Honeywell

NetAXS®

Web-based Access Control System

Honeywell's web-based access control offering now provides solutions for installations of any size. NetAXS® enables users to securely manage their system anywhere there's an Internet connection—with no dedicated PC costs. The user-friendly design makes it simple to install and easy to operate and maintain. NetAXS gives you all the benefits of traditional access control such as helping you secure your doors, manage employee access, and manage sites remotely. It also lets you pull reports easily to meet compliance requirements. With a browser-based interface, your learning curve and training time are significantly decreased. And you don't have to have a dedicated PC—simply log on and you're ready to go, securely—from the office or anywhere. NetAXS has been developed with an installer-friendly design that easily adapts to existing IT infrastructure and methods. This means reduced installation and support cost. Its superior scalability means you can purchase the exact amount of access control you need now—and add doors later as business needs change. Plus, NetAXS integrates with Honeywell's fully-featured WIN-PAK and MAXPRO Cloud softwares to enable more robust and sophisticated NetAXS integrations. So as your system grows, NetAXS grows with you.

System Highlights:

- SIMPLE: Manage your access control anywhere with an Internet connection
- SCALABLE: Purchase the exact amount of access control you need now and easily add doors later
- FLEXIBLE: Compatible with WIN-PAK® XE, WIN-PAK SE, WIN-PAK PE, WIN-PAK PRO CS (managed access) software and MAXPRO Cloud service.

NETAXS OFFERINGS

	ENCLOSURES and ADD-ON BOARDS	
1 Door	**NX1P***	NetAXS-123: One door, compact (plastic) enclosure
	NX1MPS	NetAXS-123: One door, standard (metal) enclosure with power supply and battery
2 Doors	**NX1P***	NetAXS-123: One door, compact (plastic) enclosure
		—and—
	NXD1*	NetAXS-123: One door add-on board
	NX1MPS	NetAXS-123: One door, standard (metal) enclosure with power supply and battery
		—and—
	NXD1	NetAXS-123: One door add-on board
3 Doors	**NX1MPS**	NetAXS-123: One door, standard (metal) enclosure with power supply and battery
		—and—
	NXD2	NetAXS-123: Two door add-on board
4 Doors	**NX4S1**	NetAXS-4: 4 Door control panel (standard enclosure)
	NX4L1	NetAXS-4: Pre-wired 4 door control panel (deluxe enclosure)

*450 mA @ 12 VDC is the maximum current available to power strike, reader(s) and input devices when using a 802.3af Power Over Ethernet (PoE) connection. If additional current is required, an external 12 VDC power supply is needed.

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SYSTEM BENEFITS

User Friendly

Easy to use landing page provides a user-friendly experience so you can provide end user training in less than 30 minutes. Whether you're showing customers how to set up the basic parameters such as time zones and access levels, or teaching them how to add or delete cards, everything you need is all located on one page. Simply log into your IP address and navigate the system like you would any other Internet site.

Dynamic Screen Updates

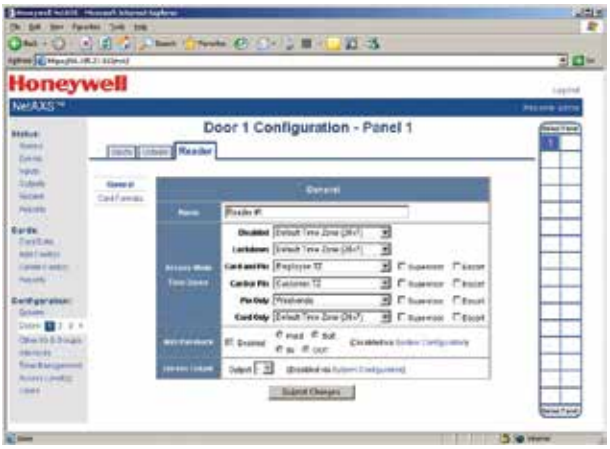
With NetAXS, dynamic screens refresh data automatically without having to refresh the page. This allows status updates from NetAXS to be pushed out to the web screens automatically, without user interaction.

