



ORBNET
SYSTEMS

Bosch B&G Series Module for XProtect

Installation, Setup, and User guide



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Prerequisites

Software and Licensing

Microsoft System Requirements

- Microsoft® Windows® 10 Pro (64 bit)
- Microsoft® Windows® 10 Enterprise (64 bit)
- Microsoft® Windows® 10 Enterprise LTSC 2016 (version 1607 or later)
- Microsoft® Windows® 10 IoT Enterprise, version 1803 or later (64 bit), IoT Core

- Microsoft® Windows® Server 2016 (64 bit): Essentials, Standard and Datacenter
- Microsoft® Windows® Server 2019 (64 bit): Essentials, Standard and Datacenter

Milestone XProtect System Requirements

- XProtect Express+, Professional+, Expert, Corporate 2020 R1 (20.1a) or above

- Milestone Event Server
 - The Event Server is included as part of you Milestone installation. ***Note*** *If this component has not been installed with your version follow the steps found in troubleshooting at the end of this document.*

- Milestone License
 - No additional license is required for Milestone for this integration

Bosch B&G Series

- IP Address of panel to be connected

- Automation Passcode of panel to be connected

ORBNET Systems

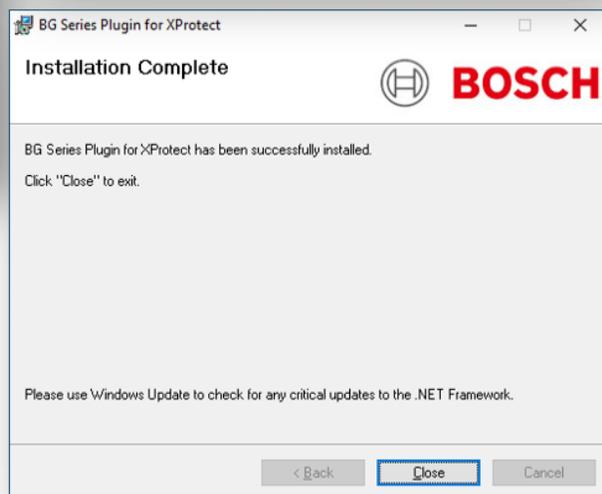
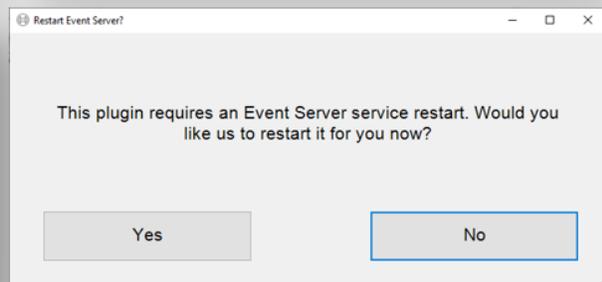
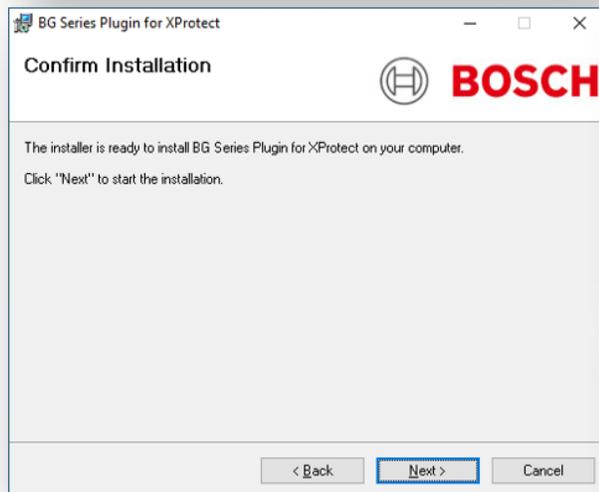
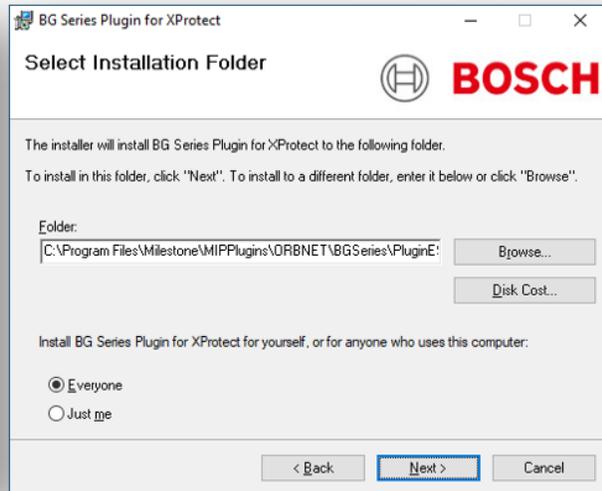
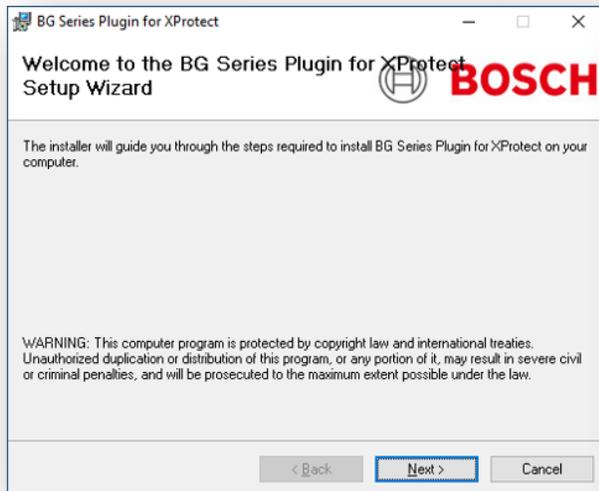
- Installer – ‘Bosch B&G Series for XProtect Setup.msi’
Available to download from <https://orbnet.com/Bosch-B&G/>
Once registered and signed into the website

- License – The product is licensed based on the number on panels and alarm points.
 - Please see the BG Series License Settings section of this document for further details on how to make a license request.

Installation of Bosch B&G Series for XProtect

Begin with the server/machine running the XProtect Management and Event Server. Close any open Milestone Smart Clients or Management Clients first. Place the 'Bosch B&G Series for XProtect Setup.msi'

in a folder on the desktop and double click and select 'Install.' During installation, a window will appear behind the installer to request restart of the Milestone Event Server.

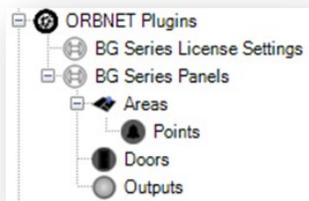


Configuration

Milestone Management Setup

This integration allows for your B&G Series system to be directly connected to Milestone's XProtect VMS (Video Management Software). It is designed to fit perfectly with any XProtect system. No matter your installation size, with XProtect you can control your video cameras and B&G Series system from a central interface in the Milestone Management and Smart Client applications.

Find and Select ORBNET Plugins in the Milestone Management client tree menu.



BG Series License Settings

This page provides a dashboard overview of your ORBNET Systems licenses for the BG Series module.

From the point of installation, this ORBNET Systems software will provide a 30-day trial license. This will allow 10 Panels and up to 10,000 Alarm points to be connected. After the 30-day time has lapsed a license request will need to be made to validate the license.

The Licensed panels can be dynamically updated as required. Use the Revoke License and Apply License buttons with the panel in question selected to update.

The screenshot shows the 'BG Series License Manager' configuration window. It is divided into several sections:

- License:** A section with a note: "Please select which features you want to activate before exporting the license. Changing these options has no effect on the trial license, which has all features enabled."
- 1. License Info:** A list of fields including Client Name (with a placeholder), Days Valid (30), Client Id, Unique Id, Hash Code, and Unique Client Number (1638435792004).
- 2. Plugin Features:** Fields for Max Active B or G Alarm (10) and Max Alarm Points (10000).
- Time left:** 8 days, 21 hours, 59 minutes, 36 seconds.
- Used Alarm Points:** 12/10000.
- Used Alarm Panels:** 1/10.
- Buttons:** 'Export license request' and 'Import valid license'.
- Client Name:** A text input field.
- Detected Alarm Panels:** A section with instructions "Use apply / revoke to choose which alarm panels are licensed." and three buttons: 'Refresh', 'Apply License', and 'Revoke License'.
- Table:** A table with columns: Id, Name, Total Alarm Points, and Is Licensed. It contains two rows of data.

