SIEMENS

Data Sheet
Fire Safety & Security Products

FACP Accessories

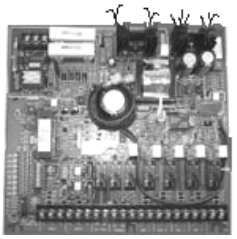
PAD-3 Distributed Power Supply Unit

Notification Appliance Circuit Extender

Models PAD-3, PAD-3R, PAD-3-MB, EN-PAD and EN-PAD-R

ARCHITECT AND ENGINEER SPECIFICATIONS

- **24VDC output voltage**
- **Ground-fault detection**
- **Advanced microprocessor control**
- **Power supply supports NAC power**
  - Up to 6A @ 170W, via Siemens Model PAD-3
- **3 Amps of auxiliary-power output**
- **'Form C' *Trouble* monitoring dry contact**
- **Four (4), power-limited notification appliance circuits (NACs)**
- **Power supply supports NAC power**
  - Up to 6A @ 170W, via Model PAD-3
- **Optional built-in strobe synchronization**
  - Supports coded audible signals including Temporal 3 pattern
- **Battery supervision and control**
- **Packaged in self-contained, sheet-metal enclosure**
  - Easily capable to house the required 7AH back-up battery set



PAD-3-MB

Model EN-PAD
[Black enclosure]

- **Multi-module mounting in System 3™ enclosures**
  - Multiple modules share battery set
- **Americans with Disabilities Act (ADA) Compliant**
- **UL 864 9th Edition Listed, ULC S527-11 Listed; FM, CSFM & NYC Fire Department Approved**

Product Overview

Used with Siemens – Fire Safety fire alarm control panels (FACPs), the Distributed Power Supply Unit (Model PAD-3 series) is a NAC expander with a built-in, auxiliary-power output. Each unit is designed to provide additional power for visual indicators in buildings that conform to the Americans with Disabilities Act (ADA).

Each Model PAD-3-series unit provides the following physical characteristics:

- NACs
- Unit enclosure
- Signal-input circuits
- Battery-charging circuit
- *Trouble* relays for remote monitoring
- Diagnostic light-emitting diodes (LEDs)
- Alternating Current (AC) power connection

The Siemens NACs, which connect with alarm signaling devices, have been designed to provide the highest level of reliability and performance.

Specifications

Each unit provides 6A @ 24VDC power for multiple uses, and all 6 Amps can be directed to four (4) NACs. Each NAC is power limited; rated at 3A. Either one (1) or two (2) inputs can control the four (4) outputs. These outputs are compatible with all Siemens – Fire Safety 24VDC notification appliances.

In order to makes the outputs easily programmable, this version of the Siemens Auxiliary Power Supply (Model PAD-3) can be configured in the following manner:

- 'STEADY' outputs
- Synchronized strobe outputs
- American National Standards Institute (ANSI) Temporal 3

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Specifications – (continued)

Each PAD-3 NAC extender unit can be configured in a way that each input circuit can be programmed as steady output, ANSI temporal output, or synchronized strobe output. Also, programming can be set so one (1) input will silence the audible signal on Siemens Models AS-series, NS-series, or ZH-series horn and horn-strobes while the strobes remain active.

Model PAD-3 is capable of operating other components within a Siemens fire alarm system, such as door holders, via 3 Amps @ 24VDC max of power-limited auxiliary output. When using this output, the total power available from the NAC extender unit cannot exceed 6 Amps.

A 'Form C' dry contact is provided for monitoring *Trouble* conditions through each input. In addition, a 'Form C' *Trouble* contact is provided for monitoring Model PAD-3 connected through the input of a Siemens FACP. The user, therefore, has the option of connecting Model PAD-3 to a notification circuit of a Siemens FACP, or monitoring Model PAD-3 with a Model TRI-series monitoring module on a Siemens intelligent fire system.

Model PAD-3 supervises a variety of functions including:

- Low AC power
- Battery-voltage level
- Earth ground-fault conditions
- Auxiliary output power-limited conditions
- End-of-Line (EOL) supervision *Trouble* condition, or power-limited condition at an output

Model PAD-3 provides 6A at 24 VDC power, directed to two (2) 'Class A' or four (4) 'Class B' power-limited NACs. Each NAC supports up to 3 Amps per circuit. Either one (1) or two (2) inputs can control four (4) outputs, which are compatible with all Siemens – Fire Safety 24VDC alarm signaling devices.

