

MASK/NO-MASK Analytic for Milestone XProtect®

Powered by NVidia® Jetson[™]

QUICK INSTALLATION GUIDE

Product Version: 1.0.0.0

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Overview

This guide provides quick installation instructions on how to install Radinium Mask for Milestone XProtect®. It lists all product requirements and guides you through the installation process. It also explains how to obtain a 10-day Trial License. This guide can be used by system integrators and administrators.

For detailed information on how to configure and use the product, please refer to our product tutorial videos.

Installation Prerequisites

Milestone Express+, Professional+, Expert, Corporate 2019 R3 or higher must be installed, all services running (making sure the Event Server Service is running) and the camera you want to use, is already added in Milestone.

Forensic Search only available on Milestone XProtect® Expert and Corporate.

Windows 10 Pro, Server 2012 R2, Server 2016 or Server 2019.

NVidia Jetson switched on with Radinium Mask image on 32GB SD Card.

Checking your Firewall

Make sure your firewall is off, or if you need it on take note of the following requirements:

ICMPv4 must be open to all servers, the unit must be able to ping the servers via normal ICMP.

Event server ports: Incoming TCP 22331 Incoming TCP 80 Incoming TCP 443 Incoming TCP 9090 (for analytics events)

Management server ports: Incoming TCP 80 Incoming TCP 443 Incoming TCP 16385

Metadata server: Incoming TCP 52123 Incoming TCP 16385

Recording server (for all servers used by Jetson): Incoming TCP 7563

Installing MASK/NO-MASK Plugin for Milestone XProtect®

- 1. Download MASK from www.radinium.com.
- 2. Run the setup package 'Radinium_Mask.exe' on the Milestone Management Server.
- 3. Do you want to install Radinium Mask? Press Yes.
- 4. Installer will Extract.

5. Press 'Next'.

6. Accept the terms in the License Agreement and press Next.

7. It is recommended you keep the default folder and press Next.

8. Press Install to start the installation.

If you run your Milestone Smart Client somewhere else, you can install 'Radinium_Mask.exe' there as well. It will automatically install the Smart Client plugin.

Setting up your NVidia $\ensuremath{\mathbb{R}}$ Jetson $\ensuremath{^{\rm TM}}$

1. We assume you have your NVidia® Jetson[™] turned on and the network is connected.

2. If a DHCP server is available, it will get an IP from your DHCP server. If not, the default IP address is 192.168.0.10.

3. Open your browser and type in exactly:

https://192.168.0.10:10000 or using your DHCP leased IP address.

4. You will receive a Certificate Warning.

5. Click on Details and Go to the Webpage.

6. Default Username: radinium and Password: pass

7. If you need to change the IP address, go to Network Configuration and Network Interface:

8. Here you can change the IP address of the Jetson[™] where and if required.

9. You can also change the Password by going to Hardware on the left menu.

Write down your new settings, as you will require in in the Milestone Management setup.

Only the IP address, Username and Password is required on the Jetson. All the rest are configured from the Management Client.

Management Client Setup

- 1. Open the Milestone Management Client.
- 2. First we need to install the Milestone MIPdriver.
- 3. Go to 'Recording Servers' and 'Add Hardware'.

4. Select 'Manual' and Next.

5. Add "password" as the password

6. Select 'Milestone' and 'MIP Driver', and Next.

7. Type in address: 127.0.0.1, Port: 52123 and Hardware model: MIP Driver

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8. Create new Blank user name and Password:

password

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9. Select how many Metadata ports you intend to use.

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10. Create a Metadata Group called "Mask".

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11. Add the Group to each Metadata channel, Finish.

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12. Now we must allocate/add the metadata channel to the camera you will be using. Click on the Camera and select the Client tab.

13. Select the metadata stream you will be using:

14. You will notice the metadata channel is recording.

15. Click on the Recording Tab of the same camera and change the pre-buffer setting to 1 second. It is recommended to set the camera resolution to 720p under Settings Tab for the Jetson[™] Nano.

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16. Click on your MIP Driver – metadata stream and change the pre-buffer setting to 1 second as well.

Adding Basic User to Milestone

 It is important to create any Basic User to be used for authentication to the Jetson[™].

2. Add your Basic User as an Administrator under Roles.

Setting up an Analytic Event

1. First make sure that your Analytic Event Port is enabled. Go to Tools, Options.

2. Click on the Analytic Events Tab and Enable Port 9090

3. Go to Analytics Events, right-click and create an Analytic Event using the exact spelling and case sensitive: No Mask

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Setting up an Alarm

1. This not required, but if you want the No-Mask detection to alarm in the Milestone Alarm Manager, go to Alarms and click on Alarm Definitions.

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2. Add an Alarm Definition called 'No Mask'. Select Analytics Events for the Trigger Event. Select 'No Mask' as the Event, and select your related camera as Source.

Adding the JetsonTM to Milestone

1. Go to MIP Plugins. Click on Jetson Configuration. Right-click and Add-New.

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- 2. Fill in the following fields:
 - a. Give the Jetson a Name. Multiple Jetsons can be added.
 - b. Select the related camera from the list previously selected for this install.
 - c. Enter the password of the Jetson, default: pass
 - d. Select the Metadata channel, previously setup for this install.
 - e. Type in the Basic Username, previously created.
 - f. Type in the Basic Password, previously created.
 - g. Type in the Server/PC Hostname where the Milestone Event Server Service resides.
 - h. Type in the IP address of the Jetson, default 192.168.0.10

Tip: Quick way to see the host name is to open a command prompt and type in 'hostname'.

3. Select the 'Area of Interest' by holding mouse down on the red dots and moving the rectangle.

It is recommended, but not limited to, to set the AOI at a 1023x1023 px maximum for the Jetson[™] Nano. AOI indicator are shown on the above screen shot. For the Jetson[™] Xavier NX and higher, the full FOV can be used with an 1080p resolution. More details are available at radinium.com.

4. Click on Save options to edge device. It will take about 30 seconds for the settings to be applied to the Jetson.

4. You might also receive a No License warning if you do not have a current license.

Licencing your JetsonTM and Milestone Plugin

1. Go to Radinium.com. Click on Portal on the menu.

2. Login or register an account.

4. Click on 'Add Site' and give your site a name.

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5. Copy the Site Key by clicking on the Copy icon.

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6. Click on Radinium Mask under MIP Plugins, and navigate to the Licensing tab. Paste your Site Key and press 'Save'.

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Now you have 2 choices to activate your license. If your system has internet, click on the 'Retrieve License (Online)' button. This will activate your license with a 10 day Grace Period linked to your Milestone SLC. If you do not have internet, go to the Offline License Request in this document. When activated, it will show licensed.

Note that the Jetson[™] must be online at the time of activation and the Serial number are linked with your SLC and Site Key.

8. To check your Registered Trial License, go back to the Portal and click on the down arrow, which will show your Site License linked with your SLC.

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Offline License request

Instead of retrieving your license online, you can Save License Request (Offline) in the Milestone Management Client in a .lrc file.

Take that file, go to your Portal and upload the Offline License Request. It will generate a .lic file, which you can then upload in the Management Client Radinium Mask Licensing tab by clicking on Load License File.

Note this .lic file has nothing to do with the Milestone .lic file.

How to purchase and activate

Your Milestone SLC will be required when purchasing your Radinium Mask Plugin. After purchase you can re-activate by Online or Offline methods. Your licence will not show a 10 day Grace Period anymore.

Note your Jetson[™] must be on and connected to the Management Server during the re-activation process.