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CHAPTER 1
Introduction to SonicWALL ViewPoint

Monitoring critical network events and activity, such as security threats, inappropriate Web use, and bandwidth levels, is an essential component of network security. ViewPoint Reporting complements SonicWALL's Internet security offerings by providing detailed and comprehensive reports of network activity.

The ViewPoint Reporting Module is a software application that creates dynamic, Web-based network reports. The ViewPoint Reporting Module generates both real-time and historical reports to offer a complete view of all activity through SonicWALL Internet security appliances. With ViewPoint Reporting, you can monitor network access, enhance security, and anticipate future bandwidth needs.

The ViewPoint Reporting Module:

- Displays bandwidth use by IP address and service
- Identifies inappropriate Web use
- Provides detailed reports of attacks
- Collects and aggregates system and network errors
- Shows VPN events and problems
- Presents visitor traffic to your Web site
- Provides detailed daily firewall logs to analyze specific events.

**Note**

The ViewPoint Reporting Module receives its information from the stream of syslog data sent by each SonicWALL appliance and stores it in the SonicWALL ViewPoint database or as files on the hard-disk. ViewPoint Reporting can be enabled or disabled. Once disabled, the Reports tab disappears from the SonicWALL ViewPoint User Interface (UI) and the syslog data is no longer stored.
Distributed Summarizer

The Distributed Summarizer provides improved performance over the old Scheduler. The following describes the processing and summarization process of the Distributed Summarizer:

- As incoming events are sent to the Agent, they are written to a file in the `<gms_directory>/logs` directory. The format of the file is:
  
  `agentid_start-date_start-time_to_end-date_end-time.unp`

  where `agentid` is the ID of the agent, `start-date` is the starting date (YYYYDD), `start-time` is the starting time (HHMMSS), `end-date` is the ending date, and `end-time` is the ending time.

- When the file contains 10,000 lines, the Distributed Summarizer closes the file and begins creating a new one.

- At the interval you specify, the Distributed Summarizer changes the extension of the file to `.prg` and begins processing the file and storing its information as summarized data. It repeats this process for every file ending with the extension `.unp`.

- After it processes a file, it changes its extension to `.PRD`.

If you choose to use the Distributed Summarizer, you will need to periodically delete files with the `.PRD` extension to prevent your disk from filling. Additionally, the Distributed Summarizer does not store raw data, so no information will appear in the log viewer.

License and Registration Requirements

Registering your ViewPoint service requires:

- **mySonicWALL.com account.** A mySonicWALL.com account allows you to manage your SonicWALL products. You need to register your SonicWALL security appliance to activate SonicWALL security services. Creating a mySonicWALL.com is fast, simple, and FREE. Simply complete an online registration form directly from your SonicWALL security appliance management interface. Your mySonicWALL.com account is also accessible at <https://www.mysonicwall.com> from any Internet connection with a Web browser.

- **Registered SonicWALL Security Appliance with Active Internet Connection.** Registering your SonicWALL security appliance is a simple procedure done directly from the management interface. Once your SonicWALL security appliance is registered, you can activate your SonicWALL security service using an activation key.
Navigating ViewPoint Reporting

ViewPoint Reporting is a robust and powerful tool you can use view detailed reports for individual SonicWALL appliances or groups of appliances.

This section describes each view and what to consider when making changes. Select from the following:

- Global and Group Views— see “Global Views,” below.
- Unit View— see “Unit View” on page 6.

Global Views

From the Global and Group views of the Reports Panel, Summary and Over Time reports are available for all SonicWALL appliances within a group or all SonicWALL appliances being managed by SonicWALL ViewPoint.

To open the Global or Group view, click the Global View icon in the upper-left hand corner of the left pane or select a Group Icon. The Global Status page displays:

Figure 1  Global Status Page

As you navigate the SonicWALL ViewPoint Reports Panel screens with the Global or Group view selected and view different reports, the settings that you specify are maintained in effect throughout the session.
Global and Group View Reports

The following lists all Global and Group View Reports:

- General
  - Status
- At A Glance
  - Summary
- Bandwidth
  - Summary
  - Over Time
- ROI
  - Summary
  - Over Time
- Web Usage
  - Summary
  - Over Time
- Browse Time
  - Summary
  - Over Time
- Web Filter
  - Summary
  - Over Time
- FTP Usage
  - Summary
  - Over Time
- Mail Usage
  - Summary
  - Over Time
- VPN Usage
  - Summary
  - Over Time
- Attacks
• Navigating ViewPoint Reporting
  – Summary
  – Errors
  – Attacks Over Time
  – Errors Over Time
• Virus Attacks
  – Summary
  – Over Time
• Anti-Spyware
  – Summary
  – Over Time
• Intrusion Prevention
  – Summary
  – Over Time
• Configuration
  – Scheduled Reports
  – Summarizer Settings
  – At A Glance
• Real-Time Viewer
  – Syslog
Unit View

From the Unit view of the Reports panel, reports contain detailed data for the selected SonicWALL appliance. To open the Unit view, click the Reports tab. Then, click a SonicWALL appliance in the left pane of the SonicWALL ViewPoint UI. The Reports page for the SonicWALL appliance displays.

**Figure 2 Unit Status Page**

As you navigate the Reports panel with a single SonicWALL appliance selected and change settings, those settings will remain in effect throughout the session.

**Unit View Reports**

The following lists all Global and Group View Reports:

- General
  - Status
- At A Glance
  - Summary
- Bandwidth
  - Summary
  - Top Users
  - Over Time
  - Top Users Over Time
• ROI
  – Summary
  – Top Users
  – Over Time
  – Top Users Over Time
• Services
  – Summary
• Web Usage
  – Summary
  – Top Sites
  – Top Users
  – By User
  – By Site
  – By Category
  – Over Time
  – Top Sites Over Time
  – Top Users Over Time
  – By Users Over Time
  – By Category Over Time
• Browse Time
  – Summary
  – Top Users
  – By User
  – Over Time
  – Top Users Over Time
  – By User Over Time
• Web Filter
  – Summary
  – Top Sites
  – Top Users
  – By User
  – By Site
Navigating ViewPoint Reporting

- By Category
- Over Time
- Top Sites Over Time
- Top Users Over Time
- By Users Over Time
- By Category Over Time

• FTP Usage
  - Summary
  - Top Users
  - Over Time
  - Top Users Over Time

• Mail Usage
  - Summary
  - Top Users
  - Over Time
  - Top Users Over Time

• VPN Usage
  - Summary
  - Top Users
  - Over Time
  - Top Users Over Time
  - By Policy
  - By Policy Over Time
  - By Policy Hourly
  - By Service

• Attacks
  - Summary
  - By Category
  - Errors
  - Attacks Over Time
  - Categories Over Time
  - Errors Over Time
• Virus Attacks
  – Summary
  – Top Viruses
  – Over Time
  – Top Viruses Over Time
• Anti-Spyware
  – Summary
  – By Category
  – Over Time
  – By Category Over Time
• Intrusion Prevention
  – Summary
  – By Category
  – Over Time
  – By Category Over Time
• Authentication
  – User Login
  – Admin Login
  – Failed Login
• Configuration
  – Scheduled Reports
  – Summarizer Settings
  – At A Glance
• Log Viewer
  – Search
• Real-Time Viewer
  – Bandwidth
  – Services
  – Syslog
CHAPTER 2
Installing SonicWALL ViewPoint

This chapter describes how to install or upgrade SonicWALL ViewPoint.

To install SonicWALL ViewPoint, complete the following procedures:

• Review the installation requirements. See “Installation Overview” on page 11.
• Install SonicWALL ViewPoint, see “Installation” on page 12.
• Register SonicWALL ViewPoint, see “Installation” on page 12.

Installation Overview

In order to install and run SonicWALL ViewPoint, you must be logged in as the administrator and the SonicWALL ViewPoint server must meet the following requirements:

• Microsoft Windows 2000 or Windows XP Professional Version 2002 Service Pack 2
• If accessed from the WAN interface, the SonicWALL appliance must have a static IP address. Otherwise, it may have either a static or dynamic IP address.
• Local and remote browser access: Microsoft Internet Explorer 6.x
• 750 MHz or faster processor
• Minimum 512 MB RAM
• At least 85 MB of free disk space
Installation

When you are ready to install SonicWALL ViewPoint, perform the following steps:

1. Log on to the computer as administrator.

2. Insert the SonicWALL ViewPoint CD-ROM or locate the SonicWALL ViewPoint install file on the network. Double-click the setup.exe. The Introduction screen displays.

3. Click Next. The License Agreement screen displays.

4. Select from the following:
   - To accept the terms of the license agreement, select I accept the terms of the License Agreement and click Next. The Choose Install Folder screen displays.
   - To not accept the terms, select I do NOT accept the terms of the License Agreement and click Next. The SonicWALL ViewPoint installation program closes and the product will not install.

5. To accept the default location, click Next. To select a different location, click Choose and select a folder. Click Next.

   The Settings screen displays. Do the following:
   - Enter the IP address or host name of the Simple Mail Transfer Protocol (SMTP) server in the SMTP Server Address field.
   - Enter the number of the web server port in the Web Server Port field (default: 80).
   - Enter the e-mail addresses of administrators who will receive e-mail notifications from SonicWALL ViewPoint.
   - Enter and confirm the database password in the Database Password and Confirm Password fields.
   - To configure SonicWALL ViewPoint to validate these settings, select the Validate fields on this screen check box.

   Click Install. The installation program begins copying SonicWALL ViewPoint files.

6. After the files are copied, restart the server. Installation is complete.
Logging In and Out of SonicWALL ViewPoint

To start and log into SonicWALL ViewPoint, perform the following steps:

1. Do one of the following:
   - If you are logging in locally, double-click the SonicWALL ViewPoint icon on your desktop.
   - If you are logging in from a remote location, open a web browser and enter http://viewpoint_ipaddress/sgms/login or http://viewpoint_ipaddress or http://localhost.

   The SonicWALL ViewPoint login page displays.

2. Enter the SonicWALL ViewPoint user ID (default: admin) and password (default: password).

   **Note** After the password is entered, an authenticated management session is established that times out after 5 minutes of inactivity. The default time-out can be changed from the General/ViewPoint Password page on the Console Panel.

   For security purposes, it is highly recommended to change the default password for the user admin. The maximum size of the SonicWALL ViewPoint User ID is 24 alphanumeric characters. If the password is more than 32 characters long, it will automatically be truncated.

3. Click **Submit**. The SonicWALL ViewPoint UI opens.

4. To logout, click the **Logout** button in the SonicWALL ViewPoint UI.
Registering SonicWALL ViewPoint

To register SonicWALL ViewPoint, perform the following steps:

• Create a mysonicwall.com account— see “Creating a mysonicwall.com Account” on page 14.
• Register the SonicWALL appliance— see “Registering the SonicWALL Appliance” on page 14.
• Activate the ViewPoint Software— see “Activating the ViewPoint Software” on page 15.
• Enable the ViewPoint license on the SonicWALL appliance— see “Enabling the ViewPoint License on the SonicWALL Appliance” on page 16.

Creating a mysonicwall.com Account

If you do not already have a mysonicwall.com account, open a web browser and navigate to the following website:

http://www.mysonicwall.com
Then, follow the on-screen prompts to create a user account.

Registering the SonicWALL Appliance

To register the SonicWALL appliance, perform the following steps:

1. Log on to mysonicwall.com.
2. Click My Products. The SonicWALL Product Registration page displays.
3. Enter your SonicWALL serial number in the **Serial Number** field.

4. If you are registering a SonicWALL SOHO TZW, enter the authentication code in the **Authentication Code** field.

5. Enter a descriptive name for the SonicWALL appliance in the **Friendly Name** field.

6. Click **Register**. The mysonicwall.com website registers the SonicWALL appliance.

### Activating the ViewPoint Software

To activate the SonicWALL ViewPoint software, perform the following steps:

1. Log on to mysonicwall.com.

2. Click the label of the newly registered SonicWALL appliance. The **Service Management** page displays.
3. Locate the ViewPoint service and click its **Activate** button. The Activate Service dialog box displays.

4. Enter the ViewPoint Activation Key in the **Activation Key** field. The ViewPoint Activation Key is printed on the ViewPoint Software License Certificate shipped with the ViewPoint package.

5. Click **Submit**. After the Activation Key is registered, a ViewPoint License Key will appear. Carefully write down the ViewPoint License Key in a safe place.

### Enabling the ViewPoint License on the SonicWALL Appliance

To enable the SonicWALL ViewPoint license, perform the following steps:

1. Log into the SonicWALL appliance.
2. Expand the **Log** tree and click **ViewPoint**. The **ViewPoint** page displays.
3. Enter the ViewPoint License Key provided by mysonicwall.com in the **Enter Upgrade Key** field.
4. Click **Apply**.
5. Restart the SonicWALL for the change to take effect.
CHAPTER 3
Configuring ViewPoint Reporting Settings

This chapter includes the following sections:

- “User Settings” section on page 20
- “Management Settings” section on page 22
- “Configuring Reporting Settings” section on page 23
- “Exporting Reports to PDF” section on page 36
- “Configuring At-a-Glance Reports” section on page 45

You manage the ViewPoint Reporting Module through the settings on the ViewPoint Console panel. The Console panel manages all the settings for ViewPoint. This chapter provides an overview of the management options that have a direct effect on the ViewPoint Reporting Module.
User Settings

The Reports page of the User Settings section of the ViewPoint Console manages the reporting defaults for the current user.

You manage the User Settings from the User Settings section of the Console tab.

Perform the following steps:

1. Select whether the reports will contain a chart and table or table only.
2. Select whether Summary and Over Time charts will be displayed as bar graphs or plots from the Summary/Over Time Charts list box (default: BAR).
3. Select whether User charts will be displayed as pie charts, bar graphs, area charts, or plots from the User Based Charts list box (default: PIE).
4. Select the number of sites to display in Top Sites reports (default: 10).
5. Select the number of users to display in Top Users reports (default: 10).
6. Select the number of sites to display in Sites by User and Users by Site reports (default: 5).
7. Select the number of items to display in all other reports (default: 10).
8. Select the number of entries per item to display in all other reports (default: 10).
9. To only display data for a specified group of web sites, enter the URL of each site (separated by commas) in the Site List field. Because this field uses pattern matching, entries such as “yahoo.com” will display data for mail.yahoo.com, shopping.yahoo.com, and so on.
   Check the Whole Name/IP box to do a full-pattern match.
10. To only display data for a specified group of users, enter the username of each user (separated by commas) in the User List field. Because this field uses pattern matching, entries such as “john” will display data for johnm, 123john, and so on.
11. To configure the default start and end times for hourly reports, select a start and end time from the Start and End list boxes.
12. To specify a list of web sites that will be excluded from the reports, enter a string that specifies a URL or portion of a URL to exclude from the reports. For example:
   - www.yahoo.com
   - ebay.com
   - netscape
   Click Add. Any web site that contains a portion of the string that you specified will be excluded from the report. Repeat this step for each web site to exclude.
13. To remove a web site from the list, select the website and click the Delete button.

Figure 8 Delete Web Site
Management Settings

The ViewPoint Management section of the Console tab controls the configuration of ViewPoint.

This section provides an overview of the Management section.

To manage the management settings for ViewPoint, select Management within the Console tab.

ViewPoint Settings

The ViewPoint Settings page manages the SMTP server and “From” address for ViewPoint e-mail alerts.

Alert Settings

The Alert Settings page manages the alert messages ViewPoint sends in response to specified events:

- **E-Mail Alert Recipient Schedule** - manages the alert recipients and the schedule for sending alerts to each recipient.
- **E-Mail Alert Format Preference** - manages the format of the e-mail alert messages.

Sessions

The Sessions page of the Management section of the ViewPoint Console allows you to view session statistics for currently logged in ViewPoint users and to end selected sessions.
Sessions do not have a direct effect on ViewPoint Reports.

**ViewPoint Updates**

The ViewPoint Updates page provides information for the SonicWALL ViewPoint primary and backup agent servers that are managing the SonicWALL appliances. This page lists the IP address and status of each agent server, the IP address and password of the ViewPoint gateway for each agent server, and the number of firewalls under SonicWALL ViewPoint management. You can also schedule all the tasks for each agent server to be executed during a specified time period.

**Configuring Reporting Settings**

This section describes how to configure reporting settings. These include how often the summary information is updated, the number of days that summary information is stored, and the number of days that raw data is stored.

The following sections are included in this chapter:

- “Settings” on page 24
  - “Configuring Data Storage Configuration Settings” on page 24
- “Summarizer” on page 25
  - “Distributed Summarizer” on page 25
  - “Summarizer Settings” on page 26
  - “Configuring Summarizer Settings in the Reports Tab” on page 29
- “Email/Archive” on page 30
- “Scheduled Reports” on page 31
  - “Resending Schedules” on page 34
- “Management” on page 34

**Configuring Reporting Settings**

These reports are constructed from the most current available summary data. In order to create summary data, the ViewPoint Reporting Module must parse the raw data files.
Configuring Reporting Settings

**Note**
Because reports are based on the most current summary data, the report may be old. For example, if the data was summarized four hours ago, all activity that occurred since the last summary will be missing from the report.

When configuring ViewPoint Reporting, you can select the amount of summary information to store. Make sure the database is large enough to accommodate the number of days that you choose.

Additionally, you can select the amount of raw data to store. The raw data is made up of information for every connection. Depending on the amount of traffic, this can quickly consume an enormous amount of space in the database. Be very careful when selecting how much raw information to store.

**Settings**

The Settings page manages the number of days for raw/syslog data storage for reports and the sort option in report tables.

**Configuring Data Storage Configuration Settings**

To configure syslog data storage settings, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Console** tab.
3. Expand the **Reports** tree and click **Settings**.
4. Specify the amount of days that you would like to store your syslog data in the **Days To Store Raw Data** list box and click **Update**.

**Summarizer**

The Distributed Summarizer gathers and processes the syslog data that the reports use. The **Summarizer** page manages the configuration of the Distributed Summarizer.

**Distributed Summarizer**

The Distributed Summarizer provides improved performance over the old Summarizer. The following describes the processing and summarization process of the Distributed Summarizer:

- As incoming events are sent to the Agent, they are written to a file in the `<ViewPoint_directory>/syslogs` directory. The format of the file is:

  `agentid_start-date_start-time_to_end-date_end-time.unp`

  where `agentid` is the ID of the agent, `start-date` is the starting date (YYYYDD), `start-time` is the starting time (HHMMSS), `end-date` is the ending date, and `end-time` is the ending time.
• When the file contains 10,000 lines, the Distributed Summarizer closes the file and begins creating a new one.

• At the interval you specify, the Distributed Summarizer changes the extension of the file to .prg and begins processing the file and stores its information as summarized data. It repeats this process for every file ending with the extension .unp.

• After it processes a file, if Log Viewer is enabled it changes its extension to .UPD, if it is disabled, it changes the extension to .PRD

If you choose to use the Distributed Summarizer, you will need to periodically delete files with the .PRD extension to prevent your disk from filling. Additionally, the Distributed Summarizer does not store raw data, so no information will appear in the log viewer.

**Summarizer Settings**

SonicWALL appliances send their syslog packets to SonicWALL ViewPoint via UDP packets. At the interval you specify, the Summarizer will process those files and store the data in the summary tables.

To configure Summarizer settings, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Console tab.
3. Expand the Reports tree and click Summarizer. The Summarizer page displays.
Figure 11  Console > Reports > Summarizer
4. The first generation of the Summarizer writes data directly to the database and periodically parses it and stores it as summarized data. This is very resource-intensive. The Distributed Summarizer writes events directly to log files which it parses periodically and stores as summarized data. To improve performance, select the Enable Distributed Summarizer check box and click Update.

5. The Summarizer Listing table displays, listing the details of that summarizer such as Last Scheduled Run Time and Next Scheduled Run Time.

6. Specify how often the ViewPoint Reporting Module processes and updates summary information from the Summarize Every list box and click Update.

7. To specify the next summary time, enter a date and time in the Next Scheduled Run Time field and click Update.

8. To update the summary information now, click the Summarize Now button. SonicWALL ViewPoint will automatically process the latest information and make it available for immediate viewing.

   Note This will not affect the normally scheduled summarization updates.

9. Configure the following report preferences (Generation 1 Summarizer only):
   - **Number of Top Sites** - specifies the number of top sites reported in each Top Sites report.
   - **Number of Top Users** - specifies the number of top users reported in each Top Users report.
   - **Number of Top Sites Per User** - specifies the number of top sites displayed per user in each Top Sites Per User report.
   - **Enable HomePort Syslog Reporting** - Select this checkbox to enable syslog data to be sent from the SonicWALL appliance home port.
   - **Enable Full URL Reporting** - Select this checkbox to enable report summarization to include the full URL of Website traffic.

   Note Enabling Full URL Reporting requires extensive resources on your SonicWALL ViewPoint Agent CPU.

10. In the Reports Summarization Data for ROI Reports section, select the currency type in the Type of Currency field, and specify an amount in the Cost Per Mega Byte Bandwidth Use field.
11. Specify how many days of summarized data the ViewPoint Reporting Module will store in the database from the **Days To Store Summarized Data** text field (default: 15) and click **Update**. To save all information, enter **All**.

   Make sure the database is large enough to accommodate the number of days that you choose.

12. To reduce the amount of syslog data stored periodically, specify a time (daily) in the **Delete Syslog Data Daily at** field.

13. To delete summarized data, specify a date in the **Delete Summarized Data For** field and click **Update**.

**Configuring Summarizer Settings in the Reports Tab**

This section describes how to tune the performance of the Summarizer by configuring which data will be created. To configure the Summarizer settings, perform the following steps:

1. Start and log into SonicWALL ViewPoint.

2. Click the **Reports** tab.

3. Expand the **Configuration** tree and click **Summarizer Settings** page. The Summarizer Settings page provides a list of reports and a correlating description of each report. Each report contains a checkbox that you can select to generate a summarized report.

*Figure 12  Reports > Configure > Summarizer Settings*
4. Select the checkbox of each report type to summarize.
5. When you are finished, click **Update**. Your configuration changes are saved automatically.

**Email/Archive**

The **Email/Archive** page manages the settings for the sending of e-mail reports and archiving reports.

**Configuring Email/Archive Settings**

To configure Email/Archive and web server settings, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Console** tab.
3. Expand the **Reports** tree and click **Email/Archive**. The Email/Archive page displays.

