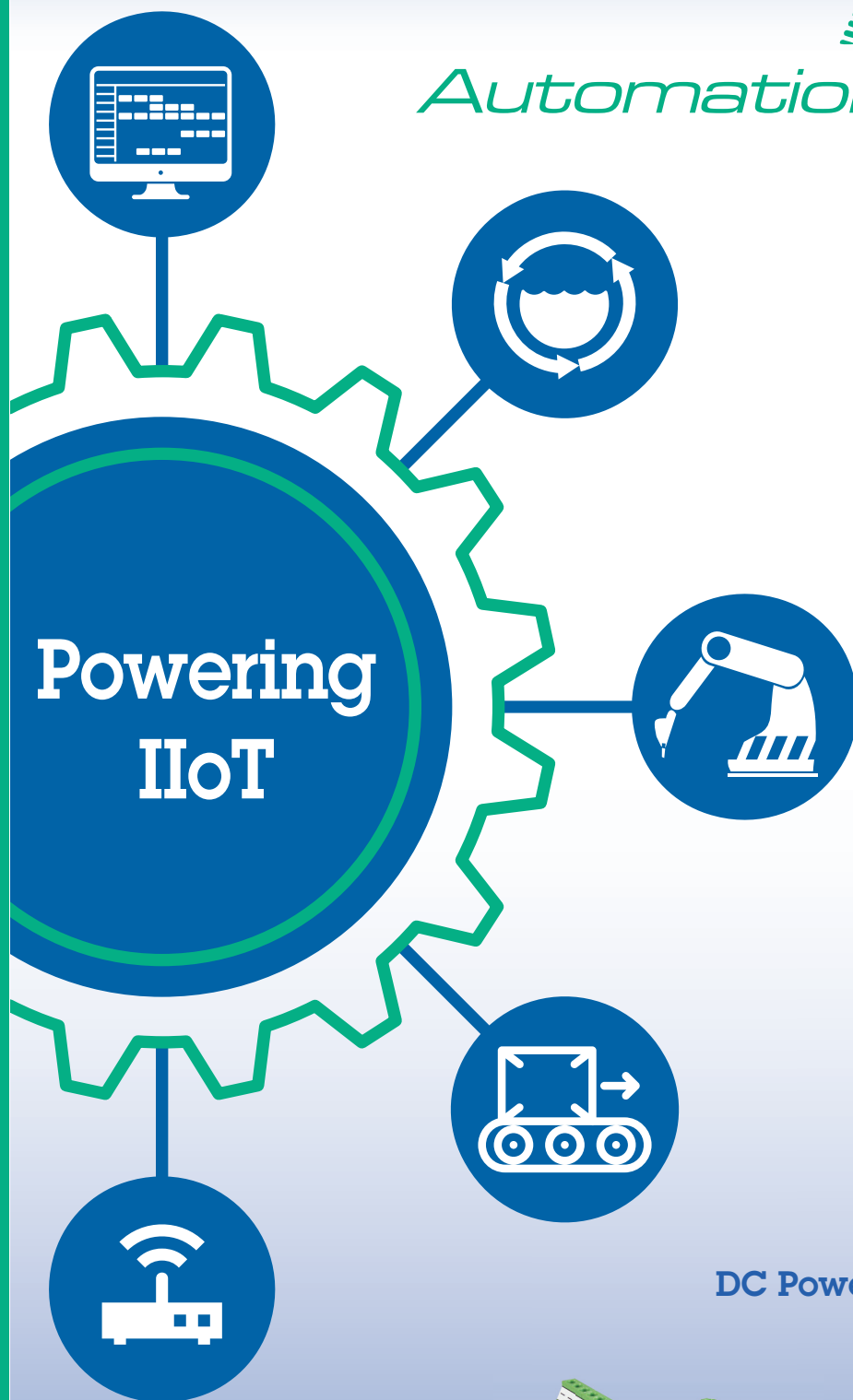
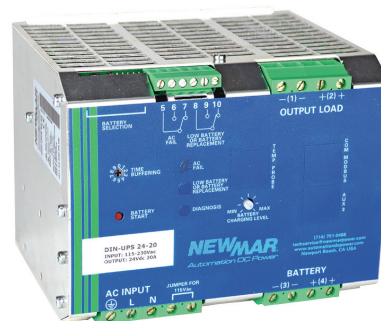


