Administrator Guide

GFI WebMonitor

Find out how to configure GFI WebMonitor in different environments, and learn how to set up advanced features.





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Document Version: 3.2.0

Last updated (month/day/year): 05/12/2016

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1 Introduction

GFI WebMonitor is a comprehensive Internet usage monitoring solution. It enables you to monitor and filter Web browsing and file downloads in real-time. It also enables you to optimize bandwidth by limiting access to streaming media and other bandwidth consuming activities, while enhancing network security with built-in tools that scan traffic for viruses, trojans, spyware and phishing material.

It is the ideal solution to transparently and seamlessly exercise control over browsing and downloading habits. At the same time, it enables you to ensure legal liability and best practice initiatives without alienating network users.

1.1 Why monitor and control Internet usage?

Avoid legal liability by:

- » blocking access to problem sites such as gambling, pornography, and hacking
- » making sure pirated software or copyrighted media are not downloaded to company computers.

Ensure that employees are always safe from the most recent online security risks:

- » hidden malware
- » websites that exploit software vulnerabilities
- » phishing attacks that steal personal and company data
- » other online threats.

Improve productivity by:

- » monitoring Internet activity
- » identifying problem websites and applications (social networks, news, webmail),
- » filtering streaming media, categories or users
- » introducing more sensible control.

Make better use of your bandwidth by:

- » identifying any network bottlenecks (video sharing sites, online file storage and streaming media)
- applying some limits to conserve resources as necessary.

1.1.1 Downloading GFI WebMonitor

GFI WebMonitor can be downloaded from: http://go.gfi.com/?pageid=WebMon_Download.

1.2 Licensing information

GFI WebMonitor requires a license for every user (or IP address) that needs to be monitored. You can configure a list of users or IP addresses that do not need to be monitored or protected so that these users do not consume a license.

This can be done by configuring an **Exclusion list** through the Configuration Wizard or from **Settings > Licensing**. For more information, refer to Configuring a Licensing Exclusion List (page 49).

NOTE

Adding users or IPs to the default Whitelist policy excludes users from being monitored, however they still consume a license. For more information, refer to Configuring the Whitelist (page 68).

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For more information about licensing, refer to GFI Software Ltd. website at: http://go.gfi.com/?pageid=WebMon_LicensingInformation

See also:

Licensing and subscription details

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2 Installing GFI WebMonitor

The following sections provide information for the successful deployment of GFI WebMonitor.

- » System requirements
- » Deployment scenarios
- » Gateway mode pre-requisites
- » Simple Proxy mode pre-requisites
- » Installation procedure
- » Post-installation setup

2.1 System requirements

2.1.1 Software

ТҮРЕ	SOFTWARE REQUIREMENTS (x86 and x64)
Supported Operating Systems	 Windows Server 2003 or later Windows 7 or later
Gateway and Simple Proxy Modes - Other server side required components	 Microsoft.NET[®] Framework 4.0 IIS[®] Express SQL Server[®] Express 2005 or later SQL Server[®] 2005 or later (for reporting purposes)
Gateway Mode - Other required components	» Routing and Remote Access configuration on Windows® Server 2003/2008
GFI WebMonitor Agent	» Windows® Vista SP2 or later
Supported Internet browsers	Server side (for the main product console): » Microsoft Internet Explorer 10 or later » Microsoft Edge » Google Chrome (v36 or later) » Mozilla Firefox (v31 or later)
	Client side: Microsoft Internet Explorer 8 or later Microsoft Edge Google Chrome (v36 or later) Safari Mozilla Firefox v. 31 or later
	Note Any client browser is supported for the main product functions, including mobile browsers, and other versions of the supported browsers; however in order to display block / warn messages properly, one of the above browsers is required.

NOTE

The installation wizard checks that Microsoft .NET® 4.0, Report Viewer, Windows® Image Component, .net Hotfix, Microsoft® Visual C++ Redistributable and IIS® Express are installed. If not installed the wizard will guide you through the installation automatically.

2.1.2 Hardware

x86 ARCHITECTURES	MINIMUM HARDWARE REQUIREMENTS
Processor	2.0 GHz processor
Memory	4 GB RAM
Physical storage	12 GB of available disk space

x64 ARCHITECTURES	MINIMUM HARDWARE REQUIREMENTS
Processor	2.0 GHz (multi-core recommended)
Memory	8 GB
Physical storage	12 GB of available disk space.

NOTE

Allocation of hard disk space depends on your environment. The size specified in the requirements is the minimum required to install and use GFI WebMonitor. The recommended size is between 150 and 250GB.

Other Hardware

COMPONENT	HARDWARE REQUIREMENTS
Network card	 2 network interface cards when installing in Gateway Mode 1 network interface card required when installing in Simple Proxy Mode.
Router	A Router\gateway that supports traffic forwarding or port blocking when installing in Simple Proxy Mode.

2.1.3 Listening ports

PRODUCT	PORT
GFI WebMonitor Gateway and Simply Proxy Mode	Listening Port (Default 8080)
GFI WebMonitor Agent	Listening Port (Default 5996) - this port will accept transfer of data from the agent to the server
GFI WebMonitor Management Console	Listening Port (Default 1007)
GFI WebMonitor Transparent Proxy	Listening Port (Default 8082)

2.1.4 GFI WebMonitor services

The table below lists Windows® services used by GFI WebMonitor. These services are created when GFI WebMonitor is installed and require an account with administrative privileges. For more information, refer to Admin Credentials for GFI WebMonitor Services (page 45).

SERVICE NAME	DESCRIPTION	LOCATION AND NAME
GFI Proxy - Local System	The GFI Proxy service is only created in the Standalone Proxy Version of GFI WebMonitor. It is used as an agent service for the Proxy server, ISAPI module and Web Filtering.	<pre><drive>:\Program Files\GFI\We- bMonitor\GFiProxy.exe</drive></pre>

SERVICE NAME	DESCRIPTION	LOCATION AND NAME
GFI WebMonitor Core Service - Local System	The GFI WebMonitor Core Service is used a worker service. Its functionality includes: Scanning downloads via AV scanning engines. Managing content updates for the various GFI WebMonitormodules. Sending notification emails to administrator and users. Provide services used to host admin UI. Loading WebGrade database to memory	<drive>:\Program Files\GFI\We- bMonitor</drive>

NOTE

During product updates the GFI WebMonitor services need to be stopped and restarted. This action causes the disruption of Internet connections going through GFI WebMonitor. Internet usage can resume once the services are restarted.

To view status of GFI WebMonitor services:

- 1. On the GFI WebMonitor server, click **Start > Run** and key in "services.msc"
- 2. From the list of services displayed locate the following services:
- » GFI Proxy
- » GFI WebMonitor Core Service

2.1.5 Assigning log on as a service rights

The GFI WebMonitor service needs to run with administrative privileges. The username and password provided for the GFI WebMonitor service must have Logon as a service rights.

Log on as a service rights allow a user to log on as a service. Services can be configured to run under the Local System, Local Service, or Network Service accounts, which have a built-in right to log on as a service. Any service that runs under a separate user account must be assigned the right.

Manually assigning Log On As A Service Rights on Windows Vista/7/8

- 1. Go to Start > Control Panel > Administrative Tools > Local Security Policy.
- 2. Expand Security Settings > Local Policies > User Rights Assignment.
- 3. Right-click Log on as a service from the right panel and click Properties.
- 4. Select the **Local Security Setting** tab.
- 5. Click Add User or Group.
- 6. Key in the account name and click **OK**.
- 7. Click **Apply** and **OK**.
- 8. Close Local Security Settings dialog.
- 9. Close all open windows.

Manually assigning Log On As A Service Rights on a Server Machine

- 1. Go to Start > Programs > Administrative Tools > Local Security Policy.
- 2. Expand Security Settings > Local Policies > User Rights Assignment.
- 3. Right-click Log on as a service from the right panel and click Properties.
- 4. Select the **Local Security Setting** tab.
- 5. Click Add User or Group button.

- 6. Key in the account name and click **OK**.
- 7. Click **Apply** and **OK**
- 8. Close all open windows.

Assigning Log On As A Service Rights via GPO in Windows® Server 2008 or later

To assign Log on as service rights on clients machines via GPO through Windows Server 2008 or later:

- 1. In the command prompt key in mmc.exe and press Enter.
- 2. In the Console Root window, go to File > Add/Remove Snap-in... to open the Add or Remove Snap-ins window.
- 3. Select Group Policy Management from the Available snap-ins list, and click Add.
- 4. Click OK.
- 5. Expand Group Policy Management > Forest > Domains and <domain>.
- 6. Right-click **Default Domain Policy** and click **Edit** to open the **Group Policy Management Editor**.
- 7. Expand Computer Configuration > Policies > Windows Settings > Security Settings > Local Policies and click User Rights Assignment.
- 8. Right-click Log on as a service from the right panel and click Properties.
- 9. Select the **Security Policy Setting** tab.
- 10. Check **Define these policy settings** checkbox
- 11. Click Add User or Group button.
- 12. Key in the account name and click **OK**.
- 13. Click **Apply** and **OK**.
- 14. Close all open windows.

2.2 Deployment scenarios

Deployment depends on the network infrastructure and the network role of the machine where GFI WebMonitor is to be installed. GFI WebMonitor can be deployed in the following modes:

MODE	DESCRIPTION
Simple Proxy mode	Select Simple Proxy mode if you want to route client HTTP traffic through GFI WebMonitor and non-HTTP traffic through a separate router. This setup requires an Internet facing router with port blocking and traffic forwarding capabilities.
Gateway mode	Deploy GFI WebMonitor in Gateway mode if you are installing the application on a server that is configured as an Internet gateway. All outbound and inbound client traffic (HTTP and non-HTTP) is routed through GFI WebMonitor. When GFI WebMonitor is deployed in this mode, you can enable Transparent Proxy, eliminating the need to set client browser settings to point to a specific proxy. For more information, refer to Configuring Transparent Proxy (page 34).
In par- allel with Microsoft Forefront TMG	GFI WebMonitor 2015 SR3 and later editions can be installed in parallel with Microsoft Forefront TMG on the same machine where Microsoft Forefront TMG is running. Use this setup when you want to keep Microsoft Forefront TMG as a firewall and use the same machine to perform web filtering by GFI WebMonitor. This setup also provides an alternative when it is not possible to add another dedicated machine in the network just for GFI WebMonitor.

2.2.1 Deployment in an Internet Gateway environment

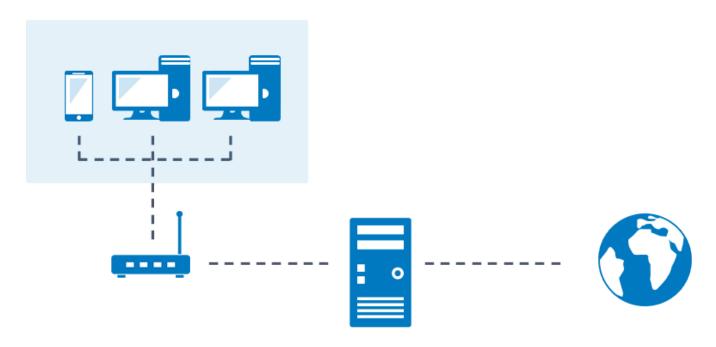
Select Gateway mode to use GFI WebMonitor as a trusted agent that can access the Internet on behalf of client computers. All outbound and inbound client traffic (HTTP, HTTPS and non-HTTP) is routed through the GFI WebMonitor

gateway. However, only HTTP and HTTPS traffic is filtered. Use this mode also when deploying GFI WebMonitor as a Transparent Proxy. For more information, refer to Configuring Transparent Proxy (page 34).

NOTE

To configure GFI WebMonitor in gateway mode you need a server with 2 network cards. The option to configure GFI WebMonitor in gateway mode is grayed out if only one network card is detected.

Your Network



GFI WebMonitor

Internet

Screenshot 1: GFI WebMonitor installed on a gateway machine

In this scenario, GFI WebMonitor is installed on the gateway machine, usually a Domain Controller. GFI WebMonitor can be configured to set up a WPAD server which will advertise the existence of the proxy on the network. For more information, refer to Configuring WPAD (page 30).

When WPAD is enabled, client machines have to be aware of the proxy by activating proxy auto detection in the browser. For more information, refer to <u>Configure Internet browser for WPAD</u> (page 31).

If WPAD is not enabled you need to manually set the proxy IP and port of client machines. For more information, refer to <u>Configure Proxy settings on client Internet browsers</u> (page 55).

When installed in Gateway Mode, the GFI WebMonitor machine must have a minimum of two network interface cards. During the Configuration Wizard, you are asked to specify the Internal network interface card and by default WebMonitor will bind to it on port 8080.

2.2.2 Gateway mode pre-requisites

Before installing GFI WebMonitor on an Internet Gateway Server, ensure that:

- 1. Client machines are configured to use the server as the default Internet gateway.
- 2. The server's network cards are connected:
- » one to the internal network (LAN)
- one to the external network (WAN)

3. Start **Routing and Remote Access service** if installing GFI WebMonitor on Windows Server 2003 or Windows Server 2008.

IMPORTANT

Ensure that the listening port (default 8080) is not blocked by your firewall. For more information on how to enable firewall ports on Microsoft Windows Firewall, refer to http://go.gfi.com/?pageid=WebMon_WIndowsFirewall

2.2.3 Deployment in a Simple Proxy environment

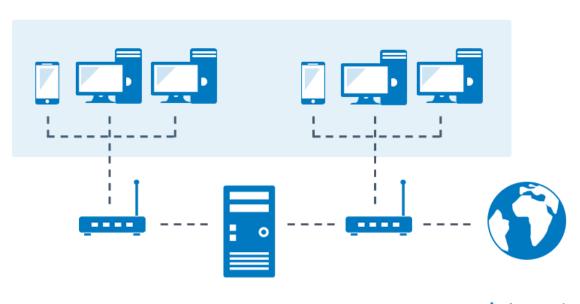
Install GFI WebMonitor in Simple Proxy mode if you want to route client HTTP traffic through GFI WebMonitor and non-HTTP traffic through a separate router. To select this mode, ensure that:

- » Users are using a router to connect to the Internet
- » GFI WebMonitor is installed within the local LAN.

IMPORTANT

The Transparent Proxy feature cannot be enabled when GFI WebMonitor is deployed in Simple Proxy mode. For more information, refer to Configuring Transparent Proxy (page 34).

Your Network



GFI WebMonitor

Internet

Screenshot 2: GFI WebMonitor installed in Simple Proxy Mode

The router must be configured to block all traffic except traffic generated by GFI WebMonitor. This can be achieved by using one of the following methods:

OPTION	DESCRIPTION
Port Blocking	Blocking client requests and allowing GFI WebMonitor traffic.
Traffic Forwarding	Forwarding all traffic from the client to GFI WebMonitor machine.

2.2.4 Simple Proxy Mode Pre-requisites

Before installing GFI WebMonitor on a Proxy server, the router/gateway must be configured to:

- » Block all outgoing HTTP/HTTPS traffic generated from the client machines
- » Allow outgoing HTTP/HTTPS traffic generated by GFI WebMonitor only
- » Allow Non-HTTP/HTTPS traffic generated from client machines.

In this environment, traffic forwarding can be used to forward HTTP/HTTPS traffic from the client machines to GFI WebMonitor machine.

IMPORTANT

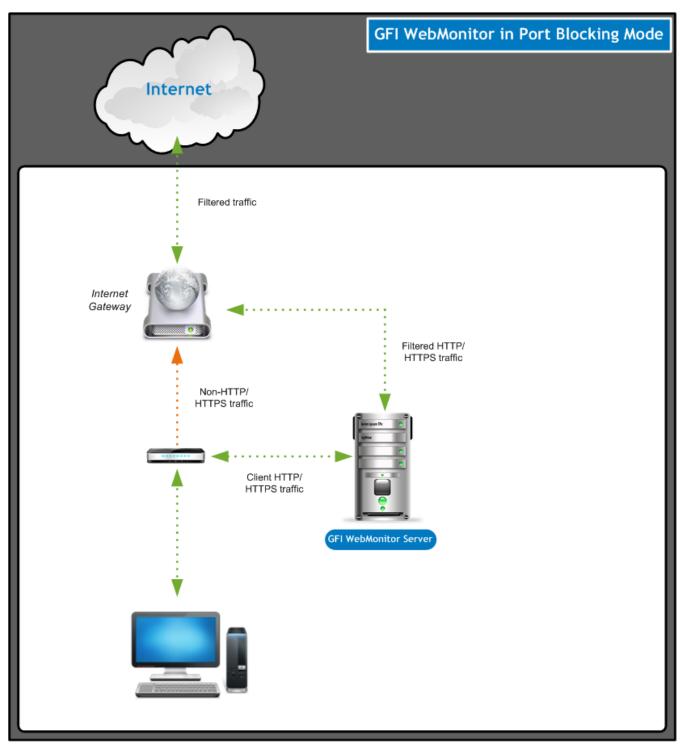
Ensure that the listening port (default 8080) is not blocked by your firewall. For more information on how to enable firewall ports on Microsoft Windows Firewall, refer to http://go.gfi.com/?pageid=WebMon_WIndowsFirewall

2.2.5 Port blocking

The router must be configured to allow both HTTP/HTTPS traffic generated from GFI WebMonitor machine and Non-HTTP/HTTPS traffic generated from client machines. In addition, it must also block HTTP/HTTPS traffic generated from client machines.

NOTE

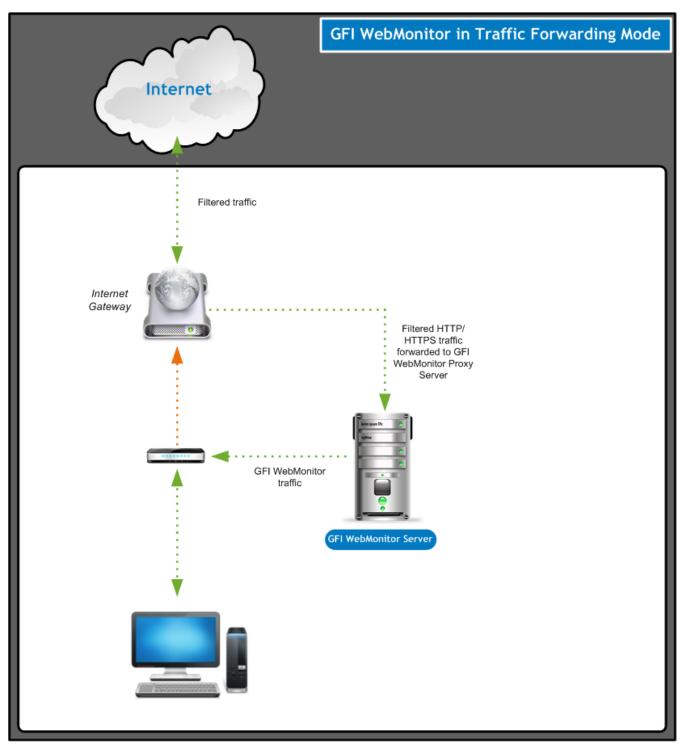
Client machines must be configured to use the GFI WebMonitor machine as the default proxy server.



Screenshot 3: GFI WebMonitorinstalled on a proxy machine connected to a router supporting port blocking

2.2.6 Traffic forwarding

The router/gateway must be configured to allow outgoing web traffic generated by GFI WebMonitor only. In addition, it must forward client HTTP/HTTPS traffic to GFI WebMonitor.



Screenshot 4: GFI WebMonitor installed on a proxy machine connected to a router supporting traffic forwarding

To install GFI WebMonitor on a proxy server, refer to Installing in Simple Proxy Mode.

2.3 Installing GFI WebMonitor

Run the installer as a user with administrative privileges on the target machine.

- 1. Double click the GFI WebMonitor executable file.
- 2. Ensure you have no Windows programs running and click **Next**.
- 3. The installer checks if required components are installed, and automatically installs missing components.

- 4. Choose whether you want the installation wizard to search for a newer build of GFI WebMonitor on the GFI website and click **Next**.
- 5. Read the licensing agreement. To proceed with the installation select I accept the terms in the license agreement and click Next.
- 6. Key in the user name or IP address of users that need administrative access to the GFI WebMonitor web interface and click **Next**. Access can be managed later on from **Settings > Advanced Settings > UI Access Control**.

NOTE

Enter only users that need access to configure GFI WebMonitor. Do not enter IPs of normal users that will be proxied through GFI WebMonitor. More than one user or machine can be specified by separating entries with semicolons ';'

- 7. Specify the Installation Folder where GFI WebMonitor will be installed. The default path is C:\Program Files\GFI\WebMonitor\.Click **Next**.
- 8. Click **Install** to start the installation, and wait for the installation to complete.
- 9. Click **Finish** to finalize setup.
- 10. After the installation, GFI WebMonitor Configuration Wizard is launched automatically.

NOTE

After installing GFI WebMonitor, you can manually launch the Configuration Wizard from the settings menu at any time.

11. Click **Get Started** to configure GFI WebMonitor for first use.

See also:

Configuring Core settings

Configuring Advanced settings

2.4 Using the Post-installation Configuration Wizard

After performing the installation, use the Configuration Wizard to configure GFI WebMonitor for first use. In the welcome screen, click **Get started**. The wizard guides trough the following steps:

OPTION	DESCRIPTION
Configure con- nection set- tings	Choose your Network Mode depending on your current network setup. Establish a connection between your internal network and the Internet through the GFI WebMonitor server.
Enable Trans- parent Proxy	Enable Transparent Proxy to monitor and control HTTP and HTTPS traffic transparently. When a user makes a request to a web server, the Transparent Proxy intercepts the request to deliver the requested content. When GFI WebMonitor is deployed in this mode, you do not need to set client browser settings to point to a specific proxy.
	IMPORTANT Ensure that GFI WebMonitor is running in Gateway mode. Transparent Proxy cannot work in Simple Proxy mode.
Enter your License key	Key in a valid license to use GFI WebMonitor. This can either be a trial license or a regular license key obtained on renewal.

OPTION	DESCRIPTION
Configure HTTPS Scan- ning	Configure HTTPS scanning to monitor and block encrypted traffic.
	IMPORTANT Ensure that by enabling HTTPS Scanning you are not violating any laws in your jurisdiction or any compliance regulations for your industry.
Set up the Database	Configure the database to use with GFI WebMonitor where collected data is stored. Use the Firebird database only during the evaluation period. It is highly recommended to switch to a Microsoft SQL Server based database for live systems.
Define Admin Credentials	Key in the admin credentials required by the GFI WebMonitor services to control internal security engines, manage updates, send notifications and control data displayed in the User Interface. The GFI WebMonitor services are Windows services installed automatically during installation and require administrative privileges to operate.
Setup Email notification set- tings	Provide the email addresses required by GFI WebMonitor to send messages containing information related to tasks such as auto-updates and licensing issues.
Configuring Internet Browsers to use a Proxy Server	If you have not configured WPAD or Transparent Proxy, ensure that proxy settings of client machines are configured to use GFI WebMonitor as the default proxy. This ensures that Internet traffic is routed through GFI WebMonitor.

