

6800 Low E Installation Instructions

Live Load Kit Designed by Chesterton to Fit Fisher® Valve Body Design E

Precaution: System should be shut down, depressurized, drained, and cool before valve is handled. Observe all plant safety requirements.

1. **Check the condition of the valve for the following:**

- A 10 to 32 RMS (7.5 to 24 Ra) stem finish is required.
- The stuffing box bore should be 125 RMS (94 Ra) or better finish.
- The stem run out should not exceed ± 0.010 TIR/FT (± 0.25 TIR/M).
- The Packing Box Ring (if used) should be in the bottom of the stuffing box.

2. The stuffing box must be clean, i.e. completely free of any previous packing or foreign material. The valve stem and gland bolt threads must be clean, free of nicks, scratches, and burrs.

3. The packing height is approximately six and a half times the cross section for the 6800 Low E Packing set. Install the Split Sleeve in the bottom of the stuffing box. Make sure the two halves align and are seated properly on the stuffing box bottom.

4. Install Style 477-1DF ring using a Chesterton Valve Tamping Tool. Care must be taken to ensure the skivecut ends are properly mated. Firmly tamp the ring to the bottom of the box.

5. Carefully install the 5800T wedge set starting with End Cap, followed by an I.D. Sealer Ring, O.D. Sealer Ring, I.D. Sealer Ring, and End Cap.

- Install rings over the valve stem by twisting slightly, never open rings with a hinge like action.
- Stagger ring joints 90° .
- Use outer most or next ring to push previously installed rings into stuffing box until all rings are in place.

DO NOT USE A TAMPING TOOL, you may damage the sealing surface on the wedge-shaped rings.

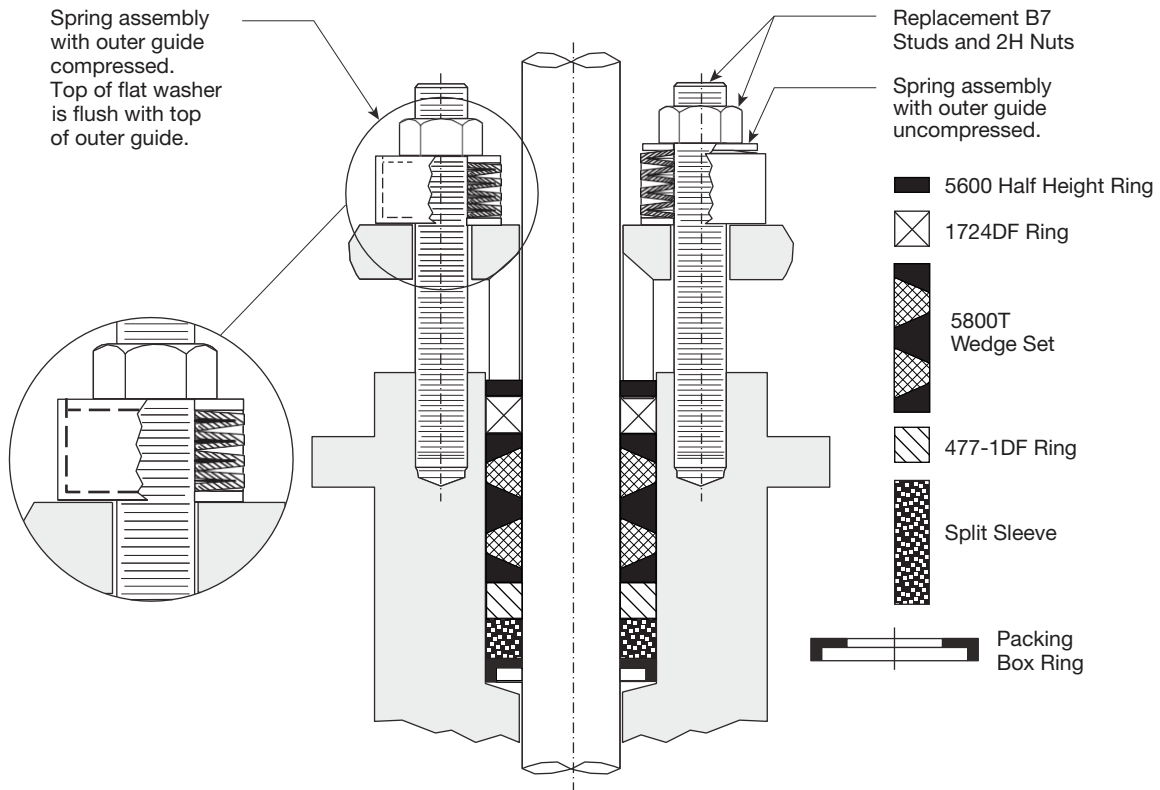
6. Install Style 1724DF ring using a Chesterton Valve Tamping Tool. Firmly tamp the ring and install Style 5600 as the End ring. Care must be taken to ensure the skive-cut ends are properly mated. (See *Packing Configuration*)

