

T ECHNICAL INFORMATION



PRODUCT

P 1 / 7

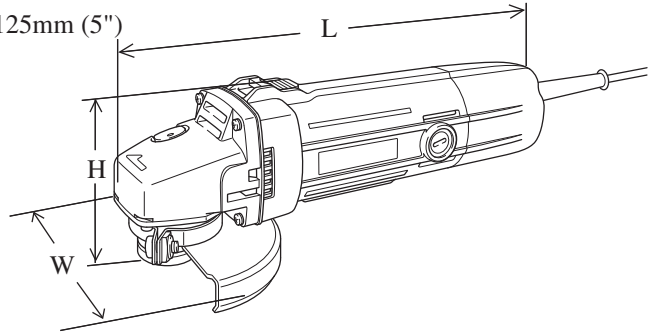
Models No. ▶ MGA450 / MGA500

Description ▶ Angle Grinders 115mm (4-1/2") / 125mm (5")

CONCEPT AND MAIN APPLICATIONS

115mm (4-1/2") and 125mm (5") angle grinders have been added to Makita SSP series.

- * Conveniently located slide switch
- * Industrial performance and durability at less expense
- * Easy-to-repair construction



Dimensions : mm (")		
Model No.	MGA450	MGA500
Length (L)	266 (10-1/2)	266 (10-1/2)
Width (W)	129 (5-1/8)	139 (5-1/2)
Height (H)	103 (4-1/16)	103 (4-1/16)

▶ Specification

Voltage (V)	Current (A)	Cycle (Hz)	Continuous Rating (W)		Max. Output(W)
			Input	Output	
220	2.7	50 / 60	570	350	650

		MGA450	MGA500
Wheel size : mm (")	Diameter	115 (4-1/2)	125 (5)
	Hole diameter	22.23 (7/8)	
	Thickness	6 (1/4)	
No load speed : min.-1 = rpm.		10,000	
Protection from electric shock		Double insulation	
Cord length : m (ft)		2.0 (6.6)	
Net weight : kg (lbs)		1.6 (3.5)	

▶ Standard equipment

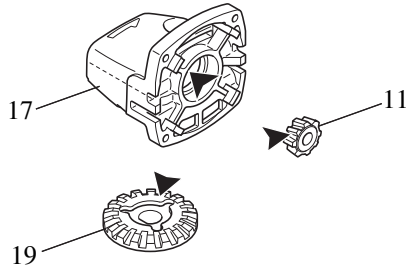
- * Lock nut wrench 1 pc.
- * Grip 36 complete 1 pc.

< Note > The standard equipment for the tool shown may differ from country to country.

< 1 > Lubrication

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

11	Spiral bevel gear 11	Teeth portion
17	Gear housing	Put 10g into gear room
19	Spiral bevel gear 36	Teeth portion



< 2 > Disassembling armature section (including spiral bevel gear 11)

(1) Remove the accessories in the following order. See Fig. 1.

