



# **Parker Legris**

Machine Safety: Product Sheets



ENGINEERING YOUR SUCCESS.



## Blocking Fittings

Blocking fittings include a pneumatic monostable 2/2 normally closed (NC) function.

These fittings are directly installed onto the pneumatic cylinder supply and exhaust chamber.



**Blocking Fitting, Male BSPP Thread**

ØD	C	
6	G1/8	<a href="#">7880 06 10</a>
	G1/4	<a href="#">7880 06 13</a>
8	G1/4	<a href="#">7880 08 13</a>
	G3/8	<a href="#">7880 08 17</a>
10	G3/8	<a href="#">7880 10 17</a>



**Blocking Fitting, Male/Female BSPP Thread**

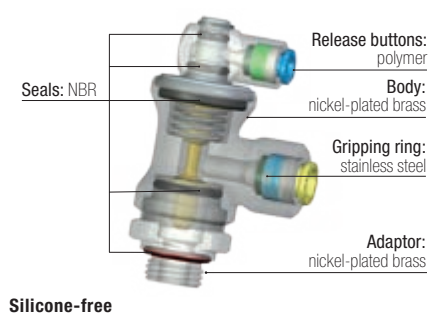
C1	C2	
G1/8	G1/4	<a href="#">7881 13 10</a>
G1/4	G1/4	<a href="#">7881 13 13</a>
G3/8	G3/8	<a href="#">7881 17 17</a>
G1/2	G1/2	<a href="#">7881 21 21</a>



**Blocker/Flow Regulator, Male BSPP Thread**

ØD	C	
4	G1/8	<a href="#">7883 04 10</a>
6	G1/8	<a href="#">7883 06 10</a>
	G1/4	<a href="#">7883 06 13</a>
	G1/4	<a href="#">7883 08 13</a>
8	G3/8	<a href="#">7883 08 17</a>

### Component Materials



## ✓ Machinery Directive DI 2006/42/EC

### ISO 13849: Reliability (related to MTTFd of safety function)

B10d = 100 000 000 cycles, according to ISO 19973 tests with a frequency of 1Hz.

The failure criteria is determined by the safety function (valve) according to standard ISO 19973.

### Conditions of use Safety Coefficient (related to CCF)

Fluids: compressed air

Working pressure: 1 to 10 bar

Working temperature:

-20°C to +70°C

-25°C to +70°C (metal version)

Working pressure is dependant upon the cracking pressure with a safety coefficient of 3.

### Endurance (related to CCF)

The number of pressure cycles of the instant connection function of the fitting connected to polymer semi-rigid tubing at 1Hz from 1 to 6 bar : 63 000 000

### Diagnostic coverage (related to DC avg and to safety function)

Sources of failure related to pneumatic components, taken from the DIN EN ISO 13849-2 standard.

Impossible to eliminate the failure:

- Change of response time
- No commutation/no return commutation
- Change of leakage over a long period of use
- Pressure drop

## ✓ Reference Directives and Standards for Design

### ISO 12238

Commutation switch: 5 ms

Commutation time is determined according to the standard test methodology.

### ISO 14743

Instant connection complies with the ISO14743 tests.

### EN 10204

With the order reference, we can provide types 2.2 ou 2.1 certificates, upon request.

### Pressure equipment directive 2014/68/EC

Meet the requirements of § 4.3 article and test pressure equivalent to 1.5 times the recommended working pressure.

### Complementary Ranges

- Polyamide tubing
- Polyurethane tubing
- Polyethylene tubing





## Piloted Non-Return Valves (PNRV)

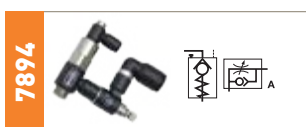
These fittings include a normally closed (NC) monostable valve with a flow control regulation function and quick exhaust (model 7894).

These fittings are directly installed onto the pneumatic cylinder supply and exhaust chamber.



