

D-ViewCam
Plus

User Manual

Version 1.02

Business Class Networking

Manual Overview

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Manual Revisions

Revision	Date	Description
1.0	November 5, 2014	DCS-250 with firmware version 1.00
1.01	February 10, 2015	Added IVS information
1.02	June 29, 2015	Updated product description

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Product Overview

System Requirements

To ensure that your D-ViewCam Plus system can maintain high video monitoring and recording performance, certain minimum system configurations are required.

CPU	Intel Core 2 Duo E5300
RAM	2 GB
Hard Disk	250 GB or above
Motherboard	Intel P55, H55, X58, P45, P43 chip, MB vendor ASUS Gigabyte or MSI with Intel Chipset recommended
Display card	ATI Radeon 4650 or above (ATI Driver V11-2 recommended)
Ethernet	100Base-T or above, Gigabit LAN recommended
OS	32 bits: Microsoft Windows XP pro SP3/ Vista SP1/ Win 7 SP1/ Win 8 64 bits: Win 7 SP1/ Win Server 2008 R2/ Win 8/ Win Server 2012
Note: Users need to disable the Metro function of Windows 8 completely when starting D-ViewCam	

Note: To determine the minimum hardware requirements for your planned surveillance system if it is not listed in the above table, please consult the SI (system integrator), the reseller, or D-Link Technical Support.

Note: Recording video over a long period of time will consume large amounts of disk space. Make sure that you have enough disk space available if you want to use the recording function.

Introduction

Thank you for purchasing D-ViewCam Plus. This state-of-the-art video management software is a comprehensive surveillance system designed to centrally manage up to 32 network cameras, while displaying real-time information on the screen. This software allows you to build a powerful surveillance system at your home or small business by using D-Link network cameras and the latest features offered by the D-ViewCam Plus software.

Key Features

- D-ViewCam Plus automatically locates and adds network cameras in the local network
- Storage management for recording files
- Single and multiple video stream monitoring (up to 32 video channels)
- Two-way audio communication
- Intelligent filter and search capabilities for scheduling recording and/or event recording

Installing Your Network Camera

Before installing D-ViewCam Plus, please make sure you have installed your D-Link network camera(s) that will be managed by D-ViewCam Plus.

Step 1 - Follow the installation procedures that came with your network camera(s) to complete the camera installation process.

Step 2 - Verify that you are able to view the video images from the network camera (s) by accessing the camera's web-based configuration utility. It is recommended that all network cameras be installed in the same subnet as your management PC running the D-ViewCam Plus software.

Step 3 - Please refer to the **Add camera(s)** section in the next section **Software Installation** for more information.

Software Installation

Download the D-ViewCam Plus software from the following site:

<http://download.hq.dlink.com/DCS-250/>

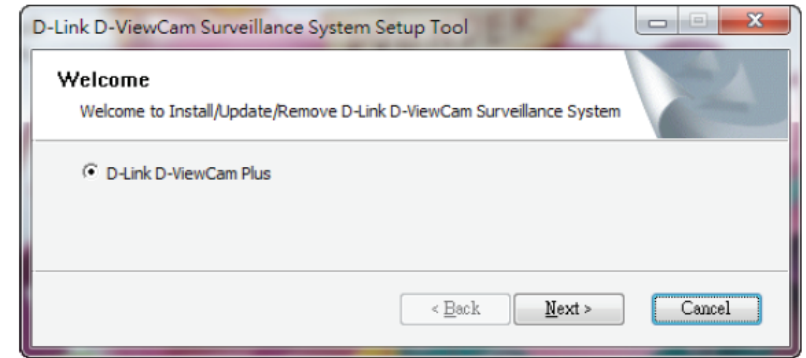
Extract the software to a folder, then run the **SetupTool.exe** file.



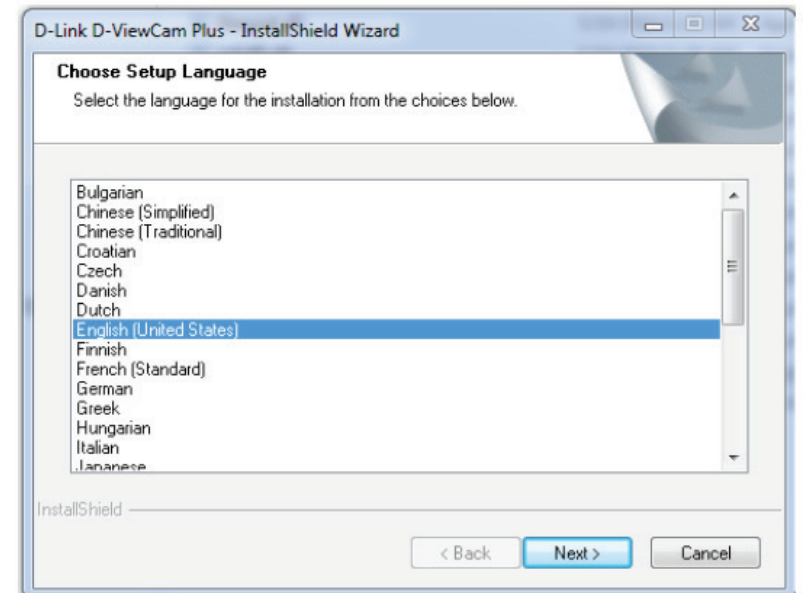
SetupTool.exe

Step by step instructions are shown below if you are using Windows® XP. However, similar instructions and windows are displayed for other Windows operating systems.

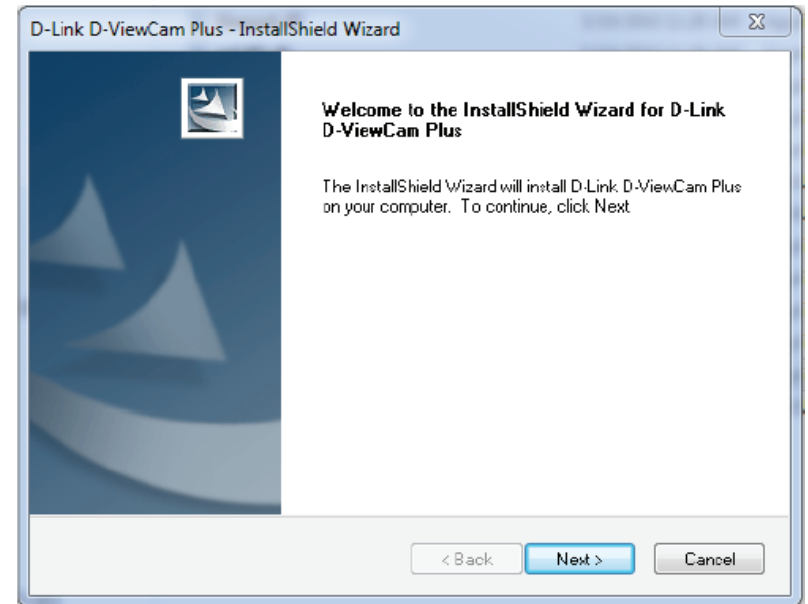
1. Click **Next** to continue.



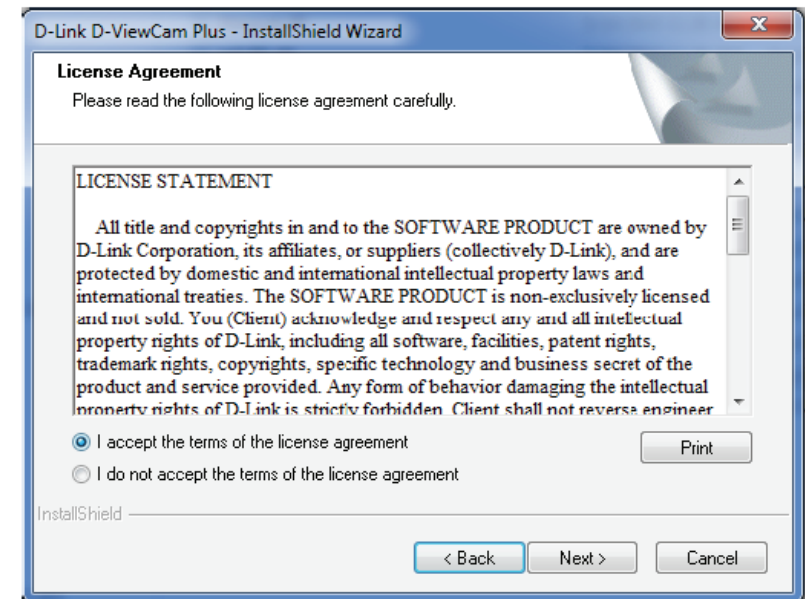
2. Select which language you want to use to install it. Click **Next** to continue.



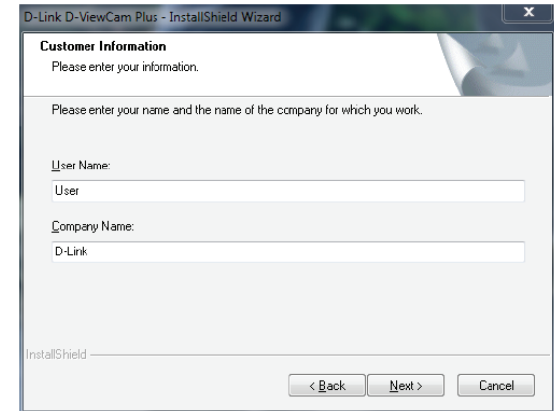
3. Click **Next** to continue.



4. Select **I accept the terms of the license agreement**. Click **Next** to continue.



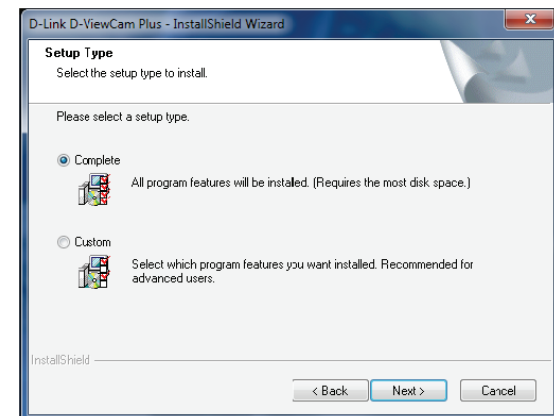
5. Enter the **User Name** and your **Company Name**. Click **Next** to continue



6. Select **Complete** to install the entire package or **Custom** to choose which programs to install. Click **Next** to continue.

COMPLETE SETUP TYPE

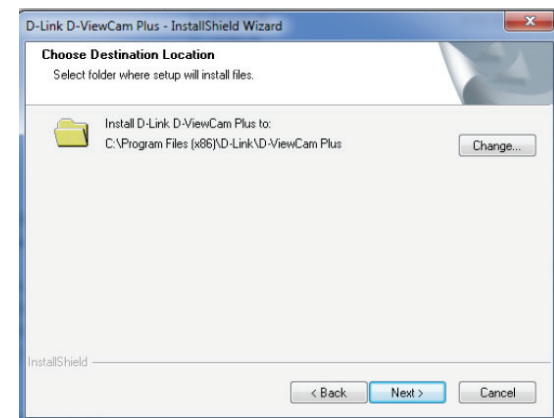
Select **Complete** to install all the program features into the default directory (requires the most disk space) and click **Next** to continue.



CUSTOM SETUP TYPE

Select **Custom** to change the installation directory and/or program features. This option is recommended only for advanced users.

7. Select **Custom** and then click **Next**. The Choose Destination Location window will appear.
8. To install to a different folder, click **Change** and select another folder. Click **Next** to choose which components are installed.

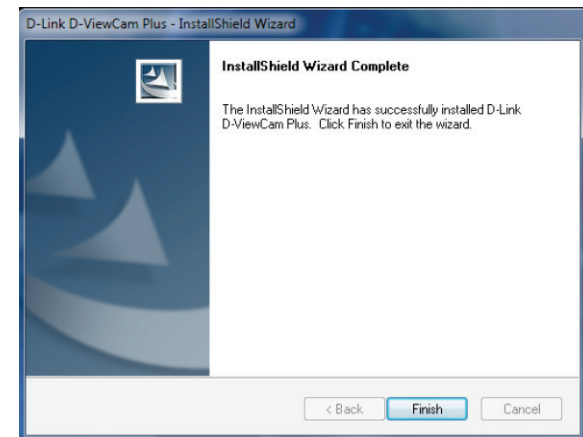
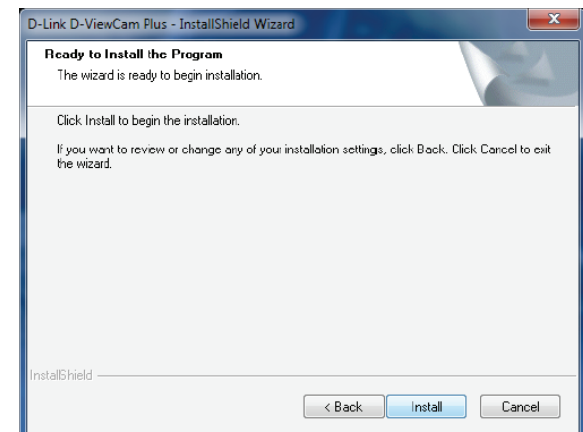
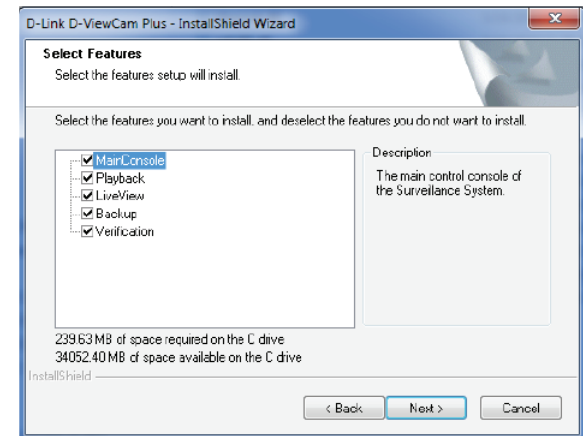


9. Select the features you want to install and click **Next** to continue. The five main features in the server setup process are:

- Main Console
- Playback
- LiveView
- Backup
- Verification

10. To continue and install to the specified folder with the chosen components, click **Install**.

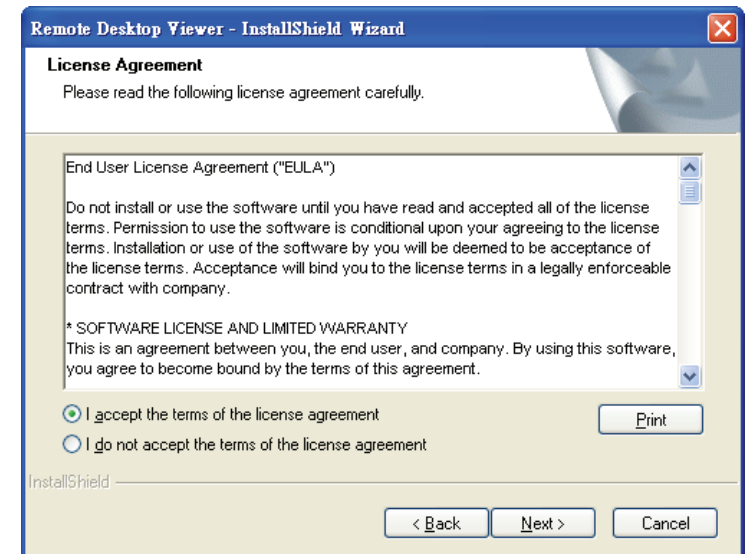
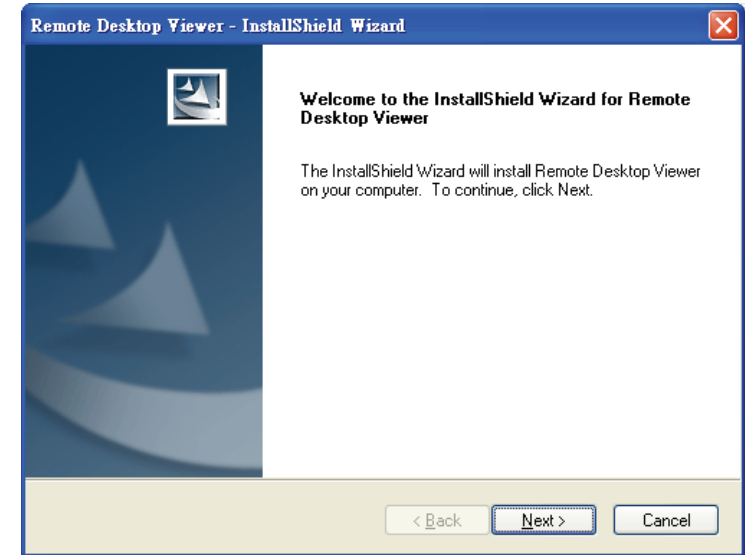
11. Click **Finish** to complete the installation.



Remote Desktop Viewer Installation

Remote Desktop Viewer allows for remote access to the Main Console and Setup configuration.

1. In the InstallShield Wizard screen, click **Remote Desktop Viewer** and then click **Next** to continue.
2. Select **I accept the terms of the license agreement**. Click **Next** to continue.



3. Enter the **User Name** and your **Company Name**. Click **Next** to continue.
4. Select **Complete** to install the entire package or **Custom** to choose which programs to install. Click **Next** to continue.

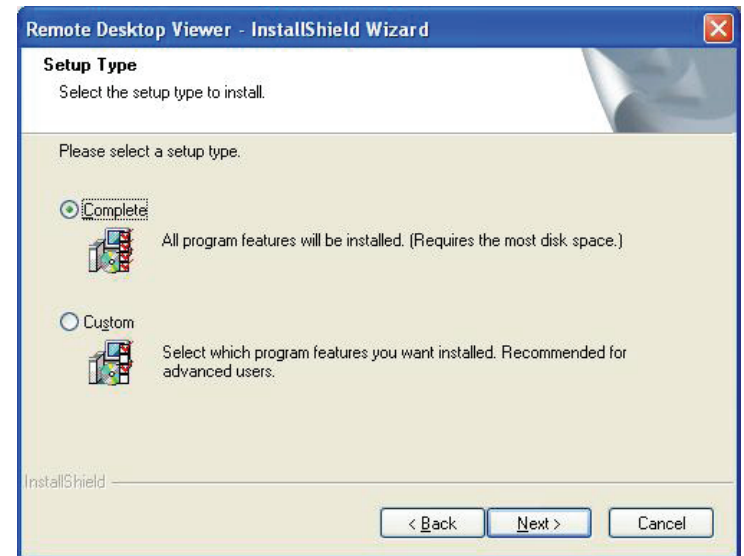
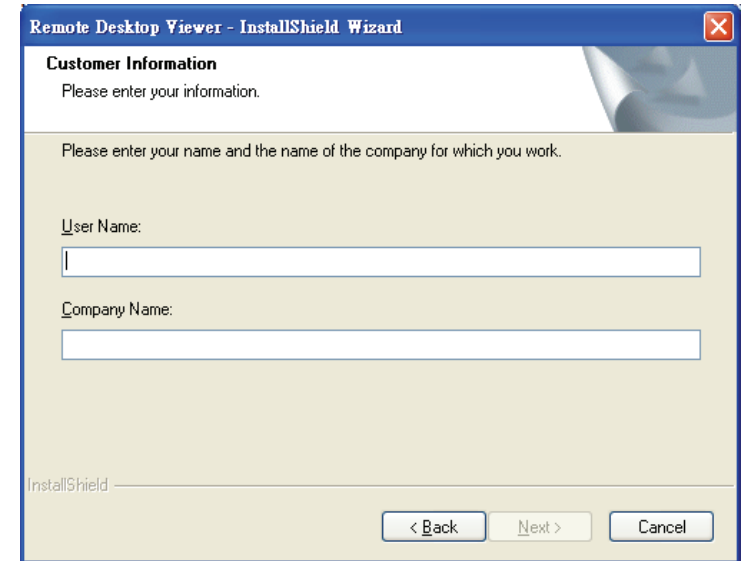
COMPLETE SETUP TYPE

Select **Complete** to install all the program features into the default directory (requires the most disk space) and click **Next** to continue.

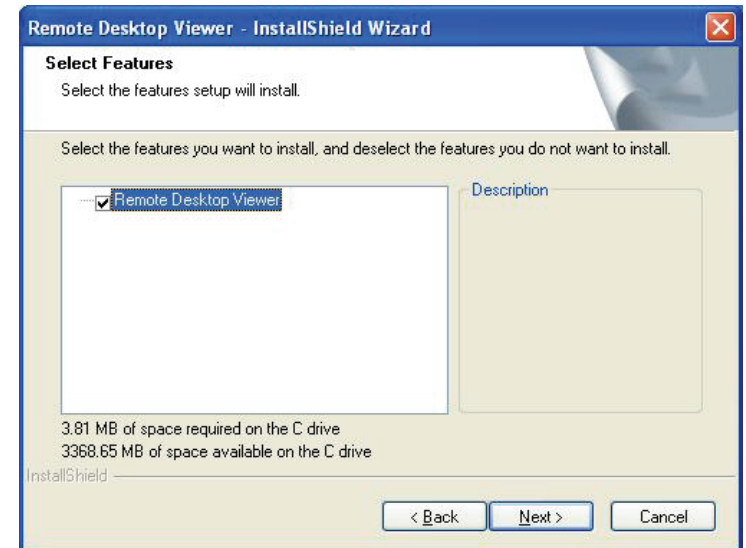
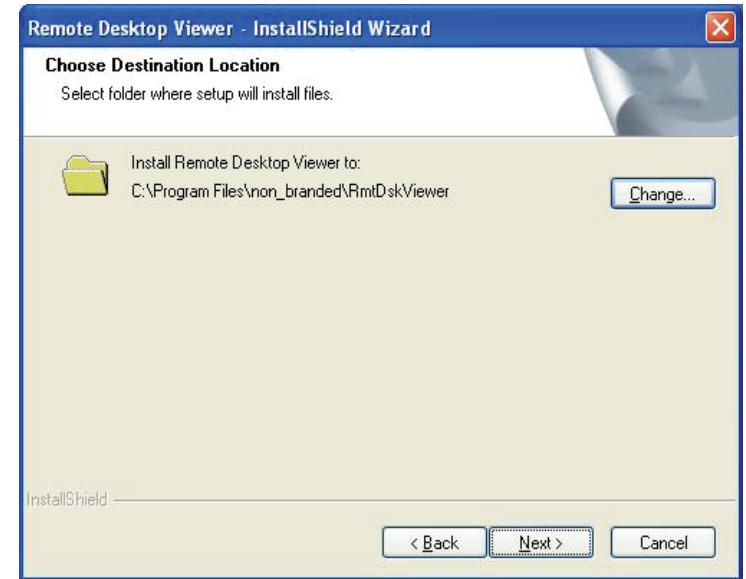
CUSTOM SETUP TYPE

Select **Custom** to change the installation directory and/or program features. This option is recommended only for advanced users.

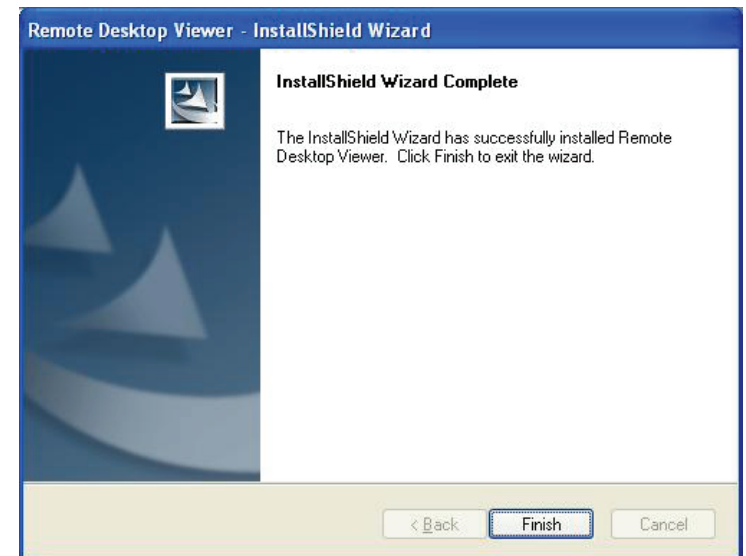
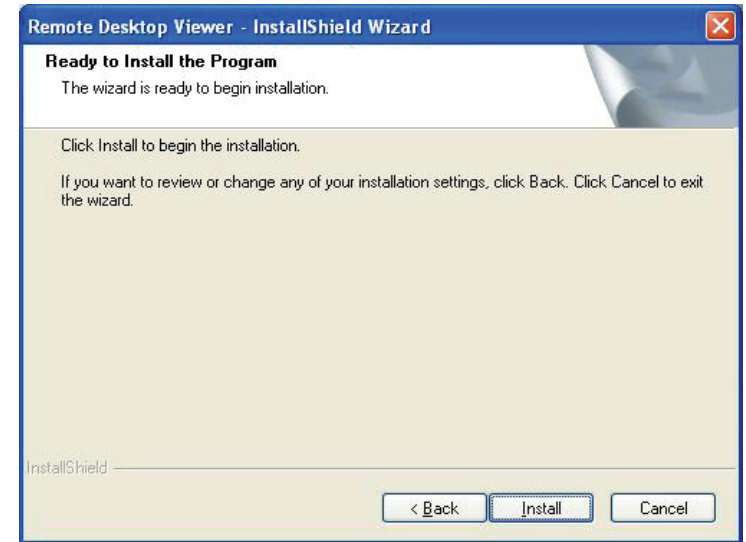
5. Select **Custom** and then click **Next**. The **Choose Destination Location** window will be displayed.



6. To install to this folder click **Next**. To install to a different folder, click **Change** and select another folder.
7. Select **Remote Desktop Viewer** and click **Next** to continue.

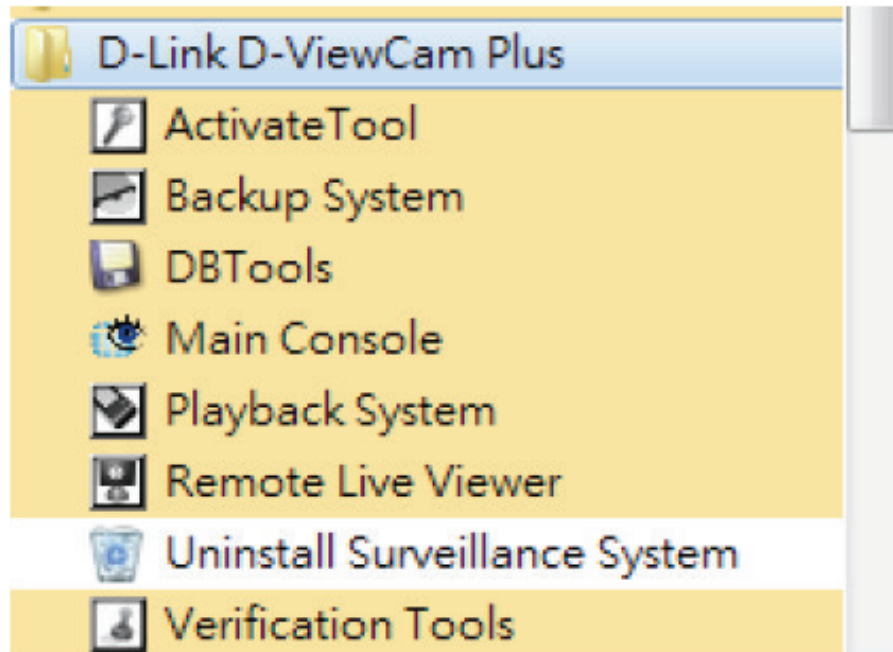


8. Click **Install** to start the installation.
9. Click **Finish** to complete the installation.



D-ViewCam Plus Login

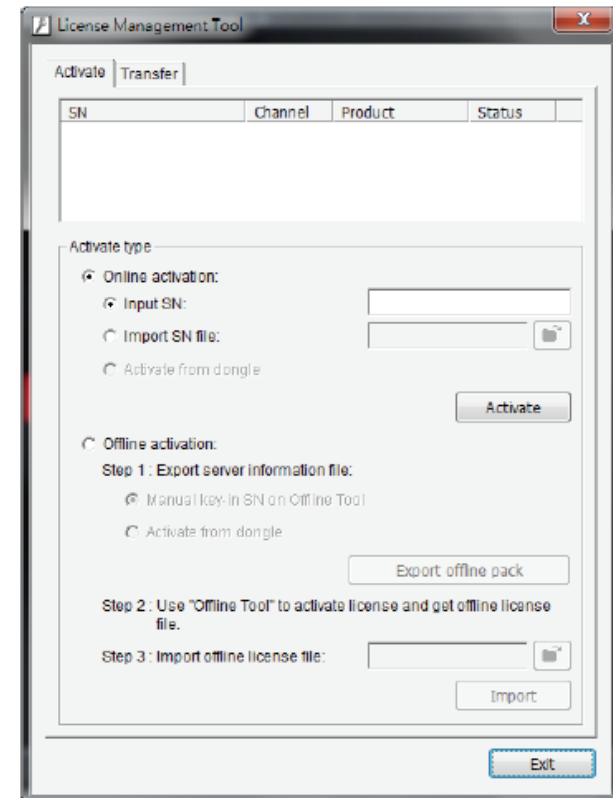
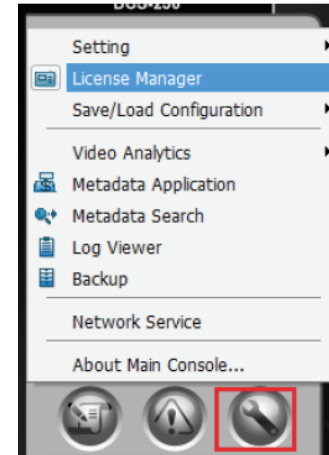
Once the console loads, enter the **User Name** and **Password** and click **OK**.





Activate Software License(s)

1. Go to **Main Console > General Setting** and open the **License Manager** tool.
2. Select Online Network Environment.
3. Select Input SN to enter the Serial Number, Import the SN file, or Active from Dongle to activate the license.
4. Click Activate. After the software license is activated successfully, please restart the Main Console.

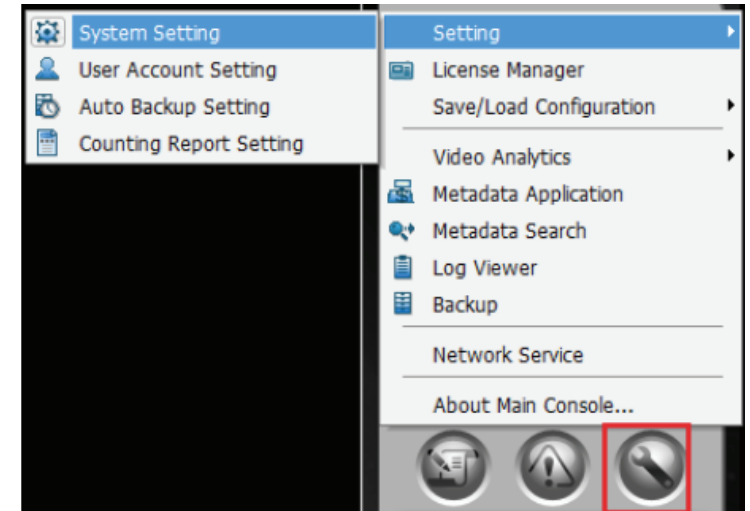
Note: Please refer to the License Management Tool section for advanced settings.



Add Camera(s)

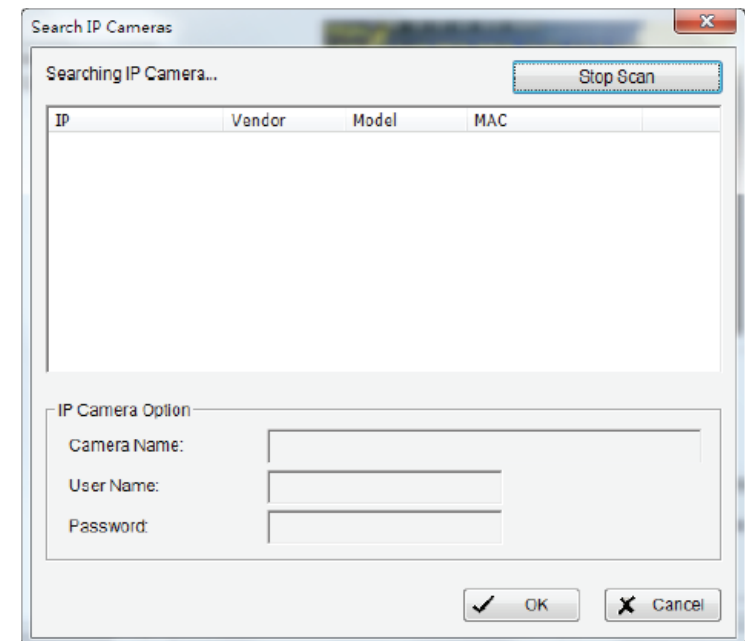
1. Once the console loads, click **General Setting** , then click **Setting**, and select **System Setting**.
2. Select the **Camera** tab, then click **Search**  to find the network camera (s) that are on your Local Area Network (LAN).

The system automatically searches for all the network cameras that are on your Local Area Network (LAN).

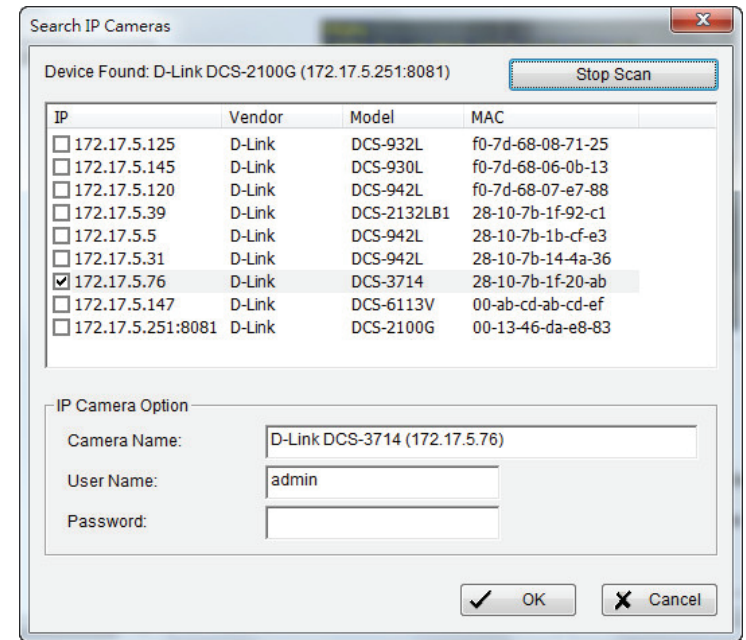


3. Select a **Camera**.


Note: If your network cameras support UPnP, follow step 3. Otherwise skip to step 5.




- Select one of the network cameras that are available, enter a **Camera Name** and then enter the **User Name** and **Password**. Click **OK** to add the camera.

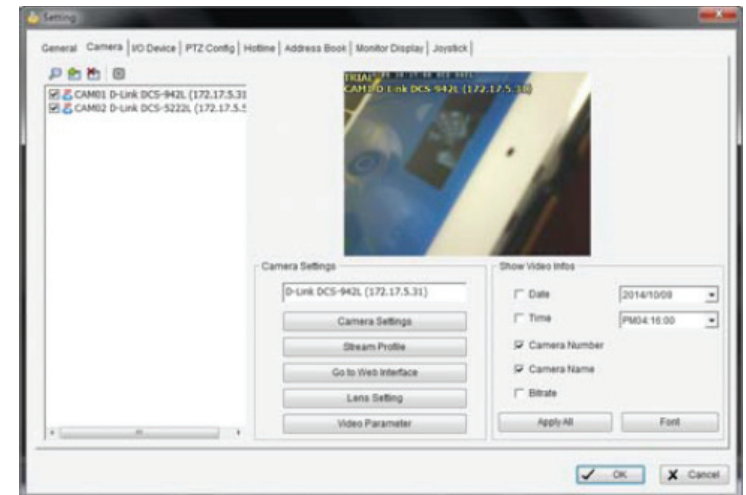


- If your camera(s) does not support UPnP, you can manually add a camera.

Insert: Click **Insert**  to manually add network camera(s) that are on your Local Area Network (LAN).

Delete: Click  **Remove** button to remove the selected IP camera(s) from the system. Click OK to finalize the modification.

Config: Click  **Config** button to view the IP Camera/Video Server Setting panel. You can modify the IP camera settings in the Setting panel.



6. Enter the following Network information for your camera:
- **Name** - Enter a name for your camera.
 - **IP Address** - Enter the IP address of this camera. If you want to use a domain name, then select DNS and enter the domain name.
 - **Port** - 80 is the default port.
 - **User Name** - Enter a username for this camera.
 - **Password** - Enter a password for this camera.
 - **Protocol** - Select **TCP, UDP, HTTP, or HTTPS.**

Enter the following **Device** information for your camera:

- **Auto Detect** - Click to detect the vendor and model information.
- **Vendor** - Select the vendor's name from the drop-down menu.
- **Camera Model** - Select the camera model from the drop-down menu.
- **Video Channel** - Select the video channel you want to assign the camera to.

7. Click **OK** to add your camera.

IP Camera / Video Server Setting

Network

Name: link DCS-942L (172.17.5.31)

IP Address: 172 . 17 . 5 . 31 DNS

Port: 80 HTTPs

User Name: admin

Password:

Protocol: TCP UDP HTTP

Device

Vendor: D-Link

Camera Model: DCS-942L

Video Channel: 1

Description

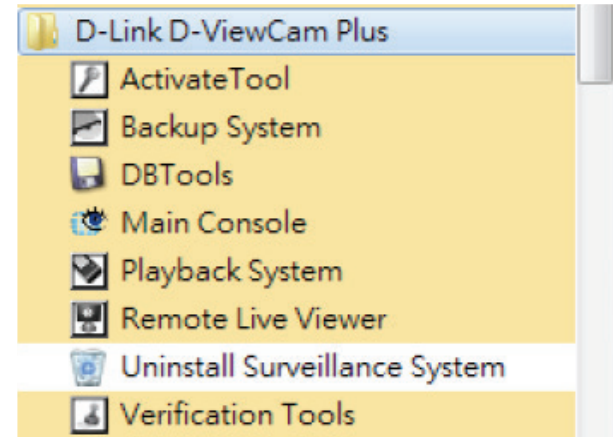
Video Codec:MPEG4 H264 MJPEG
Audio Codec:PCM
Camera:1, DI:0, DO:0

D-ViewCam Plus Interface Overview

This section will show you how to start and configure D-ViewCam Plus.

To start D-ViewCam Plus, go to

Start > All Programs > D-Link D-ViewCam Plus > Main Console.

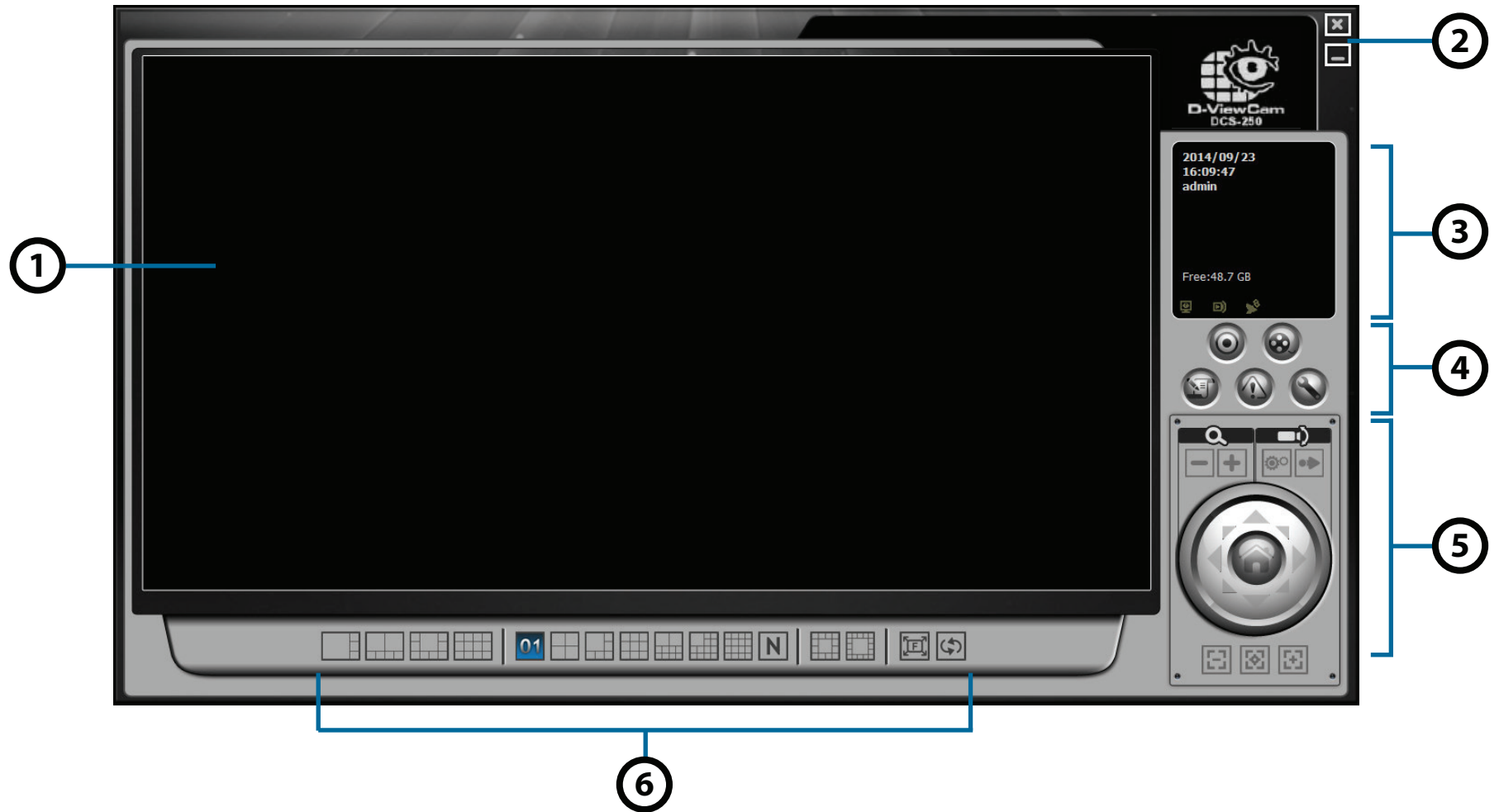


Enter **Admin** as the default username and password. Click **OK** to log into the system.

Note: Refer to the **User Account Setting** section for user account information.



Main Console



- | | | | |
|---|-----------------------|---|-------------------------------|
| 1 | Main Display Area | 4 | General Controls and Settings |
| 2 | Exit/Minimize Program | 5 | PTZ Features |
| 3 | System Information | 6 | Split-Screen Options |

Log Out/Exit Program/Minimize Window



















Click to log the current user out or to close the D-ViewCam Plus program.



Click to minimize the window.

Split Screen Options

Select a split-screen display layout by clicking on the desired layout icon. The system provides many different split screen modes. To switch to a single camera display, double-click the camera's image. To return to the previous configuration screen, press the **Esc** key or double-click on the screen again.

 Displays 4 screen	 Divides into 1 screen	 Divides into 10 screens	 Divides into 13 screens
 Divides into 6 screens	 Divides into 4 screens	 Divides into 13 screens	 Divides into 17 screens
 Divides into 9 screens	 Divides into 6 screens	 Divides into 16 screens	 Switch to full screen
 Divides into 12 screens	 Divides into 9 screens	 Divides into N screens	 Rotate all screens

Wide Screen Options

The following options are only available under wide screen resolutions (1440x900, 1680x1050, 1920x1080, 1920x1200)



Divide into 4 screen(s)



Divide into 9 screen(s)



Divide into 6 screen(s)



Divide into 12 screen(s)

Information Window

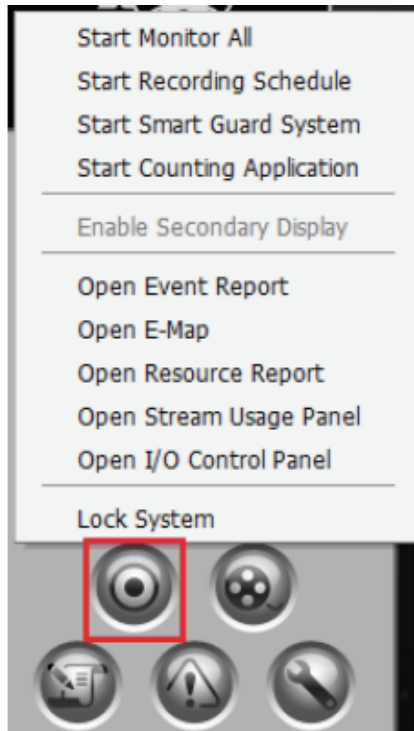
The information window displays the date, time, free disk space, IP camera bit rate, and customized text as well as information like temperature, fan speed, system resources, and network utilization.

The 5 network service icons below indicate which services are switched on or off.

	Live View	Playback	3GPP	Desktop	CMS
Start					
Stop					

Note: To customize information about window's setting, go to **General Setting > Setting > System Setting > General > Status Display**.

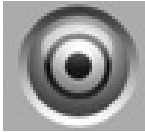
Start Monitor



Option	Function
Start/Stop Monitor All	Click to start or stop all monitoring functions.
Start/Stop Recording Schedule	Click to start or stop the recording schedule.
Start/Stop Smart Guard System	Click to start or stop the smart guard system.
Start/Stop Counting Application	Click to start or stop the counting application.
Enable Secondary Display	Click to enable secondary monitor display.
Open Event Report	Click to open the event report which will log any events.
Open E-Map	Click to open E-Map and monitor all devices with map indicators.
Open Resource Report	Click to open the resource report.
Open Stream Usage Panel	Click to open the stream usage panel for monitoring stream usage status.
Open I/O Control	Click to open the I/O control window, monitor DI/DO, and manually trigger DO devices.
Lock System	Click to lock the system.

Notes:

1. To automatically activate the recording schedule and smart guard when the main console starts, go to **General Setting > Setting > System Setting > General > Startup** to setup the auto-startup functions.
2. The secondary monitor will still retain and display all the functions (for example event report, E-map, resource report or IO controls) that are opened in the main console, even if you exit the main console.



Monitor:

Click on the **Start Monitor** icon and select from the menu to start/stop the recording schedule or guard system features. You can also open monitor tools such as event report, E-Map, I/O control panel, and system lock.



Playback:

Click on the icon to open the playback console. You can watch recorded video, search recorded video, adjust the image of the stored data, save video/pictures, print images, check log information and event records, and set up recording function configuration. See the **PlayBack** section for details.



Schedule:

Organize the recording time schedule and configure recorder settings. See the **Schedule** section for details.



Smart Guard System:

Add/edit type(s) of events that you want to detect and setup action(s) responding to events. See the **Smart Guard System** section for details.



General Setting:

Select to modify general settings, user account settings, save/load configuration settings, access log viewer and backup files, and configure network services. See the **Config** section for details.

System Information Window

Displays the Current Date, Current Time, Free Disk Space, Network Camera Bitrate, and User Defined Text.

PTZ Features

PTZ Camera Control

Use this function to control the movement of PTZ (Pan/Tilt/Zoom) cameras.

If your cameras support PTZ control, you can move, zoom, patrol, adjust the focus, and set preset points of the cameras.

Zoom

Click on the + sign to zoom in or click the – sign to zoom out.

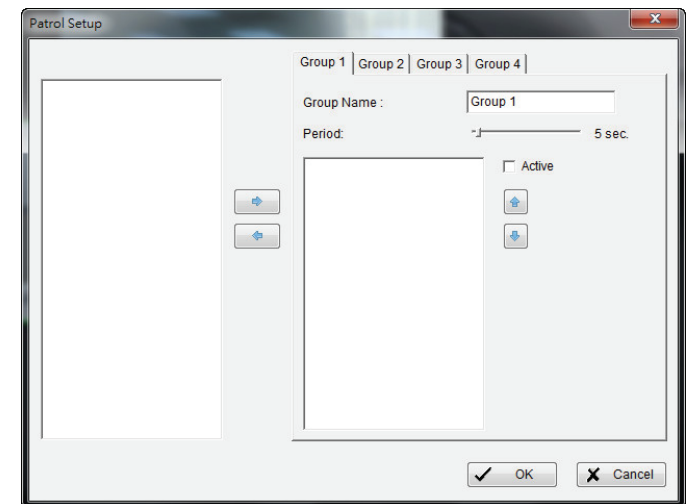
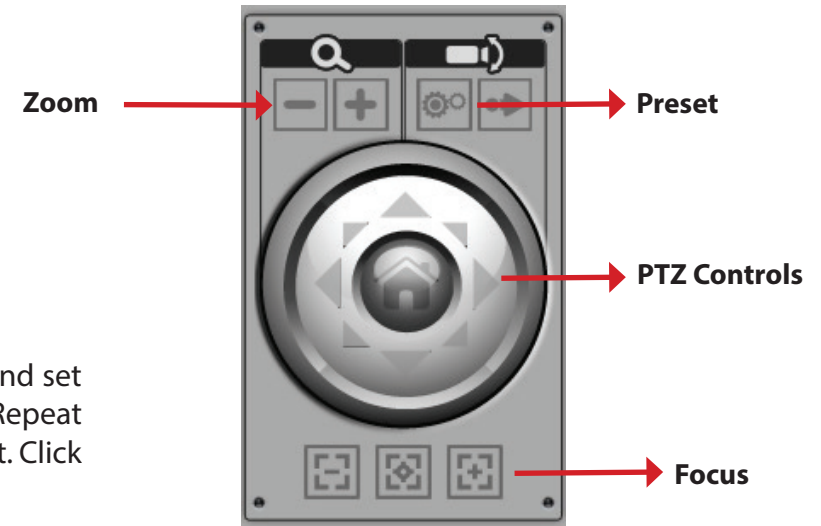
Preset/Go

Allows you to adjust the camera view until you are satisfied. For example, click **Set** and set the preset point to 01. Adjust the camera view again and set the preset point to 02. Repeat the process until all preset points are set. You can assign a custom name to each preset. Click **Go** to view the results of your setting.

Note: To adjust the speed settings of PTZ camera, go to **General Setting > Setting > PTZ Config**.

Patrol

Go to **Add Preset Point > Set Patrol** to bring up the Patrol Setup dialog. From the left window, select the camera(s) that you would like to have in the patrol group. Align the cameras in order in the right window and adjust the time. You can also rename the group name here. After completing the setup, check the Active option, and then click **OK**.






You can set up to four groups of auto patrol. To start or stop, click on the **Go to Preset Point** icon in the main console, and select **Start Patrol** or **Stop Patrol**.

Auto Pan

Go to **Go to Preset Point** and click on **Start AutoPan** to enable auto pan. Click on **Stop AutoPan** to stop. Auto Pan enables the camera to scan an area horizontally from left to right or right to left.



Focus

You can select to focus the camera near, far, or have it auto focus. Click on the  sign to focus near, click on the  sign to focus far, and click on the center icon to auto focus. Focus near means objects that are closer will be clearer than the objects that are further away. In contrast, to focus far means objects that are further away will be clearer than the objects that are closer. Click on the  icon and select auto focus if you want the system to decide the focus point for you.

On Screen Menu

Right-click on the camera screen and get the “On Screen” menu, from which you can quickly adjust the settings of your camera.

Camera Setting

Click to go to the camera setting page for general settings.

Enable Talk

With cameras that support two-way audio, select **Enable Talk** to utilize the function.

Enable Digital PTZ

To enable the PTZ functions of the camera, select the **Enable Digital PTZ** option. Use the mouse wheel or click on the + and – signs to zoom in and zoom out on the camera. The square flashing on the video grid indicates the correspondent view of the camera.

Connect/ Disconnect

Right-click on the display screen and select **Connect/Disconnect** to modify the connection status of the camera.

Show Camera

Select the camera from the Show Camera menu to display video on a selected screen. The list of cameras will be displayed in the right column of the monitor display panel.

Delete Camera

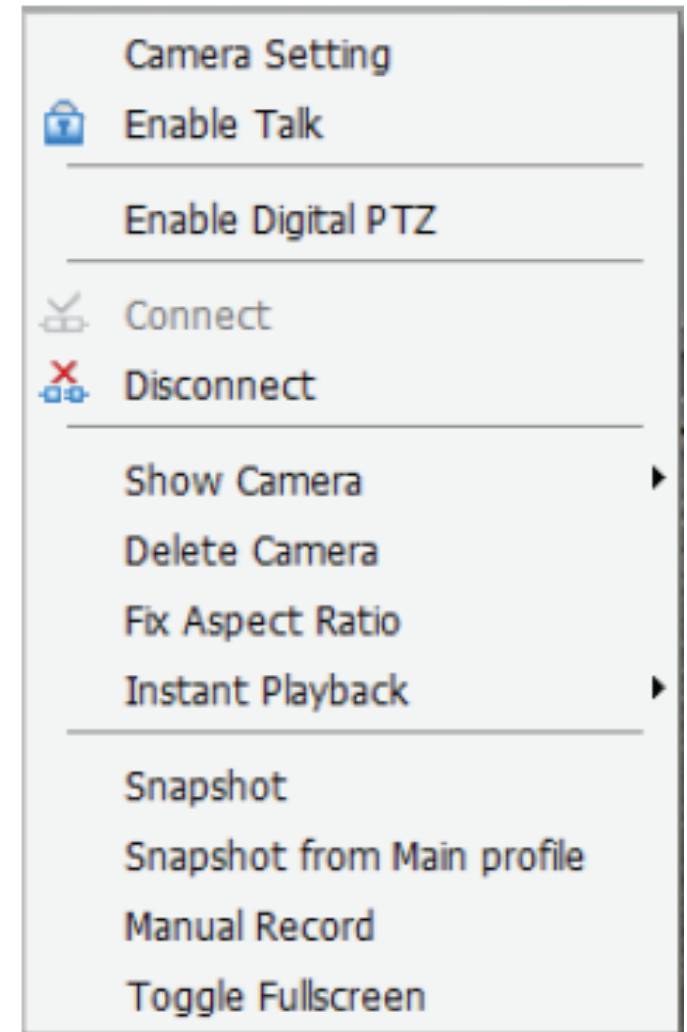
Click on **Delete Camera** to remove a camera from the display screen.

Fix Aspect Ratio

Enable **Fix Aspect Ratio** to view the original ratio video or disable this option to stretch 3:4 to fit window.

Instant Playback

Instant Playback function allows you to play the last few minutes of any live video channel. Right **Click Live Channel** and select Instant Playback to access the recorded video.



Snapshot

Select the snapshot function to capture a screen shot of the current video. You have the option to copy the image to clipboard or to save it. You may select the OSD option to export the image with the date/time and camera number/name displayed. If the digital PTZ function is enabled, you may export it in full size or select a specific area as your snapshot region.

Snapshot from Main profile

Select the snapshot function to capture a specific video image frame from the camera main profile immediately. You have the option to copy the image to the clipboard or to save it.

Stream Profile

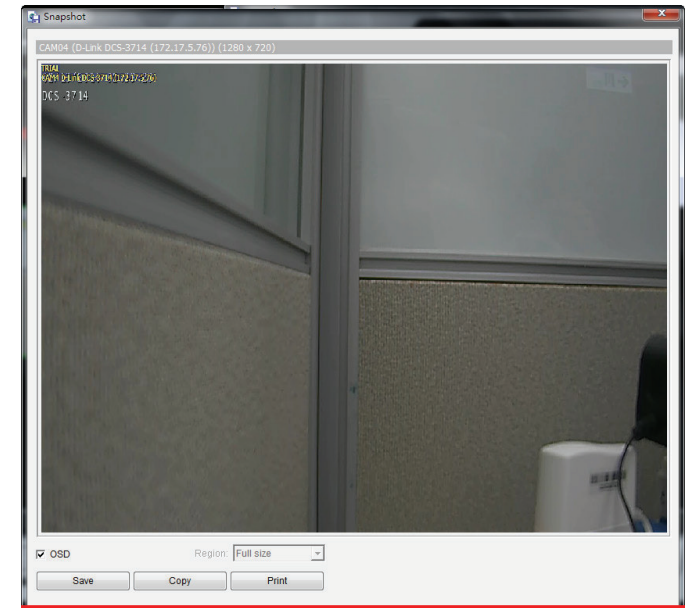
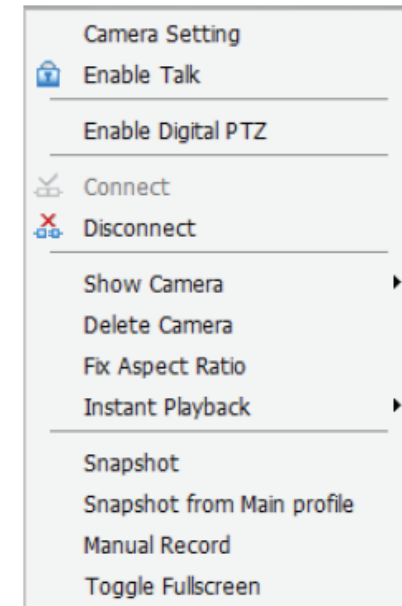
Select different level Stream Profiles to downgrade video quality for bandwidth concerns.

Manual Record

Select to start recording video.

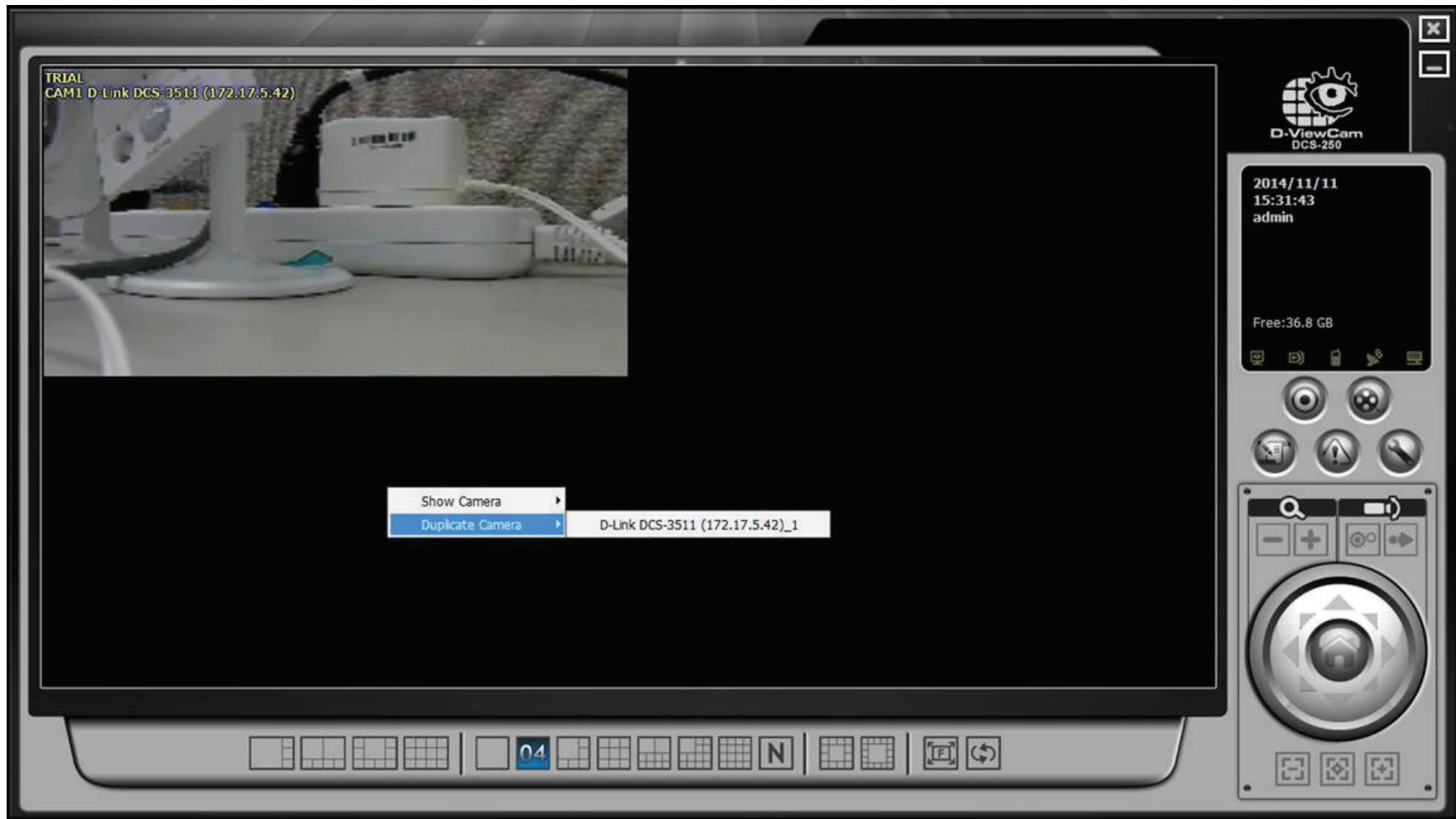
Toggle Fullscreen

Select to view live video(s) in fullscreen. Press **ESC** to go back to the original window.



Duplicate Camera

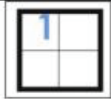
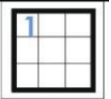


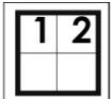
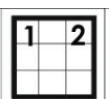
To duplicate the feed from a camera, right-click on a blank area of the screen and select **Duplicate Camera**. Select the appropriate camera to duplicate the feed from. The duplicate view from the camera will then be displayed adjacent to the original view.



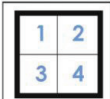
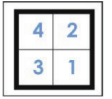
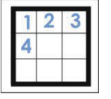
Live Display

Live display allows you to change channels and screen divisions on the main console and secondary monitor. Each screen division will have the same display list, but a different sequence. The maximum number of screen divisions supported by the main console and secondary monitor is 64. For example, when using **Show/Delete Camera** to edit the camera list, the administrator can apply this function to all the different screen divisions.

Note: The camera list for every division is the same as the right column of the monitor display in the **General Setting > Setting** window. This means two monitors can have two different lists.

Action	Current Division	Other Division
Show camera (add cam 1)		 Add to the first free channel
Duplicate camera (duplicate cam 2)		 Add to the first free channel
Delete camera (delete cam 2'')		 Remove cam 2 and keep the channel free

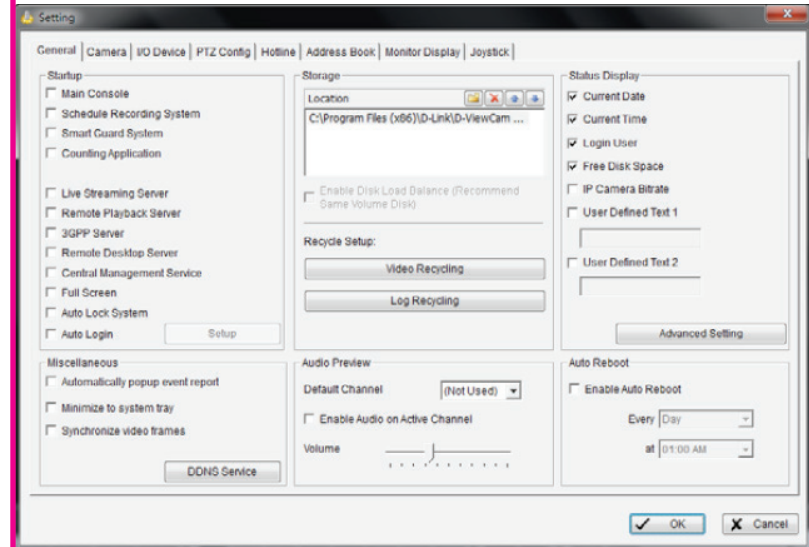
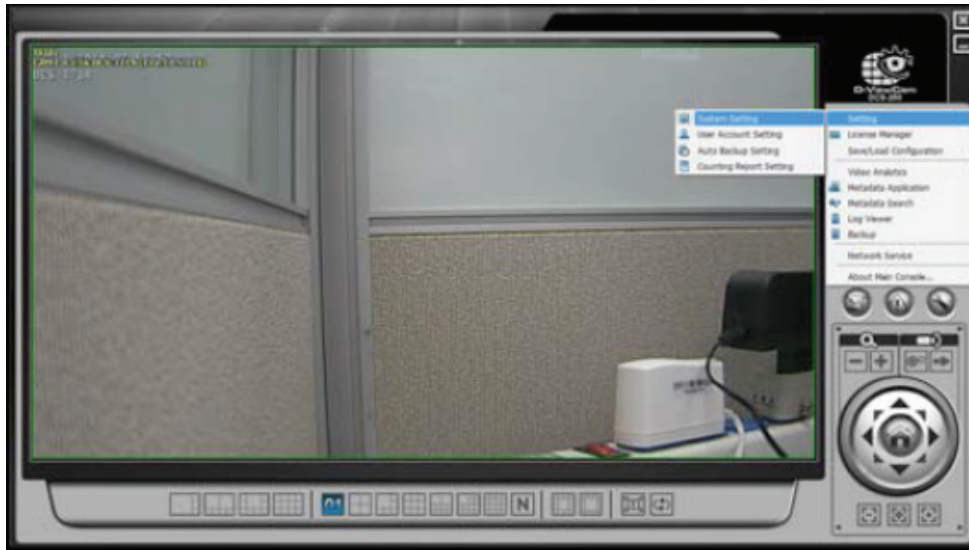
When using the mouse to drag the camera channel, the sequence change will only apply to the original division.

Original	Action	Current Division	Other Division
	Drag cam 1 to cam 4		 No change in sequence

Right click on the camera screen and get the On Screen Menu, from which you can quickly adjust the camera settings.

Configuration

Click  to configure your settings.



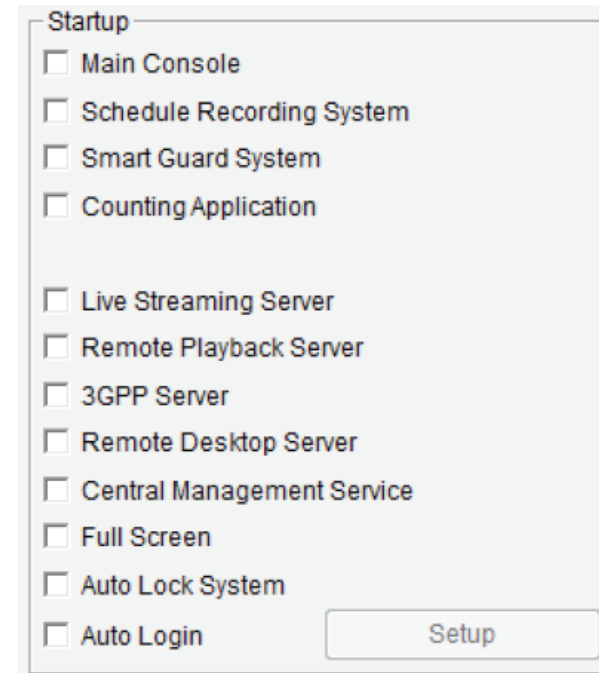
General

Go to **General Setting > Setting > System Setting > General**.

Startup

Main Console: Select to view the Main Console system upon startup.

Select the functions and network services that should activate automatically.



The screenshot shows a window titled "Startup" with a list of checkboxes for various services. The "Auto Login" checkbox is selected. A "Setup" button is located at the bottom right of the window.

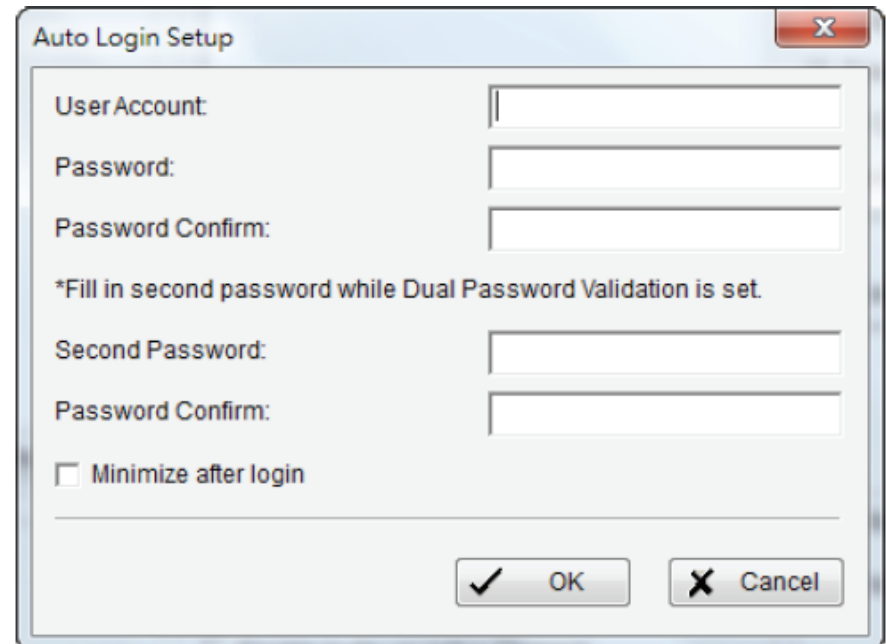
- Main Console
- Schedule Recording System
- Smart Guard System
- Counting Application
- Live Streaming Server
- Remote Playback Server
- 3GPP Server
- Remote Desktop Server
- Central Management Service
- Full Screen
- Auto Lock System
- Auto Login

Setup

Auto Login Setup

Auto Login: Select **Auto Login** and then click **Setup** to view the **Auto Login Setup** window.

Enter the **User Account** and **Password** to login automatically when the system starts. Enable **Minimize after login** to minimize the Main Console window after login.



