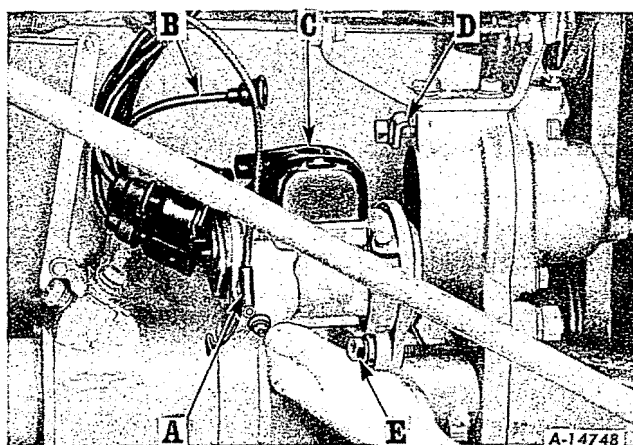


MAINTENANCE

Removal of the Magneto



Illust. 32

Removal of the magneto.

1. Disconnect switch cable "A" (Illust. 32) by removing the nut and lock washer attaching the cable to the magneto terminal.

2. Pull out cable "B" from coil cover "C" and remove the distributor cap.

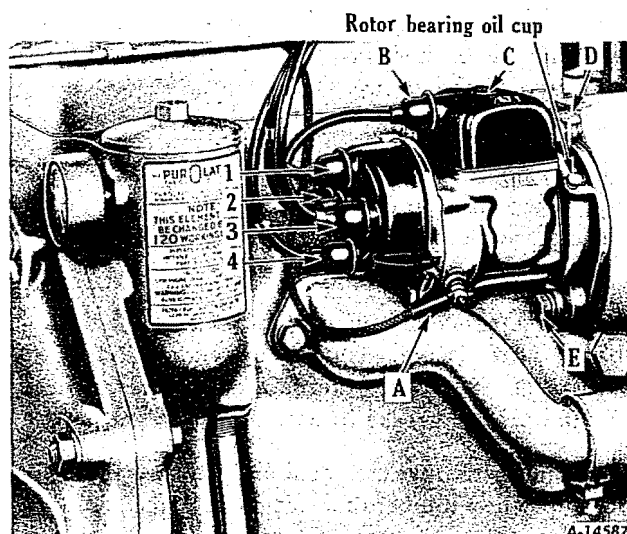
3. Loosen the nut holding magneto mounting clip "D" and remove cap screw "E." The magneto assembly can then be removed. See Illust. 32.

Installing and Timing the Magneto to the Engine

1. Pull out cable "B" (Illusts. 32 and 32A) from the coil cover end. This will eliminate any possibility of accidental starting.

2. Crank the engine until the No. 1 piston (the piston next to the radiator) is on the upper dead center of the compression stroke. The compression stroke can be determined by removing the No. 1 spark plug, placing the thumb over the opening, and cranking the engine until an outward pressure is felt. Continue cranking slowly until the notch on the fan drive pulley (on the crankshaft) is in line with pointer on front crankcase cover. See Illust. 33. Both intake and exhaust valves will then be closed.

3. Remove the distributor cap and turn the magneto impulse coupling (Illust. 31) in a counter-clockwise direction (as viewed from the coupling end) until end "B" of the distributor rotor arm points toward the No. 1 terminal on the distributor cap. See Illust. 30B. Then replace the distributor cap.



Illust. 32A

J-4 Magneto wiring (clockwise rotation).

4. Assemble the magneto on the engine, making sure that the lugs on the impulse coupling engage in the slots on the magneto drive coupling. (Assemble the magneto so that the top is as close to the crankcase as possible.)

5. Insert magneto mounting bolt "E" loosely in the magneto flange, just enough to hold the magneto in place. Then crank the engine one complete revolution to the next top dead center. Now pull the upper part of the magneto away from the engine until the impulse coupling just trips.

6. Tighten mounting clip nut "D" and bolt "E" (Illust. 32) securely. Attach the spark plug cables to the engine and magneto. Start by connecting No. 1 cylinder spark plug to the socket marked "1" on the distributor block; connect the No. 3 socket with the No. 3 cylinder; next with the No. 4 cylinder, and next with the No. 2 cylinder. See Illusts. 30 and 32A.

7. Connect the switch cable to the magneto terminal.

8. To check the timing, crank the engine slowly until the top dead center of No. 1 cylinder is reached; at which time the impulse coupling should just trip.

9. The magneto is now correctly wired and timed.

10. Push cable "B" back into the socket in the coil cover. See Illust. 32A.