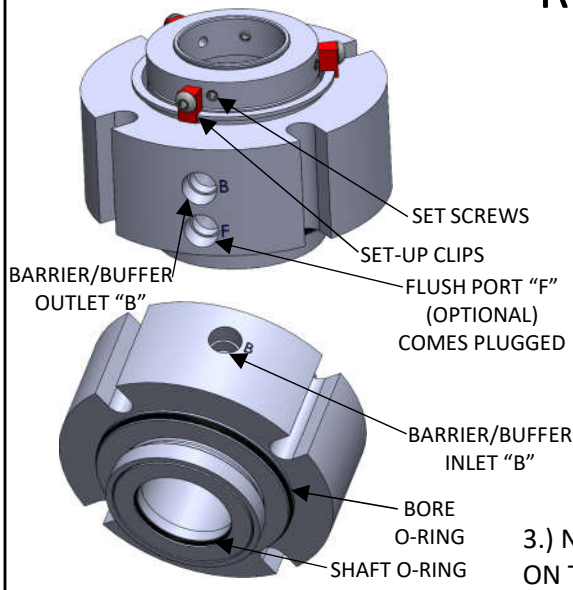
QUICK START GUIDE (QSG)
SERIES: FLOW SIDE ENTRY
RT153 DOUBLE SEAL INSTALLATION

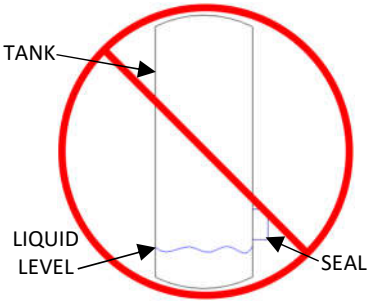
PHONE: 877.812.7573
E-MAIL: INFO@FUSIONFLUID.COM
WEBSITE: FUSIONFLUID.COM

QSG-137-A

LINK TO HOW TO VIDEOS

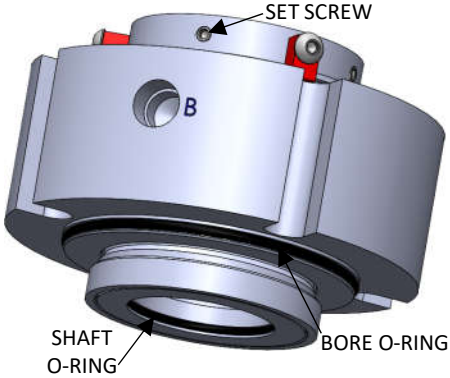
RT153 DOUBLE SEAL SHOWN AS RECEIVED



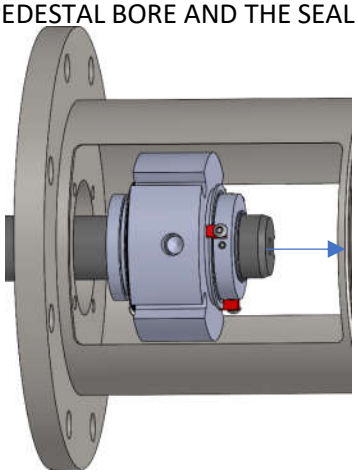


DO NOT RUN WITH THE LIQUID LEVEL IN THE TANK BELOW THE SEAL

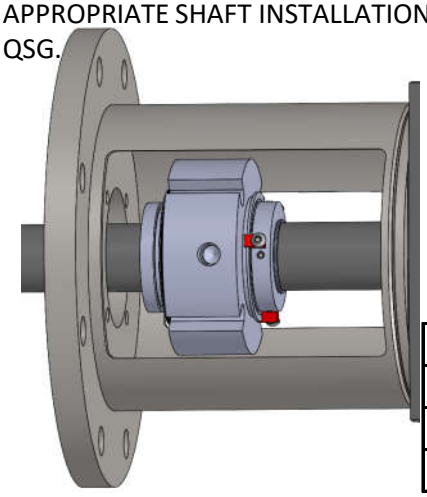
1.) APPLY PROCESS COMPATIBLE LUBRICANT TO THE SHAFT AND BORE O-RINGS, BEING CAREFUL TO ONLY PUT LUBRICANT ON THE O-RINGS. BACK OFF THE SET SCREWS SO THEY ARE CLEAR OF THE BORE.



