



Barco CMS Plugin Guide

4.0

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You can send your comments, corrections, and suggestions about this guide to documentation@genetec.com.

About this guide

This guide describes how to integrate the Barco Control Room Management Suite (CMS) software in Security Center in order to modify a Barco CMS display (video wall) using Security Desk.

This guide supplements Security Center documentation. It assumes you are familiar with the following:

- Security Center 5.2 systems.
- Configuration and use of Barco CMS displays (video walls).

Notes and notices

The following notes and notices might appear in this guide:

- **Tip.** Suggests how to apply the information in a topic or step.
- **Note.** Explains a special case, or expands on an important point.
- **Important.** Points out critical information concerning a topic or step.
- **Caution.** Indicates that an action or step can cause loss of data, security problems, or performance issues.
- **Warning.** Indicates that an action or step can result in physical harm, or cause damage to hardware.

IMPORTANT: Topics appearing in this guide that reference information found on third-party websites were accurate at the time of publication, however, this information is subject to change without prior notice to Genetec.

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Introduction to Barco CMS plugin

This section includes the following topics:

- ["What is the Barco CMS plugin?"](#) on page 2
- ["How the Barco CMS plugin works with Security Center"](#) on page 3

What is the Barco CMS plugin?

The Barco CMS plugin integrates the Barco Control Room Management Suite (CMS) 2.8 with Security Center.

The plugin allows you to do the following:

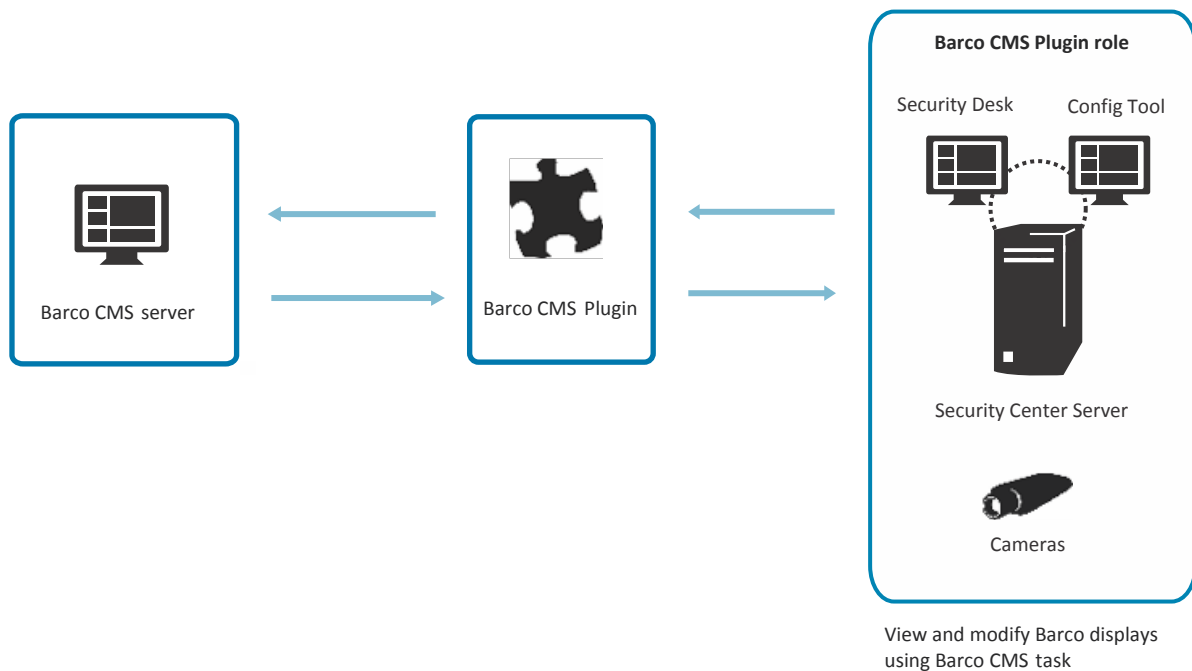
- Connect to a Barco CMS server to control and modify a Barco display (video wall) using the Barco CMS task in Security Desk. Any changes that are made are automatically shown to other users monitoring that display.
- Drag and drop live video sources and camera sequences from Security Center to a perspective or a display.
- Add and remove perspectives from a display.
- Create new perspectives and modify existing ones.
- Modify the grid layout of sources (camera or sequence) in a perspective and in a display.
- Lock perspectives so they cannot be modified.
- Block and unblock cameras.
- Configure users to manage specific displays.
- Configure user privileges so that certain users can only perform specific actions such as locking a perspective.
- Support failover.
- Report configuration changes performed by users through the Barco CMS task.

In order to transmit video streams to a Barco display, a multicast network is required. The multicast stream is sent to the Barco CMS server directly from the encoder, from the Archiver, or the Redirector depending on the configuration.

How the Barco CMS plugin works with Security Center

The Barco CMS plugin integrates the Barco Control Room Management Suite (CMS) into Security Center using the Barco CMS plugin role.

You can control and modify Barco CMS display layouts in Security Desk, and any changes you make are reflected in the Barco CMS system and vice-versa.



Release notes

This section includes the following topics:

- ["What's new in Barco CMS?"](#) on page 5
- ["Known issues in Bosch VMS 4.0 "](#) on page 6
- ["Limitations"](#) on page 7
- ["Barco CMS plugin compatibility"](#) on page 8
- ["Supported video unit extensions"](#) on page 9

What's new in Barco CMS?

With each release, new features, enhancements, or resolved issues are added to the product.

The Barco CMS plugin 4.0 includes the following new features and enhancements.

- **Support for Barco CMS 2.8:** The Barco CMS plugin 4.0 supports Barco CMS version 2.8.
- **Support for Linux based Displays:** The Barco CMS plugin 4.0 now supports Linux based Displays.
- **Multiple Barco plugin roles on a single Security Center server:** The Barco CMS plugin 4.0 enables you to install more than one Barco CMS plugin role on your Security Center server. A single plugin role connects to a single CMS server.
- **Separate client and server installations:** The Barco CMS 4.0 InstallShield enables you to perform a client installation only, or a server installation. Please note that the server installation automatically installs the client.
- **No loss of camera to source mappings after recreating the plugin role:** When you delete and recreate the Barco CMS plugin role, you will no longer lose your camera to source mappings provided you keep the database from the previous plugin role.
- **A new configuration file for advanced plugin settings:** An *AdvancedSettings.xml* file is available to configure the advanced settings of the plugin.

Resolved issues

Resolved issues are software issues from previous releases which have been fixed in the current release.

