

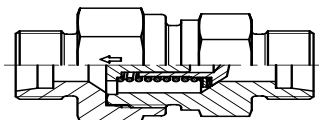


# EO<sup>®</sup> Ermeto Original *Valves*



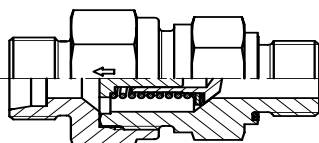
Visual index Non return valves

RHD / p. O11



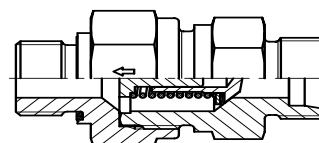
EO 24° cone end / EO 24° cone end

RHV-R-ED / p. O12



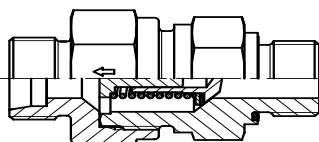
EO 24° cone end /  
Male BSPP thread – ED-seal (ISO 1179)

RHZ-R-ED / p. O13



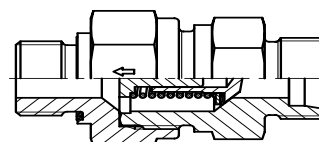
Male BSPP thread – ED-seal (ISO 1179) /  
EO 24° cone end

RHV-M-ED / p. O14



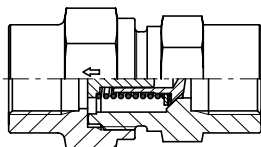
EO 24° cone end /  
Male metric thread – ED-seal (ISO 9974)

RHZ-M-ED / p. O15



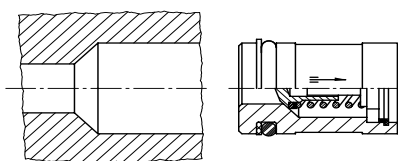
Male metric thread – ED-seal (ISO 9974) /  
EO 24° cone end

RHDI / p. O16



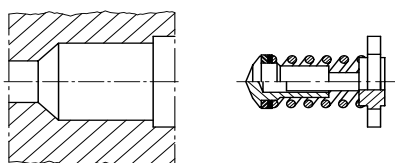
Female BSPP thread (ISO 1179-1) /  
Female BSPP thread (ISO 1179-1)

RVP / p. O17



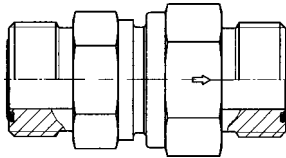
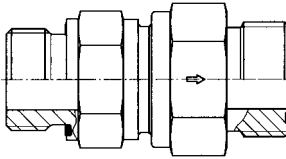
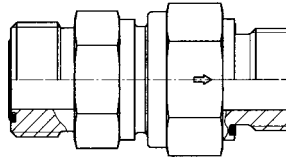
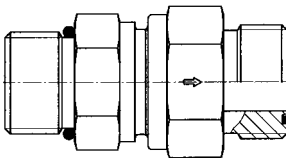
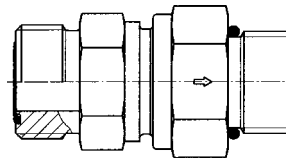
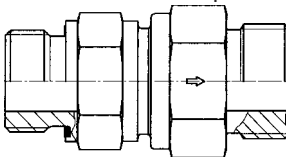
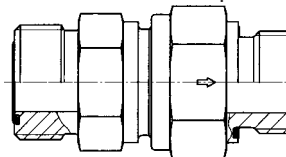
Non return valve cartridge

I-TL / p. O18



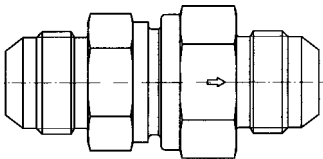
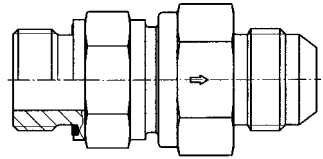
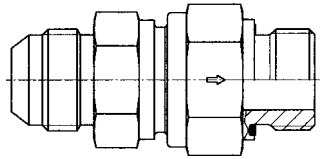
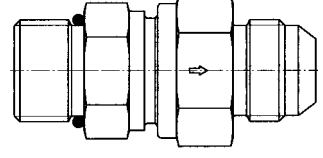
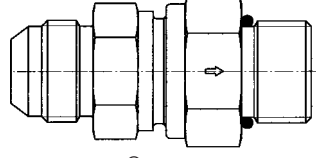
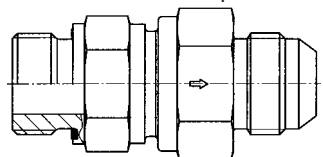
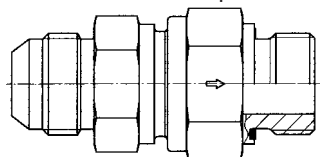
Internal parts of non return valve

Visual index Non return valves with O-Lok® connections

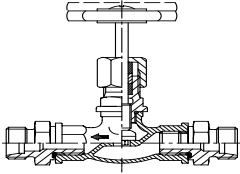
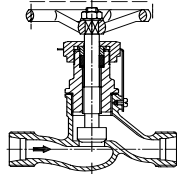
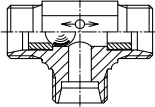

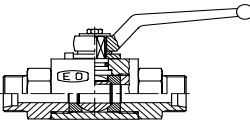
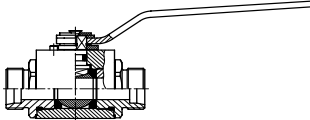
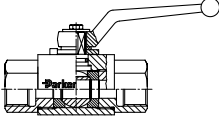
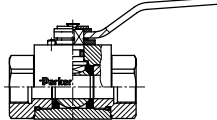
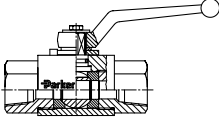
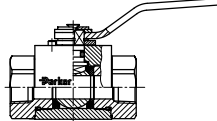
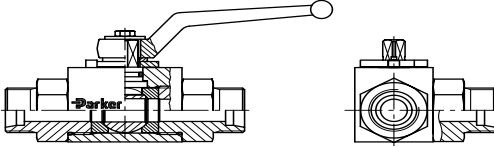
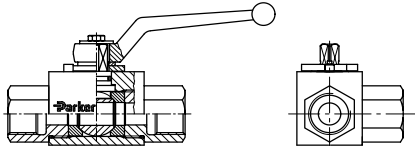
<p><b>RHDMLOS / p. O20</b></p>  <p>O-Lok® ORFS end / O-Lok® ORFS end</p>	
<p><b>RHV42EDMLOS / p. O21</b></p>  <p>Male BSPP thread – ED-seal (ISO 1179) / O-Lok® ORFS end</p>	<p><b>RHZ42EDMLOS / p. O22</b></p>  <p>O-Lok® ORFS end / Male BSPP thread – ED-seal (ISO 1179)</p>
<p><b>RHV50MLOS / p. O23</b></p>  <p>Male UN/UNF thread – O-ring (ISO 11926) / O-Lok® ORFS end</p>	<p><b>RHZ50MLOS / p. O24</b></p>  <p>O-Lok® ORFS end / Male UN/UNF thread – O-ring (ISO 11926)</p>
<p><b>RHV82EDMLOS / p. O25</b></p>  <p>Male metric thread – ED-seal (ISO 9974) / O-Lok® ORFS end</p>	<p><b>RHZ82EDMLOS / p. O26</b></p>  <p>O-Lok® ORFS end / Male metric thread – ED-seal (ISO 9974)</p>



Visual index Non return valves with Triple-Lok® connections

<p><b>RHDMTXS / p. O27</b></p>  <p>Triple-Lok® 37° flare end / Triple-Lok® 37° flare end</p>	
<p><b>RHV42EDMXS / p. O28</b></p>  <p>Male BSPP thread – ED-seal (ISO 1179) / Triple-Lok® 37° flare end</p>	<p><b>RHZ42EDMXS / p. O29</b></p>  <p>Triple-Lok® 37° flare end / Male BSPP thread – ED-seal (ISO 1179)</p>
<p><b>RHV50MXS / p. O30</b></p>  <p>Male UN/UNF thread – O-ring (ISO 11926) / Triple-Lok® 37° flare end</p>	<p><b>RHZ50MXS / p. O31</b></p>  <p>Triple-Lok® 37° flare end / Male UN/UNF thread – O-ring (ISO 11926)</p>
<p><b>RHV82EDMXS / p. O32</b></p>  <p>Male metric thread – ED-seal (ISO 9974) / Triple-Lok® 37° flare end</p>	<p><b>RHZ82EDMXS / p. O33</b></p>  <p>Triple-Lok® 37° flare end / Male metric thread – ED-seal (ISO 9974)</p>

Visual index shut off valves and ball valves

 <p><b>DV</b> p. O34</p> <p>EO 24° cone end / EO 24° cone end</p>	 <p><b>LD</b> p. O35</p> <p>EO 24° cone end / EO 24° cone end</p>
 <p><b>WV</b> p. O36</p> <p>EO 24° cone end / EO 24° cone end / EO 24° cone end</p>	 <p><b>ELA/ELAE</b> p. O46</p> <p>Air-bleed valves</p>
 <p><b>KH (S)</b> p. O37</p> <p>EO 24° cone end / EO 24° cone end</p>	 <p><b>KH (71)</b> p. O38</p> <p>EO 24° cone end / EO 24° cone end</p>
 <p><b>KH-BSPP (S)</b> p. O39</p> <p>Female BSPP thread (ISO 1179-1) / Female BSPP thread (ISO 1179-1)</p>	 <p><b>KH-BSPP (71)</b> p. O40</p> <p>Female BSPP thread (ISO 1179-1) / Female BSPP thread (ISO 1179-1)</p>
 <p><b>KH-NPT (S)</b> p. O41</p> <p>Female NPT thread (SAE 476) / Female NPT thread (SAE 476)</p>	 <p><b>KH-NPT (71)</b> p. O42</p> <p>Female NPT thread (SAE 476) / Female NPT thread (SAE 476)</p>
 <p><b>KH 3/2 (S)</b> p. O43</p> <p>EO 24° cone end / EO 24° cone end / EO 24° cone end</p>	
 <p><b>KH 3/2-BSPP(S)</b> p. O44</p> <p>Female BSPP thread (ISO 1179-1) / Female BSPP thread (ISO 1179-1) / Female BSPP thread (ISO 1179-1)</p>	



## Range of non return valves and alternating valves

### Non-return valves with nominal pressure ratings up to PN 420 bar:

- with tube connection both ends: RHD
- with tube connection to male stud: RHV/RHZ
- with female thread both ends: RHD1
- valve cartridges: RVP
- valve internal parts: I-TL
- leakage rate hydraulic testing under test pressure: 1 drop per minute

### Alternating valves:

- for nominal pressure ratings up to PN 160 WV
- leakage rate hydraulic testing under test pressure: 20 drops per minute

### Hand-operated Shut-off valves:

- for low pressure ratings up to PN 10 bar DV
- for medium pressure ratings up to PN 40 bar LD

### Design:

1. For materials, permissible working pressures, temperatures, flow medium torques for male studs etc. see relevant pages of the catalogue.
2. Tube connection ends must be assembled according to the Parker EO/EO 2 assembly instructions. The valve bodies must be held rigidly during assembly of the tube connection ends.
3. Test pressures for non return valves: PN in conformance with O.D. information see chapter C.
4. Pressure drop values please see p. C12 and diagrams.

### Caution!

Please note the admissible pressure ratings for the EO-tube ends.

## Range of hand-operated shut off valves and quarter turn ball valves

### Quarter turn Hand-operated ball valves:

- for high pressure ratings up to PN 500 bar KH
- leakage rate hydraulic testing under test pressure: 0 drops per minute

The pressure specification PN for hand-operated shut-off valves and quarter turn ball valves applies to the design factor 1,5 (according DIN 3230 T5 and ISO 5208).

### Steel

#### Materials:

Body made of steel, coating DIN 50938-FE//A/T4, ball of hard chrome plated carbon steel, stem of zinc plated steel.

#### Seals:

Ball seat of POM (e. g. Delrin), stem seal of NBR (e. g. Perbunan).

#### Applications:

Suitable for petroleum-based hydraulic fluid, lubricants and fuel oil.

For applications suitable up to 100 bar.

#### Temperature range:

–10 up to +100 °C.

### Stainless Steel

#### Materials:

Body made of stainless steel, ball of stainless steel, stem and connectors of stainless steel.

#### Seals:

Ball seat of POM (e. g. Delrin), stem seal of NBR (e. g. Perbunan), DOZ from function nut FPM (e. g. Viton).

#### Applications:

Suitable for petroleum-based hydraulic fluid, lubricants and fuel oil.

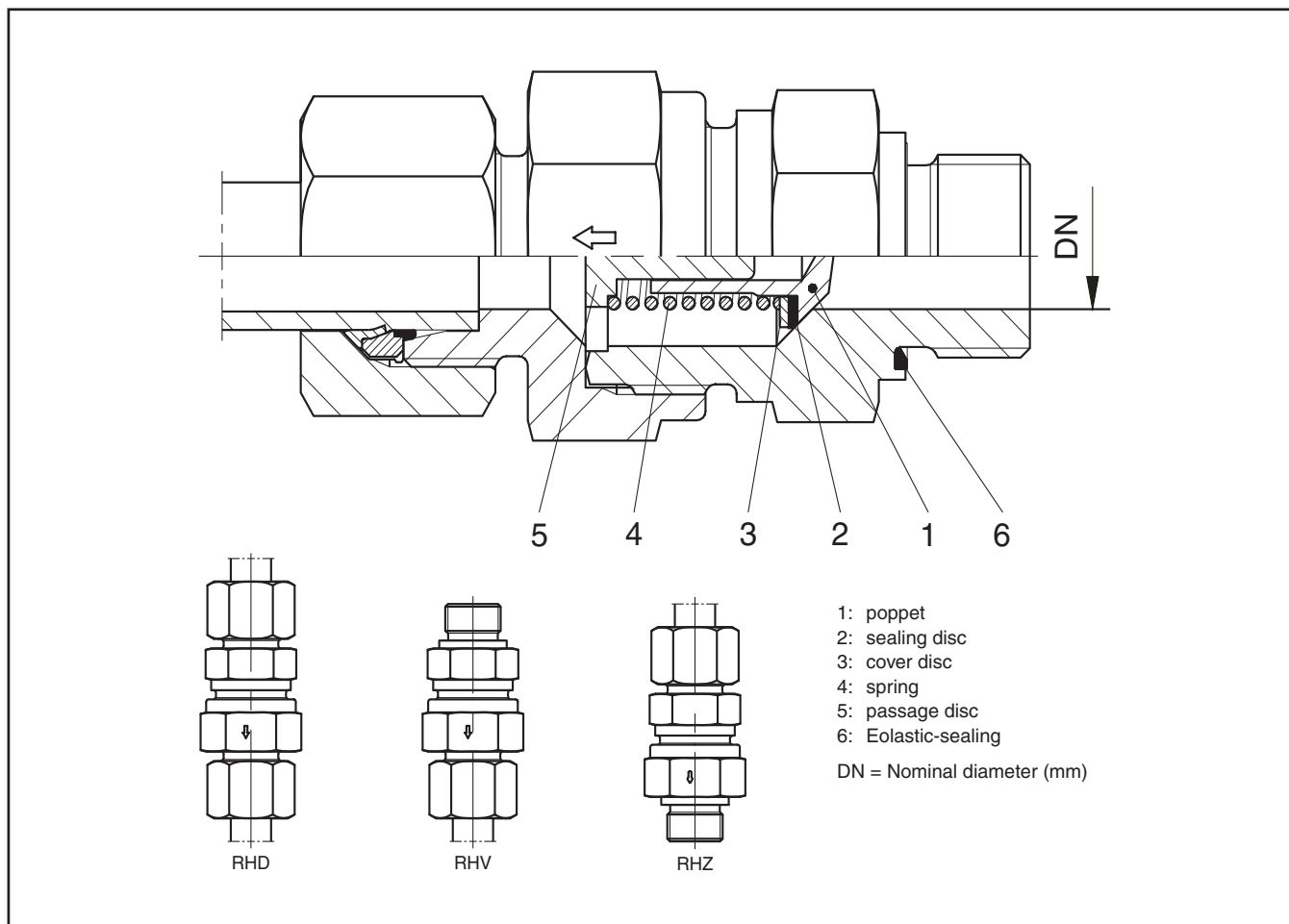
For applications suitable up to 100 bar.

#### Temperature range:

–30 up to +100 °C.

### Notes:

To assess the suitability of valves for specific applications, please advise us of the exact specification of the medium to be used, max. working pressure incl. pressure peaks, temperature and frequency of valve operations. If water is used, indicate type of water or additives, if any.

**RHD/V/Z non return valve**

**Characteristics:**

Poppet check valve with a 90° valve seat with an elastomere sealing disc. Poppet stop for controlled valve opening. Damped opening action to minimize shock and noise. No reduction of cross section. Maximum flow velocity not more than 8 m/sec (for higher flow velocities special tests are required). Sealing of male stud thread by Eolastic soft seal with types RHV and RHZ.

**Opening pressure:**

Standard 1 bar (on request also 0.2, 0.5, 2, 3, 4, 5 and 6 bar are available; please specify on order). For working pressure see appropriate tables. Cracking pressure tolerance: ± 20 %.

**Material:**

- Steel zinc-plated (A3C) or (CF chromium<sup>6</sup>-free), seals in NBR (e.g. Perbunan\*), or (e.g. Viton\*) on request.

- Stainless steel valves have FKM (e.g. Viton\*) as standard. (Up to 3 bar cracking pressure)
- Brass-valves (CuZn35Ni2 2.0540) with internals (1.4571) available on request. (Up to 3 bar cracking pressure)

**Assembly:**

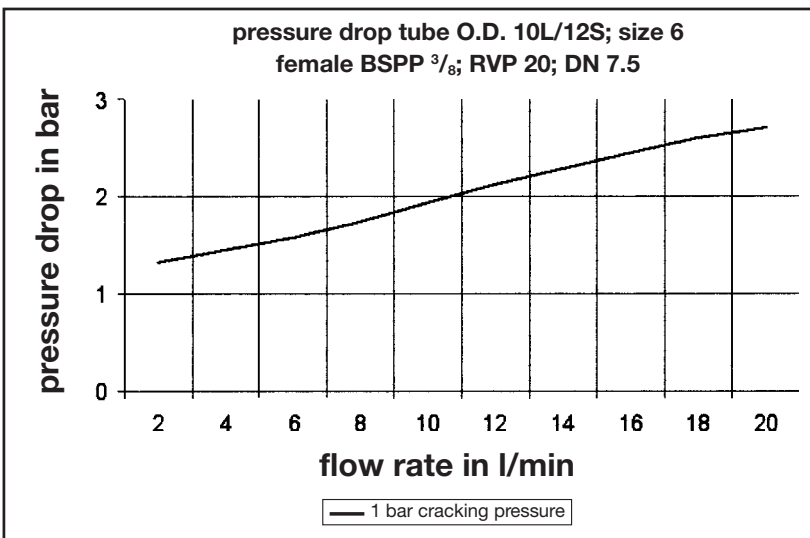
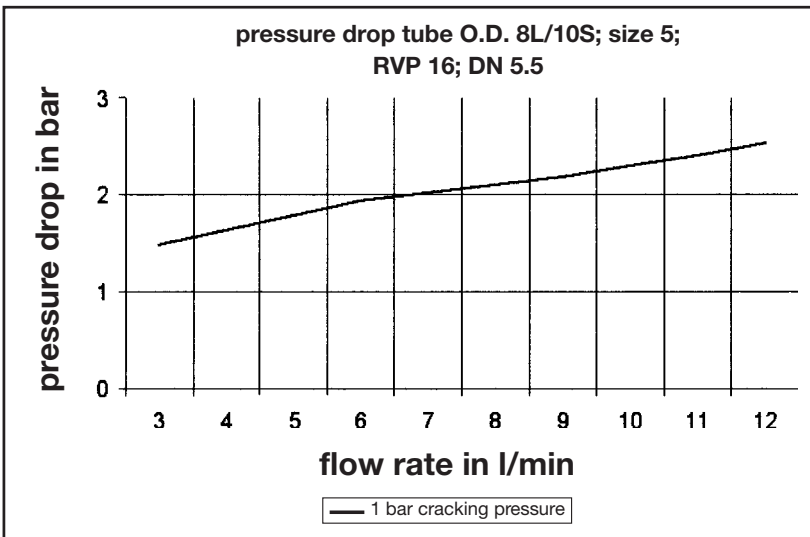
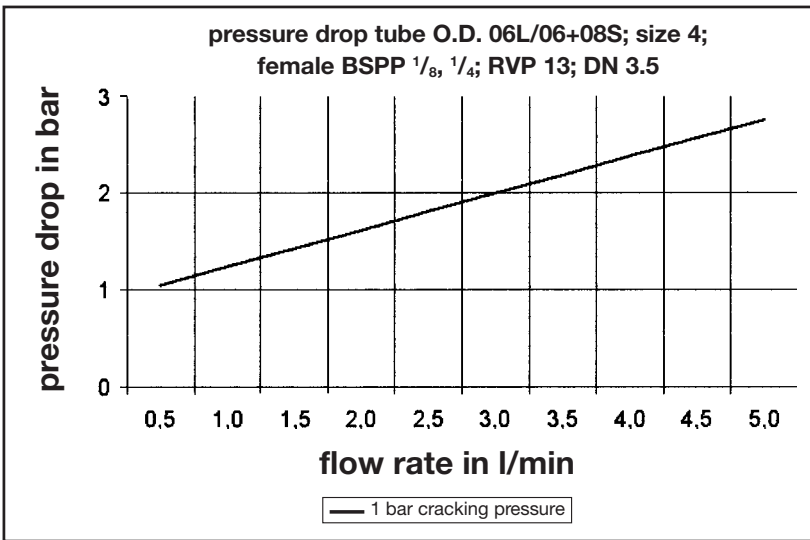
See assembly instructions for EO/EO 2 connections. Non-return valves are all packaged against contamination.