**Piloted Non-Return Valve, Male BSPP Thread**

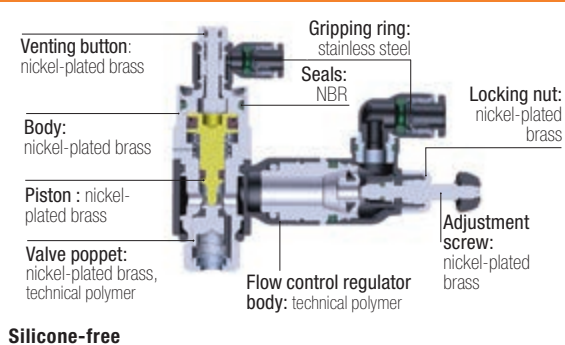
ØD	C	
6	G1/8	<a href="#">7892 06 10</a>
	G1/4	<a href="#">7892 06 13</a>
8	G1/8	<a href="#">7892 08 10</a>
	G1/4	<a href="#">7892 08 13</a>
	G3/8	<a href="#">7892 08 17</a>
10	G3/8	<a href="#">7892 10 17</a>
	G1/2	<a href="#">7892 10 21</a>
12	G1/2	<a href="#">7892 12 21</a>



**Piloted Non-Return Valve with Flow Regulator and Exhaust, Male BSPP Thread**

ØD	C	
6	G1/8	<a href="#">7894 06 10</a>
	G1/4	<a href="#">7894 06 13</a>
8	G1/8	<a href="#">7894 08 10</a>
	G1/4	<a href="#">7894 08 13</a>
	G3/8	<a href="#">7894 08 17</a>
10	G3/8	<a href="#">7894 10 17</a>
	G1/2	<a href="#">7894 10 21</a>
12	G1/2	<a href="#">7894 12 21</a>

### Component materials



**Silicone-free**

## Machinery Directive DI 2006/42/EC

**ISO 13849 : reliability**  
(related to MTTFd of safety function)

Not applicable

**Conditions of use**  
**Safety coefficient**  
(related to CCF)

Fluids: compressed air  
Working pressure: 1 to 10 bar  
Working temperature:  
-5°C to +60°C

**Endurance**  
(related to CCF)

The number of pressure cycles of the instant connection function of the fitting connected to polymer semi-rigid tubing at 1Hz from 1 to 6 bar: 63 000 000

**Diagnostic coverage**  
(related to DC avg and to safety function)

Sources of failure related to pneumatic components, taken from the DIN EN ISO 13849-2 standard.

Impossible to eliminate failure:

- Change of response time
- No commutation/no return commutation
- Change of leakage over a long period of use
- Pressure drop

## Reference Directives and Standards for Design

### ISO 12238

Commutation switch: < 5 ms  
Commutation time is determined according to the standard test methodology.

### ISO 14743

Instant connection comply with the ISO14743 tests.

### EN 10204

With the order reference, we can provide types 2.2 ou 2.1 certificates, upon request.

### Pressure equipment directive 2014/68/EC

Meet the requirements of § 4.3 article and test pressure equivalent to 1.5 times the recommended working pressure.

## Complementary Products

- Polyamide tubing
- Polyurethane tubing
- Polyethylene tubing





## Non-Return Valves

Non-return valves include a monostable normally closed (NC) valve with a cracking threshold of 0,3 bar.



**7984**  
In-Line Non-Return Valve, Supply,  
Male BSPP and Metric Thread

ØD	C	
4	M5x0.8	<a href="#">7984 04 19</a>
	G1/8	<a href="#">7984 04 10</a>
6	G1/8	<a href="#">7984 06 10</a>
	G1/4	<a href="#">7984 06 13</a>
8	G1/8	<a href="#">7984 08 10</a>
	G1/4	<a href="#">7984 08 13</a>



**7994**  
In-Line Non-Return Valve, Exhaust,  
Male BSPP and Metric Thread

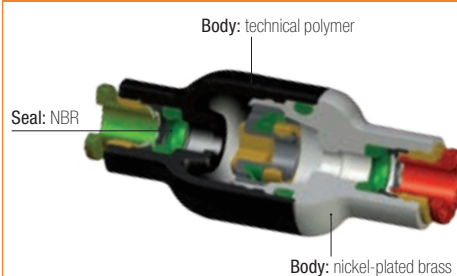
ØD	C	
4	M5x0.8	<a href="#">7994 04 19</a>
	G1/8	<a href="#">7994 04 10</a>
6	G1/8	<a href="#">7994 06 10</a>
	G1/4	<a href="#">7994 06 13</a>
8	G1/8	<a href="#">7994 08 10</a>
	G1/4	<a href="#">7994 08 13</a>



**7996**  
In-Line Equal Non-Return Valve

ØD	
4	<a href="#">7996 04 00</a>
6	<a href="#">7996 06 00</a>
8	<a href="#">7996 08 00</a>
10	<a href="#">7996 10 00</a>
12	<a href="#">7996 12 00</a>

### Component Materials



**Silicone-free**



## Machinery Directive DI 2006/42/EC

### ISO 13849 : reliability (related to MTTFd of safety function)

B10d = 26 000 000 cycles , according to ISO 19973 tests with a frequency of 1Hz.  
The failure criteria is determined by the safety function (valve) according to standard ISO 19973.

