

# NETWORK VIDEO RECORDER 1080p RESOLUTION 10/100/1000 Mbps

4-CHANNEL/8-CHANNEL/ 16-CHANNEL



User Manual DN-16111 • DN-16112 • DN16113

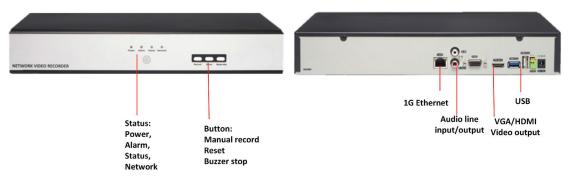
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# Hardware

#### **Overview**



#### **LED & Buttons Definitions**

LEDs	Status	Definitions							
Power	On	Solid- Power on							
Alarm	On	Blinking when a system/camera event occurs.							
		each event							
	None	Goes off if reaches the 10-second duration, or when buzzer stop button is pressed							
		(if buzzer is triggered)							
Status	On	*Solid- Normal operation							
		**Blinking after press and hold the reset button for 5 seconds indicates the device will enter the restore							
		default process. Other LEDs remain unchanged during this state.							
		*Blinking during firmware upgrade(web page upgrade or USB upgrade)							
		*Keep blinking for failed firmware upgrade through USB disk or web							
	None	*When system is unable to start properly							
Network	On	*Solid for activity on a 10/100M/1Gbps network							
Buttons									
Manual record	ON	Press and hold for 2 seconds							
	OFF	Press and hold for 2 seconds							
Reset	Restore default	Press and hold for 10 seconds							
	Restart	Press and hold for 2-10 seconds							
Buzzer stop	STOP	Press and release should stop buzzer right away							

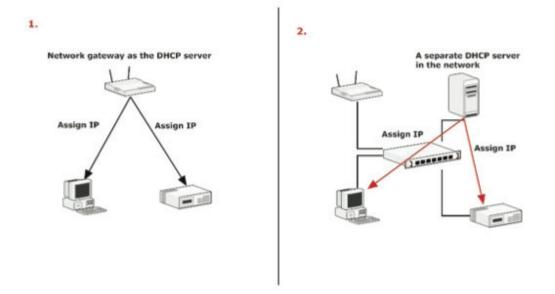
# **Connect to the NVR**

There are various ways you can connect to the NVR and below are the suggested methods for different network setup:

• The NVR is placed in a network with a DHCP server: Connect to the NVR by using **"NVR Search" Utility** 

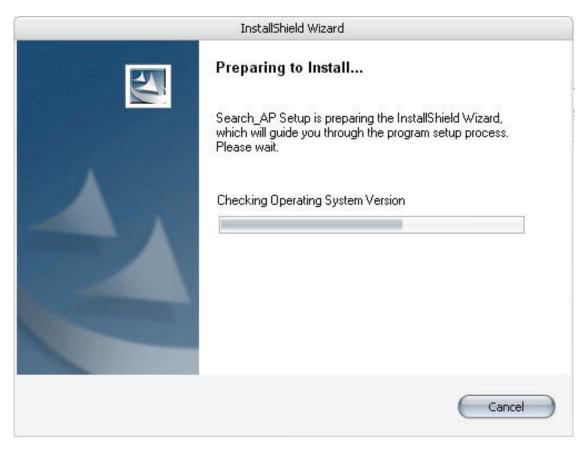
• The NVR is placed in a network without DHCP server (or you are connecting to it directly): **Access the NVR with its default IP** 

#### **Use NVR Search Utility**

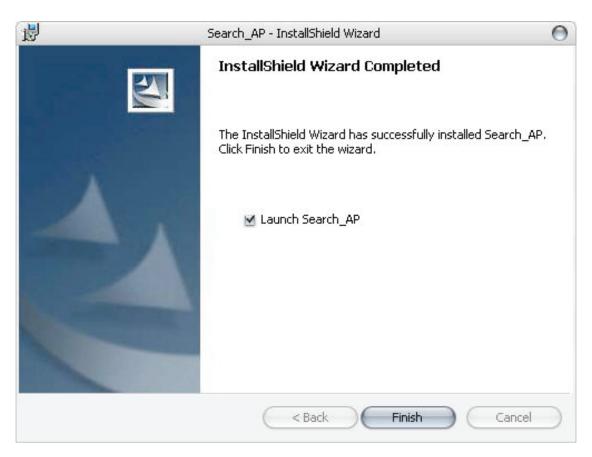


If the NVR is placed in a corporate network or a local area network where a DHCP server is already presented, run the "NVR Search" utility from a computer that is on the same network and locate the NVR with its IP address that is assigned by the top-level DHCP server.

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To begin, launch the "NVR Search" utility from the CD and proceed with the installation:



Once the installation is complete, check the "Launch the Search AP" option and click "Finish".



The search should start automatically and its status should be displayed.

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tate IP Address 192,168,11.16	Http Port 80	Brand	Modal	MAC Address 00-22-4e-a1-b2-c3
State IP Address 192.168.11.16		Brand	Modal	
192.168.11.16	80			00-22-4e-a1-b2-c3

The NVR should be located and its IP address should be displayed.

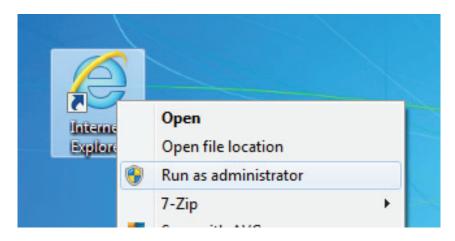
🧀 NVR Device Search				×			
3 🖸 🕑 🛤 🕈 🖪	P						
State IP Address 192.168.11.16	Http Port 80	Brand	Modal	MAL Address 00-22-4e-a1-b2-c3			
	+						
Double-click							

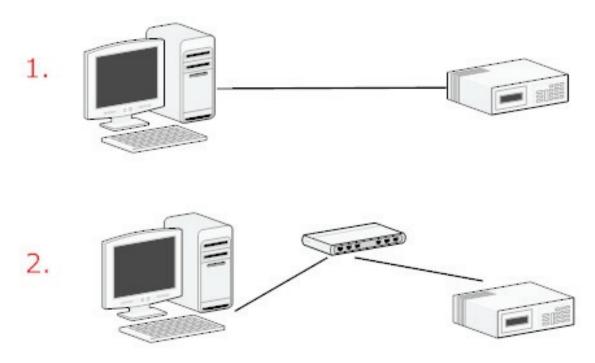
Double-click on an NVR and the search program should automatically access the NVR's web administration page from your default browser.

Connect to 192.	168.101.91	? 🛛
		G
i		
User name:	<b>2</b>	~
Password:		
	Remember my	/ password
	ОК	Cancel

You should be prompted for the NVR's username and password. Enter **its default username "admin" and password "admin"** and then click "OK" to enter the system

- Please make sure you are using Internet Explorer 7 or above
- If you are running Windows Vista or 7, please make sure you are running Internet Explorer with the "administrator" privilege.



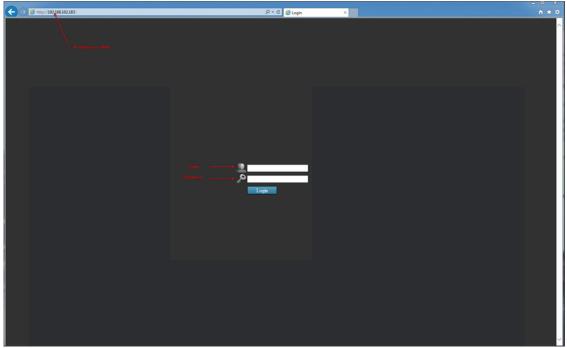


#### Access the NVR with its default IP address

The NVR comes with a pre-configured static IP "**192.168.101.50**". However, it is only used when there is no DHCP server presented in the network. The NVR will turn on its DHCP server function and act as the DHCP server in the network. To connect to the NVR, use a PC that is on the same network over a switch or hub, or connect the PC directly to the NVR using a crossover CAT5 Ethernet cable.

File	Edit	View	Favorites	Tool	s
G	Back	- 6	. 🗙	2	C
Addre	iss 🙋	192,16	8.101.50		
	_				

The PC that is connected directly to the NVR (or within the same local area network) should receive an IP from the NVR. Simply access the NVR from your web browser with its IP address

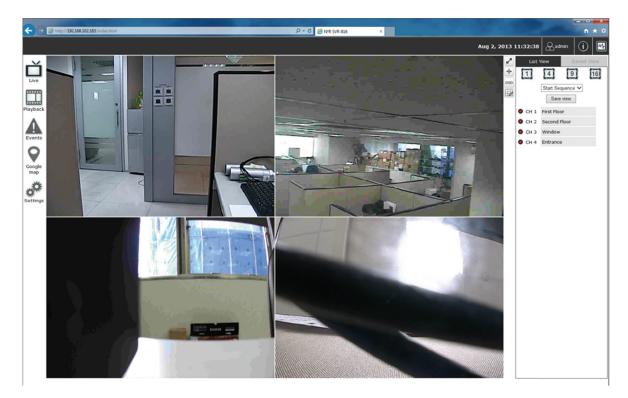


Again, you should be prompted for the username and password. Enter its default username "**admin**" and password "**admin**" and then click "Login" to enter the system

edmin Derrort Auto Login Login												
								Back				
	_											
Shi	, z							Char	Enter			
		Space										

If you use local UI to operate NVR, click to display virtual keyboard to enter user name and password.

