JUNIPER NETWORKS

SRC PE Software

CLI Command Reference, Volume 2

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Release 4.1.x
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The information in this document is current as of the date listed in the revision history.

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SRC Documentation and Release Notes

For a list of related SRC documentation, see http://www.juniper.net/techpubs/.

If the information in the latest *SRC Release Notes* differs from the information in the SRC guides, follow the *SRC Release Notes*.

Audience

This documentation is intended for experienced system and network specialists working with routers running Junos OS and JunosE software in an Internet access environment. We assume that readers know how to use the routers, directories, and RADIUS servers that they will deploy in their SRC networks. If you are using the SRC software in a cable network environment, we assume that you are familiar with the PacketCable Multimedia Specification (PCMM) as defined by Cable Television Laboratories, Inc. (CableLabs) and with the Data-over-Cable Service Interface Specifications (DOCSIS) 1.1 protocol. We also assume that you are familiar with operating a multiple service operator (MSO) multimedia-managed IP network.

Documentation Conventions

Table 1 on page viii defines the notice icons used in this guide. Table 2 on page viii defines text conventions used throughout this documentation.

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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.

Table 2: Text Conventions

Convention	Description	Examples
Bold text like this	• Represents keywords, scripts, and tools in text. • Represents a GUI element that the user selects, clicks, checks, or clears.	• Specify the keyword **exp-msg**. • Run the **install.sh** script. • Use the **pkgadd** tool. • To cancel the configuration, click **Cancel**.
Bold text like this	Represents text that the user must type.	**user@host# set cache-entry-age *cache-entry-age***

`Fixed-width text like this`	Represents information as displayed on your terminal's screen, such as CLI commands in output displays.	`nic-locators {`
		`  login {`
		`  resolution {`
		`  resolver-name /realms/`
		`  login/A1;`
		`  key-type LoginName;`
		`  value-type SaeId;`
		`  }`

Regular sans serif typeface	• Represents configuration statements. • Indicates SRC CLI commands and options in text. • Represents examples in procedures. • Represents URLs.	• **system ldap server{ stand-alone;** • Use the **request sae modify device failover** command with the **force** option • **user@host# . . .** • **http://www.juniper.net/techpubs/software/management/src/api-index.html**
Italic sans serif typeface	Represents variables in SRC CLI commands.	user@host# set local-address ***local-address***
Angle brackets	In text descriptions, indicate optional keywords or variables.	Another runtime variable is <gfwif>.
Key name	Indicates the name of a key on the keyboard.	Press Enter.

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Table 2: Text Conventions *(continued)*

Key names linked with a plus sign (+)	Indicates that you must press two or more keys simultaneously.	Press Ctrl + b.
Italic typeface	• Emphasizes words. • Identifies book names. • Identifies distinguished names. • Identifies files, directories, and paths in text but not in command examples.	• There are two levels of access: *user* and *privileged*. • *SRC PE Getting Started Guide* • *o=Users, o=UMC* • The */etc/default.properties* file.
Backslash	At the end of a line, indicates that the text wraps to the next line.	Plugin.radiusAcct-1.class=\ net.juniper.smgt.sae.plugin\ RadiusTrackingPluginEvent
Words separated by the | symbol	Represent a choice to select one keyword or variable to the left or right of this symbol. (The keyword or variable may be either optional or required.)	diagnostic | line

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- Document or topic name
- URL or page number
- Software release version (if applicable)

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- JTAC policies—For a complete understanding of our JTAC procedures and policies, review the *JTAC User Guide* located at http://www.juniper.net/us/en/local/pdf/resource-guides/7100059-en.pdf .
- Product warranties—For product warranty information, visit http://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.

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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: http://www.juniper.net/customers/support/
- Search for known bugs: http://www2.juniper.net/kb/
- Find product documentation: http://www.juniper.net/techpubs/
- Find solutions and answer questions using our Knowledge Base: http://kb.juniper.net/
- Download the latest versions of software and review release notes: http://www.juniper.net/customers/csc/software/
- Search technical bulletins for relevant hardware and software notifications: https://www.juniper.net/alerts/
- Join and participate in the Juniper Networks Community Forum: http://www.juniper.net/company/communities/
- Open a case online in the CSC Case Management tool: http://www.juniper.net/cm/

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

Opening a Case with JTAC

You can open a case with JTAC on the Web or by telephone.

- Use the Case Management tool in the CSC at http://www.juniper.net/cm/ .
- 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 http://www.juniper.net/support/requesting-support.html .

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SRC CLI

This document summarizes the SRC command-line interface (SRC CLI).

Configuration statements and operational commands are listed in alphabetical order for the following components in the *SRC PE CLI Command Reference, Volume 1*:

- CLI and System
- Juniper Networks Database
- SAE
- Network Information Collector (NIC)
- Session State Registrar (SSR)
- Subscriber Information Collector (SIC)
- SNMP Agent
- SRC Admission Control Plug-In (SRC ACP)
- SRC License Management
- COS Naming Service

Configuration statements and operational commands are listed in alphabetical order for the following components in the *SRC PE CLI Command Reference, Volume 2*:

- Service CLI
- Policy CLI
- Subscriber CLI
- Redirect Server
- External Subscriber Monitor
- Dynamic Service Activator
- IP Multimedia Subsystem (IMS)
- Diameter Application
- Juniper Policy Server (JPS)

Service CLI

The following table summarizes the SRC command-line interface (SRC CLI) for configuring services. Configuration statements are listed in alphabetical order.

Service CLI Configuration Statements
services global mutex-group
services global schedule
services global schedule name event
services global schedule name event name action
services global schedule name event name action name attribute
services global schedule name event name except
services global schedule name event name except name from
services global schedule name event name except name to
services global schedule name event name from
services global schedule name event name to
services global service
services global service name admission-control
services global service name admission-control congestion-point-classification
services global service name aggregate fragment
services global service name parameter
services global service name script
services scope
services scope name mutex-group
services scope name schedule
services scope name schedule name event
services scope name schedule name event name action

services scope name schedule name event name action name attribute
services scope name schedule name event name except
services scope name schedule name event name except name from
services scope name schedule name event name except name to
services scope name schedule name event name from
services scope name schedule name event name to
services scope name service
services scope name service name admission-control
services scope name service name admission-control congestion-point-classification
services scope name service name aggregate fragment
services scope name service name parameter
services scope name service name script

services global mutex-group

Syntax

```
services global mutex-group name {
     auto-deactivate (yes | no);
     description description;
     services [services...];
}
```

Hierarchy Level

```
[edit services global mutex-group]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a mutex group. A mutex group is a collection of services that are mutually exclusive—services that the SAE cannot simultaneous activate for a particular subscriber.

Options

`name` *`name`*— Name of the mutex group.

Value— Text

`auto-deactivate (yes | no)`— Specify whether to allow activation of a service if another service is already active.

Value

- `yes`— For any one subscriber, the SAE deactivates a service in the group before activating another service in the group.
- `no`— The SAE refuses access to a requested service if the subscriber is already using another service in this group.

Default— Yes
Editing Level—Basic

`description` *`description`*—(Optional) Description of the mutex group.

Value— Text
Default— No value
Editing Level—Basic

`services [`*`services...`*`]`—(Optional) List of services in the mutex group.

Value— List of services
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services global schedule

Syntax

```
services global schedule name {
     description description;
}
```

Hierarchy Level

```
[edit services global schedule]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service schedule.

Options

`name` *`name`*— Name of service schedule.

Value—Text

`description` *`description`*—(Optional) Description of the service schedule.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services global schedule *name* event

Syntax

```
services global schedule name event name ...
```

Hierarchy Level

```
[edit services global schedule name event]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a scheduling event.

Options

name *name*— Name of the scheduling event.

Value—Text

Required Privilege Level

service

Required Editing Level

Basic

services global schedule *name* event *name* action

Syntax

```
services global schedule name event name action name {
     type (activate | deactivate | deny | deny-deactivate);
     service service;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit services global schedule name event name action]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure actions to perform for the scheduled event.

Options

`name` *`name`*— Arbitrary identifier for action.

Value—Text

`type (activate | deactivate | deny | deny-deactivate)`— Type of action.

Value

- `activate`— Activate service at the time specified in the entry schedule.
- `deactivate`— Deactivate service at the time specified in the entry schedule.
- `deny`— Deny new activation requests during the time specified in the entry schedule; current sessions are not affected. This value applies only to services that have an authorization plug-in configured.
- `deny-deactivate`— Deny new activation requests during the time specified in the entry schedule; current sessions are deactivated at the specified time. This value applies only to services that have an authorization plug-in configured.

Default— No value
Editing Level—Basic

`service` *`service`*— Name of service affected by this action.

Value—Text
Default— No value
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Substitutions to be used when activating the service. Substitutions apply only to service activations.

Value— An entry in valid substitution format. See the *SRC PE Services and Policies Guide*.
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services global schedule *name* event *name* action *name* attribute

Syntax

```
services global schedule name event name action name attribute (sessionName |
sessionTag | sessionTimeout | downStreamBandwidth | upStreamBandwidth) {
     value;
}
```

Hierarchy Level

```
[edit services global schedule name event name action name attribute]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure subscription attributes. Subscription attributes apply only to service activations.

Options

Subscription attributes.

Value

- `sessionName`— Name of the service session.
- `sessionTag`— Tag that can be used for accounting purposes.
- `sessionTimeout`— Session timeout to be used when the service is activated. The service session is deactivated when this timeout expires.
- `downStreamBandwidth`— Attribute used by SRC Admission Control Plug-In (SRC ACP) to specify the rate of traffic between the network and the subscriber.
- `upStreamBandwidth`— Attribute used by SRC ACP to specify the rate of traffic between the subscriber and the network.

value— Value of the specified subscription attribute.

Value— Depends on the specified subscription attribute
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services global schedule *name* event *name* except

Syntax

```
services global schedule name event name except name ...
```

Hierarchy Level

```
[edit services global schedule name event name except]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure an exclusion for the event.

Options

`name` *name*— Arbitrary identifier for exclusion rule.

Value—Text

Required Privilege Level

service

Required Editing Level

Basic

services global schedule *name* event *name* except *name* from

Syntax

```
services global schedule name event name except name from {
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit services global schedule name event name except name from]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the start time of the exclusion. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services global schedule *name* event *name* except *name* to

Syntax

```
services global schedule name event name except name to {
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit services global schedule name event name except name to]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the end time of the exclusion. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

These values apply only to services that have an authorization plug-in configured. If an authorization plug-in is not configured for the service associated with the schedule, these values are ignored.

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services global schedule *name* event *name* from

Syntax

```
services global schedule name event name from {
     effective effective;
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit services global schedule name event name from]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the start time for the event. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

`effective` *`effective`*—(Optional) Interval after the associated `from` or `to` time during which the scheduled action can be initiated by a subscriber who is logging in to a subscriber session.

Value— Number of minutes in the range 0–153722867280912
Default— *
Editing Level—Basic

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event

or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *

Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services global schedule *name* event *name* to

Syntax

```
services global schedule name event name to {
     effective effective;
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit services global schedule name event name to]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the end time for the event. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

These values apply only to services that have an authorization plug-in configured. If an authorization plug-in is not configured for the service associated with the schedule, these values are ignored.

`effective` *`effective`*—(Optional) Interval after the associated `from` or `to` time during which the scheduled action can be initiated by a subscriber who is logging in to a subscriber session.

Value— Number of minutes in the range 0–153722867280912
Default— *
Editing Level—Basic

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services global service

Syntax

```
services global service name {
     description description;
     type (normal | aggregate | script | infrastructure);
     category category;
     url url;
     policy-group policy-group;
     authentication-required;
     authorization-plug-in [authorization-plug-in...];
     tracking-plug-in [tracking-plug-in...];
     session-timeout session-timeout;
     idle-timeout idle-timeout;
     idle-timeout-input idle-timeout-input;
     idle-timeout-output idle-timeout-output;
     accounting-interim-interval accounting-interim-interval;
     radius-class radius-class;
     status (inactive | active);
     activate-only;
     permanent;
     available;
     secret;
     shared-service-name shared-service-name;
}
```

Hierarchy Level

```
[edit services global service]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service.

Options

name *name*— Name of the service.

Value— Text

`description` *`description`*—(Optional) Description of the service.

Value— Text
Default— No value
Editing Level—Basic

`type (normal | aggregate | script | infrastructure)`— Type of service.

Value

- `normal`— Individual service that a subscriber activates and deactivates. A normal service provisions a set of policies when activated.
- `aggregate`— Group of services that a subscriber activates and deactivates as a unit. An aggregate service contains other services (called fragments) that are managed by the aggregate service. The aggregate service is responsible for activating, deactivating, and monitoring the fragments.
- `script`— Service into which you insert or reference a script. You can use the script to manage third-party devices, provision layer 2 devices, such as DSLAMs, or set up network connections such as MPLS tunnels.
- `infrastructure`— Service that can be provisioned only once and then activated a number of times across network devices.

Default— Normal
Editing Level—Basic

`category` *`category`*—(Optional) The service category is not used by SRC directly. You can use it, for example, to group related services in an SRC application such as a portal. For example, in the residential portal, it is the text that appears in the set of tabs that categorize services.

Value— Text
Default— No value
Editing Level—Basic

`url` *`url`*—(Optional) The service URL is not used by SRC directly. You can use it in applications such as a portal to provide a link to a service provider or to the Web page that a subscriber sees after activating a service.

Value— URL
Default— No value
Editing Level—Basic

`policy-group` *`policy-group`*—(Optional) Policy group that is applied when the service is

activated. The policy engine does not allow the activation of a normal service without an associated policy group.

Value— Policy group
Default— No value
Editing Level—Basic

`authentication-required`—(Optional) Determines whether activation of the service requires authentication with a username and password that are specific to this service. The service authentication-required flag is not used by the SRC software directly. You can use it, for example, to request a name and password when the service is activated by an SRC application such as a portal.

Default— Disabled
Editing Level—Basic

`authorization-plug-in [`*`authorization-plug-in`*`...]`—(Optional) Name of the plug-ins that authorize this service. The authorization plug-ins are called when the service is activated.

Value— Single authorization plug-in or a list of authorization plug-ins.
Default— No value
Editing Level—Basic

`tracking-plug-in [`*`tracking-plug-in`*`...]`—(Optional) Name of the plug-ins that track this service. The tracking plug-ins are called when a service is activated and deactivated, as well as for interim updates.

Value— Single tracking plug-in or a list of tracking plug-ins.
Default— No value
Editing Level—Basic

`session-timeout` *`session-timeout`*—(Optional) Time after which the service session is deactivated.

Changes to the session timeout take effect immediately if the new value is lower than the remaining time for a session or if you specify that no session timeout applies. Other changes apply only to services that are activated after you make the change.

The session timeout can also be controlled dynamically for each service session by a plug-in.

Value— Number of seconds in the range 0–2147483647
Default— No value
Editing Level—Basic

`idle-timeout` *`idle-timeout`*—(Optional) Idle time after which the SAE deactivates service. To decide whether a service is idle, the SAE collects accounting information for the service, which means that the service activation policy must specify an accounting rule. The idle timeout is the minimum time the service must be idle before it is deactivated. A service is considered idle if the volume accounting data does not change between interim updates. The actual deactivation time depends on the length of the accounting interval.

The idle timeout can also be dynamically updated per service session by an authorization plug-in.

Value— Number of seconds in the range 0–2147483647
Default— No value
Editing Level—Basic

`idle-timeout-input` *`idle-timeout-input`*—(Optional) Input idle time after which the SAE deactivates service. To decide whether a service is idle, the SAE collects accounting information for the service, which means that the service activation policy must specify an accounting rule. The input idle timeout is the minimum time the service must be idle before it is deactivated. A service is considered idle if the volume accounting data does not change between interim updates. The actual deactivation time depends on the length of the accounting interval.

The input idle timeout can also be dynamically updated per service session by an authorization plug-in.

Value— Number of seconds in the range 0–2147483647
Default— No value
Editing Level—Basic

`idle-timeout-output` *`idle-timeout-output`*—(Optional) Output idle time after which the SAE deactivates service. To decide whether a service is idle, the SAE collects accounting information for the service, which means that the service activation policy must specify an accounting rule. The input idle timeout is the minimum time the service must be idle before it is deactivated. A service is considered idle if the volume accounting data does not change between interim updates. The actual deactivation time depends on the length of the accounting interval.

The output idle timeout can also be dynamically updated per service session by an authorization plug-in.

Value— Number of seconds in the range 0–2147483647
Default— No value
Editing Level—Basic

`accounting-interim-interval` *`accounting-interim-interval`*—(Optional) Time between interim accounting messages for this service. The accounting interim interval can also be controlled dynamically for each service session by a plug-in.

Value— Number of seconds in the range 0–2147483647. Setting the value to 0 turns off interim accounting.
Default— No value
Editing Level—Basic

`radius-class` *`radius-class`*—(Optional) Default value used in the RADIUS class attribute in RADIUS accounting messages. If RADIUS authenticates the service session, the class attribute received in the RADIUS Access-Accept response from the server overrides this value. You can use this option to set the RADIUS attribute to 25.

The RADIUS class can also be dynamically for each service session by a plug-in.

Value— Text
Default— Name of the service
Editing Level—Basic

`status (inactive | active)`—(Optional) Status of the service.

Value

- `inactive`— Service does not accept new subscriptions.
- `active`— Service accepts new subscriptions.

Default— active
Editing Level—Basic

`activate-only`—(Optional) A service that is marked activate only cannot be directly deactivated. It can be deactivated indirectly through a mutex group or a session timeout.

Default— Disabled
Editing Level—Basic

`permanent`—(Optional) Specifies whether the SAE maintains permanent activation of this service for a subscriber. A service that is marked as permanent is automatically activated as soon as a subscriber subscribes to it.

Default— Disabled
Editing Level—Basic

`available`—(Optional) Specifies whether a subscriber can activate a service. To be activated, the service must be available in the currently selected scope.

Default— Enabled
Editing Level—Basic

`secret`—(Optional) Secret services are visible only to administrators who have permission to see secret information. You can use this flag to hide services from subscribers and unprivileged administrators.

Editing Level—Basic

`shared-service-name` *`shared-service-name`*—(Optional) For infrastructure services, the name of the service to be shared.

Value— Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services global service *name* admission-control

Syntax

```
services global service name admission-control {
     required-downstream-bandwidth required-downstream-bandwidth;
     required-upstream-bandwidth required-upstream-bandwidth;
     congestion-points [congestion-points...];
}
```

Hierarchy Level

```
[edit services global service name admission-control]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure upstream and downstream bandwidths for services that ACP manages.

Options

`required-downstream-bandwidth` *`required-downstream-bandwidth`*—(Optional) Downstream bandwidth to the subscriber required for the service.

Value— Number of bps
Default— No value
Editing Level—Basic

`required-upstream-bandwidth` *`required-upstream-bandwidth`*—(Optional) Upstream bandwidth from the subscriber required for the service.

Value— Number of bps
Default— No value
Editing Level—Basic

`congestion-points [`*`congestion-points`*`...]`—(Optional) Congestion points for this service.

Value— List of expressions
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services global service *name* admission-control congestion-point-classification

Syntax

```
services global service name admission-control congestion-point-classification {
     script script;
     expression [expression...];
}
```

Hierarchy Level

```
[edit services global service name admission-control congestion-point-
classification]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Congestion point classification for this service. It overrides expressions defined with congestion-points attribute.

Options

`script script`—(Optional) Congestion point classification script in python. Functions or variables defined in the script can be referred in congestion point classification expressions.

Value—Multi-line text
Editing Level—Basic

`expression [expression...]`— Congestion point classification expressions for this service.

Value— List of expressions
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services global service *name* aggregate fragment

Syntax

```
services global service name aggregate fragment name {
     expression expression;
     service service;
     mandatory;
     redundancy-group redundancy-group;
     subscription-required;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit services global service name aggregate fragment]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure service fragments for an aggregate service.

Options

`name` *`name`*— Name for service fragment. The fragment name is not stored and is re-created every time the object is read.

Value— Text

`expression` *`expression`*— Subscriber reference expression that identifies the remote subscriber session that will host the fragment. The remote subscriber session is an assigned IP subscriber. If the remote SAE manages the specified interface, the SAE creates an assigned IP subscriber session if necessary.

Value— Valid expressions are:

- current
- address = "A.B.C.D"
- vr = "vrName",interfaceName = "ifName"
- vr = "vrName",interfaceName = "ifName", address = "A.B.C.D"
- vr = "vrName",ifIndex = "1234"
- vr = "vrName",login_name = "user@domain"

- vr = "vrName",primary_user_name = "user@domain"
- dn = "uniqueId = ..."
- login_name = "user@domain"
- primary_user_name = "user@domain"
- ref = "rdn/rdn"

The rdn/rdn identifies the hierarchy of directory objects below the LDAP object *o = aggregateService*. The final object contains the attribute subscriberRefExpr to identify the subscriber session. A forward slash (/) separates the objects in the path.

You can also use a substitution or a Python expression that represents any of the literal values listed above. For a substitution or Python expression, type < - before the expression and type - > after it; for example, < -ifAlias- > . For a list and description of the fields that you can use to compose Python expressions, see *Managing Services for the SRC CLI* in the *SRC PE Services and Policies Guide*.

Examples of valid expressions are:

- current
- address = "10.10.10.1"
- vr = " < -substitution.serviceVr- > ",interfaceName = " < -substitution.serviceInterface- > "
- dn = "uniqueId = < -ifAlias- > , < -userDn- > "
- vr = < -["vr1","vr2"]- > ,loginName = < -["joe@abc","jane@abc"]- > .

When you include lists, fragment services are created for all combinations of values in the list. For example, vr = < -["vr1","vr2"]- > ,loginName = < -["joe@abc","jane@abc"]- > would cause four fragments to be created with the following expressions:

- vr = "vr1",loginName = "joe@abc"
- vr = "vr1",loginName = "jane@abc"
- vr = "vr2",loginName = "joe@abc"
- vr = "vr2",loginName = "jane@abc"

Default— No value
Editing Level—Basic

`service` *`service`*— Name of the service to be included in the aggregate service as a fragment service.

Value— Name of a service
Default— No value
Editing Level—Basic

`mandatory`—(Optional) Specifies whether the fragment service must be active for the

aggregate service to become active.

Default— Mandatory
Editing Level—Basic

`redundancy-group` *`redundancy-group`*—(Optional) Group name to be applied to each fragment service that is to be part of a redundancy group. The fragment services that have the same group name provide redundancy for each other.

Value— Text
Default— No value
Editing Level—Basic

`subscription-required`—(Optional) Specifies whether a remote subscriber session must be subscribed to the fragment service for it to become active.

Enabling subscription-required can be used to limit the services that can be activated as fragments. Enabling this option lets you control which services can be used as fragments. For example, for an aggregate service that supports VoIP to push a policy to the caller and the callee, you can require that both subscribers sign up for VoIP services. If you disable the option, only one party needs to subscribe to the aggregate service; the policy service sessions are created automatically.

Default— Disabled
Editing Level—Basic

`substitution [`*`substitution`*`...]`—(Optional) List of substitutions that are used as arguments for the fragment to become active. If a parameter does not acquire a value, the associated fragment service does not become active.

Value— One or more of the following:

- < parameter-name > —The parameter name is defined to have the same value in the fragment service session as in the aggregate service session.
- < parameter-name > = < substitution-expression > —The parameter name on the left side of the equals sign is defined for the fragment service session. This parameter name is the result of the evaluation of the expression (in the aggregate service session) on the right side of the equals sign.

Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services global service *name* parameter

Syntax

```
services global service name parameter {
     gateway-ip-address gateway-ip-address;
     service-ip-address service-ip-address;
     service-ip-mask service-ip-mask;
     service-port service-port;
     substitution [substitution...];
     session-volume-quota session-volume-quota;
}
```

Hierarchy Level

```
[edit services global service name parameter]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure parameter values for services. The policy engine substitutes parameters in policies associated with this service with the values that you specify in this parameter configuration.

Options

`gateway-ip-address` *`gateway-ip-address`*—(Optional) Actual IP address of the gateway router. This value is substituted for the policy global parameter called gateway_ipAddress.

Value— IP address
Default— No value
Editing Level—Basic

`service-ip-address` *`service-ip-address`*—(Optional) Actual IP address of the host(s) that provides the service. This value is substituted for the policy global parameter called service_ipAddress.

Value— IP address
Default— No value
Editing Level—Basic

`service-ip-mask` *`service-ip-mask`*—(Optional) Actual IP mask for the service. This value is substituted for the policy global parameter called service_ipMask.

Value— IP address
Default— No value
Editing Level—Basic

`service-port` *`service-port`*—(Optional) Actual port for the service. This value is substituted for the policy global parameter called service_port.

Value— TCP or UDP port number in the range 0–65535
Default— No value
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Actual values for other parameters. These values are substituted for the parameters that you specify.

Value— Substitution in the form < parameter name > = < value > . For example, bandwidth = 1000000.
Default— No value
Editing Level—Basic

`session-volume-quota` *`session-volume-quota`*—(Optional) Upstream and downstream volume quota for the service session.

The SAE does not directly use this value. It is used by applications that implement tracking plug-ins. The value of a service session can be defined at runtime either through an authorization plug-in or a call to the SAE API. If the Session Volume Quota attribute is defined in more than one place, which value is used depends on where the value is defined. The SRC software searches for the value in the following order:

1. Value set in a call to the SAE
2. Value set in an authorization plug-in
3. Value set in a service definition

Value— Volume quota in the format "downstream-quota:upstream-quota"

where

- Downstream quota is the number of bytes available for transmitting data from the network to the subscriber.
- Upstream quota is the number of bytes available for transmitting data from the subscriber to the network.

Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services global service *name* script

Syntax

```
services global service name script {
     script-type (url | python | java-class | java-archive);
     class-name class-name;
     file file;
     filename filename;
}
```

Hierarchy Level

```
[edit services global service name script]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the script service.

Options

`script-type (url | python | java-class | java-archive)`— Type of script service. Determines how the contents of the "file" attribute will be interpreted.

Value

- `url`— The value of attribute "file" is a URL that specifies where to find a Java archive (.jar file) containing the script service implementation.
- `python`— The value of attribute "file" is Python code.
- `java-class`— The value of attribute "file" is the binary contents of a compiled Java class file (.class file).
- `java-archive`— The value of attribute "file" is the binary contents of a Java archive file (.jar file).

Default— No value
Editing Level—Basic

`class-name` *`class-name`*— Name of the Java or Python class that implements the script service. The SAE instantiates the named class when it starts the script service.

Value— Name of the class
Default— No value
Editing Level—Basic

`file` *`file`*— If the script type is "URL", this attribute contains the URL of a Java archive (.jar) file containing the script service implementation. Otherwise, this attribute contains the script service implementation itself (i.e. python code, the binary contents of a compiled .class file, or the binary contents of a .jar file).

Value— The script itself, or a URL pointing to a .jar file containing the script
Default— No value
Editing Level—Basic

`filename` *`filename`*—(Optional) The file needs to exist locally. Its content will be read and loaded into the "file" attribute.

Value—Text
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services scope

Syntax

```
services scope name {
     precedence precedence;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit services scope]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service scope. Service scopes let you customize which services are delivered to specific organizations or locales.

Options

`name` *`name`*— Name of a service scope.

Value— Text

`precedence` *`precedence`*—(Optional) If multiple scopes are selected for the same subscriber session, they are sorted by their precedence level.

Value— Positive integer; the lower the precedence value, the higher the ranking of the service scope.
Default— No value
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Actual values for parameters associated with this object. The policy engine substitutes parameters in policies associated with this object with the values that you specify in the substitution configuration.

Value— Substitution in the form < parameter name > = < value > . For example, bandwidth = 1000000.
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services scope *name* mutex-group

Syntax

```
services scope name mutex-group name {
     auto-deactivate (yes | no);
     description description;
     services [services...];
}
```

Hierarchy Level

```
[edit services scope name mutex-group]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a mutex group. A mutex group is a collection of services that are mutually exclusive—services that the SAE cannot simultaneous activate for a particular subscriber.

Options

`name` *`name`*— Name of the mutex group.

Value— Text

`auto-deactivate (yes | no)`— Specify whether to allow activation of a service if another service is already active.

Value

- `yes`— For any one subscriber, the SAE deactivates a service in the group before activating another service in the group.
- `no`— The SAE refuses access to a requested service if the subscriber is already using another service in this group.

Default— Yes
Editing Level—Basic

`description` *`description`*—(Optional) Description of the mutex group.

Value— Text
Default— No value
Editing Level—Basic

`services [`*`services`*`...]`—(Optional) List of services in the mutex group.

Value— List of services
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services scope *name* schedule

Syntax

```
services scope name schedule name {
     description description;
}
```

Hierarchy Level

```
[edit services scope name schedule]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service schedule.

Options

`name` *`name`*— Name of service schedule.

Value—Text

`description` *`description`*—(Optional) Description of the service schedule.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services scope *name* schedule *name* event

Syntax

```
services scope name schedule name event name ...
```

Hierarchy Level

```
[edit services scope name schedule name event]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a scheduling event.

Options

`name` *name*— Name of the scheduling event.

Value—Text

Required Privilege Level

service

Required Editing Level

Basic

services scope *name* schedule *name* event *name* action

Syntax

```
services scope name schedule name event name action name {
     type (activate | deactivate | deny | deny-deactivate);
     service service;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit services scope name schedule name event name action]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure actions to perform for the scheduled event.

Options

`name` *name*— Arbitrary identifier for action.

Value—Text

`type (activate | deactivate | deny | deny-deactivate)`— Type of action.

Value

- `activate`— Activate service at the time specified in the entry schedule.
- `deactivate`— Deactivate service at the time specified in the entry schedule.
- `deny`— Deny new activation requests during the time specified in the entry schedule; current sessions are not affected. This value applies only to services that have an authorization plug-in configured.
- `deny-deactivate`— Deny new activation requests during the time specified in the entry schedule; current sessions are deactivated at the specified time. This value applies only to services that have an authorization plug-in configured.

Default— No value
Editing Level—Basic

`service` *`service`*— Name of service affected by this action.

Value—Text
Default— No value
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Substitutions to be used when activating the service. Substitutions apply only to service activations.

Value— An entry in valid substitution format. See the *SRC PE Services and Policies Guide*.
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services scope *name* schedule *name* event *name* action *name* attribute

Syntax

```
services scope name schedule name event name action name attribute (sessionName |
sessionTag | sessionTimeout | downStreamBandwidth | upStreamBandwidth) {
     value;
}
```

Hierarchy Level

```
[edit services scope name schedule name event name action name attribute]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure subscription attributes. Subscription attributes apply only to service activations.

Options

Subscription attributes.

Value

- `sessionName`— Name of the service session.
- `sessionTag`— Tag that can be used for accounting purposes.
- `sessionTimeout`— Session timeout to be used when the service is activated. The service session is deactivated when this timeout expires.
- `downStreamBandwidth`— Attribute used by SRC Admission Control Plug-In (SRC ACP) to specify the rate of traffic between the network and the subscriber.
- `upStreamBandwidth`— Attribute used by SRC ACP to specify the rate of traffic between the subscriber and the network.

`value`— Value of the specified subscription attribute.

Value— Depends on the specified subscription attribute
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services scope *name* schedule *name* event *name* except

Syntax

```
services scope name schedule name event name except name ...
```

Hierarchy Level

```
[edit services scope name schedule name event name except]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure an exclusion for the event.

Options

name *name*— Arbitrary identifier for exclusion rule.

Value—Text

Required Privilege Level

service

Required Editing Level

Basic

services scope *name* schedule *name* event *name* except *name* from

Syntax

```
services scope name schedule name event name except name from {
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit services scope name schedule name event name except name from]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the start time of the exclusion. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services scope *name* schedule *name* event *name* except *name* to

Syntax

```
services scope name schedule name event name except name to {
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit services scope name schedule name event name except name to]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the end time of the exclusion. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

These values apply only to services that have an authorization plug-in configured. If an authorization plug-in is not configured for the service associated with the schedule, these values are ignored.

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services scope *name* schedule *name* event *name* from

Syntax

```
services scope name schedule name event name from {
     effective effective;
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit services scope name schedule name event name from]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the start time for the event. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

`effective` *`effective`*—(Optional) Interval after the associated `from` or `to` time during which the scheduled action can be initiated by a subscriber who is logging in to a subscriber session.

Value— Number of minutes in the range 0–153722867280912
Default— *
Editing Level—Basic

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event

or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *

Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services scope *name* schedule *name* event *name* to

Syntax

```
services scope name schedule name event name to {
     effective effective;
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit services scope name schedule name event name to]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the end time for the event. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

These values apply only to services that have an authorization plug-in configured. If an authorization plug-in is not configured for the service associated with the schedule, these values are ignored.

`effective` *`effective`*—(Optional) Interval after the associated `from` or `to` time during which the scheduled action can be initiated by a subscriber who is logging in to a subscriber session.

Value— Number of minutes in the range 0–153722867280912
Default— *
Editing Level—Basic

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services scope *name* service

Syntax

```
services scope name service name {
     description description;
     type (normal | aggregate | script | infrastructure);
     category category;
     url url;
     policy-group policy-group;
     authentication-required;
     authorization-plug-in [authorization-plug-in...];
     tracking-plug-in [tracking-plug-in...];
     session-timeout session-timeout;
     idle-timeout idle-timeout;
     idle-timeout-input idle-timeout-input;
     idle-timeout-output idle-timeout-output;
     accounting-interim-interval accounting-interim-interval;
     radius-class radius-class;
     status (inactive | active);
     activate-only;
     permanent;
     available;
     secret;
     shared-service-name shared-service-name;
}
```

Hierarchy Level

```
[edit services scope name service]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service.

Options

name *name*— Name of the service.

Value— Text

`description` *`description`*—(Optional) Description of the service.

Value— Text
Default— No value
Editing Level—Basic

`type (normal | aggregate | script | infrastructure)`— Type of service.

Value

- `normal`— Individual service that a subscriber activates and deactivates. A normal service provisions a set of policies when activated.
- `aggregate`— Group of services that a subscriber activates and deactivates as a unit. An aggregate service contains other services (called fragments) that are managed by the aggregate service. The aggregate service is responsible for activating, deactivating, and monitoring the fragments.
- `script`— Service into which you insert or reference a script. You can use the script to manage third-party devices, provision layer 2 devices, such as DSLAMs, or set up network connections such as MPLS tunnels.
- `infrastructure`— Service that can be provisioned only once and then activated a number of times across network devices.

Default— Normal
Editing Level—Basic

`category` *`category`*—(Optional) The service category is not used by SRC directly. You can use it, for example, to group related services in an SRC application such as a portal. For example, in the residential portal, it is the text that appears in the set of tabs that categorize services.

Value— Text
Default— No value
Editing Level—Basic

`url` *`url`*—(Optional) The service URL is not used by SRC directly. You can use it in applications such as a portal to provide a link to a service provider or to the Web page that a subscriber sees after activating a service.

Value— URL
Default— No value
Editing Level—Basic

`policy-group` *`policy-group`*—(Optional) Policy group that is applied when the service is

activated. The policy engine does not allow the activation of a normal service without an associated policy group.

Value— Policy group
Default— No value
Editing Level—Basic

`authentication-required`—(Optional) Determines whether activation of the service requires authentication with a username and password that are specific to this service. The service authentication-required flag is not used by the SRC software directly. You can use it, for example, to request a name and password when the service is activated by an SRC application such as a portal.

Default— Disabled
Editing Level—Basic

`authorization-plug-in [`*`authorization-plug-in`*`...]`—(Optional) Name of the plug-ins that authorize this service. The authorization plug-ins are called when the service is activated.

Value— Single authorization plug-in or a list of authorization plug-ins.
Default— No value
Editing Level—Basic

`tracking-plug-in [`*`tracking-plug-in`*`...]`—(Optional) Name of the plug-ins that track this service. The tracking plug-ins are called when a service is activated and deactivated, as well as for interim updates.

Value— Single tracking plug-in or a list of tracking plug-ins.
Default— No value
Editing Level—Basic

`session-timeout` *`session-timeout`*—(Optional) Time after which the service session is deactivated.

Changes to the session timeout take effect immediately if the new value is lower than the remaining time for a session or if you specify that no session timeout applies. Other changes apply only to services that are activated after you make the change.

The session timeout can also be controlled dynamically for each service session by a plug-in.

Value— Number of seconds in the range 0–2147483647
Default— No value
Editing Level—Basic

`idle-timeout` *`idle-timeout`*—(Optional) Idle time after which the SAE deactivates service. To decide whether a service is idle, the SAE collects accounting information for the service, which means that the service activation policy must specify an accounting rule. The idle timeout is the minimum time the service must be idle before it is deactivated. A service is considered idle if the volume accounting data does not change between interim updates. The actual deactivation time depends on the length of the accounting interval.

The idle timeout can also be dynamically updated per service session by an authorization plug-in.

Value— Number of seconds in the range 0–2147483647
Default— No value
Editing Level—Basic

`idle-timeout-input` *`idle-timeout-input`*—(Optional) Input idle time after which the SAE deactivates service. To decide whether a service is idle, the SAE collects accounting information for the service, which means that the service activation policy must specify an accounting rule. The input idle timeout is the minimum time the service must be idle before it is deactivated. A service is considered idle if the volume accounting data does not change between interim updates. The actual deactivation time depends on the length of the accounting interval.

The input idle timeout can also be dynamically updated per service session by an authorization plug-in.

Value— Number of seconds in the range 0–2147483647
Default— No value
Editing Level—Basic

`idle-timeout-output` *`idle-timeout-output`*—(Optional) Output idle time after which the SAE deactivates service. To decide whether a service is idle, the SAE collects accounting information for the service, which means that the service activation policy must specify an accounting rule. The input idle timeout is the minimum time the service must be idle before it is deactivated. A service is considered idle if the volume accounting data does not change between interim updates. The actual deactivation time depends on the length of the accounting interval.

The output idle timeout can also be dynamically updated per service session by an authorization plug-in.

Value— Number of seconds in the range 0–2147483647
Default— No value
Editing Level—Basic

`accounting-interim-interval` *`accounting-interim-interval`*—(Optional) Time between interim accounting messages for this service. The accounting interim interval can also be controlled dynamically for each service session by a plug-in.

Value— Number of seconds in the range 0–2147483647. Setting the value to 0 turns off interim accounting.
Default— No value
Editing Level—Basic

`radius-class` *`radius-class`*—(Optional) Default value used in the RADIUS class attribute in RADIUS accounting messages. If RADIUS authenticates the service session, the class attribute received in the RADIUS Access-Accept response from the server overrides this value. You can use this option to set the RADIUS attribute to 25.

The RADIUS class can also be dynamically for each service session by a plug-in.

Value— Text
Default— Name of the service
Editing Level—Basic

`status (inactive | active)`—(Optional) Status of the service.

Value

- `inactive`— Service does not accept new subscriptions.
- `active`— Service accepts new subscriptions.

Default— active
Editing Level—Basic

`activate-only`—(Optional) A service that is marked activate only cannot be directly deactivated. It can be deactivated indirectly through a mutex group or a session timeout.

Default— Disabled
Editing Level—Basic

`permanent`—(Optional) Specifies whether the SAE maintains permanent activation of this service for a subscriber. A service that is marked as permanent is automatically activated as soon as a subscriber subscribes to it.

Default— Disabled
Editing Level—Basic

`available`—(Optional) Specifies whether a subscriber can activate a service. To be activated, the service must be available in the currently selected scope.

Default— Enabled
Editing Level—Basic

`secret`—(Optional) Secret services are visible only to administrators who have permission to see secret information. You can use this flag to hide services from subscribers and unprivileged administrators.

Editing Level—Basic

`shared-service-name` *`shared-service-name`*—(Optional) For infrastructure services, the name of the service to be shared.

Value— Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services scope *name* service *name* admission-control

Syntax

```
services scope name service name admission-control {
     required-downstream-bandwidth required-downstream-bandwidth;
     required-upstream-bandwidth required-upstream-bandwidth;
     congestion-points [congestion-points...];
}
```

Hierarchy Level

```
[edit services scope name service name admission-control]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure upstream and downstream bandwidths for services that ACP manages.

Options

`required-downstream-bandwidth` *`required-downstream-bandwidth`*—(Optional) Downstream bandwidth to the subscriber required for the service.

Value— Number of bps
Default— No value
Editing Level—Basic

`required-upstream-bandwidth` *`required-upstream-bandwidth`*—(Optional) Upstream bandwidth from the subscriber required for the service.

Value— Number of bps
Default— No value
Editing Level—Basic

`congestion-points [`*`congestion-points`*`...]`—(Optional) Congestion points for this service.

Value— List of expressions
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services scope *name* service *name* admission-control congestion-point-classification

Syntax

```
services scope name service name admission-control congestion-point-
classification {
     script script;
     expression [expression...];
}
```

Hierarchy Level

```
[edit services scope name service name admission-control congestion-point-
classification]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Congestion point classification for this service. It overrides expressions defined with congestion-points attribute.

Options

`script script`—(Optional) Congestion point classification script in python. Functions or variables defined in the script can be referred in congestion point classification expressions.

Value—Multi-line text
Editing Level—Basic

`expression [expression...]`— Congestion point classification expressions for this service.

Value— List of expressions
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services scope *name* service *name* aggregate fragment

Syntax

```
services scope name service name aggregate fragment name {
     expression expression;
     service service;
     mandatory;
     redundancy-group redundancy-group;
     subscription-required;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit services scope name service name aggregate fragment]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure service fragments for an aggregate service.

Options

`name` *`name`*— Name for service fragment. The fragment name is not stored and is re-created every time the object is read.

Value— Text

`expression` *`expression`*— Subscriber reference expression that identifies the remote subscriber session that will host the fragment. The remote subscriber session is an assigned IP subscriber. If the remote SAE manages the specified interface, the SAE creates an assigned IP subscriber session if necessary.

Value— Valid expressions are:

- current
- address = "A.B.C.D"
- vr = "vrName",interfaceName = "ifName"
- vr = "vrName",interfaceName = "ifName", address = "A.B.C.D"
- vr = "vrName",ifIndex = "1234"
- vr = "vrName",login_name = "user@domain"

- vr = "vrName",primary_user_name = "user@domain"
- dn = "uniqueId = ..."
- login_name = "user@domain"
- primary_user_name = "user@domain"
- ref = "rdn/rdn"

The rdn/rdn identifies the hierarchy of directory objects below the LDAP object *o = aggregateService*. The final object contains the attribute subscriberRefExpr to identify the subscriber session. A forward slash (/) separates the objects in the path.

You can also use a substitution or a Python expression that represents any of the literal values listed above. For a substitution or Python expression, type < - before the expression and type - > after it; for example, < -ifAlias- > . For a list and description of the fields that you can use to compose Python expressions, see *Managing Services for the SRC CLI* in the *SRC PE Services and Policies Guide*.

Examples of valid expressions are:

- current
- address = "10.10.10.1"
- vr = " < -substitution.serviceVr- > ",interfaceName = " < -substitution.serviceInterface- > "
- dn = "uniqueId = < -ifAlias- > , < -userDn- > "
- vr = < -["vr1","vr2"]- > ,loginName = < -["joe@abc","jane@abc"]- > .

When you include lists, fragment services are created for all combinations of values in the list. For example, vr = < -["vr1","vr2"]- > ,loginName = < -["joe@abc","jane@abc"]- > would cause four fragments to be created with the following expressions:

- vr = "vr1",loginName = "joe@abc"
- vr = "vr1",loginName = "jane@abc"
- vr = "vr2",loginName = "joe@abc"
- vr = "vr2",loginName = "jane@abc"

Default— No value
Editing Level—Basic

`service` *`service`*— Name of the service to be included in the aggregate service as a fragment service.

Value— Name of a service
Default— No value
Editing Level—Basic

`mandatory`—(Optional) Specifies whether the fragment service must be active for the

aggregate service to become active.

Default— Mandatory
Editing Level—Basic

`redundancy-group` *`redundancy-group`*—(Optional) Group name to be applied to each fragment service that is to be part of a redundancy group. The fragment services that have the same group name provide redundancy for each other.

Value— Text
Default— No value
Editing Level—Basic

`subscription-required`—(Optional) Specifies whether a remote subscriber session must be subscribed to the fragment service for it to become active.

Enabling subscription-required can be used to limit the services that can be activated as fragments. Enabling this option lets you control which services can be used as fragments. For example, for an aggregate service that supports VoIP to push a policy to the caller and the callee, you can require that both subscribers sign up for VoIP services. If you disable the option, only one party needs to subscribe to the aggregate service; the policy service sessions are created automatically.

Default— Disabled
Editing Level—Basic

`substitution [`*`substitution`*`...]`—(Optional) List of substitutions that are used as arguments for the fragment to become active. If a parameter does not acquire a value, the associated fragment service does not become active.

Value— One or more of the following:

- < parameter-name > —The parameter name is defined to have the same value in the fragment service session as in the aggregate service session.
- < parameter-name > = < substitution-expression > —The parameter name on the left side of the equals sign is defined for the fragment service session. This parameter name is the result of the evaluation of the expression (in the aggregate service session) on the right side of the equals sign.

Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services scope *name* service *name* parameter

Syntax

```
services scope name service name parameter {
     gateway-ip-address gateway-ip-address;
     service-ip-address service-ip-address;
     service-ip-mask service-ip-mask;
     service-port service-port;
     substitution [substitution...];
     session-volume-quota session-volume-quota;
}
```

Hierarchy Level

```
[edit services scope name service name parameter]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure parameter values for services. The policy engine substitutes parameters in policies associated with this service with the values that you specify in this parameter configuration.

Options

`gateway-ip-address` *`gateway-ip-address`*—(Optional) Actual IP address of the gateway router. This value is substituted for the policy global parameter called gateway_ipAddress.

Value— IP address
Default— No value
Editing Level—Basic

`service-ip-address` *`service-ip-address`*—(Optional) Actual IP address of the host(s) that provides the service. This value is substituted for the policy global parameter called service_ipAddress.

Value— IP address
Default— No value
Editing Level—Basic

`service-ip-mask` *`service-ip-mask`*—(Optional) Actual IP mask for the service. This value is substituted for the policy global parameter called service_ipMask.

Value— IP address
Default— No value
Editing Level—Basic

`service-port` *`service-port`*—(Optional) Actual port for the service. This value is substituted for the policy global parameter called service_port.

Value— TCP or UDP port number in the range 0–65535
Default— No value
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Actual values for other parameters. These values are substituted for the parameters that you specify.

Value— Substitution in the form < parameter name > = < value > . For example, bandwidth = 1000000.
Default— No value
Editing Level—Basic

`session-volume-quota` *`session-volume-quota`*—(Optional) Upstream and downstream volume quota for the service session.

The SAE does not directly use this value. It is used by applications that implement tracking plug-ins. The value of a service session can be defined at runtime either through an authorization plug-in or a call to the SAE API. If the Session Volume Quota attribute is defined in more than one place, which value is used depends on where the value is defined. The SRC software searches for the value in the following order:

1. Value set in a call to the SAE
2. Value set in an authorization plug-in
3. Value set in a service definition

Value— Volume quota in the format "downstream-quota:upstream-quota"

where

- Downstream quota is the number of bytes available for transmitting data from the network to the subscriber.
- Upstream quota is the number of bytes available for transmitting data from the subscriber to the network.

Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

services scope *name* service *name* script

Syntax

```
services scope name service name script {
     script-type (url | python | java-class | java-archive);
     class-name class-name;
     file file;
     filename filename;
}
```

Hierarchy Level

```
[edit services scope name service name script]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the script service.

Options

`script-type (url | python | java-class | java-archive)`— Type of script service. Determines how the contents of the "file" attribute will be interpreted.

Value

- `url`— The value of attribute "file" is a URL that specifies where to find a Java archive (.jar file) containing the script service implementation.
- `python`— The value of attribute "file" is Python code.
- `java-class`— The value of attribute "file" is the binary contents of a compiled Java class file (.class file).
- `java-archive`— The value of attribute "file" is the binary contents of a Java archive file (.jar file).

Default— No value
Editing Level—Basic

`class-name` *`class-name`*— Name of the Java or Python class that implements the script service. The SAE instantiates the named class when it starts the script service.

Value— Name of the class
Default— No value
Editing Level—Basic

`file` *`file`*— If the script type is "URL", this attribute contains the URL of a Java archive (.jar) file containing the script service implementation. Otherwise, this attribute contains the script service implementation itself (i.e. python code, the binary contents of a compiled .class file, or the binary contents of a .jar file).

Value— The script itself, or a URL pointing to a .jar file containing the script
Default— No value
Editing Level—Basic

`filename` *`filename`*—(Optional) The file needs to exist locally. Its content will be read and loaded into the "file" attribute.

Value—Text
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

Policy CLI

The following table summarizes the SRC command-line interface (CLI) for configuring policies. Configuration statements are listed in alphabetical order.

Policy CLI Configuration Statements
policies_folder
policies_global-parameters
policies_group
policies_group_name_list
policies_group_name_list_name_parent-group
policies_group_name_list_name_parent-group_name_parent-group
policies_group_name_list_name_parent-group_name_rate-limit
policies_group_name_list_name_parent-group_name_rate-limit_committed-action_filter
policies_group_name_list_name_parent-group_name_rate-limit_committed-action_forward-conditional
policies_group_name_list_name_parent-group_name_rate-limit_committed-action_forward-final
policies_group_name_list_name_parent-group_name_rate-limit_committed-action_forward-unconditional
policies_group_name_list_name_parent-group_name_rate-limit_committed-action_forward
policies_group_name_list_name_parent-group_name_rate-limit_committed-action_mark_mark-info
policies_group_name_list_name_parent-group_name_rate-limit_committed-action_parameter
policies_group_name_list_name_parent-group_name_rate-limit_conformed-action_filter
policies_group_name_list_name_parent-group_name_rate-limit_conformed-action_forward-conditional
policies_group_name_list_name_parent-group_name_rate-limit_conformed-action_forward-final
policies_group_name_list_name_parent-group_name_rate-limit_conformed-action_forward-unconditional
policies_group_name_list_name_parent-group_name_rate-limit_conformed-action_forward
policies_group_name_list_name_parent-group_name_rate-limit_conformed-action_mark_mark-info
policies_group_name_list_name_parent-group_name_rate-limit_conformed-action_parameter
policies_group_name_list_name_parent-group_name_rate-limit_exceed-action_filter

policies_group_name_list_name_parent-group_name_rate-limit_exceed-action_forward-conditional
policies_group_name_list_name_parent-group_name_rate-limit_exceed-action_forward-final
policies_group_name_list_name_parent-group_name_rate-limit_exceed-action_forward-unconditional
policies_group_name_list_name_parent-group_name_rate-limit_exceed-action_forward
policies_group_name_list_name_parent-group_name_rate-limit_exceed-action_mark_mark-info
policies_group_name_list_name_parent-group_name_rate-limit_exceed-action_parameter
policies_group_name_list_name_policer
policies_group_name_list_name_rule
policies_group_name_list_name_rule_name_color
policies_group_name_list_name_rule_name_color-mark
policies_group_name_list_name_rule_name_docsis-best-effort
policies_group_name_list_name_rule_name_docsis-down-stream
policies_group_name_list_name_rule_name_docsis-non-real-time
policies_group_name_list_name_rule_name_docsis-parameter
policies_group_name_list_name_rule_name_docsis-real-time
policies_group_name_list_name_rule_name_docsis-unsolicited-grant-ad
policies_group_name_list_name_rule_name_docsis-unsolicited-grant
policies_group_name_list_name_rule_name_dynamic-profile
policies_group_name_list_name_rule_name_dynamic-profile_variables
policies_group_name_list_name_rule_name_exception-application
policies_group_name_list_name_rule_name_filter
policies_group_name_list_name_rule_name_flow-spec
policies_group_name_list_name_rule_name_forward
policies_group_name_list_name_rule_name_forwarding-class
policies_group_name_list_name_rule_name_forwarding-instance
policies_group_name_list_name_rule_name_gate-spec
policies_group_name_list_name_rule_name_http-redirect

policies_group_name_list_name_rule_name_loss-priority
policies_group_name_list_name_rule_name_mark
policies_group_name_list_name_rule_name_mark_info
policies_group_name_list_name_rule_name_nat
policies_group_name_list_name_rule_name_nat_ip-network_group-network
policies_group_name_list_name_rule_name_nat_port
policies_group_name_list_name_rule_name_next-hop
policies_group_name_list_name_rule_name_next-interface
policies_group_name_list_name_rule_name_next-rule
policies_group_name_list_name_rule_name_policer
policies_group_name_list_name_rule_name_policer_packet-action
policies_group_name_list_name_rule_name_policer_packet-action_name_filter
policies_group_name_list_name_rule_name_policer_packet-action_name_forwarding-class
policies_group_name_list_name_rule_name_policer_packet-action_name_loss-priority
policies_group_name_list_name_rule_name_policer_packet-action_name_parameter
policies_group_name_list_name_rule_name_policer-ref
policies_group_name_list_name_rule_name_qos-attach
policies_group_name_list_name_rule_name_qos-condition
policies_group_name_list_name_rule_name_rate-limit
policies_group_name_list_name_rule_name_rate-limit_committed-action_filter
policies_group_name_list_name_rule_name_rate-limit_committed-action_forward
policies_group_name_list_name_rule_name_rate-limit_committed-action_forward-conditional
policies_group_name_list_name_rule_name_rate-limit_committed-action_forward-final
policies_group_name_list_name_rule_name_rate-limit_committed-action_forward-unconditional
policies_group_name_list_name_rule_name_rate-limit_committed-action_mark_mark-info
policies_group_name_list_name_rule_name_rate-limit_committed-action_parameter
policies_group_name_list_name_rule_name_rate-limit_conformed-action_filter

policies_group_name_list_name_rule_name_rate-limit_conformed-action_forward
policies_group_name_list_name_rule_name_rate-limit_conformed-action_forward-conditional
policies_group_name_list_name_rule_name_rate-limit_conformed-action_forward-final
policies_group_name_list_name_rule_name_rate-limit_conformed-action_forward-unconditional
policies_group_name_list_name_rule_name_rate-limit_conformed-action_mark_mark-info
policies_group_name_list_name_rule_name_rate-limit_conformed-action_parameter
policies_group_name_list_name_rule_name_rate-limit_exceed-action_filter
policies_group_name_list_name_rule_name_rate-limit_exceed-action_forward
policies_group_name_list_name_rule_name_rate-limit_exceed-action_forward-conditional
policies_group_name_list_name_rule_name_rate-limit_exceed-action_forward-final
policies_group_name_list_name_rule_name_rate-limit_exceed-action_forward-unconditional
policies_group_name_list_name_rule_name_rate-limit_exceed-action_mark_mark-info
policies_group_name_list_name_rule_name_rate-limit_exceed-action_parameter
policies_group_name_list_name_rule_name_reject
policies_group_name_list_name_rule_name_routing-instance
policies_group_name_list_name_rule_name_scheduler-action
policies_group_name_list_name_rule_name_scheduler-action_drop-profile
policies_group_name_list_name_rule_name_service-class-name
policies_group_name_list_name_rule_name_stateful-firewall
policies_group_name_list_name_rule_name_stateful-firewall_packet-action_filter
policies_group_name_list_name_rule_name_stateful-firewall_packet-action_forward
policies_group_name_list_name_rule_name_stateful-firewall_packet-action_parameter
policies_group_name_list_name_rule_name_stateful-firewall_packet-action_reject
policies group name list name rule name subscriber-profile
policies_group_name_list_name_rule_name_template-activation
policies_group_name_list_name_rule_name_template-activation_variables

policies_group_name_list_name_rule_name_traffic-class
policies_group_name_list_name_rule_name_traffic-condition
policies_group_name_list_name_rule_name_traffic-condition_name_application-protocol-condition
policies_group_name_list_name_rule_name_traffic-condition_name_application-protocol-condition_name_proto-attr
policies_group_name_list_name_rule_name_traffic-condition_name_application-protocol-condition_name_proto-attr_destination-port_port
policies_group_name_list_name_rule_name_traffic-condition_name_application-protocol-condition_name_proto-attr_source-port_port
policies_group_name_list_name_rule_name_traffic-condition_name_destination-network_group-network
policies_group_name_list_name_rule_name_traffic-condition_name_destination-network_network
policies_group_name_list_name_rule_name_traffic-condition_name_icmp-condition
policies_group_name_list_name_rule_name_traffic-condition_name_igmp-condition
policies_group_name_list_name_rule_name_traffic-condition_name_ipsec-condition
policies_group_name_list_name_rule_name_traffic-condition_name_parameter-protocol-condition
policies_group_name_list_name_rule_name_traffic-condition_name_parameter-protocol-condition_proto-attr
policies_group_name_list_name_rule_name_traffic-condition_name_parameter-protocol-condition_proto-attr_destination-port_port
policies_group_name_list_name_rule_name_traffic-condition_name_parameter-protocol-condition_proto-attr_source-port_port
policies_group_name_list_name_rule_name_traffic-condition_name_protocol-condition
policies_group_name_list_name_rule_name_traffic-condition_name_protocol-port-condition
policies_group_name_list_name_rule_name_traffic-condition_name_protocol-port-condition_destination-port_port
policies_group_name_list_name_rule_name_traffic-condition_name_protocol-port-condition_source-port_port
policies_group_name_list_name_rule_name_traffic-condition_name_source-network_group-network
policies_group_name_list_name_rule_name_traffic-condition_name_source-network_network
policies_group_name_list_name_rule_name_traffic-condition_name_tcp-condition

policies_group_name_list_name_rule_name_traffic-condition_name_tcp-condition_destination-port_port
policies_group_name_list_name_rule_name_traffic-condition_name_tcp-condition_source-port_port
policies_group_name_list_name_rule_name_traffic-condition_name_tos
policies_group_name_list_name_rule_name_traffic-condition_name_traffic-match-condition
policies_group_name_list_name_rule_name_traffic-mirror
policies_group_name_list_name_rule_name_traffic-shape
policies_group_name_list_name_rule_name_user-packet-class
policies_group_name_local-parameters

policies folder

Syntax

```
policies folder name {
     description description;
}
```

Hierarchy Level

```
[edit policies folder]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a policy folder, which is a collection of policies.

Options

`name` *`name`*— Name for a policy folder, which is a collection of policy folders or groups.

Value— Text

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value— Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies global-parameters

Syntax

```
policies global-parameters name {
     description description;
     default-value default-value;
     type type;
}
```

Hierarchy Level

```
[edit policies global-parameters]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Defines a global parameter. A global parameter is available for use in any policy. With global parameters, you can define parameters once and then reuse them in many policies. Typically, you would use global parameters if the parameter does not need to change often. If parameters require changes, use local parameters.

Options

`name` *`name`*— Name of the parameter

Value— Text

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value— Text
Default— No value
Editing Level—Basic

`default-value` *`default-value`*—(Optional) Value that the policy engine uses if no other values are provided during the parameter value acquisition process. If other values are provided to the policy engine but problems are encountered, the default value for the parameter is not used. The policy engine generates an error message.

Value— Valid value for the parameter type. See the policy documentation in the *SRC PE Services and Policies Guide* for valid values for each parameter type.

Default— No value
Editing Level—Basic

`type` *`type`*—(Optional) Type of attribute for which you can use the parameter. The parameter type determines where you can use the parameter.

Value— See the policy documentation in the *SRC PE Services and Policies Guide* for a list of parameter types, where each type of parameter is used, and what each parameter is used to specify.
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group

Syntax

```
policies group name {
     description description;
}
```

Hierarchy Level

```
[edit policies group]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a policy group, which is a collection of policy lists.

Options

`name` *`name`*— Name for a collection of policy lists.

Value— Text

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value— Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list

Syntax

```
policies group name list name {
     role (junos | junose-ipv4 | junose-ipv6 | junose-l2tp | pcmm | aaa | junos-
ise | junos-ptsp);
     applicability applicability;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a policy list that holds a collection of policy rules.

Options

`name` *`name`*— Name for a collection of policy rules.

Value— Text

`role (junos | junose-ipv4 | junose-ipv6 | junose-l2tp | pcmm | aaa | junos-ise | junos-ptsp)`— Platform for which the policy list is created. The selection that you make controls the type of policy rules that you can add to the policy list. You must configure the role before you can configure the policy rule.

Value

- `junos`— JUNOS routing platform
- `junose-ipv4`— JUNOSe router that is running IPv4
- `junose-ipv6`— JUNOSe router that is running IPv6
- `junose-l2tp`— JUNOSe router that is running L2TP
- `pcmm`— PCMM platform
- `aaa`— AAA supporting platforms
- `junos-ise`— Intelligent Services Edge routing platform
- `junos-ptsp`—JUNOS Packet Triggered Subscriber Policy

Default— No value
Editing Level—Basic

`applicability` *`applicability`*— Indicates where the policy is applied on the router or, for PCMM policies, indicates whether the policy applies to the upstream or downstream channel.

For JUNOS routing platforms, applicability determines the types of policy rules that you can create:

- JUNOS ASP—Applicability must be both.
- JUNOS FILTER—Applicability must be input or output.
- JUNOS POLICER—Applicability must be input or output.
- JUNOS SCHEDULER—Applicability must be both.
- JUNOS SHAPING—Applicability must be both.

Value—Text
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value— Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* parent-group

Syntax

```
policies group name list name parent-group name {
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name parent-group]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

Configure a parent group, an object that defines a rate-limit action as part of a rate-limit hierarchy. SRC parent groups support JUNOSe rate limits.

Options

`name` *`name`*— Name of the parent group.

Value— Text

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value— Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* parent-group *name* parent-group

Syntax

```
policies group name list name parent-group name parent-group name {
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name parent-group name parent-group]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

Add a parent group to another parent group. Parent groups let you create hierarchical rate-limit actions.

Options

`name` *`name`*— Name of the parent group.

Value— Text

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value— Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* parent-group *name* rate-limit

Syntax

```
policies group name list name parent-group name rate-limit {
     type type;
     committed-rate committed-rate;
     committed-burst committed-burst;
     peak-rate peak-rate;
     peak-burst peak-burst;
     excess-burst excess-burst;
     color-aware;
}
```

Hierarchy Level

```
[edit policies group name list name parent-group name rate-limit]
```

`type` *type*— Specify that the rate-limit profile is either one rate or two rate. The one-rate rate-limit profile provides a hard-limit rate limiter or a TCP-friendly rate limiter. The two-rate rate-limit profile provides a two-rate, three-color marking mechanism.

Value— One of the following:

- one_rate—Uses a single-rate committed rate with two burst parameters: committed burst and excess burst; supports a TCP-friendly rate limiter
- two_rate—Uses committed rate and peak rate, each with a burst parameter
- Parameter of type rateLimitType

Default— No value
Editing Level—Basic

`committed-rate` *committed-rate*—(Optional) Target rate for the traffic that the policy covers.

Value— One of the following:

- Predefined global parameter interface_speed, which is the speed of the subscriber's router interface
- Number of bits per second in the range 0–4294967295
- Parameter of type rate

Default— 0
Editing Level—Basic

`committed-burst` *`committed-burst`*—(Optional) Amount of bandwidth allocated to burst traffic in bytes.

Value— One of the following:

- Number of bytes in the range 8192–4294967295
- Numeric expression.
- Parameter of type burst

For example, max(qos*0.1/8, 16384) sets the burst size to the maximum of a 100-ms burst at committed rate (qos*0.1) in bytes (/8) or 16384

where qos is a local parameter that represents the committed rate

Default— 16384
Editing Level—Basic

`peak-rate` *`peak-rate`*—(Optional) For two-rate rate-limit profiles, specifies the amount of bandwidth allocated to excess traffic flow over the committed rate.

Value— One of the following:

- Predefined global parameter interface_speed, which is the speed of the subscriber's router interface
- Number of bits per second in the range 0–4294967295
- Numeric expression
- Parameter of type rate

For example, qos*1.5 sets the peak rate to 1.5 times the committed rate

where qos is a local parameter that represents the committed rate

Default— 0
Editing Level—Basic

`peak-burst` *`peak-burst`*—(Optional) For two-rate rate-limit profiles, specifies the amount of bandwidth allocated to burst traffic in excess of the peak rate.

Value— One of the following:

- Number of bytes in the range 8192–4294967295

- Numeric expression
- Parameter of type burst

For example, max(qos*1.5*0.1/8, 16384)

where qos is a local parameter that represents the committed rate

Default— 16384
Editing Level—Basic

`excess-burst` *`excess-burst`*—(Optional) For one-rate rate-limit profiles, specifies the amount of bandwidth allocated to accommodate burst traffic.

Value— One of the following:

- Number of bytes in the range < 0 | [committed-burst + 1, 4294967295] >
- Numeric expression
- Parameter of type burst

Default— No value
Editing Level—Basic

`color-aware`—(Optional) Specifies whether the rate-limit action is color-aware; that is, whether the rate limits can change depending on the color of the incoming packet. The color might have been set in a previous rate limit, in a policy action, or in an earlier policy. This option is supported in rate-limit hierarchies.

Default—false
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* parent-group *name* rate-limit committed-action filter

Syntax

```
policies group name list name parent-group name rate-limit committed-
action filter {
}
```

Hierarchy Level

```
[edit policies group name list name parent-group name rate-limit committed-
action filter]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Specify that the packet is dropped if the traffic flow does not exceed the committed rate, or for JUNOSe rate limits if the traffic flow conforms to the committed rate, committed burst size, exceed rate, and exceed burst size.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* parent-group *name* rate-limit committed-action forward-conditional

Syntax

```
policies group name list name parent-group name rate-limit committed-
action forward-conditional {
}
```

Hierarchy Level

```
[edit policies group name list name parent-group name rate-limit committed-
action forward-conditional]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

In JUNOSe rate-limit hierarchies, if the traffic flow conforms to the committed rate, committed burst size, exceed rate, and exceed burst size:

- Set the packet color to the result calculated by the rate limit.
- Forward the packet to the next rate limit for processing.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* parent-group *name* rate-limit committed-action forward-final

Syntax

```
policies group name list name parent-group name rate-limit committed-
action forward-final {
}
```

Hierarchy Level

```
[edit policies group name list name parent-group name rate-limit committed-
action forward-final]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

In JUNOSe rate-limit hierarchies, if the traffic flow conforms to the committed rate, committed burst size, exceed rate, and exceed burst size, the packet exits from the rate-limit hierarchy and is forwarded.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* parent-group *name* rate-limit committed-action forward-unconditional

Syntax

```
policies group name list name parent-group name rate-limit committed-
action forward-unconditional {
}
```

Hierarchy Level

```
[edit policies group name list name parent-group name rate-limit committed-
action forward-unconditional]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

In JUNOSe rate-limit hierarchies, if the traffic flow conforms to the committed rate, committed burst size, exceed rate, and exceed burst size:

- Forward the packet.
- Set the packet color to the result calculated by the rate limit.
- Decrement the bandwidth allocated to a traffic flow.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* parent-group *name* rate-limit committed-action forward

Syntax

```
policies group name list name parent-group name rate-limit committed-
action forward {
}
```

Hierarchy Level

```
[edit policies group name list name parent-group name rate-limit committed-
action forward]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Specify that the packet is forwarded if the traffic flow does not exceed the committed rate, or for JUNOSe rate-limits if the traffic flow conforms to the committed rate, committed burst size, exceed rate, and exceed burst size.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* parent-group *name* rate-limit committed-action mark mark-info

Syntax

```
policies group name list name parent-group name rate-limit committed-
action mark mark-info {
     value value;
     mask mask;
}
```

Hierarchy Level

```
[edit policies group name list name parent-group name rate-limit committed-
action mark mark-info]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the mark value and the mark mask.

Options

`value` *value*—(Optional) For IPv4 packets, sets the ToS field in the IP header. For IPv6 packets, sets the traffic-class field in the IP header.

Value— Integer in the range 0–255
Default— 0
Editing Level—Basic

`mask` *mask*—(Optional) Mask associated with the mark value.

Note: If you configure more than one mark action in a rate limit— for example, for a committed, conformed, or exceed action— configure the same mask for each action. If you use different masks, the results can be unpredictable.

Value— Integer values of 224, 252, 255 for JUNOSe; values of 224, 252 for JUNOS

For IPv4:

- 255 (tos)—Specifies the use of the whole 8 bits of the ToS byte; tos-byte range is 0–255.
- 252 (dsfield)—Specifies the use of the upper 6 bits of the ToS byte; tos-byte range is 0–63.
- 224 (precedence)—Specifies the use of the upper 3 bits of the ToS byte; tos-byte range is 0–7.

For IPv6:

- 255 (tcfield)—Specifies the use of the whole 8 bits of the traffic-class byte; tos-byte range is 0–255.
- 252 (dsfield)—Specifies the use of the upper 6 bits of the traffic-class byte; tos-byte range is 0–63.
- 224 (precedence)—Specifies the use of the upper 3 bits of the traffic-class byte; tos-byte range is 0–7.

Default— 255
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* parent-group *name* rate-limit committed-action parameter

Syntax

```
policies group name list name parent-group name rate-limit committed-
action parameter {
     action action;
}
```

Hierarchy Level

```
[edit policies group name list name parent-group name rate-limit committed-
action parameter]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Specify that the action indicated by the parameter is applied if the traffic flow does not exceed the committed rate, or for JUNOSe rate limits if the traffic flow conforms to the committed rate, committed burst size, exceed rate, and exceed burst size, .

`action` *`action`*—(Optional) Parameter that specifies the action to take on traffic.