The Barco CMS plugin integration includes the following known issues.

Issue	Description
156946	When video source windows overlap each other in a perspective, they do not display in the correct order on the wall.

Known issues in Bosch VMS 4.0

Known issues are software issues that have been discovered in the current release or a previous release, and have not yet been resolved.

The Barco CMS plugin integration includes the following known issues.

Issue	Description
156256	Perspectives unexpectedly enter a state where they cannot be locked or deleted, nor can their grid settings be modified.

Limitations

The Barco CMS plugin integration includes the following limitations.

Issue	Description
114303	Video feeds and camera sequences may take a long time to load in the CMS system. Workaround: In Config Tool on the <i>Video</i> tab of the camera, try increasing the Key frame interval. Also, when creating a camera sequence in Config Tool, set the Dwell time to a minimum of five seconds so the feed has enough time to load before the next feed starts.
149793	You cannot resize a source that represents a sequence in the Barco Sidebar. Workaround: Use the Barco CMS task in Security Desk to resize the source.
158735	After clearing the Draw Grid lines option for a perspective, the option remains enabled the next time you select the perspective. Workaround: Clear the option again or set the number of rows and columns to zero.
159103	You cannot delete a perspective from the Barco CMS task while it's being viewed or edited by a Sidebar user. Workaround: Close the perspective in the Sidebar application.
159112	When a perspective has already been added to a display, and is added for the second time, a copy is created of that perspective.
160871	Custom tile presets that are defined in the Barco Sidebar are not supported and are ignored by the plugin. Workaround: Use the grid settings available in the Barco CMS task to modify the layout of perspectives.
168289	The backup and restore functionality of the Barco CMS is not supported. If you do perform a backup or restore, any perspectives that were configured beforehand will no longer work correctly.

Barco CMS plugin compatibility

Product compatibility indicates that the product supports and can run with specific versions of other products.

The Barco CMS plugin is compatible with the following systems:

- Barco CMS version 2.8.
- Security Center version 5.2 SR10 CU2 or higher.

Supported video unit extensions

The following table lists the video unit extensions supported by Security Center that are also compatible with Barco displays.

Two certification levels exist:

- **Tested:** The units have been tested and validated by Genetec.
- **Supported by design:** The units are listed as supported by Barco, but have not been tested or validated by Genetec within the Barco CMS plugin.

Extension	Certification level
Axis	Tested
Bosch	Tested
Genetec	Tested
Panasonic	Supported by design
Generic	Supported by design
Generic Plus	Supported by design
Sony	Supported by design
Pelco	Supported by design

Installing the Barco CMS plugin

This section includes the following topics:

- ["Preparing to install the Barco CMS plugin" on page 11](#)
- ["Installing the Barco CMS plugin" on page 12](#)
- ["Upgrading from Barco CMS 3.0 to 4.0" on page 13](#)
- ["Upgrading from Barco CMS 3.0 to 3.3" on page 14](#)
- ["Upgrading from Barco CMS 3.1, 3.2 or 3.3 plugin to 4.0" on page 15](#)

Preparing to install the Barco CMS plugin

Before you install the Barco CMS plugin, you must perform some pre-configuration steps.

Before installing the Barco CMS plugin:

- 1 [Read the release notes](#).
- 2 Install Security Center 5.2 SR10 CU2 or later on the server.
For more information about installing Security Center, see the *Security Center Installation and Upgrade Guide*.
- 3 Check that your Security Center license has a valid certificate for the Barco CMS plugin.
The license number is included in the product-release email from the Genetec product manager. This email also includes links to the plugin download package and other license information.
- 4 [Configure the video streams](#) of the cameras you want to view on the Barco wall.

Configuring video streams for the Barco wall

Video is streamed in high resolution on a Barco display; therefore, to configure specific settings for streaming on the Barco display and to reduce bandwidth usage on the network, you must enable and configure the *High resolution* stream in Config Tool for all the cameras you want to display on the wall.

To configure a video stream for the Barco wall:

- 1 From the home page in Config Tool, open the **Video** task.
- 2 Select the camera that you want to view on the Barco wall, and click the **Video** tab.
- 3 If the camera supports multiple video streams, select the video stream tab at the bottom of the **Video** tab corresponding to the video feed that you want to display on your wall.
- 4 In the **Stream usage** section, select **High resolution**.
- 5 (Optional) If your camera is configured to be part of a sequence, and you want to minimize delays when switching between video feeds, select **Custom** beside **Quality** and increase the **Key frame interval**.
- 6 From the **Connection type** drop-down list in the **Network** section, select **Multicast**.
The connection type defines how communication between the Archiver and the camera is established for sending or receiving video streams. If multicast is not available, then select **Best available**.
- 7 Click **Apply**.

Installing the Barco CMS plugin

The Barco CMS plugin is installed separately from the Security Center system.

Before you begin

- [Perform the pre-installation tasks.](#)
- Close Config Tool and Security Desk.

What you should know

The plugin needs to be installed on the Security Center client and server computers.

- If your Security Center system consists of a single-server, install the plugin on that server.
- If you have a multi-server Security Center system, install the plugin on an expansion server.

To install the Barco CMS plugin:

- 1 Download the Barco CMS installation package from the GTAP [Product Downloads](#) page.
- 2 Double-click the *setup.exe* file, and follow the installation instructions.
- 3 On the *Installation Wizard Completed* page, click **Finish**.

IMPORTANT: The **Restart Genetec Server** option is selected by default. You can clear this option if do not want to restart the Genetec Server right away. However, you must make sure to remember to restart the Genetec Server at some point to complete the plugin installation.

- 4 If you haven't done so already, make sure you apply the Barco CMS certificate to your Security Center license.

The license number is included in the product-release email from the Genetec product manager. This email also includes links to the plugin download package and other license information.

After you finish

[Create the Barco CMS plugin role.](#)

Upgrading from Barco CMS 3.0 to 4.0

An upgrade from the Barco CMS plugin 3.0 must be done in three stages. You must first upgrade to the 3.3 plugin, then upgrade the Barco CMS server to 2.8, then upgrade the plugin to 4.0.

What you should know

IMPORTANT: Unless you have a lot of configuration settings you need to preserve, a clean installation of the Barco CMS plugin 4.0 is highly recommended.

To upgrade the Barco CMS from 3.0 to 4.0:

- 1 [Upgrade the 3.0 plugin to the 3.3 plugin.](#)
- 2 Upgrade the Barco CMS server to version 2.8. For more information, see your Barco documentation.

