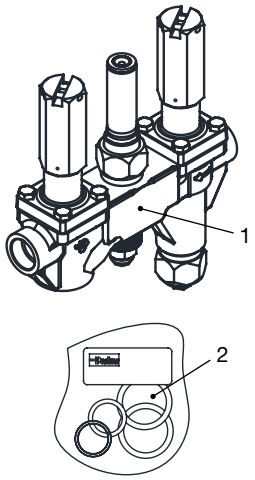
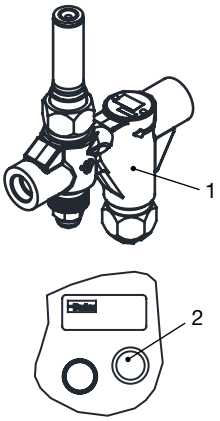
1

A

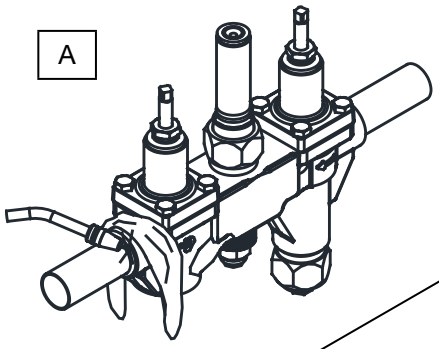


B

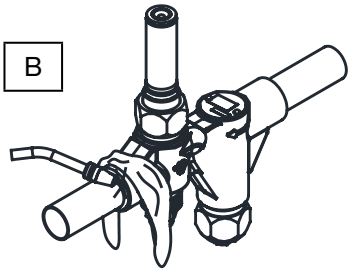


3

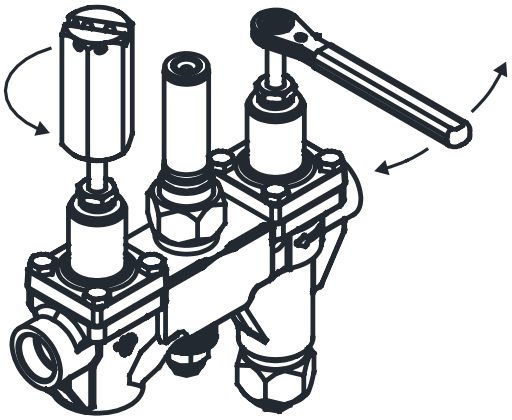
A



B

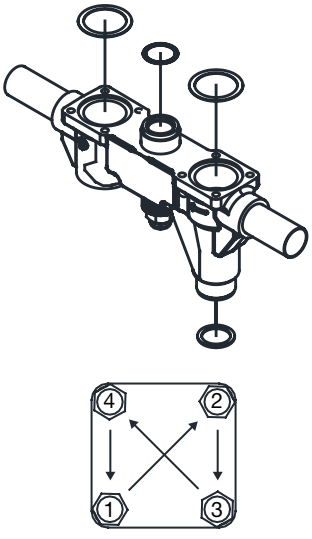


2

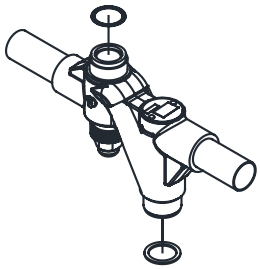


4

A



B



Parker Hannifin Corporation
Refrigerating Specialties Division
2445 South 25th Avenue
Broadview, IL 60155-3891 USA
Phone: (708) 681-6300
Fax: (708) 681-6306

ISO 9001 CERTIFIED

P/N 314455RSD Date: 02-18 ECO: 0209946

ENGLISH

Parker Weld in Valve Station (S8VS and SST) Installation Information

Operation
Prior to installing S8VS or SST valves the included safety bulletin must be read and understood.

Refrigerants
Suitable for ammonia and other common refrigerants

Liquid Temperature Range
-50ºC to 105ºC (-58ºF to 221ºF)

Ambient Temperature Range
-50ºC to 60ºC (-58ºF to 140ºF)

Maximum Rated Pressure (MRP)
32 barg (465 psig)

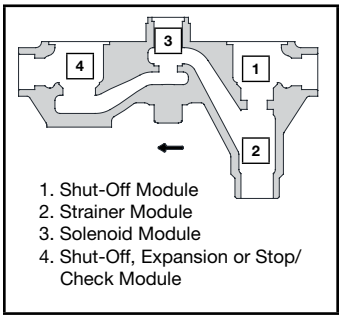
Maximum Operating Pressure Differential (MOPD)
21 bard (305 psid)

Connection Types
Socket Weld (SW)
Butt Weld (BW) ANSI
Butt Weld (BW) DIN

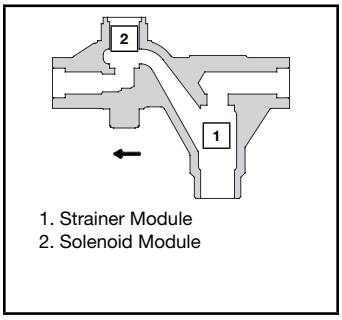
Strainer
60 mesh

Figure 1.A: Components
1 - S8VS Valve Assembly (modules will vary)
2 - Gasket Kit

