



N-SP80 Series SIP Intercom Station



N-SP80 Series Overview

The N-SP80 Series SIP Intercom Station uses industrial standard protocols of SIP (Session Initiation Protocol) and ONVIF for its audio and video communications, which gives the system a wide capability of flexible system integrations even with third-party audio and

video management systems. The high quality audio supports clear public announcements through a PA system, and the remote door release control can also be achieved by connecting with an access control system. It should fill your project design needs for small to large scale applications.



System Features

- SIP protocol is supported for 2-way communications between N-SP80 series units and other SIP compatible devices and systems through SIP server.
- Peer-to-peer communication mode is designed for SIP server-less system configuration.
- High audio quality can be achieved with the support of G.711a, G.711μ, G.722 and G.729 audio codecs, which is even ideal for clear voice announcements through PA systems.
- The N-SP80MS2 now features OPUS audio codec support and is fully compatible with TOA's IP-A1 networked public address system.
- Video streaming from N-SP80VS1 can be monitored and/or recorded by using ONVIF protocol (S Profile).
- Contact relay output equipped in Door Station can be activated remotely from N-SP80MS2 for door release.
- Secondary SIP server for server redundancy

Product Features

N-SP80MS2 SIP Multimedia Station



- Intuitive operation with 7" capacitive touch panel screen
- Less cabling thanks to PoE, or 12 V DC power supply
- Built-in camera (with privacy shutter)
- Handset, hands-free, headset conversation functionality
- HDMI output for external display connection.
- Wall mounting installation method with optional bracket



- PoE/12V DC power supply
- Robust and weatherproof hardware with IP65 graded
- Built-in AEC (acoustic echo canceller) enables intelligible full-duplex conversations
- Control input can be connected with a tamper-switch for activating an emergency message call.

(N-SP80VS1 only)

- 2MP camera resolution
- Automatic brightness adjustment
- Video streaming by using ONVIF protocol (S Profile)

Key Benefits

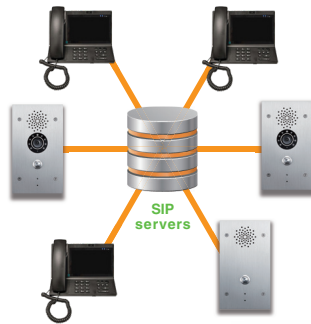
Supports peer-to-peer communication

SIP server-less system can be configured.



Compatible with variety of SIP servers

Where a SIP server is already in place, adding an N-SP80 station is easy. It's compatible with Cisco CUCM, Asterisk and Genetec Sipelia.*



*All product and company names are trademarks or registered trademarks of their respective owners.

Quick door release by keypad operation



System Example 1

The N-SP80 series stations can communicate with TOA's N-8000 IP Intercom System through N-8000SG SIP Gateway software, which contribute to adding a video feature and further SIP and/or ONVIF compatible third-party systems.

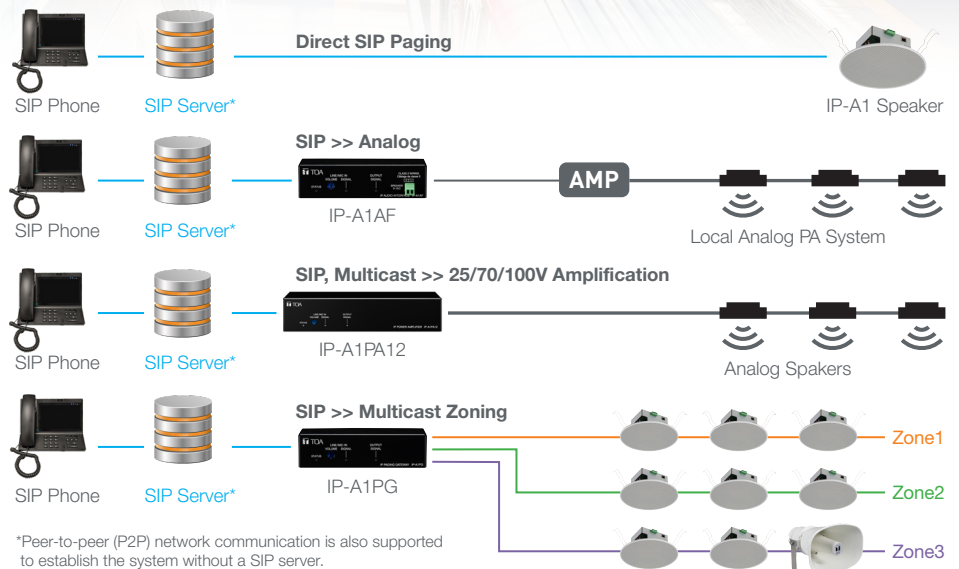


System Example 2

The N-SP80MS2 can integrate with TOA's IP-A1 Paging System natively over SIP protocol.

