

IndigoVision

**AMAG Symmetry
Integration Module**

Administrator's Guide



IndigoVision

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1 ABOUT THIS GUIDE

This guide is provided for system administrators integrating an AMAG Symmetry system with IndigoVision Control Center.

Safety notices

This guide uses the following formats for safety notices:



Indicates a hazardous situation which, if not avoided, could result in death or serious injury.



Indicates a hazardous situation which, if not avoided, could result in moderate injury, damage the product, or lead to loss of data.

Notice

Indicates a hazardous situation which, if not avoided, may seriously impair operations.



Additional information relating to the current section.

References

The following documents are referenced in this document. The paths are to the default locations where the documents can be found.

1. Control Center Help
Start > IndigoVision > Control Center > Control Center Help
Located on the Control Center server.
2. Integration Modules
<http://www.indigovision.com/products/integration>

Integration module specific references

1. Symmetry Software User Guide v8.0.2 (document number 9600-0429)
2. XML Open Integration Module Installation and User Guide v8.0.2 (document number 9600-0469)

2 OVERVIEW

The IndigoVision AMAG Symmetry Integration Module allows alarms and alarm actions from a AMAG Symmetry to be integrated with IndigoVision Control Center.

The Integration Module can also be configured to forward IndigoVision alarms and alarm actions to the AMAG Symmetry system.

This document explains how to install and configure the IndigoVision AMAG Symmetry Integration Module.

Compatibility

Please ensure you have properly installed, configured, and licensed the AMAG Symmetry and AMAG Symmetry XML Open Integration Module with valid licenses.

System requirements

The IndigoVision AMAG Symmetry Integration Module can be installed on the following Windows® operating systems with latest service packs applied:

- Windows® 7 (64-bit)
- Windows® 8.1 (64-bit)
- Windows® Server 2008 R2
- Windows® Server 2012
- Windows® Server 2012 R2

Bidirectional communication

Alarms and alarm acknowledgments can be sent from AMAG Symmetry to the IndigoVision Control Center suite, and alarms and alarm acknowledgments can be sent from the IndigoVision Control Center suite to the AMAG Symmetry.

Licensing

The IndigoVision AMAG Symmetry Integration Module is a licensed product. A correctly licensed USB dongle must be present on the system running the IndigoVision AMAG Symmetry Integration Module.

AMAG Symmetry licenses

The IndigoVision AMAG Symmetry Integration Module is compatible and has been tested with AMAG Symmetry 8.0.2.

In order to use the IndigoVision AMAG Symmetry Integration Module, AMAG Symmetry XML Open Integration Module has to be installed and licensed. HTTPS connections are not supported.

Notice *The IndigoVision AMAG Symmetry Integration Module should not be run on the same server as any other dongle-licensed IndigoVision software.*

3

INSTALLATION

This section describes how to install the IndigoVision AMAG Symmetry Integration Module. Ensure the IndigoVision AMAG Symmetry Integration Module USB license dongle is inserted into the machine that you are installing the software on before beginning the installation.

To install the IndigoVision AMAG Symmetry Integration Module, follow these steps:

1. Insert the IndigoVision Integrations DVD, or download the module from the partner extranet site.
 - ▶ For more information, see "References" on page 5If you are using the Integrations DVD, navigate to **AMAG Symmetry** and select **Install AMAG Symmetry**.
2. Run **setup.exe** and follow the on-screen instructions.

By default, the IndigoVision AMAG Symmetry Integration Module is installed to:
C:\Program Files (x86)\IndigoVision\Integration\AMAG Symmetry.
3. Follow the prompt to install Microsoft .NET 4.5.2 Framework if it is not already installed.
4. Edit the system configuration file (**System.conf**).
 - ▶ For more information, see "System configuration file (System.conf)" on page 12This file is shown during installation. Edit the system configuration parameters. Save and close the file.
5. Edit the To IV Alarm Server list configuration file (**TolvAlarmServers.conf**).
 - ▶ For more information, see "To IV alarm servers configuration file (TolvAlarmServers.conf)" on page 12This file is shown during installation. Specify the To IV Alarm Servers and their corresponding Tolv mapping files. Save and close the file.
6. Edit the AMAG Symmetry event configuration file (**Tolv.conf**).
 - ▶ For more information, see "Alarms to IV configuration file (Tolv.conf)" on page 12This file is shown during installation. Specify the mappings of the AMAG Symmetry alarms to the IndigoVision alarm IDs. Save and close the file.
7. Edit the Fromlv alarm server list configuration (**FromlvAlarmServers.conf**) file.

The IndigoVision AMAG Symmetry Integration Module registers with the alarm servers in this list to receive zone and detector alarms.

