

# TECHNICAL INFORMATION



PRODUCT

P 1/10

**Models No.** ▶ 5008MG, 5008MGA

**Description** ▶ Circular Saw 210mm (8-1/4")

## CONCEPT AND MAIN APPLICATIONS

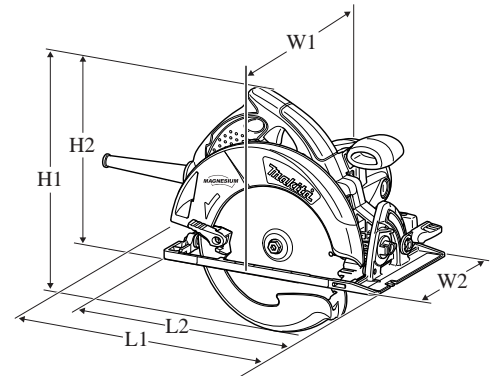
Model 5008MG and 5008MGA have been developed as 210mm (8-1/4") version of Models 5007MG/5007MGA, 185mm (7-1/4") Circular saws.

Feature new design, increased convenience, and cutting depth capacity of 75.5mm (3").

The only one difference between 5008MG and 5008MGA is;

5008MG: Without electric brake

5008MGA: With electric brake



Dimensions: mm (")	
Length (L1)	332 (13-1/8)
Width (W1)	243 (9-9/16)
Height (H1)	277 (10-7/8)
Height (H2)	192 (7-9/16)

Base size: mm (")	
Length (L2)	320 (12-5/8)
Width (W2)	170 (6-11/16)

## ► Specification

Voltage (V)	Current (A)	Cycle (Hz)	Continuous Rating (W)		Max. Output (W)
			Input	Output	
120	15	50/60	---	900	2,300
220	8.6	50/60	1,800	1,000	2,300
230	8.2	50/60	1,800	1,000	2,300
240	7.9	50/60	1,800	1,000	2,300

Size of blade: mm (")	Diameter	210 (8-1/4)
	Hole diameter	North America: 15.88 (5/8) Australia: 25.0 Europe: 30.0 Other countries: 25.4 (1)
No load speed: rpm= min.-1		5,200
Max cutting capacity: mm (")	0 degree	75.5 (3)
	45 degrees	57 (2-1/4)
	50 degrees	51.5 (2)
Protection against electric shock		Double insulation
Cord length: m (ft)		Australia, Chile: 2 (6.6) Other countries: 2.5 (8.2)
Net weight: kg (lbs)		4.8 (10.6)

## ► Standard equipment

- Hex wrench ..... 1
- Guide rule ..... 1
- TCT saw blade 210 ..... 1
- Dust nozzle and Pan head screw M5x16 .... 1 (Europe only)

**Note:** The standard equipment for the tool shown above may differ by country.

## ► Optional accessories

- Saw blades

► **Repair**

**CAUTION: Unplug the machine and remove the saw blade from the machine for safety before repair/ maintenance in accordance with the instruction manual!**

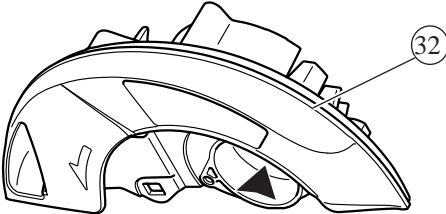
**[1] NECESSARY REPAIRING TOOLS**

Code No.	Description	Use for
1R003	Retaining ring S pliers ST-2N	Removing/installing Retaining ring S-42 from/on Spindle
1R004	Retaining ring S pliers ST-2	Pulling off Sleeve 6 from the hinge portion of Angular guide
1R008	Tips for retaining ring pliers (90 degrees)	(modular use with 1R004)
1R041	Vise plate	Fixing Bearing box section in vise
1R045	Gear extractor (large)	Removing Spindle from Bearing box
1R208	90-degree Set square	Squaring Saw blade to Base plate
1R229	1/4" Hex shank bit for M5	Removing Hex socket head bolt M5x40 from the hinge portion of Angular guide
1R236	Round bar for arbor 7-100	Removing Spindle from Helical gear 47
1R269	Bearing extractor	Removing Ball bearing 608LLB from Spindle
1R316	Adjustable bearing retainer wrench	Removing/installing Bearing retainer from/on Bearing box

**[2] LUBRICATION**

Apply Makita grease N. No.1 to the following portions designated with the black triangle to protect parts and product from unusual abrasion.

Item No.	Description	Portion to lubricate
③②	Blade case complete	Gear room for Helical gear 47 (Apply approximately 6g.)



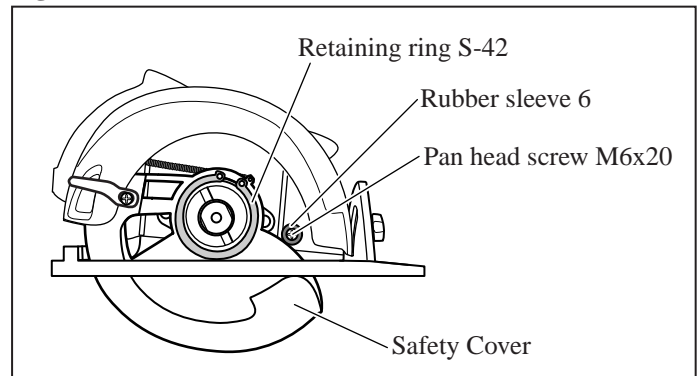
**[3] DISASSEMBLY/ASSEMBLY**

**[3] -1. Safety Cover**

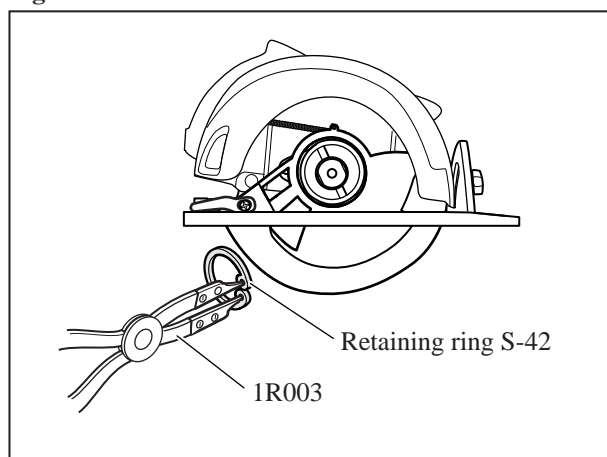
**DISASSEMBLING**

- 1) Remove Pan head screw M6x20 and Rubber sleeve 6. (**Fig. 1**)
- 2) Remove Retaining ring S-42 with 1R003. (**Fig. 2**)
- 3) Remove Torsion spring 4 and Safety cover from Blade case. Then remove Spacer from Bearing box. (**Fig. 3**)