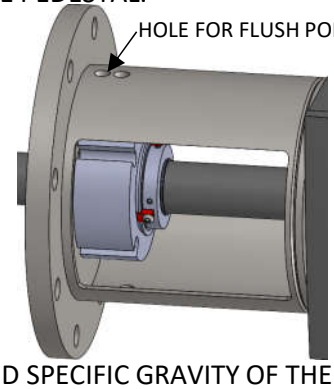
2.) INSERT THE SHAFT THROUGH THE PEDESTAL BORE AND THE SEAL BORE.



3.) NOW THAT THE SEAL IS "FLOATED" ON THE SHAFT, ATTACH THE SHAFT TO THE MIXER DRIVE ACCORDING TO THE APPROPRIATE SHAFT INSTALLATION QSG.

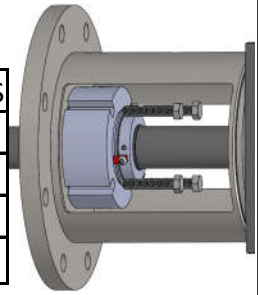


4.) SLIDE THE SEAL INTO THE PEDESTAL BORE, ALIGNING THE SLOTS IN THE SEAL TO THE TAPPED HOLES IN THE PEDESTAL. ENSURE THAT THE BARRIER/BUFFER PORTS ON THE SEAL ALIGN WITH THE HOLES ON THE TOP AND BOTTOM OF THE PEDESTAL. IF THERE'S A FLUSH PORT, ENSURE THAT IS ALSO ALIGNED TO ITS CORRESPONDING HOLE IN THE TOP OF THE PEDESTAL.



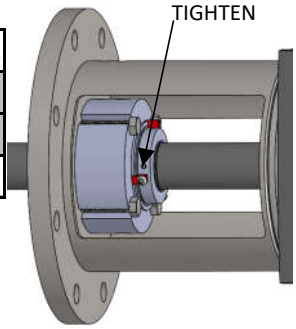
5.) INSERT AND TIGHTEN THE PROVIDED 4 BOLTS IN AN ALTERNATING PATTERN TO THE APPROPRIATE VALUE IN THE TABLE.

THREAD	18-8 STAINLESS
3/8"-16	16 ft-lb.
7/16"-14	26 ft-lb.
1/2"-13	36 ft-lb.
5/8"-11	81 ft-lb.

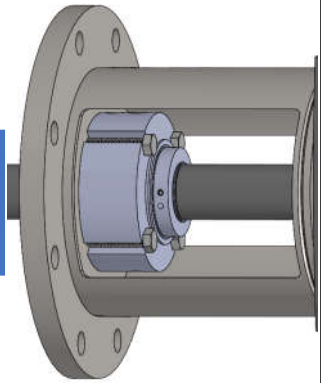


6.) THREAD IN THE SET SCREWS IN AN ALTERNATING PATTERN UNTIL THEY ARE BARELY TOUCHING THE SHAFT. <u>DO NOT TIGHTEN ONE FULLY THEN THE OTHER.</u> ONCE ALL SET SCREWS ARE SNUG, TORQUE TO THE APPROPRIATE VALUE IN THE TABLE.

THREAD	18-8 STAINLESS
1/4"-28	72 in-lb.
5/16"-24	147 in-lb.
3/8"-24	22 ft-lb.



7.) **REMOVE THE SET-UP CLIPS AND RETAIN FOR FUTURE USE.** THEY WILL BE NEEDED IN THE FUTURE WHEN THE SEAL IS REMOVED.



REMOVE SET-UP CLIPS BEFORE OPERATING MIXER

CAUTION

DISCONNECT MIXER FROM POWER SOURCE BEFORE ASSEMBLING, LIFTING, MOVING, OR SERVICING MIXER.