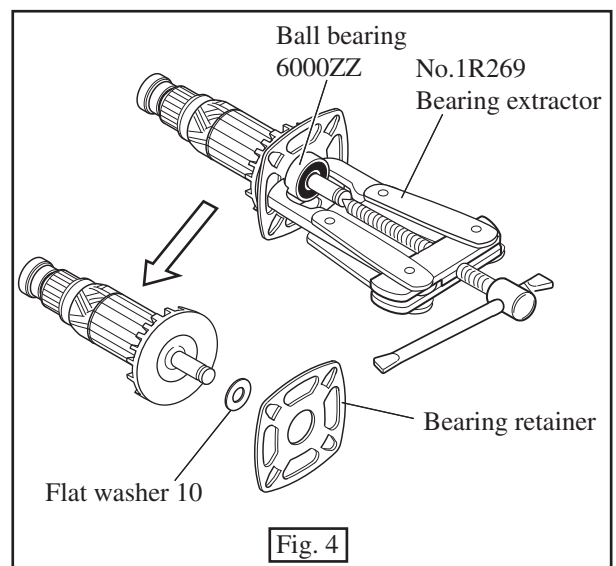
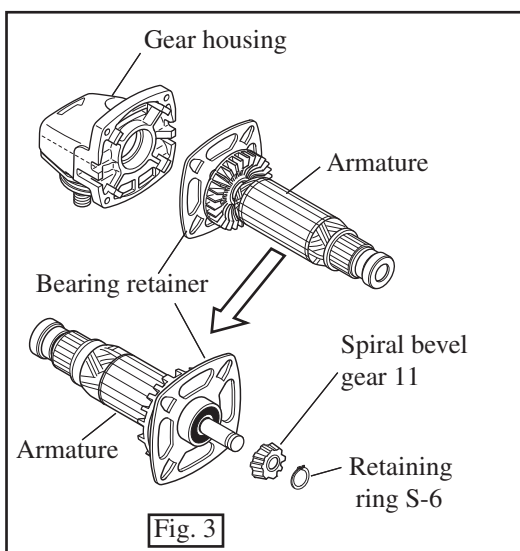
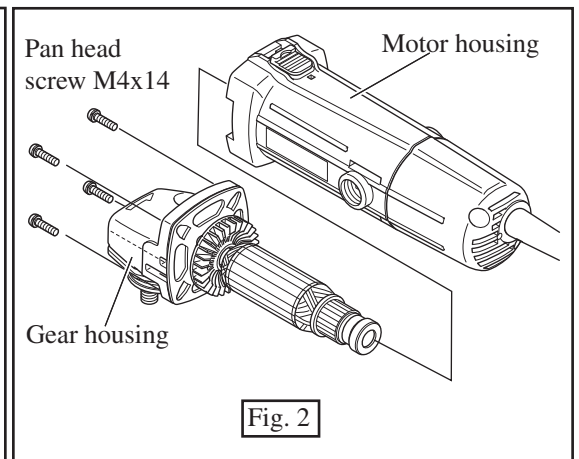
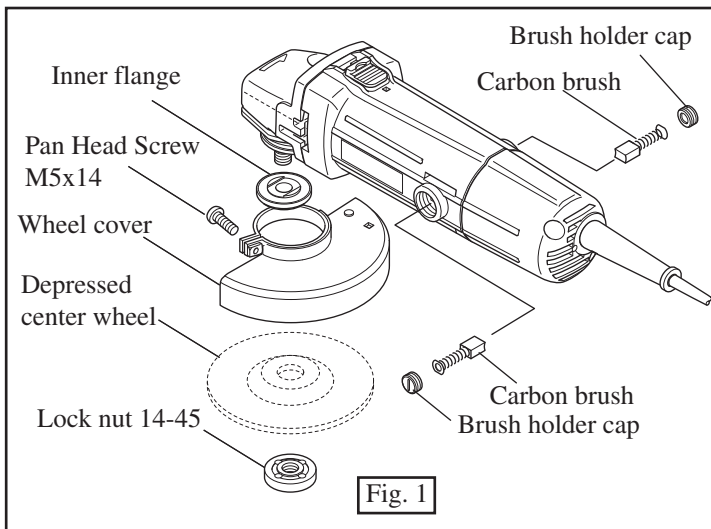
1. Lock nut 14-45, 2. Depressed center wheel, 3. Inner flange, 4. Wheel cover (Loosening pan head screw M5x14 for removing wheel cover.)

(2) Remove carbon brushes. See Fig. 1.

(3) Unscrew Pan head screws M4x14 (4 pcs.), and separate gear housing from motor housing. See Fig. 2.