# **Main/Live View**



The main/live view is the first interface displayed once you access to the NVR through the internet browser.

It displays the live video of all the cameras added to the NVR and following the pattern chosen by the user. The interface has many functions explained bellow.

The "Live View" page provides the following functions:

- Retrieve camera's video stream
- Retrieve camera's status
- Perform Live Sequence Viewing
- PTZ Control (Click directly on the video)
- Perform PTZ Preset Sequence viewing
- Perform manual recording

• **Take snapshot** - as soon as a snapshot selection is made, the snapshots are automatically saved to x:\SnapshotFolder ("x"

- represents the partition where Windows is installed, e.g: C:\)
- Receive audio of a video stream
- Send audio
- Control "Buzzer"
- Change web UI display language

#### a.The UI's 5 main functions:



The bar displays the 5 main functions of the Web User Interface (UI).



The Live view is the main view .The other 4 views will be explained in each chapter.



Google



## b. Date and Time display

Aug 2, 2013 13:43:40

The Date and the Time are defined by the user in the settings section of the NVR.

## c. User's configuration



It displays the name of the current user.

If you click on the name of the user, the context menu offers the functions bellow:

- Language settings
- User setting
- Locking the screen
- Logout function

#### d. Hardware events notification

# í

In this section, you will receive notifications if a warning sound is triggered or if the hard drive of the NVR failed in recording data.

#### e. Channels status



If you click on the icon, page tab will display the current status of the channels added to the NVR.

								2014/05/28 18	28:44 🖉 adm
					Channel Status				
Channel	Name	IP address	HITP port	Continuous Recording	Schedule Recording	Event Recording	Manual Recording	Stream 1	Stream 2
1	SNC-CH240	192.168.101.10	80					<ul> <li>H264 @ 1920x1080</li> <li>20fps, 2172kbps</li> </ul>	
2									
3									
4									
5									
6									
7									
8									
9									

It can also display the current configuration used for the event recording or the configuration settled for the scheduled and manual recording.

The channels status page is updated as long as the NVR's main user interface is open.

#### f. Video frame

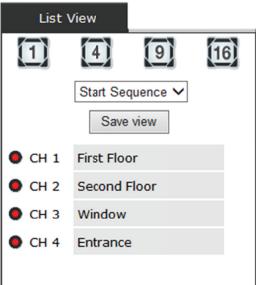
All the camera's videos are displayed in this frame.

- The PTZ function is available by clicking of the left button of the mouse on the camera's view.
- Double click on the left button of the mouse enables the zoom function. To disable it you can click on the right button of the mouse.



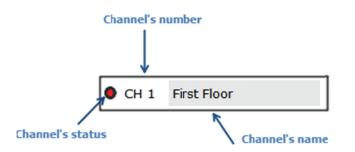
If the cursor is pointing on one of the cameras, it will show a bar in the top.

The bar displays the channel's number and some functions as showed on the snapshot above.



#### g. List view

It displays the list of channels added to the NVR. Each channel represents a camera with its name, the channel number and its currents status.



The channel's status is defined by 3 colors:

- Red: The channel is recording and the live view is available
- Blue: The channel is connected and live view is available
- Grey: The camera is disconnected

h.1, 4,	9, 16	Pattern	view
	(4)	9	16)

Different patterns of live view can be displayed on the video frame. You can display 1, 4, 9, or 16 cameras at once.

Every time you click on an " n'' pattern icon, the live video of the next "n'' cameras will be displayed.

#### i. Sequence view

Start Sequence
5s
10s
20s
30s
45s
60s

The sequence mode will automatically switch between a single or group of cameras every a certain period of time. You can define this period to 1 second to 60 seconds

#### j. Save view

Save view

Click on the save view button and you will able to name the current view and save it.

This will help to quickly display your configured views when needed.

#### k. Saved view

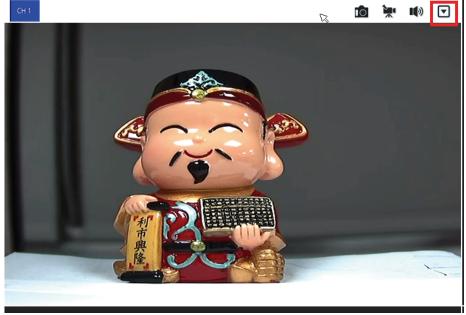
List View	Saved View						
Start Seq	uence 🗸						
	<u>ш</u>						
View1							
✓ view2							
🗌 view3							

This section can display the views that you have already saved. You can choose the views from the list you have created. You are also able to switch between saved views every certain period of time by clicking on the "start sequence function".

If you check the box beside the name of the view, you can edit or delete the view.

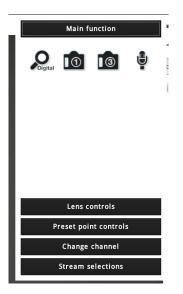
#### I. Hidden accordion menu

Click 🖸 button to open accordion menu.



The accordion menu is used to control video channel, the function depends on supported camera.

The functions include main function (digital PTZ, snapshot, audio post), lens control, preset point control, change channel, stream selections, fisheye mode and lens selection.



Main function



- 1. Digital PTZ On/Off (Default: Off)
- 2. Take a snapshot
- 3. Take 3 consecutive snapshots

4. Audio post (should be in disabled state if camera doesn't support this function)

If multi-stream mode of camera is supported by NVR, you can select the suitable video stream to be displayed.

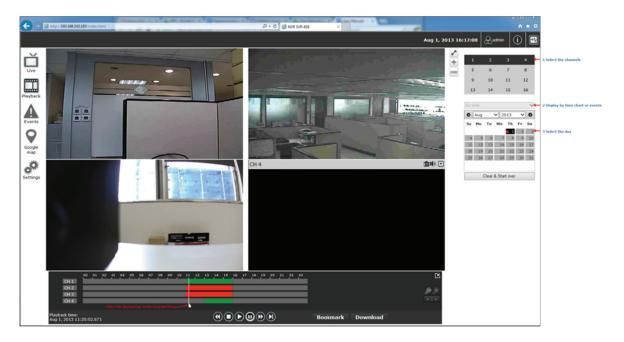
Main function						
Lens controls						
Preset point controls						
Change channel						
Stream selections						
Change to:						
Stream 1 : h264 , 1280x720						
Stream 2 : h264 , 640x480 😽						

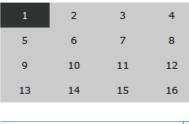
# **Playback view**

Playback is a function that allows you to play one or more videos that were previously recorded by a chosen recording method or due to an event trigger. The NVR offers synchronized playback from up to 4 channels and various types of search methods are provided to help you find the footage you need quickly.

You can turn on or off the audio of a recorded video at your choice if audio was also recorded during the recording of the video.

Playback video can be viewed in full screen and snapshots can be taken and saved during a video playback.





Search recordings	•
Search recordings	
By time	
By events	

To play a recorded video:

- 1. Select channel
- 2. Choose "search mode", by times or by events

#### a. Zoom on a range of time



If you click on the icon you can zoom on range of the time and get more details on the playback bar.

# b. Minimize the bar of the playback

If you click on the icon you can minimize the playback range to get more space for the videos.

c. Certain functions you can perform to the playback video

You can do the followings by right clicking on the playback video:

- 1. Play Audio
- 2. Snapshot
- 3. Export as AVI file
- 4. Digital PTZ
- 5. Adjust brightness
- 6. Adjust Contrast

#### d. Take a snapshot of a playback video

To take a snapshot, click on the button " $\square$ ", there is a manual showing up. You are given with options to take 1 snapshot or 3 continuous snapshots.

If the "3 continuous snapshots" option is chosen, the new window displays snapshots and lets you view them individually by using the "Prev", "Next" buttons shown above.

However, as soon as a snapshot selection is made, the snapshots are automatically saved to  $x:\SnapshotFolder$  ("x" represents the partition where Windows is installed, e.g: C:\)

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You can right-click anywhere on the image and select "Save Picture As..." to save the images somewhere else if you wish.

2014/0	5/28	19:2	8:13	&	admin	(	!	
💼 🕪 🚺	2		_					
	⇒ Mai	n funo	tion				- 1	4
		jital	1		3			2
								6
								-
	→ Enh	ancer	ments					0 Sat
						1	2	3
		4	5	6	7	8	9	10
		11	12	13	14	15	16	17
		18	19	20	21	22	23	24
		25	26	27	28	29	30	31
				Clear &	& Start	over		

X	-	1		-	-4				-	~	~	/															
Сн	1	00	01	02	03	04	05	06	07	08	09	10	11	12	13	14	15	16	17	18	19	20	21	22	23		Ľ
СН	_		-	-	-								-	-		-	-	-	-	-	-	-	-	-	5		
СН	13																								Ī.	ø	ø
СН	16																									4	F
Playba Aug 12										•	0		•	$\bullet$	) (	•	Þ	)		Book	mark		Dov	wnload			

"Bookmark" is used to set a time range for export.