Value— Parameter of type packetOperation.
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* parent-group *name* rate-limit conformed-action filter

Syntax

```
policies group name list name parent-group name rate-limit conformed-
action filter {
}
```

Hierarchy Level

```
[edit policies group name list name parent-group name rate-limit conformed-
action filter]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Specify that if the traffic flow exceeds the committed rate but remains below the peak rate (for JUNOSe rate limits, below the peak burst size), the packet is dropped.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* parent-group *name* rate-limit conformed-action forward-conditional

Syntax

```
policies group name list name parent-group name rate-limit conformed-
action forward-conditional {
}
```

Hierarchy Level

```
[edit policies group name list name parent-group name rate-limit conformed-
action forward-conditional]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

In JUNOSe rate limit hierarchies, if the traffic flow exceeds the committed rate but remains below the peak burst size:

- Set the packet color to the result calculated by the rate limit.
- Forward the packet to the next rate limit for processing.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* parent-group *name* rate-limit conformed-action forward-final

Syntax

```
policies group name list name parent-group name rate-limit conformed-
action forward-final {
}
```

Hierarchy Level

```
[edit policies group name list name parent-group name rate-limit conformed-
action forward-final]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

In JUNOSe rate-limit hierarchies, specify that if the traffic flow exceeds the committed rate but remains below the peak burst size, the packet exits from the rate-limit hierarchy and is forwarded.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* parent-group *name* rate-limit conformed-action forward-unconditional

Syntax

```
policies group name list name parent-group name rate-limit conformed-
action forward-unconditional {
}
```

Hierarchy Level

```
[edit policies group name list name parent-group name rate-limit conformed-
action forward-unconditional]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

In JUNOSe rate-limit hierarchies, if the traffic flow exceeds the committed rate but remains below the peak burst size:

- Forward the packet.
- Set the packet color to the result calculated by the rate limit.
- Decrement bandwidth allocation for the traffic flow.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* parent-group *name* rate-limit conformed-action forward

Syntax

```
policies group name list name parent-group name rate-limit conformed-
action forward {
}
```

Hierarchy Level

```
[edit policies group name list name parent-group name rate-limit conformed-
action forward]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Specify that if the traffic flow exceeds the committed rate but remains below the peak rate (for JUNOSe rate limits, below the peak burst size), the packet is forwarded.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* parent-group *name* rate-limit conformed-action mark mark-info

Syntax

```
policies group name list name parent-group name rate-limit conformed-
action mark mark-info {
     value value;
     mask mask;
}
```

Hierarchy Level

```
[edit policies group name list name parent-group name rate-limit conformed-
action mark mark-info]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the mark value and the mark mask.

Options

`value` *`value`*—(Optional) For IPv4 packets, sets the ToS field in the IP header. For IPv6 packets, sets the traffic-class field in the IP header.

Value— Integer in the range 0–255
Default— 0
Editing Level—Basic

`mask` *`mask`*—(Optional) Mask associated with the mark value.

Note: If you configure more than one mark action in a rate limit— for example, for a committed, conformed, or exceed action— configure the same mask for each action. If you use different masks, the results can be unpredictable.

Value— Integer values of 224, 252, 255 for JUNOSe; values of 224, 252 for JUNOS

For IPv4:

- 255 (tos)—Specifies the use of the whole 8 bits of the ToS byte; tos-byte range is 0–255.
- 252 (dsfield)—Specifies the use of the upper 6 bits of the ToS byte; tos-byte range is 0–63.
- 224 (precedence)—Specifies the use of the upper 3 bits of the ToS byte; tos-byte range is 0–7.

For IPv6:

- 255 (tcfield)—Specifies the use of the whole 8 bits of the traffic-class byte; tos-byte range is 0–255.
- 252 (dsfield)—Specifies the use of the upper 6 bits of the traffic-class byte; tos-byte range is 0–63.
- 224 (precedence)—Specifies the use of the upper 3 bits of the traffic-class byte; tos-byte range is 0–7.

Default— 255
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* parent-group *name* rate-limit conformed-action parameter

Syntax

```
policies group name list name parent-group name rate-limit conformed-
action parameter {
     action action;
}
```

Hierarchy Level

```
[edit policies group name list name parent-group name rate-limit conformed-
action parameter]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Specify that if the traffic flow exceeds the committed rate but remains below the peak rate (for JUNOSe rate limits, below the peak burst size), the action specified by the parameter is applied.

`action` *`action`*—(Optional) Parameter that specifies the action to take on traffic.

Value— Parameter of type packetOperation.
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* parent-group *name* rate-limit exceed-action filter

Syntax

```
policies group name list name parent-group name rate-limit exceed-action filter {
}
```

Hierarchy Level

```
[edit policies group name list name parent-group name rate-limit exceed-
action filter]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Specify that the packet is dropped if the traffic flow exceeds the peak rate, or for JUNOSe rate limits, exceeds peak burst size. .

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* parent-group *name* rate-limit exceed-action forward-conditional

Syntax

```
policies group name list name parent-group name rate-limit exceed-action forward-
conditional {
}
```

Hierarchy Level

```
[edit policies group name list name parent-group name rate-limit exceed-
action forward-conditional]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

In rate-limit hierarchies, if the traffic flow does not exceed the committed rate:

- Set the packet color to the result calculated by the rate limit.
- Forward the packet to the next rate limit for processing.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* parent-group *name* rate-limit exceed-action forward-final

Syntax

```
policies group name list name parent-group name rate-limit exceed-action forward-
final {
}
```

Hierarchy Level

```
[edit policies group name list name parent-group name rate-limit exceed-
action forward-final]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

In rate-limit hierarchies, specify that if the traffic flow does not exceed the committed rate, the packet exits from the rate-limit hierarchy and is forwarded.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* parent-group *name* rate-limit exceed-action forward-unconditional

Syntax

```
policies group name list name parent-group name rate-limit exceed-action forward-
unconditional {
}
```

Hierarchy Level

```
[edit policies group name list name parent-group name rate-limit exceed-
action forward-unconditional]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

In rate-limit hierarchies, specify that if the traffic flow does not exceed the committed rate:

- Forward the packet.
- Set the packet color to the result calculated by the rate limit.
- Decrement bandwidth allocation for the traffic flow.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* parent-group *name* rate-limit exceed-action forward

Syntax

```
policies group name list name parent-group name rate-limit exceed-action forward {
}
```

Hierarchy Level

```
[edit policies group name list name parent-group name rate-limit exceed-
action forward]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Specify that the packet is forwarded if the traffic flow exceeds the peak rate, or for JUNOSe rate limits, if the traffic flow exceeds peak burst size, .

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* parent-group *name* rate-limit exceed-action mark mark-info

Syntax

```
policies group name list name parent-group name rate-limit exceed-
action mark mark-info {
     value value;
     mask mask;
}
```

Hierarchy Level

```
[edit policies group name list name parent-group name rate-limit exceed-
action mark mark-info]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the mark value and the mark mask.

Options

`value` *value*—(Optional) For IPv4 packets, sets the ToS field in the IP header. For IPv6 packets, sets the traffic-class field in the IP header.

Value— Integer in the range 0–255
Default— 0
Editing Level—Basic

`mask` *mask*—(Optional) Mask associated with the mark value.

Note: If you configure more than one mark action in a rate limit— for example, for a committed, conformed, or exceed action— configure the same mask for each action. If you use different masks, the results can be unpredictable.

Value— Integer values of 224, 252, 255 for JUNOSe; values of 224, 252 for JUNOS

For IPv4:

- 255 (tos)—Specifies the use of the whole 8 bits of the ToS byte; tos-byte range is 0–255.
- 252 (dsfield)—Specifies the use of the upper 6 bits of the ToS byte; tos-byte range is 0–63.
- 224 (precedence)—Specifies the use of the upper 3 bits of the ToS byte; tos-byte range is 0–7.

For IPv6:

- 255 (tcfield)—Specifies the use of the whole 8 bits of the traffic-class byte; tos-byte range is 0–255.
- 252 (dsfield)—Specifies the use of the upper 6 bits of the traffic-class byte; tos-byte range is 0–63.
- 224 (precedence)—Specifies the use of the upper 3 bits of the traffic-class byte; tos-byte range is 0–7.

Default— 255
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* parent-group *name* rate-limit exceed-action parameter

Syntax

```
policies group name list name parent-group name rate-limit exceed-
action parameter {
     action action;
}
```

Hierarchy Level

```
[edit policies group name list name parent-group name rate-limit exceed-
action parameter]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Specify that the action specified by the parameter is applied if the traffic flow exceeds the peak rate, or for JUNOSe rate limits, exceeds peak burst size.

`action` *`action`*—(Optional) Parameter that specifies the action to take on traffic.

Value— Parameter of type packetOperation.
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* policer

Syntax

```
policies group name list name policer name {
     bandwidth bandwidth;
     max-burst-size max-burst-size;
}
```

Hierarchy Level

```
[edit policies group name list name policer]
```

Release Information

Statement introduced in SRC Release bitter

Options

`name` *`name`*— Name of the policer instance

Value— Text

`bandwidth` *`bandwidth`*—(Optional) Specify bandwidth of the policer instance.

Value—Integer in the range bit/s
Editing Level—Basic

`max-burst-size` *`max-burst-size`*—(Optional) Specify maximum burst size of the policer instance. For any given policer instance its maximum burst size can be specified only once. If different policy rules reference the same policer instance, they must specify identical maximum burst size parameters, otherwise the activation request will fail.

Value—Integer in the range octets
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule

Syntax

```
policies group name list name rule name {
     type type;
     precedence precedence;
     application-accounting application-accounting;
     accounting;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a policy rule, which is a collection of conditions and actions.

Options

`name` *name*— Name for a policy rule, which is a collection of conditions and actions.

Value— Text

`type` *type*— Policy rule type, which is based on the applicability and the role of the policy.

Value— The type of policy rule that you can create depends on the role and applicability of the policy list in which you create the policy rule.

- For JUNOSe policy lists, there is only one type—junose.
- For PCMM policy lists, there is only one type—pcmm.
- For AAA policy lists, there is only one type—aaa.
- For JUNOS policy lists, you can create the following policy rule types:
    - JUNOS ASP—Applicability of policy list must be both input and output.
    - JUNOS FILTER—Applicability of policy list must be input or output.
    - JUNOS POLICER—Applicability of policy list must be input

or output.
- JUNOS SCHEDULER—Applicability of policy list must be both.
- JUNOS SHAPING—Applicability of policy list must be both.

Default— No value
Editing Level—Basic

`precedence` *`precedence`*—(Optional) Order in which the policy manager applies policy rules. Rules are evaluated from lowest to highest precedence value. Precedence has meaning only if two rules have different classifiers and if those classifiers overlap. If this is the case and a packet is received that satisfies both classifiers, then only the action of the rule with the lower precedence value is performed.

- For JUNOSe policies, rules with equal precedence are evaluated in the order of creation.
- For JUNOS policies, rules with equal precedence are evaluated in random order. Precedence is not a factor for JUNOS SCHEDULER and JUNOS POLICER policy rules.

Value— One of the following:

- For JUNOS and JUNOSe policies, integer in the range 0–32767
- For PCMM policies, integer in the range 64–191
- Parameter of type prPrecedence

Default— 100
Editing Level—Basic

`application-accounting` *`application-accounting`*—(Optional) If PTSP application accounting is configured on the router, this attributed selects how application accounting is collected. Application accounting is maintained in a flat file on the router and is not collected by SRC.
Application-accounting and rule accounting are mutually exclusive.

Value—Text
Editing Level—Basic

`accounting`—(Optional) Specifies whether accounting data is collected for the actions specified in the rule.

If you specify that accounting data is collected, the SAE begins collecting accounting information when a service that uses the policy rule is activated. When the service is deactivated, the SAE sends the accounting records to the RADIUS accounting server or to a plug-in.

When you specify multiple actions for accounting, the SAE adds the accounting data for

individual actions together to obtain a summary accounting record for that interface direction.

Accounting is not available for all actions. For example, the NAT action does not provide accounting.

Value— One of the following:

- true—Accounting data is collected.
- false—Accounting data is not collected.

Default— false
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value— Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* color

Syntax

```
policies group name list name rule name color {
     color;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name color]
```

Release Information

Statement introduced in SRC Release 2.0.0

Description

Configure a color action. Use this action to specify the color that is applied to a packet when it passes through the router. You can configure color actions for JUNOSe policy rules.

color—(Optional) Color that is applied to a packet when it passes through the router.

Value— One of the following:

- Integer in the range 1–3
  - 1—green
  - 2—yellow
  - 3—red
- Parameter of type color

Default— No value
Editing Level—Basic

description *description*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* color-mark

Syntax

```
policies group name list name rule name color-mark {
     green-mark green-mark;
     yellow-mark yellow-mark;
     red-mark red-mark;
     mask mask;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name color-mark]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

Configure a color-mark action. Use this action to specify the mark value and mask for green, yellow and red packets. You can configure color-mark actions for JUNOSe policy rules.

`green-mark` *`green-mark`*—(Optional) Mark value for green packets.

Value— Integer in the range 0–255
Default— 0
Editing Level—Basic

`yellow-mark` *`yellow-mark`*—(Optional) Mark value for yellow packets.

Value— Integer in the range 0–255
Default— 0
Editing Level—Basic

`red-mark` *`red-mark`*—(Optional) Mark value for red packets.

Value— Integer in the range 0–255
Default— 0
Editing Level—Basic

`mask` *`mask`*—(Optional) Mask associated with the mark value.

Value— Integer values of 224, 252, 255 for JUNOSe; values of 224, 252 for JUNOS

For IPv4:

- 255 (tos)—Specifies the use of the whole 8 bits of the ToS byte; tos-byte range is 0–255.
- 252 (dsfield)—Specifies the use of the upper 6 bits of the ToS byte; tos-byte range is 0–63.
- 224 (precedence)—Specifies the use of the upper 3 bits of the ToS byte; tos-byte range is 0–7.

For IPv6:

- 255 (tcfield)—Specifies the use of the whole 8 bits of the traffic-class byte; tos-byte range is 0–255.
- 252 (dsfield)—Specifies the use of the upper 6 bits of the traffic-class byte; tos-byte range is 0–63.
- 224 (precedence)—Specifies the use of the upper 3 bits of the traffic-class byte; tos-byte range is 0–7.

Default— 255
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* docsis-best-effort

Syntax

```
policies group name list name rule name docsis-best-effort {
     traffic-priority traffic-priority;
     request-transmission-policy request-transmission-policy;
     maximum-sustained-rate maximum-sustained-rate;
     maximum-traffic-burst maximum-traffic-burst;
     minimum-reserved-rate minimum-reserved-rate;
     assumed-minimum-res-packet-size assumed-minimum-res-packet-size;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name docsis-best-effort]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a DOCSIS action that is set to best-effort service flow scheduling type. DOCSIS actions are for PCMM policy rules.

Options

`traffic-priority` *`traffic-priority`*—(Optional) Priority for the service flow. If two traffic flows are identical in all QoS parameters except priority, the higher-priority service flow is given preference.

Value— One of the following:

- Number in the range 0–7, where 0 is the lowest priority and 7 is the highest priority
- Parameter of type trafficPriority

Default— No value
Editing Level—Basic

`request-transmission-policy` *`request-transmission-policy`*—(Optional) Interval usage code that the cable modem uses for upstream transmission requests and packet

transmissions for this service flow. Specifies whether requests can be piggybacked with data. Also, for data packets transmitted on this service flow, specifies whether packets can be concatenated, fragmented, or have their payload headers suppressed. For UGS flows, this option also specifies how to treat packets that do not fit into the UGS grant.

Value— One of the following:

- 4-byte bit field; the valid range is 0–511
- Parameter of type requestTransmissionPolicy

Default— No value
Editing Level—Basic

`maximum-sustained-rate` *`maximum-sustained-rate`*—(Optional) Maximum sustained rate at which traffic can operate over the service flow.

Value— One of the following:

- Predefined global parameter interface_speed, which is the speed of the subscriber's DOCSIS interface
- Number of bytes in the range 0–4294967295
- Numeric expression
- Parameter of type rate

Default— No value
Editing Level—Basic

`maximum-traffic-burst` *`maximum-traffic-burst`*—(Optional) Maximum burst size for the service flow. This parameter has no effect unless you configure a nonzero value for the maximum sustained rate.

Value— One of the following:

- Predefined global parameter interface_speed, which is the speed of the subscriber's DOCSIS interface
- Number of bytes in the range 1522–4294967295
- Numeric expression
- Parameter of type burst

Default— No value
Editing Level—Basic

`minimum-reserved-rate` *`minimum-reserved-rate`*—(Optional) Guaranteed minimum rate that is reserved for the service flow.

Value— One of the following:

- Predefined global parameter interface_speed, which is the speed of the subscriber's DOCSIS interface
- Number of bits per second in the range 0–4294967295; a value of 0 means that no bandwidth is reserved for the service flow
- Numeric expression
- Parameter of type rate

Default— No value
Editing Level—Basic

`assumed-minimum-res-packet-size` *`assumed-minimum-res-packet-size`*—(Optional) Assumed minimum packet size for which the minimum reserved traffic rate is provided. If a packet is smaller than the assumed minimum packet size, the software treats the packet as if its size is equal to the value specified in this option.

Value— One of the following:

- Number of bytes in the range 0–65535
- Numeric expression
- Parameter of type packetLength

Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* docsis-down-stream

Syntax

```
policies group name list name rule name docsis-down-stream {
     traffic-priority traffic-priority;
     maximum-latency maximum-latency;
     maximum-sustained-rate maximum-sustained-rate;
     maximum-traffic-burst maximum-traffic-burst;
     minimum-reserved-rate minimum-reserved-rate;
     assumed-minimum-res-packet-size assumed-minimum-res-packet-size;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name docsis-down-stream]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a DOCSIS action that is set to downstream service flow scheduling type. DOCSIS actions are for PCMM policy rules.

Options

`traffic-priority` *`traffic-priority`*—(Optional) Priority for the service flow. If two traffic flows are identical in all QoS parameters except priority, the higher-priority service flow is given preference.

Value— One of the following:

- Number in the range 0–7, where 0 is the lowest priority and 7 is the highest priority
- Parameter of type trafficPriority

Default— No value
Editing Level—Basic

`maximum-latency` *`maximum-latency`*—(Optional) Maximum latency for downstream service flows. It is the maximum latency for a packet that passes through the CMTS device,

from the time that the CMTS device's network side interface receives the packet until the CMTS device forwards the packet on its radio frequency (RF) interface.

Value— One of the following:

- Number of microseconds in the range 0–4294967295
- Numeric expression
- Parameter of type maxLatency

Default— No value
Editing Level—Basic

`maximum-sustained-rate` *`maximum-sustained-rate`*—(Optional) Maximum sustained rate at which traffic can operate over the service flow.

Value— One of the following:

- Predefined global parameter interface_speed, which is the speed of the subscriber's DOCSIS interface
- Number of bytes in the range 0–4294967295
- Numeric expression
- Parameter of type rate

Default— No value
Editing Level—Basic

`maximum-traffic-burst` *`maximum-traffic-burst`*—(Optional) Maximum burst size for the service flow. This parameter has no effect unless you configure a nonzero value for the maximum sustained rate.

Value— One of the following:

- Predefined global parameter interface_speed, which is the speed of the subscriber's DOCSIS interface
- Number of bytes in the range 1522–4294967295
- Numeric expression
- Parameter of type burst

Default— No value
Editing Level—Basic

`minimum-reserved-rate` *`minimum-reserved-rate`*—(Optional) Guaranteed minimum rate that is reserved for the service flow.

Value— One of the following:

- Predefined global parameter interface_speed, which is the speed of the subscriber's DOCSIS interface
- Number of bits per second in the range 0–4294967295; a value of 0 means that no bandwidth is reserved for the service flow
- Numeric expression
- Parameter of type rate

Default— No value
Editing Level—Basic

`assumed-minimum-res-packet-size` *`assumed-minimum-res-packet-size`*—(Optional) Assumed minimum packet size for which the minimum reserved traffic rate is provided. If a packet is smaller than the assumed minimum packet size, the software treats the packet as if its size is equal to the value specified in this option.

Value— One of the following:

- Number of bytes in the range 0–65535
- Numeric expression
- Parameter of type packetLength

Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* docsis-non-real-time

Syntax

```
policies group name list name rule name docsis-non-real-time {
     traffic-priority traffic-priority;
     request-transmission-policy request-transmission-policy;
     maximum-sustained-rate maximum-sustained-rate;
     maximum-traffic-burst maximum-traffic-burst;
     minimum-reserved-rate minimum-reserved-rate;
     assumed-minimum-res-packet-size assumed-minimum-res-packet-size;
     nominal-polling-interval nominal-polling-interval;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name docsis-non-real-time]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a DOCSIS action that is set to non-real-time service flow scheduling type. DOCSIS actions are for PCMM policy rules.

Options

`traffic-priority` *`traffic-priority`*—(Optional) Priority for the service flow. If two traffic flows are identical in all QoS parameters except priority, the higher-priority service flow is given preference.

Value— One of the following:

- Number in the range 0–7, where 0 is the lowest priority and 7 is the highest priority
- Parameter of type trafficPriority

Default— No value
Editing Level—Basic

`request-transmission-policy` *`request-transmission-policy`*—(Optional)

Interval usage code that the cable modem uses for upstream transmission requests and packet transmissions for this service flow. Specifies whether requests can be piggybacked with data. Also, for data packets transmitted on this service flow, specifies whether packets can be concatenated, fragmented, or have their payload headers suppressed. For UGS flows, this option also specifies how to treat packets that do not fit into the UGS grant.

Value— One of the following:

- 4-byte bit field; the valid range is 0–511
- Parameter of type requestTransmissionPolicy

Default— No value
Editing Level—Basic

`maximum-sustained-rate` *`maximum-sustained-rate`*—(Optional) Maximum sustained rate at which traffic can operate over the service flow.

Value— One of the following:

- Predefined global parameter interface_speed, which is the speed of the subscriber's DOCSIS interface
- Number of bytes in the range 0–4294967295
- Numeric expression
- Parameter of type rate

Default— No value
Editing Level—Basic

`maximum-traffic-burst` *`maximum-traffic-burst`*—(Optional) Maximum burst size for the service flow. This parameter has no effect unless you configure a nonzero value for the maximum sustained rate.

Value— One of the following:

- Predefined global parameter interface_speed, which is the speed of the subscriber's DOCSIS interface
- Number of bytes in the range 1522–4294967295
- Numeric expression
- Parameter of type burst

Default— No value
Editing Level—Basic

`minimum-reserved-rate` *`minimum-reserved-rate`*—(Optional) Guaranteed minimum rate that is reserved for the service flow.

Value— One of the following:

- Predefined global parameter interface_speed, which is the speed of the subscriber's DOCSIS interface
- Number of bits per second in the range 0–4294967295; a value of 0 means that no bandwidth is reserved for the service flow
- Numeric expression
- Parameter of type rate

Default— No value
Editing Level—Basic

`assumed-minimum-res-packet-size` *`assumed-minimum-res-packet-size`*—(Optional) Assumed minimum packet size for which the minimum reserved traffic rate is provided. If a packet is smaller than the assumed minimum packet size, the software treats the packet as if its size is equal to the value specified in this option.

Value— One of the following:

- Number of bytes in the range 0–65535
- Numeric expression
- Parameter of type packetLength

Default— No value
Editing Level—Basic

`nominal-polling-interval` *`nominal-polling-interval`*—(Optional) Nominal interval between successive unicast request opportunities for this service flow.

Value— One of the following:

- Number of microseconds in the range 0–4294967295
- Numeric expression
- Parameter of type interval

Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* docsis-parameter

Syntax

```
policies group name list name rule name docsis-parameter {
     service-flow-type service-flow-type;
     traffic-priority traffic-priority;
     request-transmission-policy request-transmission-policy;
     maximum-sustained-rate maximum-sustained-rate;
     maximum-traffic-burst maximum-traffic-burst;
     minimum-reserved-rate minimum-reserved-rate;
     assumed-minimum-res-packet-size assumed-minimum-res-packet-size;
     maximum-latency maximum-latency;
     nominal-polling-interval nominal-polling-interval;
     tolerated-poll-jitter tolerated-poll-jitter;
     grant-size grant-size;
     grants-per-interval grants-per-interval;
     tolerated-grant-jitter tolerated-grant-jitter;
     nominal-grant-interval nominal-grant-interval;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name docsis-parameter]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a DOCSIS action with the service flow scheduling type set to a parameter. The parameter is a trafficProfileType parameter.

Options

`service-flow-type` *`service-flow-type`*— Parameter that is used to determine the service flow scheduling type.

Value— Parameter of type trafficProfileType. You must enter a parameter that has been created and has been committed.
Default— No value
Editing Level—Basic

`traffic-priority` *`traffic-priority`*—(Optional) Priority for the service flow. If two traffic flows are identical in all QoS parameters except priority, the higher-priority service flow is given preference.

Value— One of the following:

- Number in the range 0–7, where 0 is the lowest priority and 7 is the highest priority
- Parameter of type trafficPriority

Default— No value
Editing Level—Basic

`request-transmission-policy` *`request-transmission-policy`*—(Optional) Interval usage code that the cable modem uses for upstream transmission requests and packet transmissions for this service flow. Specifies whether requests can be piggybacked with data. Also, for data packets transmitted on this service flow, specifies whether packets can be concatenated, fragmented, or have their payload headers suppressed. For UGS flows, this option also specifies how to treat packets that do not fit into the UGS grant.

Value— One of the following:

- 4-byte bit field; the valid range is 0–511
- Parameter of type requestTransmissionPolicy

Default— No value
Editing Level—Basic

`maximum-sustained-rate` *`maximum-sustained-rate`*—(Optional) Maximum sustained rate at which traffic can operate over the service flow.

Value— One of the following:

- Predefined global parameter interface_speed, which is the speed of the subscriber's DOCSIS interface
- Number of bytes in the range 0–4294967295
- Numeric expression
- Parameter of type rate

Default— No value
Editing Level—Basic

`maximum-traffic-burst` *`maximum-traffic-burst`*—(Optional) Maximum burst size for the service flow. This parameter has no effect unless you configure a nonzero value for the maximum sustained rate.

Value— One of the following:

- Predefined global parameter interface_speed, which is the speed of the subscriber's DOCSIS interface
- Number of bytes in the range 1522–4294967295
- Numeric expression
- Parameter of type burst

Default— No value
Editing Level—Basic

`minimum-reserved-rate` *`minimum-reserved-rate`*—(Optional) Guaranteed minimum rate that is reserved for the service flow.

Value— One of the following:

- Predefined global parameter interface_speed, which is the speed of the subscriber's DOCSIS interface
- Number of bits per second in the range 0–4294967295; a value of 0 means that no bandwidth is reserved for the service flow
- Numeric expression
- Parameter of type rate

Default— No value
Editing Level—Basic

`assumed-minimum-res-packet-size` *`assumed-minimum-res-packet-size`*—(Optional) Assumed minimum packet size for which the minimum reserved traffic rate is provided. If a packet is smaller than the assumed minimum packet size, the software treats the packet as if its size is equal to the value specified in this option.

Value— One of the following:

- Number of bytes in the range 0–65535
- Numeric expression
- Parameter of type packetLength

Default— No value
Editing Level—Basic

`maximum-latency` *`maximum-latency`*—(Optional) Maximum latency for downstream service flows. It is the maximum latency for a packet that passes through the CMTS device, from the time that the CMTS device's network side interface receives the packet until the CMTS device forwards the packet on its radio frequency (RF) interface.

Value— One of the following:

- Number of microseconds in the range 0–4294967295
- Numeric expression
- Parameter of type maxLatency

Default— No value
Editing Level—Basic

`nominal-polling-interval` *`nominal-polling-interval`*—(Optional) Nominal interval between successive unicast request opportunities for this service flow.

Value— One of the following:

- Number of microseconds in the range 0–4294967295
- Numeric expression
- Parameter of type interval

Default— No value
Editing Level—Basic

`tolerated-poll-jitter` *`tolerated-poll-jitter`*—(Optional) Maximum amount of time that unicast request intervals can be delayed beyond the nominal polling interval. Delaying requests allows the service flow scheduler to fit as much data as possible in an upstream packet, thereby reducing fragmentation.

Value— One of the following:

- Number of microseconds in the range 0–4294967295
- Numeric expression
- Parameter of type jitter

Default— No value
Editing Level—Basic

`grant-size` *`grant-size`*—(Optional) Size of the individual data grants provided to the service flow.

Value— One of the following:

- Number of bytes in the range 0–65535
- Numeric expression

- Parameter of type grantSize

Default— No value
Editing Level—Basic

`grants-per-interval` *`grants-per-interval`*—(Optional) Actual number of data grants given to the service flow during each nominal grant interval.

Value— One of the following:

- Integer in the range 0–127
- Numeric expression
- Parameter of type interval

Default— No value
Editing Level—Basic

`tolerated-grant-jitter` *`tolerated-grant-jitter`*—(Optional) Maximum amount of time that the transmission opportunities can be delayed beyond the nominal grant interval. A jitter buffer can stop latency, but an improperly sized buffer can cause additional latency.

Value— One of the following:

- Number of microseconds in the range 0–4294967295
- Numeric expression
- Parameter of type jitter

Default— No value
Editing Level—Basic

`nominal-grant-interval` *`nominal-grant-interval`*—(Optional) Nominal interval between successive unsolicited data grant opportunities for this service flow.

Value— One of the following:

- Number of microseconds in the range 0–4294967295
- Numeric expression
- Parameter of type interval

Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* docsis-real-time

Syntax

```
policies group name list name rule name docsis-real-time {
     request-transmission-policy request-transmission-policy;
     maximum-sustained-rate maximum-sustained-rate;
     maximum-traffic-burst maximum-traffic-burst;
     minimum-reserved-rate minimum-reserved-rate;
     assumed-minimum-res-packet-size assumed-minimum-res-packet-size;
     nominal-polling-interval nominal-polling-interval;
     tolerated-poll-jitter tolerated-poll-jitter;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name docsis-real-time]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a DOCSIS action that is set to real-time service flow scheduling type. DOCSIS actions are for PCMM policy rules.

Options

`request-transmission-policy` *`request-transmission-policy`*—(Optional)
Interval usage code that the cable modem uses for upstream transmission requests and packet transmissions for this service flow. Specifies whether requests can be piggybacked with data. Also, for data packets transmitted on this service flow, specifies whether packets can be concatenated, fragmented, or have their payload headers suppressed. For UGS flows, this option also specifies how to treat packets that do not fit into the UGS grant.

Value— One of the following:

- 4-byte bit field; the valid range is 0–511
- Parameter of type requestTransmissionPolicy

Default— No value
Editing Level—Basic

`maximum-sustained-rate` *`maximum-sustained-rate`*—(Optional) Maximum sustained rate at which traffic can operate over the service flow.

Value— One of the following:

- Predefined global parameter interface_speed, which is the speed of the subscriber's DOCSIS interface
- Number of bytes in the range 0–4294967295
- Numeric expression
- Parameter of type rate

Default— No value
Editing Level—Basic

`maximum-traffic-burst` *`maximum-traffic-burst`*—(Optional) Maximum burst size for the service flow. This parameter has no effect unless you configure a nonzero value for the maximum sustained rate.

Value— One of the following:

- Predefined global parameter interface_speed, which is the speed of the subscriber's DOCSIS interface
- Number of bytes in the range 1522–4294967295
- Numeric expression
- Parameter of type burst

Default— No value
Editing Level—Basic

`minimum-reserved-rate` *`minimum-reserved-rate`*—(Optional) Guaranteed minimum rate that is reserved for the service flow.

Value— One of the following:

- Predefined global parameter interface_speed, which is the speed of the subscriber's DOCSIS interface
- Number of bits per second in the range 0–4294967295; a value of 0 means that no bandwidth is reserved for the service flow
- Numeric expression
- Parameter of type rate

Default— No value
Editing Level—Basic

`assumed-minimum-res-packet-size` *`assumed-minimum-res-packet-size`*—(Optional) Assumed minimum packet size for which the minimum reserved traffic rate is provided. If a packet is smaller than the assumed minimum packet size, the software treats the packet as if its size is equal to the value specified in this option.

Value— One of the following:

- Number of bytes in the range 0–65535
- Numeric expression
- Parameter of type packetLength

Default— No value
Editing Level—Basic

`nominal-polling-interval` *`nominal-polling-interval`*—(Optional) Nominal interval between successive unicast request opportunities for this service flow.

Value— One of the following:

- Number of microseconds in the range 0–4294967295
- Numeric expression
- Parameter of type interval

Default— No value
Editing Level—Basic

`tolerated-poll-jitter` *`tolerated-poll-jitter`*—(Optional) Maximum amount of time that unicast request intervals can be delayed beyond the nominal polling interval. Delaying requests allows the service flow scheduler to fit as much data as possible in an upstream packet, thereby reducing fragmentation.

Value— One of the following:

- Number of microseconds in the range 0–4294967295
- Numeric expression
- Parameter of type jitter

Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value

Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* docsis-unsolicited-grant-ad

Syntax

```
policies group name list name rule name docsis-unsolicited-grant-ad {
     request-transmission-policy request-transmission-policy;
     nominal-polling-interval nominal-polling-interval;
     grant-size grant-size;
     grants-per-interval grants-per-interval;
     tolerated-grant-jitter tolerated-grant-jitter;
     nominal-grant-interval nominal-grant-interval;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name docsis-unsolicited-grant-ad]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a DOCSIS action that is set to unsolicited grant service with activity detection (UGS-AD) service flow scheduling type. DOCSIS actions are for PCMM policy rules.

Options

`request-transmission-policy` *`request-transmission-policy`*—(Optional)
Interval usage code that the cable modem uses for upstream transmission requests and packet transmissions for this service flow. Specifies whether requests can be piggybacked with data. Also, for data packets transmitted on this service flow, specifies whether packets can be concatenated, fragmented, or have their payload headers suppressed. For UGS flows, this option also specifies how to treat packets that do not fit into the UGS grant.

Value— One of the following:

- 4-byte bit field; the valid range is 0–511
- Parameter of type requestTransmissionPolicy

Default— No value
Editing Level—Basic

`nominal-polling-interval` *`nominal-polling-interval`*—(Optional) Nominal interval between successive unicast request opportunities for this service flow.

Value— One of the following:

- Number of microseconds in the range 0–4294967295
- Numeric expression
- Parameter of type interval

Default— No value
Editing Level—Basic

`grant-size` *`grant-size`*—(Optional) Size of the individual data grants provided to the service flow.

Value— One of the following:

- Number of bytes in the range 0–65535
- Numeric expression
- Parameter of type grantSize

Default— No value
Editing Level—Basic

`grants-per-interval` *`grants-per-interval`*—(Optional) Actual number of data grants given to the service flow during each nominal grant interval.

Value— One of the following:

- Integer in the range 0–127
- Numeric expression
- Parameter of type interval

Default— No value
Editing Level—Basic

`tolerated-grant-jitter` *`tolerated-grant-jitter`*—(Optional) Maximum amount of time that the transmission opportunities can be delayed beyond the nominal grant interval. A jitter buffer can stop latency, but an improperly sized buffer can cause additional latency.

Value— One of the following:

- Number of microseconds in the range 0–4294967295
- Numeric expression
- Parameter of type jitter

Default— No value
Editing Level—Basic

`nominal-grant-interval` *`nominal-grant-interval`*—(Optional) Nominal interval between successive unsolicited data grant opportunities for this service flow.

Value— One of the following:

- Number of microseconds in the range 0–4294967295
- Numeric expression
- Parameter of type interval

Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* docsis-unsolicited-grant

Syntax

```
policies group name list name rule name docsis-unsolicited-grant {
     request-transmission-policy request-transmission-policy;
     grant-size grant-size;
     grants-per-interval grants-per-interval;
     tolerated-grant-jitter tolerated-grant-jitter;
     nominal-grant-interval nominal-grant-interval;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name docsis-unsolicited-grant]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a DOCSIS action that is set to unsolicited grant (UGS) service flow scheduling type. DOCSIS actions are for PCMM policy rules.

Options

`request-transmission-policy` *`request-transmission-policy`*—(Optional) Interval usage code that the cable modem uses for upstream transmission requests and packet transmissions for this service flow. Specifies whether requests can be piggybacked with data. Also, for data packets transmitted on this service flow, specifies whether packets can be concatenated, fragmented, or have their payload headers suppressed. For UGS flows, this option also specifies how to treat packets that do not fit into the UGS grant.

Value— One of the following:

- 4-byte bit field; the valid range is 0–511
- Parameter of type requestTransmissionPolicy

Default— No value
Editing Level—Basic

`grant-size` *`grant-size`*—(Optional) Size of the individual data grants provided to the

service flow.

Value— One of the following:

- Number of bytes in the range 0–65535
- Numeric expression
- Parameter of type grantSize

Default— No value
Editing Level—Basic

`grants-per-interval` *`grants-per-interval`*—(Optional) Actual number of data grants given to the service flow during each nominal grant interval.

Value— One of the following:

- Integer in the range 0–127
- Numeric expression
- Parameter of type interval

Default— No value
Editing Level—Basic

`tolerated-grant-jitter` *`tolerated-grant-jitter`*—(Optional) Maximum amount of time that the transmission opportunities can be delayed beyond the nominal grant interval. A jitter buffer can stop latency, but an improperly sized buffer can cause additional latency.

Value— One of the following:

- Number of microseconds in the range 0–4294967295
- Numeric expression
- Parameter of type jitter

Default— No value
Editing Level—Basic

`nominal-grant-interval` *`nominal-grant-interval`*—(Optional) Nominal interval between successive unsolicited data grant opportunities for this service flow.

Value— One of the following:

- Number of microseconds in the range 0–4294967295
- Numeric expression
- Parameter of type interval

Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* dynamic-profile

Syntax

```
policies group name list name rule name dynamic-profile {
     profile-name profile-name;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name dynamic-profile]
```

Release Information

Statement introduced in SRC Release 3.2.0

Description

Configure a dynamic profile action.

Options

`profile-name` *`profile-name`*— Name of dynamic profile to activate.

Value— Text
Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* dynamic-profile variables

Syntax

```
policies group name list name rule name dynamic-profile variables name {
     value value;
     type type;
}
```

Hierarchy Level

```
[edit policies group name list name rule name dynamic-profile variables]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure the parameters used by the action.

Options

`name name`— Name of parameter.

Value— Text

`value value`— Value for a variable.

Value— Text
Default— No value
Editing Level—Basic

`type type`—(Optional) Type of parameter, which determines where the variable is used.

Value— See the policy documentation in the *SRC PE Services and Policies Guide* for a list of parameter types, where each type of parameter is used, and what each parameter is used to specify. Variable types are mapped to parameter types.
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* exception-application

Syntax

```
policies group name list name rule name exception-application {
     application-type application-type;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name exception-application]
```

Release Information

Statement introduced in SRC Release 2.1.0

Description

Specify exceptions to a policy rule to identify the client application that is a destination for packets Use this action in policy rules for JUNOSe routers.

Options

`application-type` *`application-type`*— Specify the type of application to receive packets to which the exception action applies.

Value—
Default— http
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* filter

Syntax

```
policies group name list name rule name filter {
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name filter]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a filter action. Use this action to discard packets. You can configure filter actions for JUNOS filters and JUNOSe policy rules.

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* flow-spec

Syntax

```
policies group name list name rule name flow-spec {
     service-type service-type;
     token-bucket-rate token-bucket-rate;
     token-bucket-size token-bucket-size;
     peak-data-rate peak-data-rate;
     minimum-policed-unit minimum-policed-unit;
     maximum-packet-size maximum-packet-size;
     rate rate;
     slack-term slack-term;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name flow-spec]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a FlowSpec action, which uses an RSVP-style FlowSpec to specify a traffic profile. A FlowSpec is made up of two parts, a traffic specification (TSpec) and a service request specification (RSpec). The TSpec describes the traffic requirements for the flow, and the RSpec specifies resource requirements for the desired service. You can configure FlowSpec actions for PCMM policy rules.

`service-type` *`service-type`*—(Optional) Type of FlowSpec service.

Value— One of the following:

- 2—guaranteed_service, which provides both bandwidth and latency and delay guarantees. A guaranteed service can contain both TSpec and RSpec parameters.
- 5—controlled_load_service, which provides minimum bandwidth guarantees, but not latency and delay guarantees. A controlled-load service can contain only TSpec token-bucket parameters, and not RSpec parameters.
- Parameter of type serviceNumber

Default— No value
Editing Level—Basic

`token-bucket-rate` *`token-bucket-rate`*—(Optional) Guaranteed minimum rate that is reserved for the service flow. Token bucket rate is a TSpec parameter.

Value— One of the following:

- Predefined global parameter interface_speed, which is the speed of the subscriber's DOCSIS interface
- Number of bits per second in the range 0–4294967295
- Numeric expression
- Parameter of type rate

Default— No value
Editing Level—Basic

`token-bucket-size` *`token-bucket-size`*—(Optional) Maximum burst size for the service flow. Token bucket size is a TSpec parameter.

Value— One of the following:

- Number of bits per second in the range 1522–4294967295
- Numeric expression
- Parameter of type tokenBucketSize

Default— No value
Editing Level—Basic

`peak-data-rate` *`peak-data-rate`*—(Optional) Amount of bandwidth over the committed rate that is allocated to accommodate excess traffic flow over the committed rate. Peak data rate is a TSpec parameter.

Value— One of the following:

- Predefined global parameter interface_speed, which is the speed of the subscriber's DOCSIS interface
- Number of bits per second in the range 0–4294967295
- Numeric expression
- Parameter of type rate

Default— No value
Editing Level—Basic

`minimum-policed-unit` *`minimum-policed-unit`*—(Optional) Assumed minimum-

reserved-rate packet size. If a packet is smaller than the minimum policed unit, the software treats the packet as if its size is equal to the value specified in this option. Minimum policed unit is a TSpec parameter.

Value— One of the following:

- Number of bytes in the range 0–65535
- Numeric expression
- Parameter of type policedUnit

Default— No value
Editing Level—Basic

`maximum-packet-size` *`maximum-packet-size`*—(Optional) Maximum packet size for the FlowSpec. Maximum packet size is a TSpec parameter.

Value— One of the following:

- Number of bytes in the range 0–4294967295
- Numeric expression
- Parameter of type packetLength

Default— No value
Editing Level—Basic

`rate` *`rate`*—(Optional) Average rate. Rate is an RSpec parameter.

Value— One of the following:

- Predefined global parameter interface_speed—Speed of the subscriber's DOCSIS interface
- Number of bits per second in the range 0–4294967295
- Numeric expression
- Parameter of type rate

Default— No value
Editing Level—Basic

`slack-term` *`slack-term`*—(Optional) Amount of slack in the bandwidth reservation that can be used without redefining the reservation. Slack is the difference between the desired delay and the actual delay obtained with the current bandwidth reservation. It allows some flexibility in bandwidth reservations. Slack term is an RSpec parameter.

Value— One of the following:

- Integer in the range 0–4294967295
- Numeric expression
- Parameter of type slackTerm

Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* forward

Syntax

```
policies group name list name rule name forward {
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name forward]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a forward action. Use this action to forward packets, such as packets that are sent by means of a routing table. You can configure forward actions for JUNOS filters and JUNOSe policy rules.

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* forwarding-class

Syntax

```
policies group name list name rule name forwarding-class {
     forwarding-class;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name forwarding-class]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a forwarding class action. The forwarding class action causes the router to assign a forwarding class to packets that match the associated classify-traffic condition. You can configure forwarding class actions for JUNOS filter policy rules.

forwarding-class—(Optional) Name of the forwarding class assigned to packets.

Value— One of the following:

- String expression that matches a forwarding class that is configured on the router. Be sure to include quotation marks. For example:
  - "assured-forwarding"
  - "best-effort"
  - "expedited-forwarding"
  - "network-control"
- Parameter of type forwardingClass

Default— No value
Editing Level—Basic

description *description*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* forwarding-instance

Syntax

```
policies group name list name rule name forwarding-instance {
     forwarding-instance;
     forwarding-unit forwarding-unit;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name forwarding-instance]
```

Release Information

Statement introduced in SRC Release bitter

Description

Specifies a forwarding instance to assign to flows matching this policy. Allowed values are "__same__", or one of the forwarding instances configured in the router. The value "__same__" is interpreted to mean no change, i.e., the flow is forwarded in whatever forwarding instance it comes in or set from static configuration.

Options

forwarding-instance—(Optional) Name of the forwarding instance assigned to packets.

Value— One of the following:

- String expression that matches a forwarding instance that is configured on the router. Be sure to include quotation marks. For example:
  - "assured-forwarding"
  - "best-effort"
  - "expedited-forwarding"
  - "__same__"
- Parameter of type forwardingInstance

Default— No value
Editing Level—Basic

forwarding-unit *forwarding-unit*—(Optional) Specifies the multi-service interface unit number to forward flows to in order to reach the forwarding instance specified by attribute

forwarding-instance. Note that there is only a very loosed coupling between this unit number and the forwarding instance. The binding between them only happens with the aid of additional router configuration.

Value—Text
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* gate-spec

Syntax

```
policies group name list name rule name gate-spec {
     session-class-id-priority session-class-id-priority;
     session-class-id-preemption session-class-id-preemption;
     session-class-id-configurable session-class-id-configurable;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name gate-spec]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a GateSpec action. Use the GateSpec action to specify the session class ID for a gate. You can configure GateSpec actions for PCMM policy rules.

The session class ID provides a way for the application manager and the policy server to group gates into classes with different authorization characteristics. A CMTS device can perform authorization based not only on the requested QoS and the gate's authorized flow specification (FlowSpec), but also on the session class ID specified in the GateSpec. For example, you could use the session class ID to represent a prioritization scheme that allows either the policy server or the CMTS device to preempt a preauthorized gate in favor of allowing a new gate with a higher priority to be authorized.

`session-class-id-priority` *`session-class-id-priority`*—(Optional) Priority bits in the session class ID. The priority field describes the relative importance of the session as compared with other sessions generated by the same policy decision point.

Value— One of the following:

- Number in the range 0–7, where 0 is low priority and 7 is high priority
- String expression
- Parameter of type sessionClassIdPriority

Default— No value
Editing Level—Basic

`session-class-id-preemption` *`session-class-id-preemption`*—(Optional) Preemption bit in the session class ID. Use the preemption bit to allocate bandwidth to lower-priority sessions.

Value— One of the following:

- 0—Enables preemption
- 1—Disables preemption
- String expression
- Parameter of type sessionClassIdPreemption

Default— No value
Editing Level—Basic

`session-class-id-configurable` *`session-class-id-configurable`*—(Optional) Configurable bit in the session class ID. Application managers that provide novel services may use this value to specify new session classes. Use this option if your policy server supports configurable policies based on this value or if your CMTS device implements a novel session class based on this value.

Value— One of the following:

- Number in the range 0–15
- String expression
- Parameter of type sessionClassIdConfigurable

Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* http-redirect

Syntax

```
policies group name list name rule name http-redirect {
     subscriber-url subscriber-url;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name http-redirect]
```

Release Information

Statement introduced in SRC Release 2.1.0

Description

Specify a destination URL to which subscriber traffic is redirected. Use this action in policy rules for JUNOSe routers.

Options

`subscriber-url` *`subscriber-url`*—(Optional) Destination URL for redirected Web traffic.

You can use the exception-application action to specify exceptions to a rule to identify the client, in this case HTTP, application that is a destination for packets.

Value— Literal string or parameter of type url
Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* loss-priority

Syntax

```
policies group name list name rule name loss-priority {
     loss-priority;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name loss-priority]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a loss priority action. The loss priority action causes the router to assign a packet loss priority to packets that match the associated classify-traffic condition. You can configure loss priority actions for JUNOS filter policy rules.

loss-priority—(Optional) Packet loss priority.

Value— One of the following:

- Predefined global parameter:
  - any_priority—Sets the packet loss priority to "any." Do not select this value for loss priority actions. In this context, a value of any_priority is not valid.
  - high_priority—Sets the packet loss priority to high
  - low_priority—Sets the packet loss priority to low
- String expression that matches valid values on the router; for example, "high" or "low"
- Parameter of type packetLossPriority

Default— No value
Editing Level—Basic

description *description*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* mark

Syntax

```
policies group name list name rule name mark {
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name mark]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a mark action. Use this action to mark packets. You can configure mark actions for JUNOSe and PCMM policy rules.

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* mark info

Syntax

```
policies group name list name rule name mark info {
     value value;
     mask mask;
}
```

Hierarchy Level

```
[edit policies group name list name rule name mark info]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the mark value and mark mask for mark actions.

Options

`value value`—(Optional) For IPv4 packets, sets the ToS field in the IP header. For IPv6 packets, sets the traffic-class field in the IP header.

Value— One of the following:

- Integer in the range 0–255
- Parameter of type tosByteMask

Default— 0
Editing Level—Basic

`mask mask`—(Optional) Mask associated with the mark value.

Note: If you configure more than one mark action in a rate limit— for example, for a committed, conformed, or exceed action— configure the same mask for each action. If you use different masks, the results can be unpredictable.

Value— One of the following:

- Integer values of 224, 252, 255

For IPv4:

- 255 (tos)—Specifies the use of the whole 8 bits of the ToS byte; tos-byte range is 0–255.
- 252 (dsfield)—Specifies the use of the upper 6 bits of the ToS byte; tos-byte range is 0–63.
- 224 (precedence)—Specifies the use of the upper 3 bits of the ToS byte; tos-byte range is 0–7.

For IPv6:

- 255 (tcfield)—Specifies the use of the whole 8 bits of the traffic-class byte; tos-byte range is 0–255.
- 252 (dsfield)—Specifies the use of the upper 6 bits of the traffic-class byte; tos-byte range is 0–63.
- 224 (precedence)—Specifies the use of the upper 3 bits of the traffic-class byte; tos-byte range is 0–7.

- Parameter of type tosByteMask

Default— 255
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* nat

Syntax

```
policies group name list name rule name nat {
     translation-type translation-type;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name nat]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a NAT action. You can configure NAT actions for JUNOS ASP policy rules.

Options

`translation-type` *`translation-type`*—(Optional) Type of network address translation that is used.

Value— One of the following:

- String expression that matches a NAT type on the router; for example:
  - "destination static"—Implements address translation for destination traffic without port translation; makes selected private servers accessible
  - "source dynamic"—Implements address translation for source traffic with port translation
  - "source static"—Implements address translation for source traffic without port mapping
- Parameter of type natTranslationType

Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* nat ip-network group-network

Syntax

```
policies group name list name rule name nat ip-network group-network {
     network-specifier network-specifier;
}
```

Hierarchy Level

```
[edit policies group name list name rule name nat ip-network group-network]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configuration of the network specifier for the NAT action.

`network-specifier` *`network-specifier`*—(Optional) Specifies an IP address and mask.

Value— Specify the subnet in one of the following formats:

- [not] < address > / < mask > or < address > / < prefix length >
  - Include *not* to indicate that the condition matches every address that is not in the specified subnet.
  - < prefix length > is a number in the range 0–32, and specifies how many of the first bits in the address specify the network
- For JUNOS ASP policies, you must enter network in the format: < address > / < prefix length >

Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* nat port

Syntax

```
policies group name list name rule name nat port {
     from-port from-port;
}
```

Hierarchy Level

```
[edit policies group name list name rule name nat port]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the port range for the NAT action.

Options

`from-port` *`from-port`*—(Optional) Port range to restrict port translation when NAT is configured in dynamic-source mode.

Value— One of the following:

- service_port—A predefined global parameter that is the port of the service as specified by the service object
- Integer in the range 0–64000
- Numeric expression that indicates a range of ports; for example, 2010..2020
- 0..65535—Provides the same effect as the automatic option. JUNOS routing platforms support a port option called automatic, which means that it is a router-assigned port.
- Parameter of type port

Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* next-hop

Syntax

```
policies group name list name rule name next-hop {
     next-hop-address next-hop-address;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name next-hop]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a next-hop action. Use this action for the ingress side of the interface to specify the next IP address where the classified packets should go. You can configure next-hop actions for JUNOS filters and JUNOSe policy rules.

`next-hop-address` *`next-hop-address`*—(Optional) Address of next hop through which to send traffic.

Value— One of the following:

- IP address
- Predefined global parameter:
  - gateway_ipAddress—IP address of the gateway as specified by the service object
  - interface_ipAddress—IP address of the router interface
  - service_ipAddress—IP address of the service as specified by the service object
  - user_ipAddress—IP address of the subscriber
  - virtual_ipAddress—Virtual portal address of the SAE that is used in redundant redirect server installations
- Parameter of type address

Default— 0
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* next-interface

Syntax

```
policies group name list name rule name next-interface {
     interface-specifier interface-specifier;
     next-hop-address next-hop-address;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name next-interface]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a next-interface action. Use this action to forward packets to a particular interface and/or a next-hop address. You can configure next-interface actions for JUNOS filters and JUNOSe policy rules. On JUNOSe routers, you can use this action for both ingress and egress sides of the interface.

`interface-specifier` *`interface-specifier`*— IP interface to be used as the next interface for packets.

Value— One of the following:

- For JUNOSe interfaces, enter interface specifiers in the format:

  ' < type of specifier > = < value > '

  where < type of specifier > is the interface name, alias, description, or UID.

  For example: name = 'fastEthernet3/0'

  For lists of valid interface specifiers for JUNOSe routers, see "Interface Types and Specifiers" in the JUNOSe Command Reference Guides.

- For JUNOS interfaces, enter interface specifiers in the format:

'name = < mediatype > - < slot > / < pic > / < port > . < unit > '

For example: 'name = AT-0/1/0.0'

- Predefined global parameter:
  - bfwIf (interface that leads to the bronze firewall server)
  - gfwIf (interface that leads to gold firewall server).
- Parameter of type interfaceSpec

Default— No value
Editing Level—Basic

`next-hop-address` *`next-hop-address`*—(Optional) Address of next hop through which to send traffic.

Value— One of the following:

- IP address
- Predefined global parameter:
  - gateway_ipAddress—IP address of the gateway as specified by the service object
  - interface_ipAddress—IP address of the router interface
  - service_ipAddress—IP address of the service as specified by the service object
  - user_ipAddress—IP address of the subscriber
  - virtual_ipAddress—Virtual portal address of the SAE that is used in redundant redirect server installations
- Parameter of type address

Default— 0
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* next-rule

Syntax

```
policies group name list name rule name next-rule {
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name next-rule]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a next-rule action. If a packet matches the classify-traffic condition, the next-rule action causes the router to continue to the next rule in the policy list for evaluation. You can configure next-rule actions for JUNOS filter policy rules.

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* policer

Syntax

```
policies group name list name rule name policer {
     bandwidth-limit bandwidth-limit;
     bandwidth-limit-unit bandwidth-limit-unit;
     burst burst;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name policer]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a policer action. The policer action specifies rate and burst size limits and the action taken if a packet exceeds those limits. You can create policer actions in JUNOS policer and JUNOS filter policy rules.

`bandwidth-limit` *`bandwidth-limit`*—(Optional) Traffic rate, that if exceeded, causes the router to take the indicated packet action.

Value— One of the following:

- Predefined global parameter interface_speed, which is the speed of the subscriber's router interface.
- Bits per second in the range 32000–32000000000
- Percentage of bandwidth (1–100)
- Numeric expression
- Parameter of type rate

Default— No value
Editing Level—Basic

`bandwidth-limit-unit` *`bandwidth-limit-unit`*—(Optional) Indicates the type of value that you entered for bandwidth limit.

Value— One of the following:

- Predefined global parameter:
  - bps—Value entered for bandwidth limit is bps
  - percent—Value entered for bandwidth limit is a percentage of the port speed
- String expression
- Parameter of type bandwidthSizeUnit

Default— No value
Editing Level—Basic

`burst` *`burst`*—(Optional) Maximum burst size. The minimum recommended value is the maximum transmission unit (MTU) of the IP packets being policed.

Value— One of the following:

- Number of bytes
- Numeric expression; for example 8*64000
- Parameter of type burst

Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* policer packet-action

Syntax

```
policies group name list name rule name policer packet-action name ...
```

Hierarchy Level

```
[edit policies group name list name rule name policer packet-action]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the action taken on a packet.

Options

name *name*— Name for the action that is taken on packets that exceed the rate and burst size limits specified in the policer action.

Value— Text

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* policer packet-action *name* filter

Syntax

```
policies group name list name rule name policer packet-action name filter {
}
```

Hierarchy Level

```
[edit policies group name list name rule name policer packet-action name filter]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Specify that if the traffic flow exceeds the bandwidth and burst rate limits, the packet is dropped.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* policer packet-action *name* forwarding-class

Syntax

```
policies group name list name rule name policer packet-action name forwarding-
class {
     forwarding-class;
}
```

Hierarchy Level

```
[edit policies group name list name rule name policer packet-
action name forwarding-class]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Specify that if the traffic flow exceeds the bandwidth and burst rate limits, it is assigned to a forwarding class.

forwarding-class—(Optional) Name of the forwarding class assigned to packets.

Value— One of the following:

- String expression that matches a forwarding class that is configured on the router. Be sure to include quotation marks. For example:
  - "assured-forwarding"
  - "best-effort"
  - "expedited-forwarding"
  - "network-control"
- Parameter of type forwardingClass

Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* policer packet-action *name* loss-priority

Syntax

```
policies group name list name rule name policer packet-action name loss-priority {
     loss-priority;
}
```

Hierarchy Level

```
[edit policies group name list name rule name policer packet-action name loss-
priority]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

For a policer action, set the loss priority level as the action taken on a packet that exceeds its rate limit.

loss-priority—(Optional) Packet loss priority.

Value— One of the following:

- Predefined global parameter:
  - any_priority—Sets the packet loss priority to "any." Do not select this value for loss priority actions. In this context, a value of any_priority is not valid.
  - high_priority—Sets the packet loss priority to high
  - low_priority—Sets the packet loss priority to low
- String expression that matches valid values on the router; for example, "high" or "low"
- Parameter of type packetLossPriority

Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* policer packet-action *name* parameter

Syntax

```
policies group name list name rule name policer packet-action name parameter {
     action action;
}
```

Hierarchy Level

```
[edit policies group name list name rule name policer packet-
action name parameter]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Specify that if the traffic flow exceeds the bandwidth and burst rate limits, the action specified by the parameter is applied.

`action` *`action`*—(Optional) Parameter that specifies the action to take on traffic.

Value— Parameter of type packetOperation.
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* policer-ref

Syntax

```
policies group name list name rule name policer-ref {
     policer-name;
}
```

Hierarchy Level

```
[edit policies group name list name rule name policer-ref]
```

Release Information

Statement introduced in SRC Release bitter

Description

Police the matching flow using the named policer instance.

Options

policer-name—(Optional) Name of the policer.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* qos-attach

Syntax

```
policies group name list name rule name qos-attach {
     qos-profile qos-profile;
     qos-parameters qos-parameters;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name qos-attach]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a QoS attachment action. Use this action to specify the name of the QoS profile and the QoS parameters list to attach to the router interface when this action is taken. You can configure QoS profile attachment actions for JUNOSe policy rules.

`qos-profile` *`qos-profile`*— Name of the QoS profile to attach to the JUNOSe interface when this action is taken.

Value— One of the following:

- Name of a QoS profile that is configured on the router. Enclose the name in quotation marks. For example: "qp-vod-1024".
- Parameter of type qosProfileSpec.

Default— No value
Editing Level—Basic

`qos-parameters` *`qos-parameters`*—(Optional) Name-value pairs of the QoS parameters to attach to the interface when this action is taken. The parameters are configured on the JUNOSe router and referenced in the scheduler profiles referred to by the QoS profile.

Value— One of the following:

- Name-value pair that defines QoS parameter; map expressions define multiple QoS parameters.

Maps are a list of parameterName = parameterValue pairs separated by commas and enclosed in curly brackets. For example, the map {max-bw = 512000, shape-rate = 1000000} supplies two QoS parameters.

- Parameter of type map.

Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* qos-condition

Syntax

```
policies group name list name rule name qos-condition name {
     forwarding-class forwarding-class;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name qos-condition]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a QoS condition. You can create QoS conditions within JUNOS scheduler policy rules.

Options

`name` *`name`*— Name for the QoS condition.

Value— Text

`forwarding-class` *`forwarding-class`*—(Optional) Matches packets based on forwarding class

Value— One of the following:

- String expression that matches forwarding classes that are configured on the router. Be sure to include quotation marks. For example:
  - "assured-forwarding"
  - "best-effort"
  - "expedited-forwarding"
  - "network-control"
- Parameter of type forwardingClass

Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* rate-limit

Syntax

```
policies group name list name rule name rate-limit {
     support-hierarchical;
     type type;
     committed-rate committed-rate;
     committed-burst committed-burst;
     peak-rate peak-rate;
     peak-burst peak-burst;
     excess-burst excess-burst;
     color-aware;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name rate-limit]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a rate-limit action. Use this action to define the quality of service. You can configure rate-limit actions for JUNOSe policy rules.

Options

`support-hierarchical`—(Optional) Specifies whether the rate-limit action supports hierarchical rate limiters.

Value— One of the following:

- true—Action supports hierarchical rate limiters.
- false—Action does not support hierarchical rate limiters.

Default— false
Editing Level—Basic

`type` *type*— Specify that the rate-limit profile is either one rate or two rate. The one-rate rate-limit profile provides a hard-limit rate limiter or a TCP-friendly rate limiter. The two-rate rate-

limit profile provides a two-rate, three-color marking mechanism.

Value— One of the following:

- one_rate—Uses a single-rate committed rate with two burst parameters: committed burst and excess burst; supports a TCP-friendly rate limiter
- two_rate—Uses committed rate and peak rate, each with a burst parameter
- Parameter of type rateLimitType

Default— No value
Editing Level—Basic

`committed-rate` *`committed-rate`*—(Optional) Target rate for the traffic that the policy covers.

Value— One of the following:

- Predefined global parameter interface_speed, which is the speed of the subscriber's router interface
- Number of bits per second in the range 0–4294967295
- Parameter of type rate

Default— 0
Editing Level—Basic

`committed-burst` *`committed-burst`*—(Optional) Amount of bandwidth allocated to burst traffic in bytes.

Value— One of the following:

- Number of bytes in the range 8192–4294967295
- Numeric expression.
- Parameter of type burst

For example, max(qos*0.1/8, 16384) sets the burst size to the maximum of a 100-ms burst at committed rate (qos*0.1) in bytes (/8) or 16384

where qos is a local parameter that represents the committed rate

Default— 16384
Editing Level—Basic

`peak-rate` *`peak-rate`*—(Optional) For two-rate rate-limit profiles, specifies the amount of bandwidth allocated to excess traffic flow over the committed rate.

Value— One of the following:

- Predefined global parameter interface_speed, which is the speed of the subscriber's router interface
- Number of bits per second in the range 0–4294967295
- Numeric expression
- Parameter of type rate

For example, qos*1.5 sets the peak rate to 1.5 times the committed rate

where qos is a local parameter that represents the committed rate

Default— 0
Editing Level—Basic

`peak-burst` *`peak-burst`*—(Optional) For two-rate rate-limit profiles, specifies the amount of bandwidth allocated to burst traffic in excess of the peak rate.

Value— One of the following:

- Number of bytes in the range 8192–4294967295
- Numeric expression
- Parameter of type burst

For example, max(qos*1.5*0.1/8, 16384)

where qos is a local parameter that represents the committed rate

Default— 16384
Editing Level—Basic

`excess-burst` *`excess-burst`*—(Optional) For one-rate rate-limit profiles, specifies the amount of bandwidth allocated to accommodate burst traffic.

Value— One of the following:

- Number of bytes in the range < 0 | [committed-burst + 1, 4294967295] >
- Numeric expression
- Parameter of type burst

Default— No value
Editing Level—Basic

`color-aware`—(Optional) Specifies whether the rate-limit action is color-aware; that is, whether the rate limits can change depending on the color of the incoming packet. The color might have been set in a previous rate limit, in a policy action, or in an earlier policy. This option is supported in rate-limit hierarchies.

Default—false
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* rate-limit committed-action filter

Syntax

```
policies group name list name rule name rate-limit committed-action filter {
}
```

Hierarchy Level

```
[edit policies group name list name rule name rate-limit committed-action filter]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Specify that the packet is dropped if the traffic flow does not exceed the committed rate, or for JUNOSe rate limits if the traffic flow conforms to the committed rate, committed burst size, exceed rate, and exceed burst size.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* rate-limit committed-action forward

Syntax

```
policies group name list name rule name rate-limit committed-action forward {
}
```

Hierarchy Level

```
[edit policies group name list name rule name rate-limit committed-action forward]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Specify that the packet is forwarded if the traffic flow does not exceed the committed rate, or for JUNOSe rate-limits if the traffic flow conforms to the committed rate, committed burst size, exceed rate, and exceed burst size.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* rate-limit committed-action forward-conditional

Syntax

```
policies group name list name rule name rate-limit committed-action forward-
conditional {
}
```

Hierarchy Level

```
[edit policies group name list name rule name rate-limit committed-action forward-
conditional]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

In JUNOSe rate-limit hierarchies, if the traffic flow conforms to the committed rate, committed burst size, exceed rate, and exceed burst size:

- Set the packet color to the result calculated by the rate limit.
- Forward the packet to the next rate limit for processing.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* rate-limit committed-action forward-final

Syntax

```
policies group name list name rule name rate-limit committed-action forward-final
{
}
```

Hierarchy Level

```
[edit policies group name list name rule name rate-limit committed-action forward-
final]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

In JUNOSe rate-limit hierarchies, if the traffic flow conforms to the committed rate, committed burst size, exceed rate, and exceed burst size, the packet exits from the rate-limit hierarchy and is forwarded.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* rate-limit committed-action forward-unconditional

Syntax

```
policies group name list name rule name rate-limit committed-action forward-
unconditional {
}
```

Hierarchy Level

```
[edit policies group name list name rule name rate-limit committed-action forward-
unconditional]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

In JUNOSe rate-limit hierarchies, if the traffic flow conforms to the committed rate, committed burst size, exceed rate, and exceed burst size:

- Forward the packet.
- Set the packet color to the result calculated by the rate limit.
- Decrement the bandwidth allocated to a traffic flow.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* rate-limit committed-action mark mark-info

Syntax

```
policies group name list name rule name rate-limit committed-action mark mark-
info {
     value value;
     mask mask;
}
```

Hierarchy Level

```
[edit policies group name list name rule name rate-limit committed-
action mark mark-info]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the mark value and the mark mask.

Options

`value` *`value`*—(Optional) For IPv4 packets, sets the ToS field in the IP header. For IPv6 packets, sets the traffic-class field in the IP header.

Value— Integer in the range 0–255
Default— 0
Editing Level—Basic

`mask` *`mask`*—(Optional) Mask associated with the mark value.

Note: If you configure more than one mark action in a rate limit— for example, for a committed, conformed, or exceed action— configure the same mask for each action. If you use different masks, the results can be unpredictable.

Value— Integer values of 224, 252, 255 for JUNOSe; values of 224, 252 for JUNOS

For IPv4:

- 255 (tos)—Specifies the use of the whole 8 bits of the ToS byte; tos-byte range is 0–255.
- 252 (dsfield)—Specifies the use of the upper 6 bits of the ToS byte; tos-byte range is 0–63.
- 224 (precedence)—Specifies the use of the upper 3 bits of the ToS byte; tos-byte range is 0–7.

For IPv6:

- 255 (tcfield)—Specifies the use of the whole 8 bits of the traffic-class byte; tos-byte range is 0–255.
- 252 (dsfield)—Specifies the use of the upper 6 bits of the traffic-class byte; tos-byte range is 0–63.
- 224 (precedence)—Specifies the use of the upper 3 bits of the traffic-class byte; tos-byte range is 0–7.

Default— 255
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* rate-limit committed-action parameter

Syntax

```
policies group name list name rule name rate-limit committed-action parameter {
     action action;
}
```

Hierarchy Level

```
[edit policies group name list name rule name rate-limit committed-
action parameter]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Specify that the action indicated by the parameter is applied if the traffic flow does not exceed the committed rate, or for JUNOSe rate limits if the traffic flow conforms to the committed rate, committed burst size, exceed rate, and exceed burst size, .

`action` *`action`*—(Optional) Parameter that specifies the action to take on traffic.

Value— Parameter of type packetOperation.
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* rate-limit conformed-action filter

Syntax

```
policies group name list name rule name rate-limit conformed-action filter {
}
```

Hierarchy Level

```
[edit policies group name list name rule name rate-limit conformed-action filter]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Specify that if the traffic flow exceeds the committed rate but remains below the peak rate (for JUNOSe rate limits, below the peak burst size), the packet is dropped.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* rate-limit conformed-action forward

Syntax

```
policies group name list name rule name rate-limit conformed-action forward {
}
```

Hierarchy Level

```
[edit policies group name list name rule name rate-limit conformed-action forward]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Specify that if the traffic flow exceeds the committed rate but remains below the peak rate (for JUNOSe rate limits, below the peak burst size), the packet is forwarded.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* rate-limit conformed-action forward-conditional

Syntax

```
policies group name list name rule name rate-limit conformed-action forward-
conditional {
}
```

Hierarchy Level

```
[edit policies group name list name rule name rate-limit conformed-action forward-
conditional]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

In JUNOSe rate limit hierarchies, if the traffic flow exceeds the committed rate but remains below the peak burst size:

- Set the packet color to the result calculated by the rate limit.
- Forward the packet to the next rate limit for processing.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* rate-limit conformed-action forward-final

Syntax

```
policies group name list name rule name rate-limit conformed-action forward-final
{
}
```

Hierarchy Level

```
[edit policies group name list name rule name rate-limit conformed-action forward-
final]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

In JUNOSe rate-limit hierarchies, specify that if the traffic flow exceeds the committed rate but remains below the peak burst size, the packet exits from the rate-limit hierarchy and is forwarded.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* rate-limit conformed-action forward-unconditional

Syntax

```
policies group name list name rule name rate-limit conformed-action forward-
unconditional {
}
```

Hierarchy Level

```
[edit policies group name list name rule name rate-limit conformed-action forward-
unconditional]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

In JUNOSe rate-limit hierarchies, if the traffic flow exceeds the committed rate but remains below the peak burst size:

- Forward the packet.
- Set the packet color to the result calculated by the rate limit.
- Decrement bandwidth allocation for the traffic flow.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* rate-limit conformed-action mark mark-info

Syntax

```
policies group name list name rule name rate-limit conformed-action mark mark-
info {
     value value;
     mask mask;
}
```

Hierarchy Level

```
[edit policies group name list name rule name rate-limit conformed-
action mark mark-info]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the mark value and the mark mask.

Options

`value value`—(Optional) For IPv4 packets, sets the ToS field in the IP header. For IPv6 packets, sets the traffic-class field in the IP header.

Value— Integer in the range 0–255
Default— 0
Editing Level—Basic

`mask mask`—(Optional) Mask associated with the mark value.

Note: If you configure more than one mark action in a rate limit— for example, for a committed, conformed, or exceed action— configure the same mask for each action. If you use different masks, the results can be unpredictable.

