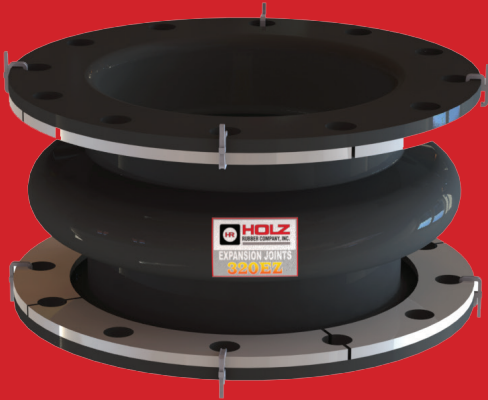




HOLZ SERIES 320EZ Lightweight Piping Expansion Joint

PRODUCT SPECIFICATIONS



The 320EZ Lightweight Piping Expansion Joint is ideal for FRP piping.

IDEAL FOR APPLICATION CONDITIONS:

Holz manufactures the 320EZ in a Nitrile tube with a Neoprene cover and an EPDM tube with an EPDM cover. These two combinations will take care of most applications encountered. Other elastomers are available upon request.

320EZ NITRILE TUBE

Resistant to:

- Hydrocarbons
- Greases
- Fats
- Hydraulic Fluids
- Oils

320EZ EPDM TUBE

Resistant to:

- Animal & Vegetable Oils
- Ozone
- Strong & Oxidizing Chemicals

For more information on the Series 320EZ, contact your Holz Representative today.



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The Series 320EZ is a lightweight piping expansion joint introduced specifically for FRP piping. This advanced-design expansion joint has the lowest spring rates in the industry. Due to the innovative design the forces applied to the mating flanges are the lowest in the industry. The 320EZ arch replaces the need for most filled arch, flowing arch, and standard arch configurations.

The Holz Series 320EZ Piping Expansion Joint is...

- Lowest spring rates in the industry: ideal for FRP piping
- Excellent for compression, extension, lateral, angular deflection and torsional movements
- Recommended for continuous temperatures up to 225°F for Buna-Nitrile and 300°F for EPDM
- Saves money and time by requiring a lighter anchoring system
- Light weight construction for easy handling and freight cost reduction (up to 50% less weight)
- Excellent pressure capacity for low, standard and most high pressure designs
- Reduces stress load with lower reaction force and springs rates
- Available in stock at 1 1/2" ID through 20" ID and standard face-to-face dimensions
- Easy to identify elastomers -
Red dot = EPDM; Yellow dot = Nitrile

Reaction Forces

NOM. I.D. (inches)	Holz 320EZ @ 50 PSI (lbs.)	Holz 320EZ @ 100 PSI (lbs.)	Holz 320EZ @ 150 PSI (lbs.)	Industry Standard @ 150 PSI
1 1/2	148	309	477	1,885
2	196	408	620	2,386
2 1/2	262	539	806	2,946
3	377	776	1,161	3,564
4	642	1,336	1,989	4,978
5	1,002	2,157	3,011	6,627
6	1,334	2,822	4,199	8,512
8	2,426	5,204	7,706	14,256
10	3,838	7,841	11,668	19,911
12	5,830	11,356	17,221	26,508
14	7,523	15,368	22,862	38,170
16	9,063	19,223	28,191	41,124
18	10,978	25,405	37,806	57,021
20	13,340	32,231	46,980	67,858

Due to the unique design of the 320EZ, the forces applied to the mating flanges are much lower than that of conventional designs.

PRODUCT SPECIFICATIONS

Pressure

Maximum Movement

Spring Rates

NOM. I.D. (inch-)	Face-to-Face (inches)	Psig	"HG	Compression (inches)	Extension (inches)	Lateral (inches)	Angular (degrees)	Torisonal (degrees)	Compression (lbs/in)	Extension (lbs/in)	Lateral (lbs/in)	Angular (lbs/degrees)
1 1/2	6	225	24	1.50	0.63	0.08	28.00	5	126	182	149	0.36
2	6	225	24	1.50	0.63	0.75	25.00	5	132	158	130	0.34
2 1/2	6	225	24	1.50	0.63	0.75	20.25	5	128	141	111	0.27
3	6	225	24	1.50	0.63	0.75	18.00	5	139	208	133	0.48
4	6	225	24	1.50	0.63	0.75	14.25	4	110	180	105	0.58
5	6	225	24	1.50	0.63	0.75	13.00	4	143	190	136	1.05
6	6	225	24	1.50	0.63	0.75	12.25	4	136	166	147	1.46
8	6	210	24	1.50	0.63	0.75	12.00	4	226	230	210	3.20
10	8	210	24	2.25	0.75	1.00	11.90	4	248	381	281	8.95
12	8	210	24	2.25	0.75	1.00	11.55	4	378	493	409	12.53
14	8	150	24	2.25	0.75	1.00	11.30	3	423	592	497	13.50
16	8	150	24	2.25	0.75	1.00	10.12	3	432	606	509	14.45
18	8	150	24	2.25	0.75	1.00	8.95	3	543	761	690	21.66
20	8	150	24	2.25	0.75	1.00	8.10	3	628	829	776	28.45

