Crankcase Aligning Jig

Fig. 304

Sometimes a main bearing knock or excessive motor vibration can be traced directly to a bent or sprung crankcase.

A crankcase which is sprung invariably throws the transmission shaft out of alignment and as the transmission shaft is firmly bolted to the flange of the crankshaft it is in reality an extension of that shaft, consequently any misalignment is bound to affect the operation of the motor.

Fig. 305

Fig. 306

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Before installing a crankcase always check it for alignment. The operation requires but a few moments and is excellent insurance against one cause of motor vibration and main bearing knocks.

A crankcase aligning jig (see Fig. 304) provides a quick and accurate method of checking the crankcase. (Before checking the case it should be thoroughly cleaned, making sure to remove any traces of old gaskets, etc., which may be sticking to the flanges.) The crankcase is checked by placing it on the alignment jig, inserting the ten locating studs in the jig through corresponding bolt holes in the flange of the case. The locating plugs are next inserted through each end of the crankcase into the jig (see Figs. 305 and 306) and the locating pins inserted through both crankcase arms (see Fig. 307). If the alignment of the crankcase is O.K., it will rest evenly on the jig at all points and the locating plugs can be freely inserted into the fixture. If the case does not rest squarely on the jig or if difficulty is experienced in installing the locating plugs, the crankcase is sprung and it will be necessary to straighten it. This is done by striking the high points with a hammer (see Fig. 307) until the crankcase rests squarely on the jig and the locating plugs can be freely inserted into the fixture.

Occasionally a crankcase has been sprung so that it has a tendency to bow either in or out, and as a result difficulty is experienced in attempting to straighten it on the jig. This is due to the fact that when a crankcase is sprung in this manner, it is first necessary to bend it in the opposite direction to which it is sprung and then bring it back to normal from that side in order to prevent it springing out of line again. This, of course, cannot be done on the aligning jig, as the level surface of the fixture prevents bending it below that point.

In an instance of this kind, possibly the simplest method is to straighten the case on an arbor press. This can be done by positioning the crankcase on the press and pressing out
the bowed or raised point; a little at a time, until the crankcase is drawn into line and checks accurately when tested on the aligning jig.

Once in a while a crankcase has been sprung so that the sides of the case where the crankcase arms are attached have slightly spread. This condition can be remedied by placing the case in an arbor press and pressing the sides together a little at a time until the case checks accurately on the aligning jig.

Dealers interested in the purchase of this equipment can obtain full information regarding prices, etc., from the nearest Ford Branch.

Fleet Owner Parts Discount Not Restricted By Volume Purchased

Although our policy in respect to discount applying to Fleet Owners on parts purchases has been clearly defined, complaints are occasionally received to the effect that certain dealers withhold discount providing the purchase does not exceed $1.00. While the amount involved is small, it nevertheless is an element of dissatisfaction to the Fleet Owner.

So let it be definitely understood that the Fleet Owner's discount applies regardless as to whether the purchase amounts to 10 cents or $10.00, the same principle applying on dealers' purchases from this Company.

IMPORTANT

Retain this Bulletin for Future Reference.