Id	Name	Total Alarm Points	Is Licensed
d43d92ba-da48-4cd1-bfb...	BG Panel	12	True
86e21fb9-6445-4600-988...	BG Panel	0	False

License Request

When making a license request please ensure these fields are filled (highlighted in bold).

- 1a – Client Name
- 2a – Max. Active B or G Alarm Panels
- 2b – Max. Alarm Points

Click Export license request and save. email the license request to purchase@orbnet.com.

Once the activated license is returned used Import valid license to activate your system.

License

Please select which features you want to activate before exporting the license. Changing these options has no effect on the trial license, which has all features enabled.

1. License Info	
a. Client Name	[Please enter your company name]
b. Days Valid (-1 == Unlimit)	30
c. Client Id	1d1651e3-eb71-4df0-88ef-7b000b1
d. Unique Id	DE84F5F9-5B04-46B9-B3AE-D95A
e. Hash Code	
f. Unique Client Number	1638435792004
2. Plugin Features	
a. Max Active B or G Alarm	10
b. Max Alarm Points	10000

Used Alarm Points: 12/10000
Used Alarm Panels: 1/10

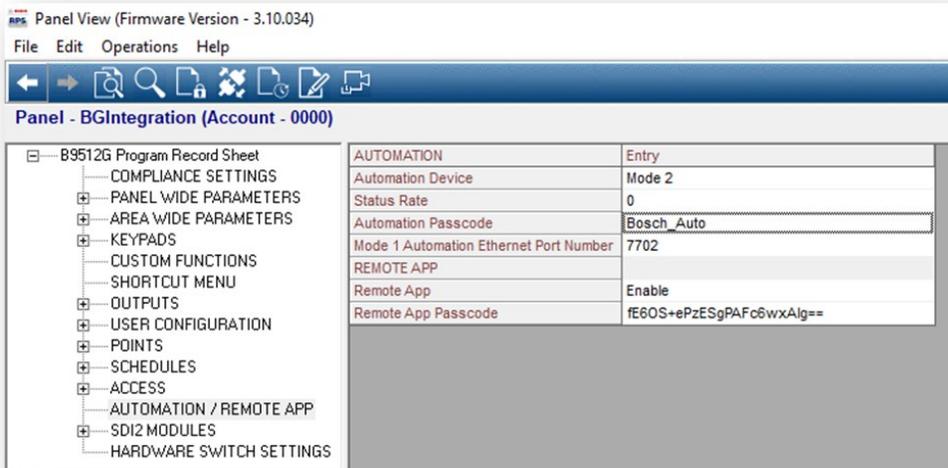
Export license request

Import valid license

a. Client Name

BG Series Panels

For each panel you will need the IP address and Automation Passcode. This will be entered into Milestone to connect the panel to the XProtect system. Below shows where the Automation Passcode is gathered or changed within the Bosch Remote Programming Software (RPS).



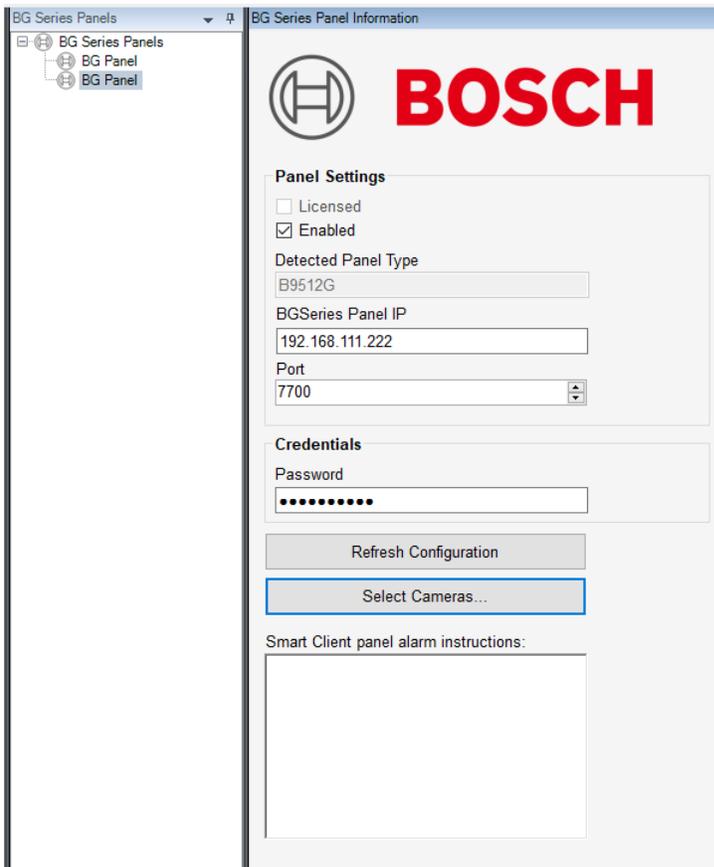
From this menu you can add, remove, and manage the connected panels.

Right click the BG Series Panels text to access the Add New option.

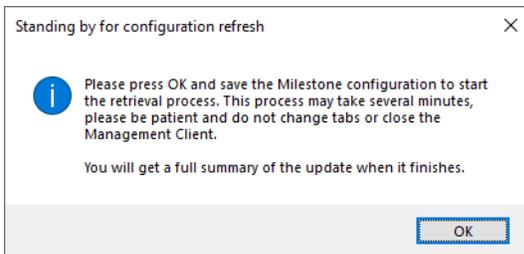


A new controller will be added to the list. This section covers the connection details and licensing.

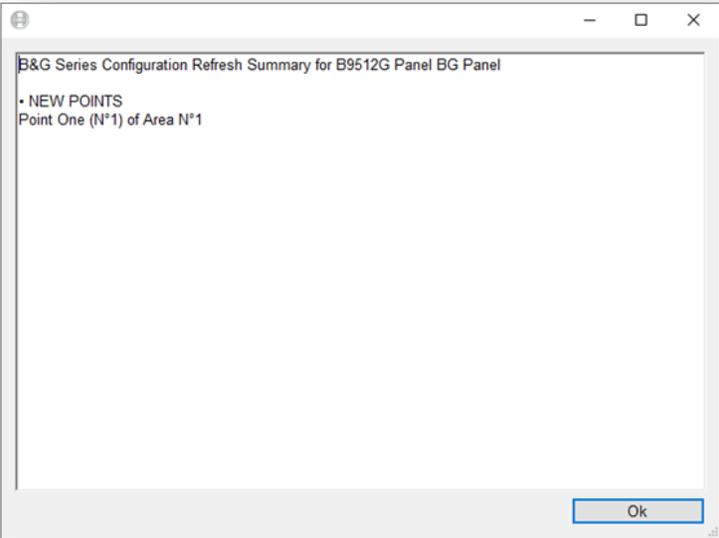
- **Panel Settings**
 - License – Tick option
 - Enable – Ticked option, untick to disable
 - BG Series Panel IP – IP Address field
 - Port – Panel Port (7700 default)
 - Password – Automation Passcode for panel
 - Refresh Configuration – This will query the panel to update with any missing or new components
 - Select Cameras – For cameras that would be associated to the panel only
 - Smart Client panel alarm instructions – The message that will display with the relevant alarm from this panel



When a new panel information is filled out click Refresh Configuration then OK on the below dialogue followed by the Milestone Save button , then the panel will be queried. The relevant connected devices will be downloaded from the panel. This can take a couple of minutes to complete.

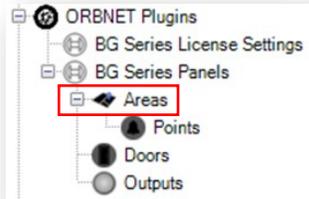


Once this process is completed you will receive a pop-up message. This will show whether any changes have been detected. Press Ok when done, all changes will be shown in the relevant section.



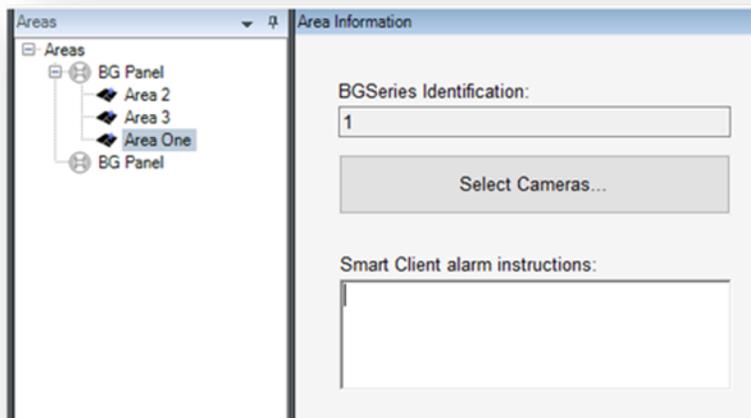
Areas

Within the Areas section of the plugin the enabled Areas from the panel will be shown.



