



General Line Catalog | 2024

Proud to be your trusted business partner since 1970



Security Communication and Access Control Solutions

*Control to keep the wrong people out.
Communicate to let the right people in.*



Award-Winning Systems, Service, and Support to Help You Succeed

Aiphone Solution Showcases

Featuring Out-of-the-Box Ideas to Help Solve Your Customers' Most Challenging Requests

THE APPLICATION

With a wide selection of Solution Showcases to check out, we are sure to have an application for your customers.

THE SCENARIO

Each showcase outlines a real-world scenario of different challenges and unique situations that end users faced.

THE SOLUTION

For every scenario, there was a reliable security solution, either installed or serviced, to meet the various needs.

THE BENEFITS

Highlighting the project's key points helps you to quickly understand how each end user benefited from an Aiphone solution.

THE CONFIGURATION

An example layout of how each system was configured provides a snapshot of how easy it is to install and operate our intercoms.

AIPHONE SOLUTION SHOWCASE

Adding Security and Communication to an Elementary School

THE SCENARIO
Administrators of a busy elementary school received a state-level grant to improve their building's security. After consulting with the school's security committee, administrators decided to use their funds to replace their existing access control system with enhanced technology that would provide modern features to keep their schools more secure.

While their older system had keycards for staff to quickly access the school, they did not have an efficient method to reprogram credentials if a staff member permanently left. The school administrators wanted an access control system that was easy to update without extra costs involved. Since the school frequently had substitute teachers, administrators wanted the same system to have a simple way for expected non-personnel to be able to access the school without disrupting reception or having to reprogram credentials.

Lastly, administrators especially wanted their new access control system to have intercom integration. This way visitors could request access at the main entrance, which was always kept locked, and then screened by staff prior to being let inside the school.

THE SOLUTION
To ensure product compatibility and smooth operation between multiple product lines, school administrators selected a premium access control system and IP video intercom from the same manufacturer.

The user-friendly management software was intuitive to use, saving resource costs when making system updates. When staff with a temporary visitor pass using the software's digital mobile app. Visitors could use the temporary pass in their phone's web browser without needing to install a mobile app.

By integrating access control with an IP video intercom, the school was outfitted with the most in-demand security features in one system, like being able to identify visitors before unlocking the main entrance.

By integrating access control with an IP video intercom, the school had the most in-demand security features to help keep students safe.

AIPHONE SOLUTION SHOWCASE

Main Entrance (Outdoor)
The video door station made it easy for staff to enter the school with their easy-to-program credential cards, while visitors could be screened before having access granted.

Administration Office
The video door station made it easy for staff to enter the school with their easy-to-program credential cards, while visitors could be screened before having access granted.

THE BENEFITS

- Combination of access control and IP intercom systems outfitted the school with comprehensive security features in a cost-effective package
- User-friendly system management software made it quick and easy to change credentials if staff left or if restrictions needed to be updated
- Visitor passes could be generated with the software's mobile app and shared to substitute teachers, providing them temporary access into the school
- Video door station at the main entrance provided staff a convenient way to enter with designated credential cards
- IP video intercom allowed administrative staff to screen visitors before granting them access into the school

System Configuration Example

Aiphone Components

- IP Video Door Station with Proximity Reader x 1
- IP Video Master Station x 1
- Proximity Credential Card x 18
- System Management Software x 1
- PoE Network Switch
- PoE Door Controller Module x 1

Application software for an elementary school with 18 staff members who needed easy access into their main school entrance. Dispatch network intercom.

Main Entrance (Outdoor)
Compact module was easily installed over the door.

Main Entrance (Indoor)
Card reader door station made it convenient for staff to access the school with their credentials. Substitute teachers could temporarily access the school with a visitor pass.

Equipment Room
Temporary visitor passes could be shared using the digital key mobile app.

Administration Office
PC

Explore more unique possibilities on our Solution Showcase page.  © 06/2023



Learn what others have done with our reliable security intercoms and discover the added value you get when working with our trustworthy brand.

Explore unique possibilities on our Solution Showcase page.

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Look for the QuikSpec Logo!

Many products can be specified using
Aiphone's online system design tool.
Plus, it's FREE to sign up.



Protected with a Comprehensive Security Combo

A Real-Word Access Control and Intercom Solution for an Elementary School

Administrators wanted a convenient way for staff to access their schools while still having a reliable way to screen visitors before unlocking the main entrance.

By combining access control with an IP video intercom, this school was outfitted with the most comprehensive security features in one cost-effective system.



Read our solution showcases where security challenges like this one are solved with our reliable systems

AIPHONE SOLUTION SHOWCASE

Adding Security and Communication to an Elementary School

THE SCENARIO

Administrators of a busy elementary school received a state-level grant to improve their building's security. After consulting with the school's security committee, administrators decided to use their funds to replace their existing access control system with enhanced technology that would provide modern features to keep their schools more secure.

While their older system had keycards for staff to quickly access the school, they did not have an efficient method to reprogram credentials if a staff member permanently left. The school's administrator wanted an access control system that was easy to update without extra costs involved. Since the school frequently had substitute teachers, administrators wanted the system to have a simple way for expected non-disrupting reception or having to reprogram credentials.

Lastly, administrators especially wanted their new access control system to have intercom integration, entrance, which was always kept locked, and then screened by staff prior to being let inside the school.

By integrating access control with an IP video intercom, the school had the most in demand security features to help keep students safe.

THE BENEFITS

- Combination of access control and IP intercom systems fortified the school with comprehensive security features in a cost-effective package
- User-friendly system management software made it quick and easy to change credentials if staff left or if restrictions needed to be updated
- Visitor passes could be generated with the software's mobile app and shared to substitute teachers providing them temporary access into the school
- Video door station at the main entrance provided staff a convenient way to enter with designated credential cards
- IP video intercom allowed administrative staff to screen visitors before granting them access into the school

System Configuration Example

Alpha Components: IP Video Door Station with Video 1, IP Video Intercom 1, IP Video Intercom 2, IP Video Intercom 3, IP Video Intercom 4, IP Video Intercom 5, IP Video Intercom 6, IP Video Intercom 7, IP Video Intercom 8, IP Video Intercom 9, IP Video Intercom 10, IP Video Intercom 11, IP Video Intercom 12, IP Video Intercom 13, IP Video Intercom 14, IP Video Intercom 15, IP Video Intercom 16, IP Video Intercom 17, IP Video Intercom 18, IP Video Intercom 19, IP Video Intercom 20, IP Video Intercom 21, IP Video Intercom 22, IP Video Intercom 23, IP Video Intercom 24, IP Video Intercom 25, IP Video Intercom 26, IP Video Intercom 27, IP Video Intercom 28, IP Video Intercom 29, IP Video Intercom 30, IP Video Intercom 31, IP Video Intercom 32, IP Video Intercom 33, IP Video Intercom 34, IP Video Intercom 35, IP Video Intercom 36, IP Video Intercom 37, IP Video Intercom 38, IP Video Intercom 39, IP Video Intercom 40, IP Video Intercom 41, IP Video Intercom 42, IP Video Intercom 43, IP Video Intercom 44, IP Video Intercom 45, IP Video Intercom 46, IP Video Intercom 47, IP Video Intercom 48, IP Video Intercom 49, IP Video Intercom 50, IP Video Intercom 51, IP Video Intercom 52, IP Video Intercom 53, IP Video Intercom 54, IP Video Intercom 55, IP Video Intercom 56, IP Video Intercom 57, IP Video Intercom 58, IP Video Intercom 59, IP Video Intercom 60, IP Video Intercom 61, IP Video Intercom 62, IP Video Intercom 63, IP Video Intercom 64, IP Video Intercom 65, IP Video Intercom 66, IP Video Intercom 67, IP Video Intercom 68, IP Video Intercom 69, IP Video Intercom 70, IP Video Intercom 71, IP Video Intercom 72, IP Video Intercom 73, IP Video Intercom 74, IP Video Intercom 75, IP Video Intercom 76, IP Video Intercom 77, IP Video Intercom 78, IP Video Intercom 79, IP Video Intercom 80, IP Video Intercom 81, IP Video Intercom 82, IP Video Intercom 83, IP Video Intercom 84, IP Video Intercom 85, IP Video Intercom 86, IP Video Intercom 87, IP Video Intercom 88, IP Video Intercom 89, IP Video Intercom 90, IP Video Intercom 91, IP Video Intercom 92, IP Video Intercom 93, IP Video Intercom 94, IP Video Intercom 95, IP Video Intercom 96, IP Video Intercom 97, IP Video Intercom 98, IP Video Intercom 99, IP Video Intercom 100.

Explore more unique possibilities on our Solution Showcase page.

Access Control

AC Series **NEW**
Access Control System
→ **p. 6**



The image shows a grey metal cabinet with a keypad and a small display, a desktop computer monitor displaying a software interface, and a black base unit. The QuikSpec logo is visible in the bottom right corner.

AC Series **NEW**
Access Control System with Intercom Integration
→ **p. 8**



The image shows the same components as the first block, but with a small tablet device displaying a video call interface. The QuikSpec logo is visible in the bottom right corner.

AC Series Access Control System NEW

AC Nio Management Software

Licenses: select 1 (required)



Cloud-Based and On-Site Hosting Options with AC Nio



AC-NIO-ESS1

1-Year AC Nio Essential License for Managing 40 Doors or Cameras
→ p. 70

AC-NIO-ESS5

5-Year AC Nio Essential License for Managing 40 Doors or Cameras
→ p. 70

AC-NIO-SB1

1-Year AC Nio Small Business License for Managing 80 Doors or Cameras
→ p. 70

AC-NIO-SB5

5-Year AC Nio Small Business License for Managing 80 Doors or Cameras
→ p. 70

AC Nio Admin

Administrative Mobile App (free with AC Nio Management Software Licenses)
→ p. 70



AC Key

Digital Key Mobile App (free with AC Nio Management Software Licenses)
→ p. 70



AC-HOST

Embedded Server Host for AC Nio Essential Licenses (Linux-based-host requires one license and is sold separately)
→ p. 70



Do you need a larger system capacity with more doors and cameras? No problem! Contact your local rep, we're here to assist.

Readers and Credentials: mix and match up to 40 or 80 readers (based on software license selection)



AC-PROX-1G
1-Gang and Mullion-Mount 125kHz Wiegand Proximity Reader
→ p. 71



AC-10K-1G
1-Gang Proximity Reader with Access Keypad
→ p. 71



AC-10K-M
Mullion-Mount Proximity Reader with Access Keypad
→ p. 71



AC-BT-10K
1-Gang Bluetooth® and NFC™ Reader with Access Keypad
→ p. 71



AC-BT-M
Mullion-Mount Bluetooth® and NFC™ Reader
→ p. 71

Select an unlimited number of user credentials in a single system!



AC-PC-40
Aiphone 40-Bit 125kHz Proximity Card
→ p. 71



AC-PC-H26
HID® 26-Bit 125kHz Proximity Card
→ p. 71



AC-PF-40
Aiphone 40-Bit 125kHz Key Fob with Brass Ring
→ p. 71



AC-PF-H26
HID® 26-Bit 125kHz Key Fob with Brass Ring
→ p. 71



AC-PT-40
Aiphone 40-Bit 125kHz Proximity Disc Tag with Adhesive Backing
→ p. 71



AC-PT-H26
HID® 26-Bit 125kHz Proximity Disc Tag with Adhesive Backing
→ p. 71

System Features

- Cloud-based and on-site hosting make it flexible for end users and dealers who want the various deployment options
- Compact PoE two-door access controllers and traditional panels provide flexibility for virtually any configuration
- Cross product compatibility with all Aiphone intercoms, both IP and analog
- NDAA compliant, TAA compliant, UL Listed
- Integrates with the most on-demand security features
- Easily retrofit existing systems
- Expand and grow with simple hardware
- Sophisticated and intuitive system management software provides easy programming and maintenance
- Free digital key mobile app (AC Key) can be used to unlock doors and share temporary visitor passes

Dimensions

	INCHES		
	Height	Width	Depth
AC-10K-1G			
AC-10K-M			
AC-2DE, AC-IOE	3-3/4"	3-1/2"	
AC-2DM-B, AC-2DM-W	3-1/2"	10"	2-3/8"
AC-BT-10K			
AC-BT-M			
AC-C, ACS-2DR-C, ACS-ELV, ACS-IO	19-3/8"	13-5/8"	3"
AC-CA1			
AC-HOST	4-1/2"	4-1/2"	1-1/2"
AC-PC-40, AC-PC-H26	2-3/16"	3-3/8"	1/16"
AC-PF-40, AC-PF-H26	1-1/2"	1-3/16"	1/8"
AC-PROX-1G (1-gang bracket)	5-3/4"	2-7/8"	7/8"
AC-PS1250	6-9/16"	2-1/8"	1-3/8"
AC-PT-40, AC-PT-H26	1"	1"	1/16"

Door Controllers: mix and match desired combination (based on software license selection)

Compact two-door controller modules easily mount above interior doorways!



AC-2DM-B
PoE Two-Door Access Controller
→ p. 72



AC-2DM-W
PoE Two-Door Access Controller
→ p. 72



ACS-2DR-C
Two-Door Access Control Starter Kit with Enclosure (includes one ACS-2DR starter kit and one AC-C enclosure, which has space for the required AC-PS1250 power supply—up to three AC-2DE expander boards can be added for an eight-door capacity)
→ p. 72



ACS-ELV
Single Elevator Access Control Starter Kit with Enclosure (includes one elevator master controller, one AC-2DE expander board, one AC-IOE expander board, and one AC-C enclosure, which has space for the required AC-PS1250 power supply—two more AC-C enclosures and up to seven AC-IOE expander boards can be added for a 64-floor capacity)
→ p. 73



ACS-IO
I/O Starter Kit with Enclosure (includes one I/O master controller, one AC-IOE expander board, and one AC-C enclosure, which has space for the required AC-PS1250 power supply—one more AC-PS1250 power supply and up to seven AC-IOE expander boards can be added for a 64-contact capacity)
→ p. 73



AC-CA1
Lockable Steel Enclosure with Power Supply (includes one Altronix® eFlow6NB power supply—one ACS-2DR starter kit and up to three AC-2DE expander boards can be added)
→ p. 74

NOTE: Image is shown with AC-CA1 enclosure, ACS-2DR starter kit, AC-2DE expander boards, and Altronix® power supply.

PoE

2 wires

Aiphone
#871802
(max. 33')



AC-PS1250
12V DC, 5A Power Supply
→ p. 74



ACS-2DR
Two-Door Access Control Starter Kit (includes one door master controller, one AC-2DE expander board, and two AC-STRIPs—included with ACS-2DR-C kit and is sold separately for AC-CA1 enclosure)
→ p. 72

Controller Accessories


AC-PS1250
12V DC, 5A Power Supply
→ p. 74



AC-2DE
Two-Door Expander Board (included with ACS-2DR-C and ACS-ELV starter kits)
→ p. 74



AC-IOE
Eight-Port I/O Expander Board (included with ACS-ELV and ACS-IO starter kits)
→ p. 74



AC-C
Steel, Vented, and Lockable Wall-Mount Enclosure (included with ACS-2DR-C, ACS-ELV, and ACS-IO starter kits)
→ p. 74

Specifications (AC Nio)

Operating System	Windows® 7 Professional, Windows® 7 Enterprise, Windows® 7 Ultimate or later
CPU	32 bit (x86) processor or 64 bit (x64) processor, 2GHz or faster
Memory	4 GB or higher
Required Storage	1 GB (additional space required for database)
Runtime	.NET Framework 4.5 or later
SQL Server	Microsoft® SQL Server 2008, SQL Server 2008 Express or higher
Doors	AC-NIO-ESS1, AC-NIO-ESS5: 40 AC-NIO-SB1, AC-NIO-SB5: 80
Cameras	AC-NIO-ESS1, AC-NIO-ESS5: 40 AC-NIO-SB1, AC-NIO-SB5: 80
Partitions	AC-NIO-ESS1, AC-NIO-ESS5: 1 AC-NIO-SB1, AC-NIO-SB5: 5
LDAP	AC-NIO-ESS1, AC-NIO-ESS5: No AC-NIO-SB1, AC-NIO-SB5: Yes
Unmanaged Doors	AC-NIO-ESS1, AC-NIO-ESS5: No AC-NIO-SB1, AC-NIO-SB5: Yes

Specifications (AC-2DM-B, AC-2DM-W)

Power Source	PoE (IEEE 802.3af)
Motion Sensor	Infrared
Lock Power	12V DC, 500mA
Option Power	12V DC, 300mA
Contact Rating	24V DC, 1A
Protocols	IPv4, IPv6, TCP, UDP, HTTPS
Reader Inputs	Wiegand
Card Storage	Up to 100,000 users per controller
Event Storage	Up to 50,000 events (first in, first out)
UL Listing	UL 294/ULC S319-05

Specifications (ACS-2DR)

Power Source	12V DC—use AC-PS1225
NIC	RJ45 Ethernet Port 10/100Mbps
Board Communication:	RS485 (AC-STRIP)
Protocols	IPv4, IPv6, TCP, UDP, HTTPS
Card Storage	Up to 100,000 users per controller
Event Storage	Up to 50,000 events (first in, first out)
UL Listing	UL 294/ULC S319-05

AC Nio Management Software

Licenses: select 1 (required)



Cloud-Based and On-Site Hosting Options with AC Nio

AC-NIO-ESS1
1-Year AC Nio Essential License for Managing 40 Doors or Cameras
→ p. 70

AC-NIO-ESS5
5-Year AC Nio Essential License for Managing 40 Doors or Cameras
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AC-10K-1G
1-Gang Proximity Reader with Access Keypad
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AC-10K-M
Mullion-Mount Proximity Reader with Access Keypad
→ p. 71



AC-BT-10K
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AC-BT-M
Mullion-Mount Bluetooth® and NFC™ Reader
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Select an unlimited number of user credentials in a single system!



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AC-PT-40
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- Cross product compatibility with all Aiphone intercoms, both IP and analog
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- Integrates with the most on-demand security features
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- Expand and grow with simple hardware
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Dimensions

	INCHES		
	Height	Width	Depth
AC-10K-1G			
AC-10K-M			
AC-2DE, AC-IOE	3-3/4"	3-1/2"	
AC-2DM-B, AC-2DM-W	3-1/2"	10"	2-3/8"
AC-BT-10K			
AC-BT-M			
AC-C, ACS-2DR-C, ACS-ELV, ACS-IO	19-3/8"	13-5/8"	3"
AC-CA1			
AC-HOST	4-1/2"	4-1/2"	1-1/2"
AC-PC-40, AC-PC-H26	2-3/16"	3-3/8"	1/16"
AC-PF-40, AC-PF-H26	1-1/2"	1-3/16"	1/8"
AC-PROX-1G (1-gang bracket)	5-3/4"	2-7/8"	7/8"
AC-PS1250	6-9/16"	2-1/8"	1-3/8"
AC-PT-40, AC-PT-H26	1"	1"	1/16"

Specifications (AC Nio)

- Operating System** Windows® 7 Professional, Windows® 7 Enterprise, Windows® 7 Ultimate or later
- CPU** 32 bit (x86) processor or 64 bit (x64) processor, 2GHz or faster
- Memory** 4 GB or higher
- Required Storage** 1 GB (additional space required for database)
- Runtime** .NET Framework 4.5 or later
- SQL Server** Microsoft® SQL Server 2008, SQL Server 2008 Express or higher
- Doors** AC-NIO-ESS1/5: 40 AC-NIO-SB1/5: 80
- Cameras** AC-NIO-ESS1/5: 40 AC-NIO-SB1/5: 80
- Partitions** AC-NIO-ESS1/5: 1 AC-NIO-SB1/5: 5
- LDAP** AC-NIO-ESS1/5: No AC-NIO-SB1/5: Yes
- Unmanaged Doors** AC-NIO-ESS1/5: No AC-NIO-SB1/5: Yes

Specifications (AC-2DM-B, AC-2DM-W, ACS-2DR)

- Power Source** ACS-2DR: PoE (IEEE 802.3af)
AC-2DM-B/W: 12V DC—use AC-PS1225
- Protocols** IPv4, IPv6, TCP, UDP, HTTPS
- Card Storage** Up to 100,000 users per controller
- Event Storage** Up to 50,000 events (first in, first out)
- UL Listing** UL 294/ULC S319-05

Door Controllers: mix and match desired combination (based on software license selection)

Compact two-door controller modules easily mount above interior doorways!



AC-2DM-B
PoE Two-Door Access Controller
→ p. 72



AC-2DM-W
PoE Two-Door Access Controller
→ p. 72



ACS-2DR-C
Two-Door Access Control Starter Kit with Enclosure (includes one ACS-2DR starter kit and one AC-C enclosure, which has space for the required AC-PS1250 power supply—up to three AC-2DE expander boards can be added for an eight-door capacity)
→ p. 72



ACS-ELV
Single Elevator Access Control Starter Kit with Enclosure (includes one elevator master controller, one AC-2DE expander board, one AC-IOE expander board, and one AC-C enclosure, which has space for the required AC-PS1250 power supply—two more AC-C enclosures and up to seven AC-IOE expander boards can be added for a 64-floor capacity)
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ACS-IO
I/O Starter Kit with Enclosure (includes one I/O master controller, one AC-IOE expander board, and one AC-C enclosure, which has space for the required AC-PS1250 power supply—one more AC-PS1250 power supply and up to seven AC-IOE expander boards can be added for a 64-contact capacity)
→ p. 73



AC-CA1
Lockable Steel Enclosure with Power Supply (includes one Altronix® eFlow6NB power supply—one ACS-2DR starter kit and up to three AC-2DE expander boards can be added)
→ p. 74

NOTE: Image is shown with AC-CA1 enclosure, ACS-2DR starter kit, AC-2DE expander boards, and Altronix® power supply.

PoE

2 wires
Aiphone
#871802
(max. 33')



AC-PS1250
12V DC, 5A Power Supply
→ p. 74



ACS-2DR
Two-Door Access Control Starter Kit (includes one door master controller, one AC-2DE expander board, and two AC-STRIPs—included with ACS-2DR-C kit and is sold separately for AC-CA1 enclosure)
→ p. 72

Controller Accessories



AC-PS1250
12V DC, 5A Power Supply
→ p. 74



AC-2DE
Two-Door Expander Board (included with ACS-2DR-C and ACS-ELV starter kits)
→ p. 74



AC-IOE
Eight-Port I/O Expander Board (included with ACS-ELV and ACS-IO starter kits)
→ p. 74



AC-C
Steel, Vented, and Lockable Wall-Mount Enclosure (included with ACS-2DR-C, ACS-ELV, and ACS-IO starter kits)
→ p. 74

See the next page for a real-world solution with this system installed.

Intercom System (compatible with all intercom systems—showing IX Series components)

Multi-Purpose Adaptor



2 wires
Aiphone
#871802
(max. 33')

PoE

For a comprehensive access control and intercom solution, we recommend integrating with our IX Series → 14-17

IP Door Station



IP Master Station



Adding Security and Communication to an Elementary School



THE SCENARIO

Administrators of a busy elementary school received a state-level grant to improve their building's security. After consulting with the school's security committee, administrators decided to use their funds to replace their existing access control system with enhanced technology that would provide modern features to keep their schools more secure.

While their older system had keycards for staff to quickly access the school, they did not have an efficient method to reprogram credentials if a staff member permanently left. The school's administrators wanted an access control system that was easy to update without extra costs involved. Since the school frequently had substitute teachers, administrators wanted the same system to have a simple way for expected non-personnel to be able to access the school without disrupting reception or having to reprogram credentials.

Lastly, administrators especially wanted their new access control system to have intercom integration. This way visitors could request access at the main entrance, which was always kept locked, and then screened by staff prior to being let inside the school.

By integrating access control with an IP video intercom, the school had the most in demand security features to help keep students safe.

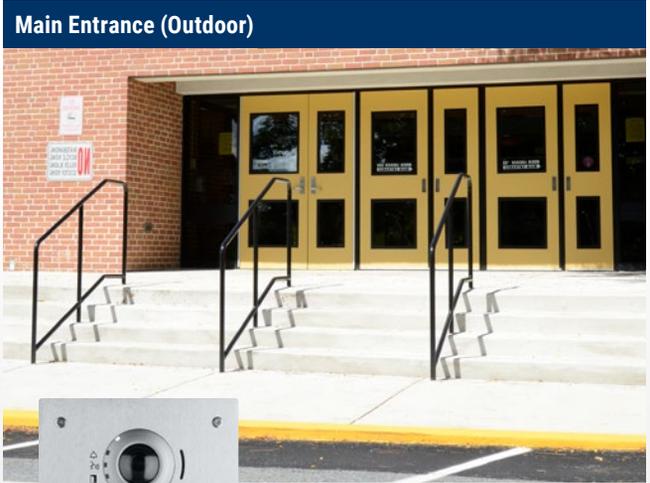
THE SOLUTION

To ensure product compatibility and smooth operation between multiple product lines, school administrators selected a premium access control system and IP video intercom from the same manufacturer.

The user-friendly management software was intuitive to use, saving resource costs when making system updates. When substitute teachers were expected, administrators could supply them with a temporary visitor pass using the software's digital key mobile app. Visitors could use the temporary pass in their phone's web browser without needing to install a mobile app.

By integrating access control with an IP video intercom, the school was outfitted with the most in demand security features in one system, like being able to identify visitors before unlocking the main entrance.



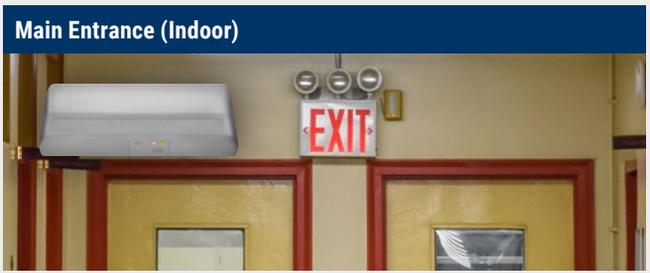


The video door station made it easy for staff to enter the school with their easy-to-program credential cards, while visitors could be screened before having access granted.

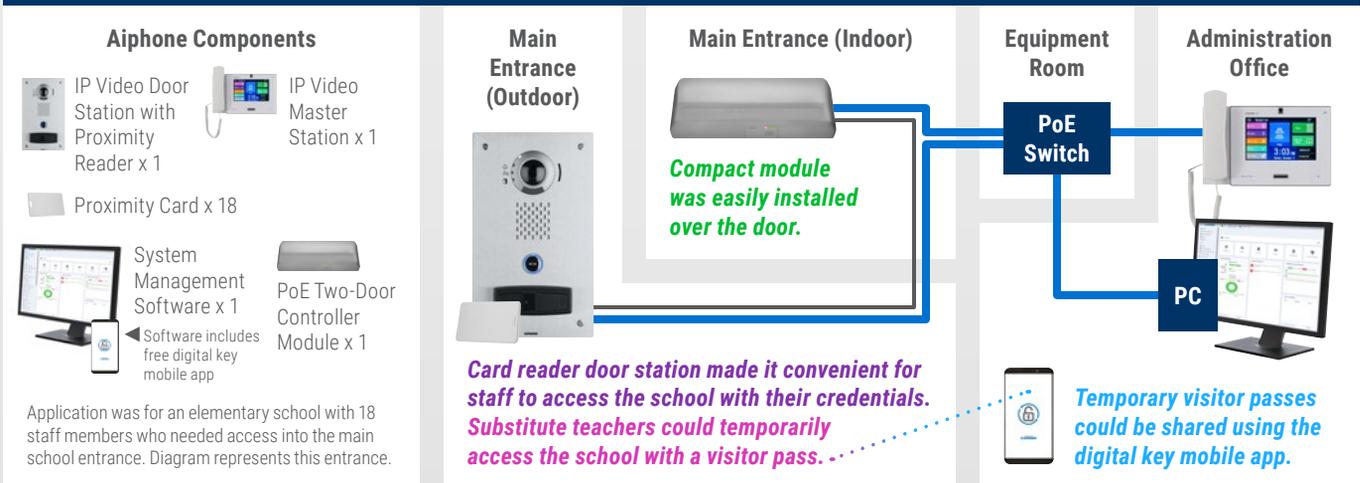


THE BENEFITS

- Combination of access control and IP intercom systems outfitted the school with comprehensive security features in a cost-effective package
- User-friendly system management software made it quick and easy to change credentials if staff left or if restrictions needed to be updated
- Visitor passes could be generated with the software's mobile app and shared to substitute teachers, providing them temporary access into the school
- Video door station at the main entrance provided staff a convenient way to enter with designated credential cards
- IP video intercom allowed administrative staff to screen visitors before granting them access into the school



System Configuration Example



IP Intercoms

IX Series

Peer-to-Peer IP Video Intercom

→ **p. 14**



QuikSpec

IX Emergency Series

Peer-to-Peer IP Video Intercom

→ **p. 16**



QuikSpec

IXG Commercial Series

IP Video Intercom with Mobile App

→ **p. 20**



IXG Series

IP Multi-Tenant Video Intercom
with Mobile App

→ **p. 22**



QuikSpec

Box Set (an unlimited number of stations can be added)



IXS-HBDV
Box Set with IX-DV, IX-MV7-HB, PoE Switch, and USB Drive

- Preprogrammed equipment is ready to install
- PoE switch allows for easy expansion
- USB drive includes back-up programming files and how-to videos for future growth

START with a BOX SET

IP Door Stations: mix and match unlimited (can call up to 20 stations at one time)



IX-EA
IP Video Door Station
→ p. 90



IX-DVM
Mullion-Mount IP Video Door Station with Built-In Touchless Call Sensor
→ p. 90



IX-DV
IP Video Door Station (included with IXS-HBDV box set)
→ p. 90



IX-DVF
IP Video Door Station
→ p. 90



IX-DVF-4A
IP Video Door Station with Four Call Buttons
→ p. 90



IX-DVF-6
IP Video Door Station with Six Call Buttons
→ p. 90



IX-DVF-L
IP Video Door Station with T-Coil Compatibility (requires PoE and 24V DC)
→ p. 90



IX-DVF-HW
IP Video Door Station with Hand Wave Call Sensor and Surface Mount Box (requires PoE+)
→ p. 90



IX-DVF-PR
Card Access IP Video Door Station (includes built-in 125 kHz Wiegand proximity reader)
→ p. 90

For emergency stations, wall boxes, and towers, see p. 16



IX-SS-2G
IP Audio Door Station
→ p. 91



IX-SSA
IP Audio Door Station
→ p. 91



IX-NVP
IP Audio Door Station
→ p. 91



IX-NVP2
IP Audio Door Station with Two Call Buttons
→ p. 91

Sub Stations: mix and match unlimited



IX-RS-B
Audio Room Sub Station with Handset
→ p. 89



IX-RS-W
Audio Room Sub Station with Handset
→ p. 89

System Features

- Can register to a compatible IP PBX for enhanced SIP features, like call forwarding and dialing out
- Device supervision allows for scheduled or manual system checks to ensure all stations are operating as expected
- IP camera integration makes it easy to toggle between the close-up view of the video door station and the wide view of an IP camera
- Transfer calls between multiple stations based on a schedule or time delay
- PoE passthrough on IX-DV, IX-DVF, IX-DVF-4A, IX-DVF-6, IX-DVF-L, IX-DVF-PR, and IX-SSA stations can power additional device (requires PoE+)
- No costly licensing fees or additional servers
- Scalable system is easy to expand—mix and match an infinite (∞) number of door stations, emergency stations, master stations, and sub stations
- ONVIF® Profile S video streaming
- Interfaces with Genetec®, LenelS2® OnGuard® (7.3 through 7.6 releases), and Software House® CCure 9000 (2.50 through 3.00 releases)
- All Call or group paging
- Priority call queueing
- Prerecorded message paging
- Bell scheduling
- Door release contacts available at door stations or IXW-MA for added security

Calling Capacities

The IX Series has an unlimited station capacity, where an infinite number of door stations, emergency stations, master stations, and sub stations can be part of the same system. However, there is a **calling capacity for each station** (refer to the chart below). Each door station, emergency station, or sub station can call up to 20 door stations, master stations, or sub stations at one time.

Chart illustrates calling capacities for each station.

	Master Stations	Door Stations, Emergency Stations, or Sub Stations
Address Book	 9,999 stations and 20 recent calls	N/A
Calling	 1 station OR a group of up to 50 stations	1 group of up to 20 stations <small>NOTE: An additional group can be called with the optional input or via CGI (does not apply to 2-wire door/sub station adaptors).</small>
Paging	 All stations (All Page) OR groups up to 50 stations	Receive only

IP Master Stations: mix and match unlimited
(can call up to 500 stations at one time)

IX-MV7-HB-L
IP Video Master Station with T-Coil Supported Handset
→ p. 88

IX-MV7-HW-JP
TAA-Compliant IP Video Master Station with Handset
→ p. 88

IX-MV7-HB
IP Video Master Station with Handset (included with IXS-HBDV box set)
→ p. 88

IX-MV7-B
IP Video Master Station
→ p. 88

IX-MV7-W
IP Video Master Station
→ p. 88

IXW-MA-SOFT
IXW-MA-SOFT-5
IXW-MA-SOFT-10
Multi-Purpose Adaptor with PC Master Station Software (includes one, five, or ten IX-SOFT licenses)
→ p. 88

IX-SOFT
IX-SOFT-3
IX-SOFT-5
IX-SOFT-10
PC Master Station Software (includes one, three, five, or ten USB dongles)
→ p. 88

LAN

Accessories

IXW-HWCBP
Hand Wave Call Sensor and Surface Mount Box
→ p. 90

SBX-2G/A
Surface Mount Box for IX-SS-2G
→ p. 115

NEW SBX-CON1 (not shown)
Surface Mount Box with Conduit Cut Outs for IX-EA, IX-DV, or IX-DVM
→ p. 115

SBX-IXDV30
30° Angle Box for IX-DV
→ p. 116

IX-MB
Mullion Mounting Bracket for IX-DV
→ p. 116

SBX-IDVFRA
Surface Mount Box for IX-DVF-L or IX-DVF-PR
→ p. 115

SBX-IDVF
Surface Mount Box for IX-DVF or IX-SSA
→ p. 115

NEW IXW-MAA
Multi-Purpose Adaptor
→ p. 89

IXW-MA
Multi-Purpose Adaptor
→ p. 89

IPW-1VC
2-Wire Network Adaptor Kit (includes one IPW-1VT, one receiver, and a power supply)
→ p. 113

NEW IPW-1VT
Analog-to-IP Transmitter
→ p. 113

NEW IPW-10VR
Rack Mount 2-Wire Network Adaptor
→ p. 113

NEW IPW-10VC
Rack Mount 2-Wire Network Adaptor Kit (includes one IPW-10VR and ten IPW-1VTs)
→ p. 113

IXW-PBXA
IP PBX
→ p. 89

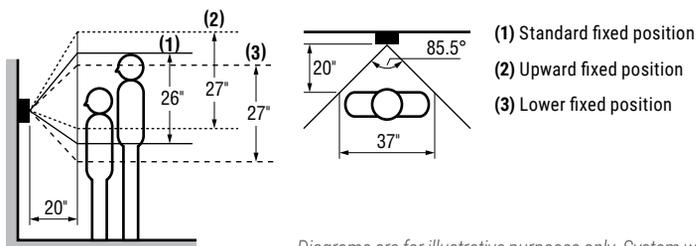
IPW-POE8
8-Port PoE Switch
→ p. 113

Dimensions

	INCHES			MILLIMETERS		
	Height	Width	Depth	Height	Width	Depth
IX-DV	8-1/16"	4-1/2"	2-1/16"	205.5	115	52.5
IX-DVF, IX-SSA	10-7/16"	5-7/8"	*	265	150	*
IX-DVF-4A, IX-DVF-6	13-11/16"	7-3/16"	*	347	182	*
IX-DVF-L, IX-DVF-PR	11-11/16"	7"	*	297	178	*
IX-DVF-HW	11-11/16"	7"	3-3/16"	297	178	80.3
IX-DVM	6-7/8"	1-7/8"	1-3/8"	175	48	34
IX-EA	6-5/16"	3-15/16"	1-11/16"	160	100	43.5
IX-NVP, IX-NVP2	5-1/2"	7-1/2"	*	140	191	*
IX-SS-2G	4-3/4"	4-3/4"	*	120	120	*
IX-MV7-B, IX-MV7-W	6-3/4"	8-11/16"	1-1/4"	172	220	31.5
IX-MV7-HB, IX-MV7-HB-L, IX-MV7-HW-JP	8-1/16"	11"	2-3/16"	204	280	55.5
IX-RS-B, IX-RS-W	7-9/16"	3-9/16"	2-5/8"	192	90	67

*Aiphone recommends a 2-1/2" minimum back box depth for all flush mount stations.

Camera View Area



Specifications

- Power Source** PoE (802.3af)
- IX-DV, IX-DVF, IX-DVF-4A, IX-DVF-6, IX-SSA:** PoE (802.3af) PoE+ (802.3at), or 24V DC—use PS-2420UL
- Network Interface** 10 BASE-T/100 BASE-TX Ethernet (RJ-45)
- Network Protocols** IPv4, IPv6, TCP, UDP, SIP, HTTP, HTTPS, RTSP, RTP, RTCP, IGMP, MLD, SMTP, SFTP, DHCP, NTP, DNS
- Bandwidth Usage** Audio (G.722): 64Kbps x 2 for communication, 64Kbps for monitoring
Video (H.264): 32Kbps–2,048Kbps
- Video Streaming** ONVIF® Profile S or RTSP
- Communication** Hands-free or handset (full-duplex), push-to-talk (simplex)
- Door Release** IXW-MA: ten programmable dry contacts (four Form C, six Form A), 24V AC/DC, 500mA
IXW-MAA: ten Form C programmable dry contacts, 24V AC/DC, 500mA
IX-DV, IX-DVF, IX-DVF-4A, IX-DVF-6, IX-DVF-L, IX-MV7-B, IX-MV7-W, IX-MV7-HB, IX-MV7-HB-L, IX-MV7-HW-JP, IX-SSA: two Form C dry contacts, 24V AC/DC, 1A
IX-DVM, IX-EA, IX-RS-B, IX-RS-W, IX-SS-2G: Form C dry contact, 24V AC/DC, 1A
- Wire Type** Cat-5e or Cat-6
- Distance** Door Station, Emergency Station, Sub Station, Master Station, or Network Adaptor to Network Node: 330'

Wall Boxes, All-in-One Towers, and Modular Towers

(optional for housing emergency stations)



WB-CE (cage)

WB-HE (hood)
ADA Compliant Wall Box with EMERGENCY Lettering
→ p. 93



WB-CA (cage)

WB-HA (hood)
ADA Compliant Wall Box with ASSISTANCE Lettering
→ p. 93



TW-SA
One-Piece Aluminum Tower with ASSISTANCE Lettering
→ p. 93

TW-SE
One-Piece Aluminum Tower with EMERGENCY Lettering
→ p. 93



TW-TE ▲
Tall One-Piece Aluminum Tower with EMERGENCY Lettering
→ p. 93

TW-TA-ARM ▲
Tall One-Piece Aluminum Tower with Camera Arm and ASSISTANCE Lettering
→ p. 93

TW-20B/A ▶
2-Module Mid-Level Tower
→ p. 94

TW-23B/A ▶
3-Module High-Level Tower
→ p. 94

TW-TE-ARM ◀
Tall One-Piece Aluminum Tower with Camera Arm and EMERGENCY Lettering
→ p. 93



IP Emergency Stations: mix and match unlimited (can call up to 20 stations at one time)



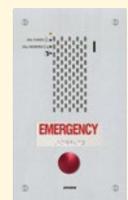
IX-DVF-2RA
ADA Compliant IP Video Emergency Station with Two Call Buttons
→ p. 91



IX-DVF-RA
ADA Compliant IP Video Emergency Station
→ p. 91



IX-SSA-2RA
ADA Compliant IP Audio Emergency Station with Two Call Buttons
→ p. 91



IX-SSA-RA
ADA Compliant IP Audio Emergency Station
→ p. 91

Stations are also available with French labels:

IX-DVF-2RA-FR
→ p. 91

IX-SSA-2RA-FR
→ p. 91

IX-DVF-RA-FR
→ p. 91

IX-SSA-RA-FR
→ p. 91

NOTE: Power is required for the beacon on wall boxes and towers—use PS-POE splitter or PS-2420UL power supply to draw power from an IX Series station's PoE passthrough.



PS-POE
PoE Splitter
→ p. 92



Solar Tower Sets

(optional for housing emergency stations)



TWS-Z4
Zone 4 Solar Tower Set

TWS-Z2 (not shown)
Zone 2 Solar Tower Set

TWS-Z1 (not shown)
Zone 1 Solar Tower Set
→ p. 92

System Features

- Can register to a compatible IP PBX for enhanced SIP features, like call forwarding and dialing out
- Device supervision allows for scheduled or manual system checks to ensure all stations are operating as expected
- IP camera integration makes it easy to toggle between the close-up view of the video door station and the wide view of an IP camera
- Transfer calls between multiple stations based on a schedule or time delay
- PoE passthrough on IX-DVF-2RA, IX-DVF-RA, IX-SSA-2RA, and IX-SSA-RA stations can power additional device (requires PoE+)
- No costly licensing fees or additional servers
- Scalable system is easy to expand—mix and match an infinite (∞) number of door stations, emergency stations, master stations, and sub stations
- Support Tool programming allows for batch configurations
- ONVIF® Profile S video streaming
- Interfaces with Genetec®, LenelS2® OnGuard® (7.3 through 7.6 releases), and Software House® CCure 9000 (2.50 through 3.00 releases)
- All Call or group paging
- Priority call queueing
- Prerecorded message paging
- Door release contacts available at door stations or IXW-MA for added security



IP Master Stations: mix and match unlimited

(can call up to 500 stations at one time)



IX-MV7-HB-L
IP Video Master Station with T-Coil Supported Handset
→ p. 88



IX-MV7-HW-JP
TAA-Compliant IP Video Master Station with Handset
→ p. 88



IX-MV7-B
IP Video Master Station
→ p. 88



IX-MV7-W
IP Video Master Station
→ p. 88



IX-MV7-HB
IP Video Master Station with Handset
→ p. 88



IXW-MA-SOFT
IXW-MA-SOFT-5
IXW-MA-SOFT-10
Multi-Purpose Adaptor with PC Master Station Software (includes one, five, or ten IX-SOFT licenses)
→ p. 88

Sub Stations: mix and match unlimited



IX-RS-B
Audio Room Sub Station with Handset
→ p. 89



IX-RS-W
Audio Room Sub Station with Handset
→ p. 89

IX-SOFT
IX-SOFT-3
IX-SOFT-5
IX-SOFT-10
PC Master Station Software (includes one, three, five, or ten USB dongles)
→ p. 88

LAN

Dimensions

	INCHES			MILLIMETERS		
	Height	Width	Depth	Height	Width	Depth
WB-CA, WB-CE	26"	10-9/16"	4"	660	203	102
WB-HA, WB-HE	27"	10-13/16"	4"	686	203	102
IX-DVF-2RA, IX-DVF-RA, IX-SSA-2RA, IX-SSA-RA	11-11/16"	7"	*	297	178	*
IX-MV7-B, IX-MV7-W	6-3/4"	8-11/16"	1-1/4"	172	220	31.5
IX-MV7-HB, IX-MV7-HB-L, IX-MV7-HW-JP	8-1/16"	11"	2-3/16"	204	280	55.5
IX-RS-B, IX-RS-W	7-9/16"	3-9/16"	2-5/8"	192	90	67
TW-20B/A	67-1/4"	10"	8"	1708	254	203
TW-23B/A	100-1/4"	10"	8"	2546	254	203

*Aiphone recommends a 2-1/2" minimum back box depth for all flush mount stations.

Calling Capacities

The IX Series has an unlimited station capacity, where an infinite number of door stations, emergency stations, master stations, and sub stations can be part of the same system. However, there is a **calling capacity for each station** (refer to the chart on page 14). Each door station, emergency station, or sub station can call up to 20 door stations, master stations, or sub stations at one time.

Accessories



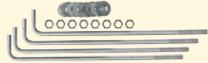
IXW-HWCBP
Hand Wave Call Sensor and Surface Mount Box
→ p. 90



MB-RF1
Retrofit Mounting Bracket for IX-DVF-2RA, IX-DVF-RA IX-SSA-2RA, or IX-SSA-RA (adapts emergency station to an existing Code Blue® or Talk-A-Phone® tower or wall box)
→ p. 117



SBX-IDVFRA
Surface Mount Box for IX-DVF-2RA, IX-DVF-RA, IX-SSA-2RA, or IX-SSA-RA
→ p. 115



TW-MKL
L-Bolt Mounting Kit for Modular Towers (an L-bolt mounting kit is required for tower installation—TW-MKL is recommended)
→ p. 95



IXW-MAA
Multi-Purpose Adaptor
→ p. 89



IXW-MA
Multi-Purpose Adaptor
→ p. 89



IPW-1VC
2-Wire Network Adaptor Kit (includes one IPW-1VT, one receiver, and a power supply)
→ p. 113



IPW-1VT
Analog-to-IP Transmitter
→ p. 113



IPW-10VR
Rack Mount 2-Wire Network Adaptor
→ p. 113



IPW-10VC
Rack Mount 2-Wire Network Adaptor Kit (includes one IPW-10VR and ten IPW-1VTs)
→ p. 113



IXW-PBXA
IP PBX
→ p. 89



IPW-POE8
8-Port PoE Switch
→ p. 113

Specifications

- Power Source** PoE (802.3af)
IX-DVF-2RA, IX-DVF-RA, IX-SSA-2RA, IX-SSA-RA: PoE (802.3af), PoE+ (802.3at), or 24V DC—use PS-2420UL
- Network Interface** 10 BASE-T/100 BASE-TX Ethernet (RJ-45)
- Network Protocols** IPv4, IPv6, TCP, UDP, SIP, HTTP, HTTPS, RTSP, RTP, RTCP, IGMP, MLD, SMTP, SFTP, DHCP, NTP, DNS
- Bandwidth Usage** Audio (G.722): 64Kbps x 2 for communication, 64Kbps for monitoring
Video (H.264): 32Kbps–2,048Kbps
- Video Streaming** ONVIF® Profile S or RSTP
- Communication** Hands-free or handset (full-duplex), push-to-talk (simplex)
- Door Release** IXW-MA: ten programmable dry contacts (four Form C, six Form A), 24V AC/DC, 500mA
IXW-MAA: ten Form C programmable dry contacts, 24V AC/DC, 500mA
IX-DVF-2RA, IX-DVF-RA, IX-MV7-B, IX-MV7-W, IX-MV7-HB, IX-MV7-HB-L, IX-MV7-HW-JP, IX-SSA-2RA, IX-SSA-RA: two Form C dry contacts, 24V AC/DC, 1A
IX-RS-B, IX-RS-W: Form C dry contact, 24V AC/DC, 1A
- Wire Type** Cat-5e or Cat-6
- Distance** Door Station, Emergency Station, Sub Station, Master Station, or Network Adaptor to Network Node: 330'

IP Intercoms

Adding Security and Communication to a Parking Lot at an Amusement Park

IP Intercoms



THE SCENARIO

A large amusement park with several remote parking lots was having a rash of vehicle break-downs and vehicles being prowled. They wanted a method for guests to call into Guest Services for assistance, as well as the option to call their security operations center (SOC) if a threat or potential crime was detected.

The park had existing security cameras covering the lots, but the security executive wanted to see an identifying view of the guests calling for assistance. He also wanted a means to deter car prowlers by warning the suspects that they were being watched.

