

FW-FLEX Two-mound spherical Rubber Flexible Joint

FW-FLEX

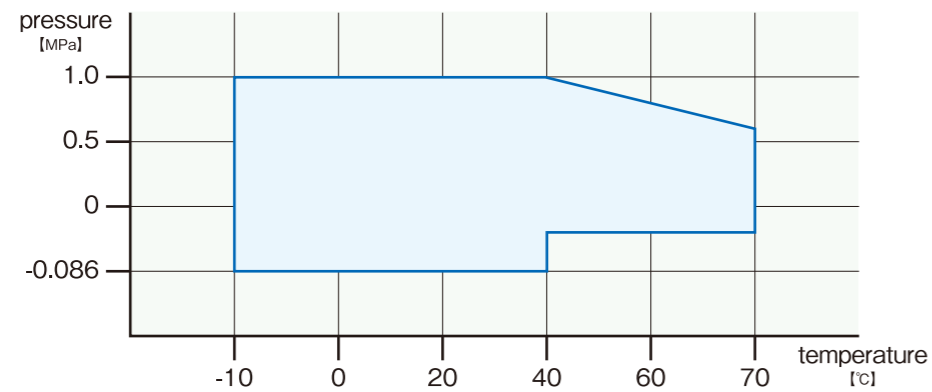
Absorption of elasticity and deflection of pipes

Excellent anti-vibration effect and pressure-resistant properties

Two-mound spherical type



Pressure / Temperature



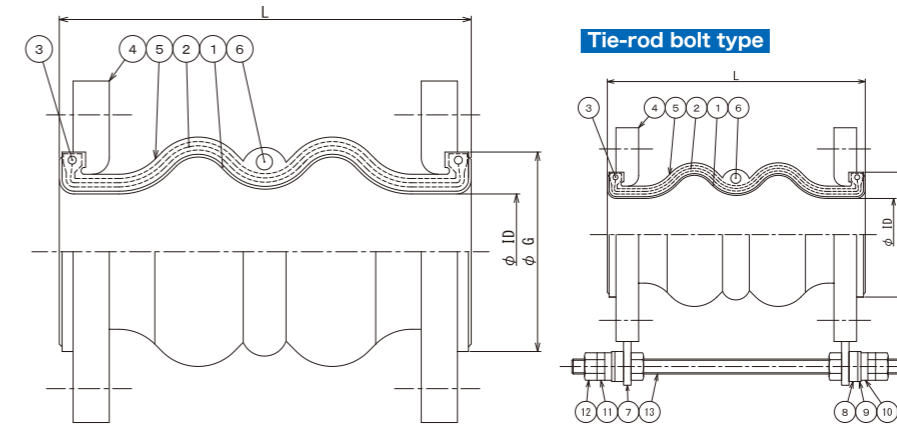
- Please make sure that the highest operating pressure and the highest operating temperature are within the operating range before use.
- Max. operating pressure : 1.0MPa (Based on the graph of operating range above)
- Max. operating temperature : 70°C (Based on the graph of operating range above)
- Please contact us if gas is flowing through the pipe because the highest operating pressure becomes different.

- (1) This product cannot be used for a hot water pipe. (Please use D-FLEX.)
- (2) This product cannot be used for the water of swimming pools. (Please use D-FLEX for pipes of circulation pumps that are used for water in swimming pools.)
- (3) This product cannot be used in areas with repeated and frequent pressure changes, such as the delivery side of pressurizing or pressure boosting water pumps.
- (4) This product cannot be used with fluids or areas of installation that might lower the elasticity of rubber. Please contact us because use of this product in such conditions needs to be examined.

Handling instructions

- This product generates reactive force due to the load of the inner pressure. Thus, fixing points or supports are required for installed pipes. (Please see p. 26-28.)
- Please see p. 26-28 for other cautions.

Structure



No.	Name	Material
1	Inner rubber	Synthetic rubber
2	Reinforcing cord	Synthetic fiber
3	Reinforcing ring	SWRH
4	Flange	SS400, SUS304 etc.
5	Outer rubber	Synthetic rubber
6	Reinforcing ring	SWRH
7	Tie-rod holder	SUS304 etc.
8	Buffer	Urethane etc.
9	Washer	SS400, SUS304 etc.
10	Spherical seat	SS400, SUS304 etc.
11	Spherical nut	SS400, SUS304 etc.
12	Nut	SS400, SUS304 etc.
13	Tie-rod bolt	SS400, SUS304 etc.

Please see "Rubber selection guide" in p.25 for selecting the material of inner rubber.

- The standard product uses the JIS10K flange. Flanges with other specification, such as JIS5K, JIS20K, tap water, JPI, ANSI can also be used.
- Besides the standard products SS400 and SUS304, acceptable materials of the flange include SUS316, SUS316L, S25C, and PVC.
- Unichrome plating, hot-dip galvanized materials (Zn plating), and painted materials are acceptable for the SS400 flange.
- Please see "Handling precautions" for PVC flanges. (Please see p. 26-28.)
- Products with tie rod bolts can be produced. (Tie rod bolts for FW-FLEX come with spherical washers, spherical nuts, and shock-absorbing materials as standard attachments.)

Size

NB	φID [mm]	φG [mm]	L [mm]	Tolerance of displacement				Dimensional tolerance for installation			
				expansion [mm]	contraction [mm]	eccentricity [mm]	angular rotation	expansion [mm]	contraction [mm]	eccentricity [mm]	angular rotation
25A	25	58.5	150	10	20	20	20°	3	6	8	10
32A	32	76	175	10	20	20	20°	3	6	8	10
40A	40	76	175	10	20	20	20°	3	6	8	10
50A	50	86	175	10	20	20	20°	3	6	8	10
65A	65	106	175	10	20	20	20°	3	6	8	10
80A	80	120	175	10	20	20	20°	3	6	8	10
100A	100	150	225	15	30	20	20°	3	6	8	10
125A	125	180	225	15	30	20	20°	3	6	8	10
150A	150	212	225	15	30	20	20°	3	6	8	10
200A	200	262	325	15	40	25	20°	3	6	8	10
250A	250	324	325	15	40	25	20°	3	6	10	10
300A	300	372	325	15	40	25	20°	3	6	10	10
350A	350	415	345	15	40	25	20°	3	6	10	10

- Please make sure that deflections remain within permissible range during operation.
- Please note that the permissible deflection includes the size tolerance of installation. (Permissible deflection = tolerance of installation + Operating deflection)
- The deflections in the chart indicate independent deflections. Corrections are required when there are multiple deflections. Please see p. 26 for the method of correcting deflections.
- The φG values in the chart indicate the standard sizes when a JIS10K flange is used.