

## Configuring 802.1X RADIUS Accounting (CLI Procedure)

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RADIUS accounting permits statistical data about users logging onto or off a LAN to be collected and sent to a RADIUS accounting server. The statistical data gathered can be used for general network monitoring, to analyze and track usage patterns, or to bill a user based upon the amount of time or type of services accessed.

To configure basic RADIUS accounting using the CLI:

1. Specify the accounting servers to which the switch will forward accounting statistics:

```
[edit access]
user@switch# set profile profile1 radius accounting-server [122.69.1.250
122.69.1.252]
```

2. Define the RADIUS accounting servers:

```
[edit access]
user@switch# set radius-server 122.69.1.250 secret juniper
user@switch# set radius-server 122.69.1.252 secret juniper1
```

3. Enable accounting for an access profile:

```
[edit access]
user@switch# set profile profile1 accounting
```

4. Configure the RADIUS servers to use while sending accounting messages and updates:

```
[edit access]
user@switch# set profile profile1 accounting order radius none
```

5. Configure the statistics to be collected on the switch and forwarded to the accounting server:

```
[edit access]
user@switch# set profile profile1 accounting order stop-on-access-deny
user@switch# set profile profile1 accounting order stop-on-failure
```

6. Display accounting statistics collected on the switch:

```
user@switch> show network-access aaa statistics accounting
```

```
Accounting module statistics
Requests received: 1
Accounting Response failures: 0
```

```
Accounting Response Success: 1
Requests timedout: 0
```

7. Open an accounting log on the RADIUS accounting server using the server's address, and view accounting statistics:

```
[root@freeradius]# cd /usr/local/var/log/radius/radacct/122.69.1.250
[root@freeradius 122.69.1.250]# ls
```

```
detail-20071214
```

```
[root@freeradius 122.69.1.250]# vi details-20071214
```

```
User-Name = "000347e1bab9"
NAS-Port = 67
Acct-Status-Type = Stop
Acct-Session-Id = "802.1x811912"
Acct-Input-Octets = 17454
Acct-Output-Octets = 4245
Acct-Session-Time = 1221041249
Acct-Input-Packets = 72
Acct-Output-Packets = 53
Acct-Terminate-Cause = Lost-Carrier
Acct-Input-Gigawords = 0
Acct-Output-Gigawords = 0
Called-Station-Id = "00-19-e2-50-52-60"
Calling-Station-Id = "00-03-47-e1-ba-b9"
Event-Timestamp = "Sep 10 2008 16:52:39 PDT"
NAS-Identifier = "esp48t-1b-01"
NAS-Port-Type = Virtual
```

```
User-Name = "000347e1bab9"
NAS-Port = 67
Acct-Status-Type = Start
Acct-Session-Id = "802.1x811219"
Called-Station-Id = "00-19-e2-50-52-60"
Calling-Station-Id = "00-03-47-e1-ba-b9"
Event-Timestamp = "Sep 10 2008 18:58:52 PDT"
NAS-Identifier = "esp48t-1b-01"
NAS-Port-Type = Virtual
```

- Related Topics**
- Example: Connecting a RADIUS Server for 802.1X to an EX-series Switch
  - Understanding 802.1X and AAA Accounting on EX-series Switches