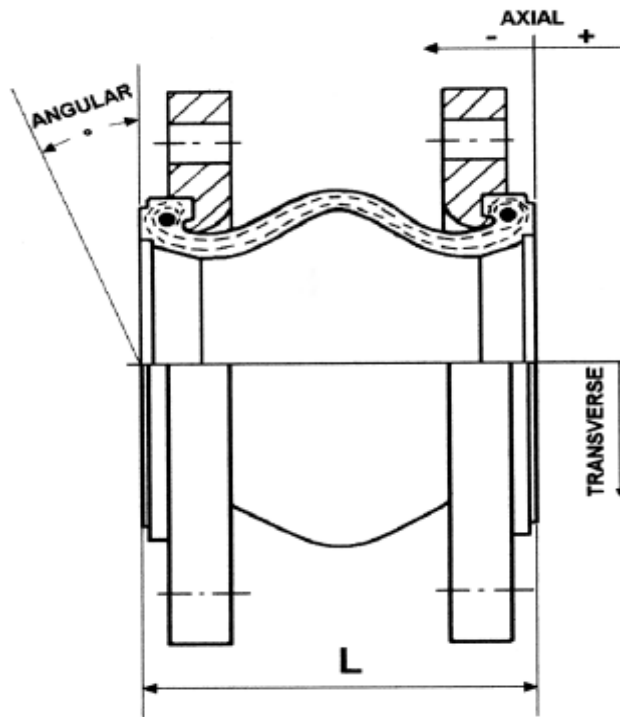


# RUBBER EXPANSION JOINTS

## SINGLE SPHERE

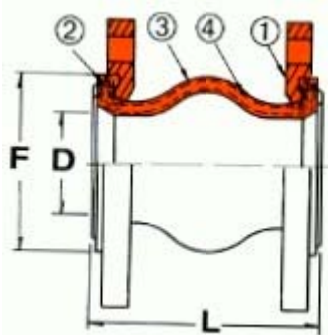


The shape of the bellows gives the expansion joint a higher flexibility and allows larger movements.  
For all sizes the overall length is 130 mm.

The maximum allowable pressure must be adjust by one of the factors below at operating temperatures over 80°C.

85°C	90°C	95°C	100°C	105°C
0,92	0,83	0,75	0,67	0,60

Burst pressure:	60 barg (1¼" - 8") 40 barg (10" - 12")
Temperature:	-10C° to 105C°



SYMBOL	PART	ENGINEERING MATERIAL
1	FLANGES	SS41 (CHANGEABLE)
2	WIRE	CARBON STEEL WIRES STRAND
3	ELASTOMER	SPECIAL SYNTHETIC RUBBER
4	REINFORCING FABRIC	SYNTHETIC FIBER

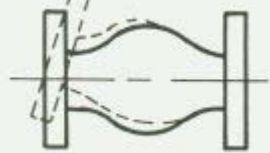
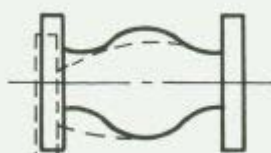
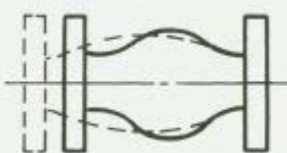
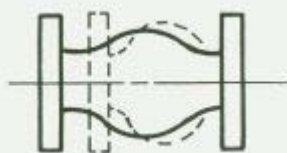
### Allowable Movements