Alarms, events, inputs, outputs, and status screens all automatically update as information is received.

Data transfer between the controller and web browsers has been optimized to reduce bandwidth requirements, improving screen response times.

RS-485 or Ethernet Virtual Loop (EVL) with NetAXS-123

Ethernet Virtual Loop (EVL), a NetAXS-123 feature, for web-hosted systems (EVL is not supported by WIN-PAK), allows up to 16 IP network connected NetAXS-123 controllers to be managed as a group. The group is called a "Virtual Loop" as its functionality is similar to an RS-485 loop. NetAXS-123 downstream panels operating EVL and on the same subnet as the gateway panel are automatically discovered by the gateway panel, greatly reducing installation time and making system expansion easy. Systems using NetAXS-4 or a mix of NetAXS-123 and NetAXS-4 must use RS-485 to loop panels.



Door Access Modes and Options

NetAXS allows you to assign cardholders different levels of access.

Supervisor access allows an employee to present their card once to the reader to give individual access. If the supervisor presents their card twice, they enable access for their team during the specified time zone.

Escort access requires a supervisor escort for a non-supervisor cardholder. The supervisor must present his card first, then the non-supervisor must present his card within ten seconds.

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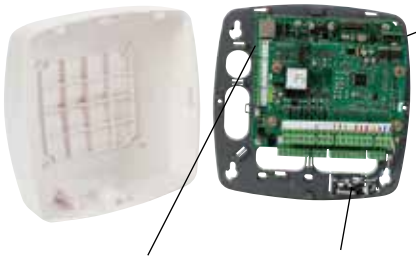
ENCLOSURE OPTIONS

NetAXS-123

NetAXS-123
Compact Plastic Enclosure



PoE or 12 VDC Powered

Built-in Tamper Switch

Control Panel (NXC1)

- Ethernet Port: Connect to web browser, MAXPRO Cloud or WIN-PAK software
- RS485 or Ethernet: Connect panels downstream and/or connect to WIN-PAK software (MAXPRO Cloud 4.0 doesn't support downstream panels.)
- USB Port: Easy setup and diagnostics from your laptop
- Color coded terminal labels
- Removable terminal blocks

Multiple Tie-Down and Grounding Points

- Cleaner and more consistent installations

4 A, 12 VDC Power Supply

- Universal input (100-240 VAC)
- 3.5 A available to power accessories - over 1 A to power each door

NetAXS-123
Standard Metal Enclosure

Terminal Block with Input Fuse

12V Battery Backup

NetAXS-123 Add-On Boards

NetAXS-123
One Door Add-on Board

NetAXS-123
Two Door Add-on Board

NetAXS-4

NetAXS-4
Standard Metal Enclosure

Control Panel (NX4PCB)

- Ethernet Port: Connect to web browser or WIN-PAK software
- RS485 or Ethernet: Connect panels downstream and/or connect to WIN-PAK software
- Built-In PCI Function
- Color coded terminal labels
- Removable terminal blocks