![Figure 13 Console > Reports > Email/Archive](image)

This page shows when the next scheduled archive and e-mail time will occur.

4. To set the next archive time, enter the date and time in the **Next Scheduled Email/Archive Time** fields and click **Update**.
5. To specify the day to send weekly reports, select the day from the **Send Weekly Reports Every** list box and click **Update**.
6. To specify the date to send monthly reports, select the date from the **Send Monthly Reports Every** list box and click **Update**.
7. If the web server address, port, or protocol has changed since SonicWALL ViewPoint was installed, this will affect reporting and you should enter the new address, port, and protocol in the Email/Archive Configuration section.

8. When you are finished, click Update. The changes are saved.

Scheduled Reports

The Scheduled Reports page allows you to manage all the report schedules in the system from a central location. This page lists all the schedules in the system, enabling you to monitor the status of these recurring schedules and resend failed schedules, if needed. This page provides information about the last execution time of a schedule, whether it ran successfully and the error that occurred if it failed, the last run type (scheduled or one time run), along with the node, owner and other relevant information.

The Summary section provides status information on your report schedules.

The Search Criteria section provides settings for searching report schedules. Results of your searches are displayed in the Search Results section.

1. Start and log into SonicWALL ViewPoint.

2. Click the Console Panel tab.

3. Expand the Reports tree and click Scheduled Reports. The Scheduled Reports page displays.

Figure 14 Console > Reports > Scheduled Reports
4. Define the **Search Criteria** tab. The Search Criteria tab contains the following elements to refine your search:

- **Schedule Type** - Select from the following schedule types:
  - All Schedules
  - Daily Schedules
  - Weekly Schedules
  - Monthly Schedules

- **Status** - Select from the following status conditions:
  - All
  - Failed
  - In Progress
  - Success
  - In Queue
  - Partial Failure

- **SonicWALL Node** - Select from the following SonicWALL nodes:
  - All
  - Global View
  - Per Unit View

- **Owner** - Displays the owner (admin).

- **Name Contains** - Enter a context string to search by keywords.

- **Error Contains** - Enter a context string to search by keywords.

- **Use Condition** - Select from the following conditions:
  - And
  - Or

- **Match Case** - Select this checkbox to limit your searches to be match-case sensitive.

Select the notepad icon to view the Schedule Properties page, as illustrated in Figure 15.
Figure 15  Schedule Properties Page

![Schedule Properties Page](image)

![Schedules in the system](image)
• **Name** - The name of the report. Click on the highlighted report name link to access the report for editing.

• **Type** - All, Daily Schedules, Weekly Schedules, and Monthly Schedules.

• **Node** - The host name of the SonicWALL appliance.

• **Last Run** - The date when the report was last generated.

• **Status** - Includes the following report status options:
  - **Red**: Failed scheduled report.
  - **Green**: Schedule processed successfully.

### Resending Schedules

Apart from selecting multiple schedules for a one-time execution by selecting the appropriate checkboxes and clicking the “Email/Archive the Selected Schedules now,” you can re-send required schedules using the “Re-send the selected schedules for dates” option.

To resend any schedules, follow the procedures below:

1. Select the Schedule Type (Daily, Weekly, or Monthly) from the Search Criteria section and click **Start Search**. This lists all the schedules of the selected type. Select the checkboxes of the schedules you want to resend.

2. Provide a start date (and an end date if applicable). Reports are generated for the specified date/date range.

3. Click **Re-send the selected schedules for dates**. Reports are generated for the specific dates and e-mailed/archived as a one time option for all the schedules selected.

### Management

The Management page allows you manage archiving settings.

To configure Management settings, perform the following steps:

1. Start and log into SonicWALL ViewPoint.

2. Click the **Console** tab.

3. Expand the **Reports** tree and click **Management**. The Management page displays.
4. Check the **Enable Data Archive** checkbox to turn data archiving on. Click the **Update** button on the same line as the checkbox to save this setting.

5. Check the **Save Data Archive Transaction Logs** checkbox to save a log record of the archiving event each time it occurs. Click the **Update** button on the same line as the checkbox to save this setting.

6. In the **Next Scheduled Archive Time** fields, enter the time for the next archiving of data. The default is 24 hours from the time the previous archiving or from the time archiving is enabled. Click the **Update** button on the same line as the checkbox to save this setting.

7. In the **Number of Days to Archive** field, select the time span in days of the data saved each time GMS archives. Click the **Update** button on the same line as the checkbox to save this setting.

8. Click the **Update** button on the same line as **Archive Data Immediately** to initiate archiving now.
Exporting Reports to PDF

ViewPoint can create scheduled e-mail reports in PDF. Called Compliance Reports, this feature allows you to export regular reports in universally readable format.

Compliance Report Overview

A Compliance Report is a report that collects report data and presents it in an organized format.

The ViewPoint Compliance Report feature allows administrators to provide more customized report summaries and to create more formal and defined layout of report information in PDF format. This feature provides the following benefits:

- Customizable cover page (Default also available)
- Customize Summary/ Descriptions for the reports.
- Ability to customize a set of reports.
- Three reports can be persisted as a profile so that it can be consumed by less novice users in the system.
- In the end result, reports can be generated in Industry Standard PDF format.
- Compressed format: The size of the file is small compared to and equivalent HTML report.
- The print quality is higher.
- This feature has the ability to open a 200 page PDF report with ease. In comparison, opening the same report in HTML takes a more extensive amount of time using IE, as its weighed down by memory and other systems.

Requirements

Adobe Reader ® plug-in is required for the preview function.

How Do Compliance Reports Work?

ViewPoint has the capability to generate both online and scheduled reports in HTML format. Since PDF has become a standard document format for distribution, the compliance reports will be based on this universal standard. Moreover, users should be able to customize/ define sections throughout the report. For example, they can assign different logos/ titles to the cover pages for their customers.
Adding a New Scheduled Compliance Report

This section includes the following sub-sections:

- “Customizing Your Cover Page” section on page 39
- “Customizing Your Summary Report Page” section on page 40
- “Customizing Your Detailed Reports Page” section on page 40
- “Editing Existing Profiles” section on page 42
- “Verifying User Compliance Reports Configuration” section on page 44

To begin creating a new customized Compliance Report, perform the following steps:

1. Navigate to Reports > Configuration > Scheduled Reports.
2. Click the ADD button, to add a scheduled report.
3. The Scheduled Report Configuration page displays. In the General section, enter the name of your report into the Name field, and the report description.

**Figure 17** New Scheduled Report General Settings

4. In the Category section, select the Email check box. The details window displays:
   - **SMTP Server** field: Enter your SMTP Server IP address or hostname.
   - **Source Email Address** field: Enter your Source Email Address.
   - **Destination Email Address** field: Enter the Destination Email Address(es).
   - **Email Subject** field: Enter your Email Subject.
   - **Email Body** field: Enter your Email Body.
5. To archive a directory, click the Archive check box. Enter the your desired directory you want to archive into the Save Directory field.

To change the format and settings of your customized compliance report, perform the following steps:

6. In the Format and Setting category, select the Report Type that reflects the time interval you want to view your reports, either Daily, Weekly, or Monthly.

7. Select the PDF report format in the Report Format category. Selecting the PDF option will open additional fields to allow you to customize the setup of the Cover Page, Summary Report Page, and Detailed Report Page of your report in PDF format.

8. To zip all of your reports into a single file, select the check box next to the Zip Reports into a single file check box.

Note PDF will disable some options that are only applicable to HTML.

9. For custom reports, enter the template folder name into the Template Folder Name field.
Customizing Your Cover Page

The Cover Page section allows the user to design a cover page for their report using different color schemes.

1. **Title** field: Enter the document title.
2. **Subtitle** field: Enter the document subtitle. (Optional).

![Scheduled Report Cover Page Settings](image1)

3. Select the color for the Title and Subtitle's foreground and background by clicking the gradient color box in the right side of the each field. You may select a color by either choosing a color on the color bar and then selecting its value in the color box or by typing in the HTML color.

![Cover Page Color Settings](image2)

4. The color codes are automatically filled in the corresponding fields once the color chooser window is closed.

![Cover Page Color Codes](image3)
Customizing Your Summary Report Page

The Summary Report Page allows you to add new reports and individually customize their appearance.

1. On the Summary report page, select the type of summary reports you need, up to a maximum of 4 reports. Then, click the Add button. The report will be created based on the type of summary report you have selected.

2. Enter the report title in and report description in the appropriate fields.

3. Select the text color for the title and description.

4. Select the background color for both fields.

5. Select the order in the Order drop-down window.

6. You may continue to add reports based on the summary you select in the Summary Reports drop-down menu. Repeat steps 1-5 to add more summary reports.

Customizing Your Detailed Reports Page

The Details Report Page provides you with a list of reports you may select to include in your report summaries. You can refine your setting for your report in more detail in the Detailed Report Settings category. First, select the appropriate profile setting for your report. If you are creating a new profile, select the Create a New Profile button.

1. New Profile Name field: Enter the name of your new profile.
2. To determine the type of reports that will be summarized in your compliance report, check the boxes next to the reports you need. Sub-folders are revealed to each folder by clicking the plus icon. When all sub-folders are selected, the main folder will be selected.

3. When you have completed your selection(s) of reports, scroll down the page until you see a check button with Configure Filters/Options beside it. Click the check mark button.

4. In the Configure Filter/Options section, you are able to decide how your filter and display is set. Once you have clicked the check button, fill out the table accordingly.
Editing Existing Profiles

A profile is associated with selected reports from the report list. You have the ability to go back and edit existing profiles in your scheduled reports. Since the report list is populated based on the report type selection, a profile is associated with the report type also. Instead of three categories, there will only be two: single day or multi-days. A profile in a single report will not be seen by the users when they select weekly or monthly as report types.

To edit existing profiles, perform the following tasks:

1. Click the edit icon, located next to the report name you want to edit.

![Edit Existing Profile](Image)

2. In the Detailed Page section, choose the Select an existing profile button.

**Note** You are able to delete an existing profile in that section by clicking the Delete Selected Scheduled Reports button located at the top of the page.

3. From the drop-down list in the Detailed Report Page, select the profile name you wish to edit. Choose the reports you want to add or remove from that profile. If a new profile has the same name as one of the existing profiles, the behavior will be the same as users opening the existing profile and edit the report list. When selecting an existing profile, the associated reports will be checked in the report list automatically.
Figure 27  Detailed Report Page

A default cover page is provided.

Figure 28  Default cover page
Verifying User Compliance Reports Configuration

If you have chosen the PDF version of making this report, you now have the option to see a preview of the report covers you have created and how all of the report summaries you added will fit into that template.

To review your customize PDF settings, click the Preview button.

*Figure 29 PDF Report Preview Button*

*Figure 30 Cover page; Summary page; and Details page Preview*

*Note* The images used for the preview does not use actual data.
Configuring At-a-Glance Reports

This section describes how to implement and manage At A Glance reports in the reports tab of SonicWALL ViewPoint.

At a Glance Reports Overview

This section provides an introduction to the At A Glance reports. This section contains the following subsections:

- “What are At A Glance Reports?” section on page 45
- “Benefits” section on page 45
- “How Does ‘At A Glance’ Reporting Work?” section on page 45

What are At A Glance Reports?

SonicWALL ViewPoint provides detailed and comprehensive reports of network activity. The ‘At A Glance’ feature is a collection of customized reports, displayed on a single page. This allows you to create an aggregated view of the system thus saving time in navigating around a system.

Network administrators access the following when viewing the ‘At A Glance’ Reporting feature:

- Improved ease of use to monitor network activity for a single day at a time
- A maximum of six reports can be configured to view at a single time
- The set of default reports can be configured by the administrator

Benefits

The benefits of the ‘At A Glance’ feature include:

- Enabling network administrators to get a bird’s eye view of high-interest areas on a daily basis
- Displaying multiple reports on a single screen to monitor critical network events and activity, such as security threats, inappropriate web use, and bandwidth levels

How Does ‘At a Glance’ Reporting Work?

Figure 31 shows a typical view of the ‘At A Glance’ summary page from a global-view level, which summarizes information from all units.
The first section called **Summary At A Glance** contains a summary of the activities and any warnings from the system/firewall based upon the settings of the alert threshold. These settings are initially set by default and can be changed by the administrator.

The second section called **Reports At A Glance** contains a view of four chart reports. Clicking on any report will take the user to the section of that report for more details. The reports displayed on this page are set by default that can be configured by the administrator.

**Figure 32** shows a typical view of the 'At A Glance' summary page from a unit level, which summarizes information from a specified unit.
Displaying Reports by Date

The **At A Glance Summary** screen is available at the group and unit levels and shows reports for a single day. To view a report for an alternate day, navigate to the date of choice by selecting the arrow keys to the right or left of the date displayed in the **Reports At A Glance** bar.

Alternately, you can click the Report Settings icon that displays a calendar to select a date. The Report Settings icon is located to the right of the **Reports At A Glance** bar, next to the print icon.

*Figure 33 Selecting a Date*
Configuring At-a-Glance Reports

Configuring Parameters for the ‘At A Glance’ Screen

The reports in the “At A Glance” section are context sensitive—click on them and you will be navigated to the report that has the table data with details in addition to the graph itself.

You configure the reports in the ‘At A Glance’ summary page on the Reports > Configuration > At A Glance page. From this page, network administrators can configure the following features:

- Summary/Statistics List
- Alerts List and Threshold
- Reports List

Summary/Statistics List

In the Reports > Configuration > At A Glance page, review the items in the Summary/Statistics List to determine the information that displays in the Summary At A Glance section.

The default list is set at four summary/statistics items:

- Up Time (Hours)
- Total Bandwidth (MBytes)
- Total HTTP Bandwidth (MBytes)
- Total Attacks

**Figure 35 Summary/Statistics List**

Adding Reports to the Summary/Statistics List

To add values to display in a report, perform the following steps:

1. Navigate to the Summary/Statistics List.
2. Select a title from the pull-down menu by highlighting it.
3. Click the **Add** button.

*Note* A maximum of six summary/statistics items can display at one time. You must remove one of the six items before you can add a new item.

Deleting Reports from the Summary/Statistics List

To delete a report, click the check box to the left of the report name in the Summary/ Statistics List, and click the **Delete** button.
Alerts List and Threshold

In the Reports > Configuration > At A Glance page, review the items in the Alerts List and Threshold to determine the information that displays in the Summary At A Glance section.

Note
To change the threshold value in the list, delete the list item and re-add it to your list.

Figure 36  Alerts List and Threshold

Adding Reports to the Alerts List and Threshold

To add values to display in a report, perform the following steps:

1. Navigate to the Alerts List and Threshold.
2. Select a title from the pull-down menu by highlighting it.
3. Click the Add button.

Note
There are no default alert items listed. A maximum of six alert items can display at one time.

Deleting Reports from the Alerts List and Threshold

To delete a report, click the check box to the left of the report name in the Alerts List, and click the Delete button.
Reports List

In the Reports > Configuration > At A Glance page, review the items in the Reports List to determine the information that displays in the Summary At A Glance section.

The default list is set at four reports items:

- Bandwidth Summary
- Web Usage (Global View—Web Usage Summary, Unit View—Web Usage Top Users)
- Attacks Summary
- Virus Attacks Summary

![Figure 37 Reports List]

Adding Reports to the Reports List

To add values to display in a report, perform the following steps:

1. Navigate to the Reports List.
2. Select a title from the pull-down menu by highlighting it.
3. Click the Add button.

Note: A maximum of six summary/statistics items can display at one time. You must remove one of the six items before you can add a new item.
Deleting Reports from the Reports List

To delete a report, click the check box to the left of the report name in the Reports List, and click the Delete button.
CHAPTER 4
Configuring SonicWALL Appliances for Syslog Data Collection

This chapter describes how to configure a SonicWALL appliance for SonicWALL ViewPoint, how to prepare an appliance for data collection, and how to verify that the summarizer is collecting reporting data. The chapter has the following sections:

- “Configuring a SonicWALL Security Appliance for SonicWALL ViewPoint” section on page 53.
- “Adding a SonicWALL Appliance to ViewPoint” section on page 54.
- “Deleting SonicWALL Appliances from ViewPoint” section on page 56.
- “Modifying Settings for a SonicWALL Appliance” section on page 57.
- “Preparing an Appliance for Reporting” section on page 58.

Configuring a SonicWALL Security Appliance for SonicWALL ViewPoint

The following instructions describe how to configure a SonicWALL security appliance, running SonicOS 2.5 Enhanced or later, to send data to SonicWALL ViewPoint.

1. Log into the SonicWALL appliance.
2. Select Log > ViewPoint. The Log > ViewPoint page displays (Figure 1).
Adding a SonicWALL Appliance to ViewPoint

3. In the Syslog Servers section, click on the Enable ViewPoint Settings checkbox. This setting enables your SonicWALL security appliance to start sending syslog data to SonicWALL ViewPoint.

4. To add a Syslog server, click the Add... button. The Add Syslog Server page displays.

Enter the IP address and port (default: 514) of the SonicWALL ViewPoint server.

Adding a SonicWALL Appliance to ViewPoint

This section describes how to add a SonicWALL appliance to SonicWALL ViewPoint. To add a SonicWALL appliance, perform the following steps:

1. Start and log into SonicWALL ViewPoint. The Status page displays.
Adding a SonicWALL Appliance to ViewPoint

Figure 3 Reports > General > Status Page

2. Right-click in the left pane of the SonicWALL ViewPoint UI and select Add Unit from the pop-up menu. The Add Unit dialog box displays (Figure 4).

Figure 4 Add Unit Dialog Box

3. Enter a descriptive name for your SonicWALL appliance in the SonicWALL Name field.

Note Do not enter the single quote character (') in the SonicWALL Name field.

4. Enter the username used to access your SonicWALL appliance in the SonicWALL Login Name field (default: admin).

5. Enter the password used to access the SonicWALL appliance in the SonicWALL Password field.

6. Enter the IP address that will be used to access the SonicWALL appliance in the SonicWALL IP Address field.
Deleting SonicWALL Appliances from ViewPoint

Note

If SonicWALL ViewPoint is on the same LAN as the SonicWALL appliance or accesses it through a VPN tunnel, enter the LAN IP address. If SonicWALL ViewPoint will access the SonicWALL appliance from the WAN interface, enter the WAN IP address.

7. Enter the HTTP port number used to access your SonicWALL appliance in the SonicWALL HTTP Port field (default: 80).

8. If SonicWALL ViewPoint will log into the SonicWALL appliance using secure HTTP (HTTPS), select the Enable HTTPS Management check box and enter the HTTPS port number in the SonicWALL HTTPS Port field (default: 443).

9. Enter the serial number of the SonicWALL appliance in the Serial Number field.

10. Click OK. SonicWALL ViewPoint finds the SonicWALL appliance and validates its ViewPoint license. When this is complete, the SonicWALL appliance will appear in the left pane of the SonicWALL ViewPoint UI.

Deleting SonicWALL Appliances from ViewPoint

To delete a SonicWALL appliance from SonicWALL ViewPoint, perform the following steps:

1. Start and log into SonicWALL ViewPoint. The Status page displays.

Figure 5 Reports > General > Status Page

2. Select a unit in the left pane of the SonicWALL ViewPoint UI.
3. Right-click the unit and select **Delete Unit** from the pop-up menu. You are prompted to confirm the deletion.

4. Click **Yes**. The SonicWALL appliance disappears from the left pane of the SonicWALL ViewPoint UI and will be deleted from the ViewPoint database.

---

**Modifying Settings for a SonicWALL Appliance**

To change the settings of a SonicWALL appliance, whether you are changing the IP address, password, or other settings, perform the following steps:

1. Start and log into SonicWALL ViewPoint. The Status page displays.

2. Select a unit in the left pane of the SonicWALL ViewPoint UI.

3. Right-click on the unit and select **Modify Unit** from the pop-up menu. The Modify Unit dialog box displays.
Preparing an Appliance for Reporting

When an appliance is configured to communicate with ViewPoint, you need to prepare it for syslog data collection for reporting. Preparing a unit involve:

- Verify Summarizer Settings for the Appliance
- Verify Summarizer Schedule
- Summarize Now to Test Report
- Check Report After Scheduled Summarization

Verify Summarizer Settings for the Appliance

Make sure the summarizer is collecting data for the reports you want for this unit.

1. In ViewPoint select the Reports tab.
2. Select the unit you are want to verify summarizer settings for.
3. In the middle column, select Configuration and select Summarizer Settings.
4. In the Summarizer Settings page, select the reports you want for this unit.
5. Click Update to save your selections.

4. Make changes to any of the fields. When you are finished, click OK. After SonicWALL ViewPoint finds the SonicWALL appliance and validates its ViewPoint license, the SonicWALL appliance will re-appear in the left pane of the SonicWALL ViewPoint UI.
Verify Summarizer Schedule

Verify that the summarizer is scheduled to collect and process data for this unit at an appropriate interval:

1. In ViewPoint select the Console tab.
2. In the middle column, select Reports and then select Summarizer
3. To summarize regularly, select an interval in hours and minutes in the Summarize Every field. The default is 8 hours, 0 minutes.
4. Click Update to save your changes.
Summarize Now to Test Report

To test that the summarizer is gathering data for the unit:

1. In the Console > Reports > Summarizer page click Summarize Now.
2. Select the Reports tab.
3. Select a report that you know you have selected for summarization and that your unit has had a chance to gather some data. For example, select a Web Usage report if the unit is a firewall with lots of user Web traffic through it.

Check Report After Scheduled Summarization

After the full summarization period has had a chance to run (for example, eight or more hours have passed), select a report again to test the summarized data.
Figure 10  Console > Web Usage > Top Web Sites Report
Preparing an Appliance for Reporting
CHAPTER 5
Generating a First-Time Report

This section contains the following subsections:

- “Overview of SonicWALL ViewPoint Reporting” section on page 63
- “Using SonicWALL GMSViewPoint Summarize Now” section on page 65

Overview of SonicWALL ViewPoint Reporting

SonicWALL ViewPoint reporting complements SonicWALL ViewPoint monitoring and other SonicWALL Internet security offerings by providing detailed and comprehensive reports of network activity. SonicWALL ViewPoint reporting allows you to review network access, enhance security, and anticipate future bandwidth needs.

