

Milestone XProtect® Device Pack 11.5a

It is with great pleasure that Milestone Systems as of April 22nd, 2021 is shipping the newly added support for devices to our Device Packs.

Device Compatibility Overview

This release note lists the changes in Device Pack 11.5a that are supported in the following VMS versions:

- XProtect Corporate 2018 - 2021
- XProtect Expert 2018 – 2021
- XProtect Professional+ 2018 - 2021
- XProtect Express+ 2018 - 2021
- XProtect Essential+ 2018 - 2021

For Husky M50A, M500A, M550A and the Husky X-series (X2 and X8 model) NVRs, the changes are supported according to the VMS software version installed.

For more information on the availability and support on the different VMS versions, please check our [Product Lifecycle](#) webpage.

NOTES

Please note, that installation of DP 10.0 and higher requires .Net 4.7 to be installed first (for details and alternative options, please refer to [Milestone Knowledge Base](#)).

Please note there are special requirements for the support of the following functionalities:

Functionality	Version required
Audio	XProtect Corporate 2.0a or above
Multi-streams	
Pre-alarms	
H.264	XProtect Corporate 2.0b or above
Interlaced field-encoded H.264	XProtect Corporate 4.1a or above
GOP	XProtect Corporate 5.0a or above
H.265	XProtect Corporate 10.2b or above

Device Pack Updates

New drivers

- **Axis**

New generic Axis driver, which replaces the existing Axis drivers (Axis1ChDevice, Axis1ChPtzDevice, Axis2ChDevice, Axis3ChDevice, Axis4ChCamera, Axis4ChDevice, Axis8ChDevice, Axis11ChDevice, Axis12ChDevice, AxisAudioDevice). New driver supports all the features supported by existing Axis drivers.

Old drivers will be kept in the DevicePack for backward compatibility, but they will be not updated with any new functionality from DP 11.5 on.

All newly added devices will be auto-discovered and added to the VMS via the new Axis driver. Via manual adding of the devices, any of the old drivers could be used, as specified for a given device on the [Supported Devices Page](#).

- **Bosch**

New Bosch driver, based on Bosch INTEOX platform. New driver supports all the features supported by existing Bosch drivers.

All currently supported devices continue to be supported with the existing Bosch drivers.

- **Universal512 driver**

New multichannel driver. Supports up to 512 channels.

The multichannel support will only be available with XProtect 2021R1 and further.

New firmware support for devices for the following partners:

- Axis
- Hikvision
- Mobotix
- Panasonic

Additional support for specific features for the following partners and drivers:

- **Hanwha**

Implemented the following events support for Hanwha TNM-3620TDY

- Temperature detection event in "Normal" mode
- Estimated body temperature detection in "BodyTemperature" mode

- **Hikvision**

Implementation of SRTP support for HikVision Generic driver.

- **Mobotix**

Implemented support for the following M7 platform group of events (including sub-events):

- Meta events;
- Message events;
- Image Analysis events;
- Environment events.

- **ONVIF**

ONVIF driver is updated to support multichannel devices (up to 512 channels).

The multichannel support will only be available with XProtect 2021R1 and further.

Existing ONVIF16 driver will be kept for backward compatibility only. It will be not updated with any new functionalities from DP 11.5 on.

- **Panasonic**

Implemented support for AI VMD. Implementation includes support for Intruder event, loitering event, Direction event and Cross line event for specific objects (humans, bicycles, or vehicles).

New device support for:

- **Axis**

M3077-PLVE, M3057-PLVE Mk II, P3925-LRE, Q6075-SE, ExCam XPT Q6075, XP40-Q1785

- **Bosch**

MIC inteoX 7100i, MIC-7602, MIC inteoX 7100i; MIC-7604, MIC inteoX 7100i; MIC-7602, FLEXIDOME multi 7000i; NDM-7702-A, FLEXIDOME multi 7000i; NDM-7703-A, AUTODOME inteoX 7000i; NDP-7602, FLEXIDOME IP Panoramic 6000 - outdoor; NDS-6004-F180E, FLEXIDOME IP Panoramic 6000 - outdoor; NDS-6004-F360E

