



## INSTALLATION SHEET FOR LS DIRECTIONAL CONTROL VALVES KEEP WITH PRODUCT UNTIL INSTALLED

ADDITIONAL SHEETS MAY BE PRINTED OUT FROM OUR WEBSITE [WWW.BRAND-HYD.COM](http://WWW.BRAND-HYD.COM) UNDER PRODUCT CATALOG SECTION

### How do I adjust pressure relief?

First, remove the chrome hex plug next to the inlet port with a 7/8" combination wrench, etc and set aside. This gives you access to the relief set screw (5/16" hex); for every  $\frac{1}{4}$  **clockwise rotation** of this screw **increases** the pressure approximately 200psi.

Can I paint my valve? – Painting valves is okay as long as the following precautions are taken: 1- All ports must be plugged and 2- the spool must be masked or taped off completely. Any paint on the spool will cause leakage when it chips off. Warranty is void if any valve is returned with paint on the spool.

### How do I assemble the handle to the valve?

Regardless of handle style, the handle retainer will already be installed on the valve.

**For the J-style handle**, recognized by the single slot in the end of the spool, first, place a pin thru the bracket welded to the retainer and secure with a pin clip. Next, place the C-notch of the handle over onto the pin. Finally, align the hole of the handle with the hole on the spool and secure both together using the second pin and clip.

**Note:** Unless specified, the retainer's placement is defaulted so the handle points up when the valve is placed on a flat surface. To change this, prior to handle installation, the screws holding the retainer must be removed and the retainer can then be rotated around the valve in 90° increments.

Pipe thread sealant – Warranty is void when Teflon tape is used to seal pipe threads. This is because Teflon tape is a friction reducing agent which allows customers to over-torque fittings. We recommend using a sealant that does not include friction reducing agents i.e. Lead Plate.

Mounting Surface – The valve must be mounted on a flat surface. It is important not to bend or twist the casting when mounting because this may cause the spool to bind.

Other Information – Valves are available in NPT and SAE, however, we do recommend SAE porting.

### Which port has "Hydraulic Kick-out"?

The "A" port (See Figure 1) will, when the handle is pushed, engage in the detent position. The valve will stay in the detent position until the kick out pressure (See Attachments below) is reached, and then the valve will "Kick-out" of detent into the neutral position.

### What is the typical use of the "Hydraulic Kick-out"?

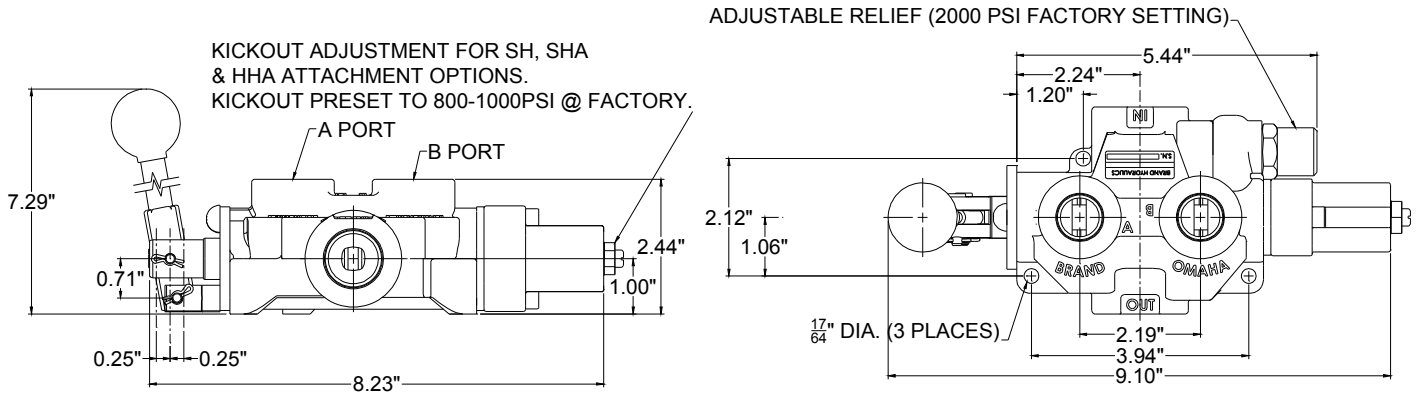
The typical set-up for using the hydraulic kick-out is the retraction of a log splitter cylinder. In this case, the cylinder can retract unmanned while another log is being loaded in the splitter.

