

# J-Web User Guide for SRX Series Devices

Published  
2020-11-13

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*J-Web User Guide for SRX Series Devices*

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# About the Documentation

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Use this guide to understand the Junos Web Device Manager, its capabilities, and features.

## Documentation and Release Notes

To obtain the most current version of all Juniper Networks® technical documentation, see the product documentation page on the Juniper Networks website at <https://www.juniper.net/documentation/>.

If the information in the latest release notes differs from the information in the documentation, follow the product Release Notes.

Juniper Networks Books publishes books by Juniper Networks engineers and subject matter experts. These books go beyond the technical documentation to explore the nuances of network architecture, deployment, and administration. The current list can be viewed at <https://www.juniper.net/books>.

## Documentation Conventions

[Table 1 on page xxxii](#) defines notice icons used in this guide.

Table 1: Notice Icons







Icon	Meaning	Description
	Informational note	Indicates important features or instructions.
	Caution	Indicates a situation that might result in loss of data or hardware damage.
	Warning	Alerts you to the risk of personal injury or death.
	Laser warning	Alerts you to the risk of personal injury from a laser.
	Tip	Indicates helpful information.
	Best practice	Alerts you to a recommended use or implementation.

Table 2 on page xxxii defines the text and syntax conventions used in this guide.

Table 2: Text and Syntax Conventions

Convention	Description	Examples
<b>Bold text like this</b>	Represents text that you type.	To enter configuration mode, type the <b>configure</b> command:  user@host> <b>configure</b>
Fixed-width text like this	Represents output that appears on the terminal screen.	user@host> <b>show chassis alarms</b>  No alarms currently active
<i>Italic text like this</i>	<ul style="list-style-type: none"> <li>Introduces or emphasizes important new terms.</li> <li>Identifies guide names.</li> <li>Identifies RFC and Internet draft titles.</li> </ul>	<ul style="list-style-type: none"> <li>A policy <i>term</i> is a named structure that defines match conditions and actions.</li> <li><i>Junos OS CLI User Guide</i></li> <li>RFC 1997, <i>BGP Communities Attribute</i></li> </ul>



Table 2: Text and Syntax Conventions (*continued*)

Convention	Description	Examples
<i>Italic text like this</i>	Represents variables (options for which you substitute a value) in commands or configuration statements.	Configure the machine's domain name:  [edit] root@# <b>set system domain-name</b> <i>domain-name</i>
<b>Text like this</b>	Represents names of configuration statements, commands, files, and directories; configuration hierarchy levels; or labels on routing platform components.	<ul style="list-style-type: none"> <li>To configure a stub area, include the <b>stub</b> statement at the [edit <b>protocols ospf area area-id</b>] hierarchy level.</li> <li>The console port is labeled <b>CONSOLE</b>.</li> </ul>
< > (angle brackets)	Encloses optional keywords or variables.	<b>stub</b> <default-metric <i>metric</i> >;
(pipe symbol)	Indicates a choice between the mutually exclusive keywords or variables on either side of the symbol. The set of choices is often enclosed in parentheses for clarity.	<b>broadcast   multicast</b>  ( <i>string1</i>   <i>string2</i>   <i>string3</i> )
# (pound sign)	Indicates a comment specified on the same line as the configuration statement to which it applies.	<b>rsvp { # Required for dynamic MPLS only</b>
[ ] (square brackets)	Encloses a variable for which you can substitute one or more values.	<b>community name members [ <i>community-ids</i> ]</b>
Indentation and braces ( { } )	Identifies a level in the configuration hierarchy.	[edit] routing-options { static { route default { nexthop <i>address</i> ; retain; } } }
; (semicolon)	Identifies a leaf statement at a configuration hierarchy level.	

## GUI Conventions

Table 2: Text and Syntax Conventions (*continued*)

Convention	Description	Examples
<b>Bold text like this</b>	Represents graphical user interface (GUI) items you click or select.	<ul style="list-style-type: none"> <li>In the Logical Interfaces box, select <b>All Interfaces</b>.</li> <li>To cancel the configuration, click <b>Cancel</b>.</li> </ul>
> (bold right angle bracket)	Separates levels in a hierarchy of menu selections.	In the configuration editor hierarchy, select <b>Protocols&gt;Ospf</b> .

## Documentation Feedback

We encourage you to provide feedback so that we can improve our documentation. You can use either of the following methods:

- Online feedback system—Click TechLibrary Feedback, on the lower right of any page on the [Juniper Networks TechLibrary](#) site, and do one of the following:



- Click the thumbs-up icon if the information on the page was helpful to you.
- Click the thumbs-down icon if the information on the page was not helpful to you or if you have suggestions for improvement, and use the pop-up form to provide feedback.
- E-mail—Send your comments to [techpubs-comments@juniper.net](mailto:techpubs-comments@juniper.net). Include the document or topic name, URL or page number, and software version (if applicable).

## Requesting Technical Support

Technical product support is available through the Juniper Networks Technical Assistance Center (JTAC). If you are a customer with an active Juniper Care or Partner Support Services support contract, or are

covered under warranty, and need post-sales technical support, you can access our tools and resources online or open a case with JTAC.

- JTAC policies—For a complete understanding of our JTAC procedures and policies, review the *JTAC User Guide* located at <https://www.juniper.net/us/en/local/pdf/resource-guides/7100059-en.pdf>.
- Product warranties—For product warranty information, visit <https://www.juniper.net/support/warranty/>.
- JTAC hours of operation—The JTAC centers have resources available 24 hours a day, 7 days a week, 365 days a year.

## Self-Help Online Tools and Resources

For quick and easy problem resolution, Juniper Networks has designed an online self-service portal called the Customer Support Center (CSC) that provides you with the following features:

- Find CSC offerings: <https://www.juniper.net/customers/support/>
- Search for known bugs: <https://prsearch.juniper.net/>
- Find product documentation: <https://www.juniper.net/documentation/>
- Find solutions and answer questions using our Knowledge Base: <https://kb.juniper.net/>
- Download the latest versions of software and review release notes: <https://www.juniper.net/customers/csc/software/>
- Search technical bulletins for relevant hardware and software notifications: <https://kb.juniper.net/InfoCenter/>
- Join and participate in the Juniper Networks Community Forum: <https://www.juniper.net/company/communities/>
- Create a service request online: <https://myjuniper.juniper.net>

To verify service entitlement by product serial number, use our Serial Number Entitlement (SNE) Tool: <https://entitlementsearch.juniper.net/entitlementsearch/>

## Creating a Service Request with JTAC

You can create a service request with JTAC on the Web or by telephone.

- Visit <https://myjuniper.juniper.net>.
- Call 1-888-314-JTAC (1-888-314-5822 toll-free in the USA, Canada, and Mexico).

For international or direct-dial options in countries without toll-free numbers, see <https://support.juniper.net/support/requesting-support/>.

# 1

PART

## Juniper Web Device Manager

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[Getting Started](#) | 2

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# Getting Started

## IN THIS CHAPTER

- [Juniper Web Device Manager Overview | 2](#)
- [Start J-Web | 3](#)
- [Explore J-Web | 29](#)

## Juniper Web Device Manager Overview

## IN THIS SECTION

- [What is J-Web? | 2](#)
- [Benefits of J-Web | 2](#)

### What is J-Web?

Juniper Networks SRX Series Services Gateways are shipped with the Juniper Networks Junos operating system (Junos OS) preinstalled.

Junos OS has the following primary user interfaces:

- Juniper Web Device Manager (J-Web) GUI
- Junos OS CLI

The J-Web interface allows you to monitor, configure, troubleshoot, and manage your device by means of a Web browser enabled with HTTP over Secure Sockets Layer (HTTPS) by default. You can also use Hypertext Transfer Protocol (HTTP) to access J-Web.

### Benefits of J-Web

- Provides a simple user interface that enables new users to quickly become proficient.

- Enables effective threat management while producing detailed data access and user activity reports. An action-oriented design enables the network administrator to detect threats across the network as they occur, quickly block the traffic going to or coming from a specific region, and apply immediate remedial action with a single click.
- Enables administrators to assess the effectiveness of each firewall rule and quickly identify the unused rules, which results in better management of the firewall environment.

## RELATED DOCUMENTATION

[Start J-Web | 3](#)

[Explore J-Web | 29](#)

## Start J-Web

### IN THIS SECTION

- [Prerequisites for Using J-Web | 3](#)
- [Log On to J-Web | 4](#)
- [Configure SRX Devices Using the J-Web Setup Wizard | 5](#)
- [J-Web First Look | 28](#)

### Prerequisites for Using J-Web

To access the J-Web interface for all platforms, your management device requires the following software:

- Supported browsers—Mozilla Firefox, Google Chrome, and Microsoft Internet Explorer.

**NOTE:** By default, you establish a J-Web session through an HTTPS-enabled Web browser.

- Language support— English-version browsers.

## Log On to J-Web

To log into the J-Web interface:

1. Connect the network port of your device to the Ethernet port on the management device (laptop or PC), using an RJ-45 cable.

**NOTE:** Following are the networks that you can use for your respective device:

- For SRX300 and SRX320 devices, use network ports numbered **0/1** through **0/6**.
- For SRX550M, use network ports numbered **0/1** through **0/5**.
- For other SRX devices, use the management port labelled **MGMT**.

2. Ensure that the management device acquires an IP address from the device.

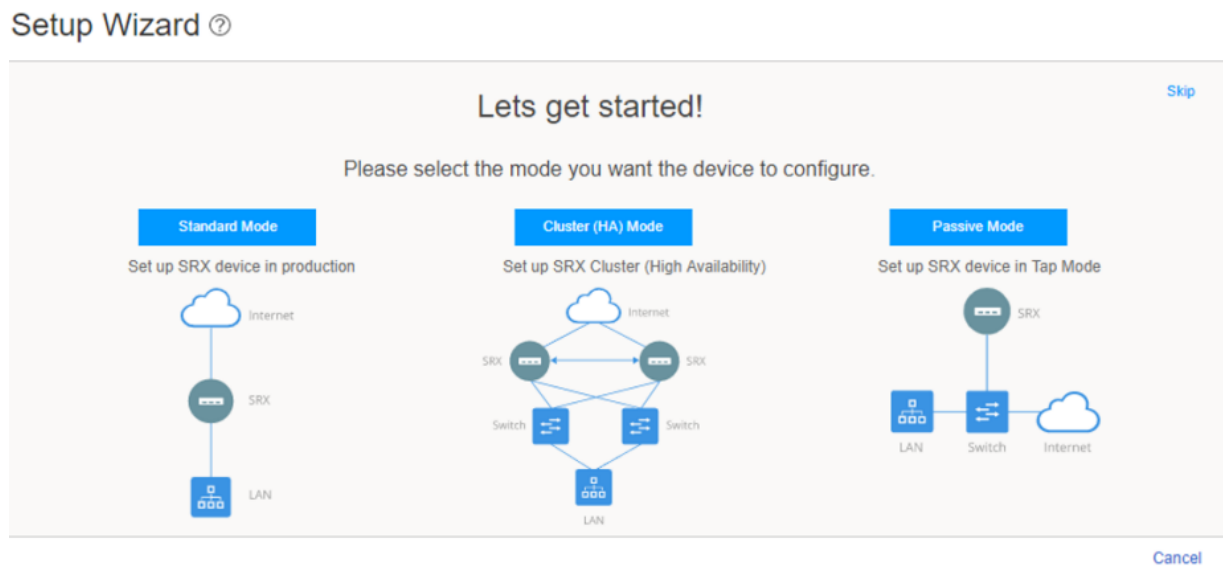
**NOTE:** The services gateway functions as a DHCP server and will assign an IP address to the management device. This is applicable only for SRX300 line of devices and SRX550M devices. If an IP address is not assigned to the management device, manually configure an IP address.

3. Open a browser, and enter **https://<IP address>** in the address bar.

Where, *<IP address>* is the IP address of the SRX Series device.

The J-Web Setup Wizard page opens. See [Figure 1 on page 5](#).

Figure 1: Setup Wizard Page



## Configure SRX Devices Using the J-Web Setup Wizard

Using the Setup wizard, you can perform step-by-step configuration of a services gateway that can securely pass traffic.

You can choose one of the following setup modes to configure the services gateway:

- **Standard mode**—Configure your SRX Series device to operate in a standard mode. In this mode, you can configure basic settings such as device and users, time and DNS Servers, also management interface, zones and interfaces, and security policies.
- **Cluster (HA) mode**—Configure your SRX Series device to operate in a cluster (HA) mode. In the cluster mode, a pair of devices are connected together and configured to operate like a single node, providing device, interface, and service level redundancy.

**NOTE:** You cannot configure Standard or Passive mode when your device is in the HA mode.

- **Passive mode**—Configure your SRX Series device to operate in a TAP mode. TAP mode allows you to passively monitor traffic flows across a network. If IDP is enabled, then the TAP mode inspects the incoming and outgoing traffic to detect the number of threats.

**NOTE:** SRX5000 line of devices, SRX4600, and vSRX devices does not support the passive mode configuration.



To help guide you through the process, the wizard:

- Determines which configuration tasks to present to you based on your selections.
- Flags any missing required configuration when you attempt to leave a page.

To configure SRX Devices using the J-Web Setup wizard:

1. Click on the configuration mode that you want to setup.

The Setup Wizard page appears.

**NOTE:**

If you do not want to perform the initial configuration, then:

- a. Click **Skip**.

The J-Web Device Password screen appears. See [Figure 2 on page 7](#)

**Figure 2: Device Password**

**Device Password**

With super user permissions for your root account, you can change any of the system settings. Please set your root password before you commit any configuration changes. We recommend that you do NOT use the root account to manage your SRX device as a best practice. You can add user accounts below in user management section.

Username	root
Password* ?	<input type="password"/>
Confirm Password*	<input type="password"/>

Cancel OK

- b. Enter the root password and reenter it to confirm.

- c. Click **OK**.

The password is committed to the device and the J-Web login page appears.

- d. Enter the username and password again and click **Log In**.

The J-Web application window appears.

**NOTE:** You can choose Configure > Setup Wizard through the J-Web menu to configure the wizard.

2. For standard mode and passive mode, complete the configuration according to the guidelines provided in [Table 3 on page 8](#).

**NOTE:**

- If you select Cluster (HA) Mode, for the configuration information see [“Configure Cluster \(HA\) Setup” on page 246](#).
- In the Setup wizard, root password is mandatory and all the other options are optional. In the passive mode, management interface, Tap interface, and services are mandatory.

3. Click **Finish**.

A successful message appears and the device configuration mode of your choice is set up.

**NOTE:**

- Once the configuration is complete, the entire configuration is committed to the device and a successful message appears. If the commit fails, the CLI displays an error message and you remain at the wizard's last page. If required, you can change the configuration until the commit is successful.
- If the connectivity is lost during commit or if commit takes more than a minute, a message will be displayed with configured IP address to access J-Web again.
- For SRX300 line of devices and SRX550M devices, an additional message will be displayed about the device reboot if you have enabled Juniper Sky ATP or Security Intelligence services. For other SRX devices, the device will not reboot.

**Table 3: Setup Wizard Configuration**

Field	Action
<i>Device &amp; Users</i>	
<b>System Identity</b>	
Hostname	<p>Enter a hostname.</p> <p>You can use alphanumeric characters, special characters such as the underscore (_), the hyphen (-), or the period (.); the maximum length is 255 characters.</p>
Allow root user SSH login	<p>Enable this option to allow the root login (to the device) using SSH.</p>
<b>Device Password</b>	

Table 3: Setup Wizard Configuration (continued)

Field	Action
Username	<p>Displays the root user.</p> <p><b>NOTE:</b> We recommend that you do not use root user account as a best practise to manage your devices.</p>
Password	<p>Enter a password.</p> <p>You can use alphanumeric characters and special characters; the minimum length is six characters.</p>
Confirm Password	Reenter the password.
User Management	<p>You can create additional user accounts in addition to root user account.</p> <p><b>NOTE:</b> We recommend that you do not use root user account as a best practise to manage your devices.</p> <p>To add additional user accounts and to assign them a role:</p> <ol style="list-style-type: none"> <li>1. Click +.</li> <li>2. Enter the details in the following fields: <ul style="list-style-type: none"> <li>• Username—Enter a username. Do not use space or symbols.</li> <li>• Password—Enter a password. You can use alphanumeric characters and special characters; the minimum length is six characters.</li> <li>• Confirm Password—Reenter the password.</li> <li>• Role—Select a role from the list. Available options are: Super User, Operator, Read-Only, and Unauthorized.</li> </ul> </li> <li>3. Click the tick mark.</li> </ol> <p>You can edit the user details using the pencil icon or select the existing user and delete it using the delete icon.</p>
<i>Time &amp; DNS Servers</i>	
<b>Set Date &amp; Time</b>	
Set system time	Select either NTP server or Manual to configure the system time.

Table 3: Setup Wizard Configuration (*continued*)

Field	Action
Date and Time	Select the date and time (in DD-MM-YYYY and HH:MM:SS 24-hour or AM/PM formats) to configure the system time manually.
NTP Server	<p>Enter a hostname or IP address of the NTP server.</p> <p>Once the system is connected to the network, the system time is synced with the NTP server time.</p> <p><b>NOTE:</b> If you want to add more NTP servers, go to Configure &gt; Device Settings &gt; Basic Settings &gt; Date &amp; Time Details through the J-Web menu.</p>
Time zone	Select an option from the list. By default, device current time (UTC) is selected.
<b>DNS Servers</b>	
DNS Server 1	<p>By default, 8.8.8.8 is displayed.</p> <p><b>NOTE:</b> Entering a new IP address for the DNS server will remove the default IP address.</p>
DNS Server 2	<p>Enter an IP address for the DNS server. By default, 8.8.4.4 is displayed.</p> <p><b>NOTE:</b> Entering a new IP address for the DNS server will remove the default IP address.</p>
<i>Management Interface</i>	
<b>Management Interface</b>	
<p><b>NOTE:</b> If you change the management IP address and click <b>Next</b>, a warning message appears on the Management Interface page that you need to use the new management IP address to log in to J-Web because you may lose the connectivity to J-Web.</p>	

Table 3: Setup Wizard Configuration (*continued*)

Field	Action
Management Port	<p>Select an option from the list.</p> <p>If fxp0 port is your device's management port, then the fxp0 port is displayed. You can change it as required or you can select <b>None</b> and proceed to the next page.</p> <p><b>NOTE:</b></p> <ul style="list-style-type: none"> <li>You can choose the revenue port as management port if your device does not support the fxp0 port. Revenue ports are all ports except fxp0 and em0.</li> <li>If you are in Tap mode, it is mandatory to configure a management port. J-Web needs a management port for viewing generated report.</li> </ul>
<b>IPv4</b>	
<p><b>NOTE:</b> Click <b>Email it to self</b> to get the newly configured IPv4 address to your inbox. This is useful if you lose connectivity when you change the management IP address to another network.</p>	
Management Address	<p>Enter a valid IPv4 address for the management interface.</p> <p><b>NOTE:</b> If fxp0 port is your device's management port, then the fxp0 port's default IP address is displayed. You can change it if required.</p>
Management Subnet Mask	Enter a subnet mask for the IPv4 address.
Static Route	Enter an IPv4 address for the static route to route to the other network devices.
Static Route Subnet Mask	Enter a subnet mask for the static route IPv4 address.
Next Hop Gateway	Enter a valid IPv4 address for the next hop.
<b>IPv6</b>	
Management Access	Enter a valid IPv6 address for the management interface.
Management Subnet Prefix	Enter a subnet prefix length for the IPv6 address.
Static Route	Enter an IPv6 address for the static route to route to the other network devices.

Table 3: Setup Wizard Configuration (*continued*)

Field	Action
Static Route Subnet Prefix	Enter a subnet prefix length for the static route IPv6 address.
Next Hop Gateway	Enter a valid IPv6 address for the next hop.

### Access Protocols

#### NOTE:

- This option is not available if the management port is fxp0. If the management port is not fxp0, a new dedicated functional management zone is created and the configures access protocols are added to the zone.
- In the Setup wizard, you cannot add any additional protocols.

HTTPS	Select this option for the web management using HTTP secured by SSL.  <b>NOTE:</b> By default, this option is selected.
SSH	Select this option for the SSH service.  <b>NOTE:</b> By default, this option is selected.
Ping	Select this option for the internet control message protocol.  <b>NOTE:</b> By default, this option is selected.
DHCP	Select this option for the Dynamic Host Configuration Protocol.
Netconf	Select this option for the NETCONF Service.

### Zones & Interfaces—For Standard Mode

### Zones & Interfaces

Zone Name	View the zone name populated from your device factory default settings.  <b>NOTE:</b> For Standard mode, trust and untrust zones are created by default even if these zones are not available in the factory default settings.
Interfaces	View the interfaces name populated from your device factory default settings.
Description	Enter the description for zone and interfaces.

Table 3: Setup Wizard Configuration (continued)

Field	Action
Edit	<p>Select a zone and click the pencil icon at the right corner of the table to modify the configuration.</p> <p>For more information on editing zones, see <a href="#">Table 4 on page 16</a> and <a href="#">Table 5 on page 24</a>.</p>
Search	Click the search icon at the right corner of the table to quickly locate a zone or an interface.
Detailed View	<p>Hover over the zone name and click the Detailed View icon to view the zone and interface details.</p> <p>You can also click <b>More</b> and select <b>Detailed View</b> for the selected zone.</p>
<i>Zones &amp; Interfaces—For Passive Mode</i>	
<b>TAP Interface</b>	
Physical Interface	<p>Select an interface from the list.</p> <p>For Passive mode, untrust zone will be displayed.</p>
<b>Internet Connectivity</b>	
<p><b>NOTE:</b> Your device must have internet connectivity to use IPS, AppSec, Web filtering, Juniper Sky ATP, and Security threat intelligence services.</p>	
Name	<p>View the zone name populated from your device factory default settings.</p> <p><b>NOTE:</b> For Passive mode, untrust zone is created by default.</p>
Interfaces	View the interfaces name populated from your device factory default settings.
Description	Enter the description for zone and interfaces.
Edit	<p>Select a zone and click the pencil icon at the right corner of the table to modify the configuration.</p> <p>For more information on editing zones, see <a href="#">Table 4 on page 16</a> and <a href="#">Table 5 on page 24</a>.</p>



Table 3: Setup Wizard Configuration (continued)

Field	Action
Search	Click the search icon at the right corner of the table to quickly locate a zone or an interface.
Detailed View	<p>Hover over the zone name and click the Detailed View icon to view the zone and interface details.</p> <p>You can also click <b>More</b> and select <b>Detailed View</b> for the selected zone.</p>
<b>Default Gateway</b>	
Default Gateway (IPv4)	Enter the IPv4 address of the default gateway.
Default Gateway (IPv6)	Enter the IPv6 address of the default gateway.
<i>Security Policies</i>	
<b>Security Services</b>	
UTM	Enable this option for configuring UTM services.
License	<p>Enter UTM license key and click <b>Install License</b> to add a new license.</p> <p><b>NOTE:</b></p> <ul style="list-style-type: none"> <li>• Use a blank line to separate multiple license keys.</li> <li>• To use UTM services, your device must have internet connectivity from a revenue interface.</li> </ul>
UTM Type	<p>Select an option to configure UTM features:</p> <ul style="list-style-type: none"> <li>• Web Filtering</li> <li>• Anti Virus</li> <li>• Anti Spam</li> </ul>
Web Filtering Type	<p>Select an option:</p> <ul style="list-style-type: none"> <li>• Enhanced—Specifies that the Juniper Enhanced Web filtering intercepts the HTTP and the HTTPS requests and sends the HTTP URL or the HTTPS source IP to the Websense ThreatSeeker Cloud (TSC).</li> <li>• Local—Specifies the local profile type.</li> </ul>

Table 3: Setup Wizard Configuration (*continued*)

Field	Action
IPS	<p>Enable this option to install the IPS signatures.</p> <ul style="list-style-type: none"> <li>• <b>IPS Policy</b>—Displays the IPS policy wizard name.</li> <li>• <b>License</b>—Enter the license key and click <b>Install License</b> to add a new license.</li> </ul> <p><b>NOTE:</b> The installation process may take few minutes.</p> <ul style="list-style-type: none"> <li>• <b>IPS Signature</b>—Click <b>Browse</b> to navigate to the IPS signature package folder and select it. Click <b>Install</b> to install the selected IPS signature package.</li> </ul> <p><b>NOTE:</b> You can download the IPS signature offline package at <a href="https://support.juniper.net/support/downloads/">https://support.juniper.net/support/downloads/</a>.</p>
Sky ATP	<p>Enable this option to use Juniper Sky ATP services.</p> <p><b>NOTE:</b> After the Juniper Sky ATP configuration is pushed, only the SRX300 line of devices and SRX550M devices are rebooted. Your device must have internet connectivity to enable Juniper Sky ATP enrollment process through J-Web.</p>
Security Intelligence	<p>Enable this option to use Security Intelligence services.</p> <p><b>NOTE:</b> After the Security Intelligence configuration is pushed, only the SRX300 line of devices and SRX550M devices are rebooted. Your device must have internet connectivity to enable Juniper Sky ATP enrollment process through J-Web.</p>
User Firewall	<p>Enable this option to use user firewall services.</p> <ul style="list-style-type: none"> <li>• <b>Domain Name</b>—Enter a domain name for Active Directory.</li> <li>• <b>Domain Controller</b>—Enter domain controller IP address.</li> <li>• <b>Username</b>—Enter a username for administrator privilege.</li> <li>• <b>Password</b>—Enter a password for administrator privilege.</li> </ul>

### Security Policies

**NOTE:** The table lists the security policy along with the selected advanced security settings.

Table 3: Setup Wizard Configuration (*continued*)

Field	Action
Policy Name	<p>Name of the policy.</p> <p><b>NOTE:</b></p> <ul style="list-style-type: none"> <li>• If you are in Standard mode, trust-to-untrust policy is created by default.</li> <li>• If you are in Tap mode, tap-policy is created by default.</li> </ul>
From Zone	<p>Name of the source zone.</p> <p><b>NOTE:</b></p> <ul style="list-style-type: none"> <li>• If you are in Standard mode, permits all traffic from the trust zone.</li> <li>• If you are in Tap mode, permits all traffic from the tap zone.</li> </ul>
To Zone	<p>Name of the destination zone.</p> <ul style="list-style-type: none"> <li>• If you are in Standard mode, permits all traffic from the trust zone to the untrust zone.</li> <li>• If you are in Tap mode, permits all traffic from the tap zone to the tap zone.</li> </ul>
Source Address	Name of the source address (not the IP address) of a policy.
Destination Address	Name of the destination address.
Application	Name of a preconfigured or custom application of the policy match.
Action	Action taken when a match occurs as specified in the policy.
Advanced Security	Name of the configured advanced security settings.

Table 4: Edit Trust Zone

Field	Action
<b>General Information</b>	
Name	Displays the zone name.
Description	Enter the description for the zone.
Application Tracking	Enables this option to provide application tracking support to the zone.

Table 4: Edit Trust Zone (continued)

Field	Action
Source Identity Log	Enables this option to trigger user identity logging when that zone is used as the source zone in a security policy.
Services	By default, this option is enabled. You can disable if required. all—Specifies all system services.
Protocols	By default, this option is enabled. You can disable if required. all—Specifies all protocol.
<b>Interfaces</b>	
Name	Displays the name of the interface
Description	Displays the description of the interface.
IP Address	Displays the IP address of the interface.
VLAN	Displays the VLAN name.
Services	Displays the system service option selected.
Protocols	Displays the protocol option selected.

Table 4: Edit Trust Zone (*continued*)

Field	Action
Add	

Table 4: Edit Trust Zone (*continued*)

Field	Action
	<p>To add a switching or a routing interface:</p> <ol style="list-style-type: none"> <li>Click +. The Add Interface page appears.</li> <li>Enter the following details: <ul style="list-style-type: none"> <li><b>General</b> (fields for switching interface): <ul style="list-style-type: none"> <li>Type (family)—Select <b>Switching</b>.  <b>NOTE:</b> This option will be available for only SRX300 line of devices, SRX550M, and SRX1500 devices. For SRX5000 line of devices, SRX4100, SRX4200, SRX4600, and vSRX devices, the Type (family) field is not available.</li> <li>Routing Interface (IRB) Unit—Enter the IRB unit.</li> <li>Description—Enter the description for the interface.</li> </ul> </li> <li><b>General</b> (fields for routing interface): <ul style="list-style-type: none"> <li>Type (family)—Select <b>Routing</b>. For SRX5000 line of devices, SRX4100, SRX4200, SRX4600, and vSRX devices, the Type (family) field is not available.</li> <li>Interface Name—Select an option from list.</li> <li>Interface Unit—Enter the Inet unit.  <b>NOTE:</b> VLAN tagging is enabled automatically if the interface unit is higher than zero.</li> <li>Description—Enter the description for the interface.</li> <li>VLAN ID—Enter the VLAN ID.  <b>NOTE:</b> VLAN ID is mandatory if the interface unit is higher than zero.</li> </ul> </li> <li><b>Interfaces</b>—Select an interface from the Available column and move it to the Selected column.  <b>NOTE:</b> This option is available only for the Switching family type.</li> <li><b>IPv4:</b> <ul style="list-style-type: none"> <li>IPv4 Address—Enter a valid IPv4 address for the switching or the routing interface.</li> <li>Subnet Mask—Enter a subnet mask for the IPv4 address.</li> </ul> </li> <li><b>IPv6:</b></li> </ul> </li> </ol>

Table 4: Edit Trust Zone (continued)

Field	Action
	<ul style="list-style-type: none"><li>IPv6 Address—Enter a valid IPv6 address for the switching or the routing interface.</li><li>Subnet Prefix—Enter a subnet prefix for the IPv6 address.</li><li><b>VLAN Details:</b> <b>NOTE:</b> This option is available only for the Switching family type.<ul style="list-style-type: none"><li>VLAN Name—Enter an unique name for the VLAN.</li><li>VLAN ID—Enter the VLAN ID.</li></ul></li></ul>

Table 4: Edit Trust Zone (*continued*)

Field	Action
	<ul style="list-style-type: none"> <li>• <b>DHCP Local Server:</b> <ul style="list-style-type: none"> <li>• DHCP Local Server—Enable this option to configure the switch to function as an extended DHCP local server.</li> <li>• DHCP Pool Name—Enter the DHCP pool name.</li> <li>• DHCP Pool Range (Low)—Enter an IP address that is the lowest address in the IP address pool range.</li> <li>• DHCP Pool Range (High)—Enter an IP address that is the highest address in the IP address pool range.</li> </ul> <p><b>NOTE:</b> This address must be greater than the address specified in DHCP Pool Range (Low).</p> </li> <li>• Propagate Settings from—Select an interface on the router through which the resolved DHCP queries are propagated to the DHCP pool.</li> </ul>



Table 4: Edit Trust Zone (continued)

Field	Action
	<ul style="list-style-type: none"> <li>● <b>System Services</b>—Select system services from the list in the Available column and then click the right arrow to move it to the Selected column.</li> </ul> <p>The available options are:</p> <ul style="list-style-type: none"> <li>● all—Specify all system services.</li> <li>● any-service—Specify services on entire port range.</li> <li>● appqoe—Specify the APPQOE active probe service.</li> <li>● bootp—Specify the Bootp and dhcp relay agent service.</li> <li>● dhcp—Specify the Dynamic Host Configuration Protocol.</li> <li>● dhcpv6—Enable Dynamic Host Configuration Protocol for IPV6.</li> <li>● dns—Specify the DNS service.</li> <li>● finger—Specify the finger service.</li> <li>● ftp—Specify the FTP protocol.</li> <li>● http—Specify the Web management using HTTP.</li> <li>● https—Specify the Web management using HTTP secured by SSL.</li> <li>● ident-reset—Specify the send back TCP RST IDENT request for port 113.</li> <li>● ike—Specify the Internet key exchange.</li> <li>● lsping—Specify the Label Switched Path ping service.</li> <li>● netconf—Specify the NETCONF Service.</li> <li>● ntp—Specify the network time protocol.</li> <li>● ping—Specify the internet control message protocol.</li> <li>● r2cp—Enable Radio-Router Control Protocol.</li> <li>● reverse-ssh—Specify the reverse SSH Service.</li> <li>● reverse-telnet—Specify the reverse telnet Service.</li> <li>● rlogin—Specify the Rlogin service</li> <li>● rpm—Specify the Real-time performance monitoring.</li> <li>● rsh—Specify the Rsh service.</li> <li>● snmp—Specify the Simple Network Management Protocol.</li> <li>● snmp-trap—Specify the Simple Network Management Protocol trap.</li> </ul>

Table 4: Edit Trust Zone (continued)

Field	Action
	<ul style="list-style-type: none"> <li>• ssh—Specify the SSH service.</li> <li>• tcp-encap—Specify the TCP encapsulation service.</li> <li>• telnet—Specify the Telnet service.</li> <li>• tftp—Specify the TFTP</li> <li>• traceroute—Specify the traceroute service.</li> <li>• webapi-clear-text—Specify the Webapi service using http.</li> <li>• webapi-ssl—Specify the Webapi service using HTTP secured by SSL.</li> <li>• xnm-clear-text—Specify the JUNOScript API for unencrypted traffic over TCP.</li> <li>• xnm-ssl—Specify the JUNOScript API Service over SSL.</li> </ul> <p>• <b>Protocols</b>—Select protocols from the list in the Available column and then click the right arrow to move it to the Selected column.</p> <p>The available options are:</p> <ul style="list-style-type: none"> <li>• all—Specifies all protocol.</li> <li>• bfd—Bidirectional Forwarding Detection.</li> <li>• bgp—Border Gateway Protocol.</li> <li>• dvmrp—Distance Vector Multicast Routing Protocol.</li> <li>• igmp—Internet Group Management Protocol.</li> <li>• ldp—Label Distribution Protocol.</li> <li>• msdp—Multicast Source Discovery Protocol.</li> <li>• nhrp- Next Hop Resolution Protocol.</li> <li>• ospf—Open shortest path first.</li> <li>• ospf3—Open shortest path first version 3.</li> <li>• pgm—Pragmatic General Multicast.</li> <li>• pim—Protocol Independent Multicast.</li> <li>• rip—Routing Information Protocol.</li> <li>• ripng—Routing Information Protocol next generation.</li> <li>• router-discovery—Router Discovery.</li> <li>• rsvp—Resource Reservation Protocol.</li> <li>• sap—Session Announcement Protocol.</li> <li>• vrrp—Virtual Router Redundancy Protocol.</li> </ul>

Table 4: Edit Trust Zone (continued)

Field	Action
Edit	<p>Select an interface and click the edit icon at the top right corner of the table.</p> <p>The Edit Interface page appears with editable fields.</p> <p><b>NOTE:</b> As interface name is prepopulated, you cannot edit it.</p>
Delete	<p>Select an interface and click the delete icon at the top right corner of the table.</p> <p>A confirmation window appears. Click <b>Yes</b> to delete the selected interface or click <b>No</b> to discard.</p>
Search	<p>Click the search icon at the top right corner of the table and enter partial text or full text of the keyword in the search bar.</p> <p>The search results are displayed.</p>

Table 5: Edit Untrust Zone

Field	Action
<b>General Information</b>	
Name	Displays the zone name as untrust.
Description	Enter the description for the zone.
Application Tracking	Enables this option to provide application tracking support to the zone.
Source Identity Log	Enables this option for system services.
<b>Interfaces</b>	
Name	Displays the name of the physical interface
Description	Displays the description of the interface.
Address Mode	Displays the type of address mode.
IP Address	Displays the IP address of the interface.
Services	Displays the system service option selected.

Table 5: Edit Untrust Zone *(continued)*

Field	Action
Protocols	Displays the protocol option selected.

Table 5: Edit Untrust Zone *(continued)*

Field	Action
Add	

Table 5: Edit Untrust Zone (continued)

Field	Action
	<p>To add an interface to the untrust zone:</p> <ol style="list-style-type: none"> <li>Click +. The Add Interface page appears.</li> <li>Enter the following details: <ul style="list-style-type: none"> <li><b>General:</b> <ul style="list-style-type: none"> <li>Interface Name—Select an interface from the list.</li> <li>Interface Unit—By default 0 will be populated. You can change the unit value if required.</li> <li>Description—Enter the description for the interface.</li> <li>Address Mode—Select an address mode for the interface. The available options are DHCP Client, PPPoE (PAP), PPPoE (CHAP) and Static IP.  <b>NOTE:</b> PPPoE (PAP) and PPPoE (CHAP) are not supported for SRX5000 line of devices and if any of the devices are in passive mode.</li> <li>Username—Enter a username for PPPoE (PAP) or PPPoE (CHAP) authentication.</li> <li>Password—Enter a password for PPPoE (PAP) or PPPoE (CHAP) authentication.</li> </ul> </li> <li><b>IPv4:</b>  <b>NOTE:</b> This option is available only for the Static IP address mode. <ul style="list-style-type: none"> <li>IPv4 Address—Enter a valid IPv4 address for the interface.</li> <li>Subnet Mask—Enter a subnet mask for the IPv4 address.</li> </ul> </li> <li><b>IPv6:</b>  <b>NOTE:</b> This option is available only for the Static IP address mode. <ul style="list-style-type: none"> <li>IPv6 Address—Enter a valid IPv6 address for the interface.</li> <li>Subnet Prefix—Enter a subnet prefix for the IPv6 address.</li> </ul> </li> </ul> </li> </ol>

Table 5: Edit Untrust Zone (continued)

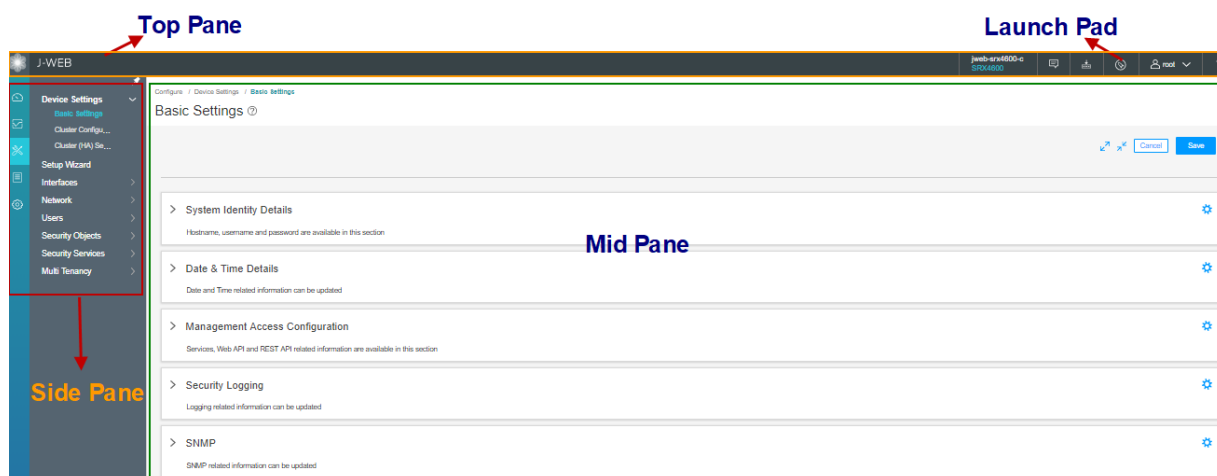
Field	Action
	<ul style="list-style-type: none"> <li>• <b>System Services</b>—Select system services from the list in the Available column and then click the right arrow to move it to the Selected column.</li> <li>• <b>Protocols</b>—Select protocols from the list in the Available column and then click the right arrow to move it to the Selected column.</li> </ul>
Edit	<p>Select an interface and click the edit icon at the top right corner of the table.</p> <p>The Edit Interface page appears with editable fields.</p> <p><b>NOTE:</b> As interface name is prepopulated, you cannot edit it.</p>
Delete	<p>Select an interface and click the delete icon at the top right corner of the table.</p> <p>A confirmation window appears. Click <b>Yes</b> to delete the selected interface or click <b>No</b> to discard.</p>
Search	<p>Click the search icon at the top right corner of the table and enter partial text or full text of the keyword in the search bar.</p> <p>The search results are displayed.</p>

## J-Web First Look

Each page of the J-Web interface is divided into the following panes (see [Figure 3 on page 29](#)):

- **Launch pad**—Displays high level details of the system identification, active users, and interface status.
- **Top pane**—Displays identifying information and links.
- **Side pane**—Displays subtasks of the Monitor, Configure, Reports, and Administration task currently displayed in the main pane. Click an item to access it in the main pane.
- **Main pane**—Location where you monitor, configure, view or generate reports, and administrate the Juniper Networks device by entering information in text boxes, making selections, and clicking buttons.

Figure 3: J-Web First Look



## Explore J-Web

### IN THIS SECTION

- J-Web Launch Pad | 29
- J-Web Top Pane | 30
- J-Web Side Pane | 32
- J-Web Main Pane | 35
- J-Web Workflow Wizards | 38
- Summary | 38

Each page of the J-Web interface is divided into the following panes:

### J-Web Launch Pad

Starting in Junos OS Release 19.3R1, after you successfully login to J-Web GUI, J-Web launch pad appears. The launch pad provides a quick view of system identification details, active users, and interface status.




**NOTE:**

- Launch pad is not displayed in the factory default settings.
- Launch pad is displayed for all users.

Table 6 on page 30 provides the details of the launch pad screen elements.

**Table 6: J-Web Launch Pad Screen Elements**

Element	Description
System Identification	<p>Displays information about the device such as model number, serial number, hostname, software version, system time, and system up time.</p> <p>You can click the arrow button on the top right of the widget to navigate to the Configure &gt; Device Settings &gt; Basic Settings page to view or configure the system settings.</p>
Active Users	Displays the number of active users using the device.
Interface Status	<p>Displays the state of the device physical interfaces: Up or Down.</p> <p>You can click the arrow button on the top right of the widget to navigate to the Monitor &gt; Interfaces &gt; Ports page to monitor the interfaces.</p>
Close	<p>Click <b>Close</b> to close the launch pad and to navigate to the Basic Settings page in J-Web.</p> <p><b>NOTE:</b></p> <ul style="list-style-type: none"> <li>• The Close button is enabled only after J-Web is loaded.</li> <li>• You can access launch pad anytime by clicking the  icon on the J-Web banner.</li> </ul>
X	<p>Click the <b>X</b> icon on the top right of the page to close the launch pad and to navigate to the Basic Settings page in J-Web.</p> <p><b>NOTE:</b> The <b>X</b> icon is enabled only after J-Web is loaded.</p>
Refresh	<p>Click the refresh icon available beside the close icon (<b>X</b>) on the top right of the page to fetch the latest system data.</p> <p><b>NOTE:</b> The refresh icon is enabled only after J-Web is loaded.</p>

## J-Web Top Pane

For a more personal, helpful, and user experience, Juniper Networks has provided some aids within the J-Web GUI. Table 7 on page 31 provides the details of the J-Web top pane elements.

Table 7: J-Web Top Pane Elements




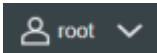

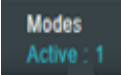

Element	Description
Banner  	<p>Location—The dark gray bar at the top of the screen.</p> <p>You can access device details, feedback button, commit options, a profile management access menu, and a help button.</p>
Device details  	<p>Location—To the upper right of the banner.</p> <p>Provides details of the device you have accessed.</p>
Feedback Button  	<p>Location—To the right of the device details.</p> <p>You can provide feedback (jweb-feedback@juniper.net) if you are having an issue with the product.</p>
Commit Configuration Menu  	<p>Location—To the right of the Feedback Button.</p> <p>Provides options to commit, compare, confirm, discard, or commit the changes in your preferred way.</p>
Launch pad  	<p>Location—To the right of the Commit Configuration Menu.</p> <p>Provides high level details of the system identification, active users, and interface status.</p>
User Functions Menu  	<p>Location—To the right of the launch pad Button.</p> <p>A head-and-shoulders icon and a field showing the logged in user type. Clicking your user name or the down arrow button, logs you out of J-Web interface.</p>

Table 7: J-Web Top Pane Elements (*continued*)

Element	Description
<p>Help Button</p> 	<p>Location—To the right of the User Functions Menu.</p> <p>Access to the online Help center and the Getting Started Guide are available by clicking the right-most icon on the banner, shaped like a question mark. The help center includes access to a list of supported web browsers, user interface assistance, as well as links to technical support and full J-Web documentation.</p>
<p>Mode</p> 	<p>Location—To the right of the device details.</p> <p>Provides the setup mode details whether your device is in the standard, chassis cluster (HA), or passive mode.</p>
<p>Tenant or Logical System User Name</p> 	<p>Location—To the left of the device details.</p> <p>Displays the name of the tenant user or logical system user when root user enter as a Tenant or a logical systems. Click on the user name and select <b>Exit</b> to go back to the root user role.</p>

## J-Web Side Pane

J-Web presents you a security-focused administrator with a tabbed interface.

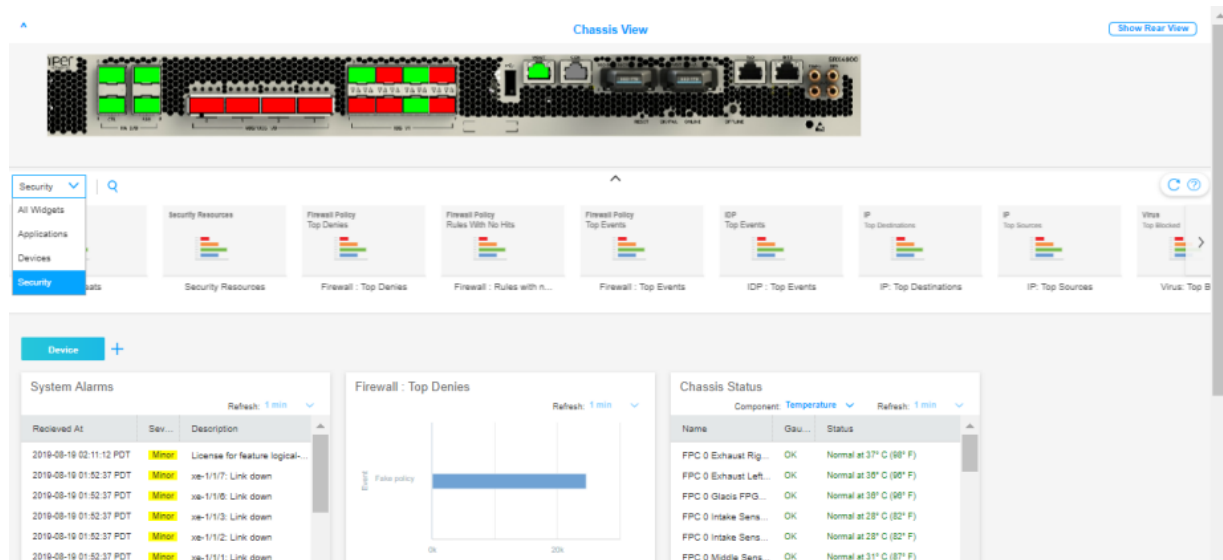
The following tabs across the side pane of the J-Web GUI provide workspaces in which an administrator can perform specific tasks:

- **Dashboard**—The Dashboard is the main page for J-Web. You can customize the workspace in your Dashboard by adding widgets from the carousel. The placement of, and settings within, widgets are saved so that anything from device information to firewall event information or from top blocked viruses to live threat maps can be unique for each user. Once you decide on the widgets that you want to see, you can minimize the carousel to regain some screen space.

**NOTE:** By default, the selected widgets are displayed every time you login to J-Web.

Figure 4 on page 33 shows an example of the J-Web Dashboard tab.

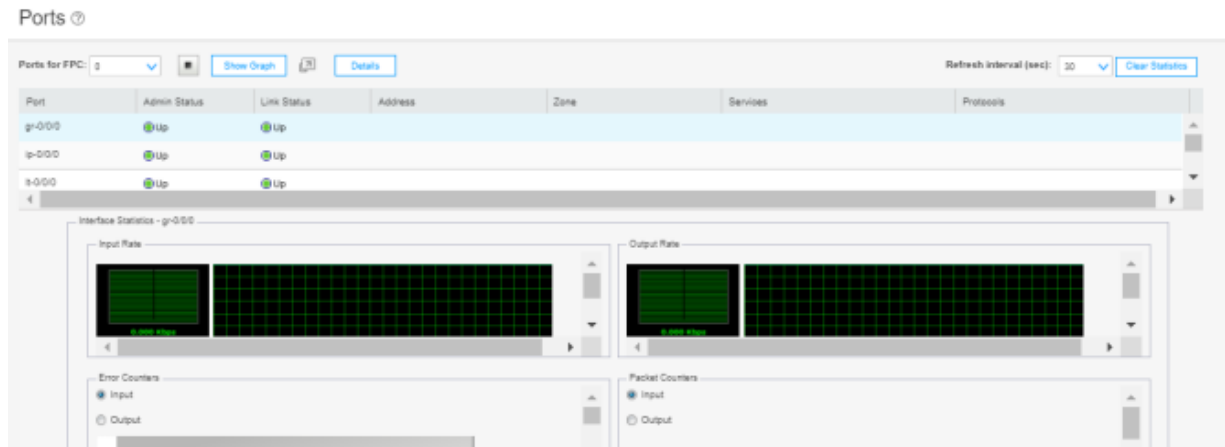
Figure 4: J-Web Dashboard Tab



- **Monitor**—The Monitor tab provides a workspace in which graphical representations of network traffic, firewall events, live threats, and network user data are available. There is also detailed data for alerts and alarms information. In this workspace, you can review the detailed information needed to understand what is happening to the managed security devices and traffic in your network.

Figure 5 on page 34 shows an example of the J-Web Monitor tab.

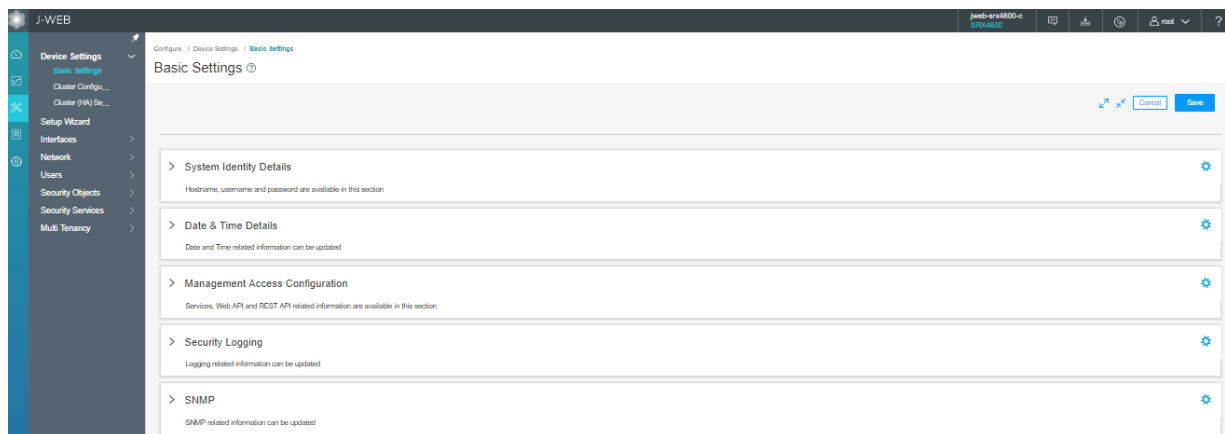
Figure 5: J-Web Monitor Tab



- **Configure**—The Configure tab is the workspace where all of the security configuration happens. You can configure device settings, interfaces, network, users, security services such as firewall, IPS, NAT, and UTM policies, assign policies to devices, create and apply policy schedules, create and manage VPNs and create and manage all of the security objects, security services, and multitenancy needed for managing your network security.

Figure 6 on page 34 shows an example of the J-Web Configure tab.

Figure 6: J-Web Configure Tab



- **Reports**—The Reports tab provides a workspace in which you can generate reports on demand. J-Web comes with a predefined set of reports. The generated report is displayed in HTML format. You can group multiple reports and generate a consolidated report.

Figure 7 on page 35 shows an example of the J-Web Reports tab.

Figure 7: J-Web Reports Tab

Reports

Reports ⓘ

Generate Report

Q

<input type="checkbox"/> Name	Report Content	Type
<input type="checkbox"/> Threat Assessment Report	Executive Summary, Application Risk Assessment, Threat & Malware Assessment <a href="#">11</a>	Log
<input type="checkbox"/> Application and User Usage	Top High-Risk Applications by Bandwidth, Top High-Risk Applications By Count, Top Categories By Bandwidth <a href="#">17</a>	Log
<input type="checkbox"/> Top Talkers	Top Source IPs by Bandwidth, Top Destination IPs by Bandwidth, Top Source IPs by Session <a href="#">23</a>	Log
<input type="checkbox"/> IPS Threat Environment	IPS Attacks by Severity Over Time, Total IPS Attacks by Severity, Top IPS Categories Blocked <a href="#">25</a>	Log
<input type="checkbox"/> Viruses Blocked	Total Viruses Blocked Over Time, Top Viruses Blocked	Log
<input type="checkbox"/> URL Report	Top URLs by Bandwidth, Top URLs by Count, Top URL Categories by Bandwidth <a href="#">25</a>	Log
<input type="checkbox"/> Virus: Top Blocked	Virus: Top Blocked	Log
<input type="checkbox"/> Top Firewall Events	Top Firewall Events	Log
<input type="checkbox"/> Top Firewall Deny Destinations	Top Firewall Deny Destinations	Log
<input type="checkbox"/> Top Firewall Service Deny	Top Firewall Service Deny	Log
<input type="checkbox"/> Top Firewall Denies	Top Firewall Denies	Log

- Administration—The Administration tab provides a workspace in which you can review and manage device log files, reboot schedule, software packages, licenses, certificates, alarms, tools, and Juniper Sky ATP enrollments.

Figure 8 on page 35 shows an example of the J-Web Administration tab.

Figure 8: J-Web Administration Tab

Files ⓘ

Clean Up Files

If you are running low on storage space on your device, you can click on the "Clean Up Files" button below. By doing so, the device will perform the following:

- Rotate your log files
- Delete log files in /var/log that are not currently being written to
- Delete temporary files in /var/tmp that have not been touched in 2 days
- Delete all crash files in /var/crash
- Delete all old software \*.tgz files in /var/sw/pkg

Alternatively, you can click on the "File Type" group name below to manually download and delete individual files.

Clean Up Files

Download and Delete Files

File Type	Directory	Usage
<a href="#">Log Files</a>	/var/log	100M
<a href="#">Temporary Files</a>	/var/tmp	4.0G
<a href="#">Jailed Temporary Files (install_log, etc)</a>	/var/jail/tmp	84K
<a href="#">Crash (Core) Files</a>	/var/crash	16K
<a href="#">Database files</a>	/var/db	305M
	/jail/var/tmp/	84K

Delete Backup JUNOS Package

JUNOS normally keeps a copy of the previous software installation in case you want to revert to it. This backup can be deleted if your compact flash is becoming full. To delete the old package file, click on the link below.

J-Web Main Pane

The main workspace of J-Web takes up the remainder of the browser window just below the Banner and next to the side pane. Table 8 on page 36 shows a sample of navigation, customization, and help icons in the main pane of the J-Web GUI.

Table 8: J-Web Main Pane Elements




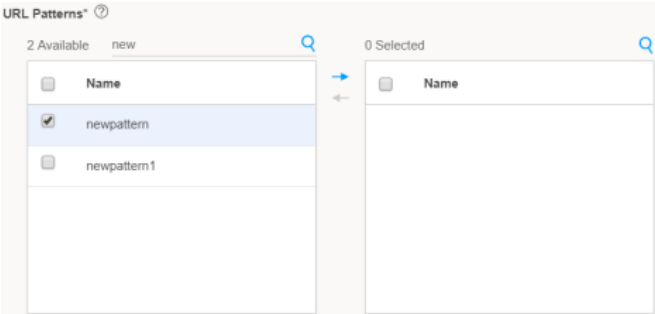

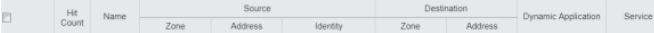





Element	Description
<p>Breadcrumbs</p> <p>Configure / Security Services / UTM / Antispam Profiles</p>	<p>Location—Upper left part of main screen. Not visible on the Dashboard.</p> <p>Trace your location in the GUI. The breadcrumbs provide a path back to one of the five tabs: Dashboard, Monitor, Configure, Reports, and Administration.</p>
<p>Info Tips</p> 	<p>Location—Various places around the GUI.</p> <p>Hover your mouse over any available question mark icon for quick pop-up guidance.</p>
<p>Show/Hide Columns</p> 	<p>Location—Upper right corner of some tabular display windows such as the Address Pools tab, Rules tab, and so on.</p> <p>In tabular displays, you can choose which columns are visible by clicking the icon and then selecting the check boxes on the menu.</p>
<p>Table Search</p> 	<p>Location—Upper right corner of tabular views.</p> <p>You can click the magnifying glass icon, within large tabular views, to search for specific text within any of the visible fields in the display.</p>
<p>Item Selector Search</p> 	<p>Location—Within the fields.</p> <p>You can use a search text box to select items for inclusion in a rule or policy.</p>

Table 8: J-Web Main Pane Elements (*continued*)

Element	Description
<p>Advanced Search</p>  	<p>Location—Above the table grid.</p> <p>The search includes the logical operators as part of the filter string. In the search text box, when you hover over the icon, it displays an example filter condition. When you start entering the search string, the icon indicates whether the filter string is valid or not.</p> <p><b>NOTE:</b> Press Spacebar to add an AND operator or OR operator to the search string. Press backspace at any point of time while entering a search criteria, only one character is deleted.</p>
<p>Filter</p> 	<p>Location—Upper right corner of tabular views.</p> <p>You can click the filter icon to select any value from a list for category and subcategory columns. The grid is reloaded with the filtered category and subcategory.</p>
<p>Success message</p> 	<p>Location—At the top of the main pane.</p> <p>A message is displayed with this icon to state that your task is successful.</p>
<p>Information message</p> 	<p>Location—At the top of the main pane.</p> <p>A message is displayed with this icon to state you have some pending actions but you can continue with the task.</p>
<p>Alert message</p> 	<p>Location—At the top of the main pane.</p> <p>A message is displayed with this icon to state you have some pending actions which you must complete to proceed with the required task.</p>
<p>Warning message</p> 	<p>Location—At the top of the main pane.</p> <p>A message is displayed with this icon to state you have some pending actions which you must complete else you cannot proceed with the required task.</p>



J-Web Workflow Wizards

J-Web contains assisting workflow wizards that guide you through some of its security functions. These include Setup wizard, Chassis Cluster wizard, PPPOE wizard, VPN wizard, and NAT wizard. These wizards helps you with a guided setup and helps you in performing step-by-step configuration of a services gateway that can securely pass traffic.

**NOTE:** PPPOE , VPN , and NAT Wizards are available only in the SRX300 line of devices and SRX550M devices.

Summary

J-Web is a GUI approach that aims to provide a graphical framework to help you visualize and manage your SRX Series devices more easily.

Release History Table

Release	Description
19.3R1	Starting in Junos OS Release 19.3R1, after you successfully login to J-Web GUI, J-Web launch pad appears. The launch pad provides a quick view of system identification details, active users, and interface status.

# 2

PART

## Dashboard

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J-Web Dashboard | 40

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# J-Web Dashboard

## IN THIS CHAPTER

- [Dashboard Overview | 40](#)

## Dashboard Overview

### IN THIS SECTION

- [What is J-Web Dashboard | 40](#)
- [Chassis View | 41](#)
- [Work with Widgets | 42](#)

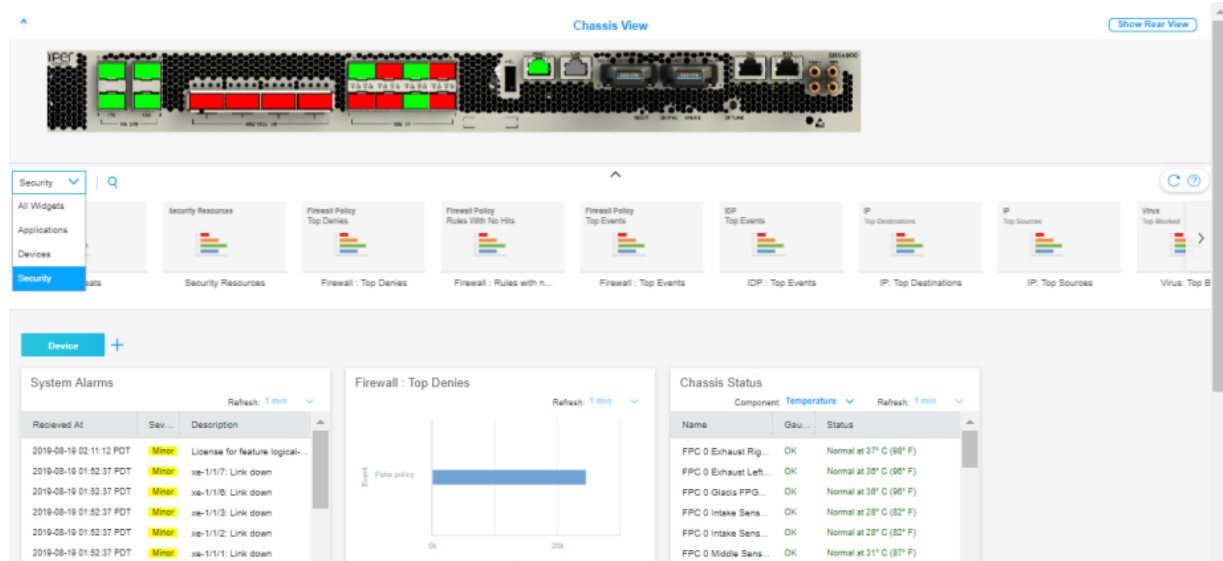
### What is J-Web Dashboard

The J-Web dashboard provides a unified overview of the system and network status retrieved from SRX Series devices.

To use the dashboard at the top-level menu, select **Dashboard**. By default, the Dashboard page displays the front view of the chassis and all the widget thumbnails.

[Figure 9 on page 41](#) shows an example of the Dashboard page of SRX4600 Services Gateway.

Figure 9: SRX4600 Dashboard



## Chassis View

You can view the image of the chassis and its component parts using the Dashboard. The ports reflect the most real-time status and are colored to indicate the port link status. For example, the ge port LED is green and steadily on when the port is up and red when the port is down. Major or minor alarm indicators appear in red. When you insert or remove a card, the chassis view reflects the change immediately.

**NOTE:** To use the Chassis View, you must install a recent version of Adobe Flash that supports ActionScript and AJAX (Version 9).

Using the chassis view, you can:

- Mouse over a port to view the port name and help tips.
- Use the Show Front View and Show Rear View buttons at the top right corner to toggle between front and rear views of the chassis.
- Use the arrow button at the left top corner to hide or show the chassis view.
- Right-click on each of the component to view the chassis information, switch to front or back view of the chassis, and configure or monitor ports.
- Use the zoom option on the left side of the chassis to zoom in or out for SRX5000 line of devices.

**NOTE:** Starting in Junos OS Release 19.3R1, J-Web supports I/O card (IOC4) and Routing Engine (RE3) line cards for SRX5000 line of devices and Switch Control Board (SCB4) line cards for SRX5600 and SRX5800 devices.

Table 9 on page 42 summarizes the fields in Chassis View.

Table 9: Fields in Dashboard Chassis View

Field	Description
Chassis View	<ul style="list-style-type: none"><li>• Provides a graphical representation of the hardware chassis.</li><li>• Displays the front or rear panel view of the device and shows which slots are occupied. When you insert or remove a card, the Chassis View reflects the change immediately.</li><li>• Changes color to indicate the port link status. For example, the ge port LED is green and steadily on when the port is up and red when the port is down.</li><li>• Displays help tips when you hover the mouse over a port.</li></ul> <p><b>NOTE:</b> You can also view the sub-ports details configured on any or all ports of the SRX5K-IOC4-MRATE line card.</p>
Show Front View	Displays the front view of the chassis and its components.
Show Rear View	Displays the rear view of the chassis and its components.
Zoom	Available on the left side of the chassis to zoom in or zoom out the chassis view.
Reset	Available on the left side of the chassis to set the chassis view for the default size.

Work with Widgets

Each widget pane acts as a separate frame. You can click + icon to add separate dashboard and name it as per your ease. You can refresh the display of the Dashboard page by clicking the refresh icon at the top right-hand corner above the widget pane.

Starting in Junos OS Release 19.3R1, you can choose any one of the categories to view widgets on your device:

- All Widgets—Displays all the supported widgets
- Applications—Displays only the supported application related widgets
- Devices—Displays only the supported device related widgets
- Security—Displays only the supported security related widgets

**NOTE:**

- The Threat Activity pane is not available on SRX5400, SRX5600, and SRX5800 devices.
- For SRX Series devices configured for logical systems, the Logical System Identification and Logical System Profile panes are displayed when you log in as a user logical system administrator. These are the only logical system panes available in Dashboard Preferences.
- If the rescue configuration is not set, the set rescue configuration link directs you to the Administration > Devices > Config Management > Rescue page to set the rescue configuration.

To use a widget on the Dashboard:

1. Drag the widgets from the palette or thumbnail container to your dashboard.

When you add more widgets on the J-Web Dashboard, you can observe high CPU usage on the Routing Engine for a short span of time on every refresh. We recommend that you use four widgets for lower CPU consumption.

2. Mouse over the top of each widget to minimize, refresh, and close by using the respective icons.

**NOTE:** Starting in Junos OS Release 19.3R1, the dashlet data is refreshed every minute by default. You cannot manually configure the refresh interval of the dashlet. If the data is not aged in the cache, data loads from the cache during the dashlet refresh. If the data is aged, it is retrieved from the device during the next refresh interval cycle.

Table 10 on page 43 provides the dashboard widgets options based on the selected device.

**Table 10: Dashboard Widgets Options**

Field	Description
System Alarms	Provides the received time, severity, description of the alarms and the action to be taken.
System Identification	Provides system details such as serial number of the software, hostname, software version, BIOS version, system uptime, and system time.
Login Sessions	Provides the user credentials, login time, idle time, and host.

Table 10: Dashboard Widgets Options (*continued*)

Field	Description
File Usage	<p>Provides current space requirements for log, temporary, crash, and database files. Click <b>Maintain</b> to download or delete some or all of these files.</p> <p><b>NOTE:</b> Starting in Junos OS Release 19.3R1, File Usage widget supports RE3 line cards for SRX5000 line of devices.</p>
Applications	Displays top 10 applications based on sessions or bandwidth.
Threats	Displays top 10 IPS sources, antispam sources, and antivirus name, sorted by count.
Resource Utilization	<p>Provides a graphical representation of the CPU, memory, and storage used for both the data and the control planes. The CPU control also shows the load average value for 1 minute when you mouse over <b>CPU Control</b>.</p> <p><b>NOTE:</b> Starting in Junos OS Release 19.3R1, Resource Utilization widget supports RE3 line cards for SRX5000 line of devices.</p>
Firewall: Top Denies	Displays top requests denied by the firewall based on their source IP addresses, sorted by count.
Firewall Policy: Rules With No Hits	Displays firewall policies with the most rules not hit, sorted by count.
Threat Activity	Provides the most current threats received on the device.
Firewall: Top Events	Displays all top 10 firewall events of the network traffic, sorted by count.
IDP: Top Events	Displays top 10 IDP events grouped by event-type, sorted by count.
Signal Strength	Displays the signal strength of the device.
Interface: Most Dropped Packets	Displays top 5 interfaces based on the CLI response; top-count will increase to 10.
Interface: Most Sessions	Displays top 10 interfaces with most sessions.
IP: Top Destinations	Displays top 10 destination-address, sorted by count or volume.
IP: Top Sources	Displays top 10 source-address of the network traffic, sorted by count or volume.
Virus: Top Blocked	Displays top 10 blocked viruses, sorted by count.

Table 10: Dashboard Widgets Options (continued)

Field	Description
Zones: Top Bandwidth by Packets	Displays top 10 zones with maximum throughput rate in packets.
Web Filtering: Top Web Blocked	Displays top 5 WebBlocked based on the CLI response.
Web Filtering: Top Source Address	Displays top 4 Source Address Web Filter based on the CLI response.
Web Filtering: Top Destination Address	Displays top 4 Destination Address Web Filter based on the CLI response.
Application & Users: High Risk Applications Blocked Per User	Displays top 4 High Risk Applications Blocked per user based on the CLI response.
Application & Users: High Risk Applications Allowed Per User	Displays High Risk Applications allowed per user.
Security Resources	Provides the maximum, configured, and activated number of session, firewall/VPN policies, and IPsec VPNs.
Chassis Status	<p>Provides the component temperature and fan tray details of the system. Select <b>Monitor &gt; Device &gt; Chassis Information</b> for more information.</p> <p><b>NOTE:</b> Starting in Junos OS Release 19.3R1, Chassis Status widget supports RE3 line cards for SRX5000 line of devices and SCB4 line cards for SRX5600 and SRX5800 devices.</p>
Content Filtering: Top Content Filters	Displays top 10 Protocol, Reason, and Source-address.
Web Filtering: Top Web Categories	Displays top 10 Web categories, Security risk, Productivity loss, Legal-liability and Blocked.
Threat Monitoring	Displays top Malwares identified, Threats and Infected categories.
Top Users of High Risk Applications by Volume/Count	Displays top users of High Risk Applications by volume.
Application & Users: Top Categories	Displays top 4 Categories of Application & Users sorted by count and volume.
Application & Users: Top Users	Displays top 4 Users sorted by count and volume.
Application & Users: Top IPs	Displays top 4 IPs of Application & Users sorted by count and volume.



Table 10: Dashboard Widgets Options (*continued*)

Field	Description
Application & Users: Top High Risk Applications	Displays top 4 High Risk Applications sorted by risk, count and volume.
Anti Spam: Top Source Address	Displays top 4 Antispam group by source address and sorted by count.
Application & Users: Application Usage by Category/Type	Displays top 5 Application Usage by Category group.
Application & Users: Users with the Most Critical Application Usage	Displays top 5 Users with the Most Critical Application Usage volume.
Storage Usage	Displays used and available storage and usage information about other system components.
Logical System Identification	Provides the logical system name, the security profile assigned to the logical system, the software version, and the system time.
Logical System Profile	Displays the types of resources that are allocated to the user logical system, the number of resources used and reserved, and the maximum number of resources allowed.

### Release History Table

Release	Description
<a href="#">19.3R1</a>	Starting in Junos OS Release 19.3R1, J-Web supports I/O card (IOC4) and Routing Engine (RE3) line cards for SRX5000 line of devices and Switch Control Board (SCB4) line cards for SRX5600 and SRX5800 devices.
<a href="#">19.3R1</a>	Starting in Junos OS Release 19.3R1, you can choose any one of the categories to view widgets on your device:
<a href="#">19.3R1</a>	Starting in Junos OS Release 19.3R1, the dashlet data is refreshed every minute by default. You cannot manually configure the refresh interval of the dashlet. If the data is not aged in the cache, data loads from the cache during the dashlet refresh. If the data is aged, it is retrieved from the device during the next refresh interval cycle.
<a href="#">19.3R1</a>	Starting in Junos OS Release 19.3R1, File Usage widget supports RE3 line cards for SRX5000 line of devices.
<a href="#">19.3R1</a>	Starting in Junos OS Release 19.3R1, Resource Utilization widget supports RE3 line cards for SRX5000 line of devices.
<a href="#">19.3R1</a>	Starting in Junos OS Release 19.3R1, Chassis Status widget supports RE3 line cards for SRX5000 line of devices and SCB4 line cards for SRX5600 and SRX5800 devices.

# 3

PART

## Monitor

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# Interfaces

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- [Monitor PPPoE | 52](#)

## Monitor Ports

You are here: **Monitor > Interfaces > Ports.**

Use this page to view general information about all physical and logical interfaces for a device.

**NOTE:** Starting in Junos OS Release 19.3R1, J-Web supports IOC4 line cards for SRX5000 line of devices. You can also view the sub-ports details configured on any or all ports of the SRX5K-IOC4-MRATE line card.

[Table 11 on page 50](#) describes the fields on the Ports page.

Table 11: Fields on the Ports Page

Field	Description
Start/Stop button	Starts or stops monitoring the selected interfaces.
Port	Displays the interface name.
Admin Status	Displays whether the interface is enabled (Up) or disabled (Down).
Link Status	Displays whether the interface is linked (Up) or not linked (Down).
Address	Displays the IP address of the interface.

Table 11: Fields on the Ports Page (*continued*)

Field	Description
Zone	Displays whether the zone is an untrust zone or a trust zone.
Services	Displays services that are enabled on the device, such as HTTP and SSH.
Protocols	Displays protocols that are enabled on the device, such as BGP and IGMP.
<b>Interface Statistics</b>	
Input Rate	Displays interface bandwidth utilization. Input rates are shown in bytes per second.
Output Rate	Displays interface bandwidth utilization. Output rates are shown in bytes per second.
Error Counters	Displays input and output error counters in the form of a bar chart.
Packet Counters	Displays the number of broadcast, unicast, and multicast packet counters in the form of a pie chart. (Packet counter charts are supported only for interfaces that support MAC statistics).

[Table 12 on page 51](#) shows the options to change the Interface display on the Ports page.

Table 12: Options to change the Interface Display

Field	Description
Port for FPC	Controls the member for which information is displayed.
Show Graph	Displays input and output packet counters and error counters in the form of charts.
Pop-up button	Displays the interface graphs in a separate pop-up window.
Details	Displays extensive statistics about the selected interface, including its general status, traffic information, IP address, I/O errors, class-of-service data, and statistics.
Refresh Interval	Indicates the duration of time after which you want the data on the page to be refreshed.

Table 12: Options to change the Interface Display (*continued*)

Field	Description
Clear Statistics	Clears the statistics for the selected interface.

Alternatively, you can enter the following show commands in the CLI to view interface status and traffic statistics:

- **show interfaces terse**

**NOTE:** On SRX Series devices, on configuring identical IPs on a single interface, you will not see a warning message; instead, you will see a syslog message.

- **show interfaces detail**
- **show interfaces extensive**
- **show interfaces interface-name**

#### Release History Table

Release	Description
<a href="#">19.3R1</a>	Starting in Junos OS Release 19.3R1, J-Web supports IOC4 line cards for SRX5000 line of devices. You can also view the sub-ports details configured on any or all ports of the SRX5K-IOC4-MRATE line card.

#### RELATED DOCUMENTATION

| [Monitor PPPoE](#) | 52

## Monitor PPPoE

You are here: **Monitor > Interfaces > PPPoE.**

Use this page to view information on the session status for PPPoE interfaces, cumulative statistics for all PPPoE interfaces on the device, and the PPPoE version configured on the device.

**NOTE:** This option is not available in SRX5000 line of devices and SRX4000 line of devices.

To view interface-specific properties in the J-Web interface, select the interface name on the PPPoE page.

[Table 13 on page 53](#) describes the fields on the PPPoE page.

**Table 13: Fields on the PPPoE Page**

Field	Description
Interface	<p>Name of the PPPoE interface.</p> <p>Click the interface name to display PPPoE information for the interface.</p>
State	State of the PPPoE session on the interface.
Session ID	<p>Unique session identifier for the PPPoE session.</p> <p>To establish a PPPoE session, first the device acting as a PPPoE client obtains the Ethernet address of the PPPoE server or access concentrator, and then the client and the server negotiate a unique session ID. This process is referred to as PPPoE active discovery and is made up of four steps:</p> <ul style="list-style-type: none"> <li>• initiation</li> <li>• offer</li> <li>• request</li> <li>• session confirmation.</li> </ul> <p>The access concentrator generates the session ID for session confirmation and sends it to the PPPoE client in a PPPoE Active Discovery Session-Confirmation (PADS) packet.</p>
Service Name	<p>Type of service required from the access concentrator.</p> <p>Service Name identifies the type of service provided by the access concentrator, such as the name of the Internet service provider (ISP), class, or quality of service.</p>
Configured AC Name	Configured access concentrator name.
Session AC Names	Name of the access concentrator.
AC MAC Address	Media access control (MAC) address of the access concentrator.
Session Uptime	Number of seconds the current PPPoE session has been running.



Table 13: Fields on the PPPoE Page (*continued*)

Field	Description
Auto-Reconnect Time-out	Number of seconds to wait before reconnecting after a PPPoE session is terminated.
Idle Time-out	Number of seconds a PPPoE session can be idle without disconnecting.
Underlying Interface	Name of the underlying logical Ethernet or ATM interface on which PPPoE is running—for example, ge-0/0/0.1.
<b>PPPoE Statistics</b>	
Active PPPoE Sessions	Total number of active PPPoE sessions.
Packet Type	<p>Packets sent and received during the PPPoE session, categorized by packet type and packet error:</p> <ul style="list-style-type: none"> <li>• <b>PADI</b>—PPPoE Active Discovery Initiation packets.</li> <li>• <b>PADO</b>—PPPoE Active Discovery Offer packets.</li> <li>• <b>PADR</b>—PPPoE Active Discovery Request packets.</li> <li>• <b>PADS</b>—PPPoE Active Discovery Session - Confirmation packets.</li> <li>• <b>PADT</b>—PPPoE Active Discovery Terminate packets.</li> <li>• <b>Service Name Error</b>—Packets for which the Service-Name request could not be honored.</li> <li>• <b>AC System Error</b>—Packets for which the access concentrator experienced an error in processing the host request. For example, the host had insufficient resources to create a virtual circuit.</li> <li>• <b>Generic Error</b>—Packets that indicate an unrecoverable error occurred.</li> <li>• <b>Malformed Packet</b>—Malformed or short packets that caused the packet handler to disregard the frame as unreadable.</li> <li>• <b>Unknown Packet</b>—Unrecognized packets.</li> </ul>
Sent	Number of the specific type of packet sent from the PPPoE client.
Received	Number of the specific type of packet received by the PPPoE client.
Timeout	<p>Information about the timeouts that occurred during the PPPoE session.</p> <ul style="list-style-type: none"> <li>• <b>PADI</b>—Number of timeouts that occurred for the PADI packet.</li> <li>• <b>PADO</b>—Number of timeouts that occurred for the PADO packet. (This value is always 0 and PADO is not supported).</li> <li>• <b>PADR</b>—Number of timeouts that occurred for the PADR packet.</li> </ul>
Sent	Number of the timeouts that occurred for PADI, PADO, and PADR packets.

Table 13: Fields on the PPPoE Page (*continued*)

Field	Description
<b>PPPoE Version</b>	
Maximum Sessions	Maximum number of active PPPoE sessions the device can support. The default is 256 sessions.
PADI Resend Timeout	<p>Initial time, (in seconds) the device waits to receive a PADO packet for the PADI packet sent. For example, 2 seconds. This timeout doubles for each successive PADI packet sent.</p> <p>The PPPoE Active Discovery Initiation (PADI) packet is sent to the access concentrator to initiate a PPPoE session. Typically, the access concentrator responds to a PADI packet with a PPPoE Active Discovery Offer (PADO) packet. If the access concentrator does not send a PADO packet, the device sends the PADI packet again after timeout period is elapsed. The PADI Resend Timeout doubles for each successive PADI packet sent. For example, if the PADI Resend Timeout is 2 seconds, the second PADI packet is sent after 2 seconds, the third after 4 seconds, the fourth after 8 seconds, and so on.</p>
PADR Resend Timeout	<p>Initial time (in seconds) the device waits to receive a PADS packet for the PADR packet sent. This timeout doubles for each successive PADR packet sent.</p> <p>The PPPoE Active Discovery Request (PADR) packet is sent to the access concentrator in response to a PADO packet, and to obtain the PPPoE session ID. Typically, the access concentrator responds to a PADR packet with a PPPoE Active Discovery Session-Confirmation (PADS) packet, which contains the session ID. If the access concentrator does not send a PADS packet, the device sends the PADR packet again after the PADR Resend Timeout period is elapsed. The PADR Resend Timeout doubles for each successive PADR packet sent.</p>
Maximum Resend Timeout	Maximum value (in seconds) that the PADI or PADR resend timer can accept. For example, 64 seconds. The maximum value is 64.
Maximum Configured AC Timeout	Time (in seconds), within which the configured access concentrator must respond.

Alternatively, enter the following CLI commands:

- **show pppoe interfaces**
- **show pppoe statistics**
- **show pppoe version**

You can also view status information about the PPPoE interface by entering the show interfaces pp0 command in the CLI editor.

## RELATED DOCUMENTATION

| [Monitor Ports](#) | 50

# Access

IN THIS CHAPTER

- [Monitor Address Pools | 57](#)

## Monitor Address Pools

You are here: **Monitor** > **Access** > **Address Pools**.

Use this page to view the properties and assignments of the address pool.

**NOTE:** This option is not available in SRX5000 line of devices and SRX4000 line of devices.

[Table 14 on page 57](#) describes the fields on the Address Pools page.

Table 14: Fields on the Address Pools Page

Field	Description
<b>Address Pool Properties</b>	
Address Pool	Select an address pool to view its properties and assignments.
Refresh Button	Refreshes the data of the address pool assignment.
Address Pool Name	Displays the name of the address pool.
Network Address	Displays the IP network address of the address pool.
Address Ranges	Displays the name, the lower limit, and the upper limit of the address range.
Primary DNS	Displays the primary-dns IP address.
Secondary DNS	Displays the secondary-dns IP address.

Table 14: Fields on the Address Pools Page (continued)

Field	Description
Primary WINS	Displays the primary-wins IP address.
Secondary WINS	Displays the secondary-wins IP address.
<b>Address Pool Address Assignment</b>	
IP Address	Displays the IP address of the address pool.
Hardware Address	Displays the hardware MAC address of the address pool.
Host/User	Displays the user name using the address pool.
Type	Displays the authentication type used by the address pool  <b>NOTE:</b> The authentication types can be extended authentication (XAuth) or IKE Authentication.

RELATED DOCUMENTATION

| [Monitor Ports](#) | 50

# Multi Tenancy

IN THIS CHAPTER

- [Monitor Logical Systems | 59](#)
- [Monitor Tenants | 62](#)

## Monitor Logical Systems

You are here: **Monitor** > **Multi Tenancy** > **Logical System**.

An SRX Series device with a multitenant logical systems device, provides various departments, organizations, customers, and partners a private use of the portion of its resource and a private view of the device.

[Table 15 on page 59](#) describes the fields on the logical system page.

Table 15: Fields on the Logical Systems Page

Field	Description
Name	Displays the logical systems configured on the device.
Resource Profile	Displays the logical system profile assigned to each logical system.
Zone Usage	Displays the used and reserved number of zones that user logical system administrators and primary logical system administrators have configured for their logical systems if the security profile is bound to the logical systems.
Scheduler Usage	Displays the number of schedulers that user logical system administrators and primary logical system administrators have configured for their logical systems if the security profile is bound to the logical systems.
Policy Count Usage	Displays the number of security policies with a count that user logical system administrators and primary logical system administrators have configured for their logical systems if the security profile is bound to the logical systems.

Table 15: Fields on the Logical Systems Page (*continued*)

Field	Description
Policy Without Count Usage	Displays the number of security policies without a count that user logical system administrators and primary logical system administrators have configured for their logical systems if the security profile is bound to the logical systems.
Nat Static Rule Usage	Displays the number of NAT static rule configurations that user logical system administrators and primary logical system administrators have configured for their logical systems if the security profile is bound to the logical systems.
Nat Source Rule Usage	Displays the NAT source rule configurations that user logical system administrators and primary logical system administrators have configured for their logical systems if the security profile is bound to the logical systems.
Nat Source Pool Usage	Displays the NAT source pool configurations that logical system administrators and primary logical system administrators have configured for their logical systems if the security profile is bound to the logical systems.
Nat Rule Referenced Prefix Usage	Displays the security NAT rule referenced IP prefix quota of a logical system.
Nat Port-ol IP Number Usage	Displays the number of NAT port overloading IP number configurations that user logical system administrators and primary logical system administrators have configured for their logical systems if the security profile is bound to the logical systems.
Nat Pat Portnum Usage	Displays the used quantity and the reserved quantity of ports for the logical system as part of the security profile.
Nat Pat Address Usage	Displays the number of NAT with port address translation (PAT) configurations that user logical system administrators and primary logical system administrators have configured for their logical systems if the security profile is bound to the logical systems.
Nat Address Usage	Displays the number of NAT without port address translation configurations that user logical system administrators and primary logical system administrators have configured for their logical systems if the security profile is bound to the logical systems.
Nat Interface Port-ol IP Usage	Displays the security NAT interface port overloading quota of a logical system.
Nat Destination Rule Usage	Displays the number of NAT destination rule configurations that user logical system administrators and primary logical system administrators have configured for their logical systems if the security profile is bound to the logical systems.

Table 15: Fields on the Logical Systems Page (*continued*)

Field	Description
Nat Destination Pool Usage	Displays the number of NAT destination pools that user logical system administrators and primary logical system administrators have configured for their logical systems if the security profile is bound to the logical systems.
Nat Cone Binding Usage	Displays the number of NAT cone binding configurations that user logical system administrators and primary logical system administrators have configured for their logical systems if the security profile is bound to the logical systems.
Flow Session Usage	Displays the number of flow sessions that user logical system administrators and primary logical system administrators have configured for their logical systems if the security profile is bound to the logical systems.
Flow Gate Usage	Displays the number of flow gates, also known as pinholes, that user logical system administrators and primary logical system administrators have configured for their logical systems if the security profile is bound to the logical systems.
DsLite Software Initiator Usage	<p>Displays the number of IPv6 dual-stack lite (DS-Lite) software initiators that can connect to the software concentrator configured in either a user logical system or the primary logical system.</p> <p><b>NOTE:</b> This statement is configured in the security profile that is bound to the logical system.</p>
CPU on SPU Usage	<p>Displays the CPU utilization and average utilization of all SPUs is shown</p> <p><b>NOTE:</b> The detail option shows CPU utilization on each SPU.</p>
Auth Entry Usage	Displays the number of firewall authentication entries that user logical system administrators and primary logical system administrators have configured for their logical systems if the security profile is bound to the logical systems.
Appfw Rule Set Usage	Displays the number of application firewall rule set configurations that a primary administrator has configured for a primary logical system or user logical system when the security profile is bound to the logical systems.
Appfw Rule Usage	Displays the number of application firewall rule configurations that a primary administrator have configured for a primary logical system or user logical system when the security profile is bound to the logical systems.



Table 15: Fields on the Logical Systems Page (*continued*)

Field	Description
appfw-profile-count	Displays the application firewall profile quota of a logical system  <b>NOTE:</b> As a primary administrator, you can create a security profile and specify the kinds and amounts of resources to allocate to a logical system to which the security profile is bound.
address-book-count	Displays the number of address books that user logical system administrators and primary logical system administrators have configured for their logical systems if the security profile is bound to the logical systems.

## RELATED DOCUMENTATION

| [Monitor Tenants](#) | 62

## Monitor Tenants

You are here: **Monitor** > **Multi Tenancy** > **Tenants**.

An SRX Series device with a multitenant systems device, provides various departments, organizations, customers, and partners, depending on your environment, private and logically separated use of system resources and tenant-specific views of security configuration and KPIs.

[Table 16 on page 62](#) describes the fields on the Tenants page.

Table 16: Fields on the Tenants Page

Field	Description
View Details	Displays the grid view or graph view of all the resources for the tenant you have selected.
Search icon	Enables you to search for a tenant system in the grid.
Filter icon	Enables you to filter and display the list of tenants based on a column in the grid.
Show Hide Column icon	Enables you to show or hide a column in the grid.
Name	Displays the tenants configured on the device.

Table 16: Fields on the Tenants Page (*continued*)

Field	Description
Resource Profile	Displays the resource profile assigned to each tenant.
Zone Usage	Displays the used and reserved number of zones for the given tenant.
Scheduler Usage	Displays the number of schedulers that primary administrators have configured for their tenants.
Policy Count Usage	Displays the number of security policies with a count primary administrators have configured for their tenants if the security profile is bound to the tenants.
Policy Without Count Usage	Displays the number of security policies without a count that primary administrators have configured for their tenants if the security profile is bound to the tenants.
Nat Static Rule Usage	Displays the number of NAT static rule configurations that primary administrators have configured for their tenants if the security profile is bound to the tenants.
Nat Source Rule Usage	Displays the NAT source rule configurations that primary administrators have configured for their tenants if the security profile is bound to the tenants.
Nat Source Pool Usage	Displays the NAT source pool configurations that primary administrators have configured for their tenants if the security profile is bound to the tenants.
Nat Rule Referenced Prefix Usage	Displays the security NAT rule referenced IP prefix quota of a tenant.
Nat Port-OI IP Number Usage	Displays the number of NAT port overloading IP number configurations that primary administrators have configured for their tenants if the security profile is bound to the tenants.
Nat Pat Portnum Usage	Displays the used quantity and the reserved quantity of ports for the tenant as part of the security profile.
Nat Pat Address Usage	Displays the number of NAT with port address translation (PAT) configurations that primary administrators have configured for their tenants if the security profile is bound to the tenants.
Nat No Pat Address Usage	Displays the number of NAT without port address translation configurations that primary administrators have configured for their tenants if the security profile is bound to the tenants.
Nat Interface Port-OI IP Usage	Displays the security NAT interface port overloading quota of a tenant.

Table 16: Fields on the Tenants Page (*continued*)

Field	Description
Nat Destination Rule Usage	Displays the number of NAT destination rule configurations that primary administrators have configured for their tenants if the security profile is bound to the tenants.
Nat Destination Pool Usage	Displays the number of NAT destination pools that primary administrators have configured for their tenants if the security profile is bound to the tenants.
Nat Cone Binding Usage	Displays the number of NAT cone binding configurations that primary administrators have configured for their tenants if the security profile is bound to the tenants.
Flow Session Usage	Displays the number of flow sessions that primary administrators have configured for their tenants if the security profile is bound to the tenants.
Flow Gate Usage	Displays the number of flow gates, also known as pinholes, that primary administrators have configured for their tenants if the security profile is bound to the tenants.
DsLite Software Initiator Usage	<p>Displays the number of IPv6 dual-stack lite (DS-Lite) software initiators that can connect to the software concentrator configured in either a user tenant or the primary tenant</p> <p><b>NOTE:</b> This statement is configured in the security profile that is bound to the tenant.</p>
CPU on SPU Usage	<p>Displays the CPU utilization and average utilization of all SPUs</p> <p><b>NOTE:</b> The detail option shows CPU utilization on each SPU.</p>
Auth Entry Usage	Displays the number of firewall authentication entries that primary administrators have configured for their tenants if the security profile is bound to the tenants.
Appfw Rule Set Usage	Displays the number of application firewall rule set configurations that a primary administrator has configured for a tenant when the security profile is bound to the tenants.
Appfw Rule Usage	Displays the number of application firewall rule configurations that a primary administrator have configured for a primary tenant or user tenant when the security profile is bound to the tenants.

Table 16: Fields on the Tenants Page *(continued)*

Field	Description
appfw-profile-count	Displays the application firewall profile quota of a tenant  <b>NOTE:</b> As a primary administrator, you can create a security profile and specify the kinds and amount of resources to allocate to a tenant to which the security profile is bound.
address-book-count	Displays the number of address books that primary administrators have configured for their tenants if the security profile is bound to the tenants.

RELATED DOCUMENTATION

# Alarms

IN THIS CHAPTER

- [Monitor Alarms | 66](#)
- [Monitor Policy Log | 67](#)

## Monitor Alarms

You are here: **Monitor** > **Alarms** > **Alarms**.

Use this page to view the alarms details such as time, severity, type, and descriptions of the alarm.

[Table 17 on page 66](#) describes the fields on the Alarms page.

Table 17: Fields on the Alarms Page

Field	Description
<b>Alarm Filter</b>	
Alarm Type	<p>Specifies the type of alarm to monitor:</p> <ul style="list-style-type: none"><li>● <b>System</b>—System alarms include FRU detection alarms (power supplies removed, for instance).</li><li>● <b>Chassis</b>—Chassis alarms indicate environmental alarms such as temperature.</li><li>● <b>All</b>—Indicates to display all the types of alarms.</li></ul>
Description	<p>Enter a brief synopsis of the alarms you want to monitor.</p>
Severity	<p>Specifies the alarm severity that you want to monitor</p> <ul style="list-style-type: none"><li>● <b>Major</b>—A major (red) alarm condition requires immediate action.</li><li>● <b>Minor</b>—A minor (yellow) condition requires monitoring and maintenance.</li><li>● <b>All</b>—Indicates to display all the severities.</li></ul>
Date From	<p>Specifies the beginning of the date range that you want to monitor. Set the date using the calendar pick tool.</p>

Table 17: Fields on the Alarms Page (*continued*)

Field	Description
To	Specifies the end of the date range that you want to monitor. Set the date using the calendar pick tool.
Search	Executes the options that you specified.
Alarm Details	Displays the following information about each alarm: <ul style="list-style-type: none"> <li>• <b>Time</b>—Time that the alarm was registered.</li> <li>• <b>Type</b>—Type of alarm: System, Chassis, or All.</li> <li>• <b>Severity</b>—Severity class of the alarm: Minor or Major.</li> <li>• <b>Description</b>—Description of the alarm.</li> </ul>

## RELATED DOCUMENTATION

| [Monitor Policy Log](#) | 67

## Monitor Policy Log

You are here: **Monitor** > **Alarms** > **Policy Log**.

Use the monitoring functionality to view the Policy Log page.

[Table 18 on page 67](#) describes the fields on the Policy Log page.

Table 18: Fields on the Policy Log Page

Field	Description
Log file name	Name of the event log files to search.
Policy name	Name of the policy of the events to be retrieved.
Source address	Source address of the traffic that triggered the event.
Destination address	Destination address of the traffic that triggered the event.
Event type	Type of event that was triggered by the traffic.

Table 18: Fields on the Policy Log Page (*continued*)

Field	Description
Application	Application of the traffic that triggered the event.
Source port	Source port of the traffic that triggered the event.
Destination port	Destination port of the traffic that triggered the event.
Source zone	Source zone of the traffic that triggered the event.
Destination zone	Destination zone of the traffic that triggered the event.
Source NAT rule	Source NAT rule of the traffic that triggered the event.
Destination NAT rule	Destination NAT rule of the traffic that triggered the event.
Is global policy	Specifies that the policy is a global policy.
Timestamp	Time when the event occurred.
Policy name	Policy that triggered the event.
Record type	Type of event log providing the data.
Source IP/Port	Source address (and port, if applicable) of the event traffic.
Destination IP/Port	Destination address (and port, if applicable) of the event traffic.
Service name	Service name of the event traffic.
NAT source IP/Port	NAT source address (and port, if applicable) of the event traffic.
NAT destination IP/Port	NAT destination address (and port, if applicable) of the event traffic.

## RELATED DOCUMENTATION

[Monitor Alarms](#) | 66

# Events

## IN THIS CHAPTER

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- Monitor System Events | 109

## Monitor All Events

You are here: **Monitor** > **Events** > **All Events**.

Use this page to view the summary of all the events, threat severity, attacks, graphs, and grid elements for all types of events.

Using the time-range slider, you can quickly focus on the time and area of activity that you are most interested in. Once the time range is selected, all of the data presented in your view is refreshed automatically. You can also use the Custom button to set a custom time range.

You can select either the Grid View tab or the Chart View tab to view your data:

- Grid View—View the comprehensive details of events in a tabular format that includes sortable columns. You can group the events using the Group By option. For example, you can group the events based on source country, Source IP etc. The table includes information such as the event name, Source country, source IP address, and so on. [Table 19 on page 70](#) describes the fields on the Grid View page.



- **Chart View**—View a brief summary of all the events in your network. The top of the page has a swim lane graph of all the all events. You can use the widgets at the bottom of the page to view critical information such as, top sources, top source countries, top destinations, and top destination countries. [Table 20 on page 73](#) describes the widgets on the Chart View page.

**Table 19: All Events—Fields on the Grid View Page**

Field	Description
<b>Grid View</b>	Displays information in grids that are lazy loaded with infinite scrolling. You can narrow down your search to a particular event based on IP address, description, or attack name.
<b>Filters</b>	Displays the filters that are displayed above the grids.
<b>First filter list</b>	<p>Displays the options available in the first filter list are: Firewall, Webfilter, ContentFilter, Antispam, Antivirus, Ipsecvpn, IPS, Screens, Security Intelligence, and ATP.</p> <p>Select the event that you want to filter in the first filter list.</p>
<b>Second filter list</b>	<p>Displays the options available in the second filter list are: Event-name, Source-address, Destination-address, Source name, User, Role, Reason, Profile, Protocol, and Category.</p> <p>Select the next criteria of the event on which you want to filter from the second filter list.</p>

Table 19: All Events—Fields on the Grid View Page (continued)

Field	Description
Text box	<p>Displays the filter parameter that you selected from the second filter list.</p> <p><b>NOTE:</b> In the filter statement the following limitation exists:</p> <ul style="list-style-type: none"> <li>• You can use only one operator at a time.</li> <li>• You can use only one instance of the criteria or parameter in one filter statement.</li> </ul> <p>For example, if you have used &amp; operator and the parameter <b>event-name</b> once, I cannot use them again in the same filter statement</p> <p><b>CORRECT USAGE :</b> <b>event name = rt_flow_session_close &amp; application=TELNET</b></p> <p><b>WRONG USAGE :</b> <b>event name=rt_flow_session_close &amp; event-name = rt_flow_session_create</b></p> <p><b>WRONG USAGE :</b> <b>event name = rt_flow_session_close &amp; source-address=x.x.x.x &amp; application=TELNET</b></p> <p><b>NOTE:</b> The filter statement is NOT case-sensitive.</p> <p>Add the parameter for which you want to filter. For example, in the first list if you selected Firewall as the event filter and in the second filter list you selected event-name as the parameter, then the text box displays <b>event-name =</b>. If you add <b>rt_flow_session_close</b> to see only Firewall events then the text box displays <b>event name = rt_flow_session_close</b>.</p>
Go	Click <b>Go</b> to executes the filter statement that is displayed in the text box.
X	Click <b>x</b> to clear the filters.
Show Hide Column Filter icon represented by three vertical dots	Enables you to show or hide a column in the grid.
Threat Severity	Displays the severity level of the threat.
Event Name	Displays the event name of the log.
Description	Displays the description of the log.
Attack Name	Displays the attack name of the log: Trojan, worm, virus, and so on.
UTM Category or Virus Name	Displays the UTM category of the log.

Table 19: All Events—Fields on the Grid View Page (*continued*)

Field	Description
Event Category	Displays the event category of the log.
Source Country	Displays the source country of the event.
Source IP	Displays the source IP address from where the event occurred.
Source Port	Displays the source port of the event.
Destination Country	Displays the destination country of the event.
Destination IP	Displays the destination IP address of the event.
Destination Port	Displays the destination port of the event.
Application	Displays the application name from which the events or logs are generated.
User Name	Displays the username from whom the log is generated.
Hostname	Displays the host name in the log.
Service Name	Displays the name of the application service. For example, FTP, HTTP, SSH, and so on.
Protocol ID	Displays the protocol ID in the log.
Policy Name	Displays the Policy name in the log.
SourceZone	Displays the User traffic received from the zone.
Destination Zone	Displays the destination zone of the log.
Nested Application	Displays the nested application in the log.
Roles	Displays the role names associated with the event.
Reason	Displays the reason for the log generation. For example, a connection tear down may have an associated reason such as authentication failed.
NAT Source Port	Displays the translated source port.
NAT Destination Port	Displays the translated destination port.

Table 19: All Events—Fields on the Grid View Page (*continued*)

Field	Description
NAT Source Rule Name	Displays the NAT source rule name.
NAT Destination Rule Name	Displays the NAT destination rule name.
NAT Source IP	Displays the translated (or natted) source IP address. It can contain IPv4 or IPv6 addresses.
NAT Destination IP	Displays the translated (also called natted) destination IP address.
Traffic Session ID	Displays the traffic session ID of the log.
URL	Displays the accessed URL name that triggered the event.
Object Name	Displays the object name of the log.
Path Name	Displays the path name of the log.
Logical SystemName	Displays the name of the logical system.
Rule Name	Displays the rule name of the log.
Action	Displays the action taken for the event: warning, allow, and block.
Time	Displays the time when the log was received.

Table 20: All Events—Widgets on the Chart View Page

Field	Description
<b>Chart View</b>	Displays the trend analysis, displayed in the Time Range graph, in numbers.
Total Events	Displays the total number of events that occurred in the specified time range.
Virus Instances	Displays the number of virus instances that occurred in the specified time range.
Attacks	Displays the number of IDP or IPS attacks that occurred in the specified time range.
Interface Down	Displays the total number of interfaces that are down.

Table 20: All Events—Widgets on the Chart View Page (continued)

Field	Description
Sessions	Displays the total number of firewall events or sessions that occurred during the time period specified in the Time Range graph.
Graphs	The graphs display the trend analysis in swim lane chart for the time range that you specified in the Time Range graph.
Firewall	Mouse over at any point in the swim lane chart to view further details at that point.
Web Filtering	
IPSec VPNs	The legend in each graph shows the colors and its related interpretation.
Content Filtering	For example, in the Firewall graph, blue color represents all firewall events and black represents blocked firewall events. Similarly, in the IPS graph, orange, amber, and yellow represent critical, high, and medium IPS attacks respectively.
Antispam	
Antivirus	
IPS	
Screen	
Security Intelligence	
ATP	

## RELATED DOCUMENTATION

[Monitor Firewall Events](#) | 74

## Monitor Firewall Events

You are here: **Monitor** > **Events** > **Firewall**.

Use this page to view information about the security events based on Event name, Source address, Destination address, Applications, User, Service, Policy, Nested application, Source interface and Source zone.

Using the time-range slider, you can quickly focus on the time and area of activity that you are most interested in. Once the time range is selected, all of the data presented in your view is refreshed automatically. You can also use the Custom button to set a custom time range.

You can select either the Grid View tab or the Chart View tab to view your data:

- **Grid View**—View the comprehensive details of firewall events in a tabular format that includes sortable columns. You can group the events using the Group By option. For example, you can group the events based on source country. The table includes information such as the event name, source IP, destination country, and so on. [Table 21 on page 75](#) describes the fields on the Grid View page.
- **Chart View**—View a brief summary of all the firewall events in your network. The top of the page has a swim lane graph of all the firewall events. You can use the widgets at the bottom of the page to view critical information such as, top sources, top destinations, and top users. [Table 22 on page 78](#) describes the widgets on the Chart View page.

**Table 21: Firewall—Fields on the Grid View Page**

Field	Description
The filter that is displayed above the grids.	<p>Displays the options available in the filter list are:</p> <ul style="list-style-type: none"> <li>• <b>Event Name</b>—Displays the event name of the log.</li> <li>• <b>Source Address</b>—Displays the source addresses to be used as match criteria for the policy. Address sets are resolved to their individual names.</li> <li>• <b>Destination Address</b>—Displays the destination addresses (or address sets) to be used as match criteria for the policy. Addresses are entered as specified in the destination zone's address book.</li> <li>• <b>Application</b>—Displays the application name from which the events or logs are generated.</li> <li>• <b>User</b>—Displays the user name from whom the log is generated.</li> <li>• <b>Service</b>—Displays the name of the application service. For example, FTP, HTTP, SSH, and so on.</li> <li>• <b>Policy</b>—Displays the Policy name in the log.</li> <li>• <b>Nested Application</b>—Displays the nested application in the log.</li> <li>• <b>Source Interface</b>—Specify the source interface for ICMP requests. If no source interface is specified, the device automatically uses the local tunnel endpoint interface.</li> <li>• <b>Source Zone</b>—Displays the User traffic received from the zone.</li> </ul> <p>Select the criteria or parameter on which you want to construct the filter statement.</p>

Table 21: Firewall—Fields on the Grid View Page (*continued*)

Field	Description
Text box	<p>Displays the filter parameter that you selected from the filter list.</p> <p><b>NOTE:</b> In the filter statement the following limitation exists.</p> <ul style="list-style-type: none"> <li>You can use only one operator at a time.</li> <li>You can use only one instance of the criteria or parameter in one filter statement.</li> </ul> <p>For example, if you have used &amp; operator and the parameter <b>event-name</b> once, you cannot use them again in the same filter statement</p> <p><b>CORRECT USAGE:</b> <b>event name = rt_flow_session_close &amp; application=TELNET</b></p> <p><b>WRONG USAGE:</b> <b>event name = rt_flow_session_close &amp; event-name = rt_flow_session_create</b></p> <p><b>WRONG USAGE :</b> <b>event name = rt_flow_session_close &amp; source-address = x.x.x.x &amp; application = TELNET</b></p> <p><b>NOTE:</b> The filter statement is NOT case-sensitive.</p> <p>Add the parameter for which you want to filter. For example, in the filter list if you selected event-name as the parameter, the text box displays <b>event-name =</b>. If you add <b>rt_flow_session_close</b> to see only Firewall events then the text box displays <b>event name = rt_flow_session_close</b>.</p>
Go	Click <b>Go</b> to execute the filter statement that is displayed in the text box.
X	Click <b>x</b> to clear the filters.
Show Hide Column Filter icon represented by three vertical dots	Enables you to show or hide a column in the grid.
Threat Severity	Displays the severity level of the threat
Description	Displays the description of the log.
Attack Name	Displays the attack name of the log.
UTM Category or Virus Name	Displays the UTM category of the log.
Event Category	Displays the event category of the log.
Source IP	Displays the source IP address from where the event occurred.

Table 21: Firewall—Fields on the Grid View Page (*continued*)

Field	Description
Source Port	Displays the source port of the event.
Application	Displays the application name from which the events or logs are generated.
User Name	Displays the user name from whom the log is generated.
Host Name	Displays the host name in the log.
Service Name	Displays the name of the application service. For example, FTP, HTTP, SSH, and so on.
Protocol ID	Displays the protocol ID in the log.
Policy Name	Displays the policy name in the log.
Destination Zone	Displays the destination zone of the log.
Roles	Displays the role names associated with the event.
Reason	Displays the reason for the log generation. For example, a connection tear down may have an associated reason such as authentication failed.
NAT Source Port	Displays the translated source port.
NAT Destination Port	Displays the translated destination port.
NAT Source Rule Name	Displays the NAT source rule name.
NAT Destination Rule Name	Displays the NAT destination rule name.
NAT Source IP	Displays the translated (or natted) source IP address. It can contain IPv4 or IPv6 addresses.
NAT Destination IP	Displays the translated (also called natted) destination IP address.
Traffic Session ID	Displays the traffic session ID of the log. 32
URL	Displays the accessed URL name that triggered the event.
Object Name	Displays the object name of the log.



Table 21: Firewall—Fields on the Grid View Page (*continued*)

Field	Description
Path Name	Displays the path name of the log.
Logical System Name	Displays the name of the logical system.
Rule Name	Displays the rule name of the log.
Action	Displays the action taken for the event: warning, allow, and block.
Profile Name	Displays the profile name in the log.
Time	Displays the time when the log was received.
Source IP	Displays the source IP address from where the event occurred.
Destination Country	Displays the destination country name from where the event occurred.
Destination IP	Displays the destination IP address of the event.
Destination Port	Displays the destination port of the event.

Table 22: Firewall—Widgets on the Chart View Page

Field	Description
Top Sources	Displays the top five source IP addresses of the network traffic; sorted by event count.
Top Destinations	Displays the top five destination IP addresses of the network traffic; sorted by event count.
Top Users	Displays the top five users of the network traffic; sorted by event count.

## RELATED DOCUMENTATION

## Monitor Web Filtering Events

You are here: **Monitor > Events > Web Filtering.**

Use this page to view information about the web filtering events based on web filtering policies, widget details, filter options, and grid elements of Web filtering events.

Using the time-range slider, you can quickly focus on the time and area of activity that you are most interested in. Once the time range is selected, all of the data presented in your view is refreshed automatically. You can also use the Custom button to set a custom time range.

You can select either the Grid View tab or the Chart View tab to view your data:

- **Grid View**—View the comprehensive details of web filtering events in a tabular format that includes sortable columns. You can group the events using the Group By option. For example, you can group the events based on source country. The table includes information such as the event name, time, source IP, source country, and so on. [Table 23 on page 79](#) describes the fields on the Grid View page.
- **Chart View**—View a brief summary of all the web filtering events in your network. The top of the page has a swim lane graph of all the events. You can use the widgets at the bottom of the page to view critical information such as, top sources, Top URLs blocked, and Top URL Categories Blocked. [Table 24 on page 82](#) describes the widgets on the Chart View page.

**Table 23: Web Filtering—Fields on the Grid View Page**

Field	Description
The filter list that is displayed above the grids.	<p>Options available in the filter list are:</p> <ul style="list-style-type: none"> <li>• <b>Event Name</b>—Displays the event name of the log.</li> <li>• <b>Source Address</b>—Displays the source addresses to be used as match criteria for the policy. Address sets are resolved to their individual names.</li> <li>• <b>Destination Address</b>—Displays the destination addresses (or address sets) to be used as match criteria for the policy. Addresses are entered as specified in the destination zone's address book.</li> <li>• <b>Source Name</b>—Displays the source name of the log.</li> <li>• <b>User</b>—Displays the user name from whom the log is generated.</li> <li>• <b>Role</b>—Displays the role names associated with the event.</li> <li>• <b>Reason</b>—Displays the reason for the log generation. For example, a connection tear down may have an associated reason such as authentication failed.</li> <li>• <b>Profile</b>—Displays the profile name in the log.</li> <li>• <b>Protocol</b>—Displays the protocol in the log.</li> <li>• <b>Category</b>—Displays the category of the log.</li> </ul> <p>Select the criteria or parameter on which you want to construct the filter statement.</p>

Table 23: Web Filtering—Fields on the Grid View Page (*continued*)

Field	Description
Text box	<p>Displays the filter parameter that you selected from the filter list.</p> <p><b>NOTE:</b> In the filter statement the following limitation exists.</p> <ul style="list-style-type: none"> <li>You can use only one operator at a time.</li> <li>You can use only one instance of the criteria or parameter in one filter statement.</li> </ul> <p>For example, if you have used &amp; operator and the parameter <b>Event-Name</b> once, I cannot use them again in the same filter statement</p> <p><b>CORRECT USAGE:</b> <b>Event-Name = rt_flow_session_close &amp; application=TELNET</b></p> <p><b>WRONG USAGE:</b> <b>Event-Name = rt_flow_session_close &amp; Event-Name = rt_flow_session_create</b></p> <p><b>WRONG USAGE:</b> <b>Event-Name = rt_flow_session_close &amp; source-address = x.x.x.x &amp; application = TELNET</b></p> <p><b>NOTE:</b> The filter statement is NOT case-sensitive.</p> <p>Add the parameter for which you want to filter. For example, in the filter list if you selected event-name as the parameter, the text box displays <b>Event-Name=</b>. If you add <b>WEBFILTER_URL_BLOCKED</b> to see only Web filtering events then the text box displays <b>Event-Name = WEBFILTER_URL_BLOCKED</b>.</p>
Go	Click <b>Go</b> to execute the filter statement that is displayed in the text box.
X	Click <b>x</b> to clear the filters.
Show Hide Column Filter icon represented by three vertical dots	Enables you to show or hide a column in the grid.
Threat Severity	Displays the severity level of the threat.
Event Name	Displays the event name of the log.
Description	Displays the description of the log.
Attack Name	Displays the attack name of the log.
UTM Category or Virus Name	Displays the UTM category or name of the virus.
Event Category	Displays the event category of the log.

Table 23: Web Filtering—Fields on the Grid View Page (*continued*)

Field	Description
Source Country	Displays the source country of the log.
Source IP	Displays the source IP address from where the event occurred.
Source Port	Displays the source port of the event.
Destination Country	Displays the destination country of the log.
Destination IP	Displays the destination IP address of the event.
Destination Port	Displays the destination port of the event.
Application	Displays the application name from which the events or logs are generated.
User name	Displays the user name from whom the log is generated.
Hostname	The host name in the log.
Service Name	The name of the application service. For example, FTP, HTTP, SSH, and so on.
Protocol ID	Displays the protocol ID in the log.
Policy name	Displays the policy name in the log.
Source Zone	User traffic received from the zone.
Destination Zone	Displays the destination zone of the log.
Nested Application	Displays the nested application in the log.
Roles	Role names associated with the event.
Reason	Displays the reason for the log generation. For example, a connection tear down may have an associated reason such as authentication failed.
NAT Source Port	Displays the translated source port.
NAT Destination Port	Displays the translated destination port.
NAT Source Rule Name	Displays the NAT source rule name.

Table 23: Web Filtering—Fields on the Grid View Page (*continued*)

Field	Description
NAT Destination Rule Name	Displays the NAT destination rule name.
NAT Source IP	Displays the translated (or natted) source IP address. It can contain IPv4 or IPv6 addresses.
NAT Destination IP	Displays the translated (also called natted) destination IP address.
Traffic Session ID	Displays the traffic session ID of the log. 32
URL	Displays the accessed URL name that triggered the event.
Object Name	Displays the object name of the log.
Path Name	Displays the path name of the log.
Logical System Name	Displays the name of the logical system.
Rule Name	Displays the rule name of the log.
Action	Displays the action taken for the event: warning, allow, and block.
Profile Name	Displays the profile name in the log.
Time	Displays the time when the log was received.
Description	Displays the description of the log.
Action	Action taken for the event: warning, allow, and block

Table 24: Web Filtering—Widgets on the Chart View Page

Field	Description
Top URLs Blocked	Displays the top URLs that are blocked.
Top URL Categories Blocked	Displays the top URL categories that are blocked.
Top Sources	Displays the top five source IP addresses of the network traffic; sorted by event count.

RELATED DOCUMENTATION

| [Monitor IPSec VPNs Events](#) | 83

## Monitor IPSec VPNs Events

You are here: **Monitor** > **Events** > **IPSec VPNs**.

Use the monitoring functionality to view the Policy Log page.

Using the time-range slider, you can quickly focus on the time and area of activity that you are most interested in. Once the time range is selected, all of the data presented in your view is refreshed automatically. You can also use the Custom button to set a custom time range.

You can select either the Grid View tab or the Chart View tab to view your data:

- **Grid View**—View the comprehensive details of IPsec events in a tabular format that includes sortable columns. You can group the events using the Group By option. For example, you can group the events based on source country. The table includes information such as the event name, UTM category, destination country, source IP address, source country, and so on. [Table 25 on page 83](#) describes the fields on the Grid View page.
- **Chart View**—View a brief summary of all the IPsec events in your network. The top of the page has a swim lane graph of all the IPsec events. You can use the widgets at the bottom of the page to view critical information such as, top sources, top source countries, top destinations, and top destination countries. [Table 26 on page 86](#) describes the widgets on the Chart View page.

Table 25: IPSec VPNs—Fields on the Grid View Page

Field	Description
The filter list that is displayed above the grids.	Displays the options available in the filter: <ul style="list-style-type: none"><li>• Event name—The event name of the log.</li></ul>

Table 25: IPSec VPNs—Fields on the Grid View Page (*continued*)

Field	Description
Text box	<p>Displays the filter parameter that you selected from the filter list.</p> <p><b>NOTE:</b> In the filter statement the following limitation exists.</p> <ul style="list-style-type: none"> <li>You can use only one operator at a time.</li> <li>You can use only one instance of the criteria or parameter in one filter statement.</li> </ul> <p>For example, if you have used &amp; operator and the parameter <b>Event-Name</b> once, I cannot use them again in the same filter statement</p> <p><b>CORRECT USAGE:</b> <b>Event-Name = rt_flow_session_close &amp; application=TELNET</b></p> <p><b>WRONG USAGE:</b> <b>Event-Name = rt_flow_session_close &amp; Event-Name = rt_flow_session_create</b></p> <p><b>WRONG USAGE:</b> <b>Event-Name = rt_flow_session_close &amp; source-address = x.x.x.x &amp; application = TELNET</b></p> <p><b>NOTE:</b> The filter statement is NOT case-sensitive.</p> <p>Add the parameter for which you want to filter. For example, in the filter list if you selected event-name as the parameter, the text box displays <b>Event-Name =</b>. If you add <b>RT_IPSEC_BAD_SPI_RT_IPSEC_RELAY, RT_IPSEC_PV_RELAY</b> to see only IPSec VPN events then the text box displays <b>Event-Name = RT_IPSEC_BAD_SPI_RT_IPSEC_RELAY, RT_IPSEC_PV_RELAY</b>.</p>
Go	Click <b>Go</b> to execute the filter statement that is displayed in the text box.
X	Click <b>X</b> to clear the filters.
Show Hide Column Filter icon represented by three vertical dots	Enables you to show or hide a column in the grid.
Threat Severity	Displays the severity level of the threat
Event Name	Displays the event name of the log.
Description	Displays the description of the log.
Attack Name	Displays the attack name of the log.
UTM Category or Virus Name	Displays the UTM category of the log.

Table 25: IPSec VPNs—Fields on the Grid View Page (*continued*)

Field	Description
Event Category	Displays the event category of the log.
Source Country	Displays the source country of the log.
Source IP	Displays the source IP address from where the event occurred.
Source Port	Displays the source port of the event.
Destination Country	Displays the destination country of the log.
Destination IP	Displays the destination IP address from where the event occurred.
Destination Port	The destination port of the event.
Application	Displays the application name from which the events or logs are generated.
User Name	Displays the user name from whom the log is generated.
Hostname	The host name in the log.
Service Name	Displays the name of the application service. For example, FTP, HTTP, SSH, and so on.
Protocol ID	Displays the protocol ID in the log.
Policy Name	Displays the policy name in the log.
Source Zone	Displays the user traffic received from the zone.
Destination Zone	Displays the destination zone of the log.
Nested Application	Displays the nested application in the log.
Roles	Displays the role names associated with the event.
Reason	Displays the reason for the log generation. For example, a connection tear down may have an associated reason such as authentication failed.
NAT Source Port	Displays the translated source port.
NAT Destination Port	Displays the translated destination port.



Table 25: IPSec VPNs—Fields on the Grid View Page (*continued*)

Field	Description
NAT Source Rule Name	Displays the NAT source rule name.
NAT Destination Rule Name	Displays the NAT destination rule name.
NAT Source IP	Displays the translated (or natted) source IP address. It can contain IPv4 or IPv6 addresses.
NAT Destination IP	Displays the translated (also called natted) destination IP address.
Traffic Session ID	Displays the traffic session ID of the log. 32
URL	Displays the accessed URL name that triggered the event.
Object Name	Displays the object name of the log.
Path Name	Displays the path name of the log.
Logical System Name	Displays the name of the logical system.
Rule Name	Displays the rule name of the log.
Action	Displays the action taken for the event: warning, allow, and block.
Profile Name	Displays the profile name in the log.
Time	Displays the time when the log was received.

Table 26: IPSec VPNs—Widgets on the Chart View Page

Field	Description
IPsec VPNs	Gives a brief summary of all the IPSec VPN events in your network.

## RELATED DOCUMENTATION

[Monitor Content Filtering Events](#) | 87

## Monitor Content Filtering Events

You are here: **Monitor > Events > Content Filtering.**

Use the monitoring functionality to view the Content Filtering page.

Using the time-range slider, you can quickly focus on the time and area of activity that you are most interested in. Once the time range is selected, all of the data presented in your view is refreshed automatically. You can also use the Custom button to set a custom time range.

You can select either the Grid View tab or the Chart View tab to view your data:

- **Grid View**—View the comprehensive details of content filtering events in a tabular format that includes sortable columns. You can group the events using the Group By option. For example, you can group the events based on source country. The table includes information such as the event name, UTM category, source IP address, source country, and so on. [Table 27 on page 87](#) describes the fields on the Grid View page.
- **Chart View**—View a brief summary of all the Content filtering events in your network. The top of the page has a swim lane graph of all the content filtering events. You can use the widgets at the bottom of the page to view critical information such as, top sources, top source countries, top destinations, and top destination countries. [Table 28 on page 90](#) describes the widgets on the Chart View page.

Table 27: Content Filtering—Fields on the Grid View Page

Field	Description
The filter list that is displayed above the grids.	<p>Displays the options available in the filter list are:</p> <ul style="list-style-type: none"><li>• <b>Event Name</b>—Displays the event name of the log.</li><li>• <b>Source Address</b>—Displays the source addresses to be used as match criteria for the policy. Address sets are resolved to their individual names.</li><li>• <b>Destination Address</b>—Displays the destination addresses (or address sets) to be used as match criteria for the policy. Addresses are entered as specified in the destination zone's address book.</li><li>• <b>Source Name</b>—Displays the source name of the log.</li><li>• <b>User</b>— Displays the user name from whom the log is generated.</li><li>• <b>Role</b>—Displays the role names associated with the event.</li><li>• <b>Reason</b> —Displays the reason for the log generation. For example, a connection tear down may have an associated reason such as authentication failed.</li><li>• <b>Profile</b>— Displays the profile name in the log.</li><li>• <b>Protocol</b>—Displays the protocol ID in the log.</li><li>• <b>Category</b>—Displays the category of the log.</li></ul>

Table 27: Content Filtering—Fields on the Grid View Page (*continued*)

Field	Description
Text box	<p>Displays the filter parameter that you selected from the filter list.</p> <p><b>NOTE:</b> In the filter statement the following limitation exists.</p> <ul style="list-style-type: none"> <li>You can use only one operator at a time.</li> <li>You can use only one instance of the criteria or parameter in one filter statement.</li> </ul> <p>For example, if you have used &amp; operator and the parameter <b>Event-Name</b> once, I cannot use them again in the same filter statement</p> <p><b>CORRECT USAGE:</b> <b>Event-Name = rt_flow_session_close &amp; application=TELNET</b></p> <p><b>WRONG USAGE:</b> <b>Event-Name = rt_flow_session_close &amp; Event-Name = rt_flow_session_create</b></p> <p><b>WRONG USAGE:</b> <b>Event-Name = rt_flow_session_close &amp; source-address = x.x.x.x &amp; application = TELNET</b></p> <p><b>NOTE:</b> The filter statement is NOT case-sensitive.</p> <p>Add the parameter for which you want to filter. For example, in the filter list if you selected event-name as the parameter, the text box displays <b>Event-Name =</b>. If you add <b>CONTENT-FILTERING-BLOCKED-MT</b> to see only Content Filtering events then the text box displays <b>Event Name = CONTENT-FILTERING-BLOCKED-MT</b>.</p>
Go	Executes the filter statement that is displayed in the text box.
X	Clears the filters.
Show Hide Column Filter icon represented by three vertical dots	Enables you to show or hide a column in the grid.
Threat Severity	Displays the severity level of the threat.
Event Name	Displays the name of the event log.
Description	Displays the description of the log.
Attack Name	Displays the attack name of the log.
UTM Category or Virus Name	Displays the UTM category of the log.
Event Category	Displays the event category of the log.

Table 27: Content Filtering—Fields on the Grid View Page *(continued)*

Field	Description
Source Country	Displays the source country of the log.
Source IP	Displays the source IP address from where the event occurred.
Source Port	Displays the source port of the event.
Application	Displays the application name from which the events or logs are generated.
Destination Country	Displays the destination country of the log.
Destination IP	Displays the destination IP of the log.
Destination Port	Displays the destination port of the log.
User Name	Displays the user name from whom the log is generated.
Host Name	Displays the host name in the log.
Service Name	Displays the name of the application service. For example, FTP, HTTP, SSH, and so on.
Protocol ID	Displays the protocol ID in the log.
Policy Name	Displays the policy name in the log.
Source Zone	Displays the source zone of the log.
Destination Zone	Displays the destination zone of the log.
Nested Application	Displays the nested application in the log.
Roles	Displays the role names associated with the event.
Reason	Displays the reason for the log generation. For example, a connection tear down may have an associated reason such as authentication failed.
NAT Source Port	Displays the translated source port.
NAT Destination Port	Displays the translated destination port.
NAT Source Rule Name	Displays the NAT source rule name.

Table 27: Content Filtering—Fields on the Grid View Page *(continued)*

Field	Description
NAT Destination Rule Name	Displays the NAT destination rule name.
NAT Source IP	Displays the translated (or natted) source IP address. It can contain IPv4 or IPv6 addresses.
NAT Destination IP	Displays the translated (also called natted) destination IP address.
Traffic Session ID	Displays the traffic session ID of the log. 32
URL	Displays the accessed URL name that triggered the event.
Object Name	Displays the object name of the log.
Path Name	Displays the path name of the log.
Logical System Name	Displays the name of the logical system.
Rule Name	Displays the rule name of the log.
Action	Displays the action taken for the event: warning, allow, and block.
Profile Name	Displays the profile name in the log.
Time	Displays the time when the log was received.

Table 28: Content Filtering—Widgets on the Chart View Page

Field	Description
Top Blocked Protocol Commands	Adds respective content for display column.
Top Reasons	Adds respective content for display column.
Top Sources	Top five source IP addresses of the network traffic; sorted by event count.

## RELATED DOCUMENTATION

## Monitor Antispam Events

You are here: **Monitor** > **Events** > **Antispam**.

Use the monitoring functionality to view the Antispam page.

Using the time-range slider, you can quickly focus on the time and area of activity that you are most interested in. Once the time range is selected, all of the data presented in your view is refreshed automatically. You can also use the Custom button to set a custom time range.

You can select either the Grid View tab or the Chart View tab to view your data:

- **Grid View**—View the comprehensive details of Antispam events in a tabular format that includes sortable columns. You can group the events using the Group By option. For example, you can group the events based on source country. The table includes information such as the event name, UTM category, source IP address, source country, and so on. [Table 29 on page 91](#) describes the fields on the Grid View page.
- **Chart View**—View a brief summary of all the Antispam events in your network. The top of the page has a swim lane graph of all the screen events. You can use the widgets at the bottom of the page to view critical information such as, top sources, top source countries, top destinations, and top destination countries. [Table 30 on page 94](#) describes the widgets on the Chart View page.

**Table 29: Antispam—Fields on the Grid View Page**

Field	Description
The filter list that is displayed above the grids.	<p>Displays the following options available in the filter list:</p> <ul style="list-style-type: none"> <li>• <b>Event Name</b>—Displays the event name of the log.</li> <li>• <b>Source Address</b>—Displays the source addresses to be used as match criteria for the policy. Address sets are resolved to their individual names.</li> <li>• <b>Destination Address</b>—Displays the destination addresses (or address sets) to be used as match criteria for the policy. Addresses are entered as specified in the destination zone's address book.</li> <li>• <b>Source Name</b>—Displays the source name of the log.</li> <li>• <b>User</b> —Displays the user name from whom the log is generated.</li> <li>• <b>Role</b>—Displays the role names associated with the event.</li> <li>• <b>Reason</b> —Displays the reason for the log generation. For example, a connection tear down may have an associated reason such as authentication failed.</li> <li>• <b>Profile</b>—Displays the profile name in the log.</li> <li>• <b>Protocol</b>—Displays the protocol in the log.</li> <li>• <b>Category</b>—Displays the category of the log.</li> </ul> <p>Select the criteria or parameter on which you want to construct the filter statement.</p>

Table 29: Antispam—Fields on the Grid View Page (continued)

Field	Description
Text box	<p>Displays the filter parameter that you selected from the filter list.</p> <p><b>NOTE:</b> In the filter statement the following limitation exists.</p> <ul style="list-style-type: none"> <li>You can use only one operator at a time.</li> <li>You can use only one instance of the criteria or parameter in one filter statement.</li> </ul> <p>For example, if you have used &amp; operator and the parameter <b>event-name</b> once, I cannot use them again in the same filter statement</p> <p><b>CORRECT USAGE:</b> <b>event name = rt_flow_session_close &amp; application=TELNET</b></p> <p><b>WRONG USAGE:</b> <b>event name = rt_flow_session_close &amp; event-name = rt_flow_session_create</b></p> <p><b>WRONG USAGE:</b> <b>event name = rt_flow_session_close &amp; source-address = x.x.x.x &amp; application = TELNET</b></p> <p><b>NOTE:</b> The filter statement is NOT case-sensitive.</p> <p>Add the parameter for which you want to filter. For example, in the filter list if you selected event-name as the parameter, the text box displays <b>event-name =</b>. If you add <b>ANTISPAM_SPAM_DETECTED_MTA</b> to see only antispam events then the text box displays <b>event name = ANTISPAM_SPAM_DETECTED_MTA</b>.</p>
Go	Executes the filter statement that is displayed in the text box.
X	Clears the filters.
Show Hide Column Filter icon represented by three vertical dots	Enables you to show or hide a column in the grid.
Threat Severity	Displays the severity level of the threat.
Event Name	Displays the event name of the log.
Description	Displays the description of the log.
Attack Name	Displays the attack name of the log.
UTM Category or Virus Name	Displays the UTM category of the log.
Event Category	Displays the event category of the log.

Table 29: Antispam—Fields on the Grid View Page (continued)

Field	Description
Source Country	Displays the source country of the log.
Source IP	Displays the source IP address from where the event occurred.
Source Port	Displays the source port of the log.
Destination Country	Displays the destination country of the log.
Destination IP	Displays the destination IP address of the event.
Destination Port	Displays the destination port of the event.
Application	Displays the application name from which the events or logs are generated.
User name	Displays the user name from whom the log is generated.
Hostname	The host name in the log.
Service Name	The name of the application service. For example, FTP, HTTP, SSH, and so on.
Protocol ID	Displays the protocol ID in the log.
Policy name	Displays the policy name in the log.
Source Zone	User traffic received from the zone.
Destination Zone	Displays the destination zone of the log.
Nested Application	Displays the nested application in the log.
Roles	Role names associated with the event.
Reason	Displays the reason for the log generation. For example, a connection tear down may have an associated reason such as authentication failed.
NAT Source Port	Displays the translated source port.
NAT Destination Port	Displays the translated destination port.
NAT Source Rule Name	Displays the NAT source rule name.



Table 29: Antispam—Fields on the Grid View Page (continued)

Field	Description
NAT Destination Rule Name	Displays the NAT destination rule name.
NAT Source IP	Displays the translated (or natted) source IP address. It can contain IPv4 or IPv6 addresses.
NAT Destination IP	Displays the translated (also called natted) destination IP address.
Traffic Session ID	Displays the traffic session ID of the log. 32
URL	Displays the accessed URL name that triggered the event.
Object Name	Displays the object name of the log.
Path Name	Displays the path name of the log.
Logical System Name	Displays the name of the logical system.
Rule Name	Displays the rule name of the log.
Action	Displays the action taken for the event: warning, allow, and block.
Profile Name	Displays the profile name in the log.
Time	Displays the time when the log was received.

Table 30: Antispam—Widgets on the Chart View Page

Field	Description
Top Sources	Top five source IP addresses of the network traffic; sorted by event count.

## RELATED DOCUMENTATION

[Monitor Antivirus Events](#) | 95

## Monitor Antivirus Events

You are here: **Monitor > Events > Antivirus.**

Use the monitoring functionality to view the Antivirus page.

Using the time-range slider, you can quickly focus on the time and area of activity that you are most interested in. Once the time range is selected, all of the data presented in your view is refreshed automatically. You can also use the Custom button to set a custom time range.

You can select either the Grid View tab or the Chart View tab to view your data:

- **Grid View**—View the comprehensive details of Antivirus events in a tabular format that includes sortable columns. You can group the events using the Group By option. For example, you can group the events based on source country. The table includes information such as the event name, UTM category, source IP address, source country, and so on. [Table 31 on page 95](#) describes the fields on the Grid View page.
- **Chart View**—View a brief summary of all the Antivirus events in your network. The top of the page has a swim lane graph of all the screen events. You can use the widgets at the bottom of the page to view critical information such as, top sources, top source countries, top destinations, and top destination countries. [Table 32 on page 98](#) describes the widgets on the Chart View page.

**Table 31: Antivirus—Fields on the Grid View Page**

Field	Description
Search filter	<p>Select one of the filters from the list. Enter the relevant data for the search and click <b>Go</b>:</p> <ul style="list-style-type: none"> <li>• <b>Event Name</b>—Displays the event name of the log.</li> <li>• <b>Source Address</b>—Displays the source addresses to be used as match criteria for the policy. Address sets are resolved to their individual names.</li> <li>• <b>Destination Address</b>—Displays the destination addresses (or address sets) to be used as match criteria for the policy. Addresses are entered as specified in the destination zone's address book.</li> <li>• <b>Source Name</b>—Displays the source name of the log.</li> <li>• <b>User</b>—Displays the user name from whom the log is generated.</li> <li>• <b>Role</b>—Displays the role names associated with the event.</li> <li>• <b>Reason</b>—Displays the reason for the log generation. For example, a connection tear down may have an associated reason such as authentication failed.</li> <li>• <b>Profile</b>—Displays the profile name in the log.</li> <li>• <b>Protocol</b>—Displays the protocol in the log.</li> <li>• <b>Category</b>—Displays the category of the log.</li> </ul> <p>Select the criteria or parameter on which you want to construct the filter statement.</p>

Table 31: Antivirus—Fields on the Grid View Page (*continued*)

Field	Description
Text box	<p>Displays the filter parameter that you selected from the filter list.</p> <p><b>NOTE:</b> In the filter statement the following limitation exists.</p> <ul style="list-style-type: none"> <li>You can use only one operator at a time.</li> <li>You can use only one instance of the criteria or parameter in one filter statement.</li> </ul> <p>For example, if you have used &amp; operator and the parameter <b>Event-Name</b> once, I cannot use them again in the same filter statement</p> <p><b>CORRECT USAGE:</b> Event-Name = rt_flow_session_close &amp; application=TELNET</p> <p><b>WRONG USAGE:</b> event name = rt_flow_session_close &amp; event-name = rt_flow_session_create</p> <p><b>WRONG USAGE:</b> event name = rt_flow_session_close &amp; source-address = x.x.x.x &amp; application = TELNET</p> <p><b>NOTE:</b> The filter statement is NOT case-sensitive.</p>
Go	Executes the filter statement that is displayed in the text box.
X	Clears the filters.
Show Hide Column Filter icon represented by three vertical dots	Enables you to show or hide a column in the grid.
Threat Severity	Displays the severity level of the threat.
Event Name	Displays the event name of the log.
Description	Displays the description of the log.
Attack Name	Displays the attack name of the log.
UTM Category or Virus Name	Displays the UTM category or name of the virus.
Event Category	Displays the event category of the log.
Source Country	Displays the source country of the log.
Source IP	Displays the source IP address from where the event occurred.

Table 31: Antivirus—Fields on the Grid View Page (*continued*)

Field	Description
Source Port	Displays the source port of the event.
Destination Country	Displays the destination country of the log.
Destination IP	Displays the destination IP address of the event.
Destination Port	Displays the destination port of the event.
Application	Displays the application name from which the events or logs are generated.
User name	Displays the user name from whom the log is generated.
Host name	The host name in the log.
Service Name	The name of the application service. For example, FTP, HTTP, SSH, and so on.
Protocol ID	Displays the protocol ID in the log.
Policy name	Displays the policy name in the log.
Source Zone	User traffic received from the zone.
Destination Zone	Displays the destination zone of the log.
Nested Application	Displays the nested application in the log.
Roles	Role names associated with the event.
Reason	Displays the reason for the log generation. For example, a connection tear down may have an associated reason such as authentication failed.
NAT Source Port	Displays the translated source port.
NAT Destination Port	Displays the translated destination port.
NAT Source Rule Name	Displays the NAT source rule name.
NAT Destination Rule Name	Displays the NAT destination rule name.
NAT Source IP	Displays the translated (or natted) source IP address. It can contain IPv4 or IPv6 addresses.

Table 31: Antivirus—Fields on the Grid View Page (*continued*)

Field	Description
NAT Destination IP	Displays the translated (also called natted) destination IP address.
Traffic Session ID	Displays the traffic session ID of the log.
URL	Displays the accessed URL name that triggered the event.
Object Name	Displays the object name of the log.
Path Name	Displays the path name of the log.
Logical System Name	Displays the name of the logical system.
Rule Name	Displays the rule name of the log.
Action	Displays the action taken for the event: warning, allow, and block.
Profile Name	Displays the profile name in the log.
Time	Displays the time when the log was received.

Table 32: Antivirus—Widgets on the Chart View Page

Field	Description
Top Sources	Displays the top five source IP addresses of the network traffic; sorted by event count.
Top Destinations	Displays the top five destination IP addresses of the network traffic; sorted by event count.
Top Viruses	Displays the top five viruses of the network traffic.

## RELATED DOCUMENTATION

## Monitor IPS Events

You are here: **Monitor > Events > IPS.**

Use the monitoring functionality to view the IPS page.

Using the time-range slider, you can quickly focus on the time and area of activity that you are most interested in. Once the time range is selected, all of the data presented in your view is refreshed automatically. You can also use the Custom button to set a custom time range.

You can select either the Grid View tab or the Chart View tab to view your data:

- **Grid View**—View the comprehensive details of IPS events in a tabular format that includes sortable columns. You can group the IPS events using the Group By option. For example, you can group the events based on source country. The table includes information such as the event name, UTM category, source IP address, source country, and so on. [Table 33 on page 99](#) describes the fields on the Grid View page.
- **Chart View**—View a brief summary of all the IPS events in your network. The top of the page has a swim lane graph of all the IPS events. You can use the widgets at the bottom of the page to view critical information such as, top sources, top source countries, top destinations, and top destination countries. [Table 34 on page 102](#) describes the widgets on the Chart View page.