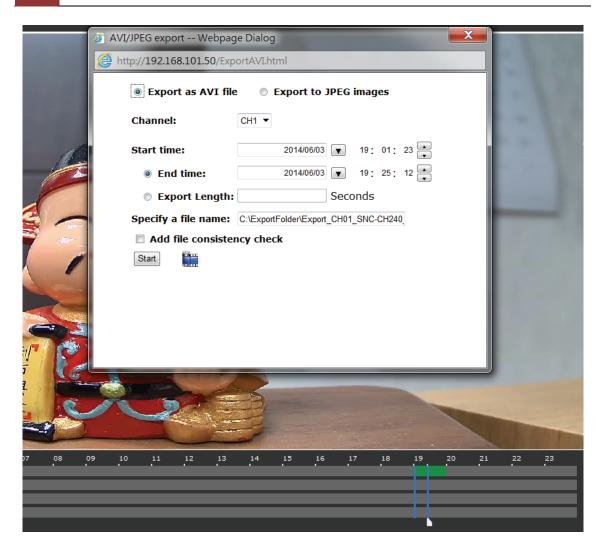


1. Click will set the current playback time as "Start" time. A blue slider should be displayed on the timeline.

2. Click again will set the current playback time as "end" time. A blue slider should be displayed on the timeline.

Click "Download" to open a pop-up dialog for export options

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On Web UI

Channel:	(CH 1		2	•
Begin Time:	2014/06/03	-	19:00:59	\$
End Time:	2014/06/03	-	19:34:26	\$
		0	ĸ	Cancel

On local UI, the recorded video can be backed up to a USB disk with AVI file. It is required to plug in a USB disk formatted in FAT32 prior to using the backup function. Click "OK" to open a pop-up dialog for USB disk options

Stop



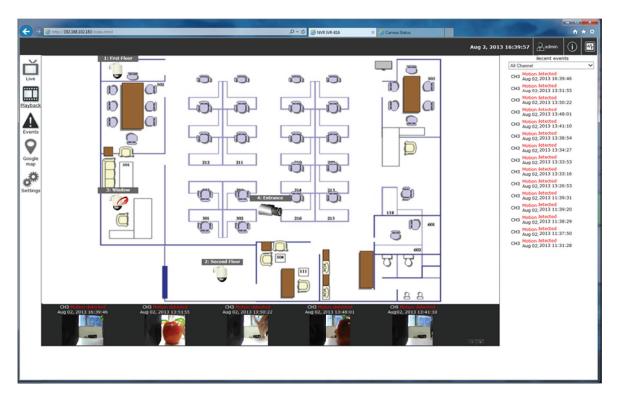
Click "OK" to start back up

USB backup in progress Time: 2014/06/03 19:04		
		Stop
	Backup complete	
USB backup in progress,		

# **Event view**

This section displays the last events recorded by the NVR.

The events can only be detected and displayed if you have configured it on the NVR's settings. You can display the event of all the channels at once or by each channel.

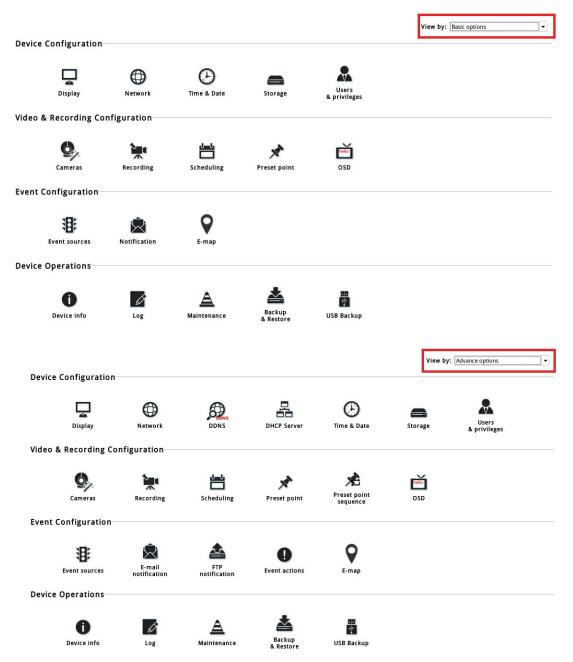


You can click on one of the picture on the bottom of the UI to display the de event related to it. The event can also be displayed if you choose them from the list in the right side of the UI.



# **NVR Setup – Settings**

The "Settings" page provides users options to setup the device quickly and properly. There are two modes, basic mode and advance mode. You just select mode from drop down manual.



After properly configuring all settings in all the sub-pages, users should expect a fully working network video recorder that is ready to manage cameras on the network. We will start by configuring its network settings to make sure it works correctly in your network. Next, we will help you adjust the system time so videos will be recorder with correct timestamp. To better secure the system for unwanted disturbance, we will guide you on setting up user's account and privileges to prevent settings gets altered by users other than the system administrator. Lastly, we will tell you what you should expect after installing a hard disk and how to prepare the hard disk for the video recording.

## Display

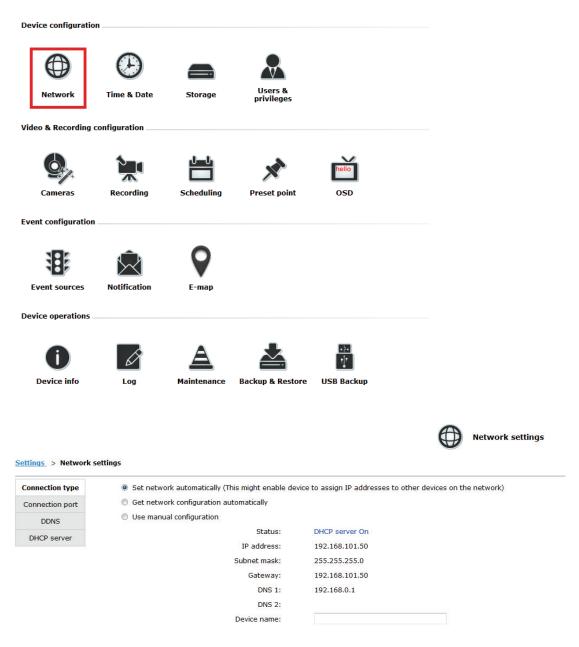
				Display settings
ň	<u>Settings</u> > Display	settings		
Live	Display	HDMI & VGA display:		
		Resolution:		
		Auto Auto 1024 x 768	12	
Playback		1024 x 768 1280 x 720 1280 x 1024 1920 x 1080		
Events				
¢				
Settings				

The "Display" configuration page allows you to choose the most optimized display resolution for the monitor that's used with NVR, as there will be circumstances that the incorrect resolution may be used when the system first boots up.

The NVR comes with two video outputs (HDMI: Primary as default, VGA: Secondary as default). The video is same for both outputs.

# NOTE: The NVR will reboot automatically upon change of resolution/or monitor for the new setting to take effect or be detected.

#### **Network Settings**



The NVR supports three connection types that can be configured depends on how the network is setup:

1. Set network automatically

Set the NVR to configure network settings automatically

1) When no other DHCP server is in the network, the NVR should use the default IP: 192.168.101.50 and turn on built-in DHCP servers

2) Users should not be able to change IP settings when this mode is selected

- 3) Users can not turn on/off built-in DHCP server
- 2. Get network configuration automatically This sets the NVR as a DHCP client

1) If no other DHCP server is in the network. The NVR should change to use the auto mode automatically

2) Users should not be able to change IP settings when this mode is selected

- 3) Users can not turn on/off built-in DHCP server
- 3. Use manual configuration Set the NVR to use static IP
- 1) Built-in DHCP server should be turned on when this mode is selected.
- 2) Use the NVR's default static IP when this mode is selected.
- 3) Users can change the IP settings

Users can turn on/off built-in DHCP server.

You need to adjust settings in this page for the device to work properly in your network. It is critical that settings here are configured correctly based on your network configurations so that the recorder can be administered through the local area network and cameras can be connected from it.

By default, the recorder is set to "Set network automatically" which if there's a DHCP server in the same local network, the NVR can obtain IP address from DHCP server, and you can locate the NVR by using the NVR search utility.

If there's no DHCP server in the network, and the NVR is set to enable DHCP server, it will use its own default static IP 192.168.101.50.

		Network settings
Settings > Network set	ettings	
Connection type	Set network automatically (This might enable dev	vice to assign IP addresses to other devices on the network)
Connection port	Get network configuration automatically	
DDNS	Use manual configuration	
DHCP server	Status:	DHCP server On
bildi berter	IP address:	192 . 168 . 101 . 50
	Subnet mask:	255 . 255 . 255 . 0
	Gateway:	192 . 168 . 101 . 1
	DNS 1:	
	DNS 2:	
	Device name:	

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If you wish to set the recorder to use a static IP address in your local area network,

1. Choose "Use manual configuration"

2. Enter the IP address, subnet mask, default gateway address and DNS server address for the recorder

\* The recorder can detect the presence of a DHCP server upon startup. It sets itself to use static IP address if there is no DHCP server currently presented in the network. Its DHCP server function is also turned on at the same time to assign IP addresses to cameras that are later connected to the network or you can manually turn off the DHCP server function if you wish to use a separate DHCP server.

#### **DHCP Server**

		$\bigcirc$	Network settings
Settings > Network settings			
Connection type	DHCP server:	() ON	OFF
Connection port	Max. DHCP dient:	30	(Max. 30)
DDNS			
DHCP server			

The built-in DHCP Server function is NOT always configurable and is greatly dependent to the connection type that is set to use in " Network Settings".