### Attachments:

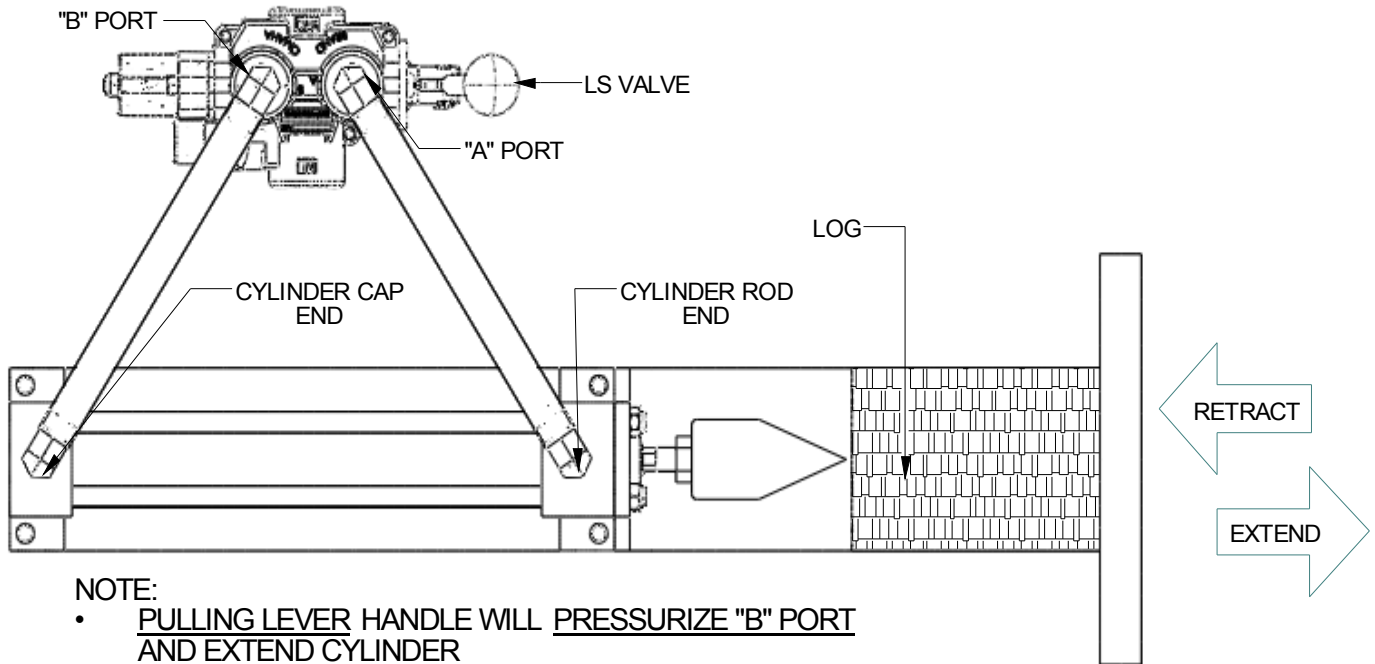
**SH** – Adjustable single hydraulic kick-out that is preset to 800-1000 psi. Kick-out pressure can be adjusted by loosening jam nut and turning set screw. To increase kick-out pressure turn set screw CCW. To decrease kick-out pressure turn set screw CW.

**SHA** – Adjustable single hydraulic kick-out that is preset to 800-1000 psi. Kick-out pressure can be adjusted by loosening jam nut and turning set screw. To increase kick-out pressure turn set screw CW. To decrease kick-out pressure turn set screw CCW.

**HHA** – Adjustable double hydraulic kick-out that is preset to 800-1000 psi. Kick-out pressure can be adjusted by loosening jam nut and turning set screw. To increase kick-out pressure turn set screw CW. To decrease kick-out pressure turn set screw CCW.



**Figure 1: Dimensions for LS755T4JRSR valve, J-style handle shown in standard position**



**NOTE:**

- PULLING LEVER HANDLE WILL PRESSURIZE "B" PORT AND EXTEND CYLINDER
- PUSHING LEVER HANDLE WILL PRESSURIZE "A" PORT AND RETRACT CYLINDER.
- LEVER HANDLE WILL KICK BACK TO NEUTRAL WHEN CYLINDER IS FULLY RETRACTED

**Figure 2: Typical Installation of a J-style handle LS valve**