

Wired-in Surge Protection Modules

APPLICATION

These modules are designed for use by equipment manufacturers who wish to incorporate integral transient voltage surge suppression with exceptional EMI filtering into their product. These devices provide a clamping profile that fully tracks the AC sine wave, providing low clamping voltage levels. They are also suitable for providing surge protection to branch circuits.



Cat. No. 51005-DIN Front View



Cat. No. 51005-DIN Back View

STANDARD SPECIFICATION

The wired-module is designated Transient Voltage Surge Suppressor and is designed for use on AC power lines or for integral SPD protection built into equipment. The Cat. Nos. 51005-WM, 51010-WM, 51015-WM, 51020-WM, and 51240-WM are backed by Leviton's 10-Year Limited Warranty. These devices have been tested to ANSI/IEEE C62.41 standards for categories A and B environments. All models are available with integral DIN-rail mounting clip designated by -DIN suffix.

FUNCTIONAL AND PERFORMANCE REQUIREMENTS

Branch Circuit Attachment—Wired modules are series (in-line) installed and available in models with circuit current capacity of 5, 10, 15, or 20 amps.

Diagnostics—Real-time diagnostics are provided with a visual and audible alarm sounding if surge protection is lost. These series-operated devices will continue to provide power to the load in the event that surge protection is lost. LED indicators identify an open ground line as well as reverse polarity.

Performance—Staged multi-component circuitry provides a clamping envelope that follows the AC sine-wave contour.



Cat. No. 51020-DIN

PERFORMANCE SPECIFICATIONS:

	51005-WM/-DIN	51010-WM/-DIN	51015-WM/-DIN	51020-WM/-DIN	51240-WM/-DIN
Rated Line Voltage	120V AC	120V AC	120V AC	120V AC	240V AC
Maximum Continuous Current Capability	5 Amps	10 Amps	15 Amps	20 Amps	20 Amps
Max. Continuous Operating Voltage	150V AC	150V AC	150V AC	150V AC	270V AC
Max. Single-Pulse Transient Current (8 x 20µs Amps peak)	L-N 26kA L-G 13kA N-G 13kA	L-N 26kA L-G 13kA N-G 13kA	L-N 26kA L-G 13kA N-G 13kA	L-N 26kA L-G 13kA N-G 13kA	L-L 26kA L-G 13kA
Rated single-pole transient energy (10 x 1000µs Joules)	L-N 336 Joules L-G 168 Joules N-G 168 Joules	L-N 336 Joules L-G 168 Joules N-G 168 Joules	L-N 336 Joules L-G 168 Joules N-G 168 Joules	L-N 336 Joules L-G 168 Joules N-G 168 Joules	L-L 540 Joules L-G 270 Joules
Noise Rejection @ 50 Ohms 5kHz to 100Mhz	-20 to -40 dB	-20 to -40 dB	-40dB to -50 dB	-40dB to -50 dB	-40dB to -50 dB
Operating Frequency Range	50/60 Hz	50/60 Hz	50/60 Hz	50/60Hz	50/60Hz

Note: Load current draw must not exceed amp rating of device

Product Specifications

51005-WM/-DIN,
51010-WM/-DIN,
51015-WM/-DIN,
51020-WM/DIN,
51240-WM/-DIN

PHYSICAL SPECIFICATIONS:

	51005-WM/-DIN	51010-WM/-DIN	51015-WM/-DIN	51020-WM/-DIN	51240-WM/-DIN
Operating Temperature Range:	-10°C to 60°C	-10°C to 60°C	-10°C to 60°C	-10°C to 60°C	-10°C to 60°C
Storage Temperature Range:	-20°C to 85°C	-20°C to 85°C	-20°C to 85°C	-20°C to 85°C	-20°C to 85°C
Dimension (L x W x D)	5.0" (127.0mm) x 2.5" (63.5mm) x 1.6" (40.1 mm)		7.5" (190.5 mm) x 4.25" (108.0 mm) x 2.34" (59.4 mm)		

CLAMPING PERFORMANCE:

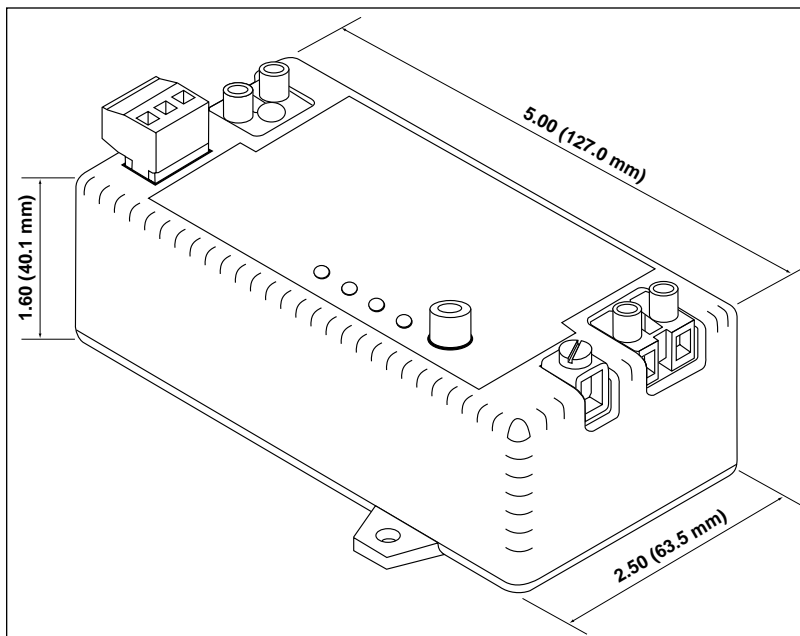
	51005-WM/-DIN	51010-WM/-DIN	51015-WM/-DIN	51020-WM/-DIN	51240-WM/-DIN
UL 1449 SVR Rating Cat B1 combination wave (8 x 20 μs, 3000A)	L-N 400V L-G 400V N-G 400V	L-N 400V L-G 400V N-G 400V	L-N 330V L-G 330V N-G 400V	L-N 330V L-G 330V N-G 400V	L-L 600V L-G 600V N-G 700V

ORDERING INFORMATION:

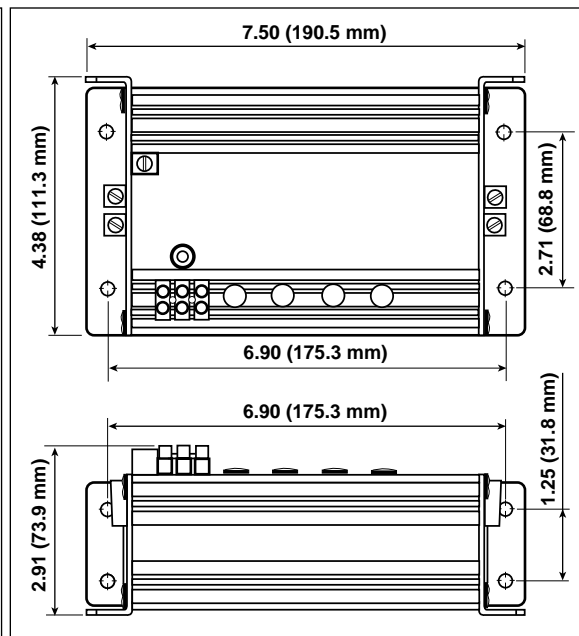
Description	Cat. No.
Wired Module Surge Protection Devices 120V AC, 5 Amps	51005-WM/-DIN
Wired Module Surge Protection Devices 120V AC, 10 Amps	51010-WM/-DIN
Wired Module Surge Protection Devices 120V AC, 15 Amps	51015-WM/-DIN
Wired Module Surge Protection Devices 120V AC, 20 Amps	51020-WM/-DIN
Wired Module Surge Protection Devices 240V AC, 20 Amps	51240-WM/-DIN

Note: All units come in black only.

DIMENSIONAL DRAWINGS



51005 & 51010 Series



51015, 51020 & 51240 Series



Leviton Manufacturing Co., Inc.—Power Quality Division
860 Harold Place, Chula Vista, CA 91914
Tech Line: 1-800-648-3332 • Fax: 1-877-711-8135

Leviton Manufacturing of Canada, Ltd.
165 Hymus Boulevard, Pointe Claire, Quebec H9R 1E9
Telephone: 1-800-469-7890 • Fax: 1-800-563-1853

Visit our Website at: www.leviton.com