**Media:**

Hydraulic oil, low flammability hydraulic fluids (except for types HFC: for HFD types; FKM seals are necessary). Please indicate on order if used with compressed air. Not suitable for steam, combustible/explosive gases, or oxygen. For water applications, please consult Parker with details of water and any additives.

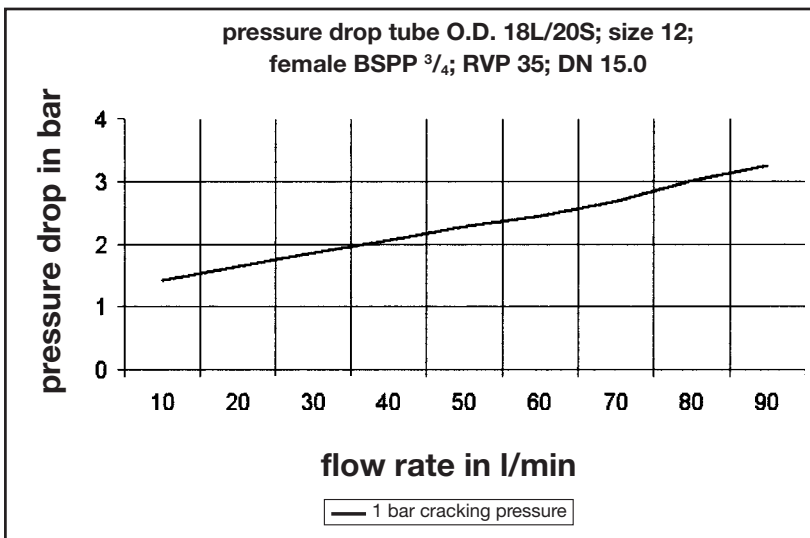
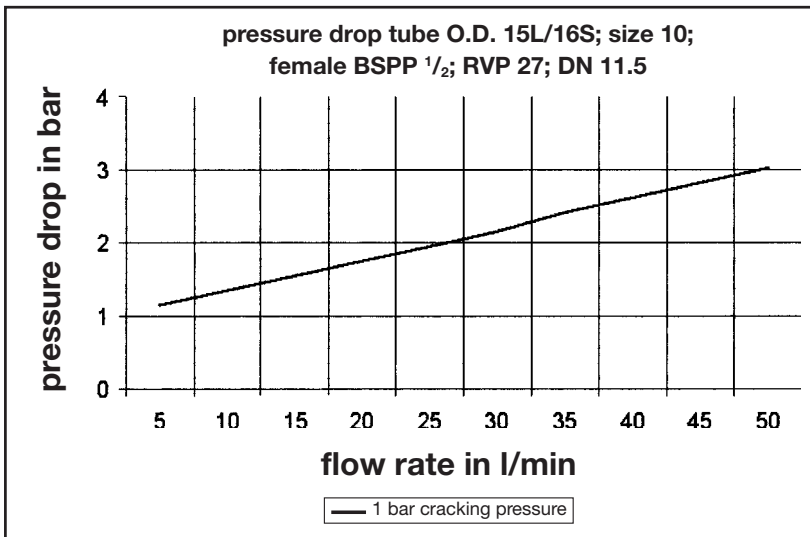
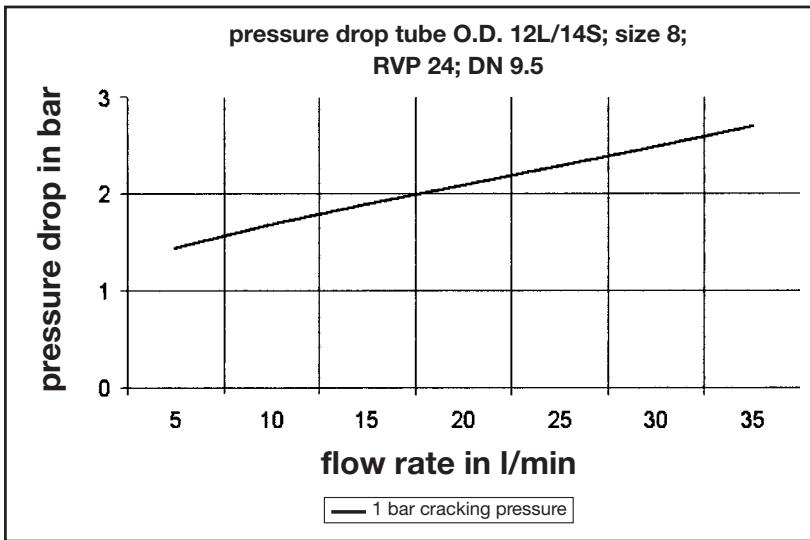
\*Perbunan and Viton are registered trademarks of Bayer and Dupont.

In all diagrams is the peak value of the flow rate in l/min. relating to the maximum permissible flow velocity of 8 m/sec.

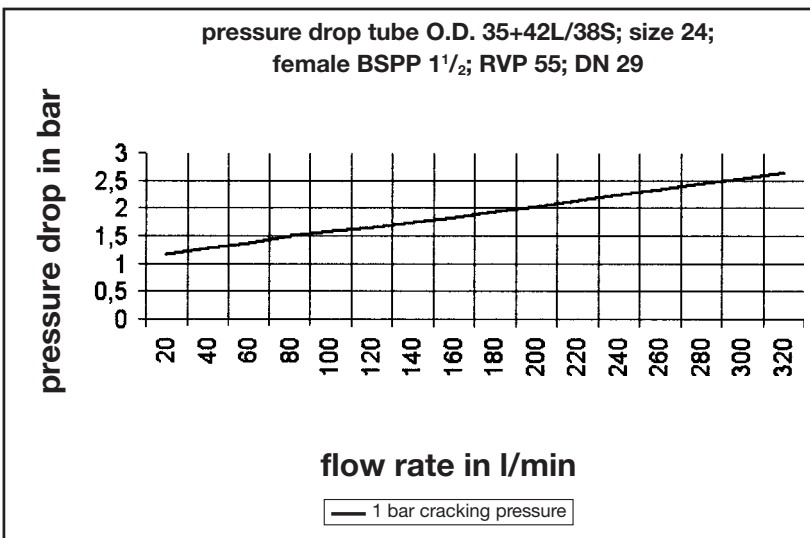
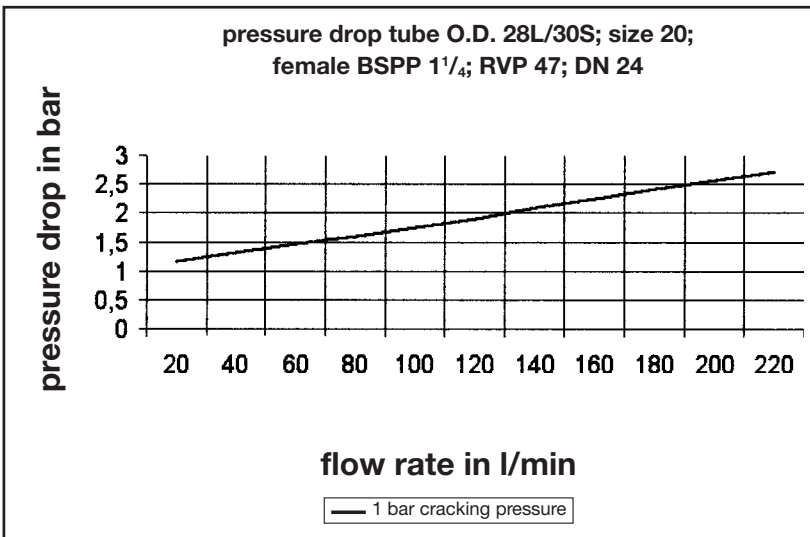
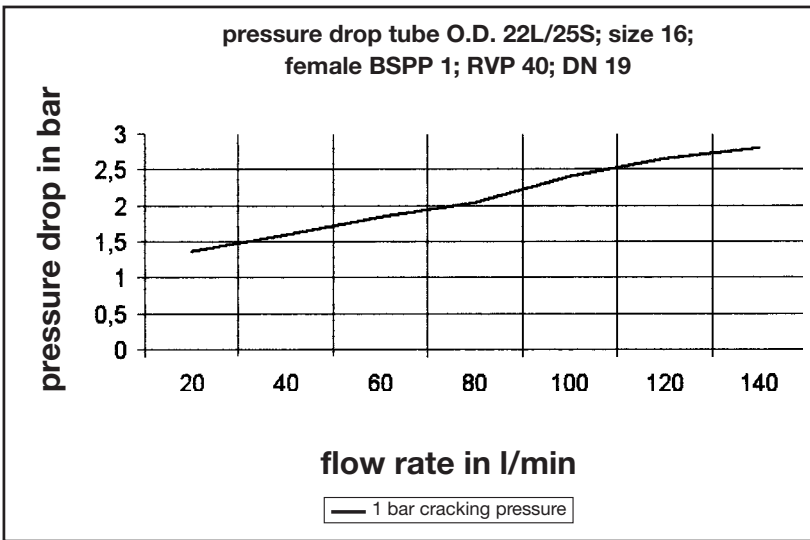




In all diagrams is the peak value of the flow rate in l/min. relating to the maximum permissible flow velocity of 8 m/sec.

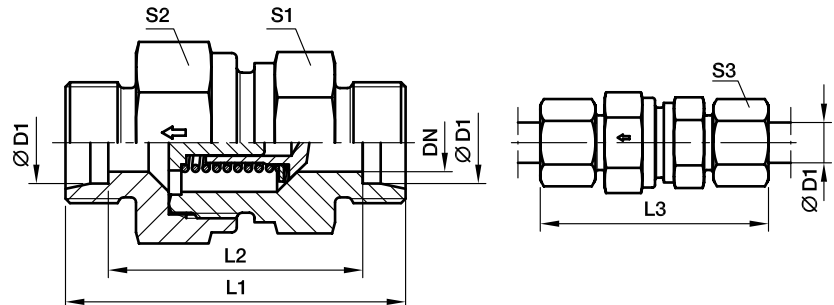


In all diagrams is the peak value of the flow rate in l/min. relating to the maximum permissible flow velocity of 8 m/sec.



## RHD Non return valve

EO 24° cone end / EO 24° cone end



Series	D1 	DN	L1	L2	L3	S1	S2	S3	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup>		
											CF	A3C	71
L <sup>3)</sup>	06	3.5	43	29.0	58.0	17	17	14	46	<b>RHD06LOMD</b>	400	250	250
	08	5.5	44	30.0	59.0	19	19	17	61	<b>RHD08LOMD</b>	400	250	250
	10	7.5	54.5	40.5	69.5	22	24	19	104	<b>RHD10LOMD</b>	400	250	250
	12	9.5	57.5	43.5	72.5	27	30	22	166	<b>RHD12LOMD</b>	400	250	250
	15	11.5	61.5	47.5	77.5	27	32	27	192	<b>RHD15LOMD</b>	400	250	250
	18	14.0	66.5	51.5	83.5	36	36	32	292	<b>RHD18LOMD</b>	400	160	160
	22	18.0	76.5	61.5	93.5	41	46	36	472	<b>RHD22LOMD</b>	250	160	160
	28	23.0	84.5	69.5	102.5	50	55	41	746	<b>RHD28LOMD</b>	250	100	100
	35	29.0	95.5	74.5	117.5	60	60	50	1062	<b>RHD35LOMD</b>	250	100	100
	42	29.0	96	74.0	119.0	65	70	60	1518	<b>RHD42LOMD</b>	250	100	100
S <sup>4)</sup>	06	3.5	48.5	34.5	63.5	19	19	17	70	<b>RHD06SOMD</b>	420	400	400
	08	3.5	48.5	34.5	63.5	19	19	19	74	<b>RHD08SOMD</b>	420	400	400
	10	5.5	55.5	40.5	72.5	22	24	22	121	<b>RHD10SOMD</b>	420	400	400
	12	7.5	57.5	42.5	74.5	24	27	24	148	<b>RHD12SOMD</b>	420	400	400
	14	9.5	63.5	47.5	82.5	27	32	27	218	<b>RHD14SOMD</b>	420	315	315
	16	11.5	67.5	50.5	86.5	32	36	30	286	<b>RHD16SOMD</b>	420	315	315
	20	15.0	75.5	54.5	97.5	41	46	36	506	<b>RHD20SOMD</b>	420	250	250
	25	19.0	82.5	58.5	106.5	46	50	46	639	<b>RHD25SOMD</b>	420	250	250
	30	24.0	96.5	69.5	122.5	60	60	50	1157	<b>RHD30SOMD</b>	250	250	250
	38	29.0	107.5	75.5	136.5	65	70	60	1650	<b>RHD38SOMD</b>	250	250	250

<sup>1)</sup> Pressure shown = item deliverable

<sup>3)</sup> L = light series; <sup>4)</sup> S = heavy series

$\frac{PN(\text{bar})}{10} = PN(\text{MPa})$

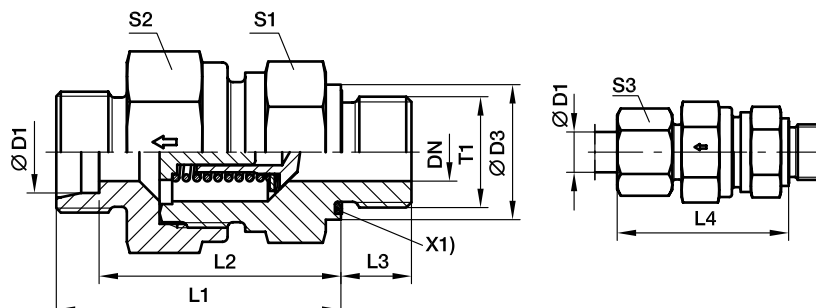
Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page 17.

\*Please add the **suffixes** below according to the material/surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, zinc plated., chrome <sup>6)</sup> -free	CF	RHD06LOMDCF	NBR
Steel, zinc yellow plated	A3C	RHD06LOMDA3C	NBR
Stainless steel	71	RHD06LOMD71	VIT

## RHV-R-ED Non return valve

EO 24° cone end / Male BSPP thread – ED-seal (ISO 1179)



X1) Eolastic sealing

Series	D1	T1	DN	D3	L1	L2	L3	L4	S1	S2	S3	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup>		
														CF	A3C	71
L <sup>3)</sup>	06	G 1/8 A	3.5	14	35	28.0	8	42.5	17	17	14	47	<b>RHV06LREDOMD</b>	400	250	250
	08	G 1/4 A	5.5	19	37	30.0	12	44.5	19	19	17	62	<b>RHV08LREDOMD</b>	400	250	250
	10	G 1/4 A	7.5	19	45.5	38.5	12	53.0	22	24	19	105	<b>RHV10LREDOMD</b>	400	250	250
	12	G 3/8 A	9.5	22	49.5	42.5	12	57.0	27	30	22	175	<b>RHV12LREDOMD</b>	400	250	250
	15	G 1/2 A	11.5	27	52.5	45.5	14	60.5	27	32	27	205	<b>RHV15LREDOMD</b>	400	250	250
	18	G 1/2 A	14.0	27	57.5	50.0	14	66.0	36	36	32	294	<b>RHV18LREDOMD</b>	400	160	160
	22	G 3/4 A	18.0	32	62.5	55.0	16	71.0	41	46	36	450	<b>RHV22LREDOMD</b>	250	160	160
	28	G 1 A	23.0	40	70.5	63.0	18	79.5	50	55	41	720	<b>RHV28LREDOMD</b>	250	100	100
	35	G 1 1/4 A	29.0	50	79.5	69.0	20	90.5	60	60	50	1050	<b>RHV35LREDOMD</b>	250	100	100
	42	G 1 1/2 A	29.0	55	79.5	68.5	22	91.0	65	70	60	1560	<b>RHV42LREDOMD</b>	250	100	100
S <sup>4)</sup>	06	G 1/4 A	3.5	19	38.5	31.5	12	46.0	19	19	17	73	<b>RHV06SREDOMD</b>	420	400	400
	08	G 1/4 A	3.5	19	38.5	31.5	12	46.0	19	19	19	79	<b>RHV08SREDOMD</b>	420	400	400
	10	G 3/8 A	5.5	22	45.5	38.0	12	54.0	22	24	22	132	<b>RHV10SREDOMD</b>	420	400	400
	12	G 3/8 A	7.5	22	48.5	41.0	12	57.0	24	27	24	153	<b>RHV12SREDOMD</b>	420	400	400
	14	G 1/2 A	9.5	27	52.5	44.5	14	62.0	27	32	27	230	<b>RHV14SREDOMD</b>	420	315	315
	16	G 1/2 A	11.5	27	56.5	48.0	14	66.0	32	36	30	293	<b>RHV16SREDOMD</b>	420	315	315
	20	G 3/4 A	15.0	32	62.5	52.0	16	73.5	41	46	36	511	<b>RHV20SREDOMD</b>	420	250	250
	25	G 1 A	19.0	40	66.5	54.5	18	78.5	46	50	46	648	<b>RHV25SREDOMD</b>	420	250	250
	30	G 1 1/4 A	24.0	50	77.5	64.0	20	90.5	60	60	50	1176	<b>RHV30SREDOMD</b>	250	250	250
	38	G 1 1/2 A	29.0	55	85.5	69.5	22	100.0	65	70	60	1624	<b>RHV38SREDOMD</b>	250	250	250

<sup>1)</sup> Pressure shown = item deliverable

<sup>3)</sup> L = light series; <sup>4)</sup> S = heavy series

$\frac{PN \text{ (bar)}}{10} = PN \text{ (MPa)}$

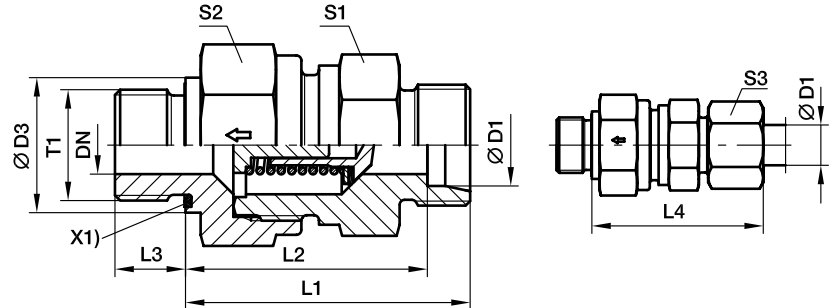
Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page 17.

