

MODEL

# 7707 HEAVY DUTY FLEXIBLE COUPLING

The **Shurjoint Model 7707** heavy duty flexible coupling is designed for use in a variety of general piping applications of moderate or high pressure services. Working pressure is usually dictated by the wall thickness and rating of the pipe being used. The Model 7707 couplings feature flexibility

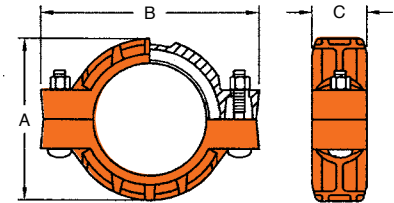
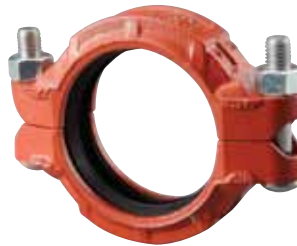
that can accommodate misalignment, distortion, thermal stress, vibration, noise and seismic tremors. The Model 7707 can even accommodate an arced or curved piping layout. See *Typical Applications - Flexible Couplings* on page 142.



### Pressure-Temperature Rating

Size	Nom. Rating	Working Pressure (STD, Roll-grooved)	Max. Service Temperature
3/4" - 6"	Class 300	750 psi @ 100°F	EPDM: 230°F / 110°C
20 - 150		52 Bar @ 38°C	
8" - 12"	Class 250	400 psi @ 100°F	Nitrile: 180°F / 82°C
200 - 300		28 Bar @ 38°C	

\*Working pressure is based on roll- or cut-grooved standard wall carbon steel pipe.  
 \*Proof test pressure: 1.5 times the working pressure, non-shock cold water.  
 \*Burst pressure is engineered minimum 3 times the working pressure.



3/4"-12"

Nominal Size mm / in	Actual O.D. mm / in	Max. Working Pressure Bar / PSI	Max. End Load kN / Lbs	Axial Displacement mm / in	Angular Movement		Dimensions			Bolts		Weight Kgs / Lbs
					Per Coupling (°)	Per Pipe mm / m in / ft	A mm / in	B mm / in	C mm / in	No.	Size mm / in	
20	26.7	52	2.91	1.6	6° - 46°	116	54	95	46	2	M10 x 45	0.6
3/4	1.050	750	650	0.0625		1.42	2.13	3.74	1.81		3/8 x 1 1/4	1.3
25	33.4	52	4.55	1.6	5° - 30°	96	61	99	46	2	M10 x 55	0.8
1	1.315	750	1020	0.0625		1.16	2.40	3.90	1.81		3/8 x 2 1/8	1.7
32	42.2	52	7.27	1.6	4° - 20°	76	70	108	46	2	M10 x 55	1.0
1 1/4	1.660	750	1620	0.0625		0.91	2.76	4.25	1.81		3/8 x 2 1/8	2.1
40	48.3	52	9.52	1.6	3° - 48°	66	76	124	45	2	M12 x 60	1.0
1 1/2	1.900	750	2130	0.0625		0.80	3.0	4.88	1.81		1/2 x 2 3/8	2.1
50	60.3	52	14.84	1.6	3° - 01°	53	90	133	46	2	M12 x 75	1.2
2	2.375	750	3320	0.0625		0.63	3.50	5.24	1.81		1/2 x 3	2.6
65	73.0	52	21.75	1.6	2° - 30°	44	102	150	46	2	M12 x 75	1.3
2 1/2	2.875	750	4870	0.0625		0.52	4.00	5.90	1.81		1/2 x 3	2.9
76.1mm	76.1	52	23.64	1.6	2° - 24°	42	103	150	46	2	M12 x 75	1.3
	3.000	750	5300	0.0625		0.50	4.06	5.90	1.81		1/2 x 3	2.9
80	88.9	52	32.25	1.6	2° - 04°	36	124	171	48	2	M12 x 75	1.5
3	3.500	750	7210	0.0625		0.43	4.88	6.73	1.89		1/2 x 3	3.3
100	114.3	52	53.33	3.2	3° - 12°	55	157	213	54	2	M16 x 90	2.1
4	4.500	750	11920	0.125		0.67	6.18	8.38	2.13		5/8 x 3 1/2	4.6
139.7mm	139.7	52	79.66	3.2	2° - 37°	46	186	241	54	2	M16 x 90	3.1
	5.500	750	17810	0.125		0.55	7.32	9.50	2.13		5/8 x 3 1/2	6.8
125	141.3	52	81.50	3.2	2° - 36°	45	186	241	54	2	M16 x 90	3.3
5	5.563	750	18220	0.125		0.54	7.32	9.50	2.13		5/8 x 3 1/2	7.2
165.1mm	165.1	52	111.27	3.2	2° - 14°	39	211	286	54	2	M20 x 120	3.6
	6.500	750	24870	0.125		0.47	8.11	11.26	2.13		3/4 x 4 3/4	7.9
150	168.3	52	115.62	3.2	2° - 10°	38	214	289	54	2	M20 x 120	3.7
6	6.625	750	25840	0.125		0.45	8.24	11.38	2.13		3/4 x 4 3/4	8.1
200	219.1	28	105.51	3.2	1° - 40°	29	276	356	62	2	---	6.6
8	8.625	400	233.60	0.125		0.35	10.86	14.00	2.44		7/8 x 5 1/2	14.5
250	273.0	28	163.81	3.2	1° - 20°	23	343	425	64	2	---	10.6
10	10.750	400	36290	0.125		0.28	13.50	16.73	2.52		7/8 x 6 1/2	23.3
300	323.9	28	230.59	3.2	1° - 08°	20	390	467	64	2	---	12.0
12	12.750	400	51045	0.125		0.25	15.35	18.39	2.52		7/8 x 6 1/2	26.4
200 JIS	216.3	28	102.83	3.2	1° - 42°	30	276	356	62	2	M20 x 120	6.6
	8.516	400	22770	0.125		0.36	10.86	14.00	2.44		3/4 x 4 3/4	14.5
250 JIS	267.4	28	157.16	3.2	1° - 22°	24	337	420	64	2	---	10.2
	10.528	400	34800	0.125		0.29	13.27	16.54	2.52		7/8 x 6 1/2	22.4
300 JIS	318.5	28	222.97	3.2	1° - 10°	20	389	478	64	2	---	11.6
	12.539	400	49370	0.125		0.25	15.31	18.81	2.52		7/8 x 6 1/2	25.5

Deflection or angular movement is the maximum value that a coupling allows with no internal pressure.