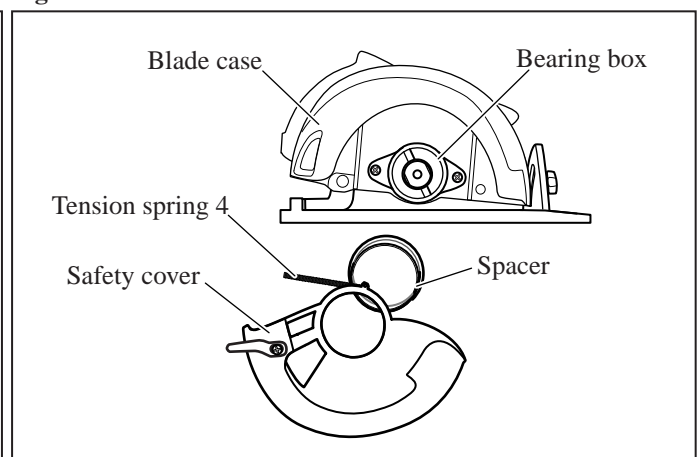
**Fig. 1**



**Fig. 2**



**Fig. 3**



► **Repair**

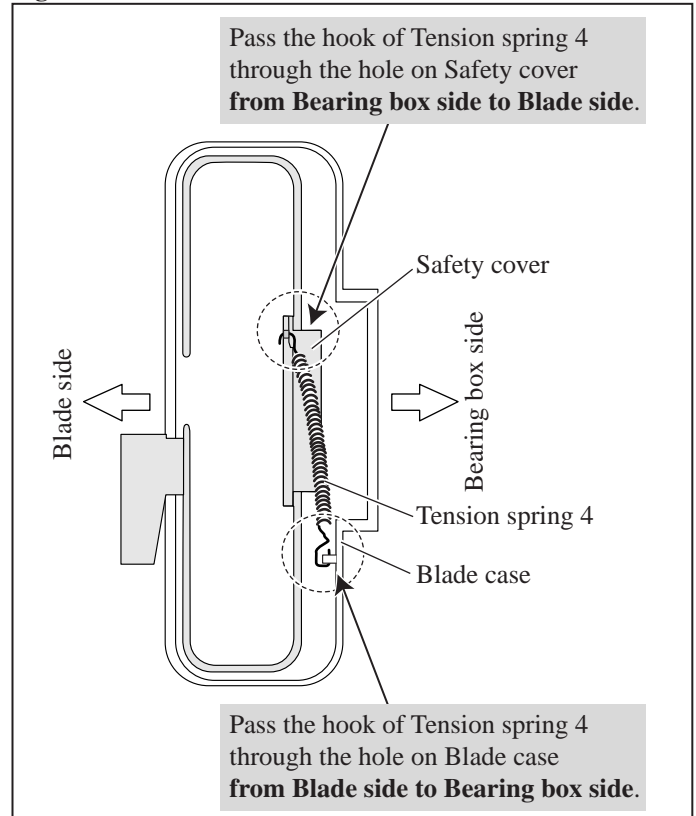
**[3] DISASSEMBLY/ASSEMBLY**

**[3] -1. Safety Cover (cont.)**

**ASSEMBLING**

- 1) Assemble Spacer and Safety cover to Bearing box. (Fig. 3 on page 2)
- 2) Assemble Safety cover to Bearing box. (Fig. 3 on page 2)  
Link Safety cover to Blade case with Tension spring 4 as illustrated in **Fig. 4**.
- Note:** Be sure to follow the instructions in **Fig. 4**. Otherwise, pivoting action of Safety cover will be interfered by Tension spring 4.
- 3) Secure Safety cover to Bearing box with Retaining ring S-42. Fasten Rubber sleeve 6 to Blade case with Pan head screw M6x20. (Figs. 1, 2 on page 2)

**Fig. 4**



**[3] -2. Base Complete**

**DISASSEMBLING**

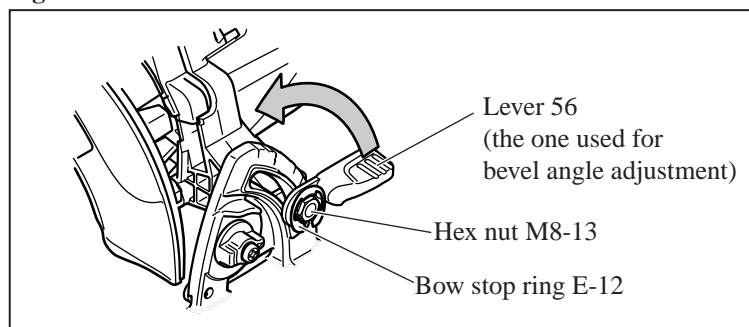
**Note:** The above illustrations show the conditions after removal of Safety cover.

It is not necessary to remove Safety cover when replacing Base complete.

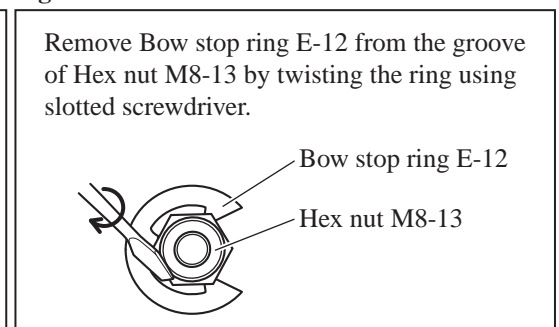
- 1) Loosen Hex nut M8-13 by turning Lever 56 (the one used for bevel angle adjustment) in the direction of the arrow as illustrated in **Fig. 5**.
- 2) Remove Bow stop ring E-12 from Hex nut M8-13 using slotted screwdriver as described in **Fig. 6**.
- 3) Remove Lever 56, Hex nut M8-13 and Flat washer 8 from Flat-head square-neck bolt M8x24.

Then remove Flat-head square-neck bolt M8x24 by pushing it in the direction of the black arrow. (**Fig. 7**)