- **Dahua**

DH-TPC-PT8621A, DH-TPC-PT8421A, DH-TPC-PT8621C, DH-TPC-PT8621B, DH-TPC-PT8421C, DH-TPC-PT8421B

- **Dallmeier electronic GmbH & Co.KG**

Panomera S8 190/30, Panomera S8 184/45, Panomera S8 78/75, Panomera S8 66/13, Panomera S8 87/45 DN, Panomera S8 43/90 DN, Panomera S4 46/15 DN, Panomera S4 46/30 DN

- **Hanwha Techwin**

TNV-8010C, PNM-9022V, PNM-9322VQP, TNM-3620TDY

- **HikVision**

DS- MP3516-RS, iDS-TCV500-BI, DS-2DF8250I8X-AELW(T3), DS-2TD2367-50/P, DS-2TD2367-75/P, DS-2TD2367-100/P, DS-2TD2637T-10/P, DS-2TD2637T-15/P, DS-2TD6267T-25H4L/W, DS-2TD6267T-50H4L/W, DS-2TD6237-50H4L/W, DS-2TD6237-75C4L/W, DS-2TD6267-50H4L/W, DS-2TD6267-75C4L/W, DS-2TD6267-100C4L/W, DS-2TD8167-150ZE2F/W, DS-2TD8167-190ZE2FL/W, DS-2TD8167-150ZC4F/W, DS-2TD8167-190ZE2F/W, DS-2TD4137T-25/W, DS-2TD4167T-25/W, DS-2TD4137-25/W, DS-2TD4137-50/W, DS-2TD4167-25/W, DS-2TD4167-50/W, DS-2CD1743G0-IZ

- **IDIS**

DC-B3303X, DC-Y6513RX, DC-T4236HRX, DC-T4236WRX, DC-D4236X, DC-D4236RX, DC-D4236WRX, DC-D4236HRX, DC-D4533RX, DC-D4533HRX

- **Intelbras**

iMHDX 5008, MHDX 1104, MHDX 1108, MHDX 1116, MHDX 3104, MHDX 3108, MHDX 3116, MHDX 5208, MHDX 5216, MHDX 7116, VIP 1130 B, VIP 1130 D, VIP 1230 B, VIP 1230 D, VIP 1230 D W, VIP 1230 W, VIP 1430 B, VIP 1430 D, VIP 3215 SD IR, VIP 3230 B SL, VIP 3230 D SL, VIP 3240 D IA, VIP 3240 D Z G2, VIP 3240 IA, VIP 3240 Z G2, VIP 3260 Z G2, VIP 5225 SD, VIP 5225 SD IR, VIP 5230 SD, VIP 5280 B IA, VIP 5550 D Z IA, VIP 5550 Z IA

