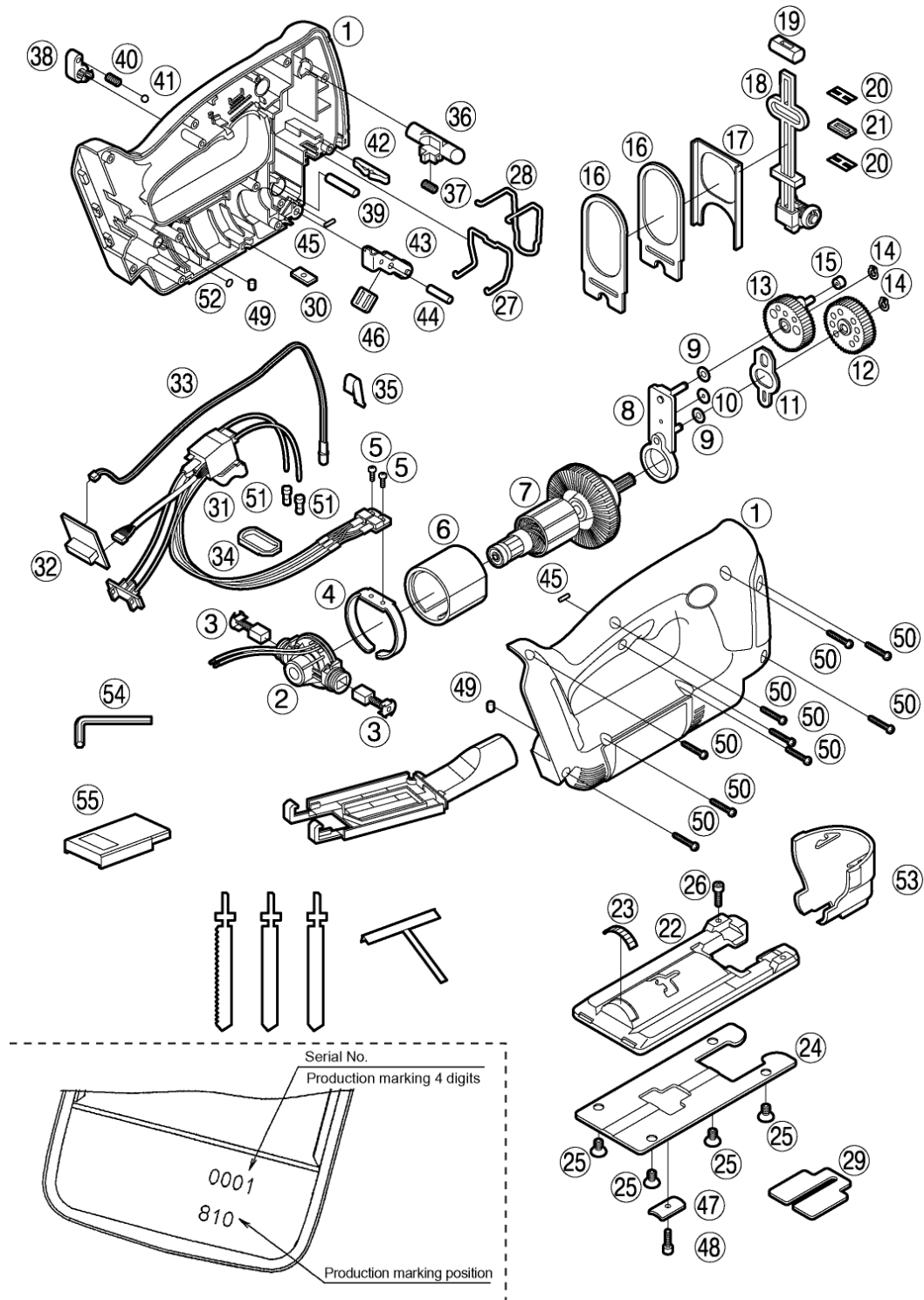


6 Schematic Diagram



7 Exploded View and Replacement Parts List

Model No. : EY4541 Exploded View



** Battery Pack is available as an optional accessory. See the nearest sales dealer for details.

*** For replacement parts of charger, see the charger service manual.

Charger complete set is available as an optional accessory. See the nearest sales dealer for details.