Dimensions

Weights

Torque

NOM. I.D. (inches)	Flange O.D.	Bolt Circles (inches)	# of Holes	Hole Diagram	Flange Width	Arch Width	Arch Height	Body O.D. (inches)	Joint (lbs/in.)	Rings (lbs/sets)	Rods (lbs/units)	Flange Bolts (ft./lbs)
1 1/2	5.00	3.875	4	0.625	0.370	2.50	1.125	2.70	1.30	2.40	3.50	25-40
2	6.00	4.75	4	0.750	0.370	2.50	1.125	3.10	1.70	3.60	3.00	25-40
2 1/2	7.00	5.50	4	0.750	0.370	2.50	1.125	3.65	2.10	5.10	3.70	35-50
3	7.50	6.00	4	0.750	0.370	2.50	1.125	4.35	2.40	5.50	3.70	35-50
4	9.00	7.50	8	0.750	0.390	2.50	1.125	5.10	3.20	8.00	3.00	45-60
5	10.00	8.50	8	0.875	0.390	2.50	1.125	6.10	3.60	8.70	4.70	45-60
6	11.00	9.50	8	0.875	0.390	2.50	1.125	7.10	4.90	10.40	4.70	65-80
8	13.50	11.75	8	0.875	0.500	2.50	1.125	9.20	7.70	14.40	9.60	65-80
10	16.00	14.25	12	1.000	0.580	3.50	1.563	11.45	13.90	16.70	10.50	80-95
12	19.00	17.00	12	1.000	0.680	3.50	1.563	13.50	19.50	25.80	10.50	80-95
14	21.00	18.75	12	1.125	0.680	3.50	1.563	15.45	22.70	28.70	12.30	85-100
16	23.50	21.25	16	1.125	0.680	3.50	1.563	17.50	26.80	35.10	13.50	85-100
18	25.00	22.75	16	1.250	0.680	3.50	1.563	19.48	29.50	33.80	14.50	100-115
20	27.50	25.00	20	1.250	0.680	3.50	1.563	21.50	31.80	40.30	16.00	100-115

Number of Control Rods

NOM. I.D. (in.)	Plate O.D. (in.)	Rod Diameter (in.)	Plate Thickness (in.)	Required Rods			NOM. I.D. (in.)	Plate O.D. (in.)	Rod Diameter (in.)	Plate Thickness (in.)	Required Rods		
				2	3	4					2	3	4
1 1/2	8.125	0.500	0.375	510	0	0	8	17.50	1.00	0.750	163	244	326
2	9.750	0.625	0.375	661	0	0	10	20.50	1.00	0.750	163	224	375
2 1/2	10.75	0.625	0.375	529	0	0	12	23.75	1.00	0.750	160	240	320
3	11.25	0.625	0.375	441	0	0	14	25.86	1.00	0.750	112	167	223
4	12.75	0.625	0.050	311	467	622	16	29.00	1.25	0.750	113	170	227
5	13.75	0.625	0.050	235	353	470	18	30.50	1.25	0.750	94	141	187
6	14.75	0.625	0.050	186	278	371	20	33.00	1.25	0.750	79	118	158

Movements shown are non-concurrent.
 Pressure ratings are based on an operating temperature of 194°F.
 All sizes are inventoried with ANSI 150# drilled flanges, other drill patterns available.
 Available in most materials.
 Inventoried in EPDM and Nitrile/Neoprene

Torque specifications are approximate, after installation the system should be pressurized and examined to confirm a proper seal. For hydrostatic testing the system, torque values may need to be increased. Control rod dimensions are to a minimum of FSA standards.
 Pressure safety factors are:
 Minimum 3 to 1 on sizes 1 1/2" ID thru 12" ID
 Minimum 4 to 1 on sizes 14" ID thru 20" ID