- **Mobotix**

S74

- **Panasonic**

WV-S1572L, WV-S1552L

- **Thermal Imaging Radar**

Thermal Radar V2

- **Uniview**

IPC3234EA-HDZK,IPC264EA-HDZK,IPC268EA-DZK,IPC3238EA-DZK,IPC312SB-ADF28K-I0,IPC314SB-ADF28K-M12-I0,IPC3634LB-ADZK-G,IPC3534LB-ADZK-G,IPC2324LB-ADZK-G,IPC3614LE-ADF28K-G,IPC3614LE-ADF40K-G,IPC324LE-DSF28K-G,IPC324LE-DSF40K-G,IPC3615LE-ADF40K-G,IPC3615LE-ADF28K-G,IPC3615LE-ADF28K-G-NB,IPC3615LE-ADF40K-G-NB,IPC2125LE-ADF28KM-G,IPC2125LE-ADF40KM-G,PC2125LE-ADF28KM-G-NB,IPC2125LE-ADF40KM-G-NB,IPC314SB-ADF28K-I0,IPC2124LE-ADF28KM-G-NB,IPC2124LE-ADF40KM-G,IPC2124LE-ADF40KM-G-NB,IPC-B2A2-FW@PAEK-IR8-F60-CA-VG,IPC-B2A2-FW@AEK-IR8-F120-CA-VG,IPC-B2A2-FW@AEK-IR8-F60-CA-VG,IPC-B2A2-FW@PAEK-IR8-F80-CA-VG,IPC-B2A2-FW@PAEK-IR8-F40-CA-VG,IPC-B2A2-FW@AEK-IR8-F40-CA-VG,IPC-B2A2-FW@PAEK-IR8-F120-CA-VG,IPC-B2A2-FW@AEK-IR8-F80-CA-VG,IPC2124LE-ADF28KM-G,IPCB2D2-WH@PAEK-F40-CA-VG,IPCB2D2-WH@PAEK-F60-CA-VG,IPC-H244-WH@PAEK-F40-CA-VG,IPC-H244-WH@PAEK-F60-CA-VG,IPCB2A4-FW@PAEK-IR8-F40-CA-VG,IPCB2A4-FW@PAEK-IR8-F60-CA-VG,IPCB2A4-FW@PAEK-IR8-F80-CA-VG,IPC2A4I-FW-AUKCF60-B-DT,IPC2A4I-FW-AUPKCF40-B-DT,IPC2A4S-IR6-AUPF40-G-DT,IPC2A4S-IR6-AUPF60-G-DT,IPC2A4I-FW-AUKCF40-B-DT,IPC2A4I-FW-AUKCF80-B-DT,IPC2A4S-IR6-AUF60-G-DT,,IPC2A4S-IR6-AUF80-G-DT,IPC2A4I-FW-AUPKCF80-B-DT,IPC2A4S-IR6-AUPF80-G-DT,IPC2A4S-IR6-AUF40-G-DT,IPC2A4I-FW-AUPKCF60-B-DT,IPC3A4S-IR3-AUF28-G-DT,IPC3A4S-IR3-AUF60-G-DT,IPC3A4I-FW-AUPKCF60-B-DT,IPC3A4I-FW-AUPKCF28-B-DT,IPC3A4S-IR3-AUPF40-G-DT,IPC3A4I-FW-AUKCF40-B-DT,IPC3A4S-IR3-AUF40-G-DT,IPC3A4I-FW-AUKCF60-B-DT,IPC3A4S-IR3-AUPF28-G-DT,IPC3A4S-IR3-AUPF60-G-DT,IPC3A4I-FW-AUPKCF40-B-DT,IPC3A4I-FW-AUKCF28-B-DT,IPC2D4E-WH-AF40-G-DT,IPC2D4E-WH-AF60-G-DT,IPC2D4E-WH-APF40-G-DT,IPC2D4E-WH-APF60-G-DT,IPCB324-IR@PAEK-IR1-F28-VG,IPCB322-IR@PAEK-IR1-F28-VG,IPC-B2A5-IR@PAEK-IR8-F60-VF,IPC-B2A5-IR@PAEK-IR8-F40-VF,IPC-B2A5-IR@PAEK-IR8-F120-VF,IPC-B2A5-IR@PAEK-IR8-F80-VF,IPC-B3A5-IR@PAK-IR3-F40-VF,IPC-B3A5-IR@PAK-IR3-F28-VF,IPC-B3A5-IR@PAK-IR3-F60-VF,IPC2122LB-ADF28KM-G,IPC2122LB-ADF40KM-G,IPC322LB-DSF28K-G,IPC322LB-DSF40K-G,IPC3612LB-ADF28K-G,IPC3612LB-ADF40K-G,IPC2322LB-ADZK-G,IPC3532LB-ADZK-G,IPC3632LB-ADZK-G,IPC2123LB-AF28KM-G,IPC2123LB-AF40KM-G,IPC323LB-SF28K-G,IPC323LB-SF40K-G,IPC3613LB-AF28K-G,IPC3613LB-AF40K-G,IPC233L-IR5-AF40-G-DT,PC233L-IR5-AF60-G-DT,PC233L-IR5-AF80-G-DT,IPC233L-IR5-APF40-G-DT,IPC233L-IR5-APF60-G-DT,IPC233L-IR5-APF80-G-DT,IPC2A3L-IR6-AF40-G-DT,IPC2A3L-IR6-AF60-G-DT,IPC2A3L-IR6-AF80-G-DT,IPC2A3L-IR6-APF40-G-DT,IPC2A3L-IR6-APF60-G-DT,IPC2A3L-IR6-APF80-G-DT,IPC3A3L-IR3-AE28-G-DT,IPC3A3L-IR3-AE40-G-DT,IPC3A3L-IR3-AE60-G-DT,IPC3A3L-IR3-APF28-G-DT,IPC3A3L-IR3-APF40-G-DT,IPC3A3L-IR3-APF60-G-DT,IPC232L-IR3-F40-G-DT,IPC232L-IR3-F60-G-DT,IPC232L-IR3-F80-G-DT,IPC232L-IR3-PF40-G-DT,IPC232L-IR3-PF60-G-DT,IPC232L-IR3-PF80-G-DT,IPC232L-IR5-F40-G-DT,IPC232L-IR5-F60-G-DT,IPC232L-IR5-F80-G-DT,IPC232L-IR5-PF40-G-DT,IPC232L-IR5-PF60-G-DT,IPC232L-IR5-PF80-G-DT,

