

GRANT

MODEL H, HX, HY, HZ (1920-21) BIJUR GENERATING, STARTING AND LIGHTING SYSTEM ATWATER KENT IGNITION

BATTERY.—Prest-O-Lite, Type 613-RHN, 6 volt, 115 ampere-hour. The positive (+) terminal is grounded.

IGNITION.—Type CC. Breaker contacts separate .006 inch. They are made of tungsten. When the condition of the contacts affects the ignition, remove and resurface with fine emery cloth or against the flat side of an emery wheel, finishing on a hard oil stone.

OILING.—Remove the distributor cap every two weeks, and put 4 or 5 drops of light engine oil in the oil hole exposed. Put a small amount of vaseline on the cam, applying with a toothpick. If the car is driven more than 500 miles in two weeks, these attentions must be given every 500 miles.

TIMING.—Breaker contacts begin to separate when piston entering power stroke is on top dead center, spark control and breaker assembly in the fully retarded position.

FIRING ORDER.—The firing order is 1, 5, 3, 6, 2, 4.

SPARK PLUG GAPS.—Spark plug gaps are .025 inch.

STARTER.—Type FD-140, M-1308 or M-1381. Starter is connected to the engine through a Bendix drive. Lock torque is 11.6 pound-feet, current being 550 amperes at 4 volts. Pressure of brushes on the commutator is 30 ounces.

OILING.—Put 5 or 6 drops of light engine oil in each of the starter bearing oilers every month.

GENERATOR.—Type P-230, M-1345. Generator current regulation is by third brush system. Maximum current output is 14 amperes, reached at 1500 R.P.M. of the armature or 15-20 miles per hour. Charging rate reduces to 12 amperes at 30-40 miles per hour. Charging rate is varied by inserting a special toothed wrench in the adjusting hole in the commutator end plate and moving the third brush assembly through a ratchet engagement. Turn the adjusting wrench in a clockwise direction to increase the charging rate, and in the opposite direction to decrease the charging rate.

OILING.—Put 5 or 6 drops of light engine oil in each of the generator oilers every two weeks. If car is driven more than 500 miles in two weeks, the oiling must be done every 500 miles.

RELAY.—Relay closes at 8-10 miles per hour or 600 R.P.M. of the armature, and opens at 6-8 miles per hour or 550 R.P.M. of the armature. Relay contacts separate .015 inch. Air gap between relay armature and coil core is .025 inch, contacts closed. Adjust spring tension on relay so that contacts close when the voltage of the generator, measured across the main brushes, reaches 6.5 volts. Clean relay contacts by drawing unglazed paper between them. If badly burned or pitted, resurface with well worn No. 00 sandpaper. Remove all grit. Adjust before again putting into service.

LAMPS.—Head lamps are 6-8 volt, 15 cp. Dimmer lamps are 6-8 volt, 4 cp. Dash and tail lamps are 6-8 volt, 2 cp.

