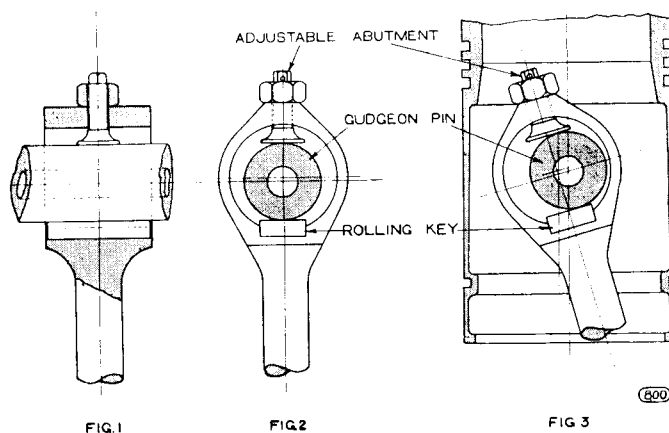


GENERAL DESCRIPTION (*continued*)

SINGLE CYLINDER SERIES

Connecting Rods (*continued*)



New Rolling Bearing for the small end of the Connecting Rod.

The results demonstrated beyond all doubt the superiority in all respects (except that of the cost of manufacture) of rolling as compared with rubbing in bearings like the gudgeon pin, where the motion is oscillatory, and we had decided to adopt roller bearings for the small end, when we were attracted by the New Rolling Bearings introduced some time ago by the makers of the well-known Kromhout Engine, which bearing is shown in Figs. 1, 2, and 3; this, by reason of its excellent design, simplicity and fewness of parts. The results of the prolonged and severe endurance tests made at our works on T engines fitted with these bearings were so eminently satisfactory, in every respect, that we have for some time past adopted them as our standard small end bearings in our larger 2-cycle engines, and are gradually adopting them for the smaller engines. This, of course, by arrangement with the Patentees from whom we hold a Licence to manufacture.

The new Rolling Bearing will be sufficiently well understood from the accompanying illustration, Figs. 1, 2, and 3. As will be seen, it consists of three extremely simple parts: (1) The gudgeon pin which, itself, forms one of the rolling elements; (2) a key or slab housed in the connecting rod; and (3) an adjustable abutment on the upper side of the gudgeon pin, which abutment, however, never comes into contact with the gudgeon pin when the engine is at work. The gudgeon pin is fixed in the piston so that, as the rod oscillates, the key or slab simply rolls (without rubbing) round the fixed gudgeon pin. At a first glance at the illustration, it might appear