### Conditions of use Safety coefficient (related to CCF)

Fluids: compressed air  
Working pressure: 1 to 10 bar  
Working temperature:  
0°C to +70°C

### Endurance (related to CCF)

The number of pressure cycles of the instant connection function of the fitting connected to polymer semi-rigid tubing at 1Hz from 1 to 6 bar : 63 000 000

### Diagnostic coverage (related to DC avg and safety function)

Sources of failure related to pneumatic components, taken from the DIN EN ISO 13849-2 standard.

Impossible to eliminate failure:

- Change of response time
- No commutation/no return commutation
- Change of leakage over a long period of use
- Pressure drop



## Reference Directives and Standards for Design

### ISO 12238

Commutation switch: < 5ms  
Commutation time is determined according to the standard test methodology.

### ISO 14743

Instant connection comply with the ISO14743 tests.

### EN 10204

With the order reference, we can provide types 2.2 ou 2.1 certificates, upon request.

### Pressure equipment directive 2014/68/EC

Meet the requirements of § 4.3 article and test pressure equivalent to 1.5 times the recommended working pressure.

## Complementary Products

- Polyamide tubing
- Polyurethane tubing
- Polyethylene tubing







## Nickel-Plated Brass Adjustable Non-Return Valves

Adjustable non-return valves include a monostable normally closed (NC) valve with a cracking threshold that is adjustable from 0,10 to 1 bar.



**Adjustable Check Valve, Double Female BSPP and Metric Thread**

C	
M5x0.8	<a href="#">7930 19 19</a>
G1/8	<a href="#">7930 10 10</a>
G1/4	<a href="#">7930 13 13</a>
G3/8	<a href="#">7930 17 17</a>
G1/2	<a href="#">7930 21 21</a>



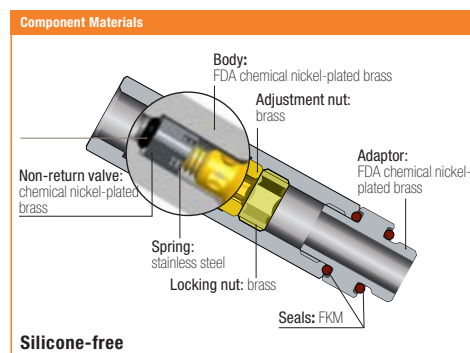
**Adjustable Check Valve Supply, Male/Female BSPP Thread**

C	
G1/8	<a href="#">7931 10 10</a>
G1/4	<a href="#">7931 13 13</a>
G3/8	<a href="#">7931 17 17</a>
G1/2	<a href="#">7931 21 21</a>



**Adjustable Check Valve Exhaust, Male/Female BSPP Thread**

C	
G1/8	<a href="#">7932 10 10</a>
G1/4	<a href="#">7932 13 13</a>
G3/8	<a href="#">7932 17 17</a>
G1/2	<a href="#">7932 21 21</a>



### Directive machine DI 2006/42/CE

#### ISO 13849: Reliability (related to MTTFd of safety function)

Not applicable

#### Conditions of use Safety coefficient (related to CCF)

Fluids: compressed air  
Working pressure: 1 to 12 bar  
Working temperature:  
-20°C to +80°C

#### Endurance (related to CCF)

10 million cycles.  
Endurance corresponds to the valve opening function at 7 bar with control of flow accuracy.

#### Diagnostic coverage (related to DC avg and to safety function)

Sources of failure related to pneumatic components, taken from the DIN EN ISO 13849-2 standard.  
Impossible to eliminate failure:  
- Change of response time  
- No commutation/no return commutation  
- Change of leakage over a long period of use  
- Pressure drop



### Reference Directives and Standards for Design

#### ISO 4414

Designed to avoid dangerous significant phenomena related to the use of pneumatic transmission in a machine, listed in appendix A, chart A1, A7 (food compatibility), A12.6

#### Technical specifications Cracking pressure

Threads	0 to 4 tours (values given as an example only)
M5x0.8 - G1/8 - G1/4	1 to 0,10 bar
G3/8	1 to 0,15 bar
G1/2	1 to 0,20 bar

#### EN 10204

With the order reference, we can provide types 2.2 ou 2.1 certificates, upon request.