Value— Integer values of 224, 252, 255 for JUNOSe; values of 224, 252 for JUNOS

For IPv4:

- 255 (tos)—Specifies the use of the whole 8 bits of the ToS byte; tos-byte range is 0–255.
- 252 (dsfield)—Specifies the use of the upper 6 bits of the ToS byte; tos-byte range is 0–63.
- 224 (precedence)—Specifies the use of the upper 3 bits of the ToS byte; tos-byte range is 0–7.

For IPv6:

- 255 (tcfield)—Specifies the use of the whole 8 bits of the traffic-class byte; tos-byte range is 0–255.
- 252 (dsfield)—Specifies the use of the upper 6 bits of the traffic-class byte; tos-byte range is 0–63.
- 224 (precedence)—Specifies the use of the upper 3 bits of the traffic-class byte; tos-byte range is 0–7.

Default— 255
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* rate-limit conformed-action parameter

Syntax

```
policies group name list name rule name rate-limit conformed-action parameter {
     action action;
}
```

Hierarchy Level

```
[edit policies group name list name rule name rate-limit conformed-
action parameter]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Specify that if the traffic flow exceeds the committed rate but remains below the peak rate (for JUNOSe rate limits, below the peak burst size), the action specified by the parameter is applied.

`action` *`action`*—(Optional) Parameter that specifies the action to take on traffic.

Value— Parameter of type packetOperation.
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* rate-limit exceed-action filter

Syntax

```
policies group name list name rule name rate-limit exceed-action filter {
}
```

Hierarchy Level

```
[edit policies group name list name rule name rate-limit exceed-action filter]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Specify that the packet is dropped if the traffic flow exceeds the peak rate, or for JUNOSe rate limits, exceeds peak burst size. .

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* rate-limit exceed-action forward

Syntax

```
policies group name list name rule name rate-limit exceed-action forward {
}
```

Hierarchy Level

```
[edit policies group name list name rule name rate-limit exceed-action forward]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Specify that the packet is forwarded if the traffic flow exceeds the peak rate, or for JUNOSe rate limits, if the traffic flow exceeds peak burst size, .

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* rate-limit exceed-action forward-conditional

Syntax

```
policies group name list name rule name rate-limit exceed-action forward-
conditional {
}
```

Hierarchy Level

```
[edit policies group name list name rule name rate-limit exceed-action forward-
conditional]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

In rate-limit hierarchies, if the traffic flow does not exceed the committed rate:

- Set the packet color to the result calculated by the rate limit.
- Forward the packet to the next rate limit for processing.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* rate-limit exceed-action forward-final

Syntax

```
policies group name list name rule name rate-limit exceed-action forward-final {
}
```

Hierarchy Level

```
[edit policies group name list name rule name rate-limit exceed-action forward-
final]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

In rate-limit hierarchies, specify that if the traffic flow does not exceed the committed rate, the packet exits from the rate-limit hierarchy and is forwarded.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* rate-limit exceed-action forward-unconditional

Syntax

```
policies group name list name rule name rate-limit exceed-action forward-
unconditional {
}
```

Hierarchy Level

```
[edit policies group name list name rule name rate-limit exceed-action forward-
unconditional]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

In rate-limit hierarchies, specify that if the traffic flow does not exceed the committed rate:

- Forward the packet.
- Set the packet color to the result calculated by the rate limit.
- Decrement bandwidth allocation for the traffic flow.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* rate-limit exceed-action mark mark-info

Syntax

```
policies group name list name rule name rate-limit exceed-action mark mark-info {
     value value;
     mask mask;
}
```

Hierarchy Level

```
[edit policies group name list name rule name rate-limit exceed-action mark mark-
info]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the mark value and the mark mask.

Options

`value value`—(Optional) For IPv4 packets, sets the ToS field in the IP header. For IPv6 packets, sets the traffic-class field in the IP header.

Value— Integer in the range 0–255
Default— 0
Editing Level—Basic

`mask mask`—(Optional) Mask associated with the mark value.

Note: If you configure more than one mark action in a rate limit— for example, for a committed, conformed, or exceed action— configure the same mask for each action. If you use different masks, the results can be unpredictable.

Value— Integer values of 224, 252, 255 for JUNOSe; values of 224, 252 for JUNOS

For IPv4:

- 255 (tos)—Specifies the use of the whole 8 bits of the ToS byte; tos-byte range is 0–255.
- 252 (dsfield)—Specifies the use of the upper 6 bits of the ToS byte; tos-byte range is 0–63.
- 224 (precedence)—Specifies the use of the upper 3 bits of the ToS byte; tos-byte range is 0–7.

For IPv6:

- 255 (tcfield)—Specifies the use of the whole 8 bits of the traffic-class byte; tos-byte range is 0–255.
- 252 (dsfield)—Specifies the use of the upper 6 bits of the traffic-class byte; tos-byte range is 0–63.
- 224 (precedence)—Specifies the use of the upper 3 bits of the traffic-class byte; tos-byte range is 0–7.

Default— 255
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* rate-limit exceed-action parameter

Syntax

```
policies group name list name rule name rate-limit exceed-action parameter {
     action action;
}
```

Hierarchy Level

```
[edit policies group name list name rule name rate-limit exceed-action parameter]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Specify that the action specified by the parameter is applied if the traffic flow exceeds the peak rate, or for JUNOSe rate limits, exceeds peak burst size.

`action` *`action`*—(Optional) Parameter that specifies the action to take on traffic.

Value— Parameter of type packetOperation.
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* reject

Syntax

```
policies group name list name rule name reject {
     message-type message-type;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name reject]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a reject action. The reject action causes the router to discard a packet and send an ICMP destination unreachable message. You can configure reject actions for JUNOS filter policy rules.

`message-type` *`message-type`*—(Optional) Type of ICMP destination unreachable message sent to the client.

`Value`— One of the following:

- String expression that matches a type of ICMP destination unreachable message supported on the router; for example:
  - "administratively-prohibited"
  - "bad-host-tos"
  - "bad-network-tos"
  - "host-prohibited"
  - "host-unknown"
  - "host-unreachable"
  - "network-prohibited"
  - "network-unknown"
  - "network-unreachable"
  - "port-unreachable"
  - "precedence-cutoff"
  - "precedence-violation"
  - "protocol-unreachable"
  - "source-host-isolated"
  - "source-route-failed"
  - "tcp-reset"—If you specify tcp-reset, a TCP reset message is sent if the packet is a TCP packet. Otherwise, nothing is sent.
- Parameter of type messageType

Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* routing-instance

Syntax

```
policies group name list name rule name routing-instance {
     routing-instance;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name routing-instance]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a routing instance action. Use routing instance actions for filter-based forwarding to direct traffic to a specific routing instance configured on the router. You can configure routing instance actions for JUNOS filter policy rules.

routing-instance—(Optional) Routing instance on the router to which packets are forwarded.

Value— One of the following:

- String expression that matches the name of a routing instance configured on the router; for example "isp2-route-table"
- Parameter of type routingInstance

Default— No value
Editing Level—Basic

description *description*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* scheduler-action

Syntax

```
policies group name list name rule name scheduler-action {
     buffer-size buffer-size;
     buffer-size-unit buffer-size-unit;
     priority priority;
     transmit-rate transmit-rate;
     transmit-rate-unit transmit-rate-unit;
     exact exact;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name scheduler-action]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a scheduler action. You use scheduler actions along with QoS conditions and traffic-shape actions to configure transmission scheduling and rate control. Schedulers define the priority, bandwidth, delay buffer size, rate control status, and random early detection (RED) drop profiles to be applied to a particular class of traffic. You can create scheduler actions in JUNOS scheduler policy rules.

`buffer-size` *`buffer-size`*—(Optional) Queue transmission buffer size.

Value— One of the following:

- Integer that represents the number of microseconds or a percentage of total buffer size.
- "remainder"—Uses available buffer that is not assigned to other queues.
- Expression
- Parameter of type schedulerBufferSize

Default— No value
Editing Level—Basic

`buffer-size-unit` *`buffer-size-unit`*—(Optional) Type of value that you entered for

buffer size.

Value— One of the following:

- Predefined global parameter:
  - buffer_size_percentage—The value is a percentage of the total buffer.
  - buffer_size_remainder—The value is the remaining buffer available.
  - temporal—The value is temporal, in microseconds.
- String expression; for example, "percent"
- Parameter of type schedulerBufferSizeUnit

Default— No value
Editing Level—Basic

`priority` *`priority`*—(Optional) Packet-scheduling priority. The priority determines the order in which an output interface transmits traffic from the queues.

Value— One of the following:

- Predefined global parameter:
  - low
  - medium_low
  - medium_high
  - high—Assigning high priority to a queue prevents the queue from being starved by traffic in a strict high-priority queue
  - strict_high—Configures a high-priority queue with unlimited transmission bandwidth available to it. As long as it has traffic to send, the strict high-priority queue receives precedence over low, medium-low, and medium-high priority queues, but not high-priority queues. You can configure strict high-priority on only one queue per interface.
- String expression—For example, "strict-high"
- Parameter of type schedulerPriority

Default— No value
Editing Level—Basic

`transmit-rate` *`transmit-rate`*—(Optional) Transmit rate.

Value— One of the following:

- Integer that represents the rate in bps or a percentage of bandwidth
- "remainder"—Uses remaining rate available
- Numeric expression

- Parameter of type schedulerTransmitRate

Default— No value
Editing Level—Basic

`transmit-rate-unit` *`transmit-rate-unit`*—(Optional) Type of value that you entered for transmit rate.

Value—Text
Default— No value
Editing Level—Basic

`exact` *`exact`*—(Optional) Specifies whether or not to enforce the exact transmission rate. Under sustained congestion, a rate-controlled queue that goes into negative credit fills up and eventually drops packets.

Value— True or false
Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* scheduler-action drop-profile

Syntax

```
policies group name list name rule name scheduler-action drop-profile name {
     loss-priority loss-priority;
     protocol protocol;
     drop-probability drop-probability;
     drop-profile-type drop-profile-type;
     queue-threshold queue-threshold;
}
```

Hierarchy Level

```
[edit policies group name list name rule name scheduler-action drop-profile]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a drop profile. The scheduler drop profile defines the drop probabilities across the range of delay-buffer occupancy, thereby supporting the RED process. For a packet to be dropped, it must match the drop profile. When a packet arrives, RED checks the queue fill level. If the fill level corresponds to a nonzero drop probability, the RED algorithm determines whether to drop the arriving packet. Depending on the drop probabilities, RED might drop packets aggressively long before the buffer becomes full, or it might drop only a few packets even if the buffer is almost full.

In drop profiles you configure queue threshold (fill level) and drop probability as paired values. The values can be either percentage values (segmented) or data points (interpolated). These two alternatives enable you to configure each drop probability at up to 64 queue threshold/drop-probability paired values, or to configure a profile represented as a series of line segments. For more information about configuring fill level and drop probabilities, see the JUNOS routing platform documentation.

Options

`name` *name*— Name for the drop profile.

Value— Text

`loss-priority` *loss-priority*— Packet loss priority.

Value—Text
Default— No value
Editing Level—Basic

`protocol` *`protocol`*— Protocol type for the drop profile map. The protocol type is ignored for priority levels greater than 2.

Value—Text
Default— No value
Editing Level—Basic

`drop-probability` *`drop-probability`*— Probability that a packet will be dropped.

Value— One of the following:

- If the drop profile type is segmented, specify the drop probability as a percentage. A value of 0 means that a packet will never be dropped, and a value of 100 means that all packets will be dropped. The range is 0–100.
- If the drop profile type is interpolated, specify a data point for packet drop probability in the range 0–100.
- Predefined parameter:
  - fwEnterpriseMaxPriority
  - fwEnterpriseMinPriority
  - fwMaxPriority
  - fwMinPriority
- Parameter of type percent

Default— No value
Editing Level—Basic

`drop-profile-type` *`drop-profile-type`*— Relationship between the queue threshold (fill level) and drop probability.

Value— One of the following:

- Predefined global parameter:
  - interpolated—Specifies values for interpolating relationship between queue fill level and drop probability
  - segmented—Specifies fill level and drop probability as percentages
- Parameter of type dropProfileType

Default— No value
Editing Level—Basic

`queue-threshold` *`queue-threshold`*— Fill level of the queue.

Value— One of the following:

- If the drop profile type is segmented, specify how full the queue is as a percentage.
- If the drop profile type is interpolated, specify a data point for mapping the queue fill percentage in the range 0–100.
- Parameter of type percent

Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* service-class-name

Syntax

```
policies group name list name rule name service-class-name {
     service-class-name service-class-name;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name service-class-name]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service class name action. You can configure service class name actions for PCMM policy rules.

Options

`service-class-name` *`service-class-name`*—(Optional) Name of a service class on the CMTS device that specifies QoS parameters for a service flow.

Value— One of the following:

- Name of a service class
- String expression
- Parameter of type serviceClassName

Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* stateful-firewall

Syntax

```
policies group name list name rule name stateful-firewall {
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name stateful-firewall]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a stateful firewall action. Stateful firewall actions specify the action to take on packets that match the classify-traffic condition. You can configure stateful firewall actions for JUNOS ASP policy rules.

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* stateful-firewall packet-action filter

Syntax

```
policies group name list name rule name stateful-firewall packet-action filter {
}
```

Hierarchy Level

```
[edit policies group name list name rule name stateful-firewall packet-
action filter]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Set the packet action for a stateful firewall to filter. The packet is not accepted and is not processed further.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* stateful-firewall packet-action forward

Syntax

```
policies group name list name rule name stateful-firewall packet-action forward {
}
```

Hierarchy Level

```
[edit policies group name list name rule name stateful-firewall packet-
action forward]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Set the packet action for a stateful firewall to forward.

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* stateful-firewall packet-action parameter

Syntax

```
policies group name list name rule name stateful-firewall packet-action parameter
{
     action action;
}
```

Hierarchy Level

```
[edit policies group name list name rule name stateful-firewall packet-
action parameter]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Set the packet action for a stateful firewall to parameter. The action specified in the parameter is applied.

`action` *`action`*—(Optional) Parameter that specifies the action to take on traffic.

Value— Parameter of type packetOperation.
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* stateful-firewall packet-action reject

Syntax

```
policies group name list name rule name stateful-firewall packet-action reject {
     message-type message-type;
}
```

Hierarchy Level

```
[edit policies group name list name rule name stateful-firewall packet-
action reject]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Set the action for a stateful firewall to reject. The packet is not accepted, and a rejection message is returned; UDP sends an ICMP unreachable code, and TCP sends RST Reject action in stateful firewall.

`message-type` *`message-type`*—(Optional) Type of ICMP destination unreachable message sent to the client.

Value— One of the following:

- String expression that matches a type of ICMP destination unreachable message supported on the router; for example:
  - "administratively-prohibited"
  - "bad-host-tos"
  - "bad-network-tos"
  - "host-prohibited"
  - "host-unknown"
  - "host-unreachable"
  - "network-prohibited"
  - "network-unknown"
  - "network-unreachable"
  - "port-unreachable"
  - "precedence-cutoff"
  - "precedence-violation"
  - "protocol-unreachable"
  - "source-host-isolated"
  - "source-route-failed"
  - "tcp-reset"—If you specify tcp-reset, a TCP reset message is sent if the packet is a TCP packet. Otherwise, nothing is

sent.

- Parameter of type messageType

Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* subscriber-profile

Syntax

```
policies group name list name rule name subscriber-profile {
     profile-name;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name subscriber-profile]
```

Release Information

Statement introduced in SRC Release 4.1.0

Description

Police the matching IP flow using the named subscriber profile.

Options

profile-name—(Optional) Name of the policer.

Value—Text
Default— No value
Editing Level—Basic

`description` *description*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* template-activation

Syntax

```
policies group name list name rule name template-activation {
     template-name template-name;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name template-activation]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure a template activation action. Use this action for CoA supporting devices and PTSP policies.

Options

`template-name` *`template-name`*— Name of template to activate.

Value— Text
Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* template-activation variables

Syntax

```
policies group name list name rule name template-activation variables name {
     value value;
     type type;
}
```

Hierarchy Level

```
[edit policies group name list name rule name template-activation variables]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure the parameters used by the action.

Options

`name` *`name`*— Name of parameter.

Value— Text

`value` *`value`*— Value for a variable.

Value— Text
Default— No value
Editing Level—Basic

`type` *`type`*—(Optional) Type of parameter, which determines where the variable is used.

Value— See the policy documentation in the *SRC PE Services and Policies Guide* for a list of parameter types, where each type of parameter is used, and what each parameter is used to specify. Variable types are mapped to parameter types.
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-class

Syntax

```
policies group name list name rule name traffic-class {
     traffic-class;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-class]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a traffic-class action. Use this action to put packets in a particular traffic class. You can configure traffic-class actions for JUNOSe policy rules.

traffic-class— Name of the traffic-class profile that is applied to a packet when it passes through the router.

Value— One of the following:

- Name of a traffic-class profile that is configured on the router
- Parameter of type trafficClassSpec

Default— No value
Editing Level—Basic

description *description*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-condition

Syntax

```
policies group name list name rule name traffic-condition name {
     match-direction match-direction;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-condition]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a classify-traffic condition. A classify-traffic condition contains values or fields that a packet must contain. If a policy rule does not contain a match condition, all packets are considered to match.

You can create classify-traffic conditions in JUNOSe policy rules, in JUNOS ASP and JUNOS filter policy rules, and in PCMM policy rules.

Options

`name` *`name`*— Name for the classify-traffic condition.

Value— Text

`match-direction` *`match-direction`*—(Optional) Applies only to JUNOS ASP policy rules. Matches packets based on the direction of the packet flow. For stateful firewall actions, this value is used in place of the policies group list `name` applicability statement.

Value— One of the following:

- input
- output
- both (Both is invalid for NAT actions.)
- String expression
- Parameter of type matchDirection

Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-condition *name* application-protocol-condition

Syntax

```
policies group name list name rule name traffic-condition name application-
protocol-condition name {
     protocol protocol;
     application-protocol application-protocol;
     idle-timeout idle-timeout;
     dce-rpc-uuid dce-rpc-uuid;
     rpc-program-number rpc-program-number;
     snmp-command snmp-command;
     ttl-threshold ttl-threshold;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-condition name application-
protocol-condition]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure application protocols for stateful firewall and NAT services to use in match condition rules. An application protocol defines application parameters by using information from network layer 3 and above. Examples of such applications are FTP and H.323.

Options

`name` *name*— Name for the application protocol condition.

Value— Text

`protocol` *protocol*—(Optional) Protocol matched by this classifier list.

Value— One of the following:

- Predefined parameter of type protocol
- Protocol number in the range 0–257
- For PCMM classifiers, there are two special protocol values:

- 256 matches traffic that has any IP protocol value
- 257 matches both TCP and UDP traffic

- String expression

Default— No value
Editing Level—Basic

`application-protocol` *`application-protocol`*—(Optional) Application protocol to match.

Value— One of the following:

- Predefined global parameter:
  - bootp—BOOTP protocol
  - dce_rpc—DCE RPC protocol
  - dce_rpc_portmap—DCE RPC portmap
  - dns—DNS protocol
  - exec—Exec protocol
  - ftp—FTP protocol
  - h323—H.323 protocol
  - icmp_app—ICMP protocol
  - iiop—Internet Inter-ORB Protocol, a TCP protocol
  - netbios—NetBIOS protocol
  - netshow—NetShow protocol
  - realaudio—RealAudio protocol
  - rpc—RPC UDP or TCP protocols
  - rpc_portmap—RPC portmap protocol
  - rtsp—Real-Time Streaming Protocol
  - shell—Shell protocol
  - snmp—SNMP protocol
  - sqlnet—SQLNet protocol
  - tftp—Trivial File Transfer Protocol
  - traceroute—Traceroute protocol
  - winframe—WinFrame protocol
- String expression that matches an application protocol name supported on the router
- Map expression—You can use a map expression to define multiple attributes with one command. Maps are a list of attributeName = value pairs separated by commas and enclosed in curly brackets.

  For example, the map {applicationProtocol = "ftp", sourcePort = 123, inactivityTimeout = 60} supplies the application protocol, source port, and inactivity timeout in one command. Another map {applicationProtocol = "tcp", inactivityTimeout = 60, destinationPort = 80} supplies the protocol, inactivity timeout, and destination port.

- Parameter of type applicationProtocol—You can add a map expression as the default value of the parameter.

Default— No value
Editing Level—Basic

`idle-timeout` *`idle-timeout`*—(Optional) Length of time the application is inactive before it times out.

Value— One of the following:

- Number of seconds in the range 4–65535
- Numeric expression
- Parameter of type timeout

Default— Unspecified; the router's default value is used
Editing Level—Basic

`dce-rpc-uuid` *`dce-rpc-uuid`*—(Optional) For the DCE RPC application protocol, specifies the universal unique identifier (UUID). For information about UUIDs, see http://www.opengroup.org/onlinepubs/9629399/apdxa.htm.

Value— One of the following:

- Hex digits in the format xxxxxxxx-xxxx-xxxx-xxxx-xxxxxxxxxxxx
- Numeric expression
- Parameter of type dceRpcUuid

Default— dceRpcUuid
Editing Level—Basic

`rpc-program-number` *`rpc-program-number`*—(Optional) For the remote procedure call (RPC) application protocol, specifies an RPC program number.

Value— One of the following:

- Integer—RPC or DCE program number in the range 100000–400000
- Numeric expression
- Parameter of type rpcProgramNumber

Default— No value
Editing Level—Basic

`snmp-command` *`snmp-command`*—(Optional) SNMP command for packet matching.

Value— One of the following:

- Predefined parameter:
  - get
  - get_next
  - set
  - trap
- String expression that matches an SNMP command supported on the router
- Parameter of type snmpCommand

Default— No value
Editing Level—Basic

`ttl-threshold` *`ttl-threshold`*—(Optional) For the traceroute application protocol, specifies the traceroute time-to-live (TTL) threshold value. This value sets the acceptable level of network penetration for trace routing.

Value— One of the following:

- Integer in the range 0–255
- Numeric expression
- Parameter of type traceRouteTtlThreshold

Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-condition *name* application-protocol-condition *name* proto-attr

Syntax

```
policies group name list name rule name traffic-condition name application-
protocol-condition name proto-attr {
     icmp-type icmp-type;
     icmp-code icmp-code;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-condition name application-
protocol-condition name proto-attr]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure ICMP packet type and code.

Options

`icmp-type` *`icmp-type`*—(Optional) ICMP packet type.

Value— One of the following:

- Integer in the range 0–255 that represents an ICMP packet type supported on the router
- Numeric expression
- Parameter of type icmpType

Default— No value
Editing Level—Basic

`icmp-code` *`icmp-code`*—(Optional) ICMP code

Value— One of the following:

- Integer in the range 0–255 that represents an ICMP code supported on the router
- Numeric expression
- Parameter of type icmpCode

Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-condition *name* application-protocol-condition *name* proto-attr destination-port port

Syntax

```
policies group name list name rule name traffic-condition name application-
protocol-condition name proto-attr destination-port port {
     from-port from-port;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-condition name application-
protocol-condition name proto-attr destination-port port]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure matching destination ports.

Options

`from-port` *`from-port`*—(Optional) Destination port

Value— One of the following:

- service_port—A predefined global parameter that is the port of the service as specified by the service object
- Integer in the range 0–65535
- Expression—A range of port numbers; for example, 10..20
- Parameter of type port

Use a range of ports to specify port numbers that are greater than or less than a specified port number. For example:

- To set a range of ports that is greater than 10, use 11..65535.
- To set a range of ports that is less than 200, use 0..199.

Default— No value

Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-condition *name* application-protocol-condition *name* proto-attr source-port port

Syntax

```
policies group name list name rule name traffic-condition name application-
protocol-condition name proto-attr source-port port {
     from-port from-port;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-condition name application-
protocol-condition name proto-attr source-port port]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure matching source ports.

Options

`from-port` *`from-port`*—(Optional) Source port

Value— One of the following:

- service_port—A predefined global parameter that is the port of the service as specified by the service object
- Integer in the range 0–65535
- Expression—A range of port numbers; for example, 10..20
- Parameter of type port

Use a range of ports to specify port numbers that are greater than or less than a specified port number. For example:

- To set a range of ports that is greater than 10, use 11..65535.
- To set a range of ports that is less than 200, use 0..199.

Default— No value

Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-condition *name* destination-network group-network

Syntax

```
policies group name list name rule name traffic-condition name destination-
network group-network {
     network-specifier network-specifier;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-condition name destination-
network group-network]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Specify the destination network to match using a network specifier. For JUNOS ASP and JUNOSe IPv6 policy rules, you must specify destination networks in the network specifier format.

`network-specifier` *`network-specifier`*—(Optional) Specifies an IP address and mask.

Value— Specify the subnet in one of the following formats:

- [not] < address > / < mask > or < address > / < prefix length >
  - Include *not* to indicate that the condition matches every address that is not in the specified subnet.
  - < prefix length > is a number in the range 0–32, and specifies how many of the first bits in the address specify the network
- For JUNOS ASP policies, you must enter network in the format: < address > / < prefix length >

Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-condition *name* destination-network network

Syntax

```
policies group name list name rule name traffic-condition name destination-
network network {
     ip-address ip-address;
     ip-mask ip-mask;
     ip-operation ip-operation;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-condition name destination-
network network]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Specify the destination network in IP address and mask format. You also use this statement to specify whether the software matches or does not match the IP address and mask.

`ip-address` *`ip-address`*—(Optional) IP address of the source or destination network or host.

Value— One of the following:

- IP address
- Predefined global parameter:
  - gateway_ipAddress—IP address of the gateway as specified by the service object
  - interface_ipAddress—IP address of the router interface
  - service_ipAddress—IP address of the service as specified by the service object
  - user_ipAddress—IP address of the subscriber
  - virtual_ipAddress—Virtual portal address of the SAE that is used in redundant redirect server installations
- Expression—For NAT actions, you can enter a range of addresses; for example, 10.10.13.1..10.10.13.100
- Parameter of type address

Default— 0.0.0.0

Editing Level—Basic

`ip-mask` *`ip-mask`*—(Optional) IP address mask applied to the IP address.

Value— One of the following:

- IP address mask
- Predefined global parameter:
  - interface_ipMask—IP mask of the interface
  - service_ipMask—IP mask of the service as specified by the service object
  - user_ipMask—IP mask of the subscriber
- Parameter of type addressMask

Default— 255.255.255.255
Editing Level—Basic

`ip-operation` *`ip-operation`*—(Optional) Matches packets with an IP address and mask that either is equal or is not equal to the specified address and mask.

Value— One of the following:

- is—Matches the specified IP address and mask
- is_not—Matches any IP address and mask except the specified address and mask
- Parameter of type networkOperation

Default— is
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-condition *name* icmp-condition

Syntax

```
policies group name list name rule name traffic-condition name icmp-condition {
     protocol protocol;
     protocol-operation protocol-operation;
     ip-flags ip-flags;
     ip-flags-mask ip-flags-mask;
     fragment-offset fragment-offset;
     packet-length packet-length;
     icmp-type icmp-type;
     icmp-code icmp-code;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-condition name icmp-
condition]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure matching conditions for the ICMP protocol.

`protocol` *`protocol`*— Protocol matched by this classifier list.

Value— One of the following:

- Predefined global parameter—Use a ? at the command line to see a list of valid protocols.
- Protocol number in the range 0–257
- For PCMM classifiers, there are two special protocol values:
  - 256 matches traffic that has any IP protocol value
  - 257 matches both TCP and UDP traffic
- String expression
- Parameter of type protocol

Default— No value
Editing Level—Basic

`protocol-operation` *`protocol-operation`*—(Optional) Matches packets with the protocol that is either equal or not equal to the specified protocol.

Value— One of the following:

- Predefined global parameter:
  - is—Matches packets that are equal to the specified protocol
  - is_not—Matches any packets except those that are equal to the specified protocol. If you are configuring an ICMP, IGMP, IPsec, or TCP classifier, is_not is not a valid option.
- Boolean expression:
  - 1—is
  - 0—is_not
- Parameter of type protocolOperation

Default— 1
Editing Level—Basic

`ip-flags` *`ip-flags`*—(Optional) Value of the IP flags field in the IP header.

Value— One of the following:

- 0—Reserved
- 1—Do not fragment
- 2—More fragments
- Numeric expression
- Parameter of type ipFlags

Default— 0
Editing Level—Basic

`ip-flags-mask` *`ip-flags-mask`*—(Optional) Mask that is associated with the IP flag.

Value— One of the following:

- Integer in the range 0–7
- Numeric expression
- Parameter of type ipFlagsMask

Default— 0
Editing Level—Basic

`fragment-offset` *`fragment-offset`*—(Optional) Value of the fragment offset field.

Value— One of the following:

- For JUNOSe routers:
  - 0—Equal to 0
  - 1—Equal to 1
  - 2..8191
- For JUNOS routing platforms, integer in the range 0–8191
- Numeric expression
- Parameter of type fragOffset

Default— No value
Editing Level—Basic

`packet-length` *`packet-length`*—(Optional) Matches on length of the packet. The length refers only to the IP packet, including the packet header, and does not include any layer 2 encapsulation overhead. This option is available only in JUNOS policy rules.

Value— One of the following:

- Number of bytes; all positive numbers and 0 are valid
- Parameter of type packetLength

Default— No value
Editing Level—Basic

`icmp-type` *`icmp-type`*—(Optional) Matches ICMP packet type.

Value— One of the following:

- Integer in the range 0–255 that represents an ICMP packet type supported on the router or CMTS device
- Numeric expression
- Parameter of type icmpType

Default— 255
Editing Level—Basic

`icmp-code` *`icmp-code`*—(Optional) Matches ICMP code

Value— One of the following:

- Integer in the range 0–255 that represents an ICMP code supported on the router or CMTS device

- Numeric expression
- Parameter of type icmpCode

Default— 255
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-condition *name* igmp-condition

Syntax

```
policies group name list name rule name traffic-condition name igmp-condition {
     protocol protocol;
     protocol-operation protocol-operation;
     ip-flags ip-flags;
     ip-flags-mask ip-flags-mask;
     fragment-offset fragment-offset;
     packet-length packet-length;
     igmp-type igmp-type;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-condition name igmp-
condition]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure matching conditions for the IGMP protocol.

`protocol` *`protocol`*— Protocol matched by this classifier list.

Value— One of the following:

- Predefined global parameter—Use a ? at the command line to see a list of valid protocols.
- Protocol number in the range 0–257
- For PCMM classifiers, there are two special protocol values:
  - 256 matches traffic that has any IP protocol value
  - 257 matches both TCP and UDP traffic
- String expression
- Parameter of type protocol

Default— No value
Editing Level—Basic

`protocol-operation` *`protocol-operation`*—(Optional) Matches packets with the protocol that is either equal or not equal to the specified protocol.

Value— One of the following:

- Predefined global parameter:
  - is—Matches packets that are equal to the specified protocol
  - is_not—Matches any packets except those that are equal to the specified protocol. If you are configuring an ICMP, IGMP, IPsec, or TCP classifier, is_not is not a valid option.
- Boolean expression:
  - 1—is
  - 0—is_not
- Parameter of type protocolOperation

Default— 1
Editing Level—Basic

`ip-flags` *`ip-flags`*—(Optional) Value of the IP flags field in the IP header.

Value— One of the following:

- 0—Reserved
- 1—Do not fragment
- 2—More fragments
- Numeric expression
- Parameter of type ipFlags

Default— 0
Editing Level—Basic

`ip-flags-mask` *`ip-flags-mask`*—(Optional) Mask that is associated with the IP flag.

Value— One of the following:

- Integer in the range 0–7
- Numeric expression
- Parameter of type ipFlagsMask

Default— 0
Editing Level—Basic

`fragment-offset` *`fragment-offset`*—(Optional) Value of the fragment offset field.

Value— One of the following:

- For JUNOSe routers:
  - 0—Equal to 0
  - 1—Equal to 1
  - 2..8191
- For JUNOS routing platforms, integer in the range 0–8191
- Numeric expression
- Parameter of type fragOffset

Default— No value
Editing Level—Basic

`packet-length` *`packet-length`*—(Optional) Matches on length of the packet. The length refers only to the IP packet, including the packet header, and does not include any layer 2 encapsulation overhead. This option is available only in JUNOS policy rules.

Value— One of the following:

- Number of bytes; all positive numbers and 0 are valid
- Parameter of type packetLength

Default— No value
Editing Level—Basic

`igmp-type` *`igmp-type`*—(Optional) IGMP packets that can be filtered by IGMP packet type or message name.

Value— One of the following:

- Integer in the range 1–255
- Numeric expression
- Parameter of type igmpType

Default— 255
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-condition *name* ipsec-condition

Syntax

```
policies group name list name rule name traffic-condition name ipsec-condition {
     spi spi;
     ip-flags ip-flags;
     ip-flags-mask ip-flags-mask;
     fragment-offset fragment-offset;
     packet-length packet-length;
     protocol protocol;
     protocol-operation protocol-operation;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-condition name ipsec-
condition]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure matching conditions for the IPsec protocol.

Options

`spi` *`spi`*—(Optional) For IPsec classifiers, specifies the authentication header (AH) or the encapsulating security payload (ESP) security parameter index (SPI). This option appears only in JUNOS policy rules.

Value— One of the following:

- Integer in the range 0–255
- Parameter of type ipSecSpi

Default— No value
Editing Level—Basic

`ip-flags` *`ip-flags`*—(Optional) Value of the IP flags field in the IP header.

Value— One of the following:

- 0—Reserved
- 1—Do not fragment
- 2—More fragments
- Numeric expression
- Parameter of type ipFlags

Default— 0
Editing Level—Basic

`ip-flags-mask` *`ip-flags-mask`*—(Optional) Mask that is associated with the IP flag.

Value— One of the following:

- Integer in the range 0–7
- Numeric expression
- Parameter of type ipFlagsMask

Default— 0
Editing Level—Basic

`fragment-offset` *`fragment-offset`*—(Optional) Value of the fragment offset field.

Value— One of the following:

- For JUNOSe routers:
  - 0—Equal to 0
  - 1—Equal to 1
  - 2..8191
- For JUNOS routing platforms, integer in the range 0–8191
- Numeric expression
- Parameter of type fragOffset

Default— No value
Editing Level—Basic

`packet-length` *`packet-length`*—(Optional) Matches on length of the packet. The length refers only to the IP packet, including the packet header, and does not include any layer 2 encapsulation overhead. This option is available only in JUNOS policy rules.

Value— One of the following:

- Number of bytes; all positive numbers and 0 are valid
- Parameter of type packetLength

Default— No value
Editing Level—Basic

`protocol` *`protocol`*— Protocol matched by this classifier list.

Value— One of the following:

- Predefined global parameter—Use a ? at the command line to see a list of valid protocols.
- Protocol number in the range 0–257
- For PCMM classifiers, there are two special protocol values:
  - 256 matches traffic that has any IP protocol value
  - 257 matches both TCP and UDP traffic
- String expression
- Parameter of type protocol

Default— No value
Editing Level—Basic

`protocol-operation` *`protocol-operation`*—(Optional) Matches packets with the protocol that is either equal or not equal to the specified protocol.

Value— One of the following:

- Predefined global parameter:
  - is—Matches packets that are equal to the specified protocol
  - is_not—Matches any packets except those that are equal to the specified protocol. If you are configuring an ICMP, IGMP, IPsec, or TCP classifier, is_not is not a valid option.
- Boolean expression:
  - 1—is
  - 0—is_not
- Parameter of type protocolOperation

Default— 1
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-condition *name* parameter-protocol-condition

Syntax

```
policies group name list name rule name traffic-condition name parameter-protocol-
condition {
     protocol protocol;
     protocol-operation protocol-operation;
     tcp-flags tcp-flags;
     tcp-flags-mask tcp-flags-mask;
     spi spi;
     ip-flags ip-flags;
     ip-flags-mask ip-flags-mask;
     fragment-offset fragment-offset;
     packet-length packet-length;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-condition name parameter-
protocol-condition]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure protocol conditions that contain a parameter value for the protocol.

Options

`protocol` *`protocol`*— Parameter that is used to determine the protocol that this classifier matches.

Value— Parameter of type protocol. You must enter a parameter that has been created and has been committed.
Default— No value
Editing Level—Basic

`protocol-operation` *`protocol-operation`*—(Optional) Matches packets with the protocol that is either equal or not equal to the specified protocol.

Value— One of the following:

- Predefined global parameter:
  - is—Matches packets that are equal to the specified protocol
  - is_not—Matches any packets except those that are equal to the specified protocol. If you are configuring an ICMP, IGMP, IPsec, or TCP classifier, is_not is not a valid option.
- Boolean expression:
  - 1—is
  - 0—is_not
- Parameter of type protocolOperation

Default— 1
Editing Level—Basic

`tcp-flags` *`tcp-flags`*—(Optional) Value of the TCP flags field in the IP header.

Value— One of the following:

- Integer in the range 0–63
- Numeric expression
- Parameter of type tcpFlags

Default— 0
Editing Level—Basic

`tcp-flags-mask` *`tcp-flags-mask`*—(Optional) Mask associated with TCP flags.

Value— One of the following:

- Integer in the range 0–63
- Numeric expression
- Parameter of type tcpFlagsMask

Default— 0
Editing Level—Basic

`spi` *`spi`*—(Optional) For IPsec classifiers, specifies the authentication header (AH) or the encapsulating security payload (ESP) security parameter index (SPI). This option appears only in JUNOS policy rules.

Value— One of the following:

- Integer in the range 0–255
- Parameter of type ipSecSpi

Default— No value
Editing Level—Basic

`ip-flags` *`ip-flags`*—(Optional) Value of the IP flags field in the IP header.

Value— One of the following:

- 0—Reserved
- 1—Do not fragment
- 2—More fragments
- Numeric expression
- Parameter of type ipFlags

Default— 0
Editing Level—Basic

`ip-flags-mask` *`ip-flags-mask`*—(Optional) Mask that is associated with the IP flag.

Value— One of the following:

- Integer in the range 0–7
- Numeric expression
- Parameter of type ipFlagsMask

Default— 0
Editing Level—Basic

`fragment-offset` *`fragment-offset`*—(Optional) Value of the fragment offset field.

Value— One of the following:

- For JUNOSe routers:
  - 0—Equal to 0
  - 1—Equal to 1
  - 2..8191
- For JUNOS routing platforms, integer in the range 0–8191
- Numeric expression
- Parameter of type fragOffset

Default— No value

Editing Level—Basic

`packet-length` *`packet-length`*—(Optional) Matches on length of the packet. The length refers only to the IP packet, including the packet header, and does not include any layer 2 encapsulation overhead. This option is available only in JUNOS policy rules.

Value— One of the following:

- Number of bytes; all positive numbers and 0 are valid
- Parameter of type packetLength

Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-condition *name* parameter-protocol-condition proto-attr

Syntax

```
policies group name list name rule name traffic-condition name parameter-protocol-
condition proto-attr {
     icmp-type icmp-type;
     icmp-code icmp-code;
     igmp-type igmp-type;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-condition name parameter-
protocol-condition proto-attr]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure ICMP packet type and code and IGMP type.

Options

`icmp-type` *`icmp-type`*—(Optional) ICMP packet type

Value— One of the following:

- Integer in the range 0–255 that represents an ICMP packet type supported on the router
- Numeric expression
- Parameter of type icmpType

Default— No value
Editing Level—Basic

`icmp-code` *`icmp-code`*—(Optional) ICMP code

Value— One of the following:

- Integer in the range 0–255 that represents an ICMP code supported on the router
- Numeric expression
- Parameter of type icmpCode

Default— No value
Editing Level—Basic

`igmp-type` *`igmp-type`*—(Optional) IGMP packets that can be filtered by IGMP packet type or message name.

Value— One of the following:

- Integer in the range 1–255
- Numeric expression
- Parameter of type igmpType

Default— 255
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-condition *name* parameter-protocol-condition proto-attr destination-port port

Syntax

```
policies group name list name rule name traffic-condition name parameter-protocol-
condition proto-attr destination-port port {
     port-operation port-operation;
     from-port from-port;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-condition name parameter-
protocol-condition proto-attr destination-port port]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure matching conditions for ports.

Options

`port-operation` *`port-operation`*—(Optional) Matches packets with a port that is either equal or not equal to the specified port.

Value— One of the following:

- Predefined global parameter:
  - eq—Matches packets that contain the specified port number
  - neq—Matches any packet except those that contain the specified port number
- String
- Parameter of type portOperation

Default— No value
Editing Level—Basic

`from-port` *`from-port`*—(Optional) Source or destination port.

Value— One of the following:

- service_port—A predefined global parameter that is the port of the service as specified by the service object
- Integer in the range 0–65535
- Expression—A range of port numbers; for example, 10..20
- Parameter of type port

Use a range of ports to specify port numbers that are greater than or less than a specified port number. For example:

One of the following:

- To set a range of ports that is greater than 10, use 11..65535.
- To set a range of ports that is less than 200, use 0..199.

Note that PCMM IO2 classifiers do not support port ranges. If you are using PCMM IO2 and you enter a range of port numbers, the software cannot translate the port, and it throws an exception.

PCMM IO3 classifiers do support port ranges.

Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-condition *name* parameter-protocol-condition proto-attr source-port port

Syntax

```
policies group name list name rule name traffic-condition name parameter-protocol-
condition proto-attr source-port port {
     port-operation port-operation;
     from-port from-port;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-condition name parameter-
protocol-condition proto-attr source-port port]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure matching conditions for ports.

Options

`port-operation` *`port-operation`*—(Optional) Matches packets with a port that is either equal or not equal to the specified port.

Value— One of the following:

- Predefined global parameter:
  - eq—Matches packets that contain the specified port number
  - neq—Matches any packet except those that contain the specified port number
- String
- Parameter of type portOperation

Default— No value
Editing Level—Basic

`from-port` *`from-port`*—(Optional) Source or destination port.

Value— One of the following:

- service_port—A predefined global parameter that is the port of the service as specified by the service object
- Integer in the range 0–65535
- Expression—A range of port numbers; for example, 10..20
- Parameter of type port

Use a range of ports to specify port numbers that are greater than or less than a specified port number. For example:

One of the following:

- To set a range of ports that is greater than 10, use 11..65535.
- To set a range of ports that is less than 200, use 0..199.

Note that PCMM IO2 classifiers do not support port ranges. If you are using PCMM IO2 and you enter a range of port numbers, the software cannot translate the port, and it throws an exception.

PCMM IO3 classifiers do support port ranges.

Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-condition *name* protocol-condition

Syntax

```
policies group name list name rule name traffic-condition name protocol-condition
{
     protocol protocol;
     protocol-operation protocol-operation;
     ip-flags ip-flags;
     ip-flags-mask ip-flags-mask;
     fragment-offset fragment-offset;
     packet-length packet-length;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-condition name protocol-
condition]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure protocol conditions that do not include port conditions.

`protocol` *`protocol`*— Protocol matched by this classifier list.

Value— One of the following:

- Predefined global parameter—Use a ? at the command line to see a list of valid protocols.
- Protocol number in the range 0–257
- For PCMM classifiers, there are two special protocol values:
  - 256 matches traffic that has any IP protocol value
  - 257 matches both TCP and UDP traffic
- String expression
- Parameter of type protocol

Default— No value
Editing Level—Basic

`protocol-operation` *`protocol-operation`*—(Optional) Matches packets with the protocol that is either equal or not equal to the specified protocol.

Value— One of the following:

- Predefined global parameter:
  - is—Matches packets that are equal to the specified protocol
  - is_not—Matches any packets except those that are equal to the specified protocol. If you are configuring an ICMP, IGMP, IPsec, or TCP classifier, is_not is not a valid option.
- Boolean expression:
  - 1—is
  - 0—is_not
- Parameter of type protocolOperation

Default— 1
Editing Level—Basic

`ip-flags` *`ip-flags`*—(Optional) Value of the IP flags field in the IP header.

Value— One of the following:

- 0—Reserved
- 1—Do not fragment
- 2—More fragments
- Numeric expression
- Parameter of type ipFlags

Default— 0
Editing Level—Basic

`ip-flags-mask` *`ip-flags-mask`*—(Optional) Mask that is associated with the IP flag.

Value— One of the following:

- Integer in the range 0–7
- Numeric expression
- Parameter of type ipFlagsMask

Default— 0
Editing Level—Basic

`fragment-offset` *`fragment-offset`*—(Optional) Value of the fragment offset field.

Value— One of the following:

- For JUNOSe routers:
  - 0—Equal to 0
  - 1—Equal to 1
  - 2..8191
- For JUNOS routing platforms, integer in the range 0–8191
- Numeric expression
- Parameter of type fragOffset

Default— No value
Editing Level—Basic

`packet-length` *`packet-length`*—(Optional) Matches on length of the packet. The length refers only to the IP packet, including the packet header, and does not include any layer 2 encapsulation overhead. This option is available only in JUNOS policy rules.

Value— One of the following:

- Number of bytes; all positive numbers and 0 are valid
- Parameter of type packetLength

Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-condition *name* protocol-port-condition

Syntax

```
policies group name list name rule name traffic-condition name protocol-port-
condition {
     protocol protocol;
     protocol-operation protocol-operation;
     ip-flags ip-flags;
     ip-flags-mask ip-flags-mask;
     fragment-offset fragment-offset;
     packet-length packet-length;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-condition name protocol-
port-condition]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure matching conditions for protocols and ports.

`protocol` *`protocol`*— Protocol matched by this classifier list.

Value— One of the following:

- Predefined global parameter—Use a ? at the command line to see a list of valid protocols.
- Protocol number in the range 0–257
- For PCMM classifiers, there are two special protocol values:
  - 256 matches traffic that has any IP protocol value
  - 257 matches both TCP and UDP traffic
- String expression
- Parameter of type protocol

Default— No value
Editing Level—Basic

`protocol-operation` *`protocol-operation`*—(Optional) Matches packets with the protocol that is either equal or not equal to the specified protocol.

Value— One of the following:

- Predefined global parameter:
  - is—Matches packets that are equal to the specified protocol
  - is_not—Matches any packets except those that are equal to the specified protocol. If you are configuring an ICMP, IGMP, IPsec, or TCP classifier, is_not is not a valid option.
- Boolean expression:
  - 1—is
  - 0—is_not
- Parameter of type protocolOperation

Default— 1
Editing Level—Basic

`ip-flags` *`ip-flags`*—(Optional) Value of the IP flags field in the IP header.

Value— One of the following:

- 0—Reserved
- 1—Do not fragment
- 2—More fragments
- Numeric expression
- Parameter of type ipFlags

Default— 0
Editing Level—Basic

`ip-flags-mask` *`ip-flags-mask`*—(Optional) Mask that is associated with the IP flag.

Value— One of the following:

- Integer in the range 0–7
- Numeric expression
- Parameter of type ipFlagsMask

Default— 0
Editing Level—Basic

`fragment-offset` *`fragment-offset`*—(Optional) Value of the fragment offset field.

Value— One of the following:

- For JUNOSe routers:
  - 0—Equal to 0
  - 1—Equal to 1
  - 2..8191
- For JUNOS routing platforms, integer in the range 0–8191
- Numeric expression
- Parameter of type fragOffset

Default— No value
Editing Level—Basic

`packet-length` *`packet-length`*—(Optional) Matches on length of the packet. The length refers only to the IP packet, including the packet header, and does not include any layer 2 encapsulation overhead. This option is available only in JUNOS policy rules.

Value— One of the following:

- Number of bytes; all positive numbers and 0 are valid
- Parameter of type packetLength

Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-condition *name* protocol-port-condition destination-port port

Syntax

```
policies group name list name rule name traffic-condition name protocol-port-
condition destination-port port {
     port-operation port-operation;
     from-port from-port;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-condition name protocol-
port-condition destination-port port]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure matching conditions for ports.

Options

`port-operation` *`port-operation`*—(Optional) Matches packets with a port that is either equal or not equal to the specified port.

Value— One of the following:

- Predefined global parameter:
  - eq—Matches packets that contain the specified port number
  - neq—Matches any packet except those that contain the specified port number
- String
- Parameter of type portOperation

Default— No value
Editing Level—Basic

`from-port` *`from-port`*—(Optional) Source or destination port.

Value— One of the following:

- service_port—A predefined global parameter that is the port of the service as specified by the service object
- Integer in the range 0–65535
- Expression—A range of port numbers; for example, 10..20
- Parameter of type port

Use a range of ports to specify port numbers that are greater than or less than a specified port number. For example:

One of the following:

- To set a range of ports that is greater than 10, use 11..65535.
- To set a range of ports that is less than 200, use 0..199.

Note that PCMM IO2 classifiers do not support port ranges. If you are using PCMM IO2 and you enter a range of port numbers, the software cannot translate the port, and it throws an exception.

PCMM IO3 classifiers do support port ranges.

Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-condition *name* protocol-port-condition source-port port

Syntax

```
policies group name list name rule name traffic-condition name protocol-port-
condition source-port port {
     port-operation port-operation;
     from-port from-port;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-condition name protocol-
port-condition source-port port]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure matching conditions for ports.

Options

`port-operation` *`port-operation`*—(Optional) Matches packets with a port that is either equal or not equal to the specified port.

Value— One of the following:

- Predefined global parameter:
  - eq—Matches packets that contain the specified port number
  - neq—Matches any packet except those that contain the specified port number
- String
- Parameter of type portOperation

Default— No value
Editing Level—Basic

`from-port` *`from-port`*—(Optional) Source or destination port.

Value— One of the following:

- service_port—A predefined global parameter that is the port of the service as specified by the service object
- Integer in the range 0–65535
- Expression—A range of port numbers; for example, 10..20
- Parameter of type port

Use a range of ports to specify port numbers that are greater than or less than a specified port number. For example:

One of the following:

- To set a range of ports that is greater than 10, use 11..65535.
- To set a range of ports that is less than 200, use 0..199.

Note that PCMM IO2 classifiers do not support port ranges. If you are using PCMM IO2 and you enter a range of port numbers, the software cannot translate the port, and it throws an exception.

PCMM IO3 classifiers do support port ranges.

Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-condition *name* source-network group-network

Syntax

```
policies group name list name rule name traffic-condition name source-
network group-network {
     network-specifier network-specifier;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-condition name source-
network group-network]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Specify the source network to match using a network specifier. For JUNOS ASP and JUNOSe IPv6 policy rules, you must specify source networks in the network specifier format.

`network-specifier` *`network-specifier`*—(Optional) Specifies an IP address and mask.

Value— Specify the subnet in one of the following formats:

- [not] < address > / < mask > or < address > / < prefix length >
  - Include *not* to indicate that the condition matches every address that is not in the specified subnet.
  - < prefix length > is a number in the range 0–32, and specifies how many of the first bits in the address specify the network
- For JUNOS ASP policies, you must enter network in the format: < address > / < prefix length >

Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-condition *name* source-network network

Syntax

```
policies group name list name rule name traffic-condition name source-
network network {
     ip-address ip-address;
     ip-mask ip-mask;
     ip-operation ip-operation;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-condition name source-
network network]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Specify the source network in IP address and mask format. You also use this statement to specify whether the software matches or does not match the IP address and mask.

`ip-address` *`ip-address`*—(Optional) IP address of the source or destination network or host.

Value— One of the following:

- IP address
- Predefined global parameter:
  - gateway_ipAddress—IP address of the gateway as specified by the service object
  - interface_ipAddress—IP address of the router interface
  - service_ipAddress—IP address of the service as specified by the service object
  - user_ipAddress—IP address of the subscriber
  - virtual_ipAddress—Virtual portal address of the SAE that is used in redundant redirect server installations
- Expression—For NAT actions, you can enter a range of addresses; for example, 10.10.13.1..10.10.13.100
- Parameter of type address

Default— 0.0.0.0

Editing Level—Basic

`ip-mask` *`ip-mask`*—(Optional) IP address mask applied to the IP address.

Value— One of the following:

- IP address mask
- Predefined global parameter:
  - interface_ipMask—IP mask of the interface
  - service_ipMask—IP mask of the service as specified by the service object
  - user_ipMask—IP mask of the subscriber
- Parameter of type addressMask

Default— 255.255.255.255
Editing Level—Basic

`ip-operation` *`ip-operation`*—(Optional) Matches packets with an IP address and mask that either is equal or is not equal to the specified address and mask.

Value— One of the following:

- is—Matches the specified IP address and mask
- is_not—Matches any IP address and mask except the specified address and mask
- Parameter of type networkOperation

Default— is
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-condition *name* tcp-condition

Syntax

```
policies group name list name rule name traffic-condition name tcp-condition {
     tcp-flags tcp-flags;
     tcp-flags-mask tcp-flags-mask;
     protocol protocol;
     protocol-operation protocol-operation;
     ip-flags ip-flags;
     ip-flags-mask ip-flags-mask;
     fragment-offset fragment-offset;
     packet-length packet-length;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-condition name tcp-
condition]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure matching conditions for the TCP protocol.

Options

`tcp-flags` *`tcp-flags`*—(Optional) Value of the TCP flags field in the IP header.

Value— One of the following:

- Integer in the range 0–63
- Numeric expression
- Parameter of type tcpFlags

Default— 0
Editing Level—Basic

`tcp-flags-mask` *`tcp-flags-mask`*—(Optional) Mask associated with TCP flags.

Value— One of the following:

- Integer in the range 0–63
- Numeric expression
- Parameter of type tcpFlagsMask

Default— 0
Editing Level—Basic

`protocol` ***`protocol`***— Protocol matched by this classifier list.

Value— One of the following:

- Predefined global parameter—Use a ? at the command line to see a list of valid protocols.
- Protocol number in the range 0–257
- For PCMM classifiers, there are two special protocol values:
  - 256 matches traffic that has any IP protocol value
  - 257 matches both TCP and UDP traffic
- String expression
- Parameter of type protocol

Default— No value
Editing Level—Basic

`protocol-operation` ***`protocol-operation`***—(Optional) Matches packets with the protocol that is either equal or not equal to the specified protocol.

Value— One of the following:

- Predefined global parameter:
  - is—Matches packets that are equal to the specified protocol
  - is_not—Matches any packets except those that are equal to the specified protocol. If you are configuring an ICMP, IGMP, IPsec, or TCP classifier, is_not is not a valid option.
- Boolean expression:
  - 1—is
  - 0—is_not
- Parameter of type protocolOperation

Default— 1
Editing Level—Basic

`ip-flags` *`ip-flags`*—(Optional) Value of the IP flags field in the IP header.

Value— One of the following:

- 0—Reserved
- 1—Do not fragment
- 2—More fragments
- Numeric expression
- Parameter of type ipFlags

Default— 0
Editing Level—Basic

`ip-flags-mask` *`ip-flags-mask`*—(Optional) Mask that is associated with the IP flag.

Value— One of the following:

- Integer in the range 0–7
- Numeric expression
- Parameter of type ipFlagsMask

Default— 0
Editing Level—Basic

`fragment-offset` *`fragment-offset`*—(Optional) Value of the fragment offset field.

Value— One of the following:

- For JUNOSe routers:
  - 0—Equal to 0
  - 1—Equal to 1
  - 2..8191
- For JUNOS routing platforms, integer in the range 0–8191
- Numeric expression
- Parameter of type fragOffset

Default— No value
Editing Level—Basic

`packet-length` *`packet-length`*—(Optional) Matches on length of the packet. The length refers only to the IP packet, including the packet header, and does not include any layer 2 encapsulation overhead. This option is available only in JUNOS policy rules.

Value— One of the following:

- Number of bytes; all positive numbers and 0 are valid
- Parameter of type packetLength

Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-condition *name* tcp-condition destination-port port

Syntax

```
policies group name list name rule name traffic-condition name tcp-
condition destination-port port {
     port-operation port-operation;
     from-port from-port;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-condition name tcp-
condition destination-port port]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure matching conditions for ports.

Options

`port-operation` *`port-operation`*—(Optional) Matches packets with a port that is either equal or not equal to the specified port.

Value— One of the following:

- Predefined global parameter:
  - eq—Matches packets that contain the specified port number
  - neq—Matches any packet except those that contain the specified port number
- String
- Parameter of type portOperation

Default— No value
Editing Level—Basic

`from-port` *`from-port`*—(Optional) Source or destination port.

Value— One of the following:

- service_port—A predefined global parameter that is the port of the service as specified by the service object
- Integer in the range 0–65535
- Expression—A range of port numbers; for example, 10..20
- Parameter of type port

Use a range of ports to specify port numbers that are greater than or less than a specified port number. For example:

One of the following:

- To set a range of ports that is greater than 10, use 11..65535.
- To set a range of ports that is less than 200, use 0..199.

Note that PCMM IO2 classifiers do not support port ranges. If you are using PCMM IO2 and you enter a range of port numbers, the software cannot translate the port, and it throws an exception.

PCMM IO3 classifiers do support port ranges.

Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-condition *name* tcp-condition source-port port

Syntax

```
policies group name list name rule name traffic-condition name tcp-
condition source-port port {
     port-operation port-operation;
     from-port from-port;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-condition name tcp-
condition source-port port]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure matching conditions for ports.

Options

`port-operation` *`port-operation`*—(Optional) Matches packets with a port that is either equal or not equal to the specified port.

Value— One of the following:

- Predefined global parameter:
  - eq—Matches packets that contain the specified port number
  - neq—Matches any packet except those that contain the specified port number
- String
- Parameter of type portOperation

Default— No value
Editing Level—Basic

`from-port` *`from-port`*—(Optional) Source or destination port.

Value— One of the following:

- service_port—A predefined global parameter that is the port of the service as specified by the service object
- Integer in the range 0–65535
- Expression—A range of port numbers; for example, 10..20
- Parameter of type port

Use a range of ports to specify port numbers that are greater than or less than a specified port number. For example:

One of the following:

- To set a range of ports that is greater than 10, use 11..65535.
- To set a range of ports that is less than 200, use 0..199.

Note that PCMM IO2 classifiers do not support port ranges. If you are using PCMM IO2 and you enter a range of port numbers, the software cannot translate the port, and it throws an exception.

PCMM IO3 classifiers do support port ranges.

Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-condition *name* tos

Syntax

```
policies group name list name rule name traffic-condition name tos {
     tos-byte tos-byte;
     tos-byte-mask tos-byte-mask;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-condition name tos]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Define a particular traffic flow to the service's network for the DA IP field in the IP packet. The CoS feature on JUNOS routing platforms supports DiffServ as well as six-bit IP header ToS byte settings. The DiffServ protocol uses the ToS byte in the IP header. The most significant six bits of this byte form the Differentiated Services code point (DSCP). The CoS feature uses DSCPs to determine the forwarding class associated with each packet. It also uses the ToS byte and ToS byte mask to determine IP precedence.

`tos-byte` *`tos-byte`*—(Optional) For IPv4 packets, matches the value of the ToS field in the IP packet header. For IPv6 packets, matches the traffic-class field in the IP packet header.

Value— One of the following:

- Integer in the range 0–255; uses whole 8 bits of the ToS byte
- Numeric expression
- Parameter of type tosByte

Default— 0
Editing Level—Basic

`tos-byte-mask` *`tos-byte-mask`*—(Optional) Mask associated with the ToS byte.

Value— One of the following:

- Integer values of 224, 252, 255 for JUNOSe; values of 224, 252 for

JUNOS

For IPv4:

- 255 (tos)—Specifies the use of the whole 8 bits of the ToS byte; tos-byte range is 0–255.
- 252 (dsfield)—Specifies the use of the upper 6 bits of the ToS byte; tos-byte range is 0–63.
- 224 (precedence)—Specifies the use of the upper 3 bits of the ToS byte; tos-byte range is 0–7.

For IPv6:

- 255 (tcfield)—Specifies the use of the whole 8 bits of the traffic-class byte; tos-byte range is 0–255.
- 252 (dsfield)—Specifies the use of the upper 6 bits of the traffic-class byte; tos-byte range is 0–63.
- 224 (precedence)—Specifies the use of the upper 3 bits of the traffic-class byte; tos-byte range is 0–7.

- Numeric expression
- Parameter of type tosByteMask

Default— 0
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-condition *name* traffic-match-condition

Syntax

```
policies group name list name rule name traffic-condition name traffic-match-
condition {
     forwarding-class forwarding-class;
     interface-group interface-group;
     parent-group parent-group;
     source-class source-class;
     destination-class destination-class;
     allow-ip-options allow-ip-options;
     traffic-class traffic-class;
     term-precedence term-precedence;
     application [application...];
     application-group [application-group...];
     nested-application [nested-application...];
     color color;
     user-packet-class user-packet-class;
     destination-local-interface destination-local-interface;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-condition name traffic-
match-condition]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure match conditions for a classify-traffic condition.

Options

`forwarding-class` *`forwarding-class`*—(Optional) Matches packets based on the name of a forwarding class

`Value`— One of the following:

- String expression that matches a forwarding class on the router; for example, "assured-forwarding," "best-effort," "expedited-

forwarding," or "network-control"
- Parameter of type forwardingClass
- Predefined runtime parameter: fc_assured, fc_besteffort, fc_expedited

Default— No value
Editing Level—Basic

`interface-group` *`interface-group`*—(Optional) Matches packets based on the interface group on which the packet was received.

Value— One of the following:

- Integer in the range 0–4294967295
- Numeric expression
- Parameter of type interfaceGroup

Default— No value
Editing Level—Basic

`parent-group` *`parent-group`*—(Optional) Matches packets based on the name of a parent group. Parent groups provide support for rate-limit hierarchies.

Value— Name of parent group
Default— No value
Editing Level—Basic

`source-class` *`source-class`*—(Optional) Matches packets based on source class. For JUNOS filter policies, a source class is a set of source prefixes grouped together and given a class name. You would usually match source and destination classes for output firewall filters. Note that you cannot match on both source class and destination class at the same time. You must choose one or the other. For JUNOSe policies, a source class classifies based on packets associated with a route class based on the packet's source address.

Value— One of the following:

- For JUNOS policies, string expression that matches a source class that is configured on the router; for example, "gold-class"
- For JUNOSe policies, route-class in the range 0-255
- Parameter of type trafficClassSpec

Default— No value
Editing Level—Basic

`destination-class` *`destination-class`*—(Optional) Matches packets based on destination class. For JUNOS filter policies, a destination class is a set of destination prefixes grouped together and given a class name. You would usually match source and destination classes for output firewall filters. Note that you cannot match on both source class and destination class at the same time. You must choose one or the other. For JUNOSe policies, a destination class classifies based on packets associated with a route class based on the packet's destination address.

Value— One of the following:

- For JUNOS policies, string expression that matches a destination class that is configured on the router; for example, "gold-class"
- For JUNOSe policies, route-class in the range 0-255
- Parameter of type trafficClassSpec

Default— No value
Editing Level—Basic

`allow-ip-options` *`allow-ip-options`*—(Optional) Matches on IP options.

Value— One of the following:

- Numeric value of the IP option
- String expression that matches a text synonym of an IP option on the router; for example, "loose-source-route," "record-route," "router-alert," "strict-source-route," or "timestamp"
- Parameter of type allowIpOptions

Default— No value
Editing Level—Basic

`traffic-class` *`traffic-class`*—(Optional) Matches packets based on traffic class.

Value—Text
Default— No value
Editing Level—Basic

`term-precedence` *`term-precedence`*—(Optional) The precedence for this term in a given policy in relation to other terms. Lower precedence terms are searched first. Precedence only matters within the same class of policies, i.e., dynamic or static. Terms with same precedence may be evaluated at any, undeterministic order.

Value—Text
Default— 100
Editing Level—Basic

`application [application...]`—(Optional) List of applications to match for this policy.

Value—Text
Editing Level—Basic

`application-group [application-group...]`—(Optional) List of applications to match for this policy.

Value—Text
Editing Level—Basic

`nested-application [nested-application...]`—(Optional) List of nested applications to match for this policy.

Value—Text
Editing Level—Basic

`color color`—(Optional) Matches packets based on packet color.

Value— One of the following:

- Integer in the range 1–3
  - 1—green
  - 2—yellow
  - 3—red
- Parameter of type color

Default— No value
Editing Level—Basic

`user-packet-class user-packet-class`—(Optional) Matches packets based on the user packet class action number.

Value— One of the following:

- Integer in the range 0–15
- Parameter of type userPacketClass

Default— No value
Editing Level—Basic

`destination-local-interface` *`destination-local-interface`*—(Optional) Matches packets based on whether the destination interface is local.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-mirror

Syntax

```
policies group name list name rule name traffic-mirror {
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-mirror]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a traffic-mirror action. Use this action to mirror traffic from a destination to a source or from a source to a destination. You can configure traffic-mirror actions for JUNOS input policy rules.

Before you use traffic-mirror actions, you must configure forwarding options on JUNOS routing platforms for port mirroring and next-hop group. For information about these features, see the *JUNOS Policy Framework Configuration Guide*.

The policy rule that contains a traffic-mirror action must comply with these conditions:

- It must be combined with forward actions in the same rule. One of the forward actions must accept the traffic if the source and/or destination IP addresses do not match the conditions.
- It contains either no classify-traffic condition or only one classify-traffic condition.
- It can be marked for accounting.

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* traffic-shape

Syntax

```
policies group name list name rule name traffic-shape {
     rate rate;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name traffic-shape]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a traffic-shape action. Traffic-shape actions specify the maximum rate of traffic transmitted on an interface. You can create traffic-shape actions in JUNOS shaping policy rules.

`rate` *`rate`*—(Optional) Maximum transmission rate.

Value— One of the following:

- Predefined global parameter interface_speed—Speed of the subscriber's router interface
- Bits per second in the range 1000–32000000000
- Numeric expression
- Parameter of type rate

Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* list *name* rule *name* user-packet-class

Syntax

```
policies group name list name rule name user-packet-class {
     user-packet-class;
     description description;
}
```

Hierarchy Level

```
[edit policies group name list name rule name user-packet-class]
```

Release Information

Statement introduced in SRC Release 2.0.0

Description

Configure a user packet class action. Use this action to put packets in a particular user packet class. You can configure user packet class actions for JUNOSe policy rules.

user-packet-class—(Optional) User packet class that is applied to a packet when it passes through the router.

