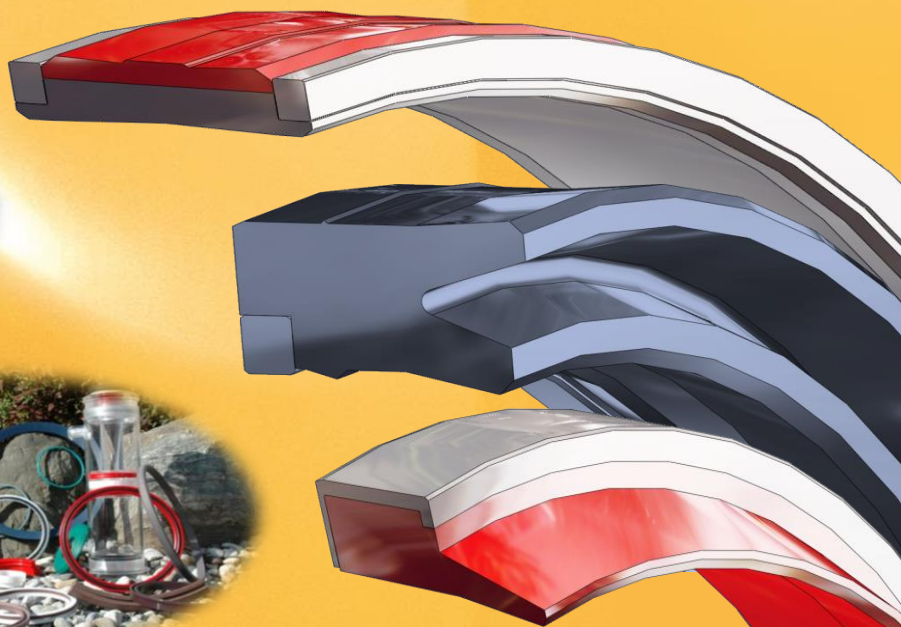
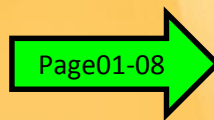
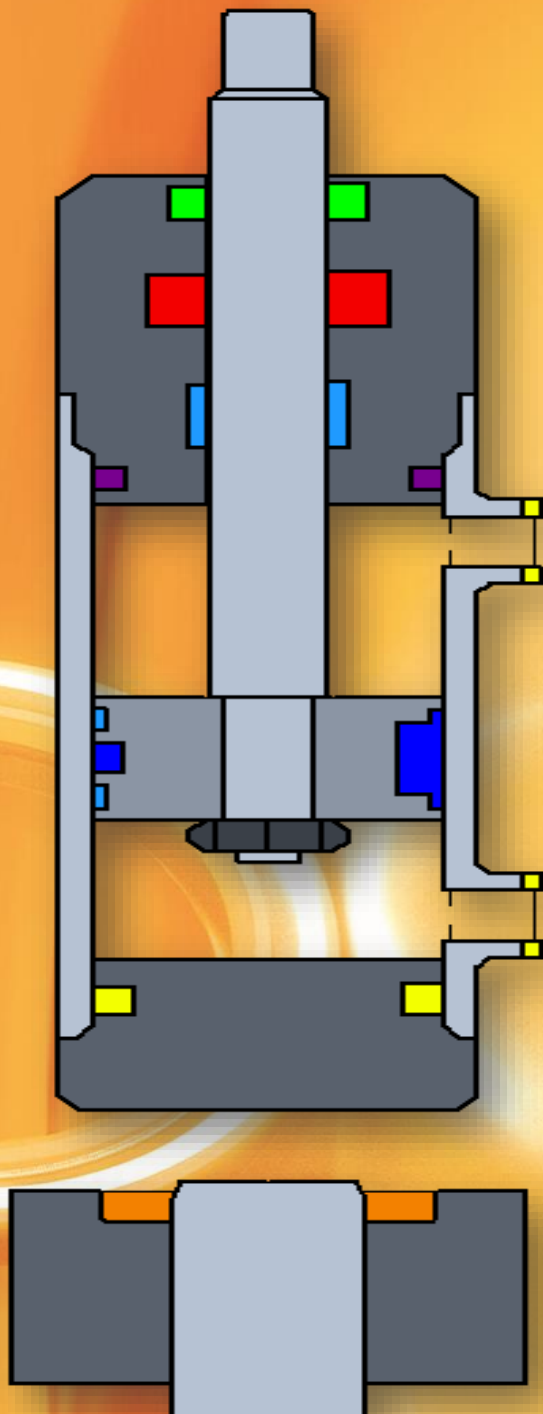


PU1TEC

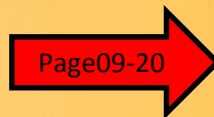
SEALING SYSTEMS CATALOG



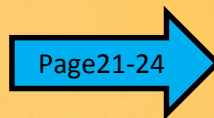
USUAL TYPES OF SEALS



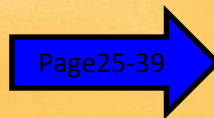
Wipers



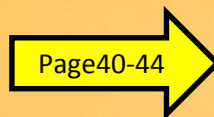
Rod Seals



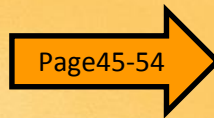
Guiderings



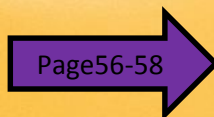
Piston Seals



Static Gaskets

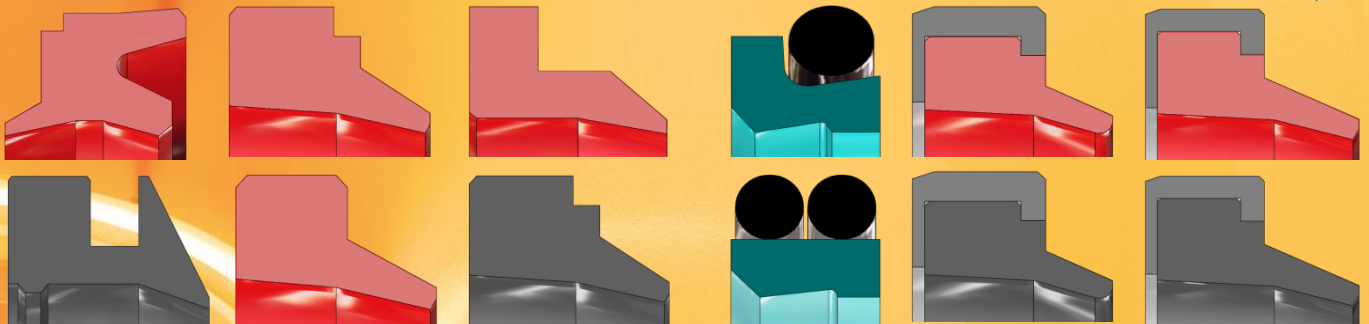
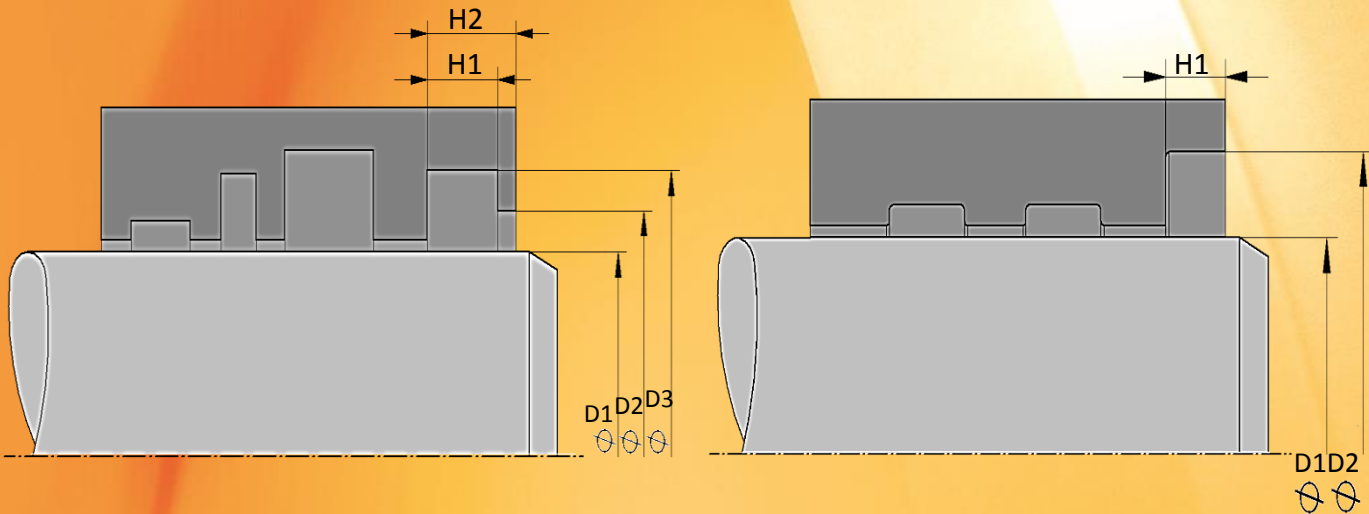


Rotary Seals



Backrings

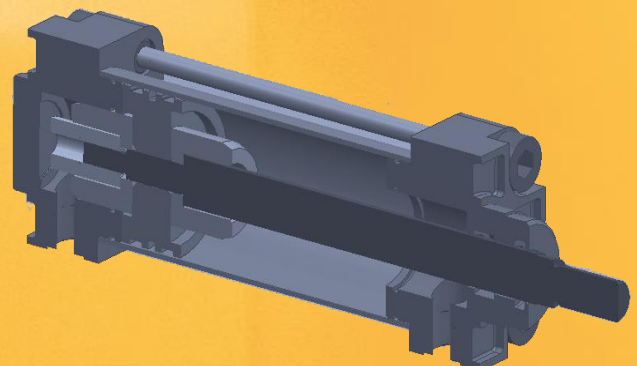
WIPERS

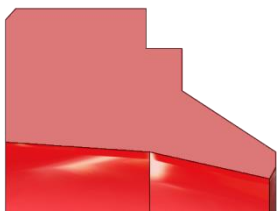


Scrapers or wipers are installed in the sealing configurations of hydraulic cylinders to scrape dirt, external particles, chips or moisture from the piston rods as they retract into the system. A hydraulic wiper or scraper prevents contamination of the hydraulic medium that could damage wear rings, seals and other components.

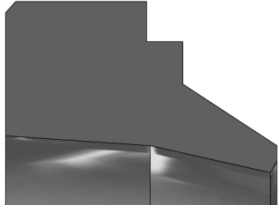
The selection of the shape and form of the wiper depends from several factors:

- Function as a wiper only or as a wiper/seal
- Dirtiness load in the external area of the system
- Sliding speed
- Space requirement in the design area
- Open or closed installation space
- Temperature range and/or medium (important for selection of material)

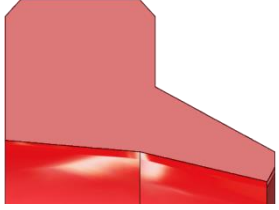
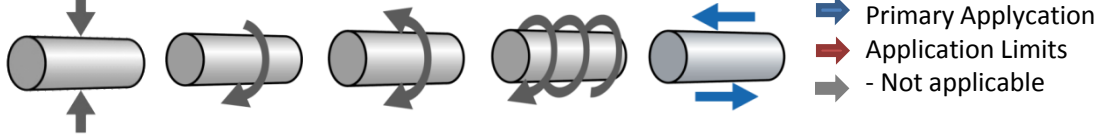




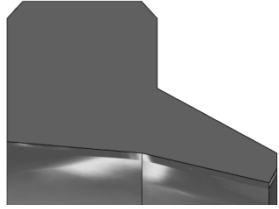
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.4m/s	-	HPU 94°	
-20°C	115°C	max.0.4m/s	-	HPU 55°D	
-20°C	110°C	max.0.5m/s	-	SL-PU 94°	
-50°C	110°C	max.0.4m/s	-	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,5m/s	-	NBR 85°	
-20°C	150°C	max.0,5m/s	-	H-NBR 85°	
-20°C	220°C	max.0,5m/s	-	FPM 82°	
-45°C	130°C	max.0,5m/s	-	EPDM 85°	
-60°C	200°C	max.0,3m/s	-	MVQ 85°	



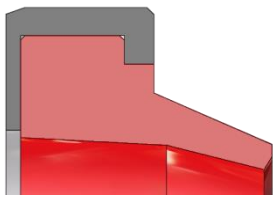
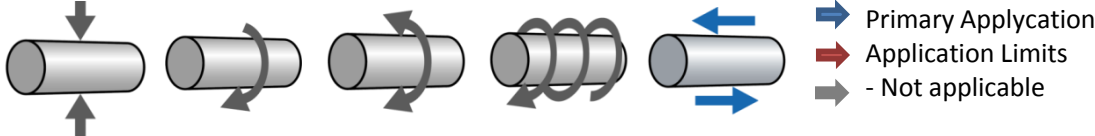
DA101



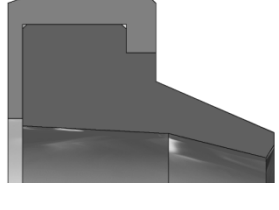
min Temp	max Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.5m/s	-	HPU 94°	
-20°C	115°C	max.0.5m/s	-	HPU 55°D	
-20°C	110°C	max.0.5m/s	-	SL-PU 94°	
-50°C	110°C	max.0.5m/s	-	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,5m/s	-	NBR 85°	
-20°C	150°C	max.0,5m/s	-	H-NBR 85°	
-20°C	220°C	max.0,5m/s	-	FPM 82°	
-45°C	130°C	max.0,5m/s	-	EPDM 85°	
-60°C	200°C	max.0,4m/s	-	MVQ 85°	



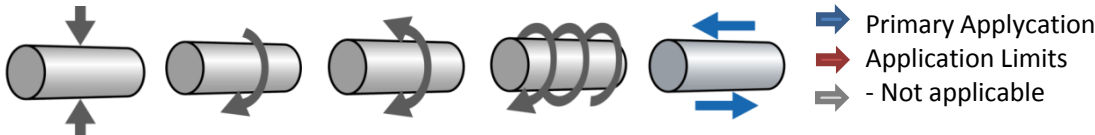
DA102

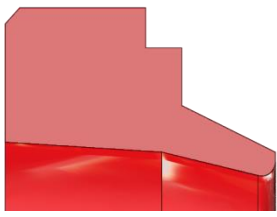


min.Temp	max.Temp	max. Speed	max. Pressure	Material / Case	
-20°C	115°C	max.0.5m/s	-	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.5m/s	-	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.5m/s	-	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.5m/s	-	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Case	
-30°C	110°C	max.0,5m/s	-	NBR 85°	POM/PTFE/PEEK
-20°C	150°C	max.0,5m/s	-	H-NBR 85°	POM/PTFE/PEEK
-20°C	220°C	max.0,5m/s	-	FPM 82°	POM/PTFE/PEEK
-45°C	130°C	max.0,5m/s	-	EPDM 85°	POM/PTFE/PEEK
-60°C	200°C	max.0,4m/s	-	MVQ 85°	POM/PTFE/PEEK

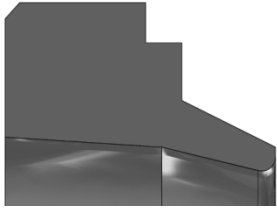


DA103

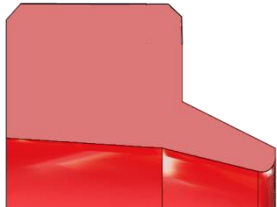
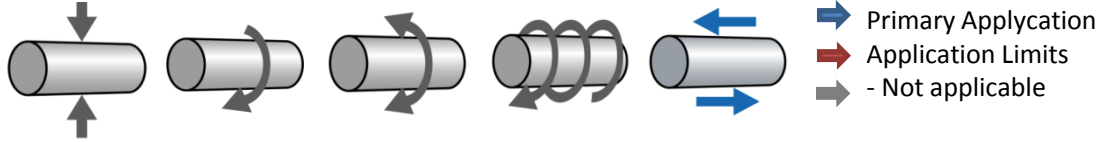




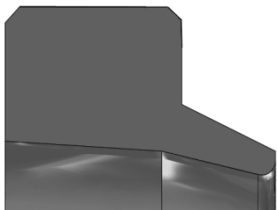
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.4m/s	-	HPU 94°	
-20°C	115°C	max.0.4m/s	-	HPU 55°D	
-20°C	110°C	max.0.5m/s	-	SL-PU 94°	
-50°C	110°C	max.0.4m/s	-	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,5m/s	-	NBR 85°	
-20°C	150°C	max.0,5m/s	-	H-NBR 85°	
-20°C	220°C	max.0,5m/s	-	FPM 82°	
-45°C	130°C	max.0,5m/s	-	EPDM 85°	
-60°C	200°C	max.0,3m/s	-	MVQ 85°	



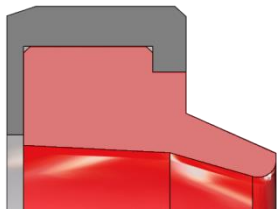
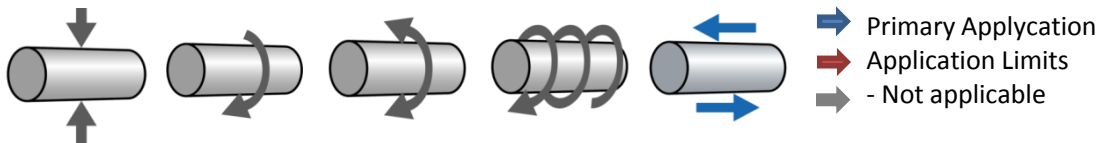
DA104-PN



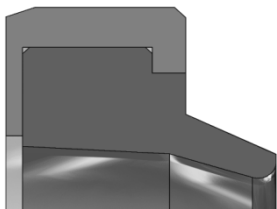
min Temp	max Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.5m/s	-	HPU 94°	
-20°C	115°C	max.0.5m/s	-	HPU 55°D	
-20°C	110°C	max.0.5m/s	-	SL-PU 94°	
-50°C	110°C	max.0.5m/s	-	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,5m/s	-	NBR 85°	
-20°C	150°C	max.0,5m/s	-	H-NBR 85°	
-20°C	220°C	max.0,5m/s	-	FPM 82°	
-45°C	130°C	max.0,5m/s	-	EPDM 85°	
-60°C	200°C	max.0,4m/s	-	MVQ 85°	



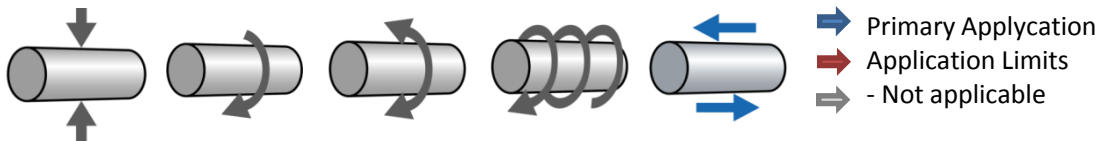
DA105-PN

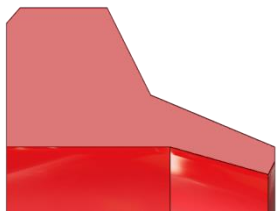


min.Temp	max.Temp	max. Speed	max. Pressure	Material	Case
-20°C	115°C	max.0.5m/s	max.500bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.5m/s	max.500bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.7m/s	max.500bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.5m/s	max.500bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material	Case
-30°C	110°C	max.0,5m/s	max.200bar	NBR 85°	POM/PTFE/PEEK
-20°C	150°C	max.0,5m/s	max.200bar	H-NBR 85°	POM/PTFE/PEEK
-20°C	220°C	max.0,5m/s	max.200bar	FPM 82°	POM/PTFE/PEEK
-45°C	130°C	max.0,5m/s	max.200bar	EPDM 85°	POM/PTFE/PEEK
-60°C	200°C	max.0,4m/s	max.200bar	MVQ 85°	POM/PTFE/PEEK

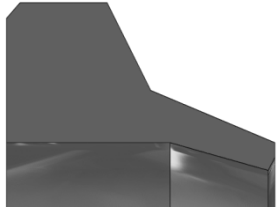


DA106-PN

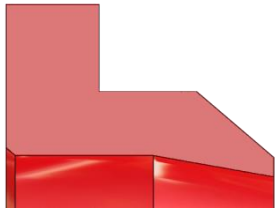
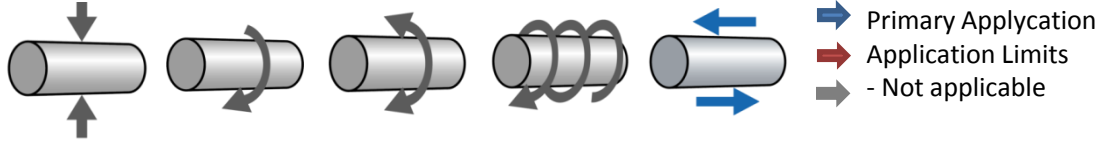




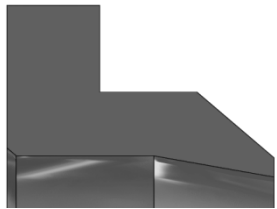
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.4m/s	-	HPU 94°	
-20°C	115°C	max.0.4m/s	-	HPU 55°D	
-20°C	110°C	max.0.5m/s	-	SL-PU 94°	
-50°C	110°C	max.0.4m/s	-	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,5m/s	-	NBR 85°	
-20°C	150°C	max.0,5m/s	-	H-NBR 85°	
-20°C	220°C	max.0,5m/s	-	FPM 82°	
-45°C	130°C	max.0,5m/s	-	EPDM 85°	
-60°C	200°C	max.0,3m/s	-	MVQ 85°	



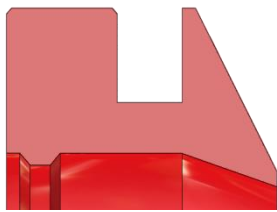
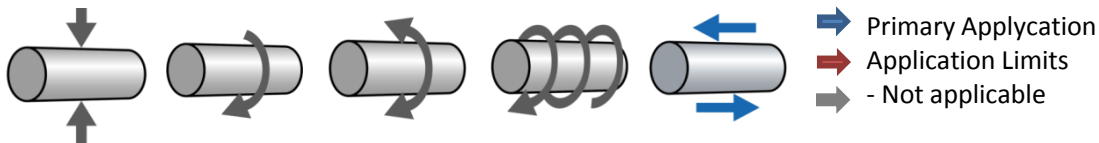
DA107



min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.4m/s	-	HPU 94°	
-20°C	115°C	max.0.4m/s	-	HPU 55°D	
-20°C	110°C	max.0.5m/s	-	SL-PU 94°	
-50°C	110°C	max.0.4m/s	-	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,5m/s	-	NBR 85°	
-20°C	150°C	max.0,5m/s	-	H-NBR 85°	
-20°C	220°C	max.0,5m/s	-	FPM 82°	
-45°C	130°C	max.0,5m/s	-	EPDM 85°	
-60°C	200°C	max.0,3m/s	-	MVQ 85°	



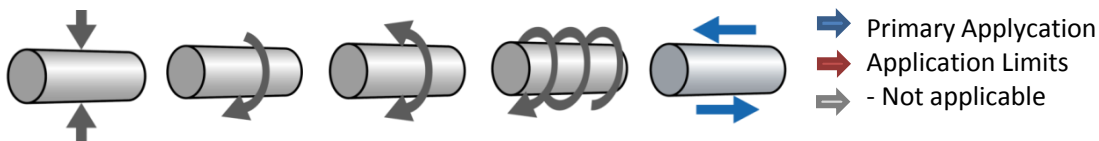
DA108

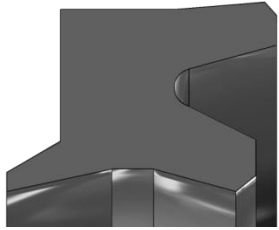
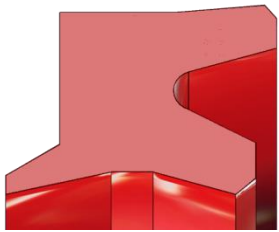


min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.5m/s	-	HPU 94°	
-20°C	115°C	max.0.5m/s	-	HPU 55°D	
-20°C	110°C	max.0.5m/s	-	SL-PU 94°	
-50°C	110°C	max.0.5m/s	-	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,5m/s	-	NBR 85°	
-20°C	150°C	max.0,5m/s	-	H-NBR 85°	
-20°C	220°C	max.0,5m/s	-	FPM 82°	
-45°C	130°C	max.0,5m/s	-	EPDM 85°	
-60°C	200°C	max.0,4m/s	-	MVQ 85°	



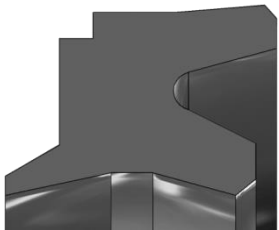
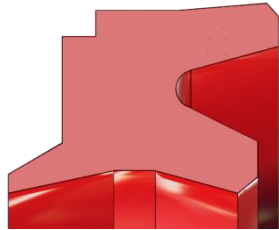
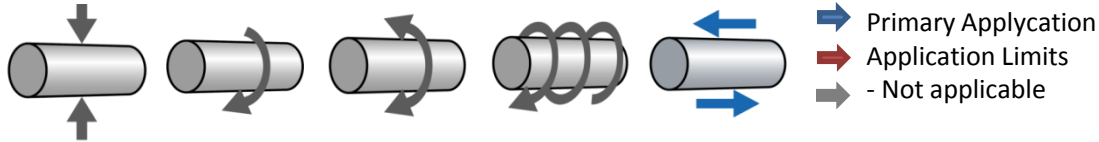
DA109





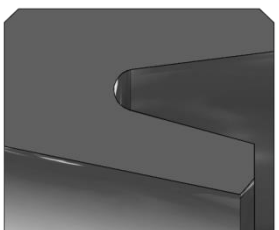
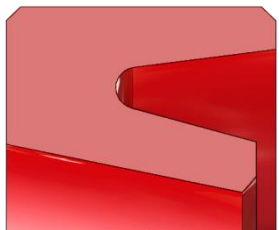
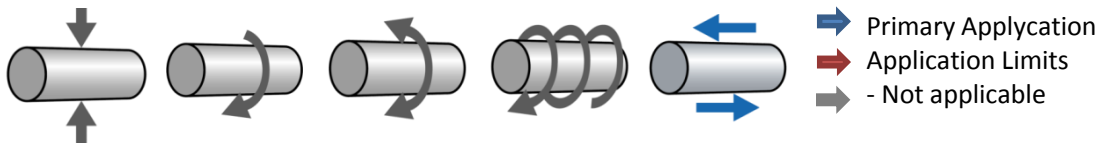
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.4m/s	-	HPU 94°	
-20°C	115°C	max.0.4m/s	-	HPU 55°D	
-20°C	110°C	max.0.5m/s	-	SL-PU 94°	
-50°C	110°C	max.0.4m/s	-	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,5m/s	-	NBR 85°	
-20°C	150°C	max.0,5m/s	-	H-NBR 85°	
-20°C	220°C	max.0,5m/s	-	FPM 82°	
-45°C	130°C	max.0,5m/s	-	EPDM 85°	
-60°C	200°C	max.0,3m/s	-	MVQ 85°	

DA211



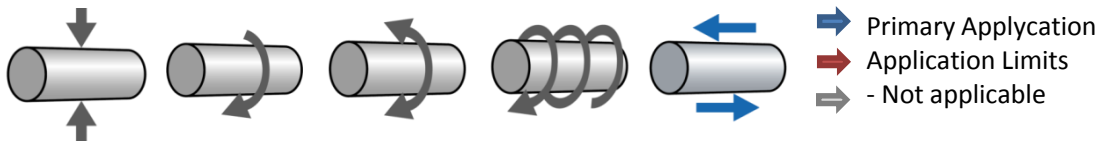
min Temp	max Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.5m/s	-	HPU 94°	
-20°C	115°C	max.0.5m/s	-	HPU 55°D	
-20°C	110°C	max.0.5m/s	-	SL-PU 94°	
-50°C	110°C	max.0.5m/s	-	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,5m/s	-	NBR 85°	
-20°C	150°C	max.0,5m/s	-	H-NBR 85°	
-20°C	220°C	max.0,5m/s	-	FPM 82°	
-45°C	130°C	max.0,5m/s	-	EPDM 85°	
-60°C	200°C	max.0,4m/s	-	MVQ 85°	

DA212



min Temp	max Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.5m/s	-	HPU 94°	
-20°C	115°C	max.0.5m/s	-	HPU 55°D	
-20°C	110°C	max.0.5m/s	-	SL-PU 94°	
-50°C	110°C	max.0.5m/s	-	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,5m/s	-	NBR 85°	
-20°C	150°C	max.0,5m/s	-	H-NBR 85°	
-20°C	220°C	max.0,5m/s	-	FPM 82°	
-45°C	130°C	max.0,5m/s	-	EPDM 85°	
-60°C	200°C	max.0,4m/s	-	MVQ 85°	

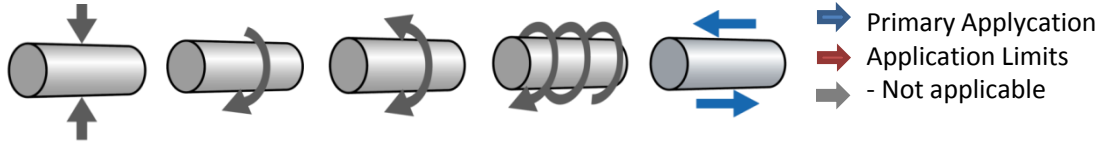
DA113





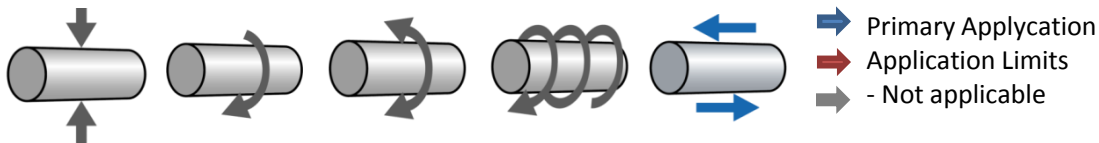
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-50°C	80°C	max.1.0m/s			POM
-40°C	80°C	max.1.0m/s			PA
-50°C	110°C	max.1.0m/s			PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material	