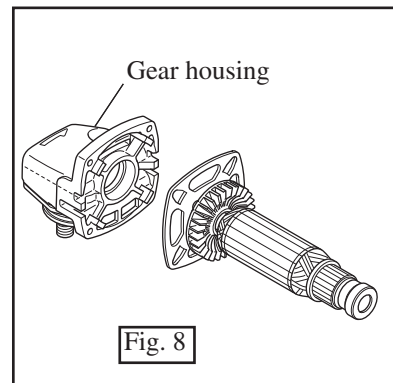
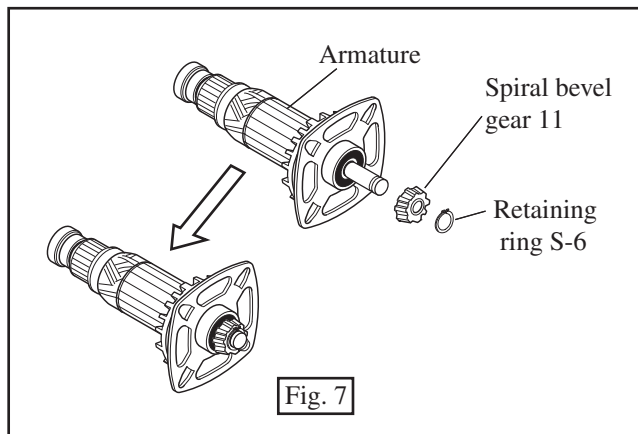
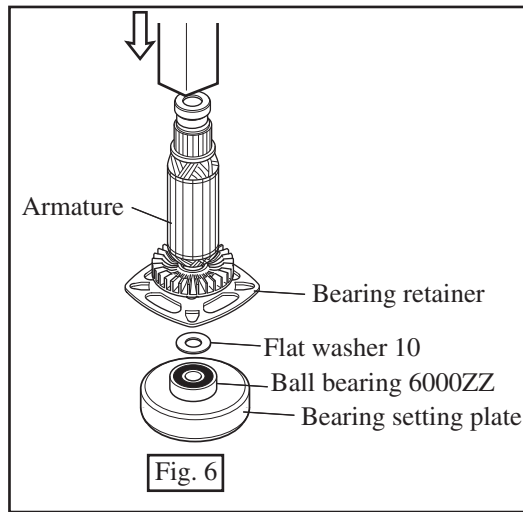
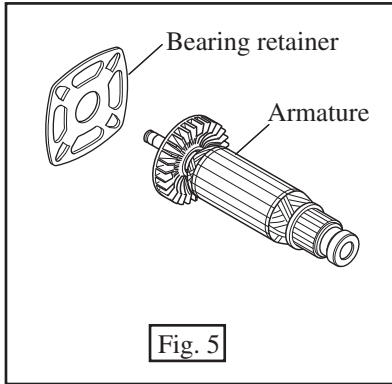
(4) After removing armature together with bearing retainer from gear housing, take off retaining ring S-6 with No.1R004 " Retaining ring S plier " from armature shaft. Then, spiral bevel gear 11 can be removed from armature shaft. See Fig. 3.

(5) Remove ball bearing 6000ZZ with No.1R269 " Bearing extractor ". And remove bearing retainer and flat washer 10 from armature. See Fig. 4.



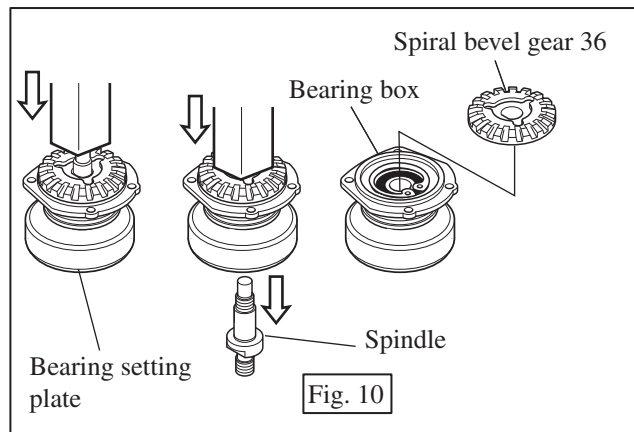
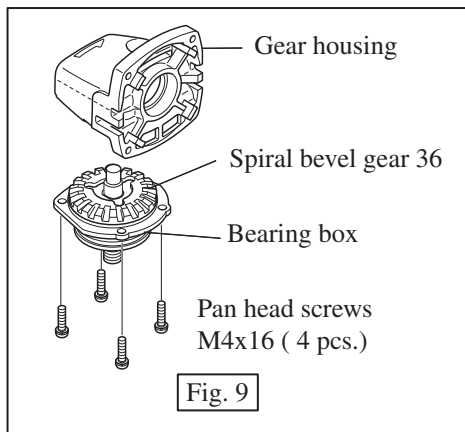
< 3 > Assembling armature section (including spiral bevel gear 11)

