



# NVR User Manual

Screen-shots provided in manual are based off having an LCD and mouse connected to the NVR:

- Connect an LCD / TV using a HDMI or VGA cable to the NVR
- Connect a USB mouse to the NVR using one of the USB ports
- If an LCD is not available a Windows laptop can be used for configuration

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## **SAFETY INSTRUCTIONS**

Please carefully read the following safety instructions.

1. Only use the power supply that was supplied with the NVR.
2. Ensure that the NVR is installed in a clean environment and is well ventilated. Blocking the vents on the sides or rear of the NVR will restrict air flow and may cause the device to overheat.
3. Do not remove the NVR upper cover while the NVR is turned on.

Failure to adhere to these safety instructions may cause damage to your NVR. Please contact your reseller for further assistance.

# Chapter 1 Product Overview

## 1.1 IVSEC NVR Specification Comparison

### NR308XB



8  
CHANNELS

10TB  
STORAGE  
POTENTIAL

128  
MBPS

**Specifications**

**Maximum Channels:** 8      **Channel Bandwidth:** 128 Mbps  
**Image Display:** 1/4/6/8/9      **Total Storage Potential (TB):** 10  
**HDD Bays (Size):** Bays x 1, Up to 10TB per HDD  
**Power Over Ethernet Switch Ports:** 8 up to 802.3at(30w)  
**Power Supply:** DC48V/2A  
**Maximum Power Consumption:** 8W (without HDD)  
**Dimensions:** 300 x 227 x 53 mm

**Connections**

1x 3.5" SATA HDD Slot	HDMI and VGA
2x USB 2 Female	Alarm ports: 8 in and 1 out
1x USB 3 Female	1x Audio out
1x Gigabit Ethernet RJ-45 Port	1x Power Jack Input
8 x PoE+ ports	1x On/Off switch

### NR316XB



16  
CHANNELS

20TB  
STORAGE  
POTENTIAL

168  
MBPS

**Specifications**

**Maximum Channels:** 16      **Channel Bandwidth:** 168 Mbps  
**Image Display:** 1/4/6/8/9/10/13/14/16  
**Total Storage Potential (TB):** 20  
**HDD Bays (Size):** Bays x 2, Up to 10TB per HDD  
**Power Over Ethernet Switch Ports:** 16 up to 802.3at(30w)  
**Power Supply:** DC48V/3.750A  
**Maximum Power Consumption:** 10W (Without HDD)  
**Dimensions:** 300 x 302 x 54mm

**Connections**

2x 3.5" SATA HDD Slot	HDMI and VGA
2x USB 2 Female	Alarm ports: 8 in and 1 out
1x USB 3 Female	1x Audio out
1x Gigabit Ethernet RJ-45 Port	1x Power Jack Input
16x PoE+ ports	1x On/Off switch

### NR532XA



32  
CHANNELS

80TB  
STORAGE  
POTENTIAL

320  
MBPS

**Specifications**

**Maximum Channels:** 32      **Channel Bandwidth:** 320 Mbps  
**Image Display:** 1/4/6/8/9/10/13/14/16/17/19/22/25/32/36  
**Total Storage Potential (TB):** 80  
**HDD Bays (Size):** Bays x 8, Up to 10TB per HDD  
**Power Over Ethernet Switch Ports:** 32 up to 802.3at(30w)  
**Power Supply:** Internal  
**Maximum Power Consumption:** 17.5W (without HDD)  
**Dimensions:** 440 x 460 x 89mm

**Connections**

8x 3.5" SATA HDD Slot	Alarm ports: 16 in and 4 out
2x USB 2 Female	1x RS485
1x USB 3 Female	1x Audio In
1x Gigabit Ethernet RJ-45 Port	1x Audio Out
32 x PoE+ ports	2x Power Input
HDMI and VGA	1x On/Off switch
1x e-Sata	

### NR564XA



64  
CHANNELS

80TB  
STORAGE  
POTENTIAL

640  
MBPS

**Specifications**

**Maximum Channels:** 64      **Channel Bandwidth:** 640 Mbps  
**Image Display:** 1/4/6/8/9/10/13/14/16/17/19/22/25/32/36/64  
**Total Storage Potential (TB):** 80 (minimum 2 HDDs)  
**HDD Bays (Size):** Bays x 8, Up to 10TB per HDD  
**Power Over Ethernet Switch Ports:** 32 up to 802.3at(30w)  
**Power Supply:** Internal  
**Maximum Power Consumption:** 17.5W (without HDD)  
**Dimensions:** 440 x 460 x 89mm

**Connections**

8x 3.5" SATA HDD Slot	Alarm ports: 16 in and 4 out
2x USB 2 Female	1x RS485
1x USB 3 Female	1x Audio In
1x Gigabit Ethernet RJ-45 Port	1x Audio Out
32 x PoE+ ports	2x Power Input
HDMI and VGA	1x On/Off switch
1x e-Sata	

## 1.2 IVSEC Dome Camera Specification Comparison

For Camera bracket Accessories please contact your IVSEC Reseller

NC110XB

5  
MEGA  
PIXELS

2.8mm  
LENS

---

**Specifications**

**Megapixels:** 5

**Max Video Resolution:** 2592 x 1944

**Lens:** 2.8 mm (H.FOV: 99°)

**Lens Type:** Fixed

**Maximum Night IR Distance (m):** 30

**Relative Image Clarity:** 3

**Connectors:** RJ-45

**Dimensions:** 100x100 mm

**Maximum Power Consumption:** <7W  
When IR turns on. Typically half that in normal use

**Frame Rate:** 20 (at highest resolution)

**Edge Recording microSD/SDXC Card Slot:** Yes

**Audio Streaming:** Yes (microphone included)

**Event Triggers:** PIR, Motion Detection

NC323XC

8  
MEGA  
PIXELS

3.6mm  
LENS

SONY STARVIS  
SENSOR

---

**Specifications**

**Megapixels:** 8

**Max Video Resolution:** 3840 x 2160

**Lens:** 3.6 mm (H.FOV: 88°)

**Lens Type:** Fixed

**Maximum Night IR Distance (m):** 30

**Relative Image Clarity:** 4.5

**Connectors:** RJ-45

**Dimensions:** 100x100 mm

**Maximum Power Consumption:** <7W  
When IR turns on. Typically half that in normal use

**Frame Rate:** 20 (at highest resolution)

**Edge Recording microSD/SDXC Card Slot:** Yes

**Audio Streaming:** Yes (microphone included)

**Event Triggers:** PIR, IVS such as Perimeter Intrusion Detection, Human and Vehicle Detection, Face Detection, Motion Detection

NC312XB

5  
MEGA  
PIXELS

ZOOM  
LENS

---

**Specifications**

**Megapixels:** 5

**Max Video Resolution:** 2592 x 1944

**Lens:** 2.8-12 mm (H.FOV: 116 to 34°)

**Lens Type:** Motorised Zoom

**Maximum Night IR Distance (m):** 40

**Relative Image Clarity:** 3.5

**Connectors:** RJ-45

**Dimensions:** Ø151 X 113mm

**Maximum Power Consumption:** <7W  
When IR turns on. Typically half that in normal use

**Frame Rate:** 15 (at highest resolution)

**Event Triggers:** Motion Detection

NC512XB

8  
MEGA  
PIXELS

ZOOM  
LENS

SONY  
SENSOR

---

**Specifications**

**Megapixels:** 8

**Max Video Resolution:** 3840 x 2160

**Lens:** 3.3-12 mm (H.FOV: 114 to 36°)

**Lens Type:** Motorised Zoom

**Maximum Night IR Distance (m):** 45

**Relative Image Clarity:** 5

**Connectors:** RJ-45, DC Power Input, Analog Video Output, Audio In, Audio Out, Alarm In and Out, Reset Button

**Dimensions:** Ø151 X 113mm

**Maximum Power Consumption:** <9W  
When IR turns on. Typically half that in normal use

**Frame Rate:** 25 (at highest resolution)

**Edge Recording microSD/SDXC Card Slot:** Yes

**Audio Streaming:** Yes (input connector for external mic)

**Event Triggers:** Line Crossing Detection, Facial Recognition, Motion detection

## 1.3 IVSEC Bullet Camera Specification Comparison

NC305XA

5  
MEGA  
PIXELS

3.6mm  
LENS

**Specifications**

**Megapixels:** 5

**Max Video Resolution:** 2592 x 1944

**Lens:** 2.8 mm (H.FOV: 92°)

**Lens Type:** Fixed

**Maximum Night IR Distance (m):** 20

**Relative Image clarity:** 3

**Connectors:** RJ-45

**Dimensions:** Ø70mm×155mm

**Maximum Power Consumption:** <6W  
When IR turns on. Typically half that in normal use

**Frame Rate:** 15 (at highest resolution)

**Audio Streaming:** Yes (microphone and speaker included)

**Event Triggers:** PIR, Motion Detection

NC317XA

5  
MEGA  
PIXELS

ZOOM  
LENS

**Specifications**

**Megapixels:** 5

**Max Video Resolution:** 2592 x 1944

**Lens:** 2.8-12 mm (H.FOV: 116 to 34°)

**Lens Type:** Motorised Zoom

**Maximum Night IR Distance (m):** 40

**Relative Image clarity:** 3.5

**Connectors:** RJ-45

**Dimensions:** Ø84 X 240mm

**Maximum Power Consumption:** <7W  
When IR turns on. Typically half that in normal use

**Frame Rate:** 15 (at highest resolution)

**Event Triggers:** Motion Detection

NC528XB

5  
MEGA  
PIXELS

ZOOM  
LENS

SONY IMAGE  
SENSOR

**Specifications**

**Megapixels:** 5

**Max Video Resolution:** 2592 x 1944

**Lens:** 5-50 mm (H.FOV: 50.9 to 7.6°)

**Lens Type:** Motorised Zoom

**Maximum Night IR Distance (m):** 80

**Relative Image clarity:** 4

**Connectors:** RJ-45 , DC Power Input, Analog Video Output, Audio In, Audio Out, Alarm In and Out, Reset Button

**Dimensions:** Ø108 X 301mm

**Maximum Power Consumption:** <10W  
When IR turns on. Typically half that in normal use

**Frame Rate:** 20 (at highest resolution)

**Edge Recording microSD/SDXC Card Slot:** Yes

**Audio Streaming:** Yes (input connector for external mic)

**Event Triggers:** IVS such as Perimeter Intrusion Detection, Human and Vehicle Detection, Face Detection, Motion Detection

NC531XA

8  
MEGA  
PIXELS

ZOOM  
LENS

SONY IMAGE  
SENSOR

**Specifications**

**Megapixels:** 8

**Max Video Resolution:** 3840 x 2160

**Lens:** 3.3-12 mm (H.FOV: 114 to 36°)

**Lens Type:** Motorised Zoom

**Maximum Night IR Distance (m):** 45

**Relative Image clarity:** 5

**Connectors:** RJ-45 , DC Power Input, Analog Video Output, Audio In, Audio Out, Alarm In and Out, Reset Button

**Dimensions:** Ø151 X 113mm

**Maximum Power Consumption:** <9W  
When IR turns on. Typically half that in normal use

**Frame Rate:** 25 (at highest resolution)

**Edge Recording microSD/SDXC Card Slot:** Yes

**Audio Streaming:** Yes (input connector for external mic)

**Event Trigger Examples:** Line Crossing Detection, Facial Recognition, Motion detection

## 1.4 IVSEC Fisheye and PTZ Camera Specification Comparison

NC541XA

**9**  
MEGA  
PIXELS

**2mm**  
LENS



SONY IMAGE SENSOR

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**Specifications**

**Megapixels:** 9

**Max Video Resolution:** 3000 x 3000

**Lens:** 2mm (H.FOV 360°)

**Lens Type:** Fixed

**Maximum Night IR Distance (m):** 5

**Relative Image clarity:** 3

**Connectors:** RJ-45 , DC Power Input, Analog Video Output, Audio In, Audio Out, Alarm In and Out, Reset Button

**Dimensions:** Ø120 X 55mm

**Maximum Power Consumption:** <7W  
When IR turns on. Typically half that in normal use

**Frame Rate:** 30 (at highest resolution)

**Audio Streaming:** Yes (microphone and speaker included)

**Event Triggers:** Motion Detection

NC591XA

**2**  
MEGA  
PIXELS

**ZOOM**  
LENS



SONY IMAGE SENSOR

---

**Specifications**

**Megapixels:** 2

**Max Video Resolution:** 1920 x 1080

**Lens:** 4.7mm -104mm (H.FOV: 72 to 3.8°)

**Lens Type:** Motorised Pan, Tilt and Zoom

**Maximum Night IR Distance (m):** 150

**Relative Image clarity:** 4

**Connectors:** RJ-45 , DC Power Input, Analog Video Output, Audio In, Audio Out, Alarm In and Out, Reset Button

**Dimensions:** Ø206 X 351mm

**Maximum Power Consumption:** <25W  
When IR turns on. Typically half that in normal use

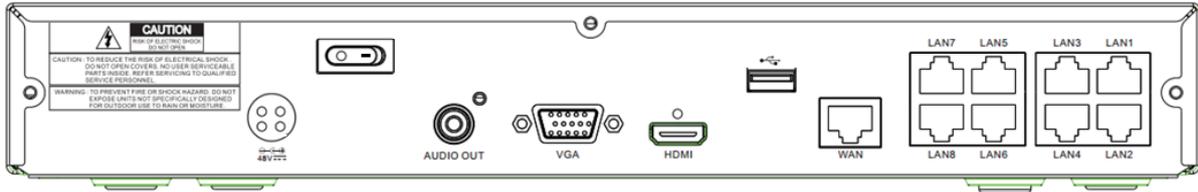
**Frame Rate:** 25 (at highest resolution)

**Audio Streaming:** Yes (input connector for external mic)

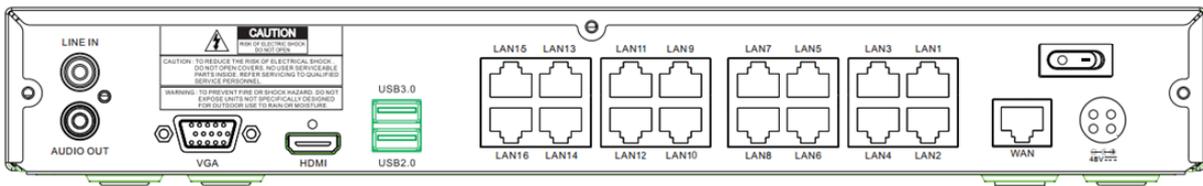
**Event Triggers:** Motion detection, alarm triggers and other

## 1.5 Rear Panels (IVSEC NVR Model Comparison)

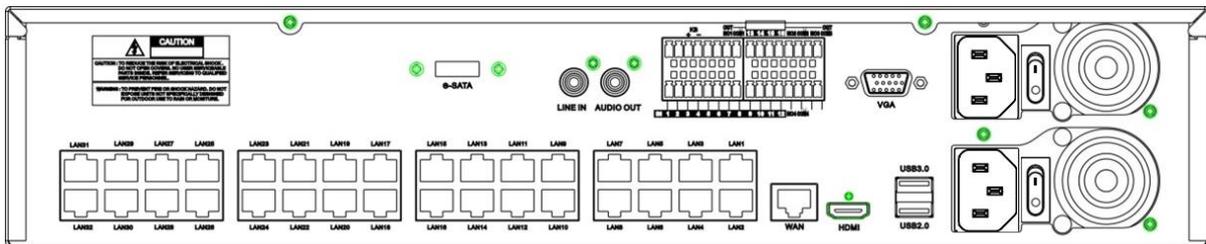
**IVSEC NR308X\*** – 8 Channel NVR with 8 POE+ ports, 1 hard drive bay (Some models may include alarm input / outputs)



**IVSEC NR316X\*** – 16 Channel NVR with 16 POE+ ports, 2 hard drive bays (Some models may include alarm input / outputs)



**IVSEC NR532XA / NR564XA** – 32 /64 Channel NVR with 32 POE+ ports, 8 hard drive bays, Alarm input / outputs



Item	Physical Port	Connection Method
1	Power Switch	Startup and shutdown
2	Power Port	Connect the attached power supply
3	USB Port	Connect USB devices, such as USB mouse and USB stick.
4	Sensor/Alarm	Connect to sensor or alarming device (available on NR532XA only)
5	HDMI Port	HDMI high definition port
6	VGA Port	Connect to VGA monitor, such as PC monitor
7	LINE IN	Intercom voice input
8	AUDIO OUTPUT	Audio signal output, RCA interface
9	WAN Port	Connect to your modem / router
10	LAN Port	Supports Auto POE, ePOE and manual mode
11	E-SATA	Connect to e-SATA HDD for recording & backup (NR532XA only)



# Chapter 2 NVR Installation & Connection

## 2.1 Hard Disk Drive (HDD) Installation

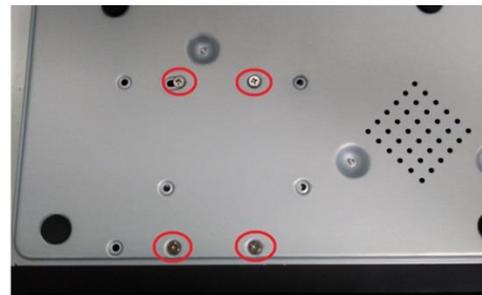
It is recommend that only surveillance grade hard drives are installed into your NVR. Contact your reseller for hard drive size and pre-installation options.

- The NR308X\* supports only one 3.5" SATA HDD's.
- The NR316X\* supports two 3.5" SATA HDD's.
- The NR532X\* and NR564X\* supports up to eight 3.5" SATA HDD's.

**CAUTION:** DO NOT install or remove HDD's while the NVR is turned on. Ensure the power supply is disconnected from the NVR while performing this process.

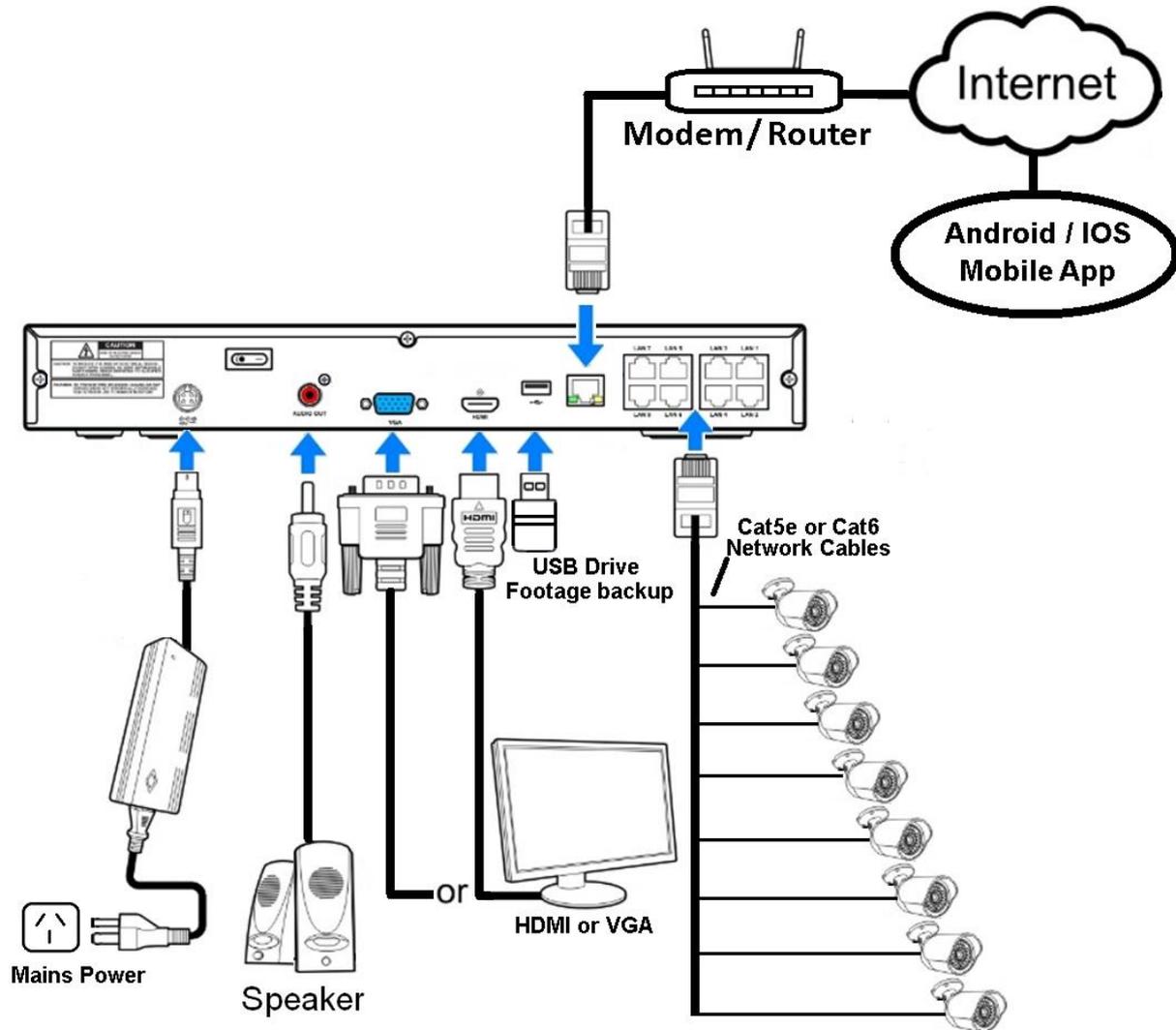
### NR308X\* HDD Installation

- a) Carefully slide the SATA connector (L shaped connectors) of the hard drive onto the SATA slot on the NVR mainboard
- b) While holding onto the hard drive carefully flip the NVR case and secure the hard drive to the NVR with the four (4) screws



**Note:** Different NVR models will vary in hard drive installation procedure

## 2.2 Connection Diagram

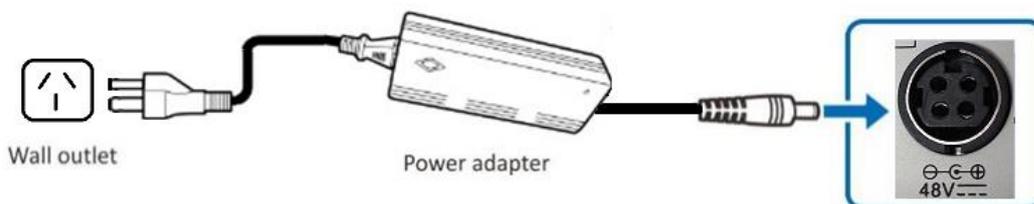


**Note:** The above diagram is for reference only. The location of various connections will be different depending on the NVR you have purchased.

