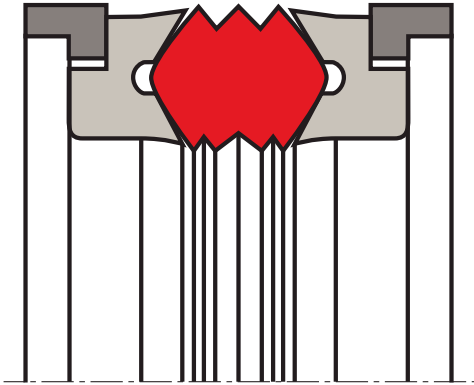


## piston seal K62

## seal spec



### description

the piston seal K62 range has been designed to meet the needs of hydraulic equipments operating at high pressures and subjected to severe loading and vibration conditions.

the main sealing element is manufactured in a highly compression set resistant nitrile. the most important quality of this element is the design of the multiple sealing lips for maximum sealing efficiency and end face configuration, which ensures that the K62 can tolerate vibrations and severe misalignment.

the two support rings are made in cotton fabric reinforced nitrile elastomer; the "U" shape is energised when pressure is applied.

the last elements are the two guide rings manufactured in acetal resin which have also the function of anti-extrusion rings.

### application



not bolded symbols; please consult our technical for application limitations

### category of profile

molded/standard/trade product or machined with minor design change.

### double acting

the K62 seal is designed for use as a piston seal.

### area of application: hydraulics

- earth-moving machines
- excavators
- lift platforms

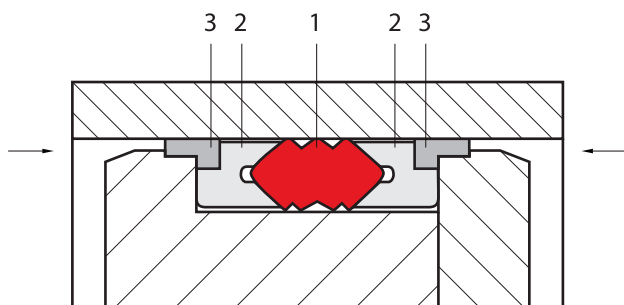
media: hydraulic fluids mineral oil-based hydraulic fluids, water and water/glycol emulsions

### advantages

- effective sealing during vibration and shock loading.
- high sealing efficiency.
- extrusion resistance at high pressure.

### design

groove type: open



- 1) sealing element
- 2) support ring
- 3) guide ring

**operating parameters & material**

material			temperature	max. surface speed	max. pressure <sup>1</sup>
sealing element	support ring	guide ring			
s-mart NBR	catton reinforced NBR - NBR (fabric)	POM <sup>2</sup>	-40°C ... + 130°C	0,5 m/s	700 bar (70 MPa)
s-mart NBR	NBR-impregn. fabric	POM <sup>2</sup>	-30°C ... + 100°C	0,5 m/s	700 bar (70 MPa)

*the stated operation conditions represent general indications. it is recommended not to use all maximum values simultaneously.*

*surface speed limits apply only to the presence of adequate lubrication film.*

<sup>1</sup> pressure ratings are dependent on the size of the extrusion gap.

<sup>2</sup> POM up to ø260 mm, PA above ø260 mm.

**surface quality**

surface roughness	material	Rtmax [µm]	Rz DIN [µm]	Ra [µm]
mating Surface	PTFE + .....	0.63 - 2.50	0.40 - 1.60	0.05 - 0.20
	PU & Rubber	1.00 - 4.00	0.63 - 2.50	0.10 - 0.40
groove surface		< 16	< 10.0	< 1.6

**gap dimension**

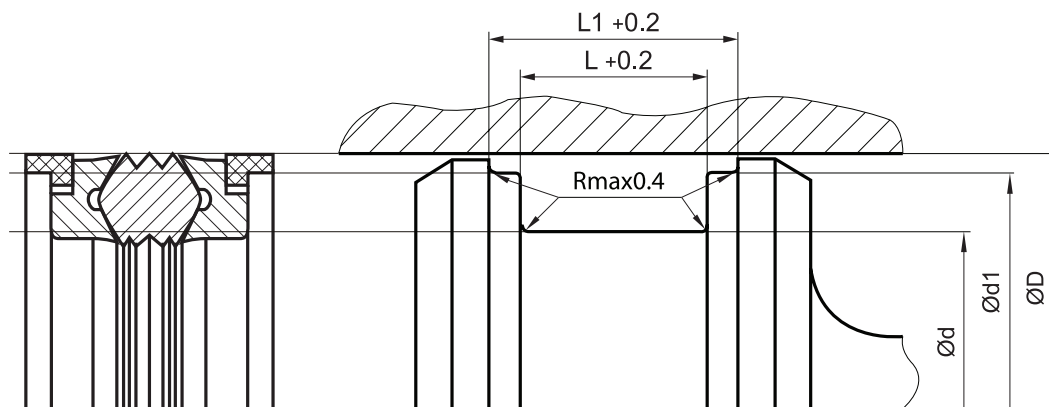
the largest gap dimension occurring on the non-pressurised side of the seal in operation is of vital importance for the function of the seal.

**tolerance recommendation**

seal housing tolerances	
Ød	h11
ØD	H11

**seal & housing recommendations**

*please note that we are able to produce those profiles to your specific need or any non standard housing. for detail measurements, please see seal-mart catalog...*



*don't hesitate to contact our technical department for further information or for special requirements (temperature, speed etc.), so that suitable materials and/or designs can be recommended.*