The screenshot shows a window titled "Auto Login Setup" with several input fields and a checkbox. The fields are for "User Account", "Password", "Password Confirm", "Second Password", and "Password Confirm". A checkbox for "Minimize after login" is present. The "OK" and "Cancel" buttons are at the bottom right.

User Account:

Password:

Password Confirm:

*Fill in second password while Dual Password Validation is set.

Second Password:

Password Confirm:





Minimize after login

OK Cancel

Storage

Location:

Assign the default folder for the system to store data files. It is recommend that you don't save in the system drive (C:\) to avoid a drop in your PC's performance when free storage is low.

	New	Click to add a new location. Click the ... button to browse to a folder. Click OK to save the location.
	Delete	Highlight a location and then click the Delete button to remove it.
	Move Item Up	Highlight a location and click the Move Item Up button to move the location higher in the list.
	Move Item Down	Highlight a location and click the Move Item Down button to move the location lower in the list.

Video Recycling:

This option allows the user to configure different recycle criteria for different cameras and recording modes.

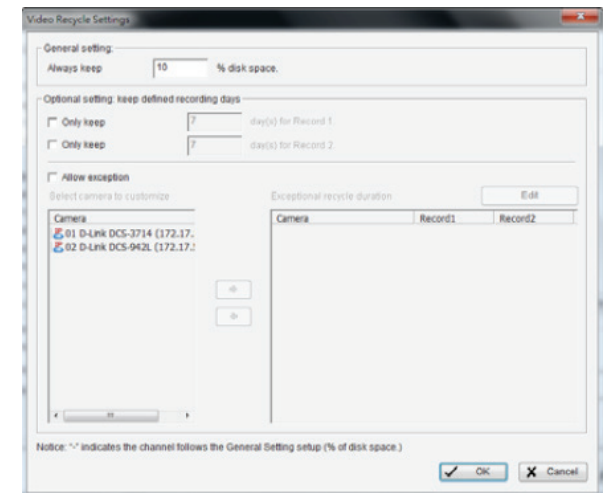
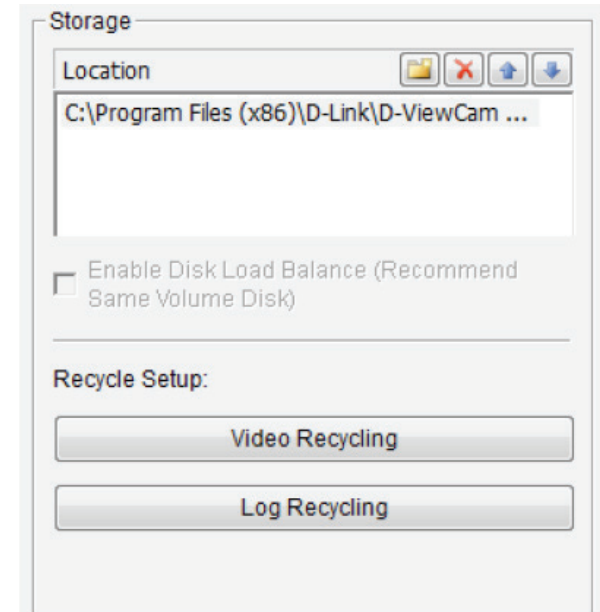
Note: Video recycling requires at least one day of HDD space for recording all of your selected video channel(s).

General setting: Set the standard limit to let the system recycle automatically. The system will start to recycle if the disk space is less than the indicated percentage (default is 10%, minimum is 5%).

Option setting: Set different recycle days for Record 1 / Record 2 in order to keep different lengths of recordings.

Allow exception: Drag and drop the camera(s) to the right panel and it will pop up a window allowing the input of special recycle criteria. In the example below, the 2 recordings of the first camera were configured with different recycle criteria: Record 1: 7 days; Record 2: 30 days.

If you expect a recording will utilize all available space, you can leave the keep x days option blank. By setting this, the symbol will become "-", and the length of Record 2 will depend on the remaining available space. This also means this recording has the lowest priority, so it would be recycled first when disk space is insufficient in order to meet recording settings.



Note:

1. The system will detect the storage space of the default location, if the default storage space is full, the video will be stored on the next available directory.
2. If all the locations exceed the storage rule, the system will start recycling.
3. Recycle priority: keep % of disk space > keep x days > keep - days.

Recycle example:

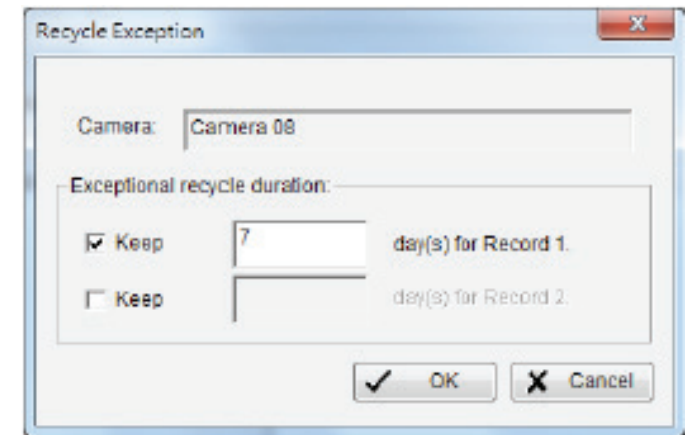
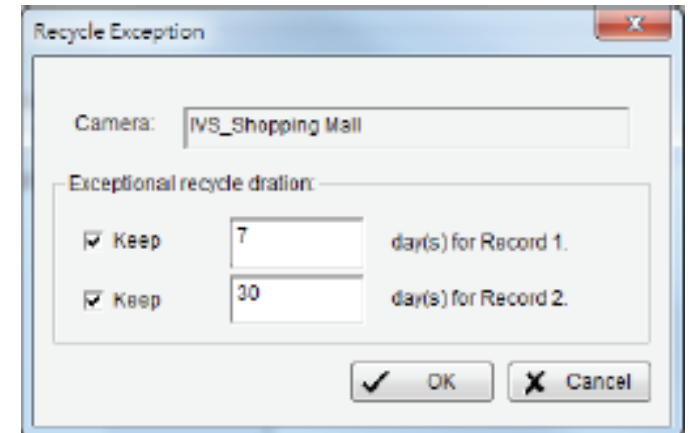
Example 1: Set “keep 10% of disk space”; Current available space is still more than 10%.

- A. For the recordings set as “keep x days”: The main console will start to delete the oldest recording when its data length reaches X days.
- B. For the recordings set as “keep - days”: The main console will continue recording and will start deleting the oldest recording when available disk space reaches 10%.

Example 2: Set “keep 10% of disk space”; Current available space is 10%.

- A. For the recordings set as “keep - days”: The main console will start to delete the oldest recording. The new space after deletion will be used to store the recording which is set as “Keep X days”.
- B. For the recordings set as “keep X days”: The main console will start to delete the oldest recording when its data length reaches X days.
- C. Main Console continues to delete the oldest recordings of “keep - days” until only 1 day is left. Then the main console will start to delete the oldest recordings from “keep x days” in order to follow the rule of keeping 10% of disk space.

Log Recycling: Click the button to obtain the **Advanced Recycle Setting** panel. Set the amount of days that you want to keep the event for.



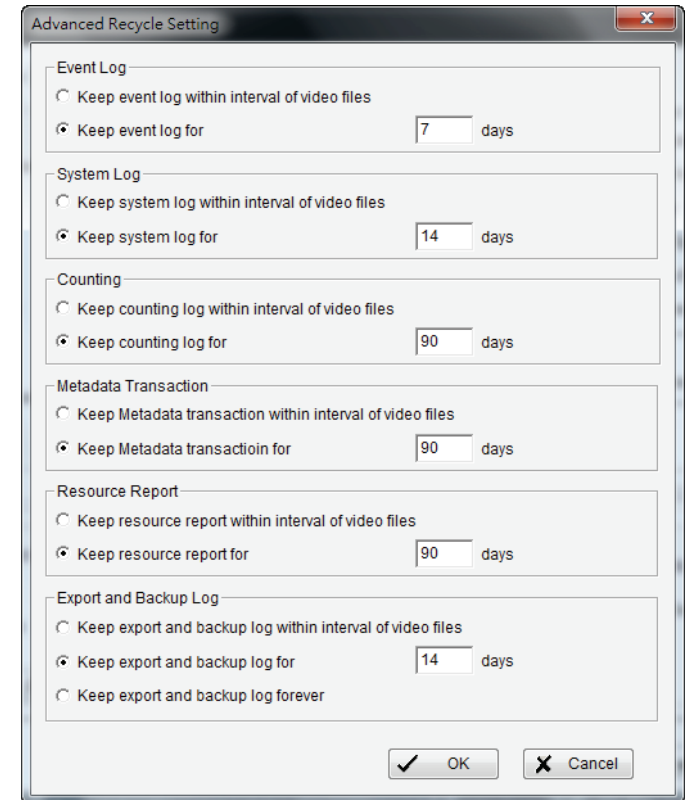
Event Log: Delete the event log data that is older than the number of days set.

System Log: Delete the system log data that is older than the number of days set.

Counting: Delete the counting application data that is older than the number of days set.

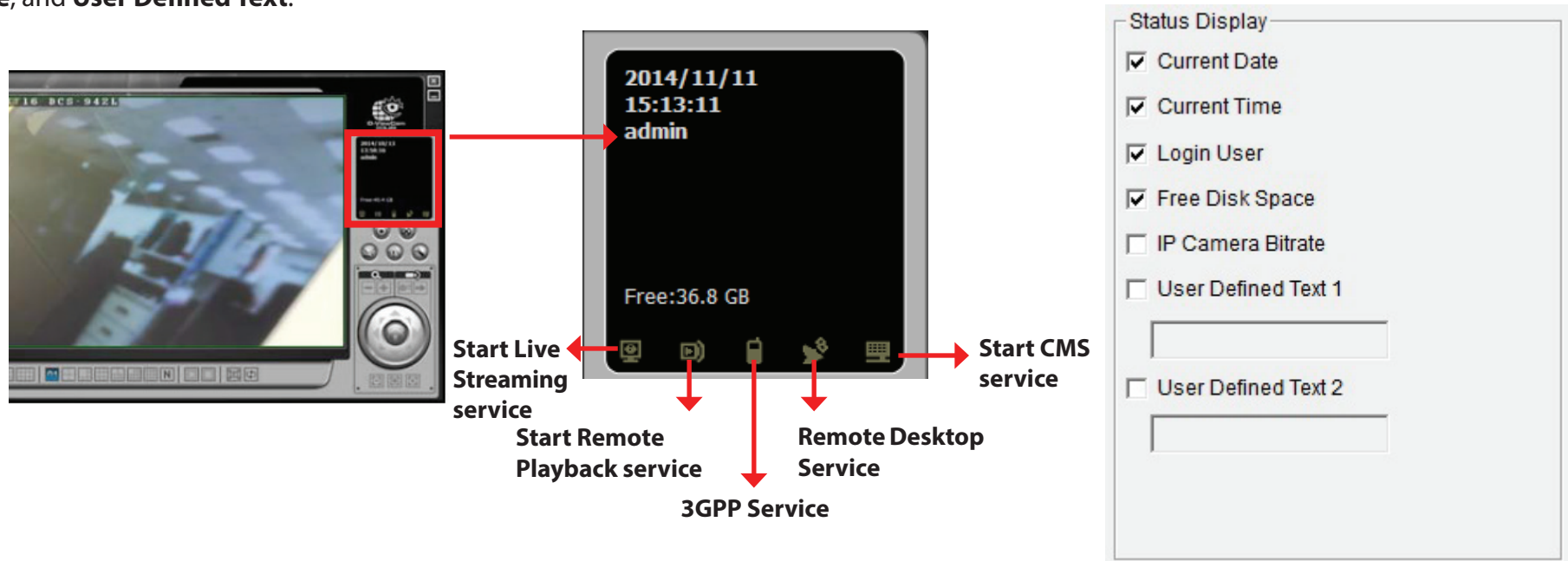
Metadata Transaction: Delete the metadata transaction data that is older than the number of days set.

Resource Report: Delete the Resource report data that is older than the number of days set.




Status Display

Select the information that you wish to display on the Main Console such as **Current Date**, **Current Time**, **Free Disk Space**, **Network Camera Bitrate**, and **User Defined Text**.



Miscellaneous

Automatically Popup Event Report: The **Event Report** will automatically popup when events have been detected. Make sure to stop the **Smart Guard** system before you modify this setting, otherwise the modification will not take place.

Minimize to system tray: Enable this  button to minimize the application to an icon in the task bar.

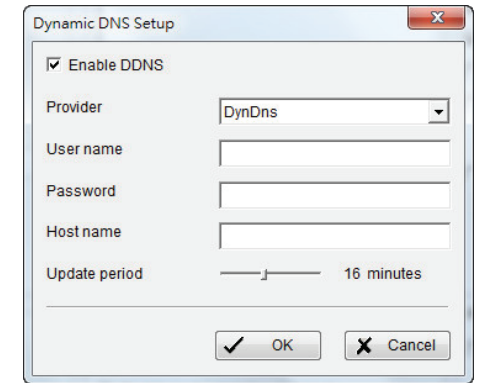
Note: Enter the username and password of the Main Console when you click the minimized icon in the task bar to start monitoring.

Synchronize video frames: Select to prevent tearing that may occur in the video display. However, this will increase the CPU processing load.

DDNS Service: Dynamic Domain Name Server (DDNS) allows you to use **Live View** or **Web View** to connect to the Main Console using the Internet even if you have a dynamic IP address.

Click **DDNS Service** to open the **Dynamic DNS Setup** window.

Update the following fields - **Provider**, **User name**, **Password** and **Host name**, and **Update period**.



Audio Preview

Default Channel: Select the audio channel that you wish to hear from.

Enable Audio on Active Channel: Select the **Enable Audio on Active Channel** to hear the audio from the selected video channel on each video grid of the main console. The default channel will play if the video channel isn't selected.

Volume: Use the volume bar to adjust volume.



System plays audio of the default channel

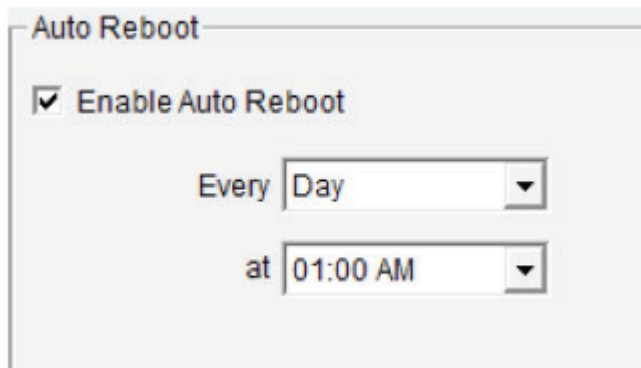


System plays audio of the selected channel

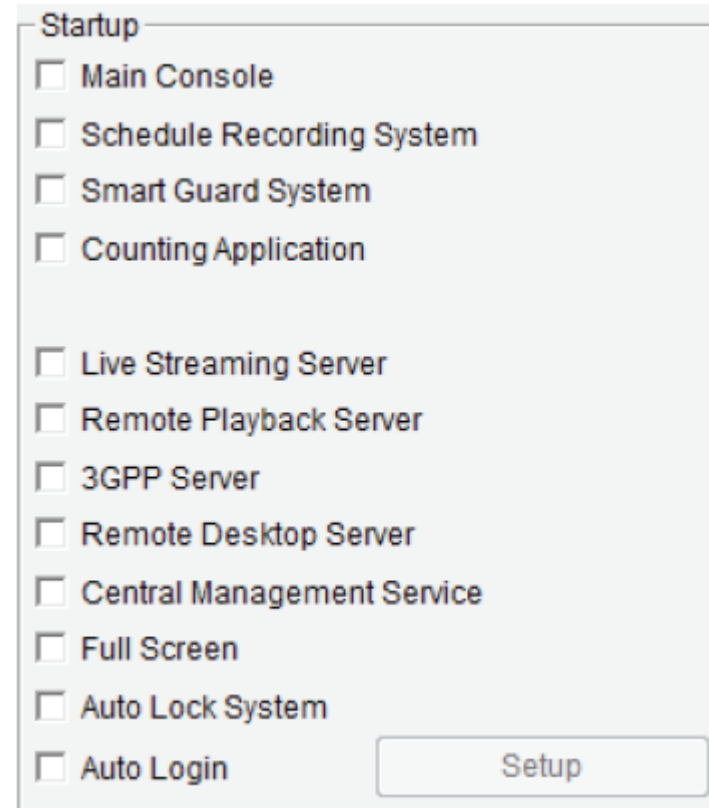
Auto Reboot

Select **Enable Auto Reboot** and set the day and time to reboot the system.

Note: Please enable **Main Console, Auto Login, and other functions in the Startup** section to ensure that the system runs normal after auto reboot.



The screenshot shows the 'Auto Reboot' configuration window. It features a checked checkbox labeled 'Enable Auto Reboot'. Below this, there are two dropdown menus: the first is labeled 'Every' and is set to 'Day', and the second is labeled 'at' and is set to '01:00 AM'.



The screenshot shows the 'Startup' configuration window. It contains a list of ten unchecked checkboxes: 'Main Console', 'Schedule Recording System', 'Smart Guard System', 'Counting Application', 'Live Streaming Server', 'Remote Playback Server', '3GPP Server', 'Remote Desktop Server', 'Central Management Service', 'Full Screen', 'Auto Lock System', and 'Auto Login'. A 'Setup' button is located at the bottom right of the window.

Camera

Go to **General Setting > Setting > System Setting > Camera**.

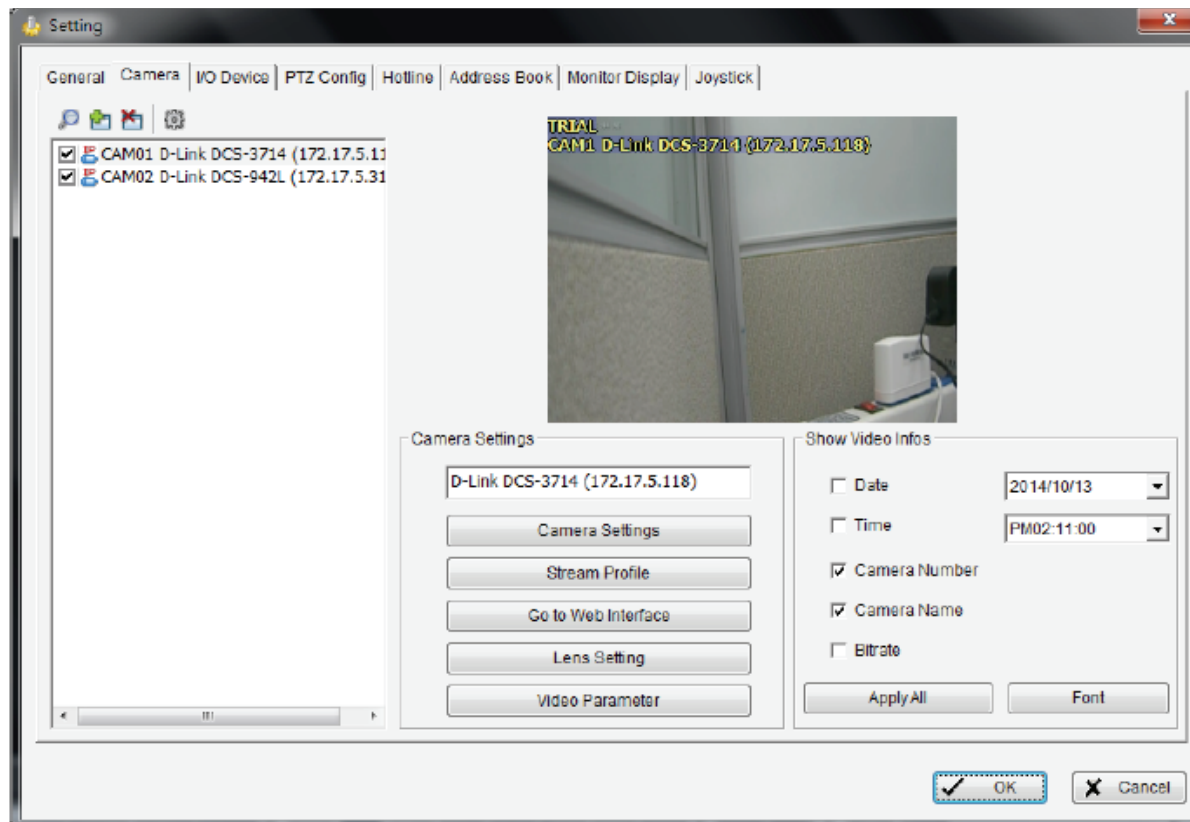
Add Camera

The **Search, Insert, Delete** and **Config** functions are included in the **Setting** window.

Search: Click **Search** to open the **Search Network Camera** window. The system will start scanning automatically once the window is opened. You may manually stop scanning by clicking **Stop Scan**.

Enter the user name and password for each network camera found and click **OK** to add it to the camera list.

Note: Drag the mouse to multi-select the cameras and then insert the username and password. The username and password will be applied to all the selected cameras automatically.



Insert: Click on the  to open **Network Camera / Video Server Setting** and add network cameras to the list.

Delete: Click on the  to remove the selected network camera(s) from the system. Click **OK** to finalize the modification.

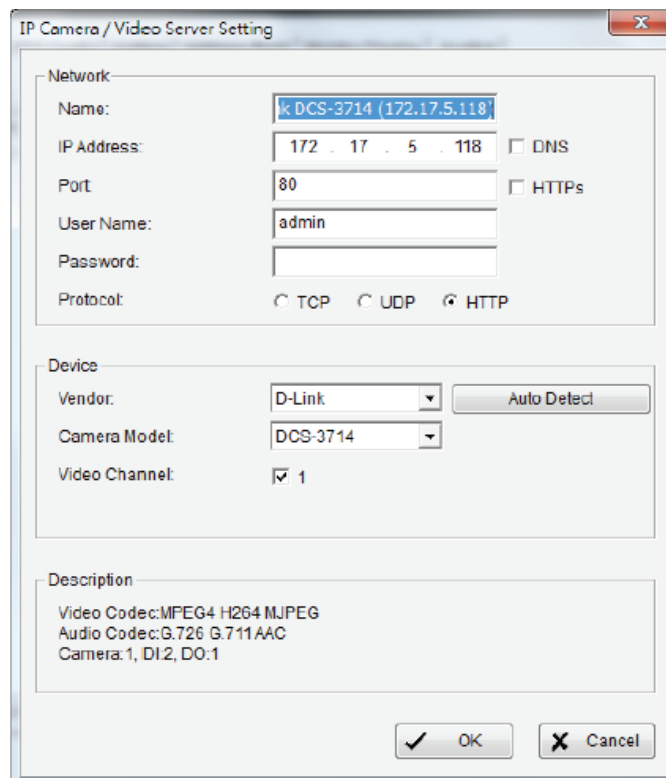
Config: Click on the  to open **Network Camera / Video Server Setting**. Here you can modify the network camera settings.

Network Camera / Video Server Setting

Network: Update the fields, including **Name**, **IP Address**, **Http Port**, **User Name**, **Password** and **Protocol**. Refer to the instructions provided by the camera manufacturer. Select **Use DNS** to use a domain name instead of an IP address.

Device: Choose the network camera manufacturer from the drop-down menu. Click **Auto Detect** and the model name will be displayed in the list.

Description: Displays information about the device.



The screenshot shows a dialog box titled "IP Camera / Video Server Setting". It is divided into three sections: Network, Device, and Description. The Network section contains fields for Name (DCS-3714 (172.17.5.118)), IP Address (172.17.5.118), Port (80), User Name (admin), Password, and Protocol (HTTP selected). The Device section contains a Vendor dropdown (D-Link), an Auto Detect button, a Camera Model dropdown (DCS-3714), and a Video Channel checkbox (checked). The Description section contains text: Video Codec: MPEG4 H264 MJPEG, Audio Codec: G.726 G.711AAC, Camera: 1, DI2, DO:1. At the bottom are OK and Cancel buttons.

Camera Parameter

Camera List: Displays all the cameras that are connected to the system. Click the name of the camera to edit the settings.

Camera Name: Name the camera here.

Camera Settings: Set the camera parameters such as resolution and frame rate offered by camera vendor. If the camera supports Multi-stream, you can enable the function by checking “**Enable Multi-Stream**”.

Note: The multi-stream function allows the main console to receive 3 different video streams. Please check device pack support list for supported features.

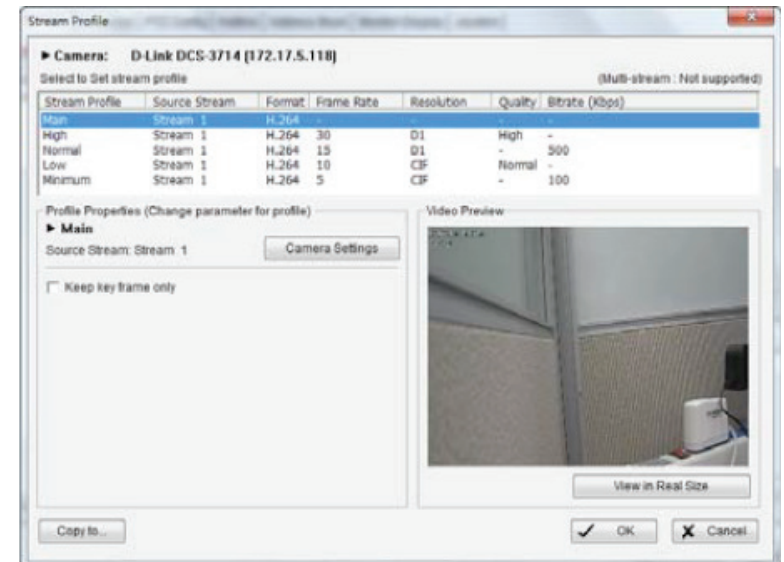
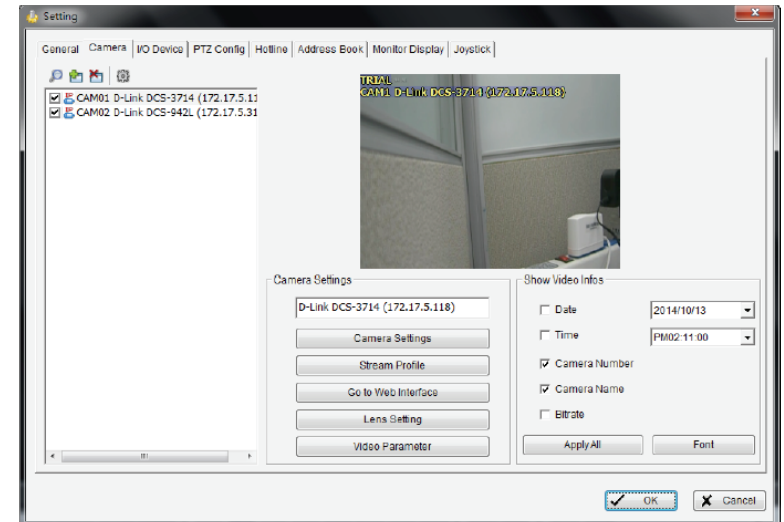
Note: Not every camera model supports multi-stream configuration, please refer to the latest camera support list to see if multi-stream is supported.

Stream Profile: Stream profiles are pre-defined to preferred settings which will respond from the query of the remote live view function. Each profile has different Format, Frame, Resolution, Quality and Bit rate (Kbps) settings.

For cameras that support the Multi-stream function, the 3 different source streams can be connected to main console and automatically mapped to different stream profiles. Click a **stream profile** to select the source stream you would like to change.

Go to Web Interface: Go to the web-based interface of your camera to configure the settings (optional).

Video Parameter: Adjust the video’s brightness, contrast, saturation, and color hue values.



Camera Settings

Video Format: Select the video format for the footage.

Frame Rate: Select the frame per second.

Resolution: Select the resolution.

Bitrate Type: Select the bitrate mode.

Bitrate: Select the bitrate amount.

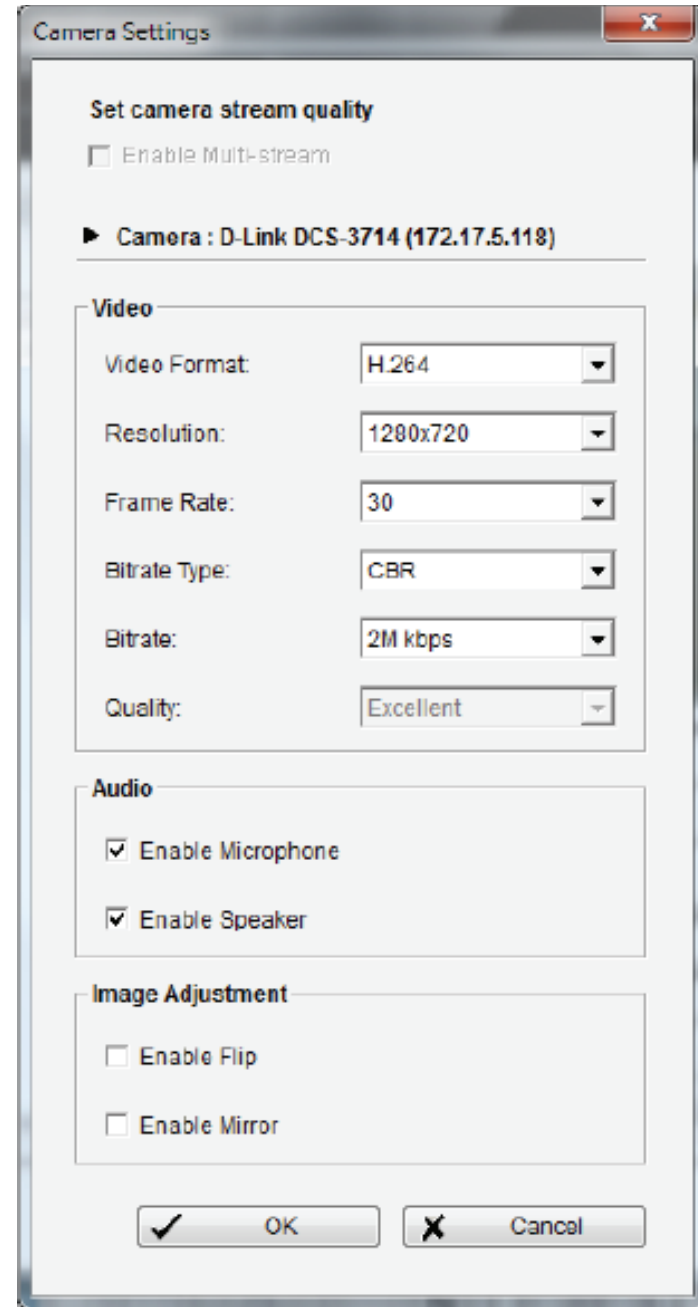


Image Adjustment: Enable image to be flipped or mirrored.

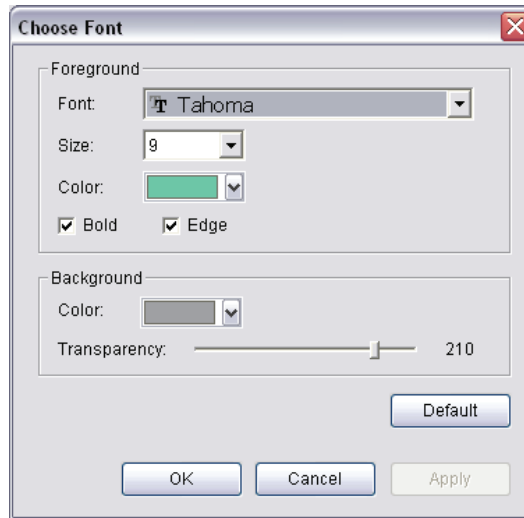
Audio: Enable microphone or speaker if your camera has these features.

Fish eye Setting (for fish eye cameras only)

Mount Type: Select whether the camera is being mounted on a wall, ceiling, or on a desktop.

Display Mode: Select the display mode from 1O (fisheye mode shows the full camera view), 1R (normal mode shows a view similar to a standard camera), 2P (panoramic mode shows a full 180-degree mode across 2 panels), 1O 3R (multi-view with Fisheye mode shows a multiple window view with fisheye in the top-left panel), and 4R (multi-view).

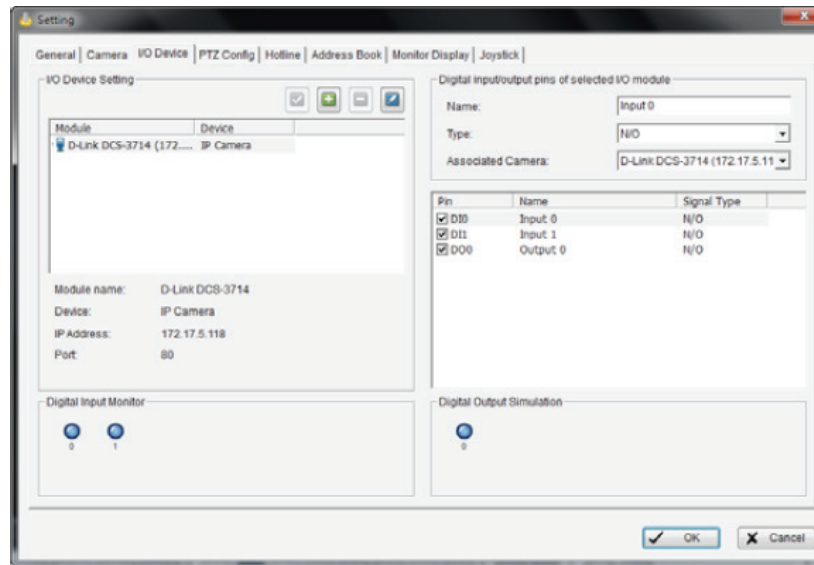
OSD (On-Screen Display) Settings



Select the information that you wish to see on the on-screen display. Click **Font** to select the font style.

I/O Device

Go to **General Setting > Setting > System Setting > I/O Device**.



I/O Device Setting:

- **Module:** Name of the module and ID of the digital input/output device(s) that is connected to your system.
- **Device:** This column displays the device(s) already installed on the system.
- **ID:** Select the I/O port.

Digital Input Monitor: The device(s) is turned on if the dot is in red. By triggering the digital input device, the related icon will light up. This is used to check if the device is correctly connected or not.

Digital Output Monitor: The device(s) is turned on if the dot is in red. By clicking on the icon, you may trigger the digital device connecting to the system. This can be used to test if the output device is correctly connected.

Device Setting

Name: Insert the name of the device (input and output).

Type: Select the device type from the drop-down menu.

1. N/O: Normal Open
2. N/C: Normal Close

PTZ Config

Go to **General Setting > Setting > System Setting > PTZ Config**.

Select a PTZ camera from the list to activate the PTZ control function.

Advanced Setting

Adjust the pan speed, tilt speed, and zoom speed settings by dragging the bars.

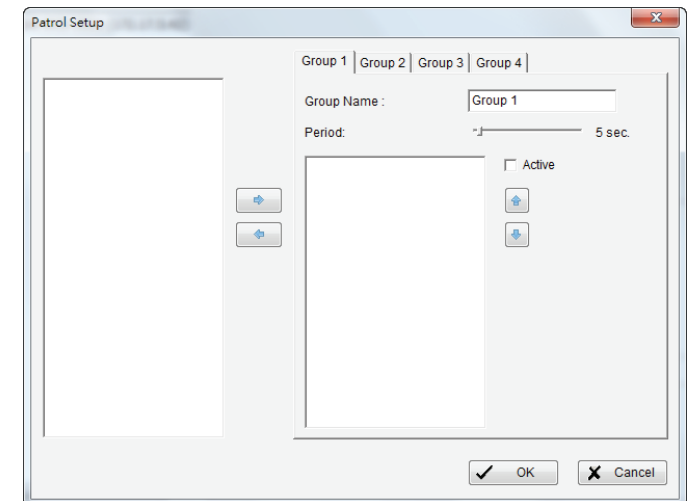
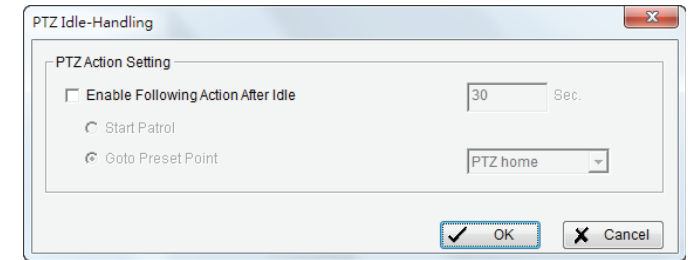
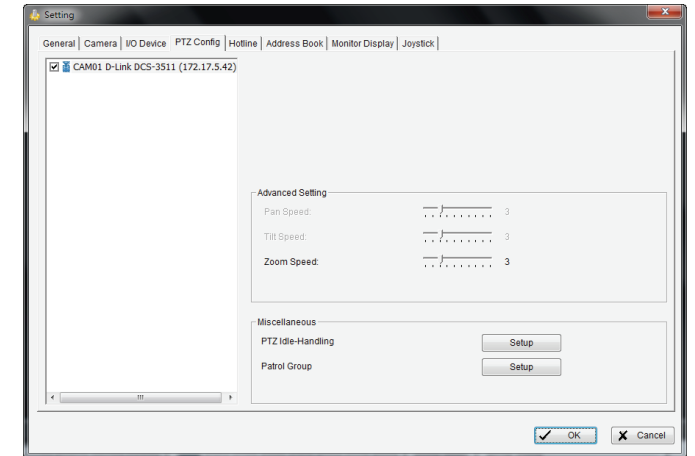
Miscellaneous

PTZ Idle-Handling: By enabling this function, the PTZ camera will automatically go back to a default preset point when no PTZ commands are under action during a period or start patrol.

Patrol Group: Click to setup a patrol group.

From the left window, select the camera(s) that you would like to have in the patrol group. In the right window, align the cameras in order and adjust the time. Rename the group name if you want. After completing the setup, select **Active** to trigger functions such as **Auto-tracking** and **Login** of the camera, and then click **OK**.

You can set up to four groups of auto patrol. To start or stop, click **Patrol** in the Main Console, and select **Start Patrol** or **Stop Patrol**.



Hotline

Go to **General Setting > Setting > System Setting > Hotline.**

Use this window to configure the Hotline settings when an unusual event is detected.

E-Mail: Enter the following information - SMTP server, port, sender's e-mail address, subject title, body content and SSL for encrypted transmission. Click **Send Test Mail** to test the settings.

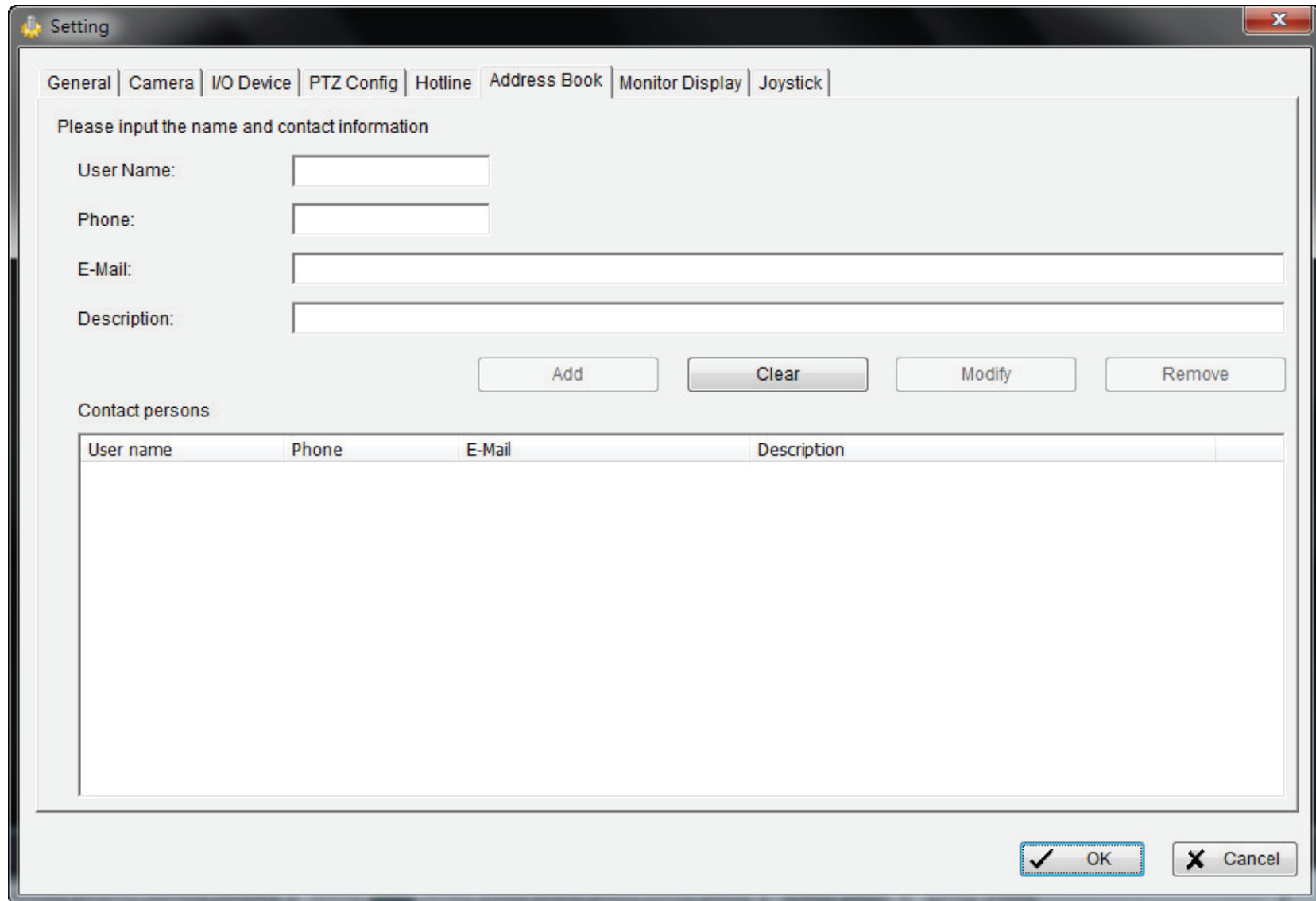
GSM modem: Set the **Port** and **Baud Rate** of the GSM modem device, and then enter **PIN** code. You can also enter the time for sending a SMS message. Click **Test** to send a test SMS message.

Note: The **Interval** is set to restrict the time period between sending two SMS messages. For example, if you set it as 60 min, the SMS sent between 60 min will be deleted and not sent to the user.

Address Book

Go to **General Setting > Setting > System Setting > Address Book**.

Use this window to update name, phone number and e-mail address information. When an unusual event is recorded, an e-mail notification will be sent out by the system.



The screenshot shows a web-based configuration window titled "Setting". The window has a tabbed interface with the following tabs: General, Camera, I/O Device, PTZ Config, Hotline, Address Book (selected), Monitor Display, and Joystick. Below the tabs, there is a section titled "Please input the name and contact information" with the following fields:

- User Name:
- Phone:
- E-Mail:
- Description:

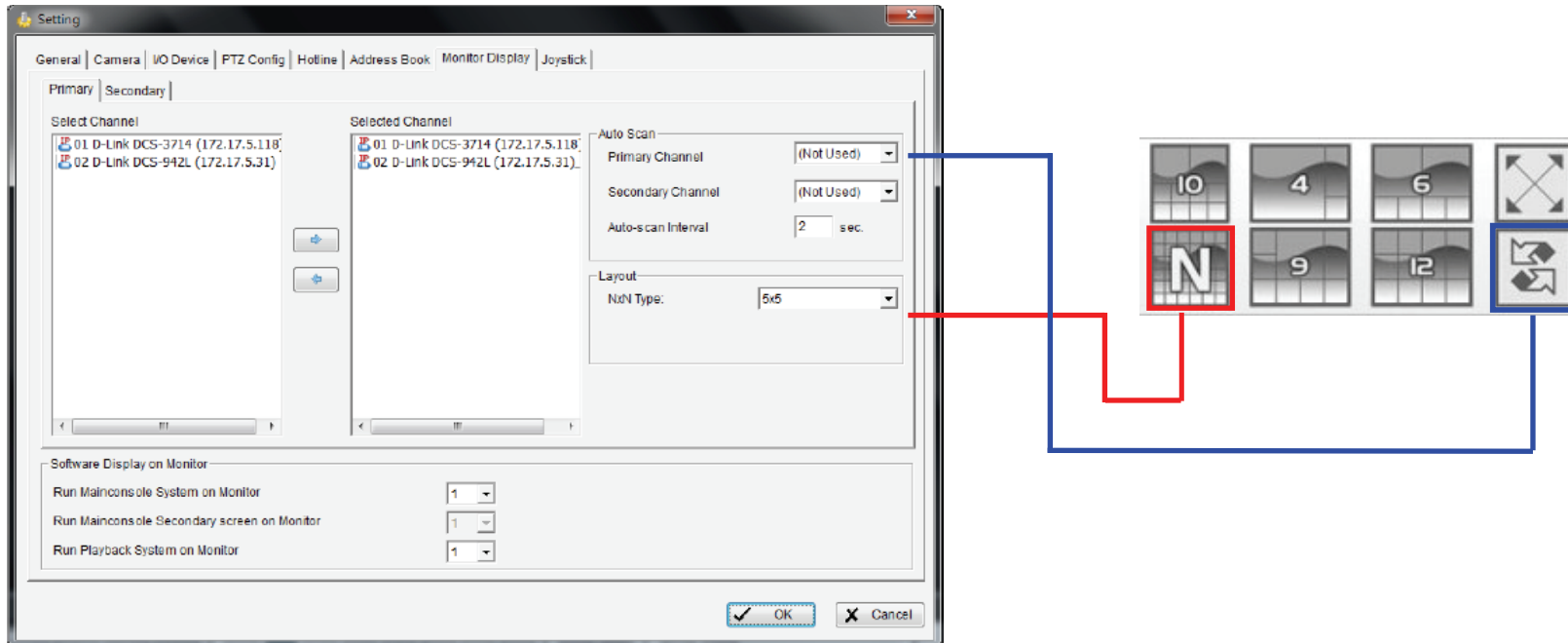
Below these fields are four buttons: Add, Clear, Modify, and Remove. The Clear button is highlighted with a grey background.

Below the buttons is a section titled "Contact persons" which contains a table with the following columns: User name, Phone, E-Mail, and Description. The table is currently empty.

At the bottom right of the window are two buttons: OK (with a checkmark icon) and Cancel (with an X icon).

Monitor Display

Go to **General Setting > Setting > System Setting > Monitor Display**.



Playback Option: Execute Playback feature on the secondary monitor by selecting the **Secondary** tab. Make sure to adjust your computer display settings (supports 800x600, 1024x768, 1200x900, 1280x1024 and 1600x1200 monitor resolutions) in advance to avoid system error.

Cameras List: The left column displays a list of all available cameras. Highlight the camera and click --> to move the camera to the right column. The right column will display the primary and secondary cameras. These cameras will be available for the auto-scan function.

Auto Scan: Activate auto scan to rotate the channels/cameras on the display screen.

For example, you may select to show only 4 sub-screens on the main Console while having 16 channels connected to the system. With auto scan function, you will be able to see all the 16 channels. You can set up a primary channel that will always be on the screen and a secondary channel that has secondary priority.

Layout: Choose the number of divisions for NxN division on the main console screen.

Joystick Setting

You can choose any function from the drop-down menu to assign to the button on the joystick

Note: Following is a complete list of all functions:

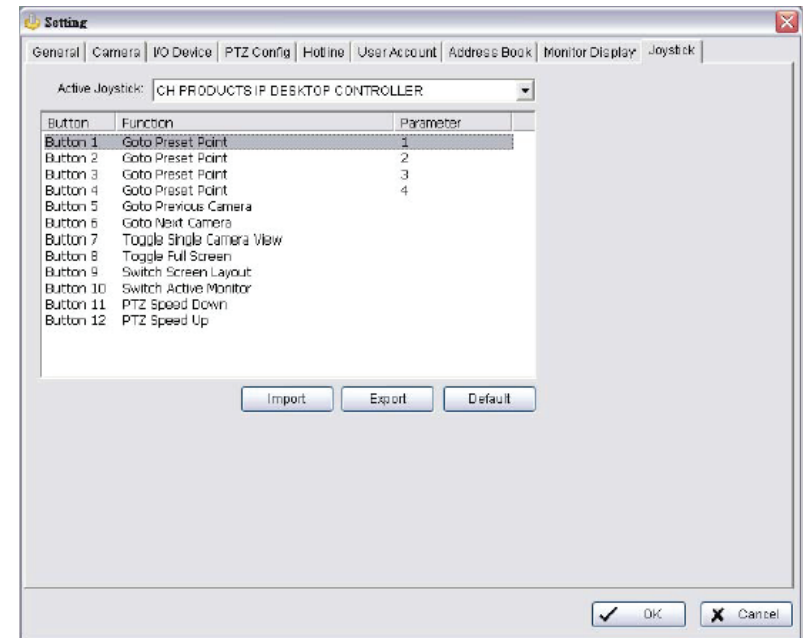
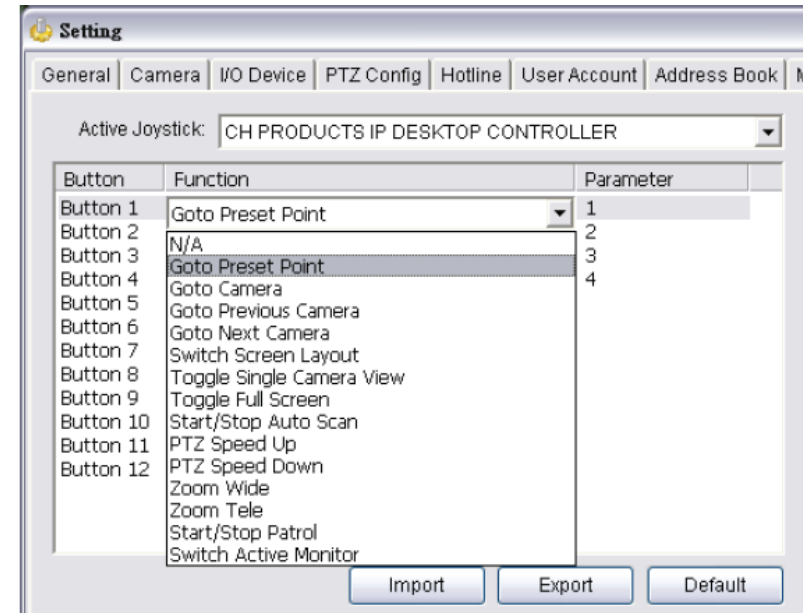
- | | |
|---------------------------------------|---------------------------|
| 1. N/A | 9. Start/Stop Auto Scan |
| 2. Goto Preset Point (including Home) | 10. PTZ Speed Up |
| 3. Goto Camera | 11. PTZ Speed Down |
| 4. Goto Previous Camera | 12. Zoom Wide |
| 5. Goto Next Camera | 13. Zoom Tele |
| 6. Switch Screen Layout | 14. Start/Stop Patrol |
| 7. Toggle Single Camera View | 15. Switch Active Monitor |
| 8. Toggle Full Screen | |

Parameter: You can choose the parameter of the function from the drop-down menu.

Default: You can set the default settings for the joystick.

Export: You can export the settings of the joystick.

Import: You can import the settings of the joystick.



User Account Setting

Go to **General Setting** > **Setting** > **User Account**.

Only an administrator can manage user accounts. From the Privilege list, highlight each account to modify.

Note: The system by default, will display the account group's default privilege profiles. Enter a **Name** and **Password** to create a new account, or click an existed account to modify his/ her privilege.

Basic Users

Click  to add a new Basic User. Click  to delete an existing Basic User.

Create and modify the content of each user account under User Account Setting:

User name: Insert the user name.

Group: Assign the group for each user.

There are 3 default privilege profiles of account groups:

Admin: Have privileges of all system functions and devices, except adding/deleting/modifying privileges of other users.

Power User: Have limited privileges of system functions and complete privileges of assigned devices.

User: All the privileges of system functions are forbidden. Users can only manage assigned devices.

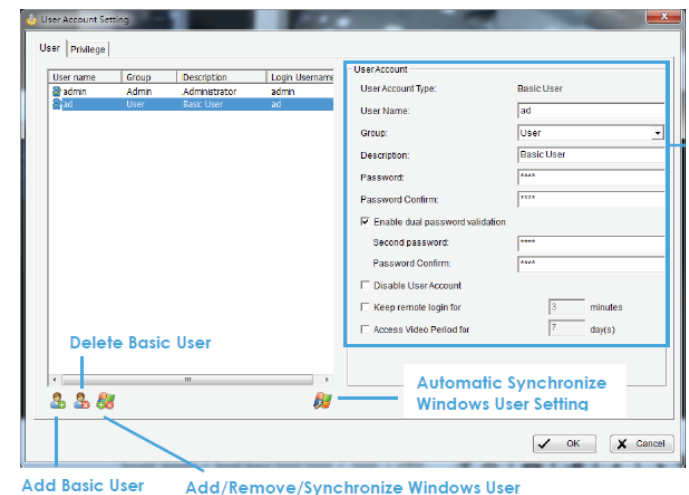
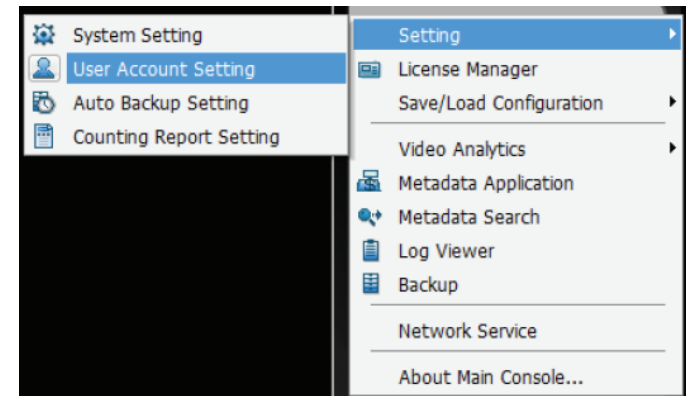
Description: Describe each user here.

Login Username: The user account name when logging in.

Password: Insert the password assigned to each user.

Password confirm: Insert the password again for confirmation.

Enable dual password validation: Insert a second password to be assigned to each user. If this function enabled, the second password will be required for certain operations.



Disable User Account: By checking this option, the account's access to the system will be blocked. Disabled accounts will be marked with a cross on the




Note: Only the default admin account cannot be disabled.

Keep remote login for ___ minutes: Insert the length of time to automatically log out the account after logging in from Remote Live Viewer or Remote Playback server.

Access Video Period for ___ day(s): Insert the length of time for the account to access videos.

Windows Users

Click  to add/remove/synchronize Windows Users.

Select User

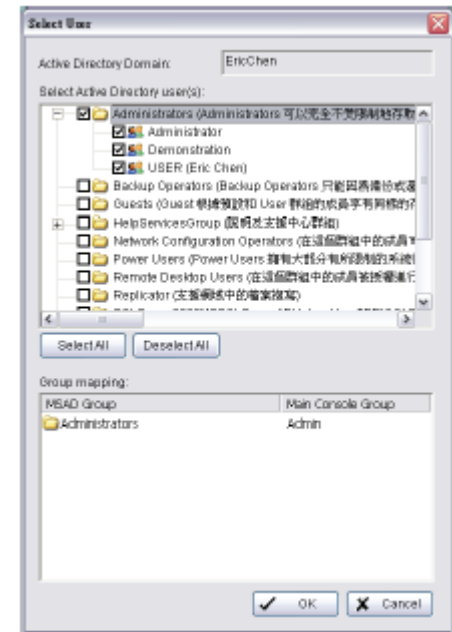
Check users or folders under **Select Active Directory user(s)** and click **OK** to add Windows Users.

Click **Select All** to check all available users and folders, or click **Deselect All** to uncheck all users.

Group Mapping:

Selected Windows users will be grouped according to default mapping.

Click **OK** when you are done adding Windows users. Synchronization results will be displayed for confirmation.



MSAD Group	Mainconsole Group
Administrator	Admin
Guest	User
Other	PowerUser

Please refer to the default solution for all conflicts:

New accounts added from AD domain:

Add to the main console

Accounts from AD domain removed:

Delete from the main console

Account description modified:

Update description

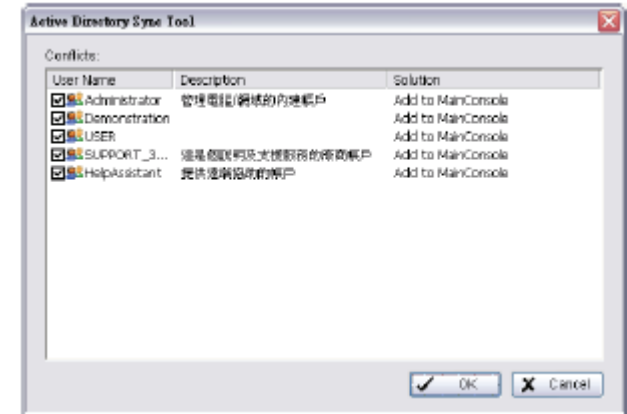
Encountered admin account:

Skip admin account

Newly added account from AD domain conflicts with existing basic user account:

Replace basic user account

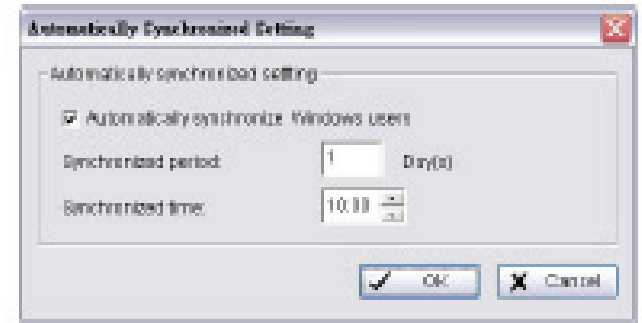
Uncheck items to skip applying solutions to the main console user account settings. For example, if you uncheck an “Add to Mainconsole” solution, the new account will not be added to the main console’s user account list.



Automatic Synchronize Windows User Setting

Instead of manually adding and updating Windows users, you may also config the system to automatically synchronize all Windows users at a specific period.

Click  to do this.



Automatically synchronize Windows users:

Check to enable automatic synchronization.

Synchronized period:

Config the synchronization to start every ___ days.

Synchronized time:

Define at what time the synchronization should start.

Note: Auto synchronization will apply all default solutions to conflicts.

Privilege: Define detailed privilege of functions and devices for each user account.

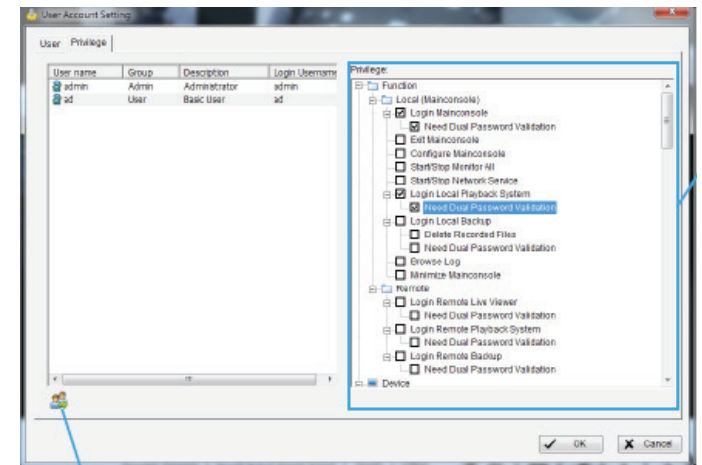
Function: General settings, operation related, system general settings, and privilege of remote access.*

Device: General setting device privileges for the camera, digital output and metadata sources in the main console and client applications.

Copy Privilege to...: Click this button to copy privilege settings of any account to another.

Note: The privilege of default admin account cannot be configured.

“Setup TV-Out function” is not available if there is no SCB-7108/7116 card installed.

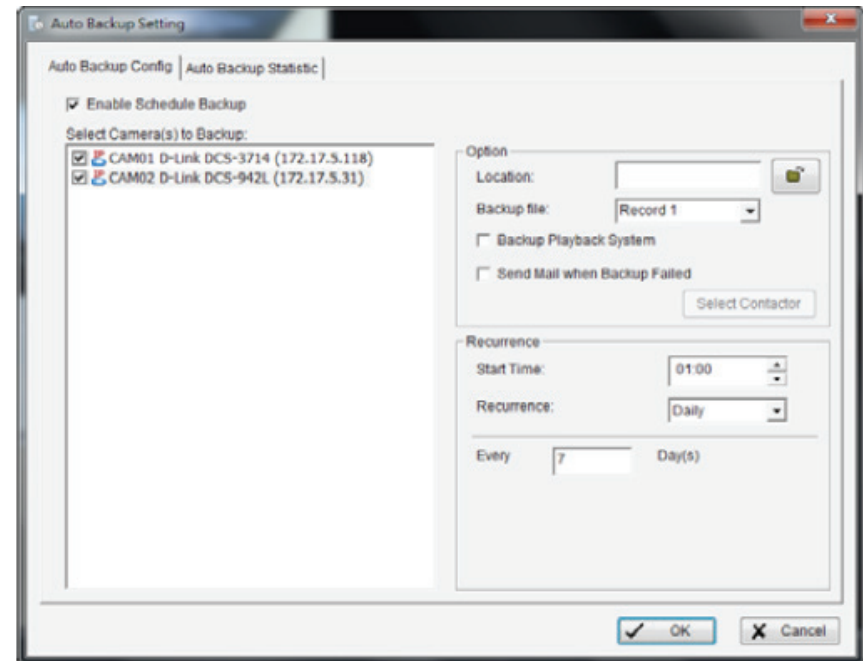
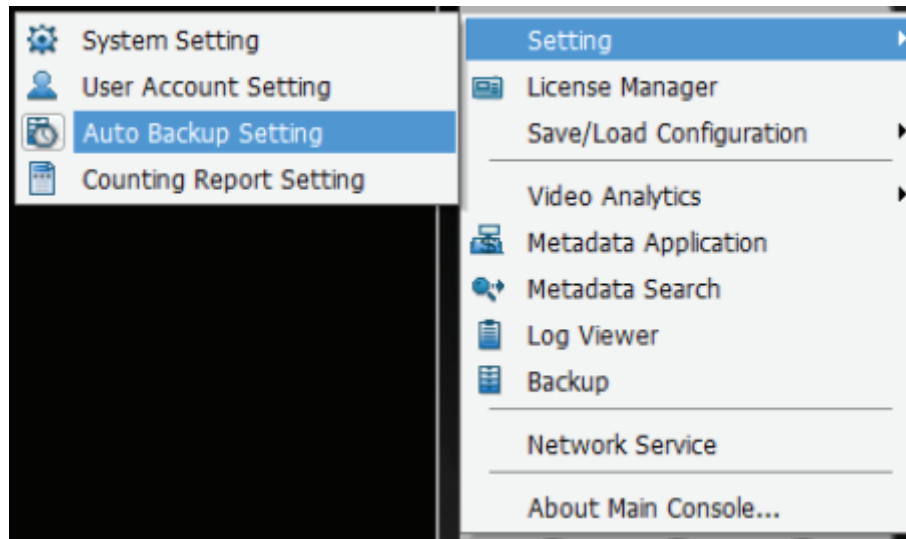


Copy Privilege to

Auto Backup Setting

Go to **General Setting > Setting > Auto Backup Setting**

To configure your system to automatically back up video data.



There are 3 main options in Auto Backup config:

Enable Schedule Back Up: Check to enable the backup process.

Select Camera(s) to Back Up: Select the camera to back up.

Option: Select options for backup.

- **Location:** Define backup route.
- **Backup Playback System:** Check to backup the playback application with each process.
- **Send Mail when Backup Fails:** Check to receive an email notification when backup fails. Click Setup for email configuration. Select one or more contacts from the address book and configure customized message content.
- **Recurrence:** Choose start time and Recurrence: Daily or Weekly modes.

There are 4 main fields in Auto Backup Statistic:

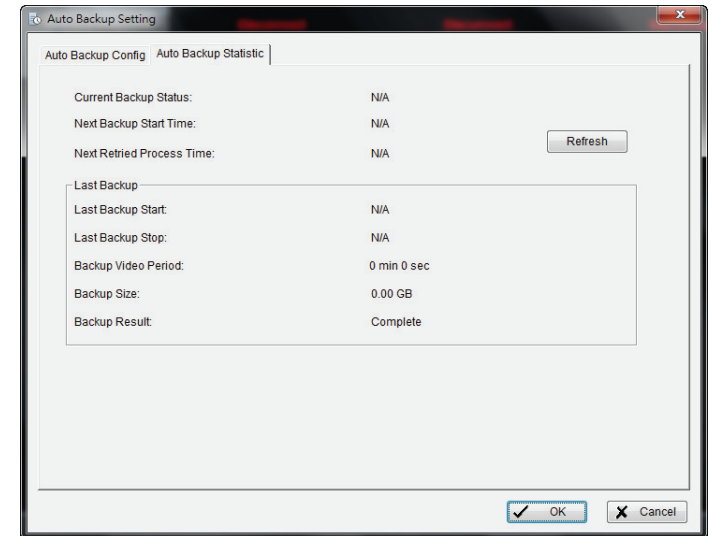
Current Backup Status: Displays whether the backup is underway, idle, or awaiting retry.

Next Backup Start Time: Displays the scheduled time for next backup process.

Next Retried Process Time: Displays the scheduled time for next backup retry process.

Last Backup: Displays information about the most recent backup.

- **Last Backup Start:** Displays the time and date the last backup started.
- **Last Playback Stop:** Displays the time and date the last backup was completed.
- **Backup Video Period:** Displays the total time that the last backup took to complete.
- **Backup Size:** Displays total file size of last backup.
- **Backup Result:** Displays the result of the last backup.



Format Setting:

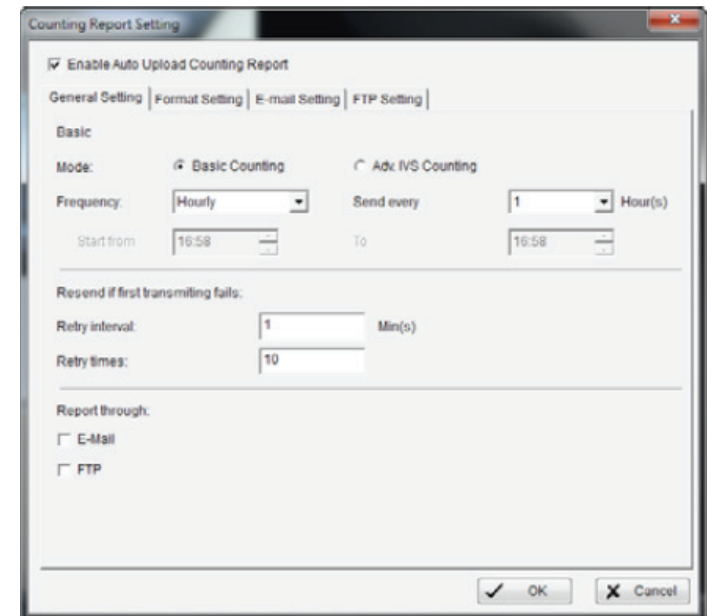
- Report format: Select report format (Diagram / .CSV) and file name prefix.
- Advance setting: Customized column name for .CSV format.

E-mail Setting:

- Synchronize with Hotline E-Mail setting: Click this option to synchronize the setting and not be asked to input the information again. Skip the option to input all necessary information of an SMTP server.

FTP Setting:

- Synchronize with Hotline FTP setting: Click this option to synchronize the setting and not be asked to input the information again. Skip the option to input all necessary information of an FTP server.



Counting Report Setting

Configure system to automatically send out the people counting report via E-mail or FTP periodically.

General setting:

Mode: Select the counting source you would like to backup.

Frequency: Define the report frequency.

Resend if first transmitting fails: Setup retry internal and times.

Report through: Select report method.

Format Setting:

Report format: Select report format (Diagram / .CSV) and file name prefix.

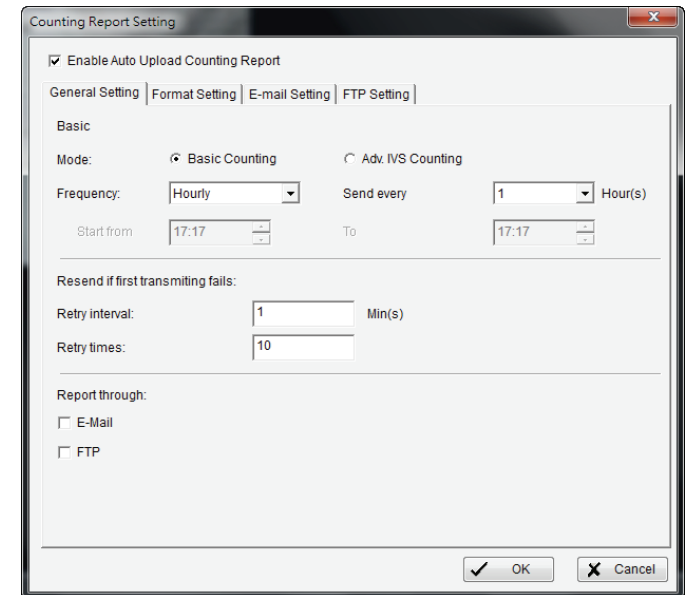
Advance setting: Customized column name for .CSV format.

E-mail Setting:

Synchronize with Hotline E-Mail setting: Click this option to synchronize the settings. Skip this option if you wish to input all the necessary information from an SMTP server.

