

# User Manual

Model: GW0421 (SIP)



**(Note:** please refer to this Manual carefully, and configure according to the step below strictly before using the devices. You should save and reboot after initial setting)

# 1. Products package

- GW0421 Phone adapter
- Power Adaptor
- Products warranty card
- Network crossover cable (grey color) and parallel cable (green color)
- CONSOLE cable

## 2 Appearance of products

### 2.1 Front panel



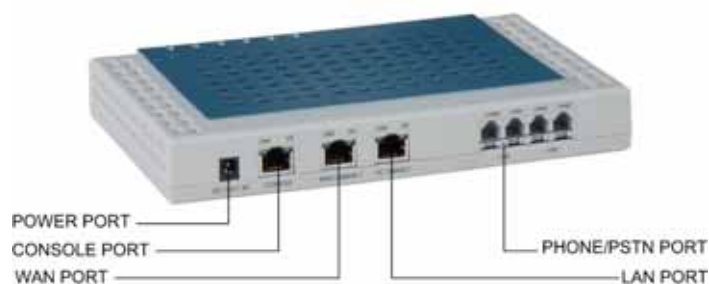
**Power LED (Green):** LED on shows, power is in place.

**Active LED (Green):** LED blinking shows, GW0421 is sending / receiving data.

**Phone LED (Green):** LED on shows, the phone port is in used.

**PSTN LED (Green):** LED on shows, the PSTN port is in used.

### 2.2 Back panel



- **Back panel port**

Interface	Description
Power Port	Input DC/12V0.6A
CONSOLE Port	Console configuration interface by PC
WAN Port	RJ45 Ethernet interface to connect INTERNET.
LAN Port	RJ45 Ethernet interface to connect LAN or PC
PHONE Port	FXS interface, connect phone of fax machine.

- **Back LED**

Back LED	Description
TX / RX ( CONSOLE )	Data stream LED on during working
LINK (WAN or LAN)	Chain LED on shows normal
T/R (WAN or LAN)	Data stream LED shows working

## 3 Hardware connection

### 3.1 Telephone connection

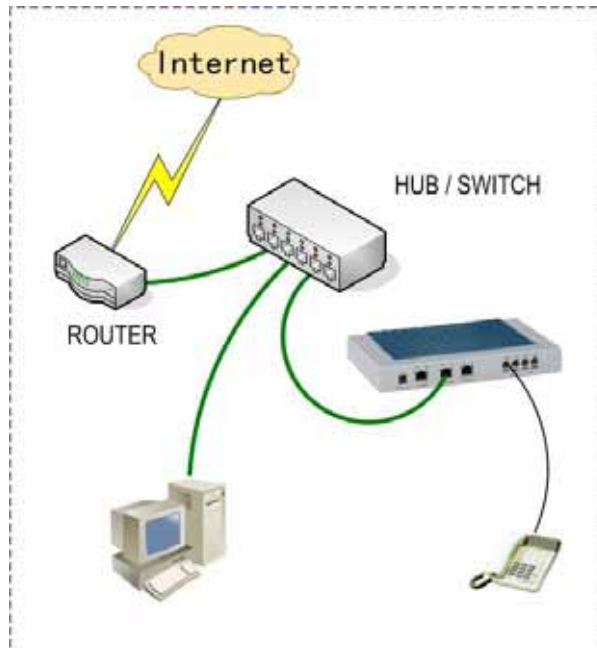
FXS interface connects phone or fax machine. FXO interface connects PSTN line or PBX extension, please care for the difference between them.



### 3.2 Network connection

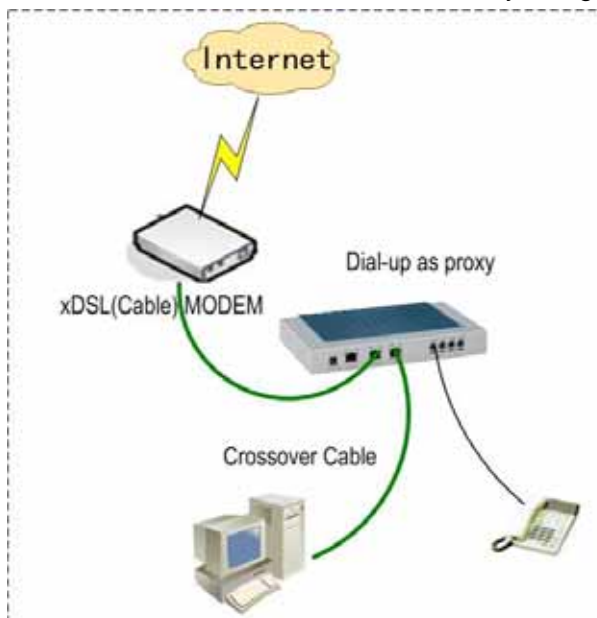
- **Connect to IP under DHCP and static IP condition.**