DA213



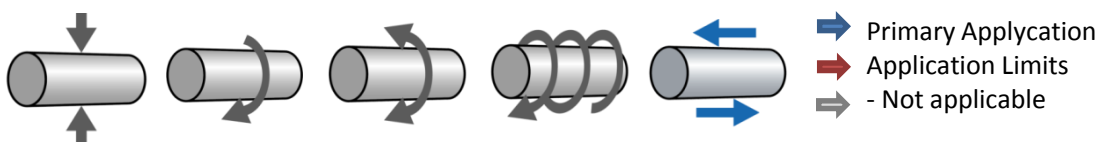
min Temp	max Temp	max. Speed	max. Pressure	Material	
-50°C	80°C	max.1.0m/s			POM
-40°C	80°C	max.1.0m/s			PA
-50°C	110°C	max.1.0m/s			PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material	

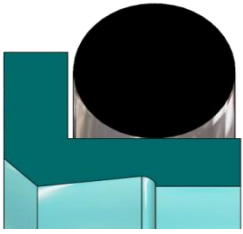
DA114



min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200°C	260°C	max.10m/s	-	PTFE pure	
-200°C	260°C	max.10m/s	-	PTFE 1glass	
-200°C	260°C	max.10m/s	-	PTFE 2 bronze	
-200°C	260°C	max.10m/s	-	PTFE carbone	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200°C	260°C	max.10m/s	-	PTFE D05 turq	
-200°C	260°C	max.10m/s	-	PTFE D05 glass	
-200°C	260°C	max.10m/s	-	PTFE graphite	
-200°C	260°C	max.10m/s	-	PTFE ekonol	
-200°C	260°C	max.10m/s	-	PTFE 25%glass	

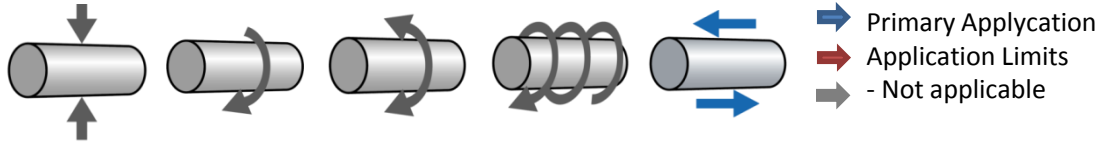
DA115





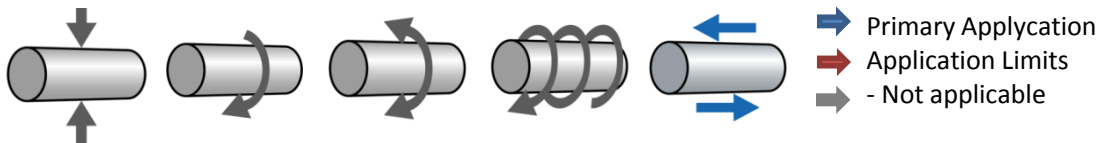
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200°C	260°C	max.10m/s	-	PTFE pure	
-200°C	260°C	max.10m/s	-	PTFE 1glass	
-200°C	260°C	max.10m/s	-	PTFE 2 bronze	
-200°C	260°C	max.10m/s	-	PTFE carbone	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200°C	260°C	max.10m/s	-	PTFE D05 turq	
-200°C	260°C	max.10m/s	-	PTFE D05 glass	
-200°C	260°C	max.10m/s	-	PTFE graphite	
-200°C	260°C	max.10m/s	-	PTFE ekonol	
-200°C	260°C	max.10m/s	-	PTFE 25%glass	

DA116

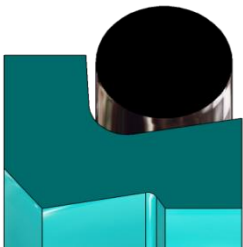


min Temp	max Temp	max. Speed	max. Pressure	Material	
-200°C	260°C	max.10m/s	-	PTFE pure	
-200°C	260°C	max.10m/s	-	PTFE 1glass	
-200°C	260°C	max.10m/s	-	PTFE 2 bronze	
-200°C	260°C	max.10m/s	-	PTFE carbone	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200°C	260°C	max.10m/s	-	PTFE D05 turq	
-200°C	260°C	max.10m/s	-	PTFE D05 glass	
-200°C	260°C	max.10m/s	-	PTFE graphite	
-200°C	260°C	max.10m/s	-	PTFE ekonol	
-200°C	260°C	max.10m/s	-	PTFE 25%glass	

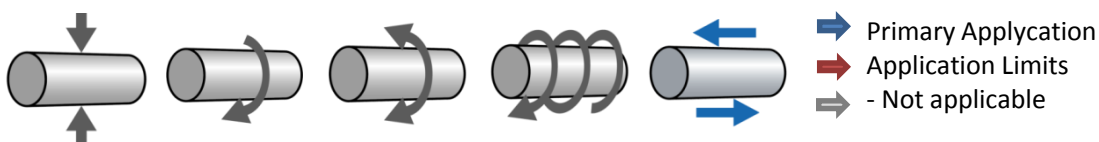
DA117

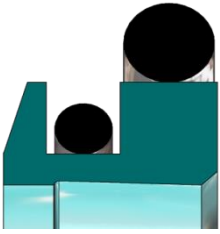


min Temp	max Temp	max. Speed	max. Pressure	Material	
-200°C	260°C	max.10m/s	-	PTFE pure	
-200°C	260°C	max.10m/s	-	PTFE 1glass	
-200°C	260°C	max.10m/s	-	PTFE 2 bronze	
-200°C	260°C	max.10m/s	-	PTFE carbone	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200°C	260°C	max.10m/s	-	PTFE D05 turq	
-200°C	260°C	max.10m/s	-	PTFE D05 glass	
-200°C	260°C	max.10m/s	-	PTFE graphite	
-200°C	260°C	max.10m/s	-	PTFE ekonol	
-200°C	260°C	max.10m/s	-	PTFE 25%glass	



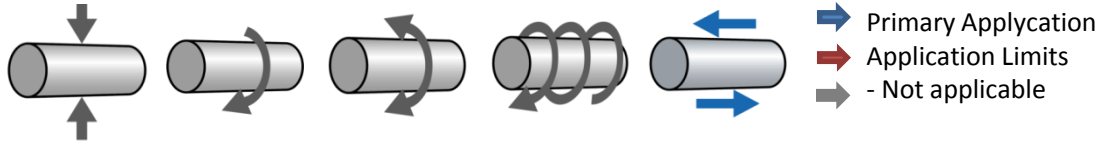
DA118



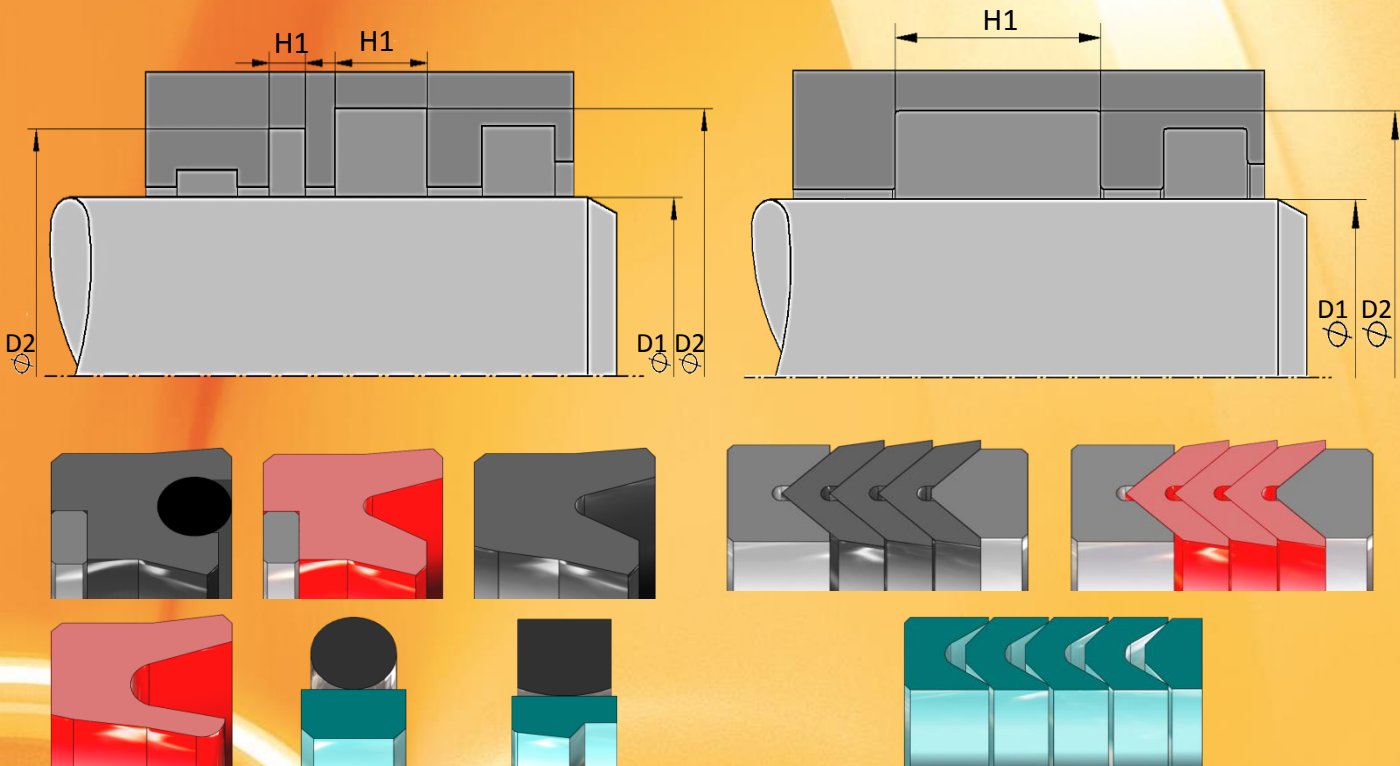


min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200°C	260°C	max.10m/s	-	PTFE pure	
-200°C	260°C	max.10m/s	-	PTFE 1glass	
-200°C	260°C	max.10m/s	-	PTFE 2 bronze	
-200°C	260°C	max.10m/s	-	PTFE carbone	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200°C	260°C	max.10m/s	-	PTFE D05 turq	
-200°C	260°C	max.10m/s	-	PTFE D05 glass	
-200°C	260°C	max.10m/s	-	PTFE graphite	
-200°C	260°C	max.10m/s	-	PTFE ekonol	
-200°C	260°C	max.10m/s	-	PTFE 25%glass	

DA119



ROD SEALS



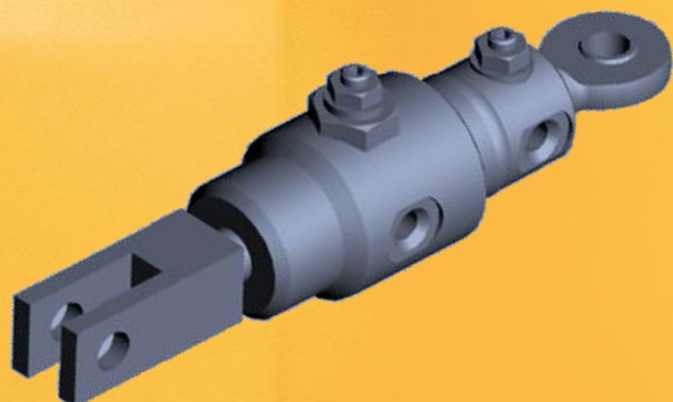
Rod seals are used in hydraulic cylinders for fluid sealing.

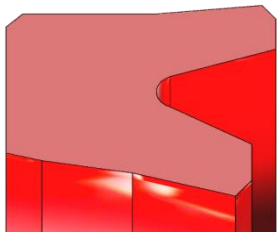
They are external to the cylinder head and seal against the cylinder's rod, preventing leakage of fluid from within the cylinder to the outside.

No double-acting hydraulic or pneumatic system could function without a rod seal (except systems with wiper seals).

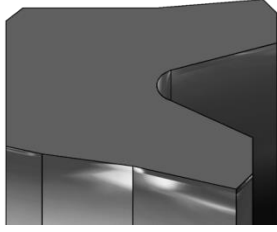
The selection criteria for rod seals arise from a number of several factors:

- Space requirement in the design area
- General system type
(press, construction machinery, industrial cylinder etc.)
- Sliding speed
- Pressure load and/or gap width
- Open or closed installation space
- Temperature and medium
(important for selection of material)

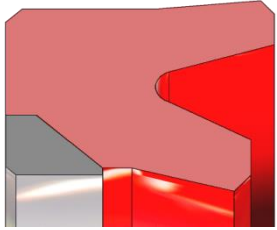
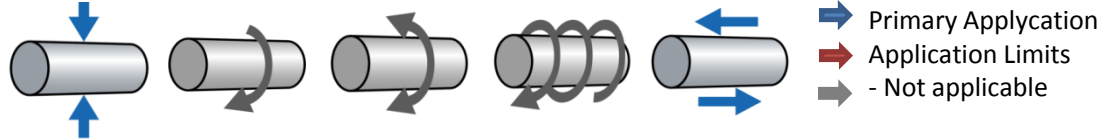




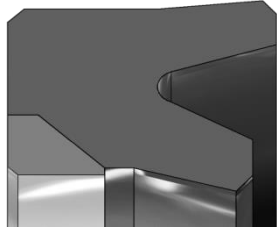
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 94°	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 55°D	
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	
-50°C	110°C	max.0.4m/s	max.400bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,5m/s	max.160bar	NBR 85°	
-20°C	150°C	max.0,5m/s	max.160bar	H-NBR 85°	
-20°C	220°C	max.0,5m/s	max.160bar	FPM 82°	
-45°C	130°C	max.0,5m/s	max.160bar	EPDM 85°	
-60°C	200°C	max.0,3m/s	max.120bar	MVQ 85°	



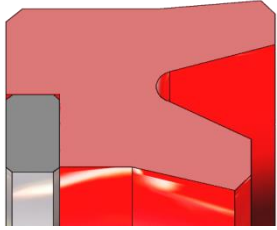
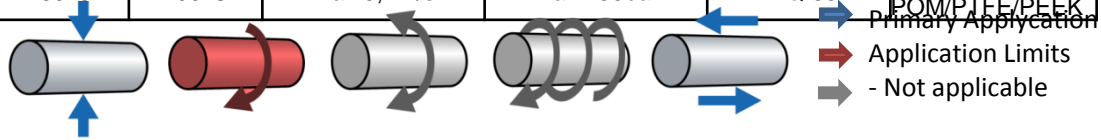
DS101



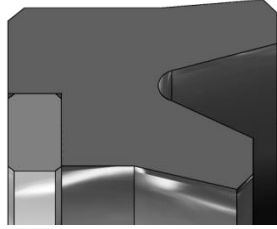
min Temp	max Temp	max. Speed	max. Pressure	Material / Backing	
-20°C	115°C	max.0.5m/s	max.400bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.5m/s	max.400bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.5m/s	max.400bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backing	
-30°C	110°C	max.0,5m/s	max.250bar	NBR 85°	POM/PTFE/PEEK
-20°C	150°C	max.0,5m/s	max.250bar	H-NBR 85°	POM/PTFE/PEEK
-20°C	220°C	max.0,5m/s	max.250bar	FPM 82°	POM/PTFE/PEEK
-45°C	130°C	max.0,5m/s	max.250bar	EPDM 85°	POM/PTFE/PEEK
-60°C	200°C	max.0,4m/s	max.250bar	MVQ 85°	POM/PTFE/PEEK



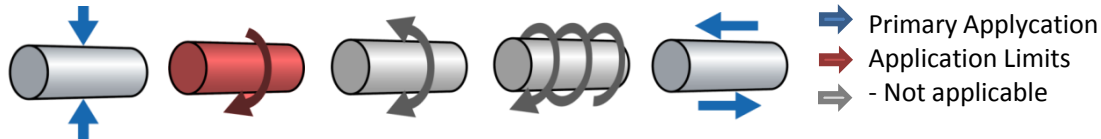
DS102

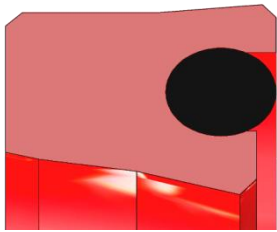


min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backing	
-20°C	115°C	max.0.5m/s	max.400bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.5m/s	max.400bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.5m/s	max.400bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backing	
-30°C	110°C	max.0,5m/s	max.250bar	NBR 85°	POM/PTFE/PEEK
-20°C	150°C	max.0,5m/s	max.250bar	H-NBR 85°	POM/PTFE/PEEK
-20°C	220°C	max.0,5m/s	max.250bar	FPM 82°	POM/PTFE/PEEK
-45°C	130°C	max.0,5m/s	max.250bar	EPDM 85°	POM/PTFE/PEEK
-60°C	200°C	max.0,4m/s	max.250bar	MVQ 85°	POM/PTFE/PEEK

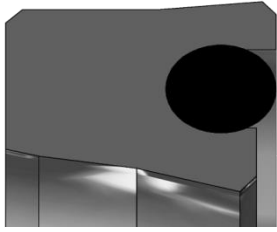


DS102-R

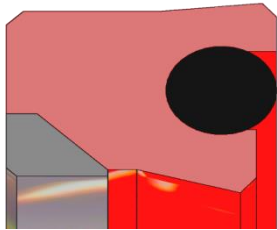
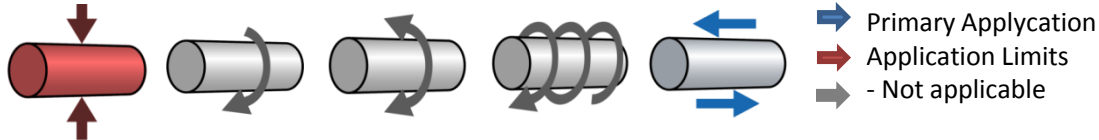




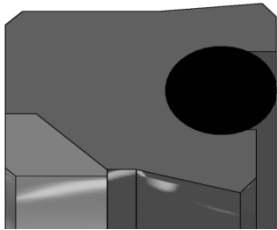
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 94°	NBR70°/FPM75°
-20°C	115°C	max.0.4m/s	max.400bar	HPU 55°D	NBR70°/FPM75°
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	NBR70°/FPM75°
-50°C	110°C	max.0.4m/s	max.400bar	LT-PU 94°	NBR70°/FPM75°
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-30°C	110°C	max.0,5m/s	max.160bar	NBR 85°	NBR70°/FPM75°
-20°C	150°C	max.0,5m/s	max.160bar	H-NBR 85°	NBR70°/FPM75°
-20°C	220°C	max.0,5m/s	max.160bar	FPM 82°	NBR70°/FPM75°
-45°C	130°C	max.0,5m/s	max.160bar	EPDM 85°	NBR70°/FPM75°
-60°C	200°C	max.0,3m/s	max.120bar	MVQ 85°	NBR70°/FPM75°



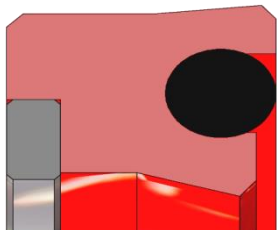
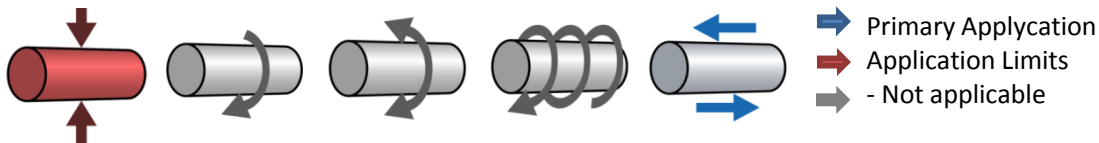
DS103



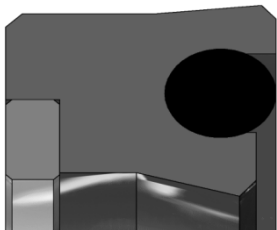
min Temp	max Temp	max. Speed	max. Pressure	Material / Backring	
-20°C	115°C	max.0.5m/s	max.400bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.5m/s	max.400bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.5m/s	max.400bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-30°C	110°C	max.0,5m/s	max.250bar	NBR 85°	NBR70°/FPM75°
-20°C	150°C	max.0,5m/s	max.250bar	H-NBR 85°	NBR70°/FPM75°
-20°C	220°C	max.0,5m/s	max.250bar	FPM 82°	NBR70°/FPM75°
-45°C	130°C	max.0,5m/s	max.250bar	EPDM 85°	NBR70°/FPM75°
-60°C	200°C	max.0,4m/s	max.250bar	MVQ 85°	NBR70°/FPM75°



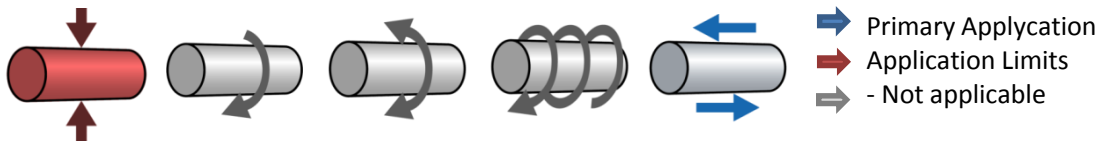
DS104

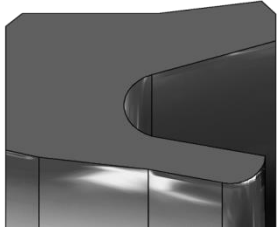
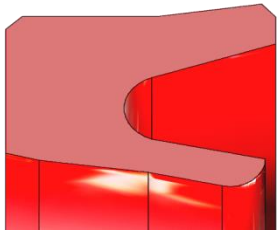


min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backring	
-20°C	115°C	max.0.5m/s	max.500bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.5m/s	max.500bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.7m/s	max.500bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.5m/s	max.500bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-30°C	110°C	max.0,5m/s	max.200bar	NBR 85°	NBR70°/FPM75°
-20°C	150°C	max.0,5m/s	max.200bar	H-NBR 85°	NBR70°/FPM75°
-20°C	220°C	max.0,5m/s	max.200bar	FPM 82°	NBR70°/FPM75°
-45°C	130°C	max.0,5m/s	max.200bar	EPDM 85°	NBR70°/FPM75°
-60°C	200°C	max.0,4m/s	max.200bar	MVQ 85°	NBR70°/FPM75°



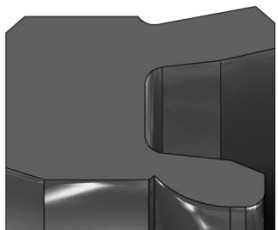
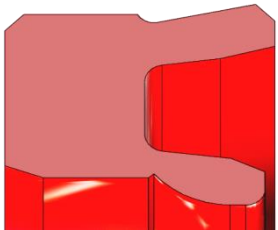
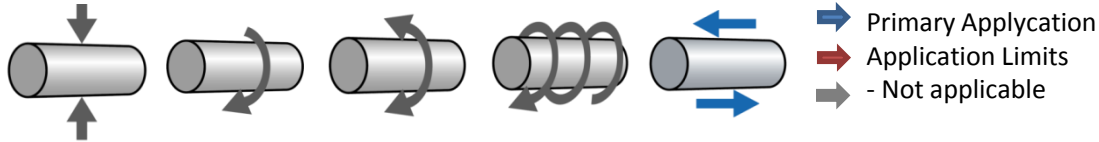
DS104-R





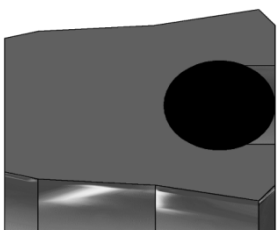
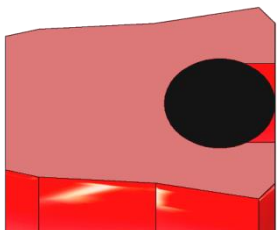
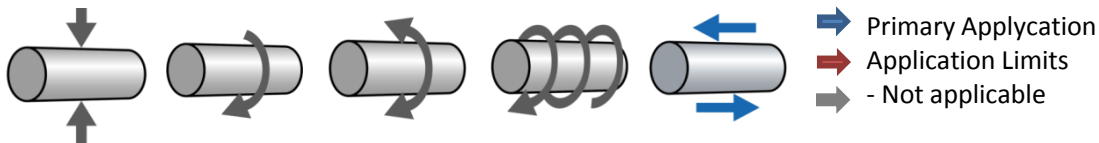
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 94°	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 55°D	
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	
-50°C	110°C	max.0.4m/s	max.400bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,5m/s	max.160bar	NBR 85°	
-20°C	150°C	max.0,5m/s	max.160bar	H-NBR 85°	
-20°C	220°C	max.0,5m/s	max.160bar	FPM 82°	
-45°C	130°C	max.0,5m/s	max.160bar	EPDM 85°	
-60°C	200°C	max.0,3m/s	max.120bar	MVQ 85°	

DS105



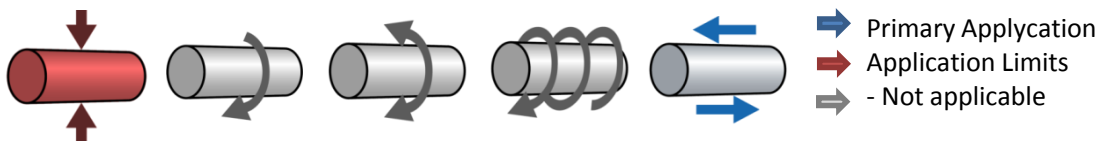
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 94°	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 55°D	
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	
-50°C	110°C	max.0.4m/s	max.400bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,5m/s	max.160bar	NBR 85°	
-20°C	150°C	max.0,5m/s	max.160bar	H-NBR 85°	
-20°C	220°C	max.0,5m/s	max.160bar	FPM 82°	
-45°C	130°C	max.0,5m/s	max.160bar	EPDM 85°	
-60°C	200°C	max.0,3m/s	max.120bar	MVQ 85°	

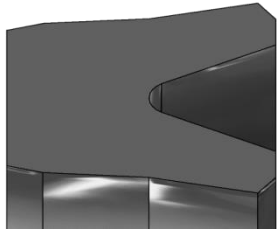
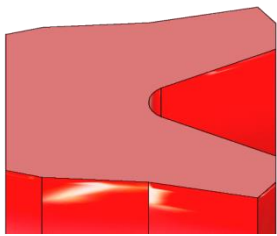
DS205



min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-20°C	115°C	max.0.5m/s	max.400bar	HPU 94°	NBR70°/FPM75°
-20°C	115°C	max.0.5m/s	max.400bar	HPU 55°D	NBR70°/FPM75°
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	NBR70°/FPM75°
-50°C	110°C	max.0.5m/s	max.400bar	LT-PU 94°	NBR70°/FPM75°
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-30°C	110°C	max.0,5m/s	max.250bar	NBR 85°	NBR70°/FPM75°
-20°C	150°C	max.0,5m/s	max.250bar	H-NBR 85°	NBR70°/FPM75°
-20°C	220°C	max.0,5m/s	max.250bar	FPM 82°	NBR70°/FPM75°
-45°C	130°C	max.0,5m/s	max.250bar	EPDM 85°	NBR70°/FPM75°
-60°C	200°C	max.0,4m/s	max.250bar	MVQ 85°	NBR70°/FPM75°

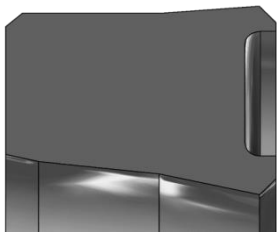
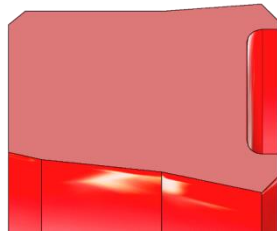
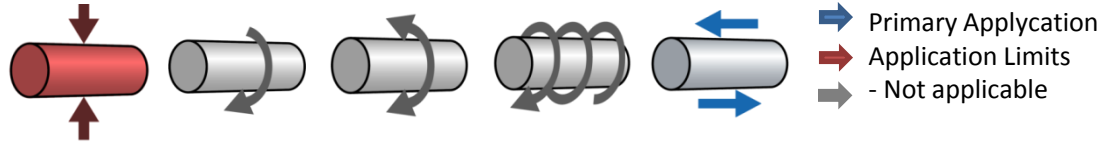
DS107





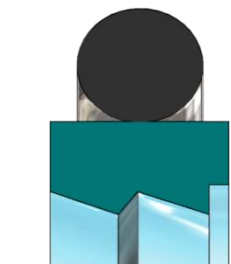
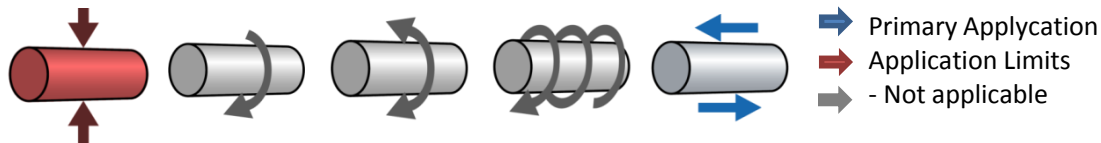
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 94°	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 55°D	
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	
-50°C	110°C	max.0.4m/s	max.400bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,5m/s	max.160bar	NBR 85°	
-20°C	150°C	max.0,5m/s	max.160bar	H-NBR 85°	
-20°C	220°C	max.0,5m/s	max.160bar	FPM 82°	
-45°C	130°C	max.0,5m/s	max.160bar	EPDM 85°	
-60°C	200°C	max.0,3m/s	max.120bar	MVQ 85°	