CAUTION:

- THE VISCOSITY AND SPECIFIC GRAVITY OF THE FLUID AFFECTS MIXER SIZING AND SPECIFICATIONS
- **HANDLE SEAL WITH CARE, DO NOT SET SEAL DOWN ON THE SEAL'S NON-METALLIC SURFACES**

FUSION FLUID EQUIPMENT
PHONE: 877.812.7573
E-MAIL: INFO@FUSIONFLUID.COM
WEBSITE: FUSIONFLUID.COM

QUICK START GUIDE (QSG)
SERIES: FLOW SIDE ENTRY

QSG-137-A

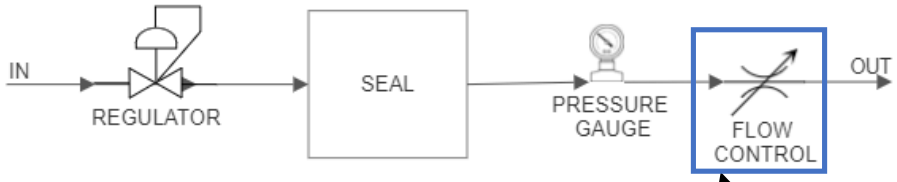
RT153 DOUBLE SEAL INSTRUCTIONS

CAUTION:

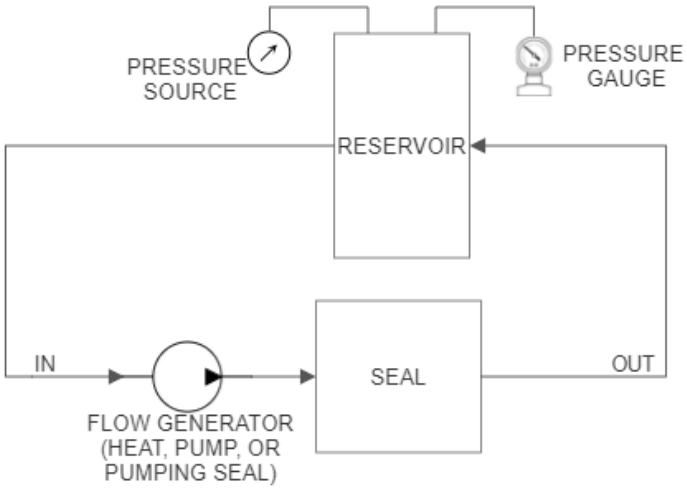
- **LISTED IN THIS QSG ARE THE GENERAL MINIMUM REQUIREMENTS FOR A SEAL SUPPORT SYSTEM**
- **PLEASE REFER TO API PIPING PLANS THAT ARE SPECIFIC TO YOUR MIXING APPLICATION**
- **HANDLE SEAL WITH CARE, DO NOT SET SEAL DOWN ON THE SEAL'S NON-METALLIC SURFACES**
- **DO NOT RUN SEAL WITHOUT A LIQUID SUPPORT SYSTEM**
- **DO NOT RUN SEAL DRY**
- **REFER TO THE APPROVAL (OR AS MANUFACTURED) DRAWING FOR REQUIRED SPECIFICATIONS (TEMP., BARRIER PRESSURE, BARRIER/BUFFER FLUID, ETC.) TO RUN YOUR SEAL**

BARRIER FLUID – A DOUBLE MECHANICAL SEAL FLUID SYSTEM WITH THE PRESSURE IN THE SEAL SYSTEM **GREATER THAN** THE TANK PRESSURE. THE DIFFERENTIAL BETWEEN THESE PRESSURES IS DEPENDENT ON THE APPLICATION. ANY SEAL LEAKAGE MAY ALLOW THE BARRIER FLUID TO LEAK INTO THE TANK.