NOTE: You will no longer be able to connect to the Barco CMS server since the 3.3 plugin does not support Barco CMS version 2.8

- 3 [Upgrade the Barco CMS 3.3 plugin to 4.0.](#)

Upgrading from Barco CMS 3.0 to 3.3

You can upgrade the Barco CMS 3.0 plugin to the Barco CMS 3.3 plugin.

What you should know

An optimization made for video sequences and included in the Barco CMS 3.1 plugin and later versions requires that the 3.0 plugin be running and connected to the Barco CMS server prior to the 3.3 upgrade. To avoid issues, do not attempt to change the CMS server's IP address or install a brand new CMS server at the same time as you plan to upgrade the plugin. The Barco CMS server should be the same (same version, same IP address, same database) as before the upgrade.

To upgrade the Barco CMS from 3.0 to 3.3:

- 1 If you were using video sequences in the Barco CMS 3.0 plugin, then make sure the plugin is running and connected to the Barco CMS server.
- 2 Download the Barco CMS installation package from the GTAP [Product Downloads](#) page.
- 3 Double-click the *setup.exe* file, and follow the installation instructions.
- 4 On the *Installation Wizard Completed* page, click **Finish**.

IMPORTANT: The **Restart Genetec Server** option is selected by default. You can clear this option if do not want to restart the Genetec Server right away. However, you must make sure to remember to restart the Genetec Server at some point to complete the plugin installation.

- 5 If you haven't done so already, make sure you apply the Barco CMS certificate to your Security Center license.

The license number is included in the product-release email from the Genetec product manager. This email also includes links to the plugin download package and other license information.

Upgrading from Barco CMS 3.1, 3.2 or 3.3 plugin to 4.0

You can upgrade the Barco CMS 3.1, 3.2, or 3.3 plugin to the Barco CMS 4.0 plugin.

What you should know

It is always best practice to backup your databases before an upgrade.

To upgrade the Barco CMS to 4.0:

- 1 If you haven't done so already, update the Barco CMS server to version 2.8. For more information, see your Barco documentation.
- 2 Download the Barco CMS installation package from the GTAP [Product Downloads](#) page.
- 3 Double-click the *setup.exe* file, and follow the installation instructions.
- 4 On the *Installation Wizard Completed* page, click **Finish**.

IMPORTANT: The **Restart Genetec Server** option is selected by default. You can clear this option if do not want to restart the Genetec Server right away. However, you must make sure to remember to restart the Genetec Server at some point to complete the plugin installation.

- 5 Once Security Center has restarted, upgrade the Barco CMS plugin role database.
 - a) Open Config Tool and select the Barco CMS plugin role.
 - b) Click **Resources**.
 - c) Click **Database update**.
- 6 If you haven't done so already, make sure you apply the Barco CMS certificate to your Security Center license.

The license number is included in the product-release email from the Genetec product manager. This email also includes links to the plugin download package and other license information.

After you finish

When upgrading to 4.0, the compression mappings file is not overwritten in order to preserve any specific mappings you had. If you want to use the default *CompressionMappings.xml* file that is provided in the 4.0 plugin installation package, you must [import it manually](#).

Configuring the Barco CMS plugin

This section includes the following topics:

- ["Creating the plugin role" on page 17](#)
- ["Configuring the Barco CMS plugin role" on page 18](#)
- ["Selecting a camera blocking user" on page 19](#)
- ["Authorizing users to manage displays" on page 21](#)
- ["Editing the CompressionMappings.xml file" on page 23](#)
- ["About the AdvancedSettings.xml" on page 25](#)

Creating the plugin role

Before you can configure and use the plugin, you must create the plugin role in Config Tool.

Before you begin

Install the plugin.

To create the plugin role:

- 1 From the home page in Config Tool, open the **Plugins** task.
- 2 At the bottom of the **Plugins** task, click **Add an entity** (+), and select **Plugin**.
- 3 On the **Specific info** page, select the plugin type, the server to run the plugin, and then click **Next**.
If you are not using an expansion server, the option to select a server is not displayed.
- 4 On the **Basic information** page, do the following:
 - a) Enter the **Entity name**.
 - b) Enter the **Entity description**.
 - c) Select a **Partition** for the plugin role .
Partitions are logical groupings used to control the visibility of entities. Only users who are members of that partition can view or modify the role.
 - d) Click **Next**.
- 5 On the **Creation summary** page, review the information, and then click **Create**, or **Back** to make changes.
After the plugin is created, the following message appears: The operation was successful.
- 6 Click **Close**.

The plugin role appears in the entity browser. The plugin role is yellow because it is not yet configured.

Related Topics

[Installing the Barco CMS plugin on page 12](#)

[Configuring the Barco CMS plugin role on page 18](#)

Configuring the Barco CMS plugin role

To view Security Center video in a Barco CMS display and make changes to that display in Security Desk, you must connect the plugin to the CMS server.

Before you begin

[Create the plugin role.](#)

What you should know

Only specific configuration settings are described here. For more information about generic Config Tool settings, such as the *Identity* and *Resources* tab settings, see the *Security Center Administrator Guide*. You can access this guide by pressing **F1** in Config Tool.

To configure the Barco CMS plugin:

- 1 From the home page in Config Tool, open the **Plugins** task.
- 2 In the *Plugins* task, select the Barco CMS plugin from the entity browser, and click the **Properties** tab.
- 3 In the **CMS Server URL** field, type the web address of the CMS server you want to connect to. For example, `http://<server name>/cms/PerspectiveMgtAPIImpl`.
- 4 [Select a camera blocking user.](#)
- 5 Disable the **Show camera name decorators** option if you do not want the camera name displayed under the video feed on your wall.
- 6 (Optional) [Edit the Compression mappings file.](#)
- 7 (Optional) Click **Trigger import** when you want to synchronize edits that have been made in the Barco Sidebar with the Barco CMS plugin. For example, if you add a perspective in the Barco Sidebar, you must click **Trigger import** to see that perspective in the Barco CMS task in Security Desk.
- 8 Click **Apply**.

Selecting a camera blocking user

You must select a *Camera blocking user* to set the security user level required to view blocked camera streams on the Barco wall.

What you should know

Some camera streams on the Barco display might be blocked in Security Desk. If the *Camera blocking user* has a lower user level (lowest is 254) than the blocking level of the camera in Security Desk, then they will not be able to view the blocked camera stream on the Barco wall. For example, if the *Camera blocking user* has a user level of 10 and a camera in Security Desk is blocked with a blocking level of 2, the stream can no longer be viewed on the wall. Your system administrator needs to set user levels in Config Tool (see the *Security Center Administrator Guide*).

