*UL, ULC, and CSFM listed **

Datasheet

LifeAlarm Fire Alarm Controls

4009 Extender Plus

Introduction

Simplex fire alarm control panels with IDNAC signaling line circuits (SLC) outputs provide individual address and control of TrueAlert and TrueAlert ES addressable notification appliances. Use of 4009 Extender Plus panels with an IDNAC card expands the number of IDNAC SLCs for remote locations throughout a building.

With IDNAC SLCs, a constant 29 VDC source is maintained in alarm, even during battery standby. This enables strobes to operate at higher voltage with lower current. This ensures a consistent current-draw and voltage-drop margin under both primary power and secondary battery standby.

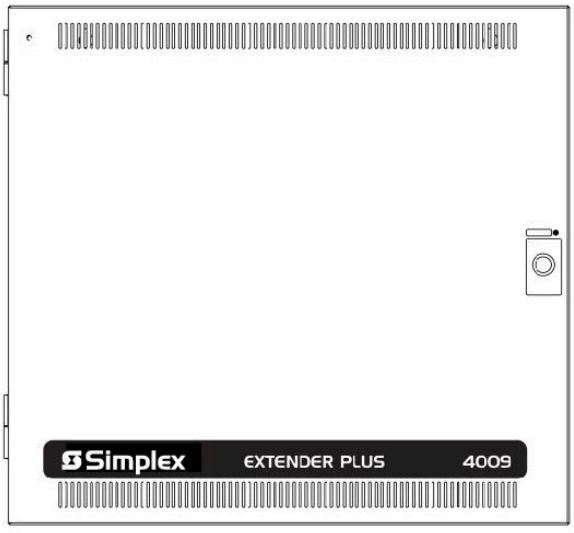
You can save on installation and maintenance with efficiencies such as:

- Longer wiring distances
- Support for more appliances
- Use of smaller gauge wiring

These features also guarantee that appliances that operate during normal system testing also operate during worst case alarm conditions.

You can add a limited variety of optional cards for supporting other field applications. The 4009 Extender Plus communicates over RUI in compatible 4007ES and 4100ES control panels.

Figure 1: 4009 Extender Plus



Features

The 4009 Extender Plus provides enhanced power delivery to TrueAlert and TrueAlert ES addressable notification appliances that are controlled by IDNAC Signaling Line Circuits (SLCs).

- Regulates alarm output voltage at 29 VDC to maintain voltage for AC power and batteries. Appliances can operate at a lower current.
- Wiring distances of up to three times more than conventional notification, increased appliance loading, and smaller wire gauge wiring options.
- Charges batteries up to 18 Ah internally, or batteries up to 110 Ah in an external cabinet.
- Monitors battery, input power, and earth faults statuses.
- Programmable aux relay output (SPDT), normally open and normally closed contact.
- Auxiliary power/simple NAC output.
- Compatible 4007ES and 4100ES Control Panels using RUI Communication.
- Four blocks of PDI space for compatible option cards. See Table 2.
- 11.5 A of total power. 9.5 A when used with an IDNAC card
- UL listed to Standard 864.

* This product has been approved by the California State Fire Marshall (CSFM) pursuant to section 13144.1 of the California Health and Safety Code. See CSFM Listing 7300-0026:0520 for allowable values and/or conditions concerning material presented in this document. Additional listings may be applicable; contact your local Simplex product supplier for the latest status. Listings and approvals under Simplex Time Recorder Co. are the property of Tyco Fire Protection Products.

© 2025 Johnson Controls. All rights reserved.

Product selection

Table 1: 4009 Extender Plus selection

Model	Cabinet color	Description
4009-9701	Red	4009 Extender Plus with cabinet includes four 4x5 PDI block space for select option cards, up to 2 A auxiliary power/simple NAC, and battery charger. 120 VAC or 240VAC, 50 Hz or 60 Hz input, and auto select.
4009-9702	Platinum	
4009-9703	Red	4009 Extender Plus with cabinet and 4100-5451 IDNAC card includes two additional 4x5 PDI block space for select option cards, up to 2 A auxiliary power/simple NAC, and battery charger. 120 VAC or 240 VAC, 50 Hz or 60 Hz input, and auto select.
4009-9704	Platinum	
Note: Compatible 4007ES control panels support a maximum of one 4009-9701 or 4009-9702 4009 Extender Plus units. Compatible 4100ES control panels support a maximum of 31 4009 Extender Plus units.		

Table 2: Compatible option card selection

PID	Description	Installation Instructions	4007ES	4100ES
4100-5451	IDNAC card	579-1289	Not available	One
4100-5450	NAC card	579-1290	Limited by space	
4100-6311	MX card	579-1390	Not available	Limited by space
4100-6312	MX Loop option			
4100-9804 or 4100-6103	DCAI card	579-1029	Limited by space	
4100-3109	IDNET2 card	579-1169	Not available	One
4100-3110	IDNET2+2 card			
4100-3207	4 PT 2 A relay card with feedback	579-1306	Limited by space	
4100-3208	4 PT 10 A relay card with feedback			
4100-3209	8 PT 3 A relay card with feedback			
Note: You cannot add the 4100-5451 in the 4009-9703 or 4009-9704. 4100-5451 is already included in these products.				