- Install the new gland studs provided. Verify the B7 studs and the 2H nuts provided are of the same or better grade than the studs and nuts being replaced.
- Install packing gland follower. Make sure the packing follower enters into the stuffing box smoothly with no interference. Gland nose should penetrate pass the stuffing box chamfers before starting packing compression.
- Lubricate the gland stud threads with Chesterton recommended anti-seize compound. Verify the springs and flat washers are properly stacked. (See *Packing Configuration*)
- Install a live loading assembly on each stud. The cut away portion of the outer guide should face the stem.
- Install the two packing gland nuts. Tighten each nut until finger tight. Alternately tighten the gland nuts until the top surface of the flat washer is flush or even with the top, flat surface of the outer guide. Verify that the packing gland is square and perpendicular to the stem.
- To properly consolidate the packing, reference torque values in Torque and Friction Values table (page 2). When seating the packing set, tighten bolts to the installed torque value supplied (for corresponding valve size). Actuate the valve 5 times, retighten the packing gland nuts at the end of the last down/in-stroke. Loosen gland nuts, then tighten to the operational torque value supplied. Actuate the valve 5 more times then check the gland nut torque. Torque the packing gland nuts at the end of the last down stroke as necessary, using the operational torque value supplied. All final torques will use the operational torque value supplied.
- Follow normal safety precautions when returning the valve to service.
- It is advisable to check gland adjustment after a few hours of service. Take up as necessary.

Important: In cases where the packing needs such adjustments, additional torque should be applied in 5% increments not to exceed 20% greater than the engineered values (Ref. Torque and Friction Values). It should be further noted that stem and stuffing box conditions greatly affect sealability in this type of service.

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PACKING CONFIGURATION



Radial Min. inch/mm	Uncompressed Axial Min. inch/mm	Compressed Height inch/mm	Bolt/Stud Diameter inch/mm	Spring Configuration	AWC Live Load Item #
0.500 / 12,70	.800 / 20,32	.748 / 19,00	.312 / 7,92	2 in par/5 in ser	16272464
0.625 / 15,86	.730 / 18,54	.626 / 15,90	.437 / 11,00	1 in par/4 in ser	16274706
0.718 / 18,24	1.038 / 26,37	.872 / 22,15	.562 / 14,27	2 in par/4 in ser	16274707

Torque and Friction Values

BODY RATING: CLASS 150 and 300

Valve Size inch	Stem O.D. inch/mm	Box I.D. inch/mm	Bolt/Stud Diameter inch/mm	Bolt/Stud Length inch/mm	Box Depth inch/mm	LL Item #	Complete Kit* Item #	Installed Torque		Operational Torque		Predicted Packing Friction	
								Ft-lb	Nm	Ft-lb	Nm	Lb	Kg
1 – 1.5	0.375 / 9,5	0.875 / 22,2	0.312 / 7,9	2.750 / 69,9	2.518 / 63,96	16272464	434147	6	8	5	7	218	99
2 / 3 / 4	0.500 / 12,7	1.000 / 25,4	0.437 / 11,1	3.250 / 82,5	3.565 / 90,55	16274706	434148	10	14	9	12	291	132
6 / 8	0.750 / 19,0	1.375 / 34,9	0.562 / 14,3	4.250 / 108,0	3.835 / 97,41	16274707	434149	23	31	20	27	544	247

BODY RATING: CLASS 600

6 / 8	0.750 / 19,0	1.375 / 34,9	0.562 / 14,3	4.250 / 108,0	3.835 / 97,41	16274707	434149	23	31	20	27	544	247
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*Kits designed to fit the following Fisher® Valve Models: EAC, EAD, EC, ED, EHAT, EHD, EHT, EJ, EP, ES, ENC, END, ENJ, EWPP and ENS.