To select a camera blocking user:

- 1 From the home page in Config Tool, open the **Plugins** task.
- 2 In the *Plugins* task, select the Barco CMS plugin from the entity browser, and click the **Properties** tab.
- 3 Beside the **Camera blocking user** field, click  to select a user that sets the user level required to view blocked camera streams on the Barco wall.
- 4 Click **Apply**.

Camera blocking

Camera blocking is an Omnicast feature that lets you restrict the viewing of video (live or playback) from certain cameras to users with a minimum user level.

Camera blocking is particularly targeted for installations that provide the general public with access to live video. In such cases, cameras might be streaming video that is not suitable for certain users. As a result, you can restrict users from viewing a segment or entire video capture by blocking the camera.

How it works

Camera blocking is based on a user attribute called the user level. The highest user level is 1 and the lowest user level is 254. If you block a camera, users with a lower user level than the one that you select cannot view video (live, playback, or cached) or export video for the amount of time that you set.

When blocking cameras, the following applies:

- A user can only block someone that has a lower user level. As a result, users with a user level equal to 254 cannot block anyone, and users with a user level equal to 1 cannot be blocked by anyone.
- A user cannot unblock or change the blocking level of a camera if the camera was blocked by someone with a higher user level.
- A user with a user level that is higher than the blocking level of a camera can unblock the camera or change its blocking level. To change the blocking level, it is not necessary to unblock the camera first.
- If there are more than one block settings applied to a camera at the same time, the user level that was specified for block setting that was created last is the active blocking level.

Example

You block a camera from 1 P.M. to 4 P.M, and set a user level of 20. Another user blocks the same camera from 3 P.M. to 5 P.M., and sets a user level of 100. From 3 to 5 P.M., the blocking level is 100.

Authorizing users to manage displays

You can authorize a user to manage a particular Barco display (video wall) or many displays in the plugin *Display Mappings* tab.

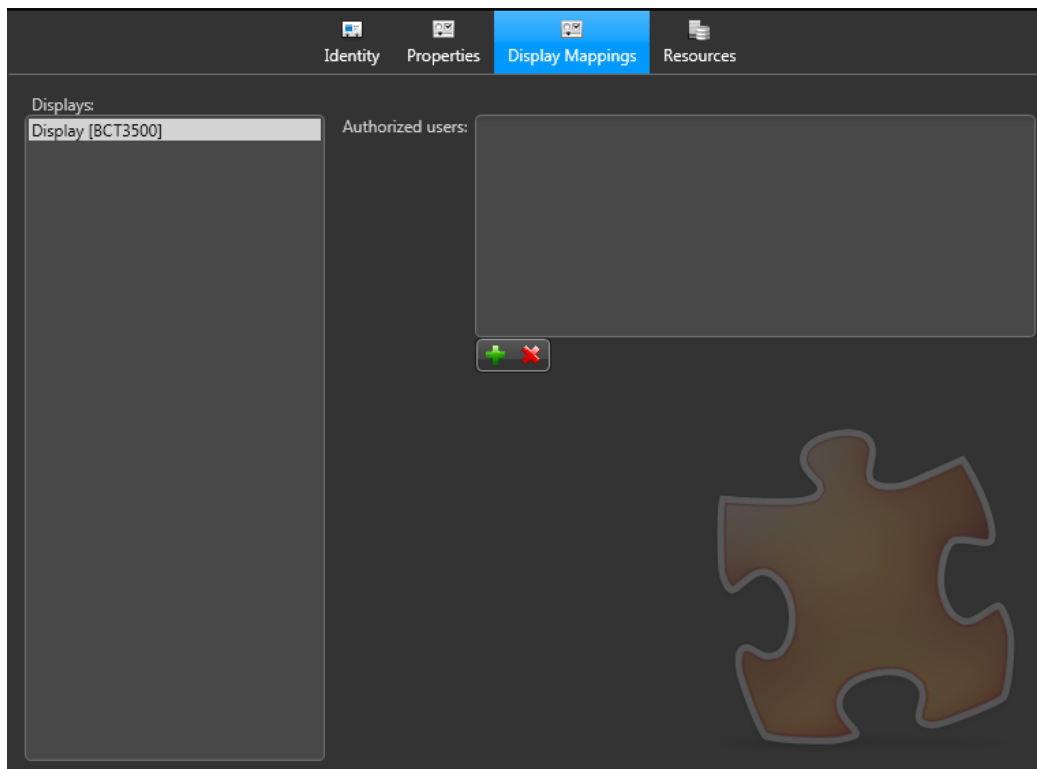
What you should know

When a user is authorized to manage a display, they can share, unshare, and change the layout of perspectives shown on a display.

A user that is an Administrator is automatically considered an authorized user.

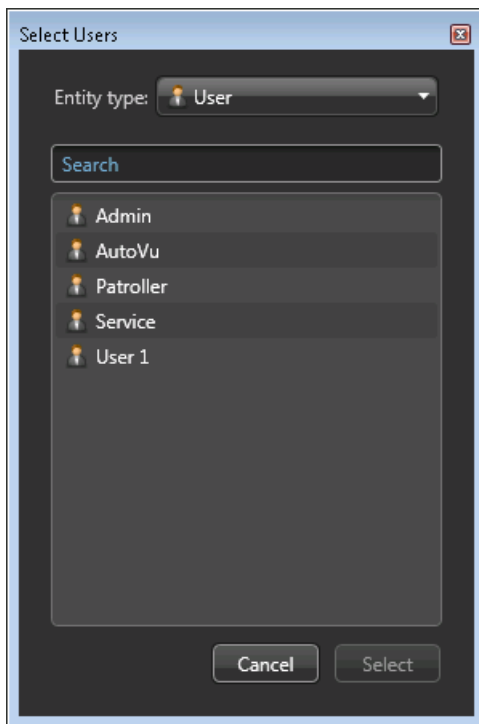
To authorize a user to manage a display:

- 1 From the home page in Config Tool, open the **Plugins** task.
- 2 In the *Plugins* task, select the Barco CMS plugin from the entity browser, and click the **Display Mappings** tab.
- 3 Under **Displays**, select a CMS display from the list.



- 4 To add an authorized user or user group for the selected display, click .
- 5 In the *Select users* dialog box, beside **Entity type**, choose whether you want to filter the user list by **User** or by **User group**.

The list displays both users and user groups by default.



