

Series 30M Molded Sphere Expansion Joint



Construction

Long radius spherical molded bellow with high tensile nylon cord and hard wire-reinforced rubber sealing bead.

1. Various elastomers
2. Nylon tire cord
3. Hard steel wire
4. Steel flange
5. Steel ring

Features

- Higher pressure resistance
- Burst Pressure : -60bars for DN25-DN 150
-40bars for DN200-DN300
- Excellent absorption of vibration
- Reduces noise and sound transfer
- Small spacer required
- No electrolysis
- Easy installation-Less cost

Application

- HVAC system
- Compressor lines
- Paper stock lines
- Pump suction and discharge
- Refrigerating lines
- Circulating water lines

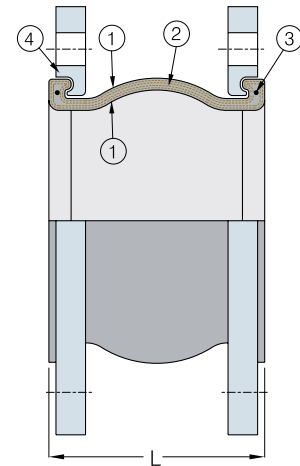
Control Unit Recommendation

Whenever either or both sides of the sphere expansion joint has no firm anchor, Control Units must be installed if surge pressure, pump start-up pressure, test pressure and operating pressure exceed the following figures:

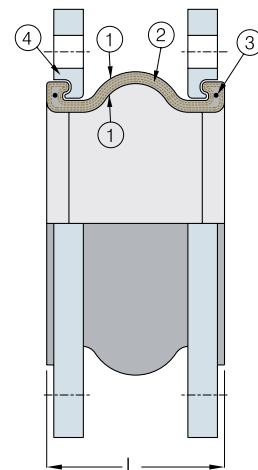
DN	25-100	125-250	300
Pressure(bar)	10	9	6

Hand -Built Version

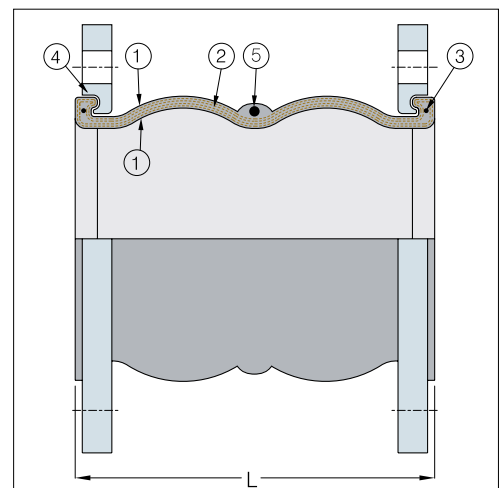
For design variations including non-standard face to face length, multiple arch configuration and also for the sizes larger than DN300, we provide Type 21FL or 31FF/32FF which are hand made version of Series 30M.



31M-A



31M-B



32M-A

Type 31M-A Single Sphere

Nominal Size		Neutral Length - L		Movement Capability				Max. Pressure (bar)	Vacuum Rating (mmHg)	Approx. Weight (kgs)
				Comp. (mm)	Ext. (mm)	Lat. (mm)	Ang. (deg.)			
DN	inch	mm	inch							
32	1.25	150	6	12	10	12	15	16	660	2.3
40	1.5	150	6	12	10	12	15	16	660	2.7
50	2	150	6	16	12	12	15	16	660	4.0
65	2.5	150	6	16	12	12	15	16	660	5.6
80	3	150	6	16	12	12	15	16	660	6.4
100	4	150	6	16	12	12	15	16	660	8.3
125	5	150	6	16	12	12	15	16	660	10.3
150	6	150	6	16	12	12	15	16	660	12.1
200	8	150	6	16	12	12	15	16	600	18.4
250	10	200	8	18	14	14	15	16	600	25.7
300	12	200	8	18	14	14	15	16	600	37.6

Type 31M-B Single Sphere

Nominal Size		Neutral Length - L		Movement Capability				Max. Pressure (bar)	Vacuum Rating (mmHg)	Approx. Weight (kgs)
				Comp. (mm)	Ext. (mm)	Lat. (mm)	Ang. (deg.)			
DN	inch	mm	inch							
32	1.25	130	5	12	10	12	15	16	660	2.3
40	1.5	130	5	12	10	12	15	16	660	2.3
50	2	130	5	14	12	12	15	16	660	3.2
65	2.5	130	5	14	12	12	15	16	660	4.8
80	3	130	5	14	12	12	15	16	660	6.0
100	4	130	5	14	12	12	15	16	660	7.5
125	5	130	5	14	12	12	15	16	660	9.2
150	6	130	5	14	12	12	15	16	660	10.3
200	8	130	5	14	12	12	15	16	600	16.1
250	10	130	5	14	12	12	15	16	600	22.3
300	12	130	5	14	12	12	15	16	600	33.3

Type 32M-A Double Sphere

Nominal Size		Neutral Length - L		Movement Capability				Max. Pressure (bar)	Vacuum Rating (mmHg)	Approx. Weight (kgs)
				Comp. (mm)	Ext. (mm)	Lat. (mm)	Ang. (deg.)			
DN	inch	mm	inch							
32	1.25	175	7	25	16	19	30	16	500	2.5
40	1.5	175	7	25	16	19	30	16	500	3.1
50	2	175	7	25	16	19	30	16	500	4.1
65	2.5	175	7	25	16	19	30	16	500	6.0
80	3	175	7	25	16	19	30	16	500	6.5
100	4	225	9	32	19	25	30	16	450	9.2
125	5	225	9	32	19	25	30	16	450	11.1
150	6	225	9	32	19	25	30	16	450	13.4
200	8	325	13	38	25	32	30	16	450	19.9
250	10	325	13	38	25	32	30	16	450	29.1
300	12	325	13	38	25	32	30	16	450	43.1