

7/17/2019

TSSA 345 Carlingview Drive Toronto ON, M9W 6N9

Dear Joanna Karpinski

Re: Reciprocal CRN Registration in Manitoba

Your application indicates that a CRN has been received in another Canadian Jurisdiction, and therefore your CRN has been registered in Manitoba as follows:

File Number: 74-R50

CRN:

0A21486.54

Scope:

SEE ATTACHMENT B FOR SCOPE OF REGISTRATION) REV C

Manufacturer: SWAGELOK COMPANY

Please find attached invoice for registration.

As indicated by the Regulatory Reconciliation and Cooperation Table and the Reconciliation Agreement for the Canadian Registration Number (CRN) for Pressure Equipment, a CRN issued in any Canadian Jurisdiction will be accepted for use in Manitoba.

In accordance with Steam and Pressure Plants Regulation and CSA B51, it is the manufacturer's responsibility to file a Manufacturers Data Report, including partial data reports, with our office, prior to shipping pressure equipment to Manitoba.

Please contact me directly via email at Cheryl.Lashek@gov.mb.ca for any questions or concerns.

Cheryl Lashek, P.Eng Director, ITSM Inspection and Technical Services Office of the Fire Commissioner 508 - 401 York Avenue, Winnipeg Manitoba R3C 0P8 T (204) 945-3507 | F (204) 948-2309



PV 09553 (06/16)

Technical Standards and Safety Authority 345 Carlingview Drive Toronto, Ontario M9W 6N9 www.tssa.org Show facsimile of manufacturer's logo or trademark, as it will appear on the fitting, in the space below



STATUTORY DECLARATION Registration of Fittings I. Joel Feldman, Vice President of Engineering (Name and Position, e.g. President, Plant Manager, Chief Engineer) of Swagelok Company (Name of Manufacturer) Located at 29500 Solon Road, Solon, Ohio 44139 USA (440) 248-4600 (440) 349-5970 (Plant Address) (Telephone No.) (Fax No.) do solemnly declare that the fittings listed hereunder, which are subject to the Technical Standards and Safety Act, Boilers and Pressure Vessels Regulation, comply with all of the requirements of ASME B31.1 for unlisted components, and ASME B31.3 for unlisted components (Title of recognized North American Standard) which specifies the dimensions, materials of construction, pressure/temperature ratings, identification marking the fittings and service; or are not covered by the provisions of a recognized North American standard and are therefore manufactured to comply with as supported by the attached data which identifies the dimensions, material of construction, pressure/temperature ratings and the basis for such ratings, the marking of the fitting for identification and service. I further declare that the manufacture of these fittings is controlled by a quality system meeting the requirements of ISO 9001:2015 which has been verified by the following authority, BSI The items covered by this declaration, for which I seek registration, are category. A. Fittings. type fittings. In support of this application, the following information and/or test data are attached as follows: ISO 9001:2015 Certificate, Attachment A, Attachment B, Catalog Information and other Support Documents (drawings, calculations, test reports, etc.) in the State of Chio Declared before me at 5000 day of March AD 20 19 Commissioner for Oaths: (Signature) (Signature of Declarer) FOR OFFICE USE ONLYTechnical Boilers and To the best of my knowledge and belief, the application meets the requirements of the tandards Pressure Vessels Technical Standards and Safety Act, Boilers and Pressure Vessels Regulation, and uthority Satesy Program CSA Standard B51 and is accepted for registration in Category CRN: Registered by: Dated: NOTE: This registration expires on:

Attachment B. Scope of Registration for Swagelok 2507 Super Duplex, (ASTM A479), Tube Fittings (Category A)

This document represents the scope of Swagelok 2507 Super Duplex Tube Fittings covered by this submission for CRN approval. These Swagelok Tube Fittings have been evaluated in accordance with ASME B31.3 for unlisted components and ASME B31.1 for unlisted components.