NOTE

The Configuration Wizard is launched automatically after installing GFI WebMonitor or manually from the **Settings** menu.

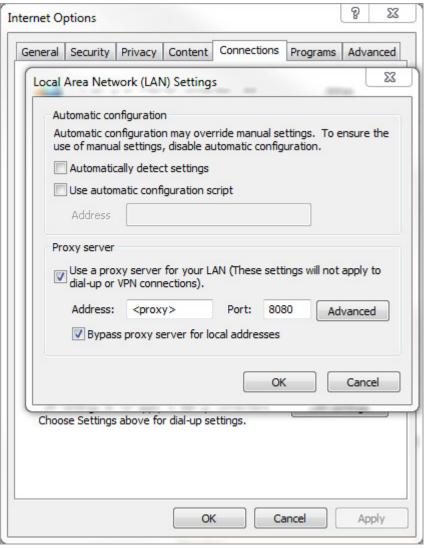
See also:

Configuring Advanced settings

2.5 Configure browser proxy settings on GFI WebMonitor machine

Configure your server's Internet browser to use GFI WebMonitor machine as the default proxy. This can be achieved by performing the following:

- 1. On the machine where GFI WebMonitor is installed, go to **Control Panel** and select **Internet Options**.
- 2. Click the **Connections** tab.
- 3. Click **LAN settings**.



Screenshot 5: Configure fixed proxy settings

- 4. Check Use a proxy server for your LAN checkbox.
- 5. In the Address field, key in the proxy server name or IP address of the GFI WebMonitor machine.
- 6. In the **Port** field enter the port used (default = 8080).

2.6 Disabling Internet connection settings on client computers

To prevent users from modifying Internet settings to bypass GFI WebMonitor, the Internet **Connections** settings tab can be disabled on client machines.

- » Disabling the Internet connections page using GPO in Microsoft Windows Server 2003
- » Disabling the Internet connections page using GPO in Microsoft Windows Server 2008

IMPORTANT

When deploying GFI WebMonitor in Transparent Proxy mode, you do not need to disable Internet connection settings on client computers if a gateway machine is configured as the only possible exit point to the internet. Traffic is filtered by the Transparent Proxy. For more information, refer to Configuring Transparent Proxy (page 34).

2.6.1 Disabling Internet connections page via GPO in Windows Server 2003

The Internet Connections settings tab can be disabled on client machines to prevent users from modifying Internet settings to bypass GFI WebMonitor.

IMPORTANT

When deploying GFI WebMonitor in Transparent Proxy mode, you do not need to disable Internet connection settings on client computers if a gateway machine is configured as the only possible exit point to the internet. Traffic is filtered by the Transparent Proxy. For more information, refer to Configuring Transparent Proxy (page 34).

To disable Connections settings on client machines through Windows® Server 2003 GPO:

- 1. Go to Start > Programs > Administrative Tools > Active Directory Users and Computers on the DNS server.
- 2. Right-click the domain node and click **Properties**.
- 3. Select **Group Policy** tab in the **Domain Properties** dialog.
- 4. Select **Default Domain Policy** from the list and click **Edit**.
- 5. Expand User Configuration > Administrative Templates > Windows Components > Internet Explorer and click Internet Control Panel.
- 6. Right-click Disable the Connections page from the right panel and click Properties.
- 7. In the **Setting** tab, select **Enabled**.

NOTE

This policy prevents users from viewing and modifying connection and proxy settings from their client machines.

- 8. Click **Apply** and **OK**.
- 9. Close all open windows.

2.6.2 Disabling Internet connections page via GPO in Windows Server 2008

The Internet Connections settings tab can be disabled on client machines to prevent users from modifying Internet settings to bypass GFI WebMonitor.

IMPORTANT

When deploying GFI WebMonitor in Transparent Proxy mode, you do not need to disable Internet connection settings on client computers if a gateway machine is configured as the only possible exit point to the internet. Traffic is filtered by the Transparent Proxy. For more information, refer to Configuring Transparent Proxy (page 34).

To disable **Connections** settings on clients machines through Windows Server 2008 GPO:

- 1. In the command prompt key in mmc.exe and press Enter.
- 2. In the Console Root window, Go to File > Add/Remove Snap-in... to open the Add or Remove Snap-ins window.
- 3. Select Group Policy Management from the Available snap-ins list, and click Add.
- 4. Click **OK**.
- 5. Expand Group Policy Management > Forest > Domains and <domain>.

- 6. Right-click Default Domain Policy and click Edit to open the Group Policy Management Editor.
- 7. Expand User Configuration > Policies > Administrative Templates > Windows Components > Internet Explorer and click Internet Control Panel.
- 8. Right-click **Disable the Connection** page from the right panel and click **Properties**.
- 9. In the **Setting** tab, select **Enabled**.

NOTE

This policy prevents users from viewing and modifying connection and proxy settings from their client machines.

- 10. Click Apply and OK.
- 11. Close Group Policy Management Editor dialog and save the management console created.

2.7 Launching GFI WebMonitor

On the same machine where GFI WebMonitor is installed:

There are 2 options for launching the GFI WebMonitor Management Console:

- » Option 1: click Start > All Programs > GFI WebMonitor > GFI WebMonitor Management Console
- » Option 2: Key in the URL http://1.1.1.1 or http://127.0.0.1:1007 in a web browser on the same machine.

NOTE

If using the GFI WebMonitor through the web browser interface on the same machine, Internet browser must be configured to use a proxy server. For http://127.0.0.1:1007 disable **Bypass proxy server for local addresses** from Internet options. For more information, refer to Configure browser proxy settings on GFI WebMonitor machine (page 17).

IMPORTANT

In http://127.0.0.1:1007, 1007 refers to the port on which the GFI WebMonitor Management Console listens by default. If this listening port is changed, the URL used to access the Management Console should reflect this, for example http://127.0.0.1:<port>. This is different from the port on which the GFI Proxy listens for incoming connections.

From a remote machine:

To launch GFI WebMonitor installation from machines of users and/or IP addresses that were allowed access to the application, key in the URL http://1.1.1.1 or http://127.0.0.1:1007 in a web browser from their machine. The Internet browser must be configured to use specific proxy settings to enable this access. For http://127.0.0.1:1007 disable Bypass proxy server for local addresses from Internet options. For more information, refer to Configure Proxy settings on client Internet browsers (page 55).

NOTE

User access to the application can be granted either during installation or from Settings > Advanced Settings > Ul Access Control.

2.8 Verify that GFI WebMonitor is working correctly

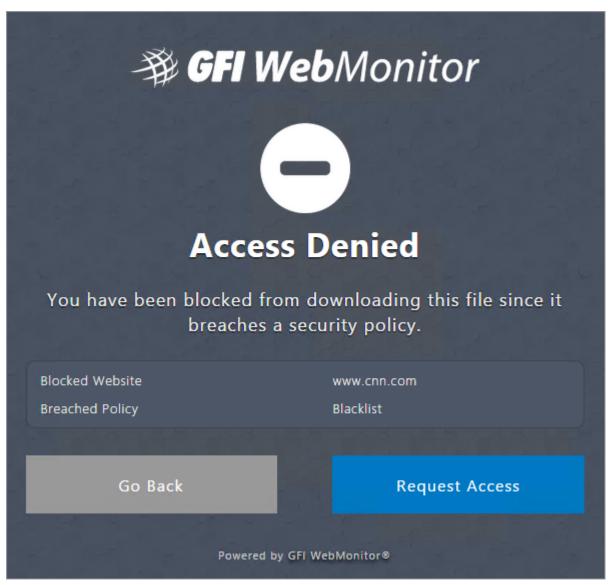
To determine that GFI WebMonitor is working correctly, perform a simple test to check whether an Internet request is blocked. To do this:

1. Go to Manage > Policies.

NOTE

You will see that a Default Web Filtering Policy is already enabled. This policy applies to every user whose traffic is routed through GFI WebMonitor.

- 2. In the sidebar, select **Blacklist** from the list of configured policies.
- 3. Click Edit.
- 3. In the **Websites** element, type *.cnn.com.
- 4. Click the **Add** sign. The URL is added to the list of blocked sites.
- 5. Click **Save** to apply the changes.
- 6. Go back to your browser and open http://www.cnn.com. The GFI WebMonitor blocking page should now be displayed.



Screenshot 6: Warning that the page you requested was blocked by GFI WebMonitor

If the warning above is displayed, then your GFI WebMonitor installation is working correctly!

You can now remove the URL from the Blacklist policy.

2.9 Using the Settings Importer tool

The Settings Importer Tool helps you import GFI WebMonitor settings from one server to another. The tool can be used to migrate GFI WebMonitor 2013 SR1 or later versions. For example, you can use this tool to import settings configured on a machine with GFI WebMonitor 2015 to a new machine on which you have the latest GFI WebMonitor installed.

NOTE

The Settings Importer Tool is available in GFI WebMonitor 2015 SR2 and later.

There are two versions of the Settings Importer Tool. The command line version of the tool is located in the GFI WebMonitor installation folder. The default path is C:\Program

Files\GFI\WebMonitor\Interface\Bin\WebMon.SettingsImporterTool.exe.For more information on how to use this tool refer to the following article: http://go.gfi.com/?pageid=webmon_settingsimporttool.

- 1. From C:\Program Files\GFI\WebMonitor\Interface\Bin\locate and double click WebMon.SettingsImporterTool.exe.
- 2. Select from the following options:

OPTION	DESCRIPTION
Export settings to a chosen file/folder	Select this option to back up settings of current GFI WebMonitor installation. Settings can be exported to a file or to a destination folder.
Import settings from a file	Select this option to import GFI WebMonitor settings from a file to current GFI WebMonitor installation. Applicable for GFI WebMonitor 2015 SR2 and later versions.
Import settings from a folder	Select this option to import GFI WebMonitor settings from a folder into your current GFI WebMonitor installation. Applicable for GFI WebMonitor 2013 SR1 and later versions.

2.9.1 Export settings to a chosen file/folder

To export settings to a file or folder:

- 1. In the GFI WebMonitor Settings Import Tool, select Export settings to a chosen file/folder and click Next.
- 2. Select one of the following options:

OPTION	DESCRIPTION
Use the settings from the current GFI WebMonitor installation	When selecting this option, the wizard automatically selects the default settings folder for export.
Select custom settings folder	Select this option to use an external settings folder. Click Choose source to browse and locate the desired folder.

- 3. Click Next.
- 4. Click **Choose destination folder** and provide the path where the settings file will be saved.
- 5. Select one of the following Export options:

OPTION	DESCRIPTION	
Use pre-defined file- name	Select this option to use the filename created automatically by the wizard.	
Use custom file name	tom file name Select this option to provide a custom name for the exported file.	
Export to folder	Select this option to export settings to a folder. The wizard creates a folder called Data and a PAC File called proxypac.pac.	

- 6. Click Next.
- 7. Review the Summary and use the link to open the export location.
- 8. Click Close.

2.9.2 Import settings from a file

To import settings from a file for GFI WebMonitor 2015 SR2 and later versions:

- 1. In the GFI WebMonitor Settings Import Tool, select Import settings from a file and click Next.
- 2. Click **Choose source** and select the file that contains the settings to import.
- 3. Click Next.
- 4. Select the settings to import or check the All Settings checkbox to select them all. Click Next.
- 5. Click **Choose destination folder** to change the default location where to save the settings. The default path is set to: C:\Program Files\GFI\WebMonitor. Click **Next**.
- 6. View the summary and click Finish to start the import.
- 7. When the import is complete, select one of the following options:

OPTION	DESCRIPTION
Click here to browse import location	Click to open the location where the settings have been saved.
Click here to restart WebMonitor services	If you have chosen to use the default destination folder in Step 5, GFI WebMonitor services need to be restarted after the import is ready. Click this link to let the wizard restart the services.

8. Click Close.

2.9.3 Import settings from a folder

To import settings from a folder for GFI WebMonitor 2013 SR1 and later versions:

- 1. In the GFI WebMonitor Settings Import Tool, select Import settings from folder and click Next.
- 2. Click **Choose source** and select the folder that contains the settings to import.
- 3. Click Next.
- 4. Select the settings to import or check the All Settings checkbox to select them all. Click Next.
- 5. Click **Choose destination folder** to change the default location where to save the settings. The default path is set to: C:\Program Files\GFI\WebMonitor. Click **Next**.
- 6. View the summary and click **Finish** to start the import.
- 7. When the import is complete, select one of the following options:

OPTION	DESCRIPTION
Click here to browse import location	Click to open the location where the settings have been saved.
Click here to restart WebMonitor services	If you have chosen to use the default destination folder in Step 5, GFI WebMonitor services need to be restarted after the import is ready. Click this link to let the wizard restart the services.

8. Click Close.

2.10 Installing GFI WebMonitor in parallel with Microsoft Forefront TMG

GFI WebMonitor 2015 SR3 and later editions can be installed on the same machine where Microsoft Forefront TMG is running.

GFI WebMonitor should be installed in parallel with Microsoft Forefront TMG when you want to keep Microsoft Forefront TMG as a firewall and use the same machine to perform web filtering by GFI WebMonitor. This setup also provides an alternative when it is not possible to add another dedicated machine in the network just for GFI WebMonitor.

NOTE

GFI WebMonitor cannot be deployed in Transparent Proxy mode when installed on machines where Microsoft Forefront TMG is running. For more information, refer to Configuring Transparent Proxy (page 34).

Microsoft Forefront Threat Management Gateway (Microsoft Forefront TMG), is a web gateway solution designed to protect users from web-based threats.

In environments where there is already GFI WebMonitor 2013 installed with Microsoft Forefront TMG, it is possible to upgrade to GFI WebMonitor 2015. Otherwise, a fresh install of GFI WebMonitor 2015 is possible.

2.10.1 What is the difference between GFI WebMonitor 2013 and 2015 in a Microsoft Forefront TMG environment?

While GFI WebMonitor 2013 was a plugin for Microsoft Forefront TMG and depended on Microsoft Forefront TMG for all proxy functions, authentication process and https scanning, GFI WebMonitor 2015 installs the GFI proxy service in parallel with the Microsoft Forefront TMG. This eliminates all dependence on Microsoft Forefront TMG for proxy, authentication and https scanning functions.

With GFI WebMonitor 2015, traffic is captured directly by the GFI WebMonitor proxy and only this traffic is monitored or controlled by GFI WebMonitor. Client machines need to be configured in order to pass through the GFI Proxy when connecting to the Internet.

Upgrading to the new GFI WebMonitor 2015 SR3 on Microsoft Forefront TMG machines is recommended to benefit from new features such as application control, new policy system, enhanced real time traffic reporting, WebInsights and increased overall performance.

2.10.2 System requirements:

Minimum hardware requirements for x64 architectures:

OPTION	DESCRIPTION
Processor	2.0 GHz (multi-core highly recommended)
RAM	8 GB
Hard disk	12 GB of available disk space
Supported Operating Systems	Windows 2008 x64 and Windows 2008 R2
Other required components	Microsoft Forefront TMG firewall needs to be installed. (ISA version – 32bit is not supported).

NOTE

Allocation of hard disk space depends on your environment. The size specified in the requirements is the minimum required to install and use GFI WebMonitor. The recommended size is from 150-250GB.

2.10.3 Upgrading from a previous GFI WebMonitor 2013 for TMG installation

Upgrades from the following editions are officially supported:

- » GFI WebMonitor 2013 SR1 TMG edition (build 20130910)
- » GFI WebMonitor 2012 R2 SR TMG edition (build 20121029).

NOTE

For different Microsoft Forefront TMG builds, we strongly recommend to perform an upgrade to GFI WebMonitor 2013 SR1 build first and then upgrade to GFI WebMonitor 2015 SR3 or later.

During the upgrade, the previously defined GFI WebMonitor configuration is retained and converted to the new format.

After the upgrade process is complete, the Configuration Wizard guides the user in setting up the most important settings. The proxy related settings will contain pre-configured values if no such setting is detected from previous installations. The proxy listening port is set to 8081 instead of the default port of 8080, in order to avoid conflict with Microsoft Forefront TMG's proxy.

2.10.4 Clean GFI WebMonitor 2015 installation on a Microsoft Forefront TMG server

In environments where there was no previous GFI WebMonitor installation, you can install the product by performing an installation process similar to the regular GFI WebMonitor Proxy edition installations.

The proxy listening port is set to 8081 instead of the default port of 8080, in order to avoid conflict with Microsoft Forefront TMG's proxy.

2.10.5 Installing or upgrading to GFI WebMonitor 2015

Run the installer to install or upgrade GFI WebMonitor. For more information, refer to <u>Installing GFI WebMonitor</u> (page 15).

The installation process is similar to the regular GFI WebMonitor Proxy edition installation with an additional step that notifies the administrator if the GFI WebMonitor installer detects a Microsoft Forefront TMG instance on the machine.

After installation or upgrade is complete, client machines need to be configured to use the GFI WebMonitor 2015 as proxy instead of the Microsoft Forefront TMG. This can be done either by configuring every client browser manually, or via GPO or by enabling WPAD.

For more information, refer to the following sections:

- » Configuring Proxy settings via GPO in Microsoft Server 2008
- » Manually configure Internet Browsers to use a Proxy Server
- » Configuring WPAD

NOTE

If GFI WebMonitor proxy is published on the network via WPAD, Microsoft Forefront TMG firewall's WPAD server needs to be de-activated in order to ensure all traffic is passing through the GFI WebMonitor proxy.

Important notes:

» Once the setup is complete and client machines point to GFI WebMonitor, Internet traffic generated by these machines is captured by the GFI proxy and only this traffic is monitored or controlled by GFI WebMonitor. The Microsoft Forefront TMG firewall can still capture traffic via its own proxy or in transparent mode; however this traffic will not be seen by GFI WebMonitor.

- » Previous GFI WebMonitor rules on the Microsoft Forefront TMG firewall configuration are no longer in effect and they can be disabled or deleted.
- » Microsoft Forefront TMG firewall remains operational and the GFI WebMonitor proxy works in parallel with the following Microsoft Forefront TMG operation modes:
 - Single Network Adapter Microsoft Forefront TMG with one network adapter connected to the Internal network or to a Perimeter network.
 - Edge Firewall Microsoft Forefront TMG located at the network edge, acting as an edge firewall and connected to two networks: the internal network and the external network (usually the Internet).
 - 3-Leg Perimeter Microsoft Forefront TMG deployed at the edge of the network, connected to the Internal network, the Perimeter network and the Internet.
 - Back Firewall Microsoft Forefront TMG deployed at the edge of the network, connected to the Internal network and the Perimeter network.

2.11 Upgrading from previous versions

The current version of GFI WebMonitor includes a number of new features aimed at making web monitoring and filtering an easier job for you, with improved user experience and performance.

GFI WebMonitor can be upgraded from version 2013 SR1 and later to the current version.

NOTE

For versions older than 2013 SR1 we recommend to first upgrade to GFI WebMonitor 2013 SR1 and then to the current version.

With a few exceptions, existing settings, policies, some alerts and reports are imported automatically into GFI WebMonitor 2015 and later versions during the upgrade process. The table below lists the exceptions and other important changes:

FEATURE DESCRIPTION

Policies

The upgrade process imports existing policies to GFI WebMonitor 2015 and later version of the product. However, the list of policies will be different.

- >> Web Filtering policies for a WebFiltering policy 2013 that has both block and warn actions set, after the upgrade there will be two corresponding policies:
 - WebFiltering policy 2013 block this will contain the blocked categories, the sites from Always Blocked section and the Reputation Index.
 - WebFiltering policy 2013 warn this will have Warn action and the corresponding categories.
 - Both policies will have the settings that were configured in the previous version: Notification, Logging enabled and Schedule. The policy with **Block** action has the higher priority.
- **Web Browsing policies** existing web browsing policies are imported with the same settings.
- >> Web Security policies for an existing Web security policy that has both block and warn actions set, after the upgrade there will be two new corresponding policies. Additionally, if in the existing policy there are file types with download window enabled and others that do not, after the upgrade these will be separated into two policies, one with AV Scanning and Download Window enabled and one with only AV Scanning.
- » Streaming Media and Instant Messaging Existing Streaming Media and Instant Messaging polices will be imported into a new policy with **Block** action and corresponding applications added.

ThreatTrack and AntiPhishing – If at least one of these features was enabled in the previous version, a new policy with Block action and URL Scanning enabled is added after the upgrade. Since ThreatTrack and AntiPhishing are no longer separated GFI WebMonitor 2015 and later versions, both features will be enabled.

GFI WebMonitor 2013 had an advanced setting that allowed the user to set a condition on multiple categories with AND operator between them. This is not imported.

FEATURE	DESCRIPTION
Activity Logging	The Activity Logging settings in GFI WebMonitor 2015 and later versions are different than previous versions. This feature is now integrated in the new policy builder, using the Logging element. Therefore, if your current installation contains Activity Logging policies please note that no corresponding policy is added after the upgrade.
Alerts	In previous versions, Monitor, Bandwidth and Security Alerts could be set up from a separate location to apply to all policies. In GFI WebMonitor 2015 and later versions these are now configured per policy using the Log Alert element. The upgrade process can import some existing alerts with a few exceptions as detailed below: **Existing Monitoring Alerts that were set for Sites Accessed will be imported into new policies with Monitor action. However, alerts for Warning Bypassed and Sites Blocked are not imported. **Existing Security Alerts are not imported.** **Bandwidth Alerts that were set for All Users cannot be imported. All other bandwidth alerts are imported into new policies with a Monitor action.
Reports	The following reports cannot be imported into GFI WebMonitor 2015 and later versions: Bandwidth - Download Only Bandwidth - Upload Only Activity - Filtered Only by Type Bandwidth Usage Trends - Downloads Bandwidth Usage Trends - Uploads Bandwidth - Non productive traffic

Upgrade procedure

The upgrade procedure is similar to the installation procedure. Refer to the installation topic for more information.

Before upgrading, ensure you have the latest version of GFI WebMonitor. This can be downloaded from http://go.gfi.com/?pageid=WebMon_Download.

NOTE

If installing a new version of GFI WebMonitor on a different infrastructure, it is recommended to uninstall the previous version before installing the new one.

2.11.1 Uninstall information

To uninstall GFI WebMonitor:

- 1. Click Start > Control Panel > Programs > Programs and Features.
- 2. Select GFI WebMonitor from the list, and click **Uninstall**.
- 3. When Are you sure you want to uninstall GFI WebMonitor? appears, click Yes.
- 4. On completion, click Finish.