\*Please add the **suffixes** below according to the material/surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, zinc plated., chrome <sup>6)</sup> -free	CF	RHV06LREDOMDCF	NBR
Steel, zinc yellow plated	A3C	RHV06LREDOMDA3C	NBR
Stainless steel	71	RHV06LREDOMD71	VIT

## RHZ-R-ED Non return valve

Male BSPP thread – ED-seal (ISO 1179) / EO 24° cone end



X1) Eolastic sealing

Series	D1	T1	DN	D3	L1	L2	L3	L4	S1	S2	S3	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup>		
														CF	A3C	71
L <sup>3)</sup>	06	G 1/8 A	3.5	14	33.5	26.5	8	41.0	17	17	14	44	<b>RHZ06LREDOMD</b>	400	250	250
	08	G 1/4 A	5.5	19	35.5	28.5	12	43.0	19	19	17	59	<b>RHZ08LREDOMD</b>	400	250	250
	10	G 1/4 A	7.5	19	45.5	38.5	12	53.0	22	24	19	125	<b>RHZ10LREDOMD</b>	400	250	250
	12	G 3/8 A	9.5	22	47.5	40.5	12	55.0	27	30	22	161	<b>RHZ12LREDOMD</b>	400	250	250
	15	G 1/2 A	11.5	27	49.5	42.5	14	57.5	27	32	27	186	<b>RHZ15LREDOMD</b>	400	250	250
	18	G 1/2 A	14.0	27	55.5	48.0	14	64.0	36	36	32	275	<b>RHZ18LREDOMD</b>	400	160	160
	22	G 3/4 A	18.0	32	63.5	56.0	16	72.0	41	46	36	463	<b>RHZ22LREDOMD</b>	250	160	160
	28	G 1 A	23.0	40	71.5	64.0	18	80.5	50	55	41	721	<b>RHZ28LREDOMD</b>	250	100	100
	35	G 1 1/4 A	29.0	50	80.5	70.0	20	91.5	60	60	50	1073	<b>RHZ35LREDOMD</b>	250	100	100
	42	G 1 1/2 A	29.0	55	81.5	70.5	22	93.0	65	70	60	1602	<b>RHZ42LREDOMD</b>	250	100	100
S <sup>4)</sup>	06	G 1/4 A	3.5	19	38.5	31.5	12	46.0	19	19	17	71	<b>RHZ06SREDOMD</b>	420	400	400
	08	G 1/4 A	3.5	19	38.5	31.5	12	46.0	19	19	19	74	<b>RHZ08SREDOMD</b>	420	400	400
	10	G 3/8 A	5.5	22	45.5	38.0	12	54.0	22	24	22	128	<b>RHZ10SREDOMD</b>	420	400	400
	12	G 3/8 A	7.5	22	48.5	41.0	12	57.0	24	27	24	152	<b>RHZ12SREDOMD</b>	420	400	400
	14	G 1/2 A	9.5	27	51.5	43.5	14	61.0	27	32	27	223	<b>RHZ14SREDOMD</b>	420	315	315
	16	G 1/2 A	11.5	27	54.5	46.0	14	64.0	32	36	30	275	<b>RHZ16SREDOMD</b>	420	315	315
	20	G 3/4 A	15.0	32	60.5	50.0	16	71.5	41	46	36	490	<b>RHZ20SREDOMD</b>	420	250	250
	25	G 1 A	19.0	40	66.5	54.5	18	78.5	46	50	46	647	<b>RHZ25SREDOMD</b>	420	250	250
	30	G 1 1/4 A	24.0	50	77.5	64.0	20	90.5	60	60	50	1180	<b>RHZ30SREDOMD</b>	250	250	250
	38	G 1 1/2 A	29.0	55	87.5	71.5	22	102.0	65	70	60	1670	<b>RHZ38SREDOMD</b>	250	250	250

<sup>1)</sup> Pressure shown = item deliverable

<sup>3)</sup> L = light series; <sup>4)</sup> S = heavy series

$\frac{PN \text{ (bar)}}{10} = PN \text{ (MPa)}$

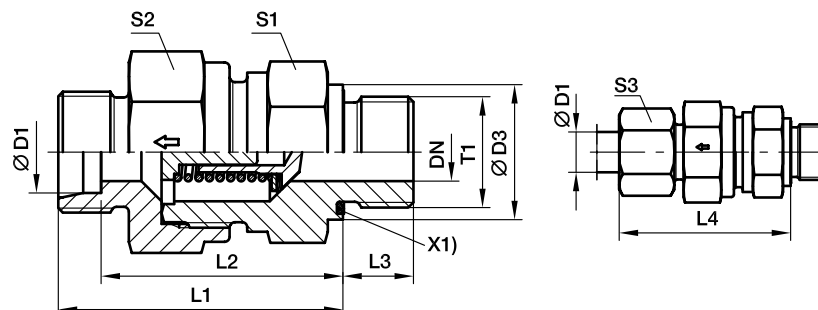
Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page 17.

\*Please add the **suffixes** below according to the material/ surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, zinc plated., chrome <sup>6</sup> -free	CF	RHZ06LREDOMDCF	NBR
Steel, zinc yellow plated	A3C	RHZ06LREDOMDA3C	NBR

## RHV-M-ED Non return valve

EO 24° cone end / Male metric thread – ED-seal (ISO 9974)



X1) Eolastic sealing

Series	D1	T1	DN	D3	L1	L2	L3	L4	S1	S2	S3	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup>		
														CF	A3C	71
L <sup>3)</sup>	06	M 10×	3.5	14	35	28.0	8	42.5	17	17	14	46	RHV06LMEDOMD	400	250	250
	08	M 12×1.5	5.5	17	36	29.0	12	43.5	19	19	17	58	RHV08LMEDOMD	400	250	250
	10	M 14×1.5	7.5	19	45.5	38.5	12	53.0	22	24	19	108	RHV10LMEDOMD	400	250	250
	12	M 16×1.5	9.5	22	49.5	42.5	12	57.0	27	30	22	173	RHV12LMEDOMD	400	250	250
	15	M 18×1.5	11.5	24	52.5	45.5	12	60.5	27	32	27	192	RHV15LMEDOMD	400	250	250
	18	M 22×1.5	14.0	27	57.5	50.0	14	66.0	36	36	32	298	RHV18LMEDOMD	400	160	160
	22	M 26×1.5	18.0	32	62.5	55.0	16	71.0	41	46	36	446	RHV22LMEDOMD	250	160	160
	28	M 33×2	23.0	40	70.5	63.0	18	79.5	50	55	41	722	RHV28LMEDOMD	250	100	100
	35	M 42×2	29.0	50	79.5	69.0	20	90.5	60	60	50	1053	RHV35LMEDOMD	250	100	100
	42	M 48×2	29.0	55	79.5	68.5	22	91.0	65	70	60	1563	RHV42LMEDOMD	250	100	100
S <sup>4)</sup>	06	M 12×1.5	3.5	17	38.5	31.5	12	46.0	19	19	17	70	RHV06SMEDOMD	420	400	400
	08	M 14×1.5	3.5	19	38.5	31.5	12	46.0	19	19	19	76	RHV08SMEDOMD	420	400	400
	10	M 16×1.5	5.5	22	45.5	38.0	12	54.0	22	24	22	124	RHV10SMEDOMD	420	400	400
	12	M 18×1.5	7.5	24	48.5	41.0	12	57.0	24	27	24	157	RHV12SMEDOMD	420	400	400
	14	M 20×1.5	9.5	26	52.5	44.5	14	62.0	27	32	27	215	RHV14SMEDOMD	420	315	315
	16	M 22×1.5	11.5	27	56.5	48.0	14	66.0	32	36	30	296	RHV16SMEDOMD	420	315	315
	20	M 27×2	15.0	32	62.5	52.0	16	73.5	41	46	36	521	RHV20SMEDOMD	420	250	250
	25	M 33×2	19.0	40	66.5	54.5	18	78.5	46	50	46	648	RHV25SMEDOMD	420	250	250
	30	M 42×2	24.0	50	77.5	64.0	20	90.5	60	60	50	1178	RHV30SMEDOMD	250	250	250
	38	M 48×2	29.0	55	85.5	69.5	22	100.0	65	70	60	1627	RHV38SMEDOMD	250	250	250

<sup>1)</sup> Pressure shown = item deliverable

<sup>3)</sup> L = light series; <sup>4)</sup> S = heavy series

$\frac{PN \text{ (bar)}}{10} = PN \text{ (MPa)}$

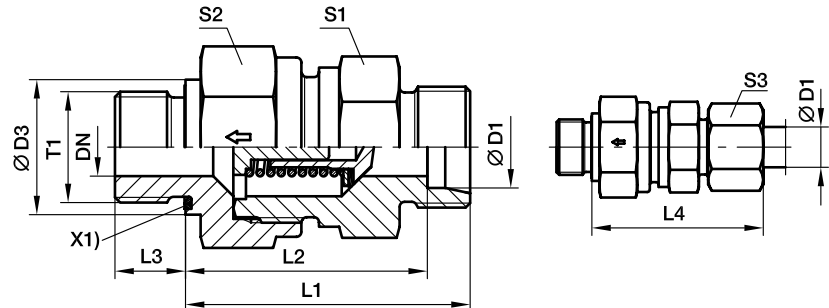
Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page 17.

\*Please add the **suffixes** below according to the material/surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, zinc plated., chrome <sup>6)</sup> -free	CF	RHV06LMEDOMDCF	NBR
Steel, zinc yellow plated	A3C	RHV06LMEDOMDA3C	NBR
Stainless steel	71	RHV06LMEDOMD71	VIT

## RHZ-M-ED Non return valve

Male metric thread – ED-seal (ISO 9974) / EO 24° cone end



X1) Eolastic sealing

Series	D1	T1	DN	D3	L1	L2	L3	L4	S1	S2	S3	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup>		
														CF	A3C	71
L <sup>3)</sup>	06	M 10×1	3.5	14	33.5	26.5	8	41.0	17	17	14	44	<b>RHZ06LMEDOMD</b>	400	250	250
	08	M 12×1.5	5.5	17	35.5	28.5	12	43.0	19	19	17	58	<b>RHZ08LMEDOMD</b>	400	250	250
	10	M 14×1.5	7.5	19	45.5	38.5	12	53.0	22	24	19	104	<b>RHZ10LMEDOMD</b>	400	250	250
	12	M 16×1.5	9.5	22	47.5	40.5	12	55.0	27	30	22	169	<b>RHZ12LMEDOMD</b>	400	250	250
	15	M 18×1.5	11.5	24	49.5	42.5	12	57.5	27	32	27	174	<b>RHZ15LMEDOMD</b>	400	250	250
	18	M 22×1.5	14.0	27	55.5	48.0	14	64.0	36	36	32	279	<b>RHZ18LMEDOMD</b>	400	160	160
	22	M 26×1.5	18.0	32	63.5	56.0	16	72.0	41	46	36	459	<b>RHZ22LMEDOMD</b>	250	160	160
	28	M 33×2	23.0	40	71.5	64.0	18	80.5	50	55	41	721	<b>RHZ28LMEDOMD</b>	250	100	100
	35	M 42×2	29.0	50	80.5	70.0	20	91.5	60	60	50	1078	<b>RHZ35LMEDOMD</b>	250	100	100
	42	M 48×2	29.0	55	81.5	70.5	22	93.0	65	70	60	1601	<b>RHZ42LMEDOMD</b>	250	100	100
S <sup>4)</sup>	06	M 12×1.5	3.5	17	38.5	31.5	12	46.0	19	19	17	70	<b>RHZ06SMEDOMD</b>	420	400	400
	08	M 14×1.5	3.5	19	38.5	31.5	12	46.0	19	19	19	75	<b>RHZ08SMEDOMD</b>	420	400	400
	10	M 16×1.5	5.5	22	45.5	38.0	12	54.0	22	24	22	123	<b>RHZ10SMEDOMD</b>	420	400	400
	12	M 18×1.5	7.5	24	48.5	41.0	12	57.0	24	27	24	157	<b>RHZ12SMEDOMD</b>	420	400	400
	14	M 20×1.5	9.5	26	51.5	43.5	14	61.0	27	32	27	214	<b>RHZ14SMEDOMD</b>	420	315	315
	16	M 22×1.5	11.5	27	54.5	46.0	14	64.0	32	36	30	279	<b>RHZ16SMEDOMD</b>	420	315	315
	20	M 27×2	15.0	32	60.5	50.0	16	71.5	41	46	36	487	<b>RHZ20SMEDOMD</b>	420	250	250
	25	M 33×2	19.0	40	66.5	54.5	18	78.5	46	50	46	647	<b>RHZ25SMEDOMD</b>	420	250	250
	30	M 42×2	24.0	50	77.5	64.0	20	90.5	60	60	50	1180	<b>RHZ30SMEDOMD</b>	250	250	250
	38	M 48×2	29.0	55	87.5	71.5	22	102.0	65	70	60	1669	<b>RHZ38SMEDOMD</b>	250	250	250

<sup>1)</sup> Pressure shown = item deliverable

<sup>3)</sup> L = light series; <sup>4)</sup> S = heavy series

$\frac{PN \text{ (bar)}}{10} = PN \text{ (MPa)}$

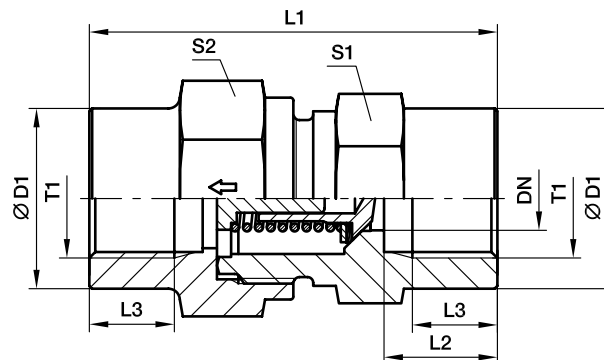
Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page 17.

\*Please add the **suffixes** below according to the material/surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, zinc plated., chrome <sup>6)</sup> -free	CF	RHZ06LMEDOMDCF	NBR
Steel, zinc yellow plated	A3C	RHZ06LMEDOMDA3C	NBR
Stainless steel	71	RHZ06LMEDOMD71	VIT

## RHDI Non return valve

Female BSPP thread (ISO 1179-1) / Female BSPP thread (ISO 1179-1)



Series	T1	DN	D1	L1	L2	L3	S1	S2	Weight g/1 piece	Order code*	CF	A3C <sup>1)</sup>	71
L <sup>3)</sup>	G11/18	3.5	19	42.5	12.0	8.0	19	19	76	<b>RHDI1/8</b>	400	400	400
	G 1/4	3.5	19	51.0	16.0	12.0	19	19	82	<b>RHDI1/4</b>	400	400	400
	G 3/8	7.5	24	60.0	17.0	12.0	24	27	157	<b>RHDI3/8</b>	400	400	400
	G 1/2	11.5	32	72.0	20.0	15.0	32	36	344	<b>RHDI1/2</b>	315	315	315
	G 3/4	15.0	41	84.0	22.0	16.5	41	46	664	<b>RHDI3/4</b>	250	250	250
	G 1	19.0	46	95.0	25.5	19.0	46	50	821	<b>RHDI1</b>	250	250	250
G 11/4	24.0	60	110.0	28.0	21.5	60	60	1581	<b>RHDI11/4</b>	250	250	250	
G 11/2	29.0	65	114.0	28.5	22.0	65	70	1919	<b>RHDI11/2</b>	250	250	250	

<sup>1)</sup> Pressure shown = item deliverable

<sup>3)</sup> L = light series

$$\frac{\text{PN (bar)}}{10} = \text{PN (MPa)}$$

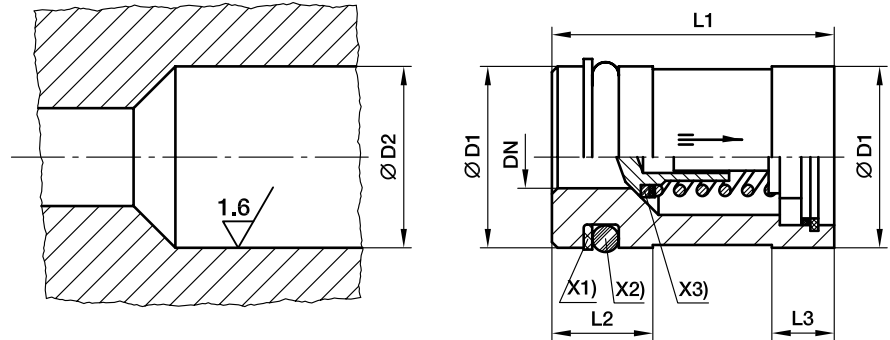
Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page I7.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, zinc plated., chrome <sup>6)</sup> -free	CF	RHDI1/8CF	NBR
Steel, zinc yellow plated	A3C	RHDI1/8A3C	NBR
Stainless steel	71	RHDI1/871	VIT

\*Please add the **suffixes** below according to the material/surface required.