Other important factors the security executive considered were that call stations must be strategically placed for easy guest access, and more importantly, that guests could quickly recognize these areas as distinct, safe places to call for assistance or help.

Reliability and ease of maintenance were critical requirements for the outdoor components too. Additionally, the park was extremely brand conscious and required all stations be delivered in a specific color with their logo displayed.

The park chose modular towers with IP intercoms to provide distinct help points for guests while saving on future costs.

THE SOLUTION

Modular towers, equipped with IP video intercoms, were installed throughout the parking lots. The intercom's two call buttons reached Guest Services for assistance or the SOC for an emergency. Adding to the wide view of the network camera, the intercom camera provided a close-up view of guests. Speakers were added to light poles to loudly broadcast alerts if a prowler was caught in action.

Highly visible beacons ensured guests could easily spot tower locations. The IP intercom covered the long distance between the strategic locations, while the modularity of the towers reduced freight costs and set-up time. By using a brand with a reputation for quality and support, the park got their custom colors, along with support for years to come.



Parking Lots



The savings in freight and installation helped offset the costs to special order towers with custom branding.



Guest Services and Security Operations



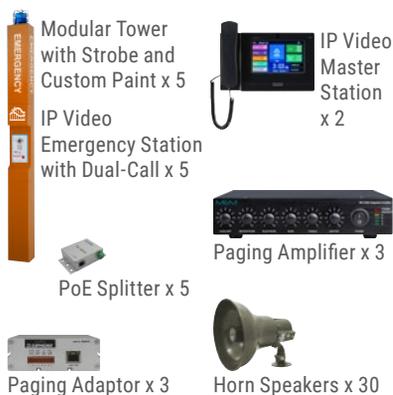
THE BENEFITS

- IP system eliminated wiring constraints and distances
- Modular towers were easy to ship and install, which increased system up-time
- Guests had easy access to services and security in discernible locations throughout the parking lots
- Video intercoms provided clear communication with guests, along with a close-up view to identify them
- Speakers on light poles would loudly broadcast alerts or voices to scare off prowlers
- Established manufacturer provided reliable products to meet custom branding requirements

IP Intercoms

System Configuration Example

Selected IX Series Equipment



Parking Lots



Equipment Closet



Amusement Park Offices



IP Door Stations: mix and match unlimited (can call up to 20 stations at one time)



IX-EA
IP Video Door Station
→ p. 90



IX-DVM
Mullion-Mount IP Video Door Station with Built-In Touchless Call Sensor
→ p. 90



IX-DV
IP Video Door Station
→ p. 90



IX-DVF
IP Video Door Station
→ p. 90



IX-DVF-4A
IP Video Door Station with Four Call Buttons
→ p. 90



IX-DVF-6
IP Video Door Station with Six Call Buttons
→ p. 90



IX-DVF-L
IP Video Door Station with T-Coil Compatibility (requires PoE and 24V DC)
→ p. 90



IX-DVF-HW
IP Video Door Station with Hand Wave Call Sensor and Surface Mount Box (requires PoE+)
→ p. 90



IX-DVF-PR
Card Access IP Video Door Station (includes built-in 125 kHz Wiegand proximity reader)
→ p. 90



IX-SS-2G
IP Audio Door Station
→ p. 91



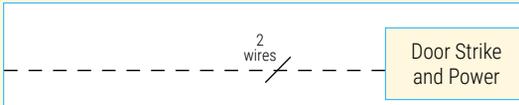
IX-SSA
IP Audio Door Station
→ p. 91



IX-NVP
IP Audio Door Station
→ p. 91



IX-NVP2
IP Audio Door Station with Two Call Buttons
→ p. 91



Sub Stations: mix and match unlimited



IX-RS-B
Audio Room Sub Station with Handset
→ p. 89



IX-RS-W
Audio Room Sub Station with Handset
→ p. 89

System Features

- Device supervision allows for scheduled or manual system checks to ensure all stations are operating as expected
- IP camera integration makes it easy to toggle between the close-up view of the video door station and the wide view of an IP camera
- Transfer calls between multiple stations based on a schedule or time delay
- PoE passthrough on IX-DV, IX-DVF, IX-DVF-4A, IX-DVF-6, IX-DVF-L, IX-DVF-PR, and IX-SSA stations can power additional device (requires PoE+)
- No costly licensing fees or additional servers
- Scalable system is easy to expand—mix and match an infinite (∞) number of door stations, emergency stations, master stations, sub stations, and mobile apps
- Support Tool programming allows for batch configurations
- ONVIF® Profile S video streaming
- All Call or group paging
- Priority call queuing
- Door release contacts available at door stations or IXW-MA for added security

Coming Soon
New cellular adaptor allows dialing from an IX or IXG Series door or entrance station



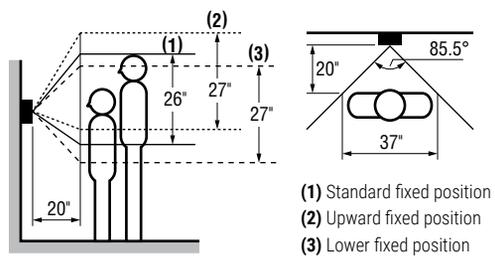
Calling Capacities

The IXG Commercial Series has an unlimited station capacity, where an infinite number of door stations, emergency stations, master stations, and sub stations can be part of the same system. However, there is a **calling capacity for each station** (refer to the chart below). Each door station, emergency station, or sub station can call up to 20 door stations, master stations, or sub stations at one time.

Chart illustrates calling capacities for each station.

	Master Stations	Door Stations, Emergency Stations, or Sub Stations
Address Book	9,999 stations and 20 recent calls	N/A
Calling	1 station OR 1 group of up to 50 masters/apps	1 group of up to 20 masters/apps <i>NOTE: An additional group can be called with the optional input or via CGI.</i>
Paging	All stations (All Page) OR groups up to 50 stations	Receive only

Camera View Area



IP Master Stations: mix and match unlimited

(can call up to 500 stations at one time)



IX-MV7-HB-L
IP Video Master Station with T-Coil Supported Handset
→ p. 88



IX-MV7-HW-JP
TAA-Compliant IP Video Master Station with Handset
→ p. 88



IX-MV7-HB
IP Video Master Station with Handset
→ p. 88



IX-MV7-B
IP Video Master Station
→ p. 88



IX-MV7-W
IP Video Master Station
→ p. 88

Mobile App Gateway: select unlimited adaptors



IXGW-GW
IXG Series Mobile App Gateway Adaptor (required for AIPHONE IXC App—service fee will apply)
→ p. 97

- Visitor screening
- Two-way communication
- Audio/Video recording
- Remote door release
- Up to eight mobile apps per tenant

NOTE: Monthly and annual mobile app subscription plans require the purchase of the IXGW-GW first and then the licenses are registered via PayPal®. Lifetime plans already include the IXGW-GW with prepaid licenses, which are purchased through Aiphone distribution partners. See the table on page p. 97 for the lifetime subscription plans.



IPW-1VC
2-Wire Network Adaptor Kit (includes one IPW-1VT, one receiver, and a power supply)
→ p. 113



IPW-1VT
Analog-to-IP Transmitter
→ p. 113



IPW-10VC
Rack Mount 2-Wire Network Adaptor Kit (includes one IPW-10VR and ten IPW-1VTs)
→ p. 113



IPW-10VR
Rack Mount 2-Wire Network Adaptor
→ p. 113



IXW-MAA
Multi-Purpose Adaptor
→ p. 89



IXW-MA
Multi-Purpose Adaptor
→ p. 89



IPW-POE8
8-Port PoE Switch
→ p. 113



IXW-HWCBP
Hand Wave Call Sensor and Surface Mount Box
→ p. 90



SBX-2G/A
Surface Mount Box for IX-SS-2G
→ p. 115



NEW SBX-CON1 (not shown)
Surface Mount Box with Conduit Cut Outs for IX-EA, IX-DV, or IX-DVM
→ p. 115



SBX-IXDV30
30° Angle Box for IX-DV
→ p. 116



IX-MB
Mullion Mounting Bracket for IX-DV
→ p. 116



SBX-IDVF
Surface Mount Box for IX-EA, IX-DV, or IX-SSA
→ p. 115



SBX-IDVFRA
Surface Mount Box for IX-DVF-L or IX-DVF-PR
→ p. 115

IP Intercoms

LAN

Dimensions

	INCHES			MILLIMETERS		
	Height	Width	Depth	Height	Width	Depth
IX-DV	8-1/16"	4-1/2"	2-1/16"	205.5	115	52.5
IX-DVF, IX-SSA	10-7/16"	5-7/8"	*	265	150	*
IX-DVF-4A, IX-DVF-6	13-11/16"	7-3/16"	*	347	182	*
IX-DVF-L, IX-DVF-PR	11-11/16"	7"	*	297	178	*
IX-DVF-HW	11-11/16"	7"	3-3/16"	297	178	80.3
IX-DVM	6-7/8"	1-7/8"	1-3/8"	175	48	34
IX-EA	6-5/16"	3-15/16"	1-11/16"	160	100	43.5
IX-NVP, IX-NVP2	5-1/2"	7-1/2"	*	140	191	*
IX-SS-2G	4-3/4"	4-3/4"	*	120	120	*
IX-MV7-B, IX-MV7-W	6-3/4"	8-11/16"	1-1/4"	172	220	31.5
IX-MV7-HB, IX-MV7-HB-L, IX-MV7-HW-JP	8-1/16"	11"	2-3/16"	204	280	55.5
IX-RS-B, IX-RS-W	7-9/16"	3-9/16"	2-5/8"	192	90	67

*Aiphone recommends a 2-1/2" minimum back box depth for all flush mount stations.

Specifications

Power Source PoE (802.3af)

IX-DV, IX-DVF, IX-DVF-4A, IX-DVF-6, IX-DVF-L, IX-SSA: PoE (802.3af) PoE+ (802.3at), or 24V DC—use PS-2420UL

Network Interface 10 BASE-T/100 BASE-TX Ethernet (RJ-45)

Mobile App: WiFi, 3G/4G/5G

Network Protocols IPv4, IPv6, TCP, UDP, SIP, HTTP, HTTPS, RTSP, RTP, RTCP, IGMP, MLD, SMTP, SFTP, DHCP, NTP, DNS

Bandwidth Usage Audio (G.722): 64Kbps x 2 for communication, 64Kbps for monitoring

Video (H.264): 32Kbps–2,048Kbps

IXGW-GW: 2Mbps minimum upload

Video Streaming ONVIF® Profile S or RTSP

Communication Hands-free or handset (full-duplex), push-to-talk (simplex)

Door Release IXW-MA: ten programmable dry contacts (four Form C, six Form A), 24V AC/DC, 500mA

IXW-MAA: ten Form C programmable dry contacts, 24V AC/DC, 500mA

IX-DV, IX-DVF, IX-DVF-4A, IX-DVF-6, IX-DVF-PR, IX-MV7-B, IX-MV7-W, IX-MV7-HB, IX-MV7-HB-L, IX-MV7-HW-JP, IX-SSA: two Form C dry contacts, 24V AC/DC, 1A

IX-DVM, IX-EA, IX-RS-B, IX-RS-W, IX-SS-2G: Form C dry contact, 24V AC/DC, 1A

Wire Type Cat-5e or Cat-6

Distance Door Station, Emergency Station, Sub Station, Master Station, or Network Adaptor to Network Node: 330'

Entrance Station: select up to 9,999



NEW

IXG-DM7-HIDA
IP Video Entrance Station with HID® Card Reader (requires a third-party host and additional wire to power card reader) → p. 96

Guard Station: select up to 9,999

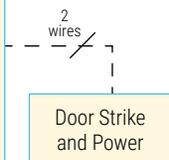


IXG-MK
IP Video Guard Station with Handset → p. 96

Single-Call Door Station: select up to 9,999



Standard IX Series door stations can be used at common entrances to control access into shared areas like a parking garage, pool, or fitness room. They can also be used as personal door stations for individual tenants. → p. 90-91



System Features

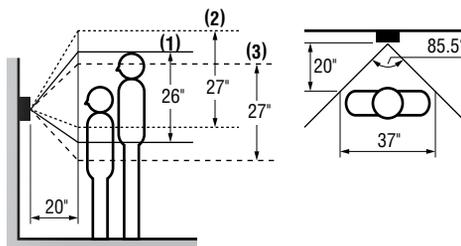
- Cloud-based mobile app (requires gateway adaptor—service fee may apply)
- Easy installation with all stations being PoE
- Modern touchscreen entrance station with optional surface mount box (SBX-IXGDM7, sold separately)
- Physical guard station with two-way video communication and privacy shutter
- Internal communication with up to eight tenant stations per apartment
- Optional elevator lift control adaptors ensure visitors are given access to the proper floor
- Simple programming with the IXG Support Tool
- Compatible with select IX Series stations (→ p. 20–21)

Dimensions

	INCHES			MILLIMETERS		
	Height	Width	Depth	Height	Width	Depth
IXG-2C7	5-13/16"	8-15/16"	1"	148	227	25.3
IXG-DM7-BOX	12-1/2"	6-1/8"	2-3/8"	317	156	60
IXG-DM7-HIDA	13-11/16"	7-3/16"	*	347	182	*
IXG-FMK-2C7	7-13/16"	11-7/16"	1-7/8"	199	290	47
IXG-MK	8-1/16"	11"	2-3/16"	204	280	55.5
IXGW-GW	4-1/4"	8-1/4"	2-3/8"	108.5	210	61
IXGW-LC	4-1/4"	8-1/4"	2-3/8"	108.5	210	61
SBX-IXGDM7	13-3/4"	7-5/16"	3-1/16"	349	185.9	78

*Aiphone recommends a 2-1/2" minimum back box depth for all flush mount stations.

Camera View Area



- (1) Standard fixed position
- (2) Upward fixed position
- (3) Lower fixed position

Coming Soon

New cellular adaptor allows dialing from an IX or IXG Series door or entrance station



See the next page for a real-world solution with this system installed.

Tenant Station: mix and match up to 9,999



IXG-2C7-L
IP Video Tenant Station with T-Coil Compatibility
→ p. 97



IXG-2C7
IP Video Tenant Station
→ p. 97

Mobile App Gateway: select up to 9,999



IXGW-GW
IXG Series Mobile App Gateway Adaptor
(required for AIPHONE IXG App—service fee will apply)
→ p. 97



- Visitor screening
- Two-way communication
- Audio/Video recording
- Remote door release
- Up to eight mobile apps per tenant

NOTE: Monthly and annual mobile app subscription plans require the purchase of the IXGW-GW first and then the licenses are registered via PayPal®. Lifetime plans already include the IXGW-GW with prepaid licenses, which are purchased through Aiphone distribution partners.

See the table below for the lifetime subscription plans.

United States	Canada
IXGW-GW-10	IXGW-GW-10C
IXGW-GW-25	IXGW-GW-25C
IXGW-GW-50	IXGW-GW-50C
IXGW-GW-75	IXGW-GW-75C
IXGW-GW-100	IXGW-GW-100C
IXGW-GW-150	IXGW-GW-150C
IXGW-GW-200	IXGW-GW-200C
IXGW-GW-250	IXGW-GW-250C
IXGW-GW-300	IXGW-GW-300C
IXGW-GW-350	IXGW-GW-350C
IXGW-GW-400	IXGW-GW-400C
IXGW-GW-450	IXGW-GW-450C
IXGW-GW-500	IXGW-GW-500C

Accessories



IXG-DM7-BOX
Flush Mount Back Box for IXG-DM7-HIDA
→ p. 96



SBX-IXGDM7
Surface Mount Back Box for IXG-DM7-HIDA
→ p. 115



IXGW-LC-RY20
Elevator Lift Control and Relay Adaptor
→ p. 97



IXGW-LC
Elevator Lift Control Adaptor
→ p. 97



IPW-POE8
8-Port PoE Switch
→ p. 113



GT-RY
External Signaling Relay for IXG-2C7
→ p. 84



MCW-S/B
Desk Stand for IXG-2C7 or IXG-2C7-L (mounting hardware included)
→ p. 117



IXG-FMK-2C7
Flush Mount Kit for IXG-2C7 or IXG-2C7-L
→ p. 97



IPW-1VC
2-Wire Network Adaptor Kit (includes one IPW-1VT, one receiver, and a power supply)
→ p. 113



IPW-1VT
Analog-to-IP Transmitter
→ p. 113



IPW-10VR
Rack Mount 2-Wire Network Adaptor
→ p. 113



IPW-10VC
Rack Mount 2-Wire Network Adaptor Kit (includes one IPW-10VR and ten IPW-1VTs)
→ p. 113

Compatible with IX Series Systems



→ p. 14-17

Specifications

- Power Source** PoE (802.3af)
- Network Interface** 10 BASE-T/100 BASE-TX Ethernet (RJ-45)
Mobile App: WiFi, 3G/4G
- Network Protocols** IPv4, IPv6, TCP, UDP, SIP, HTTP, HTTPS, RTSP, RTP, RTCP, IGMP, MLD, SMTP, SFTP, DHCP, NTP, DNS
- Bandwidth Usage** Audio (G.722): 64Kbps x 2 for communication, 64Kbps for monitoring
Video (H.264): 32Kbps–2,048Kbps
IXGW-GW: 2Mbps minimum upload
- Video Streaming** ONVIF® Profile S or RTSP
- Communication** Hands-free or handset (full-duplex), push-to-talk (simplex)
- Door Release & Relay Output** IXG-DM7-HIDA: two programmable Form C dry contacts
(Relay 1: 24V AC/DC, 3A
Relay 2: 24V AC/DC, 500mA)
IXG-MK: two programmable Form C dry contacts, 24V AC/DC, 1A
IXGW-LC, IXGW-LC-RY20: 20 programmable Form C dry contacts, 24V AC/DC, 500mA (IXGW-LC does not have door release)
- Wire Type** Cat-5e or Cat-6
- Distance** Entrance Station, Tenant Station, or Guard Station to Network Node: 330'

Adding Security and Communication to a Luxury Condominium



THE SCENARIO

A luxury condominium in a busy downtown area needed a way to control visitor access. The homeowner's association (HOA) wanted the luxury aspect to extend into all elements of their building, including the visitor management system. A majority of the 750 residents were young professionals, so the system also needed to keep up with their on-the-go lifestyle.

The building had two primary entrances, but residents did not have a convenient way of verifying visitors before unlocking either one. Corridors from each entrance met in the lobby, where a concierge desk was located. Visitors did not have a simple way to reach the concierge for their calls to be forwarded to the proper tenants. If they called residents via phone, the door would still remain locked until someone could physically open it. With the condominium being a large high-rise, this was a huge inconvenience for residents who relied on delivery services for meals, groceries, and other goods. They needed a quick and safe method to answer the door.

Being budget conscious, the HOA wanted a reliable system they would only have to install one time with minimal maintenance.

To maintain the luxury facet of their high-rise, the HOA chose a modern IP multi-tenant video intercom for visitor screening.

THE SOLUTION

To maintain the luxury facet of their condominium high-rise, the HOA chose a modern IP multi-tenant video intercom for visitor screening. Including a mobile app, residents could safely identify visitors whether they were home or away.

Touchscreen entrance stations enhanced the building's sophisticated and deluxe outward appearance. If the concierge on duty was reached, he could easily forward calls to residents via their apps. If residents were called, they could safely answer visitors directly from their mobile device and unlock the door on the spot.

With equipment from an established company selected, both the HOA and the residents knew their system would be keeping them safe for years to come.



Main Entrances



Modern entrance stations made it easy for visitors to request building access.

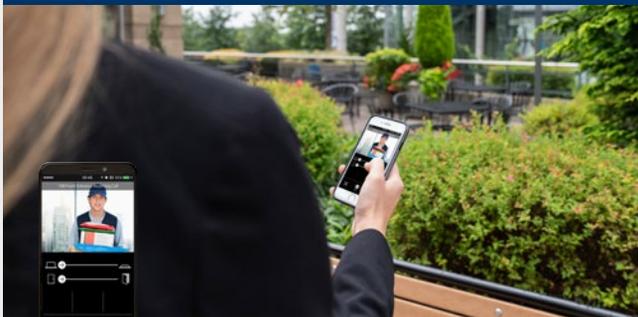
Concierge Desk



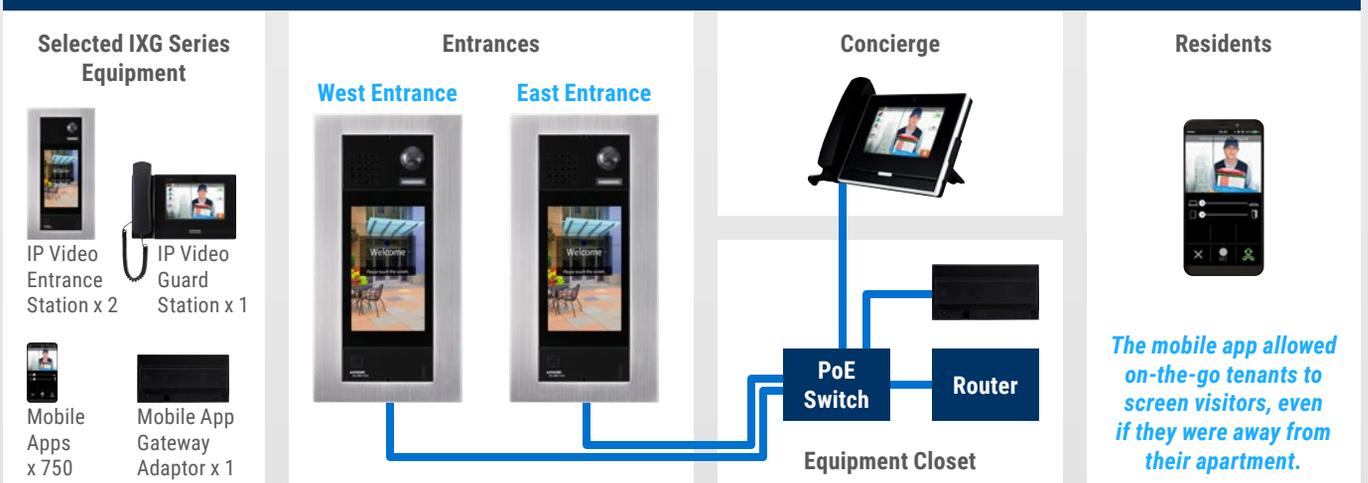
THE BENEFITS

- IP system eliminated wiring constraints and distances
- Modern technology and aesthetics enhanced building luxury and sophistication
- Video guard station provided a way for the concierge to confirm visitors and communicate with residents, even if they were away from home
- Cloud-based mobile app allowed residents to screen visitors while maintaining their on-the-go lifestyle
- Intuitive in-app slider eliminated the concern of accidentally unlocking entrances during off-hours
- Reliable system ensured the HOA and residents made a wise investment and would avoid major maintenance costs in the future

Residents



System Configuration Example



The mobile app allowed on-the-go tenants to screen visitors, even if they were away from their apartment.

Video Intercoms

JP Series

Video Intercom with
Call Partitioning
→ **p. 28**



JO Series

Video Intercom with Mobile App
→ **p. 32**



JV Series

Video Intercom
→ **p. 36**

NEW



AX Series

Video Intercom with Integration
→ **p. 38**



KB Series

Video Intercom with Handset
→ **p. 40**



JP Series Video Intercom w/ Call Partitioning

Box Sets: select 1 (up to 3 door stations and 7 sub master stations can be added)



START with a BOX SET

- JPS-4AED**
Box Set with JP-DA, JP-4MED, and PS-2420UL
- JPS-4AEDV**
Box Set with JP-DV, JP-4MED, and PS-2420UL
- JPS-4AEDF**
Box Set with JP-DVF, JP-4MED, and PS-2420UL

Door Stations: mix and match up to 4 (only up to 3 if a box set is selected)



JP-DA
Video Door Station
(included with JPS-4AED box set)
→ p. 101



JP-DV
Video Door Station
(included with JPS-4AEDV box set)
→ p. 101



JP-DVF
Video Door Station
(included with JPS-4AEDF box set)
→ p. 101



NEW JP-DVF-PR
Card Access Video Door Station
(includes built-in 125 kHz Wiegand proximity reader)
→ p. 101



GT-D
Audio Door Station
→ p. 82

Master Station



JP-4MED
Video Master Station with Handset
(included with all JPS box sets)
→ p. 100



Removable media storage!
SD or SDHC card can store up to 1,000 calls!
(Card not included)

Cat-5e/6 wire
N/A from Aiphone
(max. 650' between master station and adaptor)

2 wires
Aiphone #871802
(max. 330')

2 wires

2 wires
Aiphone #871802
(max. 33')

Door Strike and Power



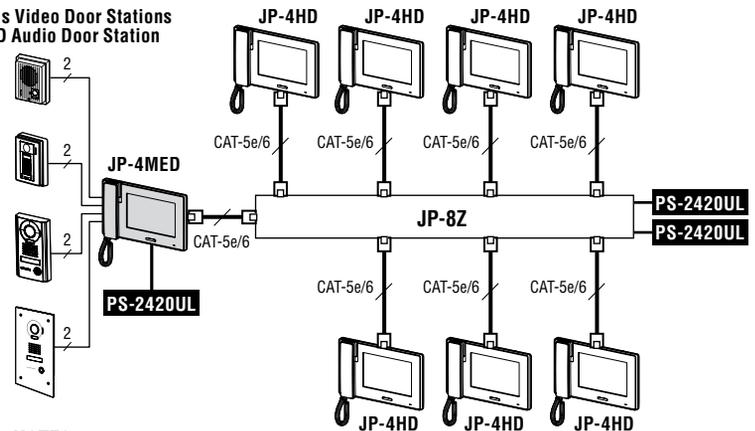
PS-2420UL
24V DC, 2A Power Supply
(included with all JPS box sets)
→ p. 119

System Features

- Camera position and zoom can be set for call-in
- Camera can be adjusted to compensate for bright illumination
- Picture memory records up to 20 calls to internal memory and max. 1,000 calls to removable SD/SDHC card (not included)
- Entry can be monitored via the master station and sub master stations
- One output to control a secondary device like a light, gate, or additional door
- Analog video output via supplied connector
- Convenient box sets are complete with a master station, each with a different door station, and a power supply (up to three more door stations and seven sub master stations can be added for a full 4 x 8 system)
- Homerun or daisy chain wiring options (see installation manual for details)

Wiring

JP Series Video Door Stations or GT-D Audio Door Station



NOTES:

1. Total cumulative wiring distance between master and sub master stations is 980' (300m)
2. Master station (JP-4MED) requires one power supply
3. Up to four sub master stations (JP-4HD) can use one power supply (use two power supplies for additional sub master stations)



Distribution Adaptor (required for homerun wiring method)



JP-8Z
Distribution Adaptor
for Video Sub
Master Stations
→ p. 100

2 wires
Aiphone
#871802
(max. 33')

PS-2420UL
24V DC, 2A
Power Supply
→ p. 119

2 wires
Aiphone
#871802
(max. 33')

PS-2420UL
24V DC, 2A
Power Supply
→ p. 119

Sub Master Station: select up to 7 (optional)

Cat-5e/6 wire
N/A from
Aiphone
(max. 165' between
adaptor and sub
master stations)



JP-4HD
Video Sub Master
Station with Handset
→ p. 100



JP-4HD → p. 100



JP-4HD → p. 100



JP-4HD → p. 100



JP-4HD → p. 100

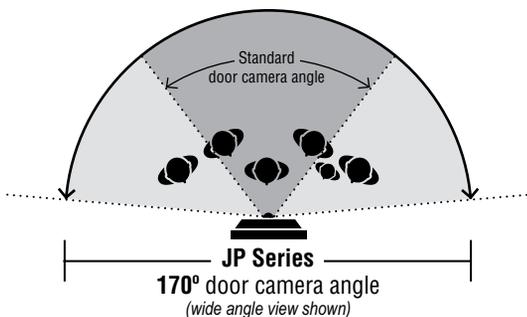


JP-4HD → p. 100



JP-4HD → p. 100

Camera View Area



Dimensions

	INCHES			MILLIMETERS		
	Height	Width	Depth	Height	Width	Depth
GT-D	5-1/8"	3-7/8"	1-1/8"	130	98	28.5
JP-4MED, JP-4HD	5-11/16"	10-1/16"	1-7/8"	145	255	48
JP-8Z	4-5/16"	4-13/16"	2-3/8"	109	123	61
JP-DA	5-1/16"	3-13/16"	1-3/16"	129	97	30.5
JP-DV	6-13/16"	3-7/8"	1-1/16"	173	98	27
JP-DVF	8-1/4"	5-5/16"	*	209	135	*
JP-DVF-PR	11-11/16"	7	*	297	178	*

*Aiphone recommends a 2-1/2" minimum back box depth for all flush mount stations.

Accessories



SBX-CON1 (not shown)
Surface Mount Box with
Conduit Cut Outs for
GT-D, JP-DA, or JP-DV
→ p. 115



KAW-D
30° Angle
Box for
JP-DA
→ p. 116



MKW-P
1-Gang
Mounting
Plate for
JP-DV
→ p. 117



KMB-45
45° Mullion
Mounting
Bracket
for GT-D
or JP-DA
→ p. 116



JK-MB
Mullion
Mounting
Bracket for
JP-DV
→ p. 116



SBX-DV30
30° Angle
Box for
JP-DV
→ p. 116



SBX-DVF
Surface Mount
Box for JP-DVF
→ p. 115



SBX-ACE
Surface Mount Box
for GT-D or JP-DA
and one Access
Control Device
→ p. 115



JPW-BA
Long
Distance/
CCTV
Adaptor
for Door
Stations
→ p. 100

EL-12S
Electric
Door Strike
for Wood
Frames
(requires
PT-1210NA)
→ p. 114



RY-1824L
Form C Door
Release Relay
(one per door-max.
two per system)
→ p. 114



RY-3DL
Selective Door
Release Adaptor
(for three or
four doors-
four doors require
one RY-3DL and
one RY-1824L)
→ p. 114



IER-2
Call
Extension
Speaker
→ p. 114



RY-ES
External
Signaling
Relay
→ p. 114



MCW-S/B
Desk Stand for
JP-4MED or JP-4HD
(mounting
hardware included)
→ p. 117

Specifications

Power Source 24V DC—use PS-2420UL

Communication Hands-free (VOX) or handset (full-duplex)

Door Release Two N/O or N/C dry contacts, 24V AC/DC, 500mA
(use RY-1824L or RY-3DL for larger contact rating)

Wire Type Door Station to Master Station: 2-cond., mid cap,
solid, non-shielded—use Aiphone #871802

Power Supply to Master Station: 2-cond., mid cap,
solid, non-shielded—use Aiphone #871802

Master Station to Adaptor: Cat-5e or Cat-6

Adaptor to Sub Master Station: Cat-5e or Cat-6

Distance Door Station to Master Station: 330'

Master Station to Distribution Adaptor: 650'

Distribution Adaptor to Sub Master Station: 165'

Door Station to Long Distance/CCTV Adaptor: 650'

Long Distance/CCTV Adaptor to Master Station: 330'

Power Supply to Master Station:
16' (22 AWG) 33' (18 AWG)

Power Supply to Distribution Adaptor:
16' (22 AWG) 33' (18 AWG)

Total Cumulative Between Inside Stations: 980'

Adding Security and Communication to a Bustling Warehouse



THE SCENARIO

Workers at a local warehouse were having challenges with their two employee-only entrances and single delivery entrance, which were all kept locked. For convenience, employees were provided access cards to enter either of the two employee entrances. However, those who forgot their cards—as well as any welcome visitors—had no way to request entry other than to knock.

The warehouse was a loud, bustling place and often an employee would be stuck outside before their knocking was heard. The same issue was happening at the delivery door. Drivers who did not have credentials would be forced to knock for several minutes to get the attention of someone to let them inside. Deliveries were missed after drivers gave up and carried on to their next stop, creating logistical challenges with inventory.

This inconvenience became a security problem when a former employee arrived and began knocking. Unaware of the trouble outside, the door was unlocked and the intruder forced his way inside. The aggressor assaulted his former supervisor and damaged property before police could arrive.

Management at the warehouse decided to have vandal-resistant video intercoms installed at each entrance.

THE SOLUTION

Management at the warehouse had video intercoms installed at each entrance. This provided employees with missing or forgotten access cards, as well as visitors and delivery drivers, an easy way to call for access.

A bell and strobe was installed and activated by calls from the door stations. This ensured all incoming calls were clearly noticed by staff. Calls could be answered by any of the interior master stations, and provided a clear identifying view of the person at the door.

The video doorbell system allowed employees to speak with callers to determine their needs before granting access. This increased the safety of workers, ensuring only those who needed to be let in were granted entry.



Employee and Delivery Entrances



The video doorbell allowed employees to speak with callers to determine their purpose before granting them access.

Warehouse Interior

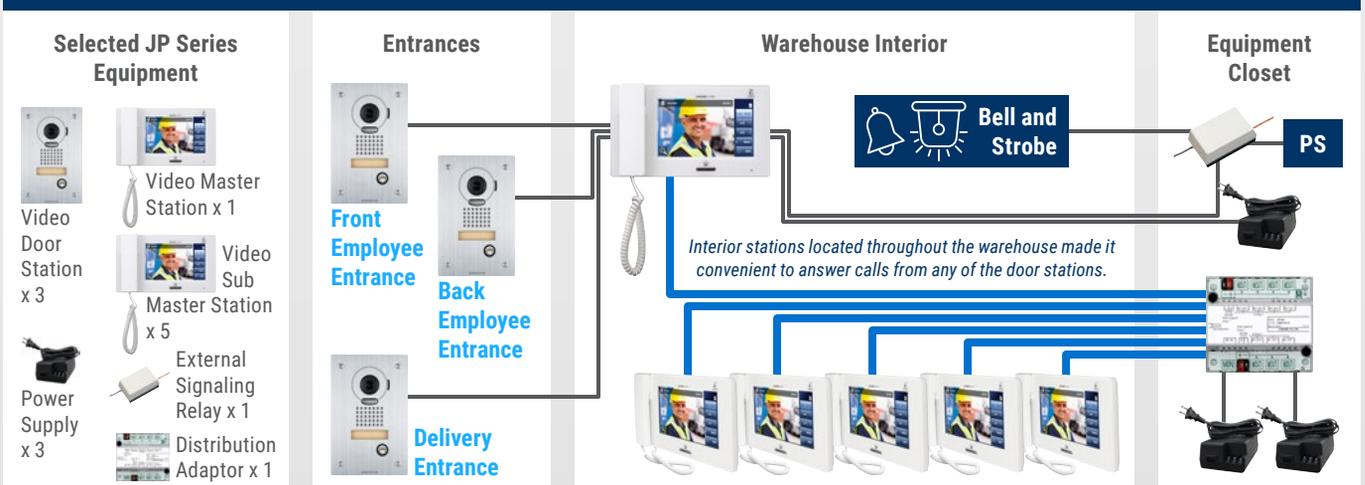


THE BENEFITS

- Employees with lost or forgotten credentials could easily request access
- The warehouse became a safer work environment after employees could easily verify identity and intent before letting anyone inside
- Drivers could notify staff of their arrival, so deliveries were no longer missed
- Multiple interior stations throughout the warehouse provided convenient places to take calls
- Bell and strobe alerts ensured that calls could be heard over the noise of an active environment



System Configuration Example



Box Sets: select 1 (a JO-DV and a JO-1FD can be added to any box set-up to 8 apps can be added to the app-compatible sets)

Box Sets with App-Compatible Master Station

JOS-1AW
Box Set with JO-DA, JO-1MDW, and PS-1820UL

JOS-1VW
Box Set with JO-DV, JO-1MDW, and PS-1820UL

JOS-1FW
Box Set with JO-DVF, JO-1MDW, and PS-1820UL



Door Stations: select a box set and a single JO-DV for the second door station option

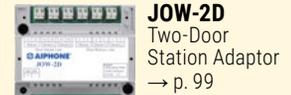


JO-DA
Video Door Station (included with JOS-1AW box set-not sold separately) → p. 99

JO-DV
Video Door Station (included JOS-1VW box set-also sold separately) → p. 99

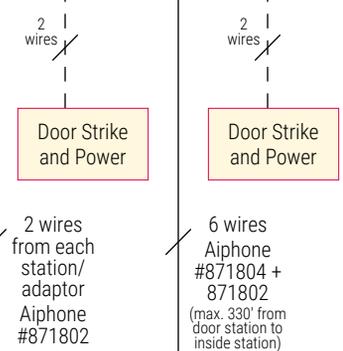
JO-DVF
Video Door Station (included JOS-1FW box set-not sold separately) → p. 99

Two-Door Station Adaptor (required for 2 door stations)



JOW-2D
Two-Door Station Adaptor → p. 99

NOTE: Use JO-DV for the second door station, which is sold separately.



PS-1820UL
18V DC, 2A Power Supply (included with all JOS box sets) → p. 119

2 wires
Aiphone #871802 (max. 33')

Expansion Station (optional)



JO-1FD
Video Expansion Station → p. 98

IMPORTANT WIRING NOTICE: When the optional JO-1FD is part of the system, it must be wired in between the door station and master station (as shown in the wiring example **WITH** JO-1FD).

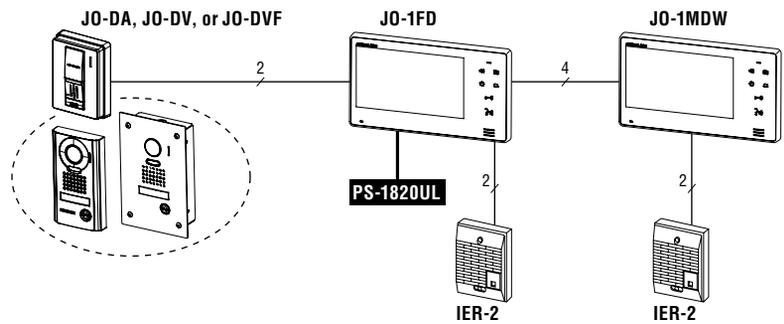
START with a BOX SET

System Features

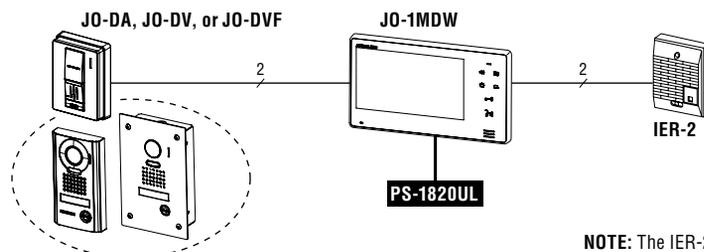
- Compact, attractive design complements most interiors
- Video monitoring
- One output to control a secondary device like a light or gate
- Up to eight mobile apps can be connected (requires JO-1MDW and 2.4Ghz WiFi connection)
- Convenient box sets are complete with a master station, each with a different door station, and a power supply (one expansion master station and a second door station can be added for a 2 x 2 system)
- Simple daisy chain wiring

Wiring

Example WITH JO-1FD



Example WITHOUT JO-1FD



NOTE: The IER-2 is optional.



Master Station: select 1 (none if a box set is selected)



JO-1MDW

App-Compatible Video Master Station
(included with J0S-1AW, J0S-1VW, and J0S-1FW box sets—also sold separately)
→ p. 98

IMPORTANT WIRING NOTICE:

When the optional JO-1FD is not part of the system, the door station, power supply, and door strike all wire directly to the JO-1MDW (as shown in the wiring example **WITHOUT** JO-1FD).

4 wires
Aiphone
#871804
(max. 330')

2 wires*
Aiphone
#871802
(max. 330')

*Two additional wires are required for door release

Mobile App



Intercom App Type B

JO Series Mobile App
(up to eight free mobile apps per system—requires JO-1MDW and 2.4Ghz WiFi connection)
→ p. 98

Accessories

NEW

SBX-CON1 (not shown)
Surface Mount Box with Conduit Cut Outs for JO-DA or JO-DV
→ p. 115



KAW-D
30° Angle Box for JO-DA
→ p. 116



MKW-P
1-Gang Mounting Plate for JO-DV
→ p. 117



KMB-45
45° Mullion Mounting Bracket for JO-DA
→ p. 116



JK-MB
Mullion Mounting Bracket for JO-DV
→ p. 116



SBX-DV30
30° Angle Box for JO-DV
→ p. 116



SBX-DVF
Surface Mount Box for JO-DVF
→ p. 115



SBX-ACE
Surface Mount Box for JO-DA and one Access Control Device
→ p. 115



EL-12S
Electric Door Strike for Wood Frames (requires PT-1210NA)
→ p. 114



RY-1824L
Form C Door Release Relay
→ p. 114



MCW-S/B
Desk Stand for JO-1MDW or JO-1FD (mounting hardware included)
→ p. 117



IER-2
Call Extension Speaker
→ p. 114



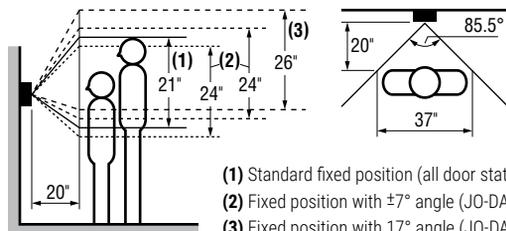
RY-ES
External Signaling Relay
→ p. 114

Dimensions

	INCHES			MILLIMETERS		
	Height	Width	Depth	Height	Width	Depth
JO-1FD	5-1/8"	9-1/16"	13/16"	130	230	21
JO-1MDW	6-1/8"	8-1/4"	1-1/16"	155	210	27
JO-DA	5-1/16"	3-13/16"	1-3/8"	129	97	35.5
JO-DV	6-13/16"	3-7/8"	1-1/16"	173	98	26.8
JO-DVF	8-1/4"	5-5/16"	*	209	135	*

*Aiphone recommends a 2-1/2" minimum back box depth for all flush mount stations.

Camera View Area



- (1) Standard fixed position (all door stations)
- (2) Fixed position with $\pm 7^\circ$ angle (JO-DA only)
- (3) Fixed position with 17° angle (JO-DA only)

Specifications

Power Source 18V DC—use PS-1820UL

Communication Hands-free (VOX) or push-to-talk (simplex)

Door Release JO-1MDW: N/O dry contact, 24V AC/ DC, 1A

JO-1FD: N/O dry contact, 24V AC/DC, 500mA (use RY-1824L for larger contact rating)

Wire Type Door Station to Master Station: 2-cond., mid cap, solid, non-shielded—use Aiphone #871802

Door Station to Expansion Station: 2-cond., mid cap, solid, non-shielded—use Aiphone #871802

Expansion Station to Master Station: 4-cond., mid cap, solid, non-shielded—use Aiphone #871804

Expansion Station to Master Station (with door release): 6-cond., mid cap, solid, non-shielded—use Aiphone #871804 + #871802

Distance Door Station to Master Station: 165' (22 AWG) 330' (18 AWG)

Door Station to Expansion Station: 165' (22 AWG) 330' (18 AWG)

Expansion Station to Master Station: 165' (22 AWG) 330' (18 AWG)

Power Supply to Master Station: 16' (22 AWG) 33' (18 AWG)

Adding Security and Communication to a Retail Dress Shop



THE SCENARIO

A popular retail dress shop was a staple in the community. Unfortunately, the small business owner and her employees were experiencing growing problems with crime.

After several robberies, unwanted visitors, and an after-hours assault on an employee, they decided to switch to an appointment-only model. This switch allowed them to keep doors locked during normal hours, better protecting clients and employees.

The business owner employed consultants and clerical associates. Consultants would provide one-on-one service and were often unavailable while working directly with clients. Associates would gather materials, provide clerical support, receive deliveries, answer calls, and coordinate schedules, frequently being away from the reception desk.

It was important to the business owner for her employees to be able to see and speak with visitors, whether calls were from the front door or the delivery door. She wanted a system at the reception area to instantly activate when a call is placed, as well as a mobile solution to provide employees a way to answer the doors while they were on the go.

The dress shop owner selected a video doorbell system to identify customers and vendors before unlocking the door.

THE SOLUTION

The business owner chose to have a vandal-resistant video doorbell station installed at both the front entrance and the delivery entrance at the back of the shop.

A primary intercom station was placed at the shop's reception area so an employee could instantly see and talk with anyone arriving at either door.

Each of the employees also installed a mobile app on their smartphone so they could answer visitors in case the reception area was unattended.

Employees could see and speak with anyone at either door from anywhere in the building to verify their identity before allowing them into the store.



Front and Delivery Entrances



Employees could rely on the video doorbell system to verify their deliveries and appointments, even after normal business hours.

Reception Area and Roaming Employees

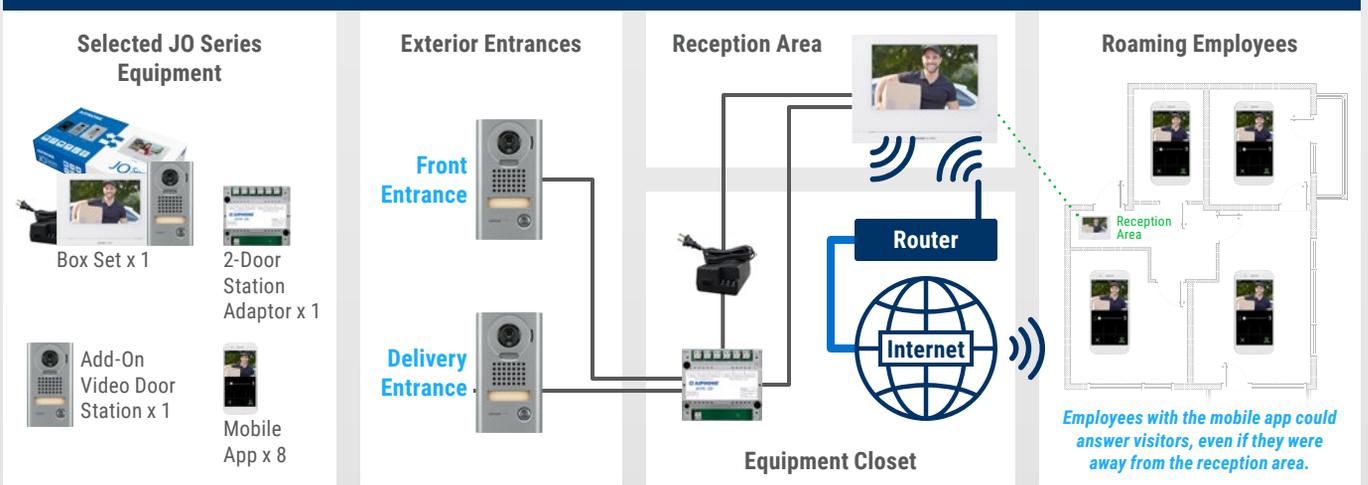


THE BENEFITS

- Video doorbell stations allowed employees to see and hear visitors or vendors before letting them inside
- Vandal-resistant door stations are durable for a more rugged outside environment
- Inside station at reception provided instant 2-way communication to the door stations
- Mobile apps allowed employees to verify visitors and vendors from anywhere in the shop
- Customers received the service they expected while employees felt safer at work



System Configuration Example



Box Sets: select 1
(a JV-1FD can be added to any box set)



JVS-1V
Box Set with JV-DV, JV-1MD,
and PS-2420UL

JVS-1F
Box Set with JV-DVF, JV-1MD,
and PS-2420UL

START with a BOX SET

Door Stations: select a box set



JV-DV
Video Door Station
(included with JVS-1V box
set—not sold separately)
→ p. 102



JV-DVF
Video Door Station
(included with JVS-1F box
set—not sold separately)
→ p. 102

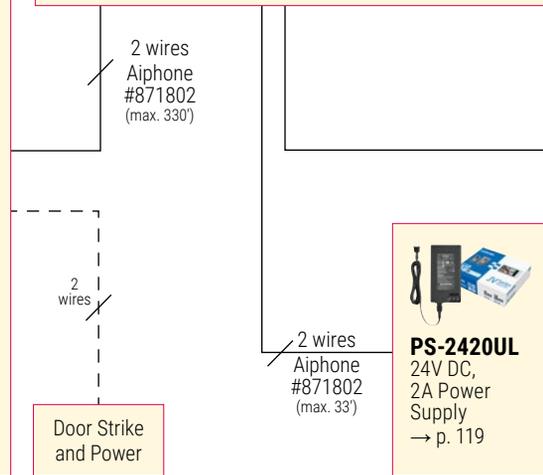
Expansion Station (optional)



JV-1FD
Video Expansion Station
→ p. 102

IMPORTANT WIRING NOTICE:

When the optional JV-1FD is part of the system, it must be wired in between the door station and master station.