 - ▶ For more information, see "From IV alarm servers configuration file (FromlvAlarmServers.conf)" on page 12This file is presented during installation. Specify the Fromlv alarm servers and their corresponding Fromlv mapping file.
Save and close the file.
8. Edit the default IndigoVision alarm configuration (**Fromlv.conf**) file.
 - ▶ For more information, see "Alarms from IV configuration file (Fromlv.conf)" on page 12

This file is presented during installation. Specify the mappings of IndigoVision zones and detectors to AMAG Symmetry alarms.

Save and close the file.

9. Specify the Username and Password to connect to the IndigoVision AMAG Symmetry Integration Module using the Configure Credentials Tool.
 - ▶ For more information, see "Configure Credentials" on page 13
10. Start the IndigoVision AMAG Symmetry Integration Module service from the Windows® services.

Configuration of AMAG Symmetry

In order to integrate AMAG Symmetry with IndigoVision Control Center suite, you need to install the AMAG Symmetry XML Open Integration Module on the web server, and a valid XML license for it.

The credentials to connect to the AMAG Symmetry XML Open Integration Module must be provided using the Configure Credentials Tool.

- ▶ For more information, see "Configure Credentials" on page 13

In addition, the hostname of the web server used for the AMAG Symmetry XML Open Integration Module needs to be set up in the system configuration file of the IndigoVision AMAG Symmetry Integration Module.

- ▶ For more information, see "System configuration file (System.conf)" on page 12

Installing with multiple network adapters or IP addresses

When the IndigoVision AMAG Symmetry Integration Module is installed on a machine with multiple network adapters or multiple IPs, then the property `IntegrationModuleIP` in the section `System` needs to be configured in the system configuration file of the IndigoVision AMAG Symmetry Integration Module.

4 CONFIGURATION

This chapter describes how to configure the IndigoVision AMAG Symmetry Integration Module.

Integration module

To integrate AMAG Symmetry into IndigoVision Control Center you must configure the following:

1. Edit the system configuration file (**System.conf**).
 - ▶ For more information, see "System configuration file (System.conf)" on page 12
2. Configure the list of Tolv IndigoVision alarm servers that receive AMAG Symmetry Alarms (**TolvAlarmServers.conf**).
 - ▶ For more information, see "To IV alarm servers configuration file (TolvAlarmServers.conf)" on page 12
3. Configure the events of interest (**Tolv.conf**).
 - ▶ For more information, see "Alarms to IV configuration file (Tolv.conf)" on page 12
4. Configure the list of FromIv IndigoVision alarm servers that notify the Integration Module of IndigoVision zone and detector alarms (**FromIvAlarmServers.conf**).
 - ▶ For more information, see "From IV alarm servers configuration file (FromIvAlarmServers.conf)" on page 12
5. Configure the IndigoVision zones and detectors of interest (**FromIv.conf**).
 - ▶ For more information, see "Alarms from IV configuration file (FromIv.conf)" on page 12
6. Credentials to connect to the AMAG Symmetry system.
 - ▶ For more information, see "Configure Credentials" on page 13
7. Define the AMAG Symmetry Alarms of interest within IndigoVision Control Center suite.
 - ▶ For more information, see "IndigoVision Control Center configuration" on page 13

Notice *The Integration Module service must be manually restarted for configuration file changes to have an effect. When the shortcuts provided in the Start menu are used, you are prompted to restart.*

If only one-way operation (Tolv) is required, do not configure the following files:

- **FromIv.conf**
- **FromIvAlarmServers.conf**

If only one-way operation (FromIv) is required, do not configure the following files:

- **Tolv.conf**

- *TolvAlarmServers.conf*

System configuration file (System.conf)

This file contains all the system configuration parameters. This file also contains the IP address and polling interval for the AMAG Symmetry system.

- ▶ For more information, see "System configuration file (system.conf)" on page 17

Alarms to IV configuration file (Tolv.conf)

This file contains the mapping between the AMAG Symmetry event name and the IndigoVision external event ID.

It contains the data that will map the alarm event received from AMAG Symmetry to the IndigoVision Control Center suite.

- ▶ For more information, see "Alarms to IndigoVision configuration file (Tolv.conf)" on page 19

Alarms from IV configuration file (Fromlv.conf)

This file contains the mapping between the IndigoVision zone alarms and detector activations and the alarms set up in AMAG Symmetry.

It contains the data that will map the alarms received from the IndigoVision Control Center suite to the alarm sent to AMAG Symmetry.

- ▶ For more information, see "Alarms from IndigoVision configuration file (Fromlv.conf)" on page 21

To IV alarm servers configuration file (TolvAlarmServers.conf)

This file contains a list of Alarm Server IP addresses. Each Alarm Server has a mapping to an Alarm ToIV configuration file.

This can be the default *Tolv.conf* configuration file.

- ▶ For more information, see "To IV Alarm Servers configuration file (TolvAlarmServers.conf)" on page 20

From IV alarm servers configuration file (FromlvAlarmServers.conf)

This file contains a list of Alarm Server IP addresses. Each Alarm Server has a mapping to an Alarm from IV configuration file. This can be the default Fromlv.conf configuration file mentioned above.

