

STACK VALVE ASSEMBLY INSTRUCTIONS

- 1. INSTALL NUTS AND LOCKWASHERS ON ONE END OF EACH TIEROD.
- 2. INSERT TIERODS THROUGH HOLES IN THE INLET SECTION
- 3. POSITION THE INLET SECTION WITH TIERODS INSTALLED ON ITS SIDE SO TIERODS ARE VERTICAL. PLACE FOUR O-RINGS INTO FOUR GROOVES ON SIDE OF INLET.
- 4. SLIDE THE WORK SECTION DOWN THE TIERODS AND POSITION OVER THE INLET SECTION. PLACE FOUR O-RINGS INTO FOUR GROOVES ON SIDE OF WORK SECTION.
- 5. REPEAT FOR REMAINING WORK SECTIONS AND OUTLET. MAKE CERTAIN O-RINGS STAY IN GROOVES DURING ASSEMBLY.
- 6. INSTALL NUTS AND LOCKWASHERS ON TIERODS. PROGRESSIVELY TIGHTEN TIERODS TO 150 IN-LBS ± 6 IN-LBS $(12.5\ FT-LBS)$
- 7. INSTALL HANDLES AND OPERATE SPOOLS. MAKE CERTAIN THAT SPOOLS DO NOT BIND AND THAT SPOOLS WITH SPRING CENTER RETURN TO NEUTRAL.
- 8. IF A SPOOL BINDS, LOOSEN TIEROD NUTS. RETORQUE ALL NUTS TO 8, THEN 10, AND FINALLY 12.5 FT-LBS.
 9. IF A SPOOL STILL BINDS CHECK FOR A SMASHED O-RING OR CONTAMINATION BETWEEN THE SECTIONS. PLEASE NOTE:

BE VERY CAREFUL NOT TO NICK OR SCRATCH THE PRECISION GROUND SURFACES ON THE SECTIONS. ALSO TAKE CARE TO KEEP THESE SURFACES CLEAN DURING ASSEMBLY.

CLOSED CENTER PLUG, OPTION 3:

This option provides for closed center operation. This is typically used with a variable displacement pressure compensated pump or in a system with an unloading valve. When the spools are in neutral the inlet port is blocked. The power beyond plugs can be used for closed center conversion by plugging the power beyond port. PLEASE NOTE: it may be necessary to increase relief pressure above pump compensator setting.

POWER BEYOND PLUG WITH #8 SAE ORB PORT, OPTION 2:
This option provides for a high pressure power beyond port. This would be used if a valve is to be added downstream.
PLEASE NOTE The outlet must be connected to tank. When spools are in neutral the inlet is connected to power beyond port.

PRESSURE BUILD—UP CART OPTION 6/P.B. PLUG WITH #8 SAE OPTION 7: Open center pressure build—up valve, required for solenoid operated sections. Option 7 same as option 2 but w/pressure build—up.

3 WAY SPOOL, OPTION 'A':

The 'A' work port is plugged. Connect 'B' work port to cylinder.

LOAD CHECK:

The load check feature is standard on all SV series valves. Each spool has a separate load check. The load check will prevent the fall of a cylinder as the spool is shifted. It also prevents the backflow of oil from the work port to the inlet. The pump must build up enough pressure to overcome the pressure on the work port caused by the weight of the load before the cylinder can move.

PLEASE NOTE: The load check has nothing to do with how well the valve will hold up a cylinder with the spool in neutral. The load check is functional only when the spool is shifted.

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