3 Configuring

The following topics contain information on how to configure your GFI WebMonitor deployment to your needs and requirements:

3.1 Configuring Core Settings

The Core Settings ensure that your GFI WebMonitor installation is properly configured to start monitoring Internet traffic on your network. After installation is complete, the Configuration Wizard helps you configure the following settings to start achieving results immediately:

OPTION	DESCRIPTION
Configure con- nection set- tings	Choose your Network Mode depending on your current network setup. Establish a connection between your internal network and the Internet through the GFI WebMonitor server.
Enable Transparent Proxy	Enable Transparent Proxy to monitor and control HTTP and HTTPS traffic transparently. When a user makes a request to a web server, the Transparent Proxy intercepts the request to deliver the requested content. When GFI WebMonitor is deployed in this mode, you do not need to set client browser settings to point to a specific proxy.
	IMPORTANT Ensure that GFI WebMonitor is running in Gateway mode. Transparent Proxy cannot work in Simple Proxy mode.
Enter your License key	Key in a valid license to use GFI WebMonitor. This can either be a trial license or a regular license key obtained on renewal.
Configure	Configure HTTPS scanning to monitor and block encrypted traffic.
HTTPS Scan- ning	IMPORTANT Ensure that by enabling HTTPS Scanning you are not violating any laws in your jurisdiction or any compliance regulations for your industry.
Set up the Database	Configure the database to use with GFI WebMonitor where collected data is stored. Use the Firebird database only during the evaluation period. It is highly recommended to switch to a Microsoft SQL Server based database for live systems.
Define Admin Credentials	Key in the admin credentials required by the GFI WebMonitor services to control internal security engines, manage updates, send notifications and control data displayed in the User Interface. The GFI WebMonitor services are Windows services installed automatically during installation and require administrative privileges to operate.
Setup Email notification set- tings	Provide the email addresses required by GFI WebMonitor to send messages containing information related to tasks such as auto-updates and licensing issues.
Configuring Internet Browsers to use a Proxy Server	If you have not configured WPAD or Transparent Proxy, ensure that proxy settings of client machines are configured to use GFI WebMonitor as the default proxy. This ensures that Internet traffic is routed through GFI WebMonitor.

NOTE

The Configuration Wizard is launched automatically after installing GFI WebMonitor or manually from the **Settings** menu.

3.1.1 Connection Settings

Select how GFI WebMonitor is configured within your network and configure the connection between your internal network and the Internet through the GFI WebMonitor server.

NOTE

The Configuration Wizard is launched automatically after installing GFI WebMonitor or manually from the **Settings** menu.

- 1. Go to Settings > Core Settings > Connection Settings.
- 2. In the **Network Mode** area, select one of the following options:

MODE	DESCRIPTION
Simple Proxy mode	Select Simple Proxy mode if you want to route client HTTP traffic through GFI WebMonitor and non-HTTP traffic through a separate router. This setup requires an Internet facing router with port blocking and traffic forwarding capabilities.
Gateway mode	Deploy GFI WebMonitor in Gateway mode if you are installing the application on a server that is configured as an Internet gateway. All outbound and inbound client traffic (HTTP and non-HTTP) is routed through GFI WebMonitor. When GFI WebMonitor is deployed in this mode, you can enable Transparent Proxy, eliminating the need to set client browser settings to point to a specific proxy. For more information, refer to Configuring Transparent Proxy (page 34).
In par- allel with Microsoft Forefront TMG	GFI WebMonitor 2015 SR3 and later editions can be installed in parallel with Microsoft Forefront TMG on the same machine where Microsoft Forefront TMG is running. Use this setup when you want to keep Microsoft Forefront TMG as a firewall and use the same machine to perform web filtering by GFI WebMonitor. This setup also provides an alternative when it is not possible to add another dedicated machine in the network just for GFI WebMonitor.

If you selected **Simple Proxy mode**, configure the following settings:

OPTION	DESCRIPTION
Listen on all network interfaces	Configure GFI WebMonitor to listen for incoming HTTP and HTTPS requests on all available network interface cards.
Proxy Server	In the Proxy Server field, enter the IP address of the computer where GFI WebMonitor is installed.
Port	In the Port field, enter the port number used by GFI WebMonitor to listen to traffic (Default is 8080).
Use WPAD	[Optional] Enable Use WPAD if you want to use Web Proxy Auto-Discovery to enable client computers to automatically detect the GFI WebMonitor server.
Repeat WPAD detection	Click to enable GFI WebMonitor to search for available WPAD servers on your network.
Proxy Authentication	Configure the authentication method used when client machines are validated when accessing the Internet.
Chained Proxy	Connecting several proxy servers together to obtain greater anonymity. These servers act together as one proxy server to process web requests.

If you selected **Gateway mode**, configure the following settings:

OPTION	DESCRIPTION
Internal Net- work card	Select a network card from the available drop-down list. GFI WebMonitor listens for incoming HTTP and HTTPS requests on the selected network card.
IP Address	If the chosen network adapter has multiple IP addresses, select the IP address you want to use from the list.

OPTION	DESCRIPTION
Use WPAD	[Optional] Enable Use WPAD if you want to use Web Proxy Auto-Discovery to enable client computers to automatically detect the GFI WebMonitor server.
Repeat WPAD detection	Click to enable GFI WebMonitor to search for available WPAD servers on your network.
Proxy Authentication	Configure the authentication method used when client machines are validated when accessing the Internet.
Chained Proxy	Connecting several proxy servers together to obtain greater anonymity. These servers act together as one proxy server to process web requests.

3. Click Next.

3.1.2 Network Interface Configuration

GFI WebMonitor must be configured to listen for incoming HTTP and HTTPS requests originating from client computers on the internal network. You can configure GFI WebMonitor to listen on a specific network card or to listen on all network cards installed on the server.

NOTE

The Configuration Wizard is launched automatically after installing GFI WebMonitor or manually from the **Settings** menu.

To configure GFI WebMonitor to listen for incoming HTTP and HTTPS requests:

- 1. Go to Settings > Core Settings > Connection Settings.
- 2. Select from the following options:

OPTION	DESCRIPTION
Proxy Server	Key in the IP Address of the internal facing network card that will listen to traffic from client computers.
Port	Specify the port number on which the internal facing network card will listen to requests.
Listen on all network interfaces	If you want GFI WebMonitor to listen for incoming requests on all available network cards, click Show Advanced Options . Click the switch to enable.

3.1.3 Configuring WPAD

The Web Proxy Auto Discovery (WPAD) is an Internet protocol supported by all major Internet browsers. It enables client web browsers to automatically retrieve proxy settings from a WPAD data file stored on a machine on your network.

WPAD is a convenient way for administrators to configure client machines to use the GFI WebMonitor machine as a proxy server without having to supply settings manually or via Active Directory Group Policies. When this feature is enabled and the Internet browser connection settings are configured to 'Automatically Detect Settings', each client machine will automatically determine the IP address of the GFI WebMonitor server and use it as a proxy without further configuration.

WPAD is particularly useful when you want to configure roaming devices such as laptops and tablets to use GFI WebMonitor as the proxy server when they are in the office.

NOTE

For client Internet browsers to use WPAD, these must be configured to automatically detect proxy settings. For more information, refer to Configure Internet browser for WPAD (page 31).

When GFI WebMonitor is installed the first time, it tries to detect available WPAD servers. Discovered WPAD servers are listed in an information window.

To enable WPAD:

- 1. Go to Core Settings > Connection Settings.
- 2. Locate **Use WPAD** switch. Click **ON** to enable.

NOTE

If GFI WebMonitor does not discover any WPAD Servers on your network, this option is disabled. Click **Repeat WPAD detection** to check for available servers.

- 3. A warning is displayed informing you that by enabling WPAD, server information is updated that might create network conflicts. These conflicts may arise when you have multiple GFI WebMonitor installations within the same network. Click **Proceed** to continue.
- 4. Select one of the following options:

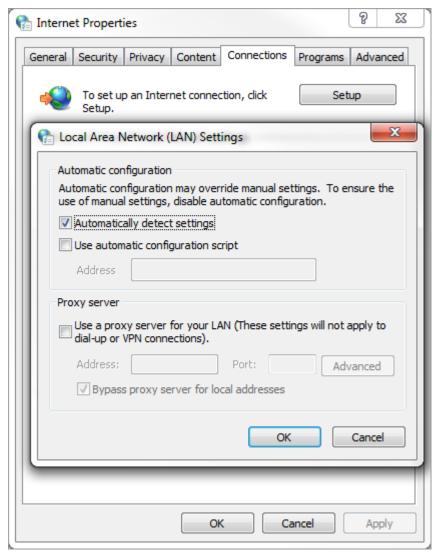
OPTION	DESCRIPTION
Publish the IP of the GFI WebMonitor proxy in WPAD	Select to include the GFI WebMonitor IP address in the WPAD.dat file.
Publish the host name of the GFI WebMonitor proxy in WPAD	Select to include the GFI WebMonitor host name in the WPAD.dat file.

5. Click Next.

3.1.4 Configure Internet browser for WPAD

After enabling WPAD in GFI WebMonitor, ensure that the updated Internet settings are automatically detected by a client browser:

- 1. On the client machine, go to **Control Panel** and select **Internet Options**.
- 2. Click the **Connections** tab.
- 3. Click LAN settings.
- 4. Check Automatically detect settings checkbox.



Screenshot 7: Configuring Automatically detect settings

- 5. Close **LAN Settings** dialog.
- 6. Click **OK** to close **Internet Options** dialog.
- 7. Restart Internet browser to refresh settings.

NOTE

WPAD is supported by all major Internet browsers.

3.1.5 Configuring Proxy Authentication Method

Proxy Authentication enables you to configure the authentication method used by the proxy. This determines how client machines are validated when accessing the Internet. **Proxy Authentication** must be enabled to be able to create new polices for users or groups. By default, Proxy Authentication is disabled. When Proxy Authentication is disabled, you are only allowed to configure new policies using IP addresses.

For enhanced security we recommend using Integrated Authentication. This method is more secure since unlike Basic Authentication it does not transmit user credentials over the network.

NOTE

The Configuration Wizard is launched automatically after installing GFI WebMonitor or manually from the **Settings** menu.

To configure user authentication method:

- 1. Go to Core Settings > Connection Settings.
- 2. Click the **Proxy Authentication** switch to enable.
- 3. In the **Proxy Authentication** area, select one of the following options:

Option 1: Leave Proxy Authentication off if the user is not required to provide login credentials when new Internet sessions are launched.

Option 2: If proxy authentication is required, select one of the following options:

OPTION	DESCRIPTION
Basic authen- tication	Select if user is required to provide login credentials when new Internet sessions are launched. When using Basic authentication, the browser prompts the user for a user name and password. This information is transmitted across HTTP as plain text and considered insecure.
Integrated authentication	(Recommended) This option enables GFI WebMonitor proxy to authenticate users by using the client machine access control service. User is not prompted to provide login credentials when new Internet sessions are launched. We recommend using Integrated authentication in a Windows domain environment since this method of authentication does not transmit user passwords across the network.
	NOTE Integrated authentication is disabled if the GFI WebMonitor machine authenticates local users as Guest. The Guest only network access model grants all users the same level of access to system resources and so GFI WebMonitor proxy will not be able to differentiate between the different users using a client machine.

4. [Optional] In the **IP's that will bypass the authentication** field, key in IP addresses to exclude from proxy authentication. IP addresses specified in this field will not be prompted to provide login credentials when new Internet sessions are launched.

3.1.6 Authentication Test (in Real-Time)

Try browsing to http://www.youtube.com and open a video of considerable length (more than 10 minutes should be enough). If you have chosen **Basic Authentication** you are prompted for a username and password. Enter the credentials you used to log onto the machine you are using, then you should be able to proceed.

If you go to **Dashboards > Real-Time Traffic** you should see the connection to http://www.youtube.com listed. Other details include the IP of the test machine and your user name, status of traffic and size of download.

Real-Time Bandwidth Chart

If you now switch from **Active Connections** to **Bandwidth** you will see a real time graph of bandwidth being used at that point in time. The more connections you open, the higher the graph will climb.

3.1.7 Blocking Test by Username

With GFI WebMonitor configured to use **Basic Authentication**, repeat the blocking test previously carried out, but this time use the logged on user credentials. The outcome of this test will confirm that policies are being applied by username.

- 1. Go to Manage > Policies and create a new Policy.
- 2. In Policy Name field, enter Authentication Test.

- 3. In **Policy Description**, enter a description.
- 3. Change the Allow, Block, Warn, Monitor element to Block
- 4. From the left sidebar, add the Websites element.
- 5. Locate and insert the **Social Network** category to block social networking websites (for blocking test purposes).
- 6. Insert the Users, Groups, IPs and insert the username currently logged on the machine.
- 7. Click **Save** to apply the changes.
- 8. Go back to your browser and open http://www.linkedin.com/. The GFI WebMonitor blocking page should now be displayed. Note that this time the label **Breached Policy** has changed to 'Authentication Test'.

If the warning is displayed, then GFI WebMonitor is working correctly!

If the block did not work, make sure you have entered all details correctly, and that you have saved changes to the policy. Try closing and re-opening the browser, and check the **Real-Time Traffic** dashboard in the GFI WebMonitor interface to ensure that traffic is being routed through the proxy correctly. If you see the request with the IP, this means that you have not forced authentication correctly and you should use IPs for your policies. If you see a different username, you need to enter this username in the policy.

If you don't manage to get this part working you should contact our support team so that we can help you to troubleshoot your installation.

3.1.8 Configuring Chained Proxy

Proxy Chaining is a method of connecting several proxy servers together to obtain greater anonymity. These servers act together as one proxy server to process web requests.

Client machines can be configured to forward web traffic to the GFI WebMonitor server. Additionally, the GFI WebMonitor server forwards the filtered traffic to a proxy server.

NOTE

The Configuration Wizard is launched automatically after installing GFI WebMonitor or manually from the **Settings** menu.

To configure GFI WebMonitor to forward web traffic to another proxy machine:

- 1. Go to Settings > Core Settings > Connection Settings.
- 2. Click the Chained Proxy switch to turn on and enable GFI WebMonitor to route traffic to another proxy server.
- 3. In the Proxy Server field, key in the IP address
- 4. In the Port field, key in the port number (default 8080).
- 5. [Optional] If proxy authentication requires alternate credentials, click **Alternative Credentials** and key in the required credentials in the **Username** and **Password** fields.

NOTE

If no credentials are keyed in, the default user credentials are used.

6. [Optional] Click **Test Proxy Chaining** to test the connection between GFI WebMonitor machine and proxy server.

3.1.9 Configuring Transparent Proxy

When configured as a Transparent Proxy, GFI WebMonitor acts as an intermediary between client machines and web servers to monitor and control HTTP and HTTPS traffic transparently. When a user makes a request to a web server, the

Transparent Proxy intercepts the request to deliver the requested content. When GFI WebMonitor is deployed in this mode, you do not need to set client browser settings to point to a specific proxy.

NOTE

Transparent Proxy can filter only HTTP (TCP port 80) and HTTPS (TCP port 443) traffic.

System Requirements and environment considerations

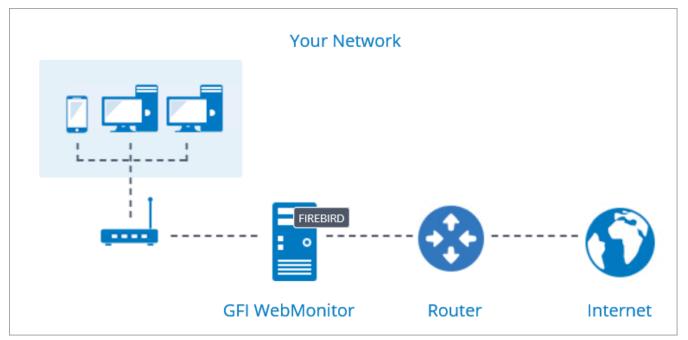
ТҮРЕ	SOFTWARE REQUIREMENTS (x64 Editions only)
Supported Operating Systems	Transparent Proxy can be enabled on servers running the following operating systems: Windows® Server 2008 R2 Windows® Server 2012 (Including R2) Windows® 7 SR3 Windows® 8.1
	NOTE Ensure the Operating System is up-to-date with all windows updates installed.
Ports	By default, Transparent Proxy uses port 8082. Ensure that the listening port does not conflict with other applications. When the port is changed the proxy is restarted and ongoing connections are terminated. Applications do not need to be configured to connect to the transparent proxy port. The port is needed for internal operations by GFI WebMonitor.
Gateway Mode	Ensure that GFI WebMonitor is running in Gateway mode. Transparent Proxy cannot work in Simple Proxy mode. For more information, refer to <u>Deployment in an Internet Gateway environment</u> (page 10).
Microsoft TMG fire- wall and Transparent Proxy	Transparent proxy is not compatible with Microsoft Forefront TMG.
Proxy Chain- ing	Transparent proxy cannot be enabled if Proxy Chaining is already used, because of possible conflicts. For more information, refer to Configuring Chained Proxy (page 34).
Network address translation (NAT)	Ensure Network address translation (NAT) is disabled on the GFI WebMonitor server for transparent proxy to work. Network address translation (NAT) modifies network address information in HTTP and HTTPS traffic.

NOTE

Certain restrictions may apply on transparent proxy usage depending on the network topology. Configuration changes might be needed on the network to enable transparent mode.

How it works

Transparent Proxy can work in parallel with the regular proxy. HTTP and HTTPS traffic originating from client machines that are not set to explicitly point to GFI WebMonitor (manually or through WPAD) is captured by the transparent proxy once this functionality is enabled.



Screenshot 8: How Transparent Proxy works

When a user makes a request, the GFI WebMonitor Transparent Proxy intercepts the request even if the client machine has no configured proxy. If the requested content is allowed by GFI WebMonitor, the Transparent Proxy delivers it to the destination.

3.1.10 Enabling Transparent Proxy

To enable Transparent Proxy:

- 1. Go to Core Settings > Transparent settings.
- 2. Click the **Enable Transparent Proxy** switch to enable.
- 3. Configure the following options:

OPTION	DESCRIPTION
Port	Specify the port number on which the internal facing network card will listen to requests. The default port is 8082.
	IMPORTANT Ensure that the listening port does not conflict with other applications. When the port is changed the proxy is restarted and ongoing connections are terminated.
Save and Test Transparent Proxy	Use the Save and Test Transparent Proxy button to check if the transparent proxy is operational.
	NOTE The test checks if the transparent proxy driver and modules are working well and traffic generated from the GFI WebMonitor server machine is filtered properly. It cannot guarantee that traffic coming from the internal network gets processed properly.
Use general proxy authen- tication set- tings	By default, Transparent Proxy inherits the authentication settings from the regular proxy set from Connection Settings > Proxy Authentication. For more information, refer to Configuring Proxy Authentication Method (page 32).
	To override the regular authentication settings, uncheck this option and then set new authentication settings in the Proxy Authentication area.

OPTION	DESCRIPTION
Proxy Authentication	 Basic authentication - Select if user is required to provide login credentials when new Internet sessions are launched. When using Basic authentication, the browser prompts the user for a user name and password. This information is transmitted across HTTP as plain text and considered insecure. Integrated authentication - (Recommended) This option enables GFI WebMonitor proxy to authenticate users by using the client machine access control service. User is not prompted to provide login credentials when new Internet sessions are launched. We recommend using Integrated authentication in a Windows domain environment since this method of authentication does not transmit user passwords across the network.
	NOTE Integrated authentication is disabled if the GFI WebMonitor machine authenticates local users as Guest. The Guest only network access model grants all users the same level of access to system resources and so GFI WebMonitor proxy will not be able to differentiate between the different users using a client machine.
IPs that will bypass the authentication	Key in the IP addresses of machines to be excluded from authentication. Traffic from excluded IPs will not be authenticated by GFI WebMonitor. The dashboards will display only IP addresses and not user names.

4. Click Save.

3.1.11 Testing Transparent Proxy

The GFI WebMonitor user interface provides a test button in the Transparent Proxy settings screen. Use this feature to check if the Transparent Proxy is operational. This test checks only if the transparent proxy driver and modules are working well and traffic generated from the GFI WebMonitor server machine is filtered properly. It cannot guarantee that traffic coming from the internal network gets processed properly.

To test if traffic generated from the internal network is properly filtered by the Transparent Proxy, perform the following steps:

- 1. Ensure the client browser is not configured to use any proxy. Also uncheck options of automatic proxy detections within browser to avoid regular proxy usage through WPAD. For more information, refer to <u>Configuring WPAD</u> (page 30).
- 2. From the client browser try to access the following URL: whatismyproxy.com. GFI WebMonitor policies might block the URL and in that case the GFI WebMonitor blocking page will appear. Otherwise, the opening web site should detect that the browser is passing through the GFI Proxy. Both behaviors prove that traffic flows through GFI WebMonitor (via transparent mode).
- 3. Additionally, if you have set up logging within the GFI WebMonitor policies, you can also check the Dashboards and locate requests made by the client machine. If requests were captured and logged by the product, Transparent Proxy is configured correctly. For more information, refer to Logging (page 74).

3.1.12 HTTPS Proxy Scanning settings

HTTPS Scanning gives GFI WebMonitor visibility into secure Internet sessions (URLs starting with https://). This feature enables you to apply policies to this type of traffic and to scan the content for threats that may be present in these sites and on downloaded files .

With HTTPS Proxy Scanning enabled, GFI WebMonitor can monitor and block traffic within an encrypted stream. This includes blocking and Anti-Virus scanning of downloads within that stream. HTTPS inspection decrypts the data in the connection coming from the client, then processes the traffic, and encrypts the traffic going to the target web server.

The actual data that is passed between source and destination is not shown because GFI WebMonitor cannot read the encrypted contents. Only the destination web server is shown. Therefore, an administrator cannot see details of the data sent, such as account information, usernames and passwords.

IMPORTANT

Ensure that by enabling HTTPS Scanning, you are not violating any legal and compliance regulations.

When HTTPS inspection is enabled, two secure connections are started for each HTTPS session; one between the web server and the GFI WebMonitor Proxy and one between the GFI WebMonitor Proxy and the client browser.

NOTE

When HTTPS Scanning is not enabled, GFI WebMonitor allows users to browse HTTPS websites without decrypting and inspecting their contents.

GFI WebMonitor needs a valid certificate for these two secure connections to be established. The Internet browser must verify that the certificate is signed by a trusted Certification Authority (CA). This means that for your client machines to be able to access HTTPS sites, they need to trust the certificate used by GFI WebMonitor to sign certificates.

CA certificates trusted by Windows machines are stored in the '*Trusted Root Certification Authorities*' certificate store. Export the certificate from your GFI WebMonitor and deploy it on client machines manually or through Group Policy in an Active Directory domain environment.

