



FIBERLIGN® TRUNNION SUPPORT

The **FIBERLIGN Trunnion Support** uses a combination of structural reinforcing rods (SRR), outer rods, a bolted housing, and resilient inserts to reduce compression, clamping, and bending stresses on OPGW and the optical fibers within it.

FEATURES AND BENEFITS

- Reduces negative effects of wind-induced cable motion, such as aeolian vibration, galloping, and sway
- Housing is designed to fit commonly used trunnion brackets
- Inserts are made from an elastomer that is specifically formulated to resist deterioration from UV, weathering, extreme temperature variations, and compression set
- An aluminum alloy reinforcement is molded into each insert half for extreme loading
- Current transfer tab is included to provide a direct electrical bond between the OPGW and ground lead
- Current transfer tab is captured between the OPGW and the SRR. No additional fasteners are needed.
- Housing keeper, SRR, and outer rods are made from a high-strength aluminum alloy. The housing base is made from galvanized ductile iron for added strength.
- An optional ground wire assembly can be included with the trunnion support
- SRR and outer rods cannot be reused. Hardware components can be reused, provided they are in good condition
- The FIBERLIGN Trunnion Support has been thoroughly tested for vibration, mechanical loading, and optical attenuation in accordance with IEEE Standard 1138 and IEEE Standard 1591.1

HOLDING STRENGTHS AND LINE ANGLES

Characteristic	Specification
Unbalanced/Slip Load	10%–20% of standard OPGW rated strength
Maximum Pull-off Load from Trunnion Pins	5,000 lb (any direction)
Maximum Line Angle	30 degrees

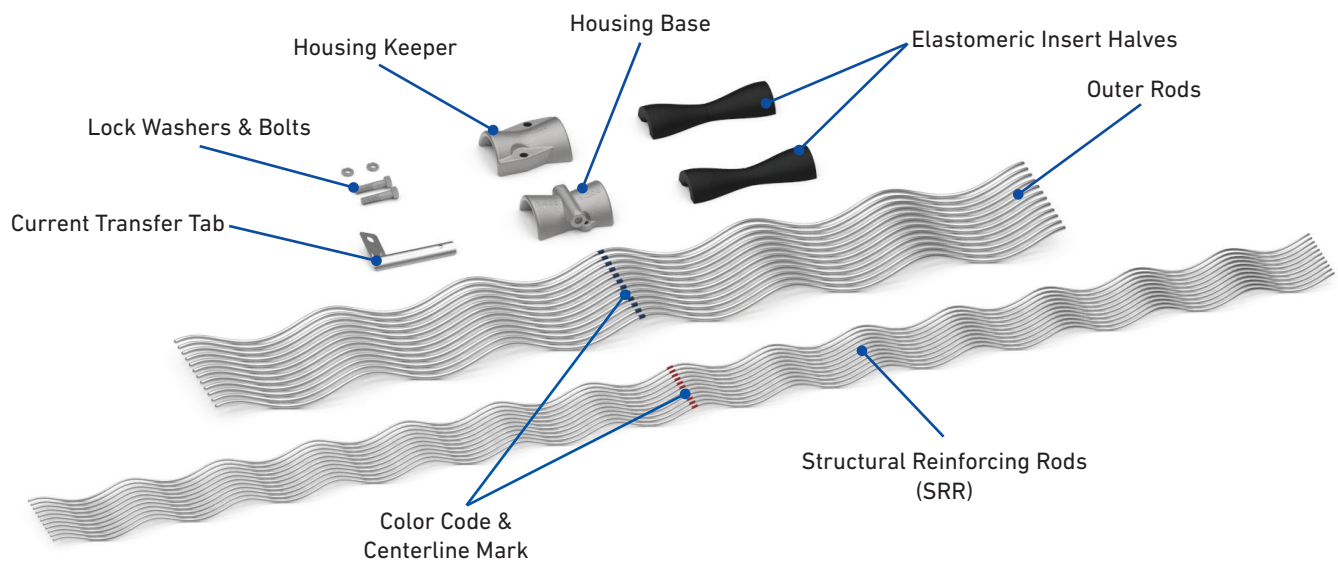
ATTACHMENT FITTINGS

- The Trunnion Support can be attached to a pole or structure with a trunnion cap or bracket with dimensions consistent with those specified in ANSI C29.7-1986, Class 57