Table 33: IPS—Fields on the Grid View Page

Field	Description
The filter list that is displayed above the grids.	<p>Options available in the filter list are:</p> <ul style="list-style-type: none"><li>• <b>Event Name</b>—Displays the event name of the log.</li><li>• <b>Source Address</b>—Displays the source addresses to be used as match criteria for the policy. Address sets are resolved to their individual names.</li><li>• <b>Destination Address</b>—Displays the destination addresses (or address sets) to be used as match criteria for the policy. Addresses are entered as specified in the destination zone's address book.</li><li>• <b>Application</b>—Displays the application name from which the events or logs are generated.</li><li>• <b>Rule Name</b>—Displays the rule name of the log.</li><li>• <b>Threat Severity</b>—Displays the severity level of the threat.</li><li>• <b>Attack Name</b>—Displays the attack name of the log.</li></ul> <p>Select the criteria or parameter on which you want to construct the filter statement.</p>

Table 33: IPS—Fields on the Grid View Page (*continued*)

Field	Description
Text box	<p>Displays the filter parameter that you selected from the filter list.</p> <p><b>NOTE:</b> In the filter statement the following limitation exists.</p> <ul style="list-style-type: none"> <li>You can use only one operator at a time.</li> <li>You can use only one instance of the criteria or parameter in one filter statement.</li> </ul> <p>For example, if you have used &amp; operator and the parameter Event-Name once, I cannot use them again in the same filter statement</p> <p>CORRECT USAGE: Event-Name = rt_flow_session_close &amp; application=TELNET</p> <p>WRONG USAGE:Event-Name = rt_flow_session_close &amp; Event-Name = rt_flow_session_create</p> <p>WRONG USAGE:Event-Name = rt_flow_session_close &amp; source-address = x.x.x.x &amp; application = TELNET</p> <p><b>NOTE:</b> The filter statement is NOT case-sensitive.</p> <p>Add the parameter for which you want to filter. For example, in the filter list if you selected event-name as the parameter, the text box displays <b>Event-Name =</b>. If you add <b>IDP_ATTACK_LOG_EVENT</b> to see only IPS events then the text box displays <b>Event-Name = IDP_ATTACK_LOG_EVENT</b>.</p>
Go	Executes the filter statement that is displayed in the text box.
X	Clears the filters.
Show Hide Column Filter icon represented by three vertical dots	Enables you to show or hide a column in the grid.
Threat Severity	Displays the severity level of the threat.
Event Name	Displays the event name of the log.
Description	Displays the description of the log.
Attack Name	Displays the attack name of the log.
UTM Category or Virus Name	Displays the UTM category or name of the virus.
Event Category	Displays the event category of the log.

Table 33: IPS—Fields on the Grid View Page (*continued*)

Field	Description
Source Country	Displays the source country of the log.
Source IP	Displays the source IP address from where the event occurred.
Source Port	Displays the source port of the event.
Destination Country	Displays the destination country of the log.
Destination IP	Displays the destination IP address of the event.
Destination Port	Displays the destination port of the event.
Application	Displays the application name from which the events or logs are generated.
User name	Displays the user name from whom the log is generated.
Hostname	The host name in the log.
Service Name	The name of the application service. For example, FTP, HTTP, SSH, and so on.
Protocol ID	Displays the protocol ID in the log.
Policy name	Displays the policy name in the log.
Source Zone	User traffic received from the zone.
Destination Zone	Displays the destination zone of the log.
Nested Application	Displays the nested application in the log.
Roles	Role names associated with the event.
Reason	Displays the reason for the log generation. For example, a connection tear down may have an associated reason such as authentication failed.
NAT Source Port	Displays the translated source port.
NAT Destination Port	Displays the translated destination port.
NAT Source Rule Name	Displays the NAT source rule name.



Table 33: IPS—Fields on the Grid View Page (*continued*)

Field	Description
NAT Destination Rule Name	Displays the NAT destination rule name.
NAT Source IP	Displays the translated (or natted) source IP address. It can contain IPv4 or IPv6 addresses.
NAT Destination IP	Displays the translated (also called natted) destination IP address.
Traffic Session ID	Displays the traffic session ID of the log. 32
URL	Displays the accessed URL name that triggered the event.
Object Name	Displays the object name of the log.
Path Name	Displays the path name of the log.
Logical System Name	Displays the name of the logical system.
Rule Name	Displays the rule name of the log.
Action	Displays the action taken for the event: warning, allow, and block.
Profile Name	Displays the profile name in the log.
Time	Displays the time when the log was received.

Table 34: IPS—Widgets on the Chart View Page

Field	Description
Top Sources	Displays the top five source IP addresses of the network traffic; sorted by event count.
Top Destinations	Displays the top five destination IP addresses of the network traffic; sorted by event count.
Top IPS Attacks	Displays the top five IPS attacks; sorted by event count.
IPS Severities	Displays the Donught chart which shows the percentage of IPS events based on their severity levels. The colors are blue, black, green, and amber representing high, info, critical, and medium IPS events respectively

RELATED DOCUMENTATION

| [Monitor Screen Events](#) | 103

## Monitor Screen Events

You are here: **Monitor** > **Events** > **Screen**.

Use screen events to view the information about security events based on screen profiles. Analyzing screen logs yields information such as attack name, action taken, source of an attack, and destination of an attack.

You can select either the Grid View tab or the Chart View tab to view your data:

- **Grid View**—View the comprehensive details of all screen events in a tabular format that includes sortable columns. You can group the events using the Group By option. For example, you can group the events based on source country. The table includes information such as the event name, source country, source address, destination country, attack name, and so on. [Table 35 on page 103](#) describes the fields on the Grid View page.
- **Chart View**—View a brief summary of all the screen events in your network. The top of the page has a swim lane graph of all the screen events. You can use the widgets at the bottom of the page to view critical information such as, top screen attackers, top screen victims, and top screen hits. [Table 36 on page 104](#) describes the widgets on the Chart View page.

**Table 35: Screen—Fields on the Grid View Page**

Field	Description
The filter list that is displayed above the grids.	<p>Options available in the filter list are:</p> <ul style="list-style-type: none"><li>• <b>Event Name</b>—Displays the event name of the log.</li><li>• <b>Source Address</b>—Displays the source addresses to be used as match criteria for the policy. Address sets are resolved to their individual names.</li><li>• <b>Destination Address</b>—Displays the destination addresses (or address sets) to be used as match criteria for the policy. Addresses are entered as specified in the destination zone's address book.</li><li>• <b>Attack Name</b>—Displays the attack name of the log.</li></ul> <p>Select the criteria or parameter on which you want to construct the filter statement.</p>
Go	<p>Executes the filter statement that is displayed in the text box.</p> <p>Click <b>Go</b>.</p>

Table 35: Screen—Fields on the Grid View Page (continued)

Field	Description
X	Clears the filters.  Click X.
Show Hide Column Filter icon represented by three vertical dots	Enables you to show or hide a column in the grid.
Timestamp	Displays the time when the log was received.
Event Name	Displays the event name of the log.
Source Country	Displays the source country of the log.
Source Address	Displays the source address from where the event occurred.
Destination Country	Displays the destination country of the log.
Destination Address	Displays the destination address of the event.
Destination Port	Displays the destination port of the event.
Source Port	Displays the source port of the event.
Description	Displays brief description of the event.
Source Zone Name	Displays the name of the source security zone of the traffic that triggered the event.
Host Name	Displays the host name of the device where the log was generated.
Action	Displays the action taken for the event. For example, warning, allow, and block.
Interface Name	Displays the name of the interface.
Domain	Displays the network or subnetwork to which the device belongs.

Table 36: Screen—Widgets on the Chart View Page

Field	Description
Top Screen Attackers	Displays the top source countries from where the event source originated; sorted by the number of source IP addresses.

Table 36: Screen—Widgets on the Chart View Page (continued)

Field	Description
Top Screen Victims	Displays the top destination countries targeted for the attack; sorted by the number of destination IP addresses.
Top Screen Hits	Displays the top source IP addresses of the network traffic; sorted by the number of event occurrences.

## RELATED DOCUMENTATION

Monitor Security Intelligence Events | 105

## Monitor Security Intelligence Events

You are here: **Monitor** > **Events** > **Security Intelligence**.

Use the monitoring functionality to view the Security Intelligence page.

Using the time-range slider, you can quickly focus on the time and area of activity that you are most interested in. Once the time range is selected, all of the data presented in your view is refreshed automatically. You can also use the Custom button to set a custom time range.

You can select either the Grid View tab or the Chart View tab to view your data:

- **Grid View**—View the comprehensive details of security intelligence events in a tabular format that includes sortable columns. You can group the events using the Group By option. For example, you can group the events based on source country. The table includes information such as the event name, source address, source country, destination country, and so on. [Table 37 on page 106](#) describes the fields on the Grid View page.
- **Chart View**—View a brief summary of all the security intelligence events in your network. The top of the page has a swim lane graph of all the security intelligence events. You can use the widgets at the bottom of the page to view critical information such as, top compromised host and top C&C Servers. [Table 38 on page 107](#) describes the widgets on the Chart View page.

Table 37: Security Intelligence—Fields on the Grid View Page

Field	Description
The filter is that is displayed above the grids.	<p>Options available in the filter list are:</p> <ul style="list-style-type: none"> <li>• <b>Event Name</b>—Displays the event name of the log.</li> <li>• <b>Source Address</b>—Displays the source addresses to be used as match criteria for the policy. Address sets are resolved to their individual names.</li> <li>• <b>Destination Address</b>—Displays the destination addresses (or address sets) to be used as match criteria for the policy. Addresses are entered as specified in the destination zone's address book.</li> </ul> <p>Select the criteria or parameter on which you want to construct the filter statement.</p>
Go	Executes the filter statement that is displayed in the text box.
X	Clears the filters.
Show Hide Column Filter icon represented by three vertical dots	Enables you to show or hide a column in the grid.
Timestamp	Displays the time when the log was received.
Event Name	Displays the event name of the log.
Source Country	Displays the source country of the log.
Source Address	Displays the source address from where the event occurred.
Destination Country	Displays the destination country of the log.
Destination Address	Displays the destination address of the event.
Destination Port	Displays the destination port of the event.
Source Port	Displays the source port of the event.
Description	Displays the description of the log.
Source Zone Name	Displays the name of log source zone.
Host name	Displays the host name in the log.
Action	Displays the action taken on the communication (permitted or blocked).

Table 37: Security Intelligence—Fields on the Grid View Page (*continued*)

Field	Description
Interface Name	Displays the name of the interface.
Domain	Displays the network or subnetwork to which the device belongs.

Table 38: Security Intelligence—Widgets on the Chart View Page

Field	Description
Top Compromised Hosts	Displays the list of the top compromised hosts based on their associated threat level and blocked status.
Top C&C Servers	Displays a color-coded map displaying the location of Command and Control servers. Click a location on the map to view the number of detected sources.

## RELATED DOCUMENTATION

[Monitor ATP Events](#) | 107

## Monitor ATP Events

You are here: **Monitor** > **Events** > **ATP**.

Use the monitoring functionality to view the ATP page.

Using the time-range slider, you can quickly focus on the time and area of activity that you are most interested in. Once the time range is selected, all of the data presented in your view is refreshed automatically. You can also use the Custom button to set a custom time range.

You can select either the Grid View tab or the Chart View tab to view your data:

- **Grid View**—View the comprehensive details of all Juniper Sky ATP events in a tabular format that includes sortable columns. You can group the events using the Group By option. For example, you can group the events based on source country. The table includes information such as the event name, source country, source address, destination country, malware information, and so on. [Table 39 on page 108](#) describes the fields on the Grid View page.
- **Chart View**—View a brief summary of all the Juniper Sky ATP events in your network. The top of the page has a swim lane graph of all the Juniper Sky ATP events. You can use the widgets at the bottom

of the page to view critical information such as, Top malware source countries, top infected file categories, and top malwares identified. [Table 40 on page 109](#) describes the widgets on the Chart View page.

**Table 39: ATP—Fields on the Grid View Page**

Field	Description
The filter list that is displayed above the grids.	<p>Options available in the filter list are:</p> <ul style="list-style-type: none"> <li>• <b>Event Name</b>—Displays the event name of the log.</li> <li>• <b>Source Address</b>—Displays the source addresses to be used as match criteria for the policy. Address sets are resolved to their individual names.</li> <li>• <b>Destination Address</b>—Displays the destination addresses (or address sets) to be used as match criteria for the policy. Addresses are entered as specified in the destination zone's address book.</li> </ul> <p>Select the criteria or parameter on which you want to construct the filter statement.</p>
Go	Executes the filter statement that is displayed in the text box.
X	Clears the filters.
Show Hide Column Filter icon represented by three vertical dots	Enables you to show or hide a column in the grid.
Timestamp	The time when the log was received.
Event Name	Event name of the log.
Source Country	Source country name from where the event originated.
Source Address	Source IP address from where the event occurred.
Destination Country	Destination country name from where the event occurred.
Destination Address	Destination IP address of the event.
Source Port	Source port of the event.
Destination Port	Destination port of the event.
Description	Description of the log.
Source Zone Name	The name of source zone of the log.

Table 39: ATP—Fields on the Grid View Page (*continued*)

Field	Description
Action	Action taken for the event: warning, allow, and block.
Host Name	The hostname in the log.
Interface Name	Name of the interface.
Domain	Displays the network or subnetwork to which the device belongs.

Table 40: ATP—Widgets on the Chart View Page

Field	Description
Top Malware Source Countries	Top source countries from where the event source originated; sorted by the number of IP addresses.
Top Infected File Categories	A graph of the top infected file categories. Examples: executables, archived files, libraries. Use the arrows to filter by threat level and time frame.
Top Malwares Identified	Top malware found based on the number of times the malware is detected over a period of time.

## RELATED DOCUMENTATION

[Monitor System Events](#) | 109

## Monitor System Events

You are here: **Monitor** > **Events** > **System**.

Use the monitoring functionality to view the System page.

[Table 41 on page 110](#) summarizes key output fields under events filters.

[Table 42 on page 110](#) summarizes key output fields under events details.



Table 41: System—Fields on the Events Filter

Field	Description
System Log File	Specifies the name of the system log file that records errors and events.
Process	Specifies the system processes that generate the events to display.
Include archived files	Specifies to enable the option to include archived files. Select to enable.
Date from	Specifies the beginning date range to monitor. Set the date using the calendar pick tool.
To	Specifies the end of the date range to monitor. Set the date using the calendar pick tool.
Event ID	Specifies the specific ID of the error or event to monitor.
Description	Enter a description for the errors or events.
Search	Fetches the errors and events specified in the search criteria.
Reset	Clears the cache of errors and events that were previously selected.

Table 42: System—Fields under Event Details

Field	Description
Process	Displays the system process that generated the error or event.

Table 42: System—Fields under Event Details (*continued*)

Field	Description
Severity	<p>Displays the severity level that indicate how seriously the triggering event affects routing platform functions. Only messages from the facility that are rated at that level or higher are logged. Possible severities and their corresponding color code are:</p> <ul style="list-style-type: none"> <li>• <b>Debug/Info/Notice (Green)</b>—Indicates conditions that are not errors but are of interest or might warrant special handling.</li> <li>• <b>Warning (Yellow)</b>—Indicates conditions that warrant monitoring.</li> <li>• <b>Error (Blue)</b>—Indicates standard error conditions that generally have less serious consequences than errors in the emergency, alert, and critical levels.</li> <li>• <b>Critical (Pink)</b>—Indicates critical conditions, such as hard drive errors.</li> <li>• <b>Alert (Orange)</b>—Indicates conditions that require immediate correction, such as a corrupted system database.</li> <li>• <b>Emergency (Red)</b>—Indicates system panic or other conditions that cause the routing platform to stop functioning.</li> </ul>
Event ID	<p>Displays the unique ID of the error or event.</p> <p>The prefix on each code identifies the generating software process. The rest of the code indicates the specific event or error.</p>
Event Description	Displays a more detailed explanation of the message.
Time	Time that the error or event occurred.
Generate Report	Creates an HTML report based on the specified parameters.

## RELATED DOCUMENTATION

[Monitor All Events](#) | 69

# Users

## IN THIS CHAPTER

- [Monitor Users](#) | 112

## Monitor Users

You are here: **Monitor** > **Users**.

Use this page to view information related to the bandwidth consumption and session establishment.

You can select either the Grid View tab or the Chart View tab to view your data:

- **Grid View**—View the comprehensive details of users in a tabular format that includes sortable columns. You can group the users using Top users by volume, Top apps by volume, timespan, username etc. The table includes information such as the username, volume, top users by volume and so on. [Table 43 on page 112](#) describes the fields on the Grid View page.
- **Chart View**—View a brief summary of all the users. It shows the top 50 users consuming maximum bandwidth in your network. The data is presented graphically as a bubble graph, heat map, or zoomable bubble graph. [Table 44 on page 113](#) describes the widgets on the Chart View page.

**Table 43: Users—Fields on the Grid View Page**

Field	Description
Top Users By Volume	Top users of the application; sorted by bandwidth consumption.
Top Apps By Volume	Top applications, such as Amazon, Facebook, and so on of the network traffic; sorted by bandwidth consumption.
User Name	Name of a user.
Volume	Bandwidth consumption of the user.
Total Sessions	Total number of user sessions.

Table 43: Users—Fields on the Grid View Page (*continued*)

Field	Description
Applications	All the applications used by a user for the time range.

Table 44: Users—Widgets on the Chart View Page

Field	Description
Top 50 Users	<p>Displays the top 50 users consuming maximum bandwidth in your network.</p> <p>The data is presented graphically as a bubble graph, heat map, or zoomable bubble graph.</p>
Show By	<p>Allows you to reorder the bubble graph by bandwidth or by number of sessions from the drop down.</p> <p>If Bandwidth is selected, the size of the bubble depends on the bandwidth used. Whereas, if Number of Session is selected, the size of the bubble depends upon the number of session.</p>
Time Span	Allows you to select a time period.

## RELATED DOCUMENTATION

| [Monitor Ports](#) | 50

# Device

## IN THIS CHAPTER

- [Monitor Chassis Information | 114](#)
- [Monitor Cluster Status | 116](#)
- [Monitor Cluster Statistics | 117](#)
- [Monitor Ethernet Switching | 120](#)
- [Monitor Voice ALGs—Summary | 121](#)
- [Monitor Voice ALGs—H323 | 122](#)
- [Monitor Voice ALGs—MGCP | 124](#)
- [Monitor Voice ALGs—SCCP | 127](#)
- [Monitor Voice ALGs—SIP | 129](#)
- [Monitor DS-Lite | 133](#)

## Monitor Chassis Information

You are here: **Monitor** > **Device** > **Chassis Information**.

Use this page to view chassis properties, which includes status of hardware components on the device. This includes routing engine details and power, and fan tray details.

**NOTE:** Starting in Junos OS Release 19.3R1, J-Web supports IOC4 and RE3 line cards for SRX5000 line of devices and SCB4 line cards for SRX5600 and SRX5800 devices.

[Table 45 on page 115](#) provides the routing engine details.

Table 45: Routing Engine Details

Field	Description
Primary	Displays information about the routing engine and the CPU load averages for the last 1, 5, and 15 minutes.  It also includes the routing engine module, model number, version, part number, serial number, memory utilization, temperature, and start time.
Backup	Displays the routing engine module, model number, version, part number, serial number, memory utilization, temperature, and start time.  It also displays the CPU load averages for the last 1, 5, and 15 minutes.

[Table 46 on page 115](#) provides the power and fan tray details.

Table 46: Power and Fan Tray Details

Field	Description
Power	Displays the names of the device's power supply units and their statuses.
Fan	Displays the names of the device's fans and their speeds (normal or high).  <b>NOTE:</b> The fan speeds is adjusted automatically according to the current temperature.

[Table 47 on page 115](#) provides the chassis component details.

Table 47: Chassis Component Details

Field	Description
General	Displays the version number, part number, serial number, and description of the selected device component.
Temperature	Displays the temperature of the selected device component (if applicable).
Resource	Displays the state, total CPU DRAM, and start time of the selected device component (if applicable).
Sub-Component	Displays information about the device's sub-components (if applicable). Details include the sub-component's version, part number, serial number, and description.

## Release History Table

Release	Description
<a href="#">19.3R1</a>	Starting in Junos OS Release 19.3R1, J-Web supports IOC4 and RE3 line cards for SRX5000 line of devices and SCB4 line cards for SRX5600 and SRX5800 devices.

## RELATED DOCUMENTATION

| [Monitor Cluster Status](#) | [116](#)

## Monitor Cluster Status

You are here: **Monitor** > **Device** > **Cluster Status**.

Use this page to view the information of cluster status.

[Table 48 on page 116](#) provides the Cluster Status details.

**Table 48: Cluster Status**

Field	Description
Refresh Interval (sec)	Displays the time interval set for page refresh.  Select the time interval from the list.
Refresh	Displays the option to refresh the page.
<b>Cluster Status</b>	
Redundancy Group	Displays the redundancy group specified for the chassis cluster.
Failover	Displays the failover options selected.  <ul style="list-style-type: none"> <li>● <b>Counter</b>—Displays the number of times chassis cluster failed.</li> <li>● <b>Action</b>—Displays the active tool for users to fail over chassis cluster.</li> </ul>
Primary	Displays the node used for the chassis cluster.
Switch	Provides an option to switch between the primary and secondary nodes.

Table 48: Cluster Status (*continued*)

Field	Description
Status	<p>Displays the state of the redundancy group for node 0 and node 1. The possible states are:</p> <ul style="list-style-type: none"> <li>• <b>Primary</b>—Redundancy group is active and passing traffic.</li> <li>• <b>Secondary</b>—Redundancy group is passive and not passing traffic.</li> <li>• <b>Lost</b>—Node loses contact with the other node through the control link. Most likely to occur when both nodes are in a cluster one node is rebooted, or, because of a control link failure, one node cannot exchange heartbeats with the other node.</li> <li>• <b>Unavailable</b>—Node has not received a single heartbeat over the control link from the other node since the other node booted up. Most likely to occur when one node boots up before the other node or if only one node is present in the cluster.</li> </ul>
Preempt	<p>Displays the preempt option selected to initiate a failover for node 0 and 1. The possible preempt options are:</p> <ul style="list-style-type: none"> <li>• <b>Yes</b>—Primary Role can be preempted based on priority.</li> <li>• <b>No</b>—Primary Role cannot be preempted if the priority changes.</li> </ul>
Manual Failover	<p>Displays the priority value of node 0 for manual failover. The possible manual failover options are:</p> <ul style="list-style-type: none"> <li>• <b>Yes</b>—If the primary role is set manually, it overrides the Priority and Preempt options.</li> <li>• <b>No</b>—Primary Role is not set manually.</li> </ul>
<b>Interface Monitoring</b>	
I/F	Displays the interfaces monitored by the redundancy group and shows their respective weights.
Weight	Displays the weight for the interface to be monitored.
Status	Displays the status of the interface.

## RELATED DOCUMENTATION

[Monitor Cluster Statistics](#) | 117

## Monitor Cluster Statistics

You are here: **Monitor** > **Device** > **Cluster Statistics**.



Use this page to view the information of cluster status.

[Table 49 on page 118](#) provides the Cluster Statistics details.

**Table 49: Cluster Statistics**

Field	Description
<b>Control Link Statistics</b>	
Control Link Statistics	Displays the Statistics of the control link used by chassis cluster traffic. Statistics for <b>Control link 1</b> are displayed when you use dual control links (SRX5000 line of devices only).
Heartbeat packets sent	Displays the Number of heartbeat messages sent on the control link.
Heartbeat packets received	Displays the number of heartbeat messages received on the control link.
Heartbeat packet errors	Displays the number of heartbeat packets received with errors on the control link.
<b>Fabric Link Statistics</b>	
Fabric Link Statistics	Displays the statistics of the fabric link used by chassis cluster traffic. Statistics for Child Link 1 are displayed when you use dual fabric links.
Probes sent	Displays the number of probes sent on the fabric link.
Probes received	Displays the number of probes received on the fabric link.
<b>Services Synchronized</b>	
Service name	Displays the name of the service.
Rtos sent	Displays the number of runtime objects (RTOs) sent.
Rtos received	Displays the number of RTOs received.
Translation context	Displays the messages synchronizing Network Address Translation (NAT) translation context.
Incoming NAT	Displays the messages synchronizing incoming Network Address Translation (NAT) service.
Resource manager	Displays the messages synchronizing resource manager groups and resources.

Table 49: Cluster Statistics (*continued*)

Field	Description
Session create	Displays the messages synchronizing session creation.
Session close	Displays the messages synchronizing session close.
Session change	Displays the messages synchronizing session change.
Gate create	Displays the messages synchronizing creation of pinholes (temporary openings in the firewall).
Session ageout refresh request	Displays the messages synchronizing request session after age-out.
Session ageout refresh reply	Displays the messages synchronizing reply session after age-out.
IPsec VPN	Displays the messages synchronizing VPN session.
Firewall user authentication	Displays the messages synchronizing firewall user authentication session.
MGCP ALG	Displays the messages synchronizing MGCP ALG sessions.
H323 ALG	Displays the messages synchronizing H.323 ALG sessions.
SIP ALG	Displays the messages synchronizing SIP ALG sessions.
SCCP ALG	Displays the messages synchronizing SCCP ALG sessions.
PPTP ALG	Displays the messages synchronizing PPTP ALG sessions.
RTSP ALG	Displays the messages synchronizing RTSP ALG sessions.
MAC address learning	Displays the messages synchronizing MAC address learning.

## RELATED DOCUMENTATION

Monitor Ethernet Switching | 120

## Monitor Ethernet Switching

You are here: **Monitor** > **Device** > **Ethernet Switching**.

Use this page to view chassis properties, which includes status of hardware components on the device. This includes routing engine details and power, and fan tray details.

**NOTE:** This option is not available for SRX5000 line of devices, SRX4200, and SRX4600 devices.

Table 50 on page 120 provides the Ethernet Switching details.

**Table 50: Ethernet Switching**

Field	Description
<b>Ethernet Switching Table Information</b>	
VLAN	The VLAN for which Ethernet switching is enabled.
MAC Address	The MAC address associated with the VLAN. If a VLAN range has been configured for a VLAN, the output displays the MAC addresses for the entire series of VLANs that were created with that name.
Type	The type of MAC address. Values are: <ul style="list-style-type: none"> <li>• static—The MAC address is manually created.</li> <li>• learn—The MAC address is learned dynamically from a packet's source MAC address.</li> <li>• flood—The MAC address is unknown and flooded to all members.</li> </ul>
Age	The time remaining before the entry ages out and is removed from the Ethernet switching table.
Interfaces	Interface associated with learned MAC addresses or All-members (flood entry).
<b>MAC Learning Log</b>	
VLAN-ID	Displays the VLAN ID.
MAC Address	Displays the learned MAC address.
Time	Displays timestamp when the MAC address was added or deleted from the log.
State	Indicates the MAC address learned on the interface.

## RELATED DOCUMENTATION

[Monitor Voice ALGs—Summary](#) | 121

## Monitor Voice ALGs—Summary

You are here: **Monitor** > **Device** > **Voice ALGs** > **Summary**.

Use this page to view information related to voice ALG summary.

[Table 51 on page 121](#) describes the fields on the Summary page.

**Table 51: Fields on the Summary Page**

Field	Description
Refresh Interval (30 sec)	Displays the time interval set for page refresh.  Select the time interval from the list.
Refresh	Click the refresh icon at the top right corner to display the option to refresh the page.
Protocol Name	Displays the protocols configured.
Total Calls	Displays the total number of calls.
Number of Active Calls	Displays the number of active calls.
Number of Received Packets	Displays the number of packets received.
Number of Errors	Displays the number of errors.
H.323 Calls Chart	Displays the H.323 calls chart.
MGCP Calls Chart	Displays the MGCP calls chart.
SCCP Calls Chart	Displays the SCCP calls chart.
SIP Calls Chart	Displays the SIP calls chart.

## RELATED DOCUMENTATION

# Monitor Voice ALGs—H323

You are here: **Monitor** > **Device** > **Voice ALGs** > **H323**.

Use this page to view counter summary, error counter, counter summary chart and message counter of H323.

[Table 52 on page 122](#) describes the fields on the H323 page.

**Table 52: Fields on the H323 Page**

Field	Description
Refresh Interval (30 sec)	Displays the time interval set for page refresh.  Select the time interval from the list.
Refresh	Click the refresh icon at the top right corner to display the option to refresh the page.
Clear	Click <b>Clear</b> to clear the monitor summary.

## H323 Counters Summary

Category	Displays the following categories: <ul style="list-style-type: none"> <li>● <b>Packets received</b>—Number of ALG H.323 packets received.</li> <li>● <b>Packets dropped</b>—Number of ALG H.323 packets dropped.</li> <li>● <b>RAS message received</b>—Number of incoming RAS (Registration, Admission, and Status) messages per second per gatekeeper received and processed.</li> <li>● <b>Q.931 message received</b>—Counter for Q.931 message received.</li> <li>● <b>H.245 message received</b>—Counter for H.245 message received.</li> <li>● <b>Number of calls</b>—Total number of ALG H.323 calls.</li> <li>● <b>Number of active calls</b>—Number of active ALG H.323 calls.</li> <li>● <b>Number of DSCP Marked</b>—Number of DSCP Marked on ALG H.323 calls.</li> </ul>
Count	Provides count of response codes for each H.323 counter summary category.

## H.323 Error Counter

Table 52: Fields on the H323 Page (*continued*)

Field	Description
Category	<p>Displays the following categories:</p> <ul style="list-style-type: none"> <li>• <b>Decoding errors</b>—Number of decoding errors.</li> <li>• <b>Message flood dropped</b>—Error counter for message flood dropped.</li> <li>• <b>NAT errors</b>—H.323 ALG NAT errors.</li> <li>• <b>Resource manager errors</b>—H.323 ALG resource manager errors.</li> <li>• <b>DSCP Marked errors</b>—H.323 ALG DSCP marked errors.</li> </ul>
Count	Provides count of response codes for each H.323 error counter category.

### Counter Summary Chart

Packets Received	Provides the graphical representation of the packets received.
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### H.323 Message Counter

Category	<p>Displays the following categories:</p> <ul style="list-style-type: none"> <li>• <b>RRQ</b>—Registration Request message counter.</li> <li>• <b>RCF</b>—Registration Confirmation Message.</li> <li>• <b>ARQ</b>—Admission Request message counter.</li> <li>• <b>ACF</b>—Admission Confirmation.</li> <li>• <b>URQ</b>—Unregistration Request.</li> <li>• <b>UCF</b>—Unregistration Confirmation.</li> <li>• <b>DRQ</b>—Disengage Request.</li> <li>• <b>DCF</b>—Disengage Confirmation.</li> <li>• <b>Oth RAS</b>—Other incoming Registration, Admission, and Status messages message counter.</li> <li>• <b>Setup</b>—Timeout value, in seconds, for the response of the outgoing setup message.</li> <li>• <b>Alert</b>—Alert message type.</li> <li>• <b>Connect</b>—Connect setup process.</li> <li>• <b>CallProd</b>—Number of call production messages sent.</li> <li>• <b>Info</b>—Number of info requests sent.</li> <li>• <b>RelCmpl</b>—Number of Rel Cmpl message sent.</li> <li>• <b>Facility</b>—Number of facility messages sent.</li> <li>• <b>Empty</b>—Empty capabilities to the support message counter.</li> <li>• <b>OLC</b>—Open Local Channel message counter.</li> <li>• <b>OLC ACK</b>—Open Local Channel Acknowledge message counter.</li> <li>• <b>Oth H245</b>—Other H.245 message counter</li> </ul>
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Table 52: Fields on the H323 Page *(continued)*

Field	Description
Count	Provides count of response codes for each H.323 message counter category.

## RELATED DOCUMENTATION

| [Monitor Voice ALGs—MGCP](#) | [124](#)

## Monitor Voice ALGs—MGCP

You are here: **Monitor** > **Device** > **Voice ALGs** > **MGCP**.

Use this page to view counters and calls of voice ALG MGCP.

[Table 53 on page 124](#) describes the fields on the MGCP page.

Table 53: Fields on the MGCP Page

Field	Description
Refresh Interval (30 sec)	Displays the time interval set for page refresh.  Select the time interval from the list.
Refresh	Click the refresh icon at the top right corner to display the option to refresh the page.
Clear	Provides an option to clear the monitor summary.  Click Clear to clear the monitor summary.

### Counters—MGCP Counters Summary

Table 53: Fields on the MGCP Page (*continued*)

Field	Description
Category	<p>Displays the following categories:</p> <ul style="list-style-type: none"> <li>• <b>Packets Received</b>—Number of ALG MGCP packets received.</li> <li>• <b>Packets Dropped</b>—Number of ALG MGCP packets dropped.</li> <li>• <b>Message received</b>—Number of ALG MGCP messages received.</li> <li>• <b>Number of connections</b>—Number of ALG MGCP connections.</li> <li>• <b>Number of active connections</b>—Number of active ALG MGCP connections.</li> <li>• <b>Number of calls</b>—Number of ALG MGCP calls.</li> <li>• <b>Number of active calls</b>—Number of active ALG MGCP calls.</li> <li>• <b>Number of active transactions</b>—Number of active transactions.</li> <li>• <b>Number of transactions</b>—Number of transactions.</li> <li>• <b>Number of re-transmission</b>—Number of ALG MGCP retransmissions.</li> <li>• <b>Number of active endpoints</b>—Number of MGCP active endpoints.</li> <li>• <b>Number of DSCP marked</b>—Number of MGCP DSCPs marked.</li> </ul>
Count	Provides the count of response codes for each MGCP counter summary category.

#### Counters—MGCP Error Counter

Category	<p>Displays the following categories:</p> <ul style="list-style-type: none"> <li>• <b>Unknown-method</b>—MGCP ALG unknown method errors.</li> <li>• <b>Decoding error</b>—MGCP ALG decoding errors.</li> <li>• <b>Transaction error</b>—MGCP ALG transaction errors.</li> <li>• <b>Call error</b>—MGCP ALG call counter errors.</li> <li>• <b>Connection error</b>—MGCP ALG connection errors.</li> <li>• <b>Connection flood drop</b>—MGCP ALG connection flood drop errors.</li> <li>• <b>Message flood drop</b>—MGCP ALG message flood drop error.</li> <li>• <b>IP resolve error</b>—MGCP ALG IP address resolution errors.</li> <li>• <b>NAT error</b>—MGCP ALG NAT errors.</li> <li>• <b>Resource manager error</b>—MGCP ALG resource manager errors.</li> <li>• <b>DSCP Marked error</b>—MGCP ALG DSCP marked errors.</li> </ul>
Count	Provides the count of response codes for each summary error counter category.
Counters Summary Chart	Displays the Counter Summary Chart.

#### Counters—MGCP Packet Counters



Table 53: Fields on the MGCP Page (*continued*)

Field	Description
Category	<p>Displays the following categories:</p> <ul style="list-style-type: none"> <li>• <b>CRCX</b>—Create Connection</li> <li>• <b>MDCX</b>—Modify Connection</li> <li>• <b>DLCX</b>—Delete Connection</li> <li>• <b>AUEP</b>—Audit Endpoint</li> <li>• <b>AUCX</b>—Audit Connection</li> <li>• <b>NTFY</b>—Notify MGCP</li> <li>• <b>RSIP</b>—Restart in Progress</li> <li>• <b>EPCF</b>—Endpoint Configuration</li> <li>• <b>RQNT</b>—Request for Notification</li> <li>• <b>000-199</b>—Respond code is 0-199</li> <li>• <b>200-299</b>—Respond code is 200-299</li> <li>• <b>300-399</b>—Respond code is 300-399</li> </ul>
Count	Provides count of response codes for each MGCP packet counter category.
<b>Calls</b>	
Endpoint@GW	Displays the endpoint name.
Zone	<p>Displays the following options:</p> <ul style="list-style-type: none"> <li>• <b>trust</b>—Trust zone.</li> <li>• <b>untrust</b>—Untrust zone.</li> </ul>
Endpoint IP	Displays the endpoint IP address.
Call ID	Displays the call identifier for ALG MGCP.
RM Group	Displays the resource manager group ID.
Call Duration	Displays the duration for which connection is active.
Refresh	Click the refresh icon at the top right corner to display the option to refresh the page.
Show	Click the icon to display the content.

## RELATED DOCUMENTATION

| [Monitor Voice ALGs—SCCP](#) | 127

## Monitor Voice ALGs—SCCP

You are here: **Monitor** > **Device** > **Voice ALGs** > **SCCP**.

Use this page to view counters and calls of voice ALG SCCP.

[Table 54 on page 127](#) describes the fields on the SCCP page.

**Table 54: Fields on the SCCP Page**

Field	Description
Refresh Interval (30 sec)	Displays the time interval set for page refresh.  Select the time interval from the list.
Refresh	Click the refresh icon at the top right corner to display the option to refresh the page.
Clear	Provides an option to clear the monitor summary.  Click <b>Clear</b> to clear the monitor summary.
Category	Displays the following categories: <ul style="list-style-type: none"> <li>• <b>Active client sessions</b>—Number of active SCCP ALG client sessions.</li> <li>• <b>Active calls</b>—Number of active SCCP ALG calls.</li> <li>• <b>Total calls</b>—Total number of SCCP ALG calls.</li> <li>• <b>Packets received</b>—Number of SCCP ALG packets received.</li> <li>• <b>PDU's processed</b>—Number of SCCP ALG protocol data units (PDUs) processed.</li> <li>• <b>Current call rate</b>—Number of calls per second.</li> <li>• <b>DSCPs Marked</b>—Number of DSCP marked.</li> </ul>
<b>Counters—SCCP Call Statistics</b>	
Count	Provides count of response codes for each SCCP call statistics category.
Call Statistics Chart	Displays the Call Statistics chart.
<b>Counters—SCCP Error Counters</b>	

Table 54: Fields on the SCCP Page (*continued*)

Field	Description
Category	<p>Displays the following categories:</p> <ul style="list-style-type: none"> <li>• <b>Packets dropped</b>—Number of packets dropped by the SCCP ALG.</li> <li>• <b>Decode errors</b>—Number of SCCP ALG decoding errors.</li> <li>• <b>Protocol errors</b>—Number of protocol errors.</li> <li>• <b>Address translation errors</b>— Number of NAT errors encountered by SCCP ALG.</li> <li>• <b>Policy lookup errors</b>—Number of packets dropped because of a failed policy lookup.</li> <li>• <b>Unknown PDUs</b>—Number of unknown PDUs.</li> <li>• <b>Maximum calls exceed</b>—Number of times the maximum SCCP calls limit was exceeded.</li> <li>• <b>Maximum call rate exceed</b>—Number of times the maximum SCCP call rate was exceeded.</li> <li>• <b>Initialization errors</b>—Number of initialization errors.</li> <li>• <b>Internal errors</b>—Number of internal errors.</li> <li>• <b>Nonspecific errors</b>—Number of nonspecific errors.</li> <li>• <b>No active calls to be deleted</b>—Number of no active calls to be deleted.</li> <li>• <b>No active client sessions to be deleted</b>—Number of no active client sessions to be deleted.</li> <li>• <b>Session cookie created error</b>—Number of session cookie created errors.</li> <li>• <b>Invalid NAT cookies deleted</b>—Number of invalid NAT cookies deleted.</li> <li>• <b>NAT cookies not found</b>—Number of NAT cookies not found.</li> <li>• <b>DSCP Marked Error</b>—Number of DSCP marked errors.</li> </ul>
Count	Provides count of response codes for each SCCP error counter category.
<b>Calls</b>	
Client IP	Displays the IP address of the client.
Zone	Displays the client zone identifier.
Call Manager	Displays the IP address of the call manager.
Conference ID	Displays the conference call identifier.
RM Group	Displays the resource manager group identifier.

## RELATED DOCUMENTATION

# Monitor Voice ALGs—SIP

You are here: **Monitor** > **Device** > **Voice ALGs** > **SIP**.

Use this page to view counters and calls of voice ALG SIP.

[Table 55 on page 129](#) describes the fields on the SIP page.

**Table 55: Fields on the SIP Page**

Field	Description
Refresh Interval (30 sec)	Displays the time interval set for page refresh.  Select the time interval from the list.
Refresh	Displays the option to refresh the page.
Clear	Provides an option to clear the monitor summary.  Click <b>Clear</b> to clear the monitor summary.

## Counters—SIP Counters Information

Table 55: Fields on the SIP Page (*continued*)

Field	Description
Method	<p>Displays the SIP counter information. The available options are:</p> <ul style="list-style-type: none"> <li>• <b>BYE</b>—Number of BYE requests sent. A user sends a BYE request to abandon a session. A BYE request from either user automatically terminates the session.</li> <li>• <b>REGISTER</b>—Number of REGISTER requests sent. A user sends a REGISTER request to a SIP registrar server to inform it of the current location of the user. The SIP registrar server records all the information it receives in REGISTER requests and makes this information available to any SIP server attempting to locate a user.</li> <li>• <b>OPTIONS</b>—Number of OPTIONS requests sent. An OPTION message is used by the User Agent (UA) to obtain information about the capabilities of the SIP proxy. A server responds with information about what methods, session description protocols, and message encoding it supports.</li> <li>• <b>INFO</b>—Number of INFO requests sent. An INFO message is used to communicate mid-session signaling information along the signaling path for the call.</li> <li>• <b>MESSAGE</b>—Number of MESSAGE requests sent. SIP messages consist of requests from a client to the server and responses to the requests from the server to a client for the purpose of establishing a session (or a call).</li> <li>• <b>NOTIFY</b>—Number of NOTIFY requests sent. A NOTIFY message – is sent to inform subscribers about the change in state of the subscription.</li> <li>• <b>PRACK</b>—Number of PRACK requests sent. The PRACK request plays the same role as the ACK request, but for provisional responses.</li> <li>• <b>PUBLISH</b>—Number of PUBLISH requests sent. The PUBLISH request is used for publishing the event state. PUBLISH is similar to REGISTER that allows a user to create, modify, and remove state in another entity which manages this state on behalf of the user.</li> <li>• <b>REFER</b>—Number of REFER requests sent. A REFER request is used to refer the recipient (identified by the Request-URI) to a third party identified by the contact information provided in the request.</li> <li>• <b>SUBSCRIBE</b>—Number of SUBSCRIBE requests sent. A SUBSCRIBE request is used to request current state and state information updates from a remote node.</li> <li>• <b>UPDATE</b>—Number of UPDATE requests sent. An UPDATE request is used to create a temporary opening in the firewall (pinhole) for new or updated Session Description Protocol (SDP) information. The following header fields are modified: Via, From, To, Call-ID, Contact, Route, and Record-Route.</li> <li>• <b>BENOTIFY</b>—Number of BENOTIFY requests sent. A BENOTIFY request is used to reduce the unnecessary SIP signaling traffic on application servers. Applications that do not need a response for a NOTIFY request can enhance performance by enabling BENOTIFY.</li> <li>• <b>SERVICE</b>—Number of SERVICE requests sent. The SERVICE method is used by a SIP client to request a service from a SIP server. It is a standard SIP message and will be forwarded until it reaches the server or end user that is performing the service.</li> <li>• <b>OTHER</b>—Number of OTHER requests sent.</li> </ul>
T, RT	Displays the transmit and retransmit method.

Table 55: Fields on the SIP Page (*continued*)

Field	Description
1xx, RT	Displays one transmit and retransmit method.
2xx, RT	Displays two transmit and retransmit methods.
3xx, RT	Displays three transmit and retransmit methods.
4xx, RT	Displays four transmit and retransmit methods.
5xx, RT	Displays five transmit and retransmit methods.
6xx, RT	Displays six transmit and retransmit methods.
<b>Calls</b>	
Call ID	Displays the call ID.
Method	Displays the call method used.
State	Displays the state of the ALG SIP.
Group ID	Displays the group identifier.
Show	Enables you to show the hidden content.
Refresh	Click the refresh icon at the top right corner to refresh the content.
<b>SIP Error Counters</b>	
Invite Method Chart	<p>Displays the invite method chart. The available options are:</p> <ul style="list-style-type: none"> <li>• T/RT</li> <li>• 1xx/ RT</li> <li>• 2xx/ RT</li> <li>• 3xx/ RT</li> <li>• 4xx/ RT</li> <li>• 5xx/ RT</li> <li>• 6xx/ RT</li> </ul>

Table 55: Fields on the SIP Page (*continued*)

Field	Description
Category	<p>Displays the SIP error counters. The available options are:</p> <ul style="list-style-type: none"> <li>• <b>Total Pkt-in</b>—Number of SIP ALG total packets received.</li> <li>• <b>Total Pkt dropped on error</b>—Number of packets dropped by the SIP ALG.</li> <li>• <b>Call error</b>—SIP Number of ALG call errors.</li> <li>• <b>IP resolve error</b>—Number of SIP ALG IP address resolution errors.</li> <li>• <b>NAT error</b>—SIP Number of ALG NAT errors.</li> <li>• <b>Resource manager error</b>—Number of SIP ALG resource manager errors.</li> <li>• <b>RR header exceeded max</b>—Number of times the SIP ALG RR (Record-Route) headers exceeded the maximum limit.</li> <li>• <b>Contact header exceeded max</b>—Number of times the SIP ALG contact header exceeded the maximum limit.</li> <li>• <b>Call dropped due to limit</b>—Number of SIP ALG calls dropped because of call limits.</li> <li>• <b>SIP stack error</b>—Number of SIP ALG stack errors.</li> <li>• <b>SIP Decode error</b>—Number of SIP ALG decode errors.</li> <li>• <b>SIP unknown method error</b>—Number of SIP ALG unknow method errors.</li> <li>• <b>SIP DSCP marked</b>—SIP ALG DSCP marked.</li> <li>• <b>SIP DSCP marked error</b>—Number of SIP ALG DSCPs marked.</li> <li>• <b>RTO message sent</b>—Number of SIP ALG marked RTO messages sent.</li> <li>• <b>RTO message received</b>—Number of SIP ALG RTO messages received.</li> <li>• <b>RTO buffer allocation failure</b>—Number of SIP ALG RTO buffer allocation failures.</li> <li>• <b>RTO buffer transmit failure</b>—Number of SIP ALG RTO buffer transmit failures.</li> <li>• <b>RTO send processing error</b>—Number of SIP ALG RTO send processing errors.</li> <li>• <b>RTO receiving processing error</b>— Number of SIP ALG RTO receiving processing errors.</li> <li>• <b>RTO receive invalid length</b>—Number of SIP ALG RTOs receiving invalid length.</li> <li>• <b>RTO receive call process error</b>—Number of SIP ALG RTO receiving call process errors.</li> <li>• <b>RTO receive call allocation error</b>—Number of SIP ALG RTO receiving call allocation error.</li> <li>• <b>RTO receive call register error</b>—Number of SIP ALG RTO receiving call register errors.</li> <li>• <b>RTO receive invalid status error</b>—Number of SIP ALG RTO receiving register errors.</li> </ul>
Count	Provides count of response codes for each SIP ALG counter category.

## RELATED DOCUMENTATION

## Monitor DS-Lite

You are here: **Monitor** > **Device** > **DS-Lite**.

Use this page to view information related to DS Lite page.

[Table 56 on page 133](#) describes the fields on the DS-Lite page.

**Table 56: Fields on the DS-Lite Page**

Field	Description
Refresh Interval	Displays the time interval for page refresh.  Select the time interval from the list.
Refresh	Click the refresh icon at the top right corner to display the fresh content.
<b>General Info</b>	
Name	Displays the name of the DS-Lite configuration.
Address	Displays the IP address of the device.
Status	Displays the status of the DS-Lite configuration.  <ul style="list-style-type: none"> <li>• <b>Connected</b>—DS-Lite configuration is connected.</li> <li>• <b>Disconnected</b>—DS-Lite configuration is not connected.</li> </ul>
Num of softwire initiator	Displays the number of softwire initiators connected to the device.
<b>Softwire Initiator from Selected Item</b>	
Address	Displays the IP address of the softwire of the selected DS-Lite configuration.
Status	Displays the status of the softwire initiator.  <ul style="list-style-type: none"> <li>• <b>Active</b>—The softwire initiator is active.</li> <li>• <b>Inactive</b>—The softwire initiator is inactive.</li> </ul> <p>The status types displayed are active and inactive.</p>
spu-id	Displays the identification number of the Services Processing Unit.
Show	Enables you to see the hidden content.
Refresh	Click the refresh icon at the top right corner to display the fresh content.



RELATED DOCUMENTATION

| [Monitor Chassis Information](#) | 114

# Routing

IN THIS CHAPTER

- [Monitor Route Information | 135](#)
- [Monitor RIP Information | 138](#)
- [Monitor OSPF Information | 139](#)
- [Monitor BGP Information | 141](#)

## Monitor Route Information

You are here: **Monitor > Routing > Route Information.**

Use this page to view information about routes in a routing table, including destination, protocol, state, and parameter information.

[Table 57 on page 135](#) describes the fields on the Route Information page.

Table 57: Fields on the Route Information Page

Field	Description
<b>Route Filter</b>	
Destination Address	Enter the destination address of the route.
Protocol	Enter the protocol from which the route was learned.
Next hop address	Specifies the network layer address of the directly reachable neighboring system (if applicable) and the interface used to reach it.  Enter the next hop address.
Receive protocol	Enter the dynamic routing protocol using which the routing information was received through a particular neighbor.

Table 57: Fields on the Route Information Page (*continued*)

Field	Description
Best route	Specifies only the best route available.  Select the view details of the best route.
Inactive routes	Specifies the inactive routes.  Select the view details of inactive routes.
Exact route	Specifies the exact route.  Select the view details of the exact route.
Hidden routes	Specifies the hidden routes.  Select the view details of hidden routes.
Search	Applies the specified filter and displays the matching messages.  To apply the filter and display messages, click <b>Search</b> .
Reset	Resets selected options to default  To reset the filter, click <b>Reset</b> .
<b>Route Table</b>	
Static Route Addresses	The list of static route addresses.
Generate Report	Creates an HTML report based on the - specified parameters.
refresh	Click the refresh icon at the top right corner to display the fresh content.
Protocol	Protocol from which the route was learned: <b>Static</b> , <b>Direct</b> , <b>Local</b> , or the name of a particular protocol.
Preference	The preference is the individual preference value for the route.  The route preference is used as one of the route selection criteria.

Table 57: Fields on the Route Information Page (*continued*)

Field	Description
Next Hop	<p>Network Layer address of the directly reachable neighboring system (if applicable) and the interface used to reach it.</p> <p>If a next hop is listed as <b>Discard</b>, all traffic with that destination address is discarded rather than routed. This value generally means that the route is a static route for which the <b>discard</b> attribute has been set.</p> <p>If a next hop is listed as <b>Reject</b>, all traffic with that destination address is rejected. This value generally means that the address is unreachable. For example, if the address is a configured interface address and the interface is unavailable, traffic bound for that address is rejected.</p> <p>If a next hop is listed as <b>Local</b>, the destination is an address on the host (either the loop back address or Ethernet management port 0 address, for example).</p>
Next hop address	<p>Specifies the network layer address of the directly reachable neighboring system (if applicable) and the interface used to reach it.</p> <p>Enter the next hop address.</p>
Age	How long the route has been active.
State	<p>Flags for this route.</p> <p>There are many possible flags.</p>
AS Path	<p>AS path through which the route was learned. The letters of the AS path indicate the path origin</p> <ul style="list-style-type: none"> <li>• I—IGP.</li> <li>• E—EGP.</li> <li>• ?—Incomplete. Typically, the AS path was aggregated.</li> </ul>

## RELATED DOCUMENTATION

## Monitor RIP Information

You are here: **Monitor** > **Routing** > **RIP Information**.

Use this page to view RIP routing information, including a summary of RIP neighbors and statistics.

[Table 58 on page 138](#) describes the fields on the RIP Information page.

**Table 58: Fields on the RIP Information Page**

Field	Description
<b>RIP Neighbors</b>	
Protocol Name	The RIP protocol name.
Port number	The port on which RIP is enabled.
Hold down time	The interval during which routes are neither advertised nor updated.
Global routes learned	Number of RIP routes learned on the logical interface.
Global routes hold down	Number of RIP routes that are not advertised or updated during the hold-down interval.
Global request dropped	Number of requests dropped.
Global responses dropped	Number of responses dropped.
<b>RIP Statistics</b>	
Details	Tab used to view the details of the interface on which RIP is enabled.
Neighbor	<p>Name of the RIP neighbor.</p> <p><b>NOTE:</b> This value is the name of the interface on which RIP is enabled. Click the name to see the details for this neighbor.</p>
State	State of the RIP connection: Up or Dn (Down).
Source Address	<p>Local source address.</p> <p>This value is the configured address of the interface on which RIP is enabled.</p>
Destination Address	<p>Destination address.</p> <p>This value is the configured address of the immediate RIP adjacency.</p>

Table 58: Fields on the RIP Information Page (*continued*)

Field	Description
Send Mode	The mode of sending RIP messages.
Receive Mode	The mode in which messages are received.
In Metric	Value of the in coming metric configured for the RIP neighbor.

## RELATED DOCUMENTATION

[Monitor OSPF Information](#) | 139

## Monitor OSPF Information

You are here: **Monitor** > **Routing** > **OSPF Information**.

Use this page to view OSPF routing information, including a summary of OSPF neighbors, interfaces, and statistics.

[Table 59 on page 139](#) describes the fields on the OSPF Information page.

Table 59: Fields on the OSPF Information Page

Field	Description
<b>OSPF Interfaces</b>	
Details	Tab used to view the details of the selected OSPF.
Interface	Name of the interface running OSPF.
State	State of the interface: <b>BDR</b> , <b>Down</b> , <b>DR</b> , <b>DRother</b> , <b>Loop</b> , <b>PtToPt</b> , or <b>Waiting</b> .  <b>NOTE:</b> The <b>Down</b> state, indicating that the interface is not functioning, and <b>PtToPt</b> state, indicating that a point-to-point connection has been established, are the most common states.
Area	Number of the area that the interface is in.
DR ID	ID of the area's designated device.

Table 59: Fields on the OSPF Information Page (*continued*)

Field	Description
BDR ID	ID of the area's backup designated device.
Neighbors	Number of neighbors on this interface.
<b>OSPF Statistics - Packets</b>	
Sent	Displays the total number of packets sent.
Received	Displays the total number of packets received.
<b>OSPF Statistics - Details</b>	
Flood Queue Depth	Number of entries in the extended queue.
Total Retransmits	Number of retransmission entries enqueued.
Total Database Summaries	Total number of database description packets.
<b>OSPF Neighbors</b>	
Address	Address of the neighbor.
Interface	Interface through which the neighbor is reachable.
State	<p>State of the neighbor: <b>Attempt, Down, Exchange, ExStart, Full, Init, Loading, or 2way.</b></p> <p>Generally, only the Down state, indicating a failed OSPF adjacency, and the Full state, indicating a functional adjacency, are maintained for more than a few seconds. The other states are transitional states that a neighbor is in only briefly while an OSPF adjacency is being established.</p>
ID	ID of the neighbor.
Priority	Priority of the neighbor to become the designated router.
Activity Time	The activity time.
Area	Area that the neighbor is in.
Options	Option bits received in the hello packets from the neighbor.

Table 59: Fields on the OSPF Information Page (*continued*)

Field	Description
DR Address	Address of the designated router.
BDR Address	Address of the backup designated router.
Uptime	Length of time since the neighbor came up.
Adjacency	Length of time since the adjacency with the neighbor was established.

## RELATED DOCUMENTATION

| [Monitor BGP Information](#) | 141

## Monitor BGP Information

You are here: **Monitor** > **Routing** > **BGP Information**.

Use this page to monitor BGP routing information on the routing device, including a summary of BGP routing and neighbor information.

[Table 60 on page 141](#) describes the fields on the BGP Information page.

Table 60: Fields on the BGP Information Page

Field	Description
<b>BGP Peer Summary</b>	
Total Groups	Number of BGP groups.
Total Peers	Number of BGP peers.
Down Peers	Number of unavailable BGP peers.
Unconfigured Peers	Address of each BGP peer.
<b>RIB Summary tab</b>	
RIB Name	Name of the RIB group.



Table 60: Fields on the BGP Information Page (*continued*)

Field	Description
Total Prefixes	Total number of prefixes from the peer, both active and inactive, that are in the routing table.
Active Prefixes	Number of prefixes received from the EBGP peers that are active in the routing table.
Suppressed Prefixes	Number of routes received from EBGP peers currently inactive because of damping or other reasons.
History Prefixes	History of the routes received or suppressed.
Dumped Prefixes	Number of routes currently inactive because of damping or other reasons. These routes do not appear in the forwarding table and are not exported by routing protocols.
Pending Prefixes	Number of pending routes.
State	Status of the graceful restart process for this routing table: BGP restart is complete, BGP restart in progress, VPN restart in progress, or VPN restart is complete.
<b>BGP Neighbors</b>	
Details	Click this button to view the selected BGP neighbor details.
Peer Address	Address of the BGP neighbor.
Autonomous System	AS number of the peer.

Table 60: Fields on the BGP Information Page (*continued*)

Field	Description
Peer State	<p>Current state of the BGP session:</p> <ul style="list-style-type: none"> <li>• <b>Active</b>—BGP is initiating a TCP connection in an attempt to connect to a peer. If the connection is successful, BGP sends an open message.</li> <li>• <b>Connect</b>—BGP is waiting for the TCP connection to become complete.</li> <li>• <b>Established</b>—The BGP session has been established, and the peers are exchanging BGP update messages.</li> <li>• <b>Idle</b>—This is the first stage of a connection. BGP is waiting for a Start event.</li> <li>• <b>OpenConfirm</b>—BGP has acknowledged receipt of an open message from the peer and is waiting to receive a keepalive or notification message.</li> <li>• <b>OpenSent</b>—BGP has sent an open message and is waiting to receive an open message from the peer.</li> </ul> <p>Generally, the most common states are <b>Active</b>, which indicates a problem establishing the BGP connection, and <b>Established</b>, which indicates a successful session setup. The other states are transition states, and BGP sessions normally do not stay in those states for extended periods of time.</p>
Elapsed Time	Elapsed time since the peering session was last reset.
Description	Description of the BGP session.

## RELATED DOCUMENTATION

[Monitor Route Information](#) | 135

# Class of Service

IN THIS CHAPTER

- [Monitor CoS Interfaces | 144](#)
- [Monitor Classifiers | 145](#)
- [Monitor CoS Value Aliases | 146](#)
- [Monitor RED Drop Profiles | 146](#)
- [Monitor Forwarding Classes | 147](#)
- [Monitor Rewrite Rules | 148](#)
- [Monitor Scheduler Maps | 149](#)

## Monitor CoS Interfaces

You are here: **Monitor** > **Class of Service** > **Interfaces**.

Use this page to display details about the physical and logical interfaces and the CoS components assigned to them.

[Table 61 on page 144](#) describes the fields on the Interfaces page.

Table 61: Fields on the Interfaces Page

Field	Description
Interface	Name of a physical interface to which CoS components are assigned.  To display names of logical interfaces configured on this physical interface, click the plus sign (+).
Scheduler Map	Name of the scheduler map associated with this interface.
Queues Supported	Number of queues you can configure on the interface.
Queues in Use	Number of queues currently configured.

RELATED DOCUMENTATION

| [Monitor Classifiers](#) | 145

Monitor Classifiers

You are here: **Monitor** > **Class of Service** > **Classifiers**.

Use this page to display the mapping of incoming CoS value to forwarding class and loss priority.

[Table 62 on page 145](#) describes the fields on the Classifiers page.

Table 62: Fields on the Classifiers Page

Field	Description
Classifier Name	Name of a classifier.  To display classifier assignments, click the plus sign (+).
CoS Value Type	The classifiers are displayed by type: <ul style="list-style-type: none"><li>• <b>dscp</b>—All classifiers of the DSCP type.</li><li>• <b>dscp ipv6</b>—All classifiers of the DSCP IPv6 type.</li><li>• <b>exp</b>—All classifiers of the MPLS EXP type.</li><li>• <b>ieee-802.1</b>—All classifiers of the IEEE 802.1 type.</li><li>• <b>inet-precedence</b>—All classifiers of the IP precedence type.</li></ul>
Index	Internal index of the classifier.
Incoming CoS Value	CoS value of the incoming packets, in bits. These values are used for classification.
Assign to Forwarding Class	Forwarding class that the classifier assigns to an incoming packet. This class affects the forwarding and scheduling policies that are applied to the packet as it transits the device.
Assign to Loss Priority	Loss priority value that the classifier assigns to the incoming packet based on its CoS value.

RELATED DOCUMENTATION

| [Monitor CoS Interfaces](#) | 144

## Monitor CoS Value Aliases

You are here: **Monitor** > **Class of Service** > **CoS Value Aliases**.

Use this page to view information about routes in a routing table, including destination, protocol, state, and parameter information.

[Table 63 on page 146](#) describes the fields on the Value Aliases page.

**Table 63: Fields on the CoS Value Aliases Page**

Field	Description
CoS Value Type	<p>Type of the CoS value:</p> <ul style="list-style-type: none"> <li>• <b>dscp</b>—Examines Layer 3 packet headers for IP packet classification.</li> <li>• <b>dscp ipv6</b>—Examines Layer 3 packet headers for IPv6 packet classification.</li> <li>• <b>exp</b>—Examines Layer 2 packet headers for MPLS packet classification.</li> <li>• <b>ieee-802.1</b>—Examines Layer 2 packet header for packet classification.</li> <li>• <b>inet-precedence</b>—Examines Layer 3 packet headers for IP packet classification.</li> </ul> <p>To display aliases and bit patterns, click the plus sign (+).</p>
CoS Value Alias	Name given to a set of bits—for example, af11 is a name for 001010 bits.
CoS Value	Set of bits associated with an alias.

### RELATED DOCUMENTATION

[Monitor Classifiers](#) | 145

## Monitor RED Drop Profiles

You are here: **Monitor** > **Class of Service** > **RED Drop Profiles**.

Use this page to view information about routes in a routing table, including destination, protocol, state, and parameter information.

[Table 64 on page 147](#) describes the fields on the RED Drop Profiles page.

Table 64: Fields on the RED Drop Profiles Page

Field	Description
RED Drop Profile Name	<p>Name of the RED drop profile.</p> <p>A drop profile consists of pairs of values between 0 and 100, one for queue buffer fill level and one for drop probability, that determine the relationship between a buffer's fullness and the likelihood it will drop packets.</p> <p>To display profile values, click the plus sign (+).</p>
Type	<p>Type of a specific drop profile:</p> <ul style="list-style-type: none"> <li>• <b>interpolated</b>—The two coordinates (x and y) of the graph are interpolated to produce a smooth profile.</li> <li>• <b>segmented</b>—The two coordinates (x and y) of the graph are represented by line fragments to produce a segmented profile.</li> </ul>
Index	Internal index of this drop profile.
Fill Level	Percentage fullness of a buffer queue. This value is the x coordinate of the RED drop profile graph.
Drop Probability	Drop probability of a packet corresponding to a specific queue buffer fill level. This value is the y coordinate of the RED drop profile graph.

## RELATED DOCUMENTATION

| [Monitor Classifiers](#) | 145

## Monitor Forwarding Classes

You are here: **Monitor** > **Class of Service** > **Forwarding Classes**.

Use this page to view the current assignment of CoS forwarding classes to queue numbers on the system.

[Table 65 on page 148](#) describes the fields on the Forwarding Classes page.

Table 65: Fields on the Forwarding Classes Page

Field	Description
Forwarding Class	<p>Names of forwarding classes assigned to queue numbers. By default, the following forwarding classes are assigned to queues 0 through 3:</p> <ul style="list-style-type: none"> <li>• <b>best-effort</b>—Provides no special CoS handling of packets. Loss priority is typically not carried in a CoS value, and RED drop profiles are more aggressive.</li> <li>• <b>expedited-forwarding</b>—Provides low loss, low delay, low jitter, assured bandwidth, and end-to-end service.</li> <li>• <b>assured-forwarding</b>—Provides high assurance for packets within specified service profile. Excess packets are dropped.</li> <li>• <b>network-control</b>—Packets can be delayed but not dropped.</li> </ul>
Queue	<p>Queue number corresponding to the forwarding class name.</p> <p>By default, four queues, 0 through 3, are assigned to forwarding classes.</p>

## RELATED DOCUMENTATION

| [Monitor RED Drop Profiles](#) | 146

## Monitor Rewrite Rules

You are here: **Monitor** > **Class of Service** > **Rewrite Rules**.

Use this page to view information about routes in a routing table, including destination, protocol, state, and parameter information.

[Table 66 on page 148](#) describes the fields on the Rewrite Rules page.

Table 66: Fields on the Rewrite Rules Page

Field	Description
Rewrite Rule Name	Names of rewrite rules.

Table 66: Fields on the Rewrite Rules Page (*continued*)

Field	Description
CoS Value Type	<p>Rewrite rule type:</p> <ul style="list-style-type: none"> <li>• <b>dscp</b>—For IPv4 DiffServ traffic.</li> <li>• <b>dscp-ipv6</b>—For IPv6 DiffServ traffic.</li> <li>• <b>exp</b>—For MPLS traffic.</li> <li>• <b>ieee-802.1</b>—For Layer 2 traffic.</li> <li>• <b>inet-precedence</b>—For IPv4 traffic.</li> </ul> <p>To display forwarding classes, loss priorities, and rewritten CoS values, click the plus sign (+).</p>
Index	Internal index for this particular rewrite rule.
Forwarding Class	<p>Forwarding class that in combination with loss priority is used to determine CoS values for rewriting.</p> <p>Rewrite rules are applied to CoS values in outgoing packets based on forwarding class and loss priority setting.</p>
Loss Priority	Loss priority that in combination with forwarding class is used to determine CoS values for rewriting.
Rewrite CoS Value To	Value that the CoS value is rewritten to.

## RELATED DOCUMENTATION

[Monitor Forwarding Classes](#) | 147

## Monitor Scheduler Maps

You are here: **Monitor** > **Class of Service** > **Scheduler Maps**.

Use this page to view information on assignments of CoS forwarding classes to schedulers.

[Table 67 on page 150](#) describes the fields on the Scheduler Maps page.



Table 67: Fields on the Scheduler Maps Page

Field	Description
Scheduler Map	Name of a scheduler map.  For details, click the plus sign (+).
Index	Index of a specific object—scheduler maps, schedulers, or drop profiles.
Scheduler Name	Name of a scheduler.
Transmit Rate	Configured transmit rate of the scheduler in bits per second (bps). The rate value can be either of the following: <ul style="list-style-type: none"> <li>• <b>A percentage</b>—The scheduler receives the specified percentage of the total interface bandwidth.</li> <li>• <b>remainder</b>—The scheduler receives the remaining bandwidth of the interface after allocation to other schedulers.</li> </ul>
Rate Limit	Rate limiting configuration of the queue: <ul style="list-style-type: none"> <li>• <b>none</b>—No rate limiting.</li> <li>• <b>exact</b>—The queue transmits at only the configured rate.</li> </ul>
Buffer Size	Delay buffer size in the queue or the amount of transmit delay (in milliseconds). The buffer size can be either of the following: <ul style="list-style-type: none"> <li>• <b>A percentage</b>—The buffer is a percentage of the total buffer allocation.</li> <li>• <b>remainder</b>—The buffer is sized according to what remains after other scheduler buffer allocations.</li> </ul>
Priority	Scheduling priority of a queue: <ul style="list-style-type: none"> <li>• <b>high</b>—Packets in this queue are transmitted first.</li> <li>• <b>low</b>—Packets in this queue are transmitted last.</li> <li>• <b>medium-high</b>—Packets in this queue are transmitted after high-priority packets.</li> <li>• <b>medium-low</b>—Packets in this queue are transmitted before low-priority packets.</li> </ul>
Drop Profiles	Name and index of a drop profile that is assigned to a specific loss priority and protocol pair.
Loss Priority	Packet loss priority corresponding to a drop profile: <ul style="list-style-type: none"> <li>• <b>low</b>—Packet has a low loss priority.</li> <li>• <b>high</b>—Packet has a high loss priority.</li> <li>• <b>medium-low</b>—Packet has a medium-low loss priority.</li> <li>• <b>medium-high</b>—Packet has a medium-high loss priority.</li> </ul>

Table 67: Fields on the Scheduler Maps Page *(continued)*

Field	Description
Protocol	Transport protocol corresponding to a drop profile.
Drop Profile Name	Name of the drop profile.
index	Internal index for this particular rewrite rule.

RELATED DOCUMENTATION

| [Monitor Rewrite Rules](#) | 148

# MPLS

IN THIS CHAPTER

- [Monitor MPLS Interfaces | 152](#)
- [Monitor LSP Information | 153](#)
- [Monitor LSP Statistics | 154](#)
- [Monitor RSVP Sessions | 155](#)
- [Monitor RSVP Interfaces | 157](#)

## Monitor MPLS Interfaces

**NOTE:** This option is not available for SRX5000 and SRX4000 line of devices.

You are here: **Monitor > MPLS > Interfaces.**

Use this page to view interfaces on which MPLS is configured, including operational state and any administrative groups applied to an interface.

[Table 68 on page 152](#) describes the fields on the Interfaces page.

**Table 68: Fields on the MPLS Interfaces Page**

Field	Description
Interface	Name of the interface on which MPLS is configured.
State	State of the specified interface: Up or Dn (down).
Administrative groups	Administratively assigned colors of the MPLS link configured on the interface.

RELATED DOCUMENTATION

## Monitor LSP Information

You are here: **Monitor > MPLS > LSP Information.**

Use this page to view all label-switched paths configured on the services router, including all inbound, outbound, and transit LSP information.

Table 69 on page 153 describes the fields on the LSP Information page.

Table 69: Fields on the LSP Information Page

Field	Description
Ingress LSP	Information about LSPs on the inbound device. Each session has one line of output.
Egress LSP	Information about the LSPs on the outbound device. Each session has one line of output.  MPLS learns this information by querying RSVP, which holds all the transit and outbound session information.
Transit LSP	Number of LSPs on the transit routers and the state of these paths.  MPLS learns this information by querying RSVP, which holds all the transit and outbound session information.
To	Destination (outbound device) of the session.
From	Source (inbound device) of the session.
State	State of the path. It can be Up, Down, or AdminDn.  AdminDn indicates that the LSP is being taken down gracefully.
Rt	Number of active routes (prefixes) installed in the routing table.  For inbound RSVP sessions, the routing table is the primary IPv4 table (inet.0). For transit and outbound RSVP sessions, the routing table is the primary MPLS table (mpls.0).
Active Path	Name of the active path: Primary or Secondary.  This field is used for inbound LSPs only.

Table 69: Fields on the LSP Information Page (*continued*)

Field	Description
P	An asterisk (*) in this column indicates that the This field is used for inbound LSPs only.  This field is used for inbound LSPs only.
LSPname	Configured name of the LSP.
Style	RSVP reservation style. This field consists of two parts. The first is the number of active reservations. The second is the reservation style, which can be FF (fixed filter), SE (shared explicit), or WF (wildcard filter).  This field is used for outbound and transit LSPs only.
Labelin	Incoming label for this LSP.
Labelout	Outgoing label for this LSP.
Total	Total number of LSPs displayed for the particular type—ingress (inbound), egress (outbound), or transit.

## RELATED DOCUMENTATION

| [Monitor MPLS Interfaces](#) | 152

## Monitor LSP Statistics

You are here: **Monitor** > **MPLS** > **LSP Statistics**.

Use this page to view statistics for LSP sessions currently active on the device.

[Table 70 on page 154](#) describes the fields on the LSP Statistics page.

Table 70: Fields on the LSP Statistics Page

Field	Description
Ingress LSP	Information about LSPs on the inbound device. Each session has one line of output.

Table 70: Fields on the LSP Statistics Page (*continued*)

Field	Description
Egress LSP	Information about the LSPs on the outbound device. Each session has one line of output.  MPLS learns this information by querying RSVP, which holds all the transit and outbound session information.
Transit LSP	Number of LSPs on the transit routers and the state of these paths.  MPLS learns this information by querying RSVP, which holds all the transit and outbound session information.
To	Destination (outbound device) of the session.
From	Source (inbound device) of the session.
State	State of the path: <b>Up</b> , <b>Down</b> , or <b>AdminDn</b> .  <b>AdminDn</b> indicates that the LSP is being taken down gracefully.
Packets	Total number of packets received on the LSP from – the upstream neighbor.
Bytes	Total number of bytes received on the LSP from the upstream neighbor.
LSPname	Configured name of the LSP.
Total	Total number of LSPs displayed for the particular type—ingress (inbound), egress (outbound), or transit.

## RELATED DOCUMENTATION

| [Monitor LSP Information](#) | 153

## Monitor RSVP Sessions

You are here: **Monitor** > **MPLS** > **RSVP Sessions**.

Use this page to view information about RSVP-signaled LSP sessions currently active on the device, ingress and outbound egress addresses, LSP state, and LSP name.

[Table 71 on page 156](#) describes the fields on the RSVP Sessions page.

Table 71: Fields on the RSVP Sessions Page

Field	Description
Ingress LSP	Information about inbound RSVP sessions. Each session has one line of output.
Egress LSP	Information about outbound RSVP sessions. Each session has one line of output.  MPLS learns this information by querying RSVP, which holds all the transit and outbound session information.
Transit LSP	Information about transit RSVP sessions.  MPLS learns this information by querying RSVP, which holds all the transit and outbound session information.
To	Destination (outbound device) of the session.
From	Source (inbound device) of the session.
State	State of the path: Up, Down, or AdminDn.  <b>AdminDn</b> indicates that the LSP is being taken down gracefully.
Rt	Number of active routes (prefixes) installed in the routing table.  For inbound RSVP sessions, the routing table is the primary IPv4 table (inet.0). For transit and outbound RSVP sessions, the routing table is the primary MPLS table (mpls.0).
Style	RSVP reservation style. This field consists of two parts. The first is the number of active reservations. The second is the reservation style, which can be FF (fixed filter), SE (shared explicit), or WF (wildcard filter).  This field is used for outbound and transit LSPs only.
Labelin	Incoming label for this RSVP session.
Labelout	Outgoing label for this RSVP session.
LSPname	Configured name of the LSP.
Total	Total number of RSVP sessions displayed for the particular type—ingress (inbound), egress (outbound), or transit).

## RELATED DOCUMENTATION

# Monitor RSVP Interfaces

You are here: **Monitor > MPLS > RSVP Interfaces.**

Use this page to view information about interfaces on which RSVP is enabled, including the interface name, total bandwidth through the interface.

[Table 72 on page 157](#) describes the fields on the RSVP Interfaces page.

**Table 72: Fields on the RSVP Interfaces Page**

Field	Description
RSVP Interface	Number of interfaces on which RSVP is active. Each interface has one line of output.
Interface	Name of the interface.
State	State of the interface: <ul style="list-style-type: none"> <li>• <b>Disabled</b>—No traffic engineering information is displayed.</li> <li>• <b>Down</b>—The interface is not operational.</li> <li>• <b>Enabled</b>—Displays traffic engineering information.</li> <li>• <b>Up</b>—The interface is operational.</li> </ul>
Active resv	Number of reservations that are actively reserving bandwidth on the interface.
Subscription	User-configured subscription factor.

## RELATED DOCUMENTATION



# DHCP

IN THIS CHAPTER

- [Monitor DHCP Server | 158](#)
- [Monitor DHCP Relay | 160](#)

## Monitor DHCP Server

You are here: **Monitor > DHCP > DHCP Server.**

Use this page to view information about dynamic and static DHCP leases, conflicts, pools, and statistics.

[Table 73 on page 158](#) describes the fields on the DHCP Server page.

Table 73: Fields on the DHCP Server Page

Field	Description
Routing Instance	Select the routing instance name.
Interface Details	Displays the interface on which the DHCP server is configured.
Clear All Bindings	Clears all the binding information.
Binding Information	
IP address	Displays the IP address of the DHCP server.
Session id	Displays the Session ID of the subscriber session.
Hardware address	Displays the Hardware address of the DHCP server.
Expires	Displays the number of seconds in which the lease expires.

Table 73: Fields on the DHCP Server Page (*continued*)

Field	Description
State	<p>State of the address binding table on the extended DHCP local server:</p> <ul style="list-style-type: none"> <li>• BOUND—Client has an active IP address lease.</li> <li>• FORCE RENEW—Client has received the FORCE RENEW message from the server.</li> <li>• INIT—Initial state.</li> <li>• RELEASE—Client is releasing the IP address lease.</li> <li>• RENEWING—Client is sending a request to renew the IP address lease.</li> <li>• REQUESTING—Client is requesting a DHCP server.</li> <li>• SELECTING—Client is receiving offers from DHCP servers.</li> </ul>
Interface	Displays the interface on which the request was received.
<b>Statistics Information</b>	
Message Counters - Sent	<p>Number of BOOTREPLY, DHCPOFFER, DHCPACK, DHCPNAK, DHCPFORCERENEW, DHCPLEASEDUNASSIGNED, DHCPLEASEUNKNOWN, AND DHCPLEASEACTIVE messages sent from the DHCP server to DHCP clients.</p> <p>Displays these information in a bar chart.</p>
Message Counters - Received	<p>Number of BOOTREQUEST, DHCPDECLINE, DHCPDISCOVER, DHCPINFORM, DHCPRELEASE, DHCPREQUEST, DHCPLEASEQUERY, and DHCPBULKLEASE messages sent from DHCP clients and received by the DHCP server.</p> <p>Displays these information in a bar chart.</p>
Dropped Packet Counters - Total Dropped Packets	Displays the number of dropped packet counters in a pie chart.
Clear All Statistics	Clears all the collected statistical information.

## RELATED DOCUMENTATION

[Monitor DHCP Relay](#) | 160

## Monitor DHCP Relay

You are here: **Monitor** > **DHCP** > **DHCP Relay**.

Use this page to view information about dynamic and static DHCP leases, conflicts, pools, and statistics.

[Table 74 on page 160](#) describes the fields on the DHCP Relay page.

**Table 74: Fields on the DHCP Relay Page**

Field	Description
Interface Details	Displays the interface on which the DHCP relay is configured.
Clear All Bindings	Clears all the binding information.
Routing Instance	Select the routing instance name.
<b>Binding Information</b>	
IP address	Displays the IP address of the DHCP relay.
Session id	Displays the Session ID of the subscriber session.
Hardware address	Displays the Hardware address of the DHCP relay.
Expires	Displays the number of seconds in which the lease expires.
State	<p>State of the address binding table on the extended DHCP local server:</p> <ul style="list-style-type: none"> <li>• BOUND—Client has an active IP address lease.</li> <li>• FORCERENEW—Client has received the FORCERENEW message from the server.</li> <li>• INIT—Initial state.</li> <li>• RELEASE—Client is releasing the IP address lease.</li> <li>• RENEWING—Client is sending a request to renew the IP address lease.</li> <li>• REQUESTING—Client is requesting a DHCP server.</li> <li>• SELECTING—Client is receiving offers from DHCP servers.</li> </ul>
Interface	Displays the interface on which the request was received.

Table 74: Fields on the DHCP Relay Page (*continued*)

Field	Description
<b>Statistics Information</b>	
Message Counters - Sent	<p>Number of BOOTREPLY, DHCPPOFFER, DHCPACK, DHCPNAK, DHCPFORCERENEW, DHCPLEASEDUNASSIGNED, DHCPLEASEUNKNOWN, AND DHCPLEASEACTIVE messages sent from the DHCP server to DHCP clients.</p> <p>Displays these information in a bar chart.</p>
Message Counters - Received	<p>Number of BOOTREQUEST, DHCPDECLINE, DHCPDISCOVER, DHCPINFORM, DHCPRELEASE, DHCPREQUEST, DHCPLEASEQUERY, and DHCPBULKLEASE messages sent from DHCP clients and received by the DHCP server.</p> <p>Displays these information in a bar chart.</p>
Packet Counters - Dropped	Displays the number of dropped packet counters in a pie chart.
Packet Counters - Forwarded	Displays the number of forwarded packet counters in a pie chart.
Clear All Statistics	Clears all the collected statistical information.

## RELATED DOCUMENTATION

| [Monitor DHCP Server](#) | 158

# NAT

IN THIS CHAPTER

- [Monitor Source NAT | 162](#)
- [Monitor Destination NAT | 168](#)
- [Monitor Static NAT | 170](#)
- [Monitor Interface NAT Ports | 172](#)

## Monitor Source NAT

You are here: **Monitor > NAT > Source NAT.**

Use this page to view configured information about source Network Address Translation (NAT) rules, pools, persistent NAT, paired addresses, and resource usage.

[Table 75 on page 162](#) describes the fields on the Source NAT page.

Table 75: Fields on the Source NAT Page

Field	Description
<b>Rules</b>	
Refresh Interval	Indicates the duration of time after which you want the data on the page to be refreshed.
Refresh	Click the refresh icon at the top right corner to display the fresh content.
Rule-set Name	Name of the rule set.  Select all rule sets or a specific rule set to display from the list.
Total rules	Number of rules configured.
ID	Rule ID number.

Table 75: Fields on the Source NAT Page (*continued*)

Field	Description
Name	Name of the rule .
From	Name of the routing instance/zone/interface from which the packet flows.
To	Name of the routing instance/zone/interface to which the packet flows.
Source address range	Source IP address range in the source pool.
Destination address range	Destination IP address range in the source pool.
Source ports	Source port numbers.
Ip protocol	IP protocol.
Action	Action taken for a packet that matches a rule.
Persistent NAT type	Persistent NAT type.
Inactivity timeout	Inactivity timeout interval for the persistent NAT binding.
Alarm threshold	Utilization alarm threshold.
Max session number	The maximum number of sessions.
Sessions (Succ/Failed/Current)	<p>Successful, failed, and current sessions.</p> <ul style="list-style-type: none"> <li>• Succ—Number of successful session installations after the NAT rule is matched.</li> <li>• Failed—Number of unsuccessful session installations after the NAT rule is matched.</li> <li>• Current—Number of sessions that reference the specified rule.</li> </ul>
Translation Hits	Number of times a translation in the translation table is used for a source NAT rule.
Refresh	Click the refresh icon at the top right corner to display the fresh content.
<b>Top 10 Translation Hits</b>	
Graph	Displays the graph of top 10 translation hits.

Table 75: Fields on the Source NAT Page (*continued*)

Field	Description
<b>Pools</b>	
Pool Name	The names of the pools. Select all pools or a specific pool to display from the list.
Total Pools	Total pools added.
ID	ID of the pool.
Name	Name of the source pool.
Address range	IP address range in the source pool.
Single/Twin ports	Number of allocated single and twin ports.
Port	Source port number in the pool.
Address assignment	Displays the type of address assignment.
Alarm threshold	Utilization alarm threshold.
Port overloading factor	Port overloading capacity.
Routing instance	Name of the routing instance.
Total addresses	Total IP address, IP address set, or address book entry.
Host address base	Host base address of the original source IP address range.
Translation hits	Number of times a translation in the translation table is used for source NAT.
Refresh	Click the refresh icon at the top right corner to display the fresh content.
<b>Top 10 Translation Hits</b>	
Graph	Displays the graph of top 10 translation hits.
<b>Persistent NAT</b>	
<b>Persistent NAT table statistics</b>	

Table 75: Fields on the Source NAT Page (*continued*)

Field	Description
FPC PIC ID	Displays the FPC PIC ID.
<b>NOTE:</b> This option is available for SRX4000 and SRX5000 lines of devices.	
binding total	Displays the total number of persistent NAT bindings for the FPC.
binding in use	Number of persistent NAT bindings that are in use for the FPC.
enode total	Total number of persistent NAT enodes for the FPC.
enode in use	Number of persistent NAT enodes that are in use for the FPC.
<b>Persistent NAT table</b>	
Source NAT pool	Name of the pool.  Select all pools or a specific pool to display from the list.
Internal IP	Internal IP address.  Select all IP addresses or a specific IP address to display from the list.
Internal port	Displays the internal ports configured in the system.  Select the port to display from the list.
Internal protocol	Internal protocols.  Select all protocols or a specific protocol to display from the list.
Internal IP	Internal transport IP address of the outgoing session from internal to external.
Internal port	Internal transport port number of the outgoing session from internal to external.
Internal protocol	Internal protocol of the outgoing session from internal to external.
Reflective IP	Translated IP address of the source IP address.
Reflective port	Displays the translated number of the port.
Reflective protocol	Translated protocol.



Table 75: Fields on the Source NAT Page (*continued*)

Field	Description
Source NAT pool	Name of the source NAT pool where persistent NAT is used.
Type	Persistent NAT type.
Left time/Conf time	Inactivity timeout period that remains and the configured timeout value.
Current session num/Max session num	Number of current sessions associated with the persistent NAT binding and the maximum number of sessions.
Source NAT rule	Name of the source NAT rule to which this persistent NAT binding applies.
Search	Applies the specified filter and displays the matching messages.
Reset	Resets selected options to default
Clear	Removes the selected option.
Clear All	Removes all the options available.
Refresh	Click the refresh icon at the top right corner to display the fresh content.
<b>External node table</b>	
Internal IP	Internal transport IP address of the outgoing session from internal to external.
Internal port	Internal port number of the outgoing session from internal to external.
External IP	External IP address of the outgoing session from internal – to external.
External port	External port of the outgoing session from internal to external.
Zone	External zone of the outgoing session from internal to external.
Refresh	Click the refresh icon at the top right corner to display the fresh content.
<b>Paired Address</b>	
Pool name	Name of the pool.  Select all pools or a specific pool to display from the list.

Table 75: Fields on the Source NAT Page (*continued*)

Field	Description
Specified Address	IP address.  Select all addresses, or select the internal or external IP address to display, and enter the IP address
Pool name	Displays the selected pool or pools.
Internal address	Displays the internal IP address.
External address	Displays the external IP address.
Refresh	Click the refresh icon at the top right corner to display the fresh content.
Search	Applies the specified filter and displays the matching messages.
Reset	Enables you to get back to the default configuration.

### Resource Usage

#### Utilization for All source pools

Pool name	Name of the pool.  <b>NOTE:</b> To view additional usage information for Port Address Translation (PAT) pools, select a pool name. The information displays under Detail Port Utilization for Specified Pool.
Pool type	Pool type: PAT or Non-PAT.
Port overloading factor	Port overloading capacity for PAT pools.
Address	Addresses in the pool.
Used	Number of used resources in the pool.  For Non-PAT pools, the number of used IP addresses is displayed.  For PAT pools, the number of used ports is displayed.
Available	Number of available resources in the pool.  For Non-PAT pools, the number of available IP addresses is displayed.  For PAT pools, the number of available ports is displayed.

Table 75: Fields on the Source NAT Page (*continued*)

Field	Description
Total	<p>Number of used and available resources in the pool.</p> <p>For Non-PAT pools, the total number of used and available IP addresses is displayed.</p> <p>For PAT pools, the total number of used and available ports is displayed.</p>
Usage	<p>Percent of resources used.</p> <p>For Non-PAT pools, the percent of IP addresses used is displayed.</p> <p>For PAT pools, the percent of ports, including single and twin ports, is displayed.</p>
Peak usage	Percent of resources used during the peak date and time.

## RELATED DOCUMENTATION

| [Monitor Destination NAT](#) | 168

## Monitor Destination NAT

You are here: **Monitor** > **NAT** > **Destination NAT**.

Use this page to view destination Network Address Translation (NAT) summary table and details of the specified NAT destination address pool.

[Table 76 on page 168](#) describes the fields on the Destination NAT page.

Table 76: Fields on the Destination NAT Page

Field	Description
<b>Rules</b>	
Rule-set name	<p>Name of the rule set.</p> <p>Select all rule sets or a specific rule set to display from the list.</p>
Total rules	Number of rules configured.

Table 76: Fields on the Destination NAT Page (*continued*)

Field	Description
ID	Rule ID number.
Name	Name of the rule.
Ruleset Name	Name of the rule set.
From	Name of the routing instance/zone/interface from which the packet flows.
Source address range	Source IP address range in the source pool.
Destination address range	Destination IP address range in the source pool.
Destination port	Destination port in the destination pool.
IP protocol	IP protocol.
Action	Action taken for a packet that matches a rule.
Alarm threshold	Utilization alarm threshold.
Sessions (Succ/ Failed/ Current)	<p>Successful, failed, and current sessions.</p> <ul style="list-style-type: none"> <li>• Succ—Number of successful session installations after the NAT rule is matched.</li> <li>• Failed—Number of unsuccessful session installations after the NAT rule is matched.</li> <li>• Current—Number of sessions that reference the specified rule.</li> </ul>
Translation hits	Number of times a translation in the translation table is used for a destination NAT rule.
Refresh Interval	Indicates the duration of time after which you want the data on the page to be refreshed.
Refresh	Click the refresh icon at the top right corner to display the fresh content.
<b>Pools</b>	
Pool Name	<p>The names of the pools.</p> <p>Select all pools or a specific pool to display from the list.</p>

Table 76: Fields on the Destination NAT Page (*continued*)

Field	Description
Total Pools	Total pools added.
ID	ID of the pool.
Name	Name of the destination pool.
Address range	IP address range in the destination pool.
Port	Destination port number in the pool.
Routing instance	Name of the routing instance.
Total addresses	Total IP address, IP address set, or address book entry.
Translation hits	Number of times a translation in the translation table is used for destination NAT.
<b>Top 10 Translation Hits</b>	
Graph	Displays the graph of top 10 translation hits.
Refresh	Click the refresh icon at the top right corner to display the fresh content.

## RELATED DOCUMENTATION

| [Monitor Source NAT](#) | 162

## Monitor Static NAT

You are here: **Monitor** > **NAT** > **Static NAT**.

Use this page to view information related to NAT rules.

[Table 77 on page 171](#) describes the fields on the Static NAT page.

Table 77: Fields on the Static NAT Page

Field	Description
Rule-set Name	Name of the rule set.  Select all rule sets or a specific rule set to display from the list.
Total rules	Number of rules configured.
Refresh	Indicates the duration of time after which you want the data on the page to be refreshed.
Refresh Interval	Click the refresh icon at the top right corner to display the fresh content.
ID	Rule ID number.
Position	Position of the rule that indicates the order in which it applies to traffic.
Name	Name of the rule.
Ruleset Name	Name of the rule set.
From	Name of the routing instance/interface/zone from which the packet comes.
Source addresses.	Source IP addresses.
Source ports	Source port numbers.
Destination addresses	Destination IP address and subnet mask.
Destination ports	Destination port numbers.
Host addresses	Name of the host addresses.
Host ports	Host port numbers.
Netmask	Subnet IP address.
Host routing instance	Name of the routing instance from which the packet comes.
Alarmthreshold	Utilization alarmthreshold.

Table 77: Fields on the Static NAT Page (*continued*)

Field	Description
Sessions (Succ/ Failed/ Current)	<p>Successful, failed, and current sessions.</p> <ul style="list-style-type: none"> <li>• Succ—Number of successful session installations after the NAT rule is matched.</li> <li>• Failed—Number of unsuccessful session installations after the NAT rule is matched.</li> <li>• Current—Number of sessions that reference the specified rule.</li> </ul>
Translation hits	Number of times a translation in the translation table is used for a static NAT rule.
Top 10 Translation Hits Graph	Displays the graph of top 10 translation hits.

## RELATED DOCUMENTATION

| [Monitor Destination NAT](#) | 168

## Monitor Interface NAT Ports

You are here: **Monitor** > **NAT** > **Interface NAT Ports**.

Use this page to view ports usage for an interface source pool.

[Table 78 on page 172](#) describes the fields on the Interface NAT Ports page.

Table 78: Fields on the Interface NAT Ports Page

Field	Description
<b>Interface NAT Summary Table</b>	
Pool Index	Port pool index.
Total Ports	Total number of ports in a port pool.
Single Ports Allocated	Number of ports allocated one at a time that are in use.
Single Ports Available	Number of ports allocated one at a time that are free for use.

Table 78: Fields on the Interface NAT Ports Page (*continued*)

Field	Description
Twin Ports Allocated	Number of ports allocated two at a time that are in use.
Twin Ports Available	Number of ports allocated two at a time that are free for use.
Refresh Interval	Indicates the duration of time after which you want the data on the page to be refreshed.
Refresh	Click the refresh icon at the top right corner to display the fresh content.

## RELATED DOCUMENTATION

[Monitor Source NAT](#) | 162



# Authentication

IN THIS CHAPTER

- [Monitor Firewall Authentication | 174](#)
- [Monitor Local Authentication | 175](#)
- [Monitor UAC Authentication | 176](#)

## Monitor Firewall Authentication

You are here: **Monitor > Authentication > Firewall Auth.**

Use this page to view user table and history table of firewall authentication.

[Table 79 on page 174](#) describes the fields on the Firewall Authentication page.

Table 79: Fields on the Firewall Authentication Page

Field	Description
Virtual Chassis Member	Displays the list of virtual chassis member.  Select one of the virtual chassis members listed.
Authentication Type	Displays the authentication type used by the Firewall.
Refresh Interval (30 sec)	Displays the time interval set for page refresh.  Select the time interval from the list.
Refresh	Displays the option to refresh the page.
Clear	Provides an option to clear the summary.  Select one of the options available: <ul style="list-style-type: none"><li>● <b>Clear User Table</b>—Enables you to clear user summary.</li><li>● <b>Clear History Table</b>—Enables you to clear history summary.</li></ul>

Table 79: Fields on the Firewall Authentication Page (*continued*)

Field	Description
<b>User Table</b>	
ID	Displays the authentication identification number.
Source IP	Displays the IP address of the authentication source.
Age	Displays the idle timeout for the user.
Status	Displays the status of authentication (success or failure).
User	Displays the name of the user.
<b>History Table</b>	
ID	Displays the identification number.
Source IP	Displays the IP address of the authentication source.
Duration	Displays the authentication duration.
Status	Displays the status of authentication (success or failure).
User	Displays the name of the user.

## RELATED DOCUMENTATION

[Monitor Local Authentication](#) | 175

## Monitor Local Authentication

You are here: **Monitor** > **Authentication** > **Local Authentication**.

Use this page to view information about local authenticated user.

[Table 80 on page 176](#) describes the fields on the Local Authentication page.

Table 80: Fields on the Local Authentication Page

Field	Description
Virtual Chassis Member	Select one of the virtual chassis members listed.
Filter by	Displays the local authentication information based on the selected filter.
IP	Displays the IP address.
User Name	Displays the name of the user.
Role List	Displays the list of roles assigned to the username.
Search	Click to search a particular data.
Clear All	Click to clear all the content.
Refresh	Click the refresh icon at the top right corner to display the fresh content.

## RELATED DOCUMENTATION

[Monitor UAC Authentication](#) | 176

## Monitor UAC Authentication

You are here: **Monitor** > **Authentication** > **UAC Authentication**.

Use this page to view information about UAC authenticated user.

[Table 81 on page 176](#) describes the fields on the UAC Authentication page.

Table 81: Fields on the UAC Authentication Page

Field	Description
Filter by	Displays the UAC authentication value based on the selected filter.
Search	Click to search any particular data.
Refresh	Click the refresh icon at the top right corner to display the fresh content.

Table 81: Fields on the UAC Authentication Page (*continued*)

Field	Description
ID	Displays the authentication identification number.
Source IP	Displays the IP address of the authentication source.
User Name	Displays the name of the user.
Age	Displays the idle timeout for the user
Role List	Displays the list of roles assigned to the username.

## RELATED DOCUMENTATION

[Monitor Firewall Authentication](#) | 174

# Security Services

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## Monitor Policy Activities

You are here: **Monitor** > **Security Services** > **Policy** > **Activities**.

Use this page to display, sort, and review policy activity for every activated policy on the device.

[Table 82 on page 179](#) describes the fields on the Activities page.

Table 82: Fields on the Activities Page

Field	Description
Policy Context (Total #)	<p>Displays a list of all from and to zone combinations for the configured policies. The total number of active policies for each context is specified in the Total # field. By default, the policies from the first Zone Context are displayed.</p> <p>To display policies for a different context, select a zone context and click <b>Filter</b>. Both inactive and active policies appear for each context. However, the Total # field for a context specifies the number of active policies only.</p>
Search	Enables you to search for a particular data in the grid.
Clear Statistics	Clears the statistics in the associated pane.
Default Policy action	<p>Specifies the action to take for traffic that does not match any of the policies in the context:</p> <ul style="list-style-type: none"> <li>• permit-all—Permit all traffic that does not match a policy.</li> <li>• deny-all—Deny all traffic that does not match a policy.</li> </ul>
From Zone	Displays the source zone to be used as match criteria for the policy.
To Zone	Displays the destination zone to be used as match criteria for the policy.
Name	Displays the name of the policy.
Source Address	Displays the source addresses to be used as match criteria for the policy. Address sets are resolved to their individual names. (In this case, only the names are given, not the IP addresses).
Destination Address	Displays the destination addresses (or address sets) to be used as match criteria for the policy. Addresses are entered as specified in the destination zone's address book.
Source Identity	<p>Displays the name of the source identities set for the policy.</p> <p>To display the value of the source identities, hover the mouse on this field. Unknown source identities are also displayed.</p>
Application	Displays the name of a predefined or custom application signature to be used as match criteria for the policy.

Table 82: Fields on the Activities Page (*continued*)

Field	Description
Dynamic App	<p>Displays the dynamic application signatures to be used as match criteria if an application firewall rule set is configured for the policy.</p> <p>For a network firewall, a dynamic application is not defined.</p> <p>The rule set appears in two lines. The first line displays the configured dynamic application signatures in the rule set. The second line displays the default dynamic application signature.</p> <p>If more than two dynamic application signatures are specified for the rule set, hover over the output field to display the full list in a tooltip.</p>
Action	<p>Displays the action portion of the rule set if an application firewall rule set is configured for the policy.</p> <ul style="list-style-type: none"> <li>• permit—Permits access to the network services controlled by the policy. A green background signifies permission.</li> <li>• deny—Denies access to the network services controlled by the policy. A red background signifies denial.</li> </ul> <p>The action portion of the rule set appears in two lines. The first line identifies the action to be taken when the traffic matches a dynamic application signature. The second line displays the default action when traffic does not match a dynamic application signature.</p>
NW Services	<p>Displays the network services permitted or denied by the policy if an application firewall rule set is configured. Network services include:</p> <ul style="list-style-type: none"> <li>• gprs-gtp-profile—Specify a GPRS Tunneling Protocol profile name.</li> <li>• idp—Perform intrusion detection and prevention.</li> <li>• redirect-wx—Set WX redirection.</li> <li>• reverse-redirect-wx—Set WX reverse redirection.</li> <li>• uac-policy—Enable unified access control enforcement of the policy.</li> </ul>
Log Action	Displays the action taken.
View Logs	Enables you to see all the logs present.
Refresh	Click the refresh icon at the top right corner to display the fresh content.
Policy Hit Counters Graph	<p>Provides a representation of the value over time for a specified counter. The graph is blank if Policy Counters indicates no data. As a selected counter accumulates data, the graph is updated at each refresh interval.</p> <p>To toggle a graph on and off, click the counter name below the graph.</p>

Table 82: Fields on the Activities Page (*continued*)

Field	Description
Policy Counters	<p>Lists statistical counters for the selected policy if Count is enabled. The following counters are available for each policy:</p> <ul style="list-style-type: none"> <li>• input-bytes</li> <li>• input-byte-rate</li> <li>• output-bytes</li> <li>• output-byte-rate</li> <li>• input-packets</li> <li>• input-packet-rate</li> <li>• output-packets</li> <li>• output-packet-rate</li> <li>• session-creations</li> <li>• session-creation-rate</li> <li>• active-sessions</li> </ul> <p>To graph or to remove a counter from the Policy Hit Counters Graph, toggle the counter name. The names of enabled counters appear below the graph.</p>

## RELATED DOCUMENTATION

| [Monitor Shadow Policies](#) | 181

## Monitor Shadow Policies

You are here: **Monitor** > **Security Services** > **Policy** > **Shadow Policies**.

Use this page to check the policy list. You can enter a criteria and conduct a policy search. The search results include all policies that match the traffic criteria in the sequence in which they will be encountered.

[Table 83 on page 181](#) describes the fields on the Shadow Policies page.

Table 83: Fields on the Shadow Policies Page

Field	Description
Check Policies Search	



Table 83: Fields on the Shadow Policies Page (*continued*)

Field	Description
<b>Policy Context</b>	
Zone Policy	<p>Specifies the source zone policy.</p> <p>Options available are:</p> <ul style="list-style-type: none"> <li>• <b>From Zone</b>—Name or ID of the source zone. If a From Zone is specified by name, the name is translated to its ID internally.</li> <li>• <b>To Zone</b>—Name or ID of the destination zone. If a To Zone is specified by name, the name is translated to its ID internally.</li> </ul>
Global Policy	Specifies that the policy defined is a global policy and zones are not required.
<b>Packet Info</b>	
Source Address	Address of the source in IP notation.
Source Port	Port number of the source.
Destination Address	Address of the destination in IP notation.
Destination Port	Port number of the destination.
Source Identity	Name of the source identity.

Table 83: Fields on the Shadow Policies Page (*continued*)

Field	Description
Protocol	<p>Name or equivalent value of the protocol to be matched.</p> <p>ah—51</p> <p>egp—8</p> <p>esp—50</p> <p>gre—47</p> <p>icmp—1</p> <p>igmp—2</p> <p>igp—9</p> <p>ipip—94</p> <p>ipv6—41</p> <p>ospf—89</p> <p>pgm—113</p> <p>pim—103</p> <p>rdp—27</p> <p>rsvp—46</p> <p>sctp—132</p> <p>tcp—6</p> <p>udp—17</p> <p>vrrp—112</p>
Search	Enable you to search for a particular data in the page.
Reset	Enable you to get back to the default configuration.
<b>Check Policies List</b>	
From Zone	Name of the source zone.
To Zone	Name of the destination zone.
Move	<p>Select according to the requirement:</p> <ul style="list-style-type: none"> <li>• <b>Move Up</b>—Enables you to move up the list.</li> <li>• <b>Move Down</b>—Enables you to move down the list.</li> <li>• <b>Move to Top</b>—Enables you to move to the top of the list.</li> <li>• <b>Move to Bottom</b>—Enables you to move to the bottom of the list.</li> <li>• <b>Move to</b>—Enables you to move to a particular point on the list.</li> </ul>

Table 83: Fields on the Shadow Policies Page (*continued*)

Field	Description
Total Policies	Number of policies retrieved.
Default Policy action	The action to be taken if no match occurs.
Name	Policy name
Source Address	Name of the source address (not the IP address) of a policy. Address sets are resolved to their individual names.
Destination Address	Displays the destination address.
Source Identity	Name of the source identity for the policy.
Application	Name of a pre configured or custom application of the policy match.
Action	Action taken when a match occurs as specified in the policy.
Hit Counts	Number of matches for this policy. This value is the same as the Policy Lookups in a policy statistics report.
Active Sessions	Number of active sessions matching this policy.

## RELATED DOCUMENTATION

[Monitor Screen Counters](#) | 184

## Monitor Screen Counters

You are here: **Monitor** > **Security Services** > **Screen Counters**.

Use this page to view screen statistics for a specified security zone.

[Table 84 on page 185](#) describes the fields on the Screen Counters page.

Table 84: Fields on the Screen Counters Page

Field	Description
Type	Select a type of screen counter: <ul style="list-style-type: none"> <li>• I/F—Displays the interfaces monitored by the IDS attack type and counter value.</li> <li>• Zone—Displays the zone name for IDS attack type.</li> </ul>
Select a value	Select a value for the Type of screen counter from the list.
Disable Log	Enables you to disable the log.
Refresh Interval	Indicates the duration of time after which you want the data on the page to be refreshed.
Refresh	Click the refresh icon at the top right corner to display the fresh content.
Clear	Clears all the data from the display page.
IDS attack type	Displays the type of IDS attacks.
Counter	Displays the number of times the attacks took place.
Log	Displays the log for the IDS attacks.
Screen Counter Hits	Displays the details of the screen counter hits.

## RELATED DOCUMENTATION

| [Monitor UTM—Antivirus](#) | 185.

## Monitor UTM—Antivirus

You are here: **Monitor** > **Security Services** > **UTM** > **Antivirus**.

Use this page to view information and statistics of UTM antivirus.

[Table 85 on page 186](#) describes the fields on the Antivirus page.

Table 85: Fields on the Antivirus Page

Field	Description
<b>UTM Antivirus</b>	
AV Key Expire Date	Displays antivirus licence key expiration date.
Update Server	Displays antivirus pattern update server settings.
Interval	Displays antivirus pattern interval.
Auto Update Status	Displays antivirus pattern auto update status.
Last Result	Displays last result of database loading.
AV Signature Version	Displays database version timestamp virus record number.
Scan Engine Type	Displays the information of the scan engine.
Pattern Type	Displays the pattern type.
Onbox AV Load Flavor Running	On-box AV is enabled.
Onbox AV Load Flavor Configured  <b>NOTE:</b> This option is available for SRX5000 and SRX4000 lines of devices.	On-box Antivirus (AV) is configured either in the heavy or light mode.
Antivirus statistics	Displays the antivirus statistics <ul style="list-style-type: none"> <li>Statistics type               <ul style="list-style-type: none"> <li>Intelligent-prescreening Passed</li> <li>Forwarded to scan engine</li> </ul> </li> <li>The total number of scan request forwarded to the engine.</li> <li>Number of threats found.</li> <li>The number of fall backs.</li> </ul>
Clear Anti-Virus Statistics	Clear all current viewable statistics and begin collecting new statistics.  Click <b>Clear Anti-Virus Statistics</b> .

## RELATED DOCUMENTATION

## Monitor UTM—Web Filtering

You are here: **Monitor** > **Security Services** > **UTM** > **Web Filtering**.

Use this page to view information and statistics of UTM web filtering.

[Table 86 on page 187](#) describes the fields on the Web Filtering page.

Table 86: Fields on the Web Filtering Page

Field	Description
UTM Web Filtering Statistics	
Statistics type	<div>Displays the available information:</div> <ul style="list-style-type: none"><li>• Total Requests</li><li>• Allowlist hit</li><li>• Blocklist hit</li><li>• Queries to server</li><li>• Server reply permit</li><li>• Server reply block</li><li>• Custom category permit</li><li>• Custom category block</li><li>• Site reputation permit</li><li>• Site reputation block</li><li>• Cache hit permit</li><li>• Cache hit block</li><li>• Safe-search redirect</li><li>• Web-filtering sessions total</li><li>• Web-filtering sessions Inuse</li><li>• Fall back</li><li>• Default</li><li>• Timeout</li><li>• Server-Connectivity</li><li>• Too-many-requests</li></ul>
Clear Web Filtering Statistics	Clear all current viewable statistics and begin collecting new statistics.

RELATED DOCUMENTATION

| [Monitor UTM—Antispam](#) | 188

# Monitor UTM—Antispam

You are here: **Monitor** > **Security Services** > **UTM** > **Antispam**.

Use this page to view status and statistics of UTM Antispam.

[Table 87 on page 188](#) describes the fields on the antispam page.

Table 87: Fields on the Antispam Page

Field	Description
UTM Antispam Status	Displays the DNS server setting IP and interface details for the following servers: <ul style="list-style-type: none"><li>• Primary</li><li>• Secondary</li><li>• Ternary</li></ul>
UTM Anti-spam Statistics	Displays the antispam statistics type and counter information: <ul style="list-style-type: none"><li>• Total connections</li><li>• Denied connections</li><li>• Total greetings</li><li>• Denied greetings</li><li>• Total e-mail scanned</li><li>• Spam total</li><li>• Spam tagged</li><li>• Spam dropped</li><li>• DNS errors</li><li>• Timeout errors</li><li>• Return errors</li><li>• Invalid parameter errors</li><li>• Statistics start time</li><li>• Statistics for the last 10 days</li></ul>
Clear Anti-Spam statistics	Clear all current viewable statistics and begin collecting new statistics.  Click <b>Clear Anti-spam statistics</b> .

RELATED DOCUMENTATION

| [Monitor UTM—Content Filtering](#) | 189

## Monitor UTM—Content Filtering

You are here: **Monitor** > **Security Services** > **UTM** > **Content Filtering**.

Use this page to view UTM content filtering statistics.

[Table 88 on page 189](#) describes the fields on the Content Filtering page.

Table 88: Fields on the Content Filtering Page

Field	Description
UTM Content Filtering Statistics	Displays the statistics type, counter passed, and counter blocked details: <ul style="list-style-type: none"><li>• Base on command list</li><li>• Base on mime list</li><li>• Base on extension list</li><li>• ActiveX plugin</li><li>• Java applet</li><li>• EXE files</li><li>• ZIP files</li><li>• HTTP cookie</li></ul>
Clear Content Filtering statistics	Clear all current viewable statistics.  Click <b>Content Filtering statistics</b> .

RELATED DOCUMENTATION

| [Monitor ICAP Redirect](#) | 189

## Monitor ICAP Redirect

You are here: **Monitor** > **Security Services** > **ICAP Redirect**.

Use this page to monitor ICAP Redirect details.



[Table 89 on page 190](#) describes the fields on the ICAP Redirect page.

**Table 89: Fields on the ICAP Redirect Page**

Field	Description
Refresh Interval(sec)	Select the refresh rate.
Refresh	Refresh at any given point, irrespective of the refresh rate set.
Clear Statistics	Clears all the collated data.
Server Status	Displays the status of the ICAP server.
Message Redirected	Displays the number of HTTP requests that have passed through the ICAP channel.
Message Received	Displays the number of HTTP requests that have passed through the ICAP channel. <ul style="list-style-type: none"> <li>• Message REQMOD Redirected—Displays the number of messages that went through the redirect request on HTTP request.</li> <li>• Message RESPMOD Redirected—Displays the number of messages that went through the redirect response on HTTP request.</li> </ul>
Fallback Details	Displays the Timeout, Connectivity, and Default values for Permitted, Rejected, and Log permitted parameters if the ICAP server is unavailable.

## RELATED DOCUMENTATION

[Monitor IPS Attacks](#) | 190

## Monitor IPS Attacks

You are here: **Monitor** > **Security Services** > **IPS** > **Attacks**.

Use this page to view attack table data and top N attack hits.

[Table 90 on page 190](#) describes the fields on the Attacks page.

**Table 90: Fields on the Attacks Page**

Field	Description
Enable Log	Click <b>Enable Log</b> to enable event logs.

Table 90: Fields on the Attacks Page (continued)

Field	Description
Disable Log	Click <b>Disable Log</b> to disable event logs.
Clear Log	Click <b>Clear Log</b> to clear all the logs that is created during the session.
Refresh interval (sec)	Displays the time interval, in seconds, set for page refresh. The default interval is 30 seconds  Select the time interval from the list.
Refresh	Displays the option to refresh the page. If <b>Manual</b> option is set, then manually click the Refresh button to refresh the page.  Click <b>Refresh</b> to refresh the page.
Clear	Provides an option to clear the data of the status type.  Click <b>Clear</b> to clear the details.
Filter By Attack Name	Specifies the string to search.  Enter the string and then click <b>Go</b> to execute the searching operation.
<b>Attack Table</b>	
Clear	Provides an option to disable the searching operation and show all results.  Click <b>Clear</b> to show all results

Table 90: Fields on the Attacks Page (*continued*)

Field	Description
Attack Name	<p>Displays the kind of attacks in the attack table. Double click on Attack Name, Attack Details are displayed.</p> <p>The available options are:</p> <ul style="list-style-type: none"> <li>• <b>Display Name</b>—Displays the name of the attack.</li> <li>• <b>Severity</b>— Displays the severity of the attack.</li> <li>• <b>Category</b>—Displays the category of attack in which the attacks are placed.</li> <li>• <b>Recommended</b>—Displays True or false to determined whether recommended or not.</li> <li>• <b>Recommended Option</b>—Displays a recommended action, when the security device detects an attack.</li> <li>• <b>Type</b>—Displays the type of attack.</li> <li>• <b>Direction</b>—Displays the connection direction of the attack.</li> <li>• <b>False positives</b>—Specifies the name of the false positives filter.</li> <li>• <b>Services</b>—Displays the service name.</li> </ul> <p>Double click Attack Name.</p>
Severity	<p>Displays the severity of the attack. The severity levels are: critical, info, minor, major and warning.</p>
Hits	<p>Displays the count of hits. Double click on hits count, Attack Records are displayed.</p> <p>The available options are:</p> <ul style="list-style-type: none"> <li>• <b>Filter Log</b>—To filter the attack records.  <b>Go</b>—To execute searching operation.</li> <li>• <b>Clear</b>—To clear the attack records.</li> </ul> <p>Double click hits count, and then select an option.</p>
Top N Attack Hits	<p>Displays statistics about hits and shows top 10 hits.</p>
Description	<p>Displays information about attack.</p>

## RELATED DOCUMENTATION

[Monitor IPS Status](#) | 193

## Monitor IPS Status

You are here: **Monitor** > **Security Services** > **IPS** > **Status**.

Use this page to view IDP Status, memory, counters, Policy Rulebase Statistics, and attack table statistics.

[Table 91 on page 193](#) describes the fields on the Status page.

**Table 91: Fields on the Status Page**

Field	Description
<b>IDP Status</b>	
Status of IDP	Displays the status of the current IDP policy.
Up Since	Displays the time from when the IDP policy first began running on the system.
Packets/Second	Displays the number of packets received and returned per second.
Peak	Displays the maximum number of packets – received per second and the time when the maximum was reached.
Kbits/Second	Displays the aggregated throughput (kilobits per second) for the system.
Peak Kbits	Displays the maximum kilobits per second and the time when the maximum was reached.
Latency (Microseconds)	Displays the delay, in microseconds, for a packet to receive and return by a node .
Current Policy	Displays the name of the current installed IDP policy.
<b>IDP Memory Statistics</b>	
PIC Name	Displays the name of the PIC.
Total IDP Data Plane Memory (MB)	Displays the total memory space, in megabytes, allocated for the IDP data plane.
Used (MB)	Displays the used memory space, in megabytes, for the data plane.

Table 91: Fields on the Status Page (*continued*)

Field	Description
Available (MB)	Displays the available memory space, in – megabytes, for the data plane.

## RELATED DOCUMENTATION

| *Monitor 802.1x*

## Monitor Application Firewalls

You are here: **Monitor** > **Security Services** > **Application FW**.

Use this page to view rule set, rules in selected rule set, and counters for selected rule-set.

[Table 92 on page 194](#) describes the fields on the Application FW page.

Table 92: Fields on the Application FW Page

Field	Description
<b>Rule Set</b>	
Name	Displays the rule sets configured for the device.  Select a rule set to display its associated rules and counters in the lower panes.
Default Rule	Displays the action taken when traffic does not match any of the associated rules. <ul style="list-style-type: none"> <li>● permit—Permits all traffic that does not match any rule in the rule set.</li> <li>● deny—Denies all traffic that does not match any rule in the rule set.</li> </ul>
Rules	Displays the rule names associated with the rule set.
Refresh	Click the refresh icon at the top right corner to display the fresh content.
<b>Rules in Selected Rule Set</b>	
Rule Name	Lists the names of the rules included in the rule set.
Match Dynamic Applications	Displays the dynamic applications used as match criteria for the associated rule.

Table 92: Fields on the Application FW Page (*continued*)

Field	Description
Action	<p>Displays the action to be taken if the traffic matches the associated rule's match criteria.</p> <ul style="list-style-type: none"> <li>• permit—Permits traffic that matches the rule.</li> <li>• deny—Denies traffic that matches the rule.</li> </ul>
<b>Counters for Selected Rule-Set</b>	
Refresh interval (sec)	Specifies the interval in seconds when counter values are refreshed.
Counter	Displays the counter for rule in the rule set
Value	Displays the value for rule in the rule set
Clear Statistics	Clears the statistics in the associated pane.

## RELATED DOCUMENTATION

[Monitor Applications](#) | 195

## Monitor Applications

You are here: **Monitor** > **Security Services** > **Applications**.

Use this page to view information about bandwidth consumption, session establishment, and risks associated with your applications.

**NOTE:** To view the data on the Applications page, ensure that:

- Logging is enabled. If not, go to **Configure** > **Device Settings** > **Basic Settings** > **Security Logging** and enable **Logging**.
- Logging is enabled for a matching traffic firewall policy. If not, go to **Configure** > **Device Settings** > **Security Services** > **Security Policy** > **Rules** and enable **Log Options** under Rule Options.
- Application tracking is enabled for a security zone. If not, go to **Configure** > **Security Services** > **Security Policy** > **Objects** > **Zones/Screens** and enable **Application Tracking**.

Table 93 on page 196 describes the fields on the Applications page.

**Table 93: Fields on the Applications Page**

Field	Description
Top Users By Volume	Top users of the application; sorted by bandwidth consumption.
Top Apps By Volume	Top applications, such as Amazon, Facebook, and so on of the network traffic; sorted by bandwidth consumption.
Top Category By Volume	Top category, such as web, infrastructure, and so on of the application; sorted by bandwidth consumption.
Top Characteristics By Volume	Top behavioral characteristics, such as prone to misuse, bandwidth consumer, and so on of the application.
Sessions By Risk	Number of events/sessions received; grouped by risk.
View App Logs	Enables you to view the application logs.
Search	Enables you to search a particular content from the data.
Application Name	Name of the application, such as Amazon, Facebook, and so on.
Risk Level	Risk associated with the application: critical, high, unsafe, moderate, low, and unknown.
Users	Total number of users accessing the application.
Volume	Bandwidth used by the application.
Total Sessions	Total number of application sessions.
Category	Category of the application, such as web, infrastructure, and so on.
Sub-Category	<p>Subcategory of the application. For example, social networking, news, and advertisements.</p> <p><b>NOTE:</b> There can be many sub-categories for a single category. For example, if the Category is Multimedia, it can have sub-categories as Video-streaming and Audio-streaming and so on.</p>

Table 93: Fields on the Applications Page (*continued*)

Field	Description
Characteristics	<p>Characteristics of the application. For example, prone to misuse, bandwidth consumer, capable of tunneling.</p> <p><b>NOTE:</b> There can be many characteristics displayed by a comma separator. For example, characteristics can be displayed as <b>Support File Transfer, Loss of Productivity, Bandwidth</b>.</p>

## RELATED DOCUMENTATION

[Monitor Application Tracking](#) | 197

## Monitor Application Tracking

You are here: **Monitor** > **Security Services** > **Application Tracking**.

Use this page to monitor sessions and bytes of a particular application or group of applications.

[Table 94 on page 197](#) describes the fields on the Application Tracking page.

Table 94: Fields on the Application Tracking Page

Field	Description
Risk	<p>Displays the risk as critical, moderate, low, or unsafe. The risk factor is based on the predefined security standard.</p> <p><b>NOTE:</b> Risk is displayed only for applications.</p>
Name	Displays the name of the application or application group.
# Sessions	Displays the number of active sessions.
Traffic	Displays the application or application group traffic in kilobytes.
Session %	Displays the session percentage of the current application or application groups.
Traffic %	Displays the traffic percentage of the application or application groups.



Table 94: Fields on the Application Tracking Page (*continued*)

Field	Description
<b>Selected Statistics</b>	
Cumulative	Refers to the statistics that are collected from the last clearing time specified to the current time.
Time Interval	<p>Enables you to set an interval of time during which statistics are collected.</p> <p>You can specify the time interval in minutes, hours, or days. The default is 1 minute.</p> <p>For example, if you set 5 minutes as the time interval at 13:00 hours, then statistics are collected from 13:00 to 13:05.</p>
<b>Details</b>	
Time Interval Began	<p>If Cumulative is selected, this field displays the last reset time that was set.</p> <p>If Time Interval is selected, this field displays the last interval that was set.</p>
Elapsed Time	Displays the time elapsed since the last time interval began.
Clear	<p>If Cumulative is selected, the cumulative statistics are cleared.</p> <p>If Time Interval is selected, the statistics collected during the last specified interval are cleared.</p> <p>You are prompted to confirm that you want to clear the statistics.</p>
<b>View</b>	
Switch to Grid	<p>In the grid view, data is displayed in a table.</p> <p>By default, application tracking statistics are displayed in the grid view.</p>

Table 94: Fields on the Application Tracking Page *(continued)*

Field	Description
Switch to Graphical	<p>In the graphical view, data is displayed in a chart. The two types of charts supported are:</p> <ul style="list-style-type: none"> <li>• Bar</li> <li>• Pie</li> </ul> <p># Displayed—Enables you to set the number of applications or application groups to be displayed in the chart. The maximum number allowed is 10, and the default is 3.</p> <p>Display order—Enables you to sort the application and application groups in ascending or descending order. By default, applications are displayed in descending order.</p> <p>Display by—Enables you to filter the display of applications and application groups by the following:</p> <ul style="list-style-type: none"> <li>• # Sessions</li> <li>• Session %</li> <li>• Traffic</li> <li>• Traffic %</li> </ul> <p>Bar chart is the default.</p>
Refresh Display	Click <b>Refresh Display</b> to retrieve the most current data.
Settings	<p>Enables you to set some additional options. You can set the following:</p> <ul style="list-style-type: none"> <li>• Display Refresh Interval—Enables you to set the interval for refreshing. You can specify a refresh time from 1 minute to 24 hours. The default is 1 minute.</li> <li>• Display Columns—Enables you to select the columns you want to display in the output.</li> </ul> <p><b>NOTE:</b> The Display Columns option is available only in the grid view.</p>
<b>Filter By</b>	
Application	<p>Enables you to collect application level statistics.</p> <p>You can filter application or application group statistics by the following:</p> <ul style="list-style-type: none"> <li>• Name (default filter) Filters the application or application groups by the name specified. <b>Contains</b> and <b>Exact Match</b> filters are supported.</li> <li>• # Session</li> <li>• Session %</li> <li>• Traffic</li> <li>• Traffic %</li> </ul>

Table 94: Fields on the Application Tracking Page (*continued*)

Field	Description
Application Group	Enables you to collect application group statistics.
Add to Results	Adds the filtered results to the output.

## RELATED DOCUMENTATION

| [Monitor AppQoS](#) | 200.

## Monitor AppQoS

You are here: **Monitor** > **Security Services** > **Application QoS**.

Use this page to diagnose and verify the connectivity of Application QoS.

**NOTE:** This option is available only for SRX4000 and SRX5000 lines of devices.

[Table 95 on page 200](#) describes the fields on the Application QoS page.

Table 95: Fields on the Application QoS Page

Field	Description
Refresh Interval	Indicates the duration of time after which you want the data on the page to be refreshed.
Refresh	Updates the display with current information. The refresh limit updates the display automatically at the interval specified. To change the refresh rate, select the number of seconds in the Refresh interval (sec) field.
<b>Rate limiters statistics</b>	
Clear statistics	Clears the statistics in the associated pane.
PIC	PIC for which the AppQoS settings of the most recent sessions are displayed.  Select the PIC to display AppQoS rate-limiter information for its recent traffic.

Table 95: Fields on the Application QoS Page (continued)

Field	Description
Rule-set Name	Name of the rule set applied to each session.
Application	Applications associated with the applied rule set.
Client2server rate limiter	Name of the rate limiter applied in the client-to-server direction.
C2s Rate (bps)	Maximum transfer rate specified for the client-to-server rate limiter.
Server2client rate limiter(bps)	Name of the rate limiter applied in the server-to-client direction.
S2C Rate(bps)	Maximum transfer rate specified for the server-to-client rate limiter.
<b>Rules statistics Pane</b>	
Clear statistics	Clears the statistics in the associated pane.
PIC	PIC for which the rule statistics are displayed.  Select the PIC to display the number of times each AppQoS rule set and rule are applied on this PIC.
Rule- set name	Name of the rule set applied to each session.
Rule name	Name of the rule in the rule set.
Hits	Number of occurrences when this rule has been matched and applied.
<b>Counters for Selected Rule-Set</b>	
Clear counter	Resets the counters to 0 in the associated pane.
PIC	PIC number for which the AppQoS counts apply.
Sessions processed	The number of sessions processed on the PIC.
Sessions marked	The number of sessions where the DSCP setting was marked.
Sessions honored	The number of sessions where an existing DSCP setting was honored.
Sessions rate limited	The number of sessions that were rate limited.
Client2server flows rate limited	The number of client-to-server flows that were rate limited.

Table 95: Fields on the Application QoS Page (*continued*)

Field	Description
Server2client flows rate limited	The number of server-to-client flows that were rate limited.

## RELATED DOCUMENTATION

| [Monitor Threat Prevention—Diagnostics](#) | 202

## Monitor Threat Prevention—Diagnostics

You are here: **Monitor** > **Security Services** > **Threat Prevention** > **Diagnostics**.

Use this page to diagnose and verify threat prevention.

[Table 96 on page 202](#) describes the fields on the Diagnostics page.

Table 96: Fields on the Diagnostics Page

Field	Description
<b>Diagnostics</b>	
SKY ATP Diagnostics	Specify to diagnose. Select an option from the list.
Diagnostics Logs	Displays the diagnostic logs for the selected option.
Run Diagnostics	Enables you to see the diagnostics of a certain region.
<b>Check Connectivity</b>	
Check	Click <b>Check</b> to verify the connectivity.
<b>Server Details</b>	
Server hostname	Specify the host name of the server.
Server realm	Specifies the name of a server realm.
Server port	Specify the server port number.

Table 96: Fields on the Diagnostics Page (*continued*)

Field	Description
<b>Connection Plane</b>	
Connection time	Specify the connection time of the server.
Connection Status	Specify the connection status.
<b>Service Plane</b>	
Card Info	Specify the card number.
Connection Active Number	Specify the connection active numbers.
Connection Relay statistics	Specify the connection relay statistics.
<b>Other Details</b>	
Configured Proxy Server	Specify the configured proxy server.
Port Number	Specify the port number of the proxy server.

## RELATED DOCUMENTATION

[Monitor Threat Prevention—Statistics](#) | 203

## Monitor Threat Prevention—Statistics

You are here: **Monitor** > **Security Services** > **Threat Prevention** > **Statistics**.

Use this page to verify the statistics of advanced-anti-malware sessions and security Intelligence sessions.

[Table 97 on page 203](#) describes the fields on the Statistics page.

Table 97: Fields on the Statistics Page

Field	Description
<b>Advanced Anti Malware Session Statistics</b>	

Table 97: Fields on the Statistics Page (*continued*)

Field	Description
<b>Sessions</b>	<p>Below are the options under session:</p> <ul style="list-style-type: none"> <li>• <b>TOTAL</b>—Specify the TOTAL Session.</li> <li>• <b>HTTP</b>—Specify the HTTP Session.</li> <li>• <b>HTTPS</b>—Specify the HTTP Session.</li> <li>• <b>SMTP</b>—Specify the simple mail transfer protocol session.</li> <li>• <b>SMTPS</b>—Specify SMTPS session.</li> </ul>
Clear Statistics	Clear the statistics.
Graph	Shows the anti-malware session statistics.
<b>Security Intelligence Session Statistics</b>	
Profiles	Displays the IP address of the software of the selected DS-Lite configuration.
<b>Sessions</b>	<p>Below are the options under session:</p> <ul style="list-style-type: none"> <li>• <b>TOTAL</b>—Displays the identification number of the Services Processing Unit.</li> <li>• <b>PERMIT</b>—Specify the permitted session.</li> <li>• <b>BLOCK-DROP</b>—Specify the block drop.</li> <li>• <b>BLOCK-CLOSE</b>—Specify the block close.</li> <li>• <b>CLOSE-REDIRECT</b>—Specify the closure of the redirect session.</li> </ul>
Clear Statistics	Clear the statistics.

## RELATED DOCUMENTATION

Monitor Policy Activities | 178

# IPsec VPN

IN THIS CHAPTER

- [Monitor IPsec VPN—Phase I | 205](#)
- [Monitor IPsec VPN—Phase II | 206](#)

## Monitor IPsec VPN—Phase I

You are here: **Monitor** > **IPsec VPN** > **Phase I**.

Use this page to view information related to IKE security associations.

[Table 98 on page 205](#) describes the fields on the Phase I page.

Table 98: Fields on the Phase I Page

Field	Description
IKE Security Associations	
Refresh Interval	Indicates the duration of time after which you want the data on the page to be refreshed.
Refresh	Click the refresh icon at the top right corner to display the fresh content.
Clear IKE SA	Clears all the IKE SA numbers on the display.
SA Index	Index number of an SA.
Remote Address	IP address of the destination peer with which the local peer communicates.
State	State of the IKE security associations: <ul style="list-style-type: none"><li>● DOWN—SA has not been negotiated with the peer.</li><li>● UP—SA has been negotiated with the peer.</li></ul>
Initiator Cookie	Random number, called a cookie, which is sent to the remote node when the IKE negotiation is triggered.



Table 98: Fields on the Phase I Page (*continued*)

Field	Description
Responder Cookie	<p>Random number generated by the remote node and sent back to the initiator as a verification that the packets were received.</p> <p><b>NOTE:</b> A cookie is aimed at protecting the computing resources from attack without spending excessive CPU resources to determine the cookie's authenticity.</p>
Mode	<p>Negotiation method agreed upon by the two IPsec endpoints, or peers, used to exchange information. Each exchange type determines the number of messages and the payload types that are contained in each message. The modes, or exchange types, are:</p> <ul style="list-style-type: none"> <li>• Main—The exchange is done with six messages. This mode, or exchange type, encrypts the payload, protecting the identity of the neighbor. The authentication method used is displayed: preshared keys or certificate.</li> <li>• Aggressive—The exchange is done with three messages. This mode, or exchange type, does not encrypt the payload, leaving the identity of the neighbor unprotected.</li> </ul>

## RELATED DOCUMENTATION

[Monitor IPsec VPN—Phase II](#) | 206

## Monitor IPsec VPN—Phase II

You are here: **Monitor** > **IPsec VPN** > **Phase II**.

Use this page to view IPsec statistics and information related to IPsec security associations.

[Table 99 on page 206](#) describes the fields on the Phase II page.

Table 99: Fields on the Phase II Page

Field	Description
<b>Statistics</b>	
Refresh Interval	Indicates the duration of time after which you want the data on the page to be refreshed.
Refresh	Click the refresh icon at the top right corner to display the fresh content.

Table 99: Fields on the Phase II Page (*continued*)

Field	Description
Clear All	Clears all the data on the display page.
By bytes	Provides total number of bytes encrypted and decrypted by the local system across the IPsec tunnel.
By packets	Provides total number of packets encrypted and decrypted by the local system across the IPsec tunnel.
<b>IPsec Statistics</b>	Provides details of the IPsec statistics.
Counter	Displays the number of chassis cluster node.
Value	Displays the values for the respective chassis cluster nodes.
Input/Output bytes/Packets	Displays the chart for phase II statistics input or output bytes.
<b>IPsec SA</b>	
<b>IPsec Security Associations</b>	
ID	Index number of the SA.
Gateway/Port	IP address of the remote gateway/port.
Algorithm	<p>Cryptography scheme used to secure exchanges between peers during the IKE Phase II negotiations:</p> <ul style="list-style-type: none"> <li>• An authentication algorithm used to authenticate exchanges between the peers. Options are hmac-md5-95 or hmac-sha1-96.</li> </ul>
SPI	Security parameter index (SPI) identifier. An SA is uniquely identified by an SPI. Each entry includes the name of the VPN, the remote gateway address, the SPIs for each direction, the encryption and authentication algorithms, and keys. The peer gateways each have two SAs, one resulting from each of the two phases of negotiation: Phase I and Phase II.
Life	The lifetime of the SA, after which it expires, expressed either in seconds or kilobytes.
Monitoring	Specifies if VPN-Liveliness Monitoring has been enabled/disabled. Enabled - 'U', Disabled- '-'
Vsys	Specifies the root system.

## RELATED DOCUMENTATION

Monitor IPsec VPN—Phase I | 205

# Flow Session

IN THIS CHAPTER

- [Monitor Flow Session](#) | 209

## Monitor Flow Session

You are here: **Monitor** > **Flow Session**.

Use this page to view flow session information of the respective session.

[Table 100 on page 209](#) describes the fields on the Flow Session page.

Table 100: Fields on the Flow Session Page

Field	Description
Flow Session Search	Provides the option to search sessions.
Application	Displays the application name for the session summary.
Protocol	Provides the option to enter protocol details.
Source IP/Prefix	Enter the IP address of the authentication source.
Dest IP/Prefix	Enter the IP address of the authentication destination.
Search	Enables you to search for the flow session after all details are entered.
Reset	Enables you to go back to the default configuration.

Table 100: Fields on the Flow Session Page (*continued*)

Field	Description
Advanced	<p>Provides you advanced options to search for Flow sessions.</p> <p>Enter the below details:</p> <ul style="list-style-type: none"> <li>• <b>Application</b>—Displays the application name for the session summary.</li> <li>• <b>Source IP/ Prefix</b>—Enter the IP address of the authentication source.</li> <li>• <b>Source Port</b>—Enter the specified source port.</li> <li>• <b>Protocol</b>—Provides the options to enter protocol details.</li> <li>• <b>AppFW Rule Set</b>—Displays the number of application firewall rule set configurations .</li> <li>• <b>Application Group</b>—Enables you to collect application group statistics.</li> <li>• <b>Interface</b>—Select an interface from the list.</li> <li>• <b>Dest IP/ Prefix</b>—Enter the IP address of the authentication destination.</li> <li>• <b>Dest Port</b>—Enter the specified destination port</li> <li>• <b>Family</b>—Select an option from the list.</li> <li>• <b>Application Firewall</b>—check the box to permit, reject, or deny traffic based on the application of the traffic.</li> <li>• <b>Application QoS</b> - displays traffic based on application type and limits the amount of bandwidth an application can consume.</li> </ul> <p><b>NOTE:</b> This option is available only with SRX4000 and SRX5000 line of devices.</p>
Flow Session Summary	Provides a summary of the all the options selected in the Flow Gate.
Clear	<p>Provides the option to clear the session details statistics.</p> <p>Click <b>Clear</b> to clear the details session statistics.</p>
<b>Flow Session Information</b>	
Session ID	Displays the number that identifies the session. Use this ID to get more information about the session.
Policy	Displays the policy that permitted the traffic.
TimeOut	Displays the idle timeout after which the session expires.
Status	Displays the status of the session.
Source IP/Port	Enter the IP address of the authentication source.

Table 100: Fields on the Flow Session Page (continued)

Field	Description
Protocol	Provides the option to enter protocol details.  Enter the protocol details.
InComing IF	Displays the incoming flow (source and destination IP addresses, application protocol, and interface).
Outgoing IF	Displays the reverse flow (source and destination IP addresses, application protocol, and interface).
AppSecure Detail	Displays list of all enabled and disabled application signatures and existing application rule sets on the device.
Refresh	Click the refresh icon at the top right corner to display the fresh content.

RELATED DOCUMENTATION

| [Monitor Flow Gate](#) | 212.

# Flow Gate

IN THIS CHAPTER

- [Monitor Flow Gate](#) | 212

## Monitor Flow Gate

You are here: **Monitor** > **Flow Gate**.

Use this page to view information about gates in the security firewall.

[Table 101 on page 212](#) describes the fields on the Flow Gate page.

Table 101: Fields on the Flow Gate Page

Field	Description
Flow Gate Search	
Source Prefix	Enter the source prefix which you have already defined, to be included in the match condition.
Source Port	Enter the source port type to be included in, or excluded from, the match condition.
Destination Prefix	Enter the destination prefix which you have already defined, to be included in the match condition.
Destination Port	Enter the port types to be included in, or excluded from, the match condition.
Protocol	Provides the option to enter protocol details.
Flow Gate Summary	Provides a summary of the all the options selected in the Flow Gate.
Flow Gate Information	
Hole	Range of flows permitted by the pinhole.

Table 101: Fields on the Flow Gate Page (*continued*)

Field	Description
Translated	Tuples used to create the session if it matches the pinhole: <ul style="list-style-type: none"> <li>• Source address and port</li> <li>• Destination address and port</li> </ul>
Protocol	Application protocol, such as UDP or TCP.
Application	Name of the application.
Age	Idle timeout for the pinhole.
Flags	Internal debug flags for pinhole.
Zone	Incoming zone.
Reference count	Number of resource manager references to the pinhole.
Resource	Resource manager information about the pinhole.

## RELATED DOCUMENTATION

[Monitor VLAN](#) | [214](#)



# VLAN

IN THIS CHAPTER

- [Monitor VLAN | 214](#)

## Monitor VLAN

You are here: **Monitor** > **VLAN**.

Use this page to view information VLAN.

[Table 102 on page 214](#) describes the fields on the VLAN page.

Table 102: Fields on the VLAN Page

Field	Description
VLAN	
Routing Instance	Displays the routing instance name.
VLAN Name	Displays the name of the VLAN.
VLAN ID	Displays the VLAN ID number.
MAC Table	
Select a VLAN	Displays the configured VLANs. Select a VLAN from the list.
MAC Address	Displays the MAC address associated with the VLAN.
MAC Flags	Displays the flags associated with the MAC address.
Logical Interface	Displays the name of a logical interface associated with the VLAN.