The following topics will guide you through the steps required to:

- » Configure HTTPS Proxy Settings
- » Create a new HTTPS Scanning certificate
- » Import an existing HTTPS Scanning certificate
- » Export an HTTPS Scanning certificate
- » Deploy an HTTPS Inspection Certificate Manually
- » Deploy an HTTPS Inspection Certificate Using GPO

NOTE

It is recommended that any HTTPS website that would be inappropriate for GFI WebMonitor to decrypt and inspect is added to the HTTPS scanning exclusion list. For more information refer to Adding Items to the HTTPS Scanning Exclusion List.

3.1.13 Configuring HTTPS Proxy settings

Enable HTTPS Scanning to monitor and block traffic within encrypted streams (URLs starting with https://). This prevents threats from malicious content that may be present in HTTPS sites or downloads. GFI WebMonitor does not read or display any encrypted contents.

To configure HTTPS Scanning settings:

1. Go to Settings > Core Settings > HTTPS Scanning.



HTTPs Scanning

NOTE: Ensure that by enabling HTTPs Scanning, you are not violating any legal and compliance regulations in your jurisdiction.

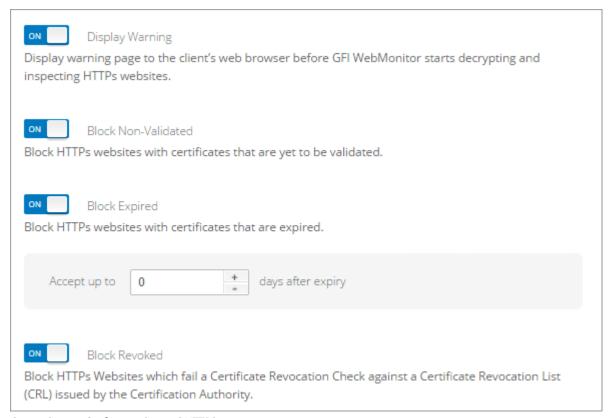
Screenshot 9: Enable HTTPS Scanning

2. Click the HTTPS Scanning switch to turn on.



Screenshot 10: Information related to active certificate

- 3. In the **Current Certificate** area, view relevant information of the currently used certificate. GFI WebMonitor needs a valid certificate to inspect HTTPS traffic. If no certificate is currently enabled, consult the following sections that show you how to work with certificates:
- » Creating a new HTTPS Scanning certificate
- » Import an existing HTTPS Scanning certificate
- » Export an HTTPS Scanning certificate



Screenshot 11: Configure advanced HTTPS options

- 4. Click the **Display Warning** switch to display a warning page to users before GFI WebMonitor starts decrypting and inspecting HTTPS traffic.
- 5. Click the **Block Non-Validated** switch to start blocking HTTPS websites with certificates that are not yet validated.
- 6. Click the **Block Expired** switch to block pages that contain expired certificates.
- 7. Use the Accept up to 'x' days after expiry field to accept websites whose certificate has expired by a number of days.
- 8. Click the **Block Revoked** switch to block websites with revoked certificates.

IMPORTANT

Ensure that by enabling HTTPS Scanning, you are not violating any legal and compliance regulations.

NOTE

It is recommended that any HTTPS website that would be inappropriate for GFI WebMonitor to decrypt and inspect is added to the HTTPS scanning exclusion list. For more information refer to Adding Items to the HTTPS Scanning Exclusion List.

3.1.14 Creating a new HTTPS Scanning certificate

After decrypting HTTPS websites, GFI WebMonitor can re-encrypt these websites for secure transmission to the client browser. To perform these actions, GFI WebMonitor requires a valid certificate signed by a trusted Certification Authority (CA). You can import an existing certificate or create a new certificate in GFI WebMonitor by performing the following steps:

NOTE

When the certificate expires, browsing of HTTPS websites is not allowed. Renew, export and deploy the certificate again to client computers.

To create a new certificate:

- 1. Go to Settings > Core Settings > HTTPS Scanning.
- 2. In the Current Certificate area, click Create Certificate.
- 3. In the **Certificate Name** field, type a name for the certificate.
- 4. Set the expiration date and click Create.

3.1.15 Importing an HTTPS Scanning certificate

To import an existing HTTPS Scanning certificate:

- 1. Go to Settings > Core Settings > HTTPS Scanning.
- 2. In the Current Certificate area, click Import Certificate.
- 3. Click **Browse** and locate the certificate you want to import.
- 4. Click Import.
- 5. If the certificate you are importing is password protected, key in the required password.

3.1.16 Exporting an HTTPS Scanning Certificate

A created or imported certificate can be exported from GFI WebMonitor in the following file formats:

FILE FORMAT	DESCRIPTION
Personal Information Exchange file format (.pfx)	Contains the certificate data and its public and private keys. Required by GFI WebMonitor proxy to reencrypt inspected HTTPS traffic. Ideal for backing up the certificate and its keys.
Certificate file format (.cer)	Contains the certificate data but not its private key. Ideal for deploying the certificate as a trusted certificate to the client computer.

Keep the private key of the certificate safe to avoid unauthorized generation of trusted certificates.

To export an existing certificate:

- 1. Go to Settings > Core Settings > HTTPS Scanning.
- 2. In the Current Certificate area, click **Export as .cer** or **Export as .pfx** as required.
- 3. Specify the destination path of the certificate.

NOTE

It is recommended that when the certificate is not issued by a trusted Certificate Authority, it is exported from GFI WebMonitor and deployed to the client computers as a trusted certificate. For more information on how to deploy a certificate to client computers, refer to: http://go.gfi.com/?pageid=WebMon_HTTPSInspectionCertificate

3.1.17 Deploy the HTTPS Inspection certificate via GPO

For your client machines to access HTTPS sites, a trusted HTTPS Inspection certificate needs to be deployed on client computers. Use the **Export Certificate** functionality to save the certificate to disk, then deploy your certificate to multiple computers using Active Directory Domain Services and a Group Policy object (GPO). A GPO can contain multiple configuration options, and is applied to all computers that are within the scope of the GPO.

NOTE

To complete this procedure you need Domain Administrator rights.

To deploy a certificate by using GPO:

- 1. Open Group Policy Management Console.
- 2. Find an existing or create a new GPO to contain the certificate settings. Ensure that the GPO is associated with the domain, site, or organizational unit which users you want affected by the policy.
- 3. Right-click the GPO, and then select **Edit**. Group Policy Management Editor opens, and displays the current contents of the policy object.
- 4. In the navigation pane, open Computer Configuration > Windows Settings > Security Settings > Public Key Policies > Trusted Publishers.
- 5. Click the **Action** menu, and then click **Import**.
- 6. Follow the instructions in the **Certificate Import Wizard** to find and import the certificate.
- 7. If the certificate is self-signed, and cannot be traced back to a certificate that is in the Trusted Root Certification Authorities certificate store, then you must also copy the certificate to that store. In the navigation pane, click **Trusted Root Certification Authorities**, and then repeat steps 5 and 6 to install a copy of the certificate to that store.

3.1.18 Deploy the HTTPS Inspection certificate manually

For your client machines to access HTTPS sites, a trusted HTTPS Inspection certificate needs to be deployed on client computers. Use the **Export Certificate** functionality to save the certificate to disk, then deploy your certificate manually as follows:

- 1. Copy the exported certificate to the client machine.
- 2. On the client machine, go to Start > Run > mmc.exe
- 3. In the MMC window, select File > Add/Remove Snap-in
- 4. Click Add, select Certificates and click Add.
- 5. Select Computer Account and click Next.
- 6. Select Local computer and click Finish.
- 7. In the MMC, browse to Certificates (Local Computer) > Trusted Root Certification Authorities.
- 8. Right click on the node and select All Tasks > Import.
- 9. Locate the certificate copied in step 1 and import the certificate.
- 10. Leave the password field blank and proceed to the end of the wizard.

To verify that the certificate was successfully imported, open an Internet browser on the client machine and browse to any HTTPS site. Verify that no warnings are shown.

NOTE

Some applications or browsers (such as Mozilla Firefox), might have their own custom certificate store. For such applications the certificate will need to be imported to the certificate store separately. To import the certificate in Firefox, perform the following steps.

- 1. Go to Tools > Options > Advanced > Encryption > View Certificates.
- 2. Click **Import** and select the certificate.
- 3. Click OK.

3.1.19 Adding Items to the HTTPS Scanning Exclusion List

When HTTPS inspection is enabled, by default this applies to all HTTPS sessions passing via the GFI WebMonitor Proxy. Administrators may however wish to exclude some domains, users, or client IPs from having their sessions inspected. This is achieved by adding them to the HTTPS scanning exclusion list.

IMPORTANT

Backup ProxyConfig.xml before making any changes.

Excluding Domains

- 1.Open ..\WebMonitor\Data\ProxyConfig.xml
- 2.Remove < DomainsExceptedFromHTTPSInspection /> tag
- 3. Add the sites exclude between a DomainsExceptedFromHTTPSInspection tag. For example:

<DomainsExceptedFromHTTPSInspection>

<string>www.domain.com</string>

<string>*.domain.com</string>

</DomainsExceptedFromHTTPSInspection >

4. Save file.

Excluding Users

- 1.Open ..\WebMonitor\Data\ProxyConfig.xml
- 2. Remove the <UsersExceptedFromHTTPSInspection /> tag
- 3. Add the users to be excluded between a UsersExceptedFromHTTPSInspection tag, for example:
- <UsersExceptedFromHTTPSInspection>
- <string>mydomain\user1</string>
- <string>mydomain\user2</string>
- </UsersExceptedFromHTTPSInspection>
- 4. Save file.

Excluding Client IPs

- 1.Open ..\WebMonitor\Data\ProxyConfig.xml
- 2. Remove the <UserIPsExceptedFromHTTPSInspection /> tag
- 3. Add the client IP addresses to be excluded between a UsersExceptedFromHTTPSInspection tag, for example:
- <UserIPsExceptedFromHTTPSInspection>
- <string>10.0.0.11</string>
- <string>10.0.0.23</string>
- </UserIPsExceptedFromHTTPSInspection>
- 4. Save file.

NOTE

Changes are applied as soon as the file is saved.

3.1.20 Configuring Databases

GFI WebMonitor supports two types of databases that can be configured to store collected monitoring data. This data is used to populate the dashboards and for reporting purposes by GFI WebMonitor. The supported databases are:

DATABASE	DESCRIPTION
Firebird Data- base	Firebird is the default database, embedded automatically with the installation. We highly recommend using this database for evaluation purposes only.
Microsoft SQL Database	GFI WebMonitor supports both Microsoft SQL Express and Microsoft SQL Server databases.

The currently configured database can be viewed from Settings > Core Settings > Database.

NOTE

The Configuration Wizard is launched automatically after installing GFI WebMonitor or manually from the **Settings** menu.

To change the current database configuration refer to the following sections:

- » Configuring the embedded Firebird Database
- » Configuring Microsoft SQL Database
- » Create a new Microsoft SOL Database

Configuring the Embedded Database

During installation, GFI WebMonitor automatically installs a Firebird database that is used by the application as the default database. The default path is: C:\Program Files\GFI\WebMonitor\Data\WEBMON.FDB.

IMPORTANT

It is highly recommended to use this database for evaluation purposes only.

To change the default location of the Firebird database:

- 1. Go to C:\Program Files\GFI\WebMonitor\Data and copy the WEBMON.FDB file.
- 2. Save the copied file to the new location.
- 3. In GFI WebMonitor, go to Settings > Core Settings > Database.
- 4. From Database Type, select Embedded.
- 5. In the **Database Path** field, change the path to point to the new location.

NOTE

To create a new Firebird Database, enter a new database name in the following format: < database name >.fdb

Configuring Microsoft® SQL Database

GFI WebMonitor supports both Microsoft® SQL Server Express and Microsoft® SQL Server databases.

To point GFI WebMonitor to use a previously created Microsoft® SQL Server database:

- 1. In GFI WebMonitor, go to Settings > Core Settings > Database.
- 2. From Database Type, select SQL Server.
- 3. In the **SQL Server** field, type the SQL Server instance name.
- 4. In the **Authentication** area, select one of the following:

OPTION	DESCRIPTION
Windows Authentication	Select this option to use Windows® credentials when connecting to your SQL Server®.
SQL Server Authentication	If your SQL Server® has been installed in SQL Server Authentication Mode, select this option and provide Username and Password .

5. In the **Database Name** field, type the name of the database created in SQL Server.

IMPORTANT

Ensure that the database name entered is unique, otherwise you will overwrite the existing database.

You can create a new database from within GFI WebMonitor. For more information, refer to <u>Creating a new Microsoft SQL Database</u> (page 45).

Creating a new Microsoft SQL Database

GFI WebMonitor supports both Microsoft® SQL Server Express and Microsoft® SQL Server databases.

You can create a new database from within GFI WebMonitor. To create a new database:

- 1. In GFI WebMonitor, go to Settings > Core Settings > Database.
- 2. From Database Type, select SQL Server.
- 3. In the **SQL Server** field, type the SQL Server instance name.
- 4. In the **Authentication** area, select one of the following:

OPTION	DESCRIPTION
Windows Authentication	Select this option to use Windows® credentials when connecting to your SQL Server®.
SQL Server Authentication	If your SQL Server® has been installed in SQL Server Authentication Mode, select this option and provide Username and Password .

5. In the **Database Name** field, type the name of the database you want to create in SQL Server.

3.1.21 Admin Credentials for GFI WebMonitor Services

When GFI WebMonitor is installed, the following Windows services are created:

- » GFI Proxy
- » GFI WebMonitor Core Service

An account with Administrative privileges is required by these Windows services to control internal security engines, manage updates, notifications and User Interface. These credentials are configured after installation using the Configuration Wizard.

IMPORTANT

We do not recommend updating the password as this change impacts GFI WebMonitor operations.

To manage the admin credentials from within the Configuration Wizard:

- 1. Go to Settings > Configuration Wizard.
- 2. Follow the wizard until you are presented with the Admin Credentials screen.
- 3. Use the provided fields to enter the server's Admin credentials. For example:
 - Admin Username: [domain name]\Administrator
 - Admin Password: [key in password]
- 4. Click Validate to have the enetered credentials validated by GFI WebMonitor.
- 5. Click **Next** and wait for GFI WebMonitor to restart the services.

The Configuration Wizard is launched automatically after installing GFI WebMonitor or manually from the **Settings** menu.

3.1.22 Updating Admin Credentials from services.msc

When GFI WebMonitor is installed, the following Windows services are created:

- » GFI Proxy
- » GFI WebMonitor Core Service

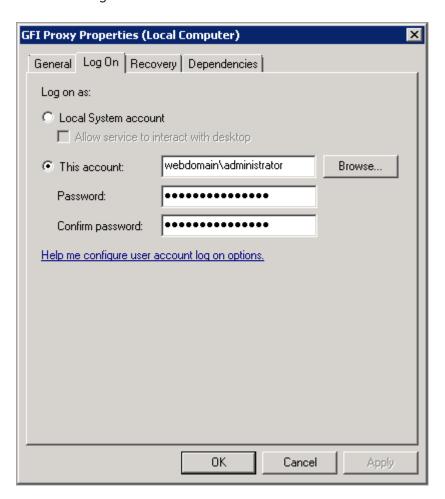
An account with Administrative privileges is required by these Windows services to control internal security engines, manage updates, notifications and User Interface. These credentials are configured after installation using the Configuration Wizard. For more information, refer to Using the Post-installation Configuration Wizard (page 16).

If you need to update the Admin Credentials after your GFI WebMonitor installation has been set up:

IMPORTANT

We do not recommend updating the password as this change impacts GFI WebMonitor operations.

- 1. On the GFI WebMonitor server, go to Start > Run and key in services.msc
- 2. Locate the GFI Proxy service, right-click and select Properties.
- 3. Go to the Log On tab and select This account.



4. Update the account name and the password.

The account must have local administrator rights, including Log on as service rights.

- 5. Restart the **GFI Proxy** service.
- 6. Repeat steps 2-5 for the GFI WebMonitor Core service.

3.1.23 Configuring Email distribution settings for notifications

When distribution settings are configured, GFI WebMonitor sends email messages containing information related to tasks such as auto-updates and licensing issues to specified email addresses.

NOTE

The Configuration Wizard is launched automatically after installing GFI WebMonitor or manually from the **Settings** menu.

To manage distribution settings:

- 1. Go to Settings > Advanced Settings > Notifications > Settings.
- 2. Change any of the following options:

OPTION	DESCRIPTION	
From Email	Specify the email address from which notifications are sent.	
SMTP Server	Enter the name or IP of the SMTP server.	
SMTP Port	Key in the port number of the SMTP server (Default 25).	
Authentication	If you are using a hosted email provider, enable Authentication and provide a Username and Password to connect to your hosted mail server and send notifications.	
Enable Secure Sockets Layer (SSL) If SSL is required to provide secure transmission between sender and recipients, check Enable Secure ets Layer (SSL) ets Layer (SSL) checkbox.		
Email Recipients	Enter recipient email address and click the plus sign to add. You can key in as many recipients as required.	
Verify Mail Settings	Click to send a test email and verify the mail server settings are configured correctly.	

3.1.24 Configuring SMTP Settings for webmail accounts

You can set up webmail accounts as the delivery mechanism for notifications in GFI WebMonitor. The following is a list of popular webmail providers with SMTP settings:

Provider	SMTP Server Details
Gmail	Email address from which notifications are sent. Example, example@gmail.com
	SMTP Server: smtp.gmail.com SMTP Port: 587 Authentication: Yes User Name: Your email address Password: Gmail password Enable SSL: Yes

Provider	SMTP Server Details
Yahoo!	Email address from which notifications are sent. Example, example@yahoo.com
	SMTP Server: smtp.mail.yahoo.com SMTP Port: 587 Authentication: Yes User Name: Your email address Password: Yahoo! ID password Enable SSL: Yes
Outlook	Email address from which notifications are sent. Example, example@outlook.com SMTP Server: smtp-mail.outlook.com SMTP Port: 587 Authentication: Yes User Name: Your email address Password: outlook.com password Enable SSL: Yes

3.2 Advanced Settings

After GFI WebMonitor is up and running, tweak your installation by configuring the following advanced options:

OPTION	DESCRIPTION
Licensing and sub- scription details	View information about the currently installed license. Renew or change your license.
Licensing Exclu- sion List	Set up a list of users that are always allowed access to the Internet without being monitored. Excluded users do not consume a license.
UI Access Control	Turn Windows Authentication on or off for users defined in the configured Authorization Rules. Add new Authorization Rules to grant limited access to users to different sections of GFI WebMonitor.
Configuring Activity Logging	Configure data retention settings to enable the recording of data related to user activity. Collected data is used by GFI WebMonitor for dashboards and reports. You can also enable/disable Anonymization; a feature that masks user names in compliance with some countries' data protection laws.
Configuring Anonymization	Anonymization enables masking private user data in accordance with European privacy and data protection laws.
Language settings	Change the language of warning messages sent to the user when GFI WebMonitor blocks user activity.
Configuring Secur- ity Engines	Configure various security technologies such as anti-virus and anti-phishing engines to protect your network.
WebGrade updates	Configure WebGrade updates to ensure that categorization and websites and applications monitored by GFI WebMonitor is always up to date.
System updates	Configure the frequency of GFI WebMonitor product updates.
Configuring search engine options	GFI WebMonitor can monitor user search queries to help identify potential risks, while also providing valuable insight into the mindset of your users.
Enable Caching	Caching transparently stores data so that future requests for that data are served faster. Caching helps bandwidth optimization.
Configuring Proxy settings on client Internet browsers	When WPAD is not enabled, client Internet browsers need to be configured to use GFI WebMonitor as the default proxy server. If this setting is not deployed, the client machines will by-pass GFI WebMonitor and the Internet traffic they generate will remain undetected.

See also:

Configuring Core settings

3.3 Licensing and subscription details

A valid license key is required by GFI WebMonitor to work. When the product is installed for the first time, the configuration wizard guides you to this area to enter the key you received when downloading the product. For more information, refer to <u>Licensing information</u> (page 5).

NOTE

The Configuration Wizard is launched automatically after installing GFI WebMonitor or manually from the **Settings** menu.

In GFI WebMonitor, users can be excluded from being counted against the license. For more information, refer to Configuring a Licensing Exclusion List (page 49).

The Licensing screen provides the following information:

OPTION	DESCRIPTION
Product Ver- sion	Shows the currently installed version of GFI WebMonitor and the build number.
License Key	For a new GFI WebMonitor installation, key in your license key in this field and click Update License . For an existing GFI WebMonitor deployment, this field displays the current license key.
	NOTE For users who wish to try out the product, an evaluation license key can be acquired from the GFI Software Ltd website. Click register to fill in the registration form and receive your evaluation key by email.
License Status	Defines the status of the current license, for example, whether the license key is active, expired, invalid or a trial license.
Subscription	Shows the date of expiry of the current license.
Licensed Seats	Displays the number of licensed users and how many are currently active on the network.

3.3.1 Updating the license

To update the current product license key:

- 1. Go to Settings > Advanced Settings > Licensing
- 2. Click **Update License** and enter license key.
- 3. Click Apply.

NOTE

To activate license key, an Internet connection must be available.

3.3.2 Configuring a Licensing Exclusion List

The Licensing Exclusion List is a feature that enables users specified in the list to be excluded from licensing. The users in the list are still allowed full access to the Internet, but they will not be counted for licensing purposes.

NOTE

The Licensing Exclusion List feature is not available when the Configuration Wizard runs for the first time. It becomes available after the initial setup has been completed.

To add users or IPs to the list:

- 1. Go to Settings > Advanced Settings > Licensing.
- 2. In the Licensing Exclusion List area select Users and enter a user name in the available field, or select IPs and key in the IP number.
- 3. Click the Add sign.
- 4. Click Save.

3.4 UI Access Control

The **UI Access Control** node enables you to:

OPTIONS	DESCRIPTION
Use Windows Authentication to configure how GFI WebMonitor authenticates users.	When Windows Authentication is enabled, users are required to enter their credentials in their browsers when accessing GFI WebMonitor UI. GFI WebMonitor Authentication uses Active Directory Users and Groups.
Add new Authorization Rules to grant users access to different sections of GFI WebMonitor.	Users, groups or IPs listed in the configured Authorization Rules will have access to limited views on the data so that, for example, Departmental Managers can access the Dashboards and Reports of members of their teams.

3.4.1 Configuring Windows Authentication

When **Windows Authentication** is enabled, GFI WebMonitor uses Active Directory or Windows Users and Groups to grant users access to the UI. Users are asked to enter their credentials when navigating within the GFI WebMonitor UI.

IMPORTANT

Users or groups specified in the Authorization Rules are allowed access only if their username is authenticated.