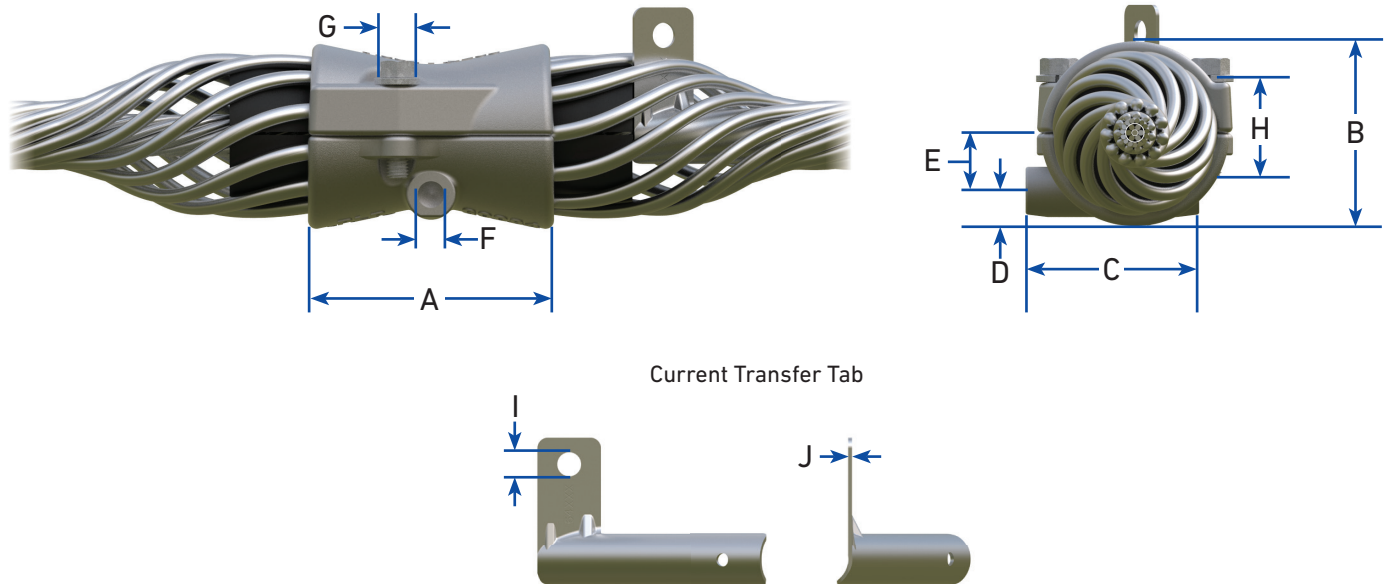
Various Trunnion Bracket Types

COMPONENTS





DIMENSIONS



FIBERLIGN Trunnion Support

OPGW Diameter Range	Dimensions									
	in (mm)									
in (mm)	A	B	C	D	E	F	G	H (Bolt Length)	I	J
0.312 – 0.458 (9.0 – 11.6)	3-3/4 (95.3)	2-24/32 (70.3)	3-7/8 (98.4)	26/32 (21.0)	9/16 (14.2)	19/32 (15.1)	3/4 (19.1)	2 (50.8)	16/32 (13.1)	3/32 (2.3)
0.459 – 0.565 (11.7 – 14.3)	4-1/2 (114.3)	3-7/32 (82.0)	3-7/8 (98.4)	7/8 (22.2)	3/4 (19.1)	19/32 (15.1)	3/4 (19.1)	2-1/4 (57.2)	9/16 (14.3)	3/32 (2.3)
0.566 – 0.625 (14.4 – 15.8)	5 (127.0)	3-19/32 (91.7)	3-7/8 (98.4)	23/32 (18.4)	1-1/8 (28.6)	19/32 (15.1)	3/4 (19.1)	2-1/4 (57.2)	9/16 (14.3)	3/32 (2.3)
0.626 – 0.750 (15.9 – 19.9)	5-1/2 (139.7)	4-1/8 (104.6)	3-7/8 (98.4)	24/32 (19.4)	1-5/16 (33.4)	19/32 (15.1)	3/4 (19.1)	2-1/4 (57.2)	9/16 (14.3)	3/32 (2.3)
0.751 – 0.786 (20.0 – 24.8)	5-1/2 (139.7)	4-1/8 (104.6)	3-7/8 (98.4)	24/32 (19.4)	1-5/16 (33.4)	19/32 (15.1)	3/4 (19.1)	2-1/4 (57.2)	5/8 (15.9)	3/16 (4.8)
0.787 – 0.855 (24.9 – 25.8)	6 (152.4)	4-21/32 (118.2)	3-7/8 (98.4)	26/32 (21.0)	1-1/2 (38.1)	19/32 (15.1)	3/4 (19.1)	2-1/4 (57.2)	5/8 (15.9)	3/16 (4.8)