NEWMAR[®]

Automation DC Power



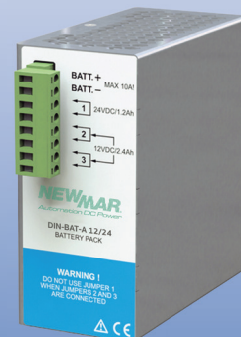
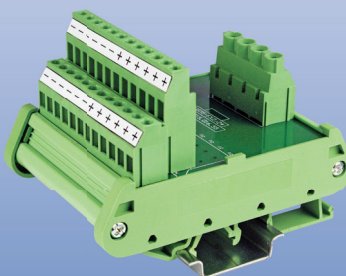
DC UPS Systems



Site Power Monitor



DC Power Accessories



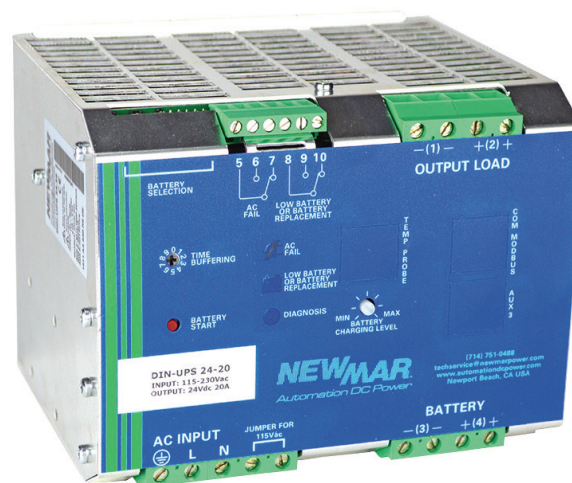
DIN-Rail DC UPS



DIN-UPS 12-10
(Case Size A)



DIN-UPS 24-10/48-5
(Case Size B)



DIN-UPS 12-35/24-20/48-10
(Case Size C)

Powers Loads and Charges Back-Up Battery, Ideal for Automation and Wireless System Transmitter Applications

- Combines all system power functions: power supply, battery charger, UPS circuitry and status monitoring in ONE compact DIN rail mount unit
- Separate outputs for load and battery
- "Load priority" circuit ensures power is dedicated first to the load, with remainder then allocated to battery charging, thus preventing a discharged battery from impacting operation of critical loads.
- 3 step charging for rapid battery recovery, programmable for battery type, with optional temperature compensation sensor
- Battery automatically supports load anytime AC fails
- Low voltage disconnect protects battery from total discharge
- Automatic periodic battery health diagnosis
- High operating temperature range to 70° C
- Alarm contacts: AC fail, battery fault
- Communication MODBUS via RS-45 Interface (DIN-UPS-48-10/24-20/12-35)
- CE Approved/Designed to UL 1950

Model	Output Voltage	Power	MODBUS	Dimensions (H x W x D)	Weight (Lbs.)
DIN-UPS 12-10	12 VDC	10 Amps	NA	4.5" x 2.6" x 5.3"	2
DIN-UPS 12-35	12 VDC	35 Amps	Yes	4.5" x 5.9" x 5.3"	4
DIN-UPS 24-10	24 VDC	10 Amps	NA	4.5" x 3.9" x 5.3"	2
DIN-UPS 24-20	24 VDC	20 Amps	Yes	4.5" x 5.9" x 5.3"	4
DIN-UPS 48-5	48 VDC	5 Amps	NA	4.5" x 3.9" x 5.3"	2
DIN-UPS 48-10	48 VDC	10 Amps	Yes	4.5" x 5.9" x 5.3"	4

DIN-Rail DC UPS

Specifications

Front Panel LED Indicators:

- Power Source: AC or on back up
- Battery and System Diagnostics (via blink code)

Settings/Selectors:

- Battery Type: Lead Acid, Gel-Cell
- Charge Current Limit: 20 - 100% of charge rating
- Back-Up Run Time on Batteries:
 - Programmed time limit: 1 - 60 min. (48-10, 24-20, and 12-35 models only)
 - Or
 - Until LVD disconnect (all models)
- Power Restore Button: re-connects battery without AC present