DS106



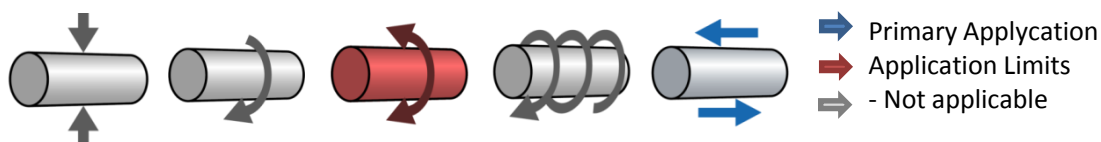
min Temp	max Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.5m/s	max.400bar	HPU 94°	-
-20°C	115°C	max.0.5m/s	max.400bar	HPU 55°D	
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	
-50°C	110°C	max.0.5m/s	max.400bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,5m/s	max.250bar	NBR 85°	
-20°C	150°C	max.0,5m/s	max.250bar	H-NBR 85°	
-20°C	220°C	max.0,5m/s	max.250bar	FPM 82°	
-45°C	130°C	max.0,5m/s	max.250bar	EPDM 85°	
-60°C	200°C	max.0,4m/s	max.250bar	MVQ 85°	

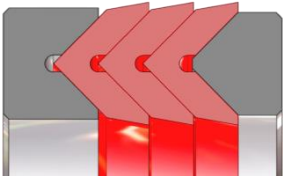
DS108



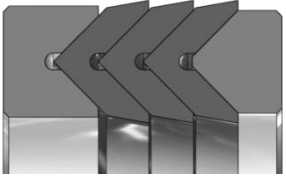
min Temp	max Temp	max. Speed	max. Pressure	Material / O-Ring	
-200°C	260°C	max.10m/s	max.400bar	PTFE pure	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE 1glass	NBR70° /FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE 2 bronze	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE carbone	NBR70°/FPM75°
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-200°C	260°C	max.10m/s	max.400bar	PTFE D05turqu	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE D05glass	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE graphite	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE ekonol	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE 25%glass	NBR70°/FPM75°

DS109

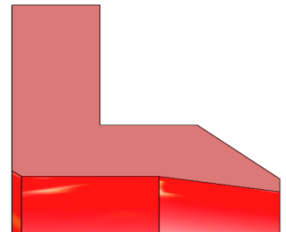
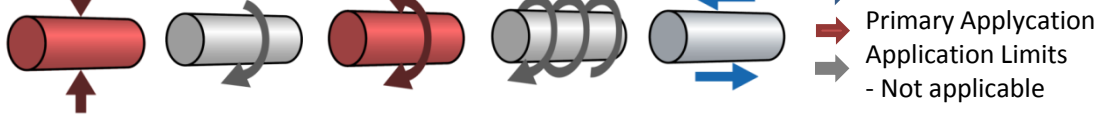




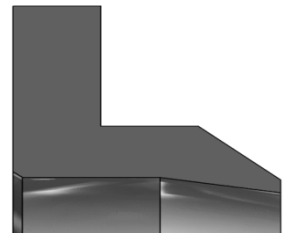
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backring	
-20°C	115°C	max.0.4m/s	max.500bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.4m/s	max.500bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.5m/s	max.500bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.4m/s	max.500bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backring	
-30°C	110°C	max.0,5m/s	max.160bar	NBR 85°	POM/PTFE/PEEK
-20°C	150°C	max.0,5m/s	max.160bar	H-NBR 85°	POM/PTFE/PEEK
-20°C	220°C	max.0,5m/s	max.160bar	FPM 82°	POM/PTFE/PEEK
-45°C	130°C	max.0,5m/s	max.160bar	EPDM 85°	POM/PTFE/PEEK
-60°C	200°C	max.0,3m/s	max.120bar	MVQ 85°	POM/PTFE/PEEK



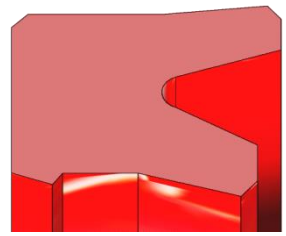
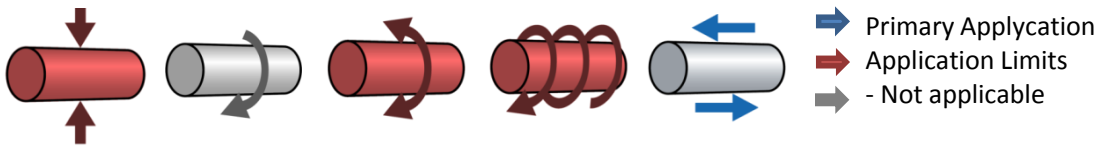
DS110-112



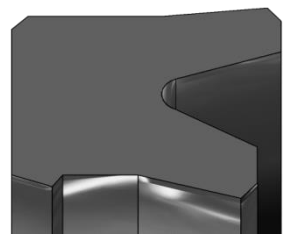
min Temp	max Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.5m/s	max.160bar	HPU 94°	
-20°C	115°C	max.0.5m/s	max.160bar	HPU 55°D	
-20°C	110°C	max.0.5m/s	max.160bar	SL-PU 94°	
-50°C	110°C	max.0.5m/s	max.160bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,5m/s	max.120bar	NBR 85°	
-20°C	150°C	max.0,5m/s	max.120bar	H-NBR 85°	
-20°C	220°C	max.0,5m/s	max.120bar	FPM 82°	
-45°C	130°C	max.0,5m/s	max.120bar	EPDM 85°	
-60°C	200°C	max.0,4m/s	max.120bar	MVQ 85°	



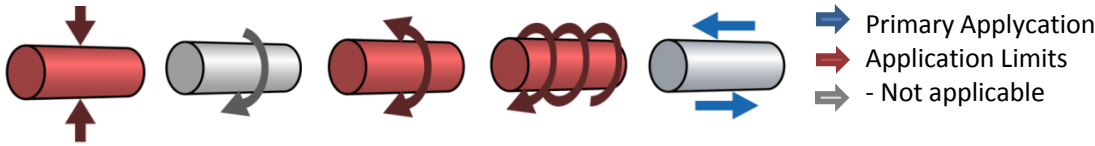
DS116

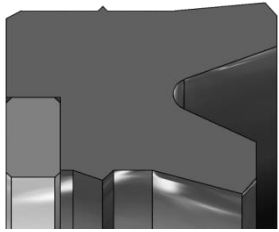
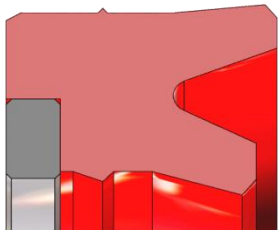


min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.5m/s	max.400bar	HPU 94°	
-20°C	115°C	max.0.5m/s	max.400bar	HPU 55°D	
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	
-50°C	110°C	max.0.5m/s	max.400bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,5m/s	max.250bar	NBR 85°	
-20°C	150°C	max.0,5m/s	max.250bar	H-NBR 85°	
-20°C	220°C	max.0,5m/s	max.250bar	FPM 82°	
-45°C	130°C	max.0,5m/s	max.250bar	EPDM 85°	
-60°C	200°C	max.0,4m/s	max.250bar	MVQ 85°	



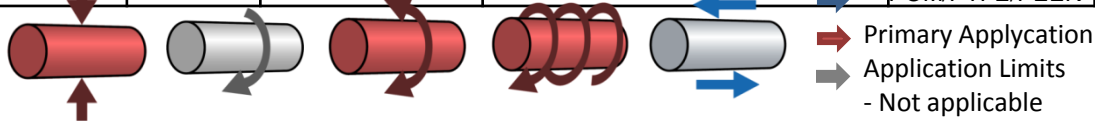
DS117





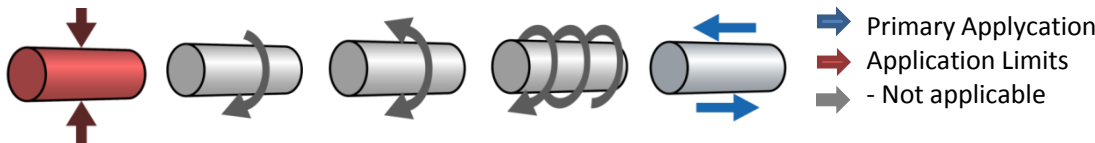
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backing	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.4m/s	max.400bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.4m/s	max.400bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backing	
-30°C	110°C	max.0,5m/s	max.160bar	NBR 85°	POM/PTFE/PEEK
-20°C	150°C	max.0,5m/s	max.160bar	H-NBR 85°	POM/PTFE/PEEK
-20°C	220°C	max.0,5m/s	max.160bar	FPM 82°	POM/PTFE/PEEK
-45°C	130°C	max.0,5m/s	max.160bar	EPDM 85°	POM/PTFE/PEEK
-60°C	200°C	max.0,3m/s	max.120bar	MVQ 85°	POM/PTFE/PEEK

DS117-R



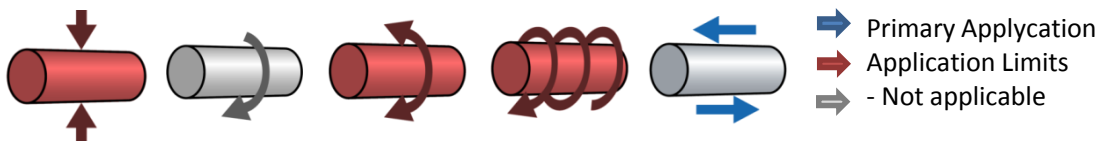
min Temp	max Temp	max. Speed	max. Pressure	Material / Spring	
-200°C	260°C	max.15m/s	max.100bar	PTFE pure	1.4310
-200°C	260°C	max.15m/s	max.160bar	PTFE 1glass	1.4310
-200°C	260°C	max.15m/s	max.160bar	PTFE 2 bronze	1.4310
-200°C	260°C	max.15m/s	max.100bar	PTFE carbone	1.4310
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Spring	
-200°C	260°C	max.15m/s	max.100bar	PTFE D05 turq	1.4310
-200°C	260°C	max.15m/s	max.160bar	PTFE D05 glass	1.4310
-200°C	260°C	max.15m/s	max.160bar	PTFE graphite	1.4310
-200°C	260°C	max.15m/s	max.160bar	PTFE ekonol	1.4310
-200°C	260°C	max.15m/s	max.160bar	PTFE 25%glass	1.4310

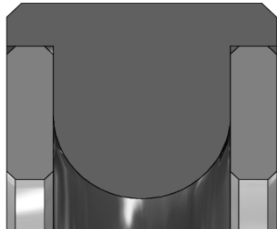
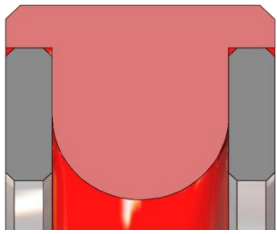
DS118



min Temp	max Temp	max. Speed	max. Pressure	Material / Spring	
-200°C	260°C	max.15m/s	max.100bar	PTFE pure	1.4310
-200°C	260°C	max.15m/s	max.160bar	PTFE 1glass	1.4310
-200°C	260°C	max.15m/s	max.160bar	PTFE 2 bronze	1.4310
-200°C	260°C	max.15m/s	max.100bar	PTFE carbone	1.4310
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Spring	
-200°C	260°C	max.15m/s	max.100bar	PTFE D05 turq	1.4310
-200°C	260°C	max.15m/s	max.160bar	PTFE D05 glass	1.4310
-200°C	260°C	max.15m/s	max.160bar	PTFE graphite	1.4310
-200°C	260°C	max.15m/s	max.160bar	PTFE ekonol	1.4310
-200°C	260°C	max.15m/s	max.160bar	PTFE 25%glass	1.4310

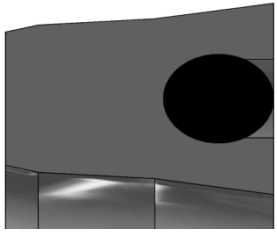
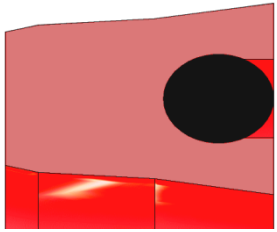
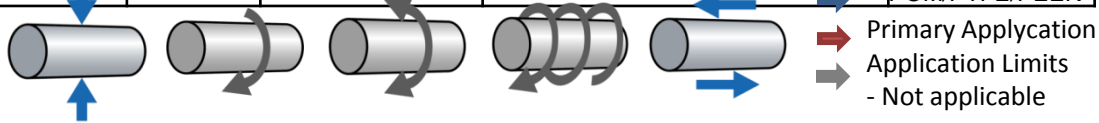
DS119





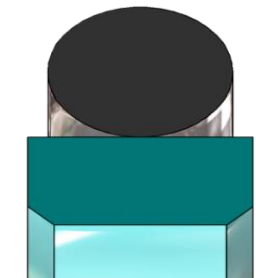
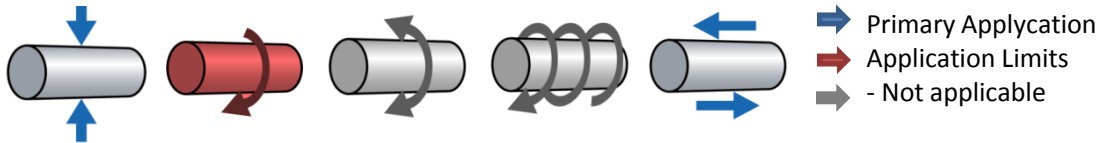
DS120

min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backring	
-20°C	115°C	max.0.4m/s	max.500bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.4m/s	max.500bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.5m/s	max.500bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.4m/s	max.500bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backring	
-30°C	110°C	max.0,5m/s	max.160bar	NBR 85°	POM/PTFE/PEEK
-20°C	150°C	max.0,5m/s	max.160bar	H-NBR 85°	POM/PTFE/PEEK
-20°C	220°C	max.0,5m/s	max.160bar	FPM 82°	POM/PTFE/PEEK
-45°C	130°C	max.0,5m/s	max.160bar	EPDM 85°	POM/PTFE/PEEK
-60°C	200°C	max.0,3m/s	max.120bar	MVQ 85°	POM/PTFE/PEEK



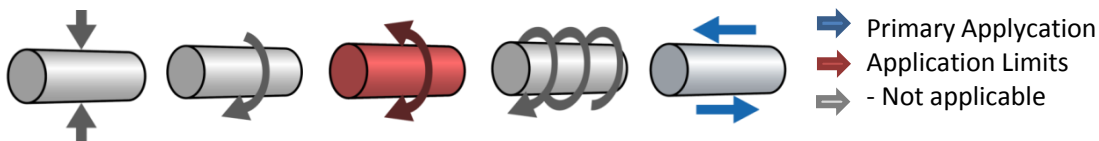
DS121

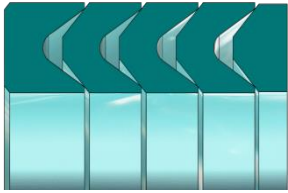
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 94°	NBR70°,FPM75°
-20°C	115°C	max.0.4m/s	max.400bar	HPU 55°D	NBR70°,FPM75°
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	NBR70°,FPM75°
-50°C	110°C	max.0.4m/s	max.400bar	LT-PU 94°	NBR70°,FPM75°
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-30°C	110°C	max.0,5m/s	max.160bar	NBR 85°	NBR70°,FPM75°
-20°C	150°C	max.0,5m/s	max.160bar	H-NBR 85°	NBR70°,FPM75°
-20°C	220°C	max.0,5m/s	max.160bar	FPM 82°	NBR70°,FPM75°
-45°C	130°C	max.0,5m/s	max.160bar	EPDM 85°	NBR70°,FPM75°
-60°C	200°C	max.0,4m/s	max.120bar	MVQ 85°	NBR70°,FPM75°



DS124

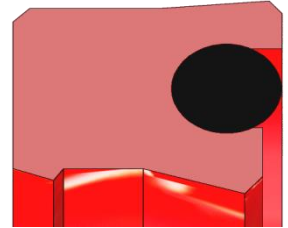
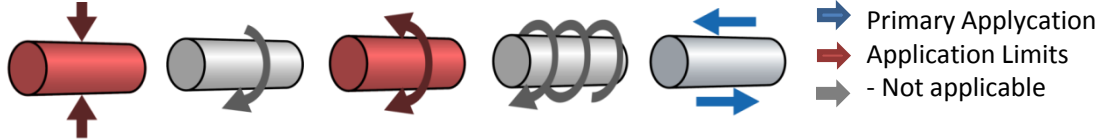
min Temp	max Temp	max. Speed	max. Pressure	Material / O-Ring	
-200°C	260°C	max.10m/s	max.400bar	PTFE pure	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE 1glass	NBR70° /FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE 2 bronze	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE carbone	NBR70°/FPM75°
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-200°C	260°C	max.10m/s	max.400bar	PTFED05turqu	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE D05glass	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE graphite	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE ekonol	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE 25%glass	NBR70°/FPM75°



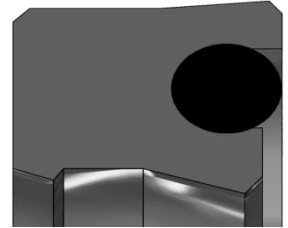


min Temp	max Temp	max. Speed	max. Pressure	Material	
-200°C	260°C	max.10m/s	max.400bar	PTFE pure	
-200°C	260°C	max.10m/s	max.400bar	PTFE 1glass	
-200°C	260°C	max.10m/s	max.400bar	PTFE 2 bronze	
-200°C	260°C	max.10m/s	max.400bar	PTFE carbone	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200°C	260°C	max.10m/s	max.400bar	PTFED05turqu	
-200°C	260°C	max.10m/s	max.400bar	PTFE D05glass	
-200°C	260°C	max.10m/s	max.400bar	PTFE graphite	
-200°C	260°C	max.10m/s	max.400bar	PTFE ekonol	
-200°C	260°C	max.10m/s	max.400bar	PTFE 25%glass	

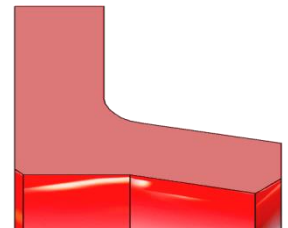
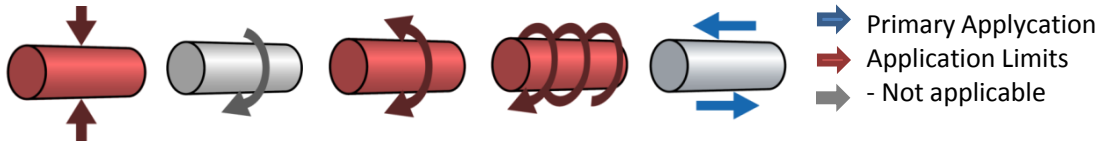
DS126-128



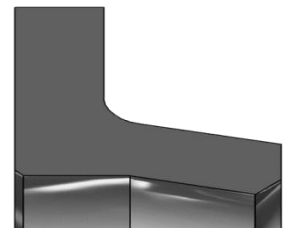
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 94°	NBR70°,FPM75°
-20°C	115°C	max.0.4m/s	max.400bar	HPU 55°D	NBR70°,FPM75°
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	NBR70°,FPM75°
-50°C	110°C	max.0.4m/s	max.400bar	LT-PU 94°	NBR70°,FPM75°
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-30°C	110°C	max.0,5m/s	max.160bar	NBR 85°	NBR70°,FPM75°
-20°C	150°C	max.0,5m/s	max.160bar	H-NBR 85°	NBR70°,FPM75°
-20°C	220°C	max.0,5m/s	max.160bar	FPM 82°	NBR70°,FPM75°
-45°C	130°C	max.0,5m/s	max.160bar	EPDM 85°	NBR70°,FPM75°
-60°C	200°C	max.0,4m/s	max.120bar	MVQ 85°	NBR70°,FPM75°



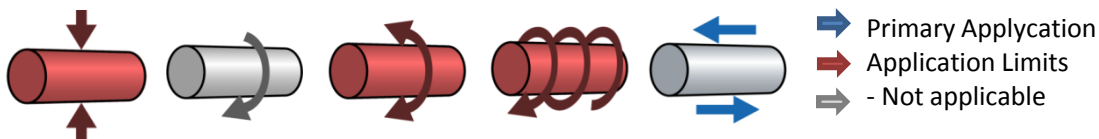
DS125

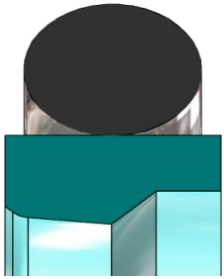


min Temp	max Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.4m/s	max.160bar	HPU 94°	
-20°C	115°C	max.0.4m/s	max.160bar	HPU 55°D	
-20°C	110°C	max.0.5m/s	max.160bar	SL-PU 94°	
-50°C	110°C	max.0.4m/s	max.160bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,4m/s	max.160bar	NBR 85°	
-20°C	150°C	max.0,4m/s	max.160bar	H-NBR 85°	
-20°C	220°C	max.0,4m/s	max.160bar	FPM 82°	
-45°C	130°C	max.0,4m/s	max.160bar	EPDM 85°	
-60°C	200°C	max.0,4m/s	max.120bar	MVQ 85°	



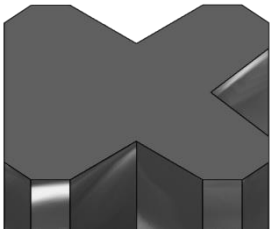
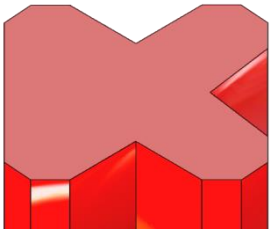
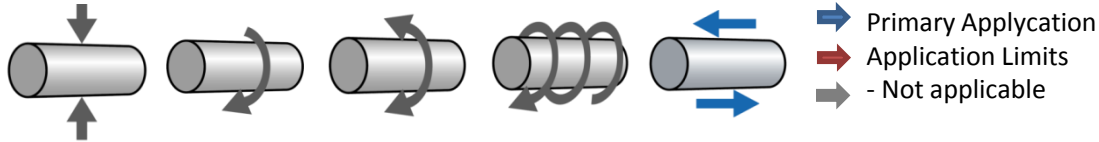
DS216





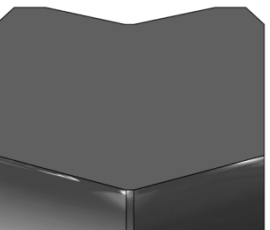
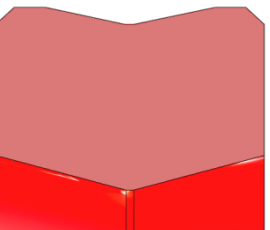
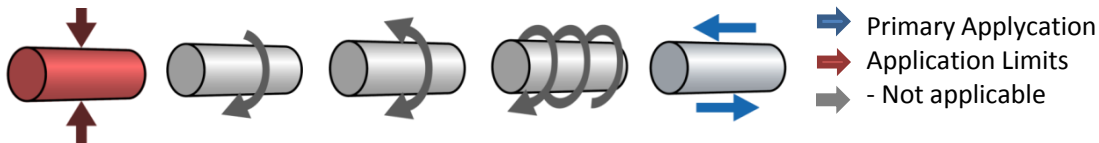
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-20°C	115°C	max.0.4m/s	max.500bar	HPU 94°	NBR70°,FPM75°
-20°C	115°C	max.0.4m/s	max.500bar	HPU 55°D	NBR70°,FPM75°
-20°C	110°C	max.0.5m/s	max.500bar	SL-PU 94°	NBR70°,FPM75°
-50°C	110°C	max.0.4m/s	max.500bar	LT-PU 94°	NBR70°,FPM75°
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-30°C	110°C	max.0,5m/s	max.160bar	NBR 85°	NBR70°,FPM75°
-20°C	150°C	max.0,5m/s	max.160bar	H-NBR 85°	NBR70°,FPM75°
-20°C	220°C	max.0,5m/s	max.160bar	FPM 82°	NBR70°,FPM75°
-45°C	130°C	max.0,5m/s	max.160bar	EPDM 85°	NBR70°,FPM75°
-60°C	200°C	max.0,3m/s	max.120bar	MVQ 85°	NBR70°,FPM75°

DS129



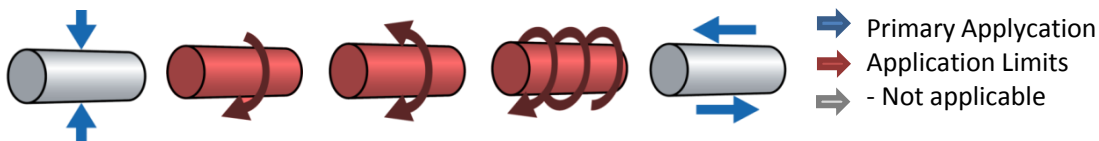
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.000m/s	max.000bar	HPU 94°	
-20°C	115°C	max.000m/s	max.000bar	HPU 55°D	
-20°C	110°C	max.000m/s	max.000bar	SL-PU 94°	
-50°C	110°C	max.000m/s	max.000bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.000m/s	max.000bar	NBR 85°	
-20°C	150°C	max.000m/s	max.000bar	H-NBR 85°	
-20°C	220°C	max.000m/s	max.000bar	FPM 82°	
-45°C	130°C	max.000m/s	max.000bar	EPDM 85°	
-60°C	200°C	max.000m/s	max.000bar	MVQ 85°	

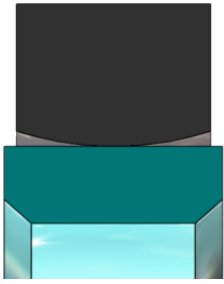
DS130



min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 94°	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 55°D	
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	
-50°C	110°C	max.0.4m/s	max.400bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,4m/s	max.160bar	NBR 85°	
-20°C	150°C	max.0,4m/s	max.160bar	H-NBR 85°	
-20°C	220°C	max.0,4m/s	max.160bar	FPM 82°	
-45°C	130°C	max.0,4m/s	max.160bar	EPDM 85°	
-60°C	200°C	max.0,4m/s	max.120bar	MVQ 85°	

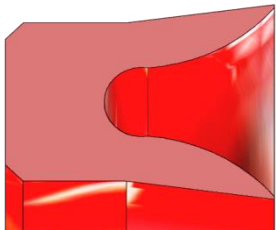
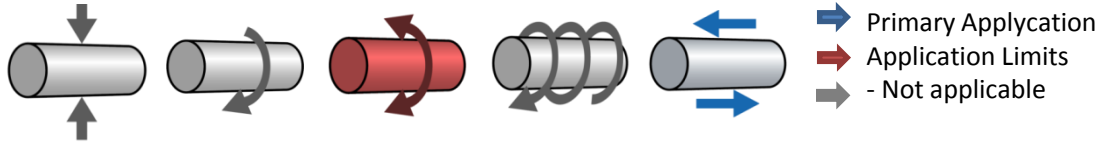
DS131





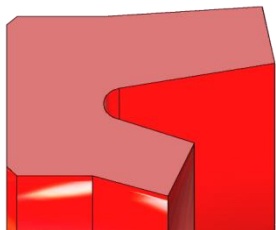
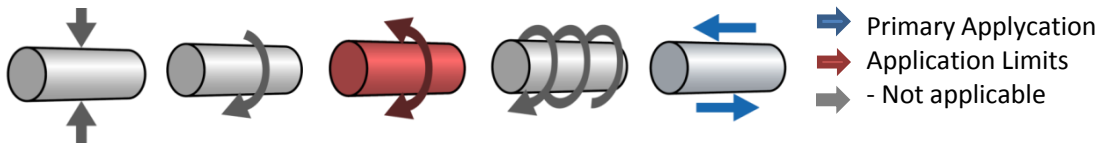
min Temp	max Temp	max. Speed	max. Pressure	Material /	Energizer
-200°C	260°C	max.10m/s	max.400bar	PTFE pure	NBR 85°
-200°C	260°C	max.10m/s	max.400bar	PTFE 1glass	H-NBR 85°
-200°C	260°C	max.10m/s	max.400bar	PTFE 2 bronze	FPM 82°
-200°C	260°C	max.10m/s	max.400bar	PTFE carbone	EPDM85°
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200°C	260°C	max.10m/s	max.400bar	PTFED05turqu	
-200°C	260°C	max.10m/s	max.400bar	PTFE D05glass	
-200°C	260°C	max.10m/s	max.400bar	PTFE graphite	
-200°C	260°C	max.10m/s	max.400bar	PTFE ekonol	
-200°C	260°C	max.10m/s	max.400bar	PTFE 25%glass	

DS138



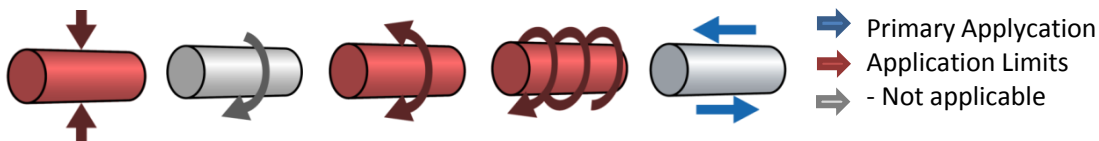
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 94°	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 55°D	
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	
-50°C	110°C	max.0.4m/s	max.400bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,4m/s	max.160bar	NBR 85°	
-20°C	150°C	max.0,4m/s	max.160bar	H-NBR 85°	
-20°C	220°C	max.0,4m/s	max.160bar	FPM 82°	
-45°C	130°C	max.0,4m/s	max.160bar	EPDM 85°	
-60°C	200°C	max.0,4m/s	max.120bar	MVQ 85°	

