

## Chapter 14

# Monitoring SAE Data with the C-Web Interface

This chapter describes how to use the C-Web interface to monitor SAE data. Topics include:

- Viewing SAE Data with the C-Web Interface on page 129
- Viewing Information About Subscriber Sessions with the C-Web Interface on page 138
- Viewing SNMP Information with the C-Web Interface on page 143

## Viewing SAE Data with the C-Web Interface

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You can view data currently stored in the SAE server's memory for:

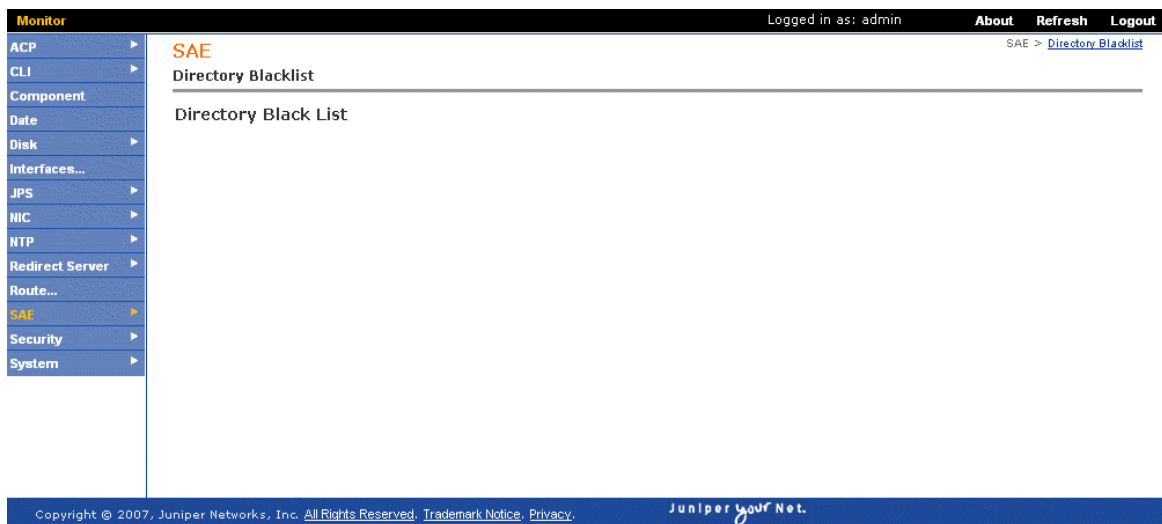
- Directory blacklist
- Services
- Licenses
- Policies
- Devices
- Interfaces
- Login registrations
- Equipment registrations
- Threads
- Subscriber Sessions

## Viewing Information About the Directory Blacklist

To view information about the directory blacklist configured on the SAE:

- Select **SAE** from the side pane, and click **Directory Blacklist**.

The Directory Blacklist pane appears.



## Viewing Information About Services

To view information about the services available on the SAE:

1. Select **SAE** from the side pane, and click **Services**.

The Services pane appears.

The screenshot shows the Juniper C-Web Interface. On the left is a navigation pane with a tree structure. The 'SAE' node is selected and highlighted in orange. Under 'SAE', the 'Services' sub-item is also highlighted. The main content area is titled 'SAE Services'. It contains several configuration fields: 'Service Name' (a text input box), 'Secret' (a checkbox), 'Style' (a dropdown menu), and 'Maximum Results' (a text input box). To the right of these fields are descriptive help texts. At the bottom of the configuration area are 'OK' and 'Reset' buttons. The top of the interface shows the user is logged in as 'admin' and includes links for 'About', 'Refresh', and 'Logout'. The bottom of the interface contains a copyright notice for Juniper Networks, Inc. and the 'Juniper your Net.' logo.

Field	Description
Service Name	Name of service. <i>Please enter:</i> All or part of the service name
Secret	Display subscriber sessions and service sessions for hidden services.
Style	Output style <i>Choices:</i> brief: Display only service names
Maximum Results	Number of results to be displayed. <i>Legal range:</i> 1 .. INF <i>Default value:</i> 25

2. In the Service Name box, enter a full or partial service name for which you want to display information, or leave the box blank to display all services.
3. Select the **Secret** check box to set a flag indicating that secret services are displayed.
4. Select an output style from the Style list.
5. In the Maximum Results box, enter the maximum number of results that you want to receive.
6. Click **OK**.

