

Standard Tools

The MAGNAMAX^{DVR}® generator is assembled with American standard SAE hardware. Wrench sizes from 5/16 inch to 7/8 inch are used. A socket head set screw is used in the drive hub. A 1/4 inch allen type wrench is required to remove it.

All fasteners should be properly torqued (see section 12). Torque wrenches ranging from 25 in-lb through 200 ft-lb should be available.

Electrical test equipment should include a voltmeter or multimeter (VOM), clamp on ammeter, accurate frequency meter or tachometer and a megohmmeter. (See section 8 – Generator Testing for more information.)

Special Tools

In addition to the standard tools mentioned above, the following special tools will facilitate removal and installation of large and/or special parts. These tools can be obtained from the Marathon Electric parts department.

Exciter Stator Lifting Fixture (figure 10-1) – In cases where the exciter stator is to be serviced without removing the generator conduit box, this fixture can be used with overhead rigging to remove and reinstall the exciter stator.

Exciter Rotor Puller Bolt (figure 10-2) – The exciter rotor has a built-in pulling system. With the use of this bolt, the rotor can be easily removed from the shaft without damage to the winding.

Snap Ring Pliers (figure 10-3) – The PMG rotor is installed to the generator shaft with a snap ring. The nominal shaft diameter is 2-3/4 inches and the ring must be spread approximately 3/4 inches for removal. To install the snap ring, use a piece of pipe with a 2-3/4 inch ID (figure 10-4). Push the PMG rotor and snap ring onto the shaft until the ring snaps into the groove.

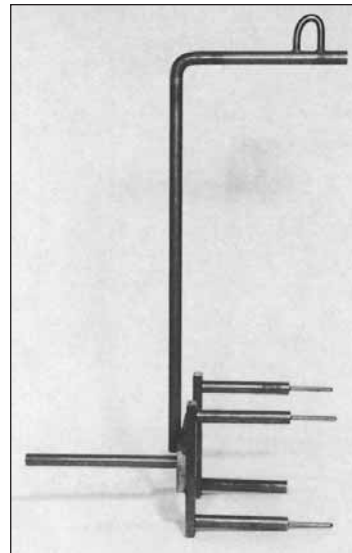


Figure 10-1

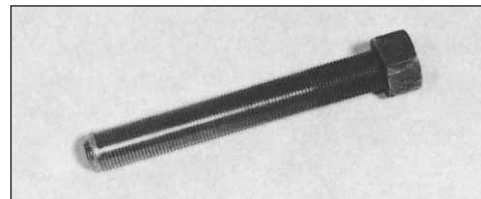


Figure 10-2



Figure 10-3



Figure 10-4