This window provides access to the available Area settings.

Add related cameras using Select Cameras and alarm instructions for an operator in the Smart Client using Smart Client alarm instructions.



Areas as shown in the Bosch Remote Programming Software (RPS).

Panel View (Firmware Version - 3.10.034)

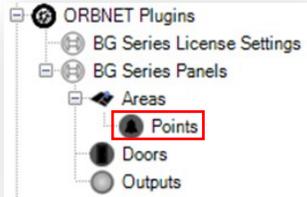
File Edit Operations Help

Panel - BGIntegration (Account - 0000)

Area 1 - 16	Area 1	Area 2	Area 3	Area 4
Area Name Text	Area One	Area 2	Area 3	Area 4
Area Name Text (Second Language)				
Area On	Yes	Yes	Yes	No
Account Number	0000	0000	0000	0000
Force Arm / Bypass Max	2	2	2	2
Delay Restorals	No Delay	No Delay	No Delay	No Delay
Exit Tone	Yes	Yes	Yes	Yes
Exit Delay Time	10	10	60	60
Auto Watch	Manual	Manual	Manual	Manual
Restart Time	5	5	5	5
Duress Enable	No	No	No	No

Points

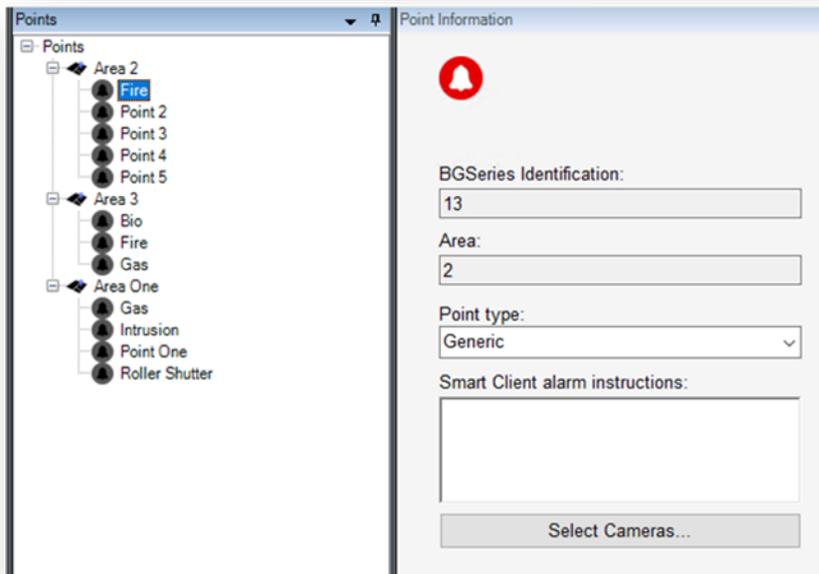
Within the Points section of the plugin the enabled Points in an Area from the panel will be shown.



This window provides access to the available Point settings.

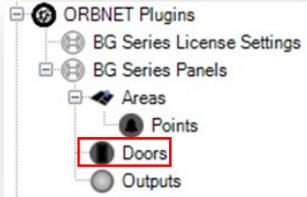
Each of the points has an option to select the Point Type. This relates to the icon that is shown for each point relevant to the point type.

Add related cameras using Select Cameras and alarm instructions for an operator in the Smart Client using Smart Client alarm instructions.



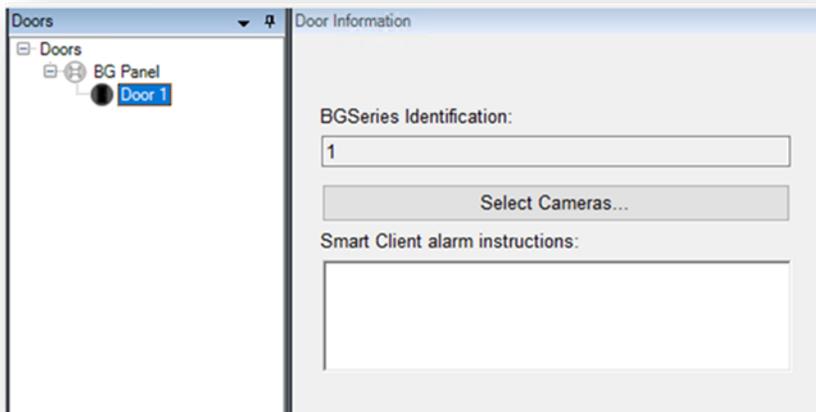
Doors

Within the Door section of the plugin the enabled Doors from the panel will be shown.



This window provides access to the available Door settings.

Add related cameras using Select Cameras and instructions for an operator in the Smart Client using Smart Client alarm instructions.



Doors as shown in the Bosch Remote Programming Software (RPS).

Panel View (Firmware Version - 3.10.034)

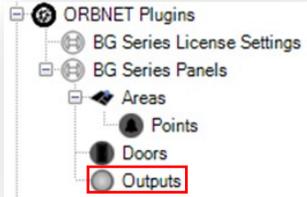
File Edit Operations Help

Panel - BGIntegration (Account - 0000)

B9512G Program Record Sheet		Doors 1 - 32	Door 1	Door 2
COMPLIANCE SETTINGS		Door Name Text	Door 1	Door 2
PANEL WIDE PARAMETERS		Door Name Text (Second Language)		
AREA WIDE PARAMETERS		Door Source	SDI2 (B901)	Disabled
KEYPADS		Entry Area	1	1
CUSTOM FUNCTIONS		Associated Keypad #	Keypad 1	No Keypad
SHORTCUT MENU		Custom Function	Disabled	Disabled
OUTPUTS		Door Point	9	0
USER CONFIGURATION		Door Point Debounce	600ms	600ms
POINTS		Interlock Point	0	0
SCHEDULES		Auto Door	No	No
<ul style="list-style-type: none"> Open/Close Windows <ul style="list-style-type: none"> Open/Close Window Open/Close Window User Group Windows Skeds Holiday Indexes 		Fire Unlock	No	No
ACCESS		Disarm On Open	Yes	No
		Strike Time	10	10
		Shunt Time	10	10
		Buzz Time	2	2
		Extend Time	10	10

Outputs

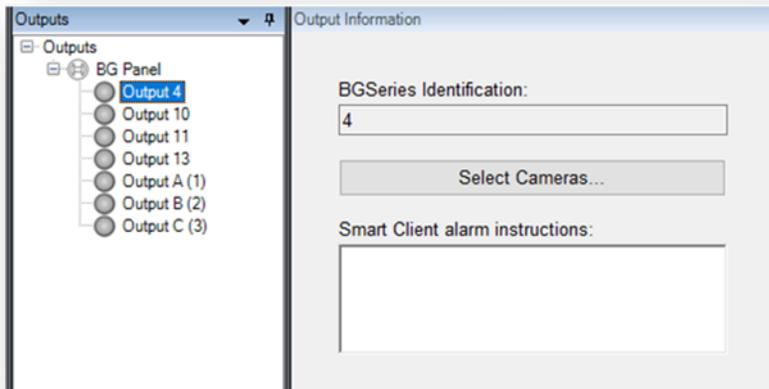
Within the Outputs section of the plugin the enabled Outputs from the panel will be shown.



This window provides access to the available Door settings.

Add related cameras using Select Cameras and instructions for an operator in the Smart Client using Smart Client alarm instructions.

From here test commands can be sent for the selected Output. This provides options to send Output On, Output Off .



Outputs as shown in the Bosch Remote Programming Software (RPS).

