

PTFE-expansion joints, 2 convolutes (PN 10)

Our expansion joints are highly flexible and provide for the compensation of vibrations and heat-induced expansion in your production line. The possible absorption of movement is increased by the number of convolutes. Expansion joints with 2 convolutes allow the highest working pressures.



PTFE-expansion joints, 2 convolutes (PN 10)

Lining-materials:

- PTFE (virgin or conductive)

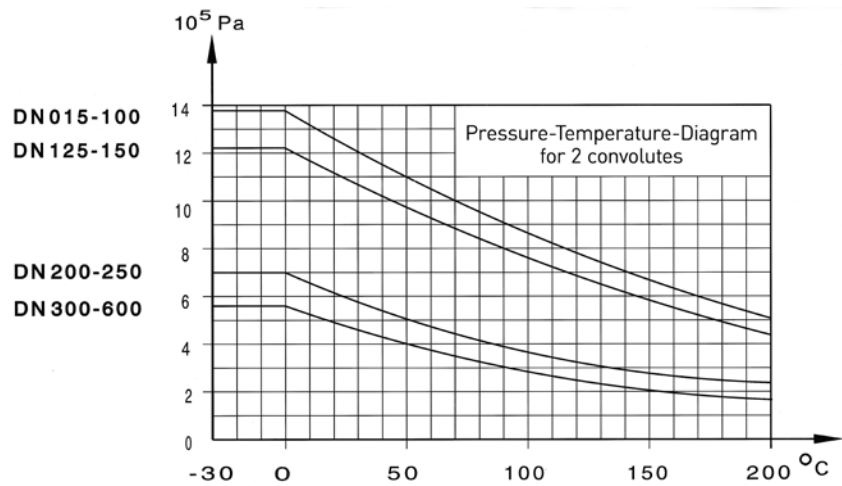
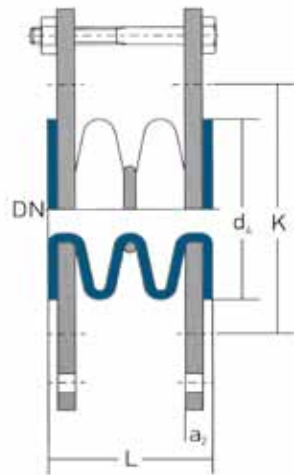
Different lining thicknesses and flange connections upon request.

Flange design:

- loose-loose

Material: carbon steel and stainless steel

Special features: earthing studs, final painting.



DN	L (mm)	Extension compression ± (mm)	Mis- align- ment max. (mm)	Angular deflec- tion max. °	Vaccum resistance at				d ₄ (mm)	K (mm)	a ₂ (mm)	Screws	Weight (ca. kg/ pc.)
					10 ⁴ Pa	max. °C	10 ⁴ Pa	max. °C					
15	35	4	2	7	0,1	200			45	65	11,00	4 x M 12	1,6
20	35	4	2	7	0,1	200			58	75	11,00	4 x M 12	1,6
25	35	6	3	7	0,1	200			68	85	11,00	4 x M 12	1,6
32	35	6	3	7	0,1	200			78	100	13,00	4 x M 16	2,0
40	35	6	3	7	0,1	200			88	110	13,00	4 x M 16	2,5
50	40	6	3	7	0,1	200			102	125	15,00	4 x M 16	3,6
65	57	9	5	7	0,1	200			122	145	15,00	4 x M 16	4,4
80	57	9	5	7	0,1	200			138	160	15,50	8 x M 16	5,2
100	67	13	6	7	0,1	200			158	180	19,00	8 x M 16	6,9
125	83	13	6	7	0,1	150			188	210	19,25	8 x M 16	11,2
150	75	13	6	7	0,1	150			212	240	23,00	8 x M 20	12,3
200	102	13	6	7	0,1	50	2,0	150	268	295	25,00	8 x M 20	20,0
250	140	15	6	7	0,7	45	3,4	100	320	350	28,00	12 x M 20	26,0
300	150	20	10	7	1,5	45	6,7	100	378	400	31,00	12 x M 20	33,0
350	160	20	10	7	1,5	45	6,7	100	438	460	32,00	16 x M 20	57,0
400	178	25	10	7	1,5	45	6,7	100	490	515	34,50	16 x M 24	72,0
450	185	25	10	7	3,4	45	7,0	100	540	565	38,50	20 x M 24	79,0
500	230	25	10	7	8,0	45	8,7	100	610	620	40,50	20 x M 24	83,0

L = Total length

d₄ = Flaring diameter

K = Bolt circle

a₂ = Length with loose flange
(standard lining)