- 6 Choose a user or user group from the list, then click **Select**.
The user or user group is added to the list of **Authorized users**.
- 7 To remove a user from the **Authorized users** list, select user from the list and click ✕.
- 8 Click **Apply**.

Editing the CompressionMappings.xml file

To view video from a camera on a Barco display (video wall), specific video compression mappings are required for the unit. Compression mappings for many supported cameras are included in the *CompressionMappings.xml* file by default, but if you are using other units, you must add mappings for those units.

What you should know

If you want to replace the current *CompressionMappings.xml* file that is being used, you can import a new one.

To edit the *CompressionMappings.xml* file:

- 1 From the home page in Config Tool, open the **Plugins** task.
- 2 In the *Plugins* task, select the Barco CMS plugin from the entity browser, and click the **Properties** tab.
- 3 Beside **Compression mappings file**, click **Export compression mappings** (📄), and save the *CompressionMappings.xml* file to a folder.
- 4 Open the *CompressionMappings.xml* file.

You will notice text similar to the following for units that you are currently using:

```
<CompressionMapping>
  <BarcoTemplate>bosch-h264-rtp-mgs</BarcoTemplate>
  <Manufacturer>Bosch</Manufacturer>
  <Model>AutoDome 700 IP IVA</Model>
  <StreamType>H264</StreamType>
</CompressionMapping>
```

- 5 Use the block of code above as a guide for what add for your camera.

You must provide the following values for the unit you want to add:

- **BarcoTemplate:** If you are not sure what to use for the Barco compression template, contact your Barco representative.
- **Manufacturer:** Manufacturer of the unit.
- **Model:** If you have multiple cameras from the same manufacturer that all map to the same *BarcoTemplate*, you can type `<Model>All</Model>`. If this is not the case, you need to provide the model of the unit. The model name can be found in the Config Tool entity tree.

NOTE: tree. Model information is not used for federated cameras because that information is not transmitted across the federation. If you have many mappings for the same *Manufacturer* and *Video compression type*, federated cameras will use the first one found. The compression mapping logic works from the most specific to the most general. If a specific model is available, that will be used first. If it does not match, it will use a loose match, then the `<Model>All</Model>` entry and so forth.

- **Video compression (or stream) type:** Should be Mpeg4 or H264.

NOTE: In the rare case that all the manufacturers and camera models map to the same *BarcoTemplate* you can use the following values:

```
<Manufacturer>All</Manufacturer>
<Model>All</Model>
```

- 6 Save the *CompressionMappings.xml* file.
- 7 In the **Properties** of the *Plugins* task, click **Import compression mappings** (📁).
- 8 Navigate to the modified *CompressionMappings.xml* file, and click **Open**.
A dialog box appears indicating if the import was successful.
- 9 Click **OK**.

The new compression mappings are applied.

About the AdvancedSettings.xml

You can configure the advanced settings for the Barco CMS plugin 4.0 using the *AdvancedSettings.xml* file located at: *C:\Program Files (x86)\Security Center Plugins\Barco CMS*.

The following table lists the options that you can configure, their descriptions, as well as the default and recommended values.

NOTE: You must run the plugin at least once to have access to the *AdvancedSettings.xml* file.

Option name	Description	Default value	Recommended range
AlwaysShowErrorDecorators	This setting determines if errors are displayed under the video feed for cameras on the wall.	True	N/A
CmsApiTimeoutSeconds	How long the plugin waits for a response when communicating with the Barco CMS server.	10	5-25
CmsServerConnectionWatcherIntervalSeconds	The time interval (in seconds) that the plugin waits before testing the connection with the Barco CMS server.	15	10-60
DefaultPerspectiveHeight	Default height value when creating new perspectives in the Barco CMS Security Desk task.	800	100
DefaultPerspectiveWidth	Default width value when creating new perspectives in the Barco CMS Security Desk task.	1200	100
LayoutThreshold	The sensitivity value used to determine if a layout change has occurred in the Barco CMS Security Desk task.	1.5	0.5-2.5
MaxTilerWidthHeight	Maximum valid value for width or height of a grid.	100	50-150
PrefetchingCmsEntitiesTimeoutSeconds	How long the plugin waits (in seconds) for the prefetch query to the Directory role when the plugin starts.	10	10-60

Option name	Description	Default value	Recommended range
SaveTimeoutSeconds	How long (in seconds) the plugin waits to execute a Save operation.	80	20-120
StreamRequestTimeoutSeconds	How long the plugin waits (in seconds) to request a video stream from the Archiver.	5	5-25
TaskAutoSaveIntervalMilliseconds	When AllowRealTimeSavingMode is enabled, this is the interval (in milliseconds) at which the Barco CMS task in Security Desk will apply any changes.	400	300-2500
UpgradeTimeoutSeconds	Timeout value (in seconds) for an upgrade procedure from a previous version of the CMS plugin.	120	100-500
AllowRealTimeSavingMode	When set to true, the Barco CMS task in Security Desk will have a toggle switch which enables you to enter real time editing mode. In Real time editing mode, you no longer have to Apply or Cancel your changes. It is done automatically based on the time interval specified in the TaskAutoSaveIntervalMilliseconds option	True	N/A

Using the Barco CMS plugin

This section includes the following topics:

- ["Assigning user privileges to use the Barco CMS plugin"](#) on page 28
- ["Barco CMS task overview"](#) on page 29
- ["Viewing entities in List view"](#) on page 32
- ["Deleting perspectives and sources"](#) on page 33
- ["Unsharing perspectives and sources"](#) on page 34
- ["Modifying grid settings"](#) on page 35
- ["Adding perspectives to displays"](#) on page 36
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- ["Adding sources to displays"](#) on page 38
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Assigning user privileges to use the Barco CMS plugin

To enable users to use the Barco CMS task and perform other actions in Security Desk, you must grant the user certain privileges.

What you should know

Only users who are members of the Administrators group can configure user privileges in Config Tool. For more information about Security Center user privileges, see the *Security Center Administrator Guide*.