Panel View (Firmware Version - 3.10.034)
 File Edit Operations Help

Panel - BGIntegration (Account - 0000) **Outputs Assigned:7**

Output Assignments	Output Source	Output Text	Output Text (Second Language)	Output Profile	Hide From User
Output A(1)	On-board A	Output A (1)		0: Unassigned	No
Output B(2)	On-board B	Output B (2)		2: Pulse	No
Output C(3)	On-board C	Output C (3)		0: Unassigned	No
Output 4	ZONEX	Output 4		4: Fire Alarm	No
Output 10	Unassigned	Output 10		3: Activate Point	No
Output 11	Unassigned	Output 11		5: Gas Alarm	No
Output 13	Unassigned	Output 13		4: Fire Alarm	No

B9512G Program Record Sheet
 COMPLIANCE SETTINGS
 PANEL WIDE PARAMETERS
 AREA WIDE PARAMETERS
 KEYPADS
 CUSTOM FUNCTIONS
 SHORTCUT MENU
 OUTPUTS
 Area Wide Outputs
 Output Area 1 - 16
 Output Area 17 - 32
 Panel Wide Outputs
 Output Assignments

Bosch B&G Series in Milestone Rules and Alarms

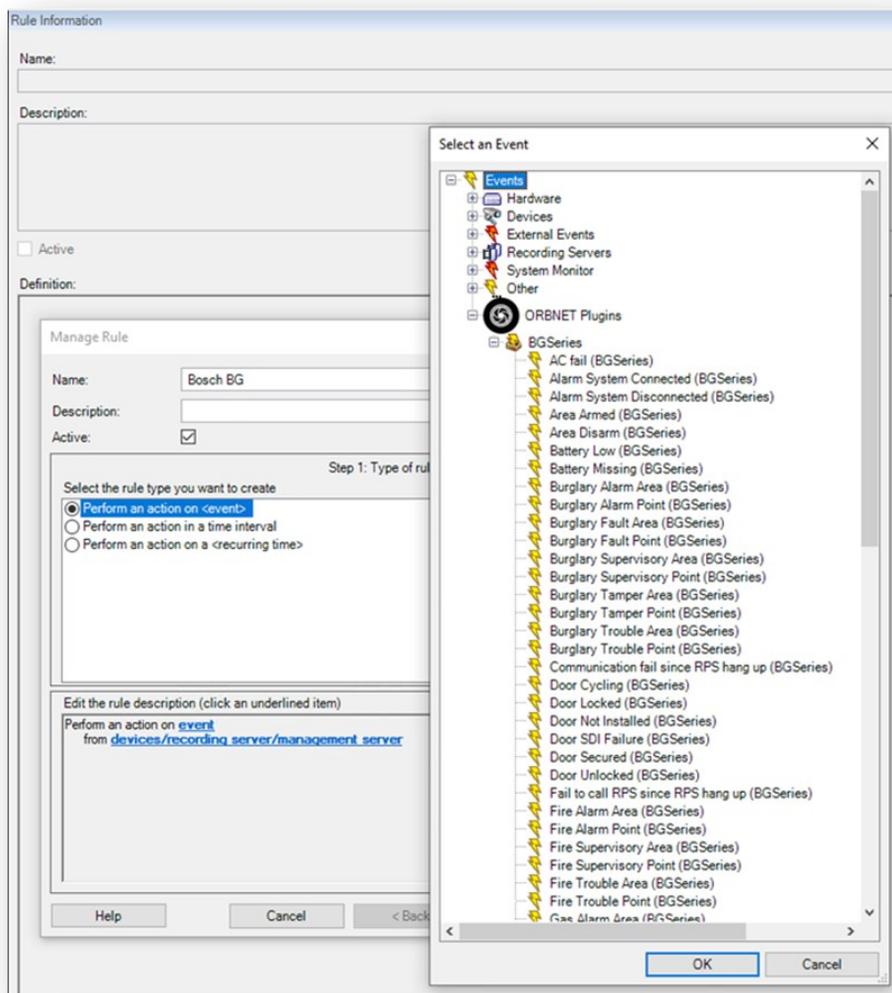
Rules

Milestone Rules provide an action on event, this B&G Series integration provides In-bound events from a panel to Milestone and Out-bound actions from Milestone to a panel.

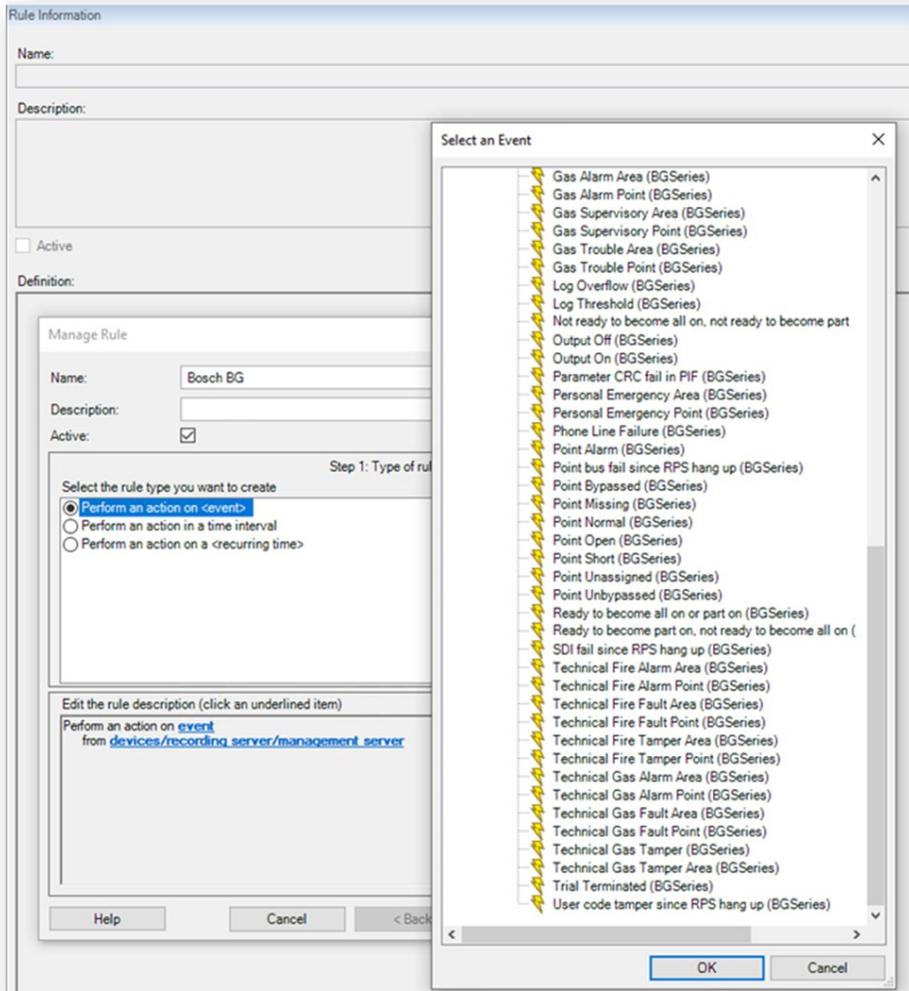
To access the B&G Series Control events in Milestone find Rules and Events > Rules section in the Management Client.

Select this and then right click Rules in the center column to Add rule...

- Perform an action on (<event>)
 - Select and expand ORBNET Plugins
 - Expand the BGSeries list to see all available events