0.856 – 0.942 (25.9 – 26.8)	6-1/2 (165.1)	5-1/16 (128.7)	3-7/8 (98.4)	29/632 (23.5)	1-5/8 (41.3)	19/32 (15.1)	3/4 (19.1)	2-1/4 (57.2)	5/8 (15.9)	3/16 (4.8)

ACCESSORIES

- All ground wire assemblies include attachment hardware (bolts, lock washers, nuts) for each terminal

Catalog Number	Suffix Code	Description
710010015	G	4 ft (1.2 m) Long #4 (7W) Copper Ground Wire Assembly with One Terminal for 1/2" Bolt
710010293	GA	4 ft (1.2 m) Long 4/0 (7W) Aluminum Ground Wire Assembly with One Terminal for 1/2" Bolt
710011205	GA2	5 ft (1.5 m) Long 95 mm ² (19W) Aluminum Ground Wire Assembly with One Terminal for M12 Bolt and One Terminal for M16 Bolt

ORDERING INFORMATION

- Select the appropriate catalog number for the Trunnion Support based on the diameter of the OPGW.
- Add the appropriate suffix code to the Trunnion Support catalog number to include a ground wire assembly (**ex: Catalog Number: 4400100G, 4400100GA, or 4400100GA2**) - see ACCESSORIES on the previous page for suffix codes.
- Standard Trunnion Supports are offered for left-hand lay OPGW. Contact PLP with OPGW specifications for further information.

