



# Bearing Flange Growth for German Applications

To allow the crankshaft thrust faces to be re-machined whilst still maintaining the recommended endfloat, the flanged pair of bearings are often supplied with an increase in the overall length. This increase is termed the "flange growth".

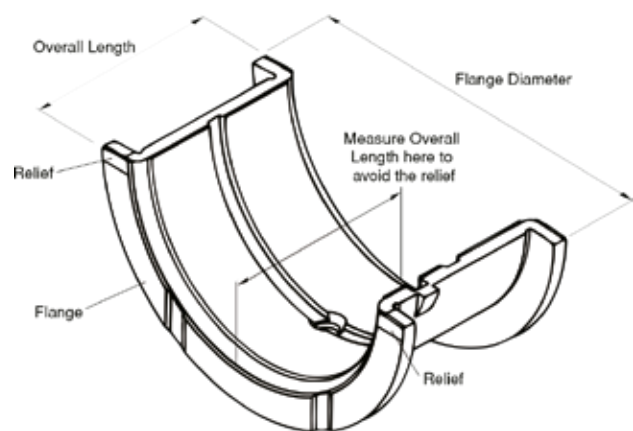
No consistency exists in the world bearing market regarding the amount of flange growth, or at what undersize the flange growth is added. Many set references have variable and differing flange growths. To address the problems created by this situation the flange growth on some main bearing set references has been revised in line with market demand.

## PLEASE NOTE

The max length of the bearing is shown in table form alongside the main bearing reference in the AE bearing catalogue. However, it is recommended that the main bearing set is obtained before any machining is carried out. The length of the flanged main bearing should then be measured. The measurement should be taken across the flanged thrust faces, see illustration, and at the crown of the bearing as shown.

The length of the bearing obtained by measuring across the flanges should then be added to the required endfloat. This final figure is the dimension required between the crankshaft thrust faces when the crankshaft is reground.

Distance required between the crankshaft thrust faces = The actual bearing length plus the desired crankshaft endfloat



When the manufacturers' recommended crankshaft endfloat specification is not available the following may be used as a general guide.

### Crankshaft main journal diameter

2.00" – 2.75" (50mm – 70mm)  
2.75" – 3.50" (70mm – 90mm)  
3.50" and over (90mm+)

### Endfloat

0.004" – 0.006" (0.10mm – 0.15mm)  
0.006" – 0.008" (0.15mm – 0.20mm)  
0.008" – 0.010" (0.20mm – 0.25mm)