System Features

- Compact, attractive design complements most interiors
- Video monitoring
- One output to control a secondary device like a light or gate
- Convenient box sets are complete with a master station, each with a different door station, and a power supply (one expansion master station can be added for a 1 x 2 system)
- Simple daisy chain wiring

Master Station: select a box set



JV-1MD
Video Master Station
(included with JVS-1A and JVS-1F
box sets—not sold separately)
→ p. 102

IMPORTANT WIRING NOTICE:

When the optional JV-1FD is not part of the system, the door station, power supply, and door strike all wire directly to the JV-1MD.

4 wires
Aiphone
#871804
(max. 330')

Accessories

NEW

SBX-CON1 (not shown)
Surface Mount Box
with Conduit Cut
Outs for JV-DV
→ p. 115



MKW-P
1-Gang
Mounting
Plate for
JV-DV
→ p. 117



JK-MB
Mullion
Mounting
Bracket for
JV-DV
→ p. 116



SBX-DV30
30° Angle Box
for JV-DV
→ p. 116



SBX-DVF
Surface Mount
Box for JV-DVF
→ p. 115



IER-2
Call
Extension
Speaker
→ p. 114



EL-12S
Electric Door Strike for Wood Frames
(requires PT-T210NA)
→ p. 114



RY-1824L
Form C Door
Release Relay
→ p. 114



RY-ES
External
Signaling
Relay
→ p. 114



MCW-S/B
Desk Stand
for JV-1MD or
JV-1FD (mounting
hardware included)
→ p. 117

Dimensions

	INCHES			MILLIMETERS		
	Height	Width	Depth	Height	Width	Depth
JV-1MD, JV-1FD	5-1/8"	9-1/16"	13/16"	130	230	21
JV-DV	6-11/16"	3-3/16"	15/16"	170	97	23.2
JV-DVF	8-1/4"	5-5/16"	*	209	135	*

*Aiphone recommends a 2-1/2" minimum back box depth for all flush mount stations.

Specifications

Power Source 24V DC—use PS-2420UL

Communication Hands-free (VOX) or push-to-talk (simplex)

Door Release Master/Expansion Station and Door Station
Output: N/O dry contact, 24V AC/ DC, 1A

Second Door Station Output: N/O wet
contact, 500 mA or less, 12V DC

Door Station Input: request to exit, N/O dry contact

Wire Type Door Station to Master Station: 2-cond., mid cap,
solid, non-shielded—use Aiphone #871802

Door Station to Expansion Station: 2-cond., mid
cap, solid, non-shielded—use Aiphone #871802

Expansion Station to Master Station: 4-cond.,
mid cap, solid, non-shielded—use Aiphone #871804

Expansion Station to Master Station (with door
release): 6-cond., mid cap, solid, non-shielded—
use Aiphone #871804 + #871802

Distance Door Station to Master Station:
165' (22 AWG) 330' (18 AWG)

Door Station to Expansion Station:
165' (22 AWG) 330' (18 AWG)

Expansion Station to Master Station:
165' (22 AWG) 330' (18 AWG)

Power Supply to Master Station:
16' (22 AWG) 33' (18 AWG)

AX Series Video Intercom with Integration

Door Stations and Indoor Sub Stations: mix and match up to 120



AX-DV
Video Door Station
→ p. 77



AX-DVF
Video Door Station
→ p. 77



AX-DV-P
Video Door Station with HID® Card Reader
(requires a third-party host and additional wire to power card reader)
→ p. 77



AX-DVF-P
Video Door Station with HID® Card Reader
(requires a third-party host and additional wire to power card reader)
→ p. 77



AX-DM
Mullion-Mount Audio Door Station
→ p. 77



IF-DA
Audio Door Station
→ p. 86



IE-JA
Audio Door Station
→ p. 86



IE-SS/A
Audio Door Station
→ p. 86



IE-SSR
Audio Door Station
→ p. 86



AX-A
Audio Sub Station
→ p. 78



AX-AN
Privacy Audio Sub Station
→ p. 78



AX-B
Audio Sub Station
→ p. 78



AX-BN
Privacy Audio Sub Station
→ p. 78

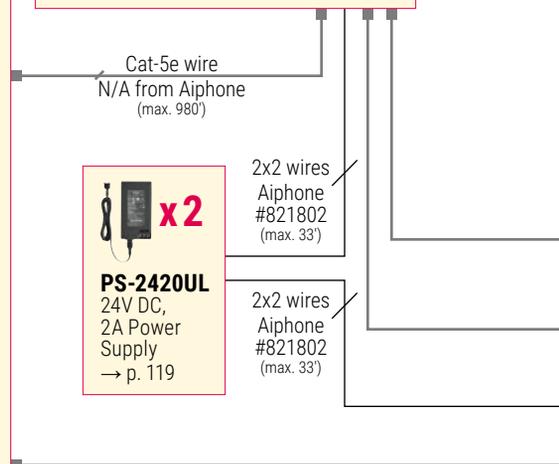
Central Exchange Units: select 1



AX-084C
Central Exchange Unit
(supports up to 4 master stations and 8 door/sub stations)
→ p. 78



AX-248C
Central Exchange Unit
(supports up to 8 master stations and 24 door/sub stations)
→ p. 78



System Features

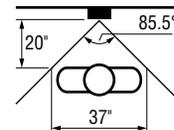
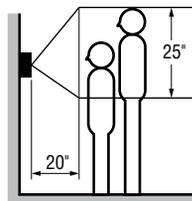
- Two talk channels
- Composite video output from CEU/video masters
- Scan monitoring
- Cat-5e wiring homerun from each station
- Selective calling between masters, and from masters to door/sub stations
- All Call or Group Call between master stations
- Normal or priority call levels
- PC programmable
- Transfer calls to an outside POTS line (requires Viking Model K-1900-5 programmable dialer)

Dimensions

	INCHES			Recessed	MILLIMETERS			
	Height	Width	Depth		Recessed	Height	Width	Depth
AX-084C, AX-248C, AX-320C	3-7/16"	16-9/16"	13-3/16"	-	88	420	335	-
AX-8MV, AX-8M, AX-8MV-W	6-7/8"	7-5/8"	2-9/16"	-	175	194	65	-
AX-A, AX-AN	7-1/16"	5-5/8"	2-1/8"	-	180	143	53.5	-
AX-B, AX-BN	8-3/16"	6"	2"	9/16"	208	153	50.5	15
AX-DM	6-5/16"	1-11/16"	7/8"	-	160	43	22.5	-
AX-DV	7-11/16"	3-15/16"	1"	-	195	100	25	-
AX-DVF	9-11/16"	5-3/4"	*	-	246	146	*	-
AX-DVF-P	11-5/8"	5-3/4"	*	-	295	146	*	-
AX-DV-P	9-5/8"	3-15/16"	1"	-	245	100	25	-
IE-JA	4-1/2"	4-9/16"	*	-	115	116	*	-
IE-SS/A, IE-SSR	4-3/4"	4-3/4"	*	-	121	121	*	-
IF-DA	5-1/8"	3-7/8"	1-1/8"	-	130	98	28.5	-

*Aiphone recommends a 2-1/2" minimum back box depth for all flush mount stations.

Camera View Area



Master Stations: mix and match up to 8



AX-8MV
Video Master Station
→ p. 76



AX-8MV-W
Video Master Station
(recommended for an 8 x 8 system only)
→ p. 76

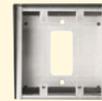


AX-8M
Audio Master Station
→ p. 76

Accessories



AX-16SW
16-Call Add-On Selector for AX-8MV or AX-8M (max. seven per master station)
→ p. 76



SBX-2G/A
Surface Mount Box for IE-JA, IE-SS/A, or IE-SSR
→ p. 115



KMB-45
45° Mullion Mounting Bracket for IF-DA
→ p. 116



SBX-AXDV30
30° Angle Box for AX-DV
→ p. 116



SBX-AXDVF
Surface Mount Box for AX-DVF
→ p. 115



SBX-DVF-P
Surface Mount Box for AX-DVF-P
→ p. 115



EL-12S
Electric Door Strike for Wood Frames (requires PT-1210NA)
→ p. 114



RY-1824L
Form C Door Release Relay (one per door)
→ p. 114



AXW-PA1
Paging Adaptor
→ p. 78



RY-ES
External Signaling Relay
→ p. 114



IER-2
Call Extension Speaker
→ p. 114

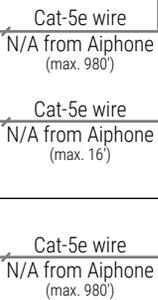


MCW-S/B
Desk Stand for AX-8MV, AX-8MV-W, or AX-8M (mounting hardware included)
→ p. 117

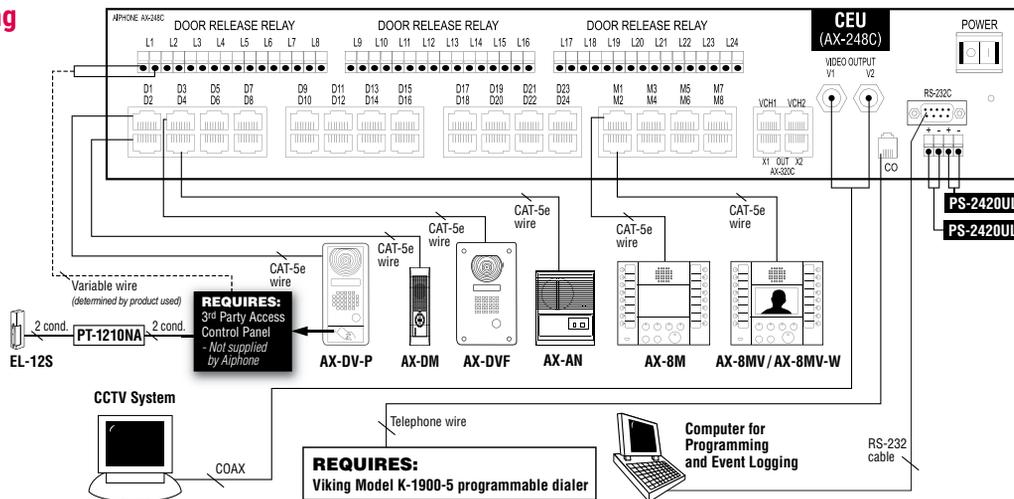
Add-On Central Exchange Unit: select up to 3 (optional)



AX-320C
Add-On Central Exchange Unit (supports up to 32 door/sub stations)
→ p. 78



Wiring



Specifications

<p>Power Source 24V DC—use two PS-2420ULs</p> <p>Communication Hands-free (VOX) or push-to-talk (simplex)</p> <p>Door Release Programmable dry contact, 24V AC/DC, 500mA—use RY-1824L for larger contact rating</p>	<p>Wire Type Between Door/Sub Station, Master Station, and Central Exchange Unit: Cat-5e</p> <p>Power Supply to Central Exchange Unit and Add-On Central Exchange Unit: 2-cond., overall shield—use Aiphone 821802</p> <p>Distance Door/Sub Station to Central Exchange Unit and Add-On Central Exchange Unit: 980'</p> <p>Central Exchange Unit to Master Station: 980'</p> <p>Central Exchange Unit to Add-On Central Exchange Unit: 16'</p> <p>Power Supply to Central Exchange Unit and Add-On Central Exchange Unit: 16' (22 AWG) 33' (18 AWG)</p>
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KB Series Video Intercom with Handset

Video Intercoms

Door Stations: mix and match up to 3 (max. 1 audio door station per system)

Master Station



KB-DAR
Video Door Station
→ p. 103



KB-DAR-M
Video Door Station
→ p. 103



AX-DM
Audio Door Station
→ p. 77



IF-DA
Audio Door Station
→ p. 86



IE-JA
Audio Door Station
→ p. 86



IE-SS/A
Audio Door Station
→ p. 86



IE-SSR
Audio Door Station
→ p. 86



KB-3MRD
Video Master Station with Handset
→ p. 103

2 wires
Aiphone
#871802
(max. 650')

Door Strike and Power

2 wires

RY-3DL
Selective Door Release Adaptor
→ p. 114

2 wires

Door Strike and Power

6 wires

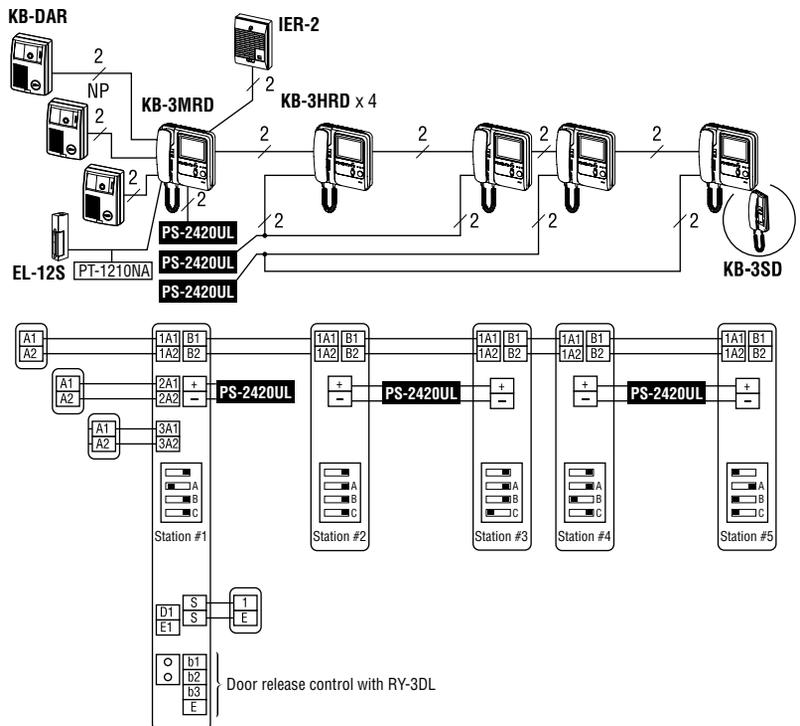
2 wires
Aiphone
#871802
(max. 33')

PS-2420UL
24V DC, 2A
Power Supply
→ p. 119

System Features

- Instant voice call-in with image
- Selective Call or All Call
- Chime or receiver volume control
- Selective door release with RY-3DL
- Video out to DVR via supplied connector
- 330' total distance looped between monitors

Wiring



NOTES: 1. D1 and E1 for IE Series door stations (audio only) instead of third KB-DAR
2. Run audio/video wires in a separate jacketed cable from door release wires

Sub Master Stations: mix and match up to 4 (optional—max. 2 audio sub master stations per system)



KB-3HRD
Video Sub Master Station with Handset
→ p. 103



KB-3SD
Audio Sub Master Station with Handset
(max. two per system)
→ p. 103

2 wires
Aiphone #871802
(max. 330' between master station and farthest sub master station)

2 wires
Aiphone #871802
(max. 33')



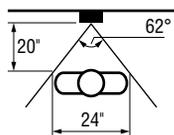
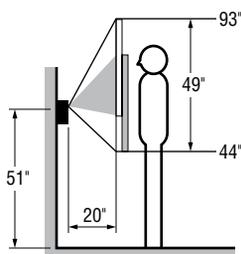
PS-2420UL
24V DC, 2A Power Supply
(required for every two KB-3HRDs)
→ p. 119

Dimensions

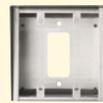
	INCHES			MILLIMETERS		
	Height	Width	Depth	Height	Width	Depth
AX-DM	6-5/16"	1-11/16"	7/8"	160	43	22.5
IE-JA	4-1/2"	4-9/16"	*	115	116	*
IE-SS/A, IE-SSR	4-3/4"	4-3/4"	*	121	121	*
IF-DA	5-1/8"	3-7/8"	1-1/8"	130	98	28.5
KB-3MRD, KB-3HRD	7-11/16"	7-5/16"	3-5/16"	195	185	84
KB-3SD	8-1/4"	3-15/16"	2-7/8"	210	100	73.5
KB-DAR, KB-DAR-M	5-1/2"	4-1/8"	1-3/4"	140	105	44

*Aiphone recommends a 2-1/2" minimum back box depth for all flush mount stations.

Camera View Area



Accessories



SBX-2G/A
Surface Mount Box for IE-JA, IE-SS/A, or IE-SSR
→ p. 115



SBX-CON1 (not shown)
Surface Mount Box with Conduit Cut Outs for AX-DM, IF-DA, KB-DAR, or KB-DAR-M
→ p. 115



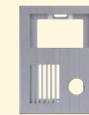
SBX-ACE
Surface Mount Box for AX-DM, IF-DA, KB-DAR, or KB-DAR-M and one Access Control Device
→ p. 115



KMB-45
Mullion Mounting Bracket for IF-DA, KB-DAR, or KB-DAR-M
→ p. 116



KAW-D
30° Angle Box for IF-DA, KB-DAR, or KB-DAR-M
→ p. 116



KA-DGR
Surface Mount Housing Panel for KB-DAR or KB-DAR-M (door station not included)
→ p. 103



IER-2
Call Extension Speaker
→ p. 114



EL-12S
Electric Door Strike for Wood Frames (requires PT-1210NA)
→ p. 114



RY-1824L
Form C Door Release Relay (for one door)
→ p. 114



RY-3DL
Selective Door Release Adaptor (for two or three doors)
→ p. 114



RY-ES
External Signaling Relay
→ p. 114



MCW-S/B
Desk Stand for KB-3MRD or KB-3HRD (mounting hardware included)
→ p. 117

Specifications

Power Source 24V DC—use PS-2420UL

Communication Handset (full-duplex)

Door Release N/O dry contact, 12V AC, 400mA—use RY-1824L for larger contact rating or RY-3DL for two or three doors

Wire Type 2-cond., mid cap, solid, non-shielded—use Aiphone #871802

Distance Master Station to Door Station:
330' (22 AWG) 650' (18 AWG)

Master Station to farthest Sub Master Station:
165' (22 AWG) 330' (18 AWG)

Power Supply to Master Station or Sub Master Station:
16' (22 AWG) 33' (18 AWG)

Residents Could Keep Their Building Safer Even When Away

A Real-Word Tenant Mobile App Solution for a Luxury Condominium

The HOA of this condo wanted a security system that would appeal to their residents' on-the-go lifestyle.

By installing an IP multi-tenant video intercom with mobile app capability, residents could safely screen visitors directly from their smartphone, even if they weren't home.

AIPHONE SOLUTION SHOWCASE

Entrance stations made it easy for visitors to request building access.

THE BENEFITS

- Modern technology and aesthetics enhanced building luxury and sophistication
- Video guard station provided a way for the concierge to screen visitors and communicate with residents, even if they were away from home
- Cloud-based mobile apps allowed residents to screen visitors while maintaining their on-the-go lifestyle
- Intuitive in-app alerts eliminated the concern of accidentally unlocking entrances during off-hours
- Reliable system ensured the HOA and residents made a wise investment and would avoid major maintenance costs in the future

System Configuration Example

IP Multi-Tenant Video Intercom

Entrance

- IP Entry Station
- IP Entry Station
- IP Entry Station

Concierge

- Video Guard Station
- Video Guard Station

Residents

- Mobile App
- Mobile App

Equipment Closet

Explore more unique possibilities on our Solution Showcase page.

THE SCENARIO

A luxury condominium in a busy downtown area needed a way to control visitor access. The homeowner's association (HOA) wanted the luxury aspect to extend into all elements of their building, including the visitor management system. A majority of the 750 residents were young professionals, so the system also needed to keep up with their on-the-go lifestyle.

The building had two primary entrances, but residents did not have a convenient way of verifying visitors before meeting in the lobby, where a concierge desk was located. Visitors did not have a simple way to request access if they called residents via phone, the door would not remain locked until someone could physically open it. With the condominium being a large high-rise, this was a huge inconvenience for residents who relied on delivery services for meals, groceries, and other goods. They needed a quick and safe method to answer the door.

Being budget conscious, the HOA wanted a reliable system they would only have to install one time with minimal maintenance.

To maintain the luxury facet of their high-rise, the HOA chose a modern IP multi-tenant video intercom for visitor screening.



Read our solution showcases where security challenges like this one are solved with our reliable systems

Multi-Tenant Intercoms

IXG Series

IP Multi-Tenant Video Intercom

→ p. 22



GT Series

Standard Multi-Tenant Video Intercom

→ p. 44



GT Series

Expanded Multi-Tenant Video Intercom

→ p. 46



GT Series

Enterprise-Level Multi-Tenant Video Intercom

→ p. 48



DA Series

Single and Multi-Tenant Handset Intercom

→ p. 49



DB Series

Single and Multi-Tenant Hands-Free Intercom

→ p. 50



Entrance Stations: mix and match up to 5

Ready-to-Install Single Panel



GT-DMB-N
3-in-1 Video Entrance Station
→ p. 81

Ready-to-Assemble Modular Kits



GTV-DES104B
Modular Video Entrance Station Kit
(includes GT-DB + GT-DBP, GT-VB + GT-VP, GT-NSB + GT-NSP-L, GT-10K + GF-10KP, and GT-4B + GT-4F)
→ p. 81



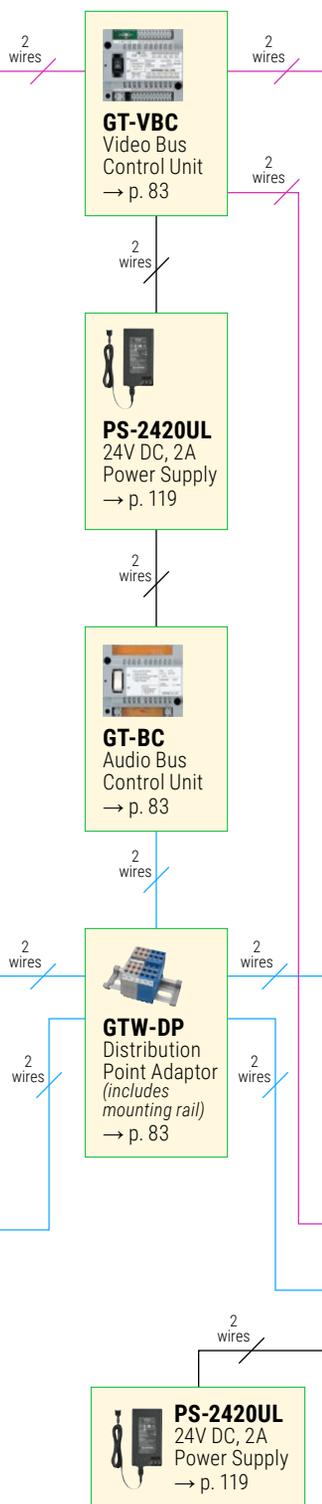
GTV-DES202B
Modular Video Entrance Station Kit
(includes GT-DB + GT-DBP, GT-VB + GT-VP, GT-NSB + GT-NSP-L, GT-10K + GF-10KP, and GF-2B + GF-2F x2)
→ p. 81



GTA-DESB
Modular Audio Entrance Station Kit
(includes GT-DB + GT-DBP, GT-NSB + GT-NSP-L, GT-10K + GF-10KP, and GF-3B + GF-3F)
→ p. 81

NOTE: To build custom entrance stations, see modular components and mounting accessories p. 84-85.

- VIDEO Wire
Aiphone #871802
- AUDIO Wire
Aiphone #872002
- POWER Wire
Aiphone #871802



Tenant Stations: mix and match up to 48*

1 GT-2C + 3 GT-2Hs per tenant (max. 48 GT-2Cs)



GT-2C
Video Tenant Master Station
(requires PS-2420UL or GT-4ZP)
→ p. 82



GT-2H
Video Tenant Sub Master Station
→ p. 82

*Tenant Stations—up to 4 stations per tenant with these parameters: 1 GT-1C7/W + 3 audio stations **OR** 2 GT-1M3s + 2 audio stations **OR** 4 audio stations (max. 48 stations or max. 100 stations if only using GT-1Ds)



GT-1C7W
App-Compatible Video Tenant Station
(requires PS-2420UL or GT-4ZP for power and WiFi connection for mobile app)
→ p. 83



GT-1C7
Video Tenant Station
→ p. 83



GT-1M3
Video Tenant Station
→ p. 83



GT-1A
Audio Tenant Station
→ p. 83



GT-1D
Audio Tenant Station with Handset
→ p. 83

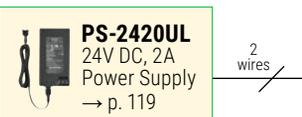
Video Guard Station: select up to 2



GT-MKB-N
Video Guard Station with Handset
→ p. 82



GT-MKB-N
Video Guard Station with Handset
→ p. 82



PS-2420UL
24V DC, 2A Power Supply
→ p. 119

NOTE: Maximum cumulative audio wire distance is 8,200 ft. If exceeded, contact Technical Support for system configuration assistance.

Specifications
→ p. 81-85

Camera View Area
→ p. 84

Tenant Stations: mix and match up to 48*

1 GT-2C + 3 GT-2Hs per tenant (max. 48 GT-2Cs)



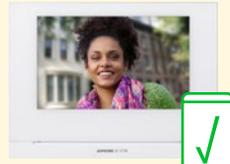
GT-2C
→ p. 82

1 + 3



GT-2H
→ p. 82

***Tenant Stations**—up to 4 stations per tenant with these parameters: 1 GT-1C7/W + 3 audio stations **OR** 2 GT-1M3s + 2 audio stations **OR** 4 audio stations (max. 48 stations or max. 100 stations if only using GT-1Ds)



GT-1C7W
App-Compatible Video Tenant Station (requires PS-2420UL or GT-4ZP for power and WiFi connection for mobile app)
→ p. 83



GT-1C7
Video Tenant Station
→ p. 83



GT-1M3
Video Tenant Station
→ p. 83



GT-1D
Audio Tenant Station with Handset
→ p. 83



GT-1A
Audio Tenant Station
→ p. 83

2 wires

2 wires

Accessories

NFC-CARD (not shown)

Access Card for GT-DB-VN and GT-DMB-N
→ p. 81



GT-102HB
2-Module Hooded Surface Mount Box (GT-102HB, GT-103HB, GT-104HB, GT-202HB, GT-203HB, and GT-303HB are also available)
→ p. 85

NFC-FOB (not shown)

Access Fob for GT-DB-VN and GT-DMB-N
→ p. 81

SBX-GTDMB
Surface Mount Box for GT-DMB-N
→ p. 85



GT-HSA
Optional Add-On Handset for GT-2C or GT-2H
→ p. 82



MCW-S/B
Desk Stand for GT-2C, GT-2H, GT-1C7, GT-1C7W, GT-1M3, or GT-1A (mounting hardware included)
→ p. 117



GFK-PS
Urgent Call Pull Cord
→ p. 84



GT-RY
External Signaling Relay
→ p. 84



GT-MCX
Network Adaptor for Remote Programming (includes mounting rail)
→ p. 83



GT-1Z
1-Way Video Distribution Adaptor
→ p. 83



GT-4ZP
4-Way Video/Power Distribution Adaptor for GT-1C7W and GT-2C
→ p. 83



GT-4Z
4-Way Video Distribution Adaptor
→ p. 83

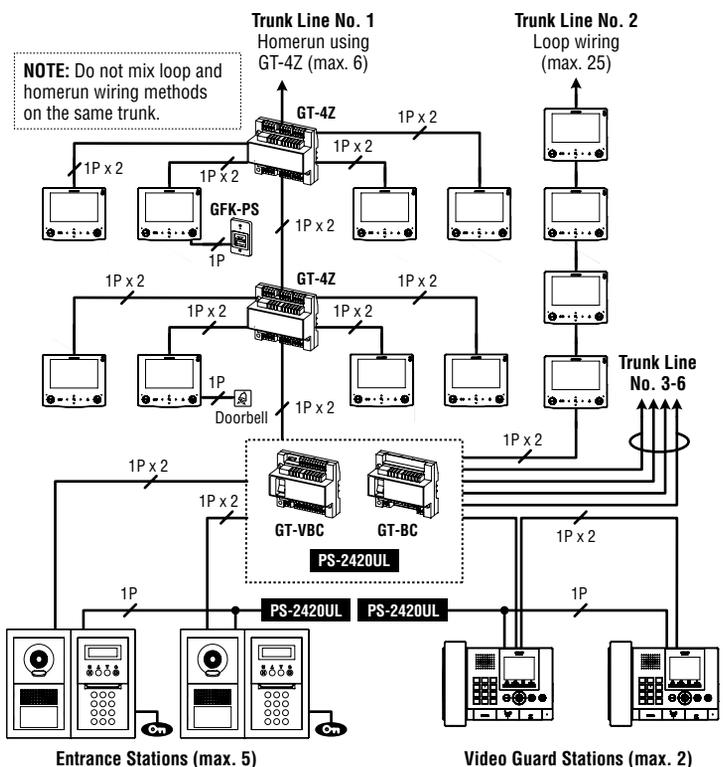


W-DIN11
DIN Mounting Rail for Control Units
→ p. 85

System Features

- Analog camera input provides additional surveillance of entry area (GT-DMB-N, GT-VB)
- Both video and audio entrance panels can be combined in the same system
- Mobile app can be used as a sub tenant station (requires GT-1C7W)
- Unlock entrance from tenant station
- Optional individual doorbell to ring tenant stations
- Panic call switch for emergency calling to guard or concierge
- Tenant can monitor the entryway (video system)
- Tenant directory can quickly be updated with NFC-compatible stations (GT-DB-VN, GT-DMB-N, GT-MKB-N, GT-BCXB-N)
- Link data allows easy programming of multiple entrance and video guard stations
- Setting via dip switch for digital systems provides faster and easier installation (GT-2C, GT-1C7, GT-1C7W, GT-1M3)
- Simple wiring with only two common wires for audio and only two additional wires for video
- Video guard station(s) can be included to provide communication between office/lobby and tenants

Wiring GT Standard Configuration Sample



Entrance Stations: mix and match up to 16

Ready-to-Install Single Panel



GT-DMB-N
3-in-1 Video Entrance Station
→ p. 81

Ready-to-Assemble Modular Kits



GTV-DES104B
Modular Video Entrance Station Kit
(includes GT-DB + GT-DBP, GT-VB + GT-VP, GT-NSB + GT-NSP-L, GT-10K + GF-10KP, and GT-4B + GT-4F)
→ p. 81



GTV-DES202B
Modular Video Entrance Station Kit
(includes GT-DB + GT-DBP, GT-VB + GT-VP, GT-NSB + GT-NSP-L, GT-10K + GF-10KP, and GF-2B + GF-2F x2)
→ p. 81



GTA-DESB
Modular Audio Entrance Station Kit
(includes GT-DB + GT-DBP, GT-NSB + GT-NSP-L, GT-10K + GF-10KP, and GF-3B + GF-3F)
→ p. 81

NOTE: To build custom entrance stations, see modular components and mounting accessories p. 84-85.

Video Guard Station: select up to 2

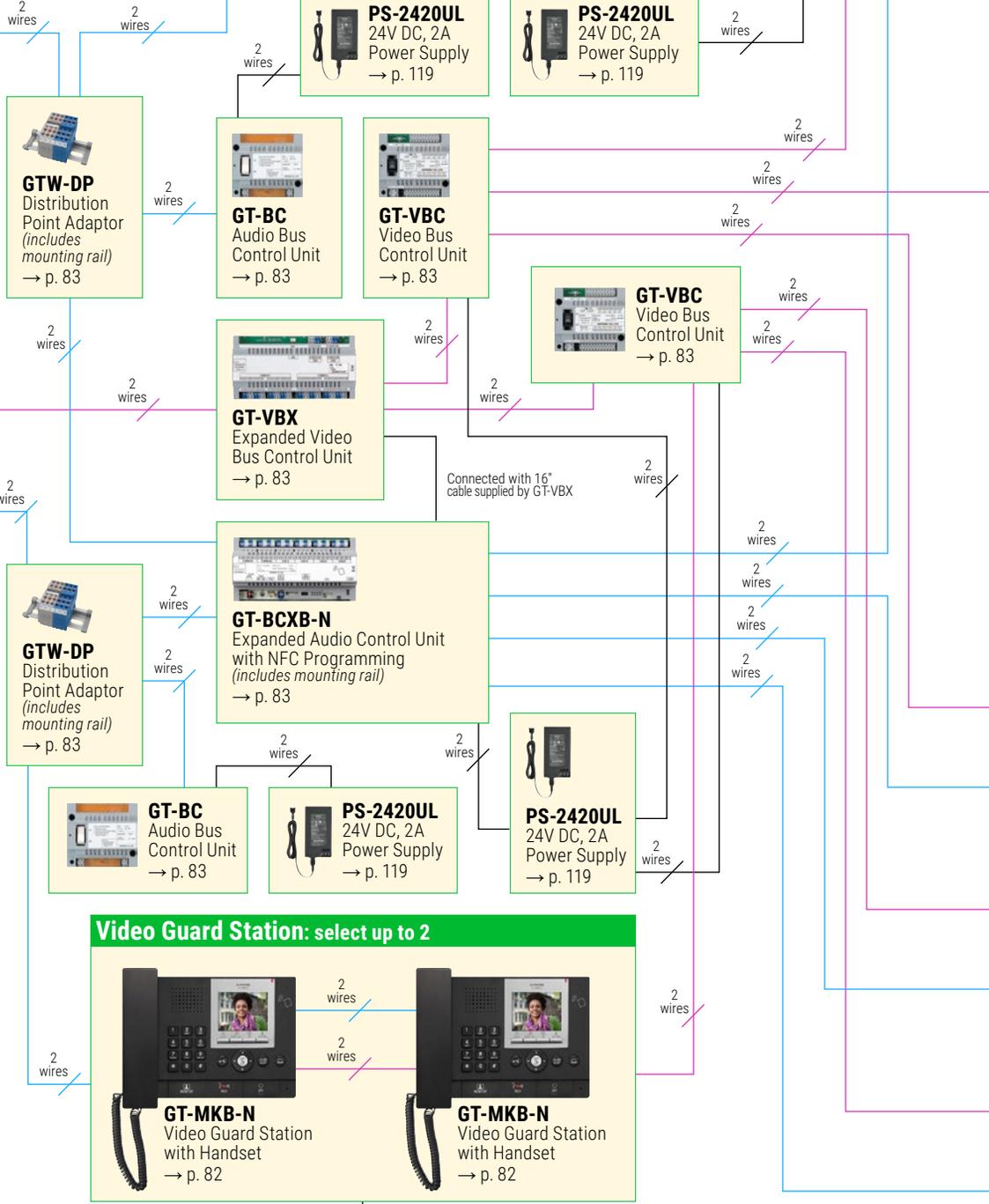


GT-MKB-N
Video Guard Station with Handset
→ p. 82



GT-MKB-N
Video Guard Station with Handset
→ p. 82

- **VIDEO Wire**
Aiphone #871802
- **AUDIO Wire**
Aiphone #872002
- **POWER Wire**
Aiphone #871802



PS-2420UL
24V DC, 2A Power Supply
→ p. 119

PS-2420UL
24V DC, 2A Power Supply
→ p. 119

Specifications

→ p. 81-85

Camera View Area

→ p. 84

GTW-DP
Distribution Point Adaptor (includes mounting rail)
→ p. 83

GT-BC
Audio Bus Control Unit
→ p. 83

GT-VBC
Video Bus Control Unit
→ p. 83

PS-2420UL
24V DC, 2A Power Supply
→ p. 119

Tenant Stations: mix and match up to 125 (Sub Trunk 1a)

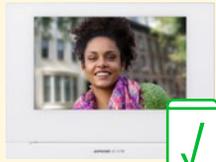


GT-2C
Video Tenant Master Station (requires PS-2420UL or GT-4ZP)
→ p. 82



GT-2H
Video Tenant Sub Master Station
→ p. 82

1 + 3



GT-1C7W
App-Compatible Video Tenant Station (requires PS-2420UL or GT-4ZP for power and WiFi connection for mobile app)
→ p. 83



GT-1C7
Video Tenant Station
→ p. 83



GT-1M3
Video Tenant Station
→ p. 83



GT-1A
Audio Tenant Station
→ p. 83



GT-1D
Audio Tenant Station with Handset
→ p. 83



GTW-LC
Multi-Relay Control Unit (for use with Expanded System only—requires GT-BCXB-N)
→ p. 83



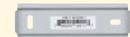
GT-4ZP
4-Way Video/Power Distribution Adaptor for GT-1C7W and GT-2C
→ p. 83



GT-1Z
1-Way Video Distribution Adaptor
→ p. 83



GT-4Z
4-Way Video Distribution Adaptor
→ p. 83



W-DIN11
DIN Mounting Rail for Control Units
→ p. 85

Accessories

NFC-CARD (not shown)
Access Card for GT-DB-VN and GT-DMB-N
→ p. 81



SBX-GTDMB
Surface Mount Box for GT-DMB-N
→ p. 85



GT-102HB
2-Module Hooded Surface Mount Box (GT-102HB, GT-103HB, GT-104HB, GT-202HB, GT-203HB, and GT-303HB are also available)
→ p. 85



GT-HSA
Optional Add-On Handset for GT-2C or GT-2H
→ p. 82



MCW-S/B
Desk Stand for GT-2C, GT-2H, GT-1C7, GT-1C7W, GT-1M3, or GT-1A (mounting hardware included)
→ p. 117



GFK-PS
Urgent Call Pull Cord
→ p. 84

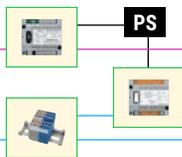


GT-RY
External Signaling Relay
→ p. 84



GT-MCX
Network Adaptor for Remote Programming (includes mounting rail)
→ p. 83

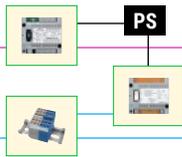
See Sub Trunk 1a above for details



Tenant Stations: mix and match up to 125 (Sub Trunk 1b)



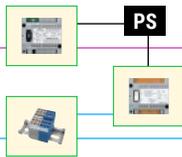
See Sub Trunk 1a above for details



Tenant Stations: mix and match up to 125 (Sub Trunk 2a)



See Sub Trunk 1a above for details



Tenant Stations: mix and match up to 125 (Sub Trunk 2b)

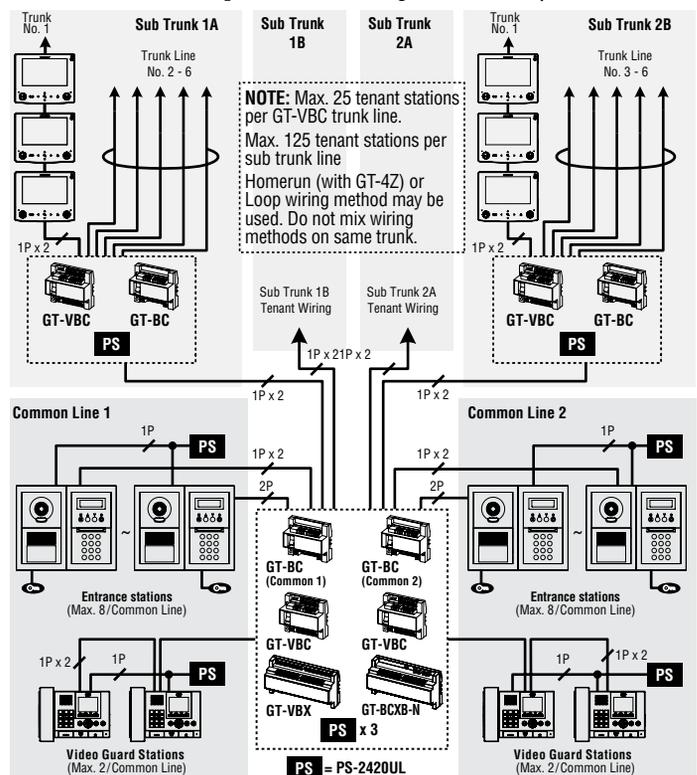


Features—same as Standard System, plus:

- Up to 16 entrance panels, 4 video guard stations, and 500 tenant stations

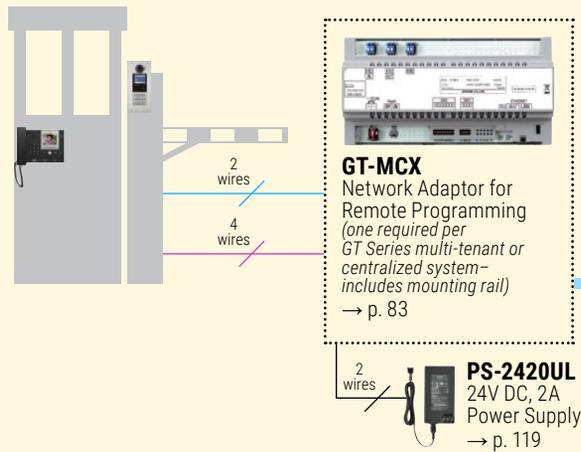
Wiring

GT Expanded Configuration Sample



GT Series Centralized System: mix and match up to 8

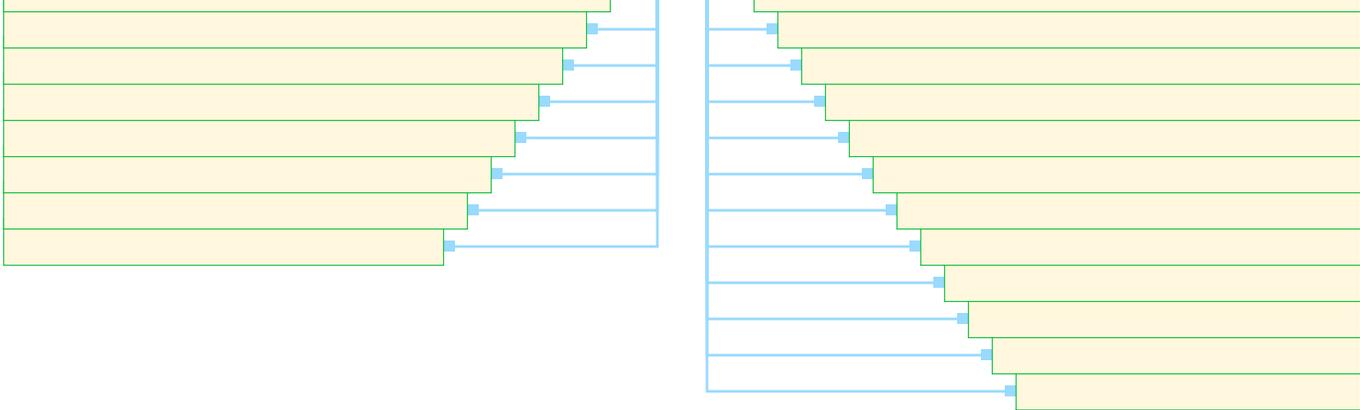
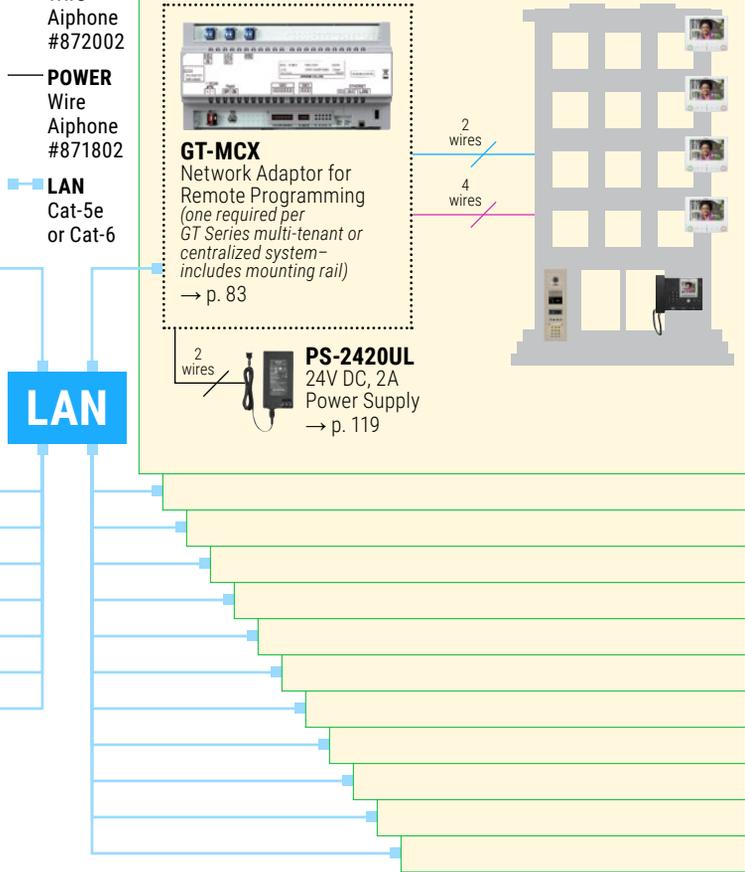
Main Entrance, Gate, or Security Center (can communicate between stations within the same system, as well as all networked multi-tenant and centralized systems)



- VIDEO Wire Aiphone #871802
- AUDIO Wire Aiphone #872002
- POWER Wire Aiphone #871802
- LAN Cat-5e or Cat-6

GT Series Standard or Expanded Multi-Tenant Video Intercom System (→ p.44, 46): mix and match up to 24

Multi-Tenant Building 1 (can communicate between stations within the same system, as well as all networked centralized systems)



Features—same as Standard System, plus:

- Network adaptor (GT-MCX) connects multiple GT Series systems together for building-to-building communication
- Up to 480 entrance panels, 96 video guard stations, and 5,000 tenant stations
- IPv4 or IPv6 network protocols
- Extends wiring distance between buildings/systems

NOTE: Each building in a networked system can have up to 500 tenant stations max., even if the capacity of 5,000 tenant stations has not been reached.

Specifications

→ p. 81–85

Camera View Area

→ p. 84

Wiring

There are many different wiring configurations possible with the GT Series.

For additional help, contact Aiphone's Technical Support.