Signal Outputs (form C):

- AC Fail - operating on back-up power
- Battery abnormal condition (summary contact): Discharged, damaged, disconnected
- MODBUS Communication (DIN-UPS 48-10/24-20/12-35 only)

Temperature: -25 to +70° C. Continuous to 50°, de-rate 2.5% per° C >50° C (50% output @ +70° C)

Cooling: Free air, convection

Protection:

- Low Voltage disconnect at 1.5 volts per cell
- Internal fuse
- Current limiting
- Short circuit and reverse polarity protection
- Thermal overload shut down and recovery

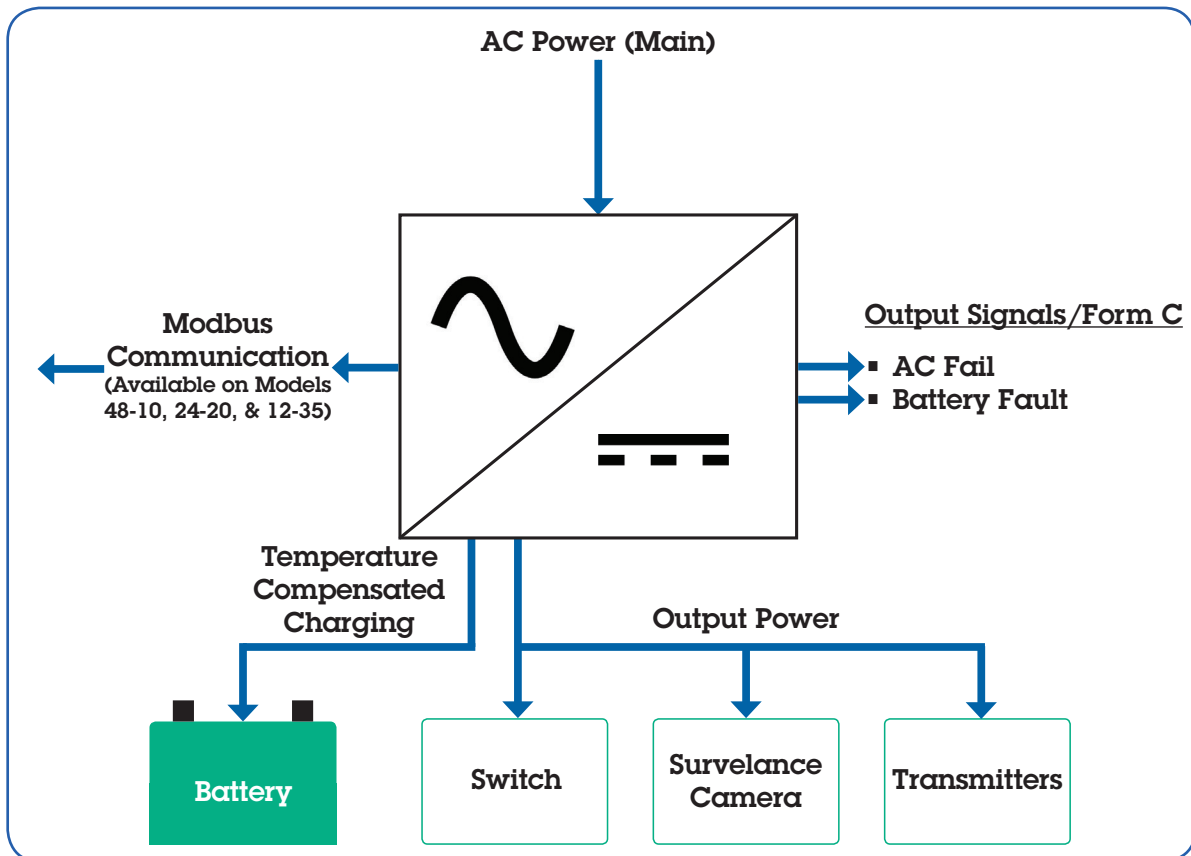
Terminal Blocks: Screw type

Mounting: DIN Rail Bracket (35mm)

Optional:

- Battery temp. comp. probe (468-4510-0)
- BDA/DAS version w/ NFPA compliant alarm signals (models DIN-UPS 48-10, 24-10 and 12-10)

Typical DC UPS Application



Site Power Monitor



Web-enable and integrate intelligence of automation and process control power with 24/7 monitoring, alarm condition notification, and data logging of vital electrical functions. All programmable, accessible, and managed via the Internet: TCIP or SNMP. View current conditions and log 30 day history of DC and AC power status at remote sites before dispatching personnel.