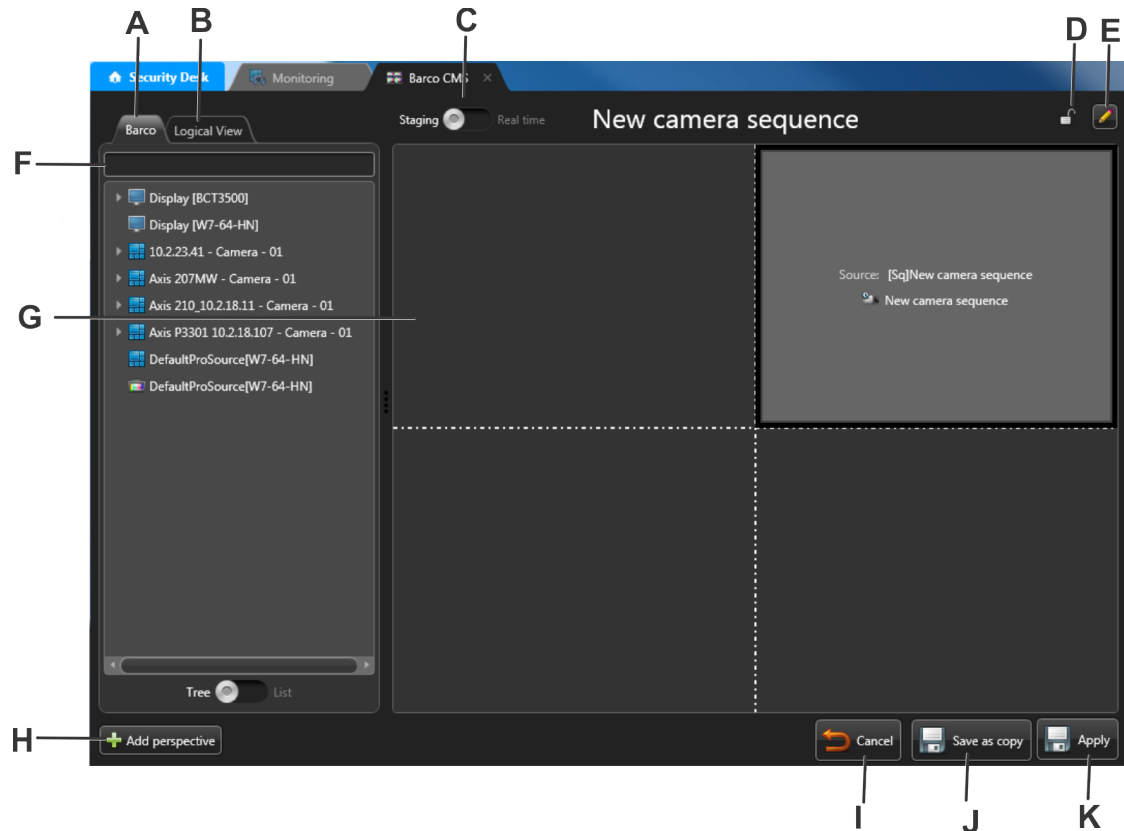
To assign user privileges required to use the Barco CMS plugin:

- 1 From the home page in Config Tool, open the **Security** task, and click the **Users** view.
- 2 Select the user to configure, and click the **Privileges** tab.
- 3 Under **Barco CMS**, expand the **General privileges**, and then select **Allow** next to the **Access to the Barco CMS task** privilege.
- 4 Under **Barco CMS**, expand the **Task privileges**, and grant the following privileges based on the actions the user will perform:
 - **Modify perspectives:** Allows the user to add, remove, resize, rename, and move sources within a perspective. The user will also be able to delete sources and perspectives, and modify grid settings for a perspective.
 - **Delete perspectives:** Allows the user to delete a perspective from the system.
 - **Delete video sources:** Allows the user to delete a video source from the system.
 - **Lock/unlock perspectives:** Allows the user to lock or unlock a perspective. Once locked, a perspective cannot be modified by users that don't have this privilege.
- 5 Click **Apply**.

Barco CMS task overview

The Barco CMS task is available when you install the Barco CMS plugin.

You can open the Barco CMS task by typing its name in the *Search* box on the home page of Security Desk or Config Tool.



A	Barco View	Click to find and view all the entities used to create a display in the Barco CMS system. You can choose between the Tree or List view.
B	Logical View	Click to find and view all the entities in your Security Center system.
C	Editing mode	Use this option to enable or disable Real time editing mode. When this option is set to Real time , you don't have to Apply or Cancel your changes, they are automatically applied. You can configure the time interval at which real time edits are saved in the AdvancedSettings.xml .
D	Lock perspective/Unlock perspective	Use this option to lock or unlock a perspective in Security Desk. When a perspective is locked, it is read-only and cannot be modified. The <i>Lock/unlock perspectives</i> user privilege is required to lock and unlock a perspective.

E	Edit grid	Click this button to edit the grid settings for a perspective or display layout.
F	Search	Type in the <i>Search</i> box to find the entities that contain specific text.
G	Editor View	Use the Editor View to create and modify perspectives and layouts for the displays.
H	Add perspective	Click to create a new perspective.
I	Cancel	Click to cancel any changes.
J	Save as copy	Click to save a copy of the perspective. This is useful if you want to create a new perspective based on the current one.
K	Apply	Click to push any changes to the CMS server.

Barco View

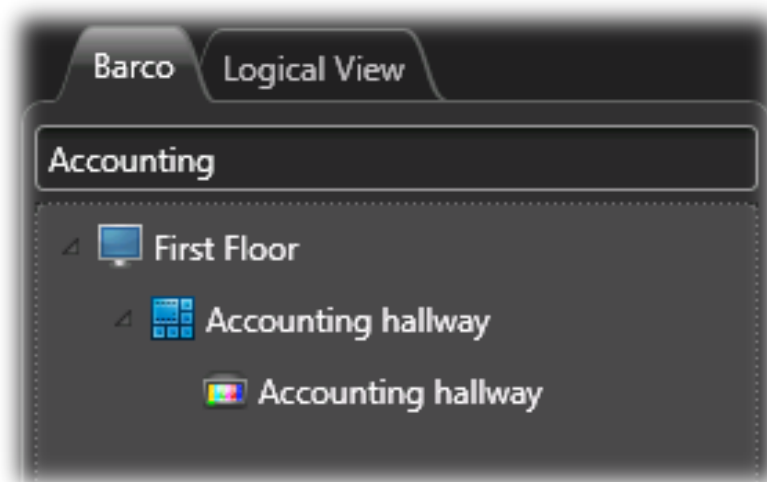
You can find and view all the entities that make up a display in the Barco View on the left side of the Barco CMS task window.

You can also use the Barco View tab to delete perspectives and sources, as well as remove them from other components. The Barco View can be used in Tree or List view.

Tree view

The Barco View opens in Tree view by default. The Tree view organizes the display components in the following hierarchy:

- Displays are root nodes located at the top of the tree.
- Perspectives are child entities of displays.
- Sources are child entities of perspectives.



NOTE: Perspectives that are not associated with a display are root nodes that follow display root nodes. Video sources that are not associated to a perspective or display are at the bottom of the tree.

