



## AP100 1-Port VoIP Gateway

**VoiceFinder** AP100 Voice Gateway is a small VoIP gateway solution available for small business environments (e.g. SOHO), cyber apartments, Internet games, and Internet users at home. This high quality VoIP product supports both routing and Internet-based voice calling to allow you to easily use VoIP phones at an affordable price.

AP100 is based on a unique QoS algorithm, which is the proprietary technology of AddPac, and a state-of-the-art voice compression algorithm as well as plain-old ones such as G.723, G.729, G.726, and G.711 to ensure the best voice quality of low-speed Internet lines as well as high-speed ones. This product is designed based on high-performance RISC CPU and DSP, and supports higher rate, better quality, and various convenient features. AP100 concurrently supports H.323, SIP, and MGCP, which are VoIP call control protocols.

The technologies of AP100 are differentiated from those of the traditional equipments in that one AP100 supports three call control protocols concurrently; thus, even if you use another Internet Telephony Service Provider (ITSP) that uses a different call control protocol from that of the old service provider, AP100 can easily adapt to a new environment without change.

The front panel of AP100 has LEDs that allow you to monitor the devices in real-time. The two 10/100Mbps Fast Ethernet ports on the rear panel support a variety of network services such as LAN-to-LAN routing, bridge, and NAT/PAT. Since this product supports both static IP addresses and flexible IP addresses for ADSL and cable modems in addition to reliable dedicated lines, you can make a selection depending on your environment. AP100 supports routing and Internet applications such as NAT/PAT, and enables VoIP, IP routers, and IP sharing equipments at one platform. In this regard, this product provides a cost-effective and efficient VoIP phone solution for a private use in a high-speed Internet access environment. The rear panel of AP100 is equipped with power ON/OFF switches that are not supported by a small gateway in general to ensure reliable installation.

The performance and reliability of AddPac VoiceFinder VoIP gateway series have been recognized in global markets as well as the Korean market. AP100, which is a collection of experiences and know-how accumulated in the enterprise and service provider markets, would be a solution that meets the needs of customers that ask for next-generation communications. AP100 supports all of the three VoIP call control protocols, H323, SIP, and MGCP. Also, AP100 provides advanced QoS for better calling quality, various routing services, and network services to present a sure solution to the customers who have prepared for BcN.

## Overview and Features

- Powerful RISC microprocessor and DSP
- Two 10/100 Mbps Fast Ethernet interfaces
- Front panel LEDs that allow you to check the VoIP and LAN ports in real-time
- Triple VoIP stacks supporting SIP, H.323, and MGCP concurrently
- Multi-protocol routing for LAN and WAN access
- Voice Processing
  - VAD, DTMF, CNG, G.168, T.38 G3 Fax Relay
  - Voice Compression Algorithms: G.723, 729A, G.726, and 711
- SNMP MIB V2 for network administration
- Smart, easy Web-based management
- Enterprise VoIP Plug & Play Management System (VPMS) management
- Standard & extended access list for security
- Essential scalability features such as DHCP server & relay, NAT/PAT, IEEE transparent bridging, and debugging/diagnostics
- Remote firmware upgrade using FTP & TFTP
- Cisco-style Command Line Interface (CLI) for expert settings
- Small and compact design
- Power On/Off switches for reliability
- Scalability, authenticity, and reliability ensured due to the installed APOS internetworking software

## APOS Internetworking Software

AddPac VoiceFinder Operating System (APOS™) is software that supports data, voice, video, and security. This internetworking software ensures scalability, authenticity, reliability, QoS, and better performance, and supports industry-standard network protocols and various features.

## AP100 Applications

- VoIP phones between the headquarters and a branch
- VoIP gateways for SOHO
- VoIP phone networks

## Hardware Specification

- Microprocessor (CPU)
  - RISC microprocessor
- Memory
  - System Memory: 2 Mbyte Flash Memory
  - Main Memory: 16 Mbyte high-speed SDRAM
- Status LED: Front Panel
  - Power, LAN0, LAN1, FXS port LEDs
- Analog VoIP Interface: On the side panels
  - FXS Voice Module: 1-port FXS interface (1 x RJ11)
- Optional PSTN Backup Interface: AP100P (1 x RJ11)
- Ethernet Interface: On the rear panel
  - 10/100 Mbps 2-port Ethernet (RJ-45)
- Power ON/OFF Switch: On the rear panel