The Site Power Monitor is designed specifically for monitoring power supplies, rectifiers, batteries, converters, inverters, UPS, distribution panels, and AC power for automated industrial applications via Ethernet or Wireless connection. The palm sized unit is DIN Rail mounted and is easily adapted to virtually any make of power system via nine sensor input ports which capture and stream critical data via the Internet for analysis and logging of site history. Web page based programs are easily user configured for site parameters with up to 50 desired alarm conditions settings and multiple automatic notification options by e-mail and text message.

Sites without Internet access can use the monitor solely as a data logger that captures and retains 30 days' data, ready for download to lap top for site history file and analysis of component performance and failure conditions.

Sensors/Inputs

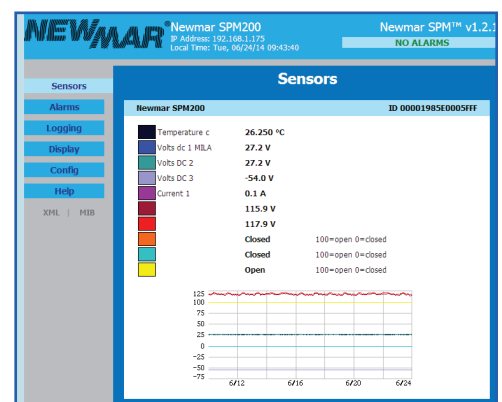
- DC Bus/Battery Voltage
- DC System Amperage/Battery Charge-Discharge Current
- AC Voltage
- Ambient Temperature
- Dry Contacts/Alarms
- Ethernet Camera

Firmware

- Programmable Alarms
- Data Logging
- Remote Firmware Update Capable

Reporting Via

- Internet – Built-in Web Server
- E-Mail
- Text Message
- SNMP



Sensors Web Page Screen Shot

Model	Input Voltage	Monitoring Ports				Dimensions (H x W x D)	Weight (Lbs.)
		VAC	VDC	DC Current	Dry		
SPM-200	9-60 VDC	2	3	1	3	3.27" x 4.66" x 2.18"	1

Site Power Monitor

Specifications

Inputs

Power Source Voltage: 9-60V DC negative/positive ground, 250 mA max.

Monitor Inputs: 9 Total

VDC: 3 Ports

- 2 each: 0-40 VDC
- 1 each: 36-60 VDC
- Accuracy: +/- 2%

VAC: 2 Ports

- 120/240 (90-264) utility power (L-N or L-L)
- 120/240 inverter output (floating)
- Accuracy: +/-2%

DC Current: 1 Port

- +/- 100mv, 100 amp differential shunt voltage
- Read battery charge/discharge current, or load current
- Shunt provided
- Accuracy: +/-3%

Dry Contact Switch Sensors: 3 Ports

- Possible uses: door open, water leak detection, smoke alarm, component fail, breaker trip, high temperature

Installation Options

- NEMA 4x Enclosure with 35MM DIN Rail Installed
Model: **DIN-ENC-748**
(7.75" H x 4" D x 8.65" W)
- 19" Rackmount Bracket
Model: SPM-RM
- RJ-45 Ethernet Surge Protector for Cat 5e networks. See catalog page 8 for information on the DIN-ETH Surge Protector series.

Reporting/Alarms

- Ethernet Port connection: RJ-45, 10/100 auto-sense
- HTTP – Web Access, Self-generated Web-page
- SNMP – MIB with Gets, Traps, and Clears
- Alarms – HIGH and LOW trip, 50 max, user-programmable
- Logging – Excel logs created, time stamped, continuous graphing

Data Screens

- Sensors
- Alarm settings (customized web page)
- Data logging
- IP Camera feeds (4 max.)

