## marathon®

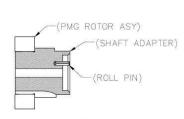
## INSTALLATION INSTRUCTIONS FOR ADD-ON PMG KITS MAGNAPLUS® GENERATORS FRAMES 431, 432, AND 433 (LK1127)

Note: For single bearing generators, this procedure should be done after the generator has been assembled to the engine to prevent the PMG rotor from binding in the PMG stator. Reference Assembly Drawing: B-779652-0A, Rev 2.

- 1) Remove louvered drip cover p/n 527259-01 from opposite drive end bearing carrier (set aside the six (6) 3/8 16 x 1" Hex Head cap screws and washers) and discard the louvered drip cover. The screws and washers will be re-installed on the new louvered drip cover p/n 527259-02, which replaces the previously discarded louvered drip cover p/n 527259-01, see step 7 below.
- 2) Inspect PMG stator adaptor and opposite drive-end bearing carrier to assure the mating surfaces are free of foreign material. Clean these surfaces as necessary.
- 3) Install PMG stator adaptor p/n 712510-01 on opposite drive-end bearing carrier and secure with four (4) 1/4 20 x 0.75 Hex Head whiz lock cap screws p/n 9646-75RC.
- 4) Position PMG rotor/shaft/roll pin assembly p/n A-S526816-1 consisting of PMG rotor assembly p/n A-526816, Shaft p/n 701991-01, and Roll pin p/n 811807-01 on the generator shaft, inserting the roll pin into the pre-drilled hole in the generator shaft.
- 5) Secure PMG rotor assembly to shaft with a 1/2 13 x 4" Hex Head machine screw p/n S-102. Torque bolt to 60 Ft-Lbs (81 N-m).
- 6) Install PMG stator assembly p/n A-525548-1 on stator adaptor. Secure with four (4) 1/4 20 x 1.75" cap screws p/n A-9812-175RC. Torque screws to 6 Ft-Lbs (8 N-m). Pass the PMG stator leads through upper opening in the opposite drive-end bearing carrier and into the generator connection box. Inspect air gap between the PMG stator and the PMG rotor. You may have to loosen the PMG stator and stator adapter bolts to adjust the position of both the stator and adaptor to achieve a uniform air gap all around the exciter rotor. Nominal air gap is 0.040". A piece of cardboard, paper, or other non-metallic material approximately 1/32" thick could be used as a feeler gauge in the process of alignment.
- 7) Install replacement louvered drip cover p/n 527259-02 to the opposite drive-end bearing bracket re-using the original six (6) 3/8 -16 x 1" Hex Head cap screws, flat washer, and split lock washer.
- 8) Install the plastic PMG cover p/n 527260 on the louvered drip cover securing with four (4) 1/4 20 x 0.75" Hex Head whiz lock cap screws, p/n A-9646-75RC.
- 9) Install proper Automatic Voltage Regulator and Capacitor.

## TYPE MAGNAPLUS® FRAMES 431 THROUGH 433 ADD-ON PMG PARTS LIST Reference Assembly Drawing: B-779652-0A, Rev 2. (Mounting Kit: LK1127)

ITEM#	PART DESCRIPTION	QTY.	PART NUMBER
1	PMG Stator Assembly	1	A-525548-1
2*	PMG Rotor Assembly	1	A-526816
3	PMG Stator Adaptor	1	712510-01
4*	PMG Shaft	1	701991-01
5	Screw, Hex Hd Cap, 1/4 - 20 x 1.75"	4	A-9812-175RC
6	Washer, Belleville - 1/4"	4	A-9682-2RC
7	Screw, Hex Hd Machine, 1/2 - 13 x 4"	1	S-102
8	Washer, Belleville - 1/2"	1	A-9682-1RC
9*	Roll Pin 0.25 x .88"	1	811807-01
10	Drip Cover - PMG Add-on	1	527259-02
11	Screw, Hex Hd Whiz Lk, 1/4 - 20 x 0.75"	8	A-9646-75RC
12	PMG Cover	1	527260
13	Screw, Hex Hd Cap, 3/8 - 16 x 1" (re-use existing)	6	A-9680-75RC
14	Washer, Flat - 3/8" (re-use existing)	6	A-7653-3RC
15	Washer, Split Lock - 3/8" (re-use existing)	6	A-7656-8RC
Α	PMG stator mounting bolts to be torqued to 6 Ft-Lbs (8 N-m).		
В	PMG rotor mounting bolt to be torqued to 60 Ft-Lbs (81 N-m).		



FOR "SERVICE ONLY" B/M, PRE-ASSEMBLE THE ROTOR,
SHAFT ADAPTER & ROLL PIN PER DRAWING A-S526816

[ITEMS MARKED WITH AN ASTERISK (\*)]