To turn Windows Authentication on or off:

- 1. Go to Settings > Advanced Settings > UI Access Control.
- 2. Click the Windows Authentication switch on or off.
- 3. Configure Authorization Rules to allow access to the GFI WebMonitor UI.

3.4.2 Add a New Authorization Rule

Configured **Authorization Rules** grant or deny access to users to different sections of GFI WebMonitor. Users, groups or IPs listed in the configured Authorization Rules will have access to limited views on the data so that, for example, Departmental Managers can access the Dashboards and Reports of members of their teams.

To add a new Authorization Rule:

- 1. Go to Settings > Advanced Settings > UI Access Control.
- 2. Click Add Rule.
- 3. Click **Ul Control** tab.
- 4. In the Name field, enter a name for the new rule.
- 5. In the **Apply Rule to** area, specify the **User**, **User Groups** or **IP Address**, to which the rule will apply. Repeat for all required users, groups and/or IPs.

IMPORTANT

Users or groups specified in the **Authorization Rules** are allowed access **only** if **Windows Authentication** is enabled and their username is authenticated. When **Windows Authentication** is disabled, use IP addresses instead. For more information, refer to Configuring Windows Authentication (page 50).

6. In the **Can View Data for** area, specify the **User**, **Group** or **IP Address**, to which the user specified in the previous step has access to. For example, John Smith, the Marketing Manager, has access to all users in the Marketing group. Repeat for all required users, groups and/or IPs.

7. Click **Access Rights** tab. **Allow** or **Block** the following:

OPTION	DESCRIPTION
View Dashboard	When enabled, user can view all GFI WebMonitor Dashboards.
View Reports When enabled, user can access the Reports tab and generate reports.	
Change Settings	When enabled, user is allowed to modify GFI WebMonitor settings.

8. Click Save.

9. New rules are displayed in the Configured Authorization Rules area. Use the Actions menu to perform additional action:

OPTION	DESCRIPTION
Edit	Click to enter into editing mode. Change settings as required.
Delete	Click to delete the configured rule.
View	View a summary of the configured rule.

3.5 Configuring Activity Logging

By default, all Internet traffic (excluding GFI WebMonitor updates) routed through GFI WebMonitor is logged for all licensed users. This data is required to populate dashboards and reports. GFI WebMonitor enables you to customize for how long this data is kept in the database.

To configure logging options:

- 1. Go to Settings > Advanced Settings > Activity Logging.
- 2. For optimization purposes, configure Data Retention using the following options:

OPTION	DESCRIPTION
Retain activity data for	Specify the length of time that all type of data collected by GFI WebMonitor is retained. Data is deleted after the specified period expires. To configure for how long to retain data, key in the number of days in this field. The default value is set to 365 days.
	NOTE Activity data affects database size. Store activity data for a shorter period of time to save space. Data older than the specified number of days will no longer be available in Dashboard. Reports defined for earlier periods will be empty.
Retain Event Log data for	Define for how long event log data is kept in the database. After the specified period expires, only Event Log data is deleted - other data collected by GFI WebMonitor is not affected by this option. We recommend setting a shorter retention period when Full URL logging is enabled.
	NOTE When Event Log data is deleted, information in the Event Log column in Bandwidth, Activity and Security dashboards will no longer be available. Some detailed reports are also affected.

3.6 Configuring Anonymization

Anonymization enables masking private user data in accordance with European privacy and data protection laws. If enabled, GFI WebMonitor:

- » Cloaks personal data so that user names and IPs can no longer be viewed from the **Dashboard** or **Monitoring** Reports
- » Enables a validation process requiring two passwords from two different users
- » Masks any features in the User Interface that provide access to private user information.

To enable Anonymization:

- 1. Go to Settings > Advanced Settings > Activity Logging.
- 2. Click the **Anonymize** switch to turn anonymization on.
- 3. Enter the passwords for Responsible Person 1 and Responsible Person 2

NOTE

To disable Anonymization, click the **Anonymize** switch to the off position and enter the required passwords.

3.7 Language settings

When GFI WebMonitor blocks user activity, a warning message is sent to the user, stating which policy was breached. The language of these warning messages can be configured from a pre-defined list.

To change the language of warning messages, select a language from the drop down list and click **Save**.

3.8 Configuring Security Engines

GFI WebMonitor uses various security technologies such as malware protection, anti-virus and anti-phishing engines to protect your network by scanning HTTP traffic. By default, all the security engines in GFI WebMonitor are enabled.

To turn off a security engine:

- 1. Go to Settings > Advanced Settings > Security & Updates > Security Engines.
- 2. In the **Security Engines** area, click the switch next to the engine to disable.
- 3. For each individual engine, configure the following:

OPTION	DESCRIPTION
Check and update every x hours	Configure the update frequency for individual engines by specifying the value in hours.
Update Now	Click to manually update individual engines.

4. [Optional] Configure the following options for all enabled security engines:

OPTION	DESCRIPTION
Send me an email when updates are successful	If an engine update fails, an email notification is sent to the domain administrator. For more information, refer to Admin Credentials for GFI WebMonitor Services (page 45).

Additional options are available for the Kaspersky engine. To perform additional configuration refer to the following section: Configuring Kaspersky.

3.8.1 Configuring Kaspersky

The **Kaspersky** anti-virus scanning engine enables you to state whether the actions specified in the **Virus Scanning Policies** should also be used when files are identified as:

OPTION	DESCRIPTION	
Suspicious	Files identified as suspicious.	
Corrupted	Files that cannot be scanned since the file format is corrupted, for example, corrupted CAB files.	
Hidden	Files that cannot be scanned since the contents are protected, for example, password protected ZIP files.	

To configure Kaspersky:

- 1. Go to Settings > Advanced Settings > Security & Updates > Security Engines.
- 2. Next to Kaspersky, click Settings.
- 3. Next to **Suspicious**, click **ON** to enable scanning of files considered to be suspicious.
- 4. Next to Corrupted, click ON to enable scanning of corrupted files.
- 5. Next to **Password Protected**, click **ON** to enable scanning of protected files.
- 6. Click Save.

3.9 Configuring WebGrade updates

The WebGrade engine ensure that categorization for websites and applications monitored by GFI WebMonitor is always up to date. These updates are enabled by default when GFI WebMonitor is installed.

To change update settings:

- 1. Go to Advanced Settings > Security & Updates > WebGrade.
- 2. Configure the following options:

OPTION	DESCRIPTION
Send me an email when updates are successful	If an engine update fails, an email notification is sent to the domain administrator. For more information, refer to <u>Admin Credentials for GFI WebMonitor Services</u> (page 45).
Enable real-time lookup for URLs not found in the local database	This setting is enabled by default to allow GFI WebMonitor to search online for URL categories not found in the local WebGrade database.
Check and update every x hours	Configure the update frequency for individual engines by specifying the value in hours.
Update Now	Click to send an update request.

3.10 Configuring system updates

System updates enable you to keep your GFI WebMonitor installation up to date with the latest updates. When enabled, GFI WebMonitor checks for new updates at specified intervals, downloads the updates, and installs them.

NOTE

During product updates the GFI WebMonitor services need to be stopped and restarted. This action causes the disruption of Internet connections going through GFI WebMonitor. Internet usage can resume once the services are restarted.

To configure system updates:

- 1. Go to Settings > Advanced Settings > Security & Updates > GFI WebMonitor Updates.
- 2. Configure the following:

OPTION	DESCRIPTION
Product Updates	Setting is enabled by default to keep GFI WebMonitor up to date with the latest updates. If disabled, GFI WebMonitor will still be active but the latest system updates are not downloaded.
Check and update weekly on <week day=""> at <time></time></week>	Configure the update frequency by specifying the day of the week and the time of day when GFI WebMonitor checks for updates.
Update Now	Click to manually check for system updates.
Send me an email when updates are successful	If an engine update fails, an email notification is sent to the domain administrator.

3.11 Configuring search engine options

GFI WebMonitor can monitor user search queries to help identify potential risks, while also providing valuable insight into the mindset of your users. The following search engine features are disabled by default when the product is installed:

OPTION	DESCRIPTION
Safe Search	 Safe Search is a feature supported by a number of search engines. If enabled, GFI WebMonitor enforces filtering of explicit email and images from user searches. Safe Search is compatible with the following search engines: Google Yahoo Bing
Search Terms Mon- itoring	Search Terms Monitoring is a feature that monitors and logs terms used during searches. If enabled, you will be able to monitor what your users are searching for in various search engines. Monitoring user searches helps identify potential high-risk issues as well as providing general mood indicators for your organization.

To exclude Users and IP addresses from Search Terms Monitoring:

- 1. Go to Settings > Advanced Settings > Search Engines.
- 2. Enable Search Terms Monitoring.
- 3. Insert the user name or IP address to exclude in the available field.
- 4. Click the **Add** icon.
- 5. Click Save.

3.12 Configuring Caching settings

If enabled, GFI WebMonitor caching transparently stores data so that future requests for that data are served faster. Caching helps bandwidth optimization. It is recommended that any website that is not required to be kept in GFI WebMonitor's cache, is added to the Cache exclusion list. For more information refer to: Adding Items to the Cache Exclusion List.

NOTE

GFI WebMonitor lets you specify the length of time to keep data from user requests in its local database. For more information, refer to <u>Configuring Activity Logging</u> (page 51).

To configure cache settings:

- 1. Go to Settings > Advanced Settings > Proxy Settings.
- 2. Click Caching.
- 3. Click the **Enable Caching** switch to turn on.
- 4. In the Caching Size Limit field, specify the amount of data to keep in cache in MB.

5.

In the **Cache Path** field, specify a location where to store temporary cached files. If no path is specified the settings cannot be saved.

NOTE

Ensure that the path exists and that the account under which GFI WebMonitor is running has sufficient privileges.

6. Click Save.

3.12.1 Adding Items to the Cache Exclusion list

When caching is enabled, content downloaded via HTTP is stored for future requests to the same resource, reducing bandwidth consumption.

IMPORTANT

Backup ProxyConfig.xml before making any changes.

To exclude sites from having their content cached, add them to the Cache exclusion list as follows:

- 1. Open ..\WebMonitor\Data\ProxyConfig.xml
- 2. Add the sites to exclude between the CacheWhiteList tag. For example:

```
<CacheWhiteList>
```

```
<string>1.1.1.1</string>
```

<string>1.1.1.1</string>

<string>your excluded domain.com</string>

- </CacheWhitelist>
- 3. Save file.

NOTE

Changes are applied as soon as the file is saved.

NOTE

The following wildcards are supported:

- » * substitutes any number of characters in the string.
- » ? substitutes a single character in the string.
- # substitutes a single digit in the string.

3.13 Configure Proxy settings on client Internet browsers

When WPAD or Transparent Proxy are not enabled, client Internet browsers need to be configured to use GFI WebMonitor as the default proxy server. If this setting is not deployed, the client machines will by-pass GFI WebMonitor

and the Internet traffic they generate will remain undetected.

Proxy settings can be configured manually, by carrying out the configuration on every machine on your network that is going to access the Internet, or through GPO (Group Policy Object), that lets you configure settings for a group of active directory users.

3.13.1 Using WPAD or Transparent Proxy

Both WPAD and Transparent Proxy offer administrators a convenient way to configure client machines to use the GFI WebMonitor machine as a proxy server without having to supply settings manually or via Active Directory Group Policies.

OPTION	DESCRIPTION
WPAD	The Web Proxy Auto Discovery (WPAD) is an Internet protocol supported by all major Internet browsers. It enables client web browsers to automatically retrieve proxy settings from a WPAD data file stored on a machine on your network. When this feature is enabled and the Internet browser connection settings are configured to Auto-detect proxy settings for this network , each client machine will automatically determine the IP address of the GFI WebMonitor server and use it as a proxy without further configuration. WPAD is particularly useful when you want to configure roaming devices such as laptops and tablets to use GFI WebMonitor as the proxy server when they are in the office.
Transparent Proxy	Transparent Proxy can work in parallel with the regular proxy. HTTP and HTTPS traffic originating from client machines that are not set to explicitly point to GFI WebMonitor (manually or through WPAD) is captured by the transparent proxy once this functionality is enabled. When a user makes a request to a web server, the Transparent Proxy intercepts the request to deliver the requested content. When GFI WebMonitor is deployed in this mode, you do not need to set client browser settings to point to a specific proxy.

3.13.2 Configuring GFI WebMonitor machine as the Default Proxy using GPO in Windows® Server 2003

To configure all client machines to use GFI WebMonitor as a proxy server through Windows® Server 2003 GPO:

- 1. On the Domain Controller, go to Start > Programs > Administrative Tools > Active Directory Users and Computers.
- 2. Under the domain node, right-click the organizational unit where you wish to apply the group policy and click **Properties**.

NOTE

To apply the group policy to all the computers on the domain, right-click on the domain node directly and click **Properties**.

- 3. In the **Domain Properties** dialog, select **Group Policy** tab.
- 4. Select **Default Domain Policy** from the list and click **Edit**.
- 5. Expand User Configuration > Windows Settings > Internet Explorer Maintenance > Connection and double-click Proxy Settings to open the Proxy Settings dialog.
- 6. Check Enable proxy settings checkbox.
- 7. Uncheck **Use the same proxy server for all addresses** checkbox.
- 8. In the HTTP and FTP text boxes key in the proxy server IP address and the port used (Default 8080).
- 9. Click **OK** to apply changes.
- 10. Close all open windows.

3.13.3 Configuring GFI WebMonitor machine as the Default Proxy using GPO in Windows® Server 2008

To configure the **Proxy Settings** on all client machines to use GFI WebMonitor as a proxy server through Windows Server 2008 GPO:

- 1. In command prompt, key in mmc.exe and press Enter.
- 2. In the Console Root window, Go to File > Add/Remove Snap-in... to open the Add or Remove Snap-ins window.
- 3. Select Group Policy Management from the Available snap-ins list, and click Add.
- 4. Click OK.
- 5. Expand **Group Policy Management > Forest > Domains** and **<domain>**, then select the organizational unit where you wish to apply the group policy.

NOTE

To apply the group policy to all domain computers, select the domain node directly.

- 6. Right-click Default Domain Policy and click Edit to open the Group Policy Management Editor.
- 7. Expand User Configuration > Policies > Windows Settings > Internet Explorer Maintenance > Connection and double-click Proxy Settings to open the Proxy Settings dialog.
- 8. Check Enable proxy settings checkbox.
- 9. Uncheck Use the same proxy server for all addresses checkbox.
- 10. In the HTTP and FTP text boxes key in the proxy server IP address and the port used (Default 8080).
- 11. Click **OK** to apply changes
- 12. Close **Proxy Settings** dialog.
- 13. Close Group Policy Management Editor dialog and save the management console.

IMPORTANT

When using Active Directory, the administrator can disable the Internet connection settings tab from the client machines. For more information, refer to Disabling Internet connection settings on client computers (page 18).

3.14 Configuring Internet Browsers to use a Proxy Server

If you have not configured WPAD, ensure that proxy settings of client machines are configured to use GFI WebMonitor as the default proxy. This ensures that Internet traffic is routed through GFI WebMonitor. You can manually configure each individual user machine to use GFI WebMonitor as the default proxy.

To configure a fixed proxy:

- 1. On the client machine, go to **Control Panel** and select **Internet Options**.
- 2. Click the **Connections** tab.
- 3. Click LAN settings.
- 4. Check Use a proxy server for your LAN checkbox.
- 5. In the Address field, key in the proxy server name or IP address of the GFI WebMonitor machine.
- 6. In the **Port** field enter the port used (default = 8080).

If WPAD is enabled in GFI WebMonitor, select **Auto-detect proxy settings for this network**. For more information, refer to <u>Configuring WPAD</u> (page 30).

To close the Configuration Wizard and start using GFI WebMonitor, check the **All the required clients are now routing** their Internet traffic through GFI WebMonitor checkbox and click See GFI WebMonitor in Action.

See also:

Configuring Proxy settings via GPO in Microsoft Server 2003

Configuring Proxy settings via GPO in Microsoft Server 2008

3.15 Configuring the GFI WebMonitor Agent

The GFI WebMonitor Agent is a small footprint version of GFI WebMonitor. It can be deployed on portable computers (as a service) to apply web filtering policies when the machine is disconnected from the corporate network (for example when the user is at home or traveling on business).

While the device is connected to the corporate network, the GFI WebMonitor Agent downloads Remote Filtering Policies locally. These are specific policies that can be set up to be applied when roaming. With this functionality, the IT Administrator can apply policies based on whether users are at the office or away. For example, Streaming Media can be allowed outside the internal network but Adult material is always denied.

Web activity logging is still performed when the user is outside the network, providing full reporting capabilities. The GFI WebMonitor Agent uploads the collected data to the server once the machine is connected to the corporate network.

NOTE

Anti-virus protection is not deployed with the GFI WebMonitor Agent. For a complete web security solution, we recommend an additional local antivirus agent besides the web filtering agent.

When roaming, Web filtering is done by the agent (on the local computer) and therefore there is no additional complexity of making any changes to your corporate network's infrastructure to enable remote filtering capabilities. For categorization and lookup purposes, the GFI WebMonitor Agent performs online lookups against the GFI WebGrade categorization service.

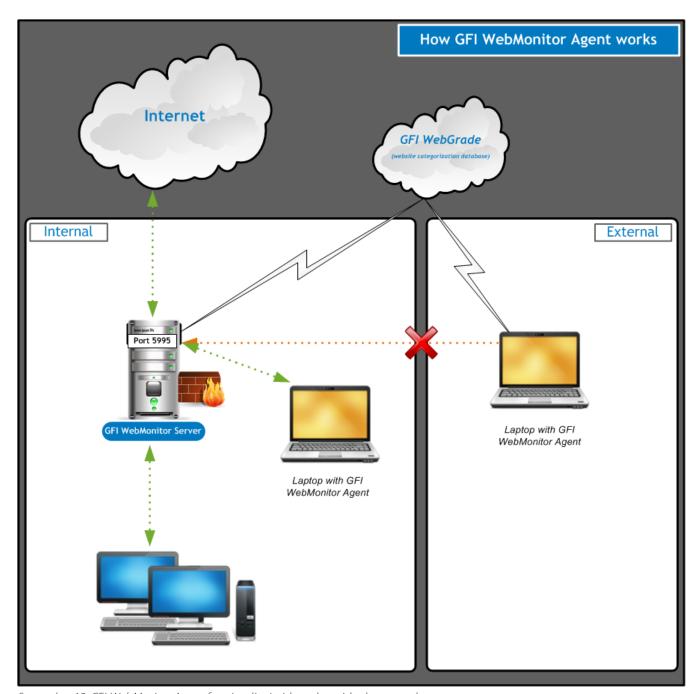
3.16 Downloading the GFI WebMonitor Agent

To download the GFI WebMonitor Agent:

- 1. In GFI WebMonitor, go to Manage > Agents.
- 2. Select one of the following download options:

OPTION	DESCRIPTION
Download (32- bit)	Select to install the agent on a 32-bit operating system. This downloads the following file: GFIWebMonitorAgent_x86.msi
Download (64- bit)	Select to install the agent on a 64-bit operating system. This downloads the following file: GFIWebMonitorAgent_x64.msi

3.17 How the GFI WebMonitor Agent works



Screenshot 12: GFI WebMonitor Agent functionality inside and outside the network

3.17.1 In internal mode:

When a laptop or other roaming machine (installed with the GFI WebMonitor Agent) is connected to the corporate network, Remote Filtering Policies are downloaded from the GFI WebMonitor server to the laptop. These policies are applied when the laptop is taken outside the network.

Web activity logging collected by the laptop while outside the network is uploaded to the GFI WebMonitor server. The GFI WebMonitor Agent disables itself after it completes the update processes.

IMPORTANT

Ensure port 5996 is not exposed outside the internal network

NOTE

Ensure that WPAD/Proxy settings are configured when the machine is on the Internal network, otherwise it will not connect to the GFI WebMonitor server.

3.17.2 In external mode:

When the laptop is taken outside the network, the GFI WebMonitor Agent activates automatically to filter and log Internet activity according to configured policies. For categorization and lookup purposes, GFI WebMonitor Agent performs online lookups against the GFI WebGrade categorization service.

NOTE

Anti-virus protection is not deployed with the GFI WebMonitor Agent. For a complete web security solution, we recommend an additional local antivirus agent besides the web filtering agent.

3.18 Installing the WebMonitor Agent Manually

To manually install GFI WebMonitor Agent:

- 1. Log on the client machine with Administrative rights.
- 2. Open GFI WebMonitor through a Web browser.

NOTE

To access GFI WebMonitor from a remote location, first grant remote access to the GFI WebMonitor server. For more information, refer to UI Access Control (page 50).

- 3. Click Manage > Agents.
- 4. Download the GFI WebMonitor Agent to a local folder.
- 5. Double click the downloaded file and follow the wizard to install.
- 6. Read the **End-User License Agreement** and click **I accept the terms in the License Agreement** to continue, then click **Next**.
- 7. In the **Server Information** window, provide the following settings:

OPTION	DESCRIPTION
Server Address	Enter the IP address of the GFI WebMonitor server to get the filtering settings and to send browsing reports.
Server Port	Enter the Port number used by the GFI WebMonitor Agent to communicate with the GFI WebMonitor server. Default is 5996.

IMPORTANT

Ensure port 5996 is not exposed outside the internal network

- 8. Click Next.
- 9. Select an installation folder were the GFI WebMonitor Agent will be installed, then click Next.
- 10. Click Install.
- 11. Click Finish.

3.19 Installing the GFI WebMonitor Agent via GPO in Windows Server 2008

You can deploy the GFI WebMonitor Agent as an MSI package using Group Policy Objects (GPO). This method assigns the agent on a per-user or a per-machine basis. If assigned per-user basis, it is installed when the user logs on. If assigned per-machine basis then the agent is installed for all users when the machine starts.

How the GFI WebMonitor Agent works

3.19.1 Step 1: Creating a distribution point

The first step in deploying the GFI WebMonitor Agent MSI through GPO is to create a distribution point on the publishing server, with a shared folder to contain the MSI package:

- 1. Download the GFI WebMonitor Agent. For more information, refer to <u>Downloading the GFI WebMonitor Agent</u> (page 58).
- 2. Log on to the server as a user with Administrative rights.
- 3. Create a shared network folder.
- 4. Set permissions on this folder in order to allow access to the distribution package.
- 5. Copy the downloaded GFI WebMonitor Agent MSI in the shared folder.

