

INNOMEDIA

MTA8328-1E

ANALOG TERMINAL ADAPTER

COMPACT AND HIGHLY MANAGEABLE CPE DEVICE FOR RESIDENTIAL AND SOHO VOIP DEPLOYMENT

Expanding on InnoMedia's widely deployed MTA6328 product family of highly manageable devices with superior quality and reliability, the new MTA8328-1E has been enhanced with house wiring support and redesigned in a compact footprint for an excellent price-performance ratio, making it ideal for home and office use.

KEY BENEFITS

Ideal for deploying to consumer and SOHO broadband customers.

Highly interoperable with all major SIP softswitches & IMS servers, thus protecting your network investment.

Easy to install and auto-provision, ready for timely and large-scale deployments.

Remote monitoring and management via InnoMedia Element Management System, minimizing service provider support cost.

Friendly user interface with dual language voice prompts for IP address, Internet cable connection status, Internet service status, and device registration status.

Rich features including T.38 for reliable fax transmission, wideband codec for superior voice quality, and low/high-speed modem support for POS.

CLASS feature support in conjunction with SIP softswitches/IMS servers.

Allows service providers to deliver seamless PSTN replacement with GR909 line diagnostic tests that detect foreign voltage, receiver off-hook, REN violation, tip-ring short as well as providing optional GR1089 intra-building lightning protection.



MTA8328-1E

The new generation 1-voice-port MTA8328-1E Residential CPE offers service operators a price competitive, feature rich, and highly manageable solution for the consumer market. It provides features such as reliable fax transmission with T.38 or G.711 fallback, in-band and RFC2833-based DTMF, low/high-speed modem support for credit card readers and other POS support, and wideband codec (G.722) capability that delivers voice quality superior to that of PSTN.

The built-in voice prompt assistant in the MTA8328-1E offers user friendly status information including the device IP address, the Ethernet cable connection status, the Internet service status, and the device registration status. In addition, the MTA8328-1E has a built-in element management client which, in conjunction with InnoMedia's carrier-grade Element Management System (EMS), makes the device highly manageable, thus greatly reducing service provider customer support cost.

The MTA8328-1E also supports various forms of auto-provisioning utilizing HTTP or TFTP. The auto-provisioning and device management support makes the MTA8328-1E an ideal solution for service providers looking for timely and large-scale voice service deployments.

The MTA8328-1E's GR909 line diagnostic tests detect the presence of foreign voltages (PSTN power feed or power crossing), receiver off-hook, REN violation, and tip-ring short. These line fault tests plus the optional GR1089 intra-building lightning protection enable the MTA8328-1E to support house wiring, thus allowing service providers to offer high-quality voice services for seamless PSTN replacement.

House Wiring Support with GR909 Line Diagnostic Tests and GR1089 Intra-Building Lightning Protection

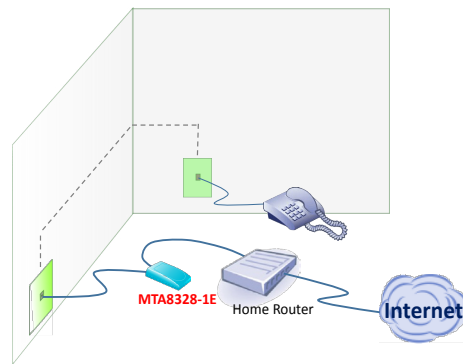


Figure 1- Seamless PSTN Replacement with House Wiring Support

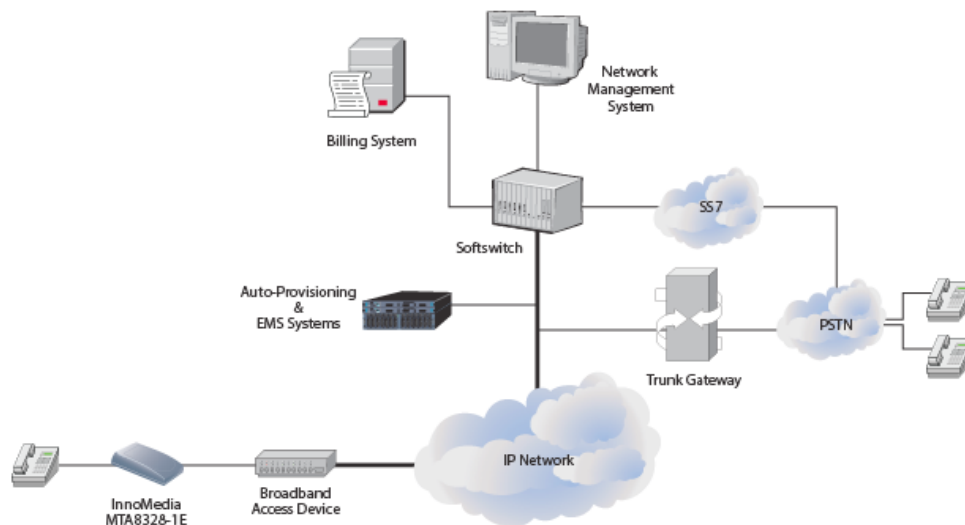
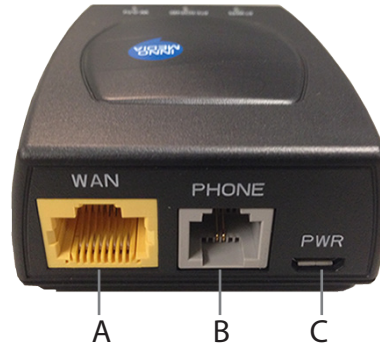