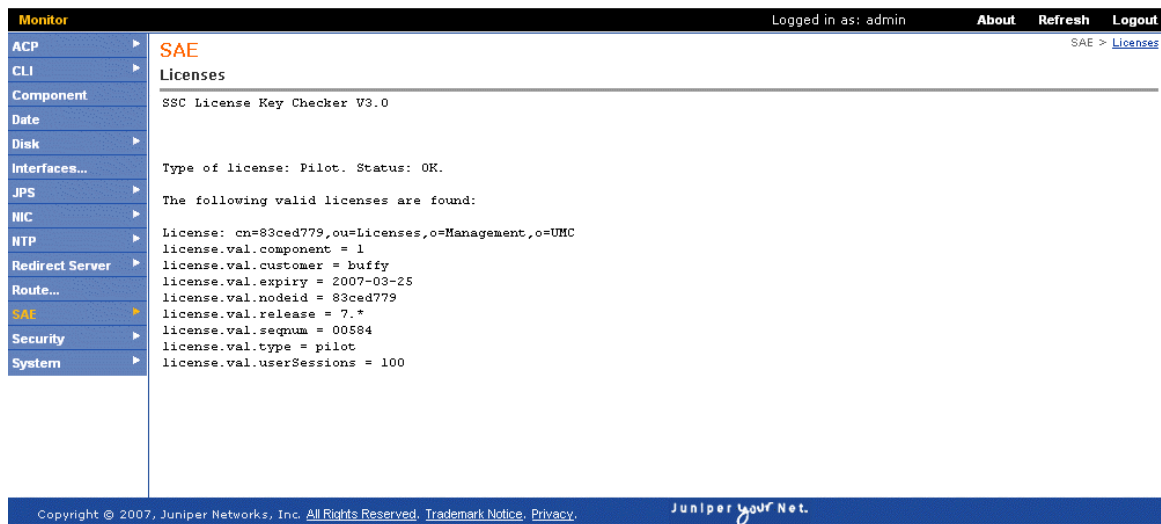
The Services pane displays the status of the services running on the SAE.

## Viewing Information About Licenses

To view information about licenses:

- Select **SAE** from the side pane, and click **License**.

The Licenses pane displays statistics for licenses.



The screenshot shows the Juniper C-Web Interface. The top navigation bar includes 'Monitor', 'Logged in as: admin', 'About', 'Refresh', and 'Logout'. The left sidebar lists various system components: ACP, CLI, Component, Date, Disk, Interfaces..., JPS, NIC, NTP, Redirect Server, Route..., SAE (highlighted), Security, and System. The main content area displays the 'SAE' section with a sub-section 'Licenses'. Below this, it shows 'SSC License Key Checker V3.0' and a list of valid licenses. The license details are as follows:

```

Type of license: Pilot. Status: OK.

The following valid licenses are found:

License: cn=83ced779,ou=Licenses,o=Management,o=UMC
license.val.component = 1
license.val.customer = buffy
license.val.expiry = 2007-03-25
license.val.nodeid = 83ced779
license.val.release = 7.*
license.val.seqnum = 00584
license.val.type = pilot
license.val.userSessions = 100
  
```

The bottom of the interface shows the copyright notice: 'Copyright © 2007, Juniper Networks, Inc. All Rights Reserved. Trademark Notice. Privacy.' and the Juniper logo with the tagline 'Juniper your Net.'

## Viewing Information About Policies

To view information about the policies available on the SAE:

1. Select **SAE** from the side pane, and click **Policies**.

The Policies pane appears.

The screenshot shows the SAE Policies configuration page. On the left is a sidebar with a 'Monitor' header and a list of components: ACP, CLI, Component, Date, Disk, Interfaces..., JPS, NIC, NTP, Redirect Server, Route..., SAE (highlighted), Security, and System. The main content area has a top bar with 'Logged in as: admin', 'About', 'Refresh', and 'Logout' links. Below this, the 'SAE' section is active, showing the 'Policies' tab. The 'Policies' section contains three input fields: 'Policy Group' (a text box), 'Style' (a dropdown menu), and 'Maximum Results' (a text box). To the right of these fields are help text boxes: 'Name of a policy group. Please enter: All or part of the policy group name' for Policy Group; 'Output style. Choices: brief: Display only policy group names' for Style; and 'Number of results to be displayed. Legal range: 1 .. INF. Default value: 25' for Maximum Results. Below the input fields are 'OK' and 'Reset' buttons. At the bottom of the page is a footer with copyright information and the Juniper logo.

2. In the Policy Group box, enter a full or partial policy name for which you want to display information, or leave the box blank to display all policies.
3. Select an output style from the Style list.
4. In the Maximum Results box, enter the maximum number of results that you want to receive.
5. Click **OK**.

The Policies pane displays the status of the policies configured on the SAE.

## Viewing Information About Device Drivers

To view information about the device drivers available on the SAE:

1. Select **SAE** from the side pane, and click **Drivers**.

The Drivers pane appears.