Related Topics

[Viewing entities in List view](#) on page 32

[Deleting perspectives and sources](#) on page 33

[Unsharing perspectives and sources](#) on page 34

Viewing entities in List view

From the List view, you can see a list of entities by category (displays, perspectives, or sources).

To view entities in List view:

- 1 From the home page, open the Barco CMS task.
- 2 At the bottom of the Barco View, move the slider from **Tree** to **List**.



- 3 Click the arrow icon to expand the category you want to view.
For example, if you want to see the list of displays, click the arrow beside **Displays**.



Related Topics

[Barco View](#) on page 30

Deleting perspectives and sources

Perspectives and sources can be deleted from the Barco View.

Before you begin

You must be [granted the *Delete perspectives* and *Delete video sources* user privileges](#).

To delete a perspective or a source:

- 1 From the home page, open the Barco CMS task.
- 2 In the Barco View, make sure you are in Tree view by moving the slider from **List** to **Tree**.
- 3 Right-click a perspective or source, and click **Delete**.
- 4 When you are asked to confirm whether you want to delete the selected entity, click **Yes**.

The item is deleted from the Barco View and any display that it's associated with. The item is also deleted from the system and is no longer available.

Unsharing perspectives and sources

Perspectives and sources can be removed from their parent components. For example, you can remove a perspective from a display.

Before you begin

- You must be [authorized to modify displays](#).
- You must be [granted the *Modify perspectives* user privilege](#).

What you should know

You can also remove a perspective or source from a parent entity by selecting it in the Editor View and pressing `BACKSPACE`.

To unshare a perspective or source:

- 1 From the home page, open the Barco CMS task.
- 2 In the Barco View, make sure you are in Tree view by moving the slider from **List** to **Tree**.
- 3 Right-click a perspective or source, and click **Unshare**.
- 4 Click **Apply**.

The item is removed from its parent entity, but it is not deleted from the system.

Modifying grid settings

From the Barco View you can enable and disable grid snapping, as well as set up how many rows and columns a perspective or display layout has.

Before you begin

- You must be [authorized to modify displays](#).
- You must be [granted the *Modify perspectives* user privilege](#).

To modify grid setting:

- 1 From the home page in Config Tool, open the Barco CMS task.
- 2 In the Barco View, double-click the perspective or display you want to modify.
- 3 In the top right corner of the task window, click **Edit grid** (✎).
- 4 In the grid options dialog box, modify the following grid settings:
 - **Enable grid snap:** Select this option to make a source or perspective “snap” to the nearest grid lines when dragged into the Editor View.
 - **Draw grid lines:** Select this option to display the grid lines in the Editor View.
 - **Row count:** Enter the number rows you want in your perspective or display layout. The maximum is 100.
 - **Column count:** Enter the number of columns you want in your perspective or display layout. The maximum is 100.
 - **Description:** Enter a description to describe the perspective.

- 5 Click **Apply**.

Adding perspectives to displays

You can drag and drop any perspective from the Barco View onto a display.

Before you begin

You must be [authorized to modify displays](#).

To add a perspective to a display:

- 1 From the home page in Config Tool, open the Barco CMS task.
- 2 In the Barco View, double-click the display you want to modify.
- 3 From the Barco View, drag a perspective onto the Editor View.

NOTE: Dragging a perspective onto an existing perspective replaces that perspective.

- 4 Click **Apply**.

Adding sources to perspectives

You can drag any source (sequence or camera) from the Barco View or the Security Center Logical View onto a perspective.

Before you begin

You must be [granted the *Modify perspectives* user privilege](#).

What you should know

When you add a sequence to a perspective, one source is shown in the Barco CMS task, whereas two identical sources are shown in the Barco Sidebar. If you delete only one of the sources from the Sidebar, there is a twenty second delay before the other source is removed by the plugin. Therefore to avoid issues, it is recommended to delete both sequence sources from the Sidebar at the same time.

TIP: You also can [drag a source onto a display](#) and a perspective will automatically be created for that source. However, you must be authorized to add sources to displays.

To add a source to a perspective:

- 1 From the home page in Config Tool, open the Barco CMS task.
- 2 In the Barco View, double-click the perspective to open it in the Editor View.
- 3 Drag the desired source onto the Editor View.
- 4 Click **Apply**.

Adding sources to displays

You can drag any source (sequence or camera) from the Barco View or the Security Center Logical View onto a display.

Before you begin

You must be [authorized to modify displays](#).

What you should know

When you drag a source onto a display, a perspective is automatically created for that source.

To add a source to a display:

- 1 From the home page in Config Tool, open the Barco CMS task.
- 2 In the Barco View, double-click the display to open it in the Editor View.
- 3 Drag the desired source onto the Editor View.
- 4 Click **Apply**.

Creating perspectives

You can create new perspectives to add to your display.

Before you begin

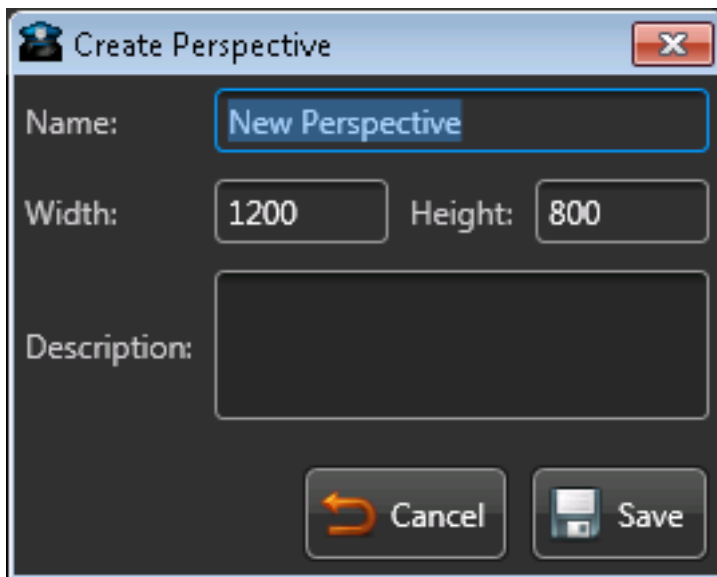
You must be [granted the *Modify perspectives* user privilege](#).

What you should know

You can also create a new perspective by editing an existing perspective and then clicking **Save as copy**.

To create a perspective:

- 1 From the home page in Config Tool, open the Barco CMS task.
- 2 In the bottom-left corner of the task window, click **Add perspective** (+).
- 3 In the **Name** field, enter a name for the new perspective.