Data logging: Remote Or Download Locally:

- 30 days + rolling history with 30 second interval refresh, CSV file compatible

Diagnostics LED Indicators

- Input Power ON/OK, System OK, Flashing Activity Indicator Ethernet port

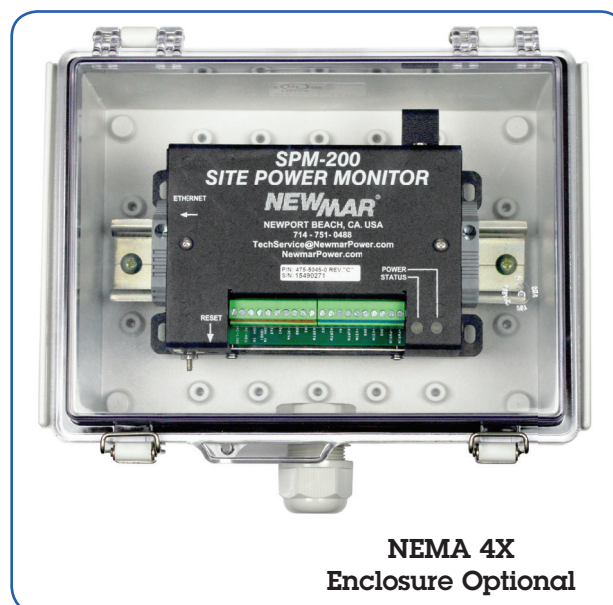
Mechanical

- Aluminum, Powder Coat
- Connections via plug-in terminal block
- 35mm DIN Rail mount

Environmental

Operating Temperature range -20° C to 60° C

Warranty: 2 years



DIN Mount Battery Brackets

DIN Mount Battery Brackets

These DIN Rail mount battery brackets simplify integrating reserve power in 12 and 24 volt DC UPS applications. Various capacities are available to select the proper size for your installation. The lower power model (DIN-BAT),

2.4 and 1.2 AH, are supplied with batteries already installed. For the higher capacity brackets, (DIN-BKT B & C) order the battery separately (see battery selection page opposite page).

All models have 35mm DIN Rail clips and an integral fuse for protection. The larger brackets (size B and C) also include 4 hanging points to transfer battery weight from the DIN Rail to the back wall of the mounting surface.

Size A Bracket with Battery Installed

The DIN Rail mount assembly contains two 1.2 amp-hour batteries. This versatile battery pack is allows user to select 12 or 24 volt configuration by inserting jumpers on the front panel. Over-current protection provided by integral 15 amp self-resetting fuse. See battery operation specifications on page 5.

Model

DIN-BAT-A 12/24

Size A
Voltage Selectable
by Jumper

12V, 2.4 AH, 24V, 1.2 AH
Battery Included

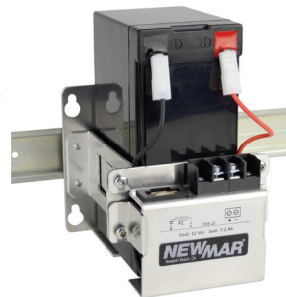


Size B: Single 7 Amp-Hour Battery Bracket (Order Battery Separately)

DIN Rail Mount bracket with back wall hanging points for supplemental mounting strength in high vibration installations accommodates one 7 amp-hour battery. Bracket assembly includes battery wiring with insulated fast-on connectors, output terminal block, and 25 amp fuse for over current protection.

Model

DIN-BKT-B



**Size B Bracket Shown
with Battery Installed**



Size B Bracket

Size C: Dual 7 Amp-Hour Battery Bracket (Order Battery Separately)

DIN Rail Mount bracket with back wall hanging points for supplemental mounting strength in high vibration installations accommodates two 7 amp-hour battery. Bracket assembly includes battery wiring with insulated fast-on connectors, output terminal block, and 25 amp fuse for over current protection.

