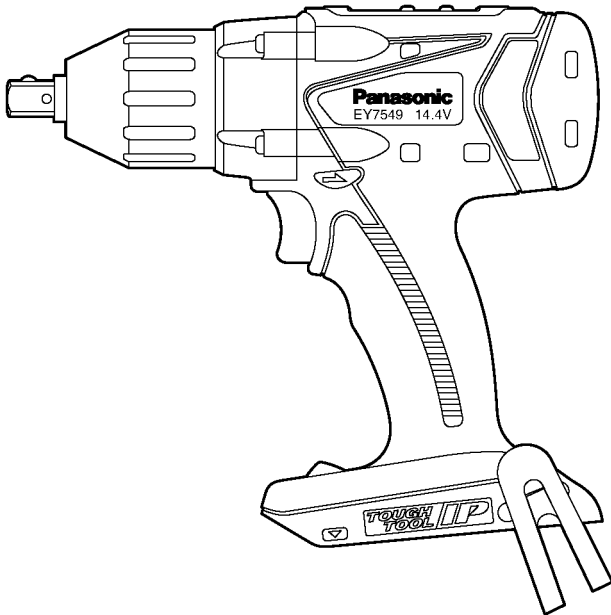


Service Manual

Cordless Multi- Impact & Drill Driver

Model No. **EY7549**

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

| | |
|----------------------------|---|
| Model No. | EY7549 |
| Motor | 14.4 V DC |
| No load speed | Impact mode: 0 - 2300 min ⁻¹ |
| | Drill driver High mode:0 - 1200min ⁻¹ |
| | Drill driver Low mode:0 - 380min ⁻¹ |
| Maximum torque | Impact mode: 150 N•m with M16 High tensile bolt 130 N•m with M14 High tensile bolt |
| | Drill driver High mode:9 N•m |
| | Drill driver Low mode:26 N•m |
| Clutch torque | Approx. 0.7 - 4.4 N•m |
| Overall length | 210 mm |
| Weight (with battery pack) | 1.85kg |
| Noise Vibration | <p>Typical Noise Emission Values according to EN 60745; Sound Pressure Level (L_{pA}): 98.2 dB (A) Sound Power Level (L_{WA}): 109.2 dB (re1pw) Uncertainty (K): 3 dB</p> <p>Typical Vibration according to EN 60745: ≤5.88 m/s² (Impact tightening of fasteners of the maximum capacity of the tool) Uncertainty (K): 1.5 m/s²</p> |

Battery Charger

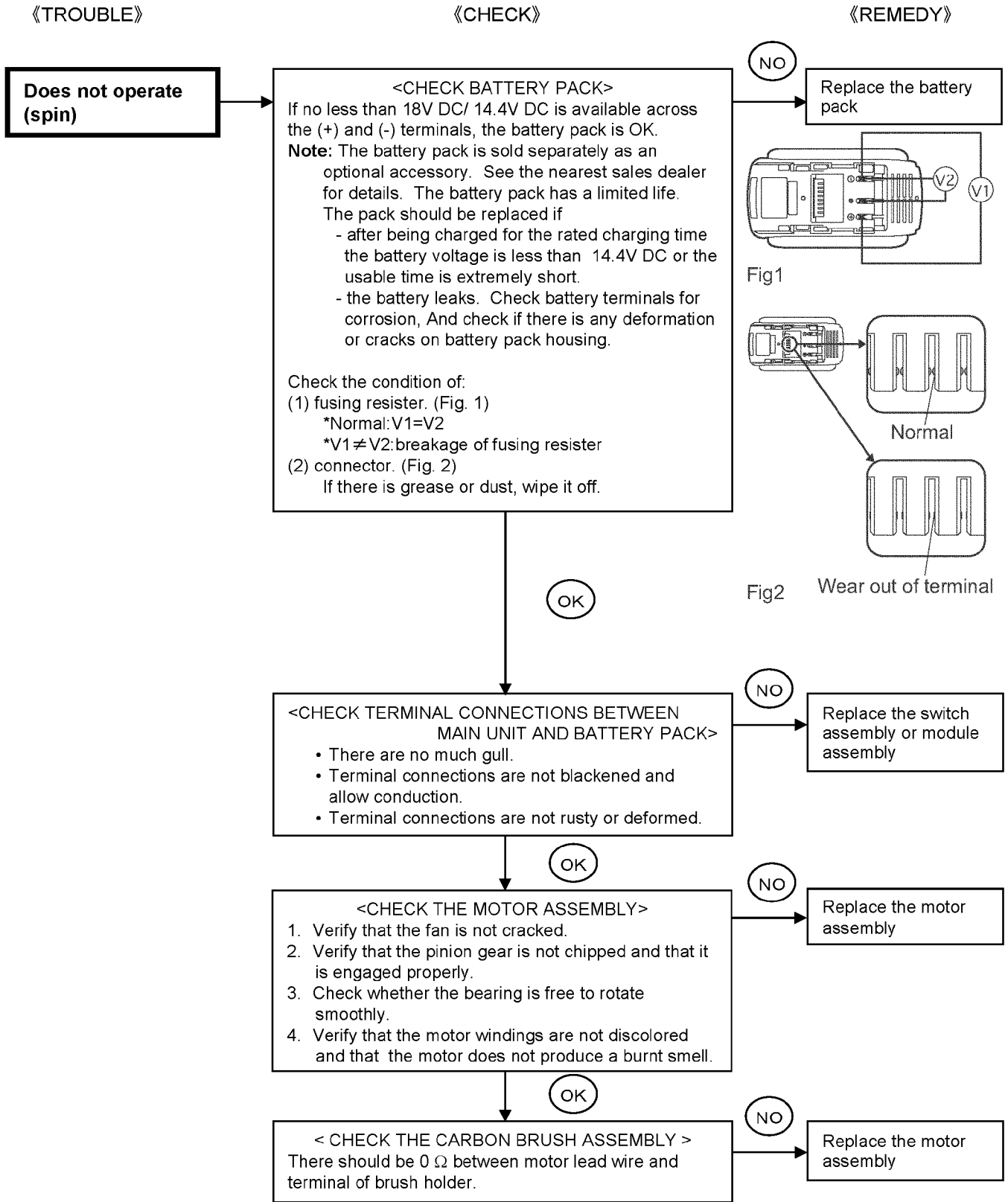
| | | | | |
|-------------------|---|--------------|--------------|--------------|
| Model No. | EY0L81 | | | |
| Electrical rating | See the rating plate on the bottom of the charger | | | |
| Weight | 0.93kg | | | |
| Charging time | EY9L41 | EY9L42 | EY9L44 | EY9L45 |
| | Usable:45min | Usable:30min | Usable:50min | Usable:65min |
| | Full:60min | Full:35min | Full:65min | Full:80min |

| | | | | |
|-------------------|---|--------------|--------------|--------------|
| Model No. | EY0L82 | | | |
| Electrical rating | See the rating plate on the bottom of the charger | | | |
| Weight | 0.93kg | | | |
| Charging time | EY9L41 | EY9L42 | EY9L44 | EY9L45 |
| | Usable:35min | Usable:30min | Usable:40min | Usable:50min |
| | Full:50min | Full:35min | Full:55min | Full:60min |