12V Battery Backup

NetAXS-4
Deluxe Metal Enclosure

Pre-Wired Panel Design

Power Door Locks

Fire-Rated Lock Power Release

Noise Suppression Filter

Fused Relay Distribution Module

Convenient 110V Plug

24V Battery Backup

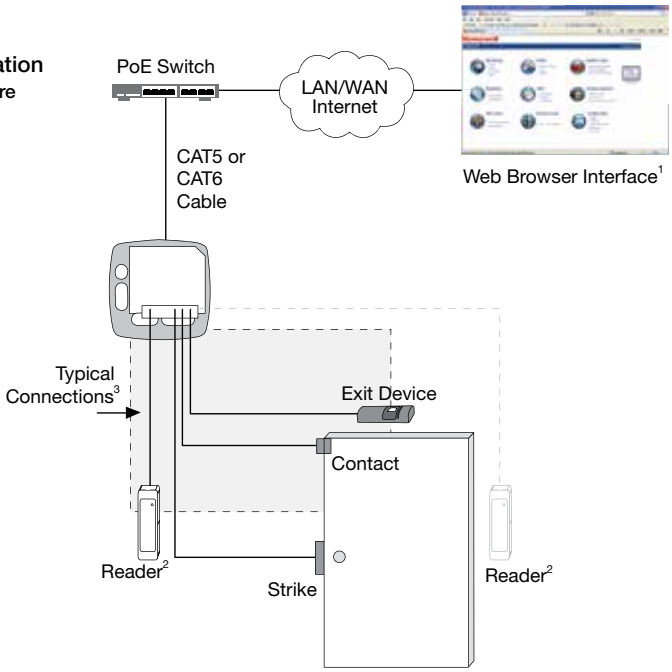
NetAXS®

Web-based Access Control System

SYSTEM OVERVIEW

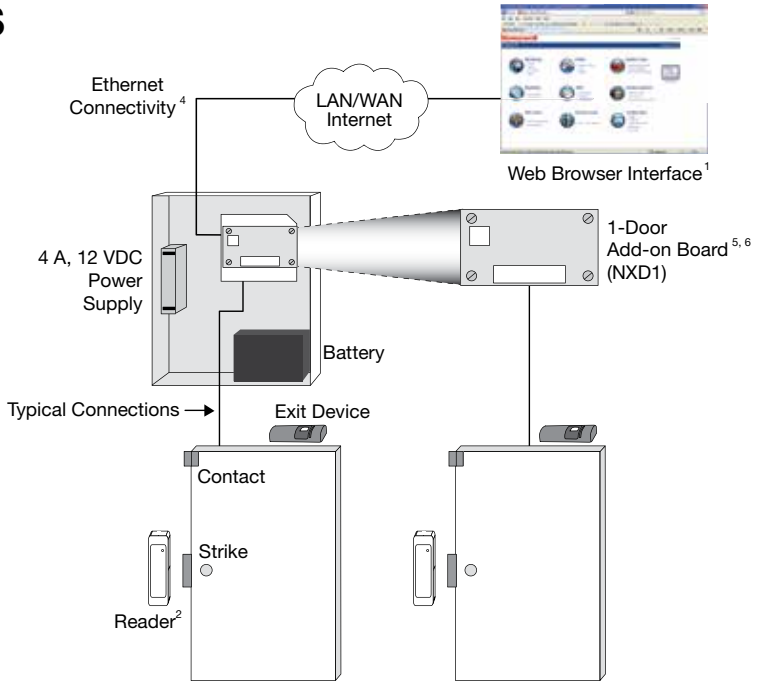
1 DOOR

Typical PoE Configuration
Compact Plastic Enclosure



2 DOORS

1 Door Standard Metal Enclosure
shown with 1-Door Add-on Board



1. Also compatible with WIN-PAK® XE, WIN-PAK SE, WIN-PAK PE and WIN-PAK PRO CS (Managed Access)
2. When using an IN and OUT reader, BOTH readers must have HOLD lines
3. 450 mA, 12 VDC is maximum available to power strike, reader(s) and input devices when using a 802.3af PoE connection. If unit is externally powered with a 12 VDC supply, higher current is available.
4. USB compatibility for local configuration
5. 1-door add-on board compatible with compact plastic enclosure
6. Requires external power when used in compact plastic enclosure
7. 2-door add-on board is not compatible with compact plastic enclosure
8. When mixing NetAXS-123 and 4-door NetAXS (NetAXS-4) controllers, the NetAXS-123 must be configured as the first panel or gateway