SonicWALL ViewPoint reporting is accessible using the Reports tab at the top of the SonicWALL ViewPoint management interface.
The SonicWALL ViewPoint reporting feature receives its information from the stream of syslog data sent by each SonicWALL appliance, processes the data, and stores it. ViewPoint Reporting can be enabled or disabled. The SonicWALL ViewPoint reporting module provides the following information:

- Bandwidth use by IP address and service
- Inappropriate Web use
- Detailed reports of attacks
- System and network errors
- VPN events and problems
- Web usage
- Firewall event logs

The SonicWALL ViewPoint reporting feature provides the following configurable reports:

<table>
<thead>
<tr>
<th>At A Glance</th>
<th>Provides a high-level activity summary.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Status</td>
<td>Provides up-time status reports.</td>
</tr>
<tr>
<td>Bandwidth</td>
<td>Provides bandwidth usage reports.</td>
</tr>
<tr>
<td>ROI</td>
<td>Provides cost of usage reports.</td>
</tr>
<tr>
<td>Services*</td>
<td>Provides events and usage by service protocol.</td>
</tr>
</tbody>
</table>

*Services reporting is only available at the unit level.
Using SonicWALL GMSViewPoint Summarize Now

The Summarize Now feature allows the administrator to create instant summary reports without affecting the regularly scheduled summary reports. The SonicWALL ViewPoint Summarize Now feature is located in the Console tab under Reports > Summarizer. The SonicWALL ViewPoint Summarizer creates summary reports by default every 8 hours. Summary reports can be configured by the administrator to occur every 1 to every 24 hours.

To use the Summarize Now feature, perform the following tasks:

1. Click the Console tab at the top of the screen.
2. In the middle pane, navigate to Reports > Summarizer.

<table>
<thead>
<tr>
<th>Table Content</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Web Usage</td>
<td>Provides Web usage reports.</td>
</tr>
<tr>
<td>Browse Time</td>
<td>Provides browse time reports.</td>
</tr>
<tr>
<td>Web Filter</td>
<td>Provides web filter event reports.</td>
</tr>
<tr>
<td>FTP Usage</td>
<td>Provides FTP usage reports.</td>
</tr>
<tr>
<td>Mail Usage</td>
<td>Provides mail usage reports.</td>
</tr>
<tr>
<td>VPN Usage</td>
<td>Provides VPN usage reports.</td>
</tr>
<tr>
<td>Attacks</td>
<td>Provides attack event reports.</td>
</tr>
<tr>
<td>Virus Attacks</td>
<td>Provides virus attack event reports.</td>
</tr>
<tr>
<td>Anti-Spyware</td>
<td>Provides spyware event reports.</td>
</tr>
<tr>
<td>Intrusion Prevention</td>
<td>Provides intrusion event reports.</td>
</tr>
<tr>
<td>Authentication</td>
<td>Provides login reports.</td>
</tr>
</tbody>
</table>
3. Click **Summarize Now**.

4. You will see a pop-up window verifying that you want to summarize the data now. Summarizing data using Summarize Now is a one-time action and will not affect the scheduled summary. Click **OK** to continue.

5. Navigate to **Logs > View Logs** in the center pane. Search for the message **Report Data Summarized** to verify that the Summarize Now action has completed.
6. When Summarize Now has completed, navigate to the **Reports** tab at the top of the screen. In the left-most pane, click **GlobalView** or click a managed appliance.

**Note**  
**Alert:** You may see incomplete data if you view the **Summary** section of a selected report before the **Summarize Now** process is complete. Wait for the **Report Data Summarized** message to be displayed in **Logs > View Logs**.

7. In the center pane, click a report to expand it, then click the **Summary** option underneath it. For example, click **Bandwidth**, then click **Summary** to review the summarized bandwidth usage data.
8. Navigate to the Summary section of other reports in the center pane to see other summarized data.
CHAPTER 6
Customizing Report Elements

This section includes the following sections:

- “Using the Reporting Customization Tool” section on page 71
- “Scheduling a Report” section on page 71

The ViewPoint Reporting Module contains many elements that can be customized to meet the look and feel of your organization's corporate image. The elements that can be customized include:

<table>
<thead>
<tr>
<th>Table 1 Custom Elements</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Element</strong></td>
</tr>
<tr>
<td>[PAGE_BG_COLOR]</td>
</tr>
<tr>
<td>[HEADING]</td>
</tr>
<tr>
<td>[LOGO]</td>
</tr>
<tr>
<td>[LOGO_DESCRIPTION]</td>
</tr>
<tr>
<td>[LOGO_HREF]</td>
</tr>
<tr>
<td>[LOGO_TABLE_BG_COLOR]</td>
</tr>
<tr>
<td>[TITLE_BAR_BG_COLOR]</td>
</tr>
<tr>
<td>[TITLE_BAR_FONT_COLOR]</td>
</tr>
<tr>
<td>[TITLE_BAR_FONT_SIZE]</td>
</tr>
<tr>
<td>[CHART_BG_COLOR]</td>
</tr>
<tr>
<td>[CHART_PLOT_COLOR]</td>
</tr>
</tbody>
</table>
The following figure shows the report elements as they are displayed.

**Table 1 Custom Elements**

<table>
<thead>
<tr>
<th>Element</th>
<th>Default</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>[PIE_PLOT_COLOR]</td>
<td>#FFFFFF</td>
<td>Color of the pie in pie graphs.</td>
</tr>
<tr>
<td>[TABLE_HEADING_COLOR]</td>
<td>#003399</td>
<td>Color of the table heading.</td>
</tr>
<tr>
<td>[TABLE_EVEN_ROW_COLOR]</td>
<td>#FFFFFF</td>
<td>Color of the even-numbered rows.</td>
</tr>
<tr>
<td>[TABLE_ODD_ROW_COLOR]</td>
<td>#E8EEF4</td>
<td>Color of the odd-numbered rows.</td>
</tr>
<tr>
<td>[TABLE_TOTAL_ROW_COLOR]</td>
<td>#003399</td>
<td>Color of the “total” row.</td>
</tr>
<tr>
<td>[FOOTER_FONT_COLOR]</td>
<td>#000000</td>
<td>Color of the footer font.</td>
</tr>
<tr>
<td>[FOOTER_FONT_SIZE]</td>
<td>1</td>
<td>Size of the footer font.</td>
</tr>
</tbody>
</table>
Using the Reporting Customization Tool

This section describes how to use the Reporting Customization Tool. You can use the tool to create multiple templates. After creating a template, you can apply it to one, some, or all reports.

To use the Reporting Customization Tool, perform the following steps:

1. Create a folder to store custom report templates. The folder name cannot contain spaces and must be located in the appropriate directory. For example, to use the folder name MyCustomReports, you must create the folder with the following directory structure:
   `<ViewPoint_directory>\Tomcat\webapps\ViewPoint\reports\scheduledreports\MyCustomReports>`

2. Create a text file that contains all the attributes and values that can be customized. For more information, see the params.txt file that accompanied the Reporting Customization Tool.

3. Enter the following command:
   `ReportTool.bat input_file target_folder`

   where `input_file` is the name of the text file that you customized and `target_folder` is the name of the target folder.

4. Do not specify the complete path to the folder.

5. The default logo used in the reports is the SonicWALL logo. If you wish to use a different logo and other graphics, copy them into the following directory:
   `
ViewPoint\images\`

6. Restart the ViewPoint Web server service.

7. Set the template folder name in the report schedule created to this folder name. This must be set for all the report schedules that use the customized templates.

Scheduling a Report

For information on scheduling a custom report, see “Scheduling Emailing/Archival Reports” on page 73.
Scheduling a Report
CHAPTER 7
Scheduling Emailing/Archival Reports

This chapter includes the following sections:

- “Scheduling a Daily Report” section on page 74
- “Scheduling a Weekly or Monthly Report” section on page 79

SonicWALL ViewPoint Reporting can automatically send reports to any email addresses that you specify.

To view currently scheduled reports or configure new reports, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select a SonicWALL appliance.
4. Expand the Configuration tree and click Scheduled Reports. The Scheduled Reports page displays.
5. The Scheduled Reports page contains a list of currently scheduled reports. To edit a report, select its radio button and click **Edit**. To delete a report, select its radio button and click **Delete**.

Select from the following:
- To create a new daily report, see “Scheduling a Daily Report” on page 74.
- To create a new weekly or monthly report, see “Scheduling a Weekly or Monthly Report” on page 79.

**Scheduling a Daily Report**

By default, daily reports are sent out once a day at 03:00 local time and contain information for the previous day. To configure a new daily report, perform the following steps:

1. From the Scheduled Reports page, click the **Add Daily Report** button. The Daily Reports page displays.
2. Enter a name for the report in the **Scheduled Report Name** field.

3. To send the report, select the **Email** check box.

4. By default, the ViewPoint Reporting Module will use the Simple Mail Transfer Protocol (SMTP) server that was specified during SonicWALL ViewPoint installation. To change it, enter the IP address or hostname of the SMTP server in the **SMTP Server Address** field.

5. Enter the Destination e-mail addresses in the **Destination Email Addresses** field. Make sure each e-mail address is separated by a semicolon (;).

6. By default, the ViewPoint Reporting Module will use the e-mail address of the user logged into SonicWALL ViewPoint as the Sender e-mail address. To change it, enter a new Sender e-mail address in the **Source Email Address** field.

7. Enter the Subject Line that will appear in reports sent from the ViewPoint Reporting Module in the **Email Subject** field.

8. Enter text that will appear in the message body in the **Email Body** field.

9. To copy the contents of the report into the body of the email message, select the **Send Reports Inline** check box. To send the file as an email attachment, make sure this check box is deselected.

   **Note** Reports can only be sent inline when all data is sent in a single report.

10. To archive the file on the server's hard disk, select the **Archive** check box and enter a path in the **Save Directory** field.

    Specify the directory where the file will be archive in the **Save Directory** field.
11. **Optional.** To specify a specific date, enter the date in the **Report Date** field.

12. If you are using custom reports, specify the folder location of the template files in the **Template Folder Name** field.

13. To compress the reports into a single file, select the **Zip Reports into a single file** check box.

14. To include all of the data in a single report, select the **Include all data in a single report** check box.

15. To password-protect the Zip file, select the **Password Protect the Zip File** check box and enter the password in the **Password** field.

16. Click the Configure Filters/Options button. The Configure Filters/Options page displays.

*Figure 8 Configure Filters/Options Page*
17. Select whether the reports will contain a chart and table or table only.

18. Select whether Summary and Over Time charts will be displayed as bar graphs or plots from the **Summary/ Over Time Charts** list box (default: BAR).

19. Select whether User charts will be displayed as pie charts, bar graphs, area charts, or plots from the **User Based Charts** list box (default: PIE).

20. Select the number of sites to display in Top Sites reports (default: 10).

21. Select the number of users to display in Top Users reports (default: 10).

22. Select the number of sites to display in Sites by User reports (default: 5).

23. Select the number of items to display in all other reports (default: 10).

24. Select the number of entries per item to display in all other reports (default: 10).

25. To only display data for a specified group of web sites, enter the URL of each site (separated by commas) in the **Site List** field. Because this field uses pattern matching, entries such as “yahoo.com” will display data for mail.yahoo.com, shopping.yahoo.com, and so on.

26. To only display data for a specified group of users, enter the username of each user (separated by commas) in the **User List** field. Because this field uses pattern matching, entries such as “john” will display data for johnm, 123john, and so on.

27. To configure the default start and end times for hourly reports, select a start and end time from the **Start** and **End** list boxes.

28. Click the **Update** button to apply changes.

29. In the **Daily Reports** page, select the daily reports that will be included in the e-mail message:

   - **User Login**— shows users that logged on to the SonicWALL appliance to bypass content filtering or to remotely access local network resources.

   - **Admin Login**— shows successful administrator logins for the SonicWALL appliance.

   - **Failed Login**— shows failed login attempts for users and administrators that attempted to log on through the SonicWALL appliance.

   - **Status Summary**— status of the SonicWALL appliance during each hour.

   - **Bandwidth Summary**— amount of traffic handled by the SonicWALL appliance during each hour.

   - **Bandwidth Top Users**— displays the users who used the most bandwidth.

   - **Service Summary**— amount of traffic handled by each service during each hour.

   - **VPN Summary**— amount of VPN traffic handled by the SonicWALL appliance during each hour.
- **VPN Top Users**—displays the users who used the most VPN bandwidth.
- **VPN By Policy**—displays VPN usage by policy.
- **VPN By Policy hourly**—displays hourly VPN usage by policy.
- **VPN By Service**—displays VPN usage by service.
- **Web Usage Summary**—amount of HTTP bandwidth handled by the SonicWALL appliance during each hour of the day.
- **Web Usage Top Sites**—displays the web sites that used the most HTTP bandwidth.
- **Web Usage Top Users**—displays the users who used the most HTTP bandwidth.
- **Web Usage Sites By User, By Site**—displays a list of all users, their top sites, the number of hits to each site, and the amount of data transferred.
- **Web Filter Summary**—displays the number of times users attempt to access blocked sites during each hour.
- **Web Filter Top Sites**—displays the top blocked web sites that users attempted to access.
- **Web Filter Top Users**—displays the users who made the most attempts to access blocked sites.
- **Web Filter Sites By User, By Site**—displays a list of all users, their top sites, and the number of attempts that were made to access each site.
- **FTP Usage Summary**—amount of FTP bandwidth handled by the SonicWALL appliance.
- **FTP Usage Top Users**—displays the users who used the most FTP bandwidth.
- **Mail Usage Summary**—amount of mail handled by the SonicWALL appliance.
- **Mail Usage Top Users**—displays the users who sent and received the most mail.
- **Attacks Summary**—number of attack attempted on the SonicWALL appliance.
- **Attacks By Category**—displays the attacks that occurred, sorted by category.
- **Attacks By Source**—displays the top sources of attacks.
- **Attacks Errors and Exceptions**—number of errors and exceptions on the SonicWALL appliance.
- **Intrusion Summary**—number of intrusions attempted on the SonicWALL appliance.
– **Intrusions By Category**— displays the intrusion attempts that occurred, sorted by category.
– **Intrusions By Source**— displays the top source that generated intrusion attempts.
– **Intrusions By Destination**— displays the top destinations that generated intrusion attempts.

30. When you are finished, click **Add**. The new report will appear in the list on the Scheduled Reports page.

### Scheduling a Weekly or Monthly Report

By default, weekly reports are sent out every Monday at 03:00 local time and contain information for the previous week. Go to the **Console > Reports > E-mail/Archive** page to configure the time and date settings (Monday at 03:00 local time). Monthly reports are sent out on the second day of every month at 03:00 local time and contain information for the previous month. To configure a new weekly or monthly report, perform the following steps:

1. From the Scheduled Reports page, click the **Add Multi-Day Report** button. The Multi-Day Reports page displays.

   **Figure 9 Multi-Day Reports Page**

2. Enter a name for the report in the **Scheduled Report Name** field.
3. Enter a description for the report in the Description field.

4. To send the report, select the Email check box.

5. By default, the ViewPoint Reporting Module will use the Simple Mail Transfer Protocol (SMTP) server that was specified during SonicWALL ViewPoint installation. To change it, enter the IP address or hostname of the SMTP server in the SMTP Server Address field.

6. Enter the Destination e-mail addresses in the Destination Email Addresses field. Make sure each e-mail address is separated by a semicolon (;).

7. By default, the ViewPoint Reporting Module will use the e-mail address of the user logged into SonicWALL ViewPoint as the Sender e-mail address. To change it, enter a new Sender e-mail address in the Source Email Address field.

8. Enter the Subject Line that will appear in reports sent from the ViewPoint Reporting Module in the Email Subject field.

9. Enter text that will appear in the message body in the Email Body field.

10. To copy the contents of the report into the body of the email message, select the Send Reports Inline check box. To send the file as an email attachment, make sure this check box is deselected.

Note: Reports can only be sent inline when all data is sent in a single report.

11. To archive the file on the server's hard disk, select the Archive check box and enter a path in the Save Directory field. Specify the directory where the file will be archive in the Save Directory field.

12. Select whether the report will be sent Weekly or Monthly.

13. If you are using custom reports, specify the folder location of the template files in the Template Folder Name field.

14. To compress the reports into a single file, select the Zip Reports into a single file check box.

15. To include all of the data in a single report, select the Include all data in a single report check box.

16. To password-protect the Zip file, select the Password Protect the Zip File check box and enter the password in the Password field.

17. Click the Configure Filters/Options button. The Configure Filters/Options page displays.
18. Select whether the reports will contain a chart and table or table only.

19. Select whether Summary and Over Time charts will be displayed as bar graphs or plots from the Summary/Over Time Charts list box (default: BAR).

20. Select whether User charts will be displayed as pie charts, bar graphs, area charts, or plots from the User Based Charts list box (default: PIE).

21. Select the number of sites to display in Top Sites reports (default: 10).

22. Select the number of users to display in Top Users reports (default: 10).

23. Select the number of sites to display in Sites by User reports (default: 5).

24. Select the number of items to display in all other reports (default: 10).

25. Select the number of entries per item to display in all other reports (default: 10).

26. To only display data for a specified group of web sites, enter the URL of each site (separated by commas) in the Site List field. Because this field uses pattern matching, entries such as “yahoo.com” will display data for mail.yahoo.com, shopping.yahoo.com, and so on.
27. To only display data for a specified group of users, enter the username of each user (separated by commas) in the User List field. Because this field uses pattern matching, entries such as “john” will display data for johnm, 123john, and so on.

28. To configure the default start and end times for hourly reports, select a start and end time from the Start and End list boxes.

29. Click the Update button to apply changes.

30. Select the reports that will be included in the e-mail message:
   - Status Over Time—displays the status of the SonicWALL appliance for the week or month.
   - Bandwidth Over Time—displays the daily amount of traffic handled by the SonicWALL appliance for the week or month.
   - Bandwidth Top Users Over Time—displays the top users of bandwidth handled by the SonicWALL appliance for the week or month.
   - Web Usage Over Time—displays the daily amount of HTTP bandwidth handled by the SonicWALL appliance for the week or month.
   - Web Usage Top Sites Over Time—displays the top sites for the week or month.
   - Web Usage Top Users Over Time—displays the top users for the week or month.
   - Web Usage By Users Over Time—displays the web usage by users for the week or month.
   - Web Filter Over Time—displays the number of attempts that were made to access blocked web sites for the week or month.
   - Web Filter Top Sites Over Time—displays the top filtered sites for the week or month.
   - Web Filter Top Users Over Time—displays the top users trying to access filtered sites for the week or month.
   - Web Filter By Users Over Time—displays web filtering by user for the week or month.
   - FTP Usage Over Time—displays the daily amount of FTP bandwidth handled by the SonicWALL appliance for the week or month.
   - FTP Usage Top Users Over Time—displays the top FTP users for the week or month.
   - Mail Usage Over Time—displays the daily amount of mail handled by the SonicWALL appliance for the week or month.
   - Mail Usage Top Users Over Time—displays the top Mail users for the week or month.
- **Attacks Over Time**— displays the daily number of attacks attempted during the week or month.

- **Attacks Categories Over Time**— displays the attacks that occurred during the week or month, sorted by category.

- **Attacks Sources Over Time**— displays the top sources of attacks during the week or month.

- **Attacks Errors and Exceptions Over Time**— number of errors and exceptions on the SonicWALL appliance during the week or month.

- **VPN Usage Over Time**— displays daily number of VPN connections during the week or month.

- **VPN Usage Top Users Over Time**— displays the users who used the most VPN bandwidth during the week or month.

- **Drop Packets Over Time**— displays the number of packet errors during the week or month.

- **VPN By Policy Over Time**— displays VPN usage by policy during the week or month.

- **Intrusions Over Time**— number of intrusions attempted on the SonicWALL appliance during the week or month.

- **Intrusions By Categories Over Time**— displays the intrusion attempts that occurred during the week or month, sorted by category.

- **Intrusions By Sources Over Time**— displays the top source that generated intrusion attempts during the week or month.

- **Intrusions By Destination Over Time**— displays the top destinations that generated intrusion attempts during the week or month.

31. When you are finished, click **Add**. The new report will appear in the list on the Scheduled Reports page.
CHAPTER 83
Viewing Reports

This chapter describes how to generate reports using the SonicWALL ViewPoint Reporting Module.

Select from the following reports:

- “Viewing At A Glance Reports” section on page 89
- “Viewing Status Reports” section on page 97
- “Viewing Bandwidth Reports” section on page 101
- “Viewing ROI Reports” section on page 109
- “Viewing Service Usage Reports” section on page 116
- “Viewing Web Usage Reports” section on page 119
- “Viewing Browse Time Reports” section on page 138
- “Viewing Web Filter Reports” section on page 148
- “Viewing File Transfer Protocol Reports” section on page 163
- “Viewing Mail Usage Reports” section on page 169
- “Viewing VPN Usage Reports” section on page 176
- “Viewing Attacks Reports” section on page 189
- “Viewing Anti-Spyware Reports” section on page 205
- “Viewing Virus Attacks Reports” section on page 199
- “Viewing Intrusion Prevention Reports” section on page 211
- “Viewing the Log” section on page 221
- “Viewing Authentication Reports” section on page 217
Managing Report Settings

All of the reports in ViewPoint report on data gathered on a specific date or range of dates. In addition many of the reports offer a choice of different display options. You can manage all of these selections by editing the report settings.

Editing Report Settings

To edit the report settings, click the Settings icon in the top right corner of the report screen. The Report Settings dialog box will display with the options available for the report you are currently viewing.

Figure 11 Report Settings Dialog Box for the Bandwidth Summary Report

Selecting a Graphical Display

Some reports allow you to specify how many items to display in the report. Select 5, 10, 20, 50, 100, or All from the Number of Items list. This allows you to limit the display to a the specified number in order to make the report easier to read.
Many reports offer different graphical displays for the data, such as a bar-graph or a pie chart. To select a graphical display, select **Chart and Table** under **Report Display Settings** and choose the display type from the **Chart Type** list. Your selection should display immediately in the report screen. For most reports you can choose **Area**, **Bar**, **Pie** or **Plot**.

**Figure 12  Area, Bar, Pie, and Plot Charts**

---

**Setting a Date or Date Range**

Most summary reports display only information for a single date. Most over-time reports display information over a date range.

**Selecting a Single Date**

To select a single date for a report, under **Select Report Date**, select the month and year from the drop-down lists and click on the day of the month in the calendar. Your selection should display immediately in the report screen. You can select dates one after another and watch the display to compare data over different days.
Managing Report Settings

Figure 13  Single Date Selection

There are two methods of selecting the date range for a report over time:

You can enter the number of days to report on since the last time the data was summarized, and then click Generate Report.