## RVP Non return valve cartridge



- X1) Supporting ring PTFE
- X2) O-ring NBR
- X3) Sealing disc NBR

Valve ITL	DN	D1	D2	L1 ±0,15	L2	L3	O-ring	Supporting ring	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup>		
											CF	A3C	71
6-L/6u.8-S	3.5	12.945 ±0.055	13 <sup>+0.12 +0.05</sup>	23.15	9.5	6.0	8.3×2.4	SRA 13-2.05-1.0	21	<b>RVP13</b>	420	400	400
8-L/10-S	5.5	15.945 ±0.055	16 <sup>+0.12 +0.05</sup>	26.65	9.5	6.5	11.3×2.4	SRA 16-2.05-1.0	32	<b>RVP16</b>	420	400	400
10-L/12-S	7.5	19.935 ±0.065	20 <sup>+0.142 +0.065</sup>	30.15	9.5	6.5	15.3×2.4	SRA 20-2.05-1.0	54	<b>RVP20</b>	420	400	400
12-L/14-S	9.5	23.935 ±0.065	24 <sup>+0.149 +0.065</sup>	35.15	12.0	7.5	18.2×3	SRA 24-2.6-1.0	80	<b>RVP24</b>	420	315	315
15-L/16-S	11.5	26.935 ±0.065	27 <sup>+0.149 +0.065</sup>	38.15	12.0	7.5	21.2×3	SRA 27-2.6-1.0	105	<b>RVP27</b>	420	315	315
18-L/20-S	15.0	34.92 ±0.08	35 <sup>+0.18 +0.08</sup>	44.65	12.0	9.5	29.2×3	SRA 35-2.5-1.0	204	<b>RVP35</b>	420	250	250
22-L/25-S	19.0	39.92 ±0.08	40 <sup>+0.18 +0.08</sup>	50.65	12.0	11.0	34.2×3	SRA 40-2.5-1.0	275	<b>RVP40</b>	420	250	250
28-L/30-S	24.0	46.92 ±0.08	47 <sup>+0.18 +0.08</sup>	60.15	13.0	13.0	41.2×3	SRA 47-2.6-1.5	412	<b>RVP47</b>	250	250	250
35-L/38-S	29.0	54.905 ±0.095	55 <sup>+0.22 +0.1</sup>	70.15	16.0	13.0	44.2×5.7	SRA 55-5.1-1.5	607	<b>RVP55</b>	250	250	250

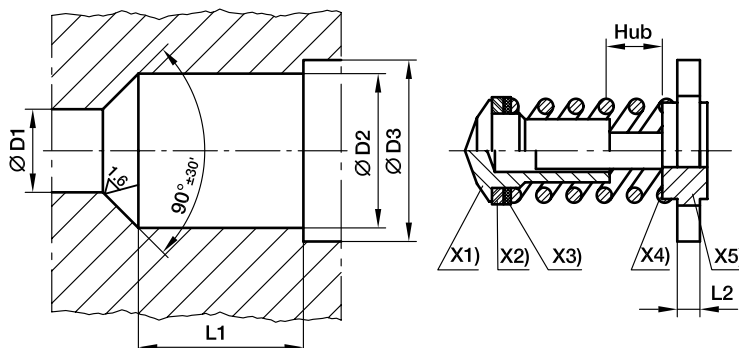
<sup>1)</sup> Pressure shown = item deliverable

$$\frac{\text{PN (bar)}}{10} = \text{PN (MPa)}$$

**Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page 17.**

\*Please add the **suffixes** below according to the material/surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, zinc plated., chrome <sup>6</sup> -free	CF	RHP13CF	NBR
Steel, zinc yellow plated	A3C	RHP13A3C	NBR
Stainless steel	71	RHP1371	VIT

**I-TL Internal parts of non return valve**


- X1) poppet
- X2) sealing disc (smooth side to the poppet)
- X3) cover disc
- X4) spring
- X5) passage disc

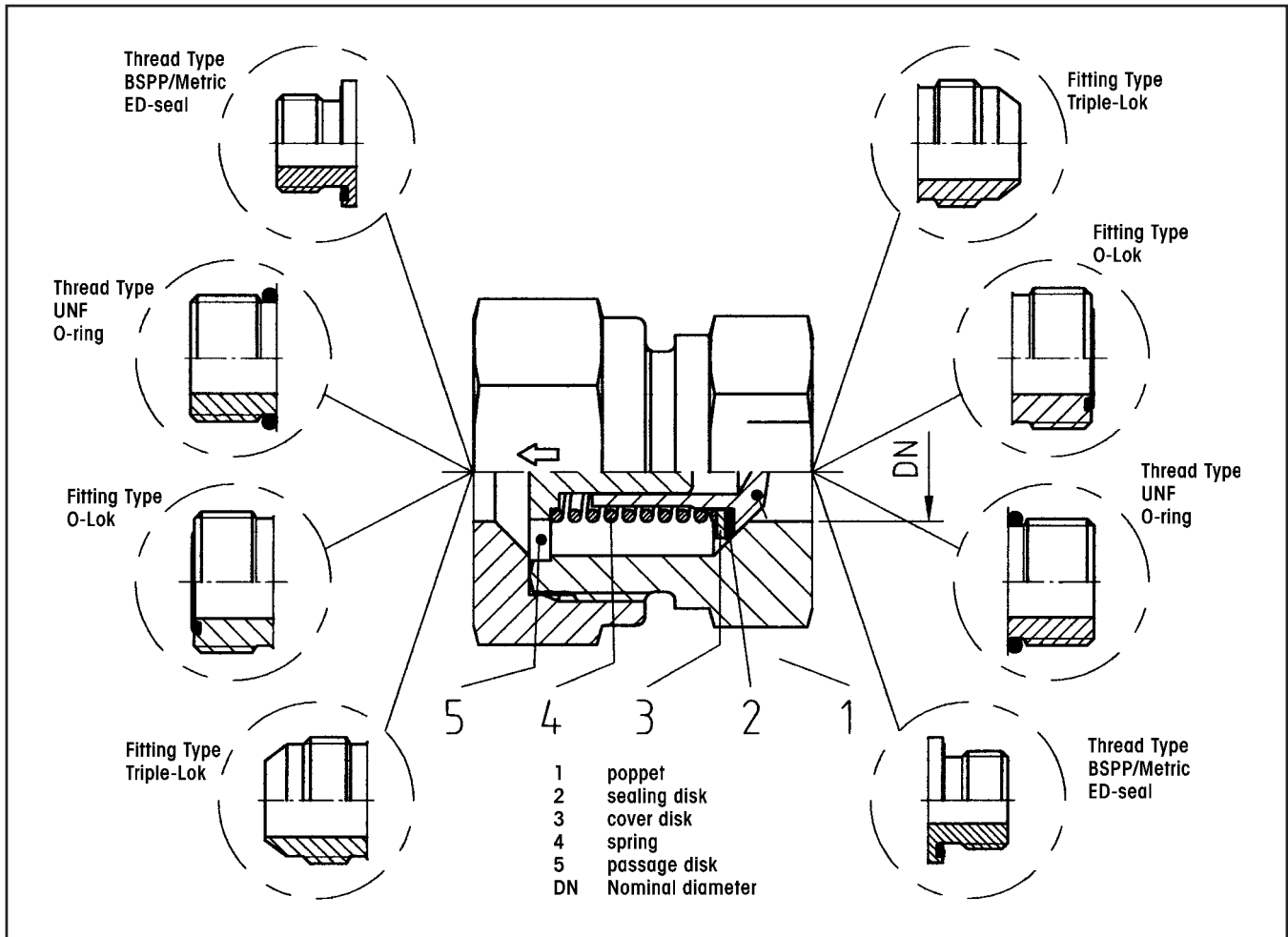
Series	Tube O.D.	D1 <sup>+0.1</sup>	D2 <sup>+0.1</sup>	D3 <sup>+0.1</sup>	L1 <sup>±0.1</sup>	L2	Hub	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup>	
										A3C	71
L/S/S	06/06/08	3.5	7.5	8.6	8.2	2.0	1.0	2	<b>ITL06L/06+08S</b>	*	*
L/S	08/10	5.5	10.2	11.6	11.0	2.0	1.7	4	<b>ITL08L/10S</b>	*	*
L/S	10/12	7.5	13.0	14.1	14.0	2.0	2.3	7	<b>ITL10L/12S</b>	*	*
L/S	12/14	9.5	16.7	18.1	16.5	2.5	2.9	13	<b>ITL12L/14S</b>	*	*
L/S	15/16	11.5	19.5	20.6	19.0	2.5	3.5	18	<b>ITL15L/16S</b>	*	*
L/S	18/20	15.0	25.2	27.1	22.5	3.0	4.4	37	<b>ITL18L/20S</b>	*	*
L/S	22/25	19.0	30.8	32.6	27.0	3.0	5.5	54	<b>ITL22L/25S</b>	*	*
L/S	28/30	24.0	38.6	40.6	32.5	3.5	7.3	107	<b>ITL28L/30S</b>	*	*
L/L/S	35/38/42	29.0	45.7	48.1	37.5	3.5	8.9	144	<b>ITL35L+42I/38S</b>	*	*

\* = item deliverable

**Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page 17.**

\*Please add the **suffixes** below according to the material/ surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, zinc yellow plated	A3C	ITL06L/06+008S	NBR
Stainless steel	71	ITL06L71/06+008S	VIT

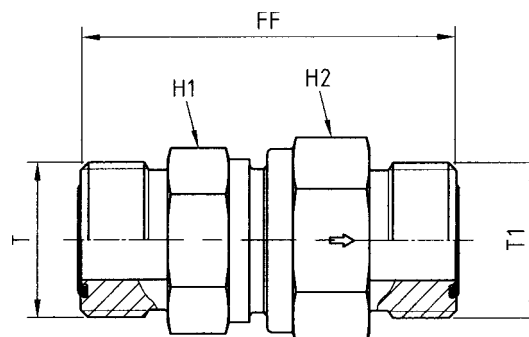
**RHD/V/Z Non return valves with O-Lok® or Triple-Lok® connections**

**Material:**

- Steel zinc-plated (A3C) or (CF chromium<sup>6</sup>-free), seals in NBR (e.g. Perbunan\*)
- Internal parts in stainless steel with FKM (Viton) also available on request.



## RHDMLOS Non return valve

O-Lok® ORFS end / O-Lok® ORFS end



Tube 1 O.D.		Tube 2 O.D.		ORFS (UN/UNF thread T)	ORFS (UN/UNF thread T1)	H1	H2	FF	DN (Nom. diam.)	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup>	
mm	Inch	mm	Inch									CF	A3C
6	1/4	6	1/4	9/16-18UNF	9/16-18UNF	19	19	44.5	3.5	108	<b>4RHDMLOS</b>	420	400
8, 10	5/16, 3/8	8, 10	5/16, 3/8	11/16-16UNF	11/16-16UNF	22	24	53.5	5.5	188	<b>6RHDMLOS</b>	420	400
12	1/2	12	1/2	13/16-16UNF	13/16-16UNF	24	27	59.5	7.5	223	<b>8RHDMLOS</b>	420	400
14, 15, 16	5/8	14, 15, 16	5/8	1-14UNF	1-14UNF	32	36	70.5	11.5	428	<b>10RHDMLOS</b>	420	315
18, 20	3/4	18, 20	3/4	1 3/16-12UNF	1 3/16-12UNF	41	46	77.5	15.0	731	<b>12RHDMLOS</b>	420	250
22, 25	1	22, 25	1	1 7/16-12UNF	1 7/16-12UNF	46	50	81.5	19.0	1076	<b>16RHDMLOS</b>	420	250
28, 30, 32	1 1/4	28, 30, 32	1 1/4	1 11/16-12UNF	1 11/16-12UNF	60	60	91.5	24.0	1630	<b>20RHDMLOS</b>	250	250
35, 38	1 1/2	35, 38	1 1/2	2-12UNF	2-12UNF	65	70	98.5	29.0	2362	<b>24RHDMLOS</b>	250	250

<sup>1)</sup> Pressure shown = item deliverable

$$\frac{\text{PN (bar)}}{10} = \text{PN (MPa)}$$

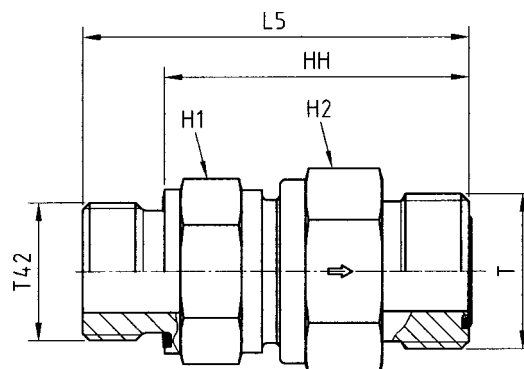
Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page 17.

\*Please add the **suffixes** below according to the material/ surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, zinc plated., chrome <sup>6</sup> -free	CF	4RHDMLOSCF	NBR
Steel, zinc yellow plated	A3C (no suffix needed)	4RHDMLOS	NBR

## RHV42EDMLOS Non return valve

Male BSPP thread – ED-seal (ISO 1179) / O-Lok® ORFS end



Tube O.D.		BSPP thread T42	ORFS (UN/UNF) thread T	H1	H2	L5	HH	DN (Nom. diam.)	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup>	
mm	Inch										CF	A3C
6	1/4	G 1/8	9/16-18UNF	19	19	44.5	36.5	3.5	92	<b>4RHV42EDMLOS</b>	420	400
8, 10	5/16, 3/8	G 1/4	11/16-16UNF	22	24	56.5	44.5	6.5	165	<b>6RHV42EDMLOS</b>	420	400
12	1/2	G 3/8	13/16-16UNF	24	27	61.5	49.5	7.5	191	<b>8RHV42EDMLOS</b>	420	400
14, 15, 16	5/8	G 1/2	1-14UNF	32	36	70.0	56.0	11.5	366	<b>10RHV42EDMLOS</b>	420	315
18, 20	3/4	G 3/4	1 3/16-12UNF	41	46	77.5	63.5	15.0	631	<b>12RHV42EDMLOS</b>	420	250
22, 25	1	G 1	1 7/16-12UNF	46	50	84.0	66.0	19.0	863	<b>16RHV42EDMLOS</b>	420	250
28, 30, 32	1 1/4	G 1 1/4	1 11/16-12UNF	60	60	95.0	75.0	24.0	1403	<b>20RHV42EDMLOS</b>	250	250
35, 38	1 1/2	G 1 1/2	2-12UNF	65	70	105.0	83.0	29.0	1969	<b>24RHV42EDMLOS</b>	250	250

<sup>1)</sup> Pressure shown = item deliverable

$$\frac{\text{PN (bar)}}{10} = \text{PN (MPa)}$$

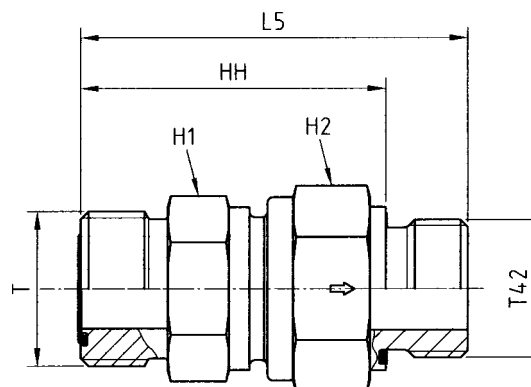
Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page 17.

\*Please add the **suffixes** below according to the material/surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, zinc plated., chrome <sup>6</sup> -free	CF	4RHV42EDMLOSCF	NBR
Steel, zinc yellow plated	A3C (no suffix needed)	4RHV42EDMLOS	NBR

## RHZ42EDMLOS Non return valve

O-Lok® ORFS end / Male BSPP thread – ED-seal (ISO 1179)



Tube O.D.		BSPP thread T42	ORFS (UN/UNF) thread T	H1	H2	L5	HH	DN (Nom. diam.)	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup>	
mm	Inch										CF	A3C
6	1/4	G 1/8	9/16-18UNF	19	19	44.5	36.5	3.5	91	<b>4RHZ42EDMLOS</b>	420	400
8, 10	5/16, 3/8	G 1/4	11/16-16UNF	22	24	56.5	44.5	6.5	161	<b>6RHZ42EDMLOS</b>	420	400
12	1/2	G 3/8	13/16-16UNF	24	27	61.5	49.5	7.5	190	<b>8RHZ42EDMLOS</b>	420	400
14, 15, 16	5/8	G 1/2	1-14UNF	32	36	70.0	56.0	11.5	348	<b>10RHZ42EDMLOS</b>	420	315
18, 20	3/4	G 3/4	1 3/16-12UNF	41	46	77.5	53.5	15.0	634	<b>12RHZ42EDMLOS</b>	420	250
22, 25	1	G 1	1 7/16-12UNF	46	50	84.0	66.0	19.0	863	<b>16RHZ42EDMLOS</b>	420	250
28, 30, 32	1 1/4	G 1 1/4	1 11/16-12UNF	60	60	95.0	75.0	24.0	1397	<b>20RHZ42EDMLOS</b>	250	250
35, 38	1 1/2	G 1 1/2	2-12UNF	65	70	105.0	83.0	29.0	2001	<b>24RHZ42EDMLOS</b>	250	250

<sup>1)</sup> Pressure shown = item deliverable

$$\frac{\text{PN (bar)}}{10} = \text{PN (MPa)}$$

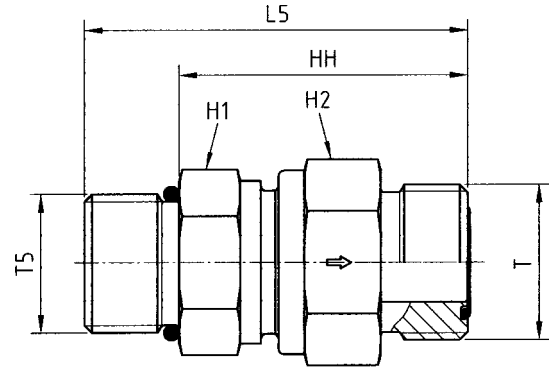
Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page 17.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, zinc plated., chrome <sup>6</sup> -free	CF	4RHZ42EDMLOSCF	NBR
Steel, zinc yellow plated	A3C (no suffix needed)	4RHZ42EDMLOS	NBR

\*Please add the **suffixes** below according to the material/surface required.

## RHV50MLOS Non return valve

Male UN/UNF thread – O-ring (ISO 11926) / O-Lok® ORFS end



Tube O.D.		UNF male thread T5	ORFS (UN/UNF) thread T	H1	H2	L5	HH	DN (Nom. diam.)	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup>	
mm	Inch										CF	A3C
6	1/4	7/16-20UNF	9/16-18UNF	19	19	45.5	34.5	3.5	92	<b>4RHV50MLOS</b>	420	400
8, 10	5/16, 3/8	9/16-18UNF	11/16-16UNF	22	24	54.5	42.5	5.5	165	<b>6RHV50MLOS</b>	420	400
12	1/2	3/4-16UNF	13/16-16UNF	24	27	60.5	46.5	5.5	165	<b>8RHV50MLOS</b>	420	400
14, 15, 16	5/8	7/8-14UNS	1-14UNF	32	36	71.0	55.0	11.5	366	<b>10RHV50MLOS</b>	420	315
18, 20	3/4	1 1/16-12UN	1 3/16-12UNF	41	46	79.0	60.5	15.0	631	<b>12RHV50MLOS</b>	420	250
22, 25	1	1 5/16-12UN	1 7/16-12UNF	46	50	82.5	64.0	19.0	863	<b>16RHV50MLOS</b>	420	250
28, 30, 32	1 1/4	1 5/8-12UN	1 11/16-12UNF	60	60	92.5	74.0	24.0	1403	<b>20RHV50MLOS</b>	250	250
35, 38	1 1/2	1 7/8-12UN	2-12UNF	65	70	99.5	81.0	29.0	1969	<b>24RHV50MLOS</b>	250	250

<sup>1)</sup> Pressure shown = item deliverable

$$\frac{\text{PN (bar)}}{10} = \text{PN (MPa)}$$

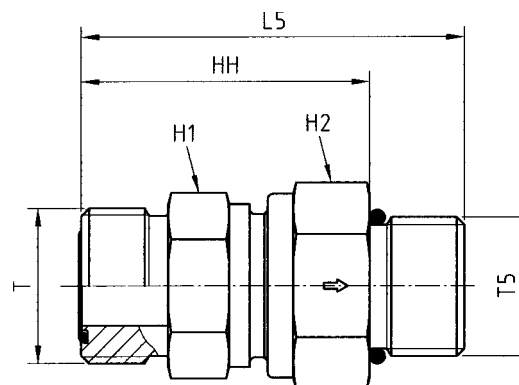
Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page 17.

\*Please add the **suffixes** below according to the material/surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, zinc plated., chrome <sup>6</sup> -free	CF	RHV50MLOSCF	NBR
Steel, zinc yellow plated	A3C (no suffix needed)	4RHV50MLOS	NBR

## RHZ5OMLOS Non return valve

O-Lok® ORFS end / Male UN/UNF thread – O-ring (ISO 11926)



Tube O.D.		UNF male thread T5	ORFS (UN/UNF) thread T	H1	H2	L5	HH	DN (Nom. diam.)	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup>	
mm	Inch										CF	A3C
6	1/4	7/16-20UNF	9/16-18UNF	19	19	45.5	34.5	3.5	91	<b>4RHZ5OMLOS</b>	420	400
8, 10	5/16, 3/8	9/16-18UNF	11/16-16UNF	22	24	54.5	42.5	5.5	161	<b>6RHZ5OMLOS</b>	420	400
12	1/2	3/4-16UNF	13/16-16UNF	24	27	60.5	46.5	5.5	161	<b>8RHZ5OMLOS</b>	420	400
14, 15, 16	5/8	7/8-14UNS	1-14UNF	32	36	71.0	55.0	11.5	348	<b>10RHZ5OMLOS</b>	420	315
18, 20	3/4	1 1/16-12UN	1 3/16-12UNF	41	46	79.0	60.5	15.0	634	<b>12RHZ5OMLOS</b>	420	250
22, 25	1	1 5/16-12UN	1 7/16-12UNF	46	50	82.5	64.0	19.0	863	<b>16RHZ5OMLOS</b>	420	250
28, 30, 32	1 1/4	1 5/8-12UN	1 11/16-12UNF	60	60	92.5	74.0	24.0	1397	<b>20RHZ5OMLOS</b>	250	250
35, 38	1 1/2	1 7/8-12UN	2-12UNF	65	70	99.5	81.0	29.0	2001	<b>24RHZ5OMLOS</b>	250	250

<sup>1)</sup> Pressure shown = item deliverable

$$\frac{\text{PN (bar)}}{10} = \text{PN (MPa)}$$

Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page 17.

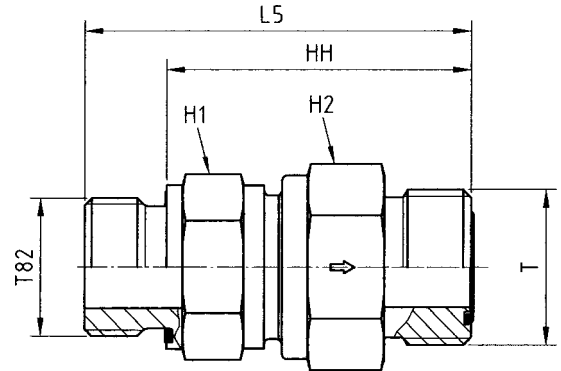
\*Please add the **suffixes** below according to the material/surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, zinc plated., chrome <sup>6</sup> -free	CF	4RHZ5OMLOSCF	NBR
Steel, zinc yellow plated	A3C (no suffix needed)	4RHZ5OMLOS	NBR



## RHV82EDMLOS Non return valve

Male metric thread – ED-seal (ISO 9974) / O-Lok® ORFS end



Tube O.D.		metric thread T82	ORFS (UN/UNF) thread T	H1	H2	L5	HH	DN (Nom. diam.)	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup>	
mm	Inch										CF	A3C
6	1/4	M12×1.5	9/16-18UNF	19	19	48.5	36.5	3.5	89	<b>4M12RHV82EDMLOS</b>	420	400
8, 10	5/16, 3/8	M16×1.5	11/16-16UNF	22	24	56.5	44.5	5.5	157	<b>6M16RHV82EDMLOS</b>	420	400
12	1/2	M18×1.5	13/16-16UNF	24	27	61.5	49.5	7.5	195	<b>8M18RHV82EDMLOS</b>	420	400
14, 15, 16	5/8	M22×1.5	1-14UNF	32	36	72.0	58.0	11.5	369	<b>10M22RHV82EDMLOS</b>	420	315
18, 20	3/4	M27×2.0	1 3/16-12UNF	41	46	79.5	63.5	15.0	628	<b>12M27RHV82EDMLOS</b>	420	250
22, 25	1	M33×2.0	1 7/16-12UNF	46	50	84.0	66.0	19.0	867	<b>16M33RHV82EDMLOS</b>	420	250
28, 30, 32	1 1/4	M42×2.0	1 11/16-12UNF	60	60	95.0	75.0	24.0	1409	<b>20M42RHV82EDMLOS</b>	250	250
35, 38	1 1/2	M48×2.0	2-12UNF	65	70	103.0	81.0	29.0	1970	<b>24M48RHV82EDMLOS</b>	250	250

<sup>1)</sup> Pressure shown = item deliverable

$$\frac{\text{PN (bar)}}{10} = \text{PN (MPa)}$$

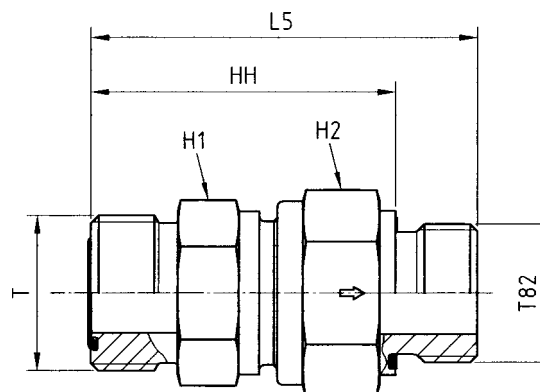
Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page 17.

\*Please add the **suffixes** below according to the material/surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, zinc plated., chrome <sup>6</sup> -free	CF	4M12RHV82EDMLOSCF	NBR
Steel, zinc yellow plated	A3C (no suffix needed)	4M12RHV82EDMLOS	NBR

## RHZ82EDMLOS Non return valve

O-Lok® ORFS end / Male metric thread – ED-seal (ISO 9974)



Tube O.D.		metric thread T82	ORFS (UN/UNF) thread T	H1	H2	L5	HH	DN (Nom. diam.)	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup>	
mm	Inch										CF	A3C
6	1/4	M12×1.5	9/16-18UNF	19	19	48.5	36.5	3.5	89	<b>4M12RHZ82EDMLOS</b>	420	400
8, 10	5/16, 3/8	M16×1.5	11/16-16UNF	22	24	56.5	44.5	5.5	156	<b>6M16RHZ82EDMLOS</b>	420	400
12	1/2	M18×1.5	13/16-16UNF	24	27	61.5	49.5	7.5	195	<b>8M18RHZ82EDMLOS</b>	420	400
14, 15, 16	5/8	M22×1.5	1-14UNF	32	36	70.0	56.0	11.5	352	<b>10M22RHZ82EDMLOS</b>	420	315
18, 20	3/4	M27×2.0	1 3/16-12UNF	41	46	77.5	61.5	15.0	608	<b>12M27RHZ82EDMLOS</b>	420	250
22, 25	1	M33×2.0	1 7/16-12UNF	46	50	84.0	66.0	19.0	965	<b>16M33RHZ82EDMLOS</b>	420	250
28, 30, 32	1 1/4	M42×2.0	1 11/16-12UNF	60	60	95.0	75.0	24.0	1396	<b>20M42RHZ82EDMLOS</b>	250	250
35, 38	1 1/2	M48×2.0	2-12UNF	65	70	115.0	93.0	29.0	1978	<b>24M48RHZ82EDMLOS</b>	250	250

<sup>1)</sup> Pressure shown = item deliverable

$$\frac{\text{PN (bar)}}{10} = \text{PN (MPa)}$$

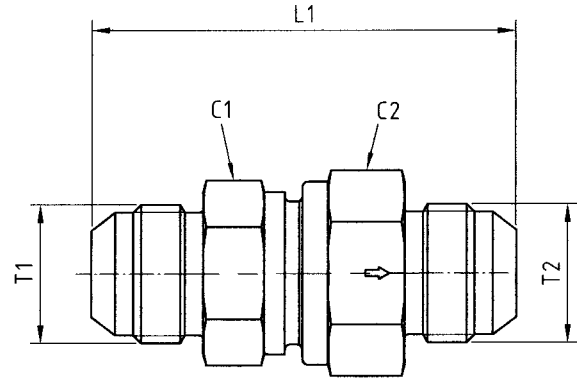
Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page 17.

\*Please add the **suffixes** below according to the material/surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, zinc plated., chrome <sup>6</sup> -free	CF	4M12RHZ82EDMLOSCF	NBR
Steel, zinc yellow plated	A3C (no suffix needed)	4M12RHZ82EDMLOS	NBR

## RHDMTXS Non return valve

Triple-Lok® 37° flare end / Triple-Lok® 37° flare end



Tube 1 O.D.		Tube 2 O.D.		Thread JIC SAE T1	Thread JIC SAE T2	C1	C2	L1	DN (Nom. diam.)	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup>	
mm	Inch	mm	Inch									CF	A3C
6	1/4	6	1/4	7/16-20UNF	7/16-20UNF	19	19	52.5	3.5	108	<b>4RHDMTXS</b>	420	350
8	5/16	8	5/16	1/2-20UNF	1/2-20UNF	22	24	59.5	5.5	188	<b>5RHDMTXS</b>	420	350
10	3/8	10	3/8	9/16-18UNF	9/16-18UNF	24	27	61.5	7.5	223	<b>6RHDMTXS</b>	420	350
12	1/2	12	1/2	3/4-16UNF	3/4-16UNF	27	32	69.5	9.5	324	<b>8RHDMTXS</b>	420	315
14, 15, 16	5/8	14, 15, 16	5/8	7/8-14UNF	7/8-14UNF	32	36	78.5	11.5	428	<b>10RHDMTXS</b>	350	315
18, 20	3/4	18, 20	3/4	1 1/16-12UN	1 1/16-12UN	41	46	87.5	15.0	731	<b>12RHDMTXS</b>	350	250
25	1	25	1	1 5/16-12UN	1 5/16-12UN	46	50	92.5	19.0	1076	<b>16RHDMTXS</b>	280	250
28, 30, 32	1 1/4	28, 30, 32	1 1/4	1 5/8-12UN	1 5/8-12UN	60	60	105.5	24.0	1630	<b>20RHDMTXS</b>	250	210
35, 38	1 1/2	35, 38	1 1/2	1 7/8-12UN	1 7/8-12UN	65	70	118.5	29.0	2362	<b>24RHDMTXS</b>	210	140

<sup>1)</sup> Pressure shown = item deliverable

$$\frac{\text{PN (bar)}}{10} = \text{PN (MPa)}$$

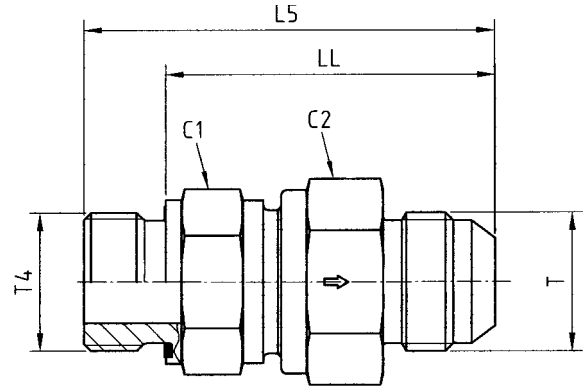
**Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page I7.**

\*Please add the **suffixes** below according to the material/surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, zinc plated., chrome <sup>6</sup> -free	CF	4RHDMTXS <sup>6</sup> CF	NBR
Steel, zinc yellow plated	A3C (no suffix needed)	4RHDMTXS	NBR

## RHV42EDMXS Non return valve

Male BSPP thread – ED-seal (ISO 1179) / Triple-Lok® 37° flare end



Tube O.D.		BSPP thread T4	Thread JIC SAE T	C1	C2	L5	LL	DN (Nom. diam.)	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup>	
mm	Inch										CF	A3C
6	1/4	G 1/8	7/16-20UNF	19	19	48.0	40.0	3.5	92	<b>4RHV42EDMXS</b>	420	350
8	5/16	G 1/4	1/2-20UNF	22	24	59.5	47.5	5.5	165	<b>5-4RHV42EDMXS</b>	420	350
10	3/8	G 1/4	9/16-18UNF	24	27	62.0	50.0	7.5	191	<b>6RHV42EDMXS</b>	420	350
12	1/2	G 3/8	3/4-16UNF	27	32	67.0	55.0	9.5	277	<b>8RHV42EDMXS</b>	420	315
14, 15, 16	5/8	G 1/2	7/8-14UNS	32	36	76.0	62.0	11.5	366	<b>10RHV42EDMXS</b>	350	315
18, 20	3/4	G 3/4	1 1/16-12UN	41	46	84.5	68.5	15.0	631	<b>12RHV42EDMXS</b>	350	250
25	1	G 1	1 5/16-12UN	46	50	89.5	71.5	19.0	863	<b>16RHV42EDMXS</b>	280	250
28, 30, 32	1 1/4	G 1 1/4	1 5/8-12UN	60	60	102.0	82.0	24.0	1403	<b>20RHV42EDMXS</b>	250	210
35, 38	1 1/2	G 1 1/2	1 7/8-12UN	65	70	113.0	91.0	29.0	1969	<b>24RHV42EDMXS</b>	210	140

<sup>1)</sup> Pressure shown = item deliverable

$$\frac{\text{PN (bar)}}{10} = \text{PN (MPa)}$$

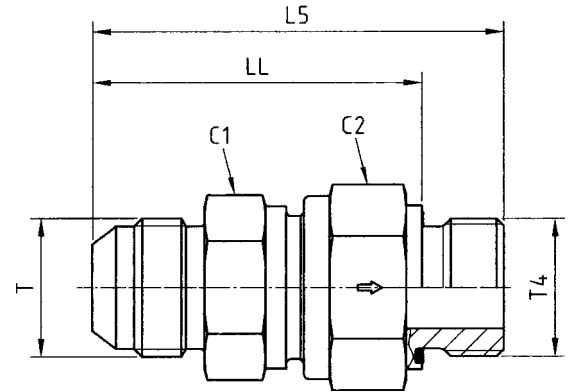
Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page I7.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, zinc plated., chrome <sup>6</sup> -free	CF	4RHV42EDMXSCF	NBR
Steel, zinc yellow plated	A3C (no suffix needed)	4RHV42EDMXS	NBR

\*Please add the **suffixes** below according to the material/surface required.

## RHZ42EDMXS Non return valve

Triple-Lok® 37° flare end / Male BSPP thread – ED-seal (ISO 1179)



Tube O.D.		BSPP thread T4	Thread JIC SAE T	C1	C2	L5	LL	DN (Nom. diam.)	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup>	
mm	Inch										CF	A3C
6	1/4	G 1/8	7/16-20UNF	19	19	48.0	40.0	3.5	89	<b>4RHZ42EDMXS</b>	420	350
8	5/16	G 1/4	1/2-20UNF	22	24	59.0	47.0	5.5	156	<b>5-4RHZ42EDMXS</b>	420	350
10	3/8	G 1/4	9/16-18UNF	24	27	62.0	50.0	7.5	190	<b>6RHZ42EDMXS</b>	420	350
12	1/2	G 3/8	3/4-16UNF	27	32	66.0	54.0	9.5	278	<b>8RHZ42EDMXS</b>	420	315
14, 15, 16	5/8	G 1/2	7/8-14UNS	32	36	74.0	60.0	11.5	348	<b>10RHZ42EDMXS</b>	350	315
18, 20	3/4	G 3/4	1 1/16-12UN	41	46	82.5	66.5	15.0	634	<b>12RHZ42EDMXS</b>	350	250
25	1	G 1	1 5/16-12UN	46	50	89.5	71.5	19.0	863	<b>16RHZ42EDMXS</b>	280	250
28, 30, 32	1 1/4	G 1 1/4	1 5/8-12UN	60	60	102.0	82.0	24.0	1397	<b>20RHZ42EDMXS</b>	250	210
35, 38	1 1/2	G 1 1/2	1 7/8-12UN	65	70	115.0	93.0	29.0	2001	<b>24RHZ42EDMXS</b>	210	140

<sup>1)</sup> Pressure shown = item deliverable

$$\frac{\text{PN (bar)}}{10} = \text{PN (MPa)}$$

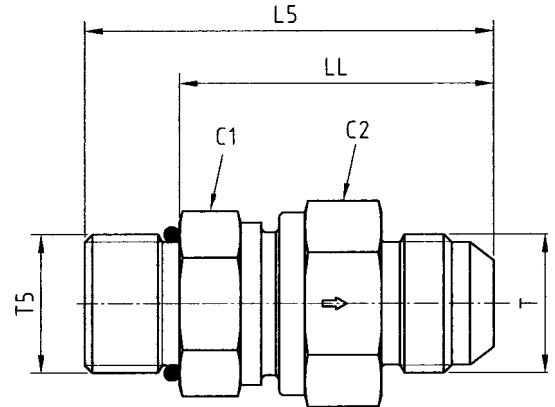
Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page I7.

\*Please add the **suffixes** below according to the material/surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, zinc plated., chrome <sup>6</sup> -free	CF	4RHZ42EDMXSCF	NBR
Steel, zinc yellow plated	A3C (no suffix needed)	4RHZ42EDMXS	NBR

## RHV5OMXS Non return valve

Male UN/UNF thread – O-ring (ISO 11926) / Triple-Lok® 37° flare end



Tube O.D.		Thread UNF T5	Thread JIC SAE T	C1	C2	L5	LL	DN (Nom. diam.)	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup>	
mm	Inch										CF	A3C
6	1/4	7/16-20UNF	7/16-18UNF	19	19	49.5	38.5	3.5	92	<b>4RHV5OMXS</b>	420	350
8	5/16	1/2-20UNF	1/2-20UNF	22	24	56.5	45.5	5.5	165	<b>5RHV5OMXS</b>	420	350
10	3/8	9/16-18UNF	9/16-18UNF	24	27	59.5	47.5	7.5	191	<b>6RHV5OMXS</b>	420	350
12	1/2	3/4-16UNF	3/4-16UNF	27	32	66.5	52.5	9.5	277	<b>8RHV5OMXS</b>	420	315
14, 15, 16	5/8	7/8-14UNS	7/8-14UNS	32	36	75.0	59.0	11.5	366	<b>10RHV5OMXS</b>	350	315
18, 20	3/4	1 1/16-12UN	1 1/16-12UN	41	46	84.0	65.5	15.0	631	<b>12RHV5OMXS</b>	350	250
25	1	1 5/16-12UN	1 5/16-12UN	46	50	88.0	69.5	19.0	863	<b>16RHV5OMXS</b>	280	250
28, 30, 32	1 1/4	1 5/8-12UN	1 5/8-12UN	60	60	99.5	81.0	24.0	1403	<b>20RHV5OMXS</b>	250	210
35, 38	1 1/2	1 7/8-12UN	1 7/8-12UN	65	70	109.5	91.0	29.0	1969	<b>24RHV5OMXS</b>	210	140

<sup>1)</sup> Pressure shown = item deliverable

$$\frac{PN \text{ (bar)}}{10} = PN \text{ (MPa)}$$

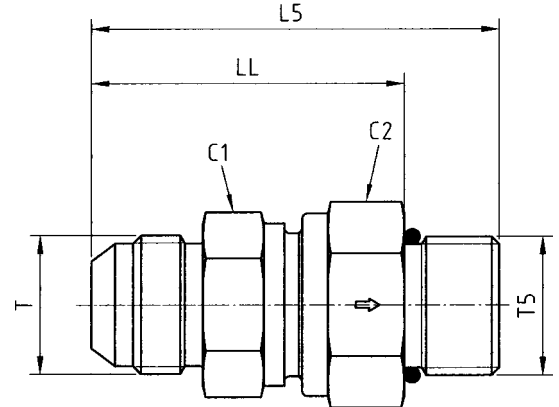
Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page 17.

\*Please add the **suffixes** below according to the material/ surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, zinc plated., chrome <sup>6</sup> -free	CF	RHV5OMXSCF	NBR
Steel, zinc yellow plated	A3C (no suffix needed)	4RHV5OMXS	NBR

## RHZ50MXS Non return valve

Triple-Lok® 37° flare end / Male UN/UNF thread – O-ring (ISO 11926)



Tube O.D.		Thread UNF T5	Thread JIC SAE T	C1	C2	L5	LL	DN (Nom. diam.)	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup>	
mm	Inch										CF	A3C
6	1/4	7/16-20UNF	7/16-18UNF	19	19	49.5	38.5	3.5	91	<b>4RHZ50MXS</b>	420	350
8	5/16	1/2-20UNF	1/2-20UNF	22	24	56.5	45.5	5.5	161	<b>5RHZ50MXS</b>	420	350
10	3/8	9/16-18UNF	9/16-18UNF	24	27	59.5	47.5	7.5	190	<b>6RHZ50MXS</b>	420	350
12	1/2	3/4-16UNF	3/4-16UNF	27	32	66.5	52.5	9.5	278	<b>8RHZ50MXS</b>	420	315
14, 15, 16	5/8	7/8-14UNS	7/8-14UNS	32	36	75.0	59.0	11.5	348	<b>10RHZ50MXS</b>	350	315
18, 20	3/4	1 1/16-12UN	1 1/16-12UN	41	46	84.0	65.5	15.0	634	<b>12RHZ50MXS</b>	350	250
25	1	1 5/16-12UN	1 5/16-12UN	46	50	88.0	69.5	19.0	863	<b>16RHZ50MXS</b>	280	250
28, 30, 32	1 1/4	1 5/8-12UN	1 5/8-12UN	60	60	99.5	81.0	24.0	1397	<b>20RHZ50MXS</b>	250	210
35, 38	1 1/2	1 7/8-12UN	1 7/8-12UN	65	70	109.5	91.0	29.0	2001	<b>24RHZ50MXS</b>	210	240

<sup>1)</sup> Pressure shown = item deliverable

$$\frac{\text{PN (bar)}}{10} = \text{PN (MPa)}$$

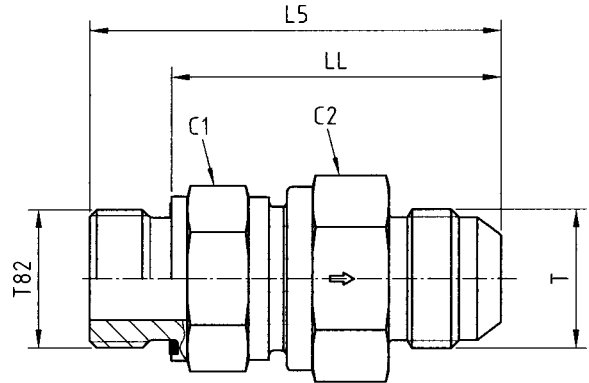
Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page 17.

\*Please add the **suffixes** below according to the material/surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, zinc plated., chrome <sup>6</sup> -free	CF	4RHZ50MXSCF	NBR
Steel, zinc yellow plated	A3C (no suffix needed)	4RHZ50MXS	NBR

## RHV82EDMXS Non return valve

Male metric thread – ED-seal (ISO 9974) / Triple-Lok® 37° flare end



Tube O.D.		Metric thread T82	Thread JIC SAE T	C1	C2	L5	LL	DN (Nom. diam.)	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup>	
mm	Inch										CF	A3C
6	1/4	M10×1.0	7/16-20UNF	19	19	48.0	40.0	3.5	89	<b>4M10RHV82EDMXS</b>	420	350
8	5/16	M12×1.5	1/2-20UNF	22	24	59.5	47.5	5.5	157	<b>5M12RHV82EDMXS</b>	420	350
10	3/8	M14×1.5	9/16-18UNF	24	27	62.0	50.0	7.5	195	<b>6M14RHV82EDMXS</b>	420	350
12	1/2	M16×1.5	3/4-16UNF	27	32	67.0	55.0	9.5	274	<b>8M16RHV82EDMXS</b>	420	315
14, 15, 16	5/8	M18×1.5	7/8-14UNS	32	36	73.5	61.5	11.5	369	<b>10M18RHV82EDMXS</b>	350	315
18, 20	3/4	M27×2.0	1 1/16-12UN	41	46	84.5	68.5	15.0	628	<b>12M27RHV82EDMXS</b>	350	160
25	1	M33×2.0	1 5/16-12UN	46	50	89.5	71.5	19.0	867	<b>16M33RHV82EDMXS</b>	280	250
28, 30, 32	1 1/4	M42×2.0	1 5/8-12UN	60	60	102.0	82.0	24.0	1409	<b>20M42RHV82EDMXS</b>	250	210
35, 38	1 1/2	M48×2.0	1 7/8-12UN	65	70	113.0	91.0	29.0	1970	<b>24M48RHV82EDMXS</b>	210	140

<sup>1)</sup> Pressure shown = item deliverable

$$\frac{\text{PN (bar)}}{10} = \text{PN (MPa)}$$

Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page I7.

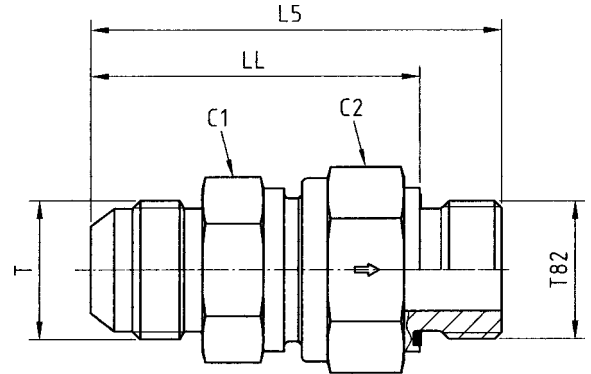
\*Please add the **suffixes** below according to the material/surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, zinc plated., chrome <sup>6</sup> -free	CF	4M10RHV82EDMXSCF	NBR
Steel, zinc yellow plated	A3C (no suffix needed)	4M10RHV82EDMXS	NBR



## RHZ82EDMXS Non return valve

Triple-Lok® 37° flare end / Male metric thread – ED-seal (ISO 9974)



Tube O.D.		Metric thread T82	Thread JIC SAE T	C1	C2	L5	LL	DN (Nom. diam.)	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup>	
mm	Inch										CF	A3C
6	1/4	M10×1.0	7/16-20UNF	19	19	48.0	40.0	3.5	89	<b>4M10RHZ82EDMXS</b>	420	350
8	5/16	M12×1.5	1/2-20UNF	22	24	59.5	47.5	5.5	156	<b>5M12RHZ82EDMXS</b>	420	350
10	3/8	M14×1.5	9/16-18UNF	24	27	62.0	50.0	7.5	195	<b>6M14RHZ82EDMXS</b>	420	350
12	1/2	M16×1.5	3/4-16UNF	27	32	66.0	54.0	9.5	272	<b>8M16RHZ82EDMXS</b>	420	315
14, 15, 16	5/8	M18×1.5	7/8-14UNS	32	36	71.5	59.5	11.5	352	<b>10M18RHZ82EDMXS</b>	350	315
18, 20	3/4	M27×2.0	1 1/16-12UN	41	46	82.5	66.5	15.0	608	<b>12M27RHZ82EDMXS</b>	350	250
25	1	M33×2.0	1 5/16-12UN	46	50	89.5	71.5	19.0	965	<b>16M33RHZ82EDMXS</b>	280	250
28, 30, 32	1 1/4	M42×2.0	1 5/8-12UN	60	60	102.0	82.0	24.0	1396	<b>20M42RHZ82EDMXS</b>	250	210
35, 38	1 1/2	M48×2.0	1 7/8-12UN	65	70	115.0	93.0	29.0	1807	<b>24M48RHZ82EDMXS</b>	210	140

<sup>1)</sup> Pressure shown = item deliverable

$$\frac{\text{PN (bar)}}{10} = \text{PN (MPa)}$$

Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page I7.

\*Please add the **suffixes** below according to the material/surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, zinc plated., chrome <sup>6</sup> -free	CF	4M10RHZ82EDMXSCF	NBR
Steel, zinc yellow plated	A3C (no suffix needed)	4M10RHZ82EDMXS	NBR

## DV Shut-off valve PN 10 – Casing DIN 3512

EO 24° cone end / EO 24° cone end

(with internal threaded spindle)

For cold and warm water\* up to 80°C, compressed air, mineral oils and fuel oils types EL and L, 6 bar and up to 80°C.

The pressure specification PN for hand-operated

shut-off valves applies to the design

factor 1,5 (according DIN 3230 T5

and ISO 5208).

### Caution!

Please note the admissible pressure ratings for the EO-tube ends.

### DVAE

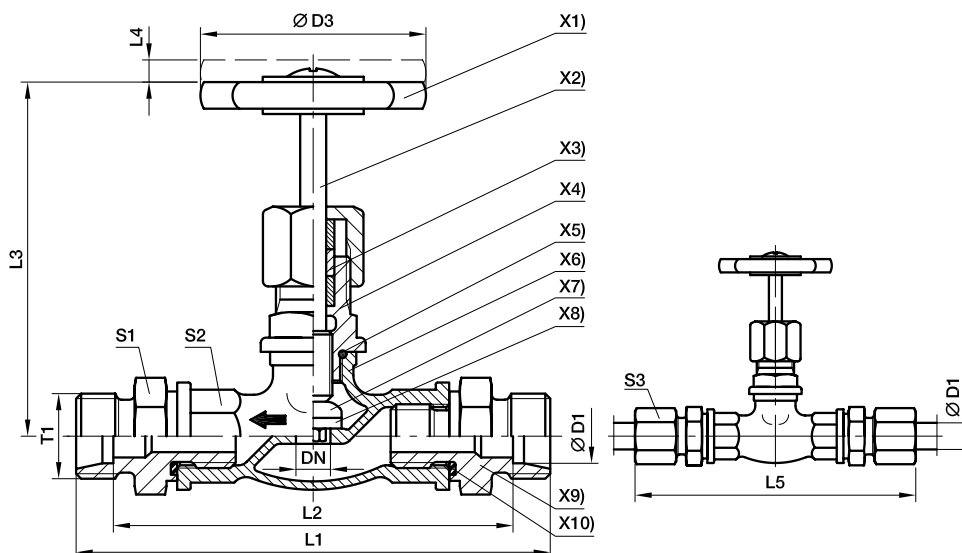
EO tube end ← male BSPP

### DVAA

male BSPP ← EO tube end

DV-valves with male BSPP thread on request.

\*Indicate type of water or additive if any



- X1) **Hand wheel:** material: Polyamid
- X2) **Spindle:** material: Brass 2.0401
- X3) **Stuffing boxpacking:** PTFE (e.g. Teflon) Compound
- X4) **Head piece:** material: Brass 2.0401
- X5) **Sealing:** O-ring NBR (e.g. Perbunan)
- X6) **Casing:** material: Brass 2.0340.02
- X7) **Valve cone:** material: Brass 2.0401
- X8) **Shut-off sealing:** NBR (e.g. Perbunan)
- X9) **Male stud fitting:** material: Brass 2.0540
- X10) **Sealing:** Elastoc-sealing NBR (e.g. Perbunan)

Series	D1	T1	DN	D3	L1	L2	L3	L4	L5	S1	S2	S3	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup> without surface
L <sup>3)</sup>	06	M 12×1.5	5	50	102	88	63	7	117	22	21	14	313	<b>DV06LX</b>	10
	08	M 14×1.5	6	50	102	88	63	7	117	22	21	17	305	<b>DV08LX</b>	10
	10	M 16×1.5	8	50	104	90	63	7	119	22	21	19	308	<b>DV10LX</b>	10
	12	M 18×1.5	10	50	104	90	63	7	119	22	21	22	304	<b>DV12LX</b>	10
	15	M 22×1.5	12	50	107	93	65	8	123	27	25	27	426	<b>DV15LX</b>	10
	18	M 26×1.5	16	50	109	94	67	8	126	27	25	32	434	<b>DV18LX</b>	10
	22	M 30×2	20	60	123	108	67	8	140	32	32	36	670	<b>DV22LX</b>	10
	28	M 36×2	25	60	140	125	95	10	158	41	38	41	1030	<b>DV28LX</b>	10
	35	M 45×2	32	70	166	145	102	10	188	50	47	50	1640	<b>DV35LX</b>	10

<sup>1)</sup> Pressure shown = item deliverable

<sup>3)</sup> L = light series

$$\frac{\text{PN (bar)}}{10} = \text{PN (MPa)}$$

Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page I7.

\*Please add the **suffixes** below according to the material/surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Brass 2.0340.02	without	DV06LX	PTFE / NBR

## LD Shut-off valve PN 40

### EO 24° cone end / EO 24° cone end

(with internal threaded spindle)

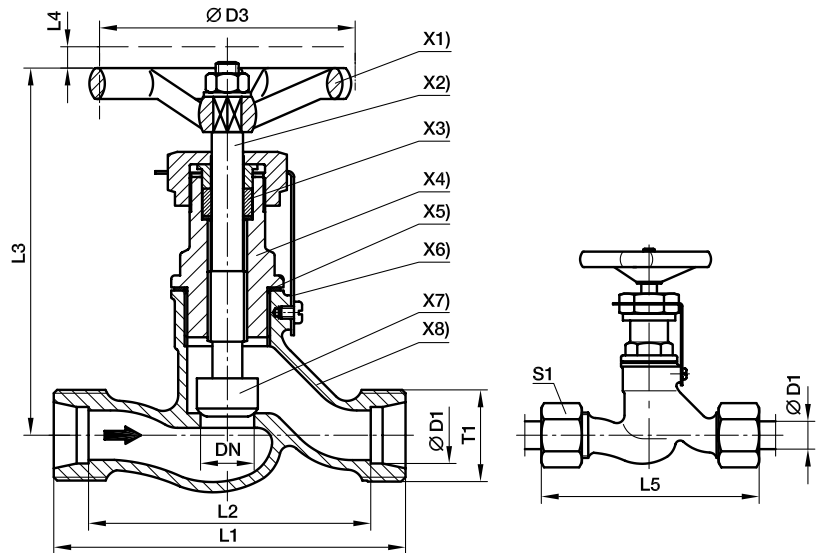
For hydraulic oil, mineral, oil, fuel oil, Diesel, water\* etc. Temperature up to 150°C. For steam up to 10 bar.

For compressed air up to 35 bar on request. CS DIN 86501 Rg.-N.

The pressure specification PN for hand-operated shut-off valves applies to the design factor 1,5 (according to DIN 3230 T5 and ISO 5208).

#### Caution!

Please note the admissible pressure ratings for the EO-tube ends.



#### EO-tube connection:

for **copper** tubes nuts, cutting and locking rings of brass

#### Attention:

for **steel** tubes: nuts, progressive rings of steel

#### specify when ordering

We recommend pre-installation in hardened pre-installation body (see assembly instructions)

- X1) **Hand wheel:** Plastic material typ 74 according to DIN 388 Form C
- X2) **Spindle:** with internal thread. Material: Cu Zn 35 Ni 2
- X3) **Stuffing box packing:** Graphite
- X4) **Head piece:** material: Cu Zn 39 Pb 3
- X5) **Sealing:** Copper ring
- X6) **Locking plates:** material: St. 37/zinc plated
- X7) **Valve cone:** loose tip material: Cu Zn 35 Ni 2
- X8) **Casing:** material: G-Cu Sn 5Zn Pb (Rg 5 according to DIN 1705)

Series	D1	T1	DN	D3	L1	L2	L3	L4	L5	S1	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup> without surface
S <sup>4)</sup>	10	M18×1.5	6	63	60	45	98	7	77	22	383	<b>LD10SX</b>	40
	12	M20×1.5	8	63	64	49	98	7	81	24	401	<b>LD12SX</b>	40
	14	M22×1.5	10	63	70	54	98	7	89	27	417	<b>LD14SX</b>	40
	16	M24×1.5	12	80	84	67	110	9	103	30	631	<b>LD16SX</b>	40
	20	M30×2	16	80	90	69	110	9	112	36	688	<b>LD20SX</b>	40
	25	M36×2	20	100	110	86	129	12	134	46	1191	<b>LD25SX</b>	40
	30	M42×2	25	100	120	93	129	12	146	50	1322	<b>LD30SX</b>	40
	38	M52×2	32	100	140	108	158	12	169	60	2268	<b>LD38SX</b>	40

<sup>1)</sup> Pressure shown = item deliverable

<sup>4)</sup> S = heavy series

$$\frac{PN \text{ (bar)}}{10} = PN \text{ (MPa)}$$

**Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page 17.**

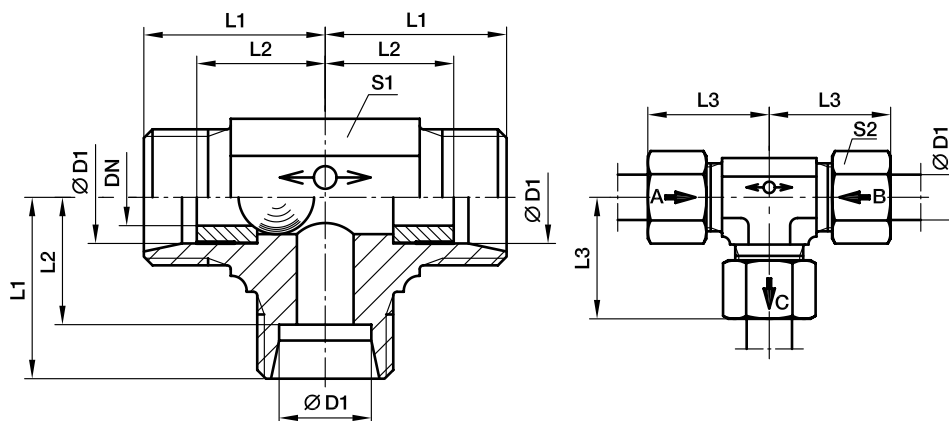
\*Please add the **suffixes** below according to the material/surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Gunmetal (Rg 5) 2.1096	without	LD10SX	Graphit / Metal

## WV Alternating valve

EO 24° cone end / EO 24° cone end / EQ 24° cone end

These valves permit the passage of flow from either inlet 1 or 2 to the outlet port whilst shutting of the inlet port not in use. The shutting off, of an inlet is achieved by a floating ball bearing which moves by the pressure of the flow.



Directions of flow:

$D_1 \rightarrow D_3 = D_2$  closed  
 $D_2 \rightarrow D_3 = D_1$  closed

Material: steel

Surface finish: Zinc plated and yellow chromated (A3C).

Valves are not recommended for compressed air and gases.

WV-valves are not to be used in connection with weld nipples, swivel nuts etc. where there is no contact with a shoulder stop in the inner cone.

Temperature range without pressure reductions: -40°C up to +120°C.

Recommended fitting position as shown in the picture.

Leakage rate for alternating valves (hydraulic test with test pressure =  $P_{max}$ ): approx. 20 drops (test period of 1 minute).

Series	D1	T1	DN	L1	L2	L3	S1	S2	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup>	
											CF	A3C
L <sup>3)</sup>	8	M 14×1.5	4,5	21	14	29	14	17	53	<b>WV08LOMD</b>	160	160
	10	M 16×1.5	6,0	22	15	30	17	19	73	<b>WV10LOMD</b>	160	160
	12	M 18×1.5	7,5	24	17	32	19	22	96	<b>WV12LOMD</b>	160	160
	15	M 22×1.5	10,0	28	21	36	19	27	134	<b>WV15LOMD</b>	160	160

<sup>1)</sup> Pressure shown = item deliverable

<sup>3)</sup> L = light series

$\frac{PN \text{ (bar)}}{10} = PN \text{ (MPa)}$

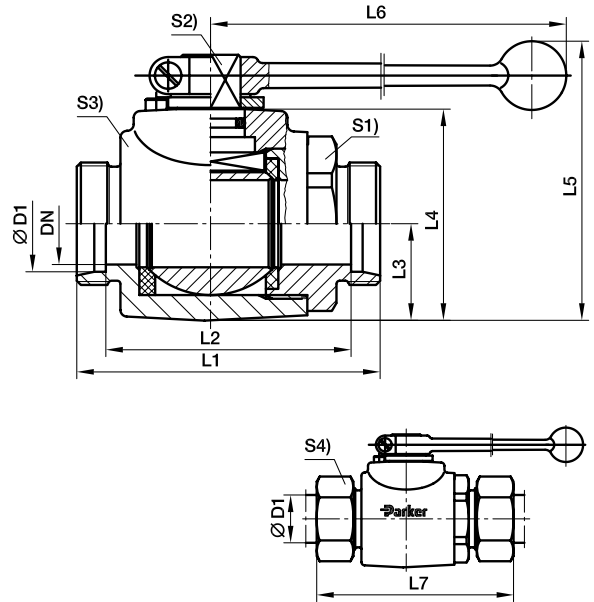
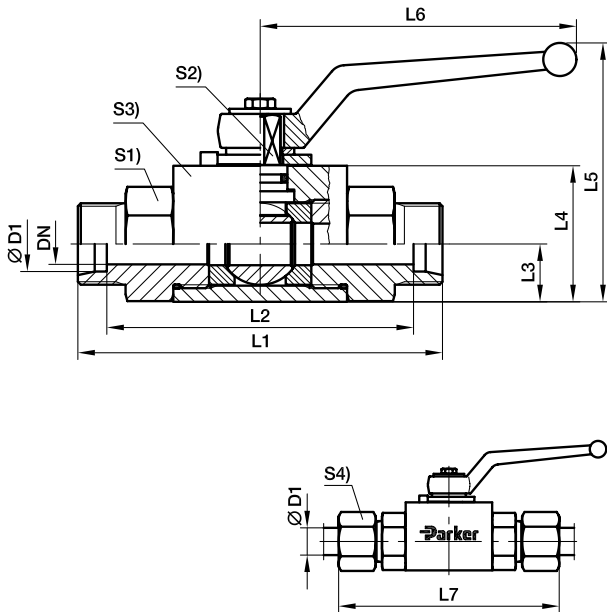
Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page 17.

\*Please add the **suffixes** below according to the material/surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, zinc plated., chrome <sup>6</sup> -free	CF	WV08LOMDCF	Steel ball
Steel, zinc yellow plated	A3C	WV08LOMDA3C	Steel ball

## KH 2-way ball valve steel

EO 24° cone end / EO 24° cone end



Series	D1 DN	L1	L2	L3	L4	L5	L6	L7	S1	S2	S3	S4	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup> bronzed		
L <sup>3)</sup>	06	4	67	53	10.0	25	55.0	76	82	19	7	20	14	195	KH06LX	500	
	08	6	67	53	10.0	25	55.0	76	82	19	7	20	17	190	KH08LX	500	
	10	8	75	61	14.5	35	68.0	100	90	24	8	30	19	420	KH10LX	500	
	12	10	75	61	14.5	35	68.0	100	90	24	8	30	22	410	KH12LX	500	
	15	12	83	69	17.0	40	92.0	112	99	30	10	35	27	631	KH15LX	500	
	18	16	82	67	20.0	45	105.0	166	99	36	11	45	32	850	KH18LX	400	
	22	20	99	84	24.0	55	113.0	187	116	41	14	45	36	1210	KH22LX	400	
	28	25	108	93	26.0	60	118.0	187	126	50	14	55	41	1750	KH28LX	400	
	35	25	116	95	26.0	60	118.0	187	138	50	14	55	50	1820	KH35LXDN25	400	
	35	32	121	100	36.5	80	180.5	320	143	60	17	73	50	3158	KH35LX	315	
	42	25	121	99	26.0	60	118.0	187	144	55	14	55	60	1940	KH42LXDN25	400	
	42	40	118	96	42.5	90	190.5	320	141	70	17	85	60	3788	KH42LX	315	
	S <sup>4)</sup>	08	4	73	59	10.0	25	55.0	76	88	19	7	20	19	214	KH08SX	500
		10	6	73	58	10.0	25	55.0	76	90	19	7	20	22	220	KH10SX	500
12		8	77	62	14.5	35	68.0	100	94	24	8	30	24	430	KH12SX	500	
14		10	81	65	14.5	35	68.0	100	100	24	8	30	27	440	KH14SX	500	
16		12	87	70	17.0	40	92.0	112	106	30	10	35	30	649	KH16SX	500	
20		16	90	69	20.0	45	105.0	166	112	36	11	45	36	900	KH20SX	400	
25		20	107	83	24.0	55	113.0	187	131	41	14	45	46	1290	KH25SX	400	
30		25	120	93	26.0	60	118.0	187	146	50	14	55	50	1880	KH30SX	400	
38		25	134	102	26.0	60	118.0	187	163	55	14	55	60	1950	KH38SXDN25	400	
38		32	127	95	36.5	80	180.5	320	156	60	17	73	60	3266	KH38SX	315	

<sup>1)</sup> Pressure shown = item deliverable

<sup>3)</sup> L = light series; <sup>4)</sup> S = heavy series

$$\frac{\text{PN (bar)}}{10} = \text{PN (MPa)}$$

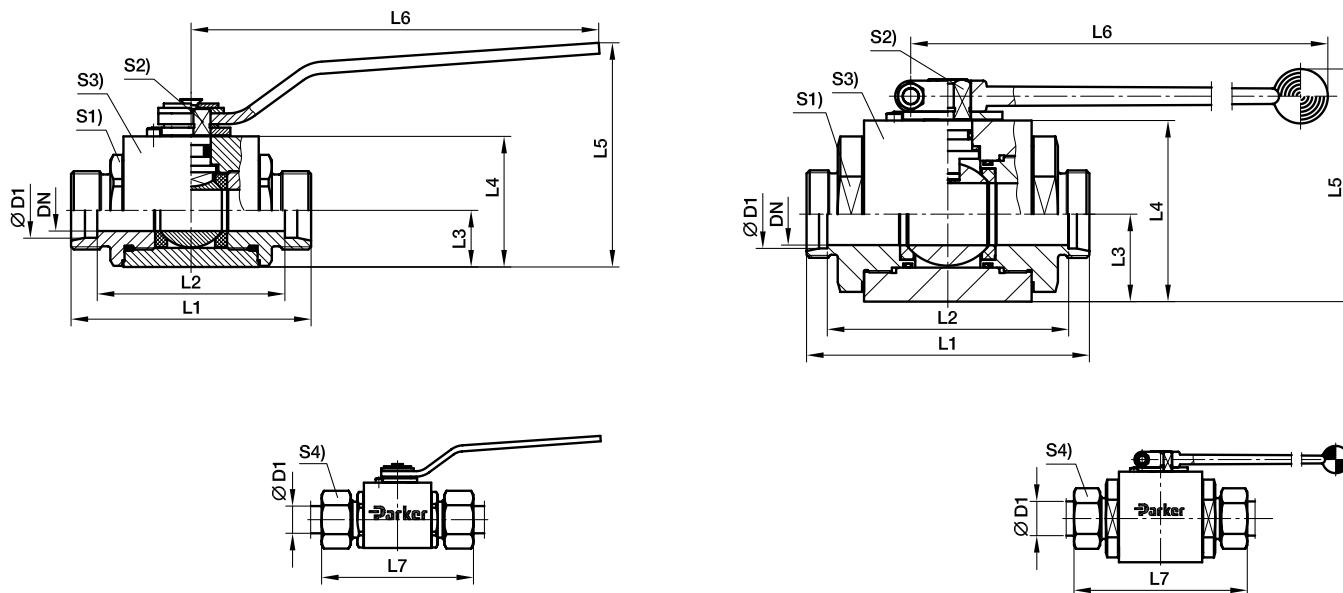
Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page 17.

\*Please add the **suffixes** below according to the material/surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, bronzed	DIN 50938-FE//A/T4	KH06LX	POM / NBR

## KH 2-way ball valve stainless steel

EO 24° cone end / EO 24° cone end



Series	D1 DN	L1	L2	L3	L4	L5	L6	L7	S1	S2	S3	S4	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup> 71	
L <sup>3)</sup>	06	4	73	59	13.7	30.0	55	76	88	22	7	30	14	383	KH06L71X	500
	08	6	73	59	13.7	30.0	55	76	88	22	7	30	17	381	KH08L71X	500
	10	8	87	73	18.0	40.0	85	130	102	30	8	40	19	809	KH10L71X	500
	12	10	87	73	18.0	40.0	85	130	102	30	8	40	22	821	KH12L71X	500
	15	12	91	77	21.0	45.0	90	130	107	32	10	45	27	1020	KH15L71X	500
	18	16	91	76	21.0	45.0	90	130	108	32	10	45	32	1037	KH18L71X	500
	22	20	102	87	26.0	60.0	103	187	119	46	14	50	36	1610	KH22L71X	315
	28	25	107	92	28.0	65.0	108	187	125	50	14	55	41	2032	KH28L71X	315
	35	32	126	105	45.0	93.2	174	320	148	70	19	100	50	4780	KH35L71X	420
	42	40	136	114	52.5	104.4	185	320	159	80	19	110	60	7754	KH42L71X	420
S <sup>4)</sup>	08	4	76	62	13.7	30.0	55	76	91	22	7	30	19	392	KH08S71X	500
	10	6	76	61	13.7	30.0	55	76	93	22	7	30	22	460	KH10S71X	500
	12	8	89	74	18.0	40.0	85	130	106	30	8	40	24	840	KH12S71X	500
	14	10	93	77	18.0	40.0	85	130	112	30	8	40	27	847	KH14S71X	500
	16	12	96	79	21.0	45.0	90	130	115	32	10	45	30	1055	KH16S71X	500
	20	16	99	78	21.0	45.0	90	130	121	32	10	45	36	1079	KH20S71X	500
	25	20	110	86	26.0	60.0	103	187	134	46	14	50	46	1720	KH25S71X	315
	30	25	120	93	28.0	65.0	108	187	146	50	14	55	50	2150	KH30S71X	315
	38	32	132	100	45.0	93.2	174	320	161	70	19	100	60	6066	KH38S71X	420

<sup>1)</sup> Pressure shown = item deliverable

<sup>3)</sup> L = light series; <sup>4)</sup> S = heavy series

$$\frac{PN \text{ (bar)}}{10} = PN \text{ (MPa)}$$

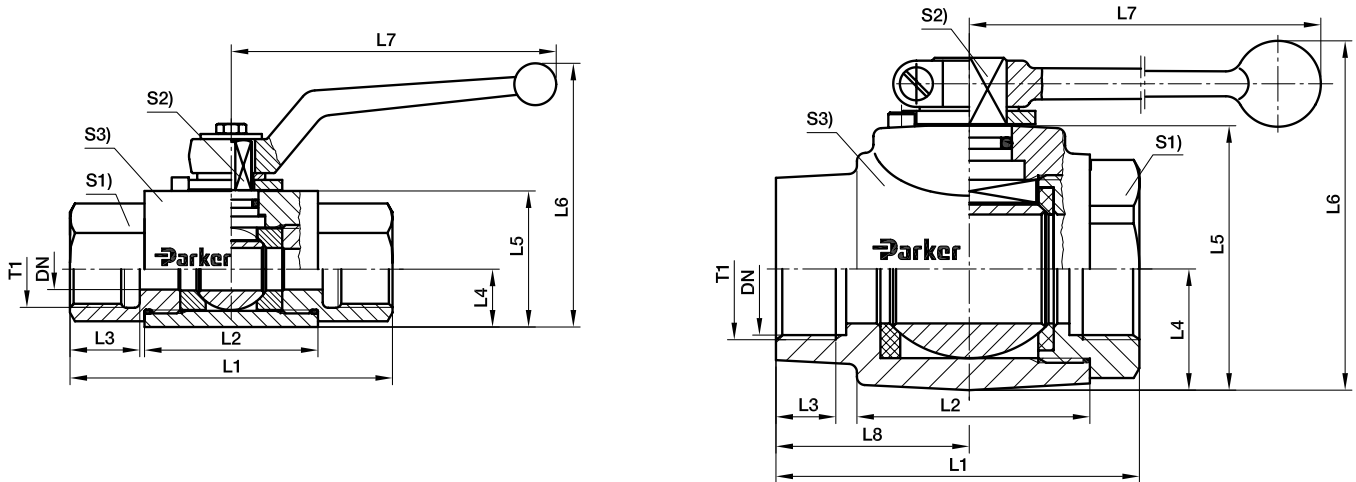
Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page 17.

\*Please add the **suffixes** below according to the material/surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Stainless Steel	without	KH06L71X	POM / NBR

## KH 2-way BSPP ball valve steel

Female BSPP thread (ISO 1179-1) / Female BSPP thread (ISO 1179-1)



T1	DN	L1	L2	L3	L4	L5	L6	L7	L8	S1	S2	S3	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup> 71
G 1/8	4	69	36	12	10.0	25	55.0	76	-	19	7	20	220	<b>KH1/8X</b>	500
G 1/4	6	69	36	12	10.0	25	55.0	76	-	19	7	20	210	<b>KH1/4X</b>	500
G 3/8	10	73	45	14	14.5	35	68.0	100	-	24	8	30	430	<b>KH3/8X</b>	500
G 1/2	12	82	51	15	17.0	40	92.0	112	-	30	10	35	670	<b>KH1/2X</b>	500
G 5/8	16	88	50	18	20.0	45	105.0	166	-	36	11	45	973	<b>KH5/8X</b>	400
G 3/4	20	93	60	18	24.0	55	113.0	187	-	41	14	45	1280	<b>KH3/4X</b>	400
G 1	25	113	70	20	26.0	60	118.0	187	-	50	14	55	1982	<b>KH1X</b>	400
G 1 1/4	32	110	70	20	36.5	80	180.5	320	58.5	60	17	73	2620	<b>KH11/4X</b>	315
G 1 1/4	25	134	70	20	26.0	60	118.0	187	-	50	14	55	2066	<b>KH11/4DN25X</b>	400
G 1 1/2	40	114	75	22	42.5	90	190.5	320	57.0	70	17	85	3989	<b>KH11/2X</b>	315
G 1 1/2	25	139	70	22	26.0	60	118.0	187	-	55	14	55	2200	<b>KH11/2DN25X</b>	400

<sup>1)</sup> Pressure shown = item deliverable

$$\frac{\text{PN (bar)}}{10} = \text{PN (MPa)}$$

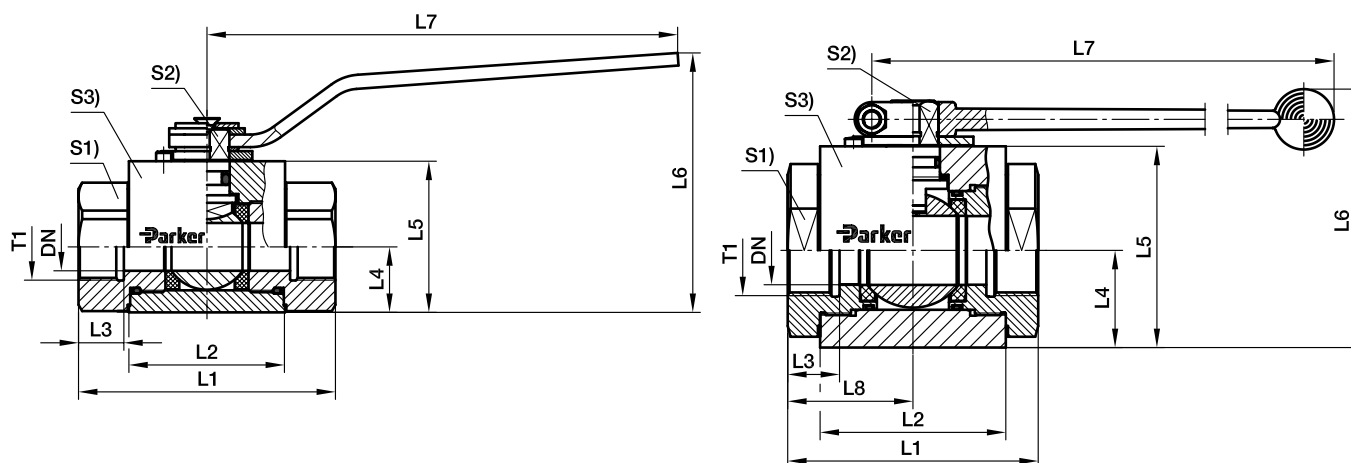
Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page 17.

\*Please add the **suffixes** below according to the material/surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, bronzed	DIN 50938-FE//A/T4	KH1/8X	POM / NBR

## KH 2-way BSPP ball valve stainless steel

Female BSPP thread (ISO 1179-1) / Female BSPP thread (ISO 1179-1)



T1	DN	L1	L2	L3	L4	L5	L6	L7	L8	S1	S2	S3	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup> 71
G 1/8	4	69	41	11	13.7	30.0	55	76	-	22	7	30	421	<b>KH1/871x</b>	500
G 1/4	6	75	41	14	13.7	30.0	55	76	-	22	7	30	422	<b>KH1/471x</b>	500
G 3/8	10	86	53	14	18.0	40.0	85	130	-	30	8	40	891	<b>KH3/871x</b>	500
G 1/2	12	92	55	16	21.0	45.0	90	130	-	32	10	45	1093	<b>KH1/271x</b>	500
G 3/4	20	102	62	18	26.0	60.0	103	187	-	46	14	50	1944	<b>KH3/471x</b>	315
G 1	25	112	67	20	28.0	65.0	108	187	-	50	14	55	2200	<b>KH171x</b>	315
G 1 1/4	32	116	86	24	45.0	93.2	174	320	58	70	19	100	5300	<b>KH11/471x</b>	420
G 1 1/2	40	120	92	26	52.2	104.5	185	320	60	80	19	110	7230	<b>KH11/271x</b>	420

<sup>1)</sup> Pressure shown = item deliverable

$$\frac{\text{PN (bar)}}{10} = \text{PN (MPa)}$$

Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page 17.

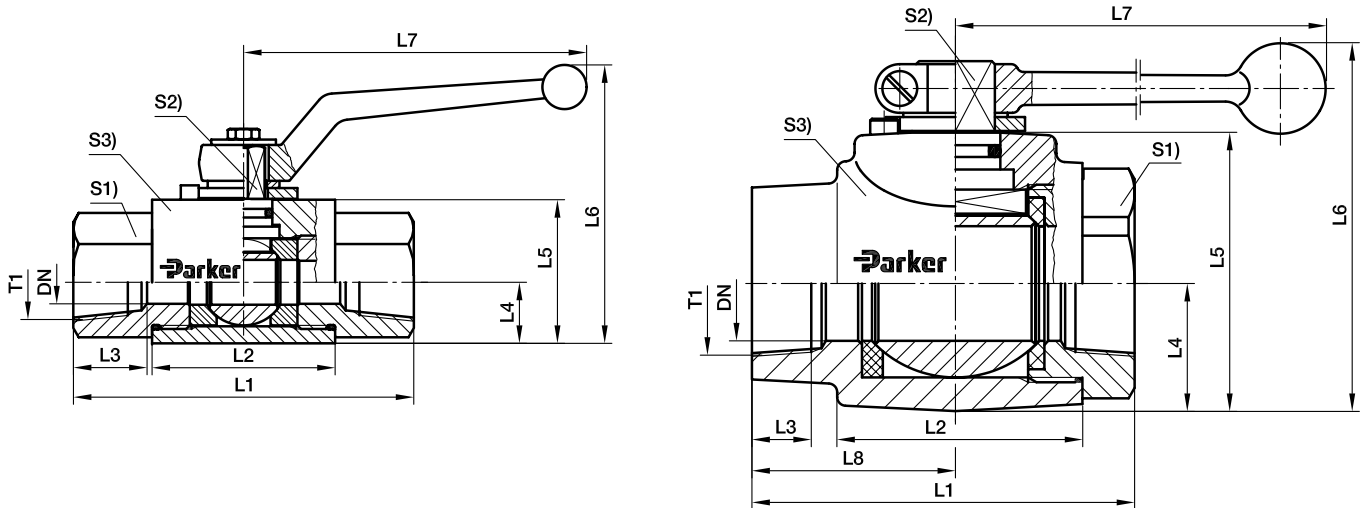
\*Please add the **suffixes** below according to the material/surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Stainless Steel	without	KH1/871X	POM / NBR



## KH 2-way NPT ball valve steel

Female NPT thread (SAE 476) / Female NPT thread (SAE 476)



T1	DN	L1	L2	L3	L4	L5	L6	L7	L8	S1	S2	S3	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup> bronzed
1/8-27 NPT	4	69	36	7.0	10.0	25	55.0	76		19	7	20	225	<b>KH1/8NPTX</b>	500
1/4-18 NPT	6	69	36	10.0	10.0	25	55.0	76		19	7	20	210	<b>KH1/4NPTX</b>	500
3/8-18 NPT	10	73	45	10.4	14.5	35	68.0	100		24	8	30	430	<b>KH3/8NPTX</b>	500
1/2-14 NPT	12	82	51	13.6	17.0	40	92.0	112		30	10	35	670	<b>KH1/2NPTX</b>	500
3/4-14 NPT	20	93	60	14.0	24.0	55	113.0	187		41	14	45	1280	<b>KH3/4NPTX</b>	400
1-11 1/2 NPT	25	113	70	16.8	26.0	60	118.0	187		50	14	55	1970	<b>KH1NPTX</b>	400
1 1/4-11 1/2 NPT	32	110	70	17.3	36.5	80	180.5	320	58.5	60	17	73	3074	<b>KH11/4NPTX</b>	315
1 1/2-11 1/2 NPT	40	114	75	17.3	42.5	90	190.5	320	57.0	70	17	85	3976	<b>KH11/2NPTX</b>	315

<sup>1)</sup> Pressure shown = item deliverable

$$\frac{\text{PN (bar)}}{10} = \text{PN (MPa)}$$

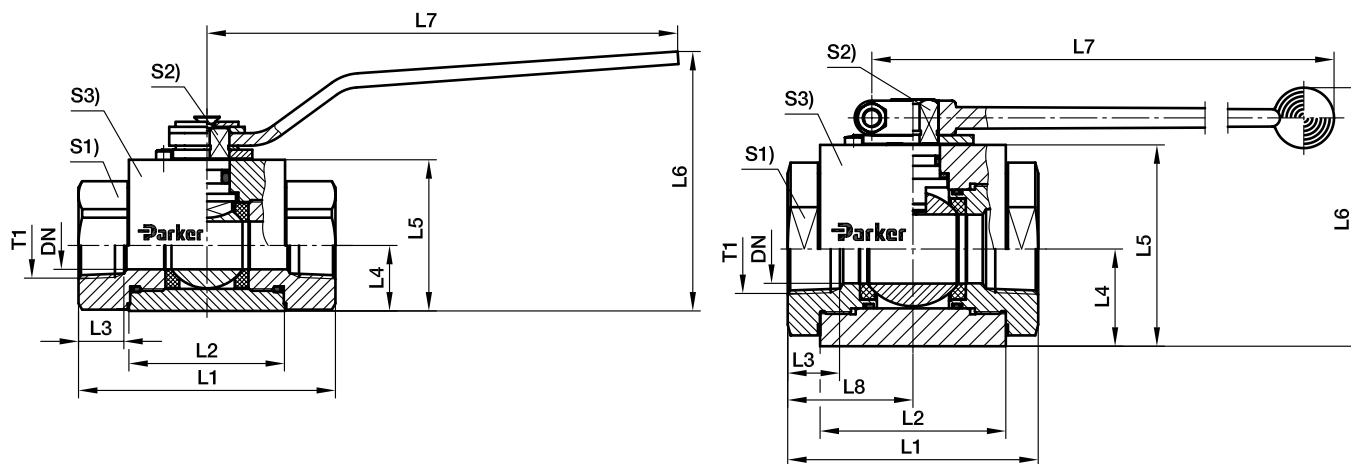
Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page 17.

\*Please add the **suffixes** below according to the material/surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, bronzed	DIN 50938-FE//A/T4	KH1/8NPTX	POM / NBR

## KH 2-way NPT ball valve stainless steel

Female NPT thread (SAE 476) / Female NPT thread (SAE 476)



T1	DN	L1	L2	L3	L4	L5	L6	L7	L8	S1	S2	S3	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup> bronzed
1/8-27 NPT	4	72	41	6.9	13.7	30.0	55	76		22	7	30	461	<b>KH1/8NPT71X</b>	500
1/4-18 NPT	6	82	41	10.0	13.7	30.0	55	76		22	7	30	441	<b>KH1/4NPT71X</b>	500
3/8-18 NPT	10	95	53	10.3	18.0	40.0	85	130		30	8	40	943	<b>KH3/8NPT71X</b>	500
1/2-14 NPT	12	108	55	13.6	21.0	45.0	90	130		32	10	45	1177	<b>KH1/2NPT71X</b>	500
3/4-14 NPT	20	112	62	14.1	26.0	60.0	103	187		46	14	50	2054	<b>KH3/4NPT71X</b>	315
1-11 1/2 NPT	25	126	67	16.8	28.0	65.0	108	187		50	14	55	2451	<b>KH1NPT71X</b>	315
1 1/4-11 1/2 NPT	32	116	86	17.3	45.0	93.2	174	320	58	70	18	100	5300	<b>KH1 1/4NPT71X</b>	420
1 1/2-11 1/2 NPT	40	120	92	17.3	52.2	104.4	185	320	60	80	19	110	7230	<b>KH1 1/2NPT71X</b>	420

<sup>1)</sup> Pressure shown = item deliverable

$$\frac{\text{PN (bar)}}{10} = \text{PN (MPa)}$$

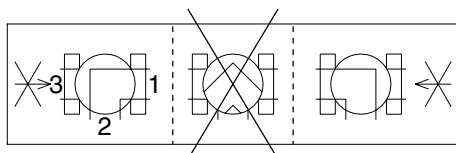
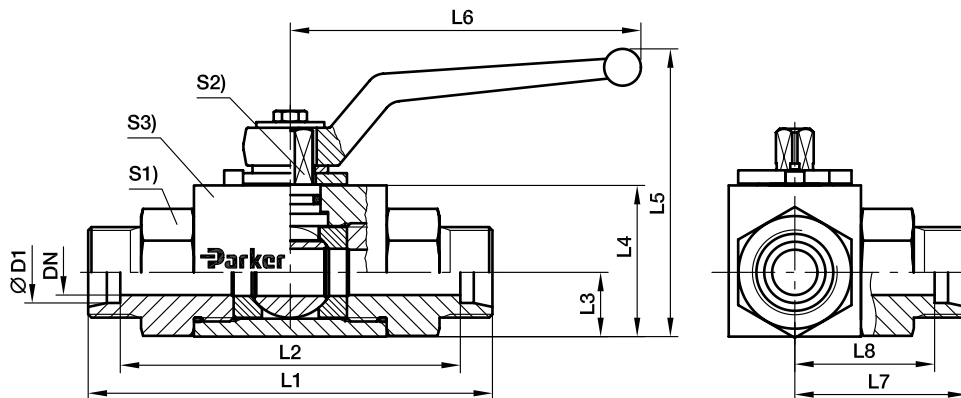
**Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page 17.**

\*Please add the **suffixes** below according to the material/surface required.

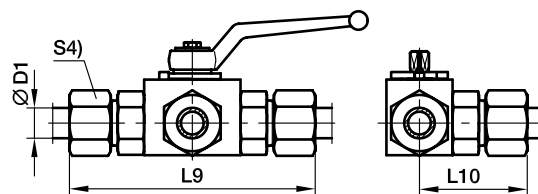
Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, bronzed	DIN 50938-FE//A/T4	KH1/8NPT71X	POM / NBR

## KH 3-way compact ball valve steel

EO 24° cone end / EO 24° cone end / EO 24° cone end



### L-Version



Series	D1	DN	L1	L2	L3	L4	L5	L6	L7	L8	L9	L10	S1	S2	S3	S4	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup> bronzed
L <sup>3)</sup>	06	4	67	53	15.0	30	59.5	76	33.5	26.5	82	41.0	19	7	30	14	317	<b>KH3/2-06LX</b>	500
	08	6	67	53	15.0	30	59.5	76	33.5	26.5	82	41.0	19	7	30	17	214	<b>KH3/2-08LX</b>	500
	10	8	75	61	14.5	35	67.5	100	37.5	30.5	90	45.0	24	8	40	19	445	<b>KH3/2-10LX</b>	500
	12	10	75	61	14.5	35	67.5	100	37.5	30.5	90	45.0	24	8	40	22	537	<b>KH3/2-12LX</b>	500
	15	12	83	69	22.0	45	96.5	112	41.5	34.5	99	49.5	30	10	45	27	678	<b>KH3/2-15LX</b>	500
	18	16	82	67	25.0	50	110.0	166	41	33.5	99	49.5	36	11	50	32	850	<b>KH3/2-18LX</b>	400
	22	20	99	84	29.0	60	126.0	187	49.5	42.0	116	58.0	41	14	55	36	1340	<b>KH3/2-22LX</b>	400
	28	25	108	93	31.0	65	131.0	187	54	46.5	126	63.0	50	14	65	41	2274	<b>KH3/2-28LX</b>	400
S <sup>4)</sup>	08	4	73	59	15.0	20	59.5	76	36.5	29.5	88	44.0	19	7	30	19	350	<b>KH3/2-08SX</b>	500
	10	6	73	58	15.0	30	59.5	76	36.5	29.0	90	45.0	19	7	30	22	300	<b>KH3/2-10SX</b>	500
	12	8	77	62	14.5	35	67.5	100	38.5	31.0	94	47.0	24	8	40	24	469	<b>KH3/2-12SX</b>	500
	14	10	81	65	14.5	35	67.5	100	40.5	32.5	100	50.0	24	8	40	27	500	<b>KH3/2-14SX</b>	500
	16	12	87	70	22.0	45	96.5	112	43.5	35.0	106	53.0	30	10	45	30	909	<b>KH3/2-16SX</b>	500
	20	16	90	69	25.0	50	110.0	166	45	34.5	112	56.0	36	11	50	36	949	<b>KH3/2-20SX</b>	400
	25	20	107	83	29.0	60	126.0	187	53.5	41.5	131	65.5	41	14	55	46	1714	<b>KH3/2-25SX</b>	400
	30	25	120	93	31.0	65	131.0	187	60	46.5	146	73.0	50	14	65	50	2462	<b>KH3/2-30SX</b>	400

<sup>1)</sup> Pressure shown = item deliverable

<sup>3)</sup> L = light series; <sup>4)</sup> S = heavy series

$$\frac{\text{PN (bar)}}{10} = \text{PN (MPa)}$$

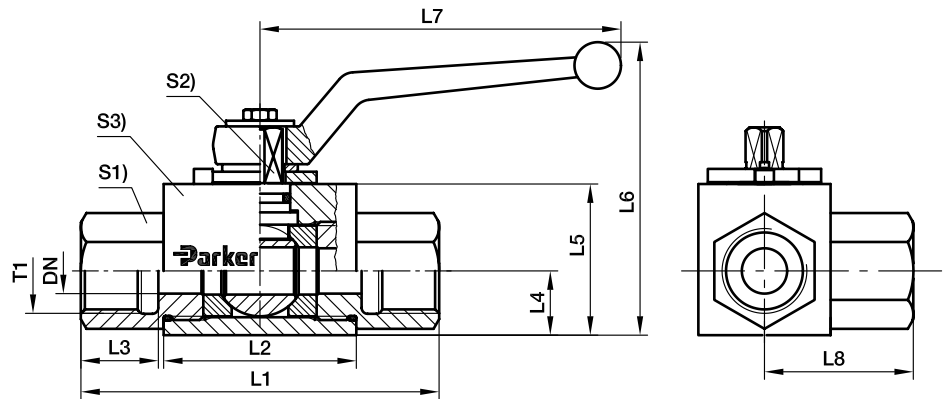
Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page I7.

\*Please add the **suffixes** below according to the material/surface required.

Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, bronzed	DIN 50938-FE//A/T4	KH3/2-06LX	POM / NBR

### KH 3-way compact BSPP ball valve steel

Female BSPP thread (ISO 1179-1) / Female BSPP thread (ISO 1179-1) / Female BSPP thread (ISO 1179-1)

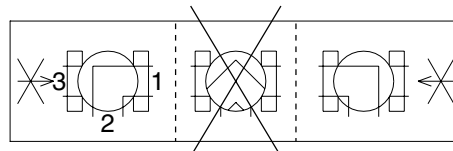


T1	DN	L1	L2	L3	L4	L5	L6	L7	L8	S1	S2	S3	Weight g/1 piece	Order code*	PN (bar) <sup>1)</sup> bronzed
G 1/8	4	69	36	12	15.0	30	55	76	34.5	19	7	30	270	<b>KH3/2-1/8X</b>	500
G 1/4	6	69	36	12	15.0	30	55	76	34.5	19	7	30	342	<b>KH3/2-1/4X</b>	500
G 3/8	10	73	45	14	14.5	35	68	100	36.5	24	8	40	563	<b>KH3/2-3/8X</b>	500
G 1/2	12	82	51	15	22.0	45	92	112	41.0	30	10	45	932	<b>KH3/2-1/2X</b>	500
G 3/4	20	93	60	18	29.0	60	113	187	48.0	41	14	55	1724	<b>KH3/2-3/4X</b>	400
G 1	25	118	70	20	31.0	65	118	187	56.5	50	14	65	2643	<b>KH3/2-1X</b>	400

<sup>1)</sup> Pressure shown = item deliverable

$$\frac{PN \text{ (bar)}}{10} = PN \text{ (MPa)}$$

Delivery without nut and ring. Information on ordering complete fittings or alternative sealing materials see page 17.



L-Version

\*Please add the **suffixes** below according to the material/surface required.

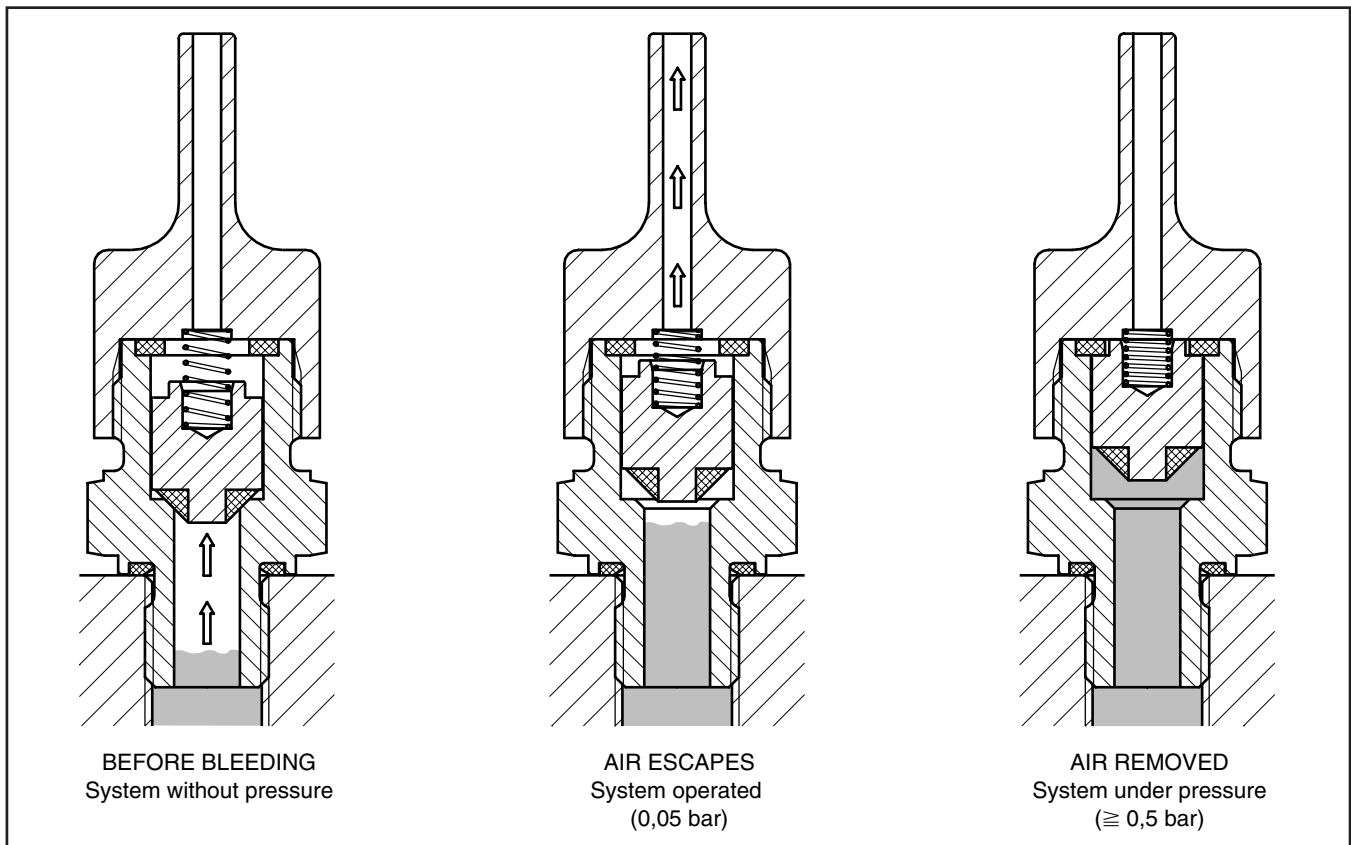
Order code suffixes			
Material	Suffix surface and material	Example	Standard sealing material (no additional suffix needed)
Steel, bronzed	DIN 50938-FE//A/T4	KH3/2-1/8X	POM / NBR

## ELA air-bleed valves

Hydraulic systems can effectively be bled with ELA air-bleed valves.

Easily installed – maintenance-free – almost unlimited service life – simple – safe – reliable – efficient. The system can be operated immediately. No control irregularities due to air contamination of the pressure medium. Cost saving, as non-productive de-aeration time is saved.

Air bleed between: – opening pressure 0.05 bar  
– closing pressure  $\geq 0.5$  bar



The principle of the air-bleed valve is based on the difference in behaviour of gases and liquids under pressure because of their dependence on viscosity. A piston, housed in the bore of the body with defined clearance, effects the opening and closing of the valve on start-up or shut-down of the system. On setting the system in operation, the accumulated air escapes until the liquid column of the pressure medium reaches the piston. The pressure of the liquid lifts the piston against the upper, high pressure seal, securely closing the air-vent (slight oil discharge may occur). When pressure is released the spring releases the piston reopening the air-vent, whereupon the procedure may be repeated. The special piston design prevents any intake of air in case of partial vacuum.

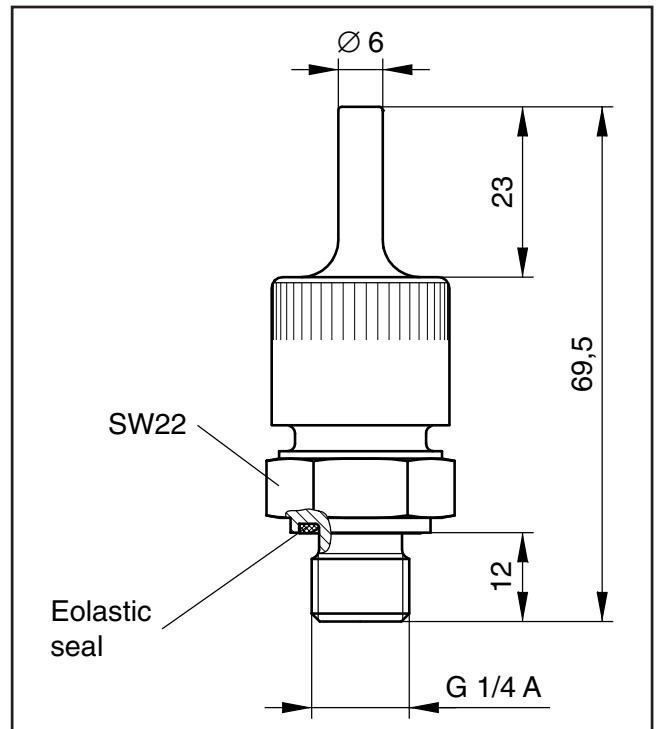
The air bleed valve should be connected vertical, at the highest point of the hydraulic system or in places where air accumulation may occur.

ELA air-bleed valves are available only for mineral oil based fluids, and within the temperature limits of  $-20^{\circ}\text{C}$  to  $+90^{\circ}\text{C}$ .

## ELA Air-bleed valves

Male BSPP thread with Eolastic seal

PN (bar)	Dry Technology Steel	Weight g/1 piece
400	<b>ELA1/4EDA3C</b>	109



## EO Swivel

PN (bar)	Dry Technology Steel	Weight g/1 piece
315	<b>ELAE10LA3C</b>	125