- 1) Adaptable for company and household who installed inside LAN.
- 2) WAN port of GW0421 connects HUB or Switch.
- 3) WAN port gets DHCP or static IP.



● **Dial-up network as a proxy**

- 1) WAN port GW0421 connects directly to xDSL ( Cable) Modem.
- 2) GW0421 as proxy, mainly used to share dial-up network.
- 3) LAN port of GW0421 connects Network interface of PC by using crossover Cable.

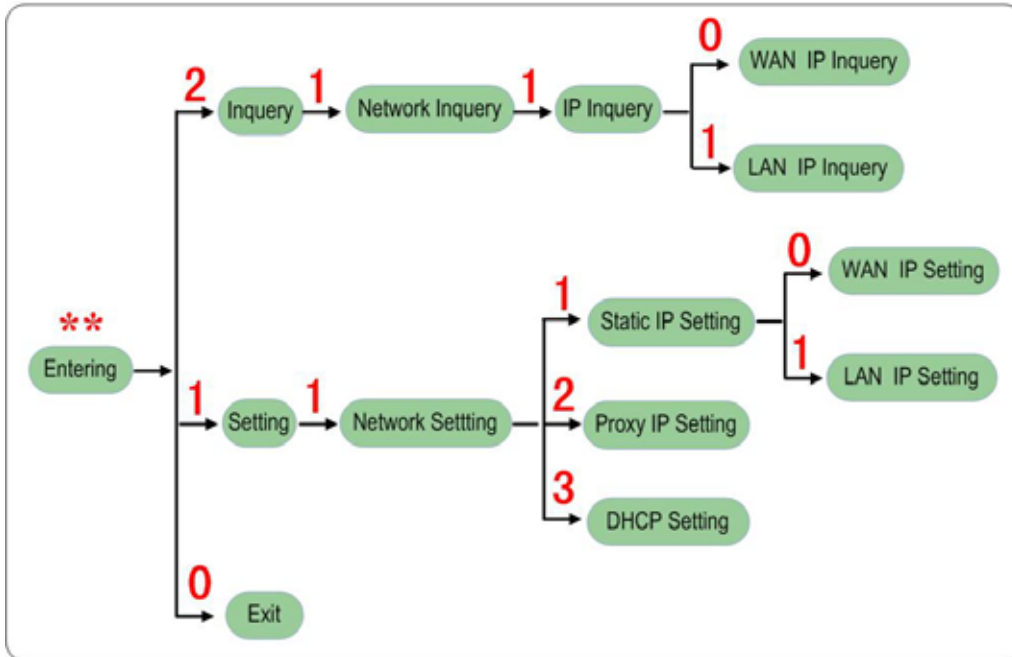


## 4. Network configuration

### 4.1 Configuration by IVR

Connect analogue telephone to any one Phone Port (FXS Port) of GW0421.

After holding up, press the star keys“\*”twice, user can hear “welcome to enter IVR configuration system”, and input the password (the default is **888**), and go on.



#### Note

- The port with 10M means WAN port and 100M for LAN port when voice cue is appeared.
- Enter IP address and Subnet mask by using “\*” to replace “.”. For example, **192.168.0.215** can be changed for **192\*168\*0\*215#**, please note the last step is to confirm with the key “#”.
- Enter“1” to quit after setting, and “1”for save.