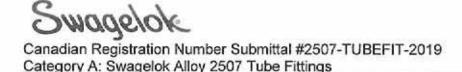
Summary Table

Product Description or Series	Material	Port Connections and Sizes		Maximum Al Pr	Design Code	
				Up to 100°F	At maximum temperature	Construction
Gaugeable Tube Fittings and Adapter Fittings	Alloy 2507 (ASTM A479)	Swagelok End Connection 1/4, 3/8, 1/2, 5/8, 3/4 inches		See Table below	See Table on Page 1	
		NPT Male 1/16 - 1 inch	ASME B31.3	15,000 - 10,000 psig	12,150 - 8100 psig @ 482°F (250°C)	ASME B31.3 (Unlisted Components) ASME B31.1 (Unlisted Components)
			ASME B31.1	15,000 - 8900 psig	12,150 - 7209 psig @ 482°F (250°C)	
		NPT Female 1/16 - 1 inch	ASME B31.3	13,000 - 8600 psig	11,530 – 6966 psig @ 482°F (250°C)	
			ASME B31.1	11,000 - 7300 psig	8910 – 5913 psig @ 482°F (250°C)	
		UN / UNF(SAE) Stud (ST) 1/8 - 3/4 inch		4500 - 3600 psig	4500 - 3600 psig @ 400°F (204°C) With FKM O-ring	A 21486.

2507 Swagelok Tube Fitting Pressure Rating Table

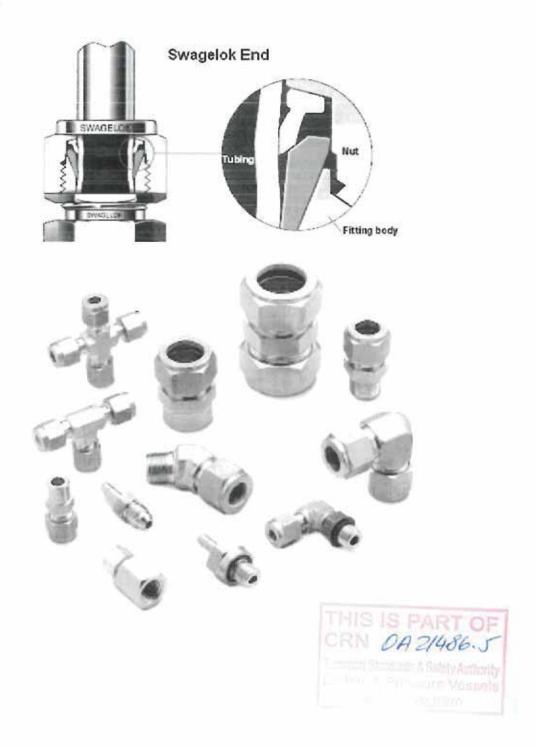
	Maximum Allowable Working Pressure (1)					
Swagelok End Connection Size	B31.3 ratings up to 100°F	B31.1 ratings up to 100°F	B31.3 ratings @ maximum temperature 482°F (250°C)	B31.1 ratings @ maximum temperature 482°F (250°C)		
1/4	15,000 psig	12,900 psig	12,150 psig	10,449 psig		
3/8	12,700 psig	10,922 psig	10,287 psig	8847 psig		
1/2	12,900 psig	11,094 psig	10,449 psig	8986 psig		
5/8	10,100 psig	8686 psig	8181 psig	7036 psig		
3/4	9380 psig	8067 psig	7598 psig	7023 psig		

Note (1): Values based on thickest wall alloy 2507 tubing per Swagelok Tubing Data Sheet MS-01-107. Thinner tubing may be used but in all cases the ratings are less than, or equal to, those shown in the table.