800.692.0200



DA Series Single and Multi-Tenant Handset Intercom

Box Set: select if DA-1AS is the desired entrance station (for 1x1 applications only)



DA-1AS:
Box Set with DA-1DS, DA-1MD, and PT-1211CA

Entrance Stations: select 1 (for a la carte applications)



DA-1DS
1-Call Audio Entrance Station (included with DA-1AS box set—also sold separately) → p. 80



DA-2DS
2-Call Audio Entrance Station → p. 80



DA-4DS
4-Call Audio Entrance Station → p. 80

Tenant Station: select up to 4



DA-1MD
Audio Tenant Station with Handset (included with DA-1AS box set) → p. 80

Accessories



EL-12S
Electric Door Strike for Wood Frames → p. 114

PT-1211CA
15V AC Transformer (included with DA-1AS box set) → p. 119

System Features

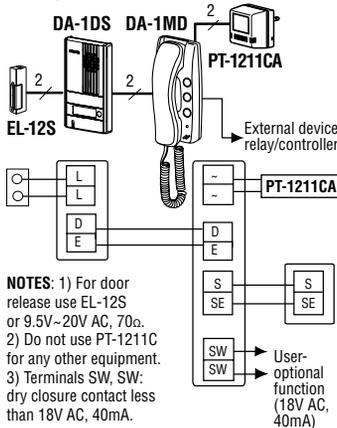
- Door strike (EL-12S) powered by door station without the need of an additional transformer or wiring
- Option button to control an external device
- Convenient box set complete with a tenant station, a 1-call entrance station, and a power supply available for 1x1 applications
- 2-wire system is quick and easy to install

Specifications

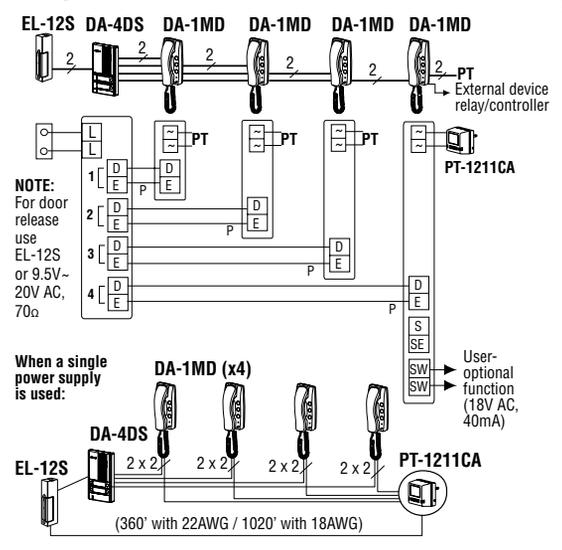
- Power Source** 15V AC—use PT-1211CA
- Communication** Handset (full-duplex)
- Door Release** 9.5–20V AC, 70Ω or higher resistance—use EL-12S
- Wire Type** Entrance Station to Tenant Station: 2-cond., overall shield—use Aiphone #822202 or 2-cond., low cap, PE insulation, solid, non-shielded—use Aiphone #871802
- Power Supply to Tenant Station: 2-cond., low cap, PE insulation, solid, non-shielded—use Aiphone #871802
- Distance** Power Supply to Entrance Station or Door Strike (cumulative): 360' (22 AWG) 1,020' (18 AWG)
- Power Supply to Tenant Station: 180' (22 AWG) 510' (18 AWG)

Wiring

Example with DA-1DS



Example with DA-4DS



Dimensions

	INCHES			MILLIMETERS		
	Height	Width	Depth	Height	Width	Depth
DA-1DS, DA-2DS, DA-4DS	6-7/8"	3-15/16"	7/8"	175	100	22
DA-1MD	7-7/8"	3-1/2"	2-1/2"	200	89	63

Box Set: select if DA-1DS is the desired entrance station (for 1x1 applications)



DBS-1A
Box Set with DA-1DS, DB-1MD, and PT-1211CA

START with a BOX SET

Entrance Stations: select 1 (for a la carte applications)



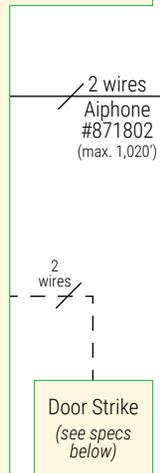
DA-1DS
1-Call Audio Entrance Station
(included with DBS-1A box set)
→ p. 80



DA-2DS
2-Call Audio Entrance Station
→ p. 80



DA-4DS
4-Call Audio Entrance Station
→ p. 80



System Features

- Door release powered by door station without the need of an additional transformer or wiring
- All Call between stations within same tenant residence or office
- Option button to control an external device
- Convenient box set is complete with a tenant master station, a 1-call entrance station, and a power supply available for 1x1 applications
- Optional call extension speaker

Dimensions

	INCHES			MILLIMETERS		
	Height	Width	Depth	Height	Width	Depth
DA-1DS, DA-2DS, DA-4DS	6-7/8"	3-15/16"	7/8"	175	100	22
DB-1MD, DB-1SD	7-5/16"	3-1/8"	1-1/16"	185	80	27

Specifications

Power Source 15V AC—use PT-1211CA (requires one per tenant master station and one per two tenant sub stations)

Communication Hands-free (VOX) or push-to-talk (simplex)

Door Release 9.5–20V AC, 70Ω or higher resistance—use EL-12S

Wire Type Entrance Station to Tenant Master Station: 2-cond., low cap, PE insulation, solid, non-shielded—use Aiphone #871802

Tenant Master Station to Tenant Sub Station: 4-cond., low cap, PE insulation, solid, non-shielded—use Aiphone #871804

Between Tenant Sub Stations: 4-cond. + 2-cond. when sharing power—use Aiphone #822206 or #871804

Power Supply to Tenant Station: 2-cond., low cap, PE insulation, solid, non-shielded—use Aiphone #871802

Distance Power Supply to Entrance Station or Door Strike (cumulative): 360' (22 AWG) 1,020' (18 AWG)

Power Supply to Tenant Master Station: 180' (22 AWG) 510' (18 AWG)

Tenant Master Station to farthest Tenant Sub Station: 330'

Tenant Master Station: select up to 4



DB-1MD
Audio Tenant Master Station
(included with DBS-1A box set)
→ p. 80

Tenant Sub Station: select up to 4 per tenant master station (optional)



DB-1SD
Audio Tenant Sub Station
→ p. 80

Accessories



EL-12S
Electric Door Strike for Wood Frames
→ p. 114



RY-ES
External Signaling Relay
→ p. 114



IER-2
Call Extension Speaker
→ p. 114



MCW-S/B
Desk Stand for DB-1MD or DB-1SD
(mounting hardware included)
→ p. 117

2 wires
Aiphone #871802
(max. 510')

4 wires
Aiphone #871804
(max. 330' between master station and farthest sub station)

2 wires
Aiphone #871802
(max. 510')



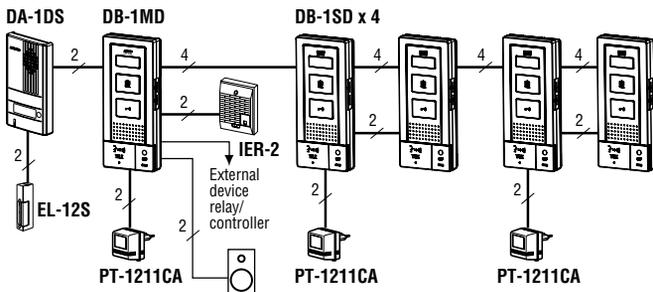
PT-1211CA
15V AC Transformer
(included with DBS-1A box set)
→ p. 119



PT-1211CA
15V AC Transformer
(one PT-1211CA per two DB-1SDs)
→ p. 119

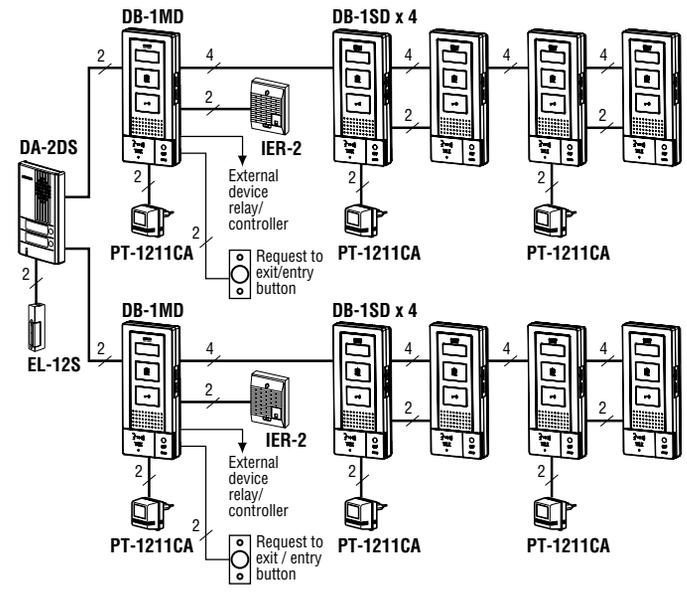
Wiring

Example with DA-1DS



NOTE: For door release use EL-12S or 9.5V-20V AC, 70Ω

Example with DA-2DS



One-of-a-Kind System Reduced Germs at High-Traffic Areas

A Real-Word Security Window Intercom Solution for Hospital Admittance Areas/Stations

During COVID-19, glass germ barriers were installed in this hospital. Unfortunately, the barriers made it difficult to hear when admitting patients or visitors.

By installing a security window intercom, conversations could clearly be heard on both sides of the glass without holes, keeping its integrity as a germ barrier.

AIPHONE SOLUTION SHOWCASE

Adding Security and Communication to Hospital Admittance Areas or Stations

THE SCENARIO

A large hospital had a total of four admittance areas to receive patients and visitors. Due to heightened COVID-19 concerns, this large hospital installed glass germ barriers to better protect their patients, staff, and visitors.

Each of the four areas were isolated with outward-facing dividers to further partition and shield patients away from their neighbors. Since the hospital was always busy, the admittance areas were often intense and loud. Staff members were unable to hear patients and patients were unable to hear staff.

The germ barriers had created a new issue: staff and patients could not hear each other when in the same room. They needed a system to talk clearly through the glass without decreasing the effectiveness of the germ barrier.

The volume of the system also needed to be easily adjustable so a patient could hear what was being said without broadcasting the staff's voice to others. Voice clarity was extremely important to ensure information was properly understood in both directions.

Personnel selected a quality security window intercom with unique acoustic tubing that turned a glass partition into a speaker.

THE BENEFITS

- Unique acoustic tube system connected easily and securely without cutting the glass
- With the glass germ barrier intact, both patients and staff remained safe while communicating
- Patients could see and hear staff clearly, providing them a better sense of comfort within the partition
- Excellent voice quality assured both patient responses and staff inquiries were clearly understood
- Staff's easy access to the system controls ensured specific volume levels met patient needs

System Configuration Example

Security Window Intercom (Speaker/Receiver) with 10' Acoustic Tube

Hands-Free Communication (VOC) with Speaker Driver and Acoustic Tube

Easy System Operation and Volume Control

Explore more unique possibilities on our Solution Showcase page.



Read our solution showcases where security challenges like this one are solved with our reliable systems

Audio Intercoms

LEF Series

Selective Call and
All Call Intercom

→ **p. 54**



QuikSpec

LEM Series

Open Voice Intercom

→ **p. 56**



QuikSpec

LEM-1DL Series

Access Sentry Intercom

→ **p. 57**



QuikSpec

C-123L/A and C-123LW Sets

ChimeCom

→ **p. 58**



QuikSpec

CCS-1A Set

ChimeCom2

→ **p. 59**



QuikSpec

IE-8 Series

Chime Tone Intercom

→ **p. 60**



QuikSpec

AT-406 Series

Handset to Handset Intercom

→ **p. 61**



MC Series

MarketCom

→ **p. 62**



TD-H Series

Selective Call Intercom

→ **p. 63**



IM Series

Security Window Intercom

→ **p. 64**



NHX Series

Nurse Call Intercom (UL 1069 Listed)

→ **p. 65**



QuikSpec

NIM Series

Nurse Call Intercom

→ **p. 66**



LEF Series Selective Call and All Call Intercom

Door Stations, Sub Stations, and Paging Adaptor: mix and match up to 10 (requires 1 master station)



LE-D
Audio Door Station
→ p. 105



LE-SS-1G
Audio Door Station
→ p. 105



LE-DA
Audio Door Station
→ p. 105



LE-SS/A
Audio Door Station
→ p. 105



LE-SSR
Audio Door Station
→ p. 105



LS-NVP/C
Audio Door Station
→ p. 105



LE-A
Audio Sub Station
→ p. 104



LE-AN
Audio Sub Station with Privacy
→ p. 104



LE-B
Audio Sub Station
→ p. 104



LE-BN
Audio Sub Station with Privacy
→ p. 104



BA-1
Paging Adaptor
→ p. 118

System Features

- Monitoring and Selective Call
- 3, 5, and 10-call master stations
- Push-to-talk at master, hands-free reply at called station
- Call tone and LED annunciation at master
- Selective door release (with 1 RY-PA per door) on LEF-3L, LEF-5, LEF-5C, LEF-10, LEF-10S, and LEF-10C master stations
- All Call with LEF-10S and all LEF-C masters (requires BG-10C)
- Mix and match doors, masters, subs, speakers, and paging adaptors to create desired communication (up to 11 total components)
- Wide variety of master and sub stations available

Specifications

Power Source 12V DC—use PS-1208UL (use PS-1225UL if installing BG-10C)

Communication Push-to-talk (simplex)

Door Release N/O dry contact, 24V DC, 1A (one RY-PA required per door strike)

Wire Type Variable wire types—see table on page 54

Distance Door Station or Sub Station to farthest Master Station: 650' (22 AWG) 1,600' (18 AWG)

LEF Series Wire Types	Wire #	Gauge	Conductor
▼ LEF Standard Wiring			
LEF-3	822210	22 AWG	10-conductor, overall shield
LEF-5	822212	22 AWG	12-conductor, overall shield
LEF-10, LEF-10S	822220	22 AWG	20-conductor, overall shield
▼ LEF-C Wiring			
LEF-3C	822212	22 AWG	12-conductor, overall shield
LEF-5C	822215	22 AWG	15-conductor, overall shield
LEF-10C	822220	22 AWG	20-conductor, overall shield
BG-10C to Master Station	822220	22 AWG	20-conductor, overall shield
▼ Sub/Door Station Wiring			
Homerun (22AWG)	822203	22 AWG	3-conductor, overall shield
Homerun (18AWG)	821803	18 AWG	3-conductor, overall shield
Looped (max. 4 stations)	822206	22 AWG	6-conductor, overall shield
Looped (max. 8 stations)	822210	22 AWG	10-conductor, overall shield
▼ LEF + Door Release Wiring			
LEF-3L	822212	22 AWG	12-conductor, overall shield
LEF-5, LEF-5C	822220	22 AWG	20-conductor, overall shield
LEF-10, LEF-10S, LEF-10C	822220 + 822210	22 AWG	20-conductor, overall shield + 10-conductor, overall shield

Master Stations: mix and match up to 11



LEF-3
3-Call Audio Master Station
→ p. 104



LEF-3L
3-Call Audio Master Station with Door Release
→ p. 104



LEF-3C
3-Call Audio Master Station with All Call (requires BG-10C)
→ p. 104



LEF-5
5-Call Audio Master Station with Door Release
→ p. 104



LEF-5C
5-Call Audio Master Station with Door Release and All Call (requires BG-10C)
→ p. 104



LEF-10
10-Call Audio Master Station with Door Release
→ p. 104



LEF-10S
10-Call Audio Master Station with Door Release and All Call (requires BG-10C)
→ p. 104



LEF-10C
10-Call Audio Master Station with Door Release and All Call (requires BG-10C)
→ p. 104

IMPORTANT VOLTAGE NOTICE:

Use 12V DC voltage only!
Connecting AC voltage to an LEF master station can damage the component.



PS-1225UL
12V DC, 2.5A Power Supply (required if using BG-10C, otherwise use PS-1208UL)
→ p. 119



PS-1208UL
12V DC, 800mA Power Supply
→ p. 119

Accessories



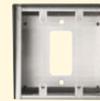
SBX-CON1 (not shown)
Surface Mount Box with Conduit Cut Outs for LE-D
→ p. 115



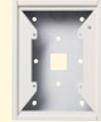
KMB-45
45° Mullion Mounting Bracket for LE-D
→ p. 116



SBX-1G
Surface Mount Box for LE-SS-1G
→ p. 115



SBX-2G/A
Surface Mount Box for LE-DA, LE-SS/A, or LE-SSR
→ p. 115



SBX-NVP/A
Surface Mount Box for LS-NVP/C
→ p. 115



EL-12S
Electric Door Strike for Wood Frames (requires PT-1210NA)
→ p. 114



RY-PA
Door Release Relay
→ p. 105



LEW-5

LEW-10

LEW-10S
Terminal Box
→ p. 105



BG-10C
All Call, Chime, and Music Adaptor (requires PS-1225UL)
→ p. 105



RY-AC/A
External Signaling Relay
→ p. 114

Dimensions

	INCHES					MILLIMETERS				
	Height	Width	Depth	Recessed	Diameter	Height	Width	Depth	Recessed	Diameter
BA-1	4-1/8"	2-1/2"	1-1/2"	-	-	105	64	38	-	-
LE-A, LE-AN	6-5/16"	5-3/16"	2"	-	-	160	131	51	-	-
LEF-3, LEF-3L	7-1/16"	5-5/8"	2-1/8"	-	-	180	143	53.5	-	-
LE-B, LE-BN, LEF-3C	8-3/16"	6"	2"	9/16"	-	208	153	50.5	15	-
LE-D	4-3/4"	3-7/16"	1-1/8"	-	-	120	88	29	-	-
LE-DA	4-1/2"	4-9/16"	*	-	-	115	116	*	-	-
LEF-5, LEF-10, LEF-10S	8-1/8"	7-1/2"	2-3/16"	-	-	206	190	55	-	-
LEF-5C, LEF-10C	9-3/8"	7-7/8"	3"	1-9/16"	-	238	200	75.5	40	-
LE-SS/A, LE-SSR	4-3/4"	4-3/4"	*	-	-	119.89	119.89	*	-	-
LE-SS-1G	4-1/2"	2-3/4"	*	-	-	114.3	69.85	*	-	-
LS-NVP/C	7-1/2"	5-1/2"	*	-	-	191	140	*	-	-

*Aiphone recommends a 2-1/2" minimum back box depth for all flush mount stations.

Wiring

There are many different wiring configurations possible with the LEF Series.

For additional help, contact Aiphone's Technical Support.

800.692.0200



Door Stations, Sub Stations, Speakers, and Paging Adaptor: mix and match up to 3



LE-D
Audio Door Station
→ p. 105



LE-SS-1G
Audio Door Station
→ p. 105



LE-DA
Audio Door Station
→ p. 105



LE-SS/A
Audio Door Station
→ p. 105



LE-SSR
Audio Door Station
→ p. 105



LS-NVP/C
Audio Door Station
→ p. 105



LE-A
Audio Sub Station
→ p. 104



LE-B
Audio Sub Station
→ p. 104



BA-1
Paging Adaptor
→ p. 118

LE-AN (not shown)
Audio Sub Station with Privacy
→ p. 104

LE-BN (not shown)
Audio Sub Station with Privacy
→ p. 104

Master Stations: select 1



LEM-1
1-Call Audio Master Station
(for applications using one door/sub station)
→ p. 106



LEM-3
3-Call Audio Master Station
(for applications using two or three door/sub stations)
→ p. 106

2 wires
Aiphone
#822202
(max. 650' between master station and farthest sub station)

2 wires
(max. 66')



SKK-620C
6V DC, 200mA Power Supply
→ p. 119

Accessories



SBX-CON1 (not shown)
Surface Mount Box with Conduit Cut Outs for LE-D
→ p. 115



KMB-45
45° Mullion Mounting Bracket for LE-D
→ p. 116



SBX-1G
Surface Mount Box for LE-SS-1G
→ p. 115



SBX-2G/A
Surface Mount Box for LE-DA, LE-SS/A, or LE-SSR
→ p. 115

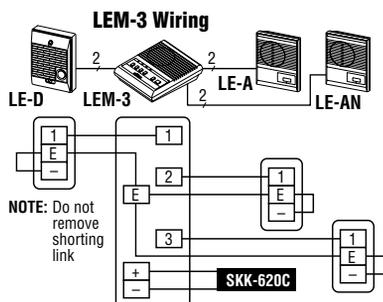
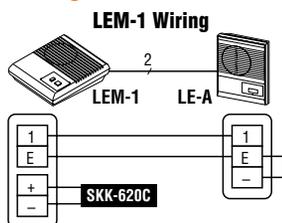


SBX-NVP/A
Surface Mount Box for LS-NVP/C
→ p. 115

System Features

- Voice volume control
- Push-to-talk at master and hands-free at remote

Wiring



Dimensions

	INCHES					MILLIMETERS				
	Height	Width	Depth	Recessed	Diameter	Height	Width	Depth	Recessed	Diameter
BA-1	4-1/8"	2-1/2"	1-1/2"	-	-	105	64	38	-	-
LE-A, LE-AN, LEM-1	6-5/16"	5-3/16"	2"	-	-	160	131	51	-	-
LEM-3	7-1/16"	5-5/8"	2-1/8"	-	-	180	143	53.5	-	-
LE-B, LE-BN	8-3/16"	6"	2"	9/16"	-	208	153	50.5	15	-
LE-D	4-3/4"	3-7/16"	1-1/8"	-	-	120	88	29	-	-
LE-DA	4-1/2"	4-9/16"	*	-	-	115	116	*	-	-
LE-SS/A, LE-SSR	4-3/4"	4-3/4"	*	-	-	119.89	119.89	*	-	-
LE-SS-1G	4-1/2"	2-3/4"	*	-	-	114.3	69.85	*	-	-
LS-NVP/C	7-1/2"	5-1/2"	*	-	-	191	140	*	-	-

*Aiphone recommends a 2-1/2" minimum back box depth for all flush mount stations.

Specifications

Power Source 6V DC—use SKK-620C

Communication Push-to-talk (simplex)

Door Release N/A

Wire Type Door Station or Sub Station to Master Station: 2-cond., overall shield—use Aiphone #822202 or #821802

Distance Door Station or Sub Station to Master Station: 650' (22 AWG) 1,570' (18 AWG)

Door Stations: select 1



LE-D
Audio Door Station
→ p. 105

LE-SS-1G
Audio Door Station
→ p. 105



LE-DA
Audio Door Station
→ p. 105

LE-SS/A
Audio Door Station
→ p. 105



LE-SSR
Audio Door Station
→ p. 105

LS-NVP/C
Audio Door Station
→ p. 105

Master Stations: select 1



LEM-1DL
Audio Master Station
→ p. 106

LEM-1DLC
Audio Master Station
(max. four)
→ p. 106

LEM-1DL
2 + 2 wires
Aiphone #822202
(max. 650' between door station and farthest master station)

LEM-1DLC
3 + 2 wires
Aiphone #822203 and #822202
(max. 650' between door station and farthest master station)

Master Stations: select 1 (optional)



LEM-1DL
Audio Master Station
(requires one DAK-2S per every two LEM-1DL master stations in the system)
→ p. 106

LEM-1DLC
Audio Master Station
(max. four)
→ p. 106

Door Strike and Power

PT-1210NA
12V AC Transformer
(one required per master station)
→ p. 119

Accessories

NEW
SBX-CON1 (not shown)
Surface Mount Box with Conduit Cut Outs for LE-D
→ p. 115

KMB-45
45° Mullion Mounting Bracket for LE-D
→ p. 116

SBX-1G
Surface Mount Box for LE-SS-1G
→ p. 115

SBX-2G/A
Surface Mount Box for LE-DA, LE-SS/A, or LE-SSR
→ p. 115

SBX-NVP/A
Surface Mount Box for LS-NVP/C
→ p. 115

EL-12S
Electric Door Strike (requires PT-1210NA)
→ p. 114

DAK-2S
Dual Master Adaptor Kit (required per two LEM-1DL master stations—not required for LEM-1DLC master stations)
→ p. 113

RY-AC/A
External Signaling Relay (requires shared PS-1208UL with LEM-1DL and DAK-2S or shared PS-1208UL with LEM-1DLC)
→ p. 114

Box Set

LEM-1DLS:
LEM-1DL, LE-D, and PT-1210NA

System Features

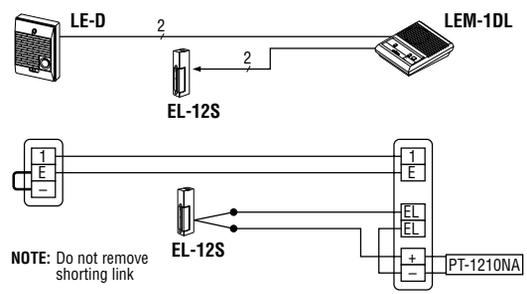
- Door release (N/O contact)
- Calling and two-way communication with door station
- Call tone and voice volume control
- 12–16V AC or 12–24V DC powered
- Any LE or LS Series door station is compatible

Dimensions

	INCHES			MILLIMETERS		
	Height	Width	Depth	Height	Width	Depth
LE-D	4-3/4"	3-7/16"	1-1/8"	120	88	29
LE-DA	4-1/2"	4-9/16"	*	115	116	*
LEM-1DL, LEM-1DLC	7-1/16"	5-5/8"	2-1/8"	180	143	53.5
LE-SS/A, LE-SSR	4-3/4"	4-3/4"	*	119.89	119.89	*
LE-SS-1G	4-1/2"	2-3/4"	*	114.3	69.85	*
LS-NVP/C	7-1/2"	5-1/2"	*	191	140	*

*Aiphone recommends a 2-1/2" minimum back box depth for all flush mount stations.

Wiring



Specifications

- Power Source** 12–16V AC—use PT-1210NA or 12–24V DC—use PS-1208UL
- Communication** Push-to-talk (simplex)
- Door Release** N/O dry contact, 30V AC/DC, 1A
- Wire Type** Door Station to Master Station: 2-cond., overall shield—use Aiphone #822202 or #821802
Between LEM-1DLCs: 3-cond., overall shield—use Aiphone #822203 or #821803
- Distance** Door Station to farthest Master Station: 650' (22 AWG) 1,570' (18 AWG)

Box Set



CCS-1A
Box Set with
CC-DA and CC-1M

*available only
as a BOX SET*

Door Station (select the box set)



CC-DA
Audio Door Station
(included with
CCS-1A box set –
not sold separately)
→ p. 79



PT-1210NA
12V AC
Transformer
→ p. 119

Master Station (select the box set)



CC-1M
Audio Master Station
(included with
CCS-1A
box set – not sold separately)
→ p. 79

2 wires
Aiphone #822202
(max. 245' between door station
and master station)

2 wires
Aiphone
#822202

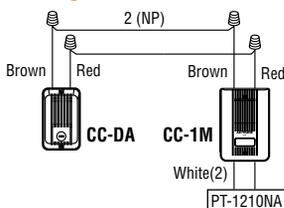
System Features

- Chime and voice volume controls
- Box set includes a door station and master station (power sold separately)
- Push-to-talk door answering with automatic shut-off
- Powered by AC transformer PT-1210NA

Dimensions

	INCHES			MILLIMETERS		
	Height	Width	Depth	Height	Width	Depth
CC-1M	7-1/16"	4-13/16"	1-5/16"	180	123	33
CC-DA	4-1/2"	2-3/4"	1-3/16"	114	70	30

Wiring



Specifications

- Power Source** 12–16V AC (with no-load voltage rating, 20V or less)– use PT-1210NA or equivalent bell transformer
- Communication** Push-to-talk (simplex)
- Door Release** N/A
- Wire Type** Door Station to Master Station: 2-cond., overall shield– use Aiphone #822202 or #821802
- Distance** Door Station to Master Station: 245' (22 AWG) 590' (18 AWG)

Are your customers looking for a solution similar to our CCS-1A Set, but need video too?

Check out the WL-11 Wireless Video Intercom | aiphone.com/glc_WL-11



Door Stations: mix and match up to 2



AX-DM
Mullion-Mount
Audio Door Station
→ p. 77



IF-DA
Audio Door Station
→ p. 86



IE-JA
Audio Door Station
→ p. 86



IE-SS/A
Audio Door Station
→ p. 86

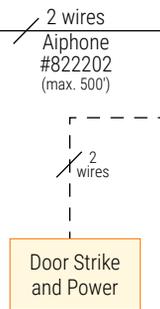


IE-SSR
Audio Door Station
→ p. 86

Master Station



IE-8MD
6-Call Audio Master
Station with Handset
→ p. 86



Accessories



SBX-2G/A
Surface Mount
Box for IE-JA,
IE-SS/A, or IE-SSR
→ p. 115



EL-12S
Electric Door Strike
for Wood Frames
(requires PT-1210NA)
→ p. 114



RY-AC/A
External
Signaling
Relay
→ p. 114

Sub Master Station: select up to 5 (optional)



IE-8HD
6-Call Audio Sub
Master Station
with Handset
→ p. 86

System Features

- Two wires to door stations, same as doorbell
- Selective Call or All Call between handsets
- Simple 4-conductor wiring between handsets
- Two doors with Selective Door Release
- External doorbell can be added
- 12-16V AC or 12-18V DC powered

Specifications

Power Source 12-16V AC—use PT-1210NA or
12-18V DC—use PS-1225UL

Communication Handset (full-duplex)

Door Release N/O dry contact, 24V AC/DC, 350mA

Wire Type Door Station to Master Station: 2-cond.,
overall shield—use Aiphone #822202

Master Station to Sub Stations: 4-cond.,
overall shield—use Aiphone #822206

Distance Door Station to Master Station:
500' (22 AWG) 1,180' (18 AWG)

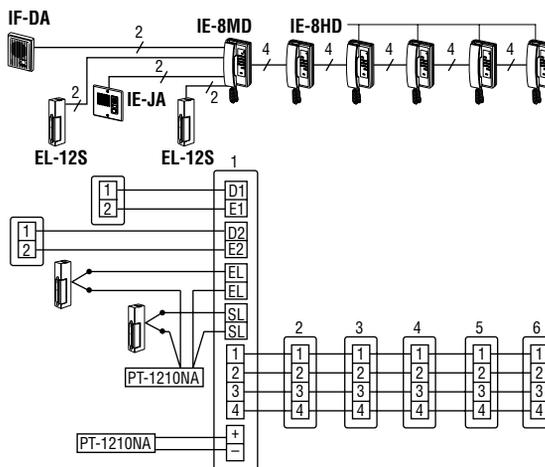
Master Station to farthest Sub Master Station:
245' (22 AWG) 580' (18 AWG)

Dimensions

	INCHES			MILLIMETERS		
	Height	Width	Depth	Height	Width	Depth
AX-DM	6-5/16"	1-11/16"	7/8"	160	43	22.5
IE-8MD, IE-8HD	8-1/4"	4-5/16"	3-1/8"	210	110	79
IE-JA	4-1/2"	4-9/16"	*	115	116	*
IE-SS/A, IE-SSR	4-3/4"	4-3/4"	*	121	121	*
IF-DA	5-1/8"	3-7/8"	1-1/8"	130	98	28.5

*Aiphone recommends a 2-1/2" minimum back box depth for all flush mount stations.

Wiring



AT-406 Series Handset to Handset Intercom

Master Station



AT-206
White Audio Master Station with Handset
(not sold separately)
→ p. 76

2 wires
Aiphone #822202
(max. 2,300')

2 wires
(max. 12')



SKK-620C
6V DC, 200mA Power Supply
→ p. 119
or four AA batteries

Sub Station: select up to 3



AT-306
White Audio Sub Station with Handset
→ p. 76

Box Sets



AT-406 (white):
AT-206 and AT-306

or

Master Station



AT-206B
Charcoal Gray Audio Master Station with Handset
(not sold separately)
→ p. 76

2 wires
Aiphone #822202
(max. 2,300')

2 wires
(max. 12')



SKK-620C
6V DC, 200mA Power Supply
→ p. 119
or four AA batteries

Sub Station



AT-306B
Charcoal Gray Audio Sub Station with Handset
(not sold separately)
→ p. 76

Box Sets



AT-406B/A (charcoal gray):
AT-206B and AT-306B with 4' coil cord

System Features

- Call button on master rings all the subs
- Power supply or battery powered
- Sub(s) ring master only
- Up to two additional subs can be added (AT-306)

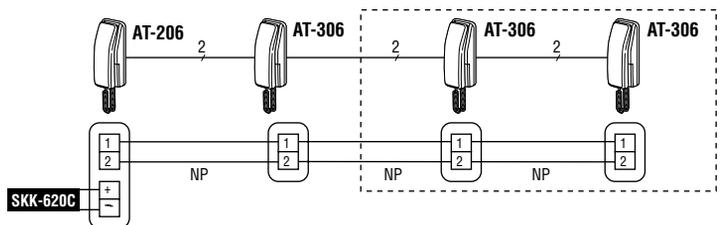
Dimensions

	INCHES			MILLIMETERS		
	Height	Width	Depth	Height	Width	Depth
AT-206, AT-206B, AT-306, AT-306B	8-1/4"	3-1/8"	2-1/16"	210	80	52

Specifications

- Power Source** 6V DC—use SKK-620C or four AA batteries
- Communication** Handset (full-duplex)
- Door Release** N/A
- Wire Type** Master Station to Sub Station: 2-cond., overall shield—use Aiphone #822202
- Distance** Two-Station Set: 2,300' (22 AWG) 5,250' (18 AWG)
Master Station to third Sub Station: 1,350' (22 AWG) 3,100' (18 AWG)

Wiring



Master Station: select up to 60

Accessories

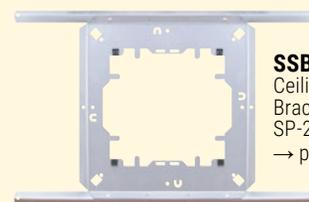


MC-60/4A
Audio MarketCom
Master Station
with Handset
→ p. 107



MC-60/4A
Audio MarketCom
Master Station
with Handset
→ p. 107

7 wires
Aiphone #852207
(see wire distance in
specifications below)



SSB-3
Ceiling Support
Bracket for
SP-2570N
→ p. 118

7 wires
Aiphone #852207
(see wire distance in
specifications below)

Paging Amplifiers (1 required for system paging)



MD35M
35W
Paging
Amplifier
→ p. 118



MD60M
60W
Paging
Amplifier
→ p. 118



MD120M
120W
Paging
Amplifier
→ p. 118

Paging Speaker: install number of speakers needed (based on amplifier wattage)



MH-15W
Multi-Tap
Horn
Speaker
→ p. 117



SP-2570N
Ceiling Speaker
→ p. 118

Paging Adaptor (1 required for system paging)



MC-A/A
Paging Adaptor
→ p. 107



PS-2420UL
24V DC, 2A
Power Supply
→ p. 119

2 wires
Aiphone
#822202
(max. 16')

2 wires
Aiphone
#822202
(max. 500')

2 wires
Aiphone
#821802

System Features

- Maximum 60 station paging and communication system
- Four selective communication channels with LED indicators
- Conference call among three stations
- Music goes mute while paging
- Reinforced modular coil cord on MC-60/4A

Dimensions

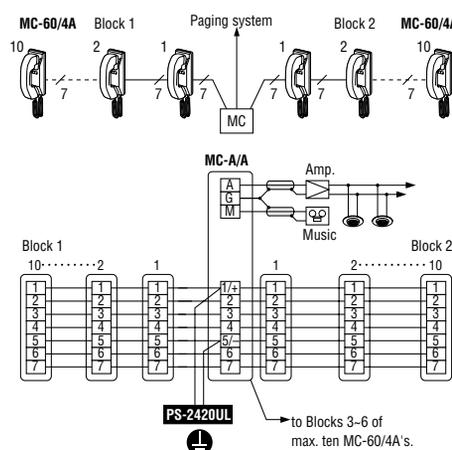
	INCHES				MILLIMETERS			
	Height	Width	Depth	Diameter	Height	Width	Depth	Diameter
MC-60/4A	9-3/16"	3-9/16"	3-11/16"	-	234	90	94	-
MC-A/A	2"	3-9/16"	5-5/8"	-	51.5	91	143	-
MD35M, MD60M, MD120M	1-3/4"	8-1/2"	12-1/2"	-	44.5	215.9	317.5	-
MH-15W	9"	9"	9-1/2"	-	229	229	241	-
SP-2570N	-	-	**	12-7/8"	-	-	**	327

**SP-2570N has a 3/8" depth projection from the surface.

Specifications

- Power Source** 24V DC—use PS-2420UL
- Communication** Handset (full-duplex)
- Door Release** N/A
- Wire Type** 7-cond., non-twisted, low capacitance, PE insulation—use Aiphone #852207
- Distance** Paging Adaptor to farthest Master Station on block: 1,700' (22 AWG) 4,000' (18 AWG)
Total cumulative wiring between Paging Adaptor and Master Stations: 5,000' (22 AWG)

Wiring



TD-H Series Selective Call Intercom

Master Stations: mix and match up to 25 (mix and match up to 25 or mix and match up to 13 if using the maximum of 12 paging adaptors)

TD-1H/B
1-Call Audio Master Station with Handset → p. 111

TD-3H/B
3-Call Audio Master Station with Handset → p. 111

TD-6H/B
6-Call Audio Master Station with Handset → p. 111

TD-12H/B
12-Call Audio Master Station with Handset → p. 111

TD-24H/B
24-Call Audio Master Station with Handset → p. 111

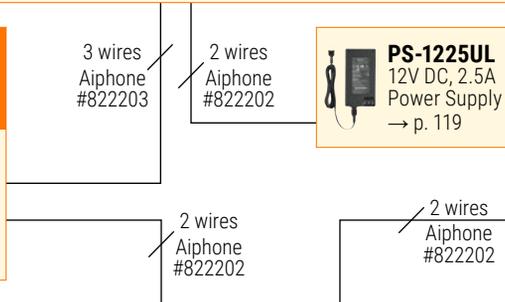
Accessories

SSB-3
Ceiling Support Bracket for SP-2570N → p. 118

RY-AC/A
External Signaling Relay → p. 114

Paging Adaptor: mix and match up to 12 (counts toward total capacity of 25 stations and requires 1 paging amplifier per paging adaptor)

PD-2
Zone Paging/Talkback Adaptor → p. 111



Paging Speaker: install number of speakers needed (based on amplifier wattage)

MH-15W
Multi-Tap Horn Speaker → p. 117

SP-2570N
Ceiling Speaker → p. 118

Paging Amplifiers (1 required per paging adaptor)

MD35M
35W Paging Amplifier → p. 118

MD60M
60W Paging Amplifier → p. 118

MD120M
120W Paging Amplifier → p. 118

System Features

- Up to 25 master stations can be installed
- 1, 3, 6, 12, and 24-call handset audio master stations available
- Paging zone(s) with optional talkback
- External signaling device when calling a handset (requires RY-AC/A)

Wiring

There are many different wiring configurations possible with the TD-H Series. For additional help, contact Aiphone's Technical Support. **800.692.0200**



Specifications

- Power Source** 12V DC—use PS-1225UL
- Communication** Handset (full-duplex)
- Door Release** N/A
- Wire Type** TD-1H/B: 6-cond., overall shield—use Aiphone #822206
- TD-3H/B, TD-6H/B: 10-cond., overall shield—use Aiphone #822210
- TD-12H/B, TD-24H/B: 16-cond., overall shield—use Aiphone #812216 (two runs of 812216 are required for full functionality of the TD-24H/B)
- Distance** Between Master Stations: 2,000' (22 AWG) 4,800' (18 AWG)

Dimensions

	INCHES				MILLIMETERS			
	Height	Width	Depth	Diameter	Height	Width	Depth	Diameter
MD35M, MD60M, MD120M	1-3/4"	8-1/2"	12-1/2"	-	44.5	215.9	317.5	-
MH-15W								
PD-2	2"	3-9/16"	5-7/16"	-	51.5	90	138	-
SP-2570N	-	-	**	12-7/8"	-	-	**	327
TD-nH/B (n = 1, 3, 6, or 12)	8-1/4"	3-15/16"	2-7/8"	-	210	100	73	-
TD-24H/B	8-1/4"	3-15/16"	3-1/4"	-	210	100	83	-

*Aiphone recommends a 2-1/2" minimum back box depth for all flush mount stations.
 **SP-2570N has a 3/8" depth projection from the surface.

IM Series Security Window Intercom

Box Set

IM-1
Box Set with
IMU-100, IAI-100,
IAX-100, IME-100,
ISE-100, and PS-2420UL



START with a BOX SET

Speaker Driver, Acoustic I/O Tube, and Tube Extension

IAI-100
Speaker Driver and Acoustic I/O Tube Kit
(includes DR-100 Speaker Driver and AI-100 Acoustic I/O Tube with noise cancelling microphone.)
→ p. 87

DR-100
Speaker Driver
(not sold separately)
→ p. 87

IAX-100
Acoustic Tube Extension
(one required per system)
→ p. 87

AI-100
Acoustic I/O Tube
(not sold separately)
→ p. 87

NOTE: Image shown with IAX-100 acoustic tube extension (not included in IAI-100 kit).

Control Unit and Operation Unit

IMU-100
Control and Operation Unit Kit
(includes MU-100 Control Unit and OU-100 Operation Unit with supplied connector.
IME-100 Gooseneck Microphone sold separately.)
→ p. 87

MU-100
Control Unit
(not sold separately)
→ p. 87

IME-100
Gooseneck Microphone
(sold separately)
→ p. 87

OU-100
Operation Unit
(not sold separately)
→ p. 87

2 wires
Aiphone #822202
(max. 66')

2 wires
Aiphone #821802
(max. 66')

2 wires
Aiphone #821802
(max. 66')

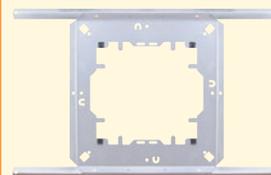
PS-2420UL
24V DC,
2A Power Supply
→ p. 119

Accessories

ISE-100
Proximity Sensor
→ p. 87



SP-2570N
8Ω, 25/70V, 5W
Ceiling Speaker
→ p. 118



SSB-3
Ceiling Support Bracket for SP-2570N
→ p. 118

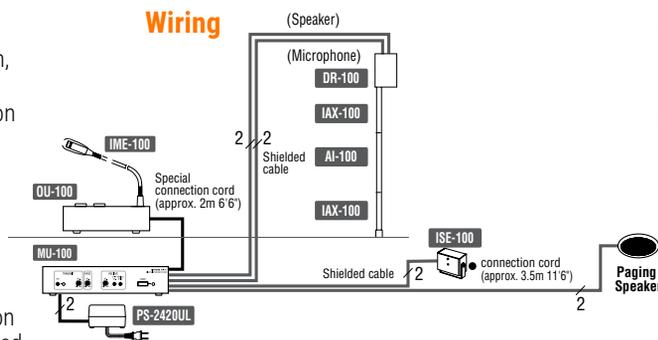
System Features

- Inconspicuous units do not obscure faces of those approaching a ticket/customer window for added visibility and security
- Flexible gooseneck microphone can be adjusted to virtually any position
- 3.5mm headset can be used (not supplied by Aiphone)
- Uses voice-actuated communication (VOX) system, requiring no additional operations during conversation
- When the TALK switch is off, the Operation Unit is put on standby, but sound from public side is still heard at reduced volume
- By linking the system to a motion sensor, communication mode is automatically activated when a customer is present

Dimensions

	INCHES				MILLIMETERS			
	Height	Width	Depth	Diameter	Height	Width	Depth	Diameter
AI-100	15-1/4"	1-1/16"	15/16"	-	388	27	24	-
DR-100	5-7/8"	3-5/16"	1-7/16"	-	150	84	36	-
IAX-100	39-3/8"	1-1/16"	15/16"	-	1000	27	24	-
IME-100	20-1/16"	-	-	9/16"	510	-	-	14
ISE-100	2-3/8"	2-7/8"	1-3/16"	-	60	72	30	-
MU-100	1-3/4"	8-1/4"	8-1/8"	-	45	210	206	-
OU-100	1-15/16"	5-1/8"	6-5/16"	-	49	130	160	-

Wiring

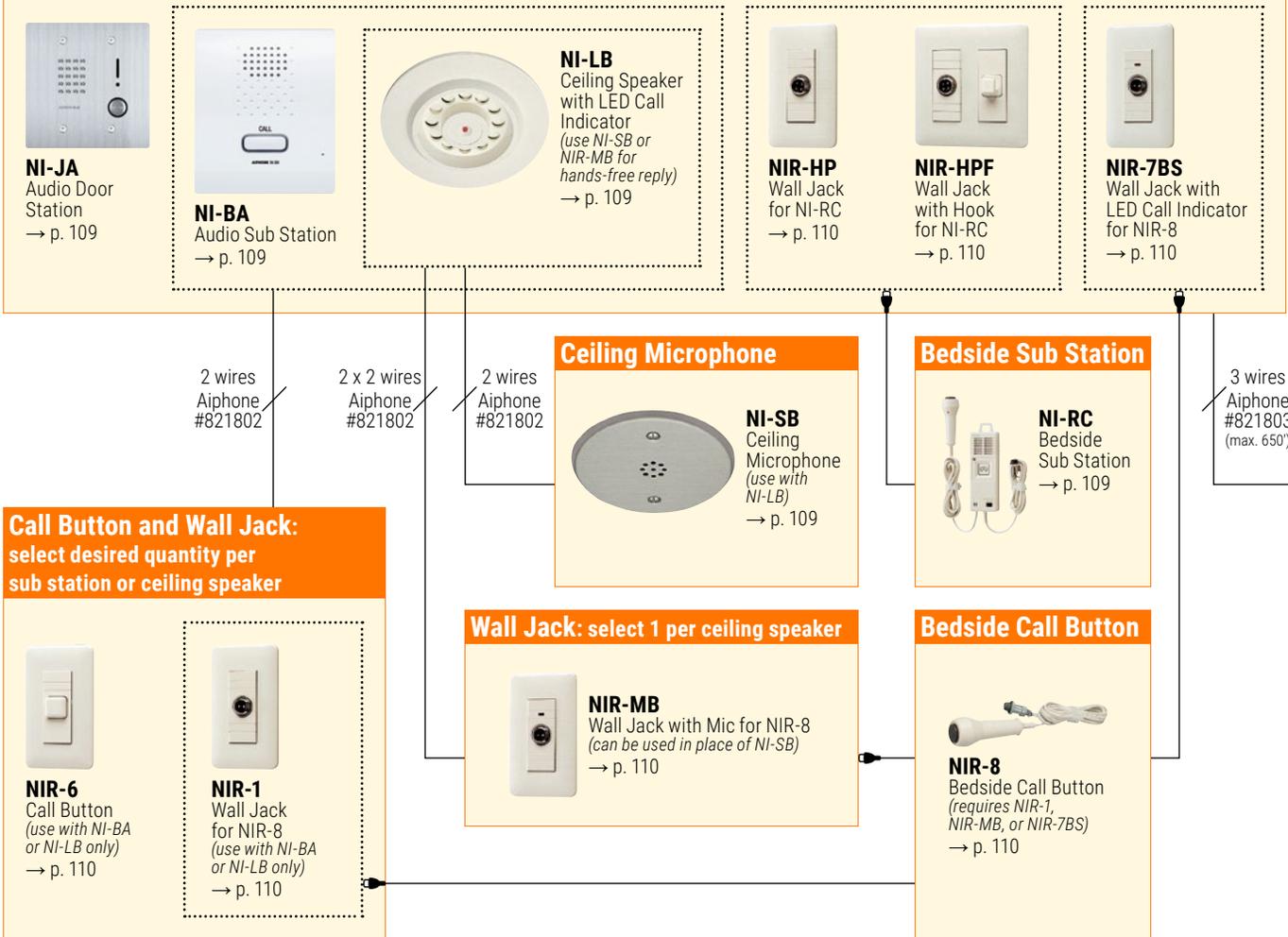


Specifications

- Power Source** 24V DC, 120mA standby, 780mA max. – use PS-2420UL
- Communication** Hands-free (VOX) or push-to-talk (simplex)
Transmit output: 3W 4Ω
Receive output: 1.5W 16Ω
- Door Release** N/A
- Wire Type** Speaker Driver to Control Unit: 2 x 2-cond., overall shield – use Aiphone #822202 or #821802
Power Supply to Control Unit: 2-cond., overall shield – use Aiphone #822202 or #821802
- Distance** Power Supply or Speaker Driver to Control Unit: 66' (22 AWG/18 AWG)

NIM Series Lamp Tone Intercom

Door Station, Sub Station, Ceiling Speaker, and Wall Jacks: mix and match up to 20 or 40 (based on master station selection)



Call Button and Wall Jack: select desired quantity per sub station or ceiling speaker

NIR-6
Call Button
(use with NI-BA or NI-LB only)
→ p. 110

NIR-1
Wall Jack
for NIR-8
(use with NI-BA or NI-LB only)
→ p. 110

Wall Jack: select 1 per ceiling speaker

NIR-MB
Wall Jack with Mic for NIR-8
(can be used in place of NI-SB)
→ p. 110

Bedside Sub Station

NI-RC
Bedside Sub Station
→ p. 109

Bedside Call Button

NIR-8
Bedside Call Button
(requires NIR-1, NIR-MB, or NIR-7BS)
→ p. 110

System Features

- Master in 20 and 40-station sizes
- Built-in All Call, Selective Call, and Group Call
- Push-to-talk at master or use handset
- Group Call up to five subs at a time
- Incoming calls remain lit until answered (max. 10)
- Separate transmit and receive volume controls
- Adjustable ring tone (melody or chime)
- Automatic ringtone volume level (increases after 90 seconds)
- Optional software for call event logging (NI-SOFT)

Specifications

- Power Source** 48V DC—use IS-PU-UL
- Communication** Handset (VOX) or push-to-talk (simplex)
- Door Release** N/A
- Wire Type** Door Station, Sub Station, Ceiling Speaker, or Wall Jack to Master Station: 3-cond. overall shield—use Aiphone #821803
- Call Button or Corridor Lamp to Sub Station: 2 cond. overall shield—use Aiphone #821802
- NIR-MB to Ceiling Speaker: 4-cond. overall shield—use two runs of #821802
- Distance** Door Station or Sub Station to Master Station: 650' (18 AWG)
- Power Supply to Master Station: 33' (18 AWG)

NOTE: If your application requires product to be UL 1069 Listed for hospital signaling and skilled nursing facilities, please see the NHX Series on p. 65.