IPC332L-IR3-F28-G-DT, IPC332L-IR3-F40-G-DT, IPC332L-IR3-F60-G-DT, IPC332L-IR3-PF28-G-DT, IPC332L-IR3-PF40-G-DT, IPC332L-IR3-PF60-G-DT, IPC3612LB-SF28-A, IPC3612LB-SF40-A, IPC3612LB-SBF28-A, IPC322LB-SF28-A, IPC322LB-SF40-A, IPC322LB-SBF28-A, IPC2122LB-SPF28-A, IPC2122LB-SPF40-A, IPC2122LB-SBF40-A

- **Vicon Industries Inc,**
V2002D-PTZ
- **Zenitel**
TCIV-2+/TCIV-3+, TCIV-5+, TCIV-6+

ADDITIONAL REMARKS

Replace Hardware Remarks:

Be aware that after using Replace Hardware and changing the license, the license should always be checked to verify that it is activated.

4K Remarks:

Due to the nature of 4K and the high resolution at high frame rates, this will increase the demand for high performing network, CPU, graphic adaptors, and monitors. Unless all components in the hardware infrastructure is prepared for a high load, there might be limitations seen as latency, stutter etc.

4K - Recommended XProtect version 2016 or newer, supporting HW accelerated decoding using the GPU

ONVIF upgrade from DP 6.2 or earlier remarks:

After upgrade, some ONVIF devices might not work. The new version of ONVIF now only shows features that a responding correctly through the ONVIF interface. Since XProtect Corporate does not allow things like e.g. Audio, Input or similar to be removed, the ONVIF device will not be upgraded properly and hence not work. A work-around is to do replace hardware.

After upgrade Video Stream 1 and 2 might not correctly reflect the actual settings on those profiles. This is due to the ONVIF driver only used to have two video streams, where you selected a profile, where it now will have a video stream for each profile. XProtect Corporate "copies" the settings for each video stream when the driver is upgraded, so if Video Stream 1 or 2 did not have the correct profile that is now mapped to the stream it will show the same settings as before the upgrade even though the mapped profile might actually have other settings. The streams should work with the new settings unless some of these are not supported on the profile.

Some settings might be missing because the driver now only looks for the different type of settings in the places, they should be according to standard.

Some features might not work any longer because the driver now only looks for the features and corresponding settings in the places and in the format, they should have according to the standard.

Profile names might get changed after the upgrade because we now use the names given by the device for the profiles. These will not always correspond to what was previously used.

Axis Remarks:

The Axis M, P and Q drivers (except P8221) have been replaced with four new dynamic drivers that also supports the new Axis Events handling. This means that all new devices added to a system will automatically be detected on one of the new drivers.

Note: If your devices are using firmware 5.20 or lower then Events and I/O will not work with the new drivers. You should either upgrade to a newer firmware or manually select the driver to add the device. Be aware if you add the device manually and later upgrade the firmware you will need to do a Replace Hardware to change to the new driver.