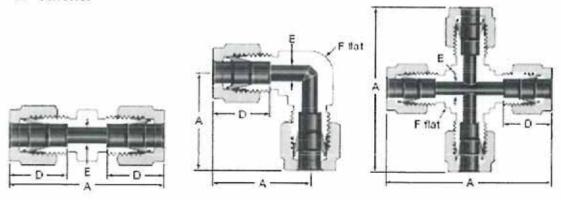
Product Description

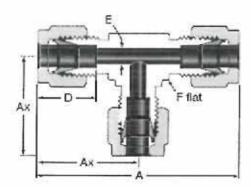
Swagelok Fittings are furnished in a variety of configurations and shapes (straight, elbow, tee or cross). Swagelok Fittings consist of at least one Swagelok End – a proprietary two-ferrule mechanical-grip design. The "Configurations" section covers a variety of other end connections.



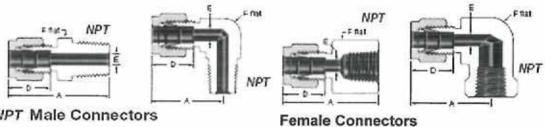
Configurations

1. Unions.

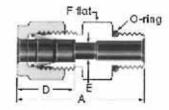




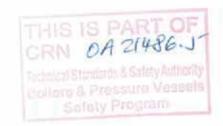
2. Male and Female connectors / adapters.



NPT Male Connectors



SAE/MS Straight Thread Stud (ST)



Product Options:

Some of the product options listed below affect the pressure-temperature ratings in the "Scope of Registration" section above, but in all cases the PRESSURE ratings are the same or less than those shown in the table.

- 1. Tapered pipe threads (NPT) with sealant
 - a. Curable resin with PTFE
 - b. PTFE tape
- Bored through fittings

Additional options that do not affect pressure and/or temperature ratings may be made available within the scope of this approval. Examples of these would include the following:

- 1. Special marking
- 2. Special cleaning
- 3. Wire drills
- 4. bulkhead configurations
- 5. Snubbers/frits and orifice plates

All of the above options, those that affect pressure and/or temperature ratings and those that do not, are within the scope of this approval.

Quality System

The Swagelok Company quality system complies with the requirements of ISO 9001:2015. The Swagelok Company maintains BSI Registration Number FM 01729, which applies to all locations listed on the Certificate.

References

The product catalog does not represent the full scope of the registration but rather details some of the most common options.

- Gaugeable SAF 2507 Super Duplex Tube Fittings MS-01-174
- Swagelok Tubing Data Sheet MS-01-107, Rev Q



Attachment A. Swagelok Manufacturing Locations

This document lists the Swagelok locations where end item or component level manufacturing activities take place.

Swagelok Company	Swagelok Company (Falon 1)		
29500 Solon Road	348 Bishop Road		
Solon, Ohio 44139	Highland Heights, Ohio 44143		
USA	USA		
Swagelok Company (Highland)	Swagelok Company (Falon 2)		
318 Bishop Road	358 Bishop Road		
Highland Heights, Ohio 44143	Highland Heights, Ohio 44143		
USA	USA		
Swagelok Company (OFC)	Swagelok Company (HPF)		
29495 F.A. Lennon Drive	6050 Cochran Road		
Solon, Ohio 44139	Solon, Ohio 44139		
USA	USA		
Swagelok Company (Atlantic)	Swagelok Company (Snow Metal)		
26651 Curtiss Wright Parkway	6060 Cochran Road		
Willoughby Hills, Ohio 44092	Solon, Ohio 44139		
USA	USA		
Swagelok Company (Micro) 26653 Curtiss Wright Parkway Willoughby Hills, Ohio 44092 USA	Swagelok Company (Alfred) 29500 Ambina Drive Solon, Ohio 44139		
Swagelok Hose Services Company (SHSC)	Swagelok Company (Strongsville)		
29900 Solon Industrial Parkway	15400 Foltz Road		
Solon, Ohio 44139	Strongsville, Ohio 44119		
Swagelok (China) Fluid System Technologies Ltd.	Swagelok Company A.G. (European Technology		
Changshu Export Process Zone	Center)		
Changshu Economic Development Zone	St. GallerstraBe 84		
Changshu, Jiangshu	Lachen, Switzerland 8853		
215513 China	Switzerland		
Swagelok Limited Tromode IM4 4RA Isle of Man	THIS IS PART OF		

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