



## FXS/FXO VoIP Gateway



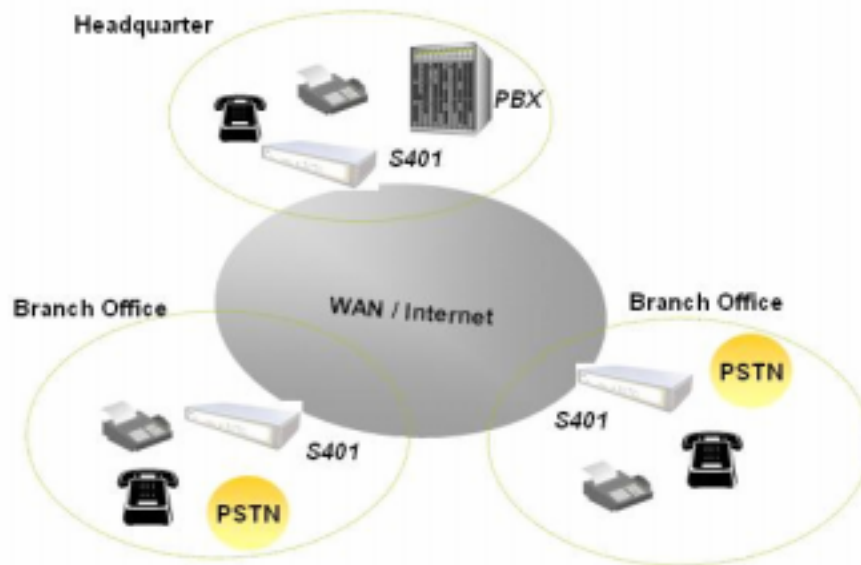
*The S400/S200 VoIP Gateway is fully H.323/SIP standard compliant residential gateway that provides a total solution for integrating voice-data network and PSTN. By simple installation, this revolutionary compact voice over IP (VoIP) gateway could be configured as a 2/4 FXS/FXO VoIP Gateway which provides voice connectivity over the IP network and to the Public Switched Telephone Network (PSTN). This Soundwin Gateway is equipped with a four port Ethernet switch and built-in NAT router function that provides Internet access using only one IP address. Besides, it provides high voice quality and optimized packet voice streaming over managed and public (Internet) IP networks.*

### **VoIP Key Features**

- Caller ID Delivery and Detection: FXS support DTMF&FSK Caller ID generation; FXO supports DTMF&FSK Caller ID detection.
- Greeting Message \*
- Smart VoIP call Dialing Book: VoIP call Book could provide any application VoIP call to any type destination (Domain name/IP address, PSTN or PBX) or hunting number setting.
- AC termination Impedance : 600/900 OHM and complex impedance
- Polarity Reversal Detection: Type I and Type II
- passNAT: This feature allow gateway to operate behind any NAT/Firewall device. There is no need to change any configuration of NAT/Firewall like setting virtual server.
- Smart-QoS Guaranteed: This bandwidth management feature provide good voice quality when user place VoIP call and access internet at the same time. The gateway will start reserve bandwidth for voice traffic automatically when VoIP call proceeds.
- Voice channels status display: This function display each port status like as onhook, offhook, calling number callee's number, talk duration, codec.
- H.323 MAC authentication : Providing H.323 MAC authentication to register H.323 Gatekeeper which need Mac address for authentication. (Note : Soundwin's Embedded H.323 Gatekeeper provides IP address, H.323 ID, MAC address authentication policy)

### **Application Scenario:**

The following application was use in Multi-Office as an example:



#### ◉ **Telephony Specification:**

- ☒ Voice Codec: G.711(A / u law), G.729 AB, G.723
- ☒ FAX support : T.30 / T.38
- ☒ Echo Cancellation: G.165/G168
- ☒ FXO Caller ID detection : DTMF and FSK
- ☒ Adjustable AC Termination Impedance : 600 / 900 OHM and complex Impedance
- ☒ Life-Line support (IP/ power failure over relay)
- ☒ IVR/Greeting Message Play \*
- ☒ Polarity Reversal : Type I and Type II

#### ◉ **IP Specifications:**

- ☒ H.323 v2/v3/v4 and SIP (RFC 2543/3261) , SDP (RFC 2327), Symmetric RTP, STUN (RFC3489), ENUM (RFC 2916)\*.
- ☒ LAN :NAT, virtual, DHCP Server
- ☒ WAN: PPPoE client, DHCP client, Fix IP Address, DDNS client
- ☒ Network Address Translation: Providing build-in NAT router function.
- ☒ Smart QoS: Guarantee the voice bandwidth

#### ◉ **Call Features**

- ☒ Voice channels status display
- ☒ Direct Call Mode : peer to peer call
- ☒ Register Call Mode : register to H.323 Gatekeeper or SIP Proxy Server
- ☒ Adjustable volume : - 9 db ~ 9 db
- ☒ Silence Compression
- ☒ Auto Dial for speed
- ☒ Dynamic Jitter Buffer

#### ◉ **Configuration & Management**

- ☒ web-based Graphical User Interface



- ☒ Remote management over the IP Network
- ☒ FTP firmware upgrade
- ☒ Backup and Restore Configuration file

**🔴 General Specification**

- ☒ AC power : AC100V-240V, DC12V/1.5A,50/60 Hz
- ☒ Temperature: 0°C ~ 45°C (Operation)
- ☒ Humidity: up to 90% non-condensing
- ☒ Emmision: FCC Part 15 Class B, CE Mark
- ☒ Telephone Safety : FCC Part 68
- ☒ Dimendion : 260 x 165 x 35 mm
- ☒ Weight: 1500g

**Note: the note (\*) function will be ready soon**



## S400/200 VoIP Gateway Catalogue

	S400	S401	S402	S404	S200	S201
<i>Ethernet Port</i>	4 LAN + 1 WAN					
<i>Telephony channels</i>	4 Channels				2 channels	
<i>FXS/FXO</i>	4FXS	3FXS+1FXO	3FXS+1FXO	4FXO	2FXS	1FXS+1FXO
<i>H.323 v2/v3/v4</i>	✓	✓	✓	✓	✓	✓
<i>Embedded H.323 Gatekeeper</i>	optional	optional	optional	optional	optional	optional
<i>SIP(RFC3261)</i>	✓	✓	✓	✓	✓	✓
<i>Smart-Qos</i>	✓	✓	✓	✓	✓	✓
<i>passNAT</i>	✓	✓	✓	✓	✓	✓
<i>Echo Cancellation</i>	✓	✓	✓	✓	✓	✓
<i>G.711 a/u law G.723, G729AB</i>	✓	✓	✓	✓	✓	✓
<i>T.38/T.30</i>	✓	✓	✓	✓	✓	✓
<i>NAT Router</i>	✓	✓	✓	✓	✓	✓
<i>DHCP server for Private Network</i>	✓	✓	✓	✓	✓	✓

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