

Chapter 30

Summary of Accounting Options Configuration Statements

The following sections explain each of the accounting options configuration statements. The statements are organized alphabetically.

accounting-options

Syntax	accounting-options {...}
Hierarchy Level	[edit]
Description	Configure options for accounting statistics collection.
Usage Guidelines	See “Configure Accounting Options” on page 261.
Required Privilege Level	interface—To view this statement in the configuration. interface-control—To add this statement to the configuration.

archive-sites

Syntax	archive-sites { <i>site-name</i> ; }
Hierarchy Level	[edit accounting-options file <i>filename</i>]
Description	Configure an archive site. If more than one site name is configured, an ordered list of archive sites for the accounting-data log files is created. When a file is archived, the router attempts to transfer the file to the first URL in the list, moving to the next site only if the transfer does not succeed. The log file is stored at the archive site with a filename of the format <i>router-name_log-filename_timestamp</i> .
Options	<i>site-name</i> —Any valid FTP URL to a destination. For information on how to specify valid FTP URLs, see the <i>JUNOS Internet Software Configuration Guide: Getting Started</i> .
Usage Guidelines	See “Configure Archive Sites” on page 265.
Required Privilege Level	interface—To view this statement in the configuration. interface-control—To add this statement to the configuration.

class-usage-profile

Syntax class-usage-profile *profile-name* {
 file *filename*;
 interval *minutes*;
 source-classes {
 source-class-name;
 }
 destination-classes {
 destination-class-name
 }
}

Hierarchy Level [edit accounting-options]

Description Create a class usage profile, which is used to log class usage statistics to a file in the /var/log directory. The class usage profile logs class usage statistics for the configured source classes on every interface that has destination-class-usage configured.

For information on configuring source classes, see the *JUNOS Software Configuration Guide: Routing and Routing Protocols*. For information on configuring source class usage, see the *JUNOS Software Configuration Guide: Interfaces and Class of Service*.

Options *profile-name*—Name of the destination class profile.

The remaining statements are explained separately.

Usage Guidelines See “Configure Class Usage Profiles” on page 276.

Required Privilege Level interface—To view this statement in the configuration.
 interface-control—To add this statement to the configuration.

counters

Syntax counters {
 counter-name;
}

Hierarchy Level [edit accounting-options filter-profile *profile-name*]

Description Names of counters for which filter profile statistics are collected. The packet and byte counts for the counters are logged to a file in the /var/log directory.

Options *counter-name*—Name of the counter.

Usage Guidelines See “Configure the Counters” on page 269.

Required Privilege Level interface—To view this statement in the configuration.
 interface-control—To add this statement to the configuration.

destination-classes

Syntax	destination-classes <i>destination-class-name</i> ;
Hierarchy Level	[edit accounting-options class-usage-profile <i>profile-name</i>]
Description	Specify the destination classes for which statistics are collected.
Options	<i>destination-class-name</i> —Name of the destination class to include in the source class usage profile.
Usage Guidelines	See “Configure a Class Usage Profile” on page 276.
Required Privilege Level	interface—To view this statement in the configuration. interface-control—To add this statement to the configuration.

fields

fields (for interface profiles)

Syntax	fields { <i>field-name</i> ; }
Hierarchy Level	[edit accounting-options interface-profile <i>profile-name</i>]
Description	Statistics to collect in an accounting-data log file for an interface.
Options	<i>field-name</i> —Name of the field: input-bytes—Input bytes input-errors—Generic input error packets input-multicast—Input packets arriving by multicast input-packets—Input packets input-unicast—Input unicast packets output-bytes—Output bytes output-errors—Generic output error packets output-multicast—Output packets sent by multicast output-packets—Output packets output-unicast—Output unicast packets
Usage Guidelines	See “Configure the Interface Profile” on page 266.
Required Privilege Level	interface—To view this statement in the configuration. interface-control—To add this statement to the configuration.

fields (for Routing Engine profiles)

Syntax fields {
 field-name;
 }

Hierarchy Level [edit accounting-options routing-engine-profile *profile-name*]

Description Statistics to collect in an accounting-data log file for a Routing Engine.

Options *field-name*—Name of the field:

cpu-load-1—Average system load over the last 1 minute

cpu-load-5—Average system load over the last 5 minutes

cpu-load-15—Average system load over the last 15 minutes

date—Date in YYYYMMDD format

host-name—Hostname for the router

time-of-day—Time of day in HHMMSS format

uptime—Time since last reboot in seconds

Usage Guidelines See “Configure the Routing Engine Profile” on page 278.

Required Privilege Level interface—To view this statement in the configuration.
 interface-control—To add this statement to the configuration.

file

file (create a log file)

Syntax	file <i>filename</i> { archive-sites { <i>site-name</i> ; } files <i>number</i> size <i>bytes</i> transfer-interval <i>minutes</i> ; }
Hierarchy Level	[edit accounting-options]
Description	Information on a log file used for accounting data.
Options	files <i>number</i> —The maximum number of files. When a log file (for example, profilelog) reaches its maximum size, it is renamed profilelog.0, then profilelog.1, and so on, until the maximum number of log files is reached. Then the oldest log file is overwritten. The minimum value for <i>number</i> is 3 and the default value is 10. The remaining statements are explained separately.
Usage Guidelines	See “Configure the Maximum Number of Files” on page 265.
Required Privilege Level	interface—To view this statement in the configuration. interface-control—To add this statement to the configuration.

file (for a profile to use)

