Linksys SPA-9000 – Usage Examples

The Linksys SPA-9000 is an IP based PBX system suitable for for small office, home office (SOHO) applications. Additionally it has a built-in router which (when used with a network switch or hub), allows the connection of over 250 devices.

Diagram 1 below shows a typical usage example for a small business who are using the SPA-9000 as their router as well as their PBX.
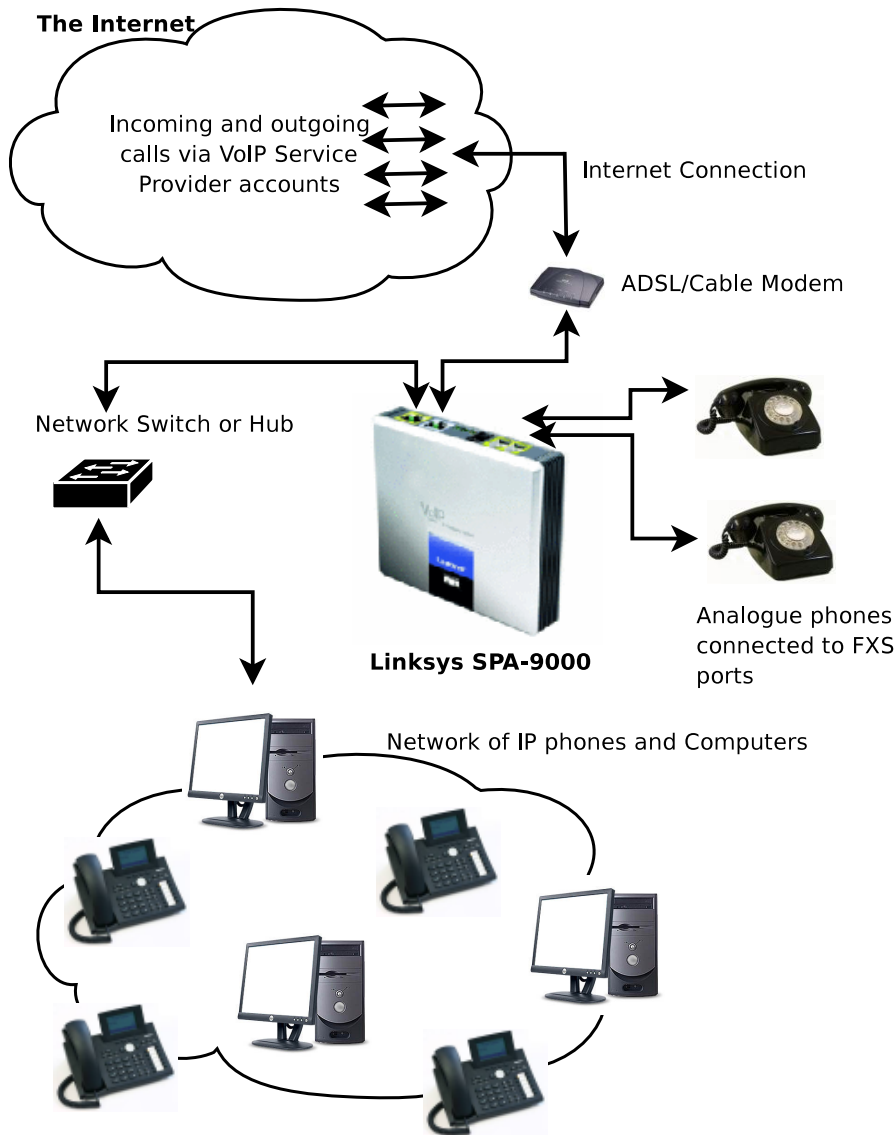

Diagram 1: Using the SPA-9000 as a PBX and router.

Here the Internet may be a cable connection (such as NTL or Telewest) or via a standalone ADSL modem. The SPA-9000 is working as a router and basic firewall as well as the PBX. Up to sixteen IP phones, analogue adaptors or softphones running on PCs can be connected (which aren't necessarily in one building) and four Service Provider registrations can be setup. Since the SPA-9000 also has two FXS ports, two analogue telephones can be connected directly to the unit itself without the need for separate analogue adaptors.

The system offers all the usual features of a PBX such as call transfers, interactive voice menus, call parking and much more. Voicemail will usually be handled by the Service Provider accounts but a local media server

can be used to handle things like voicemail and music-on-hold.

Diagram two shows another typical usage example for the SPA-9000.