RELATED DOCUMENTATION

| [Monitor Threats Map \(Live\)](#) | 216

# Threats Map (Live)

## IN THIS CHAPTER

- [Monitor Threats Map \(Live\)](#) | 216

## Monitor Threats Map (Live)

You are here: **Monitor** > **Threats Map (Live)**.

**NOTE:** Threats Map (Live) page is available on all the SRX Series devices except the SRX5000 line of devices.

Use this page to visualize incoming and outgoing threats between geographic regions. You can view blocked and allowed threat events based on feeds from intrusion prevention systems (IPS), antivirus, antispam engines, Juniper Sky ATP, and screen options. You can also click a specific geographical location to view the event count and the top five inbound and outbound IP addresses.

**NOTE:** To view the data on the Threats Map (Live) page, ensure that:

- Security logging is enabled. If not, go to **Configure** > **Device Settings** > **Basic Settings** > **Security Logging** and enable **Logging**.
- Required firewall policy is configured on the device.
- Required licenses are configured for IPS and antivirus.
- Your device is enrolled to the Juniper Sky ATP server.

The threat data is displayed starting from 12:00 AM (midnight) up to the current time (in your time zone) on that day and is updated every 30 seconds. The current date and time is displayed at the top right and a legend is displayed at the bottom left of the page.

If a threat occurs when you are viewing the page, an animation shows the country from which the threat originated (source) and the country in which the threat occurred (destination).

**NOTE:** Threats with unknown geographical IP addresses and private IP addresses are displayed as UNKNOWN\_COUNTRY.

## Field Descriptions

Table 103 on page 217 displays the fields of the Threats Map (Live) page.

**Table 103: Fields on the Threats Map (Live) Page**

Field	Description
Total Threats Blocked & Allowed	Displays the total number of threats blocked and allowed. Click the hyperlinked number to go to the All Events ( <b>Monitor</b> > <b>Events</b> > <b>All Events</b> ) page (filtered view of the Grid View tab), where you can view more information about the IPS, virus, spam, Juniper Sky ATP, and screen events.
Threats Blocked & Allowed	<p>Displays the total number of threats blocked and allowed by the following categories:</p> <ul style="list-style-type: none"> <li>• IPS Threats</li> <li>• Virus</li> <li>• Spam</li> <li>• Screen</li> <li>• Juniper Sky ATP</li> </ul> <p>Click the hyperlinked number for a category to go to the page for that category, where you can view more information about that category. For example, clicking the hyperlinked number for IPS threats takes you to the IPS (<b>Monitor</b> &gt; <b>Events</b> &gt; <b>IPS</b>) page (filtered view of the Grid View tab).</p>
Top Destination Countries	Displays the top five destination countries and the number of threats per country. Click the hyperlink for a country to go to the All Events ( <b>Monitor</b> > <b>Events</b> > <b>All Events</b> ) page (filtered view of the Grid View tab), where you can view more information about the IPS, virus, spam, Juniper Sky ATP, and screen events for that country.
Top Source Countries	Displays the top five source countries and the number of threats per country. Click the hyperlink for a country to go to the All Events ( <b>Monitor</b> > <b>Events</b> > <b>All Events</b> ) page (filtered view of the Grid View tab), where you can view more information about the IPS, virus, spam, Juniper Sky ATP, and screen events for that country.

## Threat Types

The Threats Map (Live) page displays blocked and allowed threat events based on feeds from IPS, antivirus, antispam engines, Juniper Sky ATP, and screen options. [Table 104 on page 218](#) describes different types of threats blocked and allowed.

**Table 104: Types of Threats**

Attack	Description
IPS threat events	<p>Intrusion detection and prevention (IDP) attacks detected by the IDP module.</p> <p>The information reported about the attack (displayed on the IPS (<b>Monitor &gt; Events &gt; IPS</b>) page) includes information about:</p> <ul style="list-style-type: none"> <li>• Specific events names</li> <li>• Specific event names with either source or destination country</li> </ul>
Virus	<p>Virus attacks detected by the antivirus engine.</p> <p>The information reported about the attack (displayed on the Antivirus (<b>Monitor &gt; Events &gt; Antivirus</b>) page) includes information about:</p> <ul style="list-style-type: none"> <li>• Specific events names</li> <li>• Specific event names with either source or destination country</li> </ul>
Spam	<p>E-mail spam that is detected based on the blocklist spam e-mails.</p> <p>The information reported about the attack (displayed on the Antispam (<b>Monitor &gt; Events &gt; Antispam</b>) page) includes information about:</p> <ul style="list-style-type: none"> <li>• Specific events names</li> <li>• Specific event names with source country</li> </ul>
Juniper Sky ATP	<p>Events that are detected based on Juniper Sky ATP policies.</p> <p>The information reported about the attack (displayed on the Screen (<b>Monitor &gt; Events &gt; ATP</b>) page) includes information about:</p> <ul style="list-style-type: none"> <li>• Specific events names</li> <li>• Specific event names with either source or destination country</li> </ul>
Screen	<p>Events that are detected based on screen options.</p> <p>The information reported about the attack (displayed on the Screen (<b>Monitor &gt; Events &gt; Screen</b>) page) includes information about:</p> <ul style="list-style-type: none"> <li>• Specific events names</li> <li>• Specific event names with either source or destination country</li> </ul>

Tasks You Can Perform

You can perform the following tasks from this page:

- Toggle between updating the data and allowing live updates—Click the **Pause** icon to stop the page from updating the threat map data and to stop animations. Click the **Play** icon to update the page data and resume animations.
- Zoom in and out of the page—Click the zoom in (+) and zoom out (–) icons to zoom in and out of the page.
- Pan the page—Click and drag the mouse to pan the page.
- View country-specific details:
  - Click a country on the threat map to view threat information specific to that country. A *Country-Name* pop-up appears displaying country-specific information.
  - Click **View Details** in the *Country-Name* pop-up to view additional details. The *Country-Name (Details)* panel appears.

[Table 105 on page 219](#) provides more details on the country-specific threat information.

Table 105: Country-Specific Threat Information

Field	Description
Displayed in Country-Name pop-up	
<i>Number of threat events</i> Threat Events since 12:00 am	Displays the total number of threat events (inbound and outbound) since midnight for that country.  Click the hyperlinked number to go to the All Events ( <b>Monitor &gt; Events &gt; All Events</b> ) page, where you can view more information about the events.
Inbound ( <i>Number of threat events</i> )	Displays the total number of inbound threats for the country and the IP address and the number of events for that IP address for the top five inbound events.  Click <b>View All</b> to view all the destination IP address with threat events count.
Outbound ( <i>Number of threat events</i> )	Displays the total number of outbound threats for the country and the IP address and the number of events for that IP address for the top five outbound events.  Click <b>View All</b> to view all the source IP address with threat events count.
View Details—Displayed in Country-Name (Details) panel	

Table 105: Country-Specific Threat Information (*continued*)

Field	Description
<i>Number of threat events</i> Threat Events since 12:00 am	<p>Displays the total number of threat events (inbound and outbound) since midnight for that country.</p> <p>Click the hyperlinked number to go to the All Events (<b>Monitor &gt; Events &gt; All Events</b>) page, where you can view more information about the events.</p>
Number of Inbound Events	<p>Displays the total number of inbound threats for the country and the number of inbound threat events for each of the following categories:</p> <ul style="list-style-type: none"> <li>• IPS Threats</li> <li>• Virus</li> <li>• Spam</li> <li>• Screen</li> <li>• Juniper Sky ATP</li> </ul> <p>Click the hyperlinked number for a category to go to the page for that category, where you can view more information about that category. For example, clicking the hyperlinked number for IPS threats takes you to the IPS (<b>Monitor &gt; Events &gt; IPS</b>) page.</p> <p>Click <b>Top 5 IP Addresses (Inbound)</b> to view the IP address and the number of events for that IP address for the top five inbound events.</p> <p>Click <b>View All IP Addresses</b> to view all the destination IP addresses and number of events for that IP address.</p> <p><b>NOTE:</b> You can view or select <b>View All IP Addresses</b> only after you click <b>Top 5 IP Addresses (Inbound)</b>.</p>

Table 105: Country-Specific Threat Information (*continued*)

Field	Description
Number of Outbound Events	<p>Displays the total number of outbound threats for the country and the number of outbound threat events for each of the following categories:</p> <ul style="list-style-type: none"> <li>• IPS Threats</li> <li>• Virus</li> <li>• Spam</li> <li>• Screen</li> <li>• Juniper Sky ATP</li> </ul> <p>Click the hyperlinked number for a category to go to the page for that category, where you can view more information about that category. For example, clicking the hyperlinked number for screens takes you to the Screen (<b>Monitor &gt; Events &gt; Screen</b>) page.</p> <p>Click <b>Top 5 IP Addresses (Outbound)</b> to view the IP address and the number of events for that IP address for the top five outbound events.</p> <p>Click <b>View All IP Addresses</b> to view all the source IP addresses and number of events for that IP address.</p> <p><b>NOTE:</b> You can view or select <b>View All IP Addresses</b> only after you click <b>Top 5 IP Addresses (Outbound)</b>.</p>

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# 4

PART

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# Device Settings

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## Configure Basic Settings

You are here: **Configure** > **Device Settings** > **Basic Settings**.

Use this page to configure your device basic settings.

You can do the following:

- **Save**—Saves all the basic settings configuration and returns to the main configuration page.

**NOTE:** For all the configuration options under Basic Settings:

- Tool tip on the right-side represents different icons for notifications, validation errors, and successful configuration.
- When you make a configuration change and navigate to a different page without saving it, a pop-up message is displayed to save the configuration.

- **Cancel**—Cancels all your entries and returns to the main configuration page.
- **Commit**—Commits all the basic settings configuration and returns to the main configuration page.

[Table 106 on page 227](#) describes the fields on the Basic Settings page.

Table 106: Fields on the Basic Settings Page

Field	Action
<b>System Identity Details</b>	
Host Name	Enter a hostname for the device.
Domain Name	Enter a domain name to specify the network or subnetwork to which the device belongs.
Root Password	<p>Enter a password for the root user.</p> <p><b>NOTE:</b> After you have defined a root password, that password is required when you log in to the J-Web or the CLI.</p>
Confirm Password	Re-enter the password to confirm.
DNS Servers	<p>Select an option to specify the DNS server settings:</p> <ul style="list-style-type: none"> <li>• To specify a server that the device can use to resolve hostnames into addresses: <ol style="list-style-type: none"> <li>1. Click + at the top right side of the DNS Servers table.</li> <li>2. Enter an IPv4 address of the server.</li> <li>3. Click the tick mark to save the changes. Else, click the cancel (X) icon to discard the changes.</li> </ol> </li> <li>• To edit an existing DNS server hostname: <ol style="list-style-type: none"> <li>1. Select a DNS server hostname that you want to edit.</li> <li>2. Click the pencil icon at the top right side of the DNS Servers table or right-click on the hostname and edit the IPv4 address.</li> <li>3. Click the tick mark to save the changes. Else, click the cancel (X) icon to discard the changes.</li> </ol> </li> <li>• To remove an existing DNS server hostname, select it and click the delete icon at the top right side of the DNS Servers table or right-click on the hostname and delete it.</li> </ul>

Table 106: Fields on the Basic Settings Page *(continued)*

Field	Action
Domain Search	<p>Select an option:</p> <ul style="list-style-type: none"> <li>To add a domain name: <ol style="list-style-type: none"> <li>Click + at the top right side of the Domain Search table.</li> <li>Enter a domain name. The string must contain an alphanumeric character and can include underscores, hyphen, slash and dot. No spaces allowed.</li> <li>Click the tick mark to save the changes. Else, click the cancel (X) icon to discard the changes.</li> </ol> </li> <li>To edit an existing domain name: <ol style="list-style-type: none"> <li>Select a domain name that you want to edit.</li> <li>Click the pencil icon at the top right side of the Domain Search table or right-click on the domain name and edit the name.</li> <li>Click the tick mark to save the changes. Else, click the cancel (X) icon to discard the changes.</li> </ol> </li> <li>To remove an existing domain name, select it and click the delete icon at the top right side of the Domain Search table or right-click on the name and delete it.</li> </ul>
<b>Date and Time Details</b>	
Time Zone	Select the time zone from the list in which the router resides.
Current date/time	Displays the current date and time.

Table 106: Fields on the Basic Settings Page (continued)

Field	Action
Time Source	<p>Select an option from the list to set the system time:</p> <hr/> <p><b>Sync with NTP Server</b>—Synchronizes the system time with the NTP server that you select. Click one of the following options:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—Click + to add an NTP server. Then, enter the NTP server name, key, and Routing Instance. Select an option from the list for Version and Prefer.</li> <li>• <b>Edit</b>—Select an existing NTP server that you want to edit and click the pencil icon available at the upper right of the NTP Server table. You can also right-click on the NTP server and click Edit Row. Then, edit the key and version and click the tick mark.</li> <li>• <b>Delete</b>—Select an existing NTP server that you want to delete and click the delete icon available at the upper right of the NTP Server table. You can also right-click on the NTP server and click Delete Row. Click Yes to delete the selected server.</li> </ul> <hr/> <p><b>Sync with Computer Time</b>—Uses the computer that you are currently logged into to determine the system time for the device.</p> <p><b>NOTE:</b> When you select this option, the PC time that will be used is displayed in the <b>Current Date &amp; Time</b> field.</p> <hr/> <p><b>Manual Configure Time</b>—Enables you to manually select the date and time for the device.</p> <p>Set the date and time using the calendar pick tool and time fields.</p> <p><b>NOTE:</b> After you configure the time manually, the session will expire. Log in to J-Web.</p>
<b>Management Access Configuration</b>	
Loopback Address	<p>Enter IP address and subnet for the loopback address.</p> <p><b>NOTE:</b> If the SRX device does not have a dedicated management port (fxp0), then Loopback Address and Subnet are the only options available for the management access configuration.</p>



Table 106: Fields on the Basic Settings Page (continued)

Field	Action
Subnet	<p>Enter the address, for example, 255.255.255.0. You can also specify the address prefix.</p> <p>Specifies the range of logical addresses within the address space that is assigned to an organization.</p>
IPv4	<p>Select this option to enable IPv4.</p> <p><b>NOTE:</b> IPv4 configuration is supported only on the SRX devices with fxp0 port.</p>
Management Access Port	Enter an IPv4 address for the device.
Subnet	<p>Enter the address, for example, 255.255.255.0. You can also specify the address prefix.</p> <p>Specifies the range of logical addresses within the address space that is assigned to an organization.</p>
Default Gateway	Enter the default gateway address for IPv4.
<b>Services</b>	
Telnet	Select this option to enable telnet.
SSH	Select this option to enable SSH connections.
FTP	Select this option to enable FTP for secure file transfer.
Netconf	Select this option to enable NETCONF connections.
RFC Complaint	<p>Select this option to enable RFC complaint.</p> <p>Provides NETCONF sessions complaint with RFC 4741.</p>
Netconf -> SSH	Select this option to enable NETCONF connections over SSH connections.
Trace Options	Select this option to enable NETCONF trace options.
On Demand	Select this option to enable on-demand tracing.
No Remote Trace	Select this option to enable no remote tracing.

Table 106: Fields on the Basic Settings Page (*continued*)

Field	Action
Junoscript Over Clear Text	Select this option to enable Junoscript connections over clear text.
Junoscript Over SSL	Select this option to enable Junoscript connections over SSL.
Junoscript Certificate	Select the local certificate for SSL from the list.
HTTP	Select this option to enable HTTP connection settings.
Interface	Select the interface in order of your preference and click on the left arrow/right arrow to add.
HTTPS	Select this option to enable HTTPS connection settings.
Interface	Select the interface in order of your preference and click on the left arrow/right arrow to add.
HTTPS Certificate	<p>Specifies the certificate that you want to use to secure the connection from the HTTPS certificates list when you enable HTTPS.</p> <p>Select the HTTPS certificate from the list.</p>
PKI Certificate	<p>Select the PKI certificate for HTTPS from the list.</p> <p><b>NOTE:</b> This option is available only if you select pki-local-certificate in the HTTPS Certificate options.</p>
Local Certificate	<p>Select the local certificate for HTTPS from the list.</p> <p><b>NOTE:</b> This option is available only if you select local-certificate in the HTTPS Certificate options.</p>
HTTPS Port	Select the TCP port by clicking top or bottom arrows for incoming HTTPS connections.
<b>WEB API</b>	
Web API	Select to enable Web API configuration.
Client	Select to enable client for the Web API.

Table 106: Fields on the Basic Settings Page *(continued)*

Field	Action
Host Name	<p>Provides the address of permitted HTTP/HTTPS request originators.</p> <p>To add, click + and enter the IPv4 address of the permitted HTTP/HTTPS request originator and click tick mark to save the changes.</p> <p>To delete, select the hostname and click the delete icon. Then, click <b>Yes</b> to delete it.</p>
HTTP	Select to enable unencrypted HTTP connection settings.
HTTP Port	Click top or bottom arrows to select the TCP ports for incoming HTTP connections.
HTTPS	Select to enable encrypted HTTPS connection settings.
HTTPS Port	Click top or bottom arrows to select the TCP ports for incoming HTTP connections.

Table 106: Fields on the Basic Settings Page (*continued*)

Field	Action
Certificate Type	Select to specify the certificate that you want to use to secure the connection from the HTTPS certificates list when you enable HTTPs for Web API:
	Default—Selects the default system generated certificate.
	PKI Certificate—Select a PKI certificate from the list for HTTPS of Web API.
	<p>File Path</p> <p>The options available are as follows:</p> <ul style="list-style-type: none"> <li>• <b>File Path:</b> <ul style="list-style-type: none"> <li>• <b>Browse</b>—Click and select a certificate from your desired location.</li> <li>• <b>Upload</b>—Click and upload the selected certificate.</li> </ul> </li> <li>• <b>Certificate</b>—Displays the file path of the uploaded certificate.</li> <li>• <b>Certificate Key:</b> <ul style="list-style-type: none"> <li>• <b>Browse</b>—Click and select the certificate key from your desired location.</li> <li>• <b>Upload</b>—Click and upload the selected certificate key.</li> </ul> </li> <li>• <b>Certificate Key</b>—Displays the file path of the uploaded certificate key.</li> </ul>
User	Select this option to enable user credentials.
Name	Enter a username.
Password	Enter the user password.
<b>REST API</b>	
REST API	Enable this option to allow RPC execution over HTTP(S) connection.
Explorer	Select this option to enable REST API explorer.
Control	Select this option to enable control the REST API process.

Table 106: Fields on the Basic Settings Page (continued)

Field	Action
Allowed Sources	<p>Provides the source IP address.</p> <p>Click + and enter the IPv4 address of the source. Then, click tick mark.</p> <p>To delete, select an existing address and click the delete icon. Then, click <b>Yes</b> to delete it.</p>
Connection Limit	Click top or bottom arrows to select the number of simultaneous connections.
HTTP	Select to enable unencrypted HTTP connections for REST API.
Address	<p>Click + and enter the IPv4 address for the incoming connections for HTTP of REST API. Then, click tick mark to add it.</p> <p>To delete, select an existing address and click the delete icon. Then, click <b>Yes</b> to delete it.</p>
Port	<p>Click top or bottom arrows to select the HTTP port to accept HTTP connections for REST API.</p> <p><b>NOTE:</b> The default port for HTTP of REST API is 3000.</p>
HTTPS	Select to enable encrypted HTTPS connections for REST API.
Address	<p>Click + and enter the IPv4 address for the incoming connections for HTTPS of REST API. Then, click tick mark to add it.</p> <p>To delete, select an existing address and click the delete icon. Then, click <b>Yes</b> to delete it.</p>
Cipher List	Select the Cipher suites in order of your preference and click on the left arrow or right arrow to add.
Port	<p>Click top or bottom arrows to select the HTTPS port to accept the HTTPS connection of REST API.</p> <p><b>NOTE:</b> The default port for HTTPS of REST API is 3443.</p>

Table 106: Fields on the Basic Settings Page (continued)

Field	Action
Certificate Authority Profile	<p>Select the certificate authority profile for HTTPS of REST API from the list.</p> <p>To create Certificate Authority inline:</p> <ul style="list-style-type: none"> <li>• Click <b>Create Certificate Authority Profile</b>.</li> <li>• Enter the following details: <ul style="list-style-type: none"> <li>• <b>CA Profile *</b>—Enter the CA profile name.</li> <li>• <b>CA Identifier *</b>—Enter the CA identifier.</li> <li>• <b>File Path on Device for Certificate:</b> <ul style="list-style-type: none"> <li>• <b>Browse</b>—Click and select the certificate from your desired location.</li> <li>• <b>Upload</b>—Click and upload the selected certificate.</li> </ul> </li> <li>• <b>File Path on Device for Certificate</b>—Displays the file path of the selected certificate.</li> </ul> </li> <li>• Click <b>OK</b>.</li> </ul>
<b>Certificate</b>	
Certificate	<p>Specifies the certificate name to secure HTTPS connections.</p> <p>Select an option:</p> <ul style="list-style-type: none"> <li>• To add a new certificate, click <b>+</b>. Then, enter the certificate name and certificate content and then click <b>OK</b>.</li> <li>• To edit an existing certificate, select it and click the pencil icon or right-click on it and click <b>Edit Row</b>. Then, edit the certificate content and click <b>OK</b>.</li> <li>• To delete an existing certificate, select it and click the delete icon or right-click on it and click <b>Delete Row</b>.</li> </ul>
<b>Security Logging</b>	
Logging	<p>Select this option to enable logging.</p> <p><b>NOTE:</b> Starting in Junos OS Release 19.1R1, the <b>Enable Traffic Logs</b> option is available for user logical system and tenants.</p>

Table 106: Fields on the Basic Settings Page (continued)

Field	Action
UTC Timestamp	Select this option to enable UTC Timestamp for security log timestamps.
Log On	<p>Select one of the log on types for logging.</p> <ul style="list-style-type: none"> <li>• <b>Source Address</b>—Select this option and then enter the source IP address in IP Address field.</li> <li>• <b>Source Interface</b>—Select this option and then select an interface from the list.</li> </ul>
Format	<p>Specifies the format in which the logs are stored.</p> <p>Select a format in which the logs are stored from the list.</p> <ul style="list-style-type: none"> <li>• <b>binary</b>—Binary encoded text to conserve resources.</li> <li>• <b>SD-Syslog</b>—Structured system log file.</li> <li>• <b>Syslog</b>—Traditional system log file.</li> </ul> <p>By default, None logging format is selected.</p>
Transport Protocol	<p>Specifies the type of transport protocol to be used to log the data.</p> <p>Select the logging transport protocol. By default, <b>None</b> is selected.</p> <p>Options available are:</p> <ul style="list-style-type: none"> <li>• <b>TCP</b>—Select this option to set the transport protocol to TCP. Then, select the TCP connections for logging using up and down arrows.</li> <li>• <b>UDP</b>—Select this option to set the transport protocol to UDP.</li> <li>• <b>TLS</b>—Select this option to set the transport protocol to TLS.</li> <li>• <b>Connections</b>—Select the TLS connections for logging using up and down arrows.</li> <li>• <b>TLS Profile</b>—Select an option from the list.</li> </ul>

Table 106: Fields on the Basic Settings Page (continued)

Field	Action
Syslog Server	<p>Enables you to configure syslog servers. You can configure a maximum of three syslog servers.</p> <p>Select an option:</p> <ul style="list-style-type: none"> <li>• To create syslog server, click +, enter the following details and then click <b>OK</b>. <ul style="list-style-type: none"> <li>• <b>Name</b>—Enter the name of the new stream configuration.</li> <li>• <b>Save At</b>—Select the location from the list to save the stream.</li> <li>• <b>Type</b>—Select a format in which the logs are stored from the list. The log types are: <ul style="list-style-type: none"> <li>• Structure</li> <li>• Standard</li> <li>• Web</li> </ul> </li> <li>• <b>Host</b>—Enter the IP address for the stream host name.</li> </ul> </li> <li>• To edit an existing syslog server, select it and click the pencil icon. Then, edit the saving mode, streaming type, and host in the Edit Syslog page and click <b>OK</b>.</li> <li>• To delete an existing syslog server, select it and click the delete icon.</li> </ul>
<b>SNMP</b>	
Contact Information	Enter any contact information for the administrator of the system (such as name and phone number).
System Description	Enter any information that describes the system.
Local Engine ID	<p>Enter the MAC address of Ethernet management port 0.</p> <p>Specifies the administratively unique identifier of an SNMPv3 engine for system identification. The local engine ID contains a prefix and a suffix. The prefix is formatted according to specifications defined in RFC 3411. The suffix is defined by the local engine ID. Generally, the local engine ID suffix is the MAC address of Ethernet management port 0.</p>



Table 106: Fields on the Basic Settings Page *(continued)*

Field	Action
System Location	Enter any location information for the system (lab name or rack name, for example).
System Name Override	Specifies the option to override the system hostname.  Enter the name of the system.
Community	Specifies the name and authorization for the SNMP community.  <ul style="list-style-type: none"> <li>• Click +.</li> <li>• Enter the name of the community being added.</li> <li>• Select the desired authorization (either read-only or read-write) from the list.</li> </ul> Click tick mark.
<b>Trap Groups</b>	
Name	Click + to add a trap group.  Enter the SNMP trap group being configured.
Categories	Select trap categories to add to the trap group being configured. The options available are: <ul style="list-style-type: none"> <li>• Authentication</li> <li>• Chassis</li> <li>• Configuration</li> <li>• Link</li> <li>• Remote operations</li> <li>• RMON alarm</li> <li>• Routing</li> <li>• Startup</li> <li>• CRRP events</li> </ul>
Targets	Specifies one or more IP addresses that specify the systems to receive SNMP traps that are generated by the trap group being configured.  Click +, enter the target IP address for SNMP trap group, and click tick mark.

Table 106: Fields on the Basic Settings Page (continued)

Field	Action
Health Monitoring	<p>Enable the option to check the SNMP health monitor on the device. The health monitor periodically checks the following key indicators of device health:</p> <ul style="list-style-type: none"> <li>• Percentage of file storage used</li> <li>• Percentage of Routing Engine CPU used</li> <li>• Percentage of Routing Engine memory used</li> <li>• Percentage of memory used for each system process</li> <li>• Percentage of CPU used by the forwarding process</li> <li>• Percentage of memory used for temporary storage by the forwarding process</li> </ul>
Interval	<p>Specifies the sampling frequency interval, in seconds, over which the key health indicators are sampled and compared with the rising and falling thresholds. For example, if you configure the interval as 100 seconds, the values are checked every 100 seconds.</p> <p>Select a value from 1 through 24855. The default value is 300 seconds.</p>
Rising Threshold	<p>Specifies the value at which you want SNMP to generate an event (trap and system log message) when the value of a sampled indicator is increasing. For example, if the rising threshold is 90, SNMP generates an event when the value of any key indicator reaches or exceeds 90 seconds.</p> <p>Select a value from 1 through 100. The default value is 90 seconds.</p>
Falling Threshold	<p>Specifies a value at which you want SNMP to generate an event (trap and system log message) when the value of a sampled indicator is decreasing. For example, if the falling threshold is 80, SNMP generates an event when the value of any key indicator falls back to 80 seconds or less.</p> <p>Select a value 0 through 100. The default value is 80 seconds.</p>

## Release History Table

Release	Description
<a href="#">19.1R1</a>	Starting in Junos OS Release 19.1R1, the <b>Enable Traffic Logs</b> option is available for user logical system and tenants.

## RELATED DOCUMENTATION

| [Configure Chassis Cluster](#) | 240

## Configure Chassis Cluster

You are here: **Configure** > **Device Settings** > **Cluster Configuration**.

Use this page to add, edit, or delete chassis cluster configuration.

[Table 107 on page 240](#) through [Table 109 on page 241](#) describes the fields on the Cluster Configuration page.

**Table 107: Fields on the Node Settings Page**

Field	Description
Node ID	Displays the node ID.
Cluster ID	Displays the cluster ID configured for the node.
Host Name	Displays the name of the node.
Backup Router	Displays the IP address used while booting.
Management Interface	Displays the management interface of the node.
IP Address	Displays the management IP address of the node.
Status	Displays the state of the redundancy group. <ul style="list-style-type: none"> <li>• <b>Primary</b>—Redundancy group is active.</li> <li>• <b>Secondary</b>—Redundancy group is passive.</li> </ul>

Table 108: Fields on the Edit Node Settings Page

Field	Description
<b>Node Settings</b>	
Host Name	Enter the name of the host.
Backup Router	Enter the backup router address to be used during failover.
<b>Destination</b>	
IP	<p>Enter the destination IP address.</p> <p>Click + to add the destination IP address or select an existing IP address and click X to delete it.</p>
<b>Interface</b>	
Interface	<p>Select an interface available for the router from the list.</p> <p><b>NOTE:</b> You can add and edit two interfaces for each fabric link.</p>
IP	Enter the interface IP address.
Add	Click + to add the interface.
Delete	Select one or more existing interfaces and click X to delete it.

Table 109: Fields on the HA Cluster Settings Page

Field	Action
<b>Interfaces</b>	
Global Settings	<p>To configure the global settings:</p> <ol style="list-style-type: none"> <li>Click <b>Global Settings</b> at the upper right side of the Interfaces table. The Global Settings window appears.</li> <li>Enter the number of redundant Ethernet (reth) interfaces allowed. Range is 1 through 128.</li> <li>Click <b>OK</b> to save the changes. If you want to discard your changes, click <b>Cancel</b>.</li> </ol>

Table 109: Fields on the HA Cluster Settings Page (*continued*)

Field	Action
Name	Displays the physical interface name.
Member Interfaces/IP Address	Displays the member interface name or IP address configured for an interface.
Redundancy Group	Displays the redundancy group.
Add	<p>To add a HA cluster interface:</p> <ol style="list-style-type: none"> <li>Click + at the upper right side of the Interfaces table. The Add HA Cluster Interface window appears.</li> <li>Enter the following details for Fabric Link: <ul style="list-style-type: none"> <li><b>Fabric Link 0 (fab0)</b> <ul style="list-style-type: none"> <li>Interface—Enter the interface IP address for fabric link 0 and click + to add it.</li> <li>Select an existing interface and click <b>X</b> to delete the interface.</li> </ul> </li> <li><b>Fabric Link 1 (fab1)</b> <ul style="list-style-type: none"> <li>Interface—Enter the interface IP address for fabric link 1 and click + to add it.</li> <li>Select an existing interface and click <b>X</b> to delete the interface.</li> </ul> </li> </ul> </li> <li>Enter the following details for Redundant Ethernet: <ul style="list-style-type: none"> <li>Interface—Enter the logical interface. This specifies a logical interface consisting of two physical Ethernet interfaces, one on each chassis.</li> <li>IP—Enter redundant Ethernet IP address.</li> <li>Redundancy Group—Select one of the redundancy group from the list. Else, enter a redundancy group.</li> <li>lacp—Select an option from list: <ul style="list-style-type: none"> <li>active—Initiate transmission of LACP packets.</li> <li>passive—Respond to LACP packets.</li> </ul> </li> <li>periodic—Select an option from list for periodic transmission of LACP packets. The options are fast or slow.</li> <li>Click + to add the redundant Ethernet configuration.</li> <li>Select one or more existing redundant Ethernet configurations and click <b>X</b> to delete it.</li> </ul> </li> <li>Click <b>OK</b> to save the changes. If you want to discard your changes, click <b>Cancel</b>.</li> </ol>

Table 109: Fields on the HA Cluster Settings Page (*continued*)

Field	Action
Edit	<p>Select an interface and click the pencil icon at the upper right side of the Interfaces table.</p> <p>The Edit HA Cluster Interface window appears with editable fields. Once you complete the your edits, click <b>OK</b> to save the changes.</p>
Delete	<p>Select the existing interfaces and click the delete icon at the upper right side of the Interfaces table.</p> <p>Click <b>OK</b> to delete.</p>
<b>Redundancy Group</b>	
Group	Displays the redundancy group identification number.
Preempt	<p>Displays the selected Preempt option.</p> <ul style="list-style-type: none"> <li>• <b>True</b>—Primary Role can be preempted based on priority.</li> <li>• <b>False</b>—Primary Role cannot be preempt based on priority.</li> </ul>
Gratuitous ARP Count	Displays the number of gratuitous ARP requests that a newly elected primary device in a chassis cluster sends out to announce its presence to the other network devices.
Node Priority	Displays the assigned priority for the redundancy group on that node. The eligible node with the highest priority is elected as primary for the redundant group.

Table 109: Fields on the HA Cluster Settings Page *(continued)*

Field	Action
Add	

Table 109: Fields on the HA Cluster Settings Page (*continued*)

Field	Action
	<p>To add a redundancy group:</p> <ol style="list-style-type: none"> <li>Click + at the upper right side of the Redundancy Group table. The Add Redundancy Group window appears.</li> <li>Enter the following details for Fabric Link: <ul style="list-style-type: none"> <li>Redundancy Group—Enter the redundancy group name.</li> <li>Allow preemption of primaryship—Select the check box to allow a node with a better priority to initiate a failover for a redundancy group.  <b>NOTE:</b> By default, this feature is disabled. When disabled, a node with a better priority does not initiate a redundancy group failover (unless some other factor, such as faulty network connectivity identified for monitored interfaces, causes a failover).</li> <li>Gratuitous ARP Count—Enter a value. The range is 1 through 16. The default is 4. This specifies the number of gratuitous Address Resolution Protocol requests that a newly elected primary sends out on the active redundant Ethernet interface child links to notify network devices of a change in primary role on the redundant Ethernet interface links.</li> <li>node0 priority—Enter the node priority number as 0 for a redundancy group.</li> <li>node1 priority—Enter the node priority number as 1 for a redundancy group.</li> <li>Interface Monitor: <ul style="list-style-type: none"> <li>Interface—Select an interface from the list.</li> <li>Weight—Enter a value to specify the weight for the interface to be monitored. The ranges is from 1 through 125.</li> <li>Click + to add the interface monitor configuration.</li> <li>Select one or more existing interfaces and click X to delete them.</li> </ul> </li> <li>IP Monitoring: <ul style="list-style-type: none"> <li>Weight—Enter a value to specify the weight for IP monitoring. The ranges is 0 through 225.</li> <li>Threshold—Enter a value to specify the global threshold for IP monitoring. The ranges is 0 through 225.</li> <li>Retry Count—Enter a value to specify the number of retries needed to declare reachability failure. The range is 5 through 15.</li> <li>Retry Interval—Enter a value to specify the time interval in seconds between retries. The range is 1 through 30.</li> </ul> </li> <li>IPv4 Addresses to be monitored: <ul style="list-style-type: none"> <li>IP—Enter an IPv4 address to be monitored for reachability. You select an existing IP address and can click X to delete it.</li> <li>Weight—Enter a value to specify the weight for the redundancy group interface to be</li> </ul> </li> </ul> </li> </ol>



Table 109: Fields on the HA Cluster Settings Page (*continued*)

Field	Action
	<p>monitored.</p> <ul style="list-style-type: none"> <li>• Interface—Enter a value to specify the logical interface to monitor this IP address.</li> <li>• Secondary IP address—Enter the secondary IP address for monitoring packets on a secondary link.</li> <li>• Click + to add the IPv4 Addresses to be monitored configuration.</li> </ul> <p>3. Click <b>OK</b> to save the changes. If you want to discard your changes, click <b>Cancel</b>.</p>
Edit	<p>Select a group and click the pencil icon at the upper right side of the Redundancy Group table.</p> <p>The Edit Redundancy Group window appears with editable fields. Once you complete the your edits, click <b>OK</b> to save the changes.</p>
Delete	<p>Select the existing interfaces and click the delete icon at the upper right side of the Redundancy Group table.</p> <p>Click <b>OK</b> to delete.</p>

## RELATED DOCUMENTATION

[Configure Cluster \(HA\) Setup](#) | 246

## Configure Cluster (HA) Setup

You are here: **Configure** > **Device Settings** > **Cluster (HA) Setup**.

The Junos OS provides high availability on SRX Series device by using chassis clustering. SRX Series Services Gateways can be configured to operate in cluster mode, where a pair of devices can be connected together and configured to operate like a single node, providing device, interface, and service level redundancy.

A chassis cluster can be configured in the following modes:

- Active/passive mode: In active/passive mode, transit traffic passes through the primary node while the backup node is used only in the event of a failure. When a failure occurs, the backup device becomes primary and takes over all forwarding tasks.
- Active/active mode: In active/active mode, has transit traffic passing through both nodes of the cluster all of the time.

**NOTE:** In the J-Web cluster (HA) setup, you can only configure active/passive mode (RG1). Navigate to **Configure > Device Settings > Cluster Configuration** to configure active/active mode (RG1+).

You can set up chassis cluster using a simplified Cluster (HA) Mode wizard when the standalone SRX Series devices are in factory default. You can also create HA using the same wizard from **Configure > Device Settings > Cluster (HA) Setup** when the devices are already in the network.

**NOTE:**

In the factory default settings:

- A warning message is displayed in SRX300, SRX320, SRX320-POE, SRX340, and SRX345 devices to disconnect the ports between the two nodes. This is to avoid displaying the details of the other nodes.
- The Cluster (HA) Mode Wizard is supported only on SRX300, SRX320, SRX320-POE, SRX340, SRX345, SRX550M, SRX4100, and SRX4200 devices.

Before you begin:

- Establish a chassis cluster connection between the two units, ensure that you have physical access to both the devices.
- You must configure the two devices separately.
- Your other unit must be on the same hardware and software version as the current unit.
- Note that both units are erased and rebooted, after which all existing data is irretrievable. You have the option to save a backup copy of your configuration before rebooting.

To set up cluster (HA):

1. Select **Configure > Device Setup > Cluster (HA) Setup**.

The Chassis Cluster Setup Wizard configuration page appears. This wizard guides you through configuring chassis cluster on a two-unit cluster.

*Select the unit*

The welcome page shows the possible chassis cluster connections that you can configure for your SRX Series device. It shows a graphical representation for primary unit (Node 0) and secondary unit (Node 1) and guides you to first configure the primary unit (node 0).

2. Select **Yes, this is the primary unit (Node 0)**. to select the unit.

**NOTE:** If you have already configured the primary node settings, then select **No, this is the secondary unit (Node 1)** and follow the instructions from Step 8.

3. Click **Next**.
4. To configure the primary unit, complete the configuration according to the guidelines provided in [Table 110 on page 248](#).

**Table 110: Primary Unit Configuration**

Field	Description	Action
<b>System Identity</b>		
Node 0 Cluster ID	Specifies the number by which a cluster is identified.	Enter a number from 1 through 255. By default, 1 is assigned.
Node 0 Priority	Specifies the device priority for being elected to be the primary device in the VRRP group.	Enter a number from 1 through 255. By default, 200 is assigned.
Node 1 Priority	Specifies the device priority for being elected to be the primary device in the VRRP group.	Enter a number from 1 through 255. By default, 100 is assigned.
Node 0 Host Name	Specifies the device host name of the node 0.	By default, host name is assigned. For example, SRX1500-01.
Node 1 Host Name	Specifies the device host name of the node 1.	By default, host name is assigned. For example, SRX1500-02.
Allow root user SSH login	Allows users to log in to the device as root through SSH.	Enable this option.
<b>Management Interface</b>		
<b>IPv4 Address</b>		
<b>NOTE:</b> Make a note of the IPv4 address as you need it to access the settings after you commit the configuration.		
Node 0 Management IPv4	Specifies the management IPv4 address of node 0.	Enter a valid IPv4 address for the management interface.

Table 110: Primary Unit Configuration (*continued*)

Field	Description	Action
Node 0 Subnet Mask	Specifies subnet mask for IPv4 address.	Enter a subnet mask for the IPv4 address.
Node 1 Management IPv4	Specifies the management IPv4 address of node 1.	Enter a valid IPv4 address for the management interface.
Node 1 Subnet Mask	Specifies subnet mask for IPv4 address.	Enter a subnet mask for the IPv4 address.
Static Route IP	Defines how to route to the other network devices.	Enter an IPv4 address for the static route.
Static Route Subnet	Specifies the subnet for the static route IPv4 address.	Enter a subnet mask for the static route IPv4 address.
Next Hop IPv4	Specifies next hop gateway for the IPv4 address.	Enter a valid IPv4 address for the next hop.
<b>IPv6 Address (Optional)</b>		
Node 0 Management IPv6	Specifies the management IPv6 address of node 0.	Enter a valid IPv6 address for the management interface.
Node 0 Subnet Prefix	Specifies subnet prefix for IPv6 address.	Enter a subnet prefix for the IPv6 address.
Node 1 Management IPv6	Specifies the management IPv6 address of node 1.	Enter a valid IPv6 address for the management interface.
Node 1 Subnet Prefix	Specifies subnet prefix for IPv6 address.	Enter a subnet prefix for the IPv6 address.
Static Route IPv6	Defines how to route to the other network devices.	Enter an IPv6 address for the static route.
Static Route Subnet Prefix	Specifies the subnet prefix for the static route IPv6 address.	Enter a subnet prefix for the static route IPv6 address.
Next Hop IPv6	Specifies next hop gateway for the IPv6 address.	Enter a valid IPv6 address for the next hop.

Table 110: Primary Unit Configuration (*continued*)

Field	Description	Action
<b>Device Password</b>		
Root Password	Specifies root password of the device.	Enter root password if not already configured for the device.
Re-Enter Password	-	Reenter the root password.
<b>Control Ports</b>		
<b>NOTE:</b> This option is available only for SRX5600 and SRX5800 devices.		
Dual Link	Provides redundant link for failover.	<p>By default, this option is disabled.</p> <p>Once you enable this option, the following fields appear:</p> <ul style="list-style-type: none"> <li>• <b>Link 1</b> <ul style="list-style-type: none"> <li>• Node 0 FPC—Select an option from the list.</li> <li>• Node 0 Port—Select an option from the list.</li> <li>• Node 1 FPC.</li> <li>• Node 1 Port.</li> </ul> </li> <li>• <b>Link 2 (Optional)</b> <ul style="list-style-type: none"> <li>• Node 0 FPC—Select an option from the list.</li> <li>• Node 0 Port—Select an option from the list.</li> <li>• Node 1 FPC.</li> <li>• Node 1 Port.</li> </ul> </li> </ul>
Node 0 FPC	Specifies FPC slot number on which to configure the control port.	Select an option from the list.
Node 0 Port	Specifies port number on which to configure the control port.	Select an option from the list.
Node 1 FPC	Optional. Specifies FPC slot number on which to configure the control port.	Select an option from the list.

Table 110: Primary Unit Configuration (*continued*)

Field	Description	Action
Node 1 Port	Optional. Specifies port number on which to configure the control port.	Select an option from the list.
<b>Save Backup (Optional)</b>		
Save Backup (to client)	<p>Saves backup of the current configuration to the client local machine.</p> <p><b>NOTE:</b> When restarting the primary unit, J-Web deletes the existing configuration to configure chassis cluster. Therefore, it is recommended that you save a backup file of your current settings before committing the new configuration.</p>	Enable the option to save the backup file of your settings.

- Click **Reboot and Continue** to restart the primary unit to configure chassis cluster.
- After rebooting the primary unit (node 0), connect to the management port of the secondary unit to switch to the secondary unit.
- Click **Refresh** if the management IP address of the secondary unit is same as the existing device default IP address. If not, open a new browser with the new secondary device IP address.
- To configure the secondary unit, complete the configuration according to the guidelines provided in [Table 111 on page 251](#).

Table 111: Secondary Unit Configuration

Field	Description	Action
<b>Secondary Unit Information</b>		
Cluster ID	<p>Specifies the number by which a cluster is identified.</p> <p><b>NOTE:</b> Cluster ID must be same for both primary and secondary units.</p>	Enter a number from 1 through 255. By default, 1 is assigned.
<b>Device Password</b>		

Table 111: Secondary Unit Configuration (*continued*)

Field	Description	Action
Root Password	Specifies root password of the device.	Enter new root password.
Re-Enter Password	-	Reenter the root password.

### Control Ports

**NOTE:** This option is available only for SRX5600 and SRX5800 devices.

Dual Link	Provides redundant link for failover.	<p>By default, this option is disabled.</p> <p>Once you enable dual link option, the following fields appear:</p> <ul style="list-style-type: none"> <li>• <b>Link 1</b> <ul style="list-style-type: none"> <li>• Node 0 FPC—Select an option from the list.</li> <li>• Node 0 Port—Select an option from the list.</li> <li>• Node 1 FPC.</li> <li>• Node 1 Port.</li> </ul> </li> <li>• <b>Link 2 (Optional)</b> <ul style="list-style-type: none"> <li>• Node 0 FPC—Select an option from the list.</li> <li>• Node 0 Port—Select an option from the list.</li> <li>• Node 1 FPC.</li> <li>• Node 1 Port.</li> </ul> </li> </ul>
Node 0 FPC	Specifies FPC slot number on which to configure the control port.	Select an option from the list.
Node 0 Port	Specifies port number on which to configure the control port.	Select an option from the list.
Node 1 FPC	Optional. Specifies FPC slot number on which to configure the control port.	Select an option from the list.
Node 1 Port	Optional. Specifies port number on which to configure the control port.	Select an option from the list.

Table 111: Secondary Unit Configuration (*continued*)

Field	Description	Action
<b>Save Backup (Optional)</b>		
Save Backup (to client)	<p>Saves backup of the current configuration to the client local machine.</p> <p><b>NOTE:</b> When restarting the secondary unit, J-Web deletes the existing configuration to configure chassis cluster. Therefore, it is recommended that you save a backup file of your current settings before committing the new configuration.</p>	Enable the option to save the backup file of your settings.

9. Click **Reboot and Continue** to restart the secondary unit to configure chassis cluster.
10. After rebooting the secondary unit (node 1), launch the J-Web UI using primary unit management IP address.
11. Navigate to the Cluster Status step in the wizard.

**NOTE:**

- J-Web uses **show chassis cluster status** to verify control link status. Number on the link signifies if it is single (1) or dual links (2).
- The control and fabric link status colors are as follows:
- Green—Indicates that the links are up.
  - Red—Indicates that the links are down.
  - Orange—Indicates that one of the dual links is up.
  - Grey—Indicates that the fabric link is not configured.
- If chassis cluster is not connected, then the connection is failed and the all possible failure reasons will be displayed. For information on troubleshooting tips, see [Juniper Knowledge Search](#).
  - You can configure fabric link only after the chassis cluster is formed. For the first time configuration, the chassis status displays as **The fabric ports links is not yet configured**.



12. To configure fabric link, complete the configuration according to the guidelines provided in [Table 112 on page 254](#).

**Table 112: Fabric Link Configuration**

Field	Description	Action
<b>Fabric Link Details</b>		
Dual Link	Provides redundant link for failover.	Enable this option.
<b>Link 1</b>		
Fabric 0	Specifies the fabric port link for node 0.	Select an interface from the list.
Fabric 1	Specifies the fabric port link for node 1.	-
<b>Link 2 (Optional)</b>		
Fabric 0	Specifies the secondary fabric port link for node 0.	Select an interface from the list.
Fabric 1	Specifies the secondary fabric port link for node 1.	-

13. Click **Configure Link**.

14. Click **Next**.

15. To add redundant Ethernet (reth) interface, click + and complete the configuration according to the guidelines provided in [Table 113 on page 254](#).

**NOTE:** You can also use the pencil icon to edit the reth interface and delete icon to delete the reth interfaces.

**Table 113: Add Reth Interface**

Field	Description	Action
RETH Name	Specifies the reth interface name.	Enter a name for reth interface.

Table 113: Add Reth Interface (*continued*)

Field	Description	Action
Node 0 Interfaces	Specifies the list of Node 0 interfaces.	Select an interface from the Available column and move it to the Selected column.
Node 1	Specifies the Node 1 interfaces based on the node 0 interfaces.	-
<b>Advance Settings</b>		
LACP Configuration	Optional. Configure Link Aggregation Control Protocol (LACP).	-
LACP Mode	Optional. Specifies the LACP mode.  Available options are: <ul style="list-style-type: none"> <li>• active—Initiate transmission of LACP packets.</li> <li>• passive—Respond to LACP packets.</li> <li>• periodic—Interval for periodic transmission of LACP packets.</li> </ul>	Select an option from the list.
Periodicity	Optional. Specifies the interval at which the interfaces on the remote side of the link transmit link aggregation control protocol data units (PDUs).  Available options are: <ul style="list-style-type: none"> <li>• fast—Transmit link aggregation control PDUs every second.</li> <li>• slow—Transmit link aggregation control PDUs every 30 seconds.</li> </ul>	Select an option from the list.
Description	Optional. Specifies the description for LACP.	Enter a description.
VLAN Tagging	Optional. Specifies whether or not to enable VLAN tagging.	Enable this option.
Redundancy Group	Specifies the number of the redundancy group that the reth interface belongs to.	-

16. Click **Save**.

Virtual reth interface is created.

17. To add a logical interface to the new virtual reth interfaces, complete the configuration according to the guidelines provided in [Table 114 on page 256](#).

Table 114: Add Reth Logical Interface

Field	Description	Action
<b>General</b>		
Reth Interface Name	Specifies the name of the reth interface.	Enter a name for the reth interface.
Logical Interface Unit	Specifies the logical interface unit.	Enter the logical interface unit.
Description	Specifies the description of the reth interface.	Enter the description.
VLAN ID	Optional. Specifies the VLAN ID.	Enter the VLAN ID.
<b>IPv4 Address</b>		
IPv4 Address	Specifies the IPv4 address.	Click + and enter a valid IP address.
Subnet Mask	Specifies the subnetmask for IPv4 address.	Enter a valid subnetmask.
<b>IPv6 Address (Optional)</b>		
IPv6 Address	Specifies the IPv6 address.	Enter a valid IP address.
Prefix Length	Specifies the number of bits set in the subnet mask.	Enter the prefix length.

18. Click **OK**.

19. To configure zones, complete the configuration according to the guidelines provided in [Table 115 on page 257](#).

**NOTE:**

- With factory default configuration, trust and untrust zones are displayed by default.
- You can edit the security zone, add new zones, and delete the newly added zones. You will receive an error message while committing if you try to delete a default zone. This is because, the default zones are referenced in the security policies.
- You can also edit zone description, application tracking, source identity log, interfaces, system services, protocols, and traffic control options.

Table 115: Create Zones

Field	Description	Action
<b>General Information</b>		
Name	Specifies the name of the zone.	Enter a name for the zone.
Description	Specifies a description for the zone.	Enter a description for the zone.
Application Tracking	Enables application tracking (AppTrack) to collect statistics for the application usage on the device, and when the session closes	Enable this option.
Source Identity Log	Specifies the source-identity-log parameter as part of the configuration for a zone to enable it to trigger user identity logging when that zone is used as the source zone (from-zone) in a security policy.	Enable this option.
<b>Interfaces</b>		
Interfaces	Specifies the list of reth interfaces available.	Select an interface from the Available column and move it to the Selected column.
<b>System Services</b>		
Except	Drops the selected services.	Enable this option if you want to drop the selected services.
Services	Specify the types of incoming system service traffic that can reach the device for all interfaces in a zone.	Select a service from the Available column and move it to the Selected column.
<b>Protocols</b>		
Except	Drops the selected protocols.	Enable this option if you want to drop the selected protocols.
Protocols	Specify the types of routing protocol traffic that can reach the device on a per-interface basis.	Select a protocol from the Available column and move it to the Selected column.
<b>Traffic Control Options</b>		

Table 115: Create Zones (*continued*)

Field	Description	Action
TCP Reset	Specifies the device to send a TCP segment with the RST (reset) flag set to 1 (one) in response to a TCP segment with any flag other than SYN set and that does not belong to an existing session.	Enable this option.

20. Click **OK**.

21. Click **Finish**.

A cluster setup success message appears.

If you click the Cluster (HA) Setup menu again, a cluster setup success message appears and you can click **Cluster Configuration** to view and edit the chassis cluster configuration.

**NOTE:** If the chassis cluster configuration fails after you click **Finish**, then edit the configuration as required and commit the changes again.

## Configure PPPoE

**NOTE:** This menu is available only for SRX300 lines of devices and SRX550M device.

You are here: **Configure > Device Settings > PPPoE**.

PPPoE connects multiple hosts on an Ethernet LAN to a remote site through a single customer premises equipment (CPE) device (Juniper Networks device).

Use the configure PPPoE tasks to configure the PPPoE connection. The PPPoE wizard guides you to set up a PPPoE client over the Ethernet connection.

**NOTE:** On all branch SRX Series devices, the PPPoE wizard has the following limitations:

- While you use the load and save functionality, the port details are not saved in the client file.
- The Non Wizard connection option cannot be edited or deleted through the wizard. Use the CLI to edit or delete the connections.
- The PPPoE wizard cannot be launched if the backend file is corrupted.
- The PPPoE wizard cannot be loaded from the client file if non-wizard connections share the same units.
- The PPPoE wizard cannot load the saved file from one platform to another platform.
- There is no backward compatibility between PPPoE wizard Phase 2 to PPPoE wizard Phase 1. As a result, the PPPoE connection from Phase 2 will not be shown in Phase 1 when you downgrade to an earlier release.

#### RELATED DOCUMENTATION

| [Configure VPN | 259](#).

## Configure VPN

**NOTE:** This menu is available only for SRX300 lines of devices and SRX550M device.

You are here: **Configure > Device Settings > VPN**.

A virtual private network (VPN) provides a means for secure communication among remote computers across a public WAN, such as the Internet.

Click **Launch VPN Wizard**. This wizard leads you through the basic required steps to configure basic settings for a router-based VPN. To configure a VPN with a complete set of options, use either the J-Web interface or the command-line interface (CLI).

As you use this wizard, refer to the upper left area of the page to see where you are in the configuration process. Refer to the lower left area of the page for help related to the current page and its contents.

When you click a link under the Resources heading in the lower left area, the document opens in your browser. If it is in a new tab, be sure to close only the tab (not the browser window) when you close the document.

## RELATED DOCUMENTATION

| [Configure NAT | 260.](#)

## Configure NAT

**NOTE:** This menu is available only for SRX300 lines of devices and SRX550M device.

You are here: **Configure > Device Settings > NAT.**

Network Address Translation (NAT) is a method for modifying or translating network address information in packet headers. Either one or both of the source and destination addresses in a packet may be translated. NAT can also include the translation of port numbers.

The NAT type determines the order in which NAT rules are processed. During the first packet processing for a flow, NAT rules are applied in the following order:

1. Static NAT rules
2. Destination NAT rules
3. Route lookup
4. Security policy lookup
5. Reverse mapping of static NAT rules
6. Source NAT rules

Click **Launch NAT Wizard**. This wizard leads you through the basic required steps to configure NAT for the SRX Series security device. To configure more detailed settings, use either the J-Web interface or the command-line interface (CLI).

As you use this wizard, refer to the upper left area of the page to see where you are in the configuration process. Refer to the lower left area of the page for help related to the current page and its contents.

When you click a link under the Resources heading in the lower left area, the document opens in your browser. If it is in a new tab, be sure to close only the tab (not the browser window) when you close the document.

## RELATED DOCUMENTATION

| [Configure Basic Settings](#) | 226.



# Setup Wizard

## IN THIS CHAPTER

- [Configure Setup Wizard](#) | 262

## Configure Setup Wizard

You are here: **Configure** > **Setup Wizard**.

Using the Setup wizard, you can perform step-by-step configuration of a services gateway that can securely pass traffic.

**NOTE:** You can also configure the setup modes in the factory default settings. Connect your management device (laptop or PC) to the SRX device in factory default settings, the J-Web Setup wizard will appear. For more information on the Setup wizard in the factory default settings, see [“Start J-Web” on page 3](#).

You can choose one of the following setup modes to configure the services gateway:

**NOTE:** Click **Cancel** to exit the mode selection window.

- **Standard mode**—Configure your SRX Series device to operate in a standard mode. In this mode, you can configure basic settings such as device and users, time and DNS Servers, also management interface, zones and interfaces, and security policies.
- **Cluster (HA) mode**—Configure your SRX Series device to operate in a cluster (HA) mode. In the cluster mode, a pair of devices are connected together and configured to operate like a single node, providing device, interface, and service level redundancy.

**NOTE:** You cannot configure Standard or Passive mode when your device is in the HA mode.

- **Passive mode**—Configure your SRX Series device to operate in a TAP mode. TAP mode allows you to passively monitor traffic flows across a network. If IDP is enabled, then the TAP mode inspects the incoming and outgoing traffic to detect the number of threats.

**NOTE:** SRX5000 line of devices, SRX4600, and vSRX devices does not support the passive mode configuration.

To help guide you through the process, the wizard:

- Determines which configuration tasks to present to you based on your selections.
- Flags any missing required configuration when you attempt to leave a page.

To configure SRX Devices using the J-Web Setup wizard:

1. Click on the mode you want to setup.

**NOTE:** For the standard and the passive modes, the Reset Configuration message window appears. Click **Proceed to Launch** to launch the Setup Wizard. Launching the Setup wizard resets the device to the factory default configuration after saving a backup of the current committed configuration to the local file system. If you click **Cancel** anytime in the wizard before completing the configuration, the current rolls back the configuration to the current committed state.

2. For standard mode and passive mode, complete the configuration according to the guidelines provided in [Table 3 on page 8](#).

**NOTE:**

- If you select Cluster (HA) Mode, for the configuration information see [“Configure Cluster \(HA\) Setup” on page 246](#).
- In the Setup wizard, root password is mandatory and all the other options are optional. In the passive mode, management interface, Tap interface, and services are mandatory.

3. Click **Finish**.

A successful message appears and the device configuration mode of your choice is set up.

**NOTE:**

- Once the configuration is complete, the entire configuration is committed to the device and a successful message appears. If the commit fails, the CLI displays an error message and you remain at the wizard's last page. If required, you can change the configuration until the commit is successful.
- If the connectivity is lost during commit or if commit takes more than a minute, a message will be displayed with configured IP address to access J-Web again.
- For SRX300 line of devices and SRX550M devices, an additional message will be displayed about the device reboot if you have enabled Juniper Sky ATP or Security Intelligence services. For other SRX devices, the device will not reboot.

**Table 116: Setup Wizard Configuration**

Field	Action
<i>Device &amp; Users</i>	
<b>System Identity</b>	
Hostname	<p>Enter a hostname.</p> <p>You can use alphanumeric characters, special characters such as the underscore (_), the hyphen (-), or the period (.); the maximum length is 255 characters.</p>
Allow root user SSH login	<p>Enable this option to allow the root login (to the device) using SSH.</p>
<b>Device Password</b>	
Username	<p>Displays the root user.</p> <p><b>NOTE:</b> We recommend that you do not use root user account as a best practise to manage your devices.</p>
Password	<p>Enter a password.</p> <p>You can use alphanumeric characters and special characters; the minimum length is six characters.</p>
Confirm Password	<p>Reenter the password.</p>

Table 116: Setup Wizard Configuration (continued)

Field	Action
User Management	<p>You can create additional user accounts in addition to root user account.</p> <p><b>NOTE:</b> We recommend that you do not use root user account as a best practise to manage your devices.</p> <p>To add additional user accounts and to assign them a role:</p> <ol style="list-style-type: none"> <li>1. Click +.</li> <li>2. Enter the details in the following fields: <ul style="list-style-type: none"> <li>• Username—Enter a username. Do not use space or symbols.</li> <li>• Password—Enter a password. You can use alphanumeric characters and special characters; the minimum length is six characters.</li> <li>• Confirm Password—Reenter the password.</li> <li>• Role—Select a role from the list. Available options are: Super User, Operator, Read-Only, and Unauthorized.</li> </ul> </li> <li>3. Click the tick mark.</li> </ol> <p>You can edit the user details using the pencil icon or select the existing user and delete it using the delete icon.</p>
<i>Time &amp; DNS Servers</i>	
<b>Set Date &amp; Time</b>	
Set system time	Select either NTP server or Manual to configure the system time.
Date and Time	Select the date and time (in DD-MM-YYYY and HH:MM:SS 24-hour or AM/PM formats) to configure the system time manually.
NTP Server	<p>Enter a hostname or IP address of the NTP server.</p> <p>Once the system is connected to the network, the system time is synced with the NTP server time.</p> <p><b>NOTE:</b> If you want to add more NTP servers, go to Configure &gt; Device Settings &gt; Basic Settings &gt; Date &amp; Time Details through the J-Web menu.</p>

Table 116: Setup Wizard Configuration (continued)

Field	Action
Time zone	Select an option from the list. By default, device current time (UTC) is selected.
<b>DNS Servers</b>	
DNS Server 1	By default, 8.8.8.8 is displayed.  <b>NOTE:</b> Entering a new IP address for the DNS server will remove the default IP address.
DNS Server 2	Enter an IP address for the DNS server. By default, 8.8.4.4 is displayed.  <b>NOTE:</b> Entering a new IP address for the DNS server will remove the default IP address.
<i>Management Interface</i>	
<b>Management Interface</b>	
<b>NOTE:</b> If you change the management IP address and click <b>Next</b> , a warning message appears on the Management Interface page that you need to use the new management IP address to log in to J-Web because you may lose the connectivity to J-Web.	
Management Port	Select an option from the list.  If fxp0 port is your device's management port, then the fxp0 port is displayed. You can change it as required or you can select <b>None</b> and proceed to the next page.  <b>NOTE:</b> <ul style="list-style-type: none"><li>• You can choose the revenue port as management port if your device does not support the fxp0 port. Revenue ports are all ports except fxp0 and em0.</li><li>• If you are in Tap mode, it is mandatory to configure a management port. J-Web needs a management port for viewing generated report.</li></ul>
<b>IPv4</b>	
<b>NOTE:</b> Click <b>Email it to self</b> to get the newly configured IPv4 address to your inbox. This is useful if you lose connectivity when you change the management IP address to another network.	

Table 116: Setup Wizard Configuration (continued)

Field	Action
Management Address	Enter a valid IPv4 address for the management interface.  <b>NOTE:</b> If fxp0 port is your device's management port, then the fxp0 port's default IP address is displayed. You can change it if required.
Management Subnet Mask	Enter a subnet mask for the IPv4 address.
Static Route	Enter an IPv4 address for the static route to route to the other network devices.
Static Route Subnet Mask	Enter a subnet mask for the static route IPv4 address.
Next Hop Gateway	Enter a valid IPv4 address for the next hop.
<b>IPv6</b>	
Management Access	Enter a valid IPv6 address for the management interface.
Management Subnet Prefix	Enter a subnet prefix length for the IPv6 address.
Static Route	Enter an IPv6 address for the static route to route to the other network devices.
Static Route Subnet Prefix	Enter a subnet prefix length for the static route IPv6 address.
Next Hop Gateway	Enter a valid IPv6 address for the next hop.
<b>Access Protocols</b>	
<b>NOTE:</b>	
<ul style="list-style-type: none"> <li>• This option is not available if the management port is fxp0. If the management port is not fxp0, a new dedicated functional management zone is created and the configures access protocols are added to the zone.</li> <li>• In the Setup wizard, you cannot add any additional protocols.</li> </ul>	
HTTPS	Select this option for the web management using HTTP secured by SSL.  <b>NOTE:</b> By default, this option is selected.
SSH	Select this option for the SSH service.  <b>NOTE:</b> By default, this option is selected.

Table 116: Setup Wizard Configuration (*continued*)

Field	Action
Ping	Select this option for the internet control message protocol.  <b>NOTE:</b> By default, this option is selected.
DHCP	Select this option for the Dynamic Host Configuration Protocol.
Netconf	Select this option for the NETCONF Service.
<i>Zones &amp; Interfaces—For Standard Mode</i>	
<b>Zones &amp; Interfaces</b>	
Zone Name	View the zone name populated from your device factory default settings.  <b>NOTE:</b> For Standard mode, trust and untrust zones are created by default even if these zones are not available in the factory default settings.
Interfaces	View the interfaces name populated from your device factory default settings.
Description	Enter the description for zone and interfaces.
Edit	Select a zone and click the pencil icon at the right corner of the table to modify the configuration.  For more information on editing zones, see <a href="#">Table 4 on page 16</a> and <a href="#">Table 5 on page 24</a> .
Search	Click the search icon at the right corner of the table to quickly locate a zone or an interface.
Detailed View	Hover over the zone name and click the Detailed View icon to view the zone and interface details.  You can also click <b>More</b> and select <b>Detailed View</b> for the selected zone.
<i>Zones &amp; Interfaces—For Passive Mode</i>	
<b>TAP Interface</b>	

Table 116: Setup Wizard Configuration (*continued*)

Field	Action
Physical Interface	<p>Select an interface from the list.</p> <p>For Passive mode, untrust zone will be displayed.</p>
<b>Internet Connectivity</b>	
<p><b>NOTE:</b> Your device must have internet connectivity to use IPS, AppSec, Web filtering, Juniper Sky ATP, and Security threat intelligence services.</p>	
Name	<p>View the zone name populated from your device factory default settings.</p> <p><b>NOTE:</b> For Passive mode, untrust zone is created by default.</p>
Interfaces	View the interfaces name populated from your device factory default settings.
Description	Enter the description for zone and interfaces.
Edit	<p>Select a zone and click the pencil icon at the right corner of the table to modify the configuration.</p> <p>For more information on editing zones, see <a href="#">Table 4 on page 16</a> and <a href="#">Table 5 on page 24</a>.</p>
Search	Click the search icon at the right corner of the table to quickly locate a zone or an interface.
Detailed View	<p>Hover over the zone name and click the Detailed View icon to view the zone and interface details.</p> <p>You can also click <b>More</b> and select <b>Detailed View</b> for the selected zone.</p>
<b>Default Gateway</b>	
Default Gateway (IPv4)	Enter the IPv4 address of the default gateway.
Default Gateway (IPv6)	Enter the IPv6 address of the default gateway.
<i>Security Policies</i>	
<b>Security Services</b>	



Table 116: Setup Wizard Configuration (continued)

Field	Action
UTM	Enable this option for configuring UTM services.
License	<p>Enter UTM license key and click <b>Install License</b> to add a new license.</p> <p><b>NOTE:</b></p> <ul style="list-style-type: none"> <li>• Use a blank line to separate multiple license keys.</li> <li>• To use UTM services, your device must have internet connectivity from a revenue interface.</li> </ul>
UTM Type	<p>Select an option to configure UTM features:</p> <ul style="list-style-type: none"> <li>• Web Filtering</li> <li>• Anti Virus</li> <li>• Anti Spam</li> </ul>
Web Filtering Type	<p>Select an option:</p> <ul style="list-style-type: none"> <li>• Enhanced—Specifies that the Juniper Enhanced Web filtering intercepts the HTTP and the HTTPS requests and sends the HTTP URL or the HTTPS source IP to the Websense ThreatSeeker Cloud (TSC).</li> <li>• Local—Specifies the local profile type.</li> </ul>
IPS	<p>Enable this option to install the IPS signatures.</p> <ul style="list-style-type: none"> <li>• IPS Policy—Displays the IPS policy wizard name.</li> <li>• License—Enter the license key and click <b>Install License</b> to add a new license.</li> </ul> <p><b>NOTE:</b> The installation process may take few minutes.</p> <ul style="list-style-type: none"> <li>• IPS Signature—Click <b>Browse</b> to navigate to the IPS signature package folder and select it. Click <b>Install</b> to install the selected IPS signature package.</li> </ul> <p><b>NOTE:</b> You can download the IPS signature offline package at <a href="https://support.juniper.net/support/downloads/">https://support.juniper.net/support/downloads/</a>.</p>
Sky ATP	<p>Enable this option to use Juniper Sky ATP services.</p> <p><b>NOTE:</b> After the Juniper Sky ATP configuration is pushed, only the SRX300 line of devices and SRX550M devices are rebooted. Your device must have internet connectivity to enable Juniper Sky ATP enrollment process through J-Web.</p>

Table 116: Setup Wizard Configuration (*continued*)

Field	Action
Security Intelligence	<p>Enable this option to use Security Intelligence services.</p> <p><b>NOTE:</b> After the Security Intelligence configuration is pushed, only the SRX300 line of devices and SRX550M devices are rebooted. Your device must have internet connectivity to enable Juniper Sky ATP enrollment process through J-Web.</p>
User Firewall	<p>Enable this option to use user firewall services.</p> <ul style="list-style-type: none"> <li>• Domain Name—Enter a domain name for Active Directory.</li> <li>• Domain Controller—Enter domain controller IP address.</li> <li>• Username—Enter a username for administrator privilege.</li> <li>• Password—Enter a password for administrator privilege.</li> </ul>

### Security Policies

**NOTE:** The table lists the security policy along with the selected advanced security settings.

Policy Name	<p>Name of the policy.</p> <p><b>NOTE:</b></p> <ul style="list-style-type: none"> <li>• If you are in Standard mode, trust-to-untrust policy is created by default.</li> <li>• If you are in Tap mode, tap-policy is created by default.</li> </ul>
From Zone	<p>Name of the source zone.</p> <p><b>NOTE:</b></p> <ul style="list-style-type: none"> <li>• If you are in Standard mode, permits all traffic from the trust zone.</li> <li>• If you are in Tap mode, permits all traffic from the tap zone.</li> </ul>
To Zone	<p>Name of the destination zone.</p> <ul style="list-style-type: none"> <li>• If you are in Standard mode, permits all traffic from the trust zone to the untrust zone.</li> <li>• If you are in Tap mode, permits all traffic from the tap zone to the tap zone.</li> </ul>
Source Address	Name of the source address (not the IP address) of a policy.
Destination Address	Name of the destination address.

Table 116: Setup Wizard Configuration (*continued*)

Field	Action
Application	Name of a preconfigured or custom application of the policy match.
Action	Action taken when a match occurs as specified in the policy.
Advanced Security	Name of the configured advanced security settings.

Table 117: Edit Trust Zone

Field	Action
<b>General Information</b>	
Name	Displays the zone name.
Description	Enter the description for the zone.
Application Tracking	Enables this option to provide application tracking support to the zone.
Source Identity Log	Enables this option to trigger user identity logging when that zone is used as the source zone in a security policy.
Services	By default, this option is enabled. You can disable if required.  all—Specifies all system services.
Protocols	By default, this option is enabled. You can disable if required.  all—Specifies all protocol.
<b>Interfaces</b>	
Name	Displays the name of the interface
Description	Displays the description of the interface.
IP Address	Displays the IP address of the interface.
VLAN	Displays the VLAN name.
Services	Displays the system service option selected.

Table 117: Edit Trust Zone (continued)

Field	Action
Protocols	Displays the protocol option selected.

Table 117: Edit Trust Zone (continued)

Field	Action
Add	

Table 117: Edit Trust Zone (*continued*)

Field	Action
	<p>To add a switching or a routing interface:</p> <ol style="list-style-type: none"> <li>Click +. The Add Interface page appears.</li> <li>Enter the following details: <ul style="list-style-type: none"> <li><b>General</b> (fields for switching interface): <ul style="list-style-type: none"> <li>Type (family)—Select <b>Switching</b>. <b>NOTE:</b> This option will be available for only SRX300 line of devices, SRX550M, and SRX1500 devices. For SRX5000 line of devices, SRX4100, SRX4200, SRX4600, and vSRX devices, the Type (family) field is not available.</li> <li>Routing Interface (IRB) Unit—Enter the IRB unit.</li> <li>Description—Enter the description for the interface.</li> </ul> </li> <li><b>General</b> (fields for routing interface): <ul style="list-style-type: none"> <li>Type (family)—Select <b>Routing</b>. For SRX5000 line of devices, SRX4100, SRX4200, SRX4600, and vSRX devices, the Type (family) field is not available.</li> <li>Interface Name—Select an option from list.</li> <li>Interface Unit—Enter the Inet unit. <b>NOTE:</b> VLAN tagging is enabled automatically if the interface unit is higher than zero.</li> <li>Description—Enter the description for the interface.</li> <li>VLAN ID—Enter the VLAN ID. <b>NOTE:</b> VLAN ID is mandatory if the interface unit is higher than zero.</li> </ul> </li> <li><b>Interfaces</b>—Select an interface from the Available column and move it to the Selected column. <b>NOTE:</b> This option is available only for the Switching family type.</li> <li><b>IPv4:</b> <ul style="list-style-type: none"> <li>IPv4 Address—Enter a valid IPv4 address for the switching or the routing interface.</li> <li>Subnet Mask—Enter a subnet mask for the IPv4 address.</li> </ul> </li> <li><b>IPv6:</b> <ul style="list-style-type: none"> <li>IPv6 Address—Enter a valid IPv6 address for the switching or the routing interface.</li> <li>Subnet Prefix—Enter a subnet prefix for the IPv6 address.</li> </ul> </li> <li><b>VLAN Details:</b> <b>NOTE:</b> This option is available only for the Switching family type.</li> </ul> </li> </ol>

Table 117: Edit Trust Zone (continued)

Field	Action
	<ul style="list-style-type: none"><li>• VLAN Name—Enter an unique name for the VLAN.</li><li>• VLAN ID—Enter the VLAN ID.</li></ul>

Table 117: Edit Trust Zone (continued)

Field	Action
	<ul style="list-style-type: none"><li>• <b>DHCP Local Server:</b><ul style="list-style-type: none"><li>• DHCP Local Server—Enable this option to configure the switch to function as an extended DHCP local server.</li><li>• DHCP Pool Name—Enter the DHCP pool name.</li><li>• DHCP Pool Range (Low)—Enter an IP address that is the lowest address in the IP address pool range.</li><li>• DHCP Pool Range (High)—Enter an IP address that is the highest address in the IP address pool range.</li></ul><p><b>NOTE:</b> This address must be greater than the address specified in DHCP Pool Range (Low).</p><li>• Propagate Settings from—Select an interface on the router through which the resolved DHCP queries are propagated to the DHCP pool.</li></li></ul>



Table 117: Edit Trust Zone (*continued*)

Field	Action
	<ul style="list-style-type: none"> <li>● <b>System Services</b>—Select system services from the list in the Available column and then click the right arrow to move it to the Selected column.</li> </ul> <p>The available options are:</p> <ul style="list-style-type: none"> <li>● all—Specify all system services.</li> <li>● any-service—Specify services on entire port range.</li> <li>● appqoe—Specify the APPQOE active probe service.</li> <li>● bootp—Specify the Bootp and dhcp relay agent service.</li> <li>● dhcp—Specify the Dynamic Host Configuration Protocol.</li> <li>● dhcpv6—Enable Dynamic Host Configuration Protocol for IPV6.</li> <li>● dns—Specify the DNS service.</li> <li>● finger—Specify the finger service.</li> <li>● ftp—Specify the FTP protocol.</li> <li>● http—Specify the Web management using HTTP.</li> <li>● https—Specify the Web management using HTTP secured by SSL.</li> <li>● ident-reset—Specify the send back TCP RST IDENT request for port 113.</li> <li>● ike—Specify the Internet key exchange.</li> <li>● lsping—Specify the Label Switched Path ping service.</li> <li>● netconf—Specify the NETCONF Service.</li> <li>● ntp—Specify the network time protocol.</li> <li>● ping—Specify the internet control message protocol.</li> <li>● r2cp—Enable Radio-Router Control Protocol.</li> <li>● reverse-ssh—Specify the reverse SSH Service.</li> <li>● reverse-telnet—Specify the reverse telnet Service.</li> <li>● rlogin—Specify the Rlogin service</li> <li>● rpm—Specify the Real-time performance monitoring.</li> <li>● rsh—Specify the Rsh service.</li> <li>● snmp—Specify the Simple Network Management Protocol.</li> <li>● snmp-trap—Specify the Simple Network Management Protocol trap.</li> </ul>

Table 117: Edit Trust Zone (*continued*)

Field	Action
	<ul style="list-style-type: none"> <li>• ssh—Specify the SSH service.</li> <li>• tcp-encap—Specify the TCP encapsulation service.</li> <li>• telnet—Specify the Telnet service.</li> <li>• tftp—Specify the TFTP</li> <li>• traceroute—Specify the traceroute service.</li> <li>• webapi-clear-text—Specify the Webapi service using http.</li> <li>• webapi-ssl—Specify the Webapi service using HTTP secured by SSL.</li> <li>• xnm-clear-text—Specify the JUNOScript API for unencrypted traffic over TCP.</li> <li>• xnm-ssl—Specify the JUNOScript API Service over SSL.</li> </ul> <p>• <b>Protocols</b>—Select protocols from the list in the Available column and then click the right arrow to move it to the Selected column.</p> <p>The available options are:</p> <ul style="list-style-type: none"> <li>• all—Specifies all protocol.</li> <li>• bfd—Bidirectional Forwarding Detection.</li> <li>• bgp—Border Gateway Protocol.</li> <li>• dvmrp—Distance Vector Multicast Routing Protocol.</li> <li>• igmp—Internet Group Management Protocol.</li> <li>• ldp—Label Distribution Protocol.</li> <li>• msdp—Multicast Source Discovery Protocol.</li> <li>• nhrp- Next Hop Resolution Protocol.</li> <li>• ospf—Open shortest path first.</li> <li>• ospf3—Open shortest path first version 3.</li> <li>• pgm—Pragmatic General Multicast.</li> <li>• pim—Protocol Independent Multicast.</li> <li>• rip—Routing Information Protocol.</li> <li>• ripng—Routing Information Protocol next generation.</li> <li>• router-discovery—Router Discovery.</li> <li>• rsvp—Resource Reservation Protocol.</li> <li>• sap—Session Announcement Protocol.</li> <li>• vrrp—Virtual Router Redundancy Protocol.</li> </ul>
Edit	<p>Select an interface and click the edit icon at the top right corner of the table.</p> <p>The Edit Interface page appears with editable fields.</p> <p><b>NOTE:</b> As interface name is prepopulated, you cannot edit it.</p>

Table 117: Edit Trust Zone (continued)

Field	Action
Delete	<p>Select an interface and click the delete icon at the top right corner of the table.</p> <p>A confirmation window appears. Click <b>Yes</b> to delete the selected interface or click <b>No</b> to discard.</p>
Search	<p>Click the search icon at the top right corner of the table and enter partial text or full text of the keyword in the search bar.</p> <p>The search results are displayed.</p>

Table 118: Edit Untrust Zone

Field	Action
<b>General Information</b>	
Name	Displays the zone name as untrust.
Description	Enter the description for the zone.
Application Tracking	Enables this option to provide application tracking support to the zone.
Source Identity Log	Enables this option for system services.
<b>Interfaces</b>	
Name	Displays the name of the physical interface
Description	Displays the description of the interface.
Address Mode	Displays the type of address mode.
IP Address	Displays the IP address of the interface.
Services	Displays the system service option selected.
Protocols	Displays the protocol option selected.

Table 118: Edit Untrust Zone (continued)

Field	Action
Add	

Table 118: Edit Untrust Zone (continued)

Field	Action
	<p>To add an interface to the untrust zone:</p> <ol style="list-style-type: none"> <li>Click +. The Add Interface page appears.</li> <li>Enter the following details: <ul style="list-style-type: none"> <li><b>General:</b> <ul style="list-style-type: none"> <li>Interface Name—Select an interface from the list.</li> <li>Interface Unit—By default 0 will be populated. You can change the unit value if required.</li> <li>Description—Enter the description for the interface.</li> <li>Address Mode—Select an address mode for the interface. The available options are DHCP Client, PPPoE (PAP), PPPoE (CHAP) and Static IP.  <b>NOTE:</b> PPPoE (PAP) and PPPoE (CHAP) are not supported for SRX5000 line of devices and if any of the devices are in passive mode.</li> <li>Username—Enter a username for PPPoE (PAP) or PPPoE (CHAP) authentication.</li> <li>Password—Enter a password for PPPoE (PAP) or PPPoE (CHAP) authentication.</li> </ul> </li> <li><b>IPv4:</b>  <b>NOTE:</b> This option is available only for the Static IP address mode. <ul style="list-style-type: none"> <li>IPv4 Address—Enter a valid IPv4 address for the interface.</li> <li>Subnet Mask—Enter a subnet mask for the IPv4 address.</li> </ul> </li> <li><b>IPv6:</b>  <b>NOTE:</b> This option is available only for the Static IP address mode. <ul style="list-style-type: none"> <li>IPv6 Address—Enter a valid IPv6 address for the interface.</li> <li>Subnet Prefix—Enter a subnet prefix for the IPv6 address.</li> </ul> </li> </ul> </li> </ol>

Table 118: Edit Untrust Zone (*continued*)

Field	Action
	<ul style="list-style-type: none"> <li>• <b>System Services</b>—Select system services from the list in the Available column and then click the right arrow to move it to the Selected column.</li> <li>• <b>Protocols</b>—Select protocols from the list in the Available column and then click the right arrow to move it to the Selected column.</li> </ul>
Edit	<p>Select an interface and click the edit icon at the top right corner of the table.</p> <p>The Edit Interface page appears with editable fields.</p> <p><b>NOTE:</b> As interface name is prepopulated, you cannot edit it.</p>
Delete	<p>Select an interface and click the delete icon at the top right corner of the table.</p> <p>A confirmation window appears. Click <b>Yes</b> to delete the selected interface or click <b>No</b> to discard.</p>
Search	<p>Click the search icon at the top right corner of the table and enter partial text or full text of the keyword in the search bar.</p> <p>The search results are displayed.</p>

## RELATED DOCUMENTATION

| [Start J-Web](#) | 3

# Interfaces—Ports

## IN THIS CHAPTER

- [About the Ports Page | 284](#)
- [Add a Logical Interface | 287](#)
- [Edit a Logical Interface | 292](#)
- [Delete Logical Interface | 293](#)

## About the Ports Page

You are here: **Configure > Interfaces > Ports**.

Use this page to view or configure the logical interfaces to switch to L2 or L3 mode. You can view the interfaces in the ways of interface type, interface state, or zone association.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a logical interface. See [“Add a Logical Interface” on page 287](#).
- Edit a logical interface. See [“Edit a Logical Interface” on page 292](#).
- Delete a logical interface. See [“Delete Logical Interface” on page 293](#).

### Field Descriptions

[Table 119 on page 285](#) describes the fields to view interface configuration on the ports page.

**NOTE:** Starting in Junos OS Release 19.3R1, J-Web supports IOC4 line cards for SRX5000 line of devices. You can also view the sub-ports details configured on any or all ports of the SRX5K-IOC4-MRATE line card.

Table 119: View Interface Configuration Details on the Ports Page

Field	Action
Filter	<p>Select an option from the list to view the interfaces configuration details. The available options are:</p> <ul style="list-style-type: none"> <li>• Interface Type—Select an option to display the list of interfaces available on the device.</li> <li>• Interface State—Select an option to display the interfaces state of the device. The options are: <ul style="list-style-type: none"> <li>• Admin Up</li> <li>• Link Up</li> <li>• Admin Up &amp; Link Down</li> <li>• Admin Down</li> </ul> </li> <li>• Zone Association—Select an option to display the list of available security zones.</li> </ul>
Go	Displays the list of interfaces based on the interface type, interface state, or zone association that you have used to filter the interface information.
Clear	Clears the filter options that you have selected and displays all the interfaces.
Expand All	Expands the tree under the list of interfaces.
Global Settings	<p>To configure global setting for the interface ports:</p> <ol style="list-style-type: none"> <li>1. Click <b>Global Settings</b>. The Global Settings window appears.</li> <li>2. Enter the following details: <ul style="list-style-type: none"> <li>• MAC Table size—Enter the size of MAC address forwarding table.</li> <li>• MAC Limit—Enter the maximum number of MAC addresses learned per interface. The range is 1 through 65,535.</li> <li>• Packet Action—Select an option from the list for the action taken when MAC limit is reached. The options available are: <ul style="list-style-type: none"> <li>• drop</li> <li>• drop-and-log</li> <li>• log</li> <li>• none</li> <li>• shutdown</li> </ul> </li> </ul> </li> </ol>
Disable	Disables the selected interface.
Enable	Enables the selected disabled interface.



Table 120 on page 286 describes the fields on the ports page.

**Table 120: Fields on the Ports Page**

Field	Description
Interface	Displays the interface name.  Logical interfaces configured under this interface appear in a collapsible list under the physical interface.
Admin status	Displays the administrative status of the interface. Status can be either Up or Down.
Link Status	Displays the operational status of the link. Status can be either Up or Down.
IP Address	Displays the configured IP addresses.  Multiple IP addresses configured on one logical interface are displayed in a collapsible list under the logical interface.
Zone	Displays the security zone with which this interface is associated.
Logical System/Tenant	Display the statistics information for the specified logical system or tenant.
MTU	Displays the maximum transmission unit value for this physical interface.
Speed	Displays the Interface speed (10 Mbps, 100 Mbps, 1 Gbps, or Auto).
Link Mode	Displays the link mode status for this interface. Status can be Active, Passive, or None.
Auto Negotiation	Displays the auto negotiation status of the interface. Status can be either Enabled or Disabled.
Media Type	Displays the media type of the operating modes (copper or fiber) for the 2-Port 10 Gigabit Ethernet XPIM.

**Release History Table**

Release	Description
<a href="#">19.3R1</a>	Starting in Junos OS Release 19.3R1, J-Web supports IOC4 line cards for SRX5000 line of devices. You can also view the sub-ports details configured on any or all ports of the SRX5K-IOC4-MRATE line card.

RELATED DOCUMENTATION

| [Add a Logical Interface](#) | 287

## Add a Logical Interface

You are here: **Configure** > **Interfaces** > **Ports**.

To add a logical interface:

1. Select an interface and click the add icon (+) available on the upper right side of the Ports page.  
The Add Interface page appears.
2. Complete the configuration according to the guidelines provided in [Table 121 on page 287](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel** instead.  
If you click **OK**, a new logical interface with the provided configuration is created.

[Table 121 on page 287](#) provides guidelines on using the fields on the Add Interface page.

Table 121: Fields on the Add Interface Page

Field	Description
<b>General</b>	
Unit	Enter the logical unit number.
Description	Enter the description for the interface.
Vlan Id	Enter the VLAN ID
Multi Tenancy Type	Select an option from the list: <ul style="list-style-type: none"><li>• None</li><li>• Logical System</li><li>• Tenant</li></ul>
Logical System	Select a logical system from the list.  <b>NOTE:</b> This option is available when you select the multitenancy type as logical system.

Table 121: Fields on the Add Interface Page (*continued*)

Field	Description
Tenant	<p>Select a tenant from the list.</p> <p><b>NOTE:</b> This option is available when you select the multitenancy type as tenant.</p>
Zone	Select a zone form the list.
<b>Protocol (family)</b>	
<b>IPv4 Address</b>	
IPv4 Address/DHCP configuration	Select the check box to enable this option.
Enable DHCP	Select this option to enable Dynamic Host Configuration Protocol (DHCP).
Enable address configuration	<p>Select this option to add IPv4 address.</p> <p>To add IPv4 address:</p> <ol style="list-style-type: none"> <li>1. Click <b>+</b>.</li> <li>2. Enter the following details: <ul style="list-style-type: none"> <li>• IPv4 Address—Enter an IPv4 address.</li> <li>• Web Auth—Click <b>Configure</b> and enable the options, Enable Http, Enable Https, and Redirect to Https. Then, click <b>OK</b> to save changes.</li> <li>• ARP—Click <b>Edit</b>.</li> </ul> <p>In the ARP Address page, click <b>+</b> and enter the IPv4 Address, MAC Address, and select <b>Publish</b>.</p> <p>Click <b>OK</b> to save the changes.</p> </li> </ol>
<b>IPv6 Address</b>	
IPv6 Address/DHCP configuration	<p>Select the check box to enable this option.</p> <p><b>NOTE:</b> Not available for irb interface</p>
Enable DHCP	Select this option to enable DHCP.

Table 121: Fields on the Add Interface Page (*continued*)

Field	Description
Enable address configuration	<p>Select this option to add IPv6 address.</p> <p>To add IPv6 address:</p> <ol style="list-style-type: none"> <li>1. Click +.</li> <li>2. Enter an IPv6 address.</li> </ol>
<b>Ethernet Switching</b>	
Ethernet Switching configuration	<p>Select the check box to enable this option.</p> <p><b>NOTE:</b> Not available for irb interface</p>
Interface Mode	<p>Select an option from the list:</p> <ul style="list-style-type: none"> <li>• access—Configures a logical interface to accept untagged packets.</li> <li>• trunk—Configures a single logical interface to accept packets tagged with any VLAN ID.</li> </ul>
Recovery Timeout	Enter a period of time in seconds that the interface remains in a disabled state due to a port error prior to automatic recovery.
VLAN Member	Select a VLAN member from the list.
VoIP VLAN	Select a VLAN name from the list to be sent from the authenticating server to the IP phone.
Configure Vlan(s)	Select a VLAN from the <b>Available</b> column and move it to <b>Selected</b> column using the right arrow.
All Vlans	Select this option to select any available VLANs.
<b>General- ge</b>	
Description	Enter a description for the interface.
MTU (Bytes)	Enter the MTU in bytes.
Speed	Select the speed from the list: 10 Mbps, 100 Mbps, 1 Gbps, or None.
Link Mode	Select the link mode from the list: Half Duplex, Full Duplex, and None.

Table 121: Fields on the Add Interface Page (*continued*)

Field	Description
Loopback	Select this option if you want the interface to loop back.
Flow Control	Select this option to enable flow control, which regulates the flow of packets from the router to the remote side of the connection.
Enable Auto Negotiation	Select this option to enable autonegotiation.
Enable Per Unit Scheduler	Select this option to enable the association of scheduler maps with logical interfaces.
Enable Vlan Tagging	Select this option to enable the reception and transmission of 802.1Q VLAN-tagged frames on the interface.
<b>Source MAC Filter</b>	
Add	Click + and enter the MAC address to assign it to the interface.
Delete	Select a MAC address and click X.
MAC Limit	Enter a value for MAC addresses to be associated with a VLAN.  Range: 1 through 131071.
Packet Action	Select an option from the list: <ul style="list-style-type: none"> <li>• drop—Drop packets with new source MAC addresses, and do not learn the new source MAC addresses.</li> <li>• drop-and-log—Drop packets with new source MAC addresses, and generate an alarm, an SNMP trap, or a system log entry</li> <li>• log—Hold packets with new source MAC addresses, and generate an alarm, an SNMP trap, or a system log entry.</li> <li>• none—Forward packets with new source MAC addresses, and learn the new source MAC address.</li> <li>• shutdown—Disable the specified interface, and generate an alarm, an SNMP trap, or a system log entry.</li> </ul>
<b>General- It</b>	
Unit	Enter a logical unit number.

Table 121: Fields on the Add Interface Page (*continued*)

Field	Description
Encapsulation	Select an option from the list: <ul style="list-style-type: none"> <li>• Ethernet</li> <li>• Ethernet-VPLS</li> </ul>
Peer Unit	Enter a peer unit number.
Multi Tenancy Type	Select an option from the list: <ul style="list-style-type: none"> <li>• None</li> <li>• Logical System</li> <li>• Tenant</li> </ul>
Logical System	Select a logical system from the list.  <b>NOTE:</b> This option is available when you select the multitenancy type as logical system.
Tenant	Select a tenant from the list.  <b>NOTE:</b> This option is available when you select the multitenancy type as tenant.
IP Address	Click <b>Add</b> and enter an IP address.  Select an IP address and click <b>Delete</b> to delete the selected IP address.
<b>st0</b>	
Tunnel Interface st0	Enter the logical unit number.
Zone	Select a zone from the list.
Description	Enter the description for the interface.
Unnumbered	Select this option to fetch interface from which an unnumbered interface borrows an IPv4 address.
Numbered	Select this option to fetch interface from which a numbered interface borrows an IPv4 or IPv6 address.
IPv4 Address	Enter an IPv4 address.
IPv4 Subnet Mask	Enter a subnet mask for the IPv4 address.

Table 121: Fields on the Add Interface Page (*continued*)

Field	Description
IPv6 Address	Enter an IPv4 address.
IPv6 Subnet Mask	Enter a subnet mask for the IPv6 address.
<b>Multipoint</b>	
St Interface Configuration	Select the check box to enable this option.
Automatic	Select this option to automatically fetch next hop tunnel address.
Manual	Click + to add next hop tunnel address and VPN name.  Select an existing next hop address and click X to delete it.
<b>Routing Protocols</b>	
Enable Routing Protocols	Select an option: <ul style="list-style-type: none"> <li>• all—Select this option to enable all protocols routing on the routing device.</li> <li>• OSPF—Select this option to enable OSPF routing on the routing device.</li> <li>• BGP—Select this option to enable BGP routing on the routing device.</li> <li>• RIP—Select this option to enable RIP routing on the routing device.</li> </ul>

## RELATED DOCUMENTATION

[Edit a Logical Interface | 292](#)
[Delete Logical Interface | 293](#)

## Edit a Logical Interface

You are here: **Configure > Interfaces > Ports.**

To edit a logical interface:

1. Select an existing logical interface that you want to edit on the Ports page.
2. Click the pencil icon available on the upper right side of the page.

The interface options appears with editable fields. For more information on the options, see [“Add a Logical Interface” on page 287](#).

3. Click **OK**.

#### RELATED DOCUMENTATION

[Delete Logical Interface | 293](#)

## Delete Logical Interface

You are here: **Configure > Interfaces > Ports**.

To delete a logical interface:

1. Select a logical interface that you want to delete from the Ports page.
2. Click the delete icon (X) available on the upper right side of the page.  
A confirmation window appears.
3. Click **Yes** to delete or click **No**.

#### RELATED DOCUMENTATION

[Add a Logical Interface | 287](#)

[Edit a Logical Interface | 292](#)



# Interfaces—Interconnecting Ports

## IN THIS CHAPTER

- [About the Interconnecting Ports Page | 294](#)
- [Add a LT Logical Interface | 296](#)
- [Edit a LT Logical Interface | 302](#)
- [Delete Logical Interface | 302](#)
- [Search for Text in an Interconnect Ports Table | 303](#)

## About the Interconnecting Ports Page

You are here: **Configure** > **Interfaces** > **Interconnect Ports**.

On SRX Series Services Gateways, the logical tunnel interface is used to interconnect logical systems. Use this page to interconnect logical system that serves as an internal virtual private LAN service (VPLS) switch connecting one logical system on the device to another.

**NOTE:** This menu is available only for SRX4000 line of devices and SRX5000 line of devices.

## Tasks You Can Perform

You can perform the following tasks from this page:

- Create a LT Logical Interface. See [“Add a LT Logical Interface” on page 296](#).
- Edit a LT Logical Interface. See [“Edit a LT Logical Interface” on page 302](#).
- Delete an Interconnect Interface. See [“Delete Logical Interface” on page 302](#).
- Search for Text in an Interconnect Ports table. See [“Search for Text in an Interconnect Ports Table” on page 303](#).

## Field Descriptions

Table 122 on page 295 describes the fields on the Interconnect ports page.

**Table 122: Fields on the Interconnect Ports Page**

Field	Description
Interface	Displays the interface name. Logical interfaces configured under this interface appear in a collapsible list under the physical interface.
Link Status	Displays the operational status of the link. Status can be either Up or Down.
IP Addresses	Displays the configured IP addresses. Multiple IP addresses configured on one logical interface are displayed in a collapsible list under the logical interface.
Encapsulation	<p>Displays the mode of encapsulation. Encapsulation is the process of taking data from one protocol and translating it into another protocol, so the data can continue across a network. It can from the following points:</p> <ul style="list-style-type: none"> <li>• Ethernet</li> <li>• Frame Relay</li> <li>• Ethernet VPLS</li> </ul> <p>Ethernet and Frame Relay are used if logical tunnel interfaces connected between two logical systems. Ethernet VPLS will be used on logical tunnel interface which is connecting VPLS switch to logical system.</p>
LSYS/Tenant/VPLS Switch	Displays the name of the logical system or the name of VPLS Switch.
Peer Interface	Displays the peer details.
Peer Encapsulation	Displays the peer encapsulation mode.
Peer LSYS/VPLS Switch	Displays the name of the peer logical system and VPLS Switch.
Type	Displays the type for logical interface—Logical System, Tenant, or VPLS Switch.

## RELATED DOCUMENTATION

[Add a LT Logical Interface](#) | 296

# Add a LT Logical Interface

You are here: **Configure** > **Interfaces** > **Interconnect Ports**.

To add a LT logical interface:

1. Click the add icon (+) available on the upper right side of the Interconnect Ports page.  
The Create LT Logical Interface page appears.
2. Complete the configuration according to the guidelines provided in [Table 123 on page 296](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.  
If you click **OK**, a new LT logical interface with the provided configuration is created.

[Table 123 on page 296](#) provides guidelines on using the fields on the Create LT Logical Interface page.

**Table 123: Fields on the Create LT Logical Interface Page**

Field	Description
<b>Local Details</b>	
Unit	Enter the Logical unit number for interface.
Type	Select a logical interface type from the list. The options available are Logical System, Tenant, and VPLS Switch.
Logical System	<p>This option is available when you select the logical interface type as Logical System.</p> <p>Select a logical system from the list. If not present in the list, then we need to create a logical system.</p> <p><b>NOTE:</b> Starting from Junos OS 19.1R1, the user interface will auto complete the logical system names when you type the partial name.</p>
Tenant	<p>This option is available when you select the logical interface type as Tenant.</p> <p>Select a tenant from the list.</p> <p><b>NOTE:</b> Starting from Junos OS 19.1R1, the user interface will auto complete the tenant names when you type the partial name.</p>
VPLS Switch	<p>This option is not available if the logical interface type is VPLS Switch.</p> <p>Select a VPLS switch from the list.</p>
Description	Enter description for the interface.

Table 123: Fields on the Create LT Logical Interface Page (*continued*)

Field	Description
IPv4 Address	<p><b>NOTE:</b> This option is not available if the logical interface type is VPLS Switch.</p> <p>Specify the IPv4 address.</p> <p>To add an IPv4 address:</p> <ol style="list-style-type: none"> <li>1. Click + at the upper right of the IPv4 Address table.</li> <li>2. Enter the following details: <ul style="list-style-type: none"> <li>• <b>IPv4 address</b>—Enter an IPv4 address. IP Addresses added here would be used as interconnect IP.</li> <li>• <b>Prefix Length</b>—Enter the prefix length. This specifies the number of bits set in the subnet mask.</li> </ul> </li> <li>3. Click the tick mark to add the IPv4 address or click <b>X</b> to discard the changes.</li> </ol> <p>To edit an IPv4 address:</p> <ol style="list-style-type: none"> <li>1. Select an existing IPv4 address and click the pencil icon at the upper right of the IPv4 Address table.</li> <li>2. Edit the IPv4 address and prefix length.</li> <li>3. Click the tick mark to add the IPv4 address or click <b>X</b> to discard the changes.</li> </ol> <p>To delete an IPv4 address:</p> <ol style="list-style-type: none"> <li>1. Select one or more existing IPv4 addresses and click the delete icon at the upper right of the IPv4 Address table.</li> <li>2. Click <b>OK</b> to delete the IPv4 address. If you want to discard the changes, click <b>Cancel</b>.</li> </ol>

Table 123: Fields on the Create LT Logical Interface Page (*continued*)

Field	Description
IPv6 Address	<p><b>NOTE:</b> This option is not available if the logical interface type is VPLS Switch.</p> <p>Specify the IPv6 address.</p> <p>To add an IPv6 address:</p> <ol style="list-style-type: none"> <li>1. Click <b>+</b> at the upper right of the IPv6 Address table.</li> <li>2. Enter the following details: <ul style="list-style-type: none"> <li>• <b>IPv6 address</b>—Enter an IPv6 address. IP Addresses added here would be used as interconnect IP.</li> <li>• <b>Prefix Length</b>—Enter the prefix length. This specifies the number of bits set in the subnet mask.</li> </ul> </li> <li>3. Click the tick mark to add the IPv6 address or click <b>X</b> to discard the changes.</li> </ol> <p>To edit an IPv6 address:</p> <ol style="list-style-type: none"> <li>1. Select an existing IPv6 address and click the pencil icon at the upper right of the IPv6 Address table.</li> <li>2. Edit the IPv6 address and prefix length.</li> <li>3. Click the tick mark to add the IPv6 address or click <b>X</b> to discard the changes.</li> </ol> <p>To delete an IPv6 address:</p> <ol style="list-style-type: none"> <li>1. Select one or more existing IPv6 addresses and click the delete icon at the upper right of the IPv6 Address table.</li> <li>2. Click <b>OK</b> to delete the IPv6 address. If you want to discard the changes, click <b>Cancel</b>.</li> </ol>
<b>Peer Details</b>	
Type	<p>Select any one of the connection types from the list:</p> <ul style="list-style-type: none"> <li>• Logical system</li> <li>• Tenant</li> <li>• VPLS Switch</li> </ul>
Logical System	<p>This option is available when you select the connection type as Logical System.</p> <p>Select a logical system from the list. If not present in the list, then we need to create a logical system.</p>

Table 123: Fields on the Create LT Logical Interface Page (*continued*)

Field	Description
Tenant	<p>This option is available when you select the connection type as Tenant.</p> <p>Select a tenant from the list.</p>
VPLS Switch	<p>This option is available when you select the connection type as VPLS Switch.</p> <p>Select a VPLS switch from the list.</p>
Unit	<p>Enter the peering logical system unit number.</p>
Description	<p>Specify the interface description.</p> <p>Enter description for the interface.</p>

Table 123: Fields on the Create LT Logical Interface Page (*continued*)

Field	Description
IPv4 Address	<p><b>NOTE:</b> This option is not available if the logical interface type is VPLS Switch.</p> <p>Specify the IPv4 address.</p> <p>To add an IPv4 address:</p> <ol style="list-style-type: none"> <li>1. Click <b>+</b> at the upper right of the IPv4 Address table.</li> <li>2. Enter the following details: <ul style="list-style-type: none"> <li>• <b>IPv4 address</b>—Enter an IPv4 address. IP Addresses added here would be used as interconnect IP.</li> <li>• <b>Prefix Length</b>—Enter the prefix length. This specifies the number of bits set in the subnet mask.</li> </ul> </li> <li>3. Click the tick mark to add the IPv4 address or click <b>X</b> to discard the changes.</li> </ol> <p>To edit an IPv4 address:</p> <ol style="list-style-type: none"> <li>1. Select an existing IPv4 address and click the pencil icon at the upper right of the IPv4 Address table.</li> <li>2. Edit the IPv4 address and prefix length.</li> <li>3. Click the tick mark to add the IPv4 address or click <b>X</b> to discard the changes.</li> </ol> <p>To delete an IPv4 address:</p> <ol style="list-style-type: none"> <li>1. Select one or more existing IPv4 addresses and click the delete icon at the upper right of the IPv4 Address table.</li> <li>2. Click <b>OK</b> to delete the IPv4 address. If you want to discard the changes, click <b>Cancel</b>.</li> </ol>

Table 123: Fields on the Create LT Logical Interface Page (*continued*)

Field	Description
IPv6 Address	<p><b>NOTE:</b> This option is not available if the logical interface type is VPLS Switch.</p> <p>Specify the IPv6 address.</p> <p>To add an IPv6 address:</p> <ol style="list-style-type: none"> <li>1. Click <b>+</b> at the upper right of the IPv6 Address table.</li> <li>2. Enter the following details: <ul style="list-style-type: none"> <li>• <b>IPv6 address</b>—Enter an IPv6 address. IP Addresses added here would be used as interconnect IP.</li> <li>• <b>Prefix Length</b>—Enter the prefix length. This specifies the number of bits set in the subnet mask.</li> </ul> </li> <li>3. Click the tick mark to add the IPv6 address or click <b>X</b> to discard the changes.</li> </ol> <p>To edit an IPv6 address:</p> <ol style="list-style-type: none"> <li>1. Select an existing IPv6 address and click the pencil icon at the upper right of the IPv6 Address table.</li> <li>2. Edit the IPv6 address and prefix length.</li> <li>3. Click the tick mark to add the IPv6 address or click <b>X</b> to discard the changes.</li> </ol> <p>To delete an IPv6 address:</p> <ol style="list-style-type: none"> <li>1. Select one or more existing IPv6 addresses and click the delete icon at the upper right of the IPv6 Address table.</li> <li>2. Click <b>OK</b> to delete the IPv6 address. If you want to discard the changes, click <b>Cancel</b>.</li> </ol>

## RELATED DOCUMENTATION

[Edit a LT Logical Interface](#) | 302



## Edit a LT Logical Interface

You are here: **Configure** > **Interfaces** > **Interconnect Ports**.

To edit a LT logical interface:

1. Select an existing logical interface that you want to edit on the Interconnect Ports page.
2. Click the pencil icon available on the upper right side of the page.

The Edit LT Logical Interface page appears with editable fields. For more information on the fields, see [“Add a LT Logical Interface” on page 296](#).

3. Click **OK** to save the changes or click **Cancel** to discard the changes.

### RELATED DOCUMENTATION

| [Delete Logical Interface](#) | 302

## Delete Logical Interface

You are here: **Configure** > **Interfaces** > **Interconnect Ports**.

To delete a logical interface:

1. Select one or more the logical interfaces that you want to delete on the Interconnect Ports page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the logical interface.

### RELATED DOCUMENTATION

| [Search for Text in an Interconnect Ports Table](#) | 303

## Search for Text in an Interconnect Ports Table

You can use the search icon in the top right corner of the Interconnect Ports page to search for text containing letters and special characters on that page.

To search for text:

1. Click the search icon and enter partial text or full text of the keyword in the search bar.

The search results are displayed.

2. Click **X** next to a search keyword or click **Clear All** to clear the search results.

### RELATED DOCUMENTATION

[About the Interconnecting Ports Page | 294](#)

# Interfaces—VLAN

## IN THIS CHAPTER

- [About the VLAN Page | 304](#)
- [Add a VLAN | 305](#)
- [Edit a VLAN | 307](#)
- [Delete VLAN | 308](#)
- [Assign an Interface to VLAN | 308](#)
- [Search for Text in VLAN Table | 309](#)

## About the VLAN Page

You are here: **Configure > Interfaces > VLAN.**

Use this page to view, add, and remove VLAN configuration details.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a VLAN. See [“Add a VLAN” on page 305](#).
- Edit a VLAN. See [“Edit a VLAN” on page 307](#).
- Delete a VLAN. See [“Delete VLAN” on page 308](#).
- Assign Interface. See [“Assign an Interface to VLAN” on page 308](#).
- Search for Text in a VLAN table. See [“Search for Text in VLAN Table” on page 309](#).
- Filter the application signature information based on select criteria. To do this, select the filter icon at the top right-hand corner of the table. The columns in the grid change to accept filter options. Type the filter options; the table displays only the data that fits the filtering criteria.
- Show or hide columns in the VLAN table. To do this, use the Show Hide Columns icon in the top right corner of the page and select the options you want to show or deselect to hide options on the page.

Field Descriptions

Table 124 on page 305 describes the fields on the VLAN page.

Table 124: VLAN Configuration Page

Field	Function
VLAN Name	Displays the name for the VLAN.
VLAN ID/List	Displays the identifier or list for the VLAN.
Interface Assigned	Displays the interfaces assigned for the VLAN.
Description	Displays a brief description for the VLAN.

RELATED DOCUMENTATION

| [Add a VLAN | 305](#)

Add a VLAN

You are here: **Configure > Interfaces > VLAN.**

To add a VLAN:

1. Click the add icon (+) available on the upper right side of the VLAN page.  
The Add VLAN page appears.
2. Complete the configuration according to the guidelines provided in [Table 125 on page 305](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

[Table 125 on page 305](#) provides guidelines on using the fields on the Add VLAN page.

Table 125: Fields on the Add VLAN Page

Field	Description
VLAN Details	

Table 125: Fields on the Add VLAN Page (*continued*)

Field	Description
VLAN Name	Enter an unique name for the VLAN.  <b>NOTE:</b> The VLAN text field is disabled when vlan-tagging is not enabled.
VLAN ID Type	Select a type of VLAN ID.  The available options are: <ul style="list-style-type: none"> <li>• Single</li> <li>• Range</li> </ul>
VLAN ID	Enter an unique identification number for the VLAN from 1 through 4094. If no value is specified, the default is 1.
Description	Enter a brief description for the VLAN.
<b>Advanced Settings (optional)</b>	
L2 Interfaces	Enter the interfaces to be associated with the VLAN.  The available options are as follows: <ul style="list-style-type: none"> <li>• <b>Add</b>—Click + to add the MAC address and L2 interface details.</li> <li>• <b>Edit</b>—Click the pencil icon to edit the selected interface.</li> <li>• <b>Remove</b>—Select the interface or interfaces that you do not want associated with the VLAN.</li> </ul>
<b>Filter</b>	
Input Filter	To apply an input firewall filter to an interface, select the firewall filter from the list.
Output Filter	To apply an output firewall filter to an interface, select the firewall filter from the list.
<b>IPv4 Address</b>	
<b>NOTE:</b> This option is available only when you select VLAN ID type as Single.	
IPv4 Address	Enter the IPv4 address of the VLAN.

Table 125: Fields on the Add VLAN Page (continued)

Field	Description
Subnet	<p>Enter the range of logical addresses within the address space that is assigned to an organization. For example, 255.255.255.0.</p> <p>You can also specify the address prefix.</p>
IP Address	<p>Enter the IP address of the VLAN.</p> <p>The available options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—Click + to add the IP address, MAC address, and L2 interface details.</li> <li>• <b>Edit</b>—Click the pencil icon to edit the selected IPv4 address.</li> <li>• <b>Delete</b>—Select the IPv4 address or addresses that you do not want associated with the VLAN.</li> </ul>
<b>IPv6 Address</b>	
NOTE: This option is available only when you select VLAN ID type as Single.	
IPv6 Address	Enter the IPv6 address of the VLAN.
Prefix	Select the destination prefix of the VLAN.

## RELATED DOCUMENTATION

[Edit a VLAN](#) | 307

## Edit a VLAN

You are here: **Configure > Interfaces > VLAN.**

To edit a VLAN:

1. Select an existing VLAN that you want to edit on the VLAN page.
2. Click the pencil icon available on the upper right side of the page.

The Edit VLAN page appears with editable fields. For more information on the options, see [“Add a VLAN” on page 305](#).

3. Click **OK** to save the changes.

#### RELATED DOCUMENTATION

| [Delete VLAN](#) | 308

## Delete VLAN

You are here: **Configure** > **Interfaces** > **VLAN**.

To delete a VLAN:

1. Select one or more VLANs that you want to delete on the VLAN page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the profile.

#### RELATED DOCUMENTATION

| [Assign an Interface to VLAN](#) | 308

## Assign an Interface to VLAN

You are here: **Configure** > **Interfaces** > **VLAN**.

To assign an interface to VLAN:

1. Select a VLAN.
2. Click **Assign Interface** on the right side of the VLAN page.  
The Assign Interfaces page appears.
3. Complete the configuration according to the guidelines provided in [Table 126 on page 309](#).
4. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 126: Fields on the Assign Interfaces Page

Field	Description
VLAN Name	Displays the name of the VLAN for which you want to assign the interface.
VLAN ID	Displays the ID of the selected VLAN.
Description	Displays the description of the selected VLAN.
Interfaces	Select the interfaces in the Available column and use the right arrow to move them to the Selected column.
VoIP Interfaces	Select the VoIP interfaces in the Available column and use the right arrow to move them to the Selected column.

## RELATED DOCUMENTATION

[Search for Text in VLAN Table | 309](#)

## Search for Text in VLAN Table

You can use the search icon in the top right corner of the VLAN page to search for text containing letters and special characters on that page.

To search for text:

1. Click the search icon and enter partial text or full text of the keyword in the search bar.

The search results are displayed.

2. Click **X** next to a search keyword or click **Clear All** to clear the search results.

## RELATED DOCUMENTATION

[About the VLAN Page | 304](#)



# Interfaces—Link Aggregation

## IN THIS CHAPTER

- [About the Link Aggregation Page | 310](#)
- [Link Aggregation Global Settings | 311](#)
- [Add a Logical Interface to Link Aggregation | 312](#)
- [Add a Link Aggregation | 314](#)
- [Edit an Aggregated Interface | 315](#)
- [Delete Link Aggregation | 316](#)

## About the Link Aggregation Page

You are here: **Configure** > **Interfaces** > **Link Aggregation**.

Use this page to view, add, and remove link aggregation configuration details.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Global Settings. See [“Link Aggregation Global Settings” on page 311](#).
- Add Logical Interface. See [“Add a Logical Interface to Link Aggregation” on page 312](#).
- Enable/Disable LACP link-protection.

To do this, select a link aggregation and click **Enable/Disable** available at the upper right side of the Link Aggregation table.

- Add Link Aggregation. See [“Add a Link Aggregation” on page 314](#).
- Edit Link Aggregation. See [“Edit an Aggregated Interface” on page 315](#).
- Delete Link Aggregation. See [“Delete Link Aggregation” on page 316](#).
- Show or hide columns in the Link Aggregation table. To do this, use the Show Hide Columns icon in the top right corner of the page and select the options you want to show or deselect to hide options on the page.

### Field Descriptions

Table 127 on page 311 describes the fields on the Link Aggregation page.

Table 127: Fields on the Link Aggregation Page

Field	Description
Name	Displays the name of the select LAG.
Link Status	Displays whether the interface is linked (Up) or not linked (Down).
Admin Status	Displays whether the interface is up or down.
Interfaces	Displays the name of the aggregated interface.
VLAN ID	Displays the Virtual LAN identifier value for IEEE 802.1Q VLAN tags (0.4094).
IP Address	Displays the IP address associated with the interface.
VLAN Tagging	Displays whether the interface is VLAN-tagged (enabled) or untagged (disabled).
Enabled/Disabled	Displays whether the LACP link-protection is enabled or disabled.
Description	Provides a description of the LAG.

### RELATED DOCUMENTATION

| [Link Aggregation Global Settings](#) | 311

## Link Aggregation Global Settings

You are here: **Configure** > **Interfaces** > **Link Aggregation**.

To add link aggregation global settings:

1. Complete the configuration according to the guidelines provided in [Table 128 on page 312](#).

**Table 128: Fields on the Link Aggregation Global Settings page**

Field	Action
<b>Global Settings</b>	
Device Count	<p>Enter the device count.</p> <p>The range is 1 through 28.</p>
<b>Advanced Settings</b>	
<b>NOTE:</b> This option is not available for SRX5000 line of devices.	
LACP Configuration	Specifies global Link Aggregation Control Protocol configuration.
System Priority	Click the arrow button to select the priority level that you want to associate with the LAG.
Link Protection	<p>Select the option to protect the link.</p> <p><b>NOTE:</b> You can configure only two member links for an aggregated Ethernet interface, that is, one active and one standby.</p>
Non-Revertive	Enable or disable the option to not to choose even if a higher priority link is available.

## RELATED DOCUMENTATION

| [Add a Logical Interface to Link Aggregation](#) | 312

## Add a Logical Interface to Link Aggregation

You are here: **Configure > Interfaces > Link Aggregation**.

To add an interface to link aggregation:

1. Select an aggregated interface.
2. Click **Add Logical Interface** on the right side of the Link Aggregation page.  
The Add Logical Interface page appears.
3. Complete the configuration according to the guidelines provided in [Table 129 on page 313](#).
4. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 129: Fields on the Add Logical Interface Page

Field	Action
Aggregated Interface Name	Displays aggregated interface name.
Logical Interface Unit	Enter the logical interface unit.
Description	Enter the description.
VLAN ID	Enter the VLAN ID. VLAN ID is mandatory.
<b>IPv4 Address</b>	
IPv4 Address	Click + and enter a valid IPv4 address.
Subnet Mask	Enter a valid subnet mask for IPv4 address.
<b>IPv6 Address</b>	
IPv6 Address	Enter a valid IPv6 address.
Subnet Mask	Enter a valid subnet mask for IPv6 address.

RELATED DOCUMENTATION

## Add a Link Aggregation

You are here: **Configure** > **Interfaces** > **Link Aggregation**.

To add a link aggregation:

1. Click the add icon (+) on the upper right side of the Link Aggregation page.  
The Create Link Aggregation page appears.
2. Complete the configuration according to the guidelines provided in [Table 130 on page 314](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

**Table 130: Fields on the Create Link Aggregation Page**

Field	Action
<b>General Settings</b>	
AE Name	Enter the aggregated interface name.  <b>NOTE:</b> If an aggregated interface already exists, then the field is displayed as read-only.
Interfaces	Select the interface available for aggregation and move to Selected column using right arrow.  <b>NOTE:</b> Only interfaces that are configured with the same speed can be selected together for a LAG.
<b>Advanced Settings</b>	
LACP Configuration	Specifies global Link Aggregation Control Protocol configuration.
LACP Mode	Select a mode in which Link Aggregation Control Protocol packets are exchanged between the interfaces. The modes are: <ul style="list-style-type: none"> <li>● <b>Active</b>—Indicates that the interface initiates transmission of LACP packets</li> <li>● <b>Passive</b>—Indicates that the interface only responds to LACP packets.</li> </ul>
Periodic	Select a periodic transmissions of link aggregation control PDUs occur at different transmission rate. The options available are: <ul style="list-style-type: none"> <li>● <b>fast</b>—Transmit link aggregation control PDUs every second.</li> <li>● <b>slow</b>—Transmit link aggregation control PDUs every 30 seconds.</li> </ul>

Table 130: Fields on the Create Link Aggregation Page (*continued*)

Field	Action
System Priority	Click the arrow button to select the priority level that you want to associate with the LAG.
Link Protection	Enable or disable the option to protect the link.  <b>NOTE:</b> You can configure only two member links for an aggregated Ethernet interface, that is, one active and one standby.
Non-Revertive	Enable or disable the option to not to choose even if a higher priority link is available.
Description	Enter a description for the LAG.
VLAN Tagging	Enable or disable VLAN tagging for a LAG.

## RELATED DOCUMENTATION

[Edit an Aggregated Interface](#) | 315

## Edit an Aggregated Interface

You are here: **Configure** > **Interfaces** > **Link Aggregation**.

To edit an aggregated interface:

1. Select an existing aggregated interface that you want to edit on the Aggregated Interface page.
2. Click the pencil icon available on the upper right side of the page.

The edit Aggregated Interface page appears with editable fields. For more information on the options, see [“Add a Link Aggregation” on page 314](#).

3. Click **OK** to save the changes or click **Cancel** to discard the changes.

## RELATED DOCUMENTATION

[Delete Link Aggregation](#) | 316

## Delete Link Aggregation

You are here: **Configure** > **Interfaces** > **Link Aggregation**.

To delete link aggregation:

1. Select one or more aggregated interfaces that you want to delete on the Link Aggregation page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the profile.

### RELATED DOCUMENTATION

[About the Link Aggregation Page](#) | 310

# Network— DHCP Client

IN THIS CHAPTER

- [About the DHCP Client Page | 317](#)
- [Add DHCP Client Information | 318](#)
- [Delete DHCP Client Information | 319](#)

## About the DHCP Client Page

You are here: **Configure > Network > DHCP Client.**

Use this page to view, add, and remove link aggregation configuration details.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Global Settings. See [“About the DHCP Client Page” on page 317](#).
- Create DHCP client information. See [“Add DHCP Client Information” on page 318](#).
- Edit DHCP client information. See *Edit DHCP Client Information*
- Delete DHCP client information. See [“Delete DHCP Client Information” on page 319](#).

### Field Descriptions

[Table 131 on page 317](#) describes the fields on the DHCP Client page.

Table 131: Fields on the DHCP Client Page

Field	Description
Interface Name	Displays the interface name.
DHCP Client Identifier	Displays the name of the client used by the DHCP server to index its database of address bindings.



Table 131: Fields on the DHCP Client Page *(continued)*

Field	Description
Server	Displays the DHCP server address.
Lease Time	Displays the time in seconds, to negotiate and exchange DHCP messages.
Add	Adds a new DHCP client configuration.
Delete	Deletes the selected DHCP client configuration.

## RELATED DOCUMENTATION

| [Add DHCP Client Information](#) | 318

## Add DHCP Client Information

You are here: **Configure** > **Network** > **DHCP** > **DHCP Client**.

To add DHCP Client information:

1. Click **Add** on the DHCP Client page.  
The DHCP Client Information page appears.
2. Complete the configuration according to the guidelines provided in [Table 132 on page 318](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 132: Fields on the DHCP Client Information Page

Field	Action
<b>DHCP Client Information</b>	
Interface	Enter the name of the interface on which to configure the DHCP client.

Table 132: Fields on the DHCP Client Information Page (*continued*)

Field	Action
Client Identifier	<p>Specifies the name of the client used by the DHCP server to index its database of address bindings.</p> <p>Select an option from the list:</p> <ul style="list-style-type: none"> <li>• <b>ASCII</b>—ASCII client.</li> <li>• <b>Hexadecimal</b>—Hexadecimal client.</li> </ul>
Lease Time	<p>Enter a value from 60 through 2,147,483,647.</p> <p>Specifies the time in seconds, to negotiate and exchange DHCP messages.</p>
Retransmission Attempt	<p>Enter a value from 0 through 6. The default value is 4.</p> <p>Specifies the number of attempts the router is allowed to retransmit a DHCP packet fallback.</p>
DHCP Server Address	<p>Enter the IPv4 address of the DHCP server.</p> <p>Specifies the preferred DHCP server that the DHCP clients contact with DHCP queries.</p>
Vendor Class ID	<p>Enter the vendor class ID numbers.</p> <p>Specifies the vendor class identity number for the DHCP client.</p>
Update Server	<p>Select the check box to enable the propagation of TCP/IP settings on the specified interface (if it is acting as a DHCP client) to the DHCP server that is configured on the router.</p>

## RELATED DOCUMENTATION

[Delete DHCP Client Information](#) | 319

## Delete DHCP Client Information

You are here: **Configure** > **Network** > **DHCP** > **DHCP Client**.

To delete a DHCP Client Information:

1. Select a DHCP Client that you want to delete on the DHCP Client page.
2. Click **Delete** available on the DHCP Client page.
3. Click **Yes** to delete or click **No** to retain the profile.

RELATED DOCUMENTATION

[About the DHCP Client Page | 317](#)

[Add DHCP Client Information | 318](#)

[Edit DHCP Client Information](#)

# Network—DHCP Server

## IN THIS CHAPTER

- [About the DHCP Server Page | 321](#)
- [Add a DHCP Pool | 323](#)
- [Edit a DHCP Pool | 326](#)
- [Delete DHCP Pool | 327](#)
- [DHCP Groups Global Settings | 327](#)
- [Add a DHCP Group | 328](#)
- [Edit a DHCP Group | 328](#)
- [Delete DHCP Group | 329](#)

## About the DHCP Server Page

You are here: **Configure > Network > DHCP > DHCP Server.**

Use this page to view, add, and remove DHCP server configuration details.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a DHCP Pool. See [“Add a DHCP Pool” on page 323](#).
- Edit a DHCP Pool. See [“Edit a DHCP Pool” on page 326](#).
- Delete a DHCP Pool. See [“Delete DHCP Pool” on page 327](#).
- Configure DHCP group global settings. See [“DHCP Groups Global Settings” on page 327](#).
- Add a DHCP group. See [“Add a DHCP Group” on page 328](#).
- Edit a DHCP group. See [“Edit a DHCP Group” on page 328](#).
- Delete a DHCP group. See [“Delete DHCP Group” on page 329](#).

## Field Descriptions

Table 133 on page 322 describes the fields on the DHCP Server page.

Table 133: Fields on the DHCP Server Page

Field	Description
Routing Instance	Displays the name of the routing instance selected for DHCP server.
<b>DHCP Pools</b>	
Pool Name	Displays the name of the source pool.
Network Addresses	Displays the IP address in the pool.
Routing Instance	Displays the name of the routing instance selected.
<b>DHCP Groups</b>	
Global Settings	Specifies the global settings of DHCP server.
Group name	Specifies the source name of the group.
Interfaces	Displays name of the interfaces selected.
Routing Instance	Displays the name of the routing instance selected.
<b>DHCP Address range for pool</b>	
Address Range Name	Specify the name of the address assignment pool.
Address Range (Low)	Specifies the lowest address in the IP address pool range.
Address Range (High)	Specifies the highest address in the IP address pool range.
<b>DHCP Static Bindings for pool</b>	
Host Name	Specifies the name of the client for the static binding.
MAC Address	Specifies the client MAC address.
Fixed IP Address	Specifies the IP address to reserve for the client.

RELATED DOCUMENTATION

| [Add a DHCP Pool](#) | 323

## Add a DHCP Pool

You are here: **Configure** > **Network** > **DHCP** > **DHCP Server**.

To add a DHCP Pool:

1. Click the add icon (+) on the upper right side of the DHCP Pools table.  
The Add DHCP Pool page appears.
2. Complete the configuration according to the guidelines provided in [Table 134 on page 323](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

[Table 134 on page 323](#) describes the Add DHCP Pool Page.

Table 134: Fields on the Add DHCP Pool Page.

Field	Action
<b>General</b>	
Pool Name	Enter a name for DHCP pool.
Routing Instance	Select a routing instance from the list.
Network Addresses	Enter the following details: <ul style="list-style-type: none"><li>• IP Address—Enter an IP address.</li><li>• Subnet Mask—Enter a subnet mask for the IP address.</li></ul>
<b>DHCP Pool Attributes</b>	
Click <b>DHCP Attributes</b> to add DHCP pool attributes. After configuring the attributes, click <b>OK</b> to save the changes.	
Pool Name	Displays the DHCP pool name.
Domain Name	Enter the domain name to be assigned to the address pool.
Server Identifier	Enter the name of the server identifier to assign to the DHCP client in the address pool.

Table 134: Fields on the Add DHCP Pool Page. (continued)

Field	Action
Netbios Node Type	Select a NetBIOS node type from the list. This is equivalent to DHCP option 46.
Next Server	Enter the IP address of the next DHCP server that the clients need to contact.
Propagate Settings	Select an interface from the list.  Specifies the name of the interface on the router through which the resolved DHCP queries are propagated to the DHCP pool.
TFTP Server	Enter the IP address of the TFTP server.
Maximum Lease Time (Secs)	Enter a from value 60 through 1,209,600.  Specifies the maximum length of time in seconds, a client can hold a lease. (Dynamic BOOTP lease lengths can exceed this maximum time.)
Boot File	Enter the path and filename of the initial boot file to be used by the client.
Boot Server	Enter the IP address or hostname of the TFTP server that provides the initial boot file to the client.
Grace Period (Secs)	Enter a number of seconds the lease is retained.  range is 0 through 4,294,967,295. By default, 0 is no grace period.
DNS Name Servers	Specifies the DNS name to assign to the DHCP client in the address pool.  Click any one of the following: <ul style="list-style-type: none"> <li>• +—Adds the DNS name in the address pool.</li> <li>• Click the pencil icon to edit a selected DNS name in the address pool.</li> <li>• X—Deletes the DNS name in the address pool.</li> </ul>
WINS Servers	Specifies the WINS servers to assign to the DHCP client in the address pool.  Click any one of the following: <ul style="list-style-type: none"> <li>• +—Adds WINS servers to the address pool.</li> <li>• Click the pencil icon to edit a selected WINS server in the address pool.</li> <li>• X—Deletes the WINS servers in the address pool.</li> </ul>

Table 134: Fields on the Add DHCP Pool Page. (continued)

Field	Action
Gateway Routers	<p>Specifies the gateway router to assign client in the address pool.</p> <p>Click any one of the following:</p> <ul style="list-style-type: none"> <li>• <b>+</b>—Adds the gateway router to the address pool.</li> <li>• Click the pencil icon to edit a selected gateway router in the address pool.</li> <li>• <b>X</b>—Deletes the gateway router in the address pool.</li> </ul>
Options	<p>Click <b>+</b> to add DHCP option.</p> <p>Enter the following details:</p> <ul style="list-style-type: none"> <li>• <b>Code</b>—Type a number.</li> <li>• <b>Type</b>—Select a type from the list that corresponds to the code.</li> <li>• <b>Value</b>—Type a valid option value based on the type.</li> </ul> <p>You can select the DHCP option and click the pencil icon to edit or click <b>X</b> to delete the DHCP options.</p>
Option-82	<p>Device inserts DHCP option 82 (also known as the DHCP relay agent information option) information.</p> <p>Enter the following details:</p> <ul style="list-style-type: none"> <li>• <b>Circuit Identifier</b>—Enter circuit ID to identify the circuit (interface or VLAN) on the switching device on which the request was received.</li> <li>• <b>Ranges</b>—Enter a value for the circuit ID.</li> <li>• <b>Remote Identifier</b>—Enter remote ID to identify the remote host.</li> <li>• <b>Ranges</b>—Enter a value for the remote ID.</li> </ul>

### Address Range

Click **+** to add address range. After configuring the attributes, click **OK** to save the changes.

Selected an address range and click the pencil icon to edit it or click **X** to delete it.

Name	Enter the address range name.
Low	Enter an IP address that is part of the subnet specified in Address Pool subnet.
High	Enter an IP address that is part of the subnet specified in Address Pool Subnet. This address must be greater than the address specified in Address Range Low.



Table 134: Fields on the Add DHCP Pool Page. *(continued)*

Field	Action
<b>Static Bindings</b>	
Click + to add DHCP static bindings. After configuring the attributes, click <b>OK</b> to save the changes.	
Selected a DHCP static binding and click the pencil icon to edit it or click <b>X</b> to delete it.	
Host Name	Enter the hostname to assign the DHCP client to the MAC address.
Mac Address	Enter the MAC address of the DHCP client.
Fixed IP Address	Enter the fixed address to assign the DHCP client to the MAC address.

RELATED DOCUMENTATION

| [Edit a DHCP Pool](#) | 326.

**Edit a DHCP Pool**

You are here: **Configure** > **Network** > **DHCP** > **DHCP Server**.

To edit a DHCP Pool:

1. Select an existing DHCP Pool that you want to edit on the DHCP Server page.
2. Click the pencil icon available on the upper right side of the DHCP Pools table.

The Edit DHCP Pool page appears. You can edit the network addresses. For more information on the options, see [“Add a DHCP Pool” on page 323](#).

3. Click **OK** to save the changes.

RELATED DOCUMENTATION

| [Delete DHCP Pool](#) | 327.

# Delete DHCP Pool

You are here: **Configure** > **Network** > **DHCP** > **DHCP Server**.

To delete a DHCP Pool:

1. Select a DHCP Pool that you want to delete on the DHCP Server page.
2. Click the delete icon available on the upper right side of the DHCP Pools table.
3. Click **Yes** to delete or click **No** to retain the profile.

## RELATED DOCUMENTATION

[DHCP Groups Global Settings](#) | 327.

# DHCP Groups Global Settings

You are here: **Configure** > **Network** > **DHCP** > **DHCP Server**.

To configure DHCP groups global settings:

1. Click **Global Settings** available on the upper right side of the DHCP Groups table.  
The DHCP Global Configuration page appears.
2. Select the options available in the Available column and move them to Selected column using the arrow to configure the order of the DHCP pool match.
3. Click **OK** to save the changes or click **Cancel** to discard the changes.

## RELATED DOCUMENTATION

[Add a DHCP Group](#) | 328

[Edit a DHCP Group](#) | 328

[Delete DHCP Group](#) | 329

## Add a DHCP Group

You are here: **Configure > Network > DHCP > DHCP Server.**

To add a DHCP Group:

1. Click the add icon (+) on the upper right side of the DHCP Groups table.  
The Add DHCP Group page appears.
2. Complete the configuration according to the guidelines provided in [Table 135 on page 328](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

[Table 135 on page 328](#) describes the fields on the Add DHCP Group.

**Table 135: Fields on the Add DHCP Group Page**

Field	Action
Group Name	Enter a name for the DHCP group.
Routing Instance	Select a routing instance from the list.
Interfaces	Select the interfaces available in the Available column and move them to Selected column using the right arrow.

### RELATED DOCUMENTATION

[Edit a DHCP Group | 328](#)

[Delete DHCP Group | 329](#)

[DHCP Groups Global Settings | 327](#)

## Edit a DHCP Group

You are here: **Configure > Network > DHCP > DHCP Server.**

To edit a DHCP group:

1. Select an existing DHCP group that you want to edit on the DHCP Server page.

2. Click the pencil icon available on the upper right side of the DHCP Groups table.

The Edit DHCP Group page appears with editable fields. For more information on the options, see [“Add a DHCP Group” on page 328](#).

3. Click **OK** to save the changes.

RELATED DOCUMENTATION

[DHCP Groups Global Settings | 327](#)

[Add a DHCP Group | 328](#)

[Delete DHCP Group | 329](#)

## Delete DHCP Group

You are here: **Configure > Network > DHCP > DHCP Server**.

To delete a DHCP group:

1. Select a DHCP group that you want to delete on the DHCP Server page.
2. Click the delete icon available on the upper right side of the DHCP Groups table.
3. Click **Yes** to delete or click **No** to retain the profile.

RELATED DOCUMENTATION

[DHCP Groups Global Settings | 327](#)

[Add a DHCP Group | 328](#)

[Edit a DHCP Group | 328](#)

# Network—Routing Instances

## IN THIS CHAPTER

- [About the Routing Instances Page | 330](#)
- [Add a Routing Instance | 331](#)
- [Edit a Routing Instance | 332](#)
- [Delete Routing Instance | 333](#)
- [Search for Text in a Routing Instances Table | 333](#)

## About the Routing Instances Page

You are here: **Configure** > **Network** > **Routing Instances**.

Use this page to configure routing instances.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Create a routing instance. See [“Add a Routing Instance” on page 331](#).
- Edit a routing instance. See [“Edit a Routing Instance” on page 332](#).
- Delete a routing instance. See [“Delete Routing Instance” on page 333](#).
- Search for Text in a Routing Instances table. See [“Search for Text in a Routing Instances Table” on page 333](#).

### Field Descriptions

[Table 136 on page 331](#) describes the fields on the Routing Instances page.

Table 136: Fields on the Routing Instances Page

Field	Description
Name	Name of the routing instance.
Type	Identifies the routing instance type.
Assigned Interfaces	Displays the selected interfaces assigned to the routing instance.
Description	Displays the description of the routing instances.

## RELATED DOCUMENTATION

| [Add a Routing Instance](#) | 331.

## Add a Routing Instance

You are here: **Configure** > **Network** > **Routing Instances**.

To add a routing interface:

1. Click the add icon (+) available on the upper right side of the Routing Instances page.  
The Create Routing Instance page appears.
2. Complete the configuration according to the guidelines provided in [Table 137 on page 331](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel** instead.  
If you click **OK**, a new routing instance is added with the provided configuration.

Table 137: Fields on the Add Routing Instance

Field	Description
<b>General Settings</b>	
Name	Enter a unique name for the routing instance that contains a corresponding IP unicast table; no special characters are allowed and the keyword default cannot be used.

Table 137: Fields on the Add Routing Instance (*continued*)

Field	Description
Description	Enter a description for the routing instance. We recommend that you enter a maximum of 255 characters.
Instance Type	<p>Select the type of routing instance from the list:</p> <ul style="list-style-type: none"> <li>• Virtual Router—Used for non-VPN related applications.</li> <li>• VPLS—This instance is applicable only for root or super admin. This option will not be applicable for LSYS admin. Interfaces with Encapsulation Ethernet-VPLS will be listed when VPLS instance type is selected.</li> </ul>
Interfaces	<p>Select interfaces from the Available column and move it to the Selected column using the arrow.</p> <ul style="list-style-type: none"> <li>• Name—Displays the interface name.</li> <li>• Zone—Displays the zone name corresponding to the interface name.</li> </ul> <p>This is used to validate that all the interfaces of the selected zone(s) must belong to the same routing instance.</p>

## RELATED DOCUMENTATION

[Edit a Routing Instance](#) | 332

## Edit a Routing Instance

You are here: **Configure** > **Network** > **Routing Instances**.

To edit a routing instance:

1. Select a routing instance that you want to edit on the Routing Instances page.
2. Click the pencil icon available on the upper right side of the page.

The Edit Routing Instance page appears with editable fields. For more information on the fields, see [“Add a Routing Instance” on page 331](#).

3. Click **OK** to save the changes or click **Cancel** to discard the changes.

## RELATED DOCUMENTATION

[Add a Routing Instance | 331](#)

[Delete Routing Instance | 333](#)

## Delete Routing Instance

You are here: **Configure** > **Network** > **Routing Instances**.

To delete a routing instance:

1. Select one or more routing instance that you want to delete on the Routing Instances page.
2. Click the delete icon available on the upper right side of the page.  
A confirmation window appears.
3. Click **Yes** to delete or click **No**.

## RELATED DOCUMENTATION

[Add a Routing Instance | 331](#)

[Edit a Routing Instance | 332](#)

[Search for Text in a Routing Instances Table | 333](#)

## Search for Text in a Routing Instances Table

You are here: **Configure** > **Network** > **Routing Instances**.

You can use the search icon in the top right corner of the Routing Instances page to search for text containing letters and special characters on that page.

To search for text:

1. Click the search icon and enter partial text or full text of the keyword in the search bar.  
The search results are displayed.
2. Click **X** next to a search keyword or click **Clear All** to clear the search results.



## RELATED DOCUMENTATION

| [About the Routing Instances Page](#) | 330

# Network—Static Routing

IN THIS CHAPTER

- [About the Static Routing Page | 335](#)
- [Add a Static Route | 336](#)
- [Edit a Static Route | 337](#)
- [Delete Static Route | 338](#)

## About the Static Routing Page

You are here: **Configure > Network > Routing > Static Routing.**

Use this page to view, add, and remove link aggregation configuration details.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a static route. See [“Add a Static Route” on page 336](#).
- Edit a static route. See [“Edit a Static Route” on page 337](#).
- Delete a static route. See [“Delete Static Route” on page 338](#).