Value— One of the following:

- Integer in the range 0–15
- Parameter of type userPacketClass

Default— No value
Editing Level—Basic

description *description*—(Optional) Description of the object that you are configuring.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

policies group *name* local-parameters

Syntax

```
policies group name local-parameters name {
     description description;
     default-value default-value;
     type type;
}
```

Hierarchy Level

```
[edit policies group name local-parameters]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Define a local parameter. Local parameters are available only for the policy group in which the parameter is defined.

Options

`name` *`name`*— Name of the parameter

Value— Text

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value— Text
Default— No value
Editing Level—Basic

`default-value` *`default-value`*—(Optional) Value that the policy engine uses if no other values are provided during the parameter value acquisition process. If other values are provided to the policy engine but problems are encountered, the default value for the parameter is not used. The policy engine generates an error message.

Value— Valid value for the parameter type. See the policy documentation in the *SRC PE Services and Policies Guide* for valid values for each parameter type.
Default— No value

Editing Level—Basic

`type` *type*—(Optional) Type of attribute for which you can use the parameter. The parameter type determines where you can use the parameter.

Value— See the policy documentation in the *SRC PE Services and Policies Guide* for a list of parameter types, where each type of parameter is used, and what each parameter is used to specify.
Default— No value
Editing Level—Basic

Required Privilege Level

service

Required Editing Level

Basic

Subscriber CLI

The following table summarizes the SRC command-line interface (SRC CLI) for configuring subscribers. Configuration statements are listed in alphabetical order.

Subscriber CLI Configuration Statements
subscribers retailer
subscribers retailer name info
subscribers retailer name manager
subscribers retailer name schedule
subscribers retailer name schedule name event
subscribers retailer name schedule name event name action
subscribers retailer name schedule name event name action name attribute
subscribers retailer name schedule name event name except
subscribers retailer name schedule name event name except name from
subscribers retailer name schedule name event name except name to
subscribers retailer name schedule name event name from
subscribers retailer name schedule name event name to
subscribers retailer name subscriber-folder
subscribers retailer name subscriber-folder folder-name device
subscribers retailer name subscriber-folder folder-name device device-name manager
subscribers retailer name subscriber-folder folder-name device device-name schedule
subscribers retailer name subscriber-folder folder-name device device-name schedule name event
subscribers retailer name subscriber-folder folder-name device device-name schedule name event name action
subscribers retailer name subscriber-folder folder-name device device-name schedule name event name action name attribute
subscribers retailer name subscriber-folder folder-name device device-name schedule name event name except

subscribers retailer name subscriber-folder folder-name device device-name schedule name event name except name from
subscribers retailer name subscriber-folder folder-name device device-name schedule name event name except name to
subscribers retailer name subscriber-folder folder-name device device-name schedule name event name from
subscribers retailer name subscriber-folder folder-name device device-name schedule name event name to
subscribers retailer name subscriber-folder folder-name device device-name subscription
subscribers retailer name subscriber-folder folder-name enterprise
subscribers retailer name subscriber-folder folder-name enterprise name access
subscribers retailer name subscriber-folder folder-name enterprise name access name admission-control
subscribers retailer name subscriber-folder folder-name enterprise name access name manager
subscribers retailer name subscriber-folder folder-name enterprise name access name schedule
subscribers retailer name subscriber-folder folder-name enterprise name access name schedule name event
subscribers retailer name subscriber-folder folder-name enterprise name access name schedule name event name action
subscribers retailer name subscriber-folder folder-name enterprise name access name schedule name event name action name attribute
subscribers retailer name subscriber-folder folder-name enterprise name access name schedule name event name except
subscribers retailer name subscriber-folder folder-name enterprise name access name schedule name event name except name from
subscribers retailer name subscriber-folder folder-name enterprise name access name schedule name event name except name to
subscribers retailer name subscriber-folder folder-name enterprise name access name schedule name event name from
subscribers retailer name subscriber-folder folder-name enterprise name access name schedule name event name to
subscribers retailer name subscriber-folder folder-name enterprise name access name subscription
subscribers retailer name subscriber-folder folder-name enterprise name device
subscribers retailer name subscriber-folder folder-name enterprise name device device-name manager

subscribers retailer name subscriber-folder folder-name enterprise name device device-name schedule
subscribers retailer name subscriber-folder folder-name enterprise name device device-name schedule name event
subscribers retailer name subscriber-folder folder-name enterprise name device device-name schedule name event name action
subscribers retailer name subscriber-folder folder-name enterprise name device device-name schedule name event name action name attribute
subscribers retailer name subscriber-folder folder-name enterprise name device device-name schedule name event name except
subscribers retailer name subscriber-folder folder-name enterprise name device device-name schedule name event name except name from
subscribers retailer name subscriber-folder folder-name enterprise name device device-name schedule name event name except name to
subscribers retailer name subscriber-folder folder-name enterprise name device device-name schedule name event name from
subscribers retailer name subscriber-folder folder-name enterprise name device device-name schedule name event name to
subscribers retailer name subscriber-folder folder-name enterprise name device device-name subscription
subscribers retailer name subscriber-folder folder-name enterprise name info
subscribers retailer name subscriber-folder folder-name enterprise name manager
subscribers retailer name subscriber-folder folder-name enterprise name schedule
subscribers retailer name subscriber-folder folder-name enterprise name schedule name event
subscribers retailer name subscriber-folder folder-name enterprise name schedule name event name action
subscribers retailer name subscriber-folder folder-name enterprise name schedule name event name action name attribute
subscribers retailer name subscriber-folder folder-name enterprise name schedule name event name except
subscribers retailer name subscriber-folder folder-name enterprise name schedule name event name except name from
subscribers retailer name subscriber-folder folder-name enterprise name schedule name event name except name to
subscribers retailer name subscriber-folder folder-name enterprise name schedule name event name from

subscribers retailer name subscriber-folder folder-name enterprise name schedule name event name to
subscribers retailer name subscriber-folder folder-name enterprise name site
subscribers retailer name subscriber-folder folder-name enterprise name site name access
subscribers retailer name subscriber-folder folder-name enterprise name site name access name admission-control
subscribers retailer name subscriber-folder folder-name enterprise name site name access name manager
subscribers retailer name subscriber-folder folder-name enterprise name site name access name schedule
subscribers retailer name subscriber-folder folder-name enterprise name site name access name schedule name event
subscribers retailer name subscriber-folder folder-name enterprise name site name access name schedule name event name action
subscribers retailer name subscriber-folder folder-name enterprise name site name access name schedule name event name action name attribute
subscribers retailer name subscriber-folder folder-name enterprise name site name access name schedule name event name except
subscribers retailer name subscriber-folder folder-name enterprise name site name access name schedule name event name except name from
subscribers retailer name subscriber-folder folder-name enterprise name site name access name schedule name event name except name to
subscribers retailer name subscriber-folder folder-name enterprise name site name access name schedule name event name from
subscribers retailer name subscriber-folder folder-name enterprise name site name access name schedule name event name to
subscribers retailer name subscriber-folder folder-name enterprise name site name access name subscription
subscribers retailer name subscriber-folder folder-name enterprise name site name device
subscribers retailer name subscriber-folder folder-name enterprise name site name device device-name manager
subscribers retailer name subscriber-folder folder-name enterprise name site name device device-name schedule
subscribers retailer name subscriber-folder folder-name enterprise name site name device device-name schedule name event

subscribers retailer name subscriber-folder folder-name enterprise name site name device device-name schedule name event name action
subscribers retailer name subscriber-folder folder-name enterprise name site name device device-name schedule name event name action name attribute
subscribers retailer name subscriber-folder folder-name enterprise name site name device device-name schedule name event name except
subscribers retailer name subscriber-folder folder-name enterprise name site name device device-name schedule name event name except name from
subscribers retailer name subscriber-folder folder-name enterprise name site name device device-name schedule name event name except name to
subscribers retailer name subscriber-folder folder-name enterprise name site name device device-name schedule name event name from
subscribers retailer name subscriber-folder folder-name enterprise name site name device device-name schedule name event name to
subscribers retailer name subscriber-folder folder-name enterprise name site name device device-name subscription
subscribers retailer name subscriber-folder folder-name enterprise name site name manager
subscribers retailer name subscriber-folder folder-name enterprise name site name schedule
subscribers retailer name subscriber-folder folder-name enterprise name site name schedule name event
subscribers retailer name subscriber-folder folder-name enterprise name site name schedule name event name action
subscribers retailer name subscriber-folder folder-name enterprise name site name schedule name event name action name attribute
subscribers retailer name subscriber-folder folder-name enterprise name site name schedule name event name except
subscribers retailer name subscriber-folder folder-name enterprise name site name schedule name event name except name from
subscribers retailer name subscriber-folder folder-name enterprise name site name schedule name event name except name to
subscribers retailer name subscriber-folder folder-name enterprise name site name schedule name event name from
subscribers retailer name subscriber-folder folder-name enterprise name site name schedule name event name to

subscribers retailer name subscriber-folder folder-name enterprise name site name subscription
subscribers retailer name subscriber-folder folder-name enterprise name subscription
subscribers retailer name subscriber-folder folder-name enterprise name vpn
subscribers retailer name subscriber-folder folder-name manager
subscribers retailer name subscriber-folder folder-name schedule
subscribers retailer name subscriber-folder folder-name schedule name event
subscribers retailer name subscriber-folder folder-name schedule name event name action
subscribers retailer name subscriber-folder folder-name schedule name event name action name attribute
subscribers retailer name subscriber-folder folder-name schedule name event name except
subscribers retailer name subscriber-folder folder-name schedule name event name except name from
subscribers retailer name subscriber-folder folder-name schedule name event name except name to
subscribers retailer name subscriber-folder folder-name schedule name event name from
subscribers retailer name subscriber-folder folder-name schedule name event name to
subscribers retailer name subscriber-folder folder-name subscriber
subscribers retailer name subscriber-folder folder-name subscriber name admission-control
subscribers retailer name subscriber-folder folder-name subscriber name info
subscribers retailer name subscriber-folder folder-name subscriber name schedule
subscribers retailer name subscriber-folder folder-name subscriber name schedule name event
subscribers retailer name subscriber-folder folder-name subscriber name schedule name event name action
subscribers retailer name subscriber-folder folder-name subscriber name schedule name event name action name attribute
subscribers retailer name subscriber-folder folder-name subscriber name schedule name event name except
subscribers retailer name subscriber-folder folder-name subscriber name schedule name event name except name from
subscribers retailer name subscriber-folder folder-name subscriber name schedule name event name except name to
subscribers retailer name subscriber-folder folder-name subscriber name schedule name event name from

subscribers retailer name subscriber-folder folder-name subscriber name schedule name event name to
subscribers retailer name subscriber-folder folder-name subscriber name subscription
subscribers retailer name subscriber-folder folder-name subscription
subscribers retailer name subscription
subscribers retailer name vpn

subscribers retailer

Syntax

```
subscribers retailer name {
     domain-name [domain-name...];
     authentication-plug-in [authentication-plug-in...];
     dhcp-authentication-plug-in [dhcp-authentication-plug-in...];
     tracking-plug-in [tracking-plug-in...];
     maximum-login maximum-login;
     session-timeout session-timeout;
     scope [scope...];
     imported-extranet [imported-extranet...];
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a retailer subscriber.

Options

`name` *`name`*— Name of the retailer.

Value— Text

`domain-name [`*`domain-name`*`...]`— Domain names associated with the retailer.

Value— Domain name in the format domainName.domainExtension. For example: virneo.com.
Default— No value
Editing Level—Basic

`authentication-plug-in [`*`authentication-plug-in`*`...]`—(Optional) Single authentication plug-in or a list of plug-ins used to authenticate subscribers who log in to the domains specified for this retailer. If you do not specify a plug-in for the retailer, the SAE uses

the default retailer authentication plug-in.

Value— Single authentication plug-in or a list of plug-ins
Default— No value
Editing Level—Basic

`dhcp-authentication-plug-in [`*`dhcp-authentication-plug-in...`*`]`—(Optional) Single authentication plug-in or a list of plug-ins used to authenticate DHCP address requests for subscribers who log in to the domains specified for this retailer. If you do not specify a plug-in for the retailer, the SAE uses the default retailer DHCP authentication plug-in.

Value— Single authentication plug-in or a list of plug-ins
Default— No value
Editing Level—Basic

`tracking-plug-in [`*`tracking-plug-in...`*`]`—(Optional) Single tracking plug-in or a list of tracking plug-ins used to track subscriber sessions associated with this retailer. If you do not specify a plug-in for the retailer, the SAE uses the global subscriber tracking plug-in.

Value— Single tracking plug-in or a list of tracking plug-ins
Default— No value
Editing Level—Basic

`maximum-login` *`maximum-login`*—(Optional) Maximum number of concurrent logins for subscribers associated with this object. By default, all subordinate objects use this value. However, if you specify this value for a subordinate object, that object and its subordinate objects will use the subordinate's value.

Value— Integer in the range 0–2147483647
Default— No value
Editing Level—Basic

`session-timeout` *`session-timeout`*—(Optional) Timeout for subscriber sessions. By default, all subordinate objects use this value. However, if you specify this value for a subordinate object, that object and its subordinate objects will use the subordinate's value.

Value— Number of seconds in the range 0–2147483647
Default— No value
Editing Level—Basic

`scope [`*`scope...`*`]`—(Optional) Service scope(s) assigned to subscribers. By default, this value is inherited from parent objects. However, if you specify a value here, it overrides the default for this subscriber and all subordinate objects.

Value— Single service or a list of scopes
Default— No value

Editing Level—Basic

`imported-extranet [`*`imported-extranet...`*`]`—(Optional) Extranet exported by another retailer or enterprise.

Value— DN of the extranet
Default— No value
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Actual values for parameters associated with this object. The policy engine substitutes parameters in policies associated with this object with the values that you specify in the substitution configuration.

Value— Substitution in the form < parameter name > = < value > . For example, bandwidth = 1000000.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* info

Syntax

```
subscribers retailer name info {
     contact contact;
     e-mail e-mail;
     url url;
}
```

Hierarchy Level

```
[edit subscribers retailer name info]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure contact information for the retailer.

Options

`contact` *`contact`*—(Optional) Name of the contact person at the retailer.

Value— Text
Default— No value
Editing Level—Basic

`e-mail` *`e-mail`*—(Optional) E-mail address of the contact person at the retailer.

Value— E-mail address
Default— No value
Editing Level—Basic

`url` *`url`*—(Optional) URL of the retailer.

Value— URL
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* manager

Syntax

```
subscribers retailer name manager name {
     role [(administrator | subscription | substitution | activation | vpn)...];
     encrypted-password encrypted-password;
     plain-text-password;
     description description;
}
```

Hierarchy Level

```
[edit subscribers retailer name manager]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a manager account.

Options

`name` *`name`*— Name of the manager account.

Value— Text

`role [(administrator | subscription | substitution | activation | vpn)...]`— Privilege level of the enterprise manager account. If you do not specify a privilege level, the manager has read-only access to associated objects.

Value

- `administrator`— Administrators have all privileges of the subscription, substitution, activation, and vpn roles. Additionally, administrators can create, delete, and modify other enterprise manager objects.
- `subscription`— Subscription managers can create, delete, modify, activate, and deactivate subscriptions.
- `substitution`— Substitution managers can modify policy parameters provided by subscriptions, enterprises, sites, and accesses.
- `activation`— Activation managers can activate and deactivate

subscriptions.
- `vpn`— VPN managers can modify, export, and cancel the export of VPNs.

Default— No value
Editing Level—Basic

`encrypted-password` *`encrypted-password`*—(Optional) Login password and type of encryption.

Value— Enter a password, and select an encryption method that your directory supports.

- crypt—Style is /etc/passwd
- sha—Secure hash algorithm
- md5—Message digest #5

Default— No value
Editing Level—Basic

`plain-text-password`—(Optional) Plain text password. The password is encrypted using the algorithm defined in `system services editor password-encryption`.

Value— Text
Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value— Text
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* schedule

Syntax

```
subscribers retailer name schedule name {
     description description;
}
```

Hierarchy Level

```
[edit subscribers retailer name schedule]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service schedule.

Options

`name` *`name`*— Name of service schedule.

Value—Text

`description` *`description`*—(Optional) Description of the service schedule.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* schedule *name* event

Syntax

```
subscribers retailer name schedule name event name ...
```

Hierarchy Level

```
[edit subscribers retailer name schedule name event]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a scheduling event.

Options

`name` *name*— Name of the scheduling event.

Value—Text

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* schedule *name* event *name* action

Syntax

```
subscribers retailer name schedule name event name action name {
     type (activate | deactivate | deny | deny-deactivate);
     service service;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name schedule name event name action]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure actions to perform for the scheduled event.

Options

`name` *name*— Arbitrary identifier for action.

Value—Text

`type (activate | deactivate | deny | deny-deactivate)`— Type of action.

Value

- `activate`— Activate service at the time specified in the entry schedule.
- `deactivate`— Deactivate service at the time specified in the entry schedule.
- `deny`— Deny new activation requests during the time specified in the entry schedule; current sessions are not affected. This value applies only to services that have an authorization plug-in configured.
- `deny-deactivate`— Deny new activation requests during the time specified in the entry schedule; current sessions are deactivated at the specified time. This value applies only to services that have an authorization plug-in configured.

Default— No value
Editing Level—Basic

`service` *`service`*— Name of service affected by this action.

Value—Text
Default— No value
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Substitutions to be used when activating the service. Substitutions apply only to service activations.

Value— An entry in valid substitution format. See the *SRC PE Services and Policies Guide*.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* schedule *name* event *name* action *name* attribute

Syntax

```
subscribers retailer name schedule name event name action name attribute (sessionName |
sessionTag | sessionTimeout | downStreamBandwidth | upStreamBandwidth) {
     value;
}
```

Hierarchy Level

```
[edit subscribers retailer name schedule name event name action name attribute]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure subscription attributes. Subscription attributes apply only to service activations.

Options

Subscription attributes.

Value

- `sessionName`— Name of the service session.
- `sessionTag`— Tag that can be used for accounting purposes.
- `sessionTimeout`— Session timeout to be used when the service is activated. The service session is deactivated when this timeout expires.
- `downStreamBandwidth`— Attribute used by SRC Admission Control Plug-In (SRC ACP) to specify the rate of traffic between the network and the subscriber.
- `upStreamBandwidth`— Attribute used by SRC ACP to specify the rate of traffic between the subscriber and the network.

`value`— Value of the specified subscription attribute.

Value— Depends on the specified subscription attribute
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* schedule *name* event *name* except

Syntax

`subscribers retailer` *name* `schedule` *name* `event` *name* `except` *name* `...`

Hierarchy Level

`[edit subscribers retailer` *name* `schedule` *name* `event` *name* `except]`

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure an exclusion for the event.

Options

`name` *name*— Arbitrary identifier for exclusion rule.

`Value`—Text

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* schedule *name* event *name* except *name* from

Syntax

```
subscribers retailer name schedule name event name except name from {
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name schedule name event name except name from]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the start time of the exclusion. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* schedule *name* event *name* except *name* to

Syntax

```
subscribers retailer name schedule name event name except name to {
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name schedule name event name except name to]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the end time of the exclusion. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

These values apply only to services that have an authorization plug-in configured. If an authorization plug-in is not configured for the service associated with the schedule, these values are ignored.

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or

exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
  - *hh*—Hour of the day in the range of 0–23
  - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* schedule *name* event *name* from

Syntax

```
subscribers retailer name schedule name event name from {
     effective effective;
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name schedule name event name from]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the start time for the event. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

`effective` *`effective`*—(Optional) Interval after the associated `from` or `to` time during which the scheduled action can be initiated by a subscriber who is logging in to a subscriber session.

Value— Number of minutes in the range 0–153722867280912
Default— *
Editing Level—Basic

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event

or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *

Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* schedule *name* event *name* to

Syntax

```
subscribers retailer name schedule name event name to {
     effective effective;
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name schedule name event name to]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the end time for the event. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

These values apply only to services that have an authorization plug-in configured. If an authorization plug-in is not configured for the service associated with the schedule, these values are ignored.

`effective` *`effective`*—(Optional) Interval after the associated `from` or `to` time during which the scheduled action can be initiated by a subscriber who is logging in to a subscriber session.

Value— Number of minutes in the range 0–153722867280912
Default— *
Editing Level—Basic

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder

Syntax

```
subscribers retailer name subscriber-folder folder-name {
     maximum-login maximum-login;
     session-timeout session-timeout;
     scope [scope...];
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a subscriber folder. You can create subscriber folders for retailers, existing subscriber folders, enterprises, and sites. You must create a subscriber folder in a retailer object before you can add other types of subscribers.

Options

`folder-name` *`folder-name`*— Name of the subscriber folder.

Value— Text

`maximum-login` *`maximum-login`*—(Optional) Maximum number of concurrent logins for subscribers associated with this object. By default, all subordinate objects use this value. However, if you specify this value for a subordinate object, that object and its subordinate objects will use the subordinate's value.

Value— Integer in the range 0–2147483647
Default— No value
Editing Level—Basic

`session-timeout` *`session-timeout`*—(Optional) Timeout for subscriber sessions. By default, all subordinate objects use this value. However, if you specify this value for a subordinate object, that object and its subordinate objects will use the subordinate's value.

Value— Number of seconds in the range 0–2147483647
Default— No value
Editing Level—Basic

`scope [scope...]`—(Optional) Service scope(s) assigned to subscribers. By default, this value is inherited from parent objects. However, if you specify a value here, it overrides the default for this subscriber and all subordinate objects.

Value— Single service or a list of scopes
Default— No value
Editing Level—Basic

`substitution [substitution...]`—(Optional) Actual values for parameters associated with this object. The policy engine substitutes parameters in policies associated with this object with the values that you specify in the substitution configuration.

Value— Substitution in the form < parameter name > = < value > . For example, bandwidth = 1000000.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* device

Syntax

```
subscribers retailer name subscriber-folder folder-name device device-name {
     display-name display-name;
     maximum-login maximum-login;
     accounting-user-id accounting-user-id;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-name device]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a device subscriber for subscriber sessions that manage the forwarding interface on JUNOS routing platforms and the router pseudo-subscriber on JUNOSe routers.

Options

`device-name` *`device-name`*— Name of the device subscriber.

Value— Text

`display-name` *`display-name`*—(Optional) Subscriber's name as it appears in portal applications. If you do not specify a display name, the value of the name option is used.

Value— Text
Default— No value
Editing Level—Basic

`maximum-login` *`maximum-login`*—(Optional) Maximum number of concurrent logins for subscribers associated with this object. By default, all subordinate objects use this value. However, if you specify this value for a subordinate object, that object and its subordinate objects will use the subordinate's value.

Value— Integer in the range 0–2147483647
Default— No value

Editing Level—Basic

`accounting-user-id` *`accounting-user-id`*—(Optional) Value that identifies the subscriber in accounting records. For a household subscriber, all subordinate subscribers generally use the same ID. For an enterprise, all parts of the enterprise generally use the same ID.

Value— Text
Default— No value
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Actual values for parameters associated with this object. The policy engine substitutes parameters in policies associated with this object with the values that you specify in the substitution configuration.

Value— Substitution in the form < parameter name > = < value > . For example, bandwidth = 1000000.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* device *device-name* manager

Syntax

```
subscribers retailer name subscriber-folder folder-name device device-
name manager name {
     role [(administrator | subscription | substitution | activation | vpn)...];
     encrypted-password encrypted-password;
     plain-text-password;
     description description;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-name device device-
name manager]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a manager account.

Options

`name` *name*— Name of the manager account.

Value— Text

`role [(administrator | subscription | substitution | activation | vpn)...]`— Privilege level of the enterprise manager account. If you do not specify a privilege level, the manager has read-only access to associated objects.

Value

- `administrator`— Administrators have all privileges of the subscription, substitution, activation, and vpn roles. Additionally, administrators can create, delete, and modify other enterprise manager objects.
- `subscription`— Subscription managers can create, delete, modify, activate, and deactivate subscriptions.

- `substitution`— Substitution managers can modify policy parameters provided by subscriptions, enterprises, sites, and accesses.
- `activation`— Activation managers can activate and deactivate subscriptions.
- `vpn`— VPN managers can modify, export, and cancel the export of VPNs.

Default— No value
Editing Level—Basic

`encrypted-password` *`encrypted-password`*—(Optional) Login password and type of encryption.

Value— Enter a password, and select an encryption method that your directory supports.

- crypt—Style is /etc/passwd
- sha—Secure hash algorithm
- md5—Message digest #5

Default— No value
Editing Level—Basic

`plain-text-password`—(Optional) Plain text password. The password is encrypted using the algorithm defined in `system services editor password-encryption`.

Value— Text
Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value— Text
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* device *device-name* schedule

Syntax

```
subscribers retailer name subscriber-folder folder-name device device-
name schedule name {
     description description;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-name device device-
name schedule]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service schedule.

Options

`name` *`name`*— Name of service schedule.

Value—Text

`description` *`description`*—(Optional) Description of the service schedule.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* device *device-name* schedule *name* event

Syntax

```
subscribers retailer name subscriber-folder folder-name device device-
name schedule name event name ...
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-name device device-
name schedule name event]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a scheduling event.

Options

name *name*— Name of the scheduling event.

Value—Text

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* device *device-name* schedule *name* event *name* action

Syntax

```
subscribers retailer name subscriber-folder folder-name device device-
name schedule name event name action name {
     type (activate | deactivate | deny | deny-deactivate);
     service service;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-name device device-
name schedule name event name action]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure actions to perform for the scheduled event.

Options

`name` *name*— Arbitrary identifier for action.

Value—Text

`type (activate | deactivate | deny | deny-deactivate)`— Type of action.

Value

- `activate`— Activate service at the time specified in the entry schedule.
- `deactivate`— Deactivate service at the time specified in the entry schedule.
- `deny`— Deny new activation requests during the time specified in the entry schedule; current sessions are not affected. This value applies only to services that have an authorization plug-in configured.
- `deny-deactivate`— Deny new activation requests during the

time specified in the entry schedule; current sessions are deactivated at the specified time. This value applies only to services that have an authorization plug-in configured.

Default— No value
Editing Level—Basic

`service` *`service`*— Name of service affected by this action.

Value—Text
Default— No value
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Substitutions to be used when activating the service. Substitutions apply only to service activations.

Value— An entry in valid substitution format. See the *SRC PE Services and Policies Guide*.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* device *device-name* schedule *name* event *name* action *name* attribute

Syntax

```
subscribers retailer name subscriber-folder folder-name device device-
name schedule name event name action name attribute (sessionName | sessionTag |
sessionTimeout | downStreamBandwidth | upStreamBandwidth) {
     value;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-name device device-
name schedule name event name action name attribute]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure subscription attributes. Subscription attributes apply only to service activations.

Options

Subscription attributes.

Value

- `sessionName`— Name of the service session.
- `sessionTag`— Tag that can be used for accounting purposes.
- `sessionTimeout`— Session timeout to be used when the service is activated. The service session is deactivated when this timeout expires.
- `downStreamBandwidth`— Attribute used by SRC Admission Control Plug-In (SRC ACP) to specify the rate of traffic between the network and the subscriber.
- `upStreamBandwidth`— Attribute used by SRC ACP to specify the rate of traffic between the subscriber and the network.

`value`— Value of the specified subscription attribute.

Value— Depends on the specified subscription attribute
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* device *device-name* schedule *name* event *name* except

Syntax

```
subscribers retailer name subscriber-folder folder-name device device-
name schedule name event name except name ...
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-name device device-
name schedule name event name except]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure an exclusion for the event.

Options

`name` *name*— Arbitrary identifier for exclusion rule.

Value—Text

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* device *device-name* schedule *name* event *name* except *name* from

Syntax

```
subscribers retailer name subscriber-folder folder-name device device-
name schedule name event name except name from {
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-name device device-
name schedule name event name except name from]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the start time of the exclusion. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* device *device-name* schedule *name* event *name* except *name* to

Syntax

```
subscribers retailer name subscriber-folder folder-name device device-
name schedule name event name except name to {
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-name device device-
name schedule name event name except name to]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the end time of the exclusion. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

These values apply only to services that have an authorization plug-in configured. If an authorization plug-in is not configured for the service associated with the schedule, these values are ignored.

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
  - *hh*—Hour of the day in the range of 0–23
  - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* device *device-name* schedule *name* event *name* from

Syntax

```
subscribers retailer name subscriber-folder folder-name device device-
name schedule name event name from {
     effective effective;
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-name device device-
name schedule name event name from]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the start time for the event. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

`effective` *`effective`*—(Optional) Interval after the associated `from` or `to` time during which the scheduled action can be initiated by a subscriber who is logging in to a subscriber session.

Value— Number of minutes in the range 0–153722867280912
Default— *
Editing Level—Basic

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23

- *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* device *device-name* schedule *name* event *name* to

Syntax

```
subscribers retailer name subscriber-folder folder-name device device-
name schedule name event name to {
     effective effective;
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-name device device-
name schedule name event name to]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the end time for the event. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

These values apply only to services that have an authorization plug-in configured. If an authorization plug-in is not configured for the service associated with the schedule, these values are ignored.

`effective` *`effective`*—(Optional) Interval after the associated `from` or `to` time during which the scheduled action can be initiated by a subscriber who is logging in to a subscriber session.

Value— Number of minutes in the range 0–153722867280912
Default— *
Editing Level—Basic

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* device *device-name* subscription

Syntax

```
subscribers retailer name subscriber-folder folder-name device device-
name subscription subscription-name {
     status (active | suspended | hidden);
     activation (manual | automatically-on-login);
     activation-order activation-order;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-name device device-
name subscription]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service subscription.

Options

`subscription-name` *`subscription-name`*— Name of the service optionally followed by "%*subscription-id*". Use "%*subscription-id*" to subscribe subscribers to the same service multiple times with different subscription attributes.

Value— Text

`status (active | suspended | hidden)`— Status of the service subscription.

Value

- `active`— The subscriber can activate the subscription.
- `suspended`— The subscriber cannot activate the subscription, although it may be visible through the portal. If you change the status of the subscription to suspended while the subscription is active, the service is deactivated.
- `hidden`— Service is not available through a portal and cannot be

activated automatically when the subscribers log in. If you change the status of the subscription to hidden while the subscription is active, the service is not deactivated.

Default— Active
Editing Level—Basic

`activation (manual | automatically-on-login)`— Specify how the service is activated.

Value

- `manual`— Subscriber must manually activate the service.
- `automatically-on-login`— Service is activated automatically when the subscriber logs in.

Default— Manual activation
Editing Level—Basic

`activation-order` *`activation-order`*—(Optional) Order in which subscriptions are automatically activated on login relative to the subscriber's other subscriptions that are configured to activate on login. Review all subscriptions that are configured to activate on login for the subscriber, and review the activation order for subscriptions of the parent subscribers. Assign the lowest number to the subscription that you want to activate first. Assign higher numbers to the other subscriptions in the order that you want the SAE to activate them. If you assign the same number to multiple subscriptions, the SAE activates them in an unspecified order.

Value— Integer in the range 0–21474863647
Default— 10000
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Actual values for parameters associated with this object. The policy engine substitutes parameters in policies associated with this object with the values that you specify in the substitution configuration.

Value— Substitution in the form < parameter name > = < value > . For example, bandwidth = 1000000.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise

Syntax

```
subscribers retailer name subscriber-folder folder-name enterprise name {
     display-name display-name;
     accounting-user-id accounting-user-id;
     description description;
     scope [scope...];
     imported-extranet [imported-extranet...];
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-name enterprise]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure an enterprise subscriber.

Options

`name` *`name`*— Name of the enterprise subscriber

Value— Text

`display-name` *`display-name`*—(Optional) Subscriber's name as it appears in portal applications. If you do not specify a display name, the value of the name option is used.

Value— Text
Default— No value
Editing Level—Basic

`accounting-user-id` *`accounting-user-id`*—(Optional) Value that identifies the subscriber in accounting records. For a household subscriber, all subordinate subscribers generally use the same ID. For an enterprise, all parts of the enterprise generally use the same ID.

Value— Text
Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value— Text
Default— No value
Editing Level—Basic

`scope [`*`scope...`*`]`—(Optional) Service scope(s) assigned to subscribers. By default, this value is inherited from parent objects. However, if you specify a value here, it overrides the default for this subscriber and all subordinate objects.

Value— Single service or a list of scopes
Default— No value
Editing Level—Basic

`imported-extranet [`*`imported-extranet...`*`]`—(Optional) Extranet exported by another retailer or enterprise.

Value— DN of the extranet
Default— No value
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Actual values for parameters associated with this object. The policy engine substitutes parameters in policies associated with this object with the values that you specify in the substitution configuration.

Value— Substitution in the form < parameter name > = < value > . For example, bandwidth = 1000000.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* access

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name access name {
     routing-protocol routing-protocol;
     interface-alias interface-alias;
     interface-description interface-description;
     interface-name interface-name;
     unique-id unique-id;
     port-id port-id;
     device-name device-name;
     display-name display-name;
     accounting-user-id accounting-user-id;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name access]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure an access. You can configure an access for an enterprise or for a site. An access determines the way that the enterprise or site accesses Internet services, and specifies a set of services that are available to the enterprise or site.

Options

`name` *`name`*— Name of the access.

Value— Text

`routing-protocol` *`routing-protocol`*—(Optional) Routing protocol used at the enterprise or site. If you build a custom enterprise manager application, you can access this information through the enterprise portal APIs.

Value— Routing protocol
Default— No value
Editing Level—Basic

`interface-alias` *`interface-alias`*—(Optional) Description of the router interface. You can use this option to allow subscriber classification scripts to match interfaces reported from the network to be matched with the corresponding access.

Value— Interface description that is configured on the router.
Default— No value
Editing Level—Basic

`interface-description` *`interface-description`*—(Optional) Name of the interface that SNMP uses. You can use this option to allow subscriber classification scripts to match interfaces reported from the network to be matched with the corresponding access.

Value— One of the following:

- For JUNOSe routers, the format of the description is ip < slot > / < port > . < subinterface >
- On the JUNOS routing platform, interface description is the same as interfaceName

Default— No value
Editing Level—Basic

`interface-name` *`interface-name`*—(Optional) Name of the interface. You can use this option to allow subscriber classification scripts to match interfaces reported from the network to be matched with the corresponding access.

Value— One of the following:

- Name of the interface in your router CLI syntax.
- FORWARDING_INTERFACE for routing instance (used by traffic mirroring).

Default— No value
Editing Level—Basic

`unique-id` *`unique-id`*—(Optional) Unique identifier of the router. You can use this option to allow subscriber classification scripts to match interfaces reported from the network to be matched with the corresponding access.

Value— Index of the router in the SNMP table for all interfaces.
Default— No value

Editing Level—Basic

`port-id` *`port-id`*—(Optional) NAS port ID reported by the JUNOSe router through COPS. You can use this option to allow subscriber classification scripts to match interfaces reported from the network to be matched with the corresponding access.

Value— Includes the interface name and additional layer 2 information.
Default— No value
Editing Level—Basic

`device-name` *`device-name`*—(Optional) Name of the router or other device.

Value— Name of the device
Default— No value
Editing Level—Basic

`display-name` *`display-name`*—(Optional) Subscriber's name as it appears in portal applications. If you do not specify a display name, the value of the name option is used.

Value— Text
Default— No value
Editing Level—Basic

`accounting-user-id` *`accounting-user-id`*—(Optional) Value that identifies the subscriber in accounting records. For a household subscriber, all subordinate subscribers generally use the same ID. For an enterprise, all parts of the enterprise generally use the same ID.

Value— Text
Default— No value
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Actual values for parameters associated with this object. The policy engine substitutes parameters in policies associated with this object with the values that you specify in the substitution configuration.

Value— Substitution in the form < parameter name > = < value > . For example, bandwidth = 1000000.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* access *name* admission-control

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name access name admission-control {
     downstream-provisioned-rate downstream-provisioned-rate;
     upstream-provisioned-rate upstream-provisioned-rate;
     downstream-sync-rate downstream-sync-rate;
     upstream-sync-rate upstream-sync-rate;
     congestion-points [congestion-points...];
     detect-link-rate;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name access name admission-control]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure bandwidths for subscribers that the SRC-ACP manages.

Options

`downstream-provisioned-rate` *`downstream-provisioned-rate`*—(Optional) Provisioned downstream bandwidth. This rate is used if the subscriber bandwidth settings are not provided by the API for ACP or by the downstream-sync-rate option.

Value— Number of bps in the range 0–9223372036854775807
Default— No value
Editing Level—Basic

`upstream-provisioned-rate` *`upstream-provisioned-rate`*—(Optional) Provisioned upstream bandwidth. This rate is used if the subscriber bandwidth settings are not provided by the API for ACP or by the upstream-sync-rate option.

Value— Number of bps in the range 0–9223372036854775807
Default— No value

Editing Level—Basic

`downstream-sync-rate` *`downstream-sync-rate`*—(Optional) Actual downstream bandwidth for the current subscriber session. If you do not set this value and it is not provided by the API for ACP, the value of the downstream-provisioned-rate option is used.

Value— Number of bps in the range 0–9223372036854775807
Default— No value
Editing Level—Basic

`upstream-sync-rate` *`upstream-sync-rate`*—(Optional) Actual upstream bandwidth for the current subscriber session. If you do not set this value and it is not provided by the API for ACP, the value of the upstream-provisioned-rate option is used.

Value— Number of bps in the range 0–9223372036854775807
Default— No value
Editing Level—Basic

`congestion-points [`*`congestion-points...`*`]`—(Optional) Congestion points for the subscriber.

Value— DN of interface associated with congestion point
Default— No value
Editing Level—Basic

`detect-link-rate`—(Optional) To identify the possibility of getting the actual link rate information for a congestion point via L2C or other solutions developed later. By default , it is false for the sake of backward compatibility.

Default— false
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* access *name* manager

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name access name manager name {
     role [(administrator | subscription | substitution | activation | vpn)...];
     encrypted-password encrypted-password;
     plain-text-password;
     description description;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name access name manager]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a manager account.

Options

`name` *name*— Name of the manager account.

Value— Text

`role [(administrator | subscription | substitution | activation | vpn)...]`— Privilege level of the enterprise manager account. If you do not specify a privilege level, the manager has read-only access to associated objects.

Value

- `administrator`— Administrators have all privileges of the subscription, substitution, activation, and vpn roles. Additionally, administrators can create, delete, and modify other enterprise manager objects.
- `subscription`— Subscription managers can create, delete, modify, activate, and deactivate subscriptions.

- `substitution`— Substitution managers can modify policy parameters provided by subscriptions, enterprises, sites, and accesses.
- `activation`— Activation managers can activate and deactivate subscriptions.
- `vpn`— VPN managers can modify, export, and cancel the export of VPNs.

Default— No value
Editing Level—Basic

`encrypted-password` *`encrypted-password`*—(Optional) Login password and type of encryption.

Value— Enter a password, and select an encryption method that your directory supports.

- crypt—Style is /etc/passwd
- sha—Secure hash algorithm
- md5—Message digest #5

Default— No value
Editing Level—Basic

`plain-text-password`—(Optional) Plain text password. The password is encrypted using the algorithm defined in `system services editor password-encryption`.

Value— Text
Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value— Text
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* access *name* schedule

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name access name schedule name {
     description description;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name access name schedule]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service schedule.

Options

`name` *name*— Name of service schedule.

Value—Text

`description` *description*—(Optional) Description of the service schedule.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* access *name* schedule *name* event

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name access name schedule name event name ...
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name access name schedule name event]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a scheduling event.

Options

name *name*— Name of the scheduling event.

Value—Text

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* access *name* schedule *name* event *name* action

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name access name schedule name event name action name {
     type (activate | deactivate | deny | deny-deactivate);
     service service;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name access name schedule name event name action]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure actions to perform for the scheduled event.

Options

`name` *name*— Arbitrary identifier for action.

Value—Text

`type (activate | deactivate | deny | deny-deactivate)`— Type of action.

Value

- `activate`— Activate service at the time specified in the entry schedule.
- `deactivate`— Deactivate service at the time specified in the entry schedule.
- `deny`— Deny new activation requests during the time specified in the entry schedule; current sessions are not affected. This value applies only to services that have an authorization plug-in configured.
- `deny-deactivate`— Deny new activation requests during the time specified in the entry schedule; current sessions are deactivated at the specified time. This value applies only to services that have an authorization plug-in configured.

Default— No value
Editing Level—Basic

`service` *`service`*— Name of service affected by this action.

Value—Text
Default— No value
Editing Level—Basic

`substitution [`*`substitution`*`...]`—(Optional) Substitutions to be used when activating the service. Substitutions apply only to service activations.

Value— An entry in valid substitution format. See the *SRC PE Services and Policies Guide*.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* access *name* schedule *name* event *name* action *name* attribute

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name access name schedule name event name action name attribute (sessionName |
sessionTag | sessionTimeout | downStreamBandwidth | upStreamBandwidth) {
     value;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name access name schedule name event name action name attribute]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure subscription attributes. Subscription attributes apply only to service activations.

Options

Subscription attributes.

Value

- `sessionName`— Name of the service session.
- `sessionTag`— Tag that can be used for accounting purposes.
- `sessionTimeout`— Session timeout to be used when the service is activated. The service session is deactivated when this timeout expires.
- `downStreamBandwidth`— Attribute used by SRC Admission Control Plug-In (SRC ACP) to specify the rate of traffic between the network and the subscriber.
- `upStreamBandwidth`— Attribute used by SRC ACP to specify the rate of traffic between the subscriber and the network.

`value`— Value of the specified subscription attribute.

Value— Depends on the specified subscription attribute
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* access *name* schedule *name* event *name* except

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name access name schedule name event name except name ...
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name access name schedule name event name except]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure an exclusion for the event.

Options

`name` *name*— Arbitrary identifier for exclusion rule.

Value—Text

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* access *name* schedule *name* event *name* except *name* from

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name access name schedule name event name except name from {
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name access name schedule name event name except name from]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the start time of the exclusion. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of

the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
  - *hh*—Hour of the day in the range of 0–23
  - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* access *name* schedule *name* event *name* except *name* to

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name access name schedule name event name except name to {
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name access name schedule name event name except name to]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the end time of the exclusion. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

These values apply only to services that have an authorization plug-in configured. If an authorization plug-in is not configured for the service associated with the schedule, these values are ignored.

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
  - *hh*—Hour of the day in the range of 0–23
  - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* access *name* schedule *name* event *name* from

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name access name schedule name event name from {
     effective effective;
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name access name schedule name event name from]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the start time for the event. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

`effective` *`effective`*—(Optional) Interval after the associated `from` or `to` time during which the scheduled action can be initiated by a subscriber who is logging in to a subscriber session.

Value— Number of minutes in the range 0–153722867280912
Default— *
Editing Level—Basic

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *

Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* access *name* schedule *name* event *name* to

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name access name schedule name event name to {
     effective effective;
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name access name schedule name event name to]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the end time for the event. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

These values apply only to services that have an authorization plug-in configured. If an authorization plug-in is not configured for the service associated with the schedule, these values are ignored.

`effective` *`effective`*—(Optional) Interval after the associated `from` or `to` time during which the scheduled action can be initiated by a subscriber who is logging in to a subscriber session.

Value— Number of minutes in the range 0–153722867280912
Default— *
Editing Level—Basic

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* access *name* subscription

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name access name subscription subscription-name {
     status (active | suspended | hidden);
     activation (manual | automatically-on-login);
     activation-order activation-order;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name access name subscription]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service subscription.

Options

`subscription-name` *`subscription-name`*— Name of the service optionally followed by "%*subscription-id*". Use "%*subscription-id*" to subscribe subscribers to the same service multiple times with different subscription attributes.

Value— Text

`status (active | suspended | hidden)`— Status of the service subscription.

Value

- `active`— The subscriber can activate the subscription.
- `suspended`— The subscriber cannot activate the subscription, although it may be visible through the portal. If you change the status of the subscription to suspended while the subscription is active, the service is deactivated.
- `hidden`— Service is not available through a portal and cannot be

activated automatically when the subscribers log in. If you change the status of the subscription to hidden while the subscription is active, the service is not deactivated.

Default— Active
Editing Level—Basic

`activation (manual | automatically-on-login)`— Specify how the service is activated.

Value

- `manual`— Subscriber must manually activate the service.
- `automatically-on-login`— Service is activated automatically when the subscriber logs in.

Default— Manual activation
Editing Level—Basic

`activation-order` *`activation-order`*—(Optional) Order in which subscriptions are automatically activated on login relative to the subscriber's other subscriptions that are configured to activate on login. Review all subscriptions that are configured to activate on login for the subscriber, and review the activation order for subscriptions of the parent subscribers. Assign the lowest number to the subscription that you want to activate first. Assign higher numbers to the other subscriptions in the order that you want the SAE to activate them. If you assign the same number to multiple subscriptions, the SAE activates them in an unspecified order.

Value— Integer in the range 0–21474863647
Default— 10000
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Actual values for parameters associated with this object. The policy engine substitutes parameters in policies associated with this object with the values that you specify in the substitution configuration.

Value— Substitution in the form < parameter name > = < value > . For example, bandwidth = 1000000.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* device

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name device device-name {
     display-name display-name;
     maximum-login maximum-login;
     accounting-user-id accounting-user-id;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name device]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a device subscriber for subscriber sessions that manage the forwarding interface on JUNOS routing platforms and the router pseudo-subscriber on JUNOSe routers.

Options

`device-name` *`device-name`*— Name of the device subscriber.

Value— Text

`display-name` *`display-name`*—(Optional) Subscriber's name as it appears in portal applications. If you do not specify a display name, the value of the name option is used.

Value— Text
Default— No value
Editing Level—Basic

`maximum-login` *`maximum-login`*—(Optional) Maximum number of concurrent logins for subscribers associated with this object. By default, all subordinate objects use this value. However, if you specify this value for a subordinate object, that object and its subordinate

objects will use the subordinate's value.

Value— Integer in the range 0–2147483647
Default— No value
Editing Level—Basic

`accounting-user-id` *`accounting-user-id`*—(Optional) Value that identifies the subscriber in accounting records. For a household subscriber, all subordinate subscribers generally use the same ID. For an enterprise, all parts of the enterprise generally use the same ID.

Value— Text
Default— No value
Editing Level—Basic

`substitution [`*`substitution`*`...]`—(Optional) Actual values for parameters associated with this object. The policy engine substitutes parameters in policies associated with this object with the values that you specify in the substitution configuration.

Value— Substitution in the form < parameter name > = < value > . For example, bandwidth = 1000000.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* device *device-name* manager

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name device device-name manager name {
     role [(administrator | subscription | substitution | activation | vpn)...];
     encrypted-password encrypted-password;
     plain-text-password;
     description description;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name device device-name manager]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a manager account.

Options

`name` *name*— Name of the manager account.

Value— Text

`role [(administrator | subscription | substitution | activation | vpn)...]`— Privilege level of the enterprise manager account. If you do not specify a privilege level, the manager has read-only access to associated objects.

Value

- `administrator`— Administrators have all privileges of the subscription, substitution, activation, and vpn roles. Additionally, administrators can create, delete, and modify other enterprise manager objects.
- `subscription`— Subscription managers can create, delete, modify, activate, and deactivate subscriptions.

- `substitution`— Substitution managers can modify policy parameters provided by subscriptions, enterprises, sites, and accesses.
- `activation`— Activation managers can activate and deactivate subscriptions.
- `vpn`— VPN managers can modify, export, and cancel the export of VPNs.

Default— No value
Editing Level—Basic

`encrypted-password` *`encrypted-password`*—(Optional) Login password and type of encryption.

Value— Enter a password, and select an encryption method that your directory supports.

- crypt—Style is /etc/passwd
- sha—Secure hash algorithm
- md5—Message digest #5

Default— No value
Editing Level—Basic

`plain-text-password`—(Optional) Plain text password. The password is encrypted using the algorithm defined in `system services editor password-encryption`.

Value— Text
Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value— Text
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* device *device-name* schedule

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name device device-name schedule name {
     description description;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name device device-name schedule]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service schedule.

Options

`name` *`name`*— Name of service schedule.

Value—Text

`description` *`description`*—(Optional) Description of the service schedule.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* device *device-name* schedule *name* event

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name device device-name schedule name event name ...
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name device device-name schedule name event]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a scheduling event.

Options

`name` *name*— Name of the scheduling event.

Value—Text

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* device *device-name* schedule *name* event *name* action

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name device device-name schedule name event name action name {
     type (activate | deactivate | deny | deny-deactivate);
     service service;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name device device-name schedule name event name action]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure actions to perform for the scheduled event.

Options

`name` *name*— Arbitrary identifier for action.

Value—Text

`type (activate | deactivate | deny | deny-deactivate)`— Type of action.

Value

- `activate`— Activate service at the time specified in the entry schedule.
- `deactivate`— Deactivate service at the time specified in the entry schedule.
- `deny`— Deny new activation requests during the time specified in the entry schedule; current sessions are not affected. This value applies only to services that have an authorization plug-in

configured.
- `deny-deactivate`— Deny new activation requests during the time specified in the entry schedule; current sessions are deactivated at the specified time. This value applies only to services that have an authorization plug-in configured.

Default— No value
Editing Level—Basic

`service` *`service`*— Name of service affected by this action.

Value—Text
Default— No value
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Substitutions to be used when activating the service. Substitutions apply only to service activations.

Value— An entry in valid substitution format. See the *SRC PE Services and Policies Guide*.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* device *device-name* schedule *name* event *name* action *name* attribute

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name device device-
name schedule name event name action name attribute (sessionName | sessionTag |
sessionTimeout | downStreamBandwidth | upStreamBandwidth) {
     value;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name device device-
name schedule name event name action name attribute]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure subscription attributes. Subscription attributes apply only to service activations.

Options

Subscription attributes.

Value

- `sessionName`— Name of the service session.
- `sessionTag`— Tag that can be used for accounting purposes.
- `sessionTimeout`— Session timeout to be used when the service is activated. The service session is deactivated when this timeout expires.
- `downStreamBandwidth`— Attribute used by SRC Admission Control Plug-In (SRC ACP) to specify the rate of traffic between the network and the subscriber.
- `upStreamBandwidth`— Attribute used by SRC ACP to specify the rate of traffic between the subscriber and the network.

value— Value of the specified subscription attribute.

Value— Depends on the specified subscription attribute
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* device *device-name* schedule *name* event *name* except

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name device device-name schedule name event name except name ...
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name device device-name schedule name event name except]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure an exclusion for the event.

Options

`name` *name*— Arbitrary identifier for exclusion rule.

Value—Text

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* device *device-name* schedule *name* event *name* except *name* from

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name device device-name schedule name event name except name from
{
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name device device-name schedule name event name except name from]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the start time of the exclusion. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *

Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* device *device-name* schedule *name* event *name* except *name* to

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name device device-name schedule name event name except name to {
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name device device-name schedule name event name except name to]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the end time of the exclusion. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

These values apply only to services that have an authorization plug-in configured. If an authorization plug-in is not configured for the service associated with the schedule, these values are ignored.

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
  - *hh*—Hour of the day in the range of 0–23
  - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* device *device-name* schedule *name* event *name* from

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name device device-name schedule name event name from {
     effective effective;
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name device device-name schedule name event name from]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the start time for the event. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

`effective` *`effective`*—(Optional) Interval after the associated `from` or `to` time during which the scheduled action can be initiated by a subscriber who is logging in to a subscriber session.

Value— Number of minutes in the range 0–153722867280912
Default— *
Editing Level—Basic

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23

Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE

- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* device *device-name* schedule *name* event *name* to

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name device device-name schedule name event name to {
     effective effective;
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name device device-name schedule name event name to]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the end time for the event. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

These values apply only to services that have an authorization plug-in configured. If an authorization plug-in is not configured for the service associated with the schedule, these values are ignored.

`effective` *`effective`*—(Optional) Interval after the associated `from` or `to` time during which the scheduled action can be initiated by a subscriber who is logging in to a subscriber session.

Value— Number of minutes in the range 0–153722867280912
Default— *
Editing Level—Basic

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event

or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* device *device-name* subscription

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name device device-name subscription subscription-name {
     status (active | suspended | hidden);
     activation (manual | automatically-on-login);
     activation-order activation-order;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name device device-name subscription]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service subscription.

Options

`subscription-name` *`subscription-name`*— Name of the service optionally followed by "%*subscription-id*". Use "%*subscription-id*" to subscribe subscribers to the same service multiple times with different subscription attributes.

Value— Text

`status (active | suspended | hidden)`— Status of the service subscription.

Value

- `active`— The subscriber can activate the subscription.
- `suspended`— The subscriber cannot activate the subscription, although it may be visible through the portal. If you change the status of the subscription to suspended while the subscription is active, the service is deactivated.
- `hidden`— Service is not available through a portal and cannot be

activated automatically when the subscribers log in. If you change the status of the subscription to hidden while the subscription is active, the service is not deactivated.

Default— Active
Editing Level—Basic

`activation (manual | automatically-on-login)`— Specify how the service is activated.

Value

- `manual`— Subscriber must manually activate the service.
- `automatically-on-login`— Service is activated automatically when the subscriber logs in.

Default— Manual activation
Editing Level—Basic

`activation-order` *`activation-order`*—(Optional) Order in which subscriptions are automatically activated on login relative to the subscriber's other subscriptions that are configured to activate on login. Review all subscriptions that are configured to activate on login for the subscriber, and review the activation order for subscriptions of the parent subscribers. Assign the lowest number to the subscription that you want to activate first. Assign higher numbers to the other subscriptions in the order that you want the SAE to activate them. If you assign the same number to multiple subscriptions, the SAE activates them in an unspecified order.

Value— Integer in the range 0–21474863647
Default— 10000
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Actual values for parameters associated with this object. The policy engine substitutes parameters in policies associated with this object with the values that you specify in the substitution configuration.

Value— Substitution in the form < parameter name > = < value > . For example, bandwidth = 1000000.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* info

Syntax

```
subscribers retailer name subscriber-folder folder-name enterprise name info {
     phone phone;
     fax fax;
     po-box po-box;
     city city;
     street street;
     state state;
     postal-code postal-code;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name info]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure additional information about the enterprise subscriber.

Options

`phone` *`phone`*—(Optional) Telephone number for the subscriber.

Value— Telephone number
Default— No value
Editing Level—Basic

`fax` *`fax`*—(Optional) Fax number for the subscriber.

Value— Fax number
Default— No value
Editing Level—Basic

`po-box` *`po-box`*—(Optional) Post office box for the subscriber.

Value— Post office box
Default— No value
Editing Level—Basic

`city` *`city`*—(Optional) City name for the subscriber.

Value— City name
Default— No value
Editing Level—Basic

`street` *`street`*—(Optional) Street address for the subscriber.

Value— Street address
Default— No value
Editing Level—Basic

`state` *`state`*—(Optional) State or province for the subscriber.

Value— State or province
Default— No value
Editing Level—Basic

`postal-code` *`postal-code`*—(Optional) Postal code for the subscriber.

Value— Postal code
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* manager

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name manager name {
     role [(administrator | subscription | substitution | activation | vpn)...];
     encrypted-password encrypted-password;
     plain-text-password;
     description description;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name manager]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a manager account.

Options

`name` *`name`*— Name of the manager account.

Value— Text

`role [(administrator | subscription | substitution | activation | vpn)...]`— Privilege level of the enterprise manager account. If you do not specify a privilege level, the manager has read-only access to associated objects.

Value

- `administrator`— Administrators have all privileges of the subscription, substitution, activation, and vpn roles. Additionally, administrators can create, delete, and modify other enterprise manager objects.
- `subscription`— Subscription managers can create, delete, modify, activate, and deactivate subscriptions.

- `substitution`— Substitution managers can modify policy parameters provided by subscriptions, enterprises, sites, and accesses.
- `activation`— Activation managers can activate and deactivate subscriptions.
- `vpn`— VPN managers can modify, export, and cancel the export of VPNs.

Default— No value
Editing Level—Basic

`encrypted-password` *`encrypted-password`*—(Optional) Login password and type of encryption.

Value— Enter a password, and select an encryption method that your directory supports.

- crypt—Style is /etc/passwd
- sha—Secure hash algorithm
- md5—Message digest #5

Default— No value
Editing Level—Basic

`plain-text-password`—(Optional) Plain text password. The password is encrypted using the algorithm defined in `system services editor password-encryption`.

Value— Text
Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value— Text
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* schedule

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name schedule name {
     description description;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name schedule]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service schedule.

Options

`name` *`name`*— Name of service schedule.

Value—Text

`description` *`description`*—(Optional) Description of the service schedule.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* schedule *name* event

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name schedule name event name ...
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name schedule name event]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a scheduling event.

Options

name *name*— Name of the scheduling event.

Value—Text

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* schedule *name* event *name* action

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name schedule name event name action name {
     type (activate | deactivate | deny | deny-deactivate);
     service service;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name schedule name event name action]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure actions to perform for the scheduled event.

Options

`name` *name*— Arbitrary identifier for action.

Value—Text

`type (activate | deactivate | deny | deny-deactivate)`— Type of action.

Value

- `activate`— Activate service at the time specified in the entry schedule.
- `deactivate`— Deactivate service at the time specified in the entry schedule.
- `deny`— Deny new activation requests during the time specified in the entry schedule; current sessions are not affected. This value applies only to services that have an authorization plug-in configured.
- `deny-deactivate`— Deny new activation requests during the

time specified in the entry schedule; current sessions are deactivated at the specified time. This value applies only to services that have an authorization plug-in configured.

Default— No value
Editing Level—Basic

`service` *`service`*— Name of service affected by this action.

Value—Text
Default— No value
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Substitutions to be used when activating the service. Substitutions apply only to service activations.

Value— An entry in valid substitution format. See the *SRC PE Services and Policies Guide*.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* schedule *name* event *name* action *name* attribute

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name schedule name event name action name attribute (sessionName |
sessionTag | sessionTimeout | downStreamBandwidth | upStreamBandwidth) {
     value;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name schedule name event name action name attribute]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure subscription attributes. Subscription attributes apply only to service activations.

Options

Subscription attributes.

Value

- `sessionName`— Name of the service session.
- `sessionTag`— Tag that can be used for accounting purposes.
- `sessionTimeout`— Session timeout to be used when the service is activated. The service session is deactivated when this timeout expires.
- `downStreamBandwidth`— Attribute used by SRC Admission Control Plug-In (SRC ACP) to specify the rate of traffic between the network and the subscriber.
- `upStreamBandwidth`— Attribute used by SRC ACP to specify the rate of traffic between the subscriber and the network.

`value`— Value of the specified subscription attribute.

Value— Depends on the specified subscription attribute
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* schedule *name* event *name* except

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name schedule name event name except name ...
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name schedule name event name except]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure an exclusion for the event.

Options

name *name*— Arbitrary identifier for exclusion rule.

Value—Text

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* schedule *name* event *name* except *name* from

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name schedule name event name except name from {
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name schedule name event name except name from]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the start time of the exclusion. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event

or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* schedule *name* event *name* except *name* to

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name schedule name event name except name to {
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name schedule name event name except name to]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the end time of the exclusion. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

These values apply only to services that have an authorization plug-in configured. If an authorization plug-in is not configured for the service associated with the schedule, these values are ignored.

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59

Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ | -) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* schedule *name* event *name* from

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name schedule name event name from {
     effective effective;
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name schedule name event name from]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the start time for the event. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

`effective` *`effective`*—(Optional) Interval after the associated `from` or `to` time during which the scheduled action can be initiated by a subscriber who is logging in to a subscriber session.

Value— Number of minutes in the range 0–153722867280912
Default— *
Editing Level—Basic

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23

- *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* schedule *name* event *name* to

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name schedule name event name to {
     effective effective;
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name schedule name event name to]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the end time for the event. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

These values apply only to services that have an authorization plug-in configured. If an authorization plug-in is not configured for the service associated with the schedule, these values are ignored.

`effective` *`effective`*—(Optional) Interval after the associated `from` or `to` time during which the scheduled action can be initiated by a subscriber who is logging in to a subscriber session.

Value— Number of minutes in the range 0–153722867280912
Default— *
Editing Level—Basic

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site

Syntax

```
subscribers retailer name subscriber-folder folder-name enterprise name site name
{
     network [network...];
     display-name display-name;
     accounting-user-id accounting-user-id;
     description description;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure an enterprise site.

Options

`name` *`name`*— Name of the site.

Value— Text

`network [`*`network...`*`]`—(Optional) Network used at the enterprise or site. If you build a custom enterprise manager application, you can access this information through the enterprise portal APIs.

Value— Network
Default— No value
Editing Level—Basic

`display-name` *`display-name`*—(Optional) Subscriber's name as it appears in portal applications. If you do not specify a display name, the value of the name option is used.

Value— Text
Default— No value
Editing Level—Basic

`accounting-user-id` *`accounting-user-id`*—(Optional) Value that identifies the subscriber in accounting records. For a household subscriber, all subordinate subscribers generally use the same ID. For an enterprise, all parts of the enterprise generally use the same ID.

Value— Text
Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value— Text
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* access

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name access name {
     routing-protocol routing-protocol;
     interface-alias interface-alias;
     interface-description interface-description;
     interface-name interface-name;
     unique-id unique-id;
     port-id port-id;
     device-name device-name;
     display-name display-name;
     accounting-user-id accounting-user-id;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name access]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure an access. You can configure an access for an enterprise or for a site. An access determines the way that the enterprise or site accesses Internet services, and specifies a set of services that are available to the enterprise or site.

Options

`name` *`name`*— Name of the access.

Value— Text

`routing-protocol` *`routing-protocol`*—(Optional) Routing protocol used at the enterprise or site. If you build a custom enterprise manager application, you can access this information through the enterprise portal APIs.

Value— Routing protocol
Default— No value
Editing Level—Basic

`interface-alias` *`interface-alias`*—(Optional) Description of the router interface. You can use this option to allow subscriber classification scripts to match interfaces reported from the network to be matched with the corresponding access.

Value— Interface description that is configured on the router.
Default— No value
Editing Level—Basic

`interface-description` *`interface-description`*—(Optional) Name of the interface that SNMP uses. You can use this option to allow subscriber classification scripts to match interfaces reported from the network to be matched with the corresponding access.

Value— One of the following:

- For JUNOSe routers, the format of the description is ip < slot > / < port > . < subinterface >
- On the JUNOS routing platform, interface description is the same as interfaceName

Default— No value
Editing Level—Basic

`interface-name` *`interface-name`*—(Optional) Name of the interface. You can use this option to allow subscriber classification scripts to match interfaces reported from the network to be matched with the corresponding access.

Value— One of the following:

- Name of the interface in your router CLI syntax.
- FORWARDING_INTERFACE for routing instance (used by traffic mirroring).

Default— No value
Editing Level—Basic

`unique-id` *`unique-id`*—(Optional) Unique identifier of the router. You can use this option to allow subscriber classification scripts to match interfaces reported from the network to be matched with the corresponding access.

Value— Index of the router in the SNMP table for all interfaces.
Default— No value

Editing Level—Basic

`port-id` *`port-id`*—(Optional) NAS port ID reported by the JUNOSe router through COPS. You can use this option to allow subscriber classification scripts to match interfaces reported from the network to be matched with the corresponding access.

Value— Includes the interface name and additional layer 2 information.
Default— No value
Editing Level—Basic

`device-name` *`device-name`*—(Optional) Name of the router or other device.

Value— Name of the device
Default— No value
Editing Level—Basic

`display-name` *`display-name`*—(Optional) Subscriber's name as it appears in portal applications. If you do not specify a display name, the value of the name option is used.

Value— Text
Default— No value
Editing Level—Basic

`accounting-user-id` *`accounting-user-id`*—(Optional) Value that identifies the subscriber in accounting records. For a household subscriber, all subordinate subscribers generally use the same ID. For an enterprise, all parts of the enterprise generally use the same ID.

Value— Text
Default— No value
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Actual values for parameters associated with this object. The policy engine substitutes parameters in policies associated with this object with the values that you specify in the substitution configuration.

Value— Substitution in the form < parameter name > = < value > . For example, bandwidth = 1000000.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* access *name* admission-control

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name access name admission-control {
     downstream-provisioned-rate downstream-provisioned-rate;
     upstream-provisioned-rate upstream-provisioned-rate;
     downstream-sync-rate downstream-sync-rate;
     upstream-sync-rate upstream-sync-rate;
     congestion-points [congestion-points...];
     detect-link-rate;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name access name admission-control]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure bandwidths for subscribers that the SRC-ACP manages.

Options

`downstream-provisioned-rate` *`downstream-provisioned-rate`*—(Optional) Provisioned downstream bandwidth. This rate is used if the subscriber bandwidth settings are not provided by the API for ACP or by the downstream-sync-rate option.

Value— Number of bps in the range 0–9223372036854775807
Default— No value
Editing Level—Basic

`upstream-provisioned-rate` *`upstream-provisioned-rate`*—(Optional) Provisioned upstream bandwidth. This rate is used if the subscriber bandwidth settings are not provided by the API for ACP or by the upstream-sync-rate option.

Value— Number of bps in the range 0–9223372036854775807
Default— No value

Editing Level—Basic

`downstream-sync-rate` *`downstream-sync-rate`*—(Optional) Actual downstream bandwidth for the current subscriber session. If you do not set this value and it is not provided by the API for ACP, the value of the downstream-provisioned-rate option is used.

Value— Number of bps in the range 0–9223372036854775807
Default— No value
Editing Level—Basic

`upstream-sync-rate` *`upstream-sync-rate`*—(Optional) Actual upstream bandwidth for the current subscriber session. If you do not set this value and it is not provided by the API for ACP, the value of the upstream-provisioned-rate option is used.

Value— Number of bps in the range 0–9223372036854775807
Default— No value
Editing Level—Basic

`congestion-points [`*`congestion-points...`*`]`—(Optional) Congestion points for the subscriber.

Value— DN of interface associated with congestion point
Default— No value
Editing Level—Basic

`detect-link-rate`—(Optional) To identify the possibility of getting the actual link rate information for a congestion point via L2C or other solutions developed later. By default , it is false for the sake of backward compatibility.

Default— false
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* access *name* manager

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name access name manager name {
     role [(administrator | subscription | substitution | activation | vpn)...];
     encrypted-password encrypted-password;
     plain-text-password;
     description description;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name access name manager]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a manager account.

Options

`name` *name*— Name of the manager account.

Value— Text

`role [(administrator | subscription | substitution | activation | vpn)...]`— Privilege level of the enterprise manager account. If you do not specify a privilege level, the manager has read-only access to associated objects.

Value

- `administrator`— Administrators have all privileges of the subscription, substitution, activation, and vpn roles. Additionally, administrators can create, delete, and modify other enterprise manager objects.
- `subscription`— Subscription managers can create, delete, modify, activate, and deactivate subscriptions.

- `substitution`— Substitution managers can modify policy parameters provided by subscriptions, enterprises, sites, and accesses.
- `activation`— Activation managers can activate and deactivate subscriptions.
- `vpn`— VPN managers can modify, export, and cancel the export of VPNs.

Default— No value
Editing Level—Basic

`encrypted-password` *`encrypted-password`*—(Optional) Login password and type of encryption.

Value— Enter a password, and select an encryption method that your directory supports.

- crypt—Style is /etc/passwd
- sha—Secure hash algorithm
- md5—Message digest #5

Default— No value
Editing Level—Basic

`plain-text-password`—(Optional) Plain text password. The password is encrypted using the algorithm defined in `system services editor password-encryption`.

Value— Text
Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value— Text
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* access *name* schedule

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name access name schedule name {
     description description;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name access name schedule]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service schedule.

Options

`name` *name*— Name of service schedule.

Value—Text

`description` *description*—(Optional) Description of the service schedule.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* access *name* schedule *name* event

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name access name schedule name event name ...
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name access name schedule name event]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a scheduling event.

Options

name *name*— Name of the scheduling event.

Value—Text

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* access *name* schedule *name* event *name* action

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name access name schedule name event name action name {
     type (activate | deactivate | deny | deny-deactivate);
     service service;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name access name schedule name event name action]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure actions to perform for the scheduled event.

Options

`name` *name*— Arbitrary identifier for action.

Value—Text

`type (activate | deactivate | deny | deny-deactivate)`— Type of action.

Value

- `activate`— Activate service at the time specified in the entry schedule.
- `deactivate`— Deactivate service at the time specified in the entry schedule.
- `deny`— Deny new activation requests during the time specified in the entry schedule; current sessions are not affected. This value applies only to services that have an authorization plug-in configured.
- `deny-deactivate`— Deny new activation requests during the time specified in the entry schedule; current sessions are deactivated at the specified time. This value applies only to services that have an authorization plug-in configured.

Default— No value
Editing Level—Basic

`service` *service*— Name of service affected by this action.

Value—Text

Default— No value
Editing Level—Basic

`substitution [`*`substitution`*`...]`—(Optional) Substitutions to be used when activating the service. Substitutions apply only to service activations.

Value— An entry in valid substitution format. See the *SRC PE Services and Policies Guide*.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* access *name* schedule *name* event *name* action *name* attribute

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name access name schedule name event name action name attribute (sessionName | sessionTag
| sessionTimeout | downStreamBandwidth | upStreamBandwidth) {
     value;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name access name schedule name event name action name attribute]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure subscription attributes. Subscription attributes apply only to service activations.

Options

Subscription attributes.

Value

- `sessionName`— Name of the service session.
- `sessionTag`— Tag that can be used for accounting purposes.
- `sessionTimeout`— Session timeout to be used when the service is activated. The service session is deactivated when this timeout expires.
- `downStreamBandwidth`— Attribute used by SRC Admission Control Plug-In (SRC ACP) to specify the rate of traffic between the network and the subscriber.
- `upStreamBandwidth`— Attribute used by SRC ACP to specify the rate of traffic between the subscriber and the network.

`value`— Value of the specified subscription attribute.

Value— Depends on the specified subscription attribute
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* access *name* schedule *name* event *name* except

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name access name schedule name event name except name ...
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name access name schedule name event name except]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure an exclusion for the event.

Options

`name` *name*— Arbitrary identifier for exclusion rule.

Value—Text

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* access *name* schedule *name* event *name* except *name* from

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name access name schedule name event name except name from {
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name access name schedule name event name except name from]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the start time of the exclusion. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh*:*mm* | *hh mm* | *hh*)
  - *hh*—Hour of the day in the range of 0–23
  - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* access *name* schedule *name* event *name* except *name* to

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name access name schedule name event name except name to {
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name access name schedule name event name except name to]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the end time of the exclusion. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

These values apply only to services that have an authorization plug-in configured. If an authorization plug-in is not configured for the service associated with the schedule, these values are ignored.

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
  - *hh*—Hour of the day in the range of 0–23
  - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* access *name* schedule *name* event *name* from

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name access name schedule name event name from {
     effective effective;
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name access name schedule name event name from]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the start time for the event. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

`effective` *`effective`*—(Optional) Interval after the associated `from` or `to` time during which the scheduled action can be initiated by a subscriber who is logging in to a subscriber session.

Value— Number of minutes in the range 0–153722867280912
Default— *
Editing Level—Basic

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If

you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
  - *hh*—Hour of the day in the range of 0–23
  - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* access *name* schedule *name* event *name* to

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name access name schedule name event name to {
     effective effective;
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name access name schedule name event name to]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the end time for the event. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

These values apply only to services that have an authorization plug-in configured. If an authorization plug-in is not configured for the service associated with the schedule, these values are ignored.

`effective` *`effective`*—(Optional) Interval after the associated `from` or `to` time during which the scheduled action can be initiated by a subscriber who is logging in to a subscriber session.

Value— Number of minutes in the range 0–153722867280912
Default— *
Editing Level—Basic

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59

Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
  - *hh*—Hour of the day in the range of 0–23
  - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* access *name* subscription

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name access name subscription subscription-name {
     status (active | suspended | hidden);
     activation (manual | automatically-on-login);
     activation-order activation-order;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name access name subscription]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service subscription.

Options

`subscription-name` *`subscription-name`*— Name of the service optionally followed by "%*subscription-id*". Use "%*subscription-id*" to subscribe subscribers to the same service multiple times with different subscription attributes.

Value— Text

`status (active | suspended | hidden)`— Status of the service subscription.

Value

- `active`— The subscriber can activate the subscription.
- `suspended`— The subscriber cannot activate the subscription, although it may be visible through the portal. If you change the status of the subscription to suspended while the subscription is active, the service is deactivated.
- `hidden`— Service is not available through a portal and cannot be

activated automatically when the subscribers log in. If you change the status of the subscription to hidden while the subscription is active, the service is not deactivated.

Default— Active
Editing Level—Basic

`activation (manual | automatically-on-login)`— Specify how the service is activated.

Value

- `manual`— Subscriber must manually activate the service.
- `automatically-on-login`— Service is activated automatically when the subscriber logs in.

Default— Manual activation
Editing Level—Basic

`activation-order` *`activation-order`*—(Optional) Order in which subscriptions are automatically activated on login relative to the subscriber's other subscriptions that are configured to activate on login. Review all subscriptions that are configured to activate on login for the subscriber, and review the activation order for subscriptions of the parent subscribers. Assign the lowest number to the subscription that you want to activate first. Assign higher numbers to the other subscriptions in the order that you want the SAE to activate them. If you assign the same number to multiple subscriptions, the SAE activates them in an unspecified order.

Value— Integer in the range 0–21474863647
Default— 10000
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Actual values for parameters associated with this object. The policy engine substitutes parameters in policies associated with this object with the values that you specify in the substitution configuration.

Value— Substitution in the form < parameter name > = < value > . For example, bandwidth = 1000000.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* device

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name device device-name {
     display-name display-name;
     maximum-login maximum-login;
     accounting-user-id accounting-user-id;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name device]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a device subscriber for subscriber sessions that manage the forwarding interface on JUNOS routing platforms and the router pseudo-subscriber on JUNOSe routers.

Options

`device-name` *`device-name`*— Name of the device subscriber.

Value— Text

`display-name` *`display-name`*—(Optional) Subscriber's name as it appears in portal applications. If you do not specify a display name, the value of the name option is used.

Value— Text
Default— No value
Editing Level—Basic

`maximum-login` *`maximum-login`*—(Optional) Maximum number of concurrent logins for subscribers associated with this object. By default, all subordinate objects use this value. However, if you specify this value for a subordinate object, that object and its subordinate

objects will use the subordinate's value.

Value— Integer in the range 0–2147483647
Default— No value
Editing Level—Basic

`accounting-user-id` *`accounting-user-id`*—(Optional) Value that identifies the subscriber in accounting records. For a household subscriber, all subordinate subscribers generally use the same ID. For an enterprise, all parts of the enterprise generally use the same ID.

