



HS-30A Model

Introduction

Since 1980, Eaton’s Innovative Technology has provided Surge Protective Devices (SPDs) to power quality equipment users around the world. Whatever your electrical surge protection need may be, Eaton’s Innovative Technology has a Surge Protective Device to fill it!

General Features

- Description — Series or parallel wired, terminal strip connected, Multi-stage hybrid **Active Tracking Network** (ATN®) enhanced sine wave tracking surge protective device
- Application — Dedicated ac power circuits, ≤30 amps, feeding variable speed drives, process controllers, PLCs, power supplies, microprocessor-based loads, CNCs and a wide variety of other mission-critical and general-purpose individual loads
- Warranty — 10-Year Free Replacement
- Unit Listings — Recognized components under UL® 1449 Second Edition, UL® 1283
- Manufacturer Qualifications — ISO® 9001:1994 Quality System Certification BSI FM 30833

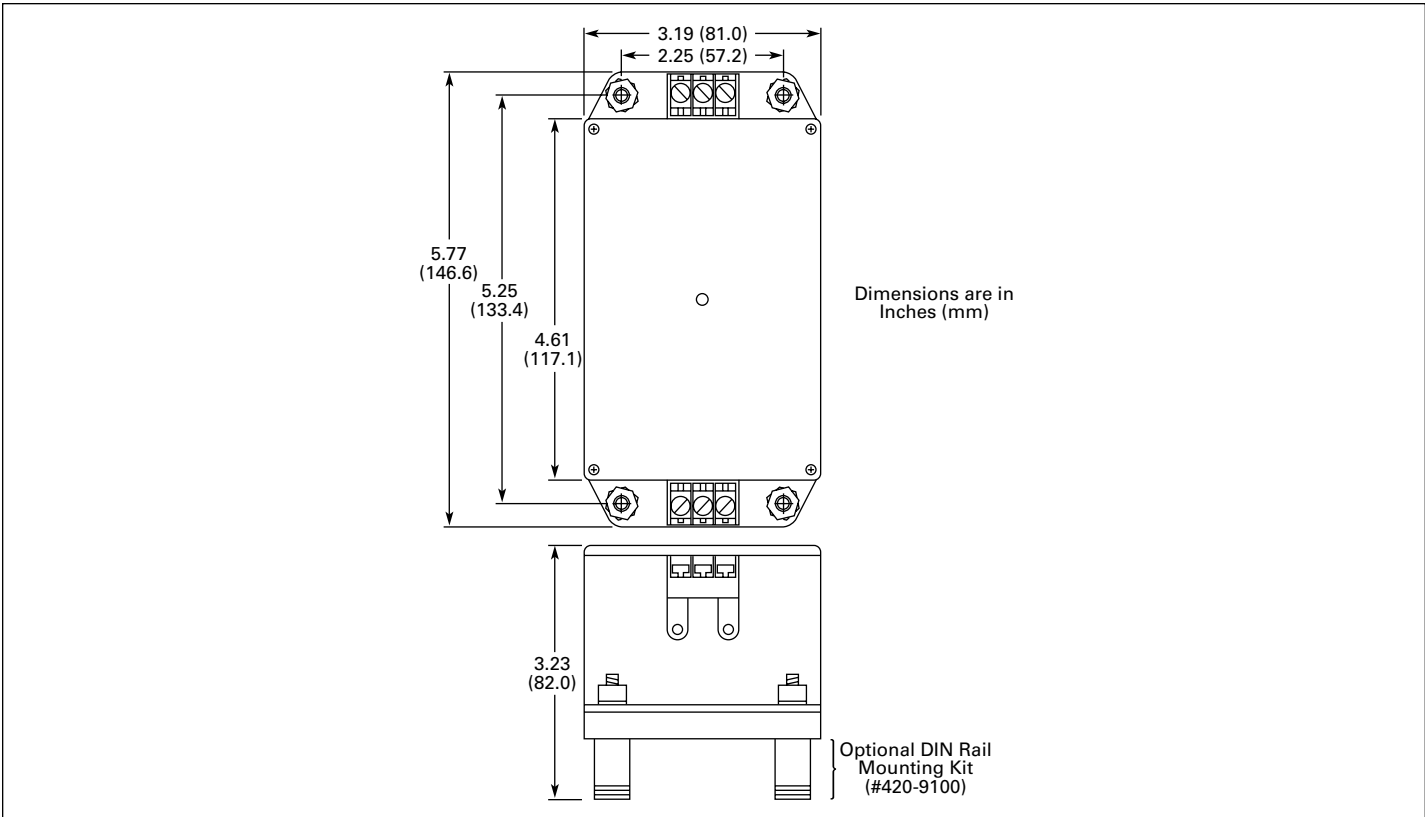
Mechanical and Electrical Features

- Enclosure — ABS Plastic UL® 94-5VA
- Connection — Wire clamping box terminals
 - Minimum 18 AWG (0.8 mm²) wire size
 - Maximum 10 AWG (5.0 mm²) wire size
- Weight — ≈1 lb (0.45 kg)
- Operating Temperature — -40°F (-40°C) to +140°F (+60°C)
- Circuit Description — Multi-stage hybrid network utilizing circuit encapsulation and Advanced Surge Path Technology
- Protection Modes — All Mode: Dedicated L-N (normal mode), Dedicated L-G, N-G (common mode)
- Input Power Frequency — 0 – 64 Hz (ac)
- Response Time — Active <1 nanosecond

Maximum EMI/RFI Attenuation – Mil-Std-220

1 kHz	10 kHz	100 kHz	1 MHz	10 MHz	Maximum Attenuation Frequency
3 dB	21 dB	38 dB	36 dB	15 dB	47 dB @ 16 kHz

- Maximum Continuous Operating Current — 30 Amps rms up to 250 volts
- Short Circuit Current Rating — 200 kAIC when protected by Class R, 30 Amp fuse



Performance Data

Available Models	Peak Surge Current Phase/Mode	Nominal System Voltage (ac-Vrms, dc-Vpk)	ANSI/IEEE C62.41-1991 Measured Limiting Voltage*			UL SVR
			A1 Ring Wave 2 kV, 67 A 180° Phase Angle	A3 Ring Wave 6 kV, 200 A 90° Phase Angle	B3/C1 Impulse Wave 6 kV, 3 kA 90° Phase Angle	UL 1449-2 Suppressed Voltage Ratings
cRU _{US} HS-120-30A	80 kA/40 kA	48 – 150 Vac	L-N L-G, N-G	L-N L-G, N-G	L-N L-G, N-G	L-N
		48 – 200 Vdc	30 70, 50	240 340, 140	430 420, 430	400 400, 400
cRU _{US} HS-250-30A	80 kA/40 kA	120 – 275 Vac	L-N	L-N	L-N	L-N
		120 – 300 Vdc	60 90, 50	400 520, 140	760 790, 770	800 800, 800

* Test environment: Positive polarity. Tested with ac power applied. All units tested at terminals, time base = 1 ms. All measurements referenced from zero volts per NEMA® LS-1.

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 Printed in USA
 Form No. PS01006042E / Z2990
 February 2007