- 4 Enter a **Width** and **Height**.

The **Width** and **Height** affect the default size of entities that are dragged into the new perspective, as well as the default size of the perspective when it is added to a display. The perspective can also be resized in the Editor View to cover any size of display.

- 5 Enter a **Description** for the perspective.
- 6 Click **Save**.

The new perspective appears in the Barco View.

Renaming displays

You can rename a Barco CMS display.

Before you begin

You must be [authorized to modify displays](#).

To rename a display:

- 1 From the home page in Config Tool, open the Barco CMS task.
- 2 In the Barco View, double-click the display you want to modify.
- 3 At the top of the Editor View, click the name of the display and type the new name.
- 4 Click **Apply**.

Renaming perspectives

You can rename a perspective at any time using the Editor View or the Tree view in the Barco View.

Before you begin

You must be [granted the *Modify perspectives* user privilege](#).

What you should know

From the Tree view in the Barco View you can rename more than one perspective at a time. All name changes are applied once you click **Apply**.

To rename a perspective using the Editor View:

- 1 From the home page in Config Tool, open the Barco CMS task.
- 2 In the Barco View, double-click the perspective you want to modify.
- 3 At the top of the Editor View, click the name of the perspective and type the new name.
- 4 Click **Apply**.

To rename a perspective using the Barco View:

- 1 From the home page in Config Tool, open the Barco CMS task.
- 2 In the Barco View, click the perspective you want to modify, wait a little, and then click it again.
- 3 Type a name for the perspective.
- 4 Click **Apply**.

Keyboard shortcuts for modifying Barco CMS display layouts

The following table lists the keyboard shortcuts that can be used to modify layouts in the Editor View.

Description	Shortcut
Resize a component using a fixed aspect ratio.	SHIFT
Delete a selected component from the Editor View.	BACKSPACE
Delete all components in the Editor View.	SHIFT+BACKSPACE
Bring a component to front (one level).	CTRL+PLUS SIGN (+)
Send a component to back (one level).	CTRL+HYPHEN (-)
Bring a component completely to front.	CTRL+SHIFT+PLUS SIGN (+)
Send a component completely to back.	CTRL+SHIFT+HYPHEN (-)
Move component by 1 pixel ¹	CTRL+ARROW KEY (any direction)
Move component by 1 tile ²	CTRL+SHIFT+ARROW KEY (any direction)

¹ If grid snapping is enabled, this shortcut will move the component by 1 tile.

² If grid snapping is not enabled, the component is moved by a distance that equals 10% of the Editor View size.

Investigating user related activity with the Barco CMS task

Using the Barco CMS activities report, you can view configuration changes made by users through the Barco CMS task.

What you should know

For example, you can use the Barco CMS activities report to find out who created and shared a perspective, who created and shared a source, who unshared a perspective, who edited a perspective, or who removed a perspective from a display.

To investigate user activities through the Barco CMS task:

- 1 From the home page in Security Desk, open the **Barco CMS activities** report.
- 2 In the **Entities** filter, select the users to investigate.
- 3 In the **Activities** filter, select the activities performed by the users:
 - **Create perspective:** Who created a new perspective.
 - **Create source:** Who created a new source.
 - **Edit display:** Who added, resized, or moved perspectives on a display.
 - **Edit perspective:** Who added, resized, or moved sources within a perspective.
 - **Remove perspective:** Who removed a perspective from a display.
 - **Remove source:** Who removed a source from a perspective.
 - **Share perspective:** Who made a perspective visible on a display.
 - **Share source:** Who made a source visible in a perspective, whether the perspective is shared on a display or not.
 - **Unshare perspective:** Who made a perspective invisible on a display.
 - **Unshare source:** Who made a source invisible in a perspective, whether the perspective is shared on a display or not.
- 4 Set up the other query filters for the report. Choose from one or more of the following filters:
 - **Displays:** Displays associated with the activities performed.
 - **Perspectives:** Perspectives associated with the activities performed.
 - **Sources:** Sources associated with the activities performed.
 - **Time range:** Define the time range for the query.
- 5 Click **Generate report**.

The activity results are listed in the report pane.

Where to find product information

You can find our product documentation in the following locations:

- **Genetec Technical Information Site:** The latest version of the documentation is available from the [Documents](#) page of the Technical Information Site. To access the Technical Information Site, simply log on to [GTAP](#) and click the tab for the Technical Information Site.
- **Installation package:** The documentation is available in the Documentation folder of the installation package. Some of the documents also have a direct download link to the latest version of the document.
- **Help:** Security Center client and web-based applications include help, which explain how the product works and provide instructions on how to use the product features. Patroller and the Sharp Portal also include context-sensitive help for each screen. To access the help, click **Help**, press F1, or tap the ? (question mark) in the different client applications.

Technical support

Genetec Technical Assistance Center (GTAC) is committed to providing its worldwide clientele with the best technical support services available. As a Genetec customer, you have access to the Genetec Technical Information site, where you can find information and search for answers to your product questions.

- **Genetec Technical Information Site:** Browse over 5000 articles or download one of our many technical publications to find information on how to deploy and use Genetec products. Prior to contacting GTAC or opening a support case, it is recommended to search the Technical Information Site for potential fixes, workarounds, or known issues. To access the Technical Information Site, simply log on to [GTAP](#) and click the tab for the Technical Information Site.
- **Genetec Technical Assistance Center (GTAC):** Live support is available during business hours over the phone or using GTAP chat at <https://gtap.genetec.com/Cases>. For GTAC's contact information in your region see the Contact page at <https://gtap.genetec.com>.

NOTE: To obtain phone support, you must provide a certification number and the last six digits of your system ID. Refer to the [Genetec Training FAQ](#) for more information.

NOTE: To open a case with GTAC, you must provide your System ID (Omnicast, Synergis and Security Center) and/or SMA contract number. In addition, for Genetec hardware controllers and appliances, you'll need the software revision number (image version).

Additional resources

If you require additional resources other than the Genetec Technical Assistance Center, the following is available to you:

- **GTAP Forum:** The Forum is an easy-to-use message board that allows clients and Genetec staff to communicate with each other and discuss a variety of topics, ranging from technical questions to technology tips. You can log in or sign up at <https://gtapforum.genetec.com>.
- **Technical training:** In a professional classroom environment or from the convenience of your own office, our qualified trainers can guide you through system design, installation, operation, and troubleshooting. Technical training services are offered for all products and for customers with a varied level of technical experience, and can be customized to meet your specific needs and objectives. For more information, go to <http://www.genetec.com/Services>.