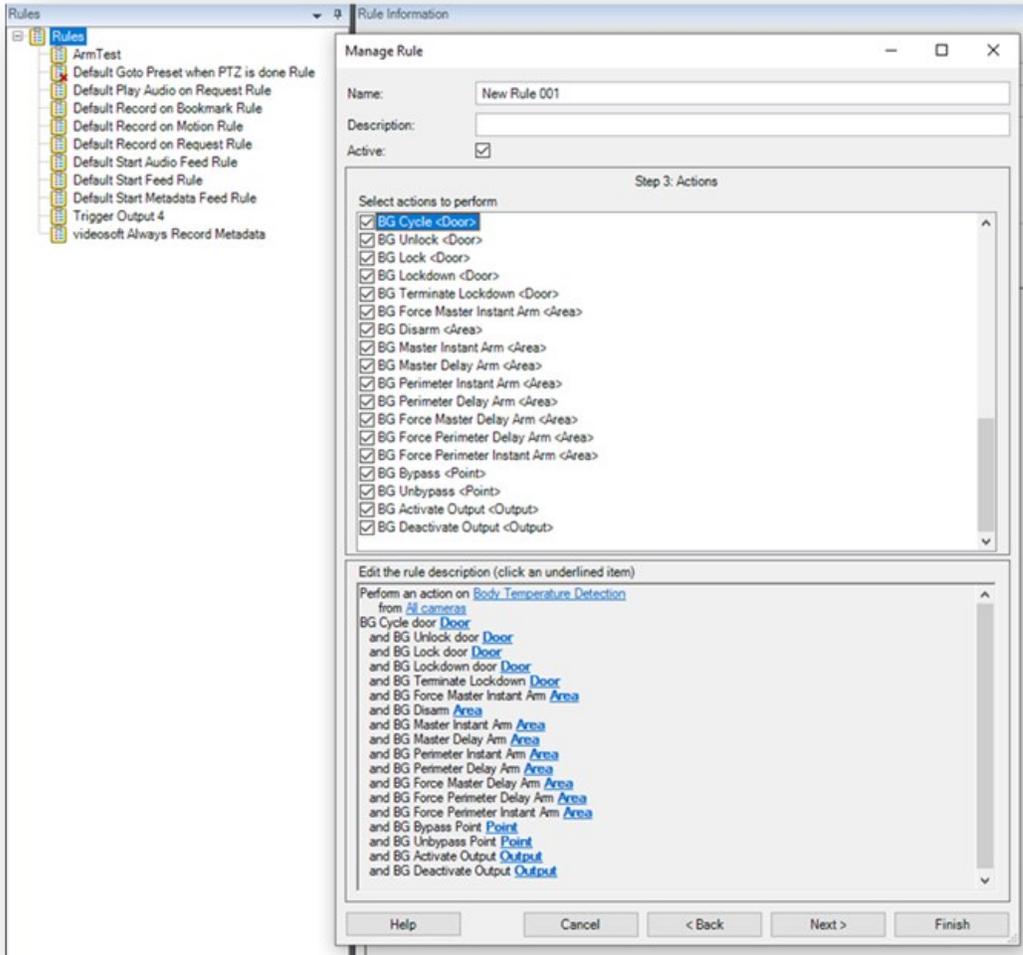


Continued list of events



Once the event has been selected you can select actions to perform when this event is triggered. These are out-bound actions triggered from Milestone to the Bosch B&G panel.

Each option can be selected by ticking the relevant box, more than one action can be triggered for the event used to trigger

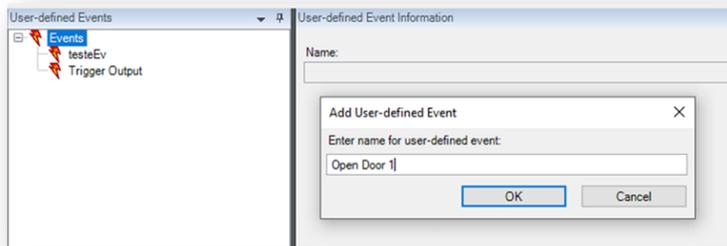


User-defined Events

Often overlooked the User-defined Event allows easy access to the control of an out-bound actions from Milestone and the Smart Client. The initial setup of the User-defined event is as a placeholder for a Rule.

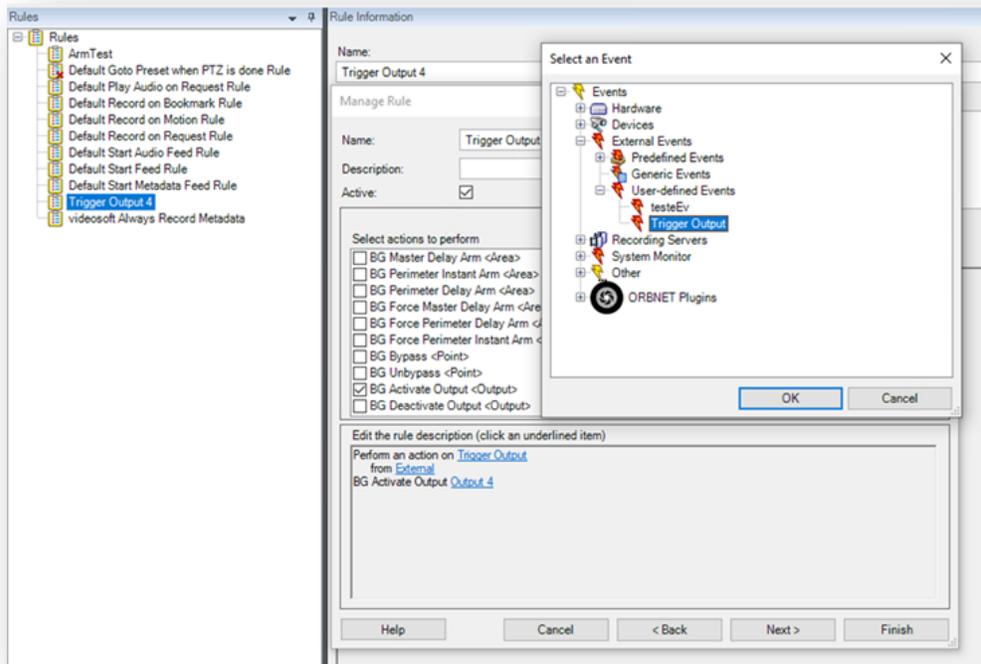
Under Rules and Events select User-defined Events, right click and Add User-defined Event

This provides just a name field, fill this with a name relevant to the action you intend to add. Remember that this is the name of the event shown at the Smart Client.



Back in Rules create a new rule and select the User-defined event that was created.

- Perform an action on <event>
- Events > External Events > User-defined Events
- Click Next, Select the relevant action to be performed on the Bosch panel by selecting the tick box/s.

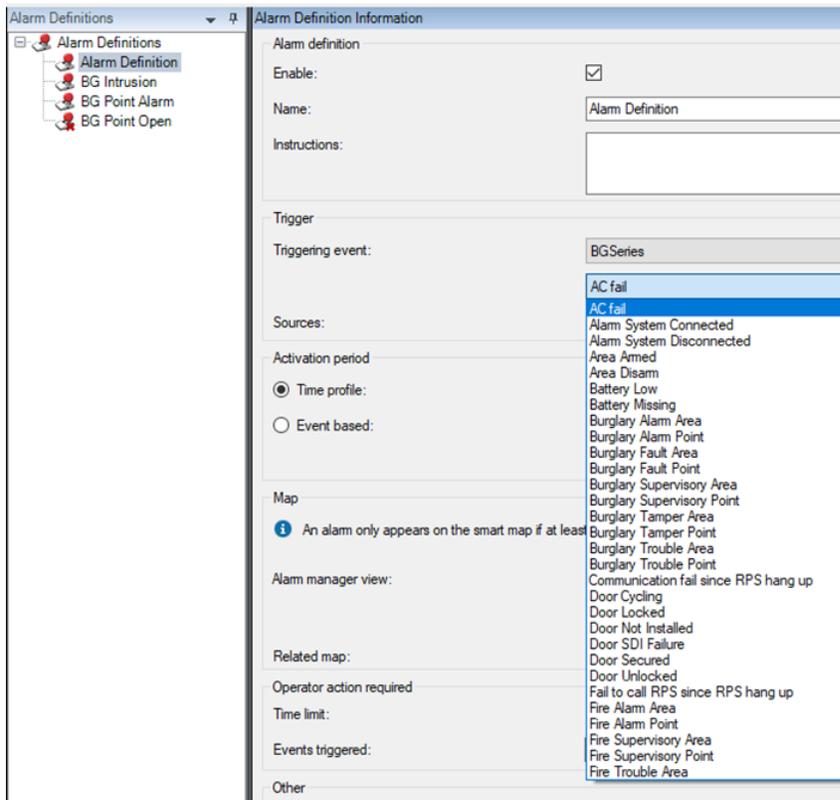


Alarm definitions

In the Milestone Management alarms can be created from in-bound Bosch B&G Series panel events. These events are added to the Alarm stack in the Milestone Smart Client and will highlight an Area, Point, Door or Output on a Map with a round red circle when triggered.

The below alarm shows how to add a Triggering event:

- Select BGSeries from the dropdown list
- Select the relevant event from your B&G panel
- Select the Source for this event

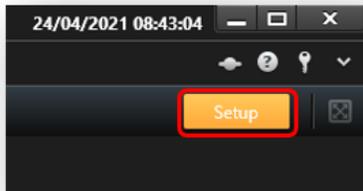


If you wish to use Events triggered in the Alarm Definition you will have to create User-defined Event. Follow the steps in the last section.

