

TECH TIP

04 Crankshaft Assembly

1 - MEASUREMENTS AND TOLERANCES

The following tips summarize crucial points to look at, when rebuilding a crankshaft.

Download the latest version of the respective engine repair manual on www.rotax-kart.com.

Read the instructions how to rebuild a crankshaft carefully. Make yourself familiar with all safety instructions and make sure that all measurements are according to the specifications stated in the repair manual for the best durability of our products.

Please note: The repair manual is revised every 2nd year without commitment to advise modifications.

One important measurement when pressing the crankshaft together is the distance between both crank webs (halves) specified $49,0 \pm 0,05$ mm (**CS07**) in the repair manual:

Description	Code	New dimension	Wear limit
Distance of crank webs	CS07	48.95 - 49.05 mm	49.05 mm

The crank web distance is a crucial factor for the durability of the crankshaft:

- › **Measurement CS07 bigger than specified**
If the con rod axial play is bigger than specified, the con rod will travel (left and right) which could eventually cause the con rod to break.
- › **Measurement CS07 smaller than specified**
If the con rod axial play is smaller than specified, excessive friction will occur and create heat within the big end bearing. This may lead to a failure of the big end bearing.