Model

DIN-BKT-C



**Size C Bracket Shown
with Batteries Installed**



Size C Bracket

Model	Voltage	Capacity	Battery	*Dimension (H x W x D) mm	Weight with Battery	Weight w/out Battery
DIN-BAT-A 12/24	12/24	2.4/1.2	Included	98 x 48 x 55	3	N/A
DIN-BKT-B	12	7.0	Order Separately	155 x 105 x 125	7	1
DIN-BKT-C	12/24	14.0/7.0	Order Separately	155 x 170 x 125	14	1

*With battery installed

Batteries

BATT 1.2 Amp-Hour

Application: 2 each used in Model DIN-BAT-A 12/24

VRLA Type: 12 Volt

General Specifications

Capacity Ratings	Amp Hour
20 hour to 1.75 vpc 30° C	1.2
10 hour to 1.75 vpc 20° C	1.1
5 hour 1.70 20° C	1.0
1 hour to 1.6 vpc 20° C	0.7

Discharge Ratings	Amps
Maximum	12
Short circuit	36

Operating Temperature	°C
Charge	-15 to 50
Discharge	-20 to 60

Dimensions/Weight	(L x W X H) mm/Lbs.
	97 x 48 x 55/2



BATT 7 Amp-Hour

Application:

- 1 each used in DIN-BKT-B
- 2 each used in DIN-BKT-C

VRLA Type: 12 Volt



General Specifications

Capacity Ratings	Amp Hour
20 hour rate of 0.35 A to 10.5 V	7.0
10 hour rate of 0.65 A to 10.5 V	6.5
5 hour rate of 1.19 A to 10.2 V	5.95
1 hour rate of 4.2 A to 9.6 V	4.2

Discharge Ratings	Amps
Maximum	40
Short circuit	210

Operating Temperature	°C
Charge	-15 to 50
Discharge	-20 to 60

Dimensions/Weight	L x W X H mm/Lbs.
	150 x 65 x 100/2

DC Converters/Isolation Modules

DC-DC Converters

These DIN Rail mount converters provide efficient conversion of various DC sources; 12, 24, and 48 to lower/higher DC voltage for powering specialized secondary loads such as POE injectors, IIoT devices, and other sensors. Precise regulation delivers proper voltage over a wide input range, and excellent isolation ratings and protection circuits prevent damage to loads.

Features

- Wide input voltage range
- Precise output regulation meets tight power tolerances of sensitive loads
- 125% peak power
- >85% efficiency
- Numerous protection features
- 35mm DIN Rail mount

Model	Input VDC	Output	
		Volts DC (adjustable)	Amps
DIN-DC 12-24-5	10.5 - 18	24 (23.0 - 27.5)	5
DIN-DC 24-12-7	18 - 36	12 (12.0 - 15.0)	7
DIN-DC 48-12-8	36 - 72	12 (12.0 - 15.0)	8
DIN-DC 48-24-5	36 - 72	24 (23.0 - 27.5)	5

Protections

- High Isolation Ratings: same as Isolation Module (see below)
- Input over-voltage
- Output Overload
- High temp shutdown (Operating Temp: -20 to +50° C)
- Internal fuse



Case Size (mm):
115 H x 54 W x 110 D
(all models)



Case Size (mm):
115 H x 54 W x 110 D

DC Isolation Module

This 24 volt isolation module improves sensing accuracy in I/O channels by preventing noise interference that often occurs in common ground configurations. The wide operating input voltages regulates to a user adjustable output to meet precise needs of powered components

High Isolation Ratings:

- Input/Output: 2.2 kVDC
- Input/Ground: 1.4 kVDC
- Output/Ground: 75 kVDC

Model	Input VDC	Output	
		Volts DC (adjustable)	Amps
DIN-ISO 24-24-5	18 - 36	24 (23.0 - 27.5)	5

Surge Suppressors

AC

Utilizing AC surge suppression in DC UPS system design is highly recommended. This fast acting, thermally protected MOV with embedded arc-extinguishing device, provides rapid and reliable voltage suppression. Its high short current rating and thermal disconnect function delivers added protection. Form C and visual indicators report condition of the suppressor module, which is easily removed/replaced from the DIN Rail mount base assembly.