3.19.2 Step 2: Installing GFI WebMonitor Agent via GPO in Windows Server 2008

To distribute the GFI WebMonitor Agent MSI package through GPO as a Group Policy Object:

- 1. Go to command prompt, key in: mmc.exe and click Enter to launch the Microsoft Management Console.
- 2. Click File > Add/Remove Snap-in... and click Add...
- 3. Select Group Policy Management Editor snap-in and click Add.
- 4. Click Browse... and select the domain policy to edit.
- 5. Select the domain policy and click **OK**
- 6. Click **Finish** to close 'Select Group Policy Object' dialog. Click **Close** to close 'Add standalone Snap-in' dialog and click **OK** to close 'Add/Remove Snap-in' dialog; to return to the Microsoft Management Console.
- 7. Go to Console Root > <domain policy> > User Configuration > Policies, right-click Administrative Templates, and select Add/Remove Templates....
- 8. Click Add..., browse for the file GFIWebMonitorAgentSettings.adm located in: <Program Files\GFI\WebMonitor\Agent> and click Open.

NOTE

The license key value is not added to the registry when the .adm file is used. This value is taken from the server after the agent starts and communicates with the GFI WebMonitor server for the first time.

- 9. Click **Close** to return to the Microsoft Management Console.
- 10. Expand Console Root > <domain policy> > User Configuration > Policies > Administrative Templates > Classic Administrative Templates (ADM) > GFI Applications.
- 11. From the right pane, double click **GFI WebMonitor Server Location** policy and select **Enabled**. In the Server URL text box enter the URL where user machines can access GFI WebMonitor in the form http://<host-name>/<GFI WebMonitor virtual folder name>

When specifying the name of a machine in the domain, enter the machine name only, without the domain name. The IP address can also be used.

- 12. Click **OK** when all settings are configured.
- 13. Select Console Root > <domain policy> > Computer Configuration > Policies > Software Settings.
- 14. Right click **Software installation** and select **New > Package...**
- 15. In the **Open** dialog, locate the share where the MSI file is saved.

NOTE

When selecting the location of the msi file ensure that this is done through 'My network locations' so that the share name in GFI WebMonitor includes the full network share location rather than the local path.

- 16. Choose the deployment option select Assigned and OK
- 17. GFI WebMonitor Agent will be installed the **Next** time each client machine is started.

How the Agent works

3.19.3 Step 3: Verify Agent installation parameters

To verify the parameters have been set up:

- 1. On the server where GFI WebMonitor is installed, go to **Start > Run** and type **regedit** to open the **Registry Editor**.
- 2. Expand HKEY_LOCAL_MACHINE > SOFTWARE > GFI > WebMonitorAgent for 32 bit systems and HKEY_LOCAL_MACHINE > SOFTWARE > WebMonitorAgent for 64 bit systems
- 3. Check the following keys: LicenseKey, ServerAddress, ServerPort.

NOTE

The license key value is not added to the registry when the .adm file is used. This value is taken from the server after the agent starts and communicates with the GFI WebMonitor server for the first time.

How the Agent works

3.20 Installing the GFI WebMonitor Agent via GPO - Windows Server 2008 R2 / 2012

Group Policy software installation is a method that enables you to install applications automatically across your entire network.

3.20.1 Prepare the software to install

- 1. Open the following location on the GFI WebMonitor server: < Program Files \GFI \WebMonitor \Agent> and copy one of the following installation packages:
- » GFIWebMonitorAgent_x86 (Installer for Microsoft Windows 32-bit computers only)
- » GFIWebMonitorAgent_x64 (Installer for Microsoft Windows 64-bit computers only)

NOTE

Make sure that when deploying the 32-bit version of the GFI WebMonitor Agent, the domain policy used contains only computers running Microsoft Windows 32-bit version.

Similarly, ensure that when deploying GFI WebMonitor Agent 64-bit edition, the domain policy used contains only computers running Microsoft Windows 64-bit version.

- 2. Save the file to a shared folder on your network, accessible by all domains.
- 3. Locate the downloaded file. Take note of the folder path for later use.
- 4. Click Start > Administrative Tools > Group Policy Management.
- 5. Expand Forest > Domains > domain name. Right-click the domain name and select Create a GPO in this domain, and Link it here...
- 6. Enter a name for the new Group Policy Object (GPO). For example: GFI WebMonitor Agent. Click OK
- 7. Right-click the newly created Linked GPO and click Edit.
- 8. In the Group Policy Management Editor window, expand User Configuration > Policies > Software settings > Software Installation. Right click Software Installation > New > Package to configure the GPO to install on log in.
- 9. Enter the network path of the shared folder that contains the GFI WebMonitor Agent package. Click OK

NOTE

When selecting the location of the file ensure that this is done through 'My network locations' so that the share name includes the full network share location rather than the local path.

- 10. In the **Deploy Software** pop-up, select **Assigned** and click **OK**.
- 11. The new package is now added under **Software Installation**.

3.20.2 Configure the ADM file

Use an Administrative Template file (ADM) to set up and manage the required registry settings for the GFI WebMonitor Agent to communicate with GFI WebMonitor server.

To add an ADM template:

- 1. Click Start > Administrative Tools > Group Policy Management.
- 2. Expand Forest > Domains > domain name. Right-click GFI WebMonitor Agent and select Edit
- 3. In the Group Policy Management Editor window, expand User Configuration > Policies > Software settings > Software Installation.
- 4. Double-click the package to open the properties window.
- 5. In the Deployment tab, select Install this application at logon.
- 6. Click **Apply** and **OK** to close the window.
- 7. In the Group Policy Management window expand Forest > Domains > domain name > GFI WebMonitor Agent

- 8. In the Security Filtering Pane, click Add.
- 9. In Select User, Computer or Group add Domain Users and click OK.
- 10. In **Group Policy Management**, expand **Forest > Domains > Group Policy Objects**. Right click GFI WebMonitor Agent and click **Edit**.
- 11. In the **Group Policy Management Editor**, expand GFI WebMonitor Agent > **User Configuration** > **Policies** > **Administrative Templates**.
- 12. Right-click Administrative Templates and select Add/Remove Templates.
- 13. Click Add. Open the GFI WebMonitor installation folder (default path: < Program Files\GFI\WebMonitor\Agent>).
- 14. Locate GFIWebMonitorAgentSettingsTemplate.adm and click Open to add the template. Click Close.

3.20.3 Configure the GFI WebMonitor server location

- 1. In the Group Policy Management Editor, expand GFI WebMonitor Agent > Computer Configuration > Policies > Administrative Templates > Classic Administrative Templates (ADM) > Software > GFI > GFI WebMonitor Agent Policies.
- 2. In the right-hand pane, double click Specify the settings used by the GFI WebMonitor Agent to connect to GFI WebMonitor Server.
- 3. Select the **Enabled** radio-button.
- 4. In the Server URL field, type the GFI WebMonitor URL. Click Apply and OK to close the window.
- 5. The set up should now be complete. GFI WebMonitor Agent will be installed the **Next** time each client machine is started.

How the Agent works

3.21 Configuring Remote Policies

Remote Policies control Web activity on roaming devices, offering the same level of web filtering protection to users who take their devices with them outside the office. New or updated Remote Policies are downloaded from the GFI WebMonitor server when the device is connected to the corporate network.

A default policy is automatically created when GFI WebMonitor is installed. This policy is configured to **Allow** all Internet traffic to **Everyone**. You can change the policy type to **Block**, but you cannot delete or disable this default policy. New policies are added on top of the default policy to provide monitoring and filtering options as required.

To add a new policy:

- 1. Go to Manage > Remote Polices
- 2. Click Add Policy.
- 3. In the Add Policy Name field, type a policy name.
- 4. Drag policy elements from the left sidebar to the main policy screen. Available elements include:

ELEMENT	DESCRIPTION
Policy Type	Select the action taken by GFI WebMonitor when filtering internet traffic. Available options are: Allow, Block or Warn.
Users or Groups	Specify Users or Groups for whom the new policy applies.
Websites	Specify for which websites the policy applies. You can define specific website categories or input the URLs or IPs of websites to include in the policy.

ELEMENT	DESCRIPTION
Exceptions	Define users, groups or websites that are to be excluded from the policy.
Schedule	Select the time-window during which the policy is active.
Logging	The logging feature is enabled by default and cannot be disabled for Remote Policies. This feature is used to keep track of URLs visited by users.

5. Click Save.

3.22 Edit existing Remote Policies

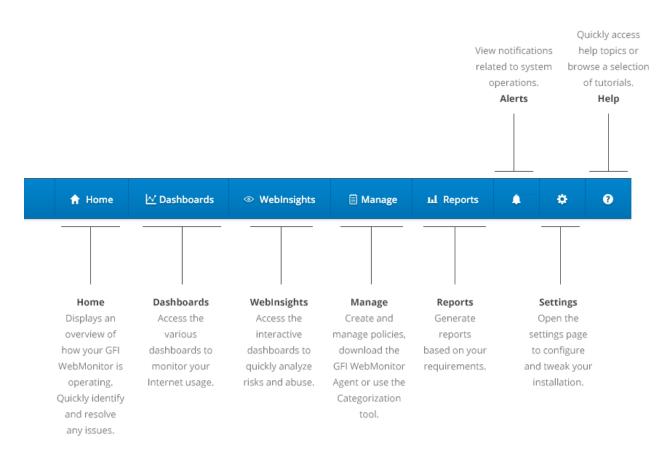
Remote Policies control Web activity on roaming devices, offering the same level of web filtering protection to users who take their devices with them outside the office. New or updated Remote Policies are downloaded from the GFI WebMonitor server when the device is connected to the corporate network.

To edit an existing policy:

- 1. Go to Manage > Remote Polices
- 2. Click **Edit**.
- 3. Make the required changes. For more information, refer to Configuring Remote Policies (page 64).
- 4. Click Save.

4 Using GFI WebMonitor

After the initial configuration is complete, the home page is displayed. Use the main navigation bar to access all the product features.



Screenshot 13: The product toolbar

4.1 Working with Policies

Policies enable you to exercise control over Internet activity that can effect security, productivity, performance and legal issues.

You can create as many new policies as required, either by configuring each new policy from scratch or by cloning existing policies. Configured policies are displayed as a list in the left sidebar. Click the switch next to configured policies to activate or deactivate as required.

IMPORTANT

GFI WebMonitor policies work in a hierarchical order. The policies at the top take precedence over the ones beneath. It is possible to change the order of the configured policies by dragging a policy to the desired place in the list, however this may have repercussions on your setup.

A default policy is automatically created when GFI WebMonitor is installed. This is the fallback policy – if no policies are matched for a given situation, the default policy will apply.

This policy is configured to **Allow** all Internet traffic to **Everyone**. You can change the policy type to **Block**, but you cannot delete or disable this default policy. New policies are added on top of the default policy to provide monitoring and filtering options as required.

2 additional policies are also enabled by default when GFI WebMonitor is installed:

POLICY	DESCRIPTION
Blacklist	The Blacklist is a list of sites, users and IP addresses that are always blocked by GFI WebMonitor.
Whitelist	The Whitelist is a list of sites, users and IP addresses that are automatically excluded from all filtering policies configured in GFI WebMonitor.

The default policies:

- » Apply to everyone
- » Can be edited customization of default policy is limited
- Cannot be disabled or deleted

For each configured policy, GFI WebMonitor provides a summary of the configured values. These values include:

OPTION	DESCRIPTION
Policy Type	There are 2 types of policies, Default Policy or Custom Policy .
Policy Action	Displays the action the policy will take when the configured criteria are met. The action can be Allow, Block, Warn or Monitor.
Status	Shows if the selected policy is Active or Inactive .
Active Since	If the policy status is Active , the summary displays the date since the policy has been active.
Applies To	Displays the number of users, groups or IPs the selected policy applies to.
Allow, Warn, Monitor or Block	This area shows how many websites, applications or file types are affected by the configured policy action.
Thresholds	Displays configured limits based on bandwidth, hits or time.
Notify	Shows any configured notifications. Can be User, Administrator or both.
Scheduled on	Displays the period during which the selected policy is active.
Exceptions	Displays configured exceptions that are not affected by the policy.

4.2 Configuring Blacklist

The **Blacklist** list is a list of sites, users and IP addresses that should always be blocked. The **Blacklist** takes priority over all other policies. The **Blacklist** cannot be switched off, however when GFI WebMonitor is first installed, the **Blacklist** policy is inactive. This is because by default, the GFI WebMonitor **Blacklist** does not contain any pre-configured websites.

IMPORTANT

In GFI WebMonitor, the **Blacklist** takes priority over the **Whitelist**. Therefore, if a site is listed both in the **Whitelist** and in the **Blacklist**, access to the site is blocked.

We recommend adding potentially unsafe sites to the **Blacklist** so that these are always blocked. These sites should include websites known for their malicious content or illegal material such as malware sites, bot nets and fraudulent websites.

NOTE

The Blacklist functions using an OR method. Any item added to the list will be blocked.

4.2.1 Adding Items to the Blacklist

By default, the GFI WebMonitor Blacklist does not contain any pre-configured websites. We recommend adding potentially unsafe sites to the Blacklist so that these are always blocked. These sites should include websites known for their malicious content or illegal material such as malware sites, bot nets and fraudulent websites.

NOTE

The **Blacklist** functions using an OR method. Any item added to the list will be blocked.

To add an item to the Blacklist:

- 1. Go to Manage > Policies > Blacklist.
- 2. Click Edit.
- 3. Drag the Websites element into the policy builder.
- 4. Insert the URL or IP of the website you want to block and click the add symbol.
- 5. Drag any other elements from the left sidebar that you want to include.

NOTE

Customization of system policies is limited to ensure that the intended policy function is not altered. In these policies, customization is limited to: Users, Groups or IPs, Websites filtering, notifications and logging.

6. Click Save.

Removing items from the Blacklist

To delete an item from the Blacklist:

- 1. Go to Manage > Policies > Blacklist.
- 2. Click Edit.
- 3. Locate the relevant element and click the icon next to the item to delete.
- 4. Click Save.

4.3 Configuring the Whitelist

The **Whitelist** is a list of sites, users and IP addresses that are automatically excluded from all filtering policies configured in GFI WebMonitor. When GFI WebMonitor is installed, the **Whitelist** is populated with a list of sites that are needed by GFI WebMonitor for system updates. Removing these sites from the **Whitelist** is not recommended.

NOTE

If the items in the **Whitelist** are also added to the **Blacklist**, priority is granted to the **Blacklist** and access is blocked. GFI Software Ltd sites and Microsoft sites are automatically whitelisted in a separate internal whitelist. This is required to enable automatic updates to both GFI WebMonitor and Microsoft products.

Using the whitelist, you can configure a list of users or IP addresses that do not need to be monitored or protected. These users still consume a product license. For more information, refer to Licensing information (page 5).

4.3.1 Adding items to the Whitelist

By default, GFI WebMonitor includes a number of pre-configured sites in the **Whitelist**. Additional items may be included in the Whitelist to ensure they are always allowed access.

NOTE

The Whitelist functions using an OR method. Any item added to the list will be allowed.

To add an item to the Whitelist:

- 1. Go to Manage > Policies > Whitelist.
- 2. Click Edit.
- 3

In the Websites element, insert the URL or IP of the website you want to allow and click the add symbol.

4. Use the left menu to drag any elements you want to include.

NOTE

Customization of system policies is limited to ensure that the intended policy function is not altered. In these policies, customization is limited to: Users, Groups or IPs, Websites filtering, notifications and logging.

5. Click Save.

4.3.2 Removing items from the Whitelist

To delete an item from the Whitelist:

- 1. Go to Manage > Policies > Whitelist.
- 2. Click Edit.
- 3. Locate the relevant element and click the icon next to the item to delete.
- 4. Click Save.

4.4 Adding a new policy

GFI WebMonitor uses different elements that can be configured individually to create a policy.

NOTE

Policies use an AND method, where for the policy to function all the conditions of the configured elements in the policy must be satisfied.

To add a new policy:

- 1. Go to Manage > Policies.
- 2. Click Add Policy.
- 3. In Add policy name field key in a title for that policy.
- 4. Add a policy description.
- 5. Some policy elements are already available in the main policy window. Drag additional elements from the list of elements on the left. Available elements are:

ELEMENT	DESCRIPTION
Policy Action: Allow, Block, Warn or Monitor	Select the action taken by GFI WebMonitor when filtering internet traffic. Available options are: Allow , Block , Warn or Monitor .
Users, Groups, IPs	Specify Users, Groups or IPs for whom the new policy applies.
Websites	Specify for which websites the policy applies. Select between All Websites or specific website categories.
Applications	Specify for which applications the policy applies. Select between All Applications, application categories or specific applications.
File Types	Specify for which file types the policy applies. Select between All file types, file type categories or specific file types.
Exceptions	Define users, groups, IP addresses, websites or applications that are to be excluded from the policy.
Bandwidth limit	Select the type of bandwidth limit applied to users.
Time limit	Define time limits during which users specified in the policy are allowed/denied to perform particular actions.
Schedule	Select the time-window during which the policy is active.
Schedule Expiry	Specify a deactivation date after which the policy will become inactive.
Breacher	Configure notifications sent to the users who infringe a policy. Provide the body text of the notification email in the available space.
Administrator	Configure notifications sent to System Administrators when a user infringes policy. Provide the body text of the notification email in the available space.
Log Alert	Automatically send alert notifications when the criteria in the configured policy are met.
Hits limit	Specify a limit type and the number of hits per period after which GFI WebMonitor will perform the action specified in the Policy Type element.
Logging	Enable advanced logging options that keep track of full URLs visited by users. This option is useful for investigative purposes.
	NOTE Full URL logging generates a large amount of data in the database. We recommend using this feature only for specific users (or domains) and only for a limited period of time.

6. Click Save.

4.4.1 Policy action; Allow, Block, Warn or Monitor

Select what action the policy should take when the configured policy parameters are met. The options are:

OPTION	DESCRIPTION
Allow	GFI WebMonitor allows the user to access the requested content. Subsequent policies are not applied.
Block	The content requested by the user is blocked. Subsequent policies are not applied. The user attempting to access a blocked website is notified that his request has been blocked. This notification contains a Request Access button that works in conjunction with the Log Alert element to alert the system administrator that a user is requesting temporary access to a blocked site. For more information, refer to Notification Center (page 93).
Warn	The user receives a notification that the requested content breaches a configured policy, but enables user to access the content. Subsequent policies are not applied.
Monitor	GFI WebMonitor allows access to requested content and moves to the next applicable policy.

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OPTION	DESCRIPTION
Enable users tem- porary access request	When enabled, a button called 'Request Access' is displayed in the blocking page, enabling users to request temporary access to certain pages.

4.4.2 Users, Groups, IPs

Specify Active Directory Users or Groups for whom the new policy applies. Select the following options:

OPTION	DESCRIPTION
Users	Key in user names in the available field and click the add icon.
Groups	Key in an Active Directory group name in the available field and click the add icon.
IPs	Key in an IP address in the available field and click the add icon.

4.4.3 Websites

Use the Websites element to specify for which websites the policy applies.

- 1. Drag the Websites element into the policy to edit.
- 2. Select from the following options:

OPTION	DESCRIPTION
Categories	Key in the website categories in the available field and click the add icon. To select multiple categories at the same time, click the menu icon next to the add sign, select the required categories and click Add To Policy .
URLs / IPs	Key in website URL or IP address in the available field and click the add icon. Multiple URLs or IP addresses can be included in the policy using the Import from file feature. Prepare a text (.txt) file with the URLs and IPs to import. Click Browse and select the file.
	NOTE When keying in a URL for a website you can use the wildcard character [*], for example: Type *.com to allow or block all '.com' top-level domains Type *.website.com to allow or block all sub-domains of 'website.com'
URL Scan- ning	When this feature is enabled, all accessed URLs are scanned by ThreatTrack and AntiPhishing engines. URLs identified as malicious, vulnerable, phishing or pointing to dangerous domains will be allowed/blocked/warned/monitored depending on the configured action with that policy.
Filter by Reputation	Move the slider to enable filtering by reputation. Reputation index can be set from 1 (Trustworthy) to 5 (High Risk).

4.4.4 Applications

Use the Applications element to specify for which applications the policy applies.

- 1. Drag the Applications element into the policy to edit.
- 2. Select from the following options:

OPTION	DESCRIPTION
Application Category	Key in the application category in the available field and click the add icon. To select multiple categories at the same time, click the menu icon next to the add sign, select the required categories and click Add To Policy .

OPTION	DESCRIPTION
Applications	Key in a specific application name in the available field and click the add icon. To select multiple applications at the same time, click the menu icon next to the add sign. Browse the list of application, use available filters or the search tool to locate required applications. Select the applications and click Add To Policy .

4.4.5 File Types

Specify for which file types the policy applies.

- 1. Drag the File Types element into the policy to edit.
- 2. Select from the following options:

OPTION	DESCRIPTION
File Type Categories	Key in the File Type category in the available field and click the add icon. To select multiple categories at the same time, click the menu icon next to the add sign, select the required categories and click Add To Policy .
File Types	Key in a specific file type in the available field and click the add icon. To select multiple file types at the same time, click the menu icon next to the add sign, select the required applications and click Add To Policy .
Custom File Types	Click Manage File Types to add new File Types not available by default. Specify the file type in the Content Type field, key in additional information in the Description field and click Add . To add the newly created Custom File Type to the policy, start typing in the Insert a Custom File Type field, select the File Type and click the Add icon.
AV Scan- ning	When enabled, GFI WebMonitor scans the downloaded file using the internal Anti-Virus engines. Click Configure Engines to select which AV engines to use.
Download Progress Window	Enable to show download progress information when users download file types configured in the policy.

4.4.6 Exceptions

Define users, groups, websites or applications that are to be excluded from the policy.

- 1. Drag the Exceptions element into the policy to edit.
- 2. Select from the following options:

OPTION	DESCRIPTION
Users	Key in user names in the available field and click the add icon.
User IP Addresses	Key in the IP address or a range of IP addresses of user machines to exclude from the policy.
Groups	Key in an Active Directory group name in the available field and click the add icon.
URLs / IPs	Key in an IP address in the available field and click the add icon.
Applications	Key in a specific application name in the available field and click the add icon. To select multiple applications at the same time, click the menu icon next to the add sign, select the required applications and click Add To Policy .

4.4.7 Bandwidth Limit

Select the type of bandwidth limit applied to users. Select from the following options:

OPTION	DESCRIPTION
Total Bandwidth	Select to set a limit according to specific value for combined download and upload bandwidth.

OPTION	DESCRIPTION
Download	Select to set a limit according to specific value for download bandwidth.
Upload	Select to set a limit according to specific value for upload bandwidth.
Size	Input a value in the available field and select KB, MB or GB from the drop down menu.
Period	Specify if the limit is set per hour, day, week or month.

4.4.8 Time Limit

Define time limits during which users specified in the policy are allowed/denied to perform particular actions.

OPTION	DESCRIPTION
Limit by	Key in a value to set a limit.
Time	Select if the limit value is in minutes or hours from the drop down menu.
Period	Specify if the limit is set per hour, day, week or month.

4.4.9 Breacher notifications

Use the **Breacher** element to enable notifications to send when a user infringes policy. Provide the body text of the notification email in the available space.