- ▶ For more information, see "From IndigoVision Alarm Servers configuration file (FromlvAlarmServers.conf)" on page 22

Configure Credentials

To provide the credentials that the IndigoVision AMAG Symmetry Integration Module will use to connect to the AMAG Symmetry XML Open Integration Module you must use the **Configure Credentials Tool**.

1. Run the tool from **Start Menu > IndigoVision > AMAG Symmetry Integration Module**.
2. Enter the Username and Password for a valid AMAG Symmetry user.
It is recommended that you use the same user credentials that were provided when installing and configuring the AMAG Symmetry XML Open Integration Module.
3. Click **Save**.
4. Click **Yes** to restart the service using the new credentials.
Alternatively, click **No** and then manually restart the service later using the **Service Control Manager** under **Administrative Tools** in the Windows **Control Panel**.

Configure Logging

Logging is configured within a separate configuration file, allowing customization of the logging as well as the management of backup log files. To access this file, select the following:

Start Menu > All Programs > IndigoVision > AMAG Symmetry Integration Module > Edit Logging Configuration File

To adjust the logging level, within the `root` section of the file, modify the value of `level`. This can be set to the following values:

- `DEBUG`: Verbose logs with comprehensive details on operations.
- `INFO`: Successful events and behavior as well as all warnings and errors.
- `WARN`: Warning or error messages that indicate the integration module may not be functioning correctly and may require action.
- `ERROR`: Messages where a failure has occurred and action may be required.
- `FATAL`: Critical errors where the integration module cannot continue.

For example, to increase the default logging level to include confirmation of events sent successfully:

```
<level value="INFO"/>
```

To customize the retention of log files, modify the following values:

- `maximumFileSize`: The size which individual log files can reach before a new file is created.
- `maxSizeRollBackups`: The number of backup files to be kept. Older files are removed when this limit is reached and new files are required.

It is not recommended that any other settings are modified unless advised by IndigoVision.

IndigoVision Control Center configuration

If the `IMOnline`, `IMOffline`, `3rdPartyOffline` or `3rdPartyOnline` external system inputs are defined in the system configuration file and are of interest, then they must be configured in Control Center.

Create a new external system

The IP address entered is the IP address of the host running the Integration Module. Refer to the Control Center online help about creating a new external system.

Create a new zone and external detector for Tolv events

Add a new zone for each unique alarm that must be reported in Control Center.

Within the zone create a new external detector for the external system above with the external event ID of the event configured in the Tolv file of the Integration Module.

It is recommended that the zone name description configured in Control Center closely matches the AMAG Symmetry event name. This will help to ensure there is no confusion in correlating events.

Create external detectors for all types of events

After the Tolv configuration file has been edited with all the supported events, it is possible to quickly configure an IndigoVision Alarm Server using the IndigoVision Import Alarm Sources tool.

This tool can be found in the IndigoVision Integrations DVD.

Every time an event is added to the Tolv configuration file, the tool needs to be run to update the IndigoVision NVR-AS.

Alarm Actions

To set up the IndigoVision AMAG Symmetry Integration Module to keep the state of the alarms synchronized between the AMAG Symmetry system and the IndigoVision Control Center suite, use the following configuration:

- One Control Center zone for each entry in the Tolv configuration files.
Optionally, automate this step after the Tolv files have been configured.
 - ▶ For more information, see "Create external detectors for all types of events" on page 14
- One AMAG Symmetry alarm for each Control Center zone in FromIv configuration files.

Do not set up Control Center detectors in the FromIv configuration files.

With this configuration, the alarm states of the two systems are kept synchronized while the IndigoVision AMAG Symmetry Integration Module is running.

Tolv Alarm Actions

When TolvAlarmActions functionality is enabled in the System configuration file and the chosen direction is `both`, it allows the Integration Module to forward alarm actions (such as acknowledgments and zone clear) from the AMAG Symmetry system to the IndigoVision Control Center suite.

If the chosen direction is `ToIv`, then only actions linked to alarms generated in AMAG Symmetry are forwarded to the corresponding zones in the IndigoVision Control Center suite. These zones belong to the Alarm Servers configured in the TolvAlarmServers configuration file and contain the detectors set up in the Tolv configuration files.

If the chosen direction is `FromIv`, then only actions linked to zone alarms specified in `FromIv` configuration files and generated in Control Center and reported in AMAG Symmetry are forwarded to the IndigoVision Control Center suite.

If a Control Center zone contains a detector that is still activated, then clearing the alarm from AMAG Symmetry system fails.

FromIv Alarm Actions

When `FromIvAlarmActions` functionality is enabled in the System configuration file and the chosen direction is `both`, it allows the Integration Module to forward alarm actions (such as acknowledgments and zone clear) from the IndigoVision Control Center suite to the AMAG Symmetry system.