The screenshot shows the Juniper SAE Drivers pane. On the left is a navigation menu with items: ACP, CLI, Component, Date, Disk, Interfaces..., JPS, NIC, NTP, Redirect Server, Route..., SAE (highlighted), Security, and System. The main area is titled 'SAE Drivers' and contains three input fields: 'Name Of Device Driver' (a text box), 'Style' (a dropdown menu), and 'Maximum Results' (a text box). To the right of these fields are help text boxes: for 'Name Of Device Driver', it says 'Name of device drivers. Please enter: All or part of the device driver name. For JUNOS router drivers and PCMM drivers, use the format default@routerName.'; for 'Style', it says 'Output style Choices: brief: Display only virtual router names'; and for 'Maximum Results', it says 'Number of results to be displayed. Legal range: 1 .. INF Default value: 25'. Below the input fields are 'OK' and 'Reset' buttons. At the bottom of the pane is a large empty area for displaying results. The top of the interface shows 'Monitor', 'Logged in as: admin', and links for 'About', 'Refresh', and 'Logout'. The bottom of the interface shows the Juniper logo and copyright information.

2. In the Name of Device Driver box, enter a full or partial device driver name for which you want to display information, or leave the box blank to display all devices.

For JUNOSe router drivers, use the format:

**<virtual router name>@<router name>**

For JUNOS router drivers and PCMM drivers, use the format:

**default@<router name>**

3. Select an output style from the Style list.
4. In the Maximum Results box, enter the maximum number of results that you want to receive.
5. Click **OK**.

The Drivers pane displays the status of the routers running on the SAE.

## Viewing Information About Interfaces

To view information about the interfaces available on the router:

1. Select **SAE** from the side pane, and click **Interfaces**.

The Interfaces pane appears.

Monitor Logged in as: admin About Refresh Logout

ACP CLI Component Date Disk Interfaces... JPS IIC ITP Redirect Server Route... **SAE** Security System

**SAE**  
Interfaces

Interface Name  Name of router interface.  
*Please enter:* All or part of the interface name

Virtual Router  Name of virtual router.  
*Please enter:* All or part of the virtual router name

Style  Output style.  
*Choices:* brief: Display only interface names

Maximum Results  Number of results to be displayed.  
*Legal range:* 1 .. INF  
*Default value:* 25

OK Reset

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2. In the Interface Name box, enter the name of the router interface for which you want to display information. or leave the box blank to display information about all router interfaces.
3. In the Virtual Router box, enter the name of the virtual router for which you want to display interfaces, or leave the box blank to display information for all virtual routers.
4. Select an output style from the Style list.
5. In the Maximum Results box, enter the maximum number of results that you want to receive.
6. Click **OK**.

The Interfaces pane displays the interfaces available on the router.

## Viewing Login Registrations

You can view all login registrations, or you can view a specific registration.

For information about login and equipment registrations, see *SRC-PE Subscribers and Subscriptions Guide, Chapter 17, How Subscribers Use the Sample Residential Portal*.

To view information about login registrations:

1. Select **Registered** from the side pane, and click **Login**.

The Login pane appears.

2. In the MAC Address box, enter a MAC address that specifies the login registrations that you want to display.

Use the format:

**xx:xx:xx:xx:xx:xx**

3. Select an output style from the Style list.
4. In the Maximum Results box, enter the maximum number of results that you want to receive.
5. Click **OK**.

The Login pane displays information about the login registrations.



## Viewing Equipment Registrations

You can view all equipment registrations, or you can view a specific registration.

For information about login and equipment registrations, see *SRC-PE Subscribers and Subscriptions Guide, Chapter 17, How Subscribers Use the Sample Residential Portal*.

To view information about equipment registrations:

1. Select **Registered** from the side pane, and click **Equipment**.

The Equipment pane appears.

The screenshot shows the Juniper C-Web Interface. The top navigation bar includes 'Monitor', 'Logged in as: admin', and links for 'About', 'Refresh', and 'Logout'. The left sidebar lists various components: ACP, CLI, Component, Date, Disk, Interfaces..., JPS, NIC, NTP, Redirect Server, Route..., SAE (highlighted), Security, and System. The main content area is titled 'SAE Equipment'. It contains three input fields: 'Mac Address' (with a text box and a description: 'MAC address of equipment registrations. Please enter: MAC address in the format xx:xx:xx:xx:xx:xx'), 'Style' (with a dropdown menu and a description: 'Output style. Choices: brief: Display only MAC address of registered equipment'), and 'Maximum Results' (with a text box and a description: 'Number of results to be displayed. Legal range: 1 .. INF Default value: 25'). Below these fields are 'OK' and 'Reset' buttons. The bottom of the interface shows the copyright notice: 'Copyright © 2007, Juniper Networks, Inc. All Rights Reserved. Trademark Notice. Privacy.' and the Juniper logo.

2. In the MAC Address box, enter a MAC address that specifies the equipment registrations that you want to display.

Use the format:

**xx:xx:xx:xx:xx:xx**

3. Select an output style from the Style list.
4. In the Maximum Results box, enter the maximum number of results that you want to receive.
5. Click **OK**.

The Equipment pane displays information about the equipment registrations.