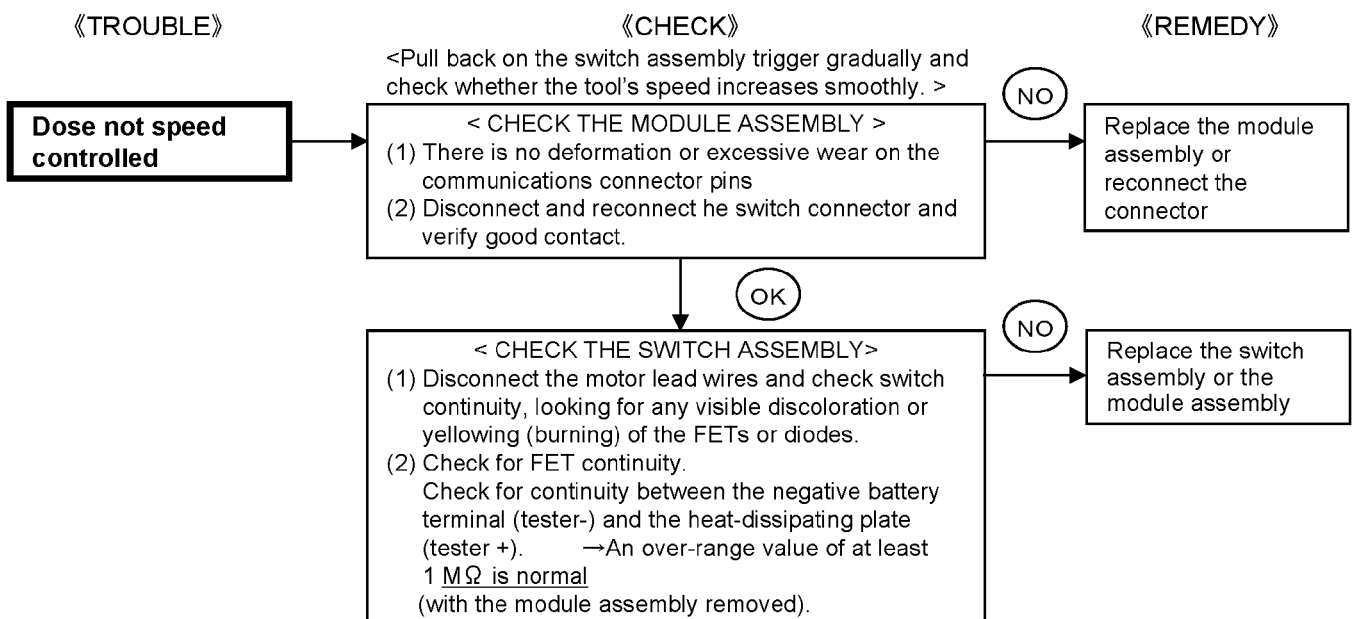
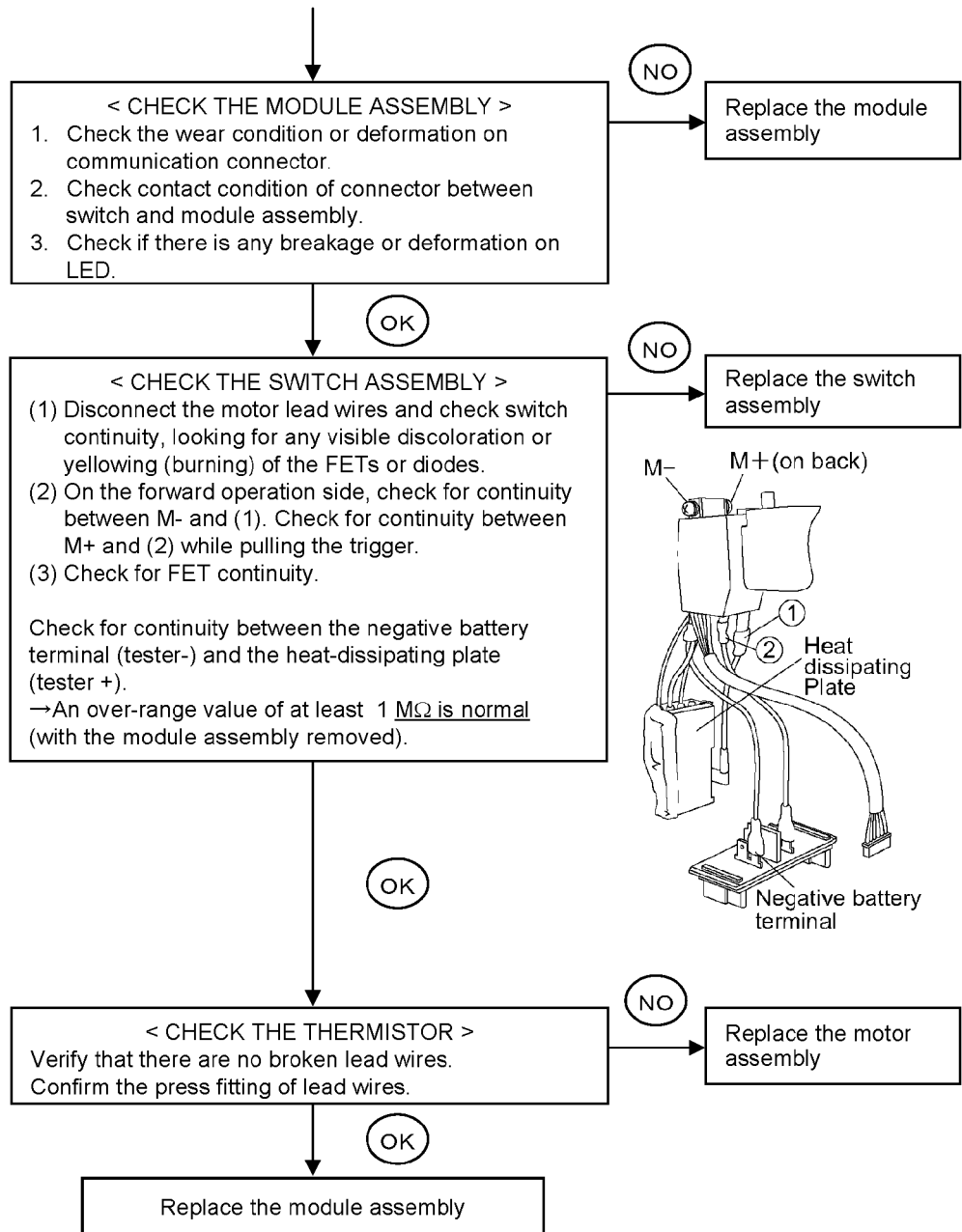
NOTE : This chart may include models that are not available in your area.
 Please refer to the latest general catalogue.