Wiring

There are many different wiring configurations possible with the NIM Series.

For additional help, contact Aiphone's Technical Support.

800.692.0200



Master Stations: select 1

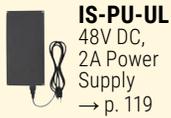


NIM-20B
20-Call Audio Master Station with Handset
→ p. 109



NIM-40B
40-Call Audio Master Station with Handset
→ p. 109

2 wires
Aiphone
#821802
(max. 33')



IS-PU-UL
48V DC,
2A Power
Supply
→ p. 119

Accessories



NIR-2
Call Reset Button
→ p. 110



NIR-4
Single Room
Corridor Call Light
→ p. 110



NIR-4S
Multi-Room
Corridor Call Light
→ p. 110



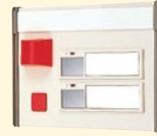
NIR-4BZ
Corridor Light with
Tone Indicator
→ p. 110



NIR-42
Corridor Light with
Call Reset Button
→ p. 110



NIR-31
Corridor Light with One
Magnetic Nameplate
→ p. 110



NIR-32
Corridor Light with Two
Magnetic Nameplates
→ p. 110



NIR-34
Corridor Light with Four
Magnetic Nameplates
→ p. 110



NIR-7HW
Bathroom Call
Button with Pull Cord
→ p. 110



NI-SOFT
Call Event Log PC Software
(includes RS-232 cable, approx. 40')
→ p. 110



IER-2
Call Extension Speaker
→ p. 114



SBX-2G/A
Surface Mount
Box for NI-JA
→ p. 115



RY-ES
External
Signaling
Relay
→ p. 114

Dimensions

	INCHES				MILLIMETERS			
	Height	Width	Depth	Diameter	Height	Width	Depth	Diameter
NI-BA	5-7/8"	5-1/8"	1-5/16"	-	150	130	33	-
NI-JA	4-3/4"	4-3/4"	*	-	120	120	*	-
NI-LB	-	-	**	7-1/16"	-	-	**	180
NIM-20B	9-1/16"	13"	5-1/2"	-	230	330	140	-
NIM-40B	9-1/16"	18-7/8"	5-1/2"	-	230	480	140	-
NIR-1, NIR-2, NIR-4, NIR-4S, NIR-6, NIR-7BS, NIR-7HW, NIR-HP, NIR-MB	4-3/4"	2-3/4"	*	-	120	70	*	-
NIR-31, NIR-32	5-11/16"	7-1/2"	1-9/16"	-	144	190	40	-
NIR-34	5-11/16"	12-1/16"	1-9/16"	-	144	306	40	-
NIR-42, NIR-4BZ, NIR-HPF	4-3/4"	4-9/16"	*	-	120	116	*	-
NIR-8	3-3/4"	-	-	1-7/16"	95	-	-	36
NI-RC	6-3/4"	2-3/16"	1-1/8"	-	171.5	56	28	-
NI-SB	-	-	**	4-1/8"	-	-	**	105

*Aiphone recommends a 2-1/2" minimum back box depth for all flush mount stations.

**NI-LB has a 9/16" depth projection from the surface and NI-SB has a 3/16" depth projection from the surface.

Technology Partners

All Connections Matter

By partnering with key brands for various integration needs, we open more opportunities for you.



Find all our
technology
partners

We can
integrate with

GenetecTM



Register IX Series stations to **Sipelia** as SIP devices to call third-party IP phones or soft clients and activate door release.

Use ONVIF[®] to stream audio and video to **Omnicast** directly from IX Series door stations.



Components

AC Series Components

AC Nio Management Software Licenses



Cloud-Based and On-Site Hosting Options with AC Nio



Do you need a larger system capacity with more doors and cameras? No problem! Contact your local rep, we're here to assist.

AC-NIO-ESS1

1-Year AC Nio Essential License for Managing 40 Doors or Cameras

AC-NIO-ESS5

5-Year AC Nio Essential License for Managing 40 Doors or Cameras

AC-NIO-SB1

1-Year AC Nio Small Business License for Managing 80 Doors or Cameras

AC-NIO-SB5

5-Year AC Nio Small Business License for Managing 80 Doors or Cameras

Features

- User-friendly system management software makes it is easy to program and maintain everyday functionality
- Modern and secure interface can easily be customized
- Essential and Small Business licenses available in 1- and 5-year options
- Essential license is for managing smaller systems with up to 40 doors and 40 cameras and allows 1 partition (does not support additional partitions or LDAP integration)
- Small Business license is for managing up to 80 doors and 80 cameras, as well as elevators and unmanaged doors
- Small Business license can be installed on a local server, PC, or on the AC-HOST embedded server
- Small Business license allows up to five partitions and supports Lightweight Directory Access Protocol (LDAP) integration

Specifications

Operating System	Windows® 7 Professional, Windows® 7 Enterprise, Windows® 7 Ultimate or later
CPU	32 bit (x86) processor or 64 bit (x64) processor, 2GHz or faster
Memory	4 GB or higher
Required Storage	1 GB (additional space required for database)
Runtime	.NET Framework 4.5 or later
SQL Server	Microsoft® SQL Server 2008, SQL Server 2008 Express or higher
Doors	AC-NIO-ESS1, AC-NIO-ESS5: 40 AC-NIO-SB1, AC-NIO-SB5: 80
Cameras	AC-NIO-ESS1, AC-NIO-ESS5: 40 AC-NIO-SB1, AC-NIO-SB5: 80
Partitions	AC-NIO-ESS1, AC-NIO-ESS5: 1 AC-NIO-SB1, AC-NIO-SB5: 5
LDAP	AC-NIO-ESS1, AC-NIO-ESS5: No AC-NIO-SB1, AC-NIO-SB5: Yes
Unmanaged Doors	AC-NIO-ESS1, AC-NIO-ESS5: No AC-NIO-SB1, AC-NIO-SB5: Yes

Administrative Mobile App



AC Nio Admin (not shown)
Administrative Mobile App
(free with AC Nio Management Software Licenses)

Features

- Companion app to AC Nio, provides many of the same administrative tools as the full-featured software
- Add and remove users, edit permissions, and remotely lock or unlock doors

Specifications

Operating System	Android: 5.1 or newer iOS: 13.4 or newer
Requirements	Active AC Nio License (Essential or Small Business)

Digital Key Mobile App



AC Key
Digital Key Mobile App
(free with AC Nio Management Software Licenses)

Features

- Unlock controlled doors from a smartphone or tablet
- Administered by AC Nio and can track user and visitor activity
- Assign users to the entire site or specific partitions
- Works on the local network or off-site with port forwarding
- Create favorite lists of frequently used doors
- Issue temporary visitor passes by text or email
- Visitor pass users do not need AC Key installed
- Available for Apple® iOS and Google Play™ at no charge

Specifications

Operating System	Android: 5.1 or newer iOS: 13.4 or newer
Requirements	Active AC Nio License (Essential or Small Business)

Embedded Server



AC-HOST
Embedded Server Host for AC Nio Essential Licenses
(Linux-based-host requires one license and is sold separately)

Features

- Compact form factor
- Supports applications of up to 40 doors (Essential Business License)

Specifications

CPU	Broadcom BCM2711B0 quad-core A72 @ 1.5GHz
RAM	2 GB LPDDR4 SDRAM
Storage	16 GB microSD, A1 rated
Ports	2 USB 3.0, 2 USB 2.0
Network	Gigabit Ethernet
Protocols	IPv4, IPv6, TCP, UDP, HTTPS
Dimensions	4-1/2" H x 4-1/2" W x 1-1/2" D

Readers



AC-PROX-1G
1-Gang and Mullion-Mount
125kHz Wiegand Proximity Reader



AC-10K-1G
1-Gang Proximity
Reader with
Access Keypad



AC-10K-M
Mullion-Mount
Proximity Reader
with Access Keypad



AC-BT-10K
1-Gang Bluetooth®
and NFC™ Reader
with Access Keypad



AC-BT-M
Mullion-Mount
Bluetooth® and
NFC™ Reader

Features

(AC-PROX-1G)

- Compatible with Aiphone, HID, AWID, and Wiegand
- Mullion or 1-gang mount
- Up to 6" read range
- Indoor and outdoor rated
- Horizontal or vertical mounting orientation

Features

(AC-10K-1G, AC-10K-M)

- Combination 125kHz Wiegand proximity reader and security keypad
- Up to a 6" non-contact read range with clamshell cards
- Compatible with Aiphone, HID, AWID, and Pyramid credentials
- Entry can be accessed with a pin code, a card swipe, or a pin code and card swipe in conjunction with each other

Features

(AC-BT-10K, AC-BT-M)

- Combination 13.56MHz Bluetooth® reader and security keypad
- Uses a Wiegand connection
- Supports a variety of Bluetooth® and NFC credentials
- Entry can be accessed with a pin code, a card swipe, or a pin code and card swipe in conjunction with each other (AC-BT-10K)

Specifications (AC-PROX-1G)

Power Input	5–14V DC
Power Draw	45mA
Frequency	125kHz
Certifications	CSA, FCC, CE, C-Tick
Supported Credentials	Aiphone 40-bit, HID, AWID, and Wiegand
UL Listing	UL 294/ULC S319-05
Temperature Rating	-40°~149°F(40°~65°C)
Dimensions	1-Gang Bracket: 5-3/4" H x 2-7/8" W x 7/8" D Mullion: 4-7/16" H x 1-5/8" W x 3/4" D

Specifications (AC-10K-1G, AC-10K-M)

Power Input	5–14V DC
Power Draw	50mA typical, 115mA peak
Frequency	125kHz
Certifications	CSA, FCC, CE, C-Tick
Supported Credentials	Aiphone 40-bit, HID, AWID, Pyramid
UL Listing	UL 294
Temperature Rating	-40°~149°F (40°~65°C)
Dimensions	AC-10K-1G: 4-5/16" H x 3" W x 11/16" D AC-10K-M: 6-1/8" H x 1-3/4" W x 15/16" D

Specifications (AC-BT-10K, AC-BT-M)

Power Input	AC-BT-10K: 7–28V DC AC-BT-M: 9–15V DC
Power Draw	AC-BT-10K: 180mA peak at 12V DC AC-BT-M: 150mA peak at 12V DC
Frequency	13.56MHz + Bluetooth (low energy)
Certifications	CE, FCC, IC, UL
Supported Credentials	NFC, Bluetooth, STiD Mobile ID app for Android and iOS, STiD Mobile ID® Orange Pack ID + MIFARE Ultralight® and Ultralight C, MIFARE® Classic and Classic EV1, MIFARE Plus® (S/X) and Plus® EV1, DESFire® 256, EV1, EV2, EV3, NFC, HCE, PicoPass® (CSN only), and iCLASS™ (CSN only)
UL Listing	UL 294
Temperature Rating	AC-BT-10K: -30°~158°F (30°~70°C)
Dimensions	AC-BT-10K: 4-3/16" H x 3-1/8" W x 1" D AC-BT-M: 4-3/8" H x 1-11/16" W x 7/8" D

Credentials



AC-PC-40
Aiphone 40-Bit 125kHz
Proximity Card



AC-PC-H26
HID® 26-Bit 125kHz
Proximity Card



AC-PF-40
Aiphone 40-Bit 125kHz
Key Fob with Brass Ring



AC-PF-H26
HID® 26-Bit 125kHz Key
Fob with Brass Ring



AC-PT-40
Aiphone 40-Bit 125kHz
Proximity Disc Tag with
Adhesive Backing



AC-PT-H26
HID® 26-Bit 125kHz
Proximity Disc Tag
with Adhesive Backing

Features

- Credentials come in three different form factors: a clamshell card, a key fob for attaching to a keyring, and a disc tag with an adhesive backing for attaching to a personal item
- AC-PC-40 and AC-PC-H26 have a 6" read range from card to reader
- AC-PF-40 and AC-PF-H26 have a 4" read range from fob to reader
- AC-PT-40 and AC-PT-H26 have a 3-1/2" read range from tag to reader
- Site code and card number are printed on credential

Specifications

Format	AC-PC-40, AC-PF-40, AC-PT-40: Aiphone 40-bit AC-PC-H26, AC-PF-H26, AC-PT-H26: HID 26-bit (H10301)
Frequency	125kHz
Material	AC-PC-40, AC-PC-H26, AC-PF-40, AC-PF-H26: ABS AC-PT-40, AC-PT-H26: PVC
Dimensions	AC-PC-40, AC-PC-H26: 2-3/16" H x 3-3/8" W x 1/16" D AC-PF-40, AC-PF-H26: 1-1/2" H x 1-3/16" W x 1/8" D AC-PT-40, AC-PT-H26: 1" H x 1" W x 1/16" D

PoE Two-Door Access Controllers



AC-2DM-B
PoE Two-Door Access Controller



AC-2DM-W
PoE Two-Door Access Controller

Features

- Two Wiegand reader inputs
- Two solid state dry contact relays
- Integrated lock power (12V DC, 500mA)
- Four configurable inputs
- Infrared motion sensor
- Up to 100,000 card holders
- Built-in diagnostic LCD
- PoE powered
- Custom scripting and actions available
- NDAA and TAA compliant
- UL and ULC Listed (UL 294/ULC S319-05)

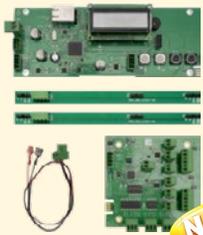
Specifications

- Power Source** PoE (IEEE 802.3af)
- Motion Sensor** Infrared
- Lock Power** 12V DC, 500mA
- Option Power** 12V DC, 300mA
- Contact Rating** 24V DC, 1A
- Protocols** IPv4, IPv6, TCP, UDP, HTTPS
- Reader Inputs** Wiegand
- Card Storage** Up to 100,000 users per controller
- Event Storage** Up to 50,000 events (first in, first out)
- UL Listing** UL 294/ULC S319-05
- Dimensions** 3-1/2" H x 10" W x 2-3/8" D

Two-Door Access Control Starter Kit



ACS-2DR-C
Two-Door Access Control Starter Kit with Enclosure (includes one ACS-2DR starter kit and one AC-C enclosure, which has space for the required AC-PS1250 power supply—up to three AC-2DE expander boards can be added for an eight-door capacity)



ACS-2DR
Two-Door Access Control Starter Kit (includes one door master controller, one AC-2DE expander board, and two AC-STRIPS—included with ACS-2DR-C kit and is sold separately for AC-AC1 enclosure, p. 74)



AC-C
Steel, Vented, and Lockable Wall-Mount Enclosure
→ p. 74



AC-2DE
Two-Door Expander Board
→ p. 74



AC-PS1250
12V DC, 5A Power Supply
→ p. 74

Features

- Starter kit includes a ventilated lockable steel enclosure (AC-C) with a master door control board and a two-door expander board (AC-2DE)
- Designed to fit an AC-PS1250 power supply (sold separately) and up to four expansion boards.
- Up to three AC-2DE expander boards can be added to manage a max of eight doors
- Two Wiegand reader inputs per AC-2DE (kit includes one AC-2DE and up to three additional can be added)
- Integrated lock power for each door (12V DC, 500mA)
- Two solid state dry contact relays per door
- Three dry contact inputs per door
- Built-in diagnostic LCD
- Custom scripting and actions available
- Can support up to 8 doors with additional AC-2DEs
- Short and over-voltage protection
- Dedicated port for battery backup
- TAA and NDAA compliant
- Standoffs are included for board mounting
- It is lockable, vented, and includes nine conduit knockouts on the sides and the back of the enclosure
- This kit can be used on its own or as part of a larger AC Series access control system with additional components

Specifications

- Power Source** 12V DC—use AC-PS1225
- NIC** RJ45 Ethernet Port 10/100Mbps
- Board Communication:** RS485 (AC-STRIP)
- Protocols** IPv4, IPv6, TCP, UDP, HTTPS
- Card Storage** Up to 100,000 users per controller
- Event Storage** Up to 50,000 events (first in, first out)
- UL Listing** UL 294/ULC S319-05
- Dimensions (Enclosure)** 19-3/8" H x 13-5/8" W x 3" D

Elevator Control and I/O Starter Kits



ACS-ELV
Single Elevator Access Control Starter Kit with Enclosure
(includes one elevator master controller, one AC-2DE expander board, one AC-IOE expander board, and one AC-C enclosure, which has space for the required AC-PS1250 power supply—two more AC-C enclosures and up to seven AC-IOE expander boards can be added for a 64-floor capacity)

NEW



ACS-IO
I/O Starter Kit with Enclosure
(includes one I/O master controller, one AC-IOE expander board, and one AC-C enclosure, which has space for the required AC-PS1250 power supply—one more AC-C enclosure and up to seven AC-IOE expander boards can be added for a 64-contact capacity)

NEW



AC-C
Steel, Vented, and Lockable Wall-Mount Enclosure
→ p. 74



AC-2DE
Two-Door Expander Board
→ p. 74



AC-IOE
Eight-Port I/O Expander Board
→ p. 74



AC-PS1250
12V DC, 5A Power Supply
→ p. 74

Features (ACS-ELV)

- Two Wiegand inputs per AC-2DE
- Eight solid state dry contact relays per AC-IOE
- Eight solid state dry contact inputs per AC-IOE
- NDAA and TAA compliant
- Supports up to 64 floors for a single elevator cab; up to 32 floors for two elevator cabs
- Up to seven AC-IOE boards can be added

Features (ACS-IO)

- Eight solid state dry contact relays per AC-IOE
- Eight solid state dry contact inputs per AC-IOE
- Built-in diagnostic LCD
- NDAA and TAA compliant

Specifications (ACS-ELV)

Power Source	PoE (IEEE 802.3af)
Motion Sensor	Infrared
Lock Power	12V DC, 500mA
Option Power	12V DC, 300mA
Contact Rating	24V DC, 1A
Protocols	IPv4, IPv6, TCP, UDP, HTTPS
Reader Inputs	Wiegand
Card Storage	Up to 100,000 users per controller
Event Storage	Up to 50,000 events (first in, first out)
UL Listing	UL 294/ULC S319-05
Dimensions (Enclosure)	19-3/8" H x 13-5/8" W x 3" D

Specifications (ACS-IO)

Power Source	12V DC (AC-PS1250)
NIC	RJ45 Ethernet Port 10/100Mbps
Board	RS485 (AC STRIP)
Communication Protocols	IPv4, IPv6, TCP, UDP, HTTPS
UL Listing	UL 294/ULC S319-05
Dimensions (Enclosure)	19-3/8" H x 13-5/8" W x 3" D

Self-Assembly Altronix® Trove1 Enclosure



AC-CA1
Lockable Steel Enclosure with Power Supply (includes one Altronix® eFlow6NB power supply—one ACS-2DR starter kit and up to three AC-2DE expander boards can be added)

NEW

NOTE: Image is shown with AC-CA1 enclosure, ACS-2DR starter kit, AC-2DE expander boards, and Altronix® power supply.



ACS-2DR
Two-Door Access Control Starter Kit for AC-CA1 Enclosure (includes one door master controller, one AC-2DE expander board, and two AC-STRIPs) → p. 72

NEW

Features

- This streamlined solution simplifies board layout and wiring, reducing installation time
- Selectable 12V DC or 24V DC
- Fire alarm disconnect
- Over voltage protection, low power disconnect
- Relay outputs for supervision

Specifications

Power Source	Input: 120V AC, 60Hz Output: 12–24V DC, 6A
Material	Steel
Temperature Rating	32°~120°F (0°~49°C)
UL Listing	UL 294/ULC S319-05
Dimensions	18" H x 14-1/2" W x 4-9/16" D (knockouts are 1-1/8" or 2" in diameter)

Controller Accessories



AC-C
Steel, Vented, and Lockable Wall-Mount Enclosure (included with ACS-2DR-C, ACS-ELV, and ACS-IO starter kits)

NEW

Features (AC-C)

- The AC-C is a steel enclosure designed to hold a master controller, an AC-PS1250 power supply, and up to four expansion boards
- Standoffs are included for board mounting
- Lockable, vented, and includes nine conduit knockouts on the sides and back of the enclosure

Specifications (AC-C)

Material	Steel
UL Listing	UL 294/ULC S319-05
Dimensions	Enclosure: 19-3/8" H x 13-5/8" W x 3" D Knockouts: 1-1/8" and 2" diameter

Specifications (AC-2DE)

Power Source	12V DC (drawn from main board)
Lock Power	12V DC 500mA
Option Power	12V DC 500mA
Contact Rating	30V DC, 1A
Dimensions	3-3/4" H x 3-1/2" W

Specifications (AC-IOE)

Power Source	12V DC (drawn from main board)
Contact Rating	30V DC, 500mA
Dimensions	3-3/4" H x 3-1/2" W

Specifications (AC-PS1250)

Power Input	90–264V AC, 50/60Hz
Power Output	12V DC, 5A
UL Listing	UL/ULC 60950-1
Dimensions	6-9/16" H x 2-1/8" W x 1-3/8" D



AC-2DE
Two-Door Expander Board (included with ACS-2DR-C and ACS-ELV starter kits)



AC-IOE
Eight-Port I/O Expander Board (included with ACS-ELV and ACS-IO starter kits)



AC-PS1250
12V DC, 5A Power Supply

Your Reliable Security Solution Provider



Superior
Quality

Award-Winning
Service

Unrivaled
Support



Authorized staff can quickly access their buildings while having a secure method to identify visitors before unlocking the door.

Approved visitors can be let inside with the simple touch of a button.



Discover how combining our video intercoms with our access control system will provide a comprehensive (yet cost-effective) security solution for your buildings and campuses



AT-406 Series Components

Audio Master and Sub Stations



AT-206
White Audio Master Station with Handset
(not sold separately)



AT-306
White Audio Sub Station with Handset



AT-206B
Charcoal Gray Audio Master Station with Handset
(not sold separately)



AT-306B
Charcoal Gray Audio Sub Station with Handset
(not sold separately)

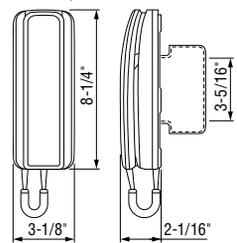
Features

- Handset for privacy
- Call button on master rings all the subs
- Power supply or battery powered
- Sub(s) ring master only

Specifications

- Power Source** 6V DC—use SKK-620C or four AA batteries
- Communication** Handset (full-duplex)
- Cord Length** AT-206B, AT-306B: 4'
- Wire Type** Master Station to Sub Station: 2-cond., overall shield—use Aiphone #822202
- Distance** Two-Station Set: 2,300' (22 AWG) 5,250' (18 AWG)
Master Station to third Sub Station: 1,350' (22 AWG) 3,100' (18 AWG)

AT-206, AT-206B, AT-306, AT-306B



AX Series Components

Master Stations and Add-On Selector



AX-8MV
Video Master Station



AX-8MV-W
Video Master Station
(recommended for an 8 x 8 system only)



AX-8M
Audio Master Station



AX-16SW
16-Call Add-On Selector for AX-8MV or AX-8M
(max. seven per master)

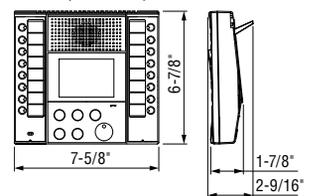
Features (AX-8MV, AX-8MV-W, AX-8M)

- Hands-free or push-to-talk communication
- Two talk channels
- Composite video output from CEU/video master stations
- All Call or Group Call to master stations
- Scan monitoring

Specifications (AX-8MV, AX-8MV-W, AX-8M)

- Power Source** Supplied by Central Exchange Unit
- Communication** Hands-free (VOX) or push-to-talk (simplex)
- Video Display** AX-8M: N/A
AX-8MV, AX-8MV-W: 3-1/2" LCD screen
- Door Release** Programmable dry contact, 24V AC/DC, 500mA (use RY-1824L for larger contact rating)
- Mounting** Surface mount directly to wall or desk mount—use MCW-S/B for an adjustable desk angle
- Wire Type** Between Door/Sub Station, Master Station, and Central Exchange Unit: Cat-5e
- Distance** Central Exchange Unit to Master Station: 980'

AX-8M, AX-8MV, AX-8MV-W



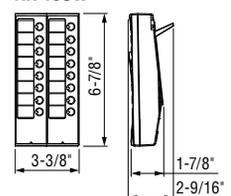
Features (AX-16SW)

- Provides ability to select/call 16 additional door stations
- Aesthetically matches AX-8M or AX-8MV

Specifications (AX-16SW)

- Power Source** Supplied by Master Station
- Calling Capacity** 16 door/sub stations
- Unit Capacity** Max. 7 for up to 112 additional door/sub stations (max. 120 door/sub stations per system)
- Mounting** Mounts directly to Master Station or other AX-16SW with supplied brackets
- Wire Type** Add-On Selector to Master Station: Ribbon cable (included with AX-16SW)

AX-16SW



Video Door Stations



AX-DV
Video Door Station



AX-DV-P
Video Door Station with HID® Card Reader
(requires a third-party host and additional wire to power card reader)



AX-DVF
Video Door Station



AX-DVF-P
Video Door Station with HID® Card Reader
(requires a third-party host and additional wire to power card reader)

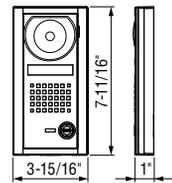
Features

- Polycarbonate lens cover
- Fixed camera provides clear video
- LED illumination automatically turns on in low light conditions
- Weather and vandal resistant

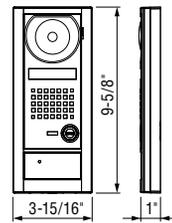
Specifications

- Power Source** Supplied by Central Exchange Unit
- Communication** Hands-free
- Camera** Type: 1/4" CCD
Area View: 2' 1" vertical x 3' 1" horizontal at 20"
- Temperature Rating** 14°~ 140°F (-10°~ 60°C)
- HID® Reader** ProxPoint® Plus
- Material** AX-DV, AX-DV-P: aluminum die cast
AX-DVF, AX-DVF-P: stainless steel
- Mounting** AX-DV, AX-DV-P: surface mount directly to wall
AX-DVF: flush mount with included back box or surface mount with SBX-AXDVF
AX-DVF-P: flush mount with included back box or surface mount with SBX-DVF-P
- Wire Type** Door Station to Central Exchange Unit: Cat-5e
- Distance** Door Station to Central Exchange Unit: 980'

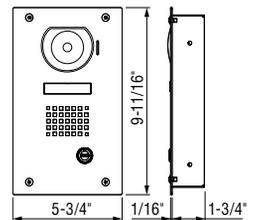
AX-DV



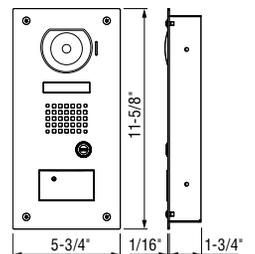
AX-DV-P



AX-DVF



AX-DVF-P



Audio Door Stations



AX-DM
Mullion-Mount Audio Door Station



IF-DA
→ p. 86



IE-JA
→ p. 86



IE-SS/A
→ p. 86



IE-SSR
→ p. 86

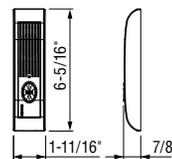
Features (AX-DM)

- Weather resistant
- Mullion surface mount
- Can be used with AX Series, IE-8 Series, KB Series, or TD-H Series

Specifications (AX-DM)

- Power Source** Supplied by Central Exchange Unit
- Communication** Hands-free
- Temperature Rating** 14°~ 140°F (-10°~ 60°C)
- Material** ABS plastic
- Mounting** Surface mount directly to wall or mullion
- Wire Type** Door Station to Central Exchange Unit: Cat-5e or 2-cond.
- Distance** Door Station to Central Exchange Unit: 980'

AX-DM



Features

(IF-DA, IE-JA, IE-SS/A, IE-SSR)
→ p. 86

Specifications

(IF-DA, IE-JA, IE-SS/A, IE-SSR)
→ p. 86

Central Exchange Units



AX-084C
Central Exchange Unit
(supports up to 4 master stations and 8 door/sub stations)



AX-248C
Central Exchange Unit
(supports up to 8 master stations and 24 door/subs stations)



AX-320C
Add-On Central Exchange Unit
(supports up to 32 door/sub stations)

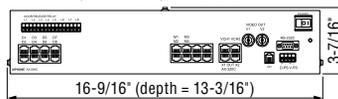
Features

- Wiring hub uses Cat-5e
- Two 24V DC power supply input terminals
- Rack mountable

Features (additional for AX-084C, AX-248C)

- Controls all system functionality
- Two BNC composite video outputs and video switching triggers
- CO line transfer (requires Viking K-1900-5 programmable auto-dialer)
- Programmable functionality via supplied software

AX-084C, AX-248C, AX-320C



Specifications

- Power Source** 24V DC—use two PS-2420ULs
- Consumption** Video: 0.62A max. Audio: 0.65A max.
- CO Line Port** RJ11 for Viking K-1900-5 programmable auto-dialer
- Door Release** Programmable dry contact, 24V AC/DC, 500mA (use RY-1824L for larger contact rating)
- Mounting** 19" EIA rack (2U) or wall mount
- Wire Type** Between Door/Sub Station, Master Station, and Central Exchange Unit: Cat-5e
- Power Supply to Central Exchange Unit and Add-On Central Exchange Unit: 2-cond., overall shield—use Aiphone 821802
- Distance** Door/Sub Station to Central Exchange Unit and Add-On Central Exchange Unit: 980'
Central Exchange Unit to Master: 980'
Central Exchange Unit to Add-On Central Exchange Unit: 16'
Power Supply to Central Exchange Unit and Add-On Central Exchange Unit: 16' (22 AWG) 33' (18 AWG)

Audio Sub Stations



AX-A
Audio Sub Station



AX-AN
Privacy Audio Sub Station



AX-B
Audio Sub Station



AX-BN
Privacy Audio Sub Station

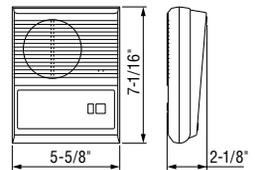
Features

- Hands-free communication when master answers
- Privacy feature blocks unwanted monitoring from master (AX-AN, AX-BN)

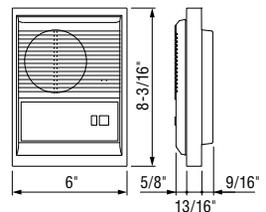
Specifications

- Power Source** Supplied by Central Exchange Unit
- Communication** Hands-free
- Material** ABS plastic
- Mounting** AX-A, AX-AN: desk mount or surface mount directly to wall/1-gang box
AX-B, AX-BN: semi-flush mount
- Wire Type** Sub Station to Central Exchange Unit: Cat-5e or 2-cond.
- Distance** Sub Station to Central Exchange Unit: 980'

AX-A, AX-AN



AX-B, AX-BN



Paging Adaptor



AXW-PA1
Paging Adaptor
for AX Series

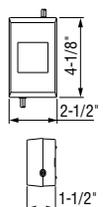
Features

- Page from an intercom master station out to a PA system
- Takes the place of a separate microphone for paging where there is an intercom

Specifications

- Power Source** Supplied by Master Station or Central Exchange Unit
- Input** Direct Central Exchange Unit connection
- Output** 600Ω
- Output to Adaptor** 0dB and -20dB, selectable
- Requirements** AUX input (10kΩ) or 100mV for rated output
- Wire Type** 2-cond., overall shield—use Aiphone #822202

AXW-PA1



CCS-1A Set Components

Audio Master Station



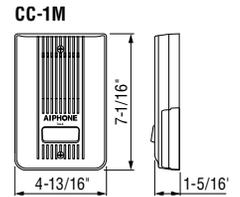
CC-1M
Audio Master Station
(not sold separately)

Features

- Chime and voice volume controls

Specifications

- Power Source** 12–16V AC (with no-load voltage rating, 20V or less)—use PT-1210NA
- Communication** Push-to-talk (simplex)
- Door Release** N/A
- Mounting** Surface mount directly to wall
- Wire Type** Door Station to Master Station: 2-cond., overall shield—use Aiphone #822202 or #821802
- Distance** Door Station to Master Station: 245' (22 AWG) 590' (18 AWG)



Audio Door Station



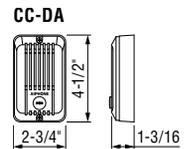
CC-DA
Audio Door Station
(not sold separately)

Features

- Backlit call button
- Weather resistant

Specifications

- Power Source** Supplied by Master Station
- Communication** Push-to-talk (simplex)
- Material** Fire resistant ABS plastic
- Mounting** Surface mount directly to wall
- Wire Type** Door Station to Master Station: 2-cond., overall shield—use Aiphone #822202 or #821802
- Distance** Door Station to Master Station: 245' (22 AWG) 590' (18 AWG)



C-123L/A and C-123LW Sets Components

Audio Master Station



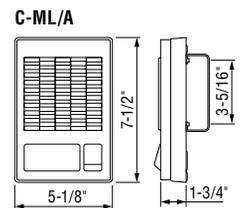
C-ML/A
Audio Master Station
(includes DAK-2S dual master adaptor kit)

Features

- Adjustable communication volume
- Batteries or 6V DC power supply (one per master)
- Automatically turns off in 20 seconds

Specifications

- Power Source** 6V DC—use SKK-620C or four C batteries
- Consumption** 85mA
- Output** 100mW
- Communication** Push-to-talk (simplex)
- Door Release** N/O dry contact, 50V AC, 1A
- Mounting** Surface mount directly to wall
- Wire Type** Door Station to Master Station: 2-cond., overall shield—use Aiphone #822202 or #821802
- Distance** Door Station to farthest Master Station: 245' (22 AWG) 590' (18 AWG)



Audio Door Station



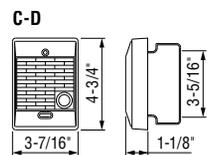
C-D
Audio Door Station
(not sold separately)

Features

- Can be replaced with any LE or LS Series door station
- Physically identical to LE-D
- Weather resistant

Specifications

- Power Source** Supplied by Master Station
- Communication** Push-to-talk (simplex)
- Temperature Rating** 14°~140°F (-10°~60°C)
- Material** Fire resistant ABS plastic
- Mounting** Surface mount directly to wall
- Wire Type** Door Station to Master Station: 2-cond., overall shield—use Aiphone #822202 or #821802
- Distance** Door Station to farthest Master Station: 245' (22 AWG) 590' (18 AWG)



Dual Master Adaptor Kit



DAK-2S
→ p. 113

Features

→ p. 113

Specifications

→ p. 113

DA Series Components

Audio Tenant Station



DA-1MD
Audio Tenant Station
with Handset
(included with
DA-1AS box set)

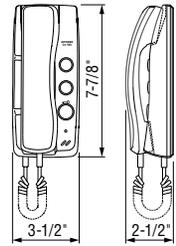
Features

- Handset for privacy
- Service button to control an external device
- Call tone volume control with mute indicator
- Door release button (powered by door station)

Specifications

- Power Source** 15V AC—use PT-1211CA
- Communication** Handset (full-duplex)
- Wire Type** Entrance Station to Tenant Station: 2-cond., overall shield—use Aiphone #822202 or 2-cond., low cap, PE insulation, solid, non-shielded—use Aiphone #871802
- Power Supply to Tenant Station: 2-cond., low cap, PE insulation, solid, non-shielded—use Aiphone #871802
- Distance** Power Supply to Tenant Station: 180' (22 AWG) 510' (18 AWG)
- Entrance Station to Power Supply (cumulative): 360' (22 AWG) 1,020' (18 AWG)

DA-1MD



Entrance Stations



DA-1DS



DA-2DS



DA-4DS

Features

See below

Specifications

See below

DB Series Components

Audio Tenant Stations



DB-1MD
Audio Tenant
Master Station
(included with
DBS-1A box set)



DB-1SD
Audio Tenant
Sub Station

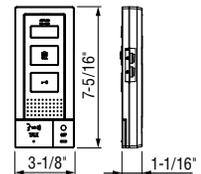
Features

- All Call between stations in same residence/office
- Option button for external device control (N/O dry contact, AC/DC 24V 1.6A max.)
- Call tone volume control with LED mute indicator
- Receive volume control
- Optional call extension speaker (IER-2)
- Optional external signaling to third-party bell or light using RY-ES (used in lieu of IER-2)
- Door release button (powered by door station)

Specifications

- Power Source** 15V AC—use PT-1211CA (requires one per tenant master station and one per two tenant sub stations)
- Communication** Hands-free (VOX) or push-to-talk (simplex)
- Wire Type** Entrance Station to Tenant Master Station: 2-cond., low cap, PE insulation, solid, non-shielded—use Aiphone #871802
- Tenant Master Station to Tenant Sub Station: 4-cond., low cap, PE insulation, solid, non-shielded—use Aiphone #871804
- Between Tenant Sub Stations: 4-cond. + 2-cond. when sharing power - use Aiphone #822206 or #871804
- Distance** Power Supply to Tenant Master Station: 180' (22 AWG) 510' (18 AWG)
- Tenant Master Station to farthest Tenant Sub Station: 330'
- Power Supply to Entrance Station (cumulative): 360' (22 AWG) 1,020' (18 AWG)

DB-1MD



Entrance Stations



DA-1DS
1-Call Audio
Entrance Station
(included with
both DA-1AS and
DBS-1A box sets)



DA-2DS
2-Call Audio
Entrance Station



DA-4DS
4-Call Audio
Entrance Station

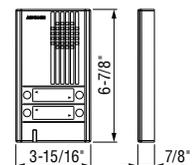
Features

- Door release powered by door station without the need of an additional transformer or wiring
- Direct select button(s)
- Backlit directory
- Weather resistant

Specifications

- Power Source** Supplied by Tenant Station
- Communication** Hands-free
- Door Release** 9.5–20V AC, 70Ω or higher resistance—use EL-12S
- Temperature Rating** 14° ~ 140°F (-10° ~ 60°C)
- Material** Aluminum cover
- Mounting** Surface mount directly to wall
- Wire Type** Entrance Station to Tenant Station: 2-cond., overall shield—use Aiphone #822202 or 2-cond., low cap, PE insulation, solid, non-shielded—use Aiphone #871802
- Distance** Power Supply to Entrance Station (cumulative): 360' (22 AWG) 1,020' (18 AWG)

**DA-1DS, DA-2DS,
DA-4DS**



Entrance Stations and Access Card/Fob

Ready-to-Install Single Panel



GT-DMB-N
3-in-1 Video
Entrance Station

Ready-to-Assemble Modular Kits



GTV-DES104B
Modular Video Entrance Station Kit
(includes GT-DB + GT-DBP, GT-VB + GT-VP,
GT-NSB + GT-NSP-L, GT-10K + GF-10KP,
GT-4B + GT-4F, and GT Operation Plate)



GTV-DES202B
Modular Video Entrance Station Kit
(includes GT-DB + GT-DBP, GT-VB + GT-VP,
GT-NSB + GT-NSP-L, GT-10K + GF-10KP,
and GF-2B + GF-2F x2)



GTA-DESB
Modular Audio Entrance Station Kit
(includes GT-DB + GT-DBP, GT-NSB + GT-NSP-L,
GT-10K + GF-10KP, and GF-3B + GF-3F)

NFC-CARD
Access Card
for GT-DB-VN
and GT-DMB-N
(image not available)

NFC-FOB
Access Fob for
GT-DB-VN and
GT-DMB-N (image not
available)

NOTE: To build custom entrance stations, see modular components and mounting accessories p. 84–85.