## 2.3 Power Supply

**Caution:** Only use the power adapter that was supplied with the NVR

Connect one end of the power adapter to the power connector on the back of the NVR. Plug the other end of the power adapter into the wall outlet (NR308X\* and NR316X\* scenario shown below).

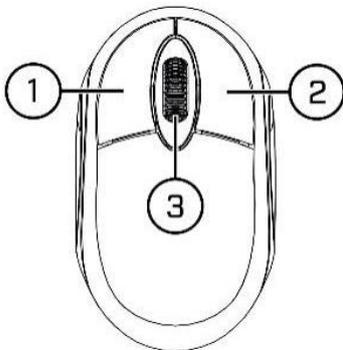


On the rear panel of the NVR set the power switch to the on position



## Chapter 3 NVR Common Operations

### 3.1 Using the Supplied Mouse



#### 1. Left Button:

- Click to select menu options.
- During live viewing in split-screen view, double-click on a channel to view it in full-screen (mainstream). Double-click the channel again to return to split-screen viewing.
- To open the Camera Quick Toolbar single-click on a channel / camera from the Live Viewing screen. A bar of icons will then appear
- Click and hold to drag sliders and scales on menu mode

#### 2. Right Button:

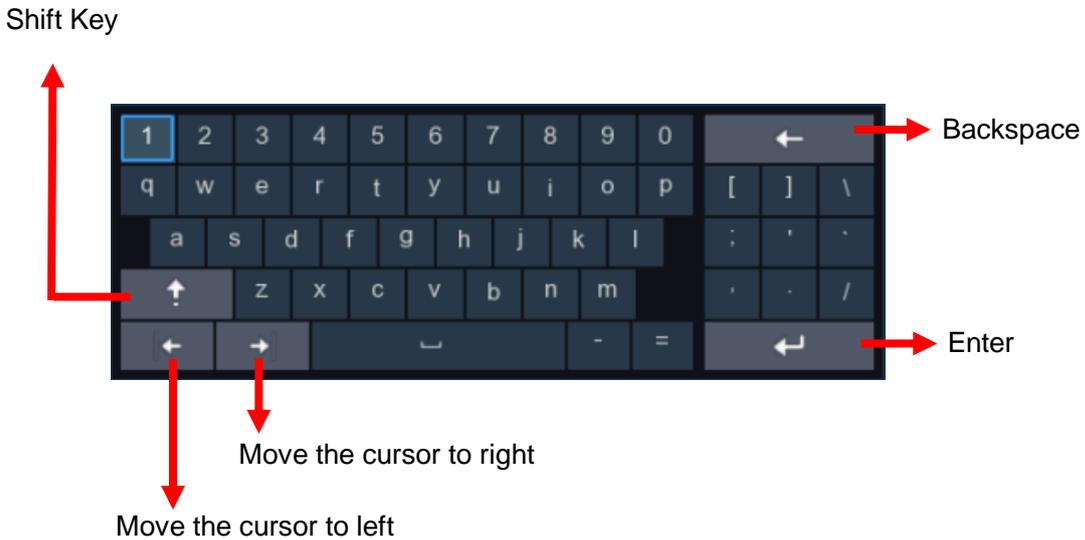
- Click once to open the Taskbar on the Live Viewing screen. View Taskbar on [4.2.2 Taskbar](#)
- Continually clicking on the right mouse button will take you back to the live viewing screen.

#### 3. Scroll Wheel:

- When previewing a camera scroll up / down to digitally zoom in and out.
- In menus, scroll to move up / down through the menu content.
- While hovering over the volume control wheel, scroll to turn system volume up / down.

### 3.2 Using the Virtual Keyboard

The virtual keyboard will appear automatically when you are prompted to enter a password or other details. Use the mouse to control the virtual keyboard



Clicking on the Shift key will allow you to access upper case letters and other special characters

### 3.3 Password

The first time the NVR is powered on you must enter your login password (there is no default password). This password will be used to access the NVR menus as well as for the Android / IOS mobile application.

The screenshot shows a configuration screen with the following fields and options:

- Language: ENGLISH (dropdown menu)
- Device ID: 000000 (text input, with (000000) next to it)
- New Admin Name: admin (text input)
- Password Strength: (three progress bars)
- New Admin Password: (password input, with  Show Password)
- Confirm Password: (password input, with  Show Password)
- Unlock Pattern Enable: Disable (dropdown menu)
- Apply (button)

**Language:** Choose your preferred language. English is set as Default

**Device ID:** It is recommended not to change this setting. Only in the event that you have more than one NVR onsite, it may be useful to give each device a unique ID.

**New Admin name:** The default setting is “admin”. Please do not change this setting

**New Admin Password:** The password must be a minimum of 6 characters.

**Confirm Password:** Re-enter your password to confirm

**Unlock Pattern Enable:** Default setting is “Disabled”. Enabling this setting will allow you to use a pattern to login to the NVR. If you forget your pattern you can still use your password to login.

Click **Apply** to save your settings. Enter your user name & password to **Login** the NVR system.

The screenshot shows a dark-themed login interface with the following elements:

- Language:** A dropdown menu currently set to "ENGLISH".
- Device ID:** A text input field containing "000000" with a "(000000)" label to its right.
- User:** A dropdown menu currently set to "admin".
- Password:** A text input field with six dots representing a masked password. To its right is a checkbox labeled "Show Password" which is currently unchecked.
- Buttons:** Two buttons at the bottom: "Forgot Password" and "Login".

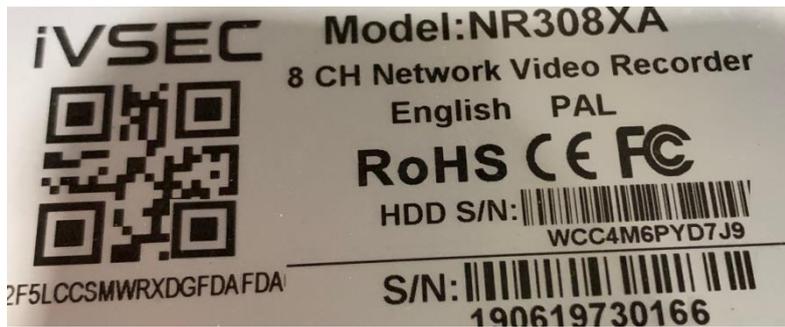
### 3.4 Password Recovery

If you forget your password you can click on the “Forgot Password” option at the login screen. A temporary password will be sent to your email address. Please note that this option will only work if you have previously configured your email address into the NVR. If this is not already configured you will not be able to access the NVR.

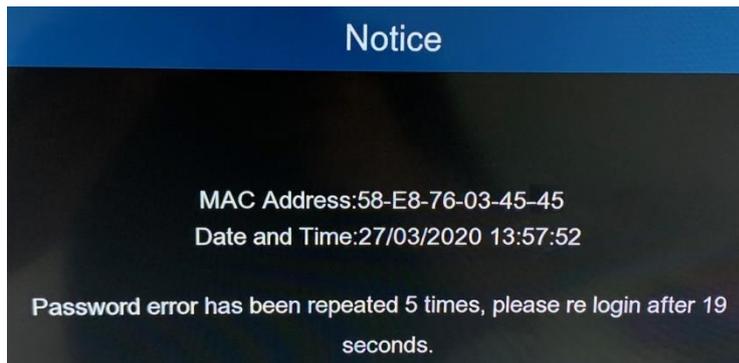
Before contacting IVSEC for assistance you will be required to email the following details to [service@ivsecurity.com.au](mailto:service@ivsecurity.com.au)

- A photo of the NVR serial number sticker.
- A photo of the MAC Address Notice that appears on the screen after entering an incorrect password 5 times.
- Your Business Name, contact name, phone number and where you purchased the IVSEC product from.

**NVR Serial Number Sticker** (Located on the top cover of the NVR)



**MAC Address Notice** (Appears after entering an incorrect password 5 times.)



# Chapter 4 NVR Starting up

## 4.1 Before you Begin

Ensure that you have connected an LCD / TV using a HDMI or VGA cable as well as a USB mouse to the NVR

### 4.1.1 Start Wizard

Click the **Start Wizard** to proceed to the next step



### 4.1.2 Network Configuration

Connect an Ethernet cable from the WAN port on the rear of the NVR to your modem / router LAN port. The WAN port should be flashing orange and green lights once the cable is connected. Ensure that **DHCP** is ticked during the initial configuration:

Wizard ✕

Network

Local Connection

DHCP

IP Address

Subnet Mask

Gateway

DNS

DNS1

DNS2

Port

	Service	Protocol	Internal Port	External Port	UPNP Status	Mapping Strategy	UPNP
1	Web	TCP	00080	00080	Inactive	Auto	<input type="checkbox"/>
2	Client	TCP	09000	09000	Inactive	Auto	<input type="checkbox"/>
3	RTSP	TCP	00554	00554	Inactive	Auto	<input type="checkbox"/>
4	Https	TCP	00443	00443	Inactive	Auto	<input type="checkbox"/>

PPPoE

Enable PPPOE

User

Password   Show Password

Next
Cancel

**DHCP:** Enabling DHCP will automatically request an IP address from your modem / router.

**IP Address:** The default IP address of the NVR is 192.168.001.100. This address should change automatically when DHCP is ticked.

## Port

**Web Port:** The default web port is 80. Only a qualified IT Support technician should change this setting

**Client Port:** The default port is 9000 and can be changed as required. This port number is required to setup the Android / IOS mobile application

**RTSP Port:** The default port is 554

**HTTPS:** The default port is 443

**UPNP:** Disabled by default

**PPPOE:** Disabled by default. Normally this setting is not used by users. Simply ticking the DHCP box will be sufficient for most scenarios.

### 4.1.3 Date/Time / NTP / DST

#### Date & Time

This menu allows you to configure the Date, Time, Date Format and Time Format, Time Zone, NTP and Daylight savings (DST). It is important to configure the correct date / time and DST.

Date/Time		
Date and Time	NTP	DST
Date	18/02/2020	
Time	05:24:57	
Date Format	DD/MM/YYYY	▼
Time Format	24Hour	▼
Time Zone	GMT+10:00	▼

**Date:** Click on the calendar icon to set the current system date.

**Time:** Click to set the system time.

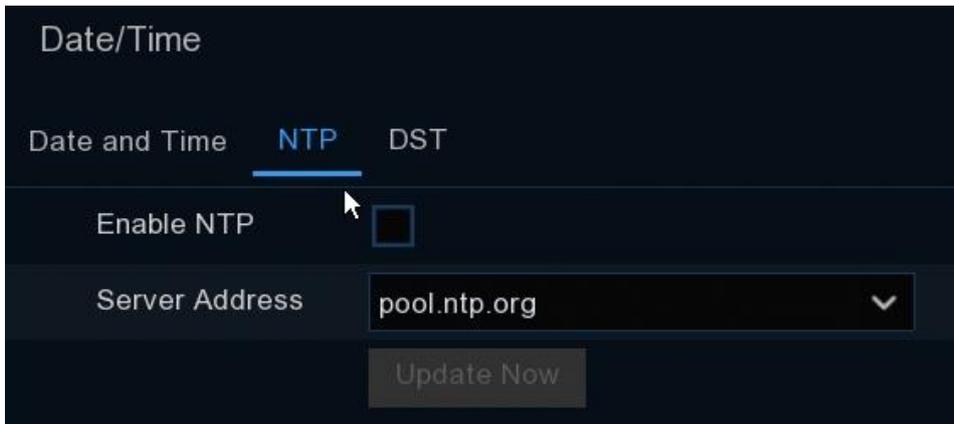
**Date Format:** Choose from the dropdown menu to set preferred date format.

**Time Format:** Default is 24Hour.

**Time Zone:** Set the correct time zone (The Default is GMT+ 10 – (applicable for ACT, NSW, QLD, VIC and TAS).

## NTP

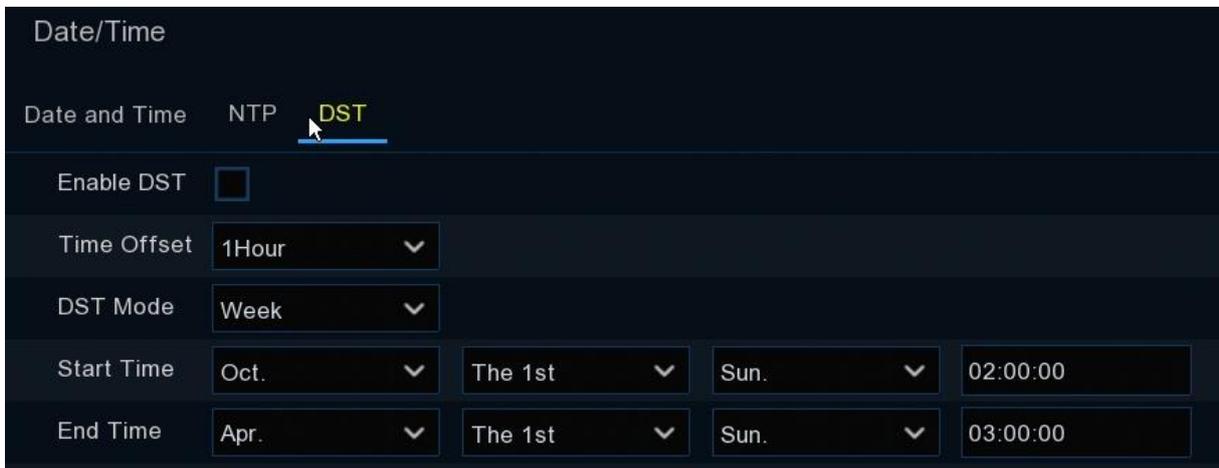
NTP stands for Network Time Protocol. This feature allows you to synchronise the date and time automatically on the NVR over the Internet. The default setting is disabled



Tick the “**Enable NTP**” box, and select pool.ntp.org. Click on “Update Now”

## DST

DST stands for Daylight Savings Time.



**Enable DST:** Enable if Daylight Saving Time (DST) is observed in your region (NSW, VIC, ACT, SA and TAS). Ensure that you configure the correct Start / End Time settings based on the state you reside in.

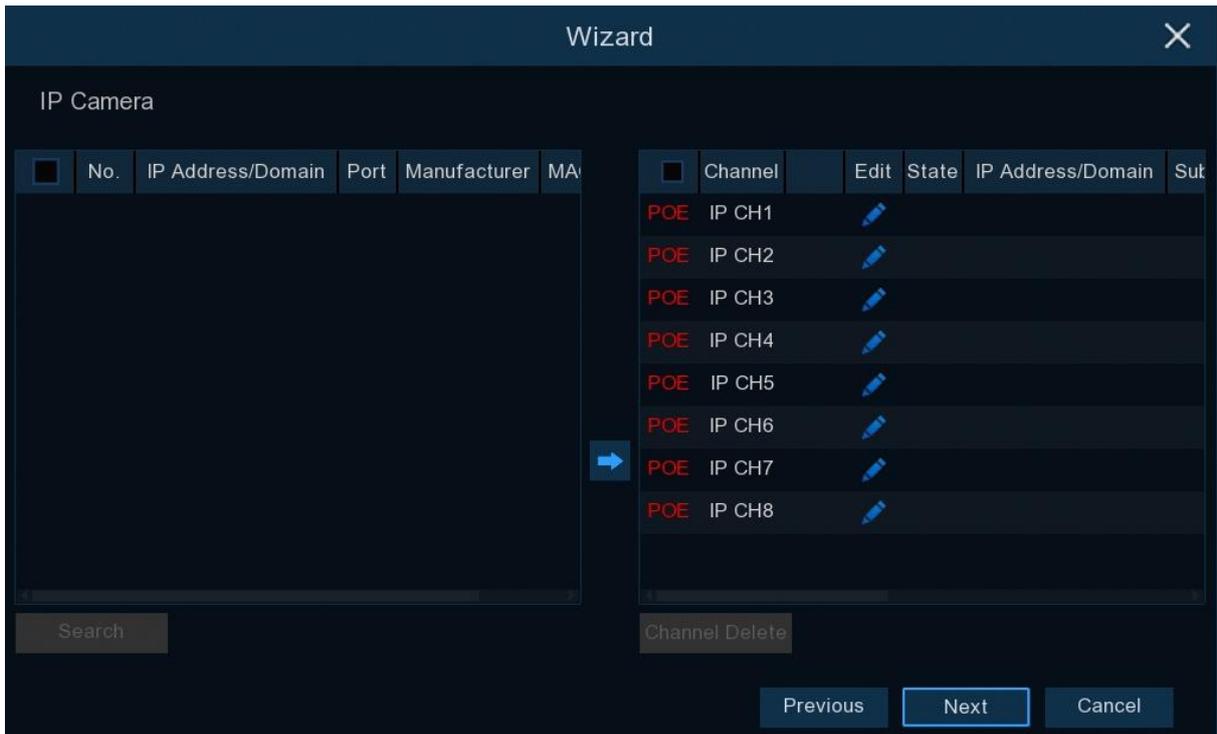
**Time Offset:** Select the amount of time to offset for DST

**Time Mode:** Choose to set the daylight saving time in weeks or in days

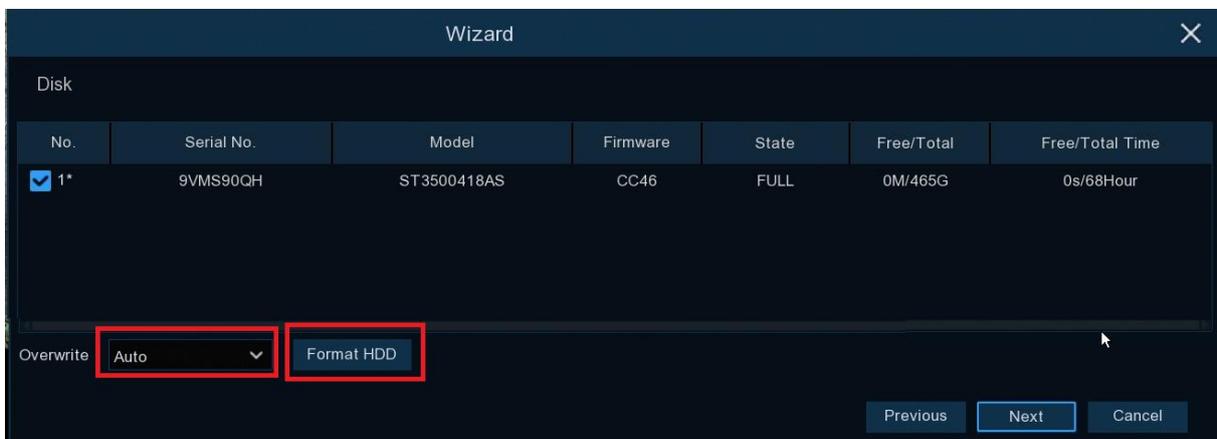
**Start Time/End Time:** Set the start time and end time for daylight saving

### 4.1.4 IP Camera

When you connect an IVSEC camera with an X in the model number (e.g. NC110X\*) directly to the NVR it will automatically be configured within 60 seconds of being connected (plug and play). Connect a camera using an Ethernet cable to a LAN port on the rear of the NVR. No additional configuration is required on this menu. Most users can skip this menu by clicking "Next"



### 4.1.5 Disk



**Overwrite:** Default setting is "Auto".

This setting will automatically record over the oldest footage when the hard drive becomes full.

