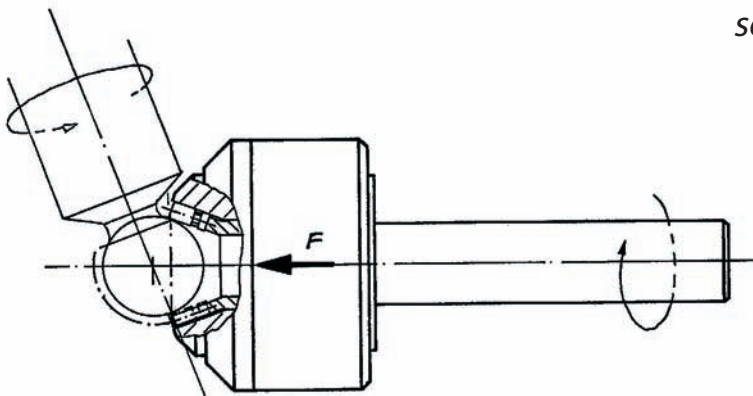


Type RKAK Roller Burnishing Tool

Application: Spherical surfaces



RKAK tool in operation



How the RKAK tool works

How it works

During the roller burnishing process, the rollers are pressed against the spherical workpiece surface. This movement applies the required burnishing force (F), which is generated by the springs. The workpiece's rotational speed determines the feed rate.

Features

- Can be applied on almost all machine tools with rotating components
- All ductile metals up to a hardness of 45 HRC and a tensile strength of 1400 N/mm² can be treated
- On pre-machined surfaces, a surface quality of $R_z < 1 \mu\text{m}$ ($R_a \leq 0.2 \mu\text{m}$) can be achieved in one pass

Advantages

- Can be applied on CNC-controlled and conventional lathes
- Complete processing in one setting
 - Short work cycle
 - Extraneous set-up and auxiliary processing time eliminated
 - No dust or grinding residue
 - Minimal lubrication required (Oil or emulsion)

Operating parameters

- Circumferential speed: 100 m/min.
- Feed rate: 0.05 – 0.20 mm per roller