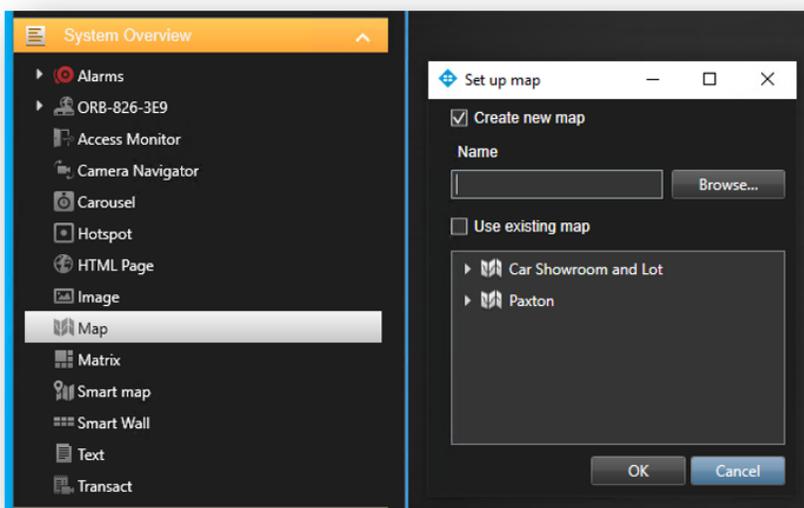
Smart Client

Maps Setup

Once logged into the Smart Client enter Setup mode via the right-hand site menu.

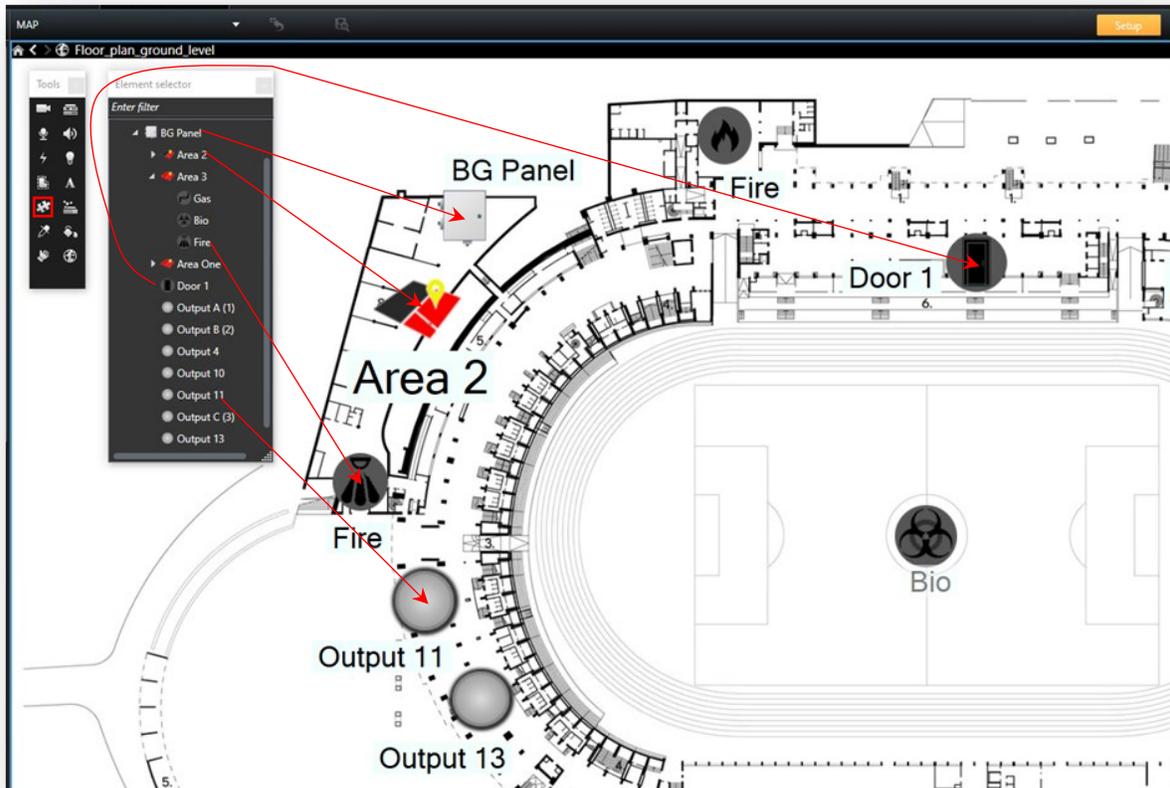


Under Setup create a new layout (Recommended view layout 4:3 > 1x1), drag the Map component into the blank tile. Select a floorplan image representing your site layout using Browse. The name of the image will show as the map title for future reference.



All the Bosch B&G components can be added to a map created within the Milestone Smart Client.

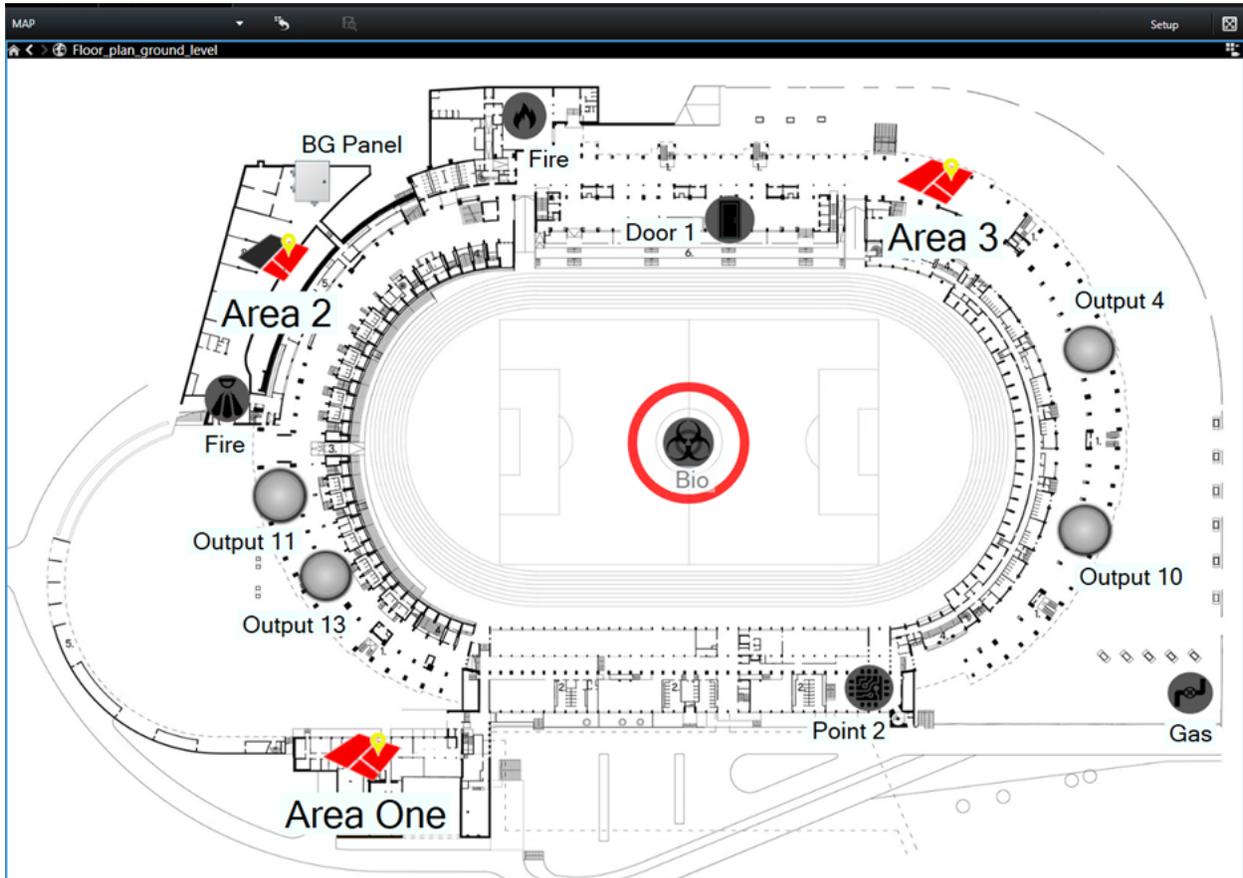
Use Add Plug-In Element (Puzzle piece) from the Tools menu.



Once out of setup mode the panel components (Areas, Points, Doors and Outputs) will show with the current states.