Features

- High Surge Energy capacity protects down stream loads from voltage spikes and line transients
- Thermal protection circuit disconnects load under high energy absorption events
- Fail safe/self-protection design
- Visual red-green indicator alerts when surge module needs replacement
- Remote alarm contact, Form C
- Surge module plugs into DIN Rail mount base assembly for easy replacement in field
- Two pole device provides full protection L-N, L-G, L-G
- Short Current Rating: 200kA RMS
- UL Listed



**DIN-SS Surge Suppressor,
Double Pole**

Model	Nominal Input	Max Continuous Voltage			Surge Suppression			Dimensions (mm)
		L-N	L-G	N-G	L-N	L-G	N-G	
DIN-SS-120	120 VAC, 2 Pole	180	180	180	3140	1570	1570	90 H x 36 W x 65 D
DIN-SS-240	240 VAC, 2 Pole	275	275	275	3660	1890	1890	



Ethernet CAT 5 Surge Suppressor

RJ-485 Ethernet

With the implementation of IIoT, faster data speeds and fragile high speed components dictates use of surge suppressors to protect sensitive equipment from line transients and indirect lighting strikes.

This RJ-485 – Cat 5, 8 wire protection device limits transients with 2-stage protection using gas discharge tubes and transzorb diodes.

Features

- Simple in-line installation by female RJ-485 connectors
- 1000 Mbps Transmission speed
- Low insertion loss <3.0dB @ 80 Mhz
- Operating temp -25to + 70 C
- Models available for 12, 24 & 48 volt
- 35mm DIN Rail mount

Model	Nominal DC Voltage	Max. Continuous Voltage	Dimensions (mm)
DIN-ETH-12	12	15	85 H x 25 W x 40 D
DIN-ETH-24	24	28	
DIN-ETH-48	48	60	

Circuit Breakers

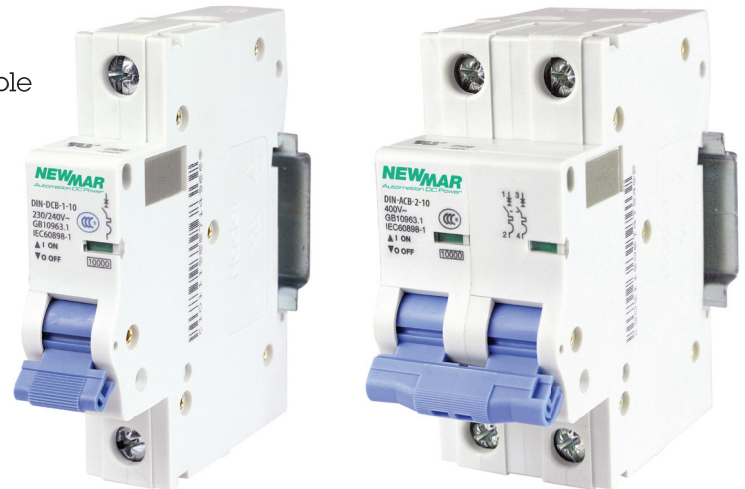
AC

These DIN Rail circuit breakers provide overcurrent protection and quick disconnect of AC input power to DC UPS and other systems. Available in single and double pole configurations

Features

- Screw clamp, shock-proof wire terminations
- Visual trip indicator
- UL 1077 Recognized
- Medium trip, for use most industrial loads (fast and time delay type available on special order)
- 35mm DIN Rail mount
- In stock ratings: 4, 6 and 10 amp, single & double pole (Other ratings available on special request, contact factory)

Model	Poles	Rating (Amps)
DIN-ACB-1-4	1	4
DIN-ACB-1-6	1	6
DIN-ACB-1-10	1	10
DIN-ACB-2-4	2	4
DIN-ACB-2-6	2	6
DIN-ACB-2-10	2	10



Single Pole
82 H x 18 W x 75 D mm

Double Pole
82 H x 36 W x 75 D mm

DC

Utilize for power distribution to protect and control power to DC loads, also configure as battery breaker. Single pole.

