Cisco DSL Router Configuration and Troubleshooting Guide − Cisco DSL Router: RFC1483 Pure Bridging

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Introduction

Your Internet Service Provider (ISP) has assigned you a bridged connection.

Tip: If you are not familiar with how to configure Cisco devices and would like to follow a step−by−step configuration, refer to Step−by−Step Configuration of RFC1483 Pure Bridging.

Prerequisites

Requirements

There are no specific requirements for this document.

Components Used

This document is not restricted to specific software and hardware versions.

Conventions

Refer to Cisco Technical Tips Conventions for more information on document conventions.

Tasks to Perform

- Manually configure PC clients with the information provided by your ISP.
    - ♦ IP addresses and subnet masks.
    - ♦ Default gateway.
    - ♦ Domain Name Server (DNS) IP addresses.

- Configure **no ip routing** and **bridge 1 protocol ieee** on the Cisco Digital Subscriber Line (DSL) Router.
- Configure the ATM interface (the Asymmetric Digital Subscriber Line (ADSL) interface) with an ATM permanent virtual circuit (PVC) and encapsulation.
- Configure **bridge−group 1** on the ATM and Ethernet interfaces.

Note: When the Cisco DSL Router is in bridge mode, Network Address Translation (NAT) and Dynamic Host Control Protocol (DHCP) server configurations are not supported.

Configure

Tip: If you are not familiar with how to configure Cisco devices and would like to follow a step−by−step configuration, refer to Step−by−Step Configuration of RFC1483 Pure Bridging.

Cisco DSL Router with RFC1483 Pure Bridging

```
!−−− Comments contain explanations and additional information.


service timestamps debug datetime msec
service timestamps log datetime msec
!
no ip routing
!
interface ethernet0
 no shut
 no ip directed−broadcast
 bridge−group 1
!
interface atm0
 no shut
 no ip address
 no ip directed−broadcast
 no atm ilmi−keepalive
 pvc <vpi/vci>
  encapsulation aal5snap

!−−− Common PVC values supported by ISPs are 0/35 or 8/35.
 !−−− Confirm your PVC values with your ISP.

 !
 bridge−group 1
!
bridge 1 protocol ieee
!
end
```

Verify

There is currently no verification procedure available for this configuration.

Troubleshoot

If your ADSL service is not working properly, refer to Troubleshooting RFC1483 Pure Bridging.

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Related Information

- **Cisco DSL Router Configuration and Troubleshooting Guide − RFC1483 Bridging Implementations**
- **Cisco DSL Router Configuration and Troubleshooting Guide**
- **Technical Support & Documentation − Cisco Systems**

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