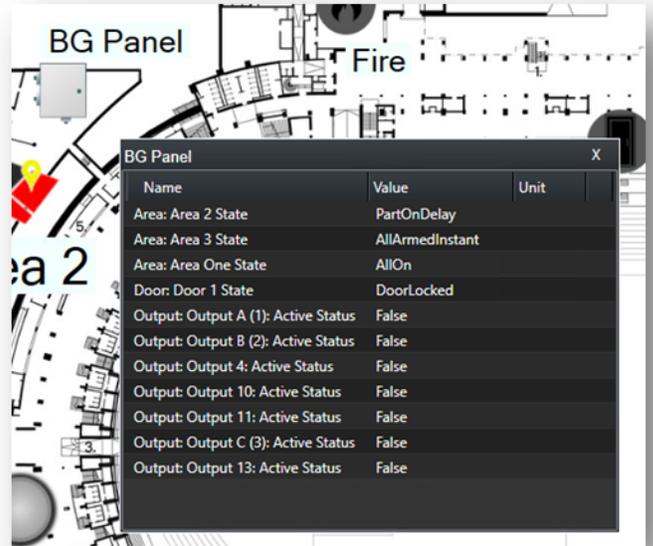
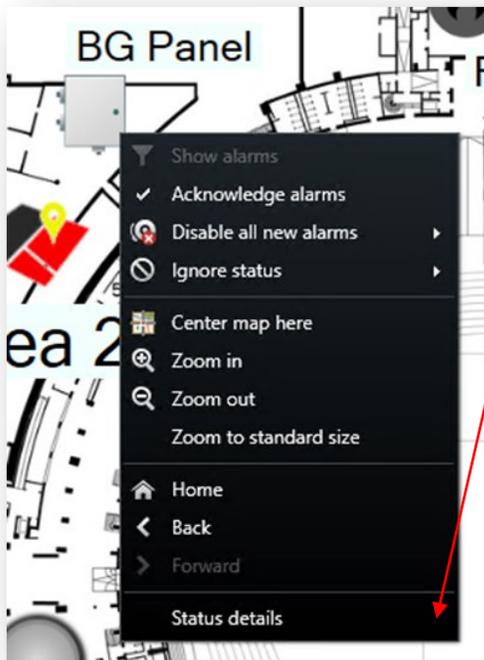
Below Area One and Area 3 are set, Area 2 is part set. All other points, doors and outputs are in a normal state. The center Bio alarm has a red ring, this would be flashing and shows an alarm definition has been triggered. There will also be a trigger shown in the alarm stack.

There are also several actions available to each component from the right click menu.



PANELS

STATUS DETAILS



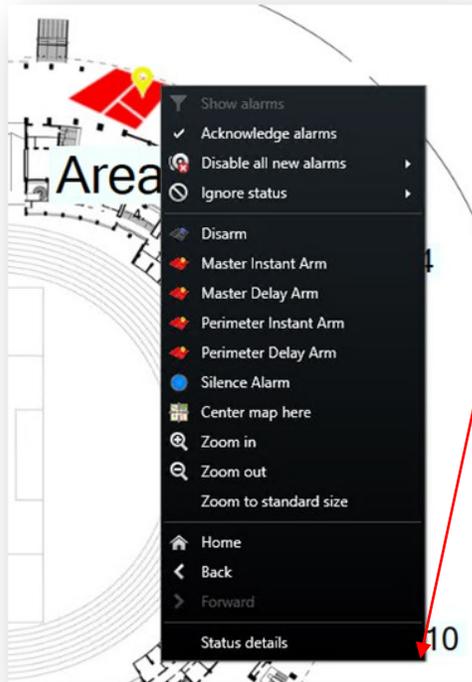
Relevant actions in list;

- [Show alarms] will switch to alarm stack and filter the alarms for the selected device
- [Acknowledge alarms] will do so in the Smart Client and at the Bosch panel
- [Disable all new alarms] will only do so in the Smart Client
- [Ignore stats] will only do so in the Smart Client
- -----
- -----
- [Status details] will show a floating screen with the relevant connected devices.

Component States



AREAS



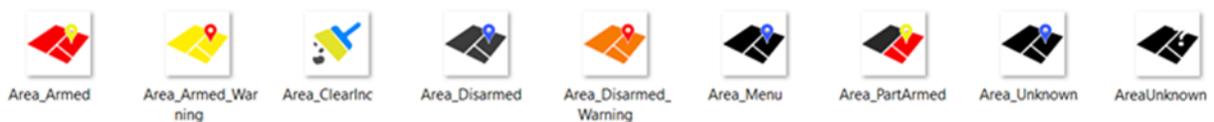
STATUS DETAILS

Name	Value	Unit
Area State	AllOn	
Area Ready State	AllReady	
Number of faulted points	0	
Point One State	Normal	
Intrusion State	Normal	
Roller Shutter State	Normal	
Gas State	Normal	

Relevant actions in list;

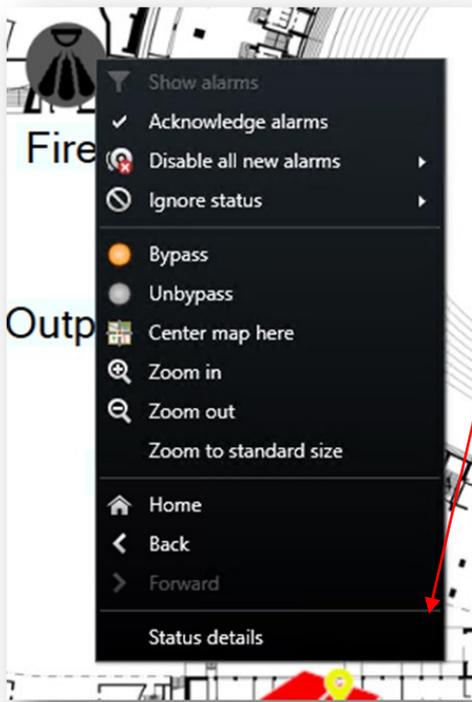
- [Show alarms] will switch to alarm stack and filter the alarms for the selected device
- [Acknowledge alarms] will do so in the Smart Client and at the Bosch panel
- [Disable all new alarms] will only do so in the Smart Client
- [Ignore stats] will only do so in the Smart Client
- -----
- [Disarm]
- [Master Instant Arm]
- [Master Delay Alarm]
- [Perimeter Instant Arm]
- [Perimeter Delay Alarm]
- [Silence Alarm]
- -----
- [Status details] will show a floating screen with the relevant connected devices.

Component States



POINTS

STATUS DETAILS



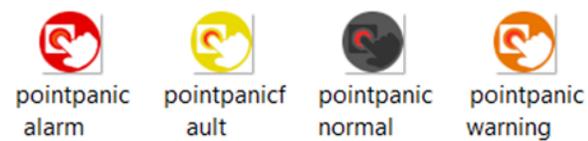
Name	Value	Unit
Area	Area 2	
Fire State	Normal	
Bypassed status	Not bypassed	

Relevant actions in list;

- [Show alarms] will switch to alarm stack and filter the alarms for the selected device
- [Acknowledge alarms] will do so in the Smart Client and at the Bosch panel
- [Disable all new alarms] will only do so in the Smart Client
- [Ignore stats] will only do so in the Smart Client
- -----
- [Bypass]
- [Unbypass]
- -----
- [Status details] will show a floating screen with the relevant connected devices.

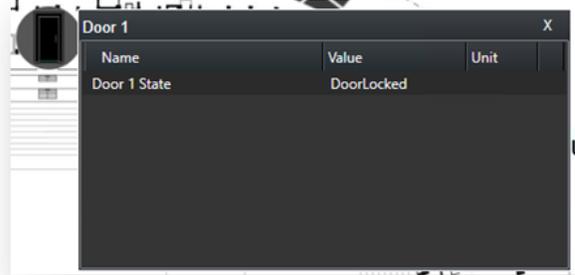
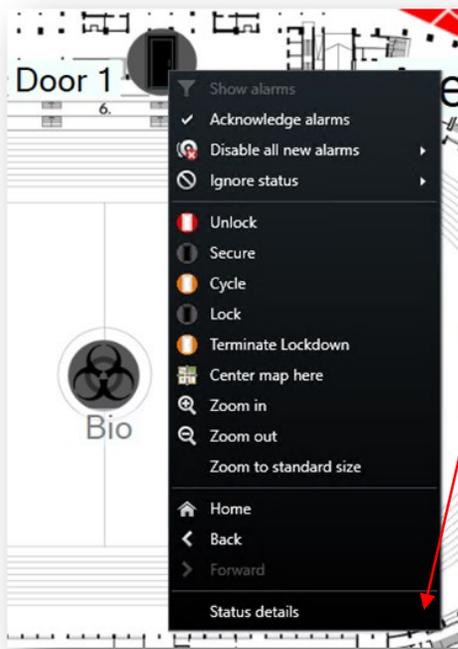
Component States

States are: [Alarm] : [Fault] : [Normal] : [Warning]



DOORS

STATUS DETAILS



Relevant actions in list;

- [Show alarms] will switch to alarm stack and filter the alarms for the selected device
- [Acknowledge alarms] will do so in the Smart Client and at the Bosch panel
- [Disable all new alarms] will only do so in the Smart Client
- [Ignore stats] will only do so in the Smart Client
- -----
- [Unlock]
- [Secure]
- [Cycle]
- [Lock]
- [Terminate Lockdown]
- -----
- [Status details] will show a floating screen with the relevant connected devices.

