FITTING A DRIVING DOG OR DRIVING GEAR TO DISTRIBUTORS AND VERTICAL TYPE MAGNETOS

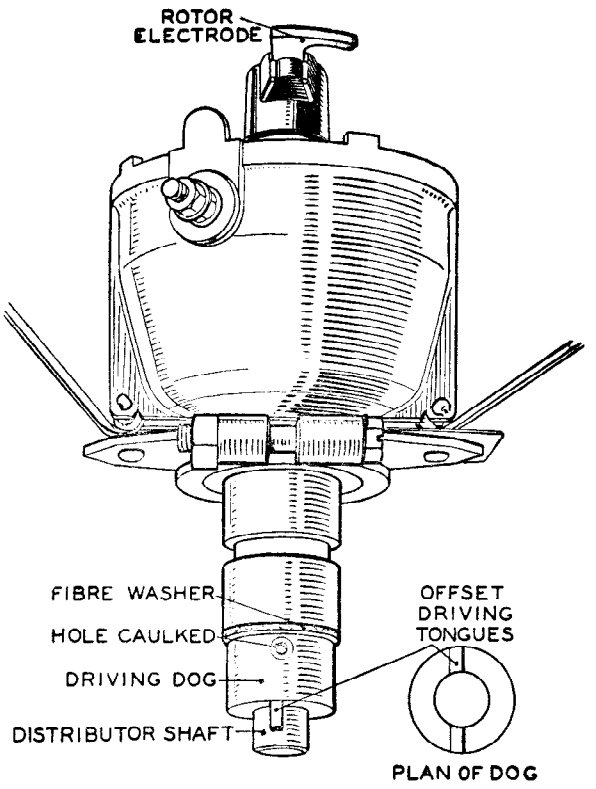

Fig. 1.

DRIVING DOGS

Fig. 1. shows a correctly pinned driving dog. Note carefully the order of assembly and the following relationships:

(*a*) The driving tongues are in line with the rotor arm. *

(*b*) The driving tongues are offset with respect to the centre line of the shaft and, when viewed as shown in Fig. 1., lie to the left of this line.

* Except for a very small number of applications where installational difficulties have necessitated departure from standard practice.

P.T.O.

Fig. 2. shows the method of drilling the shaft, using the hole in the driving dog as a guide.

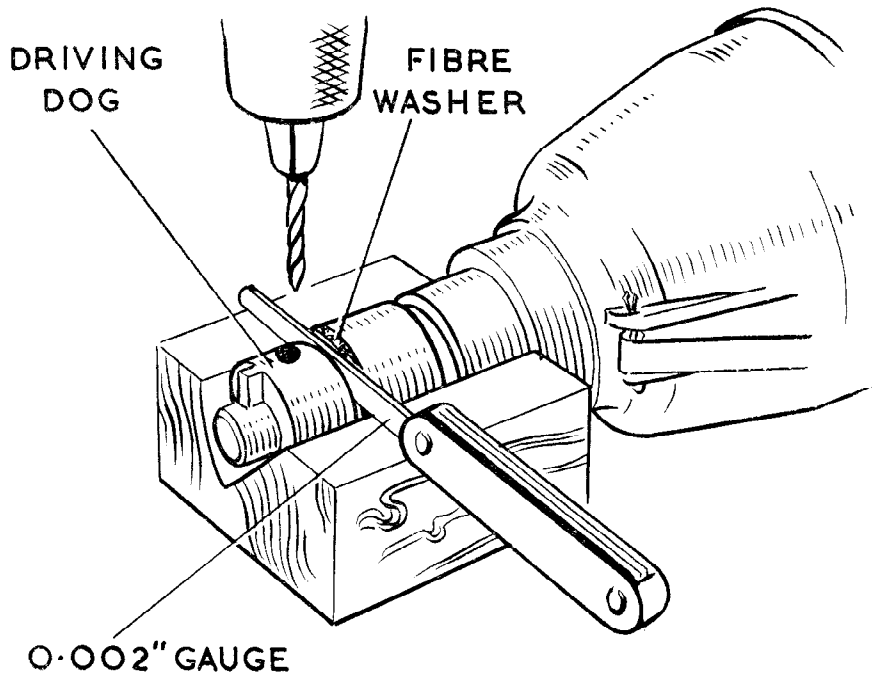

Fig. 2.

If the dog has been drilled to take a plain $\frac{1}{8}$" diameter pin (Part No. 404314), the hole through the shaft must be drilled 0.125"—0.126" diameter. If the dog has been drilled to take a plain $\frac{3}{16}$" diameter pin (Part No. 421197), the hole through the shaft must be drilled 0.1875"—0.1885" diameter.

The shaft must be free to rotate with end-play not exceeding 0.006".

Before drilling, ensure that the relationships referred to overleaf are obtained and, with distributors having fibre thrust washers, insert a 0.002" gauge as a temporary spacer between driving dog and fibre washer. *

Whilst drilling, press the shaft in from the action-plate end and thus keep the 0.002" spacer gauge hard against the fibre washer and driving dog.

After drilling, fit the pin and remove the spacer gauge. Caulk over the holes to secure the pin. The driving dog must be a tight fit on the shaft .

DRIVING GEARS

A driving gear is fitted in a similar manner, except that the angular position of the gear in relation to the rotor electrode is immaterial.

* BRASS THRUST WASHERS

The spacer gauge method illustrated above must not be used if the thrust washer is of brass instead of fibre. The brass washer has three equidistant dimples on one side, with three corresponding pips on the other. The washer and driving dog should be assembled to the shaft with the pips against the dog. After drilling, pinning and caulking, the shaft assembly should be end tight but, using a hide mallet, a sharp tap against the end of the shaft will flatten the pips and permit free rotation of the assembly.