A new hard drive installed into the NVR must be formatted during the initial setup. Any existing data on the hard drive will be erased

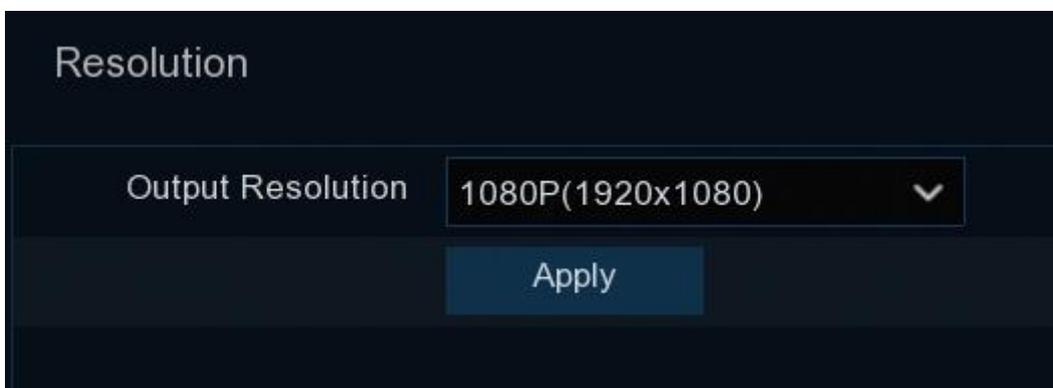
Select the hard drive number (e.g. 1, if you have multiple drives installed select the additional numbers)

Click the "Format HDD" button and enter your password. The hard drive will now format. Click "Next" when complete.

**Record On ESATA:** Option only available on the NR532X\* and NR564X\* NVR. When this option is enabled you can record the video to an e-SATA device.

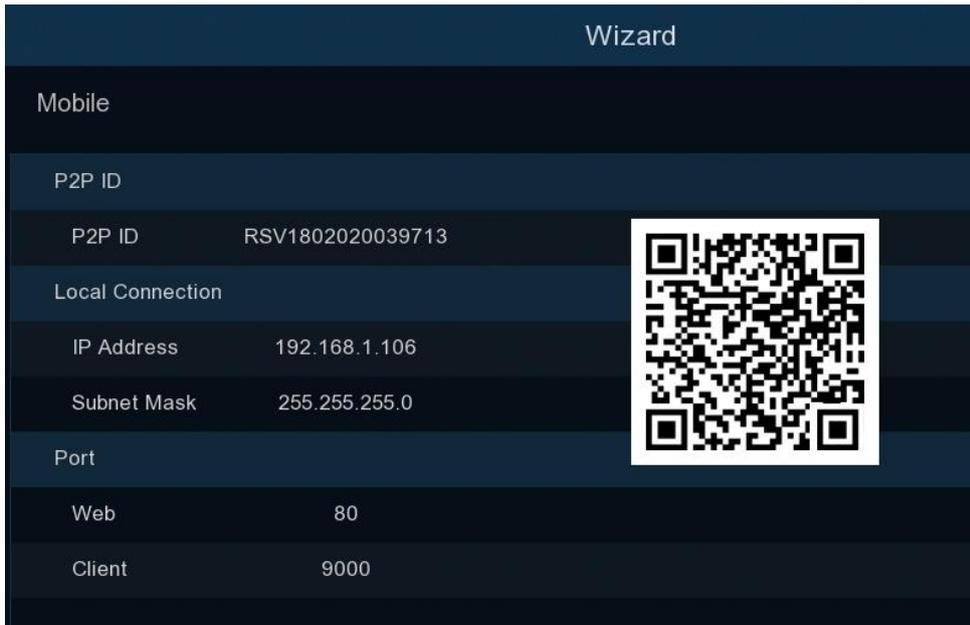
### 4.1.6 Resolution

Choose an output resolution that matches to your LCD monitor capabilities. The NVR supports to adjust the output resolution automatically to match the best resolution of your monitor when the system is starting up. A window will appear asking you to confirm the change to the Output Resolution, confirm this and when the window closes click **Next**



### 4.1.7 Mobile

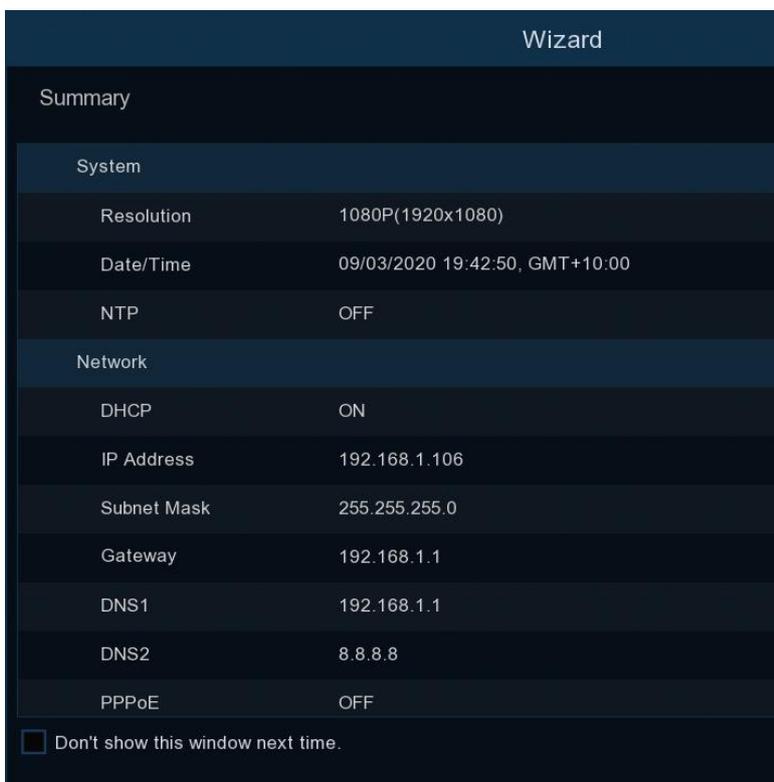
Scanning the QR ID is required to access the NVR using the IVSEC X Mobile application; you can scan the QR code using the mobile app.



### 4.1.8 Summary

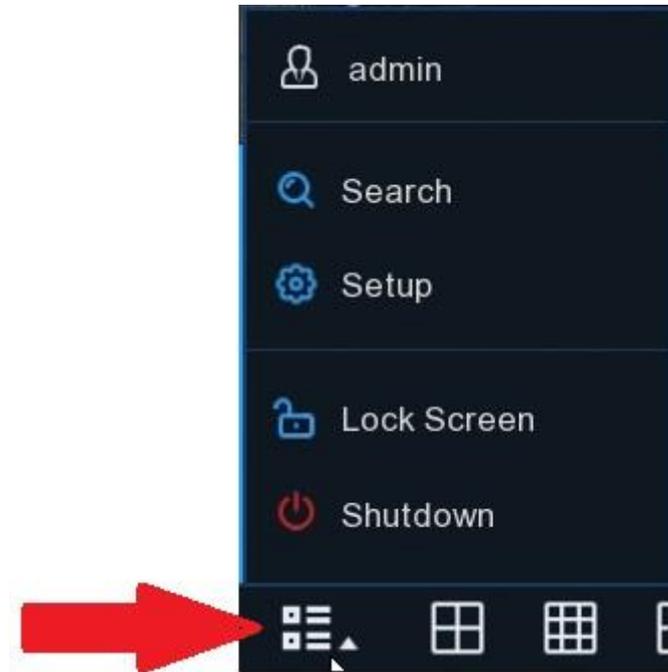
You can check the system summary information you had set in the start wizard.

Ticking **“Don't show this window next time”** will stop the Start Wizard from re-appearing when the NVR is restarted. Click the **Finish** button to save & exit.

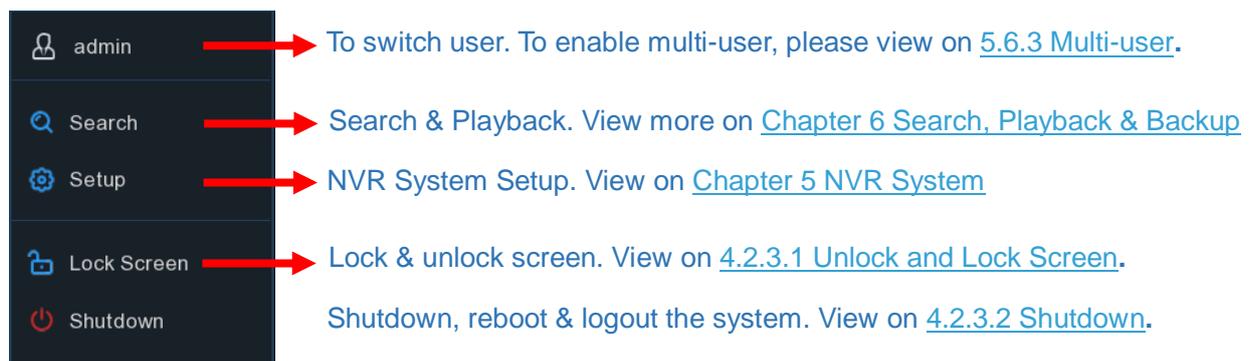


## 4.2. Start Menu

The Start menu is located on the bottom left hand corner of the screen



With the start menu, you can switch user, search & playback, enter system setup menu, lock & unlock the screen, shut down, reboot & logout the system.



**Admin** – Clicking on “admin” allows you to switch to a different user if additional users have been previously configured

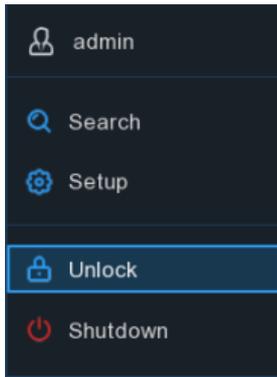
**Search** – Review, playback and backup (when a USB stick is connected to the NVR) previously recorded footage

**Setup** – Access to camera configuration, record settings, network configuration, hard drive and system configuration

**Lock Screen** – Once the screen is locked you will need to enter the NVR password to unlock it

**Shutdown** – Allows you to Shutdown, Reboot or Logout of the NVR (password required)

## 4.2.1 Unlock and Lock Screen

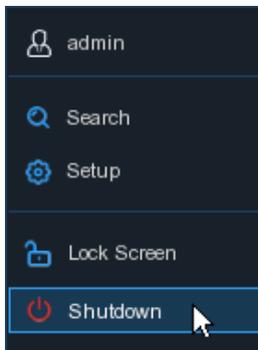


The screen will automatically lock after 1 minute of inactivity to protect unauthorised access.

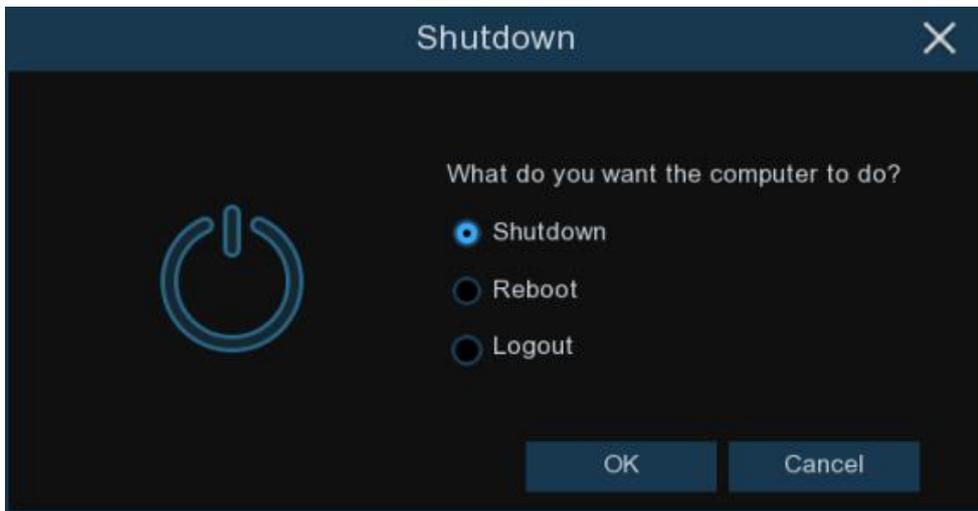
If necessary, you can also lock the screen operation manually. To do so, go to the Start Menu, then click the Lock Screen icon  to lock the system immediately.

If the system is locked, you can click the Unlock icon  to unlock the system. You will need to enter your password

## 4.2.2 Shutdown



Click the **Shutdown** button from the Start Menu, select from Shutdown, Reboot or Logout. Click the **OK** button; you will be required to enter the Admin password to authenticate.



If you choose to **Logout**, the live viewing screen will disappear. You will need to re-login to view the cameras.

Language: ENGLISH

Device ID: 000000 (000000)

User: admin

Password:  Show Password

Forgot Password Login

### 4.3 Live View



#### Camera Title

The camera title of cameras can be adjusted from Start – Setup – Channel – Live – Channel Name

#### Status Icons

 This indicates that the NVR is currently recording.



 This icon appears when the camera has detected motion.

**PIR** This icon indicates that a PIR detection has been made.

**S** This icon indicates an intelligent even has been triggered

 The icon indicates that the external I/O alarm device is triggered

 This icon indicates that the HDD has an error

 This icon indicates the HDD is unformatted

 This icon indicates the HDD is full.

 This icon indicates the HDD is read-only.

**Off-line:** If Off-line is displayed on a channel it means the camera has lost connection to the NVR.

Try to disconnect and re-connect the camera cable at the rear of the NVR.

 Indicates the channel is set to manual mode. Click to open **Quick Add** menu to add IP camera

 Click to edit current IP camera

### 4.3.1 Camera Quick Toolbar

In live viewing, click the left button of your mouse on a connected camera to display the Camera Quick Toolbar.



 Click to manually record the channel immediately. If the manually recording is in process, the icon will be in red colour. Click one more time to stop manual record.

 Click to save a snapshot of the current camera image. Manual Capture must be enabled to use this feature. For details on enabling Manual Capture, see [5.2.3.1 Capture](#).

 Click to play the latest 5 minutes recording of this channel

 Click to enter PTZ control panel, see [4.2.1.1 PTZ Control](#)

 Click to zoom-in the channel. When the  icon appears, press and hold the left button of your mouse to drag the area you want to zoom in.

 Click to adjust the image colour of the channel. You can adjust the HUE, BRIGHT, CONTRAST & SATURATION of the image.

**HD** Switch the live view video stream between HD & SD. HD is mainstream live view, SD is substream live view. Limit of 2 cameras running in HD resolution on the live view. Switching too many cameras to HD mode will result in the errors “**To view more cameras please select substream**” or “**resource is not enough**” to appear.



Light – Deterrent feature available in selected camera models, similar to a floodlight.



Siren - Deterrent feature available in selected camera models. Caution must be taken when activating the siren as it is noisy.



Add customized tag - will allow you to create an individual name for the tag to make it easier to identify in the Tag menu.



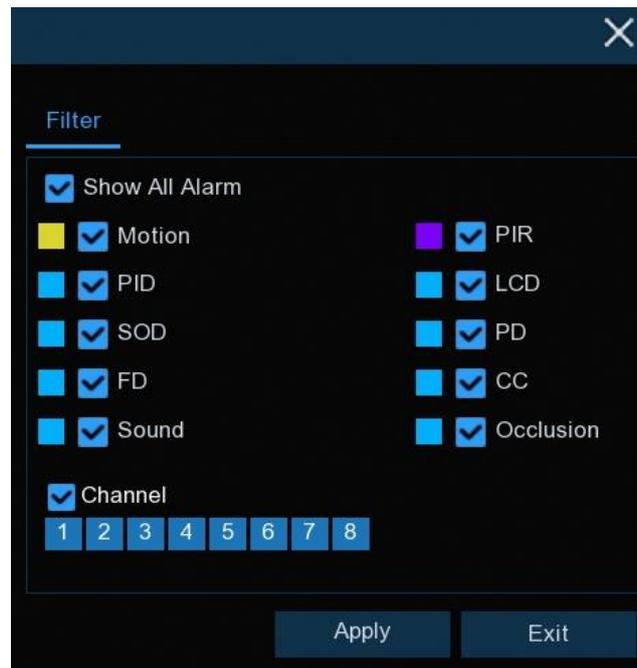
Recent recordings will show up on a scroll bar on the right hand side of the screen. This will show the channel name, a still image of the channel, the time of the event and will be colour coded based on the event type. You can choose to pin this menu otherwise it will collapse after a few minutes until the next activity is recorded.



Clicking on the icon of an eye will hide the menu. The icon will change to a closed eye



Clicking on the gear icon will bring up the filter menu. You can select the type of events that will appear on the menu



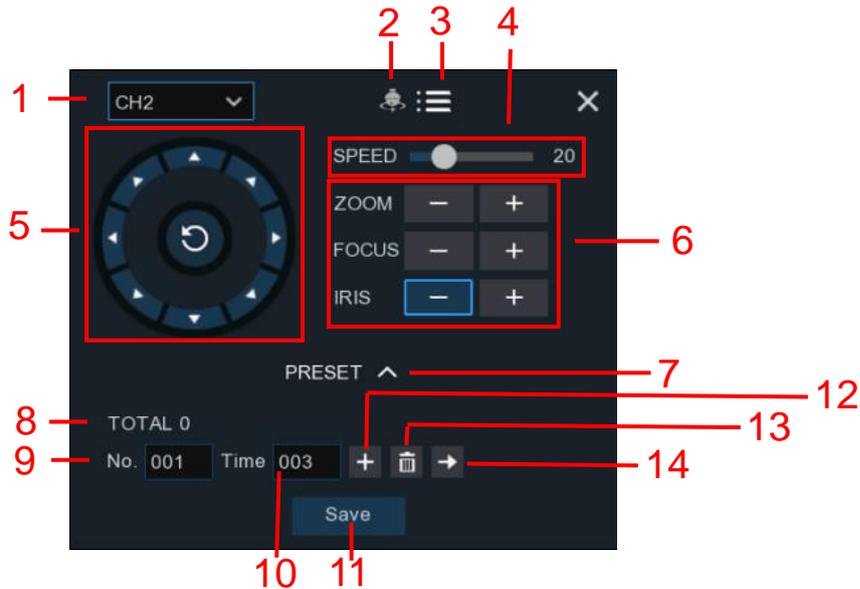
**Instant Playback:**

You can click on the play button to instantly view a recording.

### 4.3.2 PTZ Control

PTZ control allows you to control your PTZ (up, down, left, right or zoom /focus) or a camera with a motorised lens (Zoom / Focus)

- 1) Left mouse click on the PTZ channel in the Live Viewing screen to open [Camera Quick Toolbar](#), and choose the PTZ control icon .
- 2) PTZ control panel will be displayed.



No.	Icon	Item	Description
1		Channel	Click to select the channel of the PTZ camera.
2		Cruise	Start / stop PTZ cruise by preset points. Make sure you had enabled the Cruise function for this channel in <a href="#">5.1.4 PTZ</a> .
3		UTC Menu	If you have chosen protocol for this channel as COAX1 or COAX2, the UTC menu button will be display. Click this icon to enter UTC OSD menu. It is also the confirm button for your selection in the UTC OSD menu.
4	Speed	Speed	Adjust the PTZ speed
5		Pointer Panel	A) Click the direction arrow to select the direction of the PTZ camera B) Click up/down/left/right arrow to move cursor in UTC OSD menu C) Click  to switch to auto pan mode
6	- ZOOM +	Zoom	Click to zoom in/out.
	- FOCUS +	Focus	Click to adjust the focus
	- IRIS +	Iris	Click to adjust the iris setting
7		PRESET	To display or hide the preset point panel

8	Total	Total	Display the total number of preset points
9	No.	No.	Number of preset point
10	Time	Time	Set the time how long the camera will stay in the preset point
11	Save	Save	Click to save the settings and preset points
12		set	Enter the number of a specific preset point, click this button to move your PTZ camera to the preset point
13		Delete	Click to delete the selected preset point
14		Go to	Click to set a specific preset point on a PTZ camera. You can add up to 255 preset points for the NVR.

### 4.3.4 Taskbar



 Click to open the Start Menu

 Click to choose different layout options for live view

 Click to choose more layout options for live view

 Click to start viewing channels in a sequence

 Quick playback. You can choose to play the latest recording for all channels from the beginning of the day, or you can choose the playback from the latest 5s, 10s, 30s, 1Min, 5Min.

 Click to adjust audio volume (external speakers required). Only cameras with inbuilt microphones will be able to transmit audio

 Click to switch all IP channels between mainstream and substream). See [4.3.5 Mainstream in](#)

#### Live View

 Click to switch among real-time, balanced, or smooth view. The view effect modes affect only the live view video quality by bitrate and frame rate but do not affect the recording quality.