DDNS Se	DDNS Service							
<u>Settings</u> > Networ	k settings		Network settings					
Connection type	Enable DDNS service							
Connection port	Service provider:	www.no-ip.com						
DDNS	Domain name:							
DHCP server	Username:							
	Password:							
	Connection status:	Disconnected						
	Check DDNS status							

DDNS, which stands for "Dynamic DNS", is a method, protocol, or network service that provides the capability for a networked device, such as a router or computer system (in this case, the NVR) using the Internet Protocol Suite, to notify a domain name server to change, in real time, the active DNS configuration of its configured hostnames, addresses or other information stored in DNS.

A popular application of dynamic DNS is to provide a residential user's Internet gateway that has a variable, often changing, IP address with a well-known hostname resolvable through standard DNS queries. This is useful if the NVR is placed on the Internet with a dynamic public IP, which once the DDNS is properly setup, users can access the NVR remotely with the DDNS domain name without worrying if the IP has changed or not.

\*Please make sure a valid DNS server has been configured under the "Network Setting" page in order for this function to work properly.

\*The NVR currently works with free DDNS service provided by "DynDNS & No-IP". For more information, please go to <u>www.dyndns.com</u> & <u>http://www.noip.com/</u>

\*If the NVR is placed behind a router or Internet gateway, please make sure port forwarding for port 80 is configured on the router or the gat- way in order for the DDNS function to properly register with the service. **It's often suggested to use the DDNS function in the router/ gateway for such case instead.** 

\*Once you have the DDNS function successfully up and running, please DO NOT forget to configure port forwarding for the NVR web port (default 80) and the streaming port (default 9877) in the router/gateway for remote viewing. You can then type in http://yourddnsdomain in the browser to access the NVR remotely for live view.

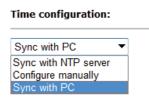
#### **Time and Date**

<u>Settings</u> > Time & Date	Time & Date
Time & Date	<u>Reminder:</u>
	It's important to setup the system time properly before using any of its functions, especially recording. Altering system time at any point may result in unexpected system error/restart, or loss of the recording data.
	Time zone configuration:
	GMT+08 (Beijing, Hong Kong, Shanghal, Taipei) 👻
	Enable summer time
	Time configuration:
	Sync with PC
	2014/05/29 10:28:57

Set the time and date by selecting the time zone according to your location. It is imperative that you set the recorder's time correctly to avoid the following errors:

• Incorrect display time for playback videos

• Inconsistent display time of event logs and when they actually occur After selecting the time zone, choose an option below to set the recorder time



Time configuration:

•Sync with NTP server – enter the hostname or IP address of a valid NTP server and set how often the recorder should synchronize the time with it by using the "Update interval" drop-down menu

Sync with NTP server 💌						
NTP server:	ntp.ucsd.edu					
Update interval:	24 hr 💌					
	Last sync: 2000/01/01 08:51:10. Status: Failed					

•**Configure manual** – Use the drop-down list and configure the time manually

• **Sync with PC** – Check this option to synchronize the recorder time with the PC that you are currently using to access the recorder

### Storage

Disk actions Select an action ▼										
<u>Disk list</u>										
Disk ID 2	Model	Capacity 469GB	Remaining space 445GB	Online Time 2014/06/03 19:00:41	Recording Period 2014/06/03 19:00:53 - 2014/06/03 19:03:00	Est. remaining recording time	Status Online			
USB disk list Disk ID Capacity Remaining space Status										

Once you install a hard disk to the recorder, you would need to initialize it so that it can be ready for recording. You can obtain basic information about the disk you installed in this page.

Disk actions						
Format	-	Select a disk or volume 🔻				
		Select a disk or volume				
		Hard disk 2				

To initialize it, simply choose the "Format" and disk ID in Disk actions, then click "Apply"

\*This page will list the Internal disks, and the USB disk only. The HDD will be formatted in EXT4 file system.

- Disk ID: Display disk ID
- Model: Display HDD model name
- Capacity: Display HDD capacity in "GB"
- Remaining space: Display remaining space in "GB"
- Online Time: Display when it was formatted
- Recording Period: Display period of time recording was taken place
- Est. remaining recording time: Calculate remaining recording time based on remaining disk space and current cameras' settings
- Status: Display HDD status

#### **Users & privileges**

		Users & privileges		
Users & privileges				
Create new user			Group privileges	Edit
Username:			Group name:	
Password:			Live videos	Advance
Confirm password:			Allow use of PTZ	Advanc
Group:	-		Playback videos	Advanc
Language:	<b>~</b>		System settings	Advanc
User account list				
		Add Remove		
Username	Group	Language		
admin	admin	English		

Multiple users can access the recorder simultaneously. You can add, remove, and edit users by using options provided in this page to keep user information organized. Each recorder comes with a built-in "admin" account with password "admin". It's highly recommended to change the password upon your initial login.

Create new user		
Username:		
Password:	]	
Confirm password:	]	
Group:		
Language:	]	
<u>User account list</u>		Add Remove
Username	Group	Language

admin

English

#### Add a new user

Click "Add" to add new user

admin

- Enter a username and password
- Select a group from the "Group" drop-down menu to assign the new user to a particular group

• Click "Apply" to finish configuration

Create new user			
Username:	admin		
Password:	•••••		
Confirm password:	•••••		
Group:	admin 🔻		
Language:	English 🔻		
<u>User account list</u>			Add Remove
Username		Group	Language
admin		admin	English

# Change the password of the "admin" account

- 1. Click and highlight the "admin" account in the account list and click
- 2. Its information should be displayed

3. Enter a new password in the "Password" field and enter it again in "Confirm Password"

# **Group Privilege**

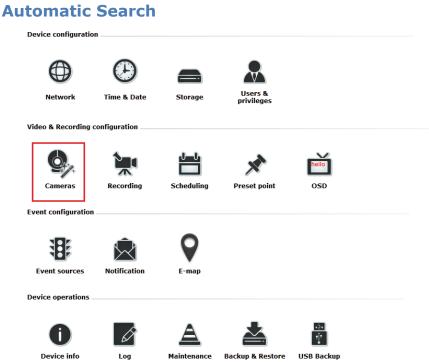
Group Privilege is where you can create multiple customized access policies for situations if you need the recorder to be accessed by users other than the administrator. There are 7 pre-defined user groups for privilege configurations. You can do so by creating a group, and then remove access privileges for certain configuration pages or cameras. Users that are created and assigned to this group will have limited access instead of full administration rights.

The recorder comes with seven built-in groups and five built-in privilege profiles, except the "admin" and the "guest" accounts; the other five groups are fully customizable or you can simply assign a group with one of the default privilege profiles. You can, however, assign more than one users to the "admin" account if you wish to do so. The guest account comes with a "view-only" privilege in the "Live View" page, and users in this group do not have the power to make any changes in the "Live View" page.

To change a group configuration, after clicking "Add" to add new user account, press "Edit" to change Group privileges. User account list

			Add Remove
Username		Group	Language
admin		admin	English
<u>Group privileges</u>		Edit	
Group name:	admin		
✓ Live videos	/	Advance	
✓ Allow use of PTZ	/	Advance	
Playback videos	/	Advance	
System settings	/	Advance	

You can change the group name and privilege.



# Camera

Auto searc	ch Add manua	ally		
Channel	Channel name	Camera's IP address	Live stream	Record stream
1	SNC-CH240	<u>192.168.101.10</u>	H264, 1920x1080	H264, 1920x1080

In "Settings" >> "Cameras", click the "Auto search" button to perform the camera search.

After that, the search should begin and its status should be displayed:

	Camera settings	
	<b></b>	
Settings > Cam	mera settings	

Channellist	* Double-click on one from	n the list to continue.			
Camera info	Search again				
Video settings	Brand	Model	IP address	HTTP port	Installed
Record settings	SONY	SNC-VB630	192.168.101.81	80	

Found cameras should be listed and simply select a camera from the list

			Camera settings
Channel:	1	-	
Name:	SNC-CH240		
IP address:	192.168.101.10	Q Q≣	
Port:	80		
Username:	admin		
Password:	•••••		
			Channel 1 - Preview

Its corresponding information should be displayed in the "Camera Information" section. Enter its username and password and press "Next" to detect this camera.

Settings > Cam	era settings		
Channel list			
Camera info			
Video settings	Video port:	554	
Record settings	Format:	H264	-
	Resolution:	1920x1080	-
	Frame rate:	60	•
	Bitrate mode:	CBR	-
	Bitrate:	3 Mbps	-

If connection establishes successfully, camera's detailed information should be polled and displayed as below.

Adjust its video format, frame rate, resolution or bitrate...etc if you wish.

You can enable "Configure with advance mode" to set up multi-stream if it is supported on this camera.

You will start to set up 1<sup>st</sup> video stream, then 2<sup>nd</sup> stream, and so on.

Some cameras are capable of four streaming profiles, in which different video codecs are used for different purposes.

Settings > Camera	settings
Channel list	
Camera info	
Video settings	
Record settings	Port setting
	Video port: 554
	Stream Profile Settings
	Stream1
	Format: 🔻
Settings > Camera	settings
Channel list	
Camera info	
Video settings	
Record settings	Port setting
	_
	Video port: 554
	Stream Profile Settings
	Stream1
	Format: 💌
	MJPEG H264
	H264

After  $1^{st}$  video stream has been set up, then you can set up the  $2^{nd}$  video stream.