## Power and Operation Environment

- Power: VAC 110~220V, 50/60Hz  
External Power Supply, Power ON/OFF Switch
- Power Consumption: 5V, 2A, 10 watts
- Operation Temperature: 0°C~+45°C
- Storage Temperature: -40°C~+85°C
- Humidity: 5%~95%

## Size

- Width X Height X Depth: 77 mm x 111 mm x 28.8 mm

## IP Routing Protocol

- Static and IEEE802.1Q VLAN routing

## WAN Protocol

- Broadband IP network environment
- PPPoE
- Industry-standard WAN protocol

## Voice over IP Service

- Supports H.323, SIP, MGCP VoIP signaling protocols concurrently.
- VAD, DTMF, CNG, G.168, T.38 FAX relay
- Supports the H.323 gateway features.
- Supports H.245 tunneling.
- Supports the H.235 security feature.
- SIP IETF RFC3261 or RFC2543 standard
- MGCP IETF RFC2705bis-02 standard
- Voice Codecs: G.723, G.729, G.726, G.711, G.711PLC
- Various supplementary VoIP features
- Compatibility with commercial VoIP gateways
- Compatibility with commercial VoIP gatekeepers, SIP proxy servers, and MGC

## Operation and Management

- Analyzes the performance of processes, CPU, and interfaces.
- Backs up or recovers configuration for APOS management.
- Supports debugging and diagnostics.
- Boots or reboots the system using Watchdog.
- Administers the system by enabling data logging.
- Creates a statistic of IP traffic by enabling the accounting feature.

## Network Administration and Operation

- Supports the standard SNMP agent (MIB v2).
- Supports easy Web-based Installation setup.
- Supports management based on Telnet.
- Downloads configuration remotely using FTP/TFTP.
- Upgrades firmware remotely using FTP/TFTP.

## Traffic QoS Control

- Controls traffic QoS for each service.
- Controls priority setting (voice and data).
- Supports various QoS algorithms.

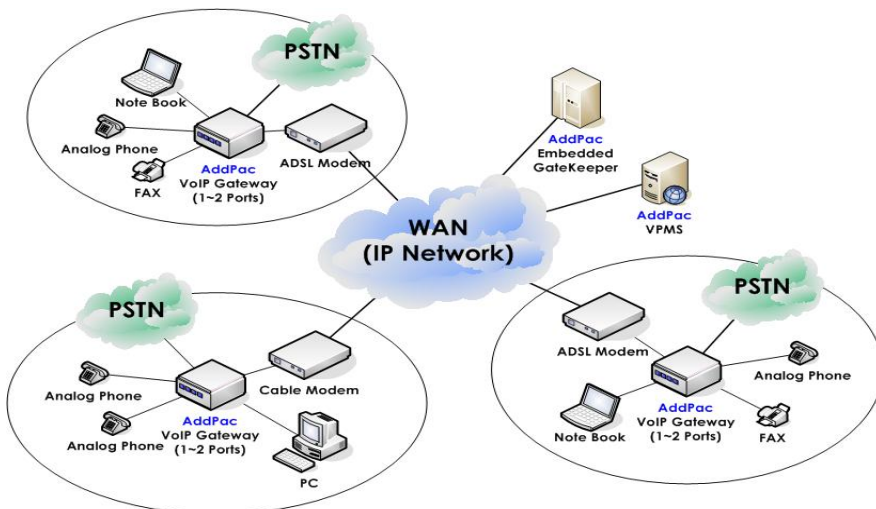
## Information Protection

- IP Packet Filtering and Access List
- Access Control and Data Protection
- Enabling/Disabling Specific Protocols
- Multi-Level User Account Management
- Auto-Disconnecting Telnet/Console Sessions
- PPP User Authentication Support
  - Password Authentication Protocol (PAP)
  - Challenge Handshake Authentication Protocol (CHAP)

## Supplementary Features

- Supports DHCP servers and relay.
- Supports Network Address Translation (NAT).
- Supports Port Address Translation (PAT).
- Transparent Bridging (IEEE Standard)
  - Spanning Tree Bridging Protocol
  - Concurrent Routing and Bridging
- Supports Network Time Protocol (NTP).
- Supports Cisco-style Command Line Interface (CLI).
- Supports industry-standard network protocols.

## Network Configuration



## Ordering Information

- AP100: Standard Configuration
- Two (2) Fast Ethernet Port
  - RISC CPU + DSP,
  - 2 MB Flash, 16MB SDRAM
  - 1-Port FXS Interface
  - Power ON/OFF Switch
  - LAN Cable
- AP100P: Optional PSTN Backup Interface