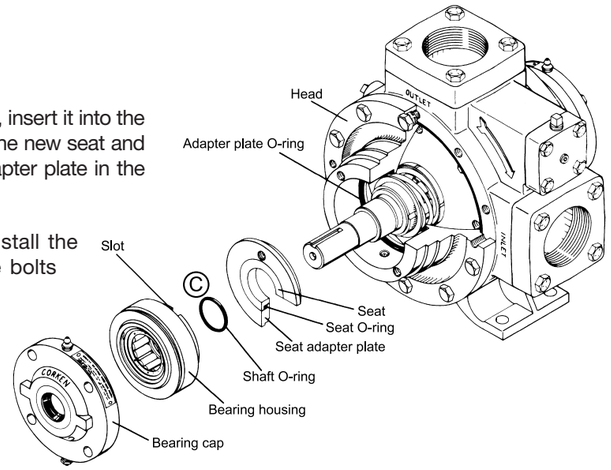
Step 4

Completing the installation.

After applying some oil to the new adapter plate O-ring, insert it into the pump head. Without touching the lapped face, insert the new seat and oiled seat O-ring into the adapter plate. Install the adapter plate in the pump head. Install the shaft O-ring on the shaft.

C. Slide the bearing housing over the shaft and install the bearing cap using a criss-cross method on the bolts and make sure the pump shaft turns freely.

Watch alignment C!



Step 5

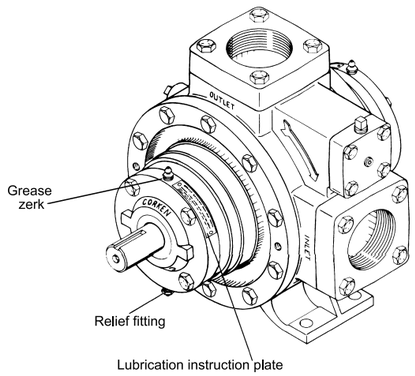
Proper lubrication.

For proper lubrication, use MIL-G-10924C ball bearing grease only. Each pump is equipped with a grease zerk and relief fitting. Before greasing the bearing, the grease zerk and relief fitting must be cleaned thoroughly. If any dirt is forced through the grease zerk, early bearing failure will result.

Overgreasing will damage the pump bearings. To help prevent overgreasing, use a hand operated grease gun. Insert the grease slowly and stop as soon as the relief fitting opens. Excessive grease may drip out of the relief fitting for several hours after lubrication.

Do not overgrease!

NOTE: When lubricating truck pumps, grease the U-joints and the spline of the drive shaft as well.

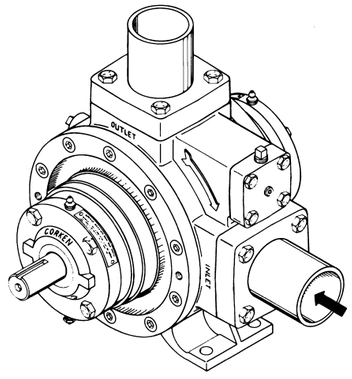


Step 6

Repressurize the system.

For best results slowly pressurize the pump with vapor before introducing liquid to the pump. When liquid enters a unpressurized pump-even slowly-it can sometimes refrigerate enough to keep the O-rings/elastomers from sealing properly and cause a leak.

Vapor first, then liquid!



Solutions beyond products...

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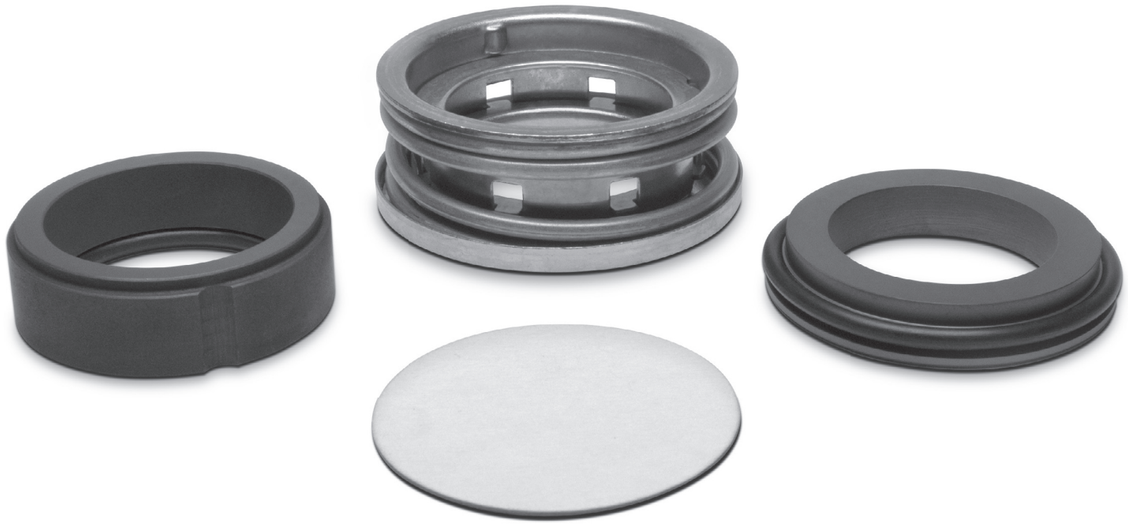
Important Instructions

Seal Replacement for Sliding-Vane Pumps

Applies to Part Numbers 1769-X_6, 1769-XR_6, 1769-2X_6, and 1769-2XR_6



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Seal Replacement Instructions

Simple as A, B, C... but watch alignments A, B and C or your new seal will leak!