### Field Descriptions

[Table 138 on page 335](#) describes the fields on the Static Routing page.

Table 138: Fields on the Static Routing Page

Field	Description
Route	Displays the static route selected.
Next-hop	Displays the selected next-hop address.

Table 138: Fields on the Static Routing Page (*continued*)

Field	Description
Routing Instance	Displays the routing instance selected for this route.

## RELATED DOCUMENTATION

| [Add a Static Route](#) | 336

## Add a Static Route

You are here: **Configure** > **Network** > **Routing** > **Static Routing**.

To add a static route:

1. Click the add icon (+) on the upper right side of the Static Routing page.  
The Add Static Route page appears.
2. Complete the configuration according to the guidelines provided in [Table 139 on page 336](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel** instead.  
If you click **OK**, a new static route is added with the provided configuration.

Table 139: Fields on the Add Static Route Page

Field	Description
Routing Instance	Select the routing instance from the list.  The selected destination routing instance that points to the routing table containing the tunnel destination address.  <b>NOTE:</b> If you log in as a tenant user, routing instance is not displayed as tenant context supports only one routing instance.
IPv4	Click the IPv4 button.
IP address	Enter the static route IPv4 address.
Subnet mask	Enter the subnet mask. For example, 24 bits represents the 255.255.255.0 address.

Table 139: Fields on the Add Static Route Page (*continued*)

Field	Description
IPv6	Click the IPv6 button.
IPv6 address	Enter the static route IPv6 address.
Prefix	Enter the prefix for IPv6 address.
Next-hop	<p>Displays the next-hop address created.</p> <p>Click any one of the following</p> <ul style="list-style-type: none"> <li>• <b>+</b>—To add the next-hop, enter the following details and click <b>OK</b>: <ul style="list-style-type: none"> <li>• <b>IP Address/IPv6 Address</b>—Enter the IPv4 or IPv6 address based on the selected static route address type.</li> <li>• <b>Interface Name</b>—Select an interface from the list.</li> </ul> </li> <li>• <b>Delete</b>—Select one or more next-hop addresses and click <b>X</b>. Then, click <b>Yes</b> to delete it.</li> </ul>

## RELATED DOCUMENTATION

[Edit a Static Route](#) | 337

## Edit a Static Route

You are here: **Configure** > **Network** > **Routing** > **Static Routing**.

To edit a static route:

1. Select the existing static route that you want to edit on the Static Routing page.
2. Click the pencil icon available on the upper right side of the Static Routing page.

The Edit Static Route page appears with editable fields. For more information on the options, see [“Add a Static Route” on page 336](#).

3. Click **OK** to save the changes.

## RELATED DOCUMENTATION

[Delete Static Route](#) | 338

## Delete Static Route

You are here: **Configure** > **Network** > **Routing** > **Static Routing**.

To delete a static route:

1. Select the existing static route that you want to delete on the Static Routing page.
2. Click the delete icon available on the upper right side of the Static Routing page.

A confirmation window appears.

3. Click **Yes** to delete or click **No**.

## RELATED DOCUMENTATION

[About the Static Routing Page](#) | 335

# Network—RIP Routing

## IN THIS CHAPTER

- [About the RIP Page | 339](#)
- [Add a RIP Instance | 340](#)
- [Edit a RIP Instance | 342](#)
- [Delete RIP Instance | 343](#)
- [Edit RIP Global Settings | 343](#)
- [Delete RIP Global Settings | 346](#)

## About the RIP Page

You are here: **Configure** > **Network** > **Routing** > **RIP**.

Use this page to configure RIP.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a RIP instance. See [“Add a RIP Instance” on page 340](#).
- Edit a RIP instance. See [“Edit a RIP Instance” on page 342](#).
- Delete a RIP instance. See [“Delete RIP Instance” on page 343](#).
- Edit RIP global settings. See [“Edit RIP Global Settings” on page 343](#).
- Delete RIP global settings. See [“Delete RIP Global Settings” on page 346](#).

### Field Descriptions

[Table 140 on page 340](#) describes the fields on the RIP page.

Table 140: Fields on the RIP Page

Field	Description
Routing Instance	Select a routing instance from the list.
<b>RIP Instances</b>	
RIP Instances	Displays the RIP instance selected.
Neighbors	Displays the neighbors selected.
Routing Instance	Displays the routing instance.
Export Policies	Displays the export policies selected.
Import Policies	Displays the import policies selected.
Preference	Displays the preference selected.
Update Interval	Displays the update interval selected.
Metric-out	Displays the metric-out value selected.
<b>RIP Global Settings</b>	
Name	Displays the name of the RIP.
Value	Displays the values for RIP.

## RELATED DOCUMENTATION

| [Add a RIP Instance](#) | 340

## Add a RIP Instance

You are here: **Configure** > **Network** > **Routing** > **RIP**.

To add a RIP instance:

1. Click the add icon (+) on the upper right side of the RIP page.

The Add page appears.

2. Complete the configuration according to the guidelines provided in [Table 141 on page 341](#).

3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel** instead.

If you click **OK**, a new RIP instance is added with the provided configuration.

**Table 141: Fields on the Add Page**

Field	Action
<b>General</b>	
Routing Instance	Select a routing instance from the list to display only the master routing instance or all routing instances.
RIP Instance Name	Enter the RIP instance name.
Preference	Enter the preference of the external routes learned by RIP as compared to those learned from other routing protocols.
Metric out	Enter the metric value to add to routes transmitted to the neighbor.
Update Interval	Enter the update time interval to periodically send out routes learned by RIP to neighbors.
Route Timeout	Enter the route timeout interval for RIP.
<b>Policy</b>	
Import Policy	<p>Specifies one or more policies to control which routes learned from an area are used to generate summary link-state advertisements (LSAs) into other areas.</p> <p>Click one of the following options:</p> <ul style="list-style-type: none"> <li>• <b>+</b>—Adds an import policy.</li> <li>• <b>Move up arrow</b>—Moves the selected policy up the list of policies.</li> <li>• <b>Move down arrow</b>—Moves the selected policy down the list of policies.</li> <li>• <b>X</b>—Removes an import policy.</li> </ul>



Table 141: Fields on the Add Page (*continued*)

Field	Action
Export Policy	<p>Specifies one or more policies to control which summary LSAs are flooded into an area.</p> <p>Click one of the following options:</p> <ul style="list-style-type: none"> <li>• <b>+</b>—Adds an export policy.</li> <li>• <b>Move up arrow</b>—Moves the selected policy up the list of policies.</li> <li>• <b>Move down arrow</b>—Moves the selected policy down the list of policies.</li> <li>• <b>X</b>—Removes an export policy.</li> </ul>
<b>Neighbor</b>	
Displays the RIP-enabled interfaces, its port, metric-in, and update interval.	
Associate	<p>Select interface(s) to associate with the RIP.</p> <p>Select the box next to the interface name to enable RIP on an interface.</p> <p>Click the edit icon to modify one or more selected interfaces settings.</p> <p><b>NOTE:</b> Only logical interfaces for RIP are displayed.</p>

## RELATED DOCUMENTATION

[Edit a RIP Instance](#) | 342

## Edit a RIP Instance

You are here: **Configure** > **Network** > **Routing** > **RIP**.

To edit a RIP instance:

1. Select the existing logical system profile that you want to edit on the RIP page.
2. Click the pencil icon available on the upper right side of the RIP page.

The Edit page appears with editable fields. For more information on the options, see [“Add a RIP Instance” on page 340](#).

3. Click **OK** to save the changes.

## RELATED DOCUMENTATION

| [Delete RIP Instance](#) | 343

## Delete RIP Instance

You are here: **Configure** > **Network** > **Routing** > **RIP**.

To delete a RIP instance:

1. Select the existing logical system profile that you want to delete on the RIP page.
2. Click the delete icon available on the upper right side of the RIP page.

A confirmation window appears.

3. Click **Yes** to delete or click **No**.

## RELATED DOCUMENTATION

| [Edit RIP Global Settings](#) | 343

## Edit RIP Global Settings

You are here: **Configure** > **Network** > **Routing** > **RIP**.

To edit RIP global settings:

1. Click the pencil icon on the upper right side of the RIP Global Settings table.  
The Edit RIP Global Settings page appears.
2. Complete the configuration according to the guidelines provided in [Table 142 on page 344](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 142: Fields on the Edit RIP Global Settings Page

Field	Action
<b>General</b>	
Send	<p>Select a RIP send options from the list:</p> <ul style="list-style-type: none"> <li>• Broadcast</li> <li>• Multicast</li> <li>• None</li> <li>• Version-1</li> </ul>
Receive	<p>Select a RIP receive options from the list:</p> <ul style="list-style-type: none"> <li>• Both</li> <li>• None</li> <li>• Version-1</li> <li>• Version-2</li> </ul>
Route timeout (sec)	Enter the route timeout interval value for RIP.
Update interval (sec)	Enter the update time interval value to periodically send out routes learned by RIP to neighbors.
Hold timeout (sec)	Enter the hold timeout interval period for which the expired route is retained in the routing table before being removed.
Metric in	Enter the metric-in value to add to incoming routes when advertising into RIP routes that were learned from other protocols.
RIB Group	Select a routing table group to install RIP routes into multiple routing tables.
Message size	Enter the number of route entries to be included in every RIP update message.
Check Zero	<p>Specifies whether the reserved fields in a RIP packet are set to zero.</p> <p>Select an option:</p> <ul style="list-style-type: none"> <li>• <b>True</b>—Discards version 1 packets that have nonzero values in the reserved fields and version 2 packets that have nonzero values in the fields that must be zero. This default behavior implements check-zero the RIP version 1 and version 2 specifications.</li> <li>• <b>False</b>—Receives RIP version 1 packets with nonzero values in the reserved fields or RIP version 2 packets with nonzero values in the fields that must be zero. This behavior violates the specifications in RFC 1058 and RFC 2453.</li> </ul>

Table 142: Fields on the Edit RIP Global Settings Page (*continued*)

Field	Action
Graceful switchover	<p>Specifies graceful switch over for RIP.</p> <p>Enter the following:</p> <ul style="list-style-type: none"> <li>• <b>Disable</b>—Select the check box to disable graceful switchover.</li> <li>• <b>Restart time (sec)</b>—Enter the time in seconds for the restart to complete.</li> </ul>
Authentication	<p>Enter the following:</p> <ul style="list-style-type: none"> <li>• <b>Authentication Type</b>—Select the type of authentication for RIP route queries received on an interface. The options available are: <ul style="list-style-type: none"> <li>• None</li> <li>• MD5</li> <li>• Simple</li> </ul> </li> <li>• <b>Authentication key</b>—Enter the authentication key for MD5.</li> </ul>
<b>Policy</b>	
Import Policy	<p>Specifies one or more policies to routes being imported into the local routing device from the neighbors.</p> <p>Click one of the following options:</p> <ul style="list-style-type: none"> <li>• <b>+</b>—Adds an import policy.</li> <li>• <b>Move up arrow</b>—Moves the selected policy up the list of policies.</li> <li>• <b>Move down arrow</b>—Moves the selected policy down the list of policies.</li> <li>• <b>X</b>—Removes an import policy.</li> </ul>
<b>Trace Options</b>	
File Name	Enter the filename to receive the output of the trace operation.
Number of Files	Enter the maximum number of trace files.
File Size	Enter the maximum size for each trace file.
World-readable	<p>Specifies whether or not the trace file can be read by any user or not.</p> <p>Select an option:</p> <ul style="list-style-type: none"> <li>• <b>True</b>—Allows any user to read the file.</li> <li>• <b>False</b>—Restricts all users being able to read the file.</li> </ul>

Table 142: Fields on the Edit RIP Global Settings Page (*continued*)

Field	Action
Flags	Select one or more flags from the Available Flags column and move it to the Configured Flags column using the arrow.

## RELATED DOCUMENTATION

[Delete RIP Global Settings](#) | 346

## Delete RIP Global Settings

You are here: **Configure** > **Network** > **Routing** > **RIP**.

To delete RIP global settings:

1. Select an information that you want to delete on the RIP Global settings table.
2. Click the delete icon available on the upper right side of the RIP Global settings table.  
A confirmation window appears.
3. Click **Yes** to delete or click **No**.

## RELATED DOCUMENTATION

[About the RIP Page](#) | 339

# Network—OSPF Routing

IN THIS CHAPTER

- [About the OSPF Page | 347](#)
- [Add an OSPF | 348](#)
- [Edit an OSPF | 355](#)
- [Delete OSPF | 356](#)
- [Search for Text in an OSPF Table | 356](#)

## About the OSPF Page

You are here: **Configure** > **Network** > **Routing** > **OSPF**.

Use this page to configure OSPF routing.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add an OSPF. See [“Add an OSPF” on page 348](#).
- Edit an OSPF. See [“Edit an OSPF” on page 355](#).
- Delete OSPF. See [“Delete OSPF” on page 356](#).
- Search for text in an OSPF table. See [“Search for Text in an OSPF Table” on page 356](#).

### Field Descriptions

[Table 143 on page 347](#) describes the fields on the OSPF page.

Table 143: Fields on the OSPF Page

Field	Description
Filter	Select an instance for OSPF from the list.

Table 143: Fields on the OSPF Page (*continued*)

Field	Description
Area ID	Displays the area ID selected.
Area Type	Displays the area type selected.
Member Interfaces	Displays the member interface selected.
Version	Displays the version of the interface selected (OSPF for IPv4 and OSPFv3 for IPv6).
Routing Instance	Displays the routing instance of the interface selected. <b>NOTE:</b> This option is not available for tenant users.
Import Policy	Displays the import policy selected. <b>NOTE:</b> This option is not available for tenant users.
Export Policy	Displays the export policy selected. <b>NOTE:</b> This option is not available for tenant users.

## RELATED DOCUMENTATION

| [Add an OSPF](#) | 348

## Add an OSPF

You are here: **Configure** > **Network** > **Routing** > **OSPF**.

To add an OSPF routing:

1. Click the add icon (+) on the upper right side of the OSPF page.  
The Create OSPF page appears.
2. Complete the configuration according to the guidelines provided in [Table 144 on page 349](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel** instead.

If you click **OK**, a new OSPF routing is added with the provided configuration.

**Table 144: Fields on the Add an OSPF Page**

Field	Action
<b>Basic Settings</b>	
Routing Instance	<p>Select the routing instance from the list or create a new routing instance inline.</p> <p><b>NOTE:</b> This option is not available for tenant users.</p> <p>To add a new routing instance inline:</p> <ol style="list-style-type: none"> <li>1. Click <b>Add</b>.</li> </ol> <p>The Create Routing Instance page appears.</p> <ol style="list-style-type: none"> <li>2. Enter the following details: <ul style="list-style-type: none"> <li>• <b>General Settings</b> <ul style="list-style-type: none"> <li>• <b>Name</b>—Enter a unique name for the routing instance that contains a corresponding IP unicast table; no special characters are allowed and the keyword default cannot be used.</li> <li>• <b>Description</b>—Enter a description for the routing instance. We recommend that you enter a maximum of 255 characters.</li> <li>• <b>Instance Type</b>—Select a type of routing instance from the list: <ul style="list-style-type: none"> <li>• <b>Virtual Router</b>—Used for non-VPN related applications.</li> <li>• <b>VPLS</b>—This instance is applicable only for root or super admin. This option will not be applicable for LSYS admin. Interfaces with Encapsulation Ethernet-VPLS will be listed when VPLS instance type is selected.</li> </ul> </li> <li>• <b>Interfaces</b>—Select one or more interfaces to associate with the routing instance from the Available column and move it to the Selected column using arrow.</li> </ul> <p>To search for specific interface, click the search icon and enter partial text or full text of the keyword in the search bar.</p> </li> <li>3. Click <b>OK</b> to save changes.</li> </ul></li></ol>
<b>Routing Options</b>	
Router ID	Enter the ID of the routing device.
Traffic Engineering	Enable this option if you want the traffic to be managed or engineered.
<b>NOTE:</b> This option is not available for OSPFv3.	



Table 144: Fields on the Add an OSPF Page (continued)

Field	Action
<b>Area Details</b>	
Area Id	<p>Specifies the uniquely identified area within its AS.</p> <p>Type a 32-bit numeric identifier for the area.</p> <p>Type an integer or select and edit the value.</p> <p>If you enter an integer, the value is converted to a 32-bit equivalent. For example, if you enter 3, the value assigned to the area is <b>0.0.0.3</b>.</p>

Table 144: Fields on the Add an OSPF Page (*continued*)

Field	Action
Area Range	<p>Displays a range of IP addresses for the summary link state advertisements (LSAs) to be sent within an area.</p> <p>Select an option:</p> <ol style="list-style-type: none"> <li>To add an area range form: <ol style="list-style-type: none"> <li>Click <b>+</b>. The Create Area Range form page appears.</li> <li>Enter the following details: <ul style="list-style-type: none"> <li>Area Range—Enter the area range address. <b>NOTE:</b> For OSPF, enter an IPv4 address and for OSPFv3 enter an IPv6 address.</li> <li>Subnet mask—Enter the subnet mask area address. <b>NOTE:</b> This option is available only for IPv4 address.</li> <li>Override metric—Select a value to override the metric for the IP address range. Range: 1025 through 65534.</li> </ul> </li> <li>Select <b>Restrict Advertisements of this area range</b> to specify that the routes contained within a summary must not be displayed.</li> <li>Select <b>Enforce exact match for advertisements of this area range</b> to specify that the summary of a route must be advertised only when an exact match is made within the configured summary range.</li> <li>Click <b>OK</b>.</li> </ol> </li> <li>To edit the selected are range: <ol style="list-style-type: none"> <li>Select the existing area range.</li> <li>Click the pencil icon to edit the selected area range. The Edit Area Range form page appears with editable fields.</li> <li>Click <b>OK</b> to save the changes.</li> </ol> </li> <li>To delete an area range: <ol style="list-style-type: none"> <li>Select the area range that you want to delete.</li> <li>Click the delete icon. A confirmation message appears.</li> <li>Click <b>Yes</b> to delete the selected area range.</li> </ol> </li> </ol>
Version	<p>Select the version of the OSPF:</p> <ul style="list-style-type: none"> <li>ospf—Enables OSPF routing on the routing device.</li> <li>ospf3—Enables OSPFv3 routing on the routing device.</li> </ul>

Table 144: Fields on the Add an OSPF Page (*continued*)

Field	Action
<p>Area Type</p> <p><b>NOTE:</b> This option is not applicable for area zero.</p>	<p>Specifies the type of OSPF area.</p> <p>Select an option from the list:</p> <ul style="list-style-type: none"> <li>• <b>None</b>—A regular OSPF area, including the backbone area.</li> <li>• <b>stub</b>—A stub area.</li> <li>• <b>nssa</b>—A not-so-stubby area (NSSA).</li> </ul>
<p>No Summaries (Totally Stubby area)</p> <p><b>NOTE:</b> This option is applicable for non-zero area and it is not applicable for area zero.</p>	<p>Enable or disable the summaries.</p> <p><b>NOTE:</b> This option can be configured when area-type is nssa or stub.</p>
<p>Virtual Link</p> <p><b>NOTE:</b> This option is applicable for area zero and it is not applicable for non-zero area.</p>	<p>Select whether you want the virtual link to be established. If you select virtual link to be created, then enter the Neighbor ID and Transit area. Transit area is the area that has virtual link connecting two or more ABRs attached to this area.</p>
<b>Interface Details</b>	
Select Interface	Select one or more interfaces to associate with the routing instance from the Available column and move it to the Selected column using arrow.
Interface type	<p>Specifies the interfaces to be associated with the OSPF configuration.</p> <p>Select an option from the list:</p> <ul style="list-style-type: none"> <li>• <b>None</b>—No interface.</li> <li>• <b>nbma</b>—Non broadcast multiaccess (NBMA) interface.</li> </ul> <p><b>NOTE:</b> This option is not available for OSPFv3.</p> <ul style="list-style-type: none"> <li>• <b>p2mp</b>—Point-to-multipoint interface.</li> <li>• <b>p2p</b>—Point-to-point interface.</li> <li>• <b>p2mp-over-lan</b>—Point-to-multipoint over LAN mode.</li> </ul> <p><b>NOTE:</b> This option is not available for OSPF.</p>
Interface Metric	Type the metric that you want for measuring the interface.

Table 144: Fields on the Add an OSPF Page (*continued*)

Field	Action
Passive mode	<p>Enable this option for the passive mode.</p> <p><b>NOTE:</b> You can enable this option only if Secondary option is disabled and vice-versa.</p>
<b>Advanced</b>	
Bidirectional Forward Detection	<p>Enable this option for the bidirectional forward detection (BFD) protocol version that you want to detect.</p> <p>If you enable, enter the following details:</p> <ul style="list-style-type: none"> <li>• BFD Version—Select the bidirectional forward detection version from the list: <ul style="list-style-type: none"> <li>• None—No BFD version is used.</li> <li>• automatic—Autodetects the BFD protocol version.</li> <li>• BFD Version 0—Uses BFD protocol version 0.</li> <li>• BFD Version 1—Uses BFD protocol version 1.</li> </ul> </li> <li>• Minimum Interval—Enter the minimum interval value for BFD in milliseconds. Range: 1 through 255,000.</li> <li>• Minimum Receive Interval—Enter the minimum receive interval value. Range: 1 through 255,000.</li> </ul>
IPSec security association	<p>Select a number of one of the security associations from the list.</p> <p>By default, no security keys are configured.</p> <p><b>NOTE:</b> You can configure this option only if Secondary option is disabled and vice-versa.</p>
Link protection	<p>Enable this option. Creates a backup loop-free alternate path to the primary next hop for all destination routes that traverse the protected interface.</p> <p><b>NOTE:</b> You can either enable Link protection or Node Link protection at a time. For example, if you enable Link protection, then Node Link protection is automatically disabled.</p>
Node Link protection	<p>Enable this option. Creates an alternate loop-free path to the primary next hop for all destination routes that traverse a protected interface.</p> <p><b>NOTE:</b> You can either enable Link protection or Node Link protection at a time. For example, if you enable Link protection, then Node Link protection is automatically disabled.</p>

Table 144: Fields on the Add an OSPF Page (*continued*)

Field	Action
Secondary	<p>Enable this option. Specifies an interface to belong to another OSPF area.</p> <p><b>NOTE:</b> You can enable this option only if Passive Mode is disabled and IPSec security association is not configured and vice-versa.</p>
Authentication  <b>NOTE:</b> This option is not available for OSPFv3.	<p>Select an authentication key (password) from the list:</p> <ul style="list-style-type: none"> <li>• None</li> <li>• md5</li> <li>• simplepassword</li> </ul>
MD5 Authentication Key  <b>NOTE:</b> This option is not available for OSPFv3.	<p>Specifies an MD5 authentication key (password).</p> <p>Click + and enter the following details:</p> <ul style="list-style-type: none"> <li>• MD5 ID—MD5 key identifier. Range: 0 through 255.</li> <li>• Key—One or more MD5 key strings. The MD5 key values can be from 1 through 16 characters long. Characters can include ASCII strings. If you include spaces, enclose all characters in quotation marks (" ").</li> <li>• Start Time—MD5 start time.</li> </ul> <p>Then, click tick mark to save the changes.</p>
Simple Password  <b>NOTE:</b> This option is not available for OSPFv3.	<p>Enter a a simple authentication key (password).</p>

### Advanced Settings

#### Policy

**NOTE:** This option is not available for tenant users.

Import Policy	<p>Specifies one or more policies to control which routes learned from an area are used to generate summary link-state advertisements (LSAs) into other areas.</p> <p>Click one of the following options:</p> <ul style="list-style-type: none"> <li>• +—Adds an import policy.</li> <li>• <b>Move up</b>—Moves the selected policy up the list of policies.</li> <li>• <b>Move down</b>—Moves the selected policy up the list of policies down.</li> <li>• <b>X</b>—Removes the import policy.</li> </ul>
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Table 144: Fields on the Add an OSPF Page (*continued*)

Field	Action
Export Policy	<p>Specifies one or more policies to control which summary LSAs are flooded into an area.</p> <p>Click one of the following options:</p> <ul style="list-style-type: none"> <li>• <b>+</b>—Adds an import policy.</li> <li>• <b>Move up</b>—Moves the selected policy up the list of policies.</li> <li>• <b>Move down</b>—Moves the selected policy up the list of policies down.</li> <li>• <b>X</b>—Removes the import policy.</li> </ul>
<b>Trace Options</b>	
File Name	Enter the name of the file to receive the output of the trace operation.
Number of files	Enter the maximum number of trace files.
File Size	Enter the maximum size for each trace file.
World Readable	<p>Enable this option to allow any user to read the file.</p> <p>Disable this option to prevent all users from reading the file.</p>
<b>Flags</b>	<p>Specifies the trace operation to be performed.</p> <p>Select one or more flags in the Available column and move them to the Selected column using the right arrow.</p>

## RELATED DOCUMENTATION

[Edit an OSPF](#) | 355

## Edit an OSPF

You are here: **Configure** > **Network** > **Routing** > **OSPF**.

To edit an OSPF routing:

1. Select an existing OSPF routing that you want to edit on the OSPF page.
2. Click the pencil icon available on the upper right side of the OSPF page.

The Create OSPF page appears with editable fields. For more information on the options, see [“Add an OSPF” on page 348](#).

3. Click **OK** to save the changes.

#### RELATED DOCUMENTATION

| [Delete OSPF](#) | 356

## Delete OSPF

You are here: **Configure** > **Network** > **Routing** > **OSPF**.

To delete an OSPF routing:

1. Select an existing OSPF routing that you want to delete on the OSPF page.
2. Click the delete icon available on the upper right side of the OSPF page.  
A confirmation window appears.
3. Click **Yes** to delete or click **No**.

#### RELATED DOCUMENTATION

| [Search for Text in an OSPF Table](#) | 356

## Search for Text in an OSPF Table

You can use the search icon in the top right corner of the OSPF page to search for text containing letters and special characters on that page.

To search for text:

1. Click the search icon and enter partial text or full text of the keyword in the search bar.  
The search results are displayed.

2. Click **X** next to a search keyword or click **Clear All** to clear the search results.

#### RELATED DOCUMENTATION

| [About the OSPF Page | 347](#)



# Network—BGP Routing

IN THIS CHAPTER

- [About the BGP Page | 358](#)
- [Add a BGP Group | 360](#)
- [Edit a BGP Group | 365](#)
- [Delete a BGP Group | 366](#)
- [Edit Global Information | 366](#)

## About the BGP Page

You are here: **Configure** > **Network** > **Routing** > **BGP**.

Use this page to configure BGP routing.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Create a routing instance. See [“Add a BGP Group” on page 360](#).
- Edit a routing instance. See [“Edit a BGP Group” on page 365](#).
- Delete a routing instance. See [“Delete a BGP Group” on page 366](#).
- Disable group information. To do this, select an existing group information and click **Disable**.
- Edit global information. See [“Edit Global Information” on page 366](#).
- Disable global information. To do this, select an existing global information and click **Disable**.

### Field Descriptions

[Table 145 on page 359](#) describes the fields on the BGP page.

Table 145: Fields on the BGP Page

Field	Description
Routing Instance  <b>NOTE:</b> If you log in as a tenant user, the Routing Instance is not displayed as tenant context supports only one routing instance.	Select routing instances from the list. Example: Primary or All routing instances.
Group Name	Displays the name of the group.
Status	Displays the status of the group.
Peer ASN	Displays the peer ASN.
Type	Displays the group type.
Dynamic Peers	Displays the dynamic peers selected.
Static Peers	Displays the static peers selected.
Routing Instance	Displays the routing instance selected.
Import Policy	Displays the import policy selected.  <b>NOTE:</b> If you log in as a tenant user, Routing Instance, Import Policy, and Export Policy are not displayed.
Export Policy	Displays the export policy selected.  <b>NOTE:</b> If you log in as a tenant user, Routing Instance, Import Policy, and Export Policy are not displayed.

### Global Information

The global information values corresponding to the routing instance that you selected will be displayed in the Global Information section. Based on the routing instance that you select, the values in the Global information.

Edit	Edits the Global settings which lists the following fields. See <a href="#">“Edit Global Information” on page 366</a> .
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Table 145: Fields on the BGP Page (*continued*)

Field	Description
Name	<p>Displays the following names:</p> <ul style="list-style-type: none"> <li>• Router Identifier—Specifies the routing device's IP address.</li> <li>• BGP Status—Enables or disables BGP.</li> <li>• Router ASN—Specifies the routing device's AS number.</li> <li>• Preference—Specifies the route preference.</li> <li>• Confederation—Specifies the routing device's confederation AS number.</li> </ul> <p><b>NOTE:</b> If you log in as a tenant user, Confederation is not displayed.</p> <ul style="list-style-type: none"> <li>• Confederation Members—Specifies the AS numbers for the confederation members.</li> </ul> <p><b>NOTE:</b> If you log in as a tenant user, Confederation Members is not displayed.</p> <ul style="list-style-type: none"> <li>• Description—Specifies the text description of the global, group, or neighbor configuration.</li> <li>• Import Policy—Specifies one or more routing policies for routes being imported into the routing table from BGP.</li> </ul> <p><b>NOTE:</b> If you log in as a tenant user, Import Policy is not displayed.</p> <ul style="list-style-type: none"> <li>• Export Policy—Specifies one or more policies to routes being exported from the routing table into BGP.</li> </ul> <p><b>NOTE:</b> If you log in as a tenant user, Export Policy is not displayed.</p>

## RELATED DOCUMENTATION

[Add a BGP Group](#) | 360

## Add a BGP Group

You are here: **Configure** > **Network** > **Routing** > **BGP**.

To add a BGP Group:

1. Click the add icon (+) on the upper right side of the BGP Group page.

The Add a Group page appears.

2. Complete the configuration according to the guidelines provided in [Table 146 on page 361](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

**Table 146: Fields on the Add a Group Page**

Field	Action
<b>General</b>	
Routing Instance  <b>NOTE:</b> If you log in as a tenant user, the Routing Instance is not displayed as tenant context supports only one routing instance.	Select a routing instance from the list.
Group Name	Enter a new group name.
ASN	Specifies the unique numeric identifier of the AS in which the routing device is configured.  Enter the routing device's 32-bit AS number, in dotted decimal notation.  If you enter an integer, the value is converted to a 32-bit equivalent. For example, if you enter <b>3</b> , the value assigned to the AS is <b>0.0.0.3</b> .
Preference	Enter the degree of preference value for an external route.  The route with the highest local preference value is preferred.
Cluster Id	Enter the IPv6 or IPv4 address to be used as the cluster identifier.  The cluster identifier is used by the route reflector cluster in an internal BGP group.
Description	Enter the text description for the global, group, or neighbor configuration.
Damping	Select the check box to enable route flap damping.
Advertise Inactive Routes	Select the check box to enable advertising of inactive routes.
Advertise Peer AS Routes	Select the check box to advertising of peer AS routes.
<b>Neighbors</b>	

Table 146: Fields on the Add a Group Page (*continued*)

Field	Action
Dynamic Neighbors	<p>Configures a dynamic neighbor (peer).</p> <p>Select one of the following options:</p> <ol style="list-style-type: none"> <li>To add a dynamic neighbor: <ol style="list-style-type: none"> <li>Click <b>+</b>. The Add Dynamic Neighbor window appears.</li> <li>Select one of the following options in the Addresses field: <ul style="list-style-type: none"> <li>• All</li> <li>• IPv4</li> <li>• IPv6</li> </ul> </li> <li>Enter the following details if you select IPv4 in the Addresses field: <ul style="list-style-type: none"> <li>• IP Address—Enter the IPv4 address for dynamic neighbor.</li> <li>• Subnet Mask—Enter the subnet mask for the IPv4 address.</li> </ul> </li> <li>Enter the following details if you select IPv6 in the Addresses field: <ul style="list-style-type: none"> <li>• IPv6 Address—Enter the IPv6 address for dynamic neighbor.</li> <li>• Prefix—Enter the prefix length using up and down arrows for the IPv6 address.</li> </ul> </li> <li>Click <b>OK</b> to save changes.</li> </ol> </li> <li>To edit a dynamic neighbor: <ol style="list-style-type: none"> <li>Select the existing dynamic neighbor address.</li> <li>Click the pencil icon to edit the selected dynamic neighbor address. The Edit Dynamic Neighbor window appears with editable fields.</li> <li>Click <b>OK</b> to save changes.</li> </ol> </li> <li>To delete a dynamic neighbor: <ol style="list-style-type: none"> <li>Select the existing dynamic neighbor address.</li> <li>Click the delete icon (<b>X</b>) to delete the selected dynamic neighbor address.</li> </ol> </li> </ol>

Table 146: Fields on the Add a Group Page *(continued)*

Field	Action
Static Neighbors	

Table 146: Fields on the Add a Group Page (*continued*)

Field	Action
	<p>Configures a static neighbor (peer).</p> <p>Select one of the following options:</p> <ol style="list-style-type: none"> <li>To add a static neighbor: <ol style="list-style-type: none"> <li>Click <b>+</b>. The Add Static Neighbor window appears.</li> <li>Enter the following details: <ul style="list-style-type: none"> <li>Addresses—Select IPv4 or IPv6.</li> <li>IP Address—Enter the IPv4 address for static neighbor.</li> <li>Local Address—Enter the IP address for static neighbor.</li> <li>Preference—Enter the preference value for an external route. The route with the highest local preference value is preferred.</li> <li>Description—Enter a description.</li> <li>Hold Time—Enter the hold timeout interval period.</li> <li>Out Delay—Enter the output delay time. Range: 0 through 65,535 seconds.</li> <li>Passive—Select the check box to enable the device to be passive. The routing device will wait for the peer to issue an open request before a message is sent.</li> <li>As Override—Select the check box to replace all occurrences of the peer AS number in the AS path with its own AS number before advertising the route to the peer.</li> <li>Import Policy—Select one of the following options: <ul style="list-style-type: none"> <li><b>+</b>—Adds an import policy.</li> <li><b>Move up</b>—Moves the selected policy up the list of policies.</li> <li><b>Move down</b>—Moves the selected policy down.</li> <li><b>X</b>—Removes an import policy.</li> </ul> </li> <li>Export Policy—Select one of the following options: <ul style="list-style-type: none"> <li><b>+</b>—Adds an import policy.</li> <li><b>Move up</b>—Moves the selected policy up the list of policies.</li> <li><b>Move down</b>—Moves the selected policy down.</li> <li><b>X</b>—Removes an import policy.</li> </ul> </li> </ul> </li> <li>Click <b>OK</b> to save changes.</li> </ol> </li> <li>To edit a static neighbor: <ol style="list-style-type: none"> <li>Select the existing static neighbor address.</li> <li>Click the pencil icon to edit the selected static neighbor address. The Edit Static Neighbor window appears with editable fields.</li> </ol> </li> </ol>

Table 146: Fields on the Add a Group Page (*continued*)

Field	Action
	<ul style="list-style-type: none"> <li>c. Click <b>OK</b> to save changes.</li> </ul> <p>3. To delete a static neighbor:</p> <ul style="list-style-type: none"> <li>a. Select the existing static neighbor address.</li> <li>b. Click the delete icon (<b>X</b>) to delete the selected static neighbor address.</li> </ul>
<b>Policies Tab</b>	
Import Policy	<p>Specifies one or more routing policies for routes being imported into the routing table from BGP.</p> <p>Select one of the following options:</p> <ul style="list-style-type: none"> <li>• <b>+</b>—Adds an import policy.</li> <li>• <b>Move up</b>—Moves the selected policy up the list of policies.</li> <li>• <b>Move down</b>—Moves the selected policy down.</li> <li>• <b>X</b>—Removes an import policy.</li> </ul>
Export Policy	<p>Specifies one or more policies to routes being exported from the routing table into BGP.</p> <p>Select one of the following options:</p> <ul style="list-style-type: none"> <li>• <b>+</b>—Adds an import policy.</li> <li>• <b>Move up</b>—Moves the selected policy up the list of policies.</li> <li>• <b>Move down</b>—Moves the selected policy down.</li> <li>• <b>X</b>—Removes an import policy.</li> </ul>

## RELATED DOCUMENTATION

[Edit a BGP Group](#) | 365

## Edit a BGP Group

You are here: **Configure** > **Network** > **Routing** > **BGP**.

To edit a BGP group :

1. Select an existing BGP group that you want to edit on the BGP page.



2. Click the pencil icon available on the upper right side of the BGP page.

The Edit a Group page appears with editable fields. For more information on the fields, see [“Add a BGP Group” on page 360](#).

3. Click **OK** to save the changes.

#### RELATED DOCUMENTATION

| [Delete a BGP Group](#) | 366

## Delete a BGP Group

You are here: **Configure** > **Network** > **Routing** > **BGP**.

To delete a BGP group:

1. Select an existing BGP group that you want to delete on the BGP page.
2. Click the delete icon available on the upper right side of the BGP page.

A confirmation window appears.

3. Click **Yes** to delete or click **No**.

#### RELATED DOCUMENTATION

| [Edit Global Information](#) | 366

## Edit Global Information

You are here: **Configure** > **Network** > **Routing** > **BGP**.

To edit BGP global information:

1. Select an existing global information that you want to edit on the BGP page.
2. Click the pencil icon available on the upper right side of the Global Information table.

The Edit Global Settings page appears.

- 3. Complete the configuration according to the guidelines provided in [Table 147 on page 367](#).
- 4. Click **OK** to save the changes.

Table 147: Fields on the Edit Global Settings Page

Field	Action
<b>General</b>	
Router ASN	Enter the router ASN value.
Router Identifier	Enter the router identification IP address.
BGP Status	Select an option from the list: Enable or Disable.
Preference	Enter the degree of preference value for an external route.  The route with the highest local preference value is preferred.
Description	Enter the description.
Confederation Number	Enter the router confederation ASN value.

Table 147: Fields on the Edit Global Settings Page (*continued*)

Field	Action
Confederation Members	<p>Specifies the AS numbers for the confederation members.</p> <p>Select one of the following options:</p> <ol style="list-style-type: none"> <li>To add a member ASN: <ol style="list-style-type: none"> <li>Click <b>+</b>. The Confederation Members window appears.</li> <li>Enter member ASN value in the Member ASN field.</li> <li>Click <b>OK</b> to save changes.</li> </ol> </li> <li>To edit a member ASN: <ol style="list-style-type: none"> <li>Select an existing member ASN value and click the pencil icon. The Confederation Members window appears.</li> <li>Edit member ASN value in the Member ASN field.</li> <li>Click <b>OK</b> to save changes.</li> </ol> </li> <li>To delete a member ASN: <ol style="list-style-type: none"> <li>Select an existing member ASN value. The Confederation Members window appears.</li> <li>click the delete icon to delete the member ASN value.</li> </ol> </li> </ol>
<b>Advance Options</b>	
Keep Route	<p>Specifies whether routes learned from a BGP peer must be retained in the routing table even if they contain an AS number that was exported from the local AS.</p> <p>Select <b>All</b> or <b>None</b> to configure keep routes.</p>
TCP MSS	
MTU Discovery	Select the check box to enable MTU discovery.
Remove Private ASN	Select the check box to enable removal of private ASNs.
Graceful Restart	<p>Enter the following details:</p> <ul style="list-style-type: none"> <li>Restart Time—Enter the period of time after which a restart is expected to be complete.</li> <li>Stale Routes Time—Enter the maximum time that stale routes are kept during restart.</li> </ul>

Table 147: Fields on the Edit Global Settings Page (*continued*)

Field	Action
Multihop	<p>Specifies the maximum time-to-live (TTL) value for the TTL in the IP header of BGP packets.</p> <p>Enter the following details:</p> <ul style="list-style-type: none"> <li>• Nexthop Change—Select the check box to allow unconnected third-party next hops.</li> <li>• TTL—Enter a TTL value.</li> </ul>
Authentication	<p>Enter the following details:</p> <ul style="list-style-type: none"> <li>• Authentication Algorithm—Select an option from the list: None, MD5, or SHA1.</li> <li>• Authentication Key—Enter an MD5 authentication key (password). This option is available if you select MD5 as authentication algorithm.</li> </ul>

### Policies Tab

**NOTE:** If you log in as a tenant user, Policy tab is not displayed.

Import Policy	<p>Applies one or more policies to routes being imported into the local routing device from the neighbors.</p> <p>Select one of the following options:</p> <ul style="list-style-type: none"> <li>• +—Adds an import policy.</li> <li>• <b>Move up</b>—Moves the selected policy up the list of policies.</li> <li>• <b>Move down</b>—Moves the selected policy down.</li> <li>• <b>X</b>—Removes an import policy.</li> </ul>
Export Policy	<p>Specifies one or more policies to control which summary LSAs are flooded into an area.</p> <p>Select one of the following options:</p> <ul style="list-style-type: none"> <li>• +—Adds an import policy.</li> <li>• <b>Move up</b>—Moves the selected policy up the list of policies.</li> <li>• <b>Move down</b>—Moves the selected policy down.</li> <li>• <b>X</b>—Removes an import policy.</li> </ul>

### Trace Options Tab

File Name	Enter the name of the file to receive the output of the trace operation.
Number of Files	Enter the maximum number of trace files.
File Size	Enter the maximum size for each trace file.

Table 147: Fields on the Edit Global Settings Page *(continued)*

Field	Action
World Readable	<p>Specifies whether the trace file can be read by any user.</p> <p>Select an option:</p> <ul style="list-style-type: none"><li>• <b>True</b>—Allows any user to read the file.</li><li>• <b>False</b>—Prevents all users from reading.</li></ul>
Flags	<p>Select one or more flags from the Available Flags column and move it to the Configured Flags column using the arrow.</p>

RELATED DOCUMENTATION

| [About the BGP Page](#) | 358

# Network—ALG

IN THIS CHAPTER

- About the ALG Page | 371

## About the ALG Page

You are here: **Configure** > **Network** > **ALG**.

Use this page to configure Application Layer Gateway (ALG).

### Field Descriptions

Table 148 on page 371 describes the fields on the ALG page.

Once the configuration is complete, click **OK** to save the changes or click **Reset** to revert back the changes.

Table 148: Fields on the ALG Page

Field	Description
<b>Main</b>	
Enable PPTP	Select the check box to enable the Point-to-Point Tunneling Protocol (PPTP) for ALG.  PPTP is a Layer 2 protocol that tunnels PPP data across TCP/IP networks. The PPTP client is freely available on Windows systems and is widely deployed for building VPNs.
Enable RSH	Select the check box to enable RSH for ALG.  The RSH ALG handles TCP packets destined for port 514 and processes the RSH port command. The RSH ALG performs NAT on the port in the port command and opens gates as necessary.
Enable RTSP	Select the check box to enable the Real-Time Streaming Protocol (RTSP) for ALG.

Table 148: Fields on the ALG Page (*continued*)

Field	Description
Enable SQL	<p>Select the check box to enable Structured Query Language (SQL) for ALG.</p> <p>The SQLNET ALG processes SQL TNS response frames from the server side. It parses the packet and looks for the (HOST=ipaddress), (PORT=port) pattern and performs NAT and gate opening on the client side for the TCP data channel.</p>
Enable TALK	<p>Select the check box to enable the TALK protocol for ALG.</p> <p>The TALK protocol uses UDP port 517 and port 518 for control-channel connections. The talk program consists of a server and a client. The server handles client notifications and helps to establish talk sessions. There are two types of talk servers: ntalk and talkd. The TALK ALG processes packets of both ntalk and talkd formats. It also performs NAT and gate opening as necessary.</p>
Enable TFTP	<p>Select the check box to enable the Trivial File Transfer Protocol (TFTP) for ALG.</p> <p>The TFTP ALG processes TFTP packets that initiate a request and opens a gate to allow return packets from the reverse direction to the port that sends the request.</p>
<b>DNS</b>	
Enable DNS	<p>Select the check box to enable the domain name system (DNS) for ALG.</p> <p>The DNS ALG monitors DNS query and reply packets and closes the session if the DNS flag indicates the packet is a reply message.</p>
Doctoring	<p>Select one of the following options:</p> <ul style="list-style-type: none"> <li>• Sanity Check—Performs only DNS ALG sanity checks.</li> <li>• None—Disables all DNS ALG doctoring.</li> </ul>
Maximum Message length	<p>Select a number to specify the maximum DNS message length.</p> <p>Range: 512 through 8192 bytes.</p>
Enable Oversize message drop.	<p>Select the check box to enable oversize message drop.</p>
<b>FTP</b>	

Table 148: Fields on the ALG Page (*continued*)

Field	Description
Enable FTP	<p>Select the check box to enable the File Transfer Protocol (FTP) for ALG.</p> <p>The FTP ALG monitors PORT, PASV, and 227 commands. It performs Network Address Translation (NAT) on IP/port in the message and gate opening on the device as necessary. The FTP ALG supports FTP put and FTP get command blocking. When FTP_NO_PUT or FTP_NO_GET is set in the policy, the FTP ALG sends back a blocking command and closes the associated opened gate when it detects an FTP STOR or FTP RETR command.</p>
Enable allow mismatch IP address	Select the check box to allow any mismatch in IP address.
Enable FTPs Extension	Select the check box to enable secure FTP and FTP SSL protocols.
Enable line Break Extension	<p>Select the check box to enable line-break-extension.</p> <p>This option will enable the FTP ALG to recognize the LF as line break in addition to the standard CR+LF (carriage return, followed by line feed).</p>
<b>H323</b>	
Enable H323	Select the check box to enable the H.323 ALG.



Table 148: Fields on the ALG Page (*continued*)

Field	Description
Application Screen	<p>Specify the security screens for the H.323 protocol ALG.</p> <p>Enter the following details:</p> <ul style="list-style-type: none"> <li>• <b>Message Flood Gatekeeper Threshold</b>—Enter a value. The value range is 1 to 50000 messages per second. Limits the rate per second at which remote access server (RAS) requests to the gatekeeper are processed. Messages exceeding the threshold are dropped. This feature is disabled by default.</li> <li>• <b>Action on receiving unknown message:</b> <ul style="list-style-type: none"> <li>• <b>Enable Permit NAT Applied</b>—Select the check box to specify how unidentified H.323 (unsupported) messages are handled by the device. The default is to drop unknown messages. Permitting unknown messages can compromise security and is not recommended. However, in a secure test or production environment, this statement can be useful for resolving interoperability issues with disparate vendor equipment. By permitting unknown H.323 messages, you can get your network operational and later analyze your VoIP traffic to determine why some messages were being dropped. This statement applies only to received packets identified as supported VoIP packets. If a packet cannot be identified, it is always dropped. If a packet is identified as a supported protocol, the message is forwarded without processing.</li> <li>• <b>Enable Permit Routed</b>—Select the check box to specify that unknown messages be allowed to pass if the session is in route mode. Sessions in transparent mode are treated as though they are in route mode.</li> </ul> </li> </ul>
DSCP Code Rewrite	<p><b>Code Point</b>—Select a 6-bit string from the list.</p> <p>Specifies a rewrite-rule for the traffic that passes through a voice over IP Application Layer Gateway (VoIP ALG). The value of code point is in binary format.</p> <p>The VoIP rewrite rules modifies the appropriate class of service (CoS) bits in an outgoing packets through Differentiated Services Code Point (DSCP) mechanism that improves the VoIP quality in a congested network.</p>
Endpoints	<p>Enter the following details:</p> <ul style="list-style-type: none"> <li>• <b>Timeout For Endpoint</b>—Enter a timeout value in seconds for entries in the NAT table. Range: 10 through 50,000 seconds Controls the duration of the entries in the NAT table.</li> <li>• <b>Enable Permit Media From Any Source Port</b>—Select this option to allow media traffic from any port number.</li> </ul>

Table 148: Fields on the ALG Page (*continued*)

Field	Description
<b>IKE-ESP</b>	
Enable IKE-ESP	Select the check box to enable IKE-ESP.
ESP Gate Timeout (sec)	Select the gate timeout from 2 to 30 seconds.
ESP Session Timeout (sec)	Select the ESP timeout session from 60 to 2400 seconds.
ALG State Timeout (Sec)	Select the ALG state time out from 180 to 86400 sec.
<b>MGCP</b>	
Enable MGCP	Select the check box to enable the Media Gateway Control Protocol (MGCP).
Inactive Media Timeout	<p>Select a value to specify the maximum amount of time that the temporary openings in the firewall (pinholes) remain open for media if no activity is detected. range is from 10 through 2,550 seconds.</p> <p>Specifies the maximum time (in seconds) a call can remain active without any media (RTP or RTCP) traffic within a group. Each time an RTP or RTCP packet occurs within a call, this timeout resets. When the period of inactivity exceeds this setting, the temporary openings (pinholes) in the firewall MGCP ALG opened for media are closed. The default setting is 120 seconds; the range is from 10 to 2550 seconds. Note that, upon timeout, while resources for media (sessions and pinholes) are removed, the call is not terminated.</p>
Maximum Call Duration	<p>Select a value from 3 through 720 minutes.</p> <p>Sets the maximum length of a call. When a call exceeds this parameter setting, the MGCP ALG tears down the call and releases the media sessions. The default setting is 720 minutes; the range is from 3 to 720 minutes.</p>
Transaction Timeout	<p>Enter a value from 3 through 50 seconds to specify</p> <p>Specifies a timeout value for MGCP transactions. A transaction is a signalling message, for example, a NTFY from the gateway to the call agent or a 200 OK from the call agent to the gateway. The device tracks these transactions and clears them when they time out.</p>

Table 148: Fields on the ALG Page (*continued*)

Field	Description
Application Screen	<p>Enter the following details:</p> <ul style="list-style-type: none"> <li>• <b>Message Flood Threshold</b>—Enter a value from 2 through 50,000 seconds per media gateway. Limits the rate per second at which message requests to the Media Gateway are processed. Messages exceeding the threshold are dropped by the Media Gateway Control Protocol (MGCP). This feature is disabled by default.</li> <li>• <b>Connection Flood Threshold</b>—Enter a value from 2 through 10,000. Limits the number of new connection requests allowed per Media Gateway (MG) per second. Messages exceeding the ALG.</li> <li>• <b>Action On Receiving Unknown Message</b>—Enter any of the following: <ul style="list-style-type: none"> <li>• <b>Enable Permit NAT Applied</b>—Select the check box to specify how unidentified MGCP messages are handled by the Juniper Networks device. The default is to drop unknown (unsupported) messages. Permitting unknown messages can compromise security and is not recommended. However, in a secure test or production environment, this statement can be useful for resolving interoperability issues with disparate vendor equipment. By permitting unknown MGCP (unsupported) messages, you can get your network operational and later analyze your VoIP traffic to determine why some messages were being dropped.</li> <li>• <b>Enable Permit Routed</b>—Select the check box. Specifies that unknown messages be allowed to pass if the session is in route mode. (Sessions in transparent mode are treated as route mode.)</li> </ul> </li> </ul>
DSCP Code Rewrite	<p>Specifies a code-point alias or bit set to apply to a forwarding class for a rewrite rule.</p> <p><b>Code Point</b>—Enter a six-bit DSCP code point value.</p>
<b>MSRPC</b>	
Enable MSRPC	<p>Select the check box to enable the MSRPC.</p> <p>Provides a method for a program running on one host to call procedures in a program running on another host. Because of the large number of RPC services and the need to broadcast, the transport address of an RPC service is dynamically negotiated based on the service program's Universal Unique IDentifier (UUID). The specific UUID is mapped to a transport address.</p>
Maximum Group Usage (%)	Select the group usage % from 10 to 100%.
Map Entry Timeout (min)	Select the map entry timeout session from 5 to 4320 minutes.

Table 148: Fields on the ALG Page (*continued*)

Field	Description
<b>SCCP</b>	
Enable SCCP	Select the check box to enable the Skinny Client Control Protocol.
Inactive Media Timeout	<p>Select a value from 10 through 600 seconds.</p> <p>Indicates the maximum length of time (in seconds) a call can remain active without any media (RTP or RTCP) traffic within a group. Each time an RTP or RTCP packet occurs within a call, this timeout resets. When the period of inactivity exceeds this setting, the gates opened for media are closed.</p>
Application Screen	<p>Call Flood Threshold—Select a value from 2 through 1,000.</p> <p>Protects SCCP ALG clients from flood attacks by limiting the number of calls they attempt to process.</p>
Action On Receiving Unknown Messages	<ul style="list-style-type: none"> <li>• Enable Permit NAT Applied—Select the check box. Specifies how unidentified SCCP messages are handled by the device. The default is to drop unknown (unsupported) messages. Permitting unknown messages can compromise security and is not recommended. However, in a secure test or production environment, this statement can be useful for resolving interoperability issues with disparate vendor equipment. By permitting unknown SCCP (unsupported) messages, you can get your network operational and later analyze your VoIP traffic to determine why some messages were being dropped.  This statement applies only to received packets identified as supported VoIP packets. If a packet cannot be identified, it is always dropped. If a packet is identified as a supported protocol, the message is forwarded without processing.</li> <li>• Enable Permit Routed—Select the check box. Specifies that unknown messages be allowed to pass if the session is in route mode. (Sessions in transparent mode are treated as though they are in route mode.)</li> </ul>
DSCP Code Rewrite	Code Point—Enter a six-bit DSCP code point value.
<b>SIP</b>	
Enable SIP	Select the check box to enable Session Initiation Protocol (SIP).
Enable Retain Hold Resource	<p>Select the check box to enable whether the device frees media resources for a SIP, even when a media stream is placed on hold.</p> <p>By default, media stream resources are released when the media stream is held.</p>

Table 148: Fields on the ALG Page (*continued*)

Field	Description
Maximum Call Duration	<p>Select a value from 3 through 720 minutes.</p> <p>Sets the absolute maximum length of a call. When a call exceeds this parameter setting, the SIP ALG tears down the call and releases the media sessions. The default setting is 720 minutes, the range is from 3 to 720 minutes.</p>
C Timeout	<p>Select a value from 3 through 10 minutes.</p> <p>Specifies the INVITE transaction timeout at the proxy, in minutes; the default is 3. Because the SIP ALG is in the middle, instead of using the INVITE transaction timer value B (which is <math>(64 * T1) = 32</math> seconds), the SIP ALG gets its timer value from the proxy.</p>
T4 Interval	<p>Select a value from 5 through 10 seconds.</p> <p>Specifies the maximum time a message remains in the network. The default is 5 seconds; the range is 5 through 10 seconds. Because many SIP timers scale with the T4-Interval (as described in RFC 3261), when you change the value of the T4-Interval timer, those SIP timers also are adjusted.</p>
Inactive Media Timeout	<p>Select a value from 10 through 2,550 seconds.</p> <p>Specifies the maximum time (in seconds) a call can remain active without any media (RTP or RTCP) traffic within a group. Each time an RTP or RTCP packet occurs within a call, this timeout resets. When the period of inactivity exceeds this setting, the temporary openings (pinholes) in the firewall SIP ALG opened for media are closed. The default setting is 120 seconds; the range is 10 through 2550 seconds. Note that, upon timeout, while resources for media (sessions and pinholes) are removed, the call is not terminated.</p>
T1 Interval	<p>Select a value from 500 through 5000 milliseconds.</p> <p>Specifies the round trip time estimate, in seconds, of a transaction between endpoints. The default is 500 milliseconds. Because many SIP timers scale with the T1-Interval (as described in RFC 3261), when you change the value of the T1-Interval timer, those SIP timers also are adjusted.</p>

Table 148: Fields on the ALG Page (*continued*)

Field	Description
Application Screen	<p>Action On Receiving Unknown Message:</p> <ul style="list-style-type: none"> <li>• <b>Enable Permit NAT Applied</b>—Select the check box to enable handling unidentified SIP messages by the device. This statement applies only to received packets identified as supported VoIP packets. If a packet cannot be identified, it is always dropped. If a packet is identified as a supported protocol, the message is forwarded without processing.</li> <li>• <b>Enable Permit Routed</b>—Select the check box to enable to allow unknown messages to pass if the session is in route mode. (Sessions in transparent mode are treated as route mode.)</li> </ul>
Protect Options	<ul style="list-style-type: none"> <li>• <b>SIP Invite Attack Table Entry Timeout</b>—Enter a value from 1 through 3,600 seconds. Specifies the time (in seconds) to make an attack table entry for each INVITE, which is listed in the application screen.</li> <li>• <b>Enable Attack Protection</b>—Select one of the options: All Servers, Selected Servers, or None. Protects servers against INVITE attacks. Configures the SIP application screen to protect the server at some or all destination IP addresses against INVITE attacks. When you select Selected Servers, enter the destination IP address and click +. You can select the destination IP address and click X to delete it.</li> </ul>
DSCP Code Rewrite	Code Point—Enter a six-bit DSCP code point value.
<b>SUNRPC</b>	
Enable SUNRPC	<p>Select the check box to enable SUNRPC.</p> <p>Because of the large number of RPC services and the need to broadcast, the transport address of an RPC service is dynamically negotiated based on the service's program number and version number. Several binding protocols are defined for mapping the RPC program number and version number to a transport address.</p>
Maximum Group Usage (%)	Select the maximum group usage % from 10 to 100%.
Map Entry Timeout	Select the map entry timeout session from 5 to 4320 minutes.

# Network—Forwarding Mode

IN THIS CHAPTER

- About the Forwarding Mode Page | 380

## About the Forwarding Mode Page

You are here: **Configure** > **Network** > **Forwarding Mode**.

Use this page to view the forwarding configuration details.

### Field Descriptions

Table 149 on page 380 describes the fields on the Forwarding Mode page.

Once the configuration is complete, click **OK** to save the changes or click **Cancel** to discard the changes.

Table 149: Fields on the Forwarding Mode Page

Field	Description
Family IPv6	<p>Supports IPv6 protocol traffic, including Routing Information Protocol for IPv6 (RIPng).</p> <p>Select an option from the list:</p> <ul style="list-style-type: none"><li>None</li><li>drop—Drop IPv6 packets.</li><li>flow-based—Perform flow-based packet forwarding.</li><li>packet-based—Perform simple packet forwarding.</li></ul> <p><b>NOTE:</b> For SRX5000 line of devices, only drop and flow based options are available.</p>

Table 149: Fields on the Forwarding Mode Page (*continued*)

Field	Description
Family ISO	Supports IS-IS traffic.
<b>NOTE:</b> This option is not available for SRX5000 line of devices.	Select an option from the list: <ul style="list-style-type: none"> <li>• None</li> <li>• packet-based</li> </ul>
Family MPLS	Supports MPLS traffic.
<b>NOTE:</b> This option is not available for SRX5000 line of devices.	Select an option from the list: <ul style="list-style-type: none"> <li>• None</li> <li>• flow-based</li> <li>• packet-based</li> </ul>



# Network—Policies

IN THIS CHAPTER

- [About the Policies Page | 382](#)
- [Global Options | 383](#)
- [Add a Policy | 385](#)
- [Clone a Policy | 393](#)
- [Edit a Policy | 394](#)
- [Delete Policy | 394](#)
- [Test a Policy | 395](#)

## About the Policies Page

You are here: **Configure > Network > Policies.**

Use this page to configure policies.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Create global options. See [“Global Options” on page 383](#).
- Create a policy. See [“Add a Policy” on page 385](#).
- Clone a policy. See [“Clone a Policy” on page 393](#).
- Edit a policy. See [“Edit a Policy” on page 394](#).
- Delete a policy. See [“Delete Policy” on page 394](#).
- Test a policy. See [“Test a Policy” on page 395](#).

### Field Descriptions

[Table 150 on page 383](#) describes the fields on the Policies page.

Table 150: Fields on the Policies Page

Field	Description
Name	Displays the name of the policy.
From: Prefix	Displays the policy prefix.
From: Protocol	Displays the selected source protocol.
From: Interface or Address	Displays the selected source interface or IP address.
To: Protocol	Displays the source destination protocol.
To: Interface or Address	Displays the selected interface or address.
Action	Displays the selected action.
Move To	Displays if the action is to move to next policy or term.

#### RELATED DOCUMENTATION

| [Global Options](#) | 383

## Global Options

You are here: **Configure** > **Network** > **Policies**.

To edit global options:

1. Select an existing configuration that you want to edit on the Global Options page.
2. Click the pencil icon available on the upper right side of the page.

The Edit Global Options page appears. You can modify any previous changes done. For more information on the options, see [Table 151 on page 384](#).

3. Click **OK** to save the changes.

Table 151: Fields on the Global Options Page

Field	Action
<b>Add Prefix List</b>	
Name	<p>Enter the name of the prefix list.</p> <p>Select an option from the list:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—Adds the prefix list.</li> <li>• <b>Edit</b>—Edits the prefix list.</li> <li>• <b>X</b>—Removes the prefix list.</li> </ul>
<b>Members</b>	
IP Address	<p>To add prefix list members:</p> <ol style="list-style-type: none"> <li>1. Click <b>+</b>. The Add Prefix List Members page appears.</li> <li>2. Enter the following details: <ul style="list-style-type: none"> <li>• IP Address—Enter the prefix list IP address.</li> <li>• Subnet Mask—Enter the subnet mask IP address</li> </ul> </li> <li>3. Click <b>OK</b> to save changes.</li> </ol> <p>Click the pencil icon to edit the IP address. You can click <b>X</b> to delete the IP address.</p>
<b>As Path</b>	
As Path	<p>Click <b>+</b> to add As path.</p> <p>As Path Name—Enter the name of the As path.</p> <p>Regular Expression—Enter the regular expression of the As path.</p> <p>Click the pencil icon to edit the As path. You can click <b>X</b> to delete the As path.</p>
<b>BGP Community</b>	
BGP Community	<p>Click <b>+</b> to add a BGP community.</p> <p>Name—Enter the BGP community name.</p> <p>Click the pencil icon to edit the As path. You can click <b>X</b> to delete the As path.</p>

Table 151: Fields on the Global Options Page (*continued*)

Field	Action
Members	Click + to add a BGP community members.  Community ID—Enter the BGP community ID.

## RELATED DOCUMENTATION

| [Add a Policy](#) | 385.

## Add a Policy

You are here: **Configure** > **Network** > **Policies**.

To add a policy:

1. Click + > **New** on the right side of the Policies page.  
The Add Policy page appears.
2. Complete the configuration according to the guidelines provided in [Table 152 on page 385](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel** instead.  
If you click **OK**, a new policy is added with the provided configuration.

Table 152: Fields on the Policy Page

Field	Description
Policy Name	Enter the policy name.
Terms	Click one of the following: <ul style="list-style-type: none"> <li>• +—Adds the term.</li> <li>• <b>Edit</b>—Edits the term.</li> <li>• <b>X</b>—Deletes the term,</li> </ul>
<b>Add Term</b>	
Term Name	Enter the term name.

Table 152: Fields on the Policy Page (*continued*)

Field	Description
<b>Source</b>	
Family	Select a family protocol address from the list.
Routing Instance	Select a routing instance from the list.
RIB	Select a routing table from the list.
Preference	Enter a preference value for the route.
Metric	Enter the metric value.  You can specify up to four metric values.
Interface	<p>Specifies the name or IP address of one or more routing device interfaces. Do not use this qualifier with protocols that are not interface-specific, such as internal BGP (IBGP).</p> <p>Choose one of the following options:</p> <ol style="list-style-type: none"> <li>To add an interface <ol style="list-style-type: none"> <li>Click <b>+</b> and select <b>Interface</b>. The Available Interfaces page appears.</li> <li>Select an interface from the list and click <b>OK</b>. The selected interface is added.</li> </ol> </li> <li>To add an IP address <ol style="list-style-type: none"> <li>Click <b>+</b> and select <b>Address</b>. The Add IP Address page appears.</li> <li>Enter IP address from the list and click <b>OK</b>. The selected IP address is added.</li> </ol> </li> <li>To delete an interface or an IP address: <ol style="list-style-type: none"> <li>Select an existing interface or address from Interfaces.</li> <li>Click <b>X</b>. The selected interface or IP address is deleted.</li> </ol> </li> </ol>

Table 152: Fields on the Policy Page (*continued*)

Field	Description
Prefix List	<p>Specifies a named list of IP addresses. You can specify an exact match with incoming routes.</p> <p>Choose one of the following options:</p> <ol style="list-style-type: none"> <li>To add a prefix list: <ol style="list-style-type: none"> <li>Click <b>+</b>. The Available Prefix List page appears.</li> <li>Select a prefix list from the list and click <b>OK</b>. The selected prefix list is added.</li> </ol> </li> <li>To delete a prefix list: <ol style="list-style-type: none"> <li>Select an existing prefix list.</li> <li>Click <b>X</b>. The selected prefix list is deleted.</li> </ol> </li> </ol>
Protocol	<p>Specifies the name of the protocol from which the route was learned or to which the route is being advertised.</p> <p>Choose one of the following options:</p> <ol style="list-style-type: none"> <li>To add a protocol: <ol style="list-style-type: none"> <li>Click <b>+</b>. The Available Protocols page appears.</li> <li>Select a protocol from the list and click <b>OK</b>. The selected protocol is added.</li> </ol> </li> <li>To delete a protocol: <ol style="list-style-type: none"> <li>Select an existing protocol.</li> <li>Click <b>X</b>. The selected protocol is deleted.</li> </ol> </li> </ol>

Table 152: Fields on the Policy Page (*continued*)

Field	Description
Policy	<p>Specifies the name of a policy to evaluate as a subroutine.</p> <p>Choose one of the following options:</p> <ol style="list-style-type: none"> <li>To add a policy: <ol style="list-style-type: none"> <li>Click <b>+</b>. The Available Policies page appears.</li> <li>Select a policy from the list and click <b>OK</b>. The selected policy is added.</li> </ol> </li> <li>To delete a policy: <ol style="list-style-type: none"> <li>Select an existing policy.</li> <li>Click <b>X</b>. The selected policy is deleted.</li> </ol> </li> </ol>
More	<p>Click <b>More</b> for advanced configuration options for policies.</p> <p>The More Options page appears.</p> <p>Click <b>OK</b> to save changes after the configuration is complete.</p>
<b>More Options</b>	
OSPF Area ID	Enter the IP address for the area identifier.
BGP Origin	Select a value from the list to specify the origin of the AS path information.
Local Preference	Type a BGP local preference value.

Table 152: Fields on the Policy Page (*continued*)

Field	Description
AS Path	<p>Specifies the name of an AS path regular expression.</p> <p>Choose one of the following options:</p> <ol style="list-style-type: none"> <li>To add an As path: <ol style="list-style-type: none"> <li>Click <b>+</b>. The Available AS Paths page appears.</li> <li>Select an As path from the list and click <b>OK</b>. The selected As path is added.</li> </ol> </li> <li>To delete an As path: <ol style="list-style-type: none"> <li>Select an existing As path.</li> <li>Click <b>X</b>. The selected As path is deleted.</li> </ol> </li> </ol>
Route	<p>Enter the following details:</p> <ul style="list-style-type: none"> <li>External—Select the check box to enable external routing.</li> <li>OSPF Type—Select an OSPF type from the list.</li> </ul>
Community	<p>Specifies the name of one or more communities.</p> <p>Choose one of the following options:</p> <ol style="list-style-type: none"> <li>To add a community: <ol style="list-style-type: none"> <li>Click <b>+</b>. The Available Communities page appears.</li> <li>Select a community from the list and click <b>OK</b>. The selected community is added.</li> </ol> </li> <li>To delete a community: <ol style="list-style-type: none"> <li>Select an existing community.</li> <li>Click <b>X</b>. The selected community is deleted.</li> </ol> </li> </ol>
<b>Destination</b>	
Family	Select a value for address family protocol from the list.
Routing Instance	Select a routing instance from the list.
RIB	Select a name of a routing table from the list.



Table 152: Fields on the Policy Page (*continued*)

Field	Description
Preference	Type a preference value for the route.
Metric	Type a metric value.
Interface	<p>Specifies the name or IP address of one or more routing device interfaces. Do not use this qualifier with protocols that are not interface-specific, such as internal BGP (IBGP).</p> <p>Choose one of the following options:</p> <ol style="list-style-type: none"> <li>To add an interface <ol style="list-style-type: none"> <li>Click <b>+</b> and select <b>Interface</b>. The Available Interfaces page appears.</li> <li>Select an interface from the list and click <b>OK</b>. The selected interface is added.</li> </ol> </li> <li>To add an IP address <ol style="list-style-type: none"> <li>Click <b>+</b> and select <b>Address</b>. The Add IP Address page appears.</li> <li>Enter IP address from the list and click <b>OK</b>. The selected IP address is added.</li> </ol> </li> <li>To delete an interface or an IP address: <ol style="list-style-type: none"> <li>Select an existing interface or address from Interfaces.</li> <li>Click <b>X</b>. The selected interface or IP address is deleted.</li> </ol> </li> </ol>
Protocol	<p>Specifies the name of the protocol from which the route was learned or to which the route is being advertised.</p> <p>Choose one of the following options:</p> <ol style="list-style-type: none"> <li>To add a protocol: <ol style="list-style-type: none"> <li>Click <b>+</b>. The Available Protocols page appears.</li> <li>Select a protocol from the list and click <b>OK</b>. The selected protocol is added.</li> </ol> </li> <li>To delete a protocol: <ol style="list-style-type: none"> <li>Select an existing protocol.</li> <li>Click <b>X</b>. The selected protocol is deleted.</li> </ol> </li> </ol>

Table 152: Fields on the Policy Page (*continued*)

Field	Description
Policy	<p>Displays the name of the policy.</p> <p>Choose one of the following options:</p> <ol style="list-style-type: none"> <li>To add a policy: <ol style="list-style-type: none"> <li>Click <b>+</b>. The Available Policies page appears.</li> <li>Select a policy from the list and click <b>OK</b>. The selected policy is added.</li> </ol> </li> <li>To delete a policy: <ol style="list-style-type: none"> <li>Select an existing policy.</li> <li>Click <b>X</b>. The selected policy is deleted.</li> </ol> </li> </ol>
More	<p>Click <b>More</b> for advanced configuration options for policies.</p> <p>The More Options page appears.</p> <p>Click <b>OK</b> to save changes after the configuration is complete.</p>
<b>Action</b>	
Action	Select an action value from the list.
Default Action	<p>Select a value from the list.</p> <p>Specifies that any action that is intrinsic to the protocol is overridden. This action is also non terminating so that various policy terms can be evaluated before the policy is terminated.</p>
Next	<p>Select a value from the list.</p> <p>Specifies the default control action if a match occurs, and there are no further terms in the current routing policy.</p>
Priority	<p>Select a value from the list.</p> <p>Specifies a priority for prefixes included in an OSPF import policy. Prefixes learned through OSPF are installed in the routing table based on the priority assigned to the prefixes.</p>
BGP Origin	<p>Select a value from the list.</p> <p>Specifies the BGP origin attribute.</p>

Table 152: Fields on the Policy Page (*continued*)

Field	Description
AS Path Prepend	<p>Enter AS path prepend value.</p> <p>Affixes an AS number at the beginning of the AS path. AS numbers are added after the local AS number has been added to the path. This action adds an AS number to AS sequences only, not to AS sets. If the existing AS path begins with a confederation sequence or set, the affixed AS number is placed within a confederation sequence. Otherwise, the affixed AS number is placed with a non confederation sequence.</p>
AS Path Expand	<p>Enter the following details:</p> <ul style="list-style-type: none"> <li>• <b>Type</b>—Select the type and type a value.</li> </ul> <p>Extracts the last AS number in the existing AS path and affixes that AS number to the beginning of the AS path n times, where n is a number from 1 through 32. The AS number is added before the local AS number has been added to the path. This action adds AS numbers to AS sequences only, not to AS sets. If the existing AS path begins with a confederation sequence or set, the affixed AS numbers are placed within a confederation sequence. Otherwise, the affixed AS numbers are placed within a non confederation sequence. This option is typically used in non-IBGP export policies.</p> <ul style="list-style-type: none"> <li>• <b>Value</b>—Enter the As path value.</li> </ul>
Preference	<p>Enter the following details:</p> <ul style="list-style-type: none"> <li>• <b>Action</b>—Select the preference action and type a value.</li> <li>• <b>Value</b>—Enter the preference value.</li> </ul>
Local Preference	<p>Enter the following details:</p> <ul style="list-style-type: none"> <li>• <b>Action</b>—Select the preference action and type a value.</li> <li>• <b>Value</b>—Enter the preference value.</li> </ul>
Load Balance Per Packet	<p>Select the check box to enable this option.</p> <p>Specifies that all next-hop addresses in the forwarding table must be installed and have the forwarding table perform per-packet load balancing. This policy action allows you to optimize VPLS traffic flows across multiple paths.</p>
Tag	<p>Enter the following details:</p> <ul style="list-style-type: none"> <li>• <b>Action</b>—Select the action and type a value.</li> </ul> <p>Changes the metric (MED) value by the specified negative or positive offset. This action is useful only in an external BGP (EBGP) export policy.</p> <ul style="list-style-type: none"> <li>• <b>Value</b>—Enter the tag value.</li> </ul>

Table 152: Fields on the Policy Page (*continued*)

Field	Description
Metric	<p>Enter the following details:</p> <ul style="list-style-type: none"> <li>• <b>Action</b>—Select the action and type a value. Specifies the tag value. The tag action sets the 32-bit tag field in OSPF external link-state advertisement (LSA) packets.</li> <li>• <b>Value</b>—Enter the metric value.</li> </ul>
Route	<p>Enter the following details:</p> <ul style="list-style-type: none"> <li>• <b>External</b>—Select the check box to enable this option.</li> <li>• <b>OSPF Type</b>—Select an option from the list.</li> </ul>
Class of Service	<p>Enter the following details:</p> <ul style="list-style-type: none"> <li>• <b>Class</b>—Select <b>None</b> from the list. Specifies the class-of-service parameters to be applied to routes installed into the routing table.</li> <li>• <b>Source Class</b>—Enter the source class. Specifies that the value entered here maintains the packet counts for a route passing through your network, based on the source address.</li> <li>• <b>Destination Class</b>—Enter the destination class. Specifies the value entered here maintains packet counts for a route passing through your network, based on the destination address in the packet.</li> <li>• <b>Forwarding Class</b>—Enter the forwarding class. Specifies that the value of queue number entered here maintains packet counts for a route passing through your network, based on the internal queue number assigned in the packet.</li> </ul>

## RELATED DOCUMENTATION

| [Clone a Policy](#) | 393

## Clone a Policy

You are here: **Configure** > **Network** > **Policies**.

To clone a policy:

1. Select a policy that you want to clone and select **Clone** from the More link.

The Clone Policy page appears with editable fields. For more information on the fields, see [“Add a Policy” on page 385](#).

2. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

#### RELATED DOCUMENTATION

| [Edit a Policy](#) | [394](#)

## Edit a Policy

You are here: **Configure** > **Network** > **Policies**.

To edit a policy:

1. Select a policy that you want to edit on the Policies page.
2. Click the pencil icon available on the upper right side of the Policies page.

The Edit Policy page appears with editable fields. For more information on the options, see [“Add a Policy” on page 385](#).

3. Click **OK** to save the changes.

#### RELATED DOCUMENTATION

| [Delete Policy](#) | [394](#).

## Delete Policy

You are here: **Configure** > **Network** > **Policies**.

To delete a policy configuration:

1. Select one or more policies that you want to delete from the Policies page.
2. Click the delete icon available on the upper right side of the Policies page.

A confirmation window appears.

- 3. Click **Yes** to delete or click **No**.

RELATED DOCUMENTATION

| [Test a Policy](#) | 395.

## Test a Policy

You are here: **Configure** > **Network** > **Policies**.

To test a policy

- 1. Select a policy you want to test.
- 2. Click **Test Policy** at the upper right side of the Policies page.

The Test Policy page appears.

- 3. Click **Start** to test the policy.

You can click **Generate Report** to get the test reports.

RELATED DOCUMENTATION

| [Add a Policy](#) | 385.

| [Edit a Policy](#) | 394.

| [Delete Policy](#) | 394.

# Network—DS-Lite

IN THIS CHAPTER

- [About the DS-Lite Page | 396](#)
- [Add a DS-Lite | 397](#)
- [Edit a DS-Lite | 398](#)
- [Delete DS-Lite | 398](#)

## About the DS-Lite Page

You are here: **Configure > Network > DS-Lite.**

Use this page to configure DS Lite.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Create a DS Lite. See [“Add a DS-Lite” on page 397](#).
- Edit a DS Lite. See [“Edit a DS-Lite” on page 398](#).
- Delete a DS Lite. See [“Delete DS-Lite” on page 398](#).

### Field Descriptions

[Table 153 on page 396](#) describes the fields on the DS-Lite page.

Table 153: Fields on the DS-Lite Page

Field	Description
Name	Displays the name of the DS-Lite configuration.
Concentrator	Displays the name of the software concentrator.

Table 153: Fields on the DS-Lite Page (*continued*)

Field	Description
Type	Displays the type of DS-Lite used.

## RELATED DOCUMENTATION

| [Add a DS-Lite](#) | 397.

## Add a DS-Lite

You are here: **Configure** > **Network** > **DS-Lite**.

To add a DS-Lite:

1. Click **+** on the upper right side of the DS-Lite page.  
The Add DS-Lite page appears.
2. Complete the configuration according to the guidelines provided in [Table 154 on page 397](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel** instead.  
If you click **OK**, a new DS-Lite is added.

Table 154: Fields on the Add DS Lite Page

Field	Description
Name	Enter a name for the DS-Lite configuration.
Concentrator	Enter an IP address of the softwire concentrator.
Type	Select the softwire type from the list.

## RELATED DOCUMENTATION

| [Edit a DS-Lite](#) | 398.



## Edit a DS-Lite

You are here: **Configure** > **Network** > **DS-Lite**.

To edit a DS-Lite:

1. Select a DS-Lite interface that you want to edit on the DS-Lite page.
2. Click the pencil icon available on the upper right side of the DS-Lite page.

The Edit DS-Lite page appears with editable fields. For more information on the options, see [“Add a DS-Lite” on page 397](#).

3. Click **OK** to save the changes.

### RELATED DOCUMENTATION

| [Delete DS-Lite](#) | 398.

## Delete DS-Lite

You are here: **Configure** > **Network** > **DS-Lite**.

To delete a DS Lite:

1. Select a DS-Lite interface that you want to edit on the DS-Lite page.
2. Click the delete icon available on the upper right side of the DS-Lite page.

A confirmation window appears.

3. Click **Yes** to delete or click **No**.

### RELATED DOCUMENTATION

| [About the DS-Lite Page](#) | 396.

# Network—CoS Value Alias

## IN THIS CHAPTER

- [About the Value Alias Configuration Page | 399](#)
- [Add a Code Point Alias | 400](#)
- [Edit a Code Point Alias | 401](#)
- [Delete Code Point Alias | 401](#)

## About the Value Alias Configuration Page

You are here: **Configure** > **Network** > **Class of Service** > **Value Aliases**.

Use this page to view, add, and remove value aliases details.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a code point alias. See [“Add a Code Point Alias” on page 400](#).
- Edit a code point alias. See [“Edit a Code Point Alias” on page 401](#).
- Delete a code point alias. See [“Delete Code Point Alias” on page 401](#).

### Field Descriptions

[Table 155 on page 399](#) describes the fields on the Value Alias page.

**Table 155: Fields on the Value Alias Page**

Field	Description
Alias name	Displays the name given to CoS values. For example, af11 or be.

Table 155: Fields on the Value Alias Page (*continued*)

Field	Description
Alias type	<p>Displays the code point type.</p> <p>The following types of code points are supported:</p> <ul style="list-style-type: none"> <li>• <b>DSCP</b>—Defines aliases for Differentiated Services code point (DSCP) for IPv4 values. You can refer to these aliases when you configure classes and define classifiers.</li> <li>• <b>DSCP-IPv6</b>—Defines aliases for DSCP IPv6 values. You can refer to these aliases when you configure classes and define classifiers.</li> <li>• <b>EXP</b>—Defines aliases for MPLS experimental (EXP) bits. You can map MPLS EXP bits to the device forwarding classes.</li> <li>• <b>inet-precedence</b>—Defines aliases for IPv4 precedence values. Precedence values are modified in the IPv4 TOS field and mapped to values that correspond to levels of service.</li> </ul>
CoS Value bits	<p>Displays the CoS value for which an alias is defined.</p> <p><b>NOTE:</b> Changing this value alters the behavior of all classifiers that refer to this alias.</p>

## RELATED DOCUMENTATION

| [Add a Code Point Alias](#) | 400.

## Add a Code Point Alias

You are here: **Configure** > **Network** > **Class of Service** > **Value Aliases**

To add a code point alias:

1. Click the add icon (+) available on the right side of the Value Aliases page.

The Add Code Point Alias page appears.

2. Complete the configuration according to the guidelines provided in [Table 156 on page 401](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 156: Fields on the Add Code Point Alias Page

Field	Description
Code point name	Enter a name for the CoS point alias.
Code point type	Select a code point type from the list.
Code point value bits	Select a COS value for which an alias is defined.

RELATED DOCUMENTATION

[Edit a Code Point Alias](#) | 401.

## Edit a Code Point Alias

You are here: **Configure > Network > Class of Service > Value Aliases**

To edit a code point alias:

1. Select a code point alias that you want to edit on the Value Aliases page.
2. Click the pencil icon available on the upper right side of the Value Aliases page.

The Code Point options appears with editable fields. For more information on the options, see [“Add a Code Point Alias” on page 400](#).

3. Click **OK** to save the changes.

RELATED DOCUMENTATION

[Delete Code Point Alias](#) | 401.

## Delete Code Point Alias

You are here: **Configure > Network > Class of Service > Value Aliases**

To delete a code point alias:

1. Select a code point alias that you want to delete on the Value Aliases page.
2. Click the delete icon available on the upper right side of the Value Aliases page.

A confirmation window appears.

3. Click **Yes** to delete or click **No**.

#### RELATED DOCUMENTATION

| [About the Value Alias Configuration Page](#) | 399.

# Network—CoS Forwarding Classes

IN THIS CHAPTER

- [About the Forwarding Classes Page | 403](#)
- [Add a Forwarding Class | 404](#)
- [Edit a Forwarding Class | 405](#)
- [Delete Forwarding Class | 405](#)

## About the Forwarding Classes Page

You are here: **Configure > Network > Class of Service > Forwarding Classes.**

Use this page to view, add, and delete Forwarding Classes.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a forwarding class. See [“Add a Forwarding Class” on page 404](#).
- Edit a forwarding class. See [“Edit a Forwarding Class” on page 405](#).
- Delete forwarding class. See [“Delete Forwarding Class” on page 405](#).

### Field Descriptions

[Table 157 on page 403](#) describes the fields on the Forwarding Classes page.

Table 157: Fields on the Forwarding Classes Page

Field	Description
Forwarding class name	Displays the forwarding class name assigned to the internal queue number.  By default, four forwarding classes are assigned to queue numbers: 0 (best-effort), 1 (assured-forwarding), 5 (expedited-forwarding), and 7 (network-connect).

Table 157: Fields on the Forwarding Classes Page (*continued*)

Field	Description
Queue number	Displays the internal queue numbers to which forwarding classes are assigned.  By default, if a packet is not classified, it is assigned to the class associated with queue 0. You can have more than one forwarding class assigned to a queue number.
Queue characteristics	Displays the queue characteristics, for example, video or voice.

## RELATED DOCUMENTATION

[Add a Forwarding Class](#) | 404.

## Add a Forwarding Class

You are here: **Configure** > **Network** > **Class of Service** > **Forwarding Classes**.

To add a forwarding class:

1. Click the add icon (+) available on the right side of the Forwarding Class page.  
The Add Forwarding Class page appears.
2. Complete the configuration according to the guidelines provided in [Table 158 on page 404](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 158: Fields on the Add Forwarding Class page

Field	Description
Queue number	Select the internal queue number to which a forwarding class is assigned.
Forwarding class name	Enter the forwarding class name assigned to the internal queue number.

## RELATED DOCUMENTATION

[Edit a Forwarding Class](#) | 405.

## Edit a Forwarding Class

You are here: **Configure** > **Network** > **Class of Service** > **Forwarding Classes**.

To edit a forwarding class:

1. Select an existing forwarding class that you want to edit on the Forwarding Classes page.
2. Click the pencil icon available on the upper right side of the Forwarding Classes page.

The Edit Forwarding Class options appears with editable fields. For more information on the options, see [“Add a Forwarding Class” on page 404](#) for options available for editing.

3. Click **OK** to save the changes.

### RELATED DOCUMENTATION

| [Delete Forwarding Class](#) | 405.

## Delete Forwarding Class

You are here: **Configure** > **Network** > **Class of Service** > **Forwarding Classes**.

To delete a forwarding class:

1. Select an existing forwarding class that you want to delete on the Forwarding Classes page.
2. Click the delete icon available on the upper right side of the Forwarding Classes page.

A confirmation window appears.

3. Click **Yes** to delete or click **No**.

### RELATED DOCUMENTATION

| [About the Forwarding Classes Page](#) | 403.



# Network—CoS Classifiers

IN THIS CHAPTER

- [About the Classifiers Page | 406](#)
- [Add a Classifier | 407](#)
- [Edit a Classifier | 409](#)
- [Delete Classifier | 409](#)

## About the Classifiers Page

You are here: **Configure > Network > Class of Service > Classifiers.**

Use this page to view, add, and delete Classifier Page configuration.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a classifier. See [“Add a Classifier” on page 407](#).
- Edit a classifier. See [“Edit a Classifier” on page 409](#).
- Delete classifier. See [“Delete Classifier” on page 409](#).

### Field Descriptions

[Table 159 on page 406](#) describes the fields on the Classifiers page.

Table 159: Fields on the Classifiers Page

Field	Description
Classifier name	Displays the name of a classifier.

Table 159: Fields on the Classifiers Page (*continued*)

Field	Description
Classifier type	<p>Displays the classifier type.</p> <p>The following type of classifiers are supported on :</p> <ul style="list-style-type: none"> <li>• J Series (J6350), SRX210, SRX240, SRX650: <ul style="list-style-type: none"> <li>• <b>dscp</b>—Differentiated Services code point classifier for IPv4</li> <li>• <b>dscp-ipv6</b>—Differentiated Services code point classifier for IPv6 (default and compatibility)</li> <li>• <b>exp</b>—MPLS experimental (EXP) bits classifier</li> <li>• <b>ieee-802.1</b>—IEEE-802.1 classifier</li> <li>• <b>ieee-802.1ad</b>—IEEE-802.1ad classifier</li> <li>• <b>inet-precedence</b>—IPv4 precedence classifier (default and compatibility).</li> </ul> </li> <li>• SRX3400, SRX3600, SRX5600, SRX5800: <ul style="list-style-type: none"> <li>• <b>dscp</b>—Differentiated Services code point classifier for IPv4</li> <li>• <b>dscp-ipv6</b>—Differentiated Services code point classifier for IPv6 .</li> <li>• <b>ieee-802.1</b>—IEEE-802.1 classifier</li> <li>• <b>ieee-802.1ad</b>—IEEE-802.1ad classifier</li> <li>• <b>inet-precedence</b>—IPv4 precedence classifier.</li> </ul> </li> </ul>
<b>Details of classifiers</b>	
Incoming code point	Displays CoS values and the aliases to which the forwarding class and loss priority are mapped.
Forwarding class name	Displays forwarding class names that are assigned to specific CoS values and aliases of a classifier.
Loss priority	Displays loss priorities that are assigned to specific CoS values and aliases of a classifier.

## RELATED DOCUMENTATION

[Add a Classifier](#) | 407.

## Add a Classifier

You are here: **Configure** > **Network** > **Class of Service** > **Classifiers**.

To add a Classifier:

1. Click the add icon (+) available on the right side of the Classifiers page.  
The Add Classifier page appears.
2. Complete the configuration according to the guidelines provided in [Table 160 on page 408](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

**Table 160: Fields on the Add Classifier Page**

Field	Description
Classifier name	Enter the classifier name.
Classifier type	<p>Select a classifier type from the list.</p> <ul style="list-style-type: none"> <li>• J Series (J6350), SRX210, SRX240, SRX650: <ul style="list-style-type: none"> <li>• <b>dscp</b>—Differentiated Services code point classifier for IPv4.</li> <li>• <b>dscp-ipv6</b>—Differentiated Services code point classifier for IPv6.</li> <li>• <b>exp</b>—MPLS experimental bits classifier.</li> <li>• <b>ieee-802.1</b>—IEEE-802.1 classifier.</li> <li>• <b>ieee-802.1ad</b>—IEEE-802.1ad classifier.</li> <li>• <b>inet-precedence</b>—Precedence classifier for IPv4.</li> </ul> </li> <li>• SRX3400, SRX3600, SRX5600, SRX5800: <ul style="list-style-type: none"> <li>• <b>dscp</b>—Differentiated Services code point classifier for IPv4.</li> <li>• <b>dscp-ipv6</b>—Differentiated Services code point classifier for IPv6.</li> <li>• <b>ieee-802.1</b>—IEEE-802.1 classifier.</li> <li>• <b>ieee-802.1ad</b>—IEEE-802.1ad classifier.</li> <li>• <b>inet-precedence</b>—Precedence classifier for IPv4.</li> </ul> </li> </ul>
Code point mapping	<p>Specifies the code point mapping created.</p> <p>The available options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—Click + to add a code point mapping.</li> <li>• <b>Edit</b>—Click pencil icon to edit the selected code point mapping.</li> <li>• <b>Delete</b>—Deletes the code point mapping.</li> </ul>
Code point	Select the CoS value in bits and the alias of a classifier from the list.
Forwarding class	Select the forwarding class for the specified CoS value and alias from the list.
Loss priority	Select the loss priority for the specified CoS value and alias from the list.

## RELATED DOCUMENTATION

| [Edit a Classifier](#) | 409.

## Edit a Classifier

You are here: **Configure** > **Network** > **Class of Service** > **Classifiers**.

To edit a classifier:

1. Select an existing classifier configuration that you want to edit on the Classifiers page.
2. Click the pencil icon available on the upper right side of the Classifiers page.

The Edit Classifiers page appears with editable fields. For more information on the options, see [“Add a Classifier” on page 407](#).

3. Click **OK** to save the changes.

## RELATED DOCUMENTATION

| [Delete Classifier](#) | 409.

## Delete Classifier

You are here: **Configure** > **Network** > **Class Of Service** > **Classifiers**.

To delete a classifier:

1. Select a classifier that you want to delete on the Classifiers Page.
2. Click the delete icon available on the upper right side of the Classifiers page.

A confirmation window appears.

3. Click **Yes** to delete or click **No** to retain the profile.

## RELATED DOCUMENTATION

| [About the Classifiers Page](#) | 406.

# Network—CoS Rewrite Rules

IN THIS CHAPTER

- [About the Rewrite Rules Page | 411](#)
- [Add a Rewrite Rule | 412](#)
- [Edit a Rewrite Rule | 413](#)
- [Delete Rewrite Rule | 414](#)

## About the Rewrite Rules Page

You are here: **Configure > Network > Class of Service > Rewrite Rules.**

Use this page to add, edit, or delete rewrite rule configurations.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a rewrite rule. See [“Add a Rewrite Rule” on page 412.](#)
- Edit a rewrite rule. See [“Edit a Rewrite Rule” on page 413.](#)
- Delete rewrite rule. See [“Delete Rewrite Rule” on page 414.](#)

### Field Descriptions

[Table 161 on page 411](#) describes the fields on the Rewrite Rules page.

Table 161: Fields on the Rewrite Rules Page

Field	Description
Rewrite rule name	Displays the names of defined rewrite rules.
Rewrite rule type	Displays the rewrite rule type.

Table 161: Fields on the Rewrite Rules Page *(continued)*

Field	Description
<b>Code Point Details</b>	
Egress/Outgoing Code point	Displays the CoS values and aliases that a specific rewrite rule has set for a specific forwarding class and loss priority.
Forwarding class name	Displays the forwarding classes associated with a specific rewrite rule.
Loss priority	Displays the loss priority values associated with a specific rewrite rule.

## RELATED DOCUMENTATION

| [Add a Rewrite Rule](#) | 412.

## Add a Rewrite Rule

You are here: **Configure** > **Network** > **Class of Service** > **Rewrite Rules**.

To add a rule configuration:

1. Click the add icon (+) available on the right side of the Forwarding Class page.  
The Add Rewrite Rule page appears.
2. Complete the configuration according to the guidelines provided in [Table 162 on page 412](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 162: Fields on the Add Rewrite Rule Page

Field	Action
Rewrite rule name	Enter the name of a defined rewrite rule.

Table 162: Fields on the Add Rewrite Rule Page (*continued*)

Field	Action
Rewrite rule type	<p>Select a rewrite rule type from the list.</p> <ul style="list-style-type: none"> <li>• <b>dscp</b>—Defines the Differentiated Services code point rewrite rule.</li> <li>• <b>ieee-802.1</b>—Defines the IEEE-802.1 rewrite rule.</li> <li>• <b>inet-precedence</b>—Defines the precedence rewrite rule for IPv4.</li> <li>• <b>exp</b>—Defines the MPLS EXP rewrite rule (not supported for SRX3400, SRX3600, SRX5600, and SRX5800 devices).</li> <li>• <b>dscp-ipv6</b>—Defines the Differentiated Services code point rewrite rule for IPv6.</li> <li>• <b>ieee-802.1ad</b>—Defines the IEEE-802.1ad rewrite rule.</li> <li>• <b>frame-relay-de</b>—Defines the frame relay discard eligible bit rewrite rule (not supported for SRX3400, SRX3600, SRX5600, and SRX5800 devices).</li> </ul>
Code point mapping	<p>Specifies the code point mapping created.</p> <p>Click one:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—Click + to add a code point mapping.</li> <li>• <b>Edit</b>—Click pencil icon to edit the selected code point mapping.</li> <li>• <b>Delete</b>—Deletes the code point mapping.</li> </ul>
Egress/Outgoing Code point	Select a CoS value and alias from the list.
Forwarding class	Select the forwarding class of the rewrite rule from the list.
Loss priority	Select the loss priority of the rewrite rule from the list.

## RELATED DOCUMENTATION

[Edit a Rewrite Rule](#) | 413.

## Edit a Rewrite Rule

You are here: **Configure** > **Network** > **Class of Service** > **Rewrite Rules**.

To edit a rewrite rule:

1. Select an existing rule configurations you want to edit on the Rewrite Rules page.



2. Click the pencil icon available on the upper right side of the Rewrite Rules page.

The Edit Rewrite Rule page appears with editable fields. For more information on the options, see [“Add a Rewrite Rule” on page 412](#).

3. Click **OK** to save the changes.

#### RELATED DOCUMENTATION

| [Delete Rewrite Rule](#) | 414.

## Delete Rewrite Rule

You are here: **Configure** > **Network** > **Class of Service** > **Rewrite Rules**.

To delete a rewrite rule:

1. Select an existing rule configurations you want to delete on the Rewrite Rules page.
2. Click the delete icon available on the upper right side of the Rewrite Rules page.  
A confirmation window appears.
3. Click **Yes** to delete or click **No** to retain the previous configuration.

#### RELATED DOCUMENTATION

| [About the Rewrite Rules Page](#) | 411.

# Network—CoS Schedulers

## IN THIS CHAPTER

- [About the Schedulers Page | 415](#)
- [Add a Scheduler | 416](#)
- [Edit a Scheduler | 418](#)
- [Delete Scheduler | 418](#)

## About the Schedulers Page

You are here: **Configure > Network > Class of Service > Schedulers > Schedulers.**

Use this page to add, edit or delete configuration of schedulers and enable or disable global settings.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a scheduler. See [“Add a Scheduler” on page 416](#).
- Edit a scheduler. See [“Edit a Scheduler” on page 418](#).
- Delete scheduler. See [“Delete Scheduler” on page 418](#).

### Field Descriptions

[Table 163 on page 415](#) describes the fields on the Schedulers page.

**Table 163: Fields on the Schedulers Page**

Field	Description
<b>Schedulers Global Setting</b>	
Enable Non Strict Priority	Applies non-strict priority policy to all the schedulers.

Table 163: Fields on the Schedulers Page (*continued*)

Field	Description
<b>Schedulers Configuration</b>	
Scheduler name	Displays the names of defined schedulers.
Scheduler priority	Displays the scheduler transmission priority, which determines the order in which an output interface transmits traffic from the queues.
<b>Details of scheduler</b>	
Name	Displays the scheduler name.
Value	Displays the CoS value.

## RELATED DOCUMENTATION

[Add a Scheduler](#) | 416

## Add a Scheduler

You are here: **Configure** > **Network** > **Class of Service** > **Schedulers** > **Schedulers**.

To add a scheduler:

1. Click the add icon (+) available on the right side of the Scheduler page.  
The Add Scheduler page appears.
2. Complete the configuration according to the guidelines provided in [Table 164 on page 416](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 164: Fields on the Add Scheduler Page

Field	Action
Scheduler name	Enter the scheduler name.

Table 164: Fields on the Add Scheduler Page (*continued*)

Field	Action
Scheduler priority	<p>Select the scheduler priority from the list.</p> <ul style="list-style-type: none"> <li>• <b>high</b>—Packets in this queue have high priority.</li> <li>• <b>low</b>—Packets in this queue are transmitted last.</li> <li>• <b>medium-low</b>—Packets in this queue have medium-low priority.</li> <li>• <b>medium-high</b>—Packets in this queue have medium-high priority.</li> <li>• <b>strict-high</b>—Packets in this queue are transmitted first.</li> </ul>
Buffer size	<p>Select one of the options from the list.</p> <ul style="list-style-type: none"> <li>• <b>exact</b>—Exact buffer size.</li> <li>• <b>percent</b>—Percentage of the total buffer. Select and type an integer from 1 through 100.</li> <li>• <b>remainder</b>—Remaining available buffer size.</li> <li>• <b>temporal</b>—Temporal value in microseconds.</li> </ul>
Shaping rate	<p>Enter the minimum bandwidth allocated to a queue.</p> <p>Select one of the options from the list.</p> <ul style="list-style-type: none"> <li>• <b>rate</b>—Shaping rate as an absolute number of bits per second. Select and type an integer from 3200 through 160,000,000,000 bits per second.</li> <li>• <b>percent</b>—Shaping rate as a percentage. Select and type an integer from 0 through 100.</li> </ul>
Transmit rate	<p>Enter the transmission rate of a scheduler.</p> <p>Select one of the options from the list.</p> <ul style="list-style-type: none"> <li>• <b>rate</b>—Transmit rate. Select and type an integer from 3200 through 160,000,000,000 bits per second.</li> <li>• <b>exact</b>—Exact transmit rate.</li> <li>• <b>percent</b>—Percentage of transmission capacity. Select and type an integer from 1 through 100.</li> <li>• <b>remainder</b>—Remaining transmission capacity.</li> </ul>

## RELATED DOCUMENTATION

[Edit a Scheduler](#) | **418**.

## Edit a Scheduler

You are here: **Configure** > **Network** > **Class of Service** > **Schedulers** > **Schedulers**.

To edit a scheduler:

1. Select an existing scheduler that you want to edit on the Schedulers page.
2. Click the pencil icon available on the upper right side of the Schedulers page.

The Edit Scheduler appears with editable fields. For more information on the options, see [“Add a Scheduler” on page 416](#).

3. Click **OK** to save the changes.

### RELATED DOCUMENTATION

| [Delete Scheduler](#) | 418.

## Delete Scheduler

You are here: **Configure** > **Network** > **Class of Service** > **Schedulers** > **Schedulers**.

To delete a scheduler:

1. Select an existing scheduler that you want to delete on the Schedulers page.
2. Click the delete icon available on the upper right side of the Schedulers page.

A confirmation window appears.

3. Click **Yes** to delete or click **No**.

### RELATED DOCUMENTATION

| [About the Schedulers Page](#) | 415.

# Network—CoS Scheduler Maps

IN THIS CHAPTER

- [About the Scheduler Maps Page | 419](#)
- [Add a Scheduler Map | 420](#)
- [Edit a Scheduler Map | 421](#)
- [Delete Scheduler Map | 422](#)

## About the Scheduler Maps Page

You are here: **Configure > Network > Class of Service > Schedulers > Scheduler Maps.**

Use this page to add, edit, or delete schedulers maps configurations.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a scheduler map. See [“Add a Scheduler Map” on page 420](#).
- Edit a scheduler map. See [“Edit a Scheduler Map” on page 421](#).
- Delete a scheduler map. See [“Delete Scheduler Map” on page 422](#).

### Field Descriptions

[Table 165 on page 419](#) describes the fields on the Scheduler Maps page.

Table 165: Fields on the Scheduler Maps Page

Field	Description
Scheduler map name	Displays the names of defined scheduler maps. Scheduler maps link schedulers to forwarding classes.
Schedulers	Displays the schedulers assigned for each map.

Table 165: Fields on the Scheduler Maps Page (*continued*)

Field	Description
Forwarding classes	Displays the forwarding classes assigned for each map.
<b>Details of Schedulers</b>	
Name	Displays the scheduler assigned to the selected scheduler map.
Value	Displays the CoS values.

## RELATED DOCUMENTATION

[Add a Scheduler Map](#) | 420.

## Add a Scheduler Map

You are here: **Configure** > **Network** > **Class of Service** > **Schedulers** > **Scheduler Maps**.

To add a scheduler map:

1. Click the add icon (+) available on the right side of the Scheduler Map page.  
The Add Scheduler Map page appears.
2. Complete the configuration according to the guidelines provided in [Table 166 on page 420](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 166: Fields on the Add Scheduler Map Page

Field	Action
Scheduler map name	Enter a name for the scheduler map.
best-effort	Select an option from the list.  Specifies no service profile. Loss priority is typically not carried in a CoS value.

Table 166: Fields on the Add Scheduler Map Page (*continued*)

Field	Action
expedited-forwarding	Select an option from the list.  Specifies end-to-end service with low loss, low latency, low jitter, and assured bandwidth.
assured-forwarding	Select an option from the list.  Specifies the group of defined values.
network-control	Select an option from the list.  Specifies CoS packet forwarding class of high priority.

## RELATED DOCUMENTATION

[Edit a Scheduler Map](#) | 421.

## Edit a Scheduler Map

You are here: **Configure** > **Network** > **Class of Service** > **Schedulers** > **Scheduler Maps**.

To edit a scheduler map:

1. Select an existing scheduler map that you want to edit on the Schedulers page.
2. Click the pencil icon available on the upper right side of the Schedulers page.

The Edit Scheduler Map page appears with editable fields. For more information on the options, see [“Add a Scheduler Map” on page 420](#).

3. Click **OK** to save the changes.

## RELATED DOCUMENTATION

[Delete Scheduler Map](#) | 422.



## Delete Scheduler Map

You are here: **Configure** > **Network** > **Class of Service** > **Schedulers** > **Scheduler Maps**.

To delete a scheduler map:

1. Select an existing scheduler map that you want to delete on the Schedulers page.
2. Click the delete icon available on the upper right side of the Schedulers page.

A confirmation window appears.

3. Click **Yes** to delete or click **No**.

### RELATED DOCUMENTATION

| [About the Scheduler Maps Page](#) | 419.

# Network—CoS Drop Profile

IN THIS CHAPTER

- [About the Drop Profile Page | 423](#)
- [Add a Drop Profile | 424](#)
- [Edit a Drop Profile | 425](#)
- [Delete Drop Profile | 426](#)

## About the Drop Profile Page

You are here: **Configure > Network > Class of Service > Drop Profile.**

Use this page to configure drop profiles.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a drop profile. See [“Add a Drop Profile” on page 424](#).
- Edit a drop profile. See [“Edit a Drop Profile” on page 425](#).
- Delete a drop profile. See [“Delete Drop Profile” on page 426](#).

### Field Descriptions

[Table 167 on page 423](#) describes the fields on the Drop Profile page.

Table 167: Fields on the Drop Profile Page

Field	Description
Drop profile name	Displays the configured random early detection (RED) drop profile names.
Profile type	Displays whether a RED drop profile type is interpolated or segmented.

Table 167: Fields on the Drop Profile Page (*continued*)

Field	Description
Data points	Displays information about the data point types.

## RELATED DOCUMENTATION

| [About the Drop Profile Page](#) | 423.

## Add a Drop Profile

You are here: **Configure** > **Network** > **Class of Service** > **Drop Profile**.

To add a drop profile:

1. Click the add icon (+) available on the right side of the Drop Profile page.  
The Add Drop Profile page appears.
2. Complete the configuration according to the guidelines provided in [Table 168 on page 424](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 168: Fields on the Add Drop Profile Page

Field	Action
Drop Profile Name	Enter a drop profile name.
Interpolated	Select the option to specify whether the value pairs are interpolated to produce a smooth profile.
Segmented	Select the option to specify whether the value pairs are represented by line fragments, which connect each data point on the graph to produce a segmented profile.

Table 168: Fields on the Add Drop Profile Page *(continued)*

Field	Action
Data point	<p>To add a data point:</p> <ol style="list-style-type: none"> <li>Click +.</li> </ol> <p>The Add Data Point page appears.</p> <ol style="list-style-type: none"> <li>Enter the following details: <ul style="list-style-type: none"> <li>Fill Level—Enter a percentage value for queue buffer fullness for the X-coordinate. For example, 95.</li> <li>Drop Probability—Enter a percentage value for drop probability for the Y-coordinate. For example, 85.</li> </ul> </li> <li>Click <b>OK</b> to save changes.</li> </ol> <p>To edit a data point:</p> <ol style="list-style-type: none"> <li>Select the existing data point and click the pencil icon.</li> </ol> <p>The Edit Data Point page appears.</p> <ol style="list-style-type: none"> <li>Enter a percentage value for Drop Probability.</li> <li>Click <b>OK</b> to save changes.</li> </ol> <p>To delete a data point, select the existing data point and click the delete (X) icon. Then, click <b>Yes</b> to delete it.</p>

## RELATED DOCUMENTATION

[Edit a Drop Profile](#) | 425.

## Edit a Drop Profile

You are here: **Configure** > **Network** > **Class of Service** > **Drop Profile**.

To edit a drop profile:

- Select an existing drop profile that you want to edit on the Drop Profile page.

2. Click the pencil icon available on the upper right side of the Drop Profile page.

The Edit Drop Profile page appears with editable fields. For more information on the options, see [“Add a Drop Profile” on page 424](#).

3. Click **OK** to save the changes.

#### RELATED DOCUMENTATION

| [Delete Drop Profile | 426](#).

## Delete Drop Profile

You are here: **Configure > Network > Class of Service > Drop Profile**.

To delete a drop profile:

1. Select an existing drop profile that you want to delete on the Drop Profile page.
2. Click the delete icon available on the upper right side of the Drop Profile page.

A confirmation window appears.

3. Click **Yes** to delete or click **No**.

#### RELATED DOCUMENTATION

| [About the Drop Profile Page | 423](#).

# Network—CoS Virtual Channel Groups

IN THIS CHAPTER

- [About the Virtual Channel Groups Page | 427](#)
- [Add a Virtual Channel | 428](#)
- [Edit a Virtual Channel | 429](#)
- [Delete Virtual Channel | 430](#)

## About the Virtual Channel Groups Page

You are here: **Configure** > **Network** > **Class of Service** > **Virtual Channel Groups**.

Use this page to configure virtual channel group.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a virtual channel. See [“Add a Virtual Channel” on page 428](#).
- Edit a virtual channel. See [“Edit a Virtual Channel” on page 429](#).
- Delete a virtual channel. See [“Delete Virtual Channel” on page 430](#).

### Field Descriptions

[Table 169 on page 427](#) describes the fields on the Virtual Channel Groups page.

Table 169: Fields on the Virtual Channel Groups Page

Field	Description
Virtual Channel Group Name	Displays the name of defined virtual channel groups.
Virtual Channel Name	Displays the name of defined virtual channels.

Table 169: Fields on the Virtual Channel Groups Page *(continued)*

Field	Description
Default	Displays the default virtual channel of a group marking.
Scheduler Map	Displays the scheduler map assigned to a particular virtual channel.
Shaping Rate	Displays the shaping rate configured for a virtual channel.

#### RELATED DOCUMENTATION

| [Add a Virtual Channel](#) | 428.

## Add a Virtual Channel

You are here: **Configure** > **Network** > **Class of Service** > **Virtual Channel Groups**.

**NOTE:** This menu is not available for SRX4000 line of devices and SRX5000 line of devices.

To add a virtual channel to the virtual channel group:

1. Click **Add** on the Virtual Channel page.  
The Virtual Channel Information page appears.
2. Complete the configuration according to the guidelines provided in [Table 170 on page 428](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 170: Fields on the Virtual Channel Information Page

Field	Action
Virtual Channel Name	Select a predefined name from the list or enter a new virtual channel name.
Scheduler Map	Select a scheduler map from the list.  Specifies a predefined scheduler map to assign to a virtual channel. The scheduler maps associate schedulers with forwarding classes.

Table 170: Fields on the Virtual Channel Information Page (*continued*)

Field	Action
Shaping Rate	<p>Enter the shaping rate for a virtual channel.</p> <p>Configuring a shaping rate is optional. If no shaping rate is configured, a virtual channel without a shaper can use the full logical interface bandwidth. The options available are:</p> <p>Select an option from the list:</p> <ul style="list-style-type: none"> <li>• Unconfigured—Select the option for no shaping rate.</li> <li>• Absolute Rate—Configures a shaping rate as an absolute number of bits per second. Range: 3200 through 320000000000.</li> <li>• Percent—Configures a shaping rate as a percentage. Range: 0 through 100.</li> </ul>

## RELATED DOCUMENTATION

[Edit a Virtual Channel](#) | 429.

## Edit a Virtual Channel

You are here: **Configure** > **Network** > **Class of Service** > **Virtual Channel Groups**.

To edit a virtual channel in the virtual channel group:

1. Click on the existing virtual channel name that you want to edit on the Virtual Channel Groups page.  
The Virtual Channel Information page appears with editable fields. For more information on the options, see [“Add a Virtual Channel” on page 428](#).
2. Click **OK** to save the changes.

## RELATED DOCUMENTATION

[Delete Virtual Channel](#) | 430.



## Delete Virtual Channel

You are here: **Configure** > **Network** > **Class of Service** > **Virtual Channel Groups**.

To delete a virtual channel:

1. Select an existing virtual channel name that you want to delete on the Virtual Channel Groups page.
2. Click **Delete** on the Virtual Channel Groups page.

### RELATED DOCUMENTATION

[About the Virtual Channel Groups Page](#) | 427.

# Network—CoS Assign To Interface

IN THIS CHAPTER

- [About the Assign To Interface Page | 431](#)
- [Edit a Port | 432](#)
- [Add a Logical Interface | 433](#)
- [Edit a Logical Interface | 435](#)
- [Delete Logical Interface | 435](#)

## About the Assign To Interface Page

You are here: **Configure** > **Network** > **Class of Service** > **Assign To Interface**.

Use this page to add, edit, or delete interface configuration.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Edit a port. See [“Edit a Port” on page 432](#).
- Add a Logical Interface. See [“Add a Logical Interface” on page 433](#).
- Edit a Logical Interface. See [“Edit a Logical Interface” on page 435](#).
- Delete Logical Interface. See [“Delete Logical Interface” on page 435](#).

### Field Descriptions

[Table 171 on page 431](#) describes the fields on the Assign To Interface page.

Table 171: Fields on the Assign To Interface Page

Field	Description
Port	Displays the port and interface name.

**Table 171: Fields on the Assign To Interface Page** *(continued)*

Field	Description
Scheduler map	Displays the predefined scheduler maps for the physical interface.
<b>Details of Logical Interfaces</b>	
Unit	Displays the name of a logical interface.
Forwarding class	Displays the forwarding classes assigned to a particular interface.
Scheduler map	Displays the scheduler maps assigned to a particular interface.
Virtual channel group	Displays the virtual channel groups assigned to a particular interface.
Classifier[dscp,dscpv6,exp,inet]	Displays the classifiers assigned to a particular interface—for example, information about DSCP and DSCPv6, EXP, and IPv4 (inet precedence) classifiers.
Rewrite rule[dscp,dscpv6,exp,inet]	Displays the rewrite rules assigned to a particular interface—for example, information about Differentiated Services Code Point (DSCP and DSCPv6), EXP, and IPv4 (inet precedence) rewrite rules.

## RELATED DOCUMENTATION

| [Edit a Port](#) | 432

## Edit a Port

You are here: **Configure > Network > Class of Service > Assign To Interface.**

To edit a Port:

1. Select an existing port profile that you want to edit on the Assign To Interface page.
2. The Edit page appears with editable fields. For more information on the options, see [Table 172 on page 433](#).
3. Click **OK** to save the changes.

Table 172: Fields on the Edit Port Page

Field	Action
Interface Name	Displays the selected interface name.
Associate system default scheduler map	<p>Select <b>Associate system default scheduler map</b>.</p> <p>Specifies that you can associate the system default scheduler map with the selected interface.</p>
Select the scheduler map	<p>Select <b>Select the scheduler map</b> and select a value from the list.</p> <p>Specifies the scheduler map to the selected interface.</p>

## RELATED DOCUMENTATION

[Add a Logical Interface](#) | 433

## Add a Logical Interface

You are here: **Configure** > **Network** > **Class of Service** > **Assign To Interface**.

To add a Logical Interface:

1. Click the add icon (+) available on the right side of the Logical Interface page.  
The Add Logical Interface page appears.
2. Complete the configuration according to the guidelines provided in [Table 173 on page 433](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 173: Fields on the Add Logical Interface

Field	Action
Unit	Enter a logical interface name.
Scheduler map	Select a scheduler map from the list.
Forwarding class	Select a forwarding class from the list.

Table 173: Fields on the Add Logical Interface (*continued*)

Field	Action
Virtual channel group	Select a virtual channel group from the list.
<b>Classifiers</b>	
dscp	<p>Select a classifier DSCP value from the list.</p> <p>Specifies the Differentiated Services Code Point of the classifier type assigned to a particular interface.</p>
dscp v6	<p>Select a classifier DSCPv6 value from the list.</p> <p>Specifies the Differentiated Services Code Point version 6 of the classifier type assigned to a particular interface.</p>
exp	<p>Select an EXP classifier value from the list.</p> <p>Specifies the EXP classifier type assigned to a particular interface.</p>
inet precedence	<p>Select an IPv4 precedence classifier value from the list.</p> <p>Specifies the IPv4 precedence classifier type assigned to a particular interface.</p>
<b>Rewrite rules</b>	
dscp	<p>Select a rewrite rule DSCP value from the list.</p> <p>Specifies the Differentiated Services Code Point of the rewrite rule type assigned to a particular interface</p>
dscp v6	<p>Select a rewrite rule DSCPv6 value from the list.</p> <p>Specifies the Differentiated Services Code Point version 6 of the rewrite rule type assigned to a particular interface.</p>
exp	<p>Select an EXP rewrite rule value from the list.</p> <p>Specifies the EXP rewrite rule type assigned to a particular interface.</p>
inet precedence	<p>Select an IPv4 precedence rewrite rule value from the list.</p> <p>Specifies the IPv4 precedence rewrite rule type assigned to a particular interface.</p>

## RELATED DOCUMENTATION

| [Edit a Logical Interface](#) | 435.

## Edit a Logical Interface

You are here: **Configure** > **Network** > **Class of Service** > **Assign To Interface**.

To edit a logical interface:

1. Select an existing logical interface that you want to edit on the Logical Interface page.
2. Click the pencil icon available on the upper right side of the Logical Interface page.

The Edit Logical Interface page appears with editable fields. For more information on the options, see [“Add a Logical Interface” on page 433](#).

3. Click **OK** to save the changes.

## RELATED DOCUMENTATION

| [Delete Logical Interface](#) | 435.

## Delete Logical Interface

You are here: **Configure** > **Network** > **Class of Service** > **Assign To Interface**.

To delete a logical interface:

1. Select an existing logical interface that you want to delete on the Logical Interface page.
2. Click the delete icon available on the upper right side of the Logical Interface page.

A confirmation window appears.

3. Click **Yes** to delete or click **No**.

## RELATED DOCUMENTATION

| [About the Assign To Interface Page | 431.](#)

# User Management

## IN THIS CHAPTER

- [About the User Management Page | 437](#)
- [Add an User | 441](#)
- [Edit an User | 442](#)
- [Delete User | 443](#)
- [Search for Text in an User Management Table | 443](#)

## About the User Management Page

You are here: **Configure > Users > User Management**.

Using this page, you can configure user details, authentication methods, and passwords.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add an user. See [“Add an User” on page 441](#).
- Edit an user. See [“Edit an User” on page 442](#).
- Delete an user. See [“Delete User” on page 443](#).
- Search for Text in an User Management table. See [“Search for Text in an User Management Table” on page 443](#).
- Filter the user information based on select criteria. To do this, select the filter icon at the top right-hand corner of the table. The columns in the grid change to accept filter options. Type the filter options; the table displays only the data that fits the filtering criteria.

### Field Descriptions

[Table 174 on page 438](#) describes the fields on the User Management page.



Table 174: Fields on the User Management Page

Field	Description
<b>User Details</b>	
User Details	<p>Provides the users details to the device's local database. The options available are:</p> <ul style="list-style-type: none"> <li>• Add</li> <li>• Edit</li> <li>• Delete</li> <li>• Search</li> <li>• Filter</li> </ul>
<b>Authentication Methods</b>	
Authentication Method And Order	<p>Enable authentication methods and drag and drop to change the authentication order. The options available are:</p> <ul style="list-style-type: none"> <li>• Password</li> <li>• RADIUS Servers</li> <li>• TACACS+Servers</li> </ul>
<b>RADIUS Servers</b>	

Table 174: Fields on the User Management Page (*continued*)

Field	Description
RADIUS Servers	<p>Specifies the details of RADIUS servers.</p> <p>Click <b>Configure</b>.</p> <p>To add a new RADIUS server, click <b>+</b>. Then enter the details specified below and click <b>OK</b>.</p> <ul style="list-style-type: none"> <li>• <b>IP Address</b>—Enter the server's 32-bit IP address.</li> <li>• <b>Password</b>—Enter the secret password for the server.</li> <li>• <b>Confirm Password</b>—Re-enter the secret password for the server.</li> <li>• <b>Server Port</b>—Enter an appropriate port.</li> <li>• <b>Source Address</b>—Enter the source IP address of the server.</li> <li>• <b>Time out</b>—Specify the amount of time (in seconds) the device should wait for a response from the server.</li> <li>• <b>Retry Attempts</b>—Specify the number of times that the server should try to verify the user's credentials.</li> </ul> <p>To delete an existing RADIUS server, select it and click <b>Delete</b>.</p>
TACACS	
TACACS Servers	<p>Specifies the details of TACACS servers.</p> <p>Click <b>Configure</b>.</p> <p>To add a new TACACS server, click <b>+</b>. Then enter the details specified below and click <b>OK</b>.</p> <ul style="list-style-type: none"> <li>• <b>IP Address</b>—Enter the server's 32-bit IP address.</li> <li>• <b>Password</b>—Enter the secret password for the server.</li> <li>• <b>Confirm Password</b>—Re-enter the secret password for the server.</li> <li>• <b>Server Port</b>—Enter an appropriate port.</li> <li>• <b>Source IP Address</b>—Enter the source IP address of the server.</li> <li>• <b>Time out</b>—Specify the amount of time (in seconds) the device should wait for a response from the server.</li> </ul> <p>To delete an existing TACACS server, select it and click <b>Delete</b>.</p>

Table 174: Fields on the User Management Page (*continued*)

Field	Description
<b>Password Settings</b>	
<b>NOTE:</b> <ul style="list-style-type: none"> <li>Starting in Junos OS Release 19.1R1, the User Management configuration supports the password settings range.</li> <li>J-Web interface does not support configuring the number of characters by which the new password should be different from the existing password.</li> </ul>	
Minimum Reuse	<p>Starting in Junos OS Release 19.1R1, this <b>Minimum Reuse</b> option is supported.</p> <p>Click top or bottom arrow to specify the minimum number of old passwords that you want to use. Range: 1-20.</p>
Maximum Lifetime	<p>Starting in Junos OS Release 19.1R1, this <b>Maximum Lifetime</b> option is supported.</p> <p>Click top or bottom arrow to specify the maximum lifetime of your password in days. Range: 30-365.</p>
Minimum Lifetime	<p>Starting in Junos OS Release 19.1R1, this <b>Minimum Lifetime</b> option is supported.</p> <p>Click top or bottom arrow to specify the minimum lifetime of your password in days. Range: 1-30.</p>

**Release History Table**

Release	Description
<a href="#">19.1R1</a>	Starting in Junos OS Release 19.1R1, the User Management configuration supports the password settings range.
<a href="#">19.1R1</a>	Starting in Junos OS Release 19.1R1, this <b>Minimum Reuse</b> option is supported.
<a href="#">19.1R1</a>	Starting in Junos OS Release 19.1R1, this <b>Maximum Lifetime</b> option is supported.
<a href="#">19.1R1</a>	Starting in Junos OS Release 19.1R1, this <b>Minimum Lifetime</b> option is supported.

## RELATED DOCUMENTATION

Add an User	441
Edit an User	442
Delete User	443
Search for Text in an User Management Table	443

## Add an User

You are here: **Configure > Users > User Management.**

To add a user:

1. Click the add icon (+) on the upper right side of the User Details page.  
The Create User page appears.
2. Complete the configuration according to the guidelines provided in [Table 175 on page 441](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

**Table 175: Fields on the Add User Page**

Field	Description
<b>User name</b>	Enter a unique name for the user. Do not include spaces, colons, or commas in the username.
<b>Login ID</b>	Enter a unique ID for the user.  Range is: 100 through 64000.
<b>Full Name</b>	Enter the user's full name. If the full name contains spaces, enclose it in quotation marks. Do not include colons or commas.
<b>Password</b>	Enter a login password for the user. The login password must meet the following criteria: <ul style="list-style-type: none"> <li>• The password must be at least 6 characters long.</li> <li>• You can include most character classes in a password (alphabetic, numeric, and special characters), except control characters.</li> </ul>
<b>Confirm password</b>	Reenter the login password for the user.

Table 175: Fields on the Add User Page (*continued*)

Field	Description
Role	<p>Select the user's access privilege from the following options:</p> <ul style="list-style-type: none"> <li>• <b>super-user</b></li> <li>• <b>operator</b></li> <li>• <b>read-only</b></li> <li>• <b>unauthorized</b></li> <li>• <b>lsys</b></li> <li>• <b>tenant</b></li> </ul>

## RELATED DOCUMENTATION

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[About the User Management Page | 437](#)


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[Edit an User | 442](#)


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[Delete User | 443](#)


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[Search for Text in an User Management Table | 443](#)


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## Edit an User

You are here: **Configure** > **Users** > **User Management**.

To edit a user:

1. Select an existing user profile that you want to edit on the User Profiles page.
2. Click the pencil icon available on the upper right side of the page.

The Edit User page appears with editable fields. For more information on the options, see ["Add an User" on page 441](#).

3. Click **Save** to save the changes or click **Cancel** to discard the changes.

## RELATED DOCUMENTATION

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[About the User Management Page | 437](#)


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<a href="#">Add an User   441</a>
<a href="#">Edit an User   442</a>
<a href="#">Search for Text in an User Management Table   443</a>

## Delete User

You are here: **Configure > User > User Management.**

To delete users:

1. Select one or more users that you want to delete from the User Profile page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the profile.

### RELATED DOCUMENTATION

<a href="#">About the User Management Page   437</a>
<a href="#">Add an User   441</a>
<a href="#">Edit an User   442</a>
<a href="#">Search for Text in an User Management Table   443</a>

## Search for Text in an User Management Table

You are here: **Configure > Users > User Management.**

You can use the search icon in the top right corner of the User Management page to search for text containing letters and special characters on that page.

To search for text:

1. Click the search icon and enter partial text or full text of the keyword in the search bar.  
The search results are displayed.
2. Click **X** next to a search keyword or click **Clear All** to clear the search results.

## RELATED DOCUMENTATION

[About the User Management Page | 437](#)

---

[Add an User | 441](#)

---

[Edit an User | 442](#)

---

[Delete User | 443](#)

# Users—Access Profile

## IN THIS CHAPTER

- [About the Access Profile Page | 445](#)
- [Add an Access Profile | 446](#)
- [Edit an Access Profile | 449](#)
- [Delete an Access Profile | 450](#)
- [Search for Text in an Access Profile Table | 450](#)

## About the Access Profile Page

You are here: **Configure** > **Users** > **Access Profile**.

Use this page to configure Access Profile.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Create an access profile. See [“Add an Access Profile” on page 446](#).
- Edit an access profile. See [“Edit an Access Profile” on page 449](#).
- Delete an access profile. See [“Delete an Access Profile” on page 450](#).
- Search for text in an access profile table. See [“Search for Text in an Access Profile Table” on page 450](#).
- Filter the Access profiles based on select criteria. To do this, select the filter icon at the top right-hand corner of the Access profiles table. The columns in the grid change to accept filter options. Type the filter options; the table displays only the data that fits the filtering criteria.
- View the details of the Access profile—To do this, select the Access profile for which you want to view the details and follow the available options:
  - Click **More** and select **Detailed View**.
  - Right-click on the selected Access profile and select **Detailed View**.
  - Mouse over to the left of the selected Access profiles and click **Detailed View**.



## Field Descriptions

Table 176 on page 446 describes the fields on the Access Profile page.

**Table 176: Fields on the Access Profile Page**

Field	Description
Profile Name	Enter a unique string of alphanumeric characters, colons, periods, dashes, and underscores. Maximum length is 64 characters.
Order 1	Configures the order in which the user tries different authentication methods during login. For each login attempt, the method for authentication starts with the first one, until the password matches.
Order 2	Configures the next authentication method if the authentication method included in the authentication order option is not available, or if the authentication is available but returns a reject response.
LDAP Server (Address)	Configures the LDAP server for authentication.
LDAP Option (Base Distinguished Name)	Specifies the base distinguished name that defines the user.
Number of Users	Specifies the total number of users accessing the application.

## RELATED DOCUMENTATION

[Add an Access Profile | 446](#)

[Edit an Access Profile | 449](#)

[Delete an Access Profile | 450](#)

[Search for Text in an Access Profile Table | 450](#)

## Add an Access Profile

You are here: **Configure > Users > Access Profile.**

To add an access profile:

1. Click the add icon (+) on the upper right side of the Access Profile page.

The Create Access Profile page appears.

2. Complete the configuration according to the guidelines provided in [Table 177 on page 447](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

**Table 177: Fields on the Access Profile Page**

Field	Description
<b>General Settings</b>	
Profile Name	Enter a unique string of alphanumeric characters, colons, periods, dashes, and underscores. Maximum length is 64 characters.
<b>Authentication Order</b>	
Order 1	<p>Select one or more of the following authentication method:</p> <ul style="list-style-type: none"> <li>• <b>NONE</b>—No authentication for the specified user.</li> <li>• <b>LDAP</b>—Use LDP. The SRX Series device uses this protocol to get user and group information necessary to implement the integrated user firewall feature.</li> <li>• <b>Password</b>—Use a locally configured password in the access profile. You can set the password to none or configure for the following authentication orders: <ul style="list-style-type: none"> <li>• LDAP</li> <li>• Radius servers</li> <li>• Secure ID</li> </ul> </li> <li>• <b>Radius</b>—Use RADIUS authentication services. If RADIUS servers fail to respond or return a reject response, try password authentication, because it is explicitly configured in the authentication order.</li> <li>• <b>Secure ID</b>—Configure the RSA SecurID authentication. Users can enter either static or dynamic passwords as their credentials. A dynamic password is a combination of a user's PIN and a randomly generated token that is valid for a short period of time, approximately one minute. A static password is configured for the user on the SecurID server. For example, the SecurID server administrator might set a temporary static password for a user who has lost SecurID token.</li> </ul>
Order 2	Select the authentication method from the list and click <b>Next</b> .
<b>Password</b>	

Table 177: Fields on the Access Profile Page (*continued*)

Field	Description
Address Assignment	<p>Select an address pool from the list.</p> <p>Click + to create the password using the address pool and enter the following details:</p> <ul style="list-style-type: none"> <li>• <b>User Name</b>—Enter the user name.</li> <li>• <b>Password</b>—Enter the password.</li> <li>• <b>XAUTH IP Address</b>—Enter the IPv4 address of the external authentication server to verify the authentication user account.</li> <li>• <b>Groups</b>—Enter the group name to store several user accounts together on the external authentication servers.</li> </ul>
<b>LDAP</b>	
LDAP	<p>Click + to add LDAP server, enter the following details, and click <b>OK</b>:</p> <ul style="list-style-type: none"> <li>• <b>Address</b>—Enter the IPv4 address or hostname of the LDAP authentication server.</li> <li>• <b>Port</b>—Configure the port number on which to contact the LDAP server. Range is 1 through 65535.</li> <li>• <b>Retry</b>—Specify the number of retries that a device can attempt to contact an LDAP server. Range is 1 through 10 seconds.</li> <li>• <b>Routing Instance</b>—Configure the routing instance used to send LDAP packets to the LDAP server.</li> <li>• <b>Source Address</b>—Configure a source IP address for each configured LDAP server.</li> <li>• <b>Timeout</b>—Configure the amount of time that the local device waits to receive a response from an LDAP server. Range is 3 through 90.</li> </ul>
<b>LDAP Options</b>	
Base Distinguished Name	Enter the base distinguished name that defines the user.
Revert Interval	<p>Specifies the amount of time that elapses before the primary server is contacted if a backup server is being used.</p> <p>Use top/bottom arrows to provide the revert interval.</p> <p>Range is 60 through 4294967295.</p>
<b>Additional Details</b>	
Assemble	Enable the assemble option.

Table 177: Fields on the Access Profile Page (*continued*)

Field	Description
Common Name	Enter a common name identifier.
Search	Enable the search option.
Search Filter	Specify the name of the filter to find the users LDAP distinguished name.
Admin Search	Enable the Admin search option.
Distinguished Name	Specify the distinguished name of an administrative user. The distinguished name is used in the bind for performing the LDAP search.
Password	Enter the password for the administrative user.

## RELATED DOCUMENTATION

[About the Access Profile Page | 445](#)

[Edit an Access Profile | 449](#)

[Delete an Access Profile | 450](#)

[Search for Text in an Access Profile Table | 450](#)

## Edit an Access Profile

You are here: **Configure** > **Security Services** > **Users** > **Access Profile**.

To edit an access profile:

1. Select an existing access profile that you want to edit on the Access Profile page.
2. Click the pencil icon available on the upper right side of the page.

The Edit Access Profiles page appears with editable fields. For more information on the options, see [“Add an Access Profile” on page 446](#).

3. Click **OK** to save the changes or click **Cancel** to discard the changes.

## RELATED DOCUMENTATION

- [About the Access Profile Page | 445](#)
- [Add an Access Profile | 446](#)
- [Delete an Access Profile | 450](#)
- [Search for Text in an Access Profile Table | 450](#)

## Delete an Access Profile

You are here: **Configure** > **Security Services** > **Users** > **Access Profiles**.

To delete an access profile:

1. Select an access profile that you want to delete on the Access Profiles page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the profile.

## RELATED DOCUMENTATION

- [About the Access Profile Page | 445](#)
- [Add an Access Profile | 446](#)
- [Edit an Access Profile | 449](#)
- [Search for Text in an Access Profile Table | 450](#)

## Search for Text in an Access Profile Table

You can use the search icon in the top right corner of the Access Profile page to search for text containing letters and special characters on that page.

To search for text:

1. Click the search icon and enter partial text or full text of the keyword in the search bar.  
The search results are displayed.
2. Click **X** next to a search keyword or click **Clear All** to clear the search results.

RELATED DOCUMENTATION

About the Access Profile Page	445
Add an Access Profile	446
Edit an Access Profile	449
Delete an Access Profile	450

# Users—Firewall Authentication

IN THIS CHAPTER

- About the Firewall Authentication Page | 452

## About the Firewall Authentication Page

You are here: **Configure > Users > Firewall Authentication**.

Use this page to configure firewall authentication.

To edit this page, configure minimum one access profile under **Configure > Users > Access Profile**.

### Field Description

To configure a firewall authentication:

- Complete the configuration according to the guidelines provided in [Table 178 on page 452](#).
- Click **Save** to save the changes.

[Table 178 on page 452](#) describes the fields on the Firewall Authentication page.

Table 178: Fields on the Firewall Authentication Page

Field	Description
<b>Pass-through Settings</b>	
Default Profile	Select a profile from the list that the policies use to authenticate users.
<b>FTP Banners</b>	
Login	Displays the login prompt for users logging in using FTP.  Maximum characters is 250.

Table 178: Fields on the Firewall Authentication Page (*continued*)

Field	Description
Success	Displays a successful login prompt for users logging in using FTP.  Maximum characters is 250.
Fail	Displays failed login prompt for users logging in using FTP.  Maximum characters is 250.
<b>Telnet Banners</b>	
Login	Displays the login prompt for users logging in using telnet.  Maximum characters is 250.
Success	Displays a successful login prompt for users logging in using telnet.  Maximum characters is 250.
Fail	Displays failed login prompt for users logging in using telnet.  Maximum characters is 250.
<b>HTTP Banner</b>	
Login	Displays the login prompt for users logging in using HTTP.
Success	Displays a successful login prompt for users logging in using HTTP.
Fail	Displays failed login prompt for users logging in using HTTP.
<b>Web-auth-settings</b>	
Default Profile	Select a profile that the policies use to authenticate users.
Success	Displays a successful login prompt for users logging in using Web authentication banner.
<b>Logo Image Upload</b>	
Logo File	Indicates an image to be chosen for the Web authentication logo.  <b>NOTE:</b> For the good logo image, the image format must be in .gif and the resolution must be 172x65.



Table 178: Fields on the Firewall Authentication Page *(continued)*

Field	Description
Browse	Click the button to navigate to the logo image on the user's local disk.
Sync	Click the button to sync the logo image.
Restore	Click the button to restore the Web authentication logo.

RELATED DOCUMENTATION

| [About the UAC Settings Page](#) | 455

# Users—UAC Settings

IN THIS CHAPTER

- About the UAC Settings Page | 455

## About the UAC Settings Page

You are here: **Configure** > **Users** > **UAC Settings**.

Use this page to configure UAC Settings.

### Field Description

To configure UAC settings:

- Complete the configuration according to the guidelines provided in [Table 179 on page 455](#).
- Click **Save** to save the changes.

[Table 179 on page 455](#) describes the fields on the UAC Setting page.

Table 179: Fields on the UAC Setting Page

Field	Description
Global Settings	

Table 179: Fields on the UAC Setting Page (*continued*)

Field	Description
Certificate Verification	<p>Determines whether server certificate verification is required when initiating a connection between a device and an Access Control Service in a UAC configuration.</p> <p>Select the following options from the list:</p> <ul style="list-style-type: none"> <li>• <b>None</b>—Certificate verification is not required.</li> <li>• <b>Optional</b>—Certificate verification is not required. If the CA certificate is not specified in the ca-profile option, the commit check passes and no warning is issued.</li> <li>• <b>Required</b>—Certificate verification is required. If the CA certificate is not specified in the ca-profile option, an error message is displayed, and the commit check fails. Use this option to ensure strict security.</li> <li>• <b>Warning</b>—Certificate verification is not required. A warning message is displayed during commit check if the CA certificate is not specified in the ca-profile option.</li> </ul>
Interval	<p>Specifies the value in seconds that the device should expect to receive a heartbeat signal from the IC Series device.</p> <p>Enter the heartbeat interval in seconds. Range: 1 through 9999.</p>
Test Only Mode	<p>Allows all traffic and log enforcement result.</p> <p>Enable the Test Only Mode option.</p>
Timeout	<p>Specifies (in seconds) that the device should wait to get a heartbeat response from an IC Series UAC Appliance.</p> <p>Enter the timeout in seconds. Range: 2 through 10000.</p>
Timeout Action	<p>Specifies the action to be performed when a timeout occurs and the device cannot connect to an Infranet Enforcer.</p> <p>Select the timeout action from the list.</p>
<b>Infranet Controller</b>	
Infranet Controller	<p>Click + to add an infranet controller.</p> <p>Click pencil icon to edit a selected infranet controller.</p> <p>Click delete icon to delete the selected infranet controller.</p>
Name	Enter a name for the Infranet Controller.
IP address	Enter an IP address for the Infranet Controller.

Table 179: Fields on the UAC Setting Page (continued)

Field	Description
Interface	Select an interface used for the Infranet Controller.
Interface	Enter the password to use for the Infranet Controller
CA Profiles	<p>Select a CA from the list in the <b>CA Profiles</b> column and then click the right arrow to move them to the <b>Selected</b> column.</p> <p><b>NOTE:</b> To deselect a CA, select the CA in the <b>Selected</b> column and then click the left arrow to move them to the <b>CA Profiles</b> column.</p>
Port	<p>Specifies the port number to be associated with this Infranet Controller for data traffic.</p> <p>Enter a value from 1 through 65,535.</p>
Server Certificate Subject	Enter the server certificate subject name of the Infranet Controller certificate to match.
<b>Captive Portal</b>	
Captive Portal	<p>Specifies the preconfigured security policy for captive portal on the Junos OS Enforcer.</p> <p>Click + to add a captive portal.</p> <p>Click pencil icon to edit a selected captive portal.</p> <p>Click delete icon to delete the selected captive portal.</p>
Name	Enter a name for the captive portal.
Redirect Traffic	Select a traffic type to be redirected.
Redirect URL	Enter the URL to which the captive portal should be directed.