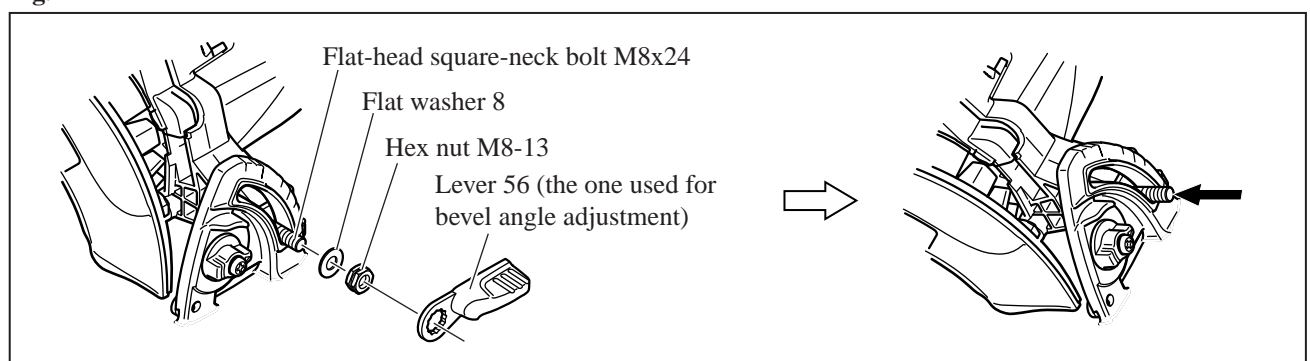
**Fig. 5**



**Fig. 6**



**Fig. 7**



► **Repair**

**[3] DISASSEMBLY/ASSEMBLY**

**[3] -2. Base Complete (cont.)**

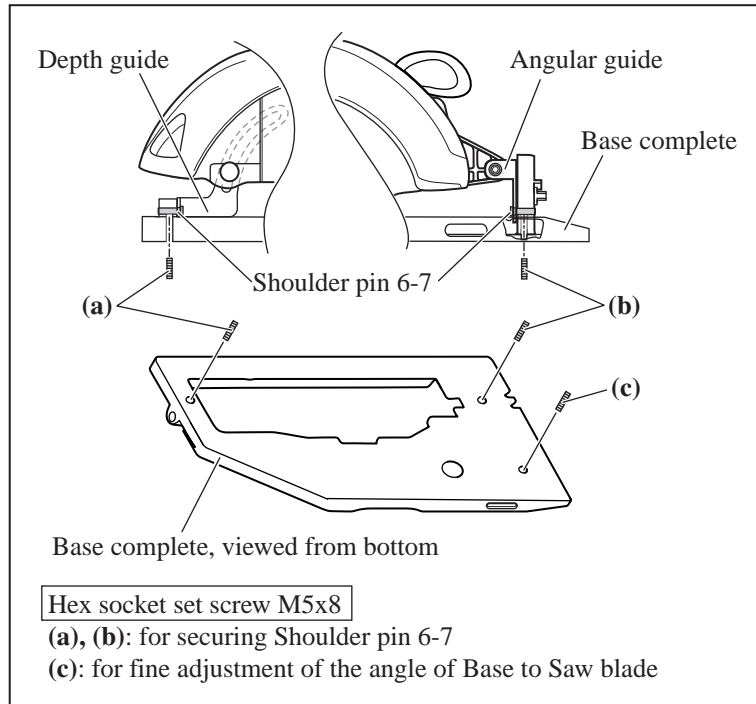
**DISASSEMBLING**

4) Unscrew two M5x8 Hex socket set screws that secure 6-7 Shoulder pins. (Fig. 8)

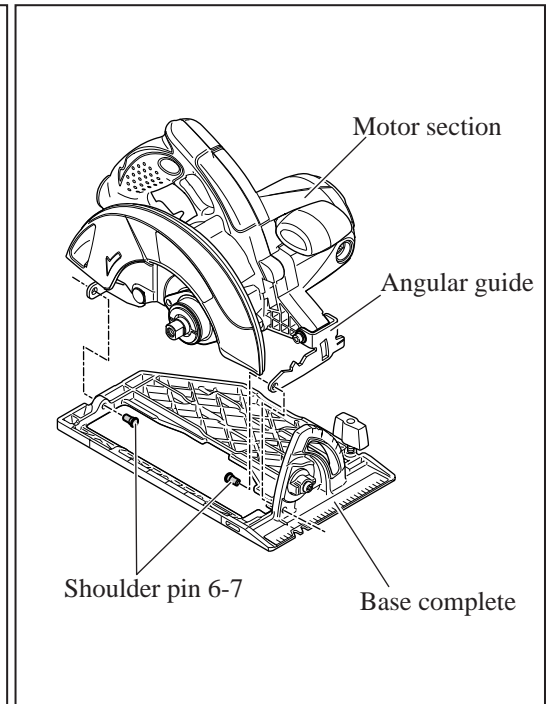
**Note: Do not unscrew the M5x8 Hex socket set screw used for fine adjustment of the angle of Base to Saw blade in this step.**

5) Remove two 6-7 Shoulder pins. Base complete can now be separated from Motor section. (Fig. 9)

**Fig. 8**



**Fig. 9**



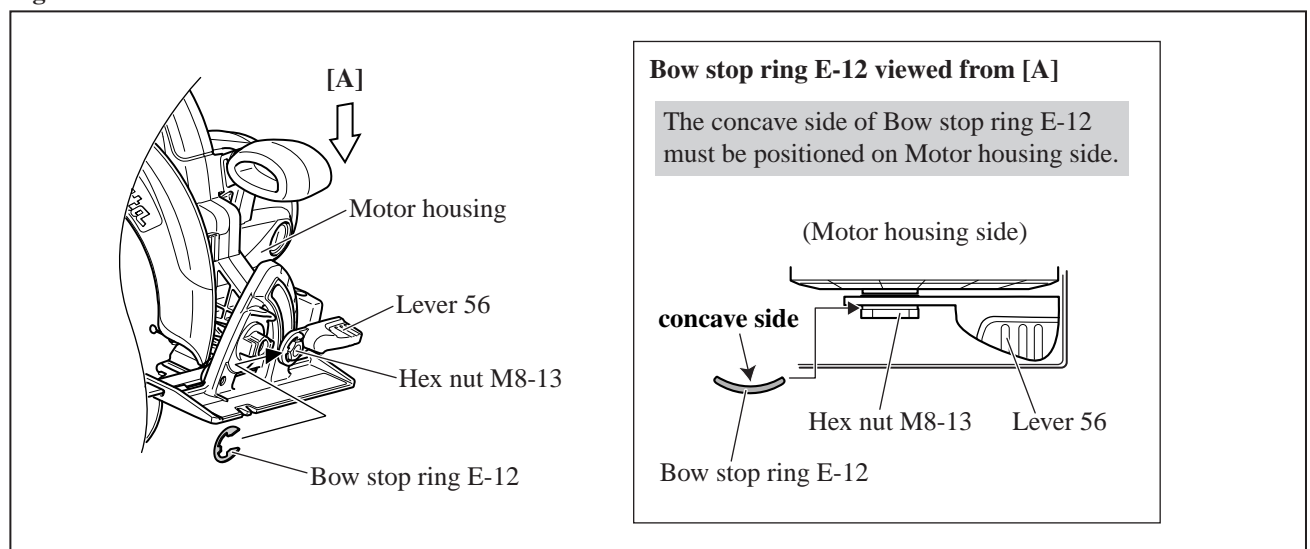
**ASSEMBLING**

Do the reverse of the disassembling steps.

**Note:** Bow stop ring E-12 is not reversible when assembled to Lever 56.

Be sure to assemble it in place as described in Fig. 10.