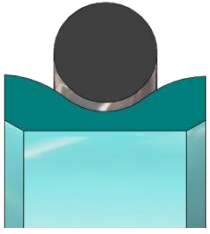
DS139



min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 94°	-
-20°C	115°C	max.0.4m/s	max.400bar	HPU 55°D	-
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	-
-50°C	110°C	max.0.4m/s	max.400bar	LT-PU 94°	-
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,4m/s	max.160bar	NBR 85°	-
-20°C	150°C	max.0,4m/s	max.160bar	H-NBR 85°	-
-20°C	220°C	max.0,4m/s	max.160bar	FPM 82°	-
-45°C	130°C	max.0,4m/s	max.160bar	EPDM 85°	-
-60°C	200°C	max.0,4m/s	max.120bar	MVQ 85°	-

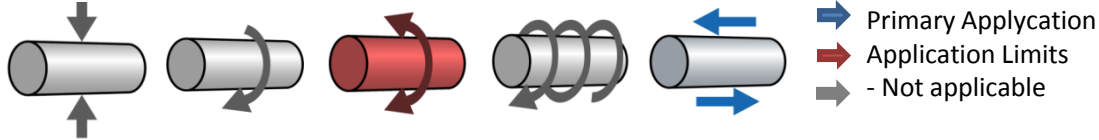
DS141





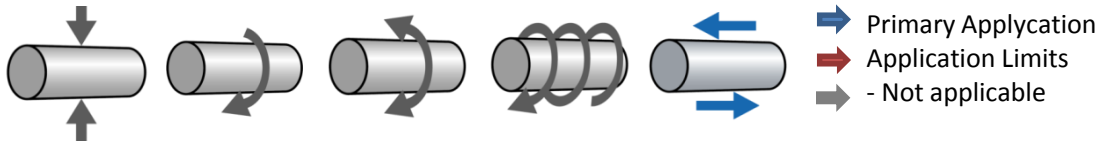
min Temp	max Temp	max. Speed	max. Pressure	Material / O-Ring	
-200°C	260°C	max.10m/s	max.400bar	PTFE pure	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE 1glass	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE 2 bronze	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE carbone	NBR70°/FPM75°
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-200°C	260°C	max.10m/s	max.400bar	PTFED05turqu	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE D05glass	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE graphite	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE ekonol	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE 25%glass	NBR70°/FPM75°

DS142



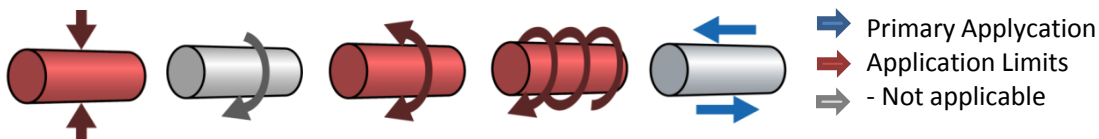
min Temp	max Temp	max. Speed	max. Pressure	Material / Energizer	
-200°C	260°C	max.10m/s	max.400bar	PTFE pure	NBR 85°
-200°C	260°C	max.10m/s	max.400bar	PTFE 1glass	H-NBR 85°
-200°C	260°C	max.10m/s	max.400bar	PTFE 2 bronze	FPM 82°
-200°C	260°C	max.10m/s	max.400bar	PTFE carbone	EPDM85°
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200°C	260°C	max.10m/s	max.400bar	PTFE D05 turq	
-200°C	260°C	max.10m/s	max.400bar	PTFE D05 glass	
-200°C	260°C	max.10m/s	max.400bar	PTFE graphite	
-200°C	260°C	max.10m/s	max.400bar	PTFE ekonol	
-200°C	260°C	max.10m/s	max.400bar	PTFE 25%glass	

DS238

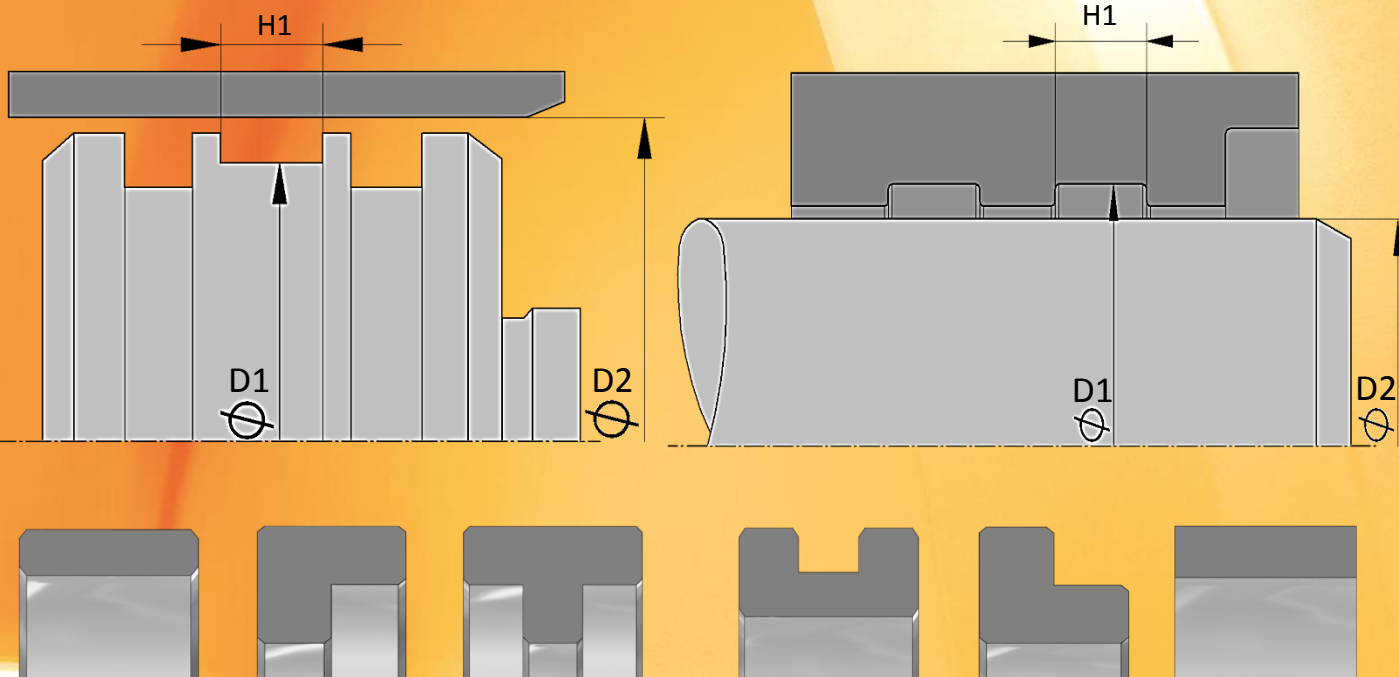


min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 94°	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 55°D	
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	
-50°C	110°C	max.0.4m/s	max.400bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,4m/s	max.160bar	NBR 85°	
-20°C	150°C	max.0,4m/s	max.160bar	H-NBR 85°	
-20°C	220°C	max.0,4m/s	max.160bar	FPM 82°	
-45°C	130°C	max.0,4m/s	max.160bar	EPDM 85°	
-60°C	200°C	max.0,4m/s	max.120bar	MVQ 85°	

DS199



GUIDE RINGS

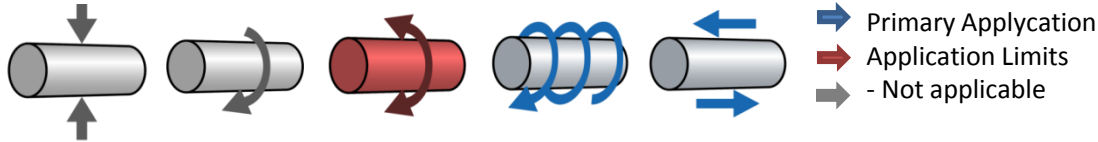


The function of guide rings is to guide precisely the piston rod and piston in the cylinder liner. This makes guide rings into very important elements of the complete system. The lifetime of the rod and piston seal would be seriously impaired without this guidance.



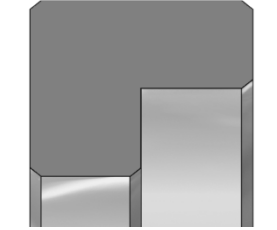
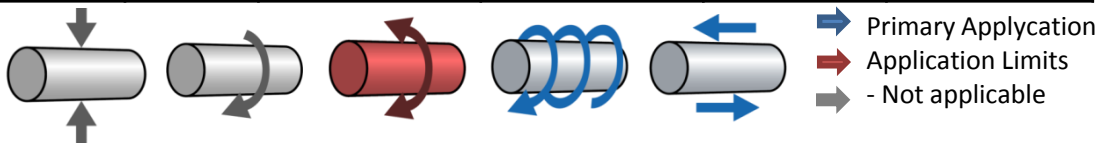
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-50	100	4m/s			POM
-200	260	4m/s			PTFE
-60	250	5m/s			PEEK
-200	260	5m/s			PTFE filled
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200	80	4m/s			UHMW-PE
-40	110	4m/s			PA

DF102



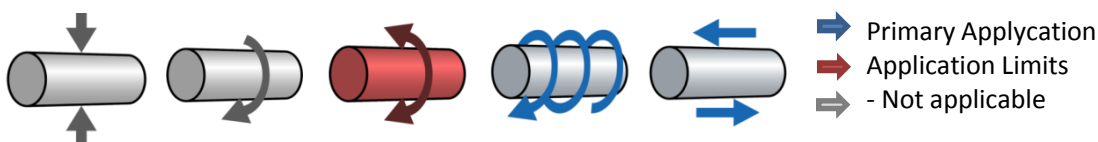
min Temp	max Temp	max. Speed	max. Pressure	Material	
-50	100	4m/s			POM
-200	260	4m/s			PTFE
-60	250	5m/s			PEEK
-200	260	5m/s			PTFE filled
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200	80	4m/s			UHMW-PE
-40	110	4m/s			PA

DF101



min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-50	100	4m/s			POM
-200	260	4m/s			PTFE
-60	250	5m/s			PEEK
-200	260	5m/s			PTFE filled
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200	80	4m/s			UHMW-PE
-40	110	4m/s			PA

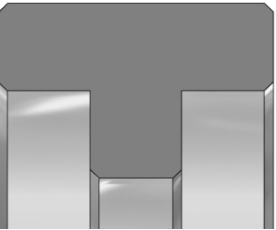
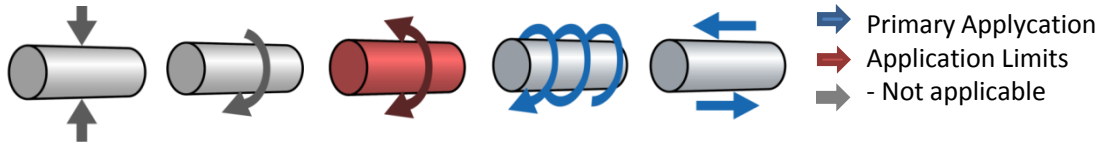
DF103





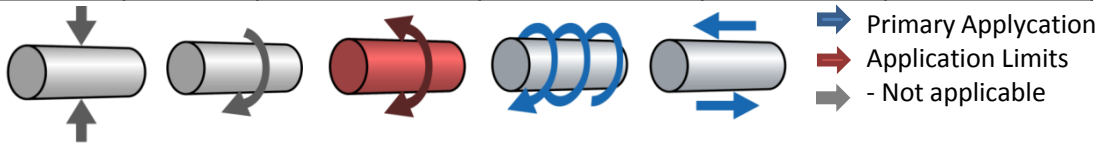
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-50	100	4m/s			POM
-200	260	4m/s			PTFE
-60	250	5m/s			PEEK
-200	260	5m/s			PTFE filled
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200	80	4m/s			UHMW-PE
-40	110	4m/s			PA

DF104



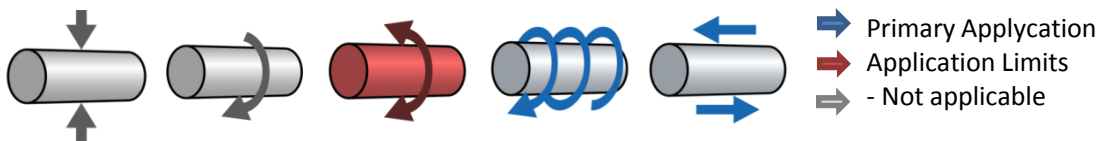
min Temp	max Temp	max. Speed	max. Pressure	Material	
-50	100	4m/s			POM
-200	260	4m/s			PTFE
-60	250	5m/s			PEEK
-200	260	5m/s			PTFE filled
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200	80	4m/s			UHMW-PE
-40	110	4m/s			PA

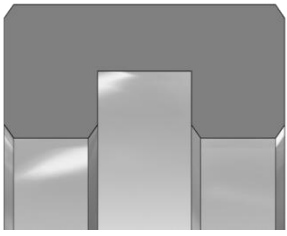
DF105



min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-50	100	4m/s			POM
-200	260	4m/s			PTFE
-60	250	5m/s			PEEK
-200	260	5m/s			PTFE filled
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200	80	4m/s			UHMW-PE
-40	110	4m/s			PA

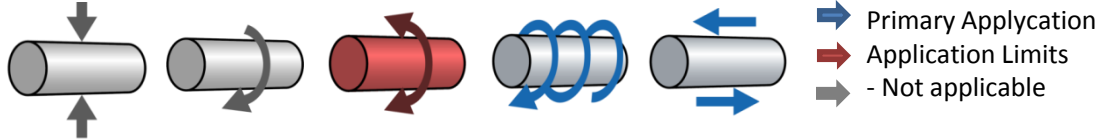
DF106





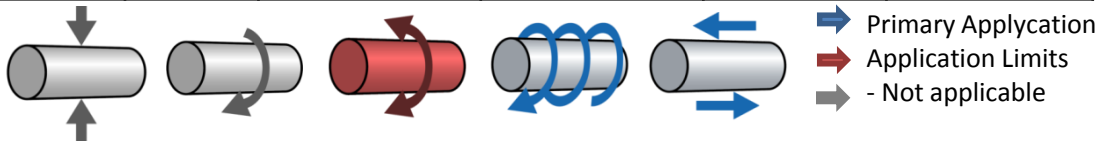
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-50	100	4m/s			POM
-200	260	4m/s			PTFE
-60	250	5m/s			PEEK
-200	260	5m/s			PTFE filled
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200	80	4m/s			UHMW-PE
-40	110	4m/s			PA

DF107



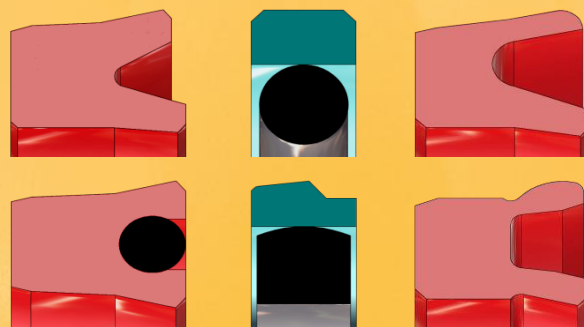
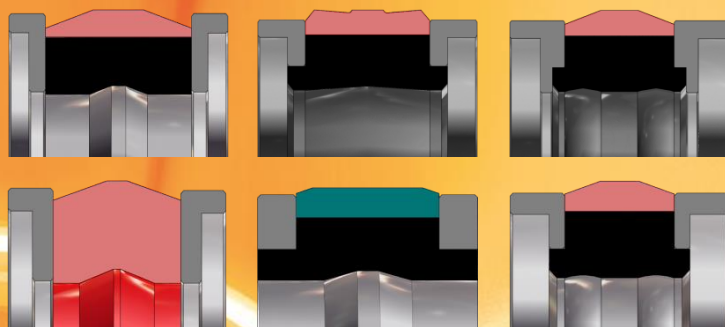
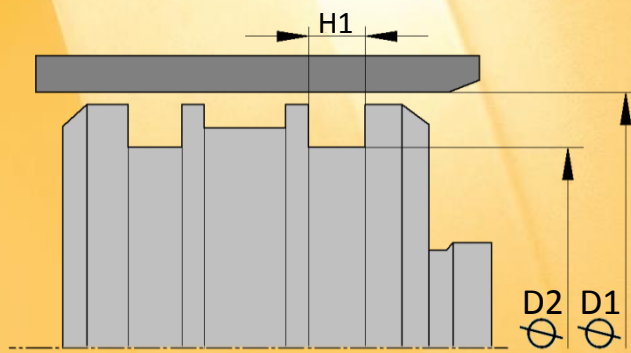
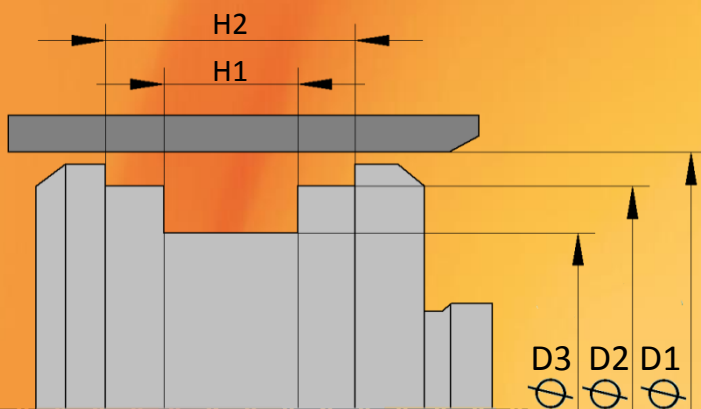
min Temp	max Temp	max. Speed	max. Pressure	Material	
-50	100	4m/s			POM
-200	260	4m/s			PTFE
-60	250	5m/s			PEEK
-200	260	5m/s			PTFE filled
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200	80	4m/s			UHMW-PE
-40	110	4m/s			PA

DF108





PISTON SEALS



The piston seal is responsible for a system's mechanical function. The use of piston seals in cylinders facilitates leak tightness during every stroke and traction movement.

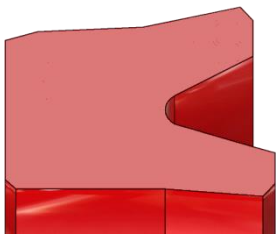
Regardless of whether it is single or double acting, the piston seal is the "workhorse" of all seals.

Due to continuously increasing requirements in the area of hydraulics and pneumatics the diversity of shapes and sizes is immense in this area.

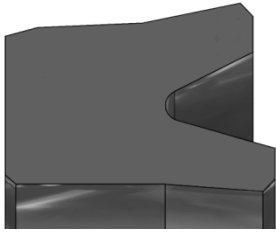
Only in the mechanical seal sector the combination of geometry and the different, increasingly highly developed materials continuously make new options possible.

The following factors are important for the selection of this seal:

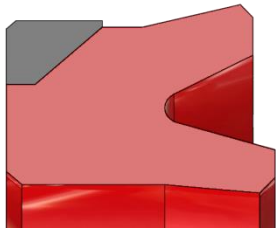
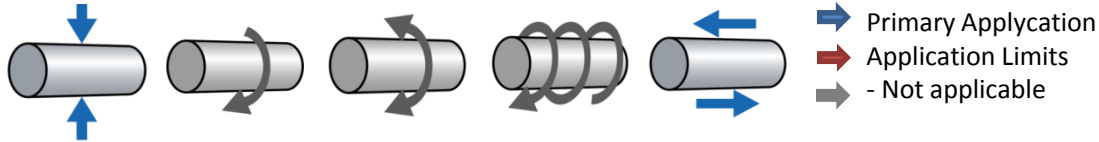
- Single or double action sealing system
- Space requirement
- Pressure load and/or gap width
- Sliding speed
- General system type
(press, construction machinery, industrial cylinder etc.)
- Open or closed installation space
- Temperature and/or medium
(important for selection of material)



min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 94°	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 55°D	
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	
-50°C	110°C	max.0.4m/s	max.400bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,5m/s	max.160bar	NBR 85°	
-20°C	150°C	max.0,5m/s	max.160bar	H-NBR 85°	
-20°C	220°C	max.0,5m/s	max.160bar	FPM 82°	
-45°C	130°C	max.0,5m/s	max.160bar	EPDM 85°	
-60°C	200°C	max.0,3m/s	max.120bar	MVQ 85°	

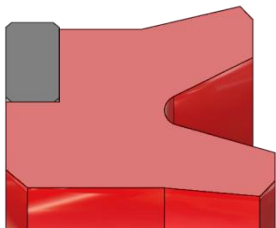
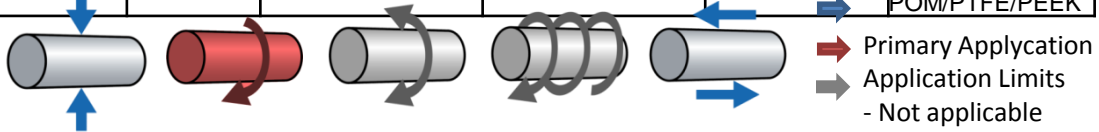


DK101



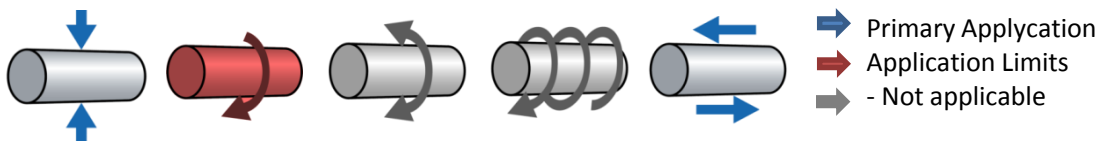
min Temp	max Temp	max. Speed	max. Pressure	Material / Backing	
-20°C	115°C	max.0.5m/s	max.400bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.5m/s	max.400bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.5m/s	max.400bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backing	
-30°C	110°C	max.0,5m/s	max.250bar	NBR 85°	POM/PTFE/PEEK
-20°C	150°C	max.0,5m/s	max.250bar	H-NBR 85°	POM/PTFE/PEEK
-20°C	220°C	max.0,5m/s	max.250bar	FPM 82°	POM/PTFE/PEEK
-45°C	130°C	max.0,5m/s	max.250bar	EPDM 85°	POM/PTFE/PEEK
-60°C	200°C	max.0,4m/s	max.250bar	MVQ 85°	POM/PTFE/PEEK

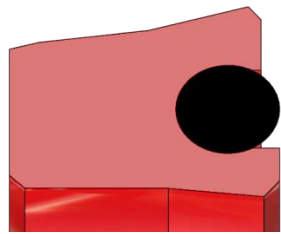
DK102



min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backing	
-20°C	115°C	max.0.5m/s	max.400bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.5m/s	max.400bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.5m/s	max.400bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backing	
-30°C	110°C	max.0,5m/s	max.250bar	NBR 85°	POM/PTFE/PEEK
-20°C	150°C	max.0,5m/s	max.250bar	H-NBR 85°	POM/PTFE/PEEK
-20°C	220°C	max.0,5m/s	max.250bar	FPM 82°	POM/PTFE/PEEK
-45°C	130°C	max.0,5m/s	max.250bar	EPDM 85°	POM/PTFE/PEEK
-60°C	200°C	max.0,4m/s	max.250bar	MVQ 85°	POM/PTFE/PEEK

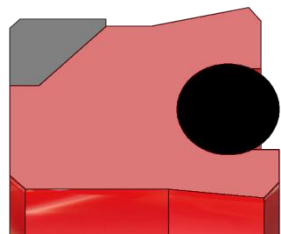
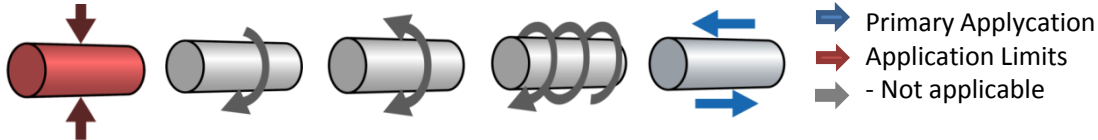
DK102-R





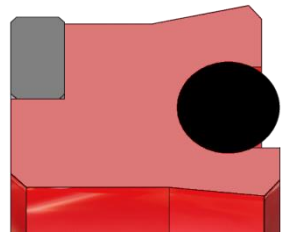
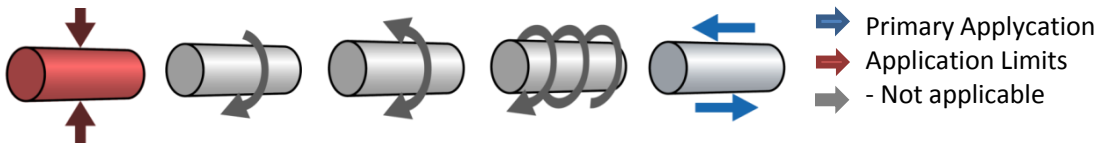
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-20°C	115°C	max.0.5m/s	max.400bar	HPU 94°	NBR70°/FPM75°
-20°C	115°C	max.0.5m/s	max.400bar	HPU 55°D	NBR70°/FPM75°
-20°C	110°C	max.0.7m/s	max.400bar	SL-PU 94°	NBR70°/FPM75°
-50°C	110°C	max.0.5m/s	max.400bar	LT-PU 94°	NBR70°/FPM75°
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-30°C	110°C	max.0,5m/s	max.160bar	NBR 85°	NBR70°/FPM75°
-20°C	150°C	max.0,5m/s	max.160bar	H-NBR 85°	NBR70°/FPM75°
-20°C	220°C	max.0,5m/s	max.160bar	FPM 82°	NBR70°/FPM75°
-45°C	130°C	max.0,5m/s	max.160bar	EPDM 85°	NBR70°/FPM75°
-60°C	200°C	max.0,4m/s	max.120bar	MVQ 85°	NBR70°/FPM75°

DK103



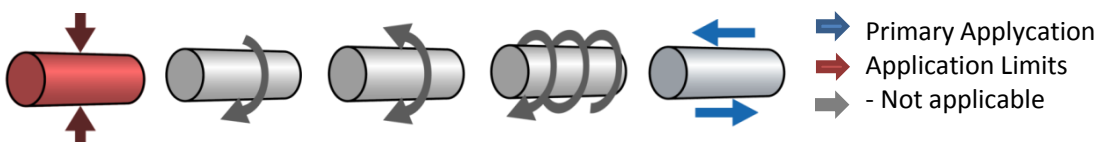
min Temp	max Temp	max. Speed	max. Pressure	Material / Backring	
-20°C	115°C	max.0.5m/s	max.500bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.5m/s	max.500bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.7m/s	max.500bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.5m/s	max.500bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-30°C	110°C	max.0,5m/s	max.200bar	NBR 85°	NBR70°/FPM75°
-20°C	150°C	max.0,5m/s	max.200bar	H-NBR 85°	NBR70°/FPM75°
-20°C	220°C	max.0,5m/s	max.200bar	FPM 82°	NBR70°/FPM75°
-45°C	130°C	max.0,5m/s	max.200bar	EPDM 85°	NBR70°/FPM75°
-60°C	200°C	max.0,4m/s	max.200bar	MVQ 85°	NBR70°/FPM75°

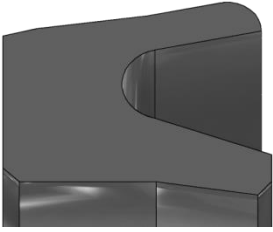
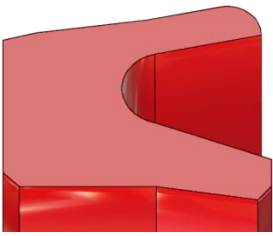
DK104



min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backring	
-20°C	115°C	max.0.5m/s	max.500bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.5m/s	max.500bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.7m/s	max.500bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.5m/s	max.500bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-30°C	110°C	max.0,5m/s	max.200bar	NBR 85°	NBR70°/FPM75°
-20°C	150°C	max.0,5m/s	max.200bar	H-NBR 85°	NBR70°/FPM75°
-20°C	220°C	max.0,5m/s	max.200bar	FPM 82°	NBR70°/FPM75°
-45°C	130°C	max.0,5m/s	max.200bar	EPDM 85°	NBR70°/FPM75°
-60°C	200°C	max.0,4m/s	max.200bar	MVQ 85°	NBR70°/FPM75°

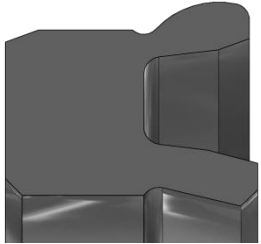
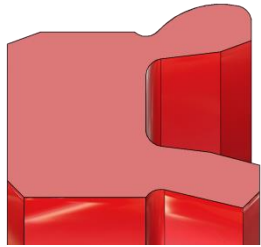
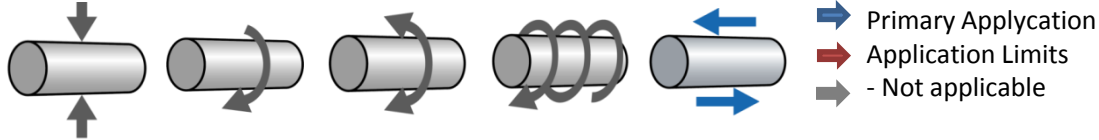
DK104-R





