



Network Configurations for VoIP Phones

The first step is finding out who your ISP is and if you are using a Gateway (modem/router all in one combo) or a Modem that connect to a router. Our two most common examples are U-Verse and Comcast.

U-verse Instructions (you will need an additional router):

1. Contact AT&T/U-Verse and have them place the router behind the DMZ (DMZ Plus) area and connect the router directly to the gateway.
2. Connect the phones to that router and not to the U-Verse gateway.

Comcast/Cox/TimeWarner Instructions (you will need an additional router):

1. Place the Comcast/Cox/Timewarner Gateway into 'Bridge mode' - this will require contacting the ISP in most cases.
2. Using the gateway in bridge mode as a normal modem, connect your router to this and then connect your phones directly to the router or additional switches which connect to the router.

Note: This guide specifies Comcast (and similar cable ISPs) and U-Verse because they are the most common and have the most configuration required, however these above steps will work with most other companies as well.

Router Settings:

There are settings that should be adjusted on all routers in order to perform correctly regardless of your ISP:

- DISABLE SIP ALG – if it is enabled (not all routers have this setting, if setting is not found, it may be enabled by default and unable to change, you may need to replace the router with one that can be disabled)
- Make sure NAT is enabled – please be aware that if there is more than one router in the path, there could be 'DUAL NATTING.' If this is the case, you may need to put the second router in BRIDGE mode. You may need to contact your Internet Service Provider to assist.
- DISABLE Universal Plug'N'Play (UPnP)
- Enable QoS (Quality of Service) if available
- You may also need to open the following ports on your router/firewall:
 - **Port 5060 TCP and UDP** (this is for the SIP call messaging)
 - **Ports 16348-32768 UDP** (this is for all RTP and audio streams)