

Surge Tracker™ ST4-100xxx

100 kA Per Phase / 50 kA Per Mode



Specifications

Protection Modes:	3Yx,3Dx,1Sx: L-N, L-G, N-G (Direct), L-L (Indirect)	1Px: L-N, L-G, N-G (Direct) 3Nx,2Nx: L-G, L-L (Direct)
Surge Current Rating: (per phase / per mode)	100 kA per phase / 50 kA per mode	
Nominal Discharge Current Rating (I_n):	20 kA	
Short Circuit Current Rating:	200 kA	

Physical Specifications

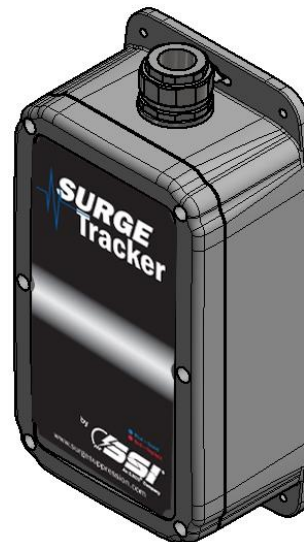
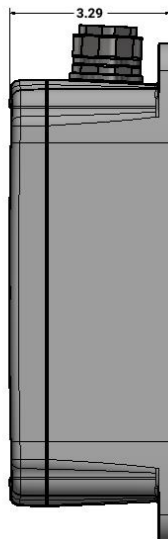
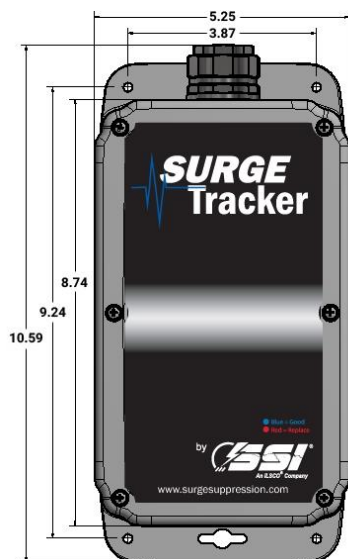
Enclosure	NEMA 4X Watertight
Conduit Size:	3/4" Metal Hub
Temperature Rating:	-40°C to 80°C
Diagnostics:	One Blue LED per phase normally on, Red LED indicates the SPD needs to be replaced. If any Blue LED is off check power and/or replace unit.

Standards and Certifications

SPD Type:	Type 1 / Type 2
Product Certifications	ANSI/UL 1449, 1283* and CSA C22.2 No. 269.1-14, No. 269.2-13* and No. 8-13* (VZCA, VZCA7, FOKY* & FOKY7*) *Type 2 SPDs only
Warranty:	10 Year Limited Warranty

Options

Option Code	SPD Type	Indicator LED	Audible Alarm	Dry Relay Contact	Advanced Surge Filtering
A	1	•	--	--	--
B	1	•	•	•	--
C	2	•	--	--	•
D	2	•	•	•	•



MEASURED LIMITING VOLTAGE PERFORMANCE AND ELECTRICAL SPECIFICATIONS

ST4-100 Family Table

Voltage Code	Circuit Type	Mode	Maximum Continuous Operating Voltage (MCOV)	Voltage Protection Rating (VPR) A/B	Voltage Protection Rating (VPR) C/D	ANSI/IEEE C62.41.2, C62.45, C62.62 Measured Limiting Voltage Test Results (6" External Lead Length)
						Category A 30 Ω 100 kHz Ring Wave 2 kV / 67 A @ 270° Phase Angle
						C/D Suffix
ST4-1001P1x	120 V, Single Ø (2 wire + ground)	L-N	150	700	700	43 V
		N-G	150	700	700	339 V
		L-G	150	700	700	440 V
ST4-1001P2x	220-277 V, Single Ø (2 wire + ground)	L-N	320	1200	1200	44 V
		N-G	320	1200	1200	716 V
		L-G	320	1200	1200	1086 V
ST4-1001S1x	120/240 V, Split Ø (3 wire + ground)	L-N	150	700	700	43 V
		N-G	150	700	700	339 V
		L-G	150	700	700	440 V
		L-L	300	1000	1200	54 V
ST4-1002N1x	120 V, Two Ø (2 wire + ground)	L-G	150	600	600	440 V
		L-L	150	600	700	54 V
ST4-1002N2x	240 V, Two Ø (2 wire + ground)	L-G	300	1200	1200	1086 V
		L-L	300	1200	1200	58 V
ST4-1003Y1x	120/208 V, 3ØY (4 wire + ground)	L-N	150	600	700	43 V
		N-G	150	700	700	339 V
		L-G	150	600	600	440 V
		L-L	300	1000	1000	54 V
ST4-1003Y2x	277/480 V, 3ØY (4 wire + ground)	L-N	320	1200	1200	44 V
		N-G	320	1200	1200	716 V
		L-G	320	1200	1200	1086 V
		L-L	640	2000	2500	58 V
ST4-1003Y3x	600/347 V, 3ØY (4 wire + ground)	L-N	400	1500	NA	NA
		N-G	400	1500	NA	NA
		L-G	400	1500	NA	NA
		L-L	800	2500	NA	NA
ST4-1003D1x	120/240 V, 3ØΔ (4 wire + ground)	L-L	300	1000	1200	54 V
		L-N	150	700	700	43 V
		HL-N	300	1200	1200	44 V
		L-G	150	700	700	440 V
		HL-G	300	1200	1200	1086 V
		N-G	150	700	700	339 V
ST4-100-3N4x	480 V, 3ØΔ (3 wire + ground)	L-G	552	1800	1800	1663 V
		L-L	552	1800	1800	57 V
ST4-1003N6x	600 V, 3ØΔ (3 wire + ground)	L-G	690	3000	NA	NA
		L-L	690	3000	NA	NA

Measured Limiting Voltage (MLV) Test Parameters: Positive polarity, Category A: Line power applied, Category C: No line power applied, Voltages are peak (±10%). Measured Limiting Voltages are measured from the insertion point on the sine wave to the peak of the surge for powered tests. Each MLV is the average of the phases within that mode of protection. In order to duplicate the results, the specified mode of protection must be tested in all phases (except N-G) and averaged together. (Individual mode or shot results may vary by more than 10%. *Scope Settings: Time Base = 10 microseconds per division, Sampling Rate = 2.5 GigaSamples/sec, Bandwidth = 400 MHz (200 MHz for Cat C), Probes: Tektronix P5100/P6015A. These settings help to assure MLV results are accurate.* **All tests performed with 6" lead length (external to the enclosure), simulating actual installed performance.**