#### Pressure equipment directive 2014/68/EC

Meet the requirements of § 4.3 article and test pressure equivalent to 1.5 times the recommended working pressure.

### Complementary Ranges

- Polyamide tubing
- Polyurethane tubing
- Polyethylene tubing



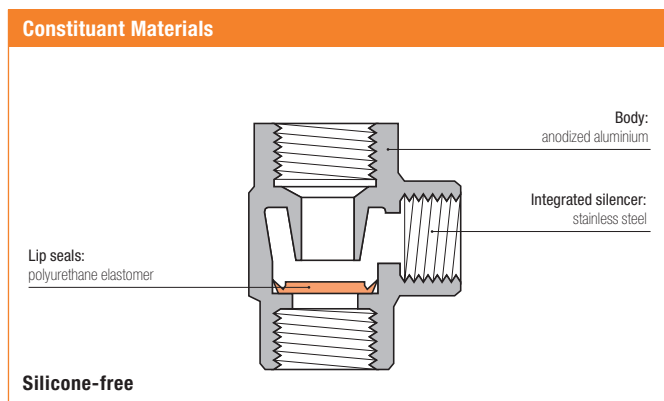


## Quick Exhaust Valve

The metal quick exhaust valve includes a normally closed (NC) single shut-off function.

Installed on the venting circuit, this valve increases the return speed of the cylinder.

<b>7971</b>			
<b>Elbow Quick Exhaust Valve, Male BSPT/Female BSPP Thread</b>			
<b>C</b>	<b>C1</b>		
G1/8	R1/8	<b>7971 10 10</b>	
G1/4	R1/4	<b>7971 13 13</b>	
G3/8	R3/8	<b>7971 17 17</b>	
G1/2	R1/2	<b>7971 21 21</b>	



## Machinery Directive DI 2006/42/EC

### ISO 13849: reliability (related to MTTFd of safety function)

Not applicable

### Conditions of use Safety coefficient (related to CCF)

Fluids: compressed  
Working pressure: 0,7 to 10 bar  
Working temperature:  
-20°C to +70°C

### Endurance (related to CCF)

Not applicable

### Diagnostic coverage (related to DC avg and to safety function)

Sources of failure related to pneumatic components, taken from the DIN EN ISO 13849-2 standard.

Impossible to eliminate failure:

- Change of response time
- No commutation/no return commutation
- Change of leakage over a long period of use
- Pressure drop



## Reference Directives and Standards for Design

### ISO 4414

Designed to avoid dangerous significant phenomena related to the use of pneumatic transmission in a machine, listed in appendix A, tableau A1 : A12.1

### ISO 14743

Minimum cracking pressure: 0,3 bar at room temperature

### EN 10204

With the order reference, we can provide types 2.2 ou 2.1 certificates, upon request.

### Pressure equipment directive 2014/68/EC

Meet the requirements of § 4.3 article and test pressure equivalent to 1.5 times the recommended working pressure.

## Complementary Ranges

- Polyamide tubing
- Polyurethane tubing
- Polyethylene tubing





## Silencers

Silencers include a sound propagation filter equipped with an exhaust flow control regulator (models 0672 and 0676).

They are designed for installation on exhaust circuits.

0674



**Polymer Silencer, Male BSPP and Metric Thread**

0673



**Compact Silencer, Male BSPP and Metric Thread**

0670



**Threaded Silencer, Male BSPP Thread**

0676



**Flow Control Polymer Silencer, Male BSPP and Metric Thread**

0671



**Push-In Silencer**

0672



**Flow Control Silencer, Male BSPP Thread**

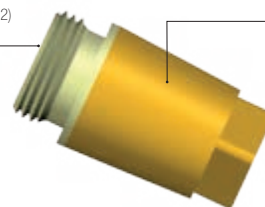
### Component Materials

Body:

brass (0670-0673-0671-0672)  
polymer (0676)

Silencer:

Sintered bronze (0670-0673-0671-0672)  
polymer (0674-0676)



**Silicone-free**



## Machinery Directive DI 2006/42/EC

**ISO 13849: reliability**  
(related to MTTFd of safety function)

Not applicable

**Conditions of use**  
**Safety coefficient**  
(related to CCF)

**Fluids:** compressed air  
**Working pressure:**  
Polyethylene : 0 to 10 bar  
Sintered bronze: 0 to 12 bar  
**Working temperature:**  
Polyethylene : -10°C à +80°C  
Sintered bronze: -20°C à +150°C

**Endurance**  
(related to CCF)

Not applicable

**Diagnostic coverage**  
(related to DC avg and to safety function)

Sources of failure related to pneumatic components, taken from the DIN EN ISO 13849-2 standard.

Impossible to eliminate failure:  
- Pressure drop



## Reference Directives and Standards for Design

**ISO 4414**

Designed to avoid dangerous significant phenomena related to the use of pneumatic transmission in a machine, listed in appendix A, chart A1, A.4

**OSHA 1910.95 (b)**  
**DI 2003/11/EC**

Noise level measured for 8 hours' exposure and risks involved for operators:  
- 90 dBA max.  
- for noise levels > 80 dBA: requirement to use ear protection if exposure > 8 hours

**EN 10204**

With the order reference, we can provide types 2.2 ou 2.1 certificates, upon request.

**Pressure equipment directive 2014/68/EC**

Meet the requirements of § 4.3 article and test pressure equivalent to 1.5 times the recommended working pressure.

### Complementary Products

- Compression fittings





## Tamper-Proof Safety Clip

This product is directly installed on the push-in fitting. It is designed to block the release button. For disconnection, the tamper-evident safety clip must be broken with a tool to unblock the release button.

Tamper-Proof Safety Clip

	ØD						
3130	4	3130 04 01	3130 04 02	3130 04 03	3130 04 04	3130 04 05	
	6	3130 06 01	3130 06 02	3130 06 03	3130 06 04	3130 06 05	3130 06 10
	8	3130 08 01	3130 08 02	3130 08 03	3130 08 04	3130 08 05	3130 08 10
	10	3130 10 01	3130 10 02	3130 10 03	3130 10 04	3130 10 05	3130 10 10
	12	3130 12 01		3130 12 03		3130 12 05	3130 12 10

Component Material and Installation Process



## Machinery Directive DI 2006/42/EC

**ISO 13849: reliability**  
(related to MTTFd  
of safety function)

Not applicable

**Conditions of use**  
**Safety coefficient**  
(related to CCF)

**Compatible ranges :** LF 3000®, LIQUIfit®  
**Working temperature:**  
-20°C to +95°C

**Endurance**  
(related to CCF)

Not applicable

**Diagnostic coverage**  
(related to DC avg  
and to safety function)

Sources of failure related to pneumatic components, taken from the DIN EN ISO 13849-2 standard

Impossible to eliminate failure:

- Obstruction (blockage)
- Error of connection



## Reference Directives and Standards for Design

**ISO 4414**

Design to avoid dangerous significant phenomena related to the use of pneumatic transmission in a machine, listed in appendix A, chart A1 : A.11.2, A.12.6

**ISO 14743**

Not applicable

**EN 10204**

With the order reference, we can provide types 2.2 ou 2.1 certificates, upon request.

**Pressure equipment  
directive 2014/68/EC**

Not applicable

### Complementary Ranges

- LF 3000® push-in fittings
- LIQUIfit® push-in fittings







## Ball Valves, Universal Series, Lockable

These valves are normally open (NO) ball valves. The flow passes through the ball valve in a straight or elbow line. These valves can be open or closed by a simple 90° rotation of the handle.