Figure 14  Specify Number of Days to Report

You can select a Start Date and End Date and click Generate Report. The lists display all the dates of summarized data available to report on.

Figure 15  Select Start and End Dates for Report
Additional Settings

Many reports have additional settings you can select such as source and destination interfaces to report traffic through or how to display names and IP addresses. Make your selection from these lists and click Generate Report.

Viewing At A Glance Reports

This section describes how to implement and manage ViewPoint At A Glance reports. This document contains the following sections:

- “At-a-Glance Reports Overview” section on page 89
- “Configuring Parameters for the ‘At A Glance’ Screen” section on page 92

At-a-Glance Reports Overview

This section provides an introduction to the ‘At A Glance’ feature. This section contains the following subsections:

- “What is the ‘At A Glance’ Reporting Feature?” section on page 89
- “Benefits” section on page 89
- “How Does ‘At A Glance’ Reporting Work?” section on page 90

What is the ‘At A Glance’ Reporting Feature?

SonicWALL ViewPoint provides detailed and comprehensive reports of network activity. The ‘At A Glance’ feature is a collection of customized reports, displayed on a single screen.

Network administrators access the following when viewing the ‘At A Glance’ Reporting feature:

- Improved ease of use to monitor network activity for a single day at a time
- A maximum of six reports can be configured to view at a single time
- The set of default reports can be configured by the administrator

Benefits

The benefits of the ‘At A Glance’ feature include:
- Enabling network administrators to get a bird’s eye view of high-interest areas on a daily basis
- Displaying multiple reports on a single screen to monitor critical network events and activity, such as security threats, inappropriate web use, and bandwidth levels

**How Does ‘At A Glance’ Reporting Work?**

Figure 16 shows a typical view of the ‘At A Glance’ summary page from a global-view level, which summarizes information from all units.

**Figure 16  At A Glance Summary-Global View**

The first section called **Summary At A Glance** contains a summary of the activities and any warnings from the system/firewall based upon the settings of the alert threshold. These settings are initially set by default and can be changed by the administrator.

The second section called **Reports At A Glance** contains a view of four chart reports. Clicking on any report will take the user to the section of that report for more details. The reports displayed on this page are set by default that can be configured by the administrator.
The ViewPoint reporting module receives its information from the stream of syslog data sent by each SonicWALL appliance and stores it in the SonicWALL ViewPoint database or as files on the hard disk.

Figure 17 shows a typical view of the ‘At A Glance’ summary page from a summary-unit level, which summarizes information from specified units.

Figure 17  ‘At A Glance’ Summary-Unit View
Displaying Reports by Date

The At A Glance Summary screen is available at the group and unit levels and shows reports for a single day. To view a report for an alternate day, navigate to the date of choice by selecting the arrow keys to the right or left of the date displayed in the Reports At A Glance bar.

Alternately, you can click the Report Settings icon that displays a calendar to select a date. The Report Settings icon is located to the right of the Reports At A Glance bar, next to the print icon.

Configuring Parameters for the ‘At A Glance’ Screen

The reports in the “At A Glance” section are context sensitive—click on them and you will be navigated to the report that has the table data with details in addition to the graph itself.

The reports in the ‘At A Glance’ summary page are configurable from the Reports > Configuration > Reports At A Glance page (see Figure 18). From this page, network administrators can configure the following features:

- Summary/Statistics List
- Alerts List and Threshold
- Reports List
Summary/Statistics List

In the Reports > Configuration > At A Glance page, review the items in the Summary/Statistics List to determine the information that displays in the Summary At A Glance section.

The default list is set at four summary/statistics items:

- Up Time (Hours)
- Total Bandwidth (MBytes)
- Total HTTP Bandwidth (MBytes)
- Total Attacks
Adding Reports to the Summary/Statistics List

To add values to display in a report, perform the following steps:

1. Navigate to the Summary/Statistics List.
2. Select a title from the pull-down menu by highlighting it.
3. Click the Add button.

Note: A maximum of six summary/statistics items can display at one time. You must remove one of the six items before you can add a new item.

Deleting Reports from the Summary/Statistics List

To delete a report, click the check box to the left of the report name in the Summary/Statistics List, and click the Delete button.

Alerts List and Threshold

In the Reports > Configuration > At A Glance page, review the items in the Alerts List and Threshold to determine the information that displays in the Summary At A Glance section.
To change the threshold value in the list, delete the list item and re-add it to your list.

Figure 20 Alerts List and Threshold

Adding Reports to the Alerts List and Threshold

To add values to display in a report, perform the following steps:

1. Navigate to the Alerts List and Threshold.
2. Select a title from the pull-down menu by highlighting it.
3. Click the Add button.

Note There are no default alert items listed. A maximum of six alert items can display at one time.

Deleting Reports from the Alerts List and Threshold

To delete a report, click the check box to the left of the report name in the Alerts List, and click the Delete button.
### Viewing At A Glance Reports

#### Reports List

In the Reports > Configuration > At A Glance page, review the items in the Reports List to determine the information that displays in the Summary At A Glance section.

The default list is set at four reports items:

- Bandwidth Summary
- Web Usage (Gavial View—Web Usage Summary, Unit View—Web Usage Top Users)
- Attacks Summary
- Virus Attacks Summary

#### Figure 21 Reports List

<table>
<thead>
<tr>
<th>Reports List</th>
<th>Reports List</th>
</tr>
</thead>
<tbody>
<tr>
<td>☐ Bandwidth Summary</td>
<td>☐ Bandwidth Summary</td>
</tr>
<tr>
<td>☐ Web Usage Summary</td>
<td>☐ Web Usage Summary</td>
</tr>
<tr>
<td>☐ Attacks Summary</td>
<td>☐ Attacks Summary</td>
</tr>
<tr>
<td>☐ Virus Attacks Summary</td>
<td>☐ Virus Attacks Summary</td>
</tr>
<tr>
<td>☐ Spyware Attempts Summary</td>
<td>☐ Spyware Attempts Summary</td>
</tr>
<tr>
<td>☐ VPN Usage Summary</td>
<td>☐ VPN Usage Summary</td>
</tr>
<tr>
<td>☐ Up-Time Status Summary</td>
<td>☐ Up-Time Status Summary</td>
</tr>
</tbody>
</table>

#### Adding Reports to the Reports List

To add values to display in a report, perform the following steps:

1. Navigate to the Reports List.
2. Select a title from the pull-down menu by highlighting it.
3. Click the Add button.
Note

A maximum of six summary/statistics items can display at one time. You must remove one of the six items before you can add a new item.

Deleting Reports from the Reports List

To delete a report, click the check box to the left of the report name in the Reports List, and click the Delete button.

Viewing Status Reports

Status reports display the number of hours that one or more SonicWALL appliances were online and functional during the time period.

From this information, you can locate trouble spots within your network, such as a SonicWALL appliance that is having network connectivity issues caused by the ISP.

Note

Global reports are displayed in the ViewPoint’s timezone. Reports for individual SonicWALL security appliances are displayed in the individual appliance’s time zone.

Select from the following:

- “Viewing the Status Up-Time Summary Report” on page 97
- “Viewing Bandwidth Usage Over Time” on page 106

Viewing the Status Up-Time Summary Report

The Status Up-Time Summary report contains information on the amount of status of a SonicWALL appliance or group of Status appliances during each hour of the specified day.

To view the Status Up-Time Summary report, perform the following steps:

1. Click the Reports tab.
2. Select the global icon, a group, or a SonicWALL appliance.
3. Expand the Status tree and click Up-Time Summary. The Up-Time Summary page displays.
4. The bar graph displays the amount of time the SonicWALL appliance(s) were online and functional during each hour of the day.

5. The table contains the following information:
   - **Hour**—when the sample was taken.
   - **Up Time**—number of minutes during the hour that the SonicWALL appliance was “Up.”
   - **% of Up Time**—percentage of time the SonicWALL appliance was “Up” over the hour.

6. The ViewPoint Reporting Module shows today’s report. To change the date of the report and other settings, click the Report Settings icon to display the **Report Settings** dialog box.
7. With the Report Settings dialog box you can set:
   - Display Setting: Area, Bar, or Plot chart or Table Only
   - Report Date

See “Managing Report Settings” on page 86.

**Viewing Status Up-Time Over Time**

The Status Up-Time Over Time report displays the how often the SonicWALL appliance or a group of SonicWALL appliances was available during the specified time period.

To view the Status Up-Time Over Time report, perform the following steps:

1. Click the Reports tab.
2. Select the global icon, a group, or a SonicWALL appliance.
3. Expand the Status tree and click Up-Time Over Time. The Up-Time Over Time page displays.
4. The bar graph displays the amount of time the SonicWALL appliance(s) were available during each day of the specified time period.

5. The table contains the following information:
   - **Date**—when the sample was taken.
   - **Up Time**—amount of time (in hours) that the SonicWALL appliance was “Up.”
   - **% of Up Time**—percentage of time the SonicWALL appliance was “Up” over the date.

6. To change the date range of the report, click Report Settings icon to display the **Reporting Date Range Selector** dialog box. You can select:
   - **Number of Items** to display in the report
   - **Display Type**: Area, Bar, or Plot chart or **Table Only**
   - Number of days to report on since last summarization
   - Date range to report on

See “Managing Report Settings” on page 86.
Viewing Bandwidth Reports

Bandwidth reports display the amount of data transferred through one or more selected SonicWALL appliances.

Bandwidth reports are an ideal starting point for viewing overall bandwidth usage. You can view bandwidth usage view by the hour, day, or over a period of days. Additionally, you can view the top users of bandwidth.

From this information, you can determine network strategies. For example, if you need more bandwidth, you might need to upgrade network equipment, or you might simply need to curtail the bandwidth usage of a few employees.

Note   All reports appear in the Firewall’s time zone.

Select from the following:
• “Viewing the Bandwidth Summary Report” on page 101
• “Monitoring Bandwidth Usage in Real Time” on page 103
• “Viewing the Top Users of Bandwidth” on page 104
• “Viewing Bandwidth Usage Over Time” on page 106
• “Viewing the Top Users of Bandwidth Over Time” on page 108

Viewing the Bandwidth Summary Report

The Bandwidth Summary report contains information on the amount of traffic handled by a SonicWALL appliance or group of SonicWALL appliances during each hour of the specified day.

To view the Bandwidth Summary report, perform the following steps:

1. Click the Reports tab.
2. Select the global icon, a group, or a SonicWALL appliance.
3. Expand the Bandwidth tree and click Summary. The Summary page displays.
4. The bar graph displays the amount of bandwidth transferred during each hour of the day.

5. The table contains the following information:
   - **Hour**—when the sample was taken.
   - **Events**—number of events or “hits.”
   - **MBytes**—number of megabytes transferred.
   - **% of MBytes**—percentage of megabytes transferred during this hour, compared to the day. For example, if 1000 megabytes of data was transferred during the day and 100 megabytes was transferred at the 12:00 time period, the **% of MBytes** field will display 10%.

6. The ViewPoint Reporting Module shows today’s report. To change the date of the report and other settings, click the Report Settings icon 🌌. The Report Settings dialog box displays.
7. Select the type of chart to display from the Report Display Settings area.

8. Select the year, month, and day that you would like to view from the Select Report Date area.

9. Select the Source and Destination interfaces to view. If you want to track bandwidth usage in both directions, select the Bi-directional check box.

10. When you are finished, click Generate Report. The ViewPoint Reporting Module displays the report for the selected day.

Note These settings will stay in effect for all similar reports during your active login session.

Monitoring Bandwidth Usage in Real Time

The Bandwidth Monitor displays bandwidth usage for the selected SonicWALL appliance in real time.

To view the Bandwidth Monitor, perform the following steps:

1. Click the Reports tab.
2. Select a SonicWALL appliance.
3. Expand the Bandwidth tree and click Monitor. The Monitor page displays.
Viewing Bandwidth Reports

GMS Dev: UI displays: “This screen is available only for Generation 1 Summarizer.” We need to add data to get an updated screenshot.

4. The Bandwidth Monitor shows the amount of data transferred during each sampling period for the last five minutes. The sampling period is five seconds.

Viewing the Top Users of Bandwidth

The Top Users report displays the users who used the most bandwidth on the specified date.

To view the Top Users report, perform the following steps:

1. Click the Reports tab.
2. Select a SonicWALL appliance.
3. Expand the Bandwidth tree and click Top Users. The Top Users page displays.
4. The pie chart displays the percentage of bandwidth transferred by each user.

5. The table contains the following information:
   - **Users**—the IP address of the user.
   - **Connections**—number of events or “hits.”
   - **MBytes**—number of megabytes.
   - **% of MBytes**—percentage of megabytes transferred by this user, compared to all users. For example, if 1000 megabytes of data was transferred during the day and 200 megabytes was transferred by the top user, the **% of MBytes** field will display 20%.

6. By default, the ViewPoint Reporting Module shows today's report, a pie chart, and the ten top users. To change these settings, click the Report Settings icon. The Reports Setting dialog box displays.

7. Select the number of users that will be displayed from the **Number of Users** list box.

8. Select the type of chart from the **Chart Type** list box.

9. Select the year, month, and day that you would like to view.

10. To display a limited group of users, enter the user IDs in the **Select Users** field and separate each entry with a comma.
Note  This field does not use pattern matching. For example, “john” will not match john_smith, john42, or big_john.

11. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.

Note  These settings will stay in effect for all similar reports during your active login session.

**Viewing Bandwidth Usage Over Time**

The Bandwidth Over Time report displays the daily amount of traffic handled by a SonicWALL appliance or a group of SonicWALL appliances for the specified time period.

To view the Bandwidth Over Time report, perform the following steps:

1. Click the **Reports** tab.
2. Select the global icon, a group, or a SonicWALL appliance.
3. Expand the **Bandwidth** tree and click **Over Time**. The Over Time page displays.
4. The bar graph displays the amount of bandwidth transferred during each day of the specified time period.

5. The table contains the following information:
   - **Date**—when the sample was taken.
   - **Connections**—number of hits.
   - **MBytes**—number of megabytes transferred.
   - **% of MBytes**—percentage of megabytes transferred during this day, compared to the time period. For example, if 100,000 megabytes of data was transferred during the time period and 25,000 megabytes was transferred on one day, the % of MBytes field will display 25%.

6. To change the date range of the report, click the Report Settings icon 🎨. The Reports Setting dialog box displays.

7. Select the number of items that will be displayed from the drop-down list.

8. Select whether to display a chart and table or a table only.

9. Select from the following:
   - To select a period of time before the last summarization, enter the number of days to view before the last summarization.
   - To view a specific date range, select the starting and ending dates that you would like to view.
10. When you are finished, click Close. The ViewPoint Reporting Module displays the report for the selected date range.

**Note**

These settings will stay in effect for all similar reports during your active login session.

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**Viewing the Top Users of Bandwidth Over Time**

The Top Users report displays the users who used the most bandwidth on the specified date.

To view the Top Users Over Time report, perform the following steps:

1. Click the **Reports** tab.
2. Select a SonicWALL appliance.
3. Expand the **Bandwidth** tree and click **Top Users Over Time**. The Top Users Over Time page displays.

**Figure 30**  **Reports > Bandwidth > Top Users Over Time**

4. The pie chart displays the percentage of bandwidth transferred by each user.
5. The table contains the following information:
   - **Users**—the IP address of the user.
– **Connections**— number of events or “hits.”
– **MBytes**— number of megabytes.
– **% of MBytes**— percentage of megabytes transferred by this user, compared to all users. For example, if 1000 megabytes of data was transferred during this period and 200 megabytes was transferred by the top user, the % of MBytes field will display 20%.

6. To change the date range of the report, click the Report Settings icon . The Reports Setting dialog box displays.

7. Select whether to display a chart and table or a table only.

8. Select from the following:
   – To select a period of time before the last summarization, enter the number of days to view before the last summarization.
   – To view a specific date range, select the starting and ending dates that you would like to view.

9. To display a limited group of users, enter the user IDs in the **Select Users** field and separate each entry with a comma.

   **Note** This field does not use pattern matching. For example, “john” will not match john_smith, john42, or big_john.

10. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected date range.

   **Note** These settings will stay in effect for all similar reports during your active login session.

### Viewing ROI Reports

Return on Investment (ROI) reports display the total cost of consumed network bandwidth transferred through one or more selected SonicWALL appliances.

ROI reports are an ideal starting point for viewing the overall cost of consumed network bandwidth usage. You can view ROI usage view by the hour, day, or over a period of days. Additionally, you can view the top users who consume the most network bandwidth and the percentage of the total cost attributed to each top user.
From this information, you can determine network strategies. For example, if you need to lower costs attributed to consumed network bandwidth, you will have the ability to generate ROI reports to identify the time where network bandwidth consumption costs.

**Note**

All reports appear in the Firewall’s time zone.

Select from the following:

- “Viewing the ROI Summary Report” on page 110
- “Viewing the Top Users in an ROI Report” on page 112
- “Viewing ROI Over Time” on page 113
- “Viewing ROI for Top Users Over Time” on page 115

**Viewing the ROI Summary Report**

The ROI Summary report contains information on the amount of traffic handled (measured in megabytes (MBytes)) by a SonicWALL appliance or group of SonicWALL appliances during each hour of the specified day.

To view the ROI Summary report, perform the following steps:

1. Click the **Reports** tab.
2. Select the global icon, a group, or a SonicWALL appliance.
3. Expand the **ROI** tree and click **Summary**. The Summary page displays.
4. The bar graph displays the total cost for consumed network bandwidth spent each hour of the day.

5. The table contains the following information:
   - **Hour**—when the sample was taken.
   - **MBBytes**—number of megabytes transferred.
   - **Cost**—total amount of the expense per 100 megabytes.
   - **% of Cost**—percentage of the total amount of the expense from consumed network bandwidth during this hour, compared to the day.

6. SonicWALL ViewPoint shows today’s report. To change the date of the report and other settings, click the Report Settings icon \(\text{\textcopyright}\). The Reports Setting dialog box displays.

7. Select the type of chart to display from the **Report Display Settings** area.

8. Select the year, month, and day that you would like to view from the **Select Report Date** area.

**Note** These settings will stay in effect for all similar reports during your active login session.
Viewing the Top Users in an ROI Report

The Top Users report displays the users who used consumed the most network bandwidth and the correlating expense for the specified date.

To view the Top Users report, perform the following steps:

1. Click the **Reports** tab.
2. Select a SonicWALL appliance.
3. Expand the **ROI** tree and click **Top Users**. The Top Users page displays.

![Figure 32 Reports > ROI > Top Users](image)

4. The pie chart displays an ROI report on the consumed network bandwidth costs used by each user.

5. The table contains the following information:
   - **Users**—the IP address or name of the user.
   - **MBytes**—number of megabytes transferred.
   - **Cost**—total amount of the expense per 100 megabytes.
   - **% of Cost**—percentage of the total amount of the expense from consumed network bandwidth during this hour, compared to the day.

6. By default, SonicWALL ViewPoint shows today's report, a pie chart, and the ten top users. To change these settings, click the Report Settings icon . The Reports Setting dialog box displays.
7. Select the number of users that will be displayed from the **Number of Users** list box.

8. Select the type of chart from the **Chart Type** list box.

9. Select the year, month, and day that you would like to view.

10. To display a limited group of users, enter the user IDs in the **Select Users** field and separate each entry with a comma.

   **Note**  
   This field does not use pattern matching. For example, “john” will not match john_smith, john42, or big_john.

11. When you are finished, click **Close**. SonicWALL ViewPoint displays the report for the selected day.

   **Note**  
   These settings will stay in effect for all similar reports during your active login session.

### Viewing ROI Over Time

The ROI Over Time report displays the total daily expense for consumed network bandwidth handled by a SonicWALL appliance or a group of SonicWALL appliances for the specified time period.

To view the ROI Over Time report, perform the following steps:

1. Click the **Reports** tab.
2. Select the global icon, a group, or a SonicWALL appliance.
3. Expand the **ROI** tree and click **Over Time**. The Over Time page displays.
4. The bar graph displays the total cost for bandwidth transferred during each day of the specified time period.

5. The table contains the following information:
   - **Date**—when the sample was taken.
   - **MBytes**—number of megabytes transferred.
   - **Cost**—total amount of the expense per 100 megabytes
   - **% of Cost**—percentage of the total amount of the expense from consumed network bandwidth during this hour, compared to the day.

6. To change the date range of the report, click the Report Settings icon. The Reporting Date Range Selector dialog box displays.

7. Select whether to display a chart and table or a table only.

8. Select from the following:
   - To select a period of time before the last summarization, enter the number of days to view before the last summarization.
   - To view a specific date range, select the starting and ending dates that you would like to view.

9. When you are finished, click **Close**. SonicWALL ViewPoint displays the report for the selected date range.
Viewing ROI for Top Users Over Time

The Top Users report displays the users who used the most bandwidth and accumulated the highest cost on the specified date.

To view the Top Users Over Time report, perform the following steps:

1. Click the Reports tab.
2. Select a SonicWALL appliance.
3. Expand the ROI tree and click Top Users Over Time. The Top Users Over Time page displays.

4. The pie chart displays the total cost of network bandwidth consumed by each user.
5. The table contains the following information:
   - Date—when the sample was taken.
   - MBytes—number of megabytes transferred.
Viewing Service Usage Reports

- **Cost**—total amount of the expense per 100 megabytes.
- **% of Cost**—percentage of the total amount of the expense from consumed network bandwidth during this hour, compared to the day.

6. To change the date range of the report, click the Report Settings icon 📏. The Reporting Date Range Selector dialog box displays.

7. Select whether to display a chart and table or a table only.

8. Select from the following:
   - To select a period of time before the last summarization, enter the number of days to view before the last summarization.
   - To view a specific date range, select the starting and ending dates that you would like to view.

9. To display a limited group of users, enter the user IDs in the **Select Users** field and separate each entry with a comma.

   **Note** This field does not use pattern matching. For example, “john” will not match john_smith, john42, or big_john.

10. When you are finished, click **Close**. SonicWALL ViewPoint displays the report for the selected date range.

   **Note** These settings will stay in effect for all similar reports during your active login session.

Viewing Service Usage Reports

Service reports provide information on the amount of data transmitted through the selected SonicWALL appliance by each service.

Service reports are useful for revealing inappropriate usage of bandwidth and can help determine network policies. For example, if there is a large spike of bandwidth usage, you can determine whether this is caused by regular web access, someone using FTP to transfer large files, an attempted Denial of Service (DoS) attack, or another service.