Value— Text
Default— No value
Editing Level—Basic

`substitution [`*`substitution`*`...]`—(Optional) Actual values for parameters associated with this object. The policy engine substitutes parameters in policies associated with this object with the values that you specify in the substitution configuration.

Value— Substitution in the form < parameter name > = < value > . For example, bandwidth = 1000000.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* device *device-name* manager

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name device device-name manager name {
     role [(administrator | subscription | substitution | activation | vpn)...];
     encrypted-password encrypted-password;
     plain-text-password;
     description description;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name device device-name manager]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a manager account.

Options

`name` *name*— Name of the manager account.

Value— Text

`role [(administrator | subscription | substitution | activation | vpn)...]`— Privilege level of the enterprise manager account. If you do not specify a privilege level, the manager has read-only access to associated objects.

Value

- `administrator`— Administrators have all privileges of the subscription, substitution, activation, and vpn roles. Additionally, administrators can create, delete, and modify other enterprise manager objects.
- `subscription`— Subscription managers can create, delete, modify, activate, and deactivate subscriptions.

- `substitution`— Substitution managers can modify policy parameters provided by subscriptions, enterprises, sites, and accesses.
- `activation`— Activation managers can activate and deactivate subscriptions.
- `vpn`— VPN managers can modify, export, and cancel the export of VPNs.

Default— No value
Editing Level—Basic

`encrypted-password` *`encrypted-password`*—(Optional) Login password and type of encryption.

Value— Enter a password, and select an encryption method that your directory supports.

- crypt—Style is /etc/passwd
- sha—Secure hash algorithm
- md5—Message digest #5

Default— No value
Editing Level—Basic

`plain-text-password`—(Optional) Plain text password. The password is encrypted using the algorithm defined in `system services editor password-encryption`.

Value— Text
Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value— Text
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* device *device-name* schedule

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name device device-name schedule name {
     description description;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name device device-name schedule]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service schedule.

Options

`name` *`name`*— Name of service schedule.

Value—Text

`description` *`description`*—(Optional) Description of the service schedule.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* device *device-name* schedule *name* event

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name device device-name schedule name event name ...
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name device device-name schedule name event]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a scheduling event.

Options

name *name*— Name of the scheduling event.

Value—Text

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* device *device-name* schedule *name* event *name* action

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name device device-
name schedule name event name action name {
     type (activate | deactivate | deny | deny-deactivate);
     service service;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name device device-name schedule name event name action]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure actions to perform for the scheduled event.

Options

`name` *name*— Arbitrary identifier for action.

Value—Text

`type (activate | deactivate | deny | deny-deactivate)`— Type of action.

Value

- `activate`— Activate service at the time specified in the entry schedule.
- `deactivate`— Deactivate service at the time specified in the entry schedule.
- `deny`— Deny new activation requests during the time specified in the entry schedule; current sessions are not affected. This value

applies only to services that have an authorization plug-in configured.

- `deny-deactivate`— Deny new activation requests during the time specified in the entry schedule; current sessions are deactivated at the specified time. This value applies only to services that have an authorization plug-in configured.

Default— No value
Editing Level—Basic

`service` *`service`*— Name of service affected by this action.

Value—Text
Default— No value
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Substitutions to be used when activating the service. Substitutions apply only to service activations.

Value— An entry in valid substitution format. See the *SRC PE Services and Policies Guide*.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* device *device-name* schedule *name* event *name* action *name* attribute

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name device device-
name schedule name event name action name attribute (sessionName | sessionTag |
sessionTimeout | downStreamBandwidth | upStreamBandwidth) {
     value;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name device device-
name schedule name event name action name attribute]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure subscription attributes. Subscription attributes apply only to service activations.

Options

Value

- `sessionName`— Name of the service session.
- `sessionTag`— Tag that can be used for accounting purposes.
- `sessionTimeout`— Session timeout to be used when the service is activated. The service session is deactivated when this timeout expires.
- `downStreamBandwidth`— Attribute used by SRC Admission Control Plug-In (SRC-ACP) to specify the rate of traffic between the network and the subscriber.
- `upStreamBandwidth`— Attribute used by SRC-ACP to specify the rate of traffic between the subscriber and the network.

`value`— Value of the specified subscription attribute.

Value— Depends on the specified subscription attribute
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* device *device-name* schedule *name* event *name* except

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name device device-
name schedule name event name except name ...
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name device device-name schedule name event name except]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure an exclusion for the event.

Options

`name` *name*— Arbitrary identifier for exclusion rule.

Value—Text

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* device *device-name* schedule *name* event *name* except *name* from

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name device device-
name schedule name event name except name from {
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name device device-
name schedule name event name except name from]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the start time of the exclusion. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59

Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ | -) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* device *device-name* schedule *name* event *name* except *name* to

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name device device-
name schedule name event name except name to {
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name device device-
name schedule name event name except name to]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the end time of the exclusion. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

These values apply only to services that have an authorization plug-in configured. If an authorization plug-in is not configured for the service associated with the schedule, these values are ignored.

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event

or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
  - *hh*—Hour of the day in the range of 0–23
  - *mm*—Minutes past the hour in the range of 0–59

Default— *

Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* device *device-name* schedule *name* event *name* from

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name device device-name schedule name event name from {
     effective effective;
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name device device-name schedule name event name from]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the start time for the event. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

`effective` *`effective`*—(Optional) Interval after the associated `from` or `to` time during which the scheduled action can be initiated by a subscriber who is logging in to a subscriber session.

Value— Number of minutes in the range 0–153722867280912
Default— *
Editing Level—Basic

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23

Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE

- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
  - *hh*—Hour of the day in the range of 0–23
  - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* device *device-name* schedule *name* event *name* to

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name device device-name schedule name event name to {
     effective effective;
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name device device-name schedule name event name to]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the end time for the event. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

These values apply only to services that have an authorization plug-in configured. If an authorization plug-in is not configured for the service associated with the schedule, these values are ignored.

`effective` *`effective`*—(Optional) Interval after the associated `from` or `to` time during which the scheduled action can be initiated by a subscriber who is logging in to a subscriber session.

Value— Number of minutes in the range 0–153722867280912
Default— *
Editing Level—Basic

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event

or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* device *device-name* subscription

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name device device-name subscription subscription-name {
     status (active | suspended | hidden);
     activation (manual | automatically-on-login);
     activation-order activation-order;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name device device-name subscription]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service subscription.

Options

`subscription-name` *`subscription-name`*— Name of the service optionally followed by "%*subscription-id*". Use "%*subscription-id*" to subscribe subscribers to the same service multiple times with different subscription attributes.

Value— Text

`status (active | suspended | hidden)`— Status of the service subscription.

Value

- `active`— The subscriber can activate the subscription.
- `suspended`— The subscriber cannot activate the subscription, although it may be visible through the portal. If you change the status of the subscription to suspended while the subscription is active, the service is deactivated.
- `hidden`— Service is not available through a portal and cannot be

activated automatically when the subscribers log in. If you change the status of the subscription to hidden while the subscription is active, the service is not deactivated.

Default— Active
Editing Level—Basic

`activation (manual | automatically-on-login)`— Specify how the service is activated.

Value

- `manual`— Subscriber must manually activate the service.
- `automatically-on-login`— Service is activated automatically when the subscriber logs in.

Default— Manual activation
Editing Level—Basic

`activation-order` *`activation-order`*—(Optional) Order in which subscriptions are automatically activated on login relative to the subscriber's other subscriptions that are configured to activate on login. Review all subscriptions that are configured to activate on login for the subscriber, and review the activation order for subscriptions of the parent subscribers. Assign the lowest number to the subscription that you want to activate first. Assign higher numbers to the other subscriptions in the order that you want the SAE to activate them. If you assign the same number to multiple subscriptions, the SAE activates them in an unspecified order.

Value— Integer in the range 0–21474863647
Default— 10000
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Actual values for parameters associated with this object. The policy engine substitutes parameters in policies associated with this object with the values that you specify in the substitution configuration.

Value— Substitution in the form < parameter name > = < value > . For example, bandwidth = 1000000.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* manager

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name manager name {
     role [(administrator | subscription | substitution | activation | vpn)...];
     encrypted-password encrypted-password;
     plain-text-password;
     description description;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name manager]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a manager account.

Options

`name` *name*— Name of the manager account.

Value— Text

`role [(administrator | subscription | substitution | activation | vpn)...]`— Privilege level of the enterprise manager account. If you do not specify a privilege level, the manager has read-only access to associated objects.

Value

- `administrator`— Administrators have all privileges of the subscription, substitution, activation, and vpn roles. Additionally, administrators can create, delete, and modify other enterprise manager objects.
- `subscription`— Subscription managers can create, delete, modify, activate, and deactivate subscriptions.

- `substitution`— Substitution managers can modify policy parameters provided by subscriptions, enterprises, sites, and accesses.
- `activation`— Activation managers can activate and deactivate subscriptions.
- `vpn`— VPN managers can modify, export, and cancel the export of VPNs.

Default— No value
Editing Level—Basic

`encrypted-password` *`encrypted-password`*—(Optional) Login password and type of encryption.

Value— Enter a password, and select an encryption method that your directory supports.

- crypt—Style is /etc/passwd
- sha—Secure hash algorithm
- md5—Message digest #5

Default— No value
Editing Level—Basic

`plain-text-password`—(Optional) Plain text password. The password is encrypted using the algorithm defined in `system services editor password-encryption`.

Value— Text
Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value— Text
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* schedule

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name schedule name {
     description description;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name schedule]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service schedule.

Options

`name` *name*— Name of service schedule.

Value—Text

`description` *description*—(Optional) Description of the service schedule.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* schedule *name* event

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name schedule name event name ...
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name schedule name event]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a scheduling event.

Options

name *name*— Name of the scheduling event.

Value—Text

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* schedule *name* event *name* action

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name schedule name event name action name {
     type (activate | deactivate | deny | deny-deactivate);
     service service;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name schedule name event name action]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure actions to perform for the scheduled event.

Options

`name` *name*— Arbitrary identifier for action.

Value—Text

`type (activate | deactivate | deny | deny-deactivate)`— Type of action.

Value

- `activate`— Activate service at the time specified in the entry schedule.
- `deactivate`— Deactivate service at the time specified in the entry schedule.
- `deny`— Deny new activation requests during the time specified in the entry schedule; current sessions are not affected. This value applies only to services that have an authorization plug-in configured.
- `deny-deactivate`— Deny new activation requests during the

time specified in the entry schedule; current sessions are deactivated at the specified time. This value applies only to services that have an authorization plug-in configured.

Default— No value
Editing Level—Basic

`service` *`service`*— Name of service affected by this action.

Value—Text
Default— No value
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Substitutions to be used when activating the service. Substitutions apply only to service activations.

Value— An entry in valid substitution format. See the *SRC PE Services and Policies Guide*.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* schedule *name* event *name* action *name* attribute

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name schedule name event name action name attribute (sessionName |
sessionTag | sessionTimeout | downStreamBandwidth | upStreamBandwidth) {
     value;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name schedule name event name action name attribute]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure subscription attributes. Subscription attributes apply only to service activations.

Options

Subscription attributes.

Value

- `sessionName`— Name of the service session.
- `sessionTag`— Tag that can be used for accounting purposes.
- `sessionTimeout`— Session timeout to be used when the service is activated. The service session is deactivated when this timeout expires.
- `downStreamBandwidth`— Attribute used by SRC Admission Control Plug-In (SRC ACP) to specify the rate of traffic between the network and the subscriber.
- `upStreamBandwidth`— Attribute used by SRC ACP to specify the rate of traffic between the subscriber and the network.

`value`— Value of the specified subscription attribute.

Value— Depends on the specified subscription attribute
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* schedule *name* event *name* except

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name schedule name event name except name ...
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name schedule name event name except]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure an exclusion for the event.

Options

name *name*— Arbitrary identifier for exclusion rule.

Value—Text

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* schedule *name* event *name* except *name* from

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name schedule name event name except name from {
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name schedule name event name except name from]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the start time of the exclusion. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
  - *hh*—Hour of the day in the range of 0–23
  - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* schedule *name* event *name* except *name* to

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name schedule name event name except name to {
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name schedule name event name except name to]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the end time of the exclusion. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

These values apply only to services that have an authorization plug-in configured. If an authorization plug-in is not configured for the service associated with the schedule, these values are ignored.

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *

Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- * —Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
  - *hh*—Hour of the day in the range of 0–23
  - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* schedule *name* event *name* from

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name schedule name event name from {
     effective effective;
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name schedule name event name from]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the start time for the event. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

`effective` *`effective`*—(Optional) Interval after the associated `from` or `to` time during which the scheduled action can be initiated by a subscriber who is logging in to a subscriber session.

Value— Number of minutes in the range 0–153722867280912
Default— *
Editing Level—Basic

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23

- *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* schedule *name* event *name* to

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name schedule name event name to {
     effective effective;
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name schedule name event name to]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the end time for the event. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

These values apply only to services that have an authorization plug-in configured. If an authorization plug-in is not configured for the service associated with the schedule, these values are ignored.

`effective` *`effective`*—(Optional) Interval after the associated `from` or `to` time during which the scheduled action can be initiated by a subscriber who is logging in to a subscriber session.

Value— Number of minutes in the range 0–153722867280912
Default— *
Editing Level—Basic

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* site *name* subscription

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name site name subscription subscription-name {
     status (active | suspended | hidden);
     activation (manual | automatically-on-login);
     activation-order activation-order;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name site name subscription]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service subscription.

Options

`subscription-name` *`subscription-name`*— Name of the service optionally followed by "%*subscription-id*". Use "%*subscription-id*" to subscribe subscribers to the same service multiple times with different subscription attributes.

Value— Text

`status (active | suspended | hidden)`— Status of the service subscription.

Value

- `active`— The subscriber can activate the subscription.
- `suspended`— The subscriber cannot activate the subscription, although it may be visible through the portal. If you change the status of the subscription to suspended while the subscription is active, the service is deactivated.
- `hidden`— Service is not available through a portal and cannot be

activated automatically when the subscribers log in. If you change the status of the subscription to hidden while the subscription is active, the service is not deactivated.

Default— Active
Editing Level—Basic

`activation (manual | automatically-on-login)`— Specify how the service is activated.

Value

- `manual`— Subscriber must manually activate the service.
- `automatically-on-login`— Service is activated automatically when the subscriber logs in.

Default— Manual activation
Editing Level—Basic

`activation-order` *`activation-order`*—(Optional) Order in which subscriptions are automatically activated on login relative to the subscriber's other subscriptions that are configured to activate on login. Review all subscriptions that are configured to activate on login for the subscriber, and review the activation order for subscriptions of the parent subscribers. Assign the lowest number to the subscription that you want to activate first. Assign higher numbers to the other subscriptions in the order that you want the SAE to activate them. If you assign the same number to multiple subscriptions, the SAE activates them in an unspecified order.

Value— Integer in the range 0–21474863647
Default— 10000
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Actual values for parameters associated with this object. The policy engine substitutes parameters in policies associated with this object with the values that you specify in the substitution configuration.

Value— Substitution in the form < parameter name > = < value > . For example, bandwidth = 1000000.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* subscription

Syntax

```
subscribers retailer name subscriber-folder folder-
name enterprise name subscription subscription-name {
     status (active | suspended | hidden);
     activation (manual | automatically-on-login);
     activation-order activation-order;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name enterprise name subscription]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service subscription.

Options

`subscription-name` *`subscription-name`*— Name of the service optionally followed by "%*subscription-id*". Use "%*subscription-id*" to subscribe subscribers to the same service multiple times with different subscription attributes.

Value— Text

`status (active | suspended | hidden)`— Status of the service subscription.

Value

- `active`— The subscriber can activate the subscription.
- `suspended`— The subscriber cannot activate the subscription, although it may be visible through the portal. If you change the status of the subscription to suspended while the subscription is active, the service is deactivated.
- `hidden`— Service is not available through a portal and cannot be

activated automatically when the subscribers log in. If you change the status of the subscription to hidden while the subscription is active, the service is not deactivated.

Default— Active
Editing Level—Basic

`activation (manual | automatically-on-login)`— Specify how the service is activated.

Value

- `manual`— Subscriber must manually activate the service.
- `automatically-on-login`— Service is activated automatically when the subscriber logs in.

Default— Manual activation
Editing Level—Basic

`activation-order` *`activation-order`*—(Optional) Order in which subscriptions are automatically activated on login relative to the subscriber's other subscriptions that are configured to activate on login. Review all subscriptions that are configured to activate on login for the subscriber, and review the activation order for subscriptions of the parent subscribers. Assign the lowest number to the subscription that you want to activate first. Assign higher numbers to the other subscriptions in the order that you want the SAE to activate them. If you assign the same number to multiple subscriptions, the SAE activates them in an unspecified order.

Value— Integer in the range 0–21474863647
Default— 10000
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Actual values for parameters associated with this object. The policy engine substitutes parameters in policies associated with this object with the values that you specify in the substitution configuration.

Value— Substitution in the form < parameter name > = < value > . For example, bandwidth = 1000000.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* enterprise *name* vpn

Syntax

```
subscribers retailer name subscriber-folder folder-name enterprise name vpn vpn-id {
     extranet-client [extranet-client...];
     display-name display-name;
     description description;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-name enterprise name vpn]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Add a VPN to the subscriber configuration.

Options

`vpn-id` *`vpn-id`*— Name of the routing instance on a JUNOS routing platform that implements the VPN.

Value— Text

`extranet-client [`*`extranet-client`*`...]`—(Optional) DN of a retailer or an enterprise that is an extranet client of this VPN.

Value— DN
Default— No value
Editing Level—Basic

`display-name` *`display-name`*—(Optional) Subscriber's name as it appears in portal applications. If you do not specify a display name, the value of the name option is used.

Value— Text
Default— No value

Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value— Text
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* manager

Syntax

```
subscribers retailer name subscriber-folder folder-name manager name {
     role [(administrator | subscription | substitution | activation | vpn)...];
     encrypted-password encrypted-password;
     plain-text-password;
     description description;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-name manager]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a manager account.

Options

`name` *`name`*— Name of the manager account.

Value— Text

`role [(administrator | subscription | substitution | activation | vpn)...]`— Privilege level of the enterprise manager account. If you do not specify a privilege level, the manager has read-only access to associated objects.

Value

- `administrator`— Administrators have all privileges of the subscription, substitution, activation, and vpn roles. Additionally, administrators can create, delete, and modify other enterprise manager objects.
- `subscription`— Subscription managers can create, delete, modify, activate, and deactivate subscriptions.
- `substitution`— Substitution managers can modify policy parameters provided by subscriptions, enterprises, sites, and accesses.
- `activation`— Activation managers can activate and deactivate

subscriptions.
- `vpn`— VPN managers can modify, export, and cancel the export of VPNs.

Default— No value
Editing Level—Basic

`encrypted-password` *`encrypted-password`*—(Optional) Login password and type of encryption.

Value— Enter a password, and select an encryption method that your directory supports.

- crypt—Style is /etc/passwd
- sha—Secure hash algorithm
- md5—Message digest #5

Default— No value
Editing Level—Basic

`plain-text-password`—(Optional) Plain text password. The password is encrypted using the algorithm defined in `system services editor password-encryption`.

Value— Text
Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value— Text
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* schedule

Syntax

```
subscribers retailer name subscriber-folder folder-name schedule name {
     description description;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-name schedule]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service schedule.

Options

`name` *`name`*— Name of service schedule.

Value—Text

`description` *`description`*—(Optional) Description of the service schedule.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* schedule *name* event

Syntax

```
subscribers retailer name subscriber-folder folder-
name schedule name event name ...
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-name schedule name event]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a scheduling event.

Options

`name` *name*— Name of the scheduling event.

Value—Text

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* schedule *name* event *name* action

Syntax

```
subscribers retailer name subscriber-folder folder-
name schedule name event name action name {
     type (activate | deactivate | deny | deny-deactivate);
     service service;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name schedule name event name action]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure actions to perform for the scheduled event.

Options

`name` *name*— Arbitrary identifier for action.

Value—Text

`type (activate | deactivate | deny | deny-deactivate)`— Type of action.

Value

- `activate`— Activate service at the time specified in the entry schedule.
- `deactivate`— Deactivate service at the time specified in the entry schedule.
- `deny`— Deny new activation requests during the time specified in the entry schedule; current sessions are not affected. This value applies only to services that have an authorization plug-in configured.
- `deny-deactivate`— Deny new activation requests during the

time specified in the entry schedule; current sessions are deactivated at the specified time. This value applies only to services that have an authorization plug-in configured.

Default— No value
Editing Level—Basic

`service` *`service`*— Name of service affected by this action.

Value—Text
Default— No value
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Substitutions to be used when activating the service. Substitutions apply only to service activations.

Value— An entry in valid substitution format. See the *SRC PE Services and Policies Guide*.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* schedule *name* event *name* action *name* attribute

Syntax

```
subscribers retailer name subscriber-folder folder-
name schedule name event name action name attribute (sessionName | sessionTag |
sessionTimeout | downStreamBandwidth | upStreamBandwidth) {
     value;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name schedule name event name action name attribute]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure subscription attributes. Subscription attributes apply only to service activations.

Options

Subscription attributes.

Value

- `sessionName`— Name of the service session.
- `sessionTag`— Tag that can be used for accounting purposes.
- `sessionTimeout`— Session timeout to be used when the service is activated. The service session is deactivated when this timeout expires.
- `downStreamBandwidth`— Attribute used by SRC Admission Control Plug-In (SRC ACP) to specify the rate of traffic between the network and the subscriber.
- `upStreamBandwidth`— Attribute used by SRC ACP to specify the rate of traffic between the subscriber and the network.

`value`— Value of the specified subscription attribute.

Value— Depends on the specified subscription attribute
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* schedule *name* event *name* except

Syntax

```
subscribers retailer name subscriber-folder folder-
name schedule name event name except name ...
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name schedule name event name except]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure an exclusion for the event.

Options

name *name*— Arbitrary identifier for exclusion rule.

Value—Text

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* schedule *name* event *name* except *name* from

Syntax

```
subscribers retailer name subscriber-folder folder-
name schedule name event name except name from {
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name schedule name event name except name from]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the start time of the exclusion. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* schedule *name* event *name* except *name* to

Syntax

```
subscribers retailer name subscriber-folder folder-
name schedule name event name except name to {
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name schedule name event name except name to]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the end time of the exclusion. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

These values apply only to services that have an authorization plug-in configured. If an authorization plug-in is not configured for the service associated with the schedule, these values are ignored.

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59

Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ | -) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* schedule *name* event *name* from

Syntax

```
subscribers retailer name subscriber-folder folder-
name schedule name event name from {
     effective effective;
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name schedule name event name from]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the start time for the event. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

`effective` *`effective`*—(Optional) Interval after the associated `from` or `to` time during which the scheduled action can be initiated by a subscriber who is logging in to a subscriber session.

Value— Number of minutes in the range 0–153722867280912
Default— *
Editing Level—Basic

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23

- *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* schedule *name* event *name* to

Syntax

```
subscribers retailer name subscriber-folder folder-
name schedule name event name to {
     effective effective;
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name schedule name event name to]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the end time for the event. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

These values apply only to services that have an authorization plug-in configured. If an authorization plug-in is not configured for the service associated with the schedule, these values are ignored.

`effective` *`effective`*—(Optional) Interval after the associated `from` or `to` time during which the scheduled action can be initiated by a subscriber who is logging in to a subscriber session.

Value— Number of minutes in the range 0–153722867280912
Default— *
Editing Level—Basic

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* subscriber

Syntax

```
subscribers retailer name subscriber-folder folder-name subscriber name {
     common-name common-name;
     surname surname;
     given-name given-name;
     initials initials;
     anonymous;
     ip-address ip-address;
     interface-name interface-name;
     maximum-login-group maximum-login-group;
     display-name display-name;
     encrypted-password encrypted-password;
     plain-text-password;
     maximum-login maximum-login;
     session-timeout session-timeout;
     accounting-user-id accounting-user-id;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-name subscriber]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a residential subscriber. The SRC software uses the information in the subscriber definition to create a subscriber profile.

Options

`name` *`name`*— Name of the residential subscriber

Value— Text

`common-name` *`common-name`*— Name that defines the subscriber in the directory. The value is not used directly by the SRC software, but it is not optional because it is required by the LDAP

schema. The common name is available through SRC APIs.

Value— Text. Typically in the format firstName lastName or lastname firstName
Default— No value
Editing Level—Basic

`surname` *`surname`*— Subscriber's last name. The surname is not directly used by the SRC software, but it is not optional because it is required by the LDAP schema. The surname is available through SRC APIs.

Value— Text
Default— No value
Editing Level—Basic

`given-name` *`given-name`*—(Optional) Subscriber's given name. The given name is not used directly by the SRC software, but it is available through SRC APIs.

Value— Text
Default— No value
Editing Level—Basic

`initials` *`initials`*—(Optional) Subscriber's initials. The initials are not used directly by the SRC software but are available through SRC APIs.

Value— Text
Default— No value
Editing Level—Basic

`anonymous`—(Optional) A flag that marks the subscriber profile as a shared profile. Shared profiles can be used by multiple subscriber sessions. The SAE API prevents subscribers from making changes to their profile if the profile is marked as anonymous.

Default— Disabled
Editing Level—Basic

`ip-address` *`ip-address`*—(Optional) IP address for subscribers who have fixed addresses, and for whom the SRC does not learn addresses through its management of routers or through calls to its notification API.

Value— IP address
Default— No value
Editing Level—Basic

`interface-name` *`interface-name`*—(Optional) Type and specifier of the router interface and virtual router that manage this subscriber. Use this option when you want the subscriber classification script to identify the subscriber entry in the directory based on the interface name received from the router.

Value— Interface as configured on the router. For example:

- For JUNOSe routers: "fastethernet6/0.1@vrName@routerName"
- For JUNOS routing platforms: "fe-0/10.0@vrName@routerName"

Default— No value
Editing Level—Basic

`maximum-login-group` *`maximum-login-group`*—(Optional) Maximum number of concurrent logins for this subscriber and all subordinate objects; typically the maximum number of concurrent logins for a household.

Value— Integer in the range 0–2147483647
Default— No value
Editing Level—Basic

`display-name` *`display-name`*—(Optional) Subscriber's name as it appears in portal applications. If you do not specify a display name, the value of the name option is used.

Value— Text
Default— No value
Editing Level—Basic

`encrypted-password` *`encrypted-password`*—(Optional) Login password and type of encryption.

Value— Enter a password, and select an encryption method that your directory supports.

- crypt—Style is /etc/passwd
- sha—Secure hash algorithm
- md5—Message digest #5

Default— No value
Editing Level—Basic

`plain-text-password`—(Optional) Plain text password. The password is encrypted using the algorithm defined in `system services editor password-encryption`.

Value— Text
Default— No value
Editing Level—Basic

`maximum-login` *`maximum-login`*—(Optional) Maximum number of concurrent logins for subscribers associated with this object. By default, all subordinate objects use this value. However, if you specify this value for a subordinate object, that object and its subordinate objects will use the subordinate's value.

Value— Integer in the range 0–2147483647
Default— No value
Editing Level—Basic

`session-timeout` *`session-timeout`*—(Optional) Timeout for subscriber sessions. By default, all subordinate objects use this value. However, if you specify this value for a subordinate object, that object and its subordinate objects will use the subordinate's value.

Value— Number of seconds in the range 0–2147483647
Default— No value
Editing Level—Basic

`accounting-user-id` *`accounting-user-id`*—(Optional) Value that identifies the subscriber in accounting records. For a household subscriber, all subordinate subscribers generally use the same ID. For an enterprise, all parts of the enterprise generally use the same ID.

Value— Text
Default— No value
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Actual values for parameters associated with this object. The policy engine substitutes parameters in policies associated with this object with the values that you specify in the substitution configuration.

Value— Substitution in the form < parameter name > = < value > . For example, bandwidth = 1000000.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* subscriber *name* admission-control

Syntax

```
subscribers retailer name subscriber-folder folder-name subscriber name admission-
control {
     downstream-provisioned-rate downstream-provisioned-rate;
     upstream-provisioned-rate upstream-provisioned-rate;
     downstream-sync-rate downstream-sync-rate;
     upstream-sync-rate upstream-sync-rate;
     congestion-points [congestion-points...];
     detect-link-rate;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name subscriber name admission-control]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure bandwidths for subscribers that the SRC-ACP manages.

Options

`downstream-provisioned-rate` *`downstream-provisioned-rate`*—(Optional) Provisioned downstream bandwidth. This rate is used if the subscriber bandwidth settings are not provided by the API for ACP or by the downstream-sync-rate option.

Value— Number of bps in the range 0–9223372036854775807
Default— No value
Editing Level—Basic

`upstream-provisioned-rate` *`upstream-provisioned-rate`*—(Optional) Provisioned upstream bandwidth. This rate is used if the subscriber bandwidth settings are not provided by the API for ACP or by the upstream-sync-rate option.

Value— Number of bps in the range 0–9223372036854775807
Default— No value
Editing Level—Basic

`downstream-sync-rate` *`downstream-sync-rate`*—(Optional) Actual downstream bandwidth for the current subscriber session. If you do not set this value and it is not provided by the API for ACP, the value of the downstream-provisioned-rate option is used.

Value— Number of bps in the range 0–9223372036854775807
Default— No value
Editing Level—Basic

`upstream-sync-rate` *`upstream-sync-rate`*—(Optional) Actual upstream bandwidth for the current subscriber session. If you do not set this value and it is not provided by the API for ACP, the value of the upstream-provisioned-rate option is used.

Value— Number of bps in the range 0–9223372036854775807
Default— No value
Editing Level—Basic

`congestion-points [`*`congestion-points...`*`]`—(Optional) Congestion points for the subscriber.

Value— DN of interface associated with congestion point
Default— No value
Editing Level—Basic

`detect-link-rate`—(Optional) To identify the possibility of getting the actual link rate information for a congestion point via L2C or other solutions developed later. By default , it is false for the sake of backward compatibility.

Default— false
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* subscriber *name* info

Syntax

```
subscribers retailer name subscriber-folder folder-name subscriber name info {
     home-phone home-phone;
     additional-phone additional-phone;
     fax fax;
     e-mail e-mail;
     city city;
     street street;
     postal-code postal-code;
     language language;
     job job;
     description description;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name subscriber name info]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure administrative information about the subscriber. The additional subscriber information is not used directly by the SRC software.

Options

`home-phone` *`home-phone`*—(Optional) Home telephone number of the subscriber.

Value— Telephone number
Default— No value
Editing Level—Basic

`additional-phone` *`additional-phone`*—(Optional) Additional telephone number for the subscriber.

Value— Telephone number

Default— No value
Editing Level—Basic

`fax` *`fax`*—(Optional) Fax number for the subscriber.

Value— Fax number
Default— No value
Editing Level—Basic

`e-mail` *`e-mail`*—(Optional) E-mail address for the subscriber.

Value— E-mail address
Default— No value
Editing Level—Basic

`city` *`city`*—(Optional) City name for the subscriber.

Value— City name
Default— No value
Editing Level—Basic

`street` *`street`*—(Optional) Street address for the subscriber.

Value— Street address
Default— No value
Editing Level—Basic

`postal-code` *`postal-code`*—(Optional) Postal code for the subscriber.

Value— Postal code
Default— No value
Editing Level—Basic

`language` *`language`*—(Optional) Preferred language for the subscriber.

Value— Language name
Default— No value
Editing Level—Basic

`job` *`job`*—(Optional) Job or business category for the subscriber.

Value— Job or business category

Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value— Text
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* subscriber *name* schedule

Syntax

```
subscribers retailer name subscriber-folder folder-
name subscriber name schedule name {
     description description;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name subscriber name schedule]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service schedule.

Options

`name` *`name`*— Name of service schedule.

Value—Text

`description` *`description`*—(Optional) Description of the service schedule.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* subscriber *name* schedule *name* event

Syntax

```
subscribers retailer name subscriber-folder folder-
name subscriber name schedule name event name ...
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name subscriber name schedule name event]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a scheduling event.

Options

name *name*— Name of the scheduling event.

Value—Text

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* subscriber *name* schedule *name* event *name* action

Syntax

```
subscribers retailer name subscriber-folder folder-
name subscriber name schedule name event name action name {
     type (activate | deactivate | deny | deny-deactivate);
     service service;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name subscriber name schedule name event name action]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure actions to perform for the scheduled event.

Options

`name` *name*— Arbitrary identifier for action.

Value—Text

`type (activate | deactivate | deny | deny-deactivate)`— Type of action.

Value

- `activate`— Activate service at the time specified in the entry schedule.
- `deactivate`— Deactivate service at the time specified in the entry schedule.
- `deny`— Deny new activation requests during the time specified in the entry schedule; current sessions are not affected. This value applies only to services that have an authorization plug-in configured.
- `deny-deactivate`— Deny new activation requests during the

time specified in the entry schedule; current sessions are deactivated at the specified time. This value applies only to services that have an authorization plug-in configured.

Default— No value
Editing Level—Basic

`service` *`service`*— Name of service affected by this action.

Value—Text
Default— No value
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Substitutions to be used when activating the service. Substitutions apply only to service activations.

Value— An entry in valid substitution format. See the *SRC PE Services and Policies Guide*.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* subscriber *name* schedule *name* event *name* action *name* attribute

Syntax

```
subscribers retailer name subscriber-folder folder-
name subscriber name schedule name event name action name attribute (sessionName |
sessionTag | sessionTimeout | downStreamBandwidth | upStreamBandwidth) {
     value;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name subscriber name schedule name event name action name attribute]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure subscription attributes. Subscription attributes apply only to service activations.

Options

Subscription attributes.

Value

- `sessionName`— Name of the service session.
- `sessionTag`— Tag that can be used for accounting purposes.
- `sessionTimeout`— Session timeout to be used when the service is activated. The service session is deactivated when this timeout expires.
- `downStreamBandwidth`— Attribute used by SRC Admission Control Plug-In (SRC ACP) to specify the rate of traffic between the network and the subscriber.
- `upStreamBandwidth`— Attribute used by SRC ACP to specify the rate of traffic between the subscriber and the network.

value— Value of the specified subscription attribute.

Value— Depends on the specified subscription attribute
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* subscriber *name* schedule *name* event *name* except

Syntax

```
subscribers retailer name subscriber-folder folder-
name subscriber name schedule name event name except name ...
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name subscriber name schedule name event name except]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure an exclusion for the event.

Options

name *name*— Arbitrary identifier for exclusion rule.

Value—Text

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* subscriber *name* schedule *name* event *name* except *name* from

Syntax

```
subscribers retailer name subscriber-folder folder-
name subscriber name schedule name event name except name from {
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name subscriber name schedule name event name except name from]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the start time of the exclusion. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or

exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
  - *hh*—Hour of the day in the range of 0–23
  - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* subscriber *name* schedule *name* event *name* except *name* to

Syntax

```
subscribers retailer name subscriber-folder folder-
name subscriber name schedule name event name except name to {
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name subscriber name schedule name event name except name to]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the end time of the exclusion. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

These values apply only to services that have an authorization plug-in configured. If an authorization plug-in is not configured for the service associated with the schedule, these values are ignored.

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59

Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ | -) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* subscriber *name* schedule *name* event *name* from

Syntax

```
subscribers retailer name subscriber-folder folder-
name subscriber name schedule name event name from {
     effective effective;
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name subscriber name schedule name event name from]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the start time for the event. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

`effective` *`effective`*—(Optional) Interval after the associated `from` or `to` time during which the scheduled action can be initiated by a subscriber who is logging in to a subscriber session.

Value— Number of minutes in the range 0–153722867280912
Default— *
Editing Level—Basic

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23

- *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* subscriber *name* schedule *name* event *name* to

Syntax

```
subscribers retailer name subscriber-folder folder-
name subscriber name schedule name event name to {
     effective effective;
     hour hour;
     minute minute;
     day-of-month day-of-month;
     day-of-week day-of-week;
     month month;
     year year;
     time-zone time-zone;
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name subscriber name schedule name event name to]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the end time for the event. For guidelines about entering time values, see the *SRC PE Services and Policies Guide*.

These values apply only to services that have an authorization plug-in configured. If an authorization plug-in is not configured for the service associated with the schedule, these values are ignored.

`effective` *`effective`*—(Optional) Interval after the associated `from` or `to` time during which the scheduled action can be initiated by a subscriber who is logging in to a subscriber session.

Value— Number of minutes in the range 0–153722867280912
Default— *
Editing Level—Basic

`hour` *`hour`*—(Optional) Hour of the day in the indicated month in which to schedule the event or exclusion.

Value— 0-23
Default— *
Editing Level—Basic

`minute` *`minute`*—(Optional) Minutes past the indicated hour in which to schedule the event or exclusion.

Value— 0-59
Default— *
Editing Level—Basic

`day-of-month` *`day-of-month`*—(Optional) Day of the month in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 1-31
Default— *
Editing Level—Basic

`day-of-week` *`day-of-week`*—(Optional) Day of the week in which to schedule the event or exclusion. If you specify both `day-of-month` and `day-of-week`, `day-of-month` is used.

Value— 0-6, with 0 representing Sunday and each subsequent number representing the next day of the week
Default— *
Editing Level—Basic

`month` *`month`*—(Optional) Month of the year in which to schedule the event or exclusion.

Value— 1-12
Default— *
Editing Level—Basic

`year` *`year`*—(Optional) Year in which to schedule the event or exclusion.

Value— Four integers that indicate the year
Default— *
Editing Level—Basic

`time-zone` *`time-zone`*—(Optional) Name of the time zone to use in the schedule.

Value— One of the following values:

- *—Local time zone of the SAE
- An offset to GMT in the format: GMT (+ |-) (*hh:mm* | *hh mm* | *hh*)
    - *hh*—Hour of the day in the range of 0–23
    - *mm*—Minutes past the hour in the range of 0–59

Default— *
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* subscriber *name* subscription

Syntax

```
subscribers retailer name subscriber-folder folder-
name subscriber name subscription subscription-name {
     status (active | suspended | hidden);
     activation (manual | automatically-on-login);
     activation-order activation-order;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-
name subscriber name subscription]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service subscription.

Options

`subscription-name` *`subscription-name`*— Name of the service optionally followed by "*%subscription-id*". Use "*%subscription-id*" to subscribe subscribers to the same service multiple times with different subscription attributes.

Value— Text

`status (active | suspended | hidden)`— Status of the service subscription.

Value

- `active`— The subscriber can activate the subscription.
- `suspended`— The subscriber cannot activate the subscription, although it may be visible through the portal. If you change the status of the subscription to suspended while the subscription is active, the service is deactivated.
- `hidden`— Service is not available through a portal and cannot be

activated automatically when the subscribers log in. If you change the status of the subscription to hidden while the subscription is active, the service is not deactivated.

Default— Active
Editing Level—Basic

`activation (manual | automatically-on-login)`— Specify how the service is activated.

Value

- `manual`— Subscriber must manually activate the service.
- `automatically-on-login`— Service is activated automatically when the subscriber logs in.

Default— Manual activation
Editing Level—Basic

`activation-order` *`activation-order`*—(Optional) Order in which subscriptions are automatically activated on login relative to the subscriber's other subscriptions that are configured to activate on login. Review all subscriptions that are configured to activate on login for the subscriber, and review the activation order for subscriptions of the parent subscribers. Assign the lowest number to the subscription that you want to activate first. Assign higher numbers to the other subscriptions in the order that you want the SAE to activate them. If you assign the same number to multiple subscriptions, the SAE activates them in an unspecified order.

Value— Integer in the range 0–21474863647
Default— 10000
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Actual values for parameters associated with this object. The policy engine substitutes parameters in policies associated with this object with the values that you specify in the substitution configuration.

Value— Substitution in the form < parameter name > = < value > . For example, bandwidth = 1000000.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscriber-folder *folder-name* subscription

Syntax

```
subscribers retailer name subscriber-folder folder-name subscription subscription-
name {
     status (active | suspended | hidden);
     activation (manual | automatically-on-login);
     activation-order activation-order;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscriber-folder folder-name subscription]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service subscription.

Options

`subscription-name` *`subscription-name`*— Name of the service optionally followed by "%*subscription-id*". Use "%*subscription-id*" to subscribe subscribers to the same service multiple times with different subscription attributes.

Value— Text

`status (active | suspended | hidden)`— Status of the service subscription.

Value

- `active`— The subscriber can activate the subscription.
- `suspended`— The subscriber cannot activate the subscription, although it may be visible through the portal. If you change the status of the subscription to suspended while the subscription is active, the service is deactivated.
- `hidden`— Service is not available through a portal and cannot be activated automatically when the subscribers log in. If you change

the status of the subscription to hidden while the subscription is active, the service is not deactivated.

Default— Active
Editing Level—Basic

`activation (manual | automatically-on-login)`— Specify how the service is activated.

Value

- `manual`— Subscriber must manually activate the service.
- `automatically-on-login`— Service is activated automatically when the subscriber logs in.

Default— Manual activation
Editing Level—Basic

`activation-order` *`activation-order`*—(Optional) Order in which subscriptions are automatically activated on login relative to the subscriber's other subscriptions that are configured to activate on login. Review all subscriptions that are configured to activate on login for the subscriber, and review the activation order for subscriptions of the parent subscribers. Assign the lowest number to the subscription that you want to activate first. Assign higher numbers to the other subscriptions in the order that you want the SAE to activate them. If you assign the same number to multiple subscriptions, the SAE activates them in an unspecified order.

Value— Integer in the range 0–21474863647
Default— 10000
Editing Level—Basic

`substitution [`*`substitution...`*`]`—(Optional) Actual values for parameters associated with this object. The policy engine substitutes parameters in policies associated with this object with the values that you specify in the substitution configuration.

Value— Substitution in the form < parameter name > = < value > . For example, bandwidth = 1000000.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* subscription

Syntax

```
subscribers retailer name subscription subscription-name {
     status (active | suspended | hidden);
     activation (manual | automatically-on-login);
     activation-order activation-order;
     substitution [substitution...];
}
```

Hierarchy Level

```
[edit subscribers retailer name subscription]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a service subscription.

Options

`subscription-name` *`subscription-name`*— Name of the service optionally followed by "*%subscription-id*". Use "*%subscription-id*" to subscribe subscribers to the same service multiple times with different subscription attributes.

Value— Text

`status (active | suspended | hidden)`— Status of the service subscription.

Value

- `active`— The subscriber can activate the subscription.
- `suspended`— The subscriber cannot activate the subscription, although it may be visible through the portal. If you change the status of the subscription to suspended while the subscription is active, the service is deactivated.
- `hidden`— Service is not available through a portal and cannot be activated automatically when the subscribers log in. If you change the status of the subscription to hidden while the subscription is active, the service is not deactivated.

Default— Active
Editing Level—Basic

`activation (manual | automatically-on-login)`— Specify how the service is activated.

Value

- `manual`— Subscriber must manually activate the service.
- `automatically-on-login`— Service is activated automatically when the subscriber logs in.

Default— Manual activation
Editing Level—Basic

`activation-order` *`activation-order`*—(Optional) Order in which subscriptions are automatically activated on login relative to the subscriber's other subscriptions that are configured to activate on login. Review all subscriptions that are configured to activate on login for the subscriber, and review the activation order for subscriptions of the parent subscribers. Assign the lowest number to the subscription that you want to activate first. Assign higher numbers to the other subscriptions in the order that you want the SAE to activate them. If you assign the same number to multiple subscriptions, the SAE activates them in an unspecified order.

Value— Integer in the range 0–21474863647
Default— 10000
Editing Level—Basic

`substitution [`*`substitution`*`...]`—(Optional) Actual values for parameters associated with this object. The policy engine substitutes parameters in policies associated with this object with the values that you specify in the substitution configuration.

Value— Substitution in the form < parameter name > = < value > . For example, bandwidth = 1000000.
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

subscribers retailer *name* vpn

Syntax

```
subscribers retailer name vpn vpn-id {
     extranet-client [extranet-client...];
     display-name display-name;
     description description;
}
```

Hierarchy Level

```
[edit subscribers retailer name vpn]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Add a VPN to the subscriber configuration.

Options

`vpn-id` *`vpn-id`*— Name of the routing instance on a JUNOS routing platform that implements the VPN.

Value— Text

`extranet-client [`*`extranet-client...`*`]`—(Optional) DN of a retailer or an enterprise that is an extranet client of this VPN.

Value— DN
Default— No value
Editing Level—Basic

`display-name` *`display-name`*—(Optional) Subscriber's name as it appears in portal applications. If you do not specify a display name, the value of the name option is used.

Value— Text
Default— No value
Editing Level—Basic

`description` *`description`*—(Optional) Description of the object that you are configuring.

Value— Text
Default— No value
Editing Level—Basic

Required Privilege Level

subscriber

Required Editing Level

Basic

Redirect Server

The following table summarizes the SRC command-line interface (SRC CLI) for the Redirect Server. Configuration statements and operational commands are listed in alphabetical order.

Redirect Server
Configuration Statements
redirect-server
redirect-server dns
redirect-server ip-redirect
redirect-server ldap
redirect-server monitor
Operational Commands
show redirect-server statistics

redirect-server

Syntax

```
redirect-server {
     tcp-port tcp-port;
     destination-url destination-url;
     proxy-support;
     proxy-destination-url proxy-destination-url;
     refresh;
     refresh-document refresh-document;
     request-rate request-rate;
     request-burst-size request-burst-size;
     client-rate client-rate;
     client-burst-size client-burst-size;
     check-file-extensions;
     file-extensions [file-extensions...];
     redundancy;
}
```

Hierarchy Level

```
[edit redirect-server]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure redirect server properties. The redirect server redirects HTTP requests to a captive portal page.

Options

`tcp-port` *`tcp-port`*—(Optional) TCP port number on which the redirect server listens for requests. Use any valid TCP port number.

Value—Integer in the range 1–65535
Default—8800
Editing Level—Basic

`destination-url` *`destination-url`*— URL sent as a response to redirect requests. Typically, this URL is the URL of the captive portal.

The URL can contain the special strings "%(url)s" and "%(proxy)s." If the HTTP request is sent

to a proxy, the "%(url)s" string is replaced with the originally requested URL, and the "%(proxy)s" string is replaced with the proxy's "<ipAddress>:<port>". If the request is sent directly, the string is replaced with "None."

If the `proxy-destination-url` option is not configured, this URL is used for both proxy and nonproxy requests.

Value— http://<serverHost>/accessDenied.do?url=%(url)s where <serverHost> is a valid URL; a string of ASCII characters.
Editing Level—Basic

`proxy-support`—(Optional) Enable proxy support. If you do not enable proxy support, the redirect server handles proxy requests in the same manner as direct requests.

Editing Level—Basic

`proxy-destination-url` *`proxy-destination-url`*—(Optional) URL sent as a response to proxy requests. If you do not configure a value, then the URL defaults to the value for the `destination-url` option. You can use this option to send proxy requests to a page different from the page specified by the `destination-url` option.

Value— Valid URL; string of ASCII characters in URL string format
Editing Level—Basic

`refresh`—(Optional) Specify that the redirect server send an HTTP 200 OK response with an HTML document that includes the <HTTP-Equiv="Refresh"> header to a subscriber's browser in response to a captured request. If not set, the redirect server sends a 302 Found response to the client. If the client is not a Web browser, typically it does not follow the URL included in the `refresh` option.

Editing Level—Basic

`refresh-document` *`refresh-document`*—(Optional) Directory path to a local HTML file that the redirect server returns to a subscriber's browser in response to a captured HTTP request.

If you enter an invalid path, the redirect server uses a default file. This file can contain the string "%(url)s" which is replaced with the URL of the local HTML file to be returned to the subscriber's browser.

Value— Path to HTML file
Editing Level—Basic

`request-rate` *`request-rate`*—(Optional) Number of requests that the redirect server can accept per minute from all clients (global sustained rate).

Value— Integer in the range 0–2147483647
Default—12000
Editing Level—Basic

`request-burst-size` *`request-burst-size`*—(Optional) Maximum number of requests that the redirect server can accept from all clients (burst size). This value should exceed value set by the `request-rate` option. If the number of requests exceeds this value, the redirect server drops the excess requests.

Value— Integer in the range 0–2147483647
Default—18000
Editing Level—Basic

`client-rate` *`client-rate`*—(Optional) Number of requests that the redirect server can accept per minute for a single client (per client sustained rate).

Value— Integer in the range 0–2147483647
Default—25
Editing Level—Basic

`client-burst-size` *`client-burst-size`*—(Optional) Maximum number of requests that the redirect server can accept for a single client (per client burst size). This value should exceed the value set by the `client-rate` option. If at any time the number of requests from one client exceeds this value, the redirect server drops the excess requests.

Value— Integer in the range 0–2147483647
Default—50
Editing Level—Basic

`check-file-extensions`—(Optional) Check file extension of requested URLs and accept only URLs that point to files that have standard file extensions— < empty > , .asp, .htm, .html, .jsp, .php, .shtml, .shtm and .xml, and extensions specified by the `file-extensions` option. If a URL does not have a standard extension, the redirect server returns an HTTP 403 Forbidden message.

If not set, the redirect server accepts all file extensions.

Default—false
Editing Level—Basic

`file-extensions [`*`file-extensions`*`...]`—(Optional) List of file extensions that augments the standard list of extensions. Entries for extensions are case-sensitive and are preceded by a period.

Value— Text string of file extensions.
Editing Level—Basic

`redundancy`—(Optional) Enable redundancy for the redirect server on this system, which then monitors a redundant redirect server and configures static routes in the managed routers running JunosE Software to facilitate failover.

Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

redirect-server dns

Syntax

```
redirect-server dns {
     enable;
     tcp-port tcp-port;
     udp-port udp-port;
     forwarder [forwarder...];
     error-ip-address error-ip-address;
}
```

Hierarchy Level

```
[edit redirect-server dns]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure properties for the DNS server included with the redirect server.

Options

`enable`—(Optional) Enable the DNS server included with the redirect server.

A DNS server is required to support HTTP proxies to resolve the name of any HTTP proxy, even if the name is valid only in the private domain of the client. You can use an external DNS server or the DNS server that is included with the redirect for this purpose.

Editing Level—Basic

`tcp-port` *`tcp-port`*— TCP port on which the DNS server listens. You can disable the TCP port by entering 0.

Value—Integer in the range 0–65535
Default—8853
Editing Level—Basic

`udp-port` *`udp-port`*— UDP port on which the DNS server listens. You can disable the UDP port by entering 0.

Value—Integer in the range 0–65535
Default—8853
Editing Level—Basic

`forwarder [`*`forwarder...`*`]`—(Optional) DNS servers to which requests are forwarded.

If you specify DNS servers for this option, incoming requests are forwarded to one of these servers. If you do not specify servers, the DNS server will resolve incoming requests using the normal DNS method.

Value— List of fully qualified IP address of DNS servers.
Editing Level—Basic

`error-ip-address` *`error-ip-address`*—(Optional) IP address that is returned when a DNS request results in an unknown name (NXDOMAIN) error.

Value— Fully qualified IP address
Default—192.168.254.2
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

redirect-server ip-redirect

Syntax

```
redirect-server ip-redirect {
     interface [interface...];
     port [port...];
}
```

Hierarchy Level

```
[edit redirect-server ip-redirect]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure IP redirection.

Options

`interface [interface...]`—(Optional) Interface on a C Series Controller that forwards traffic to be redirected. If you do not specify one or more interface names, the redirect server accepts specified traffic from all interfaces.

Value— Interface name
Editing Level—Basic

`port [port...]`—(Optional) Port number that identifies traffic destined for this port to be redirected to another URL.

Value—Integer in the range 1–65535
Default— 80
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

redirect-server ldap

Syntax

```
redirect-server ldap {
     url [url...];
     bind-dn bind-dn;
     bind-password bind-password;
     base-dn base-dn;
}
```

Hierarchy Level

```
[edit redirect-server ldap]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure directories employed by the redirect server.

Options

`url [url...]`— List of the URLs for directories employed by the redirect server.

Value— URL in the format ldap:// < host > : < portNumber > , where < host > is the IP address or name of the host that supports the directory, and < portNumber > is the number of the TCP port. Example— ldap://localhost ldap://1.2.3.4:389
Editing Level—Basic

`bind-dn bind-dn`— DN that the redirect server uses to authorize connections to the directory. The DN must have read and write access to *o = Network, < baseDN > , where < baseDN >* is the root of the SRC directory tree.

Value— DN
Editing Level—Basic

`bind-password bind-password`— Password used to authorize connections to the directory.

Value— Text string in LDAP format

Editing Level—Basic

`base-dn` *`base-dn`*—(Optional) Base DN that is the root of the SRC directory tree. The redirect server can store information at any DN subordinate to the base DN that you specify.

Value— DN
Default—o = umc
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

redirect-server monitor

Syntax

```
redirect-server monitor {
     redundant-host-ip-address redundant-host-ip-address;
     virtual-ip-address virtual-ip-address;
     real-ip-address real-ip-address;
     primary-server;
     check-interval check-interval;
     virtual-routers [virtual-routers...];
}
```

Hierarchy Level

```
[edit redirect-server monitor]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure redundancy for the redirect server. With redundancy configured, a pair of redirect servers monitor each other. If one server detects that the other server is not responding, it reconfigures all managed JunosE virtual routers with a static route that points to a virtual IP address to the active redirect server.

Options

`redundant-host-ip-address` *`redundant-host-ip-address`*— IP address of the redundant redirect server.

Value— Fully qualified IP address
Editing Level—Basic

`virtual-ip-address` *`virtual-ip-address`*— Virtual IP address of the redirect server. Do not specify a hostname.

You can configure the primary and redundant redirect servers to share this address under a common name in the DNS. Each redirect server dynamically sets up and maintains a static route on managed routers running JunosE Software. The static route directs client traffic destined for the virtual IP address to the real IP address of the active redirect server.

Value— Fully qualified IP address
Default—192.168.254.1

Editing Level—Basic

`real-ip-address` *`real-ip-address`*— Real IP address of the redirect server. Do not specify a hostname.

Each redirect server dynamically sets up and maintains a static route on managed routers running JunosE Software. The static route directs client traffic that is destined for the virtual IP address to the real IP address of the active redirect server.

Value— Fully qualified IP address
Editing Level—Basic

`primary-server`—(Optional) Set this redirect server as the primary server. When the primary redirect server is started, it configures a static route for the virtual IP address.

If not enabled for this redirect server, this server becomes the redundant one.

Default—false
Editing Level—Basic

`check-interval` *`check-interval`*—(Optional) Interval at which the primary redirect server polls the redundant redirect server.

A shorter interval leads to faster detection of problems and results in higher consumption of CPU resources.

Value— Number of seconds in the range 60/clientRate–2147483647, where clientRate is the number of requests per minute that the redirect server accepts from one client.
Default—30
Editing Level—Basic

`virtual-routers [`*`virtual-routers...`*`]`— List of virtual routers to which the redirect server connects.

Value— Identifier for the virtual router in the format < vrName > @ < routerName > , where < vrName > is the name of the virtual router, and < routerName > is the name of the router on which the virtual router is configured.
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

show redirect-server statistics

Syntax

```
show redirect-server statistics < (brief) >
```

Release Information

Command introduced in SRC Release 1.0.0

Description

Display statistics for redirect server.

Options

(Optional) Output style.

Value

- `brief`— Display brief information.

Default—normal

Required Privilege Level

view

External Subscriber Monitor

The following table summarizes the SRC command-line interface (SRC CLI) for External Subscriber Monitor. Configuration statements and operational commands are listed in alphabetical order.

External Subscriber Monitor
Configuration Statements
slot number external-subscriber-monitor
slot number external-subscriber-monitor event-notification
slot number external-subscriber-monitor initial
slot number external-subscriber-monitor initial directory-connection
slot number external-subscriber-monitor initial directory-eventing
slot number external-subscriber-monitor logger
slot number external-subscriber-monitor logger name file
slot number external-subscriber-monitor logger name syslog
slot number external-subscriber-monitor nic-proxy-configuration radius-accounting-nic cache
slot number external-subscriber-monitor nic-proxy-configuration radius-accounting-nic nic-host-selection
slot number external-subscriber-monitor nic-proxy-configuration radius-accounting-nic nic-host-selection blacklisting
slot number external-subscriber-monitor nic-proxy-configuration radius-accounting-nic resolution
slot number external-subscriber-monitor nic-proxy-configuration radius-authorization-nic cache
slot number external-subscriber-monitor nic-proxy-configuration radius-authorization-nic nic-host-selection
slot number external-subscriber-monitor nic-proxy-configuration radius-authorization-nic nic-host-selection blacklisting
slot number external-subscriber-monitor nic-proxy-configuration radius-authorization-nic resolution
slot number external-subscriber-monitor radius-accounting
slot number external-subscriber-monitor radius-accounting client
slot number external-subscriber-monitor radius-attribute-extraction default interface-name

slot number external-subscriber-monitor radius-attribute-extraction default virtual-router-name
slot number external-subscriber-monitor radius-authorization
slot number external-subscriber-monitor radius-authorization client
slot number external-subscriber-monitor radius-authorization ldap cached-dhcp-profile
slot number external-subscriber-monitor radius-authorization ldap cached-dhcp-profile directory-connection
slot number external-subscriber-monitor radius-authorization ldap subscriber-data
slot number external-subscriber-monitor radius-authorization ldap subscriber-data directory-connection
Operational Commands
monitor external-subscriber-monitor event-notifications
monitor external-subscriber-monitor radius-accounting
monitor external-subscriber-monitor radius-authorization
show external-subscriber-monitor statistics event-notifications
show external-subscriber-monitor statistics process
show external-subscriber-monitor statistics radius-accounting
show external-subscriber-monitor statistics radius-authorization

slot *number* external-subscriber-monitor

Syntax

```
slot number external-subscriber-monitor {
     java-heap-size java-heap-size;
     java-garbage-collection-options java-garbage-collection-options;
}
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure the local properties for External Subscriber Monitor.

Options

`java-heap-size` *`java-heap-size`*— Maximum Java heap (memory) size available to the JRE. Changes take effect only after you restart External Subscriber Monitor.

Value— Number of megabytes in the format *integer*m
Default— 160m
Editing Level—Basic

`java-garbage-collection-options` *`java-garbage-collection-options`*— (Optional) Garbage collection functionality of the Java Virtual Machine.

Value—
Default— -Xbatch -XX: + UseConcMarkSweepGC -XX: CMSInitiatingOccupancyFraction = 80 -XX: + UseParNewGC -XX: SurvivorRatio = 1 -XX:InitialTenuringThreshold = 8 -XX: MaxTenuringThreshold = 10 -XX:TargetSurvivorRatio = 90 -XX: + UseCMSCompactAtFullCollection -XX:CMSFullGCsBeforeCompaction = 0 -XX: + CMSClassUnloadingEnabled -XX: + CMSParallelRemarkEnabled
Editing Level—Advanced

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* external-subscriber-monitor event-notification

Syntax

```
slot number external-subscriber-monitor event-notification {
     event-threads event-threads;
     event-thread-idle-timeout event-thread-idle-timeout;
     event-retry-timeout event-retry-timeout;
     event-retry-interval event-retry-interval;
     session-timeout session-timeout;
}
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor event-notification]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure event notification. This is mandatory if radius-accounting is on.

Options

`event-threads` *`event-threads`*—(Optional) Maximum number of concurrent threads in a pool for event handler.

Value—Integer in the range 1–2147483648
Default— 8
Editing Level—Advanced

`event-thread-idle-timeout` *`event-thread-idle-timeout`*—(Optional) Time to keep an event handler alive for reuse.

Value—Integer in the range 1–2147483648 second
Default— 300
Editing Level—Advanced

`event-retry-timeout` *`event-retry-timeout`*—(Optional) Maximum time to wait before discarding failed events.

Value—Integer in the range 1–2147483648 second
Default— 300
Editing Level—Advanced

`event-retry-interval` *`event-retry-interval`*—(Optional) Time to wait before retrying failed events.

Value—Integer in the range 1–2147483648 second
Default— 30
Editing Level—Advanced

`session-timeout` *`session-timeout`*—(Optional) Keepalive time for a RADIUS subscriber or service. This value should be larger than the interim update interval. We recommend twice the interim update interval. Setting the session timeout less than or equal to zero means the subscriber session never expires.

Value—Integer in the range -2147483648–2147483647 second
Default— 1800
Editing Level—Normal

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* external-subscriber-monitor initial

Syntax

```
slot number external-subscriber-monitor initial {
     dynamic-dn dynamic-dn;
}
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor initial]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure initial properties for SRC components.

Options

`dynamic-dn` *`dynamic-dn`*—(Optional) Location of programmatically-defined configuration data in the directory.

Value—Text
Default—ou = dynamicConfiguration,ou = Configuration,o = Management, o = umc
Editing Level—Advanced

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* external-subscriber-monitor initial directory-connection

Syntax

```
slot number external-subscriber-monitor initial directory-connection {
     url url;
     backup-urls [backup-urls...];
     principal principal;
     credentials credentials;
     protocol (ldaps);
     timeout timeout;
     check-interval check-interval;
     blacklist;
     snmp-agent;
}
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor initial directory-connection]
```

Description

Configure properties for the directory connection.

Options

`url url`—(Optional) URL that identifies the location of the primary directory server.

Value— URL
Default—ldap://127.0.0.1:389
Editing Level—Basic

`backup-urls [backup-urls...]`—(Optional) URLs that identify the locations of backup directory servers. Backup servers are used if the primary directory server is not accessible.

Value— List of URLs
Editing Level—Basic

`principal principal`— DN that the SRC component uses for authentication to access the directory.

Value— DN.

When you specify the DN, you can use < base > to indicate the base DN.

Editing Level—Basic

`credentials` *`credentials`*— Password with which the SRC component accesses the directory.

Value— Password
Editing Level—Basic

`protocol (ldaps)`—(Optional) Security protocol used to connect to the directory. If you do not configure a security protocol, plain socket is used.

Value

- `ldaps`— LDAPS which uses SSL.

Editing Level—Expert

`timeout` *`timeout`*—(Optional) Maximum amount of time during which the directory must respond to a connection request.

Value—Integer in the range 1–2147483647 s
Default—10
Editing Level—Expert

`check-interval` *`check-interval`*—(Optional) Time interval at which the directory monitoring system verifies its connection to the directory. If the directory connection fails after this interval, the directory monitoring system initiates a connection to another directory.

Value—Integer in the range 15–2147483647 s
Default—60
Editing Level—Expert

`blacklist`—(Optional) Specifies whether the directory monitoring system prevents connection to a directory if the directory fails to respond during 10 polling intervals.

Default—false
Editing Level—Basic

`snmp-agent`—(Optional) Specifies whether the SRC SNMP agent exports MIBs for this

directory connection.

Default—false
Editing Level—Expert

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* external-subscriber-monitor initial directory-eventing

Syntax

```
slot number external-subscriber-monitor initial directory-eventing {
     eventing;
     signature-dn signature-dn;
     polling-interval polling-interval;
     event-base-dn event-base-dn;
     dispatcher-pool-size dispatcher-pool-size;
}
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor initial directory-eventing]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Change configuration for directory eventing properties. In most cases, you can use the default configuration for these properties.

Options

`eventing`—(Optional) Enable an SRC component to poll the directory for changes.

Default—true
Editing Level—Normal

`signature-dn` *`signature-dn`*—(Optional) DN of the directory entry that specifies the usedDirectory attribute for the SRC CLI. The usedDirectory attribute identifies the vendor of the directory server.

Value— DN
Default—o = umc
Editing Level—Expert

`polling-interval` *`polling-interval`*—(Optional) Interval at which an SRC component polls the directory to check for directory changes.

Value—Integer in the range 15–2147483647 s
Default—30
Editing Level—Normal

`event-base-dn` *`event-base-dn`*—(Optional) DN of an entry superior to the data associated with an SRC component in the directory.

If you are storing non-SRC data in the directory, and that data changes frequently whereas the SRC data does not, you may need to adjust the default value to improve performance. For optimal performance, set the value to the DN of an entry superior to both the SRC data and the changing non-SRC data.

Value— DN
Default—o = UMC
Editing Level—Expert

`dispatcher-pool-size` *`dispatcher-pool-size`*—(Optional) Number of directory change notifications that can be sent simultaneously to the SRC component.

Value—Integer in the range 0–2147483647
Default—1
Editing Level—Expert

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* external-subscriber-monitor logger

Syntax

```
slot number external-subscriber-monitor logger name ...
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor logger]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure the logging destination.

Options

`name` *name*— Name used to group parameters for the logging destination.

Value— Text

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* external-subscriber-monitor logger *name* file

Syntax

```
slot number external-subscriber-monitor logger name file {
     filter filter;
     filename filename;
     rollover-filename rollover-filename;
     maximum-file-size maximum-file-size;
}
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor logger name file]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure the logging destination for file-based logging.

`filter` *`filter`*—(Optional) Filter to define which event messages the software logs or ignores. Filters can specify the logging level, such as debug, or can specify expressions. For information about expressions, see the documentation that describes how to configure logging.

Value— Log filter
Default— The default value is different for each type of component.
Editing Level—Basic

`filename` *`filename`*— Absolute path of the filename that contains the current logs.

Note: Make sure that the user under which the J2EE application server or Web application server runs has write access to this folder. If this user does not have write access to the default folder, configure the component or application to write logs in folders to which the user has write access.

Value— Filename
Default— By default, SRC components and applications write log files in the folder in which the component or application is started.
Editing Level—Basic

`rollover-filename` *`rollover-filename`*—(Optional) Absolute path of the filename that contains the log history. When the log file reaches the maximum size, the software closes the log file and renames it with the name you specify for the rollover file. If a previous rollover file exists, the software overwrites it. The software then reopens the log file and continues to save event messages in it.

Value— Path of filename

Example—/opt/UMC/sae/var/log/sae.alt

Default— The default value is different for each type of component.
Editing Level—Normal

`maximum-file-size` *`maximum-file-size`*—(Optional) Maximum size of the log file and the rollover file.

Do not set the maximum file size to a value greater than the available disk space.

Value—Integer in the range 0–2147483647 kbytes
Default— 1000000
Editing Level—Normal

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* external-subscriber-monitor logger *name* syslog

Syntax

```
slot number external-subscriber-monitor logger name syslog {
     filter filter;
     host host;
     facility facility;
     format format;
}
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor logger name syslog]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure the logging destination for syslog-based logging.

`filter` *`filter`*—(Optional) Filter to define which event messages the software logs or ignores. Filters can specify the logging level, such as debug, or can specify expressions. For information about expressions, see the documentation that describes how to configure logging.

Value— Log filter
Default— The default value is different for each type of component.
Editing Level—Basic

`host` *`host`*— IP address or name of a host that collects event messages by means of a standard system logging daemon.

Value— IP address or hostname
Default—loghost
Editing Level—Basic

`facility` *`facility`*—(Optional) Type of system log in accordance with the system logging protocol.

Value—Integer in the range 0–23
Default— 3

Editing Level—Advanced

`format` *`format`*—(Optional) MessageFormat string that specifies how the information in an event message is printed. (The strings {#} are replaced with the log information [...]).

Value— MessageFormat string as specified in http://java.sun.com/j2se/1.4.2/docs/api/java/text/MessageFormat.html.

The fields available for events are:

- 0—Time and date of the event
- 1—Name of the thread generating the event
- 2—Text message of the event
- 3—Category of the event
- 4—Priority of the event

Editing Level—Advanced

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* external-subscriber-monitor nic-proxy-configuration radius-accounting-nic cache

Syntax

```
slot number external-subscriber-monitor nic-proxy-configuration radius-accounting-
nic cache {
     cache-size cache-size;
     cache-cleanup-interval cache-cleanup-interval;
     cache-entry-age cache-entry-age;
}
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor nic-proxy-configuration radius-
accounting-nic cache]
```

Description

Configure the NIC Proxy cache properties. You can modify cache properties for the NIC proxy to optimize the resolution performance for your network configuration and system resources. Typically, you can use the default settings for the cache properties.

`cache-size` *`cache-size`*—(Optional) Maximum size of the cache in which the NIC proxy retains data. If you decrease the cache size or disable the cache while the NIC proxy is running, the NIC proxy removes entries in order of descending age until the cache size meets the new limit.

Value— Integer in the range 0–2147483647
Default—10000
Editing Level—Advanced

`cache-cleanup-interval` *`cache-cleanup-interval`*— Time interval at which the NIC proxy removes expired entries from its cache.

Value— Number of seconds in the range 5–2147483
Default—15
Editing Level—Advanced

`cache-entry-age` *`cache-entry-age`*—(Optional) Maximum time that the NIC proxy can cache an entry. The NIC proxy compares this property with the life expectancy of each entry and uses the lower value to determine when to remove the entry.

Value— Number of seconds in the range 0–4294967295

- 0 or unspecified—Life expectancy of the data, which determines expiration of data
- Other values—Actual time that the NIC proxy caches entries

Editing Level—Advanced

Required Privilege Level

No specific privilege required.

Required Editing Level

Advanced

slot *number* external-subscriber-monitor nic-proxy-configuration radius-accounting-nic nic-host-selection

Syntax

```
slot number external-subscriber-monitor nic-proxy-configuration radius-accounting-
nic nic-host-selection {
     groups [groups...];
     selection-criteria (roundRobin | randomPick | priorityList);
}
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor nic-proxy-configuration radius-
accounting-nic nic-host-selection]
```

Description

Configure the mechanism that a NIC proxy uses to select NIC system if multiple systems are available. You use NIC host selection when you use NIC replication.

`groups [groups...]`—(Optional) List of groups of NIC hosts that the NIC proxy can contact for resolution requests.

Value— Names of groups.
Default— No value
Editing Level—Advanced

`selection-criteria (roundRobin | randomPick | priorityList)`— Selection criteria that the NIC proxy uses to determine which NIC host to contact. Configure selection criteria if you configure more than one group.

Value— One of the following criteria:

- roundRobin—NIC proxy selects NIC hosts in a fixed, cyclic order. The NIC proxy always selects the next host in the list.
- randomPick—NIC proxy selects NIC hosts randomly from the list.
- priorityList—NIC proxy selects NIC hosts according to their assigned priorities in the list. If the host with the highest priority in the list is not available, the NIC proxy tries the host with the next-highest priority, and so on.

Use round-robin or random pick to distribute resolution requests among NIC hosts. Use priority list if you prefer to use a particular NIC host; for example, you may reduce operating cost by using a local NIC host.
Default—roundRobin

Editing Level—Advanced

Required Privilege Level

No specific privilege required.