Table 3: Battery selection

Model	Description	Comments
2081-9272	6.2 Ah battery, 12 VDC	Requires two batteries for 24 VDC operation. Supports mounting within a 4009 Extender Cabinet
2081-9274	10 Ah battery, 12 VDC	
2081-9288	12.7 Ah battery, 12 VDC,	
2081-9275	18 Ah battery, 12 CDV	
2081-9287	25 Ah battery, 12 VDC	Requires two batteries for 24 VDC operation. Requires an external battery cabinet without a charger. For battery and battery cabinet references, refer to datsheet *System Batteries, Sealed Lead-Acid with Applications Reference for Battery Cabinets, and Battery Cabinets with Charger (S2081-0006)*.
2081-9271	33Ah battery, rectangular, 12 VDC	
2081-9276	33 Ah battery, square, 12 VDC	
2081-9296	50 Ah battery, 12 VDC	
2081-9279	110 Ah battery, 12 VDC	

© 2025 Johnson Controls. All rights reserved.

Technical specifications

Table 4: 4009 Extender Plus specifications and ratings

Item	Rating	
Operating temperature and humidity	32°F to 120°F (0°C to 49°C) Up to 93% relative humidity at 90°F (32°C), non-condensing	
AC input	120 V (50 Hz or 60 Hz): 3.38 A at 11.5 A or 220 V to 240 V (50 Hz or 60 Hz): 1.64 A at 11.5 A	
DC output	19.5 VDC to 29.5 VDC 11.5 A total from all outputs in alarm 5 A total from all outputs in standby Battery charger current does not count against total standby current.	
	Signal power	11.5 A 9.5 A when used with an IDNAC card.
	UL 24V regulated NAC	5 A
	Card power	2 A
	AUX Power/Simple NAC	• 2 A special applications Aux or SNAC, programmable • 1 A, 24 V regulated SNAC
Internal battery charger	Charges up to 110 Ah sealed lead acid batteries. UL-864 and ULC-S527.	
	Charging voltage: typically 27.6 V, peak 29.3 V, dual-rate, temperature compensated.	
	Charging current: 1.3 A or 4.2 A, software configurable	
AUX relay	Form C dry contacts, 2 A at 32 VDC and 30 VAC, resistive load.	
Battery standby current	64 mA standby, 64 mA alarm at 24 VDC	
Capacitive load	10,000 uF total across all Aux power points	

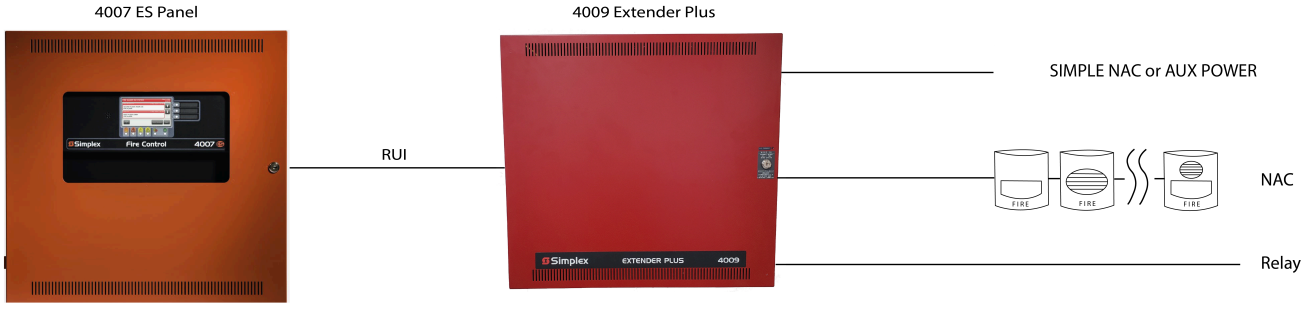
Note:

- The total of SIG, Card and Auxiliary maximum power must be less than the total 4009 Extender Plus current of 11.5 A. Connecting a 24 V regulated NAC circuit to the SNAC or to a card powered by SIG power from the 4009 Extender Plus power supply, for example the 4100-5450 NAC card, reduces the total 4009 Extender Plus current rating to 5 A.
- The battery charger circuit was UL/ULC tested for a 24 hour standby time followed by a 2 Hour Alarm time. For expected holdup times versus battery size and panel loading refer to 0900-012. For combinations outside this chart, you must manually calculate the holdup using the manufacturer's battery specifications and discharge tables, and according to NFPA 72 guidelines.

© 2025 Johnson Controls. All rights reserved.

Typical connections with RUI communications

Figure 2: 4007ES and 4009 Extender Plus connection example



Note: Only one 4009 Extender Plus may be connected to a 4007ES Control Panel.