**Fig. 10**



► **Repair**

**[3] DISASSEMBLY/ASSEMBLY**

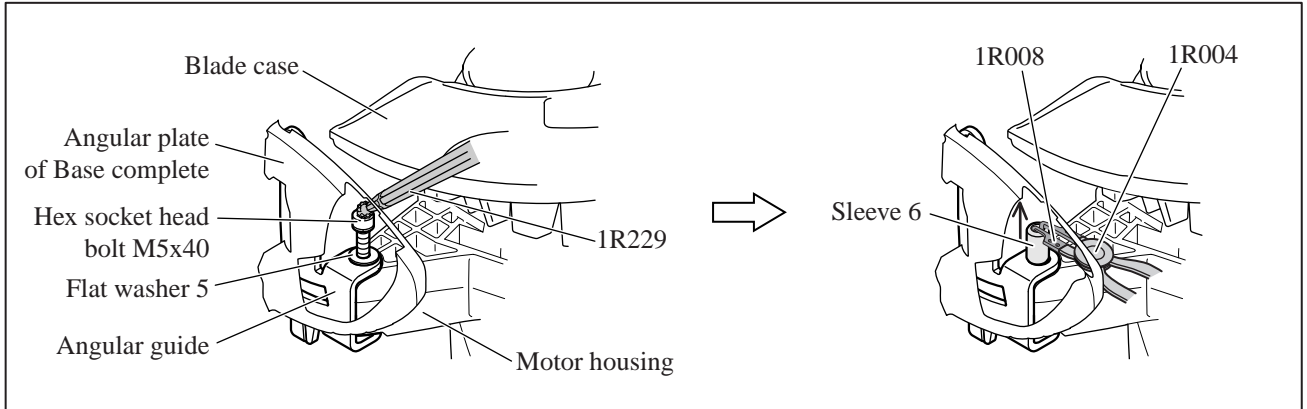
**[3] -3. Motor Section**

**DISASSEMBLING**

After removing Safety cover, disassemble Motor section as described below;

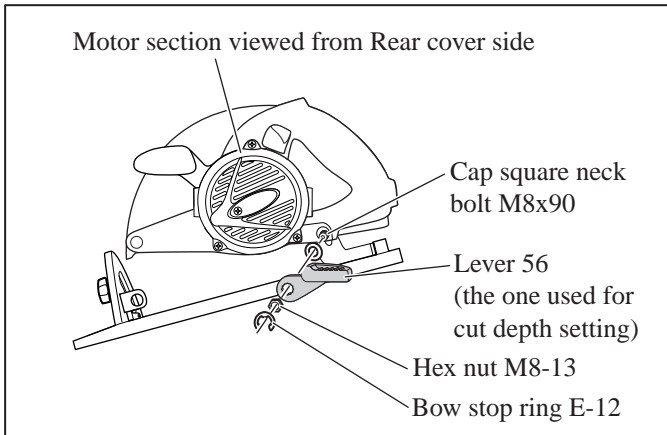
- 1) Remove Hex socket head bolt M5x40 using 1R229, then remove Flat washer 5 from Angular guide. (**left in Fig. 11**)
- 2) Remove Sleeve 6 using 1R004 and 1R008. (**right in Fig. 11**)

**Fig. 11**

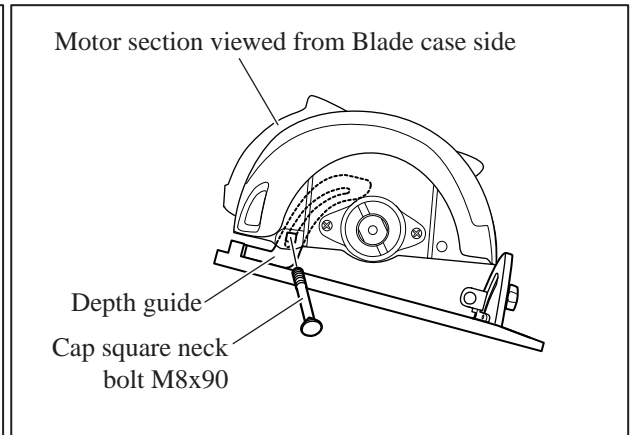


- 3) Loosen Hex nut M8x13 halfway with Lever 56; leave the nut on the threads of Cap square neck bolt M8x90 in this step. (**Fig. 12**)
- 4) Remove Bow stop ring E-12 with slotted screwdriver. (Refer to **Fig. 6** on page 3.)
- 5) Remove Lever 56 (the one used for cut depth setting), Hex nut M8-13 and Flat washer 8 from Cap square neck bolt M8x90. (**Fig. 12**)
- 6) Pull off cap square neck bolt M8x90. Motor section can be separated from Depth guide and Base complete. (**Fig. 13**)

**Fig. 12**

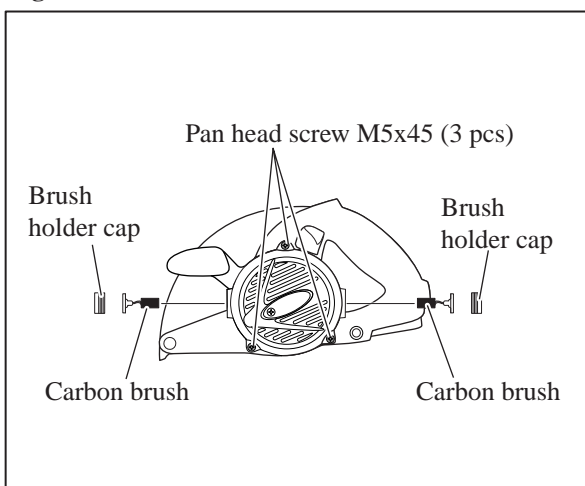


**Fig. 13**

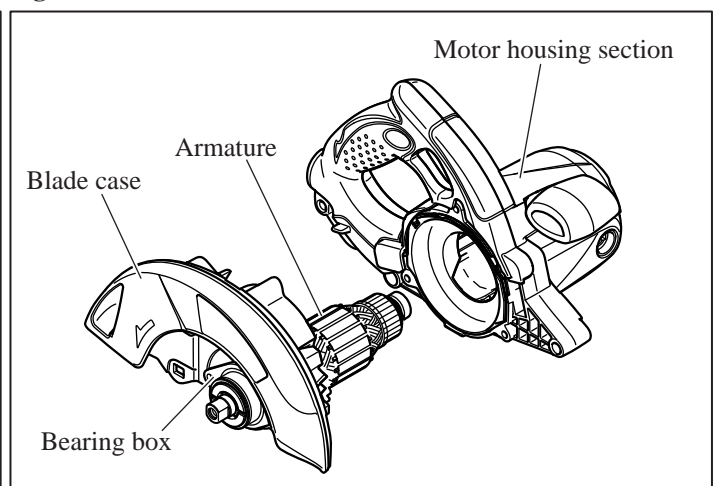


- 7) Remove Brush holder caps and Carbon brushes, then remove three M5x45 Pan head screws. (**Fig. 14**)
- 8) Motor housing section can now be separated from Blade case, and electrical parts in Motor housing section can be replaced. (**Fig. 15**)

**Fig. 14**



**Fig. 15**



► **Repair**

**[3] DISASSEMBLY/ASSEMBLY**

**[3] -4. Motor Housing Section (cont.)**

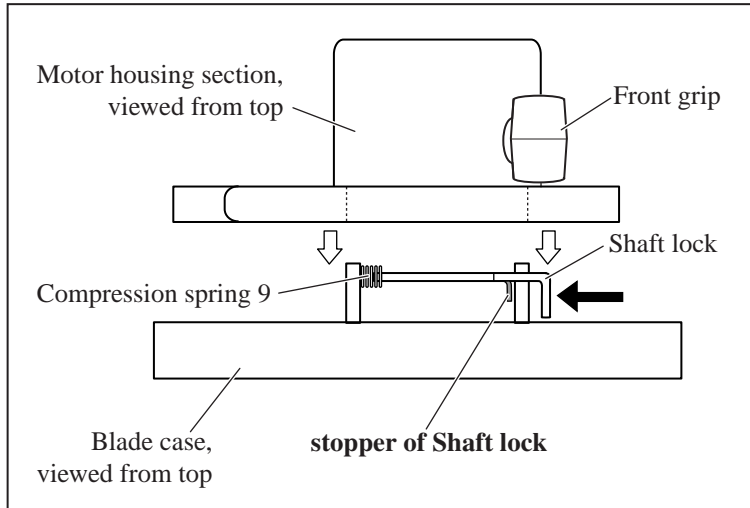
**ASSEMBLING**

Do the reverse of the disassembling steps.