FTP Setting:

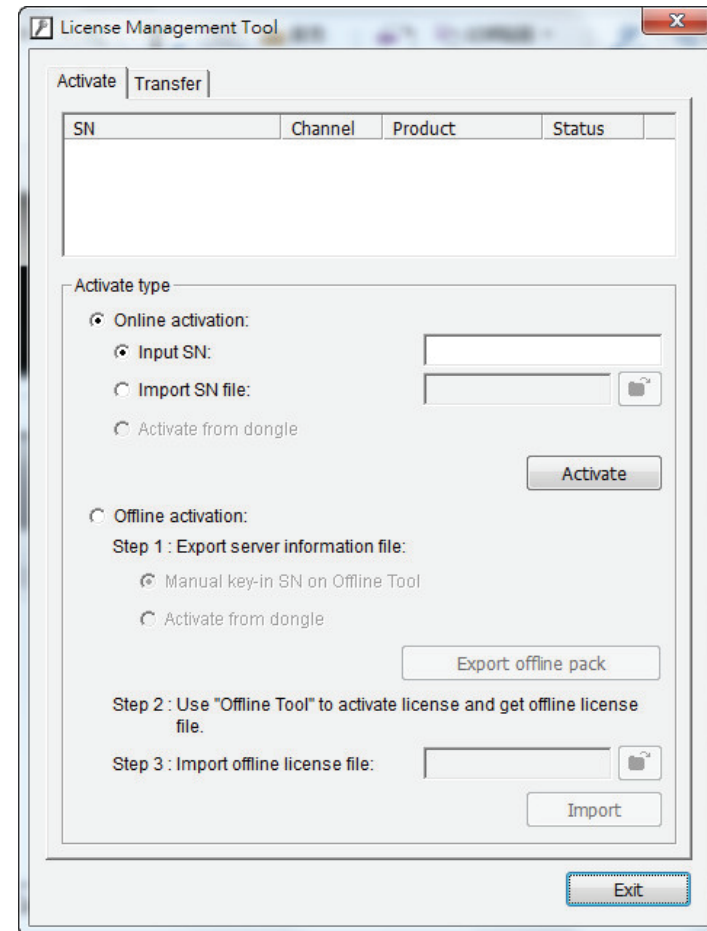
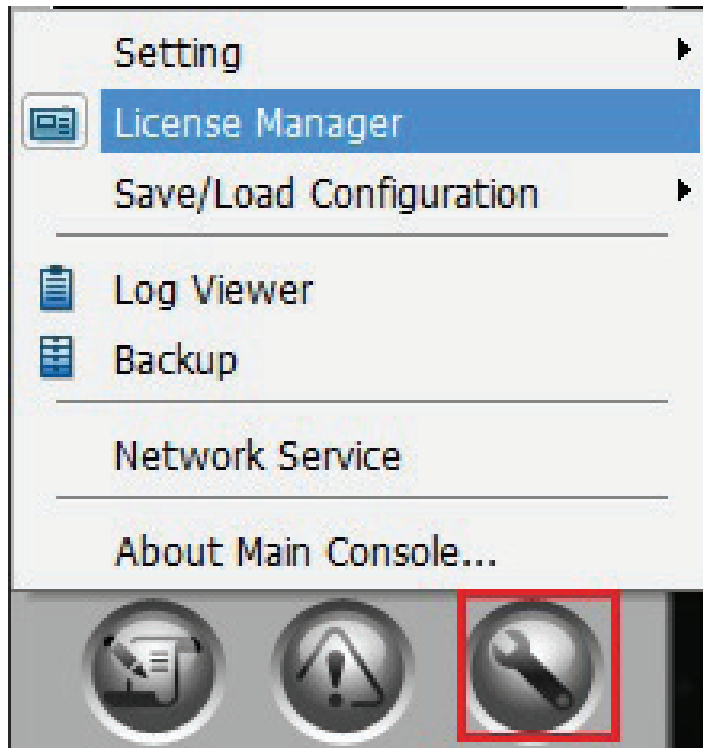
Synchronize with Hotline FTP setting: Click this option to synchronize the settings. Skip this option if you wish to input all the necessary information from an FTP server.



License Manager

Go to **General Setting > License Management** in the Main Console to activate the license.

Note: Please refer to the **License Management Tool** section for details.



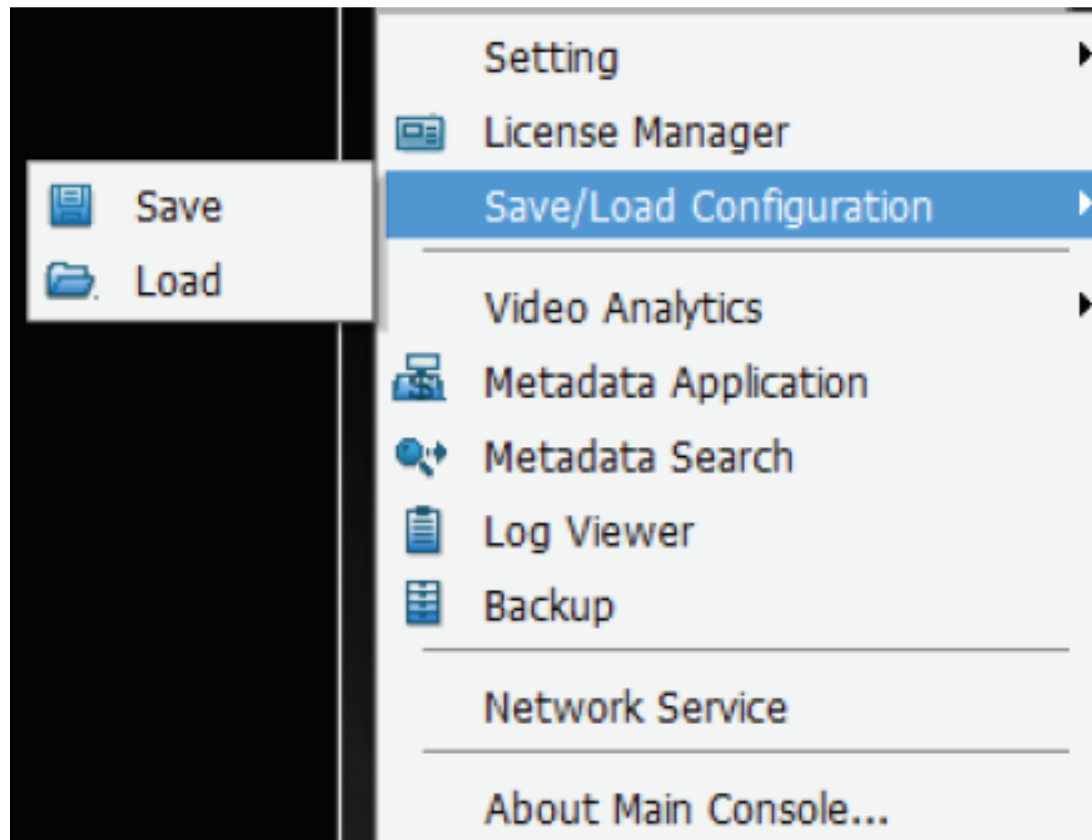
Save/Load Configuration

The Save/Load Configuration function allows system users to save any specific setting as a .cfg (config) file. You may save several different .cfg files at any time.

Save Configuration: To save a specific setting, go to **General Setting > Save/Load Configuration > Save**. In the popup window, type in the file name and then save it as a .cfg file.

Load Configuration: To load a specific setting, go to **General Setting > Save/Load Configuration > Load**. In the popup window, go to the directory that you saved the .cfg file at, select any one of them and then click **OK** to load the file.

Note: *The Main Console will be automatically shutdown after loading a new configuration. Please re-start the Main Console manually.*



Video Analytics - Counting Application

Count objects, people or vehicles passing through pre-defined detection zones. To access this page, login with admin account or user account with config main system privileges.

Camera List: Select which camera to enable the counting application on.

Operation

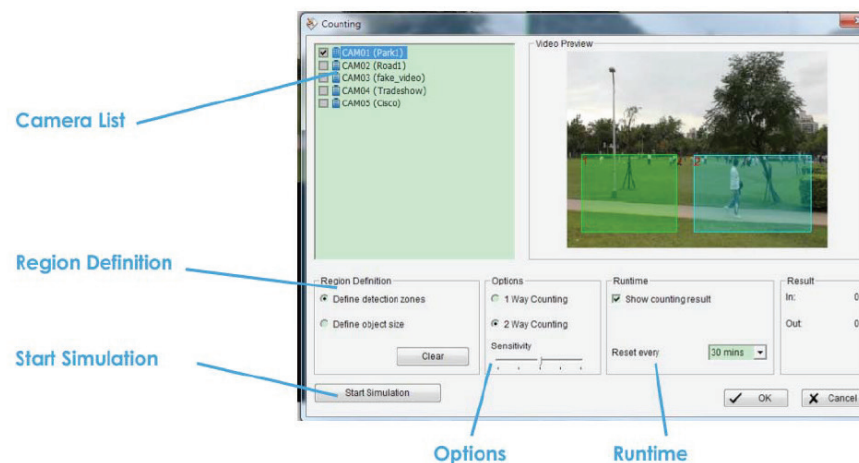
Define detection zones: Defines the detection zone.

Define object size: Defines the size of the objects to count.

Options: 1 Way Counting will take objects going from Region 1 to Region 2 as one count. In 2 Way Counting mode, it counts either going from Region 1 to Region 2 or from Region 2 to Region 1.

Runtime: Check the boxes to show the counting result on the screen and/or show object bounding box, which draws the shape of the object that the system detects in red squares. You can choose from the drop-down menu for how long you want to reset the counting number.

Start Simulation: Click to test the settings.



Video Analytics – Privacy Mask

Mask your video with dark areas to protect your privacy.

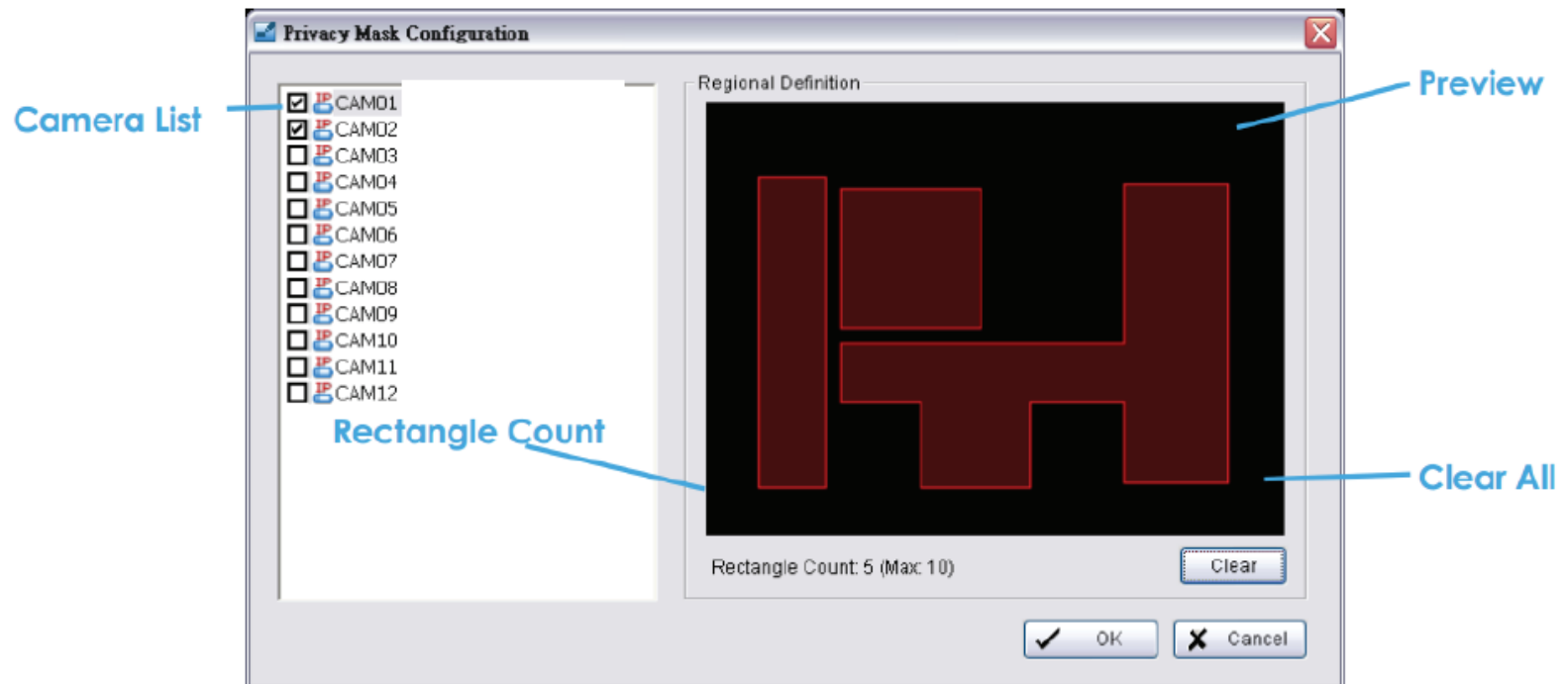
To access this page, log in with an admin account or user account with config main system privileges. Privacy mask settings will apply to local and remote live view, web live view, local playback, remote playback and web playback.

Camera List: Check cameras to enable privacy mask.

Regional Definition: Click and drag to define privacy masked areas.

Rectangle Count: Maximum 10 rectangles can be drawn to define privacy masked areas.

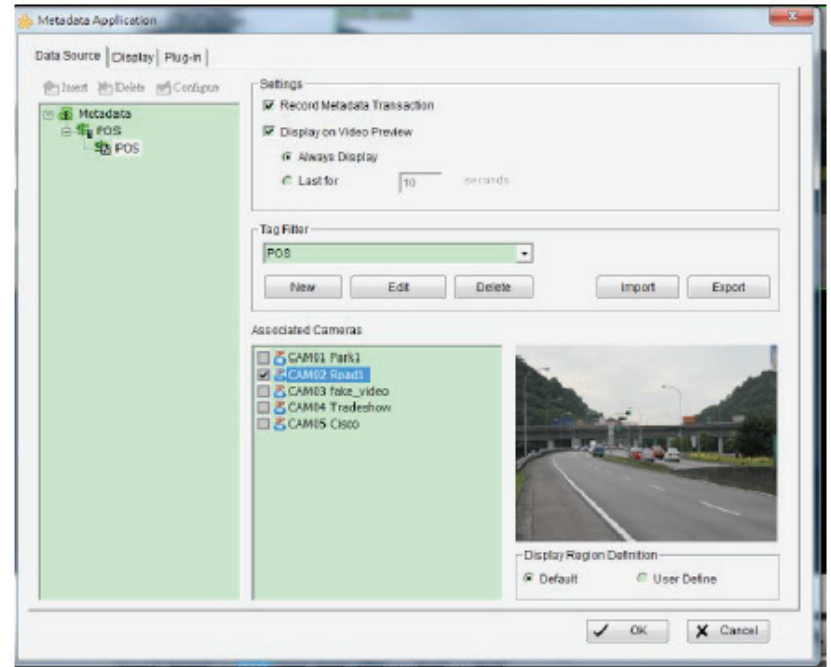
Clear: Click to clear all rectangles



Metadata Application

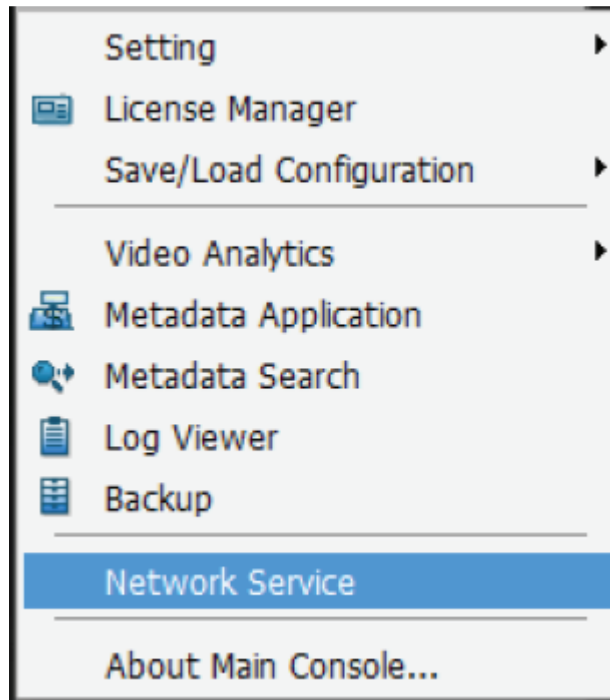
The Metadata application supports three different data types, including POS, LPR and access control.

This tool can be used to adjust general settings for these devices. Note that you will need additional licenses to use these features.



Network Service

There are 5 types of network services: **Live Streaming Server**, **Remote Playback Server**, **3GPP Service**, **Remote Desktop**, and **Central Management**. From the main console, go to **General Setting > Network Service** to open the **Network Service** window.



Live Streaming Server

With Live Streaming, the system allows remote users to log in to a specific computer and view cameras that are connected to it. As a system administrator, you can monitor these accounts in order to maintain the efficiency of the system.

Main

From the Live Streaming Server window, administrators can view all the clients who have logged in. It also enables administrators to view live video from a remote location.

Client List

Client Count: Shows the number of channels that are connected.

Kill: Highlight an IP address and click **Kill** to block the client from your client list.

Kill All: Click to block all the clients that are currently logged in to your system.

Service

Server Status: Click **Start/Stop** to turn the server on/off.

Options

To modify this section, click **Stop** to stop the server.

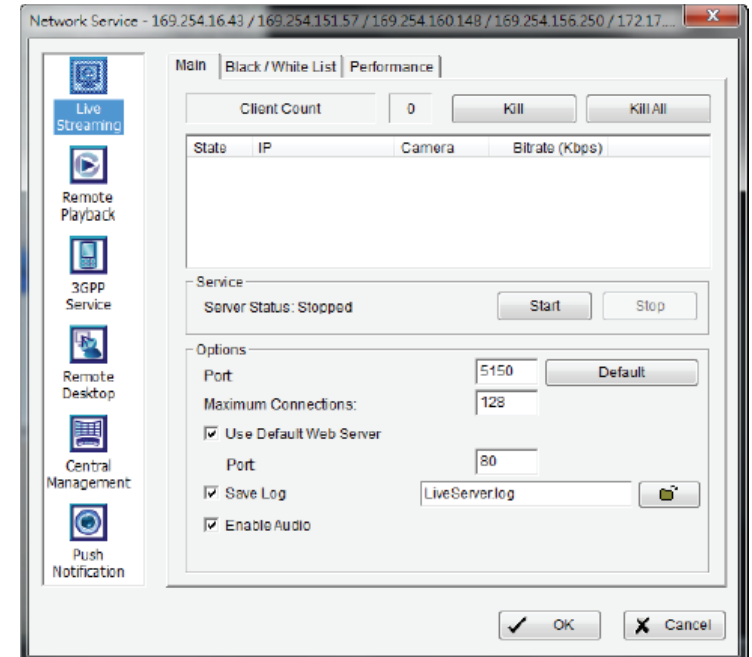
Port: Assign a port for the client to connect to your system via **Remote Live Viewer**. The default port is **5150**.

Maximum Connections: Number of connections that are allowed to connect to the system. The maximum is **128**, one camera video counts as one connection.

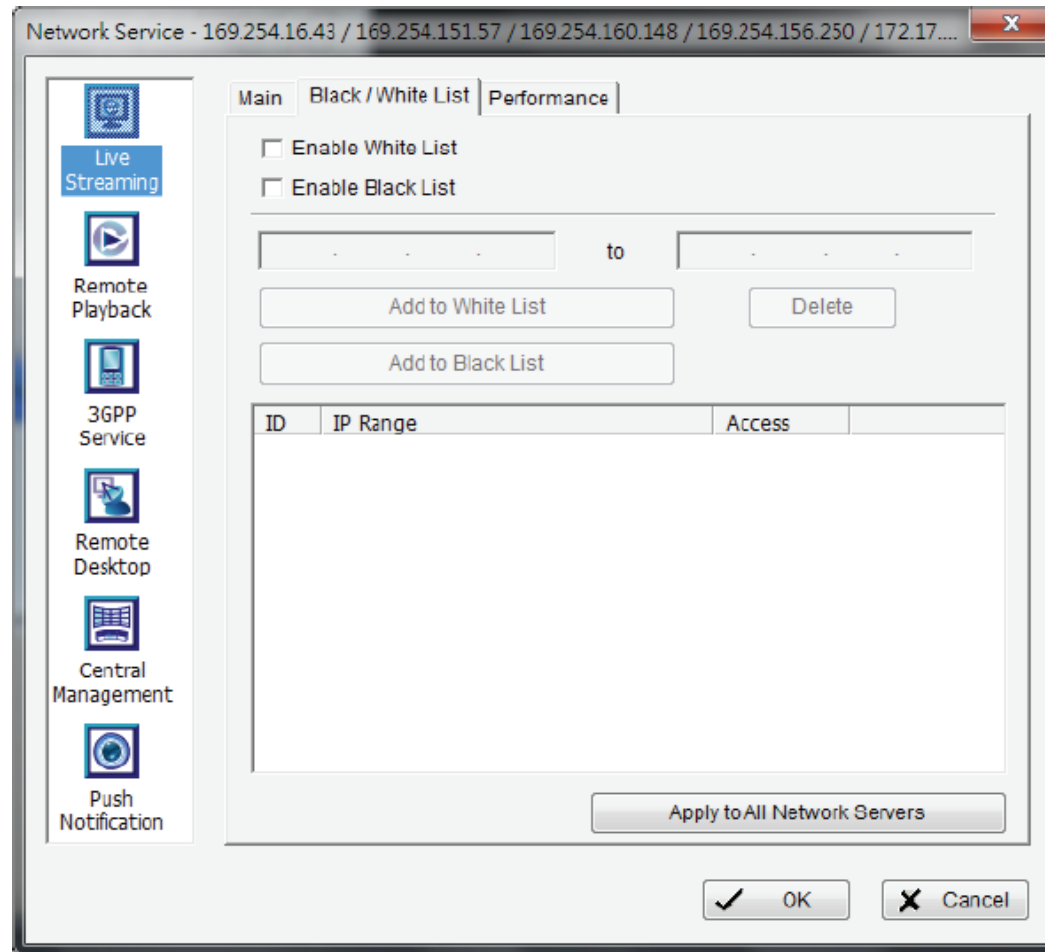
Use Default Web Server: Activate the web server by selecting this box. Clients will be able to watch live video via Internet Explorer. The default port for live streaming server is **80**.

Save Log: Select to save the current log information to your computer.

Enable Audio: Select this option to enable audio transmission along with video streaming.



Live Streaming - Black / White List



Enable White List: Select to activate the white list filter. Only IP addresses from this list are allowed to log in.

Enable Black List: Select to activate the black list filter. The IP addresses from this list will be blocked.

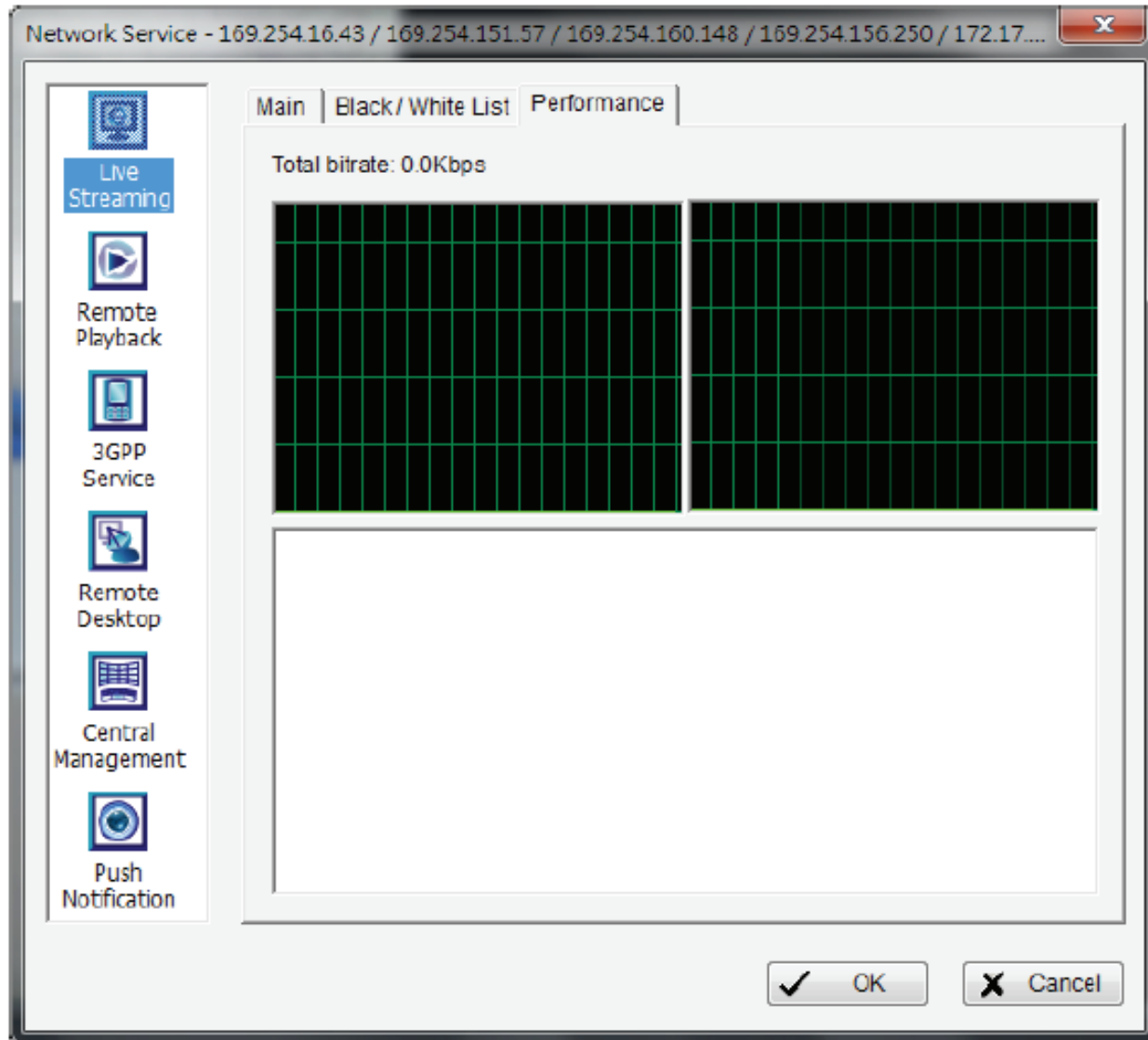
IP Address: Enter an IP address or two sets of IP addresses to indicate a series of IP addresses.

Add/Delete: To add the IP address into the list or to remove it from the list.

Apply to All Network Servers: Click to apply these settings to both live streaming servers and remote playback servers.

Live Streaming - Performance

This window displays the **Total bitrate** and individual **Camera bitrate** information.



Remote Playback Server

With the Remote Playback function, the system allows remote users to log in to a specific computer and withdraw data files that are stored. As a system administrator, you can monitor the accounts that are logged in to maintain the system efficiency.

Main

This window displays all the clients who are currently logged in and watching a playback video from a remote location.

Client List

User Count: Displays the number of users that are connecting to the system.

Kill: Highlight an IP address and click **Kill** to block the client from your client list.

Kill All: Click to block all the clients that are currently logged in to your system.

Service

Server Status: Click **Start/Stop** to turn on/off this service.

Options

Port: Assign a port for clients to connect to your system via Remote Playback. The default port is **5160**.

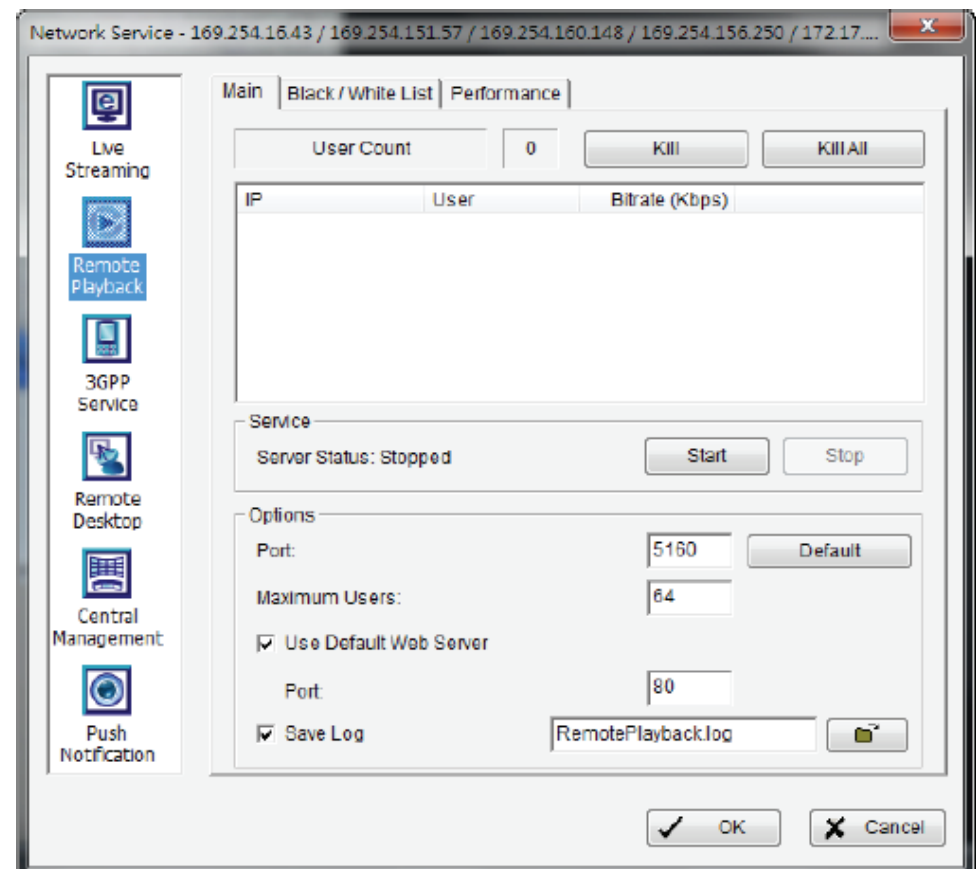
Maximum Users: Number of connections that are allowed to connect to the system. The maximum is **64**.

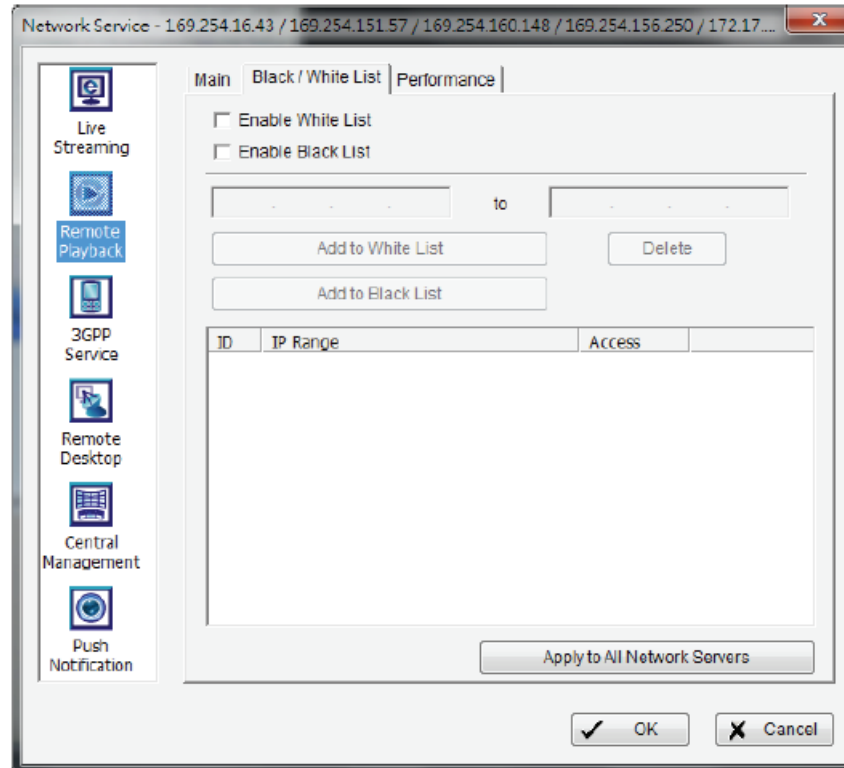
Note: A single user logged in to the server is considered as one account.

Use Default Web Server: Activate the Web server by selecting this box. Clients will be able to watch live video via Internet Explorer. The default port is **80**.

Save Log: Save the current log information.

Note: Ensure that the server is stopped before making any changes.



Remote Playback - Black / White List

Enable White List: Select to activate the white list filter. Only IP addresses from this list are allowed to log in.

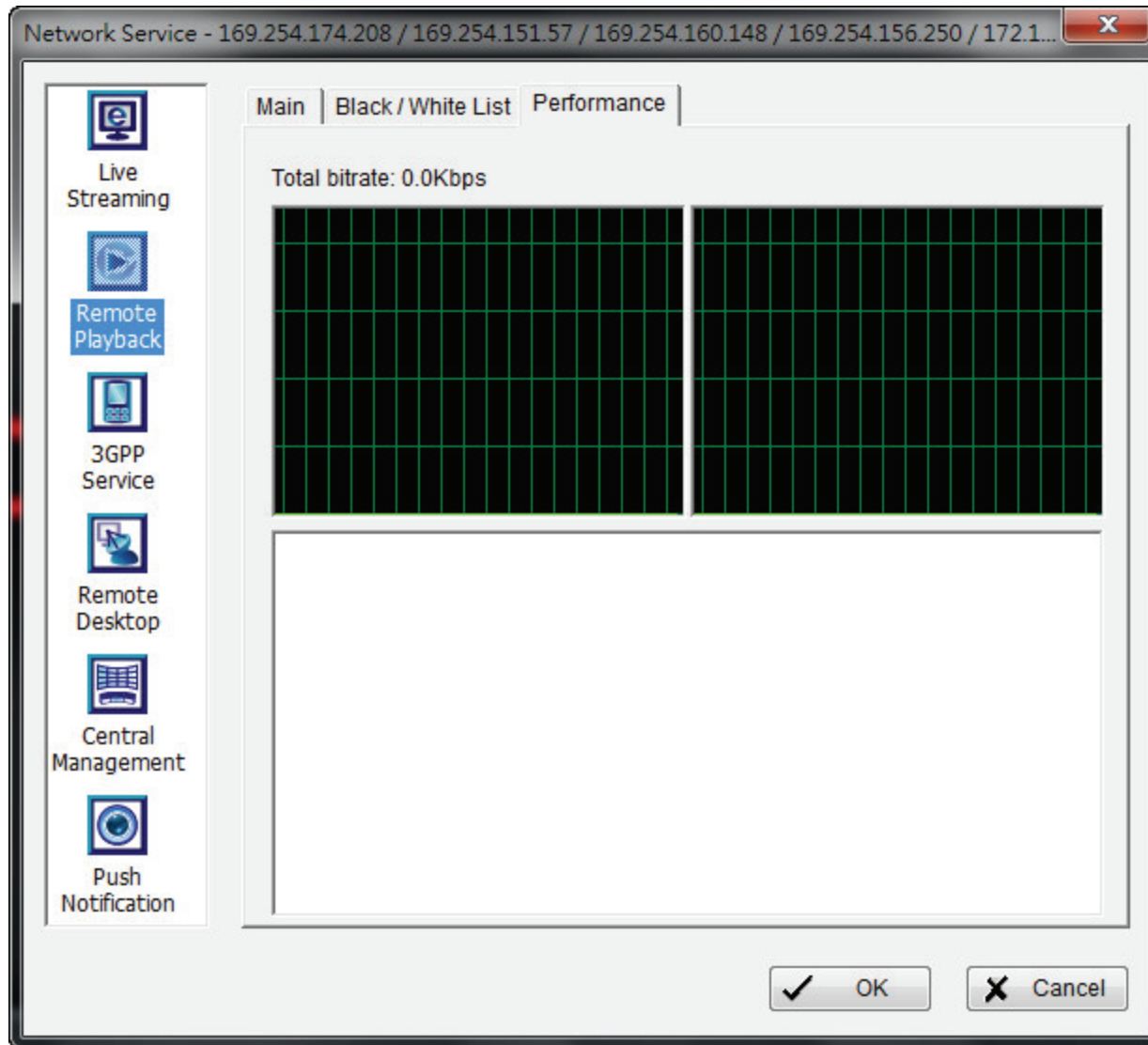
Enable Black List: Select to activate the black list filter. The IP addresses from this list will be blocked.

IP Address: Enter an IP address or two sets of IP addresses to indicate a series of IP addresses.

Add/Delete: Add the IP address into the list or remove it from the list.

Apply to All Network Servers: Click to apply these settings to both live streaming servers and remote playback servers.

Remote Playback - Performance



This window displays the **Total bitrate** and individual **Camera bitrate** information.

3GPP Service

When starting the 3GPP service function of your computer, the system allows remote users to log in and view cameras that are connecting to it with a 3GPP supported mobile phone.

Client list

Client Count: Show the number of channels that are connected to system.

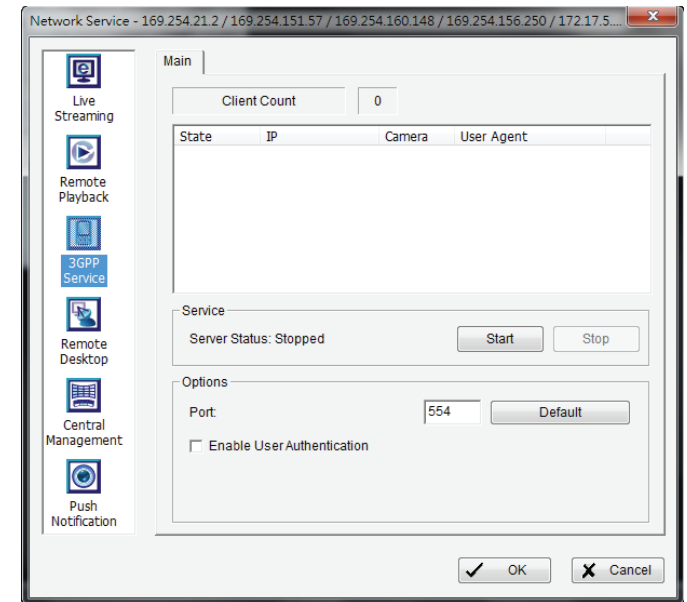
Service

Server Status: Click **Start/Stop** to turn on/off this option.

Options: Adjust the setting only when the server is stopped.

Port: Assign a port for the clients to connect to your system via 3GPP Service. Default port is 554.

Enable User Authentication: Users need to insert the username and password to log in to the 3GPP server and view the video stream.



Remote Desktop

This window allows remote users to use Remote Desktop Viewer to log in and configure the system. Refer to the **Remote Desktop Viewer** section to install and use this tool.

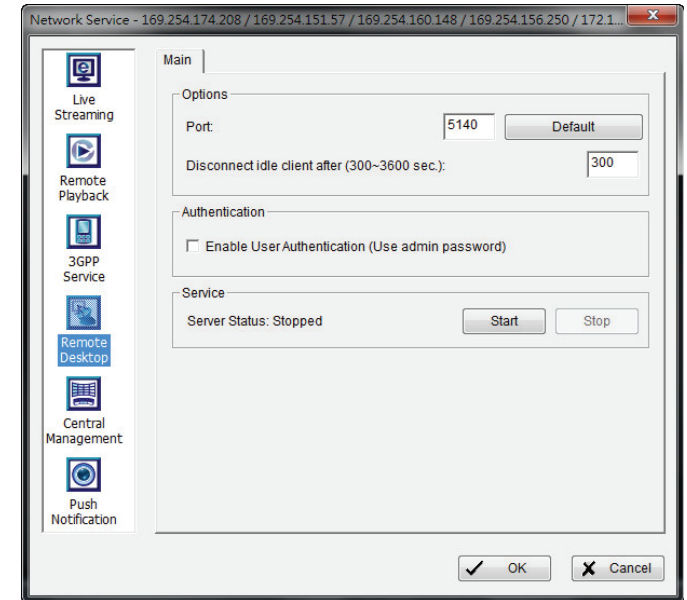
Options

Port: Assign a port for Remote Desktop Viewer, so that users can log in and configure the system.

Disconnect idle client after (300~3600 sec): Auto disconnects an online user who is idle for more than the specified time period.

Authentication: Enable this option to allow only an administrator to log into the system.

Server Status: Click **Start/Stop** to turn on/off this service.



Central Management

This service only supports Central Management System (CMS). Having started the Central Management Service, the main console sends event information to CMS and allows the CMS system to control I/O devices from a remote site.

Note: To enable this action, go to **Guard >Action** and select **“Send to Central Server”** to enable the action triggered by preference event.

Client list:

Client Count: Show the amount of NCS Servers that are connected to system.

Kill: Highlight an IP address and Click the **“Kill Client”** button to block the client from your client list.

Kill All: Click this button and then block all the clients logged in to your system.

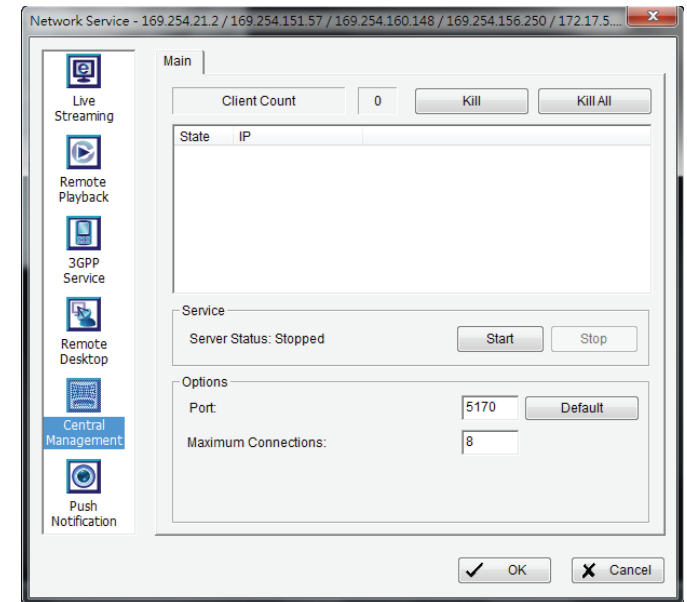
Service:

Server Status: Click **Start/Stop** to turn on/off this option.

Options: Adjust the setting only when the server is stopped.

Port: Assign a port for the CMS System to connect to the main console system with. The default port is 5170.

Maximum Connections: Number of connections from CMS Servers that are allowed to connect to the system. The default is 8 CMS Servers and maximum is 16.



Push Notifications

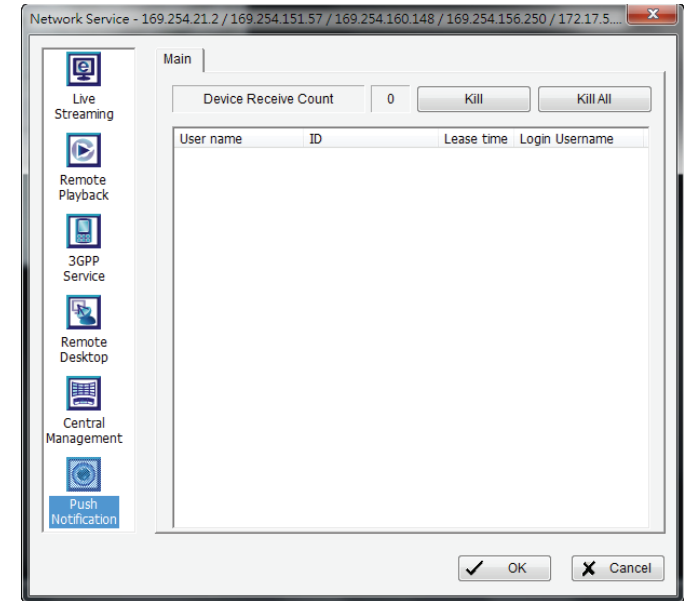
When starting the Push Notification service function of your computer, the system allows users to view and delete mobile devices.

Device list:

Device Receive Count: Show the amount of users with mobile devices that are connected to system.

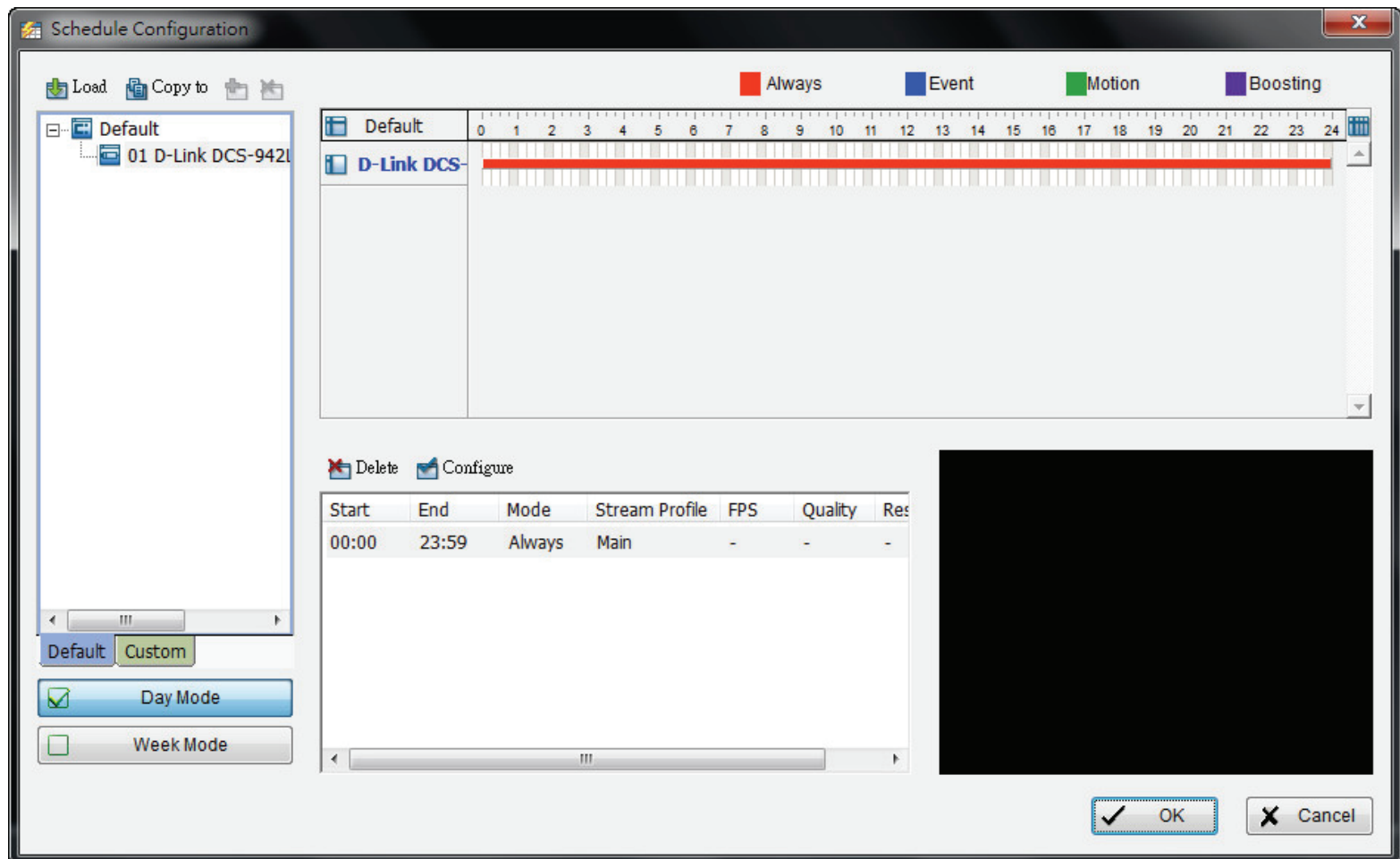
Kill: Click the “Kill” button to delete the user from your device list.

Kill All: Click this button and then delete all the devices logged into your system.



Schedule System

Click the **Configure Schedule System** icon on the Main Console to set up the time duration for video recording.

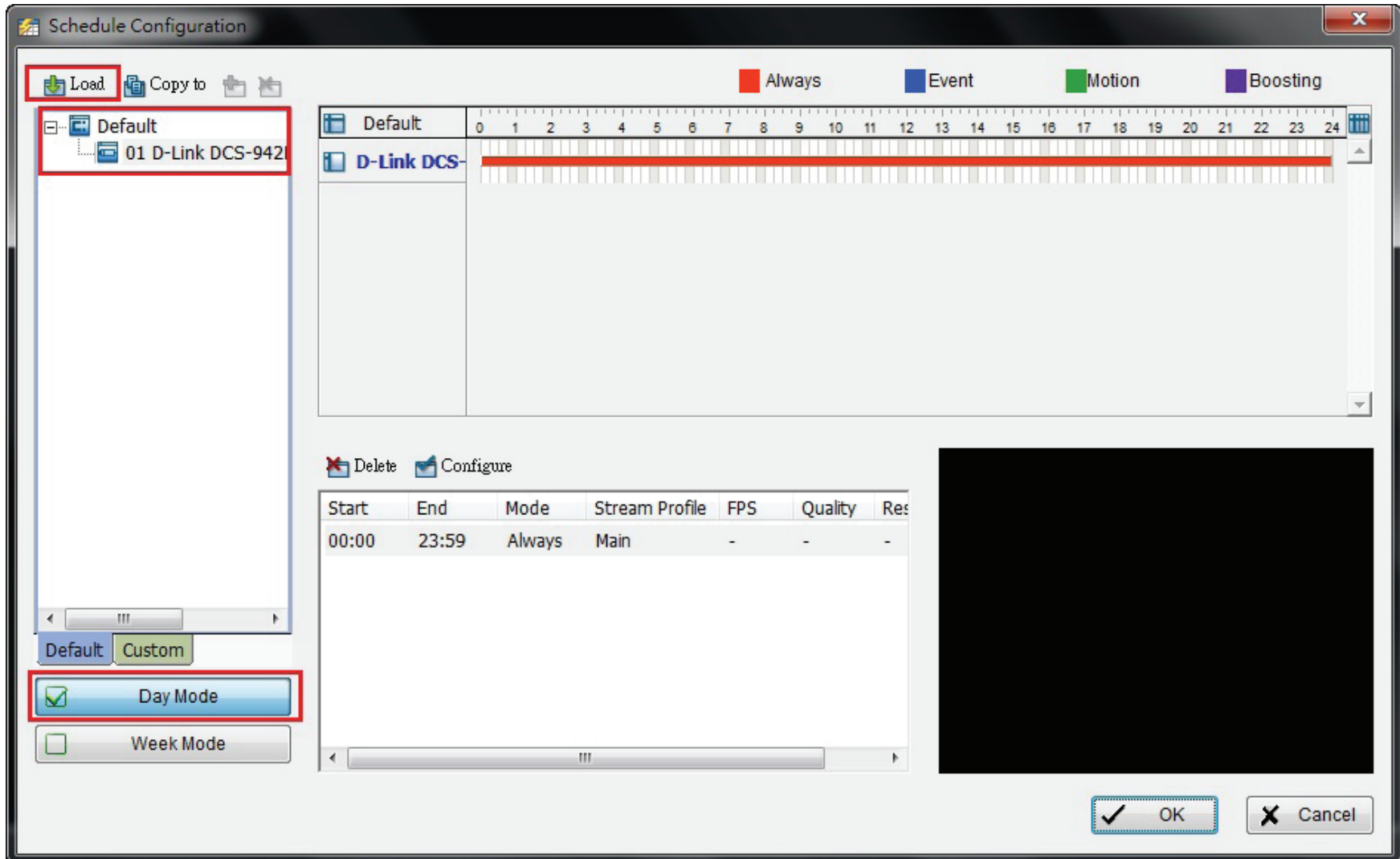


Day Mode


Schedule the camera(s) to record video every day at the same time.

There are three ways to setup the time schedule for each camera:

1. Load a preset mode.
2. Insert a new schedule manually.
3. Copy to other cameras after the manual setup.



Load Preset Modes

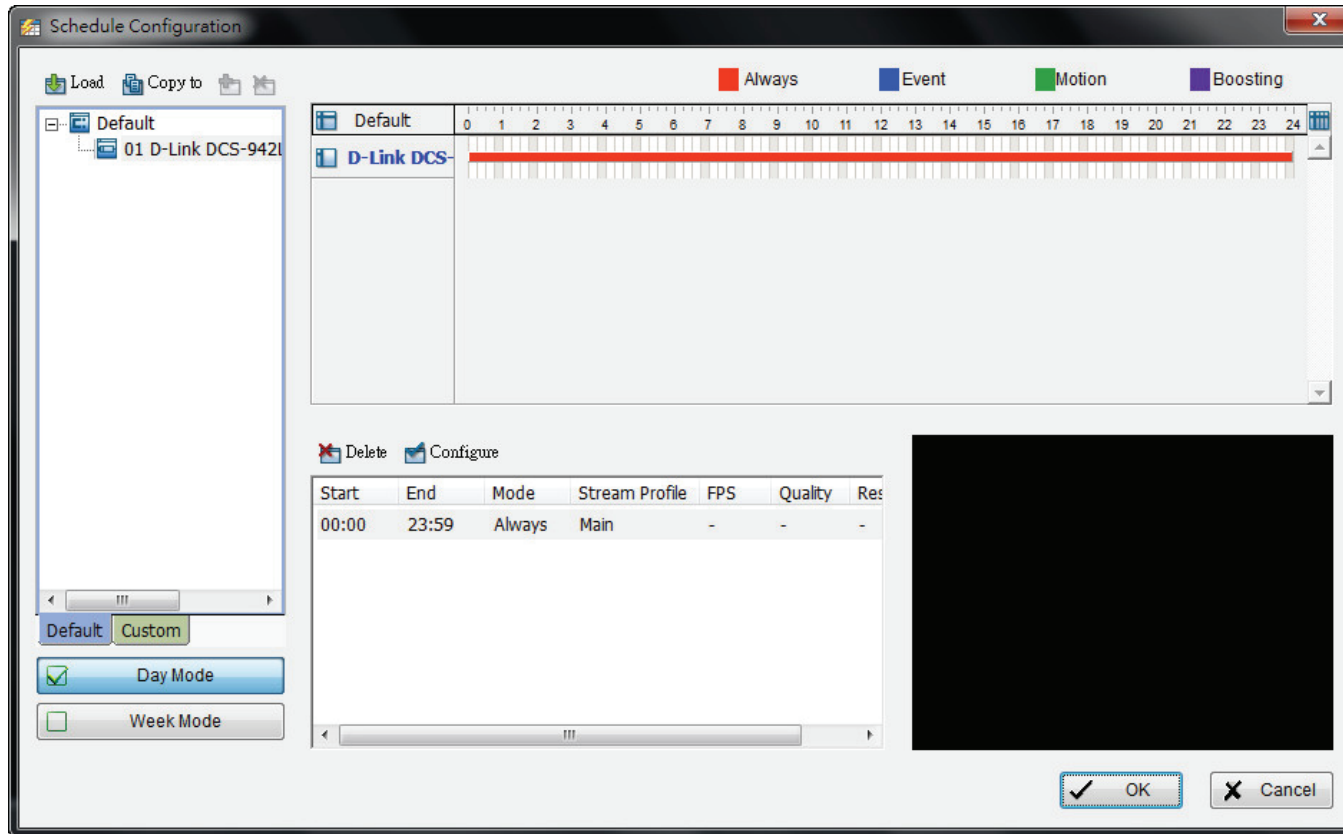
The system provides six modes for quickly setting up the recording schedule. Click  Load to select the preset mode. Refer to the following table for definitions of each mode in each series.

Mode	Format	Time	Record Mode	key frame only	Adjust video frame	Profile
Regular	M-JPEG	00:00-24:00	Always	checked	uncheck	Main
	MPEG4/H.264			uncheck		
Office	M-JPEG	08:00-20:00	Always	checked	uncheck	Main
	MPEG4/H.264			uncheck		
Shop	M-JPEG	10:00-22:00	Always	checked	uncheck	Main
	MPEG4/H.264			uncheck		
Highly Secure	M-JPEG	00:00-24:00	Always	checked	uncheck	Main
	MPEG4/H.264			uncheck		
Disk Saving	M-JPEG	00:00-24:00	Motion	checked	10 fps	Main
	MPEG4/H.264			checked		
Minor	M-JPEG	00:00-24:00	Motion	checked	5 fps	Main
	MPEG4/H.264			checked		

Insert a New Schedule Manually

Step 1

Left-click and draw the bar you want to add to the time table. The scheduled time will be seen as a grey bar.



Step 2

Click on the **Configure** icon or double-click the schedule information to change the settings.

Step 3

Click **OK**.

Copy Schedule

You may set up the schedule for each channel/camera by repeating the process above, or simply apply the settings of a single camera to all the others by clicking the **Copy To** icon on the top of the display window.

Week Mode

Schedule the camera(s) for each day of the week. In addition, you may assign holidays under the Week Mode.

Default

Follow the same process to set up the schedule for each day of the week.

Holiday

You may assign holidays where the system will work according to the pre-defined Sunday schedule.

Custom

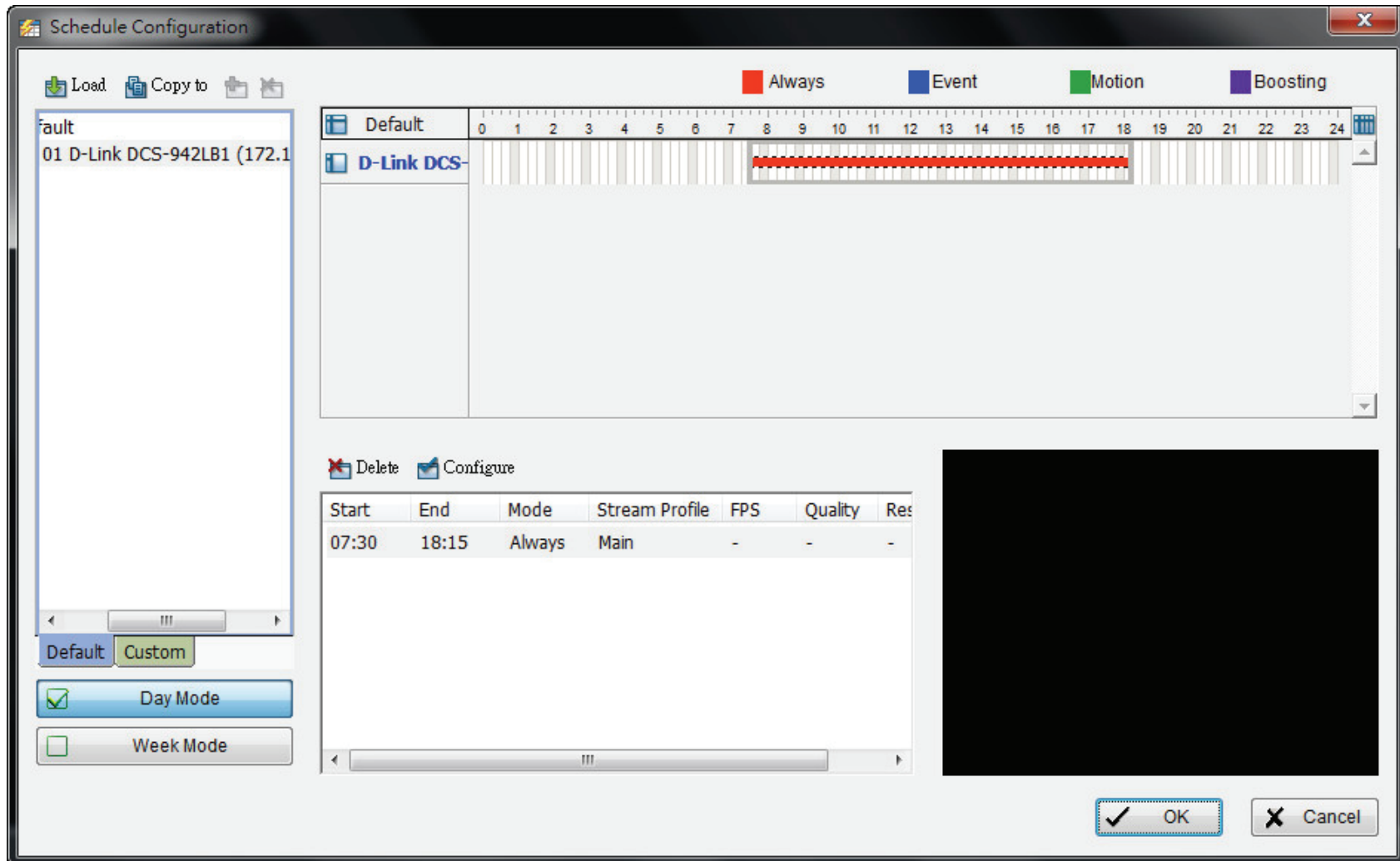
You can assign a particular date(s) for the system to work according to a special schedule(s).

Adjust the Schedule Settings

You can manually change the settings at any time after you insert or load a schedule.

Option 1: Select the **Time Bar** and slide the bar to the left or right to change the start and end points.

Option 2: Click **Configure** or double-click on the schedule information (highlighted in blue) to open the **Encoding Options** window and modify the settings.



Record Mode

There are 2 recording modes and 5 video profiles to choose from. Please choose one that best suits your scenario.

Always Record

Select this option to record video continuously.

Record on Motion

Select this option to start recording when motion is detected. Please adjust sensitivity, the frame interval, and set up the detection zone to detect motion. Frame interval is the interval in the number of frames between each check by D-ViewCam. To set up a single detection zone, left-click and drag the mouse to draw a rectangle. To set up more than one detection zone, simply repeat the same process or click **All** to select the entire screen.

Boosting Record on Event:

This option enables you to record at a lower frame rate at regular times, and at a higher frame rate under Smart Guard triggered events.

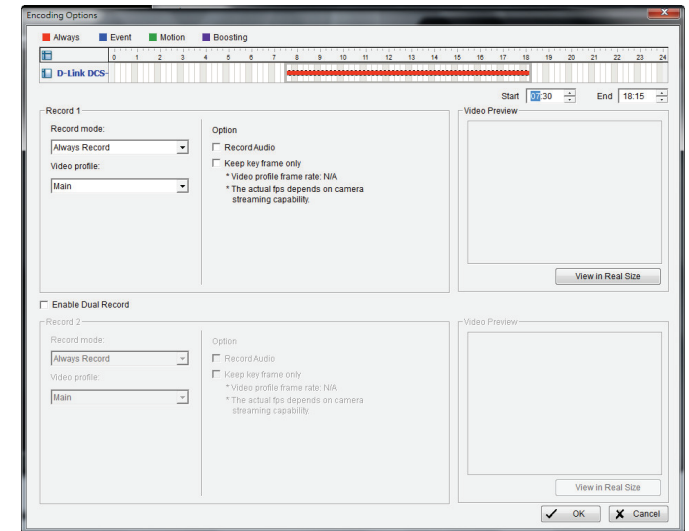
Select this option to obtain the “**Select Event**” panel. Choose from the list any Smart Guard or digital input events or video analytics from the device. The chosen event(s) will trigger the recorded action.

Note: It is required to enable “**Smart Guard**” from the main console panel before **General Setting** “**boosting record on event**” to trigger recording.

Record on Event:

Select this option to start recording at any predefined event, including Smart Guard events, metadata events, digital input events, and video analytics from devices.

Note: The maximum number of rectangle detection zones you may create is 10.



Enable Dual Record: Record two video streams from the IP camera at the same time.

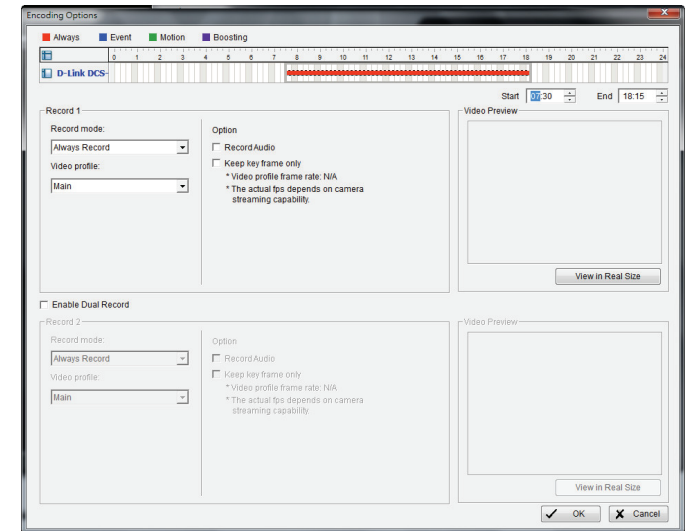
Record Audio: Use the check box to enable or disable audio recording.

Keep key-frame only: The system will only record key frames of the video stream.

Note: The key frame interval is controlled by each camera manufacturer and cannot be adjusted.

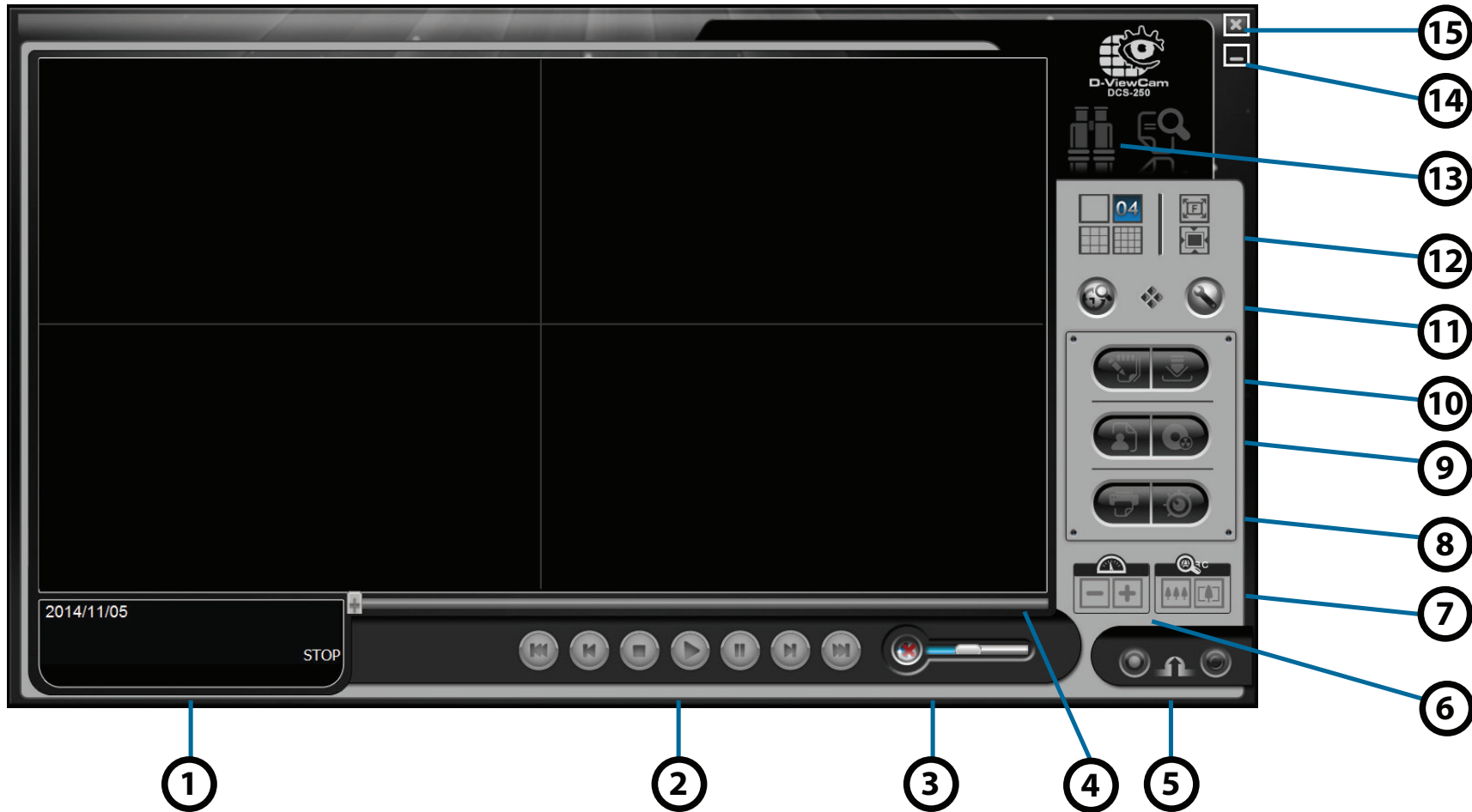
Pre-record/Post-record Time: The pre-record/post-record function saves the recording data accordingly. For instance, to set up a 5 second pre-record time means the system will start saving the recording data 5 seconds before the event happens.

Note: The maximum record period is 60 seconds.



Playback

The Playback console allows you to watch recorded video, view and/or search for unusual events, and view recorded system information.