The Model PAD-3 battery charger can charge up to 15AH batteries. Each unit is packaged in its own sheet-metal enclosure with sufficient space to house up to 7AH battery sets. PAD-3 enclosures are available in either black or red.

When battery sets greater than 7AH are required, the battery set must be housed in a System 3 enclosure or a separate UL / ULC Listed battery enclosure.

System 3 enclosures may also be used to house multiple Model PAD-3 units in a single enclosure, via the Model S3AP Adapter Plate. Two (2) units are capable of sharing the same battery set when mounted in the same enclosure.

Each Model PAD-3 unit complies with seismic certification, pursuant to the following:

- ASCE Standard 7, 2005 Edition
- International Building Code, 2006 Edition
- California Building Code, 2007 Edition
- ICC-ES AC 156, effective 2007
- OSHPD preapproved, under: OSP-0057-10
  - OSHPD CAN 2-1708A.5, Rev. 3

Configuration Options

Option	Input[s]	Output Controls	Circuit Types
1	Input 1	All outputs	'Class B' circuits
2	Input 1	All outputs	'Class B' circuits
	Input 2*	Silences horns on Output 1	—
3	Input 1	Outputs 1 and 2	'Class B' circuits
	Input 2	Outputs 3 and 4	'Class B' circuits
4	Input 1	Output 1	'Class B' circuits
	Input 2	Outputs 2, 3 and 4	'Class B' circuits
5	Input 1	Outputs 1 through 4	'Class A' circuit pairs
6	Input 1	Outputs 1 through 4	'Class A' circuit pairs
	Input 2*	Silences horns on Output 1	
7	Input 1	Outputs 1 and 2	'Class A' circuit pairs
	Input 2	Outputs 3 and 4	'Class A' circuit pairs

** denotes when used with Siemens Model AS, NS or ZH--series horn / strobe NAC devices*

Indicator Lights

AC Power ON:	**Green**
Battery *Trouble*:	**Yellow**
Ground Fault:	**Yellow**
Auxiliary *Trouble*:	**Yellow**
Output 1 *Trouble*:	**Yellow**
Output 2 *Trouble*:	**Yellow**

Technical Data

***Trouble* Contact Rating:** { 'Form C'}	2.5A @ 250VAC, 30VDC
AC Input	2.5A @ 120VDC
Input Configurations:	Two (2) 'Class B' or Two (2) 'Class A'
Input Current:	0.006A, max.
Input Voltage Range:	9 — 32VDC
Auxiliary Power Circuit:	One (1) circuit @ 3A max.
Battery Charging Capacity:	15AH
Notification Circuits:	Four (4) circuits
Ambient Temperature:	32° — 120° F (0° — 49° C)
Relative Humidity:	Up to 93% @ 86° F (30° C); non-condensing
NAC Outputs:	24VDC @ 3.0A each; 24K ohm EOL resistor required on each 'Class B' circuit
Amps per Output Circuit:	3.0
Total Output:	24VDC @ 6 Amps (with Model FP2011-U1)
Output Configurations:	Two (2) 'Class A'; Four (4) 'Class B'; One (1) Class A, Two (2) Class B
Single-Unit Dimensions: { W -x- H -x- D } **PAD-3 enclosure**	12.2" —x— 16.4" —x— 3.1" (31 cm. -x- 41.7 cm. -x- 7.9 cm.)
Colors: **PAD-3 enclosures**	Black or Red

Temperature and Humidity Range

Model PAD-3 is ®UL 864 9th Edition Listed for indoor dry locations within a temperature range of 120+/-3°F (49+/-2°C) to 32+/-3°F (0+/-2°C) and a relative humidity of 93+/-2% at a temperature of 90+/-3°F (32+/-2°C).

Details for Ordering

Model Number	Part Number	Description
PAD-3	599-699189	Up to 6A Pwr. Supply – NAC Extender with black enclosure
PAD-3R	599-699190	Up to 6A Pwr. Supply – NAC Extender with red enclosure
PAD-3-MB	500-699080	Main board used for Model PAD-3 series
EN-PAD	310-099073	Black enclosure for PAD-3 unit
EN-PADR	310-099150	Red enclosure for PAD-3 unit

Note: The Distributed Power Supply Unit is referred as Model PAD-3C in Canada.

Optional Accessory

Model Number	Part Number	Description
PAD-3-UK	500-648449	Battery brackets PAD-3-UK Upgrade Kit

Notice: This marketing data sheet is not intended to be used for system design or installation purposes. For the most up-to-date information, refer to each product's installation instructions.

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