Fiber Gateway

GW421W

Fiber Based IAD With Wireless LAN

The GW421W is a single mode Fiber and VoIP-based IAD, which is designed to interoperate with end-to-end fiber CO from major vendors to meet the worldwide market requirements. It is Class 1 laser product complied with EN 60825-1. The integrated Ethernet switch features automatic crossover-correction and speed sensing for easily connecting to user's PCs or LAN environment. Alternatively the built-in 802.11g WLAN brings relief to those troublesome wirings. Two lines of telephony service are provided using VoIP technology with SIP and MGCP signaling protocol. By offering the flexibility to service provider with one model that fits different kind of internet applications.

Features

- Fiber interface supports up to 100 Mbps downstream and 100 Mbps upstream rates

- Integrated four-port Ethernet switch with automatic speed-sensing and crossover correction

- 802.11b/g WLAN supports up to 54 Mbps transmission rate

- Secure transmitting encryption by either 802.1x; WEP; WEP2; WPA; WPA2; TKIP; AES; 802.11i

- One FXO port for failsafe lifeline, two FXS ports for VoIP using POTS phone set

- Support voice CODECs like G.711, G.726, G.729AB, BV16, ILBC, T.38 etc.; programmable G.168 echo cancellation, adaptive jitter buffer and packet loss concealment

- Voice activity detection (VAD), comfort noise generation (CNG) and caller ID

- DTMF tone detection and generation; Fax / Modem detection and pass-through

- Support SIP signaling protocol and bonus services like call forwarding, call waiting, call transfer, call busy, call return, enquiry service, CLIP/CLIR and three way conference

- Support Networking protocols such as PPP, NAT, Routing, DHCP server / relay / client

- Configuration and management by Web-browser through the Ethernet interface and remotely through WAN interface

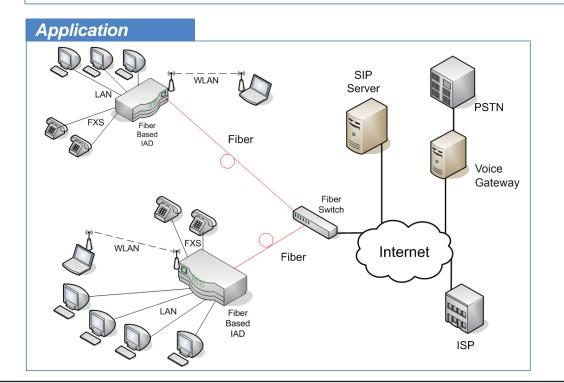- Firmware upgradeable through HTTP / TFTP

- Support TR-069 and TR-104

Ordering Information

- GW421FW   Fiber based IAD with fiber uplink & wireless LAN
- GW421EW   Fiber based IAD with copper uplink & wireless LAN
- GW421F   Fiber based IAD with fiber uplink
- GW421E   Fiber based IAD with copper uplink

Specifications

Hardware		
Local Interface	Four 10/100 Base-T Ethernet ports in RJ-45 connector, comply with IEEE 802.3u	
	Integrated 802.11g WLAN Access Point with external antenna, backward compatible with 802.11b	
WAN Interface	Single-mode single fiber transceiver Operates at a nominal wavelength of 1310 nm and receiver at 1550nm.	
	Build-in 1310/1550 nm WDM filter Bi-directional single fiber	
Analog Voice Interface	2 * FXS ports with RJ-11 connectors for analog phone set connection	
	1 * FXO port with RJ-11 connector for PSTN	
Indicators	Front Panel	PWR – ON when the power supply is properly connected.
		WAN – Blinking while ADSL is training, and ON when
		WLAN – Blinking while WLAN is transmitting data, and ON
		TEL1 – Green when VoIP call is working.
		TEL2 – Green when VoIP call is working.
		LAN1-4 – Green when LAN is
	Rear Panel	Each Ethernet port got speed (10/100) and activity indicators.
OAM&P	Through Web browser, remotely or locally	
	One hidden console port (RS-232) for maintenance	
Environment	Operation Temperature: 0°C ~ 45°C	
	Operation Humidity: 5% ~ 95% (non-condensing)	
	Storage Temperature: -20°C ~ +85°C Storage Humidity: 5% ~ 95% (non-condensing)	
Power	DC adapter :Input 120 VAC/60Hz or 230VAC/50Hz; Output 15VAC 1A, power consumption: Less than 15 watts	
Dimensions(WxDxH)	165 x 220 x 29mm	
Certification	CE, CB (TBD)	

Specifications

◢

Software	
Routing	Support Point-to-Point Protocol (PPPoE) and user authentication via PAP, CHAP or MS-CHAP
	Routing Information Protocol (RIP) v1 and v2, static route
	DHCP client, server and relay agent
	NAT / PAT – RFC1631 with support for extensive ALGs
	DNS relay
Firewall	NAT: 16 sessions, DMZ and ALGs
	Stateful Packet Inspection (SPI) with DOS protection - Ping of Death, SYN Flood LAND
	Protection against IP and MAC address spoofing
	UPnP NAT traversal and VPN / IPSec pass-through
Wireless	Supports 802.1x; WEP; WEP2; WPA; WPA2; TKIP; AES; 802.11i
	Hidden SSID
	WMM for advanced Quality of Service
	AES in hardware
	125 High Speed Mode: Standards-plus performance enhancement delivers best real-world performance as the client card use the same 125 High Speed Mode
Voice	FXO for failsafe lifeline
	Supports voice CODECs like G.711, G.726, G.729AB, BV16, ILBC, T.38 etc
	G.168 line echo cancellation with programmable tail
	Adaptive jitter buffer, packet loss concealment (PLC), voice activity detection (VAD), comfort noise generation (CNG) and Caller ID
	DTMF tone detection and generation; Fax / Modem detection and pass-through
VoIP and Telephony Bonus Services	Supports SIP (RFC3261), SDP (RFC2327, RFC3264) as well as both TCP and UDP transport
	Supports User Agent Client (UAC) - User Agent Server (UAS) call, or proxy call routing
	Supports SIP and telephone URL addressing
	Supports in-band DTMF tone sending / receiving and out-band DTMF signaling with RTP, as per RFC2833
	Bonus services include: − Call Forwarding: Unconditional, No Response, On Busy − Call Waiting: Force busy, Pickup and release old, Pickup and put old on hold, Switch between two calls − Call Transfer, Call Back busy subscriber, Call Back last number called (call return) − Enquiry service
	Provisioning through TFTP client with configuration profile
Configuration and Network Management	SNMP GETs, SETs and TRAPs for four groups in MIB-II
	Embedded syslog; SNTP with DHCP options
	UPnP Internet Gateway Device (IGD) compliance
	Management and configuration via Web / HTTP
	Firmware upgrade using HTTP or TFTP
	Support TR-069 and with parameters: DeviceInfo, management server, time, IPPingDiagonostic, etc
	Support TR-104

Application

IP Surveillance

2 Fiber Series

PDH Series

Broadband Access

Measurement

Interface Converter

Datacom Accessories

Network Management