## Viewing Information About Threads

To view information about the threads and their priority on the SAE:

- Select **SAE** from the side pane, and click **Threads**.

The Threads pane displays information about threads.

The screenshot shows the SAE monitoring interface. The left sidebar lists various components, with 'SAE' selected. The main area displays the 'Threads' section. It shows two thread groups: 'system' and 'main'. Each group has a table of active threads with columns for Thread name, Priority, and Daemon thread.

Thread Group		
Thread group name	system	
Active threads	130	
Active groups	12	
Max priority	10	
Thread name	Priority	Daemon thread
Reference Handler	10	true
Finalizer	8	true
Signal Dispatcher	9	true

Thread Group		
Thread group name	main	
Active threads	127	
Active groups	11	
Max priority	10	
Thread name	Priority	Daemon thread
main	5	false
Timer-0	5	true
DESConnectionTester	5	true
Timer-1	5	true
Thread-3	5	true
DispatcherThread {idle}	5	true
Timer-2	5	true
Thread-6	5	true

## Viewing Information About Subscriber Sessions with the C-Web Interface

You can list subscriber sessions by the distinguished name (DN) of the subscriber entry in the directory, by login name, or by session ID. You can also list subscriber sessions by IP address for Dynamic Host Configuration Protocol (DHCP) subscribers, authenticated Point-to-Point Protocol (PPP) subscribers, and static IP subscribers who are being managed by the SAE.

## Viewing Information About Subscriber Sessions by DN

To view information about subscriber sessions by DN:

1. Select **SAE** from the side pane, click **Subscribers**, and then click **DN**.

The DN pane appears.

Monitor Logged in as: admin About Refresh Logout

SAE > Subscribers > DN

ACP CLI Component Date Disk Interfaces... JPS NHC NTP Redirect Server Route... SAE Security System

SAE DN

Maximum Results  Number of results to be displayed.  
Legal range: 1 .. INF  
Default value: 25

Secret ☐ Display subscriber sessions and service sessions for hidden services.

Style  Output style  
Choices:  
brief: Display only subscriber sessions  
terse: Display subscriber session ID, login name, and IP address

Subscriber DN  DN of the subscribers.  
Please enter: All or part of the subscriber DN

OK Reset

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2. In the Maximum Results box, enter the maximum number of results that you want to receive.
3. Select the **Secret** check box to set a flag indicating that subscriptions and service sessions from hidden services are displayed.
4. Select an output style from the Style list.
5. In the Subscriber DN box, enter a full or partial subscriber DN for which you want to display information, or leave the box blank to display all subscriber sessions.
6. Click **OK**.

The DN pane displays information about subscriber sessions.

## Viewing Information About Subscribers by IP Address

To view information about subscriber sessions by IP address:

1. Select **SAE** from the side pane, click **Subscribers**, and then click **IP**.

The IP pane appears.

Monitor Logged in as: admin About Refresh Logout

SAE > Subscribers > IP

Maximum Results	<input type="text"/>	Number of results to be displayed. <i>Legal range:</i> 1 .. INF <i>Default value:</i> 25
Secret	<input type="checkbox"/>	Display subscriber sessions and service sessions for hidden services.
Style	<input type="text"/>	Output style <i>Choices:</i> brief: Display only subscriber sessions terse: Display subscriber session ID, login name, and IP address
IP Address	<input type="text"/>	IP address of subscriber sessions. <i>Please enter:</i> All or part of the subscriber IP address

OK Reset

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2. In the Maximum Results box, enter the maximum number of results that you want to receive.
3. Select the **Secret** check box to set a flag indicating that subscriptions and service sessions from hidden services are displayed.
4. Select an output style from the Style list.
5. In the IP Address box, enter a full or partial IP address for which you want to display information, or leave the box blank to display all subscriber sessions.
6. Click **OK**.

The IP pane displays information about subscriber sessions.

## Viewing Information About Subscriber Sessions by Login Name

To view information about subscriber sessions by login name:

1. Select **SAE** from the side pane, click **Subscribers**, and then click **Login Name**.

The Login Name pane appears.

Monitor Logged in as: admin About Refresh Logout

SAE > Subscribers > Login Name

**SAE**

Login Name

Maximum Results	<input type="text"/>	Number of results to be displayed. <i>Legal range:</i> 1 .. INF <i>Default value:</i> 25
Secret	<input type="checkbox"/>	Display subscriber sessions and service sessions for hidden services.
Style	<input type="text"/>	Output style <i>Choices:</i> brief: Display only subscriber sessions terse: Display subscriber session ID, login name, and IP address
Login Name	<input type="text"/>	Login name of subscriber sessions. <i>Please enter:</i> All or part of the subscriber login name

OK Reset

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2. In the Maximum Results box, enter the maximum number of results that you want to receive.
3. Select the **Secret** check box to set a flag indicating that subscriptions and service sessions from hidden services are displayed.
4. Select an output style from the Style list.
5. In the Login Name box, enter a full or partial login name for which you want to display information, or leave the box blank to display all subscriber sessions.
6. Click **OK**.