Required Editing Level

Advanced

slot *number* external-subscriber-monitor nic-proxy-configuration radius-accounting-nic nic-host-selection blacklisting

Syntax

```
slot number external-subscriber-monitor nic-proxy-configuration radius-accounting-
nic nic-host-selection blacklisting {
     try-next-system-on-error;
     number-of-retries-before-blacklisting number-of-retries-before-blacklisting;
     blacklist-retry-interval blacklist-retry-interval;
}
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor nic-proxy-configuration radius-
accounting-nic nic-host-selection blacklisting]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure how to handle nonresponsive NIC hosts. When a NIC host does not respond, it is blacklisted which means that other NIC hosts are contacted until the blacklisted host becomes available again.

Options

`try-next-system-on-error`—(Optional) Specifies whether or not the NIC proxy should contact the next specified NIC host if a NIC host is determined to be unavailable. Configure this property only if you configure more than one group.

Default—true
Editing Level—Advanced

`number-of-retries-before-blacklisting` *`number-of-retries-before-blacklisting`*— Number of times the NIC proxy tries to communicate with a NIC host before the NIC proxy stops communicating with the NIC host for a period of time.

Value—Integer in the range 0–2147483647
Default—3
Editing Level—Advanced

`blacklist-retry-interval` *`blacklist-retry-interval`*— Interval at which the NIC proxy attempts to connect to an unavailable NIC host.

Value—Integer in the range 15–2147483647 s
Default—15
Editing Level—Advanced

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* external-subscriber-monitor nic-proxy-configuration radius-accounting-nic resolution

Syntax

```
slot number external-subscriber-monitor nic-proxy-configuration radius-accounting-
nic resolution {
     resolver-name resolver-name;
     constraints constraints;
}
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor nic-proxy-configuration radius-
accounting-nic resolution]
```

Description

Configure properties for a NIC proxy (NIC locator), the NIC component that requests information on behalf of an application.

`resolver-name` *`resolver-name`*— NIC resolver that the NIC proxy uses. This resolver must be the same as one that is configured on the NIC host.

Value— Path to the NIC resolver.

Example—/realms/ip/A1

Default— No value
Editing Level—Normal

`constraints` *`constraints`*—(Optional) Data type that a resolver uses during the resolution process. A constraint represents a condition that must or may be satisfied before the next stage of the resolution process can proceed.

Configure a constraint only if the constraint will be provided by the application in the resolution request. Typically, you do not need to configure constraints.

Value— Data types of constraints specified for the NIC resolution. Separate data types with commas.
Default— No value
Editing Level—Advanced

Required Privilege Level

No specific privilege required.

Required Editing Level

Normal

slot *number* external-subscriber-monitor nic-proxy-configuration radius-authorization-nic cache

Syntax

```
slot number external-subscriber-monitor nic-proxy-configuration radius-
authorization-nic cache {
     cache-size cache-size;
     cache-cleanup-interval cache-cleanup-interval;
     cache-entry-age cache-entry-age;
}
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor nic-proxy-configuration radius-
authorization-nic cache]
```

Description

Configure the NIC Proxy cache properties. You can modify cache properties for the NIC proxy to optimize the resolution performance for your network configuration and system resources. Typically, you can use the default settings for the cache properties.

`cache-size` *`cache-size`*—(Optional) Maximum size of the cache in which the NIC proxy retains data. If you decrease the cache size or disable the cache while the NIC proxy is running, the NIC proxy removes entries in order of descending age until the cache size meets the new limit.

Value— Integer in the range 0–2147483647
Default—10000
Editing Level—Advanced

`cache-cleanup-interval` *`cache-cleanup-interval`*— Time interval at which the NIC proxy removes expired entries from its cache.

Value— Number of seconds in the range 5–2147483
Default—15
Editing Level—Advanced

`cache-entry-age` *`cache-entry-age`*—(Optional) Maximum time that the NIC proxy can cache an entry. The NIC proxy compares this property with the life expectancy of each entry and uses the lower value to determine when to remove the entry.

Value— Number of seconds in the range 0–4294967295

- 0 or unspecified—Life expectancy of the data, which determines expiration of data
- Other values—Actual time that the NIC proxy caches entries

Editing Level—Advanced

Required Privilege Level

No specific privilege required.

Required Editing Level

Advanced

slot *number* external-subscriber-monitor nic-proxy-configuration radius-authorization-nic nic-host-selection

Syntax

```
slot number external-subscriber-monitor nic-proxy-configuration radius-
authorization-nic nic-host-selection {
     groups [groups...];
     selection-criteria (roundRobin | randomPick | priorityList);
}
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor nic-proxy-configuration radius-
authorization-nic nic-host-selection]
```

Description

Configure the mechanism that a NIC proxy uses to select NIC system if multiple systems are available. You use NIC host selection when you use NIC replication.

`groups [groups...]`—(Optional) List of groups of NIC hosts that the NIC proxy can contact for resolution requests.

Value— Names of groups.
Default— No value
Editing Level—Advanced

`selection-criteria (roundRobin | randomPick | priorityList)`— Selection criteria that the NIC proxy uses to determine which NIC host to contact. Configure selection criteria if you configure more than one group.

Value— One of the following criteria:

- roundRobin—NIC proxy selects NIC hosts in a fixed, cyclic order. The NIC proxy always selects the next host in the list.
- randomPick—NIC proxy selects NIC hosts randomly from the list.
- priorityList—NIC proxy selects NIC hosts according to their assigned priorities in the list. If the host with the highest priority in the list is not available, the NIC proxy tries the host with the next-highest priority, and so on.

Use round-robin or random pick to distribute resolution requests among NIC hosts. Use priority list if you prefer to use a particular NIC host; for example, you may reduce operating cost by using a local NIC host.
Default—roundRobin

Editing Level—Advanced

Required Privilege Level

No specific privilege required.

Required Editing Level

Advanced

slot *number* external-subscriber-monitor nic-proxy-configuration radius-authorization-nic nic-host-selection blacklisting

Syntax

```
slot number external-subscriber-monitor nic-proxy-configuration radius-
authorization-nic nic-host-selection blacklisting {
     try-next-system-on-error;
     number-of-retries-before-blacklisting number-of-retries-before-blacklisting;
     blacklist-retry-interval blacklist-retry-interval;
}
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor nic-proxy-configuration radius-
authorization-nic nic-host-selection blacklisting]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure how to handle nonresponsive NIC hosts. When a NIC host does not respond, it is blacklisted which means that other NIC hosts are contacted until the blacklisted host becomes available again.

Options

`try-next-system-on-error`—(Optional) Specifies whether or not the NIC proxy should contact the next specified NIC host if a NIC host is determined to be unavailable. Configure this property only if you configure more than one group.

Default—true
Editing Level—Advanced

`number-of-retries-before-blacklisting` *`number-of-retries-before-blacklisting`*— Number of times the NIC proxy tries to communicate with a NIC host before the NIC proxy stops communicating with the NIC host for a period of time.

Value—Integer in the range 0–2147483647
Default—3
Editing Level—Advanced

`blacklist-retry-interval` *`blacklist-retry-interval`*— Interval at which the NIC proxy attempts to connect to an unavailable NIC host.

Value—Integer in the range 15–2147483647 s
Default—15
Editing Level—Advanced

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* external-subscriber-monitor nic-proxy-configuration radius-authorization-nic resolution

Syntax

```
slot number external-subscriber-monitor nic-proxy-configuration radius-
authorization-nic resolution {
     resolver-name resolver-name;
     constraints constraints;
}
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor nic-proxy-configuration radius-
authorization-nic resolution]
```

Description

Configure properties for a NIC proxy (NIC locator), the NIC component that requests information on behalf of an application.

`resolver-name` *`resolver-name`*— NIC resolver that the NIC proxy uses. This resolver must be the same as one that is configured on the NIC host.

Value— Path to the NIC resolver.

Example—/realms/ip/A1

Default— No value
Editing Level—Normal

`constraints` *`constraints`*—(Optional) Data type that a resolver uses during the resolution process. A constraint represents a condition that must or may be satisfied before the next stage of the resolution process can proceed.

Configure a constraint only if the constraint will be provided by the application in the resolution request. Typically, you do not need to configure constraints.

Value— Data types of constraints specified for the NIC resolution. Separate data types with commas.
Default— No value
Editing Level—Advanced

Required Privilege Level

No specific privilege required.

Required Editing Level

Normal

slot *number* external-subscriber-monitor radius-accounting

Syntax

```
slot number external-subscriber-monitor radius-accounting {
     port port;
     include-mac-address;
     include-interface-name;
     service-type (all | login | framed | callback-login | callback-framed |
outbound | administrative | nas-prompt | authenticate-only | callback-nas-prompt
| callback-check | callback-administrative);
     allow [allow...];
     deny [deny...];
     maximum-queue-length maximum-queue-length;
}
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor radius-accounting]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure the pseudo-RADIUS server. If not configured, no pseudo-RADIUS service is started.

Options

`port` *port*— Listening port for RADIUS accounting requests.

Value—Integer in the range 1–65535
Default— 1813
Editing Level—Normal

`include-mac-address`—(Optional) Specify whether the MAC address is included in the event notification.

NOTE: Do not configure if you are not extracting RADIUS attributes with the pseudo-RADIUS server.

Default— false
Editing Level—Normal

`include-interface-name`—(Optional) Specify whether the interface name is included in the event notification.

NOTE: Do not configure if you are not extracting RADIUS attributes with the pseudo-RADIUS server.

Default— false
Editing Level—Normal

`service-type (all | login | framed | callback-login | callback-framed | outbound | administrative | nas-prompt | authenticate-only | callback-nas-prompt | callback-check | callback-administrative)`—(Optional) Service type of RADIUS packets that will be forwarded.

Value

- `all`— Forward all packets
- `login`— Forward packets with type of Login
- `framed`— Forward packets with type of Framed
- `callback-login`— Forward packets with type of Callback Login
- `callback-framed`— Forward packets with type of Callback Framed
- `outbound`— Forward packets with type of Outbound
- `administrative`— Forward packets with type of Administrative
- `nas-prompt`— Forward packets with type of NAS Prompt
- `authenticate-only`— Forward packets with type of Authenticate Only
- `callback-nas-prompt`— Forward packets with type of Callback NAS Prompt
- `callback-check`— Forward packets with type of Callback Check
- `callback-administrative`— Forward packets with type of Callback Administrative

Default— framed
Editing Level—Advanced

`allow [`*`allow...`*`]`—(Optional) List of hosts that filters which packets are forwarded. If both the allow and deny lists are empty, forward all packets. If the allow list has entries and the deny list is empty, forward packets from the listed hosts and ignore all others. If the allow list is empty and the deny list has entries, forward all packets except those from the listed hosts in the deny list. If both the allow and deny lists have entries, forward packets from the listed hosts in the allow list and ignore the deny list entries.

Value— Entries are delimited by spaces in the format ID = < regular expression > or IP = < regular expression >

Example—allow = ID = C2000.*

Default— Empty list
Editing Level—Advanced

deny [*deny...*]—(Optional) List of hosts that filters which packets are forwarded. If both the allow and deny lists are empty, forward all packets. If the allow list has entries and the deny list is empty, forward packets from the listed hosts and ignore all others. If the allow list is empty and the deny list has entries, forward all packets except those from the listed hosts in the deny list. If both the allow and deny lists have entries, forward packets from the listed hosts in the allow list and ignore the deny list entries.

Value— Entries are delimited by spaces in the format ID = < regular expression > or IP = < regular expression >

Example—deny = ID = SAE.*

Default— Empty list
Editing Level—Advanced

maximum-queue-length *maximum-queue-length*— Maximum number of unacknowledged RADIUS messages received from the RADIUS server before it discards new messages. 0 or negative number means infinite number of messages are allowed.

Value— Integer in the range 0–2147483647
Default— 10000
Editing Level—Normal

Required Privilege Level

No specific privilege required.

Required Editing Level

Normal

slot *number* external-subscriber-monitor radius-accounting client

Syntax

```
slot number external-subscriber-monitor radius-accounting client client-address {
     secret secret;
}
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor radius-accounting client]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure the shared secret between the RADIUS server and its clients.

Options

`client-address` *`client-address`*— Address of the specific RADIUS client.

Value— Address in dot format. Currently, only IPv4 addresses are supported.

`secret` *`secret`*— Shared secret of a specific RADIUS client.

Value—Secret text
Editing Level—Basic

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* external-subscriber-monitor radius-attribute-extraction default interface-name

Syntax

```
slot number external-subscriber-monitor radius-attribute-
extraction default interface-name {
     regular-expression [regular-expression...];
}
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor radius-attribute-
extraction default interface-name]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure the interface name attribute value extraction. By default, the interface-name attribute value is extracted from standard RADIUS attribute id = 87(RADIUS, 87) with RADIUS attribute type of chars.

`regular-expression [regular-expression...]`—(Optional) The regular expression of the radius attribute, A multi-value can be specified. If no regular expression is specified, the whole value would be considered the valid value; if any regular expression is present, Only the first group of regular expression is considered the valid value. Note that if type is raw-byte, the regular expression should be described hexadecimal format

Value—Text
Default— None
Editing Level—Basic

Required Privilege Level

No specific privilege required.

Required Editing Level

Normal

slot *number* external-subscriber-monitor radius-attribute-extraction default virtual-router-name

Syntax

```
slot number external-subscriber-monitor radius-attribute-
extraction default virtual-router-name {
     id id;
     vsa;
     vsa-id vsa-id;
     regular-expression [regular-expression...];
     type (raw-byte | chars);
     prefix prefix;
}
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor radius-attribute-
extraction default virtual-router-name]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure the virtual router name attribute value extraction.

`id` *`id`*— Specifies radius attribute id

Value—Integer in the range 0–2147483647
Editing Level—Basic

`vsa`—(Optional) Indicate if this attribute is vendor specific

Default— false
Editing Level—Basic

`vsa-id` *`vsa-id`*—(Optional) Specifies radius vendor speicific identifer

Value—Integer in the range 0–2147483647
Editing Level—Basic

`regular-expression [`*`regular-expression`*`...]`—(Optional) The regular expression of the radius attribute, A multi-value can be specified. If no regular expression is specified, the whole value would be considered the valid value; if any regular expression is present, Only the first group of regular expression is considered the valid value. Note that if type is raw-byte, the regular expression should be described hexadecimal format

Value—Text
Default— None
Editing Level—Basic

`type (raw-byte | chars)`—(Optional) The value type of this radius attribute. Currently only supports two type: 'r' (raw bytes) and 's' (string). By default, the type is raw type,'r'

Value

- `raw-byte`— Set type as raw byte
- `chars`— Set type as a sequence of characters

Default— r
Editing Level—Basic

`prefix` *`prefix`*—(Optional) The prefix that is to be appended to radius attribute's value.

Value—Text
Default— None
Editing Level—Basic

Required Privilege Level

No specific privilege required.

Required Editing Level

Normal

slot *number* external-subscriber-monitor radius-authorization

Syntax

```
slot number external-subscriber-monitor radius-authorization {
     port port;
     local-address local-address;
     check-lease-limit-with-sae;
     query-cached-dhcp-profile;
     default-lease-limit default-lease-limit;
     invalid-pool-name invalid-pool-name;
     lease-time-limit lease-time-limit;
     cleanup-interval cleanup-interval;
     maximum-age maximum-age;
     minimum-pool-size minimum-pool-size;
     maximum-queue-length maximum-queue-length;
     service-type (all | login | framed | callback-login | callback-framed |
outbound | administrative | nas-prompt | authenticate-only | callback-nas-prompt
| callback-check | callback-administrative);
}
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor radius-authorization]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure the Pseudo-RADIUS authorization server.

Options

`port` *`port`*— Listening port for RADIUS access requests.

Value—Integer in the range 1–65535
Default— 1812
Editing Level—Normal

`local-address` *`local-address`*—(Optional) Address to bind to pseudo-RADIUS authorization server. Absence of this attribute means binding the server to a wildcard (*) address. Currently, only IPV4 addresses are supported.

Value—Text
Editing Level—Advanced

`check-lease-limit-with-sae`—(Optional) Specify whether to query the SAE for the number of active subscribers for a given interface. If set to true, the response to the RADIUS access request depends on the comparison between the number of actve subscriber sessions and the lease limit for the interface. If the number of active subscriber sessions is less than the lease limit, the response is RADIUS access accept message without the lease limit RADIUS attribute; otherwise, the response is RADIUS access deny message. If set to false, the response is RADIUS access accept message with the lease limit RADIUS attribute.

Default— false
Editing Level—Normal

`query-cached-dhcp-profile`—(Optional) Specify whether to search for a cached DHCP profile in the o = AuthCache directory based on the MAC address.

If set to true, you must configure a directory connection to the cached DHCP profiles and the following conditions apply:

- If a cached DHCP profile is found, the RADIUS response message includes the RADIUS attributes for framed IP address, pool name, service bundle, and RADIUS class attributes.
- If the check-lease-limit-with-sae option is set to true and the number of active subscriber sessions is less than the lease limit, the RADIUS access accept message includes the cached DHCP profile.
- If the check-lease-limit-with-sae option is set to false, the RADIUS response always includes the cached DHCP profile.

If set to false, the cached DHCP profile information is not included in the RADIUS response.

Default— false
Editing Level—Normal

`default-lease-limit` *`default-lease-limit`*—(Optional) Default lease limit for all interfaces.

Value—Integer in the range -2147483648–2147483647
Default—1
Editing Level—Normal

`invalid-pool-name` *`invalid-pool-name`*—(Optional) Invalid pool name returned when number of active subscriber sessions exceeds the lease limit.

Value— None empty pool name
Editing Level—Normal

`lease-time-limit` *`lease-time-limit`*—(Optional) Timeout of a cached authenticated request.

Value—Integer in the range 1–9223372036854775807 ms
Default— 60000
Editing Level—Advanced

`cleanup-interval` *`cleanup-interval`*—(Optional) Time to wait before cleaning up cached RADIUS access requests that have been authenticated or accepted.

Value—Integer in the range 1–9223372036854775807 ms
Default— 3600000
Editing Level—Advanced

`maximum-age` *`maximum-age`*—(Optional) Maximum age of an unacknowledged request packet cached in memory. We recommend a value slightly greater than the RADIUS packet retry interval.

Value—Integer in the range 1–9223372036854775807 ms
Default— 60000
Editing Level—Basic

`minimum-pool-size` *`minimum-pool-size`*—(Optional) Number of concurrent threads processing RADIUS messages subtasks.

Value—Integer in the range 1–2147483647
Default— 8
Editing Level—Basic

`maximum-queue-length` *`maximum-queue-length`*— Maximum number of unacknowledged RADIUS messages received from the RADIUS server before it discards new messages. 0 or negative number means infinite number of messages are allowed.

Value— Integer in the range 0–2147483647
Default— 10000
Editing Level—Normal

`service-type (all | login | framed | callback-login | callback-framed | outbound | administrative | nas-prompt | authenticate-only | callback-nas-prompt | callback-check | callback-administrative)`—(Optional) Service type of RADIUS packets that will be forwarded.

Value

- `all`— Forward all packets
- `login`— Forward packets with type of Login
- `framed`— Forward packets with type of Framed
- `callback-login`— Forward packets with type of Callback Login
- `callback-framed`— Forward packets with type of Callback Framed
- `outbound`— Forward packets with type of Outbound
- `administrative`— Forward packets with type of Administrative
- `nas-prompt`— Forward packets with type of NAS Prompt
- `authenticate-only`— Forward packets with type of Authenticate Only
- `callback-nas-prompt`— Forward packets with type of Callback NAS Prompt
- `callback-check`— Forward packets with type of Callback Check
- `callback-administrative`— Forward packets with type of Callback Administrative

Default— framed
Editing Level—Advanced

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* external-subscriber-monitor radius-authorization client

Syntax

```
slot number external-subscriber-monitor radius-authorization client client-
address {
     secret secret;
}
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor radius-authorization client]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure the shared secret between the RADIUS server and its clients.

Options

`client-address` *`client-address`*— Address of the specific RADIUS client.

Value— Address in dot format. Currently, only IPv4 addresses are supported.

`secret` *`secret`*— Shared secret of a specific RADIUS client.

Value—Secret text
Editing Level—Basic

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* external-subscriber-monitor radius-authorization ldap cached-dhcp-profile

Syntax

```
slot number external-subscriber-monitor radius-authorization ldap cached-dhcp-
profile {
     base base;
     base-dn base-dn;
}
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor radius-authorization ldap cached-
dhcp-profile]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure the connection to the directory in which the cached DHCP profile data is stored.

Options

`base` *`base`*—(Optional) Top level or base or directory DN

Value— DN. You can use < base > to refer to the globally configured base DN. The string < base > is replaced with the directory base DN.
Default— < base >
Editing Level—Advanced

`base-dn` *`base-dn`*—(Optional) Subtree in the directory in which authCache profile data is stored.

Value— DN. You can use < base > to refer to the globally configured base DN. The string < base > is replaced with the directory base DN.
Default— o = authCache, < base >
Editing Level—Normal

Required Privilege Level

No specific privilege required.

Required Editing Level

Normal

slot *number* external-subscriber-monitor radius-authorization ldap cached-dhcp-profile directory-connection

Syntax

```
slot number external-subscriber-monitor radius-authorization ldap cached-dhcp-
profile directory-connection {
     url url;
     principal principal;
     credentials credentials;
     protocol (ldaps);
     backup-urls [backup-urls...];
     timeout timeout;
     check-interval check-interval;
     blacklist;
     snmp-agent;
     signature-dn signature-dn;
}
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor radius-authorization ldap cached-
dhcp-profile directory-connection]
```

Description

Configure properties for the directory connection.

Options

`url url`—(Optional) URL that identifies the location of the primary directory server.

Value— URL
Default—ldap://127.0.0.1:389
Editing Level—Basic

`principal principal`— DN that the SRC component uses for authentication to access the directory.

Value— DN.

When you specify the DN, you can use < base > to indicate the base DN.

Editing Level—Basic

`credentials` *`credentials`*— Password with which the SRC component accesses the directory.

Value— Password
Editing Level—Basic

`protocol (ldaps)`—(Optional) Security protocol used to connect to the directory. If you do not configure a security protocol, plain socket is used.

Value

- `ldaps`— LDAPS which uses SSL.

Editing Level—Expert

`backup-urls [`*`backup-urls`*`...]`—(Optional) URLs that identify the locations of backup directory servers. Backup servers are used if the primary directory server is not accessible.

Value— List of URLs
Editing Level—Basic

`timeout` *`timeout`*—(Optional) Maximum amount of time during which the directory must respond to a connection request.

Value—Integer in the range 1–2147483647 s
Default—10
Editing Level—Expert

`check-interval` *`check-interval`*—(Optional) Time interval at which the directory monitoring system verifies its connection to the directory. If the directory connection fails after this interval, the directory monitoring system initiates a connection to another directory.

Value—Integer in the range 15–2147483647 s
Default—60
Editing Level—Expert

`blacklist`—(Optional) Specifies whether the directory monitoring system prevents connection to a directory if the directory fails to respond during 10 polling intervals.

Default—false
Editing Level—Basic

`snmp-agent`—(Optional) Enable the SRC SNMP agent to export MIBs for this directory connection.

Default—false
Editing Level—Expert

`signature-dn` *`signature-dn`*—(Optional) DN of the directory entry that specifies the usedDirectory attribute for the SRC CLI. The usedDirectory attribute identifies the vendor of the directory server.

Value— DN
Default—o = umc
Editing Level—Expert

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* external-subscriber-monitor radius-authorization ldap subscriber-data

Syntax

```
slot number external-subscriber-monitor radius-authorization ldap subscriber-data
{
     base base;
     base-dn base-dn;
}
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor radius-
authorization ldap subscriber-data]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure the connection to the directory in which subscriber data is stored.

Options

`base` *`base`*—(Optional) Top level or base or directory DN.

Value— DN. You can use < base > to refer to the globally configured base DN. The string < base > is replaced with the directory base DN.
Default— < base >
Editing Level—Advanced

`base-dn` *`base-dn`*—(Optional) Subtree in the directory in which subscriber data is stored.

Value— DN. You can use < base > to refer to the globally configured base DN. The string < base > is replaced with the directory base DN.
Default— o = Users, < base >
Editing Level—Normal

Required Privilege Level

No specific privilege required.

Required Editing Level

Normal

slot *number* external-subscriber-monitor radius-authorization ldap subscriber-data directory-connection

Syntax

```
slot number external-subscriber-monitor radius-authorization ldap subscriber-
data directory-connection {
     url url;
     principal principal;
     credentials credentials;
     protocol (ldaps);
     backup-urls [backup-urls...];
     timeout timeout;
     check-interval check-interval;
     blacklist;
     snmp-agent;
     signature-dn signature-dn;
}
```

Hierarchy Level

```
[edit slot number external-subscriber-monitor radius-
authorization ldap subscriber-data directory-connection]
```

Description

Configure properties for the directory connection.

Options

`url url`—(Optional) URL that identifies the location of the primary directory server.

Value— URL
Default—ldap://127.0.0.1:389
Editing Level—Basic

`principal principal`— DN that the SRC component uses for authentication to access the directory.

Value— DN.

When you specify the DN, you can use < base > to indicate the base DN.

Editing Level—Basic

`credentials` *`credentials`*— Password with which the SRC component accesses the directory.

Value— Password
Editing Level—Basic

`protocol (ldaps)`—(Optional) Security protocol used to connect to the directory. If you do not configure a security protocol, plain socket is used.

Value

- `ldaps`— LDAPS which uses SSL.

Editing Level—Expert

`backup-urls [`*`backup-urls`*`...]`—(Optional) URLs that identify the locations of backup directory servers. Backup servers are used if the primary directory server is not accessible.

Value— List of URLs
Editing Level—Basic

`timeout` *`timeout`*—(Optional) Maximum amount of time during which the directory must respond to a connection request.

Value—Integer in the range 1–2147483647 s
Default—10
Editing Level—Expert

`check-interval` *`check-interval`*—(Optional) Time interval at which the directory monitoring system verifies its connection to the directory. If the directory connection fails after this interval, the directory monitoring system initiates a connection to another directory.

Value—Integer in the range 15–2147483647 s
Default—60
Editing Level—Expert

`blacklist`—(Optional) Specifies whether the directory monitoring system prevents connection to a directory if the directory fails to respond during 10 polling intervals.

Default—false
Editing Level—Basic

`snmp-agent`—(Optional) Enable the SRC SNMP agent to export MIBs for this directory connection.

Default—false
Editing Level—Expert

`signature-dn` *`signature-dn`*—(Optional) DN of the directory entry that specifies the usedDirectory attribute for the SRC CLI. The usedDirectory attribute identifies the vendor of the directory server.

Value— DN
Default—o = umc
Editing Level—Expert

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

monitor external-subscriber-monitor event-notifications

Syntax

```
monitor external-subscriber-monitor event-notifications
```

Release Information

Command introduced in SRC Release 3.1.0

Description

Display real-time statistics about event notifications, including the number of ipUp and ipDown notifications sent.

Required Privilege Level

view

monitor external-subscriber-monitor radius-accounting

Syntax

`monitor external-subscriber-monitor radius-accounting client-address` *`client-address`*

Release Information

Command introduced in SRC Release 3.1.0

Description

Display real-time RADIUS accounting statistics for External Subscriber Monitor.

Options

`client-address` *`client-address`*— IP address of RADIUS client to monitor.

Value—Text

Required Privilege Level

view

monitor external-subscriber-monitor radius-authorization

Syntax

`monitor external-subscriber-monitor radius-authorization client-address` *`client-address`*

Release Information

Command introduced in SRC Release 3.1.0

Description

Display real-time RADIUS authorization statistics for External Subscriber Monitor.

Options

`client-address` *`client-address`*— IP address of RADIUS client to monitor.

Value—Text

Required Privilege Level

view

show external-subscriber-monitor statistics event-notifications

Syntax

```
show external-subscriber-monitor statistics event-notifications
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Display statistics about event notifications, including the number of ipUp and ipDown notifications sent.

Required Privilege Level

view

show external-subscriber-monitor statistics process

Syntax

```
show external-subscriber-monitor statistics process
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Display process information for External Subscriber Monitor, including up time and memory usage.

Required Privilege Level

view

show external-subscriber-monitor statistics radius-accounting

Syntax

```
show external-subscriber-monitor statistics radius-accounting <client-address
client-address> < (brief) >
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Display RADIUS accounting statistics for External Subscriber Monitor.

Options

`client-address` *`client-address`*—(Optional) IP address of a RADIUS accounting client. If you do not specify a valid client address, statistics for all clients are displayed.

Value—Text
Default— No value

(Optional) Output style

Value

- `brief`— Display only total number of RADIUS packets sent or received.

Default— Detail

Required Privilege Level

view

show external-subscriber-monitor statistics radius-authorization

Syntax

```
show external-subscriber-monitor statistics radius-authorization <client-address
client-address> < (brief) >
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Display RADIUS authorization statistics for External Subscriber Monitor.

Options

`client-address` *`client-address`*—(Optional) IP address of a RADIUS authorization client. If you do not specify a valid client address, statistics for all clients are displayed.

Value—Text
Default— No value

(Optional) Output style

Value

- `brief`— Display only total number of RADIUS packets sent or received.

Default— Detail

Required Privilege Level

view

Dynamic Service Activator

The following table summarizes the SRC command-line interface (SRC CLI) for providing Dynamic Service Activator. Configuration statements and operational commands are listed in alphabetical order.

Dynamic Service Activator
Configuration Statements
shared_dsa_configuration
shared_dsa_configuration_client
shared_dsa_configuration_client_name_application
shared_dsa_configuration_client_name_application_application-id_event-subscription
shared_dsa_configuration_client_name_permissions
shared_dsa_configuration_client_name_permissions_attributes
shared_dsa_configuration_client_name_permissions_method
shared_dsa_configuration_client_name_permissions_method_name_constraints
shared_dsa_configuration_client_name_permissions_script
shared_dsa_configuration_client_name_permissions_script_name_constraints
shared_dsa_configuration_logger
shared_dsa_configuration_logger_name_file
shared_dsa_configuration_logger_name_syslog
shared_dsa_configuration_method_allocate-resource_constraints
shared_dsa_configuration_method_commit-resources_constraints
shared_dsa_configuration_method_invoke-gateway-extension_constraints
shared_dsa_configuration_method_invoke-script_constraints
shared_dsa_configuration_method_query-available-services_constraints
shared_dsa_configuration_method_query-client-status_constraints
shared_dsa_configuration_method_query-contexts_constraints
shared_dsa_configuration_method_query-status_constraints

shared_dsa_configuration_method_release-network-resource_constraints
shared_dsa_configuration_method_release-resource_constraints
shared_dsa_configuration_method_release-resources_constraints
shared_dsa_configuration_method_reserve-network-resource_constraints
shared_dsa_configuration_method_subscriber-activate-service_constraints
shared_dsa_configuration_method_subscriber-deactivate-service_constraints
shared_dsa_configuration_method_subscriber-login_constraints
shared_dsa_configuration_method_subscriber-logout_constraints
shared_dsa_configuration_method_subscriber-modify-service_constraints
shared_dsa_configuration_method_subscriber-read-subscription_constraints
shared_dsa_configuration_method_subscribers-activate-service_constraints
shared_dsa_configuration_method_subscribers-deactivate-service_constraints
shared_dsa_configuration_method_subscribers-login_constraints
shared_dsa_configuration_method_subscribers-logout_constraints
shared_dsa_configuration_method_subscribers-modify-service_constraints
shared_dsa_configuration_method_subscribers-read_constraints
shared_dsa_configuration_method_subscribers-read-subscriber_constraints
shared_dsa_configuration_method_subscribers-read-subscription_constraints
shared_dsa_configuration_nic-proxy-configuration
shared_dsa_configuration_nic-proxy-configuration_name_cache
shared_dsa_configuration_nic-proxy-configuration_name_nic-host-selection
shared_dsa_configuration_nic-proxy-configuration_name_nic-host-selection_blacklisting
shared_dsa_configuration_nic-proxy-configuration_name_resolution
shared_dsa_configuration_nic-proxy-configuration_name_test-nic-bindings
shared_dsa_configuration_nic-proxy-configuration_name_test-nic-bindings_key-values
shared_dsa_configuration_script
shared_dsa_configuration_script_name_constraints

shared_dsa_configuration_session-handle
shared_dsa_configuration_subscriber-types
shared_dsa_configuration_video-policy-manager_service-map
shared_dsa_configuration_video-policy-manager_service-map_application
shared_dsa_configuration_video-policy-manager_service-map_application_name_media-type
shared_dsa_configuration_video-policy-manager_service-map_application_name_media-type (application | data | video | voice) content-type
shared_dsa_configuration_video-policy-manager_video-server
shared_dsa_group
slot_number_dsa
slot_number_dsa_deploy
slot_number_dsa_initial
slot_number_dsa_initial_directory-connection
slot_number_dsa_initial_directory-eventing
Operational Commands
monitor_dsa_nic-proxy
monitor_dsa_soap-operation
show_dsa_statistics_general
show_dsa_statistics_nic-proxy
show_dsa_statistics_soap-operation
test_dsa_dsa-service_environment_clear
test_dsa_dsa-service_environment_clear_client-id
test_dsa_dsa-service_environment_clear_client-password
test_dsa_dsa-service_environment_clear_host
test_dsa_dsa-service_environment_clear_port
test_dsa_dsa-service_environment_clear_subscriber-id
test_dsa_dsa-service_environment_clear_subscriber-password

test_dsa_dsa-service_environment_clear_subscriber-uri
test_dsa_dsa-service_environment_set
test_dsa_dsa-service_environment_set_subscriber-uri
test_dsa_dsa-service_environment_show
test_dsa_dsa-service_environment_show_client-id
test_dsa_dsa-service_environment_show_client-password
test_dsa_dsa-service_environment_show_host
test_dsa_dsa-service_environment_show_port
test_dsa_dsa-service_environment_show_subscriber-id
test_dsa_dsa-service_environment_show_subscriber-password
test_dsa_dsa-service_environment_show_subscriber-uri
test_dsa_dsa-service_invoke-gateway-extension
test_dsa_dsa-service_invoke-script
test_dsa_dsa-service_subscriber-activate-service
test_dsa_dsa-service_subscriber-deactivate-service
test_dsa_dsa-service_subscriber-login
test_dsa_dsa-service_subscriber-logout
test_dsa_dsa-service_subscriber-modify-service
test_dsa_dsa-service_subscriber-read-subscription
test_dsa_dsa-service_subscribers-activate-service
test_dsa_dsa-service_subscribers-deactivate-service
test_dsa_dsa-service_subscribers-login
test_dsa_dsa-service_subscribers-logout
test_dsa_dsa-service_subscribers-modify-service
test_dsa_dsa-service_subscribers-read
test_dsa_dsa-service_subscribers-read-subscriber
test_dsa_dsa-service_subscribers-read-subscription

test_dsa_dsa2-service_environment_clear
test_dsa_dsa2-service_environment_clear_client-id
test_dsa_dsa2-service_environment_clear_client-password
test_dsa_dsa-service_environment_clear_host
test_dsa_dsa-service_environment_clear_port
test_dsa_dsa2-service_environment_clear_subscriber-id
test_dsa_dsa2-service_environment_clear_subscriber-password
test_dsa_dsa2-service_environment_clear_subscriber-uri
test_dsa_dsa2-service_environment_set
test_dsa_dsa2-service_environment_set_subscriber-uri
test_dsa_dsa2-service_environment_show
test_dsa_dsa2-service_environment_show_client-id
test_dsa_dsa2-service_environment_show_client-password
test_dsa_dsa2-service_environment_show_host
test_dsa_dsa2-service_environment_show_port
test_dsa_dsa2-service_environment_show_subscriber-id
test_dsa_dsa2-service_environment_show_subscriber-password
test_dsa_dsa2-service_environment_show_subscriber-uri
test_dsa_dsa2-service_invoke-gateway-extension
test_dsa_dsa2-service_invoke-script
test_dsa_dsa2-service_subscriber-activate-service
test_dsa_dsa2-service_subscriber-deactivate-service
test_dsa_dsa2-service_subscriber-login
test_dsa_dsa2-service_subscriber-logout
test_dsa_dsa2-service_subscriber-modify-service
test_dsa_dsa2-service_subscriber-read-subscription
test_dsa_dsa2-service_subscribers-activate-service

test_dsa_dsa2-service_subscribers-deactivate-service
test_dsa_dsa2-service_subscribers-login
test_dsa_dsa2-service_subscribers-logout
test_dsa_dsa2-service_subscribers-modify-service
test_dsa_dsa2-service_subscribers-read
test_dsa_dsa2-service_subscribers-read-subscriber
test_dsa_dsa2-service_subscribers-read-subscription
test_dsa_on-demand-video-service_environment_clear
test_dsa_on-demand-video-service_environment_clear_client-id
test_dsa_on-demand-video-service_environment_clear_client-password
test_dsa_on-demand-video-service_environment_clear_host
test_dsa_on-demand-video-service_environment_clear_port
test_dsa_on-demand-video-service_environment_set
test_dsa_on-demand-video-service_environment_show
test_dsa_on-demand-video-service_environment_show_client-id
test_dsa_on-demand-video-service_environment_show_client-password
test_dsa_on-demand-video-service_environment_show_host
test_dsa_on-demand-video-service_environment_show_port
test_dsa_on-demand-video-service_query-client-status
test_dsa_on-demand-video-service_release-network-resources
test_dsa_on-demand-video-service_reserve-network-resource
test_dsa_pcmm-service_commit-resources
test_dsa_pcmm-service_environment_clear
test_dsa_pcmm-service_environment_clear_client-id
test_dsa_pcmm-service_environment_clear_client-password
test_dsa_pcmm-service_environment_clear_host
test_dsa_pcmm-service_environment_clear_port

test_dsa_pcmm-service_environment_clear_subscriber-address
test_dsa_pcmm-service_environment_clear_subscriber-uri
test_dsa_pcmm-service_environment_set
test_dsa_pcmm-service_environment_show
test_dsa_pcmm-service_environment_show_client-id
test_dsa_pcmm-service_environment_show_client-password
test_dsa_pcmm-service_environment_show_host
test_dsa_pcmm-service_environment_show_port
test_dsa_pcmm-service_environment_show_subscriber-address
test_dsa_pcmm-service_environment_show_subscriber-uri
test_dsa_pcmm-service_query-available-services
test_dsa_pcmm-service_query-contexts
test_dsa_pcmm-service_release-resources
test_dsa_personalized-video-service_allocate-resource
test_dsa_personalized-video-service_environment_clear
test_dsa_personalized-video-service_environment_clear_client-id
test_dsa_personalized-video-service_environment_clear_client-password
test_dsa_personalized-video-service_environment_clear_host
test_dsa_personalized-video-service_environment_clear_port
test_dsa_personalized-video-service_environment_set
test_dsa_personalized-video-service_environment_show
test_dsa_personalized-video-service_environment_show_client-id
test_dsa_personalized-video-service_environment_show_client-password
test_dsa_personalized-video-service_environment_show_host
test_dsa_personalized-video-service_environment_show_port
test_dsa_personalized-video-service_query-status
test_dsa_personalized-video-service_release-resource

shared dsa configuration

Syntax

```
shared dsa configuration {
     disable-soap-client-authentication;
     disable-access-control-mechanism;
}
```

Hierarchy Level

```
[edit shared dsa configuration]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure the general properties that determine the behavior of the application.

Options

`disable-soap-client-authentication`—(Optional) Disables security control for SOAP clients.

Default—true
Editing Level—Advanced

`disable-access-control-mechanism`—(Optional) Specify whether the access control mechanism is disabled.

Editing Level—Advanced

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration client

Syntax

```
shared dsa configuration client name {
     restricted;
}
```

Hierarchy Level

```
[edit shared dsa configuration client]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure the client.

Options

`name` *`name`*— Name of Dynamic Service Activator client. You must use a name that is configured on the Web application server for the user account.

Value—Text

`restricted`—(Optional) If set to true, restricts access to the client's own service session; otherwise, exposes all service sessions to the client.

Default—false
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration client *name* application

Syntax

```
shared dsa configuration client name application application-id {
     disabled;
     listener-url listener-url;
     http-id http-id;
     http-password http-password;
     jms-queue-size jms-queue-size;
}
```

Hierarchy Level

```
[edit shared dsa configuration client name application]
```

Release Information

Statement introduced in SRC Release 3.2.0

Description

Configure an external SOAP application to which Dynamic Service Activator may publish subscriber, service session, and interface events.

Options

`application-id` *`application-id`*— Identifier of an external SOAP application to which Dynamic Service Activator may publish subscriber, service session, and interface events.

Value—Text

`disabled`—(Optional) When set, disables the sending of events to this external SOAP application.

Default—false
Editing Level—Basic

`listener-url` *`listener-url`*— URL of the external SOAP application to which events are published.

Value—Text
Editing Level—Basic

`http-id` *`http-id`*—(Optional) Username that Dynamic Service Activator provides to the external SOAP application if HTTP authentication is required.

Value—Text
Editing Level—Basic

`http-password` *`http-password`*—(Optional) Password that Dynamic Service Activator provides to the external SOAP application if HTTP authentication is required.

Value—Secret text
Editing Level—Basic

`jms-queue-size` *`jms-queue-size`*—(Optional) Size of the queue that holds events received from the SAE but not yet published by SOAP. In the event of a failure, these events may be lost. If the queue is full, events from the SAE are rejected. The SAE's JMS adapter plug-in will write those rejected events to disk, and attempt to resend them periodically.

Value—Integer in the range 1–2147483647
Default— 1200 events
Editing Level—Advanced

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration client *name* application *application-id* event-subscription

Syntax

```
shared dsa configuration client name application application-id event-
subscription event-subscription-name {
     disabled;
     subject-id subject-id;
     public-interface-id public-interface-id;
     event-type-filter [(user-start | user-interim | user-stop | service-start |
service-interim | service-stop | interface-start | interface-interim | interface-
stop)...];
     service-name-filter [service-name-filter...];
     event-filter event-filter;
     attribute-names [attribute-names...];
}
```

Hierarchy Level

```
[edit shared dsa configuration client name application application-id event-
subscription]
```

Release Information

Statement introduced in SRC Release 3.2.0

Description

Defines a set of events (and the attributes in those events) that are published to the external SOAP application.

Options

`event-subscription-name` *`event-subscription-name`*— Arbitrary name used to distinguish this event subscription from others.

Value—Text

`disabled`—(Optional) When set, disables this event subscription.

Default—false
Editing Level—Basic

`subject-id` *`subject-id`*— Persistent identifier of the subscriber or interface for which subscriber, service session, or interface events are published. This event subscription causes only those events associated with the specified subscriber or interface to be forwarded to the external SOAP application.

Value—Text
Editing Level—Basic

`public-interface-id` *`public-interface-id`*—(Optional) For interface events only, the identifier that is published to the external SOAP application instead of the interface's actual name or alias (that is, instead of its subject ID). With this identifier, the network provider can hide network information from the external SOAP application. If not specified, the value of the subject ID is published to the external SOAP application in interface events.

Value—Text
Editing Level—Basic

`event-type-filter [(user-start | user-interim | user-stop | service-start | service-interim | service-stop | interface-start | interface-interim | interface-stop)...]`—(Optional) Types of events that Dynamic Service Activator may forward to the external SOAP application. If no event types are specified, all event types are allowed. Note that only subscriptions for subscriber and service session events may be created by calls to Dynamic Service Activator's SOAP interface.

Value

- `user-start`—User start events (such as login)
- `user-interim`—User interim events
- `user-stop`—User stop events (such as logout)
- `service-start`—Service session start events
- `service-interim`—Service session interim events
- `service-stop`—Service session stop events
- `interface-start`—Interface up events
- `interface-interim`—Interface interim events
- `interface-stop`—Interface down events

Editing Level—Basic

`service-name-filter [`*`service-name-filter`*`...]`—(Optional) Names of services for which Dynamic Service Activator may send service session events to the external SOAP application. If no service names are specified, events for all services are allowed.

Value—Text
Editing Level—Basic

`event-filter` *`event-filter`*—(Optional) LDAP-style filter that determines which SAE plug-in events Dynamic Service Activator may forward to the external SOAP application. It allows arbitrary constraints to be placed on arbitrary plug-in event attributes. If the event attributes do not satisfy the specified constraints, Dynamic Service Activator is not allowed to forward the event to the CSP application. If not specified, no constraints are applied.

Value—Text
Editing Level—Advanced

`attribute-names [`*`attribute-names`*`...]`—(Optional) Names of SAE plug-in event attributes that Dynamic Service Activator may forward to the external SOAP application. If no attribute names are specified, all attributes are forwarded.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration client *name* permissions

Syntax

```
shared dsa configuration client name permissions {
     pcmm-service [pcmm-service...];
}
```

Hierarchy Level

```
[edit shared dsa configuration client name permissions]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure the services available to the client.

Options

`pcmm-service [pcmm-service...]`—(Optional) PCMM services available to the client.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration client *name* permissions attributes

Syntax

```
shared dsa configuration client name permissions attributes {
     service [service...];
     subscription [subscription...];
     subscriber [subscriber...];
}
```

Hierarchy Level

```
[edit shared dsa configuration client name permissions attributes]
```

Release Information

Statement introduced in SRC Release 3.2.0

Description

Control attributes to which a gateway client has access. If you do not configure the client's access to attributes, all configured attributes are allowed.

Options

`service [service...]`—(Optional) Service attributes to which a gateway client has access. Set this value only if you want gateway clients to have restricted access to configured attributes. If you do not want to allow access to any of these attributes, set this value to `none`.

Value—Text
Editing Level—Basic

`subscription [subscription...]`—(Optional) Subscription attributes to which a gateway client has access. Set this value only if you want gateway clients to have restricted access to configured attributes. If you do not want to allow access to any of these attributes, set this value to `none`.

Value—Text
Editing Level—Basic

`subscriber [subscriber...]`—(Optional) Subscriber attributes to which a gateway client has access. Set this value only if you want gateway clients to have restricted access to configured attributes. If you do not want to allow access to any of these attributes, set this value to `none`.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration client *name* permissions method

Syntax

```
shared dsa configuration client name permissions method name ...
```

Hierarchy Level

```
[edit shared dsa configuration client name permissions method]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure client access to methods.

Options

`name` *`name`*— Name of the method.

Value—Text

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration client *name* permissions method *name* constraints

Syntax

```
shared dsa configuration client name permissions method name constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration client name permissions method name constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure the access constraints for this gateway client.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration client *name* permissions script

Syntax

```
shared dsa configuration client name permissions script name ...
```

Hierarchy Level

```
[edit shared dsa configuration client name permissions script]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure client access to scripts.

Options

`name` *name*— Name of the script.

Value—Text

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration client *name* permissions script *name* constraints

Syntax

```
shared dsa configuration client name permissions script name constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration client name permissions script name constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure the access constraints for this gateway client.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration logger

Syntax

```
shared dsa configuration logger name ...
```

Hierarchy Level

```
[edit shared dsa configuration logger]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Create a logging configuration for Dynamic Service Activator.

Options

`name` *name*— Name of the logging configuration.

Value—Text

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration logger *name* file

Syntax

```
shared dsa configuration logger name file {
     filter filter;
     filename filename;
     rollover-filename rollover-filename;
     maximum-file-size maximum-file-size;
}
```

Hierarchy Level

```
[edit shared dsa configuration logger name file]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure logging of messages to a file.

`filter` *`filter`*—(Optional) Filter to define which event messages the software logs or ignores. Filters can specify the logging level, such as debug, or can specify expressions. For information about expressions, see the documentation that describes how to configure logging.

Value— Log filter
Default— The default value is different for each type of component.
Editing Level—Basic

`filename` *`filename`*— Absolute path of the filename that contains the current logs.

Note: Make sure that the user under which the J2EE application server or Web application server runs has write access to this folder. If this user does not have write access to the default folder, configure the component or application to write logs in folders to which the user has write access.

Value— Filename
Default— No value
Editing Level—Basic

`rollover-filename` *`rollover-filename`*—(Optional) Absolute path of the filename that

contains the log history. When the log file reaches the maximum size, the software closes the log file and renames it with the name you specify for the rollover file. If a previous rollover file exists, the software overwrites it. The software then reopens the log file and continues to save event messages in it.

Value— Path of filename

Example—/opt/UMC/sae/var/log/sae.alt

Default— The default value is different for each type of component.
Editing Level—Normal

`maximum-file-size` *`maximum-file-size`*—(Optional) Maximum size of the log file and the rollover file.

Do not set the maximum file size to a value greater than the available disk space.

Value—Integer in the range 0–2147483647 kbytes
Default— 1000000
Editing Level—Normal

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration logger *name* syslog

Syntax

```
shared dsa configuration logger name syslog {
     filter filter;
     host host;
     facility facility;
     format format;
}
```

Hierarchy Level

```
[edit shared dsa configuration logger name syslog]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure logging of messages to system logging.

`filter` *`filter`*—(Optional) Filter to define which event messages the software logs or ignores. Filters can specify the logging level, such as debug, or can specify expressions. For information about expressions, see the documentation that describes how to configure logging.

Value— Log filter
Default—/error-
Editing Level—Basic

`host` *`host`*— IP address or name of a host that collects event messages by means of a standard system logging daemon.

Value— IP address or hostname
Default—loghost
Editing Level—Basic

`facility` *`facility`*—(Optional) Type of system log in accordance with the system logging protocol.

Value—Integer in the range 0–23
Default— 3

Editing Level—Advanced

`format` *`format`*—(Optional) MessageFormat string that specifies how the information in an event message is printed. (The strings {#} are replaced with the log information [...]).

Value— MessageFormat string as specified in http://java.sun.com/j2se/1.4.2/docs/api/java/text/MessageFormat.html.

The fields available for events are:

- 0—Time and date of the event
- 1—Name of the thread generating the event
- 2—Text message of the event
- 3—Category of the event
- 4—Priority of the event

Default— None
Editing Level—Advanced

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method allocate-resource constraints

Syntax

```
shared dsa configuration method allocate-resource constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method allocate-resource constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method commit-resources constraints

Syntax

```
shared dsa configuration method commit-resources constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method commit-resources constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method invoke-gateway-extension constraints

Syntax

```
shared dsa configuration method invoke-gateway-extension constraints argument-
index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method invoke-gateway-extension constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method invoke-script constraints

Syntax

```
shared dsa configuration method invoke-script constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method invoke-script constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method query-available-services constraints

Syntax

```
shared dsa configuration method query-available-services constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method query-available-services constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method query-client-status constraints

Syntax

```
shared dsa configuration method query-client-status constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method query-client-status constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method query-contexts constraints

Syntax

```
shared dsa configuration method query-contexts constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method query-contexts constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method query-status constraints

Syntax

```
shared dsa configuration method query-status constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method query-status constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method release-network-resource constraints

Syntax

```
shared dsa configuration method release-network-resource constraints argument-
index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method release-network-resource constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method release-resource constraints

Syntax

```
shared dsa configuration method release-resource constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method release-resource constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method release-resources constraints

Syntax

```
shared dsa configuration method release-resources constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method release-resources constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method reserve-network-resource constraints

Syntax

```
shared dsa configuration method reserve-network-resource constraints argument-
index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method reserve-network-resource constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method subscriber-activate-service constraints

Syntax

```
shared dsa configuration method subscriber-activate-service constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method subscriber-activate-service constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method subscriber-deactivate-service constraints

Syntax

```
shared dsa configuration method subscriber-deactivate-
service constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method subscriber-deactivate-service constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method subscriber-login constraints

Syntax

```
shared dsa configuration method subscriber-login constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method subscriber-login constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method subscriber-logout constraints

Syntax

```
shared dsa configuration method subscriber-logout constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method subscriber-logout constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method subscriber-modify-service constraints

Syntax

```
shared dsa configuration method subscriber-modify-service constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method subscriber-modify-service constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method subscriber-read-subscription constraints

Syntax

```
shared dsa configuration method subscriber-read-subscription constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method subscriber-read-subscription constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method subscribers-activate-service constraints

Syntax

```
shared dsa configuration method subscribers-activate-service constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method subscribers-activate-service constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method subscribers-deactivate-service constraints

Syntax

```
shared dsa configuration method subscribers-deactivate-
service constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method subscribers-deactivate-service constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method subscribers-login constraints

Syntax

```
shared dsa configuration method subscribers-login constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method subscribers-login constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method subscribers-logout constraints

Syntax

```
shared dsa configuration method subscribers-logout constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method subscribers-logout constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method subscribers-modify-service constraints

Syntax

```
shared dsa configuration method subscribers-modify-service constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method subscribers-modify-service constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method subscribers-read constraints

Syntax

```
shared dsa configuration method subscribers-read constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method subscribers-read constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method subscribers-read-subscriber constraints

Syntax

```
shared dsa configuration method subscribers-read-subscriber constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method subscribers-read-subscriber constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration method subscribers-read-subscription constraints

Syntax

```
shared dsa configuration method subscribers-read-
subscription constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration method subscribers-read-subscription constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the method for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration nic-proxy-configuration

Syntax

```
shared dsa configuration nic-proxy-configuration name {
}
```

Hierarchy Level

```
[edit shared dsa configuration nic-proxy-configuration]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure the NIC proxy.

Options

`name` *name*— Name of the NIC proxy configuration.

Value—Text

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration nic-proxy-configuration *name* cache

Syntax

```
shared dsa configuration nic-proxy-configuration name cache {
     cache-size cache-size;
     cache-cleanup-interval cache-cleanup-interval;
     cache-entry-age cache-entry-age;
}
```

Hierarchy Level

```
[edit shared dsa configuration nic-proxy-configuration name cache]
```

Description

Configure the NIC proxy cache properties. You can modify cache properties for the NIC proxy to optimize the resolution performance for your network configuration and system resources. Typically, you can use the default settings for the cache properties.

`cache-size` *`cache-size`*—(Optional) Maximum size of the cache in which the NIC proxy retains data. If you decrease the cache size or disable the cache while the NIC proxy is running, the NIC proxy removes entries in order of descending age until the cache size meets the new limit.

Value— Integer in the range 0–2147483647
Default—10000
Editing Level—Advanced

`cache-cleanup-interval` *`cache-cleanup-interval`*— Time interval at which the NIC proxy removes expired entries from its cache.

Value— Number of seconds in the range 5–2147483
Default—15
Editing Level—Advanced

`cache-entry-age` *`cache-entry-age`*—(Optional) Maximum time that the NIC proxy can cache an entry. The NIC proxy compares this property with the life expectancy of each entry and uses the lower value to determine when to remove the entry.

Value— Number of seconds in the range 0–4294967295

- 0 or unspecified—Life expectancy of the data, which determines expiration of data
- Other values—Actual time that the NIC proxy caches entries

Editing Level—Advanced

Required Privilege Level

system

Required Editing Level

Advanced

shared dsa configuration nic-proxy-configuration *name* nic-host-selection

Syntax

```
shared dsa configuration nic-proxy-configuration name nic-host-selection {
     groups [groups...];
     selection-criteria (roundRobin | randomPick | priorityList);
}
```

Hierarchy Level

```
[edit shared dsa configuration nic-proxy-configuration name nic-host-selection]
```

Description

Configure the mechanism that a NIC proxy uses to select NIC system if multiple systems are available. You use NIC host selection when you use NIC replication.

`groups [groups...]`—(Optional) List of groups of NIC hosts that the NIC proxy can contact for resolution requests.

Value— Names of groups.
Default— No value
Editing Level—Advanced

`selection-criteria (roundRobin | randomPick | priorityList)`— Selection criteria that the NIC proxy uses to determine which NIC host to contact. Configure selection criteria if you configure more than one group.

Value— One of the following criteria:

- roundRobin—NIC proxy selects NIC hosts in a fixed, cyclic order. The NIC proxy always selects the next host in the list.
- randomPick—NIC proxy selects NIC hosts randomly from the list.
- priorityList—NIC proxy selects NIC hosts according to their assigned priorities in the list. If the host with the highest priority in the list is not available, the NIC proxy tries the host with the next-highest priority, and so on.

Use round-robin or random pick to distribute resolution requests among NIC hosts. Use priority list if you prefer to use a particular NIC host; for example, you may reduce operating cost by using a local NIC host.
Default— roundRobin
Editing Level—Advanced

Required Privilege Level

system

Required Editing Level

Advanced

shared dsa configuration nic-proxy-configuration *name* nic-host-selection blacklisting

Syntax

```
shared dsa configuration nic-proxy-configuration name nic-host-
selection blacklisting {
     try-next-system-on-error;
     number-of-retries-before-blacklisting number-of-retries-before-blacklisting;
     blacklist-retry-interval blacklist-retry-interval;
}
```

Hierarchy Level

```
[edit shared dsa configuration nic-proxy-configuration name nic-host-
selection blacklisting]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure how to handle nonresponsive NIC hosts. When a NIC host does not respond, it is blacklisted which means that other NIC hosts are contacted until the blacklisted host becomes available again.

Options

`try-next-system-on-error`—(Optional) Specifies whether or not the NIC proxy should contact the next specified NIC host if a NIC host is determined to be unavailable. Configure this property only if you configure more than one group.

Default—true
Editing Level—Advanced

`number-of-retries-before-blacklisting` *`number-of-retries-before-blacklisting`*— Number of times the NIC proxy tries to communicate with a NIC host before the NIC proxy stops communicating with the NIC host for a period of time.

Value—Integer in the range 0–2147483647
Default—3
Editing Level—Advanced

`blacklist-retry-interval` *`blacklist-retry-interval`*— Interval at which the NIC

proxy attempts to connect to an unavailable NIC host.

Value—Integer in the range 15–2147483647 s
Default—15
Editing Level—Advanced

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration nic-proxy-configuration *name* resolution

Syntax

```
shared dsa configuration nic-proxy-configuration name resolution {
     resolver-name resolver-name;
     key-type key-type;
     value-type value-type;
     expect-multiple-values;
     constraints constraints;
}
```

Hierarchy Level

```
[edit shared dsa configuration nic-proxy-configuration name resolution]
```

Description

Configure properties for a NIC proxy (NIC locator), the NIC component that requests information on behalf of an application.

`resolver-name` *`resolver-name`*— NIC resolver that the NIC proxy uses. This resolver must be the same as one that is configured on the NIC host.

Value— Path to the NIC resolver.

Example—/realms/ip/A1,/realms/dn/A1.

Default— No value
Editing Level—Basic

`key-type` *`key-type`*— Type of data used that the key provides for the NIC resolution. You can provide a qualifier to a data type to distinguish between different instances of a data type in a resolution scenario, or to provide information about a data type to clarify the use of that data type in a resolution.

Value— One of the following types:

- Ip —Subscriber's IP address
- Vr—Virtual router
- Interface—Name of router's interface
- InterfaceId—Identifier of an interface on the router
- Dn—LDAP distinguished name for subscriber

- LoginName—Subscriber login ID
- AnyString—Other information

To qualify data types, enter a qualifier within parentheses.

Example—LoginName(username).

Default— No value
Editing Level—Basic

`value-type` *`value-type`*— Type of value to be returned in the resolution. The value type varies according to the application that uses the NIC proxy.

Value— One of the following types:

- SaeId—SAE server ID
- LoginName—Subscriber login ID
- AnyString—Other information

To qualify data types, enter a qualifier within parentheses.

Example—LoginName(username).

Default— No value
Editing Level—Basic

`expect-multiple-values`—(Optional) Specifies whether or not the key can have multiple corresponding values.

Editing Level—Basic

`constraints` *`constraints`*—(Optional) Data type that a resolver uses during the resolution process. A constraint represents a condition that must or may be satisfied before the next stage of the resolution process can proceed.

Configure a constraint only if the constraint will be provided by the application in the resolution request. Typically, you do not need to configure constraints.

Value— Data types of constraints specified for the NIC resolution. Separate data types with commas.
Default— No value
Editing Level—Advanced

Required Privilege Level

system

Required Editing Level

Normal

shared dsa configuration nic-proxy-configuration *name* test-nic-bindings

Syntax

```
shared dsa configuration nic-proxy-configuration name test-nic-bindings {
     use-test-bindings;
}
```

Hierarchy Level

```
[edit shared dsa configuration nic-proxy-configuration name test-nic-bindings]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure key-value mappings to be used to test a NIC resolution.

Options

`use-test-bindings`—(Optional) Test the NIC resolutions without having to configure or run a NIC host. The values returned are those configured in the key-values property.

Default—false
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration nic-proxy-configuration *name* test-nic-bindings key-values

Syntax

```
shared dsa configuration nic-proxy-configuration name test-nic-bindings key-
values name {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration nic-proxy-configuration name test-nic-bindings key-
values]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure keys and associated values to use for testing. Define all of values to be returned for specified keys.

Options

name *name*—

Value—Text

value—

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Advanced

shared dsa configuration script

Syntax

```
shared dsa configuration script name {
     sae-locator-index sae-locator-index;
}
```

Hierarchy Level

```
[edit shared dsa configuration script]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure a script for Dynamic Service Activator.

Options

`name` *`name`*— Name of Dynamic Service Activator script.

Value—Text

`sae-locator-index` *`sae-locator-index`*— The zero-based index of the script argument to be used to locate the SAE server on which to invoke the script.

Value—Integer in the range -2147483648–2147483647
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration script *name* constraints

Syntax

```
shared dsa configuration script name constraints argument-index {
     value;
}
```

Hierarchy Level

```
[edit shared dsa configuration script name constraints]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure access constraints for the script for all clients.

Options

`argument-index` *`argument-index`*— Zero-based index of the argument.

Value—Integer in the range 1–2147483647

`value`— Regular expression that the argument must match.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration session-handle

Syntax

```
shared dsa configuration session-handle {
     strong-encoding;
     encoding-key encoding-key;
}
```

Hierarchy Level

```
[edit shared dsa configuration session-handle]
```

Release Information

Statement introduced in SRC Release 3.2.0

Description

Configure client's session handle.

Options

`strong-encoding`—(Optional) Level of encoding used to encode a sessionHandle attribute to sessionUri. If set to true, a DES algorithm is used for encoding; otherwise, an exclusive-or algorithm is applied.

Default—false
Editing Level—Advanced

`encoding-key` *`encoding-key`*— Private key used for encoding a sessionHandle attribute to sessionUri.

Value—Text
Default—yS6RfY0t
Editing Level—Advanced

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration subscriber-types

Syntax

```
shared dsa configuration subscriber-types name {
     subscriber-id-type (address | dn | login-name | interface-name | interface-
index | address-interface-name | primary-user-name | session-handle | tunnel-
session | global-address | global-login-name);
     nic-proxy nic-proxy;
}
```

Hierarchy Level

```
[edit shared dsa configuration subscriber-types]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure the subscriber types.

Options

`name` *`name`*— Name of the subscriber type used to construct the subscriber URI.

Value—Text

`subscriber-id-type (address | dn | login-name | interface-name | interface-index | address-interface-name | primary-user-name | session-handle | tunnel-session | global-address | global-login-name)` — The subscriber ID type used to pass correct argument to the subscriber URI.

Value— One of the following types:

- address—Subscriber's IP address
- dn—Distinguished name of subscriber profile
- login-name—Subscriber's login name
- interface-name—Name of the interface and name of the virtual router to which the subscriber connects
- interface-index—SNMP index of the interface and name of the virtual router to which the subscriber connects
- address-interface-name—Subscriber's IP address, name of the managed interface, and name of the virtual router to which the subscriber connects

- primary-user-name—Primary username
- session-handle—Subscriber session handle
- tunnel-session—Subscriber's L2TP tunnel session identifier, tunnel identifier and IP of L2TP Access Concentrator
- global-address—Subscriber's IP address and VPN identifier
- global-login-name—Subscriber's login name and VPN identifier

Editing Level—Basic

`nic-proxy` *`nic-proxy`*— Configuration that contains the NIC proxy configuration properties for the subscriber type.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration video-policy-manager service-map

Syntax

```
shared dsa configuration video-policy-manager service-map {
     default-service default-service;
}
```

Hierarchy Level

```
[edit shared dsa configuration video-policy-manager service-map]
```

Release Information

Statement introduced in SRC Release 4.0.0

Description

Maps resource allocation requests to the SRC service name. If mapping is not defined, the default service is used.

Options

`default-service` *`default-service`*—(Optional) Default SRC service to use if mapping is not defined.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration video-policy-manager service-map application

Syntax

```
shared dsa configuration video-policy-manager service-map application name {
     use-request-value;
     default-service default-service;
}
```

Hierarchy Level

```
[edit shared dsa configuration video-policy-manager service-map application]
```

Release Information

Statement introduced in SRC Release 4.0.0

Description

Map resource allocation request for a specific application to SRC service.

Options

`name` *`name`*— Application name for personalized video service requests to map to SRC service name.

Value—Text

`use-request-value`—(Optional) If set, the value of the SOAP request is used for the SRC service name.

Default— Enabled
Editing Level—Basic

`default-service` *`default-service`*—(Optional) Default SRC service name that maps to the application. If no media type attribute is provided in the resource allocation request, this service is used.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration video-policy-manager service-map application *name* media-type

Syntax

```
shared dsa configuration video-policy-manager service-map application name media-
type (application | data | video | voice) {
     use-request-value;
     default-service default-service;
}
```

Hierarchy Level

```
[edit shared dsa configuration video-policy-manager service-
map application name media-type]
```

Release Information

Statement introduced in SRC Release 4.0.0

Description

Map resource allocation request for a specific media type to SRC service.

Options

Media type for personalized video service requests.

Value

- `application`— Application
- `data`— Data
- `video`— Video
- `voice`— Voice

`use-request-value`—(Optional) If set, the value of the SOAP request is used for the SRC service name.

Default— Enabled
Editing Level—Basic

`default-service` *`default-service`*—(Optional) Part of the SRC service name that maps

to the media type. If no content type attribute is provided in the resource allocation request, this service is used.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration video-policy-manager service-map application *name* media-type (application | data | video | voice) content-type

Syntax

```
shared dsa configuration video-policy-manager service-map application name media-
type (application | data | video | voice) content-type (hd | sd) {
     use-request-value;
     default-service default-service;
}
```

Hierarchy Level

```
[edit shared dsa configuration video-policy-manager service-
map application name media-type (application | data | video | voice) content-type]
```

Release Information

Statement introduced in SRC Release 4.0.0

Description

Map resource allocation request for a specific content type to SRC service.

Options

Content type for personalized video service requests. If specified, it is used as part of the service name.

Value

- `hd`— High definition
- `sd`— Standard definition

`use-request-value`—(Optional) If set, the value of the SOAP request is used for the SRC service name.

Default— Enabled
Editing Level—Basic

`default-service` *`default-service`*—(Optional) Part of the SRC service name that maps

to the content type. If specified, it is used as part of the SRC service name.

Value—Text
Default— No value
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa configuration video-policy-manager video-server

Syntax

```
shared dsa configuration video-policy-manager video-server name {
     type (seachange | tandberg);
     url url;
     software-version software-version;
     interface-version interface-version;
     interval interval;
     subscriber-type (address-subscriber | static-interface-subscriber);
     client-id client-id;
     client-password client-password;
}
```

Hierarchy Level

```
[edit shared dsa configuration video-policy-manager video-server]
```

Release Information

Statement introduced in SRC Release 4.0.0

Description

Configure the video server that is requesting resources using SOAP.

Options

`name` *name*— Name of the video server requesting resources.

Value—Text

`type (seachange | tandberg)`— Type of video server.

Value

- `seachange`— SeaChange video server for on-demand video service
- `tandberg`— Tandberg video server for personalized video service

Editing Level—Basic

`url` *`url`*— URL of the video server for synchronization requests.

Value—Text
Editing Level—Basic

`software-version` *`software-version`*—(Optional) Software version.

Value—Text
Editing Level—Basic

`interface-version` *`interface-version`*—(Optional) Interface version.

Value—Text
Editing Level—Basic

`interval` *`interval`*—(Optional) Interval for a synchronization request.

Value—Integer in the range -1–2147483647 s
Default— No value
Editing Level—Basic

`subscriber-type (address-subscriber | static-interface-subscriber)`—Subscriber type requesting resources; static interface or assigned IP.

Value

- `address-subscriber`— Assigned IP address subscriber
- `static-interface-subscriber`— Static interface name subscriber

Editing Level—Basic

`client-id` *`client-id`*—(Optional) Client ID for accessing the policy manager.

Value—Text
Editing Level—Basic

`client-password` *`client-password`*—(Optional) Password with which Dynamic Service Activator accesses the policy manager.

Value— Password

Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared dsa group

Syntax

```
shared dsa group name ...
```

Hierarchy Level

```
[edit shared dsa group]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure group of Dynamic Service Activator configuration properties.

Options

`name` *name*— Name of an SRC DSA configuration.

Value—Text

Required Privilege Level

system

Required Editing Level

Basic

slot *number* dsa

Syntax

```
slot number dsa {
     shared shared;
}
```

Hierarchy Level

```
[edit slot number dsa]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure local properties for Dynamic Service Activator.

Options

`shared` *`shared`*— The configuration namespace that contains the Dynamic Service Activator's configuration data. You cannot specify root (/).

Value—Text
Default—/sample
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

slot *number* dsa deploy

Syntax

```
slot number dsa deploy {
     virtual-host virtual-host;
}
```

Hierarchy Level

```
[edit slot number dsa deploy]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure the virtual host on which to deploy the application.