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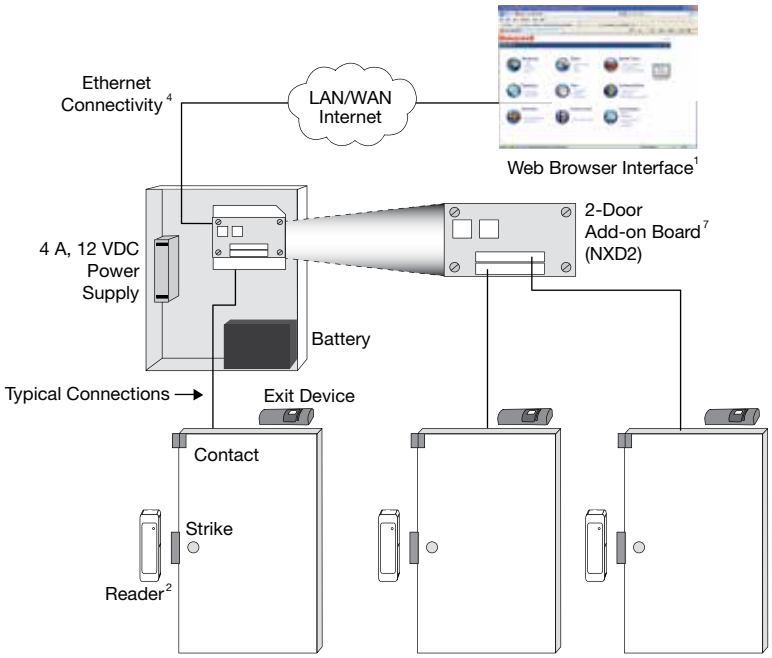
SYSTEM OVERVIEW