## RELATED DOCUMENTATION

| [About the Application Tracking Page](#) | 458

# Security Objects—Application Tracking

IN THIS CHAPTER

- About the Application Tracking Page | 458

## About the Application Tracking Page

You are here: **Configure** > **Security Objects** > **Application Tracking**.

Use this page to configure application tracking.

### Field Description

To configure application tracking:

- Complete the configuration according to the guidelines provided in [Table 180 on page 458](#).
- Click **Save** to save the changes.

[Table 180 on page 458](#) describes the fields on the Application Tracking page.

Table 180: Fields on the Application Tracking Page

Field	Description
Application tracking	Select this option to enable application tracking.
Logging Type	Select an option. <ul style="list-style-type: none"><li><b>Log as session(s) created</b>—Generates a log message when a session is created. By default, this option is disabled.</li><li><b>Delay logging first session</b>—Enables you to specify the length of time that must pass before the first log message is created. The default is 1 minute.</li></ul>
First Update Interval (min)	Use the up/down arrow to set the interval time.

Table 180: Fields on the Application Tracking Page (*continued*)

Field	Description
Session Update Interval (min)	Use the up/down arrow to set the interval time.
Application Tracking By Zone	<p>Lists the available zones.</p> <ul style="list-style-type: none"><li>• To enable application tracking, select the zone and click the right arrow to move it to the tracking enabled list.</li><li>• To disable application tracking, select the zone and then click the left arrow to move the zone back into the available list.</li></ul>

## RELATED DOCUMENTATION

[About the Address Pools Page | 460](#)

# Security Objects—Address Pools

## IN THIS CHAPTER

- [About the Address Pools Page | 460](#)
- [Add an Address Pool | 461](#)
- [Edit an Address Pool | 463](#)
- [Delete Address Pool | 463](#)
- [Search for Text in an Address Pools Table | 464](#)

## About the Address Pools Page

You are here: **Configure** > **Security Objects** > **Address Pools**.

Use this page to get configure Address Pools.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add Address Pool. See [“Add an Address Pool” on page 461](#).
- Edit Address Pool. See [“Edit an Address Pool” on page 463](#).
- Delete Address Pool. See [“Delete Address Pool” on page 463](#).
- Search for Text in an Address Pools table. See [“Search for Text in an Address Pools Table” on page 464](#).
- View the details of an address pool—To do this, select the address pool for which you want to view the details and follow the available options:
  - Click **More** and select **Detailed View**.
  - Right-click on the selected address pool and select **Detailed View**.
  - Mouse over to the left of the selected address pool and click **Action\_Detail\_View**.

- Filter the address pool based on select criteria. To do this, select the filter icon at the top right-hand corner of the address pool table. The columns in the grid change to accept filter options. Type the filter options; the table displays only the data that fits the filtering criteria.
- Show or hide columns in the address pool table. To do this, use the Show Hide Columns icon in the top right corner of the page and select the options you want to show or deselect to hide options on the page.

### Field Descriptions

Table 181 on page 461 describes the fields on the Address Pools page.

**Table 181: Fields on the Address Pools Page**

Field	Description
Name	Specifies the name of the address pool.
Network Address	Specifies the network address used by the address pool.
Primary DNS	Specifies the primary-dns IP address.
Secondary DNS	Specifies the secondary-dns IP address.
Primary WINS	Specifies the primary-wins IP address.
Secondary WINS	Specifies the secondary-wins IP address.
Address Range	Specifies the name of the address range.

### RELATED DOCUMENTATION

[Add an Address Pool | 461](#)

[Edit an Address Pool | 463](#)

[Delete Address Pool | 463](#)

[Search for Text in an Address Pools Table | 464](#)

## Add an Address Pool

You are here: **Configure > Security Objects > Address Pools.**



To add an address pool:

1. Click the add icon (+) on the upper right side of the Address Pools page.  
The Create Address Pool page appears.
2. Complete the configuration according to the guidelines provided in [Table 182 on page 462](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

**Table 182: Fields on the Create Address Pool Page**

Field	Description
<b>General</b>	
Pool Name	Enter the address pool name.
Network Address	Enter a IPv4 address for the address pool.
<b>XAUTH Attributes</b>	
Primary DNS Server	Enter the primary-dns IPv4 address.
Secondary DNS Server	Enter the secondary-dns IPv4 address.
Primary WINS Server	Enter the primary-wins IPv4 address.
Secondary WINS Server	Enter the secondary-wins IPv4 address.
<b>Address Ranges</b>	
Add	Click + to add a new address range for the address pool.
Name	Enter a name for the IP address range.
Lower Limit	Enter the lower limit of the address range.
High Limit	Enter the upper limit of the address range.
Delete	Click the <b>Delete</b> icon to delete the address range for the address pool.

## RELATED DOCUMENTATION

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[About the Address Pools Page | 460](#)

---

[Edit an Address Pool | 463](#)

---

[Delete Address Pool | 463](#)

---

[Search for Text in an Address Pools Table | 464](#)

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## Edit an Address Pool

You are here: **Configure** > **Security Objects** > **Address Pools**.

To edit an address pool:

1. Select an existing address pool that you want to edit on the Address Pools page.
2. Click the pencil icon available on the upper right side of the page.

The Edit Address Pool page appears with editable fields. For more information on the options, see [“Add an Address Pool” on page 461](#).

3. Click **OK** to save the changes.

### RELATED DOCUMENTATION

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[About the Address Pools Page | 460](#)

---

[Add an Address Pool | 461](#)

---

[Delete Address Pool | 463](#)

---

[Search for Text in an Address Pools Table | 464](#)

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## Delete Address Pool

You are here: **Configure** > **Security Objects** > **Address Pools**.

To delete an address pool:

1. Select an address pool that you want to delete on the Address Pools page.
2. Click the delete icon available on the upper right side of the page.

- 3. Click **Yes** to delete or click **No** to retain the profile.

RELATED DOCUMENTATION

<a href="#">About the Address Pools Page   460</a>
<a href="#">Add an Address Pool   461</a>
<a href="#">Edit an Address Pool   463</a>
<a href="#">Search for Text in an Address Pools Table   464</a>

## Search for Text in an Address Pools Table

You can use the search icon in the top right corner of the Address Pools page to search for text containing letters and special characters on that page.

To search for text:

- 1. Click the search icon and enter partial text or full text of the keyword in the search bar.  
The search results are displayed.
- 2. Click **X** next to a search keyword or click **Clear All** to clear the search results.

RELATED DOCUMENTATION

<a href="#">About the Address Pools Page   460</a>
<a href="#">Add an Address Pool   461</a>
<a href="#">Edit an Address Pool   463</a>
<a href="#">Delete Address Pool   463</a>

# Security Services—Policy Rules

## IN THIS CHAPTER

- [About the Rules Page | 465](#)
- [Global Options | 468](#)
- [Add a Rule | 472](#)
- [Edit a Rule | 481](#)
- [Clone a Rule | 482](#)
- [Delete Rules | 482](#)
- [Search for Text in a Rules Table | 483](#)

## About the Rules Page

You are here: **Configure** > **Security Services** > **Security Policy** > **Rules**.

Use this page to get a high-level view of your firewall policy rules settings. The security policy applies the security rules to the transit traffic within a context (from-zone to to-zone). The traffic is classified by matching its source and destination zones, the source and destination addresses, and the application that the traffic carries in its protocol headers with the policy database in the data plane

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add Global Options. See [“Global Options” on page 468](#).
- Add a Rule. See [“Add a Rule” on page 472](#).
- Edit a Rule. See [“Edit a Rule” on page 481](#).
- Clone a Rule. See [“Clone a Rule” on page 482](#).
- Delete a Rule. See [“Delete Rules” on page 482](#).
- Search for text in a Rules Table. See [“Search for Text in a Rules Table” on page 483](#).

- Advanced search for policy rule. To do this, use the search text box present above the table grid. The search includes the logical operators as part of the filter string. In the search text box, when you hover over the icon, it displays an example filter condition. When you start entering the search string, the icon indicates whether the filter string is valid or not.

For an advanced search:

1. Enter the search string in the text box.

Based on your input, a list of items from the filter context menu appears.

2. Select a value from the list and then select a valid operator based on which you want to perform the advanced search operation.

**NOTE:** Press Spacebar to add an AND operator or OR operator to the search string. Press backspace at any point of time while entering a search criteria, only one character is deleted.

3. Press Enter to display the search results in the grid.

- Filter the policy rule profiles based on select criteria. To do this, select the filter icon at the top right-hand corner of the policy rule table. The columns in the grid change to accept filter options. Type the filter options; the table displays only the data that fits the filtering criteria.
- Show or hide columns in the policy rule table. To do this, click the Show Hide Columns icon in the top right corner of the policy rule table and select the options you want to view or deselect the options you want to hide on the page.

Table 183 on page 466 describes few more options on Rules.

**Table 183: More options on Rules**

Field	Description
Add Rule Before	Adds a new rule before the selected rule.
Add Rule After	Adds a new rule after the selected rule.
Copy	Copies a selected rule and enables you to paste it before or after the selected rule.
Cut	Removes the selected rule from its row and enables you to paste it before or after the selected rule.
Paste	Pastes the copied or cut rule before or after the rule selected for copy.

Table 183: More options on Rules (*continued*)

Field	Description
Clone	Clones or copies the selected firewall policy configuration and enables you to update the details of the rule.
Move Rule	Organizes records. Select a rule and choose <b>Move up</b> , <b>Move down</b> , <b>Move to top</b> , or <b>Move to bottom</b> to reposition the rule.
Disable	Disables the selected rule.
Enable	Enables the selected rule if it was disabled.
Clear Selection	Clears the selection of those rules that are selected.

## Field Descriptions

[Table 184 on page 467](#) describes the fields on the Policy Rules page.

Table 184: Fields on the Policy Rules page

Field	Description
Seq	Displays the sequence number of rules in a zone pair.
Hit Count	Displays the number of hits the rule has encountered.
Rule Name	Displays the rule name.
Source Zone	Displays the source zone that is specified in the zone pair for the rule.
Source Address	Displays the name of the source address or address set for the rule.
Source Identity	Displays the user identity of the rule.
Destination Zone	Displays the destination zone that is specified in the zone pair for the rule.
Destination Address	Displays the name of the destination address or address set for the rule.
Dynamic Application	<p>Displays the dynamic application names for match criteria in application firewall rule set.</p> <p>An application firewall configuration permits, rejects, or denies traffic based on the application of the traffic.</p>

Table 184: Fields on the Policy Rules page (*continued*)

Field	Description
Service	Displays the type of service for the destination of the rule.
URL Category	Displays the URL category that you want to match criteria for web filtering category.
Action	Displays the actions that need to take place on the traffic as it passes through the firewall.
Rule Options	Displays the rule option while permitting the traffic.
Advanced Security	Displays the security option that apply for this rule.

## RELATED DOCUMENTATION

| [Global Options](#) | 468.

## Global Options

You are here: **Configure** > **Security Services** > **Security Policy** > **Rules**.

To add global options:

1. Click **Global Options** available on the upper right side of the Rules page.  
The Global Options page appears.
2. Complete the configuration according to the guidelines provided in [Table 185 on page 468](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

[Table 185 on page 468](#) describes the fields on the Global Options page.

Table 185: Fields on the Global Options Page

Field	Action
<b>Policy Options</b>	

Table 185: Fields on the Global Options Page (*continued*)

Field	Action
Default policy action	<p>Select a value from the list.</p> <p>Specifies that specific protocol actions are overridden. This action is also non terminating. The options available are:</p> <ul style="list-style-type: none"> <li>• permit-all</li> <li>• deny-all</li> </ul>
Policy rematch	<p>Select the check box.</p> <p>Specifies that a policy is added that has just been modified to a deferred action list for reevaluation. For every session associated with the policy, the device reevaluates the policy lookup. If the policy is different from the one associated with the session, the device drops the session. If the policy matches, the session continues.</p>
Extensive	Select the check box.
Unified Policy Explicit Match	Select the check box.
<b>Flow - Main</b>	
Early ageout	<p>Enter a value from 1 through 65,535 seconds. The default value is 20 seconds.</p> <p>Specifies the amount of time before the device aggressively ages out a session from its session table.</p>
High watermark	<p>Enter a value from 0 through 100 percent. The default value is 100 percent.</p> <p>Specifies the percentage of session table capacity at which the aggressive aging-out process begins.</p>
Low watermark	<p>Enter a value from 0 through 100 percent. The default value is 100 percent.</p> <p>Specifies the percentage of session table capacity at which the aggressive aging-out process ends.</p>
Enable SYN cookie protection	<p>Select the check box.</p> <p>Enables SYN cookie defenses against SYN attacks.</p>
Enable SYN proxy protection	<p>Select the check box.</p> <p>Enables SYN proxy defenses against SYN attacks.</p>



Table 185: Fields on the Global Options Page (*continued*)

Field	Action
Allow DNS reply	<p>Select the check box.</p> <p>Specifies that an incoming DNS reply packet without a matched request is allowed.</p>
Force IP reassembly	<p>Specifies reassemble all IP fragmented packets before forwarding.</p>
Enable Routing Mode	<p>Enables routing mode on uPIM and ePIM ports that correspond to the interfaces that will carry the VPLS traffic.</p>
Route change to nonexistent route timeout	<p>Specifies the session timeout value on a route change to a nonexistent route.</p> <p>Enter a value from 6 through 1800 seconds.</p>
<b>Flow - TCP MSS</b>	
Enable MSS override for all packets	<p>Select the check box.</p> <p>Enables maximum segment size override for all TCP packets for network traffic.</p> <p>Enter an maximum segment size value from 64 through 65,535.</p>
Enable MSS override for all GRE packets coming out of an IPsec tunnel	<p>Select the check box.</p> <p>Enables maximum segment size override for all generic routing encapsulation packets exiting an IPsec tunnel.</p> <p>Enter a maximum segment size value from 64 through 65,535 bytes. The default value is 1320 bytes.</p>
Enable MSS override for all GRE packets entering an IPsec tunnel	<p>Select the check box.</p> <p>Enables maximum segment size override for all generic routing encapsulation packets entering an IPsec tunnel.</p> <p>Enter a maximum segment size value from 64 through 65,535 bytes. The default value is 1320 bytes.</p>
Enable MSS override for all packets entering IPsec tunnel	<p>Select the check box.</p> <p>Enables maximum segment size override for all packets entering an IPsec tunnel.</p> <p>Enter a maximum segment size value from 64 through 65,535 bytes. The default value is 1320 bytes.</p>
<b>Flow - TCP Session</b>	

Table 185: Fields on the Global Options Page (*continued*)

Field	Action
Disable sequence-number checking	<p>Select the check box.</p> <p>Disables checking of sequence numbers in TCP segments during stateful inspections. By default, the device monitors the sequence numbers in TCP segments.</p>
Strict SYN-flag check	<p>Select the check box.</p> <p>Enables the strict three-way handshake check for the TCP session. This check enhances security by dropping data packets before the three-way handshake is done. By default, this check is disabled.</p>
Disable SYN-flag check	<p>Disables the checking of the TCP SYN bit before creating a session. By default, the device checks that the SYN bit is set in the first packet of a session. If it is not set, the device drops the packet.</p> <p>Select the check box.</p>
Disable SYN-flag check (tunnel packets)	<p>Select the check box.</p> <p>Disables the first packet check for the SYN flag when forming a TCP flow session.</p>
RST invalidate session	<p>Select the check box.</p> <p>Specifies that a session is marked for immediate termination when it receives a TCP RST segment. By default, this statement is unset. When unset, the device applies the normal session timeout interval—for TCP, session timeout is 30 minutes; for HTTP, it is 5 minutes; and for UDP, it is 1 minute.</p>
RST sequence check	<p>Select the check box.</p> <p>Specifies that the TCP sequence number in a TCP segment can be checked, with the RST bit enabled. This matches the previous sequence number for a packet in that session or is the next higher number incrementally.</p>
TCP Initial Timeout	<p>Select the check box.</p> <p>Specifies the length of time (in seconds) that the device keeps an initial TCP session in the session table before dropping it, or until the device receives a FIN or RST packet.</p>
<b>Pre-id Default Policy</b>	
<b>Session Timeout</b>	

Table 185: Fields on the Global Options Page (*continued*)

Field	Action
ICMP	Type the interval in seconds from 4 through 86400.
ICMP6	Type the interval in seconds from 4 through 86400.
OSPF	Type the interval in seconds from 4 through 86400.
Others	Type the interval in seconds from 4 through 86400.
TCP	Type the interval in seconds from 4 through 86400.
UDP	Type the interval in seconds from 4 through 86400.
<b>Log</b>	
Enable Session init	Select the check box to enable Session init.
Enable Session close	Select the check box to enable Session close.
<b>NGFW Options</b>	
Default SSL Profile	Select the default SSL profile.

## RELATED DOCUMENTATION

| [Add a Rule](#) | 472.

## Add a Rule

You are here: **Configure > Security Services > Security Policy > Rules.**

To add a Rule:

1. Click the add icon (+) on the upper right side of the Rules page.

The Create Rule page appears.

2. Complete the configuration according to the guidelines provided in [Table 186 on page 473](#).

3. Click **OK** to save the changes or click **Cancel** to discard the changes.

**Table 186: Fields on Create Rule page**

Field	Action
<b>General</b>	
Rule Name	Enter a name for the new rule or policy.
Rule Description	Enter a description for the security policy.
Global Policy	Specifies that the policy defined is a global policy and zones are not required.
<b>Source</b>	
Zone	Identify and select the source zone to which you want the rule to be associated with from the menu.
Address(es)	<p>Select the Address(es) for the policy by clicking Select The Source Address page appears.</p> <p>Select the Address for this policy. The options available are:</p> <ul style="list-style-type: none"> <li>• Include Any Address—Selecting this will include any address as the source address.</li> <li>• Include Specific—Selects an address book entry from the available list or you can make a new address book entry by selecting Add New Source Address and creating a new source address in the Create Address page.</li> <li>• Exclude Specific—Selects an address book entry from the available list or you can make a new address book entry by selecting Add New Source Address and creating a new source address in the Create Address page.</li> </ul>
Identity	<p>Select the user identity to permit or deny.</p> <p>Click <b>Select</b> to choose a user identity from the available list or you can make a new user identity by selecting <b>Add New Identity</b> and creating a new user name or identity in the Create Identity page.</p> <p><b>NOTE:</b> Starting in Junos OS Release 19.1R1, list of local authentication users are available in the source identity list for logical system and tenant users.</p>
<b>Destination</b>	
Zone	Identify and select the destination zone to which you want the rule to be associated with from the dropdown menu.

Table 186: Fields on Create Rule page (continued)

Field	Action
Address(es)	<p>Select the Address(es) for the policy by clicking <b>Select</b> The Destination Address page appears.</p> <p>Select the Address for this policy. The options available are:</p> <ul style="list-style-type: none"><li>• Include Any Address—Selecting this will include any address as the destination address.</li><li>• Include Specific—Selects an address book entry from the available list or you can make a new address book entry by selecting <b>Add New Source Address</b> and creating a new source address in the Create Address page.</li><li>• Exclude Specific—Selects an address book entry from the available list or you can make a new address book entry by selecting <b>Add New Source Address</b> and creating a new source address in the Create Address page.</li></ul>

Table 186: Fields on Create Rule page (*continued*)

Field	Action
Dynamic Application	<p>Select the dynamic application names for match criteria in application firewall rule set.</p> <p>Select the application from the Available list and move it to Selected list.</p> <p>Starting in Junos OS Release 19.2R1, you can add an application or application group for a dynamic application using the <b>Add New Application</b> or <b>Add New Application Group</b> button.</p> <ol style="list-style-type: none"> <li>Click <b>Select</b> to select a dynamic application. Enter the following details in the Dynamic Application page: The Dynamic Application page appears.</li> <li>Application/Group—Select an option from the list. To add a new application: <ol style="list-style-type: none"> <li>Select Application from the list.</li> <li>Click Add New Application. The Create Application Signature page appears.</li> <li>Follow the steps mentioned in the Application Signature Configuration Page Options section to create application signature.</li> <li>Click <b>OK</b>. The Dynamic Application page appears.</li> </ol>  To add a new application group: <ol style="list-style-type: none"> <li>Select Group from the list.</li> <li>Click Add New Application Group. The Create Application Signature Group page appears.</li> <li>Enter name of the application group in the Name field.</li> <li>Select the group members or click + to add application signatures to the group member.</li> <li>Click <b>OK</b>. The Dynamic Application page appears.</li> </ol> <p><b>NOTE:</b> After adding an application or group, it should be auto-selected in Dynamic Application. The values None or any should be moved to available list. By default, None value is auto-populated when the Selected list is empty.</p> </li> <li>Predefined/Custom—Select an option from the list: Predefined, Custom, or All.</li> <li>Category—Select an option from the list.</li> <li>Dynamic Application—Select the application from the Available list and move it to Selected list.</li> <li>Click <b>OK</b>.</li> </ol>

Table 186: Fields on Create Rule page (continued)

Field	Action
Service(s)	

Table 186: Fields on Create Rule page (*continued*)

Field	Action
	<p>Click <b>Select</b> to select the services to permit or deny. You can choose a service from the available list.</p> <p>Starting in Junos OS Release 19.2R1, you can add a new service using the Add New Service button.</p> <p>To add a new service:</p> <ol style="list-style-type: none"> <li>1. Click <b>Add New Service</b> on the Service page. The Create Service page appears.</li> <li>2. Enter the following details for global settings: <ul style="list-style-type: none"> <li>• Name—Enter a unique name for application.</li> <li>• Description—Enter description of application.</li> <li>• Application Protocol—Select an option from the list for application protocol.</li> <li>• Match IP protocol—Select an option from the list to match IP protocol.</li> <li>• Source Port—Select an option from the list for source port.</li> <li>• Destination Port—Select an option from the list for destination port.</li> <li>• ICMP Type—Select an option from the list for ICMP message type.</li> <li>• ICMP Code—Select an option from the list for ICMP message code.</li> <li>• RPC program numbers—Enter a value for RPC program numbers. The format of the value must be W or X-Y. Where, W, X, and Y are integers between 0 and 65535.</li> <li>• Inactivity Timeout—Select an option from the list for application specific inactivity timeout.</li> <li>• UUID—Enter a value for DCE RPC objects. <b>NOTE:</b> The format of the value must be 12345678-1234-1234-1234-123456789012.</li> </ul> </li> <li>3. Enter the following details for terms if you want to define individual application protocols: <ol style="list-style-type: none"> <li>a. Click + to create a term.</li> <li>b. Name—Enter the name for term.</li> <li>c. ALG—Select an option from the list for ALG.</li> <li>d. Match IP protocol—Select an option from the list to match IP protocol.</li> <li>e. Source Port—Select an option from the list for source port.</li> <li>f. Destination Port—Select an option from the list for destination port.</li> <li>g. ICMP Type—Select an option from the list for ICMP message type.</li> <li>h. ICMP Code—Select an option from the list for ICMP message code.</li> <li>i. RPC program numbers—Enter a value for RPC program numbers. <b>NOTE:</b> The format of the value must be W or X-Y. Where, W, X, and Y are integers between 0 and 65535.</li> </ol> </li> </ol>



Table 186: Fields on Create Rule page (continued)

Field	Action
	<p>j. Inactivity Timeout—Select an option from the list for application specific inactivity timeout.</p> <p>k. UUID—Enter a value for DCE RPC objects.</p> <p>NOTE: The format of the value must be 12345678-1234-1234-1234-123456789012.</p> <p>4. Click <b>Create</b> to create a service.</p> <p>5. Click <b>OK</b>.</p> <p>NOTE: After adding a service, it should be auto-selected in Service(s). The values None or any should be moved to available list.</p>
URL Category	<p>Select the URL category that you want to match criteria for web filtering category.</p> <p>Select the URL category by clicking Select.</p> <p>URL Category page appears.</p> <ul style="list-style-type: none"><li>• Predefined/Custom—Select an option from the list: Predefined, Custom, or All.</li><li>• URL Category—Select an option from the list.</li></ul>
Advanced Security	

Table 186: Fields on Create Rule page (*continued*)

Field	Action
Rule Action	<p>Select an option.</p> <p>Specifies the action taken when traffic matches the criteria. Available options are:</p> <ul style="list-style-type: none"> <li>• Permit</li> <li>• Deny</li> <li>• Reject</li> </ul> <p>Permit—Allow packet to pass through the firewall. It enables the following Permit options:</p> <ol style="list-style-type: none"> <li>1. App Firewall—Select the application firewall from the list.</li> <li>2. IPS—Select Off or On from the list. If you select On, the IPS Policy field will be disabled. If you select Off, you may select the IPS Policy from the list.</li> <li>3. UTM—Select the UTM policy to associate with this rule from the list, which shows all the UTM policies available. If you want to create a new UTM policy, click Add New, which enables you to create a new UTM policy in the Create UTM Policies Wizard. To know more about this wizard refer Configure&gt;Security&gt;UTM page in J-Web.</li> <li>4. SSL Proxy—Select the SSL proxy policy to associate with this rule from the list, which shows all the SSL proxy profiles that are created using the Configure&gt;Security&gt;SSL Proxy page in J-Web. After you associate, the SSL proxy policy will be applied to the traffic.</li> <li>5. IPsec VPN—Select the IPsec VPN tunnel from the list.</li> <li>6. Pair Policy Name—Select the name of the policy with the same IPsec VPN in the opposite direction to create a pair policy.</li> <li>7. Threat Prevention Policy—Select the configured threat prevention policy from the list. To create a threat prevention policy go to Configure&gt;Security&gt;SkyATP or Threat Prevention&gt;Policies.</li> <li>8. ICAP Redirect Profile—Select the configured ICAP Redirect profile name from the list.</li> </ol> <p>Deny—Block and drop the packet, but do not send notification back to the source.</p> <p>Reject—Block and drop the packet and send a notice to the source host.</p> <ul style="list-style-type: none"> <li>• For TCP traffic—Sends TCP RST.</li> <li>• For UDP traffic—Sends ICMP destination unreachable, port unreachable message (type 3, code 3).</li> <li>• For TCP and UDP traffic—Specifies action denied.</li> </ul>
<b>Rule Options</b>	
<b>Logging/Count</b>	

Table 186: Fields on Create Rule page (*continued*)

Field	Action
Log at Session Close Time	<p>Select the check box.</p> <p>Specifies that an event is logged when the session closes.</p>
Log at Session Init Time	<p>Select the check box.</p> <p>Specifies that an event is logged when the session is created.</p>
Enable Count	<p>Select the check box.</p> <p>Specifies statistical counts and triggers alarms whenever traffic exceeds specified packet and byte thresholds. When this count is enabled, statistics are collected for the number of packets, bytes, and sessions that pass through the firewall with this policy.</p> <p><b>NOTE:</b> Alarm threshold fields are disabled if Enable Count is not enabled.</p>
<b>Authentication</b>	
Push Auth Entry to JIMS	<p>Select the check box.</p> <p>Pushes authentication entries from firewall authentication, that are in auth-success state, to Juniper Identity Management Server (JIMS). This will enable the SRX device to query JIMS to get IP/user mapping and device information.</p>
Type	Select the type of firewall authentication from the list. The options available are: None, Pass-through, User-firewall, and Web-authentication.
<b>Advanced Settings</b>	
Destination Address Translation	Select the action to be taken on a destination address translation. The options available are: None, Drop Translated, Drop Untranslated.
Redirect Options	Select the action to redirect. The options available are: None, Redirect Wx, and Reverse Redirect Wx.
Enable TCP-SYN	<p>Disables or enables the checking of the TCP SYN bit before creating a session. By default, the device checks that the SYN bit is set in the first packet of a session. If it is not set, the device drops the packet.</p> <p>Select if you want enable TCP-SYN.</p>

Table 186: Fields on Create Rule page (*continued*)

Field	Action
Log TCP Sequence	<p>Disables or enables checking of sequence numbers in TCP segments during stateful inspections. By default, the device monitors the sequence numbers in TCP segments.</p> <p>Select if you want to log TCP sequencing.</p>

## RELATED DOCUMENTATION

[Edit a Rule | 481.](#)
[Clone a Rule | 482](#)

## Edit a Rule

You are here: **Configure** > **Security Services** > **Security Policy** > **Rules**.

To edit a Rule:

1. Select an existing rule configuration that you want to edit on the Rules page.
2. Click the pencil icon available on the upper right side of the page.

The Edit Rule page appears with editable fields. For more information on the options, see [“Add a Rule” on page 472](#).

3. Click **OK** to save the changes.

## RELATED DOCUMENTATION

[Delete Rules | 482](#)

## Clone a Rule

You are here: **Configure** > **Security Services** > **Security Policy** > **Rules**.

To clone a Rule:

1. Select a Rule that you want to clone and select **Clone** from the More link.

**NOTE:** Alternatively, you can right-click on the selected Rule and select **Clone**.

The Clone Rule page appears with editable fields. For more information on the options, see [“Add a Rule” on page 472](#).

2. Click **OK** to save the changes or click **Cancel** to discard the changes.

### RELATED DOCUMENTATION

[Delete Rules | 482](#)

[Search for Text in a Rules Table | 483](#)

## Delete Rules

You are here: **Configure** > **Security Services** > **Security Policy** > **Rules**.

To delete a rule:

1. Select one or more rules that you want to delete on the Rules page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the profile.

### RELATED DOCUMENTATION

[Search for Text in a Rules Table | 483](#).

## Search for Text in a Rules Table

You can use the search icon in the top right corner of the rules page to search for text containing letters and special characters on that page.

To search for text:

1. Click the search icon and enter partial text or full text of the keyword in the search bar.

The search results are displayed.

2. Click **X** next to a search keyword or click **Clear All** to clear the search results.

### RELATED DOCUMENTATION

[About the Rules Page](#) | 465.

# Security Services—Policy Objects Zones/Screens

IN THIS CHAPTER

- [About the Zones/Screens Page | 484](#)
- [Add a Zone | 485](#)
- [Edit a Zone | 488](#)
- [Delete Zone | 488](#)
- [Add a Screen | 489](#)
- [Edit a Screen | 497](#)
- [Delete Screen | 497](#)

## About the Zones/Screens Page

You are here: **Configure > Security Services > Security Policy > Objects > Zones/Screens.**

Use this page to configure zones and screens.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a Zone. See [“Add a Zone” on page 485](#).
- Edit a Zone. See [“Edit a Zone” on page 488](#).
- Delete Zone. See [“Delete Zone” on page 488](#).
- Add a Screen. See [“Add a Screen” on page 489](#).
- Edit a Screen. See [“Edit a Screen” on page 497](#).
- Delete Screen. See [“Delete Screen” on page 497](#).

### Field Descriptions

[Table 187 on page 485](#) describes the fields on Zones/Screens page.

Table 187: Fields on Zones/Screens Page

Field	Description
<b>Zone List</b>	
Zone name	Displays the name of the zone.
Type	Displays the type of zone.
Host-inbound Services	Displays the services that permit inbound traffic.
Host-inbound Protocols	Displays the protocol that permit inbound traffic.
Interfaces	Displays the interfaces that are part of this zone.
Screen	Displays name of the option objects applied to the zone.
Description	Displays a description of the zone.
<b>Screen List</b>	
Screen name	Displays the name of the screen object.
Type	Displays the type of screen.
Description	Displays a description of the screen.

## RELATED DOCUMENTATION

| [Add a Zone](#) | 485.

## Add a Zone

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Zones/Screens**.

To add a zone:

1. Click the add icon (+) on the upper right side of the Zone List page.

The Add Zone page appears.



2. Complete the configuration according to the guidelines provided in [Table 188 on page 486](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

**Table 188: Fields on the Add Zone page**

Field	Action
<b>Main</b>	
Zone name	Enter a name for the zone.
Zone description	Enter a description for the zone.
Zone type	Select a zone type: Security or Functional.
Application Tracking	Select the check box to enable application tracking support for the zone.
Source Identity Log	Select the check box to enable it to trigger user identity logging when that zone is used as the source zone (from-zone) in a security policy.
Traffic Control Options	<p>Enter the following details:</p> <ul style="list-style-type: none"> <li>• Send RST for Non Matching Session—Select the check box to enable this option. Specifies that when the reset feature is enabled, the system sends a TCP segment with the RESET flag set when traffic arrives. This does not match an existing session and does not have the Synchronize flag set.</li> <li>• Binding Screen—Select a binding screen from the list. <b>NOTE:</b> If you have already configured screens, the list shows the screen names and allows you to select or delete a screen.</li> </ul>
Interfaces	Select interfaces from the Available column and move it to the Selected column using the arrow to include in the security zone.
<b>Host inbound traffic - Zone</b>	
Protocols	<p>Specifies the protocols that permit inbound traffic of the selected type to be transmitted to hosts within the zone.</p> <p>Select the protocols from the Available column and move it to the Selected column using the right arrow.</p> <p>Select <b>all</b> to permit all protocols.</p> <p><b>NOTE:</b> To deselect protocols, select the protocols in the Selected column and then use the left arrow to move them to the Available column.</p>

Table 188: Fields on the Add Zone page (*continued*)

Field	Action
Services	<p>Specifies the interface services that permit inbound traffic of the selected type to be transmitted to hosts within the zone.</p> <p>Select the services from the Available column and move it to the Selected column using the right arrow.</p> <p>Select <b>all</b> to permit all services.</p> <p><b>NOTE:</b> To deselect services, select the services in the Selected column and then use the left arrow to move them to the Available column.</p>
<b>Host inbound traffic - Interface</b>	
Selected Interfaces	Displays the list of selected interfaces.
Interface Services	<p>Specifies the interfaced services that permit inbound traffic from the selected interface to be transmitted to hosts within the zone.</p> <p>Select the interface services from the Available column and move it to the Selected column using the right arrow. Select <b>all</b> to permit all interface services.</p> <p><b>NOTE:</b> If you select multiple interfaces, the existing interface services and protocols are cleared and are applied to the selected interfaces.</p>
Interface Protocols	<p>Specifies the interfaced protocols that permit inbound traffic from the selected interface to be transmitted to hosts within the zone.</p> <p>Select the interface protocols from the Available column and move it to the Selected column using the right arrow. Select <b>all</b> to permit all interface protocols.</p>

## RELATED DOCUMENTATION

[Edit a Zone](#) | 488

## Edit a Zone

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Zones/Screens**.

To edit a zone:

1. Select an existing zone configuration that you want to edit on the Zones/Screens page.
2. Click the pencil icon available on the upper right side of the Zone List page.

The Edit Zone page appears with editable fields. For more information on the options, see [“Add a Zone” on page 485](#).

3. Click **OK** to save the changes.

### RELATED DOCUMENTATION

| [Delete Zone](#) | [488](#).

## Delete Zone

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Zones/Screens**.

To delete a zone:

1. Select a zone that you want to delete on the Zones/Screens page.
2. Click the delete icon available on the upper right side of the Zone List page.

A confirmation window appears.

3. Click **Yes** to delete or click **No** to retain the profile.

### RELATED DOCUMENTATION

| [Add a Screen](#) | [489](#).

## Add a Screen

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Zones/Screens**.

To add a Screen:

1. Click the add icon (+) on the upper right side of the Screen List page.  
The Add Screen page appears.
2. Complete the configuration according to the guidelines provided in [Table 189 on page 489](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

[Table 189 on page 489](#) describes the fields on Add Screen page.

**Table 189: Fields on the Add Screen Page**

Field	Action
<b>Main</b>	
Screen name	Enter a name for the screen object.
Screen description	Enter a description for the screen object.
Generate alarms without dropping packet	Select the check box to enable this feature.
IP spoofing	<p>Select the check box to enable this feature.</p> <p>Specifies that you can enable IP address spoofing. IP spoofing is when a false source address is inserted in the packet header to make the packet appear to come from a trusted source.</p>
IP sweep	<p>Select the check box to enable this feature.</p> <p>Specifies the number of ICMP address sweeps. An IP address sweep can occur with the intent of triggering responses from active hosts.</p>
Threshold	<p>Enter the time interval for an IP sweep.</p> <p><b>NOTE:</b> If a remote host sends ICMP traffic to 10 addresses within this interval, an IP address sweep attack is flagged and further ICMP packets from the remote host are rejected.</p> <p>Range: 1000 through 1000000 microseconds. The default value is 5000 microseconds.</p>

Table 189: Fields on the Add Screen Page (*continued*)

Field	Action
Port scan	<p>Select the check box to enable this feature.</p> <p>Specifies the number of TCP port scans. The purpose of this attack is to scan the available services in the hopes that at least one port will respond, thus identifying a service to target.</p>
Threshold	<p>Enter the time interval for a TCP port scan.</p> <p><b>NOTE:</b> If a remote host scans 10 ports within this interval, a port scan attack is flagged and further packets from the remote host are rejected.</p> <p>Range: 1000 through 1000000 microseconds. The default value is 5000 microseconds.</p>
MS-Windows Defense	<p>WinNuke attack protection—Select the check box to enable this feature.</p> <p><b>NOTE:</b> WinNuke is a DoS attack targeting any computer on the Internet running Windows operating system.</p>
IPv6 Check	<p>Enter the following details:</p> <ul style="list-style-type: none"> <li>● Malformed IPv6—Select this check box to enable the IPv6 malformed header intrusion detection service (IDS) option.</li> <li>● Malformed ICMPv6—Select this check box to enable the ICMPv6 malformed IDS option.</li> </ul>
<b>Denial of Service</b>	
Land attack protection	<p>Select the check box to enable this feature.</p> <p><b>NOTE:</b> Land attacks occur when an attacker sends spoofed SYN packets containing the IP address of the victim as both the destination and source IP address.</p>
Teardrop attack protection	<p>Select the check box to enable this feature.</p> <p><b>NOTE:</b> Teardrop attacks exploit the reassembly of fragmented IP packets.</p>
ICMP fragment protection	<p>Select the check box to enable this feature.</p> <p><b>NOTE:</b> ICMP packets contain very short messages. There is no legitimate reason for ICMP packets to be fragmented.</p>
Ping of death attack protection	<p>Select the check box to enable this feature.</p> <p><b>NOTE:</b> A ping of death occurs when IP packets are sent that exceed the maximum legal length (65,535 bytes).</p>

Table 189: Fields on the Add Screen Page (*continued*)

Field	Action
Large size ICMP packet protection	Select the check box to enable this feature.
Block fragment traffic	Select the check box to enable this feature.
SYN-ACK-ACK proxy protection	Select the check box to enable this feature.
Threshold	Enter the threshold value for SYN-ACK-ACK proxy protection.  <b>NOTE:</b> The range is from 1 through 250000 sessions. The default value is 512 sessions.
<b>Anomalies</b>	
IP	<p>Enter the following details:</p> <ul style="list-style-type: none"> <li>• Bad option—Select the check box to specify the number of bad options counter.</li> <li>• Security—Select the check box to enable the method for hosts to send security.</li> <li>• Unknown protocol—Select the check box to enable the IP address with security option.</li> <li>• Strict source route—Select the check box to enable the complete route list for a packet to take on its journey from source to destination.</li> <li>• Source route—Select the check box to enable this feature. Specifies the number of IP addresses of the devices set at the source that an IP transmission is allowed to take on its way to its destination.</li> <li>• Timestamp—Select the check box to enable the time recorded (in UTC) when each network device receives the packet during its trip from the point of origin to its destination.</li> <li>• Stream—Select the check box to enable a method for the 16-bit SATNET stream identifier to be carried through networks that do not support streaming.</li> <li>• Loose source route—Select the check box to enable a partial route list for a packet to take on its journey from source to destination.</li> <li>• Record route—Select the check box to enable that IP addresses of network devices along the path that the IP packet travels can be recorded.</li> </ul>

Table 189: Fields on the Add Screen Page (*continued*)

Field	Action
TCP	<p>Enter the following details:</p> <ul style="list-style-type: none"> <li>• SYN Fragment Protection—Select the check box to enable the number of TCP SYN fragments.</li> <li>• SYN and FIN Flags Set Protection—Select the check box to enable the number of TCP SYN and FIN flags.</li> </ul> <p><b>NOTE:</b> When you enable this option, Junos OS checks if the SYN and FIN flags are set in TCP headers. If it discovers such a header, it drops the packet.</p> <ul style="list-style-type: none"> <li>• FIN Flag Without ACK Flag Set Protection—Select the check box to enable the number of TCP FIN flags set without an ACK flag set.</li> <li>• TCP Packet Without Flag Set Protection—Select the check box to enable the number of TCP headers without flags set.</li> </ul> <p><b>NOTE:</b> A normal TCP segment header has at least one flag control set.</p>
<b>Flood Defense</b>	
Limit sessions from the same source	<p>Enter the range within which the sessions are limited from the same source IP.</p> <p>Range: 1 through 50000 sessions.</p>
Limit sessions from the same destination	<p>Enter the range within which the sessions are limited from the same destination IP. The range is from 1 through 50000 sessions.</p> <p>Range: 1 through 8000000 sessions per second. The default value is 128 sessions.</p>
ICMP flood protection	<p>Select the check box to enable the Internet Control Message Protocol (ICMP) flood counter.</p> <p><b>NOTE:</b> An ICMP flood typically occurs when ICMP echo requests use all resources in responding, such that valid network traffic can no longer be processed.</p>
Threshold	<p>Enter the threshold value for ICMP flood protection.</p> <p><b>NOTE:</b> Range: 1 through 4000000 ICMP pps.</p>
UDP flood protection	<p>Select the check box to enable the User Datagram Protocol (UDP) flood counter.</p> <p><b>NOTE:</b> UDP flooding occurs when an attacker sends IP packets containing UDP datagrams to slow system resources, such that valid connections can no longer be handled.</p>

Table 189: Fields on the Add Screen Page (*continued*)

Field	Action
Threshold	<p>Enter the threshold value for UDP flood protection.</p> <p><b>NOTE:</b> Range: 1 through 100000 session. The default value is 1000 sessions.</p>
<p>UDP white list</p> <p>Starting Junos Release 18.1R1, the option to add UDP IP addresses and allowlist them is available.</p>	<ol style="list-style-type: none"> <li>Click <b>Select</b>. A window appears.</li> <li>Click + to add IP addresses that you wish to allowlist. A window appears.</li> <li>Enter the following details: <ul style="list-style-type: none"> <li>Name—Enter a Name to identify the group of IP addresses.</li> <li>IPv4/IPv6 Address—Enter IPv4 or IPv6 address.</li> <li>IPv4/IPv6 Address(es)—Lists the address that you have entered.</li> </ul> <p><b>NOTE:</b> You can select the IP address and click <b>X</b> to delete it.</p> </li> <li>Click <b>OK</b> to save the changes.</li> <li>Select the allowlist name that you associated with the group of IP addresses from the Available column and move it to the Selected column using the right arrow.</li> <li>Click <b>OK</b> to save the changes.</li> </ol> <p><b>NOTE:</b></p> <ul style="list-style-type: none"> <li>This option is enabled only if you select UDP flood protection.</li> <li>The allowlist that you created in the UDP white list window will be available in the TCP white list window also for selection.</li> </ul> <p>To edit an allowlist, select the allowlist name and click on the pencil icon.</p> <p>To delete an allowlist, select the allowlist name and click on the delete icon.</p>
SYN flood protection	<p>Select the check box to enable all the threshold and age timeout options.</p> <p>Specifies that SYN flooding occurs when a host becomes so overwhelmed by SYN segments initiating incomplete connection requests that it can no longer process legitimate connection requests.</p>



Table 189: Fields on the Add Screen Page (*continued*)

Field	Action
<p>TCP white list</p> <p>Starting Junos Release 18.1R1, the option to add TCP IP addresses and allowlist them is available.</p>	<ol style="list-style-type: none"> <li>Click <b>Select</b>. A window appears.</li> <li>Click + to add IP addresses that you wish to allowlist. A window appears.</li> <li>Enter the following details: <ul style="list-style-type: none"> <li>Name—Enter a Name to identify the group of IP addresses.</li> <li>IPv4/IPv6 Address—Enter IPv4 or IPv6 address.</li> <li>IPv4/IPv6 Address(es)—Lists the address that you have entered.</li> </ul> <p><b>NOTE:</b> You can select the IP address and click <b>X</b> to delete it.</p> </li> <li>Click <b>OK</b> to save the changes.</li> <li>Select the allowlist name that you associated with the group of IP addresses from the Available column and move it to the Selected column using the right arrow.</li> <li>Click <b>OK</b> to save the changes.</li> </ol> <p><b>NOTE:</b></p> <ul style="list-style-type: none"> <li>This option is enabled only if you select SYN flood protection.</li> <li>The allowlist that you created in the TCP white list window will be available in the UDP white list window also for selection.</li> </ul> <p>To edit an allowlist select the allowlist name and click on the pencil icon.</p> <p>To delete an allowlist, select the allowlist name and click on the delete icon.</p>
Attack threshold	<p>Enter a value to specify the number of SYN packets per second required to trigger the SYN proxy mechanism.</p> <p><b>NOTE:</b> Range: 1 through 1000000 proxied requests per second. The default attack threshold value is 625 pps.</p>
Alarm threshold	<p>Enter a value to specify the number of half-complete proxy connections per second at which the device makes entries in the event alarm log.</p> <p><b>NOTE:</b> Range: 1 through 1000000 segments per second. The default alarm threshold value is 250 pps.</p>

Table 189: Fields on the Add Screen Page (continued)

Field	Action
Source threshold	<p>Enter a value to specify the number of SYN segments received per second from a single source IP address (regardless of the destination IP address and port number), before the device begins dropping connection requests from that source.</p> <p><b>NOTE:</b> Range: 4 through 1000000 segments per second. The default source threshold value is 25 pps.</p>
Destination threshold	<p>Enter a value to specify the number of SYN segments received per second for a single destination IP address before the device begins dropping connection requests to that destination. If a protected host runs multiple services, you might want to set a threshold based only on destination IP address, regardless of the destination port number.</p> <p><b>NOTE:</b> Range: 4 through 1000000 segments per second. The default destination threshold value is 0 pps.</p>
Ager timeout	<p>Enter a value to specify the maximum length of time before a half-completed connection is dropped from the queue. You can decrease the timeout value until you see any connections dropped during normal traffic conditions.</p> <p>Range: 1 through 50 seconds. The default value is 20 seconds.</p> <p><b>NOTE:</b> 20 seconds is a reasonable length of time to hold incomplete connection requests.</p>
<b>IPv6 EXT Header</b>	
Predefined Header Type	<p>Configure the following screen options:</p> <ul style="list-style-type: none"> <li>• Hop-by-Hop header—Select an option from the list and enter the value and click + to add it. To delete, select one or more headers and click X.</li> <li>• Destination header—Select an option from the list and enter the value and click + to add it. To delete, select one or more headers and click X.</li> </ul>
Routing header	Select the check box to enable the IPv6 routing header screen option.
ESP header	Select the check box to enable the IPv6 Encapsulating Security Payload header screen option.
No-Next header	Select the check box to enable the IPv6 no next header screen option.
Mobility header	Select the check box to enable the IPv6 mobility header screen option.

Table 189: Fields on the Add Screen Page (*continued*)

Field	Action
Fragment header	Select the check box to enable the IPv6 fragment header screen option.
AH header	Select the check box to enable the IPv6 Authentication Header screen option.
Shim6 header	Select the check box to enable the IPv6 shim header screen option.
HIP header	Select the check box to enable the IPv6 Host Identify Protocol header screen option.
Customer Defined Header Type	Enter a value to define the type of header range and click + to add it.  Range: 0 through 255.  To delete, select one or more header types and click X.
IPv6 ext header limit	Enter a value to set the number of IPv6 extension headers that can pass through the screen.  Range: 0 through 32.
<b>Apply to Zones</b>	
Apply to Zones	Select zones from the Available column and move them to the Selected column using the right arrow.

**Release History Table**

Release	Description
<a href="#">18.1R1</a>	Starting Junos Release 18.1R1, the option to add UDP IP addresses and allowlist them is available.
<a href="#">18.1R1</a>	Starting Junos Release 18.1R1, the option to add TCP IP addresses and allowlist them is available.

**RELATED DOCUMENTATION**

[Edit a Screen](#) | [497](#).

## Edit a Screen

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Zones/Screens**.

To edit a screen:

1. Select an existing screen that you want to edit on the Zones/Screens page.
2. Click the pencil icon available on the upper right side of the Screen List page.

The Edit Screen page appears with editable fields. For more information on the options, see [“Add a Screen” on page 489](#).

3. Click **OK** to save the changes.

### RELATED DOCUMENTATION

| [Delete Screen](#) | [497](#).

## Delete Screen

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Zones/Screens**.

To delete a screen:

1. Select a screen that you want to delete on the Zones/Screens page.
2. Click the delete icon available on the upper right side of the Screen List page.
3. Click **Yes** to delete or click **No** to retain the profile.

### RELATED DOCUMENTATION

| [About the Zones/Screens Page](#) | [484](#).

# Security Services—Policy Objects Services

IN THIS CHAPTER

- [About the Services Page | 498](#)
- [Add a Custom Application | 500](#)
- [Edit a Custom Application | 502](#)
- [Delete Custom Application | 502](#)
- [Add an Application Group | 503](#)
- [Edit an Application Group | 504](#)
- [Delete Application Group | 505](#)

## About the Services Page

You are here: **Configure > Security Services > Security Policy > Objects > Services.**

Use services in policies to manage applications across devices.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a custom application. See [“Add a Custom Application” on page 500.](#)
- Edit a custom application. See [“Edit a Custom Application” on page 502.](#)
- Delete custom application. See [“Delete Custom Application” on page 502.](#)
- Add an application group. See [“Add an Application Group” on page 503.](#)
- Edit an application group. See [“Edit an Application Group” on page 504.](#)
- Delete an application group. See [“Delete Application Group” on page 505.](#)

### Field Descriptions

[Table 190 on page 499](#) describes the fields on the Services Page.

Table 190: Fields on the Services Page

Field	Description
<b>Custom-Applications</b>	
Application Name	Displays the custom application name.
Application Description	Displays a description of the custom application.
Application-Protocol	Displays the custom application protocol.
IP-Protocol	Displays the custom network protocol.
Source-Port	Displays the custom source port identifier.
Destination-Port	Displays the custom destination port identifier.
<b>Pre-defined Applications</b>	
Application Name	Displays the predefined application name.
Application-Protocol	Displays the predefined application protocol.
IP-Protocol	Displays the predefined network protocol.
Source-Port	Displays the predefined source port identifier.
Destination-Port	Displays the predefined destination port identifier.
<b>Application Group</b>	
Application Group Name	Displays the application group name.
Members	Displays members in the set.
Description	Displays a description of the application group.

## RELATED DOCUMENTATION

| [Add a Custom Application](#) | 500.

# Add a Custom Application

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Services**.

To add a custom application:

1. Click the **Custom-Applications** tab.
2. Click the add icon (+) on the upper right side of the Services page.  
The Add an Application page appears.
3. Complete the configuration according to the guidelines provided in [Table 191 on page 500](#).
4. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

**Table 191: Fields on the Add an Application Page**

Field	Action
<b>Global</b>	
Application Name	Enter a custom application name.
Application Description	Enter a description for the custom application.
Application-protocol	Select a custom application protocol from the list.
Match IP protocol	Select a custom network protocol from the list.
Destination Port	Select a custom destination port identifier from the list.
Source Port	Select a custom source port identifier from the list.
Inactivity-timeout	Enter a value from 4 through 86400.  Specifies the length of time (in seconds) that the application is inactive before it times out.
RPC-program-number	Enter a remote procedure call value from 0 through 65535.
Match ICMP message code	Select an Internet Control Message Protocol (ICMP) message code value from the list.
Match ICMP message type	Select a Internet Control Message Protocol message type value from the list.

Table 191: Fields on the Add an Application Page (*continued*)

Field	Action
UUID	Enter a universal unique identifier (UUID).
Application Group	Select an option from the list.  Specifies the set to which this application belongs.
<b>Terms</b>	
Add	Click +.  The Add new term page appears.
Term Name	Enter an application term name.
ALG	Select an option from the list.  Specifies the Application Layer Gateway (ALG) for the application protocol.
Match IP protocol	Select a network protocol from the list.
Destination Port	Enter the destination port identifier.
Source Port	Specifies the source port identifier.
Inactivity-timeout	Enter a value from 4 through 86400.  Specifies the length of time (in seconds) that the application is inactive before it times out.
RPC-program-number	Enter a remote procedure call value from 0 through 65535.
Match ICMP message code	Select a ICMP message code value from the list.
Match ICMP message type	Select a ICMP message type value from the list.
UUID	Select an option from the list.  Specifies the set to which this application belongs.
Edit	Select a term and click the pencil icon at the right corner of the table to modify the configuration.



Table 191: Fields on the Add an Application Page (*continued*)

Field	Action
Delete	Select a term and click the delete (X) icon at the right corner of the table to delete the selected term.

#### RELATED DOCUMENTATION

| [Edit a Custom Application](#) | 502.

## Edit a Custom Application

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Services**.

To edit a custom application:

1. Click the **Custom-Applications** tab.
2. Select an existing application that you want to edit on the Services page.
3. Click the pencil icon available on the upper right side of the Services page.

The Edit an Application page appears with editable fields. For more information on the options, see [“Add a Custom Application” on page 500](#).

4. Click **OK** to save the changes.

#### RELATED DOCUMENTATION

| [Delete Custom Application](#) | 502.

## Delete Custom Application

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Services**.

To delete a custom application:

1. Click the **Custom-Applications** tab.
2. Select an application that you want to delete on the Services page.
3. Click the delete icon available on the upper right side of the Services page.  
A confirmation message window appears.
4. Click **Yes** to delete or click **No** to retain the profile.

RELATED DOCUMENTATION

- [Add a Custom Application | 500](#)  
[Add an Application Group | 503.](#)

## Add an Application Group

You are here: **Configure > Security Services > Security Policy > Objects > Services.**

To add an application group:

1. Click the **Application Group** tab.
2. Click the add icon (+) on the upper right side of the Application Group page.  
The Add New Application Set page appears.
3. Complete the configuration according to the guidelines provided in [Table 192 on page 503](#).
4. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 192: Fields on the Add New Application Set Page

Field	Action
Application Group Name	Enter a name for application group.
Description	Enter a description for application group.

Table 192: Fields on the Add New Application Set Page (*continued*)

Field	Action
Application	<p>Using the right arrow, select values from <b>Applications out of this set</b> and move them to <b>Applications in this set</b>.</p> <p><b>NOTE:</b></p> <ul style="list-style-type: none"> <li>• Enter the application name in the search box and press Enter to search for the required application.</li> <li>• Click <b>Clear</b> to remove the selected applications from the list of <b>Applications in this set</b> column.</li> </ul>
Application Group	<p>Using the right arrow, select values from <b>Application groups out of this group</b> and move them to <b>Application groups in this group</b>.</p> <p><b>NOTE:</b></p> <ul style="list-style-type: none"> <li>• Enter the application name in the search box and press Enter to search for the required application.</li> <li>• Click <b>Clear</b> to remove the selected applications from the list of <b>Application groups in this group</b> column.</li> </ul>

## RELATED DOCUMENTATION

[Edit an Application Group](#) | 504.

## Edit an Application Group

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Services**.

To edit an application group:

1. Click the **Application Group** tab.
2. Select an existing application group that you want to edit on the Services page.
3. Click the pencil icon available on the upper right side of the Services page.

The Edit Application Set page appears with editable fields. For more information on the options, see [“Add an Application Group” on page 503](#).

4. Click **OK** to save the changes.

## RELATED DOCUMENTATION

| [Delete Application Group](#) | 505.

## Delete Application Group

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Services**.

To delete an application group:

1. Click the **Application Group** tab.
2. Select an application group name that you want to delete on the Services page.
3. Click the delete icon available on the upper right side of the Services page.  
A confirmation message window appears.
4. Click **Yes** to delete or click **No** to retain the profile.

## RELATED DOCUMENTATION

| [About the Services Page](#) | 498.

# Security Services—Policy Objects Zone Addresses

## IN THIS CHAPTER

- [About the Zone Addresses Page | 506](#)
- [Add Zone Addresses | 508](#)
- [Edit Zone Addresses | 509](#)
- [Delete Zone Addresses | 510](#)
- [Search Text in a Zone Addresses Table | 510](#)

## About the Zone Addresses Page

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Zone Addresses**.

Use this page to configure zone address or address set.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add addresses or address sets. See [“Add Zone Addresses” on page 508](#).
- Edit addresses or address sets. See [“Edit Zone Addresses” on page 509](#).
- Delete addresses or address sets. See [“Delete Zone Addresses” on page 510](#).
- Clone addresses or address sets. See *Clone Zone Addresses*.
- View the details of addresses or address sets—To do this, select the address or address set for which you want to view the details and follow the available options:
  - Click **More** and select **Detailed View**.
  - Click the detailed view icon available to the left of the selected address or address set.
- Deselect the selected address or address set. To do this, click **More** and select **Clear All Selections**.

- Search text in the Addresses table. See [“Search Text in a Zone Addresses Table” on page 510.](#)
- Show or hide columns in the Web filtering profiles table. To do this, click the Show Hide Columns icon in the top right corner of the Web filtering profiles table and select the options you want to view or deselect the options you want to hide on the page.

### Field Descriptions

[Table 193 on page 507](#) describes the fields on the Zone Addresses page.

**Table 193: Fields on the Zone Addresses Page**

Field	Description
<b>Addresses</b>	
Zone	Displays the zone name to which the address is applied.
Name	Displays the address name.
Type	Displays the selected address type.
IP Address	Displays the IP address of the zone address.
Description	Displays the description of the address.
<b>Address Sets</b>	
Zone	Displays the zone name to which the address set is applied.
Name	Displays the address sets name.
Type	Displays the selected address type.
Address List	Displays the preexisting addresses that should be included from the address set.
Address Set List	Displays the preexisting addresses that should be included from the list.
Description	Displays the description of the address set.

### RELATED DOCUMENTATION

| [Add Zone Addresses](#) | **508.**

# Add Zone Addresses

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Zone Addresses**.

To create a zone address or address set:

1. Click the add icon (+) on the upper right side of the Zone Addresses page.  
The Create Addresses page appears.
2. Complete the configuration according to the guidelines provided in [Table 194 on page 508](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

describes the fields on the Create Addresses page.

**Table 194: Fields on the Create Addresses Page**

Field	Action
Object Type	Select an option from the list: Address or Address Group.
<b>Addresses or Address Sets</b>	
Zone	Select a zone from the list to which the address is applied.
Name	Enter the address name.
Description	Enter the description for the address.
Type	Select an option from the list: Host, Range, or DNS host.
Host IP	Enter the IPv4 or IPv6 address. <b>NOTE:</b> This option is available if you have selected Host type.
Start Address	Enter the start IPv4 or IPv6 address. <b>NOTE:</b> This option is available if you have selected Range type.
End Address	Enter the end IPv4 or IPv6 address. <b>NOTE:</b> This option is available if you have selected Range type.

Table 194: Fields on the Create Addresses Page (*continued*)

Field	Action
DNS Name	<p>Enter a domain hostname.</p> <p>The string must include alphanumeric characters, periods, dashes, no spaces are allowed and must end with an alphanumeric character.</p> <p><b>NOTE:</b> This option is available if you have selected DNS Host type.</p>
Address Sets	Displays the address set name. Select the address set.
Create Address Set	Enter the address set name and click + to add the address set in the Address Sets.
Address Set Name	<p>Enter a name for address set.</p> <p><b>NOTE:</b> This option is available if you have selected Address Group for Object type.</p>
Description	<p>Enter a description for address set.</p> <p><b>NOTE:</b> This option is available if you have selected Address Group for Object type.</p>
Address List	<p>Specifies which of the preexisting addresses should be included or excluded from the address set.</p> <p>Select the addresses from the list in the Available column and then click the right arrow to move it to the Selected column.</p> <p><b>NOTE:</b> This option is available if you have selected Address Group for Object type.</p>

## RELATED DOCUMENTATION

[Edit Zone Addresses](#) | 509.

## Edit Zone Addresses

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Zone Addresses**.

To edit a zone address or address set:

1. Select an existing zone address or address set that you want to edit on the Zone Addresses page.
2. Click the pencil icon available on the upper right side of the Zone Addresses page.



The Edit Addresses page appears with editable fields. For more information on the options, see [“Add Zone Addresses” on page 508](#).

3. Click **OK** to save the changes.

#### RELATED DOCUMENTATION

| [Delete Zone Addresses](#) | 510.

## Delete Zone Addresses

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Zone Addresses**.

To delete a zone address or address set:

1. Select a zone address or address set that you want to delete on the Zone Addresses page.
2. Click the delete icon available on the upper right side of the Zone Addresses page.  
A confirmation window appears.
3. Click **Yes** to delete or click **No** to retain the profile.

#### RELATED DOCUMENTATION

| [Search Text in a Zone Addresses Table](#) | 510.

## Search Text in a Zone Addresses Table

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Zone Addresses**.

You can use the search icon in the top right corner of the Zone Addresses page to search for text containing letters and special characters on that page.

To search for text:

1. Click the search icon and enter partial text or full text of the keyword in the search bar.

The search results are displayed.

2. Click **X** next to a search keyword or click **Clear All** to clear the search results.

#### RELATED DOCUMENTATION

| [About the Zone Addresses Page](#) | 506.

# Security Services—Policy Objects Global Addresses

## IN THIS CHAPTER

- [About the Global Addresses Page | 512](#)
- [Add an Address Book | 513](#)
- [Edit an Address Book | 516](#)
- [Delete Address Book | 516](#)

## About the Global Addresses Page

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Global Addresses**.

Use this page to configure global address books for security policies.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add an Address Book. See [“Add an Address Book” on page 513](#).
- Edit an Address Book. See [“Edit an Address Book” on page 516](#).
- Delete an Address Book. See [“Delete Address Book” on page 516](#).
- Upgrade the old zone-based address book to global address books. To do this, click **Upgrade** available on the right side corner of the Global Addresses table. Click **Yes** to proceed with the upgrade to global address books and click **OK**.

### Field Descriptions

[Table 195 on page 513](#) describes the fields on the Global Addresses Page.

Table 195: Fields on the Global Addresses Page

Field	Description
Address Book Name	Displays the address book name.
Attached Zone	Displays the name of the zone that is attached to the address book.
Global	Displays information about the predefined address book.  The global address book is available by default to all security zones. You do not need to attach a security zone to the global address book.
Address/Address-Set Name	Displays the addresses and address sets associated with the selected address book.
Address Value	Displays the IP address.
Address-Set Members	Displays the addresses in an address set.

## RELATED DOCUMENTATION

| [Add an Address Book](#) | 513.

## Add an Address Book

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Global Addresses**.

To add an address book:

1. Click the add icon (+) on the upper right side of the Global Addresses page.  
The Add Address Book page appears.
2. Complete the configuration according to the guidelines provided in [Table 196 on page 514](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 196: Fields on the Global Addresses Page

Field	Action
Address Book Name	Enter a name for the address book.
Address Book Description	Enter a description for the address book.
Attach Zones	<p>You can select more than one zone from the list for one address book.</p> <p><b>NOTE:</b> Ensure that each zone has only one address book attached to it. If there is more than one address book attached to a zone, you will get the following error when you commit the configuration.</p> <p><b>Security zone must be unique in address books.</b></p>
<b>Addresses</b>	
+	<p>To add an address:</p> <ol style="list-style-type: none"> <li>Click + available at the upper right side of the Addresses table. The Add Address page appears.</li> <li>Enter the following details: <ul style="list-style-type: none"> <li>Address Name—Enter a name for the address.</li> <li>Description—Enter a description for the address.</li> <li>Address Type—Select one of the following address types from the list: <ul style="list-style-type: none"> <li>IP Address</li> <li>Wildcard Address</li> <li>Domain Name</li> <li>Ranged Address</li> </ul> </li> <li>Value—Enter an address that matches the selected address type.</li> </ul> </li> <li>Click <b>OK</b> to save the changes.</li> </ol>
Edit	<p>To edit an address:</p> <ol style="list-style-type: none"> <li>Select an existing address and click the pencil icon available at the upper right side of the Addresses table. The Add Address page appears with editable fields.</li> <li>Click <b>OK</b> to save the changes.</li> </ol>

Table 196: Fields on the Global Addresses Page (*continued*)

Field	Action
Delete	Select an existing address and click the delete (X) icon available at the upper right side of the Addresses table to delete it.
<b>Address Set</b>	
+	<p>To add an address set:</p> <ol style="list-style-type: none"> <li>Click + available at the upper right side of the Addresses table. The Add Address Set page appears.</li> <li>Enter the following details: <ul style="list-style-type: none"> <li>Address Set Name—Enter a name for the address set.</li> <li>Description—Enter a description for the address set.</li> <li>Address List—Select the address from the list in the Available column and then click the right arrow to move it to the Selected column. Specifies which of the preexisting addresses should be included or excluded from the address set.</li> <li>Address Set List—Select the address sets from the list in the Available column and then click the right arrow to move it to the Selected column. Specifies which of the preexisting address sets should be included or excluded from the list.</li> </ul> </li> <li>Click <b>OK</b> to save the changes.</li> </ol>
Edit	<p>To edit an address set:</p> <ol style="list-style-type: none"> <li>Select an existing address and click the pencil icon available at the upper right side of the Address Set table. The Add Address Set page appears with editable fields.</li> <li>Click <b>OK</b> to save the changes.</li> </ol>
Delete	Select an existing address set and click the delete (X) icon available at the upper right side of the Address Set table to delete it.

## RELATED DOCUMENTATION

[Edit an Address Book](#) | 516.

## Edit an Address Book

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Global Addresses**.

To edit an address book:

1. Select an existing address book that you want to edit on the Global Addresses page.
2. Click the pencil icon available on the upper right side of the Global Addresses page.

The Edit Address Book page appears with editable fields. For more information on the options, see [“Add an Address Book” on page 513](#).

3. Click **OK** to save the changes.

### RELATED DOCUMENTATION

[Delete Address Book](#) | 516.

## Delete Address Book

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Global Addresses**.

To delete an address book:

1. Select an existing address book that you want to delete on the Global Addresses page.
2. Click the delete icon available on the upper right side of the Global Addresses page.

A confirmation window appears.

3. Click **Yes** to delete or click **No** to retain the profile.

### RELATED DOCUMENTATION

[About the Global Addresses Page](#) | 512.

# Security Services—Policy Objects Proxy Profiles

## IN THIS CHAPTER

- [About the Proxy Profiles Page | 517](#)
- [Add a Proxy Profile | 518](#)
- [Edit a Proxy Profile | 519](#)
- [Delete Proxy Profile | 520](#)
- [Search Text in a Proxy Profiles Table | 520](#)

## About the Proxy Profiles Page

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Proxy Profiles**.

Use this page to configure the proxy profiles.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a proxy profile. See [“Add a Proxy Profile” on page 518](#).
- Edit a proxy profile. See [“Edit a Proxy Profile” on page 519](#).
- Delete a proxy profile. See [“Delete Proxy Profile” on page 520](#).
- Search text in a proxy profile table. See [“Search Text in a Proxy Profiles Table” on page 520](#).
- Filter the proxy profile based on select criteria. To do this, select the filter icon at the top right-hand corner of the Proxy Profiles table. The columns in the grid change to accept filter options. Type the filter options; the table displays only the data that fits the filtering criteria.
- Show or hide columns in the Proxy Profiles table. To do this, click the Show Hide Columns icon in the top right corner of the Proxy Profiles table and select the options you want to view or deselect the options you want to hide on the page.



## Field Descriptions

Table 197 on page 518 describes the fields on the Proxy Profiles Page.

**Table 197: Fields on the Proxy Profiles Page**

Field	Description
Profile Name	Displays the name of the proxy profile.
Server IP / Host Name	Displays the connection type used by the proxy profile.
Port Number	Displays the port number.

## RELATED DOCUMENTATION

| [Add a Proxy Profile](#) | 518.

## Add a Proxy Profile

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Proxy Profiles**.

To add a proxy profile:

1. Click the add icon (+) on the upper right side of the Proxy Profiles page.  
The Create Proxy Profile page appears.
2. Complete the configuration according to the guidelines provided in [Table 198 on page 518](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 198 on page 518 describes the fields on the Create Proxy Profile Page.

**Table 198: Fields on the Create Proxy Profile Page**

Field	Action
Profile Name	Enter a name of the proxy profile.

Table 198: Fields on the Create Proxy Profile Page (*continued*)

Field	Action
Connection Type	Select the type of connection used by the proxy profile; <ul style="list-style-type: none"> <li>• Server IP—Enter the server IP address.</li> <li>• Host Name—Enter a hostname.</li> </ul>
Port Number	Enter the port number used by the proxy profile.  Range: 0 through 65535.

## RELATED DOCUMENTATION

[Edit a Proxy Profile](#) | 519.

## Edit a Proxy Profile

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Proxy Profiles**.

To edit a proxy profile:

1. Select an existing proxy profile that you want to edit on the Proxy Profiles page.
2. Click the pencil icon available on the upper right side of the Proxy Profiles page.

The Edit Proxy Profile page appears with editable fields. For more information on the options, see [“Add a Proxy Profile” on page 518](#).

3. Click **OK** to save the changes.

## RELATED DOCUMENTATION

[Delete Proxy Profile](#) | 520.

## Delete Proxy Profile

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Proxy Profiles**.

To delete a proxy profile:

1. Select a proxy profile that you want to delete on the Proxy Profiles page.
2. Click the delete icon available on the upper right side of the Proxy Profiles page.

A confirmation window appears.

3. Click **Yes** to delete or click **No** to retain the profile.

### RELATED DOCUMENTATION

[Search Text in a Proxy Profiles Table](#) | 520.

## Search Text in a Proxy Profiles Table

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Proxy Profiles**.

You can use the search icon in the top right corner of the Proxy Profiles page to search for text containing letters and special characters on that page.

To search for text:

1. Click the search icon and enter partial text or full text of the keyword in the search bar.

The search results are displayed.

2. Click **X** next to a search keyword or click **Clear All** to clear the search results.

### RELATED DOCUMENTATION

[About the Proxy Profiles Page](#) | 517.

# Security Services—Policy Objects Schedules

## IN THIS CHAPTER

- [About the Schedules Page | 521](#)
- [Add a Schedule | 522](#)
- [Clone a Schedule | 524](#)
- [Edit a Schedule | 525](#)
- [Delete Schedule | 525](#)
- [Search Text in Schedules Table | 526](#)

## About the Schedules Page

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Schedules**.

Use this page to configure security policy schedules.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a schedule. See [“Add a Schedule” on page 522](#).
- Clone a schedule. See [“Clone a Schedule” on page 524](#).
- Edit a schedule. See [“Edit a Schedule” on page 525](#).
- Delete a schedule. See [“Delete Schedule” on page 525](#).
- View the details of schedules—To do this, select the schedule for which you want to view the details and follow the available options:
  - Click **More** and select **Detailed View**.
  - Right-click on the selected custom object and select **Detailed View**.
  - Mouse over to the left of the selected custom object and click **Detailed View**.
- Deselect the selected schedules. To do this, click **More** and select **Clear All Selections**.

- Search text in the Schedules table. See [“Search Text in Schedules Table” on page 526](#).
- Show or hide columns in the Schedules table. To do this, click the Show Hide Columns icon in the top right corner of the Schedules table and select the options you want to view or deselect the options you want to hide on the page.

### Field Descriptions

[Table 199 on page 522](#) describes the fields on the Schedules Page.

**Table 199: Fields on the Schedules Page**

Field	Description
Name	Displays the name of the policy schedule.
Description	Displays a description of the policy schedule.
Start Date	Displays the start date for the first day.
End Date	Displays the stop date for the first day.
Second Start Date	Displays the start date for the second day.
Second End Date	Displays the stop date for the second day.
Schedules	On expanding, displays the days of the schedule, exclusion days if any, and the start and end time of the schedule.

### RELATED DOCUMENTATION

| [Add a Schedule](#) | [522](#)

## Add a Schedule

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Schedules**.

To add a schedule:

1. Click the add icon (+) on the upper right side of the Schedules page.

The Create Schedule page appears.

2. Complete the configuration according to the guidelines provided in [Table 200 on page 523](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

**Table 200: Fields on the Create Schedule Page**

Field	Action
<b>General</b>	
Name	Enter the name of the scheduler.
Description	Enter a description for the scheduler.
<b>Dates</b>	
Start Date	Select the start date for the first day from the calendar and select the time in AM, PM, or 24 ours format.
Stop Date	Select the stop date for the first day from the calendar and select the time in AM, PM, or 24 ours format.
Second Start Date	Select the start date for the second day from the calendar and select the time in AM, PM, or 24 ours format.
Second End Date	Select the stop date for the second day from the calendar and select the time in AM, PM, or 24 ours format.
<b>Time Ranges</b>	
Time Ranges	Select the check box to specify the time range.

Table 200: Fields on the Create Schedule Page (continued)

Field	Action
Daily Options	<ol style="list-style-type: none"> <li>Click on the day to specify the time for a particular day. The Specify Time for &lt;Selected Day&gt; page appears. <b>NOTE:</b> Click <b>Specify the same time for all days</b> to configure the same time options to all days.</li> <li>Select an option for Time Options: <ul style="list-style-type: none"> <li>All Day—Specifies time options for an entire day.</li> <li>Exclude Day—Excludes a specific day.</li> <li>Time Ranges—Enter time ranges for the selected day: <ul style="list-style-type: none"> <li>Start Time—Enter the first day start time in HH:MM:SS and select AM, PM, or 24 hours format.</li> <li>End Time—Enter the first day end time first day in HH:MM:SS and select AM, PM, or 24 hours format.</li> <li>Second Start Time—Click + and enter the second day start time in HH:MM:SS, and then select AM, PM, or 24 hours format.</li> <li>Second End Time—Enter the second day end time in HH:MM:SS and select AM, PM, or 24 hours format.</li> </ul> </li> </ul> <p><b>NOTE:</b> Click <b>X</b> to delete the second day start and end time.</p> </li> <li>Click <b>OK</b> to save changes.</li> </ol>

## RELATED DOCUMENTATION

[Edit a Schedule](#) | 525.

## Clone a Schedule

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Schedules**.

To clone a schedule:

- Select a schedule that you want to clone and select **Clone** from the More link.

The Clone Schedule page appears with editable fields. For more information on the fields, see [“Add a Schedule” on page 522](#).

**NOTE:** Alternatively, you can right-click on the selected schedule and select **Clone**.

2. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

#### RELATED DOCUMENTATION

| [Edit a Schedule](#) | 525.

## Edit a Schedule

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Schedules**.

To edit a schedule:

1. Select an existing schedule that you want to edit on the Schedules page.
2. Click the pencil icon available on the upper right side of the Schedules page.

The Edit Schedules page appears with editable fields. For more information on the options, see "[Add a Schedule](#)" on page 522.

3. Click **OK** to save the changes or click **Cancel** to discard the changes.

#### RELATED DOCUMENTATION

| [Delete Schedule](#) | 525.

## Delete Schedule

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Schedules**.

To delete a schedule:

1. Select a schedule that you want to delete on the Schedules page.



2. Click the delete icon available on the upper right side of the Schedules page.  
A confirmation window appears.
3. Click **Yes** to delete or click **No** to retain the profile.

#### RELATED DOCUMENTATION

| [Search Text in Schedules Table](#) | 526.

## Search Text in Schedules Table

You are here: **Configure** > **Security Services** > **Security Policy** > **Objects** > **Schedules**.

You can use the search icon in the top right corner of the Schedules page to search for text containing letters and special characters on that page.

To search for text:

1. Click the search icon and enter partial text or full text of the keyword in the search bar.  
The search results are displayed.
2. Click **X** next to a search keyword or click **Clear All** to clear the search results.

#### RELATED DOCUMENTATION

| [About the Schedules Page](#) | 521.

# Security Services—IPv4 Firewall Filters

IN THIS CHAPTER

- About the IPv4 Page | 527
- Add IPv4 Firewall Filters | 528

## About the IPv4 Page

You are here: **Configure > Security Services > Security policy > Firewall Filters > IPV4.**

Use this page to configure IPv4 firewall filters.

### Tasks You Can Perform

You can perform the following task from this page:

- Add an IPv4 firewall filter. See [“Add IPv4 Firewall Filters” on page 528.](#)

### Field Descriptions

[Table 201 on page 527](#) describes the fields on the IPv4 page.

Table 201: Fields on the IPv4 Page

Field	Description
IPv4 Filter Summary	
Filter Name	Displays the name of the filter and when expanded, lists the terms attached to the filter.
Add New IPv4 Filter	
Filter Name	Searches for existing filters by filter name.
Term Name	Searches for existing terms by term name.

Table 201: Fields on the IPv4 Page (continued)

Field	Description
Location	Specifies the position of the new filter.

## RELATED DOCUMENTATION

| [Add IPv4 Firewall Filters](#) | 528.

## Add IPv4 Firewall Filters

You are here: **Configure** > **Security Services** > **Security Policy** > **Firewall Filters** > **IPv4**.

To add an IPV4 firewall filter:

1. Complete the configuration according to the guidelines provided in [Table 202 on page 528](#) and [Table 203 on page 530](#).
2. Click **Add** available in the Add New IPv4 Filter section.  
A new IPv4 Firewall Filter is created.
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 202: Fields on the Add IPv4 Firewall Filter Page

Field	Action
<b>IPv4 Filter Summary</b>	
Action column	<p>Select an option.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>● <b>To move an item upward</b>—Locate the item and click the up arrow from the same row.</li> <li>● <b>To move an item downward</b>—Locate the item and click the down arrow from the same row.</li> <li>● <b>To delete an item</b>—Locate the item and click the <b>X</b> from the same row.</li> </ul>

Table 202: Fields on the Add IPv4 Firewall Filter Page (*continued*)

Field	Action
Filter Name	<p>Displays the name of the filter and when expanded, lists the terms attached to the filter.</p> <p>Displays the match conditions and actions that are set for each term.</p> <p>Allows you to add more terms to a filter or modify filter terms.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>● <b>To display the terms added to a filter</b>—Click the plus sign next to the filter name. This also displays the match conditions and actions set for the term.</li> <li>● <b>To edit a filter</b>—Click the filter name. To edit a term, click the name of the term.</li> </ul>
<b>Search</b>	
IPv4 Filter Name	<p>Enter the existing filter name.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>● <b>To find a specific filter</b>—Enter the name of the filter in the Filter Name box.</li> <li>● <b>To list all filters with a common prefix or suffix</b>—Use the wildcard character (*) when you enter the name of the filter. For example, <b>te*</b> lists all filters with a name starting with the characters <b>te</b>.</li> </ul>
IPv4 Term Name	<p>Enter the existing terms by term name.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>● <b>To find a specific term</b>—Enter the name of the term in the Term Name box.</li> <li>● <b>To list all terms with a common prefix or suffix</b>—Use the wildcard character (*) when typing the name of the term. For example, <b>ra*</b> lists all terms with a name starting with the characters <b>ra</b>.</li> </ul>
Number of Items to Display	Enter the number of filters or terms to display on one page. Select the number of items to be displayed on one page.
<b>Add New IPv4 Filter</b>	
Filter Name	<p>Enter the existing filter name.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>● <b>To find a specific filter</b>—Enter the name of the filter in the Filter Name box.</li> <li>● <b>To list all filters with a common prefix or suffix</b>—Use the wildcard character (*) when you enter the name of the filter. For example, <b>te*</b> lists all filters with a name starting with the characters <b>te</b>.</li> </ul>

Table 202: Fields on the Add IPv4 Firewall Filter Page (*continued*)

Field	Action
Term Name	<p>Enter the existing terms by term name.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>To find a specific term</b>—Enter the name of the term in the Term Name box.</li> <li>• <b>To list all terms with a common prefix or suffix</b>—Use the wildcard character (*) when typing the name of the term. For example, <b>ra*</b> lists all terms with a name starting with the characters <b>ra</b>.</li> </ul>
Location	<p>Positions the new filter in one of the following locations:</p> <ul style="list-style-type: none"> <li>• <b>After Final IPv4 Filter</b>—At the end of all filters.</li> <li>• <b>After IPv4 Filter</b>—After a specified filter.</li> <li>• <b>Before IPv4 Filter</b>—Before a specified filter.</li> </ul>
Add	Adds a new filter name. Opens the term summary page for this filter allowing you to add new terms to this filter.

#### Add New IPv4 Term

Location	<p>Positions the new term in one of the following locations:</p> <ul style="list-style-type: none"> <li>• <b>After Final IPv4 Filter</b>—At the end of all term.</li> <li>• <b>After IPv4 Filter</b>—After a specified term.</li> <li>• <b>Before IPv4 Filter</b>—Before a specified term.</li> </ul>
Add	Opens the Filter Term page allowing you to define the match conditions and the action for this term.

Table 203: Fields on the Match Criteria for IPv4 Firewall Filter

Field	Action
Match Source	

Table 203: Fields on the Match Criteria for IPv4 Firewall Filter (*continued*)

Field	Action
Source Address	<p>Enter IP source addresses to be included in, or excluded from, the match condition. Allows you to remove source IP addresses from the match condition.</p> <p>If you have more than 25 addresses, this field displays a link that allows you to easily scroll through pages, change the order of addresses, and also search for them.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the address in the match condition.</li> <li>• <b>Except</b>—To exclude the address from the match condition and then select Add -To include the address in the match condition.</li> <li>• <b>Delete</b>—To remove an IP source address from the match condition.</li> </ul> <p>Enter an IP source address and prefix length, and select an option.</p>
Source Prefix List	<p>Enter source prefix lists, which you have already defined, to be included in the match condition. Allows you to remove a prefix list from the match condition.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include a predefined source prefix list in the match condition, type the prefix list name.</li> <li>• <b>Except</b>—To exclude the prefix list from the match condition and then select Add—To include the prefix list in the match condition.</li> <li>• <b>Delete</b>—To remove a prefix list from the match condition.</li> </ul> <p>Select an option.</p>
Source Port	<p>Enter the source port type to be included in, or excluded from, the match condition. Allows you to remove a source port type from the match condition.</p> <p><b>NOTE:</b> This match condition does not check the protocol type being used on the port. Make sure to specify the protocol type (TCP or UDP) match condition in the same term.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the port in the match condition.</li> <li>• <b>Except</b>—To exclude the port from the match condition and then select Add—To include the port in the match condition.</li> <li>• <b>Delete</b>—To remove a port from the match condition.</li> </ul> <p>Select the port from the port name list; enter the port name, number, or range and then select an option.</p>
Match Destination	

Table 203: Fields on the Match Criteria for IPv4 Firewall Filter (*continued*)

Field	Action
Destination Address	<p>Enter destination addresses to be included in, or excluded from, the match condition. Allows you to remove a destination IP address from the match condition.</p> <p>If you have more than 25 addresses, this field displays a link that allows you to easily scroll through pages, change the order of addresses, and also search for them.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the address in the match condition.</li> <li>• <b>Except</b>—To exclude the address from the match condition and then select Add—To include the address in the match condition.</li> <li>• <b>Delete</b>—To remove an IP address from the match condition.</li> </ul> <p>Enter an IP destination address and prefix length and select an option.</p>
Destination Prefix List	<p>Enter destination prefix lists, which you have already defined, to be included in the match condition. Allows you to remove a prefix list from the match condition.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include a predefined destination prefix list, enter the prefix list name.</li> <li>• <b>Except</b>—To exclude the prefix list from the match condition and then select Add—To include the prefix list in the match condition.</li> <li>• <b>Delete</b>—To remove a prefix list from the match condition.</li> </ul> <p>Select an option.</p>
Destination Port	<p>Enter destination port types to be included in, or excluded from, the match condition. Allows you to remove a destination port type from the match condition.</p> <p><b>NOTE:</b> This match condition does not check the protocol type being used on the port. Make sure to specify the protocol type (TCP or UDP) match condition in the same term.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the port in the match condition.</li> <li>• <b>Except</b>—To exclude the port from the match condition and then select Add—To include the port in the match condition.</li> <li>• <b>Delete</b>—To remove a port type from the match condition.</li> </ul> <p>Select the port from the port name list; enter the port name, number, or range; and then select an option.</p>
<b>Match Source or Destination</b>	

Table 203: Fields on the Match Criteria for IPv4 Firewall Filter (*continued*)

Field	Action
Address	<p>Enter IP addresses to be included in, or excluded from, the match condition for a source or destination. Allows you to remove an IP address from the match condition.</p> <p>If you have more than 25 addresses, this field displays a link that allows you to easily scroll through pages, change the order of addresses and also search for them.</p> <p><b>NOTE:</b> This address match condition cannot be specified in conjunction with the source address or destination address match conditions in the same term.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the address in the match condition.</li> <li>• <b>Except</b>—To exclude the address from the match condition and then select Add—To include the address in the match condition.</li> <li>• <b>Delete</b>—To remove an IP address from the match condition.</li> </ul> <p>Enter an IP destination address and prefix length and select an option.</p>
Prefix List	<p>Enter prefix lists, which you have already defined, to be included in the match condition for a source or destination. Allows you to remove a prefix list from the match condition.</p> <p><b>NOTE:</b> This prefix list match condition cannot be specified in conjunction with the source prefix list or destination prefix list match conditions in the same term.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include a predefined destination prefix list, type the prefix list name.</li> <li>• <b>Delete</b>—To remove a prefix list from the match condition.</li> </ul> <p>Select an option.</p>



Table 203: Fields on the Match Criteria for IPv4 Firewall Filter (*continued*)

Field	Action
Port	<p>Enter a port type to be included in, or excluded from, a match condition for a source or destination. Allows you to remove a destination port type from the match condition.</p> <p><b>NOTE:</b> This match condition does not check the protocol type being used on the port. Make sure to specify the protocol type (TCP or UDP) match condition in the same term.</p> <p>Also, this port match condition cannot be specified in conjunction with the source port or destination port match conditions in the same term.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the port in the match condition.</li> <li>• <b>Except</b>—To exclude the port from the match condition and then select Add—To include the port in the match condition.</li> <li>• <b>Delete</b>—To remove a port type from the match condition.</li> </ul> <p>Select the port from the port name list; enter the port name, number, or range; and then select an option.</p>
<b>Match Interface</b>	
Interface	<p>Enter interfaces to be included in a match condition. Allows you to remove an interface from the match condition.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include an interface in a match condition.</li> <li>• <b>Delete</b>—To remove an interface from the match condition.</li> </ul> <p>Select a name from the interface name list or Enter the interface name and select an option.</p>
Interface Set	<p>Enter interface sets, which you have already defined, to be included in a match condition. Allows you to remove an interface set from the match condition.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the group in the match condition.</li> <li>• <b>Delete</b>—To remove an interface group from the match condition.</li> </ul> <p>Enter the interface set name and select an option.</p>

Table 203: Fields on the Match Criteria for IPv4 Firewall Filter (*continued*)

Field	Action
Interface Group	<p>Enter interface groups, which you have already defined, to be included in, or excluded from, a match condition. Allows you to remove an interface group from the match condition.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the port in the match condition.</li> <li>• <b>Except</b>—To exclude the port from the match condition and then select Add—To include the port in the match condition.</li> <li>• <b>Delete</b>— To remove a port type from the match condition.</li> </ul> <p>Enter the name of the group and select an option.</p>
<b>Match Packet and Network</b>	
First Fragment	<p>Select the check box.</p> <p>Matches the first fragment of a fragmented packet.</p>
Is Fragment	<p>Select the check box.</p> <p>Matches trailing fragments (all but the first fragment) of a fragmented packet.</p>
Fragment Flags	<p>Enter fragmentation flags to be included in the match condition.</p> <p>Enter a text or numeric string defining the flag.</p>
TCP Established	<p>Select the check box.</p> <p>Matches all Transmission Control Protocol packets other than the first packet of a connection.</p> <p><b>NOTE:</b> This match condition does not verify that the TCP is used on the port. Make sure to specify the TCP as a match condition in the same term.</p>
TCP Initial	<p>Select the check box.</p> <p>Matches the first Transmission Control Protocol packet of a connection.</p> <p><b>NOTE:</b> This match condition does not verify that the TCP is used on the port. Make sure to specify the TCP as a match condition in the same term.</p>
TCP Flags	<p>Enter Transmission Control Protocol flags to be included in the match condition.</p> <p><b>NOTE:</b> This match condition does not verify that the TCP is used on the port. Make sure to specify the TCP as a match condition in the same term.</p>

Table 203: Fields on the Match Criteria for IPv4 Firewall Filter (*continued*)

Field	Action
Protocol	<p>Enter IPv4 protocol types to be included in, or excluded from, the match condition. Allows you to remove an IPv4 protocol type from the match condition.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the protocol in the match condition.</li> <li>• <b>Except</b>—To exclude the protocol from the match condition and then select Add—To include the protocol in the match condition.</li> <li>• <b>Delete</b>—To remove an IPv4 protocol type from the match condition.</li> </ul> <p>Select a protocol name from the list or enter a protocol name or number and then select an option.</p>
ICMP Type	<p>Select a packet type from the list or enter a packet type name or number and then select an option.</p> <p><b>NOTE:</b> This protocol does not verify that ICMP is used on the port. Make sure to specify an ICMP type match condition in the same term.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the packet type in the match condition.</li> <li>• <b>Except</b>— To exclude the packet type from the match condition and then select.  <b>Add</b>—To include the packet type in the match condition.</li> <li>• <b>Delete</b>—To remove an ICMP packet type from the match condition.</li> </ul>
ICMP Code	<p>Select a packet code from the list or enter the packet code as text or a number and select an option.</p> <p><b>NOTE:</b> The ICMP code is dependent on the ICMP type. Make sure to specify an ICMP type match condition in the same term.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the packet type in the match condition.</li> <li>• <b>Except</b>—To exclude the packet type from the match condition and then select  <b>Add</b>—To include the packet type in the match condition.</li> <li>• <b>Delete</b>—To remove an ICMP packet type from the match condition.</li> </ul>

Table 203: Fields on the Match Criteria for IPv4 Firewall Filter (*continued*)

Field	Action
Fragment Offset	<p>Enter a fragment offset number or range and then select an option.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the offset in the match condition.</li> <li>• <b>Except</b>—To exclude the offset from the match condition and then select Add—To include the offset in the match condition.</li> <li>• <b>Delete</b>—To remove a fragment offset value from the match condition.</li> </ul>
Precedence	<p>Enter IP precedences to be included in, or excluded from, the match condition. Allows you to remove an IP precedence entry from the match condition.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the precedence in the match condition.</li> <li>• <b>Except</b>—To exclude the precedence from the match condition and then select Add—To include the precedence in the match condition.</li> <li>• <b>Delete</b>—To remove an IP precedence from the match condition.</li> </ul>
DSCP	<p>Select DSCP from the list; or enter the DSCP value as a keyword, a decimal integer from 0 through 7, or a binary string; and then select an option.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the DSCP in the match condition.</li> <li>• <b>Except</b>—To exclude the DSCP from the match condition and then select Add—To include the DSCP in the match condition.</li> <li>• <b>Delete</b>—To remove a DSCP from the match condition.</li> </ul>
TTL  <b>NOTE:</b> This option is not available in SRX5600 device.	<p>Enter an IPv4 TTL value by entering a number from 1 through 255, and select an option.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the TTL in the match condition.</li> <li>• <b>Except</b>—To exclude the TTL from the match condition and then select Add—To include the TTL in the match condition .</li> <li>• <b>Delete</b>—To remove an IPv4 TTL type from the match condition.</li> </ul>

Table 203: Fields on the Match Criteria for IPv4 Firewall Filter (*continued*)

Field	Action
Packet Length	<p>Specify a packet length, enter a value or range.</p> <p>Select an option.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the packet length in the match condition.</li> <li>• <b>Except</b>—To exclude the packet length from the match condition and then select <b>Add</b>—To include the packet length in the match condition.</li> <li>• <b>Delete</b>—To remove a packet length value from the match condition.</li> </ul>
Forwarding Class	<p>Specify a forwarding class by selecting a forwarding class from the list or entering a forwarding class, and then select an option.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the forwarding class in the match condition.</li> <li>• <b>Except</b>—To exclude the forwarding class from the match condition and then select <b>Add</b>—To include the forwarding class in the match condition.</li> <li>• <b>Delete</b>—To remove a forwarding class from the match condition.</li> </ul>
IP Options	<p>Enter option by selecting an IP option from the list or entering a text or numeric string identifying the option, and then select an option.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the IP option in the match condition.</li> <li>• <b>Except</b>—To exclude the IP option from the match condition and then select <b>Add</b>—To include the IP option in the match condition.</li> <li>• <b>Delete</b>—To remove an IP option from the match condition.</li> </ul>
IPSec ESP SPI	<p>Enter an ESP SPI value by entering a binary, hexadecimal, or decimal SPI value or range, and then select an option.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the value in the match condition.</li> <li>• <b>Except</b>—To exclude the value from the match condition and then select <b>Add</b>—To include the value in the match condition.</li> <li>• <b>Delete</b>—To remove an ESP SPI value from the match condition.</li> </ul>
<b>Action</b>	

Table 203: Fields on the Match Criteria for IPv4 Firewall Filter (*continued*)

Field	Action
Nothing	<p>Select <b>Nothing</b>.</p> <p>Specifies that no action is performed. By default, a packet is accepted if it meets the match conditions of the term, and packets that do not match any conditions in the firewall filter are dropped.</p>
Accept	<p>Select <b>Accept</b>.</p> <p>Accepts a packet that meets the match conditions of the term.</p>
Discard	<p>Select <b>Discard</b>.</p> <p>Discards a packet that meets the match conditions of the term. Names a discard collector for packets.</p>
Reject	<p>Select <b>Reject</b> and then select a message type from the reason list.</p> <p>Rejects a packet that meets the match conditions of the term and returns a rejection message. Allows you to specify a message type that denotes the reason the packet was rejected.</p> <p><b>NOTE:</b> To log and sample rejected packets, specify log and sample action modifiers in conjunction with this action.</p>
Next Term	<p>Select <b>Next Term</b>.</p> <p>Evaluates a packet with the next term in the filter if the packet meets the match conditions in this term. This action makes sure that the next term is used for evaluation even when the packet matches the conditions of a term. When this action is not specified, the filter stops evaluating the packet after it matches the conditions of a term, and takes the associated action.</p>
Routing Instance	<p>Accepts a packet that meets the match conditions, and forwards it to the specified routing instance.</p> <p>Select <b>Routing Instance</b>, and enter the routing instance name in the box next to <b>Routing Instance</b>.</p>
<b>Action Modifiers</b>	
Forwarding Class	<p>Classifies the packet as a specific forwarding class.</p> <p>Select <b>Forwarding Class</b> from the list.</p>

Table 203: Fields on the Match Criteria for IPv4 Firewall Filter (*continued*)

Field	Action
Count	<p>Counts the packets passing this term. Allows you to name a counter that is specific to this filter. This means that every time a packet transits any interface that uses this filter, it increments the specified counter.</p> <p>Select <b>Count</b> and enter a 24-character string containing letters, numbers, or hyphens to specify a counter name.</p>
Virtual Channel  <b>NOTE:</b> This option is not available in SRX345 series of devices.	Enter a string identifying the virtual channel.
Prefix Action  <b>NOTE:</b> This option is not available in SRX4100 and SRX345 series of devices.	Enter the prefix action.
Log	<p>Select <b>Log</b>.</p> <p>Logs the packet header information in the routing engine.</p>
Syslog	<p>Select <b>Syslog</b>.</p> <p>Records packet information in the system log.</p>
Port Mirror  <b>NOTE:</b> This option is not available in SRX5600 and SRX345 series of devices.	<p>Select <b>Port Mirror</b>.</p> <p>Port mirrors the packet.</p>
Loss Priority	<p>Sets the loss priority of the packet. This is the priority of dropping a packet before it is sent, and it affects the scheduling priority of the packet.</p> <p>Select the range of priority from the list.</p>

RELATED DOCUMENTATION

| [About the IPv4 Page](#) | 527.



# Security Services—IPv6 Firewall Filters

IN THIS CHAPTER

- About the IPv6 Page | 542
- Add IPv6 Firewall Filters | 543

## About the IPv6 Page

You are here: **Configure** > **Security policy** > **Security Services** > **Firewall Filters** > **IPv6**.

Use this page to configure IPv6 firewall filter.

### Tasks You Can Perform

You can perform the following task from this page:

- Add an IPv6 Firewall Filters. See [“Add IPv6 Firewall Filters” on page 543](#).

### Field Descriptions

[Table 204 on page 542](#) describes the fields on IPv6 page.

Table 204: Fields on the IPv6 Page

Field	Description
IPv6 Filter Summary	
Filter Name	Displays the name of the filter and when expanded, lists the terms attached to the filter.
Add New IPv6 Filter	
Filter Name	Searches for existing filters by filter name.

Table 204: Fields on the IPv6 Page (continued)

Field	Description
Term Name	Searches for existing terms by term name.
Location	Specifies the position of the new filter.

RELATED DOCUMENTATION

| [Add IPv6 Firewall Filters](#) | 543.

## Add IPv6 Firewall Filters

To add an IPV6 firewall filter:

1. Complete the configuration according to the guidelines provided in [Table 205 on page 543](#) and [Table 206 on page 546](#).
2. Click **Add** available in the Add New IPv6 Filter section.  
A new IPv6 Firewall Filter is created.
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

[Table 205 on page 543](#) describes the fields on the Add IPv6 page.

Table 205: Fields on the Add IPv6 Firewall Filter Page

Field	Action
IPv6 Filter Summary	

Table 205: Fields on the Add IPv6 Firewall Filter Page (*continued*)

Field	Action
Action column	<p>Select an option.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>To move an item upward</b>—Locate the item and click the up arrow from the same row.</li> <li>• <b>To move an item downward</b>—Locate the item and click the down arrow from the same row.</li> <li>• <b>To delete an item</b>—Locate the item and click the X from the same row.</li> </ul>
Filter Name	<p>Enter the name of the filter and, when expanded, lists the terms attached to the filter.</p> <p>Displays the match conditions and actions that are set for each term.</p> <p>Allows you to add more terms to a filter or to modify filter terms.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>To display the terms added to a filter</b>—Click the plus sign next to the filter name. This also displays the match conditions and actions set for the term.</li> <li>• <b>To edit a filter</b>—Click the filter name. To edit a term, click the name of the term.</li> </ul>
<b>Search</b>	
Filter Name	<p>Searches for existing filters by filter name.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>To find a specific filter</b>—Enter the name of the filter in the Filter Name box.</li> <li>• <b>To list all filters with a common prefix or suffix</b>—Use the wildcard character (*) when you enter the name of the filter. For example, <b>te*</b> lists all filters with a name starting with the characters <b>te</b>.</li> </ul>

Table 205: Fields on the Add IPv6 Firewall Filter Page (*continued*)

Field	Action
Term Name	<p>Searches for existing terms by name.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>To find a specific term</b>—Enter the name of the term in the Term Name box.</li> <li>• <b>To list all terms with a common prefix or suffix</b>—Use the wildcard character (*) when typing the name of the term. For example, <b>ra*</b> lists all terms with a name starting with the characters <b>ra</b>.</li> </ul>
Number of Items to Display	<p>Specifies the number of filters or terms to display on one page. Selects the number of items to be displayed on one page.</p>
<b>Add New IPv6 Filter</b>	
Filter Name	<p>Enter the name of the filter and when expanded, lists the terms attached to the filter.</p> <p>Displays the match conditions and actions that are set for each term.</p> <p>Allows you to add more terms to a filter or modify filter terms.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>To display the terms added to a filter</b>—Click the plus sign next to the filter name. This also displays the match conditions and actions set for the term.</li> <li>• <b>To edit a filter</b>—Click the filter name. To edit a term, click the name of the term.</li> </ul> <p>Select an option.</p>

Table 205: Fields on the Add IPv6 Firewall Filter Page (*continued*)

Field	Action
Term Name	<p>Select an option.</p> <p>Searches for existing terms by term name.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>To find a specific term</b>—Enter the name of the term in the Term Name box.</li> <li>• <b>To list all terms with a common prefix or suffix</b>—Use the wildcard character (*) when typing the name of the term. For example, <b>ra*</b> lists all terms with a name starting with the characters <b>ra</b>.</li> </ul>
Location	<p>Positions the new filter in one of the following locations:</p> <ul style="list-style-type: none"> <li>• <b>After Final IPv4 Filter</b>—At the end of all filters.</li> <li>• <b>After IPv6 Filter</b>—After a specified filter.</li> <li>• <b>Before IPv6 Filter</b>—Before a specified filter.</li> </ul>
Add	<p>Click <b>Add</b>.</p> <p>Opens the Filter Term page allowing you to define the match conditions and the action for this term.</p>
<b>Add New IPv6 Term</b>	
Location	<p>Positions the new filter in one of the following locations:</p> <ul style="list-style-type: none"> <li>• <b>After Final IPv4 Filter</b>—At the end of all filters.</li> <li>• <b>After IPv6 Filter</b>—After a specified filter.</li> <li>• <b>Before IPv6 Filter</b>—Before a specified filter.</li> </ul>
Add	<p>Click <b>Add</b>.</p> <p>Opens the Filter Term page allowing you to define the match conditions and the action for this term.</p>

Table 206: Fields on the Match Criteria for IPv6 Firewall Filter

Field	Action
Match Source	

Table 206: Fields on the Match Criteria for IPv6 Firewall Filter (*continued*)

Field	Action
Source Address	<p>Specifies IP source addresses to be included in, or excluded from, the match condition. Allows you to remove source IP addresses from the match condition.</p> <p>If you have more than 25 addresses, this field displays a link that allows you to easily scroll through pages, change the order of addresses, and also search for them.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the address in the match condition.</li> <li>• <b>Except</b>—To exclude the address from the match condition and then select Add -To include the address in the match condition.</li> <li>• <b>Delete</b>—To remove an IP source address from the match condition.</li> </ul> <p>Enter an IP source address and prefix length, and select an option.</p>
Source Prefix List	<p>Specifies source prefix lists, which you have already defined, to be included in the match condition. Allows you to remove a prefix list from the match condition.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include a predefined source prefix list in the match condition, type the prefix list name.</li> <li>• <b>Delete</b>—To remove a prefix list from the match condition.</li> </ul> <p>Select an option.</p>
Source Port	<p>Specifies the source port type to be included in, or excluded from, the match condition. Allows you to remove a source port type from the match condition.</p> <p><b>NOTE:</b> This match condition does not check the protocol type being used on the port. Make sure to specify the protocol type (TCP or UDP) match condition in the same term.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the port in the match condition.</li> <li>• <b>Except</b>—To exclude the port from the match condition and then select Add—To include the port in the match condition.</li> <li>• <b>Delete</b>—To remove a port from the match condition.</li> </ul> <p>Select the port from the port name list; enter the port name, number, or range and then select an option.</p>
<b>Match Destination</b>	

Table 206: Fields on the Match Criteria for IPv6 Firewall Filter (*continued*)

Field	Action
Destination Address	<p>Specifies destination addresses to be included in, or excluded from, the match condition. Allows you to remove a destination IP address from the match condition.</p> <p>If you have more than 25 addresses, this field displays a link that allows you to easily scroll through pages, change the order of addresses, and also search for them.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the address in the match condition.</li> <li>• <b>Except</b>—To exclude the address from the match condition and then select Add—To include the address in the match condition.</li> <li>• <b>Delete</b>—To remove an IP address from the match condition.</li> </ul> <p>Enter an IP destination address and prefix length and select an option.</p>
Destination Prefix List	<p>Specifies destination prefix lists, which you have already defined, to be included in the match condition. Allows you to remove a prefix list from the match condition.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include a predefined destination prefix list, enter the prefix list name.</li> <li>• <b>Delete</b>—To remove a prefix list from the match condition.</li> </ul> <p>Select an option.</p>
Destination Port	<p>Specifies destination port types to be included in, or excluded from, the match condition. Allows you to remove a destination port type from the match condition.</p> <p><b>NOTE:</b> This match condition does not check the protocol type being used on the port. Make sure to specify the protocol type (TCP or UDP) match condition in the same term.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the port in the match condition.</li> <li>• <b>Except</b>—To exclude the port from the match condition and then select Add—To include the port in the match condition.</li> <li>• <b>Delete</b>—To remove a port type from the match condition.</li> </ul> <p>Select the port from the port name list; enter the port name, number, or range; and then select an option.</p>
<b>Match Source or Destination</b>	

Table 206: Fields on the Match Criteria for IPv6 Firewall Filter (*continued*)

Field	Action
Address	<p>Specifies IP addresses to be included in, or excluded from, the match condition for a source or destination. Allows you to remove an IP address from the match condition.</p> <p>If you have more than 25 addresses, this field displays a link that allows you to easily scroll through pages, change the order of addresses and also search for them.</p> <p><b>NOTE:</b> This address match condition cannot be specified in conjunction with the source address or destination address match conditions in the same term.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the address in the match condition.</li> <li>• <b>Except</b>—To exclude the address from the match condition and then select Add—To include the address in the match condition.</li> <li>• <b>Delete</b>—To remove an IP address from the match condition.</li> </ul> <p>Enter an IP destination address and prefix length and select an option.</p>
Prefix List	<p>Specifies prefix lists, which you have already defined, to be included in the match condition for a source or destination. Allows you to remove a prefix list from the match condition.</p> <p><b>NOTE:</b> This prefix list match condition cannot be specified in conjunction with the source prefix list or destination prefix list match conditions in the same term.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include a predefined destination prefix list, type the prefix list name.</li> <li>• <b>Delete</b>—To remove a prefix list from the match condition.</li> </ul> <p>Select an option.</p>



Table 206: Fields on the Match Criteria for IPv6 Firewall Filter (*continued*)

Field	Action
Port	<p>Specifies a port type to be included in, or excluded from, a match condition for a source or destination. Allows you to remove a destination port type from the match condition.</p> <p><b>NOTE:</b> This match condition does not check the protocol type being used on the port. Make sure to specify the protocol type (TCP or UDP) match condition in the same term.</p> <p>Also, this port match condition cannot be specified in conjunction with the source port or destination port match conditions in the same term.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the port in the match condition.</li> <li>• <b>Except</b>—To exclude the port from the match condition and then select Add—To include the port in the match condition.</li> <li>• <b>Delete</b>—To remove a port type from the match condition.</li> </ul> <p>Select the port from the port name list; enter the port name, number, or range; and then select an option.</p>
<b>Match Interface</b>	
Interface	<p>Specifies interfaces to be included in a match condition. Allows you to remove an interface from the match condition.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include an interface in a match condition.</li> <li>• <b>Delete</b>—To remove an interface from the match condition.</li> </ul> <p>Select a name from the interface name list or Enter the interface name and select an option.</p>
Interface Set	<p>Specifies interface sets, which you have already defined, to be included in a match condition. Allows you to remove an interface set from the match condition.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the group in the match condition.</li> <li>• <b>Delete</b>—To remove an interface group from the match condition.</li> </ul> <p>Enter the interface set name and select an option.</p>

Table 206: Fields on the Match Criteria for IPv6 Firewall Filter (*continued*)

Field	Action
Interface Group	<p>Specifies interface groups, which you have already defined, to be included in, or excluded from, a match condition. Allows you to remove an interface group from the match condition.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the port in the match condition.</li> <li>• <b>Except</b>—To exclude the port from the match condition and then select <b>Add</b> to include the port in the match condition.</li> <li>• <b>Delete</b>—To remove a port type from the match condition.</li> </ul> <p>Enter the name of the group and select an option.</p>
<b>Match Packet and Network</b>	
TCP Established	<p>Matches all Transmission Control Protocol packets other than the first packet of a connection.</p> <p><b>NOTE:</b> This match condition does not verify that the TCP is used on the port. Make sure to specify the TCP as a match condition in the same term.</p> <p>Select the check box.</p>
TCP Initial	<p>Matches the first Transmission Control Protocol packet of a connection.</p> <p><b>NOTE:</b> This match condition does not verify that the TCP is used on the port. Make sure to specify the TCP as a match condition in the same term.</p> <p>Select the check box.</p>
TCP Flags	<p>Specifies Transmission Control Protocol flags to be included in the match condition.</p> <p><b>NOTE:</b> This match condition does not verify that the TCP is used on the port. Make sure to specify the TCP as a match condition in the same term.</p> <p>Enter a text or numeric string defining the flag.</p>
Next Header	<p>Specifies IPv6 protocol types to be included in, or excluded from, the match condition. Allows you to remove an IPv6 protocol type from the match condition.</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the protocol in the match condition.</li> <li>• <b>Except</b>—To exclude the protocol from the match condition and then select <b>Add</b>—To include the protocol in the match condition.</li> <li>• <b>Delete</b>—To remove an IPv6 protocol type from the match condition.</li> </ul> <p>Select a protocol name from the list or enter a protocol name or number and then select an option.</p>

Table 206: Fields on the Match Criteria for IPv6 Firewall Filter (*continued*)

Field	Action
ICMP Type	<p>Specifies ICMP packet types to be included in, or excluded from, the match condition. Allows you to remove an ICMP packet type from the match condition.</p> <p><b>NOTE:</b> This protocol does not verify that ICMP is used on the port. Make sure to specify an ICMP type match condition in the same term.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the packet type in the match condition.</li> <li>• <b>Except</b>—To exclude the packet type from the match condition and then select <b>Add</b> to include the packet type in the match condition.</li> <li>• <b>Delete</b>—To remove an ICMP packet type from the match condition.</li> </ul> <p>Select a packet type from the list or enter a packet type name or number and then select an option.</p>
ICMP Code	<p>Specifies the ICMP code to be included in, or excluded from, the match condition. Allows you to remove an ICMP code from the match condition.</p> <p><b>NOTE:</b> The ICMP code is dependent on the ICMP type. Make sure to specify an ICMP type match condition in the same term.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the packet type in the match condition.</li> <li>• <b>Except</b>—To exclude the packet type from the match condition and then select <b>Add</b>—To include the packet type in the match condition.</li> <li>• <b>Delete</b>—To remove an ICMP packet type from the match condition.</li> </ul> <p>Select a packet code from the list or enter the packet code as text or a number and select an option.</p>
Traffic Class	<p>Specifies the traffic class to be included in, or excluded from, the match condition. Allows you to remove a traffic class value from the match condition.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the traffic class in the match condition.</li> <li>• <b>Except</b>—To exclude the traffic class from the match condition and then select <b>Add</b>—To include the traffic class in the match condition.</li> <li>• <b>Delete</b>—To remove an traffic class value from the match condition.</li> </ul>

Table 206: Fields on the Match Criteria for IPv6 Firewall Filter (*continued*)

Field	Action
Packet Length	<p>Specifies the length of received packets, in bytes, to be included in, or excluded from, the match condition. Allows you to remove a packet length value from the match condition.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the packet length in the match condition.</li> <li>• <b>Except</b>—To exclude the packet length from the match condition and then select <b>Add</b> to include the packet length in the match condition.</li> <li>• <b>Delete</b>—To remove a packet length value from the match condition.</li> </ul> <p>Specify a packet length, enter a value or range.</p> <p>Select an option.</p>
Forwarding Class	<p>Specifies forwarding classes to be included in, or excluded from, the match condition. Allows you to a remove forwarding class entry from the match condition.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Add</b>—To include the forwarding class in the match condition.</li> <li>• <b>Except</b>—To exclude the forwarding class from the match condition and then select <b>Add</b> to include the forwarding class in the match condition.</li> <li>• <b>Delete</b>—To remove a forwarding class from the match condition.</li> </ul> <p>Specify a forwarding class by selecting a forwarding class from the list or entering a forwarding class, and then select an option.</p>
<b>Action</b>	
Nothing	<p>Select <b>Nothing</b>.</p> <p>Specifies that no action is performed. By default, a packet is accepted if it meets the match conditions of the term, and packets that do not match any conditions in the firewall filter are dropped.</p>
Accept	<p>Select <b>Accept</b>.</p> <p>Accepts a packet that meets the match conditions of the term.</p>
Discard	<p>Select <b>Discard</b>.</p> <p>Discards a packet that meets the match conditions of the term. Names a discard collector for packets.</p>

Table 206: Fields on the Match Criteria for IPv6 Firewall Filter (*continued*)

Field	Action
Reject	<p>Select <b>Reject</b> and then select a message type from the reason list.</p> <p>Rejects a packet that meets the match conditions of the term and returns a rejection message. Allows you to specify a message type that denotes the reason the packet was rejected.</p> <p><b>NOTE:</b> To log and sample rejected packets, specify log and sample action modifiers in conjunction with this action.</p>
Next Term	<p>Select <b>Next Term</b>.</p> <p>Evaluates a packet with the next term in the filter if the packet meets the match conditions in this term. This action makes sure that the next term is used for evaluation even when the packet matches the conditions of a term. When this action is not specified, the filter stops evaluating the packet after it matches the conditions of a term, and takes the associated action.</p>
Routing Instance	<p>Accepts a packet that meets the match conditions, and forwards it to the specified routing instance.</p> <p>Select <b>Routing Instance</b>, and enter the routing instance name in the box next to <b>Routing Instance</b>.</p>
<b>Action Modifiers</b>	
Forwarding Class	<p>Classifies the packet as a specific forwarding class.</p> <p>Select <b>Forwarding Class</b> from the list.</p>
Count	<p>Counts the packets passing this term. Allows you to name a counter that is specific to this filter. This means that every time a packet transits any interface that uses this filter, it increments the specified counter.</p> <p>Select <b>Count</b> and enter a 24-character string containing letters, numbers, or hyphens to specify a counter name.</p>
Log	<p>Select <b>Log</b>.</p> <p>Logs the packet header information in the routing engine.</p>
Syslog	<p>Select <b>Syslog</b>.</p> <p>Records packet information in the system log.</p>
Loss Priority	<p>Sets the loss priority of the packet. This is the priority of dropping a packet before it is sent, and it affects the scheduling priority of the packet.</p> <p>Select the range of priority from the list.</p>

## RELATED DOCUMENTATION

| [About the IPv6 Page | 542.](#)

# Security Services—Firewall Filters—Assign to Interfaces

IN THIS CHAPTER

- About the Assign to Interfaces Page | 556

## About the Assign to Interfaces Page

You are here: **Configure > Security Services > Security Policy > Firewall Filters > Assign To Interfaces.**

Use this page to configure interface for firewall filters.

### Field Descriptions

Table 207 on page 556 describes the fields on the Assign Interfaces page.

Table 207: Fields on the Assign Interfaces Page

Field	Description
Logical Interface Name	<p>Displays the logical interfaces on a router. Allows you to apply IPv4 and IPv6 firewall filters to packets received on the interface and packets transmitted from the interface.</p> <p>The options available are:</p> <ul style="list-style-type: none"><li>• <b>Input firewall filter:</b><ul style="list-style-type: none"><li>• IPv4 Input Filter—Enter the name of IPv4 filter applied to received packets.</li><li>• IPv6 Input Filter—Enter the name of IPv6 filter applied to received packets.</li></ul></li><li>• <b>Output firewall filter:</b><ul style="list-style-type: none"><li>• IPv4 Output Filter—Enter the name of IPv4 filter applied to transmitted packets.</li><li>• IPv6 Output Filter—Enter the name of IPv6 filter applied to transmitted packets.</li></ul></li></ul> <p>Click <b>OK</b> to save the changes.</p>
Link State	<p>Displays the status of the logical interface.</p>

Table 207: Fields on the Assign Interfaces Page (*continued*)

Input Firewall Filters	Displays the input firewall filter applied on an interface. This filter evaluates all packets received on the interface.
Output Firewall Filters	Displays the output firewall filter applied on an interface. This filter evaluates all packets transmitted from the interface.

## RELATED DOCUMENTATION

[Add IPv4 Firewall Filters | 528](#)[Add IPv6 Firewall Filters | 543](#)



# Security Services—Source NAT

## IN THIS CHAPTER

- [About the Source Page | 558](#)
- [Global Settings | 560](#)
- [Add a Source Rule Set | 562](#)
- [Edit a Source Rule Set | 565](#)
- [Delete Source Rule Set | 566](#)
- [Add a Source NAT Pool | 566](#)
- [Edit a Source NAT Pool | 568](#)
- [Delete Source NAT Pool | 568](#)

## About the Source Page

You are here: **Configure** > **Security Services** > **NAT** > **Source** .

Use this page to configure source NAT.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a global settings. See [“Global Settings” on page 560](#).
- Add a source rule set. See [“Add a Source Rule Set” on page 562](#).
- Edit a source rule set. See [“Edit a Source Rule Set” on page 565](#).
- Delete a source rule set. See [“Delete Source Rule Set” on page 566](#).
- Add a source NAT pool. See [“Add a Source NAT Pool” on page 566](#).
- Edit a source NAT pool. See [“Edit a Source NAT Pool” on page 568](#).
- Delete a source NAT pool. See [“Delete Source NAT Pool” on page 568](#).

## Field Descriptions

Table 208 on page 559 describes the fields on the Source Page.

Table 208: Fields on the Source Page.

Field	Description
<b>Source NAT Rule Set</b>	
From	Displays the source NAT sort options from which the packets flow.  The options available are: <ul style="list-style-type: none"> <li>• Routing Instance</li> <li>• Zone</li> <li>• Interface</li> </ul>
To	Displays the source NAT sort options to which the packets flow.  The options available are: <ul style="list-style-type: none"> <li>• Routing Instance</li> <li>• Zone</li> <li>• Interface</li> </ul>
Filter	Displays the filter option.
Name	Displays the name of the source NAT rule set.
From	Displays the name of the routing instance, zone, or interface from which the packets flow.
To	Displays the name of the routing instance, zone, or interface to which the packets flow.
Rule	Displays the name of the rule in the selected source NAT rule set.
Description	Displays a description of the source NAT rule set.
<b>Rules in Selected Rule-Set</b>	
Rule Name	Displays the name of the rule in the selected source NAT rule set.
Source Addresses	Displays the match source address.
Source Ports	Displays the match source ports.

Table 208: Fields on the Source Page. (continued)

Field	Description
Destination Addresses	Displays the match destination address.
Destination Ports	Displays the match destination port.
IP Protocol	Displays the match IP protocol.
Action	Displays the action of the rule.
Persistent	Displays the persistent NAT address in the source NAT pool
Upper Threshold	Displays the upper threshold value at which an SNMP trap is triggered.
Lower Threshold	Displays the lower threshold value at which an SNMP trap is triggered.
Description	Displays the description of the rule.
<b>Source NAT Pool</b>	
Name	Displays the name of the source NAT pool.
Address	Displays the IP address of the source NAT pool.
Port	Displays the port address of the source NAT pool.
Description	Displays the description of the source NAT pool.
Upper Threshold	Displays the
Lower Threshold	Displays the

## RELATED DOCUMENTATION

| [Global Settings](#) | 560.

## Global Settings

You are here: **Configure > Security Services > NAT > Source** .

To add global settings for a source NAT rule set:

1. Click the **Global Settings** available on the upper right side of the page.  
The Global Settings page appears.
2. Complete the configuration according to the guidelines provided in [Table 209 on page 561](#).
3. Click **OK** to save the changes.

**Table 209: Fields on the Global Settings Page**

Field	Action
Address Persistent	Select check box to the enable address persistence.  Provides source address to maintain same translation.
Port randomization	Select check box to the enable source NAT port randomization.
<b>Pool Utilization Alarm</b>	
Clear Threshold	Enter the clear threshold value for pool utilization.  Range: 40 through 100.
Raise Threshold	Enter the raise threshold value for pool utilization.  Range: 50 through 100.
<b>Interface Port-Overloading</b>	
On	Select to the enable source NAT interface with port overloading.
Factor	Enter a value for the port overloading capacity for the source NAT interface.
Off	Select to the disable source NAT interface with port overloading.

#### RELATED DOCUMENTATION

| [Add a Source Rule Set](#) | [562](#).

# Add a Source Rule Set

You are here: **Configure** > **Security Services** > **NAT** > **Source** .

To add a source rule set:

1. Click the add icon (+) on the upper right side of the Source page.  
The Add Rule Set page appears.
2. Complete the configuration according to the guidelines provided in [Table 210 on page 562](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

**Table 210: Fields on the Add Rule Set Page**

Field	Action
Rule Set Name	Enter a rule set name.
Rule Set Description	Enter a description for the rule set.
From	Select an option from the list: <ul style="list-style-type: none"><li>• Routing Instance</li><li>• Zone</li><li>• Interface</li></ul> Select the source routing instances, zones, or interfaces in the <b>Available</b> column and use the right arrow to move them to the <b>Selected</b> column.
To	Select an option from the list: <ul style="list-style-type: none"><li>• Routing Instance</li><li>• Zone</li><li>• Interface</li></ul> Select the destination routing instances, zones, or interfaces in the <b>Available</b> column and use the right arrow to move them to the <b>Selected</b> column.
<b>Rules</b>	
Rules	Specifies the rules added to the selected source rule set.
<b>Add Rules</b>	

Table 210: Fields on the Add Rule Set Page (*continued*)

Field	Action
+	Click + available at the upper right of the Rules table.  The Add Rule page appears.
Rule Name	Enter a rule name.
Rule Description	Enter a description for the rule.
Match	Displays the match source and destination addresses.
Source addresses and Ports	Enter the following details: <ul style="list-style-type: none"> <li>• Source Address—Select an IPv4 or IPv6 address from the list and move it from the <b>Available</b> column to the <b>Selected</b> column using the right arrow. Or enter an IP address in the <b>Selected</b> column and click + to add it.</li> <li>• Ports—Enter a port number or port range from low to high and click + to add it. Port Range: 0 through 65535. Select an existing port and click X to delete it.</li> <li>• IP Protocol—Select a protocol from the list or enter a protocol number and click +.</li> </ul>
Destination addresses and Ports:	Enter the following details: <ul style="list-style-type: none"> <li>• Destination Address—Select an IPv4 or IPv6 address from the list and move it from the <b>Available</b> column to the <b>Selected</b> column using the right arrow. Or enter an IP address in the <b>Selected</b> column and click + to add it.</li> <li>• Port—Select one of the following options: <ul style="list-style-type: none"> <li>• Any—Selects available port.</li> <li>• Port—Enter a port number.</li> <li>• Port Range—Enter a port range from low to high.</li> </ul> </li> </ul>
<b>Action</b>	
No Source NAT	

Table 210: Fields on the Add Rule Set Page (*continued*)

Field	Action
Do Source NAT With Egress Interface Address	<p>Enable the Persistent check box and enter the following:</p> <ul style="list-style-type: none"> <li>• <b>Permit</b>—Select an option from the list: <ul style="list-style-type: none"> <li>• <b>any-remote-host</b>—All requests from a specific internal IP address and port are mapped to the same reflexive transport address. (The reflexive transport address is the public IP address and port created by the NAT device closest to the STUN server.) Any external host can send a packet to the internal host by sending the packet to the reflexive transport address.</li> <li>• <b>target-host</b>—All requests from a specific internal IP address and port are mapped to the same reflexive transport address. An external host can send a packet to an internal host by sending the packet to the reflexive transport address. The internal host must have previously sent a packet to the external host's IP address.</li> <li>• <b>target-host-port</b>—All requests from a specific internal IP address and port are mapped to the same reflexive transport address. An external host can send a packet to an internal host by sending the packet to the reflexive transport address. The internal host must have previously sent a packet to the external host's IP address and port.</li> </ul> <p><b>NOTE:</b> The target-host-port configuration is not supported for NAT64 when configured with IPv6 address.</p> </li> <li>• <b>Inactivity Timeout</b>—Enter the value in seconds for the persistent NAT binding remains in the SRX device memory when all the sessions of the binding entry are gone. When the configured timeout is reached, the binding is removed from memory. Range: 60 through 7200.</li> <li>• <b>Max Session Number</b>—Enter the number of the sessions with which a persistent NAT binding can be associated. Range: 8 through 65,536.</li> </ul>
<b>Utilization Alarm</b>	
Upper Threshold	<p>Enter an upper threshold value at which an SNMP trap is triggered.</p> <p>Range: 1 through 4294967295.</p>
Lower Threshold	<p>Enter a lower threshold value at which an SNMP trap is triggered.</p> <p>Range: 1 through 4294967295.</p> <p><b>NOTE:</b> This option can be set only if you configure the upper threshold value.</p>
Edit Rules	<p>Select an existing rule and click the edit icon at the top right corner of the Rules table.</p> <p>The Edit Interface page appears with editable fields.</p>

Table 210: Fields on the Add Rule Set Page (*continued*)

Field	Action
Delete Rules	<p>Select an interface and click the delete icon at the top right corner of the Rules table.</p> <p>A confirmation window appears. Click <b>Yes</b> to delete the selected interface or click <b>No</b> to discard.</p>

## RELATED DOCUMENTATION

[Edit a Source Rule Set](#) | 565.

## Edit a Source Rule Set

You are here: **Configure** > **Security Services** > **NAT** > **Source**.

To edit a source rule set and its rules:

1. Select an existing source rule set profile that you want to edit on the Source page.
2. Click the pencil icon available on the upper right side of the page.

The Edit Source Rule Set page appears with editable fields. For more information on the options, see [“Add a Source Rule Set” on page 562](#).

**NOTE:** Alternatively, you can select the rule directly and click the pencil icon available on the upper right side of the Rules table to edit a rule for the selected rule set.

3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

## RELATED DOCUMENTATION

[Delete Source Rule Set](#) | 566.



## Delete Source Rule Set

You are here: **Configure** > **Security Services** > **NAT** > **Source**.

To delete a source rule set and its rules:

1. Select one or more rule sets that you want to delete on the Source page.
2. Click the delete icon available on the upper right side of the page.

A confirmation window appears.

**NOTE:** Alternatively, you can select the rule directly and click the delete icon available on the upper right side of the Rules table to delete a rule for the selected rule set.

3. Click **Yes** to delete or click **No** to retain the profile.

### RELATED DOCUMENTATION

| [Add a Source NAT Pool](#) | [566](#).

## Add a Source NAT Pool

You are here: **Configure** > **Security Services** > **NAT** > **Source**.

To add a source NAT pool:

1. Click the add icon (+) on the upper right side of the Source NAT Pool page.  
The Add Source NAT Pool page appears.
2. Complete the configuration according to the guidelines provided in [Table 211 on page 567](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 211: Fields on the Add Source NAT Pool Page

Field	Description
Pool Name	Enter a source NAT pool name.
Pool Description	Enter a description for the source NAT pool.
Routing Instance	Select a routing instance from the list.
Pool Address Family	Select a source NAT pool IPv4 or IPv6 address family.
Pool Addresses	<p>Enter the source NAT pool address range in the <b>From</b> and <b>To</b> text boxes. Click + to add the addresses.</p> <p>To delete any addresses, select the address you want to delete and click X.</p>
Port Translation	<p>Select a port translation option from the list:</p> <ul style="list-style-type: none"> <li>• No Translation</li> <li>• Translation with Default Port Range (1024–65535)</li> <li>• Translation with Specified Port Range—Enter a port range from low to high.</li> <li>• Translation with Port Overloading Factor—Enter a value for the port overloading capacity for the source NAT interface.</li> </ul>
Address Assignment	<p>Select an option:</p> <ul style="list-style-type: none"> <li>• Enable Address Shared—Specifies that multiple internal IP addresses can be mapped to the same external IP address. Use this option only when the source NAT pool is configured with no port translation.</li> </ul> <p>When a source NAT pool configured with no port translation has few external IP addresses available, or only one external IP address, the address shared option, with a many-to-one mapping, increases NAT resources and improves traffic.</p> <ul style="list-style-type: none"> <li>• Enable Address Pooling—Select an option: <ul style="list-style-type: none"> <li>• paired—Allows address-pooling paired.</li> <li>• no-paired—Allow address-pooling no-paired.</li> </ul> </li> </ul>
<b>Utilization Alarm</b>	
Upper Threshold	<p>Enter an upper threshold percentage at which an SNMP trap is triggered.</p> <p>Range: 50 through 100.</p>

Table 211: Fields on the Add Source NAT Pool Page (*continued*)

Field	Description
Lower Threshold	<p>Enter a lower threshold percentage at which an SNMP trap is triggered.</p> <p>Range: 40 through 100.</p> <p><b>NOTE:</b> This option can be set only if you configure the upper threshold value.</p>

#### RELATED DOCUMENTATION

| [Edit a Source NAT Pool](#) | 568.

## Edit a Source NAT Pool

You are here: **Configure** > **Security Services** > **NAT** > **Source**.

To edit a source NAT pool:

1. Select an existing source NAT pool that you want to edit on the Source page.
2. Click the pencil icon available on the upper right side of the page.

The Edit Source NAT Pool page appears with editable fields. For more information on the options, see [“Add a Source NAT Pool”](#) on page 566.

3. Click **OK** to save the changes.

#### RELATED DOCUMENTATION

| [Delete Source NAT Pool](#) | 568.

## Delete Source NAT Pool

You are here: **Configure** > **Security Services** > **NAT** > **Source**.

To delete a source NAT pool:

1. Select one or more source NAT pools that you want to delete on the Source page.
2. Click the delete icon available on the upper right side of the page.  
A confirmation message window appears.
3. Click **Yes** to delete or click **No** to retain the profile.

#### RELATED DOCUMENTATION

| [About the Source Page](#) | 558.

# Security Services—Destination NAT

IN THIS CHAPTER

- [About the Destination Page | 570](#)
- [Add a Destination Rule Set | 572](#)
- [Edit a Destination Rule Set | 575](#)
- [Delete Destination Rule Set | 576](#)
- [Add a Destination NAT Pool | 576](#)
- [Edit a Destination NAT Pool | 579](#)
- [Delete Destination NAT Pool | 580](#)

## About the Destination Page

You are here: **Configure > Security Services > NAT > Destination** .

Use this page to add, edit, or delete destination NAT configurations.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a Destination Rule Set. See [“Add a Destination Rule Set” on page 572](#).
- Add a Destination Rule Set. See [“Edit a Destination Rule Set” on page 575](#).
- Delete a Destination Rule Set. See [“Delete Destination Rule Set” on page 576](#).
- Add a Destination NAT Pool. See [“Add a Destination NAT Pool” on page 576](#).
- Edit a Destination NAT Pool. See [“Edit a Destination NAT Pool” on page 579](#).
- Delete a Destination NAT Pool. See [“Delete Destination NAT Pool” on page 580](#).

### Field Descriptions

[Table 212 on page 571](#) describes the fields on the Destination Page.

Table 212: Fields on the Destination Page.

Field	Description
<b>Destination NAT Rule Set</b>	
From	<p>Displays the destination NAT sort options from which the packets flow.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• Routing Instance</li> <li>• Zone</li> <li>• Interface</li> </ul>
To	<p>Displays the destination NAT sort options to which the packets flow.</p> <p>The options available are:</p> <ul style="list-style-type: none"> <li>• Routing Instance</li> <li>• Zone</li> <li>• Interface</li> </ul>
Filter	Displays the filter option.
Name	Displays the name of the destination NAT rule set.
From	Displays the name of the routing instance/zone/interface from which the packets flow.
Rule	Displays the name of the rule in the selected destination NAT rule set.
Description	Displays a description of the destination NAT rule set.
<b>Rules in Selected Rule-Set</b>	
Rule Name	Displays the name of the rule in the selected destination NAT rule set.
Match Source	Displays the match source address.
Match Destination	Displays the match destination address.
Match IP Protocol	Displays the match IP protocol.
Match Destination Port	Displays the match destination port.
Action	Displays the action of the rule in the selected rule set.

Table 212: Fields on the Destination Page. (continued)

Field	Description
Description	Displays a description of the rule in the selected destination NAT rule set.
<b>Destination NAT Pool</b>	
Name	Displays the name of the destination NAT pool.
Address	Displays the IP address of the destination NAT pool.
Port	Displays the port address of the destination NAT pool.
Description	Displays a description of the destination NAT pool.

#### RELATED DOCUMENTATION

| [Add a Destination Rule Set](#) | 572.

## Add a Destination Rule Set

You are here: **Configure** > **Security Services** > **NAT** > **Destination** .

To add a destination Rule Set:

1. Click the add icon (+) on the upper right side of the Destination page.  
The Add Rule Set page appears.
2. Complete the configuration according to the guidelines provided in [Table 213 on page 572](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

[Table 213 on page 572](#) describes the fields on the Add Rule Set page.

Table 213: Fields on the Add Rule Set page.

Field	Action
<b>Destination Rule Set</b>	

Table 213: Fields on the Add Rule Set page. (continued)

Field	Action
<b>Add Rule Set</b>	
Rule Set Name	Enter the rule set name.
Rule Set Description	Enter a description for the rule set.
<b>From</b>	<p>Specifies the filter options. The options available are:</p> <ul style="list-style-type: none"> <li>• Routing Instance</li> <li>• Zone</li> <li>• Interface</li> </ul> <p>Select an option.</p> <p>Select the routing instances/zones/interfaces in the <b>Available</b> column and the use the right arrow to move them to the <b>Selected</b> column.</p>
<b>Add Rule</b>	
Rule Name	Enter the rule name.
Rule Description	Enter a description for the rule.
<b>Match</b>	
Source Address	<p>Search and select the source addresses in the <b>Available</b> column and the use the right arrow to move them to the <b>Selected</b> column.</p> <p>You can also enter a source address in the <b>New</b> text box in the <b>Selected</b> column and click <b>Add</b> to add the source address to the lower pane of the <b>Selected</b> column.</p>
Destination Address	Enter the destination IP address.
Port	Enter the destination port number.
IP Protocol	Enter the protocol name in the text box and click <b>Add</b> to add the protocol to the <b>IP Protocol</b> column.



Table 213: Fields on the Add Rule Set page. (continued)

Field	Action
<b>Actions</b>	<p>Specifies the actions for the destination NAT pool. The options available are:</p> <ul style="list-style-type: none"> <li>• No Destination NAT.</li> <li>• Do Destination NAT With Pool.</li> </ul> <p>Select an option.</p>
<b>Do Destination NAT With Pool</b>	
Add New Pool	<p>Specifies the add option for the Do Destination NAT With Pool option.</p> <p>Click <b>Add New Pool</b>.</p>
<b>Add Destination Pool</b>	
Pool Name	Enter the destination pool name.
Pool Description	Enter a description for the destination pool.
Routing Instance	<p>Specifies the routing instance available.</p> <p>Select an option.</p>
<b>Pool Addresses and Port</b>	
Address/Port	Enter the destination pool address.
Port	Enter the destination pool port number.
Address Range	Enter the destination pool address range.
<b>Destination NAT Pool</b>	
<b>Add Destination Pool</b>	
Pool Name	Enter the destination pool name.
Pool Description	Enter a description for the destination pool.
Routing Instance	<p>Specifies the routing instance available.</p> <p>Select an option.</p>
<b>Pool Addresses and Port</b>	

Table 213: Fields on the Add Rule Set page. (continued)

Field	Action
Address/Port	Enter the destination pool address.
Port	Enter the destination pool port number.
Address Range	Enter the destination pool address range.

## RELATED DOCUMENTATION

[Edit a Destination Rule Set](#) | 575.

## Edit a Destination Rule Set

You are here: **Configure** > **Security Services** > **NAT** > **Destination**.

To edit a destination rule set:

1. Select an existing destination rule set that you want to edit on the Destination page.
2. Click the pencil icon available on the upper right side of the page.

The Edit Rule Set page appears with editable fields. For more information on the options, see [“Add a Destination Rule Set” on page 572](#).

3. Click **OK** to save the changes.

## RELATED DOCUMENTATION

[Delete Destination Rule Set](#) | 576.

## Delete Destination Rule Set

You are here: **Configure** > **Security Services** > **NAT** > **Destination**.

To delete destination rule set:

1. Select one or more destination rule sets that you want to delete on Destination page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the profile.

### RELATED DOCUMENTATION

| [Add a Destination NAT Pool](#) | [576](#).

## Add a Destination NAT Pool

You are here: **Configure** > **Security Services** > **NAT** > **Destination** .

To add a Destination NAT Pool:

1. Click the add icon (+) on the upper right side of the Destination page. The Add Rule Set page appears.
2. Complete the configuration according to the guidelines provided in [Table 214 on page 576](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

[Table 214 on page 576](#) describes the fields on the Add Rule Set Page.

Table 214: Fields on the Add Rule Set Page.

Field	Action
<b>Destination Rule Set</b>	
<b>Add Rule Set</b>	
Rule Set Name	Specifies the name of the rule set.  Enter the rule set name.