Caution: Bleed all pressure from the pump and piping before starting to install your seal assembly.

Cleanliness

Even the smallest amount of dirt on your new seal can cause early failure. Keep all parts, tools and your hands clean while installing the seal. Never touch the smooth lapped faces of the carbon rotor or seal seat. With LP-Gas, anhydrous ammonia, and similar liquids, the fluid is 5 to 10 times thinner than water so the smooth/lapped surfaces of the new seal need to be as clean as possible.

Workmanship

This pump is a precision piece of equipment with very close clearances and should be treated with care. Never beat on it when inserting or removing parts.

1769-X_6[a,b] and 1769-2XE6 (PTFE Only) Seal Assembly

Part Number	Description	Qty
1769-X1	Bearing housing assembly	1
1822	Seat adapter plate	1
2-128_[a]	O-ring	1
2-240_[a]	O-ring	1
2298-X_6[a]	Silicon carbide seal	1
2755	Bearing inner race	1

1769-XR_6[a,b] and 1769-2XRE6 (PTFE Only) Seal Replacement

Part Number	Description	Qty
2-128_[a]	O-ring	1
2-240_[a]	O-ring	1
2298-X_6[a]	Silicon carbide seal	1

O-ring Code	
A	Buna-N
B	Neoprene®[c]
D	Viton®[c]
E	PTFE
G	Ethylene Propylene
K	Kalrez®[c]

[a] _ denotes O-ring code. See O-ring code chart for details.
[b] Not available in PTFE, use 1769-2XE6 or 1769-2XRE6.
[c] Registered trademark of the DuPont company.

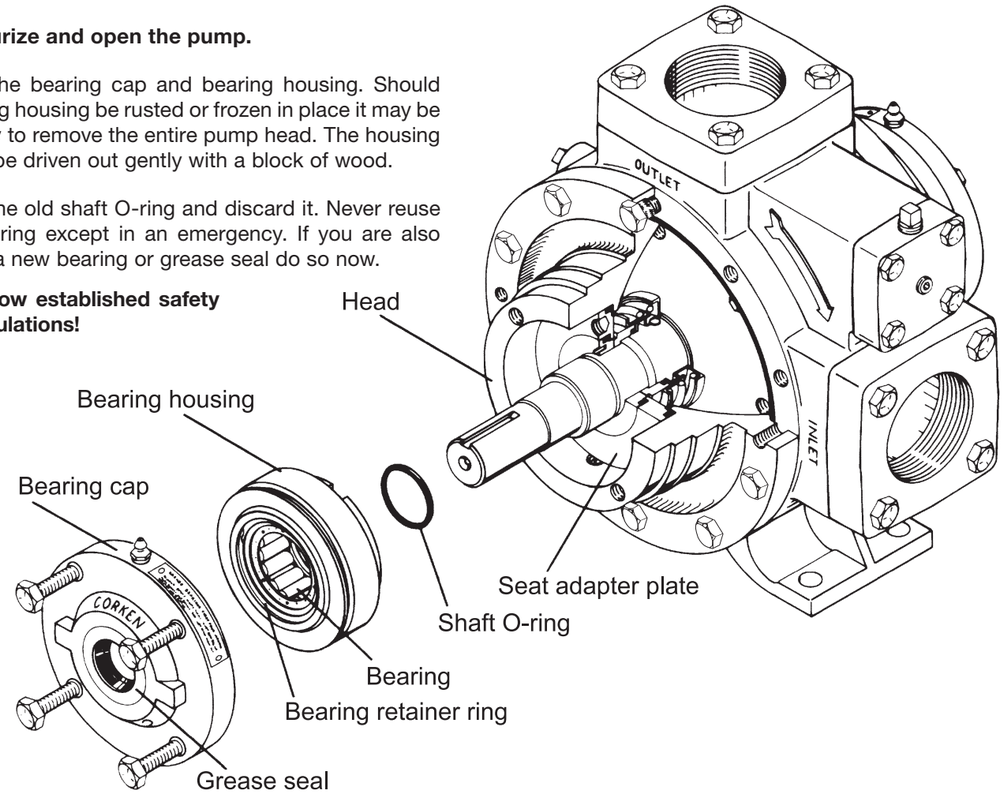
Step 1

Depressurize and open the pump.

Remove the bearing cap and bearing housing. Should the bearing housing be rusted or frozen in place it may be necessary to remove the entire pump head. The housing can then be driven out gently with a block of wood.

