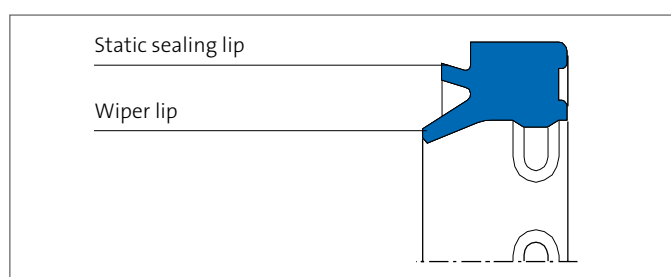


MERKEL WIPER PU 5



Merkel Wiper PU 5 with additional static sealing lip and bearing segments. Sealing edge of wiper lip slightly rounded.



Application

Single-acting wiper, used also in standardized housings according to ISO 6195 Type A. Typical applications are earth moving equipment, agricultural machinery, injection molding machines, telescopic cylinders, presses, industrial vehicles, cranes, loading platforms, support cylinders in the mining industry.

Material

Material	Designation	Color
Polyurethane	95 AU V149	dark blue

VALUE TO THE CUSTOMER

- Additional static sealing lip prevents ingress of dirt and water spray.
- Wiper lip with slightly rounded sealing edge reliably wipes dirt away and leaves a residual oil film on the retracting rod; friction behaviour and service life are improved.
- The support on the wiper heel prevents twisting in the groove as well as pressure build-up between wiper and seal.



FEATURES AND BENEFITS

Operating conditions

Werkstoff	95 AU V149
Hydraulic oils, HL, HLP	−30 ... +110 °C
HFA fluids	+5 ... +50 °C
HFB fluids	+5 ... +50 °C
HFC fluids	−30 ... +40 °C
HFD fluids	–
Water	+5 ... +50 °C
HETG (rape-seed oil)	−30 ... +60 °C
HEES (synth. ester)	−30 ... +80 °C
HEPG (glycol)	−30 ... +50 °C
Mineral greases	−30 ... +110 °C
Sliding speed	2 m/s

Surface finish

Peak-to-valley heights	R_a	R_{max}
Sliding surface	*	*
Groove base	$\leq 1,6 \mu m$	$\leq 6,3 \mu m$
Groove sides	$\leq 3,0 \mu m$	$\leq 15,0 \mu m$

Material content $M_r > 50\%$ to max. 90 %, with cut depth $c = R_z/2$ and reference line $C_{ref} = 0\%$.

* Surface roughness of the sliding surface to suit the sealing component used.

Tolerance recommendation

Nominal- $\varnothing d$ [mm]	D	D_1
16 ... 200	H11	H11

The tolerance for the $\varnothing d$ is defined by the buffer seal.

Installation chamfers

Length and angle must be executed to suit the rod seal being used.

Installation & assembly

Careful installation is a prerequisite for the correct function of the wiper PU 5. Generally, wipers can be quickly and easily fitted by deforming into a kidney shape. Please note the general remarks on the installation of hydraulic seals in our Technical Manual assembling hydraulic seals.

Design notes

Please note the general design remarks in our Technical Manual.



FEATURES AND BENEFITS

Installation diagram