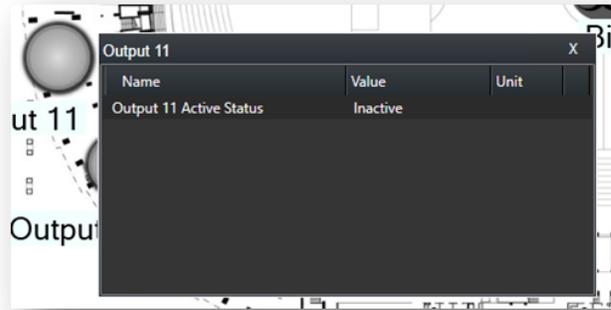
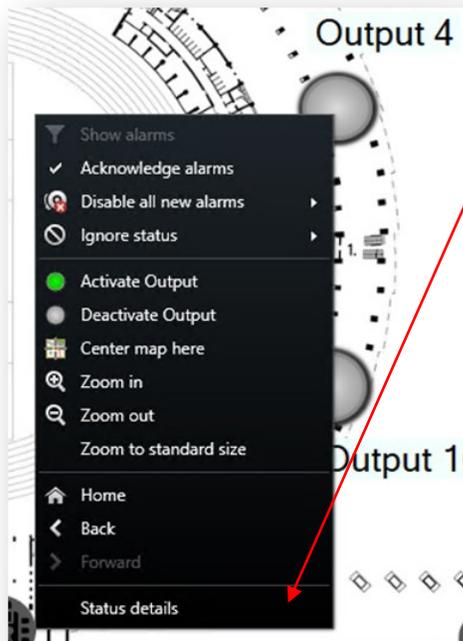
Component States

States are: [Alarm] : [Fault] : [Normal] : [Warning]



OUTPUTS

STATUS DETAILS



Relevant actions in list;

- [Show alarms] will switch to alarm stack and filter the alarms for the selected device
- [Acknowledge alarms] will do so in the Smart Client and at the Bosch panel
- [Disable all new alarms] will only do so in the Smart Client
- [Ignore stats] will only do so in the Smart Client
- -----
- [Activate Output]
- [Deactivate Output]
- -----
- [Status details] will show a floating screen with the relevant connected devices.

Component States



Alarm



Bypass



Disabled



Enabled



Silence

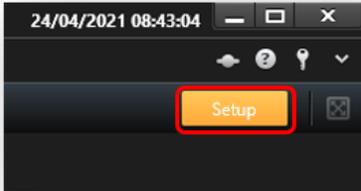


Unbypass

Other Controls

User-defined Event

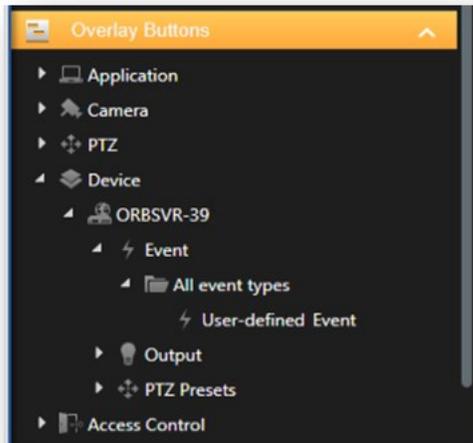
Once logged into the Smart Client enter Setup mode via the right-hand site menu.



From a layout that is already created, find Overlay Buttons > Device > {Server-Name} > Events > All Event Types > {User Created User-Defined Event}

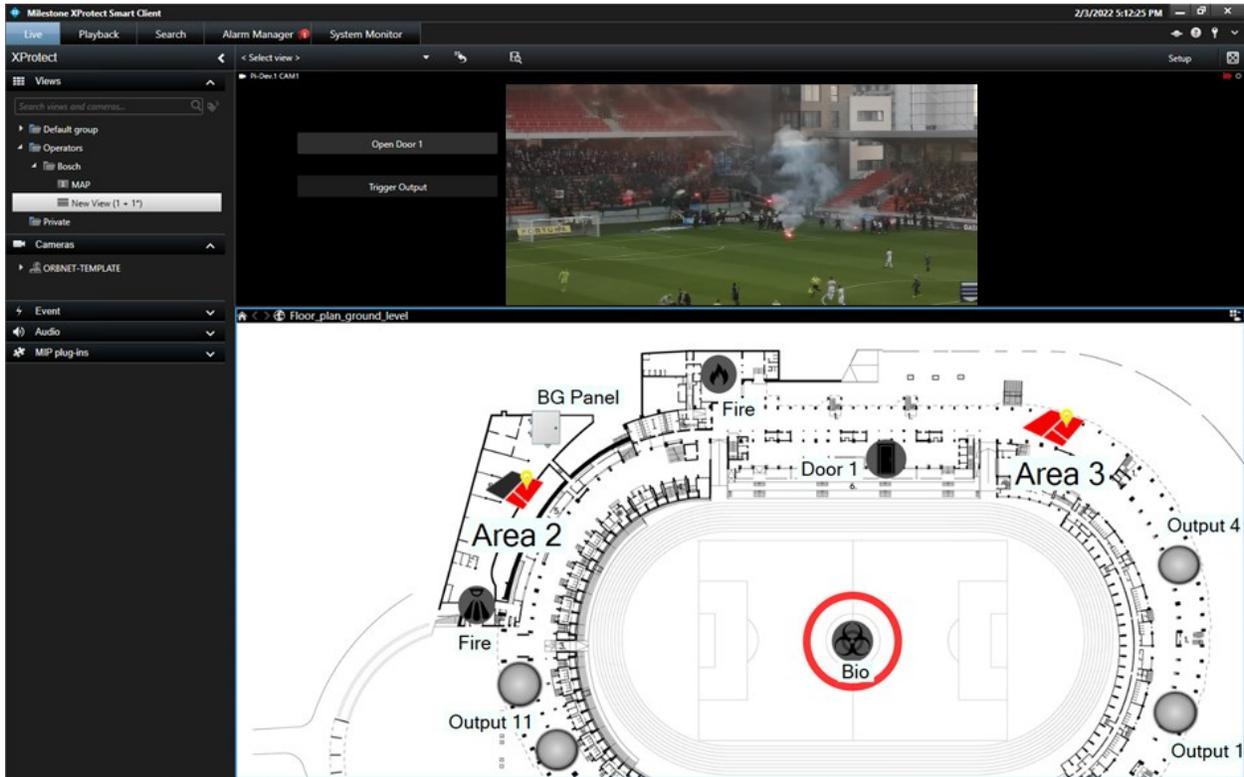
*** Note *** – See User-Defined Events section under Bosch B&G Series in Milestone Rules and Alarms in this document for more information.

Drag and drop this onto a tile, this will show as a push button over the camera tile.



When out of setup in Live mode, you will see the Overlay button only when the mouse is hovered over the camera tile. These can only be used in a camera tile.

As shown below, open Door 1 and Trigger Output



Troubleshooting

Event Server Installation

If Milestone was installed via a custom installation, the Event service may not have been included as it is not always required.

From the server/machine with the Milestone Management service follow to

This will provide a Milestone installation page where you will be about to run the installer for the Event Server. This must be installed so the OBNET plugin can communicate with Milestone.

Renaming of Devices

While it is possible to update the names of Areas, Points, Doors and Outputs in the Management application. These updated names will only remain until the panel configuration is refreshed next. Any name changes should be completed within the Bosch Remote Programming Software (RPS), after the configuration is refreshed the new names will show. This plugin checks for all differences between what is already loaded in the Milestone database and updates any changes using the system Bosch as the master.

The Milestone API does not allow us to control whether the Rename option is shown in the right click menu.