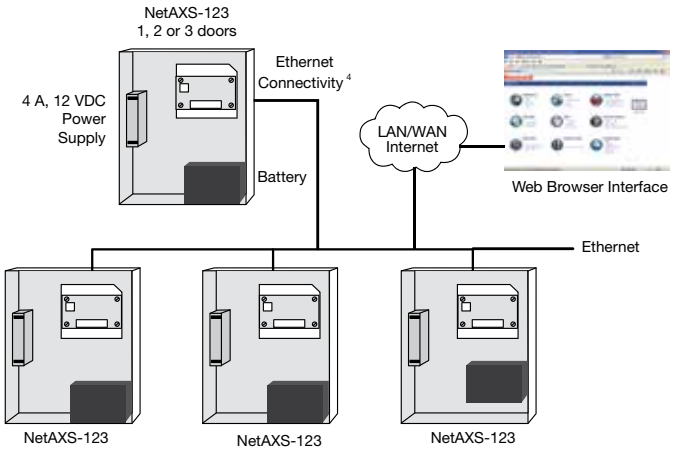
3 DOORS

1 Door Standard Metal Enclosure
shown with 2-Door Add-on Board



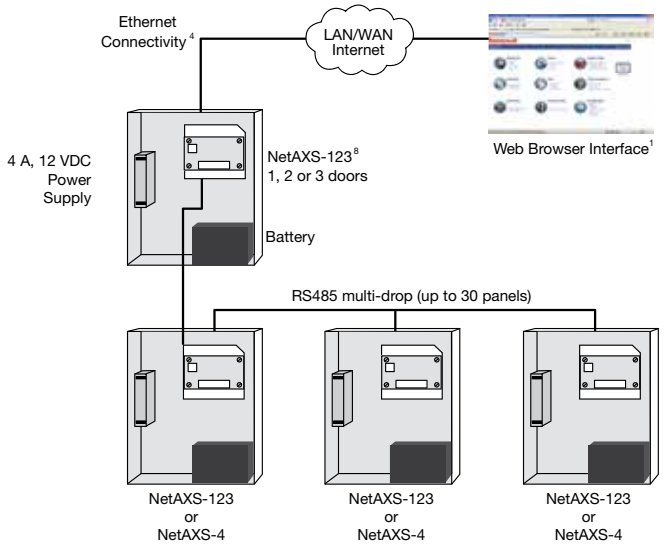
>3 DOORS

Scalable Architecture
Ethernet Virtual Loop



>3 DOORS

Scalable Architecture
RS-485 panel loop



1. Also compatible with MAXPRO Cloud WIN-PAK® XE, WIN-PAK SE, WIN-PAK PE version 3.3 or higher and WIN-PAK PRO CS 4.2 or higher (Managed Access)
2. When using an IN and OUT reader, BOTH readers must have HOLD lines
3. 450 mA, 12 VDC is maximum available to power strike, reader(s) and input devices when using a 802.3af PoE connection. If unit is externally powered with a 12 VDC supply, higher current is available.
4. USB compatibility for local configuration
5. 1-door add-on board compatible with compact plastic enclosure
6. Requires external power when used in compact plastic enclosure
7. 2-door add-on board is not compatible with compact plastic enclosure
8. When mixing NetAXS-123 and NetAXS-4 (version 3.04.15 or higher) controllers, the NetAXS-123 must be configured as the first panel or gateway
9. NetAXS-123 v5.0 or later supports Ethernet Virtual Loop (EVL). NetAXS-4 DOES NOT SUPPORT EVL. Therefore, systems using EVL must use NetAXS-123 panels.

SPECIFICATIONS AND FEATURES

		NetAXS-123		NetAXS-4	
					
		NX1P	NX1MPS	NX4S1	NX4L1
READERS/DOORS	Door/Reader Capability	1 DOOR Controller[1,4]	1, 2 or 3 DOOR Controller (NXD1 or NXD2 add-on board is required for 2nd or 3rd door)	Four READER controller	
	Expandability	Expandable up to 93 DOORS (186 readers) per controller loop[2,3]		Expandable up to 124 doors (124 readers) per controller loop[2,3]	
	Dual Reader Control Capability (IN/OUT Reader per Door)	YES[5] – IN and OUT reader capability per door (readers must have HOLD line capability)		--	
	Reader Compatibility	Standard Wiegand protocol supported ABA not supported		Standard Wiegand protocol supported ABA not supported	
OUTPUTS	Number of Outputs	Two SPDT relays (jumper selectable NO or NC contacts) per door rated at 3 A @ 28 VDC Two open collector outputs (OC) (16 ma, 12 VDC): reader LED (Aux) and reader buzzer (Aux) per door are available.		Eight SPDT, Form C relays rated at 10 A @ 28 VDC Eight open collector outputs (OC) (16 ma, 12 VDC): 4 reader LED (Aux Output) and 4 reader buzzer (Aux Output) are available.	
	Output Expandability	2-door solution has 8 total outputs: 4 relays, 4 OC (requires NXD1 add-on board); Expandable[10] to 72 total outputs using a maximum of four (4) NX4OUT relay output boards.	2-door solution has 8 total outputs: 4 relays, 4 OC (requires NXD1 add-on board) 3-door solution has 12 total outputs: 6 relays, 6 OC (requires NXD2 add-on board); Expandable[10] to 76 total outputs using a maximum of four (4) NX4OUT relay output boards.	4-door solution expandable to 72 total outputs using a maximum of four (4) NX4OUT relay output boards.	
	Relay Power Source	Selectable: +12 VDC self-powered - OR - 0 to 28 VDC externally supplied source		0 to 28 VDC externally supplied source	+24 VDC self-powered