Note: Before Replacing Hardware to only change the driver and not the hardware please contact Support on how to do this correctly.

AVHS: Due to a limitation in the firmware only 9 socket connections can be open on an AVHS device at any time. JPEG video streams, Audio In streams, Audio Out and Output streams use 1 socket connection each. H.264 video streams, Events, Inputs and Edge Storage use 2 connections each. This also means that when upgrading from a previous Device Pack to 7.3 all Channels should be disabled before the upgrade.

AVHS: Audio Out does not work properly with firmware before 5.50 when running the 2013 or older versions. To get Audio Out to work in the 2013 or older versions with a firmware before 5.50 you need to either enable anonymous login or disable all authentication on the device. Audio Out will work with firmwares before 5.50 on the new 2014 versions.

Axis S3008 Recorder integration

Axis S3008 Recorder is used as an external storage for camera devices added to Milestone VMS.

It is not added as a separate hardware device.

The cameras should be connected to Axis Recorder and properly set in Management client to retrieve the recordings.

Setup steps:

1. Connect the Axis S3008 Recorder to your device network.
2. Define username and password for the Recorder.
3. Configure all camera devices that will use this recorder as external storage to use the same credentials.
4. Add the camera devices in XProtect.
5. For each device make the next settings in Management client*:
 - Add the Axis Recorder IP address in **Settings tab > General settings > "Recorder address"**

- Select the preferred stream used for recording from the drop-down menu in **Settings tab > Stream number section > "Recorder stream index" field**
- Field **"Recorder retention time (hours)"** can be used to modify the desired retention time in hours, per channel.
 - * In Xprotect 2021R1 and further, there will be a separate tab for recorder's settings in Management client.

There are the following known limitations:

- Credentials of the Axis Recorder and camera devices connected to it must be the same**
- The camera devices can use only the default ports (80 or 443).
- Error handling is still not fully implemented.
- If a device connected to Axis Recorder is removed from Management Client, the recordings from this device on Axis Recorder are not removed.

** This limitation will be not valid for XProtect 2021R1 and further, as there will be a separate setting tab (in Management client) for adding the credentials for S3008 Recorder connection.

Bosch remarks:

For Bosch devices with FW 6.60 and above, adding might fail, if you use Auto Discovery method and have more than 3 unsuccessful tries with incorrect credentials. To avoid that, we recommend manually add these Bosch devices with correct credentials. For details please refer to:

https://supportcommunity.milestonesys.com/s/article/unable-to-add-device-with-any-driver-even-if-the-correct-password-is-in-the-list?language=en_US

Hikvision remarks:

Due to the new security policy introduced by Hikvision with the 5.3.x baseline firmware, adding Hikvision cameras may cause temporary lockout of devices, even if the correct username and password have been predefined. This can be avoided by disabling the 'Enable Illegal Login Lock' option on the camera's webpage, if it is available in the firmware.

Firmware versions supporting the 'Enable Illegal Login Lock':

v5.3.8 build 150722
v5.3.0 build 150513
v5.3.8 build 151224
v5.3.10 build 150917

Firmware versions without the 'Enable Illegal Login Lock':

v5.3.8 build 150707
v5.3.9 build 150910

Recommended installation steps:

For devices that have the ability to control the Illegal Login Lock:

It is recommended to disable the Illegal Login Lock from camera's web page prior adding the device to XProtect software.

Enabling it afterwards will not affect the functionality of this camera.

If disabling this feature is not an option, please mind the following:

1. Avoid using express scan. If this is not an option, please specify the username and password on top of the credentials' list.
2. When using IP range don't define more than 1 password and username.
3. If you need to add a lot of cameras with different credentials it is recommended using CSV file method.
4. Use manual add method (auto discovery).

For devices without Illegal Login Lock control in their webpage:

5. Avoid using express scan. If this is not an option, please specify the username and password on top of the credentials' list.
6. When using IP range don't define more than 1 password and username.
7. If you need to add a lot of cameras with different credentials it is recommended using CSV file method.
8. Use manual add method (auto discovery).