### 4.2 Configuration by WEB

#### ● Entering into WEB GUI

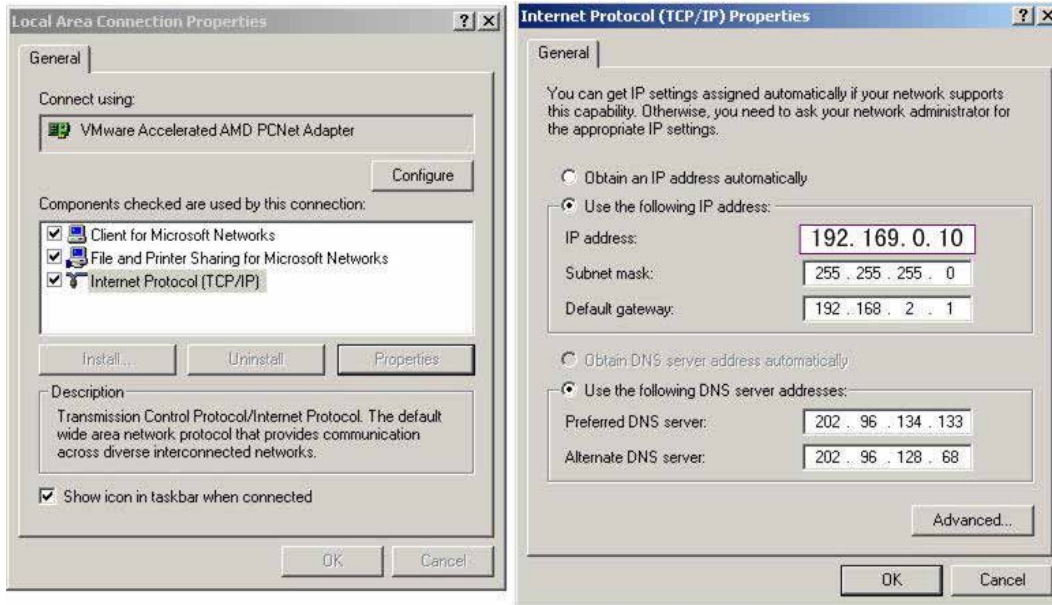
##### Step one

Choose PC after setting network card and TCP/IP protocol. Connect PC to LAN port of GW0421 crossover cable (using other device such as HUB, Switch.)

##### Step two

Pitch on “Local connection” after opening “network neighbor”. Hit right key to choose property such as below picture. Configure IP address of PC to be in the same network

segment with LAN IP of GW0421. (The default IP of LAN port for GW0421 is **192.169.0.235**, subnet mask is **255.255.255.0**.)



**Step three:**

Open IE browser, enter LAN port IP address of GW0421. Input user name and password (default user: **admin**. password: **admin**), entering into WEB GUI configuration.



- **Network configuration**

After entering into WEB GUI, open “Network Setting > WAN Setting”, it can be divided into three modes.)

**Web Configuration System**

**Ethernet Settings**

**Network Setting**  
[Sip Setting](#)  
[Ports Setting](#)  
[Dialing Plan](#)  
[System Function](#)  
[Current Status](#)

**Gateway Info**

Host Name:

MAC Address:

**Select IP Type**

DHCP

PPPoE

Static IP

Username:

Password:

MTU:

IP Address:

NetMask:

Gateway:

**DNS Settings**

Primary DNS:

Secondary DNS:

**Time Server**

Primary Time Server:

Secondary Time Server:

TimeZone:

**1) DHCP mode**

Start "DHCP" mode (using DHCP to get IP address) and save from "Select IP Type".

**Select IP Type**

DHCP

PPPoE

Static IP

Username:

Password:

MTU:

IP Address:

NetMask:

Gateway:

**2) PPPoE mode**

Start "PPPoE" mode (PPPoE dial-up, input user name and password), and then save from "Select IP Type".

**Select IP Type**

DHCP  
 PPPoE

Static IP

Username:   
 Password:   
 MTU:   
 IP Address:   
 NetMask:   
 Gateway:

### 3) Static IP mode

Start “Static IP” mode (input IP address, Subnet mask and Default gateway), and then save from “Select IP Type”.

**Select IP Type**

DHCP  
 PPPoE  
 Static IP

Username:   
 Password:   
 MTU:   
 IP Address:   
 NetMask:   
 Gateway:

## 5 Advanced options

### 5.1 SIP server setting

Open “SIP Settings” to set SIP server parameters, the typical parameters are referenced as below:

- SIP proxy, like domain name or IP address.
- SIP proxy port, the default is 5060.
- SIP registrar, like domain name or IP address.
- SIP registrar port.
- SIP realm, the same is SIP proxy.