3 Troubleshooting Guide

3.1. Troubleshooting Guide



To next page



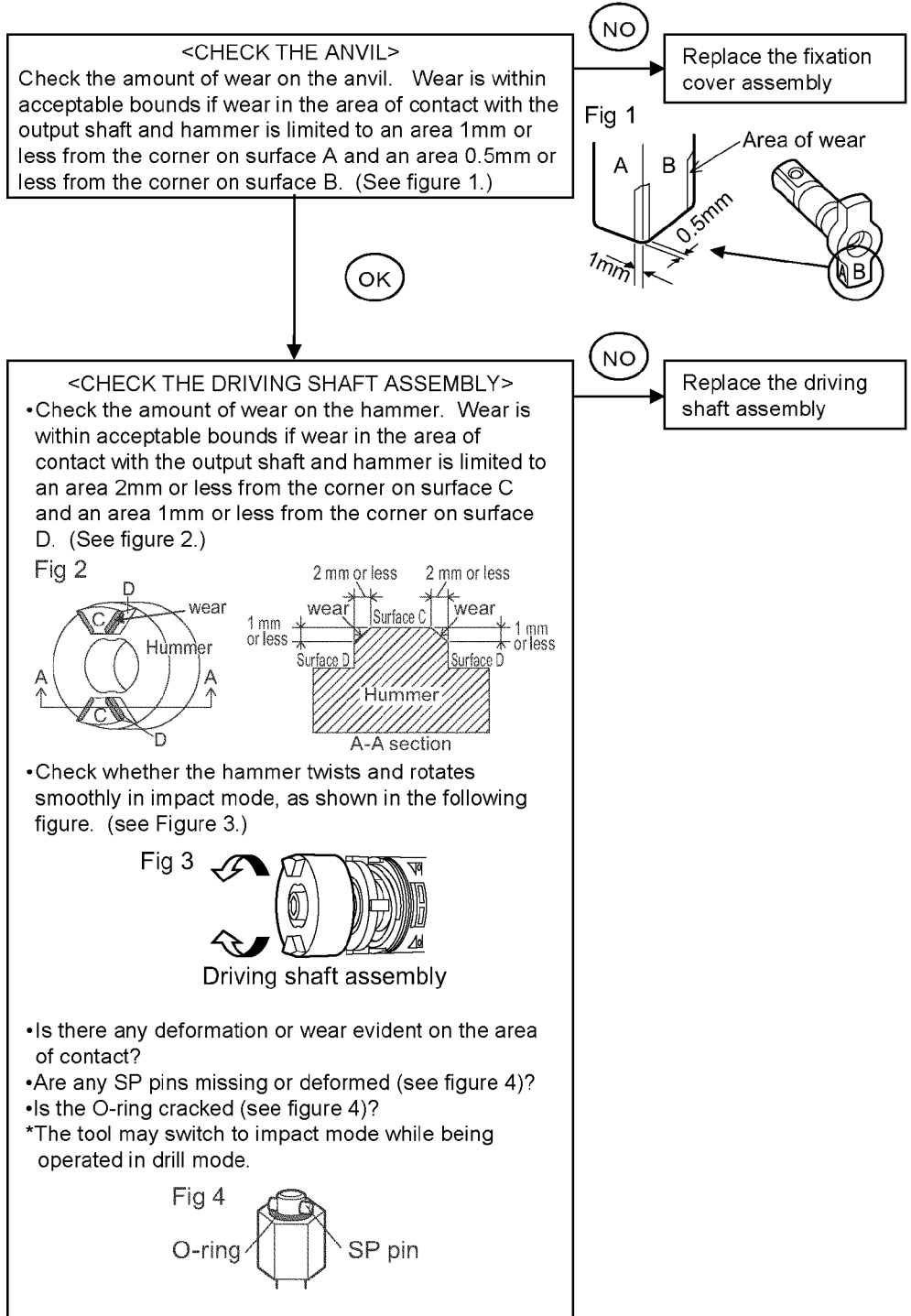
《TROUBLE》

The tool is not producing adequate impact force

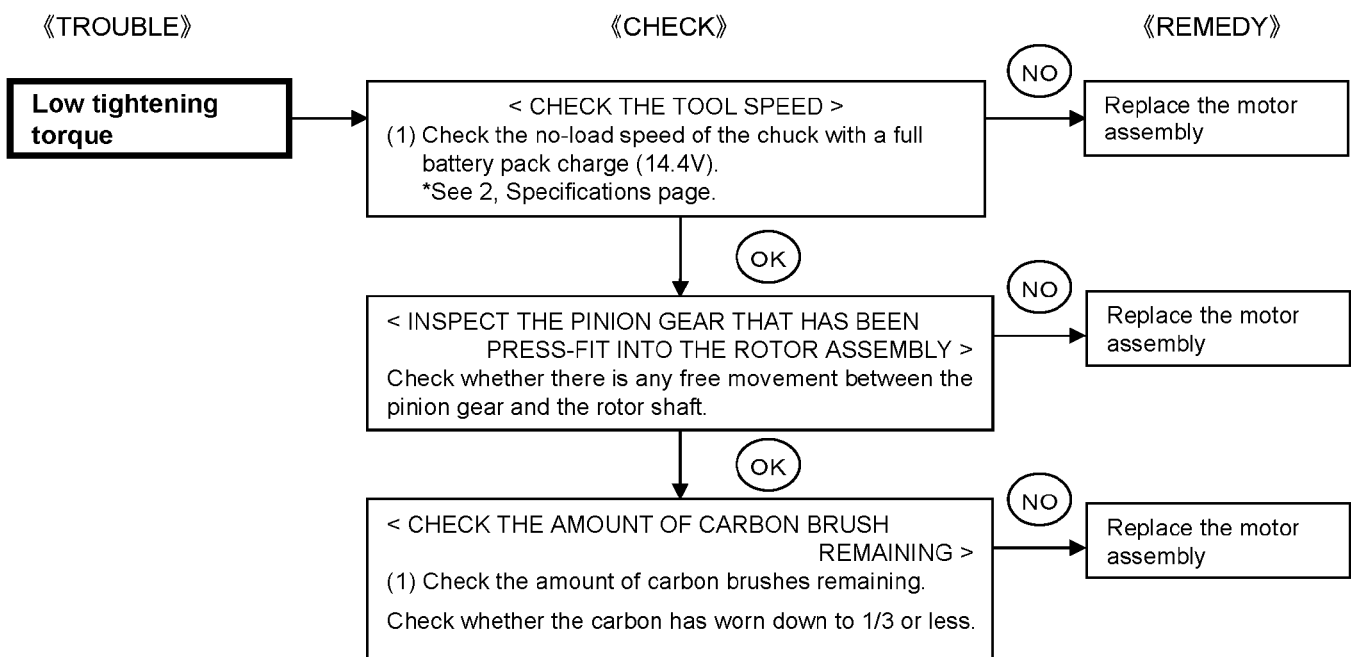
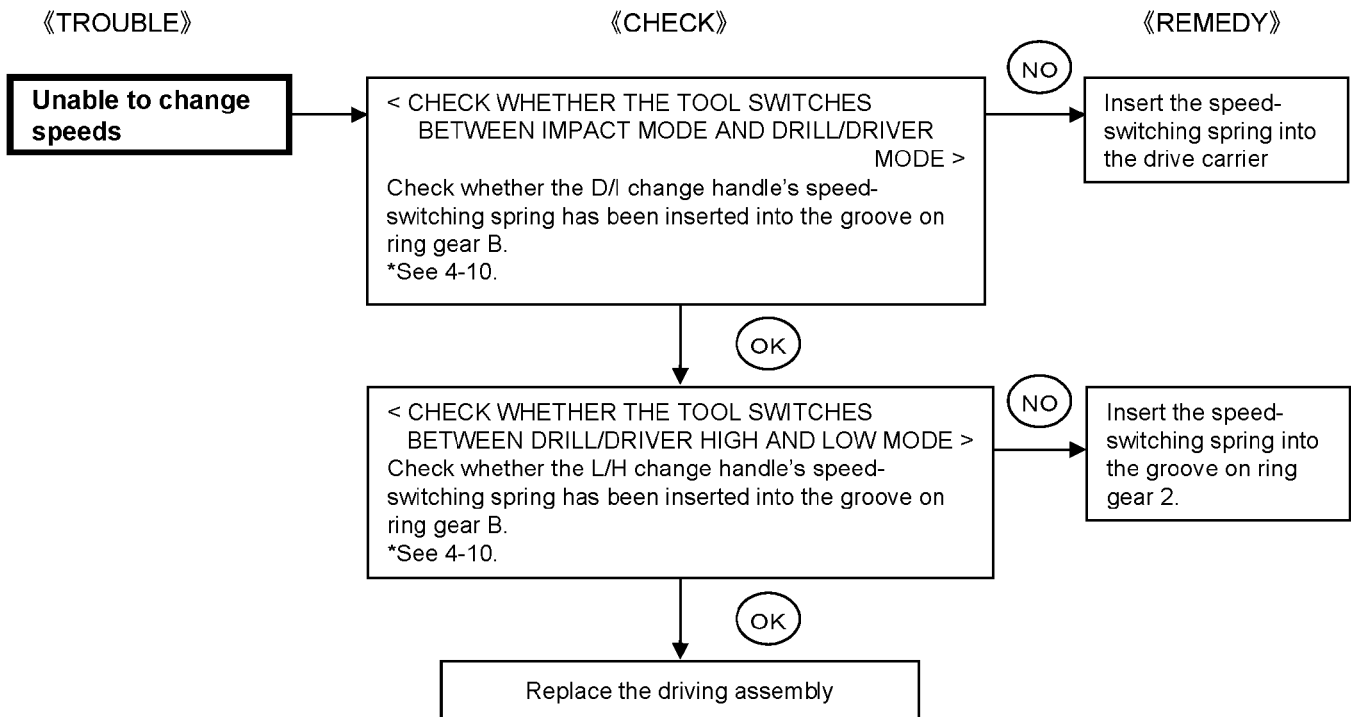
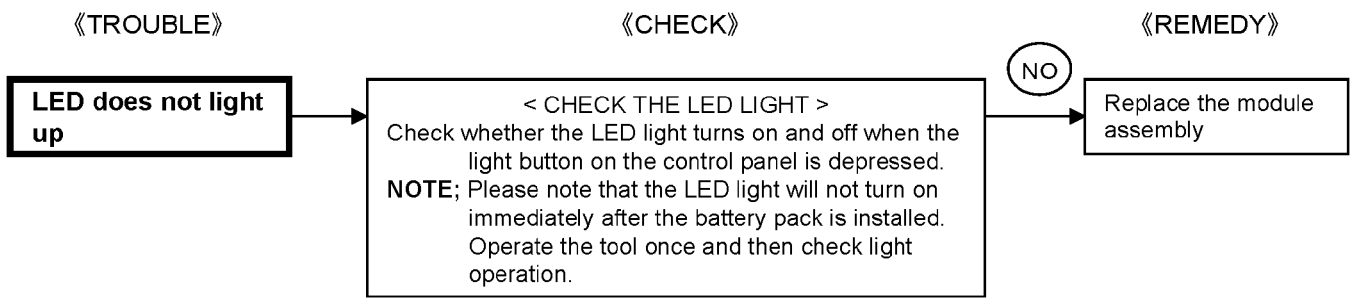
《CHECK》

《REMEDY》

*Before inspecting the anvil, inspect the battery pack and check the tool speed. Using a constant-voltage source, energize the tool with 14.4 V DC and pull back on the trigger with the impact indicator set to high mode. Check whether the tool speed is between 0 and 2,300 rpm. IF the speed falls outside this range, inspect the carbon brushes, rotor, and stator and start the inspection after setting the tool speed between 0 and 2,300 rpm.