Connect Status – An active Ethernet cable is connected to the WAN port of the NVR



Not connected – No active cable is connected to the WAN port of the NVR or the network is down



Light & Siren – Manually activate light and siren



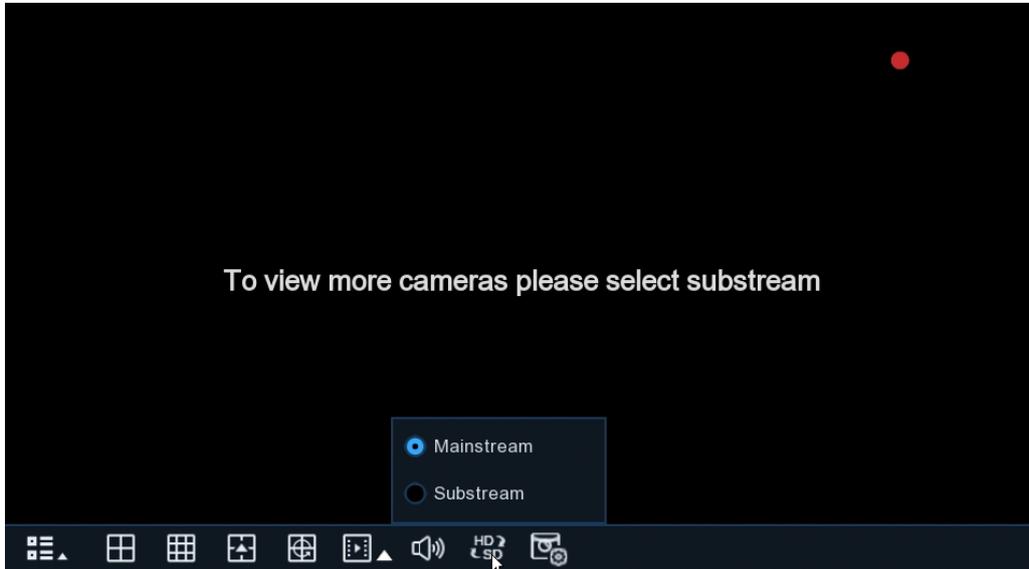
To start or stop Manual Record and Manual Alarm.



To view system information, channel information, record info and network state.

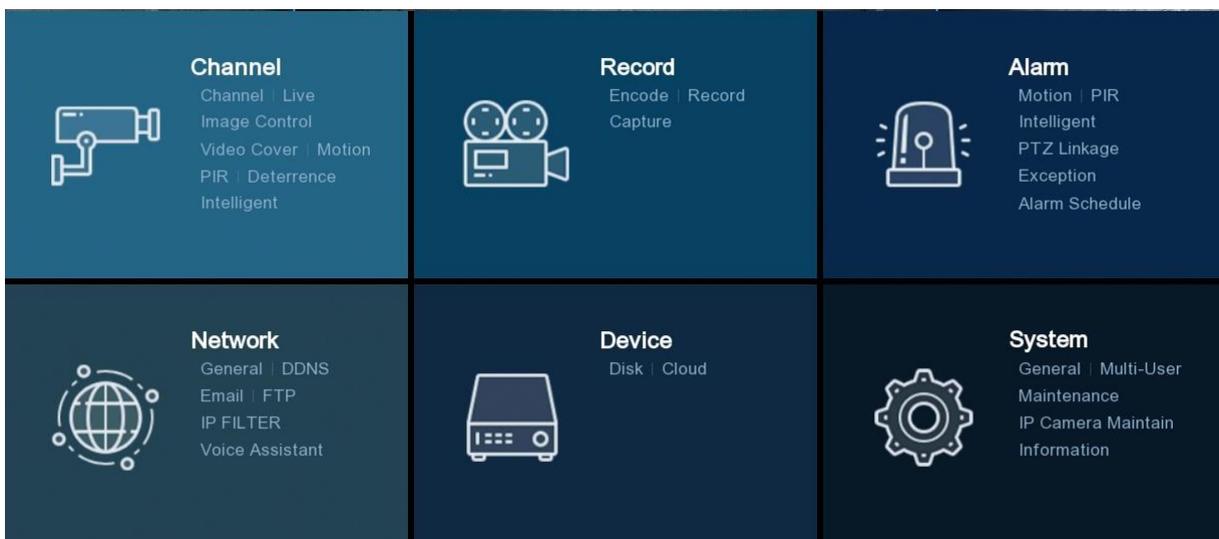
### 4.3.5 Mainstream in Live View

If you select Mainstream for all cameras in Live view you will receive a message “**To view more cameras please select substream**” or “**Resource is not enough**”. To resolve this message select substream from the  menu.



## Chapter 5 NVR System Setup

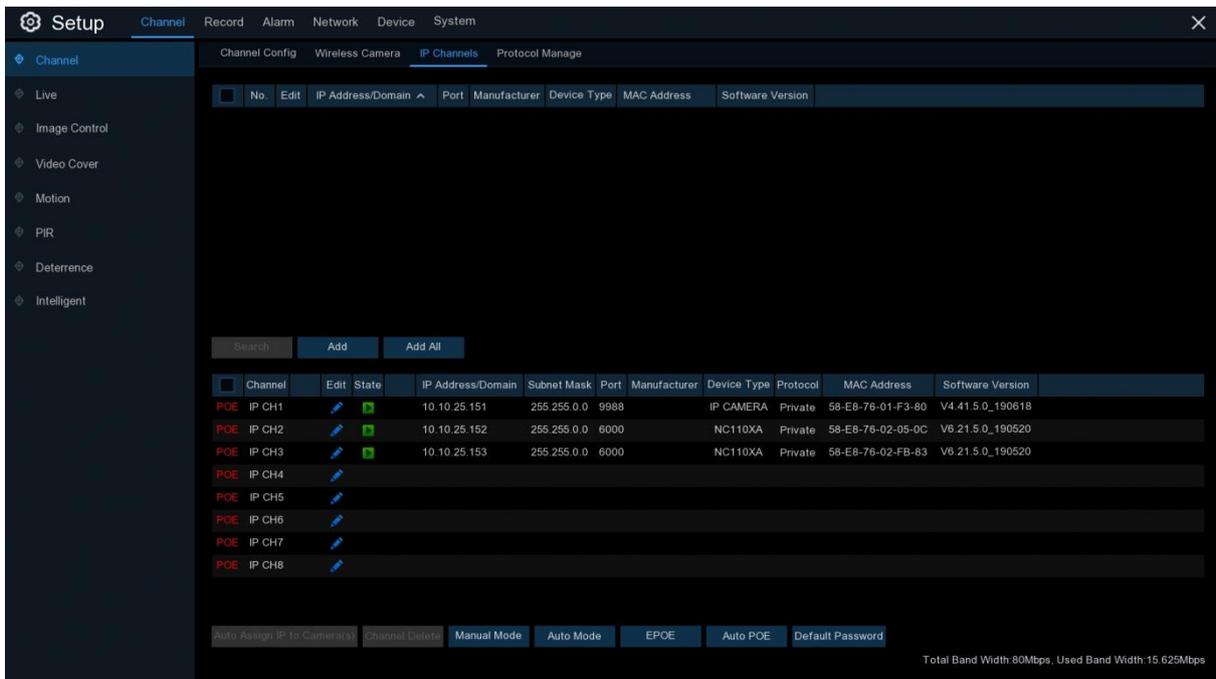
To configure channel, record, alarm, network, device and system settings click on the [Start Menu](#) → [Setup](#).



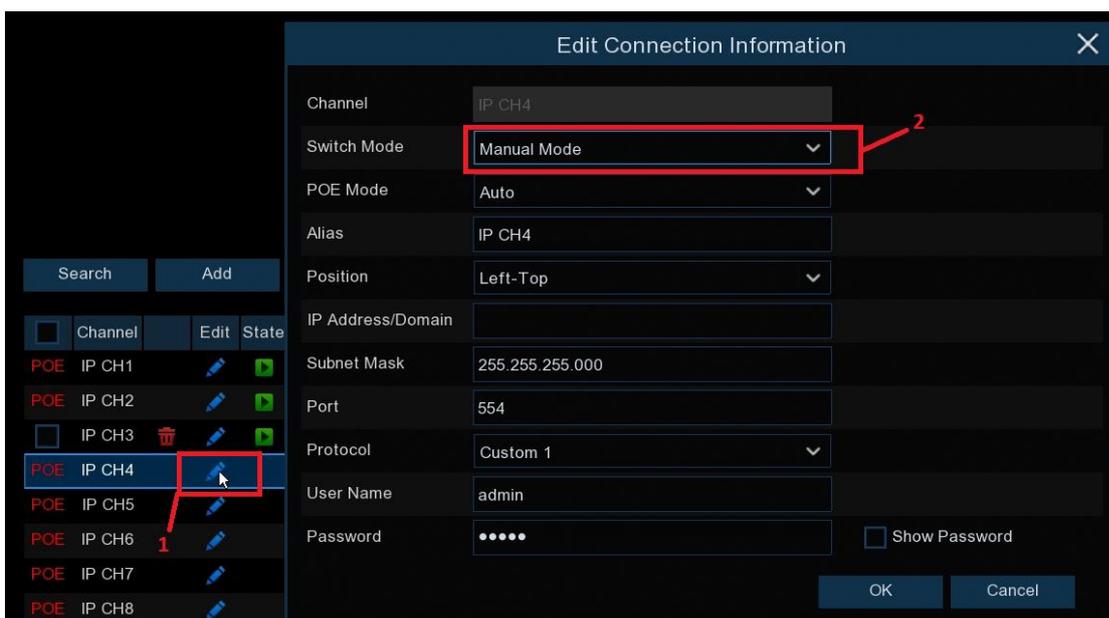
## 5.1 Channel

In this section, you are allowed to configure the camera, live view display, manage IP cameras, adjust IP camera's image, PTZ setup, motion setup, covert mode, and more.

### 5.1.1 Manually adding IP Channels



Click on the icon in the "edit" column. Set the Switch mode to "manual mode". Click "OK"



Click **Search** to search IP cameras from the local network, click **Add** to add individual IP cameras,

**Search:** Click button to search IP cameras, and then click one of the IP camera in the device list.

**IP Address/Domain:** IP address or domain name of the IP camera

**Alias:** Name of the IP camera

**Position:** Position to display the camera name on the screen.

**Port:** Port of the IP camera

**Protocol:** Choose the protocol of the IP camera from the dropdown menu

**User Name:** User Name of the IP camera

**Password:** Password of the IP camera

**Bind channel:** Choose a channel of the NVR you want to attach to

**Auto Assign IP to Camera(s):** The added IP camera would be not able to connect if its IP address is not in the same network segment with NVR. With this function to reassign an IP address to all added IP cameras.

**Channel Delete:** Choose one or more added IP cameras, and click this button to delete.

## 5.1.2 Protocol Manage

With the Protocol Manage, you can edit your own RTSP protocol for IP camera connection.

The screenshot shows the 'Protocol Manage' configuration page. The left sidebar has a 'Channel' menu. The main content area has tabs for 'Analog Channels', 'IP Channels', and 'Protocol Manage'. The configuration fields are as follows:

Custom Protocol	Custom Protocol1	
Protocol Name	Custom 1	
Stream Type	Mainstream	Substream
Enable Substream	<input checked="" type="checkbox"/>	
Type	RTSP	RTSP
Port	554	554
Resources Path	rtsp://192.168.1.150:554/ch01/0	rtsp://192.168.1.150:554/ch01/1

Example :  
 [type]://[IP address]:[port]/[resources path]  
 rtsp://192.168.0.1:554/resourcesPath

**Custom Protocol:** Protocol number

**Protocol Name:** To give a name to your custom protocol.

**Enable Substream:** Check the box if you want to enable sub-stream.

**Type:** Only RTSP is currently available.

**Port:** Input the RTSP port of your IP camera.

**Resources Path:** Input the RTSP address of your IP camera.

### RTSP Strings of IVSEC X- Range Products

The default RTSP strings of IVSEC X-range cameras are:

- Mainstream: rtsp://cameraipaddress/ch01/0
- Substream: rtsp://cameraipaddress/ch01/1
- Mobilestream (if supported by camera): rtsp://cameraipaddress/ch01/2

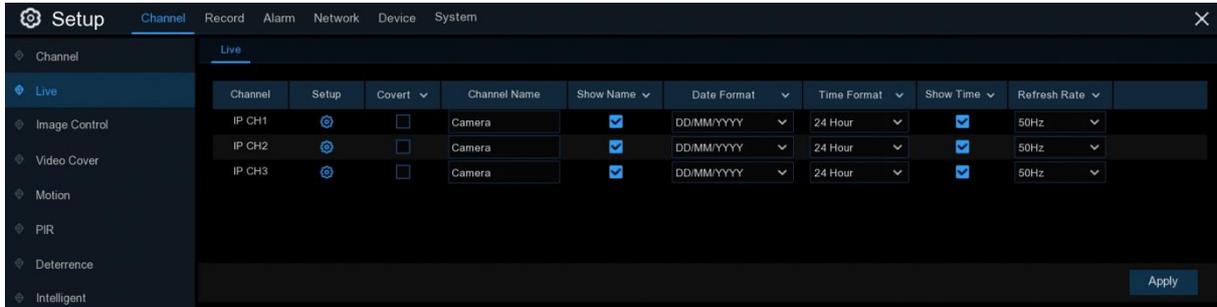
### Default RTSP strings of IVSEC X-range NVR's:

- Mainstream (channel1): rtsp://NVRipaddress/ch01/0
- Substream (channel1): rtsp://NVRipaddress/ch01/1

NOTE: If 8 cameras are connected to the NVR and you want to access all 8 x RTSP strings simply change the **ch01** in the strings listed above to ch02 - ch08

### 5.1.3 Live

To configure camera parameters.



The screenshot shows a configuration menu for a camera channel. The settings are as follows:

- Channel:** IP CH1 (dropdown menu)
- Channel Name:** Camera (text input)
- Date Format:** DD/MM/YYYY (dropdown menu)
- Time Format:** 24 Hour (dropdown menu)
- Refresh Rate:** 50Hz (dropdown menu)
- Show Name:**  (checkbox)
- Show Time:**  (checkbox)
- Alpha:** Slider set to 64
- HUE:** Slider set to 128
- BRIGHT:** Slider set to 128
- CONTRAST:** Slider set to 128
- SATURATION:** Slider set to 128
- Default:** Button to load default settings
- Apply:** Button to save settings

Red arrows point from each setting to its corresponding description on the right:

- Choose a channel to configure
- Give a name to the camera
- Date format to display for the camera
- Time format to display for the camera
- Refresh Rate of the camera
- To show the camera name in live view screen
- To show the system time in live view screen
- Adjust the Hue value for the image colour
- Adjust the Bright value for the image colour
- Adjust the Contrast value for the image colour
- Adjust the Saturation value for the image colour
- Click **Default** to load default settings,
- Click **Apply** to save settings, click right mouse button of your mouse to exit.

**Channel:** Display channel name.

**Setup:** Click  icon into the setup page.

### 5.1.4 Image Control

This menu allows you to control image settings for supported IP cameras. Most settings do not need to be modified.

Channel	Setup	IR-CUT Mode	IR-CUT Delay	Lens Flip	Angle Flip	Angle Trad	BLC Level	3D Noise Reduction	DWDR	AGC	White Balance	Time Exposure	Defog Level
IP CH1		GPIO Auto	2	OFF	OFF	0	OFF	Auto	OFF	Middle	Auto	Auto	Auto
IP CH2		GPIO Auto	2	OFF	OFF	0	OFF	Auto	OFF	Middle	Auto	Auto	Disable
IP CH3		GPIO Auto	2	OFF	OFF	0	OFF	Auto	OFF	Middle	Auto	Auto	Disable

**Channel:** Channel name.

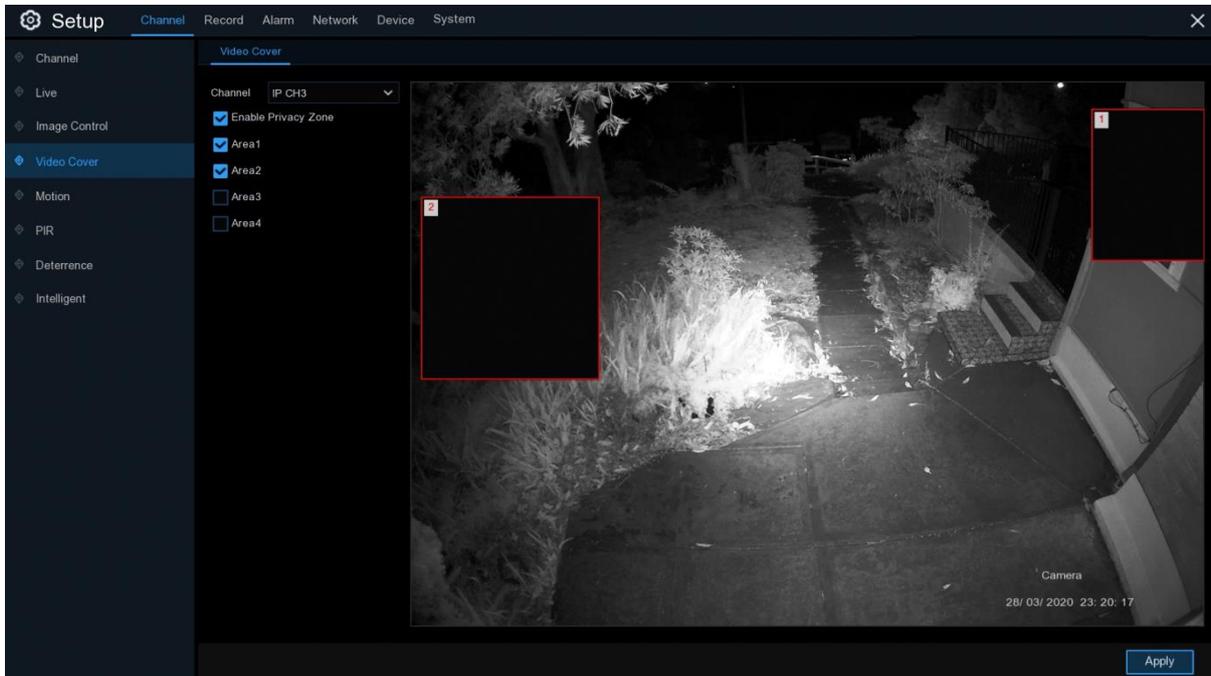
**Setup:** Click icon into the setup page.

- Channel:** IP CH3 (dropdown) → Choose a channel to configure
- IR-CUT Mode:** GPIO Auto (dropdown) → GPIO Auto is set as default
- IR-CUT Delay:** 2 (slider) → Set the delay time of IR-CUT switching
- IR-LED:** Auto (dropdown) →
- Lens Flip:**  → Check to enable vertical lens flip
- Angle Flip:**  → Check to enable horizontal flip
- Angle Trad:** 0 (dropdown) → Select 180 to enable 180 degree clockwise rotation
- Back Light:** Disable (dropdown) → To enable or disable Backlight compensation
- 3D Noise Reduction:** Auto (dropdown) → To enable or disable 3D noise reduction function
- DWDR:** Disable (dropdown) → Enable to automatically adjust the brightness & contrast in an environment with both dark & bright sources
- HLC:** Disable (dropdown) →
- AGC:** 64 (slider) → Automatic Gain Control
- White Balance:** Auto (dropdown) → Configure White Balance
- Shutter:** Auto (dropdown) → Set the shutter mode
- Time Exposure:** 1/8 (dropdown) → Choose the exposure time of the camera
- Defog Mode:** Disable (dropdown) → Use in foggy environments to improve the video quality

**Default** (button)

## 5.1.6 Video Cover

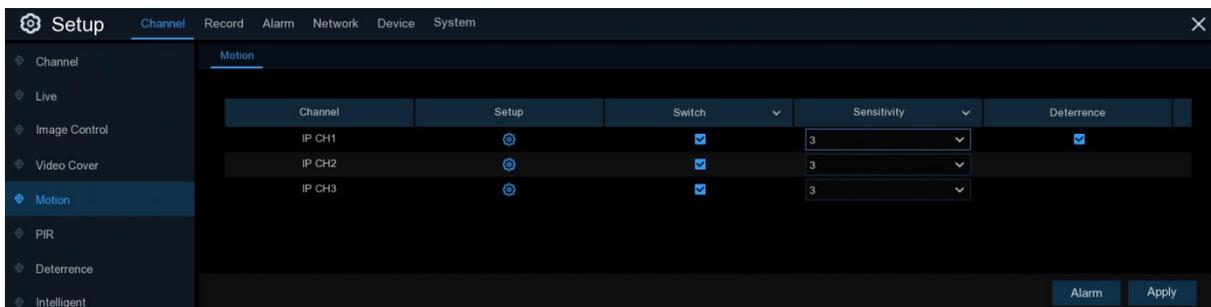
This menu allows you to create privacy zone(s) if you want to partially cover some certain part of the image. You can create up to 4 privacy zones in any size and location on the camera image. Enable the Privacy Zone, and choose how many zones you need. The zone(s) appear as “red box”. Click the edge of the red box and drag it to any size to create a privacy zone.