- SIP port, the default is 5060.

**SIP Settings**

**SIP Server Settings**

SIP Proxy:	<input type="text" value="sip.123.com"/>
SIP Proxy Port:	<input type="text" value="5060"/> (Optional)
OutBound Proxy:	<input type="text"/>
OutBound Proxy Port:	<input type="text" value="0"/> (Optional)
SIP Registrar:	<input type="text" value="sip.123.com"/>
SIP Registrar port:	<input type="text" value="5060"/> (Optional)
SIP Realm:	<input type="text" value="127.0.0.1"/>

**SIP Local Settings**

SIP Port:	<input type="text" value="5060"/>
Register Expires(s):	<input type="text" value="60"/>

## 5.2 Ports setting

Open “Ports Setting > Single Port Setting” to configure the caller number, PHONE port (PSTN port) other parameters. The typical parameters are referenced as below:

- Select Port: Line0, Line1, Line2 or Line3 (the different port).
- Work status: on or off.
- Password: register password.
- Phone Number: Caller Number.
- Prefix: Called prefix.

Ports Settings

**Select Port** Line 0 ▾

**Work Status**

Port Type: FXS Port Status: On ▾

**SIP Settings**

Password:  Phone Number:

Prefix1:  Prefix2:

**Media Configuration**

Ring Mode: Terminal ▾ TOS: 5 ▾

Preferred Codec: G723/6 ▾ Nob: 2 ▾

Fax Mode: T38 ▾ Fax Rate: 14400 ▾

Fax Redundancy: 1 ▾ DTMF Tx Method: InBand ▾

RTP Port Base:  Skip:

**Advanced Function**

Caller ID: Disable ▾ Billing: Disable ▾

Display Name:

Hotline Number:  IP-PSTN Switch: Disable ▾

Call Transfer:

## 5.3 Dialing plan

Open “Dialing Plan > Single Plan Setting”, the typical parameters are referenced as below:

- Dialing Plan: the default “T” can be defined as any number.
- IP Map Rules: registering with GK where should be set as 0.0.0.0
- Digit Map Rules: configuration of replacement principle of called number.
- Intelligent Route: aimed at 2FXS+2FXO and 4FXO.

Dialing Plan

**Dialing Plan** < [Previous](#) [Next](#) [New](#) [Delete](#) >

<b>Dialing Plan:</b>	<input type="text" value="T"/>
<b>IP Map Rules:</b>	<input type="text" value="0.0.0.0"/>
<b>Advanced Function</b>	
<b>Digit Map Rules:</b>	<input type="text" value="-0 + /"/>
<b>Ring Mode:</b>	<input type="text" value="Relay"/>
<b>Intelligent Route:</b>	<input type="text" value="Auto"/>

## 5.5 Status check

Open "Current Status", the typical parameters are referenced as below:

- Ethernet setting, WAN port information.
- SIP setting, SIP server information. Checking it if registered or not.
- The current Codec
- Software version information.

View Current Status	
<b>Ethernet Settings</b>	
Current IP :	192.168.0.203
PPPoE Status :	Offline
<b>SIP Settings</b>	
SIP Registrar :	sip.123.com (DOWN) (DOWN)
SIP Proxy :	sip.123.com
SIP Realm :	127.0.0.1
SIP Port :	5060
<b>NAT Status</b>	
NAT Server :	Disabled
<b>Codec</b>	
Optional Codec :	G723/6, G723/5, G729, G729A, G729B, G729AB, G711U, G711A.
<b>Time</b>	
System Time :	1970/01/01 04:32:44
Working Time :	04:32:44
<b>Version</b>	
Software Version:	V02.02.R1.300

## 5.6 Software update and setting default.

- **Software update**

Open "System Function > Software Update " to update software version.

Software update	
<b>HTTP update</b>	
Select file:	<input type="text"/> <input type="button" value="Browse..."/>
	<input type="button" value="Install"/>
<b>FTP Update</b>	
FTP IP:	<input type="text"/>
File Name:	<input type="text"/>
	<input type="button" value="Update"/>

- **Setting default**

Open "System Function > Resume Default Setting" to set default.

[Warning]: If you press 'Set default' button, the settings of the gateway will go back to the original.

You will re-configure the gateway to fit your need.

Set default