**0432**  
**2/2 In-Line Lockable Ball Valve, Female BSPP Thread**



**0439**  
**3/2 In-line Vented Lockable Ball Valve, Female BSPP Thread**



**0436**  
**3/2 In-Line Lockable Ball Valve with Threaded Exhaust Port, Female BSPP and Metric Thread**

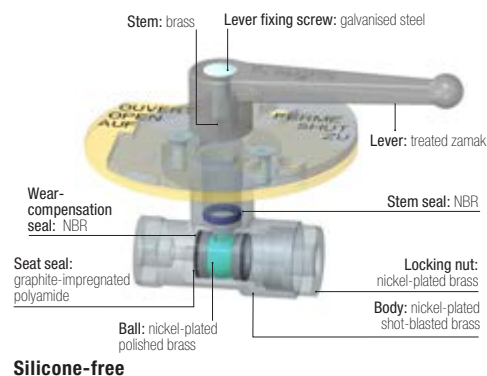


**0437**  
**3/2 In-line Vented 3-Point Lockable Ball Valve, Female BSPP Thread**



**0438**  
**3/2 Right-Angled 3-Point Lockable Ball Valve, Female BSPP Thread**

### Component Materials



## ✓ Machinery Directive DI 2006/42/EC

### ISO 13849 : Reliability (related to MTTFd of safety function)

Not applicable

### Conditions of use Safety coefficient (related to CCF)

Fluids: Industrial fluids  
Working pressure: 20 to 40 bar, according to the model  
Working temperature: -40°C to +80°C

### Endurance (related to CCF)

5000 operating cycles (opening/ closing) at 6 bar according to standard EN 13828

### Diagnostic coverage (related to DC avg and to safety function)

Not applicable

## ✓ Reference Directives and Standards for Design

### ISO 4414

To prevent hazards caused by unintended operations, the lockable plate fixed to the stem guarantees the conformity to this standard.

### EN 13828

Standard's performance requirements and test methods. Sealing is reinforced with the double wear compensation seat ball.

### EN 10204

With the order reference, we can provide types 2.2 ou 2.1 certificates, upon request.

### Pressure equipment directive 2014/68/CE

Mandatory CE marking for DN > 25 mm. For use with dangerous gases, please consult us.

## Complementary Products

- Polyamide tubing
- Polyurethane tubing
- Polyethylene tubing
- Compression fittings





## Safety Blowgun

This blowgun is designed with a blowing nozzle including a normally open (NO) valve with automatic blockage in case there is an obstruction of the nozzle. The remaining pressure is therefore limited to 0,5 bar.



**Safety Blowgun, Lower Connection, Female BSPP Thread**

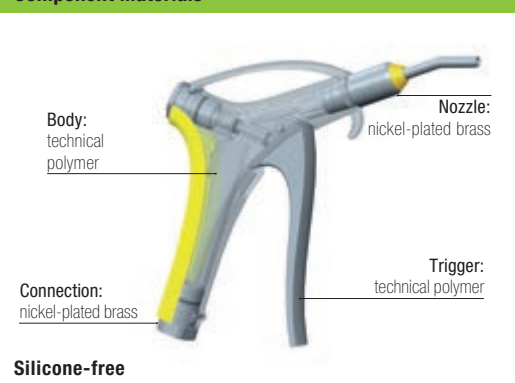
C	DN	
G1/4	3	0654 00 13



**SUVA Safety Blowgun, Lower Connection, Female BSPP Thread**

C	DN	
G1/4	3	0654 01 13

### Component Materials



## Machine Directive DI 2006/42/EC

### ISO 13849 : reliability (related to MTTFd of safety function)

Not applicable

### Conditions of use Safety Factor (related to CCF)

Fluid: compressed air  
Working pressure: 0 to 10 bar  
Working temperature:  
-20°C to +80°C

### Endurance (related to CCF)

Number of piston operating cycles allowing opening/closing of compressed air circuit at 6 bar : 365 000 cycles.

### Diagnostic coverage (related to DC avg and to safety function)

Sources of failure related to pneumatic components, taken from the DIN EN ISO 13849-2 standard.

Impossible to eliminate the failure for the nozzle :

- Change of response time
- No commutation/no return commutation
- Change of leakage over a long period of use
- Pressure drop

## Reference Directives and Standards for Design

### OSHA 1910.242 (b)

Residual static pressure < 30 psi in the case when the nozzle is blocked

### OSHA 1910.95 (b) DI 2003/11/EC

Noise level measured for 8 hours' exposure and risks involved for operators:

- 80 dBA
- No ear protection necessary

### EN 10204

With the order reference, we can provide types 2.2 ou 2.1 certificates, upon request.

### Pressure equipment directive 2014/68/EC

Meet the requirements of § 4.3 article and test pressure equivalent to 1.5 times the recommended working pressure.

### Complementary Products

- Braided PU ester and ether recoil hose
- Recoil semi-rigid PA tubing