Remove the old shaft O-ring and discard it. Never reuse an old O-ring except in an emergency. If you are also installing a new bearing or grease seal do so now.

Follow established safety regulations!

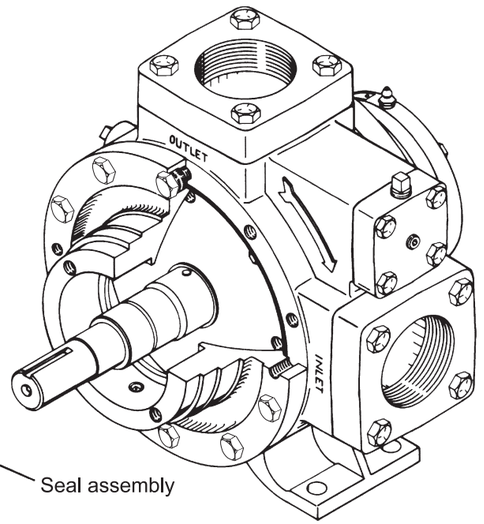


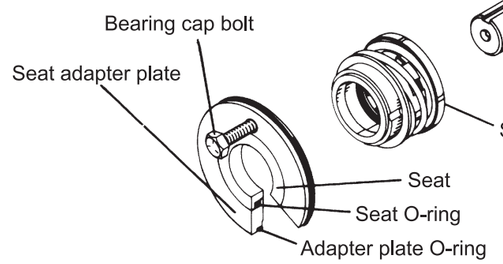
Step 2

Remove the old seal.

The seat adapter plate can be removed using a bearing cap bolt as a puller. Disregard the old adapter plate O-ring, seat, and seat O-ring. Remove and discard the rest of the old seal. Thoroughly clean all surfaces that contact O-rings. Use fine emery or crocus cloth. The shaft under the seal O-ring should be shiny smooth. Lubricate all surfaces with a clean, light oil. Do not let dirt settle on the parts.

Caution: Mechanical seals are precision devices. Care must be used when handling and installing the seal seat to prevent chipping or cracking.





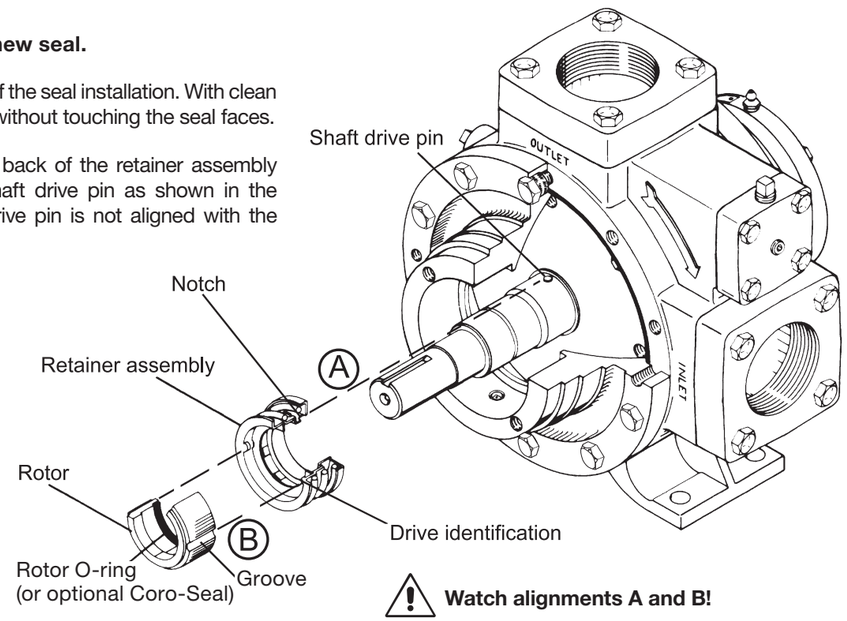
Step 3

Proper alignment of the new seal.

This is the most critical step of the seal installation. With clean hands unwrap the new seal without touching the seal faces.

A. Locate the notch on the back of the retainer assembly and position over the shaft drive pin as shown in the illustration. If the shaft drive pin is not aligned with the notch, the seal will be improperly positioned and leak. It should not require any force to install the retainer assembly.

   Hold the carbon rotor without touching the lapped face; lubricate the rotor O-ring with a light oil and install both on the pump shaft. (For the optional PTFE Coro-Seal installation, see the following paragraph.)



Watch alignments A and B!

If you are using the optional PTFE Coro-Seal, make sure the shaft is very clean and smooth as the PTFE seal is not as tolerant of surface blemishes as rubber O-rings. After lubricating the Coro-Seal, install in the backside of carbon rotor with the spring toward you and slide the carbon rotor in position as previously described.

B. The two grooves in the carbon rotor must line up with the drive indentations in the retainer assembly. If they do not, the seal will be improperly positioned and leak. Do not allow the carbon rotor to cock. This may chip the lapped face.