



# Per-User QoS via AAA Policy Name

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The Per-User QoS via AAA Policy Name feature provides the ability to download a policy name that describes quality of service (QoS) parameters for a user session from a RADIUS server and apply them for the particular session.

## Finding Feature Information

Your software release may not support all the features documented in this module. For the latest feature information and caveats, see the release notes for your platform and software release. To find information about the features documented in this module, and to see a list of the releases in which each feature is supported, see the [“Feature Information for Per-User QoS via AAA Policy Name” section on page 6](#).

Use Cisco Feature Navigator to find information about platform support and Cisco IOS and Catalyst OS software image support. To access Cisco Feature Navigator, go to <http://tools.cisco.com/ITDIT/CFN/jsp/index.jsp>. An account on Cisco.com is not required.

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# Prerequisites for Per-User QoS via AAA Policy Name

Before you configure the Per-User QoS via AAA Policy Name feature, you must locally define on your router the policy whose name is received from the RADIUS server.

## Information About Per-User QoS via AAA Policy Name

Effective with Cisco IOS Release 12.2(15)T, separate Cisco vendor-specific attributes (VSAs) are added for the service map.

To configure the Per-User QoS via AAA Policy Name feature, you must understand the following concept:

## VSAs Added for Per-User QoS via AAA Policy Name

Two new VSAs have been added for the service map, and the VSAs will bypass the parser while applying the policy for a particular user or session. The new VSAs are as follows:

- vendor-id=9 (Cisco) Vendor type 37 for upstream traffic to input policy name
- vendor-id=9 (Cisco) Vendor type 38 for downstream traffic to output policy name

## How to Configure Per-User QoS via AAA Policy Name

This section contains the following procedure:

- [Monitoring and Maintaining Per-User QoS via AAA Policy Name, page 2](#)

To configure per-user QoS, use the authentication, authorization, and accounting (AAA) policy name that you have received from the RADIUS server. To configure QoS policy, refer to the [“Related Documents” section on page 4](#).

## Monitoring and Maintaining Per-User QoS via AAA Policy Name

To monitor and maintain per-user QoS using the AAA policy name, use the following **debug** commands:

### SUMMARY STEPS

1. **enable**
2. **debug aaa authorization**
3. **debug aaa per-user**

## DETAILED STEPS

	Command or Action	Purpose
Step 1	<b>enable</b>  <b>Example:</b> Router> enable	Enables privileged EXEC mode. <ul style="list-style-type: none"> <li>Enter your password if prompted.</li> </ul>
Step 2	<b>debug aaa authorization</b>  <b>Example:</b> Router# debug aaa authorization	Displays information about AAA/TACACS+ authorization.
Step 3	<b>debug aaa per-user</b>  <b>Example:</b> Router# debug aaa per-user	Displays information about per-user QoS parameters.

## Configuration Example for Per-User QoS via AAA Policy Name

The following example shows per-user QoS being configured using the AAA policy name “policy\_class\_1\_2”:

```

!NAS configuration
class-map match-all class1
  match access-group 101
class-map match-all class2
  match qos-group 4
  match access-group 101

policy-map policy_class_1_2
  class class1
    bandwidth 3000
    queue-limit 30
  class class2
    bandwidth 2000
  class class-default
    bandwidth 500

!RADIUS Profile Configuration
peruser_qos_1 Password = "password1"
  Service-Type = Framed,
  Framed-Protocol = PPP,
  Cisco:Cisco-avpair = "ip:sub-policy-In=ssspolicy"
!ssspolicy in the above line is the name of the policy.

peruser_qos_2 Password = "password1"
  Service-Type = Framed,
  Framed-Protocol = PPP,
  Cisco:Cisco-avpair = "ip:sub-policy-Out=ssspolicy"

```

## Additional References

The following sections provide references related to the Per-User QoS via AAA Policy Name.

### Related Documents

Related Topic	Document Title
AAA per-user and QoS configurations and information about the <b>policy-map</b> command	<ul style="list-style-type: none"> <li>• <a href="#">Configuring Per-User Configuration</a></li> <li>• <a href="#">Cisco IOS Security Command Reference</a></li> </ul>

### Standards

Standards	Title
None	—

### MIBs

MIBs	MIBs Link
None	To locate and download MIBs for selected platforms, Cisco IOS releases, and feature sets, use Cisco MIB Locator found at the following URL: <a href="http://www.cisco.com/go/mibs">http://www.cisco.com/go/mibs</a>

### RFCs

RFCs	Title
No new or modified RFCs are supported by this feature.	—

## Technical Assistance

Description	Link
<p>The Cisco Support website provides extensive online resources, including documentation and tools for troubleshooting and resolving technical issues with Cisco products and technologies.</p> <p>To receive security and technical information about your products, you can subscribe to various services, such as the Product Alert Tool (accessed from Field Notices), the Cisco Technical Services Newsletter, and Really Simple Syndication (RSS) Feeds.</p> <p>Access to most tools on the Cisco Support website requires a Cisco.com user ID and password.</p>	<p><a href="http://www.cisco.com/techsupport">http://www.cisco.com/techsupport</a></p>

# Feature Information for Per-User QoS via AAA Policy Name

Table 1 lists the release history for this feature.

Not all commands may be available in your Cisco IOS software release. For release information about a specific command, see the command reference documentation.

Use Cisco Feature Navigator to find information about platform support and software image support. Cisco Feature Navigator enables you to determine which Cisco IOS and Catalyst OS software images support a specific software release, feature set, or platform. To access Cisco Feature Navigator, go to <http://tools.cisco.com/ITDIT/CFN/jsp/index.jsp>. An account on Cisco.com is not required.



**Note**

Table 1 lists only the Cisco IOS software release that introduced support for a given feature in a given Cisco IOS software release train. Unless noted otherwise, subsequent releases of that Cisco IOS software release train also support that feature.

**Table 1** Feature Information for Per-User QoS via AAA Policy Name

Feature Name	Releases	Feature Information
Per-User QoS via AAA Policy Name	12.2(15)B 12.2(15)T 12.2(33)SRC	You can use the Per-User QoS via AAA Policy Name feature to download a policy name that describes QoS parameters for a user session from a RADIUS server and apply them for a particular session.

# Glossary

**RADIUS**—Remote Authentication Dial-In User Service. RADIUS is a database for authenticating modem and ISDN connections and for tracking connection time.

**VSA**—vendor-specific attribute. A VSA is an attribute that has been implemented by a particular vendor. It uses the attribute Vendor-Specific to encapsulate the resulting AV pair: essentially, Vendor-Specific = protocol:attribute = value.

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