FIBERLIGN Trunnion Support

Catalog Number	Cable Diameter Range		SRR Specifications						Outer Rod Specifications					
	in	mm	Rod Length		Rod Diameter		Rods per Set	Color Code	Rod Length		Rod Diameter		Rods per Set	Color Code
			in	m	in	mm			in	m	in	mm		
4400099	0.312 – 0.339	7.9 – 8.6	66	1.68	0.167	4.2	7	Orange	42	1.07	0.204	5.2	11	Blue
4400100	0.354 – 0.381	9.0 – 9.6	66	1.68	0.146	3.7	9	Blue	42	1.07	0.204	5.2	11	Blue
4400101	0.382 – 0.398	9.7 – 10.0	66	1.68	0.146	3.7	9	Green	42	1.07	0.204	5.2	11	Green
4400102	0.399 – 0.418	10.1 – 10.5	66	1.68	0.146	3.7	10	Yellow	42	1.07	0.204	5.2	11	Yellow
4400103	0.419 – 0.439	10.6 – 11.1	67	1.70	0.146	3.7	10	Black	42	1.07	0.204	5.2	11	Black
4400104	0.440 – 0.458	11.2 – 11.6	68	1.73	0.146	3.7	11	White	43	1.09	0.204	5.2	11	White
4400105	0.459 – 0.461	11.7 – 11.6	72	1.83	0.167	4.2	10	Purple	46	1.17	0.250	6.4	10	Orange
4400106	0.462 – 0.476	11.7 – 12.0	72	1.83	0.167	4.2	10	Purple	46	1.17	0.250	6.4	10	Purple
4400107	0.477 – 0.503	12.1 – 12.7	72	1.83	0.146	3.7	11	Orange	46	1.17	0.250	6.4	10	Orange
4400108	0.504 – 0.511	12.8 – 12.9	73	1.85	0.146	3.7	12	Red	46	1.17	0.250	6.4	10	Purple
4400109	0.512 – 0.536	13.0 – 13.5	76	1.93	0.167	4.2	11	Blue	49	1.24	0.250	6.4	11	Blue
4400110	0.537 – 0.559	13.6 – 14.1	77	1.96	0.167	4.2	11	Green	49	1.24	0.250	6.4	11	Green
4400111	0.560 – 0.565	14.2 – 14.3	77	1.96	0.167	4.2	11	Green	49	1.24	0.250	6.4	11	Green
4400112	0.566 – 0.573	14.4 – 14.6	79	2.01	0.182	4.6	11	Black	54	1.37	0.250	6.4	12	Black
4400113	0.577 – 0.598	14.7 – 15.1	79	2.01	0.182	4.6	11	Black	54	1.37	0.250	6.4	12	White
4400114	0.599 – 0.625	15.2 – 15.8	81	2.06	0.182	4.6	11	Brown	54	1.37	0.250	6.4	12	Brown
4400116	0.626 – 0.632	15.9 – 16.0	94	2.39	0.204	5.2	11	Red	63	1.60	0.310	7.9	11	Red
4400117	0.633 – 0.666	16.1 – 16.8	94	2.39	0.204	5.2	11	Red	63	1.60	0.310	7.9	11	Blue
4400118	0.667 – 0.682	16.9 – 17.2	94	2.39	0.204	5.2	11	Yellow	63	1.60	0.310	7.9	11	Green
4400119	0.683 – 0.710	17.3 – 18.0	94	2.39	0.204	5.2	11	Yellow	63	1.60	0.310	7.9	11	Yellow
4400120	0.711 – 0.728	18.1 – 18.4	94	2.39	0.204	5.2	12	White	63	1.60	0.310	7.9	12	Black
4400121	0.729 – 0.750	18.5 – 19.0	94	2.39	0.204	5.2	12	White	63	1.60	0.310	7.9	12	White
4400122	0.751 – 0.786	19.1 – 19.9	94	2.39	0.204	5.2	12	Brown	63	1.60	0.310	7.9	12	Brown
4400123	0.787 – 0.814	20.0 – 20.6	100	2.54	0.250	6.4	11	Green	72	1.83	0.365	9.3	11	Green
4400124	0.815 – 0.845	20.7 – 21.4	100	2.54	0.250	6.4	11	Yellow	72	1.83	0.365	9.3	11	Yellow
4400125	0.846 – 0.855	21.5 – 21.6	100	2.54	0.250	6.4	11	Blue	72	1.83	0.365	9.3	12	Blue
4400126	0.856 – 0.894	21.7 – 22.6	100	2.54	0.250	6.4	12	Black	80	2.03	0.365	9.3	12	Black
4400127	0.895 – 0.907	22.7 – 23.0	100	2.54	0.250	6.4	12	White	80	2.03	0.365	9.3	12	White
4400128	0.908 – 0.916	23.1 – 23.2	100	2.54	0.250	6.4	12	Purple	80	2.03	0.365	9.3	12	Purple
4400129	0.917 – 0.929	23.3 – 23.5	100	2.54	0.250	6.4	12	Brown	80	2.03	0.365	9.3	12	Brown
4400130	0.930 – 0.942	23.6 – 23.9	100	2.54	0.250	6.4	12	Red	80	2.03	0.365	9.3	12	Red