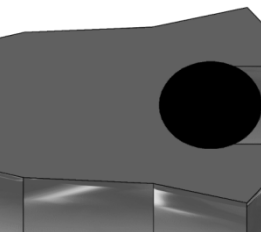
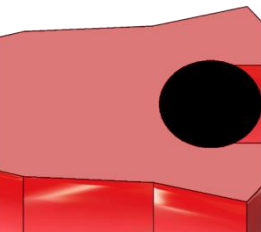
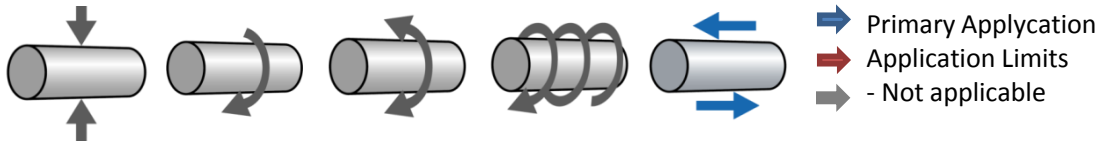
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.1m/s	max.25bar	HPU 94°	
-20°C	115°C	max.0.1m/s	max.25bar	HPU 55°D	
-20°C	110°C	max.0.2m/s	max.25bar	SL-PU 94°	
-50°C	110°C	max.0.1m/s	max.25bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.1m/s	max.25bar	NBR 85°	
-20°C	150°C	max.1m/s	max.25bar	H-NBR 85°	
-20°C	220°C	max.1m/s	Max.25bar	FPM 82°	
-45°C	130°C	max.1m/s	max.25bar	EPDM 85°	
-60°C	200°C	max.0,5m/s	max.25bar	MVQ 85°	

DK105



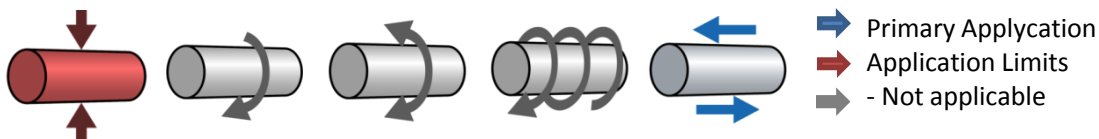
min Temp	max Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.1m/s	max.25bar	HPU 94°	
-20°C	115°C	max.1m/s	max.25bar	HPU 55°D	
-20°C	110°C	max.1m/s	max.25bar	SL-PU 94°	
-50°C	110°C	max.1m/s	max.25bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.1m/s	max.25bar	NBR 85°	
-20°C	150°C	Max.1m/s	max.25bar	H-NBR 85°	
-20°C	220°C	max.1m/s	max.25bar	FPM 82°	
-45°C	130°C	max.1m/s	max.25bar	EPDM 85°	
-60°C	200°C	max.0,5m/s	max.25bar	MVQ 85°	

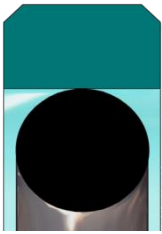
DK205



min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-20°C	115°C	max.0.5m/s	max.400bar	HPU 94°	NBR70°/FPM75°
-20°C	115°C	max.0.5m/s	max.400bar	HPU 55°D	NBR70°/FPM75°
-20°C	110°C	max.0.7m/s	max.400bar	SL-PU 94°	NBR70°/FPM75°
-50°C	110°C	max.0.5m/s	max.400bar	LT-PU 94°	NBR70°/FPM75°
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-30°C	110°C	max.0,5m/s	max.160bar	NBR 85°	NBR70°/FPM75°
-20°C	150°C	max.0,5m/s	max.160bar	H-NBR 85°	NBR70°/FPM75°
-20°C	220°C	max.0,5m/s	max.160bar	FPM 82°	NBR70°/FPM75°
-45°C	130°C	max.0,5m/s	max.160bar	EPDM 85°	NBR70°/FPM75°
-60°C	200°C	max.0,2m/s	max.120bar	MVQ 85°	NBR70°/FPM75°

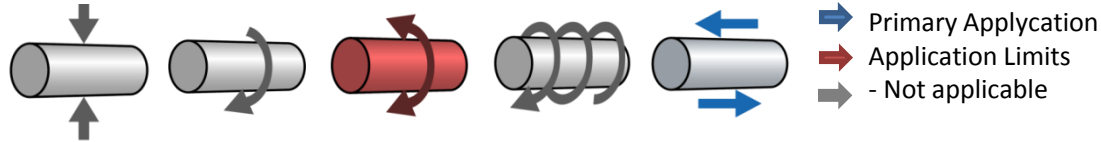
DK107





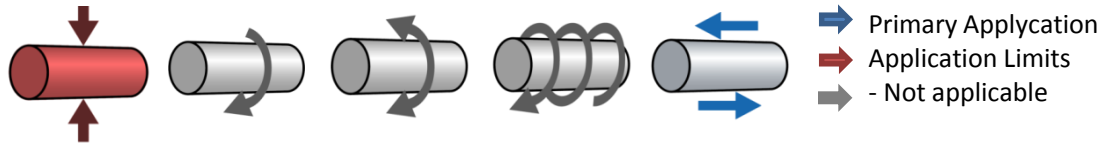
min Temp	max Temp	max. Speed	max. Pressure	Material / O-Ring	
-200°C	260°C	max.10m/s	max.400bar	PTFE pure	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE 1glass	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE 2 bronze	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE carbone	NBR70°/FPM75°
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-200°C	260°C	max.10m/s	max.400bar	PTFE D05turqu	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE D05glass	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE graphite	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE ekonol	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE 25%glass	NBR70°/FPM75°

DK108



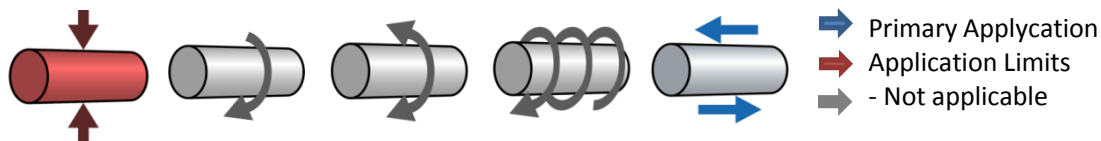
min Temp	max Temp	max. Speed	max. Pressure	Material / Backring	
-20°C	115°C	max.0.5m/s	max.400bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.5m/s	max.400bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.5m/s	max.400bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Energizer	
-30°C	110°C	max.000m/s	max.000bar	NBR 85°	-
-20°C	150°C	max.000m/s	max.000bar	H-NBR 85°	-
-20°C	220°C	max.000m/s	max.000bar	FPM 82°	-
-45°C	130°C	max.000m/s	max.000bar	EPDM 85°	-
-60°C	200°C	max.000m/s	max.000bar	MVQ 85°	-

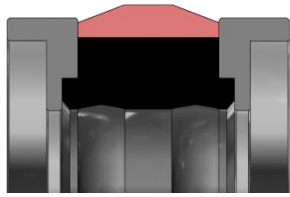
DK109



min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backring	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.4m/s	max.400bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.4m/s	max.400bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Energizer	
-30°C	110°C	max.000m/s	max.000bar	NBR 85°	-
-20°C	150°C	max.000m/s	max.000bar	H-NBR 85°	-
-20°C	220°C	max.000m/s	max.000bar	FPM 82°	-
-45°C	130°C	max.000m/s	max.000bar	EPDM 85°	-
-60°C	200°C	max.000m/s	max.000bar	MVQ 85°	-

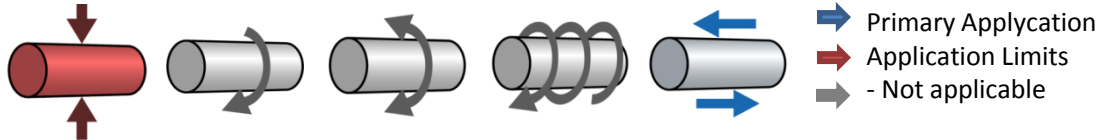
DK109D





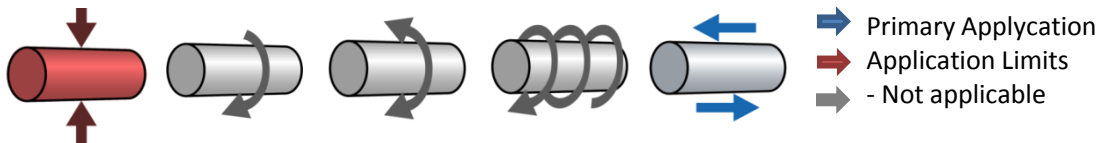
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backring	
-20°C	115°C	max.0.5m/s	max.700bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.5m/s	max.700bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.7m/s	max.700bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.5m/s	max.700bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Energizer	
-30°C	110°C	max.000m/s	max.000bar	NBR 85°	-
-20°C	150°C	max.000m/s	max.000bar	H-NBR 85°	-
-20°C	220°C	max.000m/s	max.000bar	FPM 82°	-
-45°C	130°C	max.000m/s	max.000bar	EPDM 85°	-
-60°C	200°C	max.000m/s	max.000bar	MVQ 85°	-

DK109H



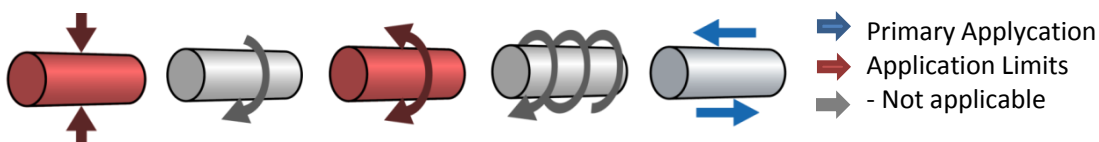
min Temp	max Temp	max. Speed	max. Pressure	Material / Backring	
-20°C	115°C	max.0.5m/s	max.400bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.5m/s	max.400bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.7m/s	max.400bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.5m/s	max.400bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Energizer	
-30°C	110°C	max.000m/s	max.000bar	NBR 85°	-
-20°C	150°C	max.000m/s	max.000bar	H-NBR 85°	-
-20°C	220°C	max.000m/s	max.000bar	FPM 82°	-
-45°C	130°C	max.000m/s	max.000bar	EPDM 85°	-
-60°C	200°C	max.000m/s	max.000bar	MVQ 85°	-

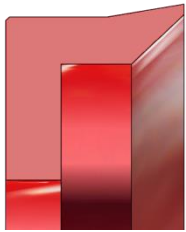
DK109N



min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backring	
-20°C	115°C	max.0.5m/s	max.500bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.5m/s	max.500bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.7m/s	max.500bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.5m/s	max.500bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backring	
-30°C	110°C	max.0,4m/s	max.160bar	NBR 85°	POM/PTFE/PEEK
-20°C	150°C	max.0,4m/s	max.160bar	H-NBR 85°	POM/PTFE/PEEK
-20°C	220°C	max.0,4m/s	max.160bar	FPM 82°	POM/PTFE/PEEK
-45°C	130°C	max.0,4m/s	max.160bar	EPDM 85°	POM/PTFE/PEEK
-60°C	200°C	max.0,4m/s	max.120bar	MVQ 85°	POM/PTFE/PEEK

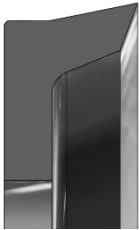
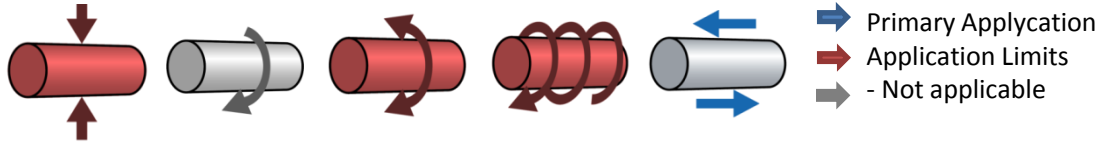
DK110/112





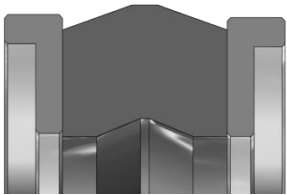
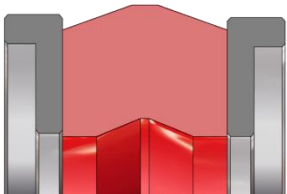
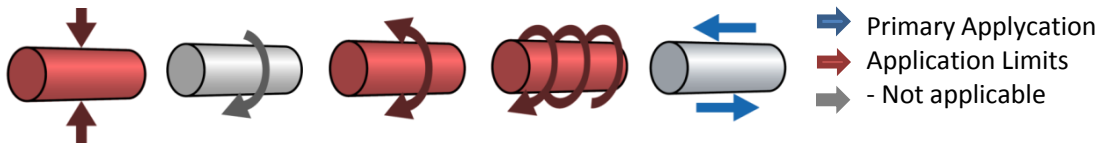
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.4m/s	max.160bar	HPU 94°	
-20°C	115°C	max.0.4m/s	max.160bar	HPU 55°D	
-20°C	110°C	max.0.5m/s	max.160bar	SL-PU 94°	
-50°C	110°C	max.0.4m/s	max.160bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,4m/s	max.120bar	NBR 85°	
-20°C	150°C	max.0,4m/s	max.120bar	H-NBR 85°	
-20°C	220°C	max.0,4m/s	max.120bar	FPM 82°	
-45°C	130°C	max.0,4m/s	max.120bar	EPDM 85°	
-60°C	200°C	max.0,4m/s	max.120bar	MVQ 85°	

DK116



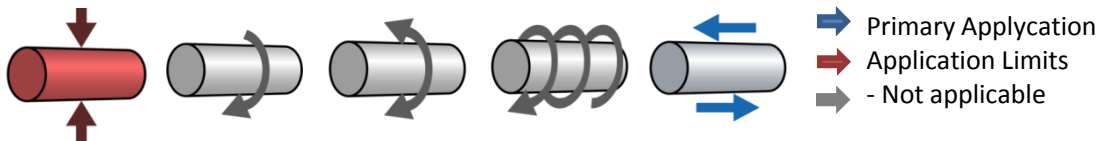
min Temp	max Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.4m/s	max.160bar	HPU 94°	
-20°C	115°C	max.0.4m/s	max.160bar	HPU 55°D	
-20°C	110°C	max.0.5m/s	max.160bar	SL-PU 94°	
-50°C	110°C	max.0.4m/s	max.160bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,4m/s	max.160bar	NBR 85°	
-20°C	150°C	max.0,4m/s	max.160bar	H-NBR 85°	
-20°C	220°C	max.0,4m/s	max.160bar	FPM 82°	
-45°C	130°C	max.0,4m/s	max.160bar	EPDM 85°	
-60°C	200°C	max.0,4m/s	max.120bar	MVQ 85°	

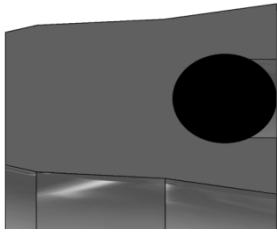
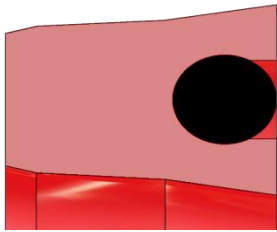
DK216



min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backring	
-20°C	115°C	max.0.5m/s	max.250bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.5m/s	max.250bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.7m/s	max.250bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.5m/s	max.250bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backring	
-30°C	110°C	max.0,5m/s	max.200bar	NBR 85°	POM/PTFE/PEEK
-20°C	150°C	max.0,5m/s	max.200bar	H-NBR 85°	POM/PTFE/PEEK
-20°C	220°C	max.0,5m/s	max.200bar	FPM 82°	POM/PTFE/PEEK
-45°C	130°C	max.0,5m/s	max.200bar	EPDM 85°	POM/PTFE/PEEK
-60°C	200°C	max.0,5m/s	max.200bar	MVQ 85°	POM/PTFE/PEEK

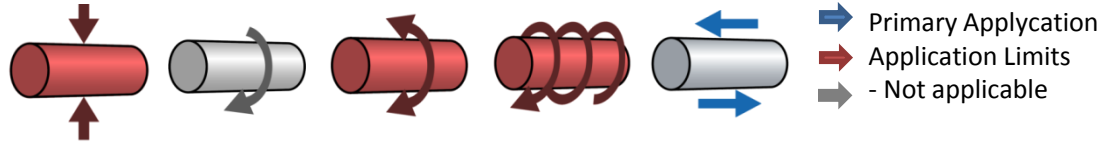
DK117





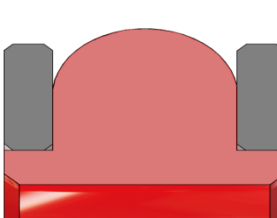
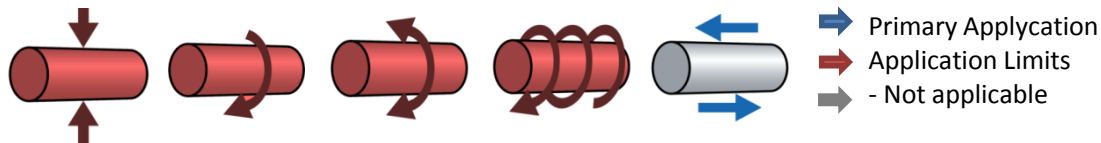
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 94°	NBR70°,FPM75°
-20°C	115°C	max.0.4m/s	max.400bar	HPU 55°D	NBR70°,FPM75°
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	NBR70°,FPM75°
-50°C	110°C	max.0.4m/s	max.400bar	LT-PU 94°	NBR70°,FPM75°
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-30°C	110°C	max.0,5m/s	max.160bar	NBR 85°	NBR70°,FPM75°
-20°C	150°C	max.0,5m/s	max.160bar	H-NBR 85°	NBR70°,FPM75°
-20°C	220°C	max.0,5m/s	max.160bar	FPM 82°	NBR70°,FPM75°
-45°C	130°C	max.0,5m/s	max.160bar	EPDM 85°	NBR70°,FPM75°
-60°C	200°C	max.0,4m/s	max.120bar	MVQ 85°	NBR70°,FPM75°

DK118



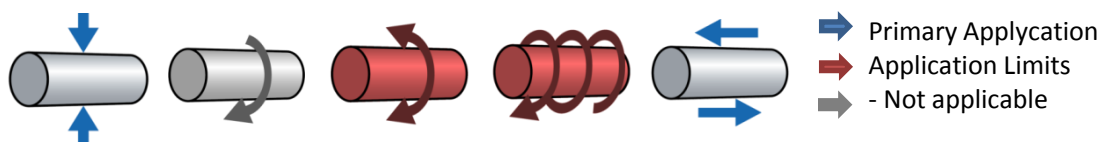
min Temp	max Temp	max. Speed	max. Pressure	Material / Spring	
-200°C	260°C	max.15m/s	max.100bar	PTFE pure	1.4310
-200°C	260°C	max.15m/s	max.160bar	PTFE 1glass	1.4310
-200°C	260°C	max.15m/s	max.160bar	PTFE 2 bronze	1.4310
-200°C	260°C	max.15m/s	max.100bar	PTFE carbone	1.4310
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Spring	
-200°C	260°C	max.15m/s	max.100bar	PTFE D05 turq	1.4310
-200°C	260°C	max.15m/s	max.160bar	PTFE D05 glass	1.4310
-200°C	260°C	max.15m/s	max.160bar	PTFE graphite	1.4310
-200°C	260°C	max.15m/s	max.160bar	PTFE ekonol	1.4310
-200°C	260°C	max.15m/s	max.160bar	PTFE 25%glass	1.4310

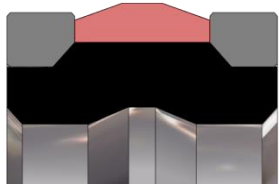
DK119



min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backring	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.4m/s	max.400bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.4m/s	max.400bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backring	
-30°C	110°C	max.0,5m/s	max.160bar	NBR 85°	POM/PTFE/PEEK
-20°C	150°C	max.0,5m/s	max.160bar	H-NBR 85°	POM/PTFE/PEEK
-20°C	220°C	max.0,5m/s	max.160bar	FPM 82°	POM/PTFE/PEEK
-45°C	130°C	max.0,5m/s	max.160bar	EPDM 85°	POM/PTFE/PEEK
-60°C	200°C	max.0,4m/s	max.120bar	MVQ 85°	POM/PTFE/PEEK

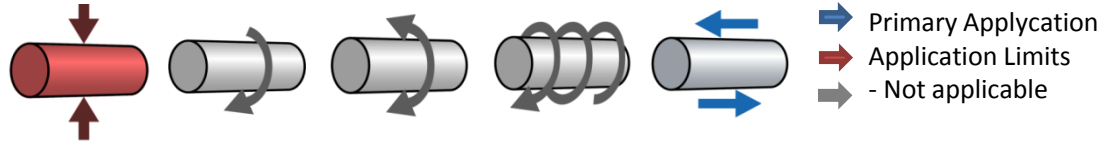
DK120





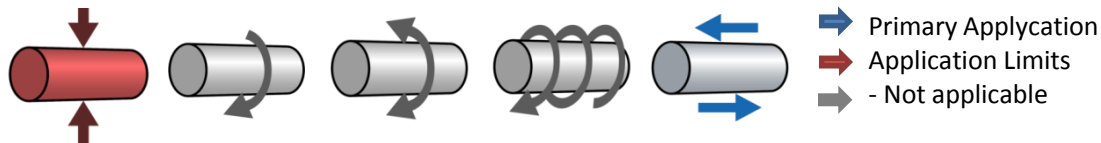
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backring	
-20°C	115°C	max.0.5m/s	max.400bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.5m/s	max.400bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.7m/s	max.400bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.5m/s	max.400bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Energizer	
-30°C	110°C	max.000m/s	max.000bar	NBR 85°	-
-20°C	150°C	max.000m/s	max.000bar	H-NBR 85°	-
-20°C	220°C	max.000m/s	max.000bar	FPM 82°	-
-45°C	130°C	max.000m/s	max.000bar	EPDM 85°	-
-60°C	200°C	max.000m/s	max.000bar	MVQ 85°	-

DK122



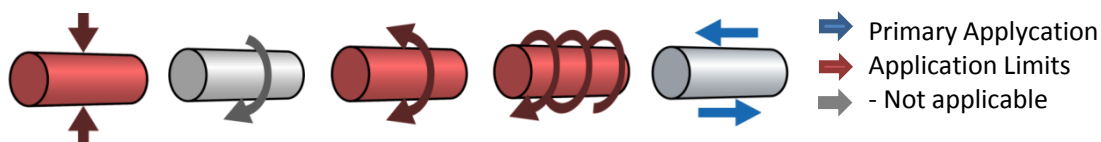
min Temp	max Temp	max. Speed	max. Pressure	Material / Backring	
-200°C	260°C	max.1,5m/s	max.400bar	PTFE pure	POM/PTFE/PEEK
-200°C	260°C	max.1,5m/s	max.450bar	PTFE 1glass	POM/PTFE/PEEK
-200°C	260°C	max.1,5m/s	max.450bar	PTFE 2 bronze	POM/PTFE/PEEK
-200°C	260°C	max.1,5m/s	max.450bar	PTFE carbone	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Energizer	
-200°C	260°C	max.000m/s	max.000bar	NBR 85°	-
-200°C	260°C	max.000m/s	max.000bar	H-NBR 85°	-
-200°C	260°C	max.000m/s	max.000bar	FPM 82°	-
-200°C	260°C	max.000m/s	max.000bar	EPDM 85°	-
-200°C	260°C	max.000m/s	max.000bar	MVQ 85°	-

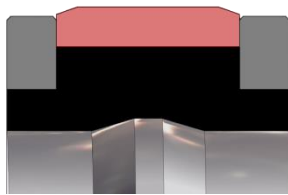
DK222



min.Temp	max.Temp	max. Speed	max. Pressure	Material / Retainerring	
-20°C	115°C	max.0.5m/s	max.400bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.5m/s	max.400bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.7m/s	max.400bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.5m/s	max.400bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Retainerring	
-30°C	110°C	max.0,5m/s	max.160bar	NBR 85°	POM/PTFE/PEEK
-20°C	150°C	max.0,5m/s	max.160bar	H-NBR 85°	POM/PTFE/PEEK
-20°C	220°C	max.0,5m/s	max.160bar	FPM 82°	POM/PTFE/PEEK
-45°C	130°C	max.0,5m/s	max.160bar	EPDM 85°	POM/PTFE/PEEK
-60°C	200°C	max.0,4m/s	max.120bar	MVQ 85°	POM/PTFE/PEEK

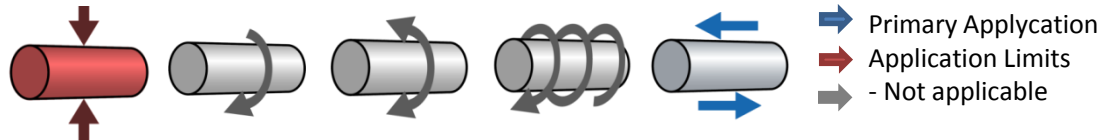
DK123





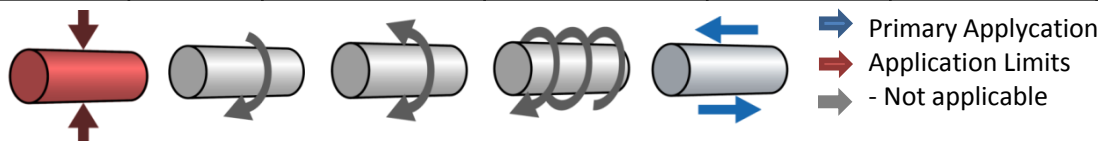
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backring	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.4m/s	max.400bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.4m/s	max.400bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Energizer	
-30°C	110°C	max.000m/s	max.00bar	NBR 85°	
-20°C	150°C	max.000m/s	max.000bar	H-NBR 85°	
-20°C	220°C	max.000m/s	max.000bar	FPM 82°	
-45°C	130°C	max.000m/s	max.000bar	EPDM 85°	
-60°C	200°C	max.000m/s	max.000bar	MVQ 85°	

DK123D



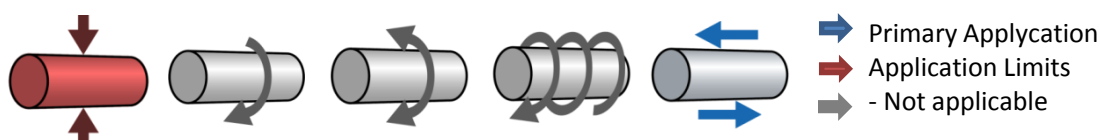
min Temp	max Temp	max. Speed	max. Pressure	Material / Backring	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.4m/s	max.400bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.4m/s	max.400bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Energizer	
-30°C	110°C	max.000m/s	max.000bar	NBR 85°	
-20°C	150°C	max.000m/s	max.000bar	H-NBR 85°	
-20°C	220°C	max.000m/s	max.000bar	FPM 82°	
-45°C	130°C	max.000m/s	max.000bar	EPDM 85°	
-60°C	200°C	max.000m/s	max.000bar	MVQ 85°	

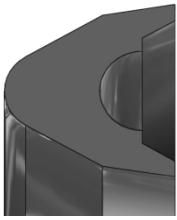
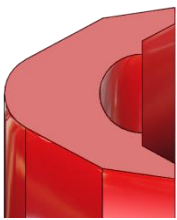
DK123H



min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backring	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.4m/s	max.400bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.4m/s	max.400bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Engrizer	
-30°C	110°C	max.000m/s	max.000bar	NBR 85°	
-20°C	150°C	max.000m/s	max.000bar	H-NBR 85°	
-20°C	220°C	max.000m/s	max.000bar	FPM 82°	
-45°C	130°C	max.000m/s	max.000bar	EPDM 85°	
-60°C	200°C	max.000m/s	max.000bar	MVQ 85°	

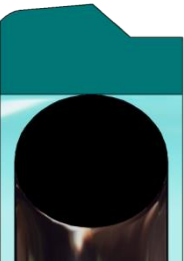
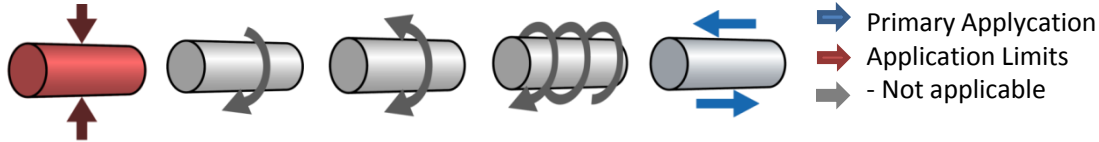
DK123N





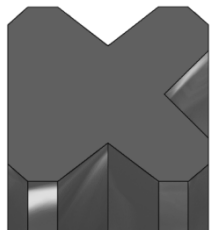
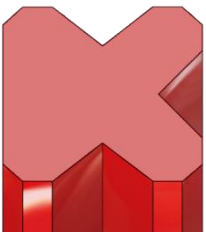
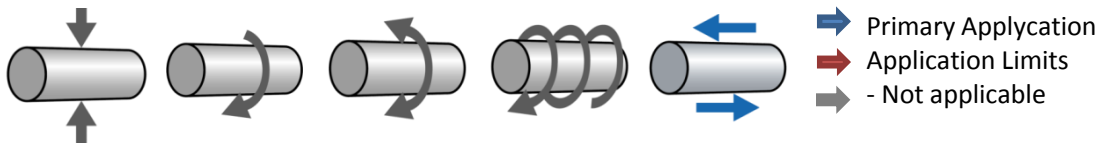
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.5m/s	max.400bar	HPU 94°	
-20°C	115°C	max.0.5m/s	max.400bar	HPU 55°D	
-20°C	110°C	max.0.7m/s	max.400bar	SL-PU 94°	
-50°C	110°C	max.0.5m/s	max.400bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,5m/s	max.260bar	NBR 85°	
-20°C	150°C	max.0,5m/s	max.260bar	H-NBR 85°	
-20°C	220°C	max.0,5m/s	max.260bar	FPM 82°	
-45°C	130°C	max.0,5m/s	max.260bar	EPDM 85°	
-60°C	200°C	max.0,4m/s	max.220bar	MVQ 85°	