Features

- PTZ camera with 170° angle view (GT-DMB-N, GTV-DES104B, GTV-DES202B)
- Hands-free communication
- Direct dialing, alphabetical scrolling, or “jump” scrolling by letter to select tenant
- Digital panel stores up to 500 tenant names/number locations and 500 unique access codes to activate door release
- Voice annunciation in English, French, German, Spanish, Dutch, and Italian
- Alpha-numeric room numbers and/or names can be programmed with software
- Scrolling welcome message, up to 160 characters, adjustable scroll speed
- VFD displays calling unit name and number (GTA-DESB, GTV-DES104B, GTV-DES202B)
- Configuration can be customized
- Weather and vandal resistant

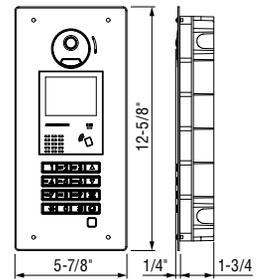
Features (additional for GT-DMB-N)

- Tenant directory programming with NFC technology
- PC configuration via USB or NFC technology
- Motion activated 3-1/2" LCD screen can display a customized greeting, operation instructions, or standby image

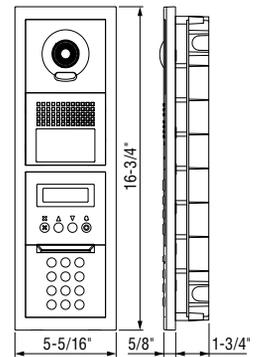
Specifications

- Power Source** 24V DC—use specified number of PS-2420ULs per system configuration
- Communication** Hands-free (VOX)
- Camera** Type: 1/4" CMOS (not GTA-DESB)
View Area: 100° vertical x 170° horizontal (not GTA-DESB)
- Door Release** Form C dry contact, 24V AC/DC, 4A
- Temperature Rating** 14° ~ 140°F (-10° ~ 60°C)
- Material** GT-DMB-N: stainless steel
GTA-DESB, GTV-DES104B, GTV-DES202B: zinc die cast
- Mounting** GT-DMB-N: flush mount with GF-3B (sold separately) or surface mount with SBX-GTDMB (sold separately)
GTA-DESB, GTV-DES104B, GTV-DES202B: semi-flush mount with GF-3B (included), semi-flush mount with GT-nH (sold separately), or surface mount with GT-nHB (sold separately)
- Wire Type** 2-cond., solid, non-shielded, PE insulation—use Aiphone #872002 for audio and #871802 for video and power
- Distance** Variable wiring distances—see table on p. 83

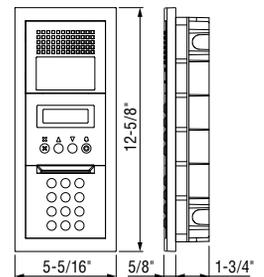
GT-DMB-N



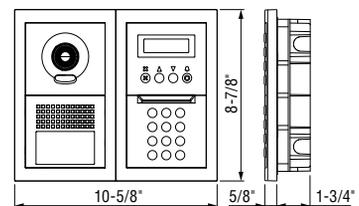
GTV-DES104B



GTA-DESB



GTV-DES202B



Video Guard Station



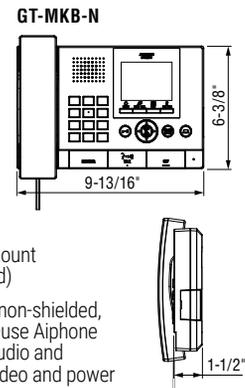
GT-MKB-N
Video Guard Station with Handset

Features

- Tenant directory programming with NFC technology
- For audio or video systems
- Video identification and monitoring
- Calls entrance or tenant stations
- Reception Mode intercepts visitor calls for screening by guard or concierge
- Door release
- PC configuration via USB or NFC technology
- Hands-free communication with handset for privacy
- Includes desk stand
- Compatible with JO-DV for single-door video entry

Specifications

- Power Source** 24V DC—use PS-2420UL
- Communication** Handset
- Video Display** 3-1/2" LCD screen
- Temperature Rating** 32°~104°F (0°~40°C)
- Mounting** Wall or desk mount (stand included)
- Wire Type** 2-cond., solid, non-shielded, PE insulation—use Aiphone #872002 for audio and #871802 for video and power



Audio Tenant Door Station



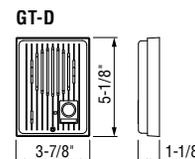
GT-D
Audio Tenant Door Station (one per GT-2C for single-door audio entry)

Features

- Compatible with GT-2C video tenant master station
- Provides additional access control at individual tenant doorways
- Calls tenant's personal master and sub master stations simultaneously
- Hands-free communication

Specifications

- Power Source** Supplied by GT-2C
- Communication** Hands-free (VOX)
- Temperature Rating** 14°~140°F (-10°~60°C)
- Material** Plastic
- Mounting** Surface mount
- Wire Type** 2-cond., low cap, PE, solid, non-shielded—use Aiphone #871802
- Distance** Variable wiring distances—see table on p. 83



Video Tenant Master and Sub Master Stations



GT-2C
Video Tenant Master Station



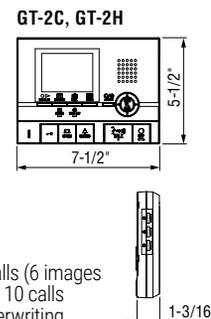
GT-2H
Video Tenant Sub Master Station

Features

- Video identification and monitoring with 3-1/2" screen
- Hands-free or push-to-talk communication
- Internal Picture Memory (GT-2C)
- Door release, video guard station call, and optional service buttons
- PTZ, brightness, call tone, and communication volume control
- Simple station programming via dip switch setting
- Security inputs for alerting tenant and guard
- Input for a private tenant door station (GT-D or any JP Series door station)
- Internal communication with up to three GT-2H sub master stations
- Missed call from guard notification
- Menu can be displayed in six languages

Specifications

- Power Source** GT-2C: 24V DC—use PS-2420UL
GT-2H: supplied by GT-2C
- Communication** Hands-free (VOX) or push-to-talk (simplex)
- Video Display** 3-1/2" LCD screen
- Picture Memory** Record max. 40 calls (6 images per call) with up to 10 calls protected from overwriting
- Mounting** Wall mount or desk mount with MCW-S/B
- Wire Type** 2-cond., solid, non-shielded, PE insulation—use Aiphone #872002 for audio and #871802 for video and power
- Distance** Variable wiring distances—see table on p. 83



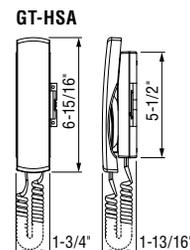
Optional Add-On Handset



GT-HSA
Optional Add-On Handset for GT-2C or GT-2H

Features

- Handset for privacy
- Easy to attach and remove
- Compatible with GT-2C or GT-2H



Video and Audio Tenant Stations



GT-1C7W
App-Compatible Video Tenant Station
(requires PS-2420UL or GT-4ZP for power and WiFi connection for mobile app)



GT-1C7
Video Tenant Station



GT-1M3
Video Tenant Station



GT-1A
Audio Tenant Station



GT-1D
Audio Tenant Station with Handset

Features

(GT-1C7W, GT-1C7, GT-1M3, GT-1A)

- Door release, video guard station call, and optional service buttons
- Call tone and communication volume control
- Up to eight free mobile apps can be connected (requires GT-1C7W and WiFi connection)
- Simple station programming via dip switch setting (GT-1M3, GT-1C7, GT-1C7W)
- PTZ and brightness control (GT-1C7, GT-1C7W)

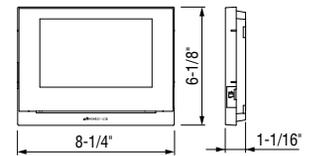
Features (GT-1D)

- Door release and video guard station call buttons
- Call tone volume control

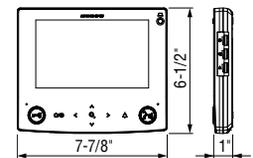
Specifications

- Power Source** GT-1C7, GT-1M3, GT-1A, GT-1D: 24V DC—supplied by GT-BC or GT-VBC
GT-1C7W: 24V DC—supplied by GT-4ZP or power supply
- Communication** GT-1C7W, GT-1C7, GT-1M3, GT-1A: hands-free (VOX) or push-to-talk (simplex)
GT-1D: handset
- Video Display** GT-1C7: 7" LCD screen
GT-1C7W: 7" LCD touchscreen
GT-1M3: 3-1/2" LCD screen
GT-1A, GT-1D: N/A
- Mounting** GT-1C7, GT-1C7W, GT-1M3, GT-1A: wall mount or desk mount with MCW-S/B
GT-1D: wall mount
- Wire Type** 2-cond., solid, non-shielded, PE insulation—use Aiphone #872002 for audio and #871802 for video (GT-1A or GT-1D do not need video wire)
- Distance** Variable wiring distances—see table below

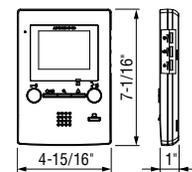
GT-1C7W



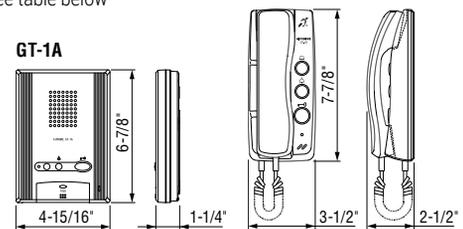
GT-1C7



GT-1M3



GT-1D



Adaptors and Control Units



GT-MCX
Network Adaptor for Remote Programming (includes mounting rail)



GT-1Z
1-Way Video Distribution Adaptor



GT-BC
Audio Bus Control Unit



GT-VBC
Video Bus Control Unit



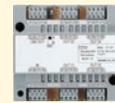
GT-BCXB-N
Expanded Bus Control Unit (includes mounting rail)



GT-VBX
Expanded Video Bus Control Unit (includes mounting rail)



GT-4Z
4-Way Video Distribution Adaptor



GT-4ZP
4-Way Video/Power Distribution Adaptor for GT-1C7W



GTW-LC
Multi-Relay Control Unit (for use with GT Series Expanded System only and requires GT-BCXB-N—includes mounting rail)

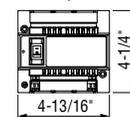


GTW-DP
Distribution Point Adaptor (includes mounting rail)

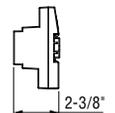
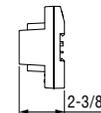
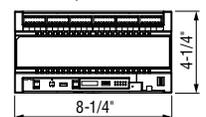
Specifications

- Power Source** GT-4ZP, GT-BC, GT-VBC, GT-BCXB-N, GT-MCX: 24V DC—use PS-2420UL
GT-VBX: supplied by GT-BCXB-N
GTW-LC: supplied by GT-BC
GT-1Z, GT-4Z: power not required
- Mounting** DIN rail (equipped with large units)—use W-DIN11 for small units
- Wire Type** 2-cond., solid, non-shielded, PE insulation—use Aiphone #872002 for audio and #871802 for video and power
- Distance** Variable wiring distances—see table below

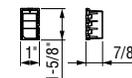
GT-4Z, GT-4ZP, GT-BC, GT-VBC



GT-BCXB-N, GT-MCX, GT-VBX, GTW-LC



GT-1Z



GT Wiring Distances	22 AWG	20 AWG	18 AWG
GT-BC to Distribution Point	10'	16'	16'
GTW-DP to Entrance Station	490'	980'	980'
GTW-DP to GT-MKB-N	490'	980'	980'
GTW-DP to farthest Tenant Station	490'	980'	980'
GT-VBC to farthest Tenant Station	330'	490'	490'
GT-VBC (standard) to GT-VBC (expanded)	330'	490'	490'
GT-BC or GT-VBC to Power Supply	10'	16'	16'
GT-NSB or GT-AC to Power Supply	980'	980'	980'
GT-MKB-N to Power Supply	490'	980'	980'
Total cumulative wiring per common line (max. two) and per sub trunk line (max. four)	5,400'	8,200'	8,200'

External Signaling Relay



GT-RY
External Signaling Relay

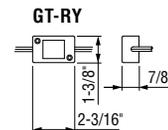
Features

- N/O contact output
- Provides relay for entrance light control or an additional buzzer at residence

Specifications

Power Source 24V DC—supplied by station

Contact Rating 24V AC/DC, 500mA



Urgent Call Pull Cord



GFK-PS
Urgent Call Pull Cord

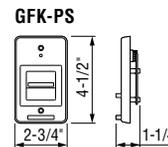
Features

- Latching call switch
- Suitable for bathrooms and high-moisture areas
- Durable 7' nylon pull cord with pendant
- Easily resets by pushing back up

Specifications

Contact Rating N/C 24V DC, 500mA

Mounting Flush mount with 1-gang box



Modular Components for Custom Entrance Stations

Audio Module and Panel (required for custom entrance stations)



GT-DB
Audio Module

GT-DB-VN
Audio Module with NFC Programming (requires Android® device)

GT-DBP
Panel for GT-DB or GT-DB-VN

Video Module and Panel



GT-VB
Video Module with PTZ Camera

GT-VP
Camera Panel for GT-VB

Specifications

Power Source GT-10K, GT-AD, GT-DB, GT-DB-VN, GT-SW, GT-VB: supplied by system

GT-AC, GT-NSB: PS-2420UL

Door Release GT-DB, GT-DB-VN: Form C dry contact, 24V AC/DC, 4A

Temperature Rating 14°~ 140°F (-10°~ 60°C)

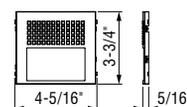
Material Panels: zinc die cast

Modules: fire resistant ABS plastic

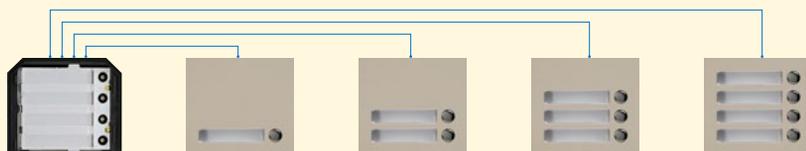
Wire Type 2-cond., solid, non-shielded, PE insulation—use Aiphone #872002 for audio and #871802 for video and for power to GT-AC

Distance Variable wiring distances—see table on p. 83

All GT & GF Panels



Direct Select Module and Panels



GT-SW
Call Switch Module

GF-1P
1-Call Panel for GT-SW

GF-2P
2-Call Panel for GT-SW

GF-3P
3-Call Panel for GT-SW

GF-4P
4-Call Panel for GT-SW

Digital Scroll Modules and Panels



GT-NSB
Display Module

GT-NSP-L
Panel for GT-NSB

GT-10K
Keypad Module

GF-10KP
Panel for GT-10K

Other Optional Modules, Panels, and Operation Plate



GT-AD
Address Module

GF-AP
Address Panel for GT-AD

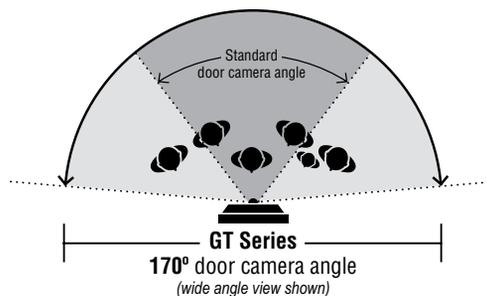
GF-BP
Blank Panel (can be used as a placeholder)

GT-AC
Access Control Keypad Module



GT-HID
ProxPoint Plus® Embedded HID® Card Reader Module (requires a third-party host and additional wire to power card reader)

Camera View Area



Easily mix and match modular components for custom entrance stations



Mounting Accessories



SBX-GTDMB
Surface Mount Box for GT-DMB-N



GF-2B
2-Module Back Box



GF-3B
3-Module Back Box



GT-4B
4-Module Back Box



GT-103H
3-Module Rain Hood



GT-202HB
4-Module Hooded Surface Mount Box (for 2x2 layout)



GT-102HB
2-Module Hooded Surface Mount Box



GT-103HB
3-Module Hooded Surface Mount Box



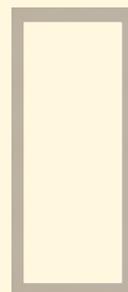
GT-104HB
4-Module Hooded Surface Mount Box (for 1x4 layout)



GT-203HB
6-Module Hooded Surface Mount Box (for 2x3 layout)



GF-2F
2-Module Front Frame



GF-3F
3-Module Front Frame



GT-4F
4-Module Front Frame



GT-303HB
9-Module Hooded Surface Mount Box (for 3x3 layout)



W-DIN11
DIN Mounting Rail for Control Units

Features

- Hood provides additional weather protection
- Includes space inside for wiring
- Can mount directly to wall surface
- Openings at bottom allow for moisture drainage

Specifications

Material 16GA stainless steel

Mounting Surface mount directly to wall with included hardware (8 x 32 with T-15 Torx head)



There are many different entrance station and mounting configurations possible with the GT Series.

For additional help, contact Aiphone's Technical Support.

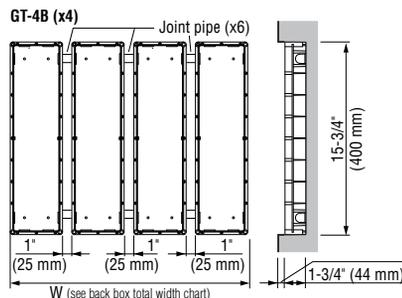
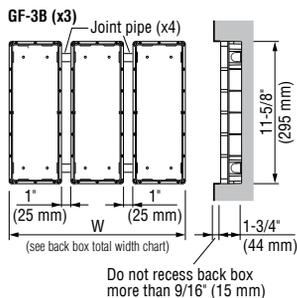
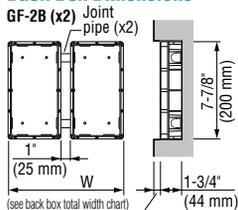
800.692.0200

Rain Hood & Hooded Surface Mount Box Dimensions

Component	Height (in / mm)	Width (in / mm)
SBX-GTDMB	12-11/16" / 323	6-1/16" / 154
GT-102HB	9-9/16" / 243	6-1/8" / 155
GT-202HB	9-9/16" / 243	11-7/16" / 290
GT-103H / HB	13-5/16" / 338	6-1/8" / 155
GT-203HB	13-5/16" / 338	11-7/16" / 290
GT-104HB	17-7/16" / 443	6-1/8" / 155
GT-303HB	13-5/16" / 338	16-3/4" / 425
GF-2F	8-7/8" / 225	5-5/16" / 135
GF-3F	12-5/8" / 320	5-5/16" / 135
GT-4F	16-3/4" / 425	5-5/16" / 135

Component	Depth (in / mm)
SBX-GTDMB	2-1/2" / 64
GT-nH	7/8" / 23
GT-nHB	2-11/16" / 68
GF/T-nF	5/8" / 16

Back Box Dimensions



Back Box Total Width

GF-2B / GF-3B / GT-4B	Width (in / mm)
1 back box	4-5/16" / 110
2 back boxes	9-5/8" / 245
3 back boxes	15" / 380
4 back boxes	20-1/4" / 515
5 back boxes	25-9/16" / 650
6 back boxes	30-7/8" / 785
7 back boxes	36-1/4" / 920
8 back boxes	41-9/16" / 1,055
9 back boxes	46-7/8" / 1,190

Do not recess back box more than 9/16" (15 mm)

Postal Lock Modules for Custom Entrance Stations



GT-OP2
2-Module
Postal Lock



GT-OP3
3-Module
Postal Lock
(top position
open for
additional
module)

Specifications

Power Source 24V DC—use PS-2420UL

Output Rating N/O: 30V DC, 5A
125V AC, 10A
250V AC, 3A

N/C: 30V DC or
125V AC, 3A

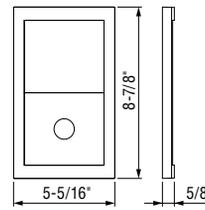
Mounting GT-OP2: surface mount*
or flush mount with GF-2B

GT-OP3: surface mount*
or flush mount with GF-3B

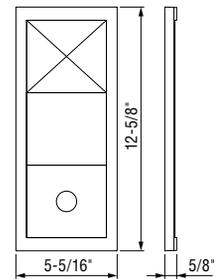
*Surface mount box selection
depends on entry panel layout

Wire Type 2-cond., non-shielded—use Aiphone #872002

GT-OP2



GT-OP3



IE-8 Series Components

Audio Master and Sub Master Stations



IE-8MD
6-Call Audio
Master Station
with Handset



IE-8HD
6-Call Audio
Sub Master Station
with Handset

Features

- Selective Call or All Call between handsets
- Simple 4-conductor wiring between handsets
- Handset for privacy

Specifications

Power Source 12–16V AC—use PT-1210NA or
12–18V DC—use PS-1225UL

Communication Handset (full-duplex)

Door Release N/O dry contact, 24V AC/DC, 350mA

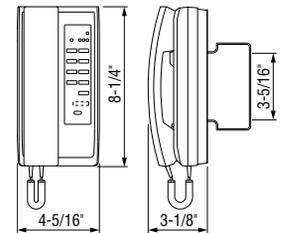
Wire Type Door Station to Master Station: 2-cond.,
overall shield—use Aiphone #822202

Master Station to Sub Stations: 4-cond.,
overall shield—use Aiphone #822206

Distance Door Station to Master Station: 500' (22 AWG) 1,180' (18 AWG)

Master Station to farthest Sub Master Station: 245' (22 AWG) 580' (18 AWG)

IE-8MD, IE-8HD



Audio Door Stations



AX-DM
Mullion-Mount
Audio Door Station
→ p. 77



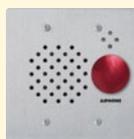
IF-DA
Audio Door Station



IE-JA
Audio Door Station



IE-SS/A
Audio Door Station



IE-SSR
Audio Door Station

Features

- Weather resistant
- Can be used with AX Series, IE-8 Series, KB Series, or TD-H Series
- Locator LED beside call button (IF-DA)
- Locator LED above call button (IE-JA)

Features (additional for AX-DM)
→ p. 77

Features (additional for IE-SS/A, IE-SSR)

- Vandal resistant
- Moisture and puncture resistant speaker
- 3-layer steel baffle protects speaker from tampering
- Pigtail wires for connection to master station
- Includes tamper proof mounting screws
- Stainless steel, mechanical call button (IE-SS/A)
- Red mushroom call button (IE-SSR)

Specifications (AX-DM)

→ p. 77

Specifications

Power Source Supplied by Master Station

Communication Hands-free

Temperature Rating 14°~140°F (-10°~60°C)

Material IF-DA: ABS plastic

IE-JA: ABS plastic with
stainless steel cover

IE-SS/A, IE-SSR: stainless steel

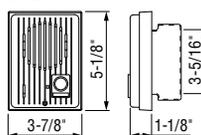
Mounting IF-DA: surface mount directly
to wall or 1-gang box/ring

IE-JA, IE-SS/A, IE-SSR: flush
mount with 2-gang box/ring or
surface mount with SBX-2G/A

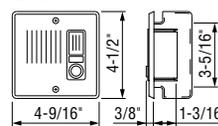
Wire Type Door Station to Master Station:
2-cond., overall shield—
use Aiphone #822202
or #821802

Distance Door Station to Master Station:
varies by system

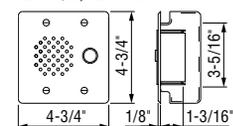
IF-DA



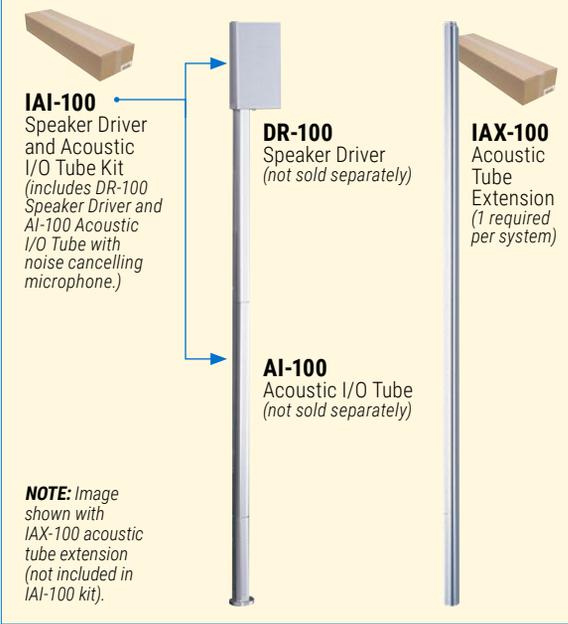
IE-JA



IE-SS/A, IE-SSR



Speaker Driver, Acoustic I/O Tube, and Tube Extension



Features (DR-100)

- Window or ceiling mount
- Indoor or outdoor use
- Access panel for future maintenance

Features (AI-100)

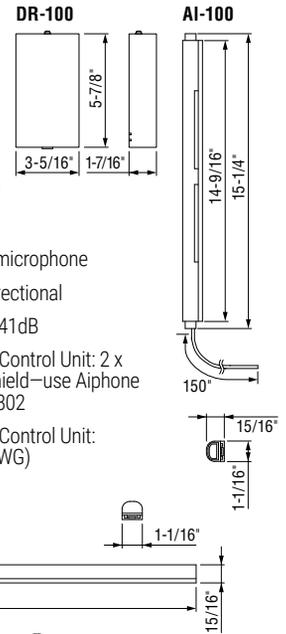
- Optimum acoustic tube location is 12" to 16" from the center of the ticket passthrough
- For smaller windows, acoustic tube may be mounted at the junction of the window and frame
- Noise cancelling microphone
- Mounting rails included

Specifications (IAI-100)

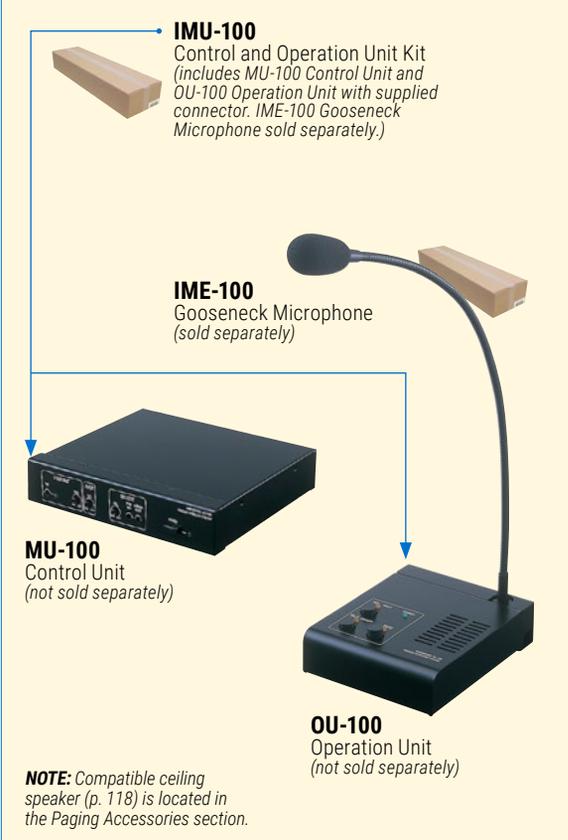
- Power Source** Supplied by Control Unit
- Temperature Rating** 14°~140°F (-10°~60°C)
- Acoustic Output** Impedance: 4Ω
Rated Input: 4.5W
Max. Input: 6W
- Microphone** Type: condenser microphone
Directivity: non-directional
Input Sensitivity: -41dB
- Wire Type** Speaker Driver to Control Unit: 2 x 2-cond., overall shield—use Aiphone #822202 or #821802
- Distance** Speaker Driver to Control Unit: 66' (22 AWG/18 AWG)

Specifications (IAX-100)

- Material** Aluminum



Control Unit, Operation Unit, and Gooseneck Mic



Features (MU-100)

- VOX sensitivity adjustment
- VOX operation LED
- Transmit, speaker, receive, and standby volume control
- Ambient noise cancelling control
- Can be desk mounted or mounted under the counter with the supplied bracket
- Rubber feet prevent slipping

Features (OU-100)

- Volume control switch (hi/lo)
- Socket for optional gooseneck microphone
- Designed for desk mounting
- Can mount up to 6' away from the MU-100 via the supplied connector
- Rubber feet prevent slipping

Features (IME-100)

- Flexible neck
- Hands-free communication

Specifications (IMU-100)

- Power Source** 24V DC, 120mA standby, 780mA max. — use PS-2420UL
- Temperature Rating** 14°~140°F (-10°~60°C)
- Communication** Hands-free (VOX) or push-to-talk (simplex)
- Transmit output:** 3W 4Ω
- Receive output:** 1.5W 16Ω
- Headset** Φ 3.5mm plug
- Rated input:** 40mW or more
- Max. input:** 100mW or more
- Impedance:** 32Ω

External Speaker

- Rated input:** 3W or more—use SP-2570N
- Max. input:** 6W or more
- Impedance:** 4 to 8Ω

Wire Type

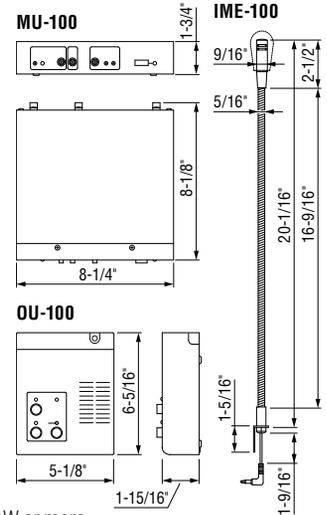
- Speaker Driver to Control Unit: 2 x 2-cond., overall shield—use Aiphone #822202 or #821802

Distance

- Speaker Driver to Control Unit: 66' (22 AWG/18 AWG)

Specifications (IME-100)

- Microphone** Condenser microphone, unidirectional
- Input Sensitivity** -46dB

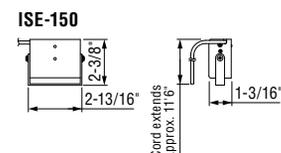


Proximity Sensor



Specifications

- Power Source** 24V DC—supplied by MU-100
- Material** Aluminum
- Wire** Aiphone #821802



Video Master Stations and PC Software



IX-MV7-HB-L
IP Video Master Station with T-Coil Supported Handset



IX-MV7-HW-JP®
TAA-Compliant IP Video Master Station with Handset



IX-MV7-HB®
IP Video Master Station with Handset
(included with IXS-HBDV box set—available soon)



IX-MV7-B®
IP Video Master Station



IX-MV7-W®
IP Video Master Station



Activate individual PCs using the USB dongle, available in bundles of one, three, five, and ten. For a centralized solution, use the multi-purpose adaptor for a single PC, a group of five PCs, or a group of ten PCs.



IX-SOFT
PC Master Station Software

IX-SOFT-3
PC Master Station Software
(bundle includes 3 USB dongles)

IX-SOFT-5
PC Master Station Software
(bundle includes 5 USB dongles)

IX-SOFT-10
PC Master Station Software
(bundle includes 10 USB dongles)



IXW-MA-SOFT
Multi-Purpose Adaptor with PC Master Station Software
(includes one IX-SOFT license)

IXW-MA-SOFT-5
Multi-Purpose Adaptor with PC Master Station Software
(includes five IX-SOFT licenses)

IXW-MA-SOFT-10
Multi-Purpose Adaptor with PC Master Station Software
(includes ten IX-SOFT licenses)

Features

- SIP compliant
- Video identification and monitoring with 7" LCD touchscreen
- 8 speed dial buttons
- Camera for two-way video calls, includes privacy shutter
- On-board recording with a microSD™ card (not included)
- Hands-free communication (IX-MV7-HB, IX-MV7-HB-L, and IX-MV7-HW-JP have a handset for privacy)
- Door release
- Brightness control
- Wall or desk mount (stand included)
- Connects using Cat-5e or Cat-6 wire
- Toggle between a close-up view and a CCTV camera view with picture-in-picture

Features

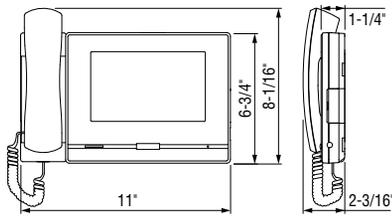
(additional for IX-SOFT)

- Interactive map is a visual, efficient way of selecting stations
- Feature-rich PC intercom helps to reclaim valuable desk space
- Device check and Line Supervision ensure the system will operate as expected
- Video conversations can easily be recorded
- Computer screen offers a larger viewing platform
- Up to 50 speed-dials can be programmed

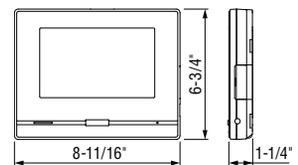
Specifications

Power Source	PoE (802.3af)
Network Interface	10 BASE-T/100 BASE-TX Ethernet (RJ-45)
Network Protocols	IPv4, IPv6, TCP, UDP, SIP, HTTP, HTTPS, RTSP, RTP, RTCP, IGMP, MLD, SMTP, SFTP, DHCP, NTP, DNS
Bandwidth Usage	Audio (G.722): 64Kbps x 2 for communication, 64Kbps for monitoring Video (H.264): 32Kbps-2,048Kbps
Video Stream	ONVIF® Profile S
Communication	IX-MV7-HB, IX-MV7-HB-L, IX-MV7-HW-JP: hands-free (full-duplex), push-to-talk (simplex), or handset (full-duplex) IX-MV7-B, IX-MV7-W: hands-free (full-duplex) or push-to-talk (simplex)
Video Display	IX-MV7-HB, IX-MV7-HB-L, IX-MV7-HW-JP, IX-MV7-B, IX-MV7-W: 7" LCD touchscreen
Door Release	IX-MV7-HB, IX-MV7-HB-L, IX-MV7-HW-JP, IX-MV7-B, IX-MV7-W: N/O dry contact, 24V AC/DC, 1A
Mounting	Wall or desk mount (stand included)
Wire Type	Cat-5e or Cat-6
Distance	Master Station to Network Node: 330'

IX-MV7-HB, IX-MV7-HB-L, IX-MV7-HW-JP



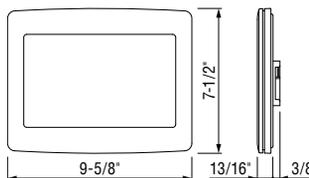
IX-MV7-B, IX-MV7-W



IX-SOFT USB Dongle Actual Size



IXW-MA-SOFT, IXW-MA-SOFT-5, IXW-MA-SOFT-10



Sub Stations



IX-RS-B®
Audio Room Sub
Station with Handset



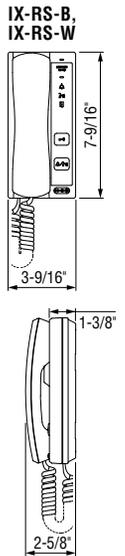
IX-RS-W®
Audio Room Sub
Station with Handset

Features

- SIP compliant
- Hands-free communication or handset for privacy
- Internal communication with other sub stations
- 8Ω, 2W external speaker output for communication or paging (use 8Ω tap on SP-2570N)
- Illuminated call button indicator
- Communication/call tone volume control switch
- One contact output
- One trigger input

Specifications

Power Source	PoE (802.3af)
Audio Codec	G.722 (μ-law, A law), G.722
Protocols	IPv4, IPv6, TCP, UDP, SIP, HTTP, HTTPS, RTSP, RTP, RTCP, IGMP, MLD, SMTP, SFTP, DHCP, NTP, DNS
Temperature Rating	32° ~ 104°F (0° ~ 40°C)
Mounting	Wall mount
Wire Type	Cat-5e or Cat-6
Distance	Master Station to Network Node: 330'



Adaptors



IXW-MA
Multi-Purpose Adaptor for IX Series



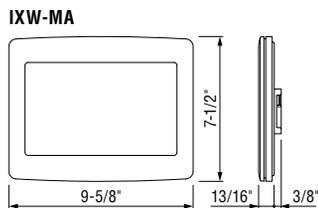
IXW-MAA
Multi-Purpose Adaptor for IX Series



IXW-PBXA
IP PBX for IX Series

Features (IXW-MA)

- Compatibility with IX Support Tool makes programming efficient—no need to program adaptors separately
- 10 outputs



Specifications (IXW-MA)

Power Source	PoE (802.3af)
Consumption	43mA standby, 135mA max.
Relay Output	Relays 1-4: Form C, 24V AC/DC, 500mA Relays 5-10: Form A, 24V AC/DC, 500mA
Network Interface	Ethernet (10BASE-T, 100BASE-TX)
Network Protocols	IPv4, IPv6, TCP, UDP, SIP, HTTP, HTTPS, SMTP, SFTP, DHCP, NTP, DNS
Encryption System	TLS1.2
Port Security	IEEE 802.1X
Temperature Rating	14° ~ 122°F (-10° ~ 50°C)

Features (IXW-MAA)

- 802.3af PoE
- Four contact inputs
- Ten Form C relay outputs
- 24V AC/DC 500mA relay contact rating
- Mountable to a 170mm DIN rail or directly to a wall

Specifications (IXW-MAA)

Power Source	PoE (IEEE 802.3af class 0)
Consumption	4.48W max.
Relay Output	10 Form C relays, 24V AC/DC 500mA
Network Interface	Ethernet (10BASE-T, 100BASE-TX)
Network Protocols	IPv4, IPv6, TCP, UDP, HTTP, HTTPS, SMTP, SFTP, DHCP, NTP, DNS
Port Security	IEEE 802.1X
Temperature Rating	14° ~ 122°F (-10° ~ 50°C)
Dimensions	4-1/4" H x 8-1/4" W x 2-3/8" D

Features (IXW-PBXA)

- Supports up to 500 registered SIP devices and up to 75 concurrent calls
- Dual Gigabit network ports with integrated PoE+
- Built-in call recording server; recordings accessed via web interface
- Supports H.264, H.263, and H.263+ video codecs

Specifications (IXW-PBXA)

Power Source	12V DC, 1.5A (supplied)
Network Interface	Dual Gigabit with integrated PoE+ (IEEE 802.3at)
Network Protocols	TCP/UDP/IP, RTP/RTCP, ICMP, ARP, DNS, DDNS, DHCP, NTP, TFTP, SSH, HTTP/HTTPS, PPPoE, SIP, STUN, SRTP, TLS, LDAP
Ports	2 FXO, 2 FXS
Encryption	SRTP, TLS, HTTPS, SSH, 802.1X
Temperature Rating	32° ~ 104°F (0° ~ 40°C)
Dimensions	1-7/16" H x 10-5/8" W x 6-7/8" D

Video Door Stations



IX-EA
IP Video Door Station



IX-DVM [®]
Mullion-Mount IP Video Door Station with Built-in Touchless Call Sensor



IX-DV [®]
IP Video Door Station (included with IXS-HBDV box set)



IX-DVF [®]
IP Video Door Station



IX-DVF-4A
IP Video Door Station with Four Call Buttons



IX-DVF-6
IP Video Door Station with Six Call Buttons



IX-DVF-L
IP Video Door Station with T-Coil Compatibility (requires PoE and 24V DC)



IX-DVF-HW
IP Video Door Station with Hand Wave Call Sensor and Surface Mount Box (requires PoE+)



IX-DVF-PR
Card Access IP Video Door Station (includes built-in 125 kHz Wiegand proximity reader)

Features

- SIP compliant
- On-board recording with a microSD™ card
- Camera provides clear video
- Weather and vandal resistant (IX-EA, IX-DVF-4A, and IX-DVF-6 are weather resistant only)
- Indoor or outdoor use
- Connects using Cat-5e or Cat-6 wire
- PoE passthrough can power additional device with IX-DV, IX-DVF, IX-DVF-4A, IX-DVF-6, IX-DVF-HW, IX-DVF-L (requires PoE+)

Specifications

Power Source IX-EA: PoE (802.3af)

IX-DV, IX-DVF, IX-DVF-4A, IX-DVF-6, IX-DVF-HW: PoE (802.3af), PoE+ (802.3at), or 24V DC—use PS-2420UL

Communication Hands-free

Camera IX-EA, IX-DV, IX-DVF, IX-DVF-4A, IX-DVF-6, IX-DVF-PR: 1/3" color CMOS 1.23 megapixel

IX-DVM: 0.9 megapixel/720p WDR camera

Area View: 2' 1" vertical x 3' 1" horizontal at 20"

Temperature Rating IX-EA, IX-DV, IX-DVM, IX-DVF, IX-DVF-4A, IX-DVF-6, IX-DVF-L: -40°~ 140°F (-40°~ 60°C)

IX-DVF-HW: -4°~ 131°F (-20°~ 55°C)

IX-DVF-PR: -31°~ 140°F (-35°~ 60°C)

Material IX-EA: self-extinguishing ABS resin

IX-DV, IX-DVM: aluminum die cast cover

IX-DVF, IX-DVF-4A, IX-DVF-6, IX-DVF-HW, IX-DVF-L, IX-DVF-PR: stainless steel

Door Release IX-DVM, IX-EA: Form C dry contact, 24V AC/DC, 1A

IX-DV, IX-DVF, IX-DVF-4A, IX-DVF-6, IX-DVF-L, IX-DVF-HW, IX-DVF-PR: two Form C dry contacts, 24V AC/DC, 1A

Mounting IX-DV, IX-DVM, IX-EA, IX-DVF-HW: surface mount

IX-DVF: flush mount with included back box or surface mount with SBX-IDVF

IX-DVF-L, IX-DVF-PR: flush mount with included back box or surface mount with SBX-IDVFRA

IX-DVF-4A, IX-DVF-6: flush mount with included back box or surface mount with SBX-IXGDM7

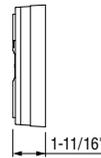
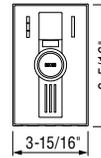
Wire Type Cat-5e or Cat-6

Distance Door Station to Network Node: 330'

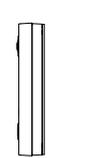
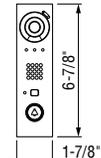
Door Station to Power Supply: 50'

IX-DVF-PR Card Reader 5-14V DC power input | 45mA power draw
125kHz frequency | CSA, FCC, CE, C-Tick certifications

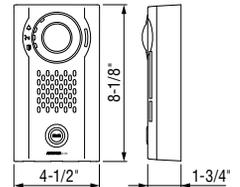
IX-EA



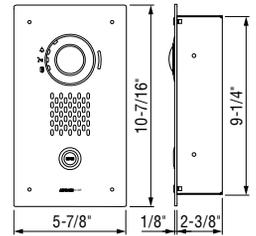
IX-DVM



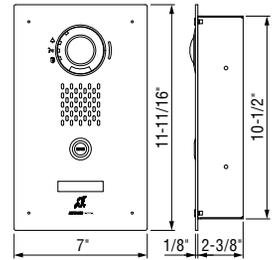
IX-DV



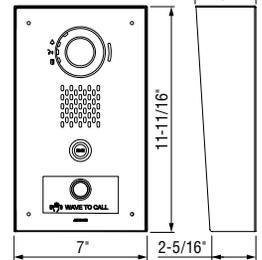
IX-DVF



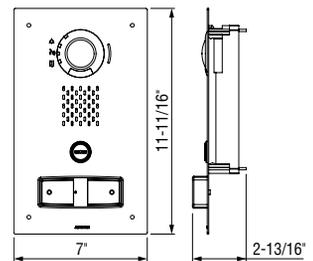
IX-DVF-L



IX-DVF-HW



IX-DVF-PR



Add-On Call Sensor



IXW-HWCBP
Hand Wave Call Sensor and Surface Mount Box

Features

- Weather resistant
- Includes the SBX-2G/A surface mount box and PS-POE splitter to power the sensor
- Powered from either a PoE network drop or from the LAN 2 output on an IX Series door station (requires PoE+ switch)
- Form C dry contact output can be connected to the trigger input of an IX Series door station
- Allows visitors to place a call without touching the call button on the door station
- Sensor is illuminated in blue while in standby and turns green when activated

Specifications

Power Source PoE (IEEE 802.3af class 0)

Power Draw 30mA standby, 50mA active

Sensor Type Infrared with LED ring

Detection Range 0-10 cm

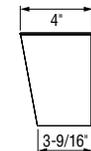
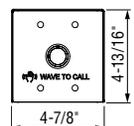
Temperature Rating -4°~ 131°F (-20°~ 55°C)

Material Stainless steel

Contact Rating 30V AC/DC, 3A

Mounting Surface mount with included SBX-2G/A

IXW-HWCBP



Audio Door Stations



IX-SS-2G®
IP Audio Door Station



IX-SSA®
IP Audio Door Station



IX-NVP
IP Audio Door Station



IX-NVP2
IP Audio Door Station
with Two Call Buttons

Stations are also available with French labels:

IX-DVF-2RA-FR®

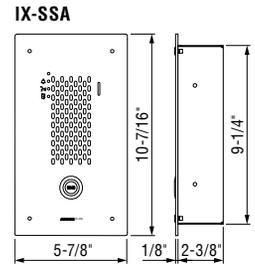
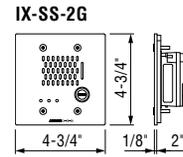
IX-DVF-RA-FR®

IX-SSA-2RA-FR

IX-SSA-RA-FR

Features

- SIP compliant
- Weather and vandal resistant
- Indoor or outdoor use
- Connects using Cat-5e or Cat-6 wire
- PoE passthrough can power additional device with IX-SSA (requires PoE+)
- On-board recording with a microSD™ card (IX-SSA only)



Specifications

Power Source IX-SS-2G, IX-NVP, IX-NVP2: PoE (802.3af)
IX-SSA: PoE (802.3af), PoE+ (802.3at) or 24V DC—use PS-2420UL

Communication Hands-free

Temperature Rating -40°~140°F (-40°~60°C)

Material IX-SS-2G, IX-SSA: stainless steel
IX-NVP, IX-NVP2: powder-coated steel

Door Release IX-SSA: two Form C dry contacts, 24V AC/DC, 1A

IX-SS-2G, IX-NVP, IX-NVP2: Form C dry contact, 24V AC/DC, 1A

Mounting IX-SS-2G: flush mount with 2-gang box or surface mount with SBX-2G/A

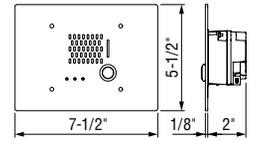
IX-SSA: flush mount with included back box or surface mount with SBX-IDVF

IX-NVP, IX-NVP2: flush mount with 3-gang back box or surface mount with SBX-NVP/A

Wire Type Cat-5e or Cat-6

Distance Door Station to Network Node: 330' | Door Station to Power Supply: 50'

IX-NVP, IX-NVP2



ADA Compliant Emergency Stations



IX-DVF-2RA®
ADA Compliant IP
Video Emergency Station
with Two Call Buttons



IX-DVF-RA®
ADA Compliant IP Video
Emergency Station



IX-SSA-2RA®
ADA Compliant IP Audio
Emergency Station
with Two Call Buttons

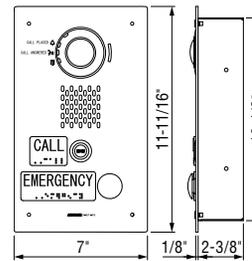


IX-SSA-RA®
ADA Compliant IP Audio
Emergency Station

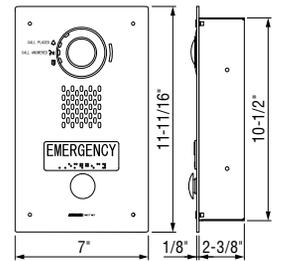
Features

- Passthrough can power additional device (requires PoE+)
- SIP compliant
- On-board recording with a microSD™ card
- Lettering and braille signage
- LED call status indicator
- Two Form C relay outputs
- Weather and vandal resistant
- Fixed camera provides clear video (IX-DVF-2RA, IX-DVF-RA)
- Indoor or outdoor use
- Connects using Cat-5e or Cat-6 wire
- Tamper resistant screws
- Can be mounted into emergency wall boxes or towers

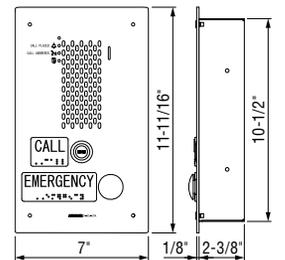
IX-DVF-2RA, IX-DVF-2RA-FR



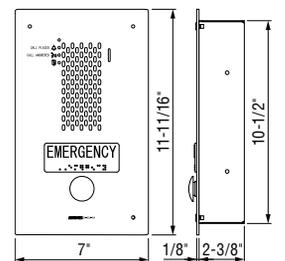
IX-DVF-RA, IX-DVF-RA-FR



IX-SSA-2RA, IX-SSA-2RA-FR



IX-SSA-RA, IX-SSA-RA-FR



Specifications

Power Source PoE (802.3af) or 24V DC—use PS-2420UL

Communication Hands-free

Camera Type: 1/3" color CMOS 1.2 megapixel
Area View: 2' 1" vertical x 3' 1" horizontal at 20'

Temperature Rating -40°~140°F (-40°~60°C)

Material Stainless steel

Door Release Two Form C dry contacts, 24V AC/DC, 1A

Mounting Flush mount with included back box or surface mount with SBX-IDVFR

Wire Type Cat-5e or Cat-6

Distance Emergency Station to Network Node: 330'
Door Station to Power Supply: 50'

Solar Tower Sets



TWS-Z4
Zone 4 Solar Tower Set
(includes one solar panel)

TWS-Z2 (not shown)
Zone 2 Solar Tower Set
(includes two solar panels)

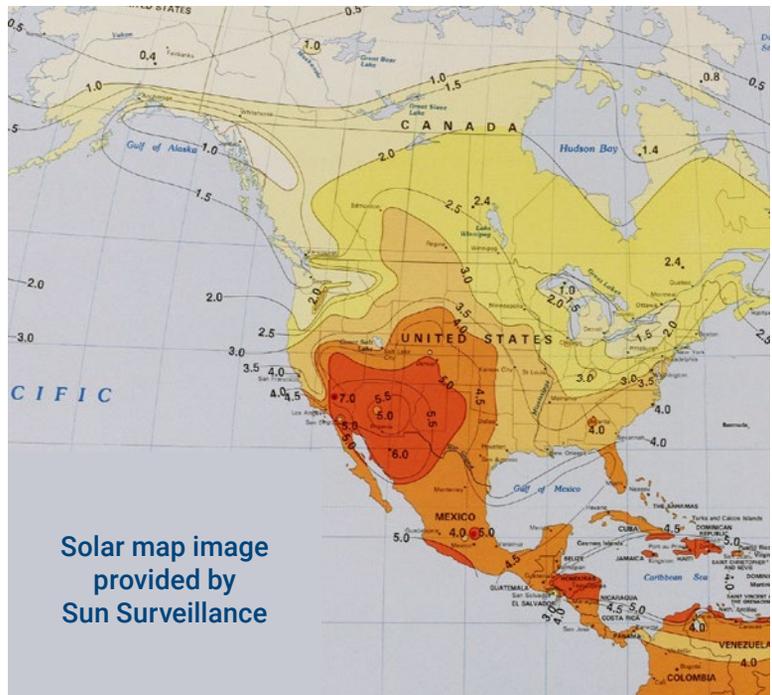
TWS-Z1 (not shown)
Zone 1 Solar Tower Set
(includes three solar panels)

Features

- Wireless solar solution uses the sun to power all components
- Pre-assembled sets include WB-HE wall box with mounting pole, battery and electrical enclosure, WiFi device, and one, two, or three solar panels (see solar map as a guideline to determine the model best suitable for a region based on its sun rating zone)
- TWS-Z1 with three panels is recommended for zones rated 1.0 to 1.9
- TWS-Z2 with two panels is recommended for zones rated 2.0 to 3.9
- TWS-Z4 with one panel is recommended for zones rated 4.0+
- TWS-Z4 and TWS-Z2 can be mounted above ground (TWS-Z1 requires underground mounting due to weight)

Specifications

- Power Source** 24V DC supplied from batteries
- Solar Panel** 160W 12V
- Wireless** Ubiquiti LoCo5AC 5GHz, 450+Mbps (requires line of sight for connectivity)
- Battery Bank** 12V DC 220AH
- Temperature Rating** -40°~140°F (-40°~60°C)
- Material** Aluminum tower with 5052 aircraft grade aluminum electrical enclosure
- Dimensions** Tower: 11' H x 6" W
Solar Panel: 26-1/2" H x 58-1/3" W x 1-3/8" D



Solar map image
provided by
Sun Surveillance

PoE Splitter for Tower and Wall Box Beacons



PS-POE
PoE Splitter

Features

- Powers beacon, eliminating the need of a separate power supply
- Avoid added wire—only one cable is needed from the PoE+ switch when wired with an IX Series emergency station
- Mounts directly to the back of an IX Series emergency call station or 1-gang box
- Can withstand temperatures ranging from -40 to 140° F

Specifications

- Power Source** PoE (803.2af)
- Consumption** 8.4W
- Output** 24V DC, 350mA
- Temperature Rating** -40°~140°F (-40°~60°C)
- Dimensions** 3-1/4" H x 2-1/2" W x 1" D

ADA Compliant Wall Boxes

UL LISTED Electrical Box



WB-CA (cage)
WB-HA (hood)
 ADA Compliant Wall Box with ASSISTANCE Lettering

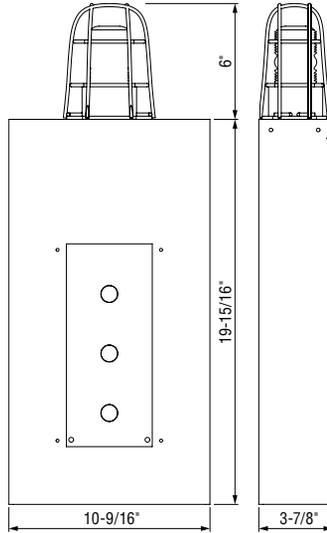
WB-CE (cage)
WB-HE (hood)
 ADA Compliant Wall Box with EMERGENCY Lettering

NOTE: Power required for the beacon—use PS-POE splitter to draw power from PoE+ network switch.