- (1) Pass bearing retainer through the armature shaft. See Fig. 5.
- (2) Put flat washer 10 on ball bearing 6000ZZ which has been set on the bearing setting plate. And press armature with arbor press to mount ball bearing 6000ZZ to armature. See Fig. 6.
- (3) Mount spiral bevel gear 11 to armature shaft. And secure it with retaining ring S-6. See Fig. 7.
- (4) Mount armature section to gear housing. See Fig. 8.

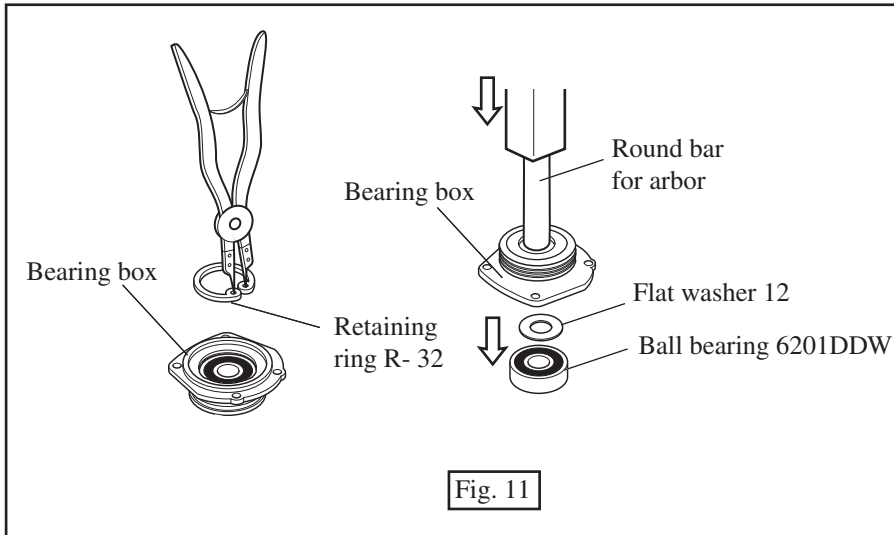


< 4 > Disassembling gear section

- (1) Disassemble the product as illustrated in Fig. 1 and Fig. 2 at page 2 in order to separate gear section from armature section.
- (2) Unscrew pan head screws M4x16 and remove bearing box together with spiral bevel gear 36 from gear housing. See Fig. 9.
- (3) Remove spindle by pressing with arbor press. See Fig. 10.