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Settings > Camera settings

Channel list						
Camera info						
Video settings						
Record settings	Port setting					
	-					
	Video poi	rt: 554				
	Stream Profile Sett	tings				
	Stre	eam1		Stream		
	Format:	H264	-	Format:		•
	Resolution:	1280x720	-			
	Frame rate:	20	-			
	Bitrate Mode:		-			
	Bitrate:	2 Mbps	-			
	Stream Function So Live view	ettings w: Stream 1		•		
	Recordin	ng: Stream 2		-		
Settings > Camera	settings					
Channel list						
Camera info						
Video settings						
Record settings	Port setting					
		oort: 554				
	Stream Profile Se	ettings				
		tream1			eam2	
		: H264	-	Format:		-
		: 1280x720	-	Resolution:		-
	Frame rate		-	Frame rate:		-
	Bitrate Mode		-	Bitrate Mode:		-
	Bitrate	: 2 Mbps	-	Bitrate:	2 Mbps	-

Then click "Apply" to finish adding the camera.

Settings > Camera	settings					
Channel list						
Camera info						
Video settings						
Record settings	Port setting					
	Video po	ort: 554				
	Stream Profile Set	tings				
	Str	eam1	St	ream2		
	Format:	H264	· Format:	H264	•	
	Resolution:	1280x720	Resolution:	640x480	-	
	Frame rate:	30	Frame rate:	30	-	Configuration updated successfully
	Bitrate Mode:	CBR	Bitrate Mode:	CBR	-	
	Bitrate:	2 Mbps	· Bitrate:	2 Mbps	-	ок

You will be able to use different video format for continuous recording if it's a multi-stream capable camera.

Stream Function Sett	ings	
Live view:	Stream 1	-
Recording:	Stream 2	-

If "Enable dynamic streaming live view" is enabled, the NVR will select best suitable resolution according to screen layout dynamically. Live stream profile will be taken over by this setting.

🗶 Enable dynamic streaming live view

The "Dynamic streaming" status will be on if "Enable dynamic streaming live view" is enabled.

Settings > Camera	a settings					
Channel list	(Auto accord)	And an annually				
Camera info	Auto search	Add manually				
Video settings	Channel	Channel name	Camera's IP address	Live stream	Record stream	Dynamic streaming
Record settings						
	1	SNC-VB630	192.168.101.81	H264, 1280x720	H264, 640x480	ON

# Add a camera manually

			Camera settings	
Auto search	Add manually			
Channel	Channel name   Camera's IP ad	dress   Live str	ream Record stream	
			Camera settings	
Channel: Name:	1  ▼ CAM-001			
IP address:		Q Q≣		
Port:				
Username: Password:				
L			Channel 1 - Preview	I

Simply follow the instruction described above but click "Add manually" function, enter the camera's IP address and credential in the "Camera Information" manually.



Double-	click on one from	the list to continue.		
Search	again			
Brand	Model	IP address	Port	Installed
SONY	SNC-CH240	192.168.101.10	80	*

\*If cameras are marked with "\*" in the search result, it means those cameras are already configured and connected to the NVR.

# Recording

The "recording" gives users the overall control of how and when a recording is performed and the quality of different types of recordings performed on each channels. It can help the recorder to operate with sufficient system resource by performing recording only when it's necessary with adjustable recording frame rate.

<u>General</u>						
🗵 Enable HDI	D recycle (When ena	bled, it automaticall	y starts when re	emaining HDD s	pace reaches 20	GB. Oldest data is recycled 32GB at a time.)
🔲 Always kee	ep the previous	days of record	led video			
Channel speci	fic					
	Continuous	Schedule	Event *	Manual **	Audio	
CH 1	✓ I Only ▼	I Only 🔻	Full 🔻	Full 🔻		
*Event recordin						

\*Event recording is always on

\*\*Manual recording is turned on/off in live view

You can define the following in "General Settings":

- Enable cycle recording or not
- Recording frame rate
- Define to always keep a number of days of previously recorded data
- Enable/disable different recording types on different cameras
- Enable/disable audio recording

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Always keep the previous days of recorded video

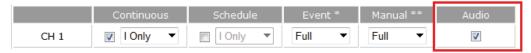
Users can also set to keep a previous number of days of recording data by enabling the option below. This is quite often used in application such as banking which certain countries requires to always keeping a minimum previous number of days of recording data.

	Continuous	Schedule	Event *	Manual **	Audio		
CH 1	☑ I Only ▼	I Only 🔻	Full 🔻	Full 🔻			

Recording frame rate allows you to set different frame rate for different types of recording instead of recording at one frame rate only. Use the drop-down menu and select one of the pre-defined frame rates for a particular recording type

There are two types of fps settings here, one is the fps that NVR sets back to the camera, and this is the fps NVR will be receiving from the camera. The other is recording fps, which will be limited by the live fps. (ex. if the live fps is set to 10, choosing "Full" in the recording fps meaning it will only record at 10fps maximum.

For MPEG/H.264, only i frame or full (i+p frame) can be selected for recording fps.



You also can disable audio recording (record video only) of particular channels.

# Scheduling

#### Schedule Recording Settings

Channel: Select a channel... -Schedule Table Sunday Monday Tuesday Wednesday Thursday Friday Saturday Clear Quick Configuration Davs: Sun Mon Tues Wed Thur Fri Sat All Duration: All day Add O ▼: 00 ▼: 00 ▼
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 End time: 00 🔻 : 00 🔻 -Copy Schedule To Channel: Select a channel.

You can define the time range of the schedule recording for all channels in this page.

Channel: Select a channel... -

Use the "Channel" drop-down menu and select a camera first.

	0	1	2		3	4	ı	5		6	7	8	9		10		11	1	12	1	3	1	4	1	5	16	17	18	1	9	2	0	2	1	2	2	2
Sunday	T		Ŵ	Π	Ī	Π	Π	T		Ň	Î	Ĩ	Ť	Π	Ĩ		Ĩ	Π	Ī	T	Ĭ	Ń	İ	Î	Ī	Î	ñ	Ĩ	T	Ť	T	Ī	T	Î	Ĩ	Ī	Ĩ
Monday			Ш				П	Π	Π		П	Π					Π	П	Π				П	Π	Π	Π	Π	Π	Π	Π	Π	Π		Π		П	
Tuesday			Ш					Π	Π		П	Π					Π	П	Π				П	Π	Π	Π	Π	Π	Π	Π	Π	Π		Π		Π	
Wednesday			Ш					Π	Π		П	Π					Π	П	Π				П	П	Π	Π	Π	Π	Π	Π	Π	Π				Π	
Thursday						П	Π	Π	Π	П	Π	Π		П	Π	Π	Π	П	Π				Π	Π	Π		Π	Π	Π		П	П				Π	
Friday						П	П	Π	Π	П	Π	Π		Π	Π	Ī	Π	П	Π				П	Π	Π			Π			П	П				Π	
Saturday			Ш			П	П	Π	Π	П	П	Π			Π	Π	П	П	Π				П	Π	Π	Π		Π			П	П			П	Π	

You can use the schedule table to set the time range. Click the cell boxes then move horizontally lets you set what hours to perform recording during a day. Click and move vertically lets you set what days to perform recording at a specific time. \* Each cell box represents 15 minutes of time. Click one or more boxes to omit consecutive recording.

Quick Configuration	
Days:	
Sun Mon Tues Wed Thur Fri Sat All	
Duration:	
🔿 All day	
O ▼: 00 ▼: 00 ▼: 00 ▼     End time: 00 ▼: 00 ▼	Add

You can also use the "Quick Configuration" to define recording time range instead of clicking cell boxes one by one on the timetable. Simply check what days you would like to perform recording and specify the recording duration by either choosing "All Day" or enter a start and end time for specific recording duration.

Copy Schedule To Channel:	Select a channel	-

Select the "Copy Schedule to Channel:" option if you would like to set the same recording schedule to another camera.

# **Preset Point Setting**

### **PTZ Preset Settings**

The recorder supports PTZ cameras and can set multiple preset points or retrieve and manage preset points that are set in the camera. This is helpful if you need to monitor multiple spots in one area from a particular camera. Channel: Select a channel... -

	Preset
	Sy
Focus: Near Far Auto	
* Click on the video to pan and tilt, use the scroll button for zoom control	
Add	

Preset points list	
Sync from camera	Edit

To set up PTZ preset points:

1. Select a camera from the "Channel" drop-down menu

2. Use the PTZ control provided in the configuration page to set the preset point

3. Press "Add" to add preset point

Press "Edit" to enter edit mode to change preset point names or delete preset points

The function of "Sync from camera" is to retrieve preset points from camera

You can choose to make this preset point a "Home" point among all other preset points, as well as making the camera to move to this particular point when an event is triggered.

\* "Move Here when Event Trigger": In order for this function to work properly, please also complete configuration in "Event Configuration" >> "Event Trigger"

### **PTZ Preset Sequence**

Channel: Select a channel... -

```
Preset points
Sequence points and orders

Preview of the selected preset points

→

★

←

★ ↓
Evelotion:

20s

Preview of the selected preset points
```

Once you have multiple preset points defined for a camera, it is convenient for monitoring to set up the sequencing viewing among those preset point and let the recorder automatically switch between them for you.

To configure preset sequence for a camera,

1. Select a channel from the "Channel" drop-down menu. The available preset points should be listed in "Camera Presets" section.

2. Pick the ones you like for sequence viewing and press the "->" button to move them to the "Preset Sequence" section, then

3. Use the up and down buttons to adjust their sequencing positions.

4. Finally, select a dwell time from the drop-down menu and click "Apply" to save the configuration

# **OSD Settings**

<u>Select a chanr</u>	<u>iel</u>		<u>Preview</u>
Channel: Se	elect a chan	nel 🔻	
Display	OSD		
Display option	<u>5</u>		
Display	time		
Display	FPS		
Display	channel n	umber	
Display	customize	d text:	
Display positio	<u>on</u>		Preview * Click to see a preview of your OSD settings
۲	0	۲	
	Video		
0	0	0	

The OSD (On Screen Display) allows users to add informational text message and embed it onto the video. By default, this function is turned off. To add texts to one or more videos:

### Select a channel



Display OSD

Select a camera you would like to add text to and choose "Display OSD"

#### **Display options**

Choose one or more display options if you would also like the recorder to automatically embed the system time or the frame rate for you. Or simply choose to display a custom message of your own.

#### **Display position**

۲	0	0
	Video	

Next, define where the text will be displayed by either entering an X/Y value based on percentage or use the system pre-defined position from the drop-down menu.

#### **Preview**



Preview \* Click to see a preview of your OSD settings

Click on the "Preview" button to see the preview of your setting and click "Apply" to save the configuration.

# **Event sources**

The "Event sources" section allows users to define conditions that constitute an event, its corresponding trigger action and when it will be triggered. Such setting can reduce the management overhead and notify the administrator only when it's necessary.

### **Event sources**

#### Device events

- Disk fail
   When HDD is recycling because of disk full

   When device starts up
   When device configuration changed
- 🕱 When channel configuration changed 🔹 When camera co
- X When camera connection status changed
- When remaining HDD space is lower than GB (\*minimum 2GB when HDD recycle is disabled)
   When the remaining space of event log file falls below 20% When event log file is recycling

#### Camera events

Reminder:

\*Please make sure you have properly enabled and configured motion detection in the camera's web configuration UI before enabling motion detection in the device. The device only supports single region detection, and only the first region will be used even if you set multiple motion detection regions in the camera.

\*Enable event log function to start event actions and keep event log file. If it is unchecked, the NVR only starts event recording when event is triggered.

		From camera		From CMS software	Enable event log	
	Camera's digital inputs		Motion detection			
	Digital input Port condition		Motion detection			
CH 1	Disable	Disable -			×	

Advance

The 1<sup>st</sup> step is to define the condition to trigger event, we can finish up the event triggers by setting:

- •Which channels will have event trigger function enabled
- •What is considered to be an event

Device events	
Disk fail	When HDD is recycling because of disk full
🕱 When device starts up	🕱 When device configuration changed
🕱 When channel configuration changed	🕱 When camera connection status changed
When remaining HDD space is lower than	GB (*minimum 2GB when HDD recycle is disabled)
When the remaining space of event log file falls b	elow 20% 🗌 When event log file is recycling

Define which system events should trigger the recorder to send out notifications.

		From camera		From CMS software	Enable event log
	Camera's digital inputs		Motion detection		
	Digital input Port condition		Motori detection		
CH 1	Disable 👻	Disable 👻			×

Use the checkbox to enable event trigger on the desired channels.

\*Once motion detection is enabled in this page, please configure the motion area and enable motion detection in the corresponding channels (cameras) from camera's own web UI. The NVR only detects the first motion area set in the camera. The NVR recognizes the first motion area by its ID number set in the camera.

\* Enabling the "From CMS software" option allows the NVR to receive events from the CMS software and start recording; events such as the intelligent video detection in the CMS.

You can setup the recorder to receive triggers from a particular camera's digital input.

1. For cameras that come with physical digital input ports, their ports will be listed in the far left drop-down menu.

2. Pick the desired channel, and then select the camera's input port from the drop-down menu.

3. Select the trigger condition from the "Port condition" drop-down menu.

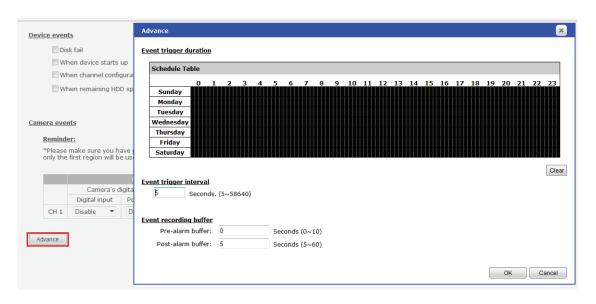
\*The recorder only acts as a medium for pairing up input/output ports between cameras and the recorder.

\*Only connected cameras will be displayed in the list.

\*Some cameras only allow one trigger source be configured at a time, e.g.:

*if the camera has the motion detection function turned on, its digital input will be disabled and vice versa. Under such circumstance, if you set to use camera's digital input port as the event trigger source, you will not be able to select motion detection as the trigger source for this camera* 

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Click "Advance" button to set up event schedule.

The "recording buffer" allows user to define "pre-alarm" and "postalarm" time for event recordings. The "pre-alarm" time sets the NVR to record in advance when an event is triggered. The "post-alarm" time sets the NVR to continue recording for a period of time after an event trigger is finished.

# **Notifications**

Event servers are to be used with event trigger actions. In case of unusual motion detected by the camera or a disk failure, the recorder can send notification with the acceptable format (image/txt) to a destined event server according to the configuration.

E-Mail notification

Primary SMTP server	:	
Network address:		(* Enter domain name or IP address)
Port:	25	]
Authentication:		
Username:		]
Password:		]
Add backup SMTP server	:	
Send mail setting	I	
Sender's name:		]
Send from:		]
Send to:		(* Use "," to separate e-mails)
		( Use , to separate e-mails)

- 1. Enter the hostname or the IP address of the SMTP server
- 2. Enter the port of the SMTP server
- 3. Specify the sender's name in the "Sender's name" field
- 4. Enter the sender's e-mail address

5. Check "Enable Authentication" and enter the username and password of the SMTP server if it requires authentication6. Click "Apply" to save the configuration

- The NVR supports SMTP servers that use base64 or MD5 authentication methods.
- 3rd party free E-mail services such as Gmail (openssl) is supported.

FTP notification

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Server settings:		FTP server list:
Server name:		Add Remove
Network address:		Server name
	(* Enter domain name or IP address)	*Click on one to edit its settings
Port:	21	
Allow and	onymous login:	
Username:		
Password:		
🗌 Use pa	ssive mode:	
Test connection:	Test	
<u>Upload settings:</u>		

Upload path:

To add an FTP server,

1. Start by giving a name to the server that you are adding to the recorder

- 2. Enter the hostname or the IP address of the FTP server
- 3. Enter the communication port of the FTP server (usually port 21)
- 4. Enter the username and password of the FTP server if it's required
- 5. Check "Use Passive Mode" if it's required or leaves it unchecked to

use active mode

6. Click "Test" to verify if all information is entered correctly and the connection to the FTP server can be established successfully

7. Click "Add" for the settings to take effect

# **Event actions**

Warning sound

- E-mail pre-defined text file
- Upload pre-defined text file to FTP servers
- E-mail video snapshot
- Upload video snapshot to FTP servers

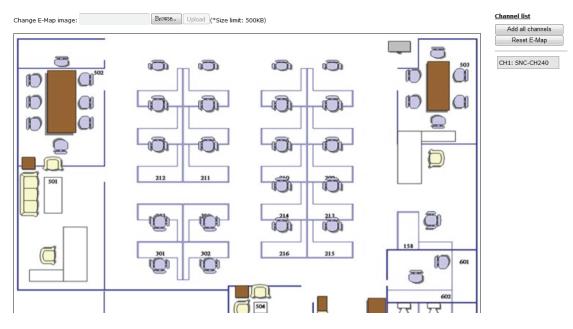
E-mail or upload 1 ▼ frames per event

Define how the notifications will be sent and where they will be sent.

• Event trigger may not work for cameras that are placed outside of your local network or on the Internet until the "UPnP Port Forwarding" is enabled in both the NVR and the router.

# E-Map

# Local E-Map Setting

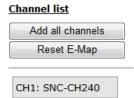


E-Map monitor is a function that alerts users whenever there is an event triggered (e.g. motion detected) from a camera with a geographical perspective. With this function, users can quickly identify which camera has detected an unusual event and where this event is happening. This function works by incorporating the event detection function as well as the recording function, which, as a result, helps users take all the necessary actions when an unusual event occurs.

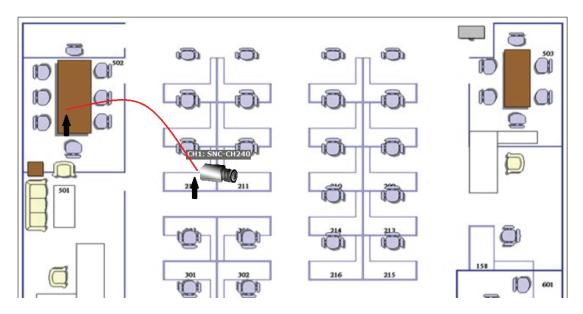
Change E-Map image:

Browse... Upload (\*Size limit: 500KB)

To replace the map, click "Browse" button to locate the new map image file from the local PC and then click "Upload". \* Only JPG, PNG, and GIF file formats are supported with file size under 500KB.

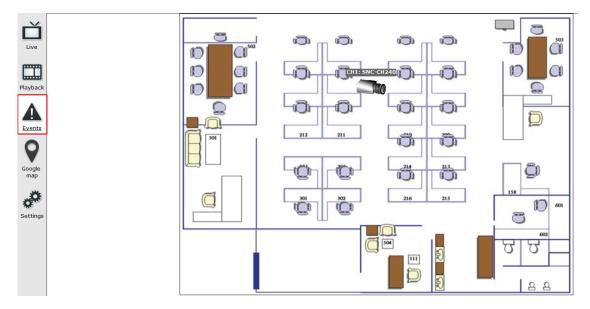


Add all channels: display all camera icons on E-map Reset E-Map: remove all camera icons on E-map Click CH ID to display camera icon of this camera on E-map



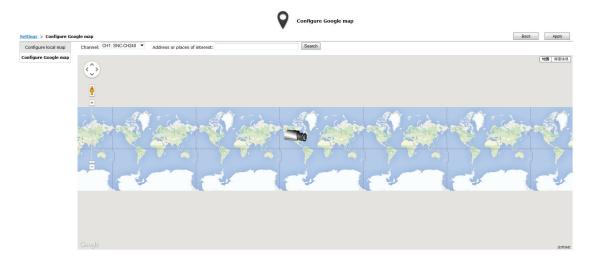
Then click and drag the camera icon to move the camera to define its location.

Access the E-Map by enabling "Event view".





# **Google Map Setting**



The Google Map monitor is a similar function to the aforementioned E-Map monitor. It is useful if you are managing multiple cameras from different locations.



To configure locations of each camera, first determine the location you'd like to place the camera to on the map. You can do so by:

- 1. Zoom in to a smaller area by using the zoom control bar on the map
- 2. Zoom in to a smaller area by using the mouse scroll button

Address or places of interest: Search

You can also go to a specific place on the map by entering its address or the name of the place in the "Address or places of interest" field

Once the location has been determined, click and drag the camera icon to move it to the desired location

\* The Google Map Monitor requires active Internet connection and can not be used in conjunction with the regular E-Map monitor function.

# **Device Info**

#### General information

Device name:	
Model name:	NVR16
Firmware version:	v1.5.0.70990
Device up since:	2014/06/03 09:05:56

#### Network information

Connection type: Auto mode: ON Static IP Device IP: 192.168.101.50 HTTP port: 80 Streaming port: 9877 MAC address: 00:22:4E:E1:00:CA DHCP server: ON UPnP port forwarding: OFF

Device info gives users a glance of the overall system status

and allows users to perform maintenance tasks such as upgrading firm- ware, restore/backup device settings or reboot device ....etc.

NVR Setup • System Configuration	General Information
<ul> <li>Channel Configuration</li> <li>Event Configuration</li> <li>Recording Configuration</li> <li>System Options         <u>Device Information</u> System Logs     </li> </ul>	Device Name: Model Name: SVR-632 Firmware Version: 1.0.0.39090 Device Time: July 18, 2011 17:51:10 Network Information
Maintenance Disk Status USB Backup	Network Type: DHCP Device IP: 192.168.102.48 HTTP Port: 80 Streaming Port: 9877 MAC Address: 00:19:0f:07:39:5a UPnP Port Forwarding: Disabled

The "Device Information" provides the general information of the device such as firmware version and system time. It also provides information of the current network settings and status.

# Log

Clear log

Export log

ID	Time	Туре	Sub-type	CH	AP	IP	User
1	2014/06/03 15:51:58	User	User login		Web Event Receiver	192.168.101.60	admin
2	2014/06/03 15:51:56	User	User logout		Web Event Receiver	192.168.101.60	admin
3	2014/06/03 15:50:08	User	User login		Web Event Receiver	192.168.101.60	admin
4	2014/06/03 15:50:07	User	User logout		Web Event Receiver	192.168.101.60	admin
5	2014/06/03 15:45:02	User	User login		Web Event Receiver	192.168.101.60	admin
6	2014/06/03 15:45:00	User	User logout		Web Event Receiver	192.168.101.60	admin
7	2014/06/03 15:22:33	User	User login		Web Event Receiver	192.168.101.60	admin
8	2014/06/03 15:22:31	User	User logout		Web Event Receiver	192.168.101.60	admin
9	2014/06/03 15:21:20	User	User login		Web Event Receiver	192.168.101.60	admin
10	2014/06/03 15:21:18	User	User logout		Web Event Receiver	192.168.101.60	admin
11	2014/06/03 15:21:16	User	User login		Web Event Receiver	192.168.101.60	admin
12	2014/06/03 15:21:13	User	User login		Web	192.168.101.60	admin
13	2014/06/03 15:03:21	User	User logout		Web Event Receiver	192.168.101.60	admin
14	2014/06/03 13:57:30	User	User login		Web Event Receiver	192.168.101.60	admin
15	2014/06/03 13:57:28	User	User logout		Web Event Receiver	192.168.101.60	admin
16	2014/06/03 13:57:16	User	User login		Web Event Receiver	192.168.101.60	admin
17	2014/06/03 13:57:13	User	User login		Web	192.168.101.60	admin
18	2014/06/03 10:17:25	User	User logout		Web Event Receiver	192.168.101.60	admin
19	2014/06/03 10:12:08	User	User login		Web Event Receiver	192.168.101.60	admin
20	2014/06/03 10:12:06	User	User logout		Web Event Receiver	192.168.101.60	admin
21	2014/06/03 10:03:19	User	User login		Web Event Receiver	192.168.101.60	admin
22	2014/06/03 10:03:17	User	User logout		Web Event Receiver	192.168.101.60	admin
23	2014/06/03 10:03:08	User	User login		Web Event Receiver	192.168.101.60	admin
24	2014/06/03 10:03:06	User	User logout		Web Event Receiver	192.168.101.60	admin
25	2014/06/03 10:02:58	User	User login		Web Event Receiver	192.168.101.60	admin
26	2014/06/03 10:02:56	User	User logout		Web Event Receiver	192.168.101.60	admin
27	2014/06/03 09:50:30	User	User login		Web Event Receiver	192.168.101.60	admin
28	2014/06/03 09:50:29	User	User logout		Web Event Receiver	192.168.101.60	admin
29	2014/06/03 09:38:33	User	User login		Web Event Receiver	192.168.101.60	admin
30	2014/06/03 09:38:31	User	User logout		Web Event Receiver	192.168.101.60	admin

"Log" keeps a record of what's been happening to the device and provides basic information for troubleshooting.

# Maintenance

Upgrade firmware	
Locate firmware: 選擇檔案 未選擇任何檔案	Upgrade Current version: v1.0.1.79272
Restart device	
Restart	
Restart camera.	
Select a channel   Restart	
Reset to factory default.	
Reset to default	
Change logo	
Locate logo image: 選擇檔案 未選擇任何檔案	Change (*Max. 20KB)

"Maintenance" provides functions for users to:

- Perform Firmware Upgrade(Only on Web UI)
- Restart the NVR when necessary
- Restart cameras directly from the NVR
- Reset the NVR's settings to their factory default values
- Change logo of NVR

• Enable auto reboot: NVR will reboot automatically when system is abnormal.

### **Firmware Upgrade**

The firmware can be upgraded through web UI. Before upgrading firmware, please backup configuration in advance.

\*\* the firmware file comes with a ".bin" file extension.

	Choose File to Upload		-		×
	<li>&lt; ↓ ● 電腦 ●</li>	本機磁碟 (C:) ▶ Gordon ▶ tmp ▶		▼ 4 / <i>搜尋 tmp</i>	٩
Maintenance	組合管理 ▼ 新増資料				. 0
Upgrade firmware	- ● ■片	名稱	修改日期	頬型	大小 ^
Locate firmware: Browse Upgrade	🜏 家用群组	🛃 id1	2014/3/12 下午 0 2014/3/12 下午 0		7,566 K 7,566 K
Restart device	- 電腦	ID2 IMG_13012014_144432	2014/1/13 下午 0	PNG 影像	14 K
Restart	▲ 本機磁碟 (C:) → 抽取式磁碟 (D:)	VS Central Basic_v2.0.2.70401	2014/3/14 下午 1 2014/5/7 上午 10	WinRAR 壓縮檔	1,047 K 14,522 K
Restart camera_	⊲≫ Hitachi (F:) 🎎 DVD RW 磁碟機	MIPS LOGO		Microsoft Word 9	26 K 163 K ≡
Select a channel		A NoBrand_SVR-816_1.5.0.70990	類型: VLC media file (.bir		19,332 K 384 K
Reset to factory default	📜 My Web Sites on	Norder2	大小: 18.8 MB 修改日期: 2014/5/21 下午	F 07:31	335 K 160 K
Reset to default	🍓 網路 👻	Uutlook	2013/12/6 下午 0	壓縮的 (zipped)	91 K 👻
Change logo	檔案	能名稱(N): NoBrand_SVR-816_1.5.0.70990	- Al	ll Files (*.*)	•
Locate logo image: Browse Change				開啟舊檣(O)	取満

Click "Browse...", A new dialog should display and let you choose the location of the firmware file.

<u>Upgrade firmware</u>			_
Locate firmware:	C:\Gordon\tmp\NoBrand_{ Browse	Upgrade	Current version: v1.5.0.70990

When done, click "Upgrade".

Follow the on screen instruction and wait for the process to finish (After upgrade, the system will reboot automatically, it's part of the process)

# **Backup & Restore**

Backup configuration Backup		
Restore configuration		
Locate configuration file:	Browse	Restore

It is a function that allows users to backup the NVR's settings to a local hard drive.

Users also can restore the NVR's settings from a previously saved configuration file

	🥝 另存新檔			×
		Gordon 🕨	▾ ɬ• 搜尋 Gordon	P
Backup & Restore	組合管理 ▼ 新増資料夾			• 0
Backup & Kestore Backup configuration. Backup	- <u>③</u> 文件	名稱 Meeting minute SBIR L tmp	修改日期 2014/2/13 下午 12: 2013/9/10 上午 10: 2014/6/3 下午 04:16	檔案資料夾
Restore configuration. Locate configuration file: Restore Restore	<ul> <li>● 素用群組</li> <li>■ 電腦</li> <li>● 指取式磁環(C:)</li> <li>● 指取式磁環(D:)</li> <li>● Hitachi (C)</li> <li>● Mitachi (C)</li> <li>■ DVD RV 磁磁機 (b) 20121021_1C</li> </ul>			
	<ul> <li>本場張葉(0:)</li> <li>種業名稱(N): backup</li> <li>存標構型(7): SSB 檔案</li> <li>● 隱微資料夾</li> </ul>	< [III	存櫃(S)	• • 取消

On Web UI, he configuration can be backed up to or restore from a local computer.

Click "Backup" to store configuration file in local computer.

On local UI, the configuration can be backed up to or restore from a USB disk. It is required to plug in a USB disk formatted in FAT32 prior to using the backup and restore functions.

Once it's detected, click "Backup" to store configuration file in USB disk.



USB bac	ckup				
USB HDD:	USB2, 926MB available	-	* Please format the HDD to	o FAT32 on a Windows PC	before using it for backup
Export As:	Media database	-			
Channel:	SNC-CH240 Channel 5 Channel 9 Channel 13		Channel 2 Channel 6 Channel 10 Channel 14	Channel 3 Channel 7 Channel 11 Channel 15	<ul> <li>Channel 4</li> <li>Channel 8</li> <li>Channel 12</li> <li>Channel 16</li> </ul>
Start time:	2014/06/03	16	50:02		
End time:	2014/06/03	16	50:02		
Backup					

It's a function that allows users to backup the recording data in its database file format as well as in AVI to the externally connected USB hard disk.

USB	HD	D:

USB2, 926MB available 🔹

The USB hard disk(s) will be listed in the drop-down menu displaying the remaining disk space. Make your selection from the drop-down menu if you have more than one disks connected to the NVR.

	SNC-CH240	Channel 2	Channel 3	Channel 4
Channel:	Channel 5	Channel 6	Channel 7	Channel 8
channel.	Channel 9	Channel 10	Channel 11	Channel 12
	Channel 13	Channel 14	Channel 15	Channel 16

Next, select channels which you would like to backup the recording data from. Maximum 4 channels can be selected at once.

Start time:	2014/06/03	16: 50: 02	
End time:	2014/06/03	16: 50: 02	

Configure the start and end time of the recording data you would like to backup and click the "Backup" button to begin.

# Things to pay attention to the USB Backup function

### Limitation:

• It does not support USB Hub extend the number of HDD connected to the NVR

- Only one backup process can be performed at a time
- Maximum 4 channels can be selected for backup

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- Only FAT32 USB hard disk is supported for backup
- The USB hard disk needs to have more than 100MB remaining space

• If multiple partitions are presented in one disk, only the first partition will be detected and used for backup

### **Process:**

• Progress will be displayed on the UI

• If the backup process gets interrupted, which the process stops at a point of time that is before the "END Time" user defined, such time will be displayed on the UI

• A folder will be automatically created in the USB hard disk with a name format like 0028687831\_20100610151515\_2010060511 0010\_20100606110010 (MAC\_backupbuttonclicktime\_starttime\_endtime)

### Note:

• Please plug in the USB HDD only after the NVR is fully started, or the HDDs will be incorrectly mounted.

• Play the backed up files using the NVR media player.

# **NVR Media Player**

You can use the NVR Media Player to play the exported AVI files or media database file. This can save you the trouble of installing thirdparty media player or codecs when playing the exported AVI videos.

The NVR Media Player will be automatically installed after the CMS software is installed. You can find it in the Windows Start menu.

# Play the backup file with the NVR Media Player

# Play Media database

ſ	1	NVR Media Player	100	
	Оре	en Setting Validate Ak	out	
		AVI File		
		Media Data Base		A e
l		Image File		
		Exit		

The backup files can be played with the NVR media player. To do, open the player and select "Open" >> "Media Database"

Him Playback Setting
MDB PATH Z:\Release\QA - Release\SEEnergy Browse Check
MDB Info
Server
Time Zone
Summer Time
Channel
First data time
Last data time
Start play time 2014/06/04 ÷ 上午 08:35:57 ÷
OK Cancel

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Click "Browse..." to select the file from the USB disk.

Browse for Folder	$\mathbf{X}$
FAT THUMB (E:)	
Consistency     Desktop     Desktop     My Documents	<
My Computer     Josh Star Floppy (A:)     Local Disk (C:)	11
WXPVOL_EN (D:)     FAT THUMB (E:)     DO224EC00379_20100812121019_20100809	
exacq     Product CD     Mware.Workstation.v7.1.261024.Incl.Keym	
Work on '.psf' (V:)     Utility_HD-PXU2 on '.psf' (W:)     Share on '.psf' (X:)	
HD-PUI/2 on '.psf' (Y:)	~
OK Cancel	

A new dialog should be prompted for you to select the file location.

Playback Setting
MDB PATH Z:\Release\QA - Release\SEEnergy Browse Check
MDB Info
Server
Time Zone 🗨
Summer Time
Channel
First data time
Last data time
Start play time 2014/06/04
OK Cancel

When done, click "Check" to validate the file.

MDB PATH	;\00224EC00379	_201008121210	Browse	Check
MDB Info				
Server				
Time Zone	NVR Media Pl	ayer 🚺	3	•
_		Media Database Success!	1	•
First data tim	e 🗌	ОК		
l ast data tim	e			

Once the file has been successfully verified, you should be prompted with the message shown below.

Time Zone		-
	GMT-14	~
	GMT-13	
Channel	GMT-12 Eniwetok, Kwajalein	
Channer	GMT-11 Midway Island, Samoa	
	GMT-10 Hawaii, Aleutian Island	
First data t	GMT-9 Alaska	
	GMT-8 Las Vegas, San Francisco, Vancouver	
	GMT-7 Calgary, Denver, Salt Lake City	

Select the time zone according to your current location.



Finally, click "OK" to begin playing. The player should now play the backed up file.

# Play Media database

Open the player and select "Open" >> "AVI File"

	NVR Media Player	
0	pen Setting Validate Ab	oout
	AVI File	
	Media Data Base	
	Image File	🗈 🔤 🖪 e
	Exit	

■ 開啟	X
搜尋位置(I): 💽 抽取式磁碟 (D:) 🔽 ← 🗈 🖻	*▼
名稱	修改日期 🔺
👢 china	2012/8/24 날
👢 MARKETING	2012/11/5 7
I. WEBSITE	2012/11/5 7
00224EE100CA_20140604081412_20140603190000_2014	2014/6/4 上"
	-
<	
檔案名稱(N): 00224EE100CA_20140604081412_20140603190000	開啟(0)
檔案類型(T): AVI Files (*.avi)	取消

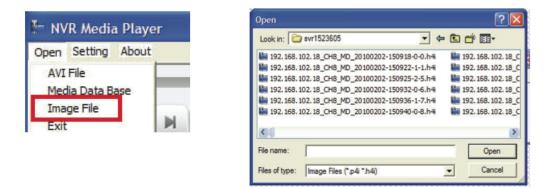
# Select the AVI file



Click "Open" to play file

• •

# **Open Event Snapshot images with NVR Media Player**



The NVR sends snapshots that are taken when an event occurs to a destined FTP server or mail recipient. These types of snapshot images are saved in a proprietary image file format, h4i or p4i, and can only be opened by the NVR media player.

Note: In case of incorrect installation and improper use in a residential area, the interference to radio devices and other electronic devices could be caused.

It is recommended to use the device where applicable with shielded cables (also shielded with networking products of cable Category 5e and higher). The device was tested to comply with the limits for Computer and IT accessories of Class A according to the requirements of EN 55022. Warning: This product complies with the test class A - It may be used in the living area but could cause radio interference; in this case, it may be demanded by the operator to take appropriate corrective action at his/her own expense.

#### Declaration of Conformity:

The device meets the EMC requirements according to EN 55022 class A and EN 55024 for ITE category with external or built-in power supply to meet the requirements of EN 61000-3-2 and EN 61000-3-3 according to the EMC Directive 2004/108/EC. The declaration of Conformity can be requested by post at the following manufacturer address.

www.assmann.com

ASSMANN Electronic GmbH Auf dem Schüffel 3 58513 Lüdenscheid Germany