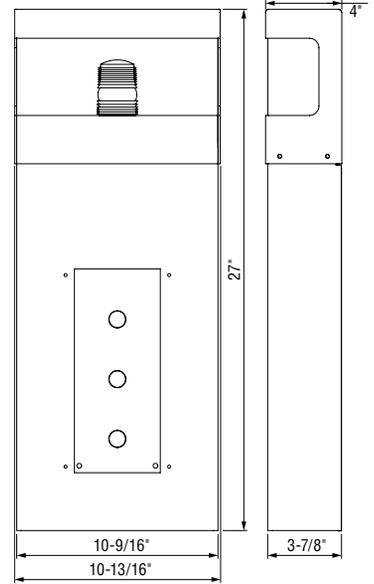
Features

- Includes UL Listed electrical box
- Made of 12-gauge stainless steel
- Beacon is always lit and strobes during emergency call-in
- Compatible with IX Series emergency stations
- ASSISTANCE or EMERGENCY lettering on two sides
- 4" depth and proper signage meet ADA requirements
- Interior bracket (right side) has 1-gang mounting pattern
- Built-in accessory mounting hardware with internal threads (female: M3 x .05, 1-gang spacing pattern)

WB-CA, WB-CE



WB-HA, WB-HE



All-in-One Aluminum Towers

UL LISTED Electrical Box



TW-SA
 One-Piece Aluminum Tower with ASSISTANCE Lettering

TW-SE
 One-Piece Aluminum Tower with EMERGENCY Lettering

TW-TA
 Tall One-Piece Aluminum Tower with ASSISTANCE Lettering

TW-TE
 Tall One-Piece Aluminum Tower with EMERGENCY Lettering

TW-TA-ARM
 Tall One-Piece Aluminum Tower with Camera Arm and ASSISTANCE Lettering

TW-TE-ARM
 Tall One-Piece Aluminum Tower with Camera Arm and EMERGENCY Lettering

Features

- Includes UL Listed electrical box
- Constructed with lightweight, durable aluminum
- Large access panel at the rear base of the tower
- ASSISTANCE or EMERGENCY lettering on three sides
- Beacon is always lit and strobes during emergency call-in (requires 24V DC)
- LED illumination above call station (requires 24V DC)
- Call button mounting height and signage meet ADA regulations

Specifications

- Material** Aluminum 6061-T6
- Dimensions** TW-SA, TW-SE: 73" H x 8" W x 8" D
 TW-TA, TW-TE: 112" H x 8" W x 8" D
 TW-SA-ARM, TW-SE-ARM: 174" H x 8" W x 15-3/4" D
- Weight** TW-SA, TW-SE: 43 lbs
 TW-TA, TW-TE: 68 lbs
 TW-SA-ARM, TW-SE-ARM: 80 lbs

Modular Towers

STEP 1 (required)

Choose modular tower size.



TW-20B/A
2-Module
Tower



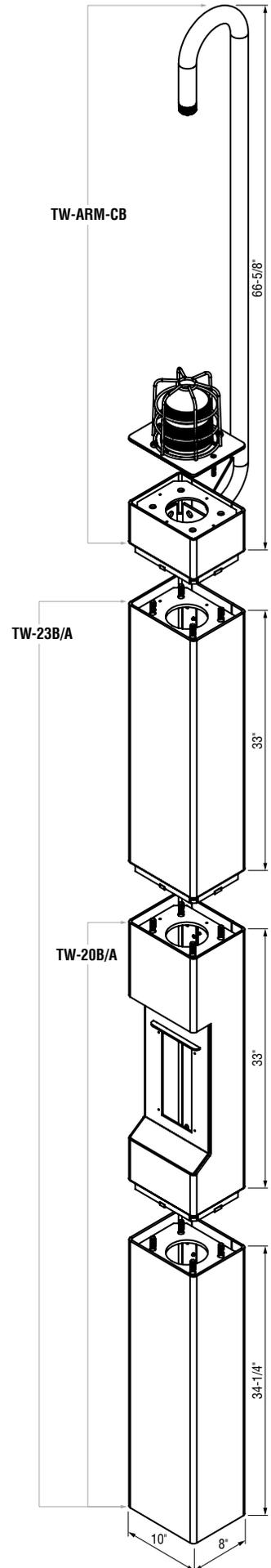
TW-23B/A
3-Module
Tower

UL LISTED
Electrical Box

- CCTV camera arm module with universal pipe threading (1.50" NPT threading x 1" long)
- Includes accessory mounting hardware with external threads (male: M3 x .05, 1-gang spacing pattern)
- Large access panel on each module

Features

- 1/4" zinc-treated steel with powder coating
- Modular design allows for installations where smaller segments are required to fit the space
- Two sizes available with choice of lettering, custom colors available upon request
- Compatible with any IX Series emergency station
- Beacon on top of tower and LED on front panel can share same power supply—use PS-POE with IX Series systems (requires PoE+)
- Beacon is always lit and strobes during emergency call-in
- Call button mounting height meets ADA regulations



CCTV Camera Arm for Modular Towers

STEP 2 (optional)

Add the optional CCTV camera arm. Skip this step if module is not required.



TW-ARM-CB
CCTV Camera Arm
Module for Tower

NOTE: The CCTV camera arm module is only compatible with new tower modules that have the 'A' in the model name.

Cap for Modular Towers

STEP 3 (required)

Add the required top plate.



TW-LCB
Top Plate with Caged Beacon
(strobes during emergency call-in)

Lettering Options for Modular Towers

STEP 4 (required)

Choose ASSISTANCE or EMERGENCY lettering. Refer to chart for applicable lettering quantities.

TW-ASW
White ASSISTANCE
Lettering

TW-EMW
White EMERGENCY
Lettering

Lettering Order Quantities

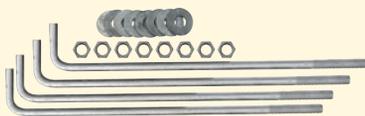
	TW-20B/A 2-Module Tower	TW-23B/A 3-Module Tower
All 4 Sides	/	Order qty of 4
3 Sides Left, Right, and Front	/	Order qty of 3
3 Sides Left, Right, and Back	Order qty of 3	Order qty of 3
2 Sides Left and Right	Order qty of 2	Order qty of 2
1 Side Left, Right, or Back	Order qty of 1	Order qty of 1
No Lettering	N/A	N/A

NOTE: All lettering is applied to the tower at the factory.

Mounting Kit for Modular Towers

STEP 5 (recommended)

Add a mounting kit for tower installation. Aiphone's TW-MKL is recommended.



TW-MKL
L-Bolt Mounting Kit for Modular Towers
(can also be used to install the all-in-one aluminum towers)

Power Supply

STEP 6 (recommended)

Add power for the beacon and LED illuminator lights. Aiphone's PS-POE and PS-2420UL are recommended.



PS-POE
PoE Splitter
→ p. 92

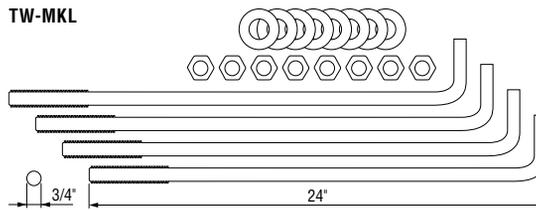


PS-2420UL
24V DC, 2A
Power Supply
→ p. 119

NOTE: Power required for the beacon—use PS-POE splitter to draw power from PoE+ network switch.

Mounting Kit for Modular Towers

TW-MKL



Does your project require customized solutions? Contact Aiphone's Technical Support to learn about custom color and lettering options.

800.692.0200



Entrance Station



NEW

IXG-DM7-HIDA
IP Video Entrance Station with HID® Card Reader (requires a third-party host and additional wire to power card reader)



IXG-DM7-BOX
Flush Mount Back Box for IXG-DM7-HIDA

Features (IXG-DM7-HIDA)

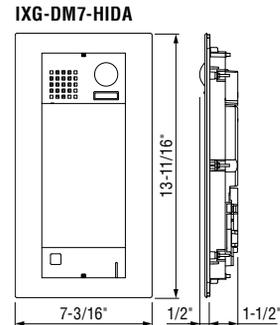
- Built-in HID® reader connects to third-party access control
- LCD directory screen
- Welcome screen can be customized
- Up to 9,999 names/numbers can be stored
- Motion sensor activates the screen when a visitor approaches
- Hands-free communication
- Rugged IP65 and IK08 ratings
- Modern and simple user touchscreen interface
- Programmable inputs and outputs
- On-board recording with a microSD™ card (not included)

Features (IXG-DM7-BOX)

- Steel construction
- Six conduit knockouts
- Sold separately for pre-installation convenience

Specifications (IXG-DM7-HIDA)

- Power Source** PoE (IEEE 802.3af Class 0)
- Consumption** 5.3W standby, 11.6W max.
- Video Display** 7" TFT LCD touchscreen (800 x 400 resolution)
- Communication** Hands-free (full-duplex)
- Camera** 720p HD
- Audio Codec** G.711 (μ-law, A-law)
- Video Codec** H.264
- Protocol** IPv4/v6, TCP, UDP, SIP, HTTP, HTTPS, RTSP, RTP/RTCP, IGMP, MLD, SMTP, SFTP, DHCP, NTP, DNS, TLS
- Temperature Rating** -22° ~ 140°F (-30° ~ 60°C)
- HID® Reader** High Frequency (13.56MHz): iCLASS, SEOS, iCLASS SR, iCLASS SE, MIFARE Classic, MIFARE DES Fire EV1
Low Frequency (125kHz): HID® Proximity
Bluetooth Interface (2.44GHz): mobile phone with compatible bluetooth
- Material** Stainless steel
- Door Release** Two programmable Form C dry contacts, 24V AC/DC
Relay 1: 3A
Relay 2: 500mA
- Mounting** Flush mount with IXG-DM7-BOX or surface mount with SBX-IXGDM7
- Wire Type** Cat-5e or Cat-6
- Distance** Entrance Station, Tenant Station, or Guard Station to Network Node: 330'



Guard Station



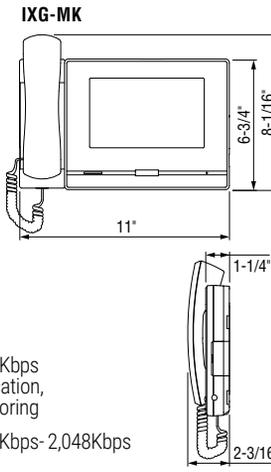
IXG-MK®
IP Video Guard Station

Features

- Two-way video with privacy shutter
- Programmable inputs and outputs
- On-board recording with a microSD™ card (not included)
- Video identification and monitoring
- Hands-free communication with a handset for privacy
- Door release
- Brightness control
- Connects using Cat-5e or Cat-6 wire
- Built-in camera provides two-way video communication with entrance station or guard station, includes privacy shutter
- Toggle between a close-up view and a CCTV camera view with picture-in-picture

Specifications

- Power Source** PoE (802.3af)
- Network Interface** 10 BASE-T/100 BASE-TX Ethernet (RJ-45)
- Network Protocols** IPv4, IPv6, TCP, UDP, SIP, HTTP, HTTPS, RTSP, RTP, RTCP, IGMP, MLD, SMTP, SFTP, DHCP, NTP, DNS
- Bandwidth Usage** Audio (G.722): 64Kbps x 2 for communication, 64Kbps for monitoring
Video (H.264): 32Kbps-2,048Kbps
- Video Stream** ONVIF® Profile S
- Communication** Hands-free (full-duplex), push-to-talk (simplex), or handset (full-duplex)
- Video Display** 7" LCD touchscreen
- Door Release** N/O dry contact, 24V AC/DC, 1A
- Mounting** Wall or desk mount (stand included)
- Wire Type** Cat-5e or Cat-6
- Distance** Master Station to Network Node: 330'



Tenant Station



IXG-2C7-L
IP Video
Tenant Station
with T-Coil
Compatibility



IXG-2C7®
IP Video
Tenant Station



IXG-FMK-2C7
Flush Mount
Kit for IXG-2C7

Features (IXG-2C7-L, IXG-2C7)

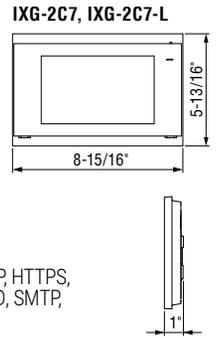
- Programmable inputs and outputs
- On-board recording with a microSD™ card (not included)
- Internal communication with up to eight stations within apartment/suite
- Hands-free communication
- Can call concierge/guard station directly
- Can call elevator to floor
- Video monitoring
- Answers calls from an entrance station, guard station, or individual door station
- Selectively call other IXG-2C7s or IXG-2C7-Ls in the same apartment/suite
- Call all associated mobile apps connected to the same apartment/suite

Features (IXG-FMK-2C7)

- Provides ability to flush mount IXG-2C7 or IXG-2C7-L directly into the wall
- Includes mounting hardware

Specifications (IXG-2C7, IXG-2C7-L)

- Power Source** PoE
- Consumption** 1.9W standby, 5.9W max.
- Video Display** 7" TFT LCD touchscreen (800 x 400 resolution)
- Communication** Hands-free (full-duplex)
- Audio Codec** G.711 (μ-law, A-law)
- Video Codec** H.264, MJPEG
- Protocol** IPv4/v6, TCP, UDP, SIP, HTTP, HTTPS, RTSP, RTP/RTCP, IGMP, MLD, SMTP, SFTP, DHCP, NTP, DNS, TLS
- Encryption** TLS 1.2
- Temperature Rating** 32° ~ 104°F (0° ~ 40°C)
- Material** Stainless steel
- Door Release** Two Form C dry contacts, 24V AC/DC, 1A
- Mounting** Flush mount with IXG-FMK-2C7 or surface mount to wall
- Wire Type** Cat-5e or Cat-6
- Distance** Tenant Station to Network Node: 330'



Specifications (IXG-FMK-2C7)

- Mounting** Flush mount
- Materials** Panel: self-extinguishing resin
Frame and Back Box: Self-extinguishing plastic

Adaptors



IXGW-GW®
IXG Series Mobile
App Gateway
Adaptor
(required for
AIPHONE)



IXG App—service fee will apply)

NOTE: Monthly and annual mobile app subscription plans require the purchase of the IXGW-GW first and then the licenses are registered via PayPal®. Lifetime plans already include the IXGW-GW with prepaid licenses, which are purchased through Aiphone distribution partners.

See the table below for the lifetime subscription plans.

United States	Canada
IXGW-GW-10	IXGW-GW-10C
IXGW-GW-25	IXGW-GW-25C
IXGW-GW-50	IXGW-GW-50C
IXGW-GW-75	IXGW-GW-75C
IXGW-GW-100	IXGW-GW-100C
IXGW-GW-150	IXGW-GW-150C
IXGW-GW-200	IXGW-GW-200C
IXGW-GW-250	IXGW-GW-250C
IXGW-GW-300	IXGW-GW-300C
IXGW-GW-350	IXGW-GW-350C
IXGW-GW-400	IXGW-GW-400C
IXGW-GW-450	IXGW-GW-450C
IXGW-GW-500	IXGW-GW-500C



IXGW-LC®
Elevator Lift
Control Adaptor



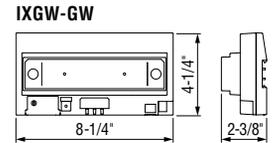
IXGW-LC-RY20
Elevator Lift Control
and Relay Adaptor

Features (IXGW-GW)

- iOS® or Android®
- Up to eight mobile apps per tenant
- One adaptor per system
- DIN Rail mountable
- Eight simultaneous call paths
- Supports up to 9,999 IXG Series mobile apps

Specifications (IXGW-GW)

- Power Source** PoE
- Consumption** 2.4W standby, 2.9W max.
- LAN** Ethernet (10BASE-T, 100BASE-TX)
- Bandwidth Usage** 2Mbps minimum upload
- Packet Delivery** Unicast, Multicast
- Protocol** IPv4/v6, TCP, UDP, SIP, HTTPS, RTP, RTCP, SRTP, SRTPC, IGMP, MLD, SFTP, DHCP, NTP, DNS, MQTT, ICE, DTLS, SDP
- Encryption** TLS 1.2
- Temperature Rating** 14° ~ 122°F (-10° ~ 50°C)
- Wire Type** Cat-5e or Cat-6
- Distance** Adaptor to Network Node: 330'

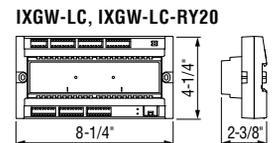


Features (IXGW-LC, IXGW-LC-RY20)

- 20 Form C relays, each can be configured and assigned to a specific entrance station, tenant station, or mobile app
- Ensures visitors only have access to the proper guest floor
- Up to 16 adaptors per building
- Compatible with IXG-DM7-HIDA and IXG-2C7
- Wall mount with DIN rail (sold separately)

Specifications (IXGW-LC, IXGW-LC-RY20)

- Power Source** PoE
- Consumption** 2.1W standby, 4.4W max.
- Relay Rating** 24V AC/DC, 500mA
- LAN** Ethernet (10BASE-T, 100BASE-TX)
- Packet Delivery** Unicast, Multicast
- Protocol** IPv4/v6, TCP, UDP, HTTPS, IGMP, MLD, SFTP, DHCP, NTP, DNS, TLS
- Encryption** TLS 1.2
- Temperature Rating** 14° ~ 122°F (-10° ~ 50°C)
- Distance** Adaptor to Network Node: 330'



Video Master and Expansion Stations



JO-1MDW
App-Compatible Video Master Station
(included with JOS-1AW, JOS-1VW, and JOS-1FW box sets—also sold separately)



JO-1FD
Video Expansion Station

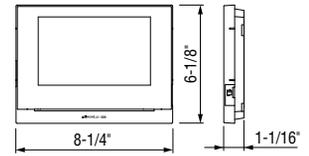
Features

- Video identification and monitoring
- Slim design
- Hands-free communication or push-to-talk
- JO-1MDW allows up to eight free mobile apps

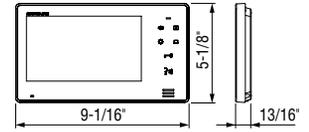
Specifications

- Power Source** 18V DC—use PS-1820UL
- Communication** Hands-free (VOX) or push-to-talk (simplex)
- Video Display** JO-1MDW: 7" LCD touchscreen
JO-1FD: 7" LCD screen
- Picture Memory** Internal/Built-In: record ten calls max. (ten seconds per call) with up to five calls protected from overwriting
SD/SDHC card: record max. 1,000 calls (10 seconds per call) with up to 100 calls protected from overwriting
- Door Release** JO-1MDW: N/O dry contact, 24V AC/DC, 1A
JO-1FD: N/O dry contact, 24V AC/DC, 500mA
- Network Interface** WiFi
- Wireless Frequency** 2.4GHz
- Wireless Protocols** 802.11b/g/n
- Mounting** Surface mount directly to wall or desk mount using MCW-S/B
- Wire Type** Door Station to Master Station: 2-cond., mid cap, solid, non-shielded—use Aiphone #871802
Door Station to Expansion Station: 2-cond., mid cap, solid, non-shielded—use Aiphone #871802
Expansion Station to Master Station: 4-cond., mid cap, solid, non-shielded—use Aiphone #871804
Expansion Station to Master Station with door release: 6-cond., mid cap, solid, non-shielded—use Aiphone #871804 + #871802
- Distance** Door Station to Master Station: 165' (22 AWG) 330' (18 AWG)
Door Station to Expansion Station: 165' (22 AWG) 330' (18 AWG)
Expansion Station to Master Station: 165' (22 AWG) 330' (18 AWG)
Power Supply to Master Station: 16' (22 AWG) 33' (18 AWG)

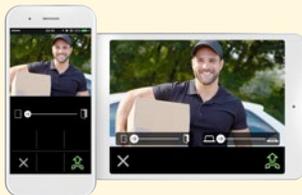
JO-1MDW



JO-1FD



Mobile App



Intercom App Type B
JO Series Mobile App
(requires JO-1MDW and 2.4GHz WiFi connection)

Features

- Calls can be answered and doors can be unlocked from virtually anywhere
- Up to eight free mobile apps can be downloaded per system
- Provides ability to activate the video door station camera to monitor entry from a remote location
- Recorded calls can be viewed directly from a smartphone or tablet
- In-app door release slider prevents accidental unlocking
- Hands-free or push-to-talk communication
- Works with a variety of smartphones and tablets
- Available on Google Play™ (Google Play is a trademark of Google LLC.)
- Available on the App Store™ (App Store is a service mark of Apple Inc.)

Specifications

- Capacity** Up to eight mobile apps per JO Series system
- Door Release** In-app slider activates dry contacts on JO-1MDW
- Requirements** One JO-1MDW
- Network Protocols** IPv4, TCP, UDP, SIP, RTP, RTCP, IGMP, DHCP
- Bandwidth Usage** 1.3MBs upload and download minimum
- Operating System** Android™
Apple® iOS
- Communication** Hands-free (VOX), push-to-talk (simplex)

Two-Door Station Adaptor



JOW-2D
Two-Door Station Adaptor

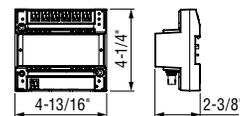
Features

- Allows a second door station to be connected to any JO Series system
- Can be added to existing systems for upgrade opportunities
- Selective door release is routed to the door station where communication is established

Specifications

- Power Source** 18V DC (supplied by JO Series master station)
- Consumption** 18mA standby, 100mA max.
- Relay Outputs** JO-1MDW: 24V DC, 1A
JO-1FD: 24V DC, 500mA
- Temperature Rating** 32°~104°F (0°~ 40°C)

JOW-2D



Video Door Stations



JO-DA
Video Door Station
(included with JOS-1AW box set—
not sold separately)



JO-DV
Video Door Station
(included with JOS-1VW box set—
also sold separately)



JO-DVF
Video Door Station
(included with JOS-1FW box set—
not sold separately)

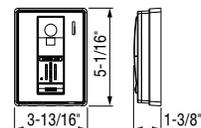
Features

- Fixed camera provides clear video
- LED illumination automatically turns on in low light conditions
- Weather resistant
- JO-DA has LED backlit call button
- JO-DV and JO-DVF have an LED backlit nameplate
- JO-DV and JO-DVF are vandal resistant
- JO-DV is compatible with GT-MKB-N video guard station

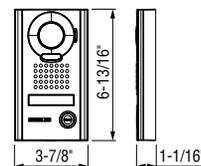
Specifications

- Power Source** Supplied by Master Station or Expansion Station
- Communication** Hands-free
- Camera** Type: 1/4" CMOS
View Area: 2"1" vertical x 3"1" horizontal at 20°
- Temperature Rating** -4°~ 140°F (-20°~ 60°C)
- Material** JO-DA: fire resistant PC + ABS plastic
JO-DV: zinc die cast
JO-DVF: stainless steel
- Mounting** JO-DA: surface mount directly to wall or 1-gang box
JO-DV: surface mount directly to wall
JO-DVF: flush mount with included back box or surface mount with SBX-DVF
- Wire Type** Door Station to Master Station or Expansion Station: 2-cond., low cap, non-shielded—use Aiphone #871802
- Distance** Door Station to Master Station or Expansion Station: 330' (18 AWG)

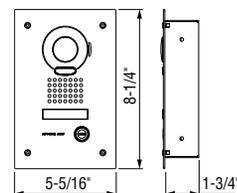
JO-DA



JO-DV



JO-DVF



Video Master and Sub Master Stations



JP-4MED
Video Master Station
with Handset
(included with
all JPS box sets)



JP-4HD
Video Sub
Master Station
with Handset

Features

- Video identification and monitoring with 7" touchscreen
- Hands-free communication with handset for privacy
- Door release button
- Optional service button
- PTZ and brightness control
- Eight selectable call tones
- Station partitioning with security code
- All Call to inside stations
- Door monitoring
- Continuous room monitoring

Features (additional for JP-4MED)

- Camera position and zoom can be set for call-in
- Video out via supplied connector
- Picture Memory
- Security inputs for alerting stations
- Removable media storage (memory card not included)

Specifications

Power Source 24V DC—use PS-2420UL

Consumption Max. 340mA

Communication Hands-free (VOX) or handset (full-duplex)

Video Display 7" LCD touchscreen

Picture Memory Internal/Built-In: record max. 20 calls (6 images per call) with up to 5 calls protected from overwriting

SD/SDHC card: record max. 1,000 calls (40 images per call) with up to 100 calls protected from overwriting

Door Release N/O dry contact, 24V AC/DC, 500mA (use RY-1824L for larger contact rating and use RY-3DL for three or four doors)

Mounting Surface mount directly to wall or 1-gang box or desk mount using MCW-S/B

Wire Type Door Station to Master Station: 2-cond., mid cap, solid, non-shielded—use Aiphone #871802

Power Supply to Master Station: 2-cond., mid cap, solid, non-shielded—use Aiphone #871802

Master Station to Adaptor: Cat-5e or Cat-6

Adaptor to Sub Master Station: Cat-5e or Cat-6

Distance Door Station to Master Station: 330'

Master Station to Distribution Adaptor: 650'

Distribution Adaptor to Sub Master Station: 165'

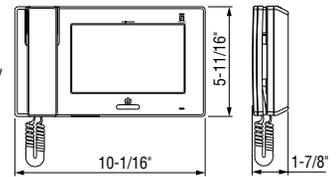
Long Distance/CCTV Adaptor to Master Station: 330'

Total Cumulative Between Inside Stations: 980'

Power Supply to Master Station: 16' (22 AWG) 33' (18 AWG)

Power Supply to Distribution Adaptor: 16' (22 AWG) 33' (18 AWG)

JP-4MED, JP-4HD



Long Distance/CCTV and Distribution Adaptors



JPW-BA
Long Distance/
CCTV Adaptor for
Door Stations



JP-8Z
Distribution Adaptor
for Video Sub
Master Stations
(only required for
homerun wiring methods)

Features

- Extends wiring distance from door stations to master stations up to 980' max.
- Allows for analog camera integration
- Allows for homerun wiring method (JP-8Z)

Specifications

Power Source 24V DC—use PS-2420UL

Capacity JPW-BA: one adaptor unit for each video door/sub master station located beyond the standard specified wire distance

JP-8Z: up to seven video sub master stations

Mounting DIN rail (included)

Wire Type JPW-BA: 2-cond., low cap, PE, solid, non-shielded—use Aiphone #871802

JP-8Z: Cat-5e

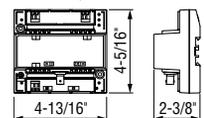
Distance JPW-BA to Door Station: 650'

JPW-BA to Master Station: 330'

JP-8Z to Master Station: 650'

JP-8Z to Sub Master Station: 165'

JPW-BA, JP-8Z



Video Door Stations



JP-DA
Video Door Station
(included with JPS-4AED box set)



JP-DV
Video Door Station
(included with JPS-4AEDV box set)



JP-DVF
Video Door Station
(included with JPS-4AEDF box set)



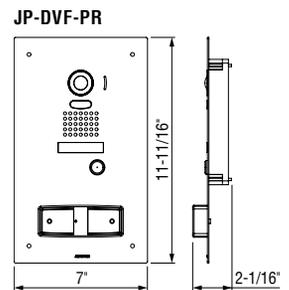
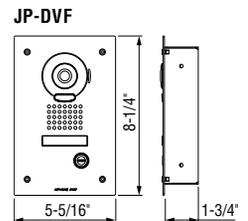
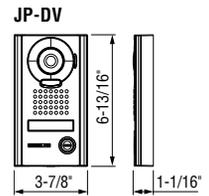
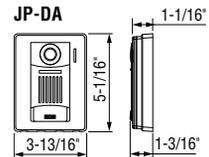
JP-DVF-PR
Card Access Video Door Station
(includes built-in 125 kHz Wiegand proximity reader)

Features

- Digital PTZ camera provides clear video
- LED illumination automatically turns on in low light conditions
- Weather resistant
- JP-DV, JP-DVF, and JP-DVF-PR are vandal resistant
- JP-DA has an LED backlit call button
- JP-DV, JP-DVF, and JP-DVF-PR have an LED backlit nameplate
- JP-DVF-PR has built-in 125 kHz Wiegand proximity reader designed for single-gang and mullion mounting

Specifications

- Power Source** Supplied by Master Station
- Communication** Hands-free
- Camera** Type: 1/4" CMOS
View Area: 100° vertical x 170° horizontal
- Temperature Rating** JP-DA, JP-DV, JP-DVF: -14°~ 140°F (-10°~ 60°C)
JP-DVF-PR: -4°~ 140°F (-10°~ 60°C)
- Material** JP-DA: fire resistant PC + ABS plastic
JP-DV: zinc die cast
JP-DVF, JP-DVF-PR: stainless steel
- Mounting** JP-DA: surface mount directly to wall or 1-gang box
JP-DV: surface mount directly to wall
JP-DVF: flush mount with included back box or surface mount with SBX-DVF
JP-DVF-PR: flush mount with included back box or surface mount with SBX-IDVFRA
- Wire Type** Door Station to Master Station: 2-cond., low cap, non-shielded – use Aiphone #871802
- Distance** Door Station to Master Station: 330'
Door Station to Long Distance/ CCTV Adaptor: 650'
- JP-DVF-PR Card Reader** 5–14V DC power input
45mA power draw
125kHz frequency
CSA, FCC, CE, C-Tick certifications



Audio Door Station



GT-D
→ p. 82

Features

→ p. 82

Specifications

→ p. 82

Video Master and Expansion Stations



JV-1MD
Video Master Station
(included with JVS-1A and JVS-1F box sets—not sold separately)



JV-1FD
Video Expansion Station

Features

- Video identification and monitoring
- Slim design
- Hands-free communication or push-to-talk

Specifications

- Power Source** 24V DC—use PS-2420UL
- Communication** Hands-free (VOX) or push-to-talk (simplex)
- Video Display** 7" LCD screen
- Picture Memory** Internal/Built-In: record ten calls max. (ten seconds per call) with up to five calls protected from overwriting
SD/SDHC card: record max. 1,000 calls (10 seconds per call) with up to 100 calls protected from overwriting
- Door Release** N/O dry contact, 24V AC/ DC, 1A
- Mounting** Surface mount directly to wall or desk mount using MCW-S/B
- Wire Type** Door Station to Master Station: 2-cond., mid cap, solid, non-shielded—use Aiphone #871802
Door Station to Expansion Station: 2-cond., mid cap, solid, non-shielded—use Aiphone #871802
Expansion Station to Master Station: 4-cond., mid cap, solid, non-shielded—use Aiphone #871804
Expansion Station to Master Station with door release: 6-cond., mid cap, solid, non-shielded—use Aiphone #871804 + #871802
- Distance** Door Station to Master Station: 165' (22 AWG) 330' (18 AWG)
Door Station to Expansion Station: 165' (22 AWG) 330' (18 AWG)
Expansion Station to Master Station: 165' (22 AWG) 330' (18 AWG)
Power Supply to Master Station: 16' (22 AWG) 33' (18 AWG)
- Dimensions** 5-1/8" H x 9-1/16" W x 13/16" D

Video Door Stations



JV-DV
Video Door Station
(included with JVS-1V box set—not sold separately)



JV-DVF
Video Door Station
(included with JVS-1F box set—not sold separately)

Features

- Fixed camera provides clear video
- LED illumination automatically turns on in low light conditions
- Weather and vandal resistant
- Backlit call button
- LED backlit nameplate

Specifications

- Power Source** Supplied by Master Station or Expansion Station
- Communication** Hands-free
- Camera** Type: 1/4" CMOS
View Area: 2'1" vertical x 3'1" horizontal at 20"
- Door Release** Door Station Output: N/O dry contact, 24V AC/ DC, 1A
Second Door Station Output: N/O wet contact, 500 mA or less, 12V DC
Door Station Input: request to exit, N/O dry contact
- Temperature Rating** -4°~ 140°F (-20°~ 60°C)
- Material** JV-DV: zinc die cast
JV-DVF: stainless steel
- Mounting** JV-DV: surface mount directly to wall
JV-DVF: flush mount with included back box or surface mount with SBX-DVF
- Wire Type** Door Station to Master Station or Expansion Station: 2-cond., low cap, non-shielded—use Aiphone #871802
- Distance** Door Station to Master Station or Expansion Station: 330' (18 AWG)
- Dimensions** JV-DV: 6-11/16" H x 3-3/16" W x 15/16" D
JV-DVF: 8-1/4" H x 5-5/16" W

Video and Audio Master Stations



KB-3MRD
Video Master Station with Handset



KB-3HRD
Video Sub Master Station with Handset



KB-3SD
Audio Sub Master Station with Handset

Features

- Handset for privacy
- All Call
- Chime and receiver volume control
- Optional selective door release with RY-3DL
- Two-way communication between inside stations

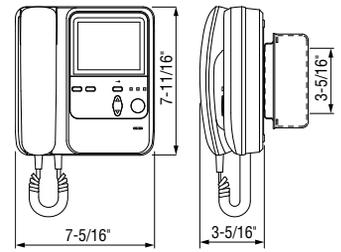
Features (additional for KB-3MRD, KB-3HRD)

- Analog video out via supplied connector (KB-3MRD only)
- Video identification and monitoring with 4" screen
- Instant voice call-in with image
- Built-in illumination for low light conditions
- Selective Call

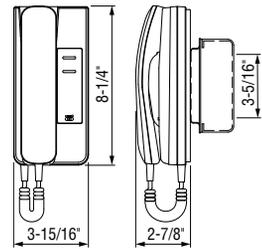
Specifications

- Power Source** 24V DC—use PS-2420UL
- Communication** Handset (full-duplex)
- Video Display** KB-3MRD, KB-3HRD: 4" LCD screen
KB-3SD: N/A
- Door Release** N/O dry contact, 12V AC, 400mA (use RY-1824L for larger contact rating or RY-3DL for two or three doors)
- Mounting** Surface mount directly to wall or desk mount using MCW-S/B
- Wire Type** 2-cond., mid cap, solid, non-shielded—use Aiphone #871802
- Distance** Master Station to Door Station: 330' (22 AWG) 650' (18 AWG)
Master Station to farthest Sub Master Station: 165' (22 AWG) 330' (18 AWG)
Power Supply to Master Station or Sub Master Station: 16' (22 AWG) 33' (18 AWG)

KB-3MRD, KB-3HRD



KB-3SD



Video Door Stations



KB-DAR
Video Door Station



KB-DAR-M
Video Door Station

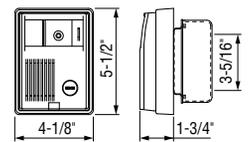
Features

- Tilt controlled camera
- Locator LED backlit on CALL button
- LED illumination automatically turns on in low light conditions
- Weather resistant
- KB-DAR-M has a motion detector interface

Specifications

- Power Source** Supplied by Master Station
- Communication** Hands-free
- Camera** Type: 1/4" CCD
View Area: 3' 8" – 7' 1" vertical x 2' horizontal at 20°
- Temperature Rating** 14° ~ 140°F (-10° ~ 60°C)
- Material** Fire resistant ABS plastic
- Mounting** Surface mount directly to wall or 1-gang box
- Wire Type** Door Station to Master Station: 2-cond., low cap, non-shielded—use Aiphone #871802
- Distance** Door Station to Master Station: 330' (22 AWG) 650' (18 AWG)

KB-DAR, KB-DAR-M



Housing Panel for KB-DAR and KB-DAR-M



KA-DGR
Surface Mount Housing Panel for KB-DAR or KB-DAR-M

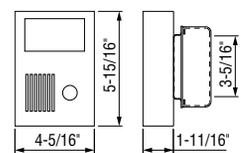
Features

- Stainless steel construction
- Weather resistant for outdoor use
- Can be added to any existing KB-DAR or KB-DAR-M video door station

Specifications

- Material** Stainless steel
- Mounting** Surface mount directly to wall

KA-DGR



Audio Door Stations



AX-DM
→ p. 77



IF-DA
→ p. 86



IE-JA
→ p. 86



IE-SS/A
→ p. 86



IE-SSR
→ p. 86

Features (AX-DM)

→ p. 77

Features (IE Series Door Stations)

→ p. 86

Specifications (AX-DM)

→ p. 77

Specifications (IE Series Door Stations)

→ p. 86

Audio Master Stations



LEF-3
3-Call Audio Master Station



LEF-3L
3-Call Audio Master Station with Door Release



LEF-3C
3-Call Audio Master Station with All Call (requires BG-10C)



LEF-5
5-Call Audio Master Station with Door Release



LEF-5C
5-Call Audio Master Station with Door Release and All Call (requires BG-10C)



LEF-10
10-Call Audio Master Station with Door Release



LEF-10S
10-Call Audio Master Station with Door Release and All Call (requires BG-10C)



LEF-10C
10-Call Audio Master Station with Door Release and All Call (requires BG-10C)

NOTE: Compatible paging adaptor (p. 118) for third-party speakers is located in the Paging Accessories section.

Features

- Mix and match a variety of stations
- Complements CCTV system
- Push-to-talk communication
- LED and call-tone indicators
- Selective Call and optional All Call

Specifications

Power Source 12V DC—use PS-1208UL (use PS-1225UL if installing BG-10C)

Consumption 300mA

Output 800mW

Communication Push-to-talk (simplex)

Door Release N/O dry contact, 24V DC, 1A—use one RY-PA per door being released

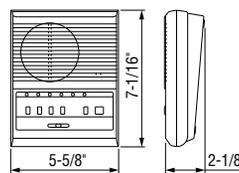
Mounting LEF-3, LEF-3L, LEF-5, LEF-10, LEF-10S: surface mount directly to wall or desk mount

LEF-3C, LEF-5C, LEF-10C: semi-flush mount into wall or desk mount

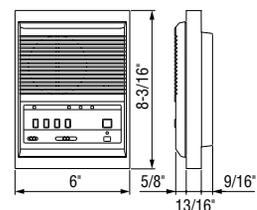
Wire Type Variable wire types—see table on page 54

Distance Sub Station to farthest Master Station: 650' (22 AWG) 1,600' (18 AWG)

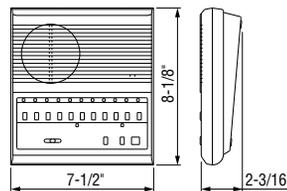
LEF-3, LEF-3L



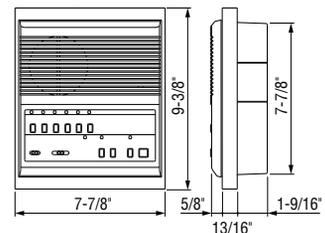
LEF-3C



LEF-5, LEF-10, LEF-10S



LEF-5C, LEF-10C



Audio Sub Master and Sub Stations



LE-A
Audio Sub Station



LE-AN
Audio Sub Station with Privacy



LE-B
Audio Sub Station



LE-BN
Audio Sub Station with Privacy

Features

- Provides internal communication to master stations

Specifications

Power Source Supplied by Master Station

Communication Push-to-talk (simplex)

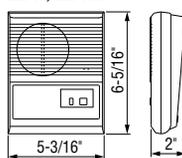
Mounting LE-A, LE-AN: surface mount directly to wall or desk mount

LE-B, LE-BN: semi-flush mount into wall or desk mount

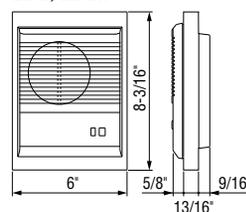
Wire Type Variable wire types—see table on page 54

Distance Sub Station to farthest Master Station: 650' (22 AWG) 1,600' (18 AWG)

LE-A, LE-AN



LE-B, LE-BN



Audio Door Stations



LE-D
Audio Door Station



LE-DA
Audio Door Station



LE-SS-1G
Audio Door Station



LE-SS/A
Audio Door Station



LE-SSR
Audio Door Station



LS-NVP/C
Audio Door Station

Features (LE-D) Specifications

- Weather resistant
- Push button to call master station(s)
- Hands-free communication when master answers

Power Source Supplied by Master Station
Communication Hands-free
Temperature Rating 14°~140°F (-10°~60°C)

Features (LE-DA)

- Weather resistant
- Push button to call master station(s)
- Hands-free communication when master answers

Features (LE-SS-1G, LE-SS/A, LE-SSR, LS-NVP/C)

- Weather and vandal resistant
- Stainless steel, mechanical call button (LE-SS/A, LS-NVP/C)
- Red mushroom call button (LE-SSR)
- Moisture and puncture resistant speaker
- Three-layer steel baffle protects speaker from tampering
- Hands-free communication when master answers
- Pigtail wires for connection to master station
- Includes tamper proof mounting screws

Material LE-D: fire resistant ABS plastic
 LE-DA: ABS plastic with stainless steel cover
 LE-SS-1G, LE-SS/A, LE-SSR: stainless steel
 LS-NVP/C: carbon steel with powder-coated white baked epoxy finish

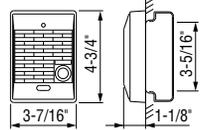
Mounting LE-D: surface mount directly to wall or 1-gang box/ring
 LE-SS-1G: flush mount with 1-gang box/ring or surface mount with SBX-1G

LE-DA, LE-SS/A, LE-SSR: flush mount with 2-gang box/ring or surface mount with SBX-2G/A
 LS-NVP/C: flush mount with 3-gang box/ring or surface mount with SBX-NVP/A

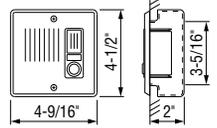
Wire Type Door Station to LEF Master Station: 3-cond., overall shield—use Aiphone #822203
 Door Station to LEM Master Station: 2-cond., overall shield—use Aiphone #822202 or #821802

Distance Door Station to Master Station: 650' (22 AWG) 1,600' (18 AWG)

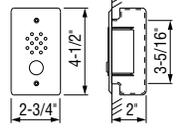
LE-D



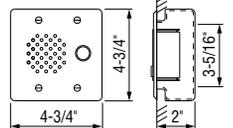
LE-DA



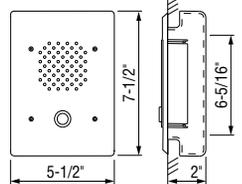
LE-SS-1G



LE-SS/A, LE-SSR



LS-NVP/C



Door Release Relay



RY-PA
Door Release Relay

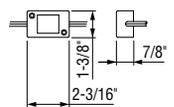
Features

- Door release activation
- N/O contact output
- Camera call-up

Specifications

Power Source 12V DC
Contact Rating 24V DC, 1A or 240V AC, 300mA

RY-PA



All Call, Music, and Chime Adaptor



BG-10C
All Call, Chime, and Music Adaptor
(1 BG-10C is required for up to 11 stations)

Features

- Music ON/OFF switch plus music and chime selector switch for each station
- Chime volume control plus music, bass, and treble controls
- All Call pre-tone volume and speech volume controls
- Terminals for power supply, music and door station connection and LEF-C network (All Call and music receiving)
- Provides All Call and door chime for LEF-C and LEF-10S systems
- Background music input

Specifications

Power Source 12V DC, 2.5A—use PS-1225UL
 Standby: 100mA

All Call Transmit From LEF-3C, LEF-5C, LEF-10C, LEF-10S

All Call Receive All LEF Master Stations

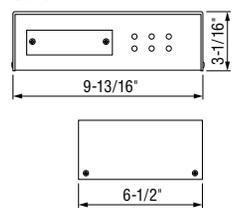
BGM Input AUX R, E and AUX L, E

Controls Music ON/OFF, 11 selector switches of music and chime (off or chime only)

Wire Type BG-10C to LEF-10C: 19 wires max.—use Aiphone #822220

To each LE-D or LE-DA: 3 wires—use Aiphone #822203

BG-10C



Terminal Box



LEW-5S
Terminal Box

LEW-10S
Terminal Box

LEW-10S
Terminal Box

Features

- Remote terminal box for wire organization to masters mounted on a table or desk

LEM Series Components

Audio Master Stations



LEM-1
1-Call Audio Master Station
(for applications using one door/sub station)



LEM-3
3-Call Audio Master Station
(for applications using two or three door/sub stations)

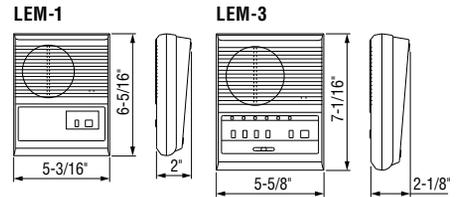
NOTE: Compatible paging adaptor (p. 118) for third-party speakers is located in the Paging Accessories section.

Features

- Voice volume control
- Push-to-talk communication

Specifications

- Power Source** 6V DC—use SKK-620C
- Consumption** 200mA
- Output** 350mW
- Communication** Push-to-talk (simplex)
- Door Release** N/A
- Mounting** Surface mount directly to wall or desk mount
- Wire Type** Door Station or Sub Station to Master Station: 2-cond., overall shield—use Aiphone #822202 or #821802
- Distance** Door Station or Sub Station to Master Station: 650' (22 AWG) 1,570' (18 AWG)



Audio Sub Stations



LE-A
→ p. 104



LE-AN
→ p. 104



LE-B
→ p. 104



LE-BN
→ p. 104

Features

→ p. 104

Specifications

→ p. 104

Audio Door Stations



LE-D
→ p. 105



LE-DA
→ p. 105



LE-SS-1G
→ p. 105



LE-SS/A
→ p. 105



LE-SSR
→ p. 105



LS-NVP/C
→ p. 105

Features

→ p. 105

Specifications

→ p. 105

LEM-1DL Series Components

Audio Master Stations



LEM-1DL
Audio Master Station
(requires one DAK-2S per every two master stations in the system)



LEM-1DLC
Audio Master Station
(max. four)

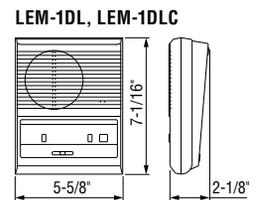
NOTE: Compatible door stations (p. 105) are located in the LEF Series Components. Compatible dual master adaptor kit (p. 113) is located in the Relay and Adaptor Accessories section.

Features

- Door release (N/O contact)
- Calling and two-way communication with door station
- Call tone and voice volume control

Specifications

- Power Source** 12–16V AC—use PT-1210NA or 12–24V DC—use PS-1208UL
- Consumption** 4W (16V AC) max., 200mA (24V DC) max.
- Output** 100mW
- Communication** Push-to-talk (simplex)
- Door Release** N/O dry contact, 30V AC/DC, 1A
- Mounting** Wall or desk mount
- Wire Type** Door Station to Master Station: 2-cond., overall shield—use Aiphone #822202 or #821802
Between LEM-1DLCs: 3-cond., overall shield—use Aiphone #822203 or #821803
- Distance** Door Station to farthest Master Station: 650' (22 AWG) 1,570' (18 AWG)



Audio Master Station



MC-60/4A
Audio MarketCom Master Station with Handset

NOTE: Compatible speakers and paging amplifiers are located in the Paging Accessories section (p. 117).