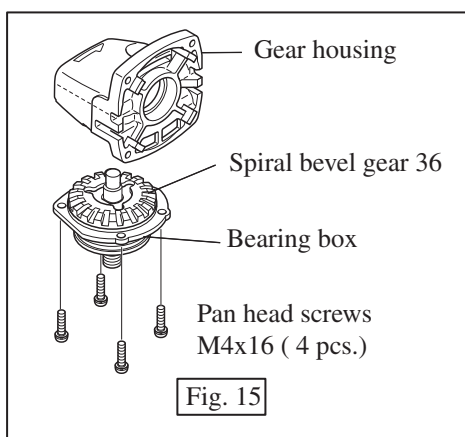
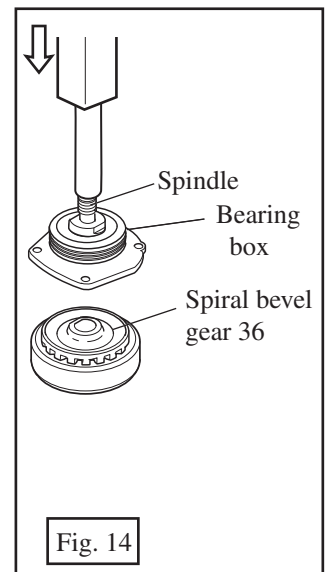
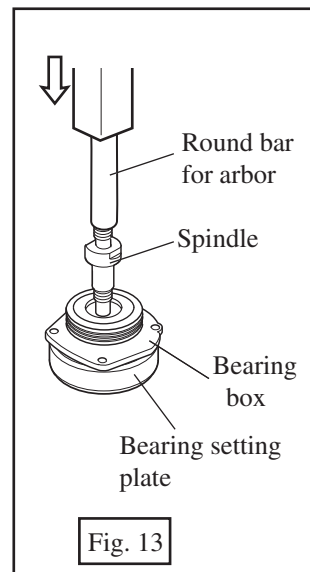
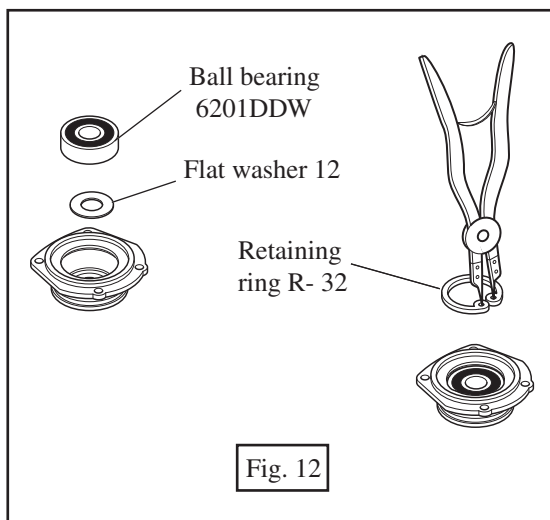


(4) Remove retaining ring R- 32. And then, remove ball bearing 6201DDW with arbor press as illustrated in Fig. 11.