If the chosen direction is `ToIv`, then only zone actions linked to alarms generated in the AMAG Symmetry system and configured in the `ToIv` configuration files are forwarded to the AMAG Symmetry system. Those zones belong to the Alarm Servers configured in the `ToIvAlarmServers` configuration file and contain the detectors set up in the `ToIv` configuration files.

If the chosen direction is `FromIv`, then only zone actions linked to zone alarms generated in Control Center and reported in AMAG Symmetry are forwarded to the AMAG Symmetry system.

If an AMAG Symmetry alarm has to be reset before clearing it, then clearing the alarm from Control Center fails, leaving the AMAG Symmetry alarm in the `Acknowledged Require Reset` state. No error will be reported by Control Center.

`FromIv` actions are available only for Control Center zones, not for single detectors.

Status in Control Center

If a problem has occurred within the AMAG Symmetry system or if the connectivity between the IndigoVision AMAG Symmetry Integration Module and the AMAG Symmetry system has been lost, then reporting the status of the AMAG Symmetry system within Control Center allows you to identify when this has occurred.

To enable this feature:

1. Edit the System configuration file and set up an input number for `3rdPartyOffline` and `3rdPartyOnline`.
 - ▶ For more information, see "System configuration file (System.conf)" on page 12
2. If it does not already exist, create a new zone in Control Center.
3. Create a new detector that activates on the input number set up for `3rdPartyOffline`, and deactivates on the input number set up for `3rdPartyOnline`.

The `3rdPartyOnline` or `3rdPartyOffline` events are sent every 60 seconds, so the detector will be activated when the AMAG Symmetry system is offline, and will return to a normal state when the AMAG Symmetry system is online and the IndigoVision AMAG Symmetry Integration Module is able to connect.

5

SYSTEM CONFIGURATION FILES

This chapter contains examples of the configuration files required by the IndigoVision AMAG Symmetry Integration Module.

System configuration file (system.conf)

This file lists the configurable system parameters that are independent of alarms and events. The comments in the sample configuration file below explain how to use the parameters listed.

Figure 1: Example of a System Configuration file

```
[AlarmServer]
#
# The IP address of the primary Alarm Server (NVR) must be specified if any
# SystemEvents are defined.
#
# IP=0.0.0.0
[System]
#
# IntegrationModuleIP is the IP of this machine that should be used to send
# events. It should match the External System which is configured in Control
# Center.
# Note: This must be specified for machines with multiple IP addresses. It may
# be omitted for machines with just a single IP address.
#
# IntegrationModuleIP=0.0.0.0
[Events]
#
# The direction of forwarding of events that the Integration Module should use.
#
# The default events direction is "toIv", whereby events are forwarded from
# the AMAG Symmetry system to the IndigoVision system.
#
# Change to "fromIv", whereby events are forwarded from
# the IndigoVision system to the AMAG Symmetry system.
#
# Change to "both" to forward events in both directions.
# That is whereby events are forwarded from a AMAG Symmetry system to the
# IndigoVision system
# AND
# events are forwarded from the IndigoVision system to a AMAG Symmetry system.
#
# Direction=toIv
#
```

```
# OPTIONAL: Whether to enable FromIv alarm actions.
# Default is "false" which means that FromIv alarm actions are disabled.
# Change to "true" to enable FromIv alarm actions.
#
# EnableAlarmActionsFromIv=false
#
# OPTIONAL: Whether to enable ToIv alarm actions.
# Default is "false" which means that ToIv alarm actions are disabled.
# Change to "true" to enable ToIv alarm actions.
#
# EnableAlarmActionsToIv=false
[SystemEvents]
#
# SystemEvents are events that may be sent to Control Center to report the
# status of, or problems with, the AMAG Symmetry Integration Module.
#
# The number assigned to a system event is a user-defined event number that
# corresponds to an external system input number of an alarm source in
# Control Center.
#
#
# If IMOffline is defined, an event with this number will be sent to the
# primary Alarm Server whenever the AMAG Symmetry Integration Module is
# about to go offline.
# Reasons for going offline include a manual service stop request, the host
# PC shutting down or when the USB license dongle is removed.
#
# IMOffline=1
#
# If IMOnline is defined, an event with this number will be sent to the
# primary Alarm Server (NVR) whenever the AMAG Symmetry Integration Module
# has successfully started up.
#
# IMOnline=2
#
# If the 3rdPartyOffline property is defined, an event with this number will
# be sent to the primary Alarm Server whenever the connection with the AMAG
# XML Open Integration Module is lost.
#
# 3rdPartyOffline=3
#
# If the 3rdPartyOnline property is defined, an event with this number will
# be sent to the primary Alarm Server whenever the connection with the AMAG
# XML Open Integration Module is established.
#
# 3rdPartyOnline=4
[AMAGSymmetry]
#
# AMAG Symmetry specific configuration
#
# ModuleAddress is the IP or hostname of the machine where the AMAG XML Open
# Integration Module is installed.
#
# PollingTime is the time in seconds to wait between to poll for new alarms in
```

```
# AMAG Symmetry. The default is 1 second.
#
# ModuleAddress =
# PollingTime = 1
```

Alarms to IndigoVision configuration file (Tolv.conf)

The installation provides one default alarm to the IndigoVision configuration file located in the Tolv folder.