Features

- Four selective communication channels with LED indicators
- Easy access page button, music mutes while paging
- Crosstalk reduction circuit
- Reinforced modular coil cord on MC-60/4A
- Handset for privacy

Specifications

Power Source 24V DC—use PS-2420UL

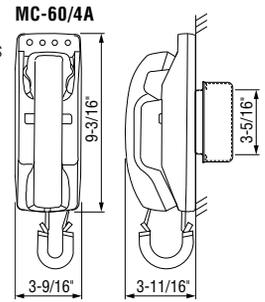
Consumption 70mA (paging mode)

Communication Handset (full-duplex)

Mounting Surface mount directly to wall

Wire Type 7 wires in loop, non-twisted, low capacitance, PE insulation—use Aiphone #852207

Distance Paging Adaptor to farthest Master Station on block: 1,700' (22 AWG) 4,000' (18 AWG)
Total cumulative wiring between Paging Adaptor and Master Station: 5,000' (22 AWG)



Paging Adaptor



MC-A/A
Paging Adaptor for MC Series

Features

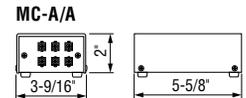
- Separate music and paging controls: bass, treble and volume
- Paging pre-tone volume control
- Connects to standard paging amplifier
- Background music can be included and automatically mutes during page

Specifications

Power Source 24V DC—use PS-2420UL

Input AUX 10kΩ, 0.3V–0.5V

Music Output Range 100mV–1.2V, 10kΩ or less



NHX Series Components

Central Control Unit



NHX-80X®
Central Control Unit



NHR-30K®
30-Call Add-On Truck Card
(required for NHX-30G)

Features (NHX-80X)

- UL 1069 Listed
- Controls system functions with microprocessor
- All wire terminations are made inside with easy "screwless" wire connections

Features (NHR-30K)

- Provides additional capacity for NHX-30G add-on selector

Specifications (NHX-80X)

Power Source 24V DC—use two PS-2420ULs

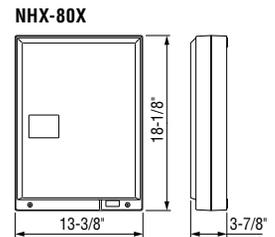
Wire Type Sub/Duty Station to Central Control Unit: 4 twisted pair, low cap, PE, overall shield—use Aiphone #862208

Master Station to Central Control Unit: 5 twisted pair, low cap, PE, overall shield—use Aiphone #862210

Distance Sub Station to Central Control Unit: 165' (22 AWG)

Duty Station to Central Control Unit: 65' (22 AWG)

Master Station to Central Control Unit: 65' (22 AWG)



Master Station and Add-On Selector



NHX-50M®
50-Call Audio Master Station with Handset

NHX-30G®
30-Call Add-On Selector
(requires NHR-30K to be installed into NHX-80X)

Features (NHX-50M)

- 3 call levels with distinct tone and light signalling for routine, urgent, and cord-out trouble calls
- Auto-connect to next call-in priority (no need to select station)
- Alert tone sounds if power or data wire is interrupted, or if handset is off-hook for more than 90 sec.
- Tone off button

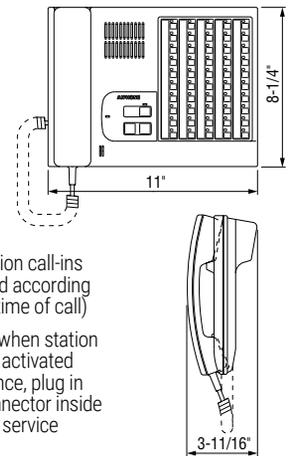
Features (NHX-30G)

- Plugs into NHX-50M with supplied connectors
- Expands NHX-50M to an 80-call master station

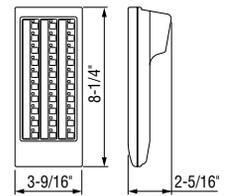
Specifications (NHX-50M)

- Power Source** Supplied by Central Control Unit (NHX-80X)
- Communication** Handset (VOX) or push-to-talk (simplex)
- Call-In Priority**
 - 1) Cord-out trouble call
 - 2) Urgent bathroom call and NHR-3TS common area bathroom/staff call
 - 3) Routine call (sub station call-ins on standby connected according to urgency level and time of call)
- Warning Tones**
 - 1) Line-off trouble alert when station is unplugged (buzzer activated at NHX-50M)—to silence, plug in CN1047 shorting connector inside NHX-80X and call for service
 - 2) 90 sec. elapse timer—call tone goes up to HIGH level
 - 3) 90 sec. off-hook timer—steady tone will notify handset is off-hook
- Wire Type** Master Station to Central Control Unit: 5 twisted pair, low cap, PE, overall shield—use Aiphone #862210
- Distance** Master Station to Central Control Unit: 65' (22 AWG)

NHX-50M



NHX-30G



Sub and Duty Stations



NH-1SA/A®
Single-Jack Bedside Audio Sub Station



NH-2SA/A®
Dual-Jack Bedside Audio Sub Station



NHR-SP®
Audio Duty Station



NHR-3TS®
Dual Corridor Light Sub Station
(required for NHR-7A if NH-1SA/A or NH-2SA/A are not used)

One bedside call button is required per sub station jack



NHR-8C®
Bedside Call Button

Features (NH-1SA/A, NH-2SA/A)

- Bedside sub station for calling and communication
- Single-jack (NH-1SA/A) and dual-jack (NH-2SA/A) for NHR-8C bedside call button(s)
- Hands-free communication
- Flush mount with standard 2-gang box

Features (NHR-SP)

- Alerts staff when a master station receives a call (urgent calls override routine calls)
- Acknowledges any station call with tone and blinking LED (use NHX-50M to identify caller or to answer call)
- Ideal for break rooms, hallways, or locations without a master station
- Flush mount with standard 2-gang box

Features (NHR-3TS)

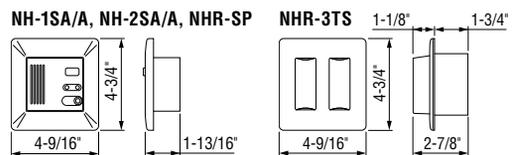
- Provides call from common area, restrooms, or staff location
- Allows NHR-7A pull cord to be used without the need for a bedside sub station
- Two corridor lights indicate call location
- Wires the same as a bedside sub station
- Flush mount with standard 2-gang box
- Stainless steel cover

Features (NHR-8C)

- Button activates routine call at master
- Cord-out activates urgent call at master

Specifications (NH-1SA/A, NH-2SA/A, NHR-SP, NHR-3TS)

- Power Source** Supplied by Central Control Unit (NHX-80X)
- Wire Type** Sub Station or Duty Station to Central Control Unit: 4 twisted pair, low cap, PE, overall shield—use Aiphone #862208
- Distance** Sub Station to Central Control Unit: 165' (22 AWG)
Duty Station to Central Control Unit: 65' (22 AWG)



Accessories



NHR-7A®
Urgent Call Pull Cord



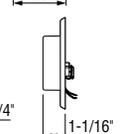
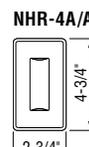
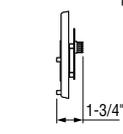
NHR-4A/A®
LED Corridor Light
(red and amber LEDs)

Features (NHR-7A)

- Latching call switch
- Waterproof for bathroom areas
- Durable and strong nylon pull cord with pendant
- Can be used without cord as urgent call station (with NHR-3TS)
- LED "call placed" indicator
- Flush mount with standard 1-gang box

Features (NHR-4A/A)

- Amber lamp for bedside call, red lamp for bathroom call
- Easy wiring to bedside sub station
- Flush mount with standard 1-gang box



Master Stations



NIM-20B
20-Call Audio Master Station with Handset



NIM-40B
40-Call Audio Master Station with Handset

Features

- Supports up to 20 or 40 door stations, sub stations, ceiling speakers, and wall jacks
- Selective Call, Group Call, and All Call
- Volume controls
- Handset for privacy

Specifications

Power Source 48V DC—
use IS-PU-UL

Communication Handset (VOX) or push-to-talk (simplex)

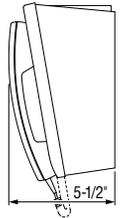
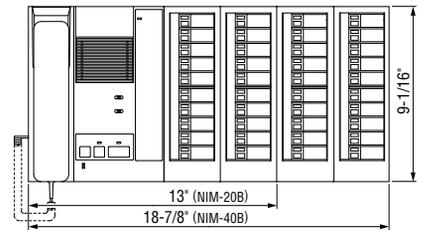
Door Release N/A

Material Panel: fire resistant ABS plastic
Chassis: SPCC

Wire Type Door Station, Sub Station, Ceiling Speaker, or Wall Jack to
Master Station: 3 cond. overall shield—use Aiphone #821803

Distance Door Station or Sub Station to Master Station: 650' (18 AWG)
Power Supply to Master Station: 33' (18 AWG)

NIM-20B, NIM-40B



Door Station



NI-JA
Audio Door Station

Features

- Weather and vandal resistant

Specifications

Power Source Supplied by Master Station

Communication Hands-free

Temperature Rating 14°~140°F (-10°~60°C)

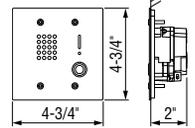
Material Stainless steel

Mounting Flush mount with 2-gang box or surface mount with SBX-2G/A

Wire Type Door Station to Master Station: 3 cond. overall shield—use Aiphone #821803

Distance Door Station to Master Station: 650' (18 AWG)

NI-JA



Sub Stations



NI-BA
Audio Sub Station



NI-RC
Bedside Sub Station

Specifications

Power Source Supplied by
Master Station

Communication Hands-free

Material Plastic

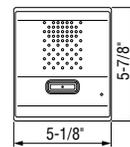
Mounting NI-BA: surface
mount directly to
wall or desk mount

NI-RC: hang from
hook on NIR-HPF

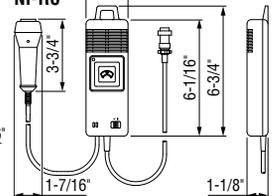
Wire Type Sub Station to Master Station: 3 cond. overall shield—use Aiphone #821803

Distance Sub Station to Master Station: 650' (18 AWG)

NI-BA



NI-RC



Ceiling Speaker and Ceiling Microphone



NI-LB
Ceiling Speaker with
LED Call Indicator
(use NI-SB or NIR-MB
for hands-free reply)



NI-SB
Ceiling Microphone
(for use with NI-LB)

Specifications

Power Source Supplied by Master Station

Communication NI-LB: hands-free (receive)
NI-SB: hands-free (transmit)

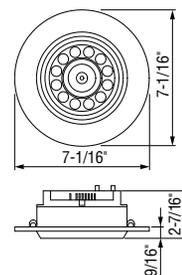
Material NI-LB: ABS plastic
NI-SB: stainless steel

Mounting Ceiling flush mount

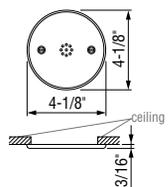
Wire Type Ceiling Speaker to
Master Station: 3 cond. overall
shield—use Aiphone #821803

NIR-MB to Ceiling Speaker:
4-cond. overall shield—
use two runs of #821802

NI-LB



NI-SB



Call Buttons and Wall Jacks



NIR-6
Call Button



NIR-8
Bedside Call Button
(requires NIR-1, NIR-MB, or NIR-7BS)



NIR-1
Wall Jack for NIR-8



NIR-MB
Wall Jack with Mic for NIR-8



NIR-7BS
Wall Jack with LED Call Indicator for NIR-8



NIR-HP
Wall Jack for NI-RC

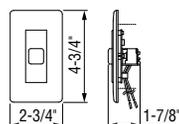


NIR-HPF
Wall Jack with Hook for NI-RC

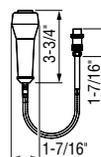
Specifications

- Power Source** Supplied by Master Station
- Material** Fire resistant ABS plastic
- Mounting** NIR-6, NIR-1, NIR-MB, NIR-7BS, NIR-HP: flush mount with 1-gang box
NIR-HPF: flush mount with 2-gang box
- Wire Type** Variable wire types—refer to installation manual

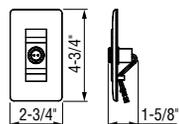
NIR-6



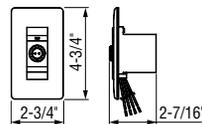
NBR-8A



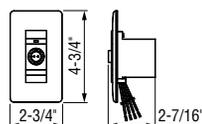
NIR-1



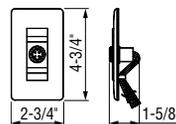
NIR-MB



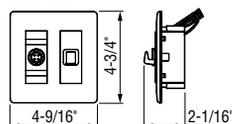
NIR-7BS



NIR-HP



NIR-HPF



Accessories



NIR-2
Call Reset Button



NIR-4
Single Room Corridor Call Light



NIR-4S
Multi-Room Corridor Call Light



NIR-4BZ
Corridor Light with Tone Indicator



NIR-42
Corridor Light with Call Reset Button



NIR-31
Corridor Light with One Magnetic Nameplate



NIR-32
Corridor Light with Two Magnetic Nameplates



NIR-34
Corridor Light with Four Magnetic Nameplates



NIR-7HW
Bathroom Call Button with Pull Cord

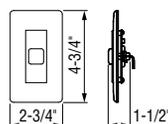


NIR-SOFT
Call Event Log PC Software
(includes RS-232 cable, approx. 40')

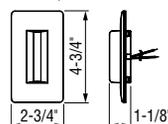
Specifications (NIR-2, NIR-4, NIR-4S, NIR-4BZ, NIR-42, NIR-31, NIR-32, NIR-34, NIR-7HW)

- Power Source** Supplied by Master Station
- Material** Fire resistant ABS plastic
- Mounting** NIR-2, NIR-4, NIR-4S, NIR-7HW: flush mount with 1-gang box
NIR-4BZ, NIR-42: flush mount with 2-gang box
NIR-31, NIR-32, NIR-34: surface mount directly to wall
- Wire Type** Variable wire types—refer to installation manual

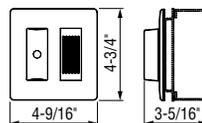
NIR-2



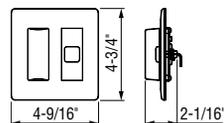
NIR-4, NIR-4S



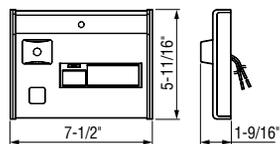
NIR-4BZ



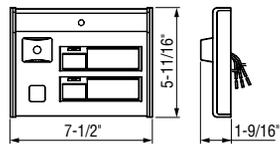
NIR-42



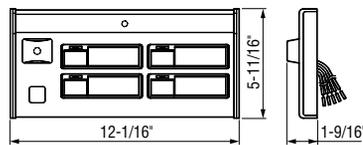
NIR-31



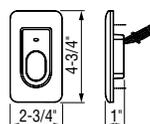
NIR-32



NIR-34



NIR-7HW



Specifications (NI-SOFT)

- Software** OS: Windows® 7 (32/64 bit), Windows® 8 (32/64 bit), Windows® 10
- Processor: 3GHz or faster
- Memory: 2GB of RAM
- Hard Drive: 100MB or more

Audio Master Stations



TD-1H/B
1-Call Audio Master Station with Handset
(cannot be used for door answering)



TD-3H/B
3-Call Audio Master Station with Handset



TD-6H/B
6-Call Audio Master Station with Handset



TD-12H/B
12-Call Audio Master Station with Handset



TD-24H/B
24-Call Audio Master Station with Handset

Features

- Multiple talk paths for communication and paging
- Handset for privacy
- Handset cradle for wall mounting can be reversed for desk use
- Station-select break-in call

Specifications

Power Source 12V DC—use PS-1225UL

Consumption 70mA per station

Communication Handset (full-duplex)

Mounting Desk mount or surface mount directly to wall or 1-gang box

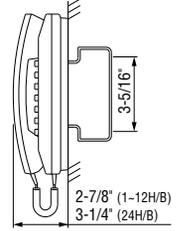
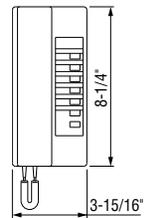
Wire Type TD-1H/B: 6-cond., overall shield—use Aiphone #822206

TD-3H/B, TD-6H/B: 10 cond., overall shield—use Aiphone #822210

TD-12H/B, TD-24H/B: 16 cond., overall shield—use Aiphone #812216 (two runs of 812216 are required for full functionality of the TD-24H/B)

Distance Between Master Stations:
2,000' (22 AWG) 4,800' (18 AWG)

TD-nH/B
(n = 1, 3, 6, 12, 24)



Audio Door Stations



AX-DM
→ p. 77



IF-DA
→ p. 86



IE-JA
→ p. 86



IE-SS/A
→ p. 86



IE-SSR
→ p. 86

Features (AX-DM)

→ p. 77

Specifications (AX-DM)

→ p. 77

Features

(IF-DA, IE-JA, IE-SS/A, IE-SSR)

→ p. 86

Specifications

(IF-DA, IE-JA, IE-SS/A, IE-SSR)

→ p. 86

Paging Adaptors



PD-2
Zone Paging/Talkback Adaptor for TD-H Series

NOTE: Compatible speakers and paging amplifiers are located in the Paging Accessories section (p. 117).

Features

- Provides paging from TD-H handsets to an overhead PA system
- Single or multi-zones, one station capacity per zone
- PAGE button located in TD-H handsets
- Music source connection, automatically mutes when paging

Specifications

Power Source 12V DC, 48mA (talkback)—supplied by Master Station

Output 5kΩ, 1.5V max.

Paging and Music Controls Treble: 12dB at 10kHz

Bass: 12dB at 100kHz

Amp. Input AUX or PHONO 100K–500kΩ, 0.12V–0.5V

Music Input 17kΩ, 0.3V, 1kHz for full output

Tuner Output Audio output range: 100mV–1.2V, 10kΩ or less

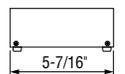
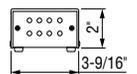
Talkback Gain 40dB, 1kHz at max. volume

Environmental Noise Less than 80dB (phono)

Wire Type Adaptor to Amplifier: 2-cond., overall shield—use Aiphone #822202

Adaptor to Master Station: 3-cond. overall shield—use Aiphone #822203

PD-2



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Accessories

Adaptor, Network, and Relay Accessories

Adaptors



IPW-1VC
2-Wire Network Adaptor Kit
(includes one IPW-1VT, one receiver, and power supply)



IPW-1VT
Analog-to-IP
Transmitter



IPW-10VR
Rack Mount 2-Wire Network
Adaptor (add one IPW-1VT per
device powered by the IPW-10VR)



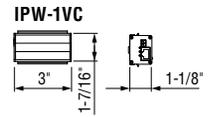
IPW-10VC
Rack Mount 2-Wire Network
Adaptor Kit (includes one
IPW-10VR and ten IPW-1VTs)

Features

- Upgrade 2-wire analog systems to an IP video intercom
- Use existing wire—up to 1,000' (18-22AWG shielded, unshielded)
- Compact design is small enough to fit behind most door or sub stations
- LED status indicators

Specifications (IPW-1VC)

Power Source	IPW-1VC: 48V DC, 1A—use included power supply
	IPW-1VT: supplied by IPW-10VR
	IPW-10VR, IPW-10VC: supplied by IPW-1VC
Consumption	< 2 Watts
Temperature Rating	-4°~140°F (-20°~60°C)
Mounting	Supplied mounting bracket
Wire Type	Network Adaptor to Network Node: Cat-5e or Cat-6
	Between Network Adaptors: existing 2 cond., shielded or non-shielded
Distance	Network Adaptor to Network Node: 15'
	Between Network Adaptors: 1,000' (22 AWG, 18 AWG)



PoE Switch



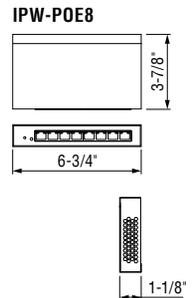
IPW-POE8
8-Port PoE Switch

Features

- Eight 10/100/1000 BASE-T PoE ports
- 64W PoE power budget
- Supports both IEEE 802.3af and 802.3at PoE on all eight ports
- Quiet, fanless design
- Web interface for management

Specifications

Power Source	100–240V AC, 54V, 1.574A DC
Consumption	4.6W (PoE off), 77.9W (PoE on)
PoE Ports	8
PoE Power Budget	64W
Auto MDI/MDIX	Yes
Switching Capacity	16Gbps
Packet Forwarding Rate	11.9Mbps
Packet Buffer Size	1.5Mbits
Temperature Rating	32° ~ 104°F (0° ~ 40°C)



Dual Master Adaptor Kit



DAK-2S
Dual Master Adaptor Kit for
C-123L/A and LEM-1DL Systems

Features

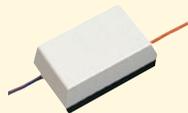
- Allows second master station to be used in C-123L/A and LEM-1DL systems
- Allows RY-AC/A to be used for external signaling in C-123L/A and LEM-1DL systems
- Two component modules per kit
- Included with the C-123LW set and C-ML/A master station

Adaptor, Network, and Relay Accessories (continued)

External Signaling Relays



RY-AC/A
External Signaling Relay for C-123L/A Set, C-123LW Set, IE-8 Series, LEF Series, LEM Series, LEM-1DL Series, or TD-H Series (requires DAK-2S when used with C-123L/A Set, C-123LW Set, LEM Series, or LEM-1DL Series)



RY-ES
External Signaling Relay for AX Series, DB Series, JF Series, JO Series, JP Series, JV Series, KB Series, or NIM Series

Features (RY-AC/A)

- Allows an external device to be triggered when the intercom is called
- External device will be activated momentarily as long as the call button on the door station is activated

Features (RY-ES)

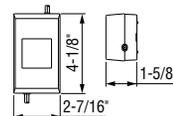
- Allows an external device to be triggered when the intercom is called
- External device will be activated when the door station calls in

Specifications

Power Source RY-AC/A: 12V DC—supplied by Master Station
RY-ES: 12–24V DC, 12–16V AC—supplied by Master Station

Contact Rating RY-AC/A: 240V AC, 0.3A, 24V DC, 1A (bell, buzzer, or chime must be AC operated or DC mechanical type only)
RY-ES: 125V AC, 1.0A 30V DC, 1.0A

RY-AC/A, RY-ES



Call Extension and Door Release Accessories

Call Extension Speaker



IER-2
Call Extension Speaker for AX Series, DB Series, JO Series, JP Series, KB Series, or NIM Series

Features

- Announces chime tone only
- Adjustable volume (three positions)
- Indoor mounting

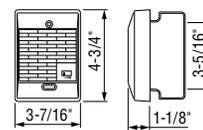
Specifications

Material ABS plastic

Mounting Surface mount directly to wall or 1-gang box

Wire Type Single pair of wires, non-polarized

IER-2



Electric Door Strike



EL-12S
Electric Door Strike for Wood Frames (requires PT-1210NA unless used with DA or DB Series)



PT-1210NA
12V AC Transformer
→ p. 119

Features

- Controlled by N/O contact or voltage output
- Includes both flush mount plate (comes attached) and surface mount plate

Specifications

Power Source 12V AC/DC, 125mA (AC) 200mA (DC)—use PT-1210NA

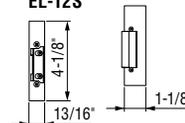
Rated Resistance DC 60Ω

Break-In Resistance 4,000 N

Temperature Rating 5°~140°F (-15°~60°C)

Material Jaw/Body: zinc die cast
Plate: steel

EL-12S



Door Release Adaptor



RY-3DL
Selective Door Release Adaptor for JP Series or KB Series

Features

- Selective door release with one button
- Door release contacts release the door where communication is established
- Normally open (N/O) contacts for electric strike
- Normally closed (N/C) contacts for magnetic locks

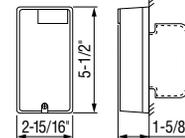
Specifications

Power Source Shared with Master Station—PS-2420UL

Contact Rating Three Form C dry contacts, 50V AC, 1A 30V DC, 1A

Distance Master Station to Door Release Adaptor: 165' (22 AWG) 330' (18 AWG)

RY-3DL



Form C Door Release Relays



RY-1824L
Form C Door Release Relay for AX Series, JO Series, JP Series, or KB Series

Features

- Normally open (N/O) contact with high current rating for door strikes
- Normally closed (N/C) contact with high current for magnetic locks
- Use with any 18-24V system that requires door release

Specifications

Power Source Supplied by Master Station or CEU

Relay Input 18-24V DC, red and black wires, 22AWG

Relay Output Brown, yellow, and orange wires, 18AWG

Output Rating 30V DC, 5A 250V AC, 8A

Wire Type 2-cond. to door release and 2-cond. to strike with power for strike wired in system

Dimensions 1-7/16" H x 13/16" W x 7/16" D (with wires extending approx. 7-1/2")

Surface Mount Boxes

NEW

SBX-CON1 (not shown)
Surface Mount Box with
Conduit Cut Outs for IF-DA,
IX-EA, IX-DV, IX-DVM, JO-DA,
JO-DV, JP-DA, JP-DV, JV-DV,
KB-DAR, KB-DAR-M, or LE-D

SBX-ACE
Surface Mount Box for
AX-DM, GT-D, IF-DA,
JO-DA, JP-DA, KB-DAR,
or KB-DAR-M and one
Access Control Device



SBX-DVF
Surface Mount
Box for JO-DVF
or JP-DVF



SBX-AXDVF
Surface Mount
Box for AX-DVF



SBX-DVF-P
Surface Mount
Box for AX-DVF-P



SBX-IDVF
Surface Mount Box
for IX-DVF or IX-SSA



SBX-IDVFRA
Surface Mount Box for
IX-DVF-2RA, IX-DVF-2RA-FR,
IX-DVF-L, IX-DVF-PR,
IX-DVF-RA, IX-DVF-RA-FR,
IX-SSA-2RA, IX-SSA-2RA-FR,
IX-SSA-RA, or IX-SSA-RA-FR



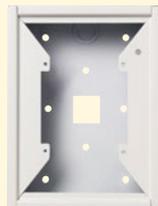
SBX-IXGDM7
Surface Mount Back
Box for IX-DVF-4A,
IX-DVF-6, or
IXG-DM7-HIDA



SBX-1G
Surface
Mount Box
for LE-SS-1G



SBX-2G/A
Surface Mount Box
for IE-JA, IE-SS/A,
IE-SSR, IX-SS-2G,
LE-DA, LE-SS/A,
LE-SSR, or NI-JA



SBX-NVP/A
Surface Mount
Box for IX-NVP
or LS-NVP/C

Features (SBX-CON1)

- TBD
- TBD
- TBD
- TBD
- TBD

Features (SBX-ACE)

- Vandal resistant
- Hood provides weather resistance
- Includes blank stainless steel cover for wide range of mounting options
- Openings at bottom allow for moisture drainage

Features (SBX-DVF, SBX-AXDVF, SBX-DVF-P, SBX-IDVF, SBX-IDVFRA)

- Hood provides weather resistance
- Includes space inside for wiring
- Mounts directly to wall
- Openings at bottom allow for moisture drainage

Features (SBX-IXGDM7)

- 1-gang and 2-gang mounting hole patterns
- One conduit knockout at bottom
- Built-in rain hood

Features (SBX-1G)

- Weather resistant
- Includes space inside for wiring
- Mounts directly to wall surface

Features (SBX-2G/A)

- Weather resistant
- Includes space inside for wiring
- Mounts to 1-gang box or ring
- Can mount directly to wall surface
- Includes hardware for mounting intercom

Features (SBX-NVP/A)

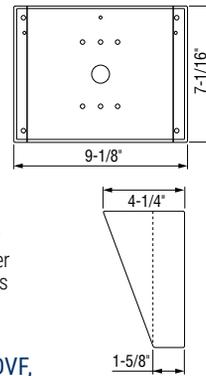
- Weather resistant
- Includes space inside for wiring
- Mounts to 1-gang box or ring
- Can mount directly to wall surface
- Powder-coated white baked epoxy finish

Specifications

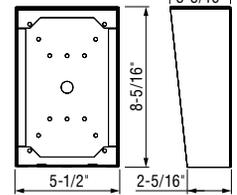
Material SBX-ACE, SBX-DVF-P, SBX-IDVF, SBX-IDVFRA, SBX-IXGDM7, SBX-1G, SBX-2G/A: 18GA stainless steel
SBX-DVF, SBX-AXDVF: 16GA stainless steel (outer layer), 18GA stainless steel (inner layer)
SBX-NVP/A: 1/8" rolled steel

Mounting SBX-ACE, SBX-DVF, SBX-AXDVF, SBX-DVF-P, SBX-IDVF, SBX-IDVFRA: surface mount directly to wall, 1-gang box, or 2-gang box with included hardware (8 x 32 with T-15 Torx head)
SBX-1G, SBX-2G/A, SBX-NVP/A: surface mount directly to wall or 1-gang box with included hardware (8 x 32 with T-15 Torx head)

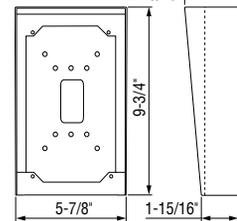
SBX-ACE



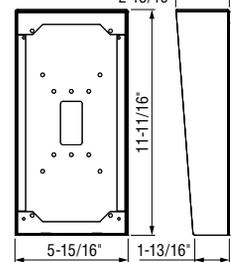
SBX-DVF



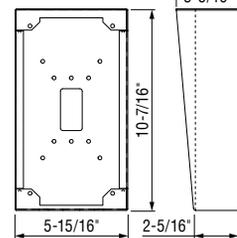
SBX-AXDVF



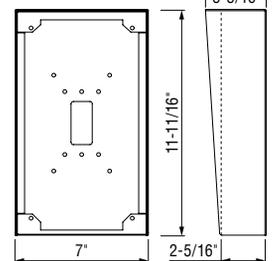
SBX-DVF-P



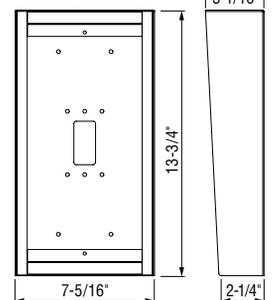
SBX-IDVF



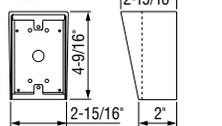
SBX-IDVFRA



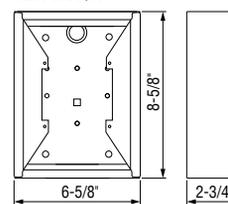
SBX-IXGDM7



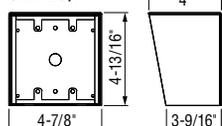
SBX-1G



SBX-NVP/A



SBX-2G/A



Angle Boxes



KAW-D
30° Angle Box
for IF-DA, JO-DA,
JP-DA, KB-DAR,
or KB-DAR-M



SBX-AXDV30
30° Angle Box
for AX-DV



SBX-DV30
30° Angle Box for
JO-DV or JP-DV



SBX-IXDV30
30° Angle Box
for IX-DV

Features (KAW-D)

- Provides a better viewing angle for the camera
- Compatible with Aiphone 1-gang surface mount door stations
- Angles 1-gang door stations outward by 30°
- Can mount to either right or left of door
- Hinged cover for mounting door station

Features (SBX-DV30, SBX-AXDV30, SBX-IXDV30)

- Provides a better viewing angle for the camera
- Designed for angle mounting door stations outward by 30°
- Applicable for wide or double door entrances

Specifications

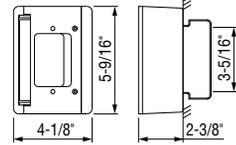
Material KAW-D: ABS plastic

SBX-IXDV30: 16GA stainless steel

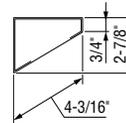
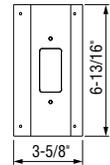
SBX-DV30, SBX-AXDV30, SBX-IXDV30:
18GA stainless steel

Mounting Surface mount directly to wall or 1-gang box

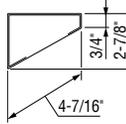
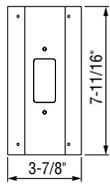
KAW-D



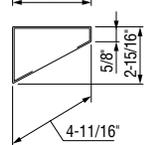
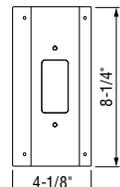
SBX-DV30



SBX-AXDV30



SBX-IXDV30



Mullion Mounting Brackets



IX-MB
Mullion Mounting
Bracket for IX-DV



JK-MB
Mullion Mounting
Bracket for
JO-DV or JP-DV



KMB-45
45° Mullion Mounting
Bracket for C-D,
GT-D, IF-DA, JO-DA,
JP-DA, KB-DAR,
KB-DAR-M, or LE-D

Features (IX-MB, JK-MB)

- Mounts compatible station to a door frame or mullion
- Designed to fit station precisely and conceals wiring inside
- Can mount to either right or left of door

Features (KMB-45)

- Compatible with Aiphone 1-gang surface mount door stations
- Mounts door stations to mullion with a 45° angle
- Can mount to either right or left of door
- Provides a better viewing angle for the camera

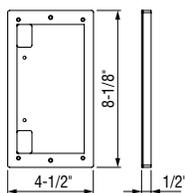
Specifications

Material Aluminum

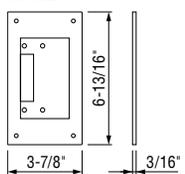
Mounting IX-MB, JK-MB: surface mount
directly to mullion or 1-gang box

KMB-45: surface mount
directly to side of mullion

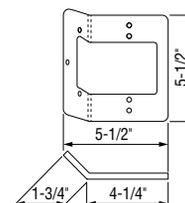
IX-MB



JK-MB



KMB-45



Mounting Accessories (continued)

Retrofit Mounting Bracket



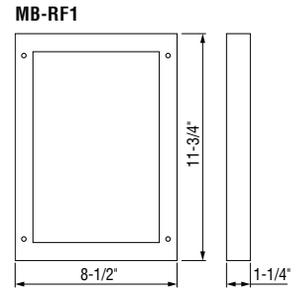
MB-RF1
Retrofit Mounting Bracket for IX-DVF-2RA, IX-DVF-4A, IX-DVF-6, IX-DVF-HW, IX-DVF-L, IX-DVF-RA, IX-SSA-2RA, or IX-SSA-RA (adapts station to an existing Code Blue® or Talk-A-Phone® tower or wall box)

Features

- Adapts IX Series emergency stations to existing Code Blue® or Talk-A-Phone® towers or wall boxes
- Powder-coated exterior

Specifications

Material 18GA CRS
Mounting Surface mount directly to tower or wall box



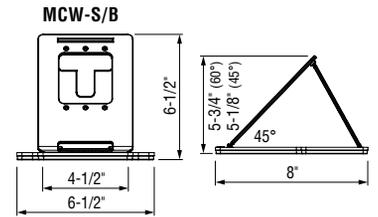
Desk Stand



MCW-S/B
Desk Stand for AX-8M, AX-8MV, AX-8MV-W, DB-1MD, DB-1SD, GT-1A, GT-1C7, GT-1C7-L, GT-1M3, GT-2C, GT-2H, IXG-2C7, IXG-2C7-L, JO-1FD, JO-1MDW, JV-1FD, JV-1MD, JP-4HD, JP-4MED, KB-3HRD, or KB-3MRD

Features

- Allows desk mounting of master and/or handset station
- Mounting hardware included
- Station is propped up for easier viewing
- Pre-drilled mounting holes
- Constructed with sturdy ABS plastic
- Adjustable to 45° or 60° angles



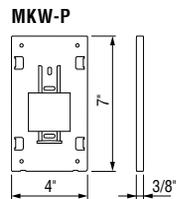
Mounting Plate



MKW-P
1-Gang Mounting Plate for JO-DV or JP-DV

Features

- Hardware included
- Adapts the JO-DV and JP-DV surface mount door stations to a standard 1-gang box or ring



Paging Accessories

Horn Speaker



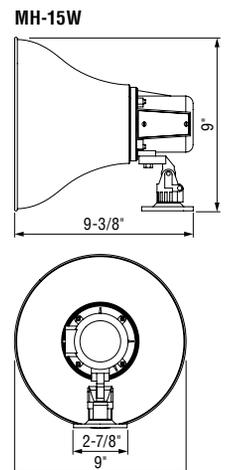
MH-15W
Multi-Tap Horn Speaker

Features

- Weatherproof and waterproof paging horn speaker for indoor and outdoor use
- Lightweight all-aluminum construction
- Wide frequency response
- External adjustable power taps
- Can be used with intercom systems for two-way communication that require an 8Ω direct tap
- Built-in transformer for 25/70/100V systems
- Mounts directly to a flat surface and can be adjusted to the desired angle

Specifications

Power Capacity 15W max.
Impedance 5.0K, 2.5K, 1.3K, 670, 330, 90, 8Ω
Sensitivity 120dB (measured at 1 meter on axis with 15W input)
Frequency Response 375Hz–14kHz
Materials Body: spun aluminum
Driver Housing: die-cast aluminum

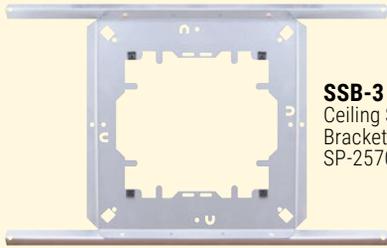


Paging Accessories (continued)

Indoor Ceiling Speakers and Support Bracket



SP-2570N
Ceiling Speaker



SSB-3
Ceiling Support
Bracket for
SP-2570N

Features (SP-2570N)

- Indoor use
- Can be used with any Aiphone system that has paging ability (see specifications for requirements)
- Ceiling flush mount
- 8" dual cone speaker with 12-7/8" white baffle
- Excellent sound and voice reproduction
- Easy installation in a drop tile ceiling using the SSB-3

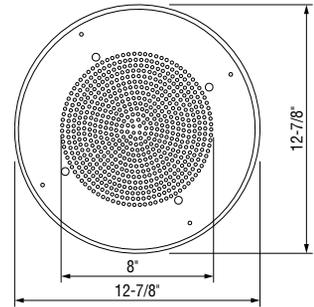
Features (SSB-3)

- Optional ceiling support bracket for installations in drop tile ceilings

Specifications (SP-2570N)

- Power Capacity 8W RMS
- Impedance 8Ω direct or 25/70V transformer
- Frequency Response 65Hz–17kHz
- Wattage Taps 25V: 0.325W, 0.625W, 1.25W, 2.5W, and 5W
70V: 0.312W, 0.625W, 1.25W, 2.5W, and 5W

SP-2570N



Paging Amplifiers



MD35M®
35W Paging
Amplifier



MD60M®
60W Paging
Amplifier



MD120M®
120W Paging
Amplifier

Features

- Can be used with any Aiphone system with paging ability (see specifications for requirements)
- Three channel inputs
- Wide frequency response with very low distortion
- Balanced microphone input
- Phantom power on mic input with selector
- Balanced telephone paging input
- VoIP telephone paging input
- Tel and mic VOX sensitivity control
- Auxiliary input with stereo summing
- Auxiliary input gain
- Independent input controls (bass and treble)
- Direct muting or unmuting
- 12V accessory power output
- 600Ω or 10K (VoIP) MOH output with separate output level control
- 8Ω, 25V, and 70V output impedance
- Rack mounting with optional kits

Specifications

- Power Source 120V AC, 50-60Hz
- Output 35/60/120W RMS
- Input Microphone: 250Ω balanced
Telephone: 600Ω balanced
Auxiliary: 47kΩ
VoIP: 50kΩ unbalanced
- Distortion Less than 0.5% THD
- Frequency Response 20Hz–20kHz ± 2dB
- Dimensions (H x W x D) 1-3/4" x 8-1/2" x 12-1/2"
44.5mm x 215.9mm x 317.5mm

Paging Adaptor



BA-1
Paging Adaptor
for LEF Series
or LEM Series

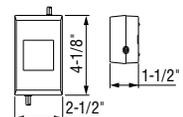
Features

- Provides outgoing paging to external speakers
- Takes the place of a separate microphone for paging where there is an intercom

Specifications

- Power Source Supplied by Master Station
- Input 20Ω
- Output 10kΩ
- Output to Adaptor 0dB and -20dB, selectable
- Requirements AUX input (10kΩ) or 100mV for rated output
- Wire Type 2-cond., overall shield—use Aiphone #822202

BA-1



Power Supplies



SKK-620C®
6V DC, 200mA Power Supply for AT-406 Series, C-123L/A Set, C-123LW Set, or LEM Series



PS-1225UL®
12V DC, 2.5A Power Supply for LEF Series with All Call or TD-H Series
(required for the LEF Series if using BG-10C, otherwise use PS-1208UL)



PS-1208UL®
12V DC, 800mA Power Supply for LEF Series without All Call



PS-1820UL®
18V DC, 2A Power Supply for JO Series



PS-2420UL®
24V DC, 2A Power Supply for AX Series, GT Series, IM Series, IX Series, JP Series, JV Series, KB Series, MC Series, NHX Series, or the Beacon for Emergency Wall Boxes and Towers

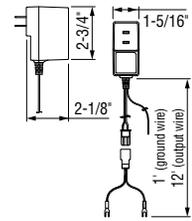


IS-PU-UL®
48V DC, 2A Power Supply for NIM Series

Specifications (SKK-620C)

Cord Length 12'
Ground Wire Length 1'
Input 120V AC, 60Hz
Output 6V DC, 200mA

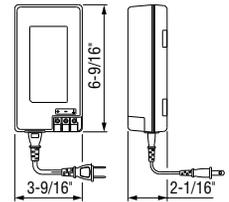
SKK-620C



Specifications (PS-1225UL, PS-1208UL)

Cord Length 6' 2"
Input 100–240V AC, 50/60Hz
Output PS-1225UL: 12V DC, 2.5A
PS-1208UL: 12V DC, 800mA
Consumption 37W, 65–82VA

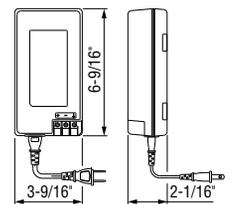
PS-1225UL, PS-1208UL



Specifications (PS-1820UL)

Cord Length 6' 2"
Input 100–240V AC, 50/60Hz
Output 18V DC, 2A
Consumption 45W, 75–95VA

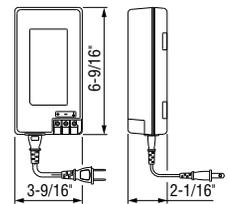
PS-1820UL



Specifications (PS-2420UL)

Cord Length 6' 2"
Input 100–240V AC, 50/60Hz
Output 24V DC, 2A
Consumption 60W, 100–125VA

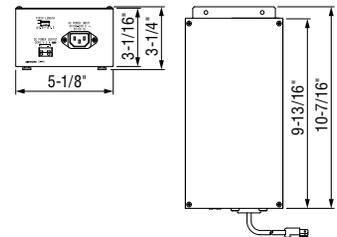
PS-2420UL



Specifications (IS-PU-UL)

Cord Length 5' 10"
Input 100–240V AC, 50/60Hz
Output 48V DC, 2.1A
Consumption 120W

IS-PU-UL



Transformers



PT-1210NA
12V AC Transformer for CCS-1A Set, EL-12S, IE-8 Series, or LEM-1DL Series

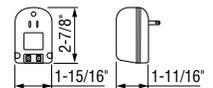


PT-1211CA
15V AC Transformer for DA-1DS, DA-4DS, or DB Series

Specifications (PT-1210NA)

Input 120V AC, 60Hz
Output 12V AC, 10VA, 830mA
Consumption 15W

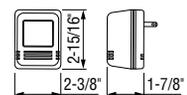
PT-1210NA



Specifications (PT-1211CA)

Input 120V AC, 60Hz
Output 15V AC, 10VA, 700mA
Consumption 10.5W

PT-1211CA



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LEF-10S			55	104
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AIPHONE WIRE BY STOCK NUMBER

STOCK #	LENGTH	AWG	DESCRIPTION	INSULATION	CAPACITANCE	DC RES / 1000
81221650C	500'	22	16-conductor, non-shielded	PVC	23.60 pf/ft	17.50 ohm
82180210C	1,000'	18	2-conductor, overall shield	PVC	47.00 pf/ft	6.92 ohm
82180310C	1,000'	18	3-conductor, overall shield	PVC	47.00 pf/ft	6.92 ohm
82220250C	500'	22	2-conductor, overall shield	PVC	44.65 pf/ft	17.50 ohm
82220210C	1,000'	22	2-conductor, overall shield	PVC	44.65 pf/ft	17.50 ohm
82220350C	500'	22	3-conductor, overall shield	PVC	44.62 pf/ft	17.50 ohm
82220650C	500'	22	6-conductor, overall shield	PVC	44.65 pf/ft	17.50 ohm
82221050C	500'	22	10-conductor, overall shield	PVC	44.65 pf/ft	17.50 ohm
82221250C	500'	22	12-conductor, overall shield	PVC	44.65 pf/ft	17.50 ohm
82221550C	500'	22	15-conductor, overall shield	PVC	44.65 pf/ft	17.50 ohm
82222050C	500'	22	20-conductor, overall shield	PVC	44.65 pf/ft	17.50 ohm
85160210C	1,000'	16	2-conductor, low cap, PE, solid, non-shielded	PE	12.50 pf/ft	4.02 ohm
851602DBW10C	1,000'	16	2-conductor, low cap, PE, solid, non-shielded, direct burial	PE	12.50 pf/ft	4.16 ohm
85220710C	1,000'	22	7-conductor, low cap, PE, non-shielded	PE	16.50 pf/ft	17.50 ohm
86220810C	1,000'	22	4 twisted pair, low cap, PE, overall shield	PE	15.28 pf/ft	10.15 ohm
86221025C	250'	22	5 twisted pair, low cap, PE, overall shield	PE	15.28 pf/ft	10.15 ohm
87180250C	500'	18	2-conductor, low cap, PE, solid, non-shielded	PE	11.05 pf/ft	6.39 ohm
87180210C	1,000'	18	2-conductor, low cap, PE, solid, non-shielded	PE	11.05 pf/ft	6.39 ohm
871802P10C	1,000'	18	2-conductor, low cap, PVC, solid, non-shielded, plenum rated	FEP	13.00 pf/ft	6.52 ohm
87180450C	500'	18	4-conductor, low cap, PE, solid, non-shielded	PE	13.60 pf/ft	6.39 ohm
871804P50C	500'	18	4-conductor, low cap, PE, solid, non-shielded, plenum rated	FEP	23.60 pf/ft	6.80 ohm
87200250C	500'	20	2-conductor, mid cap, PE, solid, non-shielded	PE	20.96 pf/ft	10.15 ohm
87200210C	1,000'	20	2-conductor, mid cap, PE, solid, non-shielded	PE	20.96 pf/ft	10.15 ohm
872002P10C	1,000'	20	2-conductor, mid cap, PE, solid, non-shielded, plenum rated	FEP	18 pf/ft	10.15 ohm

WIRE NUMBER CODING

1st digit: 8 = Aiphone approved wire

2nd digit: Type of wire → **1** = non-shielded **5** = low capacitance
2 = shielded **6** = twisted pair / shielded
3 = twisted pair **7** = solid PE, low / mid capacitance

3rd & 4th digits: Gauge → **22** = 22 AWG **20** = 20 AWG **18** = 18 AWG **16** = 16 AWG

5th & 6th digits: Number of-conductors → **02** = 2-conductors **12** = 12-conductors

7th & 8th digits: Length of wire → **10** = 1,000' box **50** = 500' box **25** = 250' box

9th digit: "C" indicates new wire

DB = Direct Burial

P = Plenum

WIRE NUMBER CODING EXAMPLE

1st: Aiphone Approved	2nd: TYPE - Shielded	3rd & 4th: GAUGE - 22 AWG	5th & 6th: CONDUCTORS 02=2 Conductors	7th & 8th: WIRE LENGTH 10=1,000' Box	9th: "C" is New Wire
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8

2

22

02

10

C

WIRE INFORMATION

All wire is stranded unless otherwise indicated.

Non-plenum wires have a gray jacket. Plenum wires have a natural jacket.

All wire meets the following standards: UL, C(UL), UL 444, CA Fire Marshal

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