

Springer Pumps, LLC

Toll Free: 866-777-6060 Int'l: 484-949-2900 Fax: 866-777-6383 www.springerpumps.com

CAUSES OF SEAL LEAKAGE

Trouble	Probable Cause	Remedy
1. Cracked or broken mating ring	Seal ran dry and heated up. When liquid reached seal faces, it was cooler and caused thermal cracks.	Check to insure seal chamber is full of liquid before starting pump. On high temperature applications, insure proper flushing at seal faces.
2. Carbon washer scored and grooved	Dirty system	Have system cleaned and flushed. Consider installation of abrasive separator (see page 4).
3. Short seal life in treated system	Treatment level and temperature higher than anticipated.	Advise SPLLC of product temperature and PPM Treatment level, for alternate seal recommendation.
4. Primary Ring worn unevenly	Seal improperly installed.	Check installation instructions for proper assembly.
5. Bellows hard and brittle. Rapid carbon wear	Temperature too high. Pump may have run dry and cavitated.	Cool seal chamber. Use EPDM or Viton® elastomers, high temperature carbon, Ni-Resist or Tungsten Carbide mating rings.
6. Bellows soft and sticky. Appears to be dissolving	Bellows not compatible with material being pumped.	Consult SPLLC for recommendation advising pumpage and temperature.
7. Retainer drive tabs badly worn or broken	Vibration or coupling misalignment. Periodic loss of lubrication at seal faces.	Realign pump and motor. Insure proper flushing at seal faces.
8. Flexible bellows broken.	Coupling misalignment.	Realign pump and motor.
9. Seal wears out shaft.	Shaft end play. Radial shaft movement. Shaft not straight.	Replace bearings. Replace shaft.

Viton is a registered trademark of DuPont.



Springer Parts, LLC. is not acting as an agent, distributor and/or representative of any other seal or equipment manufacturer and their affiliates and/or subsidiaries. All these seals are manufactured to Springer Parts, LLC. specifications and drawings. If properly Installed in the same application, the Springer Parts, LLC. seals will perform as well as or better than the original manufacturer's seals if properly installed in the same application. FEB. 2008.