Table 214: Fields on the Add Rule Set Page. (continued)

Field	Action
Rule Set Description	<p>Specifies a description for the rule set.</p> <p>Enter a description for the rule set.</p>
<b>From</b>	<p>Specifies the filter options. The options available are:</p> <ul style="list-style-type: none"> <li>• Routing Instance</li> <li>• Zone</li> <li>• Interface</li> </ul> <p>Select an option.</p> <p>Select the routing instances/zones/interfaces in the <b>Available</b> column and the use the right arrow to move them to the <b>Selected</b> column.</p>
<b>Add Rule</b>	
Rule Name	<p>Specifies the name of the rule.</p> <p>Enter the rule name.</p>
Rule Description	<p>Specifies a description for the rule.</p> <p>Enter a description for the rule.</p>
<b>Match</b>	
Source Address	<p>Specifies the source IP address. The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Available</b>—Specifies the available source addresses.</li> <li>• <b>Selected</b>—Specifies the selected source addresses.</li> </ul> <p>Search and select the source addresses in the <b>Available</b> column and the use the right arrow to move them to the <b>Selected</b> column.</p> <p>You can also enter a source address in the <b>New</b> text box in the <b>Selected</b> column and click <b>Add</b> to add the source address to the lower pane of the <b>Selected</b> column.</p>
Destination Address	<p>Specifies the destination IP address.</p> <p>Enter the destination IP address.</p>
Port	<p>Specifies the destination port number.</p> <p>Enter the destination port number.</p>

Table 214: Fields on the Add Rule Set Page. (continued)

Field	Action
IP Protocol	<p>Specifies the IP protocol for the destination NAT rule.</p> <p>Enter the protocol name in the text box and click <b>Add</b> to add the protocol to the <b>IP Protocol</b> column.</p>
<b>Actions</b>	<p>Specifies the actions for the destination NAT pool. The options available are:</p> <ul style="list-style-type: none"> <li>• No Destination NAT.</li> <li>• Do Destination NAT With Pool.</li> </ul> <p>Select an option.</p>
<b>Do Destination NAT With Pool</b>	
Add New Pool	<p>Specifies the add option for the Do Destination NAT With Pool option.</p> <p>Click <b>Add New Pool</b>.</p>
<b>Add Destination Pool</b>	
Pool Name	Enter the name of the destination pool.
Pool Description	Enter a description for the destination pool.
Routing Instance	Select an option.
<b>Pool Addresses and Port</b>	
Address/Port	Enter the destination pool address.
Port	Enter the destination pool port number.
Address Range	Enter the destination pool address range.
<b>Destination NAT Pool</b>	
<b>Add Destination Pool</b>	
Pool Name	Enter the destination pool name.
Pool Description	Enter a description for the destination pool.

Table 214: Fields on the Add Rule Set Page. (continued)

Field	Action
Routing Instance	Specifies the routing instance available.  Select an option.
<b>Pool Addresses and Port</b>	
Address/Port	Enter the destination pool address.
Port	Enter the destination pool port number.
Address Range	Enter the destination pool address range.

## RELATED DOCUMENTATION

[Edit a Destination NAT Pool](#) | 579.

## Edit a Destination NAT Pool

You are here: **Configure** > **Security Services** > **NAT** > **Destination**.

To edit a Destination NAT Pool:

1. Select an existing destination NAT pool that you want to edit on the Destination page.
2. Click the pencil icon available on the upper right side of the page.

The Edit Destination NAT Pool page appears with editable fields. For more information on the options, see [“Add a Destination NAT Pool” on page 576](#).

3. Click **OK** to save the changes.

## RELATED DOCUMENTATION

[Delete Destination NAT Pool](#) | 580.

## Delete Destination NAT Pool

You are here: **Configure** > **Security Services** > **NAT** > **Destination**.

To delete a Destination NAT Pool:

1. Select one or more destination NAT pools that you want to delete on the Destination page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the profile.

### RELATED DOCUMENTATION

| [About the Destination Page](#) | 570.

# Security Services—Static NAT

## IN THIS CHAPTER

- [About the Static Page | 581](#)
- [Add a Static Rule Set | 583](#)
- [Edit a Static Rule Set | 586](#)
- [Delete Static Rule Set | 587](#)

## About the Static Page

You are here: **Configure > Security Services > NAT > Static.**

Use this page to configure static NAT.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a static rule set and rules to it. See [“Add a Static Rule Set” on page 583](#).
- Edit a static rule set and its rules. See [“Edit a Static Rule Set” on page 586](#).
- Delete a static rule set and its rules. See [“Delete Static Rule Set” on page 587](#).
- Move the rules in the rules table. To do this, select a rule which you want to move and select the following options according to your choice:
  - Move Up—Enables you to move the rule up in the list.
  - Move Down—Enables you to move the rule down in the list.
  - Move to Top—Enables you to move the rule to top of the list
  - Move to Bottom—Enables you to move the rule to the bottom of the list



## Field Descriptions

Table 215 on page 582 describes the fields on the Static page.

Table 215: Fields on the Static Page

Field	Description
<b>Static NAT Rule Set</b>	
From	Displays the destination NAT sort options from which the packets flow.  The options available are: <ul style="list-style-type: none"> <li>• Routing Instance</li> <li>• Zone</li> <li>• Interface</li> </ul>
Filter	Displays the filter options.
Name	Displays the name of the static NAT rule set.
From	Displays the name of the routing instance, zone, or interface from which the packets flow.
Rule	Displays the name of the rule in the selected static NAT rule set.
Description	Displays a description of the static NAT rule set.
<b>Rules in Selected Rule-Set</b>	
Rule Name	Displays the name of the routing instance, zone, or interface to which the packet flows.
Source Addresses	Displays the source address to match the rule.
Source Ports	Displays the source port number.
Destination Addresses	Displays the destination address to match the rule.
Destination Ports	Displays the destination port number.
Prefix	Displays the static IP address prefix.
Mapped Port	Displays the destination port or port range to allow static NAT to map ports.
Upper Threshold	Displays the upper threshold value of the at which an SNMP trap is triggered.

Table 215: Fields on the Static Page (*continued*)

Field	Description
Lower Threshold	Displays the lower threshold value of the at which an SNMP trap is triggered.
Description	Displays the description of the rule in the selected static NAT rule set.

## RELATED DOCUMENTATION

[Add a Static Rule Set | 583](#)
[Edit a Static Rule Set | 586](#)
[Delete Static Rule Set | 587](#)
[Add a Static Rule](#)
[Edit a Static Rule](#)
[Delete Static Rule](#)

## Add a Static Rule Set

You are here: **Configure** > **Security Services** > **NAT** > **Static**.

To add a static rule set:

1. Click the add icon (+) on the upper right side of the Static page.  
The Add Rule Set page appears.
2. Complete the configuration according to the guidelines provided in [Table 216 on page 583](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 216: Fields on the Add Static Rule Set Page

Field	Action
Rule Set Name	Enter a rule set name.
Rule Set Description	Enter a description for the rule set.

Table 216: Fields on the Add Static Rule Set Page *(continued)*

Field	Action
From	<p>Select a filter option from the list:</p> <ul style="list-style-type: none"> <li>• Routing Instance</li> <li>• Zone</li> <li>• Interface</li> </ul> <p>Select the routing instances, zones, or interfaces in the <b>Available</b> column and use the right arrow to move them to the <b>Selected</b> column.</p>
<b>Rules</b>	
Rules	Specifies the rules added to the selected static rule set.

Table 216: Fields on the Add Static Rule Set Page (*continued*)

Field	Action
Add	<p>To add a rule to the selected static rule set:</p> <ol style="list-style-type: none"> <li>Click + available at the upper right of the Rules table. The Add Rule page appears.</li> <li>Enter the following details: <ul style="list-style-type: none"> <li>Rule Name—Enter a rule name.</li> <li>Rule Description—Enter a description for the rule.</li> <li>Match—Displays the match destination address. <ul style="list-style-type: none"> <li>Source Address—Select an IPv4 or IPv6 address from the list or enter the address and click + to add it. Select an existing IPv4 or IPv6 address and click X to delete it.</li> <li>Source Port—Enter a port number or port range from low to high and click + to add it. Port Range: 0 through 65535. Select an existing port and click X to delete it.</li> <li>Destination Address—Select <b>IPv4</b> or <b>IPv6</b> and then select an address from the list.</li> <li>Destination Port—Select one of the following options: <ul style="list-style-type: none"> <li>Any—Selects available port.</li> <li>Port—Enter a port number.</li> <li>Port Range—Enter a port range from low to high.</li> </ul> </li> </ul> </li> <li>Then—Enter the following details: <ul style="list-style-type: none"> <li>Host Address—Enter the static prefix address. <b>NOTE:</b> You can select <b>Translate to ipv4 address</b> if you have selected IPv6 in the destination address.</li> <li>Mapped Port—Select one of the following options: <ul style="list-style-type: none"> <li>Any—Selects available port.</li> <li>Port—Enter a port number.</li> <li>Port Range—Enter a port range from low to high.</li> </ul> </li> <li>Routing Instance—Select a routing instance from the list.</li> <li>Upper Threshold—Enter an upper threshold value at which an SNMP trap is triggered. Range: 1 through 4294967295.</li> <li>Lower Threshold—Enter a lower threshold value at which an SNMP trap is triggered. Range: 1 through 4294967295. <b>NOTE:</b> This option can be set only if you configure the upper threshold value.</li> </ul> </li> <li>Click <b>OK</b> to save the changes. If you want to discard your changes, click <b>Cancel</b>.</li> </ul></li></ol>

Table 216: Fields on the Add Static Rule Set Page (*continued*)

Field	Action
Edit	<p>Select an existing rule and click the edit icon at the top right corner of the Rules table.</p> <p>The Edit Interface page appears with editable fields.</p>
Delete	<p>Select an interface and click the delete icon at the top right corner of the Rules table.</p> <p>A confirmation window appears. Click <b>Yes</b> to delete the selected interface or click <b>No</b> to discard.</p>

## RELATED DOCUMENTATION

[About the Static Page | 581](#)
[Edit a Static Rule Set | 586](#)
[Delete Static Rule Set | 587](#)

## Edit a Static Rule Set

You are here: **Configure** > **Security Services** > **NAT** > **Static**.

To edit a static rule set and its rules:

1. Select an existing static rule set that you want to edit on the Static page.
2. Click the pencil icon available on the upper right side of the Static page.

The Edit Static Rule Set page appears with editable fields. For more information on the options, see [“Add a Static Rule Set” on page 583](#).

**NOTE:** Alternatively, you can select the rule directly and click the pencil icon available on the upper right side of the Rules table to edit a rule for the selected rule set.

3. Click **OK** to save the changes.

## RELATED DOCUMENTATION

---

[About the Static Page | 581](#)

---

[Add a Static Rule Set | 583](#)

---

[Delete Static Rule Set | 587](#)

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## Delete Static Rule Set

You are here: **Configure** > **Security Services** > **NAT** > **Static**.

To delete a static rule set and its rules:

1. Select one or more static rules sets that you want to delete on the Static page.
2. Click the delete icon available on the upper right side of the page.

A confirmation window appears.

**NOTE:** Alternatively, you can select the rule directly and click the delete (X) icon available on the upper right side of the Rules table to delete a rule for the selected rule set.

3. Click **Yes** to delete or click **No** to retain the profile.

### RELATED DOCUMENTATION

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[About the Static Page | 581](#)

---

[Add a Static Rule Set | 583](#)

---

[Edit a Static Rule Set | 586](#)

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# Security Services—NAT Proxy ARP/ND

## IN THIS CHAPTER

- [About the Proxy ARP/ND Page | 588](#)
- [Add a Proxy ARP | 589](#)
- [Edit a Proxy ARP | 590](#)
- [Delete a Proxy ARP | 591](#)
- [Add a Proxy ND | 592](#)
- [Edit a Proxy ND | 593](#)
- [Delete Proxy ND | 593](#)

## About the Proxy ARP/ND Page

You are here: **Configure** > **Security Services** > **NAT** > **Proxy ARP/ND**.

You can add, edit, and delete proxy ARP or proxy ND configurations.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a proxy ARP. See [“Add a Proxy ARP” on page 589](#).
- Edit a proxy ARP. See [“Edit a Proxy ARP” on page 590](#).
- Delete a proxy ARP. See [“Delete a Proxy ARP” on page 591](#).
- Create a proxy ND. See [“Add a Proxy ND” on page 592](#).
- Edit a proxy ND. See [“Edit a Proxy ND” on page 593](#).
- Delete a proxy ND. See [“Delete Proxy ND” on page 593](#).

### Field Descriptions

[Table 217 on page 589](#) describes the fields on the Proxy ARP/ND Configuration page.

Table 217: Fields on the Proxy ARP/ND Configuration Page

Field	Description
Interface	Displays the interface type.
Address	Displays the IPv4 or IPv6 address.

RELATED DOCUMENTATION

<a href="#">Add a Proxy ARP   589</a>
<a href="#">Edit a Proxy ARP   590</a>
<a href="#">Delete a Proxy ARP   591</a>
<a href="#">Add a Proxy ND   592</a>
<a href="#">Edit a Proxy ND   593</a>
<a href="#">Delete Proxy ND   593</a>

## Add a Proxy ARP

You are here: **Configure** > **Security Services** > **NAT** > **Proxy ARP/ND**.

To add a proxy ARP:

1. Click the add icon (+) on the upper right side of the proxy ARP/ND page.  
Select the Proxy ARP page. The Add Proxy ARP page appears.
2. Complete the configuration according to the guidelines provided in [Table 218 on page 590](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.



Table 218: Fields on the Add Proxy ARP Page

Field	Action
Interface	<p>Enter the interface type. The options available are:</p> <ul style="list-style-type: none"> <li>• ge-0/0/0.0</li> <li>• ge-0/0/2.0</li> <li>• lo0.0</li> <li>• vlan0.0</li> </ul> <p>Select an option.</p>
Address	<p>Enter the proxy ARP IP address.</p> <p>Click <b>Delete</b> to deleted the proxy ARP address.</p>
Address/Range	<p>Enter the source IP address range.</p> <p>Click <b>Add</b> to add the range address.</p>
To	<p>Enter the end IP address that the device can be assigned to.</p> <p>Click <b>Add</b> to add the port address.</p>

## RELATED DOCUMENTATION

[About the Proxy ARP/ND Page | 588](#)

[Edit a Proxy ARP | 590](#)

[Delete a Proxy ARP | 591](#)

[Add a Proxy ND | 592](#)

[Edit a Proxy ND | 593](#)

[Delete Proxy ND | 593](#)

## Edit a Proxy ARP

You are here: **Configure** > **Security Services** > **NAT** > **Proxy ARP/ND**.

To edit a proxy ARP:

1. Select an existing proxy ARP that you want to edit on the Proxy ARP/ND page.

- 2. Click the pencil icon available on the upper right side of the page.

The Edit Proxy ARP page appears with editable fields. For more information on the options, see [“Add a Proxy ARP” on page 589](#).

- 3. Click **OK** to save the changes or click **Cancel** to discard the changes.

RELATED DOCUMENTATION

<a href="#">About the Proxy ARP/ND Page   588</a>
<a href="#">Add a Proxy ARP   589</a>
<a href="#">Delete a Proxy ARP   591</a>
<a href="#">Add a Proxy ND   592</a>
<a href="#">Edit a Proxy ND   593</a>
<a href="#">Delete Proxy ND   593</a>

Delete a Proxy ARP

You are here: **Configure** > **Security Services** > **NAT** > **Proxy ARP/ND**.

To delete proxy ARP:

- 1. Select one or more proxy ARPs that you want to delete on the Proxy ARP page.
- 2. Click the delete icon available on the upper right side of the page.
- 3. Click **Yes** to delete or click **No** to retain the profile.

RELATED DOCUMENTATION

<a href="#">About the Proxy ARP/ND Page   588</a>
<a href="#">Add a Proxy ARP   589</a>
<a href="#">Edit a Proxy ARP   590</a>
<a href="#">Add a Proxy ND   592</a>
<a href="#">Edit a Proxy ND   593</a>
<a href="#">Delete Proxy ND   593</a>

## Add a Proxy ND

You are here: **Configure** > **Security Services** > **NAT** > **Proxy ARP/ND**.

To add a proxy ND:

1. Click the add icon (+) on the upper right side of the proxy ARP/ND page.  
Select the Proxy ND page. The Add Proxy ND page appears.
2. Complete the configuration according to the guidelines provided in [Table 219 on page 592](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 219: Fields on the Add Proxy ND Page

Field	Action
Interface	Enter the interface type. The options available are: <ul style="list-style-type: none"><li>• ge-0/0/0.0</li><li>• ge-0/0/1.0</li><li>• ge-0/0/3.0</li><li>• lo0.0</li></ul> Select an option.
Address	Enter the proxy ND IP address.  Click <b>Delete</b> to deleted the proxy ND address.
Address/Range	Enter the source IPv6 address range.  Click <b>Add</b> to add the range address.
To	Enter the end IPv6 address that the device can be assigned to.  Click <b>Add</b> to add the port address.

### RELATED DOCUMENTATION

[About the Proxy ARP/ND Page | 588](#)

[Add a Proxy ARP | 589](#)

[Edit a Proxy ARP | 590](#)

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[Delete a Proxy ARP | 591](#)

---

[Edit a Proxy ND | 593](#)

---

[Delete Proxy ND | 593](#)

---

## Edit a Proxy ND

You are here: **Configure** > **Security Services** > **NAT** > **Proxy ARP/ND**.

To edit a proxy ND:

1. Select an existing proxy ND that you want to edit on the Proxy ARP/ND page.
2. Click the pencil icon available on the upper right side of the page.

The Edit Proxy ND page appears with editable fields. For more information on the options, see [“Add a Proxy ND” on page 592](#).

3. Click **OK** to save the changes or click **Cancel** to discard the changes.

### RELATED DOCUMENTATION

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[About the Proxy ARP/ND Page | 588](#)

---

[Add a Proxy ARP | 589](#)

---

[Edit a Proxy ARP | 590](#)

---

[Delete a Proxy ARP | 591](#)

---

[Add a Proxy ND | 592](#)

---

[Delete Proxy ND | 593](#)

---

## Delete Proxy ND

You are here: **Configure** > **Security Services** > **NAT** > **Proxy ARP/ND**.

To delete a proxy ND:

1. Select one or more proxy NDs that you want to delete on the Proxy ND page.
2. Click the delete icon available on the upper right side of the page.

3. Click **Yes** to delete or click **No** to retain the profile.

RELATED DOCUMENTATION

<a href="#">About the Proxy ARP/ND Page   588</a>
<a href="#">Add a Proxy ARP   589</a>
<a href="#">Edit a Proxy ARP   590</a>
<a href="#">Delete a Proxy ARP   591</a>
<a href="#">Add a Proxy ND   592</a>
<a href="#">Edit a Proxy ND   593</a>

# Security Services—App Secure Application Signatures

## IN THIS CHAPTER

- [About the Application Signatures Page | 595](#)
- [Global Settings | 598](#)
- [Add Application Signatures | 600](#)
- [Add Application Signatures Group | 602](#)
- [Edit Application Signatures | 603](#)
- [Delete Application Signatures | 604](#)
- [Clone Application Signatures | 605](#)
- [Search Text in an Application Signatures Table | 605](#)

## About the Application Signatures Page

You are here: **Configure > Security Services > App Secure > App Signatures.**

Use this page to create, modify, clone, and delete application signature groups. You can view the details of predefined application signatures that are already downloaded.

All enabled and disabled application signatures on the device are displayed in a grid format. A message **Once a new custom application signature is created or modified, the configuration is committed immediately to the device.** is displayed at the top of the page.

A status message is displayed just above the grid. It shows the version number of the installed application, the latest version available, and whether you have downloaded or installed an application package.

```
Installed application package version : 0 | Latest version 3207 available |  
No application package is downloaded yet
```

**NOTE:** If you successfully download an application package, the Install button is displayed. If you successfully install a downloaded application package, an Uninstall button is displayed.

## Tasks You Can Perform

You can perform the following tasks from this page:

- Global Settings. See [“Global Settings” on page 598](#).
- Create application signatures. See [“Add Application Signatures” on page 600](#).
- Create application signatures group. See [“Add Application Signatures Group” on page 602](#).
- Edit application signatures. See [“Edit Application Signatures” on page 603](#).
- Delete application signatures. See [“Delete Application Signatures” on page 604](#).
- Clone application signatures. See [“Clone Application Signatures” on page 605](#).
- Search text in an application signatures. See [“Search Text in an Application Signatures Table” on page 605](#).
- View the details of application signatures—To do this, select the application signature for which you want to view the details and follow the available options:
  - Click **More** and select **Detailed View**.
  - Right-click on the selected application signature profile and select **Detailed View**.
  - Mouse over to the left of the selected application signature and click **Detailed View**.
- Filter the application signatures based on select criteria. To do this, select the filter icon at the top right-hand corner of the application signatures table. The columns in the grid change to accept filter options. Type the filter options; the table displays only the data that fits the filtering criteria.
- Show or hide columns in the application signature profiles table. To do this, click the Show Hide Columns icon in the top right corner of the application signatures table and select the options you want to view or deselect the options you want to hide on the page.
- **Download**—Manually downloads the latest or predefined application signature package.
- **More**—Clone an existing application signature package, create group, or configure the page to show a detailed view.
- **Create Group**—Create a new application signature or application signatures group.
- **Uninstall**—Removes application signatures that are currently installed on your device.

On SRX1400, SRX3400, SRX3600, SRX5600, and SRX5800 devices, specify the type of signature to uninstall. Choose one of the uninstall options:

- **Customized**—Uninstalls all customized application signatures on your device. This option does not uninstall predefined application signatures.
- **Predefined**—Uninstalls all predefined application signatures on your device. This option does not uninstall any customized applications.
- **All**—Uninstalls all customized and predefined application signatures on your device.

### Field Descriptions

Table 220 on page 597 describes the fields on the Application Signatures page.

Table 220: Fields on the Application Signatures Page

Field	Description
Name	Displays the application signature name.
Object Type	Displays the application signature object type.
Category	Specifies the category of the application signature.
Subcategory	Specifies the subcategory of the application signature.
Risk	Displays the risk as critical, high, moderate, low, or unsafe.
Characteristic	Specifies the characteristic of the application signature.
Predefined or Custom	Displays the predefined or custom application signatures and settings that are configured on your device.
Status	Displays the status of the application signature.

### RELATED DOCUMENTATION

- [Global Settings | 598](#)
- [Add Application Signatures | 600](#)
- [Add Application Signatures Group | 602](#)
- [Edit Application Signatures | 603](#)
- [Delete Application Signatures | 604](#)
- [Clone Application Signatures | 605](#)
- [Search Text in an Application Signatures Table | 605](#)



# Global Settings

You are here: **Configure** > **Security Services** > **App Secure** > **App Signatures**.

To add global settings:

1. Click the **Global Settings** on the upper right side of the Application Signatures page.  
The Global Settings page appears.
2. Complete the configuration according to the guidelines provided in [Table 221 on page 598](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 221: Fields on the Global Settings Option page

Field	Action
<b>Application Signature</b>  Specifies run conditions, to enable or disable application signatures and the application system cache. You can also select a proxy profile or create a proxy profile.	
Application Identification	Disable the application identification of applications running on your network.  Click the check box to Disable this option.
Proxy Profile	To create a proxy profile:  1. Click <b>Create Profile</b> .  2. Enter the following details: <ul style="list-style-type: none"><li>• Profile Name - Enter a valid profile name.</li><li>• Connection Type - Select any one option from the following:<ul style="list-style-type: none"><li>• Server IP—Enter the server IP address</li><li>• Host Name—Enter the host name.</li></ul></li><li>• Port Number-Enter the port number in the range 0 through 65535. Default port number is 80.</li></ul> 3. Click <b>OK</b> to save the changes. If you want to discard your changes, click <b>Cancel</b> .

Table 221: Fields on the Global Settings Option page (*continued*)

Field	Action
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**Download**

Specifies the URL from where you can download the signature package, set up a schedule for automatic downloads of the latest predefined application signature package.

URL	Enter the URL for the application package for downloading.
Automatic Update	Enable this option to schedule download and update.

**Application System Cache**

Enable or disable storing of AI result in application cache, configure ASC security services, configure miscellaneous services such as ABPR, or set the cache entry timeout.

Application Cache	Enable this option to save the mapping between an application type and the corresponding destination IP address, destination port, protocol type, and service.
Security Services	Enable this option for security services, such as security policies, application firewall (AppFW), Juniper Sky ATP, IDP, and UTM
Miscellaneous Services	Enable this option for miscellaneous services, such as APBR and AppTrack.
Cache entry timeou	Enter the timeout value in seconds for the application system cache (ASC) entries.

**RELATED DOCUMENTATION**

[About the Application Signatures Page | 595](#)

[Add Application Signatures | 600](#)

[Add Application Signatures Group | 602](#)

[Edit Application Signatures | 603](#)

[Delete Application Signatures | 604](#)

[Clone Application Signatures | 605](#)

[Search Text in an Application Signatures Table | 605](#)

# Add Application Signatures

You are here: **Configure** > **Security Services** > **App Secure** > **App Signatures**.

To add an application signature:

1. Click the add icon (+) on the upper right side of the Application Signatures page.  
The Create Application Signatures page appears.
2. Complete the configuration according to the guidelines provided in [Table 222 on page 600](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

**Table 222: Fields on the Add Application Signatures Page**

Field	Action
Name	Enter the application signature name.
Description	Enter the application signature description.
Order	Enter the order of the custom application.  Lower order has higher priority.  The range is 1 through 50,000.
Priority	Enter the priority over other signature applications.  Select an option from the list: <ul style="list-style-type: none"><li>• High</li><li>• Low</li></ul>
Risk	Enter the risk as critical, high, moderate, low, or unsafe.
Application Identification match criteria	Select one or more options from the list: <ul style="list-style-type: none"><li>• ICMP Mapping</li><li>• IP Protocol Mapping</li><li>• Address Mapping</li><li>• L7 Signature</li></ul>

Table 222: Fields on the Add Application Signatures Page (*continued*)

Field	Action
ICMP Mapping	<p>Select a value from the list.</p> <ul style="list-style-type: none"> <li>• ICMP Type—Select the numeric value of an ICMP type. The type identifies the ICMP message, such as Unassigned or Destination Unreachable. The range is from 0 through 254.</li> <li>• Select the numeric value of an ICMP code. The code field provides further information (such as RFCs) about the associated type field. The range is from 0 through 254.</li> </ul>
IP Protocol Mapping	<p>Select the numeric value of an ICMP type. The type identifies the ICMP message, such as Unassigned or Destination Unreachable.</p> <p>The range is from 0 through 254.</p>
Address Mapping	<p>To add a new address mapping:</p> <ol style="list-style-type: none"> <li>1. Click <b>Add</b>. The Add Address Mapping page appears. Enter the following details: <ul style="list-style-type: none"> <li>• Name—Enter the name of the address mapping.</li> <li>• IP Address—Enter an IPv4 or IPv6 address.</li> <li>• CIDR Range—Enter an IPv4 or IPV6 address prefix for classless IP addressing.</li> <li>• TCP Port range—Enter the TCP port range for the application.</li> <li>• UDP Port Range—Enter the UDP port range for the application.</li> </ul> </li> <li>2. Click the pencil icon at the top right side of the Address Mapping table. Then, edit the address mapping and click <b>OK</b>.</li> <li>3. To delete an existing Address Mapping, select it and click the delete icon or right-click on it and click <b>Delete</b>.</li> </ol>

Table 222: Fields on the Add Application Signatures Page (continued)

Field	Action
L7 Signature	<p>To add a L7 Signature:</p> <ol style="list-style-type: none"><li>Click <b>Add L7 Signature</b>. The Add L7 Signature page appears with the following options.<ul style="list-style-type: none"><li>Over HTTP</li><li>Over SSL</li><li>Over TCP</li><li>Over UDP</li></ul></li><li>Click the pencil icon at the top right side of the L7 Signature table. Then, edit the address mapping and click <b>OK</b>.</li><li>To delete an existing L7 Signature, select it and click the delete icon or right-click on it and click <b>Delete</b>.</li></ol>

RELATED DOCUMENTATION

<a href="#">About the Application Signatures Page   595</a>
<a href="#">Global Settings   598</a>
<a href="#">Add Application Signatures Group   602</a>
<a href="#">Edit Application Signatures   603</a>
<a href="#">Delete Application Signatures   604</a>
<a href="#">Clone Application Signatures   605</a>
<a href="#">Search Text in an Application Signatures Table   605</a>

## Add Application Signatures Group

You are here: **Configure** > **Security Services** > **App Secure** > **Application Signatures**.

To add an application signature group:

- Click the create icon on the upper right side of the Application Signatures page and select Application Signature Group. You can also click **More** and select **Create Group**.  
The Create Application Signature Group page appears.
- Complete the configuration according to the guidelines provided in [Table 223 on page 603](#).

3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 223: Fields on the Add Application Signature Group Page

Field	Action
Name	Enter the application signature group name.
Group Members	<div>Enter the add or remove applications associated with the application signature group.</div> <div>Click one of the following options:</div> <ul style="list-style-type: none"><li>• <b>Add</b> - Click + to create an application signature group.</li><li>• <b>Delete</b> - Select an existing application signature group that you want to delete and click the delete icon available at the upper right of the application signature group table.</li><li>• <b>Detailed View</b> - Hover over the application signature group name and click the Detailed View icon to view the signature group.</li></ul> <div>You can also click <b>More</b> and select <b>Detailed View</b> for the selected signature group.</div>

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Edit Application Signatures   603
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## Edit Application Signatures

You are here: **Configure > Security Services > App Secure > App Signatures.**

To edit an application signature:

1. Select an existing application signature that you want to edit on the Application Signatures page.
2. Click the pencil icon available on the upper right side of the page.

The Edit Application Signatures page appears with editable fields. For more information on the options, see [“Add Application Signatures” on page 600.](#)

3. Click **OK** to save the changes.

RELATED DOCUMENTATION

<a href="#">About the Application Signatures Page   595</a>
<a href="#">Global Settings   598</a>
<a href="#">Add Application Signatures   600</a>
<a href="#">Add Application Signatures Group   602</a>
<a href="#">Add Application Signatures Group   602</a>
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## Delete Application Signatures

You are here: **Configure** > **Security Services** > **App Secure** > **App Signatures**.

To delete application signatures:

1. Select an application signature that you want to delete on the Application Signatures page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the profile.

RELATED DOCUMENTATION


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# Clone Application Signatures

You are here: **Configure** > **Security Services** > **App Secure** > **App Signatures**.

To clone an application signature:

1. Select the application signature profile that you want to clone and select **Clone** from the More link.

**NOTE:** Alternatively, you can right-click on the selected application signature profile and select **Clone**.

The Clone Application Signature page appears with editable fields. For more information on the fields, see [“Add Application Signatures” on page 600](#).

2. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

## RELATED DOCUMENTATION

<a href="#">About the Application Signatures Page   595</a>
<a href="#">Global Settings   598</a>
<a href="#">Add Application Signatures   600</a>
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# Search Text in an Application Signatures Table

You can use the search icon in the top right corner of the Application Signatures page to search for text containing letters and special characters on that page.

To search for text:

1. Click the search icon and enter partial text or full text of the keyword in the search bar.

The search results are displayed.



- 2. Click **X** next to a search keyword or click **Clear All** to clear the search results.

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# Security Services—UTM Default Configuration

## IN THIS CHAPTER

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- [Add an Antivirus | 609](#)
- [Add a Web Filtering | 616](#)
- [Add an Antispam | 624](#)
- [Add a Content Filtering | 625](#)
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## About the Default Configuration Page

You are here: **Configure > Security Services > UTM > Default Configuration**.

The Default Configuration page describes the security features of Unified Treat Management (UTM).

This default configuration will be used, if there are multiple UTM policies present in the potential list. The global configuration will be used till the exact match is found in the potential list.

The following security features are parts of UTM default configuration:

- **Antivirus**—Antivirus is an in-the-cloud antivirus solution. The virus pattern and malware database is located on external servers maintained by Sophos (Sophos Extensible List) servers.
- **Web Filtering**—Web filtering lets you to manage Internet usage by preventing access to inappropriate Web content.
- **Antispam**—This feature examines transmitted messages to identify any e-mail spam.
- **Content Filtering**— This feature blocks or permits certain types of traffic based on the MIME type, file extension, protocol command, and embedded object type.

## Tasks You Can Perform

You can perform the following tasks from this page:

- Create an antivirus. See [“Add an Antivirus” on page 609](#).
- Create a Web filtering. See [“Add a Web Filtering” on page 616](#).
- Create an antispam. See [“Add an Antispam” on page 624](#).
- Create a content filtering. See [“Add a Content Filtering” on page 625](#).
- Edit a default configuration. See [“Edit a Default Configuration” on page 627](#).
- Delete a default configuration. See [“Delete Default Configuration” on page 628](#).

Field Descriptions

[Table 224 on page 608](#) describes the fields on the Default Configuration page.

Table 224: Fields on the Default Configuration Page

Field	Function
Anti-Virus	Displays the configured antivirus. You can also configure an antivirus.
Web Filtering	Displays the configured Web filtering. You can also configure a web filtering.
Anti-Spam	Displays the configured antispam. You can also configure an antispam.
Content-Filtering	Displays the configured content filtering. You can also configure a content filtering.

RELATED DOCUMENTATION

<a href="#">Add an Antivirus   609</a>
<a href="#">Add a Web Filtering   616</a>
<a href="#">Add an Antispam   624</a>
<a href="#">Add a Content Filtering   625</a>
<a href="#">Edit a Default Configuration   627</a>
<a href="#">Delete Default Configuration   628</a>

## Add an Antivirus

You are here: **Configure** > **Security Services** > **UTM** > **Default Configuration**.

To add an antivirus:

1. Select the Antivirus tab to view or create the antivirus configuration.

The Create Antivirus page appears.

2. Complete the configuration according to the guidelines provided in [Table 225 on page 609](#).

3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

**Table 225: Fields on the Create Antivirus Page**

Field	Action
Type	Select the required engine type: <ul style="list-style-type: none"> <li>• Anti Virus None</li> <li>• Sophos Engine</li> </ul>
URL Whitelist	Select the customized object from the list.
<b>MIME Whitelist</b>	
List	Specifies the comprehensive list of MIME types that can bypass antivirus scanning.  Select the customized object from the list.
Exception	Specifies a list of MIME types to be excluded from the allowlist. The exception MIME allowlist is a subset of MIME types found in the MIME allowlist.  Select the customized object from the list.
<b>Scan Options</b>	
URI Check	Enable the URI check.
Content Size Limit	Specifies the accumulated TCP payload size.  Enter the content size limit, a value from 20 through 40,000 KB.

Table 225: Fields on the Create Antivirus Page (continued)

Field	Action
Decompress layer Limit	<p>Specifies the number of layers of nested compressed files the internal antivirus scanner can decompress before the execution of the virus scan.</p> <p>Enter the decompress layer limit, a value from 0 through 3 layers.</p>
Timeout	<p>Specifies the timeframe between the scan requests generated to the scan result returned by the scan engine. Trickling timeout value is used by all supported protocols. Each protocol can have a different timeout value.</p> <p>Enter the time interval from 1 through 1800 seconds. The default value is 180 seconds.</p>
Pre Detection	Enable the Pre detection.

**Avira Engine**

NOTE: This option is available for SRX4600 and SRX5000 line of devices.

**On Box AV Load Flavour**

Type	<p>Select an option from the list for onbox AV load flavor Type.</p> <p>NOTE: Changing the onbox AV load flavor type value will prompt for device reboot.</p>
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**Pattern Update**

URL	Enter the URL for the pattern database.
Routing Instance	Select a routing instance from the list. Routing instance can be defined under, Configure > Network > Routing Instance.
Interval (sec)	Enter the time interval for automatically updating the pattern database. The range is from 10 through 10080 seconds. The default interval is 60 seconds.

Table 225: Fields on the Create Antivirus Page (continued)

Field	Action
Auto Update	Specifies that the antivirus pattern database is configured to be automatically updated.  Select the auto update option.
No Auto Update	Specifies that the automatic download and update of the antivirus engine and signature database are disabled.  Select the no auto update option.
Proxy Profile	Select the proxy profile for antivirus.  To create a proxy profile inline:  1. Click <b>Create Profile</b> .  2. Enter the following details: <ul style="list-style-type: none"> <li>• Profile Name - Enter a valid profile name.</li> <li>• Connection Type - Select any one option from the following: <ul style="list-style-type: none"> <li>• Server IP—Enter the server IP address</li> <li>• Host Name—Enter the host name.</li> </ul> </li> <li>• Port Number-Enter the port number in the range 0 through 65535. Default port number is 80.</li> </ul> 3. Click <b>OK</b> to save the changes. If you want to discard your changes, click <b>Cancel</b> .
Start Time	Enter the start time in the YYYY-MM-DD.HH:MM:SS format.
<b>Email Notify</b>	
Admin Email	Enter a valid admin email id to notify about the pattern file update.
Custom Message subject	Enter the subject of the custom message or notification.
Custom Message	Enter the custom message for notification.
<b>Sophos Engine options</b>	

Table 225: Fields on the Create Antivirus Page (continued)

Field	Action
<b>General Settings</b>	
Timeout	Specify the Sophos antivirus engine timeout.  Select a time, ranges from 1 through 5 seconds.
Retry	Specify the number of times retry the Sophos antivirus engine query.  Select the number of retries from 1 through 5 numeric values.
<b>Server</b>	
Server IP	Enter a valid DNS server IP address.
Routing Instance	Select a valid routing instance name.
<b>Pattern Update</b>	
URL	Enter the URL for the pattern database.
Routing Instance	Select a routing instance from the list. Routing instance can be defined under, 'Configure > Network > Routing Instance'.
Interval (sec)	Enter the time interval for automatically updating the pattern database. The range is from 10 through 10080 seconds. The default interval is 60 seconds.
No Auto Update	Specifies that the automatic download and update of the antivirus engine and signature database are disabled.  Select the no auto update option.
Proxy Profile	Select the proxy profile for antivirus
Start Time	Enter the start time in the YYYY-MM-DD.HH:MM:SS format.
<b>Email Notify</b>	

Table 225: Fields on the Create Antivirus Page (*continued*)

Field	Action
Admin Email	Enter a valid admin email id to notify about the pattern file update.
Custom Message subject	Enter the subject of the custom message or notification.
Custom Message	Enter the custom message for notification.
<b>Fallback Settings</b>	
Default	<p>Specifies all errors other than the categorized settings. This could include either unhandled system exceptions (internal errors) or other unknown errors. The available actions are block or log-and-permit.</p> <p>Select an option from the list. The default action is Block.</p>
Content Size	<p>Fallback action for over content size.</p> <p>Select an option from the list.</p>
Engine-not-ready	<p>Specifies that the scan engine is not ready during certain processes, for example, while the signature database is loading. The available actions are block or log-and-permit.</p> <p>Select an option from the list.</p>
Timeout	<p>Specifies that if the time taken to scan exceeds the timeout setting in the antivirus profile, the processing is terminated and the content is passed or blocked without completing the virus checking.</p> <p>Select an option from the list. The default action is Block.</p>
Out-of-resources	<p>Specifies the resource constraints error received during virus scanning. This error can be or by the can be sent by the scan engine (as a scan-code) or scan manager. When the system is out of resources occurs, scanning is terminated. The available actions are block or log-and-permit.</p> <p>Select an option from the list. The default action is Block.</p>



Table 225: Fields on the Create Antivirus Page (continued)

Field	Action
Too-many-requests	<p>Specifies that if the total number of messages received concurrently exceeds the device limits, the content is passed or blocked depending on the too-many-request fallback option. The available actions are block or log-and-permit.</p> <p>Select an option from the list. The default action is Block.</p>
<b>Trickling</b>	
Trickling Timeout	<p>Displays the trickling timeout interval.</p> <p>Enter the time interval from 0 through 600 seconds.</p>
<b>Virus Detection</b>	
Type	<p>Specifies the type of notification to be sent when a virus is detected.</p> <p>Select Protocol Only or Message option.</p>
Notify Mail Sender	<p>Specifies whether or not a notification is sent to the virus-detection notification e-mail address when a virus is detected.</p> <p>Enable this option to send a notification or disable to not send a notification.</p>
Custom Message Subject	<p>Specifies the subject line text for your custom message for the virus detection notification.</p> <p>Enter the subject line text for your custom message.</p>
Custom Message	<p>Specifies the customized message text for the virus detection notification.</p> <p>Enter the text for this custom notification message.</p>
<b>Fallback Block</b>	
Type	<p>Specifies the type of notification sent when a fallback option of block is triggered.</p> <p>Select the Protocol Only or the Message check box.</p>

Table 225: Fields on the Create Antivirus Page (continued)

Field	Action
Notify Mail Sender	<p>Specifies that when a virus is detected and a fallback option of block is triggered, an e-mail is sent to the administrator.</p> <p>Enable this option to send a notification or disable to not send a notification.</p>
Custom Message	<p>Specifies the customized message text for the fallback block notification.</p> <p>Enter the text for this custom notification message.</p>
Custom Message Subject	<p>Specifies the subject line text for your custom message for the fallback block notification.</p> <p>Enter the subject line text for your custom message.</p>
<b>Fallback Non Block</b>	
Notify Mail Recipient	<p>Enable this option to send a notification or disable to not send a notification.</p>
Custom Message Subject	<p>Specifies the customized message text for the fallback nonblock notification.</p> <p>Enter the text for this custom notification message.</p>
Custom Message	<p>Specifies the subject line for your custom message for the fallback nonblock notification.</p> <p>Enter the subject line text for your custom message.</p>

## RELATED DOCUMENTATION

[About the Default Configuration Page | 607](#)
[Add a Web Filtering | 616](#)
[Add an Antispam | 624](#)
[Add a Content Filtering | 625](#)
[Edit a Default Configuration | 627](#)
[Delete Default Configuration | 628](#)

## Add a Web Filtering

You are here: **Configure > Security Services > UTM > Default Configuration.**

To add a web filtering:

1. Select the Web Filtering tab to view or create the web filtering configuration.  
The Create Web Filtering page appears.
2. Complete the configuration according to the guidelines provided in [Table 226 on page 616](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

**Table 226: Fields on the Create Web Filtering Page**

Field	Action
HTTP persist	Configure the web-filtering engine type.  Click the check box to enable this option.
HTTP Reassemble	Specifies a unique customized list of all URLs or IP addresses for a given category that are to be bypassed for scanning.  Click the check box to enable this option to reassemble HTTP request segments.
Type	Specifies a unique customized list of all URLs or IP addresses for a given category that are scanned for blocklisting.  Select from the list: <ul style="list-style-type: none"><li>• Juniper Enhanced</li><li>• Juniper Local</li><li>• Websense Redirect</li></ul>
URL Blacklist	Specifies a unique customized list of all URLs or IP addresses for a given category that are to be bypassed for scanning.  Select an option from the list.
URL Whitelist	Specifies a unique customized list of all URLs or IP addresses for a given category that are scanned for blocklisting.  Select an option from the list.

Table 226: Fields on the Create Web Filtering Page (*continued*)

Field	Action
<b>Juniper Enhanced Options</b>	
Specifies that the Juniper Enhanced Web filtering intercepts the HTTP and the HTTPS requests and sends the HTTP URL or the HTTPS source IP to the Websense ThreatSeeker Cloud (TSC).	
<b>Global</b>	
Base Filter	Select the base filter from the list.
Custom Block Message	Enter the juniper enhanced custom block message sent to HTTP Client.
Default Action	<p>Juniper enhanced profile default.</p> <p>Select an option from the list. The default action is Log and Permit.</p>
No Safe Search	<p>Specifies not to perform safe-search for Juniper enhanced protocol.</p> <p>Select the check box to enable this option to choose this type of search.</p> <p><b>NOTE:</b> Do not perform safe-search for Juniper enhanced protocol</p>
Quarantine Custom Message	Enter the quarantine custom message.
Timeout	Select a timeout interval from 1 to 1800 seconds.
<b>Cache</b>	
Size	<p>Specify Juniper enhanced cache size</p> <p>Select a cache size from 0 to 4096 Killobytes.</p>
Time out	<p>Specify Juniper enhanced cache time out.</p> <p>Select a timeout interval from 1 to 1800 seconds.</p>
<b>Block Messages</b>	
Type	Select the type of block message from the list.
URL	Enter URL of the block messages.
<b>Fallback Settings</b>	

Table 226: Fields on the Create Web Filtering Page (*continued*)

Field	Action
Default	<p>Specifies all errors other than the categorized settings. These could include either unhandled system exceptions (internal errors) or other unknown errors. The available actions are block or log-and-permit.</p> <p>Select an option from the list. The default action is Log and Permit.</p>
Server-connectivity	<p>Specifies that the server connection is not established during certain processes, for example, while the signature database is loading. The available actions are block or log-and-permit.</p> <p>Select an option from the list. The default action is Log and Permit.</p>
Timeout	<p>Specifies that if the time taken to scan exceeds the timeout setting in the Web filtering profile, the processing is terminated and the content is passed or blocked without completing filtering.</p> <p>Select an option from the list. The default action is Log and Permit.</p>
Too-many-requests	<p>Specifies that if the total number of messages received concurrently exceeds the device limits, the content is passed or blocked depending on the too-many-request fallback option. The available actions are block or log-and-permit.</p> <p>Select an option from the list. The default action is Log and Permit.</p>
Category	<p>Specifies a unique customized list of categories.</p> <ul style="list-style-type: none"> <li>• Add (+)—Adds the selected category and the corresponding action to the list of available categories for the Juniper Enhanced Web Filtering profile.</li> <li>• Delete(X)—Deletes the selected category from the list of available categories for the Juniper Enhanced Web Filtering profile.</li> </ul> <p>Select a category from the list.</p>
Action	<p>Specifies the action that the device must take for the category selected.</p> <p>Select Permit, Log and Permit, or Block.</p>
<b>Quarantine Message</b>	
Type	Select a type of quarantine message desired.
URL	<p>URL of quarantine message.</p> <p>Enter a valid URL.</p>

Table 226: Fields on the Create Web Filtering Page (*continued*)

Field	Action
<b>Server</b>	
Host	Enter the address of the host server.
Port	Enter the port number of the server.
Routing Instance	Select a routing instance.
Proxy Profile	Create a Proxy profile.

To create a proxy profile:

1. Click **Create Profile**.
2. Enter the following details:
  - Profile Name - Enter a valid profile name.
  - Connection Type - Select any one option from the following:
    - Server IP—Enter the server IP address
    - Host Name—Enter the host name.
  - Port Number-Enter the port number in the range 0 through 65535. Default port number is 80.
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Site Reputation Action	<p>Specify the action to be taken depending on the site reputation returned for all types of URLs whether it is categorized or uncategorized.</p> <p>Displays the following options:</p> <ul style="list-style-type: none"> <li>• Very Safe– Permit, log-and-permit, block, or quarantine a request if a site-reputation of 90 through 100 is returned.</li> <li>• Moderately Safe– Permit, log-and-permit, block, or quarantine a request if a site-reputation of 80 through 89 is returned.</li> <li>• Fairly Safe– Permit, log-and-permit, block, or quarantine a request if a site-reputation of 70 through 79 is returned.</li> <li>• Suspicious– Permit, log-and-permit, block, or quarantine a request if a site-reputation of 60 through 69 is returned.</li> <li>• Harmful– Permit, log-and-permit, block, or quarantine a request if a site-reputation of zero through 59 is returned.</li> </ul> <p>Click Reset to position the slider to the recommended levels.</p>
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Table 226: Fields on the Create Web Filtering Page (*continued*)

Field	Action
<b>Juniper Local</b>	
Select this option to use the Local profile type.	
<b>Global</b>	
Custom Block Message	Specify the juniper local custom block message sent to HTTP Client.  Enter a message to be displayed when content is blocked.
Default Action	Juniper local profile default.  Select Log and Permit. The default action is Log and Permit.
Quarantine Custom Message	Enter the Juniper local quarantine custom message.
Timeout	Juniper local timeout.  Select a timeout interval from 1 to 1800 seconds.
<b>Block Messages</b>	
Type	Select the type of block message.
URL	Enter URL of the block messages.
<b>Fallback Settings</b>	
Default	Specifies all errors other than the categorized settings. These could include either unhandled system exceptions (internal errors) or other unknown errors. The available actions are block or log-and-permit.  Select Log and Permit. The default action is Log and Permit.
Server-connectivity	Specifies that the server connection is not established during certain processes, for example, while the signature database is loading. The available actions are block or log-and-permit.  Select Log and Permit. The default action is Log and Permit.
Timeout	Specifies that if the time taken to scan exceeds the timeout setting in the Web filtering profile, the processing is terminated and the content is passed or blocked without completing filtering.  Select Log and Permit. The default action is Log and Permit.

Table 226: Fields on the Create Web Filtering Page (*continued*)

Field	Action
Too-many-requests	<p>Specifies that if the total number of messages received concurrently exceeds the device limits, the content is passed or blocked depending on the too-many-request fallback option. The available actions are block or log-and-permit.</p> <p>Select Log and Permit. The default action is Log and Permit.</p>
Category	<p>Specifies a unique customized list of categories.</p> <ul style="list-style-type: none"> <li>• Add (+)—Adds the selected category and the corresponding action to the list of available categories for the Juniper Local Web Filtering profile.</li> <li>• Edit (+)—Edits the selected category and the corresponding action to the list of available categories for the Juniper Local Web Filtering profile.</li> <li>• Delete(X)—Deletes the selected category from the list of available categories for the Juniper Local Web Filtering profile.</li> </ul> <p>Select a category from the list.</p>
Name	Specifies the name of the device that you take for the category selected.
Action	Specifies the action that the device must take for the category selected.
Custom Message	Specifies the custom message.
<b>Quarantine Message</b>	
Type	<p>Specify type of quarantine message desired.</p> <p>Select a type.</p>
URL	<p>URL of quarantine message.</p> <p>Enter a valid URL.</p>
<b>Websense Redirect</b>	
<b>Global</b>	
Account	Displays the user account for which this profile is intended.
Custom Block Message	<p>Specify the websense redirect custom block message sent to HTTP Client.</p> <p>Enter a message to be displayed when content is blocked.</p>



Table 226: Fields on the Create Web Filtering Page (*continued*)

Field	Action
Quarantine Custom Message	<p>Juniper local quarantine custom message.</p> <p>Enter the quarantine custom message.</p>
Sockets	Displays the number of sockets used for communicating between the client and server.
Timeout	<p>Juniper local timeout.</p> <p>Select a timeout interval from 1 to 1800 seconds.</p>
<b>Block Messages</b>	
Type	Select the type of block message.
URL	Select the URL of the block message.
<b>Fallback Settings</b>	
Default	<p>Specifies all errors other than the categorized settings. These could include either unhandled system exceptions (internal errors) or other unknown errors. The available actions are block or log-and-permit.</p> <p>Select Log and Permit. The default action is Log and Permit.</p>
Server-connectivity	<p>Specifies that the server connection is not established during certain processes, for example, while the signature database is loading. The available actions are block or log-and-permit.</p> <p>Select Log and Permit. The default action is Log and Permit.</p>
Timeout	<p>Specifies that if the time taken to scan exceeds the timeout setting in the Web filtering profile, the processing is terminated and the content is passed or blocked without completing filtering.</p> <p>Select Log and Permit. The default action is Log and Permit.</p>
Too-many-requests	<p>Specifies that if the total number of messages received concurrently exceeds the device limits, the content is passed or blocked depending on the too-many-request fallback option. The available actions are block or log-and-permit.</p> <p>Select Log and Permit. The default action is Log and Permit.</p>

Table 226: Fields on the Create Web Filtering Page (*continued*)

Field	Action
Category	<p>Specifies a unique customized list of categories.</p> <ul style="list-style-type: none"> <li>• Add (+)—Adds the selected category and the corresponding action to the list of available categories for the Juniper Local Web Filtering profile.</li> <li>• Edit (+)—Edits the selected category and the corresponding action to the list of available categories for the Juniper Local Web Filtering profile.</li> <li>• Delete(X)—Deletes the selected category from the list of available categories for the Juniper Local Web Filtering profile.</li> </ul> <p>Select a category from the list.</p>
Name	<p>Specifies the name of the device that you take for the category selected.</p> <p>Select a category from the list.</p>
Action	<p>Specifies the action that the device must take for the category selected.</p> <p>Select Permit, Log and Permit, or Block.</p>
Custom Message	<p>Specifies the custom message.</p> <p>Enter the custom message.</p>
<b>Quarantine Message</b>	
Type	Enter the type of quarantine message desired.
URL	Enter a valid URL.
<b>Server</b>	
Host	Enter the address of the host server.
Port	Enter the port number of the server.
Routing Instance	Select a routing instance.

## RELATED DOCUMENTATION

[About the Default Configuration Page | 607](#)
[Add an Antivirus | 609](#)

Add an Antispam | 624

Add a Content Filtering | 625

Edit a Default Configuration | 627

Delete Default Configuration | 628

## Add an Antispam

You are here: **Configure** > **Security Services** > **UTM** > **Default Configuration**.

To add an antispam:

1. Select the Antispam tab to view or create the antispam configuration.  
The Create Antispam page appears.
2. Complete the configuration according to the guidelines provided in [Table 227 on page 624](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 227: Fields on the Create Antispam Page

Field	Action
Address Whitelist	Specifies the comprehensive list of MIME types that can bypass antivirus scanning.  Select the customized object from the list.
Address Blacklist	Specifies a list of MIME types to be excluded from the allowlist. The exception MIME allowlist is a subset of MIME types found in the MIME allowlist.  Select the customized object from the list.
Type	Specify the antispam type.
<b>SBL</b>	
Custom Tag String	Specifies the custom string that is used to identify a spam message.  Enter a custom string for identifying a message as spam. By default the devices uses ***SPAM***.
SBL Default Server	Specifies the profile that uses SBL server. The SBL server is predefined on the device.  Select the check box if you are using the default server.

Table 227: Fields on the Create Antispam Page (*continued*)

Field	Action
Spam Action	<p>Displays the Spam action.</p> <p>Select any one from the action.</p> <ul style="list-style-type: none"> <li>• Block Email</li> <li>• Tag header email</li> <li>• Tag subject email.</li> </ul>

## RELATED DOCUMENTATION

[About the Default Configuration Page | 607](#)
[Add an Antivirus | 609](#)
[Add a Web Filtering | 616](#)
[Add a Content Filtering | 625](#)
[Edit a Default Configuration | 627](#)
[Delete Default Configuration | 628](#)

## Add a Content Filtering

You are here: **Configure** > **Security Services** > **UTM** > **Default Configuration**.

To add a content filtering:

1. Select the Content Filtering tab to view or create the content filtering configuration.  
The Create Content Filtering page appears.
2. Complete the configuration according to the guidelines provided in [Table 228 on page 625](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 228: Fields on the Create Content Filtering Page

Field	Action
Permit Command List	Select the protocol command name to be permitted from the list.

Table 228: Fields on the Create Content Filtering Page (*continued*)

Field	Action
Block Command List	Select the protocol command name to be blocked from the list.
Block Extension List	Select the extension to be blocked from the list.
Block MIME List	Select the MIME type from the list.
Block MIME Exception List	Select the MIME type to be excluded from the list.
Type	Select the content filtering type.
Block Content Type	<p>Specifies the blocked content type.</p> <ul style="list-style-type: none"> <li>• activex</li> <li>• exe</li> <li>• http-cookie</li> <li>• java-applet</li> <li>• zip</li> </ul> <p>Select the content type to be blocked.</p>
<b>Notification Options</b>	
Type	<p>Specifies the type of notification sent when a content block is triggered.</p> <p>Select the Protocol Only or the Message check box.</p>
Notify Mail Sender	<p>Specifies that when a virus is detected and a content block is triggered, an e-mail is sent to the administrator.</p> <p>Select the Notify Mail Sender check box.</p>
Custom Notification Message	<p>Specifies the customized message text for the content-block notification.</p> <p>Enter the text for this custom notification message (if you are using one).</p>

## RELATED DOCUMENTATION

[About the Default Configuration Page | 607](#)
[Add an Antivirus | 609](#)
[Add a Web Filtering | 616](#)

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[Add an Antispam | 624](#)

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[Edit a Default Configuration | 627](#)

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[Delete Default Configuration | 628](#)

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## Edit a Default Configuration

You are here: **Configure** > **Security Services** > **UTM** > **Default Configuration**.

You can edit all of the following UTM default configurations:

- Antivirus
- Web filtering
- Antispam
- Content filtering

To edit a default configuration:

1. Select any of the existing UTM default configurations that you want to edit on the Default Configuration page.
2. Click the pencil icon available on the upper right side of the page.

The edit page for the selected default configuration appears with editable fields. You can modify any previous changes done to Antivirus, Web Filtering, Antispam, and Content Filtering. For more information on the options, see [“Add an Antivirus” on page 609](#), [“Add a Web Filtering” on page 616](#), [“Add an Antispam” on page 624](#), and [“Add a Content Filtering” on page 625](#).

3. Click **OK** to save the changes.

### RELATED DOCUMENTATION

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[About the Default Configuration Page | 607](#)

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[Add an Antivirus | 609](#)

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[Add a Web Filtering | 616](#)

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[Add an Antispam | 624](#)

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[Add a Content Filtering | 625](#)

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[Delete Default Configuration | 628](#)

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# Delete Default Configuration

You are here: **Configure** > **Security Services** > **UTM** > **Default Configuration**.

You can delete all of the following UTM default configurations:

- Antivirus
- Web filtering
- Antispam
- Content filtering

To delete a default configuration:

1. Select any of the existing UTM default configurations that you want to delete on the Default Configuration page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the profile.

## RELATED DOCUMENTATION

[About the Default Configuration Page | 607](#)

[Add an Antivirus | 609](#)

[Add a Web Filtering | 616](#)

[Add an Antispam | 624](#)

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# Security Services—UTM Antivirus

## IN THIS CHAPTER

- [About the Antivirus Page | 629](#)
- [Add an Antivirus Profile | 631](#)
- [Edit an Antivirus Profile | 639](#)
- [Delete Antivirus Profile | 640](#)
- [Search for Text in Antivirus Profile | 641](#)

## About the Antivirus Page

You are here: **Configure** > **Security Services** > **UTM** > **Antivirus Profiles**.

Use this page to configure antivirus.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add an antivirus profile. See [“Add an Antivirus Profile” on page 631](#) for more details.
- Edit an antivirus profile. See [“Edit an Antivirus Profile” on page 639](#) for more details.
- Delete antivirus profile. See [“Delete Antivirus Profile” on page 640](#) for more details.
- Search text in antivirus profile. See [“Search for Text in Antivirus Profile” on page 641](#).
- View the details of an antivirus profile—To do this, select the antivirus profile for which you want to view the details and follow the available options:
  - Click **More** and select **Detailed View**.
  - Right-click on the selected antivirus profile and select **Detailed View**.
  - Mouse over to the left of the selected antivirus profile and click **Detailed View**.
- Advanced search for antivirus profiles. To do this, use the search text box present above the table grid. The search includes the logical operators as part of the filter string. In the search text box, when you



hover over the icon, it displays an example filter condition. When you start entering the search string, the icon indicates whether the filter string is valid or not.

For an advanced search:

1. Enter the search string in the text box.

Based on your input, a list of items from the filter context menu appears.

2. Select a value from the list and then select a valid operator based on which you want to perform the advanced search operation.

**NOTE:** Press Spacebar to add an AND operator or OR operator to the search string. Press backspace at any point of time while entering a search criteria, only one character is deleted.

3. Press Enter to display the search results in the grid.

- Filter the antivirus profiles based on select criteria. To do this, select the filter icon at the top right-hand corner of the antivirus profiles table. The columns in the grid change to accept filter options. Type the filter options; the table displays only the data that fits the filtering criteria.
- Show or hide columns in the antivirus profiles table. To do this, click the Show Hide Columns icon in the top right corner of the antivirus profiles table and select the options you want to view or deselect the options you want to hide on the page.

Field Descriptions

Table 229 on page 630 describes the fields on the Antivirus Profiles page.

Table 229: Fields on the Antivirus Profiles Page

Field	Function
Name	Displays the unique name of the antispam profile.
URL Whitelist	Specifies a unique customized list of all URLs or IP addresses for a given category that are to be bypassed for scanning.
Content Size	Specifies that if the content size exceeds a set limit, the content is passed or blocked depending on the max-content-size fallback option. The available actions are block, log and permit, or permit.
Timeout	Displays the timeout interval.

RELATED DOCUMENTATION

<a href="#">Add an Antivirus Profile   631</a>
<a href="#">Edit an Antivirus Profile   639</a>
<a href="#">Delete Antivirus Profile   640</a>
<a href="#">Search for Text in Antivirus Profile   641</a>

## Add an Antivirus Profile

You are here: **Configure** > **Security Services** > **UTM** > **Anti-Virus**.

To add an antivirus profile:

1. Click the add icon (+) available on the upper right side of the Antivirus Profiles page.  
The Create Antivirus Profiles page appears.
2. Complete the configuration according to the guidelines provided in [Table 230 on page 631](#) and [Table 231 on page 634](#).

Click one:

- **Global Options**—Defines general specifications for antivirus configuration. Enter information as specified in [Table 230 on page 631](#).

**NOTE:** Global Options are NOT enabled for logical systems users. It is enabled only for root users.

- **+**—Adds a new antivirus profile configuration. Enter information as specified in [Table 231 on page 634](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 230: Global Options Antivirus Configuration Details

Field	Action
<b>Main</b>	
MIME Whitelist	Specifies the comprehensive list of MIME types that can bypass antivirus scanning.  Select the customized object from the list.

Table 230: Global Options Antivirus Configuration Details (*continued*)

Field	Action
Exception MIME Whitelist	<p>Specifies a list of MIME types to be excluded from the allowlist. The exception MIME allowlist is a subset of MIME types found in the MIME allowlist.</p> <p>Select the customized object from the list.</p>
URL Whitelist	<p>Specifies a unique customized list of all URLs or IP addresses for a given category that are to be bypassed for scanning.</p> <p>Select the customized object from the list.</p>
<b>Engine Type</b>	
Kaspersky Lab	<p>Specifies the internal scan engine for full antivirus protection provided by Kaspersky Labs.</p> <p><b>NOTE:</b> This option is not supported on SRX1500 devices.</p> <p>Select this option to choose the Kaspersky Lab engine type.</p>
Juniper Express	<p>Specifies the internal scan engine for full antivirus protection provided by Juniper Networks.</p> <p><b>NOTE:</b> This option is not supported on SRX1500 devices.</p> <p>Select this option to choose the Juniper Express engine type.</p>
Sophos	<p>Specifies the internal scan engine for full antivirus protection provided by Sophos.</p> <p><b>NOTE:</b> SRX1500 devices support only this option.</p> <p>Select this option to choose the Sophos engine type.</p>
<b>Kaspersky Lab Engine Options</b>	
Admin Email	<p>Specifies the e-mail address for the notification to be sent to the administrator when the pattern update is complete.</p> <p>Enter the administrator e-mail address.</p>
Custom Message	<p>Specifies the text of the pattern-update e-mail notification that is sent when the pattern update is complete.</p> <p>Enter the customized message.</p>

Table 230: Global Options Antivirus Configuration Details (*continued*)

Field	Action
Custom Message Subject	<p>Specifies the customized message subject line for the custom message.</p> <p>Enter the customized message subject line.</p>
<b>Juniper Express Engine Options</b>	
Pattern Update URL	<p>Specifies the URL of the database server.</p> <p>Enter the URL for the pattern database.</p>
Pattern Update Interval (sec)	<p>Specifies the interval at which the database server is queried for a new version of the database.</p> <p>Enter the time interval for automatically updating the pattern database. The range is from 10 through 10080 seconds. The default interval is 60 seconds.</p>
Auto Update	<p>Specifies that the antivirus pattern database is configured to be automatically updated.</p> <p>Select the auto update option.</p>
No Auto Update	<p>Specifies that the automatic download and update of the antivirus engine and signature database are disabled.</p> <p>Select the no auto update option.</p>
<b>Sophos Engine Options</b>	
Pattern Update URL	Enter the URL for the pattern database.
Pattern Update Interval (sec)	<p>Specifies the interval at which the database server is queried for a new version of the database.</p> <p>Enter the time interval for automatically updating the pattern database. The range is from 10 through 10080 seconds. The default interval is 60 seconds.</p>
Auto Update	<p>Specifies that the antivirus pattern database is configured to be automatically updated.</p> <p>Select the auto update option.</p>

Table 230: Global Options Antivirus Configuration Details (*continued*)

Field	Action
No Auto Update	Specifies that the automatic download and update of the antivirus engine and signature database are disabled.  Select the no auto update option.
<b>Proxy Options</b>	
Proxy Server Host	Enter the IP address or hostname of the proxy server.
Proxy Server Port	Enter the port with which the proxy server is associated.
Proxy Server Username	Enter the username to use on the proxy server.
Proxy Server Password	Enter the password to use on the proxy server.
Confirm Proxy Server Password	Verifies the login password for the proxy server.  Re-enter the password.

Table 231: Fields on the Create Antivirus Profile Page

Field	Function
<b>Main</b>	
Profile Name	Enter a unique name for the antivirus profile.
Profile Type	Displays the internal scan engine for full antivirus option selected in the global options. Intelligent prescreening is only intended for use with non-encoded traffic.
Trickle Timeout	Enter the trickle timeout value.
<b>Scan Options for Kaspersky Lab Engine</b>	
Intelligent Prescreening	Specifies the antivirus module used to begin scanning a file and improves antivirus scanning performance. The antivirus module generally begins to scan data after the gateway device has received all the packets of a file.  Select <b>yes</b> to enable intelligent prescreening.

Table 231: Fields on the Create Antivirus Profile Page (*continued*)

Field	Function
Content Size Limit	<p>Specifies the accumulated TCP payload size.</p> <p>Enter the content size limit, a value from 20 through 20000 KB.</p>
Scan Engine Timeout	<p>Specifies the timeframe between the scan request generated to the scan result returned by the scan engine. Tricking timeout value is used by all supported protocols. Each protocol can have a different timeout value.</p> <p>Enter the time interval from 1 through 1800 seconds. The default value is 180 seconds.</p>
Decompress Layer Limit	<p>Specifies the number of layers of nested compressed files the internal antivirus scanner can decompress before the execution of the virus scan.</p> <p>Enter the decompress layer limit, a value from 1 through 4 layers.</p>
<b>Scan Mode</b>	
Scan All Files	Select this option to scan all files.
Scan Files With Specified Extension	Select this option to scan files with specific extensions.
Scan Engine Filename Extension	Select this option to scan the engine filename extension.
<b>Scan Options for Juniper Express Engine</b>	
Intelligent Prescreening	<p>Specifies the antivirus module used to begin scanning a file and improves antivirus scanning performance. The antivirus module generally begins to scan data after the gateway device has received all the packets of a file.</p> <p>Select <b>yes</b> to enable intelligent prescreening.</p>
Content Size Limit	<p>Specifies the accumulated TCP payload size.</p> <p>Enter the content size limit, a value from 20 through 20,000 KB.</p>

Table 231: Fields on the Create Antivirus Profile Page (*continued*)

Field	Function
Scan Engine Timeout	<p>Specifies the timeframe between the scan request generated to the scan result returned by the scan engine. Trickling timeout value is used by all supported protocols. Each protocol can have a different timeout value.</p> <p>Enter the time interval from 1 through 1800 seconds. The default value is 180 seconds.</p>
<b>Scan Options for Sophos Engine</b>	
URI Check	<p>Specifies Uniform Resource Identifier blocking: an effective measure for preventing malware from reaching the endpoint. URI lookup is performed against an in-the-cloud malicious/infected URI database on each URI requested via HTTP.</p> <p>Select the <b>URI check</b> check box to enable URI check.</p>
Content Size Limit	<p>Specifies the accumulated TCP payload size.</p> <p>Enter the content size limit, a value from 20 through 20,000 KB.</p>
Scan Engine Timeout	<p>Specifies the timeframe between the scan request generated to the scan result returned by the scan engine. Trickling timeout value is used by all supported protocols. Each protocol can have a different timeout value.</p> <p>Enter the time interval from 1 through 1800 seconds. The default value is 180 seconds.</p>
Query Interval	<p>Specifies the antivirus engine query timeout interval.</p> <p>Enter the query interval from 1 through 5 seconds.</p>
Query Retries	<p>Specifies the antivirus engine query retry (number of times) value.</p> <p>Enter the query retry value from 0 through 5.</p>
<b>Fallback Settings</b>	
Default Action	<p>Specifies all errors other than the categorized settings. This could include either unhandled system exceptions (internal errors) or other unknown errors. The available actions are block or log-and-permit.</p> <p>Select <b>Log and Permit</b>. The default action is <b>Block</b>.</p>

Table 231: Fields on the Create Antivirus Profile Page (continued)

Field	Function
Corrupt File	<p>Specifies the error returned by the scan engine when it detects a corrupted file. The available actions are block or log-and-permit.</p> <p>Select <b>Log and Permit</b>. The default action is <b>Block</b>.</p>
Password File	<p>Specifies the error returned by the scan engine when the scanned file is protected by a password. The available actions are block or log-and-permit.</p> <p>Select <b>Log and Permit</b>. The default action is <b>Block</b>.</p>
Decompress Layer	<p>Specifies the error returned by the scan engine when the scanned file has too many compression layers. The available actions are block or log-and-permit.</p> <p>Select <b>Log and Permit</b>. The default action is <b>Block</b>.</p>
Content Size	<p>Specifies that if the content size exceeds a set limit, the content is passed or blocked depending on the max-content-size fallback option. The available actions are block or log-and-permit.</p> <p>Select <b>Log and Permit</b>. The default action is <b>Block</b>.</p>
Engine Not Ready	<p>Specifies that the scan engine is not ready during certain processes, for example, while the signature database is loading. The available actions are block or log-and-permit.</p> <p>Select <b>Log and Permit</b>. The default action is <b>Block</b>.</p>
Timeout	<p>Specifies that if the time taken to scan exceeds the timeout setting in the antivirus profile, the processing is terminated and the content is passed or blocked without completing the virus checking. The decision is made based on the timeout fallback option. The available actions are block or log-and-permit.</p> <p>Select <b>Log and Permit</b>. The default action is <b>Block</b>.</p>
Out Of Resource	<p>Specifies the resource constraints error received during virus scanning. This error can be or by the can be sent by the scan engine (as a scan-code) or scan manager. When the system is out of resources occurs, scanning is terminated. The available actions are block or log-and-permit.</p> <p>Select <b>Log and Permit</b>. The default action is <b>Block</b>.</p>



Table 231: Fields on the Create Antivirus Profile Page (*continued*)

Field	Function
Too Many Requests	<p>Specifies that if the total number of messages received concurrently exceeds the device limits, the content is passed or blocked depending on the too-many-request fallback option. The available actions are block or log-and-permit.</p> <p>Select <b>Log and Permit</b>. The default action is <b>Block</b>. The allowed request limit is not configurable.</p>
<b>Notification Options</b>	
<b>Fallback Block</b>	
Notification Type	<p>Specifies the type of notification sent when a fallback option of block is triggered.</p> <p>Select the <b>Protocol Only</b> or the <b>Message</b> check box.</p>
Notify Mail Sender	<p>Specifies that when a virus is detected and a fallback option of block is triggered, an e-mail is sent to the administrator.</p> <p>Select the <b>Notify Mail Sender</b> check box to enable this notification.</p>
Custom Message	<p>Specifies the customized message text for the fallback block notification.</p> <p>Enter the text for this custom notification message (if you are using one).</p>
Custom Message Subject	Enter the subject line text for your custom message for the fallback block notification.
Display Hostname	Select the check box to display the hostname.
Allow Email	Select the check box to allow e-mail.
Administrator Email Address	Enter the administrator e-mail address where notification is sent when a fallback error occurs.
<b>Fallback Nonblock</b>	
Notify Mail Recipient	<p>Specifies that the fallback nonblock notification is sent when a fallback e-mail option without a blocking action is triggered.</p> <p>Select the <b>Notify Mail Sender</b> check box.</p>

Table 231: Fields on the Create Antivirus Profile Page (*continued*)

Field	Function
Custom Message	Enter the customized message text for the fallback nonblock notification.
Custom Message Subject	Enter the subject line for your custom message for the fallback nonblock notification.
<b>Virus Detection</b>	
Notification Type	Specifies the type of notification to be sent when a virus is detected.  Select <b>Protocol Only</b> or <b>Message</b> option.
Notify Mail Sender	Specifies whether or not a notification is sent to the virus-detection notification e-mail address when a virus is detected.  Select the <b>Notify Mail Sender</b> check box.
Custom Message	Enter the customized message text for the virus detection notification.
Custom Message Subject	Enter the subject line text for your custom message for the virus detection notification.

## RELATED DOCUMENTATION

[About the Antivirus Page | 629](#)
[Edit an Antivirus Profile | 639](#)
[Delete Antivirus Profile | 640](#)
[Search for Text in Antivirus Profile | 641](#)

## Edit an Antivirus Profile

You are here: **Configure** > **Security Services** > **UTM** > **Anti-Virus**.

To edit an antivirus profile:

1. Select an existing antivirus profile that you want to edit on the Antivirus Profiles page.

2. Click the pencil icon available on the upper right side of the page.

The Edit Antivirus Profiles page appears with editable fields. For more information on the options, see [“Add an Antivirus Profile” on page 631](#).

3. Click **OK** to save the changes.

#### RELATED DOCUMENTATION

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[About the Antivirus Page | 629](#)

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[Delete Antivirus Profile | 640](#)

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## Delete Antivirus Profile

You are here: **Configure** > **Security Services** > **UTM** > **Anti-Virus**.

To delete an antivirus profile:

1. Select an antivirus profile that you want to delete on the Antivirus Profiles page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the profile.

#### RELATED DOCUMENTATION

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# Search for Text in Antivirus Profile

You can use the search icon in the top right corner of the antivirus profile page to search for text containing letters and special characters on that page.

To search for text:

1. Click the search icon and enter partial text or full text of the keyword in the search bar.

The search results are displayed.

2. Click **X** next to a search keyword or click **Clear All** to clear the search results.

## RELATED DOCUMENTATION

[About the Antivirus Page | 629](#)

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# Security Services—UTM Web Filtering

## IN THIS CHAPTER

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- [Add a Web Filtering Profile | 644](#)
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## About the Web Filtering Page

You are here: **Configure** > **Security Services** > **UTM** > **Web Filtering**.

Use this page to manage Internet usage by preventing access to inappropriate Web content.

A Web filtering profile defines a set of permissions and actions to take based on Web connections predefined by website categories. In addition, you can create custom URL categories and URL pattern lists during this process.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a Web filtering profile. See [“Add a Web Filtering Profile” on page 644](#).
- Edit a Web filtering profile. See [“Edit a Web Filtering Profile” on page 651](#).
- Clone a Web filtering profile. See [“Clone a Web Filtering Profile” on page 650](#).
- Delete a Web filtering profile. See [“Delete Web Filtering Profile” on page 651](#).
- Filter the Web filtering profiles based on select criteria. To do this, select the filter icon at the top right-hand corner of the Web filtering profiles table. The columns in the grid change to accept filter options. Type the filter options; the table displays only the data that fits the filtering criteria.

- Show or hide columns in the Web filtering profiles table. To do this, click the Show Hide Columns icon in the top right corner of the Web filtering profiles table and select the options you want to view or deselect the options you want to hide on the page.
- View the details of a Web filtering profile—To do this, select the Web filtering profile for which you want to view the details and follow the available options:
  - Click **More** and select **Detailed View**.
  - Right-click on the selected Web filtering profile and select **Detailed View**.
  - Mouse over to the left of the selected Web filtering profile and click **Detailed View**.
- Advanced search for Web filtering profiles. To do this, use the search text box present above the table grid. The search includes the logical operators as part of the filter string. In the search text box, when you hover over the icon, it displays an example filter condition. When you start entering the search string, the icon indicates whether the filter string is valid or not.

For an advanced search:

1. Enter the search string in the text box.  
Based on your input, a list of items from the filter context menu appears.
2. Select a value from the list and then select a valid operator based on which you want to perform the advanced search operation.

**NOTE:** Press Spacebar to add an AND operator or OR operator to the search string. Press backspace at any point of time while entering a search criteria, only one character is deleted.

3. Press Enter to display the search results in the grid.

Field Descriptions

Table 232 on page 643 describes the fields on the Web filtering page.

Table 232: Fields on the Web Filtering Page

Field	Action
Name	Displays the name for the Web filtering profile.
Profile type	Displays the type of profile based on the filtering type selected.
Default action	Displays the default action to be taken for the web filtering profile.

Table 232: Fields on the Web Filtering Page (*continued*)

Field	Action
Timeout	Displays the time interval to wait before the connection to the server is closed.

## RELATED DOCUMENTATION

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[Edit a Web Filtering Profile | 651](#)
[Delete Web Filtering Profile | 651](#)

## Add a Web Filtering Profile

You are here: **Configure** > **Security Services** > **UTM** > **Web Filtering**.

To create a new web filtering profile:

1. Click the add icon (+) available on the upper right side of the Web Filtering Profiles page.  
The Create Web Filtering Profiles page appears.
2. Complete the configuration according to the guidelines provided in [Table 233 on page 644](#) through [Table 235 on page 649](#).
3. Click **Finish** to save the changes or click **Back** to go to the previous tab. If you want to discard your changes, click **Cancel**.

If you click **Finish**, a new web filtering profile is created.

Table 233: Fields on the General tab

Field	Action
Name	Enter a name for the Web filtering profile.  The maximum length is 29 characters.
Timeout	Enter a timeout value to wait for a response from the Websense server.  The maximum value is 1800 seconds. Default value is 15 seconds.

Table 233: Fields on the General tab (*continued*)

Field	Action
Engine type	<p>Select an engine type for Web filtering:</p> <p>The available options are</p> <ul style="list-style-type: none"> <li>• Juniper Enhanced—Specifies that the Juniper Enhanced Web filtering intercepts the HTTP and the HTTPS requests and sends the HTTP URL or the HTTPS source IP to the Websense ThreatSeeker Cloud (TSC).</li> <li>• Websense Redirect—Specifies that the Web filtering module intercepts an HTTP request. The URL in the request is then sent to the external Websense server which makes a permit or a deny decision.</li> <li>• Local—Specifies that the Web filtering module intercepts URLs and makes a permit or deny decision locally.</li> </ul> <p><b>NOTE:</b> The default value is Juniper Enhanced.</p>
Safe search	<p>Enable a safe search solution to ensure that the embedded objects such as images on the URLs received from the search engines are safe and that no undesirable content is returned to the client.</p> <p><b>NOTE:</b> This option is available only for the Juniper Enhanced engine type. By default, this option is enabled.</p>
Account	<p>Enter the user account associated with the Websense Web filtering profile.</p> <p><b>NOTE:</b> This option is available only for the Websense Redirect engine type.</p>
Server	<p>Enter the hostname or IP address for the Websense server.</p> <p><b>NOTE:</b> This option is available only for the Websense Redirect engine type.</p>
Port	<p>Enter the port number for communicating with the Websense server.</p> <p>The default port is 15868.</p> <p><b>NOTE:</b> This option is available only for the Websense Redirect engine type.</p>
Sockets	<p>Enter the number of sockets used for communication between the client and the server.</p> <p>The default value is 8.</p> <p><b>NOTE:</b> This option is available only for the Websense Redirect engine type.</p>
Custom Block Message/URL	<p>Specify the redirect URL or a custom message to be sent when HTTP requests are blocked.</p> <p>Maximum length is 512 characters.</p>



Table 233: Fields on the General tab (*continued*)

Field	Action
Custom Quarantine Message	<p>Define a custom message to allow or deny access to a blocked site based on a users response to the message.</p> <p>Maximum length is 512 characters.</p> <p><b>NOTE:</b> This option is available only for the Juniper Enhanced and the Local engine types.</p>
Base Filter	<p>Select a predefined base filter, which has default actions for all categories, for Web filtering.</p> <p>Click <b>Clear All</b> to discard the changes.</p> <p><b>NOTE:</b> This option is available only for the Juniper Enhanced engine type.</p>

Table 234: Fields on the URL Categories Tab

Field	Action
Apply actions	<p>To apply actions that the device must take for the selected category:</p> <ol style="list-style-type: none"> <li>Click <b>Apply Actions</b>. The Apply Actions page appears.</li> <li>Enter the following details: <ul style="list-style-type: none"> <li>Action—Select an action for the URL category from the list. The options are Permit, Log and Permit, Block or Quarantine.</li> <li>Custom Message—Select a custom message for the URL category.</li> </ul> <p><b>NOTE:</b></p> <ul style="list-style-type: none"> <li>This option is applicable only when the action is Block or Quarantine.</li> <li>Click <b>Clear all</b> to clear the custom message.</li> </ul> <p>To add a custom message list inline:</p> <ol style="list-style-type: none"> <li>Click <b>Create New</b>.</li> <li>Enter the following details: <ul style="list-style-type: none"> <li>Name—Enter a unique name for the custom message list. Special characters such as hyphen, underscore, !, @, \$, *, + are allowed. The maximum length is 29 characters.</li> <li>Type—Select an option from the list. The options are Redirect URL or User Message.</li> <li>Content—Enter a content for the custom message list. The maximum length is 512 characters.</li> </ul> </li> <li>Click <b>OK</b> to add a new custom message list. Else, click <b>Cancel</b>.</li> </ol> </li> <li>Click <b>OK</b> to apply actions for the category. Else, click <b>Cancel</b>.</li> </ol>

Table 234: Fields on the URL Categories Tab (*continued*)

Field	Action
Create	<p>To add a new URL category:</p> <ol style="list-style-type: none"> <li>Click <b>+</b>. The Select URL Categories page appears.</li> <li>Select one or more predefined and custom URL categories to apply to the list. The Name column displays the list of URL categories to choose from. Click the search icon in the top right corner of the table to search for any particular URL category in the list.</li> <li>Enter the following details: <ul style="list-style-type: none"> <li>Action—Select an action for the URL category from the list. The options available are Permit, Log and Permit, Block, and Quarantine. <b>NOTE:</b> The default action is Log and Permit.</li> <li>Custom Message—Select a custom message for the URL category. <b>NOTE:</b> <ul style="list-style-type: none"> <li>This option is applicable only when the action is Block or Quarantine.</li> <li>Click <b>Clear all</b> to clear the custom message.</li> <li>Click <b>Create New</b> to add a custom message list inline.</li> </ul> </li> </ul> </li> <li>Click <b>OK</b> to save the changes. If you want to discard your changes, click <b>Cancel</b>.</li> </ol>
Delete	Select a URL category that you want to delete and click the delete icon in the top right corner of the table
Search	Click the search icon in the top right corner of the table and the URL category you want to search.
Category name	<p>Displays the URL category names.</p> <p>Select one or more categories from the list.</p>
Action	Displays the action taken for the URL category.
Custom message	Displays the respective custom messages for the URL categories.

Table 235: Fields on the Fallback Options Tab

Field	Action
Global Reputation Actions	<p>Select to choose the action you want to take for each reputation level.</p> <p>URLs can be processed using their reputation score if there is no category available.</p>
Very Safe	<p>Select an option from the list for the device must take appropriate action if the site reputation reaches the % score that is defined by you.</p> <p><b>NOTE:</b> If you have not defined the percentage, the default score is 90 through 100.</p> <p>The options are Permit, Log and Permit, Block, and Quarantine.</p>
Moderately Safe	<p>Select an option from the list for the device must take appropriate action if the site reputation reaches the % score that is defined by you.</p> <p><b>NOTE:</b> If you have not defined the percentage, the default score is 80 through 89.</p> <p>The options are Permit, Log and Permit, Block, and Quarantine.</p>
Fairly Safe	<p>Select an option from the list for the device must take appropriate action if the site reputation reaches the % score that is defined by you.</p> <p><b>NOTE:</b> If you have not defined the percentage, the default score is 70 through 79.</p> <p>The options are Permit, Log and Permit, Block, and Quarantine.</p>
Suspicious	<p>Select an option from the list for the device must take appropriate action if the site reputation reaches the % score that is defined by you.</p> <p><b>NOTE:</b> If you have not defined the percentage, the default score is 60 through 69.</p> <p>The options are Permit, Log and Permit, Block, and Quarantine.</p>
Harmful	<p>Select an option from the list for the device must take appropriate action if the site reputation reaches the % score that is defined by you.</p> <p><b>NOTE:</b> If you have not defined the percentage, the default score is 50 through 59.</p> <p>The options are Permit, Log and Permit, Block, and Quarantine.</p>
Default Action	<p>Select an option from the list for the actions to be taken for URL categories with no assigned action and for uncategorized URLs.</p> <p>The options are Permit, Log and Permit, Block, and Quarantine.</p>

Table 235: Fields on the Fallback Options Tab (*continued*)

Field	Action
Fallback Action	<p>Select an option from the list. The options are Log and Permit and Block.</p> <p>Use this option when the ThreatSeeker Websense Cloud servers are unreachable. A timeout occurs for requests to ThreatSeeker Cloud.</p>

## RELATED DOCUMENTATION

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[Clone a Web Filtering Profile | 650](#)
[Edit a Web Filtering Profile | 651](#)
[Delete Web Filtering Profile | 651](#)

## Clone a Web Filtering Profile

You are here: **Configure** > **Security Services** > **UTM** > **Web Filtering**.

To clone a Web filtering profile:

1. Select a Web filtering profile that you want to clone and select **Clone** from the More link.

**NOTE:** Alternatively, you can right-click on the selected Web filtering profile and select **Clone**.

The Clone Web Filtering Profiles page appears with editable fields. For more information on the options, see [“Add a Web Filtering Profile” on page 644](#).

2. Click **OK** to save the changes or click **Cancel** to discard the changes.

## RELATED DOCUMENTATION

[About the Web Filtering Page | 642](#)
[Add a Web Filtering Profile | 644](#)

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[Edit a Web Filtering Profile | 651](#)

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## Edit a Web Filtering Profile

You are here: **Configure** > **Security Services** > **UTM** > **Web Filtering**.

To edit a Web filtering profile:

1. Select a Web filtering profile that you want to edit on the Web Filtering page.
2. Click the pencil icon available on the upper right side of the page.

The Edit Web Filtering Profiles page appears with editable fields. For more information on the options, see [“Add a Web Filtering Profile” on page 644](#).

3. Click **OK** to save the changes or click **Cancel** to discard the changes.

### RELATED DOCUMENTATION

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[About the Web Filtering Page | 642](#)

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[Add a Web Filtering Profile | 644](#)

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## Delete Web Filtering Profile

You are here: **Configure** > **Security Services** > **UTM** > **Web Filtering**.

To delete Web filtering profiles:

1. Select one or more Web filtering profiles that you want to delete from the Web Filtering page.
2. Click the delete icon available on the upper right side of the page.  
A confirmation window appears.
3. Click **Yes** to delete or click **No** to retain the profile.

## RELATED DOCUMENTATION

[About the Web Filtering Page | 642](#)

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# Security Services—UTM Category Update

## IN THIS CHAPTER

- [About the Category Update Page | 653](#)
- [Category Update Settings | 655](#)
- [Download and Install Settings | 658](#)

## About the Category Update Page

You are here: **Configure** > **Security Services** > **UTM** > **Category Update**.

Use the Category Update page to download and install a new Juniper Enhanced Web Filtering (EWF) category. You can also use the predefined base filter and all categories in the base filter have default actions.

A base filter is an object that contains a category action pair for all categories defined in the category file. predefined base filters, defined in a category file, are supported for individual EWF categories. Each EWF category has a default action in a base filter, which is attached to the user profile to act as a backup filter. If the categories are not configured in the user profile, then the base filter takes the action.

**NOTE:** If you have not installed the UTM license or if the license has expired, J-Web prompts you to install license to proceed with configuring the Category Update page. J-Web also provides the License Management page link for you to install the license on your device.

## Tasks You Can Perform

You can perform the following tasks from this page:

- Configure URL settings and automatically download and install the category packages. See [“Category Update Settings” on page 655](#).
- Download a category package manually and install it on SRX Series devices with an EWF license. See [“Download and Install Settings” on page 658](#).



- Install a category file. To do this, click **Install** on the Category Update page to install the already downloaded category.
- Uninstall categories. To do this, select an existing category and click **Uninstall** on the Category Update page.

**NOTE:** The Uninstall option appears only when there is an installed version of the category package.

- Search a category name. To do this, enter the category name that you want to find and click the search icon in the top right corner of the Category Update page or above the base filters table.
- Show or hide columns in the base filters table. To do this, click the Show Hide Columns icon in the top right corner of the base filters table and select the options you want to view or deselect the options you want to hide on the page.

Field Descriptions

Table 236 on page 654 describes the fields on the Category Update page.

Table 236: Fields on the Category Update Page

Field	Description
Base Filters	Select a predefined base filter for your category.
Installed Versions	Displays the number of category package installed version.
Check Latest	Opens a new browser page and displays the latest list of EWF category files.
Download Completed	Displays the number of downloads completed status.
Name	Displays the category name of the base filter.
Action	Displays the action for each of the categories in the base filter.

RELATED DOCUMENTATION

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# Category Update Settings

You are here: **Configure** > **Security Services** > **UTM** > **Category Update**.

Use this page to configure the URL to download, routing instances, proxy profiles, and auto-download settings.

To configure the category update settings:

1. Click **Settings**.  
The Settings page appears.
2. Complete the configuration according to the guidelines provided in [Table 237 on page 655](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 237: Fields on the Settings Page

Field	Action
Download URL	Enter the URL from where you want to download a category file.

Table 237: Fields on the Settings Page (*continued*)

Field	Action
Routing Instance	<p>Select an option from the list of configured routing instances or you can create a new routing instance inline.</p> <p>To create a new routing instance inline:</p> <ol style="list-style-type: none"> <li>Click <b>Create</b>. The Create Routing Instance page appears.</li> <li>Enter the following details: <ul style="list-style-type: none"> <li><b>General Settings:</b> <ul style="list-style-type: none"> <li>• <b>Name</b>—Enter a unique name for the routing instance that contains a corresponding IP unicast table; no special characters are allowed and the keyword default cannot be used.</li> <li>• <b>Description</b>—Enter a description for the routing instance. We recommend that you enter a maximum of 255 characters.</li> <li>• <b>Instance Type</b>—Select the type of routing instance from the list: <ul style="list-style-type: none"> <li>• <b>Virtual Router</b>—Used for non-VPN related applications.</li> <li>• <b>VPLS</b>—Lists the interfaces with Encapsulation Ethernet-VPLS.</li> </ul> <p><b>NOTE:</b> This instance is applicable only for root or super admin. This option will not be applicable for Logical system admin.</p> </li> <li>• <b>Interfaces</b>—Select interfaces from the Available column and move it to the Selected column. <ul style="list-style-type: none"> <li>• <b>Name</b>—Displays the interface name.</li> <li>• <b>Zone</b>—Displays the zone name corresponding to the interface name.</li> </ul> </li> </ul> </li> <li>Click <b>OK</b>.</li> </ul></li></ol>

Table 237: Fields on the Settings Page (continued)

Field	Action
Proxy Profile	<p>Select an option from the list of configured proxy profiles or you can create a new proxy profile inline.</p> <p>To create a new proxy profile inline:</p> <ol style="list-style-type: none"> <li>Click <b>Create</b>. The Create Proxy Profile page appears.</li> <li>Enter the following details: <ul style="list-style-type: none"> <li>Profile Name—Enter a unique proxy profile name.</li> <li>Connection Type: <ul style="list-style-type: none"> <li>Server IP—Enter the IP address of the server.</li> <li>Host Name—Enter the host name.</li> </ul> </li> <li>Port Number—Select the port number by using top or down arrows. Range: 0 through 65535</li> </ul> </li> <li>Click <b>OK</b>.</li> </ol>
Auto Download	<p>Enable this option to automatically detect a newer version of the UTM category file. If a newer version of UTM category is available, J-Web automatically downloads the file and installs it on your device.</p>
Start Time	<p>Specify a date and time (in MM/DD/YYYY and HH:MM:SS formats) to initiate automatic download and installation process for the category file.</p>
Interval (Hrs)	<p>Enter a time interval to download and check install category file.</p> <p>Range is 1 through 336.</p>

## RELATED DOCUMENTATION

[About the Category Update Page | 653](#)
[Download and Install Settings | 658](#)

# Download and Install Settings

You are here: **Configure** > **Security Services** > **UTM** > **Category Update**.

Use this page to download or download and install URL category packages on your device.

To download and install URL category packages:

1. Click **Download**.  
The Download and Install Settings page appears.
2. Complete the configuration according to the guidelines provided in [Table 238 on page 658](#).
3. Click **OK** to download the package. If you want to cancel the download, click **Cancel**.

If you have not selected the Download and Install option, then the package is only downloaded. You can install the package at a later time using **Install** available on the Category Update page.

If you have selected the Download and Install option, J-Web downloads the package and installs the URL categories on the SRX Series devices with an EWF license.

Table 238: Fields on the Download and Install Settings Page

Field	Action
Version	Select the latest version option or specify an available version number.
Download and Install	Enable this option if you want to install the categories after downloading them.

## RELATED DOCUMENTATION

- [About the Category Update Page | 653](#)
- [Category Update Settings | 655](#)

# Security Services—UTM Antispam Profiles

## IN THIS CHAPTER

- [About the Antispam Page | 659](#)
- [Add an Antispam Profile | 661](#)
- [Clone an Antispam Profile | 662](#)
- [Edit an Antispam Profile | 663](#)
- [Delete Antispam Profile | 663](#)

## About the Antispam Page

You are here: **Configure** > **Security Services** > **UTM** > **Antispam Profiles**.

Use the Antispam Profiles page to view and manage antispam profiles. An antispam profile is used to examine transmitted e-mail messages to identify e-mail spam by using a constantly updated spam block list.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Create an antispam profile. See [“Add an Antispam Profile” on page 661](#).
- Edit an antispam profile. See [“Edit an Antispam Profile” on page 663](#).
- Delete an antispam profile. See [“Delete Antispam Profile” on page 663](#).
- Clone an antispam profile. See [“Clone an Antispam Profile” on page 662](#).
- View the details of an antispam profile—To do this, select the antispam profile for which you want to view the details and follow the available options:
  - Click **More** and select **Detailed View**.
  - Right-click on the selected antispam profile and select **Detailed View**.
  - Mouse over to the left of the selected antispam profile and click **Detailed View**.

- Advanced search for antispam profiles. To do this, use the search text box present above the table grid. The search includes the logical operators as part of the filter string. In the search text box, when you hover over the icon, it displays an example filter condition. When you start entering the search string, the icon indicates whether the filter string is valid or not.

For an advanced search:

1. Enter the search string in the text box.

Based on your input, a list of items from the filter context menu appears.

2. Select a value from the list and then select a valid operator based on which you want to perform the advanced search operation.

**NOTE:** Press Spacebar to add an AND operator or OR operator to the search string. Press backspace at any point of time while entering a search criteria, only one character is deleted.

3. Press Enter to display the search results in the grid.

- Filter the antispam profiles based on select criteria. To do this, select the filter icon at the top right-hand corner of the antispam profiles table. The columns in the grid change to accept filter options. Type the filter options; the table displays only the data that fits the filtering criteria.
- Show or hide columns in the antispam profiles table. To do this, click the Show Hide Columns icon in the top right corner of the antispam profiles table and select the options you want to view or deselect the options you want to hide on the page.

## Field Descriptions

Table 239 on page 660 describes the fields on the Antispam Profiles page.

**Table 239: Fields on the Antispam Profiles Page**

Field	Description
Name	Name of the antispam profile.
Sophos Blacklist	Indicates whether this option is enabled (server-based filtering) or disabled (local filtering).
Action	Action to be taken when spam is detected.
Custom Tag	Custom-defined tag that identifies an e-mail message as spam.

RELATED DOCUMENTATION

<a href="#">Add an Antispam Profile   661</a>
<a href="#">Clone an Antispam Profile   662</a>
<a href="#">Edit an Antispam Profile   663</a>
<a href="#">Delete Antispam Profile   663</a>

## Add an Antispam Profile

You are here: **Configure** > **Security Services** > **UTM** > **Antispam Profiles**.

To add an antispam profile:

1. Click the add icon (+) on the upper right side of the Antispam Profiles page.  
The Create Antispam Profiles page appears.
2. Complete the configuration according to the guidelines provided in [Table 240 on page 661](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

**Table 240: Fields on the Create Antispam Profiles Page**

Field	Action
<b>General Information</b>	
Name	Enter a unique name for your antispam profile.
Sophos Blacklist	<p>Enable this option to use server-based spam filtering. By default, this option is enabled.</p> <p><b>NOTE:</b> If you disable this option, then local spam filtering is used.</p>
<b>Action</b>	
Default Action	<p>Select an option to be taken when a spam message is detected. The options available are:</p> <ul style="list-style-type: none"> <li>● Tag E-Mail Subject Line—Adds a custom string at the beginning of the subject of the e-mail.</li> <li>● Tag SMTP Header—Adds a custom string to the e-mail header.</li> <li>● Block E-Mail—Blocks the spam e-mail.</li> <li>● None—No action taken.</li> </ul>



Table 240: Fields on the Create Antispam Profiles Page (*continued*)

Field	Action
Custom Tag	Enter a custom string for identifying a message as spam. By default, the device uses ***SPAM***.

## RELATED DOCUMENTATION

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[Clone an Antispam Profile | 662](#)
[Edit an Antispam Profile | 663](#)
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## Clone an Antispam Profile

You are here: **Configure** > **Security Services** > **UTM** > **Antispam Profiles**.

To clone an antispam profile:

1. Select an antispam profile that you want to clone and select **Clone** from the More link.

**NOTE:** Alternatively, you can right-click on the selected antispam profile and select **Clone**.

The Clone Antispam Profiles page appears with editable fields. For more information on the fields, see [“Add an Antispam Profile” on page 661](#).

2. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

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[Delete Antispam Profile | 663](#)

## Edit an Antispam Profile

You are here: **Configure** > **Security Services** > **UTM** > **Antispam Profiles**.

To edit an antispam profile:

1. Select an existing antispam profile that you want to edit on the Antispam Profiles page.
2. Click the pencil icon available on the upper right side of the page.

The Edit Antispam Profiles page appears. For more information on the options, see [“Add an Antispam Profile” on page 661](#).

3. Click **OK** to save the changes.

### RELATED DOCUMENTATION

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[Delete Antispam Profile | 663](#)

## Delete Antispam Profile

You are here: **Configure** > **Security Services** > **UTM** > **Antispam Profiles**.

To delete antispam profiles:

1. Select one or more antispam profiles that you want to delete on the Antispam Profiles page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the profile.

### RELATED DOCUMENTATION

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# Security Services—UTM Content Filtering

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- [Add a Content Filtering Profile | 667](#)
- [Edit a Content Filtering Profile | 668](#)
- [Delete Content Filtering Profile | 669](#)

## About the Content Filtering Page

You are here: **Configure** > **Security Services** > **UTM** > **Content Filtering**.

Use this page to configure content filtering.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Create content filtering profile. See [“Add a Content Filtering Profile” on page 667](#).
- Edit a content filtering profile. See [“Edit a Content Filtering Profile” on page 668](#).
- Delete a content filtering profile. See [“Delete Content Filtering Profile” on page 669](#).
- View the details of an content filtering profile—To do this, select the content filtering profile for which you want to view the details and follow the available options:
  - Click **More** and select **Detailed View**.
  - Right-click on the selected content filtering profile and select **Detailed View**.
  - Mouse over to the left of the selected content filtering profile and click **Detailed View**.
- Advanced search for content filtering profiles. To do this, use the search text box present above the table grid. The search includes the logical operators as part of the filter string. In the search text box, when you hover over the icon, it displays an example filter condition. When you start entering the search string, the icon indicates whether the filter string is valid or not.

For an advanced search:

1. Enter the search string in the text box.

Based on your input, a list of items from the filter context menu appears.

2. Select a value from the list and then select a valid operator based on which you want to perform the advanced search operation.

**NOTE:** Press Spacebar to add an AND operator or OR operator to the search string. Press backspace at any point of time while entering a search criteria, only one character is deleted.

3. Press Enter to display the search results in the grid.

- Filter the content filtering profiles based on select criteria. To do this, select the filter icon at the top right-hand corner of the content filtering profiles table. The columns in the grid change to accept filter options. Type the filter options; the table displays only the data that fits the filtering criteria.
- Show or hide columns in the content filtering profiles table. To do this, click the Show Hide Columns icon in the top right corner of the content filtering profiles table and select the options you want to view or deselect the options you want to hide on the page.

## Field Descriptions

[Table 241 on page 666](#) describes the fields on the Content Filtering Profiles page.

**Table 241: Fields on the Content Filtering Profiles Page**

Field	Description
Name	Displays the unique name of the content filtering profile.
Permit Command List	Displays the permitted protocol command name.
Block Command List	Displays the blocked protocol command.
Notification Type	Displays the notification type opted.
Description	Displays the description for the content filtering profile.

## RELATED DOCUMENTATION

[Add a Content Filtering Profile | 667](#)

[Edit a Content Filtering Profile | 668](#)

[Delete Content Filtering Profile | 669](#)

## Add a Content Filtering Profile

You are here: **Configure > Security Services > UTM > Content Filtering.**

To add a content filtering profile:

1. Click the add icon (+) on the upper right side of the Content Filtering Profiles page.  
The Create Content Filtering page appears.
2. Complete the configuration according to the guidelines provided in [Table 242 on page 667](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

**Table 242: Fields on the Create Content Filtering Profiles Page**

Field	Action
<b>Main</b>	
Profile Name	Enter a unique name for the antispam profile.
Permit Command List	Select the protocol command name to be permitted from the list.
Block Command List	Select the protocol command name to be blocked from the list. By blocking certain commands, traffic can be controlled on the protocol command level.
Block Extension List	Select the extension to be blocked from the list.
Block MIME List	Select the MIME type from the list.
Block MIME Exception List	Select the MIME type to be excluded from the list.
Block Content Type	Select the content type to be blocked.
<b>Notification Options</b>	

Table 242: Fields on the Create Content Filtering Profiles Page (*continued*)

Field	Action
Notification Type	Specifies the type of notification sent when a content block is triggered.  Select the <b>Protocol Only</b> or the <b>Message</b> check box.
Notification Mail Sender	Specifies that when a virus is detected and a content block is triggered, an e-mail is sent to the administrator.  Select the <b>Notify Mail Sender</b> check box.
Custom Notification Message	Specifies the customized message text for the content-block notification.  Enter the text for this custom notification message (if you are using one).

## RELATED DOCUMENTATION

[About the Content Filtering Page | 665](#)
[Edit a Content Filtering Profile | 668](#)
[Delete Content Filtering Profile | 669](#)

## Edit a Content Filtering Profile

You are here: **Configure** > **Security Services** > **UTM** > **Content Filtering**.

To edit a content filtering profile:

1. Select an existing content filtering profile that you want to edit on the Content Filtering profiles page.
2. Click the pencil icon available on the upper right side of the page.

The Edit Content Filtering Profiles page appears with editable fields. For more information on the options, see [“Add a Content Filtering Profile” on page 667](#).

3. Click **OK** to save the changes.

## RELATED DOCUMENTATION

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[About the Content Filtering Page | 665](#)

---

[Add a Content Filtering Profile | 667](#)

---

[Delete Content Filtering Profile | 669](#)

---

## Delete Content Filtering Profile

You are here: **Configure** > **Security Services** > **UTM** > **Content Filtering**.

To delete a content filtering profile:

1. Select a content filtering profile that you want to delete on the Content Filtering Profiles page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the profile.

### RELATED DOCUMENTATION

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[About the Content Filtering Page | 665](#)

---

[Add a Content Filtering Profile | 667](#)

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[Edit a Content Filtering Profile | 668](#)

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# Security Services—UTM Custom Objects

## IN THIS CHAPTER

- [About the Custom Objects Page | 670](#)
- [Add a MIME Pattern List | 673](#)
- [Add a File Extension List | 674](#)
- [Add a Protocol Command List | 675](#)
- [Add a URL Pattern List | 676](#)
- [Add a URL Category List | 677](#)
- [Add a Custom Message List | 679](#)
- [Clone Custom Objects | 680](#)
- [Edit Custom Objects | 681](#)
- [Delete Custom Objects | 681](#)

## About the Custom Objects Page

You are here: **Configure** > **Security Services** > **UTM** > **Custom Objects**.

Use the Custom Objects page to define your own objects for URL filtering, antivirus filtering, and content filtering.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a MIME pattern list. See [“Add a MIME Pattern List” on page 673](#).
- Add a file extension list. See [“Add a File Extension List” on page 674](#).
- Add a protocol command list. See [“Add a Protocol Command List” on page 675](#).
- Add an URL pattern list. See [“Add a URL Pattern List” on page 676](#).
- Add an URL category list. See [“Add a URL Category List” on page 677](#).
- Add a custom message list. See [“Add a Custom Message List” on page 679](#).

- Edit custom objects. See [“Edit Custom Objects” on page 681](#).
- Delete custom objects. See [“Delete Custom Objects” on page 681](#).
- Clone custom objects. See [“Clone Custom Objects” on page 680](#)
- View the details of custom objects—To do this, select the custom object for which you want to view the details and follow the available options:
  - Click **More** and select **Detailed View**.
  - Right-click on the selected custom object and select **Detailed View**.
  - Mouse over to the left of the selected custom object and click **Detailed View**.
- Filter the custom objects based on select criteria. To do this, select the filter icon at the top right-hand corner of the custom objects table. The columns in the grid change to accept filter options. Type the filter options; the table displays only the data that fits the filtering criteria.
- Show or hide columns in the custom objects table. To do this, click the Show Hide Columns icon in the top right corner of the custom objects table and select the options you want to view or deselect the options you want to hide on the page.
- Advance search for custom objects. To do this, use the search text box present above the table grid. The search includes the logical operators as part of the filter string. In the search text box, when you hover over the icon, it displays an example filter condition. When you start entering the search string, the icon indicates whether the filter string is valid or not.

For an advanced search:

1. Enter the search string in the text box.

Based on your input, a list of items from the filter context menu appears.

2. Select a value from the list and then select a valid operator based on which you want to perform the advanced search operation.

**NOTE:** Press Spacebar to add an AND operator or OR operator to the search string. Press backspace at any point of time while entering a search criteria, only one character is deleted.

3. Press Enter to display the search results in the grid.

## Field Descriptions

[Table 243 on page 672](#) describes the fields on the Custom Objects page.

Table 243: Fields on the Custom Objects Page

Field	Description
<b>MIME Pattern List</b>	
Name	Displays the user-defined name or a predefined MIME pattern name.
Value	Displays the user-defined value or a predefined MIME pattern value.
<b>Filename Extension List</b>	
Name	Displays the user-defined name or a predefined file extension name.
Value	Displays the user-defined value or a predefined file extension value.
<b>Protocol Command List</b>	
Name	Displays only the user-defined protocol command names.
Value	Displays only the user-defined protocol command values.
<b>URL Pattern List</b>	
Name	Displays only the user-defined URL pattern names.
Value	Displays only the user-defined URL pattern values.
<b>URL Category List</b>	
Name	Displays only the predefined URL categories.
Value	Displays only the predefined URL categories from the SurfControl server. You can also configure URLs. The URLs configured in the URL pattern list are displayed here.
<b>Custom Message List</b>	
The Custom Message List displays the custom messages that you have created. It also displays the type of action taken when you create block message or URL, or quarantine message or URL for each category.	
Name	Displays the name of the custom message that you have created.
Type	Displays the type of custom message. The options are Redirect-URL or User Message.

Table 243: Fields on the Custom Objects Page (continued)

Field	Description
Content	Displays the content of the custom message. It is either a user message or a URL to which you will be redirected.

RELATED DOCUMENTATION

| [Add a MIME Pattern List](#) | 673

# Add a MIME Pattern List

You are here: **Configure** > **Security Services** > **UTM** > **Custom Objects**.

To add a MIME pattern list:

1. Click the **MIME Pattern List** tab.
2. Click the add icon (+) on the upper right side of the MIME Pattern List tab.  
The Add MIME Pattern List page appears.
3. Complete the configuration according to the guidelines provided in [Table 244 on page 673](#).
4. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 244: Fields on the Add MIME Pattern List Page

Field	Action
Name	Enter a name for the MIME pattern list.  You can use a string beginning with a letter or underscore and consisting of alphanumeric characters, special characters such as dashes and underscores. The maximum length is 40 characters.

Table 244: Fields on the Add MIME Pattern List Page (*continued*)

Field	Action
Value	<p>To add a MIME pattern value:</p> <ol style="list-style-type: none"> <li>1. Click +.</li> <li>2. Enter the MIME pattern value in the Value List. <p><b>NOTE:</b> Value must be two strings separated by slash(/):</p> <ul style="list-style-type: none"> <li>• The first string beginning with a letter or number and consisting of alphanumeric characters, underscores and dashes. Dashes cannot be shown continuously in the string.</li> <li>• The second string can be null or begin with a letter or number and consisting of alphanumeric characters, underscores, dashes, dots and pluses. Dashes, dots, and pluses cannot be shown continuously in the string.</li> </ul> </li> <li>3. Click the tick mark.</li> </ol> <p>If you want to delete any MIME pattern values, select the value and click the delete icon.</p>

## RELATED DOCUMENTATION

[Clone Custom Objects](#) | 680

[Edit Custom Objects](#) | 681

[Delete Custom Objects](#) | 681

## Add a File Extension List

You are here: **Configure** > **Security Services** > **UTM** > **Custom Objects**.

To add a file extension list:

1. Click the **File Extension List** tab.
2. Click the add icon (+) on the upper right side of the File Extension List tab.

The Add File Extension List page appears.

3. Complete the configuration according to the guidelines provided in [Table 245 on page 675](#).
4. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

**Table 245: Fields on the Add File Extension List Page**

Field	Action
Name	<p>Enter a name for the file extension list.</p> <p>You can use a string beginning with a letter or underscore and consisting of alphanumeric characters, special characters such as dashes and underscores. The maximum length is 29 characters.</p>
Value	Select values from the list in the Available column to associate it with the file extension name and then click the right arrow to move it to the Selected column.

## RELATED DOCUMENTATION

[Clone Custom Objects | 680](#)

[Edit Custom Objects | 681](#)

[Delete Custom Objects | 681](#)

## Add a Protocol Command List

You are here: **Configure** > **Security Services** > **UTM** > **Custom Objects**.

To add a protocol command list:

1. Click the **Protocol Command List** tab.
2. Click the add icon (+) on the upper right side of the Protocol Command List tab.  
The Add Protocol Command List page appears.
3. Complete the configuration according to the guidelines provided in [Table 246 on page 676](#).
4. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 246: Fields on the Add Protocol Command List Page

Field	Action
Name	<p>Enter a name for the protocol command list.</p> <p>You can use a string beginning with a letter or underscore and consisting of alphanumeric characters, special characters such as dashes and underscores. The maximum length is 29 characters.</p>
Value	<p>To add a protocol command value:</p> <ol style="list-style-type: none"> <li>1. Click +.</li> <li>2. Enter the protocol command value in the Value List.</li> <li>3. Click the tick mark.</li> </ol> <p>If you want to delete any protocol command values, select the value and click the delete icon.</p>

## RELATED DOCUMENTATION

[Clone Custom Objects | 680](#)
[Edit Custom Objects | 681](#)
[Delete Custom Objects | 681](#)

## Add a URL Pattern List

You are here: **Configure** > **Security Services** > **UTM** > **Custom Objects**.

To add a URL pattern list:

1. Click the **URL Pattern List** tab.
2. Click the add icon (+) on the upper right side of the URL Pattern List tab.

The Add URL Pattern List page appears.

3. Complete the configuration according to the guidelines provided in [Table 247 on page 677](#).
4. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 247: Fields on the Add URL Pattern List Page

Field	Action
Name	<p>Enter a name for the URL pattern list.</p> <p>You can use a string beginning with a letter or underscore and consisting of alphanumeric characters, special characters such as dashes and underscores. The maximum length is 29 characters.</p> <p><b>NOTE:</b> Multiple URLs are supported in a pattern.</p>
Value	<p>To add a URL pattern value:</p> <ol style="list-style-type: none"> <li>1. Click +.</li> <li>2. Enter the URL pattern value in the Value List.</li> <li>3. Click the tick mark.</li> </ol> <p>If you want to delete any URL pattern values, select the value and click the delete icon.</p>

## RELATED DOCUMENTATION

[Clone Custom Objects | 680](#)
[Edit Custom Objects | 681](#)
[Delete Custom Objects | 681](#)

## Add a URL Category List

You are here: **Configure** > **Security Services** > **UTM** > **Custom Objects**.

To add a URL category list:

1. Click the **URL Category List** tab.
2. Click the add icon (+) on the upper right side of the URL Category List tab.

The Add URL Category List page appears.



- 3. Complete the configuration according to the guidelines provided in [Table 248 on page 678](#).
- 4. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

[Table 248 on page 678](#) provides guidelines on using the fields on the Add URL Category List page.

**Table 248: Fields on the Add URL Category List Page**

Field	Action
Name	<p>Enter a name for the URL category list.</p> <p>You can use a string beginning with a letter or underscore and consisting of alphanumeric characters, special characters such as dashes and underscores. The maximum length is 59 characters.</p>
Value	<p>Select values from the list in the Available column to associate it with the URL category list name and then click the right arrow to move it to the Selected column.</p> <p>To add a new URL pattern inline:</p> <ol style="list-style-type: none"><li>1. Click <b>Create New URL Pattern</b>.</li></ol> <p>The Add URL Pattern List page appears.</p> <ol style="list-style-type: none"><li>2. Enter a URL pattern name.</li></ol> <p>You can use a string beginning with a letter or underscore and consisting of alphanumeric characters, special characters such as dashes and underscores. The maximum length is 29 characters.</p> <ol style="list-style-type: none"><li>3. Click + to add a URL pattern value.</li><li>4. Enter the URL pattern value in the Value List.</li><li>5. Click the tick mark.</li><li>6. Optional. If you want to delete any URL pattern values, select the value and click the delete icon.</li><li>7. Click <b>OK</b> to save the changes.</li></ol>

RELATED DOCUMENTATION

<a href="#">Clone Custom Objects   680</a>
<a href="#">Edit Custom Objects   681</a>

## Add a Custom Message List

You are here: **Configure** > **Security Services** > **UTM** > **Custom Objects**.

To add a custom message list:

1. Click the **Custom Message List** tab.
2. Click the add icon (+) on the upper right side of the Custom Message List tab.  
The Add Custom Message List page appears.
3. Complete the configuration according to the guidelines provided in [Table 249 on page 679](#).
4. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 249: Fields on the Add Custom Message List Page

Field	Action
Name	<p>Enter a name for the custom message list.</p> <p>You can use a string beginning with a letter or underscore and consisting of alphanumeric characters, special characters such as dashes and underscores. The maximum length is 59 characters.</p>
Type	<p>Select an option:</p> <ul style="list-style-type: none"><li>• Redirect URL—Specifies custom redirect URL server.</li><li>• User Message—Specifies that website access has been blocked by an organization's access policy.</li></ul>
Content	<p>Enter content of the custom message; maximum length is 1024 characters. It is either a user message or a URL to which you will be redirected.</p>

### RELATED DOCUMENTATION

[Clone Custom Objects](#) | 680

[Edit Custom Objects](#) | 681

## Clone Custom Objects

You are here: **Configure** > **Security Services** > **UTM** > **Custom Objects**.

You can clone all of the following custom objects:

- MIME pattern list
- File extension list
- Protocol command list
- URL pattern list
- URL category list
- Custom message list

To clone a custom object:

1. Right-click any of the custom objects and select **Clone**. You can also select **Clone** from the More link.  
The clone page for the selected custom object appears with editable fields.
2. Make the required changes in the editable fields.
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

### RELATED DOCUMENTATION

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[Add a MIME Pattern List](#) | 673

---

[Add a File Extension List](#) | 674

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[Add a Protocol Command List](#) | 675

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[Add a URL Pattern List](#) | 676

---

[Add a URL Category List](#) | 677

---

[Add a Custom Message List](#) | 679

## Edit Custom Objects

You are here: **Configure** > **Security Services** > **UTM** > **Custom Objects**.

You can edit all of the following custom objects:

- MIME pattern list
- File extension list
- Protocol command list
- URL pattern list
- URL category list
- Custom message list

To edit a custom objects:

1. Select any of the existing custom objects that you want to edit on the Custom Objects page.
2. Click the pencil icon available on the upper right side of the page.

The edit page for the selected custom object appears with editable fields. You can modify the parameters of the custom object as required.

3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

### RELATED DOCUMENTATION

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[Add a MIME Pattern List | 673](#)

---

[Add a File Extension List | 674](#)

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[Add a Protocol Command List | 675](#)

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[Add a URL Pattern List | 676](#)

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[Add a URL Category List | 677](#)

---

[Add a Custom Message List | 679](#)

## Delete Custom Objects

You are here: **Configure** > **Security Services** > **UTM** > **Custom Objects**.

You can delete all of the following custom objects:

- MIME pattern list
- File extension list
- Protocol command list
- URL pattern list
- URL category list
- Custom message list

To delete a custom objects:

1. Select any of the existing custom objects that you want to delete from the Custom Objects page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the selected custom object.

#### RELATED DOCUMENTATION

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[About the Custom Objects Page | 670](#)

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[Clone Custom Objects | 680](#)

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[Edit Custom Objects | 681](#)

# Security Services—UTM Policy

IN THIS CHAPTER

- [About the Policy Page | 683](#)
- [Add an UTM Policy | 684](#)
- [Edit an UTM Policy | 686](#)
- [Delete UTM Policy | 687](#)
- [Launch UTM Wizard | 687](#)

## About the Policy Page

You are here: **Configure > Security Services > UTM > Policy.**

Use this page to configure UTM Policies.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Create an UTM policy. See [“Add an UTM Policy” on page 684.](#)
- Edit an UTM policy. See [“Edit an UTM Policy” on page 686.](#)
- Delete an UTM policy. See [“Delete UTM Policy” on page 687.](#)
- Launch an UTM wizard. See [“Launch UTM Wizard” on page 687.](#)

### Field Descriptions

[Table 250 on page 683](#) describes the fields on the UTM policy page.

Table 250: Fields on the UTM Policy Page

Field	Description
UTM policy name	Displays the UTM policy name.

Table 250: Fields on the UTM Policy Page (*continued*)

Field	Description
Anti-Virus	Displays the antivirus profile.
Anti-Spam	Displays the antispam profile.
Web filtering	Displays the Web filtering profile.
Content filtering	Displays the content filtering profiles.

## RELATED DOCUMENTATION

[Add an UTM Policy | 684](#)
[Edit an UTM Policy | 686](#)
[Delete UTM Policy | 687](#)
[Launch UTM Wizard | 687](#)

## Add an UTM Policy

You are here: **Configure** > **Security Services** > **UTM** > **Policy**.

To add a UTM policy:

1. Click the add icon (+) on the upper right side of the UTM Policy page.  
The Create UTM Policy page appears.
2. Complete the configuration according to the guidelines provided in [Table 251 on page 684](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 251: Fields on the Create UTM Policy Page

Field	Action
<b>Main</b>	
Policy name	Enter a UTM policy name.

Table 251: Fields on the Create UTM Policy Page (*continued*)

Field	Action
<b>Antivirus profiles</b>	
HTTP profile	Specifies the UTM policy for the HTTP protocol to be scanned.  Select an option from the list.
FTP upload profile	Specifies the UTM policy for the FTP protocol to be scanned.  Select an option from the list.
FTP download profile	Specifies the UTM policy for the FTP protocol to be scanned.  Select an option from the list.
IMAP profile	Specifies the UTM policy for the IMAP protocol to be scanned.  Select an option from the list.
SMTP profile	Specifies the UTM policy for the SMTP protocol to be scanned.  Select an option from the list.
POP3 profile	Specifies the UTM policy for the POP3 protocol to be scanned.  Select an option from the list.
<b>Web filtering profiles</b>	
HTTP profile	Specifies the UTM policy for the HTTP protocol to be scanned.  Select an option from the list.
<b>Antispam profiles</b>	
SMTP profile	Specifies the UTM policy for the SMTP protocol to be scanned.  Select an option from the list.
<b>Content filtering profiles</b>	
HTTP profile	Specifies the UTM policy for the HTTP protocol to be scanned.  Select an option from the list.



Table 251: Fields on the Create UTM Policy Page (*continued*)

Field	Action
FTP upload profile	Specifies the UTM policy for the FTP protocol to be scanned.  Select an option from the list.
FTP download profile	Specifies the UTM policy for the FTP protocol to be scanned.  Select an option from the list.
IMAP profile	Specifies the UTM policy for the IMAP protocol to be scanned.  Select an option from the list.
SMTP profile	Specifies the UTM policy for the SMTP protocol to be scanned.  Select an option from the list.
POP3 profile	Specifies the UTM policy for the POP3 protocol to be scanned.  Select an option from the list.

## RELATED DOCUMENTATION

[About the Policy Page | 683](#)
[Edit an UTM Policy | 686](#)
[Delete UTM Policy | 687](#)
[Launch UTM Wizard | 687](#)

## Edit an UTM Policy

You are here: **Configure** > **Security Services** > **UTM** > **Policy**.

To edit a UTM policy:

1. Select an existing UTM policy that you want to edit on the UTM Policy page.
2. Click the pencil icon available on the upper right side of the page.

The Edit UTM Policy page appears with editable fields. For more information on the options, see [“Add an UTM Policy” on page 684](#).

3. Click **OK** to save the changes.

#### RELATED DOCUMENTATION

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[About the Policy Page | 683](#)

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[Add an UTM Policy | 684](#)

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[Delete UTM Policy | 687](#)

---

[Launch UTM Wizard | 687](#)

## Delete UTM Policy

You are here: **Configure** > **Security Services** > **UTM** > **Policy**.

To delete a UTM policy:

1. Select an UTM policy that you want to delete on the UTM Policy page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the profile.

#### RELATED DOCUMENTATION

---

[About the Policy Page | 683](#)

---

[Add an UTM Policy | 684](#)

---

[Edit an UTM Policy | 686](#)

---

[Launch UTM Wizard | 687](#)

## Launch UTM Wizard

You are here: **Configure** > **Security Services** > **UTM** > **Policy**.

You can use this wizard to create UTM policies. UTM policies can include multiple profiles for Web filtering, Antivirus, Antispam, and Content Filtering, some or all of which can be configured. In addition, you can use this wizard to create profile objects.

Once you have created a policy, you can assign it to various firewall rules in the policy table.

To create a UTM policy in launch wizard:

1. Click the **Launch Wizard** icon available on the upper right side of the Policy page.
2. Complete the configuration according to the guidelines provided in [“Add an UTM Policy” on page 684](#).
3. Click **Finish** to save the changes or click **Back** to go to the previous tab. If you want to discard your changes, click **Cancel**.
4. Click **OK** after reviewing the summary of the UTM policy created.

RELATED DOCUMENTATION

<a href="#">About the Policy Page   683</a>
<a href="#">Add an UTM Policy   684</a>
<a href="#">Edit an UTM Policy   686</a>
<a href="#">Delete UTM Policy   687</a>

# Security Services—IPS Signature Update

## IN THIS CHAPTER

- [About the Signature Update Page | 689](#)
- [Download an IPS Signature | 690](#)
- [Install an IPS Signature | 691](#)
- [Check Status of the IPS Signature | 692](#)
- [IPS Signature Download Setting | 693](#)

## About the Signature Update Page

You are here: **Configure** > **Security Services** > **IPS** > **Signature Update**.

You can download, install, and check status of the latest version of signature database from the security server.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Download an IPS signature. See [“Download an IPS Signature” on page 690](#).
- Install an IPS signature. See [“Install an IPS Signature” on page 691](#).
- Check status of the IPS signature. See [“Check Status of the IPS Signature” on page 692](#).
- IPS signature download setting. See [“IPS Signature Download Setting” on page 693](#).

### Field Descriptions

[Table 252 on page 690](#) describes the fields on the IPS signature page.

Table 252: Fields on the IPS Signature Page

Field	Description
Name	Displays the field values for install or download operation.
Value	Displays the install or download status of the operation.

## RELATED DOCUMENTATION

[Download an IPS Signature | 690](#)
[Install an IPS Signature | 691](#)
[Check Status of the IPS Signature | 692](#)
[IPS Signature Download Setting | 693](#)

## Download an IPS Signature

You are here: **Configure** > **Security Services** > **IPS** > **Signature Update**.

To download an IPS signature:

1. Click **Download** on the upper right side of the Signature Update page.  
The Security Package Manual Download page appears.
2. Complete the configuration according to the guidelines provided in [Table 253 on page 690](#).
3. Click **OK** to download the package. If you want to cancel the download, click **Cancel**.

Table 253: Fields on the Security Package Manual Download Page

Field	Action
URL	Specifies the predefined default URL used by the device to download the signature database.
Version	Specifies the version number of the security package from the portal.  Select the version from the list.

Table 253: Fields on the Security Package Manual Download Page (*continued*)

Field	Action
Full Package	Select the check box to enable the device to download the latest security package with the full set of attack signature tables from the portal.

**NOTE:**

- It takes approximately one minute to retrieve the latest available version for download from the security server.
- To configure URL, click Download Setting.

**RELATED DOCUMENTATION**

[About the Signature Update Page | 689](#)

[Install an IPS Signature | 691](#)

[Check Status of the IPS Signature | 692](#)

[IPS Signature Download Setting | 693](#)

## Install an IPS Signature

You are here: **Configure** > **Security Services** > **IPS** > **Signature Update**.

To download an IPS signature:

1. Click **Install** on the upper right side of the IPS Signature page.  
The Install Signature page appears.
2. Complete the configuration according to the guidelines provided in [Table 254 on page 692](#).
3. Click **Install** to install the package. If you want to cancel the install, click **Cancel**.

Table 254: Fields on the Install Configuration Page

Field	Action
Do not set to active after installed	Select the check box to specify whether or not to activate the installed security package.
Install	Click Install to install the existing signature database.

## RELATED DOCUMENTATION

[About the Signature Update Page | 689](#)
[Download an IPS Signature | 690](#)
[Check Status of the IPS Signature | 692](#)
[IPS Signature Download Setting | 693](#)

## Check Status of the IPS Signature

You are here: **Configure** > **Security Services** > **IPS** > **Signature Update**.

To check status of an IPS signature:

1. Click **Check Status** on the upper right side of the IPS Signature page.  
The Check Status page appears.
2. Complete the configuration according to the guidelines provided in [Table 255 on page 692](#).
3. Click **OK**

Table 255: Fields on the Check Status Page

Field	Action
Download Status	Shows the security package download status in the message box.  Select Download Status from the Check Status list.
Install Status	Shows the security package install status in the message box.  Select Install Status from the Check Status list.

RELATED DOCUMENTATION

<a href="#">About the Signature Update Page   689</a>
<a href="#">Download an IPS Signature   690</a>
<a href="#">Install an IPS Signature   691</a>
<a href="#">IPS Signature Download Setting   693</a>

## IPS Signature Download Setting

You are here: **Configure** > **Security Services** > **IPS** > **Signature Update**.

To set the parameters of automatic download an IPS signature:

1. Click **Download Setting** on the upper right side of the IPS Signature page.  
The Security Package Download Setting page appears.
2. Complete the configuration according to the guidelines provided in [Table 256 on page 693](#).
3. Click **OK** to set the parameters. If you want to cancel the settings, click **Cancel**.

Table 256: Fields on the Download Setting Page

Field	Action
<b>URL Setting</b>	
URL	Enter a URL to specify the URL to be used by the device to download the signature database.  <b>NOTE:</b> The default URL is <a href="https://services.netscreen.com/cgi-bin/index.cgi">https://services.netscreen.com/cgi-bin/index.cgi</a> .



Table 256: Fields on the Download Setting Page (*continued*)

Field	Action
Proxy Profile	<p>Select an option from the list or create a new proxy profile inline.</p> <p>To create a new proxy profile inline:</p> <ol style="list-style-type: none"> <li>1. Click <b>Create</b>.</li> </ol> <p>Create Proxy Profile page appears.</p> <ol style="list-style-type: none"> <li>2. Enter the following details: <ul style="list-style-type: none"> <li>• Profile Name—Enter a unique proxy profile name.</li> <li>• Connection Type: <ul style="list-style-type: none"> <li>• Server IP—Enter the IP address of the server.</li> <li>• Host Name—Enter the host name.</li> </ul> </li> <li>• Port Number—Select the port number by using top/down arrows. Range: 0 through 65535.</li> </ul> </li> <li>3. Click <b>OK</b>.</li> </ol>
<b>Auto Download Setting</b>	
Interval	Enter an integer to specify the time interval for automatic download.
Start Time	<p>Specifies that the latest policy templates are to be installed from the portal.</p> <p>Enter a time value in YYYY-MM-DD HH:MM:SS format.</p>
Enable Schedule Update	Select the check box to activate automatic download settings.
Reset Setting	Click Reset Setting to reset the values.

## RELATED DOCUMENTATION

[About the Signature Update Page | 689](#)
[Download an IPS Signature | 690](#)
[Install an IPS Signature | 691](#)
[Check Status of the IPS Signature | 692](#)

# Security Services—IPS Sensor

IN THIS CHAPTER

- About the Sensor Page | 695

## About the Sensor Page

You are here: **Configure > Security Services > IPS > Sensor.**

You can configure sensor settings to limit the number of sessions running application identification and also to limit memory usage for application identification.

### Field Descriptions

Table 257 on page 695 describes the fields on the Sensor page.

Table 257: Fields on the Sensor Page

Field	Description
Basic Settings	Select to configure basic IPS sensor settings.
IDP Protection Mode	
Protection Mode	Select an option to specify the inspection parameters for efficient inspection of traffic in the device. The options available are: <ul style="list-style-type: none"><li>• DataCenter—Disables all STC traffic inspection.</li><li>• Datacenter Full—Disables all STC traffic inspection.</li><li>• Perimeter—Inspects all STC (Server To Client) traffic.</li><li>• Perimeter Full—Inspects all STC traffic.</li></ul>
Intelligent Inspection	
IDP By Pass	Enable or disable the IDP Intelligent Bypass option.

Table 257: Fields on the Sensor Page (continued)

Field	Description
IDP By Pass CPU Threshold	<p>Enter the threshold value.</p> <p>Range: 0 through 99. Default value: 85.</p>
IDP By Pass CPU Tolerance	<p>Enter the CPU tolerance value.</p> <p>Range: 1 through 99. Default value: 5.</p>
Intelligent Inspection	<p>Enable or disable this option.</p> <p>If you enable this option, enter the following details:</p> <ul style="list-style-type: none"> <li>• Ignore Content Decompression— Enable this option to enable payload content decompression.</li> <li>• Signature Severity—Select the severity level of the attack from the list that the signature will report for IDP processing. The available options are: minor, major, and critical.</li> </ul> <p><b>NOTE:</b> Click <b>Clear All</b> to clear all the selected severity values.</p> <ul style="list-style-type: none"> <li>• Protocols—Select the protocols from the list that needs to be processed in Intelligent Inspection mode.</li> </ul> <p><b>NOTE:</b> Click <b>Clear All</b> to clear all the selected protocols.</p> <ul style="list-style-type: none"> <li>• CPU Threshold (%)—Enter the value of CPU usage threshold percentage for intelligent inspection.</li> </ul> <p>Range: 0 through 99 percent.</p> <ul style="list-style-type: none"> <li>• CPU Tolerance (%)—Enter the value of CPU usage tolerance percentage for intelligent inspection.</li> </ul> <p>Range: 1 through 99 percent.</p> <ul style="list-style-type: none"> <li>• Memory Tolerance—Enter the value of memory tolerance percentage for intelligent inspection.</li> </ul> <p>Range: 1 through 100 percent.</p> <ul style="list-style-type: none"> <li>• Free Memory Threshold—Enter the value of free memory threshold percentage for intelligent inspection.</li> </ul> <p>Range: 1 through 100 percent.</p> <ul style="list-style-type: none"> <li>• Session Bytes Depth—Enter the value of session bytes scanning depth.</li> </ul> <p>Range: 1 through 1000000 bytes.</p>
Memory Lower Threshold	<p>Enter the memory lower threshold limit percentage.</p> <p>Range: 1 through 100.</p>

Table 257: Fields on the Sensor Page (continued)

Field	Description
Memory Upper Threshold	Enter the memory upper threshold limit percentage.  Range: 1 through 100.
<b>Flow</b>	
Drop On Limit	Enable this option to specify the dropped connections on exceeding resource limits.
Drop On Failover	Enable this option to specify the dropped traffic on HA failover sessions.
Drop If No Policy Loaded	Enable this option to specify all the dropped traffic till IDP policy gets loaded.
<b>Packet Log</b>	
<b>NOTE:</b> Starting in Junos OS Release 19.2R1, Packet Log configuration is available.	
IP Address	Enter the IP address of the destination host to send packet log.
Port	Enter the UDP port number.  Range: 0-65535.
Source Address	Enter the source IP address used to transport packet log to a host.
<b>Advanced Settings</b>	
<b>IDP Flow</b>	
Log Errors	Enable this option to specify if the flow errors have to be logged.  Select an option from the list.
Flow FIFO Max Size	Enter a value to specify the maximum FIFO size.  Range: : 1 through 65535. Default value is 1.
Hash Table Size	Enter a value to specify the hash table size.  Range: 1024 through 1,000,000. Default value is 1024.
Max Timers Poll Ticks	Enter a value to specify the maximum amount of time at which the timer ticks at a regular interval.  Range: 0 through 1000 ticks. Default value is 1000 ticks.

Table 257: Fields on the Sensor Page (*continued*)

Field	Description
Reject Timeout	<p>Enter a value to specify the amount of time in milliseconds within which a response must be received.</p> <p>Range: 1 through 65,535 seconds. Default value is 300 seconds.</p>
<b>Global</b>	
Enable All Qmodules	Select an option from the list to specify all the qmodules of the global rulebase IDP security policy are enabled.
Enable Packet Pool	Select an option from the list to specify the packet pool is enabled to be used when the current pool is exhausted.
Policy Lookup Cache	Select an option from the list to specify the cache is enabled to accelerate IDP policy lookup.
Memory Limit Percent	<p>Enter a value to specify the limit IDP memory usage at this percent of available memory.</p> <p>Range: 10 through 90 percent.</p>
<b>IPS</b>	
Detect Shellcode	Select an option from the list to specify if shellcode detection has to be applied.
Ignore Regular Expression	Select an option from the list to specify if the sensor has to bypass DFA and PCRE matching.
Process Ignore Server-to-Client	Select an option from the list to specify if the sensor has to bypass IPS processing for server-to-client flows.
Process Override	Select an option from the list to specify if the sensor has to execute protocol decoders even without an IDP policy.
Process Port	<p>Enter an integer to specify a port on which the sensor executes protocol decoders.</p> <p>Range: 0 through 65535.</p>
IPS FIFO Max Size	<p>Enter an integer to specify the maximum allocated size of the IPS FIFO.</p> <p>Range: 1 through 65535.</p>

Table 257: Fields on the Sensor Page (continued)

Field	Description
Minimum Log Supercade	Enter an integer to specify the minimum number of logs to trigger the signature hierarchy feature.  Range: 0 through 65535.
<b>Log</b>	
Cache Size	Enter a value to specify the size in bytes for each user's log cache.
Disable Suppression	Enable this option to specify if the log suppression has to be disabled.
Include Destination Address	Select an option from the list to specify if combine log records for events with a matching source address.
Max Logs Operate	Enter a value to specify the maximum number of logs on which log suppression can operate. Range is 255 through 65536.
Max Time Report	Enter a value to specify the time (seconds) after which suppressed logs will be reported. IDP reports suppressed logs after 5 seconds by default.
Start Log	Enter a value to specify the number of log occurrences after which log suppression begins. Log suppression begins with the first occurrence by default.  Range is 1 through 128.
<b>Reassembler</b>	
Ignore Memory Overflow	Select an option from the list to specify if the user has to allow per-flow memory to go out of limit.
Ignore Reassembly Memory Overflow	Select an option from the list to specify if the user has to allow per-flow reassembly memory to go out of limit.
Ignore Reassembly Overflow	Enable this option to specify the TCP reassembler to ignore the global reassembly overflow to prevent the dropping of application traffic.
Max Flow Memory	Enter an integer to specify the maximum per-flow memory for TCP reassembly in kilobytes.  Range: 64 through 4,294,967,295 kilobytes.

Table 257: Fields on the Sensor Page *(continued)*

Field	Description
Max Packet Memory	Enter an integer to specify the maximum packet memory for TCP reassembly in kilobytes.  Range: 64 through 4,294,967,295 kilobytes
Max Synacks Queued	Enter an integer to specify the maximum limit for queuing Syn/Ack packets with different SEQ numbers.  Range: 0 through 5
<b>Packet Log</b>	
Max Sessions	Enter an integer to specify the maximum number of sessions actively conducting pre-attack packet captures on a device at one time.  Range: 1 through 100 percent
Total Memory	Enter an integer to specify the maximum amount of memory to be allocated to packet capture for the device.  Range: 1 through 100 percent
<b>Detectors</b>	Click + and enter the following fields.
Protocol	Select the name of the protocol from the list to enable or disable the detector.
Tunable Name	Select the name of the specific tunable parameter from the list to enable or disable the protocol detector for each of the services.
Tunable Value	Enter the protocol value of the specific tunable parameter to enable or disable the protocol detector for each of the services.  Range: 0 to 4294967295

**Release History Table**

Release	Description
<a href="#">19.2R1</a>	Starting in Junos OS Release 19.2R1, Packet Log configuration is available.