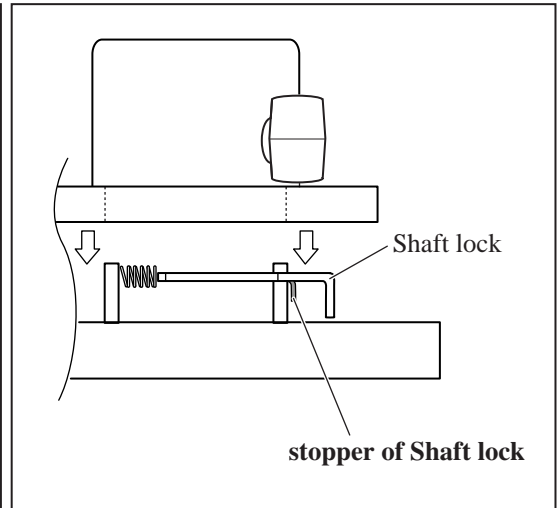
**Note 1:** Be sure to assemble Motor housing section to Blade case while pressing Shaft lock in the direction of the black arrow to position the stopper of Shaft lock inside Blade case. (Fig. 16) Armature shaft cannot be locked if the stopper of Shaft lock is positioned outside Blade case as illustrated in Fig. 17.

**Note 2:** When securing Lever 56 (the one used for cut depth setting) with Bow stop ring E-12, be sure to position the concave side of Bow stop ring E-12 on Motor housing side. (Refer to Fig. 10 on page 4.)

**Fig. 16**



**Fig. 17**

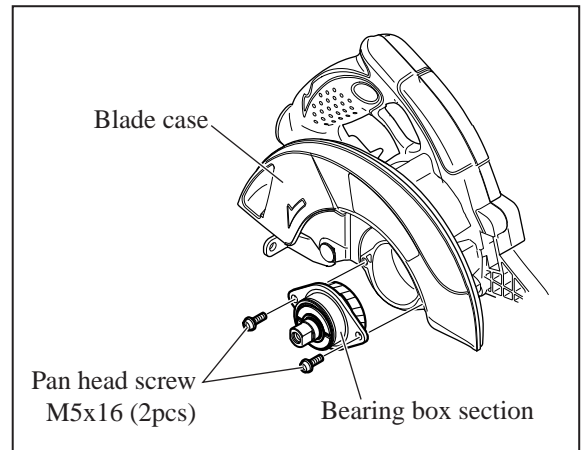


**[3] -5. Bearing Box Section and Gear Section**

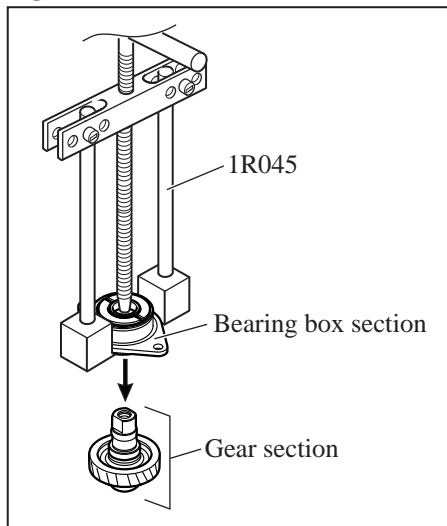
**DISASSEMBLING**

- 1) Remove Safety cover. See Figs. 1, 2, 3 on page 2.
- 2) Remove Bearing box section together with Gear section from Blade case by unscrewing two M5x16 Pan head screws. (Fig. 18)
- 3) Separate Bearing box section from Gear section using 1R045. (Fig. 19)
- 4) Turn over Gear section, and remove Ball bearing 608LLB from Gear section using 1R269. Then put 1R236 on the top end of Spindle and press it using arbor press. Spindle can now be separated from Helical gear 47. (Fig. 20)

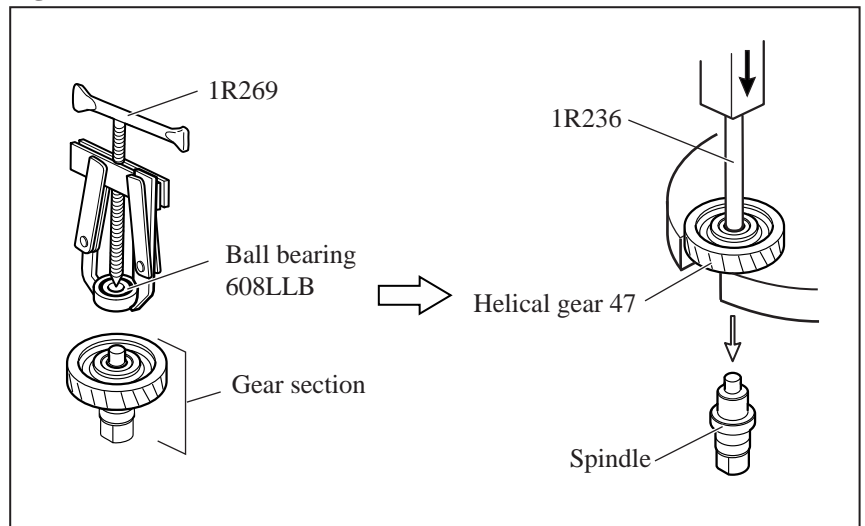
**Fig. 18**



**Fig. 19**



**Fig. 20**



► **Repair**

**[3] DISASSEMBLY/ASSEMBLY**

**[3] -5. Bearing Box Section and Gear Section (cont.)**

**DISASSEMBLING**

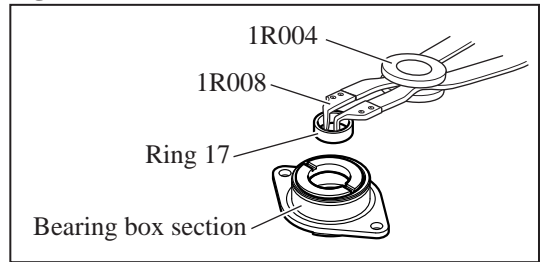
5) Remove Ring 17 from Bearing box section using 1R004 and 1R008. (Fig. 24)

6) Fix Bearing box section in vise, then remove Bearing retainer 23-36 from Bearing box using 1R316 as illustrated in Fig. 25.