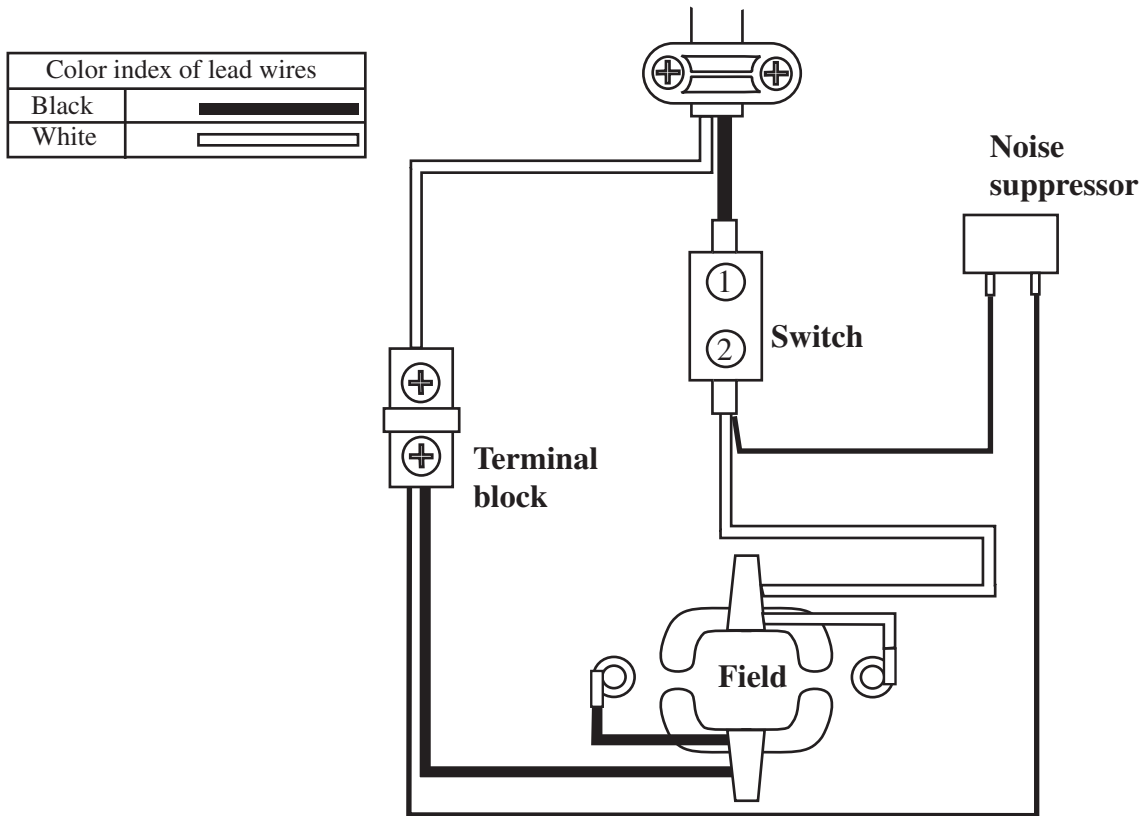


< 5 > Assembling gear section

- (1) Mount flat washer 12, and then, ball bearing 6201DDW. Secure ball bearing 6201DDW with retaining ring R-32 as illustrated in Fig. 12.
- (2) Mount spindle with arbor press as illustrated in Fig. 13.
- (3) Mount spiral bevel gear 36 by pressing the spindle which has been mounted to bearing box, with arbor press. See Fig. 14.
- (4) Mount bearing box to gear housing and secure it with 4 pcs. of pan head screws M4x16 as illustrated in Fig. 15.