**Note** All reports appear in the Firewall’s time zone.

Select from the following:
- “Viewing the Services Summary Report” on page 117
Viewing Service Usage Reports

- “Monitoring Service Usage in Real Time” on page 118

Note: You cannot view services reports from the global or group view.

Viewing the Services Summary Report

The Services Summary report displays the amount of traffic handled by each service during each hour of the specified day.

To view the Services Summary report, perform the following steps:

1. Click the **Reports** tab.
2. Select a SonicWALL appliance.
3. Expand the **Services** tree and click **Summary**. The Summary page displays.

*Figure 35 Reports > Services > Summary*

4. The bar graph displays the amount of bandwidth used by each service during each hour of the day.

5. The table contains the following information:
   - **Protocol**— the service.
   - **Events**— number of events or “hits.”
Viewing Service Usage Reports

- **MBytes**— number of kilobytes.
- **% of MBytes**— percentage of megabytes transferred by this service on the selected day, compared to all other services. For example, if 10,000 megabytes of data was transferred during the day and 5,000 of the megabytes were transferred, the % of MBytes field will display 50%.

6. The ViewPoint Reporting Module shows today's report. To change report settings, click the Report Settings icon 📊. The Report Settings dialog box displays.

7. Select the type of chart to display from the **Report Display Settings** area.

8. Select the year, month, and day that you would like to view.

9. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.

**Note** These settings will stay in effect for all similar reports during your active login session.

Monitoring Service Usage in Real Time

The Services Monitor displays service usage for the selected SonicWALL appliance in real time.

To view the Service Monitor, perform the following steps:

1. Click the **Reports** tab.
2. Select a SonicWALL appliance.
3. Expand the **Services** tree and click **Monitor**. The Monitor page displays.

**GMS Dev: UI displays:** “This screen is available only for Generation 1 Summarizer.” We need to add data to get an updated screenshot.
4. The Services Monitor shows the amount of data transferred for each service during each sampling period for the last five minutes. The sampling period is 15 seconds.

**Viewing Web Usage Reports**

Web usage reports provide information on the amount of web usage that occurs through the selected SonicWALL appliance(s).

Web usage reports can be used to view web bandwidth usage by the hour, day, or over a period of days. Additionally, you can view the top users of web bandwidth and view the most visited sites.

**Note** All reports appear in the Firewall’s time zone.

Select from the following:

- “Viewing the Web Usage Summary Report” on page 120
- “Viewing the Top Web Sites” on page 121
- “Viewing the Top Users of Web Bandwidth” on page 123
- “Viewing Web Usage by User” on page 124
- “Viewing Web Usage by Site” on page 126
- “Viewing Web Usage by Category” on page 127
Viewing the Web Usage Summary Report

The Web Usage Summary report contains information on the amount of HTTP bandwidth handled by a SonicWALL appliance or group of SonicWALL appliances during each hour of the specified day.

To view the Web Usage Summary report, perform the following steps:

1. Click the **Reports** tab.
2. Select the global icon, a group, or a SonicWALL appliance.
3. Expand the **Web Usage** tree and click **Summary**. The Summary page displays.

**Figure 37 Reports > Web Usage > Summary**

4. The bar graph displays the amount of HTTP bandwidth transferred during each hour of the day.
5. The table contains the following information:
   - **Hour**—when the sample was taken.
   - **Events**—number of events or “hits.”
   - **MBytes**—number of megabytes transferred.
   - **% of MBytes**—percentage of megabytes transferred during this hour, compared to the day. For example, if 1000 megabytes of HTTP data was transferred during the day and 100 megabytes was transferred at the 12:00 time period, the **% of MBytes** field will display 10%.

6. The ViewPoint Reporting Module shows today’s report. To change report settings, click the Report Settings icon. The Report Settings dialog box displays.

7. Select the type of chart to display from the **Report Display Settings** area.

8. Select the year, month, and day that you would like to view.

9. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.

**Viewing the Top Web Sites**

The Top Sites report displays the web sites that used the most HTTP bandwidth on the specified date. To view the Top Sites report, perform the following steps:

1. Click the **Reports** tab.

2. Select a SonicWALL appliance.

3. Expand the **Web Usage** tree and click **Top Sites**. The Top Sites page displays.
4. The pie chart displays the percentage of bandwidth used to access the top sites.

5. The table contains the following information:
   - **Site**—URL or IP address of the site.
   - **Hits**—number of hits.
   - **MBytes**—number of megabytes transferred.
   - **Category**—the web site category.
   - **% of MBytes**—percentage of megabytes transferred between this site, compared to all other HTTP traffic. For example, if 10,000 megabytes of data was transferred during the day and 5,000 megabytes was transferred between the appliance and Ebay, the **% of MBytes** field will display 50% and you have a problem.

6. By default, ViewPoint Reporting shows today’s report, a pie chart, and the ten top sites. To change these settings, click the Report Settings icon. The Report Settings dialog box displays.

7. Select the number of sites that will be displayed from the **Number of Sites** list box.

8. Select whether to display a chart and table or a table only.

9. Select the year, month, and day that you would like to view.

10. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.
Viewing Web Usage Reports

**Note** These settings will stay in effect for all similar reports during your active login session.

**Viewing the Top Users of Web Bandwidth**

The Top Users report displays the users who used the most HTTP bandwidth on the specified date.

To view the Top Users report, perform the following steps:

1. Click the **Reports** tab.
2. Select a SonicWALL appliance.
3. Expand the **Web Usage** tree and click **Top Users**. The Top Users page displays.

**Figure 39**  **REports > Web Usage > Top Users**

4. The pie chart displays the percentage of bandwidth transferred by each of the top users.

5. The table contains the following information:
   - **Users**— the IP address of the user.
   - **_hits**— number of hits.
   - **MBytes**— number of megabytes transferred.
Viewing Web Usage Reports

- **% of MBytes**—percentage of megabytes transferred by this user, compared to all users. For example, if 1000 megabytes of data was transferred during the day and 200 megabytes was transferred by the top user, the **% of MBytes** field will display 20%.

6. By default, ViewPoint Reporting shows today’s report, a pie chart, and the ten top users. To change these settings, click the Report Settings icon. The Report Settings dialog box displays.

7. Select the number of users that will be displayed from the **Number of Users** list box.

8. Select the type of chart from the **Chart Type** list box.

9. Select the year, month, and day that you would like to view.

10. To display a limited group of users, enter the user IDs in the **Select Users** field and separate each entry with a comma.

   **Note** This field does not use pattern matching. For example, “john” will not match john_smith, john42, or big_john.

11. When you are finished, click **Close**. The ViewPoint Reporting Module refreshes the report based on the selected settings.

   **Note** These settings will stay in effect for all similar reports during your active login session.

Viewing Web Usage by User

The By User report displays a list of all users, their top sites, the number of hits to each site, and the amount of data transferred.

To view the By User report, perform the following steps:

1. Click the **Reports** tab.

2. Select a SonicWALL appliance.

3. Expand the **Web Usage** tree and click **By User**. The By User page displays.
4. The table contains the following information:
   - **User**— the IP address of the user.
   - **Hits**— the number of hits to each web site visited by the user.
   - **MBytes**— the number of megabytes transferred.

5. To change the display settings, click the Report Settings icon. The Report Settings dialog box displays.

6. Select the number of users that will be displayed from the **Number of Users** list box.

7. Select the type of chart from the **Chart Type** list box.

8. Select the year, month, and day that you would like to view.

9. To display a limited group of users, enter the user IDs in the **Select Users** field and separate each entry with a comma.

   **Note**  
   This field does not use pattern matching. For example, “john” will not match john_smith, john42, or big_john.

10. When you are finished, click **Close**. The ViewPoint Reporting Module refreshes the report based on the selected settings.

   **Note**  
   These settings will stay in effect for all similar reports during your active login session.
Viewing Web Usage by Site

The By Site report displays a list of all sites, the users that accessed the sites, the number of hits to each site, and the amount of data transferred.

To view the By Site report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select a SonicWALL appliance.
4. Expand the Web Usage tree and click By Site. The By Site page displays.

The table contains the following information:

- **Site**— the URL of the site.
- **Hits**— the number of hits to the web site, by user.
- **MBytes**— the number of megabytes transferred, by the user.
- **Category**— the category of the site.

5. The ViewPoint Reporting Module shows today’s report and all web sites. To change the date of the report or web sites displayed, click the Report Settings icon. The Report Settings dialog box displays.

6. Select the number of sites that will be displayed from the Number of Sites list box.
8. Select the number of users that will be displayed per site from the **Number of Users per Site** list box.

9. To only display a limited set of web sites, enter the URLs in the **Select Site** field and separate each entry with a comma.

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**Note** This field does not use pattern matching. For example, “www.yahoo.com” will not match yahoo.com, mail.yahoo.com, or shopping.yahoo.com.

10. When you are finished, click **Close**. The ViewPoint Reporting Module adjusts the report for the selected day and settings.

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**Note** These settings will stay in effect for all similar reports during your active login session.

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**Viewing Web Usage by Category**

The Web Usage By Category report displays a list of the top Web site categories, the number of hits to each category, the amount of data transferred, and the percentage of data transferred.

To view the By Category report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select a SonicWALL appliance.
4. Expand the **Web Usage** tree and click **By Category**. The By Category page displays.
5. The table contains the following information:
   - **Category**—the web site category.
   - **Hits**—the number of hits to the Web site category.
   - **MBytes**—the number of megabytes transferred.
   - **% of MBytes**—the percentage of megabytes transferred.

6. The ViewPoint Reporting Module shows today’s report and all web site categories. To change the date of the report or web site categories displayed, click the Report Settings icon. The Report Settings dialog box displays.

7. Select the number of items that will be displayed from the **Number of Items** list box.

8. Select whether to display a chart and table or a table only.

9. When you are finished, click **Close**. The ViewPoint Reporting Module adjusts the report for the selected day and settings.

**Note** These settings will stay in effect for all similar reports during your active login session.
Viewing Web Usage Over Time

The Web Usage Over Time report displays the daily amount of HTTP bandwidth handled by a SonicWALL appliance or group of SonicWALL appliances for the specified time period.

To view the Web Usage Over Time report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select the global icon, a group, or a SonicWALL appliance.
4. Expand the Web Usage tree and click Over Time. The Over Time page displays.

Figure 43 Reports > Web Usage > Over Time

5. The bar graph displays the amount of HTTP bandwidth transferred during each day of the specified time period.
6. The table contains the following information:
   - Date—when the sample was taken.
   - Connections—the number of connections or hits.
   - MBytes—the number of megabytes transferred.
Viewing Web Usage Reports

- **% of MBytes**—the percentage of megabytes transferred during this day, compared to the time period. For example, if 100,000 megabytes of data was transferred during the time period and 25,000 megabytes was transferred on one day, the **% of MBytes** field will display 25%.

7. To change the date range of the report, click the Report Settings icon 🗓️. The Reporting Date Range Selector dialog box displays.

8. Select whether to display a chart and table or a table only.

9. Select from the following:
   - To select a period of time before the last summarization, enter the number of days to view before the last summarization.
   - To view a specific date range, select the starting and ending dates that you would like to view.

10. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected date range.

**Note**

These settings will stay in effect for all similar reports during your active login session.

Viewing Top Sites Over Time

The Top Sites Over Time report displays the most visited web sites for the specified time period.

To view the Top Sites Over Time report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.

2. Click the **Reports** tab.

3. Select a SonicWALL appliance.

4. Expand the **Web Usage** tree and click **Top Sites Over Time**. The Top Sites Over Time page displays.
5. The bar graph displays the amount of HTTP bandwidth transferred during each day of the specified time period.

6. The table contains the following information:
   - **Site**— URL or IP address of the site.
   - **Hits**— the number of hits.
   - **MBytes**— the number of megabytes transferred.
   - **Category**— the website category.
   - **% of MBytes**— the percentage of megabytes transferred between this site, compared to all other HTTP traffic. For example, if 1,000,000 megabytes of data was transferred during the day and 500,000 megabytes was transferred between the appliance and eBay, the **% of MBytes** field will display 50% and you have a problem.

7. To change the date range of the report, click the Report Settings icon . The Reporting Date Range Selector dialog box displays.

8. Select whether to display a chart and table or a table only.

9. Select from the following:
   - To select a period of time before the last summarization, enter the number of days to view before the last summarization.
   - To view a specific date range, select the starting and ending dates that you would like to view.
10. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected date range.

**Note** These settings will stay in effect for all similar reports during your active login session.

## Viewing Top Users Over Time

The Top Users Over Time report displays the top users of bandwidth for the specified time period. To view the Top Users Over Time report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select a SonicWALL appliance.
4. Expand the **Web Usage** tree and click **Top Users Over Time**. The Top Users Over Time page displays.

**Figure 45 Reports > Web Usage > Top Users Over Time**

5. The graph provides a graphical display of the percentage of bandwidth transferred by each of the top users over the specified time period.

6. The table contains the following information:
   - **Site**— URL or IP address of the site.
Viewing Web Usage Reports

- **Hits**—number of hits.
- **MBytes**—number of megabytes transferred.
- **Category**—the category of the site.
- **% of MBytes**—percentage of megabytes transferred by this user, compared to all users. For example, if 1000 megabytes of data was transferred during the period and 200 megabytes was transferred by the top user, the **% of MBytes** field will display 20%.

7. To change the date range of the report, click the Report Settings icon. The Reporting Date Range Selector dialog box displays.

8. Select whether to display a chart and table or a table only.

9. Select from the following:
   - To select a period of time before the last summarization, enter the number of days to view before the last summarization.
   - To view a specific date range, select the starting and ending dates that you would like to view.

10. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected date range.

**Note** These settings will stay in effect for all similar reports during your active login session.

**Viewing Web Sites Accessed By Users**

To view web sites access by users on a given day, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Click the **Web Usage** option.
4. Click the **By User** option. ViewPoint displays the By User page. This page contains a list of users and the number of web site hits the user had established during a set interval.
5. Click the Plus (‘+’) symbol at the top of the user list. When the resulting dialog box displays, click an eye icon. ViewPoint displays the Access Time Details page that displays the web sites the user accessed that day.

6. The screen displays the following columns of information about each site hit:
   - **Time**—the date and time the user reached the site.
   - **Full URL**—the URL of the site.
   - **Src Interface**—the interface used by the user (generally, a local area network on which the user's PC or workstation resides).
   - **Dst Interface**—the destination interface.
- **TX Bytes**—The number of bytes transmitted from the user to the destination web site.
- **RX Bytes**—The number of bytes received by the user from the destination web site.

### Viewing Web Usage By User Over Time

The By User Over Time report displays a list of all users, their top sites, the number of hits to each site, and the amount of data transferred for the specified time period.

To view the By User Over Time report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select a SonicWALL appliance.
4. Expand the **Web Usage** tree and click **By User Over Time**. The By User Over Time page displays.

#### Figure 48 Reports > Web Usage > By User Over Time

![Image of By User Over Time report]

5. The table contains the following information:
   - **User**—the IP address of the user.
   - **Hits**—number of hits to each web site visited by the user.
   - **MBytes**—number of megabytes transferred.
6. To change the date range of the report, click the Report Settings icon 📅. The Reporting Date Range Selector dialog box displays.

7. Select whether to display a chart and table or a table only.

8. Select from the following:
   - To select a period of time before the last summarization, enter the number of days to view before the last summarization.
   - To view a specific date range, select the starting and ending dates that you would like to view.

9. When you are finished, click Close. The ViewPoint Reporting Module displays the report for the selected date range.

**Note**  These settings will stay in effect for all similar reports during your active login session.

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**Viewing Web Usage By Category Over Time**

The By Category Over Time report displays a list of all users, their top sites, the number of hits to each site, and the amount of data transferred for the specified time period.

To view the By Category Over Time report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select a SonicWALL appliance.
4. Expand the Web Usage tree and click By Category Over Time. The By User Over Time page displays.
5. The table contains the following information:
   - **Category**—the website category.
   - **Hits**—number of hits to each website visited by the user.
   - **MBytes**—number of megabytes transferred.
   - **% of MBytes**—percentage of megabytes transferred by this user, compared to all users. For example, if 1000 megabytes of data was transferred during the period and 200 megabytes was transferred by the top user, the % of MBytes field will display 20%.

6. To change the date range of the report, click the Report Settings icon. The Reporting Date Range Selector dialog box displays.

7. Select whether to display a chart and table or a table only.

8. Select from the following:
   - To select a period of time before the last summarization, enter the number of days to view before the last summarization.
   - To view a specific date range, select the starting and ending dates that you would like to view.

9. When you are finished, click Close. The ViewPoint Reporting Module displays the report for the selected date range.
Viewing Browse Time Reports

Browse Time reports display the amount of time consumed browsing the Internet through one or more selected SonicWALL appliances.

Browse Time reports are an ideal starting point for viewing time spent browsing the Internet. You can view Browse Time usage view by the hour, day, or over a period of days. Additionally, you can view the top users who browse the Internet the most and the percentage of the browse time accrued by each top user.

From this information, you can determine network strategies. For example, if you need to lower costs attributed to consumed network bandwidth, you will have the ability to generate Browse Time reports to identify the total amount time used for non-job function-related Internet browsing.

Note All reports appear in the Firewall’s time zone.

Select from the following:

- “Viewing the Browse Time Summary Report” on page 138
- “Viewing the Top Users in a Browse Time Report” on page 140
- “Viewing Browse Time Usage Over Time” on page 143
- “Viewing the Top Users of Browse Time Over Time” on page 144

Viewing the Browse Time Summary Report

The Browse Time Summary report contains information on the amount of time spend browsing the Internet behind a SonicWALL appliance or group of SonicWALL appliances during each hour of the specified day.

To view the Browse Time Summary report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select the global icon, a group, or a SonicWALL appliance.
4. Expand the Browse Time tree and click Summary. The Summary page displays.
5. The bar graph displays the total time spent browsing non-job function-related sites on the Internet each hour of the day.

6. The table contains the following information:
   - **Hour**—when the sample was taken.
   - **Browse Time**—number of hours, minutes, and seconds spent browsing non-job function-related sites on the Internet.
   - **% of Browse Time**—percentage of the total amount of time browsing non-job function-related sites on the Internet during this hour, compared to the day.

7. SonicWALL ViewPoint shows today's report. To change the date of the report and other settings, click the Report Settings icon. The Report Settings dialog box displays.

8. Select the type of chart to display from the **Report Display Settings** area.

9. Select the year, month, and day that you would like to view from the **Select Report Date** area.

**Note** These settings will stay in effect for all similar reports during your active login session.
Viewing the Top Users in a Browse Time Report

The Top Users report displays the users who spent the most time browsing non-job function-related sites on the Internet for the specified date.

To view the Top Users report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select a SonicWALL appliance.
4. Expand the **Browse Time** tree and click **Top Users**. The Top Users page displays.

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**Figure 51  Reports > Browse Time > Top Users**

5. The pie chart displays a Browse Time report on the total time spent browsing non-job function-related sites on the Internet by each user.

6. The table contains the following information:
   - **Users**— the IP address or name of the user.
   - **Browse Time**— number of hours, minutes, and seconds spent browsing non-job function-related sites on the Internet.
   - **% of Browse Time**— percentage of the total amount of time browsing non-job function-related sites on the Internet during this hour, compared to the day.
7. By default, SonicWALL ViewPoint shows today’s report, a pie chart, and the ten top users. To change these settings, click the Report Settings icon . The Report Settings dialog box displays.

8. Select the number of users that will be displayed from the **Number of Users** list box.

9. Select the type of chart from the **Chart Type** list box.

10. Select the year, month, and day that you would like to view.

11. To display a limited group of users, enter the user IDs in the **Select Users** field and separate each entry with a comma.

**Note**

This field does not use pattern matching. For example, “john” will not match john_smith, john42, or big_john.

12. When you are finished, click **Close**. SonicWALL ViewPoint displays the report for the selected day.

**Note**

These settings will stay in effect for all similar reports during your active login session.

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**Viewing the Browse Time Report by User**

The By User report displays a list of all users, their top sites, the number of hits to each site, and the amount of data transferred.

To view the By User report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select a SonicWALL appliance.
4. Expand the **Browse Time** tree and click **By User**. The By User page displays.
5. The table contains the following information:
   - **User**—the IP address of the user.
   - **Browse Time**—the time in hours, minutes and seconds on a specific IP address.

6. To change the display settings, click the Report Settings icon. The Report Settings dialog box displays.

7. Select the number of users that will be displayed from the **Number of Users** list box.

8. Select the type of chart from the **Chart Type** list box.

9. Select the year, month, and day that you would like to view.

10. To display a limited group of users, enter the user IDs in the **Select Users** field and separate each entry with a comma.

   **Note** This field does not use pattern matching. For example, “john” will not match john_smith, john42, or big_john.

11. When you are finished, click **Close**. The ViewPoint Reporting Module refreshes the report based on the selected settings.
Viewing Browse Time Reports

Note
These settings will stay in effect for all similar reports during your active login session.

Viewing Browse Time Usage Over Time

The Browse Time Over Time report displays the total daily amount of time spent browsing non-job function-related sites on the Internet behind a SonicWALL appliance or a group of SonicWALL appliances for the specified time period.

To view the Browse Time Over Time report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select the global icon, a group, or a SonicWALL appliance.
4. Expand the Browse Time tree and click Over Time. The Over Time page displays.

5. The bar graph displays the total time spent browsing non-job function-related sites on the Internet each day of the specified time period.
6. The table contains the following information:
   – **Date**— when the sample was taken.
Viewing Browse Time Reports

- **Browse Time**—number of minutes spent browsing non-job function-related sites on the Internet.

- **% of Browse Time**—percentage of the total amount of time browsing non-job function-related sites on the Internet during this hour, compared to the day.

7. To change the date range of the report, click the Report Settings icon. The Reporting Date Range Selector dialog box displays.

8. Select whether to display a chart and table or a table only.

9. Select from the following:
   - To select a period of time before the last summarization, enter the number of days to view before the last summarization.
   - To view a specific date range, select the starting and ending dates that you would like to view.

10. When you are finished, click Close. SonicWALL ViewPoint displays the report for the selected date range.

**Note** These settings will stay in effect for all similar reports during your active login session.

Viewing the Top Users of Browse Time Over Time

The Top Users report displays the users who spent the most time browsing non-job function-related sites on the Internet on the specified date.

To view the Top Users Over Time report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.