INPUTS	Number of Inputs	Controller has a total of six configurable four-state supervised input points. (Factory default settings are Status, REX, Reader Tamper A, Reader Tamper B, Power Fail and General Input)		14 configurable four-state supervised input points	
	Input Expandability	2-door solution has a total of 10 inputs (requires NXD1 add-on board); Expandable[10] to 74 total inputs using a maximum of two NX4IN relay input boards.	2-door solution has a total of 10 inputs (requires NXD1 add-on board). 3-door solution has a total of 14 inputs (requires NXD2 add-on board); Expandable[10] to 78 total inputs using a maximum of two NX4IN relay input boards.	4-door solution expandable to 78 total inputs[5] using a maximum of two NX4IN relay input boards.	
	Power-Fail and Panel Tamper	Yes	Yes	Yes	Yes
	"Off the Wall" Tamper Capability	Yes	--	--	--
POWER INPUT	Unit Input	Power over Ethernet (PoE) 802.3af or external 12 VDC supply	93 VAC to 264 VAC, 50/60 Hz input provides 12 VDC, 4 A output	120 VAC, 6 A, 60 Hz input for wall transformer provides 16.5 VAC @ 50 VA output	115 VAC, 60 Hz, 2 A power supply input provides 24 VDC, 6 A output
	Socket or Hardwire AC Input	--	Yes	--	Yes
	Control Board Power Input	Power over Ethernet (PoE) or +12 VDC	+12 VDC from included power supply	16.5 VAC from included wall mount transformer	+24 VDC from included power supply
POWER OUTPUT	Power for Reader(s) and Input Devices	450 mA, 12 VDC is available to power strike, reader(s) and input devices when using PoE If higher current is needed, power by external 12 VDC supply	1.15 A per door for locks/strikes, readers and input devices (3.5 A @ 12 VDC total)	600 mA auxiliary current available to power the readers and other devices	600 mA auxiliary current available to power the readers and other devices
	Power for Locks/Strikes			Locks/strikes must be externally powered	1.1 A per door for locks/ strikes (4.4 A @ 24 VDC total)
	Backup Battery System	External[6]	12 VDC, 7 AH battery	12 VDC, 7 AH battery	Two 12 VDC, 7 AH batteries
ENCLOSURE	Material	High Impact Plastic	Metal	Metal	Metal
	Physical Enclosure Size	7.75"H x 7.75"W x 2.75"D	13.9"H x 11.9"W x 4.7"D	18"H x 15"W x 4.5"D	23.9"H x 17.7"W x 4"D
	Wiring Access Holes/Knockouts	7	19	8	30
INSTALLATION	Removable Terminal Blocks with Color Coded Labels	Yes	Yes	Yes	Yes
	Graphic Wiring Cards/Labels	Yes	Yes	Yes	Yes
	Captive Mounting Hardware	Yes	Yes	--	--
	Cable Shield Termination Points	--	Yes	Yes	Yes
SYSTEM INFORMATION	Real Time Clock	Global Geographic Time Zone Support Daylight Saving Time Support			
	Clock Synchronization	Yes - via NTP network server			
	Processor	Freescale Coldfire 32-bit		Freescale Coldfire 32-bit	
	System MTBF (mean time between failures)	250,000 hours		250,000 hours	
	Temperature Ratings	32 to 120˚F (0˚C to 49˚C) Operating; -67 to 185˚F (-55˚C to +85˚C) Storage			
	Certifications and Approvals	CE and FCC compliant UL-294 listing		CE and FCC compliant UL-294 listing	FCC compliant UL-294 listing

