

Self lubricating bushes

Assembly instructions

Using a mandrel

(Hardened carbon steel, polished finish, surface hardness 60RC)

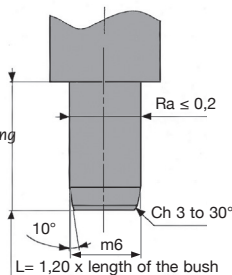
tolerance \varnothing **m6**

Fit the bush using a press ensuring that the correct diameter mandrel is used so that:

- the bushing is inserted correctly so as to ensure correct seating
- the tolerances of the bore are still correct after fitting

Inserting force

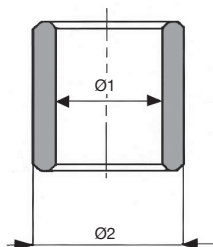
- Values are given assuming the tolerances are as follows ; mandrel **m6**, bore **H7** with $Ra \leq 3,2$ and considered to be rigid* : **100daN/cm** (equivalent surface area at \varnothing cm from exterior of bushing)



*What do we mean by rigid? It is a bore or hole in steel (or possibly cast iron) where the wall thickness is at least 3 times the diameter of the bushing

Bush before assembly

- $\varnothing 1$ interior **F7/G7**
- $\varnothing 2$ outside **r7/s7**



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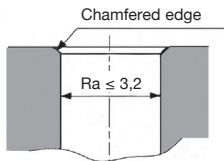
Technical information

Steel housing

(in rigid material)

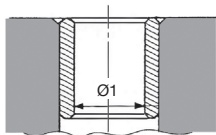
Tolerance \varnothing H7

- The tightness between the bush and the hole and the final tolerances of the bore of the bush have been calculated for a rigid steel housing.
- For all other types of support (non rigid or other materials), the tightness may vary and practical tests should be carried out to confirm the bore tolerances.



Bush after press fitting

- \varnothing interior - \varnothing 1 bush H7



Shaft to be used

- Mechanical properties of steel depending on the type of bush
- For a **sintered bronze** bush
- Steel with a minimum hardness of 80 kg/mm²
- Ra \leq 0.6

tolerance \varnothing f7

- Where bushes are fitted without additional support (Overmolding or gluing), use an h7 toleranced shaft rather than f7.

Operating clearances

- Running fit H7/f7
- Assembly instructions should be followed to ensure the correct operation of the self lubricating bush (lubricating, wear, rubbing).