The file is called Tolv.conf. There is one mapping entry per line in the mapping file. Each entry is a comma-separated value.

Figure 2: An example alarms to IndigoVision configuration file (s)

```
# This file contains the ToIv mapping of AMAG Symmetry alarms to
# IndigoVision external event input numbers.
#
# Each mapping entry consists of two ( optionally three ) comma separated
# fields.
#
# InputNumber, AMAGSymmetryAlarm, Optional Description
# The first element of each entry is a positive integer corresponding to an
# External Detector input number in the Alarm Server.
#
# The second element is a string representing the AMAG Symmetry alarm.
#
# The general format for the AMAG Symmetry alarm is as follows:
#
# Where:What
#
# The Where field corresponds to the text shown in the Where column on
# the AMAG Symmetry alarms list and is typically a device name.
# The What field corresponds to the text shown in the What column on the
# AMAG Symmetry alarms list and is typical an activity for the device
# raising the alarm.
# You may provide a partial value for What, for example if a reader's
# "Access Denied" alarm provided additional user specific information such
# as "Access Denied: ID 7" then using "MainReader:Access Denied" in the
# mapping will result in activations for all Access Denied alarms for
# MainReader.
#
# An optional third field, separated by another comma can be added with
# a description of the event mapping.
#
# The Where and What fields cannot contain the characters ',', ':' or '\'.
# Also, any leading or trailing whitespace will be stripped.
# However, octal escape codes can be added to include these characters.
# Character ' ': => \040 - for allowing leading or trailing spaces
# Character ':': => \072
# Character ',': => \054
# Character '\': => \134
#
# Unicode characters can be used for the AMAG Symmetry alarm.
#
```

```
#
# Examples
# 100,Monitor Point:Monitor Point In Alarm
# 101,Door\072 Back:Access Denied
# 102,Door\072 Main:Access Denied, Failed attempt to access "Door: Main"
# 103,Entrée lecteur:Porte Forcée, Porte d'entrée forcée
```

The first element of each entry is the positive integer associated with the IndigoVision external event ID corresponding to the AMAG Symmetry alarm. The second element is a string equal to the AMAG Symmetry event name, including the details regarding the device that generates those events.

- For information about AMAG Symmetry system configuration, see *"References"* on page 5

The AMAG Symmetry alarm name can include special characters by utilizing the octal escape code approach. For example, in order to produce the mappings that look like this:

```
External event Input id of '7' to AMAG Symmetry alarm of "SECOND\READER:Granted
Access"
```

The following mapping should be entered:

```
7, SECOND\134READER:Granted Access
```

To further aid identification of events of interest and their 3rd Party Event names, the Alarms to IV configuration file names cannot include leading or trailing whitespace. Therefore filenames can not be mapped in the Tolv Alarm Servers Configuration file.

Notice *The IMOffline and IMOnline, 3rdPartyOffline and 3rdPartyOnline alarms must be unique if configured. No alarm with these alarm IDs should be configured in Tolv.conf. If these alarms are not configured or are configured to 0, then these alarms will be disabled.*

To IV Alarm Servers configuration file (TolvAlarmServers.conf)

This file contains a list of IndigoVision Tolv alarm server IP addresses that receive AMAG Symmetry alarms. Each Alarm Server IP address is associated with an Alarms To IndigoVision configuration file.

Figure 3: An example to IV alarm servers configuration file (TolvAlarmServers.conf)

```
# List of each Alarm Server (NVR-AS) and its ToIv file (without .conf extension)
#
# Each entry consists of up to three comma separated fields
#
# The first field is the IP address of the Alarm Server (mandatory).
#
# The second field is the Alarms To IV configuration file excluding file
# extension of ".conf" (mandatory). All Alarms To IV configuration files
# are located in the "ToIv" folder.
# For example an entry of "ToIv" indicates that the
# Alarms To IV configuration file is .\ToIv\ToIv.conf
#
# The optional third field can be used to provide a description.
#
```

```
# Note that it is possible to set up all Alarm Servers to use the one default
# Alarms To Iv configuration file by entering "ToIv" as the second field
# for all entries.
# IP address, ToIv file, Description (optional)
# Example using all three fields:
#
# 0.0.0.0, ToIv, Default ToIv\ToIv.conf
# Example using two fields:
# 0.0.0.0, ToIv
```

All the entries should include a valid IP address. Anything written after '#' is considered a comment.

Alarms from IndigoVision configuration file (FromIv.conf)

By default, the installation provides one default alarm from IndigoVision configuration file located in the FromIv folder. The file is called **FromIv.conf**.