Using firmware 5.5.0 and later versions

With firmware 5.5.0 Onvif will no longer be enabled by default.

To enable it, you need to use the Hikvision's tool which is found on their webpage or do it directly on the cameras homepage.

Multi stream devices: Some Hikvision cameras have support for up to 10 streams. If stream 6 to 10 needs to be used it should be set up on the cameras webpage before the device is added to Milestone.

Video will be lost if stream 6 to 10 is selected in Milestone and not set up on the cameras webpage.

Mobotix remarks:

For the Mobotix Q24 / Q25/ Q26: With JPEG streaming and use of Audio, there is a tradeoff between network bandwidth and audio quality. In order to lower the bandwidth, the user should tune the FPS of MxPEG codec settings in a way that audio quality does not get too bad.

Stretch Remarks:

To accommodate requests that the Stretch cards can run in a machine that has no Network card, the Stretch cards will from Device Pack 7.1 use a new scheme to retrieve a serial number. This means that when updating from a previous device pack, you need to run a Replace Hardware and get a new license for the Stretch cards to work.

Stretch driver is last contained in Device Pack 11.2. It is included in Legacy device Pack 2.0

Upgrade from DP 6.7 or earlier remark:

If you are upgrading from a device pack prior to Device Pack 6.7 and using XProtect Enterprise 8.x, XProtect Professional 8.x, XProtect Express, XProtect Essential 2.x or XProtect Go 2.x versions, it is important that you do not uninstall the previous Device Pack first.

Software Manager:

The 2018 R2 release of XProtect VMSs includes an updated version of the Software Manager. This version of the Software Manager removes the need for special deployment packages and allows using the standard installers for deployment. Distributing Device Packs to Recording Servers using Software Manager will be possible to do using the normal Device Pack installer from version 9.9a.

Legacy Device Pack:

Device drivers are now split into two device packs: the regular device pack with newer drivers and the legacy device pack with older drivers.

The regular device pack is included in the Product release. The legacy device pack is a separate installer. More information about the drivers could be found on the Milestone website: <https://www.milestonesys.com/community/business-partner-tools/device-packs/>

Last released: Legacy Device Pack 2.1a

Warning: You have to stop the Milestone Recording Server service in order to install the Legacy Device Pack

VMS Features supported by Drivers:

Driver/Feature	Bulk password change (released in 2019R2)*****	Initial device configuration (released in 2020R3)*****
Axis*	supported since DP 10.3	supported since DP 11.1
Bosch**	supported since DP 10.3	supported since DP 11.1
Hanwha (Generic)	supported since DP 10.4	supported since DP 11.1
ONVIF/ONVIF16	supported since DP 10.3	supported since DP 11.1
Panasonic	supported since DP 10.4	no
PanasonicSPSF	supported since DP 10.4	no
HikvisionGeneric	supported since DP 10.4	no
Sony***	Supported since DP 11.1	no
Canon****	Supported since DP 11.1	no

*Axis drivers include:

Axis (since DP 11.5)
 Axis11ChDevice
 Axis12ChDevice
 Axis1ChDevice
 AxisAxis1ChPtzDevice
 Axis2ChDevice
 Axis3ChDevice
 Axis4ChCamera
 Axis4ChDevice
 Axis8ChDevice
 AxisAudioDevice"

**Bosch drivers:

Bosch (since DP 11.5)
 Bosch16ch

Bosch1ch
Bosch2ch
Bosch3ch
BoschPTZ
BoschX20XF
BoschX40XF"

*** Sony drivers include:

SonyG7
SonyVB600
SonyER
SonyG6Ptz
SonyRHRS
SonyZR550
SonyGenX

**** Canon drivers include:

Canon1ChDevice
Canon1ChPtzDevice
CanonVBM
CanonVBM40
CanonVBS
CanonVBSNoPtz

***** The availability of the VMS (XProtect®) features can depend on the XProtect® VMS product. For details, please refer to the [XProtect Product Comparison Charts](#).