To next page




3.2. Trial Operation (After Checking Troubleshooting Guide)

3.2.1. Assembly

- Confirm if there is no gap between housing A and B by pinching lead wires.
- Confirm all screws are tightened firmly.

3.2.2. Operation

- Check whether the tool operates properly in both the forward and reverse directions.
- Check whether the LED light turns on and off each time the LED light on/off button is depressed.
- Check whether the tool speed increases continuously as the trigger is gradually engaged.
- Check whether the tool speed is normal after repair and reassembly.
*Please refer to the specifications on page 2.
- Check whether the tool may become hot in a short operation.
- Set the clutch handle to the 「」 mark and check whether the tool rotates without any clutch operation.
- Pull the trigger all the way back and check whether the tool stops rotating immediately when it is released.
- Rotate the clutch handle and check whether the clutch switches properly.
- Check whether impact operation functions properly.

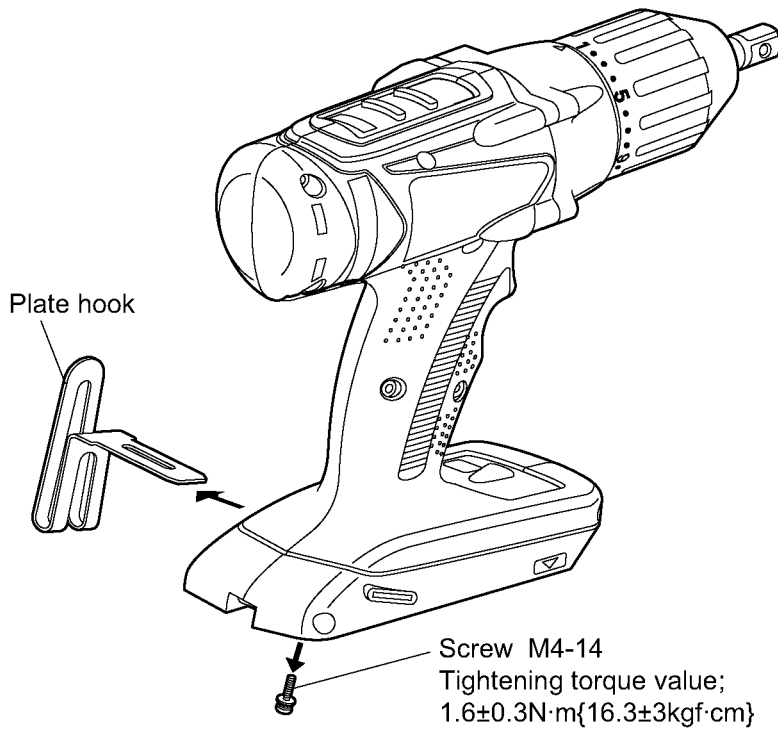
3.2.3. Integrity

- With the switch activated, shake the tool back and forth and up and down and verify that its sound does not change excessively.
- Check for the presence of any dirt or foreign matter from the repair process on the outside of the tool.

4 Disassembly and Assembly Instructions

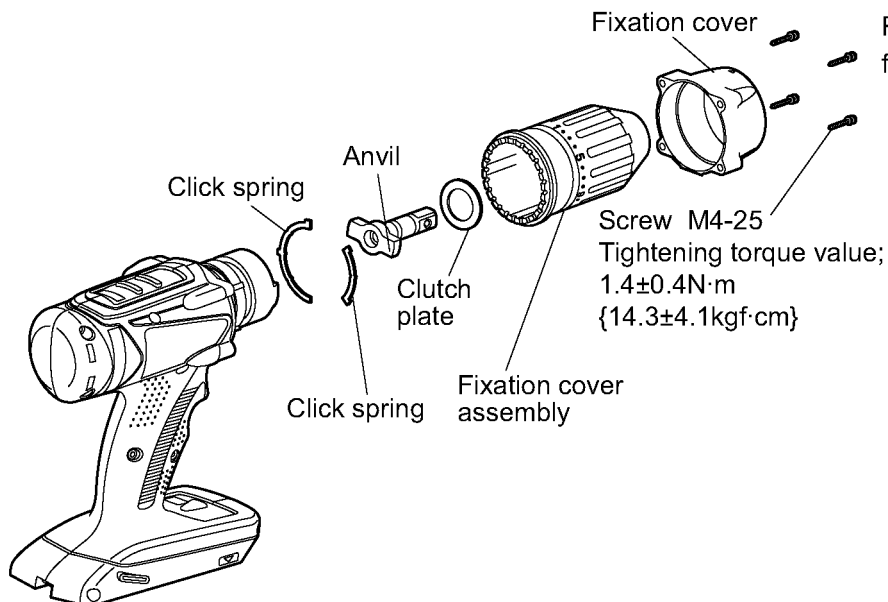
*To assemble the tool, start with 4-12 and proceed to 4-1