Figure 2- Typical Application For MTA8328-1E

MTA INTERFACES

- A. RJ-45 port (Uplink to broadband access device)
- B. RJ-11 port (Connect to phone)
- C. Power (USB Cable to Power Adapter)



SPECIFICATIONS

Product Specification

Category	Specification
Telephone Interface	1 FXS voice port
Network Interface	10/100 Base-T Uplink port
Accessory	Ethernet Cable, USB cable, AC/DC Power Adapter

Software Specification

Category	Specification								
Protocols	SIP 2.0								
Speech Codec Capabilities	G.711, G.722, G.729A/B, iLBC								
Quality of Service	Adaptive jitter buffer, TOS, VLAN								
Signal Processing	<table border="0" style="width: 100%;"> <tr> <td>Echo cancellation: G.168</td> <td>Line reversal/Polarity reversal</td> </tr> <tr> <td>T.38 Fax (or fall-back to G.711)</td> <td>OSI (Open Switch Interval-event)</td> </tr> <tr> <td>Caller ID FSK signal regeneration</td> <td>Gain Control</td> </tr> </table>	Echo cancellation: G.168	Line reversal/Polarity reversal	T.38 Fax (or fall-back to G.711)	OSI (Open Switch Interval-event)	Caller ID FSK signal regeneration	Gain Control		
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T.38 Fax (or fall-back to G.711)	OSI (Open Switch Interval-event)								
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Certification	FCC part 15B; CE; UL								
Tones	<table border="0" style="width: 100%;"> <tr> <td>Ring back tone</td> <td>Busy tone</td> </tr> <tr> <td>Reorder tone</td> <td>Dial tone</td> </tr> <tr> <td>Off hook warning tone</td> <td>Call waiting tones (multiple)</td> </tr> <tr> <td>Message waiting tone (MWI)/Stutter tone</td> <td>Confirmation Tone</td> </tr> </table> <p>Multiple country support:</p> <ul style="list-style-type: none"> - CID Type - Tone cadence - Ring cadence (Five) - Splash Ring - Line Impedance - Ring Frequency 	Ring back tone	Busy tone	Reorder tone	Dial tone	Off hook warning tone	Call waiting tones (multiple)	Message waiting tone (MWI)/Stutter tone	Confirmation Tone
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SIP OPTIONS	SIP INFO for DTMF/Flash Event SIP NOTIFY SIP PING SIP PRACK								

DTMF Tone / Announcement	DTMF tone detection and generation/RFC2833 Play out any voice stream sent by a SIP Proxy controlled announcement server as well as the following announcements (in English or Spanish): 1. Device IP announcement 3. Internet service is down 2. Internet cable is not connected 4. Device is not registered with the service provider
OAM&P	Access components implemented: - Web, SSH, CLI, HTTP 1.0, SNMP, Telnet, DHCP, or DNS Works with any SNMP (v.1, v.2c)-based EMS Detailed logging at various trace levels and uploading to syslog server Provisionable set feature codes SIP Packet and Media Loopback
GR909 Line Tests	1. FEMF/HAZ – Foreign line voltage detection (PSTN and power crossing) 2. ROH Tests – Receiver off-hook detection 3. REN Test – REN range violation detection 4. Resistive Faults Test – Tip-to-Ring short detection
Other SIP Features	Set Features: Multiple Profile Support - 3-way Conferencing Emergency Number - Call Waiting Speed dialing - Call Transfer (consulted and blind) Secondary Dial tone - Caller ID Display Web page access permission control - Reject Anonymous Call Multiple Language support: - Do not disturb (DND) - English and Spanish (IVR only) - Hot Phone

Physical Specification

Category	Specification
Power Consumption	Idle: 1.32W / Ringing: 4.1W (max @ 3 REN)
Power Adapter	Output: DC 5V, 1A / Input: AC 120V (or 220-240V), 50-60Hz, 200mA
Dimensions	90mm (L) x 58mm (W) x 29mm (H)
Weight	Unit: 0.06 kg (0.12 lb) Packaging: 0.27 kg (0.58 lb)
Operating Temperature	32°F to 104°F (0°C to 40°C)
Storage Temperature	-4°F to 158°F (-20°C to 70°C)
Operating Humidity	10 to 90% RH
Storage Humidity	5 to 95% RH

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