2. Click the Reports tab.

3. Select a SonicWALL appliance.

4. Expand the **Browse Time** tree and click **Top Users Over Time**. The Top Users Over Time page displays.
5. The pie chart displays the total time spent browsing non-job function-related sites on the Internet by each user.

6. The table contains the following information:
   - **Users**—the IP address or name of the user.
   - **Browse Time**—number of hours, minutes, and seconds spent browsing non-job function-related sites on the Internet.
   - **% of Browse Time**—percentage of the total amount of time browsing non-job function-related sites on the Internet during this hour, compared to the day.

7. To change the date range of the report, click the Report Settings icon 📊. The Reporting Date Range Selector dialog box displays.

8. Select whether to display a chart and table or a table only.

9. Select from the following:
   - To select a period of time before the last summarization, enter the number of days to view before the last summarization.
   - To view a specific date range, select the starting and ending dates that you would like to view.

10. To display a limited group of users, enter the user IDs in the **Select Users** field and separate each entry with a comma.
Viewing Browse Time Reports

**Note**  This field does not use pattern matching. For example, “john” will not match john_smith, john42, or big_john.

11. When you are finished, click **Close**. SonicWALL ViewPoint displays the report for the selected date range.

**Note**  These settings will stay in effect for all similar reports during your active login session.

**Viewing Browse Time By User Over Time**

The By User Over Time report displays a list of all users, their top sites, the number of hits to each site, and the amount of data transferred for the specified time period.

To view the By User Over Time report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.

2. Click the **Reports** tab.

3. Select a SonicWALL appliance.

4. Expand the **Browse Time** tree and click **By User Over Time**. The By User Over Time page displays.
5. The table contains the following information:
   - **User**—the IP address of the user.
   - **Hits**—the number of hits to each web site visited by the user.
   - **MBytes**—the number of megabytes transferred.

6. To change the date range of the report, click the Report Settings icon. The Reporting Date Range Selector dialog box displays.

7. Select whether to display a chart and table or a table only.

8. Select from the following:
   - To select a period of time before the last summarization, enter the number of days to view before the last summarization.
   - To view a specific date range, select the starting and ending dates that you would like to view.
Viewing Web Filter Reports

Web filter reports provide information on the number of attempts that users made to access blocked web sites through the selected SonicWALL appliance(s). These reports include web sites blocked by the Content Filter List, customized keyword filtering, and domain name filtering.

Web filter reports can be used to view blocked site access attempts by the hour, day, or over a period of days. Additionally, you can view the users that most frequently attempt to access blocked sites and the most popular blocked sites.

Note
All reports appear in the Firewall’s time zone.

Select from the following:
- “Viewing the Web Filter Summary Report” on page 148
- “Viewing the Web Filter Top Sites Report” on page 150
- “Viewing the Top Users that Try to Access Blocked Sites” on page 151
- “Viewing the Blocked Sites for Each User” on page 152
- “Viewing Blocked Sites Sorted by Site” on page 153
- “Viewing Blocked Sites Sorted by Category” on page 155
- “Viewing Blocked Site Attempts Over Time” on page 156
- “Viewing the Top Blocked Site Attempts Over Time” on page 157
- “Viewing the Top Blocked Site Users Over Time” on page 159
- “Viewing Blocked Sites for Each User Over Time” on page 160
- “Viewing Blocked Sites by Category Over Time” on page 161

Viewing the Web Filter Summary Report

The Web Filter Summary report contains information on the number of times users attempt to access blocked sites for the specified day.

To view the Web Filter Summary report, perform the following steps:
1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select the global icon, a group, or a SonicWALL appliance.
4. Expand the Web Filter tree and click Summary. The Summary page displays.
5. The bar graph displays the number of blocked sites that users attempted to access during each hour of the day.

6. The table contains the following information:
   - **Hour**—time when the sample was taken.
   - **Attempts**—the number of attempts to access blocked sites.
   - **% of Attempts**—the percentage of attempts during this hour, compared to the day. For example, if 100 attempts occurred during the day and 20 attempts occurred at the 12:00 time period, the % of Attempts field will display 20%.

7. The ViewPoint Reporting Module shows today's report. To change report settings, click the Report Settings icon. The Report Settings dialog box displays.

8. Select the type of chart to display from the Report Display Settings area.

9. Select the year, month, and day that you would like to view.

10. When you are finished, click Close. The ViewPoint Reporting Module displays the report for the selected day.
Viewing the Web Filter Top Sites Report

The Web Filter Top Sites report displays the top blocked web sites that users attempted to access on the specified date.

To view the Top Sites report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select a SonicWALL appliance.
4. Expand the Web Filter tree and click Top Sites. The Top Sites page displays.

Figure 57  Reports > Web Filter > Top Sites

5. The graph provides a display of the number of access attempts for each of the top twenty blocked web sites.

6. The table contains the following information:
   - **Site**—the URL or IP address of the site.
   - **Attempts**—the number of attempts.
   - **Category**—the web site category.
   - **% of Attempts**—percentage of attempts to access the blocked site, compared to all other blocked site attempts. For example, if 500 attempts were made during the day and 100 of those attempts were for www.badsite.com, its % of Attempts field will display 20%.
7. The ViewPoint Reporting Module shows today's report. To change report settings, click the Report Settings icon . The Report Settings dialog box displays.

8. Select the type of chart to display from the Report Display Settings area.

9. Select the year, month, and day that you would like to view.

10. When you are finished, click Close. The ViewPoint Reporting Module displays the report for the selected day.

Viewing the Top Users that Try to Access Blocked Sites

The Web Filter Top Users report displays the users who made the most attempts to access blocked sites on the specified date.

To view the Top Users report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.

2. Click the Reports tab.

3. Select a SonicWALL appliance.

4. Expand the Web Filter tree and click Top Users. The Top Users page displays.

5. The pie chart displays the top users with the most blocked site attempts.

6. The table contains the following information:
Viewing Web Filter Reports

- **Users**— the IP address of the user.
- **Attempts**— the number of attempts.
- **Category**— the web site category.
- **% of Attempts**— percentage of attempts to access the blocked site, compared to all other user attempts. For example, if 500 attempts were made during the day and 250 of those attempts were made by a single user, his **% of Attempts** field will display 50%.

7. By default, ViewPoint Reporting shows today's report, a pie chart, and the ten top users. To change these settings, click the Report Settings icon 📊. The Report Settings dialog box displays.

8. Select the number of users that will be displayed from the **Number of Users** list box.

9. Select the type of chart from the **Chart Type** list box.

10. Select the year, month, and day that you would like to view.

11. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.

**Note**
These settings will stay in effect for all similar reports during your active login session.

**Viewing the Blocked Sites for Each User**

The Web Filter By User report displays the top blocked web sites that each user attempted to access on the specified date.

To view the Web Filter By User report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select a SonicWALL appliance.
4. Expand the **Web Filter** tree and click **By User**. The By User page displays.
5. The table contains the following information:
   - **User**— the IP address of the user.
   - **Site**— the top five sites visited by the user.
   - **Attempts**— the number of attempts the user made to access each web site.

6. By default, the ViewPoint Reporting Module shows today's report, a pie chart, and the ten top users. To change these settings, click **Settings**. The Report Settings dialog box displays.

7. Select the number of users that will be displayed from the **Number of Users** list box.

8. Select the type of chart from the **Chart Type** list box.

9. Select the year, month, and day that you would like to view.

10. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.

   **Note**  These settings will stay in effect for all similar reports during your active login session.

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### Viewing Blocked Sites Sorted by Site

The Web Filter By Site report displays the top blocked web sites that were accessed by users.

To view the Web Filter By Site report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select a SonicWALL appliance.
4. Expand the **Web Filter** tree and click **By Site**. The By Site page displays.

**Figure 60 Reports > Web Filter > By Site**

5. The table contains the following information:
   - **Site**—the top five sites visited by the user.
   - **Attempts**—the number of attempts the user made to access each web site.
   - **Category**—the web site category.

6. By default, the ViewPoint Reporting Module shows today’s report, a pie chart, and the ten top users. To change these settings, click the Report Settings icon  . The Report Settings dialog box displays.

7. Select the number of sites that will be displayed from the **Number of Sites** list box.

8. Select the number of users per site that will be displayed from the **Number of Users** list box.

9. Select the year, month, and day that you would like to view.

10. Enter web site addresses, using a comma to separate each entry, in the **Select Site** box.

11. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.
Viewing Blocked Sites Sorted by Category

The Web Filter By Category report displays the top categories of web sites that were accessed by users.

To view the Web Filter By Category report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select a SonicWALL appliance.
4. Expand the Web Filter tree and click By Category. The By Site page displays.

5. The table contains the following information:
   - **Category**—the web site category.
   - **Attempts**—the number of attempts the user made to access each web site.
   - **% of Attempts**—the percentage of attempts to access the blocked site, compared to all other user attempts. For example, if 500 attempts were made during the day and 250 of those attempts were made by a single user, his % of Attempts field will display 50%.

6. By default, the ViewPoint Reporting Module shows today’s report, a pie chart, and the ten top users. To change these settings, click the Report Settings icon. The Report Settings dialog box displays.
7. Select the number of items that will be displayed from the **Number of Items** list box.
8. Select whether to display a chart and table or table only.
9. Select the year, month, and day that you would like to view.
10. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.

**Viewing Blocked Site Attempts Over Time**

The Web Filter Over Time report displays the number of attempts that were made to access blocked web sites for the specified time period.

To view the Web Filter Over Time report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select the global icon, a group, or a SonicWALL appliance.
4. Expand the **Web Filter** tree and click **Over Time**. The Over Time page displays.

**Figure 62** Reports > Web Filter > Over Time

5. The bar graph displays the number of attempts that were made to access blocked web sites during each day of the specified time period.
6. The table contains the following information:
   - **Date**—the day when the sample was taken.
   - **Attempts**—the number of attempts to access blocked web sites.
   - **% of Attempts**—the percentage of attempts to access the blocked site on the day, compared to the time period. For example, if 5,000 attempts were made during the time period and 500 were made on one day, its **% of Attempts** field will display 10%.

7. To change the date range of the report, click the Report Settings icon . The Reporting Date Range Selector dialog box displays.

8. Select whether to display a chart and table or a table only.

9. Select from the following:
   - To select a period of time before the last summarization, enter the number of days to view before the last summarization.
   - To view a specific date range, select the starting and ending dates that you would like to view.

10. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected date range.

   **Note** These settings will stay in effect for all similar reports during your active login session.

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**Viewing the Top Blocked Site Attempts Over Time**

The Top Sites Over Time report displays the top blocked web sites for the specified time period.

To view the Web Filter Over Time report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select a SonicWALL appliance.
4. Expand the **Web Filter** tree and click **Top Sites Over Time**. The Top Sites Over Time page displays.
5. The graph displays the number of access attempts for each of the top blocked web sites during the specified time period.

6. The table contains the following information:
   - **Site**—the URL or IP address of the site.
   - **Attempts**—the number of attempts.
   - **Category**—the web site category.
   - **% of Attempts**—the percentage of attempts to access the blocked site, compared to all other blocked site attempts. For example, if 500 attempts were made during the period and 100 of those attempts were for www.badsite.com, its % of Attempts field will display 20%.

7. To change the date range of the report, click **Settings**. The Reporting Date Range Selector dialog box displays.

8. Select whether to display a chart and table or a table only.

9. Select from the following:
   - To select a period of time before the last summarization, enter the number of days to view before the last summarization.
   - To view a specific date range, select the starting and ending dates that you would like to view.

10. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected date range.
Note  These settings will stay in effect for all similar reports during your active login session.

Viewing the Top Blocked Site Users Over Time

The Web Filter Top Users Over Time report displays the users who made the most attempts to access blocked sites during the specified time period.

To view the Top Users Over Time report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select a SonicWALL appliance.
4. Expand the Web Filter tree and click Top Users Over Time. The Top Users Over Time page displays.

*Figure 64  Reports > Web Filter > Top Users Over Time*

5. The pie chart displays the top users with the most blocked site attempts.
6. The table contains the following information:
   - Users— the IP address of the user.
   - Attempts— the number of attempts.
Viewing Web Filter Reports

- **Category**— the web site category.
- **% of Attempts**— the percentage of attempts to access the blocked site, compared to all other user attempts. For example, if 500 attempts were made during the period and 250 of those attempts were made by a single user, his % of Attempts field will display 50%.

7. To change the date range of the report, click **Settings**. The Reporting Date Range Selector dialog box displays.

8. Select whether to display a chart and table or a table only.

9. Select from the following:
   - To select a period of time before the last summarization, enter the number of days to view before the last summarization.
   - To view a specific date range, select the starting and ending dates that you would like to view.

10. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected date range.

**Note**  These settings will stay in effect for all similar reports during your active login session.

Viewing Blocked Sites for Each User Over Time

The Web Filter By User report displays the top blocked web sites that each user attempted to access during the specified time period.

To view the By User Over Time report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select a SonicWALL appliance.
4. Expand the **Web Filter** tree and click **By User Over Time**. The By User Over Time page displays.
5. The table contains the following information:
   - **User**—the IP address or name of the user.
   - **Attempts**—the number of attempts the user made to access each web site.

6. To change the date range of the report, click **Settings**. The Reporting Date Range Selector dialog box displays.

7. Select whether to display a chart and table or a table only.

8. Select from the following:
   - To select a period of time before the last summarization, enter the number of days to view before the last summarization.
   - To view a specific date range, select the starting and ending dates that you would like to view.

9. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected date range.

**Note**
These settings will stay in effect for all similar reports during your active login session.

**Viewing Blocked Sites by Category Over Time**

The Web Filter By Category Over Time report displays the top categories that users attempted to access.

To view the By Category Over Time report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select a SonicWALL appliance.
4. Expand the **Web Filter** tree and click **By Category Over Time**. The By Category Over Time page displays.

![Image](image.png)

**Figure 66 Reports > Web Filter > By Category Over Time**

5. The table contains the following information:
   - **Category**—the web site category.
   - **Attempts**—number of attempts the user made to access each web site.
   - **% of Attempts**—the percentage of attempts to access the blocked site, compared to all other user attempts. For example, if 500 attempts were made during the period and 250 of those attempts were made by a single user, his **% of Attempts** field will display 50%.

6. To change the date range of the report, click the Report Settings icon 📉. The Reporting Date Range Selector dialog box displays.

7. Select the number of items that will be displayed from the **Number of Items** list box.

8. Select whether to display a chart and table or a table only.

9. Select from the following:
   - To select a period of time before the last summarization, enter the number of days to view before the last summarization.
   - To view a specific date range, select the starting and ending dates that you would like to view.
10. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected date range.

**Note** These settings will stay in effect for all similar reports during your active login session.

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### Viewing File Transfer Protocol Reports

FTP usage reports provide information on the amount of FTP usage that occurs through the selected SonicWALL appliance(s).

FTP usage reports can be used to view FTP bandwidth usage by the hour, day, or over a period of days. Additionally, you can view the top users of FTP bandwidth.

General bandwidth reports do not always provide a complete picture of network bandwidth usage. If a large amount of FTP traffic occurs during peak times, you might need more bandwidth, you might need to upgrade network equipment, or you might ask employees to use compression or transfer large files during non-peak times.

**Note** All reports appear in the Firewall's time zone.

Select from the following:

- “Viewing the FTP Summary Report” on page 163
- “Viewing the Top Users of FTP Bandwidth” on page 165
- “Viewing FTP Bandwidth Usage Over Time” on page 166
- “Viewing FTP Bandwidth Usage Over Time” on page 166

### Viewing the FTP Summary Report

The FTP Summary report contains information on the amount of FTP bandwidth handled by a SonicWALL appliance or group of SonicWALL appliances during the specified day.

To view the FTP Summary report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select the global icon, a group, or a SonicWALL appliance.
4. Expand the **FTP Usage** tree and click **Summary**. The Summary page displays.
5. The bar graph displays the amount of FTP bandwidth transferred during each hour of the day.

6. The table contains the following information:
   - **Hour**—when the sample was taken.
   - **Events**—the number of FTP events.
   - **MBytes**—the number of megabytes transferred.
   - **% of MBytes**—the percentage of megabytes transferred during this hour, compared to the day. For example, if 1000 megabytes of FTP data was transferred during the day and 100 megabytes was transferred at the 12:00 time period, the % of MBytes field will display 10%.

7. The ViewPoint Reporting Module shows today’s report. To change report settings, click the Report Settings icon. The Report Settings dialog box displays.

8. Select the type of chart to display from the **Report Display Settings** area.

9. Select the year, month, and day that you would like to view.

10. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.
Viewing the Top Users of FTP Bandwidth

The Top Users report displays the users who used the most FTP bandwidth on the specified date.

To view the Top Users report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select a SonicWALL appliance.
4. Expand the FTP Usage tree and click Top Users. The Top Users page displays.

5. The pie chart displays the percentage of bandwidth used by each user. To view the sites visited by each user, expand the user’s site tree (indicated by a ‘+’ sign).
6. The table contains the following information:
   - Users— the IP address of the user.
   - Events— the number of FTP Events.
   - MBytes— the number of megabytes transferred.
   - % of MBytes— the percentage of megabytes transferred during this hour, compared to the day. For example, if 1000 megabytes of FTP data was transferred during the day and 100 megabytes was transferred at the 12:00 time period, the % of MBytes field will display 10%.
Viewing File Transfer Protocol Reports

7. By default, the ViewPoint Reporting Module shows today’s report, a pie chart, and the ten top users. To change these settings, click the Report Settings icon . The Report Settings dialog box displays.

8. Select the number of users that will be displayed from the **Number of Users** list box.

9. Select the type of chart from the **Chart Type** list box.

10. Select the year, month, and day that you would like to view.

11. To display a limited group of users, enter the user IDs in the **Select Users** field and separate each entry with a comma.

   **Note** This field does not use pattern matching. For example, “john” will not match john_smith, john42, or big_john.

12. When you are finished, click **Close**. The ViewPoint Reporting Module refreshes the report based on the selected settings.

   **Note** These settings will stay in effect for all similar reports during your active login session.

Viewing FTP Bandwidth Usage Over Time

The FTP Usage Over Time report displays the daily amount of FTP bandwidth handled by a SonicWALL appliance or group of SonicWALL appliances for the specified time period.

To view the FTP Usage Over Time report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select the global icon, a group, or a SonicWALL appliance.
4. Expand the **FTP Usage** tree and click **Over Time**. The Over Time page displays.
5. The bar graph displays the amount of FTP bandwidth transferred during each day of the specified time period.

6. The table contains the following information:
   - **Date**—when the sample was taken.
   - **Connections**—the number of FTP connections.
   - **MBytes**—the number of megabytes transferred.
   - **% of Usage**—the percentage of megabytes transferred during this day, compared to the time period. For example, if 10,000 megabytes of FTP data was transferred during the time period and 2,500 megabytes of FTP data was transferred on one day, the **% of Usage** field will display 25%.

7. To change the date range of the report, click **Settings**. The Reporting Date Range Selector dialog box displays.

8. Select whether to display a chart and table or a table only.

9. Select from the following:
   - To select a period of time before the last summarization, enter the number of days to view before the last summarization.
   - To view a specific date range, select the starting and ending dates that you would like to view.

10. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected date range.
Viewing File Transfer Protocol Reports

**Note**  These settings will stay in effect for all similar reports during your active login session.

## Viewing the Top Users of FTP Bandwidth Over Time

The Top Users Over Time report displays the users who used the most FTP bandwidth for the specified time period.

To view the Top Users Over Time report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select a SonicWALL appliance.
4. Expand the **FTP Usage** tree and click **Top Users Over Time**. The Top Users Over Time page displays.

**Figure 70 Reports > FTP Usage > Top Users Over Time**

5. The pie chart displays the top users of FTP bandwidth. To view the FTP sites visited by each user, expand the user’s site tree (indicated by a ‘+’ sign).

6. The table contains the following information:
   - **Users**— the IP address of the user.
   - **Events**— the number of FTP Events.
Viewing Mail Usage Reports

- **MBytes**—the number of megabytes transferred.
- **% of MBytes**—the percentage of megabytes transferred by this user, compared to all users. For example, if 10000 megabytes of data was transferred during the period and 2000 megabytes was transferred by the top user, the % of MBytes field will display 20%.

7. To change the report settings, click the Report Settings icon. The Reporting Date Range Selector dialog box displays.

8. Select whether to display a chart and table or a table only.

9. Select from the following:
   - To select a period of time before the last summarization, enter the number of days to view before the last summarization.
   - To view a specific date range, select the starting and ending dates that you would like to view.

10. To display a limited group of users, enter the user IDs in the **Select Users** field and separate each entry with a comma.

**Note** This field does not use pattern matching. For example, “john” will not match john_smith, john42, or big_john.

11. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected date range.

**Note** These settings will stay in effect for all similar reports during your active login session.

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**Viewing Mail Usage Reports**

Mail usage reports provide information on the amount of mail usage that occurs through the selected SonicWALL appliance(s).

Mail usage reports can be used to view mail bandwidth usage by the hour, day, or over a period of days. Additionally, you can view the top users of mail bandwidth.

**Note** Mail usage reports include SMTP, POP3, and IMAP traffic.
General bandwidth reports do not always provide a complete picture of network bandwidth usage. If a large amount of mail traffic occurs during peak times, you might want to take some of the following actions:

- Add bandwidth
- Upgrade network equipment
- Ask employees to use compression or transfer large files during non-peak times
- Ask employees to place large files on an FTP site rather than sending them as mail attachments.

**Note**

All reports appear in the Firewall’s time zone.

Select from the following:

- To view a summary of the daily mail usage, see “Viewing the Mail Usage Summary Report” on page 170.
- To view the users who consume the most mail bandwidth, see “Viewing the Top Users of Mail Bandwidth” on page 172.
- To view mail usage over a period of time, see “Viewing Mail Usage Over Time” on page 173.
- To view the users who consume the most mail bandwidth over time, see “Viewing the Top Users of Mail Bandwidth Over Time” on page 175.

**Viewing the Mail Usage Summary Report**

The Mail Usage Summary report contains information on the amount of mail handled by a SonicWALL appliance or group of SonicWALL appliances during the specified day.

To view the Mail Usage Summary report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select the global icon, a group, or a SonicWALL appliance.
4. Expand the **Mail Usage** tree and click **Summary**. The Summary page displays.
5. The bar graph displays the amount of mail sent and received during each hour of the day.