Features

- Screw clamp, shock-proof wire terminations
- Visual trip indicator
- UL 1077 Recognized
- Medium trip, for use most industrial loads (fast and time delay type available on special order)
- 35mm DIN Rail mount
- In stock ratings: 4, 10, 25 and 40 amp single pole (Other ratings and double pole available on special request, contact factory)

Model	Poles	Rating (Amps)
DIN-DCB-1-4	1	4
DIN-DCB-1-10	1	10
DIN-DCB-1-25	1	25
DIN-DCB-1-40	1	40



DC Single Pole
82 H x 18 W x 75 D mm

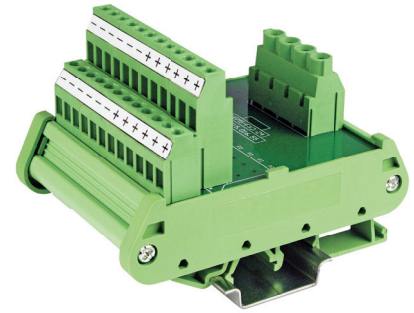
Wiring/Installation Accessories

Power Distribution

Use this distribution block to route power to multiple DC loads with secure connections and clean wire routing. Its screw type terminations are configured for two redundant DC input power sources, and 12 load distribution.

Features

- 30 amp capacity
- Compact: 12 outputs within 67mm width
- 2 Parallel input terminals for redundant power sources
- Screw clamp terminals
 - 10 awg input
 - 12 awg output
- 35 mm DIN Rail mount
- 250 VDC/AC rating



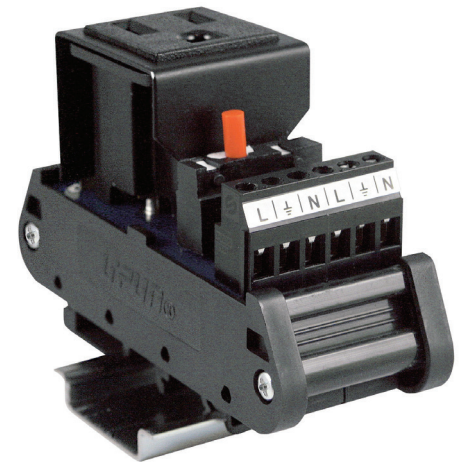
Model	Input	Output	Capacity (Total)	Size (mm)
DIN-DST-2-12	2	12	30 Amps	66 H X 1.4 W x 92 D

AC Outlet

Din rail mount single AC outlet module provides quick snap on installation; no holes to drill and tap. 5 amp resettable circuit breaker protects against powering high current devices from the outlet. Second set of terminals provides power junction/distribution point.

Features

- AC outlet with push to reset breaker.
- Led indicates outlet is live
- Screw clamp wire terminations, 12 awg
- Dual terminals to power other devices
- UL recognized component

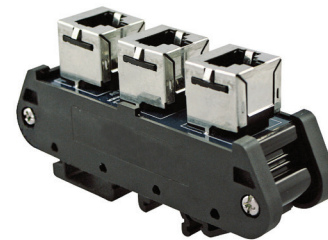


Model	Amps		Size (Inches)
	Outlet	Terminals	
DIN-AC0	5	15	3.6 H x 1.4 W x 3.6 D

Ethernet Patch Panel

Compact Din rail mount patch panel provides interconnection point for 3 Ethernet RJ45 cables

Model	Size (Inches)
DIN-EPP-3	3.6 H x 1.0 W x 2.0 D



Rackmount DIN Rail Bracket

The DIN Rack Bracket provides a sturdy and secure method to mount din rail components in a 19" rack. The 2 RU bracket with 35mm DIN Rail attached at 6.5" recess reduces component projection from the front of the rack.

Welded steel construction provides strength to accept a variety of industrial DIN mount equipment, with air circulation vents and cable pass through openings for clean wiring.



Model	Size & Description
DIN-RACK	19", 2 RU, 6.5" Rail Set Back



Table of Contents

AC Outlet	10	Ethernet RJ-485 Surge Protector	8
Batteries	6	Power Distribution	10
Battery Brackets	5	Rackmount DIN Rail Bracket	10
Circuit Breakers	9	Site Power Monitor	3-4
DC-DC Converters	7	Surge Protectors	8
DC Isolation Modules	7	Wiring/Installation Accessories	10
DC UPS	1-2	Web Based Power Monitor	3-4
Ethernet Patch Panel	10		

www.AutomationDCPower.com



P.O. Box 1306 Newport Beach, CA 92663
2911 W. Garry Ave, Santa Ana, CA 92704
Phone: 714-751-0488 ■ Fax: 714-957-1621
E-mail: salesADP@newmarpower.com

Distributed By: