

FEDERATION



IP SURVEILLANCE BEYOND IMAGINATION

INEX[®]



User's Manual

Table of Contents

Chapter 1 — Introduction	1
1.1 System Diagram	1
Monitoring Service Registered on Federation Service	1
Backup Service Registered on Administration Service	2
Backup Service Registered on Federation Service	2
Chapter 2 — Installation.....	3
2.1 Product Information.....	3
Package Contents	3
System Requirements.....	3
2.2 Installation	4
Server System	4
Client System	7
2.3 Automatic Upgrade	9
Update Service Setup	9
Upgrade	10
2.4 Uninstall.....	11
Chapter 3 — Getting Started.....	13
3.1 Running Services.....	13
3.2 Log In	13
3.3 System Setting.....	14
3.4 Registering Services	17
3.5 Live Video Monitoring.....	18
3.6 Playing Recorded Video.....	19
Chapter 4 — System Overview	21
4.1 Service Manager.....	21
4.2 Setup.....	21
4.3 Client.....	22
Site List	22

Chapter 1 — Introduction

This document describes installation and operation of iNEX Federation software, which is designed to be used with iNEX Standard software.

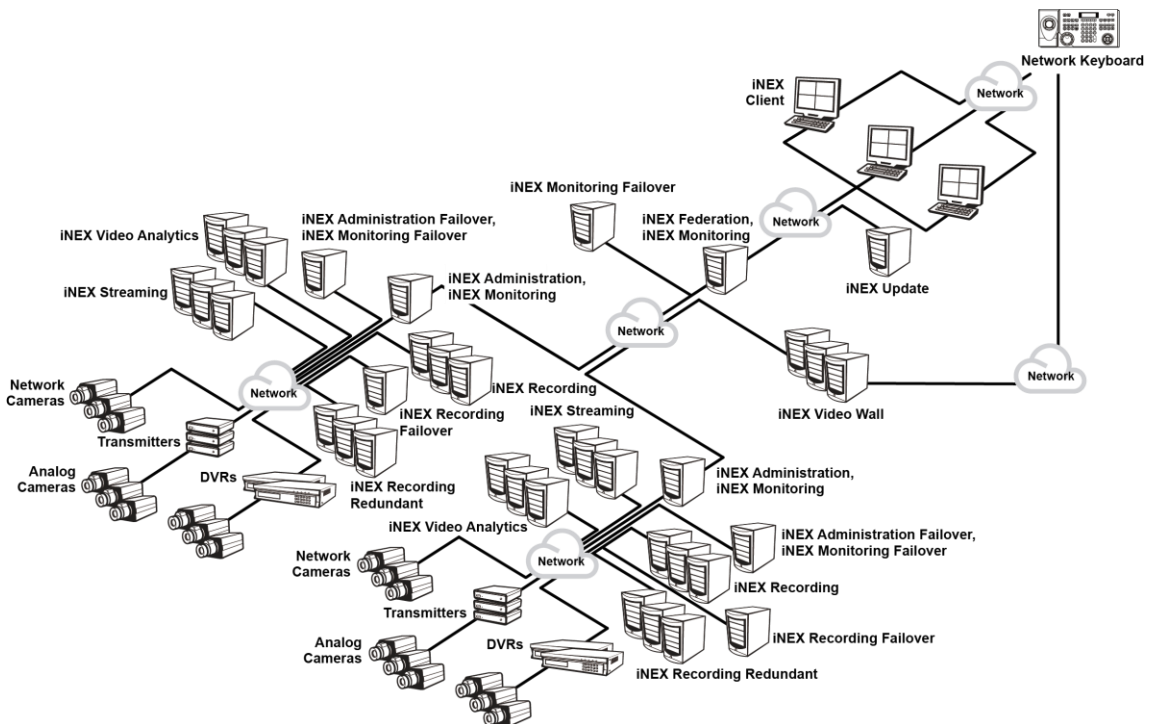
The federation service allows you to monitor live video from devices registered on the administration services and to play back recorded video saved in the recording servers that are registered on the administration services. If a backup service is registered on a federation service, the iNEX system backs up video that is saved in the recording servers and DVRs registered on the administration services. If monitoring services are registered on a federation service, the iNEX system allows you to monitor events, which are notified from monitoring services registered on the administration services, in the Client system of the federation service.

NOTES:

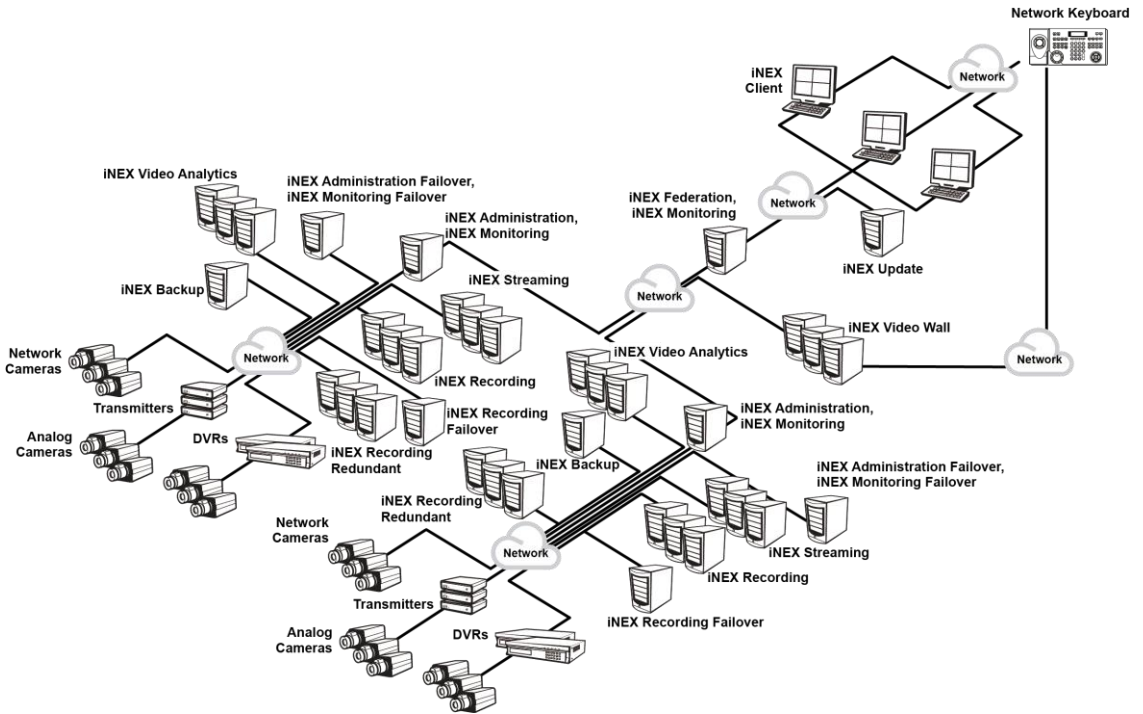
- This product includes software developed by the OpenSSL Project for use in the OpenSSL Toolkit (<http://www.openssl.org>).
- The software included in this product contains some Open Sources. You may obtain the complete corresponding source code from us. See the Open Source Guide on the software CD (*OpenSourceGuide*/*OpenSourceGuide.pdf*) or as a printed document included along with this document.

1.1 System Diagram

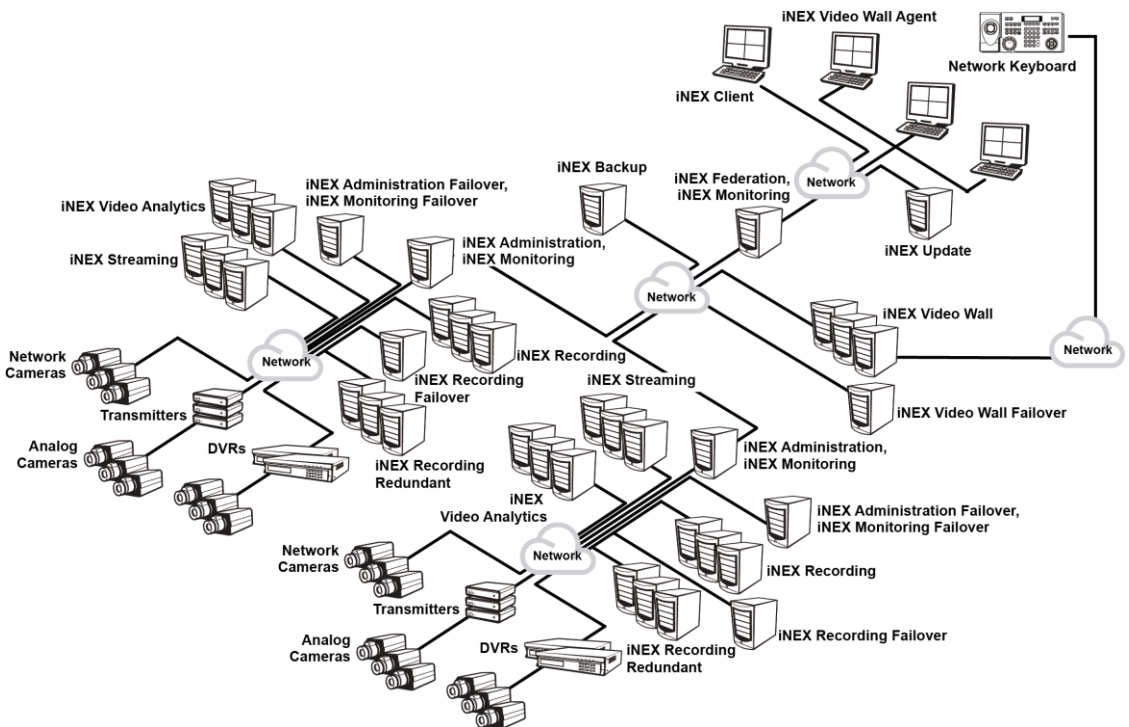
Monitoring Service Registered on Federation Service



Backup Service Registered on Administration Service



Backup Service Registered on Federation Service



Chapter 2 — Installation

2.1 Product Information

Package Contents

- Installation CD
- User's Manual
- WIBU-Key (USB Dongle)

NOTES:

- If a WIBU-Key is disconnected from a federation server, the federation service will not operate properly.
- Stop running the federation service before connecting or disconnecting a WIBU-Key.

System Requirements

Server System

- Operating System: Microsoft® Windows® XP 32-bit/Vista (Home Standard, Business, Ultimate, Enterprise), Microsoft® Windows® 7 (Home Premium, Professional, Ultimate), Microsoft® Windows® 8 (Pro, Enterprise), Microsoft® Windows® Server 2003/2008/2012
- CPU: Intel Core i5-3570 3.30GHz/Intel Xeon E3 or faster (4cores or more)
- RAM: 2GB or more
- VGA: AMD Radeon™ HD 2400 or NVIDIA GeForce FX5500 (AMD recommended) (1280x1024, 32bpp or higher)
- Hard Disk Drive: 2 GB or more free space
- LAN: Gigabit Ethernet or faster

Client System

Recommended Requirements

- Operating System: Microsoft® Windows® 7 64-bit (Home Premium, Professional, Ultimate) (Microsoft® Windows® 8 (Pro, Enterprise) compatible)
- CPU: Intel Core i5-3570 3.30GHz or faster
- RAM: 4GB or more
- VGA: AMD Radeon™ HD 7700 or NVIDIA GeForce GTX650 (AMD recommended) (1280x1024, 32bpp or higher)
- Hard Disk Drive: 6GB or more free space
- LAN: Gigabit Ethernet or faster

Minimum Requirements

- Operating System: Microsoft® Windows® XP Home SP 3
- CPU: Intel Core 2 Duo E7200 2.53GHz or faster
- RAM: 2GB or more
- VGA: AMD Radeon™ HD 2400 or NVIDIA GeForce FX5500 (AMD recommended) (1024x768, 24bpp or higher)
- Hard Disk Drive: 1GB or more free space
- LAN: 10/100 Mbps Ethernet or faster

NOTE: The client system that is installed in a 32-bit operating system could have a problem that the video is not displayed, because of a memory shortage. Ask your dealer or distributor about details about it.

FishEye Client-Side Dewarping Recommended Requirements

- Operating System: Microsoft® Windows® 7 64-bit (Home Premium, Professional, Ultimate) (Microsoft® Windows® 8 (Pro, Enterprise) compatible)
- CPU: Intel Core™ i7-3770 3.40 GHz or faster
- RAM: 8GB or more
- VGA: AMD Radeon™ HD 7700 or NVIDIA GeForce GTX650 or higher (1280x1024, 32bpp), multi monitor
- Hard Disk Drive: 6 GB or more free space
- LAN: Gigabit Ethernet or faster

NOTE: The iNEX service (except for the video analytics service) is installed and operates in 32-bit or 64-bit compatibility mode. The video analytics service and other iNEX programs (Client and Service Manager, etc.) are 32-bit applications.

2.2 Installation

NOTE: Disable your PC's Windows power saving function: *Start menu* → *Power Options* → set both *Turn off the display* and *Put the computer to sleep* to *Never* (*Power Options* → *Power Schemes* tab → set both *Turn off monitor* and *Turn off hard disks* to *Never* when using the Microsoft® Windows® XP operating system).

CAUTION: If an older version of iNEX software is installed on your computer, a screen appears asking you to upgrade the software. In this case, you are required to upgrade the software according to the instructions in the screen.

Server System

1. Insert the software CD in the federation server.
2. Run the Setup.exe file of the software CD.

NOTE: The *User Account Control* window might appear when using the Microsoft® Windows® Vista or later operating system. Click *Allow* and install the software following the instructions.

3. Select the language in which to run the program and then click OK.



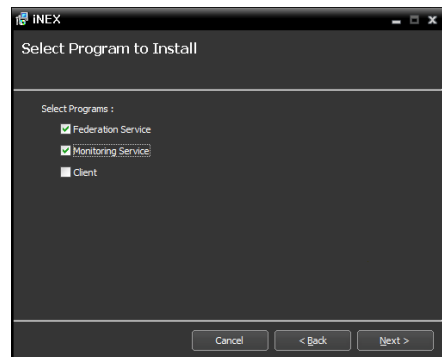
NOTES:

- To properly display the selected language, your PC's operating system should be set to support the selected language.
- To change the iNEX program's language after the software has been installed, select *Language Selector* in the *iNEX* → *Utility* folder of the *Start* menu before running the *iNEX* program.

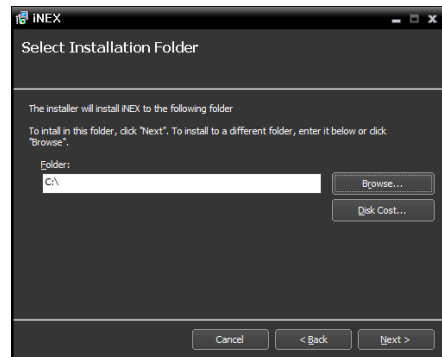
- When the following screen appears, select **Install** and click **Next**.



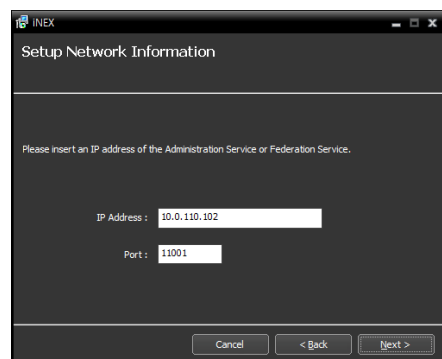
- Select **Federation Service** and **Monitoring Service**, and click **Next**.



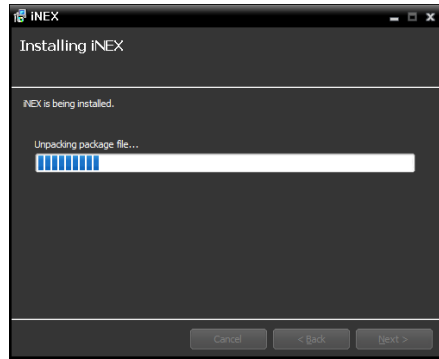
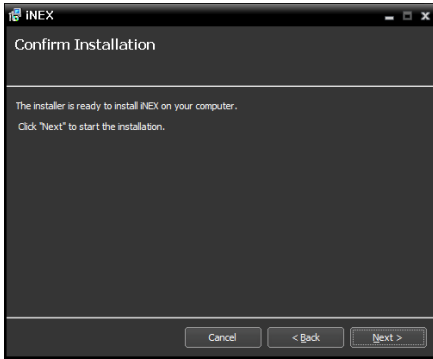
- Designate the folder path to install the service. Clicking the **Disk Cost...** button shows the available and required disk space for each hard disk drive for the installation. Then click **Next**.



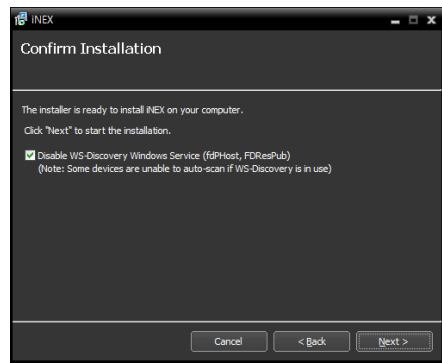
- If the service is installed on separate PCs, it is required to enter the IP address and port number of the federation server when installing the monitoring service. You can change the settings in the Service Manager program after completing installation if necessary. When the installation is complete, the monitoring service is connected to the federation service via the network if both services are operating.



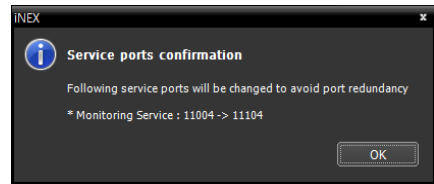
8. When the following screens appear, click Next.



NOTE: The following screen appears when using Microsoft® Windows® Vista or later operating systems. It is recommended that you check the *Disable WS-Discovery Windows Service (fdPHost, FDResPub)* box. If you do not check the box, the iNEX program cannot auto-scan devices using ONVIF™ Conformance protocol when scanning devices for device registration.

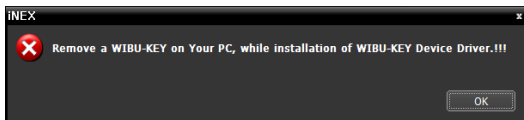
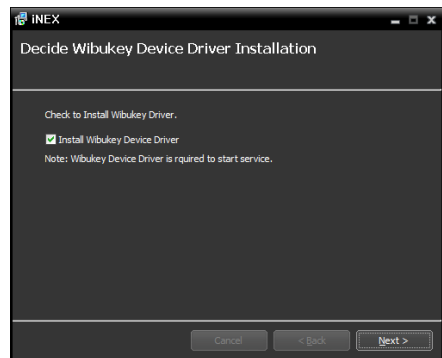


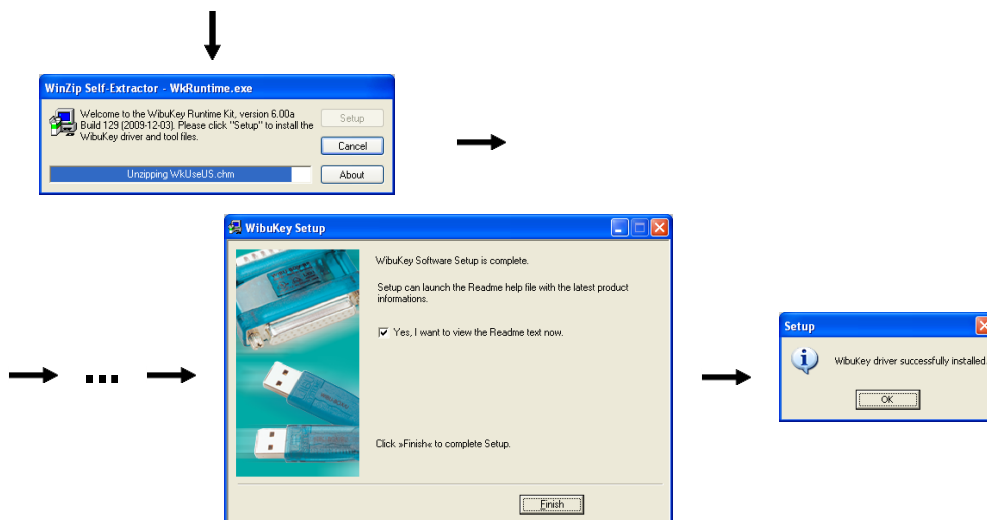
NOTE: The following screen appears when the port number of the service being installed is already in use, and the screen displays the port number that will be changed. The changed port number will be applied when the service starts operating after installation.



NOTE: .NET Framework and the Visual C++ Runtime Libraries are installed automatically, and it may take some time. This installation step will be skipped if the programs are already installed on your computer.

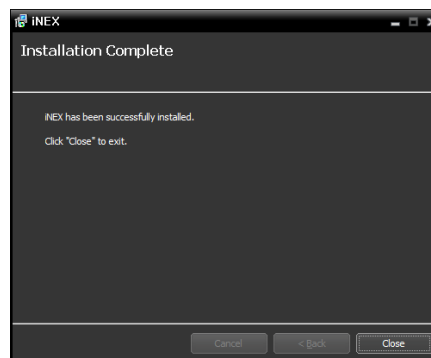
9. Disconnect the WIBU-Key from the server if a WIBU-Key is connected. Then install the WIBU-Key device driver following the instructions.





10. When the following screen appears, click the Close button to complete the installation.

NOTE: After successfully installing WIBU-Key device driver, the PC restarts automatically.



11. Connect WIBU-Keys to the federation server.

Client System

1. Insert the software CD in the Client PC.
2. Run the Setup.exe file of the software CD.

NOTE: The *User Account Control* window might appear when using the Microsoft® Windows® Vista or later operating system. Click *Allow* and install the software following the instructions.

3. Select the language in which to run the program and then click OK.

NOTES:

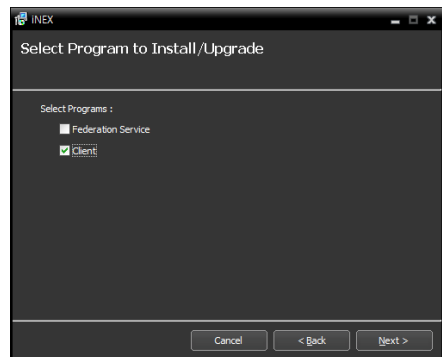
- To properly display the selected language, your PC's operating system should be set to support the selected language.
- To change the iNEX program's language after the software has been installed, select *Language Selector* in the *iNEX* → *Utility* folder of the *Start* menu before running the *iNEX* program.



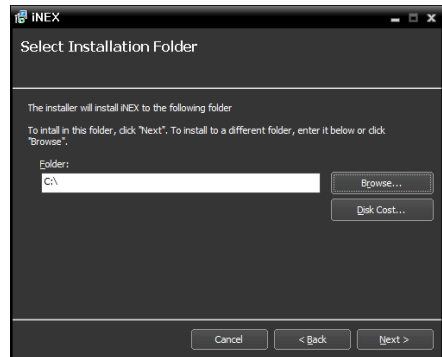
- When the following screen appears, select **Install** and click **Next**.



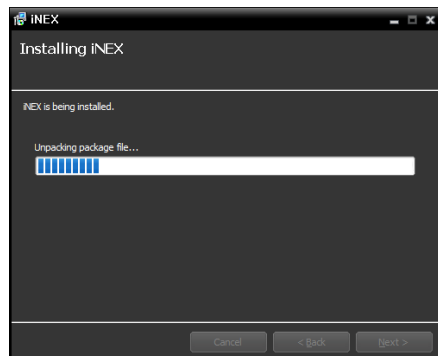
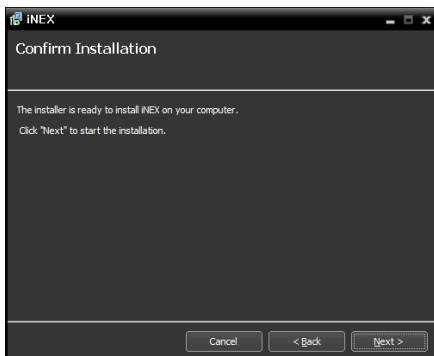
- Select **Client** and click **Next**.



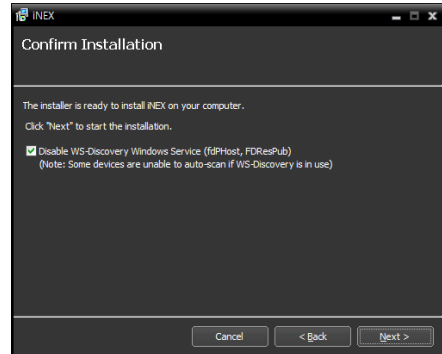
- Designate the folder path to install the Client program. Clicking the **Disk Cost...** button shows the available and required disk space for each hard disk drive for the installation. Then click **Next**.



- When the following screens appear, click **Next**.

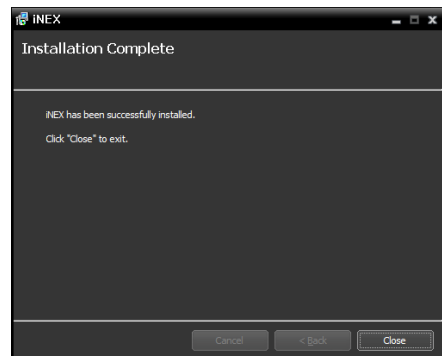


NOTE: The following screen appears when using the Microsoft® Windows® Vista or later operating system. It is recommended that you check the *Disable WS-Discovery Windows Service (fdPHost, FDResPub)* box. If you do not check the box, the iNEX program cannot auto-scan the devices that use the ONVIF™ Conformance protocol when scanning the devices for device registration.



NOTE: .NET Framework and the Visual C++ Runtime Libraries are installed automatically, and it may take some time. This installation step will be skipped if the programs are already installed on your computer.

- When the following screen appears, click the Close button to complete the installation.

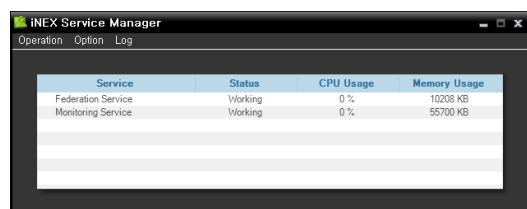


2.3 Automatic Upgrade

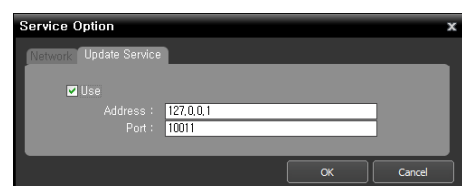
You can upgrade all services automatically by running the update service and designating the installation file of the software version to upgrade.

Update Service Setup

- Run the Service Manager program in the federation server.

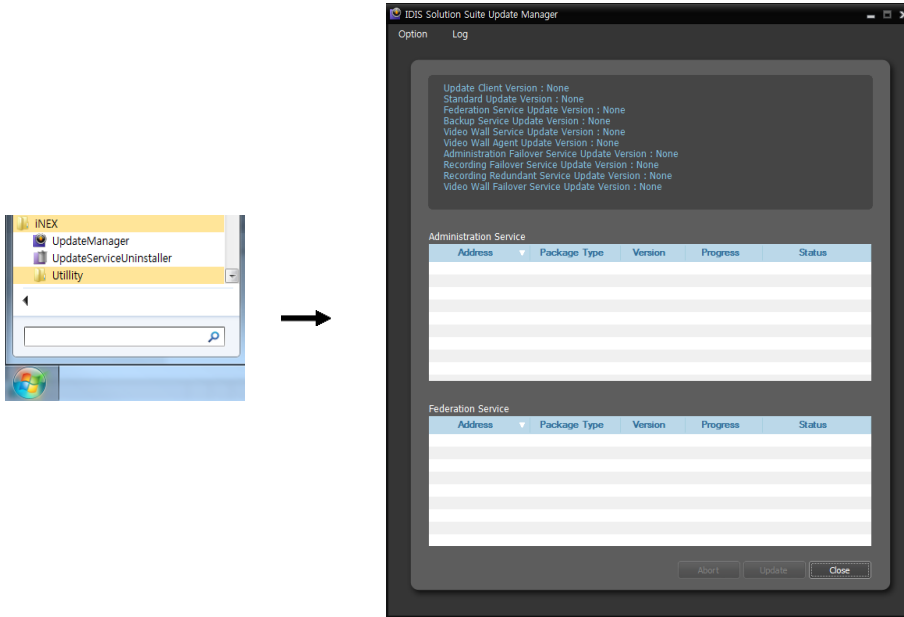


- Click Option menu and select Update Package and then select Update Service tab. Check the Use box and enter the IP address and port number of the update server. Refer to the iNEX Standard User's Manual for details about the installation of the update service.

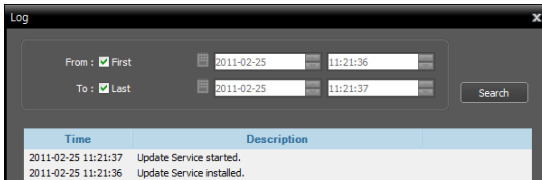


Upgrade

1. Go to the Start Menu in the update server → Click iNEX → Run the iNEX Update Manager program.

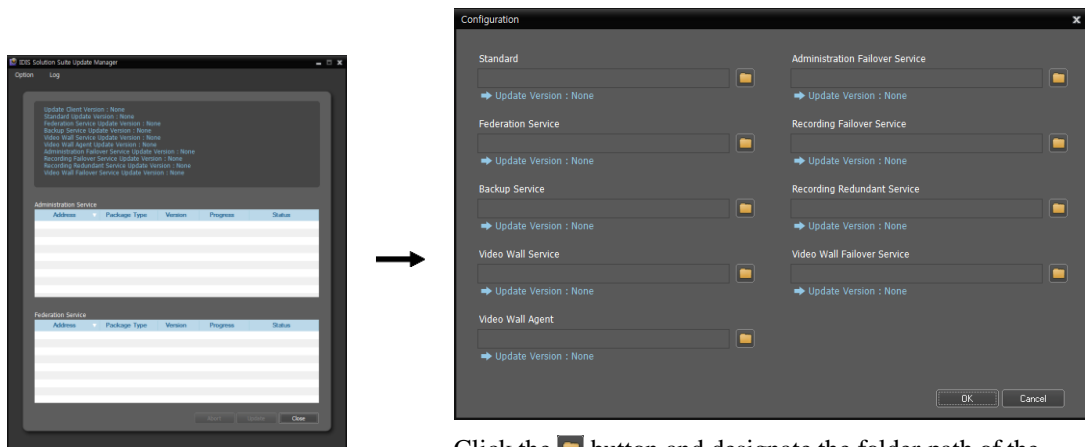


- **Option:** Designates the upgrade file or sets up the port number of the update server.
 - **Update Package:** Designates the folder path of the upgrade installation file.
 - **Port Setup:** Sets the port number of the update server.
- **Log:** Selecting **Show Log** allows you to check and search the system log.



Setting up the time range of the log and clicking the **Search** button displays the log information. Selecting **First** displays from the oldest log entries regardless of date. Selecting **Last** displays to the newest log entries regardless of date.

2. Click the Option menu and select Update Package.



Click the  button and designate the folder path of the upgrade installation file. Click the OK button.

- Click the Update button at the bottom of the iNEX Update Manager screen. For a Client system with no iNEX service program installed, clicking the Update button upgrades the Client program. For server systems, each service connects to the update service periodically and automatically upgrades if necessary.

2.4 Uninstall

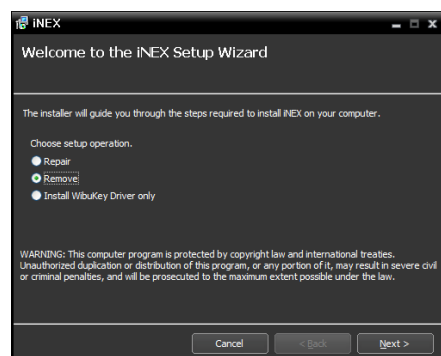
- Stop running the service and Client program first.

NOTE: The iNEX software might not uninstall correctly if you uninstall it while the services or Client program is running.

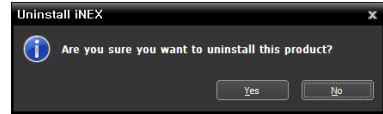
CAUTION: The iNEX software should be uninstalled following the procedures below. If you delete the installation folder manually, the iNEX software cannot be uninstalled or reinstalled.

- Go to the Start Menu and click iNEX. Click Uninstall iNEX.

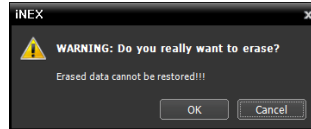
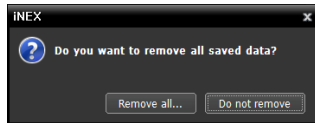
NOTE: You can uninstall the software by using the software CD. Insert the software CD in the federation server or Client PC and run the *Setup.exe* file. Select *Remove* and click *Next*.



3. Click **Yes** when the following screen appears.



4. Click the **Remove All** or **Do not remove** button when the following screen appears. Clicking the **Remove All** button deletes all saved data including previous settings in the system. Clicking the **Do not remove** button uninstalls the software without deleting any saved data in the system and keeps all saved data in the system.



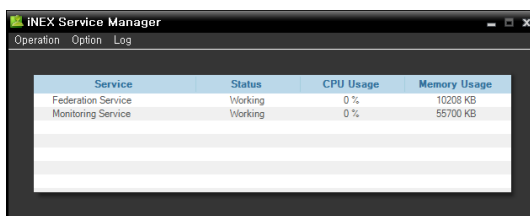
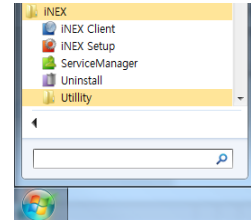
NOTE: The deleted data cannot be restored once the data is deleted.

5. Click the **OK** button to complete the uninstall process.

Chapter 3 — Getting Started

3.1 Running Services

When the federation service installed, the service runs automatically. You can also start or stop running the service manually. Go to the Start Menu → Click iNEX → Run the Service Manager program.

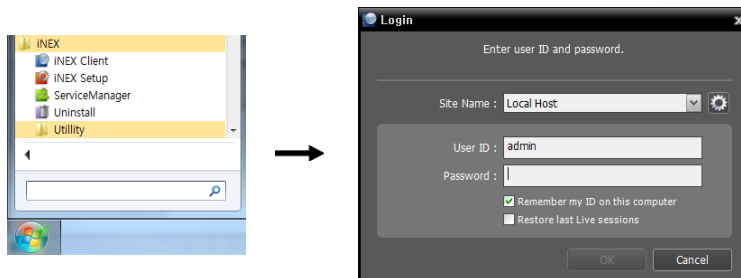



Check the status of the service. If the service is not listed as **Working** under **Status**, start the service manually. Refer to the iNEX Standard User's Manual for details about the Service Manager program.

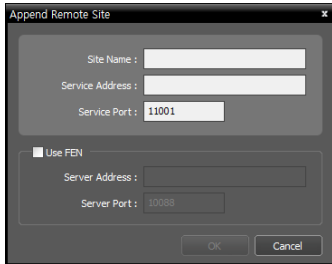
3.2 Log In

You are required to log in to the federation service as follows when running Setup and Client programs.

Go to the Start Menu → Click iNEX → Run the iNEX Setup or iNEX Client program and enter login information.



- **Site Name:** Select the federation service to connect to from the list. Select **Local Host** as the default setting if the federation service is running in the current system. You can add other federation services to the list or modify information about the federation service in the list by clicking the  button at the right.

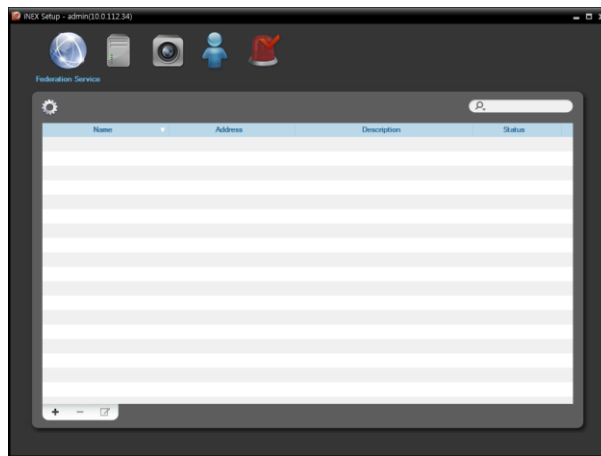



- **Site Name, Service Address, Service Port:** Designate the name of the federation service and enter the IP address and port number of the federation server (default: 11000).

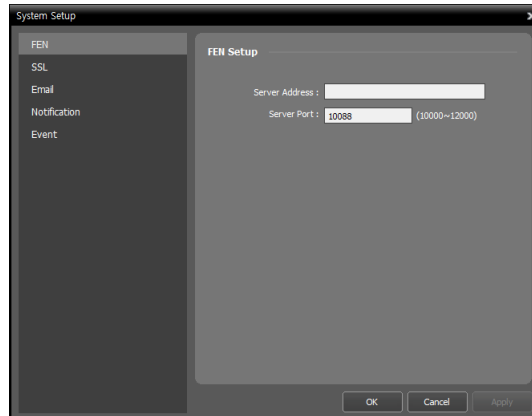
- **User ID, Password:** Enter your user ID and password. The default user ID is `admin` and default password is `12345678`. You can change the user ID and password in the User menu. Refer to the iNEX Standard User's Manual for details.
- **Remember my ID on this computer:** Check the box if you want to save your ID for logging on.
- **Restore last Live sessions:** Check the box if you want to restore the previous live monitoring sessions in the Live panel of the Client program (supported only for the Client program).

3.3 System Setting

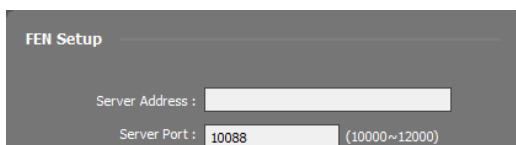
Run the Setup program and set up the federation server.



Click the  (System Setup) button to display the system setup screen.

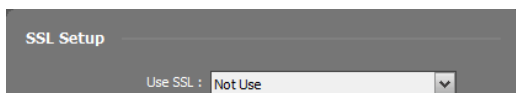


FEN



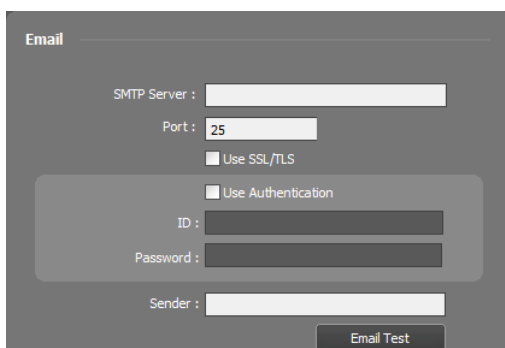
- **Server Address, Server Port:** Enter the IP address (domain name) and port number of the FEN server that the administration server to be registered on the federation server is registered.

SSL



- **Use SSL:** Allows you to enhance the security of data transferred between services of the iNEX program by using the SSL (Secure Sockets Layer) protocol. Using the SSL function might cause congestion in the federation server depending on the security level. Log in the iNEX program again after you change the setting. When the setting is changed, all services that are currently connected to the federation server reconnect, and the iNEX Setup and iNEX Client programs are logged out.

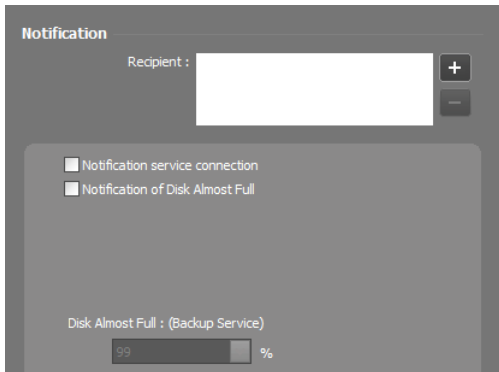
Email



Enter the SMTP server information.

- **SMTP Server, Port:** Enter the email address and port number of the SMTP server. Select Use SSL/TLS if the SMTP server requires SSL (Secure Sockets Layer) authentication.
- **Use Authentication:** Select and enter the ID and password if the SMTP server requires user authentication.
- **Sender:** Enter the sender's email address.
- **Email Test:** Click the button to test if the SMTP server information is correct.

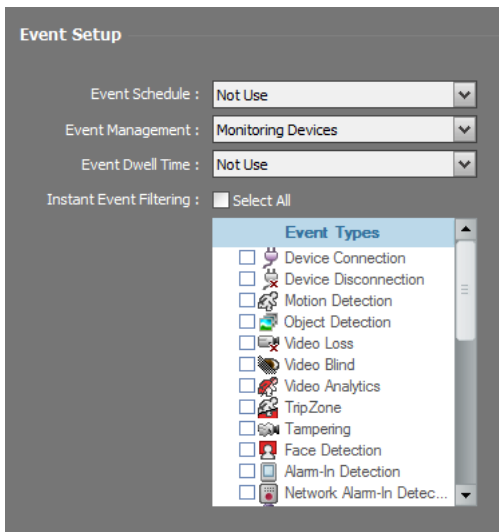
Notification



The iNEX system can notify service disconnection by sending an email.

- **Recipient:** Clicking the **+** button at the bottom allows you to enter email addresses of the recipients.
- **Notification service connection:** Sends an email to the recipients when any services are disconnected from the federation service.
- **Notification of Disk Almost Full:** Sends an email to the recipients when the system detects that the defined percentage of the hard disk storage space is being used.

Event



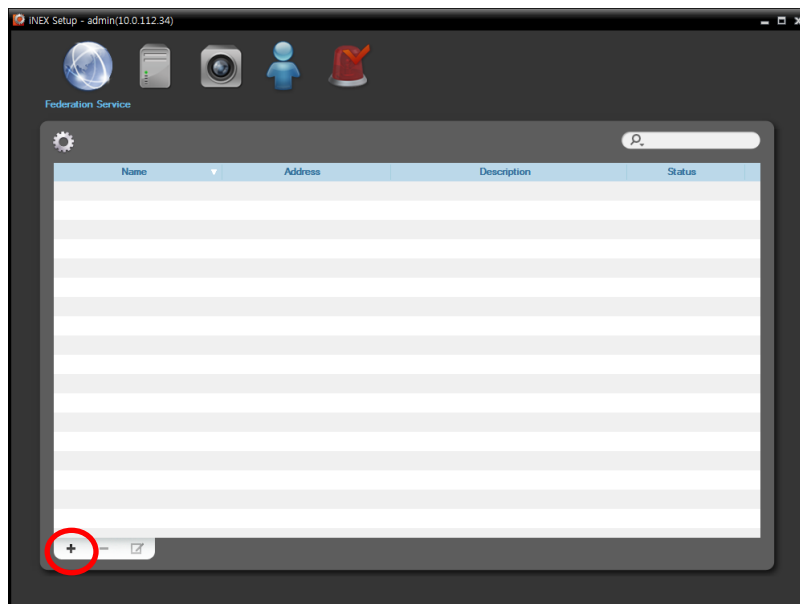
Set up the Event Management schedule option.

- **Event Schedule:** Enables or disables the Event Management menu. Refer to 4.2 Setup (p. 21) for details about the Event Management menu.
 - **Use:** Notifies you of events based on the settings in the Event Management menu.
 - **Not Use:** Notifies you of events based on the settings of the following Event Management options.
- **Event Management**
 - **Monitoring Devices:** Notifies of events detected at the currently monitoring cameras in the Live or Map panel.
 - **All Devices:** Notifies of events detected at cameras registered on the federation service.
- **Event Dwell Time:** The federation service does not notify you of the same type of events detected for the same camera within the specified period of time after the first event occurs.
- **Instant Event Filtering:** The administration service does not notify Client of the selected event even if the event is detected, except for Event Recording and Event Management schedule.

3.4 Registering Services

You must register administration services on the federation service.

Go to the Start Menu → Click iNEX → Run the iNEX Setup program and enter login information.

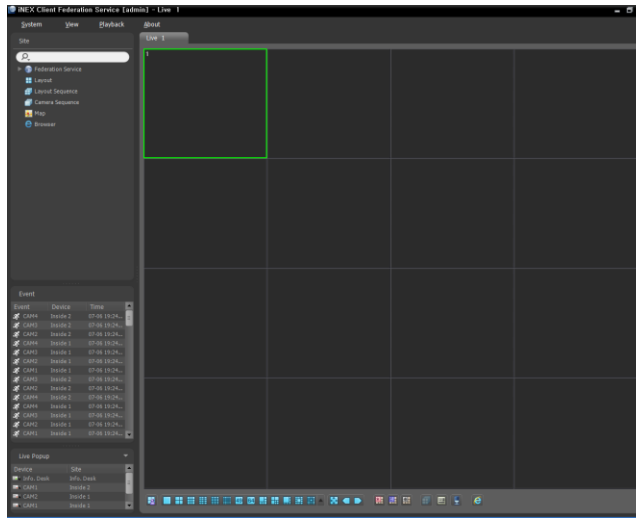


Click the **+** button at the bottom, and the Federation Service window appears. Enter the information for the administration service to register.

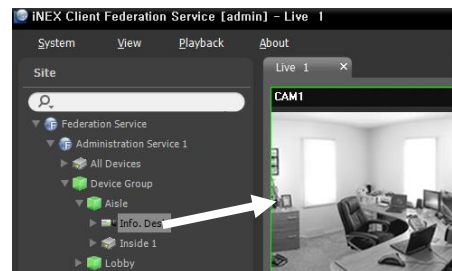
- **Site Name:** Enter the name of the administration service.
- **Service Address, Port:** Enter the IP address and port number of the administration server.
 - **Use FEN:** If the administration server uses the FEN function, selecting **Use FEN** allows you to enter the administration server's FEN name registered on the FEN server instead of the IP address.
 - **Use External IP:** Click the **Setup** button and enter the external IP address and port number of the administration server.
- **ID, Password:** Enter the ID and password for connection to the administration service. Only the users in the **Administrators** group are allowed to connect to the administration service from the federation service.
- **Connection Test:** Click the button to test the connection to the administration service with the information entered above.

3.5 Live Video Monitoring

Go to the Start Menu → Click iNEX → Run the iNEX Client program and enter login information.

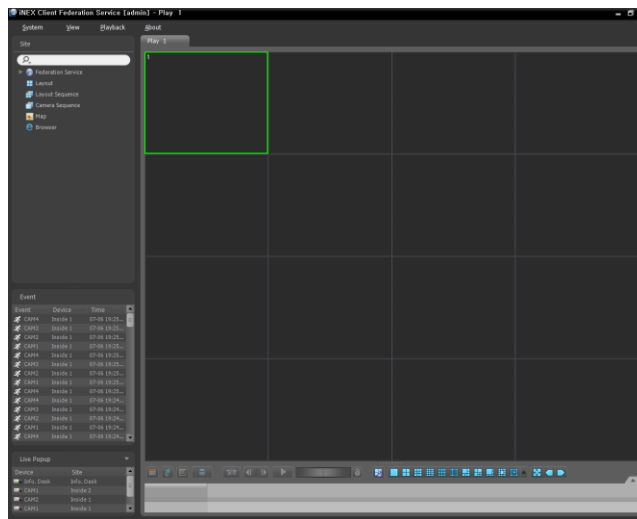


1. Check that the administration services were added to Federation Service in the Site list.
2. Click the Live tab on the tab panel → Select a site to connect to from the Site list, and drag and drop it on the Live screen. Live video from the selected site is displayed on the screen. Monitoring video in the Client program of the federation server is identical to monitoring of the administration server. Refer to the iNEX Standard User's Manual for details.

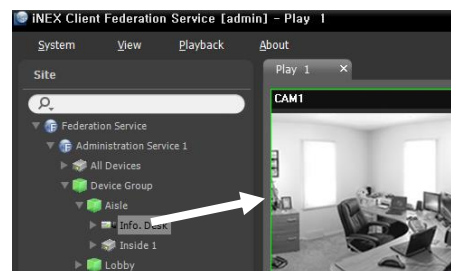


3.6 Playing Recorded Video

Go to the Start Menu → Click iNEX → Run the iNEX Client program and enter login information.



1. Check that the devices were added to a device group in the Site list.
2. Click the Play or DVR Search tab on the tab panel → Select a site to connect to from the Site list, and then drag and drop it on the Play or DVR Search screen. Recorded video from the selected site is displayed on the screen. You can search and play back recorded video by using the panel toolbar and timetable at the bottom of the Play or DVR Search panel. Playing back recorded video in the Client program of the federation server is identical to playing back of the administration server. Refer to the iNEX Standard User's Manual for details.



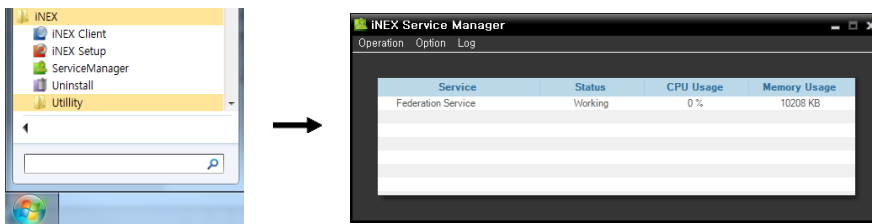
Chapter 4 — System Overview

The iNEX Federation software consists of the Service Manager, Setup and Client programs. Setting up and operating each program of the iNEX Federation software is identical to that of the iNEX Standard software except for the following functions. Refer to the iNEX Standard User's Manual for details. The following functions provided by the monitoring service are not supported by the iNEX Federation software.

- Client program: Instant recording
- Setup program: Device setup, Recording Schedule setup

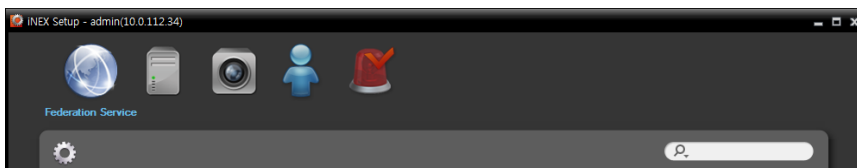
4.1 Service Manager



Services should be running on the system to operate the iNEX program. Go to the Start Menu → Click iNEX → Run the Service Manager program.



4.2 Setup

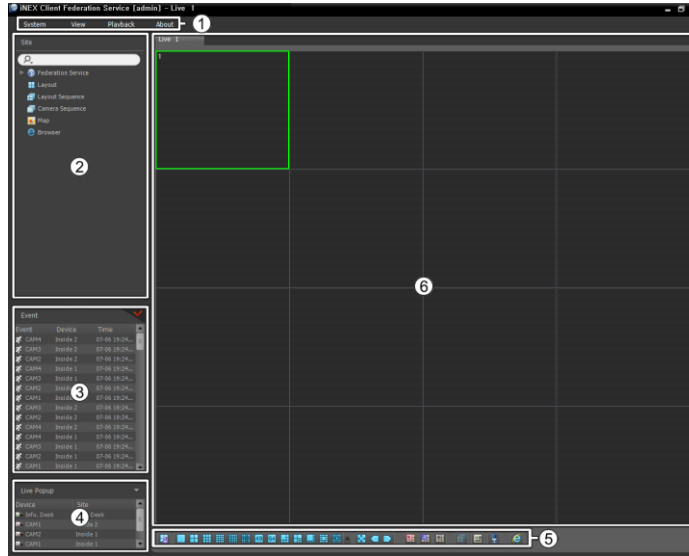
Go to the Start Menu → Click iNEX → Run the iNEX Setup program and enter login information. Refer to 3.2 Log In (p. 13) for details about the login.



- **Federation Service:** Allows you to register and manage administration services.
- **Service:** If any iNEX Monitoring service, Backup service or Video Wall service is running, it allows you to register and manage the monitoring services, backup services and video wall services. Ask your dealer or distributor about purchasing the iNEX Backup and Video Wall software and details about it.
- **Device:** Allows you to register and manage sites that consist of devices registered on the administration services.
- **User:** Allows you to register and manage users or user groups.
- **Event Management:** Allows you to set up event management schedules. This will not be available when Event Schedule is set to Not Use in the  (System Setup) → Event menu.
-  (System Setup): Sets up the federation server. Refer to 3.3 System Setting (p. 14) for details.

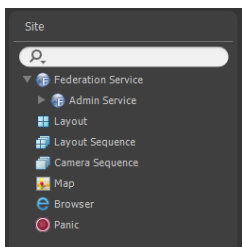
4.3 Client

Go to the Start Menu → Click iNEX → Run the iNEX Client program and enter login information. Refer to 3.2 Log In (p. 13) for details about the login.



- ① Menu: Allows you to control the Client program.
- ② Site List: Allows you to connect to the registered site by using the mouse drag and drop.
- ③ Instant Event List: Displays monitoring events from devices registered on the administration services. Event related functions may not be supported depending on the protocol that the device uses and the device model (supported protocols: iNEX protocol, some versions of the Axis, Panasonic BB, Panasonic WV (DG), Basler, Mobotix, Pelco, RTSP/STP, Protocol-H, IQinVision, ONVIF™ Conformance protocols). Ask your dealer or distributor for details.
- ④ Live Popup List: Displays the list of live popup screens currently displayed on the monitor.
- ⑤ Panel Toolbar/Timetable: Displays the toolbar or timetable depending on the panel.
- ⑥ Panel: Allows you to select which panel to use.

Site List



Displays the list of registered sites that are registered on the administration or federation service.

- **Federation Service:** Displays the list of administration services registered on the federation service. Clicking an administration service displays the list of sites registered on the administration service.
- **Layout:** Displays the list of registered layouts registered on the federation service. Clicking a layout in the list, and dragging and dropping it on the screen starts layout monitoring or playback.
- **Layout Sequence:** Displays the list of registered layout sequences registered on the federation service. Clicking a layout sequence in the list, and dragging and dropping it on the screen starts layout sequence monitoring.

- **Camera Sequence:** Displays the list of registered camera sequences registered on the federation service. Clicking a camera sequence in the list, and dragging and dropping it in the desired location on the screen starts camera sequence monitoring.
- **Map:** Displays the list of registered maps. Clicking a map in the list and dragging and dropping it in the desired location on the screen starts map monitoring.
- **Browser:** Displays the list of registered browsers. Clicking a browser in the list, and dragging and dropping it in the desired location on the screen launches the web browser.
- **Panic:** Displays the list of devices if there is any device for which panic recording has been done.

WEEE (Waste Electrical & Electronic Equipment)

Correct Disposal of This Product

(Applicable in the European Union and other European countries with separate collection systems)



This marking shown on the product or its literature, indicates that it should not be disposed with other household wastes at the end of its working life. To prevent possible harm to the environment or human health from uncontrolled waste disposal, please separate this from other types of wastes and recycle it responsibly to promote the sustainable reuse of material resources.

Household users should contact either the retailer where they purchased this product, or their local government office, for details of where and how they can take this item for environmentally safe recycling.

Business users should contact their supplier and check the terms and conditions of the purchase contract. This product should not be mixed with other commercial wastes for disposal.