

Versilon™ W.S.I.B. Hose Assemblies

Sanitary Tube Size Smooth Inner Bore Fluoropolymer Hose

Smooth Inner Bore Technology

Saint-Gobain Performance Plastics' Versilon W.S.I.B. hose is a flexible face-to-face FEP lined hose assembly utilizing smooth inner bore technology, assuring a totally bacteria-free, crevice-free fluoropolymer contact surface. This connection technology features a smooth transition through the hose fitting to the stainless steel tubing, optimizing process transfer, thus reducing concerns of pressure drop, product hold-up, and drainability.

Ideal for Sanitary Applications

W.S.I.B. hose's full flow, no entrapment and fully self-draining characteristics make it a top choice for sanitary applications. W.S.I.B. has a reduced pressure drop through the fitting compared to crimp-style fitting systems and can be steam or chemically sterilized in-line with any industrial cleaner, solvent, or sterilizing method.

Features and Benefits

- Flexible face-to-face fluoropolymer lined hose assembly
- Inert and chemically resistant to most chemicals and reagents
- S.I.B.® (Smooth Inner Bore) technology ensures crevice-free fluoropolymer contact surface
 - Ensures smooth transition from stainless steel tubing through hose fitting
 - Optimizes process transfer
 - Full flow characteristics
 - No entrapment
 - Fully self-draining
 - Reduced pressure drop through the fitting compared to crimp-style fitting systems
- Cleanable by CIP, SIP
- Resistant to chemicals, ozone and abrasion

Typical Applications

- Pharmaceutical processing
- Chemical transfer
- Acid transfer
- Sensitive product transfer
- Load cells
- Storage vessels

Fittings Options

Versilon Flare-Thru Fittings

- Clamp style (sanitary only)
- 316L stainless steel sanitary back-up ends, Flare-Thru FEP fluoropolymer liner
- Male and female "I" Line® sanitary fittings also available

W.S.I.B. Hose Specifications

Part Number	Nominal Inside Diameter		Actual Inside Diameter		Outside Diameter		Maximum Working Pressure		Minimum Bend Radius	
	in.	mm	in.	mm	in.	mm	PSI	MPa	in.	mm
14WSIB	7/8	22.23	7/8	22.23	1.53	38.86	450	3.10	4.75	120.65
22WSIB	1-3/8	34.93	1-3/8	34.93	2.06	52.32	300	2.07	9.00	228.60
30WSIB	1-7/8	47.63	1-7/8	47.63	2.58	65.53	250	1.72	11.50	292.10
46WSIB	2-7/8	73.03	2-7/8	73.03	3.71	94.23	150	1.03	22.00	558.80

NOTE: Outside diameter dimensions are nominal.

W.S.I.B. hose assemblies are **not** rated for vacuum process conditions.
 Solid PTFE clamp style gaskets **must** be used with W.S.I.B. assemblies to ensure leak-tight performance.
 W.S.I.B. sold as assembly only.
 Consult factory for additional sizes and cover color options.

Important:

Working Pressure is given @ 70°F; decrease working pressure 1% for every 2°F above 212°F.

Flare-Thru fittings are pressure rated only. Not rated for vacuum service.

Extended Service Life Tip: Saint-Gobain suggests using full-length anti-kink armor casing or at least 16" to 24" long anti-kink cuffs at each fitting end to help reduce the strain on the crimp collar and fittings in high load installations. Prolonged service at elevated temperatures will reduce total service life.

Fluoropolymer Physical Properties	Durometer Hardness Shore, A, 15s	Color	Maximum Recommended Operating Temp. °F (°C)	Tensile Strength psi (MPa)	Ultimate Elongation %	Brittle Temperature °F (°C)	Specific Gravity	Water Absorption %	Chemical Solvent Resistance	Folding Endurance (cycles)
ASTM Method	D2240-91			D1457, D1708, D638	D1457, D1708, D638	D746-79	D792	D570-81		
FEP	55D	Translucent	400 (204)	3400 (23)	325	-100 (-73)	2.15	<0.01	Excellent	5-80 x 10 ³
PFA	60D	Translucent	500 (260)	3600 (25)	300	-320 (-196)	2.15	<0.03	Excellent	50-500 x 10 ³
PTFE	58D	Translucent	500 (260)	3000 - 5000 (20.7 - 34.5)	300	-450 (-268)	2.13 - 2.22	<0.01	Excellent	10 ⁶

Construction

Inner Tube:	FEP Tube ID matches stainless steel sanitary tubing
Cover:	EPDM rubber
Reinforcement:	Multiple polyester plycord and EPDM rubber Double helix, high tensile strength carbon steel wire
Color:	White with a gray layline in white lettering
Temperature Rating:	-40°F to +350°F -40°C to +177°C
Maximum Length:	7/8" 20' 1-3/8" 20' 1-7/8" 20' 2-7/8" 20'
Minimum recommended assembly length:	7/8" 12" 1-3/8" 15" 1-7/8" 18" 2-7/8" 24"

Minimum manufacturing assembly length:*	7/8" 12" 1-3/8" 12" 1-7/8" 12" 2-7/8" 15"
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*While these short lengths can be manufactured, little "free hose" is included in the assembly and almost no flexibility is present.

Industry Approvals & Compliances

- Compliant with FDA 21CFR177.1550
- US Pharmacopeia Class VI
- 3-A Sanitary Standard 62-02

Limited Warranty: For a period of 6 months from the date of first sale, Saint-Gobain Performance Plastics Corporation warrants this product(s) to be free from defects in manufacturing. Our only obligation will be to provide replacement product for any portion proving defective, or at our option, to refund the purchase price thereof. User assumes all other risks, if any, including the risk of injury, loss or damage, whether direct or consequential, arising out of the use, misuse, or inability to use this product(s). SAINT-GOBAIN DISCLAIMS ANY AND ALL OTHER WARRANTIES, EXPRESSED OR IMPLIED, INCLUDING THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.



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