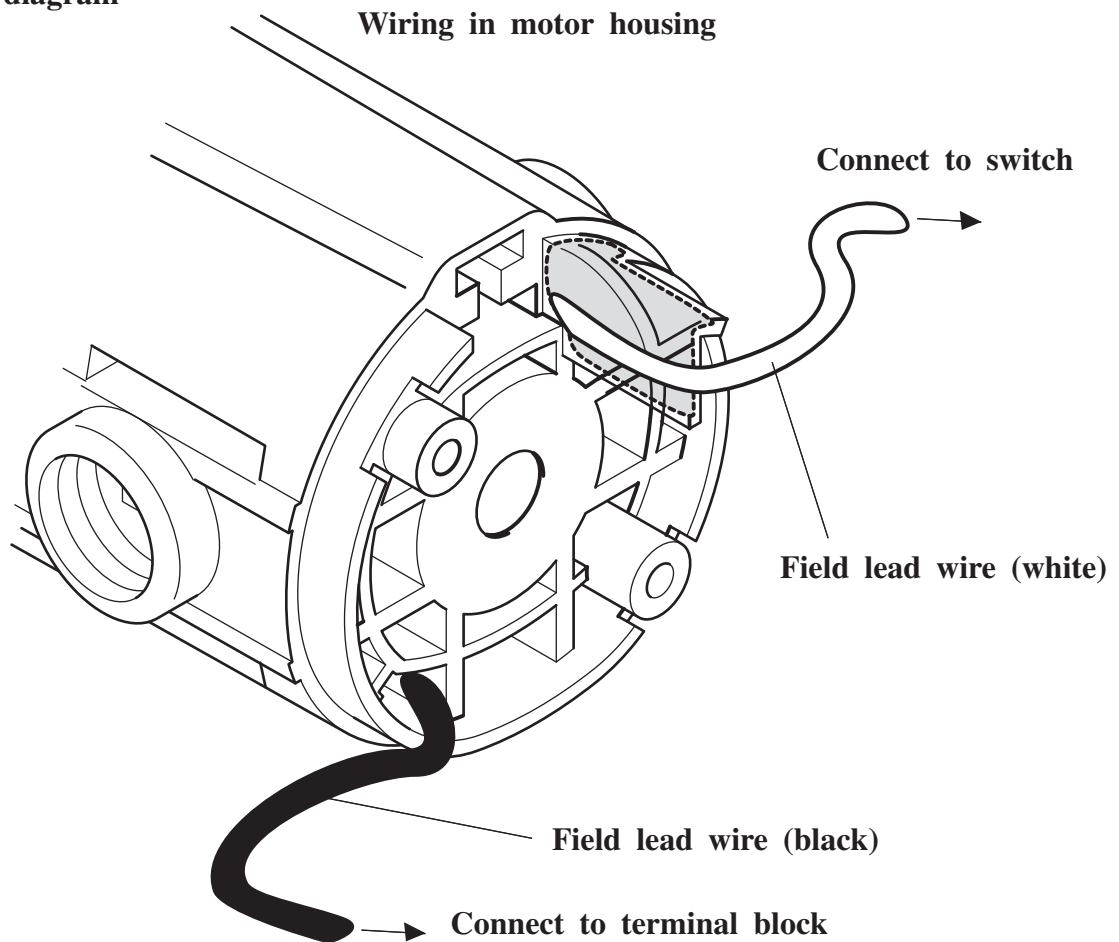
► **Circuit diagram**



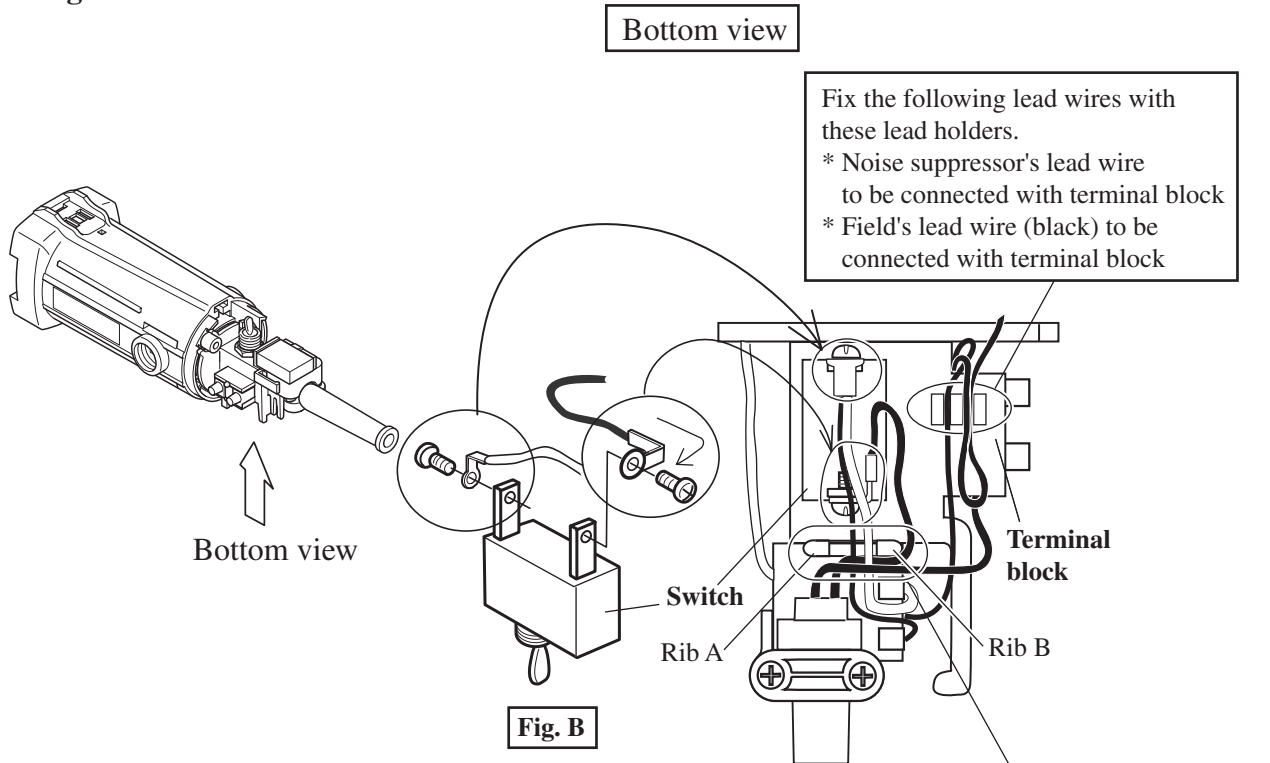
< Note >

The products for some country are not equipped with noise suppressor.