Figure 1.B: Components
1 - SST Valve Assembly
2 - Gasket Kit



1. Shut-Off Module
2. Strainer Module
3. Solenoid Module
4. Shut-Off, Expansion or Stop/ Check Module



1. Strainer Module
2. Solenoid Module

Figure 2: S8VS hand shut-off & expansion modules welding position

Figure 3.A/3.B: Welding diagram

Figure 4.A/4.B: Torque Specs

Valve Type	Bolt Size	Module Position	Torque	
			Nm	ft. lb.
S8VS	5/16 -18	1 & 4	26	19
	1 1/2 Nut	2	81	60
	1 1/2 Nut	3	81	60
	Seal Cap	—	Hand Tight	
SST	1 1/2 Nut	1	81	60
	1 1/2 Nut	2	81	60
	Seal Cap	—	Hand Tight	

Installation
All personnel working on valves must be qualified to work on refrigeration systems. If there are any questions contact Refrigerating Specialties before proceeding with the installation.

All valves are packed for a maximum protection. Unpack carefully. Check the carton to make sure all items are unpacked, see Figure 1 for the list of items included.

The valve should be installed in a location where it is easily accessible for adjustment and maintenance. The location should be such that the valve can not be easily damaged by material handling equipment. When it is necessary to insulate the valve the insulation should be installed to provide access for adjustment and maintenance. Do not insulate solenoid coils, this aslo applies to pressure regulators with pilot solenoid options. Pressure gauges should be installed to be easily visible to the operating engineer for system checks and adjustment purposes.

The S8VS and SST series valves must be mounted in the upright horizontal position with the manual opening stems on the top. The valve must be installed with the arrow pointing in the direction of flow for the valve to function properly.

It is not necessary to disassemble the S8VS or SST before welding. The hand shut-off and expansion modules on the S8VS valves should be positioned in the mid position, off the seat. To gain access to the adjustments stems for the hand shut-off and expansion modules remove the seal caps, as shown in Figure 2, prior to welding. It is recommended to use a wet rag around the valve near the weld location, as shown in Figure 3.

Note: The S8VS stop/check module can not be back seated.

Contractors need to follow a WPS (Welding Procedure Specification) for all welding. The procedure must be qualified and the welder doing the weld must be qualified to perform that procedure.

The codes applicable to the welding of socket weld valves require that the pipe be inserted into the socket until bottomed against the stop. The pipe is then to be backed out approximately 1/16 of an inch before welding. Use of welding rings is optional, but recommended for butt weld valves. They help align, control the width of the gap for full penetration welding and reduce welding debris entry.

Note: When welding carbon steel and stainless steel the welded joint should be painted to prevent galvanic corrosion. Use American Welding Society (AWS) standards for proper welding wire or weld rod.

After welding the valve in place back seat the hand shut-off modules and put the seal caps back to the correct location. The expansion and electronic models can be adjusted at a later time. Seal caps are color coded: red for the stop/check module, yellow for the hand expansion module and non-painted for the hand shut-off module. Reference the module identifying sections in this literature for correct seal cap locations.

Installation (Disassembled)
If you choose to disassemble the valve station prior to welding protect the inside of the valve station body, bonnet assemblies, solenoid pilot assembly, piston, seat and strainer from welding debris and dirt. Place the components in a plastic bag, plastic container or use a rust protection agent, such as refrigerant oil, and store them in an area where they will not be damaged.

Note: Do not remove the manual opening packing nut, stem or packing.

When welding in the valve care should be taken not to damage the internal from weld splatter and debris. After welding check all contact surfaces for damage.

Note: Refrigerating Specialties provides new bonnet gaskets for each module to be use as a replacement if valve is disassembled for welding, see Figure 4 for gasket location. See Image 1 below for the correct orientation of the solenoid module wolverine gasket.

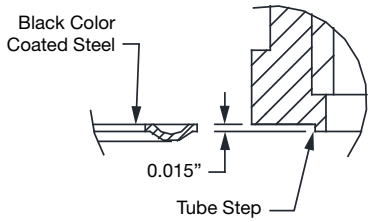


Image 1: Correct Orientation of the Wolverine Gasket

Reassemble valve in reverse order. For modules 1 and 4 on the S8VS valve tighten the bonnet and port plate assemblies with a torque wrench, evenly in a X configuration, shown in Figure 4, to provide proper seating. For all other torque specs refer to the table in Figure 4 of this literature. Apply some silicon grease on the o-rings for protection and ease of installation.

Before putting valves into service, all pipe connections, valve seats, bonnet seals, and stem seals should be tested for leaks at pressure levels called for in appropriate codes.

See bulletin 10-02 and 10-04 for information on the S8VS and SST valves.