

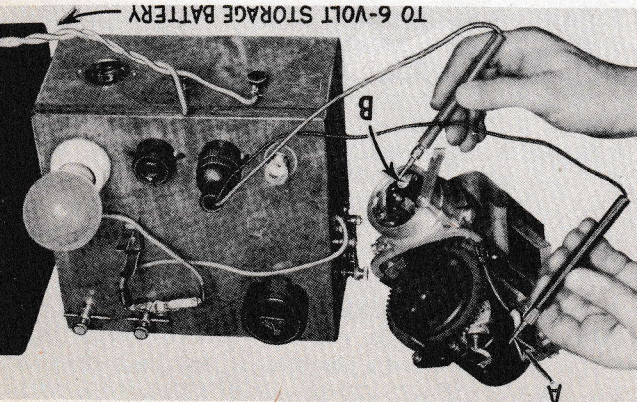
Safety Gap

If the breaker and distributor of the subject magneto are both found to be in good condition, carry the examination further. Leave the distributor block off, advance the spark, disengage the impulse coupling (see page 25), then turn the magneto briskly by hand. A spark should jump regularly across the safety gap. This test cannot be made on the F-6 magneto unless the safety gap is reduced to the same setting as in the F-4 magneto.

Examination for Safety Gap Sparking

We will assume that the spark is still unsatisfactory, intermittent, and weak. The examination must then proceed still further. Remove the magnet and frame cover. Check the condenser; be- and test the magneto for spark oncemore. and test the magneto for spark oncemore. Test condenser as explained on Page 16.

The frame cover may be left off for this test; however, it is necessary to replace magnet on magneto. The spark should jump the safety gap with the breaker in advance position, with the rotor being turned briskly by hand. If performance is now satisfactory, the condenser was at fault. Reset the F-6 magneto safety gap; see Page 16 for correct setting.

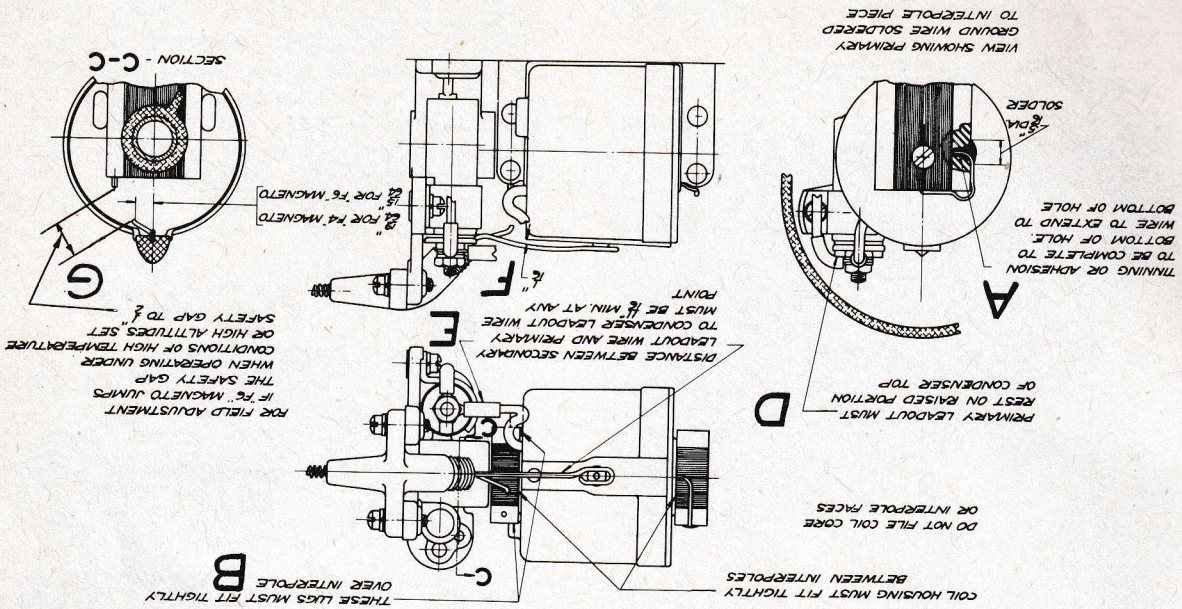


ILLUST. 14--TESTING PRIMARY LEAD-OUT WIRE FOR OPEN CIRCUIT OR FOR GROUNDING.

Assuming that the condenser exchange did not correct faulty operation, it will be in order to check the primary lead-out wire for open circuit and for grounding. This is done by using the 6-volt line on electrical test set as shown in above illustration. Disconnect primary lead-out wire terminal "A" from condenser and turn rotor until breaker points are open. If primary lead-out wire shows a closed circuit from terminal "A" to terminal "B", and an open circuit from either terminal to any grounded surface, then the fault lies either in the magneto winding or its installation.

Examination of the Ground Connection

Examine the ground connection of the winding to the interpole (Illustr. 15), Item "A"). This wire should be securely



ILLUST. 15--DRAWING OF MAGNETO COIL ASSEMBLED IN PLACE ON F-4 AND F-6 MAGNETOS WITH SERVICING POINTERS FOR INSTALLING COIL PROPERLY. (REFER TO ILLUSTR. 22, PAGE 14 FOR LATEST CONSTRUCTION OF ITEM A).