## RELATED DOCUMENTATION





# Security Services—IPS Policy

## IN THIS CHAPTER

- [About the Policy Page | 702](#)
- [IDP Policy Template | 704](#)
- [Check Status of the IDP Policy | 705](#)
- [Add an IDP Policy | 705](#)
- [Edit an IDP Policy | 708](#)
- [Delete IDP Policy | 709](#)
- [Clone an IDP Policy | 709](#)

## About the Policy Page

You are here: **Configure > Security Services > IPS > Policy.**

Use this page to configure IPS policies.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Download, install, load and unload a template. See [“IDP Policy Template” on page 704](#).
- Check status of the IDP policy. See [“Check Status of the IDP Policy” on page 705](#).
- Set a IPS policy as default policy. To do this, select an existing IPS policy and click Set Default.
- Create an IDP policy. See [“Add an IDP Policy” on page 705](#).
- Edit an IDP policy. See [“Edit an IDP Policy” on page 708](#).
- Delete an IDP policy. See [“Delete IDP Policy” on page 709](#).
- Clone an IDP policy. See [“Clone an IDP Policy” on page 709](#).

Field Descriptions

Table 252 on page 690 describes the fields on the IPD policy page.

Table 258: Fields on the IPD Policy Page

Field	Description
-------	-------------

Policy List

**NOTE:** IDP policies that are created by root users in root-logical-system are not displayed in security profile advanced settings if you have logged in as a logical system user.

Name	Displays the IDP policy name.
Type	Displays the IDP policy type.
IPS Rule Number	Displays the number of rule based IP profiles that are configured.
Exempt Rule Number	Displays the number of rule based exempt profiles that are configured.
Rulebase-IPS	Displays the IPS rulebase to detect attacks based on stateful signature and protocol anomalies.
Rulebase-Exempt	Displays the exempt rulebase to skip detection of a set of attacks in certain traffic.

Release History Table

Release	Description
<a href="#">18.3R1</a>	IDP policies that are created by root users in root-logical-system are not displayed in security profile advanced settings if you have logged in as a logical system user.

RELATED DOCUMENTATION

<a href="#">IDP Policy Template   704</a>
<a href="#">Check Status of the IDP Policy   705</a>
<a href="#">Add an IDP Policy   705</a>
<a href="#">Edit an IDP Policy   708</a>
<a href="#">Delete IDP Policy   709</a>
<a href="#">Clone an IDP Policy   709</a>

# IDP Policy Template

You are here: **Configure > Security Services > IPS > Policy.**

To download, install, load, and unload an IDP policy template:

1. Click **Template** on the upper right side of the Policy page.  
The IDP policy template options appears.
2. [Table 259 on page 704](#) describes the fields on the IDP Policy Template page.
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 259: Template Details

Field	Action
Download Template	<p>Downloads a template from the server.</p> <p><b>NOTE:</b></p> <ul style="list-style-type: none"><li>• New template will overwrite existing predefined policies. Click OK to install the new template.</li><li>• To configure URL, navigate to Security &gt; IDP &gt; Signature Update and click Download Setting.</li></ul>
Install Template	Installs the template to the router.
Load Template	Loads the predefined policies to the policy list.
Unload Template	Unloads the predefined policies from the policy list.

## RELATED DOCUMENTATION

- [About the Policy Page | 702](#)
- [Check Status of the IDP Policy | 705](#)
- [Add an IDP Policy | 705](#)
- [Edit an IDP Policy | 708](#)
- [Delete IDP Policy | 709](#)
- [Clone an IDP Policy | 709](#)

# Check Status of the IDP Policy

You are here: **Configure** > **Security Services** > **IPS** > **Policy**.

To check status of the IDP policy:

1. Click **Check Status** on the upper right side of the Policy page.  
The Check Status option appears.
2. [Table 260 on page 705](#) describes the fields on the IDP Policy Check Status page.
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 260: Check Status Details

Field	Action
Download Status	Displays downloads status information from the Check Status list.
Install Status	Displays installs status information from the Check Status list.

## RELATED DOCUMENTATION

- [About the Policy Page | 702](#)
- [IDP Policy Template | 704](#)
- [Add an IDP Policy | 705](#)
- [Edit an IDP Policy | 708](#)
- [Delete IDP Policy | 709](#)
- [Clone an IDP Policy | 709](#)

# Add an IDP Policy

You are here: **Configure** > **Security Services** > **IPS** > **Policy**.

To add an IDP policy:

1. Click the add icon (+) on the upper right side of the Policy page.  
The Add IDP Policy page appears.

2. Complete the configuration according to the guidelines provided in [Table 261 on page 706](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

**Table 261: Fields on the Add IDP Policy Page**

Field	Action
Policy Name	Enter the name of the IPS policy.
IPS Rule	<p>Specifies the IPS rule created. The options available are:</p> <ul style="list-style-type: none"> <li>● <b>Add</b>—Adds a new IPS rule.</li> <li>● <b>Edit</b>—Edits the selected IPS rule.</li> <li>● <b>Delete</b>—Deletes the selected record.</li> <li>● <b>Move</b>—Organize rows. Select <b>Move up</b>, <b>Move down</b>, <b>Move to top</b>, or <b>Move to down</b>.</li> </ul> <p>Select an option.</p>
<b>Basic</b>	
Policy Name	Displays the name of the IDP policy.
Rule Name	Enter a rule name.
Rule Description	Enter the description for the rule.
Action	Select a rule action from the list to specify the list of all the rule actions for IDP to take when the monitored traffic matches the attack objects specified in the rules.
Application	<p>Specifies the list of one or multiple configured applications.</p> <p>Select the applications to be matched.</p>
Attack Type	<p>Specifies the attack type that you do not want the device to match in the monitored network traffic. The options available are:</p> <ul style="list-style-type: none"> <li>● Predefined Attacks</li> <li>● Predefined Attack Groups</li> </ul> <p>Select an option from the list and click the right arrow to match an attack object or attack group to the rule.</p>
Category	Select a category from the list to specify the category used for scrutinizing rules of sets.
Severity	Select a severity level from the list to specify the rule severity levels in logging to support better organization and presentation of log records on the log server.

Table 261: Fields on the Add IDP Policy Page (continued)

Field	Action
Direction	Select a direction level from the list to specify the direction of network traffic you want the device to monitor for attacks.
Search	Enables you to search a specific data from the list.
<b>Advanced</b>	
<b>NOTE:</b> This tab is not available for Rulebase exempt.	
IP Action	Specifies the action that IDP takes against future connections that use the same IP address.  Select an IP action from the list.
IP Target	Select an IP target from the list.
Timeout	Specifies the number of seconds the IP action should remain effective before new sessions are initiated within that specified timeout value.  Enter the timeout value, in seconds. The maximum value is 65,535 seconds.
Log IP Action	Select the check box to specify whether or not the log attacks are enabled to create a log record that appears in the log viewer.
Enable Attack Logging	Select the check box to specify whether or not the configuring attack logging alert is enabled.
Set Alert Flag	Select the check box to specify whether or not an alert flag is set.
Severity	Select an option from the list to specify the rule severity level.
Terminal	Select the check box to specify whether or not the terminal rule flag is set.
<b>Match</b>	
From Zone	Select the match criteria for the source zone for each rule.
To Zone	Select the match criteria for the destination zone for each rule.

Table 261: Fields on the Add IDP Policy Page (*continued*)

Field	Action
Source Address	<p>Select the zone exceptions for the from-zone and source address for each rule. The options available are:</p> <ul style="list-style-type: none"> <li>• Match—Matches the from-zone and source address/address sets to the rule.</li> <li>• Except—Enables the exception criteria.</li> </ul>
Destination Address	<p>Select the zone exceptions for the to-zone and destination address for each rule. The options available are:</p> <ul style="list-style-type: none"> <li>• Match—Matches the from-zone and destination address/address sets to the rule.</li> <li>• Except—Enables the exception criteria.</li> </ul>

## RELATED DOCUMENTATION

[About the Policy Page | 702](#)
[IDP Policy Template | 704](#)
[Check Status of the IDP Policy | 705](#)
[Edit an IDP Policy | 708](#)
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[Clone an IDP Policy | 709](#)

## Edit an IDP Policy

You are here: **Configure** > **Security Services** > **IPS** > **Policy**.

To edit an IDP policy:

1. Select an existing IDP policy that you want to edit on the IPS Policy page.
2. Click the pencil icon available on the upper right side of the page.

The Edit IDP Policy page appears with editable fields. For more information on the options, see [“Add an IDP Policy” on page 705](#).

3. Click **OK** to save the changes.

RELATED DOCUMENTATION

<a href="#">About the Policy Page   702</a>
<a href="#">IDP Policy Template   704</a>
<a href="#">Check Status of the IDP Policy   705</a>
<a href="#">Add an IDP Policy   705</a>
<a href="#">Delete IDP Policy   709</a>
<a href="#">Clone an IDP Policy   709</a>

## Delete IDP Policy

You are here: **Configure** > **Security Services** > **IPS** > **Policy**.

To delete an IDP policy:

1. Select an IDP policy that you want to delete on the IPS Policy page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the profile.

RELATED DOCUMENTATION

<a href="#">About the Policy Page   702</a>
<a href="#">IDP Policy Template   704</a>
<a href="#">Check Status of the IDP Policy   705</a>
<a href="#">Add an IDP Policy   705</a>
<a href="#">Edit an IDP Policy   708</a>
<a href="#">Clone an IDP Policy   709</a>


## Clone an IDP Policy

You are here: **Configure** > **Security Services** > **IPS** > **Policy**.



To clone an IDP policy:

1. Select an IDP policy that you want to clone and click **Clone** on the upper right side of the page.

**NOTE:** Alternatively, you can right-click on the selected IDP policy and select **Clone**.

The Clone IDP Policy page appears with editable fields. For more information on the fields, see [“Add an IDP Policy” on page 705](#).

2. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

RELATED DOCUMENTATION

<a href="#">About the Policy Page   702</a>
<a href="#">IDP Policy Template   704</a>
<a href="#">Check Status of the IDP Policy   705</a>
<a href="#">Add an IDP Policy   705</a>
<a href="#">Edit an IDP Policy   708</a>
<a href="#">Delete IDP Policy   709</a>

# Security Services—Threat Prevention Policies

## IN THIS CHAPTER

- [About the Threat Prevention Policies Page | 711](#)
- [Add a Threat Prevention Policy | 712](#)
- [Edit a Threat Prevention Policy | 713](#)
- [Delete Threat Prevention Policy | 714](#)
- [Search for Text in Threat Prevention Policies Table | 715](#)

## About the Threat Prevention Policies Page

You are here: **Configure** > **Security Services** > **Threat Prevention** > **Policies**.

You can view and configure threat prevention policies. Threat prevention policies provide protection and monitoring for configured threat profiles, including command and control server, infected hosts, and malware. Using threat intelligence feeds in policies, ingress and egress traffic is monitored for suspicious content and behavior.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Create a threat prevention policy. See [“Add a Threat Prevention Policy” on page 712](#).
- Edit a threat prevention policy. See [“Edit a Threat Prevention Policy” on page 713](#).
- Delete a threat prevention policy. See [“Delete Threat Prevention Policy” on page 714](#).
- Search for text in a threat prevention policy. See [“Search for Text in Threat Prevention Policies Table” on page 715](#).

### Field Descriptions

[Table 262 on page 712](#) describes the fields on the Threat Prevention Policies page.

Table 262: Fields on the Threat Prevention Policies Page

Field	Description
Name	Enter a threat prevention policy name.  Name must begin with an alphanumeric character; dashes and underscores are allowed; cannot exceed 63 characters.
C&C Server	Displays the range value of threat score set for this policy on a C&C server. A C&C profile would provide information on C&C servers that have attempted to contact and compromise hosts on your network. If the threat score of a feed is between this range, the feed will be blocked or permitted based on the threat score.
Infected Host	Displays the range value of threat score set for this policy if . An infected host profile would provide information on compromised hosts and their associated threat levels.
Malware HTTP	A malware profile would provide information on files downloaded by hosts and found to be suspicious based on known signatures or URLs.
Malware SMTP	A malware profile would provide information on files downloaded by hosts and found to be suspicious based on known signatures or URLs.
Log	All traffic is logged by default. Use the pulldown to narrow the types of traffic to be logged.
Description	Enter a description for the threat prevention policy.

## RELATED DOCUMENTATION

[Add a Threat Prevention Policy | 712](#)
[Edit a Threat Prevention Policy | 713](#)
[Delete Threat Prevention Policy | 714](#)
[Search for Text in Threat Prevention Policies Table | 715](#)

## Add a Threat Prevention Policy

You are here: **Configure > Security Services > Threat Prevention > Policies.**

To add a threat prevention policy:

1. Click the add icon (+) on the upper right side of the Threat Prevention Policy page.

The Create Threat Prevention Policy page appears.

- 2. Complete the configuration according to the guidelines provided in [Table 263 on page 713](#).
- 3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 263: Fields on the Create Threat Prevention Policy Page

Field	Action
Name	Displays the threat prevention policy name.
Description	Displays the threat prevention policy description.
Profiles	
Include C&C profile in policy	Select the check box.
Include infected host profile in policy	Select the check box.
Include malware profile in policy	Select the check box.
Log Setting	
Log Setting	Select an option from the list. The available options are: <ul style="list-style-type: none"><li>• Log all traffic</li><li>• Log only blocked traffic</li><li>• Do not log any traffic</li></ul>

RELATED DOCUMENTATION

<a href="#">About the Threat Prevention Policies Page   711</a>
<a href="#">Edit a Threat Prevention Policy   713</a>
<a href="#">Delete Threat Prevention Policy   714</a>
<a href="#">Search for Text in Threat Prevention Policies Table   715</a>

Edit a Threat Prevention Policy

You are here: **Configure > Security Services > Threat Prevention > Policies.**

To edit a threat prevention policy:

1. Select the existing a threat prevention that you want to edit on the Threat Prevention Policies page.
2. Click the pencil icon available on the upper right side of the page.

The Edit a Threat Prevention page appears with editable fields. For more information on the options, see [“Add a Threat Prevention Policy” on page 712](#).

3. Click **OK** to save the changes.

#### RELATED DOCUMENTATION

[About the Threat Prevention Policies Page | 711](#)

[Add a Threat Prevention Policy | 712](#)

[Delete Threat Prevention Policy | 714](#)

[Search for Text in Threat Prevention Policies Table | 715](#)

## Delete Threat Prevention Policy

You are here: **Configure** > **Security Services** > **Threat Prevention** > **Policies**.

To delete a threat prevention policy:

1. Select a threat prevention policy that you want to delete on the Threat Prevention Policies page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the profile.

#### RELATED DOCUMENTATION

[About the Threat Prevention Policies Page | 711](#)

[Add a Threat Prevention Policy | 712](#)

[Edit a Threat Prevention Policy | 713](#)

[Search for Text in Threat Prevention Policies Table | 715](#)

# Search for Text in Threat Prevention Policies Table

You can use the search icon in the top right corner of the Threat Prevention Policies page to search for text containing letters and special characters on that page.

To search for text:

1. Click the search icon. Enter partial text or full text of the keyword in the search bar.

The search results are displayed.

2. Click **X** next to a search keyword or click **Clear All** to clear the search results.

## RELATED DOCUMENTATION

<a href="#">About the Threat Prevention Policies Page   711</a>
---

<a href="#">Add a Threat Prevention Policy   712</a>
--

<a href="#">Edit a Threat Prevention Policy   713</a>
---

<a href="#">Delete Threat Prevention Policy   714</a>
---

# Security Services—IPSec VPN Global Settings

IN THIS CHAPTER

- About the Global Settings Page | 716

## About the Global Settings Page

You are here: **Configure** > **Security Services** > **IPSec VPN** > **Global Settings**.

You can view or add the VPN Global configuration details.

### Field Descriptions

Table 264 on page 716 describes the fields on the VPN global settings page.

Table 264: Fields on the VPN Global Settings Page

Field	Description
IKE Global Settings	
Response Bad SPI	Select the check box if you want the device to respond to IPsec packets with invalid SPI values.
Maximum Responses	Enter a value from 1 through 30 to respond to invalid SPI values per gateway. The default is 5. This option is available when Response Bad SPI is selected.
IPsec Global Settings	
VPN Monitor Options	Select the check box if you want the device to monitor VPN liveliness.
Interval	Enter a value from 1 through 36,000 seconds at which ICMP requests are sent to the peer.
Threshold	Enter a value from 1 through 65,536 to specify the number of consecutive unsuccessful pings before the peer is declared unreachable.

Table 264: Fields on the VPN Global Settings Page (*continued*)

Field	Description
Enable Key-protection	<p>Select the check box to improve security. When key protection is enabled, persistent keys are encrypted when not in use.</p> <p><b>NOTE:</b> This option is available for SRX300 line of devices and SRX550M devices.</p>
Internal SA	<p>Select the check box for secure login and to prevent attackers from gaining privileged access through this control port by configuring the internal IPsec security association (SA).</p> <p><b>NOTE:</b> This option is available only for SRX5000 line of devices, SRX4100, SRX4200, SRX4600, and vSRX devices.</p>
Key (24 bytes)	<p>Enter the encryption key. You must ensure that the manual encryption key is in ASCII text and 24 characters long; otherwise, the configuration will result in a commit failure.</p> <p><b>NOTE:</b> This option is available only for SRX5000 line of devices, SRX4100, SRX4200, SRX4600, and vSRX devices.</p> <p>Click Refresh to activate the latest committed change of Internal SA configuration.</p>
PowerMode IPSec	<p>Select the check box to push the relevant IPSec configuration required for the device.</p> <p><b>NOTE:</b> Starting in Junos OS Release 19.1R1, PowerMode IPSec (PMI) configuration supports only SRX4100, SRX4200, SRX4600, SRX5000 line of devices with SPC3 card, and vSRX2.0 device.</p> <p><b>NOTE:</b></p> <ul style="list-style-type: none"> <li>• By default, PFE service restarts automatically after the commit. The PFE service will not explicitly restart.</li> <li>• The J-Web user interface allows you to enable or disable PMI depending on the configuration required for each of the devices.</li> </ul>
<b>TCP-Encap</b>	
Profile Name	Displays the name for the TCP encapsulation profile.
Syslog Status	Displays if the log status is enabled or disabled.



Table 264: Fields on the VPN Global Settings Page (*continued*)

Field	Description
+	<p>To add a TCP encapsulation:</p> <ol style="list-style-type: none"> <li>Click + . Add TCP encapsulation window appears.</li> <li>Enter the following details: <ul style="list-style-type: none"> <li>Profile Name—Enter a name for the TCP encapsulation profile.</li> <li>Syslogs—Select the check box to enable logging for remote access client connections.</li> </ul> </li> <li>Click <b>OK</b> to save the changes. Else, click <b>Cancel</b> to discard the changes.</li> </ol>
Edit	Select a TCP encapsulation profile that you want to edit and click on the pencil icon at the upper right of the table. You can enable or disable the Syslogs option. Click <b>OK</b> to save the changes. Else, click <b>Cancel</b> to discard the changes.
Delete	Select a TCP encapsulation profile that you want to delete and click on the delete icon at the upper right of the table. Click <b>OK</b> to save the changes. Else, click <b>Cancel</b> to discard the changes.

## Release History Table

Release	Description
<a href="#">19.1R1</a>	Starting in Junos OS Release 19.1R1, PowerMode IPSec (PMI) configuration supports only SRX4100, SRX4200, SRX4600, SRX5000 line of devices with SPC3 card, and vSRX2.0 device.

## RELATED DOCUMENTATION

[About the IKE \(Phase I\) Page](#) | 719

# Security Services—IPSec VPN IKE (Phase I)

## IN THIS CHAPTER

- [About the IKE \(Phase I\) Page | 719](#)
- [Add a Gateway | 721](#)
- [Add an IPSec Policy | 725](#)
- [Add a Proposal | 728](#)
- [Edit an IKE \(Phase I\) Configuration | 732](#)
- [Delete IKE \(Phase I\) Configuration | 733](#)

## About the IKE (Phase I) Page

You are here: **Configure** > **Security Services** > **IPSec VPN** > **IKE (Phase I)**.

Use this page to configure IPSec VPN IKE (phase I).

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a gateway. See [“Add a Gateway” on page 721](#).
- Add an IPSec policy. See [“Add an IPSec Policy” on page 725](#).
- Add a proposal. See [“Add a Proposal” on page 728](#).
- Edit an IKE (Phase I) configuration. See [“Edit an IKE \(Phase I\) Configuration” on page 732](#).
- Delete an IKE (Phase I) configuration. See [“Delete IKE \(Phase I\) Configuration” on page 733](#).
- Launch VPN wizard. To do this, click Launch Wizard available on the upper right corner of the IKE (Phase I) table. Follow the guided steps to configure the VPN wizard.

### Field Descriptions

[Table 265 on page 720](#) describes the fields on the IKE (Phase I) Configuration page.

Table 265: Fields on the IKE (Phase I) Configuration Page

Field	Description
<b>Gateway</b>	
Gateway Name	Displays the name of the gateway to be searched.
Search	Displays the text box for searching a gateway.
Name	Displays the name of the destination peer gateway, specified as an alphanumeric string.
IKE Policy	Displays the name of the IKE policy.
External Interface	Displays the name of the interface to be used to send traffic to the IPsec VPN.
Remote Identity	Displays information about the remote peer.
IKE Version	Displays the version of the IKE policy.
<b>IKE Policy</b>	
Name	Displays the name of the policy.
Description	Provides a description of the policy.
Mode	Displays the mode of configuration.
Authentication Method	Displays the authentication method configured.
Proposal	Displays the name of the proposal configured to be used by this policy in Phase 1.
<b>Proposal</b>	
Name	Displays the name of the proposal selected.
Authentication Algorithm	Displays the hash algorithm configured or selected.
Authentication Method	Displays the authentication method selected.
Encryption Algorithm	Displays the supported IKE proposals.

RELATED DOCUMENTATION

<a href="#">Add a Gateway   721</a>
<a href="#">Add an IPSec Policy   725</a>
<a href="#">Add a Proposal   728</a>
<a href="#">Edit an IKE (Phase I) Configuration   732</a>
<a href="#">Delete IKE (Phase I) Configuration   733</a>

## Add a Gateway

You are here: **Configure** > **Security Services** > **IPSec VPN** > **IKE (Phase I)**.

To add a gateway policy:

1. Click the add icon (+) on the upper right side of the Gateway tab of IKE (Phase I) page.  
The Add Gateway page appears.
2. Complete the configuration according to the guidelines provided in [Table 266 on page 721](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 266: Fields on the Add Gateway Policy Page

Field	Action
<b>IKE Gateway</b>	
<b>NOTE:</b> When IKE gateway is configured for Dynamic VPN, please select <b>Host Name</b> for Identity Type.	
Name	Enter the name of the gateway.
Policy	Enter the name of the policy you configured for Phase 1.
External Interface	Select an outgoing interface from the list to specify the name of the interface to be used to send traffic to the IPsec VPN.  Specifies the outgoing interface for IKE SAs. This interface is associated with a zone that acts as its carrier, providing firewall security for it.
Site to Site VPN	Select the Site to Site VPN radio button.

Table 266: Fields on the Add Gateway Policy Page (continued)

Field	Action
Remote Peer IP	Enter the Remote Peer IP and click + to add it. You can select the Remote Peer IP and click the delete (X) icon to delete the IP.
Address/FQDN	Specifies the address or FQDN of the peer.  Enter information about the peer IP or domain name.
Local Identity Type	Select one of the identity type options. The identify types are as follows: <ul style="list-style-type: none"> <li>• <b>IP Address</b> - Enter an IP address when you select this option from the list.</li> <li>• <b>Host Name</b> - Enter a hostname when you select this option from the list.</li> <li>• <b>Email Address</b> - Enter an email address when you select this option from the list.</li> <li>• <b>Distinguished Name</b> - Enter the following details when you select this option: <ul style="list-style-type: none"> <li>• Container-Enter a keyword to specify that the order of the fields in a DN and their values exactly match the configured DN.</li> <li>• Wilcard-Enter a keyword to specify that the values of fields in a DN must match but the order of the fields does not matter.</li> </ul> </li> </ul>
Remote Identity Type	Select one of the remote identity types from the list: <ul style="list-style-type: none"> <li>• <b>IP Address</b> - Enter an IP address when you select this option from the list.</li> <li>• <b>Host Name</b> - Enter a hostname when you select this option from the list.</li> <li>• <b>Email Address</b> - Enter an email address when you select this option from the list.</li> <li>• <b>Distinguished Name</b> - Enter the following details when you select this option:</li> </ul>
Remote Access VPN	Select the Remote Access VPN radio button.
Connections limit	Enter the limit on connections.

Table 266: Fields on the Add Gateway Policy Page (continued)

Field	Action
IKE user type	<p>Select one of the IKE user types from the list:</p> <ul style="list-style-type: none"> <li>• <b>group-ike-id</b></li> <li>• <b>shared-ike-id</b></li> </ul>
Local Identity Type	<p>Select one of the identity types from the list:</p> <ul style="list-style-type: none"> <li>• <b>IP Address</b> - Enter an IP address when you select this option from the list.</li> <li>• <b>Host Name</b> - Enter a hostname when you select this option from the list.</li> <li>• <b>Email Address</b> - Enter an email address when you select this option from the list.</li> <li>• <b>Distinguished Name</b> - Enter the following details when you select this option:</li> </ul>
Remote Identity Type	<p>Select one of the remote identity types from the list:</p> <ul style="list-style-type: none"> <li>• <b>IP Address</b> - Enter an IP address when you select this option from the list.</li> <li>• <b>Host Name</b> - Enter a hostname when you select this option from the list.</li> <li>• <b>Email Address</b> - Enter an email address when you select this option from the list.</li> <li>• <b>Distinguished Name</b> - Enter the following details when you select this option:</li> </ul>
IKE Version	<p>Select one of the IKE versions from the list:</p> <ul style="list-style-type: none"> <li>• <b>v1-only</b></li> <li>• <b>v2-only</b></li> </ul> <p>Enter the following details when you select this option:</p> <ul style="list-style-type: none"> <li>• <b>IKE Fragmentation</b>-Select the check box to enable IKE fragmentation. Enabled means that both the IKEv2 initiator and responder support message fragmentation and have negotiated the support during the IKE_SA_INIT message exchange.</li> <li>• <b>IKE Fragment Size</b>-Enter a value to show the maximum size of an IKEv2 message before it is fragmented.</li> </ul>
<b>IKE Gateway Options</b>	

Table 266: Fields on the Add Gateway Policy Page (continued)

Field	Action
Identity Type	<p>Specifies the local IKE identity to send in the exchange with the destination peer so that the destination peer can communicate with the local peer. If you do not configure a local identity, the device uses the IP address corresponding to the local endpoint. Select one of the identity types:</p> <ul style="list-style-type: none"> <li>• <b>IP Address</b>—IPv4 IP address to identify the dynamic peer.</li> <li>• <b>Hostname</b>—Fully qualified domain name (FQDN) to identify the dynamic peer.</li> <li>• <b>User at Hostname</b>—E-mail address to identify the dynamic peer.</li> <li>• <b>Distinguished Name</b>—Name to identify the dynamic peer. The distinguished name appears in the subject line of the Public Key Infrastructure (PKI) certificate. For example: Organization: juniper, Organizational unit: slt, Common name: common.</li> </ul>
Dead Peer Detection	<p>Select the check box to enable DPD.</p> <p><b>NOTE:</b> When IKE gateway is configured for Dynamic VPN, Dead Peer Detection option is not required.</p>
Always send	<p>Select the check box for the device to send DPD requests regardless of whether there is outgoing IPsec traffic to the peer.</p>
Interval	<p>Specifies the amount of time that the peer waits for traffic from its destination peer before sending a DPD request packet.</p> <p>Enter the interval at which to send DPD messages. Range: 1 through 60 seconds.</p>
Threshold	<p>Enter the maximum number of unsuccessful DPD requests to be sent before the peer is considered unavailable. Range: 1 through 5. Default: 5.</p>
AAA	<p>Select AAA from the list to provide AAA in addition to IKE authentication for remote users trying to access a VPN tunnel.</p>

Table 266: Fields on the Add Gateway Policy Page (continued)

Field	Action
NAT-Traversal	Select the checkbox to enable NAT-T. NAT-T is enabled by default.
+	<p>To add a TCP encapsulation:</p> <ol style="list-style-type: none"> <li>1. Click + Add TCP encapsulation window appears.</li> <li>2. Enter the following details: <ul style="list-style-type: none"> <li>• Profile Name - Enter a name for the TCP encapsulation profile.</li> <li>• Syslogs - Select the check box to enable logging for remote access client connections.</li> </ul> </li> <li>3. Click OK to save the changes. Else, click Cancel to discard the changes.</li> </ol>
NAT-keepalive	Enter the interval, in seconds, at which NAT keepalive packets can be sent. Default: 5 seconds. Range: 1 through 300 seconds.

## RELATED DOCUMENTATION

[About the IKE \(Phase I\) Page | 719](#)
[Add an IPSec Policy | 725](#)
[Add a Proposal | 728](#)
[Edit an IKE \(Phase I\) Configuration | 732](#)
[Delete IKE \(Phase I\) Configuration | 733](#)

## Add an IPSec Policy

You are here: **Configure** > **Security Services** > **IPSec VPN** > **IKE (Phase I)**.

To add an IKE policy:

1. Click the add icon (+) on the upper right side of the IKE Policy tab of IKE (Phase I) page.

The Add Policy page appears.



2. Complete the configuration according to the guidelines provided in [Table 267 on page 726](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

**Table 267: Fields on the Add Policy Page**

Field	Action
<b>IKE Policy</b>	
Name	Enter the policy name.
Description	Enter a description of the policy.
Mode	<p>Select a mode from the list:</p> <ul style="list-style-type: none"> <li>● <b>Main mode</b>—This mode has three 2-way exchanges between the initiator and receiver. It is secure and preferred in the auto tunnel</li> <li>● <b>Aggressive mode</b>— This mode is faster than main mode. It is less secure and is used mostly for dial-up VPN.</li> </ul> <p><b>NOTE:</b> When this IKE policy is configured for Dynamic VPN, the mode should be aggressive.</p>
<b>Proposal</b>	
Predefined	<p>Click Predefined, and select a Phase 1 proposal types:</p> <ul style="list-style-type: none"> <li>● <b>basic</b></li> <li>● <b>compatible</b></li> <li>● <b>standard</b></li> <li>● <b>prime-128</b></li> <li>● <b>prime-256</b></li> <li>● <b>suiteb-gcm-128</b></li> <li>● <b>suiteb-gcm-256</b></li> </ul>
User defined	<p>Select User defined for Phase 1 proposal.</p> <p>Select the P1 Proposals from the Available table and by using the arrow move it to the Selected P1 Proposals table.</p>

Table 267: Fields on the Add Policy Page (continued)

Field	Action
Proposal List	<p>Select the P1 Proposals from the Available table and by using the arrow move it to the Selected P1 Proposals table.</p> <p><b>NOTE:</b> When this IKE policy is configured for Dynamic VPN, the selected P1 proposal can only have one item for User Defined.</p>
<b>IKE Policy Options</b>	
Pre Shared Key	<p>Specifies use of a preshared key for the VPN.</p> <p>The available options are as follows:.</p> <ul style="list-style-type: none"> <li>• <b>ASCII text</b></li> <li>• <b>Hexadecimal</b></li> </ul> <p>If a preshared key is selected, then configure the appropriate key.</p> <p><b>NOTE:</b> When this IKE policy is configured for Dynamic VPN, select Pre Shared Key.</p>
Certificate	Select this option to use a certificate for the VPN.
Local Certificate	Enter a local certificate identifier when the local device has multiple loaded certificates.
Peer Certificate Type	<p>Specifies use of a preferred type of certificate.</p> <p>Select a certificate type:</p> <ul style="list-style-type: none"> <li>• <b>PKCS7</b></li> <li>• <b>X509</b></li> </ul>

Table 267: Fields on the Add Policy Page (continued)

Field	Action
Trusted CA	<p>Specifies the preferred CA to use when requesting a certificate from the peer. If no value is specified, then no certificate request is sent (although incoming certificates are still accepted).</p> <p>Select a trusted CA from the list:</p> <ul style="list-style-type: none"> <li>• <b>None</b>—Use none of configured certificate authorities.</li> <li>• <b>Use All</b>—Device uses all configured certificate authorities.</li> <li>• <b>CA Index</b>—Preferred certificate authority ID for the device to use.</li> </ul>

## RELATED DOCUMENTATION

[About the IKE \(Phase I\) Page | 719](#)

[Add a Gateway | 721](#)

[Add a Proposal | 728](#)

[Edit an IKE \(Phase I\) Configuration | 732](#)

[Delete IKE \(Phase I\) Configuration | 733](#)

## Add a Proposal

You are here: **Configure** > **Security Services** > **IPSec VPN** > **IKE (Phase I)**.

To add a proposal:

1. Click the add icon (+) on the upper right side of the Proposal tab of IKE (Phase I) page.  
The Add Proposal page appears.
2. Complete the configuration according to the guidelines provided in [Table 268 on page 729](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 268: Fields on the Add Proposal Page

Field	Action
<b>IKE Proposal</b>	
Name	Enter a name of the proposal.
Authentication Algorithm	<p>Specifies the AH algorithm that the device uses to verify the authenticity and integrity of a packet. Select a hash algorithm from the list:</p> <ul style="list-style-type: none"> <li>• <b>md5</b>—Produces a 128-bit digest.</li> <li>• <b>sha1</b>—Produces a 160-bit digest.</li> <li>• <b>sha-256</b>—Produces a 256-bit digest.</li> </ul> <p><b>NOTE:</b> The sha-256 authentication algorithm is not supported with the dynamic VPN feature.</p> <ul style="list-style-type: none"> <li>• <b>sha-384</b>—Produces a 384-bit digest.</li> <li>• <b>sha-512</b>—Starting in Junos OS Release 19.1R1, this option is supported. Produces a 512-bit digest.</li> </ul> <p><b>NOTE:</b> Starting in Junos OS Release 19.1R1, the new Authentication algorithm supports SRX5000 line of devices with SPC3 card upon installation of junos-ike package only. To install junos-ike package from J-Web, navigate to <b>Configure &gt; Security Services &gt; IPsec VPN &gt; Global Settings</b> and click <b>Install</b>.</p>

Table 268: Fields on the Add Proposal Page (continued)

Field	Action
Authentication Method	<p>Specifies the method the device uses to authenticate the source of IKE messages. Select an option from the list:</p> <ul style="list-style-type: none"> <li>• <b>pre-shared-key</b>—Key for encryption and decryption that both participants must have before beginning tunnel negotiations.</li> <li>• <b>rsa-key</b>—Kinds of digital signatures, which are certificates that confirm the identity of the certificate holder.</li> <li>• <b>dsa-signatures</b> - Specifies the Digital Signature Algorithm (DSA).</li> <li>• <b>ecdsa-signatures-256</b> - The Elliptic Curve DSA (ECDSA) using the 256-bit elliptic curve secp256r1, as specified in the Federal Information Processing Standard (FIPS) Digital Signature Standard (DSS) 186-3.</li> <li>• <b>ecdsa-signatures-384</b> - The ECDSA using the 384-bit elliptic curve secp384r1, as specified in the FIPS DSS 186-3.</li> </ul>
Description	Enter a brief description of the IKE proposal.

Table 268: Fields on the Add Proposal Page (*continued*)

Field	Action
DH Group	<p>Specifies the Diffie-Hellman group. The DH exchange allows participants to produce a shared secret value over an unsecured medium without actually transmitting the value across the connection.</p> <p>Select a group from the list:</p> <ul style="list-style-type: none"> <li>• <b>None</b></li> <li>• <b>group1</b></li> <li>• <b>group2</b></li> <li>• <b>group5</b></li> <li>• <b>group14</b></li> <li>• <b>group19</b></li> <li>• <b>group20</b></li> <li>• <b>group24</b></li> <li>• <b>group15</b>—Starting in Junos OS Release 19.1R1, this option is supported.</li> <li>• <b>group16</b>—Starting in Junos OS Release 19.1R1, this option is supported.</li> <li>• <b>group21</b>—Starting in Junos OS Release 19.1R1, this option is supported.</li> </ul> <p>If you configure multiple (up to four) proposals for Phase 1 negotiations, use the same Diffie-Hellman group in all proposals.</p>
Encryption Algorithm	<p>Specifies the supported Internet Key Exchange (IKE) proposals. Select an encryption algorithm from the list:</p> <ul style="list-style-type: none"> <li>• <b>3des-cbc</b>—3DES-CBC encryption algorithm.</li> <li>• <b>aes-128-cbc</b>—AES-CBC 128-bit encryption algorithm.</li> <li>• <b>aes-192-cbc</b>—AES-CBC 192-bit encryption algorithm.</li> <li>• <b>aes-256-cbc</b>—AES-CBC 256-bit encryption algorithm.</li> <li>• <b>des-cbc</b>—DES-CBC encryption algorithm.</li> <li>• <b>aes-128-gcm</b> - AES-GCM128-bit encryption algorithm</li> <li>• <b>aes-256-gcm</b> - AES-GCM256-bit encryption algorithm</li> </ul>

Table 268: Fields on the Add Proposal Page (continued)

Field	Action
Lifetime seconds	<p>Select a lifetime for the IKE SA. Default: 3,600 seconds. Range: 180 through 86,400 seconds.</p> <p>When the SA expires, it is replaced by a new SA and SPI or is terminated.</p>

## Release History Table

Release	Description
<a href="#">19.1R1</a>	<b>sha-512</b> —Starting in Junos OS Release 19.1R1, this option is supported. Produces a 512-bit digest.
<a href="#">19.1R1</a>	Starting in Junos OS Release 19.1R1, the new Authentication algorithm supports SRX5000 line of devices with SPC3 card upon installation of junos-ike package only. To install junos-ike package from J-Web, navigate to <b>Configure &gt; Security Services &gt; IPsec VPN &gt; Global Settings</b> and click <b>Install</b> .
<a href="#">19.1R1</a>	<b>group15</b> —Starting in Junos OS Release 19.1R1, this option is supported.
<a href="#">19.1R1</a>	<b>group16</b> —Starting in Junos OS Release 19.1R1, this option is supported.
<a href="#">19.1R1</a>	<b>group21</b> —Starting in Junos OS Release 19.1R1, this option is supported.

## RELATED DOCUMENTATION

[About the IKE \(Phase I\) Page | 719](#)
[Add a Gateway | 721](#)
[Add an IPSec Policy | 725](#)
[Edit an IKE \(Phase I\) Configuration | 732](#)
[Delete IKE \(Phase I\) Configuration | 733](#)

## Edit an IKE (Phase I) Configuration

You are here: **Configure > Security Services > IPSec VPN > IKE (Phase I)**.

You can edit all of the following IKE (Phase I) configurations:

- Gateway
- IKE Policy
- Proposal

To edit an IKE (Phase I):

1. Select any of the existing IKE (Phase I) configuration that you want to edit on the IKE (Phase I) page.
2. Click the pencil icon available on the upper right side of the page.

The edit page for the selected IKE (Phase I) configuration page appears with editable fields. For more information on the options, see [“Add a Gateway” on page 721](#), [“Add an IPSec Policy” on page 725](#), and [“Add a Proposal” on page 728](#).

3. Click **OK** to save the changes. If you want to discard your changes, click Cancel.

## RELATED DOCUMENTATION

[About the IKE \(Phase I\) Page | 719](#)

[Add a Gateway | 721](#)

[Add an IPSec Policy | 725](#)

[Add a Proposal | 728](#)

[Delete IKE \(Phase I\) Configuration | 733](#)

## Delete IKE (Phase I) Configuration

You are here: **Configure** > **Security Services** > **IPSec VPN** > **IKE (Phase I)**.

You can delete all of the following IKE (Phase I) configurations:

- Gateway
- IKE Policy
- Proposal

To delete a IKE (Phase I) configuration:

1. Select any of the existing IKE (Phase I) configuration that you want to delete on the IKE (Phase I) Policy page.



2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the configuration.

#### RELATED DOCUMENTATION

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[About the IKE \(Phase I\) Page | 719](#)

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[Add a Gateway | 721](#)

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[Add an IPSec Policy | 725](#)

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[Add a Proposal | 728](#)

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[Edit an IKE \(Phase I\) Configuration | 732](#)

## Security Services—IPSec VPN (Phase II)

### IN THIS CHAPTER

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### About the IKE (Phase II) Page

You are here: **Configure** > **Security Services** > **IPSec VPN** > **IKE (Phase II)**.

Use this page to configure IPSec VPN IKE (phase II).

#### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a VPN. See [“Add a VPN” on page 737](#).
- Add an IPSec policy. See [“Add an IPSec Policy” on page 741](#).
- Add a proposal. See [“Add a Proposal” on page 744](#).
- Edit an IKE (Phase I) configuration. See [“Edit an IKE \(Phase II\) Configuration” on page 746](#).
- Delete an IKE (Phase I) configuration. See [“Delete IKE \(Phase II\) Configuration” on page 746](#).
- Launch VPN wizard. To do this, click Launch Wizard available on the upper right corner of the IKE (Phase I) table. Follow the guided steps to configure the VPN wizard.

#### Field Descriptions

[Table 269 on page 736](#) describes the fields on the IKE (Phase II) Configuration page.

Table 269: Fields on the IKE (Phase II) Configuration Page

Field	Description
<b>VPN</b>	
VPN Name	Enter the name of the VPN to be searched.
Search	Displays the search specific to a VPN.
Name	Displays the name of the VPN.
Gateway	Displays the name of the gateway.
IPSec Policy	Displays the policy associated with this IPsec tunnel.
Bind Interface	Displays the tunnel interface to which the route-based VPN is bound.
Proxy Identity	Displays the IPsec proxy identity.
VPN Monitoring	Displays the name of the VPN monitoring option selected.
<b>IPSec Policy</b>	
Name	Displays the name of the IPsec policy.
Description	Displays the description of the policy.
Perfect Forward Secrecy	Displays the method the device uses to generate the encryption key. PFS generates each new encryption key independent of the previous key.
Proposal	Displays the name of the proposal to be used by the IPsec policy in Phase 2.
<b>Proposal</b>	
Name	Displays the name of the Phase 2 proposal.
Authentication Algorithm	Displays the hash algorithm that authenticates packet data.
Protocol	Displays the type of security protocol.
Encryption Algorithm	Displays the IKE encryption algorithm type.

RELATED DOCUMENTATION

<a href="#">Add a VPN   737</a>
<a href="#">Add an IPSec Policy   741</a>
<a href="#">Add a Proposal   744</a>
<a href="#">Edit an IKE (Phase II) Configuration   746</a>
<a href="#">Delete IKE (Phase II) Configuration   746</a>

Add a VPN

You are here: **Configure** > **Security Services** > **IPSec VPN** > **IKE (Phase II)**.

To add a VPN:

1. Click the add icon (+) on the upper right side of the VPN tab of IKE (Phase II) page.  
The Add VPN page appears.
2. Complete the configuration according to the guidelines provided in [Table 270 on page 737](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 270: Fields on the Add VPN Page

Field	Action
<b>IPsec VPN</b>	
VPN Name	Enter a name of the remote gateway.
Remote Gateway	Select a name from the list to associate a policy with IPsec tunnel.
IPsec Policy	Select a policy name from the list.

Table 270: Fields on the Add VPN Page (continued)

Field	Action
Bind to tunnel interface	<p>Select an interface from the list for the tunnel interface to which the route-based VPN is bound.</p> <p><b>NOTE:</b> When the IPSec VPN is configured for Dynamic VPN, Bind to tunnel interface is not required.</p> <p>You can add or edit a logical interface inline.</p> <p>To add a logical interface inline:</p> <ol style="list-style-type: none"> <li>Click +. The Add logical interface st0 page appears.</li> <li>Enter the following details: <ul style="list-style-type: none"> <li>Tunnel Interface st0-Enter the logical unit number.</li> <li>Zone-Select a zone for the logical interface.</li> <li>Description-Enter a description for the logical interface.</li> <li>Unnumbered - Disables the configuration for logical interface.</li> <li>Numbered - Determines if the logical unit is numeric.</li> <li>Ipv4 Address - Displays the IPV4 address.</li> </ul> <p><b>NOTE:</b> This field is disabled if Unnumbered is selected.</p> <ul style="list-style-type: none"> <li>IPv4 Subnet Mask - Displays the subnet mask for IPv4 address.</li> <li>Ipv6 Address- Displays the IPV6 address.</li> </ul> <p><b>NOTE:</b> This field is disabled if Unnumbered is selected.</p> <ul style="list-style-type: none"> <li>IPv6 Subnet Mask - Displays the subnet mask for IPv6 address.</li> <li>MultiPoint - Enable to configure multipoint.</li> <li>St0 Interface Configuration - Enable this option. <ul style="list-style-type: none"> <li>Automatic - Enables the configuration to automatically specify the next hop tunnel address and VPN name.</li> <li>Manual - Enables the configuration to manually provide the next-hop tunnel address and VPN name. Enables the Add and Delete options.</li> </ul> </li> </ul> </li> </ol>

Table 270: Fields on the Add VPN Page (continued)

Field	Action
Establish tunnels	<p>Select an option from the list:</p> <ul style="list-style-type: none"> <li>• <b>immediately</b>—IKE is activated immediately after VPN configuration and configuration changes are committed.</li> <li>• <b>on-traffic</b>—IKE is activated only when data traffic flows and must be negotiated.</li> <li>• <b>responder-only</b>—Starting in Junos OS Release 19.1R1, this option is supported. IKE is activated only when the device responds to negotiation request received from the peer.</li> </ul> <p><b>NOTE:</b></p> <ul style="list-style-type: none"> <li>• The responder-only mode supports SRX5000 Series devices with SPC3 card upon installation of junos-ike package only. To install junos-ike package from J-web, navigate to <b>Configure &gt; Security Services &gt; IPsec VPN &gt; Global Settings</b> and click <b>Install</b>.</li> <li>• When responder-only mode is configured for multiple VPN objects with single gateway configuration, all VPN objects must be configured with responder-only mode only.</li> <li>• Responder-only mode is supported only for site-to-site VPN and it is not supported on AutoVPN.</li> <li>• <b>responder-only-no-rekey</b>—Starting in Junos OS Release 19.1R1, this option is supported. Disables rekey in the responder-only mode.</li> </ul>
Disable anti replay	Select the check box to disable the antireplay checking feature of IPsec. By default, antireplay checking is enabled.
<b>IPSec VPN Options</b>	
Enable VPN Monitor	<p>Select the check box to enable VPN monitor.</p> <p>When the IPSec VPN is configured for Dynamic VPN, Enable VPN monitor is not required.</p>
Destination IP	Enter an IP address to associate a policy with IPsec tunnel.
Optimized	Select the check box for the tunnel interface to which the route-based VPN is bound.

Table 270: Fields on the Add VPN Page (*continued*)

Field	Action
Source Interface	Enter a source interface for ICMP requests. If no source interface is specified, the device automatically uses the local tunnel endpoint interface.
<b>Use Proxy Identity</b>	
Local IP/Netmask	Enter a local IP address.
Remote IP/Netmask	Enter a remote IP address and subnet mask for proxy identity.
Service	Select a service (port and protocol combination) from the list.
<b>Traffic Selector</b>	
+	Click plus to add a traffic selector.
Name	Enter a name of the Traffic Selector.
Local IP/Netmask	Enter a local IP address and subnet mask for proxy identity.
Remote IP/Netmask	Enter a remote IP address and subnet mask for proxy identity.
X	Click X to delete a traffic selector.
Do not fragment bit	<p>Specifies how the device handles the DF bit in the outer header.</p> <p>Select an option from the list:</p> <ul style="list-style-type: none"> <li>• <b>clear</b>—Clear (disable) the DF bit from the outer header. This is the default.</li> <li>• <b>copy</b>—Copy the DF bit to the outer header.</li> <li>• <b>set</b>—Set (enable) the DF bit in the outer header.</li> </ul>
Idle Time	Enter the idle time to delete an SA. Range: 60 through 999999 seconds.

Table 270: Fields on the Add VPN Page (continued)

Field	Action
Install interval	Specify a value from 0 through 10 seconds to allow installation of a rekeyed outbound security association (SA) on the device.

## Release History Table

Release	Description
<a href="#">19.1R1</a>	<b>responder-only</b> —Starting in Junos OS Release 19.1R1, this option is supported. IKE is activated only when the device responds to negotiation request received from the peer.
<a href="#">19.1R1</a>	<b>responder-only-no-rekey</b> —Starting in Junos OS Release 19.1R1, this option is supported. Disables rekey in the responder-only mode.

## RELATED DOCUMENTATION

[About the IKE \(Phase II\) Page | 735](#)

[Add an IPSec Policy | 741](#)

[Add a Proposal | 744](#)

[Edit an IKE \(Phase II\) Configuration | 746](#)

[Delete IKE \(Phase II\) Configuration | 746](#)

## Add an IPSec Policy

You are here: **Configure** > **Security Services** > **IPSec VPN** > **IKE (Phase II)**.

To add a IPSec policy:

1. Click the add icon (+) on the upper right side of the IPSec Policy tab of IKE (Phase II) page.  
The Add Policy page appears.
2. Complete the configuration according to the guidelines provided in [Table 271 on page 742](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.



Table 271: Fields on the Add Policy Page

Field	Action
<b>IPSec Policy</b>	
Name	Enter a name of the remote gateway.
Description	Enter a description of the policy to associate it with an IPSec tunnel.
Perfect Forward Secrecy	<p>Displays the method the device uses to generate the encryption key. PFS generates each new encryption key independent of the previous key.</p> <p>Select a method from the list:</p> <ul style="list-style-type: none"> <li>• None.</li> <li>• group1—Diffie-Hellman Group 1.</li> <li>• group2—Diffie-Hellman Group 2.</li> <li>• group5—Diffie-Hellman Group 5.</li> <li>• group14—Diffie-Hellman Group 14.</li> <li>• group19—Diffie-Hellman Group 19.</li> <li>• group20—Diffie-Hellman Group 20.</li> <li>• group24—Diffie-Hellman Group 24.</li> <li>• group15—Starting in Junos OS Release 19.1R1, Diffie-Hellman Group 15 is supported.</li> <li>• group16—Starting in Junos OS Release 19.1R1, Diffie-Hellman Group 16 is supported.</li> <li>• group21—Starting in Junos OS Release 19.1R1, Diffie-Hellman Group 21 is supported.</li> </ul> <p><b>NOTE:</b> Starting in Junos OS Release 19.1R1, the new DH-Groups supports SRX5000 Series devices with SPC3 card upon installation of junos-ike package only. To install junos-ike package from J-Web, navigate to <b>Configure &gt; Security Services &gt; IPsec VPN &gt; Global Settings</b> and click <b>Install</b>.</p>
<b>Proposal</b>	

Table 271: Fields on the Add Policy Page (continued)

Field	Action
Predefined	<p>Specifies that the anti-replay checking feature of IPsec be disabled. By default, anti-replay checking is enabled.</p> <p>Select Predefined, and select a proposal type from the list:</p> <ul style="list-style-type: none"> <li>• basic</li> <li>• compatible</li> <li>• standard</li> <li>• prime-128</li> <li>• prime-256</li> <li>• suiteb-gcm-128</li> <li>• suiteb-gcm-256</li> </ul>
User defined	<p><b>NOTE:</b> When this IKE policy is configured for Dynamic VPN, the selected P1 proposal can only have one item for User Defined proposal.</p>
Proposal List	<p>Select the P1 Proposals from the Available table and by using the arrow move it to the Selected P1 Proposals table.</p> <p><b>NOTE:</b> When this IKE policy is configured for Dynamic VPN, the selected P1 proposal can only have one item for User Defined.</p>

## Release History Table

Release	Description
<a href="#">19.1R1</a>	group15—Starting in Junos OS Release 19.1R1, Diffie-Hellman Group 15 is supported.
<a href="#">19.1R1</a>	group16—Starting in Junos OS Release 19.1R1, Diffie-Hellman Group 16 is supported.
<a href="#">19.1R1</a>	group21—Starting in Junos OS Release 19.1R1, Diffie-Hellman Group 21 is supported.

## RELATED DOCUMENTATION

[About the IKE \(Phase II\) Page | 735](#)
[Add a VPN | 737](#)
[Add a Proposal | 744](#)

[Edit an IKE \(Phase II\) Configuration | 746](#)
[Delete IKE \(Phase II\) Configuration | 746](#)

## Add a Proposal

You are here: **Configure** > **Security Services** > **IPSec VPN** > **IKE (Phase II)**.

To add a proposal:

1. Click the add icon (+) on the upper right side of the proposal tab of IKE (Phase II) page.  
The Add Proposal page appears.
2. Complete the configuration according to the guidelines provided in [Table 272 on page 744](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

**Table 272: Fields on the Add Proposal Page**

Field	Action
Name	Enter a name of the Phase 2 proposal.
Description	Enter a text description for the Phase 2 proposal.
Authentication Algorithm	<p>Select an option from the list for authenticating packet data:</p> <ul style="list-style-type: none"> <li>• <b>none</b></li> <li>• <b>hmac-md5-96</b>—Produces a 128-bit digest.</li> <li>• <b>hmac-sha1-96</b>—Produces a 160-bit digest.</li> <li>• <b>hmac-sha-256-128</b>—Produces a 256-bit digest.</li> <li>• <b>hmac-sha-512</b>—Starting in Junos OS Release 19.1R1, this option is supported. Produces a 512-bit digest.</li> <li>• <b>hmac-sha-384</b>—Starting in Junos OS Release 19.1R1, this option is supported. Produces a 384-bit digest.</li> </ul> <p><b>NOTE:</b> Starting in Junos OS Release 19.1R1, the new Authentication algorithm SRX5000 Series devices with SPC3 card upon installation of junos-ike package only. To install junos-ike package from J-Web, navigate to <b>Configure</b> &gt; <b>Security Services</b> &gt; <b>IPsec VPN</b> &gt; <b>Global Settings</b> and click <b>Install</b>.</p>

Table 272: Fields on the Add Proposal Page (*continued*)

Field	Action
Encryption Algorithm	<p>Select an option from the list of IKE encryption algorithm.</p> <ul style="list-style-type: none"> <li>• <b>3des-cbc</b>—3DES-CBC encryption algorithm.</li> <li>• <b>aes-128-cbc</b>—AES-CBC 128-bit encryption algorithm.</li> <li>• <b>aes-192-cbc</b>—AES-CBC 192-bit encryption algorithm.</li> <li>• <b>aes-256-cbc</b>—AES-CBC 256-bit encryption algorithm.</li> <li>• <b>des-cbc</b>—DES-CBC encryption algorithm.</li> <li>• <b>aes-128-gcm</b> - AES-GCM128-bit encryption algorithm</li> <li>• <b>aes-256-gcm</b> - AES-GCM256-bit encryption algorithm</li> </ul>
Lifetime Kilobytes	<p>Enter a value from 64 through 1,048,576 bytes to specify the lifetime of an IPSec SA.</p> <p>The SA is terminated when the specified number of kilobytes of traffic has passed.</p>
Lifetime Seconds Protocol	<p>Enter a value from 180 through 86,400 seconds to specify the lifetime of an IKE SA. When the SA expires, it is replaced by a new SA and SPI or is terminated.</p>
Protocol	<p>Specifies the networking protocol name.</p> <p>Select a protocol from the list:</p> <ul style="list-style-type: none"> <li>• <b>none</b></li> <li>• <b>ah</b>—IP Security Authentication Header</li> <li>• <b>esp</b>—IPsec Encapsulating Security Payload</li> </ul> <p><b>NOTE:</b> When this IPSec proposal is configured for Dynamic VPN, select esp for protocol.</p>

## Release History Table

Release	Description
<a href="#">19.1R1</a>	<b>hmac-sha-512</b> —Starting in Junos OS Release 19.1R1, this option is supported. Produces a 512-bit digest.
<a href="#">19.1R1</a>	<b>hmac-sha-384</b> —Starting in Junos OS Release 19.1R1, this option is supported. Produces a 384-bit digest.

## RELATED DOCUMENTATION

[About the IKE \(Phase II\) Page](#) | [735](#)

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[Add a VPN | 737](#)

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[Add an IPSec Policy | 741](#)

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[Edit an IKE \(Phase II\) Configuration | 746](#)

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[Delete IKE \(Phase II\) Configuration | 746](#)

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## Edit an IKE (Phase II) Configuration

You are here: **Configure** > **Security Services** > **IPSec VPN** > **IPSec (Phase II)**.

You can edit all of the following IKE (Phase I) configurations:

- Gateway
- IKE Policy
- Proposal

To edit an IPsec (Phase II):

1. Select the existing a threat prevention that you want to edit on the IPSec (Phase II) page.
2. Click the pencil icon available on the upper right side of the page.

The Edit a IPSec (Phase II) page appears with editable fields. For more information on the options, see, [“Add a VPN” on page 737](#), [“Add an IPSec Policy” on page 741](#), and [“Add a Proposal” on page 744](#).

3. Click **OK** to save the changes.

### RELATED DOCUMENTATION

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[Add a VPN | 737](#)

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[Add an IPSec Policy | 741](#)

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[Add a Proposal | 744](#)

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[Delete IKE \(Phase II\) Configuration | 746](#)

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## Delete IKE (Phase II) Configuration

You are here: **Configure** > **Security Services** > **IPSec VPN** > **IKE (Phase II)**.

You can delete all of the following IKE (Phase I) configurations:

- Gateway
- IKE Policy
- Proposal

To delete a IKE (Phase II) policy:

1. Select a IKE (Phase II) policy that you want to delete on the IKE (Phase II) Policy page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the profile.

#### RELATED DOCUMENTATION

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[About the IKE \(Phase II\) Page | 735](#)

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[Add a VPN | 737](#)

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[Add an IPSec Policy | 741](#)

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[Edit an IKE \(Phase II\) Configuration | 746](#)

# Security Services—IPSec Manual Key VPN

IN THIS CHAPTER

- [About the Manual Key VPN Page | 748](#)
- [Add a Manual Key VPN | 749](#)
- [Edit a Manual Key VPN | 751](#)
- [Delete Manual Key VPN | 752](#)

## About the Manual Key VPN Page

You are here: **Configure > Security Services > IPSec VPN > Manual Key VPN.**

Use this page to configure Manual Key VPN Page.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a manual key VPN. See [“Add a Manual Key VPN” on page 749](#).
- Edit a manual key VPN. See [“Edit a Manual Key VPN” on page 751](#).
- Delete a manual key VPN. See [“Delete Manual Key VPN” on page 752](#).

### Field Descriptions

[Table 273 on page 748](#) describes the fields on the Manual Key VPN page.

Table 273: Fields on the Manual Key VPN Page

Field	Description
Name	Displays the name of the manual tunnel.
Gateway	Displays the selected gateway.

Table 273: Fields on the Manual Key VPN Page (*continued*)

Field	Description
Bind Interface	Displays the tunnel interface to which the route-based VPN is bound.
Df Bit	Displays the DF bit in the outer header.

## RELATED DOCUMENTATION

[Add a Manual Key VPN | 749](#)
[Edit a Manual Key VPN | 751](#)
[Delete Manual Key VPN | 752](#)

## Add a Manual Key VPN

You are here: **Configure** > **Security Services** > **IPsec VPN** > **Manual Key VPN**.

To add a manual key VPN:

1. Click the add icon (+) on the upper right side of the Manual Key VPN page.  
The Add Manual Key VPN page appears.
2. Complete the configuration according to the guidelines provided in [Table 274 on page 749](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 274: Fields on the Manual Key VPN Configuration Page

Field	Action
<b>VPN Manual Key</b>	
VPN Name	Enter the VPN name for the IPsec tunnel.
Remote Gateway	Enter the name for the remote gateway.
External Interface	Select an interface from the list.



Table 274: Fields on the Manual Key VPN Configuration Page (*continued*)

Field	Action
Protocol	<p>Specifies the types of protocols available for configuration.</p> <p>Select an option from the list:</p> <ul style="list-style-type: none"> <li>• ESP</li> <li>• AH</li> </ul>
SPI	<p>Enter a SPI value.</p> <p>Range: 256 through 16639.</p>
Bind to tunnel interface	Select an interface from the list to which the route-based VPN is bound.
Do not fragment bit	<p>Specifies how the device handles the DF bit in the outer header.</p> <p>Select an option from the list.</p> <ul style="list-style-type: none"> <li>• <b>clear</b>—Clear (disable) the DF bit from the outer header. This is the default.</li> <li>• <b>Set</b>—Set the DF bit to the outer header.</li> <li>• <b>copy</b>—Copy the DF bit to the outer header.</li> </ul>
Enable VPN Monitor	
Destination IP	Enter an IP address for the destination peer.
Optimized	Select the check box to enable optimization for the device to use traffic patterns as evidence of peer liveliness. If enabled, ICMP requests are suppressed. This feature is disabled by default.
Source Interface	Enter a source interface for ICMP requests (VPN monitoring “hellos”). If no source interface is specified, the device automatically uses the local tunnel endpoint interface.
<b>Key Values</b>	
Authentication	
Algorithm	<p>Specifies the hash algorithm that authenticates packet data. Select a hash algorithm from the list:</p> <ul style="list-style-type: none"> <li>• <b>hmac-md5-96</b>—Produces a 128-bit digest.</li> <li>• <b>hmac-sha1-96</b>—Produces a 160-bit digest.</li> <li>• <b>hmac-sha-256-128</b></li> </ul>
ASCII Text	Select the <b>ASCII Text</b> option, and enter the key in the appropriate format.

Table 274: Fields on the Manual Key VPN Configuration Page (*continued*)

Field	Action
Hexadecimal	Select the <b>Hexadecimal</b> option, and enter the key in the appropriate format.
Encryption	
Encryption	<p>Specifies the supported Internet Key Exchange (IKE) proposals. Select an option from the list:</p> <ul style="list-style-type: none"> <li>• <b>3des-cbc</b>—3DES-CBC encryption algorithm.</li> <li>• <b>aes-128-cbc</b>—AES-CBC 128-bit encryption algorithm.</li> <li>• <b>aes-192-cbc</b>—AES-CBC 192-bit encryption algorithm.</li> <li>• <b>aes-256-cbc</b>—AES-CBC 256-bit encryption algorithm.</li> <li>• <b>des-cbc</b>—DES-CBC encryption algorithm.</li> </ul>
ASCII Text	Enable this option and enter the key in the appropriate format.
Hexadecimal	Enable this option and enter the key in the appropriate format.

## RELATED DOCUMENTATION

[About the Manual Key VPN Page | 748](#)
[Edit a Manual Key VPN | 751](#)
[Delete Manual Key VPN | 752](#)

## Edit a Manual Key VPN

You are here: **Configure** > **Security Services** > **IPsec VPN** > **Manual Key VPN**.

To edit a manual key VPN:

1. Select the existing manual key VPN that you want to edit on the Manual Key VPN page.
2. Click the pencil icon available on the upper right side of the page.

The Edit a Manual Key VPN page appears with editable fields. For more information on the options, see [“Add a Manual Key VPN” on page 749](#).

3. Click **OK** to save the changes.

## RELATED DOCUMENTATION

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[About the Manual Key VPN Page | 748](#)

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[Add a Manual Key VPN | 749](#)

---

[Delete Manual Key VPN | 752](#)

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## Delete Manual Key VPN

You are here: **Configure** > **Security Services** > **IPsec VPN** > **Manual Key VPN**.

To delete a manual key VPN :

1. Select a manual key VPN that you want to delete on the Manual Key VPN page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the profile.

## RELATED DOCUMENTATION

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## Security Services—IPSec Dynamic VPN Global Settings

### IN THIS CHAPTER

- [About the Dynamic VPN Global Settings Page | 753](#)
- [Add a Dynamic VPN Global Settings | 754](#)
- [Edit a Dynamic VPN Global Settings | 755](#)
- [Delete Dynamic VPN Global Settings | 756](#)

### About the Dynamic VPN Global Settings Page

You are here: **Configure** > **Security Services** > **IPSec VPN** > **Dynamic VPN**.

You can view and add, edit, or delete dynamic VPN global configuration options.

**NOTE:** This menu is available for SRX300 line of devices and SRX550M devices.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a dynamic VPN global settings. See [“Add a Dynamic VPN Global Settings” on page 754](#).
- Edit a dynamic VPN global settings. See [“Edit a Dynamic VPN Global Settings” on page 755](#).
- Delete a dynamic VPN global settings. See [“Delete Dynamic VPN Global Settings” on page 756](#).

### Field Descriptions

[Table 275 on page 754](#) describes the fields on the Dynamic VPN Configuration page.

Table 275: Fields on the Dynamic VPN Configuration Page

Field	Description
Access Profile	<p>Select a previously created access profile from the list that is displayed.</p> <p>Specifies the access profile that controls the authentication of users who want to download Access Manager. (You will need to select these access profiles when configuring the IKE gateway and dynamic VPN global options. You can use the same access profile to authenticate users in both cases, or you can use separate access profiles to authenticate downloads and VPN sessions.)</p> <p><b>NOTE:</b> This Access Profile option does not control authentication for VPN sessions. For session authentication, use the Access Profile option on the IKE Gateway Configuration page. For more information, see "Configuring an IKE Gateway Configuration (Dynamic VPNs)."</p>
Force Upgrade	<p>Select the check box to enable or disable force upgrade. This option is enabled by default. Specifies an option to set up a program to automatically download the latest client and install it on the user's computer when the setup program detects a version mismatch between the client and server. Otherwise, the setup program prompts the user to upgrade the client when it detects a version mismatch, but does not force the upgrade. If the user does not choose to upgrade, the setup program will launch the existing client version on the user's computer.</p>

## RELATED DOCUMENTATION

[Add a Dynamic VPN Global Settings | 754](#)
[Edit a Dynamic VPN Global Settings | 755](#)
[Delete Dynamic VPN Global Settings | 756](#)

## Add a Dynamic VPN Global Settings

You are here: **Configure** > **Security Services** > **IPsec VPN** > **Dynamic VPN**.

To add a dynamic VPN global settings:

1. Click the add icon (+) on the upper right side of the Dynamic VPN Global Settings Configuration page.  
The Add Dynamic VPN Global Settings Configuration page appears.
2. Complete the configuration according to the guidelines provided in [Table 276 on page 755](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 276: Fields on the Dynamic VPN Global Settings Configuration Page

Field	Action
Name	Enter the name of the client configuration.
IPSec VPN	Select a previously configured IKE AutoKey configuration from the list to use when establishing the VPN tunnel.
Remote Protected Resources IP	<p>Enter an IP address and net mask and click Add. Specifies the IP address and net mask of a resource behind the firewall. Traffic to the specified resource will go through the VPN tunnel and therefore will be protected by the firewall's security policies.</p> <p><b>NOTE:</b> The device does not validate that the IP/net mask combination that you enter here matches up with your security policies.</p>
Remote Exceptions IP	Enter an IP address and net mask and click Add. Specifies the IP address and net mask of exceptions to the remote protected resources list.
Users	<p>Enter an user name, and click <b>Add</b>. Specifies the list of users who can use this client configuration.</p> <p><b>NOTE:</b> The server does not validate the names that you enter here, but the names must be the names that the users use to log in to the device when downloading the client.</p>

## RELATED DOCUMENTATION

[About the Dynamic VPN Global Settings Page | 753](#)

[Edit a Dynamic VPN Global Settings | 755](#)

[Delete Dynamic VPN Global Settings | 756](#)

## Edit a Dynamic VPN Global Settings

You are here: **Configure > Security Services > IPsec VPN > Dynamic VPN.**

To edit a dynamic VPN global settings:

1. Select the existing a dynamic VPN global settings policy that you want to edit on the Dynamic VPN Global Settings page.
2. Click the pencil icon available on the upper right side of the page.

The Edit a Dynamic VPN Global Settings page appears with editable fields. For more information on the options, see [“Add a Dynamic VPN Global Settings” on page 754](#).

3. Click **OK** to save the changes.

#### RELATED DOCUMENTATION

---

[About the Dynamic VPN Global Settings Page | 753](#)

---

[Add a Dynamic VPN Global Settings | 754](#)

---

[Delete Dynamic VPN Global Settings | 756](#)

## Delete Dynamic VPN Global Settings

You are here: **Configure** > **Security Services** > **IPsec VPN** > **Dynamic VPN**.

To delete a dynamic VPN global setting policy:

1. Select a dynamic VPN global setting policy that you want to delete on the Dynamic VPN Global Setting Policy page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the profile.

#### RELATED DOCUMENTATION

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[About the Dynamic VPN Global Settings Page | 753](#)

---

[Add a Dynamic VPN Global Settings | 754](#)

---

[Edit a Dynamic VPN Global Settings | 755](#)

# Security Services—User Firewall Active Directory

IN THIS CHAPTER

- About the Active Directory Page | 757

## About the Active Directory Page

You are here: **Configure** > **Security Services** > **User Firewall** > **Active Directory**.

You can configure Active directory.

[Table 277 on page 757](#) describes the fields on the Active Directory page.

Table 277: Fields on the Active Directory Page

Field	Description
<b>General Information</b>	
<b>General</b>	
No on Demand Probe	Enable the manual on-demand probing of a domain PC as an alternate method for the SRX Series device to retrieve address-to-user mapping information.
<b>Timeout</b>	
Authentication Entry Timeout	<p>Set the timeout to 0 to avoid having the user's entry being removed from the authentication table after the timeout.</p> <p><b>NOTE:</b> When a user is no longer active, a timer is started for that user's entry in the Active Directory authentication table. When the time is up, the user's entry is removed from the table. Entries in the table remain active as long as there are sessions associated with the entry.</p> <p>The default authentication entry timeout is 30 minutes. Starting in Junos OS Release 19.2R1, the default value is 60 minutes.</p> <p>To disable timeout, set the interval to zero. The range is 10 through 1440 minutes.</p>



Table 277: Fields on the Active Directory Page *(continued)*

Field	Description
WMI Timeout	<p>Enter the number of seconds that the domain PC has to respond to the SRX Series device's query through Windows Management Instrumentation (WMI) or Distributed Component Object Module (DCOM).</p> <p>If no response is received from the domain PC within the wmi-timeoutinterval, the probe fails and the system either creates an invalid authentication entry or updates the existing authentication entry as invalid. If an authentication table entry already exists for the probed IP address, and no response is received from the domain PC within the wmi-timeout interval, the probe fails and that entry is deleted from the table.</p> <p>The range is 3 through 120 seconds.</p>
Invalid Authentication Entry Timeout	<p>Enter a value. The range is 10 through 1440 minutes. When a user is no longer active, a timer is started for that user's entry in the Active Directory authentication table. When the time is up, the user's entry is removed from the table.</p> <p>If this value is not configured, all the invalid auth entry from Active Directory will use the default value as 30 minutes.</p> <p>The range is 10 through 1440 minutes.</p>
Firewall Authentication Forced Timeout	<p>Enter a value. The range is 10 through 1440 minutes. This is the firewall authentication fallback time. Set the timeout to 0 to avoid having the user's entry being removed from the authentication table after the timeout.</p>
<b>Filter</b>	
Include	<p>Enable to include IP addresses from the Available column.</p> <p>Click the Add icon (+) to create a new IP address and add it as either include or exclude from monitoring.</p> <p>Click the Delete icon to delete a new IP address and add it as either include or exclude from monitoring.</p>
Exclude	<p>Enable to exclude IP addresses from the Available column.</p> <p>Click the Add icon (+) to create a new IP address and add it as either include or exclude from monitoring.</p> <p>Click the Delete icon to delete a new IP address and add it as either include or exclude from monitoring.</p>
<b>Domain Settings</b>	

Table 277: Fields on the Active Directory Page (*continued*)

Field	Description
Test	Click <b>Test</b> to check the Domain Connection status.  test:Status page appears and displays the status.
+	Click <b>+</b> to add a domain.  The Add Domain page appears.  <b>NOTE:</b> <ul style="list-style-type: none"> <li>Starting in Junos OS Release 19.2R1, for SRX4200, SRX1500, SRX550M, and vSRX devices, and for the SRX5000 and SRX3000 lines of devices, you can configure the integrated user firewall in a maximum of two domains. For the other SRX Series devices, you can create only one domain.</li> </ul> <p>You can select the pencil icon to edit the domain or select delete icon to delete the domain.</p>
<b>General</b>	
Domain Name	Enter the name of the domain.  The range for the domain name is 1 through 64 characters.
User Name	Enter the password for the Active Directory account password.  The range for the username is 1 through 64 characters. Example: admin
Password	Enter the username for the Active Directory account name.  The range for the password is 1 through 128 characters. Example: A\$BC123
<b>Domain Controller(s)</b>	
Domain Controller(s)	Click the add icon (+) to add domain controller settings. <ul style="list-style-type: none"> <li>Domain Controller Name—Enter the domain controller name. Name can range from 1 through 64 characters. You can configure up to maximum of 10 domain controllers.</li> <li>IP Address—Enter the IP address of the domain controller.</li> </ul>
<b>User Group Mapping (LDAP)</b>	

Table 277: Fields on the Active Directory Page *(continued)*

Field	Description
User Group Mapping (LDAP)	<p>Click the add icon (+):</p> <ul style="list-style-type: none"> <li>• IP Address—Enter the IP address of the LDAP server. If no address is specified, the system uses one of the configured Active Directory domain controllers.</li> <li>• Port—Enter the port number of the LDAP server. If no port number is specified, the system uses port 389 for plaintext or port 636 for encrypted text. Default value is port 443.</li> </ul>
Base Distinguish Name	<p>Enter the LDAP base distinguished name (DN).</p> <p>Example: DC=example,DC=net</p>
User Name	Enter the username of the LDAP account. If no username is specified, the system will use the configured domain controller's username.
Password	Enter the password for the account. If no password is specified, the system uses the configured domain controller's password.
Use SSL	Enable Secure Sockets Layer (SSL) to ensure secure transmission with the LDAP server. Disabled by default, then the password is sent in plaintext.
Authentication Algorithm	Enable this option to specify the algorithm used while the SRX Series device communicates with the LDAP server. By default simple is selected to configure simple(plaintext) authentication mode.
<b>IP User Mapping</b>	
Discovery Method (WMI)	<p>Enable the method of discovering IP address-to-user mappings.</p> <p>WMI—Windows Management Instrumentation (WMI) is the discovery method used to access the domain controller. This option should be enabled only for internal hosts or trusted hosts.</p>
Event Log Scanning Interval	<p>Enter the scanning interval at which the SRX Series device scans the event log on the domain controller. The range is 5 through 60 seconds.</p> <p>Default value is 60 seconds.</p>
Initial Event Log TimeSpan	<p>Enter the time of the earliest event log on the domain controller that the SRX Series device will initially scan. This scan applies to the initial deployment only. After WMIC and the user identification start working, the SRX Series device scans only the latest event log.</p> <p>The range is 1 through 168 hours. Default value is 1 hour.</p>

Release History Table

Release	Description
<a href="#">19.2R1</a>	Starting in Junos OS Release 19.2R1, the default value is 60 minutes.
<a href="#">19.2R1</a>	Starting in Junos OS Release 19.2R1, for SRX4200, SRX1500, SRX550M, and vSRX devices, and for the SRX5000 and SRX3000 lines of devices, you can configure the integrated user firewall in a maximum of two domains. For the other SRX Series devices, you can create only one domain.

RELATED DOCUMENTATION

| [About the Auth Priority Page](#) | [762](#)

# Security Services—User Firewall Authentication Priority

IN THIS CHAPTER

- About the Auth Priority Page | 762

## About the Auth Priority Page

You are here: **Configure > Security Services > User Firewall > Auth Priority.**

Use this page to enable or disable authentication priority configuration options.

[Table 278 on page 762](#) describes the fields on the Auth Priority page.

Table 278: Fields on the Auth Priority Page

Field	Description
Enable local authentication	Select the <b>Enable local authentication</b> check box to enable local authentication.
Priority	Enter a priority value (1 through 65,535) in the <b>Priority</b> field.  <b>NOTE:</b> The default local authentication priority value is 100.
Enable firewall authentication	Select the check box to enable firewall authentication.
Priority	Enter a priority value (1 through 65,535) in the <b>Priority</b> field.  <b>NOTE:</b> The default firewall authentication priority value is 150.
Enable UAC authentication	Select the check box to enable UAC authentication.
Priority	Enter a priority value (1 through 65,535) in the <b>Priority</b> field.  <b>NOTE:</b> The default local authentication priority value is 200.
Enable UAC authentication	Select the check box to enable UAC authentication.

Table 278: Fields on the Auth Priority Page (continued)

Field	Description
Priority	Enter a priority value (1 through 65,535) in the <b>Priority</b> field.  <b>NOTE:</b> The default local authentication priority value is 200.
Enable active directory	Select the check box to enable UAC authentication.
Priority	Enter a priority value (1 through 65,535) in the <b>Priority</b> field.  <b>NOTE:</b> The default local authentication priority value is 125.

RELATED DOCUMENTATION

| [About the Local Auth Page](#) | 764

# Security Services—User Firewall Local Authentication

IN THIS CHAPTER

- [About the Local Auth Page | 764](#)
- [Add a Local Auth Entry | 765](#)
- [Delete a Local Auth Entry | 766](#)

## About the Local Auth Page

You are here: **Configure > Security Services > User Firewall > Local Auth.**

Use this page to enable or disable authentication priority configuration options.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Create an local auth entry. See [“Add a Local Auth Entry” on page 765](#).
- Delete an local auth entry. See [“Delete a Local Auth Entry” on page 766](#).
- Clear all the local auth entry. To do this, select the local auth entries you want to clear and click Clear All at the top right of the table.

### Field Descriptions

[Table 279 on page 764](#) describes the fields on the Local Auth page.

Table 279: Fields on the Local Auth Page

Field	Description
Filter by	Displays the local authentication configuration based on the selected filter.
IP	Displays the IP address.

Table 279: Fields on the Local Auth Page (continued)

Field	Description
User Name	Displays the name of the user.
Role Name	Displays the list of roles assigned to the username.
Search	Select the filter you want and enter your inputs based on the filter type. Then, click the search icon to display the output based on your selected filter.

## RELATED DOCUMENTATION

[Add a Local Auth Entry | 765](#)
[Delete a Local Auth Entry | 766](#)
[Search for Text in Local Auth Entry Table](#)

## Add a Local Auth Entry

You are here: **Configure > Security Services > User Firewall > Local Auth.**

To add a local auth entry:

1. Click the add icon (+) on the upper right side of the Local Auth page.  
The Add Local Auth Entry page appears.
2. Complete the configuration according to the guidelines provided in [Table 280 on page 765](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 280: Fields on the Add Local Auth Page

Field	Action
IP Address	Enter an IP address for the local authentication.
User Name	Enter a username for the local authentication.



Table 280: Fields on the Add Local Auth Page (*continued*)

Field	Action
Role List	<p>Enter roles for the local authentication entry. Enter the role and click + to add a role.</p> <p>To delete a role, select the role and click the delete (X) icon.</p> <p><b>NOTE:</b> You can configure only maximum of 200 roles for a local authentication entry.</p>

## RELATED DOCUMENTATION

[About the Local Auth Page | 764](#)
[Delete a Local Auth Entry | 766](#)

## Delete a Local Auth Entry

You are here: **Configure** > **Security Services** > **User Firewall** > **Local Auth**.

To delete a local auth entry:

1. Select a local auth entry that you want to delete on the Local Auth Entry page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the profile.

## RELATED DOCUMENTATION

[About the Local Auth Page | 764](#)
[Add a Local Auth Entry | 765](#)
[Search for Text in Local Auth Entry Table](#)

# Security Services—User Firewall Identity Management

## IN THIS CHAPTER

- [About the Identity Management Page | 767](#)
- [Add an Identity Management Profile | 769](#)
- [Edit an Identity Management Profile | 772](#)
- [Delete Identity Management Profile | 773](#)

## About the Identity Management Page

You are here: **Configure > Security Services > User Firewall > Identity Management.**

You can add, edit or delete the identity management profiles. You can also view the connection status of this SRX device with the juniper identity management services.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add an identity management profile. See [“Add an Identity Management Profile” on page 769.](#)
- Edit an identity management profile. See [“Edit an Identity Management Profile” on page 772.](#)
- Delete an identity management profile. See [“Delete Identity Management Profile” on page 773.](#)

### Field Descriptions

[Table 281 on page 767](#) describes the fields on the Identity Management Profile page.

**Table 281: Fields on the Identity Management Profile Page**

Field	Description
<b>General Information</b>	
Connection Type	Type of connection (HTTP or HTTPS).

Table 281: Fields on the Identity Management Profile Page (*continued*)

Field	Description
Port Number	Connection port to JIMS server.
Primary IP Address	Primary IP address of the JIMS server.
Primary CA Certificate	Primary CA certificate of the JIMS server.
Primary Client ID	Client-id of the device to obtain access token from primary JIM Server
Primary Client ID	Secondary IP address of the JIMS server.
Secondary Connection Status	Connection status to the secondary JIMS server.
Secondary CA Certificate	Secondary CA certificate of the JIMS server.
Secondary Client ID	Client-id of the device to obtain access token from secondary JIMS server.
Query API	Path of the URL for querying user identities.
Query API	Path of the URL for acquiring access token.

**Advanced Settings**

**NOTE:** Advanced query cannot be configured when *active-directory* auth or *ClearPass Webapi* is enabled. Disable *active-directory-access* and *authentication-source* under *User-Identification* and disable *webapi services* before committing identity management configuration.

Items per Batch	Maximum items number in one batch query.
No IP Query	Status of no-ip-query; Enabled/Disabled
Authentication Entry Timeout	Timeout value of auth entry from identity-management.
No Authentication Entry Timeout	
Address-book	
Address-book	
Domain	

## RELATED DOCUMENTATION

[Add an Identity Management Profile | 769](#)
[Edit an Identity Management Profile | 772](#)
[Delete Identity Management Profile | 773](#)

## Add an Identity Management Profile

You are here: **Configure** > **Security Services** > **User Firewall** > **Identity Management**.

To add an identity management profile:

1. Click **Configure** on the identity management page.  
The Configure Identity Management Profile page appears.
2. Complete the configuration according to the guidelines provided in [Table 282 on page 769](#).
3. Click **Finish** to save the changes. If you want to discard your changes, click **Cancel**.

**Table 282: Fields on the Configure Identity Management Profile Page**

Field	Action
<b>General Information</b>	
General Information	Connection for Primary and Secondary Identity.
Connection Type	Select a connection type from the list. The options available are: HTTPS and HTTP.
Port	Enter the port number or press up or down arrow to either increment or decrement the port number. The default value is 443.
Primary IP Address	Enter a primary IP address of JIMS server.
Primary CA Certificate	Specifies the primary certificate of the JIMS. SRX device will use it to verify JIMS's certificate for SSL connection.  Select Upload <b>CA certificate to device</b> or <b>specify the path of the file on device</b> .

Table 282: Fields on the Configure Identity Management Profile Page (*continued*)

Field	Action
Primary CA Certificate file upload	<p>Enables you to locate and upload the CA certificate.</p> <p>Click <b>Browse</b> to locate the CA certificate on your device and click <b>Upload</b> the selected CA certificate.</p>
Primary CA Certificate file path	Enter a file path of the primary CA certificate.
Primary Client ID	Enter a primary client ID of the SRX device to obtain access token. It must be consistent with the configuration of the API client created on JIMS.
Primary Client Secret	<p>Enter a password which enables you to access the primary identity management server.</p> <p>Specifies the client secret of the SRX device to obtain access token. It must be consistent with the configuration of the API client created on JIMS.</p>
Secondary Identity Management Server	<p>Enables a secondary JIMS server, its IP address, CA certificate, client ID, and client secret.</p> <p><b>NOTE:</b> If you enable, the Secondary IP Address, Secondary CA Certificate file upload, Secondary Client ID, Secondary Client Secret rows are displayed. Enter the IP address of the secondary server, browse and upload the secondary CA certificate, enter the secondary client ID and secret in the respective fields.</p>
Token API	<p>Enter the token API to specify the path of the URL for acquiring access token.</p> <p>Default is 'oauth_token/oauth'.</p>
Query API	<p>Enter the path where the URL for querying user identities is located. Default is 'user_query/v2'.</p> <p>Click Next. The Advanced Settings page is displayed.</p>
<b>Advanced Settings</b>	
<b>Batch Query</b>	

Table 282: Fields on the Configure Identity Management Profile Page (*continued*)

Field	Action
Item Per Batch	<p>Specifies the maximum number of items in one batch query.</p> <p>Enter the number of items. Range is 100 to 1000 and the default number is 200.</p>
Query Interval	<p>Specifies the interval for querying the newly generated user identities.</p> <p>Enter the number of seconds you need between each query. The range is 1 through 60 (seconds), and the default value is 5.</p>
<b>IP Query</b>	
Query Delay Time	<p>Specifies the time delay to send individual IP query.</p> <p>Enter the time in seconds. The range is 0~60 (seconds). The default value is 15 seconds, which depends on the delay time of auth entry retrieved from JIMS to SRX.</p>
No IP Query	Select the check box if you want to disable the IP query function that is enabled by default.
<b>Authentication Timeout</b>	
Authentication Entry Timeout	<p>Enter the value in minutes. The value range is 0 or 10~1440 (minutes). 0 means no need for a timeout. the default value is 60.</p> <p>Specifies the time out value for authentication entry in identity management. The timeout interval begins from when the authentication entry is added to the identity-management authentication table. If a value of 0 is specified, the entries will never expire.</p>
Invalid Authentication Entry Timeout	<p>Enter the value in minutes. The value range is 0 or 10~1440 (minutes). 0 means no need for a timeout. the default value is 60.</p> <p>Specifies the timeout value of invalid auth entry in the SRX Series authentication table for either Windows active directory or Aruba ClearPass.</p>

Table 282: Fields on the Configure Identity Management Profile Page (*continued*)

Field	Action
<b>Filter</b>	
<b>NOTE:</b> You can select address set with maximum of 20 IP addresses and address set with wild card addresses.	
Include IP Address Book	Select an IP address book from the predefined address book in which an address set must be selected as IP filter.
Include IP Address Set	Specifies the predefined address set selected as IP filter.  Select an IP address set from the list.  To add a new address set for the IP address book, click <b>Add New Address Set</b> .
Exclude IP Address Book	Select an IP address book that you want identity management profile to exclude.
Exclude IP Address Set	Select the predefined address set that you want identity management profile to exclude.
Filter to Domain	Enter one or more active directory domains, to the SRX Series device. You can specify up to twenty domain names for the filter.

## RELATED DOCUMENTATION

[About the Identity Management Page | 767](#)
[Edit an Identity Management Profile | 772](#)
[Delete Identity Management Profile | 773](#)

## Edit an Identity Management Profile

You are here: **Configure** > **Security Services** > **User Firewall** > **Identity Management**.

To edit an identity management profile:

1. Select the existing identity management profile that you want to edit on the Identity Management page.

2. Click the pencil icon available on the upper right side of the page.

The Edit an Identity Management Profile page appears with editable fields. For more information on the options, see [“Add an Identity Management Profile” on page 769](#).

3. Click **OK** to save the changes.

#### RELATED DOCUMENTATION

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[About the Identity Management Page | 767](#)

---

[Add an Identity Management Profile | 769](#)

---

[Delete Identity Management Profile | 773](#)

## Delete Identity Management Profile

You are here: **Configure** > **Security Services** > **User Firewall** > **Identity Management**.

To delete identity management profile:

1. Select an identity management profile that you want to delete on the Identity Management page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the profile.

#### RELATED DOCUMENTATION

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[About the Identity Management Page | 767](#)

---

[Add an Identity Management Profile | 769](#)

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[Edit an Identity Management Profile | 772](#)



# Security Services—SSL Initiation Profiles

IN THIS CHAPTER

- [About the SSL Initiation Profile Page | 774](#)
- [Add a SSL Initiation Profile | 775](#)
- [Edit a SSL Initiation Profile | 778](#)
- [Delete SSL Initiation Profile | 779](#)
- [Search for Text in SSL Initiation Profile Table | 779](#)

## About the SSL Initiation Profile Page

You are here: **Configure** > **Security Services** > **SSL Profiles** > **SSL Initiation**.

You can configure SSL Initiation profiles.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Add a SSL initiation profile. See [“Add a SSL Initiation Profile” on page 775](#).
- Edit a SSL initiation profile. See [“Edit a SSL Initiation Profile” on page 778](#).
- Delete SSL initiation profile. See [“Delete SSL Initiation Profile” on page 779](#).
- Search for text in SSL initiation profile. See [“Search for Text in SSL Initiation Profile Table” on page 779](#).
- Show/ Hide columns.

### Field Descriptions

[Table 283 on page 775](#) describes the fields on the SSL Initiation Profile page.

Table 283: Fields on the SSL Initiation Profile Page

Field	Description
Name	Displays the name of the SSL initiation profile.
Flow Tracing	Displays whether flow trace is enabled or disabled for troubleshooting policy-related issues.
Protocol Version	Displays the accepted protocol SSL version.
Preferred Cipher	Displays the preferred cipher which the SSH server uses to perform encryption and decryption function.
Session Cache	Displays whether SSL session cache is enabled or not.
Server Authentication Failure	Displays the action that will be performed if errors are encountered during the server certificate verification process (such as CA signature verification failure, self-signed certificates, and certificate expiry).
Certificate Revocation	Displays the criterion for certificate revocation for the SSL initiation profile.

## RELATED DOCUMENTATION

[Add a SSL Initiation Profile | 775](#)
[Edit a SSL Initiation Profile | 778](#)
[Delete SSL Initiation Profile | 779](#)
[Search for Text in SSL Initiation Profile Table | 779](#)

## Add a SSL Initiation Profile

You are here: **Configure** > **Security Services** > **SSL Profiles** > **SSL Initiation**.

To add a SSL initiation profile:

1. Click the add icon (+) on the upper right side of the SSL Initiation Profile page.  
The Create SSL Initiation Profile page appears.
2. Complete the configuration according to the guidelines provided in [Table 284 on page 776](#).

3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

**Table 284: Fields on the Create SSL Initiation Profile Page**

Field	Action
<b>General Information</b>	
Name	<p>Enter a unique name of the SSL initiation profile.</p> <p>The string must consists of alphanumeric characters, colons, periods, dashes, and underscores. No spaces are allowed; maximum length is 63 characters.</p>
Flow Tracing	Select this option to enable flow trace for troubleshooting policy-related issues for this profile.
Protocol Version	<p>Specifies the accepted protocol SSL version.</p> <p>Select the protocol from the dropdown list: None, All, TLSv1, TLSv1.1, or TLSv1.2.</p>
Preferred Cipher	<p>Specify the cipher depending on their key strength. Select a preferred cipher from the list:</p> <ul style="list-style-type: none"> <li>• Custom—Configure custom cipher suite and order of preference.</li> <li>• Medium—Use ciphers with key strength of 128 bits or greater.</li> <li>• Strong—Use ciphers with key strength of 168 bits or greater.</li> <li>• Weak—Use ciphers with key strength of 40 bits or greater.</li> </ul>
Custom Ciphers	<p>Select one or more Ciphers from the list.</p> <p>Click Clear All to clear the selected ciphers from the list.</p>
Session Cache	Select this option to enable SSL session cache.
<b>Certificate</b>	

Table 284: Fields on the Create SSL Initiation Profile Page (*continued*)

Field	Action
Trusted CA	<p>Select the trusted certificate authority profile from the list.</p> <p>Specify the set of ciphers the SSH server can use to perform encryption and decryption functions. If this option is not configured, the server accepts any supported suite that is available.</p>
Client Certificate	<p>Specify a client certificate that is required to effectively authenticate the client.</p> <p>Select the appropriate client certificate from the list.</p> <ul style="list-style-type: none"> <li>• None</li> <li>• SSLRP_Automation_Cert_2</li> <li>• SSLFP_Automation_Cert_1</li> <li>• SSLRP_Automation_Cert_1</li> <li>• SSLFP_Automation_Cert_2</li> <li>• SSL2</li> </ul>
<b>Actions</b>	
Server Authentication Failure	<p>Select this option to ignore server authentication completely.</p> <p>In this case, SSL forward proxy ignores errors encountered during the server certificate verification process (such as CA signature verification failure, self-signed certificates, and certificate expiry).</p> <p>We do not recommend this option for authentication, because configuring it results in websites not being authenticated at all. However, you can use this option to effectively identify the root cause for dropped SSL sessions.</p>
CRL Validation	Enable this option to disable CRL validation.
Action	<p>Select an action from the list if CRL info is not present:</p> <ul style="list-style-type: none"> <li>• None</li> <li>• Allow</li> <li>• Drop</li> </ul>

Table 284: Fields on the Create SSL Initiation Profile Page (continued)

Field	Action
Hold Instruction Code	Select Ignore if you want to keep the instruction code on hold for this profile.

RELATED DOCUMENTATION

<a href="#">About the SSL Initiation Profile Page   774</a>
<a href="#">Edit a SSL Initiation Profile   778</a>
<a href="#">Delete SSL Initiation Profile   779</a>
<a href="#">Search for Text in SSL Initiation Profile Table   779</a>

## Edit a SSL Initiation Profile

You are here: **Configure** > **Security Services** > **SSL Profiles** > **SSL Initiation**.

To edit a SSL initiation profile:

1. Select the existing SSL initiation profile that you want to edit on the SSL Initiation Profile page.
2. Click the pencil icon available on the upper right side of the page.

The Edit a SSL Initiation Profile page appears with editable fields. For more information on the options, see [“Add a SSL Initiation Profile” on page 775](#).

3. Click **OK** to save the changes.

RELATED DOCUMENTATION

<a href="#">About the SSL Initiation Profile Page   774</a>
<a href="#">Add a SSL Initiation Profile   775</a>
<a href="#">Delete SSL Initiation Profile   779</a>
<a href="#">Search for Text in SSL Initiation Profile Table   779</a>

## Delete SSL Initiation Profile

You are here: **Configure** > **Security Services** > **SSL Profiles** > **SSL Initiation**.

To delete an SSL initiation profile:

1. Select an SSL initiation profile that you want to delete on the SSL Initiation Profile page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the profile.

### RELATED DOCUMENTATION

- [About the SSL Initiation Profile Page | 774](#)
- [Add a SSL Initiation Profile | 775](#)
- [Edit a SSL Initiation Profile | 778](#)
- [Search for Text in SSL Initiation Profile Table | 779](#)

## Search for Text in SSL Initiation Profile Table

You can use the search icon in the top right corner of the SSL Initiation Profile page to search for text containing letters and special characters on that page.

To search for text:

1. Click the search icon. Enter partial text or full text of the keyword in the search bar.  
The search results are displayed.
2. Click **X** next to a search keyword or click **Clear All** to clear the search results.

### RELATED DOCUMENTATION

- [About the SSL Initiation Profile Page | 774](#)
- [Add a SSL Initiation Profile | 775](#)
- [Edit a SSL Initiation Profile | 778](#)

Delete SSL Initiation Profile | 779

# Security Services—SSL Proxy Profiles

## IN THIS CHAPTER

- [About the SSL Proxy Page | 781](#)
- [Add a SSL Proxy Profile | 783](#)
- [Edit a SSL Proxy Profile | 789](#)
- [Delete SSL Proxy Profile | 790](#)
- [Clone a SSL Proxy Profile | 791](#)
- [Search for Text in SSL Proxy Table | 791](#)

## About the SSL Proxy Page

You are here: **Configure** > **Security Services** > **SSL Profiles** > **SSL Proxy**.

You can create, add, edit, and delete SSL proxy or global policy configurations.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Configure global policy. To do this, click Global Config at the upper right of the table and enter the session cache timeout in seconds.
- Add a SSL proxy profile. See [“Add a SSL Proxy Profile” on page 783](#).
- Edit a SSL proxy profile. See [“Edit a SSL Proxy Profile” on page 789](#).
- Delete SSL proxy profile. See [“Delete SSL Proxy Profile” on page 790](#).
- Clone a SSL proxy profile. See [“Clone a SSL Proxy Profile” on page 791](#).
- Detailed View.
- Clear All Selections.
- Show/ Hide columns.
- Search for text in SSL proxy profile. See [“Search for Text in SSL Proxy Table” on page 791](#).



## Field Descriptions

Table 285 on page 782 describes the fields on the SSL Proxy page.

**Table 285: Fields on the SSL Proxy Page**

Field	Description
Name	Displays the name of the SSL Proxy profile.
Protection Type	Displays the type of protection the profile provides. One is client protection and the other one is server protection. Client protection is for SSL forward proxy and server protection is for reverse proxy.
Preferred Cipher	Displays the category of the profile depending on their key strength.
Custom Cipher	Displays the custom cipher which the SSH server uses to perform encryption and decryption function.
Flow Tracing	Displays whether flow trace is enabled or disabled for troubleshooting policy-related issues.
Exempted Addresses	Displays the addresses to allowlists that bypass SSL forward proxy processing.
Server Auth Failure	Displays the action that will be performed if errors are encountered during the server certificate verification process (such as CA signature verification failure, self-signed certificates, and certificate expiry).
Session Resumption	Displays whether the session resumption is disabled or not.
Interface	Displays the name of the interface associated with the VLAN.
MAC Address	Displays the MAC address associated with the VLAN.

## RELATED DOCUMENTATION

[Add a SSL Proxy Profile | 783](#)

[Edit a SSL Proxy Profile | 789](#)

[Delete SSL Proxy Profile | 790](#)

[Clone a SSL Proxy Profile | 791](#)

[Search for Text in SSL Proxy Table | 791](#)

## Add a SSL Proxy Profile

You are here: **Configure** > **Security Services** > **SSL Profiles** > **SSL Proxy**.

To add a SSL proxy profile:

1. Click the add icon (+) on the upper right side of the SSL Proxy Profile page.  
The Create SSL Proxy Profile page appears.
2. Complete the configuration according to the guidelines provided in [Table 286 on page 783](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 286: Fields on the Create SSL Proxy Profile Page

Field	Action
<b>General Information</b>	
Name	<p>Enter a name of the SSL proxy profile.</p> <p>The string must contain alphanumeric characters, colons, periods, dashes, and underscores. No spaces are allowed; maximum length is 63 characters.</p>
Preferred Cipher	<p>Specifies the cipher depending on their key strength. Select a preferred cipher from the list:</p> <ul style="list-style-type: none"><li>• Medium—Use ciphers with key strength of 128 bits or greater.</li><li>• Strong—Use ciphers with key strength of 168 bits or greater.</li><li>• Weak—Use ciphers with key strength of 40 bits or greater.</li><li>• Custom—Configure custom cipher suite and order of preference.</li></ul>

Table 286: Fields on the Create SSL Proxy Profile Page *(continued)*

Field	Action
Custom Ciphers	

Table 286: Fields on the Create SSL Proxy Profile Page (*continued*)

Field	Action
	<p>Specifies the set of ciphers the SSH server can use to perform encryption and decryption functions. If this option is not configured, the server accepts any supported suite that is available.</p> <p>Select the set of ciphers from the list:</p> <ol style="list-style-type: none"> <li>1. rsa-with-RC4-128-md5—RSA, 128-bit RC4, MD5 hash</li> <li>2. rsa-with-RC4-128-sha—RSA, 128-bit RC4, SHA hash</li> <li>3. rsa-with-des-cbc-sha—RSA, DES/CBC, SHA hash</li> <li>4. rsa-with-3DES-edc-cbc-sha—RSA, 3DES EDE/CBC, SHA hash</li> <li>5. rsa-with-aes-128-cbc-sha—RSA, 128-bit AES/CBC, SHA hash</li> <li>6. rsa-with-aes-256-cbc-sha—RSA, 256 bit AES/CBC, SHA hash</li> <li>7. rsa-export-with-rc4-40-md5—RSA-export, 40 bit RC4, MD5 hash</li> <li>8. rsa-export-with-des40-cbc-sha—RSA-export, 40 bit DES/CBC, SHA hash</li> <li>9. rsa-with-aes-256-gcm-sha384—RSA, 256 bit AES/GCM, SHA384 hash</li> <li>10. rsa-with-aes-256-cbc-sha256—RSA, 256 bit AES/CBC, SHA256 hash</li> <li>11. rsa-with-aes-128-gcm-sha256—RSA, 128 bit AES/GCM, SHA256 hash</li> <li>12. rsa-with-aes-128-cbc-sha256—RSA, 256 bit AES/CBC, SHA256 hash</li> <li>13. ecdhe-rsa-with-aes-256-gcm-sha384—ECDHE, RSA, 256 bit AES/GCM, SHA384 hash</li> <li>14. ecdhe-rsa-with-aes-256-cbc-sha—ECDHE, RSA, 256 bit AES/CBC, SHA hash</li> <li>15. ecdhe-rsa-with-aes-256-cbc-sha384—ECDHE, RSA, 256 bit AES/CBC, SHA384 hash</li> <li>16. ecdhe-rsa-with-aes-3des-edc-cbc-sha—ECDHE, RSA, 3DES, EDE/CBC, SHA hash</li> <li>17. ecdhe-rsa-with-aes-128-gcm-sha256—ECDHE, RSA, 128 bit AES/GCM, SHA256 hash</li> <li>18. ecdhe-rsa-with-aes-128-cbc-sha—ECDHE, RSA, 128</li> </ol>

Table 286: Fields on the Create SSL Proxy Profile Page (continued)

Field	Action
	<p>bit AES/CBC, SHA hash</p> <p>19.ecdhe-rsa-with-aes-128-cbc-sha256—ECDHE, RSA, 128 bit AES/CBC, SHA256 hash</p>
Flow Trace	Select the check box to enable flow trace for troubleshooting policy-related issues. Else leave it blank.
Certificate Type	<p>Specifies whether the certificate that you want to associate with this profile is a root CA or server certificate. Server certificate is used for SSL reverse proxy. If you choose server certificate, the trusted CA, CRL, and server auth failure options will not be available. For forward proxy profile, choose the root CA</p> <p>In a public key infrastructure (PKI) hierarchy, the root CA is at the top of the trust path. The root CA identifies the server certificate as a trusted certificate.</p>
Certificate	<p>Select the certificate that you want to associate with this SSL proxy profile from the list.</p> <p>Specifies the certificate that you created in the Administration &gt; Certificate Management page of J-Web. In a public key infrastructure (PKI) hierarchy, the CA is at the top of the trust path. The CA identifies the server certificate as a trusted certificate.</p>
Trusted Certificate Authorities	<p>Select the trusted CA that are available on the device from the following options: All, None, Select specific.</p> <p>If you choose Select specific, you need to select the Certificate Authorities from the Available column and move it to the Selected column.</p>

Table 286: Fields on the Create SSL Proxy Profile Page (*continued*)

Field	Action
Exempted Addresses	<p>Specifies addresses to create allowlists that bypass SSL forward proxy processing.</p> <p>Select the addresses from the from the Available column and move it to the Selected column.</p> <p>Because SSL encryption and decryption are complicated and expensive procedures, network administrators can selectively bypass SSL proxy processing for some sessions. Such sessions mostly include connections and transactions with trusted servers or domains with which network administrators are very familiar. There are also legal requirements to exempt financial and banking sites. Such exemptions are achieved by configuring the IP addresses or domain names of the servers under allowlists.</p>
Exempted URL Categories	<p>Specifies URL categories to create allowlists that bypass SSL forward proxy processing.</p> <p>Select URL categories from the from the Available column and move it to the Selected column.</p> <p>These URL categories are exempted during SSL inspection. Only the predefined URL categories can be selected for the exemption.</p>
<b>Actions</b>	
Server Auth Failure	<p>Select the check box to ignore server authentication completely.</p> <p>In this case, SSL forward proxy ignores errors encountered during the server certificate verification process (such as CA signature verification failure, self-signed certificates, and certificate expiry).</p> <p>We do not recommend this option for authentication, because configuring it results in websites not being authenticated at all. However, you can use this option to effectively identify the root cause for dropped SSL sessions.</p>

Table 286: Fields on the Create SSL Proxy Profile Page (*continued*)

Field	Action
Session Resumption	<p>Select the check box if you do not want session resumption.</p> <p>To improve throughput and still maintain an appropriate level of security, SSL session resumption provides a session caching mechanism so that session information, such as the pre-master secret key and agreed-upon ciphers, can be cached for both the client and server.</p>
Logging	<p>Select an option from the list to generate logs.</p> <p>You can choose to log All events, Warning, Info, Errors, or different sessions (allowlisted, Allowed, Dropped, or Ignored).</p>
Renegotiation	<p>After a session is created and SSL tunnel transport has been established, a change in SSL parameters requires renegotiation. SSL forward proxy supports both secure (RFC 5746) and nonsecure (TLS v1.0 and SSL v3) renegotiation.</p> <p>You can specify whether to Allow nonsecure renegotiation, Allow-secure renegotiation, or Drop renegotiation.</p> <p>When session resumption is enabled, session renegotiation is useful in the following situations:</p> <ul style="list-style-type: none"> <li>• Cipher keys need to be refreshed after a prolonged SSL session.</li> <li>• Stronger ciphers need to be applied for a more secure connection.</li> </ul> <p>Select if a change in SSL parameters requires renegotiation. The options are: None (selected by default), Allow, Allow-secure, and Drop.</p>
Certificate Revocation	<p>Select the check box if you want to revoke the certificate.</p>
If CRL info not present	<p>Specifies if you want to allow or drop if CRL info is not present.</p> <p>Select the following actions from the list if CRL info is not present : Allow session, Drop session, or None.</p>

Table 286: Fields on the Create SSL Proxy Profile Page (*continued*)

Field	Action
Hold Instruction Code	Select Ignore if you want to keep the instruction code on hold.
<b>Mirror Decrypt Traffic</b>	
Interface	Select a SSL decryption port mirroring interface from the list. This is an Ethernet interface on SRX Series device through which the copy of the SSL decrypted traffic is forwarded to a mirror port.
Only after Security Policies Enforcement	Select the check box to enable forwarding the copy of the decrypted traffic to the external mirror traffic collector after enforcing the Layer 7 security services through a security policy.
MAC Address	Enter the MAC address of the external mirror traffic collector port.

## RELATED DOCUMENTATION

- [About the SSL Proxy Page | 781](#)
- [Edit a SSL Proxy Profile | 789](#)
- [Delete SSL Proxy Profile | 790](#)
- [Clone a SSL Proxy Profile | 791](#)
- [Search for Text in SSL Proxy Table | 791](#)

## Edit a SSL Proxy Profile

You are here: **Configure** > **Security Services** > **SSL Profiles** > **SSL Proxy**.

To edit a SSL proxy profile:

1. Select the existing SSL proxy profile that you want to edit on the SSL Proxy Profile page.
2. Click the pencil icon available on the upper right side of the page.



The Update SSL Initiation Profile page appears with editable fields. For more information on the options, see [“Add a SSL Proxy Profile” on page 783](#).

- 3. Click **OK** to save the changes.

RELATED DOCUMENTATION

<a href="#">About the SSL Proxy Page   781</a>
<a href="#">Add a SSL Proxy Profile   783</a>
<a href="#">Delete SSL Proxy Profile   790</a>
<a href="#">Clone a SSL Proxy Profile   791</a>
<a href="#">Search for Text in SSL Proxy Table   791</a>

**Delete SSL Proxy Profile**

You are here: **Configure > Security Services > SSL Profiles > SSL Proxy**.

To delete SSL proxy profile:

- 1. Select one or more SSL proxy profiles that you want to delete on the SSL Proxy page.
- 2. Click the delete icon available on the upper right side of the page.
- 3. Click **Yes** to delete or click **No** to retain the profile.

RELATED DOCUMENTATION

<a href="#">About the SSL Proxy Page   781</a>
<a href="#">Add a SSL Proxy Profile   783</a>
<a href="#">Edit a SSL Proxy Profile   789</a>
<a href="#">Clone a SSL Proxy Profile   791</a>
<a href="#">Search for Text in SSL Proxy Table   791</a>

# Clone a SSL Proxy Profile

You are here: **Configure** > **Security Services** > **SSL Profiles** > **SSL Proxy**.

To clone a SSL proxy profile:

1. Select a SSL Proxy profile that you want to clone and select **Clone** from the More link.

**NOTE:** Alternatively, you can right-click on the selected SSL Proxy profile and select **Clone**.

The Clone SSL Proxy Profile page appears with editable fields. For more information on the options, see [“Add a SSL Proxy Profile” on page 783](#).

2. Click **OK** to save the changes or click **Cancel** to discard the changes.

## RELATED DOCUMENTATION

<a href="#">About the SSL Proxy Page   781</a>
<a href="#">Add a SSL Proxy Profile   783</a>
<a href="#">Edit a SSL Proxy Profile   789</a>
<a href="#">Delete SSL Proxy Profile   790</a>
<a href="#">Search for Text in SSL Proxy Table   791</a>

# Search for Text in SSL Proxy Table

You can use the search icon in the top right corner of the SSL Proxy page to search for text containing letters and special characters on that page.

To search for text:

1. Click the search icon, enter partial text or full text of the keyword in the search bar.  
The search results are displayed.
2. Click **X** next to a search keyword or click **Clear All** to clear the search results.

RELATED DOCUMENTATION

About the SSL Proxy Page   781
Add a SSL Proxy Profile   783
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# Security Services—ICAP Redirect

IN THIS CHAPTER

- [About the ICAP Redirect Profile Page | 793](#)
- [Add an ICAP Redirect Profile | 794](#)
- [Edit an ICAP Redirect Profile | 797](#)
- [Delete ICAP Redirect Profile | 797](#)
- [Search for Text in ICAP Redirect Profile Table | 798](#)

## About the ICAP Redirect Profile Page

You are here: **Configure** > **Security Services** > **ICAP Redirect**.

You can configure ICAP Redirect Profile.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Create an ICAP redirect profile. See [“Add an ICAP Redirect Profile” on page 794](#).
- Edit an ICAP redirect profile. See [“Edit an ICAP Redirect Profile” on page 797](#).
- Delete an ICAP redirect profile. See [“Delete ICAP Redirect Profile” on page 797](#).
- Search for text in ICAP redirect profile. See [“Search for Text in ICAP Redirect Profile Table” on page 798](#).
- Show or hide columns in the ICAP redirect profiles table. To do this, click the Show Hide Columns icon in the top right corner of the ICAP redirect profiles table and select the options you want to view or deselect the options you want to hide on the page.

### Field Descriptions

[Table 287 on page 794](#) describes the fields on the ICAP Redirect Profile page.

Table 287: Fields on the ICAP Redirect Profile Page

Field	Description
Name	Displays the ICAP Service profile name.
Timeout	Displays the server response timeout in milliseconds.
Server	Displays the ICAP Redirection Server.
Fallback Option	Specifies the request timeout action when the request is sent to the server.
HTTP Redirect	Enables redirect service on HTTP request/HTTP response.

## RELATED DOCUMENTATION

[Add an ICAP Redirect Profile | 794](#)
[Edit an ICAP Redirect Profile | 797](#)
[Delete ICAP Redirect Profile | 797](#)
[Search for Text in ICAP Redirect Profile Table | 798](#)

## Add an ICAP Redirect Profile

You are here: **Configure** > **Security Services** > **ICAP Redirect**.

To add an ICAP redirect profile:

1. Click the add icon (+) on the upper right side of the ICAP Redirect Profiles page.  
The Create ICAP Redirect Profile page appears.
2. Complete the configuration according to the guidelines provided in [Table 288 on page 795](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 288: Fields on the Create ICAP Redirect Profile Page

Field	Action
Name	Enter a unique ICAP Service profile name. The string must contain alphanumeric characters, colons, periods, dashes, and underscores. No spaces are allowed; maximum length is 63 characters.
Timeout	Enter the server response timeout in milliseconds. The range is between 100 milliseconds to 50000 milliseconds.

**HTTP Redirect Option**

Request	Select to enable redirect service on HTTP request.
Response	Select to enable redirect service on HTTP response.

**ICAP Server**

You can configure ICAP Redirection server by the following options:

**Add**—Create an ICAP Redirect server. Enter information as specified in [Table 289 on page 795](#).

**Edit**—Edit an ICAP Redirect server configuration. Enter information as specified in [Table 289 on page 795](#).

**Fallback Option**

Timeout Action	Select the timeout action from the list. The available options are: None, Permit, Log Permit, and Block.
Connectivity Action	Select the connectivity action from the list that the request cannot be sent out due to connection issues.
Default Action	Select a default action from the list to be taken when there are scenarios other than the above two mentioned ones.

Table 289: Fields on the Create ICAP Redirect Server Page

Field	Action
Name	Enter a ICAP Redirect server name.  The string must contain alphanumeric characters, colons, periods, dashes, and underscores. No spaces are allowed; maximum length is 63 characters.
Host Type*	Select Name or IP address.

Table 289: Fields on the Create ICAP Redirect Server Page (continued)

Field	Action
Host	Enter the host name or host IP address depending on what host type you choose.
Port	Specifies the port in the server. This is the server listening post and the default port will be reached according to protocol defined.  Enter the port number. The range is 1025 through 65534.
Sockets	Specifies the number of connections to be created.  Enter the number of connections. The range is 1 through 64.
<b>Authentication</b>	
Authorization Type	Specifies the type of authentication.
Credentials Type	Select the credential type as ASCII or Base64.  Based on the Credential Type that you choose, enter the ASCII string or Base64 string.
<b>URL</b>	
Request MOD	Enter the reqmod uri that can be configured for ICAP server only.
Response MOD	Enter the respmod uri that can be configured for ICAP server only.
Routing Instance	Specifies the virtual router that is used for launching.  Select a routing instance from the list.
SSL Initiation Profile	Select a SSL initiation profile from the list.

## RELATED DOCUMENTATION

[About the ICAP Redirect Profile Page | 793](#)
[Edit an ICAP Redirect Profile | 797](#)
[Delete ICAP Redirect Profile | 797](#)
[Search for Text in ICAP Redirect Profile Table | 798](#)

## Edit an ICAP Redirect Profile

You are here: **Configure** > **Security Services** > **ICAP Redirect**.

To edit an ICAP redirect profile:

1. Select the existing ICAP redirect profile that you want to edit on the ICAP Redirect page.
2. Click the pencil icon available on the upper right side of the page.

The Edit ICAP Redirect Profile page appears with editable fields. For more information on the options, see [“Add an ICAP Redirect Profile” on page 794](#).

3. Click **OK** to save the changes.

### RELATED DOCUMENTATION

---

[About the ICAP Redirect Profile Page | 793](#)

---

[Add an ICAP Redirect Profile | 794](#)

---

[Delete ICAP Redirect Profile | 797](#)

---

[Search for Text in ICAP Redirect Profile Table | 798](#)

## Delete ICAP Redirect Profile

You are here: **Configure** > **Security Services** > **ICAP Redirect**.

To delete ICAP redirect profile:

1. Select one or more ICAP redirect profile that you want to delete on the ICAP Redirect page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the profile.

### RELATED DOCUMENTATION

---

[About the ICAP Redirect Profile Page | 793](#)

---

[Add an ICAP Redirect Profile | 794](#)



# Search for Text in ICAP Redirect Profile Table

You can use the search icon in the top right corner of ICAP Redirect Profile page to search for text containing letters and special characters on that page.

To search for text:

1. Click the search icon, enter partial text or full text of the keyword in the search bar.  
The search results are displayed.
2. Click **X** next to a search keyword or click **Clear All** to clear the search results.

## RELATED DOCUMENTATION

[About the ICAP Redirect Profile Page | 793](#)

[Add an ICAP Redirect Profile | 794](#)

[Edit an ICAP Redirect Profile | 797](#)

[Delete ICAP Redirect Profile | 797](#)

# Multi Tenancy—Logical Systems

## IN THIS CHAPTER

- [About the Logical Systems Page | 799](#)
- [Add a Logical System | 801](#)
- [Edit a Logical System | 810](#)
- [Delete Logical System | 810](#)
- [Search Text in Logical Systems Table | 811](#)

## About the Logical Systems Page

You are here: **Configure** > **Multi Tenancy** > **Logical Systems**.

Use this page to view, add, and delete Logical System.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Create a logical systems. See [“Add a Logical System” on page 801](#).
- Edit a logical systems. See [“Edit a Logical System” on page 810](#).
- Delete a logical systems. See [“Delete Logical System” on page 810](#).
- Search for Text in a logical systems table. See [“Search Text in Logical Systems Table” on page 811](#).
- Filter
- Show hide columns.
- Detailed View.
- Root users can switch to Logical system context. To do this, click Enter LSYS on the upper right of the table. See [Table 291 on page 800](#).

## Field Descriptions

[Table 290 on page 800](#) describes the fields on the Logical Systems page.

**Table 290: Fields on the Logical Systems Page**

Field	Description
Name	Displays the name of the logical system.
Resource Profile	Displays the name of the resource profile.
Users	Displays the logical system admin and users.
Assigned Interfaces	Displays the assigned logical interfaces.
Zone	Displays the zone of the resource profile.

[Table 291 on page 800](#) describes the options on the LSYS page.

**Table 291: Enter LSYS Page Options**

Field	Description
Select Widget	<p>Specifies the following widgets:</p> <ul style="list-style-type: none"> <li>• Logical System Profile.</li> <li>• Logical System CPU Profile.</li> <li>• Logical System FW No Hits.</li> </ul> <p>Drag and drop a widget to add it to your dashboard. Once widgets are added to the dashboard, they can be edited, refreshed, or removed by hovering over the widget header and selecting the option. The manual refresh option must be used to refresh the widget data.</p>
Add Tabs	Click + to add a dashboard.

## RELATED DOCUMENTATION

[Add a Logical System | 801](#)

[Edit a Logical System | 810](#)

[Delete Logical System | 810](#)

[Search Text in Logical Systems Table | 811](#)

## Add a Logical System

You are here: **Configure** > **Multi Tenancy** > **Logical Systems**.

To add a logical systems:

1. Click the add icon (+) on the upper right side of the Logical Systems page.  
The Create Logical Systems page appears.
2. Complete the configuration according to the guidelines provided in [Table 292 on page 801](#).
3. Click **Finish** to save the changes. If you want to discard your changes, click **Cancel**.

Table 292: Fields on the Add Logical Systems Page

Field	Description
<b>General Details</b>	
Name	Enter a logical system name of a selected Resource Profile. Only one Resource Profile can be selected, per logical system.  The string must contain alphanumeric characters, colons, periods, dashes, and underscores. No spaces are allowed; maximum length is 63 characters.
<b>Logical System Resource Profile</b>	
Click one:	
<ul style="list-style-type: none"><li>• Add icon (+)— Adds Resource Profiles.</li><li>• Edit icon (/)— Edits the selected Resource Profiles.</li><li>• Delete icon (X) — Deletes the selected Resource Profiles.</li><li>• <b>Search icon</b>—Enables you to search a Resource Profile in the grid.</li><li>• <b>Filter icon</b> — Enables you to filter the selected option in the grid.</li><li>• <b>Show Hide Column Filter icon</b>—Enables you to show or hide a column in the grid.</li></ul>	
Profile Name	Enter a name of the security profile.  The string must contain an alphanumeric character and can include underscores; no spaces allowed; 31-character maximum.
IPS Policy	Select an IPS policy from the list.
<b>Resource Allocation</b>	

Table 292: Fields on the Add Logical Systems Page *(continued)*

Field	Description
Resource Name	

Table 292: Fields on the Add Logical Systems Page (*continued*)

Field	Description
	<p>Displays the resource name.</p> <ul style="list-style-type: none"> <li>• nat-pat-portnum - Specify the maximum quantity and the reserved quantity of ports for the logical system as part of its security profile.</li> <li>• dslite-software-initiator - Specify the number of IPv6 dual-stack lite (DS-Lite) software initiators that can connect to the software concentrator configured in either a user logical system or the primary logical system.</li> <li>• cpu - Specify the percentage of CPU utilization that is always available to a logical system.</li> <li>• appfw-rule - Specify the number of application firewall rule configurations that a primary administrator can configure for a primary logical system or user logical system when the security profile is bound to the logical systems.</li> <li>• nat-interface-port-ol - Specify the number of application firewall rule set configurations that a primary administrator can configure for a primary logical system or user logical system when the security profile is bound to the logical systems.</li> <li>• nat-rule-referenced-prefix - Specify the security NAT interface port overloading the quota of a logical system.</li> <li>• nat-port-ol-ipnumber - Specify the number of NAT port overloading IP number configurations that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.</li> <li>• nat-cone-binding - Specify the number of NAT cone binding configurations that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.</li> <li>• nat-static-rule - Specify the number of NAT static rule configurations that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.</li> <li>• nat-destination-rule - Specify the number of NAT destination rule configurations that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.</li> <li>• nat-source-rule - Specify the NAT source rule configurations that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.</li> <li>• nat-nopat-address - Specify the number of NAT without port address translation configurations that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.</li> <li>• nat-pat-address - Specify the number of NAT with port address translation (PAT) configurations that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to</li> </ul>

Table 292: Fields on the Add Logical Systems Page (continued)

Field	Description
	<p>the logical systems.</p> <ul style="list-style-type: none"> <li>• nat-destination-pool - Specify the number of NAT destination pool configurations that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.</li> <li>• nat-source-pool - Specify the NAT source pool configurations that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.</li> <li>• flow-gate - Specify the number of flow gates, also known as pinholes that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.</li> <li>• flow-session - Specify the number of flow sessions that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.</li> <li>• policy - Specify the number of security policies with a count that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.</li> <li>• security-log-stream-number - Specify the Security log stream number quota of a logical system.</li> <li>• scheduler - Specify the number of schedulers that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.</li> <li>• zone - Specify the zones that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.</li> <li>• auth-entry - Specify the number of firewall authentication entries that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.</li> <li>• address-book - Specify the entries in the address book. Address book entries can include any combination of IPv4 addresses, IPv6 addresses, DNS names, wildcard addresses, and address range.</li> </ul>
Range	Display range for each resource.
Edit	Select a resource and click on the pencil icon to edit Reserved and Maximum fields.
Reserved	Specify reserved quota that guarantees that the resource amount specified is always available to the logical system.
Maximum	Specify the maximum allowed quota.

Table 292: Fields on the Add Logical Systems Page (*continued*)

Field	Description
IPS Max Sessions	Enter maximum number of sessions. Use up and down arrow keys to increase or decrease the number.

### Users

Click one:

- Add icon (+) – Create users.
- Edit icon (/) – Edit the selected users.
- Delete icon (X)– Delete the selected users.

### Create-Edit users

User Name	Enter a user name.  Maximum length is 64 characters.
Role	<ul style="list-style-type: none"> <li>• Logical System Administrator</li> <li>• Read only Access User</li> </ul> <p><b>NOTE:</b> LSYS Read Only user can only view the options but cannot modify them.</p>
Password	Enter a password for the user which is more than 6 characters but less than 128 characters.
Confirm Password	Re-enter the new password to confirm.

### Interfaces

Click One:

- **Enable/Disable** – Enable or disable the physical interface.
- Add icon (+) – Add logical interfaces.
- Edit icon (/) –Edit the selected users.
- Delete icon (X)– Delete the selected users.

### Create-Edit logical interfaces

<b>General</b>	
Physical Interface Name	Displays the name of the Physical Interface.
Logical Interface Unit	Enter the logical Interface Unit
Description	Enter the description.



Table 292: Fields on the Add Logical Systems Page (*continued*)

Field	Description
VLAN ID	Enter the VLAN ID. VLAN ID is mandatory.
<b>IPv4 Address</b>	
IPv4 Address	Click + and enter a valid IP address.
Subnet Mask	Enter a valid subnet mask.
Delete	Select the IPv4 address and click the delete icon to delete the address.
<b>IPv6 Address</b>	
IPv6 Address	Enter a valid IP address.
Subnet Mask	Enter a valid subnet mask.
Delete	Select the IPv6 address and click the delete icon to delete the address.

## Zones

Click One:

- Add icon (+) – Create security zones.
- Edit icon (/) –Edit the selected security zones.
- Delete icon (X)– Delete the selected security zone.
- Search - Search for a security zone.

## Create-Edit Security Zones

<b>General</b>	
Name	Enter a valid name of the zone.
Description	Enter a description of the zone.
Application Tracking	Enables the application tracking support.
Source Identity Log	Enable source identity log for this zone.
<b>Interfaces</b>	Select an interface from the Available column and move it to Selected column.
Selected interfaces	Displays the selected interfaces.

Table 292: Fields on the Add Logical Systems Page *(continued)*

Field	Description
System Services	

Table 292: Fields on the Add Logical Systems Page (*continued*)

Field	Description
	<p>Select system services from the following options:</p> <p><b>NOTE:</b> Select the Except check box to allow services other than the selected services.</p> <ul style="list-style-type: none"> <li>• all - Specify all system services.</li> <li>• any-service - Specify services on entire port range.</li> <li>• appqoe- Specify the APPQOE active probe service.</li> <li>• bootp - Specify the Bootp and dhcp relay agent service.</li> <li>• dhcp - Specify the Dynamic Host Configuration Protocol.</li> <li>• dhcpv6- Enable Dynamic Host Configuration Protocol for IPV6.</li> <li>• dns- Specify the DNS service.</li> <li>• finger- Specify the finger service.</li> <li>• ftp- Specify the FTP protocol.</li> <li>• http – Specify the web management using HTTP.</li> <li>• https- Specify the web management using HTTP secured by SSL.</li> <li>• ident-reset- Specify the send back TCP RST IDENT request for port 113.</li> <li>• ike- Specify the Internet key exchange.</li> <li>• lsping-Specify the Label Switched Path ping service.</li> <li>• netconf- Specify the NETCONF Service.</li> <li>• ntp - Specify the network time protocol service.</li> <li>• ping – Specify the internet control message protocol.</li> <li>• r2cp-Enable Radio-Router Control Protocol service.</li> <li>• reverse-ssh-Specify the reverse SSH Service.</li> <li>• reverse-telnet-Specify the reverse telnet Service.</li> <li>• rlogin-Specify the Rlogin service</li> <li>• rpm-Specify the Real-time performance monitoring.</li> <li>• rsh-Specify the Rsh service.</li> <li>• snmp- Specify the Simple Network Management Protocol Service.</li> <li>• snmp-trap- Specify the Simple Network Management Protocol trap.</li> <li>• ssh-Specify the SSH service.</li> <li>• tcp-encap-Specify the TCP encapsulation service.</li> <li>• telnet-Specify the Telnet service.</li> <li>• tftp-Specify the TFTP</li> <li>• traceroute-Specify the traceroute service.</li> <li>• webapi-clear-text-Specify the Webapi service using http.</li> <li>• webapi-ssl-Specify the Webapi service using HTTP secured by SSL.</li> </ul>

Table 292: Fields on the Add Logical Systems Page (*continued*)

Field	Description
	<ul style="list-style-type: none"> <li>• xnm-clear-text-Specify the JUNOScript API for unencrypted traffic over TCP.</li> <li>• xnm-ssl- Specify the JUNOScript API Service over SSL.</li> </ul>
Protocols	<p>Select a protocol from the following options:</p> <p><b>NOTE:</b> Select the Except check box to allow protocols other than the selected protocols.</p> <ul style="list-style-type: none"> <li>• bfd - Bidirectional Forwarding Detection.</li> <li>• bgp - Broder Gateway protocol.</li> <li>• dvmrp - Distance Vector Multicast Routing Protocol.</li> <li>• igmp - Internet group management protocol.</li> <li>• ldp - label Distribution Protocol.</li> <li>• msdp- Multicast source discovery protocol.</li> <li>• nhrp- Next Hop Resolution Protocol.</li> <li>• ospf- Open shortest path first.</li> <li>• ospf3- Open shortest path first version 3.</li> <li>• pgm – Pragmatic General Multicast.</li> <li>• pim- Protocol independent multicast.</li> <li>• rip- Routing information protocol.</li> <li>• ripng- Routing information protocol next generation.</li> <li>• router-discovery- Router Discovery.</li> <li>• rsvp- Resource reservation protocol.</li> <li>• sap - Session Announcement Protocol.</li> <li>• vrrp – Virtual Router redundancy protocol.</li> </ul>
Traffic Control Options	Enable this option to send RST for NON-SYN packet not matching TCP session.

## RELATED DOCUMENTATION

[About the Logical Systems Page | 799](#)
[Add a Logical System | 801](#)
[Edit a Logical System | 810](#)
[Delete Logical System | 810](#)
[Search Text in Logical Systems Table | 811](#)

## Edit a Logical System

You are here: **Configure** > **Multi Tenancy** > **Logical Systems**.

To edit a logical system profile:

1. Select the existing logical system profile that you want to edit on the Logical System Profile page.
2. Click the pencil icon available on the upper right side of the page.

The Edit a Logical System Profile page appears with editable fields. For more information on the options, see [“Add a Logical System” on page 801](#).

3. Click **OK** to save the changes.

### RELATED DOCUMENTATION

- [About the Logical Systems Page | 799](#)
- [Add a Logical System | 801](#)
- [Delete Logical System | 810](#)
- [Search Text in Logical Systems Table | 811](#)

## Delete Logical System

You are here: **Configure** > **Multi Tenancy** > **Logical Systems**.

To delete logical system:

1. Select the logical system that you want to delete on the Logical System page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the profile.

### RELATED DOCUMENTATION

- [About the Logical Systems Page | 799](#)
- [Add a Logical System | 801](#)

# Search Text in Logical Systems Table

You can use the search icon in the top right corner of a page to search for text containing letters and special characters on that page.

To search for text:

1. Click the search icon and enter a partial text or full text of the keyword in the search bar and execute.  
The search results are displayed.
2. Click **X** next to a search keyword or click **Clear All** to clear the search results.

## RELATED DOCUMENTATION

[About the Logical Systems Page | 799](#)

[Add a Logical System | 801](#)

[Edit a Logical System | 810](#)

[Delete Logical System | 810](#)

# Multi Tenancy—Resource Profiles

## IN THIS CHAPTER

- [About the Resource Profiles Page | 812](#)
- [Global Settings | 813](#)
- [Add a Resource Profile | 814](#)
- [Edit a Resource Profile | 817](#)
- [Delete Resource Profile | 818](#)
- [Search Text in Resource Profiles Table | 818](#)

## About the Resource Profiles Page

You are here: **Configure** > **Multi Tenancy** > **Resource Profiles**.

You can view Resource profile for logical-systems. Resource profiles are mandatory for creating logical systems.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Global Settings. See [“Global Settings” on page 813](#).
- Create a resource profile. See [“Add a Resource Profile” on page 814](#).
- Edit a resource profile. See [“Edit a Resource Profile” on page 817](#).
- Delete a resource profile. See [“Delete Resource Profile” on page 818](#).
- Search for Text in an resource Profile table. See [“Search Text in Resource Profiles Table” on page 818](#).
- View the details of an resource profile—To do this, select the resource profile for which you want to view the details and follow the available options:
  - Click **More** and select **Detailed View**.
  - Right-click on the selected resource profile and select **Detailed View**.

- Mouse over to the left of the selected resource profile and click **Detailed View**.
- Filter the resource profiles based on select criteria. To do this, select the filter icon at the top right-hand corner of the Resource Profiles table. The columns in the grid change to accept filter options. Type the filter options; the table displays only the data that fits the filtering criteria.
- Show or hide columns in the resource profiles table. To do this, click the Show Hide Columns icon in the top right corner of the Resource Profiles table and select the options you want to view or deselect the options you want to hide on the page.

Field Descriptions

Table 293 on page 813 describes the fields on the Resource Profiles page.

Table 293: Fields on the Resource Profiles Page

Field	Description
Profile Name	Displays the Security Profile names.
Configured Resource	Displays the configured resource.
Logical Systems/Tenants	Displays the logical system or tenants created.

RELATED DOCUMENTATION

<a href="#">Global Settings   813</a>
<a href="#">Add a Resource Profile   814</a>
<a href="#">Edit a Resource Profile   817</a>
<a href="#">Delete Resource Profile   818</a>
<a href="#">Search Text in Resource Profiles Table   818</a>

Global Settings

You are here: **Configure** > **Security Services** > **Resource Profiles**.

To add global settings:

1. Click the **Global Settings** on the upper right side of the Resource Profiles page.

The Global Settings page appears.



- 2. Complete the configuration according to the guidelines provided in [Table 294 on page 814](#).
- 3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 294: Fields on the Global Settings page

Field	Action
Enable CPU limit	Enable or disable the CPU limit.
CPU Target	<p>Specify the targeted CPU utilization allowed for the whole system (0 through 100 percent).</p> <p>Set a CPU target. You can enable/disable this option to set the value. This will be applicable to all the logical system resource profiles. If u set 50 % here then none of the profile(s) can have a value more than this and all the profiles should share this 50% of the CPU.</p>

RELATED DOCUMENTATION

<a href="#">About the Resource Profiles Page   812</a>
<a href="#">Add a Resource Profile   814</a>
<a href="#">Edit a Resource Profile   817</a>
<a href="#">Delete Resource Profile   818</a>
<a href="#">Search Text in Resource Profiles Table   818</a>

Add a Resource Profile

You are here: **Configure > Multi Tenancy > Logical Systems**.

To add a resource profile:

- 1. Click the add icon (+) on the upper right side of the Resource Profile page.  
The Add Resource Profile page appears.
- 2. Complete the configuration according to the guidelines provided in [Table 295 on page 815](#).
- 3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

Table 295: Fields on the Add Resource Profile Page

Field	Description
<b>General</b>	
Profile Name	<p>Enter a name of the security profile.</p> <p>The string must contain an alphanumeric character and can include underscores; no spaces allowed; 31-character maximum.</p>
IPS Policy	Select the IPS policy from the list.
<b>Resource Allocation</b>	
nat-pat-portnum	Specify the maximum quantity and the reserved quantity of ports for the logical system as part of its security profile.
dslite-softwire-initiator	Specify the number of IPv6 dual-stack lite (DS-Lite) softwire initiators that can connect to the softwire concentrator configured in either a user logical system or the primary logical system.
cpu	Specify the percentage of CPU utilization that is always available to a logical system.
appfw-rule	Specify the number of application firewall rule configurations that a primary administrator can configure for a primary logical system or user logical system when the security profile is bound to the logical systems.
nat-interface-port-ol	Specify the number of application firewall rule set configurations that a primary administrator can configure for a primary logical system or user logical system when the security profile is bound to the logical systems.
nat-rule-referenced-prefix	Specify the security NAT interface port overloading the quota of a logical system.
nat-port-ol-ipnumber	Specify the number of NAT port overloading IP number configurations that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.
nat-cone-binding	Specify the number of NAT cone binding configurations that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.
nat-static-rule	Specify the number of NAT static rule configurations that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.

Table 295: Fields on the Add Resource Profile Page (*continued*)

Field	Description
nat-destination-rule	Specify the number of NAT destination rule configurations that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.
nat-source-rule	Specify the NAT source rule configurations that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.
nat-nopat-address	Specify the number of NAT without port address translation configurations that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.
nat-pat-address	Specify the number of NAT with port address translation (PAT) configurations that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.
nat-destination-pool	Specify the number of NAT destination pool configurations that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.
nat-source-pool	Specify the NAT source pool configurations that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.
flow-gate	Specify the number of flow gates, also known as pinholes that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.
flow-session	Specify the number of flow sessions that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.
policy	Specify the number of security policies with a count that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.
security-log-stream-number	Specify the security log stream number.
scheduler	Specify the number of schedulers that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.

Table 295: Fields on the Add Resource Profile Page (continued)

Field	Description
zone	Specify the zones that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.
auth-entry	Specify the number of firewall authentication entries that user logical system administrators and primary logical system administrators can configure for their logical systems if the security profile is bound to the logical systems.
address-book	Specify the application firewall profile quota of a logical system.
Reserved	A reserved quota that guarantees that the resource amount specified is always available to the logical system.
Maximum	A maximum allowed quota.
Range	The minimum and maximum range permitted for each corresponding resource name.

## RELATED DOCUMENTATION

- [About the Resource Profiles Page | 812](#)
- [Global Settings | 813](#)
- [Edit a Resource Profile | 817](#)
- [Delete Resource Profile | 818](#)
- [Search Text in Resource Profiles Table | 818](#)

## Edit a Resource Profile

You are here: **Configure > Multi Tenancy > Resource Profiles.**

To edit a resource profiles:

1. Select the existing resource profiles that you want to edit on the Resource Profiles page.
2. Click the pencil icon available on the upper right side of the page.

The Edit Resource Profiles page appears with editable fields. For more information on the options, see [“Add a Resource Profile” on page 814.](#)

- 3. Click **OK** to save the changes.

RELATED DOCUMENTATION

<a href="#">About the Resource Profiles Page   812</a>
<a href="#">Global Settings   813</a>
<a href="#">Add a Resource Profile   814</a>
<a href="#">Delete Resource Profile   818</a>
<a href="#">Search Text in Resource Profiles Table   818</a>

## Delete Resource Profile

You are here: **Configure** > **Multi Tenancy** > **Resource Profile**.

To delete Resource Profiles:

- 1. Select the resource profiles that you want to delete on the Resource Profiles page.
- 2. Click the delete icon available on the upper right side of the page.
- 3. Click **Yes** to delete or click **No** to retain the profile.

RELATED DOCUMENTATION

<a href="#">About the Resource Profiles Page   812</a>
<a href="#">Global Settings   813</a>
<a href="#">Add a Resource Profile   814</a>
<a href="#">Edit a Resource Profile   817</a>
<a href="#">Search Text in Resource Profiles Table   818</a>

## Search Text in Resource Profiles Table

You can use the search icon in the top right corner of a page to search for text containing letters and special characters on that page.