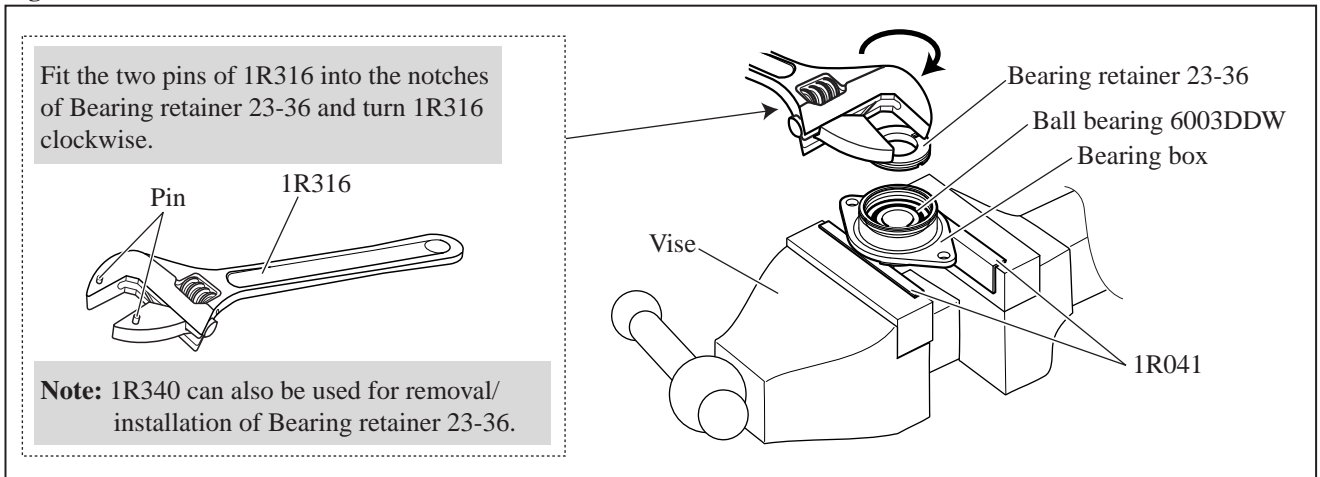
Ball bearing 6003DDW can now be removed.

**Note:** When fixing Bearing box section in vise, attach 1R041 to vise in order not to damage Bearing box.

**Fig. 24**



**Fig. 25**



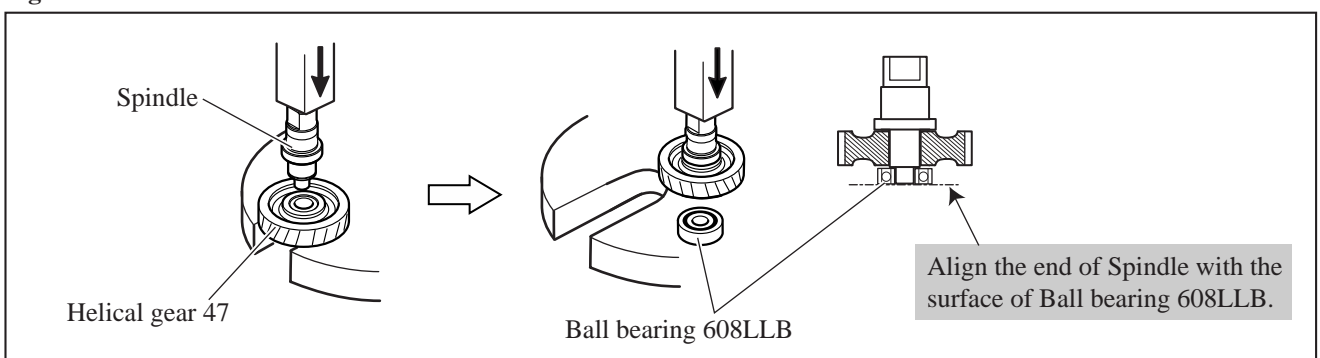
**ASSEMBLING**

1) Fit Ball bearing 6003DDW in Bearing box, then mount Bearing retainer 23-36 on Bearing box by turning it counterclockwise using 1R316 or 1R340.

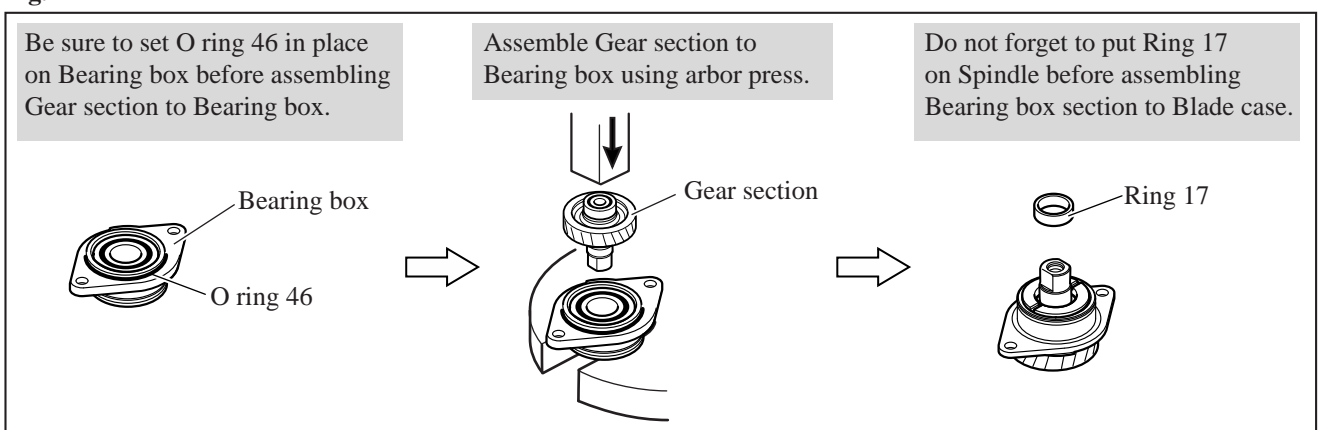
2) Assemble Spindle to Helical gear 47 using arbor press. Then assemble Ball bearing 608LLB to them using arbor press. (Fig. 26)

3) Set O ring 46 in place on Bearing box. Assemble Gear section to Bearing box using arbor press. Then put Ring 17 on Spindle. (Fig. 27)

**Fig. 26**



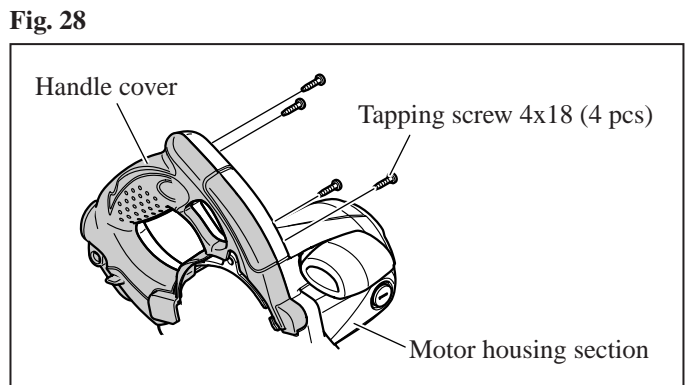
**Fig. 27**



► **Repair**

**[3] -6. Replacing the Electrical Parts in Handle Section**

Remove Handle cover by unscrewing four 4x18 Tapping screws on Motor housing section. (Fig. 28)  
 Electrical parts in Handle section can now be replaced.