There is one mapping entry per line in the mapping file. Each entry is a comma-separated pair.

Figure 4: Example of an Alarms from IndigoVision Configuration file

```
# This file contains the FromIv mapping of IndigoVision events
# to AMAG Symmetry alarms.
# Each mapping entry consists of two (optionally three) comma separated
# fields.
# For zone events the mapping is:
# ZONE:<ZoneName>,<AMAGSymmetryAlarm>,<OptionalDescription>
# The first field is the IndigoVision event.
# The event type of 'ZONE' and the zone name are separated by a ':'.
# These parameters together form a single unit that uniquely describes
# the IndigoVision event.
# For detector events the mapping is:
# DETECTOR:<ZoneName>:<DetectorName>,<AMAGSymmetryAlarm>,<OptionalDescription>
# The event type of 'DETECTOR', the zone name to which it belongs and the
# detector name are separated by a ':'.
# These parameters together form a single unit that uniquely describes
# the IndigoVision event.
#
# The AMAG Symmetry alarm name is separated from the first using ','.
# It consists of two (optionally three) fields, separated by ':'.
# The AMAG Symmetry alarm name is in the form:
#
# Where:What:Priority
#
# where the Priority field is optional.
# The Where field corresponds to the text shown in the Where column on
# the AMAG Symmetry alarms list and is typically a device name.
# The What field corresponds to the text shown in the What column on the
# AMAG Symmetry alarms list and is typical an activity for the device
# raising the alarm.
# The Priority field corresponds to the priority for the alarm within the
# AMAG Symmetry system. Acceptable values range from 1 to 999 where 1 is
# the highest priority and 999 is the lowest priority.
#
```

```

# An optional third field, separated by another comma can be added
# with a description of the event mapping.
# Examples:
# DETECTOR:IvZone102:Exit Door,AMAGSymmetry:Exit Door
# DETECTOR:IvZone103:Fire Door,MainHall:Fire Door:5, High priority door
# The ZoneName, DetectorName or AMAGSymmetryAlarm's Where and What fields
# cannot contain the characters ',', or ':' or '\'.
# Also, any leading or trailing whitespace will be stripped.
# However, octal escape codes can be added to include these characters.
# Character ' ': => \040 - for allowing leading or trailing spaces
# Character ':': => \072
# Character ',': => \054
# Character '\': => \134
#
# Unicode characters can be used for the ZoneName, DetectorName and
# AMAGSymmetryAlarm.
#
#
# Examples:
# ZONE:IvZone\072104,AMAGSymmetry:First\134Floor\102
# DETECTOR:IvZone 105\040:Exit Door,AMAGSymmetry:First\054Floor
# DETECTOR:Zone D'Entrée:Détecteur,AMAGSymmetry:Détecteur D'Entrée
#

```

From IndigoVision Alarm Servers configuration file (FromIvAlarmServers.conf)

This file contains a list of IndigoVision alarm server IP addresses that receive IndigoVision alarms. Each Alarm Server IP address is associated with an Alarms From IndigoVision configuration file.

Figure 5: An example from IV alarm servers configuration file (FromIvAlarmServers.conf)

```

# List of each Alarm Server (NVR-AS) and its FromIv file (without .conf extension)
#
# Each entry consists of up to three comma separated fields
#
# The first field is the IP address of the Alarm Server (mandatory).
#
# The second field is the Alarms From IV configuration file excluding file
# extension of ".conf" (mandatory). All Alarms From IV configuration files
# are located in the "FromIv" folder.
# For example an entry of "FromIv" indicates that the
# Alarms From IV configuration file is .\FromIv\FromIv.conf
#
# The optional third field can be used to provide a description.
#
# Note that it is possible to set up all Alarm Servers to use the one
# default Alarms From Iv configuration file by entering "FromIv" as the
# second field for all entries.
# IP address, FromIv file, Description (optional)
# Example using all three fields:
#
# 0.0.0.0, FromIv, Default FromIv\FromIv.conf

```

```
# Example using two fields:  
# 0.0.0.0, FromIv
```

All the entries should include a valid IP address. Anything written after '#' is considered a comment.

6 TROUBLESHOOTING

This chapter provides troubleshooting information to resolve common issues.

Alarms not appearing in Control Center

If alarms are not appearing in Control Center then the following end-to-end check for a single alarm may help to determine the source of the problem.

1. Enable `DEBUG` level logging.

This allows the Integration Module to log all alarms received from the AMAG Symmetry, instead of only those which have been mapped in the Alarms To IV configuration file.

► For more information, see "Configure Logging" on page 13

2. Verify that the Integration Module is sending events to the nominated Alarm Server by opening the most recent Integration Module log file and check for messages stating that the alarm has been sent.