For example, you can trigger a notification in a policy that blocks Pornography. The message would say: 'Pornography is strictly prohibited.'

4.4.10 Administrator notifications

Use the **Administrators** element to send notifications when a user infringes a policy. Add the administrator's email address and provide the body text of the notification email. Some examples include:

- » Notifications when a specific threshold is exceeded. Thresholds can be related to number of sites accessed, blocked or the number of times a user bypassed warnings.
- » Notifications sent to administrators when a bandwidth limit is exceeded. Limits can be set on the total bandwidth (download + upload traffic) consumed during a designated period, on download traffic only or on upload traffic only.
- » Notifications when specific security issues arise. These include detection of cyber-attacks, virus detection, phishing campaigns and potential threats from malware.

4.4.11 Log Alert

Add the Log Alert element to any policy to automatically send alert notifications when the criteria in the configured policy are met. Sent alerts are visible from the Notification Center.

4.4.12 Hits alert

Specify the number of hits per period after which GFI WebMonitor sends a notification specified in the Breacher and/or Administrator elements.

OPTION	DESCRIPTION
The number of hits before a notification is triggered	Input a value in the available field.
Period	Specify if the limit is set per hour, day, week or month.

4.4.13 Schedule

Use the **Schedule** element to specify the time period during which the new policy is enforced.

- 1. In the **Applies from** and **to** fields, specify the time during which the policy will be active.
- 2. Select the days of the week.
- 3. Click Add.

4.4.14 Policy Expiry

Specify a deactivation date after which the policy will become inactive.

- 1. Click in the Automatically deactivate policy on field and select a date from the calendar.
- 2. Click in the at field to key in the time.

4.4.15 Logging

Click **Enable full URL Logging** to enable advanced logging options that keep track of full URLs visited by users. This option is useful for investigative purposes. When enabled, Dashboards and reports display the full address of visited sites.

NOTE

Full URL logging generates a large amount of data in the database. We recommend using this feature only for specific users (or domains) and only for a limited period of time. Additionally, use the Data Retention options to store activity logs for a shorter period of time to save database space. For more information, refer to Configuring Activity Logging (page 51).

4.4.16 How to use Default Policies

A default policy is automatically created when GFI WebMonitor is installed. This is the fallback policy – if no policies are matched for a given situation, the default policy will apply.

This policy is configured to **Allow** all Internet traffic to **Everyone**. You can change the policy type to **Block**, but you cannot delete or disable this default policy. New policies are added on top of the default policy to provide monitoring and filtering options as required.

2 additional policies are also enabled by default when GFI WebMonitor is installed:

POLICY	DESCRIPTION
Blacklist	The Blacklist is a list of sites, users and IP addresses that are always blocked by GFI WebMonitor.
Whitelist	The Whitelist is a list of sites, users and IP addresses that are automatically excluded from all filtering policies configured in GFI WebMonitor.

The default policies:

- » Apply to everyone
- » Can be edited customization of default policy is limited
- » Cannot be disabled or deleted

We recommend you use the blacklist policy to block only highly problematic websites, typically considered as high risk (for example, sites in the following categories: Adult and Pornography, Gambling, Malware sites, Phishing and Other Frauds, Proxy Avoidance and Anonymizers, SPAM URLs and Unconfirmed SPAM Sources).

4.4.17 How to create a new blocking policy

In addition to the pre-configured and default policies which are automatically installed, you can add more policies to refine your setup. The following steps guide you through the steps required to create a new policy that blocks social networks and other leisure browsing to most users during office hours, but allow it for top management, marketing and specific users.

To create a new policy:

- 1. Go to Manage > Policies.
- 2. Click Add Policy.
- 3. In the Policy Name field, enter Block social networks and leisure browsing.
- 4. In **Policy Description**, enter a description.
- 5. In the Block, Warn, Allow, Monitor element, select Block
- 6. From the left sidebar, add the **Websites** element to block categories such as: Auctions, Dating, Entertainment and Arts, Fashion and Beauty, Games, Hunting and Fishing, Internet Communications, Music, Recreation and Hobbies, Shopping, Social Network and any other categories which could cause productivity issues in your company. Remember also to block any Security and Legal Liability categories.

NOTE

The policy we are creating blocks all users. If you wish to excludes specific users add the **Users, Groups, IPs** element to the policy. Use the **Exceptions** element to configure any exclusions.

7. Add the **Schedule** element and define the policy to be active Monday to Friday, during working hours (for example 08:00 to 12:00, and 13:00 to 17:00). This means the policy will not apply during lunch break hours and after office hours.

8. Click Save.

4.4.18 How to create a streaming media policy

Bandwidth hogging can be a major concern in any organization. GFI WebMonitor can help you reduce the headaches associated with bandwidth intensive operations through appropriate blocking policies.

Streaming audio and video are bandwidth intensive. Coupled with the fact that this is not a temporary download, but can go on for extended periods of time, streaming media can quickly create bandwidth issues. Internet radio can easily be forgotten and you only require a few users to create a serious bottleneck. Websites in the News and Sports categories are also bandwidth intensive due to video streaming – and highly newsworthy events or sports events can create serious bandwidth issues.

For this purpose, we suggest you create a streaming media policy as described below:

- 1. Go to Manage > Policies.
- 2. Locate one of the existing blocking policies. Hold and drag to the middle of the UI and drop it over **Drag policies here** to clone.
- 3. In the **Policy Name** field, replace the existing name with **Block streaming media**.
- 4. In **Policy Description**, enter a description.
- 5. In the Block, Warn, Allow, Monitor element, select Block
- 6. From the left sidebar, add the **Websites** element and block categories such as: Music, Entertainment and Arts, News and Media, Image and Video Search and Streaming Media.
- 7. Add the **Applications** element and block the Streaming Media category.

The policy we are creating blocks all users. If you wish to excludes specific users add the **Users, Groups, IPs** element to the policy.

8. Click Save.

4.4.19 How to create a bandwidth threshold policy

GFI WebMonitor enables you to create bandwidth thresholds on a per user level. For example, you can create a policy that allows users to download from specific sites not more than 100 MB.

NOTE

You can add users to a group, and add the group in the **Users/Group/IP Element**. The limits will still be applied to each individual user in the group.

To limit bandwidth intensive sites to a specific download value:

- 1. Go to Manage > Policies.
- 2. Click Add Policy.
- 3. In the Policy Name field, enter Block by bandwidth limit.
- 4. In **Policy Description**, enter a description.
- 5. In the Block, Warn, Allow, Monitor element, select Block.
- 6. From the left sidebar, add the Users, Groups, IPs element to add specific users known to be "Bandwidth Hogs".
- 7. Add the **Websites** element and select the following categories: **Image and Video Search** and **Streaming Media**. These filters will apply to YouTube and similar sites.
- 8. Add also the **Bandwidth** element and configure it to limit by downloads of 100 MB per day.
- 9. Click Save.

4.4.20 How to create a time threshold policy

GFI WebMonitor enables you to create time thresholds on a per user level. For example, you can create a policy that allows users to browse specific sites for only 30 minutes a day.

Social Networking is a good candidate for creating blocking or limiting policies based on browsing time, since sites in this category often create serious productivity loss. Policies can be created that limit the amount of time spent on these websites.

To create a policy for Social Networking:

- 1. Go to Manage > Policies.
- 2. Click Add Policy.
- 3. In the Policy Name field, enter Block social networks by time limit.
- 4. In **Policy Description**, enter a description.
- 5. In the Block, Warn, Allow, Monitor element, select Block
- 6. From the left sidebar, add the Users, Groups, IPs element to add specific users known to be "Social Network" addicts.
- 7. Add the **Websites** element and add the **Social Network** category.
- 8. Add also the **Time** element and configure the limit to 30 minutes per day.

You can add users to a group, and add the group in the **Apply Policy To** field. The limits will still be applied to each individual user in the group.

9. Click Save.

4.4.21 Using a soft blocking policy

We all know that although web filtering is required, being too restrictive may cause resentment. It may also lead to people actually being stopped from doing productive work when some certain legitimate sites are blocked.

With soft-blocking you can advise a user that it is against the organization's policy to visit the site, and leave it up to the user to decide whether they really need to access this site or not. This allows you to empower your users rather than stifle them.

NOTE

To apply "soft-blocking" policies, use the **Block, Warn, Allow or Monitor** element in configured polices. Instead of "Block" use the "Warn" option.

4.5 Configuring Exceptions

To configure exceptions in GFI WebMonitor you can either use the **Blacklist** and **Whitelist** policies or use the **Exceptions** element in the policy builder, which can be added to any custom policy.

The **Blacklist** is a list of sites, users and IP addresses banned from performing any web activity. The **Blacklist** list takes priority over all policies.

The **Whitelist** is a list of sites, users and IP addresses automatically excluded from all filtering policies configured in GFI WebMonitor, allowing them to bypass filtering and scanning policies.

IMPORTANT

In GFI WebMonitor, the **Blacklist** takes priority over the **Whitelist** list. Therefore, if a site is listed in the **Blacklist** and that same site is listed in the **Whitelist**, access to the site is blocked.

The Exceptions element can be added to any custom policy to add exceptions per policy for:

- » Specific users
- » Groups of users
- Websites and IP addresses
- » Specific applications

4.6 Application control

Using the Applications element within the policy builder, you can exert control over applications used within your organization. This includes instant messaging apps, social networking, games, streaming apps and many more. If a policy is breached, GFI WebMonitor uses the configured policy to determine what action to take.

When GFI WebMonitor is installed, a number of pre-configured policies are automatically configured for your convenience. These include:

- » Block streaming media applications
- » Block P2P

- » Block free VPN and Tunneling applications
- » Block application access to Proxy and Anonymity networks

When GFI WebMonitor is installed, these policies are switched off and must be enabled.

For your trial these policies are typically sufficient, but if you wish to create a new policy or edit one of the existing policies, you can do this from: **Manage** > **Policies**.

4.7 Security scanning policies

One of the pre-configured polices that ship with GFI WebMonitor is pre-configured to block files that may contain malicious content. This policy is set to apply to every user on the domain and to scan all file types using the inbuilt BitDefender, VIPRE and Kaspersky engines. This policy is called **Security Scanning Policy with Download Window** and can be modified as required.

The parameter **Download Progress Window** in this policy ensures that a progress window is shown whenever a users tries to download a file.

TIP

If you don't want your users to see a download progress window, switch off this policy and enable **Security Scanning Policy without Download Window** instead.

To view or edit this policy go to **Manage > Policies**. You can customize the policy as necessary; however, the initial setup should suffice for the trial period.

4.8 Monitoring and filtering Internet browsing

Using the Websites elements, GFI WebMonitor gives you the facility to create policies aimed at monitoring and filtering user browsing., GFI WebMonitor determines what action to take, according to what you configured in that policy. This may be one of the following actions:

- » Allow, Block, Warn or Monitor Internet browsing
- Scan URLs for viruses and malicious content
- » Filter by reputation using inbuilt controls that apply filters based on a website's reputation
- » Notify specific users when certain URLs are requested
- » Limit limit browsing based on surf time or bandwidth limits

GFI WebMonitor ships with a number of pre-configured policies that are typically sufficient for the purposes of the trial. However, if you wish to create a new policy or edit one of the existing policies, you can do this from: **Manage** > **Policies**.

4.9 Editing an existing Policy

To edit an existing policy:

- 1. Go to Manage > Policies.
- 2. From the policy sidebar, select an existing policy.
- 3. Click **Edit** to enter in edit mode.

- 4. Change the required settings.
- 5. Click Save.

4.10 Cloning a Policy

Existing policies can be cloned to quickly create new polices which can then be edited as required.

To clone a policy:

- 1. Go to Manage > Policies
- 2. From the policy sidebar, select an existing policy.
- 3. Hold and drag the selected policy to the main window.
- 4. The cloned policy is added to the policy sidebar.
- 5. Select the cloned policy and click **Edit** to configure.
- 6. Click Save.

NOTE

Default policies cannot be cloned.

4.11 Enabling or disabling a configured policy

To enable or disable a policy:

- 1. Go to Manage > Policies.
- 2. Click the switch next to the desired policy to enable or disable.

4.11.1 Deleting a policy

To delete a policy click on the policy you want to delete, hold and drag into the recycle bin icon.

4.12 Using the Dashboards

The GFI WebMonitor Dashboards provide quick insight to activity on your network. Use the following monitoring tools to identify potential problems:

OPTION	DESCRIPTION
Overview (Home)	Provides a quick glance of current activity on the network, enabling you to identify network usage trends and tasks that need to be carried out by the administrator.
Bandwidth	Shows activity related to bandwidth consumption. Use the provided filters to spot downloads or uploads that are affecting your network performance.
Activity	Gives you insight on different types of activity during specific times of the day.
Security	Displays activity related to security issues such as detection of infected files, malicious and phishing sites, as well as information related to the most common viruses attacking your network.
Real-Time Traffic	Shows network traffic in real-time.
Quotas	The Quotas dashboard lists active Web Browsing Quota Polices and their respective status.
Agents	The Agents dashboard provides information related to the status of configured Agents.

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If Anonymization is enabled, personal data (such as User Names and IPs) is masked. For more information, refer to Configuring Anonymization (page 52).

4.13 Overview of Internet Activity

On launching GFI WebMonitor, the home page is displayed by default. You can return to the home page anytime by clicking **Home** in the main navigation bar.

The page contains information about Internet usage trends, such as:

- » The bandwidth trends for the current day
- » Web Security issues identified by GFI WebMonitor
- » Top Web Categories displayed either by bandwidth consumed or by number of users
- » Top Web Applications displayed either by bandwidth consumed or by number of users
- » Top users consuming the most bandwidth.
- » Information related to current web sessions

4.13.1 Product Status



Screenshot 14: Product status widgets

Use the **Status widgets** at the bottom of the page to verify details related to:

STATUS	DESCRIPTION
Notifications	A list of critical items is displayed in the home page for the attention of the System Administrator. Links are provided to the item that requires attention. Click Manage notifications to view the Notification Center.
Active Polices	Check how many policies are active and use the Manage policies shortcut to manage configured polices or create new policies. For more information, refer to <u>Working with Policies</u> (page 66).
Bandwidth consumption	Displays the average bandwidth consumption for the current day. Click More Bandwidth Insights to be redirected to the Bandwidth Insights page. For more information, refer to <u>Bandwidth Insights</u> (page 90).
Licensing	Click on the drop down list next to Bandwidth Consumption and select Licensing to display the number of active users being monitored. Click Update license to view the current license or enter a new key. For more information on how GFI WebMonitor counts users for licensing purposes, refer to Knowledge Base article: http://go.gfi.com/?pageid=WebMon_Licensing.

4.14 Monitoring Bandwidth

The Bandwidth dashboard provides information related to traffic and user activity that affects bandwidth consumption. To access the dashboard, click **Dashboards > Bandwidth**.

A report summary at the top provides the following information:

- » Download
- » Projected Download
- » Upload
- » Projected Upload
- » Peak Day

Filter Dashboard data according to the following:

OPTION	DESCRIPTION
All Bandwidth	Shows download and upload traffic.
Websites	Select to display bandwidth consumed by websites only.
Applications	Select to display bandwidth consumed by applications only.
Download	Click Download underneath the graph to display only downloaded traffic.
Upload	Click Upload underneath the graph to display only uploaded traffic.
Period	Use the controls to switch between Hour, Day, Week or Month.
View by:	Use the filter in the top right corner of the page to view data for a specific date range.

The lower portion of the Bandwidth page provides a breakdown of the data monitored in the specified period.

Data is broken down as follows:

FILTER	DESCRIPTION
Categories	Select to view a list of categories and bandwidth consumption for each category.
Websites/Applications	A list of websites and applications with information related to bandwidth consumption.
Users	A list of users and bandwidth consumption information for a specified period.
Event Log	A log of all the web requests for a single day, displaying: Website/Application Name Time - date and time of request User - User name IP - IP address Machine Name - the name of the machine from which the request originated.

4.14.1 One-click Report Functionality

After you customize the dashboard, the view can be exported as a report or scheduled to be sent automatically as required.

Export Report

To export the report:

- 1. From the top of the Dashboard, click **Actions** and select **Export Report**.
- 2. GFI WebMonitor displays the exported report in a separate window in your browser.
- 3. Click **Save** and select one of the following options:

OPTION	DESCRIPTION
Excel	The report is exported in Microsoft Excel format (.xls)
PDF	The report is exported in PDF format.
Word	The report is exported in Microsoft Word format (.doc)

Schedule Report

To schedule the report:

- 1. From the top of the Dashboard, click **Actions** and select **Schedule Report**.
- 2. GFI WebMonitor redirects you automatically to the **Reports** area.
- 3. Edit the report as required.
- 4. Save the report.

For more information refer to Reporting.

IMPORTANT

If Anonymization is enabled, personal data (such as User Names and IPs) will be masked. For more information, refer to Configuring Anonymization (page 52).

4.15 Monitoring Security

The Security dashboard provides information related to web requests and user activity for a specified period. The information provided enables you to identify security risks and threats to your network environment at a glance.

To access the dashboard, click **Dashboard > Security**.

A report summary at the top provides the following information:

- » Breaches
- » Warns
- » Top Filtered Category
- » Top AV Activity
- » Top Blocked Website/Application

Filter available data to provide information related to:

OPTION	DESCRIPTION
All Security	Shows all activity made through GFI WebMonitor in the specified period.
Websites	Displays only security issues related to websites.
Applications	Displays only security issues related to application usage.
Period	Use the controls to switch between Hour, Day, Week or Month.
View by:	Use the filter in the top right corner of the page to view data for a specific date range.

NOTE

Use the View by: filter in the top right corner of the page to view data for a specific date range.

The lower portion of the **Security** page provides a breakdown of the data monitored in the specified period. Click the available tabs to view information filtered by the following categories:

FILTER	DESCRIPTION
Policies	Affected policies are listed in this tab, together with the total number of Breaches and the name of the users who made the request.

FILTER	DESCRIPTION
Policy Action	The type of action taken by GFI WebMonitor. Can be Blocked or Warned.
Categories	Select to view a list of categories with total number of Breaches for each category.
Websites/Applications	A list of websites or Applications with respective total number of Breaches . Data can be viewed by Domain or by Site using the provided controls.
Viruses	A list of detected viruses, with the total number of Breaches .
Users	A list of users and the total Breaches for a specified period, broken down under the following headings: Infected and Malicious .
Event Log	Provides a log of all the web requests that fall within the specified period, displaying: Websites / Application Name - URL of request Time - date and time of request Machine Name - the name of the machine from which the request originated. User - User name IP - IP address Policy Action - The type of action taken by GFI WebMonitor. Can be Blocked or Warned.

4.15.1 One-click Report Functionality

After you customize the dashboard, the view can be exported as a report or scheduled to be sent automatically as required.

Export Report

To export the report:

- 1. From the top of the Dashboard, click **Actions** and select **Export Report**.
- 2. GFI WebMonitor displays the exported report in a separate window in your browser.
- 3. Click **Save** and select one of the following options:

OPTION	DESCRIPTION
Excel	The report is exported in Microsoft Excel format (xls)
PDF	The report is exported in PDF format.
Word	The report is exported in Microsoft Word format (.doc)

Schedule Report

To schedule the report:

- 1. From the top of the Dashboard, click **Actions** and select **Schedule Report**.
- 2. GFI WebMonitor redirects you automatically to the Reports area.
- 3. Edit the report as required.
- 4. Save the report.

For more information refer to Reporting.

IMPORTANT

If Anonymization is enabled, personal data (such as User Names and IPs) will be masked. For more information, refer to <u>Configuring Anonymization</u> (page 52).

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4.16 Monitoring Real-Time Traffic

The Real-Time Traffic dashboard enables you to monitor Internet usage in real-time. Monitor current active connections and terminate them if necessary (for example, streaming media or large unauthorized downloads), and view most recent connections. Real-time graphs of bandwidth and activity give you visual indicators of the current situation.

IMPORTANT

If Anonymization is enabled, personal data (such as User Names and IPs) will be masked. For more information, refer to Configuring Anonymization (page 52).

To access the Real-Time Traffic dashboard:

- 1. Go to Dashboards > Real-Time Traffic.
- 2. Click one of the following tabs:

OPTION	DESCRIPTION
Active Con- nections	Provides information related to current active connections. Active connections can be terminated to free up bandwidth. For more information, refer to Terminating active connections (page 84). Additional filtering is available by: **Categories* - Select to view a list of categories with total Web Requests and Bandwidth consumption for each category. **Websites* - A list of websites with respective total Web Requests and Bandwidth consumption per site. Data can be viewed by Domain or by Site using the provided controls. **Users* - A list of users with total Web Requests and Bandwidth consumption per user.
Bandwidth	A graph displays the current bandwidth consumption in KB/sec. Additional information includes: » IP (User) » Url » Status » Downloaded » Uploaded
Activity	Displays the number of current web requests >> IP (User) >> Url >> Status >> Downloaded >> Uploaded

NOTE

For **Bandwidth** and **Activity** real-time traffic graph, set the **Auto refresh interval** at the top right corner of the page. Default is set to 3.

4.16.1 Terminating active connections

GFI WebMonitor enables you to terminate any active connections for bandwidth optimization. This action can be performed from the Real-Time Dashboard.

To terminate a connection:

- 1. Go to Dashboards > Real-Time Traffic.
- 2. Select Active Connections view.
- 3. Click the refresh button to display a list of currently active connections.

- 4. Select the connections you want to terminate and click **Terminate**.
- 5. Click Confirm.

4.17 Using the Quotas Dashboard

The Quotas dashboard lists active Polices based on web browsing quotas and their respective status. If a quota is exceeded, the administrator can review the listed items and decide on what action to take. If the policy is not reset, browsing is blocked and a message displayed in the user's browser stating the reason why the browsing was blocked and the name of the policy.

The Quotas Dashboard provides the following information:

OPTION	DESCRIPTION
User/IP	Displays the user name or IP address being blocked. If Anonymization is enabled, the data shown is generic, for example, User 0, User 1. For more information, refer to <u>Configuring Anonymization</u> (page 52).
Policy Name	The name of the active policy. Click policy name to access settings page and edit the policy.
Limit Type	Limit type can be by Bandwidth or by Time.
Limit	Displays the amount of Bandwidth or Time allocated in the respective Policy.
Current Threshold	Shows the current threshold for the configured policy. Click to sort by the current threshold.
Usage	Lists the amount remaining for each Web Browsing Quota Policy and a bar that fills up according to usage. Statistics are displayed when the mouse is hovered over the bar and contains the following: » Limited per » Policy Priority

An additional filter lets you view data by the following criteria:

OPTION	DESCRIPTION
Users (Default)	Lists Users or IP Addresses with a filter to search for entries of a particular user.
Limit Type	Click to filter data by the Limit Types. Drill down further by clicking on the types.