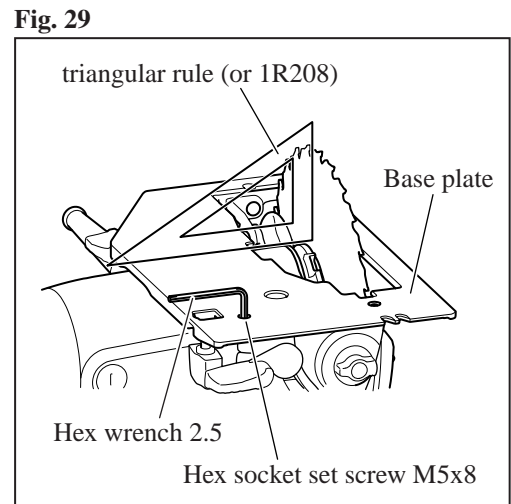


**[4] ADJUSTMENT**

**Note: Be sure to unplug the tool before making the following adjustments.**

**[4] -1. Squaring Adjustment of Saw Blade**

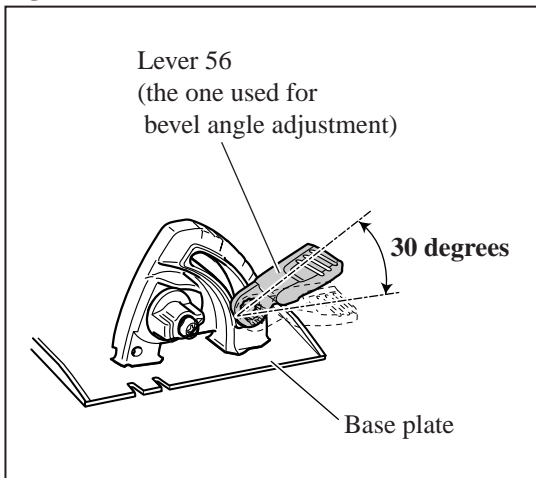
The angle of Saw blade to Base plate is adjusted to 90 degrees in factory. But if out of adjustment, apply a triangular rule or 1R208 to Saw blade and Base plate, then turn Hex socket set screw M5x8 with Hex wrench 2.5 until Saw blade is square to Base plate. (Fig. 29)



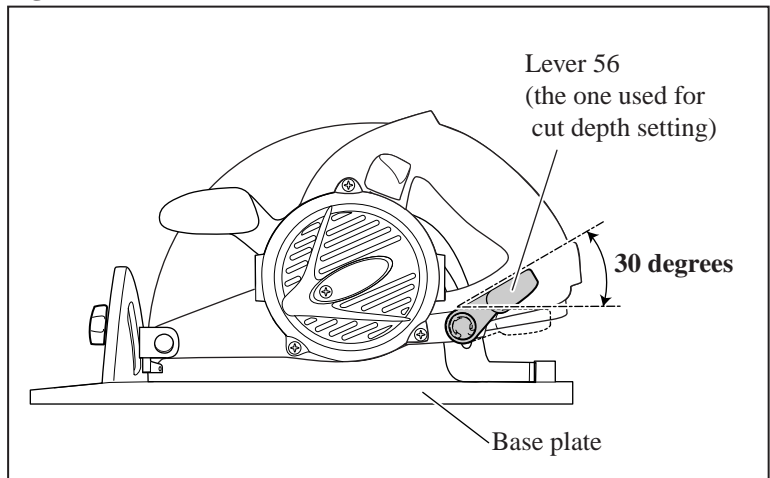
**[4] -2. Adjustment of Two Lever 56's**

Each of the two Lever 56's (the one used for bevel angle adjustment and the one used for cut depth setting) must be fixed in place so that it can be locked at an angle of between 0 and 30 degrees as illustrated in Figs. 30, 31.

**Fig. 30**



**Fig. 31**

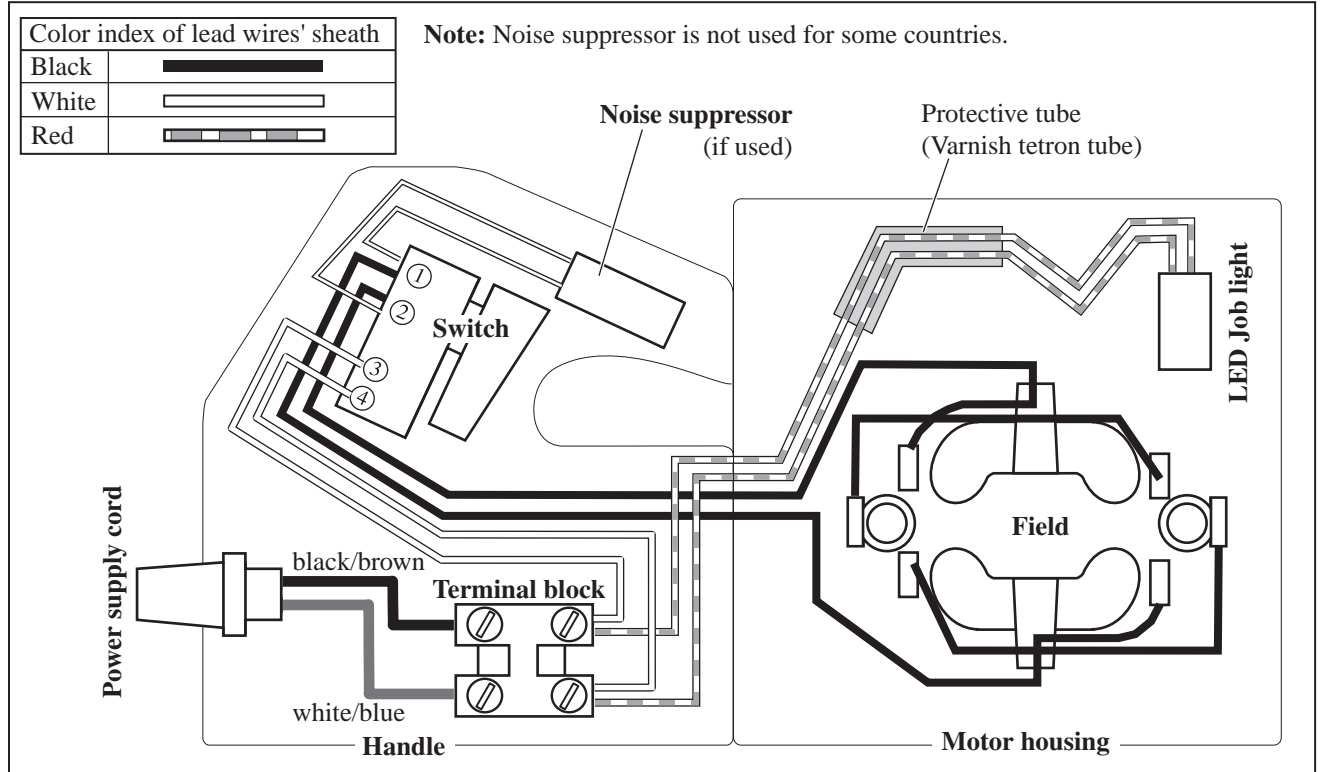




5008MG (without electric brake)