- 1 Information Window
- 2 Play/Rewind/Fast Forward
- 3 Volume Control
- 4 Scroll Bar

- 5 Cue (Start/Stop Point)
- 6 Speed
- 7 Zoom
- 8 Print & Log Viewer

- 9 Save Image & Export Video
- 10 Post Processing Tool & Backup
- 11 Date Time Search Dialog & General Setting
- 12 Screen Division

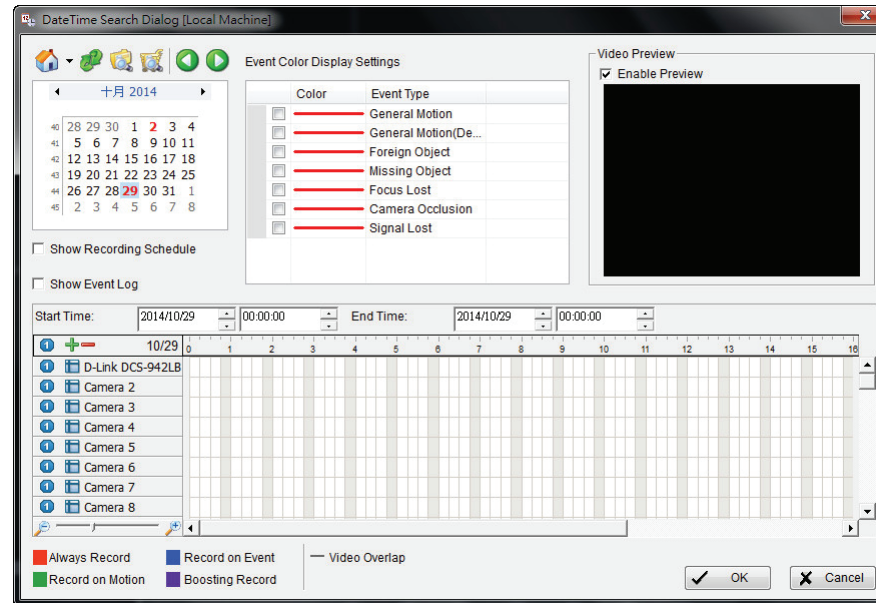
- 13 Smart Search
- 14 Minimize Window
- 15 Exit Window

1. **Information Window:** Display video date and time, current video status, cue in/out points' time, and speed.
2. **Play/Rewind/Fast Forward:** Control the video.
3. **Audio Volume Control:** Adjust the sound level.
4. **Scroll Bar:** Indicates the status of the playing video; drag it to where you want to review.
5. **Cue:** When playing video, click on the **Cue In/Cue Out** icon to set the starting/ending point of a saved video clip. The Cue In and Cue Out time will be displayed on the Playback Information Window once they are set.
6. **Speed:** Control the speed of the playing video. Click + to speed up and – to slow down.
7. **Zoom:** Zoom in and out of the recorded video.
8. **Print & Log Viewer:** Click  to open the Print window and  to open the Log Viewer window.
9. **Save image & Export:** Click  to take a picture and  to open the Export window.
10. **Post Processing Tool & Backup:** Click  to open the Post Processing Tool window and  to open the Backup window.
11. **Date Time Search Dialog & General Setting:** Click  to open the Date Time Search and  for the General Setting window
12. **Screen Division:** Allocate the sub-screen display by clicking on the desired layout. To switch to a single camera display, double-click on a particular sub-screen. Double click on the screen again to restore the previous screen division layout. To view in fullscreen mode, right-click on the screen to enable Toggle Fullscreen.
13. **Smart Search:** Click the  **Smart Search** button to access the **Smart Search** feature.
14. **Minimize:** Minimize the Playback console.
15. **Exit:** Close the Playback window.

Date Time Search Dialog



Go to **Playback** console and click **Open Record** to access the **Date Time Search Dialog**. Here you can review video records.



Record Display

The record display window displays information about the video clips. These clips can be sorted by date (calendar view) or title (list view).



Remote Server Site: Select to open **Remote Playback Site Management**. This site allows you to access a local PC or set up the remote playback server. Use **Select Folder** to directly access the recorded data folder or **Recent List** to access previously browsed recorded folders.

Note: To use **Select Folder** option you need the Main Console password.



Refresh: To refresh the Record Display window.



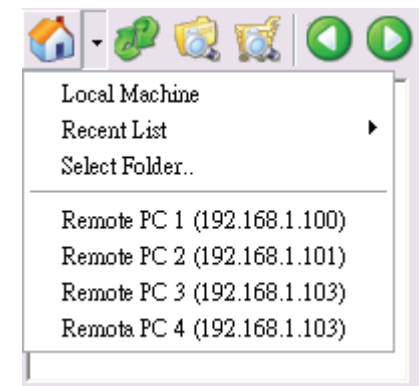
Log Viewer: To access the Log Viewer Tool.



Previous Days: To show recorded videos from the previous recording date.



Next Days: To show recorded videos of the next recording date.



Date Time Period

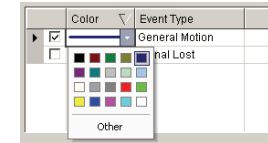
Select the starting and ending time points to review a video.

Video Preview




Select **Enable Preview** to preview the selected video.

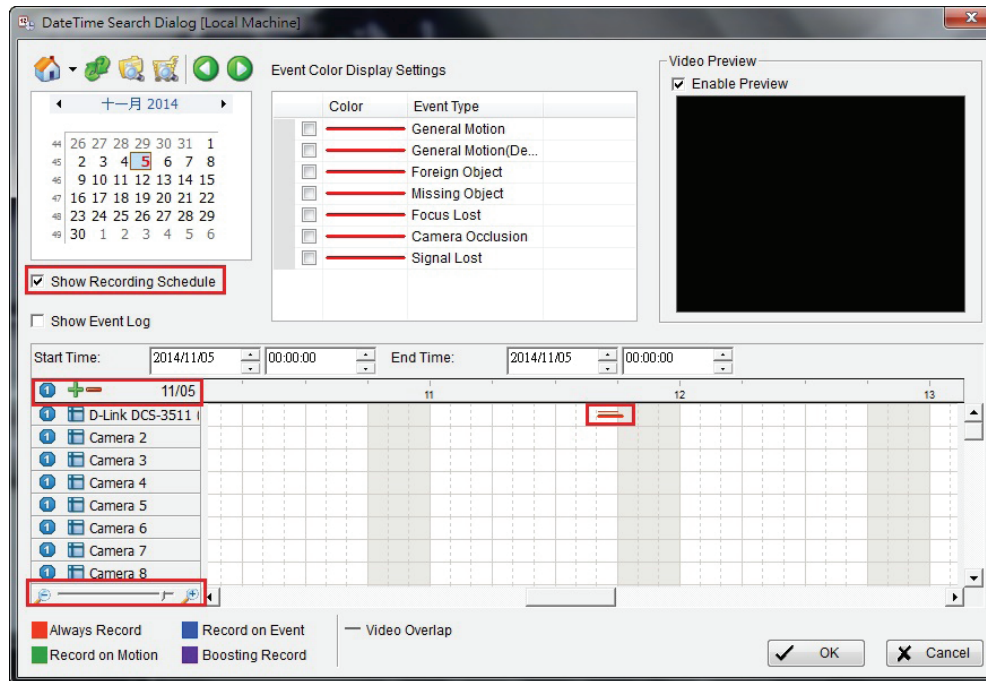
Event Type

You can change the color of the event by clicking on the color bar and then click the down arrow.



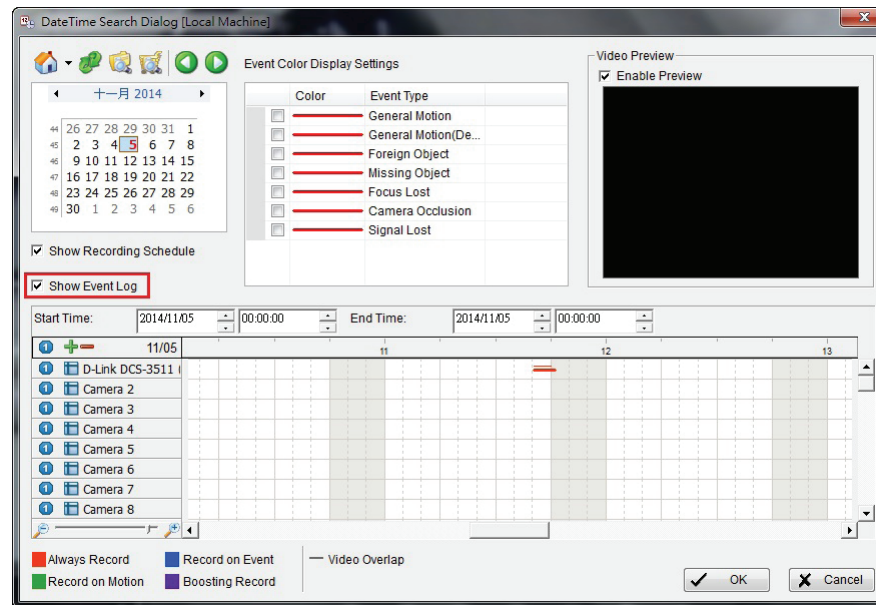
Time Table

- Click  to select all channels or  to deselect all channels. Finally, utilize the  scale bar to modify the time table.
- Select **Show Records** to display the time period of recorded data.



* Support for dual playback: If the camera has dual recording feature, you can click the numeric button near the camera name to switch between 2 recording schedules (thick line) and available recordings (thin line).

- Select **Show Event Log** to display the time of the detected event.



To Playback Video

Step 1: From the **Record Display** window, select the date of the recorded video you want to view. The red, green, and blue lines in the time table indicate the available video records.

Note: The **Record Display** window can be displayed in (a) calendar view or (b) list control view. To modify these settings, click **Settings** on the Playback Console.

Step 2: Use color bars to differentiate event types.

Step 3: Highlight the video clip you want to review by left clicking and dragging the time period. You may also utilize the **Start Time** and **End Time** in the **Date Time Period** section.

Step 4: Select **Enable Preview** in the **Video Preview** section to view your video.

Step 5: Click on the camera name to add or remove cameras that you want to playback.

Step 6: Click **OK** when finished.

Search Mode



Go to **Playback** console and click  to open the **Smart Search** window.

Alarm Event Type

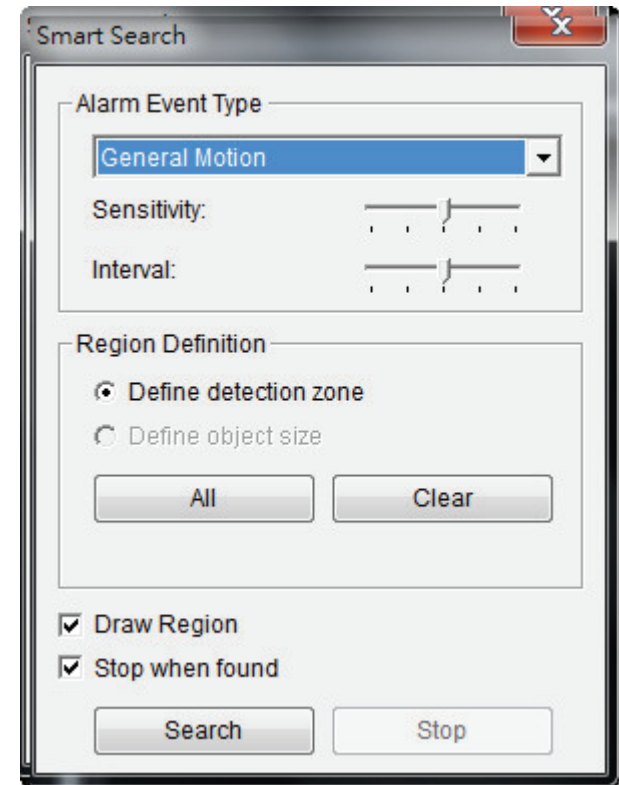
General Motion: Detects all movements in the defined area.

Sensitivity: This slider controls the sensitivity required to trigger the alarm. Slide the control to the right to increase sensitivity (relatively small movements will trigger the alarm) or to the left to reduce sensitivity.

Interval: Move the slider control to the right to increase the time interval, so the alarm will be triggered only when the movement lasts longer; moving to the left will reduce the time interval.

Define Detection Zone: Left click and drag to draw a detection zone on the video screen. You may define more than one zone on the screen by repeating the process.

Stop When Found: Select this option to stop the video when detecting motion in the detection zone. Unselect this option to keep the video rolling, and to display all the detected events on the search list. Click on the listed event to jump to the specific part in the video where motion is detected.



Post Processing Tool



Go to **Playback** console and click  to open this tool.

General Setting

Select to either apply the filter settings to only active channels or to all channels.

Filter Setting

Visibility: Select to adjust the gamma value of the image to enhance the image and make it cleaner.

Sharpen: Select and move the slider to the right to sharpen the image or to the left to soften the image.

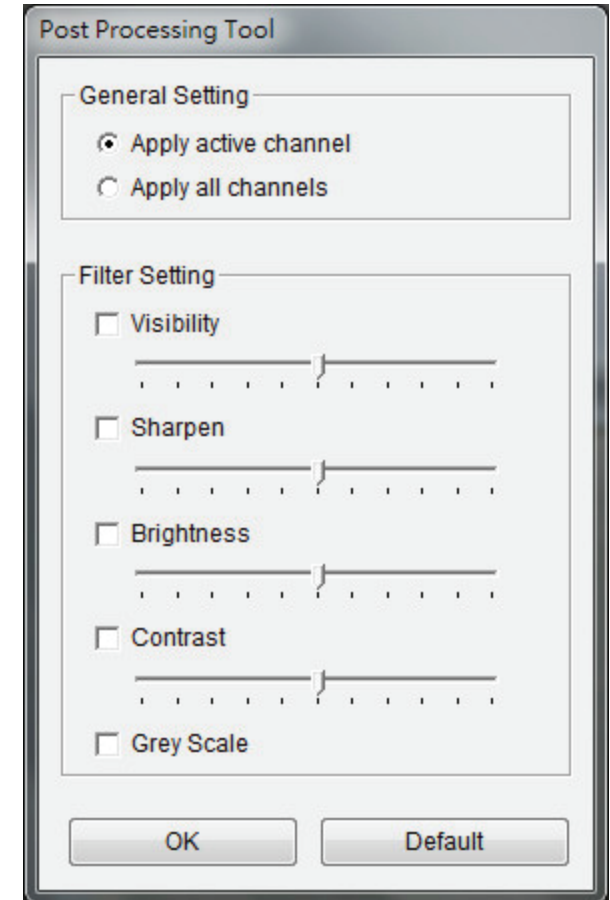
Brightness: Select and move the slider control to the right to make the image brighter.

Contrast: Select to move the slider control to the right to increase contrast.

Grey Scale: Select to display the video record in grey scale mode. The image will be displayed in black and white.

Default: Click to restore the default settings.

OK: Click to save your settings.



Backup



Go to **Playback** console and click  to open this window.

Here you can start a full function Playback Console and load the backup files on any Windows PC. You can monitor real time video and work on the backup files on separate computers simultaneously.

Step 1: Click **Open Record** in the **Playback** console and click **Backup**.

Step 2: In the **Date Time Period** section, select the **Start Time** and **End Time** for backup.

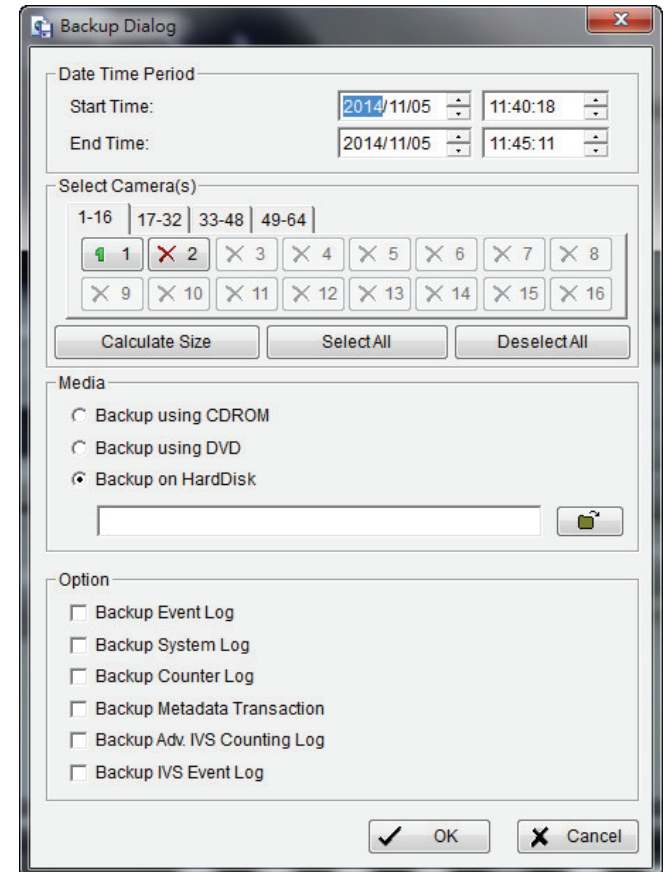
Step 3: In the **Select Camera(s)** section, select the camera(s) you want to backup.

Step 4: Click **Calculate Size** to calculate the size of the backup data.

Step 5: Under **Media**, select where you would like to save the backup data.

Step 6: Under **Option**, select the type of data you want to backup.

Step 7: Click **Backup** to start backup.



Snapshot

Go to **Playback** console and click .

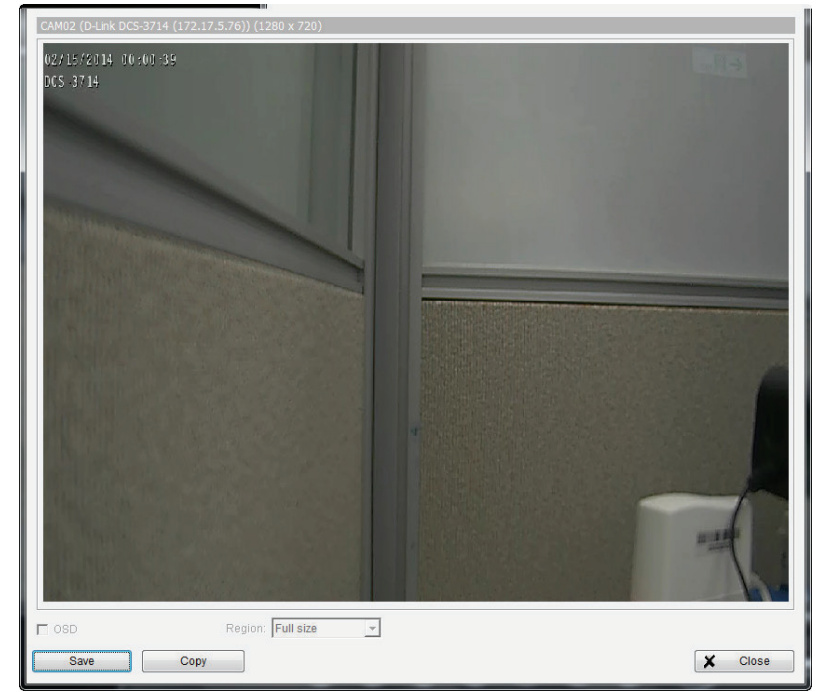
Step 1: Click on the camera display window to take a snapshot.

Step 2: Click **Save Image** when the image you want is displayed on the screen. You may click **Pause** to freeze the video and use **Step Forward/Step Backward** to find the picture(s) that you want to save.

Step 3: Select **OSD** to export the image with the date/time and camera number/name displayed. If the digital PTZ function is enabled in the display view, you can also select **Full size** or **Selected Region** as your image region.

Step 4: You have the option to copy the image to the clipboard or save it to your computer. Click **Save Image** and select the folder you want to save it to. Select the image format (BMP or JPEG) and click **Save**.

Note: You may skip step 3 by pre-setting a folder and format to save images to.



Export Video/Audio



Go to Playback console and click  to open this window.

Step 1: Click on the display screen of the Playback console to choose the camera display that you want to save as a video clip.

Step 2: Click the cue buttons to select the start and end points. The **cue in** and **cue out** time will be displayed in the information window.



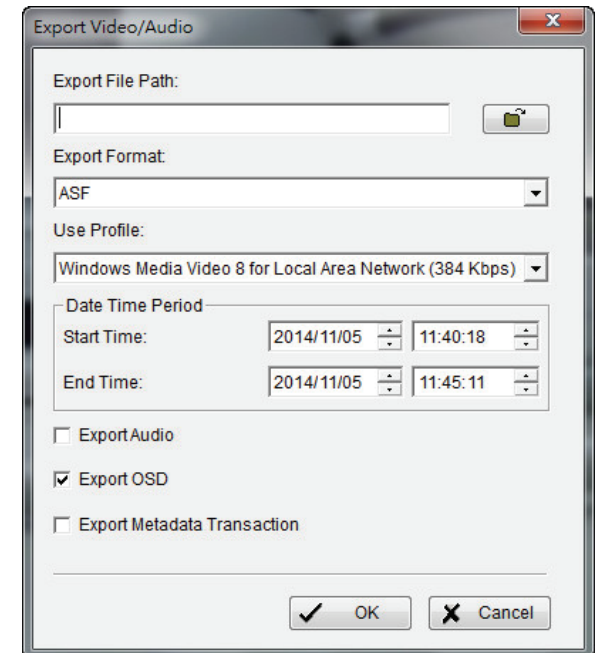
Step 3: Click the **Save Video** icon, select the location where you want to save the file to and enter the file name.

Step 4: Select **Export Format** from the drop-down list - ASF or AVI.

Step 5: Select a profile from the **Use Profile** drop-down menu.

Step 6: Select to export (i.e. save) the recorded video with audio, OSD (On-Screen Display), or export the video only.

Step 7: Click **OK** to save video.



Print

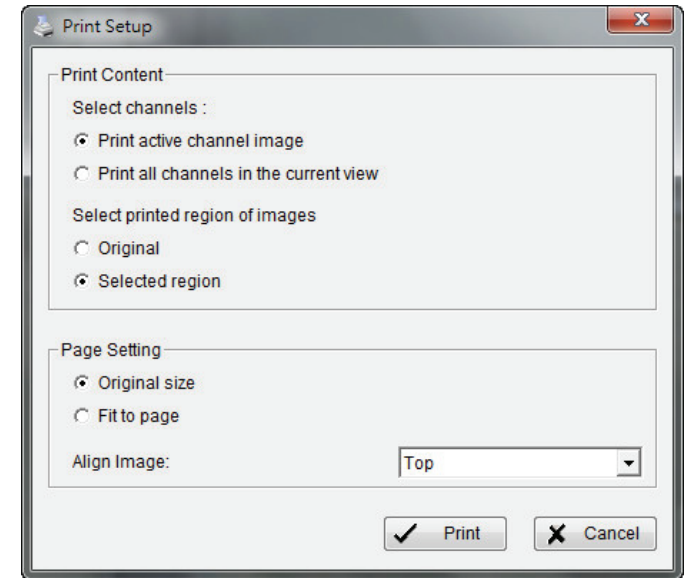


Go to **Playback** console and click  to open this window.

Page Setting: Select **Original Size** or **Fit to Page** options to print the image. Select the alignment from the **Align Image** drop-down list (Top, Center, or Bottom).

Print Content: Print the image from the selected channel or all the channels shown on the screen.

Print: Click to print the image.



Log Viewer

The screenshot shows the Log Viewer application window with the following settings and data:

- System Log | Export and Backup Log | Unusual Event | Counting Application | Counting Application (Diagram) | Metadata Log
- Log Type: All
- Date: 2014/11/05
- Date Time: 2014/11/05 16:01:28 to 2014/11/05 16:01:28
- Buttons: Export to..., Search

Event Time	Event Type	Device	Description
2014/11/05 11:16:59	Main Console Startup		
2014/11/05 11:17:02	User Login		admin
2014/11/05 11:39:36	Enable Channel	1	CAM1
2014/11/05 11:39:38	Modify Configuration		
2014/11/05 11:40:15	Start Schedule		
2014/11/05 11:42:39	Modify Schedule		Changed by admin, N/A, Day Mode: Camer...
2014/11/05 12:57:58	IP Camera Connection Lost	1	172.17.5.42
2014/11/05 13:53:16	Stop Schedule		
2014/11/05 13:53:37	Start Schedule		
2014/11/05 13:53:38	IP Camera Connection Lost	1	172.17.5.42
2014/11/05 13:54:23	IP Camera Connection Regained	1	172.17.5.42
2014/11/05 14:23:50	Stop Schedule		
2014/11/05 14:23:51	Modify Metadata Setting		
2014/11/05 14:23:51	Start Schedule		
2014/11/05 14:25:32	Stop Schedule		
2014/11/05 14:25:35	Main Console Shutdown		
2014/11/05 15:12:38	Main Console Startup		
2014/11/05 15:12:39	User Login		admin
2014/11/05 15:15:50	IP Camera Connection Lost	1	172.17.5.42
2014/11/05 15:16:14	IP Camera Connection Regained	1	172.17.5.42
2014/11/05 15:19:21	IP Camera Connection Lost	1	172.17.5.42
2014/11/05 15:19:44	IP Camera Connection Regained	1	172.17.5.42
2014/11/05 15:22:50	IP Camera Connection Lost	1	172.17.5.42
2014/11/05 15:22:51	IP Camera Connection Regained	1	172.17.5.42

To launch Log Viewer, click on **General Setting** and select **Log Viewer** from the menu. Here you can view any unusual event history that has been detected by the Smart Guard System.

System Log

Step 1: Choose the type of event you want to check or select **All** from the drop-down menu for all types of events.

Step 2: View the events that happened on a particular date or during a given time period by selecting a search period.

For a particular data: Check the "Date" box and select the date you want to view.

For a period: Check the "Date&Time" box and then enter the date and time.

Step 3: Click **Search**.

- | | |
|--------------------------------|---|
| ✓ Mainconsole Startup | ✓ Modify Remote Playback Server |
| ✓ Mainconsole Shutdown | ✓ IP Camera Connection Lost |
| ✓ User Login | ✓ Restart Windows |
| ✓ User Login Failed | ✓ Modify Metadata Setting |
| ✓ Start Schedule | ✓ Metadata Connection Lost |
| ✓ Stop Schedule | ✓ Modify E-Map |
| ✓ Execute Recycle | ✓ Start Remote Desktop |
| ✓ Enable Channel | ✓ Stop Remote Desktop |
| ✓ Disable Channel | ✓ Modify Remote Desktop |
| ✓ Start Smart Guard | ✓ Start Central Management |
| ✓ Stop Smart Guard | ✓ Stop Central Management |
| ✓ Modify Smart Guard | ✓ Modify Central Management |
| ✓ Modify Schedule | ✓ Start Counting Application |
| ✓ Modify Configuration | ✓ Stop Counting Application |
| ✓ Start Live Streaming Server | ✓ IP Camera Connection Regained |
| ✓ Stop Live Streaming Server | ✓ Sync. Microsoft Active Directory User |
| ✓ Modify Live Streaming Server | ✓ IP Camera Parameter Changed |
| ✓ Start Remote Playback Server | ✓ Update Metadata Plug-in |
| ✓ Stop Remote Playback Server | |

Export and Backup Log

View the Export and Backup Log history that has been operated by local or remote users.

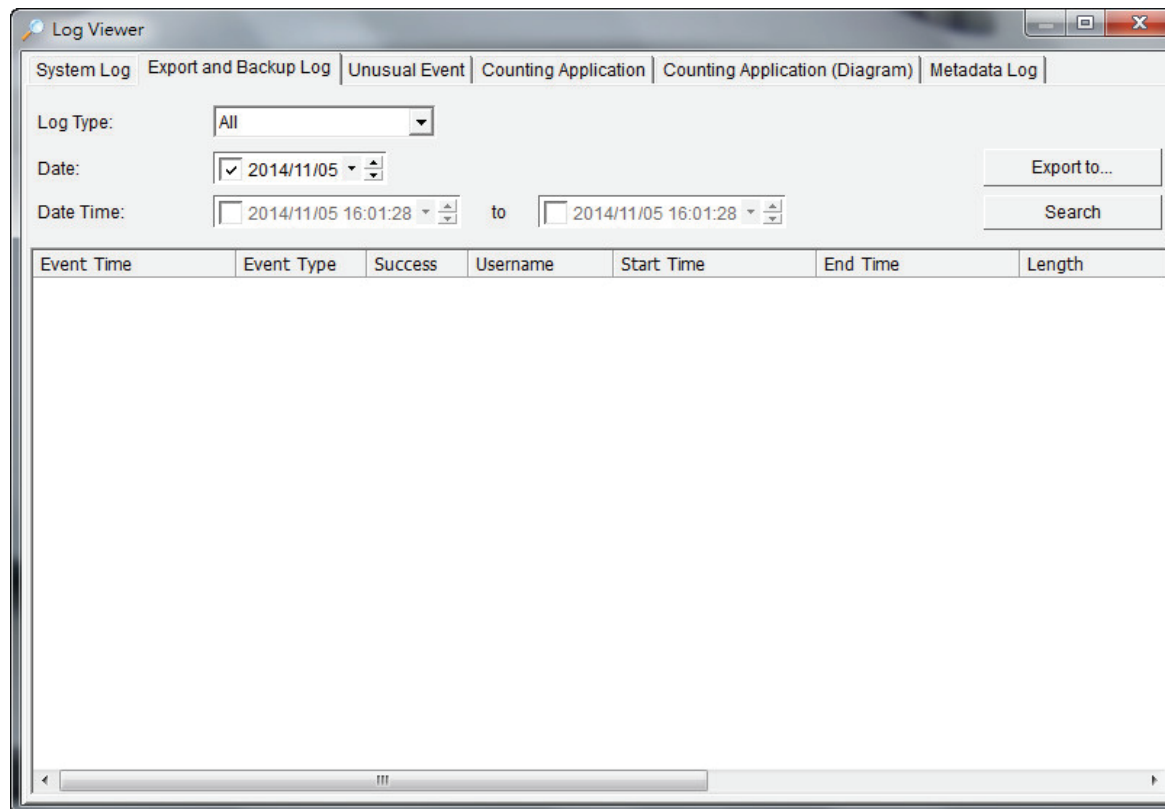
Step 1: Choose the type of event you want to check or select **All** from the drop-down menu for all types of events.

Step 2: View the events that happened on a particular date or during a given time period by selecting a search period.

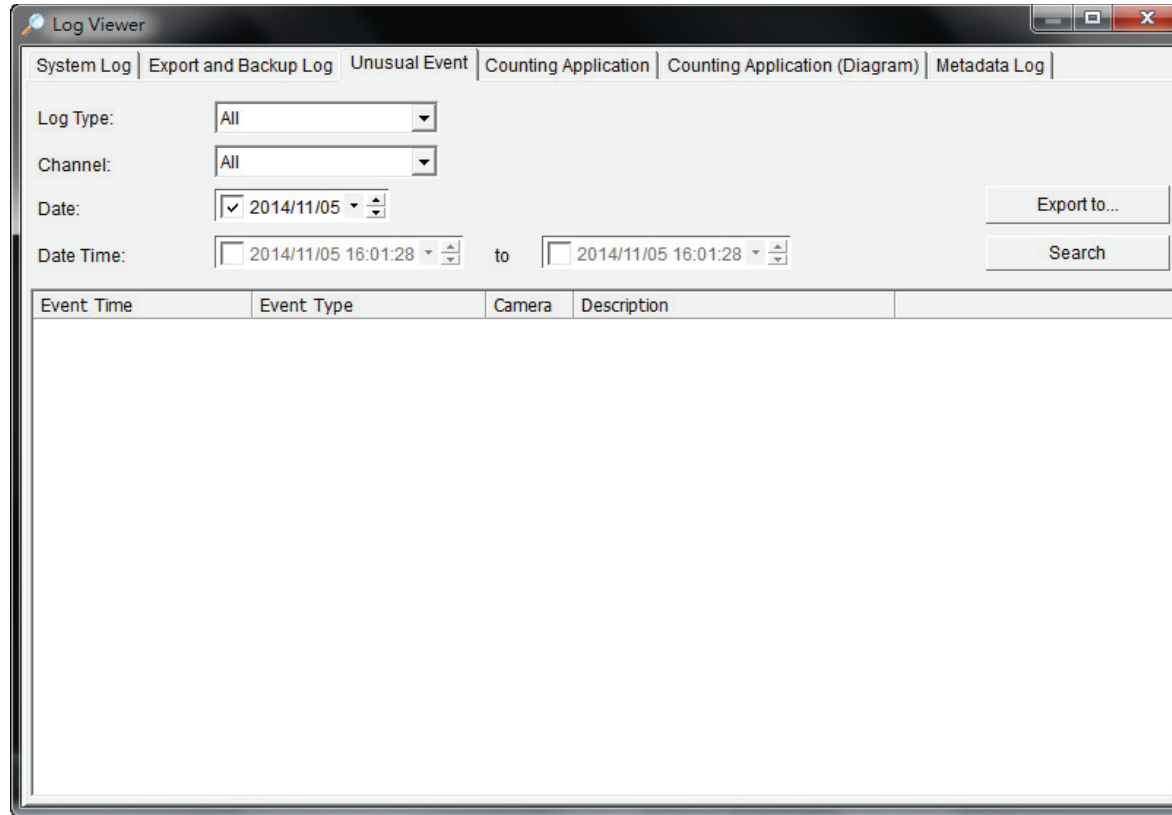
For a particular data: Check the “Date” box and select the date you want to view.

For a period: Check the “Date&Time” box and then enter the date and time.

Step 3: Click **Search**.



Unusual Event



Step 1: Select the type of event you wish to view or select **All** from the drop-down menu to view all types of events. The types include **General Motion, Signal Lost, and Digital Input Triggered**.

Step 2: Select the camera channel you wish to view or select **All** for all available channels.

Step 3: View the events that happened on a particular date or during a given time period by selecting a search period.

For a particular data: Check the "Date" box and select the date you want to view.

For a period: Check the "Date&Time" box and then enter the date and time.

Step 4: Click **Search**.

Export

After you search the log you want, you can export it to an Excel (.xls) or a text (.txt) file.

	A	B	C	D	E
1	Event/Time	Event/Type	Description		
2	2007/09/12 00:45:41	Main Console Startup			
3	2007/09/12 00:45:44	User Login	admin		
4	2007/09/12 01:11:10	Main Console Shutdown			
5	2007/09/12 01:27:04	Main Console Startup			
6	2007/09/12 01:27:05	User Login	admin		
7	2007/09/12 01:28:27	Main Console Shutdown			
8	2007/09/12 15:06:51	Main Console Startup			
9	2007/09/12 15:06:52	User Login	admin		
10	2007/09/12 15:07:04	Main Console Shutdown			
11	2007/09/12 15:08:28	Main Console Startup			
12	2007/09/12 15:08:40	Main Console Shutdown			
13	2007/09/12 15:08:54	Main Console Startup			
14	2007/09/12 15:09:01	Main Console Shutdown			
15	2007/09/12 15:14:11	Main Console Startup			
16	2007/09/12 15:14:12	Main Console Shutdown			
17	2007/09/12 15:14:31	Main Console Startup			
18	2007/09/12 15:15:20	Main Console Shutdown			
19	2007/09/12 19:44:15	Main Console Startup			
20	2007/09/12 19:44:58	Main Console Shutdown			
21	2007/09/12 22:51:57	Main Console Startup			
22	2007/09/12 22:51:59	Main Console Shutdown			
23	2007/09/12 22:52:14	Main Console Startup			
24	2007/09/12 22:52:18	User Login	admin		
25	2007/09/12 22:52:24	Main Console Shutdown			
26	2007/09/12 22:53:19	Main Console Startup			

.xls

```
2007/09/12 00:45:41, Main Console Startup,
2007/09/12 00:45:44, User Login, admin
2007/09/12 01:11:10, Main Console Shutdown,
2007/09/12 01:27:04, Main Console Startup,
2007/09/12 01:27:05, User Login, admin
2007/09/12 01:28:27, Main Console Shutdown,
2007/09/12 15:06:51, Main Console Startup,
2007/09/12 15:06:52, User Login, admin
2007/09/12 15:07:04, Main Console Shutdown,
2007/09/12 15:08:28, Main Console Startup,
2007/09/12 15:08:40, Main Console Shutdown,
2007/09/12 15:08:54, Main Console Startup,
2007/09/12 15:09:01, Main Console Shutdown,
2007/09/12 15:14:11, Main Console Startup,
2007/09/12 15:14:12, Main Console Shutdown,
2007/09/12 15:14:31, Main Console Startup,
2007/09/12 15:15:20, Main Console Shutdown,
2007/09/12 19:44:15, Main Console Startup,
2007/09/12 19:44:58, Main Console Shutdown,
2007/09/12 22:51:57, Main Console Startup,
2007/09/12 22:51:59, Main Console Shutdown,
2007/09/12 22:52:14, Main Console Startup,
2007/09/12 22:52:18, User Login, admin
2007/09/12 22:52:24, Main Console Shutdown,
2007/09/12 22:53:19, Main Console Startup,
```

.txt

Step 1: Click the **Export To** button.

Step 2: Type the file name and select the file format (.xls or .txt).

Counting Application

Display the history of the counting application over a given time period.

Step 1: Select the channel you want to check or select All from the drop-down menu for all channels.

Step 2: Select search period. View the events that happened on a particular date or during a given time period by selecting search period.

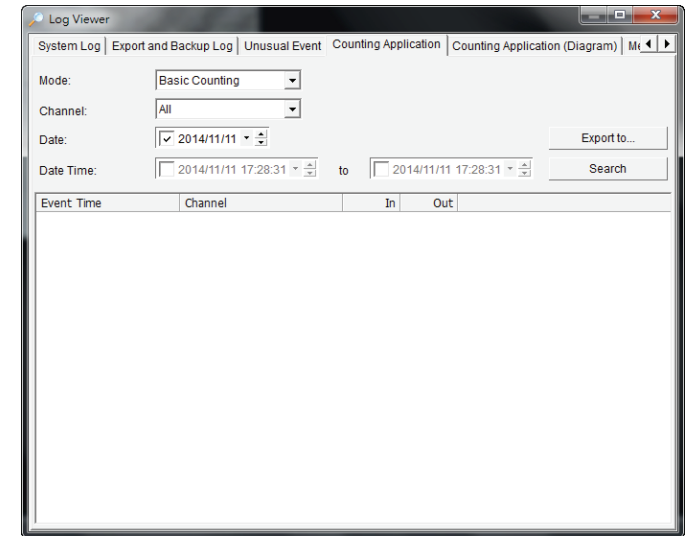
For a particular data: Check the **Date** box and select the date you want to view.

For a period: Check the **Date&Time** box and then enter the date and time.

Step 3: Click Search.

Step 4: Press the button Export to.

Step 5: Type the file name and choose the file format (.xls or .txt).



Counting Application (Diagram)

Display the Counting Application data in diagram format.

Step 1: Select the channel you want to check or select **All** from the drop-down menu for all channels.

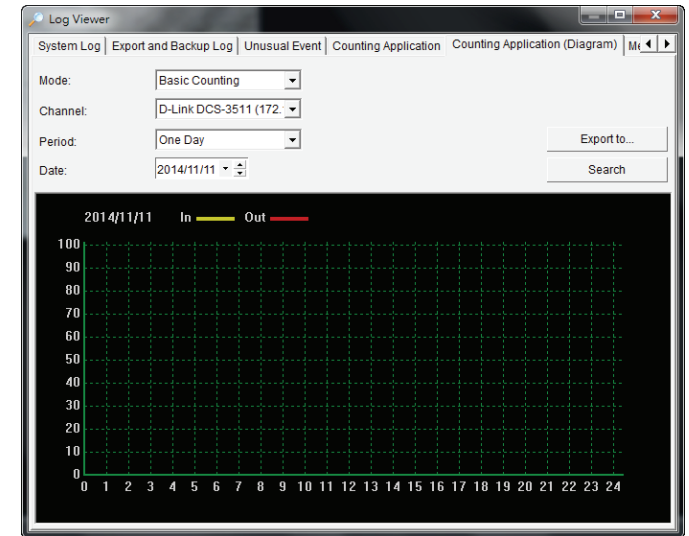
Step 2: From the drop-down menu, set up how you would like the diagram to be displayed. You have the options of one day, one month, or one year.

Step 3: Select a specific date to make it the start point of the diagram.

Step 4: Click **Search**.

Step 5: Press the button **Export to**.

Step 6: Type the file name and a .BMP file will be saved.



Metadata Log

View the Metadata log history detected by the Smart Guard System.

Step 1: Choose the type of events you wish to view or select **All** from the drop-down menu to view all types of events. The types of Unusual Events include **Transaction Start, Transaction End, Open Cash Register, Connection Lost,** and **Special User Defined** event.

Step 2: Choose the camera channel you wish to view or select **All** for all the channels available.

Step 3: View the events that happened on a particular date or during a given time period by selecting search period.

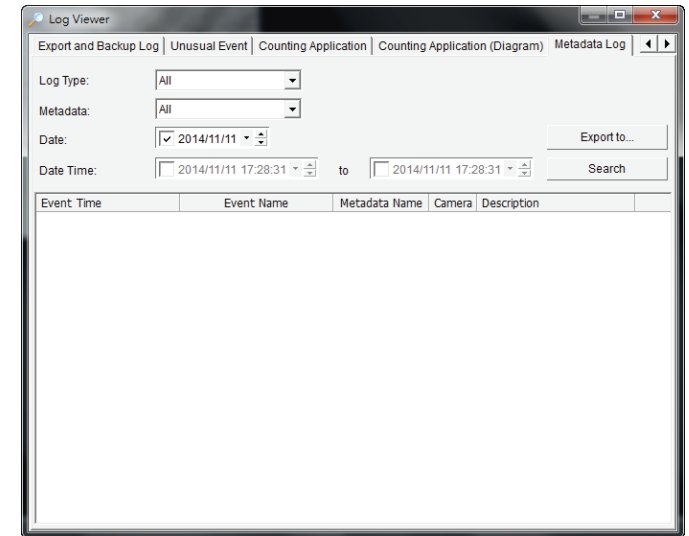
For a particular data: Check the **Date** box and select the date you want to view.

For a period: Check the **Date&Time** box and then enter the date and time.


Step 4: Click Search. A link () will appear next to each event time where video is available. By clicking on the link, an instant playback window will pop up to show recorded video

Step 5: Press the button **Export to**.

Step 6: Type the file name and choose the file format (.xls or .txt).



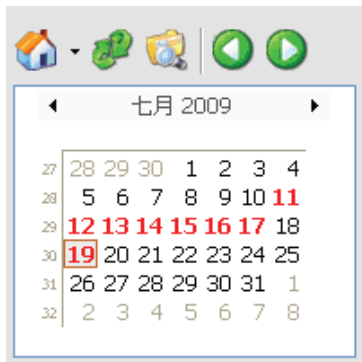
Setting

Go to **Playback** console and click  to open this window.

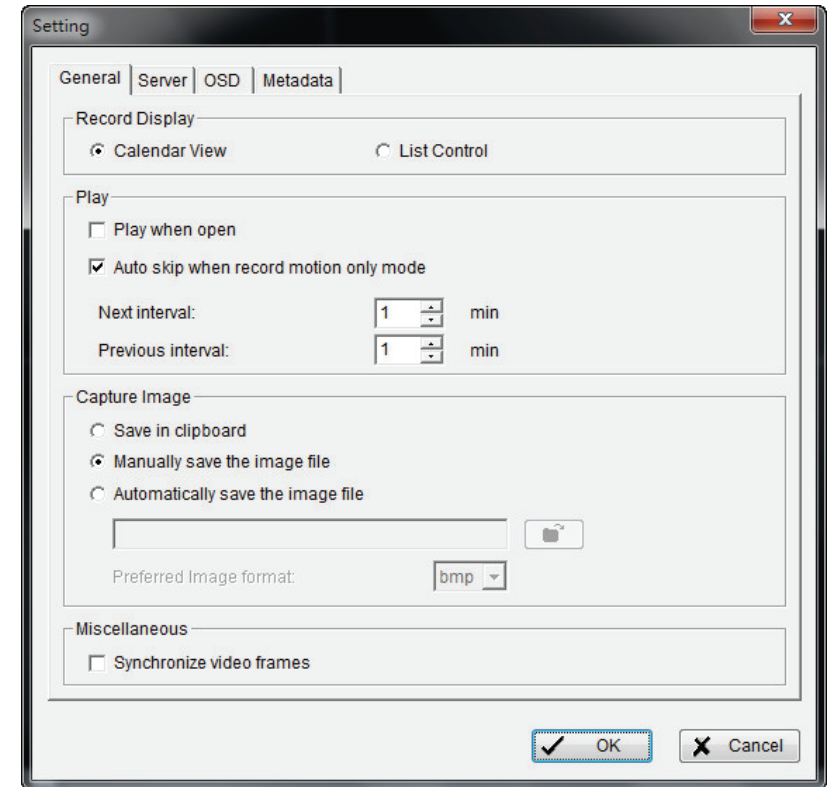
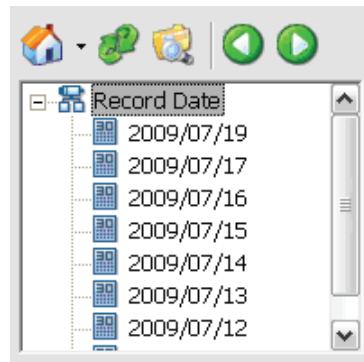
General

Record Display

Calendar View



List Control



Play

- **Play when open:** Select this option to start playing the video clip every time a record is withdrawn.
- **Auto skip when record motion only mode:** Select to set up the system to automatically skip to the points where motions were recorded.
- **Next interval:** Set the interval and click **Next** on the playback console to fast forward the video.
- **Previous interval:** Set the interval and click **Previous** on the playback console to rewind the video.

Capture Image

- **Save in clipboard:** The image will be saved in the clipboard and can be pasted to other applications.
- **Manually save the image file:** Select to manually save the image, and the format of the image.
- **Automatically save the image file:** By pre-setting the URL and the image format, the system will automatically save the image accordingly, when you click **Save** in the control panel.

Miscellaneous

- **Synchronize video frames:** Select to prevent tearing that may occur in the video display. However this will increase the CPU processing load.

Remote Server

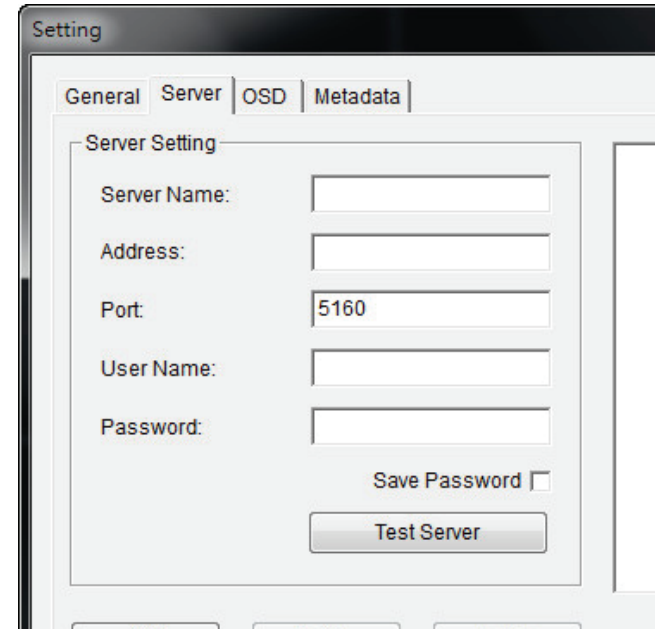
Add Remote Playback Site

Click the **Remote Server** icon to add and set up a remote playback site.


Step 1: Enter the IP address or DNS, Port, Username, and Password.

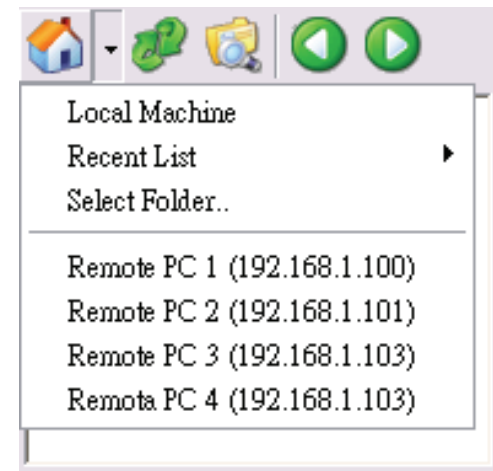
Step 2: Click **Add** to add the server.

Step 3: Click **OK** to exit.



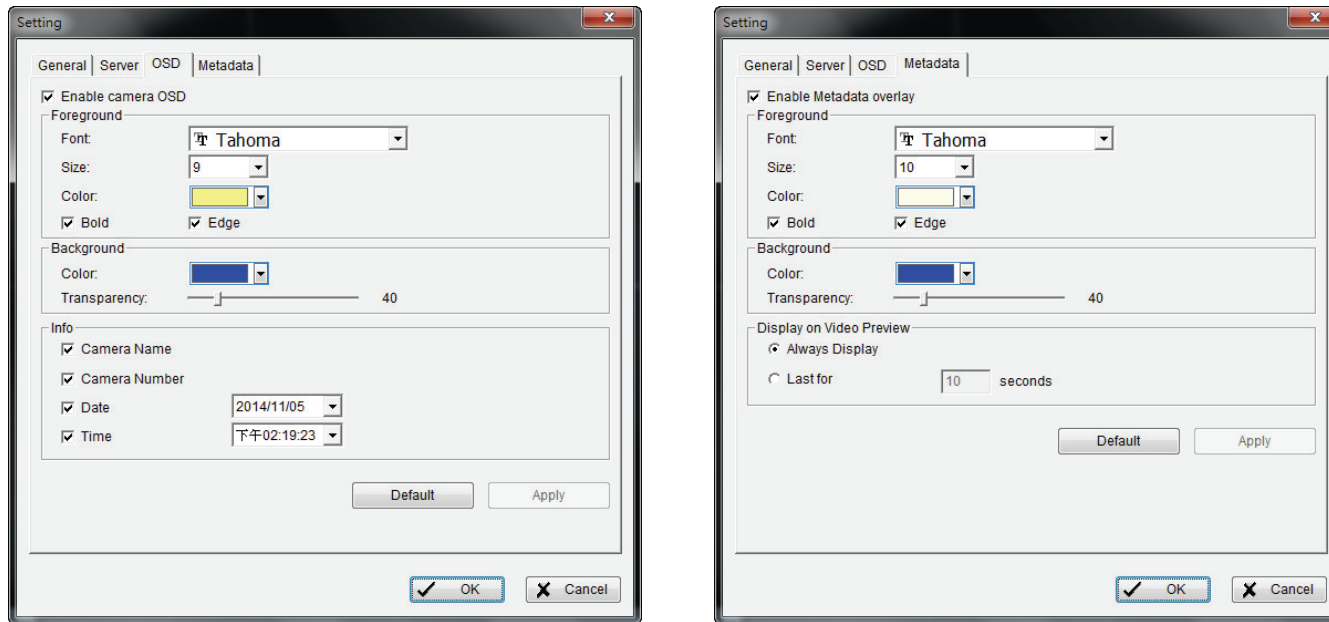
Access Remote Playback Site

Go to the Date Time Panel and click the  icon on the top of the display window to access the Remote Playback Site.



OSD

Select **Enable Camera OSD** to display video information of the recording video. Information includes camera name, camera number, date and time. Users can also set the font, size, and font color.



On Screen Menu

Toggle Fullscreen: Select to view cameras under full screen. Press "Esc" or right click to go back to original view.

Enable ImmerVision PTZ: Adjust PTZ in PTZ mode. (Depending on the device)

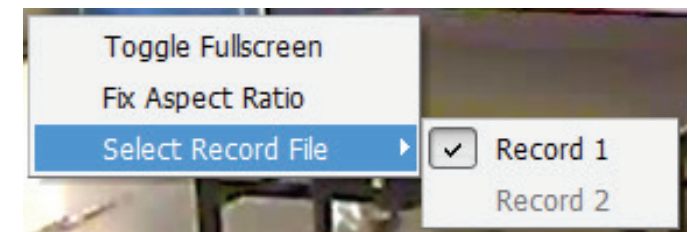
Enable Fisheye PTZ: Adjust PTZ in PTZ mode.

ImmerVision Lens Setting: Select either original, PTZ mode, Quad mode, or Perimeter mode. (Depending on the device)

Fisheye Lens Setting: Select either original, PTZ mode, Quad mode, or Perimeter mode.

Switch Recordings

When using dual recording support, users can designate the file destination by either selecting **Record 1** or **Record 2**.

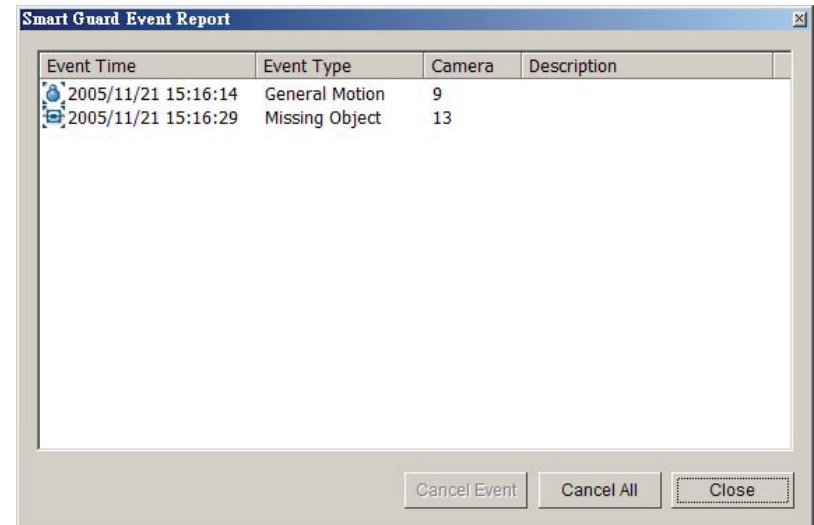
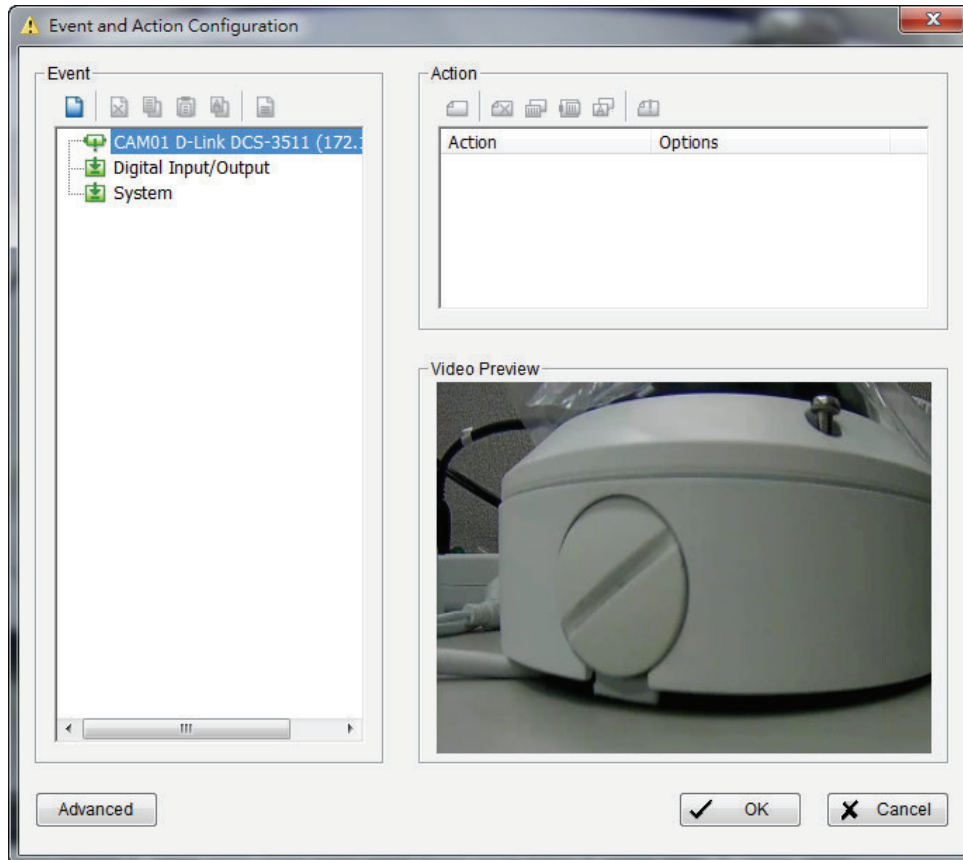


Smart Guard System

Click the **Configure Smart Guard System** icon  to open the **Event and Action Configuration** window.

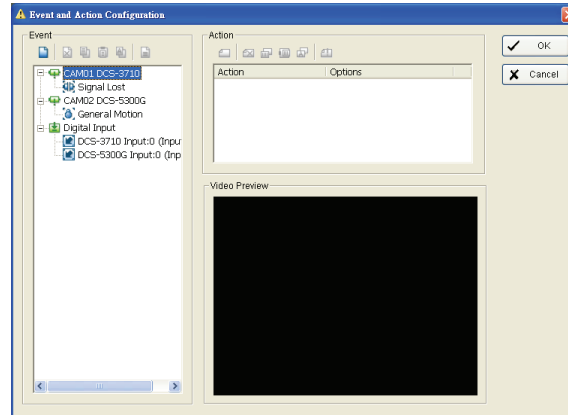
Select an event to be detected and then define an **Action** for the D-ViewCam Plus system to perform.

Note: To access the **Smart Guard Event Report**, click **Start Monitor > Open Event Report** in the Main Console.



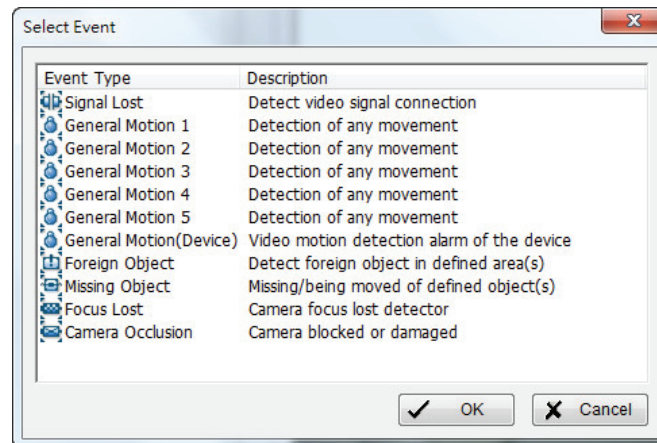
Event

There are 3 sources of events: **Camera** (video image), **Digital Input** (connected to your camera(s)) and **System** (condition of your hardware). You can assign multiple events by following the instructions below.



Assign a Camera Event

Step 1: Select a channel from the camera list and click **Insert Event** .



Step 2: There are three types of events: **Signal Lost**, **General Motion**, and **General Motion (Device)**. Select the event you want in the **Event Type** list and click **OK**.

Step 3: To configure the **Event Type** settings, refer to the next section.

Alarm Event Configuration

This section describes the basic setting of **Signal Lost** and **General Motion** events.

Signal Lost

Enable Event: Select to activate the event.

Life Cycle

- **Automatically cancel event when event disappears:** The alarm/action will be cancelled once the event is fixed or ends.
- **Manually cancel event or event last triggered:** The alarm/action will continue to be active until canceled. To cancel the event, click **Start > Open Event Report > Cancel All Events**.
- **Cancel event after timeout of xx seconds:** Enter the timeout length after which to cancel the event.
- **Always activated:** Allow the alarm to be activate at all times.
- **As Day Mode Schedule:** Customize a specific time range for the alarm to be activate.

Click **Day Schedule** to configure the schedule for this setting.

Choose **Add Time Period** and drag on the selected timeframe to define a schedule.

Choose **Remove Time Period** and drag on the selected timeframe to subtract from existing schedules.

Click **Clear All** to remove all settings.

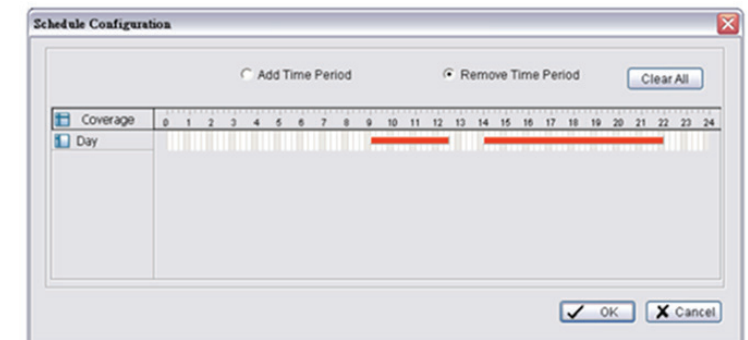
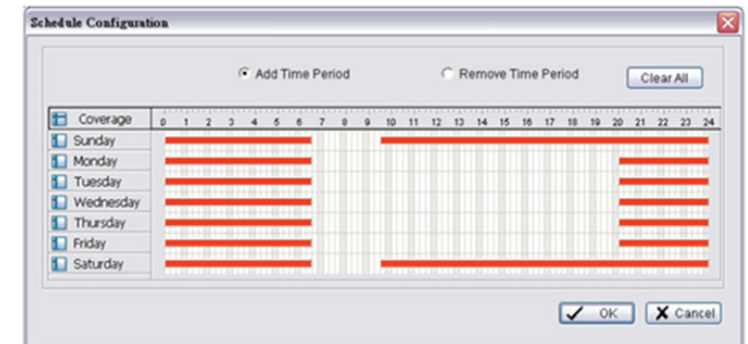
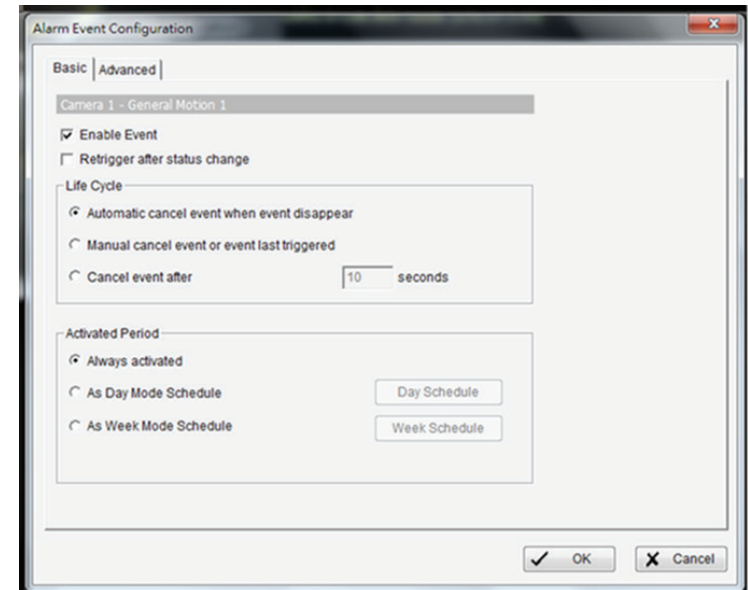
- **As Week Mode Schedule:** Customize a weekly based time range for the alarm to be activate.

Click **Week Schedule** to configure the schedule for this setting.

Choose **Add Time Period** and drag on the selected timeframe to define an activate schedule.

Choose **Remove Time Period** and drag on the selected timeframe to subtract from existing schedules.

Click **Clear All** to remove all settings.



General Motion

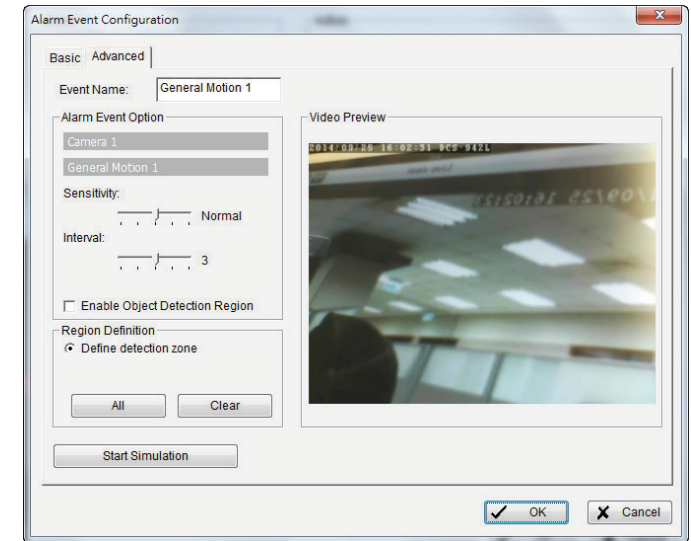
Alarm Event Option

- **Sensitivity:** Click and move the slider control to the right to increase the motion detection alarm sensitivity. Move the bar to the left to reduce the alarm sensitivity. Setting up an appropriate sensitivity value will reduce the chances of a false alarm. For example, you can lower the sensitivity to avoid the alarm being triggered by a tree swinging in the breeze.
- **Interval:** Click and move the slider control to the right to increase the interval time so that the alarm will only be triggered when the movement lasts over a certain period of time. Move the slider to the left to reduce the interval time.

Region Definition

- **Define detection zone:** To detect **General Motion**, you have to define a detection zone. Left-click and drag the mouse to draw a detection zone. You may define more than one zone on the screen by repeating the same process. You can also click **All** to select the entire detection zone.

Click **Start Simulation** and test the function on the preview window.



Camera Event - General Motion (Device)

Detect movement with the devices' motion detectors (IP cameras or video servers).

Note: This function is only available on network camera with built-in motion detection.

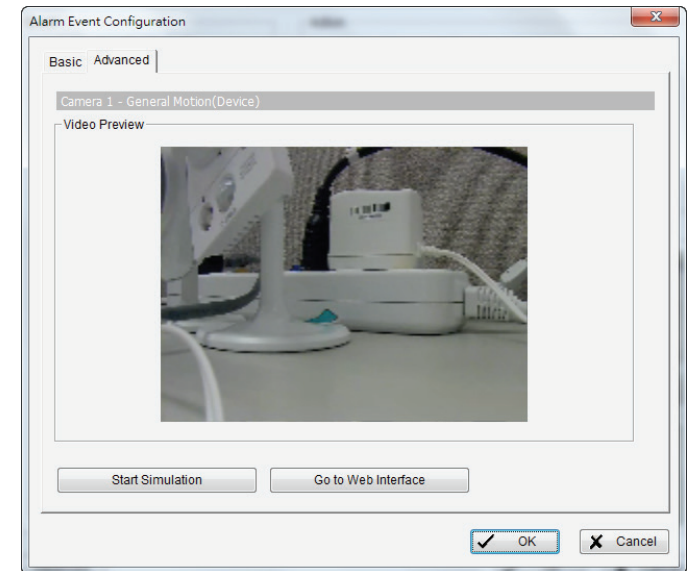
Please refer to the user manual of your network camera to set up motion detection.

Start Simulation

Click to test if motion detection is set up correctly.

Go to Web Interface

Click to go directly to device web page for General Settings.



Camera Event - Foreign Object

Alarm will be triggered when an object appears in the defined area on the screen.

Alarm Event Option

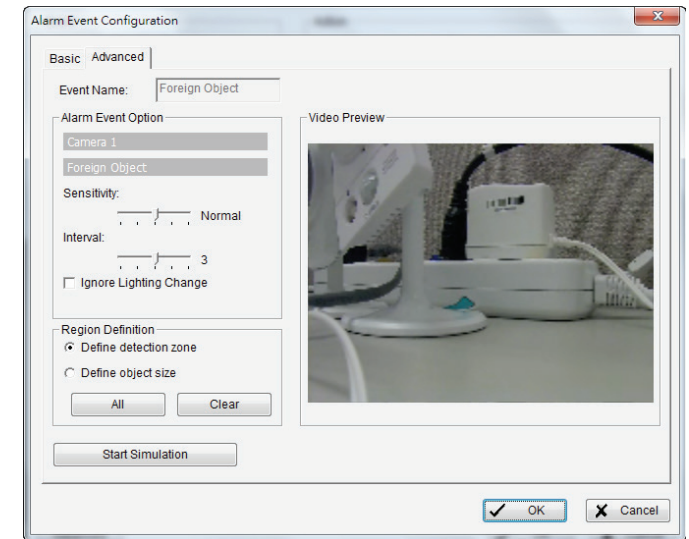
- **Sensitivity:** Click and move the slider control to the right to increase sensitivity so that a relatively small movement will trigger the alarm. Move the bar to the left to reduce sensitivity of motion detection. Setting up an appropriate sensitivity value will reduce the chances of a false alarm. For example, you can lower the sensitivity to avoid the alarm being triggered by a tree swinging in the breeze.
- **Interval:** Click and move the slider control to the right to increase the interval time so that the alarm will only be triggered when the movement lasts over a certain period of time. Move the slider to the left to reduce the interval time.

Region Definition

- **Define detection zone:** To detect a **Foreign Object**, you have to define a detection zone. Left-click and drag the mouse to draw a detection zone. You may define more than one zone on the screen by repeating the same process. You can also click **All** to select the entire screen as a detection zone.
- **Define Object size:** After defining the detection zone, select **Define Object Size** and then left-click and drag the mouse to indicate the size of the object you want to detect.

Note: For instance, if you want to prevent somebody from leaving a briefcase in a hallway, place a briefcase in the hallway in view of the camera. On the screen, draw an area that fits the size of the briefcase and define it as the object size. Remove the briefcase and then activate the Smart Guard function on the main console. The system will consider everything on the screen as normal when you click **Start** to activate the monitor function.

Click **Start Simulation** and test the function on the preview window.



Camera Event - Missing Object

Alarm triggers when an object disappears in the defined area on the screen.

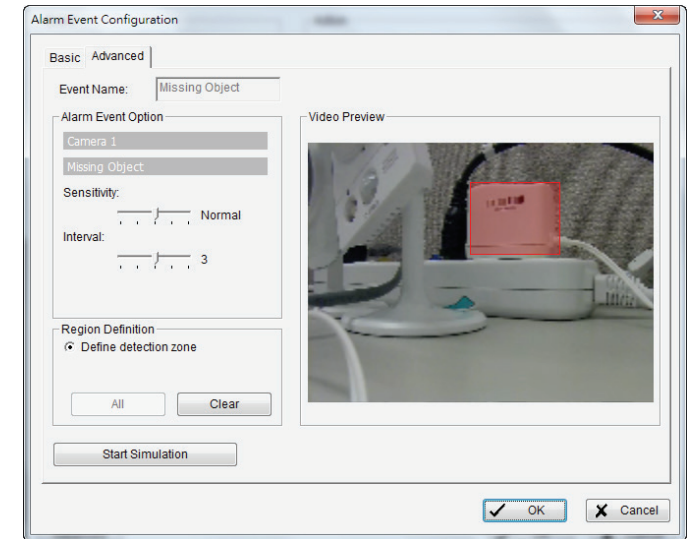
Alarm Event Option

- **Sensitivity:** Click and move the slider control to the right to increase sensitivity so that a relatively small movement will trigger the alarm. Move the bar to the left to reduce sensitivity of motion detection. Setting up an appropriate sensitivity value will reduce the chances of a false alarm. For example, you can lower the sensitivity to avoid the alarm being triggered by a tree swinging in the breeze.
- **Interval:** Click and move the slider control to the right to increase the interval time so that the alarm will only be triggered when the movement lasts over a certain period of time. Move the slider to the left to reduce the interval time.