DK124



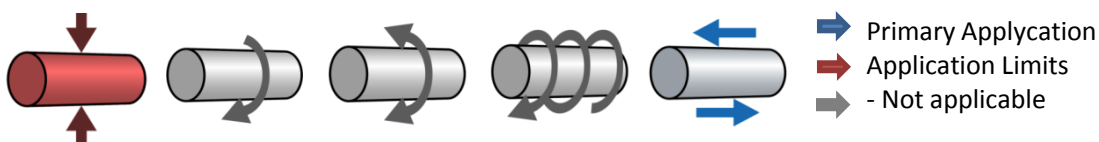
min Temp	max Temp	max. Speed	max. Pressure	Material / O-Ring	
-200°C	260°C	max.10m/s	max.400bar	PTFE pure	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE 1glass	NBR70° /FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE 2 bronze	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE carbone	NBR70°/FPM75°
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-200°C	260°C	max.10m/s	max.400bar	PTFED05turqu	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE D05glass	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE graphite	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE ekonol	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE 25%glass	NBR70°/FPM75°

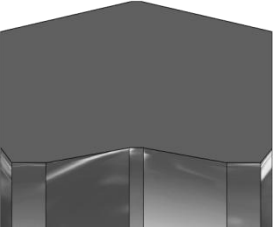
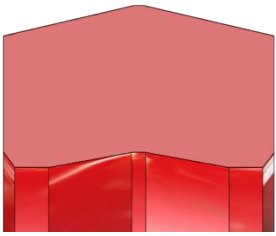
DK125



min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.000m/s	max.000bar	HPU 94°	
-20°C	115°C	max.000m/s	max.000bar	HPU 55°D	
-20°C	110°C	max.000m/s	max.000bar	SL-PU 94°	
-50°C	110°C	max.000m/s	max.000bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.000m/s	max.000bar	NBR 85°	
-20°C	150°C	max.000m/s	max.000bar	H-NBR 85°	
-20°C	220°C	max.000m/s	max.000bar	FPM 82°	
-45°C	130°C	max.000m/s	max.000bar	EPDM 85°	
-60°C	200°C	max.000m/s	max.000bar	MVQ 85°	

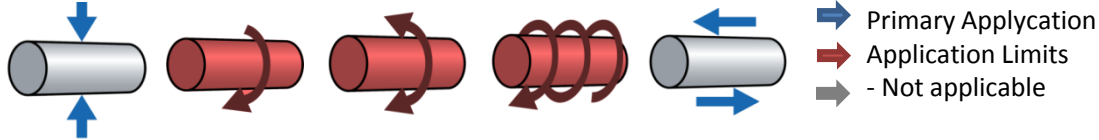
DK126





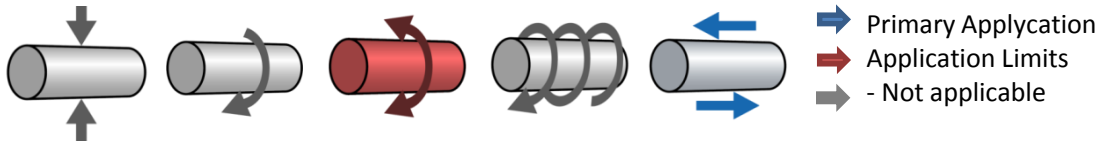
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 94°	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 55°D	
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	
-50°C	110°C	max.0.4m/s	max.400bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,4m/s	max.160bar	NBR 85°	
-20°C	150°C	max.0,4m/s	max.160bar	H-NBR 85°	
-20°C	220°C	max.0,4m/s	max.160bar	FPM 82°	
-45°C	130°C	max.0,4m/s	max.160bar	EPDM 85°	
-60°C	200°C	max.0,4m/s	max.120bar	MVQ 85°	

DK127



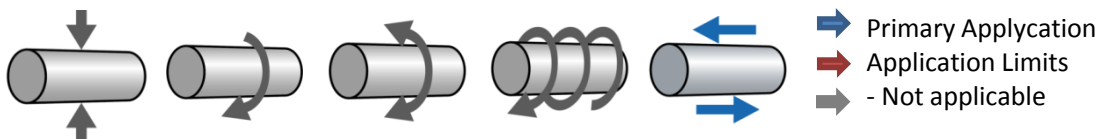
min Temp	max Temp	max. Speed	max. Pressure	Material / Energizer	
-200°C	260°C	max.10m/s	max.400bar	PTFE pure	NBR 85°
-200°C	260°C	max.10m/s	max.400bar	PTFE 1glass	H-NBR 85°
-200°C	260°C	max.10m/s	max.400bar	PTFE 2 bronze	FPM 82°
-200°C	260°C	max.10m/s	max.400bar	PTFE carbone	EPDM85°
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200°C	260°C	max.10m/s	max.400bar	PTFE D05 turq	
-200°C	260°C	max.10m/s	max.400bar	PTFE D05 glass	
-200°C	260°C	max.10m/s	max.400bar	PTFE graphite	
-200°C	260°C	max.10m/s	max.400bar	PTFE ekonol	
-200°C	260°C	max.10m/s	max.400bar	PTFE 25%glass	

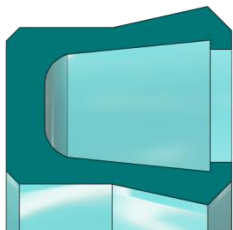
DK138



min Temp	max Temp	max. Speed	max. Pressure	Material / Energizer	
-200°C	260°C	max.10m/s	max.400bar	PTFE pure	NBR 85°
-200°C	260°C	max.10m/s	max.400bar	PTFE 1glass	H-NBR 85°
-200°C	260°C	max.10m/s	max.400bar	PTFE 2 bronze	FPM 82°
-200°C	260°C	max.10m/s	max.400bar	PTFE carbone	EPDM85°
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200°C	260°C	max.10m/s	max.400bar	PTFE D05 turq	
-200°C	260°C	max.10m/s	max.400bar	PTFE D05 glass	
-200°C	260°C	max.10m/s	max.400bar	PTFE graphite	
-200°C	260°C	max.10m/s	max.400bar	PTFE ekonol	
-200°C	260°C	max.10m/s	max.400bar	PTFE 25%glass	

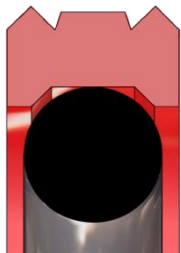
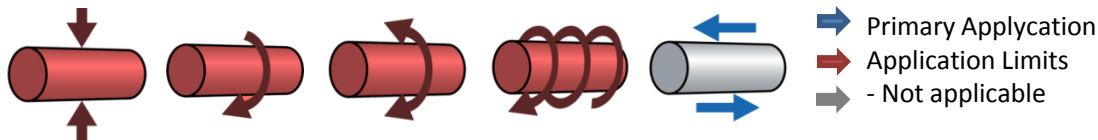
DK238





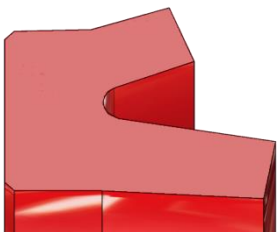
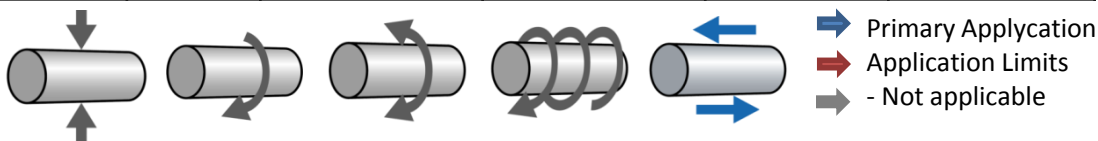
min Temp	max Temp	max. Speed	max. Pressure	Material / Spring	
-200°C	260°C	max.15m/s	max.100bar	PTFE pure	1.4310
-200°C	260°C	max.15m/s	max.160bar	PTFE 1glass	1.4310
-200°C	260°C	max.15m/s	max.160bar	PTFE 2 bronze	1.4310
-200°C	260°C	max.15m/s	max.100bar	PTFE carbone	1.4310
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Spring	
-200°C	260°C	max.15m/s	max.100bar	PTFE D05 turq	1.4310
-200°C	260°C	max.15m/s	max.160bar	PTFE D05 glass	1.4310
-200°C	260°C	max.15m/s	max.160bar	PTFE graphite	1.4310
-200°C	260°C	max.15m/s	max.160bar	PTFE ekonol	1.4310
-200°C	260°C	max.15m/s	max.160bar	PTFE 25%glass	1.4310

DK139



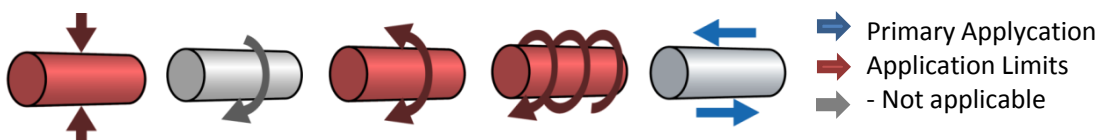
min Temp	max Temp	max. Speed	max. Pressure	Material / O-Ring	
-20°C	115°C	max.1m/s	max.400bar	HPU 94°	NBR70°/FPM75°
-20°C	115°C	max.1m/s	max.400bar	HPU 55°D	NBR70°/FPM75°
-20°C	110°C	max.1.4m/s	max.400bar	SL-PU 94°	NBR70°/FPM75°
-50°C	110°C	max.1m/s	max.400bar	LT-PU 94°	NBR70°/FPM75°
min.Temp	max.Temp	max. Speed	max. Pressure	Material	

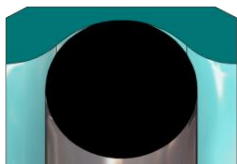
DK140



min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.5m/s	max.400bar	HPU 94°	
-20°C	115°C	max.0.5m/s	max.400bar	HPU 55°D	
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	
-50°C	110°C	max.0.5m/s	max.400bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,4m/s	max.160bar	NBR 85°	
-20°C	150°C	max.0,4m/s	max.160bar	H-NBR 85°	
-20°C	220°C	max.0,4m/s	max.160bar	FPM 82°	
-45°C	130°C	max.0,4m/s	max.160bar	EPDM 85°	
-60°C	200°C	max.0,3m/s	max.120bar	MVQ 85°	

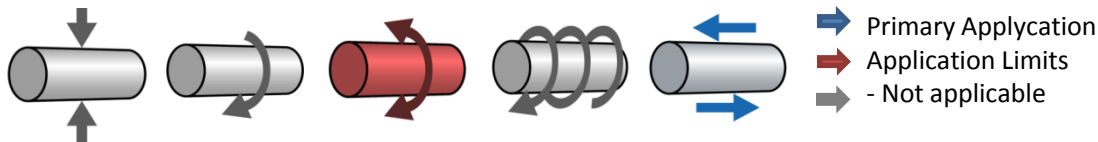
DK141





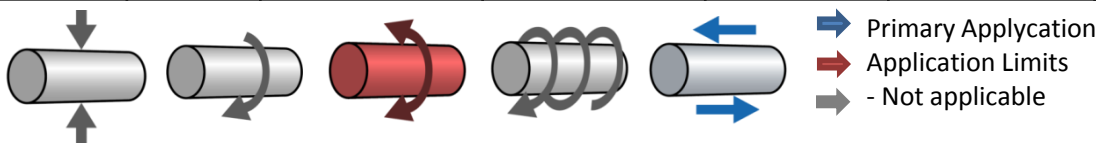
min Temp	max Temp	max. Speed	max. Pressure	Material / O-Ring	
-200°C	260°C	max.10m/s	max.400bar	PTFE pure	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE 1glass	NBR70° /FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE 2 bronze	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE carbone	NBR70°/FPM75°
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-200°C	260°C	max.10m/s	max.400bar	PTFE D05turqu	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE D05glass	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE graphite	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE ekonol	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE 25%glass	NBR70°/FPM75°

DK142



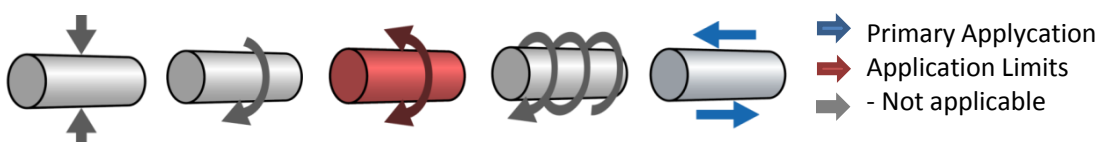
min Temp	max Temp	max. Speed	max. Pressure	Material / O-Ring	
-200°C	260°C	max.10m/s	max.400bar	PTFE pure	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE 1glass	NBR70° /FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE 2 bronze	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE carbone	NBR70°/FPM75°
min.Temp	max.Temp	max. Speed	max. Pressure	Material / X-Ring	
-200°C	260°C	max.10m/s	max.400bar	PTFE D05turqu	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE D05glass	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE graphite	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE ekonol	NBR70°/FPM75°
-200°C	260°C	max.10m/s	max.400bar	PTFE 25%glass	NBR70°/FPM75°

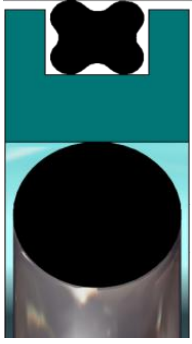
DK144



min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backring	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 94°	NBR 85°
-20°C	115°C	max.0.4m/s	max.400bar	HPU 55°D	H-NBR 85°
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	FPM 82°
-50°C	110°C	max.0.4m/s	max.400bar	LT-PU 94°	EPDM85°
min.Temp	max.Temp	max. Speed	max. Pressure	Material	

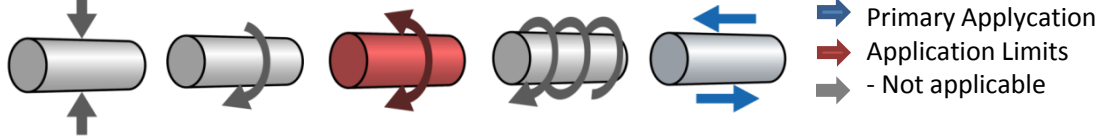
DK143





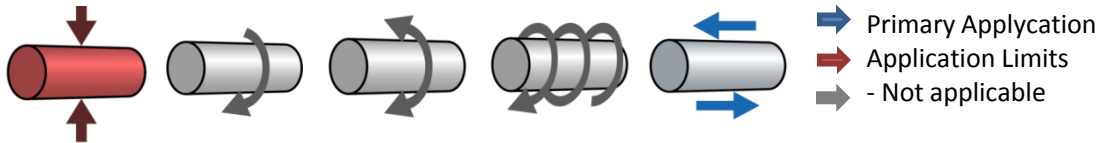
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 94°	NBR70°/FPM75°
-20°C	115°C	max.0.4m/s	max.400bar	HPU 55°D	NBR70°/FPM75°
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	NBR70°/FPM75°
-50°C	110°C	max.0.4m/s	max.400bar	LT-PU 94°	NBR70°/FPM75°
min.Temp	max.Temp	max. Speed	max. Pressure	Material / X-Ring	
-30°C	110°C	max.0,5m/s	max.160bar	NBR 85°	NBR70°/FPM75°
-20°C	150°C	max.0,5m/s	max.160bar	H-NBR 85°	NBR70°/FPM75°
-20°C	220°C	max.0,5m/s	max.160bar	FPM 82°	NBR70°/FPM75°
-45°C	130°C	max.0,5m/s	max.160bar	EPDM 85°	NBR70°/FPM75°
-60°C	200°C	max.0,4m/s	max.120bar	MVQ 85°	NBR70°/FPM75°

DK145



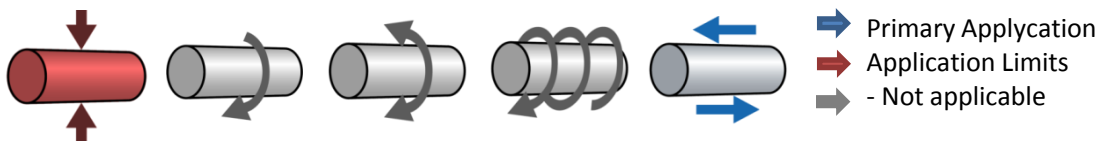
min Temp	max Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 94°	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 55°D	
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	
-50°C	110°C	max.0.4m/s	max.400bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,5m/s	max.160bar	NBR 85°	
-20°C	150°C	max.0,5m/s	max.160bar	H-NBR 85°	
-20°C	220°C	max.0,5m/s	max.160bar	FPM 82°	
-45°C	130°C	max.0,5m/s	max.160bar	EPDM 85°	
-60°C	200°C	max.0,4m/s	max.120bar	MVQ 85°	

DK199

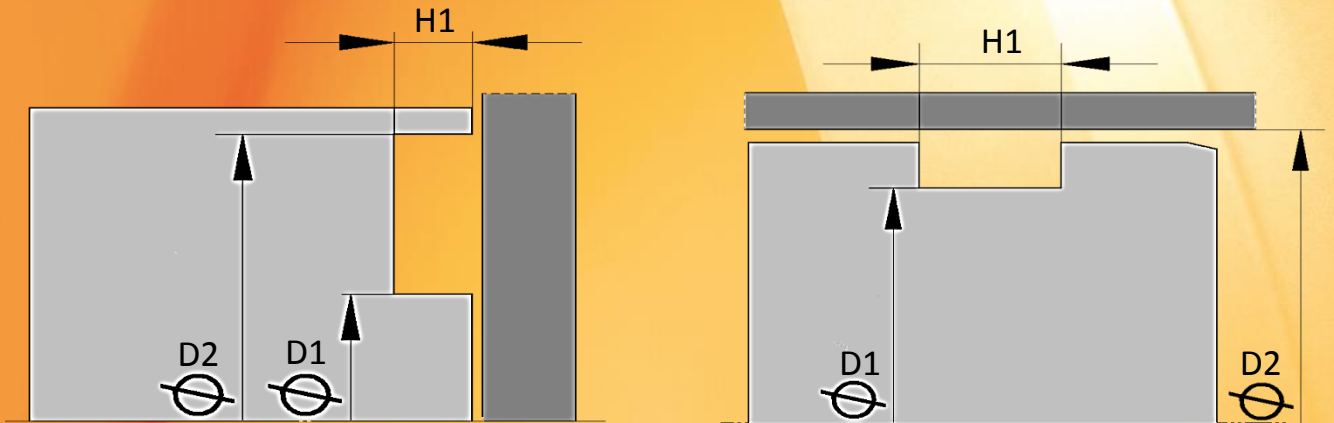


min Temp	max Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 94°	
-20°C	115°C	max.0.4m/s	max.400bar	HPU 55°D	
-20°C	110°C	max.0.5m/s	max.400bar	SL-PU 94°	
-50°C	110°C	max.0.4m/s	max.400bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,5m/s	max.160bar	NBR 85°	
-20°C	150°C	max.0,5m/s	max.160bar	H-NBR 85°	
-20°C	220°C	max.0,5m/s	max.160bar	FPM 82°	
-45°C	130°C	max.0,5m/s	max.160bar	EPDM 85°	
-60°C	200°C	max.0,4m/s	max.120bar	MVQ 85°	

DK106

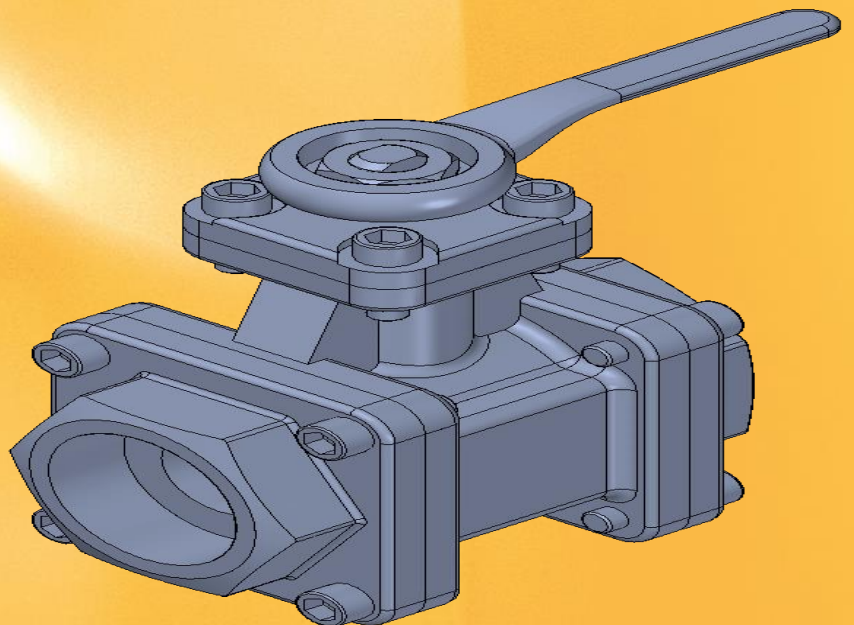


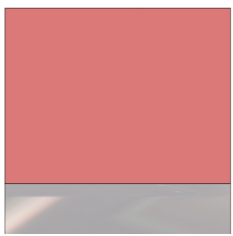
GASKETS



Gaskets are most frequently used part as static sealing elements. The availability of the widest variety of shapes and forms offers the greatest scope to designers in this area.

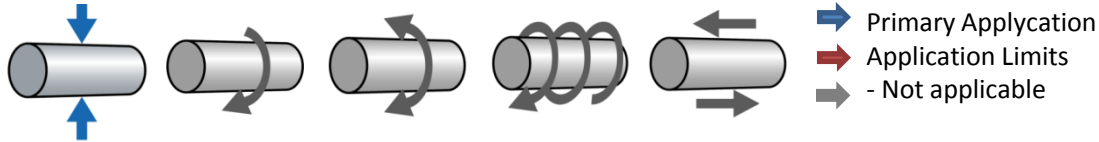
The selection of shape and form in these areas results mainly from the design of the system.





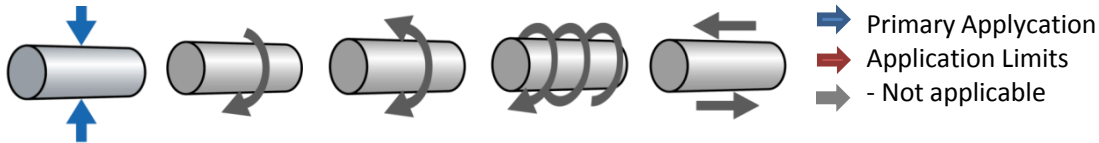
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C			HPU 94°	
-20°C	115°C			HPU 55°D	
-20°C	110°C			SL-PU 94°	
-50°C	110°C			LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C			NBR 85°	
-20°C	150°C			H-NBR 85°	
-20°C	220°C			FPM 82°	
-45°C	130°C			EPDM 85°	
-60°C	200°C			MVQ 85°	

DFL101

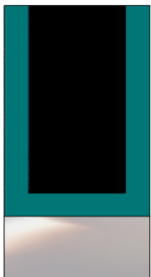


min Temp	max Temp	max. Speed	max. Pressure	Material	
-20°C	115°C			HPU 94°	
-20°C	115°C			HPU 55°D	
-20°C	110°C			SL-PU 94°	
-50°C	110°C			LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C			NBR 85°	
-20°C	150°C			H-NBR 85°	
-20°C	220°C			FPM 82°	
-45°C	130°C			EPDM 85°	
-60°C	200°C			MVQ 85°	

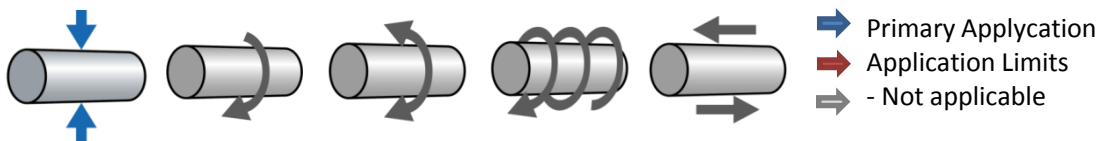
DFL102

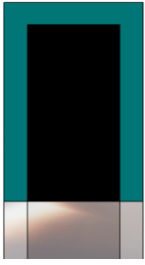


min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200°C	260°C			PTFE pure	
-200°C	260°C			PTFE graphite	
-200°C	260°C			PTFE carbone	
-200°C	260°C			PTFE D05turqu	
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Energizer	
-30°C	110°C			NBR 85°	
-20°C	150°C			H-NBR 85°	
-20°C	220°C			FPM 82°	
-45°C	130°C			EPDM 85°	
-60°C	200°C			MVQ 85°	



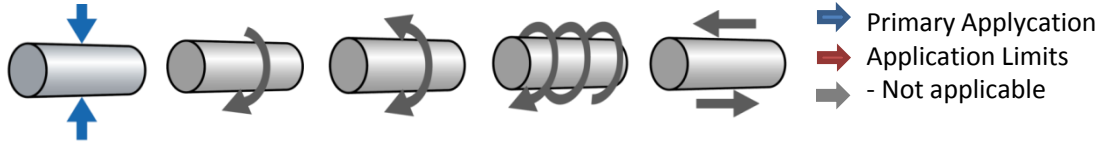
DFL103





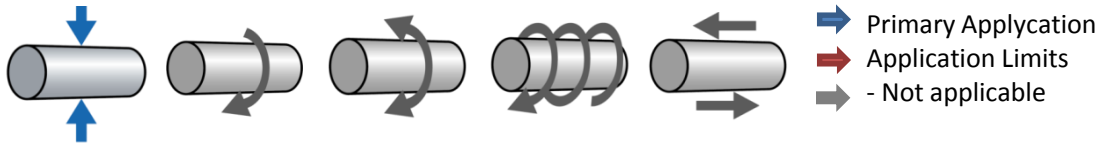
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200°C	260°C			PTFE pure	
-200°C	260°C			PTFE graphite	
-200°C	260°C			PTFE carbone	
-200°C	260°C			PTFE D05turqu	
min.Temp	max.Temp	max. Speed	max. Pressure	Material /	Energizer
-30°C	110°C			NBR 85°	
-20°C	150°C			H-NBR 85°	
-20°C	220°C			FPM 82°	
-45°C	130°C			EPDM 85°	
-60°C	200°C			MVQ 85°	

DFL104



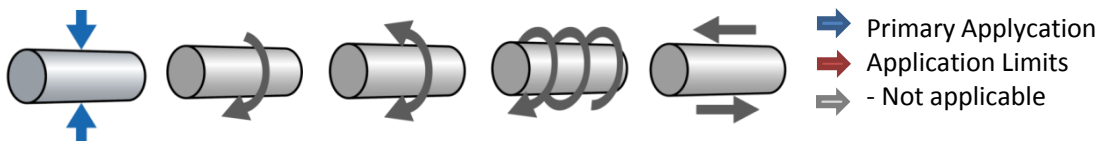
min Temp	max Temp	max. Speed	max. Pressure	Material	
-20°C	115°C			HPU 94°	
-20°C	115°C			HPU 55°D	
-20°C	110°C			SL-PU 94°	
-50°C	110°C			LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C			NBR 85°	
-20°C	150°C			H-NBR 85°	
-20°C	220°C			FPM 82°	
-45°C	130°C			EPDM 85°	
-60°C	200°C			MVQ 85°	

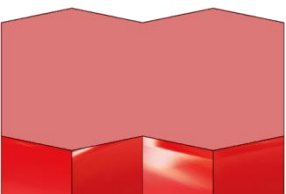
DFL105



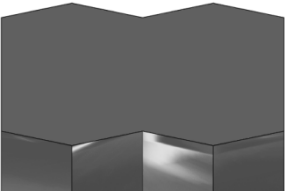
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C			HPU 94°	
-20°C	115°C			HPU 55°D	
-20°C	110°C			SL-PU 94°	
-50°C	110°C			LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C			NBR 85°	
-20°C	150°C			H-NBR 85°	
-20°C	220°C			FPM 82°	
-45°C	130°C			EPDM 85°	
-60°C	200°C			MVQ 85°	

DFL106

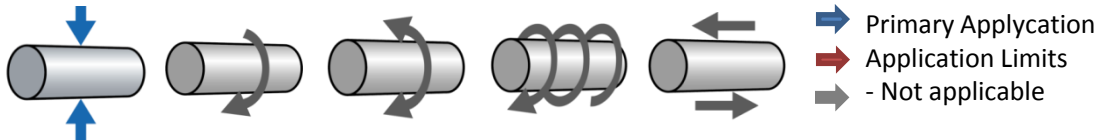




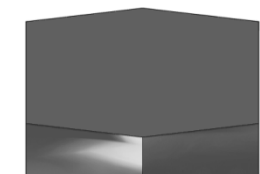
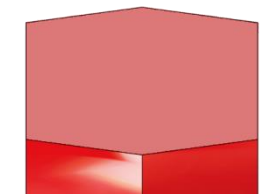
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C			HPU 94°	
-20°C	115°C			HPU 55°D	
-20°C	110°C			SL-PU 94°	
-50°C	110°C			LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C			NBR 85°	
-20°C	150°C			H-NBR 85°	
-20°C	220°C			FPM 82°	
-45°C	130°C			EPDM 85°	
-60°C	200°C			MVQ 85°	



