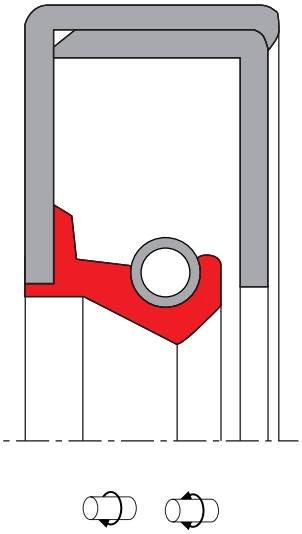
SEAL SPEC
R64



description

R64 is reinforced metal cased radial lip seals. the supplementary metal inner ring provides a superior stiffness. this type is not recommended for use in heavy polluted environments. as the static sealing between housing and metallic shell is limited, low viscosity media can "creep". better performance can be achieved with epoxy based resin O.D. coating. this special treatment is on request.

+ superior radial stiffness, especially for very large diameters
+ very good fitting stability avoiding pop-out of the seal
+ modern lip design provides low radial forces
+ cost effective for expensive elastomer materials
+ suitable for use in combination with axial seal (v-ring)

category of profile

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

single acting rotary seal

the R64 seal is designed for use as a rotary seal

area of application

sealing of rotating machine elements such as shafts, hubs and axles
- transmission systems (e.g. gearboxes)
- pump
- electrical motors
- machinery industry (e.g. tool machines)
- heavy engineering applications (e.g. mills in steel industry)

function

the R64/R65 is a single action rotary shaft seal for rotating or pivoting shafts with optional protective lip sealing action (R65) on the side facing away from the medium, against dirt accumulation from the outside. the additional metal insert gives the rotary shaft seal more rigidty and the metal outer casing guarantees tight and accurate fitting. the R64/R65 model has limited sealing action with thin fluid or gaseous media and with split housings. to guarantee a high degee of static sealing on the outer surface, better surface treatment of the housing bore is required or an additional coat of paint should be applied to the outer surface.

SEAL SPEC
R64

operating parameter & material

material			temperature	max surface speed	max pressure
sealing element[1]	metal insert[2]	spring[2]			
NBR (70, 72, 75 shore A)	mild steel DIN 1624 or non-alloy steel DIN EN 10139	mild steel DIN 17223 or non-alloy steel DIN EN 10270-1	-40 °C ... +100 °C	30 m/s	0,5 bar

[1] special grades and other materials (ACM, EACM, EPDM, HNBR, MVQ) on request

[2] metal insert, and spring as well, can be supplied in different materials on request.

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.

surface quality

surface roughness	Rtmax (µm)	Rz (µm)	Ra (µm)
shaft	≤6,3	≤1,0-5,0	≤0,2-0,8
bottom of groove	≤25	≤10-25	≤1,6-6,3

tolerance recommendation

seal housing tolerance	
Ød	f8/h11
ØD	H8

fitting & installation

suitable tool should be used for installation. it is recommended that the installation housing is designed to provide the rotary shaft seal with axial support.

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...