The Internet

Incoming and outgoing calls via VoIP Service Provider accounts

Internet Connection

Linksys SPA-9000

Analogue phones connected to FXS ports

Router and Firewall

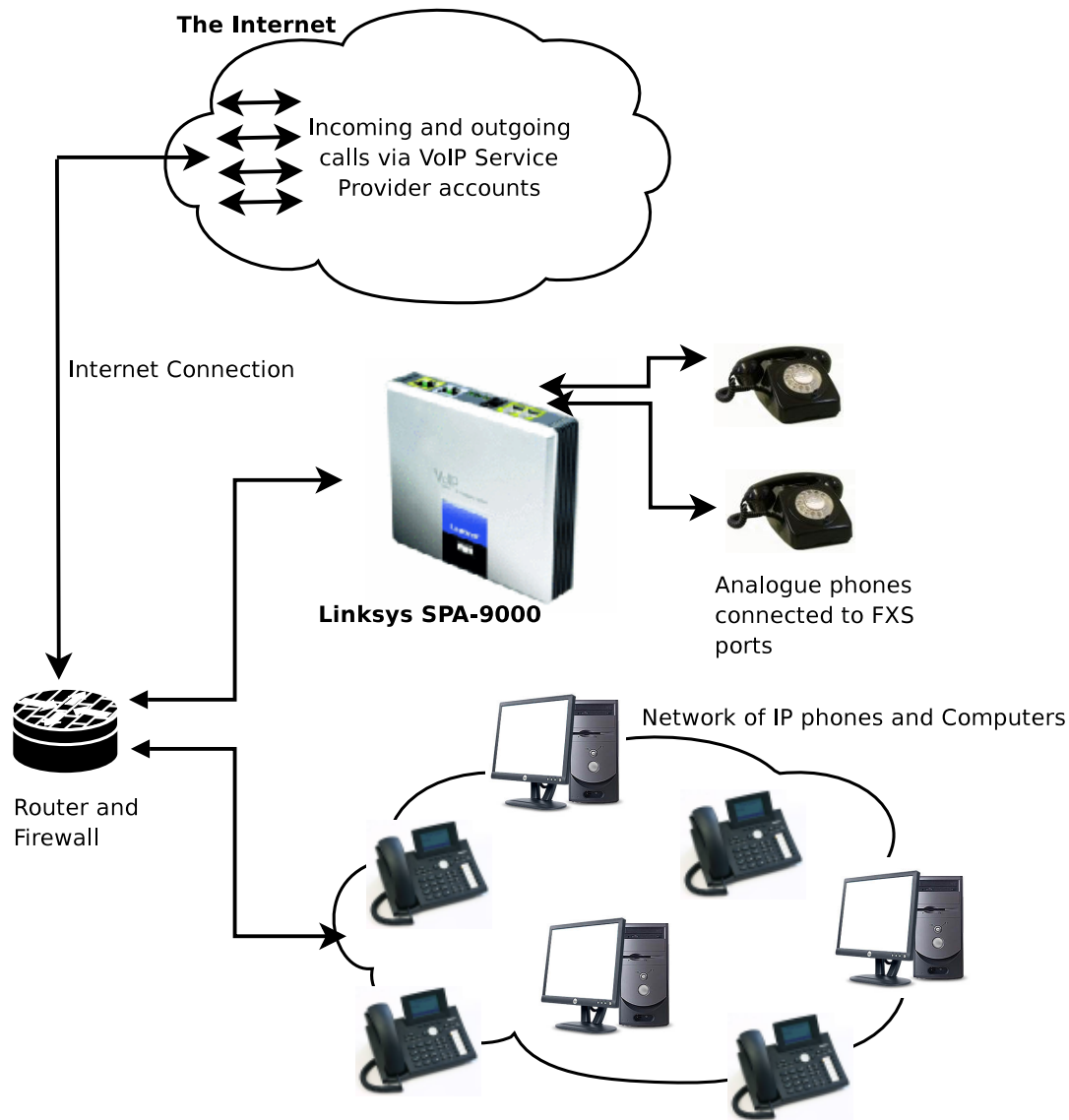Network of IP phones and Computers

Diagram 2: Using the SPA-9000 With an External Router and Firewall.

In this example, the router function of the SPA-9000 is not being used. The Internet connection can be of any type as the external router deals with this. All the PBX functionality of the SPA-9000 is still available, this configuration offers no disadvantages in comparison to the first example. However it may be necessary to configure the external router/firewall to allow VoIP traffic to pass. ProVu can offer assistance with this configuration.