Model No. : EY4541 Parts List

Safety	Ref. No.	Part No.	Part Name & Description	Q'ty	Remarks
	1	WEY4541K3079	HOUSING AB SET	1	(for EUROPE)
	1	WEY4541K3070	HOUSING AB SET	1	(for OCEANIA)
	2	WEYT510L1037	BRUSH HOLDER	1	
	3	WEYT510L2317	BRUSH ASSEMBLY	2	(2PCS/PK)
	4	WEYT510L2397	HEAT SINK	1	
	5	WEYT510L6037	TIGHT SCREW	2	(M3*6)
	6	WEYT510L1587	STATOR ASSEMBLY	1	
	7	WEY4541L1007	ROTOR ASSEMBLY	1	
	8	WEYT510L4347	GEAR STAND	1	
	9	WEYT510L6507	WASHER	2	(5.5×12×0.2), (2PCS/PK)
	10	WEYT510L6527	WASHER	1	
	11	WEYT510L0067	FORK	1	
	12	WEYT510L1457	MID GEAR	1	
	13	WEYT510L1417	GEAR ASSEMBLY	1	
	14	WEYT510L0437	C-TYPE RING	2	(2PCS/PK)
	15	WEYT510L0377	ARBOR ROLLER	1	
	16	WEYT510L0697	WEIGHT PLATE	2	(2PCS/PK)
	17	WEYT510L0497	GEAR RETAINING PLATE	1	
	18	WEYT510L0087	ARBOR ASSEMBLY	1	
	19	WEYT510L0177	ARBOR STOPPER	1	
	20	WEYT510L3147	PROTECTION PLATE	2	(2PCS/PK)
	21	WEYT510L3137	DUST PREVENT RUBBER	1	
	22	WEY4541L1897	BASE	1	
	23	WEY4541L3327	BEVEL INDEX	1	
	24	WEY4541L1907	BASE PLATE	1	
	25	WEY4541L6117	TIGHT SCREW	4	(M4×8)
	26	WEYT510L6307	HEX BOLT	1	(M4X6)
	27	WEYT510L3107	BLADE GUARD B	1	
	28	WEYT510L3117	BLADE GUARD A	1	
	29	WEYT510L0097	ANTI-SPLINTERING PLATE	1	
	30	WEYT510L1627	MOUNTING PLATE	1	
	31	WEY4541K2007	SWITCH ASSEMBLY	1	
	32	WEY4541L2127	CONTROL PCB	1	
	33	WEY4541L2337	LED ASSEMBLY	1	
	34	WEYT510L2167	LOCK COVER	1	
	35	WEYT510L2177	LOCK SPRING	1	
	36	WEY4541H3247	SWITCH LOCK LEVER	1	
	37	WEYT510L0167	SPRING	1	
	38	WEY4541H1557	ORBITAL SELECTOR LEVER	1	
	39	WEYT510L0337	ORBITAL SHAFT	1	
	40	WEYT510L0187	SPRING	1	
	41	WEYT510L6967	STEEL BALL	1	
	42	WEYT510L0927	PLATE SPRING	1	

Model No. : EY4541 Parts List

Safety	Ref. No.	Part No.	Part Name & Description	Q'ty	Remarks
	43	WEYT510L0387	ROLLER ASSEMBLY	1	
	44	WEYT510L0907	NEEDLE PIN	1	(F2*23.8)
	45	WEY4541L0917	NEEDLE PIN	2	(F2*6.8)
	46	WEYT510L3157	DUST PREVENT PLATE	1	
	47	WEYT510L1637	FIXING BRACKET	1	
	48	WEYT510L6337	BASE FIXING SCREW	1	M4*12
	49	WEYT510L0607	PIN	2	(2PCS/PK)
	50	WEYT510L9447	TIGHT SCREW	11	(M4*18), (5PCS/PK)
	51	WEYT510L2157	SIDE CLOSED TERMINAL	2	(2PCS/PK)
	52	WEY3571L0967	O-RING	1	
	53	WEY4541X3107	DUST COVER	1	
	54	WEYT510L7867	HEX WRENCH	1	
	55	WEY9L40R2788	BATTERY PACK COVER	1	
	-	WEYT510L8917	GREASE	1	
	-	WEY9638K7018	TOOL CASE	1	<SH>
	-	WEY4541K8109	OPERATING INSTRUCTIONS	1	<SH>