6. The table contains the following information:
   - **Hour**—when the sample was taken.
   - **Events**—the number of mail events.
   - **MBytes**—the number of megabytes transferred.
   - **% of MBytes**—the percentage of megabytes transferred during this hour, compared to the day. For example, if 10,000 megabytes of mail was transferred during the day and 1,000 megabytes was transferred at the 12:00 time period, the % of MBytes field will display 10%.

7. The ViewPoint Reporting Module shows today's report. To change report settings, click the Report Settings icon . The Report Settings dialog box displays.

8. Select the type of chart to display from the **Report Display Settings** area.

9. Select the year, month, and day that you would like to view.

10. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.
Viewing the Top Users of Mail Bandwidth

The Top Users report displays the users who sent and received the most mail on the specified date.

To view the Top Users report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select a SonicWALL appliance.
4. Expand the Mail Usage tree and click Top Users. The Top Users page displays.

Figure 72 Reports > Mail Usage > Top Users

5. The pie chart displays the percentage of mail sent and received by the top mail users.
6. The table contains the following information:
   - Users—the IP address of the user.
   - Events—the number of mail messages sent and received.
   - MBytes—the number of megabytes transferred.
   - % of MBytes—the percentage of megabytes transferred by this user, compared to all users. For example, if 10000 megabytes of data was transferred during the day and 2000 megabytes was transferred by the top user, the % of MBytes field will display 20%.
7. By default, the ViewPoint Reporting Module shows today's report, a pie chart, and the ten top users. To change these settings, click the Report Settings icon . The Report Settings dialog box displays.

8. Select the number of users that will be displayed from the **Number of Users** list box.

9. Select the type of chart from the **Chart Type** list box.

10. Select the year, month, and day that you would like to view.

11. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.

**Note** These settings will stay in effect for all similar reports during your active login session.

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**Viewing Mail Usage Over Time**

The Mail Usage Over Time report displays the daily amount of mail handled by a SonicWALL appliance or group of SonicWALL appliances for the specified time period.

To view the Mail Usage Over Time report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.

2. Click the **Reports** tab.

3. Select the global icon, a group, or a SonicWALL appliance.

4. Expand the **Mail Usage** tree and click **Over Time**. The Over Time page displays.
5. The bar graph displays the amount of mail sent and received during each day of the specified time period.

6. The table contains the following information:
   - **Date**—when the sample was taken.
   - **Connections**—the number of mail messages.
   - **MBytes**—the number of megabytes transferred.
   - **% of MBytes**—the percentage of megabytes transferred by this user, compared to all users. For example, if 10000 megabytes of data was transferred during the day and 2000 megabytes was transferred by the top user, the **% of MBytes** field will display 20%.

7. To change the date range of the report, click the Report Settings icon. The Reporting Date Range Selector dialog box displays.

8. Select whether to display a chart and table or a table only.

9. Select from the following:
   - To select a period of time before the last summarization, enter the number of days to view before the last summarization.
   - To view a specific date range, select the starting and ending dates that you would like to view.

10. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected date range.
Viewing the Top Users of Mail Bandwidth Over Time

The Top Users Over Time report displays the users who sent and received the most mail during the specified time period.

To view the Top Users Over Time report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select a SonicWALL appliance.
4. Expand the Mail Usage tree and click Top Users Over Time. The Top Users Over Time page displays.

The pie chart displays the percentage of mail sent and received by the top mail users.

The table contains the following information:

- **Users**— the IP address of the user.
- **Events**— the number of mail messages sent and received.
Viewing VPN Usage Reports

VPN Usage reports provide information on the amount of VPN usage that occurs through the selected SonicWALL appliance(s).

VPN Usage reports can be used to view VPN usage by the hour, day, or over a period of days. Additionally, you can view the top users of VPN.

General bandwidth reports do not always provide a complete picture of network bandwidth usage. If a large amount of VPN traffic occurs, you might need to add bandwidth, upgrade network equipment, or reconfigure the VPN network.

Select from the following:

- To view a summary of the daily VPN bandwidth usage, see “Viewing the VPN Usage Summary Report” on page 177.
- To view the users who consume the most VPN bandwidth, see “Viewing the Top VPN Users” on page 179.

Note: These settings will stay in effect for all similar reports during your active login session.

Note: All reports appear in the Firewall’s time zone.
To view VPN bandwidth usage over a period of time, see “Viewing VPN Usage Over Time” on page 180.

To view the users who consume the most VPN bandwidth over time, see “Viewing VPN Usage Over Time” on page 180.

To view the users who consume the most VPN bandwidth over time, see “Viewing the Top VPN Users Over Time” on page 182.

To view VPN usage by policy, see “Viewing VPN Usage by Policy” on page 183.

To view VPN usage by policy over time, see “Viewing the Top VPN Policies Over Time” on page 185.

To view hourly VPN usage by policy, see “Viewing Hourly VPN Usage by Policy” on page 186.

To view VPN services usage, see “Viewing the VPN Services Summary Report” on page 188.

Viewing the VPN Usage Summary Report

The VPN Usage Summary report contains information on the number of VPN connections made through a SonicWALL appliance or group of SonicWALL appliances during the specified day. To view the VPN Usage Summary report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select the global icon, a group, or a SonicWALL appliance.
4. Expand the VPN Usage tree and click Summary. The Summary page displays.
5. The bar graph displays the number of VPN connections made during each hour of the day.

6. The table contains the following information:
   - **Hour**— when the sample was taken.
   - **Events**— the number of mail events.
   - **MBytes**— the number of megabytes transferred.
   - **% of MBytes**— the percentage of megabytes transferred by this user, compared to all users. For example, if 10,000 megabytes of data was transferred during the period and 2000 kilobytes was transferred by the top user, the % of MBytes field will display 20%.

7. The ViewPoint Reporting Module shows today’s report. To change report settings, click the Report Settings icon . The Report Settings dialog box displays.

8. Select the type of chart to display from the Report Display Settings area.

9. Select the year, month, and day that you would like to view.

10. When you are finished, click Close. The ViewPoint Reporting Module displays the report for the selected day.
Viewing the Top VPN Users

The Top Users report displays the users who made the most VPN connections on the specified date.

To view the Top Users report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select a SonicWALL appliance.
4. Expand the VPN Usage tree and click Top Users. The Top Users page displays.

5. The pie chart displays the VPN connections for the top VPN users.
6. The table contains the following information:
   - Users—the IP address of the user.
   - Connections—the number of VPN connections.
   - MBytes—the number of megabytes transferred.
   - % of MBytes—the percentage of megabytes transferred by this user, compared to all users. For example, if 10,000 megabytes of data was transferred during the period and 2000 kilobytes was transferred by the top user, the % of MBytes field will display 20%.
Viewing VPN Usage Reports

7. By default, the ViewPoint Reporting Module shows today’s report, a pie chart, and the ten top users. To change these settings, click the Report Settings icon. The Report Settings dialog box displays.

8. Select the number of users that will be displayed from the Number of Users list box.

9. Select the type of chart from the Chart Type list box.

10. Select the year, month, and day that you would like to view.

11. When you are finished, click Close. The ViewPoint Reporting Module displays the report for the selected day.

Note These settings will stay in effect for all similar reports during your active login session.

Viewing VPN Usage Over Time

The VPN Usage Over Time report displays the daily number of VPN connections made through a SonicWALL appliance or group of SonicWALL appliances during the specified time period.

To view the VPN Usage Over Time report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.

2. Click the Reports tab.

3. Select the global icon, a group, or a SonicWALL appliance.

4. Expand the VPN Usage tree and click Over Time. The Over Time page displays.
5. The bar graph displays the number of VPN connections made during each day of the specified time period.

6. The table contains the following information:
   - **Date**—when the sample was taken.
   - **Connections**—the number of connections.
   - **MBytes**—the number of megabytes transferred.
   - **% of MBytes**—the percentage of megabytes transferred by this user, compared to all users. For example, if 10,000 megabytes of data was transferred during the period and 2000 kilobytes was transferred by the top user, the **% of MBytes** field will display 20%.

7. To change the date range of the report, click the Report Settings icon. The Reporting Date Range Selector dialog box displays.

8. Select whether to display a chart and table or a table only.

9. Select from the following:
   - To select a period of time before the last summarization, enter the number of days to view before the last summarization.
   - To view a specific date range, select the starting and ending dates that you would like to view.

10. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected date range.
Viewing VPN Usage Reports

Note

These settings will stay in effect for all similar reports during your active login session.

Viewing the Top VPN Users Over Time

The Top Users report displays the users who made the most VPN connections for the specified time period.

To view the Top Users report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select a SonicWALL appliance.
4. Expand the VPN Usage tree and click Top Users Over Time. The Top Users Over Time page displays.

5. The pie chart displays the VPN connections for the top VPN users.
6. The table contains the following information:
   - Users—the IP address of the user.
   - Connections—the number of VPN connections.
Viewing VPN Usage Reports

- **MBytes**— the number of megabytes transferred.
- **% of MBytes**— the percentage of megabytes transferred by this user, compared to all users. For example, if 10,000 megabytes of data was transferred during the period and 2000 kilobytes was transferred by the top user, the **% of MBytes** field will display 20%.

7. To change the date range of the report, click the Report Settings icon 🔄. The Reporting Date Range Selector dialog box displays.

8. Select whether to display a chart and table or a table only.

9. Select from the following:
   - To select a period of time before the last summarization, enter the number of days to view before the last summarization.
   - To view a specific date range, select the starting and ending dates that you would like to view.

10. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected date range.

**Note** These settings will stay in effect for all similar reports during your active login session.

Viewing VPN Usage by Policy

The VPN Usage by Policy report contains information on VPN usage for a SonicWALL appliance, organized by policy.

To view the VPN Usage by Policy report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select a SonicWALL appliance.
4. Expand the **VPN Usage** tree and click **By Policy**. The By Policy page displays.
5. The pie chart displays the amount of data transferred for each policy.

6. The table contains the following information:
   - **Policy**— the name of the policy.
   - **Events**— the number of VPN events.
   - **MBytes**— the number of megabytes transferred.
   - **% of MBytes**— the percentage of megabytes transferred for this policy, compared to all other policies. For example, if a total of 10,000 megabytes was transferred and 2,500 megabytes was transferred for one policy, the **% of Usage** field will display 25%.

7. The ViewPoint Reporting Module shows today’s report. To change report settings, click the Report Settings icon 📊. The Report Settings dialog box displays.

8. Select the number of users that will be displayed from the **Number of Users** list box.

9. Select the type of chart from the **Chart Type** list box.

10. Select the year, month, and day that you would like to view.

11. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.
Note These settings will stay in effect for all similar reports during your active login session.

Viewing the Top VPN Policies Over Time

The By Policy Over Time report displays the top VPN Policies for the specified time period.

To view the By Policy Over Time report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select a SonicWALL appliance.
4. Expand the VPN Usage tree and click By Policy Over Time. The By Policy Over Time page displays.

5. The pie chart displays the VPN connections for the top policies.
6. The table contains the following information:
   - **Policy**—the name of the policy.
Viewing VPN Usage Reports

- **Events**—the number of VPN events.
- **MBytes**—the number of megabytes transferred.
- **% of MBytes**—the percentage of megabytes transferred for this policy, compared to all other policies for the period. For example, if a total of 100,000 megabytes was transferred and 3,000 megabytes was transferred for one policy, the **% of MBytes** field will display 3%.

7. To change the date range of the report, click the Report Settings icon . The Reporting Date Range Selector dialog box displays.

8. Select whether to display a chart and table or a table only.

9. Select from the following:
   - To select a period of time before the last summarization, enter the number of days to view before the last summarization.
   - To view a specific date range, select the starting and ending dates that you would like to view.

10. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected date range.

**Note**  These settings will stay in effect for all similar reports during your active login session.

Viewing Hourly VPN Usage by Policy

The VPN Usage by Policy Hourly report contains information on hourly VPN usage for a SonicWALL appliance, organized by policy.

To view the VPN Usage by Policy Hourly report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select a SonicWALL appliance.
4. Expand the **VPN Usage** tree and click **By Policy Hourly**. The By Policy Hourly page displays.
5. The table contains the following information:
   - **Hour**—the period of time.
   - **Events**—the number of VPN events.
   - **MBytes**—the number of megabytes transferred.

6. The ViewPoint Reporting Module shows today's report. To change report settings, click the Report Settings icon . The Report Settings dialog box displays.

7. Select the number of items that will be displayed from the **Number of Items** list box.

8. Select the number of entries per item from the **Entries per Item** list box.

9. Select the beginning and ending hour that will be displayed in the report.

10. Select the year, month, and day that you would like to view.

11. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.

**Note**  These settings will stay in effect for all similar reports during your active login session.
Viewing the VPN Services Summary Report

The Services Summary report displays the amount of traffic handled by each service during each hour of the specified day.

To view the Services Summary report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select a SonicWALL appliance.
4. Expand the VPN Usage tree and click By Service. The By Service page displays.

5. The bar graph displays the amount of bandwidth used by each service during each hour of the day.
6. The table contains the following information:
   - Protocol — the service.
   - Events — the number of events or “hits.”
   - MBytes — the number of megabytes.
– % of MBytes— the percentage of megabytes transferred by this service on the selected day, compared to all other services. For example, if 1,000 megabytes were transferred and 900 megabytes were handled by the HTTP service, the % of Mbytes field will display 90%.

7. The ViewPoint Reporting Module shows today’s report. To change report settings, click the Report Settings icon . The Report Settings dialog box displays.

8. Select the type of chart to display from the Report Display Settings area.

9. Select the year, month, and day that you would like to view.

10. When you are finished, click Close. The ViewPoint Reporting Module displays the report for the selected day.

Note These settings will stay in effect for all similar reports during your active login session.

Viewing Attacks Reports

Attacks reports show the number of attacks that were directed at or through the selected SonicWALL appliance(s). These include denial of service attacks, intrusions, probes, and all other malicious activity directed at the SonicWALL appliance or computers on the LAN or DMZ.

Note All reports appear in the Firewall’s time zone.

Select from the following:

- To view a summary of the attacks, see “Viewing the Attack Summary Report” on page 190.
- To view the attacks by attack category, see “Viewing the Attacks by Category” on page 191.
- To view the attacks by source IP address, see “Viewing the Errors Report” on page 192.
- To view a summary of the errors and exceptions, see “Viewing the Errors Report” on page 192.
- To view attacks over a period of time, see “Viewing Attack Reports Over Time” on page 193.
- To view errors and exceptions over a period of time, see “Viewing Errors Over Time” on page 197.
Viewing the Attack Summary Report

The Attack Summary report contains information on the number of attacks attempted on a SonicWALL appliance or group of SonicWALL appliances during the specified day. To view the Attack Summary report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select the global icon, a group, or a SonicWALL appliance.
4. Expand the Attacks tree and click Summary. The Summary page displays.

5. The bar graph displays the number of attacks attempted during each hour of the day. The table contains the following information:
   - **Hour**—when the sample was taken.
   - **Attacks**—the number of attack attempts.
   - **% of Attacks**—the percentage of attacks during this hour, compared to the day. For example, if 1,000 attacks occurred during the day and 100 attacks occurred during the 2:00 time period, the % of Attacks field will display 10%.
6. The ViewPoint Reporting Module shows today's report. To change report settings, click the Report Settings icon. The Report Settings dialog box displays.

7. Select the type of chart to display from the Report Display Settings area.

8. Select the year, month, and day that you would like to view.

9. When you are finished, click Close. The ViewPoint Reporting Module displays the report for the selected day.

Viewing the Attacks by Category

The Attacks by Category report displays the attacks that occurred on the specified date, sorted by category.

To view the Attacks by Category report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.

2. Click the Reports tab.

3. Select a SonicWALL appliance.

4. Expand the Attacks tree and click By Category. The By Category page displays.

5. The pie chart displays the percentage of each type of attack. To view source and destination information on the individual attacks, expand the category tree (indicated by a ‘+’ sign).

6. The table contains the following information:
Viewing Attacks Reports

- **Type**— the type of attack
- **Source**— the IP address of the source
- **Destination**— the IP address to the destination
  
  Click the highlighted source or destination IP address to access the Who is Source Website.
- **Attacks**— the number of attacks
- **% of Attacks**— the percentage of this type of attack, compared to all other attack types. For example, if 5,000 attacks occurred during the day and the IP Spoof makes up 500 of the attacks, its % of Attacks field will display 10%.

7. By default, the ViewPoint Reporting Module shows today’s report, a pie chart, and the ten top categories. To change these settings, click the Report Settings icon . The Report Settings dialog box displays.
8. Select the number of categories that will be displayed from the **Number of Categories** list box.
9. Select the type of chart from the **Chart Type** list box.
10. Select the year, month, and day that you would like to view.
11. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.

**Note**

These settings will stay in effect for all similar reports during your active login session.

Viewing the Errors Report

The Errors Summary report contains information on the number of dropped packets on a SonicWALL appliance or group of SonicWALL appliances during the specified day.

To view the Errors report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select the global icon, a group, or a SonicWALL appliance.
4. Expand the **Attacks** tree and click **Errors**. The Errors page displays.
5. The bar graph displays the packets that were dropped during each hour of the day.
6. The table contains the following information:
   - **Hour**—when the sample was taken.
   - **Packets**—the number of dropped packets.
   - **% of Packets**—the percentage of packets dropped during this hour, compared to the day. For example, if 1,000 packets were dropped during the day and 100 packets were dropped during the 1:00 time period, the **% of Packets** field will display 10%.
7. The ViewPoint Reporting Module shows today's report. To change report settings, click the Report Settings icon. The Report Settings dialog box displays.
8. Select the type of chart to display from the **Report Display Settings** area.
9. Select the year, month, and day that you would like to view.
10. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.

**Viewing Attack Reports Over Time**

The Attacks Over Time report displays the daily number of attempted attacks during the specified time period.
To view the Attacks Over Time report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select the global icon, a group, or a SonicWALL appliance.
4. Expand the **Attacks** tree and click **Attacks Over Time**. The Attacks Over Time page displays.

**Figure 86 Reports > Attacks > Attacks Over Time**

5. The bar graph displays the number of attacks attempted each day of the specified time period.

6. The table contains the following information:
   - **Date**—when the sample was taken.
   - **Attacks**—the number of attacks.
   - **% of Attacks**—the percentage of attacks on this day, compared to the time period. For example, if 10,000 attacks occurred during the time period and 1,000 attacks occurred on Thursday, its **% of Attacks** field will display 10%.

7. To change the date range of the report, click the Report Settings icon . The Reporting Date Range Selector dialog box displays.
8. Select whether to display a chart and table or a table only.
9. Select from the following:
– To select a period of time before the last summarization, enter the number of days to view before the last summarization.

– To view a specific date range, select the starting and ending dates that you would like to view.

10. When you are finished, click Close. The ViewPoint Reporting Module displays the report for the selected date range.

Note These settings will stay in effect for all similar reports during your active login session.

Viewing the Attacks by Category Over Time

The Categories Over Time report displays the number of attacks in each attack category during the specified time period.

To view the Categories Over Time report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.

2. Click the Reports tab.

3. Select the global icon, a group, or a SonicWALL appliance.

4. Expand the Attacks tree and click Categories Over Time. The Categories Over Time page displays.
5. The bar graph displays the number of attacks attempted each day of the specified time period. To view source and destination information on the individual attacks, expand the category tree (indicated by a ‘+’ sign).

6. The table contains the following information:

7. The table contains the following information:
   - **Type**—the type of attack
   - **Source**—the IP address of the source
   - **Destination**—the IP address to the destination
     Click the highlighted source or destination IP address to access the Whois Source Website.
   - **Attacks**—the number of attacks
   - **% of Attacks**—the percentage of this type of attack, compared to all other attack types. For example, if 5,000 attacks occurred during the day and the IP Spoof makes up 500 of the attacks, its **% of Attacks** field will display 10%.

8. To change the date range of the report, click the Report Settings icon. The Reporting Date Range Selector dialog box displays.

9. Select whether to display a chart and table or a table only.

10. Select from the following:
– To select a period of time before the last summarization, enter the number of days to view before the last summarization.

– To view a specific date range, select the starting and ending dates that you would like to view.

11. When you are finished, click Close. The ViewPoint Reporting Module displays the report for the selected date range.

Note
These settings will stay in effect for all similar reports during your active login session.

Viewing Errors Over Time

The Errors Over Time report displays the number of errors during the specified time period.

To view the Errors Over Time report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select the global icon, a group, or a SonicWALL appliance.
4. Expand the Attacks tree and click Errors Over Time. The Errors Over Time page displays.
5. The bar graph displays the number of packets that were dropped during each day of
the specified time period.

6. The table contains the following information:
   
   – **Date**— when the sample was taken.
   
   – **Dropped Packets**— the number of dropped packets.
   
   – **% of Errors**— the percentage of dropped packets on this day, compared to the
time period. For example, if 10,000 packets were dropped during the time
period and 1,000 packets were dropped on Wednesday, its **% of Attacks** field
will display 10%.

7. To change the date range of the report, click the Report Settings icon. The
Reporting Date Range Selector dialog box displays.

8. Select whether to display a chart and table or a table only.

9. Select from the following:
   
   – To select a period of time before the last summarization, enter the number of
days to view before the last summarization.
   
   – To view a specific date range, select the starting and ending dates that you would
like to view.

10. When you are finished, click **Close**. The ViewPoint Reporting Module displays the
report for the selected date range.
Viewing Virus Attacks Reports

Virus Attacks reports show the number of virus attacks that were directed at or through the selected SonicWALL appliance(s).

Note: All reports appear in the Firewall’s time zone.

Select from the following:

- To view a summary of the virus attacks, see “Viewing the Summary Report” on page 199.
- To view the top virus, see “Viewing the Top Viruses Report” on page 200.
- To view the virus attacks by top destinations, see “Viewing the Over Time Report” on page 202.
- To view virus attacks over time, see “Viewing the Over Time Report” on page 202.
- To view virus attacks over a period of time, see “Viewing the Top Viruses Over Time Report” on page 203.
- To view virus attacks by top destinations over time, see “Viewing Anti-Spyware Reports” on page 205.

Viewing the Summary Report

The Virus Attacks Summary report contains information on the number of virus attack attempts for the specified day.

To view the Summary report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select the global icon, a group, or a SonicWALL appliance.
4. Expand the Virus Attacks tree and click Summary. The Summary page displays...
5. The bar graph displays the number of virus attacks attempted during each hour of the day. The table contains the following information:
   - **Hour**— the hour of the day for which the summary is provided.
   - **Attempts**— the number of times the virus attempted to infect the device during a pre-set time interval (the hour of the day is the default).
   - **% of Attempts**— the percent of attempts the current virus entry comprises as a portion of the aggregate number of virus attempts on the device during a pre-set time interval (the hour of the day is the default).