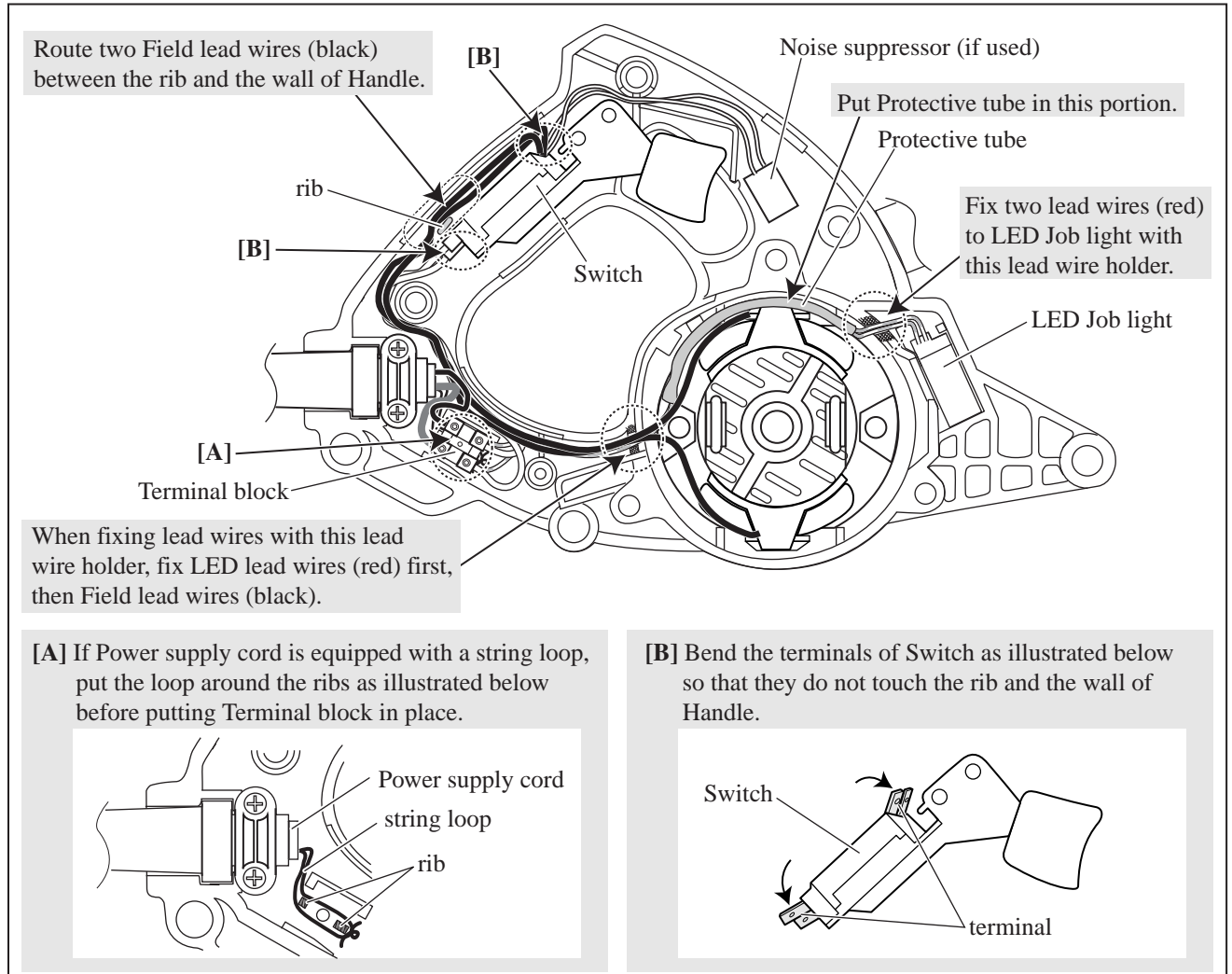
► **Circuit diagram**

Fig. D-1



► **Wiring diagram**

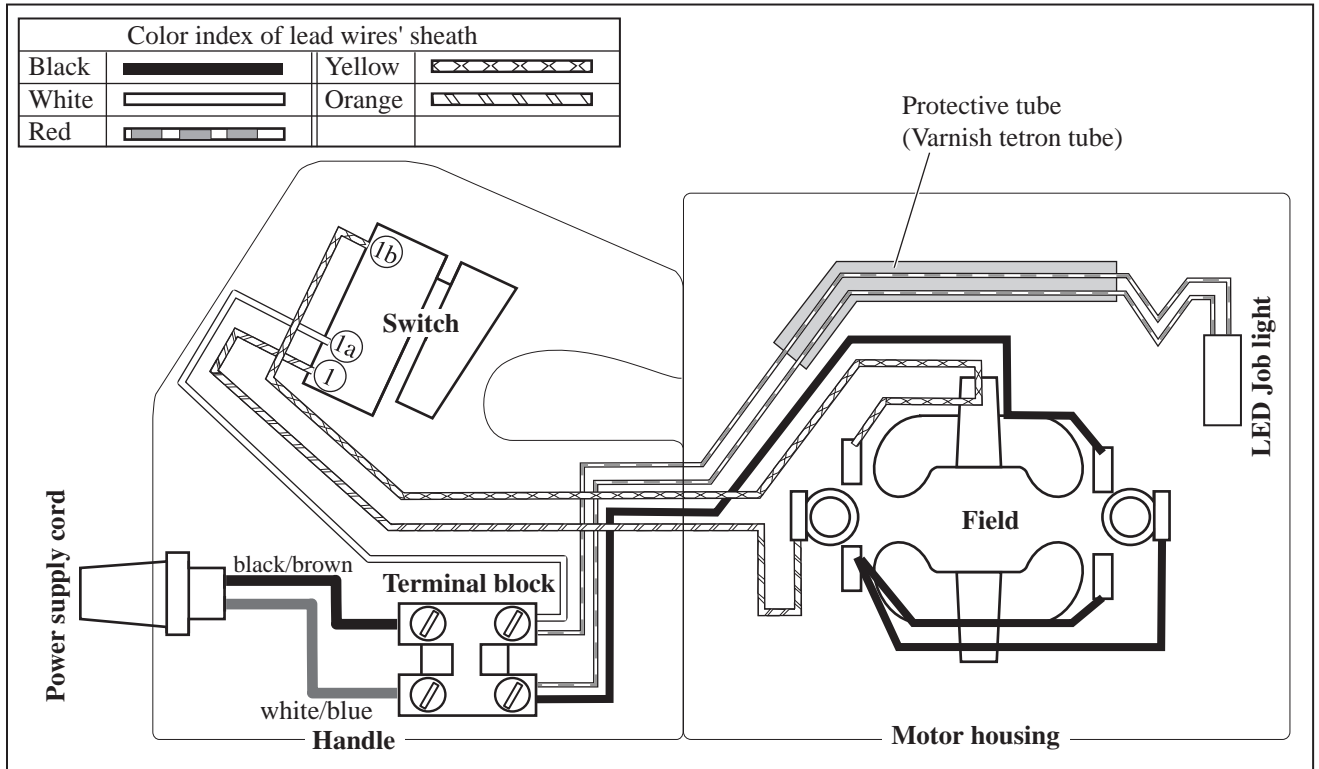
Fig. D-2



**5008MGA (with electric brake)**

► **Circuit diagram**

Fig. D-3



► **Wiring diagram**

Fig. D-4