SPECIFICATIONS AND FEATURES

		NetAXS-123		NetAXS-4	
					
		NX1P	NX1MPS	NX4S1	NX4L1
LEDs	Status LEDs	12 LEDs total (12V power, PoE, over current, Ethernet, RS485, reader(s), door state, run, relay status)		19 LEDs total (Power, system run, Ethernet, loop, downstream, readers, relay status)	
COMMS	Built-in Communication Options	Ethernet, USB[8], RS485		Ethernet, RS485	
	I/O Expansion Module Connectivity	Use RS485 port to connect a maximum of 6 downstream I/O modules (4 output and 2 input)		Use RS485 port to connect a maximum of 6 downstream I/O modules (4 output and 2 input)	
	Controller Loop Capability	Total of 16(EVL)/31(RS485) panels in a loop[2,3]		Total of 31 panels in a loop[2,3]	
HOST	Software Compatibility[9]	MAXPRO Cloud, WIN-PAK XE/SE/PE/CS – See Note 9 below			
	NetAXS-123 as Gateway Panel	Supported downstream panels include NetAXS-123 and NetAXS-4 See notes 2 & 3.			
	NetAXS-4 as Gateway Panel	Currently supported downstream panels include NetAXS-4 only See notes 2 & 3.			
	using PCI3 Converter	Supported downstream panels include NetAXS-123, NetAXS-4, N-1000 family and NS2			
	using N-485-PCI-2 Converter	Not compatible with NetAXS-123 or NetAXS			
DOOR CONTROL	Door Control Modes	Card only, card and PIN, card or PIN, PIN only, lockdown, disabled, supervisor, escort, limited use card, expire on date, first card rule, snow day rule, time zone toggle, anti-passback, duress[5]			
	Interlocks for custom actions	Yes	Yes	Yes	Yes
	Anti-Passback Capability	Local and global capability, hard and soft implementation NetAXS-123 allows anti-passback using In and Out readers per door (local and global)[5]			
CARDS and DATABASE	Card and Event Buffer Capacity	10,000 card capacity, 25,000 event capacity			
	Firmware Revision	On-board flash memory for field firmware revision updates and feature expansion			
	Offline Database backup available	Card and configuration databases			
	Export Capabilities	Card database, alarms and events (CSV format)[5]			
	Number of Card Formats	128 unique card formats can be supported[5]			
	Site Codes	8			
	Maximum Card Format Size	75-bit (maximum card # = 64-bits)[5,7]			
	Time Zones	127[5]			
	Access Levels	128			
	Holidays	255[5]			
REPORTING and ANALYSIS	Integrated basic reports	Yes	Yes	Yes	Yes
	Import/export of card database	Yes	Yes	Yes	Yes
	Alarms and events can be exported and saved in offline storage	Yes	Yes	Yes	Yes
EMBEDDED WEB SERVER	Supported Browsers	Internet Explorer and Mozilla Firefox			
	Icon Driven Landing Page	Yes	Yes	--	--
	Web Browser Control	Full control monitor and view live events manually control doors and readers			
	Web Server Support	All access control functions			
	Secure Web Browsing	SSL and SHA-1 secure socket layer encryption			
	Dynamic Screen Refresh	Yes			
	Multiple user connections	Yes	Yes	Yes	Yes
WORLDWIDE ACCEPTABILITY	Global Languages Supported	English, Italian, French, Dutch, Spanish, Czech, Simplified Chinese and Arabic		English, Italian, French, Dutch, Spanish, Czech and Simplified Chinese	
	Quick Start Guides	Yes	Yes	--	--
	Full User and Installation Guides	on product CD	on product CD	Printed	Printed
	Multi-Language Basic Installation Guides	Yes	Yes	--	--
	User Translated Files	Customer ability to export, import, modify, create and add language files. Can be selected for use with unique login accounts.			
	Universal Power Supply Input	Power over Ethernet (PoE) 802.3af	Yes 93-264 VAC, 50/60 Hz input	--	--

1. A second door may be added with a NXD1 add-on board however, PoE power restrictions apply (see footnote 4).
2. RS-485 panel loop: A total of 31 NetAXS-123 (version 5.01.07 or higher) and NetAXS-4 (version 3.04.15 or higher) panels may be combined in a controller loop for a maximum of 123 doors. Ethernet Virtual Loop (EVL): A total of 16 NetAXS-123 panels may be combined in a controller loop for a maximum of up to 48 doors. NetAXS-4 panels CANNOT be used with an EVL.
3. When mixing NetAXS-123 and NetAXS-4 controllers, NetAXS-123 must be the gateway Panel and the panel loop must be RS-485.
4. 450 mA, 12 VDC is maximum current available to power strike, reader(s) and input devices when using a 802.3af PoE connection. If unit is externally powered, higher current is available.
5. When using MAXPRO Cloud or WIN-PAK software, this feature may have limitations or not exist.
6. An external UPS is required to power the PoE power source for battery backup.
7. Suitable for handling the 75-bit transparent card format of PIV, TWIC and FRAC cards.
8. USB port for setup and troubleshooting.
9. Software compatibility for NetAXS
   a) MAXPRO Cloud 4.0 only supports NetAXS-123 configured as a gateway.
   b) All NetAXS versions programmed as an N1000: WIN-PAK SE, WIN-PAK PE, WIN-PAK PRO CS, WIN-PAK CS 4.1 WIN-PAK 2005, WIN-PAK PRO 2005, WIN-PAK 2.0 Release 4
   c) WIN-PAK v3.3 or greater or WIN-PAK CS 4.2 or greater
10. WIN-PAK will not support NX4IN or NX4OUT configured on a NetAXS-123.