1.Axial Compression

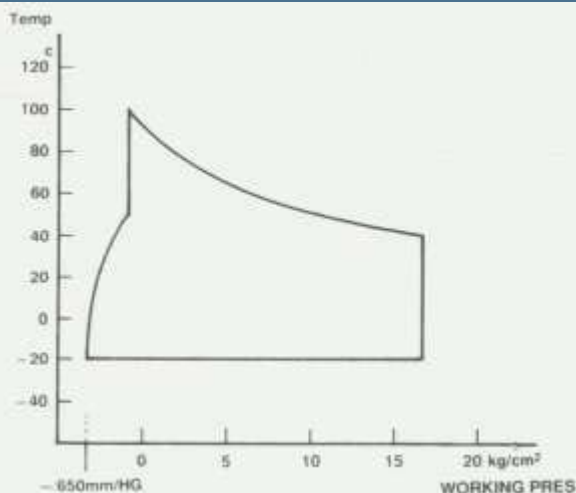
2.Axial Elongation

3.Transverse Movement

4.Angular Deflection



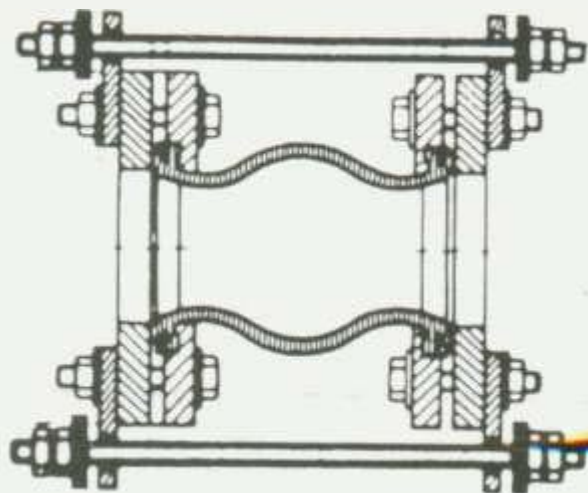
**Operation Condition**



- Operating Pressure
- Burst Pressure
- Vacuum Rating
- Temperature

(1"~12")  
16 kg/cm<sup>2</sup>  
60 kg/cm<sup>2</sup>  
650 mm/Hg

(14"~28")  
8 kg/cm<sup>2</sup>  
24 kg/cm<sup>2</sup>



**Type FSF - Single Sphere Connectors with Flanges**

Nominal Dia.		'F' installed length mm		Travel mm Min Compr. Extended	Allowable Movements from Neutral				Pressure		Weight kg	
mm	inch	Neutral Length	Max Installed		Total Compr. mm	Axial Ext. mm	Axial Defl. mm	Lateral Angular Defl.	Positive MPa	Vacuum mm	Joint & Flanges	Control Unit Sets
32	1 1/4"	95	89-97	87-99	8	4	8	15°	1.55	660	2.10	1.40
40	1 1/2"	95	89-97	87-99	8	4	8	15°	1.55	660	2.45	1.99
50	2"	105	99-107	99-110	8	5	8	15°	1.55	660	3.86	2.86
65	2 1/2"	115	107-118	103-121	8	6	10	15°	1.55	660	5.60	3.36
80	3"	130	122-133	118-113	12	6	10	15°	1.55	660	6.40	3.68
100	4"	135	122-140	117-145	18	10	12	15°	1.55	660	7.80	3.27
125	5"	170	158-175	152-180	18	10	12	15°	1.55	660	10.70	3.86
150	6"	180	167-185	162-190	18	10	12	15°	1.55	660	13.20	4.82
200	8"	205	186-212	180-220	25	14	22	15°	1.55	660	18.80	6.36
250	10"	240	221-247	215-254	25	14	22	15°	1.55	660	26.60	10.00
300	12"	260	241-267	235-274	25	14	22	15°	1.55	660	37.70	12.73
350	14"	265	246-273	240-281	25	14	22	15°	1.03	660	54.50	13.41
400	16"	265	246-273	240-281	25	14	22	15°	0.86	660	76.40	12.63
450	18"	265	246-273	240-281	25	14	22	15°	0.86	660	77.30	15.04
500	20"	265	246-273	240-281	25	14	22	15°	0.86	660	79.50	15.50
550	22"	254	235-262	229-270	25	16	19	15°	0.79	660	95.50	15.88
600	24"	254	235-262	229-270	25	16	19	15°	0.76	660	116.00	20.90

**Company:** Ningbo TianYi Chemical Industrial(T.C.I) Co., ltd

**Address:** No.181,HuiZhan Road ,Ningbo city, China 315000

**P.C:** 315000

**Tel:** 0086-574-87990349

**Fax:** 0086-574-87990130

**Url:** [Http:// www.rubbersealing.com](http://www.rubbersealing.com)

**E-mail:** [sales@rubbersealing.com](mailto:sales@rubbersealing.com)

**MSN:** [towerpacking@hotmail.com](mailto:towerpacking@hotmail.com)

**Yahoo:** [tcipacking@yahoo.com](mailto:tcipacking@yahoo.com)