4.1. Removing the plate hook

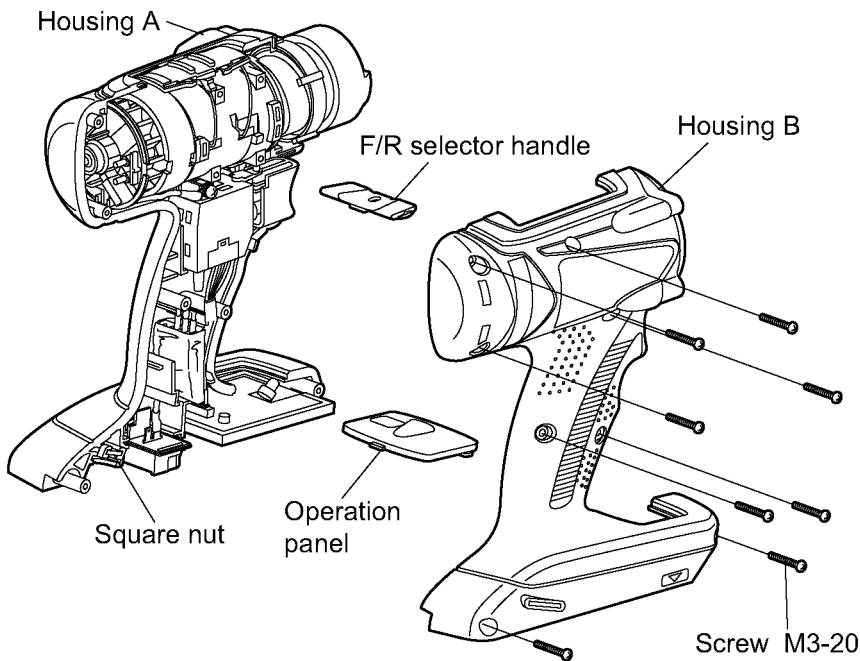


1. Remove the M4-14 screw.
2. Remove the plate hook.

4.2. Removing the Fixation cover assembly

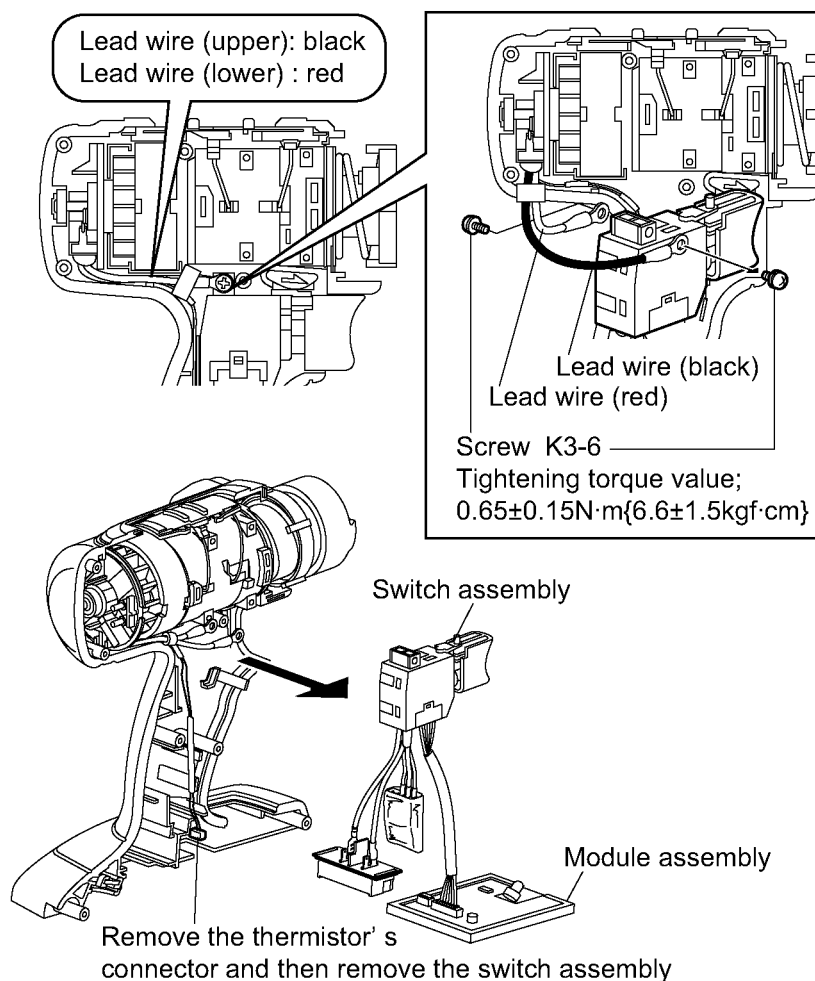


4.3. Removing the housing



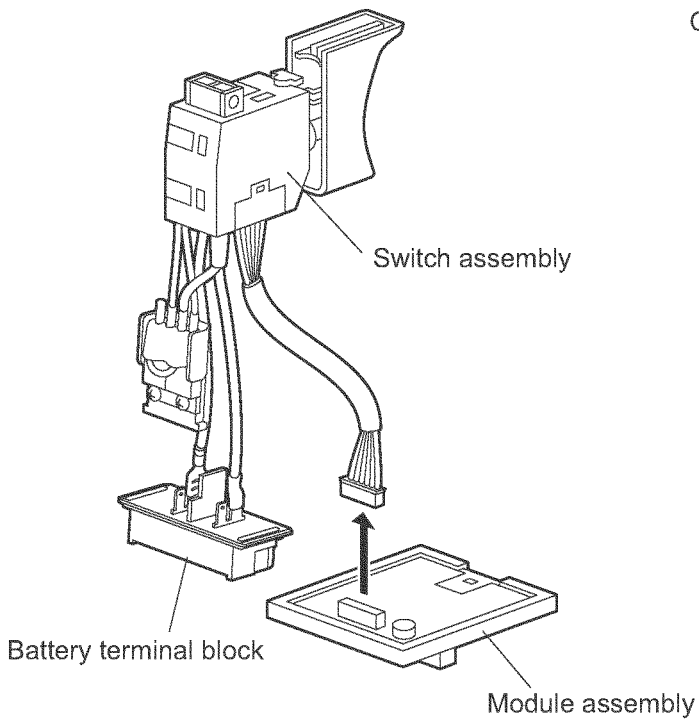
1. Remove eight screws.
2. Remove housing B.
3. Remove the F/R selector handle.
4. Remove the operation panel.
5. Remove the square nut.

4.4. Removing the switch assembly



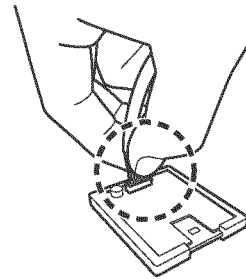
1. Remove the switch assembly from housing A and remove the 2 screws holding the carbon brush assembly's lead wires in place on the switching assembly.
2. Remove the switch assembly while removing the switch assembly's FET and battery terminal block from housing A.

4.5. Removing the Module assembly

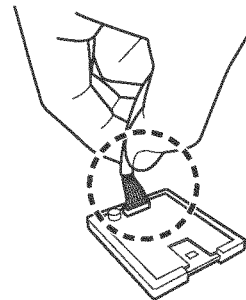


Connecting and disconnecting the connector.

○ Grip the connector at its base and pull it out.

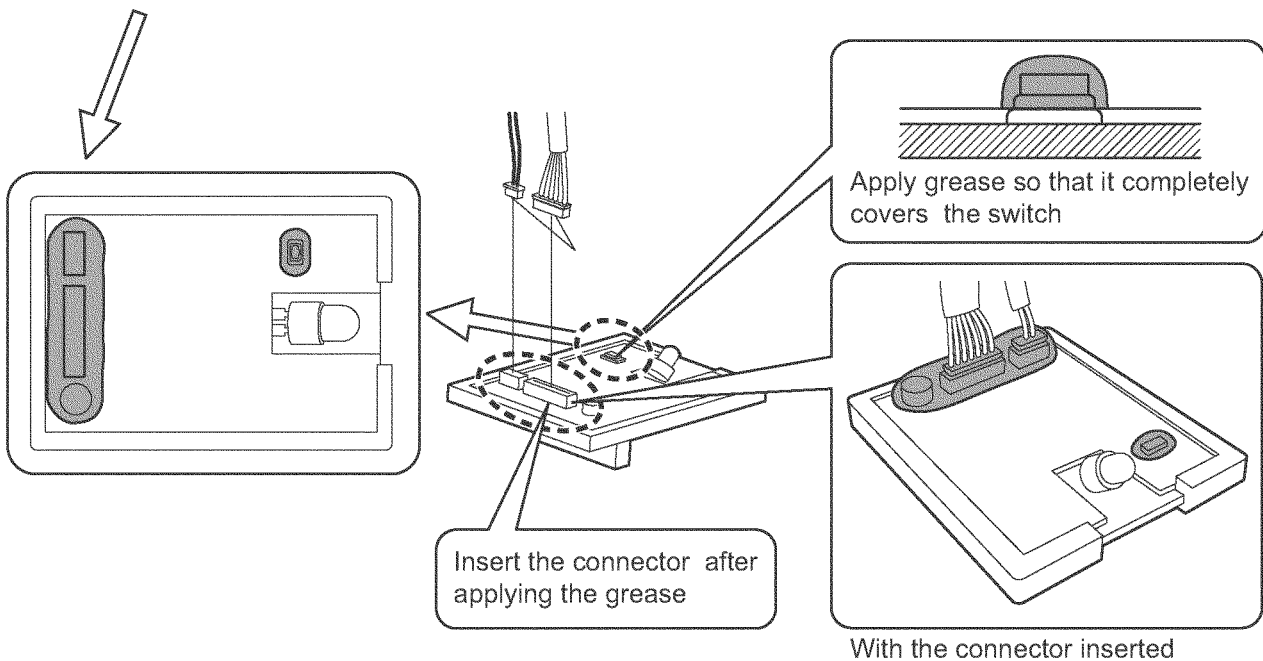


✗ Pulling on the lead wires
Will break the wires.

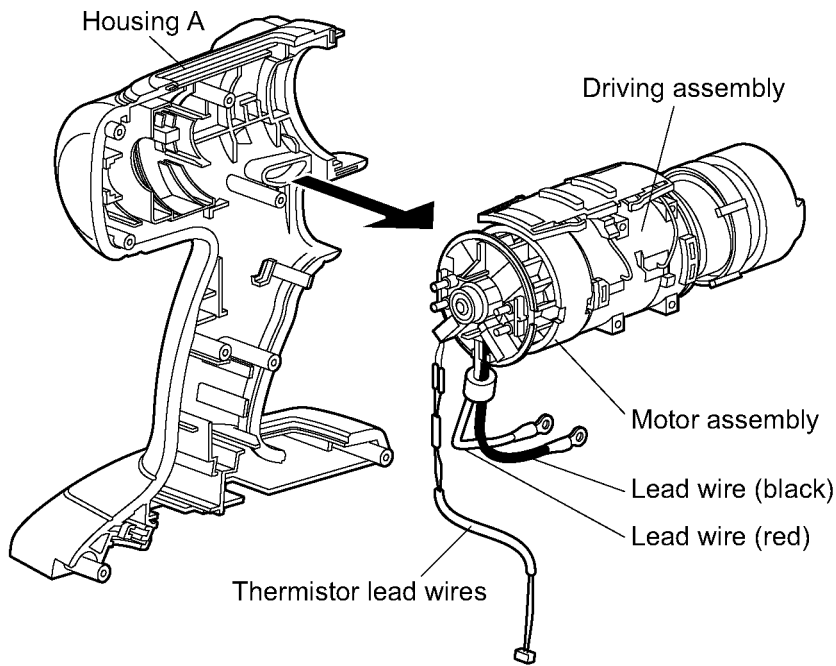


●Precautions when attaching the module assembly

- Apply the grease to the connector.
*PERMALUB (Order No.: WEY003W8957)
- Confirm to insert the connector firmly.