NetAXS®

Web-based Access Control System

ORDERING

Part Number	Description
NetAXS-123	
1 Door Solutions	
NX1P	NetAXS-123: One door, compact (plastic) enclosure - PoE or externally powered
NX1MPS	NetAXS-123: One door, standard (metal) enclosure with tamper switch and terminal block. Includes 4 A, 12 VDC output/100-240 VAC input power supply and 12V, 7 AH battery
Add-on Boards (For 2 and 3 door solutions)	
NXD1*	NetAXS-123: One door add-on board (Adds 1 door to your existing 1-door system = 2 doors)
NXD2**	NetAXS-123: Two door add-on board (Adds 2 doors to your existing 1-door system = 3 doors)
NetAXS-123 Components & Accessories	
NXC1	NetAXS-123 - Control Board only
NetAXS-123 Access Control Starter Kits with Readers	
NX1P10	NetAXS-123: Includes NX1P One door compact (plastic) enclosure and (1) OP10HONR mini-mullion proximity reader
NX1MPS10	NetAXS-123: Includes NX1MPS One door, standard (metal) enclosure with power supply and battery and (1) OP10HONR mini-mullion proximity reader
NXD1OP10	NetAXS-123: Includes NXD1 One door add-on and (1) OP10HONR mini mullion proximity reader (Adds 1 door to your existing 1-door system = 2 doors)
NXD2OP10	NetAXS-123: Includes NXD2 Two door add-on and (2) OP10HONR mini-mullion proximity readers (Adds 2 doors to your existing 1-door system = 3 doors)
NetAXS-4	
NetAXS-4 Web Based Access Control Panels	
NX4S1	NetAXS-4: 4 Door Control Panel (Standard Enclosure)
NX4L1	NetAXS-4: Pre-wired 4 Door Control Panel (Deluxe Enclosure)
NX4PCB	NetAXS-4: NetAXS PCB Board with Manual and (4) Surge Suppressors
NetAXS-4 Access Control Starter Kits with Readers	
WPNX4L30	NetAXS-4: IP Ready Access Starter Kit with WIN-PAK, NX4S1 Deluxe Standard Enclosure Option and (4) OP30HONR Mullion Proximity Readers
WPNX4S30	NetAXS-4: IP Ready Access Starter Kit with WIN-PAK, NX4S1 Standard Enclosure Option and (4) OP30HONR Mullion Proximity Readers
NX4OP30S	NetAXS-4: NetAXS with Standard Enclosure - Standalone Web-based Access 4 Door Kit with (4) OP30HONR
NX4OP40S	NetAXS-4: NetAXS with Standard Enclosure - Standalone Web-based Access 4 Door Kit with (4) OP40HONR
NX4OP30L	NetAXS-4: NetAXS with Deluxe Enclosure - Standalone Web-based Access 4 Door Kit with (4) OP30HONR
NX4OP40L	NetAXS-4: NetAXS with Deluxe Enclosure - Standalone Web-based Access 4 Door Kit with (4) OP40HONR
NetAXS Accessories***	
NX4IN******	NetAXS Input Board – 32 inputs per board. Connect 2 per panel. Total 64 inputs.
NX4OUT******	NetAXS Output Board – 16 relays per board. Connect 4 per panel. Total 64 relays.
NXIOENCKT	Double board enclosure for NX4IN, NX4OUT

* Requires external power when used in compact plastic enclosure
** 2-door add-on board is not compatible with compact plastic enclosure
*** All NetAXS accessories are compatible with both the NetAXS-123 and NetAXS-4
**** Requires 24VDC, 2.3A (55 Watts)

For more information:
www.honeywell.com/security

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