**Note:** The area of privacy zones you had set will be invisible in both live view & recording video.

## 5.1.6 Motion

This menu allows you to configure motion parameters. When motion has been detected by one or more cameras, your NVR will record the motion events. You can be notified of these events by configuring push notifications on your mobile application or configuring the email settings.

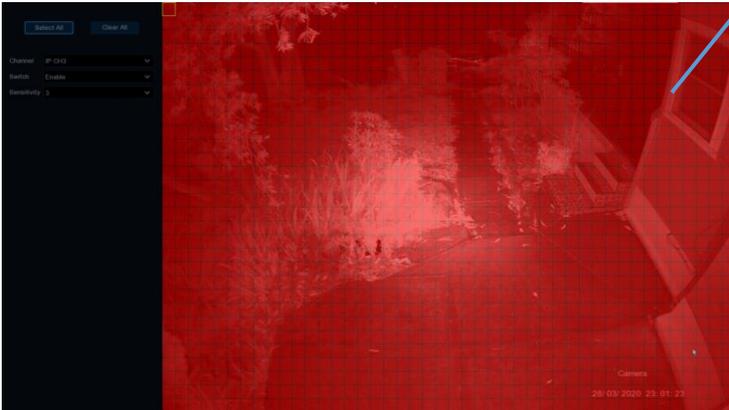


**Switch:** Ticking this box will **Enable** motion detection on the camera. Unticking will **disable** motion detection. Click **Apply** after changing any settings

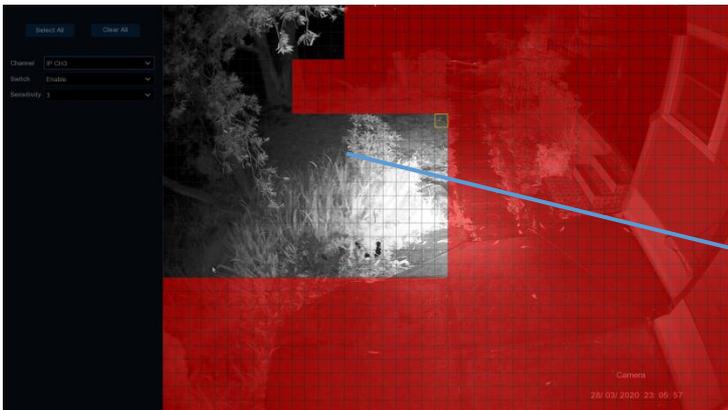
**Sensitivity:** Set the sensitivity level. Level 1 the lowest sensitivity level while level 8 is the highest sensitivity level. The default level set on the cameras is 3

**Setup:** Click  icon to adjust the motion detection settings for each camera.

**Motion Detection Area:**



The image covered in red squares is a live image of the camera you are editing. Anything that moves in an area covered by red squares will trigger an event. By default, the entire camera screen is marked for motion detection (red blocks). To minimise the number of false motion detections you can de-select areas of the screen e.g. tree canopies. To disable the motion detection on a certain area, click the grid cursor and then drag the mouse to highlight the scope to unmark the area into transparent blocks. After changes have been made, click the right button of your mouse to return and click **Apply** on the bottom right hand corner of the screen make the area setup effective.



The image shows an area of trees and bushes that has been de-selected to minimise false motion detection triggers in a windy environment

### 5.1.7 PIR (Passive Infrared Motion Detector)

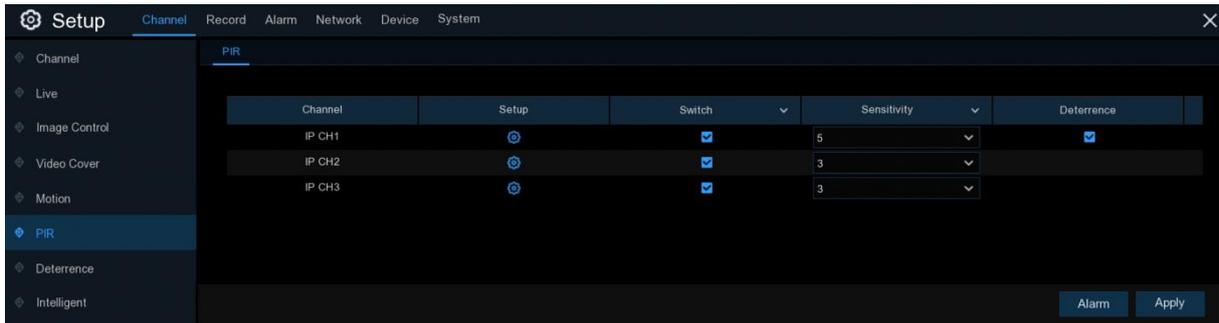
A camera that has an inbuilt PIR sensor means that it can sense movement of warm objects including people, cars and animals. The advantage of PIR compared to motion only detection is that it reduces false triggers. Please note that only certain IVSEC camera models support PIR functionality.

PIR sensors work best when an object moves parallel or passes across their field of view rather than walking directly at them.

When the PIR is triggered, the purple PIR icon will flash on-screen. If PIR and motion are triggered, the “running man” as well as the purple PIR icon will flash on-screen

PIR can detect objects outside of the camera’s field of view, so not everything that triggers the sensor will be visible on your camera.

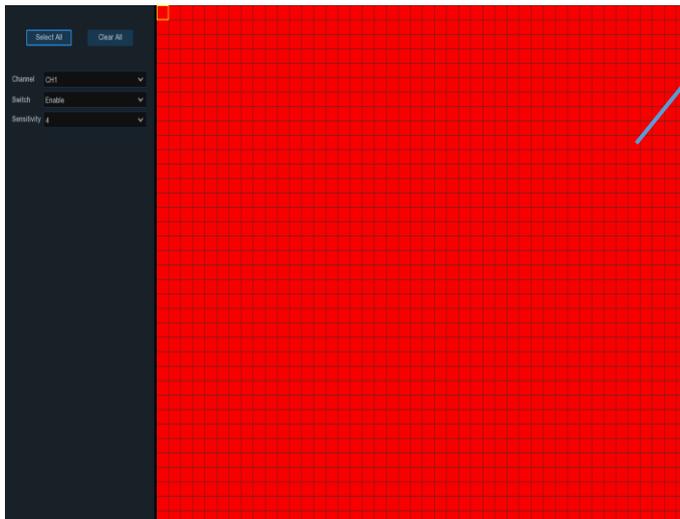
PIR Configuration is very similar to motion detection configuration



**Switch:** Ticking this box will **Enable** PIR detection on the camera. Unticking will **disable** PIR detection. Click **Apply** after changing any settings

**Sensitivity:** Set the sensitivity level. Level 1 the lowest sensitivity level while level 8 is the highest sensitivity level. The default level set on the cameras is 3

**Setup:** Click icon to adjust the PIR detection settings for each camera.

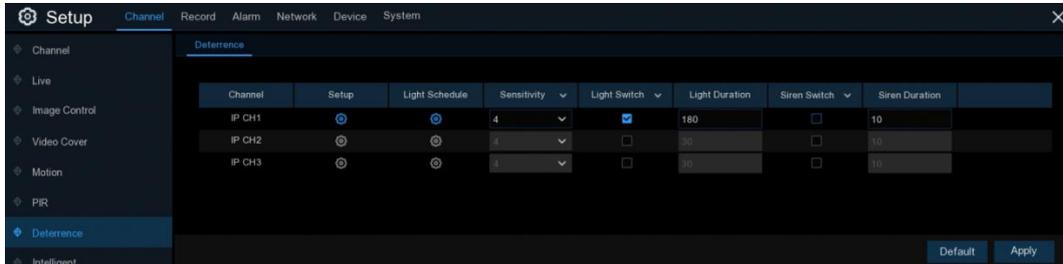


**PIR Detection Area:**

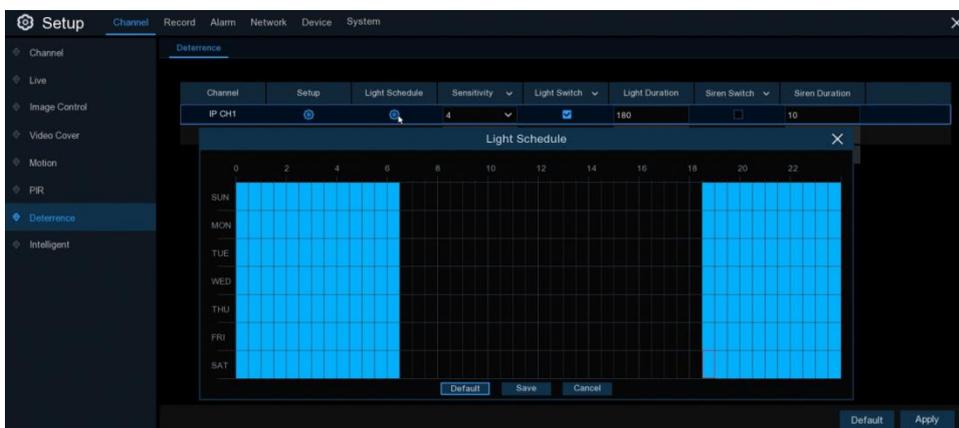
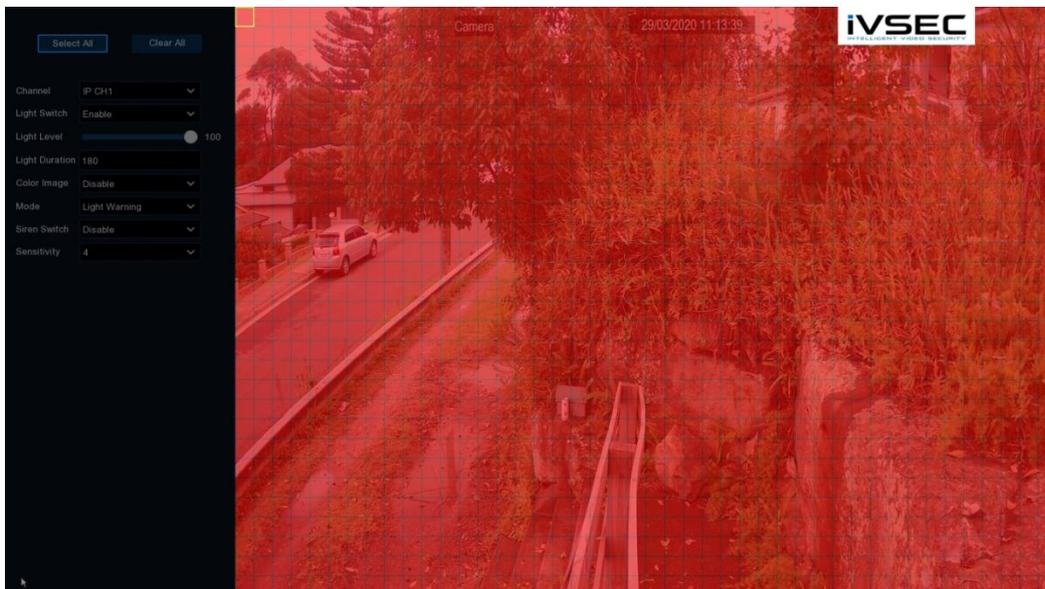
The image covered in red squares is a live image of the camera you are editing. By default, the entire camera screen is marked for PIR detection (red blocks). To minimise the number of false PIR detections you can de-select areas of the screen. To disable the PIR detection on a certain area, click the grid cursor and then drag the mouse to highlight the scope to unmark the area into transparent blocks. After changes have been made, click the right button of your mouse to return and click **Apply** on the bottom right hand corner of the screen make the area setup effective.

## 5.1.8 Deterrence

The IVSEC NC305X\* camera supports Deterrence functionality. This includes spot light, siren and 2-way audio intercom (intercom functionality accessible via the mobile application)



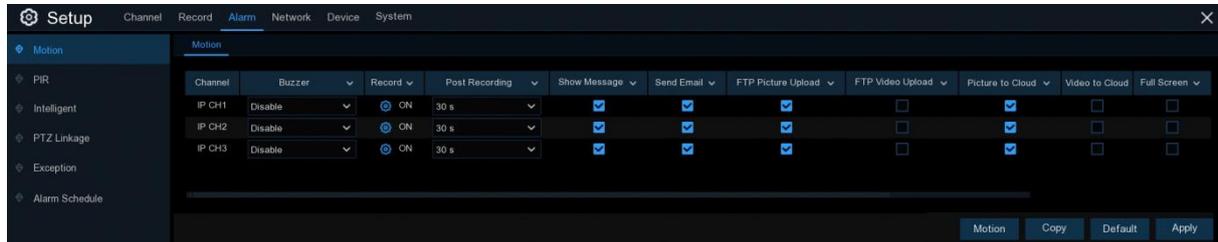
**Setup:** Click icon to adjust the spot light settings including light duration (in seconds), light level (brightness), mode (light warning or strobe) and sensitivity. Deselect the red squares as required to minimise false deterrent events.



**Light Schedule:** Click icon to adjust the light schedule times. The times selected in the table (highlighted in blue) signifies when the spot light is schedule to activated if an event is triggered.

## 5.1.9 Alarm

Click **Alarm** button to configure the motion detection alarm function:



**Channel:** Channel name

**Buzzer:** The NVR can use its internal buzzer to emit an alarm tone. You can set the buzzer duration in seconds when the motion is detected.

**Alarm Out:** Optional function. If your NVR support to connect to external alarm device, you can set to emit an alarm tone.

**Latch Time:** To configure the external alarm time when motion is detected.

**Record:** Click icon and choose which channel(s) you want to record when the motion detection is triggered.



**Post Recording:** You can set how long after an event occurs that the NVR will continue to record. The recommended recording length is 30 seconds but it can be set higher up to 5 minutes.

**Show Message:** Check the box to display icon on the live view screen when the motion is detected.

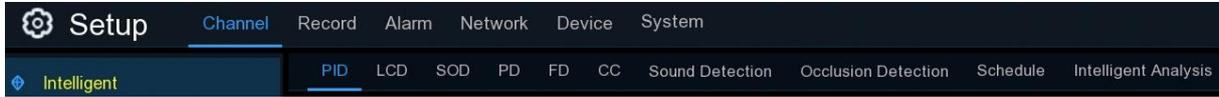
**Send Email:** You can let the NVR to send you an auto-email when the motion is detected.

**Full Screen:** If this function is enabled and a motion is detected in a channel, you will see that channel in full screen.

**FTP Upload:** To upload alarm images to FTP server when motion is detected. To enable FTP, please view [5.4.4 FTP](#).

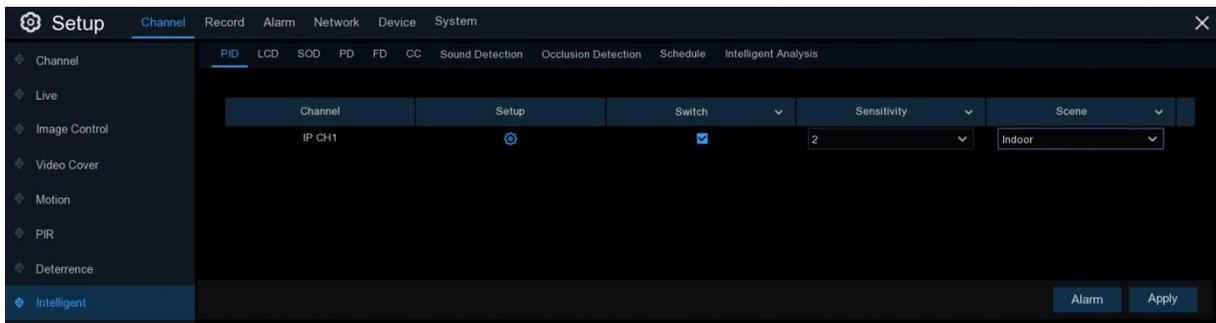
## 5.1.10 Intelligent Functions

Certain IVSEC cameras support intelligent functions, including Perimeter Intrusion Detection (PID), Line Crossing Detection (LCD), Stationary Object Detection (SOD), Pedestrian Detection (PD), Face Detection (FD), Cross Counting (CC), Sound Detection and Occlusion Detection.



### 5.1.10.1 PID (Perimeter Intrusion Detection)

Perimeter Intrusion Detection function detects people, vehicles or other objects which enter a pre-defined virtual region.



**Channel:** Select the channel you want to configure

**Switch:** Ticking will Enable the PID function. Unticking will disable PID

**Sensitivity:** The sensitivity level is from 1 to 4. Higher sensitivity will be easier to trigger the detection.

**Scene:** Scene setting includes Indoor and Outdoor. Choose the scene to match the environment your camera is installed.

**Setup:** Click on the  icon to draw the PID region. If this icon is greyed out or a camera is not visible in the PID menu then it means that the camera does not support PID function

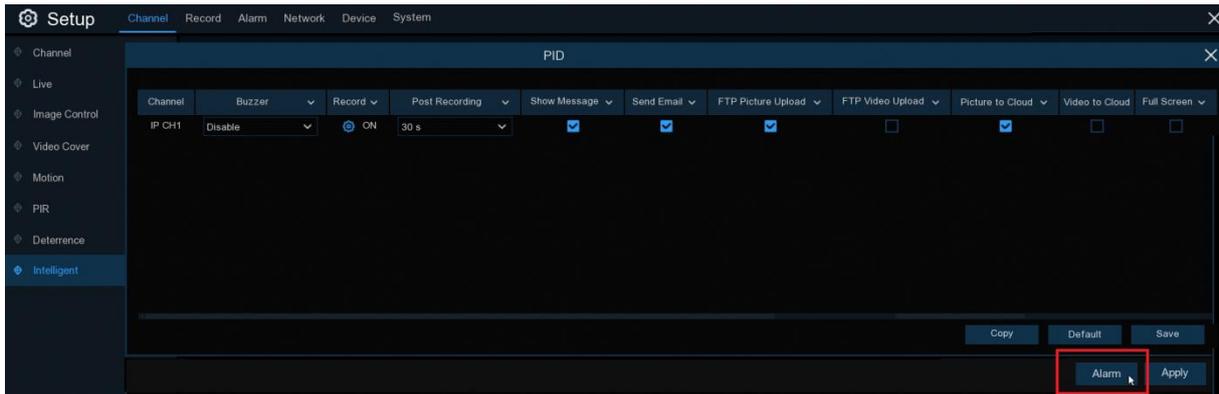


1. Choose one of the Rule Numbers. You can set a maximum of 4 PID areas.
2. enable the **Rule Switch** option to Enable detection.
3. Choose a **Rule Type**.  
 A→B: Movement from inside the PID area to the outside.  
 B→A: Movement from outside the PID area to the inside.  
 A↔B: Movement in either direction.
4. Use your mouse to click 4 points in the camera picture to draw a virtual region. The shape of the region should be a convex polygon. Concave polygons cannot be saved.
5. Click **Save** to save your settings.
6. If you want to modify the position or sharp of region, click the red box  in the region, the borders of the region will be changed to red colour. Long press the left button of your mouse to move the position of the region, or drag the corners to resize the region.
7. If you want to remove one of the regions from the camera picture, click the red box in the region and then click **Remove** button. Click **Remove All** will delete all regions.
8. To exit out of the current menu click on the right mouse button

**Notice:**

- 1) The perimeter must not be too close to the edges/corners of the camera picture, since it may fail to trigger the detection when the target passes through the edges/corners.
- 2) The shape of the regions must not be too narrow/small, since it may fail to trigger the detection when the target passes through outside the perimeter.

Click on the “Alarm” button on the bottom right hand of the screen for the menu (below) to appear



**Alarm:** Click on “Alarm” on the bottom right hand corner to access additional settings

**Buzzer:** Disable or to active the buzzer to emit an alarm tone in 10, 20, 40 or 60 seconds when the detection is triggered

**Record:** Click  icon and choose which channel(s) you want to record when the PID event is triggered.



**Post Recording:** You can set how long after an event occurs that the NVR will continue to record.

**Alarm Out:** If your NVR supports to connect to external alarm device, you can set to emit an alarm tone (NR532X\* and NR564X\* only).