Region Definition

- **Define detection zone:** To detect a **Missing Object**, you have to define a detection zone. Left-click and drag the mouse to draw a detection zone. You may define more than one zone on the screen by repeating the same process. You can also click **All** to select the entire screen as the detection zone.

Click **Start Simulation** and test the function on the preview window.



Camera Event - Focus Lost

This function informs you when a camera is losing focus and has a blurry image.

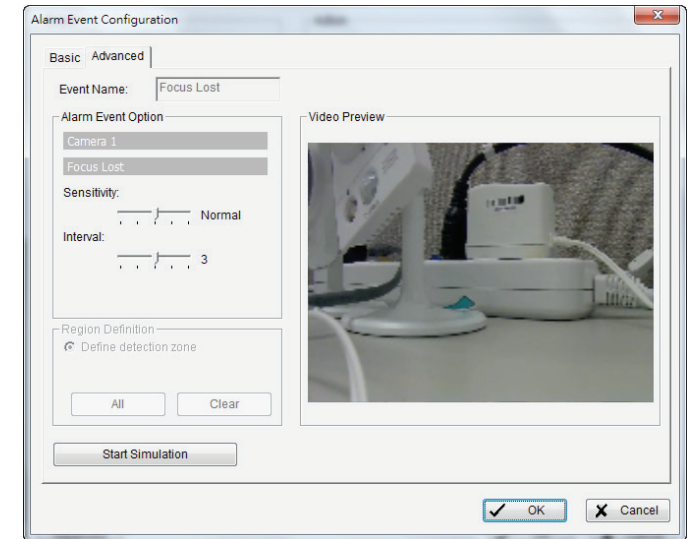
Alarm Event Option

- **Sensitivity:** Click and move the slider control to the right to increase sensitivity so that a relatively small movement will trigger the alarm. Move the bar to the left to reduce sensitivity of motion detection. Setting up an appropriate sensitivity value will reduce the chances of a false alarm. For example, you can lower the sensitivity to avoid the alarm being triggered by a tree swinging in the breeze.
- **Interval:** Click and move the slider control to the right to increase the interval time so that the alarm will only be triggered when the movement lasts over a certain period of time. Move the slider to the left to reduce the interval time.
- **Ignore Lighting:** Check the box to avoid alarm being set off by the light changing.

Region Definition

- **Define detection zone:** To detect **Focus Lost**, you have to define a detection zone. Left-click and drag the mouse to draw a detection zone. You may define more than one zone on the screen by repeating the same process. You can also click **All** to select the screen as the entire detection zone.

Click **Start Simulation** and test the function on the preview window.



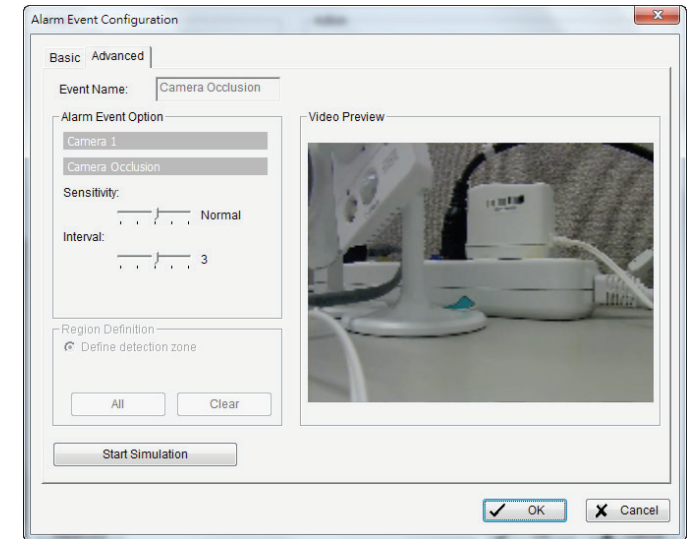
Camera Event - Camera Occlusion

This function alarms you when any of the cameras are blocked.


Alarm Event Option

- **Sensitivity:** Click and move the slider control to the right to increase sensitivity so that a relatively small movement will trigger the alarm. Move the bar to the left to reduce sensitivity of motion detection. Setting up an appropriate sensitivity value will reduce the chances of a false alarm. For example, you can lower the sensitivity to avoid the alarm being triggered by a tree swinging in the breeze.
- **Interval:** Click and move the slider control to the right to increase the interval time so that the alarm will only be triggered when the movement lasts over a certain period of time. Move the slider to the left to reduce the interval time.
- **Ignore Lighting:** Check the box to avoid alarm being set off by the light changing.

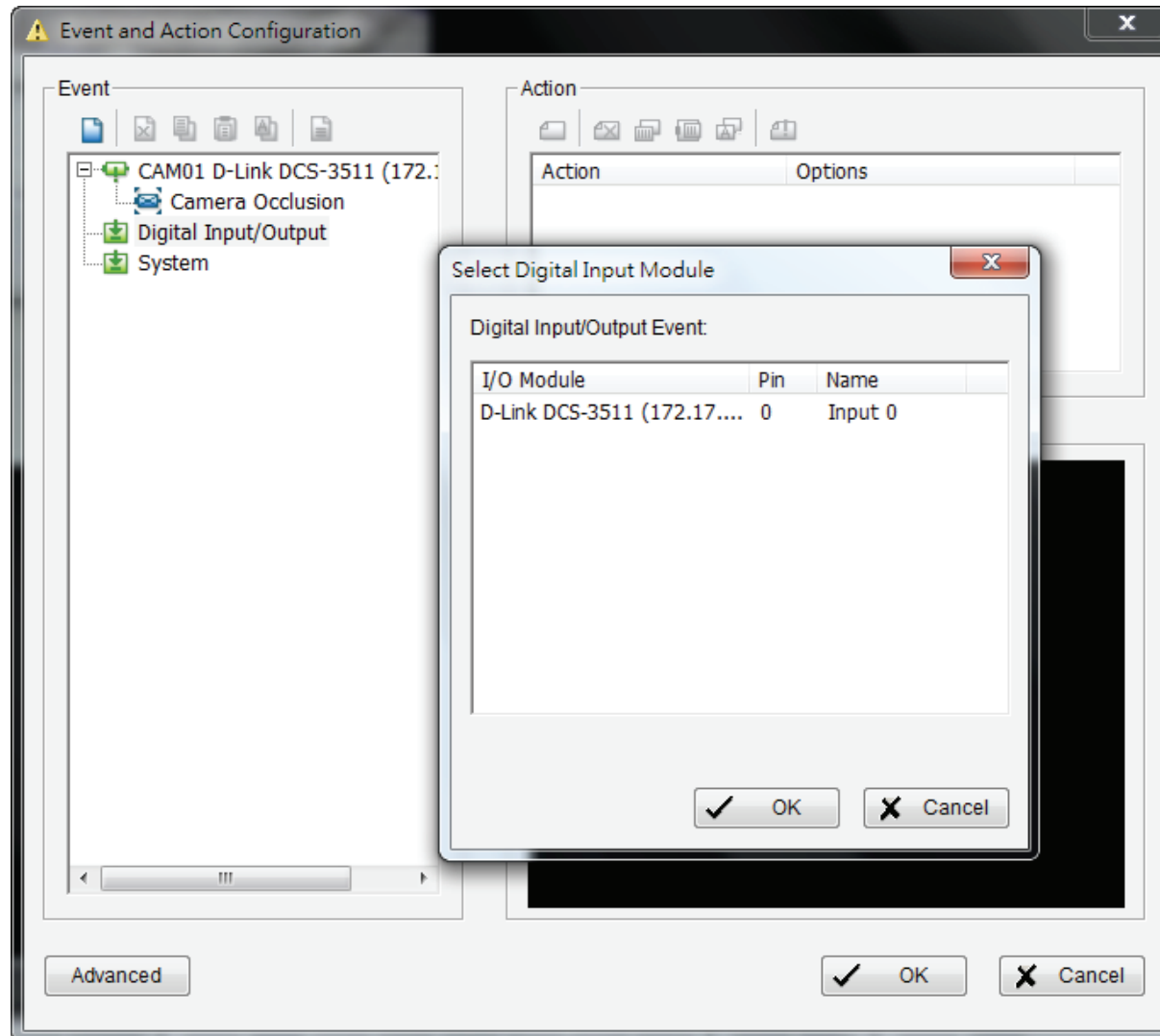
Click **Start Simulation** and test the function on the preview window.



Camera Event - Digital Input

Step 1: Select to highlight **Digital Input** on the event type list and then click  **Insert Event**.

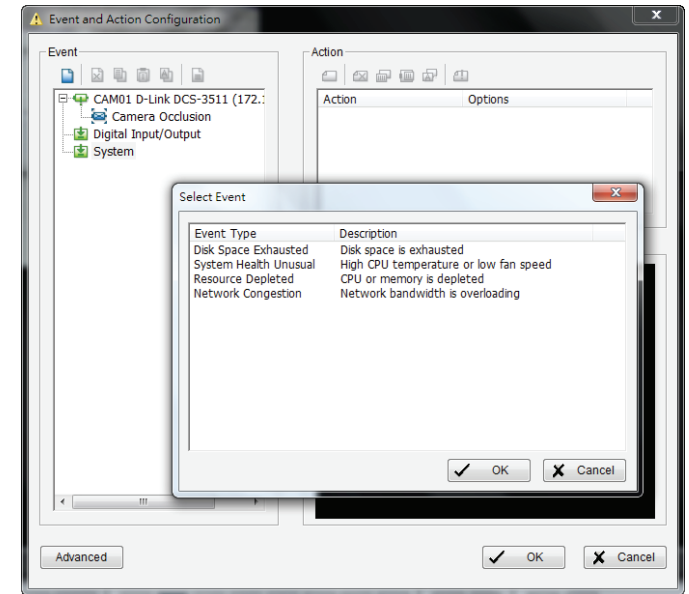
Step 2: Select the device that is connected to your camera(s).



System Event - Assign a System Event

Step 1: Click and highlight **System** on the event type list and then click  **Insert Event**.

Step 2: There are four events, select the event you want to detect.



System Event - Disk Space Exhausted

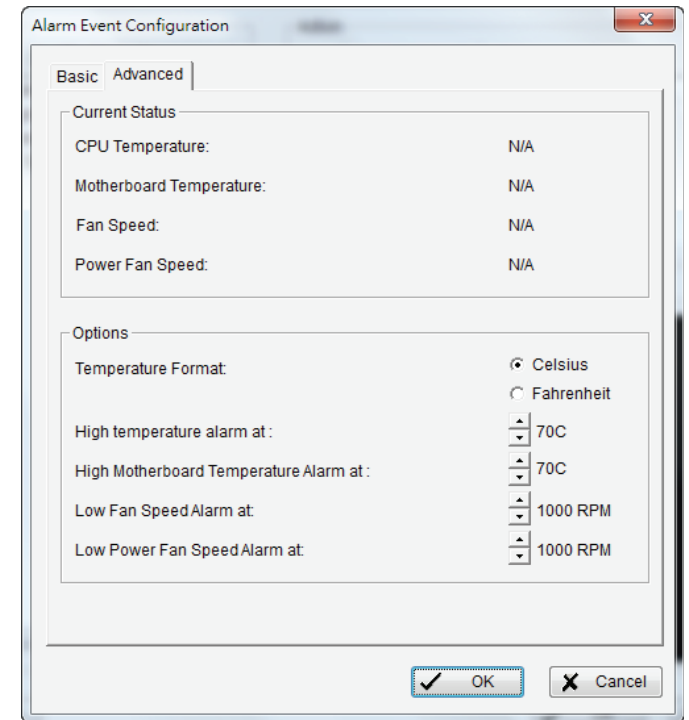
This function notifies you when disk space is exhausted.

System Event - System Health Unusual

This function notifies you when the CPU is over-heating or the fan speeds are low.

Current Status: Displays current CPU temperature, motherboard temperature, and fan speed.

Options: Select either Celsius or Fahrenheit. Set the maximum motherboard temperature alarm value and the minimum RPM alarm value for the cooling fan.

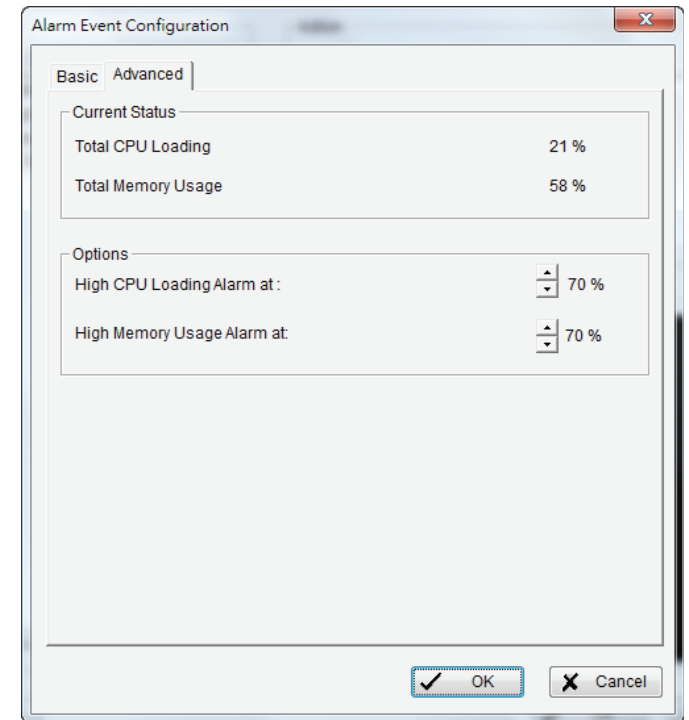


System Event - Resource Depleted

This function notifies you when either CPU or memory are depleted.

Current Status: Shows you the current Total CPU Loading and Total Memory Usage.

Options: Set the maximum percentage for the the CPU loading alarm and memory usage alarm.

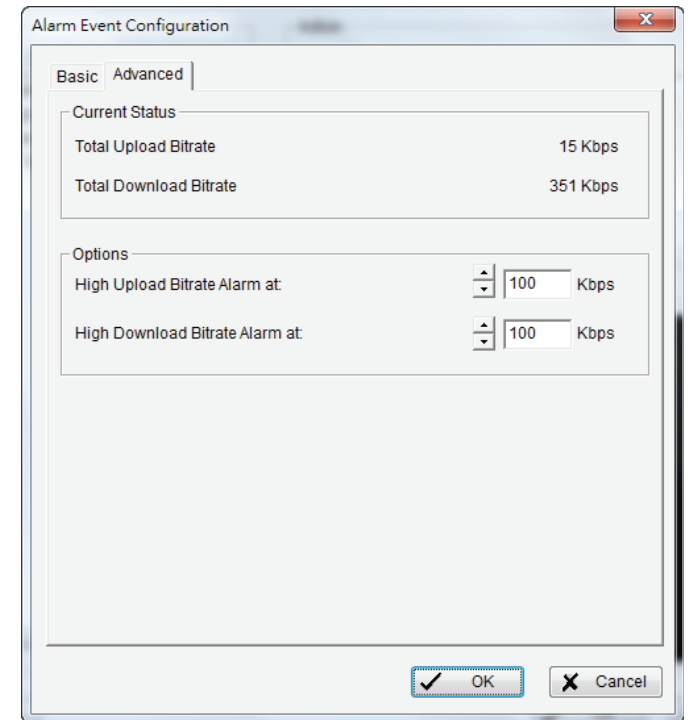


System Event - Network Congestion

This function notifies you when network bandwidth is overloaded.

Current Status: Shows you the current Total Upload/Download bit rates.


Options: Fix maximum bit rate (Kbps) for High Upload/Download Bit rate Alarms.



Action

Assign an Action Type

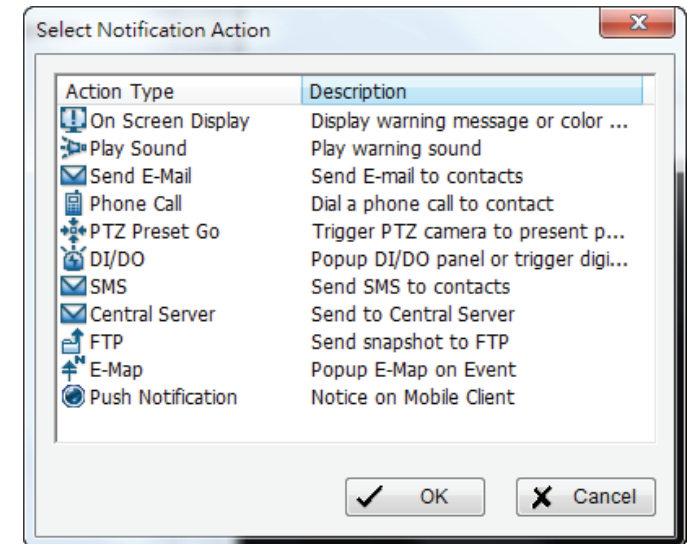
Insert Action: Select actions that responds to an unusual event.

Step 1: Select an event and click  **Insert Action**.

Step 2: Select one of the 11 actions and then click **OK**.

1. On Screen Display
2. Play Sound
3. Send E-mail
4. Phone Call
5. PTZ Preset Go
6. DI/DO
7. Send a SMS Message
8. Send to Central Server
9. Send snapshot to FTP
10. Popup E-Map on event.
11. Push Notification

Step 3: Configure the **Action Type** if required.



Action Type > On Screen Display

A red warning will be flashing on the screen of Main console, indicating which type of unusual event is detected.

Step 1: Select the “On Screen display” action and then click **OK**.

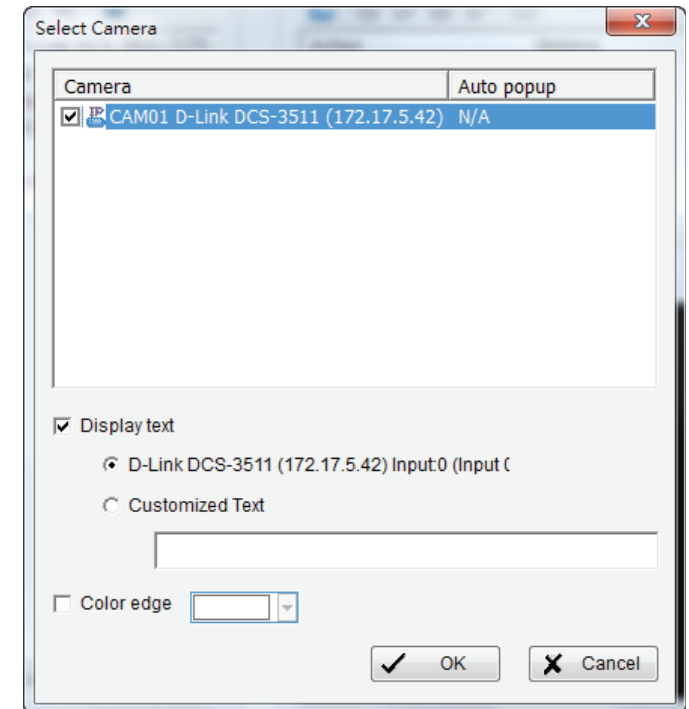
Step 2: The responding window will pop-up to Selected Camera. Click the “On Screen display” indicator to modify the setting.

Camera: Display the camera applied to this action.

Auto popup: Click the Auto popup column and select the expected monitor for popping up the event.

Displayed text: You can follow the default setting to show the event type, or enable “Customized Text” to define the text as your preference.

Color edge: Select the color edge for popping up the event

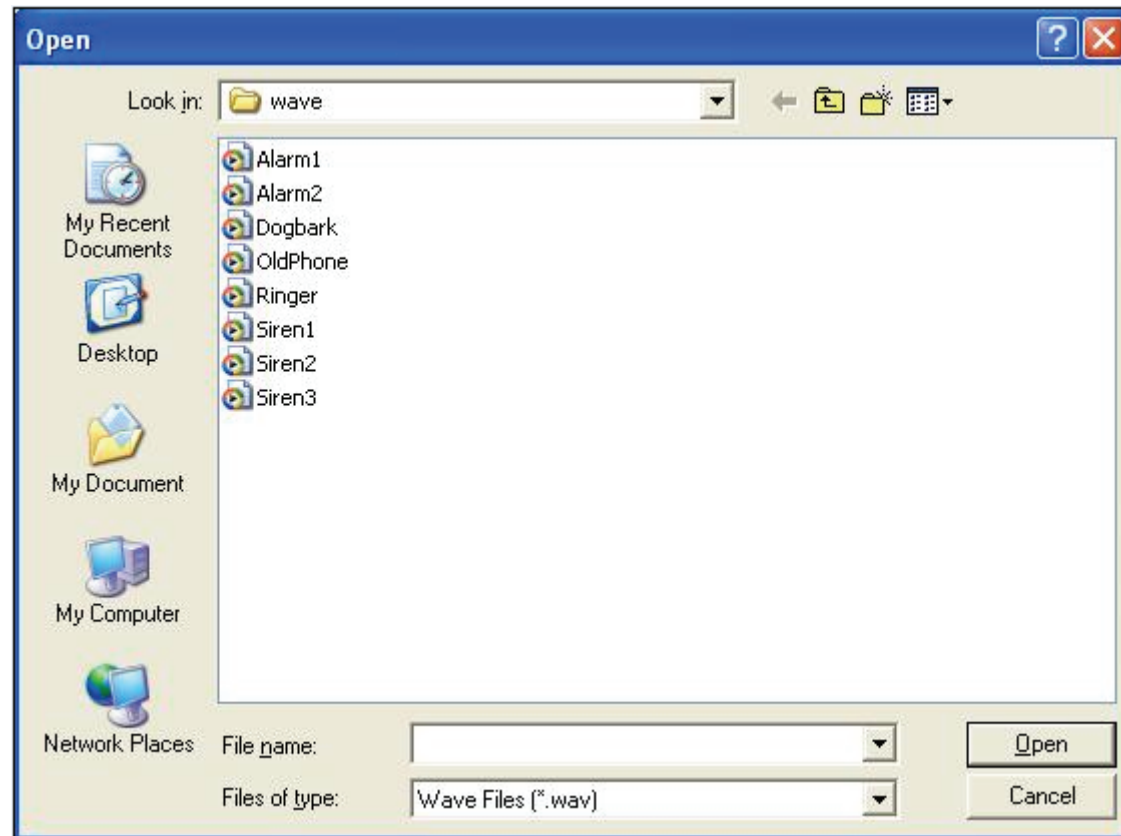


Action Type > Play Sound

The system will play an audio .wav file when an unusual event is detected.

Step 1: Select the **Play Sound** action and then click **OK**.

Step 2: Select a wave file (.wav) and then click **Play Sound** to modify the setting.

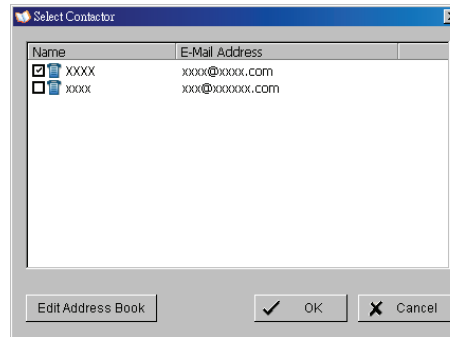


Action Type > Send E-mail

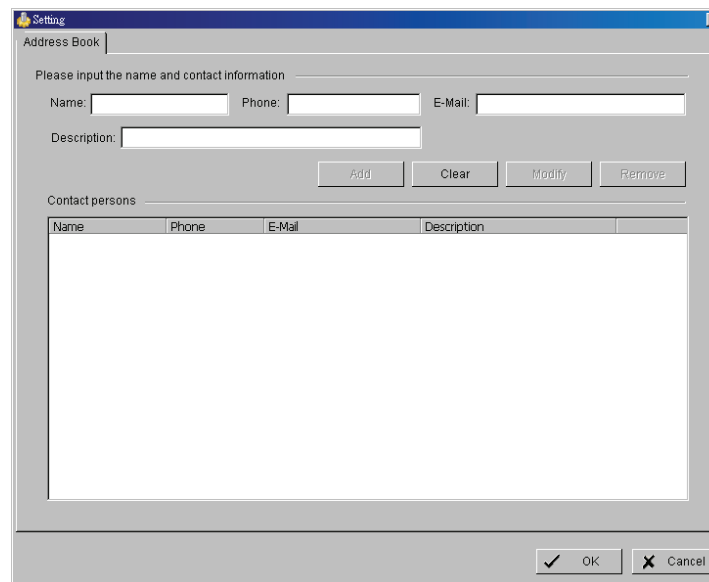
When an event is triggered, the system immediately emails the specified recipients. The email contains the type of event, the time it occurred, and a picture of the event.

Step 1: Select the **Send E-mail** action and then click **OK**.

Step 2: From the **Select Contactor** window select the email address(es) you want to send alerts to.



Click **Edit Address Book** to add, delete, or edit contacts.



Action Type > Phone Call

The system will call a given phone number when an unusual event is detected.

Step 1: Select the **Phone Call** action and then click **OK**.

Step 2: The responding window will popup to Select Contactor and key-in the message which want to append on SMS content. (You can choose one more contact at once).

Note: To setup the phone number and make an audio record for the phone call, go to **General Setting > Setup > Hotline**.

Action Type > PTZ Preset Go

Use this to trigger the PTZ (pan/tilt/zoom) camera(s)

Step 1: Select the **PTZ Preset Go** action and then click **OK**.

Step 2: In the **PTZ Preset Go** window, select the PTZ camera that is connected to your system. Then set the start and end preset points, and select the life cycle for the event. Click **Add** when you are done to add the preset to the table below. You may repeat this step to add another preset.

Step 3: When you are finished adding your presets, click **OK**.

PTZ Camera Preset Go

Camera: CAM02 (D-Link DCS-52) IP Camera

Start

Preset Patrol

Life Cycle

Stop PTZ action when event disappear Keep PTZ action 10 second

End

Preset Patrol

The end preset go will take 10 second

Add Clear Update Delete

Camera	Start	Life Cycle	End	End Preset Go

OK Cancel


Action Type > DI/DO

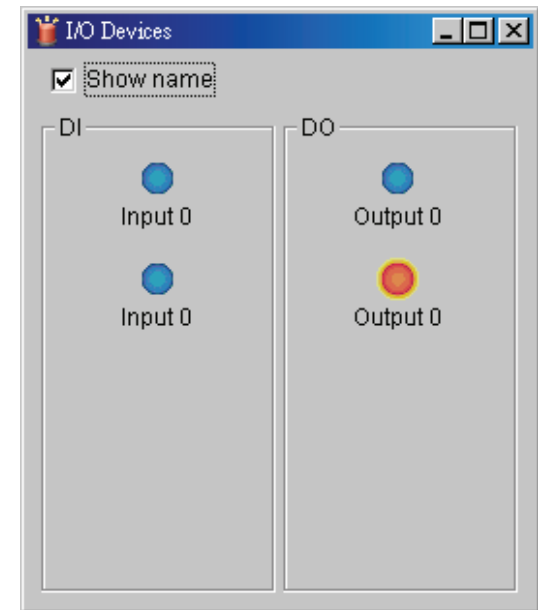
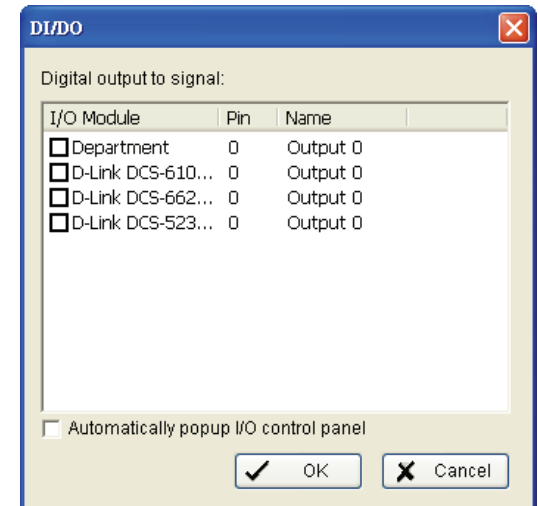
Use this to trigger the Digital Input/Output devices that are connected to the camera(s), such as alarm lights or sirens.

Step 1: Select the **DI/DO** action and then click **OK**.

Step 2: Select **Digital Input Module** and then click the **DI/DO** indicator to modify the setting.

Step 3: Select the device that is connected to your system. Enable **Automatically popup I/O control panel** to monitor the I/O status.

You must adjust the setting of I/O device in **General Setting > Setting > I/O Device** first and the I/O control will display the device status based on this setting. You can also adjust the size of the window by clicking  on the display window.



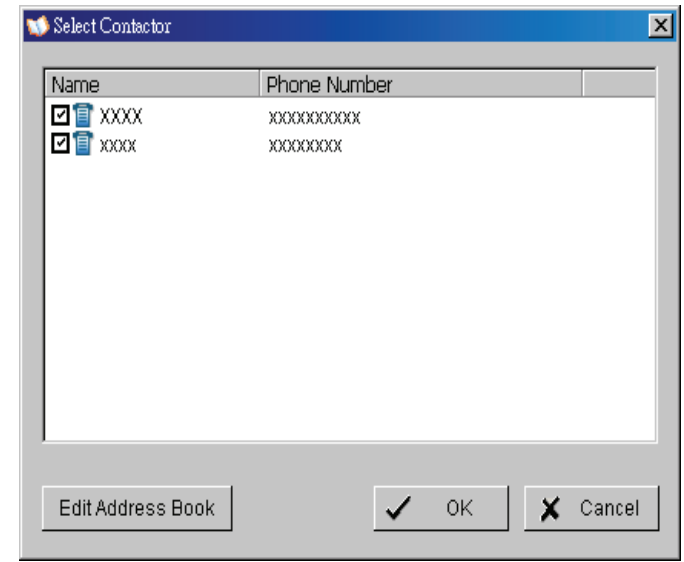
Action Type > Send a SMS

The system will immediately send an SMS to the user indicating the type of event, and the time.

Step 1: Select the **Send a SMS message** action and then click **OK**.

Step 2: The **Select Contactor** window will display. Here you can choose one or more contacts at once.

Edit Address Book: Click to enter the contact information. This is similar to the **Send E-mail** and **Phone Call** action.



Action Type > Send to Central Server

This action will send an event and snapshot to the Central Management Server (separate software package, not included).

Step 1: Select the **“Send to Central Server”** action and then click **OK**.

Action Type > Send snapshots to FTP

The system will upload a snapshot immediately to FTP site.

Step 1: Select the “**Send snapshot to FTP**” action and then click **OK**.

Step 2: General Setting options.

Life Cycle: General Setting the system to stop sending snapshots after ___ seconds, or when the event is terminated.

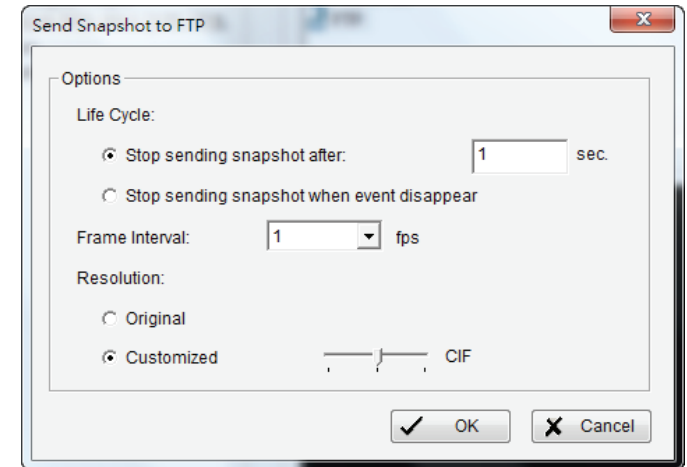
Frame Interval: Define the frequency of snapshots.

- Minimum is 1/60 fps (1 snapshot per 60 seconds)
- Maximum is 30fps (30 snapshots per second).

Resolution: Choose to keep snapshot in original resolution or compress to lower resolution.

Note:

1. For Digital Input Events, this warning action will send the snapshot of the associated camera.
2. To define an FTP server, go to **General Setting > Setup > Hotline**.



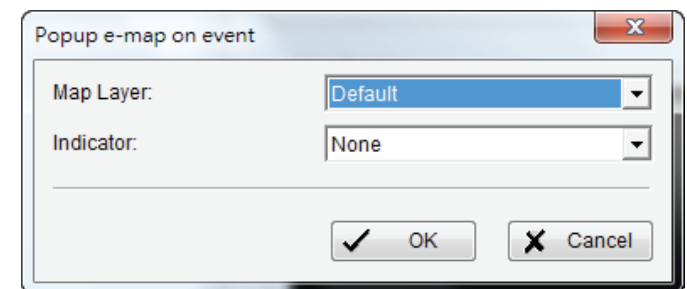
Action Type > Popup E-Map on Event

The system will auto popup E-Map window and show the assigned map and indicator.

Step 1: Select the “**Popup E-Map on Event**” action and then click **OK**.

Step 2: The responding window will pop-up to Popup e-map on event. Click the “**Popup E-Map on Event**” indicator to modify the setting.

Step 3: Select the **Map Layer** and **Indicator**, and then click **OK**.



Action Type > Push Notification

The system will send instant message to registered D-ViewCam mobile APP as a notification.

Step 1: Select the “**Notice on Mobile Client**” action and then click **OK**.

Step 2: General Setting options.

Frequency—Rearm interval: the minimum interval of notifications as the event occurs. (default:10, max:300)

User List: All user accounts in this unit. Click “**select all**” to select all user accounts; click “**deselect all**” to remove all user accounts.

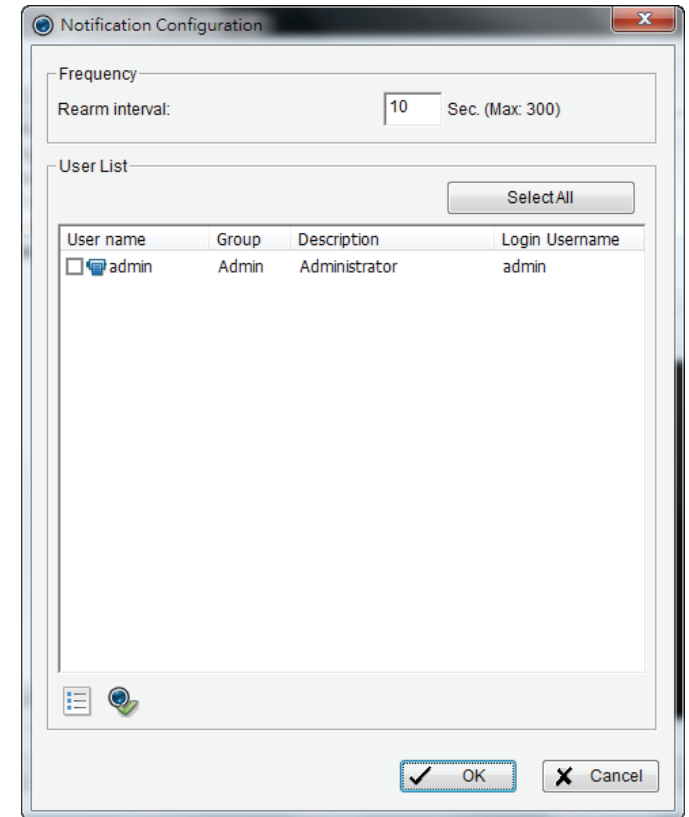
Receiver List (overview/remove): go to **General setting>Network Service>Push Notification** for user account overview. Click “**Kill**” for selected user account delete and “**Kill All**” for all user accounts delete.

1. **User name:** user account
2. **ID:** user account display name
3. **Least time:** indicate user did not login period
4. **Login Username:** the user account display name when login

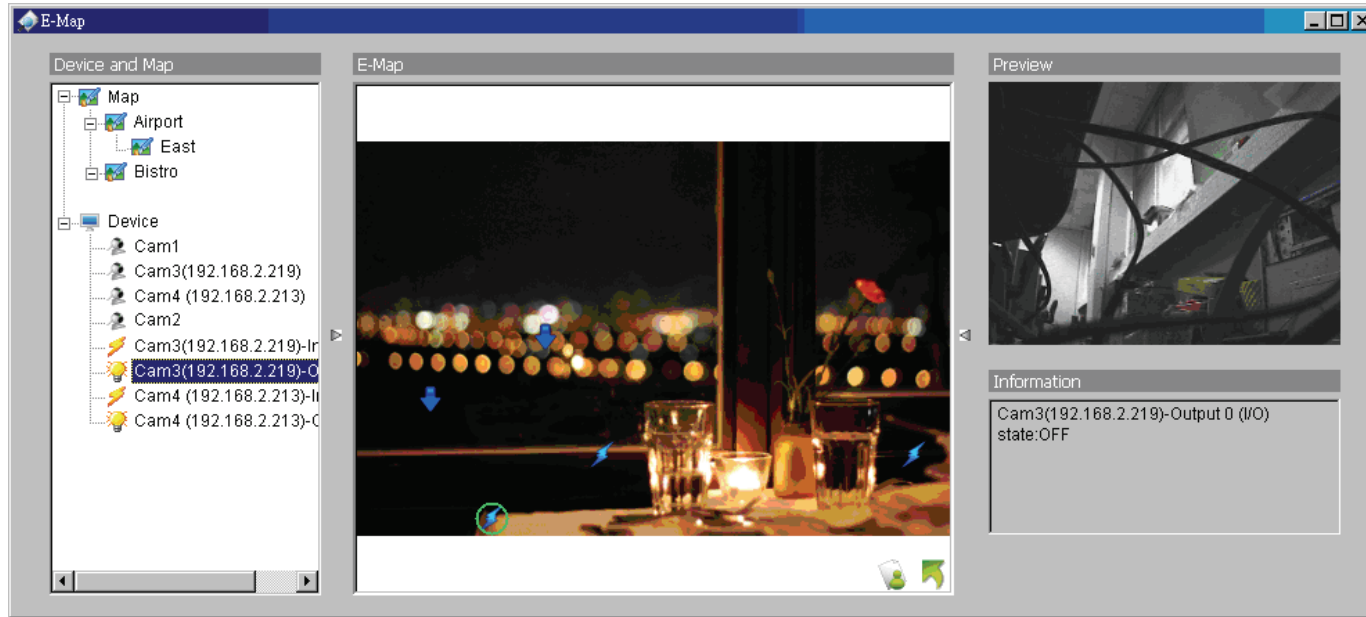
Send test: click to send test push notification to selected list.

Note:

1. Please sign in D-ViewCam mobile APP first.
2. If the user password is changed, please sign in D-ViewCam mobile APP with the new password to start the service again.
3. If users do not want to receive notifications anymore, users can turn off this feature on D-ViewCam mobile APP. There is one possibility of de-registering failed: users have ever logged in to D-ViewCam mobile APP by typing both LAN IP and WAN IP of Main Console, but only do de-registering on one side.
4. If users do not want to send notifications to certain user account, users can de-select the user account on **Notification General Setting>>Network Service**.
5. If user does not login till 30 days, user account on push notification user list will delete automatically.
6. Push notification test is depending on iOS/Android receive the message or not.



E-Map



To launch E-Map, click **Start** and select **Open E-Map** from the start menu.

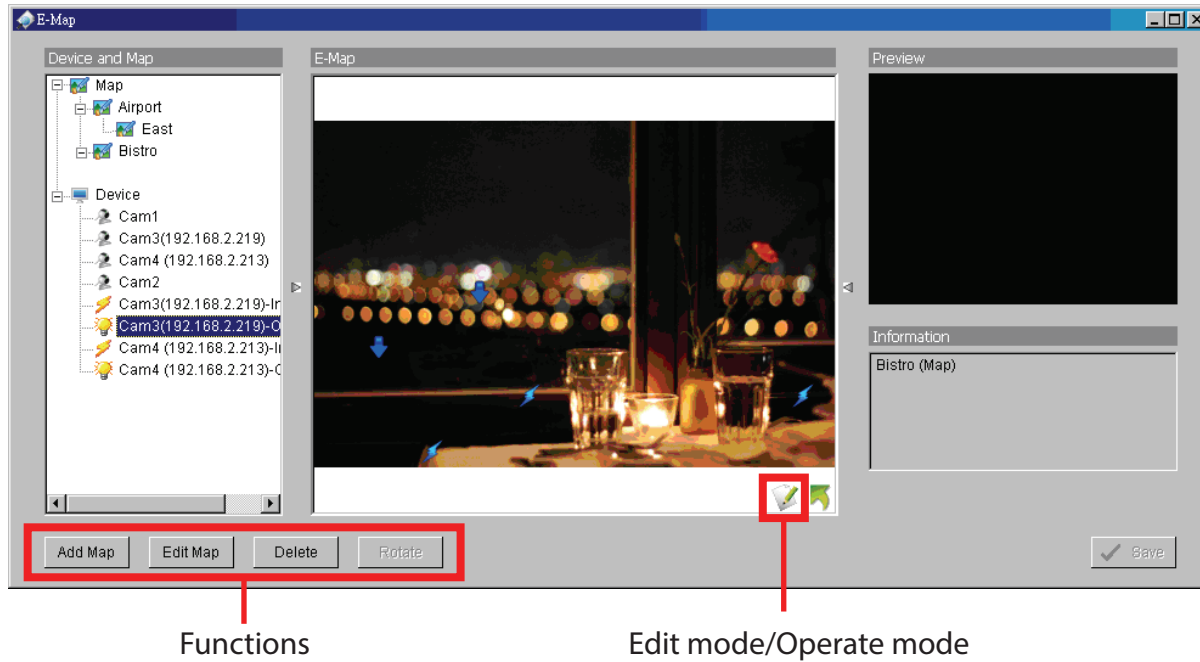
With E-Map, users can track the actual location and alarm status for each camera and receive instant response when the event happens. The arrows and lightning icon on E-Map represent cameras and I/O devices. These icons will turn red once they are triggered by alarms.

There are 2 modes in E-Map application:

Edit mode: Allows users to add/edit maps of devices.

Operate mode: All settings will be activated in this mode.

Edit Mode



In **Edit** mode, the icons at the bottom of the window will be active for configuration when running the E-map function for the first time.

Add/Edit/Delete Map

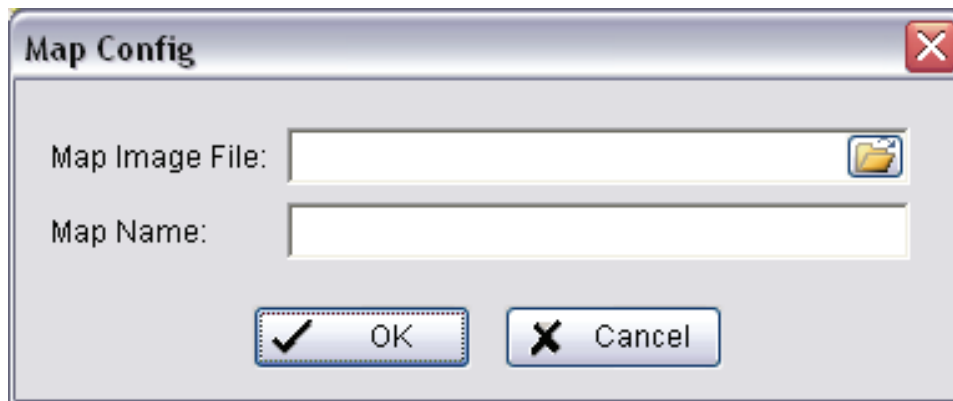
Add E-Map

Step 1: Make sure you are in **Edit Mode** and all devices are connected.

Step 2: Click **Add Map** to load a map image.


Step 3: Select the map file and insert the map name. Click **OK**, and the map you added appears in the device and map list.

Step 4: The map indicator appears on the left-up corner of the parent map. Drag it to the position you want on the map.



Edit E-Map

Step 1: Make sure you are in **Edit Mode** and all devices are connected.

Step 2: Right-click on **Map**  to view the option menu to edit map, or just click **Edit Map** to open **Map Config**.

Step 3: Modify the details and then click **OK** to save configuration.

Delete E-Map

Step 1: Make sure you are in **Edit Mode** and all devices are connected.

Step 2: Right-click on **Map**  to open the option menu to delete map, or just click **Delete** to remove the map from the list.

Note: The root map cannot be deleted.

Add/Rotate/Delete Device Indicator

Add Indicator

Step 1: Make sure you are in **Edit Mode** and all devices are connected.


Step 2: Select the Map  icon to add the device indicator.

Step 3: Before adding the indicator, ensure that the map you want is displayed. Select device from the list and directly drag a device to the desired location on the map.

Note: Different device symbolizes different indicator.

 Camera indicator  - digital Input indicator


Rotate Indicator

Step 1: Make sure you are in **Edit Mode** and all devices are connected. Select the device indicator from the Device and Map list. The device indicator will be marked with a green circle .

Step 2: Click **Rotate**, the indicator will rotate 45 degrees.

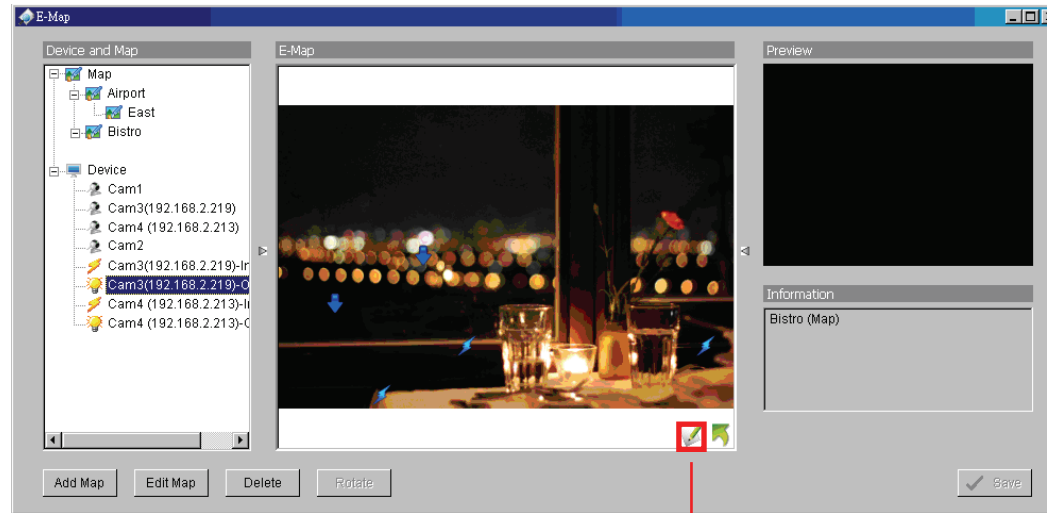
Note: Only camera indicators are allowed to be rotated.

Delete Indicator

Step 1: Make sure you are in Edit Mode and all devices are connected. Select the device indicator from the Device and Map list. The device indicator will be marked with a green circle .

Step 2: Click **Delete**.

Operate Mode



Operate Mode/Edit Mode


Device and Map Tree list

This window will list all the devices and map hierarchies. Click the **Device** or **Map** indicator to show related information in the E-Map window.





E-Map

This window displays the map layers and indicators.

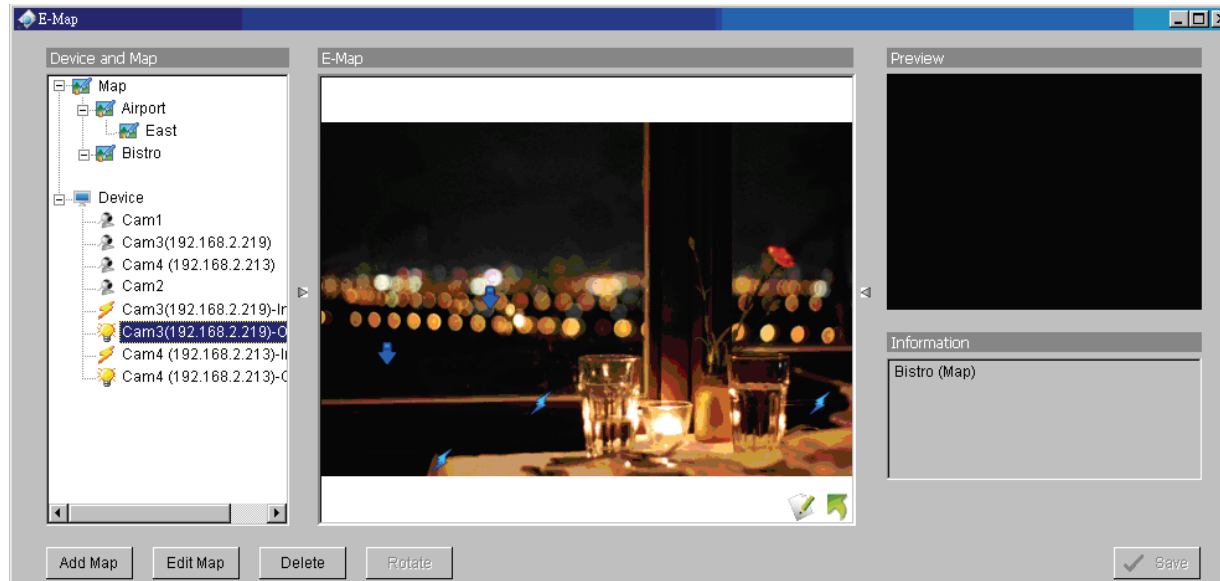
Device Indicator: Select the device indicator from **Device** and **Map Tree** list to preview video and related information.

Map Indicator: Select to enter the map layer. If you want to move to the upper layer, right click on the map to select **Up** or click  on the map.

Information and Preview window

	Map Info	Displays map name.
	Camera	Displays camera name and connection status.
	Digital Input	Displays digital input name and status (0 or 1).
	Digital Output	Displays digital output name and status (0 or 1).

Layout Adjustment



Adjust layout Window


Shrink the window:

Click the triangular indicators   to hide the device and information windows. Click the triangular indicator again to go back to the default setting.

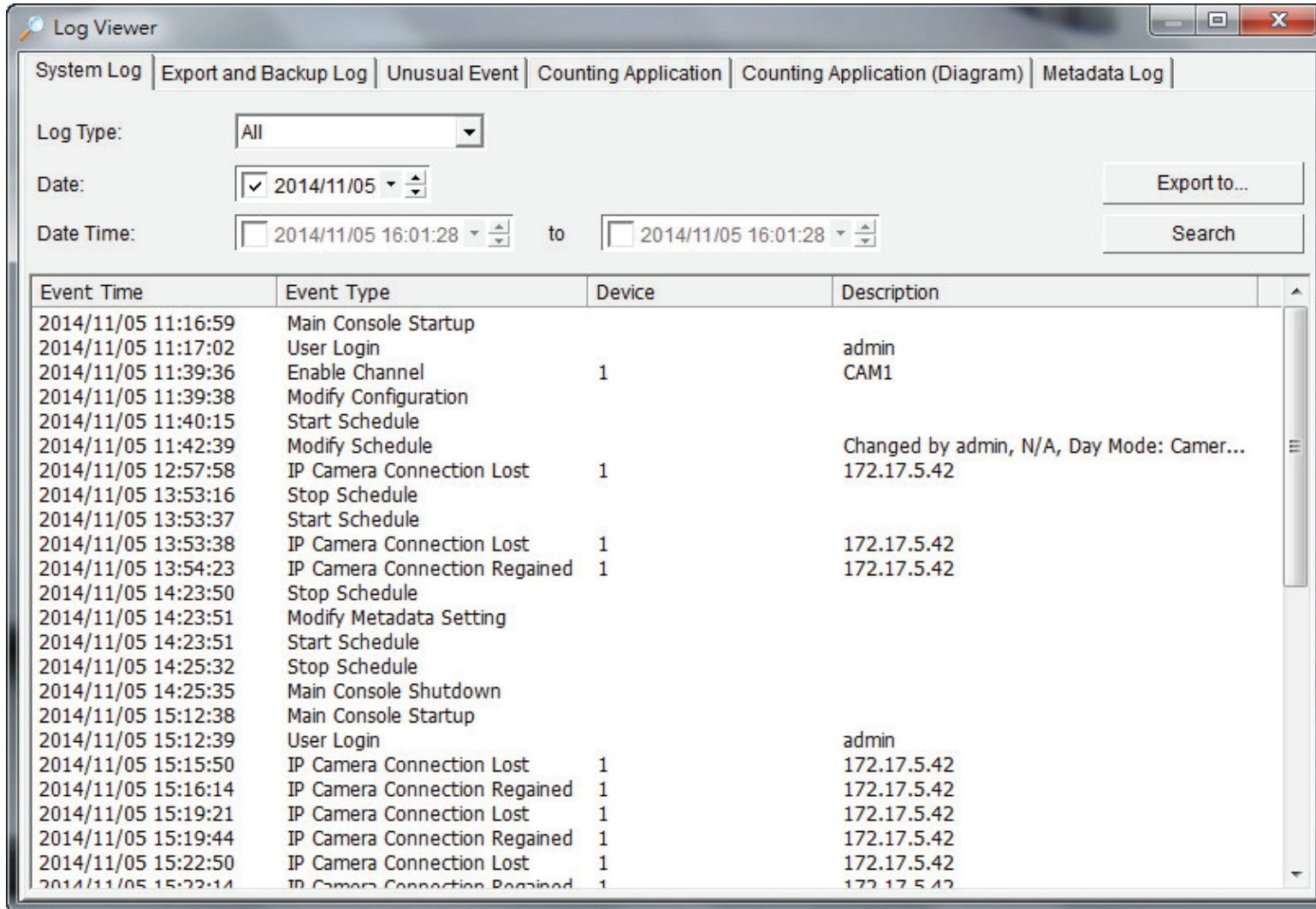
Full screen display:

For a computer system with dual monitors, you can view the Main Console on primary monitor and view full-size E-Map on a secondary monitor.

Step 1: Click the triangular indicators   to hide the device and information windows on the right and left side.

Step 2: Click  located on the upper-right side of the window to switch to fullscreen mode.

Log Viewer



The screenshot shows the Log Viewer application window with the following settings and data:

- System Log | Export and Backup Log | Unusual Event | Counting Application | Counting Application (Diagram) | Metadata Log
- Log Type: All
- Date: 2014/11/05
- Date Time: 2014/11/05 16:01:28 to 2014/11/05 16:01:28
- Buttons: Export to..., Search

Event Time	Event Type	Device	Description
2014/11/05 11:16:59	Main Console Startup		
2014/11/05 11:17:02	User Login		admin
2014/11/05 11:39:36	Enable Channel	1	CAM1
2014/11/05 11:39:38	Modify Configuration		
2014/11/05 11:40:15	Start Schedule		
2014/11/05 11:42:39	Modify Schedule		Changed by admin, N/A, Day Mode: Camer...
2014/11/05 12:57:58	IP Camera Connection Lost	1	172.17.5.42
2014/11/05 13:53:16	Stop Schedule		
2014/11/05 13:53:37	Start Schedule		
2014/11/05 13:53:38	IP Camera Connection Lost	1	172.17.5.42
2014/11/05 13:54:23	IP Camera Connection Regained	1	172.17.5.42
2014/11/05 14:23:50	Stop Schedule		
2014/11/05 14:23:51	Modify Metadata Setting		
2014/11/05 14:23:51	Start Schedule		
2014/11/05 14:25:32	Stop Schedule		
2014/11/05 14:25:35	Main Console Shutdown		
2014/11/05 15:12:38	Main Console Startup		
2014/11/05 15:12:39	User Login		admin
2014/11/05 15:15:50	IP Camera Connection Lost	1	172.17.5.42
2014/11/05 15:16:14	IP Camera Connection Regained	1	172.17.5.42
2014/11/05 15:19:21	IP Camera Connection Lost	1	172.17.5.42
2014/11/05 15:19:44	IP Camera Connection Regained	1	172.17.5.42
2014/11/05 15:22:50	IP Camera Connection Lost	1	172.17.5.42
2014/11/05 15:22:51	IP Camera Connection Regained	1	172.17.5.42

To launch Log Viewer, Click on **General Setting** and select **Log Viewer** from the menu. View the unusual event history that had been detected by the Smart Guard System.

System Log

Step 1: Choose the type of event you want to check or select All from the drop-down menu for all types of events. Select Log Type from the drop-down menu. There are in total 37 types of log types, including:

Step 2: View the events that happened on a particular date or during a given time period by selecting search period. For a particular date: check the Date box right and indicate the date. For a period: check the Date Time and then enter the date and time.

Step 3: Click Search.

- | | |
|--------------------------------|---|
| ✓ Mainconsole Startup | ✓ Modify Remote Playback Server |
| ✓ Mainconsole Shutdown | ✓ IP Camera Connection Lost |
| ✓ User Login | ✓ Restart Windows |
| ✓ User Login Failed | ✓ Modify Metadata Setting |
| ✓ Start Schedule | ✓ Metadata Connection Lost |
| ✓ Stop Schedule | ✓ Modify E-Map |
| ✓ Execute Recycle | ✓ Start Remote Desktop |
| ✓ Enable Channel | ✓ Stop Remote Desktop |
| ✓ Disable Channel | ✓ Modify Remote Desktop |
| ✓ Start Smart Guard | ✓ Start Central Management |
| ✓ Stop Smart Guard | ✓ Stop Central Management |
| ✓ Modify Smart Guard | ✓ Modify Central Management |
| ✓ Modify Schedule | ✓ Start Counting Application |
| ✓ Modify Configuration | ✓ Stop Counting Application |
| ✓ Start Live Streaming Server | ✓ IP Camera Connection Regained |
| ✓ Stop Live Streaming Server | ✓ Sync. Microsoft Active Directory User |
| ✓ Modify Live Streaming Server | ✓ IP Camera Parameter Changed |
| ✓ Start Remote Playback Server | ✓ Update Metadata Plug-in |
| ✓ Stop Remote Playback Server | |

Export and Backup Log

View the Export and Backup Log history that had been operated by local or remote user.

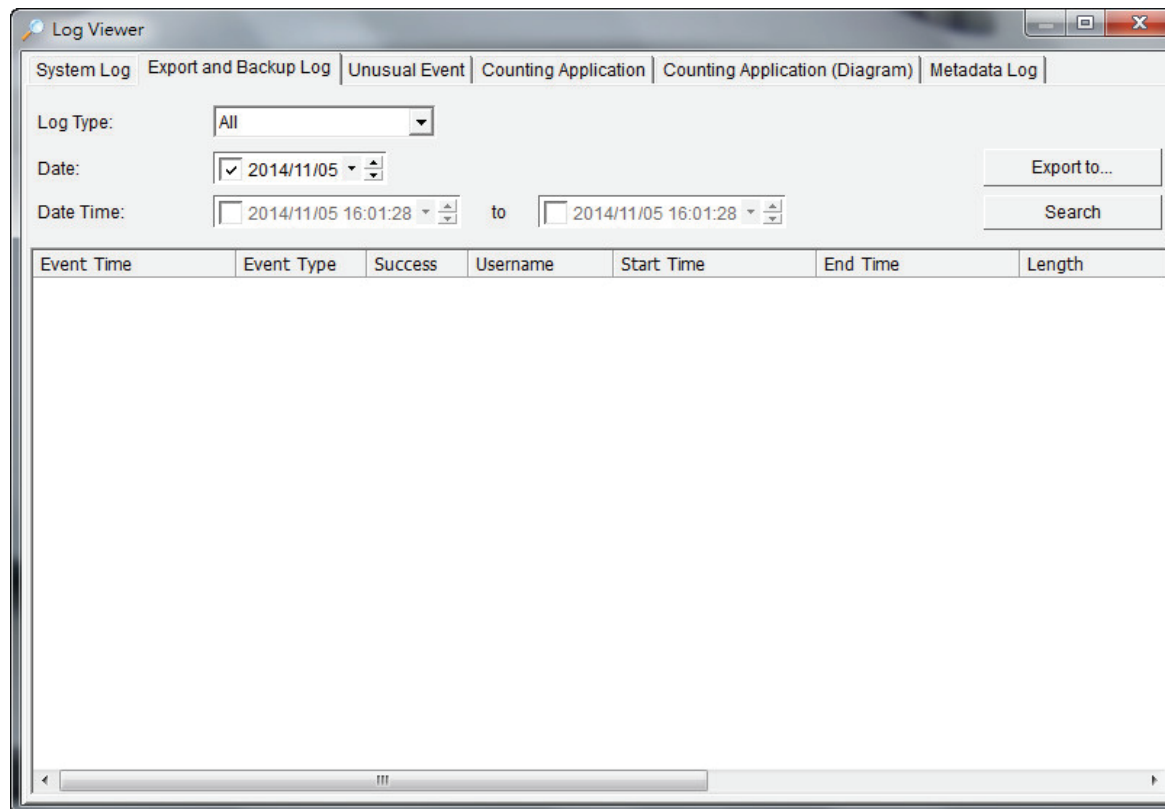
Step 1: Choose the type of event you want to check or select All from the drop-down menu for all types of events.

Step 2: View the events that happened on a particular date or during a given time period by selecting search period.

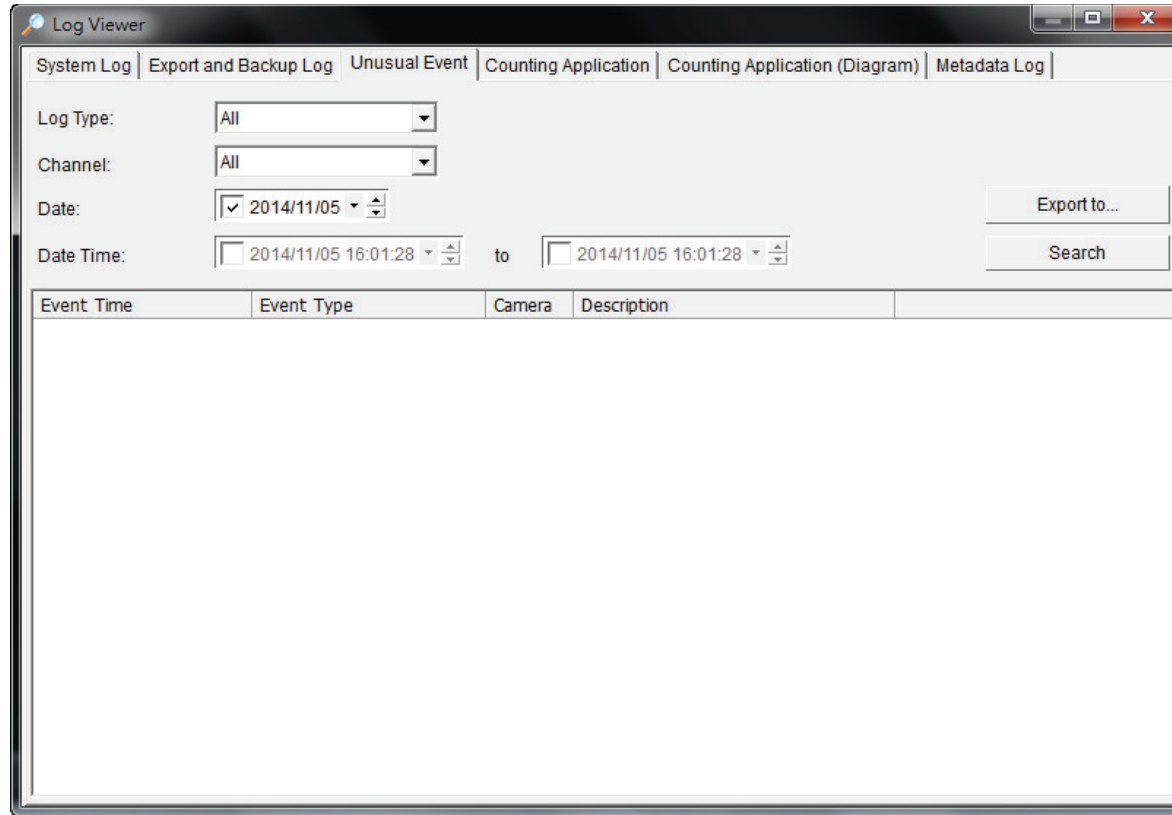
For a particular data: check the Date box right and indicate the date.

For a period: check the Date Time and then enter the date and time.

Step 3: Click Search



Unusual Event



Step 1: Select the type of event you wish to view or select **All** from the drop-down menu to view all types of events. The types include **General Motion, Signal Lost, and Digital Input Triggered**.

Step 2: Select the camera channel you wish to view or select **All** for all available channels.

Step 3: View the events that happened on a particular date or during a given time period by selecting a search period.

For a particular data: Check the "Date" box and select the date you want to view.

For a period: Check the "Date&Time" box and then enter the date and time.

Step 4: Click **Search**.

Export

After you search the log you want, you can export it to an Excel (.xls) or a text (.txt) file.

	A	B	C	D	E
1	Event/Time	Event/Type	Description		
2	2007/09/12 00:45:41	Main Console Startup			
3	2007/09/12 00:45:44	User Login	admin		
4	2007/09/12 01:11:10	Main Console Shutdown			
5	2007/09/12 01:27:04	Main Console Startup			
6	2007/09/12 01:27:05	User Login	admin		
7	2007/09/12 01:28:27	Main Console Shutdown			
8	2007/09/12 15:06:51	Main Console Startup			
9	2007/09/12 15:06:52	User Login	admin		
10	2007/09/12 15:07:04	Main Console Shutdown			
11	2007/09/12 15:08:28	Main Console Startup			
12	2007/09/12 15:08:40	Main Console Shutdown			
13	2007/09/12 15:08:54	Main Console Startup			
14	2007/09/12 15:09:01	Main Console Shutdown			
15	2007/09/12 15:14:11	Main Console Startup			
16	2007/09/12 15:14:12	Main Console Shutdown			
17	2007/09/12 15:14:31	Main Console Startup			
18	2007/09/12 15:15:20	Main Console Shutdown			
19	2007/09/12 19:44:15	Main Console Startup			
20	2007/09/12 19:44:58	Main Console Shutdown			
21	2007/09/12 22:51:57	Main Console Startup			
22	2007/09/12 22:51:59	Main Console Shutdown			
23	2007/09/12 22:52:14	Main Console Startup			
24	2007/09/12 22:52:18	User Login	admin		
25	2007/09/12 22:52:24	Main Console Shutdown			
26	2007/09/12 22:53:19	Main Console Startup			

.xls

```
2007/09/12 00:45:41, Main Console Startup,
2007/09/12 00:45:44, User Login, admin
2007/09/12 01:11:10, Main Console Shutdown,
2007/09/12 01:27:04, Main Console Startup,
2007/09/12 01:27:05, User Login, admin
2007/09/12 01:28:27, Main Console Shutdown,
2007/09/12 15:06:51, Main Console Startup,
2007/09/12 15:06:52, User Login, admin
2007/09/12 15:07:04, Main Console Shutdown,
2007/09/12 15:08:28, Main Console Startup,
2007/09/12 15:08:40, Main Console Shutdown,
2007/09/12 15:08:54, Main Console Startup,
2007/09/12 15:09:01, Main Console Shutdown,
2007/09/12 15:14:11, Main Console Startup,
2007/09/12 15:14:12, Main Console Shutdown,
2007/09/12 15:14:31, Main Console Startup,
2007/09/12 15:15:20, Main Console Shutdown,
2007/09/12 19:44:15, Main Console Startup,
2007/09/12 19:44:58, Main Console Shutdown,
2007/09/12 22:51:57, Main Console Startup,
2007/09/12 22:51:59, Main Console Shutdown,
2007/09/12 22:52:14, Main Console Startup,
2007/09/12 22:52:18, User Login, admin
2007/09/12 22:52:24, Main Console Shutdown,
2007/09/12 22:53:19, Main Console Startup,
```

.txt

Step 1: Click the **Export To** button.

Step 2: Type the file name and select the file format (.xls or .txt).

Counting Application

Display the history of Counting Application during a given time period.

Step 1: Select the channel you want to check or select All from the drop-down menu for all channels.

Step 2: Select search period. View the events that happened on a particular date or during a given time period by selecting search period.

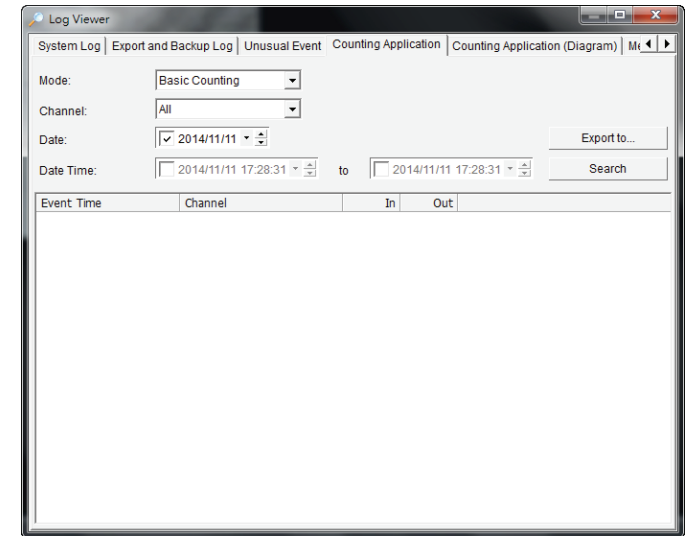
For a particular date: check the Date box right and indicate the date.