To search for text:

1. Click the search icon and enter a partial text or full text of the keyword in the search bar and execute.  
The search results are displayed.
2. Click **X** next to a search keyword or click **Clear All** to clear the search results.

RELATED DOCUMENTATION

<a href="#">About the Resource Profiles Page   812</a>
<a href="#">Global Settings   813</a>
<a href="#">Add a Resource Profile   814</a>
<a href="#">Edit a Resource Profile   817</a>
<a href="#">Delete Resource Profile   818</a>

# Multi Tenancy—Tenants

## IN THIS CHAPTER

- [About the Tenants Page | 820](#)
- [Add a Tenant | 821](#)
- [Edit a Tenant | 829](#)
- [Delete Tenant | 829](#)
- [Search Text in Tenants Table | 830](#)

## About the Tenants Page

You are here: **Configure** > **Multi Tenancy** > **Tenants**.

You can use this page to add, view, and delete Tenants.

### Tasks You Can Perform

You can perform the following tasks from this page:

- Create a tenant. See [“Add a Tenant” on page 821](#).
- Edit a tenant. See [“Edit a Tenant” on page 829](#).
- Delete a tenant. See [“Delete Tenant” on page 829](#).
- Search for Text in a tenants table. See [“Search Text in Tenants Table” on page 830](#).
- View the details of the tenants—To do this, select the tenant for which you want to view the details and follow the available options:
  - Click **More** and select **Detailed View**.
  - Right-click on the selected tenant and select **Detailed View**.
  - Mouse over to the left of the selected tenant and click **Detailed View**.

- Filter the tenant based on select criteria. To do this, select the filter icon at the top right-hand corner of the tenant table. The columns in the grid change to accept filter options. Type the filter options; the table displays only the data that fits the filtering criteria.
- Show or hide columns in the tenant table. To do this, click the Show Hide Columns icon in the top right corner of the tenant table and select the options you want to view or deselect the options you want to hide on the page.

Field Descriptions

Table 296 on page 821 describes the fields on the Tenants page.

Table 296: Fields on the Tenants Page

Field	Description
Name	Displays the name of the tenant system.
Resource Profile	Displays the name of the resource profile.
Users	Displays the tenant system admin and users, and its associated permissions.
Assigned Interfaces	Displays the assigned logical interfaces.
Zones	Displays the zones for the tenant.
Routing Instance	Displays the routing instance that is explicitly assigned to the tenant system.

RELATED DOCUMENTATION

<a href="#">Add a Tenant   821</a>
<a href="#">Edit a Tenant   829</a>
<a href="#">Delete Tenant   829</a>
<a href="#">Search Text in Tenants Table   830</a>

Add a Tenant

You are here: **Configure > Multi Tenancy > Tenants.**



To add a Tenant:

1. Click the add icon (+) on the upper right side of the Tenants page.  
The Create Tenant page appears.
2. Complete the configuration according to the guidelines provided in [Table 297 on page 822](#).
3. Click **OK** to save the changes. If you want to discard your changes, click **Cancel**.

**Table 297: Fields on the Create Tenant Page**

Field	Description
<b>General Details</b>	
Name	Enter a name for the tenant.  Enter a unique string of alphanumeric characters, colons, periods, dashes, and underscores. No spaces are allowed; maximum length is 63 characters.
Routing Instance	By default the tenant name is taken as the routing instance name.
<b>Tenant Resource Profile</b>	
Profile Name	Displays the name of the resource profile.
Configured Resources	Displays the resources and its reserved or maximum quantity assigned for this resource profile.
Logical Systems/Tenants	Displays other logical systems and/or tenants using this resource profile.

Click one:

- Add icon (+)—Adds resource profiles.
- Edit icon (/)—Edits the selected resource profiles.
- Search icon—Enables you to search a resource profile in the grid.
- Filter icon—Enables you to filter the selected option in the grid.
- Show Hide Column Filter icon—Enables you to show or hide a column in the grid.

**Create-Edit Tenant Resource Profile**

See [“Add a Resource Profile” on page 814](#) for details on creating and editing resource profile.

Table 297: Fields on the Create Tenant Page (*continued*)

Field	Description
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**User Details**

You can define tenant administrators and users.

Click one:

- Add icon (+)—Create users.
- Edit icon (/)—Edit the selected users.
- Delete icon—Delete the selected users.

**Create-Edit users**

User Name	Enter a user name.  Maximum length is 64 characters.
Role	Specify the role of the user .  Select an option from the list: <ul style="list-style-type: none"> <li>• Tenant Administrator</li> <li>• Read only Access User</li> </ul> <p><b>NOTE:</b> Logical system or tenant Read Only user can only view the options but cannot modify them.</p>
Password	Specify the password for the user.
Confirm Password	Confirm the password.

**Assign Interfaces**

Only one logical interface can be part of one tenant, whereas, a tenant can have multiple logical interfaces.

Click One:

- **Enable/Disable** —Enable or disable the physical interface.
- Add icon (+)—Add logical interfaces.
- Edit icon (/)—Edit the selected users.
- Delete icon—Delete the selected users.

**Create-Edit logical interfaces**

<b>General</b>	
Physical Interface Name	Displays the name of the Physical Interface.

Table 297: Fields on the Create Tenant Page (*continued*)

Field	Description
Logical Interface Unit	Enter the logical interface unit.
Description	Enter the description.
VLAN ID	Enter the VLAN ID. VLAN ID is mandatory.
<b>IPv4 Address</b>	
IPv4 Address	Click + and enter a valid IP address.
Subnet Mask	Enter a valid subnet mask.
Delete	Select the IPv4 address and click the delete icon to delete the address.
<b>IPv6 Address</b>	
IPv6 Address	Enter a valid IP address.
Subnet Mask	Enter a valid subnet mask.
Delete	Select the IPv6 address and click the delete icon to delete the address.

### Zone Configuration

Click One:

- Add icon (+)—Create security zones.
- Edit icon (/)—Edit the selected security zones.
- Delete icon (X)—Delete the selected security zone.
- Search—Search for a security zone.

### Create-Edit Security Zones

<b>General</b>	
Name	Enter a valid name of the zone.
Description	Enter a description of the zone.
Application Tracking	Enables the application tracking support.
Source Identity Log	Enable source identity log for this zone.

Table 297: Fields on the Create Tenant Page *(continued)*

Field	Description
<b>Interfaces</b>	Select an interface from the Available column and move it to Selected column.
Selected interfaces	Displays the selected interfaces.

Table 297: Fields on the Create Tenant Page *(continued)*

Field	Description
System Services Options	

Table 297: Fields on the Create Tenant Page (*continued*)

Field	Description
	<p>Select system services from the following options:</p> <p><b>NOTE:</b> Select the Except check box to allow services other than the selected services.</p> <ul style="list-style-type: none"> <li>• all—Specify all system services.</li> <li>• any-service—Specify services on entire port range.</li> <li>• appqoe—Specify the APPQOE active probe service.</li> <li>• bootp—Specify the Bootp and dhcp relay agent service.</li> <li>• dhcp—Specify the Dynamic Host Configuration Protocol.</li> <li>• dhcpv6—Enable Dynamic Host Configuration Protocol for IPV6.</li> <li>• dns—Specify the DNS service.</li> <li>• finger— Specify the finger service.</li> <li>• ftp—Specify the FTP protocol.</li> <li>• http—Specify the web management using HTTP.</li> <li>• https—Specify the web management using HTTP secured by SSL.</li> <li>• ident-reset—Specify the send back TCP RST IDENT request for port 113.</li> <li>• ike—Specify the Internet key exchange.</li> <li>• lsping—Specify the Label Switched Path ping service.</li> <li>• netconf—Specify the NETCONF Service.</li> <li>• ntp—Specify the network time protocol service.</li> <li>• ping—Specify the internet control message protocol.</li> <li>• r2cp—Enable Radio-Router Control Protocol service.</li> <li>• reverse-ssh—Specify the reverse SSH Service.</li> <li>• reverse-telnet—Specify the reverse telnet Service.</li> <li>• rlogin—Specify the Rlogin service</li> <li>• rpm—Specify the Real-time performance monitoring.</li> <li>• rsh—Specify the Rsh service.</li> <li>• snmp—Specify the Simple Network Management Protocol Service.</li> <li>• snmp-trap—Specify the Simple Network Management Protocol trap.</li> <li>• ssh—Specify the SSH service.</li> <li>• tcp-encap—Specify the TCP encapsulation service.</li> <li>• telnet—Specify the Telnet service.</li> <li>• tftp—Specify the TFTP</li> <li>• traceroute—Specify the traceroute service.</li> <li>• webapi-clear-text—Specify the Webapi service using http.</li> </ul>

Table 297: Fields on the Create Tenant Page (*continued*)

Field	Description
	<ul style="list-style-type: none"> <li>• webapi-ssl—Specify the Webapi service using HTTP secured by SSL.</li> <li>• xnm-clear-text—Specify the JUNOScript API for unencrypted traffic over TCP.</li> <li>• xnm-ssl—Specify the JUNOScript API Service over SSL.</li> </ul>
Protocols	<p>Select a protocol from the following options:</p> <p><b>NOTE:</b> Select the Except check box to allow protocols other than the selected protocols.</p> <ul style="list-style-type: none"> <li>• bfd—Bidirectional Forwarding Detection.</li> <li>• bgp—Broder Gateway protocol.</li> <li>• dvmrp—Distance Vector Multicast Routing Protocol.</li> <li>• igmp—Internet group management protocol.</li> <li>• ldp—label Distribution Protocol.</li> <li>• msdp—Multicast source discovery protocol.</li> <li>• nhrp—Next Hop Resolution Protocol.</li> <li>• ospf—Open shortest path first.</li> <li>• ospf3—Open shortest path first version 3.</li> <li>• pgm—Pragmatic General Multicast.</li> <li>• pim—Protocol independent multicast.</li> <li>• rip—Routing information protocol.</li> <li>• ripng—Routing information protocol next generation.</li> <li>• router-discovery—Router Discovery.</li> <li>• rsvp—Resource reservation protocol.</li> <li>• sap—Session Announcement Protocol.</li> <li>• vrrp—Virtual Router redundancy protocol.</li> </ul>
Traffic Control Options	Enable this option to send RST for NON-SYN packet not matching TCP session.

## RELATED DOCUMENTATION

[About the Tenants Page | 820](#)
[Edit a Tenant | 829](#)
[Delete Tenant | 829](#)
[Search Text in Tenants Table | 830](#)

## Edit a Tenant

You are here: **Configure > Multi Tenancy > Tenants.**

To edit a tenant:

1. Select the existing tenant that you want to edit on the Tenants page.
2. Click the pencil icon available on the upper right side of the page.

The Edit a Tenant page appears with editable fields. For more information on the options, see [“Add a Tenant” on page 821.](#)

3. Click **OK** to save the changes.

### RELATED DOCUMENTATION

---

[About the Tenants Page | 820](#)

---

[Add a Tenant | 821](#)

---

[Delete Tenant | 829](#)

---

[Search Text in Tenants Table | 830](#)

## Delete Tenant

You are here: **Configure > Multi Tenancy > Tenants.**

To delete tenants:

1. Select the tenants that you want to delete on the Tenants page.
2. Click the delete icon available on the upper right side of the page.
3. Click **Yes** to delete or click **No** to retain the profile.

### RELATED DOCUMENTATION

---

[About the Tenants Page | 820](#)

---

[Add a Tenant | 821](#)



# Search Text in Tenants Table

You can use the search icon in the top right corner of a page to search for text containing letters and special characters on that page.

To search for text:

1. Click the search icon and enter a partial text or full text of the keyword in the search bar and execute.  
The search results are displayed.
2. Click **X** next to a search keyword or click **Clear All** to clear the search results.

## RELATED DOCUMENTATION

# 5

PART

## Reports

---

Reports | **832**

---

# Reports

## IN THIS CHAPTER

- [About Reports Page | 832](#)

## About Reports Page

### IN THIS SECTION

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- [Threat Assessment Report | 836](#)
- [Application and User Usage | 836](#)
- [Top Talkers | 837](#)
- [IPS Threat Environment | 837](#)
- [Viruses Blocked | 838](#)
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## Overview

Use the Reports menu to generate reports on demand. There are several predefined reports listed in this page, see [Table 298 on page 833](#). The generated report is displayed in HTML format. You can group multiple reports and generate a consolidated report.

Logical system and tenant support the reports listed in [Table 298 on page 833](#) only for SRX1500, SRX4100, SRX4200, and SRX4600 devices.

**Table 298: Predefined Group Reports and Supported Users**

Report Name	Root	Logical System Users	Tenant Users Support
Threat Assessment Report	Yes	Yes	Yes
Application and User Usage	Yes	Yes	Yes
Top Talkers	Yes	Yes	Yes

Table 298: Predefined Group Reports and Supported Users (continued)

Report Name	Root	Logical System Users	Tenant Users Support
IPS Threat Environment	Yes	Yes	No
URL Report	Yes	Yes	Yes
Viruses Blocked	Yes	Yes	No
Virus: Top Blocked	Yes	Yes	No
Top Firewall Events	Yes	Yes	Yes
Top Firewall Deny Destinations	Yes	Yes	Yes
Top Firewall Service Deny	Yes	Yes	Yes
Top Firewall Denies	Yes	Yes	Yes
Top IPS Events	Yes	Yes	No
Top Anti-spam Detected	Yes	Yes	No
Top Screen Attackers	Yes	Yes	Yes
Top Screen Victims	Yes	Yes	Yes
Top Screen Hits	Yes	Yes	Yes
Top Firewall Rules	Yes	Yes	Yes
Top Firewall Deny Sources	Yes	Yes	Yes
Top IPS Attack Sources	Yes	Yes	Yes
Top IPS Attack Destinations	Yes	Yes	No
Top IPS Rules	Yes	Yes	No
Top Web Apps	Yes	Yes	No
Top Roles	Yes	Yes	No

Table 298: Predefined Group Reports and Supported Users (continued)

Report Name	Root	Logical System Users	Tenant Users Support
Top Applications Blocked	Yes	Yes	No
Top URLs by User	Yes	Yes	No
Top Source Zone by Volume	Yes	Yes	Yes
Top Applications by User	Yes	Yes	Yes
Top Botnet Threats By Source Address via IDP Logs	Yes	Yes	No
Top Botnet Threats by Destination Address via IDP Logs	Yes	Yes	No
Top Botnet Threats by Threat Severity via IDP Logs	Yes	Yes	No
Top Malware Threats by Source Address via IDP Logs	Yes	Yes	No
Top Malware Threats by Destination Address via IDP Logs	Yes	Yes	No
Top Malware Threats by Threat Severity via IDP Logs	Yes	Yes	No
Top Blocked Applications via Webfilter Logs	Yes	Yes	No
Top Permitted Application Subcategories by Volume via Webfilter Logs	Yes	Yes	No
Top Permitted Application Subcategories by Count via Webfilter Logs	Yes	Yes	No

**Generate Reports**

To generate a report:

1. Click **Reports**.
2. Select the predefined report name and click **Generate Report**.

The Report Title window appears.

**NOTE:** You can select single or multiple report names or all the predefined report names and generate a consolidated report.

3. Enter a Name or description for your report.
4. Select the number of records you want in the report by selecting a number in Show Top.
5. In the Show Details section, Select **All** or **Top Selected** to display all the details or only the top selected details in the report.
6. Select the predefined time span from where you want the report to be generated. You may also enter a custom time span by selecting Custom from the list.
7. Click the arrow next to Sorting Options to choose options for the your display of reports.  
You may select to display reports from Largest to Smallest or Smallest to Largest details.
8. Click **Save** to save the generated report in the desired location.

The opening page of the report shows the time when it was generated. A table of contents is generated if you have selected multiple reports. Each report displays information in a bar graph and tabular format. If there is no data to be represented, the report says -No.

## Threat Assessment Report

Threat Assessment report contains the following content:

- Executive Summary
- Application Risk Assessment
- Threat & Malware Assessment
- User and Web Access Assessment

## Application and User Usage

Application and User Usage report contains the following content:

- Top High Risk Applications by Bandwidth
- Top High Risk Applications By Count

- Top Categories By Bandwidth
- Top Applications By Bandwidth
- Top Categories By Count
- Top Applications By Count
- Top Users Of High Risk Applications By Bandwidth
- Top Users By Bandwidth
- High Risk Applications Allowed Per User
- High Risk Applications Blocked Per User

## Top Talkers

Top Talkers report contains the following content:

- Top Source IPs by Bandwidth
- Top Destination IPs by Bandwidth
- Top Source IPs by Session
- Top Destination IPs by Session
- Top Users By Bandwidth
- Top Users By Count

## IPS Threat Environment

IPS Threat Environment report contains the following content:

- IPS Attacks by Severity Over Time
- Total IPS Attacks by Severity
- Top IPS Categories Blocked
- Top IPS Attacks Blocked
- Top Targeted Hosts by IP
- Top Targeted Hosts by User

**NOTE:** IPS Threat Environment report is not supported for tenant users.



## Viruses Blocked

Viruses Blocked report contains the following content:

- Total Viruses Blocked Over Time
- Top Viruses Blocked

**NOTE:** Viruses Blocked is not supported for tenant users.

## URL Report

URL Report contains the following content:

- Top URLs by Bandwidth
- Top URLs by Count
- Top URL Categories by Bandwidth
- Top URL Categories by Count
- Total URLs Blocked Over Time
- Top Blocked URLs
- Top Blocked URL Categories by Count
- Users With Most Blocked URLs

## Virus: Top Blocked

Virus: Top Blocked report contains Virus: Top Blocked content.

**NOTE:** Virus: Top Blocked is not supported for tenant users.

## Top Firewall Events

Top Firewall Events report contains Top Firewall Events.

### **Top Firewall Deny Destinations**

Top Firewall Deny Destinations report contains Top Firewall Deny Destinations.

### **Top Firewall Service Deny**


Top Firewall Service Deny report contains Top Firewall Service Deny.

### **Top Firewall Denies**

Top Firewall Denies report contains Top Firewall Denies.

### **Top IPS Events**


Top IPS Events report contains Top IPS Events.



**NOTE:** Top IPS Events is not supported for tenant users.

### **Top Anti-spam Detected**

Top Anti-Spam Detected report Top Anti-spam Detected.



**NOTE:** Top Anti-spam Detected is not supported for tenant users.

### **Top Screen Attackers**

Top Screen Attackers report contains Top Screen Attackers.

### **Top Screen Victims**

Top Screen Victims report contains Top Screen Victims.

### **Top Screen Hits**

Top Screen Hits report contains Top Screen Hits.

## Top Firewall Rules

Top Firewall Rules report contains Top Firewall Rules.

## Top Firewall Deny Sources


Top Firewall Deny Sources report contains Top Firewall Deny Sources.

## Top IPS Attack Sources

Top IPS Attack Sources report contains Top IPS Attack Sources.

## Top IPS Attack Destinations


Top IPS Attack Destinations report contains Top IPS Attack Destinations.



**NOTE:** Top IPS Attack Destinations is not supported for tenant users.

## Top IPS Rules

Top IPS Rules report contains Top IPS Rules.



**NOTE:** Top IPS Rules is not supported for tenant users.

## TopWeb Apps


Top Web Apps report contains Top Web Apps.



**NOTE:** TopWeb Apps is not supported for tenant users.

## Top Roles


Top Roles report contains Top Roles.



**NOTE:** Top Roles is not supported for tenant users.

### **Top Applications Blocked**


Top Applications Blocked report contains Top Applications Blocked.



**NOTE:** Top Applications Blocked is not supported for tenant users.

### **Top URLs by User**

Top URLs by User report contains Top URLs by User.



**NOTE:** Top URLs by User is not supported for tenant users.

### **Top Source Zone by Volume**


Top Source Zone by Volume report contains Top Source Zone by Volume.

### **Top Applications by User**

Top Applications by User report contains Top Applications by User.

### **Top Botnet Threats By Source Address via IDP Logs**

Top Botnet Threats By Source Address via IDP Logs report contains Top Botnet Threats By Source Address via IDP Logs.



**NOTE:** Top Botnet Threats By Source Address via IDP Logs is not supported for tenant users.

### Top Botnet Threats by Destination Address via IDP Logs

Top Botnet Threats by Destination Address via IDP Logs report contains Top Botnet Threats by Destination Address via IDP Logs.

**NOTE:** Top Botnet Threats by Destination Address via IDP Logs is not supported for tenant users.

### Top Botnet Threats by Threat Severity via IDP Logs

Top Botnet Threats by Threat Severity via IDP Logs report contains Top Botnet Threats by Threat Severity via IDP Logs.

**NOTE:** Top Botnet Threats by Threat Severity via IDP Logs is not supported for tenant users.

### Top Malware Threats by Source Address via IDP Logs

Top Malware Threats by Source Address via IDP Logs report contains Top Malware Threats by Source Address via IDP Logs.

**NOTE:** Top Malware Threats by Source Address via IDP Logs is not supported for tenant users.

### Top Malware Threats by Destination Address via IDP Logs

Top Malware Threats by Destination Address via IDP Logs report contains Top Malware Threats by Destination Address via IDP Logs.

**NOTE:** Top Malware Threats by Destination Address via IDP Logs is not supported for tenant users.

### Top Malware Threats by Threat Severity via IDP Logs

Top Malware Threats by Threat Severity via IDP Logs report contains Top Malware Threats by Threat Severity via IDP Logs.

**NOTE:** Top Malware Threats by Threat Severity via IDP Logs is not supported for tenant users.

### Top Blocked Applications via Webfilter Logs

Top Blocked Applications via Webfilter Logs report contains Top Blocked Applications via Webfilter Logs.

**NOTE:** Top Blocked Applications via Webfilter Logs is not supported for tenant users.

### Top Permitted Application Subcategories by Volume via Webfilter Logs

Top Permitted Application Subcategories by Volume via Webfilter Logs report contains Top Permitted Application Subcategories by Volume via Webfilter Logs.

**NOTE:** Top Permitted Application Subcategories by Volume via Webfilter Logs is not supported for tenant users.

### Top Permitted Application Subcategories by Count via Webfilter Logs

Top Permitted Application Subcategories by Count via Webfilter Logs report contains Top Permitted Application Subcategories by Count via Webfilter Logs.

**NOTE:** Top Permitted Application Subcategories by Count via Webfilter Logs is not supported for tenant users.



## Administration

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# Devices

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- [Maintain Reboot Schedule | 848](#)
- [Maintain System Snapshots | 850](#)
- [Upload Software Packages | 851](#)
- [Install Software Packages | 852](#)
- [Rollback Software Package Version | 853](#)
- [Manage Upload Configuration Files | 854](#)
- [Manage Configuration History | 855](#)
- [Manage Rescue Configuration | 858](#)

## Maintain Files

### IN THIS SECTION

- [About Files Page | 845](#)
- [Clean Up Files | 846](#)
- [Download and Delete Files | 846](#)
- [Delete Backup JUNOS Package | 847](#)

### About Files Page

You are here: **Administration** > **Devices** > **Files**.

You can clean up files, download, or delete files and delete the JUNOS Package backup.



Clean Up Files

To maintain files:

1. Click **Clean Up Files**.

The device will perform the following tasks:

- Rotates log files—Indicates all information in the current log files is archived and fresh log files are created.
- Deletes log files in **/var/log**—Indicates any files that are not currently being written to are deleted.
- Deletes temporary files in **/var/tmp**—Indicates any files that have not been accessed within two days are deleted.
- Deletes all crash files in **/var/crash**—Indicates any core files that the device has written during an error are deleted.
- Deletes all software images (\*.tgz files) in **/var/sw/pkg**—Indicates any software image copied to this directory during software upgrades are deleted.

The J-Web interface displays the files that you can delete and the amount of space that will be freed on the file system.

2. Click one:

- **OK**—Deletes the files and returns to the Files page.
- **Cancel**—Cancels your entries and returns to the Files page.

Download and Delete Files

Table 299 on page 846 provides the maintenance options to download and delete files.

Table 299: Download and Delete Files Maintenance Options

File Type	Function	Action
Log Files	Lists the log files located in the <b>/var/log</b> directory on the device.	Select an option.  The available options are: <ul style="list-style-type: none"><li>• <b>Delete</b>—Deletes files.</li><li>• <b>Download</b>—Downloads files.</li></ul>

Table 299: Download and Delete Files Maintenance Options (*continued*)

Temporary Files	Lists the temporary files located in the <b>/var/tmp</b> directory on the device.	Select an option.  The available options are:  <ul style="list-style-type: none"> <li>• <b>Delete</b>—Deletes files.</li> <li>• <b>Download</b>—Downloads files.</li> </ul>
Jailed Temporary Files	Lists the jailed temporary files located in the <b>/var/jail/tmp</b> directory on the device.	Select an option.  The available options are:  <ul style="list-style-type: none"> <li>• <b>Delete</b>—Deletes files.</li> <li>• <b>Download</b>—Downloads files.</li> </ul>
Old JUNOS Software	Lists the software images located in the <b>/var/sw/pkg</b> (*.tgz files) directory on the device.	Select an option.  The available options are:  <ul style="list-style-type: none"> <li>• <b>Delete</b>—Deletes files.</li> <li>• <b>Download</b>—Downloads files.</li> </ul>
Crash (Core) File	Lists the core files located in the <b>/var/crash</b> directory on the device.	Select an option.  The available options are:  <ul style="list-style-type: none"> <li>• <b>Delete</b>—Deletes files.</li> <li>• <b>Download</b>—Downloads files.</li> </ul>
Database Files	Lists the database files located in the <b>/var/db</b> directory on the device.	Select an option.  The available options are:  <ul style="list-style-type: none"> <li>• <b>Delete</b>—Deletes files.</li> <li>• <b>Download</b>—Downloads files.</li> </ul>

## Delete Backup JUNOS Package

[Table 300 on page 847](#) provides the maintenance options to delete the JUNOS Package backup.

Table 300: Delete Backup JUNOS Package Files Maintenance Options

Field	Function	Action
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Table 300: Delete Backup JUNOS Package Files Maintenance Options (continued)

Delete backup Junos package	Reviews the backup image information listed.	<p>Click Delete backup JUNOS package and then select an option.</p> <p><b>NOTE:</b> Delete backup option is hidden if the router is in dual-root partitioning scheme</p> <p>The available options are:</p> <ul style="list-style-type: none"><li>• <b>OK</b>—Deletes the backup image and returns to the Files page.</li><li>• <b>Cancel</b>—Cancels the deletion of the backup image and returns to the Files page.</li></ul>
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SEE ALSO

<a href="#">Maintain Reboot Schedule   848</a>
<a href="#">Maintain System Snapshots   850</a>

Maintain Reboot Schedule

You are here: **Administration > Devices > Reboot.**

You can schedule reboot or halt the system using options such as reboot Immediately, reboot in, reboot with the system time, or halt immediately.

**NOTE:** A halted system can only be accessed from the system console port.

To reboot or halt the system:

1. Complete the configuration according to the guidelines provided in [Table 301 on page 848](#).

Table 301: Reboot Schedule Maintenance Options

Field	Action
Reboot Immediately	Select this option to reboot the device immediately.

Table 301: Reboot Schedule Maintenance Options (*continued*)

Field	Action
<b>Reboot in <i>number of minutes</i></b>	Select this option to reboot the device after the specified number of minutes from the current time.
<b>Reboot when the system time is <i>hour:minute</i></b>	Select this option to reboot the device at the absolute time that you specify, on the current day. Select a two-digit hour in 24-hour format and a two-digit minute.
<b>Halt Immediately</b> <b>NOTE:</b> This option is not available in SRX4600 device.	Select this option to stop the device immediately. After the software has stopped, you can access the device through the console port only.
<b>Reboot From Media</b> <b>NOTE:</b> This option is not available in SRX4600 device.	Choose the boot device from the Reboot From Media list: <ul style="list-style-type: none"> <li>• <b>internal</b>—Reboots from the internal media (default).</li> <li>• <b>usb</b>—Reboots from the USB storage device.</li> </ul>
<b>Message</b>	Type a message to be displayed to the user on the device before the reboot occurs.

2. Click **Schedule**.

Schedules a reboot based on the scheduled configuration.

3. The J-Web interface requests confirmation to perform the reboot or to halt.

Click **OK** to confirm to reboot or alt the system or click **Cancel** to return to the Reboot page.

**NOTE:**

- If the reboot is scheduled to occur immediately, the device reboots. You cannot access J-Web until the device has restarted and the boot sequence is complete. After the reboot is complete, refresh the browser window to display the J-Web login page.
- If the reboot is scheduled to occur in the future, the Reboot page displays the time until reboot. You have the option to cancel the request by clicking **Cancel Reboot** on the J-Web interface Reboot page.
- If the device is halted, all software processes stop and you can access the device through the console port only. Reboot the device by pressing any key on the keyboard.
- If you cannot connect to the device through the console port, shut down the device by pressing and holding the power button on the front panel until the POWER LED turns off. After the device has shut down, you can power on the device by pressing the power button again. The POWER LED lights during startup and remains steadily green when the device is operating normally.

**RELATED DOCUMENTATION**

| [Maintain System Snapshots](#) | 850

## Maintain System Snapshots

You are here: **Administration** > **Devices** > **Snapshots**.

You can configure boot devices to replace primary boot device or to act as a backup boot device.

The snapshot process copies the current system software, along with the current and rescue configurations, to alternate media. Optionally, you can copy only the factory and rescue configurations.

To maintain the system snapshots, you create a snapshot of the running system software and save the snapshot to an alternate media.

1. Complete the configuration according to the guidelines provided in [Table 302 on page 851](#).

2. Click **Snapshot**.

Creates a boot device on an alternate media.

3. Click **OK** to perform the system snapshot to a media or click **Cancel** to return to the Snapshot page.

Table 302: Snapshot Maintenance Options

Field	Function	Action
Target Media	<p>Specifies the boot device to copy the snapshot to.</p> <p><b>NOTE:</b> You cannot copy software to the active boot device.</p>	<p>Select an option.</p> <p>The available options for a boot device that is not the active boot device:</p> <ul style="list-style-type: none"> <li>• <b>internal</b>—Copies software to the internal media.</li> <li>• <b>usb</b>—Copies software to the device connected to the USB port.</li> </ul>
Partition	Partitions the media. This process is usually necessary for boot devices that do not already have software installed on them.	Select the check box.
Factory	<p>Copies only the default files that were loaded on the internal media when it was shipped from the factory, plus the rescue configuration if one has been set.</p> <p><b>NOTE:</b> After a boot device is created with the default factory configuration, it can operate only in an internal media slot.</p>	Select the check box.

## RELATED DOCUMENTATION

[Upload Software Packages | 851](#)
[Install Software Packages | 852](#)
[Rollback Software Package Version | 853](#)

## Upload Software Packages

You are here: **Administration** > **Devices** > **Software** > **Upload Package**.

You can upload a software package file to the device for installation.

To upload software packages:

1. Complete the configuration according to the guidelines provided in [Table 303 on page 852](#).

**Table 303: Upload Package Maintenance Options**

Field	Action
File to Upload	Enter the location of the software package on the local system, or click <b>Choose File</b> to navigate to the location.
Reboot If Required	Select the check box to automatically reboot when the upgrade is complete.
Do not save backup	Select the check box so that backup copy of the current Junos OS package is not saved.
Format and re-partition the media before installation <b>NOTE:</b> This option is not available for SRX4600 devices.	Select the check box to format the internal media with dual-root partitioning.

2. Click **Upload and Install Package**.

The software is activated after the device has rebooted.

## RELATED DOCUMENTATION

[Install Software Packages | 852](#)

[Rollback Software Package Version | 853](#)

## Install Software Packages

You are here: **Administration** > **Devices** > **Software** > **Install Package**.

You can install a software package from a remote server.

To install software packages:

1. Complete the configuration according to the guidelines provided in [Table 304 on page 852](#).

**Table 304: Install Package Maintenance Options**

Field	Action
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Table 304: Install Package Maintenance Options (*continued*)

Package Location	Enter the full address of the software package location on the FTP or HTTP server. For example, use one of the following format:  <i>ftp://hostname/pathname/package-name</i> <i>http://hostname/pathname/package-name</i>
User	Enter the username to use on a remote server.
Password	Enter the password to use on a remote server.
Reboot If Required	Select the check box to automatically reboot when the upgrade is complete.
Do not save backup	Select the check box so that backup copy of the current Junos OS package is not saved.
Format and re-partition the media before installation	Select the check box to format the internal media with dual-root partitioning.

2. Click **Fetch and Install Package**.

The software is activated after the device reboots.

## RELATED DOCUMENTATION

[Rollback Software Package Version | 853](#)

## Rollback Software Package Version

You are here: **Administration** > **Devices** > **Software** > **Rollback**.

You can rollback to the previously installed version of the device software.

To rollback software package version:

1. Click **Rollback** to rollback to the previous version of the software.



**NOTE:** You cannot stop the process once the rollback operation is requested.

2. Reboot the device when the rollback process is complete and for the new software to take effect. To reboot, perform the steps in [“Maintain Reboot Schedule” on page 848](#).

**NOTE:** To rollback to an earlier version, follow the procedure for upgrading, using the software image labeled with the appropriate release.

## RELATED DOCUMENTATION

[Upload Software Packages | 851](#)

[Install Software Packages | 852](#)

## Manage Upload Configuration Files

You are here: **Administration > Devices > Config Management > Upload**.

You can compare two configuration files, download a configuration file to your local system, or roll back the configuration to any of the previous versions stored on the device.

To manage upload configuration files:

1. Enter the absolute path and filename in the **File to Upload** box.

**NOTE:** You can also click **Browse** to navigate to the file location and select it.

2. Click **Upload and Commit** to upload and commit the configuration.

The device checks the configuration for the correct syntax before committing it.

**NOTE:** The file configuration replaces the existing configuration and continues the upload and commit process. If any errors occur when the file is loading or committing, J-Web displays the error and restores the previous configuration.

RELATED DOCUMENTATION

- [Manage Configuration History | 855](#)
- [Manage Rescue Configuration | 858](#)

## Manage Configuration History

You are here: **Administration > Devices > Config Management > History.**

You can view configuration history and database information about users editing the configuration database.

To manage configuration history:

1. Complete the configuration according to the guidelines provided in [Table 305 on page 855](#).

**Table 305: History Maintenance Options**

Field	Function
Number	Indicates the version of the configuration file.  To view a configuration, click the <b>version number</b> .
Date/Time	Indicates the date and time the configuration was committed.
User	Indicates the name of the user who committed the configuration.

Table 305: History Maintenance Options (*continued*)

Client	<p>Indicates the method by which the configuration was committed.</p> <p>The available options are:</p> <ul style="list-style-type: none"> <li>• <b>cli</b>—A user entered a Junos OS CLI command.</li> <li>• <b>junoscript</b>—A Junos XML management protocol client performed the operation. Commit operations performed by users through the J-Web interface are identified in this way.</li> <li>• <b>snmp</b>—An SNMP <b>set</b> request started the operation.</li> <li>• <b>button</b>—The CONFIG button on the router was pressed to commit the rescue configuration (if set) or to clear all configurations except the factory configuration.</li> <li>• <b>autoinstall</b>—Autoinstallation is performed.</li> <li>• <b>other</b>—Another method was used to commit the configuration.</li> </ul>
Comment	Indicates comments.
Log Message	<p>Indicates the method used to edit the configuration.</p> <ul style="list-style-type: none"> <li>• <b>Imported via paste</b>—Configuration was edited and loaded with the <b>Configure&gt;CLI Tools&gt;CLI Editor</b> option.</li> <li>• <b>Imported upload [filename]</b>—Configuration was uploaded with the <b>Configuration&gt;View and Edit&gt;Upload Configuration File</b> option.</li> <li>• <b>Modified via quick-configuration</b>—Configuration was modified with the specified version of the J-Web user interface.</li> <li>• <b>Rolled back via user-interface</b>—Configuration was rolled back to a previous version through the user interface specified by <i>user-interface</i>, which can be <b>Web Interface</b> or <b>CLI</b>.</li> </ul>

Table 305: History Maintenance Options (continued)

Action	<p>Indicates action to perform with the configuration file.</p> <p>Select any one of the following available options:</p> <ul style="list-style-type: none"><li>● <b>Download</b>—Downloads a configuration file to your local system. Select the options on your Web browser to save the configuration file to a target directory on your local system. The file is saved as an ASCII file.</li><li>● <b>Rollback</b>—Rolls back the configuration to any of the previous versions stored on the device. The History page displays the results of the rollback operation.</li></ul> <p><b>NOTE:</b> Click <b>Rollback</b> to load the device and download the selected configuration. This behavior is different from entering the <b>rollback</b> configuration mode command from the CLI, where the configuration is loaded, but not committed.</p>
--------	--

2. To compare configurations files:

- a. Select any two configuration files you want to compare.
- b. Click **Compare**.

The History page displays the differences between the two configuration files at each hierarchy level as follows:

- Lines that have changed are highlighted side by side in green.
- Lines that exist only in the most recent configuration file are displayed in red on the left.
- Lines that exist only in the least recent configuration file are displayed in blue on the right.

RELATED DOCUMENTATION

<a href="#">Manage Rescue Configuration   858</a>
<a href="#">Manage Upload Configuration Files   854</a>

## Manage Rescue Configuration

You are here: **Administration** > **Devices** > **Config Management** > **Rescue**.

If you inadvertently commit a configuration that denies management access, the only recourse may be to connect the console. Alternatively, you can rescue configuration that allows the management access to the device.

To load and commit the rescue configuration, press and immediately release the **Config** button on the chassis.

You can set or delete the rescue configuration.

To set or delete rescue configuration:

1. Click one:

- **View rescue configuration**—Displays the current rescue configuration (if it exists).
- **Set rescue configuration**—Sets the current running configuration as the rescue configuration. Click **OK** to confirm or **Cancel** to return to the Rescue page.
- **Delete rescue configuration**—Deletes the current rescue configuration. Click **OK** to confirm or **Cancel** to return to the Rescue page.

### RELATED DOCUMENTATION

[Manage Your Licenses | 859](#)

[Manage Device Certificates | 864](#)

# License Management

IN THIS CHAPTER

- [Manage Your Licenses | 859](#)

## Manage Your Licenses

IN THIS SECTION

- [About License Management Page | 859](#)
- [Add License | 860](#)
- [Delete Installed Licenses | 861](#)
- [Update Installed Licenses | 861](#)
- [Update Trial Licenses | 861](#)
- [Display License Keys | 861](#)
- [Download License Keys | 862](#)
- [Software Feature Licenses | 862](#)

### About License Management Page

You are here: **Administration > License Management**.

You can add a new license key, delete one or more license keys, update, or download license keys.

[Table 306 on page 859](#) describes the fields on the License Management page.

Table 306: Fields on the License Maintenance Page

Field	Function
Feature	Displays the name of the licensed feature.

Table 306: Fields on the License Maintenance Page (*continued*)

Field	Function
Licenses Used	Displays the number of licenses currently being used on the device. Usage is determined by the configuration on the device. If a feature license exists and that feature is configured, the license is considered used.
Licensed Installed	Displays the number of licenses installed on the device for the particular feature.
Licenses Needed	Displays the number of licenses required for legal use of the feature. Usage is determined by the configuration on the device. If a feature is configured and the license for that feature is not installed, a single license is needed.
License Expires on	Displays the expiry details on the license feature.

## Add License

To add a new license key with the J-Web license manager:

1. Perform one of the following:

- **License File URL**—Enter the full URL to the destination file containing the license key.

**NOTE:** Use this option to send a subscription-based license key entitlement (such as UTM) to the Juniper Networks licensing server for authorization. If authorized, the server downloads the license to the device and activates it.

- **License Key**—Paste the license key text, in plain-text format, for the license.

Use a blank line to separate multiple license keys.

**NOTE:** Use this option to activate a perpetual license directly on the device. (Most feature licenses are perpetual.)

2. Click **OK** to add the license key or click **Cancel** to return to the License Management page.

## Delete Installed Licenses

To delete one or more license keys with the J-Web license manager:

1. Select the check box of the license or licenses you want to delete.
2. Click **Delete**.

**NOTE:** If you have deleted the SRX100 Memory Upgrade license, the device reboots immediately and comes back up as a low-memory device.

3. Click **OK** to delete the selected license or licenses or click **Cancel** to return to the License Management page.

## Update Installed Licenses

To send license update to the License Management Server (LMS):

1. Click **Update**.  
The Update Licenses page appears.
2. Click **OK** to send license update to LMS.

## Update Trial Licenses

To send license update to the LMS and to update the trial licenses:

1. Click **Update Trial**.  
The Update Trial Licenses page appears.
2. Click **OK** to update the trial licenses.

## Display License Keys

To display the license keys installed on the device with the J-Web license manager:

1. Click **Display Keys** to view all of the license keys installed on the device.
2. Click **Back** to return to the License Management page.



## Download License Keys

Downloads the license keys installed on the device with the J-Web license manager.

1. Click **Download Keys** to download all of the license keys installed on the device to a single file.
2. Select **Save it to disk** and specify the file to which the license keys are to be written.

## Software Feature Licenses

Each feature license is tied to exactly one software feature, and that license is valid for exactly one device.

[Table 307 on page 862](#) describes the Junos OS features that require licenses.

**Table 307: Junos OS Services Feature Licenses**

Junos OS License Requirements	Device								
	J Series	SRX100	SRX210	SRX220	SRX240	SRX650	SRX1000 Line	SRX3000 Line	SRX5000 Line
<b>Access Manager</b>			X		X				
<b>BGP Route Reflectors</b>	X		X		X	X			
<b>Dynamic VPN</b>		X	X	X	X	X			
<b>IDP Signature Update</b>	X	X *	X *	X *	X *	X	X	X	X
<b>Application Signature Update (Application Identification)</b>							X	X	X
<b>Juniper-Kaspersky Anti-Virus</b>	X	X	X	X	X	X			
<b>Juniper-Sophos Anti-Spam</b>	X	X	X	X	X	X			
<b>Juniper-WebSense Integrated Web Filtering</b>	X	X	X	X	X	X			
<b>SRX100 Memory Upgrade</b>		X							

Table 307: Junos OS Services Feature Licenses (continued)

Junos OS License Requirements	Device								
	J Series	SRX100	SRX210	SRX220	SRX240	SRX650	SRX1000 Line	SRX3000 Line	SRX5000 Line
UTM	X		X *		X *	X			

RELATED DOCUMENTATION

<a href="#">Manage Device Certificates   864</a>
<a href="#">Manage Trusted Certificate Authority   873</a>
<a href="#">Manage Rescue Configuration   858</a>

# Certificate Management

## IN THIS CHAPTER

- [Manage Device Certificates | 864](#)
- [Manage Trusted Certificate Authority | 873](#)
- [Manage Certificate Authority Group | 882](#)

## Manage Device Certificates

## IN THIS SECTION

- [About Device Certificates Page | 864](#)
- [Import Certificate | 866](#)
- [Export Certificate | 867](#)
- [Viewing the Details of a Certificate | 867](#)
- [Add a Certificate | 870](#)
- [Delete Certificate | 872](#)
- [Search Text in Device Certificates Table | 873](#)

### About Device Certificates Page

You are here: **Administration** > **Certificate Management** > **Device Certificates**.

Manage the device certificates to authenticate Secure Socket Layer (SSL). SSL uses public-private key technology that requires a paired private key and an authentication certificate for providing the SSL service. SSL encrypts communication between your device and the Web browser with a session key negotiated by the SSL server certificate.

[Table 308 on page 865](#) provides the details of the fields of the Device Certificates page.

Table 308: Fields on Device Certificates Page

Field	Description
Certificate ID	Displays the certificate ID.  Certificate ID is a unique value across the device. This will be used to create a key pair along with the algorithm to associate with the key.
Issuer Org	Displays the details of the authority that issued the certificate.
Status	Displays whether the status of the certificate is valid, expired, and so on.
Expiration Date	Displays certificate expiration date.
Encryption Type	Displays whether the algorithm of the certificate is RSA, DSA, or ECDSA encryption.
Signature Status	Displays whether the status of the certificate is signed or in certificate signing request (CSR) stage.

You can perform the following tasks:

- Import a certificate to manually load externally generated certificates or CSR. See [“Import Certificate” on page 866](#).

**NOTE:** You must obtain the private key, passphrase, and the signed certificate from certificate authority (CA) server.

- Export a local certificate or CSR from the default location to a specific location within the device. See [“Export Certificate” on page 867](#).
- View the details of a certificate. See [“Viewing the Details of a Certificate” on page 867](#).
- Generate a certificate. See [“Add a Certificate” on page 870](#).
- Delete a certificate. See [“Delete Certificate” on page 872](#).
- Search for text in a device certificate table. See [“Search Text in Device Certificates Table” on page 873](#).
- Filter the device certificates information based on select criteria. To do this, select the filter icon at the top right-hand corner of the table. The columns in the grid change to accept filter options. Type the filter options; the table displays only the data that fits the filtering criteria.
- Show or hide columns in the Device Certificates table. To do this, use the Show Hide Columns icon in the top right corner of the page and select the options you want to show or deselect to hide options on the page

### Import Certificate

To import a device certificate:

- 1. Select **Administration > Certificate Management > Device Certificates**.
- 2. Click **Import**.

The Import Certificate page appears.

- 3. Complete the configuration according to the guidelines provided in [Table 309 on page 866](#).
- 4. Click **OK** to import the certificate.

You are taken to the Device Certificates page. If the certificate content that you imported is validated successfully, a confirmation message is displayed; if not, an error message is displayed.

After importing a certificate, you can use it when you create an SSL proxy profile and for IPSec VPN peers authentication.

- 5. Click **Cancel** to cancel your entries and returns to the Device Certificates page.

Table 309: Fields on the Import Certificate Page

Field	Action
Type	Select an option to specify whether the certificate that you are importing is an Externally Generated Certificate or a CSR.
Certificate ID	Enter a unique value for the certificate ID for an externally generated certificate. Select an option from the list to specify the certificate ID for a CSR.
File path for Certificate	Click <b>Browse</b> to navigate to the path from where you want to import the certificate.
File path for Private Key	Click <b>Browse</b> to navigate to the path from where you want to import the private key.
Passphrase	Enter the passphrase used to protect the private key or key pair of the certificate file.

### Export Certificate

To export a device certificate:

1. Select **Administration > Certificate Management > Device Certificates**.
2. Click **Export**.

The Export Certificate page appears.

3. Complete the configuration according to the guidelines provided in [Table 310 on page 867](#).
4. Click **OK** to export the certificate.

Once you save or download the exported file(s), a confirmation message is displayed; if not, an error message is displayed.

**Table 310: Fields on the Export Certificate Page**

Field	Action
Type	Select an option from the list to specify whether the certificate that you are exporting is a Local Certificate or a CSR.
Certification Name	Select an option from the list for the local certificate name.
Certificate ID	This option is available only for CSR. Select an option from the list for the CSR certificate ID.
Format	Select an option from the list to specify whether the exporting certificate format is Privacy-Enhanced Mail (PEM) or Distinguished Encoding Rules (DER).
Key Pair	Enable or disable exporting key pair of a certificate.
Passphrase	Enter the passphrase to protect the private key or key pair of the certificate file.

### Viewing the Details of a Certificate

To view the details of a device certificate:

1. Select **Administration > Certificate Management > Device Certificates**.
2. Select an existing certificate.

3. Select **More > Detailed View**.

The View Certificate page appears with the details of the certificate.

**NOTE:** When you hover over the certificate ID, a Detailed View icon appears before the certificate ID. You can also use this icon to view the certificate details.

4. Click **OK** after viewing the certificate details.

[Table 311 on page 868](#) provides the field details of the certificate on the View Certificate page.

**Table 311: Fields on the View Certificate Page**

Field	Action
<b>Certificate Details</b>	
Certificate ID	Displays the certificate ID.
Certificate Version	Displays the certificate revision number.
Certificate Type	Displays the certificate type. For example, Signed.
Encryption Type	Displays the encryption type. For example, RSA.
Key Size	Displays the key size of the encryption type.
Serial Number	Displays the unique serial number of the certificate.
<b>Subject</b>	
Domain Component	Displays the domain component associated with the certificate.
Common Name	Displays the common name associated with the certificate.
Organizational Unit Name	Displays the organizational unit associated with the certificate.
Organizational Name	Displays the organizational name associated with this certificate.
Serial Number	Displays the serial number of the device.
Locality	Displays the locality name.
State	Displays the state name.

Table 311: Fields on the View Certificate Page (continued)

Field	Action
Country	Displays the country name.
<b>Subject Alt Name</b>	
Domain Name	Displays the Fully Qualified Domain Name (FQDN).
Email	Displays the email ID of the certificate holder.
IPv4 Address	Displays the IPv4 address.
IPv6 Address	Displays the IPv6 address.
<b>Issuer Information</b>	
Common Name	Displays the issuer common name associated with the certificate.
Domain Component	Displays the issuer domain component associated with the certificate.
Organization Name	Displays the issuer organizational name.
Organization Unit Name	Displays the issuer organizational unit.
Locality Name	Displays the issuer locality name.
State or Province Name	Displays the issuer state or region name.
<b>Validity</b>	
Not Before	Displays the start time when the certificate becomes valid.
Not After	Displays the end time when the certificate becomes invalid.
<b>Auto Re Enrollment</b>	
Status	Displays whether the auto re enrollment is enabled or disabled.
Next Trigger Time	Displays the how long auto-reenrollment should be initiated before expiration.
<b>Fingerprint</b>	
MD5	Displays the MD5 fingerprints to identify the certificate.



Table 311: Fields on the View Certificate Page (*continued*)

Field	Action
SHA1	Displays the SHA-1 fingerprints to identify the certificate.
<b>Signature Algorithm</b>	
Algorithm	Displays whether the signature algorithm is SHA-1, SHA-256, or SHA-384 digest.
<b>Distribution CRL</b>	
URL	Displays the URL of the certificate revocation list (CRL) server.
LDAP	Displays the name of the location from which the CRL is retrieved through Lightweight Directory Access Protocol (LDAP).
<b>Authority Information Access OCSP</b>	
URL	Displays the URL of the Online Certificate Status Protocol (OCSP) server.

## Add a Certificate

To add a device certificate:

1. Select **Administration > Certificate Management > Device Certificates**.
2. Click the add icon (+).  
The Generate Certificate page appears.
3. Complete the configuration according to the guidelines provided in [Table 312 on page 870](#).
4. Click **OK** to save the changes. If you want to discard your changes, click **Cancel** instead.  
If you click **OK**, a new certificate with the provided configuration is created.

Table 312: Fields on the Generate Certificate Page

Field	Action
<b>Certificate Details</b>	

Table 312: Fields on the Generate Certificate Page (*continued*)

Field	Action
Certificate Type	<p>Select one of the certificate type from the list that you want to generate:</p> <ul style="list-style-type: none"> <li>• Local Self-Signed—Allows for use of SSL-based (Secure Sockets Layer) services without requiring that the user or administrator to undertake the considerable task of obtaining an identity certificate signed by a CA. Self-signed certificates are usually used for internal purpose.</li> <li>• Local Certificate—Validates the identity of the security device. A local certificate imports or references an SSL certificate.</li> </ul>
CA Profile Name	<p>This option is available for a local certificate.</p> <p>Select one of the CA profile name from the list or click <b>Create</b> to add a CA Profile. For details on adding a CA profile, see the table in the <i>Adding a Certificate Authority Profile</i> section.</p>
Certificate ID	Enter a unique value for the certificate ID.
Encryption Type	<p>Select one of the type of encryption from the list:</p> <ul style="list-style-type: none"> <li>• RSA Encryption</li> <li>• DSA Encryption</li> </ul> <p><b>NOTE:</b> The certificate cannot be used in SSL Proxy profile if it is generated using type DSA.</p> <ul style="list-style-type: none"> <li>• ECDSA Encryption</li> </ul>
Key Size	<p>Select one of the key size from the list:</p> <ul style="list-style-type: none"> <li>• RSA encryption supports 1024 bits, 2048 bits, or 4096 bits.</li> <li>• DSA encryption supports 1024 bits, 2048 bits, or 4096 bits.</li> <li>• ECDSA encryption supports 256 bits, 384 bits, or 521 bits.</li> </ul>
<b>Subject (Minimum of one field required)</b>	
Domain Component	Enter the domain component that you want to be associated with the certificate.
Common Name	Enter a common name with the certificate.
Organizational Unit Name	Enter the organizational unit that you want to be associated with the certificate.
Organizational Name	Enter the organizational name that you want to be associated with this certificate.
Serial Number	Enter a serial number of the device.

Table 312: Fields on the Generate Certificate Page (*continued*)

Field	Action
Locality	Enter the locality name.
State	Enter the state name.
Country	Enter the country name.
<b>Subject Alt Name</b>	
<b>NOTE:</b> For a local certificate, any one field is mandatory	
Domain Name	Enter a Domain Name that you want to associate with the certificate.
Email	Enter an user email address.
IPv4 Address	Enter the IPv4 address of the device.
IPv6 Address	This option is available for a local certificate.  Enter the IPv6 address of the device.
<b>Advanced</b>	
Digest	Select the digest from the list: <ul style="list-style-type: none"> <li>• For local Self-signed certificate (RSA/DSA/ECDSA) options are: None, SHA-1 digests, or SHA-256 digests.</li> <li>• For local certificate options are: <ul style="list-style-type: none"> <li>• RSA/DSA: None, SHA-1 digests, or SHA-256 digests</li> <li>• ECDSA: None, SHA-256 digests, or SHA-384 digests.</li> </ul> </li> </ul>
Signing Certificate	Enable or disable specifies that the certificate is used to sign other certificates.

## Delete Certificate

To delete a device certificate:

1. Select **Administration > Certificate Management > Device Certificates**.
2. Select the certificate you want to delete.
3. On the upper right side of the Device Certificates page, click the delete icon to delete.

A confirmation window appears.

- 4. Click **Yes** to delete.

**Search Text in Device Certificates Table**

You can use the search icon in the top right corner of a page to search for text containing letters and special characters on that page.

To search for text:

- 1. Enter partial text or full text of the keyword in the search bar and click the search icon.

The search results are displayed.

- 2. Click **X** next to a search keyword or click **Clear All** to clear the search results.

RELATED DOCUMENTATION

<a href="#">Manage Trusted Certificate Authority   873</a>
<a href="#">Manage Certificate Authority Group   882</a>

**Manage Trusted Certificate Authority**

IN THIS SECTION

- [About Trusted Certificate Authority Page | 874](#)
- [Generate Default Trusted CAs | 875](#)
- [Enroll CA Certificate | 875](#)
- [Import CA Certificate | 876](#)
- [Add a CA Profile | 877](#)
- [Edit a CA Profile | 880](#)
- [Delete CA Profile | 881](#)
- [Search Text in Trusted Certificate Authority Table | 881](#)

## About Trusted Certificate Authority Page

You are here: **Administration > Certificate Management > Trusted Certificate Authority.**

SSL forward proxy ensures secure transmission of data between a client and a server. Before establishing a secure connection, SSL forward proxy checks certificate authority (CA) certificates to verify signatures on server certificates. For this reason, a reasonable list of trusted CA certificates is required to effectively authenticate servers.

[Table 313 on page 874](#) provides the details of the fields of the Trusted Certificate Authority Page.

**Table 313: Fields on Trusted Certificate Authority Page**

Field	Description
CA Profile	Displays the name of the CA profile.
Certificate ID	Displays the CA certificate ID.
Issuer Org	Displays the issuer organizational name.
Status	<p>Displays the status of the CA certificate.</p> <p>For example:</p> <ul style="list-style-type: none"> <li>• Valid.</li> <li>• Expires in number of day(s).</li> <li>• Expired.</li> <li>• Download Required. This status is for a CA profile with manual enrollment.</li> <li>• Enrollment Required. This status is for a CA profile with automatic enrollment.</li> </ul>
Expiration Date	Displays CA certificate expiration date.
Encryption Type	Displays whether the algorithm of the certificate is RSA, DSA, or ECDSA encryption.

You can perform the following tasks:

- Generate a default trusted CAs. See [“Generate Default Trusted CAs” on page 875](#).
- Enroll a CA certificate using the Simple Certificate Enrollment Process (SCEP) or Certificate Management Protocol (CMPv2). With SCEP or CMPv2, you can configure Juniper Network device to obtain a local certificate online and start the online enrollment for the specified certificate ID. See [“Enroll CA Certificate” on page 875](#).

- Import a CA certificate to manually load CA certificates and CRL. See [“Import CA Certificate” on page 876](#).
- Add a CA profile. See [“Add a CA Profile” on page 877](#).
- Edit a CA profile. See [“Edit a CA Profile” on page 880](#).
- Delete a CA profile. See [“Delete CA Profile” on page 881](#).
- Search for text in a Trusted Certificate Authority table. See [“Search Text in Trusted Certificate Authority Table” on page 881](#).
- Filter the trusted CA information based on select criteria. To do this, select the filter icon at the top right-hand corner of the table. The columns in the grid change to accept filter options. Type the filter options; the table displays only the data that fits the filtering criteria.
- Show or hide columns in the trusted CA table. To do this, use the Show Hide Columns icon in the top right corner of the page and select the options you want to show or deselect to hide options on the page.

## Generate Default Trusted CAs

For SSL forward proxy, you need to load trusted CA certificates on your system. By default, Junos OS provides a list of trusted CA certificates that include default certificates used by common browsers. To generate default Trusted CA profiles with default name as Local, click **Generate Default Trusted CAs** and then click **Continue**. This process may take several minutes.

## Enroll CA Certificate

To enroll a trusted CA group:

1. Select **Administration > Certificate Management > Trusted Certificate Authority**.
2. Click **Enroll**.

The Enroll CA Certificate page appears.

3. Complete the configuration according to the guidelines provided in [Table 314 on page 875](#).
4. Click **OK** to enroll the CA certificate.

**Table 314: Fields on the Enroll CA Certificate Page**

Field	Action
CA Profile Name	Select a CA profile name from the list that you want to enroll.

Table 314: Fields on the Enroll CA Certificate Page (*continued*)

Field	Action
Protocol	Select a protocol from the list for the CA certificate that you want to enroll. <ul style="list-style-type: none"> <li>• SCEP—Simple Certificate Enrollment Protocol (SCEP)</li> <li>• CMPV2—Certificate Management Protocol version 2 (CMPv2)</li> </ul>
<b>NOTE:</b> The following fields are available only if you select CMPv2 protocol. All the fields are mandatory.	
CA Secret	Enter the out-of-band secret value received from the CA server.
CA Reference	Enter the out-of-band reference value received from the CA server.
CA Dn	Enter the distinguished name (DN) of the CA enrolling the EE certificate.  <b>NOTE:</b> This optional parameter is mandatory if the CA certificate is not already enrolled. If the CA certificate is already enrolled, the subject DN is extracted from the CA certificate.
Certificate Details	Click <b>Add</b> to generate a new certificate inline.

## Import CA Certificate

To import a CA certificate:

1. Select **Administration > Certificate Management > Trusted Certificate Authority**.
2. Click **Import**.

The Import CA Certificate page appears.

3. Complete the configuration according to the guidelines provided in [Table 315 on page 876](#).
4. Click **OK** to import the CA certificate.

You are taken to the Trusted Certificate Authority page. If the CA certificate content that you imported is validated successfully, a confirmation message is displayed; if not, an error message is displayed.

Table 315: Fields on the Import CA Certificate Page

Field	Action
CA Profile Name	Select a CA profile name from the list that you want to import.

Table 315: Fields on the Import CA Certificate Page (*continued*)

Field	Action
File path for CA Certificate	Click <b>Browse</b> to navigate to the path from where you want to import the CA certificate.
File path for CRL	Click <b>Browse</b> to navigate to the path from where you want to import the Certificate Revocation List (CRL).

## Add a CA Profile

To add a CA group:

1. Select **Administration > Certificate Management > Trusted Certificate Authority**.

2. Click the add icon (+).

The Add CA Profile page appears.

3. Complete the configuration according to the guidelines provided in [Table 316 on page 877](#).

4. Click **OK** to save the changes. If you want to discard your changes, click **Cancel** instead.

If you click **OK**, a new CA profile with the provided configuration is created.

Table 316: Fields on the Add CA Profile Page

Field	Action
<b>Profile Details</b>	
CA Profile Name	Enter a unique CA profile name.
CA Identity	Enter a CA identity name.
Revocation Check	<p>Select an option from the list:</p> <ul style="list-style-type: none"> <li>• <b>Disable</b>—Disables verification of status of digital certificates.</li> <li>• <b>OCSP</b>—Online Certificate Status Protocol (OCSP) checks the revocation status of a certificate.</li> <li>• <b>CRL</b>—A CRL is a time-stamped list identifying revoked certificates, which is signed by a CA and made available to the participating IPsec peers on a regular periodic basis.</li> </ul>



Table 316: Fields on the Add CA Profile Page (continued)

Field	Action
URL	<p>For OCSP, enter HTTP addresses for OCSP responders.</p> <p>For CRL, enter the name of the location from which to retrieve the CRL through HTTP or Lightweight Directory Access Protocol (LDAP).</p>
On Connection Failure	<p>Enable this option to skip the revocation check if the OCSP responder is not reachable.</p> <p><b>NOTE:</b> This option is applicable only for OCSP.</p>
Disable Responder Revocation Check	<p>Enable this option to disable revocation check for the CA certificate received in an OCSP response.</p> <p><b>NOTE:</b> This option is applicable only for OCSP.</p>
Accept Unknown Status	<p>When set to enable, accepts the certificate with unknown status.</p> <p><b>NOTE:</b> This option is applicable only for OCSP.</p>
Nonce Payload	<p>Disable the option—Explicitly disable the sending of a nonce payload.</p> <p>Enable the option—Enable the sending of a nonce payload. This is the default.</p> <p><b>NOTE:</b> This option is applicable only for OCSP.</p>
CRL Refresh Interval	<p>Enter the time interval (in hours) between CRL updates.</p> <p>Range: 0 through 8784 hours.</p> <p><b>NOTE:</b> This option is applicable only for CRL.</p>
Password	Enter the password for authentication with the server.
Disable on Download Failure	<p>Enable this option to override the default behavior and permit certificate verification even if the CRL fails to download.</p> <p><b>NOTE:</b> This option is applicable only for CRL.</p>
<b>Enrollment</b>	
CA Certificate	Select an option whether you want to enroll the CA certificate manually or automatically.
File path for Certificate	Click <b>Browse</b> to navigate to the path from where you want to enroll the CA certificate.
URL	Enter the URL from where you want to enroll the CA certificate automatically.

Table 316: Fields on the Add CA Profile Page (continued)

Field	Action
Retry	Number of enrollment retry attempts before terminating. Range: 0 - 1080.
Retry-interval	Interval in seconds between the enrollment retries. Range: 0 - 3600.
<b>Advanced</b>	
Administrator	Enter an administrator e-mail address to which the certificate request is sent.
Source Address	Enter a source IPv4 or IPv6 address to be used instead of the IP address of the egress interface for communications with external servers.
Auto Re Enrollment	Enable this option to request that the issuing CA replace a certificate before its specified expiration date.
Re Generate Key Pair	Enable this option to automatically generate a new key pair when auto-reenrolling a device certificate.
Protocol	Select an option from the list: Simple Certificate Enrollment Protocol (SCEP) or Certificate Management Protocol version 2 (CMPv2).
Challenge Password	Enter the challenge password used by the certificate authority (CA) for certificate enrollment and revocation. This challenge password must be the same used when the certificate was originally configured.
Trigger Time	Enter the percentage for the reenroll trigger time before expiration.  Range: 1 through 99 percent
Digest	Select an option from the list: None, SHA-1 digest (default), or MD5-digest.  <b>NOTE:</b> This option is applicable only when you select SCEP protocol.
Encryption	Select an option from the list: None, DES, DES 3.  <b>NOTE:</b> This option is applicable only when you select SCEP protocol.
Routing Instance	Select an option from the list of configured routing instances.

Table 316: Fields on the Add CA Profile Page (continued)

Field	Action
Proxy Profile	<p>Select an option from the list. Or</p> <p>To create a new proxy profile inline:</p> <ol style="list-style-type: none"> <li>Click <b>Create</b>. Create Proxy Profile page appears.</li> <li>Enter the following details: <ul style="list-style-type: none"> <li>Profile Name—Enter a unique proxy profile name.</li> <li>Connection Type: <ul style="list-style-type: none"> <li>Server IP—Enter the IP address of the server.</li> <li>Host Name—Enetr the host name.</li> </ul> </li> <li>Port Number—Select the port number by using top/down arrows. Range: 0 through 65535</li> </ul> </li> <li>Click <b>OK</b>.</li> </ol>

### Edit a CA Profile

To edit a CA profile:

- Select **Administration > Certificate Management > Trusted Certificate Authority**.
- Select a CA profile.
- On the upper right side of the Trusted Certificate Authority page, click the pencil icon.  
See [Table 316 on page 877](#) for the options available for editing on the Edit CA Profile page.

**NOTE:** When you select a CA profile to edit, you cannot edit the following fields:

- CA Profile Name
- Revocation Check
- Enrollment > CA Certificate
- Advanced > Auto Re Enrollment
- Advanced > Protocol

4. Click **OK**

### Delete CA Profile

To delete a CA profile:

1. Select **Administration > Certificate Management > Trusted Certificate Authority**.
2. Select a CA profile.
3. On the upper right side of the Trusted Certificate Authority page, click the delete icon to delete.  
A confirmation window appears.
4. Click **Yes** to delete.

### Search Text in Trusted Certificate Authority Table

You can use the search icon in the top right corner of a page to search for text containing letters and special characters on that page.

To search for text:

1. Enter partial text or full text of the keyword in the search bar and click the search icon.  
The search results are displayed.
2. Click **X** next to a search keyword or click **Clear All** to clear the search results.

### RELATED DOCUMENTATION

## Manage Certificate Authority Group

### IN THIS SECTION

- [About Certificate Authority Group Page | 882](#)
- [Import Trusted CA Group | 883](#)
- [Add a CA Group | 884](#)
- [Edit a CA Group | 885](#)
- [Delete CA Group | 885](#)
- [Search Text in Certificate Authority Group Table | 885](#)

### About Certificate Authority Group Page

You are here: **Administration** > **Certificate Management** > **Trusted Certificate Authority**.

Multiple CA profiles can be grouped in one trusted CA group for a given topology. The ca-group can be used either in SSL or IPsec.

SSL forward proxy ensures secure transmission of data between a client and a server. Before establishing a secure connection, SSL forward proxy checks certificate authority (CA) certificates to verify signatures on server certificates. For this reason, a reasonable list of trusted CA certificates is required to effectively authenticate servers.

[Table 317 on page 882](#) provides the details of the fields of the Certificate Authority Group Page.

**Table 317: Fields on Certificate Authority Group Page**

Field	Description
Group Name	Displays a Name for the CA profile group.
CA Profiles	Displays the name of CA profiles.
Used For	Displays whether the CA profile group is used for IPsec VPN or for SSL proxy.

You can perform the following tasks:

- Import a CA group to manually load the CA group. See [“Import Trusted CA Group” on page 883](#).
- Add a CA group. See [“Add a CA Group” on page 884](#).

**NOTE:** You can group up to maximum of 20 CA profiles in a single trusted CA group. A minimum of one CA profile is a must to create a trusted CA group.

- Edit a CA group. See [“Edit a CA Group” on page 885](#).
- Delete a CA group. See [“Delete CA Group” on page 885](#).
- Search for text in a CA group table. See [“Search Text in Certificate Authority Group Table” on page 885](#).
- Filter the CA group information based on select criteria. To do this, select the filter icon at the top right-hand corner of the table. The columns in the grid change to accept filter options. Type the filter options; the table displays only the data that fits the filtering criteria.
- Show or hide columns in the CA group table. To do this, use the Show Hide Columns icon in the top right corner of the page and select the options you want to show or deselect to hide options on the page.

## Import Trusted CA Group

To import a trusted CA group:

1. Select **Administration > Certificate Management > Certificate Authority Group**.
2. Click **Import**.

The Import Trusted CA Group page appears.

3. Complete the configuration according to the guidelines provided in [Table 318 on page 884](#).
4. Click **OK** to import the CA group.

You are taken to the Certificate Authority Group page. If the CA group content that you imported is validated successfully, a confirmation message is displayed; if not, an error message is displayed.

After importing a CA profile group, you can use it when you create a SSL proxy.

Table 318: Fields on the Import Trusted CA Group Page

Field	Action
CA Group Name	Enter the name of a CA group.
File path for CA Group	Click <b>Browse</b> to navigate to the path from where you want to import the CA group.  <b>NOTE:</b> Only .pem format is supported.

### Add a CA Group

To add a CA group:

1. Select **Administration > Certificate Management > Certificate Authority Group**.

2. Click the add icon (+).

The Add CA Group page appears.

3. Complete the configuration according to the guidelines provided in [Table 319 on page 884](#).

4. Click **OK** to save the changes. If you want to discard your changes, click **Cancel** instead.

If you click **OK**, a new CA group with the provided configuration is created.

After added a CA group, you can use it for IPsec VPN.

Table 319: Fields on the Add CA Group Page

Field	Action
CA Group Name	Enter an unique CA group name.
CA Profiles	Select a CA profile name from the list in the Available column and then click the right arrow to move it to the Selected column.  <b>NOTE:</b> You can add up to maximum of 20 CA profiles per trusted CA group.

## Edit a CA Group

To edit a CA group:

1. Select **Administration > Certificate Management > Certificate Authority Group**.
2. Select a CA group.
3. On the upper right side of the Certificate Authority Group page, click the pencil icon.  
See [Table 319 on page 884](#) for the options available for editing on the Edit CA Group page.
4. Click **OK**

## Delete CA Group

To delete a CA group:

1. Select **Administration > Certificate Management > Certificate Authority Group**.
2. Select a CA group.
3. On the upper right side of the Certificate Authority Group page, click the delete icon to delete.  
A confirmation window appears.
4. Click **Yes** to delete.

## Search Text in Certificate Authority Group Table

You can use the search icon in the top right corner of a page to search for text containing letters and special characters on that page.

To search for text:

1. Enter partial text or full text of the keyword in the search bar and click the search icon.  
The search results are displayed.
2. Click **X** next to a search keyword or click **Clear All** to clear the search results.

## RELATED DOCUMENTATION



Manage Device Certificates | 864

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Manage Trusted Certificate Authority | 873

# Network Monitoring

## IN THIS CHAPTER

- [Monitor Chassis Alarm | 887](#)
- [Monitor System Alarm | 891](#)

## Monitor Chassis Alarm

### IN THIS SECTION

- [About Chassis Alarm Page | 887](#)
- [Create Chassis Alarm Definition | 887](#)
- [Edit Chassis Alarm Definition | 890](#)

### About Chassis Alarm Page

You are here: **Administration** > **Network Monitoring** > **Alarm** > **Chassis Alarm**.

You can create a chassis alarm definition by selecting various options such as DS1, Ethernet, and integrated service, and so on.

### Create Chassis Alarm Definition

To create Chassis Alarm Definition:

1. Enter the information specified in [Table 320 on page 888](#) to create Chassis Alarm Definition.

Table 320: Chassis Alarm Definition Options

Chassis Component	Alarm Configuration Option	Action
DS1	Alarm indicator signal (ais) Yellow alarm (ylw)	<p>Select an alarm condition from the list for DS1.</p> <p>The available conditions for DS1 are:</p> <ul style="list-style-type: none"> <li>• Ignore</li> <li>• Red</li> <li>• Yellow</li> <li>• None</li> </ul>
Ethernet	Link is down (link-down)	<p>Select an alarm condition from the list for Ethernet.</p> <p>The available conditions for Ethernet are:</p> <ul style="list-style-type: none"> <li>• Ignore</li> <li>• Red</li> <li>• Yellow</li> <li>• None</li> </ul>
Integrated Services	Hardware or software failure (failure)	<p>Select an alarm condition from the list for Integrated Services.</p> <p>The available conditions for Integrated Services are:</p> <ul style="list-style-type: none"> <li>• Ignore</li> <li>• Red</li> <li>• Yellow</li> <li>• None</li> </ul>
Management Ethernet	Link is down (link-down)	<p>Select a alarm condition from the list for Management Ethernet.</p> <p>The available conditions for Management Ethernet are:</p> <ul style="list-style-type: none"> <li>• Ignore</li> <li>• Red</li> <li>• Yellow</li> <li>• None</li> </ul>

Table 320: Chassis Alarm Definition Options (*continued*)

Chassis Component	Alarm Configuration Option	Action
Optical Tansport Network Optical channel Data Unit (OTN ODU)	Backward defect indication (odu-bdi)  Payload type mismatch (odu-ptim)  Trail trace identifier mismatch (odu-ttim)	Select a alarm condition from the list for OTN ODU.  The available conditions for OTN ODU are:  <ul style="list-style-type: none"> <li>• Ignore</li> <li>• Red</li> <li>• Yellow</li> <li>• None</li> </ul>
Optical Tansport Network Optical channel Transport Unit (OTN OTU)	Loss of frame (oc-lof)  Loss of multiframe (oc-lom)  Loss of signal (oc-los)  Backward defect indication (oc-bdi)  Forward error correction excessive FEC errors (out-fec-excessive-errs)  Incoming alignment error (out-iae)  Trail trace identifier mismatch (out-ttim)  Wavelength-Lock (Wavelength Lock)	Select a alarm condition from the list for OTN OTU.  The available conditions for OTN OTU are:  <ul style="list-style-type: none"> <li>• Ignore</li> <li>• Red</li> <li>• Yellow</li> <li>• None</li> </ul>
Serial	Clear-to-send (CTS) signal absent (cts-absent)  Data carrier detect (DCD) signal absent (dcd-absent)  Data set ready (DSR) signal absent (dsr absent)  Loss of receive clock (loss-of-rx-clock)  Loss of transmit clock (loss-of-tx-clock)	Select an alarm condition from the list for Serial.  The available conditions for Serial are:  <ul style="list-style-type: none"> <li>• Ignore</li> <li>• Red</li> <li>• Yellow</li> <li>• None</li> </ul>

Table 320: Chassis Alarm Definition Options (*continued*)

Chassis Component	Alarm Configuration Option	Action
Services	Services module hardware down (hw-down)	Select an alarm condition from the list for Services.
	Services link down (linkdown)	The available conditions for Services are:
	Services module held in reset (pic-hold-reset)	<ul style="list-style-type: none"> <li>• Ignore</li> <li>• Red</li> </ul>
	Services module reset (pic-reset)	<ul style="list-style-type: none"> <li>• Yellow</li> <li>• None</li> </ul>
	Receive errors (rx-errors)	
	Services module software down (sw-down)	
	Transmit errors (tx-errors)	
DS3	Alarm indication signal (ais)	Select an alarm condition from the list for DS3.
	Excessive number of zeros (exz)	The available conditions for DS3 are:
	Far-end receive failure (ferf)	
	Idle alarm (idle)	<ul style="list-style-type: none"> <li>• Ignore</li> <li>• Red</li> </ul>
	Line code violation (lcv)	<ul style="list-style-type: none"> <li>• Yellow</li> <li>• None</li> </ul>
	Loss of frame (lof)	
	Loss of signal (los)	
	Phase-locked loop out of lock (pll)	
	Yellow alarm (ylw)	

2. Click **OK** to create Chassis Alarm Definition.

Chassis Alarm Definition page appears.

3. Click **Cancel** to cancel your entries and returns to the Chassis Alarm Definition page.

### Edit Chassis Alarm Definition

To edit Chassis Alarm Definition:

1. Click the pencil icon on the upper right side of the Chassis Alarm Definition page.

See [Table 320 on page 888](#) for the options available for editing the Chassis Alarm Definition page.

- 2. Click **OK**.

RELATED DOCUMENTATION

| [Monitor System Alarm](#) | 891

Monitor System Alarm

IN THIS SECTION

- [About System Alarm Page](#) | 891
- [Create System Alarm Configuration](#) | 891
- [Edit System Alarm Configuration](#) | 894

About System Alarm Page

You are here: **Administration** > **Network Monitoring** > **Alarm** > **System Alarm**.

You can enable system login alarm login classes. The configured Login Classes will display system alarms while logging in.

Create System Alarm Configuration

To create System Alarm Configuration:

- 1. Enter the information specified in [Table 321 on page 891](#) to create System Alarm Configuration.

Table 321: RPM Information Troubleshooting Options

Field	Function
Currently Running Tests	
Graph	Click the Graph link to display the graph (if it is not already displayed) or to update the graph for a particular test.

Table 321: RPM Information Troubleshooting Options (*continued*)

Field	Function
Owner	Configured owner name of the RPM test.
Test Name	Configured name of the RPM test.
Probe Type	<p>Type of RPM probe configured for the specified test. Following are valid probe types:</p> <ul style="list-style-type: none"> <li>• http-get</li> <li>• http-get-metadata</li> <li>• icmp-ping</li> <li>• icmp-ping-timestamp</li> <li>• tcp-ping</li> <li>• udp-ping</li> </ul>
Target Address	IP address or URL of the remote server that is being probed by the RPM test.
Source Address	<p>Explicitly configured source address that is included in the probe packet headers.</p> <p>If no source address is configured, the RPM probe packets use the outgoing interface as the source address, and the Source Address field is empty.</p>
Minimum RTT	Shortest round-trip time from the J Series device to the remote server, as measured over the course of the test.
Maximum RTT	Longest round-trip time from the J Series device to the remote server, as measured over the course of the test.
Average RTT	Average round-trip time from the J Series device to the remote server, as measured over the course of the test.
Standard Deviation RTT	Standard deviation of round-trip times from the J Series device to the remote server, as measured over the course of the test.
Probes Sent	Total number of probes sent over the course of the test.
Loss Percentage	Percentage of probes sent for which a response was not received.

Table 321: RPM Information Troubleshooting Options (*continued*)

Field	Function
<b>Round-Trip Time for a Probe</b>	
Samples	<p>Total number of probes used for the data set.</p> <p>The J Series device maintains records of the most recent 50 probes for each configured test. These 50 probes are used to generate RPM statistics for a particular test.</p>
Earliest Sample	System time when the first probe in the sample was received.
Latest Sample	System time when the last probe in the sample was received.
Mean Value	Average round-trip time for the 50-probe sample.
Standard Deviation	Standard deviation of the round-trip times for the 50-probe sample.
Lowest Value	Shortest round-trip time from the device to the remote server, as measured over the 50-probe sample.
Time of Lowest Sample	System time when the lowest value in the 50-probe sample was received.
Highest Value	Longest round-trip time from the J Series device to the remote server, as measured over the 50-probe sample.
Time of Highest Sample	System time when the highest value in the 50-probe sample was received.
<b>Cumulative Jitter for a Probe</b>	
Samples	<p>Total number of probes used for the data set.</p> <p>The J Series device maintains records of the most recent 50 probes for each configured test. These 50 probes are used to generate RPM statistics for a particular test.</p>
Earliest Sample	System time when the first probe in the sample was received.
Latest Sample	System time when the last probe in the sample was received.
Mean Value	Average jitter for the 50-probe sample.



Table 321: RPM Information Troubleshooting Options *(continued)*

Field	Function
Standard Deviation	Standard deviation of the jitter values for the 50-probe sample.
Lowest Value	Smallest jitter value, as measured over the 50-probe sample.
Time of Lowest Sample	System time when the lowest value in the 50-probe sample was received.
Highest Value	Highest jitter value, as measured over the 50-probe sample.
Time of Highest Sample	System time when the highest jitter value in the 50-probe sample was received.

- 2. Click **OK** to create System Alarm Configuration.  
System Alarm Configuration page appears.
- 3. Click **Cancel** to cancel your entries and returns to the System Alarm Configuration page.

**Edit System Alarm Configuration**

To edit System Alarm Configuration:

- 1. Click the pencil icon on the upper right side of the System Alarm Configuration page.  
See [Table 321 on page 891](#) for the options available for editing the System Alarm Configuration page.
- 2. Click **OK**.

SEE ALSO

| [Monitor Chassis Alarm](#) | 887

# RPM

IN THIS CHAPTER

- Setup RPM | 895
- View RPM | 902

## Setup RPM

**Problem**

**Description:** You are here: **Troubleshoot>RPM>Setup RPM**.

You can configure RPM parameters to monitor real-time performance through the J-Web interface. You can specify a RPM owner, request information related to probe, hardware timestamp, generates Traps, and specify a probe server.

**Solution**

To configure RPM parameters:

1. Enter the information specified in [Table 322 on page 895](#) to troubleshoot the issue.
2. From the main RPM configuration page, click one:
  - **Apply**—Applies the configuration and stays on the RPM configuration page.
  - **OK**—Applies the configuration and returns to the RPM configuration page.
  - **Cancel**—Cancels your entries and returns to the RPM configuration page.

Table 322: RPM Setup Troubleshooting Options

Field	Function	Action
Probe Owners		
Identification		

Table 322: RPM Setup Troubleshooting Options (*continued*)

Field	Function	Action
Owner Name	Specifies an RPM owner for which one or more RPM tests are configured. In most implementations, the owner name identifies a network on which a set of tests is being run (a particular customer, for example).	Type the name of the RPM owner.
<b>Performance Probe Tests</b>		
<b>Identification</b>		
Test name	Specifies a unique name to identify the RPM test.	Type the name of the RPM test.
Target (Address or URL)	Specifies an IP address or a URL of a probe target.	Type the IP address, in dotted decimal notation, or the URL of the probe target. If the target is a URL, type a fully formed URL that includes <b>http://</b> .
Source Address	Specifies an IP address to be used as the probe source address.	Type the source address to be used for the probe. If the source IP address is not one of the device's assigned addresses, the packet uses the outgoing interface's address as its source.
Routing Instance	Specifies a routing instance over which the probe is sent.	Type the routing instance name. The routing instance applies only to probes of type <b>icmp</b> and <b>icmp-timestamp</b> . The default routing instance is <b>inet.0</b> .
History Size	Specifies the number of probe results saved in the probe history.	Type a number between 0 and 255. The default history size is 50 probes.
<b>Request Information</b>		

Table 322: RPM Setup Troubleshooting Options (*continued*)

Field	Function	Action
Probe Type	Specifies the type of probe to send as part of the test.	<p>Select the desired probe type from the list:</p> <ul style="list-style-type: none"> <li>• <b>http-get</b></li> <li>• <b>http-get-metadata</b></li> <li>• <b>icmp-ping</b></li> <li>• <b>icmp-ping-timestamp</b></li> <li>• <b>tcp-ping</b></li> <li>• <b>udp-ping</b></li> </ul>
Interval	Specifies the wait time (in seconds) between each probe transmission.	Type a number between 1 and 255 (seconds).
Test Interval	Specifies the wait time (in seconds) between tests.	Type a number between 0 and 86400 (seconds).
Probe Count	Specifies the total number of probes to be sent for each test.	Type a number between 1 and 15.
Moving Average Size	Specifies the number of samples used for a moving average.	Type a number between 0 and 225.
Destination Port	<p>Specifies the TCP or UDP port to which probes are sent.</p> <p>To use TCP or UDP probes, you must configure the remote server as a probe receiver. Both the probe server and the remote server must be Juniper Networks devices configured to receive and transmit RPM probes on the same TCP or UDP port.</p>	Type the number 7—a standard TCP or UDP port number—or a port number from 49152 through 65535.
DSCP Bits	Specifies the Differentiated Services code point (DSCP) bits. This value must be a valid 6-bit pattern. The default is <b>000000</b> .	Type a valid 6-bit pattern.
Data Size	Specifies the size of the data portion of the ICMP probes.	Type a size (in bytes) between 0 and 65507.

Table 322: RPM Setup Troubleshooting Options (*continued*)

Field	Function	Action
Data Fill	Specifies the contents of the data portion of the ICMP probes.	Type a hexadecimal value between 1 and 800h to use as the contents of the ICMP probe data.
<b>Hardware Timestamp</b>		
One Way Hardware Timestamp	Specifies the hardware timestamps for one-way measurements.	To enable one-way timestamping, select the check box.
Hardware Timestamp	Specifies timestamping of RPM probe messages. You can timestamp the following RPM probes to improve the measurement of latency or jitter: <ul style="list-style-type: none"> <li>• ICMP ping</li> <li>• ICMP ping timestamp</li> <li>• UDP ping—destination port UDP-ECHO (port 7) only</li> <li>• UDP ping timestamp—destination port UDP-ECHO (port 7) only</li> </ul>	To enable timestamping, select the check box.
Destination Interface	Specifies the name of an output interface for probes.	Select the interface from the list.
<b>Maximum Probe Thresholds</b>		
Successive Lost Probes	Specifies the total number of probes that must be lost successively to trigger a probe failure and generate a system log message.	Type a number between 0 and 15.
Lost Probes	Specifies the total number of probes that must be lost to trigger a probe failure and generate a system log message.	Type a number between 0 and 15.
Round Trip Time	Specifies the total round-trip time (in microseconds), from the device to the remote server, that triggers a probe failure and generates a system log message.	Type a number between 0 and 60,000,000 (microseconds).

Table 322: RPM Setup Troubleshooting Options (*continued*)

Field	Function	Action
Jitter	Specifies the total jitter (in microseconds) for a test that triggers a probe failure and generates a system log message.	Type a number between 0 and 60,000,000 (microseconds).
Standard Deviation	Specifies the maximum allowable standard deviation (in microseconds) for a test, which, if exceeded, triggers a probe failure and generates a system log message.	Type a number between 0 and 60,000,000 (microseconds).
Egress Time	Specifies the total one-way time (in microseconds), from the device to the remote server, that triggers a probe failure and generates a system log message.	Type a number between 0 and 60,000,000 (microseconds).
Ingress Time	Specifies the total one-way time (in microseconds), from the remote server to the device, that triggers a probe failure and generates a system log message.	Type a number between 0 and 60,000,000 (microseconds)
Jitter Egress Time	Specifies the total outbound-time jitter (in microseconds) for a test that triggers a probe failure and generates a system log message.	Type a number between 0 and 60,000,000 (microseconds)
Jitter Ingress Time	Specifies the total inbound-time jitter (in microseconds) for a test that triggers a probe failure and generates a system log message.	Type a number between 0 and 60,000,000 (microseconds).
Egress Standard Deviation	Specifies the maximum allowable standard deviation of outbound times (in microseconds) for a test, which, if exceeded, triggers a probe failure and generates a system log message.	Type a number between 0 and 60,000,000 (microseconds).

Table 322: RPM Setup Troubleshooting Options (*continued*)

Field	Function	Action
Ingress Standard Deviation	Specifies the maximum allowable standard deviation of inbound times (in microseconds) for a test, which, if exceeded, triggers a probe failure and generates a system log message.	Type a number between 0 and 60,000,000 (microseconds).
<b>Traps</b>		
Egress Jitter Exceeded	Generates SNMP traps when the threshold for jitter in outbound time is exceeded.	<ul style="list-style-type: none"> <li>• To enable SNMP traps for this condition, select the check box.</li> <li>• To disable SNMP traps, clear the check box.</li> </ul>
Egress Standard Deviation Exceeded	Generates SNMP traps when the threshold for standard deviation in outbound times is exceeded.	<ul style="list-style-type: none"> <li>• To enable SNMP traps for this condition, select the check box.</li> <li>• To disable SNMP traps, clear the check box.</li> </ul>
Egress Time Exceeded	Generates SNMP traps when the threshold for maximum outbound time is exceeded.	<ul style="list-style-type: none"> <li>• To enable SNMP traps for this condition, select the check box.</li> <li>• To disable SNMP traps, clear the check box.</li> </ul>
Ingress Jitter Exceeded	Generates SNMP traps when the threshold for jitter in inbound time is exceeded.	<ul style="list-style-type: none"> <li>• To enable SNMP traps for this condition, select the check box.</li> <li>• To disable SNMP traps, clear the check box.</li> </ul>
Ingress Standard Deviation Exceeded	Generates SNMP traps when the threshold for standard deviation in inbound times is exceeded.	<ul style="list-style-type: none"> <li>• To enable SNMP traps for this condition, select the check box.</li> <li>• To disable SNMP traps, clear the check box.</li> </ul>
Ingress Time Exceeded	Generates traps when the threshold for maximum inbound time is exceeded.	<ul style="list-style-type: none"> <li>• To enable SNMP traps for this condition, select the check box.</li> <li>• To disable SNMP traps, clear the check box.</li> </ul>
Jitter Exceeded	Generates traps when the threshold for jitter in round-trip time is exceeded.	<ul style="list-style-type: none"> <li>• To enable SNMP traps for this condition, select the check box.</li> <li>• To disable SNMP traps, clear the check box.</li> </ul>

Table 322: RPM Setup Troubleshooting Options (*continued*)

Field	Function	Action
Probe Failure	Generates traps when the threshold for the number of successive lost probes is reached.	<ul style="list-style-type: none"> <li>• To enable SNMP traps for this condition, select the check box.</li> <li>• To disable SNMP traps, clear the check box.</li> </ul>
RTT Exceeded	Generates traps when the threshold for maximum round-trip time is exceeded.	<ul style="list-style-type: none"> <li>• To enable SNMP traps for this condition, select the check box.</li> <li>• To disable SNMP traps, clear the check box.</li> </ul>
Standard Deviation Exceeded	Generates traps when the threshold for standard deviation in round-trip times is exceeded.	<ul style="list-style-type: none"> <li>• To enable SNMP traps for this condition, select the check box.</li> <li>• To disable SNMP traps, clear the check box.</li> </ul>
Test Completion	Generates traps when a test is completed.	<ul style="list-style-type: none"> <li>• To enable SNMP traps for this condition, select the check box.</li> <li>• To disable SNMP traps, clear the check box.</li> </ul>
Test Failure	Generates traps when the threshold for the total number of lost probes is reached.	<ul style="list-style-type: none"> <li>• To enable SNMP traps for this condition, select the check box.</li> <li>• To disable SNMP traps, clear the check box.</li> </ul>
<b>Maximum Number of Concurrent Probes</b>		
Maximum Number of Concurrent Probes	Specifies the maximum number of concurrent probes allowed.	Type a number between 1 and 500.
<b>Probe Server</b>		
TCP Probe Server	Specifies the port on which the device is to receive and transmit TCP probes.	Type number 7, or a port number from 49160 through 65535.
UDP Probe Server	Specifies the port on which the device is to receive and transmit UDP probes.	Type number 7, or a port number from 49160 through 65535.

## RELATED DOCUMENTATION



## View RPM

### Problem

**Description:** You are here: **Administration > RPM > View RPM.**

You can configure the RPM probes, to view the RPM statistics and to ensure that the device is configured to receive and transmit TCP and UDP RPM probes on correct ports.

You can view the RPM configuration to verify the following information:

- The RPM configuration is within the expected values.
- The RPM probes are functioning and the RPM statistics are within expected values.
- The device is configured to receive and transmit TCP and UDP RPM probes on the correct ports.

In addition to the RPM statistics for each RPM test, the J-Web interface displays the round-trip times and cumulative jitter graphically. In the graphs, the round-trip time and jitter values are plotted as a function of the system time. Large spikes in round-trip time or jitter indicate a slower outbound (egress) or inbound (ingress) time for the probe sent at that particular time.

### Solution

To view RPM information:

1. Enter the information specified in [Table 323 on page 902.](#)

Table 323: RPM Information Troubleshooting Options

Field	Function
<b>Currently Running Tests</b>	
Graph	Click the Graph link to display the graph (if it is not already displayed) or to update the graph for a particular test.
Owner	Configured owner name of the RPM test.
Test Name	Configured name of the RPM test.

Table 323: RPM Information Troubleshooting Options (*continued*)

Field	Function
Probe Type	Type of RPM probe configured for the specified test. Following are valid probe types: <ul style="list-style-type: none"> <li>• http-get</li> <li>• http-get-metadata</li> <li>• icmp-ping</li> <li>• icmp-ping-timestamp</li> <li>• tcp-ping</li> <li>• udp-ping</li> </ul>
Target Address	IP address or URL of the remote server that is being probed by the RPM test.
Source Address	Explicitly configured source address that is included in the probe packet headers.  If no source address is configured, the RPM probe packets use the outgoing interface as the source address, and the Source Address field is empty.
Minimum RTT	Shortest round-trip time from the J Series device to the remote server, as measured over the course of the test.
Maximum RTT	Longest round-trip time from the J Series device to the remote server, as measured over the course of the test.
Average RTT	Average round-trip time from the J Series device to the remote server, as measured over the course of the test.
Standard Deviation RTT	Standard deviation of round-trip times from the J Series device to the remote server, as measured over the course of the test.
Probes Sent	Total number of probes sent over the course of the test.
Loss Percentage	Percentage of probes sent for which a response was not received.
<b>Round-Trip Time for a Probe</b>	

Table 323: RPM Information Troubleshooting Options (*continued*)

Field	Function
Samples	<p>Total number of probes used for the data set.</p> <p>The J Series device maintains records of the most recent 50 probes for each configured test. These 50 probes are used to generate RPM statistics for a particular test.</p>
Earliest Sample	System time when the first probe in the sample was received.
Latest Sample	System time when the last probe in the sample was received.
Mean Value	Average round-trip time for the 50-probe sample.
Standard Deviation	Standard deviation of the round-trip times for the 50-probe sample.
Lowest Value	Shortest round-trip time from the device to the remote server, as measured over the 50-probe sample.
Time of Lowest Sample	System time when the lowest value in the 50-probe sample was received.
Highest Value	Longest round-trip time from the J Series device to the remote server, as measured over the 50-probe sample.
Time of Highest Sample	System time when the highest value in the 50-probe sample was received.
<b>Cumulative Jitter for a Probe</b>	
Samples	<p>Total number of probes used for the data set.</p> <p>The J Series device maintains records of the most recent 50 probes for each configured test. These 50 probes are used to generate RPM statistics for a particular test.</p>
Earliest Sample	System time when the first probe in the sample was received.
Latest Sample	System time when the last probe in the sample was received.
Mean Value	Average jitter for the 50-probe sample.

Table 323: RPM Information Troubleshooting Options (continued)

Field	Function
Standard Deviation	Standard deviation of the jitter values for the 50-probe sample.
Lowest Value	Smallest jitter value, as measured over the 50-probe sample.
Time of Lowest Sample	System time when the lowest value in the 50-probe sample was received.
Highest Value	Highest jitter value, as measured over the 50-probe sample.
Time of Highest Sample	System time when the highest jitter value in the 50-probe sample was received.

RELATED DOCUMENTATION

| [Setup RPM](#) | 895

# Tools

## IN THIS CHAPTER

- [Troubleshoot Ping Host | 906](#)
- [Troubleshoot Ping MPLS | 909](#)
- [Troubleshoot Traceroute | 914](#)
- [Troubleshoot Packet Capture | 917](#)
- [Access CLI | 922](#)
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- [Edit CLI Configuration | 925](#)
- [Configure CLI | 927](#)

## Troubleshoot Ping Host

### IN THIS SECTION

- [About Ping Host Page | 906](#)

### About Ping Host Page

You are here: **Administration** > **Tools** > **Ping Host**.

The ping diagnostic tool sends a series of ICMP "echo request" packets to the specified remote host.

The receipt of such packets will usually result in the remote host replying with an ICMP "echo response." Note that some hosts are configured not to respond to ICMP "echo requests," so a lack of responses does not necessarily represent a connectivity problem. Also, some firewalls block the ICMP packet types that ping uses, so you may find that you are not able to ping outside your local network.

You can ping a host to verify that the host can be reached over the network or not.

To use the ping host tool:

1. Enter the information specified in [Table 324 on page 907](#) to troubleshoot the issue.

The Remote Host field is the only required field.

2. Click the expand icon next to Advanced options.

3. Click **Start**.

The results of the ping operation are displayed in [Table 325 on page 908](#). If no options are specified, each ping response is in the following format:

```
bytes bytes from ip-address: icmp_seq=number ttl=number time=time
```

4. Click **OK** to stop the ping operation before it is complete.

**Table 324: Ping Host Troubleshooting Options**

Field	Action
Remote Host	Type the hostname or IP address of the host to ping.
<b>Advanced Options</b>	
Don't Resolve Addresses	<ul style="list-style-type: none"> <li>• To suppress the display of the hop hostnames along the path, select the check box.</li> <li>• To display the hop hostnames along the path, clear the check box.</li> </ul>
Interface	From the list, select the interface on which ping requests are sent. If you select <b>any</b> , the ping requests are sent on all interfaces.
Count	From the list, select the number of ping requests to send.
Don't Fragment	<ul style="list-style-type: none"> <li>• To set the don't fragment (DF) bit in the IP header of the ping request packet, select the check box.</li> <li>• To clear the DF bit in the IP header of the ping request packet, clear the check box.</li> </ul>
Record Route	<ul style="list-style-type: none"> <li>• To record and display the path of the packet, select the check box.</li> <li>• To suppress the recording and display of the path of the packet, clear the check box.</li> </ul>
Type-of-Service	From the list, select the decimal value of the ToS in the IP header of the ping request packet.
Routing Instance	From the list, select the routing instance name for the ping attempt.
Interval	From the list, select the interval in seconds, between the transmission of each ping request.

Table 324: Ping Host Troubleshooting Options (*continued*)

Field	Action
Packet Size	Type the size, in bytes, of the packet. The size can be from 0 through 65468. The device adds 8 bytes to the size of the ICMP header.
Source Address	Type the source IP address of the ping request packet.
Time-to-Live	From the list, select the TTL hop count for the ping request packet.
Bypass Routing	<ul style="list-style-type: none"> <li>• To bypass the routing table and send the ping requests to hosts on the specified interface only, select the check box.</li> <li>• To route the ping requests using the routing table, clear the check box.</li> </ul> <p>If the routing table is not used, ping requests are sent only to hosts on the interface specified in the Interface box. If the host is not on that interface, ping responses are not sent.</p>

Table 325: Ping Host Results and Output Summary

Field	Function
<b><i>bytes bytes from ip-address</i></b>	<ul style="list-style-type: none"> <li>• <b><i>bytes</i></b>—Size of ping response packet, which is equal to the value you entered in the Packet Size box, plus 8.</li> <li>• <b><i>ip-address</i></b>—IP address of destination host that sent the ping response packet.</li> </ul>
<b><i>icmp_seq=0</i></b> <b><i>icmp_seq=number</i></b>	<b><i>time</i></b> —Sequence Number field of the ping response packet. You can use this value to match the ping response to the corresponding ping request.
<b><i>ttl=number</i></b>	<b><i>number</i></b> —TTL hop-count value of the ping response packet.
<b><i>time=time</i></b>	<b><i>time</i></b> —Total time between the sending of the ping request packet and the receiving of the ping response packet, in milliseconds. This value is also called round-trip time.
<b><i>number packets transmitted</i></b>	<b><i>number</i></b> —Number of ping requests (probes) sent to host.
<b><i>number packets received</i></b>	<b><i>number</i></b> —Number of ping responses received from host.
<b><i>percentage packet loss</i></b>	<b><i>percentage</i></b> —Number of ping responses divided by the number of ping requests, specified as a percentage.

Table 325: Ping Host Results and Output Summary (*continued*)

Field	Function
round-trip min/avg/max/stddev = <i>min-time</i> / <i>avg-time</i> / <i>max-time</i> / <i>std-dev</i> ms	<ul style="list-style-type: none"> <li>• <i>min-time</i>—Minimum round-trip time (see <b>time=time</b> field in this table).</li> <li>• <i>avg-time</i>—Average round-trip time.</li> <li>• <i>max-time</i>—Maximum round-trip time.</li> <li>• <i>std-dev</i>—Standard deviation of the round-trip times.</li> </ul>
Output = Packet loss of 100 percent	<p>If the device does not receive ping responses from the destination host (the output shows a packet loss of 100 percent), one of the following explanations might apply:</p> <ul style="list-style-type: none"> <li>• The host is not operational.</li> <li>• There are network connectivity problems between the device and the host.</li> <li>• The host might be configured to ignore ICMP echo requests.</li> <li>• The host might be configured with a firewall filter that blocks ICMP echo requests or ICMP echo responses.</li> <li>• The size of the ICMP echo request packet exceeds the MTU of a host along the path.</li> <li>• The value you selected in the TTL box was less than the number of hops in the path to the host, in which case the host might reply with an ICMP error message.</li> </ul> <p>For more information about ICMP, see RFC 792, <i>Internet Control Message Protocol</i>.</p>

## RELATED DOCUMENTATION

[Troubleshoot Ping MPLS | 909](#)
[Troubleshoot Traceroute | 914](#)
[Troubleshoot Packet Capture | 917](#)

## Troubleshoot Ping MPLS

### IN THIS SECTION

- [About Ping MPLS Page | 910](#)



## About Ping MPLS Page

You are here: **Administration > Tools > Ping MPLS.**

You can send variations of ICMP "echo request" packets to the specified MPLS endpoint.

To use the ping MPLS tool:

1. Click the expand icon next to the ping MPLS option you want to use.
2. Enter information specified in [Table 326 on page 910](#) to troubleshoot the issue.
3. Click **Start**.

The results of the ping operation are displayed in [Table 327 on page 912](#).

4. Click **OK** to stop the ping operation before it is complete.

**Table 326: Ping MPLS Troubleshooting Options**

Field	Action
<b>Ping RSVP-signaled LSP</b>	
LSP Name	Type the name of the LSP to ping.
Source Address	Type the source IP address of the ping request packet—a valid address configured on a J Series device interface.
Count	From the list, select the number of ping requests to send. The default is 5 requests.
Detailed Output	Select the check box to display detailed output rather than brief ping output.
<b>Ping LDP-signaled LSP</b>	
FEC Prefix	Type the forwarding equivalence class (FEC) prefix and length of the LSP to ping.
Source Address	Type the source IP address of the ping request packet—a valid address configured on a J Series device interface.
Count	From the list, select the number of ping requests to send. The default is 5 requests.
Detailed Output	Select the check box to display detailed output rather than brief ping output.
<b>Ping LSP to Layer 3 VPN prefix</b>	

Table 326: Ping MPLS Troubleshooting Options (*continued*)

Field	Action
Layer 3 VPN Name	Type the name of the VPN to ping.
Count	From the list, select the number of ping requests to send. The default is 5 requests.
Detailed Output	Select the check box to display detailed output rather than brief ping output.
VPN Prefix	Type the IP address prefix and length of the VPN to ping.
Source Address	Type the source IP address of the ping request packet—a valid address configured on a J Series device interface.

**Ping LSP for a Layer 2 VPN connection by interface**

Interface	From the list, select the J Series device interface on which ping requests are sent. If you select <b>any</b> , the ping requests are sent on all interfaces.  (See the interface naming conventions in the <a href="#">Junos OS Interfaces Configuration Guide for Security Devices</a> .)
Source Address	Type the source IP address of the ping request packet—a valid address configured on a J series device interface.
Count	From the list, select the number of ping requests to send. The default is 5 requests.
Detailed Output	Select the check box to display detailed output rather than brief ping output.

**Ping LSP for a Layer 2 VPN connection by instance**

Layer 2VPN Name	Type the name of the Layer 2 VPN to ping.
Remote Site Identifier	Type the remote site identifier of the Layer 2 VPN to ping.
Source Address	Type the source IP address of the ping request packet—a valid address configured on a J Series device interface.
Local Site Identifier	Type the local site identifier of the Layer 2 VPN to ping.
Count	From the list, select the number of ping requests to send. The default is 5 requests.
Detailed Output	Select the check box to display detailed output rather than brief ping output.

**Ping LSP to a Layer 2 circuit remote site by interface**

Table 326: Ping MPLS Troubleshooting Options (*continued*)

Field	Action
Interface	From the list, select the J Series device interface on which ping requests are sent. If you select <b>any</b> , the ping requests are sent on all interfaces.
Source Address	Type the source IP address of the ping request packet—a valid address configured on a J Series device interface.
Count	From the list, select the number of ping requests to send. The default is 5 requests.
Detailed Output	Select the check box to display detailed output rather than brief ping output.

**Ping LSP to a Layer 2 circuit remote site by VCI**

Remote Neighbor	Type the IP address of the remote neighbor (PE router) within the virtual circuit to ping.
Circuit Identifier	Type the virtual circuit identifier for the Layer 2 circuit.
Source Address	Type the source IP address of the ping request packet—a valid address configured on a J Series device interface.
Count	From the list, select the number of ping requests to send.
Detailed Output	Select the check box to display detailed output rather than brief ping output.

**Ping endpoint of LSP**

VPN Prefix	Type either the LDP FEC prefix and length or the RSVP LSP endpoint address for the LSP to ping.
Source Address	Type the source IP address of the ping request packet—a valid address configured on a J Series device interface.
Count	From the list, select the number of ping requests to send.
Detailed Output	Select the check box to display detailed output rather than brief ping output.

Table 327: Ping MPLS Results and Output Summary

Field	Function
Exclamation point (!)	Echo reply was received.

Table 327: Ping MPLS Results and Output Summary (continued)

Field	Function
Period (.)	Echo reply was not received within the timeout period.
x	Echo reply was received with an error code. Errored packets are not counted in the received packets count and are accounted for separately.
<b>number packets transmitted</b>	<b>number</b> —Number of ping requests (probes) sent to a host.
<b>number packets received</b>	<b>number</b> —Number of ping responses received from a host.
<b>percentage packet loss</b>	<b>percentage</b> —Number of ping responses divided by the number of ping requests, specified as a percentage.
<b>time</b>	For Layer 2 circuits only, the number of milliseconds required for the ping packet to reach the destination. This value is approximate, because the packet has to reach the Routing Engine.
Output = Packet loss of 100 percent	<p>If the device does not receive ping responses from the destination host (the output shows a packet loss of 100 percent), one of the following explanations might apply:</p> <ul style="list-style-type: none"> <li>• The host is not operational.</li> <li>• There are network connectivity problems between the device and the host.</li> <li>• The host might be configured to ignore echo requests.</li> <li>• The host might be configured with a firewall filter that blocks echo requests or echo responses.</li> <li>• The size of the echo request packet exceeds the MTU of a host along the path.</li> <li>• The outbound node at the remote endpoint is not configured to handle MPLS packets.</li> <li>• The remote endpoint's loopback address is not configured to <b>127.0.0.1</b>.</li> </ul>

## RELATED DOCUMENTATION

[Troubleshoot Traceroute | 914](#)
[Troubleshoot Packet Capture | 917](#)

## Troubleshoot Traceroute

### IN THIS SECTION

- [About Traceroute Page](#) | 914

### About Traceroute Page

You are here: **Administration** > **Tools** > **Traceroute**.

The traceroute diagnostic tool uses a series of packets crafted to elicit an ICMP "time exceeded" messages from intermediate points in the network between your device and the specified host.

The time-to-live for a packet is decremented each time the packet is routed, so traceroute generally receives at least one "time exceeded" response from each way point. Traceroute starts with a packet with a time-to-live value of one, and increments the time to live for subsequent packets, thereby constructing a rudimentary map of the path between hosts.

Use this page to display a list of routers between the device and a specified destination host.

To use the traceroute tool:

1. Click the expand icon next to Advanced options.
2. Enter information in the Traceroute page as described in [Table 328 on page 915](#).

The Remote Host field is the only required field.

3. Click **Start**.

The results of the traceroute operation are displayed in [Table 329 on page 915](#). If no options are specified, each line of the traceroute display is in the following format:

```
hop-number host (ip-address) [as-number]time1 time2 time3
```

The device sends a total of three traceroute packets to each router along the path and displays the round-trip time for each traceroute operation. If the device times out before receiving a Time Exceeded message, an asterisk (\*) is displayed for that round-trip time.

4. Click **OK** to stop the traceroute operation before it is complete.

Table 328: Ping Traceroute Troubleshooting Options

Field	Action
Remote Host	Type the hostname or IP address of the destination host of the traceroute.
<b>Advanced Options</b>	
Don't Resolve Addresses	<ul style="list-style-type: none"> <li>• To suppress the display of the hop hostnames along the path, select the check box.</li> <li>• To display the hop hostnames along the path, clear the check box.</li> </ul>
Interface	From the list, select the interface on which traceroute packets are sent. If you select <b>any</b> , the traceroute requests are sent on all interfaces.
Time-to-Live	From the list, select the time-to-live (TTL) hop count for the traceroute request packet.
Type-of-Service	From the list, select the decimal value of the type-of-service (ToS) value to include in the IP header of the traceroute request packet.
Resolve AS Numbers	<ul style="list-style-type: none"> <li>• To display the autonomous system (AS) number of each intermediate hop between the device and the destination host, select the check box.</li> <li>• To suppress the display of the AS number of each intermediate hop between the device and the destination host, clear the check box.</li> </ul>
Routing Instance	From the list, select the routing instance name for the ping attempt.
Gateway	Type the gateway IP address to route through.
Source Address	Type the source IP address of the outgoing traceroute packets.
Bypass Routing	<ul style="list-style-type: none"> <li>• To bypass the routing table and send the traceroute packets to hosts on the specified interface only, select the check box.</li> <li>• To route the traceroute packets by means of the routing table, clear the check box.</li> </ul> <p>If the routing table is not used, traceroute packets are sent only to hosts on the interface specified in the Interface box. If the host is not on that interface, traceroute responses are not sent.</p>

Table 329: Ping Traceroute Results and Output Summary

Field	Function
<b>Ping Traceroute Results and Output Summary</b>	
<i>hop-number</i>	Number of the hop (router) along the path.

Table 329: Ping Traceroute Results and Output Summary (*continued*)

Field	Function
<i>host</i>	<p>Hostname, if available, or IP address of the router.</p> <p>To suppress the display of the hostname, select the Don't Resolve Addresses check box.</p>
<i>ip-address</i>	IP address of the router.
<i>as-number</i>	AS number of the router.
<i>time1</i>	Round-trip time between the sending of the first traceroute packet and the receiving of the corresponding Time Exceeded packet from that particular router.
<i>time2</i>	Round-trip time between the sending of the second traceroute packet and the receiving of the corresponding Time Exceeded packet from that particular router.
<i>time3</i>	Round-trip time between the sending of the third traceroute packet and the receiving of the corresponding Time Exceeded packet from that particular router.
Output = Complete path to the destination host not displayed	<p>If the device does not display the complete path to the destination host, one of the following explanations might apply:</p> <ul style="list-style-type: none"> <li>• The host is not operational.</li> <li>• There are network connectivity problems between the device and the host.</li> <li>• The host, or a router along the path, might be configured to ignore ICMP traceroute messages.</li> <li>• The host, or a router along the path, might be configured with a firewall filter that blocks ICMP traceroute requests or ICMP time exceeded responses.</li> <li>• The value you selected in the Time Exceeded box was less than the number of hops in the path to the host. In this case, the host might reply with an ICMP error message.</li> </ul> <p>For more information about ICMP, see RFC 792, <i>Internet Control Message Protocol</i>.</p>

## RELATED DOCUMENTATION

| [Troubleshoot Packet Capture](#) | 917

## Troubleshoot Packet Capture

### IN THIS SECTION

- [About Packet Capture Page](#) | 917

### About Packet Capture Page

You are here: **Administration** > **Tools** > **Packet Capture**.

You can quickly capture and analyze router control traffic on a device.

The packet capture diagnostic tool allows inspection of control traffic (not transient traffic). The summary of each decoded packet is displayed as it is captured. Captured packets are written to a PCAP file which can be downloaded.

**NOTE:** Starting in Junos OS Release 19.3R1, J-Web supports RE3 line cards for SRX5000 line of devices.

To use J-Web packet capture:

1. Enter the information specified in [Table 330 on page 918](#) to troubleshoot the issue.
2. Save the captured packets to a file or specify other advanced options by clicking the expand icon next to Advanced options.
3. Click **Start**.

The captured packet headers are decoded and displayed in the Packet Capture display as specified in [Table 331 on page 921](#).

4. Click one:
  - **Stop Capturing**—Stops capturing the packets and stays on the same page while the decoded packet headers are being displayed.
  - **OK**—Stops capturing packets and returns to the Packet Capture page.



Table 330: Packet Capture Troubleshooting Options

Field	Function	Action
Interface	<p>Specifies the interface on which the packets are captured.</p> <p>If you select <b>default</b>, packets on the Ethernet management port 0 are captured.</p>	From the list, select an interface—for example, <b>ge-0/0/0</b> .
Detail level	<p>Specifies the extent of details to be displayed for the packet headers.</p> <ul style="list-style-type: none"> <li>• Brief—Displays the minimum packet header information. This is the default.</li> <li>• Detail—Displays packet header information in moderate detail.</li> <li>• Extensive—Displays the maximum packet header information.</li> </ul>	From the list, select <b>Detail</b> .
Packets	Specifies the number of packets to be captured. Values range from <b>1</b> to <b>1000</b> . Default is <b>10</b> . Packet capture stops capturing packets after this number is reached.	From the list, select the number of packets to be captured—for example, <b>10</b> .
Addresses	<p>Specifies the addresses to be matched for capturing the packets using a combination of the following parameters:</p> <ul style="list-style-type: none"> <li>• Direction—Matches the packet headers for IP address, hostname, or network address of the source, destination, or both.</li> <li>• Type—Specifies if packet headers are matched for host address or network address.</li> </ul> <p>You can add multiple entries to refine the match criteria for addresses.</p>	<p>Select address-matching criteria. For example:</p> <ol style="list-style-type: none"> <li>1. From the Direction list, select <b>source</b>.</li> <li>2. From the Type list, select <b>host</b>.</li> <li>3. In the Address box, type <b>10.1.40.48</b>.</li> <li>4. Click <b>Add</b>.</li> </ol>

Table 330: Packet Capture Troubleshooting Options (*continued*)

Field	Function	Action
Protocols	Matches the protocol for which packets are captured. You can choose to capture TCP, UDP, or ICMP packets or a combination of TCP, UDP, and ICMP packets.	From the list, select a protocol—for example:  1. Select a protocol from the list. 2. Click <b>Add</b> .
Ports	Matches the packet headers containing the specified source or destination TCP or UDP port number or port name.	Select a direction and a port. For example:  1. From the Direction list, select <b>src</b> .  2. In the Port box, type <b>23</b> .  3. Click <b>Add</b> .
<b>Advanced Options</b>		
Absolute TCP Sequence	Displays the absolute TCP sequence numbers for the packet headers.	<ul style="list-style-type: none"> <li>• To display absolute TCP sequence numbers in the packet headers, select this check box.</li> <li>• To stop displaying absolute TCP sequence numbers in the packet headers, clear this check box.</li> </ul>
Layer 2 Headers	Displays the link-layer packet headers.	<ul style="list-style-type: none"> <li>• To include link-layer packet headers while capturing packets, select this check box.</li> <li>• To exclude link-layer packet headers while capturing packets, clear this check box.</li> </ul>
Non-Promiscuous	<p>Does not place the interface in promiscuous mode so that the interface reads only packets addressed to it.</p> <p>In promiscuous mode, the interface reads every packet that reaches it.</p>	<ul style="list-style-type: none"> <li>• To read all packets that reach the interface, select this check box.</li> <li>• To read only packets addressed to the interface, clear this check box.</li> </ul>

Table 330: Packet Capture Troubleshooting Options (*continued*)

Field	Function	Action
Display Hex	Displays packet headers, except link-layer headers, in hexadecimal format.	<ul style="list-style-type: none"> <li>• To display the packet headers in hexadecimal format, select this check box.</li> <li>• To stop displaying the packet headers in hexadecimal format, clear this check box.</li> </ul>
Display ASCII and Hex	Displays packet headers in hexadecimal and ASCII formats.	<ul style="list-style-type: none"> <li>• To display the packet headers in ASCII and hexadecimal formats, select this check box.</li> <li>• To stop displaying the packet headers in ASCII and hexadecimal formats, clear this check box.</li> </ul>
Header Expression	<p>Specifies the match condition for the packets to be captured.</p> <p>The match conditions you specify for Addresses, Protocols, and Ports are displayed in expression format in this field.</p>	Enter match conditions directly in this field in expression format or modify the expression composed from the match conditions you specified for Addresses, Protocols, and Ports. If you change the match conditions specified for Addresses, Protocols, and Ports again, packet capture overwrites your changes with the new match conditions.
Packet Size	Specifies the number of bytes to be displayed for each packet. If a packet header exceeds this size, the display is truncated for the packet header. The default value is 96 bytes.	Type the number of bytes you want to capture for each packet header—for example, <b>256</b> .
Don't Resolve Addresses	Specifies that IP addresses are not to be resolved into hostnames in the packet headers displayed.	<ul style="list-style-type: none"> <li>• To prevent packet capture from resolving IP addresses to hostnames, select this check box.</li> <li>• To resolve IP addresses into hostnames, clear this check box.</li> </ul>
No Timestamp	Suppresses the display of packet header timestamps.	<ul style="list-style-type: none"> <li>• To stop displaying timestamps in the captured packet headers, select this check box.</li> <li>• To display the timestamp in the captured packet headers, clear this check box.</li> </ul>

Table 330: Packet Capture Troubleshooting Options (*continued*)

Field	Function	Action
Write Packet Capture File	<p>Writes the captured packets to a file in PCAP format in <code>/var/tmp</code>. The files are named with the prefix <b>jweb-pcap</b> and the extension <b>.pcap</b>.</p> <p>If you select this option, the decoded packet headers are not displayed on the packet capture page.</p>	<ul style="list-style-type: none"> <li>• To save the captured packet headers to a file, select this check box.</li> <li>• To decode and display the packet headers on the J-Web page, clear this check box.</li> </ul>

Table 331: Packet Capture Results and Output Summary

Field	Function
<i>timestamp</i>	<p>Displays the time when the packet was captured. The timestamp <b>00:45:40.823971</b> means 00 hours (12.00 a.m.), 45 minutes, and 40.823971 seconds.</p> <p><b>NOTE:</b> The time displayed is local time.</p>
<i>direction</i>	<p>Displays the direction of the packet. Specifies whether the packet originated from the Routing Engine (<b>Out</b>) or was destined for the Routing Engine (<b>In</b>)</p>
<i>protocol</i>	<p>Displays the protocol for the packet.</p> <p>In the sample output, <b>IP</b> indicates the Layer 3 protocol.</p>
<i>source address</i>	<p>Displays the hostname, if available, or IP address and the port number of the packet's origin. If the Don't Resolve Addresses check box is selected, only the IP address of the source is displayed.</p> <p><b>NOTE:</b> When a string is defined for the port, the packet capture output displays the string instead of the port number.</p>
<i>destination address</i>	<p>Displays the hostname, if available, or IP address of the packet's destination with the port number. If the Don't Resolve Addresses check box is selected, only the IP address of the destination and the port are displayed.</p> <p><b>NOTE:</b> When a string is defined for the port, the packet capture output displays the string instead of the port number.</p>

Table 331: Packet Capture Results and Output Summary (continued)

Field	Function
<i>protocol</i>	Displays the protocol for the packet.  In the sample output, <b>TCP</b> indicates the Layer 4 protocol.
<i>data size</i>	Displays the size of the packet (in bytes).

Release History Table

Release	Description
<a href="#">19.3R1</a>	Starting in Junos OS Release 19.3R1, J-Web supports RE3 line cards for SRX5000 line of devices.

RELATED DOCUMENTATION

| [Troubleshoot Traceroute](#) | [914](#)

Access CLI

IN THIS SECTION

- [About CLI Terminal Page](#) | [922](#)

About CLI Terminal Page

You are here: **Administration** > **Tools** > **CLI Terminal**.

The Junos CLI provides a set of commands for monitoring and configuring a routing platform. Use this page to access Junos OS CLI through J-Web interface.

This topic includes the following sections:

**CLI Terminal Requirements**

To access the CLI through the J-Web interface, your management device requires the following features:

- **SSH access**—Secure shell (SSH) provides a secured method of logging in to the routing platform to encrypt traffic so that it is not intercepted. If SSH is not enabled on your system, the CLI terminal page displays an error and provides a link to the Set Up Quick Configuration page where you can enable SSH.
- **Java applet support**—Your Web browser must support Java applets.
- **JRE installed on the client**—Java Runtime Environment (JRE) version 1.4 or later must be installed on your system to run Java applications. Download the latest JRE version from the Java Software website <http://www.java.com/>. Installing JRE installs Java plug-ins, which once installed, load automatically and transparently to render Java applets.

**NOTE:** The CLI terminal is supported on JRE version 1.4 or later only.

### CLI Overview

The Junos OS CLI uses industry-standard tools and utilities to provide a set of commands for monitoring and configuring a routing platform. You type commands on a line and press Enter to execute them. The CLI provides online command Help, command completion, and Emacs-style keyboard sequences for moving around on the command line and scrolling through a buffer of recently executed commands.

The commands in the CLI are organized hierarchically, with commands that perform a similar function grouped together under the same level. For example, all commands that display information about the device system and system software are grouped under the **show** command, and all commands that display information about the routing table are grouped under the **show route** command. The hierarchical organization results in commands that have a regular syntax and provides the following features that simplify CLI use:

- **Consistent command names**—Commands that provide the same type of function have the same name, regardless of the portion of the software they are operating on. For example, all **show** commands display software information and statistics, and all **clear** commands erase various types of system information.
- **Lists and short descriptions of available commands**—Information about available commands is provided at each level of the CLI command hierarchy. If you type a question mark (?) at any level, you see a list of the available commands along with a short description of each command.
- **Command completion**—Command completion for command names (keywords) and command options is also available at each level of the hierarchy. In the CLI terminal, you can perform one of the following actions to complete a command:
  - Enter a partial command name followed immediately by a question mark (with no intervening space) to see a list of commands that match the partial name you typed.
  - Press the Spacebar to complete a command or option that you have partially typed. If the partially typed letters begin a string that uniquely identifies a command, the complete command name appears. Otherwise, a prompt indicates that you have entered an ambiguous command, and the possible completions are displayed.

The Tab key option is currently not available on the CLI terminal.

The CLI has two modes:

- Operational mode—Complete set of commands to control the CLI environment, monitor and troubleshoot network connectivity, manage the device, and enter configuration mode.
- Configuration mode—Complete set of commands to configure the device.

For more information about the Junos OS CLI, see the [Junos OS CLI User Guide](#).

## RELATED DOCUMENTATION

| [View CLI Configuration](#) | 924

## View CLI Configuration

### IN THIS SECTION

- [About CLI Viewer Page](#) | 924

### About CLI Viewer Page

You are here: **Administration** > **Tools** > **CLI Viewer**.

You can view current configuration running on the device.

**NOTE:**

- The configuration statements appear in a fixed order irrespective of the order in which you configured the routing platform. The top of the configuration displays a timestamp indicating when the configuration was last changed and the current version.
- Each level in the hierarchy is indented to indicate each statement's relative position in the hierarchy. Each level is generally set off with braces, using an open brace ({) at the beginning of each hierarchy level and a closing brace (}) at the end. If the statement at a hierarchy level is empty, the braces are not displayed. Each leaf statement ends with a semicolon (;), as does the last statement in the hierarchy.
- The indented representation is used when the configuration is displayed or saved as an ASCII file. However, when you load an ASCII configuration file, the format of the file is not so strict. The braces and semicolons are required, but the indentation and use of new lines are not required in ASCII configuration files.
- Uncommitted configuration changes will also be listed.

To save, commit, or cancel the current configuration:

1. Click one:

- **OK**—Saves the configuration and returns to the CLI Viewer page.
- **Commit Options > Commit**—Commits the configuration and returns to the CLI Viewer page.
- **Cancel**—Cancels your entries and returns to the CLI Viewer page.

## RELATED DOCUMENTATION

[Edit CLI Configuration | 925](#)

## Edit CLI Configuration

### IN THIS SECTION

- [About CLI Editor Page | 926](#)



## About CLI Editor Page

You are here: **Administration > Tools > CLI Editor**.

You can configure all routing platform services that you can configure from the Junos CLI prompt.

To edit the CLI configuration:

1. Navigate to the hierarchy level you want to edit. Edit the candidate configuration using standard text editor operations—insert lines (with the Enter key), delete lines, modify, copy, and paste text.
2. Click **Commit** to load and commit the configuration. This saves the edited configuration, which replaces the existing configuration. The device checks the configuration for the correct syntax before committing it. If any errors occur when the configuration is loading or committed, they are displayed and the previous configuration is restored.
3. Click one:
  - **OK**—Saves the configuration and returns to the CLI Editor page.
  - **Commit Options>Commit**—Commits the configuration and returns to the CLI Editor page.
  - **Cancel**—Cancels your entries and returns to the CLI Editor page.

**NOTE:** When you edit the ASCII configuration file, you can add comments of one or more lines. Comments must precede the statement they are associated with. If you place the comments in other places in the file, such as on the same line after a statement or on a separate line following a statement, they are removed when you click Commit. Comments must begin and end with special characters. For more information, see the *Junos OS CLI User Guide*.

## RELATED DOCUMENTATION

| [Configure CLI](#) | 927

## Configure CLI

### IN THIS SECTION

- [About Point and Click CLI Page | 927](#)

### About Point and Click CLI Page

You are here: **Administration** > **Tools** > **Point and Click CLI**.

You can edit configuration on a series of pages of clickable options.

1. To edit the configuration on a series of pages of clickable options that step you through the hierarchy, enter the information specified in [Table 332 on page 928](#). [Table 333 on page 928](#) lists key J-Web configuration editor tasks and their functions.

**NOTE:** Options changes for each device. For a device, if a feature is not yet configured, you have the option to first configure the feature. If the feature is already configured, you have the option to edit or delete the feature on that particular device.

2. Click one:
  - **Refresh**—Refreshes and updates the display with any changes to the configuration made by other users.
  - **Commit**—Verifies edits and applies them to the current configuration file running on the device.
  - **Discard**—Removes edits applied to, or deletes existing statements or identifiers from, the candidate configuration.
3. Click one:
  - **OK**—Saves the configuration and returns to the main configuration page.
  - **Commit Options** > **Commit**—Commits the configuration and returns to the main configuration page.
  - **Cancel**—Cancels your entries and returns to the main configuration page.

Table 332: Point and Click Configuration Details

Field	Description	Action
Configuration	<p>Specifies that you can edit the selected configuration on a series of pages of clickable options that step you through the hierarchy. The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Expand all</b>—Expands the hierarchy of all statements.</li> <li>• <b>Hide all</b>—Hides the hierarchy of all statements.</li> <li>• <b>(+)</b>—Expands an individual statement in the hierarchy.</li> <li>• <b>(-)</b>—Hides an individual statement in the hierarchy.</li> </ul>	Click one option.

Table 333: J-Web Configuration Editor Page Details

Field	Function
Access	<p>Specifies that you can edit or delete access and user authentication methods to the device. The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Configure</b>—Configures the feature.</li> <li>• <b>Edit</b>—Edits the feature.</li> <li>• <b>Delete</b>—Deletes the feature.</li> </ul>
Accounting options	<p>Specifies that you can configure accounting options such as log data about basic system operations and services on the device. The option available is:</p> <ul style="list-style-type: none"> <li>• <b>Configure</b>—Configures the feature.</li> </ul>
Applications	<p>Specifies that you can edit or delete applications functions of the Junos OS and their properties on the device. The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Edit</b>—Edits the feature</li> <li>• <b>Delete</b>—Deletes the feature.</li> </ul>

Table 333: J-Web Configuration Editor Page Details (*continued*)

Field	Function
<b>Chassis</b>	<p>Specifies that you can configure alarms and other chassis properties on the device. The option available is:</p> <ul style="list-style-type: none"> <li>• <b>Configure</b>—Configures the feature.</li> <li>• <b>Edit</b>—Edits the feature.</li> <li>• <b>Delete</b>—Deletes the feature.</li> </ul>
<b>Class of service</b>	<p>Specifies that you can edit or delete the Class-of-Service feature. The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Edit</b>—Edits the feature</li> <li>• <b>Delete</b>—Deletes the feature.</li> </ul>
Ethernet switching options	<p>Specifies that you can configure Ethernet switching options on the device. The option available is:</p> <ul style="list-style-type: none"> <li>• <b>Configure</b>—Configures the feature.</li> </ul>
<b>Event options</b>	<p>Specifies that you can configure diagnostic event policies and actions associated with each policy. The option available is:</p> <ul style="list-style-type: none"> <li>• <b>Configure</b>—Configures the feature.</li> </ul>
<b>Firewall</b>	<p>Specifies that you can configure stateless firewall filters—also known as ACLs—on the device. The option available is:</p> <ul style="list-style-type: none"> <li>• <b>Configure</b>—Configures the feature.</li> </ul>
<b>Forwarding options</b>	<p>Specifies that you can configure forwarding option protocols, including flow monitoring, accounting properties, and packet capture. The option available is:</p> <ul style="list-style-type: none"> <li>• <b>Configure</b>—Configures the feature.</li> </ul>
<b>Interfaces</b>	<p>Specifies that you can edit or delete interfaces on the device. The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Edit</b>—Edits the feature.</li> <li>• <b>Delete</b>—Deletes the feature.</li> </ul>
Multicast snooping options	<p>Specifies that you can configure multicast snooping options. The option available is:</p> <ul style="list-style-type: none"> <li>• <b>Configure</b>—Configures the feature.</li> </ul>

Table 333: J-Web Configuration Editor Page Details (*continued*)

Field	Function
Poe	<p>Specifies that you can edit or delete Power over Ethernet options on the device. The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Edit</b>—Edits the feature.</li> <li>• <b>Delete</b>—Deletes the feature.</li> </ul>
Policy options	<p>Specifies that you can configure routing policies that control information from routing protocols that the device imports into its routing table and exports to its neighbors. The option available is:</p> <ul style="list-style-type: none"> <li>• <b>Configure</b>—Configures the feature.</li> </ul>
Protocols	<p>Specifies that you can edit or delete routing protocols, including Intermediate System-to-Intermediate System (IS-IS), OSPF, RIP, Routing Information Protocol Next Generation (RIPng), and BGP. The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Edit</b>—Edits the feature.</li> <li>• <b>Delete</b>—Deletes the feature.</li> </ul>
Routing instances	<p>Specifies that you can configure a hierarchy to configure routing instances. The options available re:</p> <ul style="list-style-type: none"> <li>• <b>Configure</b>—Configures the feature.</li> </ul>
Routing options	<p>Specifies that you can edit or delete protocol-independent routing properties. The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Edit</b>—Edits the feature.</li> <li>• <b>Delete</b>—Deletes the feature.</li> </ul>
Schedulers	<p>Specifies that you can determine the day and time when security policies are in effect. The option available is:</p> <ul style="list-style-type: none"> <li>• <b>Configure</b>—Configures the feature.</li> </ul>
Security	<p>Specifies that you can edit or delete the rules for the transit traffic and the actions that need to take place on the traffic as it passes through the firewall; and to monitor the traffic attempting to cross from one security zone to another. The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Edit</b>—Edits the feature.</li> <li>• <b>Delete</b>—Deletes the feature.</li> </ul>

Table 333: J-Web Configuration Editor Page Details (*continued*)

Field	Function
<b>Services</b>	<p>Specifies that you can configure real-time performance monitoring (RPM) on the device. The option available is:</p> <ul style="list-style-type: none"> <li>• <b>Configure</b>—Configures the feature.</li> <li>• <b>Edit</b>—Edits the feature.</li> <li>• <b>Delete</b>—Deletes the feature.</li> </ul>
<b>Smtp</b>	<p>Specifies that you can configure Simple Mail Transfer Protocol. The option available is:</p> <ul style="list-style-type: none"> <li>• <b>Configure</b>—Configures the feature.</li> </ul>
<b>Snmp</b>	<p>Specifies that you can configure Simple Network Management Protocol for monitoring router operation and performance. The option available is:</p> <ul style="list-style-type: none"> <li>• <b>Configure</b>—Configures the feature.</li> </ul>
<b>System</b>	<p>Specifies that you can edit or delete system management functions, including the device's hostname, address, and domain name; the addresses of the DNS servers; user login accounts, including user authentication and the root-level user account; time zones and NTP properties; and properties of the device's auxiliary and console ports. The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Edit</b>—Edits the feature.</li> <li>• <b>Delete</b>—Deletes the feature.</li> </ul>
<b>Vlans</b>	<p>Specifies that you can edit or delete a virtual LAN. The options available are:</p> <ul style="list-style-type: none"> <li>• <b>Edit</b>—Edits the feature.</li> <li>• <b>Delete</b>—Deletes the feature.</li> </ul>
<b>Wlan</b>	<p>Specifies that you can configure a wireless local area network. The option available is:</p> <ul style="list-style-type: none"> <li>• <b>Configure</b>—Configures the feature.</li> </ul>
<b>Access profile</b>	
Access profile name	Enter the access profile name.
<b>Advanced</b>	
Add new entry	Click <b>Add new entry</b> to add a new identifier.

## RELATED DOCUMENTATION

| [Edit CLI Configuration](#) | 925

# Sky ATP Enrollment

## IN THIS CHAPTER

- [Enroll Your Device with Juniper Sky ATP | 933](#)

## Enroll Your Device with Juniper Sky ATP

You are here: **Administration** > **Sky ATP Enrollment**.

Use this page to enroll your SRX device with Juniper Sky Advanced Threat Prevention (Juniper Sky ATP).

Juniper Sky ATP is a cloud-based threat identification and prevention solution. It protects your device from malware and sophisticated cyber threats by inspecting e-mail and web traffic for advanced threats. Juniper Sky ATP integrates with the SRX Series devices to simplify its deployment and enhance the anti-threat capabilities of the SRX device.

Before enrolling a device:

- Ensure that you have a Juniper Sky ATP account with an associated license (free, basic, or premium) to configure a Juniper Sky ATP realm. The license controls the features of the Juniper Sky ATP. For more information on the Juniper Sky ATP account, see [Registering a Juniper Sky Advanced Threat Prevention Account](#).
- Decide which region the realm you create will cover because you must select a region when you configure a realm.
- Ensure the device is registered in the Juniper Sky ATP cloud portal.
- In the CLI mode, configure **set security forwarding-process enhanced-services-mode** on your SRX300, SRX320, SRX340, SRX345, and SRX550M devices to open ports and get the device ready to communicate with Juniper Sky ATP.

To enroll your device with Juniper Sky ATP from J-Web:

1. *Proxy Profile Configuration (Optional)*



- a. Select an option in the Proxy Profile list and proceed with Step 2.

**NOTE:**

- The list displays the existing proxy profiles that you have created using the Proxy Profile page (Configure > Security Services > Security Policy > Objects > Proxy Profiles).
- The SRX device and Juniper Sky ATP communicates through the proxy server if a proxy profile is configured. Otherwise, they directly communicate with each other.

- b. Or click **Create Proxy** to create a proxy profile.

The Create Proxy Profile page appears.

- c. Complete the configuration by using the guidelines in [Table 334 on page 934](#).

- d. Click **OK**.

A new proxy profile is created.

- e. Click **Apply Proxy**.

Applying proxy enables the SRX device and Juniper Sky ATP to communicate through the proxy server.

**Table 334: Fields on the Create Proxy Profile Page**

Field	Action
Profile Name	Enter a name for the proxy profile.
Connection Type	Select the connection type server from the list that proxy profile uses: <ul style="list-style-type: none"> <li>• Server IP—Enter the IP address of the proxy server.</li> <li>• Host Name—Enter the name of the proxy server.</li> </ul>
Port Number	Select a port number for the proxy profile. Range is 0 to 65535.

## 2. Enroll SRX Device with SKY ATP

- a. Click **Enroll**.

The Sky ATP Enrollment page appears.

**NOTE:** If there are any existing configuration changes, a message appears for you to commit the changes and then to proceed with the enrollment process.

- b. Complete the configuration by using the guidelines in [Table 335 on page 935](#).
- c. Click **OK**.

The SRX device enrollment progress, successful message, or any errors will be shown at the end of the SKY ATP Enrollment page.

**NOTE:**

- A new realm is created if you have enabled **Create New Realm** and then the SRX device is enrolled to Juniper Sky ATP. If there is any existing enrollment for the same SRX device, CLI sends the data to Juniper Sky ATP portal to do the duplicate validation during the enrollment process. You cannot check for the duplicate validation through J-Web.
- Click **Diagnostics** to troubleshoot any enrollment errors.

**Table 335: Fields on the Sky ATP Enrollment Page**

Field	Description
Create New Realm	By default, this option will be disabled if you have a Sky ATP account with an associated license.  Enable this option to add a new realm if you do not have a Sky ATP account with an associated license.
Location	Select a region of the world from the list.
Email	Enter your E-mail address.
Password	Enter a unique string at least eight characters long. Include both uppercase and lowercase letters, at least one number, and at least one special character (~!@#\$\$%^&*()_-=+{}[] :;<>.,/?); no spaces are allowed, and you cannot use the same sequence of characters that are in your e-mail address.
Confirm Password	Reenter the password.
Company Name	Enter a company name to enroll into the realm. A company name can only contain alphanumeric characters, special characters (underscore and dash).
Realm	Enter a name for the security realm. This should be a name that is meaningful to your organization. A realm name can only contain alphanumeric characters and the dash symbol. Once created, this name cannot be changed.

To remove any existing SRX device enrollment:

1. Click **UnEnroll**.

The Sky ATP UnEnrollment page appears.

2. Complete the configuration by using the guidelines in [Table 335 on page 935](#).

3. Click **OK**.

The SRX device unenrollment progress, successful message, or any errors will be shown at the end of the SKY ATP Enrollment page.

**NOTE:** Click **Diagnostics** to troubleshoot any enrollment errors.