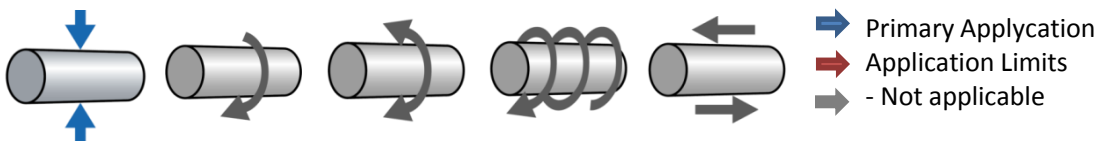
DFL108-2



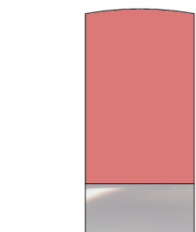
min Temp	max Temp	max. Speed	max. Pressure	Material	
-20°C	115°C			HPU 94°	
-20°C	115°C			HPU 55°D	
-20°C	110°C			SL-PU 94°	
-50°C	110°C			LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C			NBR 85°	
-20°C	150°C			H-NBR 85°	
-20°C	220°C			FPM 82°	
-45°C	130°C			EPDM 85°	
-60°C	200°C			MVQ 85°	



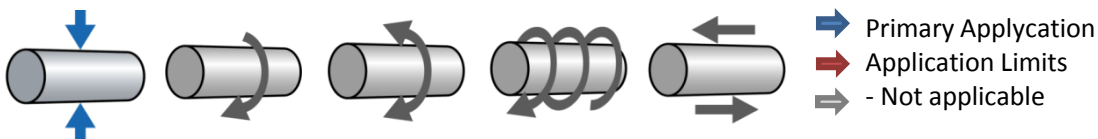
DFL108-1

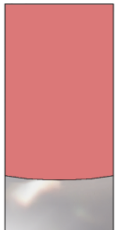


min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C			HPU 94°	
-20°C	115°C			HPU 55°D	
-20°C	110°C			SL-PU 94°	
-50°C	110°C			LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C			NBR 85°	
-20°C	150°C			H-NBR 85°	
-20°C	220°C			FPM 82°	
-45°C	130°C			EPDM 85°	
-60°C	200°C			MVQ 85°	



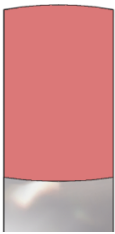
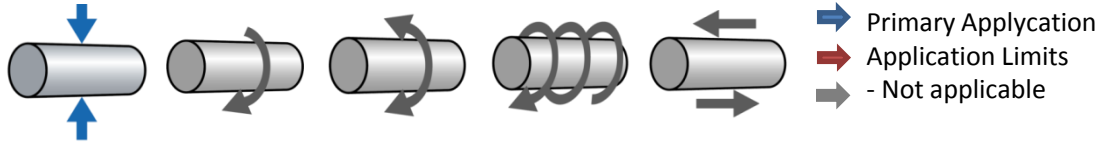
DFL109





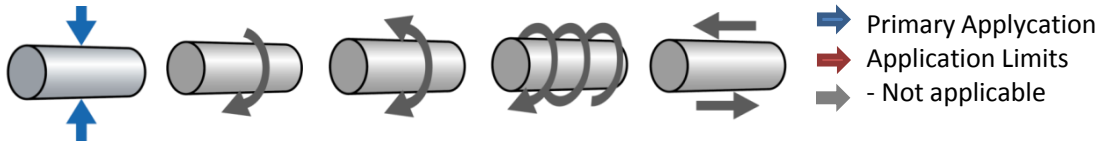
min Temp	max Temp	max. Speed	max. Pressure	Material	
-200°C	260°C			PTFE pure	
-200°C	260°C			PTFE 1glass	
-200°C	260°C			PTFE 2 bronze	
-200°C	260°C			PTFE carbone	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200°C	260°C			PTFE D05turqu	
-200°C	260°C			PTFE D05glass	
-200°C	260°C			PTFE graphite	
-200°C	260°C			PTFE ekonol	
-200°C	260°C			PTFE 25%glass	

DFL109-1



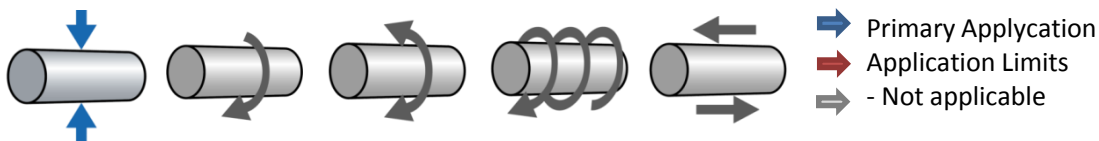
min Temp	max Temp	max. Speed	max. Pressure	Material	
-20°C	115°C			HPU 94°	
-20°C	115°C			HPU 55°D	
-20°C	110°C			SL-PU 94°	
-50°C	110°C			LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C			NBR 85°	
-20°C	150°C			H-NBR 85°	
-20°C	220°C			FPM 82°	
-45°C	130°C			EPDM 85°	
-60°C	200°C			MVQ 85°	

DFL109-2

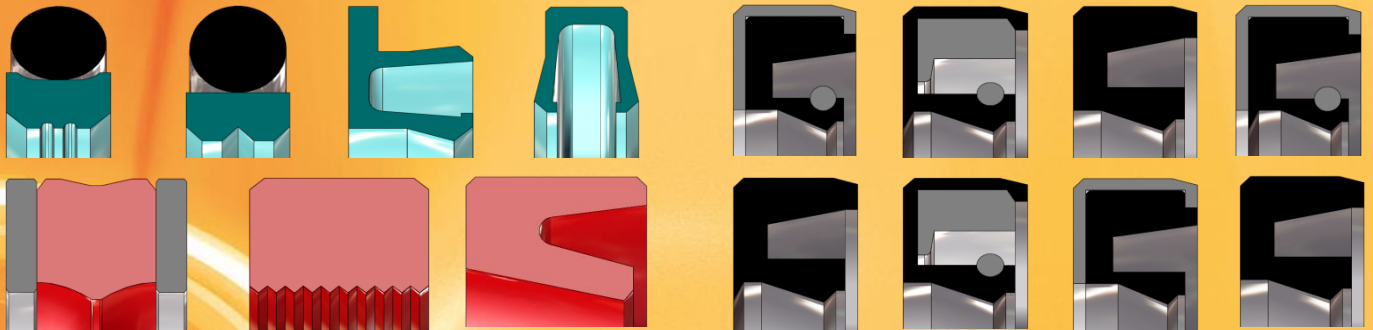
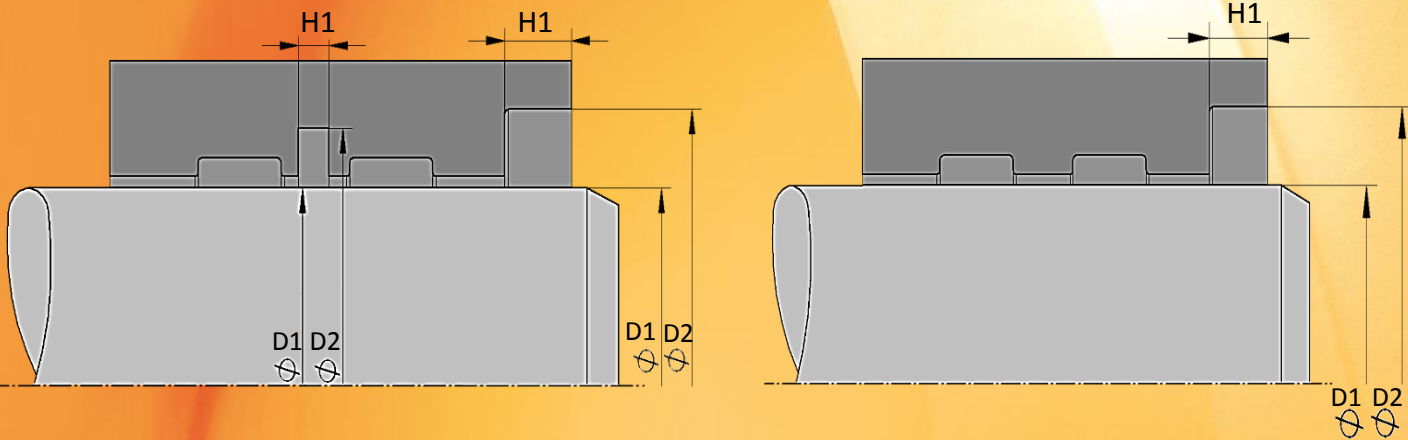


min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C			HPU 94°	
-20°C	115°C			HPU 55°D	
-20°C	110°C			SL-PU 94°	
-50°C	110°C			LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C			NBR 85°	
-20°C	150°C			H-NBR 85°	
-20°C	220°C			FPM 82°	
-45°C	130°C			EPDM 85°	
-60°C	200°C			MVQ 85°	

DFL110



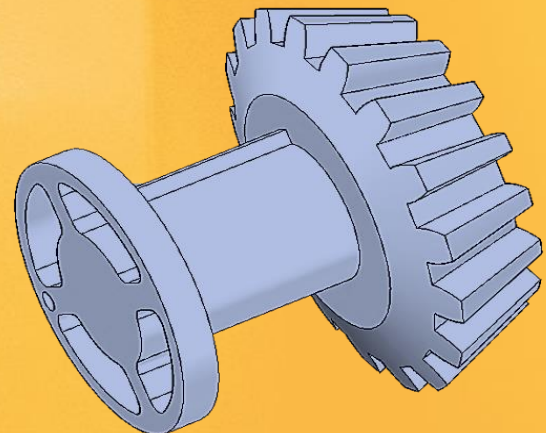
ROTARY SEALS

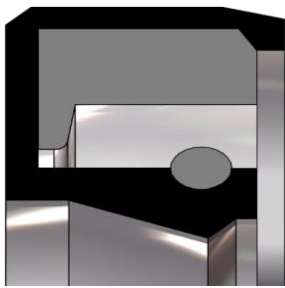


As the name suggests, this type of seal is suitable for sealing rotary (turning) parts. This is the most complex component in the entire field of sealing technology. Every manufacturer on the world market is continuously developing new techniques to avoid leakage from rotary shafts.

Attention should be paid to the following in order to make an approximate selection of the seal geometry:

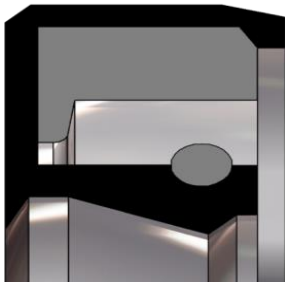
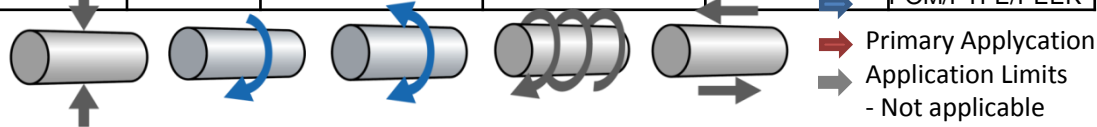
- Dirtiness load in the environment
- Space requirement
- Sliding speed – revolutions converted to m/sec
(important for design and material selection)
- Pressure load or pressure-free application
- Choice of material the counter rotation piece (shaft, etc.)
- Temperature and/or medium
(important for selection of material)





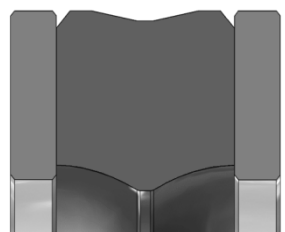
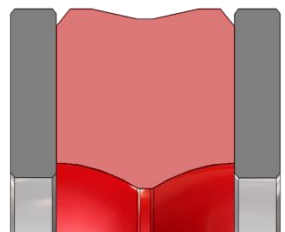
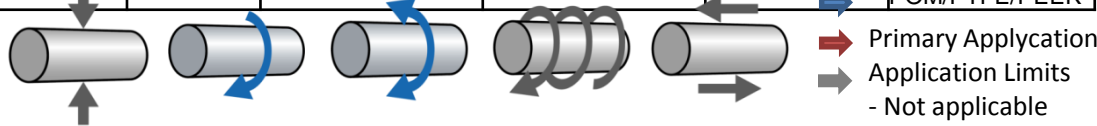
DR101

min Temp	max Temp	max. Speed	max. Pressure	Material / Backing	
-20°C	115°C	max.5m/s	max.0,5bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.5m/s	max.0,5bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.6m/s	max.0,5bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.5m/s	max.0,5bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backing	
-30°C	110°C	max.10m/s	max.0,5bar	NBR 85°	POM/PTFE/PEEK
-20°C	150°C	max.10m/s	max.0,5bar	H-NBR 85°	POM/PTFE/PEEK
-20°C	220°C	max.10m/s	max.0,5bar	FPM 82°	POM/PTFE/PEEK
-45°C	130°C	Max.10m/s	max.0,5bar	EPDM 85°	POM/PTFE/PEEK
-60°C	200°C	max.5m/s	max.0,2bar	MVQ 85°	POM/PTFE/PEEK



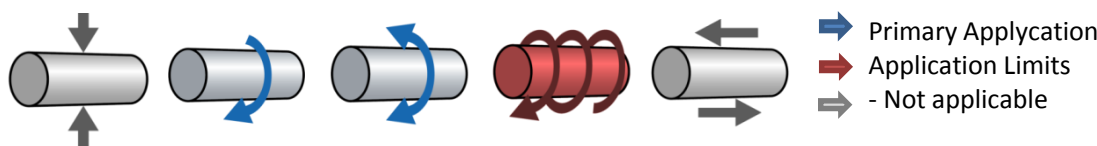
DR102

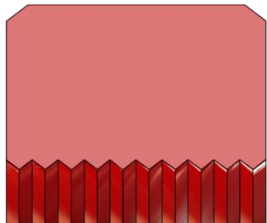
min Temp	max Temp	max. Speed	max. Pressure	Material / Backing	
-20°C	115°C	max.5m/s	max.0,5bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.5m/s	max.0,5bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.6m/s	max.0,5bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.5m/s	max.0,5bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backing	
-30°C	110°C	max.10m/s	max.0,5bar	NBR 85°	POM/PTFE/PEEK
-20°C	150°C	max.10m/s	max.0,5bar	H-NBR 85°	POM/PTFE/PEEK
-20°C	220°C	max.10m/s	max.0,5bar	FPM 82°	POM/PTFE/PEEK
-45°C	130°C	Max.10m/s	max.0,5bar	EPDM 85°	POM/PTFE/PEEK
-60°C	200°C	max.5m/s	max.0,2bar	MVQ 85°	POM/PTFE/PEEK



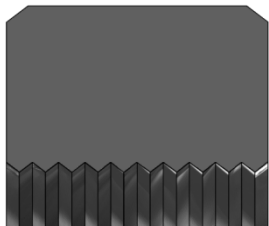
DR103

min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backing	
-20°C	115°C	max.0.2m/s	max.400bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.2m/s	max.400bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.3m/s	max.400bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.2m/s	max.400bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backing	
-30°C	110°C	max.0,2m/s	max.250bar	NBR 85°	POM/PTFE/PEEK
-20°C	150°C	max.0,2m/s	max.250bar	H-NBR 85°	POM/PTFE/PEEK
-20°C	220°C	max.0,2m/s	max.250bar	FPM 82°	POM/PTFE/PEEK
-45°C	130°C	max.0,2m/s	max.250bar	EPDM 85°	POM/PTFE/PEEK
-60°C	200°C	max.0,1m/s	max.150bar	MVQ 85°	POM/PTFE/PEEK

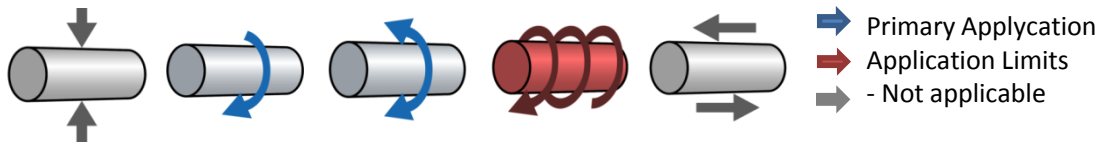




min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.2m/s	max.160bar	HPU 94°	
-20°C	115°C	max.0.2m/s	max.160bar	HPU 55°D	
-20°C	110°C	max.0.3m/s	max.160bar	SL-PU 94°	
-50°C	110°C	max.0.2m/s	max.160bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,2m/s	max.100bar	NBR 85°	
-20°C	150°C	max.0,2m/s	max.100bar	H-NBR 85°	
-20°C	220°C	max.0,2m/s	max.100bar	FPM 82°	
-45°C	130°C	max.0,2m/s	max.100bar	EPDM 85°	
-60°C	200°C	max.0,1m/s	max.100bar	MVQ 85°	



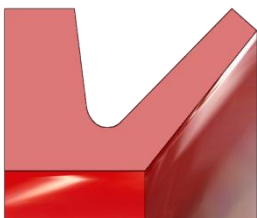
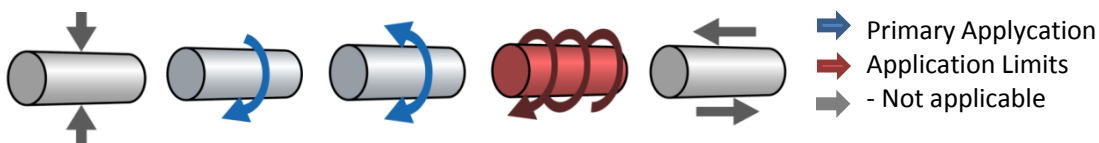
DR104



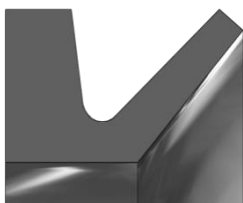
min Temp	max Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.2m/s	max.160bar	HPU 94°	
-20°C	115°C	max.0.2m/s	max.160bar	HPU 55°D	
-20°C	110°C	max.0.3m/s	max.160bar	SL-PU 94°	
-50°C	110°C	max.0.2m/s	max.160bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,2m/s	max.100bar	NBR 85°	
-20°C	150°C	max.0,2m/s	max.100bar	H-NBR 85°	
-20°C	220°C	max.0,2m/s	max.100bar	FPM 82°	
-45°C	130°C	max.0,2m/s	max.100bar	EPDM 85°	
-60°C	200°C	max.0,1m/s	max.100bar	MVQ 85°	



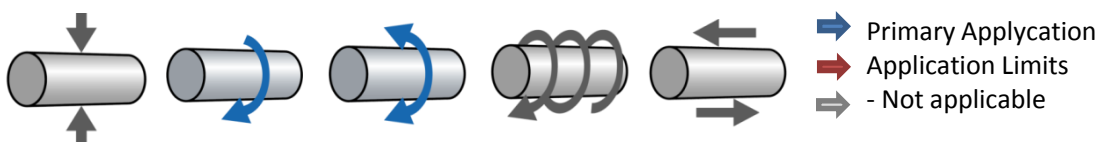
DR105

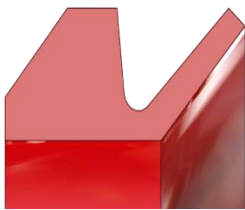


min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.25m/s	max.000bar	HPU 94°	
-20°C	115°C	max.25m/s	max.000bar	HPU 55°D	
-20°C	110°C	max.25m/s	max.000bar	SL-PU 94°	
-50°C	110°C	max.25m/s	max.000bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,2m/s	max.000bar	NBR 85°	
-20°C	150°C	max.0,2m/s	max.000bar	H-NBR 85°	
-20°C	220°C	max.0,2m/s	max.00bar	FPM 82°	
-45°C	130°C	max.0,2m/s	max.000bar	EPDM 85°	
-60°C	200°C	max.0,1m/s	max.000bar	MVQ 85°	

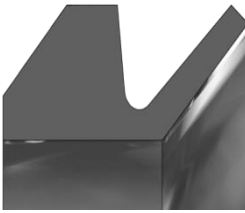


DR106

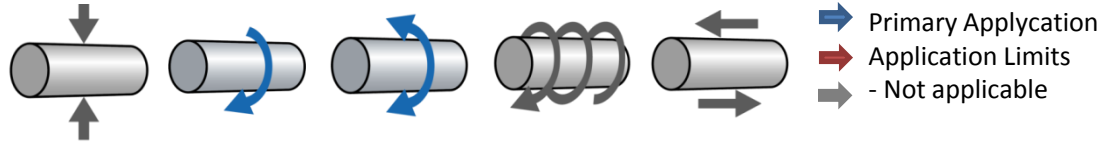




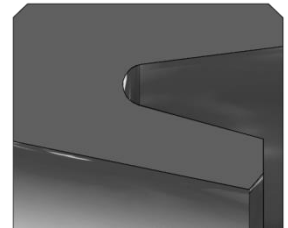
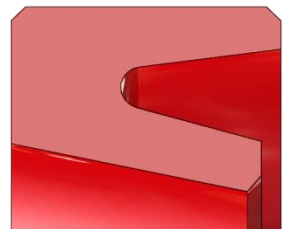
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.25m/s	max.000bar	HPU 94°	
-20°C	115°C	max.25m/s	max.000bar	HPU 55°D	
-20°C	110°C	max.25m/s	max.000bar	SL-PU 94°	
-50°C	110°C	max.25m/s	max.000bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,2m/s	max.000bar	NBR 85°	
-20°C	150°C	max.0,2m/s	max.000bar	H-NBR 85°	
-20°C	220°C	max.0,2m/s	max.00bar	FPM 82°	
-45°C	130°C	max.0,2m/s	max.000bar	EPDM 85°	
-60°C	200°C	max.0,1m/s	max.000bar	MVQ 85°	



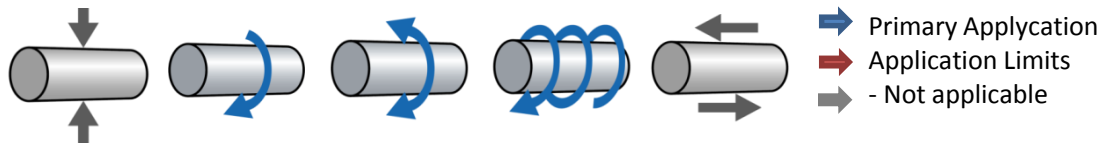
DR107



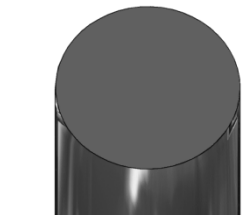
min Temp	max Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	Upon application		HPU 94°	
-20°C	115°C			HPU 55°D	
-20°C	110°C			SL-PU 94°	
-50°C	110°C			LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	Upon application		NBR 85°	
-20°C	150°C			H-NBR 85°	
-20°C	220°C			FPM 82°	
-45°C	130°C			EPDM 85°	
-60°C	200°C			MVQ 85°	



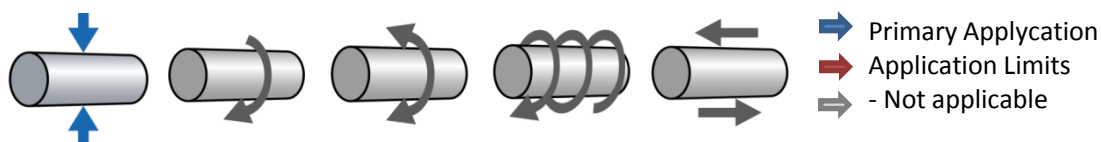
DR108

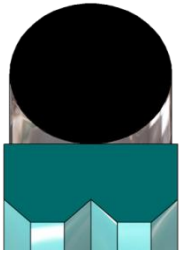


min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.000m/s	max.400bar	HPU 94°	
-20°C	115°C	max.000m/s	max.400bar	HPU 55°D	
-20°C	110°C	max.000m/s	max.400bar	SL-PU 94°	
-50°C	110°C	max.000m/s	max.400bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.000m/s	max.160bar	NBR 85°	
-20°C	150°C	max.000m/s	max.160bar	H-NBR 85°	
-20°C	220°C	max.000m/s	max.160bar	FPM 82°	
-45°C	130°C	max.000m/s	max.160bar	EPDM 85°	
-200°C	260°C	max.000m/s	max.160bar	PTFE	



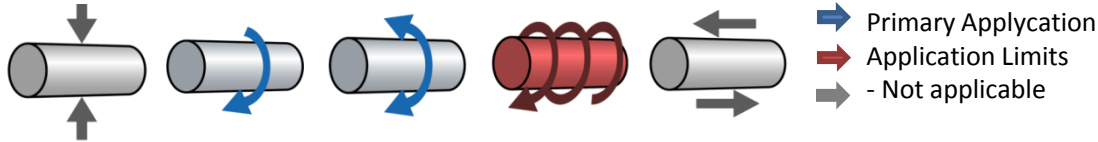
DR109





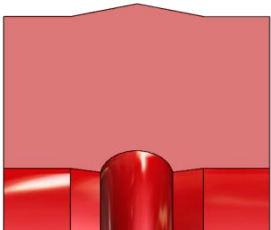
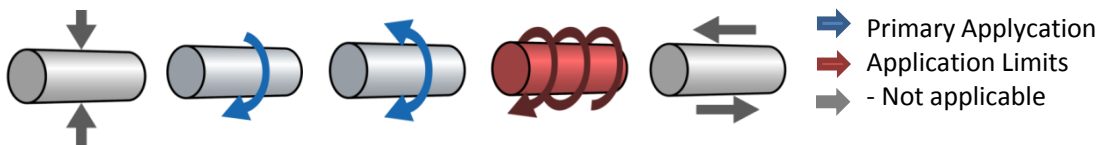
min Temp	max Temp	max. Speed	max. Pressure	Material / O-Ring	
-200°C	260°C	max.0,4m/s	max.300bar	PTFE pure	NBR70°/FPM75°
-200°C	260°C	max.0,4m/s	max.300bar	PTFE 1glass	NBR70° /FPM75°
-200°C	260°C	max.0,4m/s	max.300bar	PTFE 2 bronze	NBR70°/FPM75°
-200°C	260°C	max. 0,4m/s	max.300bar	PTFE carbone	NBR70°/FPM75°
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-200°C	260°C	max.0,4m/s	max.300bar	PTFE D05turqu	NBR70°/FPM75°
-200°C	260°C	max.0,4m/s	max.300bar	PTFE D05glass	NBR70°/FPM75°
-200°C	260°C	max.0,4m/s	max.300bar	PTFE graphite	NBR70°/FPM75°
-200°C	260°C	max.0,4m/s	max.300bar	PTFE ekonol	NBR70°/FPM75°
-200°C	260°C	max.0,4m/s	max.300bar	PTFE 25%glass	NBR70°/FPM75°

DR110

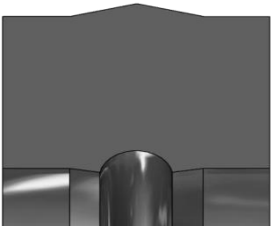


min Temp	max Temp	max. Speed	max. Pressure	Material / O-Ring	
-200°C	260°C	max.0,4m/s	max.300bar	PTFE pure	NBR70°/FPM75°
-200°C	260°C	max.0,4m/s	max.300bar	PTFE 1glass	NBR70° /FPM75°
-200°C	260°C	max.0,4m/s	max.300bar	PTFE 2 bronze	NBR70°/FPM75°
-200°C	260°C	max. 0,4m/s	max.300bar	PTFE carbone	NBR70°/FPM75°
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-200°C	260°C	max.0,4m/s	max.300bar	PTFE D05turqu	NBR70°/FPM75°
-200°C	260°C	max.0,4m/s	max.300bar	PTFE D05glass	NBR70°/FPM75°
-200°C	260°C	max.0,4m/s	max.300bar	PTFE graphite	NBR70°/FPM75°
-200°C	260°C	max.0,4m/s	max.300bar	PTFE ekonol	NBR70°/FPM75°
-200°C	260°C	max.0,4m/s	max.300bar	PTFE 25%glass	NBR70°/FPM75°

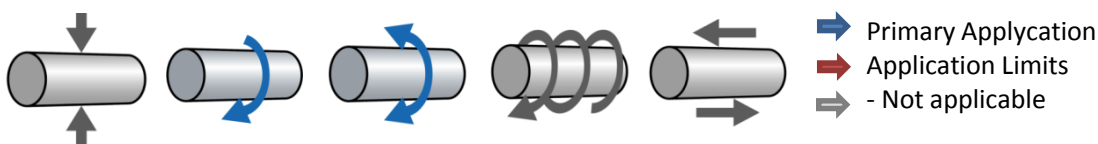
DR111

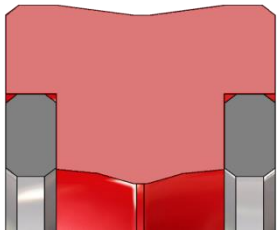


min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.0.2m/s	max.160bar	HPU 94°	
-20°C	115°C	max.0.2m/s	max.160bar	HPU 55°D	
-20°C	110°C	max.0.3m/s	max.160bar	SL-PU 94°	
-50°C	110°C	max.0.2m/s	max.160bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.0,2m/s	max.100bar	NBR 85°	
-20°C	150°C	max.0,2m/s	max.100bar	H-NBR 85°	
-20°C	220°C	max.0,2m/s	max.100bar	FPM 82°	
-45°C	130°C	max.0,2m/s	max.100bar	EPDM 85°	
-60°C	200°C	max.0,1m/s	max.100bar	MVQ 85°	