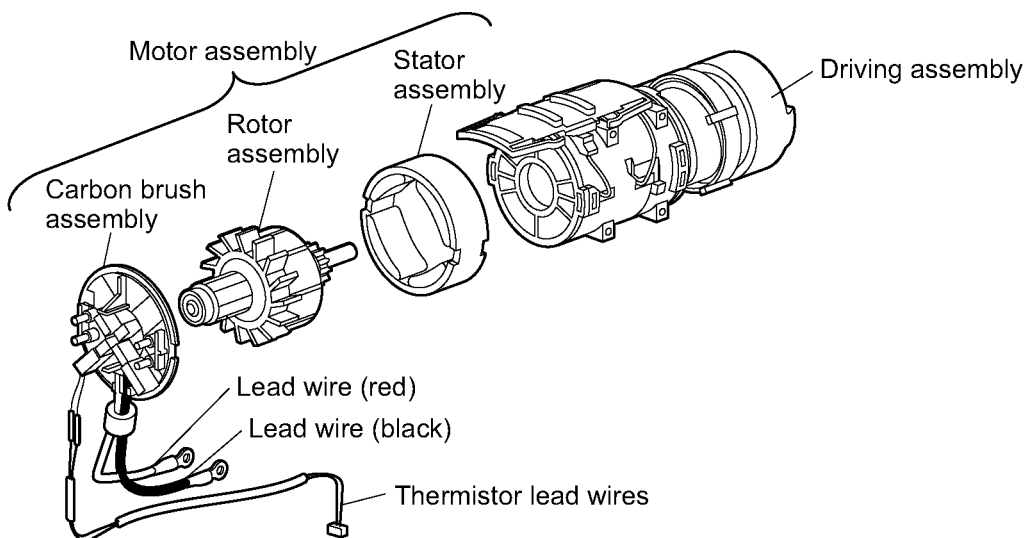
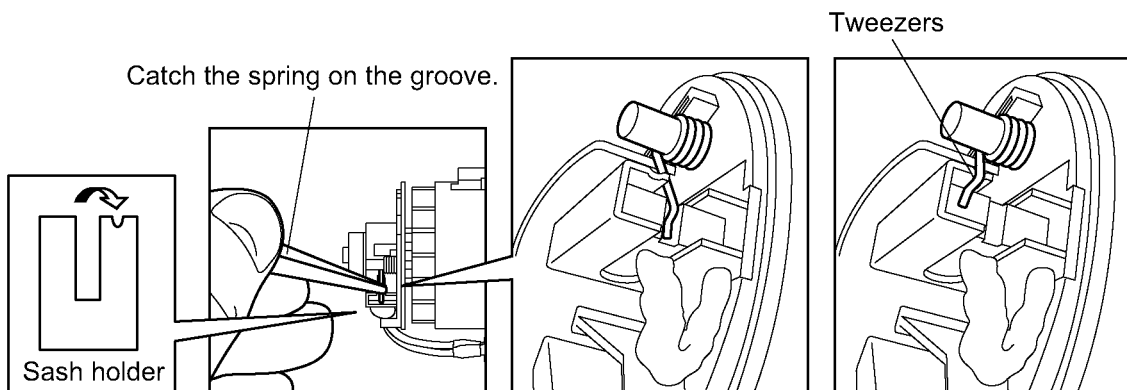


4.6. Removing the Driving assembly and Motor assembly

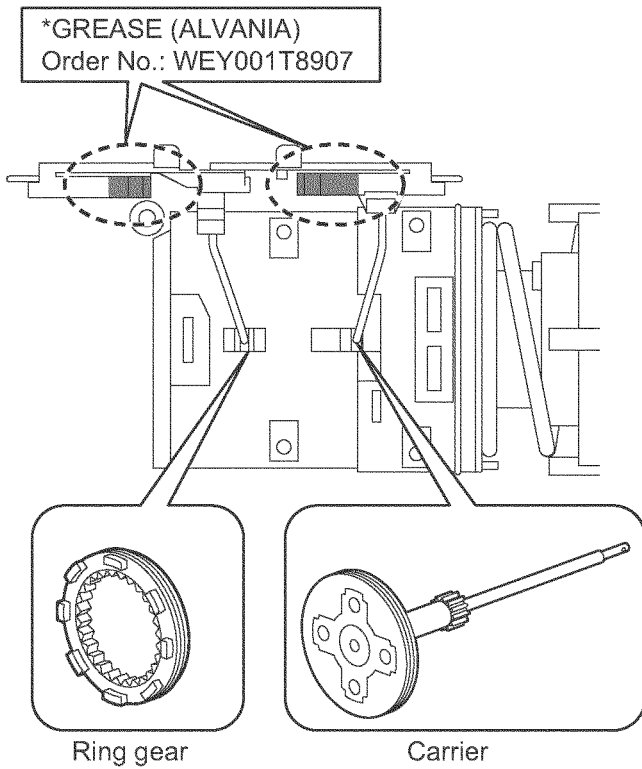


Remove the driving assembly from housing A

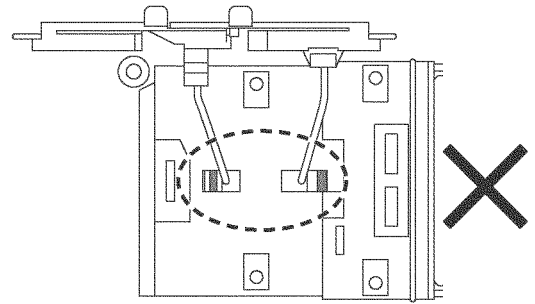
4.7. Removing the Carbon brush block



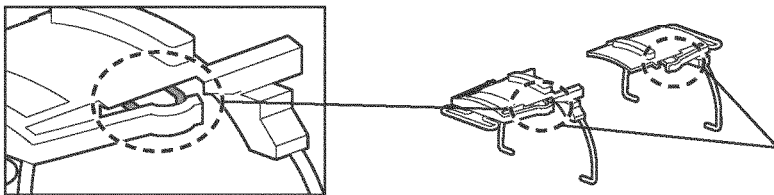
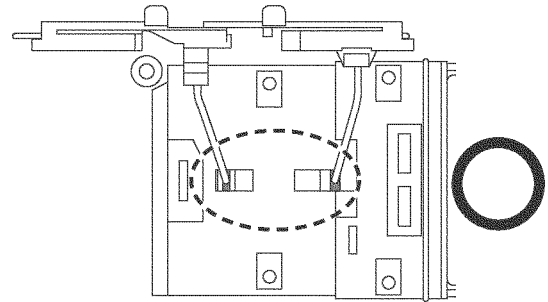
4.8. How to attach the D/I change handle and L/H change handle



- The D/I change handle and L/H change handle's speed-switching springs have become detached from the ring gear grooves.