The Login Name pane displays information about subscriber sessions.

## Viewing Information About Subscriber Sessions by Service Name

To view information about subscriber sessions by service name:

1. Select **SAE** from the side pane, click **Subscribers**, and then click **Service Name**.

The Service Name pane appears.

The screenshot shows the SAE configuration interface. On the left is a sidebar with a tree view containing: Monitor, ACP, CLI, Component, Date, Disk, Interfaces..., JPS, NHC, NTP, Redirect Server, Route..., SAE (highlighted), Security, and System. The main area is titled 'SAE' and contains a 'Service Name' section. This section includes:
 

- A 'Maximum Results' text input field with a help tooltip: 'Number of results to be displayed. Legal range: 1 .. INF. Default value: 25'.
- A 'Secret' checkbox with a help tooltip: 'Display subscriber sessions and service sessions for hidden services.'
- A 'Style' dropdown menu with a help tooltip: 'Output style. Choices: brief: Display only subscriber sessions; terse: Display subscriber session ID, login name, and IP address'.
- A 'Service Name' text input field with a help tooltip: 'Service name of subscriber sessions. Please enter: All or part of the service name'.
- 'OK' and 'Reset' buttons at the bottom of the section.

 The top of the interface shows 'Logged in as: admin' and links for 'About', 'Refresh', and 'Logout'. A breadcrumb trail at the top right reads 'SAE > Subscribers > Service Name'. The footer contains copyright information for Juniper Networks, Inc. (2007) and the Juniper logo.

2. In the Maximum Results box, enter the maximum number of results that you want to receive.
3. Select the **Secret** check box to set a flag indicating that subscriptions and service sessions from hidden services are displayed.
4. Select an output style from the Style list.
5. In the Service Name box, enter a full or partial service name for which you want to display information, or leave the box blank to display all subscriber sessions.
6. Click **OK**.

The Service Name pane displays information about subscriber sessions.

## Viewing Information About Subscriber Sessions by Session ID

To view information about subscriber sessions by session ID:

1. Select **SAE** from the side pane, click **Subscribers**, and then click **Session ID**.

The Session ID pane appears.

The screenshot shows the Juniper C-Web Interface. On the left is a sidebar with a 'Monitor' tab and a list of components: ACP, CLI, Component, Date, Disk, Interfaces..., JPS, NIC, NTP, Redirect Server, Route..., **SAE** (highlighted), Security, and System. The main content area is titled 'SAE' and 'Session ID'. It contains four configuration sections:

- Maximum Results:** A text input box. Description: 'Number of results to be displayed. Legal range: 1 .. INF. Default value: 25'.
- Secret:** A checkbox. Description: 'Display subscriber sessions and service sessions for hidden services.'
- Style:** A dropdown menu. Description: 'Output style. Choices: brief: Display only subscriber sessions; terse: Display subscriber session ID, login name, and IP address'.
- Session ID:** A text input box. Description: 'ID of subscriber sessions. Please enter: All or part of the subscriber session ID'.

At the bottom of these sections are 'OK' and 'Reset' buttons. The footer of the interface shows 'Copyright © 2007, Juniper Networks, Inc. All Rights Reserved. Trademark Notice. Privacy.' and the Juniper logo.

2. In the Maximum Results box, enter the maximum number of results that you want to receive.
3. Select the **Secret** check box to set a flag indicating that subscriptions and service sessions from hidden services are displayed.
4. Select an output style from the Style list.
5. In the Session ID box, enter a full or partial session ID name for which you want to display information, or leave the box blank to display all subscriber sessions.
6. Click **OK**.

The Session ID pane displays information about subscriber sessions.

## Viewing SNMP Information with the C-Web Interface

You can use the C-Web interface to view SNMP statistics for the SAE configuration of:

- Directory
- Licenses
- Policies

- Server processes
- RADIUS
- Devices
- Subscriber sessions and service sessions

## Viewing SNMP Statistics for the Directory

To view SNMP statistics for the directory:

- Select **SAE** from the side pane, click **Statistics**, and then click **Directory**.

The Directory pane displays statistics for the directory.

The screenshot shows the Juniper C-Web Interface. The top navigation bar includes 'Monitor', 'Logged in as: admin', and links for 'About', 'Refresh', and 'Logout'. The left sidebar lists various components: ACP, CLI, Component, Date, Disk, Interfaces..., JPS, MIC, NTP, Redirect Server, Route..., SAE (highlighted), Security, and System. The main content area displays the 'SAE' section with a 'Directory' sub-section. Under 'SNMP Statistics', a table shows the following data:

Services read	51
Services written	0
Subscriptions read	0
Subscriptions written	0
Users read	0
Users written	0

The bottom of the interface features a footer with copyright information: 'Copyright © 2007, Juniper Networks, Inc. All Rights Reserved. Trademark Notice. Privacy.' and the Juniper logo with the tagline 'Juniper your Net.'