Syntax	file <i>filename</i> ;
Hierarchy Level	[edit accounting-options class-usage-profile <i>profile-name</i>], [edit accounting-options filter-profile <i>profile-name</i>], [edit accounting-options interface-profile <i>profile-name</i>], [edit accounting-options routing-engine-profile <i>profile-name</i>]
Description	The accounting log file to use.
Options	<i>filename</i> —Name of the log file. You must specify a <i>filename</i> already configured in the file statement at the [edit accounting-options] hierarchy level.
Usage Guidelines	See “Configure the Interface Profile” on page 266, “Configure the Filter Profile” on page 268, and “Configure the Routing Engine Profile” on page 278.
Required Privilege Level	interface—To view this statement in the configuration. interface-control—To add this statement to the configuration.

filter-profile

Syntax filter-profile *profile-name* {
 counters {
 counter-name;
 }
 file *filename*;
 interval *minutes*;
 }

Hierarchy Level [edit accounting-options]

Description Create a profile to filter and collect packet and byte count statistics and write them to a file in the /var/log directory. To apply the profile to a firewall filter, you include the accounting-profile statement at the [edit firewall filter *filter-name*] hierarchy level. For more information on firewall filters, see the *JUNOS Software Configuration Guide: Interfaces and Class of Service*.

Options *profile-name*—Name of the filter profile.

The remaining statements are explained separately.

Usage Guidelines See “Configure the Filter Profile” on page 268.

Required Privilege Level interface—To view this statement in the configuration.
 interface-control—To add this statement to the configuration.

interface-profile

Syntax interface-profile *profile-name* {
 fields {
 field-name;
 }
 file *filename*;
 interval *minutes*;
 }

Hierarchy Level [edit accounting-options]

Description Create a profile to filter and collect error and packet statistics and write them to a file in the /var/log directory. You can specify an interface profile for either a physical or a logical interface.

Options *profile-name*—Name of the interface profile.

The remaining statements are explained separately.

Usage Guidelines See “Configure the Interface Profile” on page 266.

Required Privilege Level interface—To view this statement in the configuration.
 interface-control—To add this statement to the configuration.

interval

Syntax	interval <i>minutes</i> ;
Hierarchy Level	[edit accounting-options class-usage-profile <i>profile-name</i>], [edit accounting-options filter-profile <i>profile-name</i>], [edit accounting-options interface-profile <i>profile-name</i>], [edit accounting-options routing-engine-profile <i>profile-name</i>]
Description	How often statistics are collected for the accounting profile.
Options	<i>minutes</i> —Amount of time between each collection of statistics. Range: 1 through 2880 minutes Default: 30 minutes
Usage Guidelines	See “Configure the Interface Profile” on page 266, “Configure the Filter Profile” on page 268, and “Configure the Routing Engine Profile” on page 278.
Required Privilege Level	interface—To view this statement in the configuration. interface-control—To add this statement to the configuration.

routing-engine-profile

Syntax	routing-engine-profile <i>profile-name</i> { fields { <i>field-name</i> ; } file <i>filename</i> ; interval <i>minutes</i> ; }
Hierarchy Level	[edit accounting-options]
Description	Create a Routing Engine profile to collect selected Routing Engine statistics and write them to a file in the /var/log directory.
Options	<i>profile-name</i> —Name of the Routing Engine statistics profile. The remaining statements are explained separately.
Usage Guidelines	See “Configure the Routing Engine Profile” on page 278.
Required Privilege Level	interface—To view this statement in the configuration. interface-control—To add this statement to the configuration.

size

Syntax	<code>size bytes;</code>
Hierarchy Level	[edit accounting-options file <i>filename</i>]
Description	Attributes of an accounting-data log file.
Options	<p><code>size bytes</code>—Maximum size of each log file, in bytes, kilobytes (KB), megabytes (MB), or gigabytes (GB). When a log file (for example, <code>profilelog</code>) reaches its maximum size, it is renamed <code>profilelog.0</code>, then <code>profilelog.1</code>, and so on, until the maximum number of log files is reached. Then the oldest log file is overwritten. If you do not specify a size, the file is closed, archived, and renamed when the time specified for the transfer interval is exceeded.</p> <p>Syntax: <i>x</i> to specify bytes, <i>xk</i> to specify KB, <i>xm</i> to specify MB, <i>xg</i> to specify GB</p> <p>Range: 256 KB through 1 GB</p>
Usage Guidelines	See “Configure the Maximum Size of the File” on page 264.
Required Privilege Level	<p>interface—To view this statement in the configuration.</p> <p>interface-control—To add this statement to the configuration.</p>

source-classes

Syntax	<pre>source-classes { source-class-name;</pre>
Hierarchy Level	[edit accounting-options class-usage-profile <i>profile-name</i>]
Description	Specify the source classes for which statistics are collected.
Options	<code>source-class-name</code> —Name of the source class to include in the class usage profile.
Usage Guidelines	See “Configure a Class Usage Profile” on page 276.
Required Privilege Level	<p>interface—To view this statement in the configuration.</p> <p>interface-control—To add this statement to the configuration.</p>

transfer-interval

Syntax	<code>transfer-interval minutes;</code>
Hierarchy Level	[edit accounting-options file <i>filename</i>]
Description	Time the file remains open and receiving new statistics before it is closed and transferred to an archive site.
Options	<p><code>transfer-interval minutes</code>—Time the file remains open and receiving new statistics before it is closed and transferred to an archive site.</p> <p>Range: 15 through 2880 minutes</p> <p>Default: 30 minutes</p>
Usage Guidelines	See “Configure the Transfer Interval of the File” on page 265.
Required Privilege Level	<p>interface—To view this statement in the configuration.</p> <p>interface-control—To add this statement to the configuration.</p>