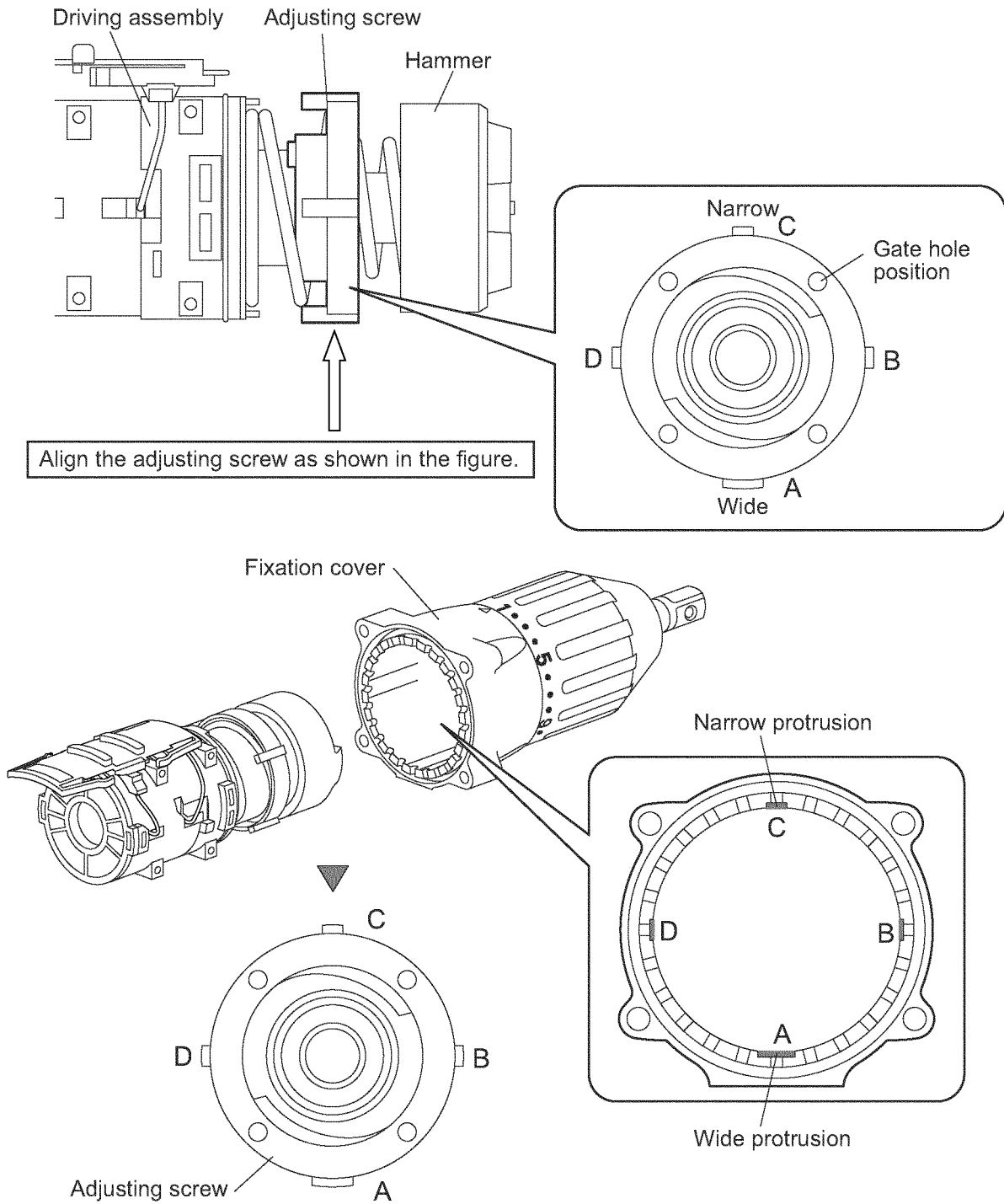


- The springs have been properly inserted into the ring grooves.

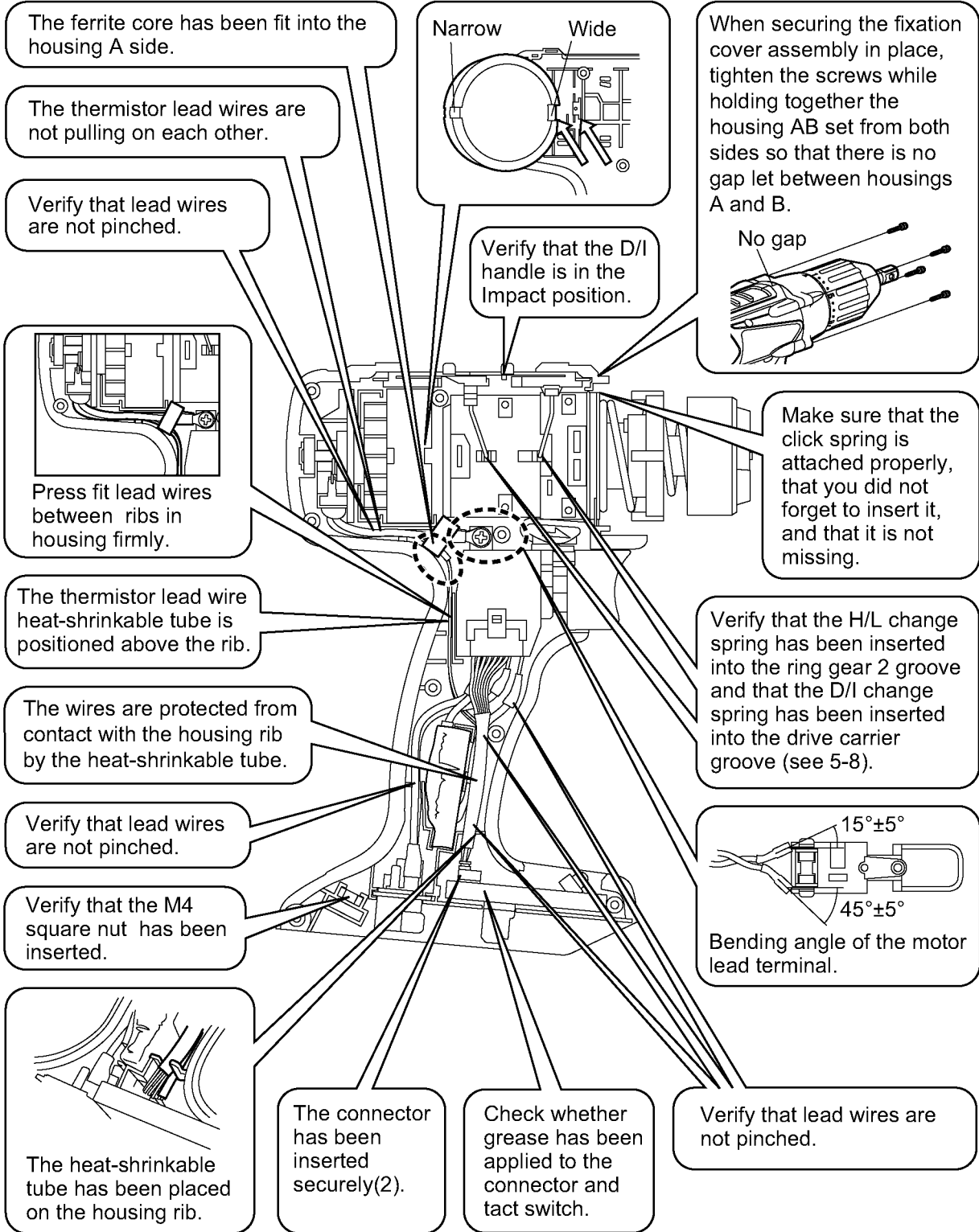


- Check whether the I/D change handle and L/H change handle's hook springs have become detached.

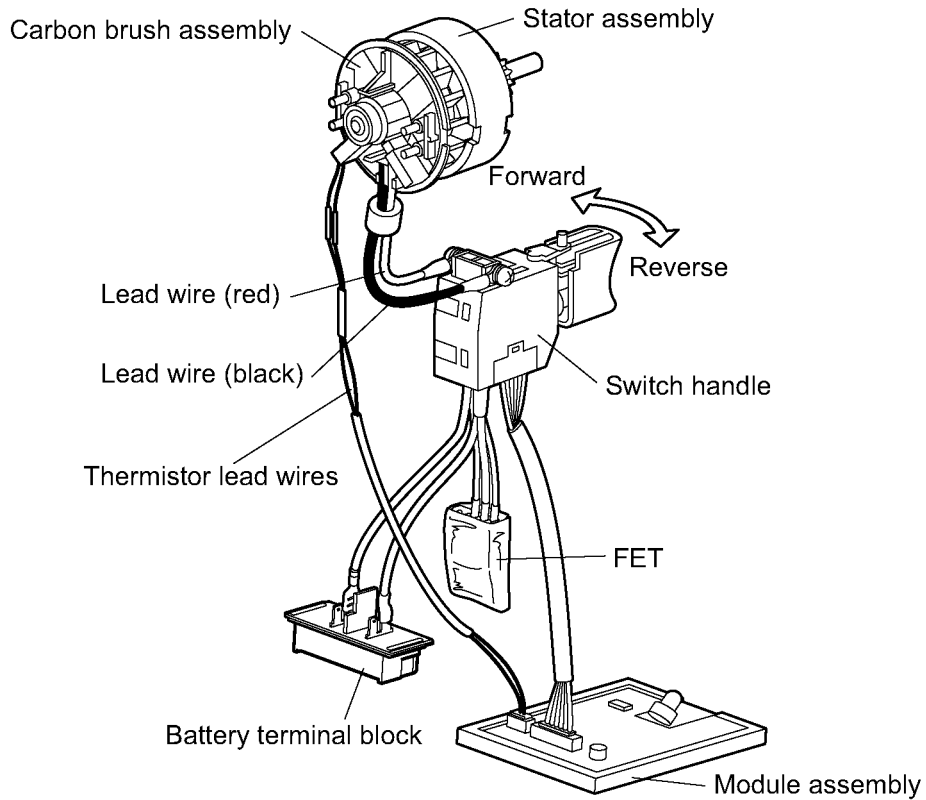
4.9. Tips for installing the driving cover assembly onto the driving assembly