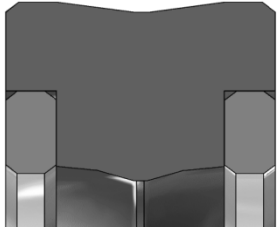


DR112

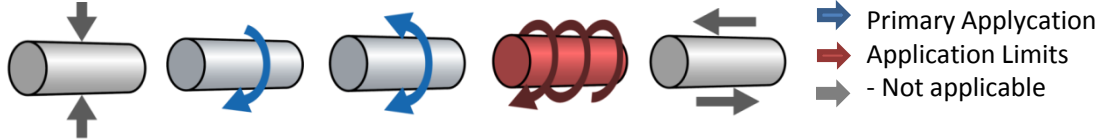




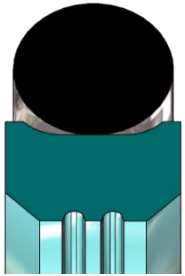
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backring	
-20°C	115°C	max.0.2m/s	max.400bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.0.2m/s	max.400bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.0.3m/s	max.400bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.0.2m/s	max.400bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backring	
-30°C	110°C	max.0,2m/s	max.250bar	NBR 85°	POM/PTFE/PEEK
-20°C	150°C	max.0,2m/s	max.250bar	H-NBR 85°	POM/PTFE/PEEK
-20°C	220°C	max.0,2m/s	max.250bar	FPM 82°	POM/PTFE/PEEK
-45°C	130°C	max.0,2m/s	max.250bar	EPDM 85°	POM/PTFE/PEEK
-60°C	200°C	max.0,1m/s	max.150bar	MVQ 85°	POM/PTFE/PEEK



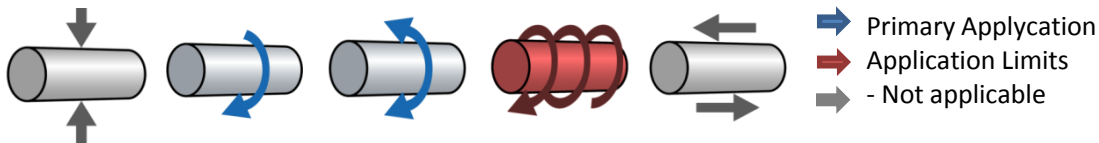
DR113



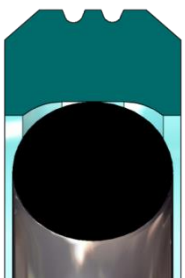
min Temp	max Temp	max. Speed	max. Pressure	Material / O-Ring	
-200°C	260°C	max.0,4m/s	max.300bar	PTFE pure	NBR70°/FPM75°
-200°C	260°C	max.0,4m/s	max.300bar	PTFE 1glass	NBR70° /FPM75°
-200°C	260°C	max.0,4m/s	max.300bar	PTFE 2 bronze	NBR70°/FPM75°
-200°C	260°C	max. 0,4m/s	max.300bar	PTFE carbone	NBR70°/FPM75°
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-200°C	260°C	max.0,4m/s	max.300bar	PTFE D05turqu	NBR70°/FPM75°
-200°C	260°C	max.0,4m/s	max.300bar	PTFE D05glass	NBR70°/FPM75°
-200°C	260°C	max.0,4m/s	max.300bar	PTFE graphite	NBR70°/FPM75°
-200°C	260°C	max.0,4m/s	max.300bar	PTFE ekonol	NBR70°/FPM75°
-200°C	260°C	max.0,4m/s	max.300bar	PTFE 25%glass	NBR70°/FPM75°



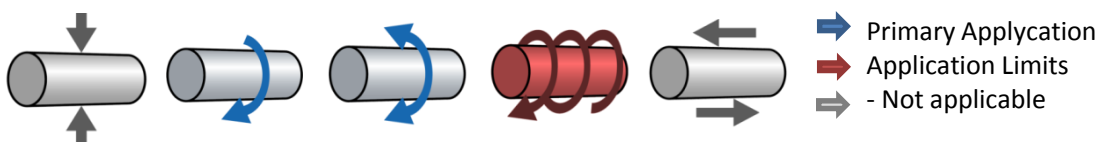
DR115

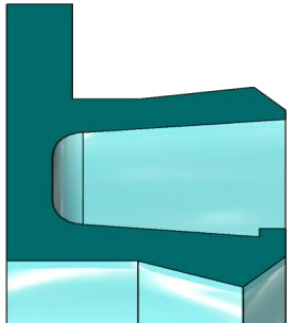


min Temp	max Temp	max. Speed	max. Pressure	Material / O-Ring	
-200°C	260°C	max.0,4m/s	max.300bar	PTFE pure	NBR70°/FPM75°
-200°C	260°C	max.0,4m/s	max.300bar	PTFE 1glass	NBR70° /FPM75°
-200°C	260°C	max.0,4m/s	max.300bar	PTFE 2 bronze	NBR70°/FPM75°
-200°C	260°C	max. 0,4m/s	max.300bar	PTFE carbone	NBR70°/FPM75°
min.Temp	max.Temp	max. Speed	max. Pressure	Material / O-Ring	
-200°C	260°C	max.0,4m/s	max.300bar	PTFE D05turqu	NBR70°/FPM75°
-200°C	260°C	max.0,4m/s	max.300bar	PTFE D05glass	NBR70°/FPM75°
-200°C	260°C	max.0,4m/s	max.300bar	PTFE graphite	NBR70°/FPM75°
-200°C	260°C	max.0,4m/s	max.300bar	PTFE ekonol	NBR70°/FPM75°
-200°C	260°C	max.0,4m/s	max.300bar	PTFE 25%glass	NBR70°/FPM75°



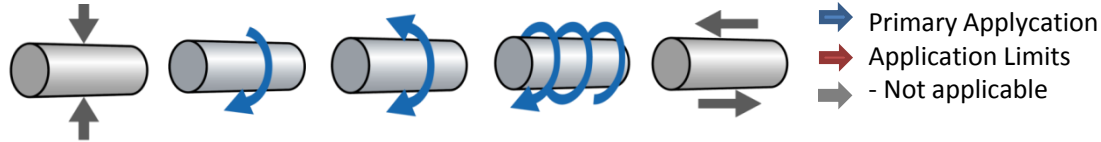
DR116





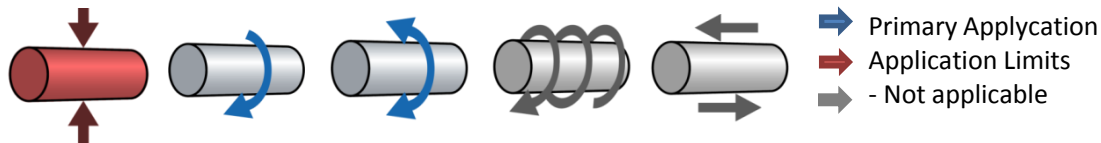
min Temp	max Temp	max. Speed	max. Pressure	Material / Spring	
-200°C	260°C	max.2m/s	max.150bar	PTFE pure	1.4310
-200°C	260°C	max.2m/s	max.150bar	PTFE 1glass	1.4310
-200°C	260°C	max.2m/s	max.150bar	PTFE 2 bronze	1.4310
-200°C	260°C	max.2m/s	max.150bar	PTFE carbone	1.4310
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Spring	
-200°C	260°C	max.2m/s	max.150bar	PTFE D05 turq	1.4310
-200°C	260°C	max.2m/s	max.150bar	PTFE D05 glass	1.4310
-200°C	260°C	max.2m/s	max.150bar	PTFE graphite	1.4310
-200°C	260°C	max.2m/s	max.150bar	PTFE ekonol	1.4310
-200°C	260°C	max.2m/s	max.150bar	PTFE 25%glass	1.4310

DR117



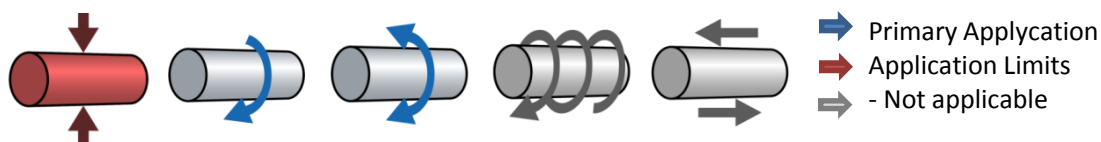
min Temp	max Temp	max. Speed	max. Pressure	Material / Spring	
-200°C	260°C	max.15m/s	max.300bar	PTFE pure	1.4310
-200°C	260°C	max.15m/s	max.300bar	PTFE 1glass	1.4310
-200°C	260°C	max.15m/s	max.300bar	PTFE 2 bronze	1.4310
-200°C	260°C	max.15m/s	max.300bar	PTFE carbone	1.4310
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Spring	
-200°C	260°C	max.15m/s	max.300bar	PTFE D05 turq	1.4310
-200°C	260°C	max.15m/s	max.300bar	PTFE D05 glass	1.4310
-200°C	260°C	max.15m/s	max.300bar	PTFE graphite	1.4310
-200°C	260°C	max.15m/s	max.300bar	PTFE ekonol	1.4310
-200°C	260°C	max.15m/s	max.300bar	PTFE 25%glass	1.4310

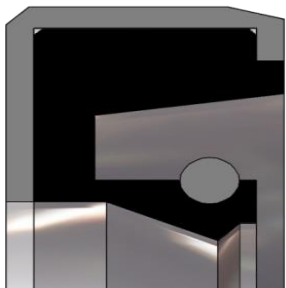
DR118



min Temp	max Temp	max. Speed	max. Pressure	Material / Spring	
-200°C	260°C	max.15m/s	max.300bar	PTFE pure	1.4310
-200°C	260°C	max.15m/s	max.300bar	PTFE 1glass	1.4310
-200°C	260°C	max.15m/s	max.300bar	PTFE 2 bronze	1.4310
-200°C	260°C	max.15m/s	max.300bar	PTFE carbone	1.4310
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Spring	
-200°C	260°C	max.15m/s	max.300bar	PTFE D05 turq	1.4310
-200°C	260°C	max.15m/s	max.300bar	PTFE D05 glass	1.4310
-200°C	260°C	max.15m/s	max.300bar	PTFE graphite	1.4310
-200°C	260°C	max.15m/s	max.300bar	PTFE ekonol	1.4310
-200°C	260°C	max.15m/s	max.300bar	PTFE 25%glass	1.4310

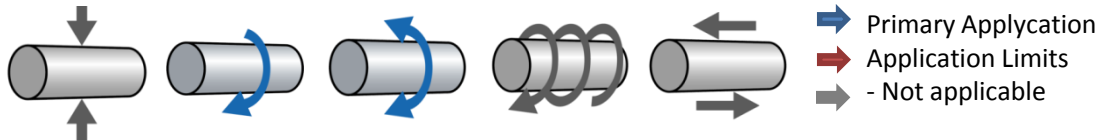
DR119



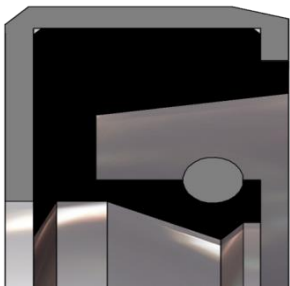


min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backing	
-20°C	115°C	max.5m/s	max.0,5bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.5m/s	max.0,5bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.6m/s	max.0,5bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.5m/s	max.0,5bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backing	
-30°C	110°C	max.10m/s	max.0,5bar	NBR 85°	POM/PTFE/PEEK
-20°C	150°C	max.10m/s	max.0,5bar	H-NBR 85°	POM/PTFE/PEEK
-20°C	220°C	max.10m/s	max.0,5bar	FPM 82°	POM/PTFE/PEEK
-45°C	130°C	Max.10m/s	max.0,5bar	EPDM 85°	POM/PTFE/PEEK
-60°C	200°C	max.5m/s	max.0,2bar	MVQ 85°	POM/PTFE/PEEK

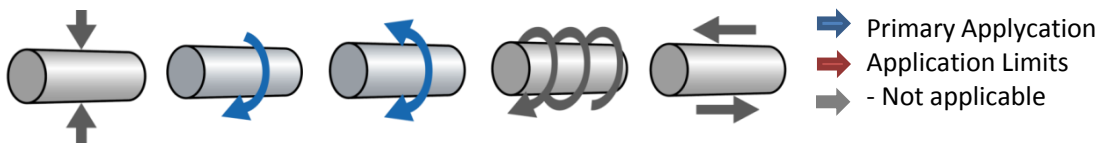
DR201



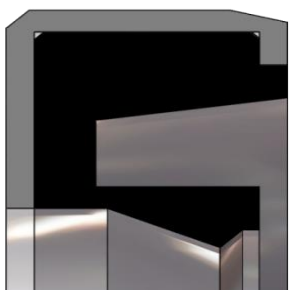
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backing	
-20°C	115°C	max.5m/s	max.0,5bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.5m/s	max.0,5bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.6m/s	max.0,5bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.5m/s	max.0,5bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backing	
-30°C	110°C	max.10m/s	max.0,5bar	NBR 85°	POM/PTFE/PEEK
-20°C	150°C	max.10m/s	max.0,5bar	H-NBR 85°	POM/PTFE/PEEK
-20°C	220°C	max.10m/s	max.0,5bar	FPM 82°	POM/PTFE/PEEK
-45°C	130°C	Max.10m/s	max.0,5bar	EPDM 85°	POM/PTFE/PEEK
-60°C	200°C	max.5m/s	max.0,2bar	MVQ 85°	POM/PTFE/PEEK



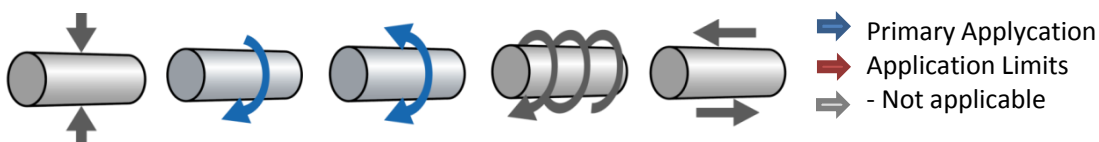
DR202

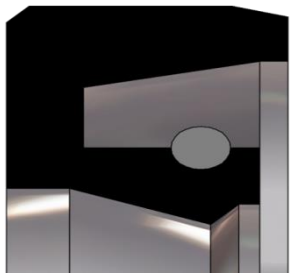


min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backing	
-20°C	115°C	max.5m/s	max.0,5bar	HPU 94°	POM/PTFE/PEEK
-20°C	115°C	max.5m/s	max.0,5bar	HPU 55°D	POM/PTFE/PEEK
-20°C	110°C	max.6m/s	max.0,5bar	SL-PU 94°	POM/PTFE/PEEK
-50°C	110°C	max.5m/s	max.0,5bar	LT-PU 94°	POM/PTFE/PEEK
min.Temp	max.Temp	max. Speed	max. Pressure	Material / Backing	
-30°C	110°C	max.10m/s	max.0,5bar	NBR 85°	POM/PTFE/PEEK
-20°C	150°C	max.10m/s	max.0,5bar	H-NBR 85°	POM/PTFE/PEEK
-20°C	220°C	max.10m/s	max.0,5bar	FPM 82°	POM/PTFE/PEEK
-45°C	130°C	Max.10m/s	max.0,5bar	EPDM 85°	POM/PTFE/PEEK
-60°C	200°C	max.5m/s	max.0,2bar	MVQ 85°	POM/PTFE/PEEK



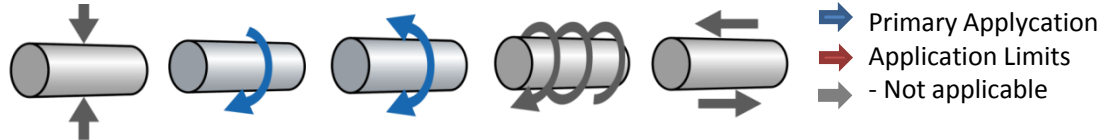
DR203





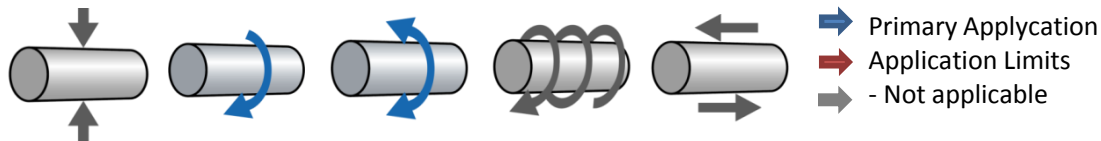
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.5m/s	max.0,5bar	HPU 94°	
-20°C	115°C	max.5m/s	max.0,5bar	HPU 55°D	
-20°C	110°C	max.6m/s	max.0,5bar	SL-PU 94°	
-50°C	110°C	max.5m/s	max.0,5bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.10m/s	max.0,5bar	NBR 85°	
-20°C	150°C	max.10m/s	max.0,5bar	H-NBR 85°	
-20°C	220°C	max.10m/s	max.0,5bar	FPM 82°	
-45°C	130°C	Max.10m/s	max.0,5bar	EPDM 85°	
-60°C	200°C	max.5m/s	max.0,2bar	MVQ 85°	

DR204



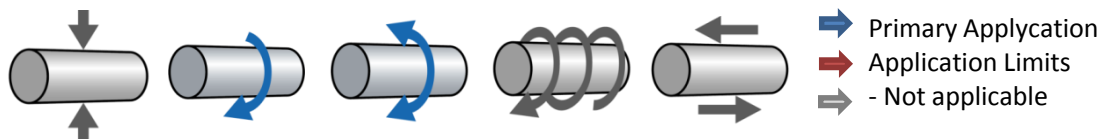
min Temp	max Temp	max. Speed	max. Pressure	Material	
-200°C	260°C	max.5m/s	max.0,5bar	PTFE pure	
-200°C	260°C	max.5m/s	max.0,5bar	PTFE 1glass	
-200°C	260°C	max.6m/s	max.0,5bar	PTFE 2 bronze	
-200°C	260°C	max.5m/s	max.0,5bar	PTFE carbone	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200°C	260°C	max.10m/s	max.0,5bar	NBR 85°	
-200°C	260°C	max.10m/s	max.0,5bar	H-NBR 85°	
-200°C	260°C	max.10m/s	max.0,5bar	FPM 82°	
-200°C	260°C	Max.10m/s	max.0,5bar	EPDM 85°	
-200°C	260°C	max.5m/s	max.0,2bar	MVQ 85°	

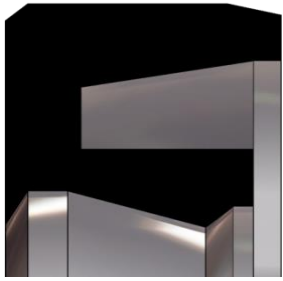
DR205



min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.5m/s	max.0,5bar	HPU 94°	
-20°C	115°C	max.5m/s	max.0,5bar	HPU 55°D	
-20°C	110°C	max.6m/s	max.0,5bar	SL-PU 94°	
-50°C	110°C	max.5m/s	max.0,5bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.10m/s	max.0,5bar	NBR 85°	
-20°C	150°C	max.10m/s	max.0,5bar	H-NBR 85°	
-20°C	220°C	max.10m/s	max.0,5bar	FPM 82°	
-45°C	130°C	Max.10m/s	max.0,5bar	EPDM 85°	
-60°C	200°C	max.5m/s	max.0,2bar	MVQ 85°	

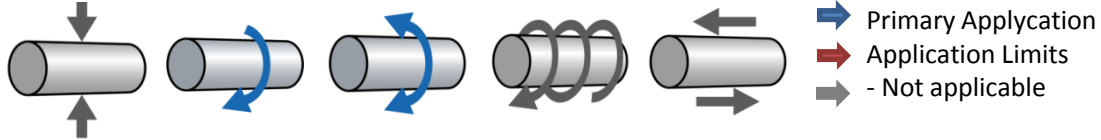
DR206



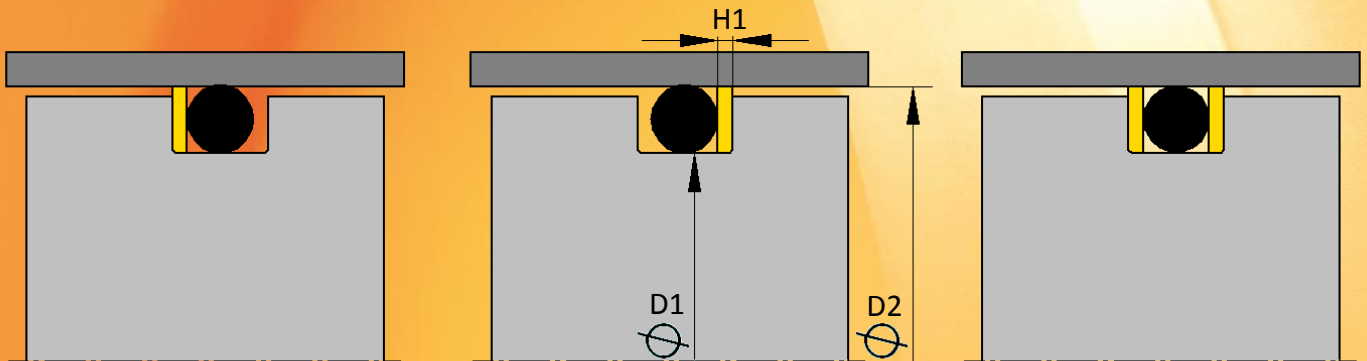


min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-20°C	115°C	max.5m/s	max.0,5bar	HPU 94°	
-20°C	115°C	max.5m/s	max.0,5bar	HPU 55°D	
-20°C	110°C	max.6m/s	max.0,5bar	SL-PU 94°	
-50°C	110°C	max.5m/s	max.0,5bar	LT-PU 94°	
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-30°C	110°C	max.10m/s	max.0,5bar	NBR 85°	
-20°C	150°C	max.10m/s	max.0,5bar	H-NBR 85°	
-20°C	220°C	max.10m/s	max.0,5bar	FPM 82°	
-45°C	130°C	Max.10m/s	max.0,5bar	EPDM 85°	
-60°C	200°C	max.5m/s	max.0,2bar	MVQ 85°	

DR207



BACKRINGS



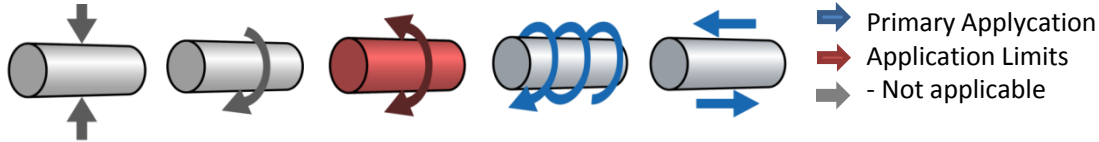
Backrings are mainly used to minimise gaps that arise during production or as a result of wear and tear on metal components.

By using such accessories (multi-part geometries with the aid of elastomers or thermoplastics) the backrings become an active aid to ensure the completeness of the seal.



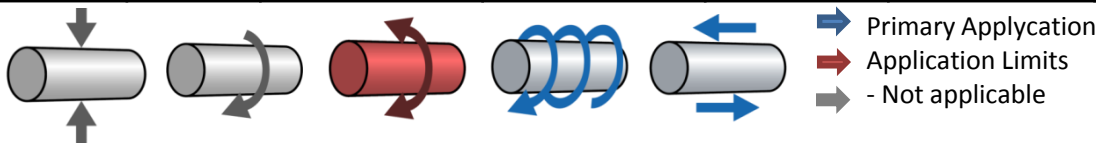
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-50	100				POM
-200	260				PTFE
-60	250				PEEK
-200	260				PTFE filled
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200	80				UHMW-PE
-20°C	115°C				HPU 94°
-20°C	115°C				HPU 55°D
-20°C	110°C				SL-PU 94°
-50°C	110°C				LT-PU 94°

DST108



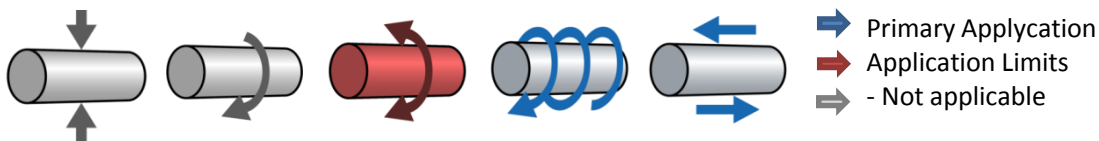
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-50	100				POM
-200	260				PTFE
-60	250				PEEK
-200	260				PTFE filled
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200	80				UHMW-PE
-20°C	115°C				HPU 94°
-20°C	115°C				HPU 55°D
-20°C	110°C				SL-PU 94°
-50°C	110°C				LT-PU 94°

DST109



min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-50	100				POM
-200	260				PTFE
-60	250				PEEK
-200	260				PTFE filled
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200	80				UHMW-PE
-20°C	115°C				HPU 94°
-20°C	115°C				HPU 55°D
-20°C	110°C				SL-PU 94°
-50°C	110°C				LT-PU 94°

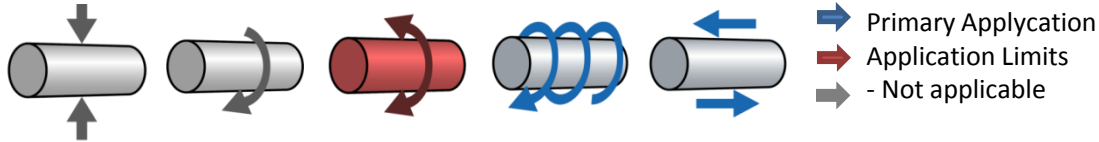
DST110





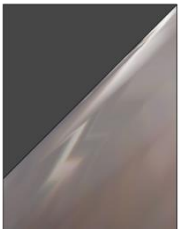
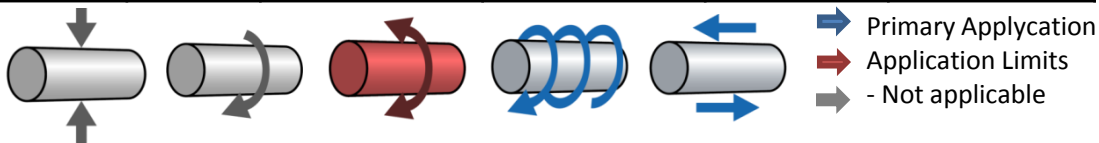
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-50	100				POM
-200	260				PTFE
-60	250				PEEK
-200	260				PTFE filled
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200	80				UHMW-PE
-20°C	115°C				HPU 94°
-20°C	115°C				HPU 55°D
-20°C	110°C				SL-PU 94°
-50°C	110°C				LT-PU 94°

DST111



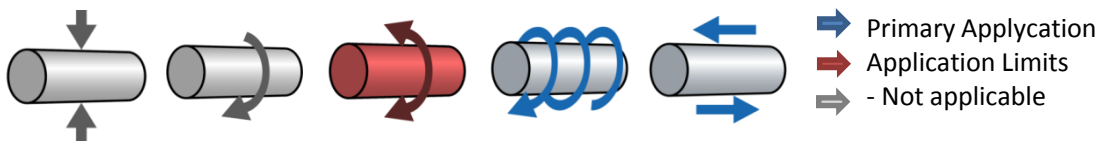
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-50	100				POM
-200	260				PTFE
-60	250				PEEK
-200	260				PTFE filled
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200	80				UHMW-PE
-20°C	115°C				HPU 94°
-20°C	115°C				HPU 55°D
-20°C	110°C				SL-PU 94°
-50°C	110°C				LT-PU 94°

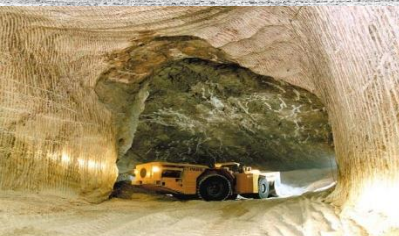
DST112



min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-50	100				POM
-200	260				PTFE
-60	250				PEEK
-200	260				PTFE filled
min.Temp	max.Temp	max. Speed	max. Pressure	Material	
-200	80				UHMW-PE
-20°C	115°C				HPU 94°
-20°C	115°C				HPU 55°D
-20°C	110°C				SL-PU 94°
-50°C	110°C				LT-PU 94°

DST113





Our innovative kind of manufacturing enables us to produce nearly every special profiles made of each material in a very short time. We can produce on our special CNC PU520 machines every seal according to your requirements from 3mm up to 520mm with a very short delivery time.

Our company sets the highest value on

- ➔ Quickness and the efficiency of our services.
- ➔ Quality and the conformity of our products.
- ➔ Proximity to our customers.
- ➔ Daily and diligent monitoring of the technological developments.
- ➔ Precision and quality "MADE IN AUSTRIA"



Seals also about 520mm to 2000mm in their desired geometry and material do not offer us a big problem, since we started 2002 our own semi-production we guarantee to the quality, flexibly and quickly service.

We have for each of our customers requirements the best solution. That is for them reliable, and fast delivery makes them no longer have to take more downtime for purchase.

Pu1Tec offers state-of-the-art in-house manufactured seals, as well as high quality merchandise. Because of our worldwide trade connections we are able to deliver virtually any seal member.

Maximum flexibility and service are central to us and we constantly broaden our range of products.

Our range of standard seals, such as wipers, rod seals, piston seals, shaft seals, O-rings, guide rings, and supporting rings, is expanding and we continuously optimize and develop new seal geometries.

Please do not hesitate to contact us in case you are unable to find the desired seal or sealing profile. We will do our best to offer you the required seal.



PU1TEC

Primoschgasse 2
9020 Klagenfurt
AUSTRIA

Contact for your inquiry

Seals Department

Phone.: +43 (0) 463339696-18 / Fax: -19

Mail.: seals@pu1tec.com