## Viewing SNMP Statistics for Directory Connections

To view SNMP statistics for directory connections:

1. Select **SAE** from the side pane, click **Statistics**, click **Directory**, and then click **Connections**.

The Connections pane appears.

Monitor Logged in as: admin About Refresh Logout

SAE > Statistics > Directory > Connections

**SAE**

Connections

Connection ID  Directory connection ID.  
Please enter: All or part of the connection ID

Style  Output style  
Choices:  
brief: Display only directory connection IDs

OK Reset

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2. In the Connection ID box, enter a full or partial connection ID for which you want to display information, or leave the box blank to display all SNMP statistics for all directory connections.
3. Select an output style from the Style list.
4. Click **OK**.

The Connections pane displays statistics for directory connections.

## Viewing SNMP Statistics for Client Licenses

To view SNMP statistics for client licenses:

- Select **SAE** from the side pane, click **Statistics**, click **License**, and then click **Client**.

The Client pane displays statistics for client licenses.

The screenshot shows the Juniper C-Web Interface. The top navigation bar includes 'Monitor', 'Logged in as: admin', and links for 'About', 'Refresh', and 'Logout'. The left sidebar lists various components: ACP, Component, Date, Disk, Iptables..., JPS, NIC, NTP, Redirect Server, SAE (highlighted), Security, and System. The main content area displays 'SAE Client' and 'SNMP Statistics'.

Application ID	1
Application type	1
Last request time	Tue Jan 09 15:00:28 EST 2007
Lease expire time	Tue Jan 16 11:31:01 EST 2007
Licenses	50
Number of request denied	0
Number of requests	9
Server	10.227.7.169
Status	Reachable

The footer contains copyright information: 'Copyright © 2007, Juniper Networks, Inc. All Rights Reserved. Trademark Notice. Privacy.' and the Juniper logo with the tagline 'Juniper your Net.'

## Viewing SNMP Statistics for Local Licenses

To view SNMP statistics for local licenses:

- Select **SAE** from the side pane, click **Statistics**, click **License**, and then click **Local**.

The Local pane displays statistics for local licenses.

The screenshot shows the Juniper C-Web Interface. On the left is a sidebar menu with items: Monitor, ACP, CLI, Component, Date, Disk, Interfaces..., JPS, NHC, NTP, Redirect Server, Route..., SAE (highlighted), Security, and System. The main content area has a header bar with 'Monitor' on the left, 'Logged in as: admin' in the center, and 'About', 'Refresh', and 'Logout' on the right. Below the header, the breadcrumb path is 'SAE > Statistics > License > Local'. The main content area is titled 'SAE Local' and contains a section 'Client License State' with a table:

Mode	Pilot
Number of licensed users	100
Number of current users	0
Expiry	2007-03-25

At the bottom of the page, there is a footer with copyright information: 'Copyright © 2007, Juniper Networks, Inc. All Rights Reserved. Trademark Notice. Privacy.' and the Juniper logo with the tagline 'Juniper your Net.'

## Viewing SNMP Statistics for Licenses by Device

To view SNMP statistics for licenses by device:

1. Select **SAE** from the side pane, click **Statistics**, click **License**, and then click **Device**.

The Device pane appears.

The screenshot shows the Juniper C-Web Interface. On the left is a sidebar with a menu including: Monitor, ACP, CLI, Component, Date, Disk, Interfaces..., JPS, HIC, NTP, Redirect Server, Route..., SAE (highlighted), Security, and System. The main content area is titled 'SAE' and 'Device'. It contains a form with a 'Device Name' text box, a 'Style' dropdown menu, and 'OK' and 'Reset' buttons. To the right of the form, there is explanatory text: 'Name of a device. Please enter: All or part of the device name. For JUNOS router drivers and PCMM drivers, use the format default@routerName.' Below this, it says 'Output style Choices: brief: Display only device names'. At the top right of the interface, it says 'Logged in as: admin' with links for 'About', 'Refresh', and 'Logout'. At the bottom, there is a copyright notice for Juniper Networks, Inc. and the Juniper logo.

2. In the Device Name box, enter a full or partial device name for which you want to display information, or leave the box blank to display SNMP statistics for all devices.

For JUNOSe router drivers, use the format:

**<virtual router name>@<router name>**

For JUNOS router drivers and PCMM drivers, use the format:

**default@<router name>**

3. Select an output style from the Style list.
4. Click **OK**.

The Device pane displays statistics for virtual router licenses.

## Viewing SNMP Statistics About Policies

To view SNMP statistics about policies:

- Select **SAE** from the side pane, click **Statistics**, and then click **Policy Management**.