**Show Message:** A letter “S” will be displayed on the live screen when a PID function is triggered.

**Send Email:** If an alarm is triggered, an Email will be sent to your preset email account.

**FTP Picture Upload:** Upload recorded pictures (snapshots) to an FTP Server.

**FTP Video Upload:** Upload recorded video to an FTP Server.

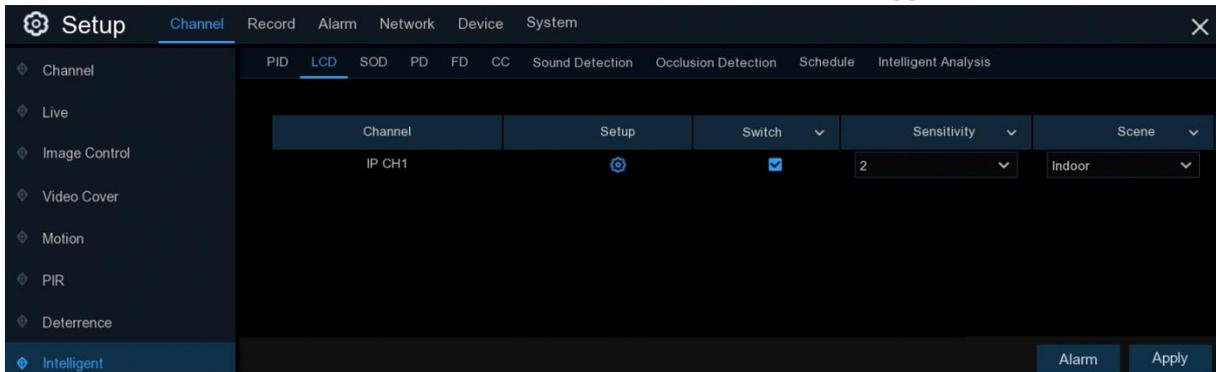
**Picture to Cloud:** Upload recorded pictures (snapshots) to Dropbox or Google Drive.

**Video to Cloud:** Upload recorded video to Dropbox or Google Drive. Maximum of 2 channels are selectable at any time.

**Full Screen:** When the detection is triggered, the channel will be enlarged into full screen.

### 5.1.10.2 LCD (Line Crossing Detection)

Line Crossing Detection function detects people, vehicles or other objects that cross a pre-defined virtual line, and some certain actions can be taken when the alarm is triggered.



**Channel:** Select the channel you want to configure

**Switch:** Ticking will Enable the LCD function. Unticking will disable LCD

**Sensitivity:** The sensitivity level is from 1 to 4. Higher sensitivity will be easier to trigger the detection.

**Scene:** Scene setting includes Indoor and Outdoor. Choose the scene to match the environment your camera is installed.

**Setup:** Click on the icon to draw the LCD region. If this icon is greyed out or a camera is not visible in the LCD menu then it means that the camera does not support LCD function

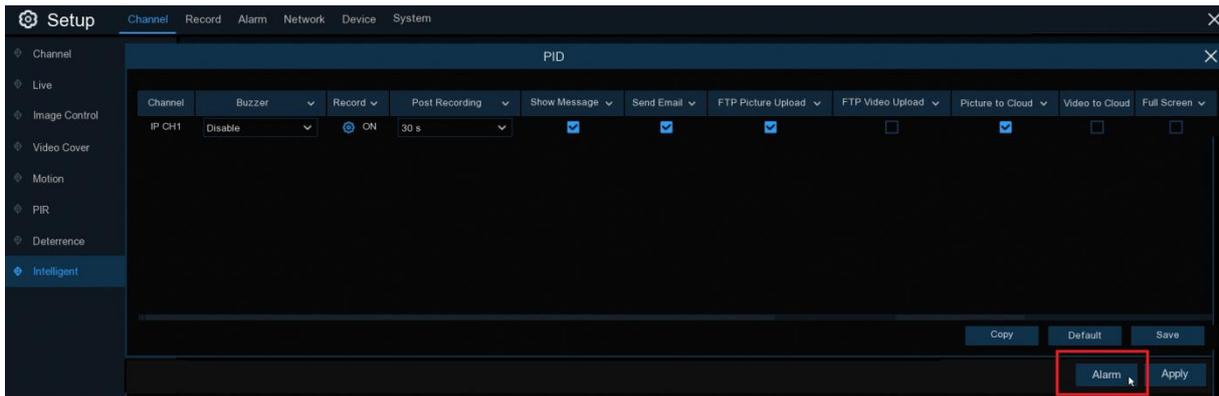


1. Choose one of the Rule Number. It is the number of LCD lines. Maximum 4 lines you can draw.
2. To enable the detection in **Rule Switch**.
3. Choose a **Rule Type**.
  - A→B: NVR will only detect the action from side A to side B;
  - B→A: NVR will only detect the action from side B to side A;
  - A↔B: NVR will detect the action from either side B to side A or side A to side B.
4. Use your mouse to click 2 points in the camera picture to draw a virtual line.
5. Click **Save** to save your settings.
6. If you want to modify the position or length of the line, click the red box in the line, the colour of the line will be changed to red colour. Long press the left button of your mouse to move the line, or drag the terminals to modify the length or position of the line.
7. If you want to remove one of the lines from the camera picture, click the red box in the line and then click **Remove** button. Click **Remove All** will delete all lines.

**Notice:**

- 1) The lines shall not be too close to the edges of the camera picture, to avoid any failure to trigger an alarm when the target crosses through it.
- 2) The lines shall not be set too short, to avoid any failure to trigger an alarm when the target passes outside it.

Click on the “Alarm” button on the bottom right hand of the screen for the menu (below) to appear



**Buzzer:** Disable or to active the buzzer to emit an alarm tone in 10, 20, 40 or 60 seconds when the detection is triggered

**Record:** Click  icon and choose which channel(s) you want to record when the PID event is triggered.



**Post Recording:** You can set how long after an event occurs that the NVR will continue to record.

**Alarm Out:** If your NVR supports to connect to external alarm device, you can set to emit an alarm tone (NR532X\* and NR564X\* only).

**Show Message:** A letter “**S**” will be displayed on the live screen when a PID function is triggered.

**Send Email:** If an alarm is triggered, an Email will be sent to your preset email account.

**FTP Picture Upload:** Upload recorded pictures (snapshots) to an FTP Server.

**FTP Video Upload:** Upload recorded video to an FTP Server.

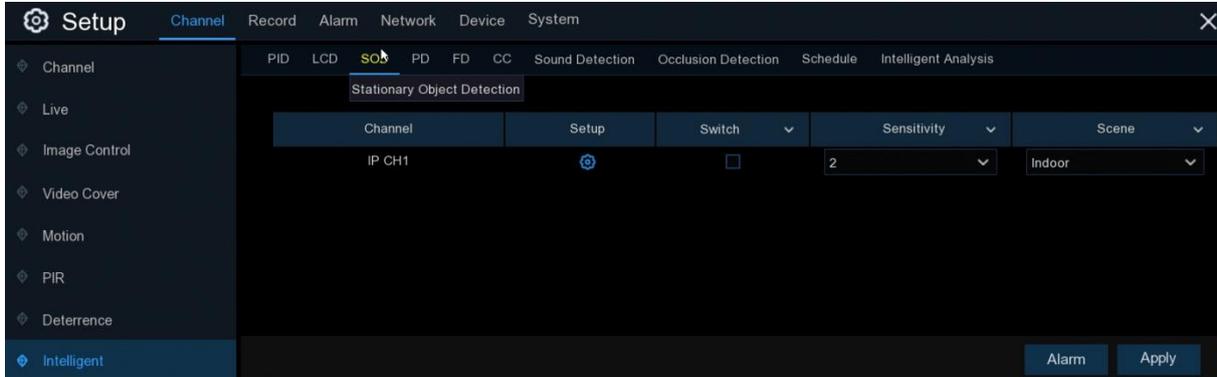
**Picture to Cloud:** Upload recorded pictures (snapshots) to Dropbox or Google Drive.

**Video to Cloud:** Upload recorded video to Dropbox or Google Drive. Maximum of 2 channels are selectable at any time.

**Full Screen:** When the detection is triggered, the channel will be enlarged into full screen.

### 5.1.10.3 SOD (Stationary Object Detection)

Stationary Object Detection function detects the objects left over or lost in the pre-defined region such as the baggage, purse, dangerous materials, etc., and a series of actions can be taken when the alarm is triggered.



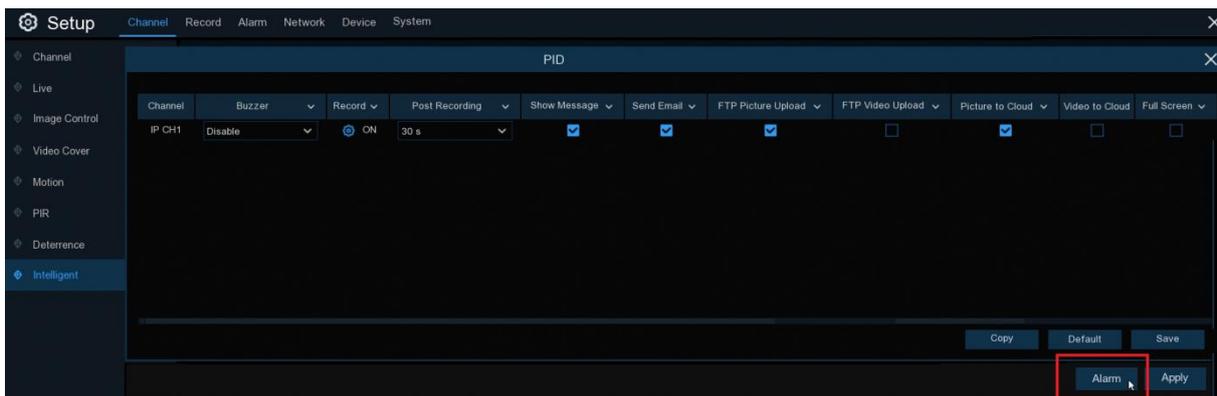
**Channel:** to select the channel you want to configure

**Switch:** to enable or disable the SOD function

**Sensitivity:** The sensitivity level is from 1 to 4, with a default value of 2. Higher sensitivity will be easier to trigger the detection.

**Scene:** Scene setting includes Indoor and Outdoor. Please choose the scene to match with the place your camera installed.

Click on the “Alarm” button on the bottom right hand of the screen for the menu (below) to appear



**Buzzer:** Disable or to active the buzzer to emit an alarm tone in 10, 20, 40 or 60 seconds when the detection is triggered

**Record:** Click icon and choose which channel(s) you want to record when the PID event is triggered.



**Post Recording:** You can set how long after an event occurs that the NVR will continue to record.

**Alarm Out:** If your NVR supports to connect to external alarm device, you can set to emit an alarm tone (NR532X\* and NR564X\* only).

**Show Message:** A letter “**S**” will be displayed on the live screen when a PID function is triggered.

**Send Email:** If an alarm is triggered, an Email will be sent to your preset email account.

**FTP Picture Upload:** Upload recorded pictures (snapshots) to an FTP Server.

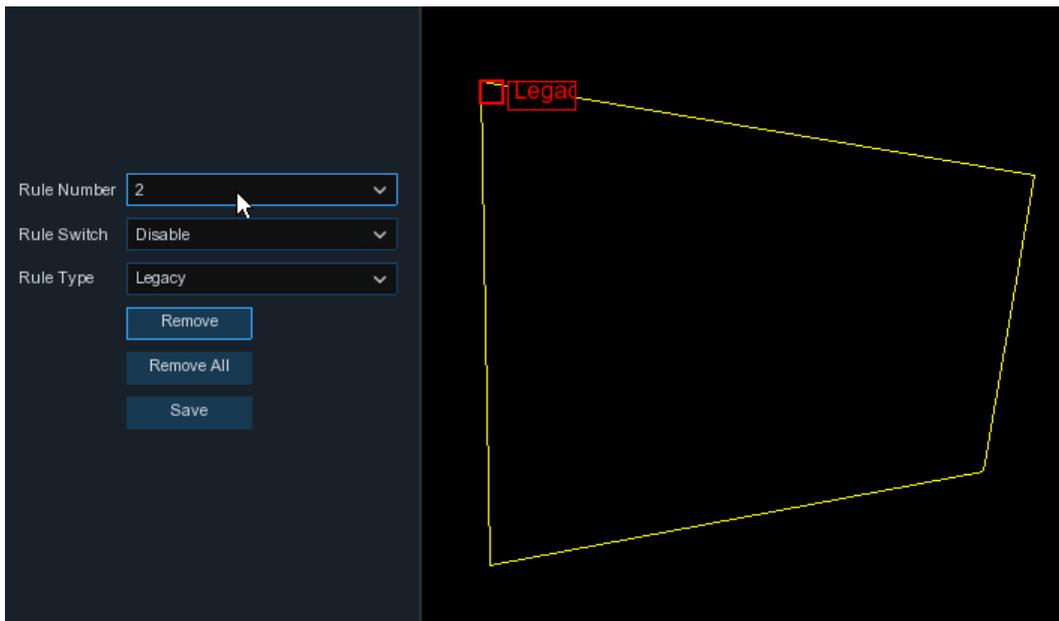
**FTP Video Upload:** Upload recorded video to an FTP Server.

**Picture to Cloud:** Upload recorded pictures (snapshots) to Dropbox or Google Drive.

**Video to Cloud:** Upload recorded video to Dropbox or Google Drive. Maximum of 2 channels are selectable at any time.

**Full Screen:** When the detection is triggered, the channel will be enlarged into full screen.

**Area:** Click [**Setup**] to draw a virtual region in the camera picture.



1. Choose one of the Rule Number. It is the number of SOD area. Maximum 4 areas you can set for SOD function.
2. To enable the detection in **Rule Switch**.
3. Choose a **Rule Type**.  
**Legacy**: NVR will only detect the left-over objects;  
**Lost**: NVR will only detect the lost objects;  
**Legacy & Lost**: NVR will detect both left-over & lost objects.
4. Use your mouse to click 4 points in the camera picture to draw a virtual region. The sharp of the region should be a convex polygon. Concave polygon will be not able to save.
5. Click **Save** to save your settings.
6. If you want to adjust the size of the region, click the red box in the region, the borders of the region will be changed to red colour. Long press the left button of your mouse to move the whole region, or drag the corners to resize the region.
7. If you want to remove one of the regions from the camera picture, click the red box in the region and then click **Remove** button. Click **Remove All** will delete all regions.

### Notice:

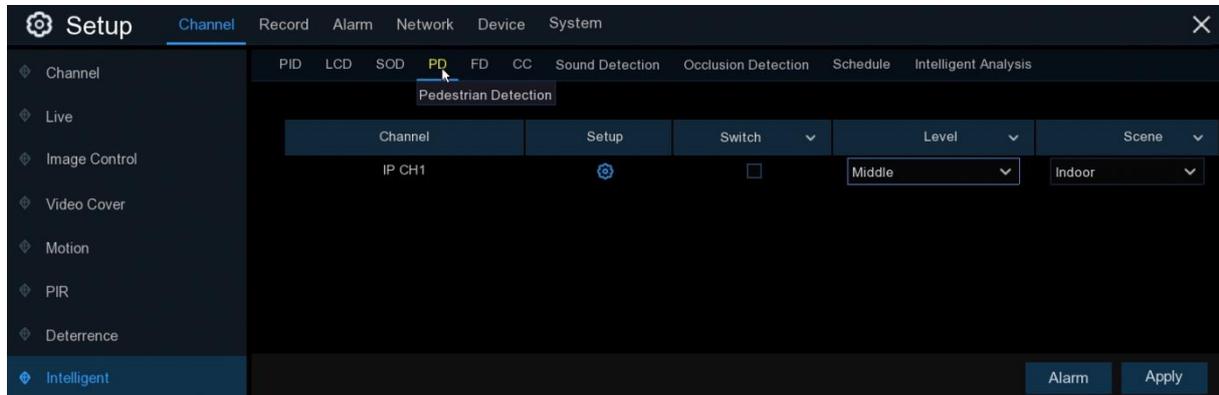
1) The area for detection shall be greater than or equal to the size of the detected object, such as the detection of a white bottle.

2) The detected object cannot be covered.



### 5.1.10.4 PD (Pedestrian Detection)

Pedestrian Detection function detects the moving people in a pre-defined region, and a series of actions can be taken when the alarm is triggered.



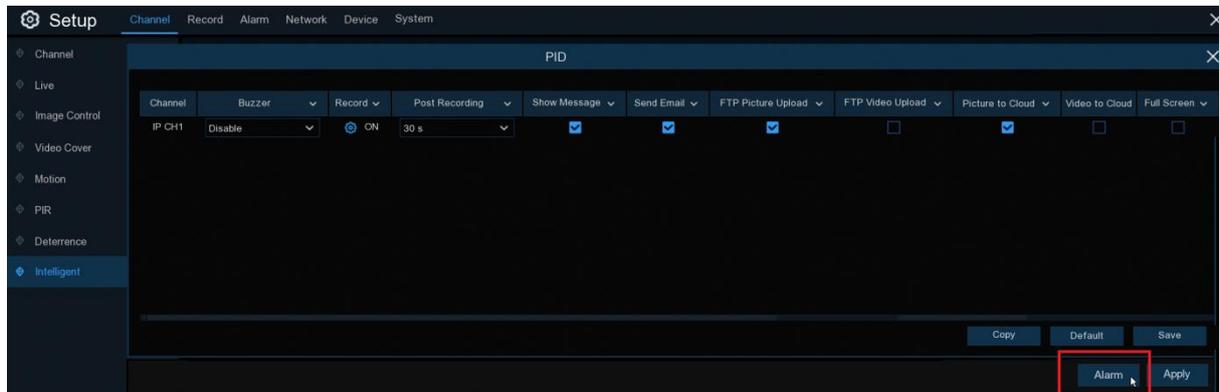
**Channel:** to select the channel you want to configure

**Switch:** to enable or disable the PD function

**Level:** Small, Middle & Big. Small level is recommended to detect objects in long distance. Big level is recommended to detect objects in short distance.

**Scene:** Scene setting includes Indoor and Outdoor. Please choose the scene to match with the place your camera installed.

Click on the “Alarm” button on the bottom right hand of the screen for the menu (below) to appear



**Buzzer:** Disable or to active the buzzer to emit an alarm tone in 10, 20, 40 or 60 seconds when the detection is triggered

**Record:** Click  icon and choose which channel(s) you want to record when the PID event is triggered.



**Post Recording:** You can set how long after an event occurs that the NVR will continue to record.

**Alarm Out:** If your NVR supports to connect to external alarm device, you can set to emit an alarm tone (NR532XA only).

**Show Message:** A letter “S” will be displayed on the live screen when a PID function is triggered.

**Send Email:** If an alarm is triggered, an Email will be sent to your preset email account.

**FTP Picture Upload:** Upload recorded pictures (snapshots) to an FTP Server.

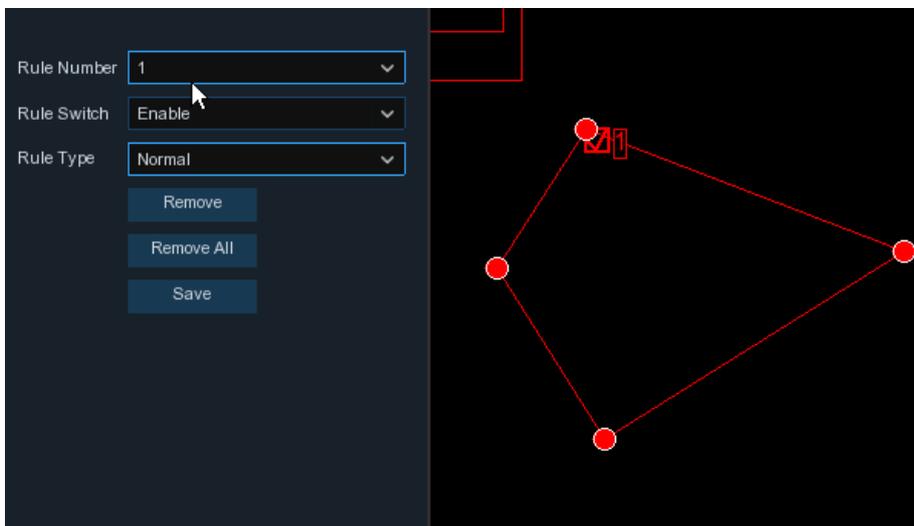
**FTP Video Upload:** Upload recorded video to an FTP Server.

**Picture to Cloud:** Upload recorded pictures (snapshots) to Dropbox or Google Drive.

**Video to Cloud:** Upload recorded video to Dropbox or Google Drive. Maximum of 2 channels are selectable at any time.

**Full Screen:** When the detection is triggered, the channel will be enlarged into full screen.

**Area:** Click [Setup] to draw a virtual region in the camera picture.



1. Choose one of the Rule Number. It is the number of PD area. Maximum 4 areas you can set for PD function.
2. To enable the detection in **Rule Switch**.
3. Choose a **Rule Type**, only Normal available for this detection.
4. Use your mouse to click 4 points in the camera picture to draw a virtual region. The sharp of the region should be a convex polygon. Concave polygon will be not able to save.
5. Click **Save** to save your settings.

6. If you want to adjust the size of the region, click the red box in the region, the borders of the region will be changed to red colour. Long press the left button of your mouse to move the whole region, or drag the corners to resize the region.
7. If you want to remove one of the regions from the camera picture, click the red box in the region and then click **Remove** button. Click **Remove All** will delete all regions.