For example,

```
2015-10-01 10:47:45,014 [DEBUG]
[IntegrationCore.Core.EventManager]: Queued ToIv stateless
event 'monitor2:Monitor Point In Alarm' to send to Alarm
Server '10.1.20.1' with external input number '7'.
2015-10-01 10:47:45,014 [DEBUG]
[IntegrationCore.Core.Event.BindingKit]: Sending ToIv
stateless event to Alarm Server '10.1.20.1' with external
input number '7' from IP '10.1.20.5'. UTC time of the event
is '01/10/2015 09:47:44'.
2015-10-01 10:47:45,026 [INFO ]
[IntegrationCore.Core.Event.BindingKit]: ToIv stateless event
sent to Alarm Server '10.1.20.1' with external input number
'7' from IP '10.1.20.5'. UTC time of the event was
'01/10/2015 09:47:44'.
```

If the alarm is generated as expected go to the next step.

If this does not identify that an alarm has been sent for the AMAG Symmetry alarm of interest, then check if the Integration Module is receiving the event but has not been correctly configured.

For example,

```
2015-10-01 10:47:32,559 [INFO ]
[AMAGSymmetryIntegration.ToIv.ToIvModule]: Received ToIv
stateless event 'SALTO:Communication failure to Salto
Server:20' but it is not configured to send to any Alarm
Server.
```

If the event is seen in the log file, then the Alarms To IV configuration file (*Tolv.conf*) is not correctly configured to forward this event to the Control Center suite.

If the event is not seen in the log file then refer to the AMAG Symmetry documentation on how to set up and configure the AMAG Symmetry and AMAG Symmetry XML Open Integration Module.

3. Verify that the corresponding zones and external detectors have been created, and that the zones have been set, and the external detectors have been enabled in Control Center.

In the Site Setup mode select the relevant Site on Alarms explorer then follow these steps:

- a. Click on the **External Systems** tab. Ensure that an External System with the IP address of the PC running the IndigoVision AMAG Symmetry Integration Module has been created.
- b. Click on the **Zones** tab. Ensure that a zone has been created containing an external detector with Input Number being the event number identified from step 2 above. Also ensure that the external system is correct. The external detector must be enabled and the zone must be set.
- c. Ensure that the zone belongs to the nominated Alarm Server.

Right-click on the zone, select **Properties** then on the **Zone** tab ensure that the Alarm Server is the same as that configured in the Tolv Alarm Servers configuration (*TolvAlarmServers.conf*) file for the IndigoVision AMAG Symmetry Integration Module.

Service does not start

If the IndigoVision AMAG Symmetry Integration Module does not start correctly from Windows Services:

1. Open the Windows **Event Viewer**.
2. Navigate to **Windows Logs > Application**.
3. Find one or more events logged at **ERROR** level and with source `IndigoVision IntegrationCore Service`.

In the **General** field, a description of the problem which prevents the service from starting is shown.

Alternatively, open the most recent log file and look at the latest 2 messages marked as **FATAL** to find the same information.

Connectivity issues

If the IndigoVision AMAG Symmetry Integration Module cannot connect to AMAG Symmetry and in the log file the following message is shown:

```
[ERROR] [AMAGSymmetryIntegration.AmagConnection]: Impossible to connect to AMAG XML Open Integration Module. Please make sure that the credentials are correct and the AMAG XML Open Integration Module is correctly installed in the web server.
```

Use the following troubleshooting procedure:

1. Ensure that the AMAG Symmetry XML Open Integration Module has been installed on the web server and licensed in the AMAG Symmetry client.

To do this, log in to the AMAG Symmetry client as the `Installer` or `Administrator` user, then navigate to **Maintenance > Licensing > System Licenses**.

Check that a license of type `XML Open Integration Module` is listed and its status is `Active`.

2. Ensure that the web server where the AMAG Symmetry XML Open Integration Module has been installed is online.
3. Ensure that the `HostName` of the web server matches the `ModuleAddress` configured in the System configuration file of the IndigoVision AMAG Symmetry Integration Module.
To verify the credentials, try to log in to the AMAG Symmetry using those credentials.
5. Ensure that a firewall is not blocking the communication between the IndigoVision AMAG Symmetry Integration Module and the web server running the AMAG Symmetry XML Open Integration Module.
6. Ensure that the AMAG Symmetry XML Open Integration Module is installed using HTTP, not HTTPS.
HTTPS is currently unsupported.

Alarms not appearing in AMAG Symmetry Alarm Monitoring

If alarms are not appearing in AMAG Symmetry Alarm Monitoring, use the following end-to-end check for a single alarm to help determine the source of the problem.

Check that the Integration Module has been configured to send alarms to AMAG Symmetry in the System configuration file.

1. Verify that the direction of events is correctly set.
To do this, open the System configuration file and verify that the property `Direction` is `Both Or From Iv`.
2. Enable `DEBUG` level logging.
This allows the Integration Module to log all alarms and events received from the Alarm server, instead of only those which have been mapped in the Alarms From IV configuration file.
► For more information, see "Configure Logging" on page 13
3. Verify that the Integration Module is receiving events from the nominated Alarm Server.