For a period: check the Date Time and then enter the date and time.

Step 3: Click Search.

Step 4: Press the button Export to.

Step 5: Type the file name and choose the file format (.xls or .txt).



Counting Application (Diagram)

Display the Counting Application data in diagram format.

Step 1: Select the channel you want to check or select All from the drop-down menu for all channels.

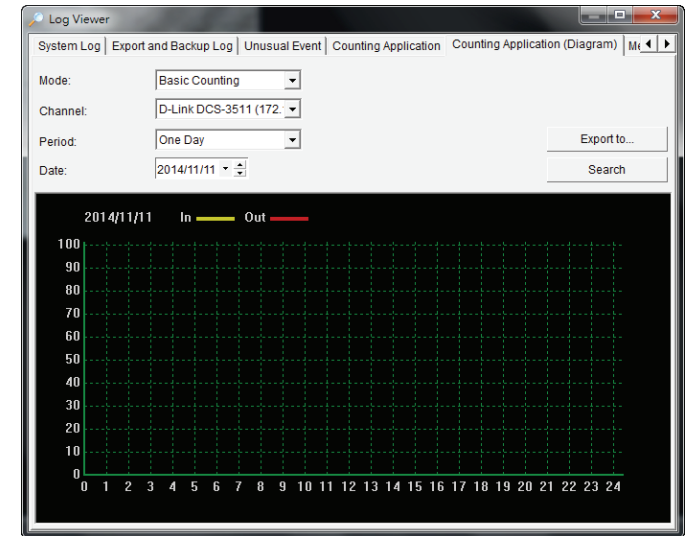
Step 2: From the drop-down menu, set up how you would like the diagram to be displayed. You have the options of one day, one month, or one year.

Step 3: Select a specific date to make it the start point of the diagram.

Step 4: Click Search.

Step 5: Press the button Export to.

Step 6: Type the file name and the file will save as BMP files.



Metadata Log

View the Metadata Log history detected by the Smart Guard System.

Step 1: Choose the type of events you wish to view or select All from the drop-down menu to view all types of events. The types of Unusual Event include Transaction Start, Transaction End, Open Cash Register, Connection Lost, and special User defined event.

Step 2: Choose the camera channel you wish to view or select All for all the channels available.

Step 3: View the events that happened on a particular date or during a given time period by selecting search period.

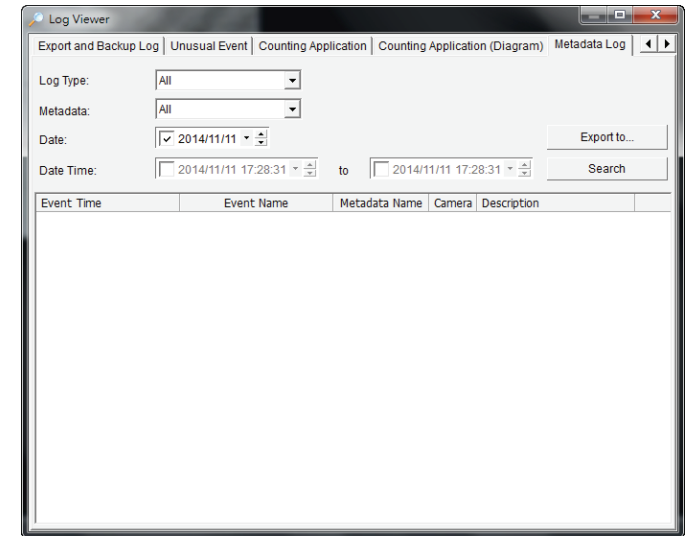
For a particular date: check the Date box right and indicate the date.

For a period: check the Date Time and then enter the date and time.

Step 4: Click Search. A link () will appear next to each event time where video is available. By clicking on the link, an instant playback window will pop up to show recorded video

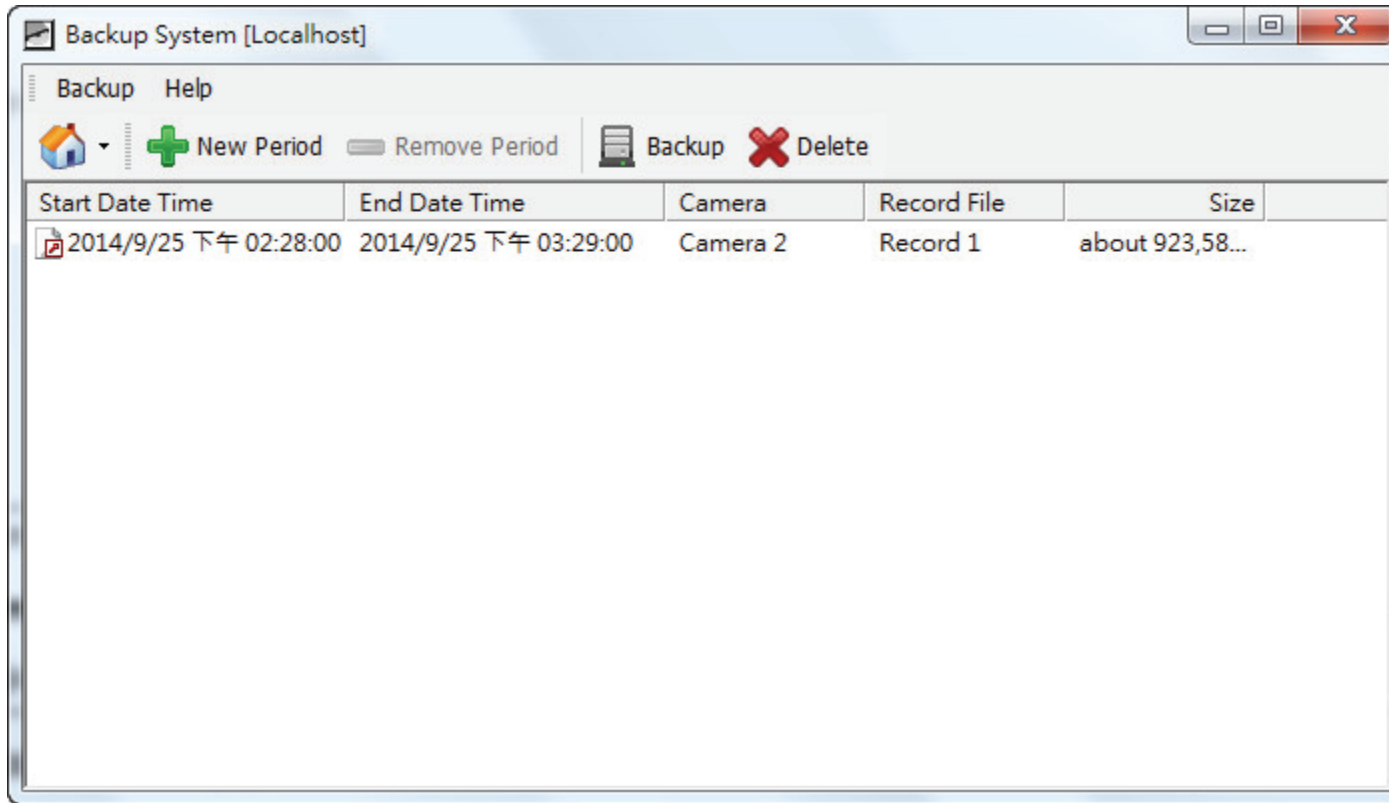
Step 5: Press the button Export to.

Step 6: Type the file name and choose the file format (.xls or .txt).



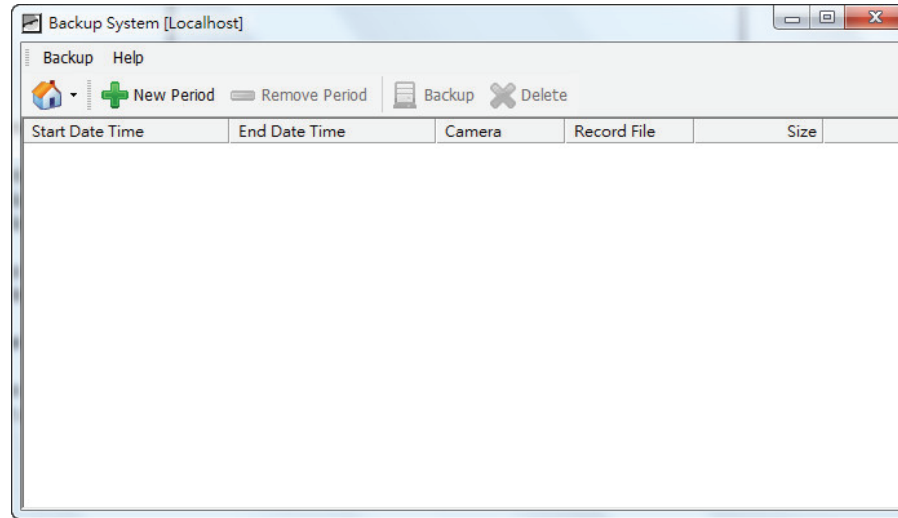
Backup

The backup function saves video records and other log information.




Note: The backup cannot exceed 7 days of recordings.

Back up Recorded File(s)



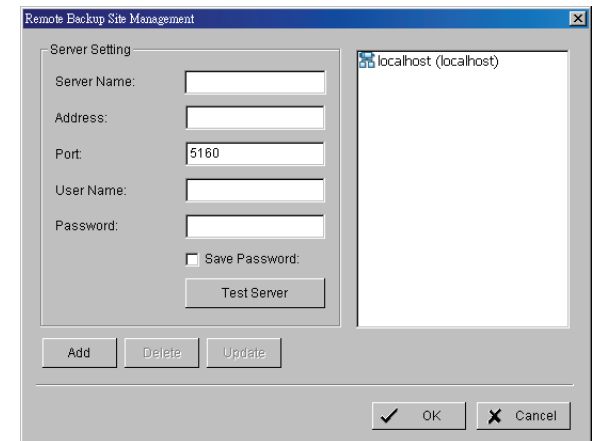
Step 1: Click **Remote Server**  to add a backup site.



- Enter the **Server Name, Address, Port, Username, and Password.**
- Click **Add** to add the server.
- Click **OK** to exit the Setting window.

Step 2: To access the **Remote Backup Site**, click  and enter the username/password of the remote server to access the backup site.

Step 3: Click **New Period** to open **Select DateTime Period.**

Step 4: Select the data you want to back up by highlighting the time period. You may also set up a start and end time in the Date Time Period section.



Step 5: Click on the camera number icon to add camera(s) or click   to add/delete all channels.

Step 6: Select **Enable Preview** to display the preview of the video you selected.

Step 7: Click **OK** when the settings are complete.

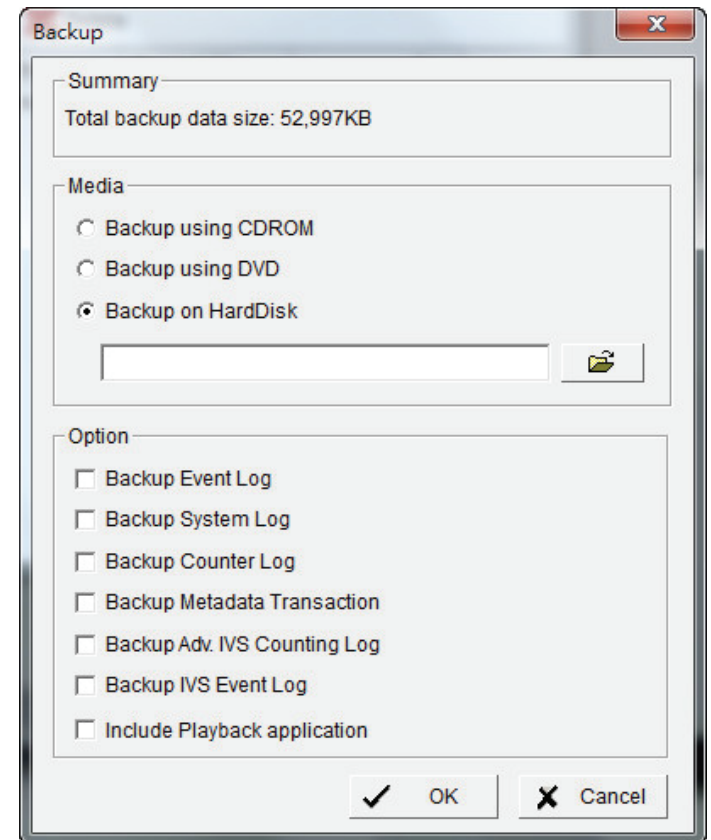
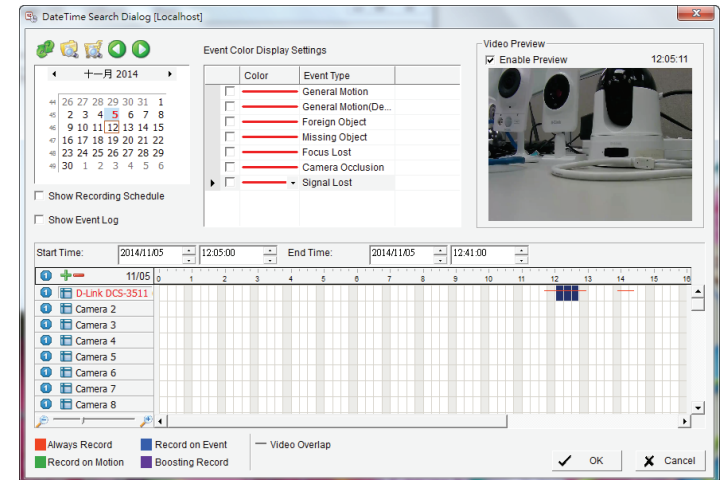
Step 8: Click **Remove Period** to remove data from the backup list.

Step 9: Click the **Backup** icon to open the Backup window.

Step 10: Under **Media**, select the path you want to save the file or burn the file directly to a CD (direct CD burning for Windows® XP only), DVD or to a hard drive.

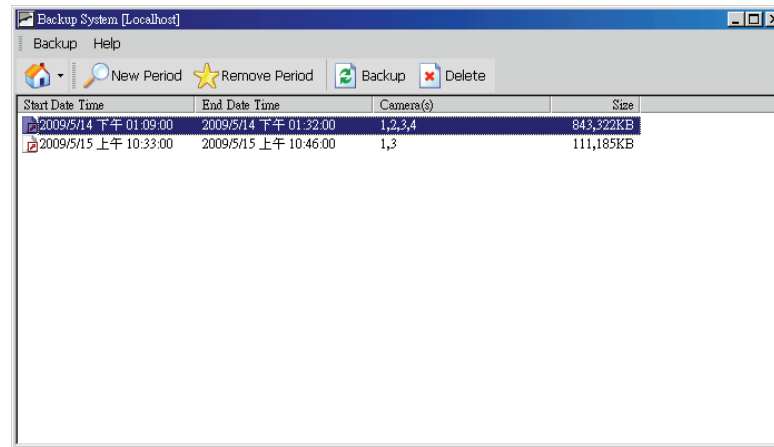
Step 11: Under **Option**, select the log information you would like to back up (Event Log, System Log, Counter Log, or Metadata Transaction), and then click **OK**.

Note: The backup cannot exceed 7 days of recordings.



Delete Recorded File(s)

Step 1: Click **New Period** to open **Select Date Time Period**.



Step 2: Follow steps 3-7 from the previous two pages to select the data period which you want to delete.

Step 3: Click on the **Delete** icon to remove all the data in the backup list from the database.

Note: The deleted video cannot be recovered.

Remote Live Viewer

With the Remote Live Viewer software, remote users may watch real-time video channel per server from remote live streaming servers

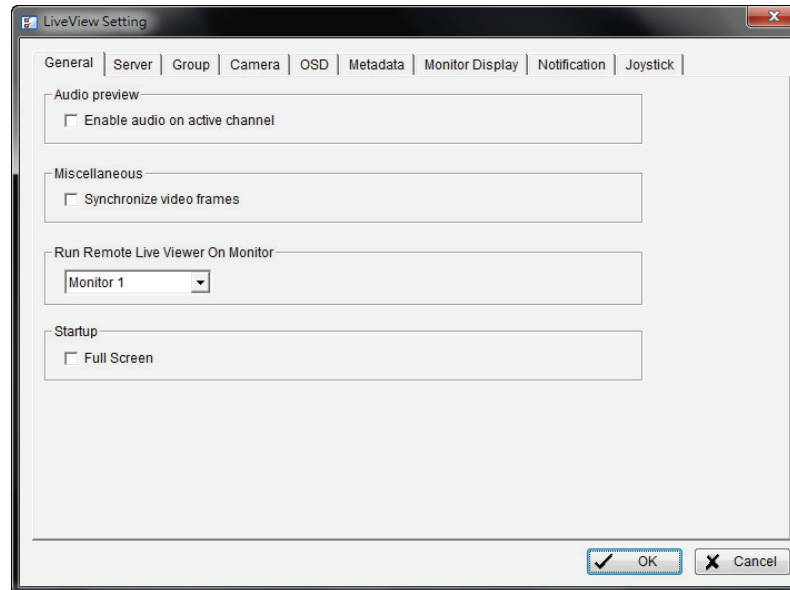


Setting

Click the **General Settings** icon in the Main Console to open the Settings window.



General Setting



Audio Preview

Enable audio on active channel: Select to enable the audio streaming on active channel.

Miscellaneous

Select to prevent tearing that may occur in the video display. However, this will increase the CPU processing load.

Run Remote Live Viewer on Monitor

Select monitor to display Remote Live Viewer.

Startup

Full screen: Users can view the window as the full screen mode

Server Setting

Step 1: Enter the Server Name as preference.

Step 2: Enter the IP address, Port, User Name, Password to log in to the server.

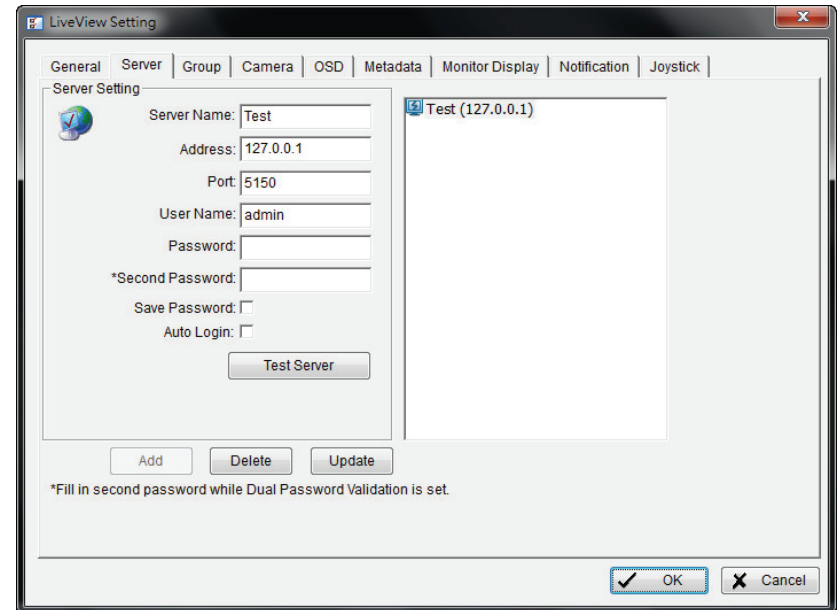
Step 3: Enable **Save Password** to login without entering the password again.

Step 4: Enable **Auto Login** to login automatically when starting the Remote Live Viewer.

Step 5: Click **Test Server** to check if the server is available.

Step 6: Click **Add** to insert the setting to server list.

Note: To remove the server, select a server in the server list and then click **Delete**.



Group Setting

Allocate different cameras into groups.

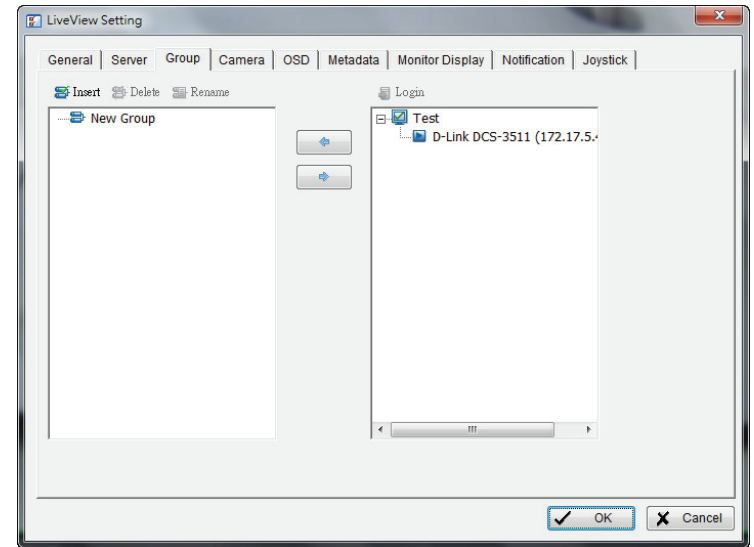
Step 1: Log in to all the servers that contain camera(s) you would like to add into the group(s).

Step 2: Click **Insert** to create and name a new group.

Step 3: Highlight the camera that you would like to add to a group and then click on <-- . Repeat the process until all the cameras you want in the group are added.

Step 4: Click **Delete** to remove a specific group or click **Rename** to change the name of a specific group.

Step 5: Click **OK** to save your group.



Camera Setting

Select the preferred stream type of each camera as default live view profile

Stream profile: Select a layout type and choose which stream profile you would like to apply on this layout.

For some layout with large and small grid, you are able to assign different stream profile.

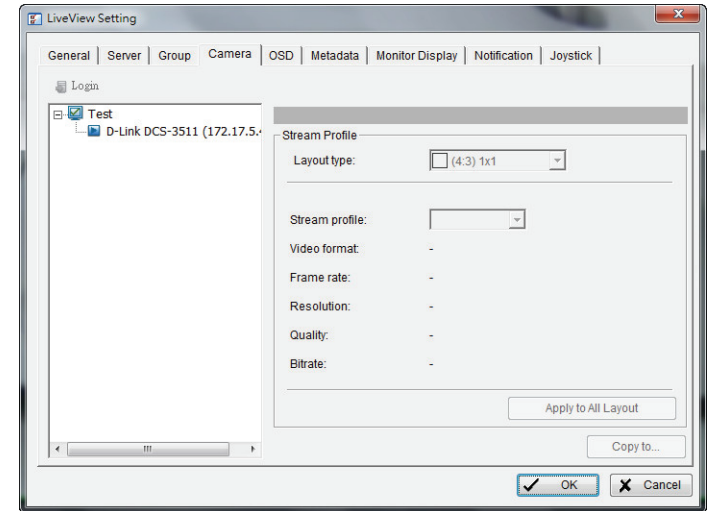
Record 1: The system will follow the stream profile set in **main console > Schedule > Configuration**.

Record 2: The system will follow the stream profile set in **main console > Schedule > Configuration**.

Main / High / Normal / Low / Minimum: The system will follow the stream profile set in **main console > Schedule > Configuration**.

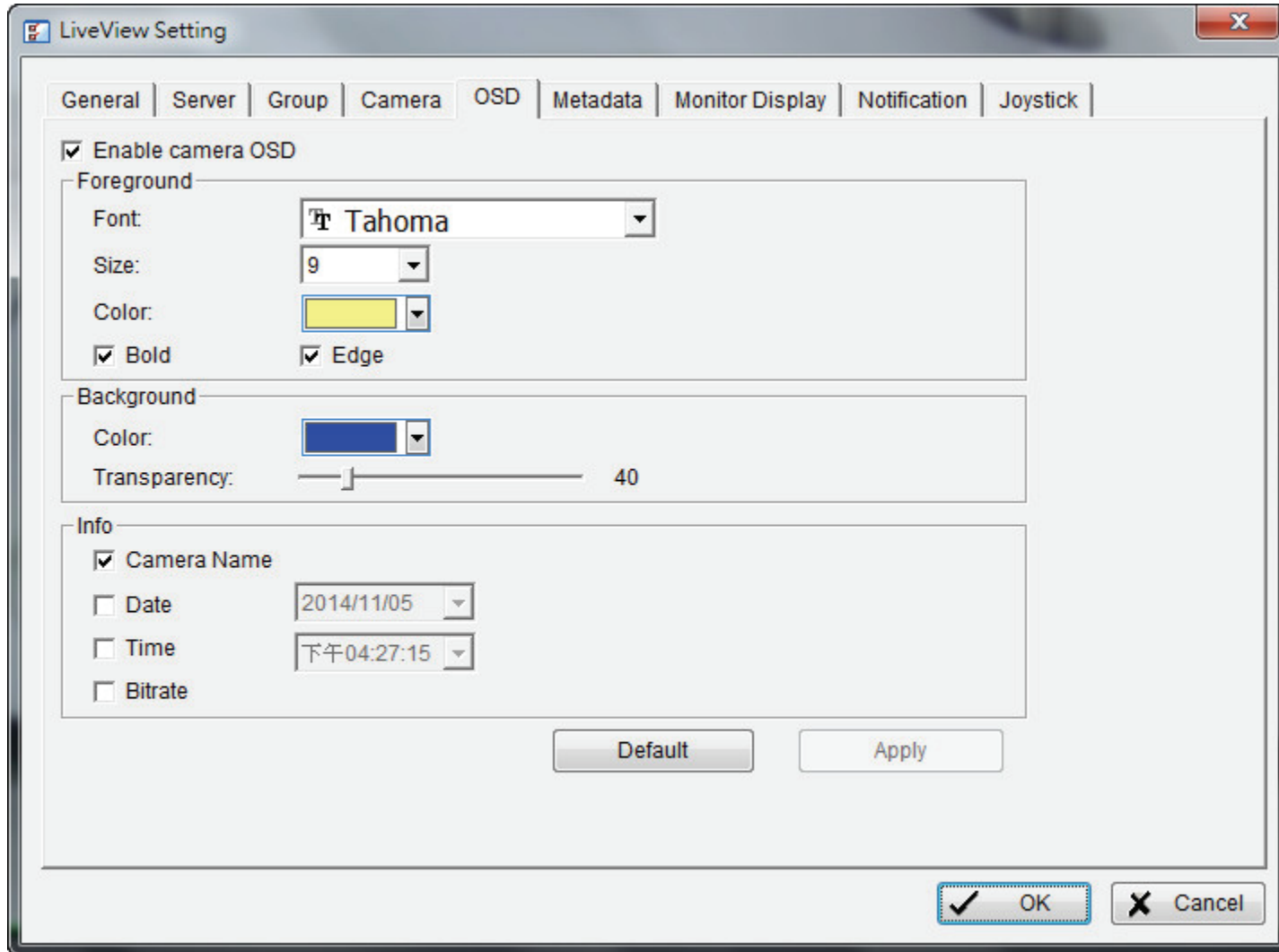
Apply to All Layout: Apply the stream profile setting of current layout to the other layouts.

Copy to: Select in order to copy the preferred stream profile of a channel to all of the listed channels



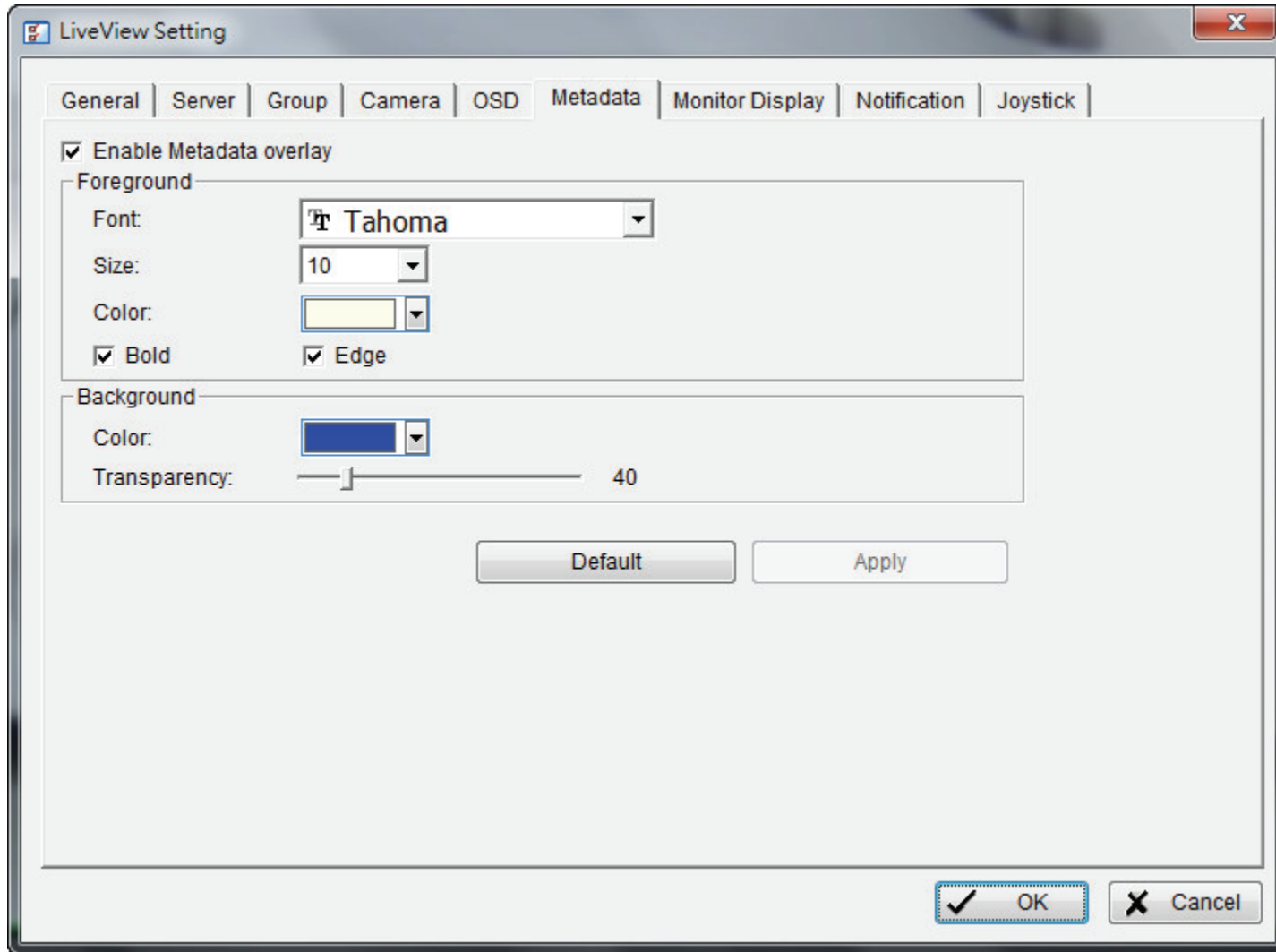
OSD Setting

Select the font style and color for the information displayed on the video.



Metadata Setting

Select the font style and color for the Metadata overlay on the panel.



Monitor Display Setting

Activate auto scan to rotate the channels/cameras on the display window. For instance, you may select to show only 4 sub-screens on the live viewer while having 16 channels connected to the system.

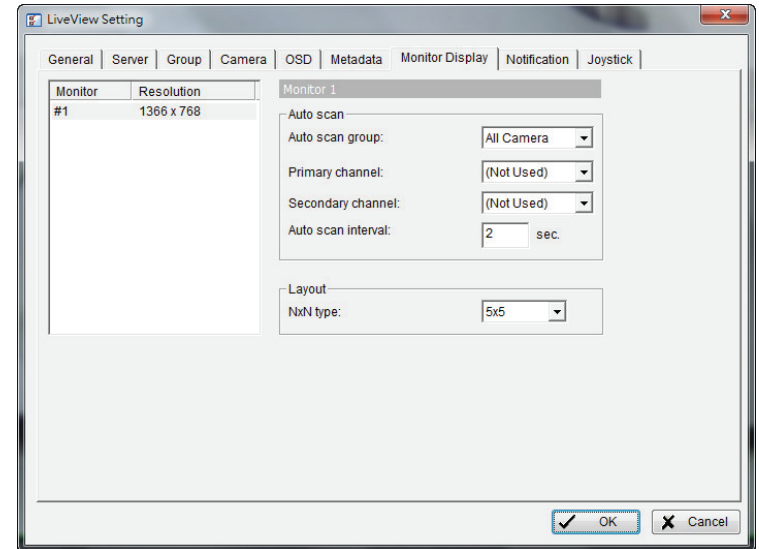
Step 1: Select the monitor connected to the system.

Step 2: From the **Auto scan group** drop-down, select a group.

Step 3: Select a primary channel that will always be on the screen when activating auto scan settings.

Step 4: Select a channel that has secondary priority then primary channel on the display screen when activating auto scan settings.

Step 5: From the **Layout** drop-down, select the screen division you want to display.



Notification Settings

Status display

Show recording status: Check to show the crystal ball with recording status on monitor display.

Show camera event: Check to show the smart guard detected event appointed in main console on each channel.

Note: To execute this function, please General Setting “on screen display” as an action of Smart Guard instant response.

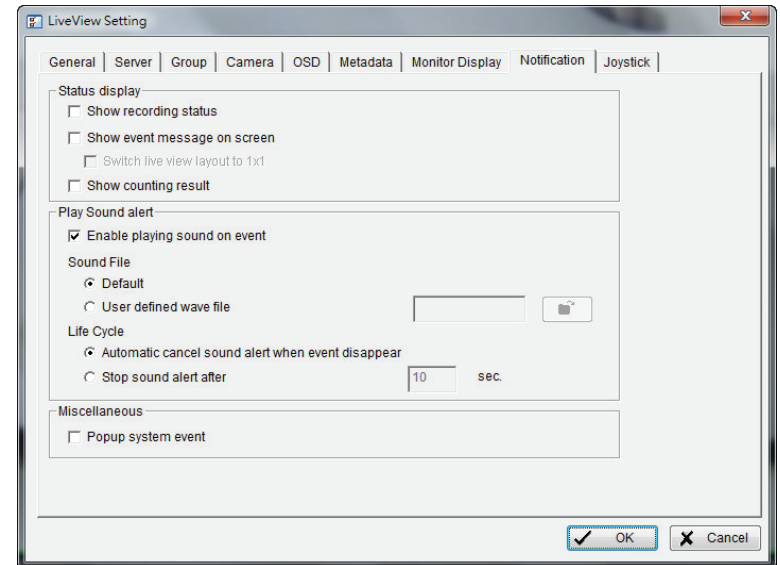
Switch live view layout to 1x1: Check to switch the display layout to 1x1 when smart guard detected event appointed in Mainconsole on each channel.

Play sound alert: Enable playing sound on event: Check to enable sound alerts on events.

Sound File: Choose a sound file to play. You may use the default file or define another.

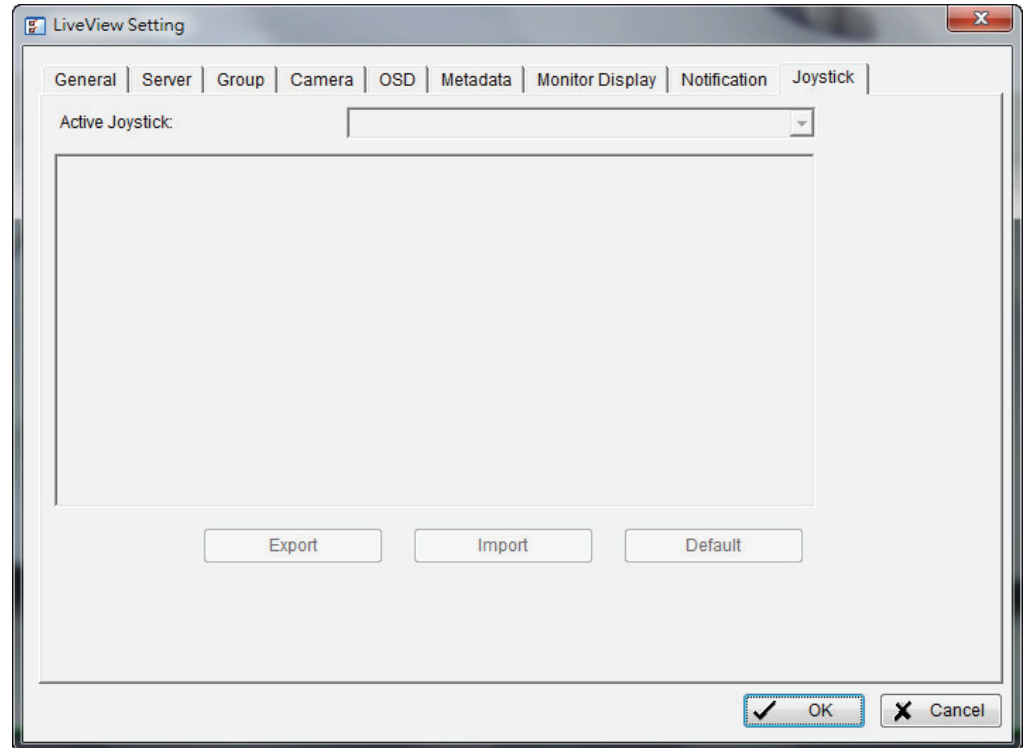
Life Cycle: Choose to allow the sound alert to close when events disappear, or define a timer to close the sound alert automatically after a specific period of time.

Note: To execute this function, please General Setting “play sound” as an action of Smart Guard instant response.



Joystick Settings


Settings are same to Main console joystick settings. For details please refer to page 53.



Server/Group/Camera

Display a complete list of the server(s), group(s), and camera(s) that are added to the system.



Server View: Click  icon to display cameras sorted by servers.



Group View: Click  icon to display cameras sorted by group names.





Server View



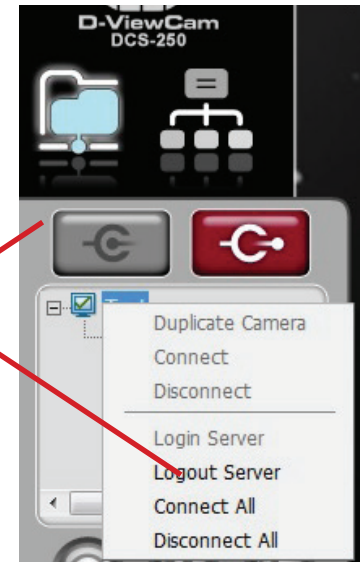
Group View

Login/Logout Server

Option 1: Select a server on the list and then click on the  **Log In** icon to access or the  **Log Out** icon to leave the server.

Option 2: On the server list, right-click to open the menu options.

Log In/Log Out Server

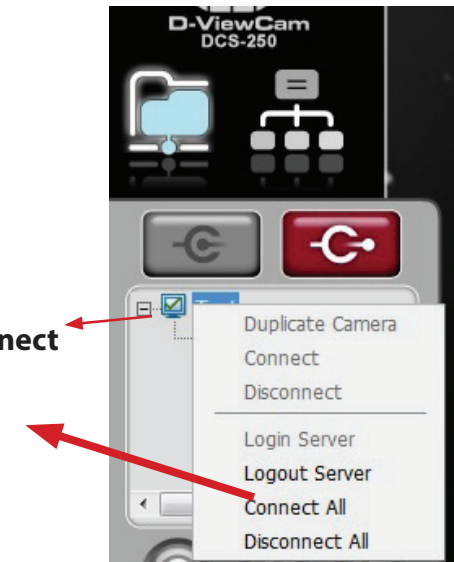


Connect/Disconnect Camera

Option 1: On the server/camera list, double-click on a camera to connect it.

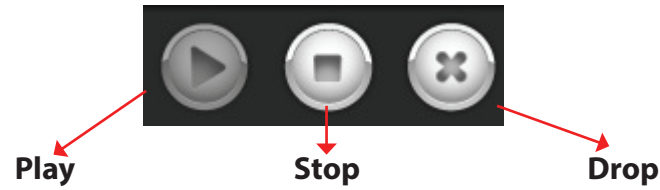
Option 2: On the server/camera list, right-click on a camera to open the menu options to connect/disconnect.

Connect/Disconnect Camera



Option 3: Select a camera from the list and drag it to where you want the image to be displayed.

Option 4: Play / Stop / Drop: Select a camera/video and click this button to play/stop/disconnect a particular channel.



PTZ Control

Control the movement of PTZ cameras. With cameras that support PTZ control, you can move, zoom, patrol, adjust the focus, and set preset points of the cameras.

Preset/Go

Adjust the camera view and click on the **Set** icon and save the view as preset point 01. Adjust the camera view again and set the preset point 02. Repeat the process until you finish setting up all the preset points. Enter a name instead of preset point 01. Click on the **Go** icon to view the preset points.

Note: To change the speed settings of your PTZ camera, click on **Main Console > General Setting > Setting > PTZ Config**.

Zoom

Click on the + and – signs to zoom in and zoom out the view.

Focus

To focus near means objects that are closer will be clearer than the objects that are further away. On contrast, to focus far means objects that are further will be clearer than the objects that are closer. Click on the **Focus** icon and select auto focus if you want the system to decide the focus point for you.

Patrol

To have your PTZ camera to patrol around pre-defined path of preset points, please click **Patrol** to start/stop patrol.

Note: To setup a patrol path, please go to **Main Console > General Setting > Setting > PTZ Config > Patrol**.

On Screen Menu

Right-click on the camera screen and get the “On Screen Menu”, from which you can quickly adjust the setting of camera.

Enable Talk

With cameras that support two-way audio, select **Enable Talk** to utilize the function

Enable Audio

Select this option to enable the audio transmission along with video stream

Enable Digital PTZ

To enable the PTZ functions of the camera, select the Enable Digital PTZ option. Use the mouse wheel or click on the + and – signs to zoom in and zoom out on the camera. The square flashing on the video grid indicates the correspondent view of the camera.

Enable Move

With cameras that support PT function, click the **Enable Move** function to adjust the current camera’s view by clicking on the display screen. To cancel this function, right Click the screen and select **Disable Move**. With cameras that support Area Zoom function, click the **Enable Move/Area Zoom** function to adjust the current camera’s view by dragging a rectangle on the display screen. To cancel this function, right Click the screen and select **Disable Move/Area Zoom**.

Fix Aspect Ratio

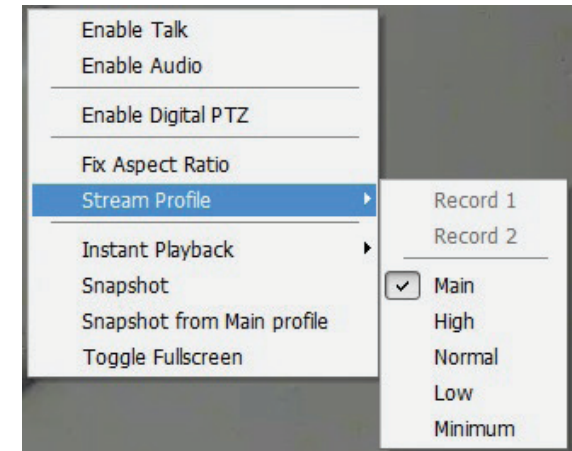
For some special camera resolution, user can enable **Fix Aspect Ratio** to view original ratio video, or disable this option to stretch 3:4 to fit window.

Stream Profile

Select different level **Stream Profiles** to downgrade video quality for bandwidth concerns.

Instant Playback

Instant Playback function allows you to play the last few minutes of any live video channel. Simply right click **Live Channel** and select **Instant Playback** to access the recorded video.



Snapshot

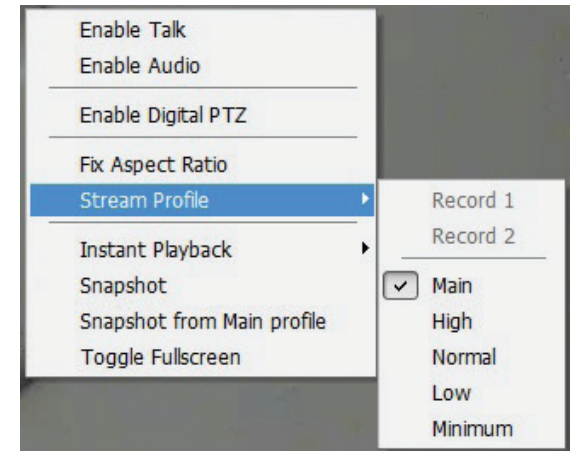
The snapshot function captures a specific video image to the clipboard or to a file you can save to your computer.

Snapshot from Main Profile

Select the snapshot function to capture a specific video image frame from the camera main profile immediately. You have the options to copy the image to clipboard or to save it

Toggle Fullscreen


Switch to view video with full screen display. To disable the function, right-click on screen and uncheck this option or simply press **ESC** to go back to original window.



Playback

Select to open the Playback console and view video remotely.

Add Remote Playback Site


Click the **Remote Sever** icon  to open the remote playback site management, and to add and setup the remote playback site.

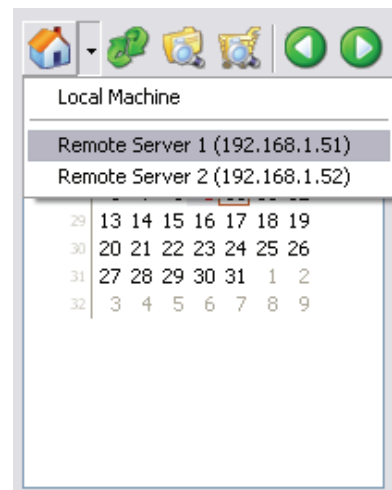
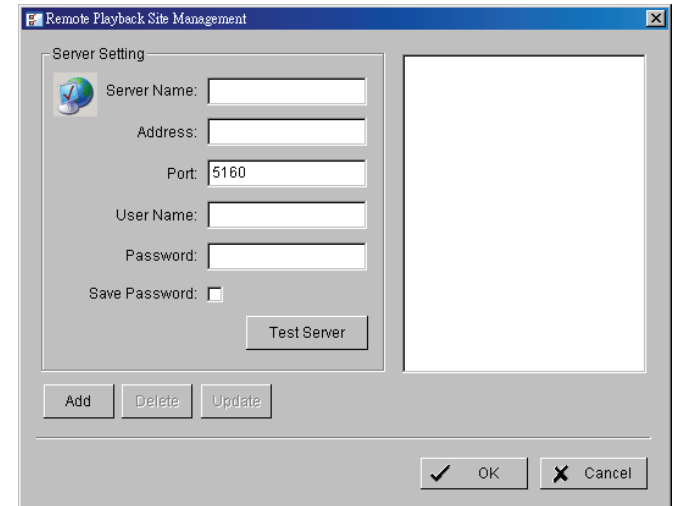
Step 1: Enter the **IP address**, **Port**, **Username**, and **Password**.

Step 2: Click **Add** to add the server.

Step 3: Click **OK** to exit the **Setting** window.

Access Remote Playback Site

Go to **Date/Time** and click  on the top of the display window to access the Remote Playback Site.



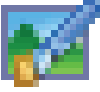



Start Monitor

Open E-Map
Open I/O Control Panel



E-Map

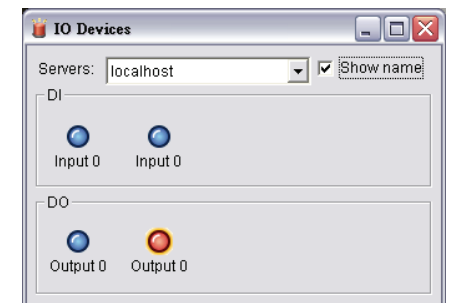
Select **Open E-Map** to open the E-Map window.

	Map	Select the map you want to show on E-Map Window.
	Camera	Select the camera you want to preview video and mark an indicator on E-map.
	Digital Input	Select to highlight the device with a green circle on the map and show status on the Information window. If the Digital Input is from a network camera, the preview window will display live video from the camera.
	Digital Output	Select to highlight the device with a green circle on the map and show status on the Information window. If the Digital Output is from a network camera, the preview window will display live video from the camera.

I/O Control

Select to open the I/O control window. This window allows you to control DO devices remotely.

Note: Adjust the setting of I/O device in **Main Console > General Setting > Setting > I/O Device** first, and the I/O control window will display the device status based on these settings.



Web View

Note: Be sure to enable the **Live Streaming Server**. To enable, go to **General Setting > Network Service** select **Live Streaming** and click **Start Server**.



Server IP

Open Internet Explorer and enter the IP address or DDNS name of the server followed by the connecting port.

Example: <http://192.168.1.16:8080/>

192.168.1.16 is the IP address of the server. 8080 is the port specified in **Use Default Web Server** in Network Service.




Note: Make sure the Live Stream Server is enabled. Please refer to Live Streaming Server for more information.

Utilities

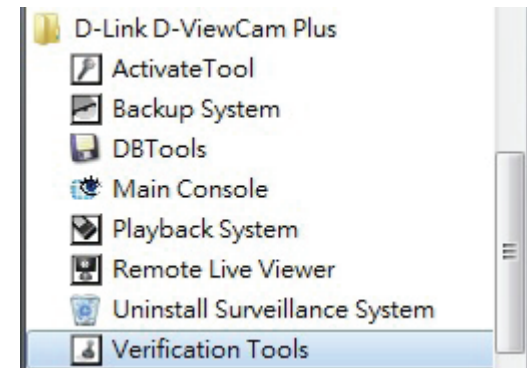
Verification Tool

The Verification Tool verifies whether the data created by the system be tampered with or not. It is the process by which a digital watermark (a digital signature) is added to each recorded video frame to ensure its authenticity.

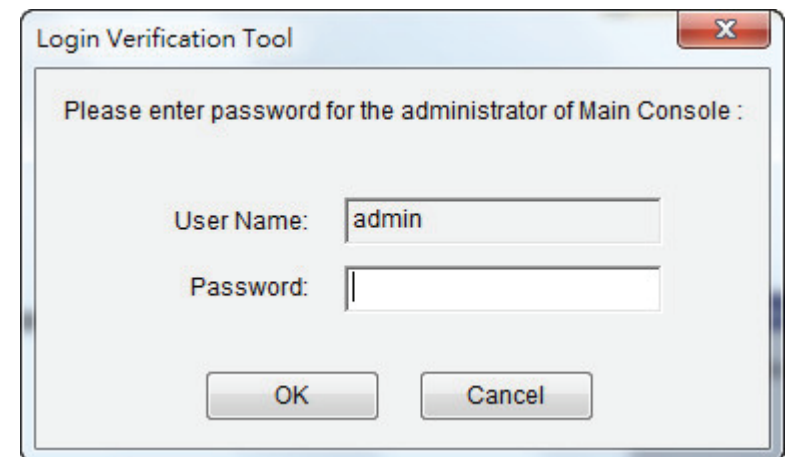
The 3 types of data that is verified by the Verification Tool are:

1. File in (.dat) (.264) format will be displayed as .
2. File in (.avi) (.asf) format will be displayed as .
3. File in (.bmp) (.jpg) format will be displayed as .

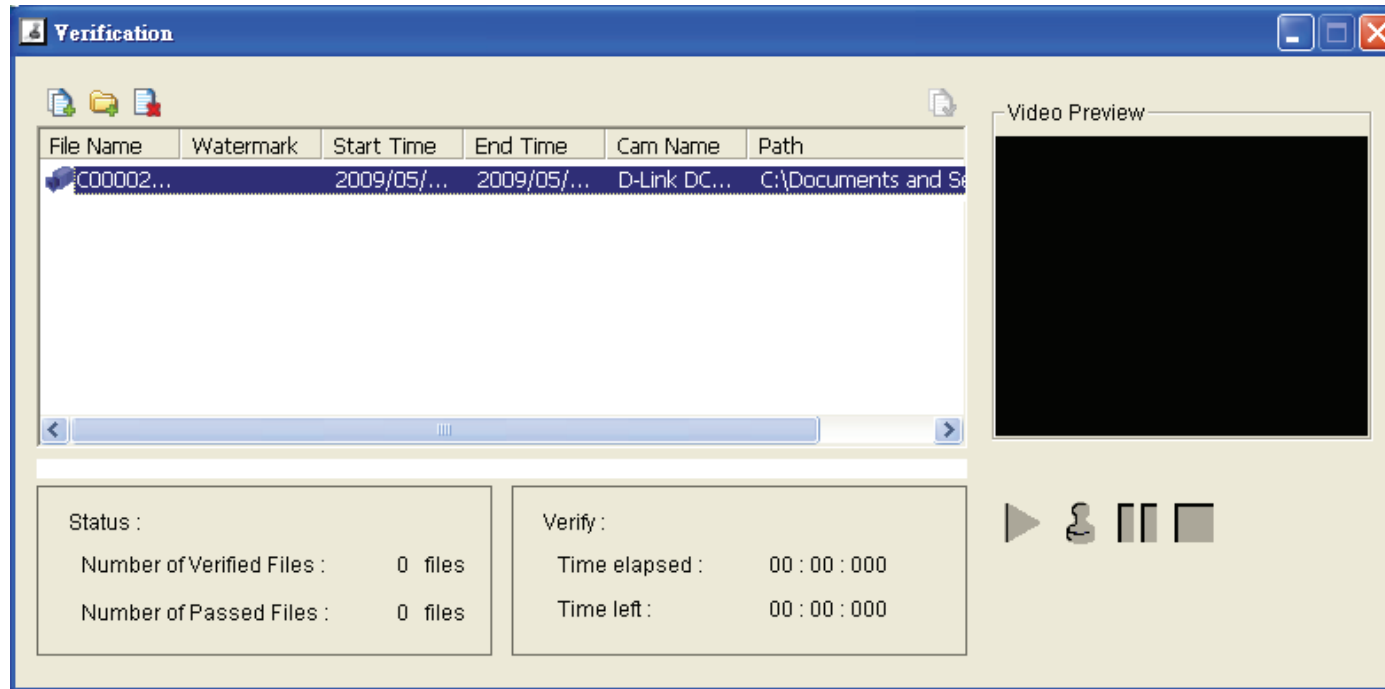
Step 1: Go to **Start > All Programs > D-Link D-ViewCam Plus > Verification Tool**.




Step 2: Enter the **Username** and **Password** to log in.





Overview



 **Add File:** Click to insert a file to the list for verification.

 **Add Folder:** Click to choose a folder with multiple files and then add it to the list for verification.

 **Remove File:** Click to remove the selected file(s) from the list.

 **Select All:** Click to select all the files in the list for verification.

Note:

1. Choose the file type first (.dat, .264, .avi, .asf, .bmp, .jpg) before selecting the files.
2. You can also drag files to the list for verification.

Video Preview: To preview the selected file from the verification list. Use **Play, Verify, Pause** and **Stop** for preview.

Note: Preview of .bmp and .jpg formats are not allowed.

Verifying Image/Video

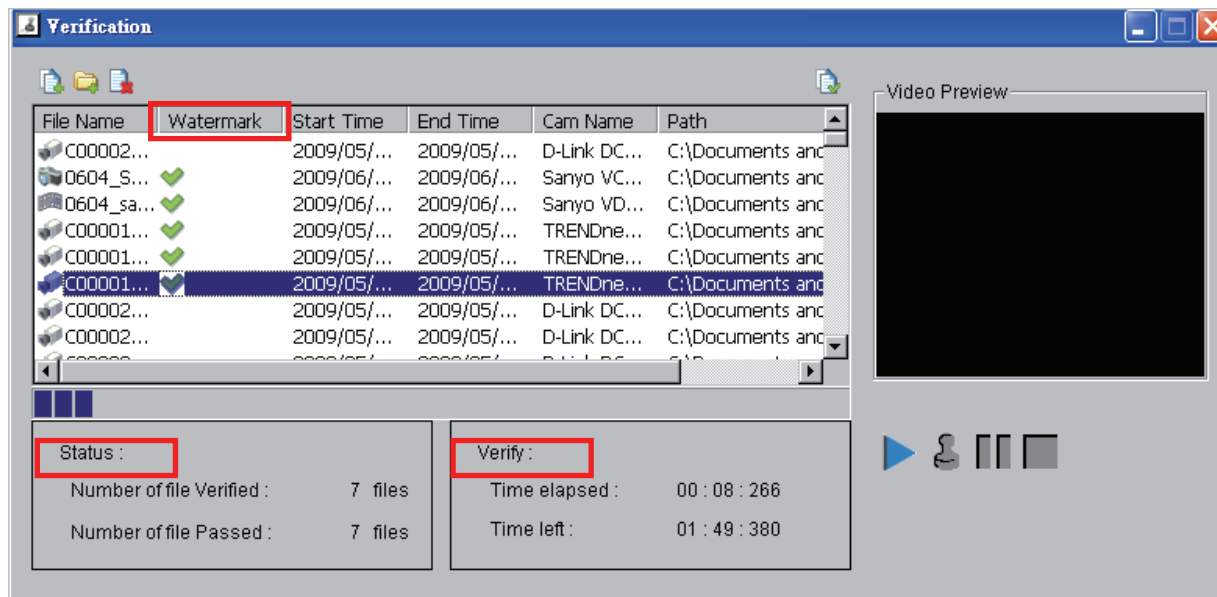
Step 1: Select a single or multiple files for verification.

Step 2: Click verify  to start verification.

Step 3: The verification results will be displayed in the **Watermark** column.

Note: If the file passes the verification, it will show .

Note: If the file was tampered with, it will show .



Step 4: The **Status** and **Verify** fields will display the information related to verification.

License Management Tool

Use the **License Management Tool** to activate the software license from a serial number allocated with the software package, or de-activate the license and activate it again in another PC.

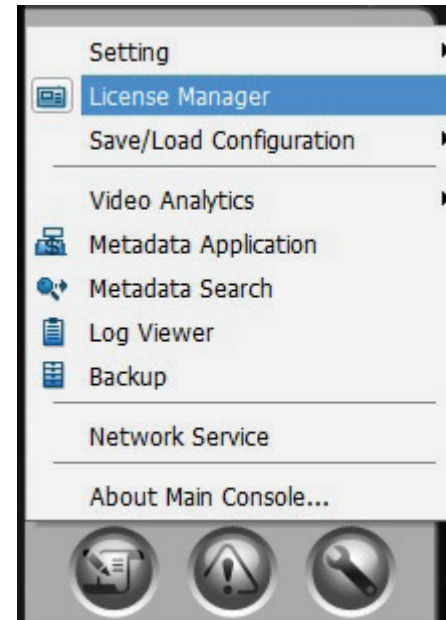
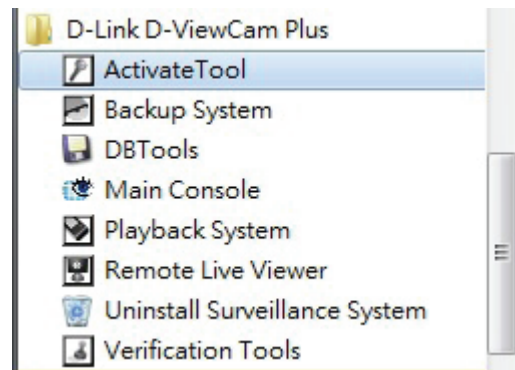
The following lists 4 types of license management process:

- To “activate” the license with PC connected to the network, follow the **Activation On line** process.
- To “activate” the license with PC not connected to the network, follow the **Activation Off line** process.
- To “de-activate/transfer” the license with PC connected to the network, follow the **Transfer On line** process.
- To “de-activate/transfer” the license with PC not connected to network, follow the **Transfer Off line** process.

Overview

Start License Management

Step 1: Click **License Manager** in **General Setting** or click Activate Tool in the installation folder or browse the installation folder and click **Activate Tool.exe**.



The **License Manager Tool** screen displays.

Activate / Transfer License

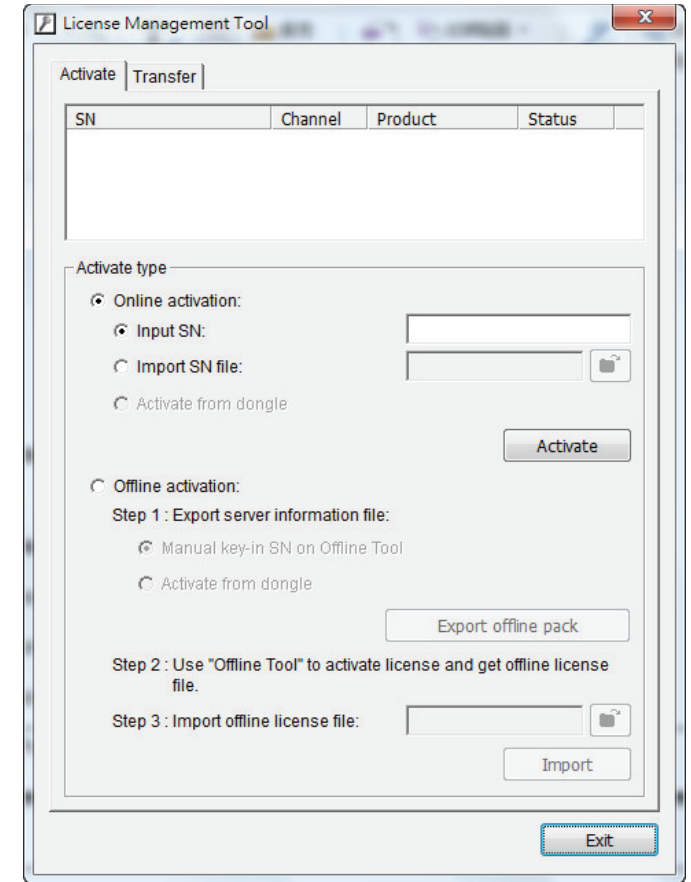
Activation On line

Step 1: Start the **License Manager Tool**.

Step 2: Select **On line** as Activate type.

Step 3: Enter the SN (Serial number) or Import SN file, and then click **Activate**.

Step 4: Restart the Main Console if activation is successful.



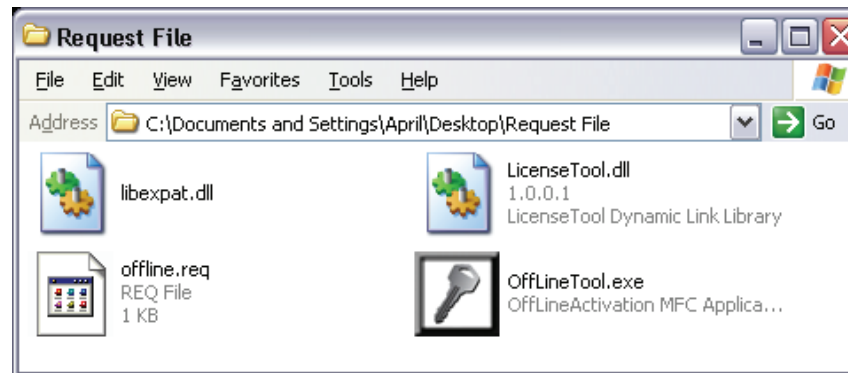
Activation Off line

Step 1: Start the **License Manager Tool**.

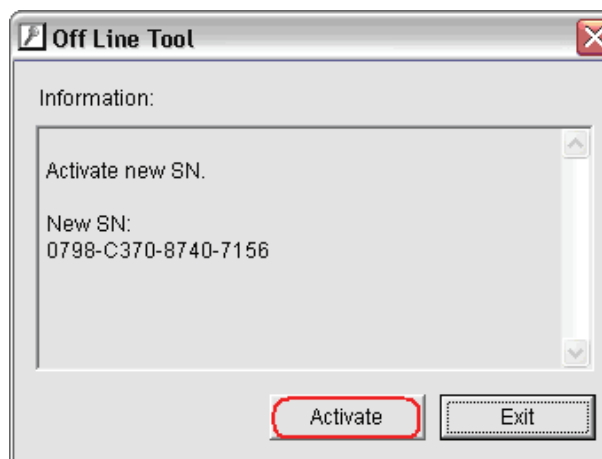
Step 2: Select **Off line** as Activate type.

Step 3: Enter the SN (Serial number) and then click **Activate**.

Step 4: Save the **Request File**, and then copy it to another PC connected to Internet.

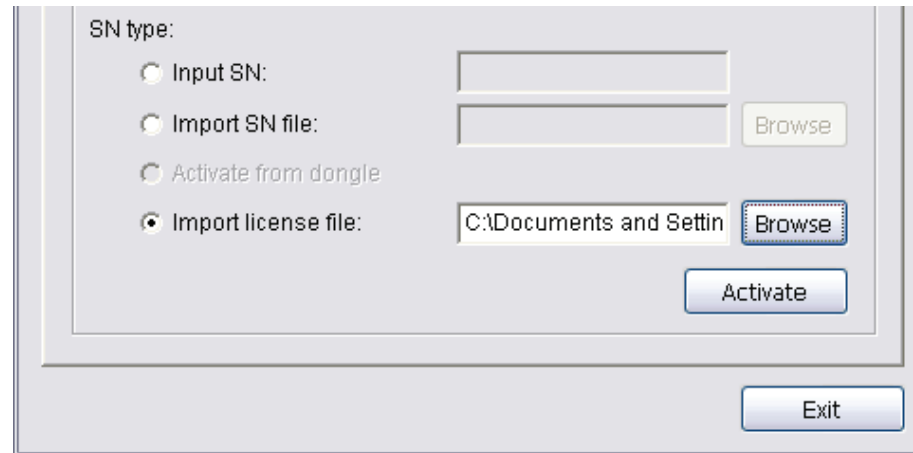


Step 5: Browse and run **Off LineTool.exe** , and then click **Activate** to send the **Request File** to the license server.

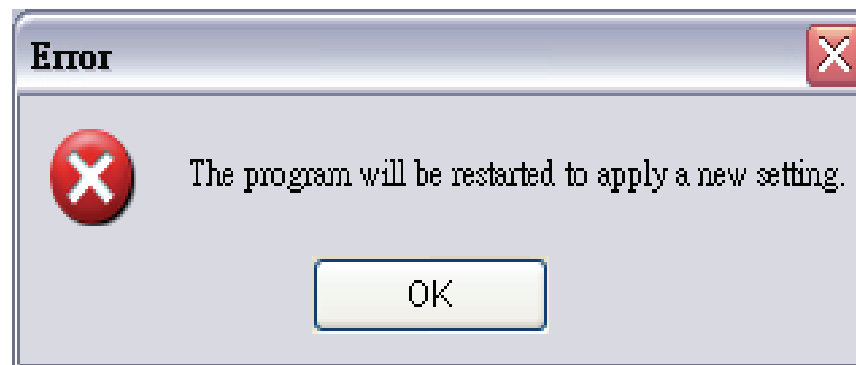


Step 6: Save this License file, and then copy it to the D-ViewCam Plus server.

Step 7: Open **License Manager Tool** again, select **Import license file**, and then click **Activate**.



Step 8: Restart the MainConsole if the activation was successful.



Transfer License

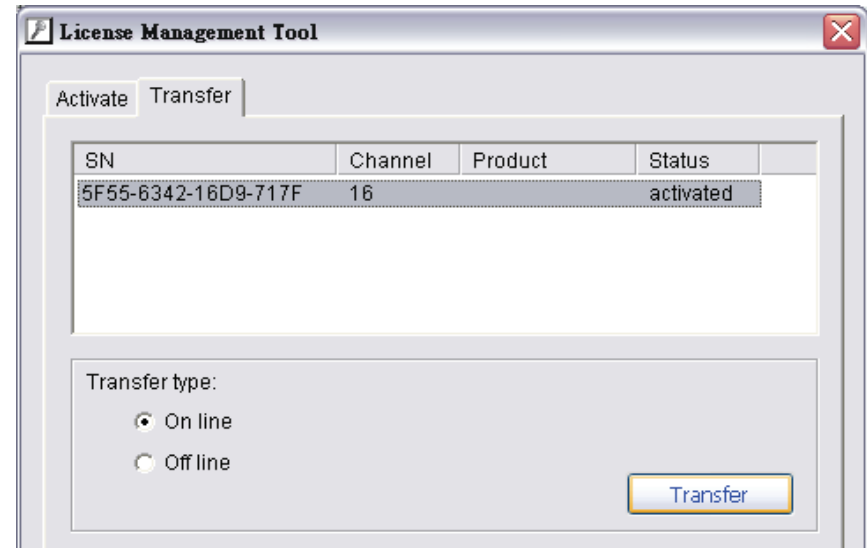
Transfer On line

Step 1: Start the **License Manager Tool**.

Step 2: Select **Transfer**, and then select **On line** as Transfer type.

Step 3: Select your SN (Serial number) and then click **Transfer**.

Step 4: Restart the Main Console if activation is successful.

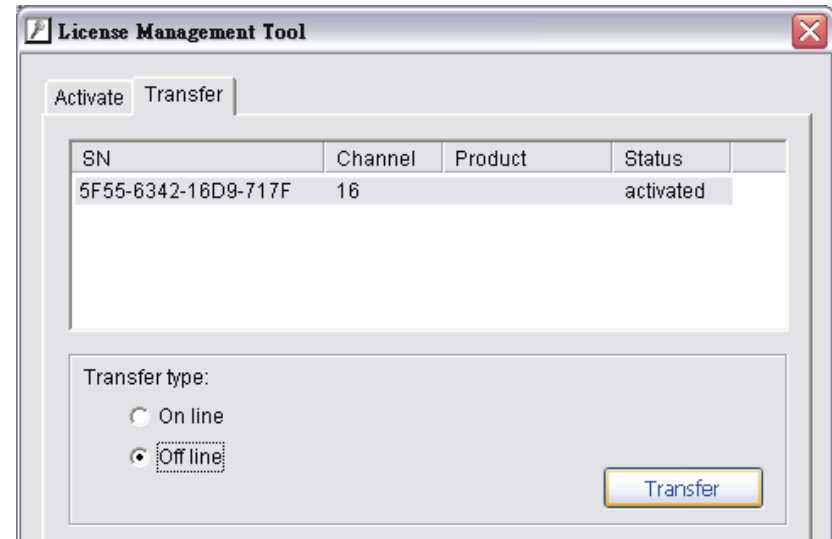


Transfer Off line

Step 1: Start the **License Manager Tool**.

Step 2: Select **Transfer**, and then select **Off line** as Transfer type.