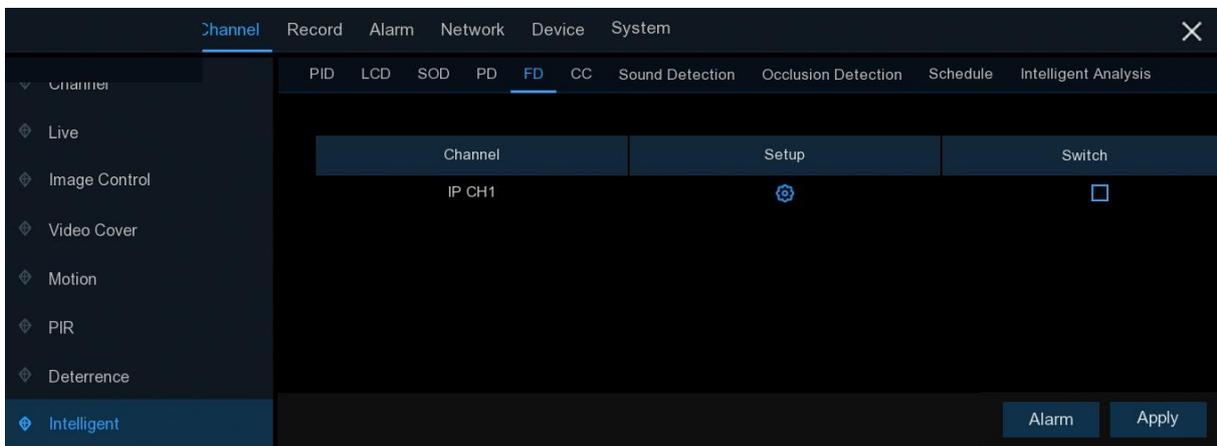
**Notice:**

- 1) The region for detection shall not be in the area that people cannot reach.
- 2) The detected people should be completely surrounded in the region.



### 5.1.10.5 FD (Face Detection)

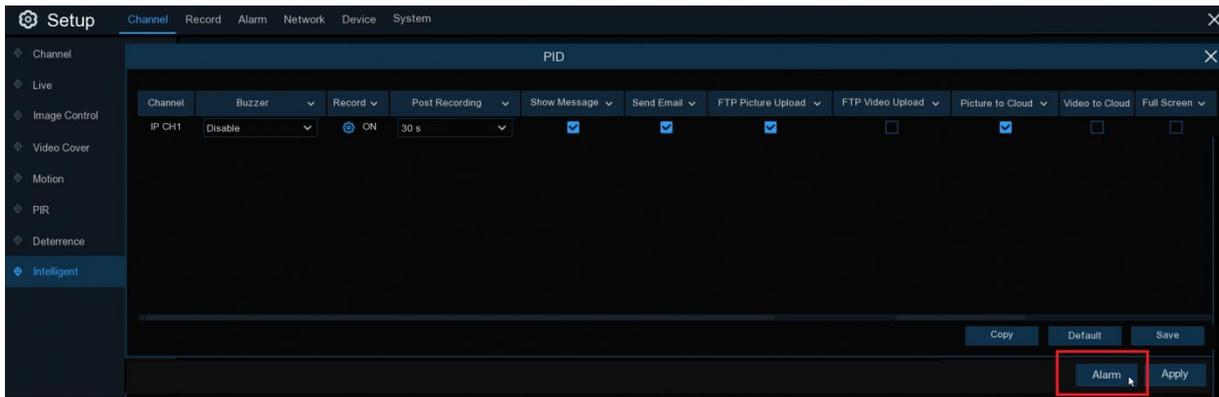
Face Detection function detects the faces of moving people appear in a pre-defined region, and a series of actions can be taken when the alarm is triggered.



**Channel:** to select the channel you want to configure

**Switch:** to enable or disable the FD function

Click on the “Alarm” button on the bottom right hand of the screen for the menu (below) to appear



**Buzzer:** to disable or to active the buzzer to emit an alarm tone in 10, 20, 40 or 60 seconds when the detection is triggered

**Record:** Click icon and choose which channel(s) you want to record when the PID event is triggered.



**Post Recording:** You can set how long after an event occurs that the NVR will continue to record.

**Alarm Out:** If your NVR supports to connect to external alarm device, you can set to emit an alarm tone (NR532XA only).

**Show Message:** A letter “S” will be displayed on the live screen when a PID function is triggered.

**Send Email:** If an alarm is triggered, an Email will be sent to your preset email account.

**FTP Picture Upload:** Upload recorded pictures (snapshots) to an FTP Server.

**FTP Video Upload:** Upload recorded video to an FTP Server.

**Picture to Cloud:** Upload recorded pictures (snapshots) to Dropbox or Google Drive.

**Video to Cloud:** Upload recorded video to Dropbox or Google Drive. Maximum of 2 channels are selectable at any time.

**Full Screen:** When the detection is triggered, the channel will be enlarged into full screen.

**Area:** Click [Setup] to draw a virtual region in the camera picture.

1. Choose one of the Rule Number. It is the number of FD area. Maximum 4 areas you can set for FD function.
2. To enable the detection in **Rule Switch**.
3. Choose a **Rule Type**, only Normal available for this detection.
4. Use your mouse to click 4 points in the camera picture to draw a virtual region. The sharp of the region should be a convex polygon. Concave polygon will be not able to save.
5. Click **Save** to save your settings.

6. If you want to adjust the size of the region, click the red box in the region, the borders of the region will be changed to red colour. Long press the left button of your mouse to move the whole region, or drag the corners to resize the region.
7. If you want to remove one of the regions from the camera picture, click the red box in the region and then click **Remove** button. Click **Remove All** will delete all regions.

### Notice:

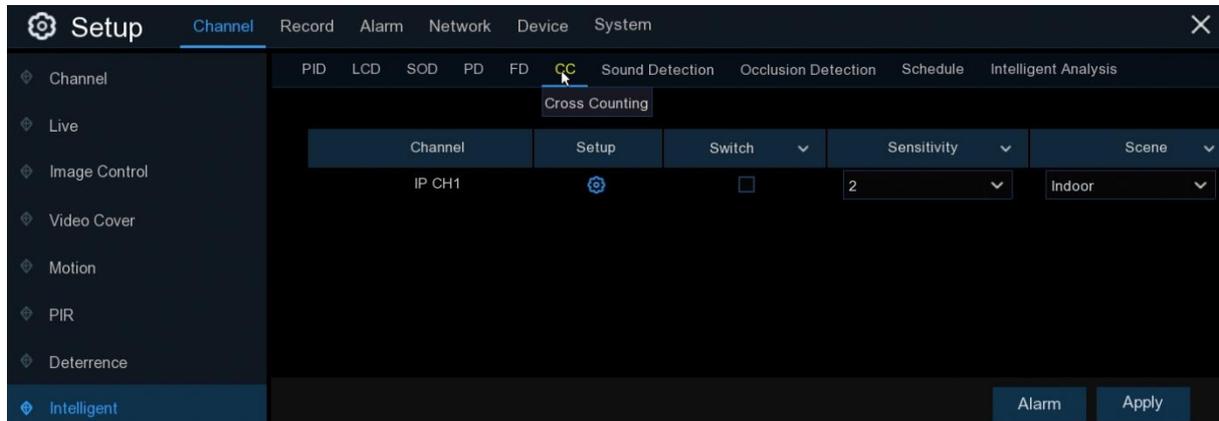
- 1) The region for detection should not be drawn in area that people cannot access



- 2) The region should include the complete front face.

### 5.1.8.6 CC (Cross-Counting)

Cross-Counting function counts the times for moving objects or people across the virtual lines.



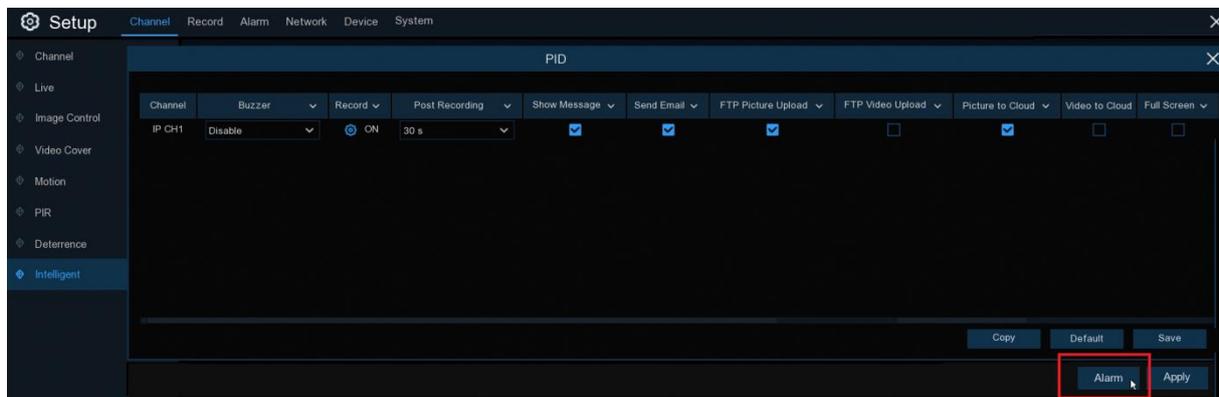
**Channel:** to select the channel you want to configure

**Switch:** to enable or disable the CC function

**Sensitivity:** The sensitivity level is from 1 to 4, with a default value of 2. Higher sensitivity will be easier to trigger the detection.

**Scene:** Scene setting includes Indoor and Outdoor. Please choose the scene to match with the place your camera installed.

Click on the “Alarm” button on the bottom right hand of the screen for the menu (below) to appear



**Buzzer:** to disable or to active the buzzer to emit an alarm tone in 10, 20, 40 or 60 seconds when the detection is triggered

**Record:** Click icon and choose which channel(s) you want to record when the PID event is triggered.



**Post Recording:** You can set how long after an event occurs that the NVR will continue to record.

**Alarm Out:** If your NVR supports to connect to external alarm device, you can set to emit an alarm tone (NR532XA only).

**Show Message:** A letter “S” will be displayed on the live screen when a PID function is triggered.

**Send Email:** If an alarm is triggered, an Email will be sent to your preset email account.

**FTP Picture Upload:** Upload recorded pictures (snapshots) to an FTP Server.

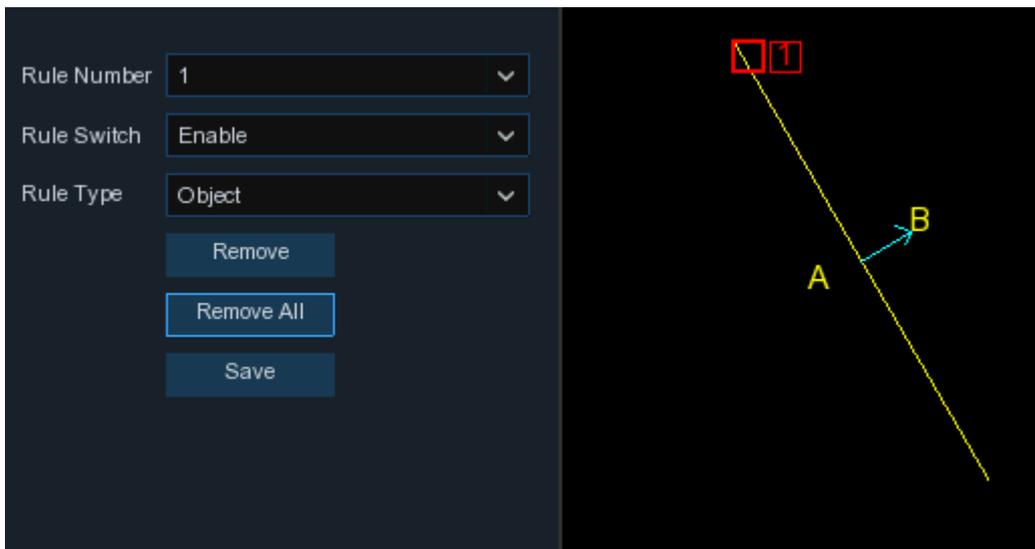
**FTP Video Upload:** Upload recorded video to an FTP Server.

**Picture to Cloud:** Upload recorded pictures (snapshots) to Dropbox or Google Drive.

**Video to Cloud:** Upload recorded video to Dropbox or Google Drive. Maximum of 2 channels are selectable at any time.

**Full Screen:** When the detection is triggered, the channel will be enlarged into full screen.

**Area:** Click [Setup] to draw a virtual region in the camera picture.

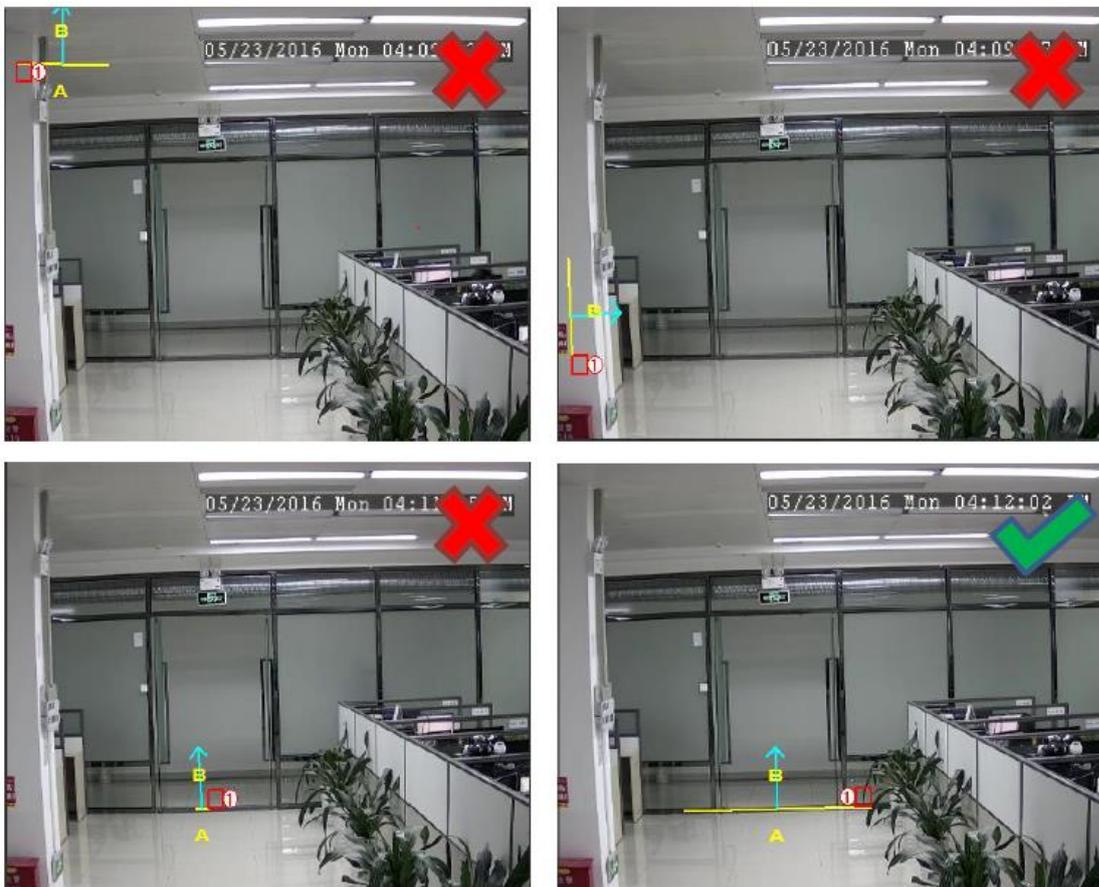


1. Choose one of the Rule Number. It is the number of virtual lines you can draw. Maximum 4 lines.
2. To enable the detection in **Rule Switch**.
3. Choose a **Rule Type**  
**Object:** Will count for only moving objects.  
**Pedestrian:** Will count only moving people.
4. Use your mouse to click 2 points in the camera picture to draw a virtual line. From Side A to Side B is Enter, from Side B to Side A is Exit.
5. Click **Save** to save your settings.

6. If you want to modify the position or length of the line, click the red box in the line, the colour of the line will be changed to red colour. Long press the left button of your mouse to move the line, or drag the terminals to modify the length or position of the line.
7. If you want to remove one of the lines from the camera picture, click the red box in the line and then click **Remove** button. Click **Remove All** will delete all lines.

### Notice:

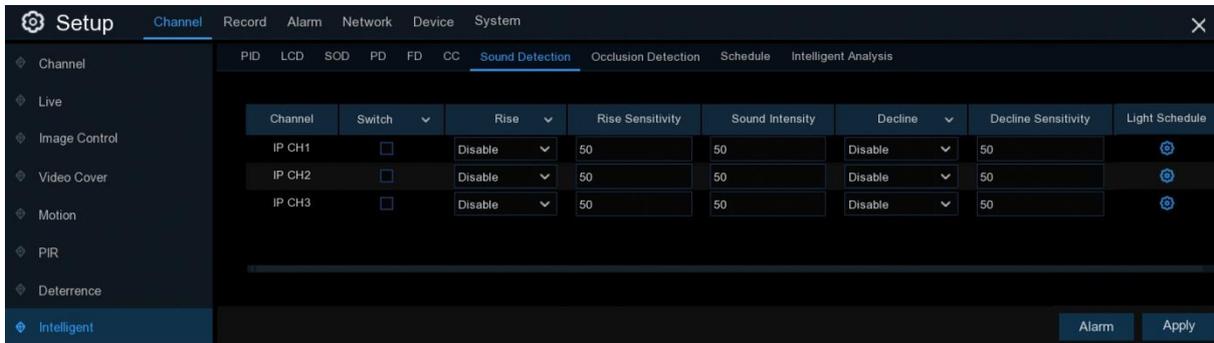
- 1) The lines shall not be too close to the edges of the camera picture, to avoid any failure to trigger an alarm when the target crosses through it.
- 2) The lines should be in the area that detected object can be reach.
- 3) The lines shall not be set too short, to avoid any failure to trigger an alarm when the target passes outside it.



You are able to search & view the statistical result of cross counting in **5.1.8.7 Intelligent Analysis**.

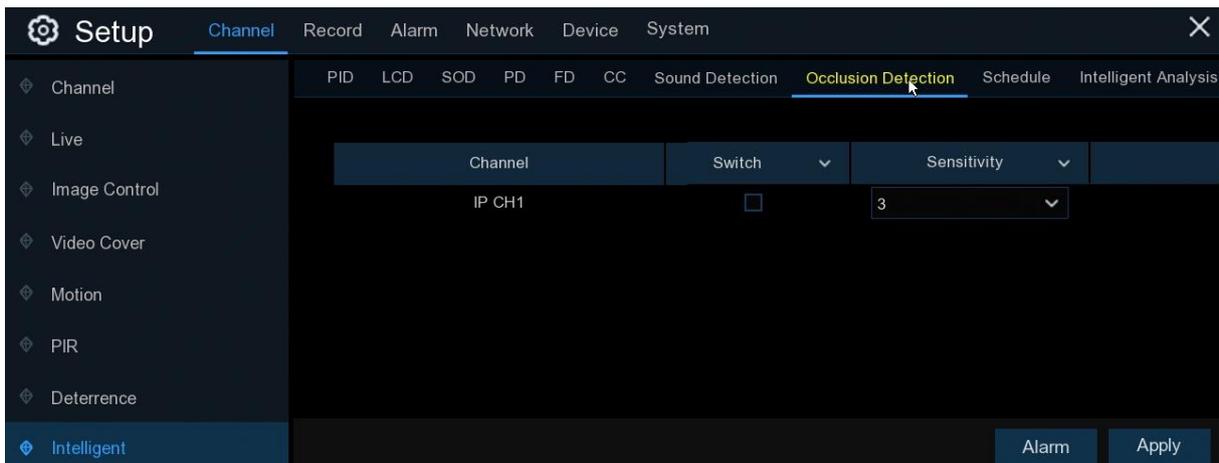
### 5.1.10.6 Sound Detection

Sound Detection is only available for IVSEC cameras with built-in microphones (e.g. NC323XB)



### 5.1.10.7 Occlusion Detection

Occlusion Detection relates camera view being obstructed (can be intentional or unintentional). To enable, tick the “Switch” option and adjust the sensitivity



### 5.1.10.8 Intelligent Analysis

The screenshot shows the 'Intelligent Analysis' tab in a software interface. At the top, there are navigation tabs: PID, LCD, SOD, PD, FD, CC, Schedule, and Intelligent Analysis. Below these are search filters: Channel (CH17), Report Type (Daily Report), Alarm Type (Pedestrian), Cross Type (Cross Out), and Start Date (08/08/2017). A 'Search' button is located to the right of the Start Date field. Below the search form is a table with two columns: 'Hour' and 'Count(Cross Out)'. The table contains 10 rows of data representing hourly intervals from 00:00 to 09:59.