Figure 3: 4100ES and 4009 Extender Plus connection example

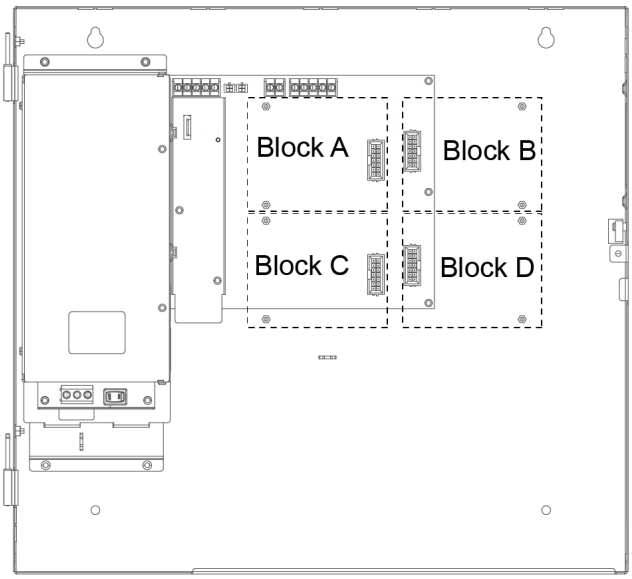


Note: Up to 31 4009 Extender Plus panels can be connected to a 4100ES Control Panel.

© 2025 Johnson Controls. All rights reserved.

Option card layout

Figure 4: Option card block layout

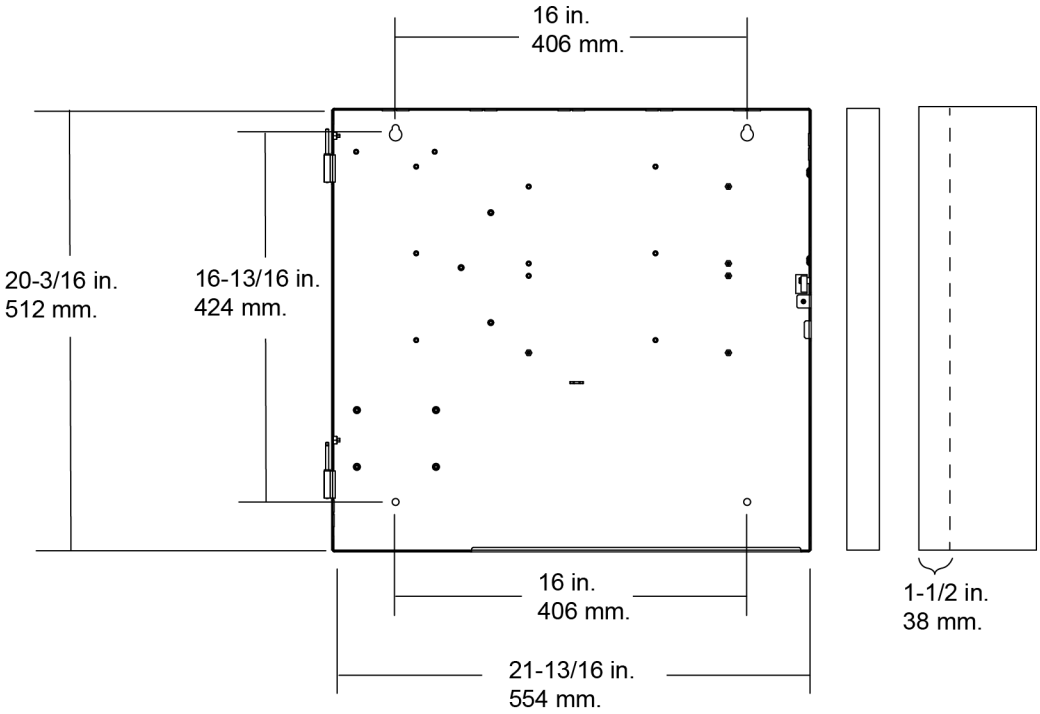


4009 Extender Plus installation requirements

You can semi-flush or surface mount the 4009 Extender Plus.

- Panel attachment requires four 1 1/2 in. or 38 mm lag bolts and four 1/2 in. or 13 mm diameter washers, supplied by others.
- For semi-flush mounting, the front surface of the back box must protrude at least 1 1/2 in. (38 mm) from the wall surface.
- Refer to *4009 Extender Plus Installation Instructions (579-1456)* for detailed installation and mounting instructions.

Figure 5: Back Box installation dimensions and semi-flush mounting



© 2025 Johnson Controls. All rights reserved.

All specifications and other information shown were current as of document revision and are subject to change without notice. Additional listings may be applicable, contact your local Simplex® product supplier for the latest status. Listings and approvals under Simplex Time Recorder Co. Simplex, and the product names listed in this material are marks and/or registered marks. Unauthorized use is strictly prohibited. NFPA 72 and National Fire Alarm Code are registered trademarks of the National Fire Protection Association (NFPA).

© 2025 Johnson Controls. All rights reserved.