PTFE-expansion joints, 2 convolutes - New design (PN 10)

Types:

- choose type of flanges (2 or 3 ears)
- up to diameter nominal DN65: with threaded holes
- up to diameter nominal DN80: with through holes

Flange design:

- loose-loose

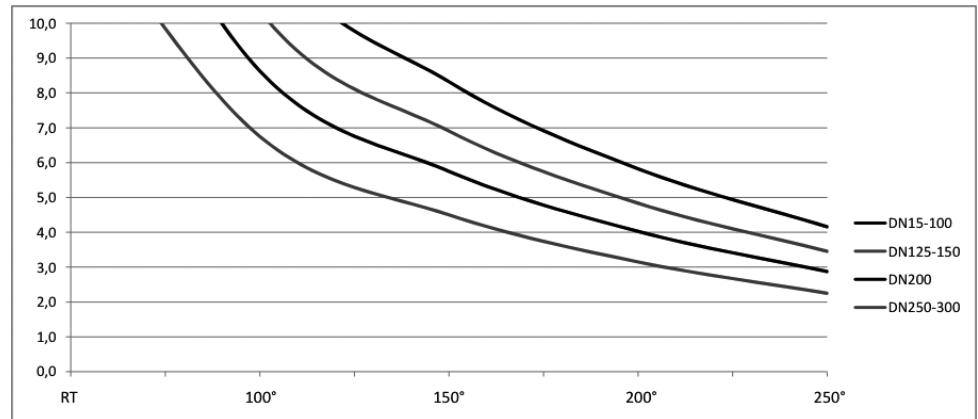
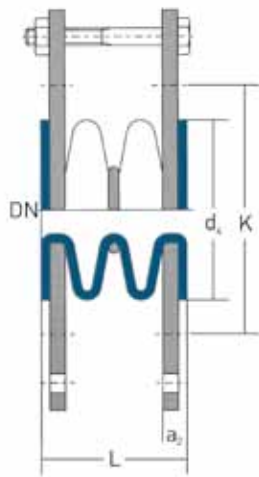
Material: carbon steel and stainless steel

Special features: earthing studs, final painting.

Lining material:

- PTFE (virgin or conductive)

Different lining thicknesses and pressure rates on request.



DN	L (mm)	Extension compression ± (mm)	Misa- lignment max. (mm)	Angular- deflec- tion max. °	d _f (mm)	K (mm)	a ₂ (mm)	Effectiv bellwo- cross section (cm ²)	Axial spring rate 20 °C N/mm	Screws	Weight (ev. kg/ pièce.)
15	54	6	3	7	45	65	11	24	27	4 x M 12	1,7
20	54	6	3	7	58	75	11	24	27	4 x M 12	1,7
25	54	6	3	7	68	85	11	24	27	4 x M 12	1,7
32	56	6	3	7	78	100	13	33	57	4 x M 16	2,1
40	56	6	3	7	88	110	13	40	66	4 x M 16	2,6
50	68	10	3	7	102	125	15	55	86	4 x M 16	3,8
65	78	12	5	7	122	145	15	85	122	4 x M 16	4,6
80	88	15	5	7	138	160	15,5	113	147	8 x M 16	5,2
100	88	15	6	7	158	180	19	158	161	8 x M 16	6,9
125	95	15	6	7	188	210	19,25	222	177	8 x M 16	11,3
150	105	15	6	7	212	240	23	299	168	8 x M 20	12,6
200	110	15	6	7	268	295	25	483	185	8 x M 20	20,8
250	128	20	6	7	320	350	28	731	174	12 x M 20	26,7
300	140	20	10	7	378	400	31	973	161	12 x M 20	34,7

L = Total length

d_f = Flaring diameter

K = Bolt circle

a₂ = Length with loose flange
(standard lining)

PTFE-expansion joints, 2 convolutes - New design (PN 10)

DN	Over pressure resistance 10 ⁵ Pa at				Vaccum resistance 10 ⁵ Pa at			
	20°C	100°C	150°C	200 °C	20°C	100°C	150°C	200 °C
15	10	10	8,3	5,8	-1	-1	-1	-1
20	10	10	8,3	5,8	-1	-1	-1	-1
25	10	10	8,3	5,8	-1	-1	-1	-1
32	10	10	8,3	5,8	-1	-1	-1	-1
40	10	10	8,3	5,8	-1	-1	-1	-1
50	10	10	8,3	5,8	-1	-1	-1	-1
65	10	10	8,3	5,8	-1	-1	-1	-1
80	10	10	8,3	5,8	-1	-1	-1	-1
100	10	10	8,3	5,8	-1	-1	-1	-1
125	10	9,2	6,9	4,8	-1	-1	-1	-0,80
150	10	9,2	6,9	4,8	-1	-1	-1	-0,80
200	10	7,7	5,8	4	-1	-1	-1	-0,70
250	10	6	4,5	3,2	-1	-1	-0,80	-0,55
300	10	6	4,5	3,2	-1	-1	-0,65	-0,45

PTFE-expansion joints, 3 convolutes (PN 10)

Our expansion joints are highly flexible and provide for the compensation of vibrations and heat-induced expansion in your production line. The possible absorption of movement is increased by the number of convolutes. Expansion joints with 3 convolutes are the standard solution for most of the applications.



PTFE-expansion joints, 3 convolutes (PN 10)

Lining-materials:

- PTFE (virgin or conductive)

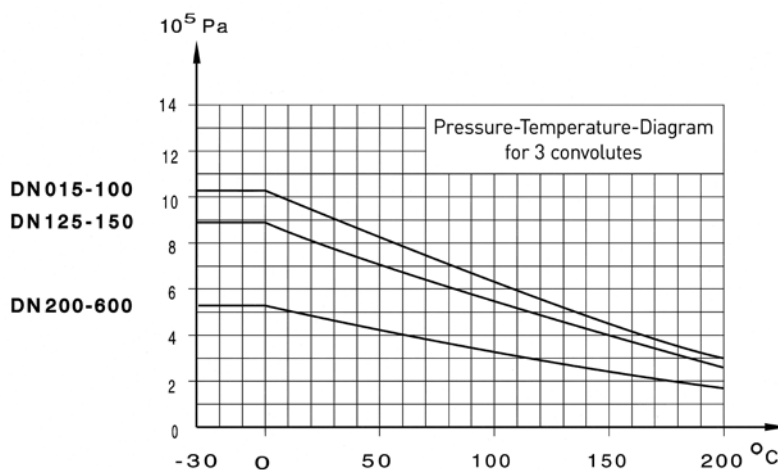
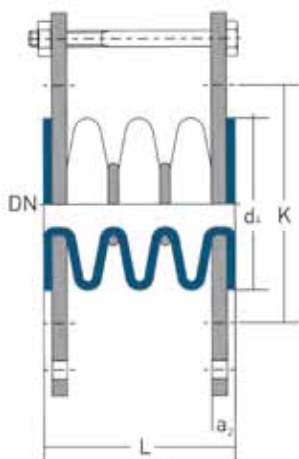
Different lining thicknesses and pressure rates on request.

Flange design:

- loose-loose

Material: carbon steel and stainless steel

Special features: earthing studs, final painting.



DN	L (mm)	Extension compression ± (mm)	Misa- lignment max. (mm)	Angular deflec- tion max. °	Vaccum resistance at				d ₄ (mm)	K (mm)	a ₂ (mm)	Screws	Weight (ca. kg/ St.)
					10 ⁴ Pa	max. °C	10 ⁴ Pa	max. °C					
15	46	6	4	14	-1	200			45	65	11,00	4 x M 12	1,7
20	46	6	4	14	-1	200			58	75	11,00	4 x M 12	1,7
25	46	13	6	14	-1	200			68	85	11,00	4 x M 12	1,7
32	46	13	6	14	-1	200			78	100	13,00	4 x M 16	2,1
40	46	13	6	14	-1	200			88	110	13,00	4 x M 16	2,6
50	56	15	9	14	-1	200			102	125	15,00	4 x M 16	3,8
65	77	19	9	14	-1	200			122	145	15,00	4 x M 16	4,6
80	77	25	13	14	-1	200			138	160	15,50	8 x M 16	5,3
100	91	25	13	14	-1	200			158	180	19,00	8 x M 16	7,0
125	111	25	14	14	-1	150			188	210	19,25	8 x M 16	11,4
150	101	28	14	14	-1	150			212	240	23,00	8 x M 20	12,7
200	137	28	14	14	-1	50	-0,8	150	268	295	25,00	8 x M 20	21,0
250	200	30	14	14	-0,93	45	-0,66	100	320	350	28,00	12 x M 20	27,0
300	196	30	15	14	-0,85	45	-0,33	100	378	400	31,00	12 x M 20	35,0
350	215	32	18	14	-0,85	45	-0,33	100	438	460	32,00	16 x M 20	60,0
400	233	35	20	14	-0,85	45	-0,33	100	490	515	34,50	16 x M 24	75,0
450	280	30	20	14	-0,66	45	-0,3	100	540	565	38,50	20 x M 24	91,0
500	327	30	25	14	---	---	-0,13	100	610	620	40,50	20 x M 24	110,0

L = Total length

d₄ = Flaring diameter

K = Bolt circle

a₂ = Length with loose flange
(standard lining)

PTFE-expansion joints, 3 convolutes - New design (PN 10)

Execution:

- choose type of flanges (2 or 3 ears)
- up to diameter nominal DN65: with threaded holes
- up to diameter nominal DN80: with through holes

Flange design:

- loose-loose

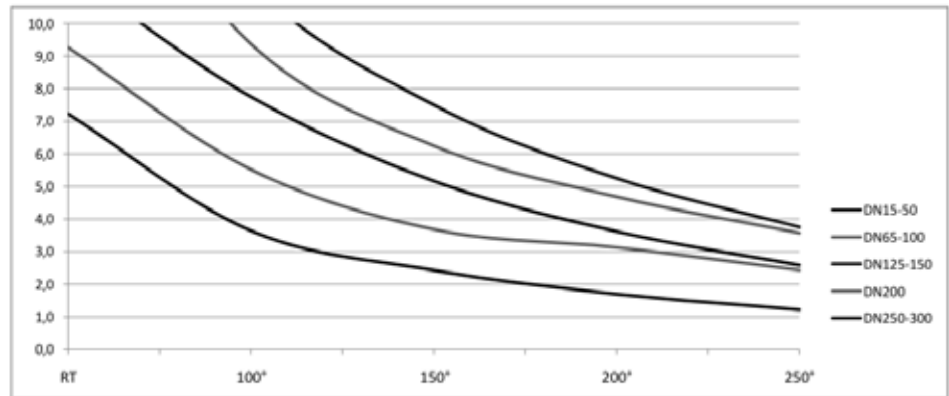
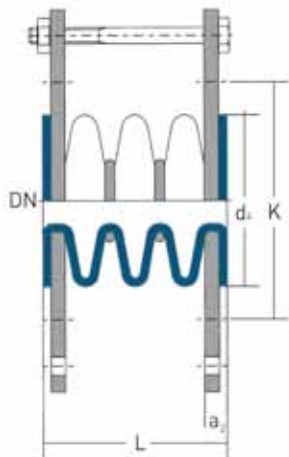
Material: carbon steel and stainless steel

Special features: earthing studs, final painting.

Lining material:

- PTFE (virgin or conductive)

Different lining thicknesses and pressure rates on request.



DN	L (mm)	Extension compression ± (mm)	Misa- lignment max. (mm)	Angular- deflec- tion max. °	d ₄ (mm)	K (mm)	a ₂ (mm)	Effectiv bellow- cross section (cm ²)	Axial spring rate 20 °C N/mm	Screws	Weight (ca. kg/ St.)
15	70	10	6	14	45	65	11	24	18	4 x M 12	1,9
20	70	10	6	14	58	75	11	24	18	4 x M 12	1,9
25	70	10	6	14	68	85	11	24	18	4 x M 12	1,9
32	75	10	6	14	78	100	13	33	38	4 x M 16	2,3
40	80	15	6	14	88	110	13	40	44	4 x M 16	2,9
50	85	15	9	14	102	125	15	55	57	4 x M 16	4,2
65	100	20	9	14	122	145	15	85	81	4 x M 16	5,1
80	110	20	13	14	138	160	15,5	113	98	8 x M 16	5,8
100	110	25	13	14	158	180	19	158	107	8 x M 16	7,7
125	120	25	14	14	188	210	19,25	222	118	8 x M 16	12,5
150	130	25	14	14	212	240	23	299	112	8 x M 20	14,0
200	140	30	14	14	268	295	25	483	123	8 x M 20	23,1
250	165	30	14	14	320	350	28	731	116	12 x M 20	29,7
300	175	30	15	14	378	400	31	973	107	12 x M 20	38,5

continued

L = Total length
d₄ = Flaring diameter
K = Bolt circle
a₂ = Length with loose flange
(standard lining)

PTFE-expansion joints, 3 convolutes - New design (PN 10)

DN	Over pressure resistance 10 ⁵ Pa at				Vaccum resistance 10 ⁵ Pa at			
	20°C	100°C	150°C	200 °C	20°C	100°C	150°C	200 °C
15	10	10	7,5	5,3	-1	-1	-1	-1
20	10	10	7,5	5,3	-1	-1	-1	-1
25	10	10	7,5	5,3	-1	-1	-1	-1
32	10	10	7,5	5,3	-1	-1	-1	-1
40	10	10	7,5	5,3	-1	-1	-1	-1
50	10	10	7,5	5,3	-1	-1	-1	-1
65	10	8,3	6,3	4,7	-1	-1	-1	-1
80	10	8,3	6,3	4,7	-1	-1	-1	-1
100	10	8,3	6,3	4,7	-1	-1	-1	-1
125	10	6,9	5,2	3,6	-1	-1	-1	-0,80
150	10	6,9	5,2	3,6	-1	-1	-1	-0,80
200	9,3	4,9	3,7	3,1	-1	-1	-0,80	-0,55
250	7,2	3,2	2,4	1,7	-1	-1	-0,70	-0,45
300	7,2	3,2	2,4	1,7	-1	-1	-0,50	-0,35

PTFE-expansion joints, 5 convolutes (PN 10)

Our expansion joints are highly flexible and provide for the compensation of vibrations and heat-induced expansion in your production line. Expansion joints with 5 convolutes allow the maximum absorption of movement.



PTFE-expansion joints, 5 convolutes (PN 10)

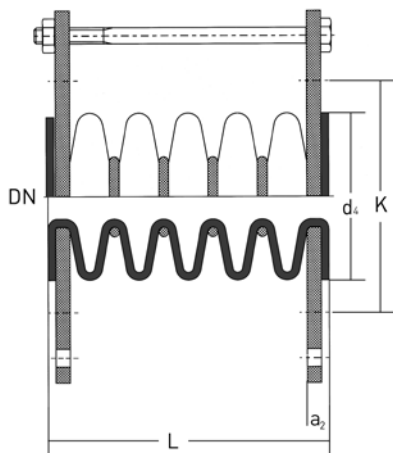
- Lining-Materials:
- PTFE (virgin or conductive)

Different lining thicknesses and flange connections upon request.

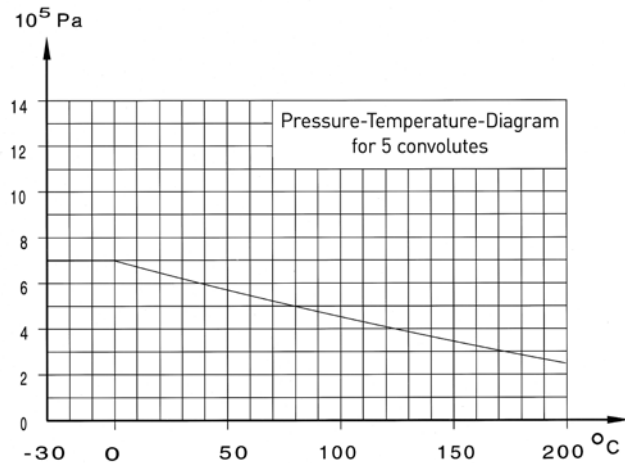
- Flange design:
- loose-loose

Material: carbon steel and stainless steel

Special features: earthing studs, final painting.



DN 015-500



DN	L (mm)	Hub ± (mm)	Mis- align- ment max. (mm)	Angular deflec- tion max. °	Vaccum resistance bei				d ₄ (mm)	K (mm)	a ₂ (mm)	Screws	Weight (ca. kg/ pc.)
					10 ⁴ Pa	max. °C	10 ⁴ Pa	max. °C					
15	68	8	5	20	confer with us				45	65	11,00	4 x M 12	1,9
20	68	8	5	20					58	75	11,00	4 x M 12	1,9
25	68	8	12	20					68	85	11,00	4 x M 12	1,9
32	68	8	12	20					78	100	13,00	4 x M 16	2,2
40	80	13	12	20					88	110	13,00	4 x M 16	2,7
50	88	19	12	20					102	125	15,00	4 x M 16	4,3
65	113	25	13	20					122	145	15,00	4 x M 16	5,0
80	113	25	16	20					138	160	15,50	8 x M 16	5,4
100	139	25	16	20					158	180	19,00	8 x M 16	7,1
125	167	32	16	20					188	210	19,25	8 x M 16	12,0
150	153	32	16	20					212	240	23,00	8 x M 20	14,2
200	207	32	16	20					268	295	25,00	8 x M 20	22,0
250	300	32	16	20					320	350	28,00	12 x M 20	29,0
300	288	35	16	20					378	400	31,00	12 x M 20	40,0
350	325	35	18	20					438	460	32,00	16 x M 20	65,0
400	343	40	25	20					490	515	34,50	16 x M 24	81,0
450	470	40	25	20					540	565	38,50	20 x M 24	97,0
500	520	40	25	20					610	620	40,50	20 x M 24	110,0

- L = Total length
- d₄ = Flaring diameter
- K = Bolt circle
- a₂ = Length with loose flange
(standard lining)