To reset an item from the Quotas list:

- 1. Go to Dashboards > Quotas.
- 2. Locate the item to reset, and select the check box next to it. You can also select multiple items.
- 3. To reset an exceeded policy perform one of the following actions:

OPTION	DESCRIPTION
Reset	Click to reset selected items in the list.
Reset All	Click to reset all items in the list.

4. From the Reset Web Browsing Quota For User window, click Confirm.

4.18 Monitoring Agents

The Agents dashboard provides information related to the status of configured GFI WebMonitor Agents. The GFI WebMonitor Agent can be deployed on portable computers to apply web filtering policies when the machine is disconnected from the corporate network (for example when the user is at home or traveling on business).

The information provided by the Agents Dashboard enables you to quickly identify when remote users last synchronized with your GFI WebMonitor server .

Data is filtered to provide information related to:

OPTION	DESCRIPTION
Host Name	Machine name where the GFI WebMonitor Agent is installed.
IP	Displays the detected GFI WebMonitor Agent by IP address.
Last Request	Lists the date and time of the last communication between the GFI WebMonitor Agent and the GFI WebMonitor server.
Agent Ver- sion	Displays the version number of the detected GFI WebMonitor Agent. An icon shows if the Agent is up to date or not.

An additional filter at the bottom of the dashboard lists Agent versions. This information is useful to identify outdated Agents.

Removing Agents from the Dashboard

Agents can be removed from the dashboard when, for example, they are no longer active. This action does not remove any information generated by the selected Agent/s or uninstall the WebMonitor Agent/s from the client machine.

To remove an Agent from the list:

- 1. Go to Dashboards > Agents
- 2. Select the checkbox next to the Agent you want to remove.
- 3. Click Delete.

4.18.1 Using Web Category Lookup

When GFI WebMonitor is installed, a database with a limited amount of categorized web sites is installed. GFI WebMonitor updates this local database on activation.

Web categorization is a feature that connects to the Internet to look up URLs not found in the local database. For more information on website categorization refer to the following whitepaper: How Web Reputation increases your online protection.

The Web Categorization page also provides a lookup area where you can check a category for a specific URL.

To look up a URL:

- 1. Go to Manage > Tools.
- 2. Enter a URL in the **Lookup website** field.
- 3. Click Check Category.
- 4. If you think the website is wrongly categorized, click **Send URL Feedback to GFI** to report the problem.

5.

Click Add in the results box and perform one of the following actions:

Action	Description
Add to existing policy	Click to open the policy wizard and add the selected URL to an existing policy.
Create new policy	Click to open the policy wizard and add the selected URL to a new policy.
Create new remote policy	Click to open the policy wizard and add the selected URL to a new remote policy.

4.19 Using WebInsights

WebInsights is an interactive facility within GFI WebMonitor that uses real-time and historical records to deliver information related to Internet usage and trends. Using an internal behavior analysis engine, GFI WebMonitor establishes a baseline based on your historical Internet usage data.

The Weblnsights dashboards compare real-time data to this baseline, enabling you to gain a quick insight on Web resource use, or misuse, while also identifying threats to your network.

IMPORTANT

The Weblnsights dashboards are available in GFI WebMonitor 2015 SR2 edition and later.

The available dashboards are:

DASHBOARD	DESCRIPTION
Bandwidth Insights	The Bandwidth Insights dashboard provides information related to traffic and user activity that affects bandwidth consumption.
Security Insights	The Security Insights dashboard provides information related to web requests and user activity for a specified period. The information provided enables you to identify security risks and threats to your network environment at a glance.
Productivity Insights	The Productivity Insights dashboard provides information related to web requests and user activity for a specified period. The information helps you identify unproductive users at a glance.

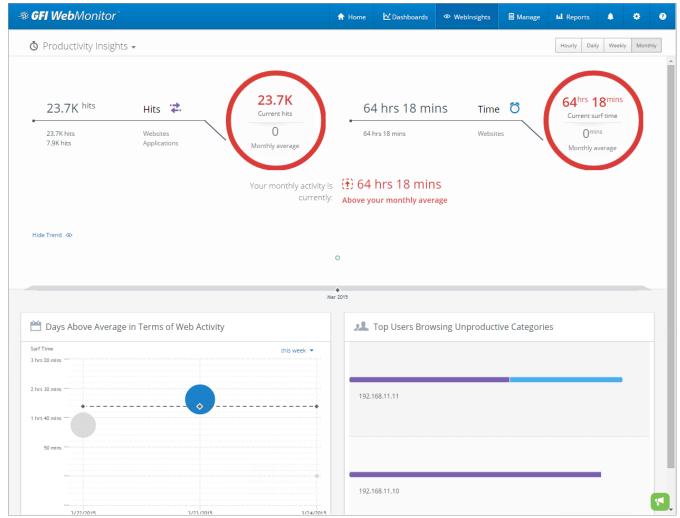
NOTE

When GFI WebMonitor is installed for the first time, the WebInsights dashboards do not display any data. Please wait for a minimum of 1 hour until GFI WebMonitor gathers enough information to start populating the dashboards.

4.20 Productivity Insights

The Productivity Insights dashboard provides information related to web requests and user activity for a specified period. The information helps you quantify your losses in terms of productivity and identify potential unproductive users, enabling you to take adequate action.

To access the dashboard, click Weblnsights > Productivity.



Screenshot 15: Productivity Insights dashboard

Use the View by: filter in the top right corner of the page to view data for a specific date range.

A summary at the top provides the following information:

- » Number of hits on websites and applications in the Productivity Loss category.
- » Time spent on websites and applications in the Productivity Loss category.
- » An estimate of productivity loss compared to the average for the same period.
- » Trend this graph shows the peaks and lows of productivity loss compared to the average for the same period. Move the cursor over the graph to display the projected loss on the selected period.

The lower portion of the WebInsights Productivity dashboard is composed of two widgets:

- » The Days Above Average in Terms of Web Activity widget compares current productivity loss with the previous period averages. The period changes according to the filtering option selected.
- » The **Top Users Browsing Unproductive Categories** widget displays a list of users that browse sites that belong to unproductive categories.

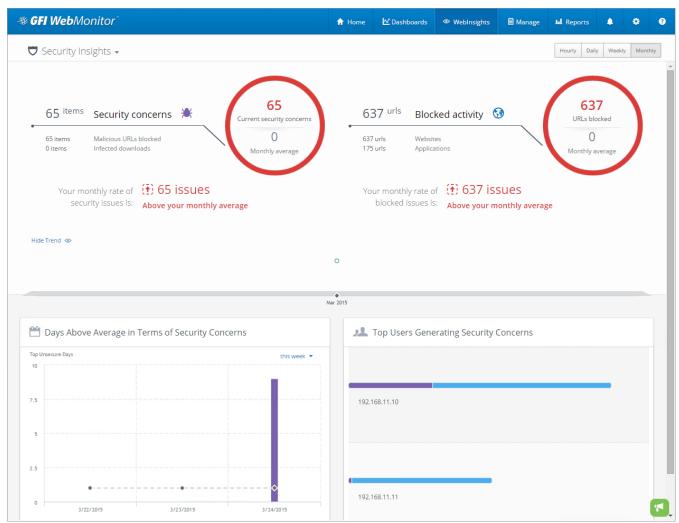
IMPORTANT

If Anonymization is enabled, personal data (such as User Names and IPs) will be masked. For more information, refer to Configuring Anonymization (page 52).

4.21 Security Insights

The Security Insights dashboard provides information related to malicious activity and infected files for a specified period. The information provided enables you to identify security risks and threats to your network environment at a glance.

To access the dashboard, click Weblnsights > Security.



Screenshot 16: Security Insights dashboard

NOTE

Use the View by: filter in the top right corner of the page to view data for a specific date range.

A summary at the top provides the following information:

- » Security concerns broken down between blocked malicious URLs and infected downloads.
- » Blocked requests broken down between websites and applications.

» Trend - this graph shows the peaks and lows of actual security issues compared to the average consumption for the same period. Move the cursor over the graph to display the amount of issues for the selected period.

The lower portion of the Weblnsights Security dashboard is composed of two widgets:

- » The Days Above Average in Terms of Security Concerns widget shows on which days of the week your network experienced security concerns that were above average. Toggle the view between results for this week or for the previous week.
- » The **Top Users Generating Security Concerns** widget displays a list of users that are accessing content that is creating security concerns to your organization.

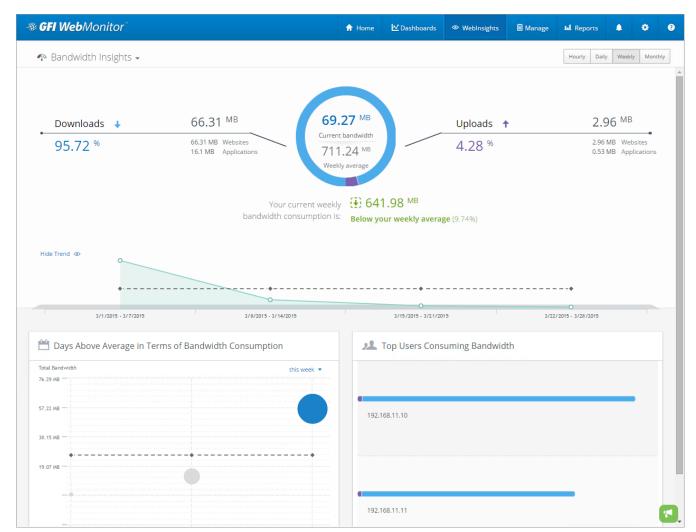
IMPORTANT

If Anonymization is enabled, personal data (such as User Names and IPs) will be masked. For more information, refer to Configuring Anonymization (page 52).

4.22 Bandwidth Insights

The Bandwidth Insights dashboard provides quick information related to traffic and user activity that affects bandwidth consumption. The dashboard is useful to understand how allocated bandwidth is being used on your network and to identify critical issues at a glance.

To access the dashboard, click **WebInsights > Bandwidth**.



Screenshot 17: Bandwidth Insights dashboard

Use the View by: filter in the top right corner of the page to view data for a specific date range.

A summary at the top provides the following information:

- » Bandwidth consumed by user downloads. This information is broken down between downloads originating from websites and that originating from applications.
- » Bandwidth consumed by user uploads. This information is broken down between uploads to websites and to applications.
- » Total bandwidth consumption for the selected period. The total downloads plus total uploads. The amount is compared to the average for the same period.
- » Trend this graph shows the peaks and lows of actual bandwidth consumption compared to the average consumption for the same period. Move the cursor over the graph to display the amount of download and upload bandwidth consumed on the selected period.

The lower portion of the WebInsights Bandwidth dashboard is composed of two widgets:

- » The Days Above Average in Terms of Bandwdith Consumption widget compares current bandwidth usage with the previous period averages. The period changes according to the filtering option selected.
- » The Top Users Consuming Bandwidth widget displays the users that consumed the most bandwidth.

IMPORTANT

If Anonymization is enabled, personal data (such as User Names and IPs) will be masked. For more information, refer to Configuring Anonymization (page 52).

4.23 Working with Reports

GFI WebMonitor makes use of an in-built reporting engine that enables you to create reports without having to leave the User Interface.

Use the reporting feature to create:

- » Department based reporting that can be scheduled and sent to the relevant department heads
- » Targeted and relevant reports based on inclusions and exclusions of users, categories and websites.
- » Need based reporting based on Browsing Activity / Bandwidth / Security and other needs
- » Scheduled reports distributed in various formats.

REPORT CATEGORY	DESCRIPTION
All	All the reports from Activity, Bandwidth and Security are displayed in this area.
Bandwidth	Monitor bandwidth activity on your network. Use these reports to identify non-productive traffic, download trends and usage patterns.
Activity	Use activity reports to gain insight into what sites users are visiting, what applications they are using and what content is downloaded to your network.
Security	Spot any security problems to prevent attacks to your network. The security reports give you full visibility into results of virus detections, hits to malicious websites and other security issues.
Starred	A list of frequently used reports. Select a report you want to mark as favorite. Click the star in top left corner of the report tile.

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REPORT CATEGORY	DESCRIPTION
Scheduled	Any reports scheduled to run at a future date are automatically added to this list.
Generated	Click Generated tab in the sidebar to display a list of previously generated reports.

To use one of the reports:

- 1. Go to **Reports** and select a report category from the left sidebar.
- 2. Click one of the report names to edit or click **Generate** to run the report.

4.23.1 Editing reports

All existing reports can be edited to change configured settings.

To edit a report:

- 1. Go to Reports.
- 2. From the left sidebar select a report category.
- 3. Click the report tile to edit and click the Edit icon with

OPTION	DESCRIPTION
General	 [Optional] Change the name of the report. Provide a date range covered by the report. Set the maximum number of records shown in the report (Default 1000).
Data	Select the filters that will be applied to the report. For each filter specify the elements to include or exclude: Click Users/IPs to add users or IP addresses to include or exclude in the report. Click Users Groups tab and add the users or groups to include or exclude in the report. Click Websites tab and add the domains to include or exclude in the report. Click Web Categories tab to add any of the pre-defined categories to include or exclude in the report Click Applications tab to add the applications to include or exclude in the report Click Policies tab to add the policies to include or exclude in the report
Schedule	1. Click the Scheduled switch to enable report scheduling.
	NOTE If the schedule is disabled, report is not automatically generated.
	 In the Runs area, select if report is going to be generated: Once, Daily, Weekly, Monthly In the Run every field, define the interval in days when the report is generated. In the Time to run field, specify at which time of day to execute the report. Use the Repeat until option to select if you want the occurrence to end after a specified period. Select Date and define the date, otherwise set the setting to Never (Default).
Output	Select the report output format and specify a location to save the report.
Distribution	[Optional] Add a recipient email address to send the document by email.

- 4. Click Save.
- 5. To run the report, click **Generate**.

4.23.2 Cloning reports

All existing reports can be cloned to create new custom reports.

To clone a report:

- 1. Go to **Reports** and select one or more reports you want to clone.
- 2. Click Actions > Clone.
- 3. Change the name of the report and edit the report as required.

4.23.3 Removing reports

Cloned reports can be removed from the list of reports.

NOTE

GFI WebMonitor ships with a set of default reports that can be modified but cannot be deleted.

To remove:

o clone a report:

- 1. Go to **Reports** and select one or more reports.
- 2. Click Actions > Remove.
- 3. Click **OK** to confirm deletion.

4.24 Notification Center

Using the Log Alert element from within Policies, GFI WebMonitor lets you configure alerts based on specific usage patterns, such as warnings bypassed or sites that have been blocked. Some examples include:

- » Monitoring alerts when a specific threshold is exceeded. Thresholds can be related to number of sites accessed, blocked or the number of times a user bypassed warnings.
- » Alerts when bandwidth limit is exceeded. Limits can be set on the total bandwidth (download + upload traffic) consumed during a designated period, on download traffic only or on upload traffic only.
- » Access requests from users asking approval to visit blocked sites.
- » Alerts related to security issues. These include detection of cyber-attacks, virus detection, phishing campaigns and potential threats from malware.

You can view a list of alerts in the Notifications Center. Click the notifications icon in the toolbar and use the following filters to sort and view the data:

OPTION	DESCRIPTION
Туре	Indicates the type of the alert.
Date & Time	The date and time of the alert.
Message	A description of why the alert was triggered.
Auto- refresh	Disabled by default. Enable to periodically refresh the list of alerts.
Search	Key in search criteria and click the magnifying glass to search for specific alerts.
Warning filter	Click to display only warning alerts.

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OPTION	DESCRIPTION
Request filter	Click to view only requests for temporary access to websites. These requests are generated from polices that block website access. To approve access, select the request you want to approve and click very to grant temporary access to the
	blocked website. If access is approved, a new temporary policy is created with top priority on the policies page. When approving, the IT Admin can define when the temporary access will expire. This creates a time window when the user can access the website. If no selection is made the default value of 24 hours is applied. The temporary policy is automatically deleted once it expires, unless the policy is edited.

To delete alerts, select the alerts you want to remove and click \blacksquare .

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5 Troubleshooting and support

5.1 Introduction

This section explains how to resolve any issues encountered during installation of GFI WebMonitor. The main sources of information available to solve these issues are:

- » This manual most issues can be solved through the information in this section.
- » GFI Knowledge Base articles
- » Web forum
- » Contacting GFI Technical Support

5.2 GFI knowledge base

GFI maintains a comprehensive knowledge base repository, which includes answers to the most common problems. GFI knowledge base always has the most up-to-date listing of technical support questions and patches. If the information in this guide does not solve your problems, refer to knowledge base.

5.3 Web Forum

User to user technical support is available via the GFI Web Forum.

5.4 Request Technical Support

If none of the resources listed above enable you to solve your issues, contact the GFI Technical Support team by filling in an online support request form or by phone.

- » Online: Fill out the Technical support form and follow the instructions on this page to submit your support request.
- » Phone: To obtain the correct technical support phone number for your region visit our website.

NOTE

Before contacting Technical Support, have your Customer ID available. Your Customer ID is the online account number that is assigned to you when first registering your license keys in the GFI Customer Area.

We will answer your query within 24 hours or less, depending on your time zone.

5.5 Documentation

If this manual does not satisfy your expectations, or if you think that this documentation can be improved in any way, let us know via email on: documentation@gfi.com.

6 Glossary

Α

Access Control

A feature that allows or denies users access to resources, for example, Internet access.

Active Directory

A technology that provides a variety of network services, including LDAP-like directory services.

AD

Active Directory

Administrator

The person responsible for installing and configuring GFI WebMonitor.

Always Allowed List

A list that contains information about what should be allowed by GFI WebMonitor.

Always Blocked List

A list that contains information about what should be blocked by GFI WebMonitor.

Anti-virus

Software that detects viruses on a computer.

C

Cache

A location where GFI WebMonitor temporarily keeps downloaded files. This will speed up subsequent requests for the same file as GFI WebMonitor would serve the file directly from the cache instead of downloading it again.

CER

CER file format

CER file format

A certificate file format that contains the certificate data but not the private key.

Certificate Revocation List

A list issued by a Certification Authority listing HTTPS websites certificates that were revoked.

Chained Proxy

When client machines connect to more than one proxy server before accessing the requested destination.

Console

An interface that provides administration tools that enable the monitoring and management of Internet traffic.

CRL

Certificate Revocation List

D

Dashboard

Enables the user to obtain graphical and statistical information related to GFI WebMonitor operations.

Ε

Expired Certificate

An expired certificate has an end date that is earlier than the date when the certificate is validated by GFI WebMonitor.

F

File Transfer Protocol

A protocol used to transfer files between computers.

FTP

File Transfer Protocol.

G

Google Chrome

A web browser developed and distributed by Google.

GPO

Group Policy Objects.

Group Policy Objects

An Active Directory centralized management and configuration system that controls what users can and cannot do on a computer network.

Н

Hidden Downloads

Unwanted downloads from hidden applications (for example, trojans) or forgotten downloads initiated by users.

HTTP

Hypertext Transfer Protocol.

HTTPS

Hypertext Transfer Protocol over Secure Socket Layer (SSL).

HyperText Transfer Protocol

A protocol used to transfer hypertext data between servers and Internet browsers.

HyperText Transfer Protocol over Secure Socket Layer (SSL)

A protocol used to securely transfer encrypted hypertext data between servers and Internet browsers. The URL of a secure connection (SSL connection) starts with https: instead of http:.

I

Internet Browser

An application installed on a client machine that is used to access the Internet.

Internet Gateway

A computer that has both an internal and an external network card. Internet sharing is enabled, and client machines on the internal network use this computer to access the Internet.

L

LAN

Local Area Network

LDAP

Lightweight Directory Access Protocol.

Lightweight Directory Access Protocol

A set of open protocols for accessing directory information such as email addresses and public keys.

Local Area Network

An internal network that connects machines in a small area.

M

Malware

Short for malicious software. Unwanted software designed to infect a computer such as a virus or a trojan.

Microsoft Forefront Threat Management Gateway

A Microsoft product that provides firewall and web proxy services. It also enables administrators to manage Internet access through policies. It is the successor of the Microsoft ISA Server and is part of the Microsoft Forefront line of business security software.

Microsoft Forefront TMG

Microsoft Forefront Threat Management Gateway

Microsoft Internet Explorer

A web browser developed and distributed by Microsoft Corporation.

Microsoft Internet Security and Acceleration Server

A Microsoft product that provides firewall and web proxy services. It also enables administrators to manage Internet access through policies.

Microsoft ISA Server

Microsoft Internet Security and Acceleration Server.

Microsoft SQL Server

A Microsoft database management system used by GFI WebMonitor to store and retrieve data.

Microsoft Windows Live Messenger

An instant messaging application developed by Microsoft used by users to communicate on the Internet.

Mozilla Firefox

Mozilla Firefox is an open source Internet browser.

MSN

Microsoft Windows Live Messenger

Ν

Non-validated Certificate

An non-validated certificate has a start date that falls after the date when the certificate is validated by GFI WebMonitor.

NT LAN Manager

A Microsoft network authentication protocol.

NTLM

NT LAN Manager.

Ρ

Personal Information Exchange file format

A certificate file format that contains the certificate data and its public and private keys.

PFX

Personal Information Exchange file format.

Phishing

The act of collecting personal data such as credit card and bank account numbers by sending fake emails which then direct users to sites asking for such information.

Port Blocking

The act of blocking or allowing traffic over specific ports through a router.

Proxy Server

A server or software application that receives requests from client machines and responds according to filtering policies configured in GFI WebMonitor.

Q

Quarantine

A temporary storage for unknown data that awaits approval from an administrator.

R

Revoked Certificate

A revoked certificate is a valid certificate that has been withdrawn before its expiry date (for example, superseded by a newer certificate or lost/exposed private key).

S

Spyware

Unwanted software that publishes private information to an external source.

Т

Traffic Forwarding

The act of forwarding internal/external network traffic to a specific server through a router.

U

Uniform Resource Locator

The address of a web page on the world wide web. It contains information about the location and the protocol.

URL

Uniform Resource Locator.

User Agent

A client application that connects to the Internet and performs automatic actions.

٧

Virus

Unwanted software that infects a computer.

W

WAN

Wide Area Network.

Web Proxy AutoDiscovery protocol

An Internet protocol used by browsers to automatically retrieve proxy settings from a WPAD data file.

Web traffic

The data sent and received by clients over the network to websites.

WebFilter Edition

A configurable database that allows site access according to specified site categories per user/group/IP address and time.

WebGrade Database

A database in GFI WebMonitor, used to categorize sites.

WebSecurity Edition

WebSecurity contains multiple anti-virus engines to scan web traffic accessed and downloaded by the clients.

Wide Area Network

An external network that connects machines in large areas.

WPAD

Web Proxy AutoDiscovery protocol.

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