

## **INSTALLATION INSTRUCTIONS FOR 9700 Series seals**

Please make sure you check the Exploded View for Installation Reference.

If you have any questions before you begin your installation, please call us at 1-856-662-5162.

- 1. The shaft should be totally clean of any wear, dirt, oils, or grease before installing the seal. Make sure that the shaft is perpendicular to the equipment wall on which the seal will be mounted.
- 2. Assemble the Split Endplate around the shaft using (2X) 1/4-20 X 1.25" long Socket Head Cap Screws provided. <u>Make sure the split line is uniform with no raised edges at the split line.</u>
- 3. Place an O-ring cord stock in the groove provided on the Split Endplate (Product Side). Ensure the O-ring sits between the Split Endplate and the equipment wall. Skip to the next step if there is no O-ring groove between Split endplate and Equipment wall.
- 4. Assembly sequence for seal internals is: Inboard Rotor cup, Silicone Boot and then the outboard rotor cup.
- 5. Assemble the inboard PTFE rotor cup around shaft using two M5 X 25MM Truss Head Cap Screws and M5 X 20MM Barrel Nuts. Hand tighten the nuts so that the seams mate evenly. Do not overtighten the screws. This could cause damage to the PTFE rotor cups. (**Torque value: 4 in-lbs**)
- 6. Wrap the split boot around the shaft. Glue the split puzzle cut with RTV. Hold glued joint together for a minimum of 5 minutes for curing purposes. (Make sure there is RTV sealant applied on the blue elastomer joint especially in the region of the joint closer to the inboard or product side). Wipe off any excess RTV from the joint on the side touching the PTFE rotor cups. The aim is to have a smooth sealing surface to keep your product from entering the split joint. Allow adequate time for the RTV to set (about 3 hours) before applying air pressure.
- 7. Assemble the outboard PTFE rotor cup on the shaft by repeating the instructions in Step 5. Slide it along the shaft such that the boot fits into counterbores in both the rotor cups. (**Torque value: 4 in-lbs**)
- 8. Place an O-ring cord stock in the groove provided on the Split Endplate (Bearing Side).
- 9. Assemble the Split Housing around the shaft using (2X) 3/8-16 X 1.00" long Socket Head Cap Screws provided. <u>Make sure the split line is uniform with no raised edges at the split line.</u>
- 10. Push the assembly on shaft using the Split Housing, until Inner Rotor Cup sits up against the Split Endplate. There should be slight resistance on the shaft while moving the parts.
- 11. Fasten the seal to the equipment wall using the necessary bolts or nuts.
- 12. Attach air line with pressure regulator to the tubing port on the Housing. Air pressure should be set to 5-8 psi **above equipment pressure**. Each seal needs to have its own dedicated airline. Sharing a single airline between multiple seals is **not** permitted. Use separate air regulator for each seal.
- 13. Turn ON air supply and jog shaft a few turns. There should be no binding or grinding. There may be a slight air leakage.

14. Run equipment and observe whether there is any product leakage. If so, air pressure may need to be increased.

Note:

- 1. Please start the air pressure FIRST before dumping the product into the equipment.
- 2. It is recommended to replace the seal once every year to maintain smooth running of the equipment.
- 3. The maximum operating temperature of the seal should be less than 400°F [204°C]. Seal Housing should be secured to the vessel wall using bolts/nuts and appropriate torques.