The Policy Management pane displays statistics for policies.

The screenshot shows the Juniper C-Web Interface. The top navigation bar includes 'Monitor', 'Logged in as: admin', and links for 'About', 'Refresh', and 'Logout'. The left sidebar lists various components: ACP, CLI, Component, Date, Disk, Interfaces..., JPS, NHC, NTP, Redirect Server, Route..., SAE (highlighted), Security, and System. The main content area is titled 'SAE Policy Management' and displays 'SNMP Statistics' in a table.

SNMP Statistics	
Average time for processing interface classifier modification	0
Average time for processing policy group modification	0
Current total number of policy groups loaded	69
Total number of default policy decisions	0
Total number of errors	0
Total number of interface classifier modifications	0
Total number of policy group modifications	0
Total number of service policy decisions	0
Up time	94686 seconds since Thu Mar 08 09:16:17 EST 2007

The bottom of the interface shows the copyright notice: 'Copyright © 2007, Juniper Networks, Inc. All Rights Reserved. Trademark Notice. Privacy.' and the Juniper logo.

## Viewing SNMP Statistics About Server Processes

To view SNMP statistics about server processes:

- Select **SAE** from the side pane, click **Statistics**, and then click **Process**.

The Process pane displays statistics for server processes.

The screenshot shows the Juniper C-Web Interface. On the left is a sidebar with a 'Monitor' section containing a list of components: ACP, CLI, Component, Date, Disk, Interfaces..., JPS, NIC, NTP, Redirect Server, Route..., **SAE** (highlighted in orange), Security, and System. The main content area is titled 'SAE Process' and displays 'SNMP Statistics' in a table format:

Heap in use	19434 kilo bytes (2%)
Heap limit	910016 kilo bytes
Threads	127
Up time	94797 seconds since Thu Mar 08 09:15:55 EST 2007

At the top right of the interface, it says 'Logged in as: admin' and has links for 'About', 'Refresh', and 'Logout'. Below the table, there is a breadcrumb trail: 'SAE > Statistics > Process'. The footer contains copyright information: 'Copyright © 2007, Juniper Networks, Inc. All Rights Reserved. Trademark Notice. Privacy.' and the Juniper logo with the tagline 'Juniper your Net.'

## Viewing SNMP Statistics About RADIUS

To view SNMP statistics about RADIUS:

- Select **SAE** from the side pane, click **Statistics**, and then click **RADIUS**.

The RADIUS pane displays statistics for RADIUS.

The screenshot shows the Juniper C-Web Interface. On the left is a sidebar menu with items: Monitor, ACP, CLI, Component, Date, Disk, Interfaces..., JPS, NHC, NTP, Redirect Server, Route..., SAE (highlighted), Security, and System. The main content area is titled 'SAE RADIUS' and shows 'SNMP Statistics'. It contains a table with three rows of data. At the top right of the main area, it says 'Logged in as: admin' and has links for 'About', 'Refresh', and 'Logout'. A breadcrumb trail at the top right reads 'SAE > Statistics > RADIUS'. The footer contains copyright information for Juniper Networks, Inc. and the Juniper logo.

SNMP Statistics	
Accounting ACKs from unrecognized IP	0
Authentication ACKs from unrecognized IP	0
Radius client ID	SAE.buffy

## Viewing SNMP Statistics About RADIUS Clients

To view SNMP statistics about RADIUS clients:

1. Select **SAE** from the side pane, click **Statistics**, click **RADIUS**, and then click **Client**.

The Client pane appears.

The screenshot shows the Juniper SAE web interface. On the left is a navigation pane with a tree view containing items like ACP, CLI, Component, Date, Disk, Interfaces..., JPS, NIC, NTP, Redirect Server, Route..., SAE (highlighted), Security, and System. The main content area is titled 'Client' and contains a form. The form has four rows of input fields: 'Client Type' with a dropdown menu showing 'accounting', 'IP Address' with a text box, 'UDP Port' with a text box, and 'Style' with a dropdown menu. To the right of each input field is a descriptive text and a list of choices. For 'Client Type', the choices are 'accounting: Display RADIUS accounting client information' and 'authentication: Display RADIUS authentication client information'. For 'IP Address', the choice is 'All or part of the client IP address'. For 'UDP Port', the choice is 'All or part of the client port number'. For 'Style', the choice is 'brief: Display only clients accessible by IP address/port number'. Below the form are 'OK' and 'Reset' buttons. At the top of the main area, there is a breadcrumb trail: 'SAE > Statistics > RADIUS > Client'. The top of the interface also shows 'Monitor', 'Logged in as: admin', and links for 'About', 'Refresh', and 'Logout'. The footer contains copyright information and the Juniper logo.

