

A7 Con-rods – The truth

Readers with an excellent memory, will recall that the January 2014 Newsletter contained a photo showing how A7 con-rods can be simply checked for bending (fore and aft) or twist, by passing a



length of 0.500" diameter ground Silver Steel through all four little ends with the rods firmly attached to the crankshaft. For new members and those with an imperfect memory, we have a similar photo here on the left.

The rod should be a firm sliding/twisting fit without any binding or loose play.

Some time ago, our Technical Advisor (Eddie the Professor) acquired a proper tool for checking the truth of con-rods and it is shown in the photo on the right, being used to check the rods for an engine that I am currently building. This delightful bench mounted machine is beautifully made of cast iron and reassuringly heavy - it would make a brilliant household ornament! The design is based on a precision expanding mandrel holding the big-end bore, whilst a rocking stirrup is brought into contact with an improvised gudgeon pin either side of the littleend, so that a pointer accurately registers the pin's position over a fine scale. The rod being examined is mounted as described and the pointer position noted. The rod is then reversed and if the pointer returns to the same place, then the bores of the big and little ends are truly parallel with one another.



Eddie assures me that slightly bent rods can be straightened satisfactorily. Very slight adjustments by cold twisting or bending are considered permissible. Usefully, the Dorset A7 Club website Technical Pages show how rods can be straightened using a vice as a press.

The good news is that my A7 rods were found to be true. Thank you Eddie Bob G