The N-SP80MS2 can be used in different applications:

- Direct SIP Paging to IP-A1 Speaker
- SIP to Analog SIP Paging via the presence of IP-A1AF
- SIP/Multicast to Analog Paging via the presence of IP-A1PA12
- Multicast SIP paging to IP-A1PG



*Peer-to-peer (P2P) network communication is also supported to establish the system without a SIP server.

| | N-SP80MS2 | N-SP80VS1 | N-SP80AS1 |
|----------------------------|---------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------|
| Power Supply | PoE (IEEE802.3af) or 12V DC (use of the optional AC adapter) | PoE (IEEE802.3af) or 12V DC | |
| Power Consumption | 12 W or less | | |
| Speech Method | Hands-free, Handset or Headset conversation | Hands-free conversation | |
| Hands-free | Speaker: 5 cm (1.97") Cone-type, Maximum output 2 W, 8 Ω Microphone: Omni-directional electret condenser microphone | Speaker: 5 cm (1.97") Cone-type, Maximum output 1 W, 8 Ω Microphone: Omni-directional electret condenser microphone | |
| Handset | Receive path: 4 cm (1.57") Cone-type, Maximum output 250 mW, 32 Ω Send path: Electret condenser microphone | - | |
| Headset | ø3.5 mini jack | - | |
| Display | 7 inch capacitive touch screen TFT LCD, 1024 x 600 pixels, 16:9 wide sceren | - | |
| Control Input | - | 2 channels, no-voltage make contact input, open circuit voltage: 5 V DC, short-circuit current: 10 mA or less | |
| Control Output | - | 2 channels, relay output, normally-open/normally-close output, withstand voltage: 30 V DC, control current: 1A | |
| DC Power Input | - | 12 V DC | |
| Operation Button | - | 1 x Call button, 1 x Reset button | |
| Indication | - | Status LED | |
| Camera | Image device: 1/5" CMOS, Number of effective pixels: 2M pixels, Maximum resolution: 1080p Other features: Free-Rotation | 1/2.7" CMOS, 2M pixels, Max 1080p resolution, Horizontal 116° x vertical 60° angle of view, IR LED, Day(color) & night(black/white) mode automatic switching | |
| Video | Image size: QCIF, CIF, 4CIF, VGA, 720P Bit rate: 64 kbps - 2 Mbps | - | |
| Network | | | |
| Network I/F | 10BASE-T/100BASE-TX (Auto-Negotiation) | | |
| Network Protocol | UDP/TCP/IP, HTTP/HTTPS, TLS, RTP/RTCP, ARP, NAT, NTP, IGMP, SIP, etc. | IPv4, HTTP, HTTPS, FTP, SNMP, DNS, NTP, RTSP, RTP, TCP, UDP, ICMP, DHCP, ARP, SIP | |
| Packet Transmission System | Unicast, Multicast | | |
| Paging | 1 x Multicast transmission | 1 x Multicast receive | |
| Connector | RJ45 2 ports (one supports PoE (IEEE802.3af)) | | |
| Quantifying bit number | Maximum 16 bits | | |
| Voice encoding method | G.711 μ-law/A-law, G.722, G.729, OPUS | | |
| Video compression method | H.263, H.264, H.265, VP8 | H.264, MJPEG | - |
| Security | - | Password protection, IP address filtering, SIP over TLS, HTTPS | |
| Speech Features | - | SIP: SIPv1(RFC2543), SIPv2(RFC3261) Acoustic echo canceller, VAD (Voice Activity Detection), Comfort noise generator Auto answer, Volume control, Peer-to-peer connection (Direct IP connection without SIP server) | |
| External Interface | USB, HDMI, Bluetooth 4.2 | - | |
| Operating Temperature | 0 °C to +40 °C (32 °F to 104 °F) | -20 °C to +55 °C (-4 °F to 131 °F) | |
| Operating Humidity | 10 % to 90 %RH (no condensation) | | |
| Dust/Water Protection | - | IP65 (Panel) | |
| Finish | Body, Handset: ABS resin, black | Panel : Stainless steel | |
| Dimensions | 250 (W) x 211.1 (H) x 195.4 (D) mm (9.84" x 8.31" x 7.69") (excluding curl cord section) x Numerical values are for reference only | 120 (W) x 210 (H) x 49.5 (D) mm (4.72" x 8.27" x 1.95") | |
| Weight | 1.15 kg (2.54 lbs) | 890g (1.96 lbs) | 850g (1.87 lbs) |
| Accessory | 1 x Handset, 1 x Coil cord, 1 x LAN cable, 1x Foot stand | 4 x Box mounting torx screw, 1 x Torx screw driver | |
| Option | AC adapter: AD-1215P, AD-5000-2, Wall bracket: N-SP80WB2 | 4 size back box: YC-400 | |

OPTIONS



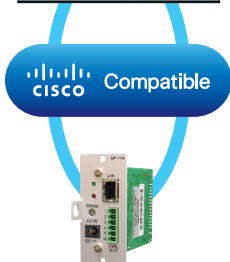
N-8000SG Q SIP Gateway

The N-8000SG Q SIP Gateway allows you to connect the TOA's N-8000 IP Intercom System to a SIP phone system.



N-SP80WB2 Wall Mounting Bracket

On-wall bracket used for the SIP multimedia station N-SP80MS2.



SP-11N Module

The SP-11N is a VoIP phone paging module supported SIP (Session Initiation Protocol) with Auto-answer function. This module can be used with TOA's 9000M2 Series, A-700 Series, A-900 Series and BG Series amplifiers.



YC-400 4-Gang Box

Designed to flush-mount N-SP80VS1 and N-SP80AS1 in a wall.



TOA Electronics Inc

www.toaelectronics.com

* Availability differs from country to country.
Please contact your nearest dealers for more details.

Specifications are subject to change without notice. (2505) 8336110044-02