2. Select a client type from the Client Type list:
  - accounting—Displays RADIUS accounting information
  - authentication—Displays RADIUS client authentication information
3. In the IP Address box, enter the client IP address to display SNMP information for a specific RADIUS client, or leave the box blank to display SNMP information for all RADIUS clients.
4. In the UDP Port box, enter a port number to display SNMP information for a specific RADIUS client, or leave the box blank to display SNMP information for all RADIUS clients.
5. Select an output style from the Style list.
6. Click **OK**.

The Client pane displays statistics for RADIUS clients.



## Viewing SNMP Statistics for Devices

To view SNMP statistics about devices:

1. Select **SAE** from the side pane, click **Statistics**, and then click **Device**.

The Device pane appears.

The screenshot shows the Juniper C-Web Interface. The top navigation bar includes 'Monitor', 'Logged in as: admin', and links for 'About', 'Refresh', and 'Logout'. The left sidebar lists various components: ACP, CLI, Component, Date, Disk, Interfaces..., JPS, NIC, NTP, Redirect Server, Route..., SAE (highlighted), Security, and System. The main content area is titled 'SAE' and 'Device'. It contains a 'Device Name' text box with a placeholder, a 'Style' dropdown menu, and 'OK' and 'Reset' buttons. To the right of the 'Device Name' box is a tooltip that reads: 'Name of a device. Please enter: All or part of the device name. For JUNOS router drivers and PCMM drivers, use the format default@routerName.' Below the 'Style' dropdown is a tooltip that reads: 'Output style Choices: brief: Display only device names'. The bottom of the interface shows the copyright notice 'Copyright © 2007, Juniper Networks, Inc. All Rights Reserved. Trademark Notice. Privacy.' and the Juniper logo.

2. In the Device Name box, enter a full or partial device name for which you want to display information, or leave the box blank to display all devices.
3. Select an output style from the Style list.
4. Click **OK**.

The Device pane displays statistics for all devices.

## Viewing SNMP Statistics for Specific Devices

To view SNMP statistics about specific devices:

1. Select **SAE** from the side pane, click **Statistics**, click **Device**, and then click **Common**.

The Common pane appears.

The screenshot shows the Juniper SAE web interface. The left sidebar contains a menu with items: ACP, CLI, Component, Date, Disk, Interfaces..., JPS, NIC, NTP, Redirect Server, Route..., SAE (highlighted), Security, and System. The main content area is titled 'Common' and contains a form with two input fields: 'Device Name' and 'Type'. The 'Device Name' field has a text input box. The 'Type' field has a dropdown menu. To the right of these fields is a text area providing instructions: 'Name of a device. Please enter: All or part of the device name. For JUNOS router drivers and PCMM drivers, use the format default@routerName.' Below this is a section titled 'Choices:' with a list of options: 'junos: Display SNMP statistics for JUNOS router drivers', 'junose-cops: Display SNMP statistics for JUNOSe router drivers', 'packetcable-cops: Display SNMP statistics for PCMM device drivers', and 'proxy: Display SNMP statistics for third-party drivers'. At the bottom of the form are 'OK' and 'Reset' buttons. The top of the interface shows 'Monitor' and 'Logged in as: admin'. The bottom of the interface shows the Juniper logo and copyright information.

2. In the Device Name box, enter a full or partial device name for which you want to display information, or leave the box blank to display all devices.
3. Select a device type from the Type list:
  - junos—Displays SNMP statistics for JUNOS router drivers
  - junose-cops—Displays SNMP statistics for JUNOSe router drivers
  - packetcable-COPS—Displays SNMP statistics for PCMM device drivers
  - proxy—Displays SNMP statistics for third-party drivers
4. Click **OK**.

The Common pane displays statistics for the specified device.

## Viewing SNMP Statistics for Subscriber Sessions and Service Sessions

To view SNMP statistics about subscriber sessions and service sessions:

- Select **SAE** from the side pane, click **Statistics**, and then click **Sessions**.

The Sessions pane displays statistics for subscriber sessions and service sessions.

The screenshot shows the Juniper C-Web Interface. On the left is a navigation pane with a 'Monitor' section containing links to ACP, CLI, Component, Date, Disk, Interfaces..., JPS, NIC, NTP, Redirect Server, Route..., SAE (highlighted), Security, and System. The main content area is titled 'SAE Sessions' and displays 'SNMP Statistics' in a table. The table lists various session metrics and their current values, all of which are 0. At the top right of the main area, there are links for 'About', 'Refresh', and 'Logout', and a breadcrumb trail 'SAE > Statistics > Sessions'. The footer contains copyright information for Juniper Networks, Inc. (2007) and the Juniper logo with the tagline 'Your Net.'

SNMP Statistics	
Current service sessions	0
Current user sessions	0
Logins (includes sync. and static IP portal logins)	0
Logouts	0
Service session idle timeouts	0
Service sessions started	0
Service sessions stopped	0
Service session timeouts	0