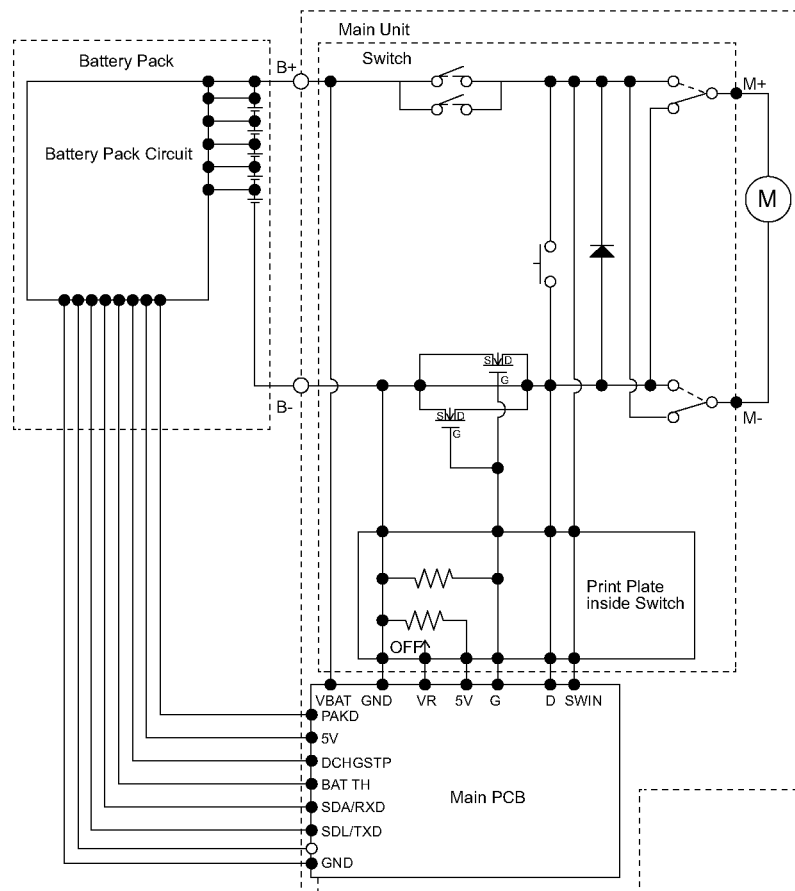
4.10. Wiring and Assembly Points



5 Wiring Connection Diagram

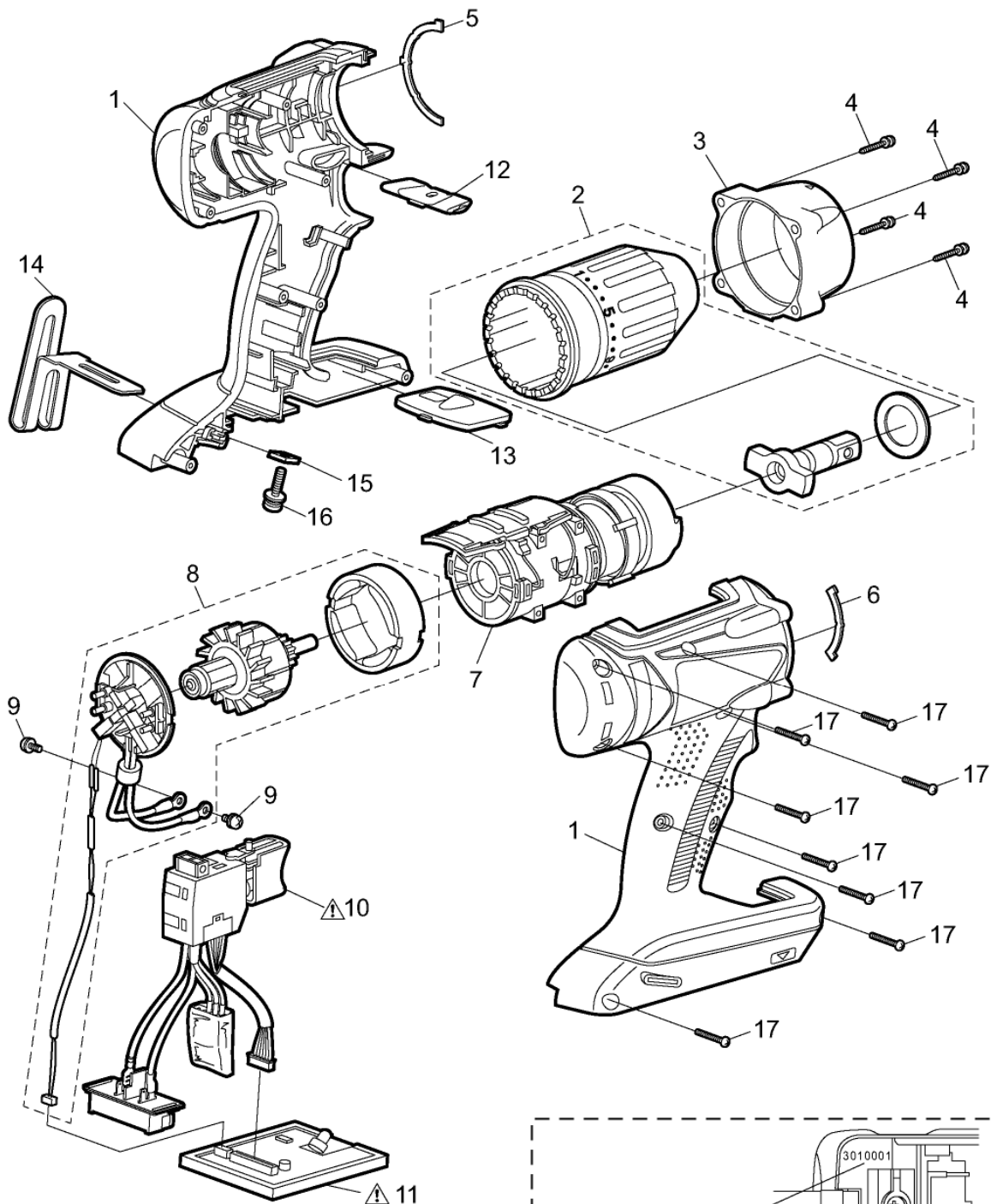


6 Schematic Diagram

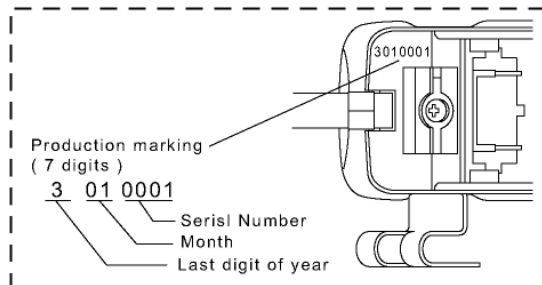


7 Exploded View and Replacement Parts List

Model No. : EY7549 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. : EY7549 Parts List

| Safety | Ref. No. | Part No. | Part Name & Description | Q'ty | Remarks |
|--------|----------|--------------|-------------------------|------|---------------|
| | 1 | WEY7549H7029 | HOUSING AB SET | 1 | (for EUROPE) |
| | 1 | WEY7549H7020 | HOUSING AB SET | 1 | (for OCEANIA) |
| | 2 | WEY7549K4058 | FIXATION COVER ASSEMBLY | 1 | |
| | 3 | WEY7548S0277 | FIXATION COVER | 1 | |
| | 4 | WEY7549K9038 | TORX TAPPING SCREW | 4 | (4*25) |
| | 5 | WEY6631L0977 | CLICK SPRING | 1 | |
| | 6 | WEY6505L0187 | CLICK SPRING | 1 | |
| | 7 | WEY7549L4128 | DRIVING ASSEMBLY | 1 | |
| | 8 | WEY7549L1108 | MOTOR ASSEMBLY | 1 | |
| | 9 | WEY7441L6028 | SCREW | 2 | (K3-6) |
| | 10 | WEY7549L2007 | SWITCH ASSEMBLY | 1 | |
| | 11 | WEY7549L2128 | MODULE ASSEMBLY | 1 | |
| | 12 | WEY7547H3247 | F/R SELECTOR HANDLE | 1 | |
| | 13 | WEY7460K3958 | OPERATION PANEL | 1 | |
| | 14 | WEY7543K3187 | PLATE HOOK | 1 | |
| | 15 | WEY7441L6487 | NUT | 1 | (M4) |
| | 16 | WEY7441K6217 | SCREW | 1 | (4-14) |
| | 17 | WEY7441K9038 | TAPPING SCREW | 8 | |
| | - | WEY9L40R2788 | BATTERY PACK COVER | 1 | |
| | - | WEY7549K7019 | TOOL CASE | 1 | |
| | - | WEY7549K8109 | OPERATING INSTRUCTIONS | 1 | |
| | - | WEY001T8907 | GREASE (ALVANIA) | 1 | |
| | - | WEY003W8957 | GREASE (PERMALUB) | 1 | |