Options

`virtual-host` *`virtual-host`*—(Optional) The host to which the application is deployed.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

slot *number* dsa initial

Syntax

```
slot number dsa initial {
     base-dn base-dn;
     static-dn static-dn;
     dynamic-dn dynamic-dn;
}
```

Hierarchy Level

```
[edit slot number dsa initial]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure initial properties for SRC components.

Options

`base-dn` *`base-dn`*— DN of the root of the SDX data in the directory.

If you are storing non-SDX data in the directory, and that data changes frequently whereas the SDX data does not, you may need to adjust the default value to improve performance. For optimal performance, set the value to the DN of an entry superior to both the SDX data and the changing non-SDX data.

Value— DN
Default—o = UMC
Editing Level—Advanced

`static-dn` *`static-dn`*—(Optional) Location of administrator-defined configuration data in the directory.

Value—Text
Default—l = DynamicServiceActivation,l = WebApplication,
ou = staticConfiguration,ou = Configuration,o = Management, < base >
Editing Level—Expert

`dynamic-dn` *`dynamic-dn`*—(Optional) Location of programmatically-defined configuration

data in the directory.

Value—Text
Default—ou = dynamicConfiguration,ou = Configuration,o = Management,
< base >
Editing Level—Expert

Required Privilege Level

system

Required Editing Level

Basic

slot *number* dsa initial directory-connection

Syntax

```
slot number dsa initial directory-connection {
     url url;
     backup-urls [backup-urls...];
     principal principal;
     credentials credentials;
     protocol (ldaps);
     timeout timeout;
     check-interval check-interval;
     blacklist;
     snmp-agent;
}
```

Hierarchy Level

```
[edit slot number dsa initial directory-connection]
```

Description

Configure properties for the directory connection.

Options

`url` *`url`*—(Optional) URL that identifies the location of the primary directory server.

Value— URL
Default—ldap://127.0.0.1:389
Editing Level—Basic

`backup-urls [`*`backup-urls`*`...]`—(Optional) URLs that identify the locations of backup directory servers. Backup servers are used if the primary directory server is not accessible.

Value— List of URLs
Editing Level—Basic

`principal` *`principal`*— DN that the SRC component uses for authentication to access the directory.

Value— DN.

When you specify the DN, you can use < base > to indicate the base DN.

Editing Level—Basic

`credentials` *`credentials`*— Password with which the SRC component accesses the directory.

Value— Password
Editing Level—Basic

`protocol (ldaps)`—(Optional) Security protocol used to connect to the directory. If you do not configure a security protocol, plain socket is used.

Value

- `ldaps`— LDAPS which uses SSL.

Editing Level—Expert

`timeout` *`timeout`*—(Optional) Maximum amount of time during which the directory must respond to a connection request.

Value—Integer in the range 1–2147483647 s
Default—10
Editing Level—Expert

`check-interval` *`check-interval`*—(Optional) Time interval at which the directory monitoring system verifies its connection to the directory. If the directory connection fails after this interval, the directory monitoring system initiates a connection to another directory.

Value—Integer in the range 15–2147483647 s
Default—60
Editing Level—Expert

`blacklist`—(Optional) Specifies whether the directory monitoring system prevents connection to a directory if the directory fails to respond during 10 polling intervals.

Default—false
Editing Level—Basic

`snmp-agent`—(Optional) Specifies whether the SRC SNMP agent exports MIBs for this directory connection.

Default—false
Editing Level—Expert

Required Privilege Level

system

Required Editing Level

Basic

slot *number* dsa initial directory-eventing

Syntax

```
slot number dsa initial directory-eventing {
     eventing;
     signature-dn signature-dn;
     polling-interval polling-interval;
     event-base-dn event-base-dn;
     dispatcher-pool-size dispatcher-pool-size;
}
```

Hierarchy Level

```
[edit slot number dsa initial directory-eventing]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Change configuration for directory eventing properties. In most cases, you can use the default configuration for these properties.

Options

`eventing`—(Optional) Enable an SRC component to poll the directory for changes.

Default—true
Editing Level—Normal

`signature-dn` *`signature-dn`*—(Optional) DN of the directory entry that specifies the usedDirectory attribute for the SRC CLI. The usedDirectory attribute identifies the vendor of the directory server.

Value— DN
Default—o = umc
Editing Level—Expert

`polling-interval` *`polling-interval`*—(Optional) Interval at which an SRC component polls the directory to check for directory changes.

Value—Integer in the range 15–2147483647 s

Default—30
Editing Level—Normal

`event-base-dn` *`event-base-dn`*—(Optional) DN of an entry superior to the data associated with an SRC component in the directory.

If you are storing non-SRC data in the directory, and that data changes frequently whereas the SRC data does not, you may need to adjust the default value to improve performance. For optimal performance, set the value to the DN of an entry superior to both the SRC data and the changing non-SRC data.

Value— DN
Default—o = UMC
Editing Level—Expert

`dispatcher-pool-size` *`dispatcher-pool-size`*—(Optional) Number of directory change notifications that can be sent simultaneously to the SRC component.

Value—Integer in the range 0–2147483647
Default—1
Editing Level—Expert

Required Privilege Level

system

Required Editing Level

Basic

monitor dsa nic-proxy

Syntax

`monitor dsa nic-proxy proxy-name` *`proxy-name`* `<interval` *`interval`*`>`

Release Information

Command introduced in SRC Release 3.0.0

Description

Monitor NIC proxy statistics for Dynamic Service Activator.

Options

`proxy-name` *`proxy-name`*— Name of the NIC proxy.

Value—Text

`interval` *`interval`*—(Optional) Frequency for refreshing the monitor.

Value—Integer in the range -2147483648–2147483647 s
Default—5

Required Privilege Level

view

monitor dsa soap-operation

Syntax

`monitor dsa soap-operation operation-name` *`operation-name`* `<interval` *`interval`*`>`

Release Information

Command introduced in SRC Release 3.0.0

Description

Monitor DSA SOAP operation statistics.

Options

`operation-name` *`operation-name`*— Name of the SOAP operation.

Value—Text

`interval` *`interval`*—(Optional) Frequency for refreshing the monitor.

Value—Integer in the range -2147483648–2147483647 s
Default—5

Required Privilege Level

view

show dsa statistics general

Syntax

```
show dsa statistics general
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Display general information for Dynamic Service Activator.

Required Privilege Level

view

show dsa statistics nic-proxy

Syntax

`show dsa statistics nic-proxy` *`proxy-name`*

Release Information

Command introduced in SRC Release 3.0.0

Description

Display information about the NIC proxies for Dynamic Service Activator.

Options

`proxy-name`— Name of the NIC proxy.

Value— NIC proxy name.
Default— No value

Required Privilege Level

view

show dsa statistics soap-operation

Syntax

`show dsa statistics soap-operation` *`operation-name`*

Release Information

Command introduced in SRC Release 3.0.0

Description

Display information about the SOAP operations for Dynamic Service Activator.

Options

`operation-name`— Name of the SOAP operation.

Value—Text

Required Privilege Level

view

test dsa dsa-service environment clear

Syntax

```
test dsa dsa-service environment clear
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Delete Dynamic Service Activator service test settings for the current subscriber session.

Required Privilege Level

maintenance

test dsa dsa-service environment clear client-id

Syntax

```
test dsa dsa-service environment clear client-id
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Delete test setting for the client ID.

Required Privilege Level

maintenance

test dsa dsa-service environment clear client-password

Syntax

```
test dsa dsa-service environment clear client-password
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Delete test setting for the client password.

Required Privilege Level

maintenance

test dsa dsa-service environment clear host

Syntax

```
test dsa dsa-service environment clear host
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Delete test setting for Dynamic Service Activator hostname.

Required Privilege Level

maintenance

test dsa dsa-service environment clear port

Syntax

```
test dsa dsa-service environment clear port
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Delete test setting for Dynamic Service Activator port.

Required Privilege Level

maintenance

test dsa dsa-service environment clear subscriber-id

Syntax

```
test dsa dsa-service environment clear subscriber-id
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Delete test setting for the subscriber ID.

Required Privilege Level

maintenance

test dsa dsa-service environment clear subscriber-password

Syntax

```
test dsa dsa-service environment clear subscriber-password
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Delete test setting for the subscriber password.

Required Privilege Level

maintenance

test dsa dsa-service environment clear subscriber-uri

Syntax

```
test dsa dsa-service environment clear subscriber-uri
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Delete test setting for the subscriber type.

Required Privilege Level

maintenance

test dsa dsa-service environment set

Syntax

`test dsa dsa-service environment set <client-id client-id> <client-password client-password> <subscriber-id subscriber-id> <subscriber-password subscriber-password> <host host> <port port>`

Release Information

Command introduced in SRC Release 3.0.0

Description

Create Dynamic Service Activator service test settings for the current subscriber session.

Options

`client-id client-id`—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password client-password`—(Optional) Password for Dynamic Service Activator client.

Value—Text

`subscriber-id subscriber-id`—(Optional) Username for SAE subscriber.

Value—Text

`subscriber-password subscriber-password`—(Optional) Password for SAE subscriber.

Value—Text

`host host`—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa-service environment set subscriber-uri

Syntax

`test dsa dsa-service environment set subscriber-uri <subscriber-uri> <subscriber-type subscriber-type> <subscriber-address subscriber-address> <login-name login-name> <dn dn> <virtual-router virtual-router> <interface-name interface-name> <interface-index interface-index> <primary-user-name primary-user-name> <external-id external-id> <session-handle session-handle> <namespace namespace> <tunnel-session-id tunnel-session-id> <tunnel-id tunnel-id> <lac-ip-address lac-ip-address> <vpn-identifier vpn-identifier> <subscriber-constraints subscriber-constraints>`

Release Information

Command introduced in SRC Release 3.2.0

Description

Set SAE subscriber URI for the current session.

Options

subscriber-uri—(Optional) Subscriber Uniform Resource Identifier (URI).

Value—Text

subscriber-type *subscriber-type*—(Optional) Subscriber type defined in current grouped Dynamic Service Activator configuration.

Value—Text

subscriber-address *subscriber-address*—(Optional) IP address of the subscriber.

Value—Text

login-name *login-name*—(Optional) Login name of the subscriber.

Value—Text

dn *dn*—(Optional) DN of the subscriber profile.

Value—Text

`virtual-router` *`virtual-router`*—(Optional) Name of the virtual router.

Value—Text

`interface-name` *`interface-name`*—(Optional) Name of the interface.

Value—Text

`interface-index` *`interface-index`*—(Optional) SNMP index of the interface.

Value—Text

`primary-user-name` *`primary-user-name`*—(Optional) Primary username.

Value—Text

`external-id` *`external-id`*—(Optional) Client external ID.

Value—Text

`session-handle` *`session-handle`*—(Optional) Subscriber session handle.

Value—Text

`namespace` *`namespace`*—(Optional) Namespace in subscriber's external ID.

Value—Text

`tunnel-session-id` *`tunnel-session-id`*—(Optional) Subscriber's L2TP tunnel session ID

Value—Integer in the range 1–2147483647

`tunnel-id` *`tunnel-id`*—(Optional) Subscriber's L2TP tunnel ID.

Value—Integer in the range 1–2147483647

`lac-ip-address` *`lac-ip-address`*—(Optional) IP address of subscriber's L2TP Access Concentrator.

Value—Text

`vpn-identifier` *`vpn-identifier`*—(Optional) VPN identifier.

Value—Text

`subscriber-constraints` *`subscriber-constraints`*—(Optional) Constraint for the NIC key, in the format " < constraint name > = < constraint value > ".

Value—Text

Required Privilege Level

maintenance

test dsa dsa-service environment show

Syntax

```
test dsa dsa-service environment show
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Display Dynamic Service Activator service test settings for the current subscriber session.

Required Privilege Level

maintenance

test dsa dsa-service environment show client-id

Syntax

```
test dsa dsa-service environment show client-id
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Display test setting for client username.

Required Privilege Level

maintenance

test dsa dsa-service environment show client-password

Syntax

```
test dsa dsa-service environment show client-password
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Display test setting for client password.

Required Privilege Level

maintenance

test dsa dsa-service environment show host

Syntax

```
test dsa dsa-service environment show host
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Display test setting for Dynamic Service Activator hostname.

Required Privilege Level

maintenance

test dsa dsa-service environment show port

Syntax

```
test dsa dsa-service environment show port
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Display test setting for Dynamic Service Activator port.

Required Privilege Level

maintenance

test dsa dsa-service environment show subscriber-id

Syntax

```
test dsa dsa-service environment show subscriber-id
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Display test setting for username that the SAE uses to authenticate the subscriber.

Required Privilege Level

maintenance

test dsa dsa-service environment show subscriber-password

Syntax

```
test dsa dsa-service environment show subscriber-password
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Display test setting for the password that the SAE uses to authenticate the subscriber.

Required Privilege Level

maintenance

test dsa dsa-service environment show subscriber-uri

Syntax

```
test dsa dsa-service environment show subscriber-uri
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Display test setting for subscriber type.

Required Privilege Level

maintenance

test dsa dsa-service invoke-gateway-extension

Syntax

`test dsa dsa-service invoke-gateway-extension gateway-extension-name` *`gateway-extension-name`* `gateway-extension-arguments` *`gateway-extension-arguments`* `<client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 3.0.0

Description

Test gateway extension invocation.

Options

`gateway-extension-name` *`gateway-extension-name`*— Name of the servlet that the gateway client invokes.

Value—Text

`gateway-extension-arguments` *`gateway-extension-arguments`*— Arguments that the gateway client passes to the servlet.

Value—Text

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa-service invoke-script

Syntax

`test dsa dsa-service invoke-script sae-script-name` *`sae-script-name`* `sae-script-arguments` *`sae-script-arguments`* `<client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 3.0.0

Description

Test script invocation.

Options

`sae-script-name` *`sae-script-name`*— Name of the script that Dynamic Service Activator starts.

Value—Text

`sae-script-arguments` *`sae-script-arguments`*— Arguments that the script requires.

Value—Text

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa-service subscriber-activate-service

Syntax

`test dsa dsa-service subscriber-activate-service <subscriber-uri` *`subscriber-uri`*`> service-name` *`service-name`* `<service-session` *`service-session`*`> <accounting-tag` *`accounting-tag`*`> <downstream-bandwidth` *`downstream-bandwidth`*`> <upstream-bandwidth` *`upstream-bandwidth`*`> <session-timeout` *`session-timeout`*`> <subscription-user` *`subscription-user`*`> <subscription-password` *`subscription-password`*`> <substitutions` *`substitutions`*`> <client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 3.0.0

Description

Test subscriber service activation.

Options

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI to locate SAE.

Value—Text

`service-name` *`service-name`*— Name of the subscription.

Value—Text

`service-session` *`service-session`*—(Optional) Name of the service session.

Value—Text

`accounting-tag` *`accounting-tag`*—(Optional) Tag used to track a session for accounting purposes.

Value—Text

`downstream-bandwidth` *`downstream-bandwidth`*—(Optional) Traffic rate between the subscriber and the network.

Value—Text

`upstream-bandwidth` *`upstream-bandwidth`*—(Optional) Traffic rate between the network and the subscriber.

Value—Text

`session-timeout` *`session-timeout`*—(Optional) Timeout for the service.

Value—Text

`subscription-user` *`subscription-user`*—(Optional) Name of the subscriber to the service.

Value—Text

`subscription-password` *`subscription-password`*—(Optional) Password of the subscriber to the service.

Value—Text

`substitutions` *`substitutions`*—(Optional) Attributes and values that the method should substitute for existing settings.

Value—Text

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa-service subscriber-deactivate-service

Syntax

`test dsa dsa-service subscriber-deactivate-service <subscriber-uri` *`subscriber-uri`*`> service-name` *`service-name`* `<service-session` *`service-session`*`> <client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 3.0.0

Description

Test subscriber service deactivation.

Options

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI to locate SAE.

Value—Text

`service-name` *`service-name`*— Name of the subscription.

Value—Text

`service-session` *`service-session`*—(Optional) Name of the service session.

Value—Text

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa-service subscriber-login

Syntax

`test dsa dsa-service subscriber-login <subscriber-uri *subscriber-uri*> <subscriber-id *subscriber-id*> <subscriber-password *subscriber-password*> <client-id *client-id*> <client-password *client-password*> <host *host*> <port *port*>`

Release Information

Command introduced in SRC Release 3.0.0

Description

Test subscriber login.

Options

`subscriber-uri *subscriber-uri*`—(Optional) Subscriber URI to locate SAE.

Value—Text

`subscriber-id *subscriber-id*`—(Optional) Username for the SAE subscriber.

Value—Text

`subscriber-password *subscriber-password*`—(Optional) Password for the SAE subscriber.

Value—Text

`client-id *client-id*`—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password *client-password*`—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa-service subscriber-logout

Syntax

`test dsa dsa-service subscriber-logout <subscriber-uri *subscriber-uri*> <client-id *client-id*> <client-password *client-password*> <host *host*> <port *port*>`

Release Information

Command introduced in SRC Release 3.0.0

Description

Test subscriber logout.

Options

`subscriber-uri *subscriber-uri*`—(Optional) Subscriber URI to locate SAE.

Value—Text

`client-id *client-id*`—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password *client-password*`—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host *host*`—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port *port*`—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa-service subscriber-modify-service

Syntax

`test dsa dsa-service subscriber-modify-service <subscriber-uri` *`subscriber-uri`*`> service-name` *`service-name`* `<service-session` *`service-session`*`> <accounting-tag` *`accounting-tag`*`> <downstream-bandwidth` *`downstream-bandwidth`*`> <upstream-bandwidth` *`upstream-bandwidth`*`> <session-timeout` *`session-timeout`*`> <subscription-user` *`subscription-user`*`> <subscription-password` *`subscription-password`*`> <substitutions` *`substitutions`*`> <client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 3.0.0

Description

Test subscriber service modifications.

Options

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI to locate SAE.

Value—Text

`service-name` *`service-name`*— Name of the subscription.

Value—Text

`service-session` *`service-session`*—(Optional) Name of the service session.

Value—Text

`accounting-tag` *`accounting-tag`*—(Optional) Tag used to track a session for accounting purposes.

Value—Text

`downstream-bandwidth` *`downstream-bandwidth`*—(Optional) Traffic rate between the subscriber and the network.

Value—Text

`upstream-bandwidth` *`upstream-bandwidth`*—(Optional) Traffic rate between the network and the subscriber.

Value—Text

`session-timeout` *`session-timeout`*—(Optional) Timeout for the service.

Value—Text

`subscription-user` *`subscription-user`*—(Optional) Name of the subscriber to the service.

Value—Text

`subscription-password` *`subscription-password`*—(Optional) Password of the subscriber to the service.

Value—Text

`substitutions` *`substitutions`*—(Optional) Attributes and values that the method should substitute for existing settings.

Value—Text

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa-service subscriber-read-subscription

Syntax

`test dsa dsa-service subscriber-read-subscription <subscriber-uri` *`subscriber-uri`*`> <attributes` *`attributes`*`> <filter` *`filter`*`> <client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 3.0.0

Description

Test subscriber's access to subscriptions.

Options

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI to locate SAE.

Value—Text

`attributes` *`attributes`*—(Optional) Attribute field in a select argument that indicates subscription attributes.

Value—Text
Default—serviceName

`filter` *`filter`*—(Optional) Filter field in a select argument that indicates subscriptions.

Value—Text
Default—*

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa-service subscribers-activate-service

Syntax

`test dsa dsa-service subscribers-activate-service <subscriber-uri` *`subscriber-uri`*`> service-name` *`service-name`* `<service-session` *`service-session`*`> <accounting-tag` *`accounting-tag`*`> <downstream-bandwidth` *`downstream-bandwidth`*`> <upstream-bandwidth` *`upstream-bandwidth`*`> <session-timeout` *`session-timeout`*`> <subscription-user` *`subscription-user`*`> <subscription-password` *`subscription-password`*`> <substitutions` *`substitutions`*`> <client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Test service activation for subscribers.

Options

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI to locate SAE.

Value—Text

`service-name` *`service-name`*— Name of the subscription.

Value—Text

`service-session` *`service-session`*—(Optional) Name of the service session.

Value—Text

`accounting-tag` *`accounting-tag`*—(Optional) Tag used to track a session for accounting purposes.

Value—Text

`downstream-bandwidth` *`downstream-bandwidth`*—(Optional) Traffic rate between the subscriber and the network.

Value—Text

`upstream-bandwidth` *`upstream-bandwidth`*—(Optional) Traffic rate between the network and the subscriber.

Value—Text

`session-timeout` *`session-timeout`*—(Optional) Timeout for the service.

Value—Text

`subscription-user` *`subscription-user`*—(Optional) Name of the subscriber to the service.

Value—Text

`subscription-password` *`subscription-password`*—(Optional) Password of the subscriber to the service.

Value—Text

`substitutions` *`substitutions`*—(Optional) Attributes and values that the method should substitute for existing settings.

Value—Text

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa-service subscribers-deactivate-service

Syntax

`test dsa dsa-service subscribers-deactivate-service <subscriber-uri` *`subscriber-uri`*`> service-name` *`service-name`* `<service-session` *`service-session`*`> <client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Test service deactivation for subscribers.

Options

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI to locate SAE.

Value—Text

`service-name` *`service-name`*— Name of the subscription.

Value—Text

`service-session` *`service-session`*—(Optional) Name of the service session.

Value—Text

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa-service subscribers-login

Syntax

```
test dsa dsa-service subscribers-login <subscriber-uri subscriber-uri>
<subscriber-id subscriber-id> <subscriber-password subscriber-password> <rollback
rollback> <client-id client-id> <client-password client-password> <host host>
<port port>
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Test login of subscribers.

Options

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI to locate SAE.

Value—Text

`subscriber-id` *`subscriber-id`*—(Optional) Username for the SAE subscriber.

Value—Text

`subscriber-password` *`subscriber-password`*—(Optional) Password for the SAE subscriber.

Value—Text

`rollback` *`rollback`*—(Optional) If this option is set and a failure occurs, previous successful logins are logged out.

Value—Text

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa-service subscribers-logout

Syntax

`test dsa dsa-service subscribers-logout <subscriber-uri` *`subscriber-uri`*`> <client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Test logout of subscribers.

Options

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI to locate SAE.

Value—Text

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa-service subscribers-modify-service

Syntax

```
test dsa dsa-service subscribers-modify-service <subscriber-uri subscriber-uri>
service-name service-name <service-session service-session> <accounting-tag
accounting-tag> <downstream-bandwidth downstream-bandwidth> <upstream-bandwidth
upstream-bandwidth> <session-timeout session-timeout> <subscription-user
subscription-user> <subscription-password subscription-password> <substitutions
substitutions> <client-id client-id> <client-password client-password> <host
host> <port port>
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Test service modifications for subscribers.

Options

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI to locate SAE.

Value—Text

`service-name` *`service-name`*— Name of the subscription.

Value—Text

`service-session` *`service-session`*—(Optional) Name of the service session.

Value—Text

`accounting-tag` *`accounting-tag`*—(Optional) Tag used to track a session for accounting purposes.

Value—Text

`downstream-bandwidth` *`downstream-bandwidth`*—(Optional) Traffic rate between the subscriber and the network.

Value—Text

`upstream-bandwidth` *`upstream-bandwidth`*—(Optional) Traffic rate between the network and the subscriber.

Value—Text

`session-timeout` *`session-timeout`*—(Optional) Timeout for the service.

Value—Text

`subscription-user` *`subscription-user`*—(Optional) Name of the subscriber to the service.

Value—Text

`subscription-password` *`subscription-password`*—(Optional) Password of the subscriber to the service.

Value—Text

`substitutions` *`substitutions`*—(Optional) Attributes and values that the method should substitute for existing settings.

Value—Text

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa-service subscribers-read

Syntax

`test dsa dsa-service subscribers-read <subscriber-uri` *`subscriber-uri`*`> <subscription-attributes` *`subscription-attributes`*`> <subscription-filter` *`subscription-filter`*`> <service-attributes` *`service-attributes`*`> <service-filter` *`service-filter`*`> <subscriber-attributes` *`subscriber-attributes`*`> <client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 3.2.0

Description

Test read all subscriber sessions.

Options

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI to locate SAE.

Value—Text

`subscription-attributes` *`subscription-attributes`*—(Optional) Attributes names for subscription.

Value—Text

`subscription-filter` *`subscription-filter`*—(Optional) Filter for subscription.

Value—Text

`service-attributes` *`service-attributes`*—(Optional) Attributes names for service.

Value—Text

`service-filter` *`service-filter`*—(Optional) Filter for service.

Value—Text

`subscriber-attributes` *`subscriber-attributes`*—(Optional) Attributes for subscriber.

Value—Text

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa-service subscribers-read-subscriber

Syntax

`test dsa dsa-service subscribers-read-subscriber <subscriber-uri` *`subscriber-uri`*`> <subscriber-attributes` *`subscriber-attributes`*`> <client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 3.2.0

Description

Test read a subscriber session.

Options

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI to locate SAE.

Value—Text

`subscriber-attributes` *`subscriber-attributes`*—(Optional) Attributes for subscriber.

Value—Text

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa-service subscribers-read-subscription

Syntax

`test dsa dsa-service subscribers-read-subscription <subscriber-uri` *`subscriber-uri`*`> <attributes` *`attributes`*`> <filter` *`filter`*`> <client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Test subscribers' access to subscriptions.

Options

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI to locate SAE.

Value—Text

`attributes` *`attributes`*—(Optional) Attribute field in a select argument that indicates subscription attributes.

Value—Text
Default—serviceName

`filter` *`filter`*—(Optional) Filter field in a select argument that indicates subscriptions.

Value—Text
Default—*

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa2-service environment clear

Syntax

```
test dsa dsa2-service environment clear
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Delete Dynamic Service Activator service test settings for the current subscriber session.

Required Privilege Level

maintenance

test dsa dsa2-service environment clear client-id

Syntax

```
test dsa dsa2-service environment clear client-id
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Delete test setting for the client ID.

Required Privilege Level

maintenance

test dsa dsa2-service environment clear client-password

Syntax

```
test dsa dsa2-service environment clear client-password
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Delete test setting for the client password.

Required Privilege Level

maintenance

test dsa dsa2-service environment clear host

Syntax

```
test dsa dsa2-service environment clear host
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Delete test setting for Dynamic Service Activator hostname.

Required Privilege Level

maintenance

test dsa dsa2-service environment clear port

Syntax

```
test dsa dsa2-service environment clear port
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Delete test setting for Dynamic Service Activator port.

Required Privilege Level

maintenance

test dsa dsa2-service environment clear subscriber-id

Syntax

```
test dsa dsa2-service environment clear subscriber-id
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Delete test setting for the subscriber ID.

Required Privilege Level

maintenance

test dsa dsa2-service environment clear subscriber-password

Syntax

```
test dsa dsa2-service environment clear subscriber-password
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Delete test setting for the subscriber password.

Required Privilege Level

maintenance

test dsa dsa2-service environment clear subscriber-uri

Syntax

```
test dsa dsa2-service environment clear subscriber-uri
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Delete test setting for the subscriber type.

Required Privilege Level

maintenance

test dsa dsa2-service environment set

Syntax

`test dsa dsa2-service environment set <client-id client-id> <client-password client-password> <subscriber-id subscriber-id> <subscriber-password subscriber-password> <host host> <port port>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Create Dynamic Service Activator service test settings for the current subscriber session.

Options

`client-id client-id`—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password client-password`—(Optional) Password for Dynamic Service Activator client.

Value—Text

`subscriber-id subscriber-id`—(Optional) Username for SAE subscriber.

Value—Text

`subscriber-password subscriber-password`—(Optional) Password for SAE subscriber.

Value—Text

`host host`—(Optional) Hostname of DSA.

Value—Text

`port` *`port`*—(Optional) Port for DSA.

Value—Text

Required Privilege Level

maintenance

test dsa dsa2-service environment set subscriber-uri

Syntax

`test dsa dsa2-service environment set subscriber-uri <subscriber-uri> <subscriber-type subscriber-type> <subscriber-address subscriber-address> <login-name login-name> <dn dn> <virtual-router virtual-router> <interface-name interface-name> <interface-index interface-index> <primary-user-name primary-user-name> <external-id external-id> <session-handle session-handle> <namespace namespace> <tunnel-session-id tunnel-session-id> <tunnel-id tunnel-id> <lac-ip-address lac-ip-address> <vpn-identifier vpn-identifier> <subscriber-constraints subscriber-constraints>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Set SAE subscriber URI for the current session.

Options

subscriber-uri—(Optional) Subscriber Uniform Resource Identifier (URI).

Value—Text

subscriber-type *subscriber-type*—(Optional) Subscriber type defined in current shared dsa group configuration.

Value—Text

subscriber-address *subscriber-address*—(Optional) IP address of the subscriber.

Value—Text

login-name *login-name*—(Optional) Login name of the subscriber.

Value—Text

dn *dn*—(Optional) DN of the subscriber profile.

Value—Text

`virtual-router` *`virtual-router`*—(Optional) Name of the virtual router.

Value—Text

`interface-name` *`interface-name`*—(Optional) Name of the interface.

Value—Text

`interface-index` *`interface-index`*—(Optional) SNMP index of the interface.

Value—Text

`primary-user-name` *`primary-user-name`*—(Optional) Primary username.

Value—Text

`external-id` *`external-id`*—(Optional) Client external ID.

Value—Text

`session-handle` *`session-handle`*—(Optional) Subscriber session handle.

Value—Text

`namespace` *`namespace`*—(Optional) Namespace in subscriber's external ID.

Value—Text

`tunnel-session-id` *`tunnel-session-id`*—(Optional) Subscriber's L2TP tunnel session ID

Value—Integer in the range 1–2147483647

`tunnel-id` *`tunnel-id`*—(Optional) Subscriber's L2TP tunnel ID.

Value—Integer in the range 1–2147483647

`lac-ip-address` *`lac-ip-address`*—(Optional) IP address of subscriber's L2TP Access Concentrator

Value—Text

`vpn-identifier` *`vpn-identifier`*—(Optional) VPN identifier.

Value—Text

`subscriber-constraints` *`subscriber-constraints`*—(Optional) Constraint for the NIC key, in the format " < constraint name > = < constraint value > ".

Value—Text

Required Privilege Level

maintenance

test dsa dsa2-service environment show

Syntax

```
test dsa dsa2-service environment show
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Display Dynamic Service Activator service test settings for the current subscriber session.

Required Privilege Level

maintenance

test dsa dsa2-service environment show client-id

Syntax

```
test dsa dsa2-service environment show client-id
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Display test setting for client username.

Required Privilege Level

maintenance

test dsa dsa2-service environment show client-password

Syntax

```
test dsa dsa2-service environment show client-password
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Display test setting for client password.

Required Privilege Level

maintenance

test dsa dsa2-service environment show host

Syntax

```
test dsa dsa2-service environment show host
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Display test setting for Dynamic Service Activator hostname.

Required Privilege Level

maintenance

test dsa dsa2-service environment show port

Syntax

```
test dsa dsa2-service environment show port
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Display test setting for Dynamic Service Activator port.

Required Privilege Level

maintenance

test dsa dsa2-service environment show subscriber-id

Syntax

```
test dsa dsa2-service environment show subscriber-id
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Display test setting for username that the SAE uses to authenticate the subscriber.

Required Privilege Level

maintenance

test dsa dsa2-service environment show subscriber-password

Syntax

```
test dsa dsa2-service environment show subscriber-password
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Display test setting for the password that the SAE uses to authenticate the subscriber.

Required Privilege Level

maintenance

test dsa dsa2-service environment show subscriber-uri

Syntax

```
test dsa dsa2-service environment show subscriber-uri
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Display test setting for subscriber type.

Required Privilege Level

maintenance

test dsa dsa2-service invoke-gateway-extension

Syntax

`test dsa dsa2-service invoke-gateway-extension gateway-extension-name` *`gateway-extension-name`* `gateway-extension-arguments` *`gateway-extension-arguments`* `<client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Test gateway extension invocation.

Options

`gateway-extension-name` *`gateway-extension-name`*— Name of the servlet that the gateway client invokes.

Value—Text

`gateway-extension-arguments` *`gateway-extension-arguments`*— Arguments that the gateway client passes to the servlet.

Value—Text

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa2-service invoke-script

Syntax

`test dsa dsa2-service invoke-script sae-script-name` *`sae-script-name`* `sae-script-arguments` *`sae-script-arguments`* `<client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Test script invocation.

Options

`sae-script-name` *`sae-script-name`*— Name of the script that Dynamic Service Activator starts.

Value—Text

`sae-script-arguments` *`sae-script-arguments`*— Arguments that the script requires.

Value—Text

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa2-service subscriber-activate-service

Syntax

`test dsa dsa2-service subscriber-activate-service <subscriber-uri` *`subscriber-uri`*`> service-name` *`service-name`* `<service-session` *`service-session`*`> <accounting-tag` *`accounting-tag`*`> <downstream-bandwidth` *`downstream-bandwidth`*`> <upstream-bandwidth` *`upstream-bandwidth`*`> <session-timeout` *`session-timeout`*`> <subscription-user` *`subscription-user`*`> <subscription-password` *`subscription-password`*`> <substitutions` *`substitutions`*`> <client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Test subscriber service activation.

Options

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI to locate SAE.

Value—Text

`service-name` *`service-name`*— Name of the subscription.

Value—Text

`service-session` *`service-session`*—(Optional) Name of the service session.

Value—Text

`accounting-tag` *`accounting-tag`*—(Optional) Tag used to track a session for accounting purposes.

Value—Text

`downstream-bandwidth` *`downstream-bandwidth`*—(Optional) Traffic rate between the subscriber and the network.

Value—Text

`upstream-bandwidth` *`upstream-bandwidth`*—(Optional) Traffic rate between the network and the subscriber.

Value—Text

`session-timeout` *`session-timeout`*—(Optional) Timeout for the service.

Value—Text

`subscription-user` *`subscription-user`*—(Optional) Name of the subscriber to the service.

Value—Text

`subscription-password` *`subscription-password`*—(Optional) Password of the subscriber to the service.

Value—Text

`substitutions` *`substitutions`*—(Optional) Attributes and values that the method should substitute for existing settings.

Value—Text

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa2-service subscriber-deactivate-service

Syntax

`test dsa dsa2-service subscriber-deactivate-service <subscriber-uri` *`subscriber-uri`*`> service-name` *`service-name`* `<service-session` *`service-session`*`> <client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Test subscriber service deactivation.

Options

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI to locate SAE.

Value—Text

`service-name` *`service-name`*— Name of the subscription.

Value—Text

`service-session` *`service-session`*—(Optional) Name of the service session.

Value—Text

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa2-service subscriber-login

Syntax

`test dsa dsa2-service subscriber-login <subscriber-uri *subscriber-uri*> <subscriber-id *subscriber-id*> <subscriber-password *subscriber-password*> <client-id *client-id*> <client-password *client-password*> <host *host*> <port *port*>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Test subscriber login.

Options

`subscriber-uri *subscriber-uri*`—(Optional) Subscriber URI to locate SAE.

Value—Text

`subscriber-id *subscriber-id*`—(Optional) Username for the SAE subscriber.

Value—Text

`subscriber-password *subscriber-password*`—(Optional) Password for the SAE subscriber.

Value—Text

`client-id *client-id*`—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password *client-password*`—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa2-service subscriber-logout

Syntax

`test dsa dsa2-service subscriber-logout <subscriber-uri *subscriber-uri*> <client-id *client-id*> <client-password *client-password*> <host *host*> <port *port*>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Test subscriber logout.

Options

`subscriber-uri *subscriber-uri*`—(Optional) Subscriber URI to locate SAE.

Value—Text

`client-id *client-id*`—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password *client-password*`—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host *host*`—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port *port*`—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa2-service subscriber-modify-service

Syntax

`test dsa dsa2-service subscriber-modify-service <subscriber-uri` *`subscriber-uri`*`> service-name` *`service-name`* `<service-session` *`service-session`*`> <accounting-tag` *`accounting-tag`*`> <downstream-bandwidth` *`downstream-bandwidth`*`> <upstream-bandwidth` *`upstream-bandwidth`*`> <session-timeout` *`session-timeout`*`> <subscription-user` *`subscription-user`*`> <subscription-password` *`subscription-password`*`> <substitutions` *`substitutions`*`> <client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Test subscriber service modifications.

Options

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI to locate SAE.

Value—Text

`service-name` *`service-name`*— Name of the subscription.

Value—Text

`service-session` *`service-session`*—(Optional) Name of the service session.

Value—Text

`accounting-tag` *`accounting-tag`*—(Optional) Tag used to track a session for accounting purposes.

Value—Text

`downstream-bandwidth` *`downstream-bandwidth`*—(Optional) Traffic rate between the subscriber and the network.

Value—Text

`upstream-bandwidth` *`upstream-bandwidth`*—(Optional) Traffic rate between the network and the subscriber.

Value—Text

`session-timeout` *`session-timeout`*—(Optional) Timeout for the service.

Value—Text

`subscription-user` *`subscription-user`*—(Optional) Name of the subscriber to the service.

Value—Text

`subscription-password` *`subscription-password`*—(Optional) Password of the subscriber to the service.

Value—Text

`substitutions` *`substitutions`*—(Optional) Attributes and values that the method should substitute for existing settings.

Value—Text

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa2-service subscriber-read-subscription

Syntax

`test dsa dsa2-service subscriber-read-subscription <subscriber-uri` *`subscriber-uri`*`> <attributes` *`attributes`*`> <filter` *`filter`*`> <client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Test subscriber's access to subscriptions.

Options

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI to locate SAE.

Value—Text

`attributes` *`attributes`*—(Optional) Attribute field in a select argument that indicates subscription attributes.

Value—Text
Default—serviceName

`filter` *`filter`*—(Optional) Filter field in a select argument that indicates subscriptions.

Value—Text
Default—*

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa2-service subscribers-activate-service

Syntax

`test dsa dsa2-service subscribers-activate-service <subscriber-uri` *`subscriber-uri`*`> service-name` *`service-name`* `<service-session` *`service-session`*`> <accounting-tag` *`accounting-tag`*`> <downstream-bandwidth` *`downstream-bandwidth`*`> <upstream-bandwidth` *`upstream-bandwidth`*`> <session-timeout` *`session-timeout`*`> <subscription-user` *`subscription-user`*`> <subscription-password` *`subscription-password`*`> <substitutions` *`substitutions`*`> <rollback` *`rollback`*`> <client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Test service activation for subscribers.

Options

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI to locate SAE.

Value—Text

`service-name` *`service-name`*— Name of the subscription.

Value—Text

`service-session` *`service-session`*—(Optional) Name of the service session.

Value—Text

`accounting-tag` *`accounting-tag`*—(Optional) Tag used to track a session for accounting purposes.

Value—Text

`downstream-bandwidth` *`downstream-bandwidth`*—(Optional) Traffic rate between the subscriber and the network.

Value—Text

`upstream-bandwidth` *`upstream-bandwidth`*—(Optional) Traffic rate between the network and the subscriber.

Value—Text

`session-timeout` *`session-timeout`*—(Optional) Timeout for the service.

Value—Text

`subscription-user` *`subscription-user`*—(Optional) Name of the subscriber to the service.

Value—Text

`subscription-password` *`subscription-password`*—(Optional) Password of the subscriber to the service.

Value—Text

`substitutions` *`substitutions`*—(Optional) Attributes and values that the method should substitute for existing settings.

Value—Text

`rollback` *`rollback`*—(Optional) If option is set and a failure occurs, roll back.

Value—Text

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa2-service subscribers-deactivate-service

Syntax

`test dsa dsa2-service subscribers-deactivate-service <subscriber-uri` *`subscriber-uri`*`> service-name` *`service-name`* `<service-session` *`service-session`*`> <client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Test service deactivation for subscribers.

Options

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI to locate SAE.

Value—Text

`service-name` *`service-name`*— Name of the subscription.

Value—Text

`service-session` *`service-session`*—(Optional) Name of the service session.

Value—Text

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa2-service subscribers-login

Syntax

```
test dsa dsa2-service subscribers-login <subscriber-uri subscriber-uri>
<subscriber-id subscriber-id> <subscriber-password subscriber-password> <rollback
rollback> <client-id client-id> <client-password client-password> <host host>
<port port>
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Test login of subscribers.

Options

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI to locate SAE.

Value—Text

`subscriber-id` *`subscriber-id`*—(Optional) Username for the SAE subscriber.

Value—Text

`subscriber-password` *`subscriber-password`*—(Optional) Password for the SAE subscriber.

Value—Text

`rollback` *`rollback`*—(Optional) If this option is set and a failure occurs, previous successful logins are logged out.

Value—Text

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa2-service subscribers-logout

Syntax

`test dsa dsa2-service subscribers-logout <subscriber-uri *subscriber-uri*> <client-id *client-id*> <client-password *client-password*> <host *host*> <port *port*>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Test logout of subscribers.

Options

`subscriber-uri *subscriber-uri*`—(Optional) Subscriber URI to locate SAE.

Value—Text

`client-id *client-id*`—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password *client-password*`—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host *host*`—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port *port*`—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa2-service subscribers-modify-service

Syntax

`test dsa dsa2-service subscribers-modify-service <subscriber-uri` *`subscriber-uri`*`> service-name` *`service-name`* `<service-session` *`service-session`*`> <accounting-tag` *`accounting-tag`*`> <downstream-bandwidth` *`downstream-bandwidth`*`> <upstream-bandwidth` *`upstream-bandwidth`*`> <session-timeout` *`session-timeout`*`> <subscription-user` *`subscription-user`*`> <subscription-password` *`subscription-password`*`> <substitutions` *`substitutions`*`> <client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Test subscriber service modifications.

Options

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI to locate SAE.

Value—Text

`service-name` *`service-name`*— Name of the subscription.

Value—Text

`service-session` *`service-session`*—(Optional) Name of the service session.

Value—Text

`accounting-tag` *`accounting-tag`*—(Optional) Tag used to track a session for accounting purposes.

Value—Text

`downstream-bandwidth` *`downstream-bandwidth`*—(Optional) Traffic rate between the subscriber and the network.

Value—Text

`upstream-bandwidth` *`upstream-bandwidth`*—(Optional) Traffic rate between the network and the subscriber.

Value—Text

`session-timeout` *`session-timeout`*—(Optional) Timeout for the service.

Value—Text

`subscription-user` *`subscription-user`*—(Optional) Name of the subscriber to the service.

Value—Text

`subscription-password` *`subscription-password`*—(Optional) Password of the subscriber to the service.

Value—Text

`substitutions` *`substitutions`*—(Optional) Attributes and values that the method should substitute for existing settings.

Value—Text

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa2-service subscribers-read

Syntax

`test dsa dsa2-service subscribers-read <subscriber-uri` *`subscriber-uri`*`> <subscription-attributes` *`subscription-attributes`*`> <subscription-filter` *`subscription-filter`*`> <service-attributes` *`service-attributes`*`> <service-filter` *`service-filter`*`> <subscriber-attributes` *`subscriber-attributes`*`> <client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Test read all subscriber sessions.

Options

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI to locate SAE.

Value—Text

`subscription-attributes` *`subscription-attributes`*—(Optional) Attributes names for subscription.

Value—Text

`subscription-filter` *`subscription-filter`*—(Optional) Filter for subscription.

Value—Text

`service-attributes` *`service-attributes`*—(Optional) Attributes names for service.

Value—Text

`service-filter` *`service-filter`*—(Optional) Filter for service.

Value—Text

`subscriber-attributes` *`subscriber-attributes`*—(Optional) Attributes for subscriber.

Value—Text

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa2-service subscribers-read-subscriber

Syntax

`test dsa dsa2-service subscribers-read-subscriber <subscriber-uri` *`subscriber-uri`*`> <subscriber-attributes` *`subscriber-attributes`*`> <client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Test read a subscriber session.

Options

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI to locate SAE.

Value—Text

`subscriber-attributes` *`subscriber-attributes`*—(Optional) Attributes for subscriber.

Value—Text

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa dsa2-service subscribers-read-subscription

Syntax

`test dsa dsa2-service subscribers-read-subscription <subscriber-uri` *`subscriber-uri`*`> <attributes` *`attributes`*`> <filter` *`filter`*`> <client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Test subscribers' access to subscriptions.

Options

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI to locate SAE.

Value—Text

`attributes` *`attributes`*—(Optional) Attribute field in a select argument that indicates subscription attributes.

Value—Text
Default—serviceName

`filter` *`filter`*—(Optional) Filter field in a select argument that indicates subscriptions.

Value—Text
Default—*

`client-id` *`client-id`*—(Optional) Username for Dynamic Service Activator client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for Dynamic Service Activator client.

Value—Text

`host` *`host`*—(Optional) Hostname of DSA. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for DSA. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa on-demand-video-service environment clear

Syntax

```
test dsa on-demand-video-service environment clear
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Delete on-demand video service test settings for the current subscriber session.

Required Privilege Level

maintenance

test dsa on-demand-video-service environment clear client-id

Syntax

```
test dsa on-demand-video-service environment clear client-id
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Delete test setting for on-demand video service client ID.

Required Privilege Level

maintenance

test dsa on-demand-video-service environment clear client-password

Syntax

```
test dsa on-demand-video-service environment clear client-password
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Delete test setting for on-demand video service client password.

Required Privilege Level

maintenance

test dsa on-demand-video-service environment clear host

Syntax

```
test dsa on-demand-video-service environment clear host
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Delete test setting for on-demand video service hostname.

Required Privilege Level

maintenance

test dsa on-demand-video-service environment clear port

Syntax

```
test dsa on-demand-video-service environment clear port
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Delete test setting for on-demand video service port.

Required Privilege Level

maintenance

test dsa on-demand-video-service environment set

Syntax

`test dsa on-demand-video-service environment set <client-id client-id> <client-password client-password> <host host> <port port>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Create on-demand video service test settings for the current subscriber session.

Options

`client-id client-id`—(Optional) ID for on-demand video service client.

Value—Text

`client-password client-password`—(Optional) Password for on-demand video service client.

Value—Text

`host host`—(Optional) Hostname of on-demand video service. The default value is localhost.

Value—Text

`port port`—(Optional) Port for on-demand video service. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa on-demand-video-service environment show

Syntax

```
test dsa on-demand-video-service environment show
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Display on-demand video service test settings for the current subscriber session.

Required Privilege Level

maintenance

test dsa on-demand-video-service environment show client-id

Syntax

```
test dsa on-demand-video-service environment show client-id
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Display on-demand video service test setting for the client username.

Required Privilege Level

maintenance

test dsa on-demand-video-service environment show client-password

Syntax

```
test dsa on-demand-video-service environment show client-password
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Display on-demand video service test setting for the client password.

Required Privilege Level

maintenance

test dsa on-demand-video-service environment show host

Syntax

```
test dsa on-demand-video-service environment show host
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Display the on-demand video service hostname.

Required Privilege Level

maintenance

test dsa on-demand-video-service environment show port

Syntax

```
test dsa on-demand-video-service environment show port
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Display the on-demand video service port.

Required Privilege Level

maintenance

test dsa on-demand-video-service query-client-status

Syntax

```
test dsa on-demand-video-service query-client-status reservation-client-ipv4
reservation-client-ipv4 <client-id client-id> <client-password client-password>
<host host> <port port>
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Searches for all active sessions, managed by SRC, of a given video server.

Options

`reservation-client-ipv4` *`reservation-client-ipv4`*— IP address of the policy manager client, that is, the video server.

Value—Text

`client-id` *`client-id`*—(Optional) ID for on-demand video service client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for on-demand video service client.

Value—Text

`host` *`host`*—(Optional) Hostname of on-demand video service. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for on-demand video service. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa on-demand-video-service release-network-resources

Syntax

`test dsa on-demand-video-service release-network-resources session-id` *`session-id`* `source-ipv4` *`source-ipv4`* `destination-ipv4` *`destination-ipv4`* `<client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Specifies the resources that are being requested to be released in the ReleaseNetworkResources message.

Options

`session-id` *`session-id`*— Session ID; globally unique identifier generated by the video server.

Value—Text

`source-ipv4` *`source-ipv4`*— IP address of the stream origin, that is, the video server edge card.

Value—Text

`destination-ipv4` *`destination-ipv4`*— IP address of the stream destination, that is, the subscriber's IP address.

Value—Text

`client-id` *`client-id`*—(Optional) ID for on-demand video service client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for on-demand video service client.

Value—Text

`host` *`host`*—(Optional) Hostname of on-demand video service. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for on-demand video service. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa on-demand-video-service reserve-network-resource

Syntax

`test dsa on-demand-video-service reserve-network-resource session-id` *`session-id`* `bit-rate` *`bit-rate`* `reservation-client-ipv4` *`reservation-client-ipv4`* `policy-manager-client-url` *`policy-manager-client-url`* `source-ipv4` *`source-ipv4`* `destination-ipv4` *`destination-ipv4`* `<client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Reserve network resource operation.

Options

`session-id` *`session-id`*— Session ID; globally unique identifier generated by the video server.

Value—Text

`bit-rate` *`bit-rate`*— Requested bandwidth for the call (bits per second).

Value—Text

`reservation-client-ipv4` *`reservation-client-ipv4`*— IP address of the policy manager client.

Value—Text

`policy-manager-client-url` *`policy-manager-client-url`*— URL that the policy manager should use to initiate requests to this client.

Value—Text

`source-ipv4` *`source-ipv4`*— IP address of the stream origin, that is, the video server edge card.

Value—Text

`destination-ipv4` *`destination-ipv4`*— IP address of the stream destination, that is, the subscriber's IP address.

Value—Text

`client-id` *`client-id`*—(Optional) ID for on-demand video service client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for on-demand video service client.

Value—Text

`host` *`host`*—(Optional) Hostname of on-demand video service. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for on-demand video service. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa pcmm-service commit-resources

Syntax

`test dsa pcmm-service commit-resources <subscriber-address` *`subscriber-address`*`> <subscriber-uri` *`subscriber-uri`*`> service-name` *`service-name`* `<context-id` *`context-id`*`> <time-usage-limit` *`time-usage-limit`*`> <classifier` *`classifier`*`> <traffic-profile` *`traffic-profile`*`> <flow-spec` *`flow-spec`*`> <client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 3.0.0

Description

Specifies the resources that are being requested in the CommitResource message.

Options

`subscriber-address` *`subscriber-address`*—(Optional) IP address for PCMM service client.

Value—Text

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI for PCMM service.

Value—Text

`service-name` *`service-name`*— Name of the SRC service.

Value—Text

`context-id` *`context-id`*—(Optional) Context ID; globally unique identifier that the application manager uses as the SRC session name.

Value—Text

`time-usage-limit` *`time-usage-limit`*—(Optional) Limit on the lifetime of a context.

Value—Text

`classifier` *`classifier`*—(Optional) Object that identifies the traffic flow for which the application server is requesting services. In the format: < parameter name > = < parameter value > .

Value—Text

`traffic-profile` *`traffic-profile`*—(Optional) The bandwidth and QoS characteristics desired for a request. In the format: < parameter name > = < parameter value > .

Value—Text

`flow-spec` *`flow-spec`*—(Optional) FlowSpec action to specify the traffic profile. In the format: < parameter name > = < parameter value > .

Value—Text

`client-id` *`client-id`*—(Optional) ID for PCMM service client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for PCMM service client.

Value—Text

`host` *`host`*—(Optional) Hostname of PCMM service. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for PCMM service. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa pcmm-service environment clear

Syntax

```
test dsa pcmm-service environment clear
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Delete PCMM service test settings for the current subscriber session.

Required Privilege Level

maintenance

test dsa pcmm-service environment clear client-id

Syntax

```
test dsa pcmm-service environment clear client-id
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Delete test setting for PCMM service client ID.

Required Privilege Level

maintenance

test dsa pcmm-service environment clear client-password

Syntax

```
test dsa pcmm-service environment clear client-password
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Delete test setting for PCMM service client password.

Required Privilege Level

maintenance

test dsa pcmm-service environment clear host

Syntax

```
test dsa pcmm-service environment clear host
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Delete test setting for PCMM service hostname.

Required Privilege Level

maintenance

test dsa pcmm-service environment clear port

Syntax

```
test dsa pcmm-service environment clear port
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Delete test setting for PCMM service port.

Required Privilege Level

maintenance

test dsa pcmm-service environment clear subscriber-address

Syntax

```
test dsa pcmm-service environment clear subscriber-address
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Delete test setting for PCMM service subscriber IP address.

Required Privilege Level

maintenance

test dsa pcmm-service environment clear subscriber-uri

Syntax

```
test dsa pcmm-service environment clear subscriber-uri
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Delete test setting for PCMM service subscriber URI.

Required Privilege Level

maintenance

test dsa pcmm-service environment set

Syntax

`test dsa pcmm-service environment set <client-id client-id> <client-password client-password> <subscriber-address subscriber-address> <subscriber-uri subscriber-uri> <host host> <port port>`

Release Information

Command introduced in SRC Release 3.0.0

Description

Create PCMM service test settings for the current subscriber session.

Options

`client-id client-id`—(Optional) ID for PCMM service client.

Value—Text

`client-password client-password`—(Optional) Password for PCMM service client.

Value—Text

`subscriber-address subscriber-address`—(Optional) IP for PCMM service client.

Value—Text

`subscriber-uri subscriber-uri`—(Optional) Subscriber URI for PCMM service. In the following format: < subscriber-type > : < subscriber-comp > [& < subscriber-comp >]* [' < ' < constraint > [& < constraint >]* ' > ']

Value—Text

`host host`—(Optional) Hostname. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa pcmm-service environment show

Syntax

```
test dsa pcmm-service environment show
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Display PCMM service test settings for the current subscriber session.

Required Privilege Level

maintenance

test dsa pcmm-service environment show client-id

Syntax

```
test dsa pcmm-service environment show client-id
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Display PCMM service test setting for the client username.

Required Privilege Level

maintenance

test dsa pcmm-service environment show client-password

Syntax

```
test dsa pcmm-service environment show client-password
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Display PCMM service test setting for the client password.

Required Privilege Level

maintenance

test dsa pcmm-service environment show host

Syntax

```
test dsa pcmm-service environment show host
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Display the PCMM service hostname.

Required Privilege Level

maintenance

test dsa pcmm-service environment show port

Syntax

```
test dsa pcmm-service environment show port
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Display the PCMM service port.

Required Privilege Level

maintenance

test dsa pcmm-service environment show subscriber-address

Syntax

```
test dsa pcmm-service environment show subscriber-address
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Display PCMM service test setting for the IP address of the subscriber.

Required Privilege Level

maintenance

test dsa pcmm-service environment show subscriber-uri

Syntax

```
test dsa pcmm-service environment show subscriber-uri
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Display PCMM service test setting for the subscriber URI.

Required Privilege Level

maintenance

test dsa pcmm-service query-available-services

Syntax

`test dsa pcmm-service query-available-services <client-id client-id> <client-password client-password> <host host> <port port>`

Release Information

Command introduced in SRC Release 3.0.0

Description

Searches for the services that are available for a specified subscriber.

Options

`client-id client-id`—(Optional) ID for PCMM service client.

Value—Text

`client-password client-password`—(Optional) Password for PCMM service client.

Value—Text

`host host`—(Optional) Hostname of PCMM service. The default value is localhost.

Value—Text

`port port`—(Optional) Port for PCMM service. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa pcmm-service query-contexts

Syntax

`test dsa pcmm-service query-contexts <subscriber-address` *`subscriber-address`*`> <subscriber-uri` *`subscriber-uri`*`> <service-name` *`service-name`*`> <context-id` *`context-id`*`> <client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 3.0.0

Description

Searches for the context ID and context status for a subscriber.

Options

`subscriber-address` *`subscriber-address`*—(Optional) IP address for PCMM service client.

Value—Text

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI for PCMM service.

Value—Text

`service-name` *`service-name`*—(Optional) Name of the SRC service.

Value—Text

`context-id` *`context-id`*—(Optional) Context ID; globally unique identifier that the application manager uses as the SRC session name.

Value—Text

`client-id` *`client-id`*—(Optional) ID for PCMM service client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for PCMM service client.

Value—Text

`host` *`host`*—(Optional) Hostname of PCMM service. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for PCMM service. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa pcmm-service release-resources

Syntax

`test dsa pcmm-service release-resources <subscriber-address` *`subscriber-address`*`> <subscriber-uri` *`subscriber-uri`*`> service-name` *`service-name`* `<context-id` *`context-id`*`> <client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 3.0.0

Description

Specifies the resources that are being requested to be released in the ReleaseResources message.

Options

`subscriber-address` *`subscriber-address`*—(Optional) IP address for PCMM service client.

Value—Text

`subscriber-uri` *`subscriber-uri`*—(Optional) Subscriber URI for PCMM service.

Value—Text

`service-name` *`service-name`*— Name of the SRC service.

Value—Text

`context-id` *`context-id`*—(Optional) Context ID; globally unique identifier that the application manager uses as the SRC session name.

Value—Text

`client-id` *`client-id`*—(Optional) ID for PCMM service client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for PCMM service client.

Value—Text

`host` *`host`*—(Optional) Hostname of PCMM service. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for PCMM service. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa personalized-video-service allocate-resource

Syntax

`test dsa personalized-video-service allocate-resource application-name` *`application-name`* `session-id` *`session-id`* `bit-rate` *`bit-rate`* `signaling-server` *`signaling-server`* `media-source-ip` *`media-source-ip`* `destination-ip` *`destination-ip`* `message-version` *`message-version`* `<mac-address` *`mac-address`*`> <media-type` *`media-type`*`> <content-type` *`content-type`*`> <priority` *`priority`*`> <duration` *`duration`*`> <trick-file-duration-delay` *`trick-file-duration-delay`*`> <client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Specifies the resources that are being requested in the AllocateResource message.

Options

`application-name` *`application-name`*— Name of the application generating the request, which is a configurable parameter on the video server. This name translates to the SRC service name.

Value—Text

`session-id` *`session-id`*— Session ID; globally unique identifier generated by the video server.

Value—Text

`bit-rate` *`bit-rate`*— Requested bandwidth for the call (bits per second).

Value—Text

`signaling-server` *`signaling-server`*— Fully qualified domain name, or the default value of IP address and optional port of the signaling server.

Value—Text

`media-source-ip` *`media-source-ip`*— Address of the interface that is the source the video stream.

Value—Text

`destination-ip` *`destination-ip`*— IP address of the stream destination, that is, the subscriber's IP address.

Value—Text

`message-version` *`message-version`*— Version of the message type to account for changes and enhancements in subsequent releases.

Value—Text

`mac-address` *`mac-address`*—(Optional) MAC address of the originating device.

Value—Text

`media-type` *`media-type`*—(Optional) Media type of video, data, voice, or application. For the personalized video service, media type is video.

Value—Text

`content-type` *`content-type`*—(Optional) Content type is sd (Standard Definition) or hd (High Definition).

Value—Text

`priority` *`priority`*—(Optional) Priority is free or pay.

Value—Text

`duration` *`duration`*—(Optional) Expected duration of the playout for the media type.

Value—Text

`trick-file-duration-delay` *`trick-file-duration-delay`*—(Optional) Maximum time the media type can be in the pause condition.

Value—Text

`client-id` *`client-id`*—(Optional) ID for personalized video service client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for personalized video service client.

Value—Text

`host` *`host`*—(Optional) Hostname. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for personalized video service. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa personalized-video-service environment clear

Syntax

```
test dsa personalized-video-service environment clear
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Delete personalized video service test settings for the current subscriber session.

Required Privilege Level

maintenance

test dsa personalized-video-service environment clear client-id

Syntax

```
test dsa personalized-video-service environment clear client-id
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Delete test setting for personalized video service client ID.

Required Privilege Level

maintenance

test dsa personalized-video-service environment clear client-password

Syntax

```
test dsa personalized-video-service environment clear client-password
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Delete test setting for personalized video service client password.

Required Privilege Level

maintenance

test dsa personalized-video-service environment clear host

Syntax

```
test dsa personalized-video-service environment clear host
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Delete test setting for personalized video service hostname.

Required Privilege Level

maintenance

test dsa personalized-video-service environment clear port

Syntax

```
test dsa personalized-video-service environment clear port
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Delete test setting for personalized video service port.

Required Privilege Level

maintenance

test dsa personalized-video-service environment set

Syntax

`test dsa personalized-video-service environment set <client-id *client-id*> <client-password *client-password*> <host *host*> <port *port*>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Create personalized video service test settings for the current subscriber session.

Options

`client-id *client-id*`—(Optional) ID for personalized video service client.

Value—Text

`client-password *client-password*`—(Optional) Password for personalized video service client.

Value—Text

`host *host*`—(Optional) Hostname of personalized video service. The default value is localhost.

Value—Text

`port *port*`—(Optional) Port for personalized video service. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa personalized-video-service environment show

Syntax

```
test dsa personalized-video-service environment show
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Display personalized video service test settings for the current subscriber session.

Required Privilege Level

maintenance

test dsa personalized-video-service environment show client-id

Syntax

```
test dsa personalized-video-service environment show client-id
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Display personalized video service test setting for the client username.

Required Privilege Level

maintenance

test dsa personalized-video-service environment show client-password

Syntax

```
test dsa personalized-video-service environment show client-password
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Display personalized video service test setting for the client password.

Required Privilege Level

maintenance

test dsa personalized-video-service environment show host

Syntax

```
test dsa personalized-video-service environment show host
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Display the personalized video service hostname.

Required Privilege Level

maintenance

test dsa personalized-video-service environment show port

Syntax

```
test dsa personalized-video-service environment show port
```

Release Information

Command introduced in SRC Release 4.0.0

Description

Display the personalized video service port.

Required Privilege Level

maintenance

test dsa personalized-video-service query-status

Syntax

`test dsa personalized-video-service query-status application-name` *`application-name`* `application-server` *`application-server`* `message-version` *`message-version`* `<client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Searches for all active sessions, managed by SRC, of a given video server.

Options

`application-name` *`application-name`*— Name of the application generating the request, which is a configurable parameter on the video server. This name translates to the SRC service name.

Value—Text

`application-server` *`application-server`*— IP address of the policy manager client, that is, the video server.

Value—Text

`message-version` *`message-version`*— Version of the message type to account for changes and enhancements in subsequent releases.

Value—Text

`client-id` *`client-id`*—(Optional) ID for personalized video service client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for personalized video service client.

Value—Text

`host` *`host`*—(Optional) Hostname of personalized video service. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for personalized video service. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

test dsa personalized-video-service release-resource

Syntax

`test dsa personalized-video-service release-resource application-name` *`application-name`* `session-id` *`session-id`* `message-version` *`message-version`* `<client-id` *`client-id`*`> <client-password` *`client-password`*`> <host` *`host`*`> <port` *`port`*`>`

Release Information

Command introduced in SRC Release 4.0.0

Description

Specifies the resources that are being requested to be released in the ReleaseResource message.

Options

`application-name` *`application-name`*— Name of the application generating the request, which is a configurable parameter on the video server. This name translates to the SRC service name.

Value—Text

`session-id` *`session-id`*— Session ID; globally unique identifier generated by the video server.

Value—Text

`message-version` *`message-version`*— Version of the message type to account for changes and enhancements in subsequent releases.

Value—Text

`client-id` *`client-id`*—(Optional) ID for personalized video service client.

Value—Text

`client-password` *`client-password`*—(Optional) Password for personalized video service client.

Value—Text

`host` *`host`*—(Optional) Hostname of personalized video service. The default value is localhost.

Value—Text

`port` *`port`*—(Optional) Port for personalized video service. The default port is 8080.

Value—Text

Required Privilege Level

maintenance

IP Multimedia Subsystem (IMS)

The following table summarizes the SRC command-line interface (SRC CLI) for supporting IMS. Configuration statements and operational commands are listed in alphabetical order.

IMS
Configuration Statements
shared_ims_configuration_nic-proxy-configuration
shared_ims_configuration_nic-proxy-configuration_name_cache
shared_ims_configuration_nic-proxy-configuration_name_nic-host-selection
shared_ims_configuration_nic-proxy-configuration_name_nic-host-selection_blacklisting
shared_ims_configuration_nic-proxy-configuration_name_resolution
shared_ims_configuration_nic-proxy-configuration_name_test-nic-bindings
shared_ims_configuration_nic-proxy-configuration_name_test-nic-bindings_key-values
shared_ims_configuration_redundancy
shared_ims_configuration_subscriber-types
shared_ims_group
slot_number_ims
slot_number_ims_aracf-rq
slot_number_ims_aracf-rq_peer
slot_number_ims_aracf-rq_test_templates_aar
slot_number_ims_aracf-rq_test_templates_aar_name_globally-unique-address
slot_number_ims_aracf-rq_test_templates_aar_name_media-component-description
slot_number_ims_aracf-rq_test_templates_aar_name_media-component-description_media-component-number_media-sub-component
slot_number_ims_initial
slot_number_ims_initial_directory-connection
slot_number_ims_initial_directory-eventing

slot number ims java-orb object-adapter
slot_number_ims_logger
slot_number_ims_logger_name_file
slot_number_ims_logger_name_syslog
Operational Commands
show ims aracf-rq peers
show ims statistics aracf rq
show ims statistics aracf rq process
test ims aracf-rq aar session-modify
test ims aracf-rq aar session-start
test ims aracf-rq str

shared ims configuration nic-proxy-configuration

Syntax

```
shared ims configuration nic-proxy-configuration name {
}
```

Hierarchy Level

```
[edit shared ims configuration nic-proxy-configuration]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a NIC proxy.

Options

name *name*—

Value—Text

Required Privilege Level

system

Required Editing Level

Basic

shared ims configuration nic-proxy-configuration *name* cache

Syntax

```
shared ims configuration nic-proxy-configuration name cache {
     cache-size cache-size;
     cache-cleanup-interval cache-cleanup-interval;
     cache-entry-age cache-entry-age;
}
```

Hierarchy Level

```
[edit shared ims configuration nic-proxy-configuration name cache]
```

Description

Configure the NIC proxy cache properties. You can modify cache properties for the NIC proxy to optimize the resolution performance for your network configuration and system resources. Typically, you can use the default settings for the cache properties.

`cache-size` *`cache-size`*—(Optional) Maximum size of the cache in which the NIC proxy retains data. If you decrease the cache size or disable the cache while the NIC proxy is running, the NIC proxy removes entries in order of descending age until the cache size meets the new limit.

Value— Integer in the range 0–2147483647
Default—10000
Editing Level—Advanced

`cache-cleanup-interval` *`cache-cleanup-interval`*— Time interval at which the NIC proxy removes expired entries from its cache.

Value— Number of seconds in the range 5–2147483
Default—15
Editing Level—Advanced

`cache-entry-age` *`cache-entry-age`*—(Optional) Maximum time that the NIC proxy can cache an entry. The NIC proxy compares this property with the life expectancy of each entry and uses the lower value to determine when to remove the entry.

Value— Number of seconds in the range 0–4294967295

- 0 or unspecified—Life expectancy of the data, which determines expiration of data
- Other values—Actual time that the NIC proxy caches entries

Editing Level—Advanced

Required Privilege Level

system

Required Editing Level

Advanced

shared ims configuration nic-proxy-configuration *name* nic-host-selection

Syntax

```
shared ims configuration nic-proxy-configuration name nic-host-selection {
     groups [groups...];
     selection-criteria (roundRobin | randomPick | priorityList);
}
```

Hierarchy Level

```
[edit shared ims configuration nic-proxy-configuration name nic-host-selection]
```

Description

Configure the mechanism that a NIC proxy uses to select NIC system if multiple systems are available. You use NIC host selection when you use NIC replication.

`groups [groups...]`—(Optional) List of groups of NIC hosts that the NIC proxy can contact for resolution requests.

Value— Names of groups.
Default— No value
Editing Level—Advanced

`selection-criteria (roundRobin | randomPick | priorityList)`— Selection criteria that the NIC proxy uses to determine which NIC host to contact. Configure selection criteria if you configure more than one group.

Value— One of the following criteria:

- roundRobin—NIC proxy selects NIC hosts in a fixed, cyclic order. The NIC proxy always selects the next host in the list.
- randomPick—NIC proxy selects NIC hosts randomly from the list.
- priorityList—NIC proxy selects NIC hosts according to their assigned priorities in the list. If the host with the highest priority in the list is not available, the NIC proxy tries the host with the next-highest priority, and so on.

Use round-robin or random pick to distribute resolution requests among NIC hosts. Use priority list if you prefer to use a particular NIC host; for example, you may reduce operating cost by using a local NIC host.
Default— roundRobin
Editing Level—Advanced

Required Privilege Level

system

Required Editing Level

Advanced

shared ims configuration nic-proxy-configuration *name* nic-host-selection blacklisting

Syntax

```
shared ims configuration nic-proxy-configuration name nic-host-
selection blacklisting {
     try-next-system-on-error;
     number-of-retries-before-blacklisting number-of-retries-before-blacklisting;
     blacklist-retry-interval blacklist-retry-interval;
}
```

Hierarchy Level

```
[edit shared ims configuration nic-proxy-configuration name nic-host-
selection blacklisting]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure how to handle nonresponsive NIC hosts. When a NIC host does not respond, it is blacklisted which means that other NIC hosts are contacted until the blacklisted host becomes available again.

Options

`try-next-system-on-error`—(Optional) Specifies whether or not the NIC proxy should contact the next specified NIC host if a NIC host is determined to be unavailable. Configure this property only if you configure more than one group.

Default—true
Editing Level—Advanced

`number-of-retries-before-blacklisting` *`number-of-retries-before-blacklisting`*— Number of times the NIC proxy tries to communicate with a NIC host before the NIC proxy stops communicating with the NIC host for a period of time.

Value—Integer in the range 0–2147483647
Default—3
Editing Level—Advanced

`blacklist-retry-interval` *`blacklist-retry-interval`*— Interval at which the NIC

proxy attempts to connect to an unavailable NIC host.

Value—Integer in the range 15–2147483647 s
Default—15
Editing Level—Advanced

Required Privilege Level

system

Required Editing Level

Basic

shared ims configuration nic-proxy-configuration *name* resolution

Syntax

```
shared ims configuration nic-proxy-configuration name resolution {
     resolver-name resolver-name;
     key-type key-type;
     value-type value-type;
     expect-multiple-values;
     constraints constraints;
}
```

Hierarchy Level

```
[edit shared ims configuration nic-proxy-configuration name resolution]
```

Description

Configure properties for a NIC proxy (NIC locator), the NIC component that requests information on behalf of an application.

`resolver-name` *`resolver-name`*— NIC resolver that the NIC proxy uses. This resolver must be the same as one that is configured on the NIC host.

Value— Path to the NIC resolver.

Example—/realms/ip/A1,/realms/dn/A1.

Default— No value
Editing Level—Basic

`key-type` *`key-type`*— Type of data used that the key provides for the NIC resolution. You can provide a qualifier to a data type to distinguish between different instances of a data type in a resolution scenario, or to provide information about a data type to clarify the use of that data type in a resolution.

Value— One of the following types:

- Ip—Subscriber's IP address
- Vr—Virtual router
- Interface—Name of router's interface
- InterfaceId—Identifier of an interface on the router
- Dn—LDAP distinguished name for subscriber

- LoginName—Subscriber login ID
- AnyString—Other information

To qualify data types, enter a qualifier within parentheses.