Step 3: Select SN (Serial number) and then click **Transfer**.



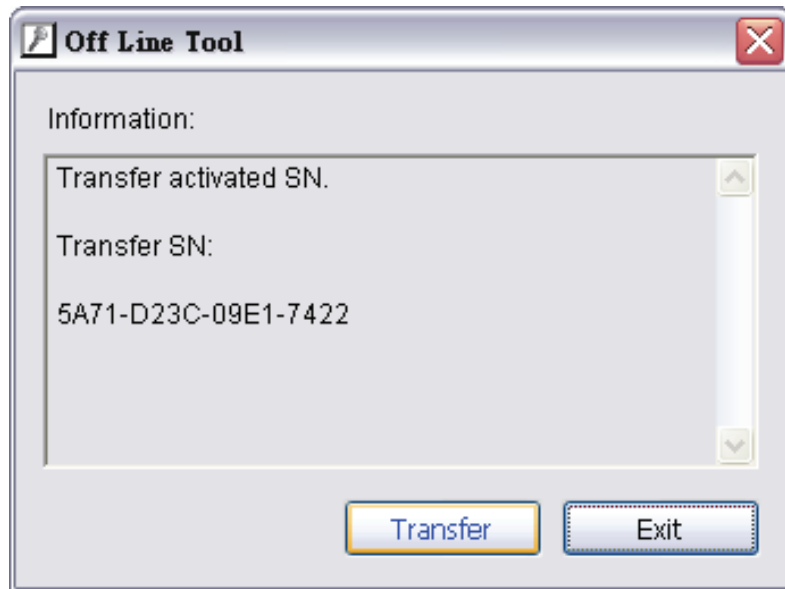
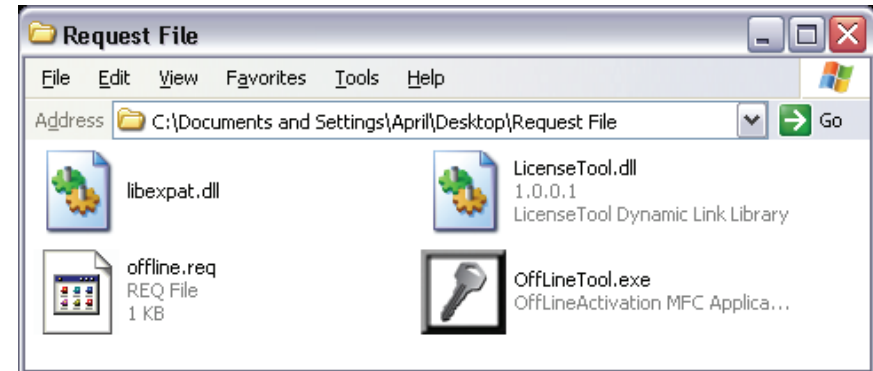
Step 4: Save the **Request File** and restart the MainConsole if activation is successful.

Step 5: Copy the **Request File** to another PC connected to Internet.

Step 6: Run **OffLineTool.exe**, select **Transfer SN** and click **Transfer** to send the **Request File** to the license server.

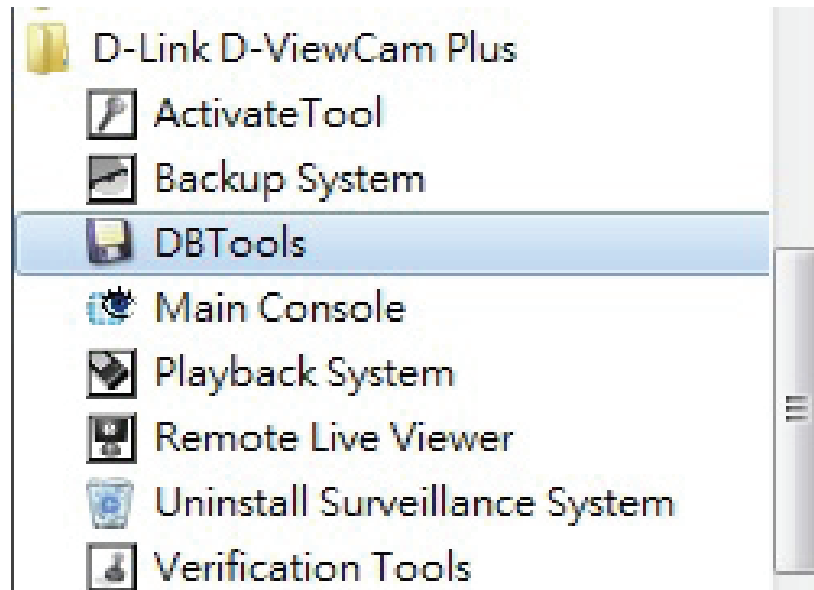
Note: Ensure to copy the request file to another PC and then send it to the license server, otherwise the SN cannot be re-activated again.

Step 7: Check if the transfer is complete.

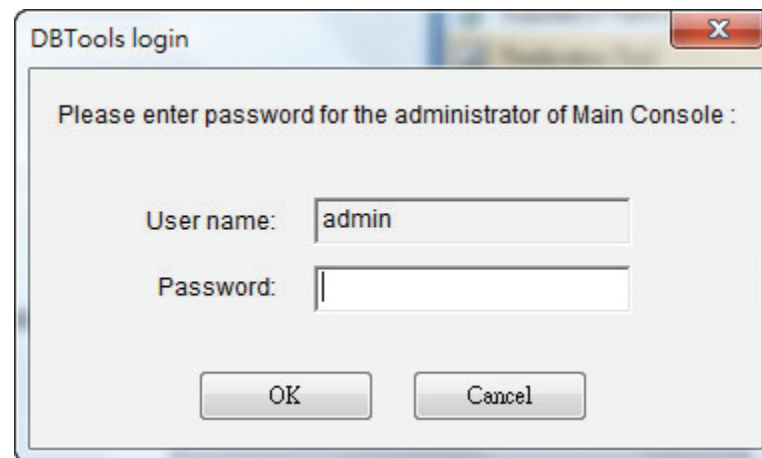


DB Tool

Step 1: Execute DB Tools from the Start menu.



Step 2: Enter the administrator password and click **OK** to log in.



Repair Database

This page has three repair methods: **Modify Location**, **Verify Only**, and **Repair Index and Repair Database**.


Modify Location

Playback system can recognize all recording video in the folders which list on **Main Console > Config > Setting > General** page. For some reason, users need to use the Playback system to open recording video beyond storage location setting.

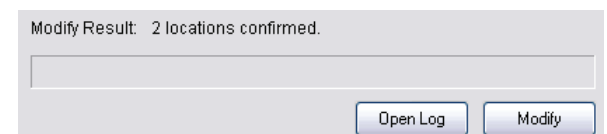
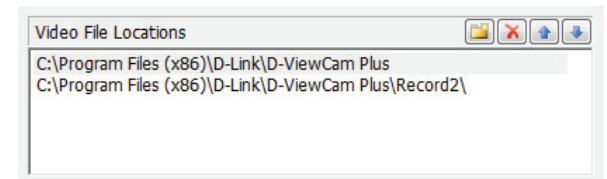
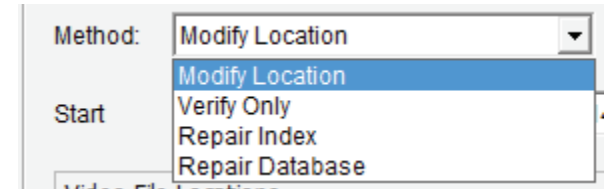
Note: The default storage location is in your installation directory.


Step 1: Select **Modify Location** from the Method drop-down menu.

Step 2: Click on the  button and select a new location.

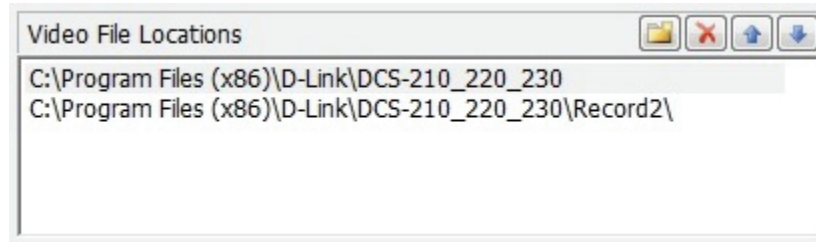
To remove a database location, select it from the list and click on the  button to delete location.

Step 3: Click on the **Modify** button to save the location.



Step 3: Click  and select a new location.

To remove a database location, select it from the list and click  to delete location.



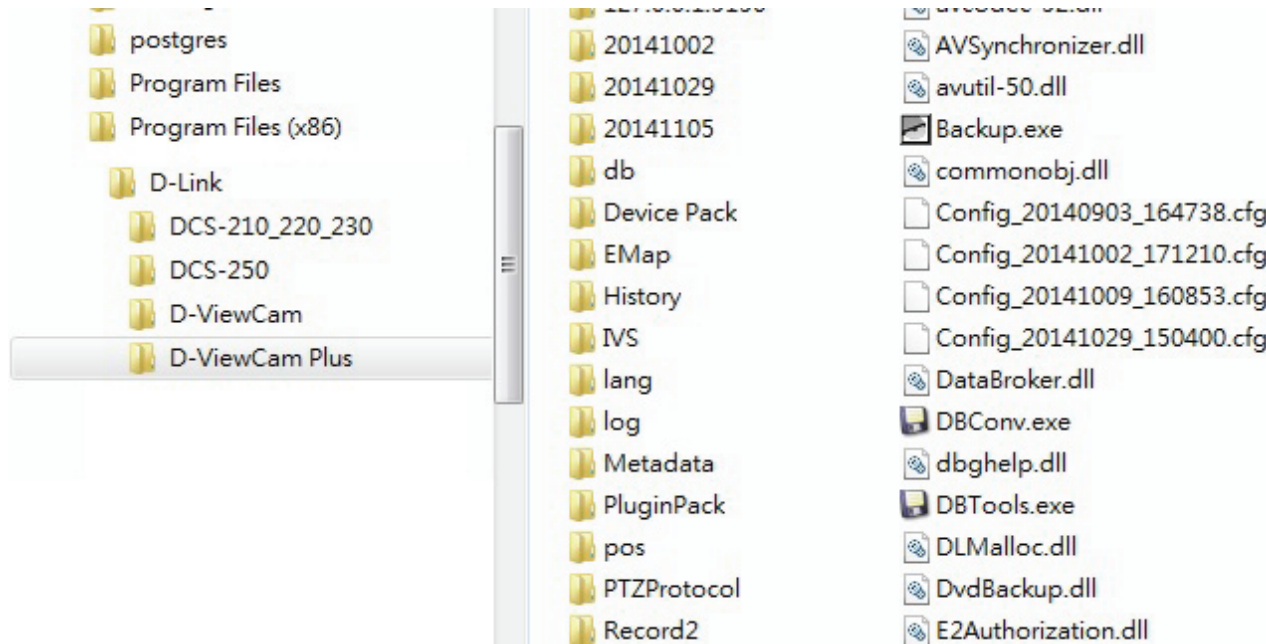
Step 4: Click **Modify** to save the location.



Example of modify database

To transfer video from one PC to another, follow this procedure:

1. Manually copy all recorded video data files from the default installation path or other user-defined storage path of the old PC.



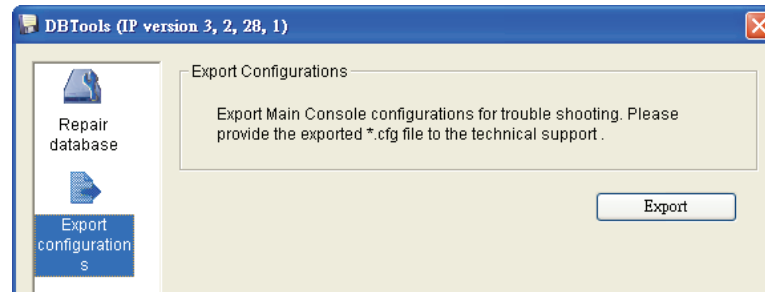
2. Manually paste all recorded video files to the default installation path or other user-defined storage path of the new PC.
3. Follow the previous page to add new location on new PC.
4. Old recorded video data can be viewed by the playback system on the new PC.

Verify and Repair

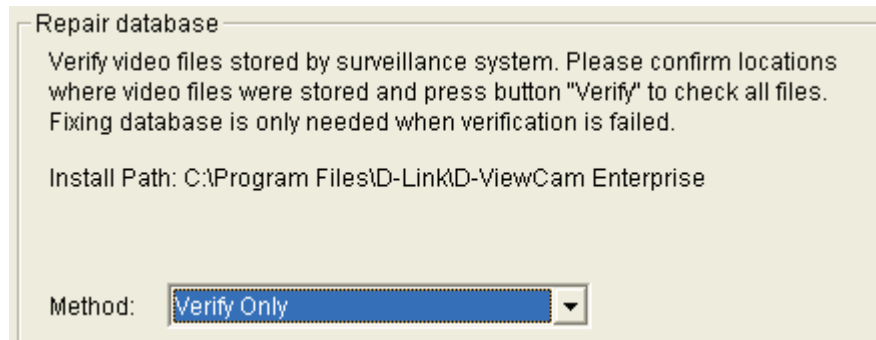
This tool is used to check and repair your database and recording video if the problems below exist:


- (1) If there are records in database, but no video file, use DB Tools to delete records.
- (2) If there are video files but no record in database, use DB Tools to rearrange the database and find these records.

Step 1: Switch to **Repair Database**.



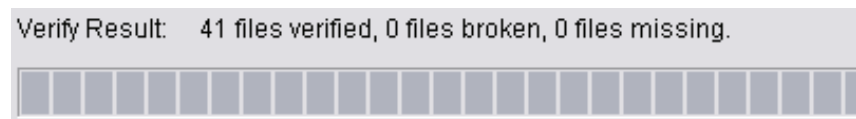
Step 2: Select **Modify Location** from the **Method** drop-down menu.



Step 3: Check the video location. The system will list all the video locations in the table, but if there are any missing locations, please use  to insert a location. After inserting the location, the system will show a file count in the table.



Step 4: Select **Verify Only** and then click **Verify**. This method will only check the files without modifying. The Verify Result will show how many files are broken or missing.



Step 5: Choose the method of Repair (Complete), and click **Repair**. The **Repair Result** will show the number of files that are fixed and inserted.

Repair Result: 2 files fixed, 41 files inserted.

Step 6: The repair new database will replace the old ones. The original database will change file names with extended repair date and time as shown below.

Name
EventLog.mdb
FileRecord.mdb
FileRecord.mdb_20080714A121358.mdb
PosRecord.mdb
ScheduleConfig.mdb
SystemLog.mdb
SystemLog.mdb_20080714A121358.mdb

Note: Open Log is a tool to record repair database recodes. It will recode repair method, file operation, start time, and end time.

```

dbtool.log - Notepad
File Edit Format View Help
-----
Operation "Verify Only" is started at (2008/07/14 12:01:17)
File Broken: D:\Video\20080708\c00002\c00002s00A20080708112323437.dat
File Broken: D:\Video\20080708\c00002\c00002s00A20080708114304625.dat
41 files verified, 2 files broken, 0 files missing.
Operation "Verify Only" is finished at (2008/07/14 12:01:19)

-----
Operation "Verify Only" is started at (2008/07/14 12:13:19)
File Broken: D:\Video\20080708\c00002\c00002s00A20080708112323437.dat
File Broken: D:\Video\20080708\c00002\c00002s00A20080708114304625.dat
41 files verified, 2 files broken, 0 files missing.
Operation "Verify Only" is finished at (2008/07/14 12:13:20)

-----
Operation "Repair (Complete)" is started at (2008/07/14 12:13:58)
File Repaired: D:\Video\20080708\c00002\c00002s00A20080708112323437.dat
File Repaired: D:\Video\20080708\c00002\c00002s00A20080708114304625.dat
2 files fixed, 41 files inserted.
Operation "Repair (Complete)" is finished at (2008/07/14 12:14:07)

```

Remote Desktop Viewer

How to install Remote Desktop Viewer

Step 1: Download the DCS-250 software from <http://download.hq.dlink.com/DCS-250/> and extract it to a folder.

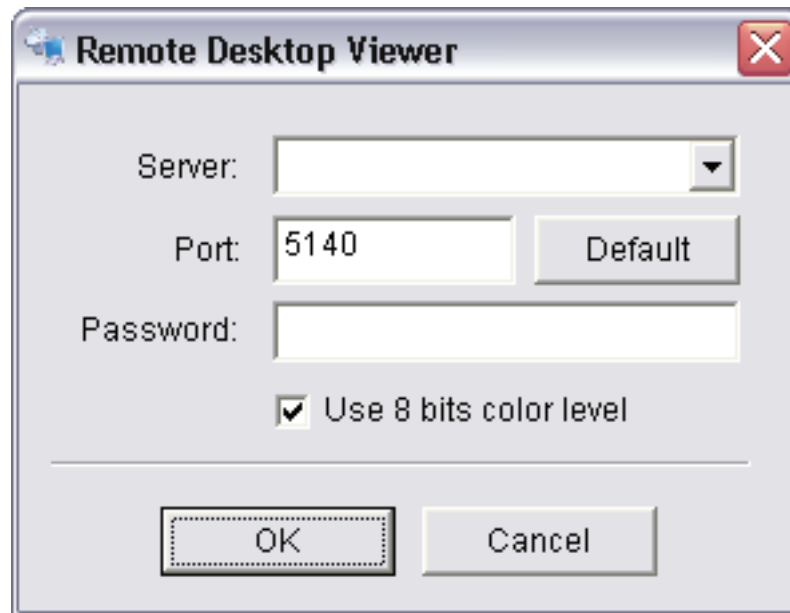
Step 2: In the newly created folder, open the **RemoteDesktopViewer** folder and run the **Setup.exe** file.

How to Start Remote Desktop Viewer

Step 1: Go to **Start > All Programs > Remote Desktop Viewer > Remote Desktop Viewer**.

Step 2: Please enter the address, Port, and Password of the server and enable **Use 8 bits color level** to show steadier screen.

Step 3: Click **OK** to start Remote Desktop.



Intelligent Video Surveillance (IVS) Software

The Intelligent Video Surveillance(IVS) software provides cutting-edge instant video analysis by tracking both moving objects and static targets while factoring environmental changes.

There are two different IVS licenses available: the Counting License and the Presence License. For information on how to register your IVS license key and activate the IVS features, refer to “License Management Tool” on page 174.

Feature	Counting License	Presence License
Number Of Detection Zones Or Lines	40	40
Object Counting	✓	
Tamper Detection	✓	✓
Camera Shake Cancellation		✓
Presence Filter		✓

Object Counting: This provides a bi-directional line-crossing filter, suitable for counting people in busy doorways and entrances.

Tamper Detection: Detects any event that significantly changes the field of view of a camera, such as a loss of focus, the camera being covered, etc.

Camera Shake Cancellation: In environments where stability is an issue, this helps compensate for any movement, providing a clear view.

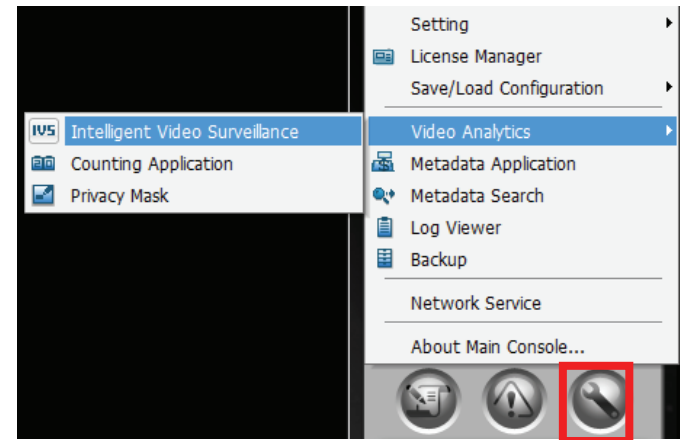
Presence Filter: Detects when an object or individual has entered a defined area.

Accessing the IVS Interface

Step 1: To access the IVS interface, double-click the camera you want to analyze video for.



Step 2: Click the General Setting button. In the menu that appears, select **Video Analytics**, then click **Intelligent Video Surveillance** to open the IVS window.

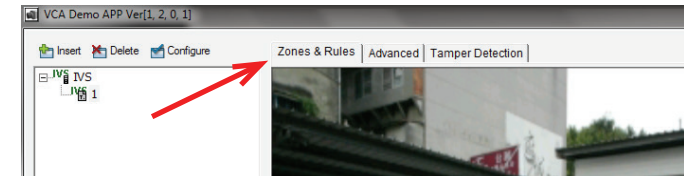


Zones & Rules

In order to make detection zones and lines useful, it is essential that you define the zones and the rules used to monitor them. The Zones & Rules tab lets you fine tune the detection zones and detection rules.

Accessing the Zones & Rules Settings

Open the IVS interface and click on the **Zones & Rules** tab.

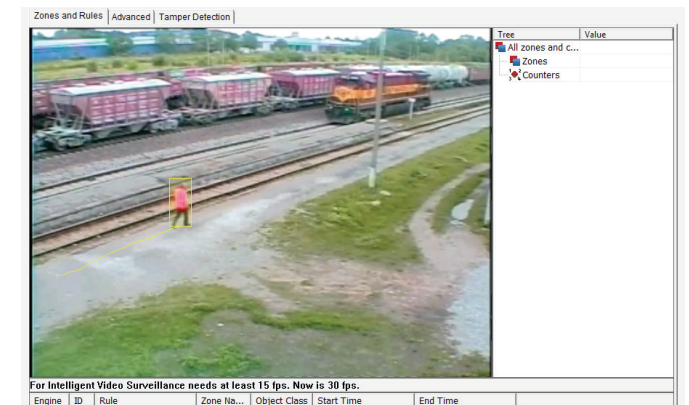


The Tracking Display

Alarmed Object: Moving objects which enter or have entered detection zones will be overlaid in red.

Non-alarmed object: Moving objects which have not entered predefined detection zones will be overlaid in yellow.

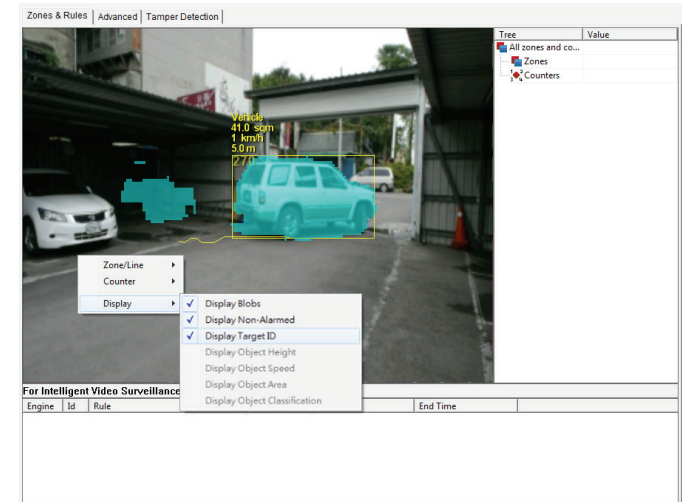
The tracking display also overlays a yellow guide path indicating the movement trails of objects.



Customizing the Tracking Display

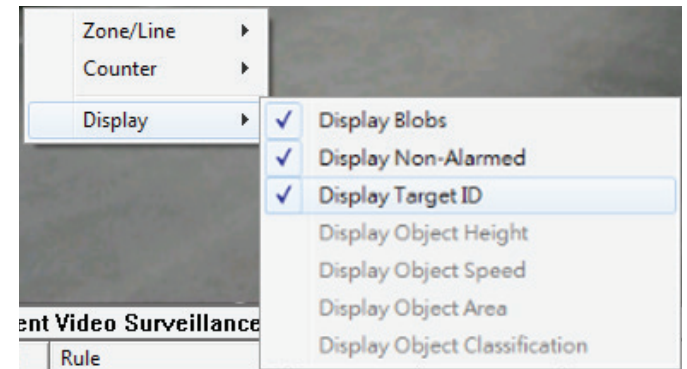
You can customize the tracking display window to show various tracking data.

Step 1: Right-click on the tracking display window, then select **Display** from the menu that appears.



Step 2: Here, you can choose whether or not to display specific tracking information.

Setting	Description	Default Setting
Display Blobs	Shows the algorithm coverage with a turquoise-colored blob.	Disabled
Display Non-Alarmed Objects	Displays all objects, including alarmed and non-alarmed objects, to show how the detection zones and object trails intersect in order to assist you with optimizing your detection settings. Alarmed objects are marked red, and non-alarmed objects are marked yellow.	Enabled
Display Target ID	Displays the object's ID number to help differentiate detected objects.	Disabled

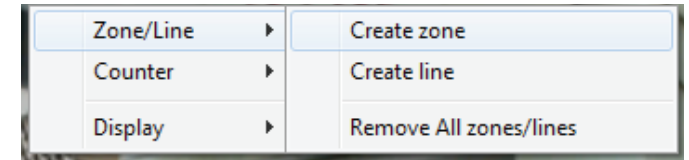


Creating Detection Zones and Lines

You can define detection zones and lines to help detect events of interest.

Creating a Zone or Line

Right-click on the video image, select **Zone/Line**, then click on **Create zone** or **Create line**.



Editing a Zone or Line

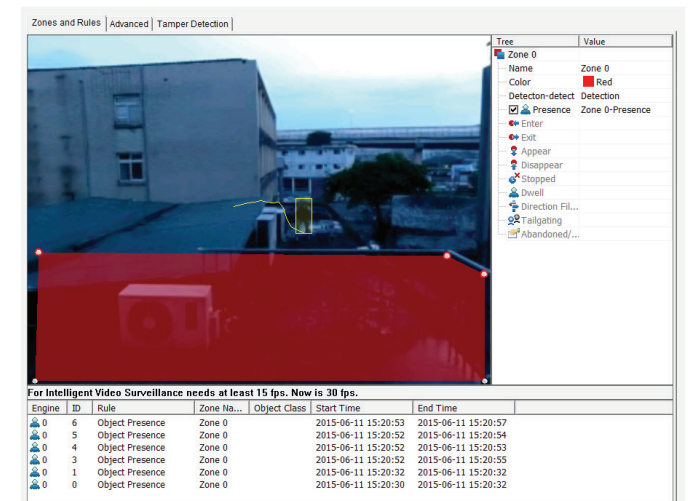
You can change the shape or size of a detection zone or line by clicking and dragging on their “nodes” at their corners.

Adding a Node

To add a node, double-click on the zone or line at the point where you want to add a new node. Alternatively, you can right-click on the area or line where you want to add a new node, select **Node** from the menu that appears, and click **Insert Node**.

Removing a Node

To remove a node, right click on the node, select **Node** from the menu that appears, and click **Remove Node**.



Detection Properties

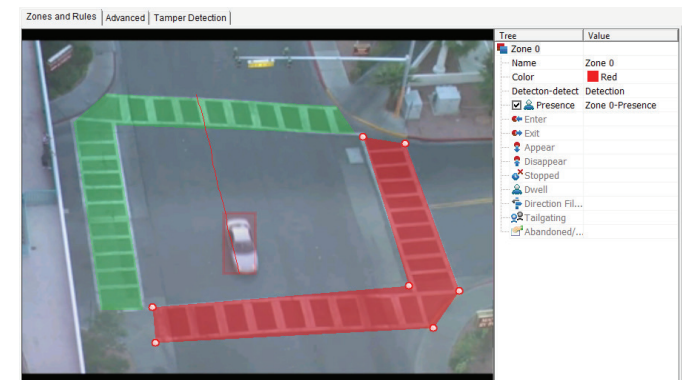
When you select a detection zone or line, the properties for it will appear on the right side of the tracking display. You can click on a property to change its values, or you can click on a checkbox to enable or disable a detection option.

Each detection zone and line has the following properties:

Setting	Description	Default Setting
Name	Enter a name to help you identify the zone or line.	Zone [ID No.]
Color	Select a color to use for the zone or line.	Red
Detect/non-detect	Set whether the zone or line is to be used for detection. When a zone is set to Non-Detection, it will not be used for tracking or detection. This can be useful for preventing false alarms, such as foliage moving in the wind. Non-Detection areas will have a grid of Xs through them when shown in the tracking display.	Detection

If you have an IVS Presence License, you can choose to enable this feature to trigger an alarm when an object is present inside a detection zone, or if an object passes through a detection line.

Tree	Value
Zone 0	
Name	Zone 0
Color	Red
Detection-detect	Detection
<input checked="" type="checkbox"/> Presence	Zone 0-Presence
Enter	
Exit	
Appear	
Disappear	
Stopped	
Dwell	
Direction Fil...	
Tailgating	
Abandoned/!	

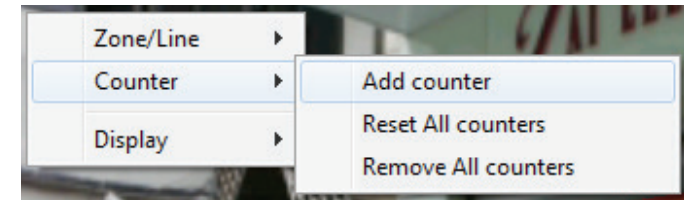


Counters

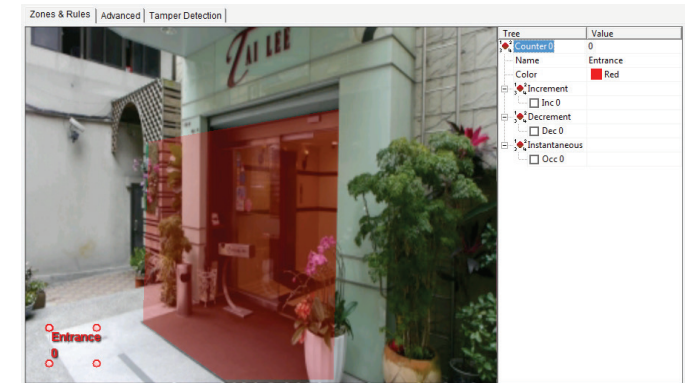
If you have a Counting License, you can create an on-screen counter to show how many alarms have been triggered by objects entering a specified detection zone or crossing a specified detection line. Counters can also show how many objects are currently in a specified detection zone or crossing a specified detection line.

Creating a Counter

Right-click on the tracking display, select **Counter**, then click **Add counter**.





A counter will be added to the video image. You can click and drag it to move it to a desired position, and you can click and drag its corners to resize it. After creating a counter, you can adjust its properties on the right side of the screen to define its behavior. These properties are described on the next page.



Counter Properties

When you have a counter selected, you can adjust its properties and how it will adjust its count.

Setting	Description
Counter #	This is the current value of the counter.
Name	Enter a name to help you identify this counter.
Color	Select a color to use for this counter.
Increment	Increases the counter each time an object enters the specified detection zone or crosses the specified detection line.
Decrement	Decreases the counter each time an object enters the specified detection zone or crosses the specified detection line.
Instantaneous	This will set the counter to display the number of objects that are currently in the specified detection zone or crossing the specified detection line.

Tree	Value
1 2 3 4 Counter 0	30
Name	Entrance
Color	 Red
1 2 3 4 Increment	
<input checked="" type="checkbox"/> Inc 0	 Zone 0 : Enter
<input type="checkbox"/> Inc 1	
1 2 3 4 Decrement	
<input type="checkbox"/> Dec 0	
1 2 3 4 Instantaneous	
<input type="checkbox"/> Occ 0	

Advanced IVS Configuration

The Advanced tab on the IVS interface allows you to adjust various settings related to video stabilization and how alarms, object detection, and counting are performed.

Accessing the Advanced Settings

To access the advanced settings, click on the **Advanced** tab in the IVS interface.

Advanced Settings

The settings available may include the following:

Setting	Description
Camera Shake Compensation	<p>Enabling this feature can help improve IVS performance if your cameras are installed in vibration-prone locations.</p> <p>If camera shake is not an issue for your cameras, this setting should be disabled.</p>
Alarm Retrigger Time	<p>After an alarm is triggered by an object, this sets the delay before another alarm can be triggered by the same object.</p>
Tracker Configuration	<p>This sets how large an object must be in order to track it, and how long to track an object for after it stops moving.</p> <p>Minimum tracked object size: This sets the minimum size for an object in order for IVS to track it. You can lower this value to track smaller objects, but this may result in more false detections and sacrifices noise immunity. Normally, there is no need to change this value.</p> <p>Object hold on time: This sets the amount of time to track an object after it stops moving. After this time expires, IVS will forget the object.</p>
Counting Runtime	<p>Reset every: This sets a daily time to reset the counters.</p> <p>Log every: This sets how often IVS will save the current counter values to a log file.</p>

The screenshot shows the 'Advanced' tab selected in the IVS interface. The settings are organized into four sections:

- Camera Shake Compensation:** A checkbox labeled 'Enable Camera Shake Cancellation' is currently unchecked.
- Alarm Retrigger Time:** The 'Alarm Holdoff time' is set to 5 seconds.
- Tracker Configuration:** The 'Minimum tracked object size' is set to 10 Pixel, and the 'Object hold on time' is set to 60 Second.
- Counting Runtime:** The 'Reset every' dropdown is set to 01:00 AM, and the 'Log every' dropdown is set to 30 mins.

Tamper Detection

Tamper Detection lets you detect events when the camera's view has been significantly changed or altered. This can be useful for detecting events like the camera view being blocked, the camera being defocused, redirecting the camera, spray-painting of the camera, etc. Tamper Detection relies on large, persistent changes in the video image.

Accessing Tamper Detection

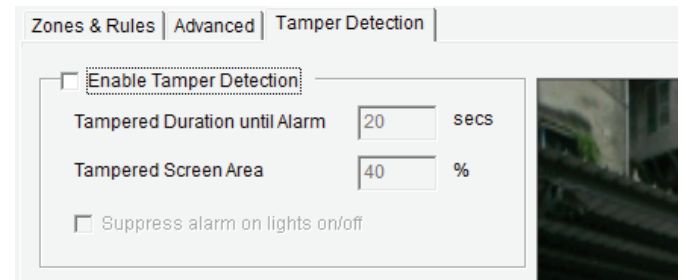
To access the Tamper Detection settings, click on the **Tamper Detection** tab in the IVS interface.

Zones & Rules | Advanced | Tamper Detection

Tamper Detection Settings

The settings available may include the following:

Setting	Description
Enable Tamper Detection	This will enable or disable the Tamper Detection feature.
Tampered Duration until Alarm	Sets how long the camera's view must be changed for before an alarm is triggered to indicate tampering. Short times will give you faster notification of possible tampering, but may result in false positives.
Tampered Screen Area	This sets how much of the video image must change to trigger an alarm. Smaller values will make detection more sensitive, but may result in false positives.
Suppress alarm on lights on/off	Enabling this will help IVS filter out situations where there may be rapid changes in the lighting of the environment, such as turning indoor lighting on/off, to prevent false detection of tampering. Enabling this setting will sacrifice some detection sensitivity, so if your cameras are not viewing an area that may have fast lighting changes, this setting should be disabled.

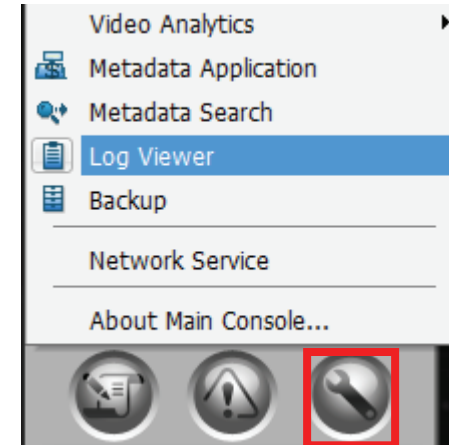


IVS Log Viewer

IVS works with D-ViewCam's Log Viewer to record detected events and alarms. You can also export these logs to file.

Accessing the Log Viewer

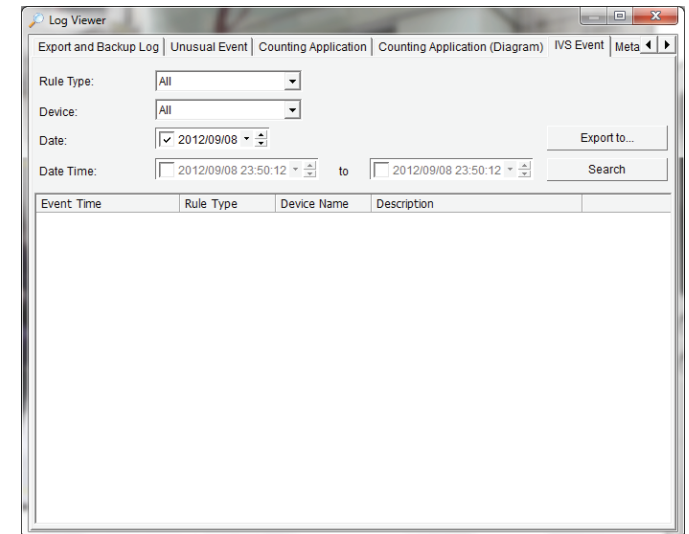
From D-ViewCam's Main Console, click the General Setting button, then select **Log Viewer** from the menu that appears.



The Log Viewer window will open. IVS adds three tabs to the Log Viewer: **Counting Application**, **Counting Application (Diagram)**, and **IVS Event**.

Counting Application	Shows a log of the IVS counter values during a specified period of time.
Counting Application (Diagram)	Shows a bar graph of the IVS counter values during a specified period of time.
IVS Event	Shows a log of events detected by IVS.

The contents of these tabs are described in the following pages.

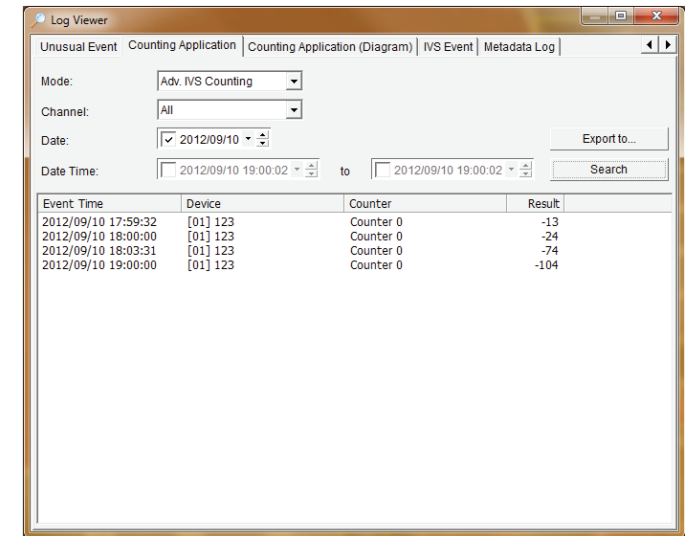


Counting Application

This tab shows a log of the IVS counter values during a specified period of time.

To view a log of your IVS counter activity:

- Step 1:** Use the **Mode** dropdown box to select whether you want **Basic Counting** or **Adv. IVS Counting**.
- Step 2:** Use the **Channel** dropdown box to select which channel you want to see activity for, or if you want a log for **All** channels.
- Step 3:** Select the period of time you want to search for. Select **Date** if you want to show activity for a specific day, or select **Date Time** and enter the period of time you want.
- Step 4:** Select **Search** to show the search results. You can click the **Export to...** button to export the log to an .xls or .txt file.

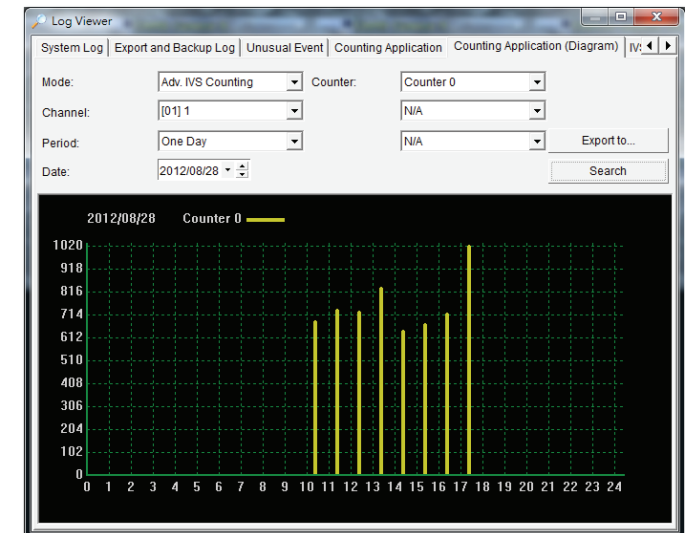


Counting Application (Diagram)

This tab shows a bar graph of the IVS counter values during a specified period of time.

To view a graph of your IVS counter activity:

- Step 1:** Use the **Mode** dropdown box to select whether you want **Basic Counting** or **Adv. IVS Counting**.
- Step 2:** Use the **Channel** dropdown box to select which channel you want to see activity for.
- Step 3:** Use the **Period** dropdown box to select the period of time you want to search for, then set the **Date** you want to see activity from.
- Step 4:** Use the **Counter** dropdown boxes to select which counters you want to see activity for. You can select up to 3 counters. Please note that if you select a counter that uses instantaneous counting, the counter value that will be displayed will be the last value recorded during the selected period.
- Step 5:** Select **Search** to show the search results. You can click the **Export to...** button to export the graph to a .bmp file.

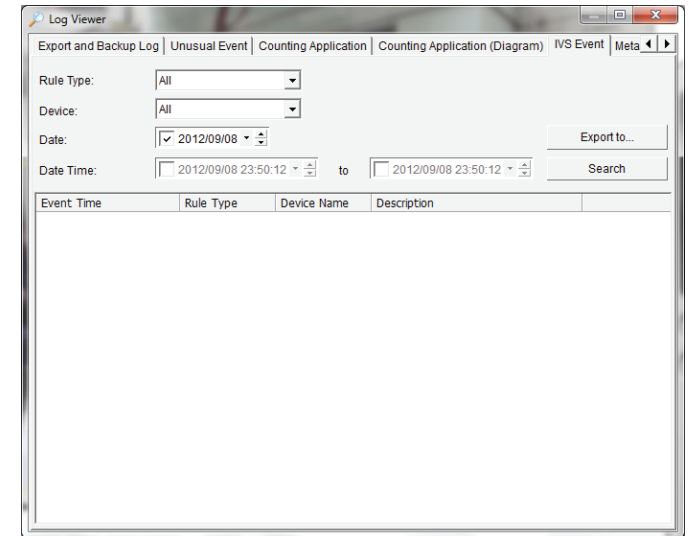


IVS Events

This tab shows events recorded by IVS.

To view a log of events recorded by IVS:

- Step 1:** Use the **Rule Type** dropdown box to select what type of event to view, or select **All** to view all event types.
- Step 2:** Use the **Device** dropdown box to select which camera you want to see activity for.
- Step 3:** Select the period of time you want to search for. Select **Date** if you want to show activity for a specific day, or select **Date Time** and enter the period of time you want.
- Step 5:** Select **Search** to show the search results. You can click the **Export to...** button to export the log to an .xls file.



Frequently Asked Questions

1. What languages does the D-ViewCam Plus software support?

Albania	Bulgarian	Chinese (Simplified)	Chinese (Traditional)	Croatian
Czech	Danish	Dutch	English	Farsi
Finnish	French	German	Hebrew	Hungarian
Italian	Japanese	Korean	Norwegian	Polish
Portuguese (Brazil)	Portuguese (Portugal)	Romanian	Russian	Serbian
Slovak	Slovenian	Spanish	Swedish	Thai
Turkish				

2. How do I set up E-Map?

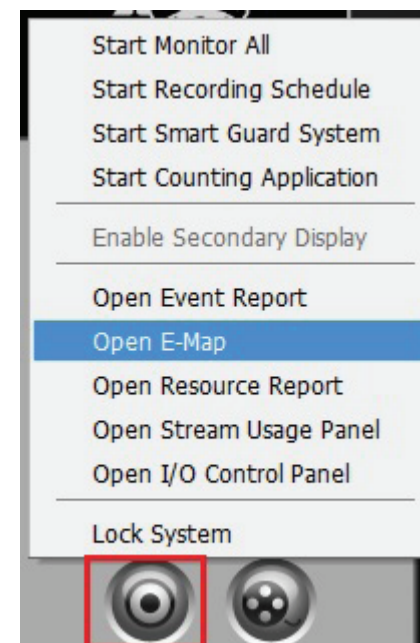
Go to **Main Console > Start Monitor** and then click **Open E-map**.

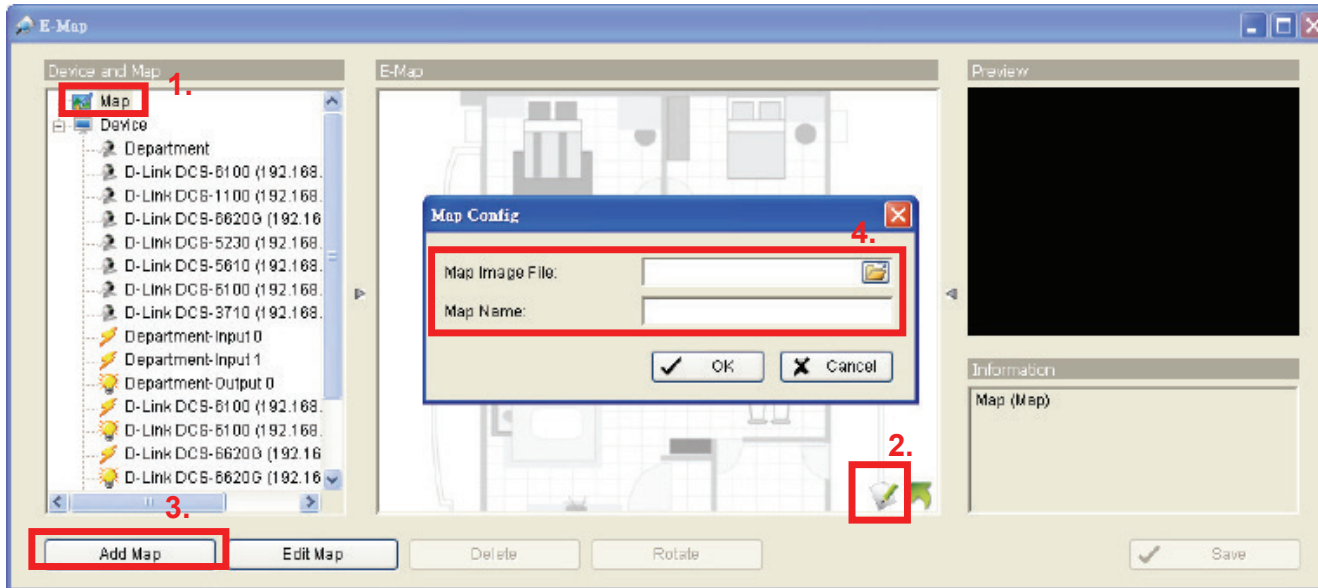
Step 1: Select the map.

Step 2: Click **Browser/Edit Mode**.

Step 3: Click **Add Map**.

Step 4: Choose a map and then enter the map name.

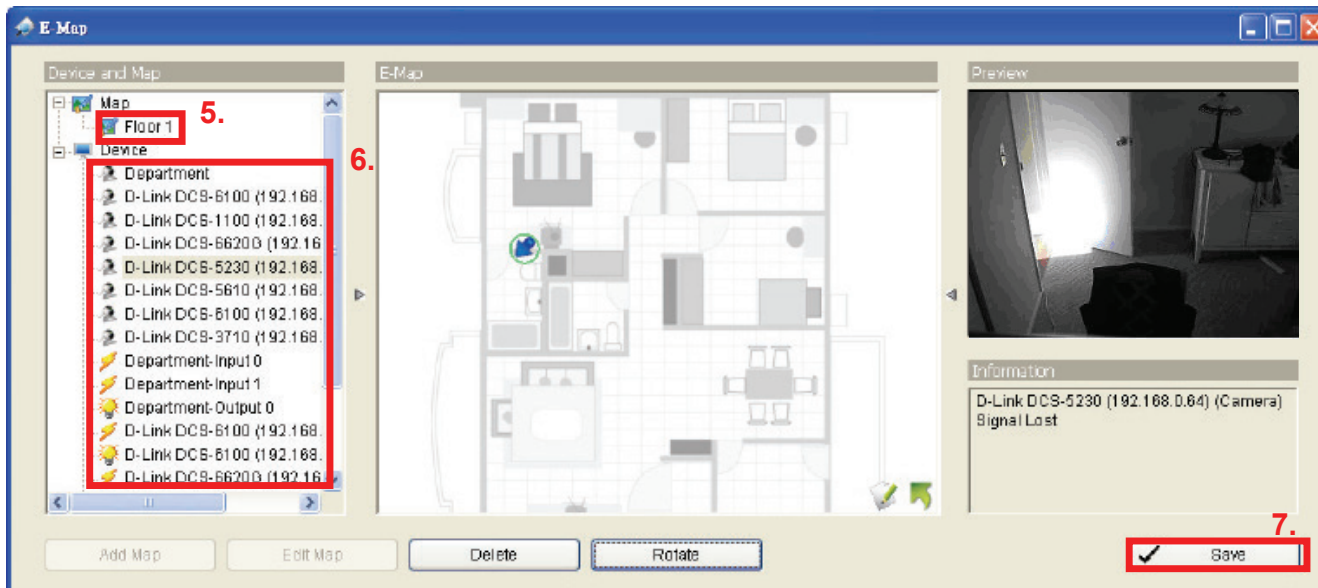




Step 5: Select the Map that you earlier set.

Step 6: Drag and drop the camera or IO device to the map.

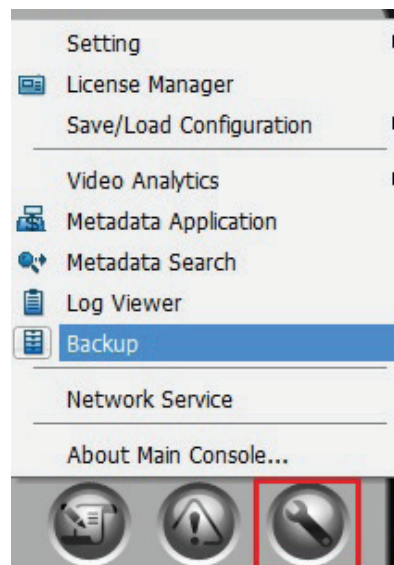
Step 7: Click **OK** to save your settings.



3. How do I backup video files?

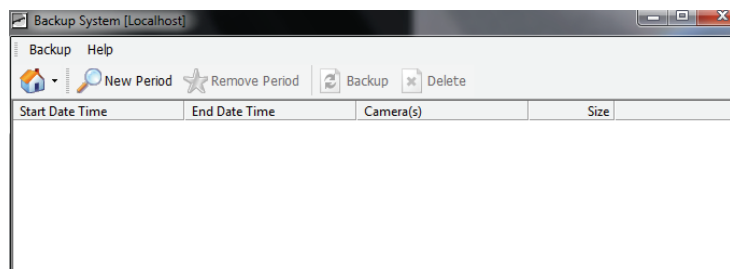
The system allows you can backup video record files into CD/DVD or other drives, and view those videos via playback.exe which will also be saved in the backup folder.

Follow these steps to backup your video:



Step 1: Go to **Main Console > General Setting > Backup.**

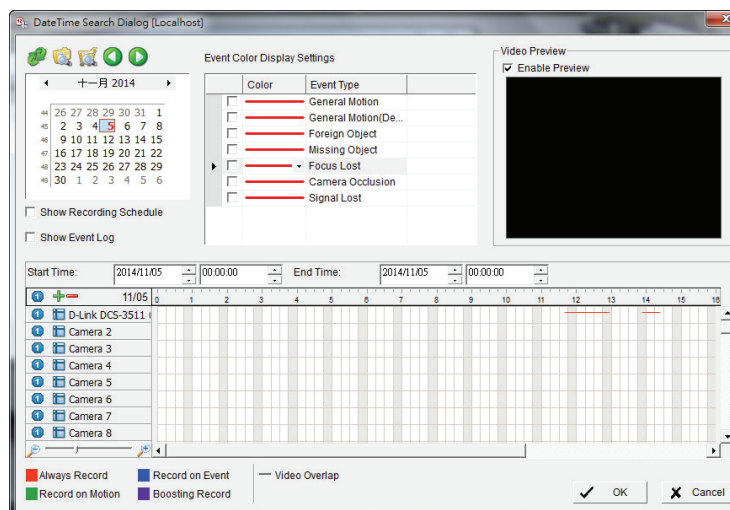
Step 2: Click **New Period.**



Step 3: Set the **Start** and **End Time.**

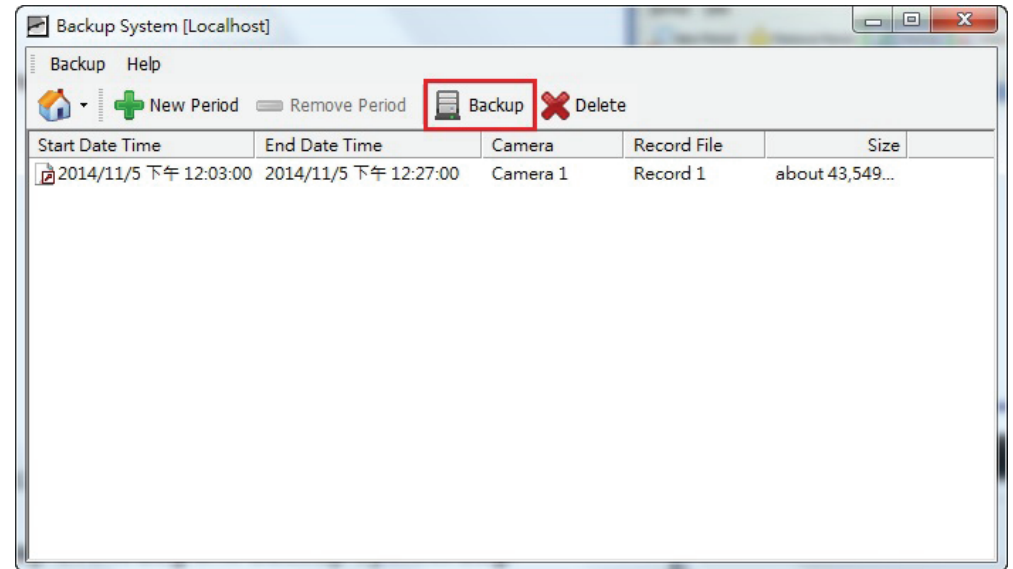
Step 4: Select the cameras that you want to backup.

Step 5: Click **OK.**



Step 6: Click **Backup**.

Step 7: Click **New Period**.

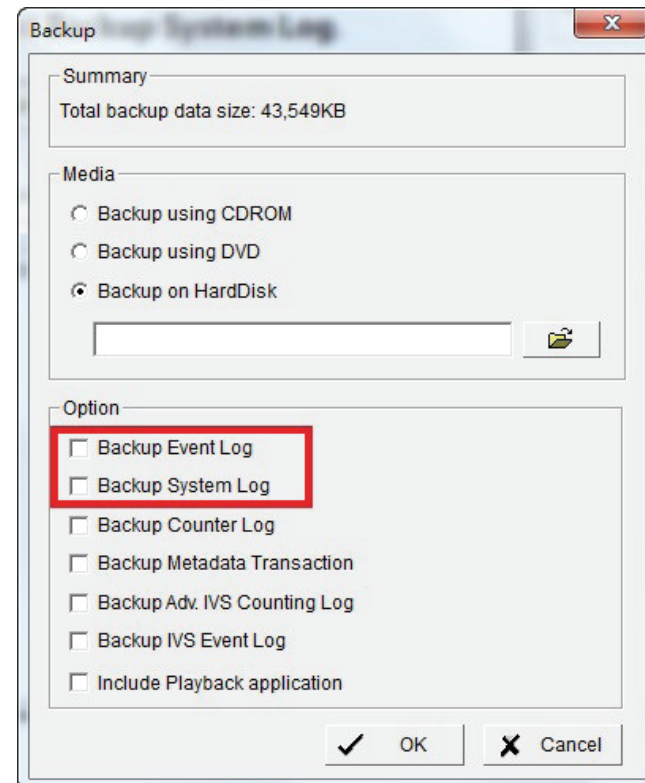


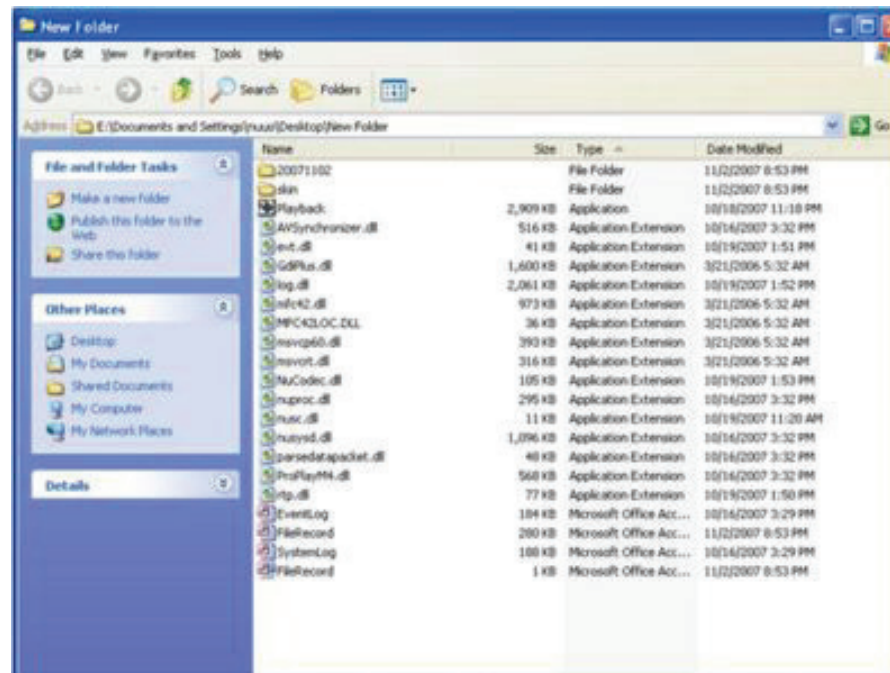
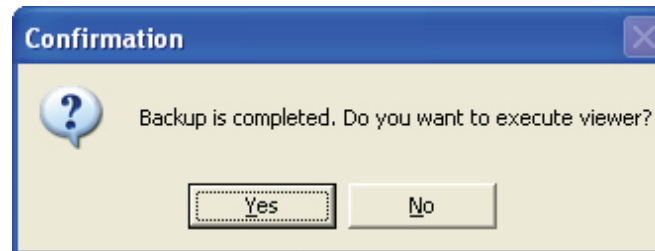
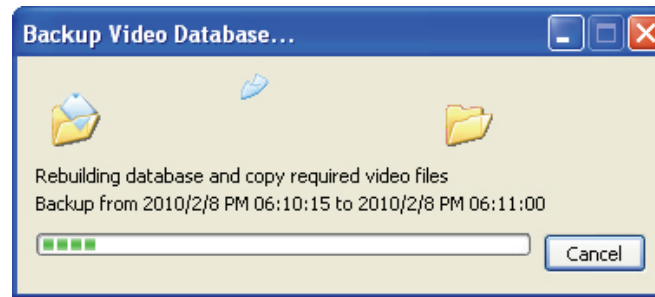
Step 8: Choose a location to backup media.

Step 9: Select **Backup Event Log** and **Backup System Log**.

Step 10: Click **OK**.

Step 11: You can now execute the playback.exe to check your backup files.



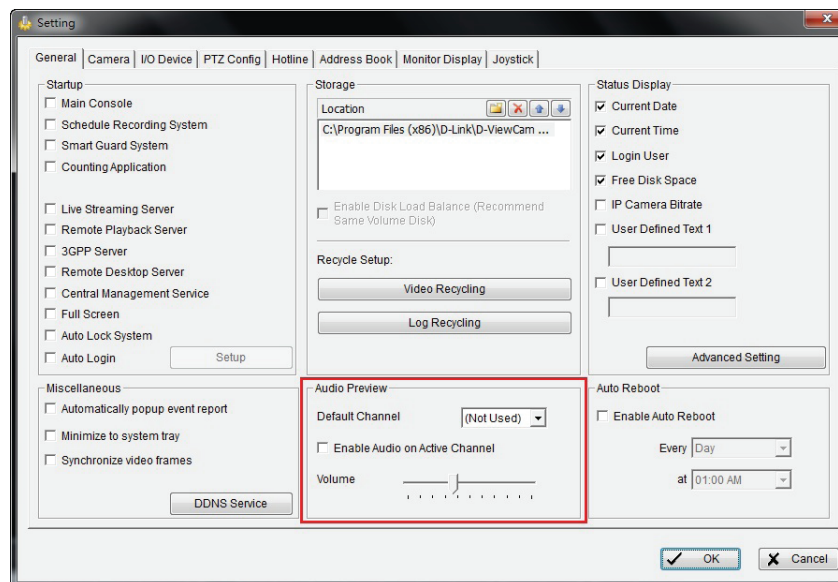


4. How do I enable audio in Live Streaming for IP cameras?

In order to save bandwidth, the default setting for audio is disabled. This function must be enabled manually. Please follow the steps given below.

Step 1: Go to **General Setting > Setting > System Setting > General** and enable **Preview Active Channel**.

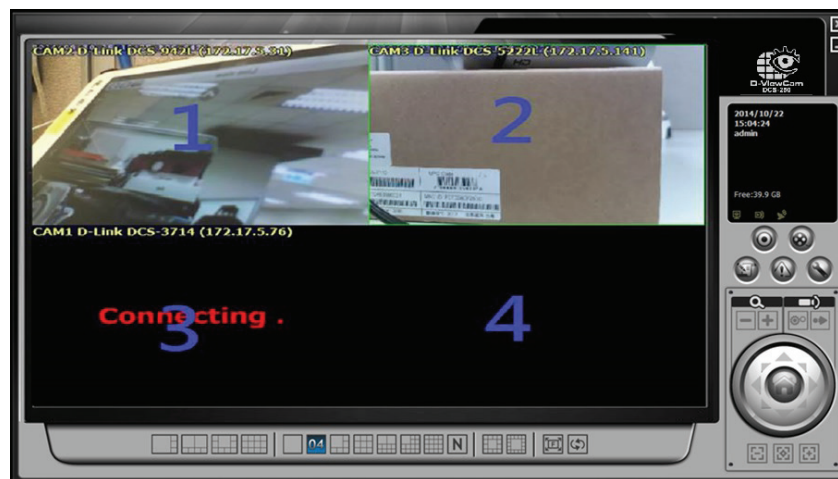
The default channel means the background audio of camera channel.



Step 2: Switch audio channels to hear audio.

If you choose sub-screen 1, you will hear audio from camera 1 or if you choose sub-screen 2, you will hear audio from camera 2.

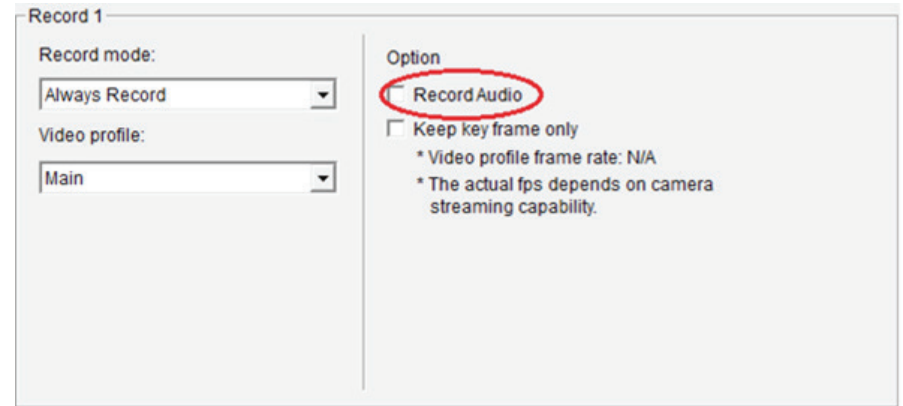
Note: If you don't choose any sub-screen, you will hear audio from the default channel.



5. How do I record audio for Network Cameras?

Step 1: Execute Main Console and go to **Schedule > Configure** > enable **Record Audio** and click **OK**.

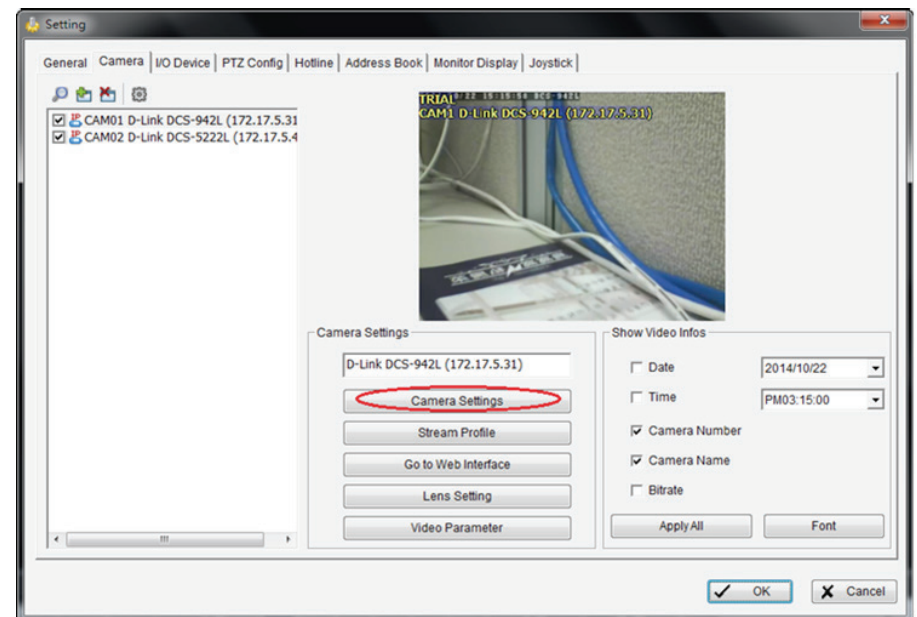
Step 2: Click on **Start > Start Recording Schedule**.



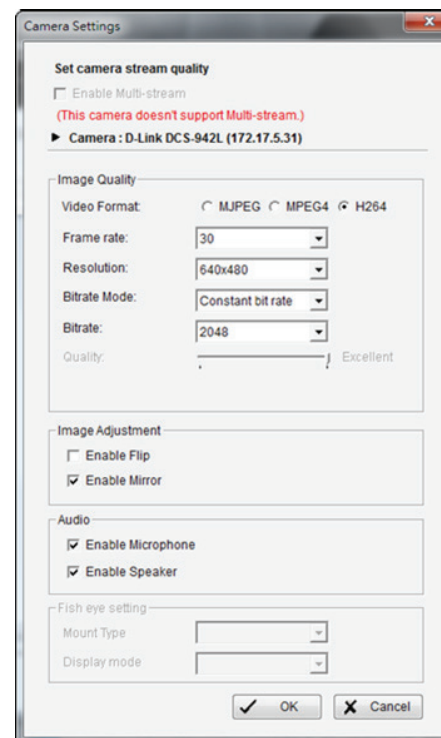
6. How do I change the recording frame rate and the resolution for network cameras?

Step 1: Open Main Console and go to **General Setting > Setting > System Setting > Camera**.

Step 2: Select the camera to change the frame rate.



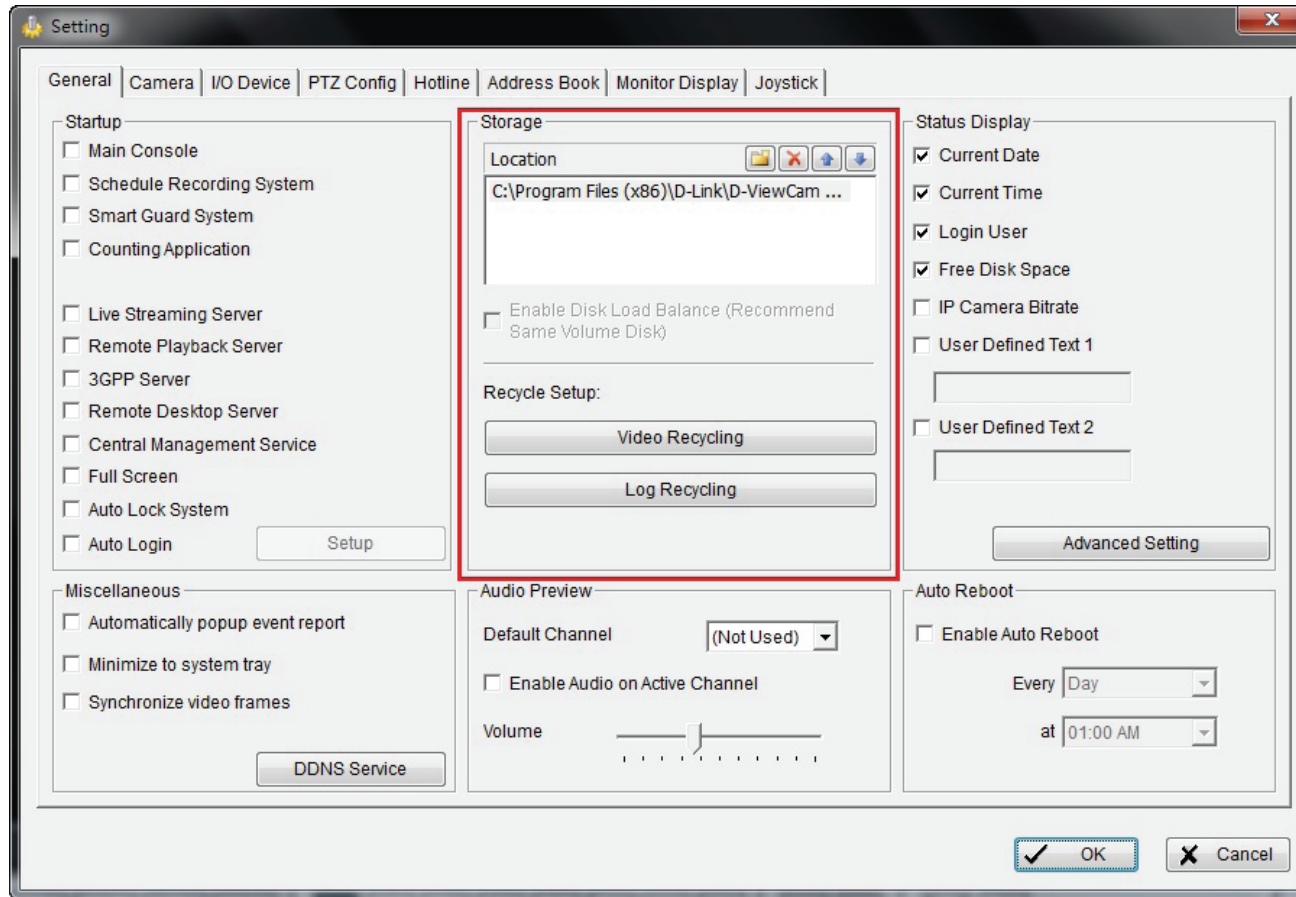
Step 3: Click **Camera Settings** to change the frame rate, resolution, and quality.