6. The ViewPoint Reporting Module shows today's report. To change report settings, click the Report Settings icon 📊. The Report Settings dialog box displays.

7. Select the type of chart to display from the **Report Display Settings** area.

8. Select the year, month, and day that you would like to view.

9. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.

**Viewing the Top Viruses Report**

The Virus Attacks Top Viruses report displays the top viruses for the specified date.
To view the Top Viruses, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select the global icon, a group, or a SonicWALL appliance.
4. Expand the Virus Attacks tree and click Top Viruses. The Top Viruses page displays.

Figure 90 Reports > Virus Attacks > Top Viruses

5. The pie chart displays the percentage of virus attacks attempted in a given day. The table contains the following information:
   - Virus—the name of the virus.
   - Attempts—the number of attack attempts.
   - % of Attempts—the percentage of attempts as compared to the day.

6. The ViewPoint Reporting Module shows today’s report. To change report settings, click the Report Settings icon . The Report Settings dialog box displays.
7. Select the type of chart to display from the Report Display Settings area.
8. Select the year, month, and day that you would like to view.
9. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.

### Viewing the Over Time Report

The Virus Attacks Over Time report displays the number of virus attempts over specified time range.

To view the Over Time, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select the global icon, a group, or a SonicWALL appliance.
4. Expand the **Virus Attacks** tree and click **Over Time**. The Over Time page displays.

**Figure 91  Reports > Virus Attacks > Over Time**

5. The bar graph displays the number of virus attempts that were made during each day over a specified time period.
6. The table contains the following information:
   - **Date**—the date of when the sample was taken.
   - **Attempts**—the number of attempted virus attacks.
- **% of Attempts**— the percentage of attempted virus attacks in a day compared to the time period. For example, if 5,000 attempts were made during the time period and 500 were made on one day, its **% of Attempts** field will display 10%.

7. To change the date range of the report, click the Report Settings icon. The Reporting Date Range Selector dialog box displays.

8. Select whether to display a chart and table or a table only.

9. Select from the following:
   - To select a period of time before the last summarization, enter the number of days to view before the last summarization.
   - To view a specific date range, select the starting and ending dates that you would like to view.

10. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected date range.

**Note**
These settings will stay in effect for all similar reports during your active login session.

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**Viewing the Top Viruses Over Time Report**

The Virus Attacks Top Viruses Over Time report displays the number of top virus attempts over specified time range.

To view the Top Viruses Over Time, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select the global icon, a group, or a SonicWALL appliance.
4. Expand the **Virus Attacks** tree and click **Top Viruses Over Time**. The Top Viruses Over Time page displays.
5. The pie chart displays the percentage of virus attacks attempted in a given day. The table contains the following information:

   - **Virus**— the name of the virus.
   - **Attempts**— the number of attack attempts.
   - **% of Attempts**— the percentage of attempts compared to the day.

6. The ViewPoint Reporting Module shows today's report. To change report settings, click the Report Settings icon. The Report Settings dialog box displays.

7. Select the type of chart to display from the **Report Display Settings** area.

8. Select the year, month, and day that you would like to view.

9. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.
Viewing Anti-Spyware Reports

SonicWALL Anti-Spyware is included within the SonicWALL Gateway Anti-Virus (GAV), Anti-Spyware and Intrusion Prevention Service (IPS) unified threat management solution. SonicWALL GAV, Anti-Spyware and IPS delivers a comprehensive, real-time gateway security solution for your entire network. You can generate the following Anti-Spyware reports:

- To enable Anti-Spyware logging in ViewPoint, go to the section “Viewing a Spyware Summary” on page 205.
- To view Anti-Spyware summary information, go the section “Viewing a Spyware Summary” on page 205.
- To view Anti-Spyware logging in ViewPoint by category, go to the section “Viewing Spyware Attempts by Category” on page 207.
- To view Anti-Spyware logging in ViewPoint over pre-set time-intervals, go to the section “Viewing Spyware Attempts Over Set Time Intervals” on page 208.
- By Category Over Time
- By Source Over Time

Unlike other threat management solutions, SonicWALL Gateway Anti-Virus, Anti-Spyware and Intrusion Prevention Service has the capacity to analyze files of any size in real-time without the need to add expensive hardware drive or extra memory. SonicWALL Gateway Anti-Virus, Anti-Spyware and Intrusion Prevention Service includes a pro-active alerting mechanism that notifies network administrators when a new threat is discovered. Granular policy tools and an intuitive user interface enable administrators to configure a custom set of detection or prevention policies tailored to their specific network environment. Network administrators can create global policies between security zones and group attacks by priority, simplifying deployment and management across a distributed network.

Viewing a Spyware Summary

The Anti-Spyware Summary report contains information on the number of spyware attempts by hour of the day.

To view a spyware Summary, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select the global icon, a group, or a SonicWALL appliance.
4. Expand the Anti-Spyware tree and click Summary. The Summary page displays.
GMS Dev: We need data populated in the Anti-spyware section. Presently it reads: “No Data Available” for all devices.

5. The bar graph displays the number of virus attacks attempted during each hour of the day. The table contains the following information:
   - **Hour**—the hour of the day for which the summary is provided.
   - **Attempts**—the number of times the spyware attempted to infect the device during a pre-set time interval (the hour of the day is the default).
   - **% of Attempts**—the percent of attempts the current spyware entry comprises as a portion of the aggregate number of spyware attempts on the device during a pre-set time interval (the hour of the day is the default).

6. The ViewPoint Reporting Module shows today's report. To change report settings, click the Report Settings icon. The Report Settings dialog box displays.

7. Select the type of chart to display from the **Report Display Settings** area.

8. Select the year, month, and day that you would like to view.

9. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.
Note this page displays the number of spyware attempts that occurred during two-hour intervals during the past day.

**Viewing Spyware Attempts by Category**

These reports display the spyware activity by category including the actual category or classification of the spyware, the priority, and the event/attacks type. By using the category as criteria, you can display details about the type/message text and number of events.

To view spyware attempts by category, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select the global icon, a group, or a SonicWALL appliance.
4. Expand the **Anti-Spyware** tree and click **By Category**. The By Category page displays.

*Figure 94  Reports > Anti-Spyware > By Category*
5. The pie chart displays the percentage of spyware attempts by category. The table contains the following information:

- **Category**— the category of the spyware.
- **Attempts**— the number of times the spyware attempted to infect the device using the category as a criteria.
- **% of Attempts**— the percent of attempts the current spyware entry comprises as a portion of the aggregate number of spyware attempts using the category as a criteria.

6. The ViewPoint Reporting Module shows today’s report. To change report settings, click the Report Settings icon . The Report Settings dialog box displays.

7. Select the type of chart to display from the **Report Display Settings** area.

8. Select the year, month, and day that you would like to view.

9. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.

**Viewing Spyware Attempts Over Set Time Intervals**

You can display spyware attempts over a set time interval. These reports are available at the unit and group levels similar to the other summary reports. To view spyware attempts using pre-set time intervals as the viewing criteria, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select the global icon, a group, or a SonicWALL appliance.
4. Expand the **Anti-Spyware** tree and click **Over Time**. The Over Time page displays.
5. The bar graph displays the number of spyware attempts that were made during each day over a specified time period.

6. The table contains the following information:
   - **Date**—the date for which the summary is provided.
   - **Attempts**—the number of times the spyware attempted to infect the device during a specific date.
   - **% of Attempts**—the percent of attempts the current spyware entry comprises as a portion of the aggregate number of spyware attempts on the device during a pre-set time interval.

7. To change the date range of the report, click the Report Settings icon. The Reporting Date Range Selector dialog box displays.

8. Select whether to display a chart and table or a table only.

9. Select from the following:
   - To select a period of time before the last summarization, enter the number of days to view before the last summarization.
   - To view a specific date range, select the starting and ending dates that you would like to view.

10. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected date range.
Viewing Anti-Spyware Reports

Note These settings will stay in effect for all similar reports during your active login session.

Viewing Spyware Attempts By Category Over Time

You can generate reports that display the spyware activity by category, such as the category, priority, and events/attacks over time. Using the category over time statistic as criteria for report generation provides details about the type/message text and number of events.

To view Anti-Spyware attempts using categories over time intervals as the viewing criteria, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select the global icon, a group, or a SonicWALL appliance.
4. Expand the Anti-Spyware tree and click By Category Over Time. The By Category Over Time page displays.

Figure 96 Reports > Anti-Spyware > By Category Over Time

5. The pie chart displays the percentage of spyware attempts by category. The table contains the following information:
– **Category**— the category of the virus.

– **Attempts**— the number of times the spyware attempted to infect the device during a pre-set time interval.

– **% of Attempts**— the percent of attempts the current spyware entry comprises as a portion of the aggregate number of spyware attempts on the device during a pre-set time interval.

6. The ViewPoint Reporting Module shows today’s report. To change report settings, click the Report Settings icon . The Report Settings dialog box displays.

7. Select the type of chart to display from the **Report Display Settings** area.

8. Select the year, month, and day that you would like to view.

9. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.

### Viewing Intrusion Prevention Reports

The Intrusion Prevention Service (IPS) reports show the number of attempted intrusions that occurred during the specified time period.

**Note** All reports appear in the Firewall’s time zone.

Select from the following:

- To view a summary of the attacks, see “Viewing the Intrusion Prevention Summary Report” on page 212.

- To view the attacks by source IP address, see “Viewing the Errors Report” on page 192.

- To view a summary of the errors and exceptions, see “Viewing the Errors Report” on page 192.

- To view attacks over a period of time, see “Viewing Attack Reports Over Time” on page 193.

- To view errors and exceptions over a period of time, see “Viewing Errors Over Time” on page 197.
Viewing the Intrusion Prevention Summary Report

The Attack Summary report contains information on the number of attempted intrusions on a SonicWALL appliance or group of SonicWALL appliances during the specified day.

To view the IPS Summary report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select the global icon, a group, or a SonicWALL appliance.
4. Expand the Intrusion Prevention tree and click Summary. The Summary page displays.

5. The bar graph displays the number of intrusions attempted during each hour of the day. The table contains the following information:
   - **Hour**—when the sample was taken.
   - **Intrusions**—the number of intrusion attempts.
– **% of Intrusions** — the percentage of intrusion attempts on this day, compared to the time period. For example, if 10,000 intrusion attempts occurred during the time period and 1,000 intrusion attempts occurred on Thursday, its **% of Intrusions** field will display 10%.

6. The ViewPoint Reporting Module shows today’s report. To change report settings, click the Report Settings icon 📊. The Report Settings dialog box displays.

7. Select the type of chart to display from the **Report Display Settings** area.

8. Select the year, month, and day that you would like to view.

9. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.

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### Viewing Intrusion Attempts by Category

These reports display the intrusion activity by category including the actual category or classification of the intrusion, the priority, and the event/attacks type. By using the category as criteria, you can display details about the type/message text and number of events.

To view intrusion attempts by category, perform the following steps:

1. Start and log into SonicWALL ViewPoint.

2. Click the **Reports** tab.

3. Select the global icon, a group, or a SonicWALL appliance.

4. Expand the **Intrusion Prevention** tree and click **By Category**. The By Category page displays.
5. The pie chart displays a list of intrusions attempted by category. The table contains the following information:
   - **Category**—the category of the intrusion attempt.
   - **Intrusions**—the number of intrusion attempts.
   - **% of Intrusions**—the percentage of intrusion attempts as a portion of the aggregate number of intrusion attempts using the category as a criteria.

6. The ViewPoint Reporting Module shows today's report. To change report settings, click the Report Settings icon . The Report Settings dialog box displays.

7. Select the type of chart to display from the **Report Display Settings** area.

8. Select the year, month, and day that you would like to view.

9. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.

**Viewing Intrusions Over Time**

The Over Time report displays the daily number of intrusion attempts during the specified time period.

To view the Intrusions Over Time report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select the global icon, a group, or a SonicWALL appliance.
4. Expand the **Intrusion Prevention** tree and click **Intrusions Over Time**. The Intrusions Over Time page displays.

**Figure 99   Reports > Intrusion Prevention > Over Time**

5. The bar graph displays the number of intrusions attempted each day of the specified time period.

6. The table contains the following information:
   - **Date**— when the sample was taken.
   - **Intrusions**— the number of intrusion attempts.
   - **% of Intrusions**— the percentage of intrusion attempts on this day, compared to the time period. For example, if 10,000 intrusion attempts occurred during the time period and 1,000 intrusion attempts occurred on Thursday, its % of Intrusions field will display 10%.

7. To change the date range of the report, click the Report Settings icon . The Reporting Date Range Selector dialog box displays.

8. Select whether to display a chart and table or a table only.

9. Select from the following:
Viewing Intrusion Prevention Reports

- To select a period of time before the last summarization, enter the number of days to view before the last summarization.
- To view a specific date range, select the starting and ending dates that you would like to view.

10. When you are finished, click Close. The ViewPoint Reporting Module displays the report for the selected date range.

Note These settings will stay in effect for all similar reports during your active login session.

Viewing Intrusion Reports By Category Over Time

You can generate reports that display the intrusion activity by category, such as the category, priority, and events/attacks over time. Using the category over time statistic as criteria for report generation provides details about the type/message text and number of events. To view intrusion attempts using categories over time intervals as the viewing criteria, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select the global icon, a group, or a SonicWALL appliance.
4. Expand the Intrusion Prevention tree and click By Category Over Time. The By Category Over Time page displays.
5. The pie chart displays a list of intrusions attempted by category over time. The table contains the following information:
   - **Category**— the category of the intrusion attempt.
   - **Intrusions**— the number of attempted intrusions during a pre-set time interval.
   - **% of Intrusions**— the percentage of intrusion attempts the current intrusion entry comprises as a portion of the aggregate number of intrusion attempts on the device during a pre-set time interval.

6. The ViewPoint Reporting Module shows today’s report. To change report settings, click the Report Settings icon. The Report Settings dialog box displays.

7. Select the type of chart to display from the **Report Display Settings** area.

8. Select the year, month, and day that you would like to view.

9. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.

**Viewing Authentication Reports**

The login reports show user logins, administrator logins, and failed login attempts for users and administrators.
All reports appear in the Firewall’s time zone.

Select from the following:

- To view user logins, see “Viewing the User Login Report” on page 218.
- To view administrator logins, see “Viewing the Administrator Login Report” on page 219.
- To view failed login attempts, see “Viewing the Failed Login Report” on page 220.

**Viewing the User Login Report**

The user login report shows users that logged on to the SonicWALL appliance during the specified day to bypass content filtering or to remotely access local network resources.

To view the User Login report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select a SonicWALL appliance.
4. Expand the **Authentication** tree and click **User Login**. The User Login page displays.
GMS Dev: We need data populated in the Authentication section. Presently it reads: “No Data Available” for all devices.

5. The table contains the following information:
   - **User**—the user name.
   - **Time**—time the user logged in.

6. The ViewPoint Reporting Module shows today's report. To change report settings, click the Report Settings icon . The Report Settings dialog box displays.

7. Select the type of chart to display from the **Report Display Settings** area.

8. Select the year, month, and day that you would like to view.

9. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.

**Viewing the Administrator Login Report**

The administrator login report shows successful administrator logins during the specified day. This report is useful for identifying misuse and unauthorized management of a SonicWALL appliance.

To view the Admin Login report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.

2. Click the **Reports** tab.

3. Select a SonicWALL appliance.

4. Expand the **Authentication** tree and click **Admin Login**. The Admin Login page displays.

**Figure 102 Reports > Authentication > Admin Login Page**

5. The table contains the following information:
   - **User**—the user name.
Viewing Authentication Reports

- **Time**—time the user logged in.

6. The ViewPoint Reporting Module shows today’s report. To change report settings, click the Report Settings icon 📊. The Report Settings dialog box displays.

7. Select the type of chart to display from the **Report Display Settings** area.

8. Select the year, month, and day that you would like to view.

9. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.

Viewing the Failed Login Report

The failed login reports shows failed login attempts for users and administrators that attempted to log on to the SonicWALL appliance during the specified day. This report is useful for identifying unauthorized access attempts and potentially malicious activity.

To view the Failed Login report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.

2. Click the **Reports** tab.

3. Select a SonicWALL appliance.

4. Expand the **Authentication** tree and click **Failed Login**. The Failed Login page displays.
5. The table contains the following information:
   - **User**—the user name.
   - **Time**—time the user logged in.
   - **IP Address**—IP address of the user.

6. The ViewPoint Reporting Module shows today’s report. To change report settings, click the Report Settings icon . The Report Settings dialog box displays.

7. Select the type of chart to display from the **Report Display Settings** area.

8. Select the year, month, and day that you would like to view.

9. When you are finished, click **Close**. The ViewPoint Reporting Module displays the report for the selected day.

### Viewing the Log

The Log Viewer contains detailed information on each transaction that occurred on the SonicWALL appliance. This information is stored for the time that you specified in the configuration settings.
The Log Viewer displays raw log information for every connection. Depending on the amount of traffic, this can quickly consume a large amount of space in the database. It is highly recommended to be careful when choosing the number of days of information that will be stored. For more information, see “Configuring ViewPoint Reporting Settings” on page 19.

Viewing the Log for a SonicWALL Appliance

To view the Log, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Reports tab.
3. Select a SonicWALL appliance.
4. Expand the Log Viewer tree and click Search. The Search page displays.

5. Select the date to view from the Date list box.
6. Enter the starting time of events to view in the Start Time field.
7. Enter the ending time of events to view in the End Time field.
8. Select the type of events to view from the Message Category list box.
9. Enter the source IP address to view in the Source IP Address field. To view all IP addresses, enter All.
10. Enter the destination IP address to view in the Destination IP Address field. To view all IP addresses, enter All.
11. Select the number of entries to display per page from the **Results Per Page** field.

12. Click **Generate Report**. The Log Viewer Results page displays.

*Figure 105  Reports > Log Viewer Results*

13. Search through the entries to find the information for which you are searching. To view the next page of entries, click **Next**.

14. To generate another report, click **Search** again in the **Log Viewer** tree.
Appendix I

Technical Tips

This chapter includes the following sections:

- “Real-time Syslog Viewer” section on page 227
- “Forwarding Syslog Data to Another Syslog Server” section on page 228
- “Forwarding the Syslog Data to a WebTrends Server” section on page 229
- “Posting ViewPoint Reporting to Another Web Server for End-User Access” section on page 230

Log Viewer

The Log Viewer contains detailed information on each transaction that occurred on the SonicWALL appliance. This information is stored for the time that you specified in the configuration settings.

**Note**

The Log Viewer displays raw log information for every connection. Depending on the amount of traffic, this can quickly consume a large amount of space in the database. It is highly recommended to be careful when choosing the number of days of information that will be stored. For more information, see “Configuring ViewPoint Reporting Settings” on page 19.

To configure Log Viewer settings for generating a report, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the **Reports** tab.
3. Select a SonicWALL appliance.
4. Expand the Log Viewer tree and click Search. The Search page displays.

Figure 106 Reports > SysLog Viewer > Search

![](image)

5. Select the date to view from the Date list box.
6. Enter the starting time of events to view in the Start Time field.
7. Select the ending date of events to view in the End Date list box.
8. Enter the ending time of events to view in the End Time field.
9. Select the type of events to view from the Message Category list box.
10. Enter the source IP address to view in the Source IP Address field. To view all IP addresses, enter All.
11. Enter the destination IP address to view in the Destination IP Address field. To view all IP addresses, enter All.
12. Select the number of entries to display per page from the Results Per Page field.
13. Click Generate Report. The Log Viewer Results page displays.
Real-time Syslog Viewer

The real-time syslog utility enables you to diagnose the system by viewing the syslog messages in real time.

Note Only use this utility when needed for diagnostic purposes.

To open the real-time syslog utility, perform the following steps:

1. Start and log into SonicWALL ViewPoint.
2. Click the Monitor tab.
4. If the Syslog Reader is not already running, click Start Syslog Reader.
5. Click Start Button at the bottom of the screen. The Syslog Viewer begins showing the latest syslog entries.
GMS Dev: We need data for syslog to view.

6. To change how many messages are displayed, select a number from the **Number of Messages** list box at the bottom of the screen.

7. To change how often the Syslog Viewer is refreshed, select the time from the **Refresh Time** list box at the bottom of the screen.

8. To stop the viewer, click the **Stop** button.

9. To search for text, use the browser's Find utility.

10. When you are finished, close the Syslog Viewer.

### Forwarding Syslog Data to Another Syslog Server

To forward SonicWALL ViewPoint syslog data to another syslog server, perform the following steps:

1. Open the SgmsConfig.xml file with a text editor.

2. Locate the following line:
   
   Parameter name = “syslog.forwardToHost” value=“”

3. Add the IP address or hostname of the destination syslog server to the value attribute.
Forwarding the Syslog Data to a WebTrends Server

From SonicWALL ViewPoint, you can forward the syslog data to a WebTrends server. To accomplish this, do the following:

1. Open the SgmsConfig.xml file with a text editor.
2. Locate the following line:
   
   Parameter name ="syslog.forwardToHost" value=""
   
3. Add the IP address or hostname of the WebTrends syslog to the value attribute.
4. Save the SgmsConfig.xml file and exit.
5. Ensure that at least firmware 6.3.1.0 is running on the managed SonicWALL appliances.
6. Change the syslog format in each managed SonicWALL appliance from the default format to the WebTrends format on the Log Settings page.

WebTrends cannot read the SonicWALL syslog in its default format. The default syslog format’s source (src) and destination (dst) fields contain port numbers and link information (i.e., WAN, LAN, and DMZ). These prevent WebTrends from resolving the IP to DNS entries and from performing HTML title lookups within the reports.

**Note**

The ViewPoint Reporting Module also has problems with the WebTrends syslog format. To disable ViewPoint Reporting, open the ViewPoint Settings page in the Console Panel, deselect the Enable Reporting check box, and click Update.
Posting ViewPoint Reporting to Another Web Server for End-User Access

To allow end user access to another web server for end-user access, install the SonicWALL ViewPoint Console in redundant mode.

You can then allow end user access to the redundant Console for viewing ViewPoint Reporting real-time and historical reports. End user access will be isolated from the main Console that is used for managing and configuring SonicWALL appliances.