Example—LoginName(username).

Default— No value
Editing Level—Basic

`value-type` *`value-type`*— Type of value to be returned in the resolution. The value type varies according to the application that uses the NIC proxy.

Value— One of the following types:

- SaeId—SAE server ID
- LoginName—Subscriber login ID
- AnyString—Other information

To qualify data types, enter a qualifier within parentheses.

Example—LoginName(username).

Default— No value
Editing Level—Basic

`expect-multiple-values`—(Optional) Specifies whether or not the key can have multiple corresponding values.

Editing Level—Basic

`constraints` *`constraints`*—(Optional) Data type that a resolver uses during the resolution process. A constraint represents a condition that must or may be satisfied before the next stage of the resolution process can proceed.

Configure a constraint only if the constraint will be provided by the application in the resolution request. Typically, you do not need to configure constraints.

Value— Data types of constraints specified for the NIC resolution. Separate data types with commas.
Default— No value
Editing Level—Advanced

Required Privilege Level

system

Required Editing Level

Normal

shared ims configuration nic-proxy-configuration *name* test-nic-bindings

Syntax

```
shared ims configuration nic-proxy-configuration name test-nic-bindings {
     use-test-bindings;
}
```

Hierarchy Level

```
[edit shared ims configuration nic-proxy-configuration name test-nic-bindings]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure key-value mappings to be used to test a NIC resolution.

Options

`use-test-bindings`—(Optional) Test the NIC resolutions without having to configure or run a NIC host. The values returned are those configured in the key-values property.

Default—false
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared ims configuration nic-proxy-configuration *name* test-nic-bindings key-values

Syntax

```
shared ims configuration nic-proxy-configuration name test-nic-bindings key-
values name {
     value;
}
```

Hierarchy Level

```
[edit shared ims configuration nic-proxy-configuration name test-nic-bindings key-
values]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure keys and associated values to use for testing. Define all of values to be returned for specified keys.

Options

name *name*—

Value—Text

value—

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Advanced

shared ims configuration redundancy

Syntax

```
shared ims configuration redundancy {
     event-notification;
     state-synchronization-timeout state-synchronization-timeout;
     state-synchronization;
     state-sync-bulk-size state-sync-bulk-size;
}
```

Hierarchy Level

```
[edit shared ims configuration redundancy]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

Configure IMS failover.

Options

`event-notification`—(Optional) Enables event notification. When event notification is enabled, the SRC Diameter Gateway will send RAR requests if a specific action is specified in the initial AAR and specific events occur.

Default—false
Editing Level—Advanced

`state-synchronization-timeout` *`state-synchronization-timeout`*—(Optional) Time to wait for initial full synchronization request from the SAE after starting or restarting IMS. Incoming requests are blocked when waiting for initial full synchronization. If IMS does not receive any full synchronization signal from the SAE after the configured time, IMS will accept incoming requests from its peer. The suggested waiting time is the sum of state-synchronization batch time and the ping interval.

Value—Integer in the range 0–2147483647 s
Default—120
Editing Level—Normal

`state-synchronization`—(Optional) Enables state synchronization for IMS from the SAE. With state synchronization enabled, the state of the IMS can be synchronized at any time.

Default—false
Editing Level—Basic

`state-sync-bulk-size` *`state-sync-bulk-size`*—(Optional) Number of events that the SAE sends to the SRC Diameter Gateway at one time during state synchronization. This value is used if state synchronization is enabled.

Value—Integer in the range 1–1000
Default— 50
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared ims configuration subscriber-types

Syntax

```
shared ims configuration subscriber-types (ip | login-name) {
     subscriber-id-type (address | login-name | primary-user-name);
     nic-proxy nic-proxy;
}
```

Hierarchy Level

```
[edit shared ims configuration subscriber-types]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a subscriber type.

Options

Subscriber type used to construct the subscriber URI. The subscriber types are the same ones that you can use in applications created with the SAE CORBA remote API.

Value

- `ip`—
- `login-name`—

`subscriber-id-type (address | login-name | primary-user-name)`— Type of information used to identify a subscriber. It is used to pass the correct argument to the subscriber URI.

Value— One of the following types:

- address—Subscriber's IP address
- login-name—Subscriber's login name
- primary-user-name—Primary username

Editing Level—Basic

`nic-proxy` *`nic-proxy`*— Configuration that contains the NIC proxy configuration properties for the subscriber type.

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared ims group

Syntax

```
shared ims group name ...
```

Hierarchy Level

```
[edit shared ims group]
```

Description

Configure group of IMS configuration properties.

Options

`name` *name*— Name of an SRC-IMS configuration.

Value—Text

Required Privilege Level

system

Required Editing Level

Basic

slot *number* ims

Syntax

```
slot number ims {
     shared shared;
}
```

Hierarchy Level

```
[edit slot number ims]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure local properties for IMS.

Options

`shared shared`— The configuration namespace that contains the IP Multimedia Subsystem's configuration data.

Value—Text
Default—/
Editing Level—Basic

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* ims aracf-rq

Syntax

```
slot number ims aracf-rq {
     protocol (tcp | sctp);
     port port;
     address address;
     origin-host origin-host;
     origin-realm origin-realm;
}
```

Hierarchy Level

```
[edit slot number ims aracf-rq]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the A-RACF Rq interface.

`protocol (tcp | sctp)`—(Optional) Protocol to use for the transport connection.

Value— tcp or sctp
Editing Level—Basic

`port` *`port`*—(Optional) Port to use for incoming connections.

Value— Port number
Default—3868
Editing Level—Basic

`address` *`address`*—(Optional) IP address of the local peer.

Value— IP address
Default— 127.0.0.1
Editing Level—Basic

`origin-host` *`origin-host`*—(Optional) Diameter identifier for the endpoint that is the originator of the Diameter message. The Origin-Host AVP (AVP Code 264) is of type

DiameterIdentity and is present in all Diameter messages.

Value—Text
Editing Level—Basic

`origin-realm` *`origin-realm`*—(Optional) Diameter identifier for the realm of the endpoint that is the originator of the Diameter message. The Origin-Realm AVP (AVP Code 296) is of type DiameterIdentity and is present in all Diameter messages.

Value—Text
Editing Level—Basic

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* ims aracf-rq peer

Syntax

```
slot number ims aracf-rq peer name {
     address address;
     port port;
     origin-host origin-host;
     watchdog-timeout watchdog-timeout;
     incoming-queue-limit incoming-queue-limit;
}
```

Hierarchy Level

```
[edit slot number ims aracf-rq peer]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the remote Diameter peers.

Options

`name` *`name`*— Name of SPDF Diameter peer from which this A-RACF accepts connections.

Value—Text

`address` *`address`*—(Optional) IP address of the remote peer.

Value— IP address
Default— 127.0.0.1
Editing Level—Basic

`port` *`port`*—(Optional) TCP port used of the remote peer.

Value— TCP port number
Default— 3868
Editing Level—Basic

`origin-host` *`origin-host`*— Diameter identifier for the endpoint that is the originator of the Diameter message. The Origin-Host AVP (AVP Code 264) is of type DiameterIdentity and is present in all Diameter messages.

Value—Text
Editing Level—Basic

`watchdog-timeout` *`watchdog-timeout`*—(Optional) Watchdog timeout of the connection to the remote peer (in ms).

Value—Text
Default—30000
Editing Level—Basic

`incoming-queue-limit` *`incoming-queue-limit`*—(Optional) Size of incoming message queue, before system rejects messages.

Value—Text
Default—100
Editing Level—Basic

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* ims aracf-rq test templates aar

Syntax

```
slot number ims aracf-rq test templates aar name {
     origin-host origin-host;
     origin-realm origin-realm;
     af-charging-identifier af-charging-identifier;
     authorization-lifetime authorization-lifetime;
     user-name user-name;
     specific-action [(indication-of-bearer-release | indication-of-subscriber-
detachment)...];
}
```

Hierarchy Level

```
[edit slot number ims aracf-rq test templates aar]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

Configure AAR test settings.

Options

`name` *`name`*— Name of AAR message.

Value—Text

`origin-host` *`origin-host`*—(Optional) Diameter identifier for the endpoint that is the originator of the Diameter message.

Value—Text
Editing Level—Basic

`origin-realm` *`origin-realm`*—(Optional) Diameter identifier for the realm of the endpoint that is the originator of the Diameter message.

Value—Text
Editing Level—Basic

`af-charging-identifier` *`af-charging-identifier`*—(Optional) Charging identifier for the Application Function (AF).

Value—Text
Editing Level—Basic

`authorization-lifetime` *`authorization-lifetime`*—(Optional) Timeout for an authorization. The A-RACF interprets this value as a request for a soft-state reservation.

Value—Integer in the range 0–2147483647
Editing Level—Basic

`user-name` *`user-name`*—(Optional) Subscriber name.

Value—Text
Editing Level—Basic

`specific-action [(indication-of-bearer-release | indication-of-subscriber-detachment)...]`—(Optional) Specific actions.

Value

- `indication-of-bearer-release`—
- `indication-of-subscriber-detachment`—

Editing Level—Basic

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* ims aracf-rq test templates aar *name* globally-unique-address

Syntax

```
slot number ims aracf-rq test templates aar name globally-unique-address {
     framed-ip-address framed-ip-address;
}
```

Hierarchy Level

```
[edit slot number ims aracf-rq test templates aar name globally-unique-address]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

Specify the globally unique address AVP.

Options

`framed-ip-address` *framed-ip-address*—(Optional) IPv4 address or fully qualified domain name.

Value—Text
Editing Level—Basic

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* ims aracf-rq test templates aar *name* media-component-description

Syntax

```
slot number ims aracf-rq test templates aar name media-component-
description media-component-number {
     af-application-identifier af-application-identifier;
     media-type (audio | video | data | application | control | text | message |
other);
     flow-status (enabled | removed);
     max-requested-download-bandwidth max-requested-download-bandwidth;
     max-requested-upload-bandwidth max-requested-upload-bandwidth;
}
```

Hierarchy Level

```
[edit slot number ims aracf-rq test templates aar name media-component-
description]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

Configure AAR test settings for service information about media types. The service information is used to determine QoS requirements for the media type.

Options

`media-component-number` *`media-component-number`*— Specify media component number. It contains the ordinal number of a media component

Value—Integer in the range 1–2147483647

`af-application-identifier` *`af-application-identifier`*— Service name.

Value—Text
Editing Level—Basic

`media-type (audio | video | data | application | control | text | message | other)`—(Optional) Media type.

Value— One of the following values:

- audio
- video
- data
- application
- control
- text
- message
- other

Default—0
Editing Level—Basic

`flow-status (enabled | removed)`—(Optional) Action taken for the AAR.

Value

- `enabled`—
- `removed`—

Default— Enabled
Editing Level—Basic

`max-requested-download-bandwidth` *`max-requested-download-bandwidth`*—(Optional) Maximum download bandwidth requested.

Value—Integer in the range 0–2147483647
Editing Level—Basic

`max-requested-upload-bandwidth` *`max-requested-upload-bandwidth`*—(Optional) Maximum upload bandwidth requested.

Value—Integer in the range 0–2147483647
Editing Level—Basic

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* ims aracf-rq test templates aar *name* media-component-description *media-component-number* media-sub-component

Syntax

```
slot number ims aracf-rq test templates aar name media-component-
description media-component-number media-sub-component flow-number {
     flow-description [flow-description...];
     max-requested-download-bandwidth max-requested-download-bandwidth;
     max-requested-upload-bandwidth max-requested-upload-bandwidth;
}
```

Hierarchy Level

```
[edit slot number ims aracf-rq test templates aar name media-component-
description media-component-number media-sub-component]
```

Release Information

Statement introduced in SRC Release 3.1.0

Description

Configure AAR test settings for the QoS and filters for the IP flows.

Options

`flow-number` *`flow-number`*— Flow number; the ordinal number of the IP flow.

Value—Integer in the range 1–2147483647

`flow-description [`*`flow-description`*`...]`—(Optional) Flow description AVP contains the classifier (or filter) information. The syntax of this AVP has the following restrictions:

- Only permit action should be used as action.
- No options shall be used.

A subcomponent may include up to two flow descriptions (uplink and downlink), including:

- Direction(in—uplink or out—downlink)
- Source IP address

- Destination IP address
- Source port
- Destination port
- Protocol

Value—Text
Editing Level—Basic

`max-requested-download-bandwidth` *`max-requested-download-bandwidth`*—(Optional) Maximum download bandwidth requested.

Value—Integer in the range 0–2147483647
Editing Level—Basic

`max-requested-upload-bandwidth` *`max-requested-upload-bandwidth`*—(Optional) Maximum upload bandwidth requested.

Value—Integer in the range 0–2147483647
Editing Level—Basic

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* ims initial

Syntax

```
slot number ims initial {
     static-dn static-dn;
     dynamic-dn dynamic-dn;
}
```

Hierarchy Level

```
[edit slot number ims initial]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure initial properties for SRC components.

Options

`static-dn` *`static-dn`*—(Optional) Location of administrator-defined configuration data in the directory.

Value—Text
Default—ou = staticConfiguration,ou = Configuration,o = Management,
o = umc
Editing Level—Expert

`dynamic-dn` *`dynamic-dn`*—(Optional) Location of programmatically-defined configuration data in the directory.

Value—Text
Default—ou = dynamicConfiguration,ou = Configuration,o = Management,
o = umc
Editing Level—Expert

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* ims initial directory-connection

Syntax

```
slot number ims initial directory-connection {
     url url;
     backup-urls [backup-urls...];
     principal principal;
     credentials credentials;
     protocol (ldaps);
     timeout timeout;
     check-interval check-interval;
     blacklist;
     snmp-agent;
}
```

Hierarchy Level

```
[edit slot number ims initial directory-connection]
```

Description

Configure properties for the directory connection.

Options

`url` *`url`*—(Optional) URL that identifies the location of the primary directory server.

Value— URL
Default—ldap://127.0.0.1:389
Editing Level—Basic

`backup-urls [`*`backup-urls`*`...]`—(Optional) URLs that identify the locations of backup directory servers. Backup servers are used if the primary directory server is not accessible.

Value— List of URLs
Editing Level—Basic

`principal` *`principal`*— DN that the SRC component uses for authentication to access the directory.

Value— DN.

When you specify the DN, you can use < base > to indicate the base DN.

Editing Level—Basic

`credentials` *`credentials`*— Password with which the SRC component accesses the directory.

Value— Password
Editing Level—Basic

`protocol (ldaps)`—(Optional) Security protocol used to connect to the directory. If you do not configure a security protocol, plain socket is used.

Value

- `ldaps`— LDAPS which uses SSL.

Editing Level—Expert

`timeout` *`timeout`*—(Optional) Maximum amount of time during which the directory must respond to a connection request.

Value—Integer in the range 1–2147483647 s
Default—10
Editing Level—Expert

`check-interval` *`check-interval`*—(Optional) Time interval at which the directory monitoring system verifies its connection to the directory. If the directory connection fails after this interval, the directory monitoring system initiates a connection to another directory.

Value—Integer in the range 15–2147483647 s
Default—60
Editing Level—Expert

`blacklist`—(Optional) Specifies whether the directory monitoring system prevents connection to a directory if the directory fails to respond during 10 polling intervals.

Default—false
Editing Level—Basic

`snmp-agent`—(Optional) Specifies whether the SRC SNMP agent exports MIBs for this directory connection.

Default—false
Editing Level—Expert

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* ims initial directory-eventing

Syntax

```
slot number ims initial directory-eventing {
     eventing;
     signature-dn signature-dn;
     polling-interval polling-interval;
     event-base-dn event-base-dn;
     dispatcher-pool-size dispatcher-pool-size;
}
```

Hierarchy Level

```
[edit slot number ims initial directory-eventing]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Change configuration for directory eventing properties. In most cases, you can use the default configuration for these properties.

Options

`eventing`—(Optional) Enable an SRC component to poll the directory for changes.

Default—true
Editing Level—Normal

`signature-dn` *`signature-dn`*—(Optional) DN of the directory entry that specifies the usedDirectory attribute for the SRC CLI. The usedDirectory attribute identifies the vendor of the directory server.

Value— DN
Default—o = umc
Editing Level—Expert

`polling-interval` *`polling-interval`*—(Optional) Interval at which an SRC component polls the directory to check for directory changes.

Value—Integer in the range 15–2147483647 s

Default—30
Editing Level—Normal

`event-base-dn` *`event-base-dn`*—(Optional) DN of an entry superior to the data associated with an SRC component in the directory.

If you are storing non-SRC data in the directory, and that data changes frequently whereas the SRC data does not, you may need to adjust the default value to improve performance. For optimal performance, set the value to the DN of an entry superior to both the SRC data and the changing non-SRC data.

Value— DN
Default—o = UMC
Editing Level—Expert

`dispatcher-pool-size` *`dispatcher-pool-size`*—(Optional) Number of directory change notifications that can be sent simultaneously to the SRC component.

Value—Integer in the range 0–2147483647
Default—1
Editing Level—Expert

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* ims java-orb object-adapter

Syntax

```
slot number ims java-orb object-adapter {
     address address;
}
```

Hierarchy Level

```
[edit slot number ims java-orb object-adapter]
```

Release Information

Statement introduced in SRC-3.2.0 Release

Description

Object adapter internet address configuration

Options

`address` *`address`*—(Optional) Object Adapter Internet Address: IP address on multi-homed host.

Value— IP address
Default— No value
Editing Level—Basic

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* ims logger

Syntax

```
slot number ims logger name ...
```

Hierarchy Level

```
[edit slot number ims logger]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the logging destination.

Options

name *name*— Name used to group parameters for the logging destination.

Value— Text

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* ims logger *name* file

Syntax

```
slot number ims logger name file {
     filter filter;
     filename filename;
     rollover-filename rollover-filename;
     maximum-file-size maximum-file-size;
}
```

Hierarchy Level

```
[edit slot number ims logger name file]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the logging destination for file-based logging.

`filter` *`filter`*—(Optional) Filter to define which event messages the software logs or ignores. Filters can specify the logging level, such as debug, or can specify expressions. For information about expressions, see the documentation that describes how to configure logging.

Value— Log filter
Default— The default value is different for each type of component.
Editing Level—Basic

`filename` *`filename`*— Absolute path of the filename that contains the current logs.

Note: Make sure that the user under which the J2EE application server or Web application server runs has write access to this folder. If this user does not have write access to the default folder, configure the component or application to write logs in folders to which the user has write access.

Value— Filename
Default— By default, SRC components and applications write log files in the folder in which the component or application is started.
Editing Level—Basic

`rollover-filename` *`rollover-filename`*—(Optional) Absolute path of the filename that contains the log history. When the log file reaches the maximum size, the software closes the log file and renames it with the name you specify for the rollover file. If a previous rollover file exists, the software overwrites it. The software then reopens the log file and continues to save event messages in it.

Value— Path of filename

Example—/opt/UMC/sae/var/log/sae.alt

Default— The default value is different for each type of component.
Editing Level—Normal

`maximum-file-size` *`maximum-file-size`*—(Optional) Maximum size of the log file and the rollover file.

Do not set the maximum file size to a value greater than the available disk space.

Value—Integer in the range 0–2147483647 kbytes
Default— 1000000
Editing Level—Normal

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* ims logger *name* syslog

Syntax

```
slot number ims logger name syslog {
     filter filter;
     host host;
     facility facility;
     format format;
}
```

Hierarchy Level

```
[edit slot number ims logger name syslog]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the logging destination for syslog-based logging.

`filter` *`filter`*—(Optional) Filter to define which event messages the software logs or ignores. Filters can specify the logging level, such as debug, or can specify expressions. For information about expressions, see the documentation that describes how to configure logging.

Value— Log filter
Default— The default value is different for each type of component.
Editing Level—Basic

`host` *`host`*— IP address or name of a host that collects event messages by means of a standard system logging daemon.

Value— IP address or hostname
Default—loghost
Editing Level—Basic

`facility` *`facility`*—(Optional) Type of system log in accordance with the system logging protocol.

Value—Integer in the range 0–23
Default— 3

Editing Level—Advanced

`format` *`format`*—(Optional) MessageFormat string that specifies how the information in an event message is printed. (The strings {#} are replaced with the log information [...]).

Value— MessageFormat string as specified in http://java.sun.com/j2se/1.4.2/docs/api/java/text/MessageFormat.html.

The fields available for events are:

- 0—Time and date of the event
- 1—Name of the thread generating the event
- 2—Text message of the event
- 3—Category of the event
- 4—Priority of the event

Editing Level—Advanced

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

show ims aracf-rq peers

Syntax

`show ims aracf-rq peers <peer-name *peer-name*> < (brief) >`

Release Information

Command introduced in SRC Release 3.1.0

Description

Display information for a peer instance.

Options

`peer-name` *`peer-name`*—(Optional) Name of a peer. If no peer name is provided, it will display status for all configured peers.

Value— All or part of the peer name.
Default— No value

(Optional) Output style.

Value

- `brief`— Display only names and connectivity.

Default— Detail

Required Privilege Level

view

show ims statistics aracf rq

Syntax

```
show ims statistics aracf rq
```

Release Information

Command introduced in SRC Release 1.0.0

Description

Display A-RACF Rq statistics, including information about the server process and the current state of the A-RACF Rq interface.

Required Privilege Level

view

show ims statistics aracf rq process

Syntax

```
show ims statistics aracf rq process
```

Release Information

Command introduced in SRC Release 1.0.0

Description

Display information about the IMS server process.

Required Privilege Level

view

test ims aracf-rq aar session-modify

Syntax

`test ims aracf-rq aar session-modify session-id` *`session-id`* `aar-name` *`aar-name`*

Release Information

Command introduced in SRC Release 3.1.0

Description

Simulate AAR request for service modification of an existing Diameter session.

Options

`session-id` *`session-id`*— Session ID to be modified.

Value—Text
Default— No value

`aar-name` *`aar-name`*— Name of AAR message.

Value—Text

Required Privilege Level

view

test ims aracf-rq aar session-start

Syntax

`test ims aracf-rq aar session-start aar-name` *`aar-name`* `<framed-ip-address` *`framed-ip-address`*`> <user-name` *`user-name`*`> <origin-host` *`origin-host`*`> <origin-realm` *`origin-realm`*`>`

Release Information

Command introduced in SRC Release 3.1.0

Description

Simulate initial AAR request for service activations.

Options

`aar-name` *`aar-name`*— Name of AAR for activating service.

Value—Text
Default— No value

`framed-ip-address` *`framed-ip-address`*—(Optional) Subscriber IP address. If specified, this value overrides the value in the AAR message.

Value—Text
Default— No value

`user-name` *`user-name`*—(Optional) Subscriber name. If specified, this value overrides the value in the AAR message.

Value—Text
Default— No value

`origin-host` *`origin-host`*—(Optional) Host of the simulator that generates the AAR packet. If specified, this value overrides the value in the AAR message.

Value—Text
Default— No value

`origin-realm` *`origin-realm`*—(Optional) Origin realm of the simulator that generates this packet. If specified, this value overrides the value in the AAR message.

Value—Text
Default— No value

Required Privilege Level

view

test ims aracf-rq str

Syntax

`test ims aracf-rq str session-id` *`session-id`*

Release Information

Command introduced in SRC Release 3.1.0

Description

Simulate STR requests to deactivate Diameter session.

Options

`session-id` *`session-id`*— Session ID to be terminated.

Value—Text
Default— No value

Required Privilege Level

view

Diameter Application

The following table summarizes the SRC command-line interface (SRC CLI) for supporting the Diameter application. Configuration statements and operational commands are listed in alphabetical order.

Diameter
Configuration Statements
shared network diameter peer
shared network nas-group
shared network nas-group name device-capabilities
shared network nas-group name interface-classifier rule
shared network nas-group name interface-classifier rule name condition
shared network nas-group name interface-classifier rule name script
shared network nas-group name routes
shared network nas-group name routes name term
system diameter
system diameter client
system diameter java-orb object-adapter
system diameter logger
system diameter logger name file
system diameter server
Operational Commands
show diameter statistics
show diameter statistics message-handler
show diameter statistics message-handler message-flow
show diameter statistics process
show diameter statistics requests

show diameter status
show diameter status clients
show diameter status peers

shared network diameter peer

Syntax

```
shared network diameter peer name {
     protocol [(tcp | sctp)...];
     address [address...];
     enforce-source-address;
     local-address local-address;
     connect-timeout connect-timeout;
     watchdog-timeout watchdog-timeout;
     state-machine-timeout state-machine-timeout;
     reconnect-timeout reconnect-timeout;
     port port;
     origin-host origin-host;
     incoming-queue-limit incoming-queue-limit;
     active-peer;
}
```

Hierarchy Level

```
[edit shared network diameter peer]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure the peer in the NAS group.

Options

`name` *`name`*— Name of the peer. The peer name must be unique in the NAS group.

Value—Text

`protocol [(tcp | sctp)...]`— Supported transport protocol.

Value

- `tcp`—TCP
- `sctp`—SCTP

Editing Level—Basic

`address [address...]`— Addresses to which the peer can be connected.

Value—IP address
Editing Level—Basic

`enforce-source-address`—(Optional) Specify whether the remote peer must connect from one of the IP addresses listed by address.

Default—false
Editing Level—Basic

`local-address local-address`—(Optional) Local IP address.

Value—IP address
Editing Level—Expert

`connect-timeout connect-timeout`—(Optional) Connect timeout.

Value—Integer in the range 0–2147483 s
Default—10
Editing Level—Basic

`watchdog-timeout watchdog-timeout`—(Optional) Watchdog timeout used for the connection to the remote peer.

Value—Integer in the range 0–2147483 s
Default—30
Editing Level—Expert

`state-machine-timeout state-machine-timeout`—(Optional) Diameter state machine timeout as specified in RFC 3588.

Value—Integer in the range 0–2147483 s
Default—30
Editing Level—Expert

`reconnect-timeout reconnect-timeout`—(Optional) Time interval between connection attempts when the peer is in the disconnected state.

Value—Integer in the range 0–2147483 s
Default—10
Editing Level—Expert

`port` *`port`*—(Optional) Client port.

Value—Integer in the range 1–65565
Default—3868
Editing Level—Basic

`origin-host` *`origin-host`*—(Optional) The expected origin-host that the peer presents during connection establishment.

Value—Text
Editing Level—Basic

`incoming-queue-limit` *`incoming-queue-limit`*—(Optional) Number of messages of the incoming message queue for a peer. Whenever the number of messages in the queue exceeds any multiple of this limit, the peer connection stops reading incoming requests. Similarly, when the limit is no longer exceeded, the peer connection resumes reading from the operating system transports.

Value—Integer in the range 1–2147483647
Editing Level—Expert

`active-peer`—(Optional) Specify whether the peer connection is in active mode.

Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared network nas-group

Syntax

```
shared network nas-group name {
     hosted-by [hosted-by...];
     peers [peers...];
     scope [scope...];
     default-peer default-peer;
     update-grace-period update-grace-period;
     initial-ppr-delay initial-ppr-delay;
}
```

Hierarchy Level

```
[edit shared network nas-group]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure group of equivalent peers.

Options

`name name`— Name of the NAS group.

Value—Text

`hosted-by [hosted-by...]`— Hosts that instantiate this peer group.

The DIAMETER server is running on every SRC PE host. If the peer group is of type aaa, then the SAEs on the listed hosts will create device drivers for this peer group.

Value—Text
Editing Level—Basic

`peers [peers...]`—(Optional) Peers.

Value—Text
Editing Level—Basic

`scope [scope...]`—(Optional) Service scopes associated with the NAS group. The scopes are available for subscribers connected to this NAS group for selecting customized versions of services.

Value— Text
Default— No value
Editing Level—Basic

`default-peer default-peer`—(Optional) Default peer.

Value—Text
Editing Level—Basic

`update-grace-period update-grace-period`—(Optional) Grace period for interim updates.

Value—Integer in the range 0–2147483647 s
Editing Level—Basic

`initial-ppr-delay initial-ppr-delay`—(Optional) Delay for sending initial policy-install PPRs.

Value—Integer in the range 0–9223372036854775807 ms
Default—0
Editing Level—Expert

Required Privilege Level

system

Required Editing Level

Basic

shared network nas-group *name* device-capabilities

Syntax

```
shared network nas-group name device-capabilities {
     no-user-interim-update;
}
```

Hierarchy Level

```
[edit shared network nas-group name device-capabilities]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Properties describing the NAS device capabilities

Options

`no-user-interim-update`—(Optional) Device does not provide user interim update

Default— No value
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared network nas-group *name* interface-classifier rule

Syntax

```
shared network nas-group name interface-classifier rule name {
     target target;
}
```

Hierarchy Level

```
[edit shared network nas-group name interface-classifier rule]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure an interface classification rule.

Options

`name` *`name`*— Name of the rule in the interface classification script.

Value— Text

`target` *`target`*—(Optional) Result of the classification script that gets returned to the SAE.

Value— Path to a policy group. For example, /sample/junose/DHCP.
Default— No value
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared network nas-group *name* interface-classifier rule *name* condition

Syntax

```
shared network nas-group name interface-classifier rule name condition name ...
```

Hierarchy Level

```
[edit shared network nas-group name interface-classifier rule name condition]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure match conditions used to find a target. You can configure multiple conditions for each classifier rule.

Options

name *name*— Match conditions used to find a target. For more information about configuring match conditions, see *Classifying Interfaces and Subscribers with the SRC CLI* in *SRC PE Subscribers and Subscriptions Guide*.

Value—Text

Required Privilege Level

system

Required Editing Level

Basic

shared network nas-group *name* interface-classifier rule *name* script

Syntax

```
shared network nas-group name interface-classifier rule name script {
     script-value;
     include include;
}
```

Hierarchy Level

```
[edit shared network nas-group name interface-classifier rule name script]
```

Release Information

Statement introduced in SRC Release 3.0.0

Options

script-value—(Optional) Script target. A script that can contain definitions of custom functions that can be called during the matching process. The complete content of the script is interpreted when the classifier is initially loaded. Because you can insert code into a script target, you can use the classification script to perform various tasks.

Value— Script enclosed in quotation marks.
Default— No value
Editing Level—Basic

include *include*—(Optional) Script reference

Value—Text
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared network nas-group *name* routes

Syntax

```
shared network nas-group name routes name {
     precedence precedence;
}
```

Hierarchy Level

```
[edit shared network nas-group name routes]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure Diameter routing configuration.

Options

`name` *name*— Name of the route configuration.

Value—Text

`precedence` *precedence*—(Optional) The order by which the route is selected. The route which meets all the matching criteria and has the lowest precedence is selected first. Routes without the precedence defined are considered after those that have the precedence defined. Route with precedence of -1 is the default route. The default route is considered after all the other routes and only one default route can be defined.

Value—Integer in the range -1–2147483647
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

shared network nas-group *name* routes *name* term

Syntax

```
shared network nas-group name routes name term name {
     transaction-variable (request-packet | user-name | realm);
     dictionary-attribute (user-name | user-password | chap-password | nas-ip-
address | nas-port | service-type | framed-protocol | framed-ip-address | framed-
ip-netmask | framed-mtu | framed-compression | login-ip-host | callback-number |
state | vendor-specific | called-station-id | calling-station-id | nas-identifier
| login-lat-service | login-lat-node | login-lat-group | chap-challenge | nas-
port-type | port-limit | login-lat-port);
     operator (equals | not_equal | present | not_present | prefix | suffix |
range);
     value value;
     low low;
     high high;
}
```

Hierarchy Level

```
[edit shared network nas-group name routes name term]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure the criteria for route selection.

Options

`name` *name*— Name of the matching criteria configuration.

Value—Text

`transaction-variable (request-packet | user-name | realm)`— Name of the transaction variable used as the matching criterion.

Value

- `request-packet`—RequestPacket transaction variable
- `user-name`—User-Name transaction variable
- `realm`—Realm transaction variable

Editing Level—Basic

`dictionary-attribute (user-name | user-password | chap-password | nas-ip-address | nas-port | service-type | framed-protocol | framed-ip-address | framed-ip-netmask | framed-mtu | framed-compression | login-ip-host | callback-number | state | vendor-specific | called-station-id | calling-station-id | nas-identifier | login-lat-service | login-lat-node | login-lat-group | chap-challenge | nas-port-type | port-limit | login-lat-port)`—(Optional) Name of the dictionary attribute contained in the attribute store. Only applicable if the transaction variable is 'request-packet'.

Value

- `user-name`—The name of the user to be authenticated
- `user-password`—The password of the user to be authenticated
- `chap-password`—The response value provided by a PPP CHAP user
- `nas-ip-address`—The identifying IP address of the NAS
- `nas-port`—The physical port number of the NAS
- `service-type`—The type of service the user has requested
- `framed-protocol`—The framing to be used for framed access
- `framed-ip-address`—The address to be configured for the user
- `framed-ip-netmask`—The IP netmask to be configured for the user
- `framed-mtu`—The Maximum Transmission Unit to be configured for user
- `framed-compression`—A compression protocol to be used for the link
- `login-ip-host`—The system with which to connect the user
- `callback-number`—A dialing string to be used for callback
- `state`—A state attribute provided by the RADIUS server
- `vendor-specific`—A vendor-specific extended attribute
- `called-station-id`—The phone number that the user called
- `calling-station-id`—The phone number that the call came from
- `nas-identifier`—A string identifying the NAS originating the request
- `login-lat-service`—The system with which to connect the user by LAT
- `login-lat-node`—The node with which to automatically connect user by LAT
- `login-lat-group`—The LAT group codes which the user is authorized to use
- `chap-challenge`—The challenge sent by the NAS to a PPP CHAP user
- `nas-port-type`—The type of the physical port of the NAS
- `port-limit`—The maximum number of ports to be provided to the user
- `login-lat-port`—The port with which to connect the user by

LAT

Editing Level—Basic

`operator (equals | not_equal | present | not_present | prefix | suffix | range)`— Operator for criterion matching.

Value

- `equals`—Target value equals
- `not_equal`—Target value not equals
- `present`—Target exists
- `not_present`—Target not exists
- `prefix`—Target value starts with
- `suffix`—Target value ends with
- `range`—Target value in the range of

Editing Level—Basic

`value` *`value`*—(Optional) Value to be matched by the target.

Value—Text
Editing Level—Basic

`low` *`low`*—(Optional) Low end of the range criterion.

Value—Integer in the range -2147483648–2147483647
Editing Level—Basic

`high` *`high`*—(Optional) High end of the range criterion.

Value—Integer in the range -2147483648–2147483647
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

system diameter

Syntax

```
system diameter {
     java-heap-size java-heap-size;
     java-new-size java-new-size;
     java-garbage-collection-options java-garbage-collection-options;
     protocol [(tcp | sctp)...];
     local-address [local-address...];
     port port;
     origin-host origin-host;
     origin-realm origin-realm;
     active-peers;
     debug-mode;
     load-balancing-mode (failover | round-robin);
     transaction-processing-log (log-no-messages | log-severe-messages | log-
normal-messages | log-debug-messages);
     packet-trace-log (log-no-messages | log-severe-messages | log-normal-
messages | log-debug-messages);
     peer-state-machine-log (log-no-messages | log-severe-messages | log-normal-
messages | log-debug-messages);
     configuration-log (log-no-messages | log-severe-messages | log-normal-
messages | log-debug-messages);
}
```

Hierarchy Level

```
[edit system diameter]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure DIAMETER application.

Options

`java-heap-size` *`java-heap-size`*— Maximum Java heap (memory) size available to the JRE.

`Value`— Number of megabytes followed by m. For example, 896m. Change this value if you experience problems caused by lack of memory. Set the value lower than the available physical memory to avoid low performance caused by disk swapping. See the documentation for the JRE for valid values.
`Default`— The value is calculated dynamically to 70% of the available real

memory.
Editing Level—Advanced

`java-new-size` *`java-new-size`*— Maximum Java new generation heap (memory) size available to the JRE when the Diameter server starts.

Value— Integer in the range 0– < Java heap size > . Specify the value in bytes or add m for megabytes, k for kilobytes, or g for gigabytes. For example, 200m. See the documentation for the JRE for valid values.
Default— 200m
Editing Level—Advanced

`java-garbage-collection-options` *`java-garbage-collection-options`*— Garbage collection functionality of the Java Virtual Machine.

Value—
Default—-XX:-DontCompileHugeMethods -XX: + UseConcMarkSweepGC -XX:CMSInitiatingOccupancyFraction = 80 -XX: + UseParNewGC -XX: SurvivorRatio = 2 -XX: + CMSConcurrentMTEnabled -XX: ParallelGCThreads = 4 -XX: + CMSParallelSurvivorRemarkEnabled -XX: TargetSurvivorRatio = 90 -XX:ParallelCMSThreads = 4 -XX: MaxTenuringThreshold = 3 -XX:ThreadPriorityPolicy = 1 -XX: + AggressiveOpts -XX: + CMSCompactWhenClearAllSoftRefs -XX: + AlwaysActAsServerClassMachine -XX: + CMSClassUnloadingEnabled -XX: + CMSParallelRemarkEnabled -XX: + CMSScavengeBeforeRemark -XX: + UseGCTaskAffinity -XX: + BindGCTaskThreadsToCPUs -XX: + UseTLAB -XX:TLABSize = 500k -XX: + ResizeTLAB -XX: + TieredCompilation -XX: + UseBiasedLocking -XX: + DontYieldALot
Editing Level—Advanced

`protocol [(tcp | sctp)...]`— Supported transport protocol.

Value

- `tcp`—TCP
- `sctp`—SCTP

Editing Level—Basic

`local-address [`*`local-address`*`...]`—(Optional) Local IP addresses that the remote peers can use to reach this server.

Value—IP address
Default—${interface eth0 unit 0 family inet address}
Editing Level—Basic

`port` *`port`*—(Optional) Server port.

Value—Integer in the range 1–65565
Default—3868
Editing Level—Basic

`origin-host` *`origin-host`*—(Optional) Fully qualified domain name used to identify this host to its DIAMETER peers.

Value—Text
Default— The host name as reported by java.net.InetAddress.getLocalHost().
getCanonicalHostName()
Editing Level—Basic

`origin-realm` *`origin-realm`*—(Optional) The DNS name of the machine used to identify this host to its DIAMETER peers.

Value—Text
Default— The DNS name part of the local hostname as reported by java.net.
InetAddress.getLocalHost().getCanonicalHostName()
Editing Level—Basic

`active-peers`—(Optional) Specify whether the peer connection is in active mode.

Default—true
Editing Level—Basic

`debug-mode`—(Optional) Specify whether the peer connection is in debug mode.

Default—false
Editing Level—Basic

`load-balancing-mode (failover | round-robin)`—(Optional) Strategy used to select a peer to forward a request message.

Value

- `failover`—
- `round-robin`—

Default—failover
Editing Level—Expert

`transaction-processing-log (log-no-messages | log-severe-messages | log-normal-messages | log-debug-messages)`—(Optional) Log level for transaction processing log.

Value

- `log-no-messages`—
- `log-severe-messages`—
- `log-normal-messages`—
- `log-debug-messages`—

Editing Level—Expert

`packet-trace-log (log-no-messages | log-severe-messages | log-normal-messages | log-debug-messages)`—(Optional) Log level for packet trace log.

Value

- `log-no-messages`—
- `log-severe-messages`—
- `log-normal-messages`—
- `log-debug-messages`—

Editing Level—Expert

`peer-state-machine-log (log-no-messages | log-severe-messages | log-normal-messages | log-debug-messages)`—(Optional) Log level for peer state machine log.

Value

- `log-no-messages`—
- `log-severe-messages`—
- `log-normal-messages`—
- `log-debug-messages`—

Editing Level—Expert

`configuration-log (log-no-messages | log-severe-messages | log-normal-messages | log-debug-messages)`—(Optional) Log level for configuration log.

Value

- `log-no-messages`—
- `log-severe-messages`—
- `log-normal-messages`—
- `log-debug-messages`—

Editing Level—Expert

Required Privilege Level

system

Required Editing Level

Basic

system diameter client

Syntax

```
system diameter client {
     threads threads;
     keep-alive-time keep-alive-time;
}
```

Hierarchy Level

```
[edit system diameter client]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure properties for the client.

Options

`threads` *`threads`*—(Optional) Minimum number of threads to use.

Value—Integer in the range -2147483648–2147483647
Default—50
Editing Level—Basic

`keep-alive-time` *`keep-alive-time`*—(Optional) Interval to keep threads alive waiting for new commands.

Value—Integer in the range -9223372036854775808–9223372036854775807 ms
Default—60000
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Advanced

system diameter java-orb object-adapter

Syntax

```
system diameter java-orb object-adapter {
     address address;
}
```

Hierarchy Level

```
[edit system diameter java-orb object-adapter]
```

Release Information

Statement introduced in SRC-3.2.0 Release

Description

Object adapter internet address configuration

Options

`address` *`address`*—(Optional) Object Adapter Internet Address: IP address on multi-homed host.

Value— IP address
Default— No value
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Basic

system diameter logger

Syntax

```
system diameter logger name ...
```

Hierarchy Level

```
[edit system diameter logger]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure the logging destination.

Options

`name` *name*— Name used to group parameters for the logging destination.

Value—Text

Required Privilege Level

system

Required Editing Level

Basic

system diameter logger *name* file

Syntax

```
system diameter logger name file {
     filter filter;
     filename filename;
     rollover-filename rollover-filename;
     maximum-file-size maximum-file-size;
}
```

Hierarchy Level

```
[edit system diameter logger name file]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure logging of messages to a file.

`filter` *`filter`*—(Optional) Filter to define which event messages the software logs or ignores. Filters can specify the logging level, such as debug, or can specify expressions. For information about expressions, see the documentation that describes how to configure logging.

Value— Log filter
Default— The default value is different for each type of component.
Editing Level—Basic

`filename` *`filename`*— Absolute path of the filename that contains the current logs.

Note: Make sure that the user under which the J2EE application server or Web application server runs has write access to this folder. If this user does not have write access to the default folder, configure the component or application to write logs in folders to which the user has write access.

Value— Filename
Default— By default, SRC components and applications write log files in the folder in which the component or application is started.
Editing Level—Basic

`rollover-filename` *`rollover-filename`*—(Optional) Absolute path of the filename that contains the log history. When the log file reaches the maximum size, the software closes the log file and renames it with the name you specify for the rollover file. If a previous rollover file exists, the software overwrites it. The software then reopens the log file and continues to save event messages in it.

Value— Path of filename

Example—/opt/UMC/sae/var/log/sae.alt

Default— The default value is different for each type of component.
Editing Level—Normal

`maximum-file-size` *`maximum-file-size`*—(Optional) Maximum size of the log file and the rollover file.

Do not set the maximum file size to a value greater than the available disk space.

Value—Integer in the range 0–2147483647 kbytes
Default— 1000000
Editing Level—Normal

Required Privilege Level

system

Required Editing Level

Basic

system diameter server

Syntax

```
system diameter server {
     threads threads;
     keep-alive-time keep-alive-time;
}
```

Hierarchy Level

```
[edit system diameter server]
```

Release Information

Statement introduced in SRC Release 3.0.0

Description

Configure properties for the server.

Options

`threads` *`threads`*—(Optional) Minimum number of threads to use.

Value—Integer in the range -2147483648–2147483647
Default—50
Editing Level—Basic

`keep-alive-time` *`keep-alive-time`*—(Optional) Interval to keep threads alive waiting for new commands.

Value—Integer in the range -9223372036854775808–9223372036854775807 ms
Default—60000
Editing Level—Basic

Required Privilege Level

system

Required Editing Level

Advanced

show diameter statistics

Syntax

```
show diameter statistics
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Display Diameter statistics, including information about the server process and the current state of the Diameter server.

Required Privilege Level

view

show diameter statistics message-handler

Syntax

```
show diameter statistics message-handler
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Display statistics for the Diameter message handler.

Required Privilege Level

view

show diameter statistics message-handler message-flow

Syntax

```
show diameter statistics message-handler message-flow <id id>
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Display statistics for Diameter message flows.

Options

`id` *id*—(Optional) Message flow ID filter.

Value— Substring of the message flow ID. If the message flow ID filter is not specified, all message flows are selected.
Default— No value

Required Privilege Level

view

show diameter statistics process

Syntax

```
show diameter statistics process
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Display information about the Diameter server process.

Required Privilege Level

view

show diameter statistics requests

Syntax

```
show diameter statistics requests
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Display information about the Diameter server requests.

Required Privilege Level

view

show diameter status

Syntax

```
show diameter status < (brief) >
```

Release Information

Command introduced in SRC Release 3.0.0

Description

Display Diameter status.

Options

(Optional) Output style.

Value

- `brief`— Display only peer and client names.

Default— Detail

Required Privilege Level

view

show diameter status clients

Syntax

`show diameter status clients <client-name *client-name*>`

Release Information

Command introduced in SRC Release 3.0.0

Description

Display information for a client instance.

Options

`client-name *client-name*`—(Optional) Name of a client.

Value— All or part of the client name.
Default— No value

Required Privilege Level

view

show diameter status peers

Syntax

`show diameter status peers <peer-name *peer-name*>`

Release Information

Command introduced in SRC Release 3.0.0

Description

Display information for a peer instance.

Options

`peer-name` *`peer-name`*—(Optional) Name of a peer.

Value— All or part of the peer name.
Default— No value

Required Privilege Level

view

Juniper Policy Server (JPS)

The following table summarizes the SRC command-line interface (SRC CLI) for the JPS. Configuration statements and operational commands are listed in alphabetical order.

JPS
Configuration Statements
slot number jps
slot number jps am-interface
slot number jps cmts-interface
slot number jps cmts-registry cmts
slot number jps cmts-registry cmts cmts-ip range-pool
slot number jps cmts-registry cmts cmts-ip subnet-pool
slot number jps logger
slot number jps logger name file
slot number jps logger name syslog
slot number jps rks-interface
slot number jps rks-interface am
slot number jps rks-interface rks-pair
Operational Commands
show jps statistics
show jps statistics am
show jps statistics am connections
show jps statistics cmts-locator
show jps statistics cmts
show jps statistics cmts connections
show jps statistics message-handler

show jps statistics message-handler message-flow
show jps statistics process
show jps statistics rks

slot *number* jps

Syntax

```
slot number jps {
     java-heap-size java-heap-size;
     snmp-agent;
     policy-server-id policy-server-id;
     use-psid-in-gate-commands;
     cmts-message-buffer-size cmts-message-buffer-size;
     am-message-buffer-size am-message-buffer-size;
}
```

Hierarchy Level

```
[edit slot number jps]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the Juniper Policy Server (JPS).

Options

`java-heap-size` *`java-heap-size`*— Maximum amount of Java heap (memory) available to the JRE.

Value— Number of megabytes in the format *integer*m
Default—400m
Editing Level—Advanced

`snmp-agent`—(Optional) Enables the JPS to communicate with the SNMP agent.

Editing Level—Basic

`policy-server-id` *`policy-server-id`*—(Optional) Network-wide unique identifier for the JPS that is sent to CMTS devices in Pdp-Config messages and gate commands generated by the JPS.

Value—Integer in the range 0–65535
Default—0

Editing Level—Basic

`use-psid-in-gate-commands`—(Optional) Specifies whether gate control messages (such as gate-info messages) generated by this JPS should contain its policy server identifier. These gate control messages are not generated by an application manager for forwarding by the JPS.

When the JPS is communicating only with PCMM I03 CMTS devices, the value must be true. When the JPS is communicating with any pre-PCMM I03 CMTS devices, the value must be false.

Default—false
Editing Level—Basic

`cmts-message-buffer-size` *`cmts-message-buffer-size`*—(Optional) Maximum number of messages buffered for each CMTS destination.

Value—Integer in the range 1–2147483647
Editing Level—Advanced

`am-message-buffer-size` *`am-message-buffer-size`*—(Optional) Maximum number of messages buffered for each application manager destination.

Value—Integer in the range 1–2147483647
Editing Level—Advanced

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* jps am-interface

Syntax

```
slot number jps am-interface {
     pep-id pep-id;
     listening-address listening-address;
     validate-pcmm-objects;
     message-max-length message-max-length;
     message-read-buffer-size message-read-buffer-size;
     message-write-buffer-size message-write-buffer-size;
     open-connection-timeout open-connection-timeout;
}
```

Hierarchy Level

```
[edit slot number jps am-interface]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the application manager–to–policy server interface (PKT-MM3) so that the policy server can communicate with application managers.

Options

`pep-id` *`pep-id`*—(Optional) Network-wide unique identifier for this JPS instance. Changes apply only to COPS connections that are established after you make the change.

Value—Text
Default—SDX-JPS
Editing Level—Basic

`listening-address` *`listening-address`*—(Optional) Local IP address on which the JPS listens for incoming connections from application managers. If no value is specified, the JPS listens on all IP addresses. Changes take effect only after you restart the JPS.

Value—IP address
Editing Level—Basic

`validate-pcmm-objects`—(Optional) Specifies whether to validate PCMM objects received

from PDPs.

Default—true
Editing Level—Advanced

`message-max-length` *`message-max-length`*—(Optional) Maximum length of incoming messages.

Value—Integer in the range 1–2147483647
Editing Level—Advanced

`message-read-buffer-size` *`message-read-buffer-size`*—(Optional) Size of message read buffer.

Value—Integer in the range 1–2147483647
Editing Level—Advanced

`message-write-buffer-size` *`message-write-buffer-size`*—(Optional) Size of message write buffer.

Value—Integer in the range 1–2147483647
Editing Level—Advanced

`open-connection-timeout` *`open-connection-timeout`*—(Optional) Maximum time to wait for the initial PCMM messages to be exchanged after a TCP connection is established. The connection is dropped when initial PCMM messages are not exchanged within this time period.

Value— Number of seconds in the range 1–65535
Default—5
Editing Level—Advanced

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* jps cmts-interface

Syntax

```
slot number jps cmts-interface {
     cmts-addresses [cmts-addresses...];
     keepalive-interval keepalive-interval;
     synch-despite-unreachable-pep;
     synch-despite-pre-i03-pep;
     use-ssq-ssc-with-pre-i03-pep;
     local-address local-address;
     message-max-length message-max-length;
     message-read-buffer-size message-read-buffer-size;
     message-write-buffer-size message-write-buffer-size;
     open-connection-timeout open-connection-timeout;
     connection-open-retry-interval connection-open-retry-interval;
     sent-message-timeout sent-message-timeout;
     validate-pcmm-objects;
}
```

Hierarchy Level

```
[edit slot number jps cmts-interface]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the policy server–to–CMTS interface (PKT-MM2) so that the policy server can communicate with CMTS devices.

Options

`cmts-addresses [cmts-addresses...]`— IP addresses of all the CMTS devices to which the JPS will try to connect.

Value— List of IP addresses
Editing Level—Basic

`keepalive-interval keepalive-interval`—(Optional) Interval between keepalive messages sent from the COPS client (CMTS device) to the COPS server (JPS). Changes apply only to COPS connections that are established after you make the change.

Value— Number of seconds in the range 0-65535. A value of 0 means that no keepalive messages will be exchanged between the CMTS device and the JPS.
Default—60
Editing Level—Basic

`synch-despite-unreachable-pep`—(Optional) Controls whether synchronization proceeds when the JPS receives a synchronization request from an application manager (such as the SAE) and the JPS is not connected to a CMTS device to which it should be connected.

If a CMTS device is not connected and sync-despite-unreachable-pep is false, synchronization does not proceed and ends with a transport-error in a synch-complete message. If a CMTS device is not connected and sync-despite-unreachable-pep is true, synchronization proceeds only with the connected CMTS devices and ends with a state-data-incomplete error in a synch-complete message.

Default—true
Editing Level—Basic

`synch-despite-pre-i03-pep`—(Optional) Controls whether synchronization proceeds when the JPS receives a synchronization request from an application manager (such as the SAE) and the JPS is connected to a pre-PCMM I03 CMTS device.

If any connected CMTS device is pre-PCMM I03 and sync-despite-pre-i03-pep is false, synchronization does not proceed and ends with a state-data-incomplete error in a synch-complete message. If any connected CMTS device is pre-PCMM I03 and sync-despite-pre-i03-pep is true, synchronization proceeds; whether the pre-PCMM I03 CMTS devices are included in the synchronization depends on the use-ssq-ssc-with-pre-i03-pep value.

Default—true
Editing Level—Basic

`use-ssq-ssc-with-pre-i03-pep`—(Optional) Controls whether synchronization includes both pre-PCMM I03 and PCMM I03 CMTS devices when the JPS receives a synchronization request from an application manager (such as the SAE) and the JPS is connected to a pre-PCMM I03 CMTS device. Relevant only when at least one pre-PCMM I03 CMTS device is connected and sync-despite-pre-i03-pep is specified as true.

If use-ssq-ssc-with-pre-i03-pep is false, synchronization proceeds only with PCMM I03 CMTS devices and ends with a state-data-incomplete error in a synch-complete message. If use-ssq-ssc-with-pre-i03-pep is true, synchronization proceeds with both PCMM I03 and pre-PCMM I03 CMTS devices. With the pre-PCMM I03 CMTS devices, an SSQ solicits Gate–Info–Acks which are filtered based on the original Synch–Request's application manager ID and subscriber ID (if any). The Gate–Info–Acks are transformed into Synch–Reports. Note that if two synchronization attempts must send SSQs to pre-PCMM I03 CMTS devices concurrently, the second attempt is rejected with an insufficient-resources error in a synch-complete message.

Default—false
Editing Level—Basic

`local-address` *`local-address`*—(Optional) Source IP address that the JPS uses to communicate with CMTS devices. If a JPS has only one IP address, this value can be left blank.

Value— IP address. If no value is specified and there is more than one local address, a random local address is used as the source address.
Editing Level—Basic

`message-max-length` *`message-max-length`*—(Optional) Maximum length of incoming messages.

Value—Integer in the range 1–2147483647
Editing Level—Advanced

`message-read-buffer-size` *`message-read-buffer-size`*—(Optional) Size of message read buffer.

Value—Integer in the range 1–2147483647
Editing Level—Advanced

`message-write-buffer-size` *`message-write-buffer-size`*—(Optional) Size of message write buffer.

Value—Integer in the range 1–2147483647
Editing Level—Advanced

`open-connection-timeout` *`open-connection-timeout`*—(Optional) Maximum time to wait for the initial PCMM messages to be exchanged after a TCP connection is established. The connection is dropped when initial PCMM messages are not exchanged within this time period.

Value— Number of seconds in the range 1–65535
Default—5
Editing Level—Advanced

`connection-open-retry-interval` *`connection-open-retry-interval`*—(Optional) Time to wait before the JPS tries to reconnect to CMTS devices.

Value— Number of seconds in the range 1–2147483647
Editing Level—Advanced

`sent-message-timeout` *`sent-message-timeout`*—(Optional) Maximum time to wait for the sent messages to be exchanged after a TCP connection is established. This value must be less than held-decs-max-age and pending-rks-event-max-age of the corresponding RKS

interface.

Value—Integer in the range 1–2147483647 s
Editing Level—Advanced

`validate-pcmm-objects`—(Optional) Specifies whether to validate PCMM objects received from PEPs.

Default—true
Editing Level—Advanced

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* jps cmts-registry cmts

Syntax

`slot *number* jps cmts-registry cmts *cmts-ip* ...`

Hierarchy Level

`[edit slot *number* jps cmts-registry cmts]`

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure a CMTS device to which the JPS can connect and the pools of subscriber IP addresses that are managed by the CMTS device.

Options

`cmts-ip *cmts-ip*`— IP address of the CMTS device.

Value—IP address

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* jps cmts-registry cmts *cmts-ip* range-pool

Syntax

```
slot number jps cmts-registry cmts cmts-ip range-pool pool-index {
     low low;
     high high;
}
```

Hierarchy Level

```
[edit slot number jps cmts-registry cmts cmts-ip range-pool]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure subscriber IP pools in IP address ranges.

Options

`pool-index` *`pool-index`*—Address range pool index

Value—Integer in the range -2147483648–2147483647

`low` *`low`*— First IP address in the IP range for the pool of subscriber IP addresses that are managed by the CMTS device.

Value—IP address
Editing Level—Basic

`high` *`high`*— Last IP address in the IP range for the pool of subscriber IP addresses that are managed by the CMTS device.

Value—IP address
Editing Level—Basic

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* jps cmts-registry cmts *cmts-ip* subnet-pool

Syntax

```
slot number jps cmts-registry cmts cmts-ip subnet-pool subnet {
     exclude [exclude...];
}
```

Hierarchy Level

```
[edit slot number jps cmts-registry cmts cmts-ip subnet-pool]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure subscriber IP pools in IP subnets.

Options

`subnet subnet`— IP address and mask of the subnet for the pool of subscriber IP addresses that are managed by the CMTS device.

Value— IP address/IP mask

`exclude [exclude...]`—(Optional) IP addresses of the subnet that are excluded from the subscriber IP pool managed by the CMTS device.

Value—IP address
Editing Level—Basic

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* jps logger

Syntax

```
slot number jps logger name ...
```

Hierarchy Level

```
[edit slot number jps logger]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the logging destination.

Options

`name` *name*— Name used to group parameters for the logging destination.

Value—Text

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* jps logger *name* file

Syntax

```
slot number jps logger name file {
     filter filter;
     filename filename;
     rollover-filename rollover-filename;
     maximum-file-size maximum-file-size;
}
```

Hierarchy Level

```
[edit slot number jps logger name file]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure logging of messages to a file.

`filter` *`filter`*—(Optional) Filter to define which event messages the software logs or ignores. Filters can specify the logging level, such as debug, or can specify expressions. For information about expressions, see the documentation that describes how to configure logging.

Value— Log filter
Default— The default value is different for each type of component.
Editing Level—Basic

`filename` *`filename`*— Absolute path of the filename that contains the current logs.

Note: Make sure that the user under which the J2EE application server or Web application server runs has write access to this folder. If this user does not have write access to the default folder, configure the component or application to write logs in folders to which the user has write access.

Value— Filename
Default— By default, SRC components and applications write log files in the folder in which the component or application is started.
Editing Level—Basic

`rollover-filename` *`rollover-filename`*—(Optional) Absolute path of the filename that contains the log history. When the log file reaches the maximum size, the software closes the log file and renames it with the name you specify for the rollover file. If a previous rollover file exists, the software overwrites it. The software then reopens the log file and continues to save event messages in it.

Value— Path of filename

Example—/opt/UMC/sae/var/log/sae.alt

Default— The default value is different for each type of component.
Editing Level—Normal

`maximum-file-size` *`maximum-file-size`*—(Optional) Maximum size of the log file and the rollover file.

Do not set the maximum file size to a value greater than the available disk space.

Value—Integer in the range 0–2147483647 kbytes
Default— 1000000
Editing Level—Normal

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* jps logger *name* syslog

Syntax

```
slot number jps logger name syslog {
     filter filter;
     host host;
     facility facility;
     format format;
}
```

Hierarchy Level

```
[edit slot number jps logger name syslog]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure logging of messages to system logging.

`filter` *`filter`*—(Optional) Filter to define which event messages the software logs or ignores. Filters can specify the logging level, such as debug, or can specify expressions. For information about expressions, see the documentation that describes how to configure logging.

Value— Log filter
Default— The default value is different for each type of component.
Editing Level—Basic

`host` *`host`*— IP address or name of a host that collects event messages by means of a standard system logging daemon.

Value— IP address or hostname
Default—loghost
Editing Level—Basic

`facility` *`facility`*—(Optional) Type of system log in accordance with the system logging protocol.

Value—Integer in the range 0–23
Default— 3

Editing Level—Advanced

`format` *`format`*—(Optional) MessageFormat string that specifies how the information in an event message is printed. (The strings {#} are replaced with the log information [...]).

Value— MessageFormat string as specified in http://java.sun.com/j2se/1.4.2/docs/api/java/text/MessageFormat.html.

The fields available for events are:

- 0—Time and date of the event
- 1—Name of the thread generating the event
- 2—Text message of the event
- 3—Category of the event
- 4—Priority of the event

Editing Level—Advanced

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* jps rks-interface

Syntax

```
slot number jps rks-interface {
     element-id element-id;
     local-address local-address;
     local-port [local-port...];
     retry-interval retry-interval;
     local-timeout local-timeout;
     mso-data mso-data;
     mso-domain-name mso-domain-name;
     default-rks-pair default-rks-pair;
     pending-rks-event-max-size pending-rks-event-max-size;
     pending-rks-event-max-age pending-rks-event-max-age;
     held-decs-max-size held-decs-max-size;
     held-decs-max-age held-decs-max-age;
     bcid-cache-size bcid-cache-size;
     bcid-cache-age bcid-cache-age;
     use-default-when-am-requests-unconfigured-rks;
}
```

Hierarchy Level

```
[edit slot number jps rks-interface]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure the the policy server–to–RKS interface (PKT-MM4) so that policy events can be sent to the RKS. As part of the configuration, you can configure RKS pairs and their associated application managers.

Options

`element-id` *`element-id`*— Network-wide unique identifier for RKS event origin.

Value—Integer in the range 0–99999
Editing Level—Basic

`local-address` *`local-address`*—(Optional) Source IP address used to communicate with the RKS. If no value is specified and there is more than one local address, the JPS randomly selects a local address to be used as the source address.

Value—IP address
Editing Level—Basic

`local-port [local-port...]`—(Optional) Source UDP port or a pool of ports used to communicate with the RKS.

Value—Text
Editing Level—Basic

`retry-interval retry-interval`—(Optional) Time the JPS waits for a response from an RKS before it resends the packet. The JPS keeps sending packets until either the RKS acknowledges the packet or the maximum timeout is reached.

Value—Integer in the range 0–2147483647
Editing Level—Basic

`local-timeout local-timeout`—(Optional) Maximum time (ms) the JPS waits for a response from an RKS.

Value—Integer in the range 0–2147483647 ms
Editing Level—Basic

`mso-data mso-data`—(Optional) MSO-defined data in the financial entity ID (FEID) attribute, which is included in event messages.

Value— ASCII character string of 8 bytes; first eight bytes of the FEID attribute.
Editing Level—Basic

`mso-domain-name mso-domain-name`—(Optional) MSO domain name in the financial entity ID (FEID) attribute that uniquely identifies the MSO for billing and settlement purposes.

Value— ASCII character string of up to 239 bytes; begins at the ninth byte of the FEID attribute.
Editing Level—Basic

`default-rks-pair default-rks-pair`—(Optional) Default RKS pair that the JPS uses unless an RKS pair is configured for a given application manager.

Value—Text
Editing Level—Basic

`pending-rks-event-max-size` *`pending-rks-event-max-size`*—(Optional) Maximum number of RKS events waiting for Gate-Set/Del-Ack/Err messages.

Value—Integer in the range 0–2147483647
Editing Level—Advanced

`pending-rks-event-max-age` *`pending-rks-event-max-age`*—(Optional) The oldest age of RKS events waiting for Gate-Set/Del-Ack/Err messages. The maximum age must be greater than sent-message-timeout of the corresponding CMTS interface.

Value— Number of seconds in the range 0–2147483647
Editing Level—Advanced

`held-decs-max-size` *`held-decs-max-size`*—(Optional) Maximum number of outstanding Gate-Info requests.

Value—Integer in the range 0–2147483647
Editing Level—Advanced

`held-decs-max-age` *`held-decs-max-age`*—(Optional) The oldest age of outstanding Gate-Info requests. The maximum age must be greater than sent-message-timeout of the corresponding CMTS interface.

Value— Number of seconds in the range 0–2147483647
Editing Level—Advanced

`bcid-cache-size` *`bcid-cache-size`*—(Optional) Size of billing correlation ID (BCID) cache.

Value—Integer in the range 0–2147483647
Editing Level—Advanced

`bcid-cache-age` *`bcid-cache-age`*—(Optional) The oldest age of billing correlation ID (BCID) in cache.

Value—Integer in the range 0–2147483647 s
Editing Level—Advanced

`use-default-when-am-requests-unconfigured-rks`—(Optional) Specifies whether the default RKS pair is used when an application manager requests the use of an unconfigured RKS pair.

If true, use the default RKS pair (normally used in cases where no RKS pair specific to an

application manager is configured for a given application manager). If false, only use the default RKS pair when no RKS pair specific to an application manager is found.

Default—false
Editing Level—Advanced

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* jps rks-interface am

Syntax

```
slot number jps rks-interface am am-name {
     am-id am-id;
     rks-pair-name rks-pair-name;
     trusted;
}
```

Hierarchy Level

```
[edit slot number jps rks-interface am]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure RKS pairs for associated application managers.

Options

am-name *am-name*— Name used to group parameters for the associated application manager. All parameters that share the same application manager name configure the RKS pair to which events associated with a specific application manager are sent.

Value—Text

am-id *am-id*— Identifier of the application manager. The application manager includes this identifier in all messages that it sends to the JPS. The JPS passes this ID to the CMTS device in gate control messages. The CMTS device returns the ID associated with the gate to the JPS. The JPS sends events associated with this application manager to the RKS pair specified by rks-pair-name with the same application manager name (am-name).

If no value is specified, the RKS pair configuration is not defined for this application manager. If you must set trusted to true without defining the RKS pair configuration, you must specify a value for am-id and not specify a value for rks-pair-name.

Value—Integer in the range 0–2147483647
Editing Level—Basic

rks-pair-name *rks-pair-name*—(Optional) RKS pair that the JPS will send events to

when those events are triggered by gate transitions associated with the application manager specified by am-id with the same application manager name (am-name).

If no value is specified, the RKS pair configuration is not defined for this application manager. Use when you must set trusted to true without defining the RKS pair configuration.

Value—Text
Editing Level—Basic

`trusted`—(Optional) Specifies whether this application manager is a trusted network element to the JPS.

If an application manager is trusted by the JPS and it provides a billing correlation ID (BCID) as part of a gate-set message, the JPS reuses the BCID provided by the application manager instead of generating a new one. If an application manager is trusted by the JPS and it specifies an RKS pair as part of a gate-set message, the JPS uses the RKS pair supplied by the application manager instead of using the one specified by rks-pair-name (which might not be defined in the JPS configuration). However, the RKS pair specified by the application manager is used only if the RKS pair exists in the JPS configuration. If the application manager specifies an RKS pair that does not exist in the JPS configuration, the default RKS pair is used.

Editing Level—Basic

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

slot *number* jps rks-interface rks-pair

Syntax

```
slot number jps rks-interface rks-pair rks-pair-name {
     primary-address primary-address;
     primary-port primary-port;
     secondary-address secondary-address;
     secondary-port secondary-port;
}
```

Hierarchy Level

```
[edit slot number jps rks-interface rks-pair]
```

Release Information

Statement introduced in SRC Release 1.0.0

Description

Configure RKS pairs. When running more than one JPS in a group to provide redundancy, all the JPSs in that group must have same RKS pair configuration (including the default RKS pair and any configured RKS pairs associated with a specific application manager).

Options

`rks-pair-name` *`rks-pair-name`*—RKS pair name

Value—Text

`primary-address` *`primary-address`*— IP address of the primary RKS for this RKS pair.

Value—IP address
Editing Level—Basic

`primary-port` *`primary-port`*—(Optional) UDP port on the primary RKS to which the JPS sends events.

Value—Integer in the range 1–65535
Default—1813
Editing Level—Basic

`secondary-address` *`secondary-address`*—(Optional) IP address of the secondary RKS for this RKS pair.

Value—IP address
Editing Level—Basic

`secondary-port` *`secondary-port`*—(Optional) UDP port on the secondary RKS to which the JPS sends events.

Value—Integer in the range 1–65535
Default—1813
Editing Level—Basic

Required Privilege Level

No specific privilege required.

Required Editing Level

Basic

show jps statistics

Syntax

```
show jps statistics
```

Release Information

Command introduced in SRC Release 1.0.0

Description

Display JPS statistics, including information about the server process and the current state of the JPS.

Required Privilege Level

view

show jps statistics am

Syntax

```
show jps statistics am
```

Release Information

Command introduced in SRC Release 1.0.0

Description

Display statistics for the application manager-to-policy server interface.

Required Privilege Level

view

show jps statistics am connections

Syntax

```
show jps statistics am connections <ip-address ip-address>
```

Release Information

Command introduced in SRC Release 1.0.0

Description

Display statistics for JPS application manager connections.

Options

`ip-address` *`ip-address`*—(Optional) IP address for the application manager.

Value— All or part of the IP address. If the IP address filter is not specified, all application managers are selected.
Default— No value

Required Privilege Level

view

show jps statistics cmts-locator

Syntax

```
show jps statistics cmts-locator
```

Release Information

Command introduced in SRC Release 1.0.0

Description

Display statistics for the CMTS locator.

Required Privilege Level

view

show jps statistics cmts

Syntax

```
show jps statistics cmts
```

Release Information

Command introduced in SRC Release 1.0.0

Description

Display JPS statistics for the policy server-to-CMTS interface.

Required Privilege Level

view

show jps statistics cmts connections

Syntax

```
show jps statistics cmts connections <ip-address ip-address>
```

Release Information

Command introduced in SRC Release 1.0.0

Description

Display statistics for JPS CMTS connections.

Options

`ip-address` *`ip-address`*—(Optional) IP address for the CMTS device.

Value— All or part of the IP address. If the IP address filter is not specified, all CMTS devices are selected.
Default— No value

Required Privilege Level

view

show jps statistics message-handler

Syntax

```
show jps statistics message-handler
```

Release Information

Command introduced in SRC Release 1.0.0

Description

Display statistics for the JPS message handler.

Required Privilege Level

view

show jps statistics message-handler message-flow

Syntax

```
show jps statistics message-handler message-flow <id id>
```

Release Information

Command introduced in SRC Release 1.0.0

Description

Display statistics for JPS message flows.

Options

`id id`—(Optional) Identifier for message flow.

Value— All or part of the message flow ID. If the message flow ID filter is not specified, all message flows are selected.
Default— No value

Required Privilege Level

view

show jps statistics process

Syntax

```
show jps statistics process
```

Release Information

Command introduced in SRC Release 1.0.0

Description

Display information about the JPS server process.

Required Privilege Level

view

show jps statistics rks

Syntax

```
show jps statistics rks
```

Release Information

Command introduced in SRC Release 1.0.0

Description

Display JPS statistics for the policy server-to-RKS interface.

Required Privilege Level

view