7. How do I set multiple storage paths for video recording?

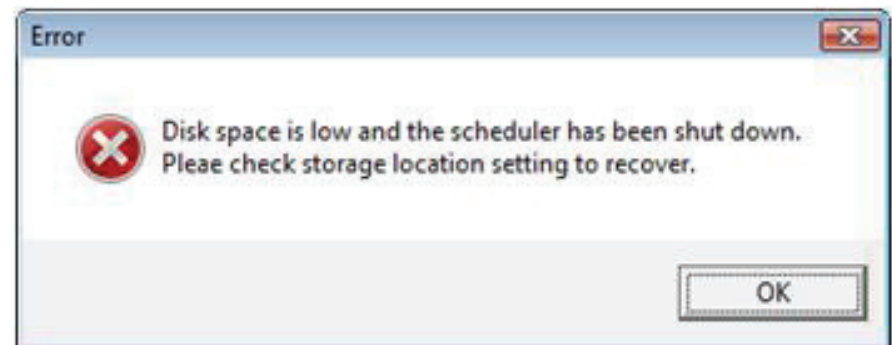
The Main Console allows you to set up several hard disk drives as storage. When the first hard disk is almost full (the capacity is less than 800 MB on system disks or 100 MB on non-system disks), the Main Console will try to find a second storage with enough capacity. If it is not available, then the system will start recycling the data, if auto-recycling is enabled.

Go to **Main Console > Setting > System Setting > General > Storage Location** to modify your settings.



8. Why do I see “Disk space is low and the scheduler has been shut down. Please check the storage location setting to recover”?

Please follow the steps below to solve this issue.



Step 1: Verify the following settings and configuration.

- Ensure the auto recycle, auto login, auto startup and schedule options are enabled in the Main Console.
- Remove NOD32 antivirus since it generates a large amount of log files (.tmp files) that occupy a lot of hard drive space and causes the recording to stop.
- Do not adjust the system clock once the recording is started.
- Do not unplug a removable disk when the system is recording.
- Check if any quota limit is set in your hard drive.
- Check if the hard drive is set as “read only” or if a folder name “1” exists.
- Check if the hard drive has bad sectors inside or damaged.
- Make sure you are not using the network hard drive.

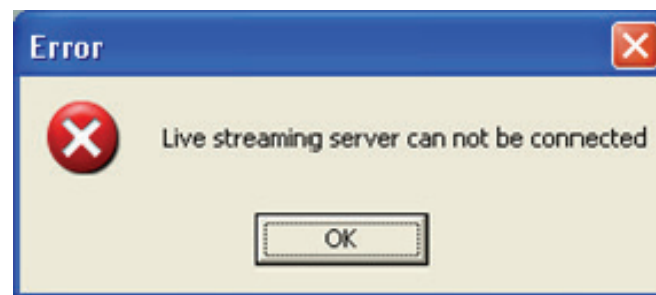
Step 2: Verify if the system stops recording which is caused by insufficient hard drive space.

- Check if the recording paths are the same in FileRecord.ini and Storage location.
 - Remove the oldest video folders or move them to another hard drive.
 - Check the dberr.log. This log file can be found in D-ViewCam installation folder. If there are a lot of Eventlog and Systemlog errors in dberr.log. Eventlog.mdb and Systemlog.mdb might be oversized due to frequent events or scheduler is set as record on motion while the cameras focus on a dynamic background.
 - The system’s hard drive space must be more than 800 MB and the data hard drive space must be more than 500 MB for recording.
- If you still experience this problem, then stop recording and use DB tools to repair/rebuild database.

9. Why do I get “Live streaming server can not be connected” message?

In general, this error message is caused by network problem, so always check your network connection first.

If you are connecting to a remote server or device through WAN. Please make sure the remote server or device is not behind a router’s firewall or the port is forwarded properly to bypass the router’s firewall.



10. Why do I get a "Missing or corrupted resource files. Please re-install the system to solve the problem" message?

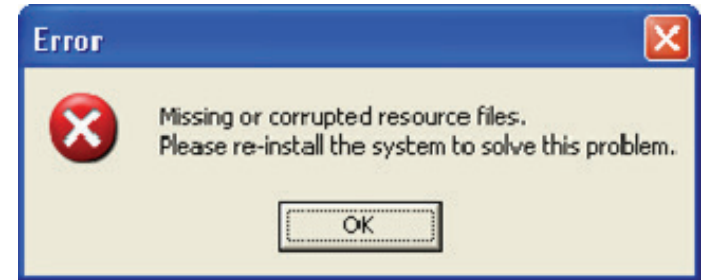
This error message occurs when the software failed to execute the necessary file for the requested operation.

1. When loading the Main Console:

The skin files or database may be corrupted to cause this error message. Please uninstall the software, and install the latest version.

2. When loading ActiveX of web live viewer/ playback

Please follow the instructions below for troubleshooting.

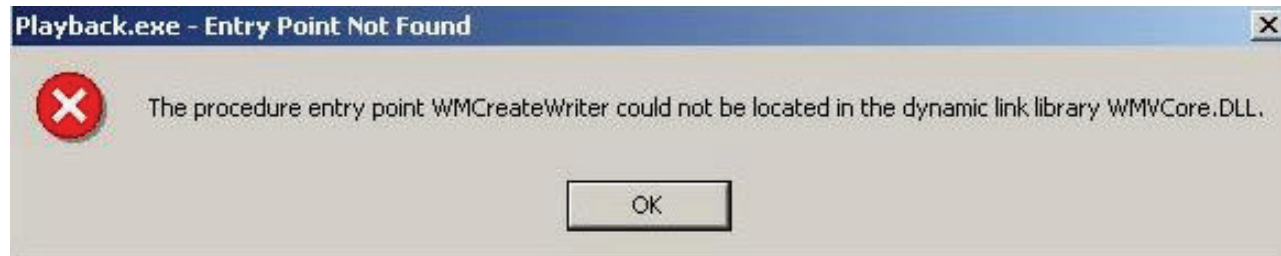


Step 1. Turn off UAC in control panel on Windows Vista.

Step 2. Enable the privilege level option in compatibility tab in Main Console properties.

11. Why do I get a “The procedure entry point WMCreateWriter could not be located in the dynamic link library WMVCore.DLL.” message?

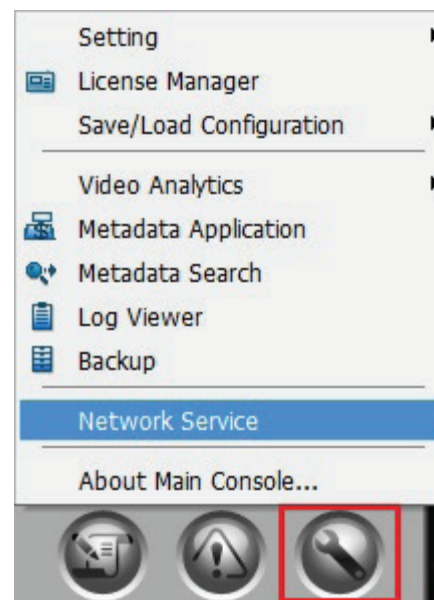
If you see this error message, then please upgrade your windows media player and this problem will be fixed.



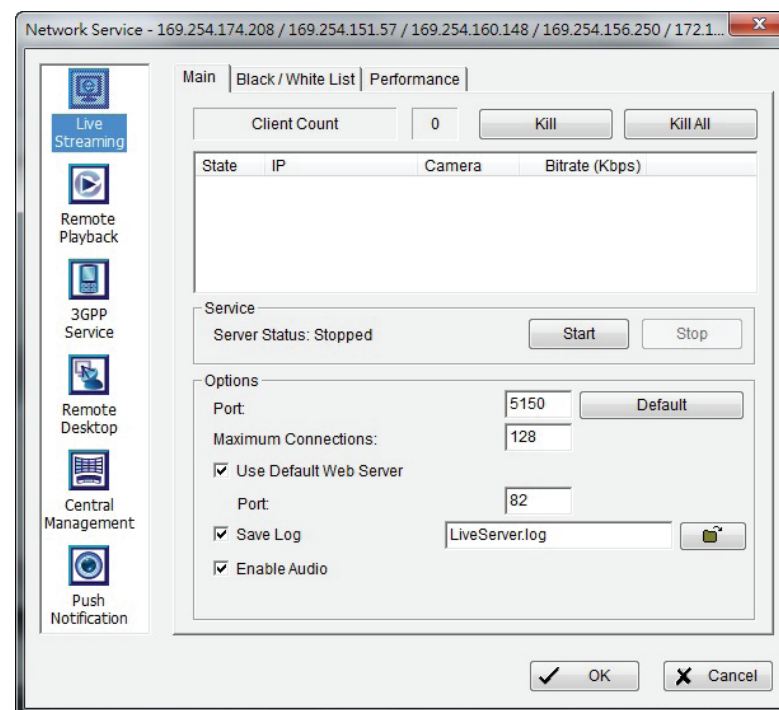
Please download the latest Windows media player here, <http://www.microsoft.com/windows/windowsmedia/default.msp>.

12. How do I start network services?

Step 1: Go to **General Setting > Network services.**



Step 2: Please remember to click on the services you want to start in Main Console.



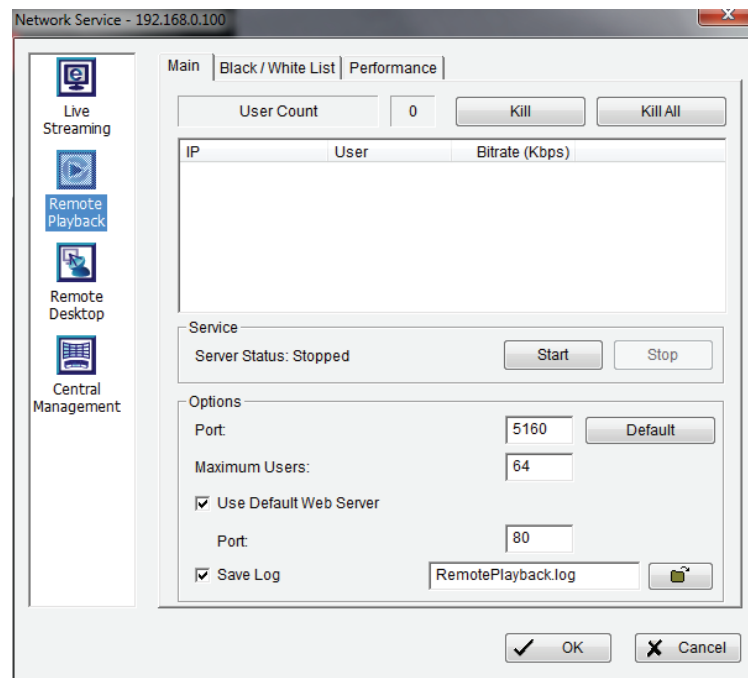
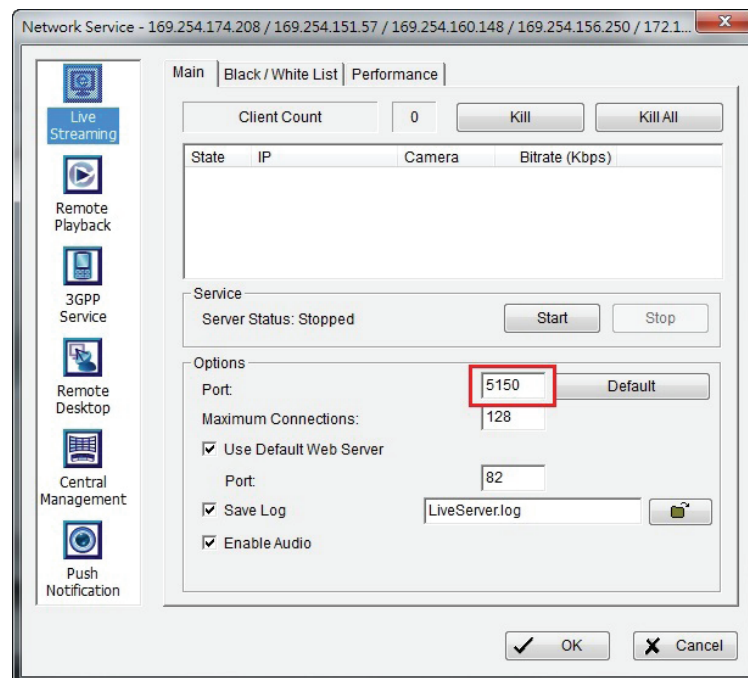
13. How to configure my PC/Server to allow remote access to Viewer and Playback?

In order to view remote live viewer and remote playback from the Internet, there are two things you have to do.

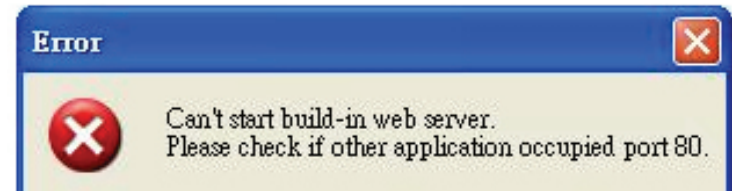
Step 1: Start Network Service in Main Console. To start, go to **Main Console > General Setting > Network Service** and then start this service.

- The default port number for live streaming is 5150.
- The default port number for remote playback is 5160.
- The default port for web browser is 80.

If you want to modify, please don't forget to set it to port forwarding on your router.



If you see the following error message, this means that your port 80 was occupied by the another device, therefore, you have to change the port number.



Step 2: Enable port forwarding in your router and then find the public IP address of your router and set port forwarding on the router to NVR LAN IP.

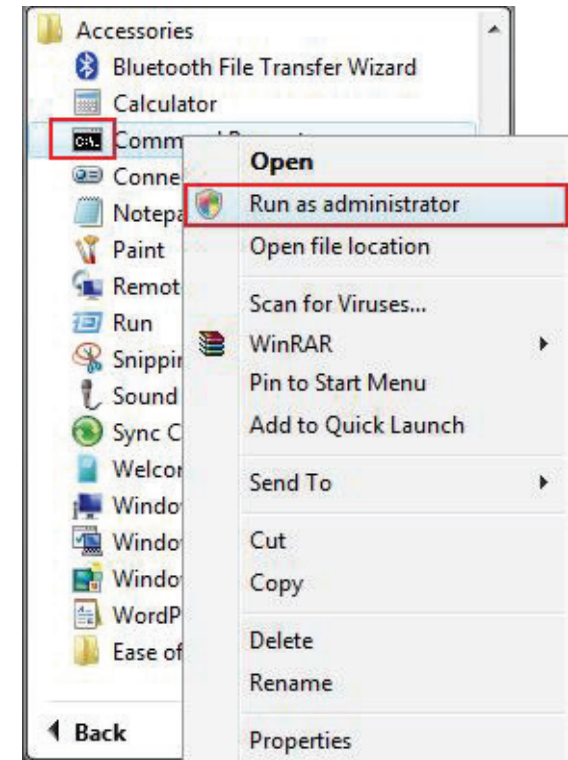
- You can see the public IP address of your router in the configuration menu.
- You can also configure NAT (or port forwarding) port 80, 5150 and 5160 to your NVR's LAN IP (e.g. 192.168.3.30) in the router.
- Port forwarding is similar to the example given below:
You have to forward 3 ports, one for 80, one for 5150 and one for 5160.
All 3 ports should point to e.g. 192.168.3.30

After you have successfully forwarded the 3 ports in your router, you will be able to access remote live viewer and remote playback from the Internet.

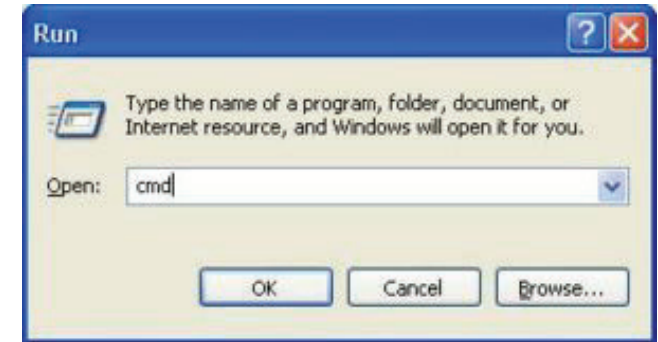
14. Why can't I see live view and video playback on Internet Explorer after upgrading to the latest version?

This is often caused by old temporary IE components in Windows. Please remove these IE components and reinstall ActiveX to solve the problem.

Step 1: Close IE and its related applications first. Otherwise some files may be locked during removal. If your OS is Vista, please run "Command prompt" as an administrator or you will not be able to remove these components.



Step 2: Go to **Start > Run >** enter **cmd** and press **OK**.



Step 3: Type **cd C:\WINDOWS\Downloaded Program Files**

Step 4: Type **dir** to list all the objects on this folder .

```

C:\WINDOWS\system32\cmd.exe
Microsoft Windows XP [Version 5.1.2600]
(C) Copyright 1985-2001 Microsoft Corp.
C:\Documents and Settings\nuuo> cd C:\WINDOWS\Downloaded Program Files
C:\WINDOWS\Downloaded Program Files> dir
  
```

Step 5: Type **del /s**.

Note: Don't forget to add (.) after /s

Step 6: Keep pressing **Y** until you are prompted to delete all the files in the folder.

```

C:\WINDOWS\system32\cmd.exe - del /s .
09/12/2008 04:05 PM          77,890 NUSrtp.dll
08/28/2008 09:01 PM           1,400 NUSWebAll.inf
12/09/2005 04:22 PM       309,488 P00RecImage.dll
08/28/2008 08:05 PM          49,152 parsedatapacket.dll
08/28/2007 02:24 PM       333,712 pmjpegaudio.ocx
10/03/2007 08:41 AM       382,864 pmjpegcam.ocx
11/30/2005 05:26 PM          76,024 ProfileAccess.dll
09/24/2008 12:02 PM     2,782,536 RACtrl.dll
09/24/2008 11:58 AM          663 RACtrl.inf
08/25/2008 12:07 PM          77,894 rtp.dll
06/06/2007 09:54 AM       843,776 RtspUappDecoder.dll
12/14/2007 07:12 PM       947,712 RtspUappDecoderNew.dll
01/17/2007 02:50 PM          897 setup.inf
10/04/2008 08:08 PM          247 swflash.inf
07/18/2007 02:54 PM       245,408 unicows.dll
03/30/2005 10:18 AM       408,064 UAPGDecoder.dll
09/13/2007 01:26 PM       827,392 UADecoder.dll
09/11/2008 09:57 PM       643,147 WebRFB.ocx
08/21/2008 02:27 PM          1,072 WebViewS.inf
09/11/2008 09:54 PM       446,542 WebViewS.ocx
          39 File(s)      16,144,897 bytes
          0 Dir(s)      2,410,991,616 bytes free
C:\WINDOWS\Downloaded Program Files> del /s .
C:\WINDOWS\Downloaded Program Files>*, Are you sure (Y/N)?
  
```

Step 7: Type **rmdir /s** .

Step 8: Continue pressing **Y** when prompted to clear up the remaining files in the folder

Step 9: Type **dir** and press **Enter** to check if the folder is empty.

Step 10: Re-install your ActiveX with web remote client.

```

C:\WINDOWS\system32\cmd.exe
Microsoft Windows XP [Version 5.1.2600]
(C) Copyright 1985-2001 Microsoft Corp.

C:\Documents and Settings\SG>cd C:\WINDOWS\Downloaded Program Files

C:\WINDOWS\Downloaded Program Files>rmdir /s .
  
```

15. What default ports are used for network service?

The default ports can be changed, but we strongly recommend you avoid using ports below 1024 because they are often used by other system services.

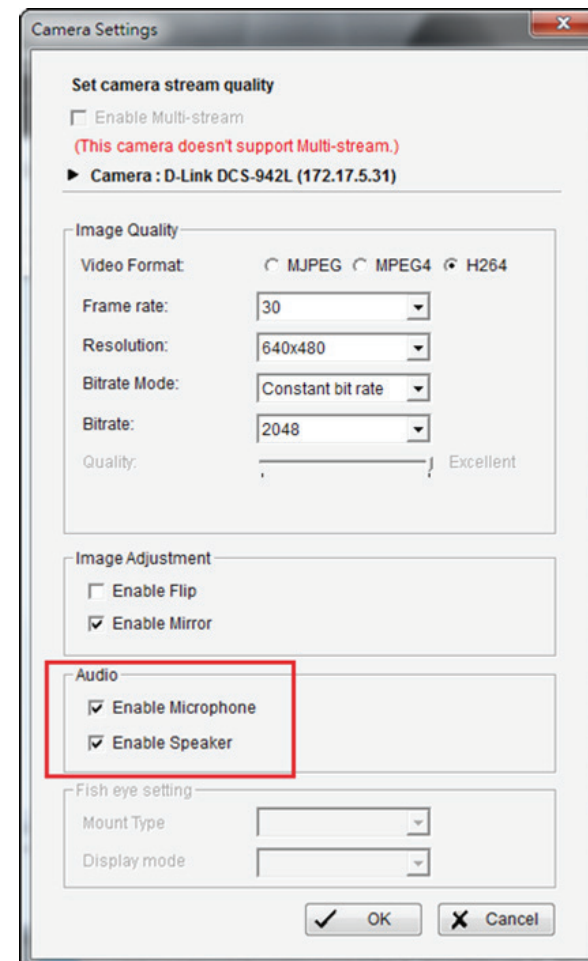
Service	Port	Purpose
Live streaming	5150	Communication between desktop remote live viewer and Main Console
Default web server	80	Access protocol of web based remote client

Remote playback	5160	Communication between desktop remote playback and Main Console
Remote desktop	5140	Remote access to Main Console

16. How to enable audio for the remote live viewer application and Internet Explorer browser?

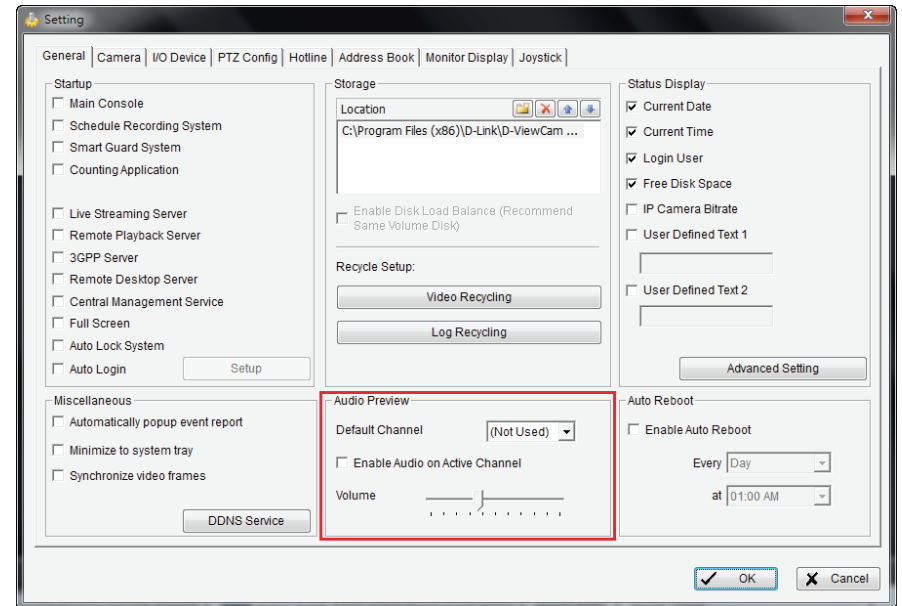
Please right click on the screen and select **Enable Audio**.

If you are using network cameras, go to **Main Console > General Setting > Setting > Camera > Camera Settings**.

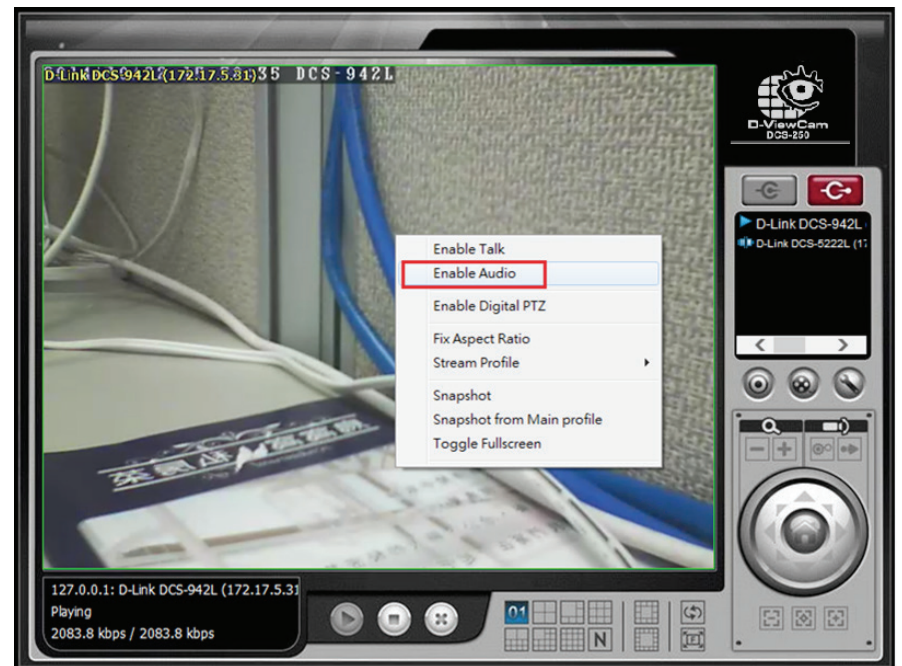


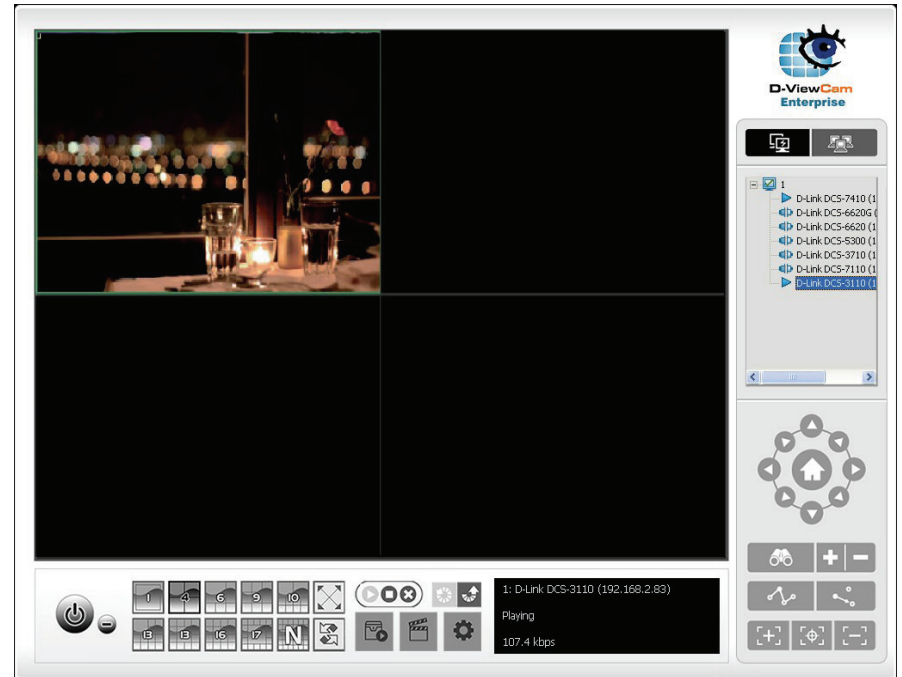
Right click on the screen and select **Enable Audio**.

If you are using analog cameras, please go to **Main Console > General Setting > Setting > Audio Preview**.



Go to remote live viewer and right click on the screen to check **Enable Audio**.



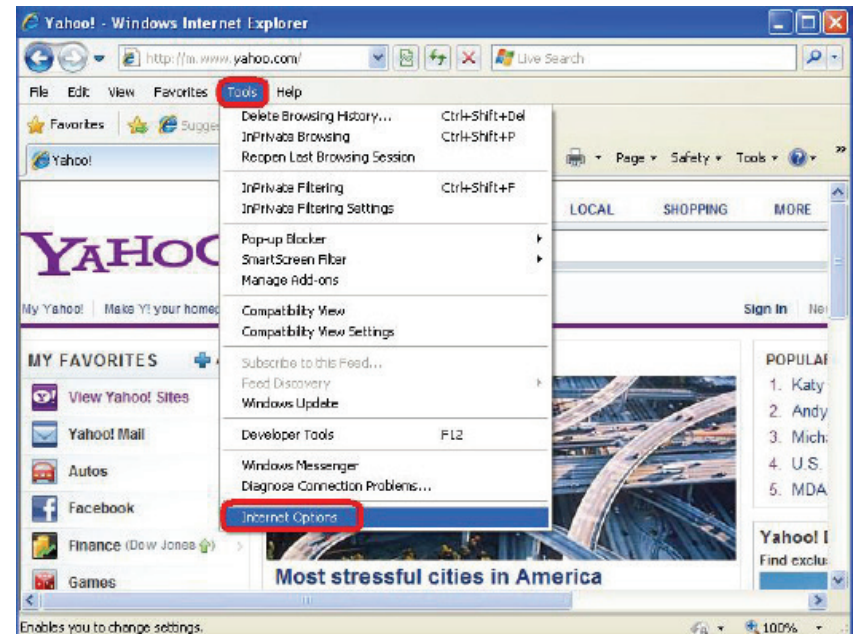


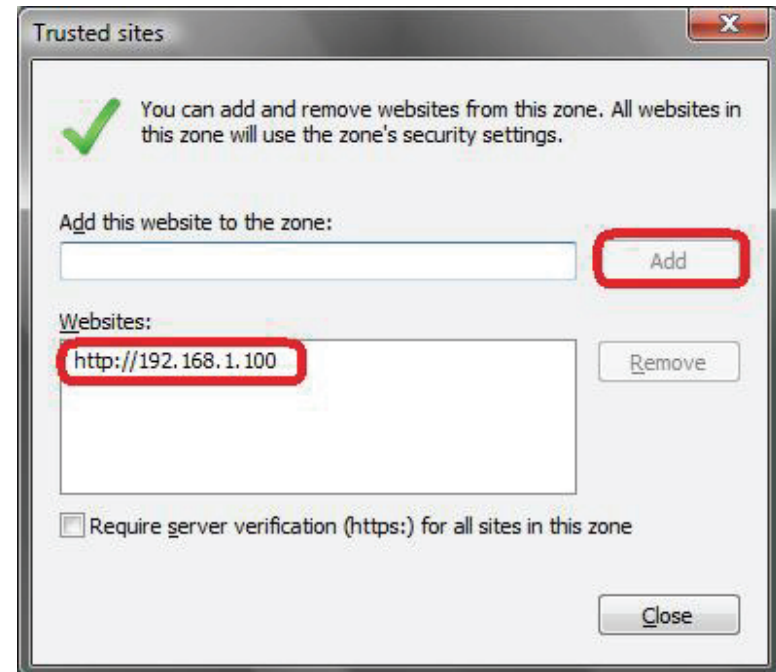
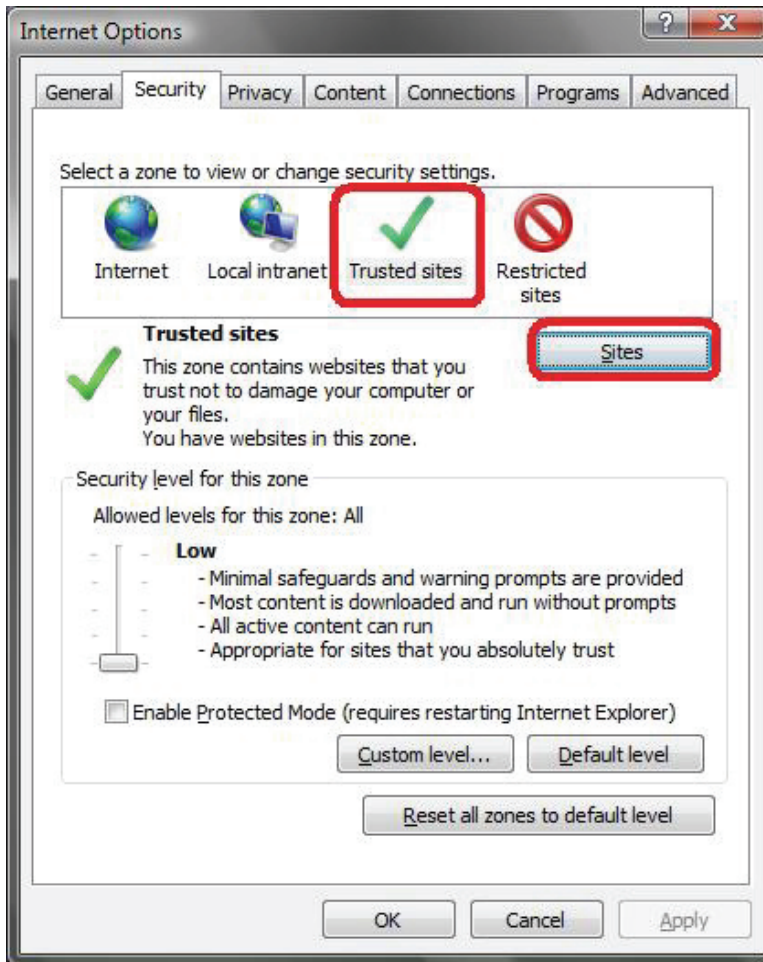
17. Why Internet Explorer 8 doesn't work well with software version 3.0?

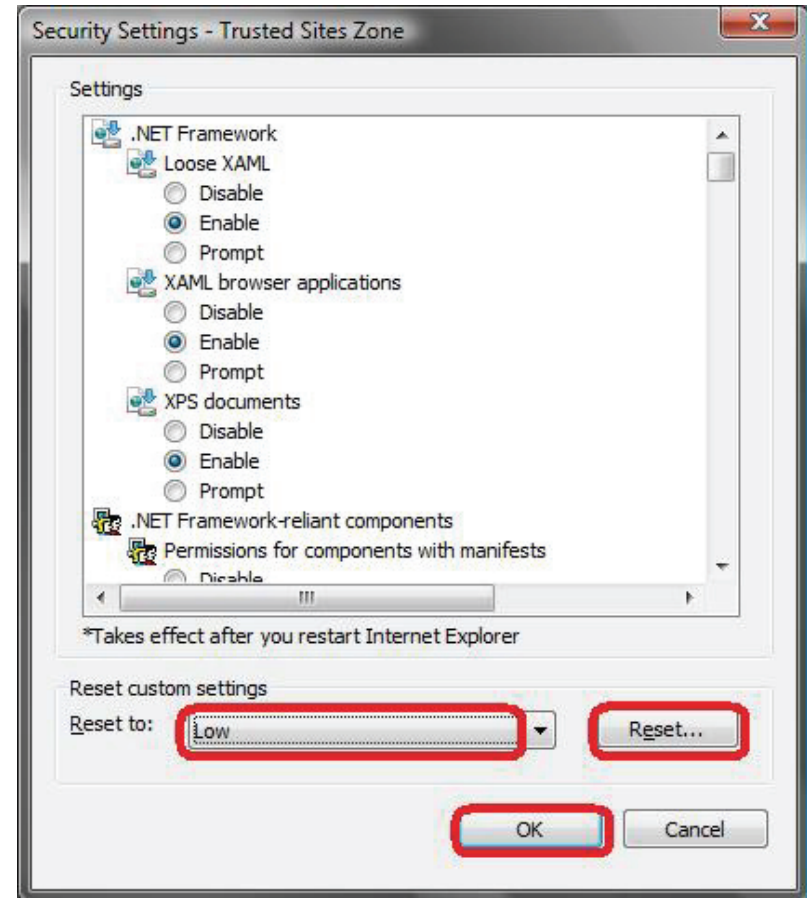
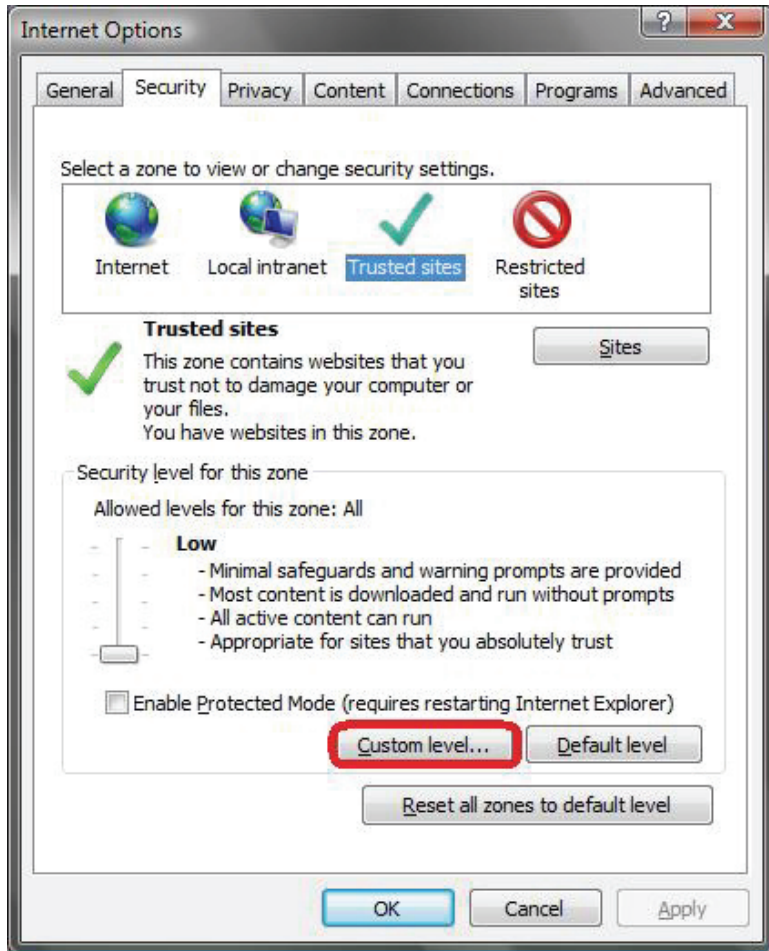
In order to install ActiveX in an IE 8 environment, we need to set up the following.

Ensure **vcredist_x86.exe** has already been installed.

Step 1: Add the Server IP into Trusted Web Site.

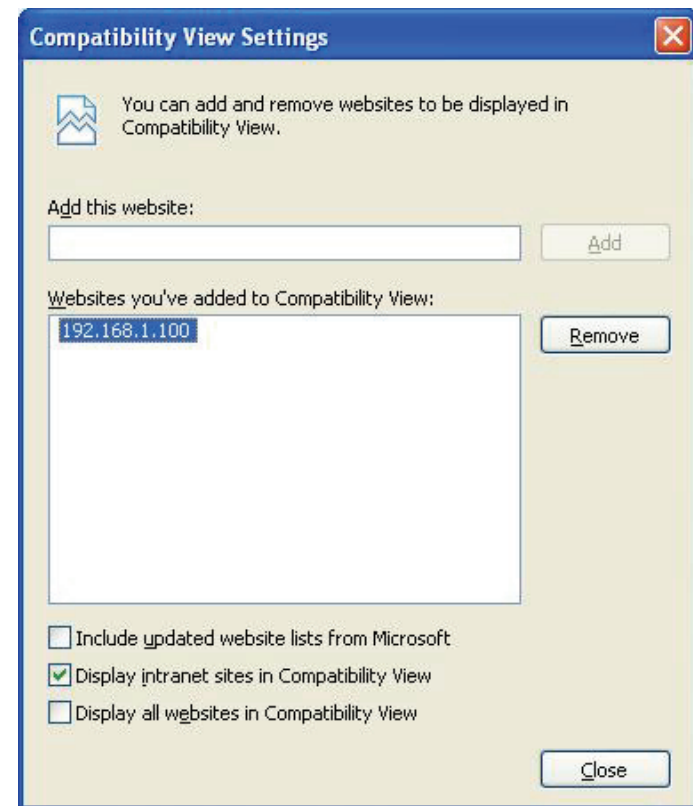
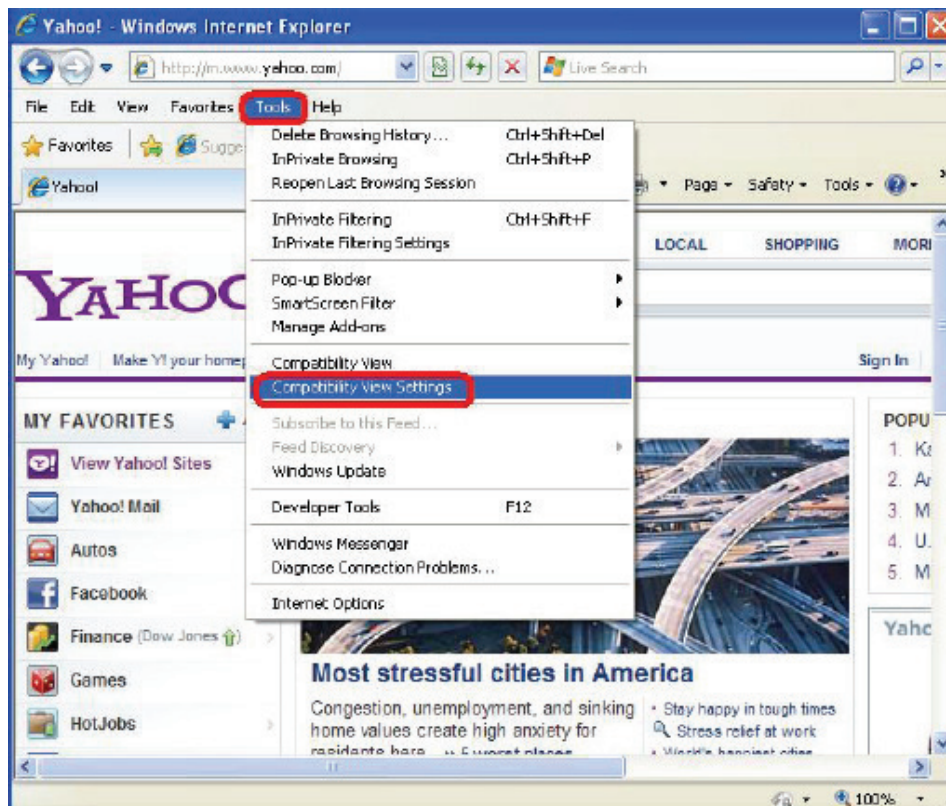






Step 2: Go to **Tools > Compatibility View Settings** and add the Server IP Compatibility View Setting.

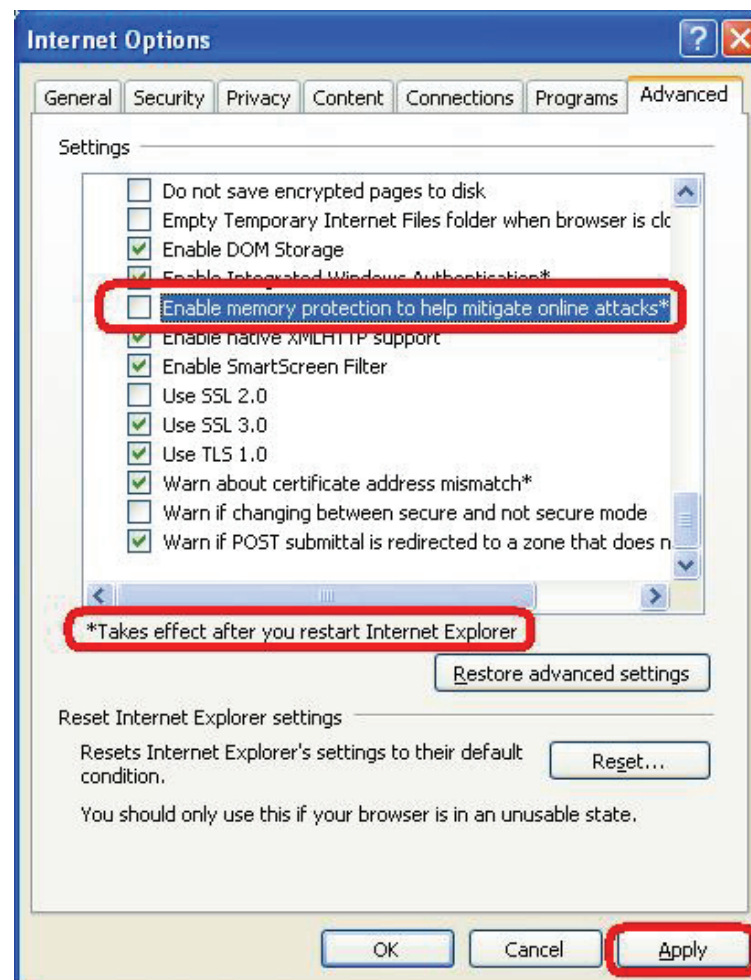
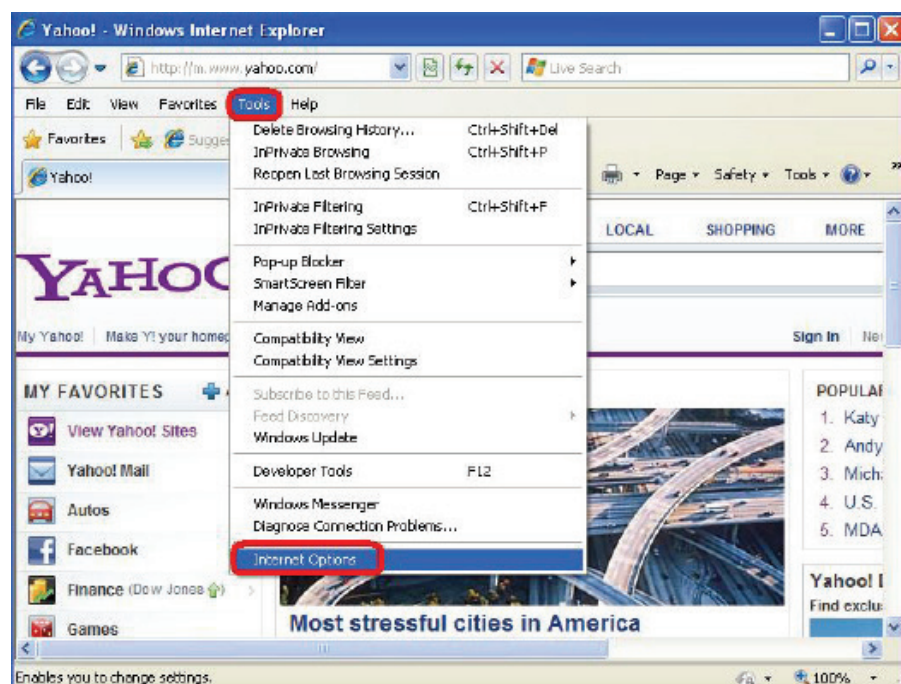
Step 2: Add the Server IP Compatibility View Setting





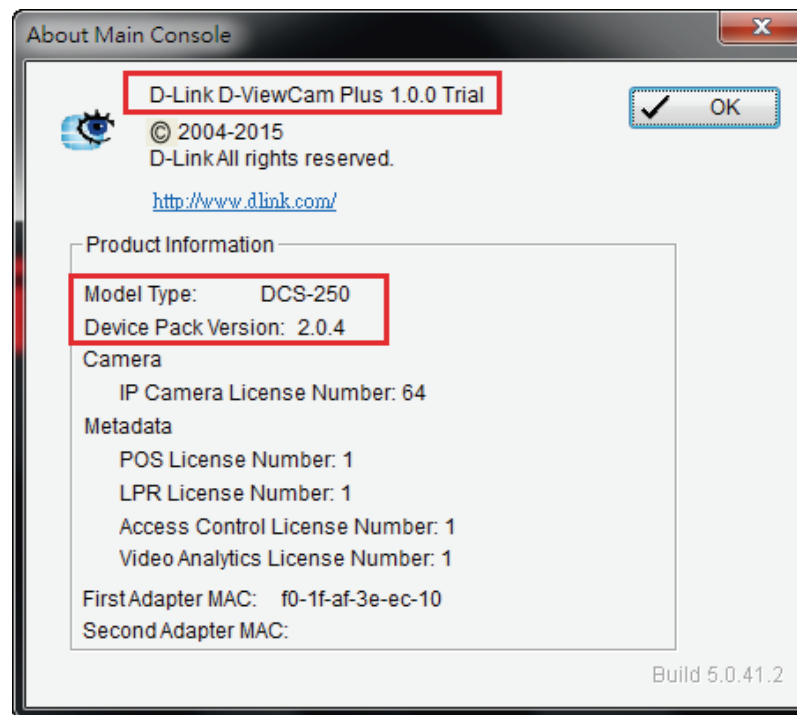
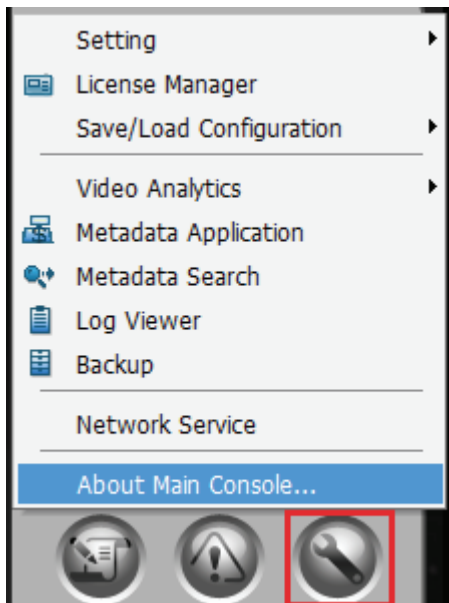
Enjoy 3.2 web live viewer with Internet Explorer 8.

Step 3: If the instructions above doesn't work, please try the following method. (Optional)



18. What is the version of my software?

Go to **Main Console > General Setting > About Mainconsole.**

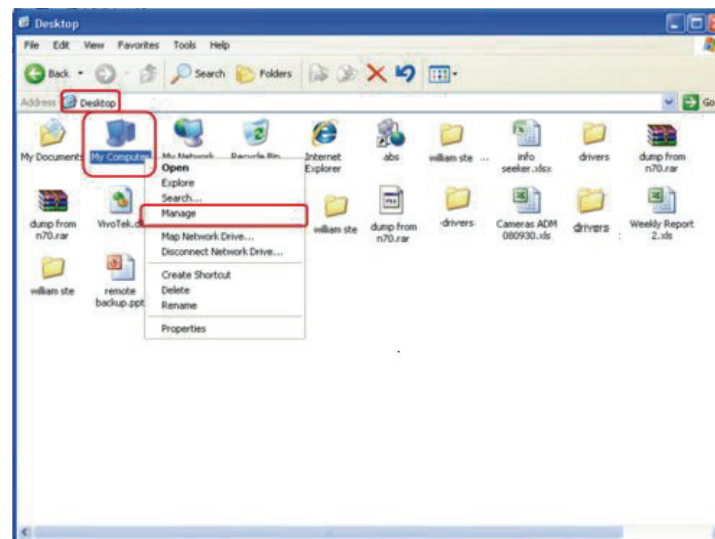


19. How do I get the Windows system log and application log?

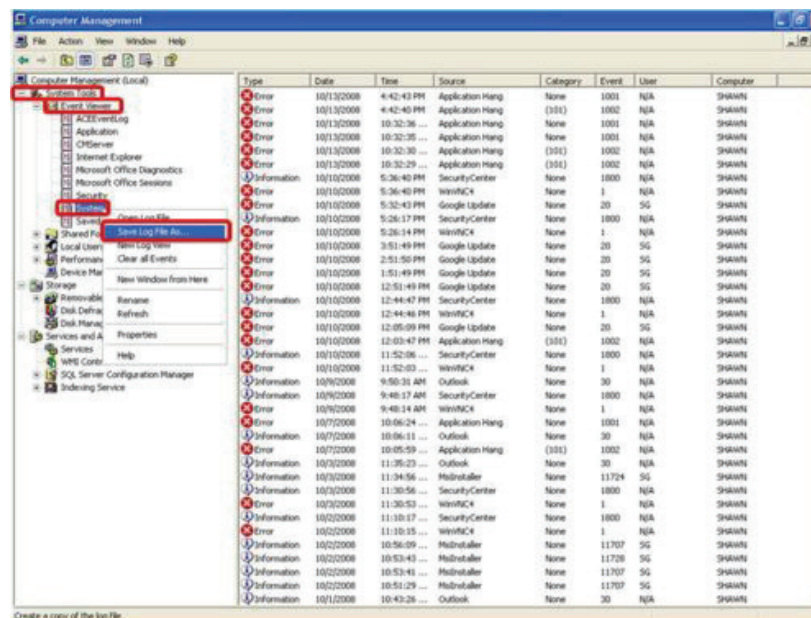
System log

Step 1: Go to **Desktop > right click on My Computer > Manage.**

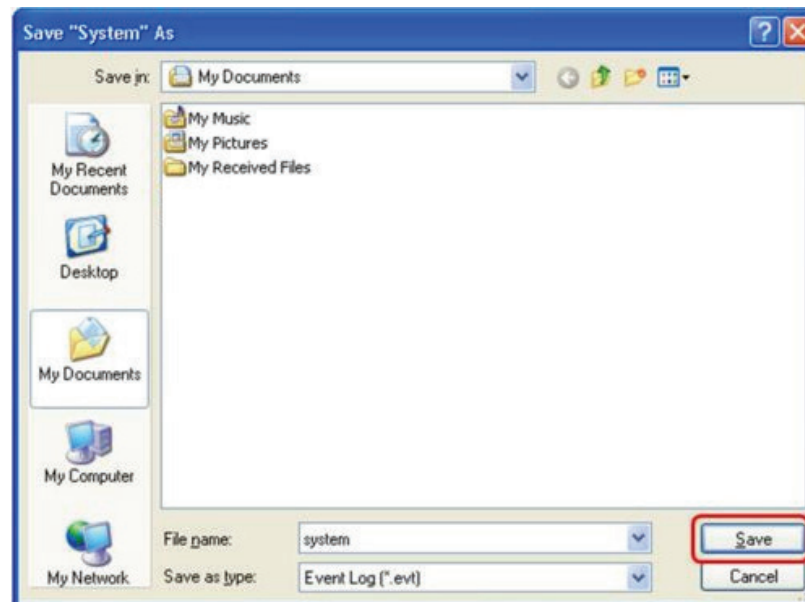
Step 2: In Computer Management, go to **System Tools > Event Viewer > System.**



Step 3: Right click on **System** > **Save Log File As...**



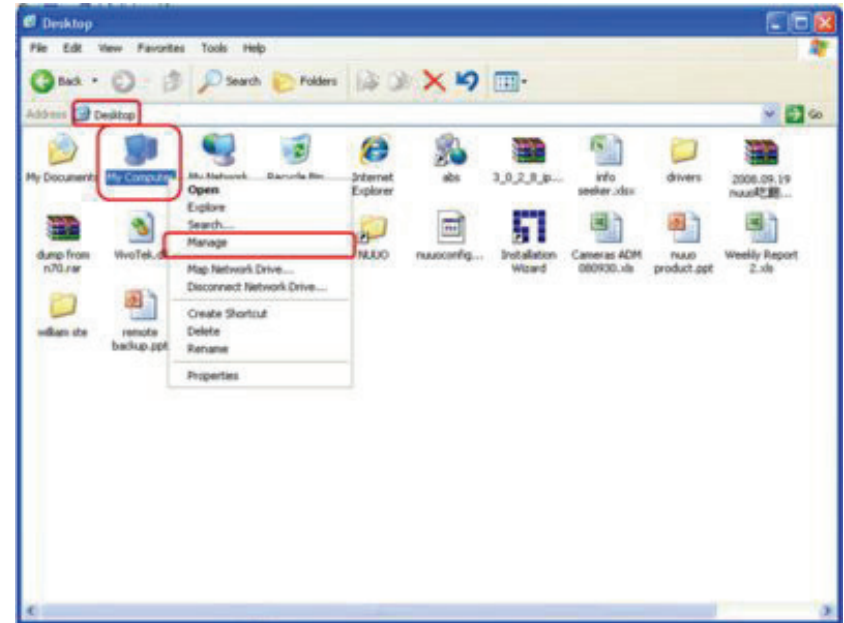
Step 4: Type **system** as file name and save file as .evt format
Please name the file as **system** so we know that it is a system log file.



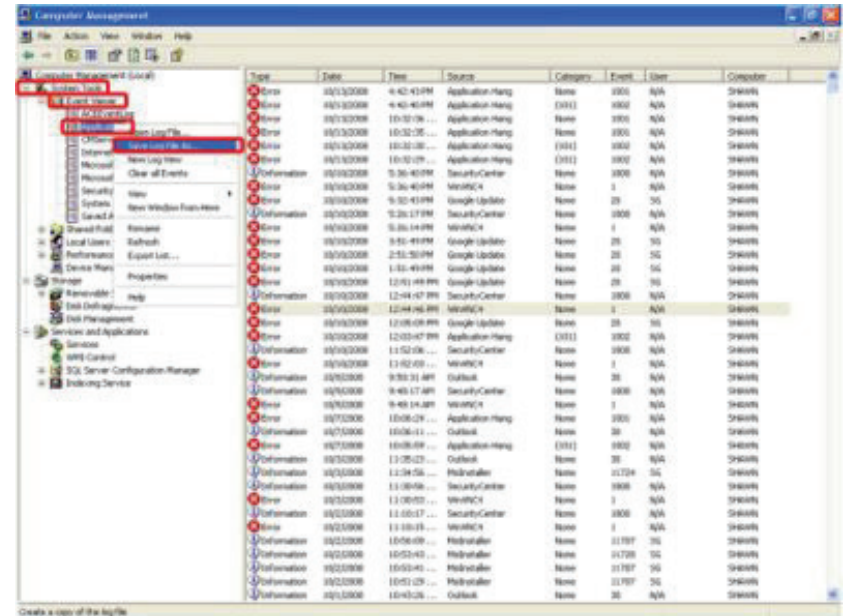
Application Log

Step 1: Go to **Desktop** > right click on **My Computer** > **Manage**.

Step 2: In **Computer Management** > **System Tools** > **Event Viewer** > **Application**.

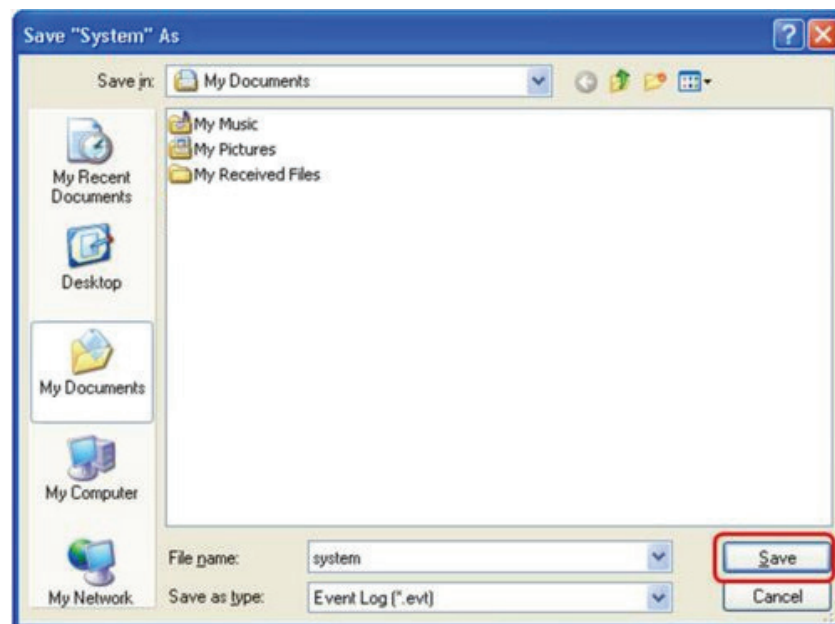


Step 3: Right click on **Application** > **Save Log File As...**



Step 4: Type **application** as file name and save file in .evt format.

Note: Please name the file as **application** so we know that it is an application log file.



20. How many user accounts can I create?

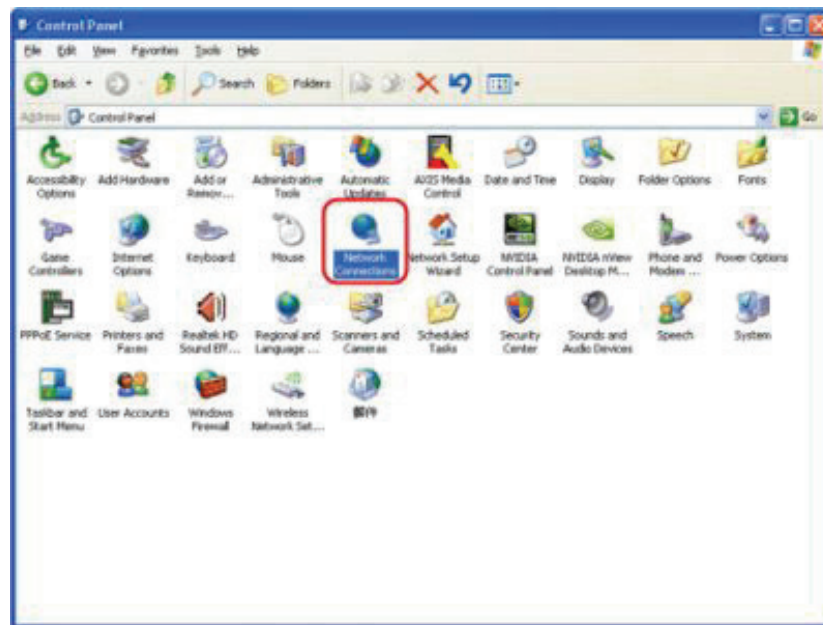
You can create an unlimited number of user accounts.

21. How do I setup local area network?

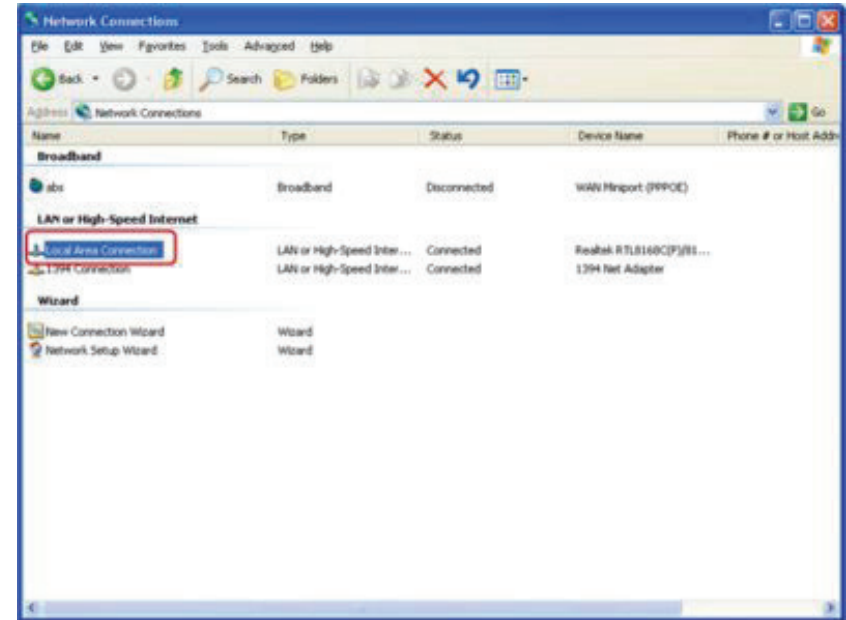
D-ViewCam Plus supports both LAN and WAN. If your surveillance system does not have Internet access, you can setup a private network or LAN to establish networking between Mainconsole and other network devices such as an IP camera.

Setup with static IP

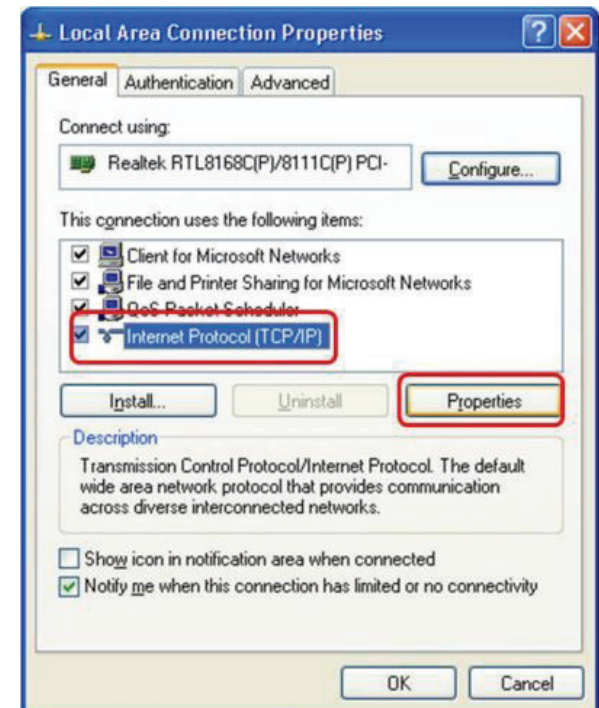
Step 1: Go to **Control Panel > Network Connections**.



Step 2: Right click on **Local Area Connection** > **Properties**.



Step 3: Select **Internet Protocol(TCP/IP)** > **Properties**.

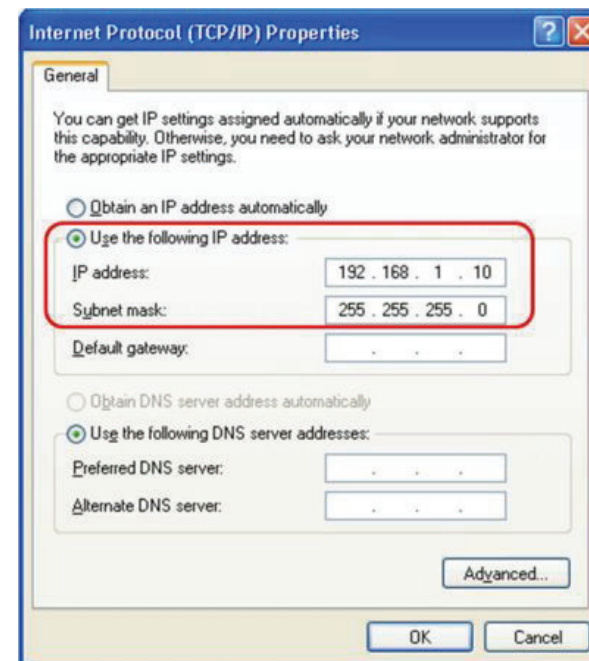


Step 4: Select **Use the following IP address** and update the fields as shown in the picture. [192.168.1.1] and [192.168.1.254] is normally occupied by the router or other network devices, so please try to avoid using these IP addresses.

Please note that you will only be able to access IP addresses between the same subnet address, such as [192.168.1.1 to 192.168.1.254].

Setup with dynamic IP

We strongly discourage assigning dynamic IP address to IP cameras that are based on DHCP. The IP address of each IP camera is temporary so whenever the address is reassigned, the camera will lose connection permanently to your D-ViewCam Plus server unless you manually rematch the camera's new IP address to D-ViewCam Plus server.



22. What type of network does the D-ViewCam Plus support?

D-ViewCam Plus supports both LAN and WAN. If your surveillance system does not have Internet access, you can setup a private network or LAN to establish connection between the Main Console and other network devices such as network camera.

23. How do I reduce CPU load?

Most CPU load comes from:

1. Decoding video streams and playing them on the monitor.
2. Decoding video streams and encoding them to other video formats and then transmitting them to remote a client in order to save network bandwidth.
3. Decoding video streams and encoding them to other video formats and then recording them in order to save HDD space.
4. Decoding video streams for video analytics.

How to reduce CPU load by using local display:

1. Disable local display on the recording server.
2. Divide all the videos into several pages.
3. Share the decoding load with other clients by using more workstations for local display.
4. If the DCS-250 supports the camera's multi-streaming function, choose Multi-stream Mode.
5. If you have no other way to lower CPU loading, you can lower the camera stream resolution or frame rate.

How to reduce video analytics CPU load:

1. When designing the project, be sure to make the video analytics process on different servers.
2. If Multi-stream is available, set the video stream format to the smallest size.

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Leonard Janke - `cast.cpp`, `seal.cpp`

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Michael Paul Johnson - `diamond.cpp`

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Chris Morgan - `rijndael.cpp`

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Matthew Skala - twofish.cpp

Kevin Springle - camellia.cpp, shacal2.cpp, ttmac.cpp, whirlpool.cpp, ripemd.cpp

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