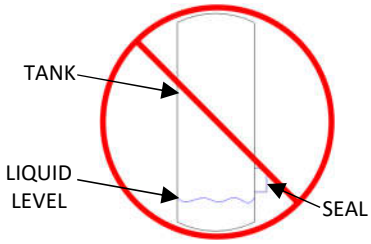
BARRIER (OPEN LOOP)



BARRIER (CLOSED LOOP)

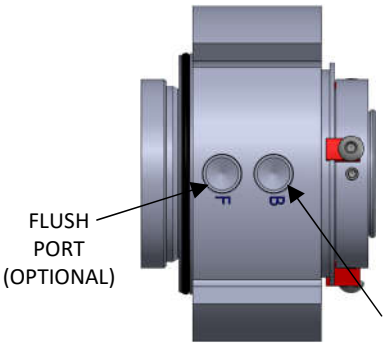


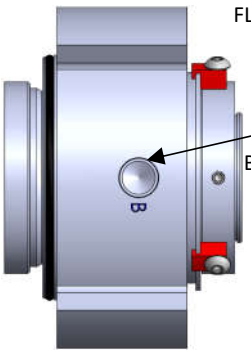
FOR A DEAD END BARRIER SYSTEM, FULLY CLOSE THE VALVE



DO NOT RUN WITH THE LIQUID LEVEL IN THE TANK BELOW THE SEAL

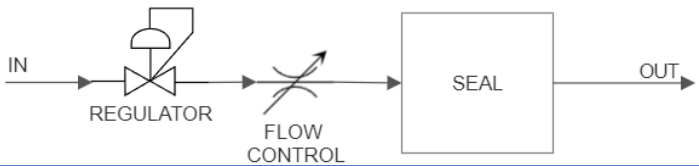
RT153 DOUBLE SEAL SHOWN AS RECEIVED



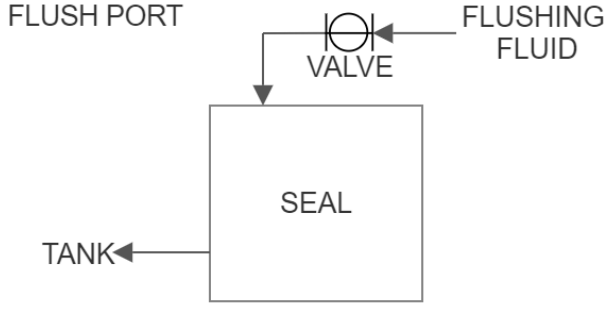


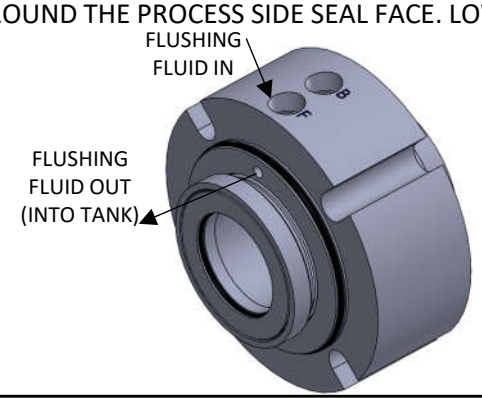
BUFFER FLUID – A DOUBLE MECHANICAL SEAL FLUID SYSTEM WITH THE PRESSURE IN THE SEAL SYSTEM **LESS THAN** THE PRESSURE IN THE TANK. THE DIFFERENTIAL BETWEEN THESE PRESSURES IS DEPENDENT ON THE APPLICATION. ANY SEAL LEAKAGE MAY ALLOW THE PROCESS FLUID TO LEAK INTO THE SEAL BUFFER FLUID.

BUFFER



FLUSH PORT – A PORT IN THE SEAL FOR CLEAN IN PLACE TO FLOOD FLUID AROUND THE PROCESS SIDE SEAL FACE. LOW PRESSURE FLUID SHOULD BE USED WHEN FLUSHING THE FACE.





CAUTION

DISCONNECT MIXER FROM POWER SOURCE BEFORE ASSEMBLING, LIFTING, MOVING, OR SERVICING MIXER.