► **Wiring diagram**



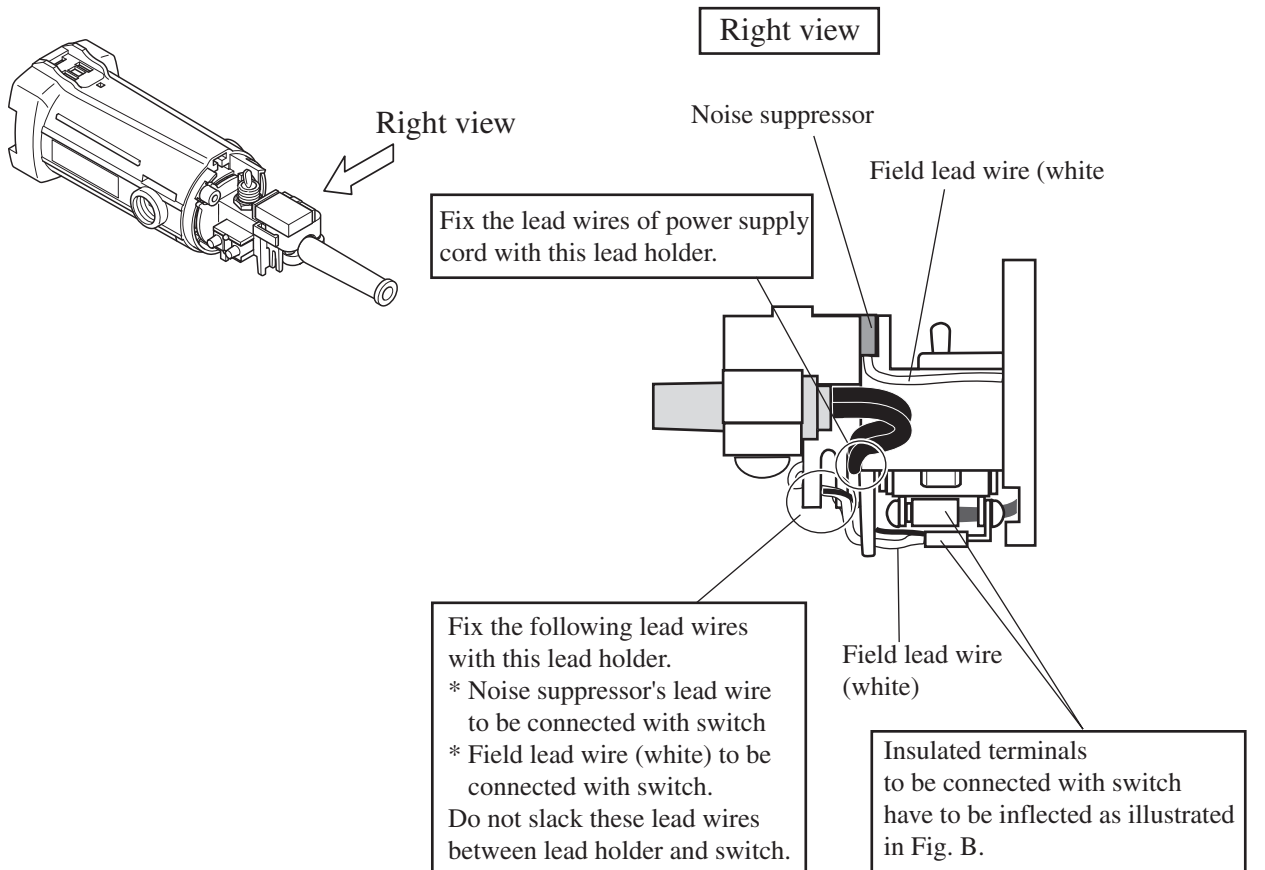
Wiring on switch box



Inflecting the insulated terminals, connect them with the switch terminals as illustrated in **Fig. B**.

Pass the following lead wires between rib A and B.

- * Noise suppressor's lead wire to be connected with switch
- * Field's lead wire (white) to be connected with switch



▶ Wiring diagram

Wiring on switch box