To do this, open the most recent Integration Module log file, and check for messages stating that the alarm has been received from the Alarm Server and sent to AMAG Symmetry.

For example:

```
[DEBUG][IntegrationCore.Service.EventManager]:
DETECTOR:Ground Floor:Motion from 10.1.219.61 has changed
state to Triggered.
```

...

```
[DEBUG][AMAGSymmetryIntegration.FromIv.FromIvModule]: Sending
event 'Ground Floor:Motion' to '10.1.219.24'.
```

If this identifies that the alarm is sent to AMAG Symmetry then go to the next step.

If this does not identify that an alarm has been sent for the IndigoVision alarm of interest, then check if the Integration Module is receiving the event but has not been correctly configured.

For example,

```
[INFO ][IntegrationCore.Service.EventManager]: DETECTOR:
Ground Floor:Motion from 10.1.219.61 has changed state to
Triggered, however it is not configured in the FromIv
configuration files.
```

```
[INFO ][AMAGSymmetryIntegration.Connection.G4tWrapper]:
FromIv event 'Ground Floor:Motion' sent to '10.1.219.24'.
```

If the alarm is specified in the log file as not configured, then the Alarms From IV configuration file and/or Alarms Server configuration file are not correctly configured to forward this event to the AMAG Symmetry.

4. Verify that the AMAG Symmetry XML Open Integration Module is running.
5. If the AMAG Symmetry XML Open Integration Module is installed on the AMAG Symmetry machine, ensure that the following services are running:
 - SMS Client Service
 - SMS Integration Service
 - SMS Services
 - SMS State Service
 - SMS Transaction Service
 - SMSHttpServer
 - SMSTransactionParser

If the AMAG Symmetry XML Open Integration Module is not installed on the AMAG Symmetry machine, check that AMAG Symmetry is running on appropriate machine and that the AMAG Symmetry XML Open Integration Module is running within Internet Information Services (IIS) Manager.

6. If these services have been restarted, restart the Integration Module.

► For more information, see "System configuration file (System.conf)" on page 12

Alarm actions not forwarded from Control Center to AMAG Symmetry

If multiple Tolv detectors are configured to trigger the same Control Center zone, then when the zone is acknowledged, only some of the alarms may show as acknowledged within the AMAG Symmetry alarm window.

However, all the interested AMAG Symmetry alarms are correctly acknowledged in the AMAG Symmetry database, and appear with the correct status when the AMAG Symmetry alarm window is reopened.

This also applies to alarm clear actions. The status panel at the bottom of the screen also shows the correct number of alarms.

IndigoVision AMAG Symmetry Integration Module is slow to start

If no internet access is available then a standard security check may cause the IndigoVision AMAG Symmetry Integration Module service to be slow to start, taking up one minute.

This is resolved by disabling `Check for publisher's certificate revocation`, which is typically found in the **Advanced** tab of **Internet Options**. However this must be disabled for the Windows user running the service, which by default is `Local System`.

To disable `Check for publisher's certificate revocation` for the `Local System` user edit the registry key:

1. Start the Windows **Registry Editor** (`Regedit.exe`).
2. Navigate to `HKEY_USERS\S-1-5-18\Software\Microsoft\Windows\CurrentVersion\WinTrust\Trust Providers\Software Publishing`.
3. Double-click the **Value** called **State**.
4. Set the **Value** data to `23e00` for hexadecimal or `146944` in decimal.
5. Click **OK**.
6. Quit **Registry Editor**.

Optionally, perform the same steps for the default registry key `HKEY_USERS\DEFAULT\Software\Microsoft\Windows\CurrentVersion\WinTrust\Trust Providers\Software Publishing`.

License Dongle Issues

If the IndigoVision AMAG Symmetry Integration Module is installed on a machine that has not had Aladdin HASP software installed previously then no license dongle issues should be encountered.

However, possible issues may occur if the machine to be installed on has previously had Aladdin HASP software installed on it.

Possible Issues

Occasionally there can be issues arising with the use of the Aladdin HASP license dongle on machines that currently have, or have been in the past, installed with the Aladdin HASP software.

This manifests itself as:

- The inability to install the Aladdin HASP software driver correctly during the installation process of the IndigoVision AMAG Symmetry Integration Module .
- Being unable to correctly check and validate the USB license dongle, as it is inactive after the installation process.

How to Check that the Sentinel HASP Dongle is Active

If the Sentinel dongle is working correctly then a red LED is illuminated on the dongle.

Check that the device drivers are listed in Device Manager:

1. Navigate to **Control Panel > System**.
2. Select the **Hardware** tab.
3. Select **Device Manager**.
4. Navigate to **Universal Serial Bus Controllers**, and expand the list.
5. Check that the following are listed:
 - SafeNet Inc. Sentinel HL Key
 - SafeNet Inc. HASP Key

- SafeNet Inc. USB Key