Hour	Count(Cross Out)
00:00 - 00:59	1
01:00 - 01:59	2
02:00 - 02:59	2
03:00 - 03:59	1
04:00 - 04:59	61812948
05:00 - 05:59	61812976
06:00 - 06:59	116859212
07:00 - 07:59	-2013242624
08:00 - 08:59	1
09:00 - 09:59	65537

The statistical result can be queried by Daily / Weekly / Monthly / Annual for Cross In & Cross Out.

### 5.1.10.9 Intelligent Schedule

The screenshot shows the 'Setup' menu with the 'Intelligent' option selected. The 'Schedule' tab is active, displaying a configuration for channel 'IP CH1'. The interface features a grid for scheduling, with days of the week (SUN to SAT) on the vertical axis and hours (0 to 22) on the horizontal axis. The entire grid is filled with sky-blue blocks, indicating that the intelligent function is active for all hours of every day. At the bottom right, there are buttons for 'Copy', 'Default', and 'Apply'.

In order to activate the intelligent function, you need to configure the schedule. The schedule will be active in 24 hours x 7 days.

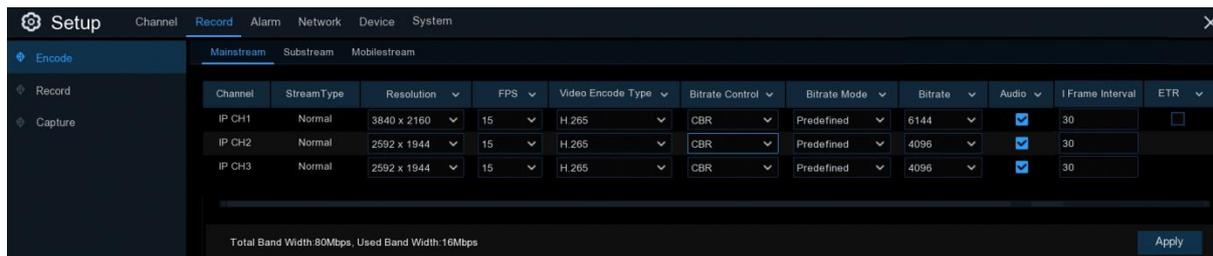
To set the schedule, choose one channel then drag the cursor to mark the slots. The sky-blue blocks in the time slots will be active for intelligent detections. The schedule is valid only for the selected channel each time when you set. If you want to use the same schedule for other channels, use **Copy** function. Click **Save** to save your settings.

## 5.2 Record

This menu allows you to configure the recording parameters

### 5.2.1 Encode

This menu allows you to configure the recording video or network transmission picture quality. Generally, Mainstream defines the recording video quality which will be saved in the HDD; Substream defines the video quality which is being viewed via remote access, for example web client & CMS; Mobilestream defines the video quality which is being viewed via remote access via mobile devices.



**Resolution:** This parameter defines how large the recorded image will be.

**FPS:** This parameter defines the number of frames per second the NVR will record.

**Video Encode Type:** NVR supports H.265 for mainstream and H.264 for substream and mobilestream.

**Bitrate Control:** Select the bitrate level. For a simple scene, such as a gray wall is suitable constant bitrate (**CBR**). For more complex scene, such as a busy street is suitable variable bitrate (**VBR**).

**Bitrate Mode:** If you want to set the bitrate by yourself, then choose **User-defined** mode. If you want to select the predefined bitrate, choose **Predefined** mode.

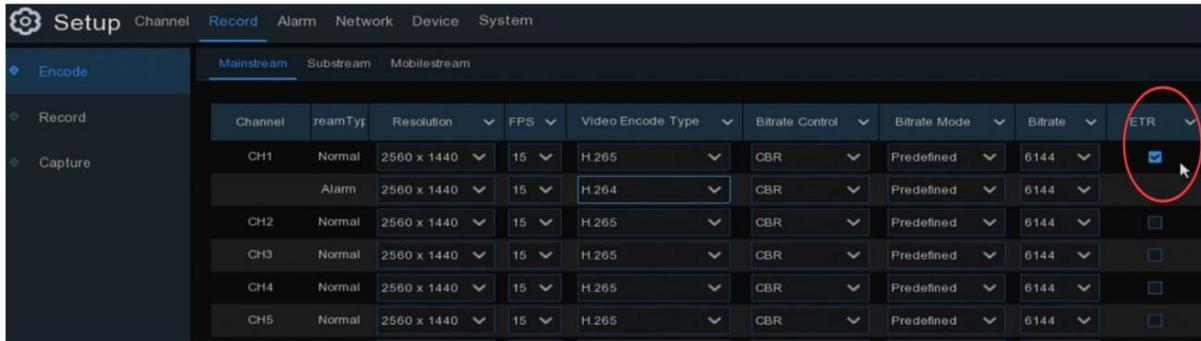
**Bitrate:** This parameter corresponds to the speed of data transfer that the NVR will use to record video. Recordings that are encoded at higher bitrates will be of better quality.

#### 5.2.1.1 Event Trigger Recording (ETR)

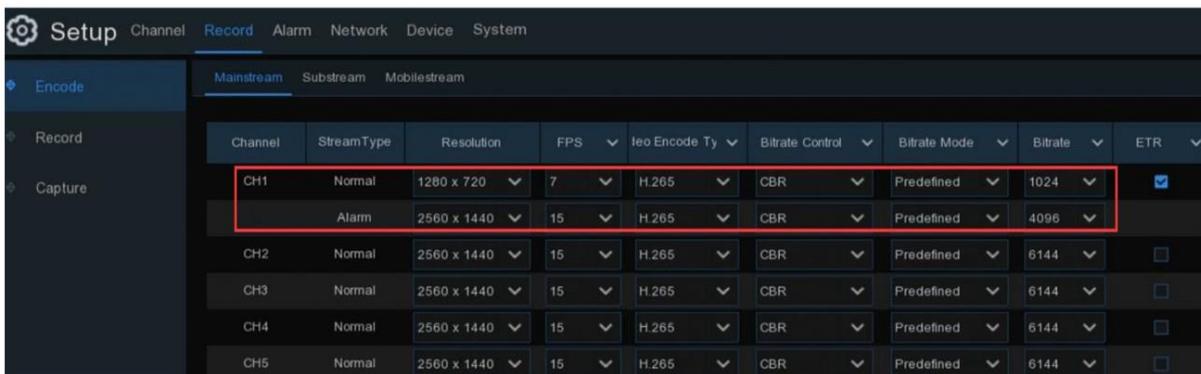
When Event triggered Recording (ETR) function is enabled it allows you to choose a lower resolution for normal recording and a higher resolution for alarm triggered recording. It will then record based on the resolution, frame rate and bitrate specifications you have selected. This can help to save hard drive storage.

Instructions:

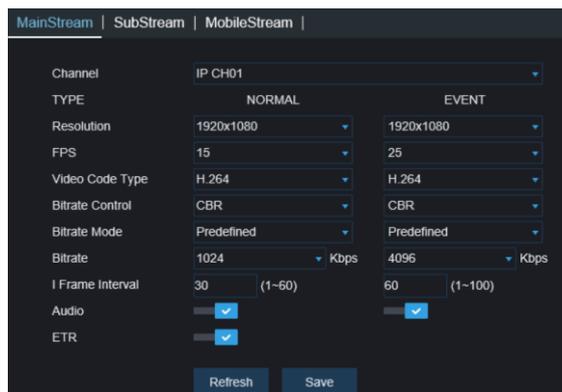
1. On the NVR Click **Setup**—**Record**—**Encode**, enter into the interface of Mainstream, enable **ETR** option



- After ETR is enabled, the channel will have an additional setting for **Alarm** recording, example below for CH1. Save settings



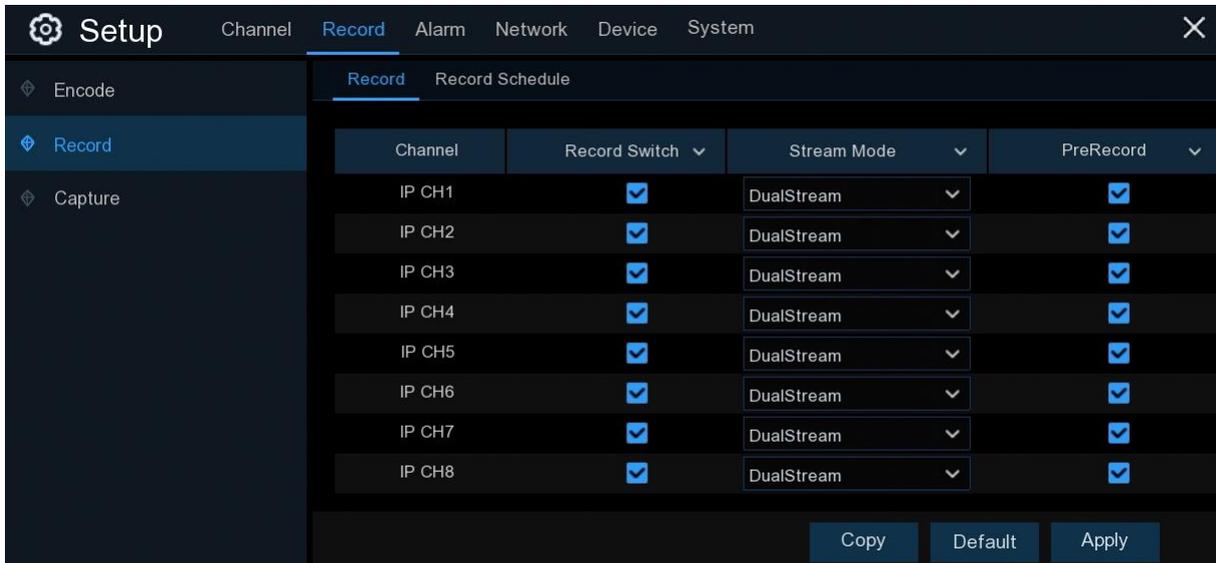
- When the channel triggers the alarm, the main stream recording will record based on the setting parameters of the "Alarm". The following are the video file codec information saved in the status of no alarm triggered (normal) and with alarm triggered (event).



## 5.2.2 Record

This menu allows you to configure the channel recording parameters.

### 5.2.2.1 Record



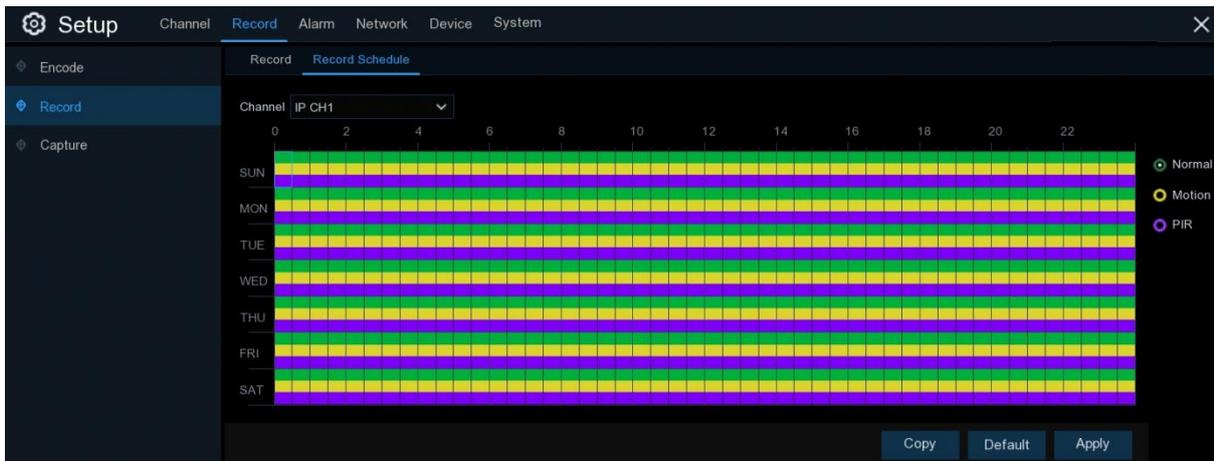
**Record Switch:** Check to enable the recording in this channel.

**Stream Mode:** Choose the recording quality. If you choose Dualstream, the system will record in both Mainstream & Substream.

**PreRecord:** If this option is enabled, the NVR starts recording a few seconds before an alarm event occurs. Use this option if your primary recording type is motion or I/O alarm based.

### 5.2.2.2 Record Schedule

This menu allows you to specify when the NVR records video and defines the recording mode for each channel. The recording schedule lets you set up a schedule like, daily and hourly by normal (continuous) recording, motion recording, I/O alarm recording & PIR recording (if your NVR supports). To set the recording mode, click first on the mode radio button (Normal, Motion, IO, PIR), then drag the cursor to mark the slots. The recording schedule is valid only for one channel. If you want to use the same recording schedule for other channels, use **Copy** function. Click **Apply** to save your settings.



**Channel:** Select the channel to set its recording parameters.

**Normal:** When the time slot is marked green, this indicates the channel performs normal recording for that time slot.

**Motion:** When the time slot is marked yellow, this indicates the channel records only when a motion is detected during that time slot.

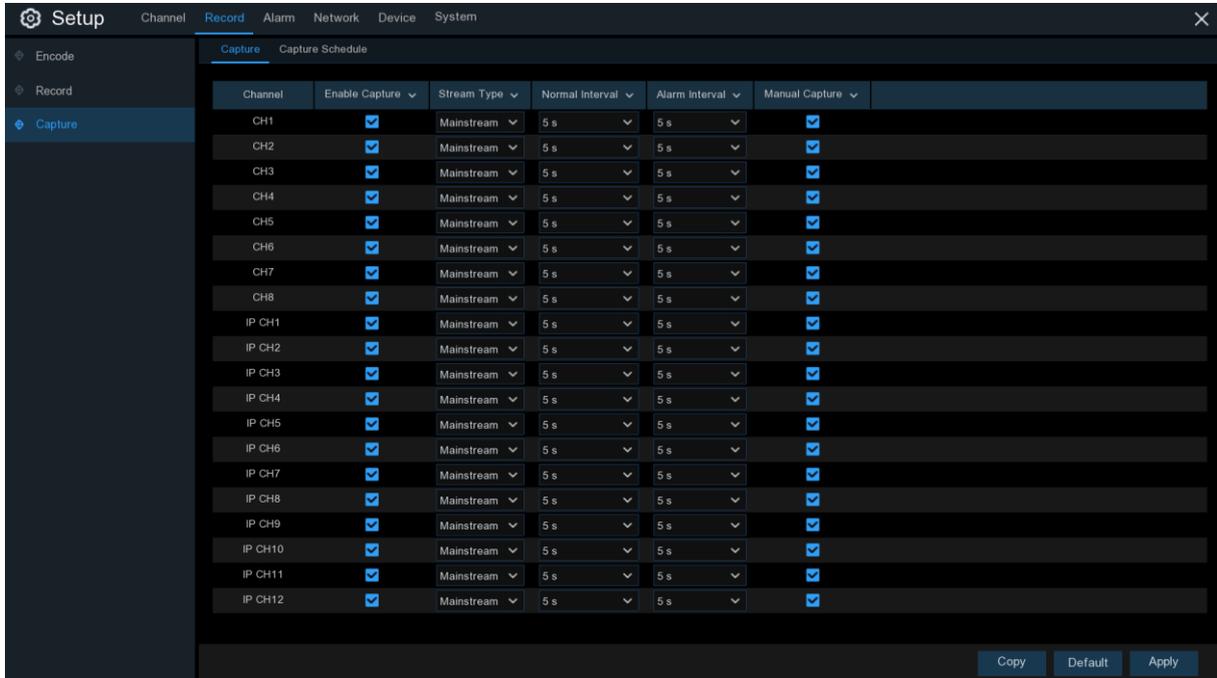
**IO:** When the time slot is marked red, this indicates the channel records only when the sensor is triggered during that time slot.

**No Record:** A time slot marked black means that there is no recording scheduled for the time slot.

## 5.2.3 Capture

This menu allows you to configure the image capture function.

### 5.2.3.1 Capture



**Enable Capture:** Enable or disable automatic capturing on the channel.

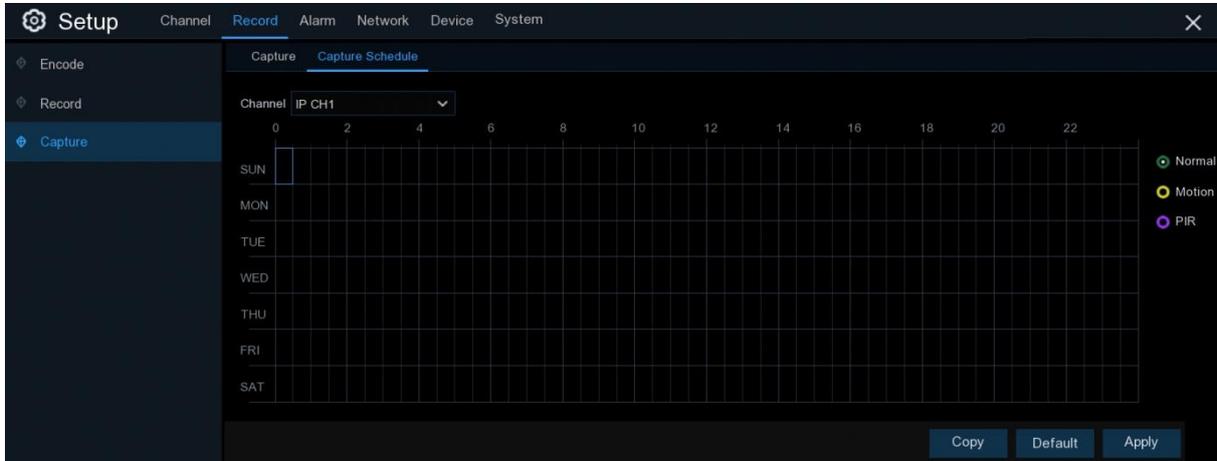
**Stream Type:** Select the image resolution by mainstream or substream.

**Normal Interval:** Time interval to capture an image in normal recording.

**Alarm Interval:** Time interval to capture an image when motion, IO alarm or PIR is triggered

**Manual Capture:** Enable or disable manual capture in the channel

### 5.2.3.2 Capture Schedule



**Channel:** Select the channel to set its capture parameters.

**Normal:** When the time slot is marked green, this indicates the channel performs normal capture for that time slot.

**Motion:** When the time slot is marked yellow, this indicates the channel capture images only when a motion is detected during that time slot.

**IO:** When the time slot is marked red, this indicates the channel capture images only when the sensor is triggered during that time slot.

**No Capture:** A time slot marked black means that it won't capture any images for the time slot, but you can manually capture images if you enable the manual capture function in the channel.

## 5.3 Alarm

In this section, you can configure the alarm parameters.

### 5.3.1 Motion

Operation is same as [5.1.6 Motion](#)

### 5.3.2 I/O

This is an optional function, it will appear if your NVR supports sensor I/O (NR532XA), and you connect external sensor I/O alarm devices to work with the NVR.

Alarm In	Alarm Type	Buzzer	Alarm Out	Latch Time	Record	Post Recording	Show Message	Send Email	Full Screen
IO-1	Normally-Open	Disable	<input type="checkbox"/>	10 s	ON	30 s	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
IO-2	Normally-Open	Disable	<input type="checkbox"/>	10 s	ON	30 s	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
IO-3	Normally-Open	Disable	<input type="checkbox"/>	10 s	ON	30 s	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
IO-4	Normally-Open	Disable	<input type="checkbox"/>	10 s	ON	30 s	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
IO-5	Normally-Open	Disable	<input type="checkbox"/>	10 s	ON	30 s	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
IO-6	Normally-Open	Disable	<input type="checkbox"/>	10 s	ON	30 s	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
IO-7	Normally-Open	Disable	<input type="checkbox"/>	10 s	ON	30 s	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
IO-8	Normally-Open	Disable	<input type="checkbox"/>	10 s	ON	30 s	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

**Alarm In:** I/O channel.

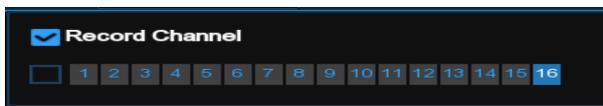
**Alarm Type:** There are 3 types for your choice: Normally-Open, Normally-Close, and OFF. Choose the one to match your sensor type, or choose OFF to close the sensor trigger function.

**Buzzer:** The NVR can use its internal buzzer to emit an alarm tone. You can set the buzzer duration in seconds when a sensor is triggered.

**Alarm out:** Tick to enable external alarm device to emit an alarm tone when a sensor is triggered.

**Latch Time:** you can set how long the buzzer will sound when external sensor is triggered (10s, 20s, 40s, and 60s).

**Record:** Click icon and choose which channel(s) you want to record when the motion detection is triggered.



**Post Recording:** You can set how long alarm record will last when alarm ends (30s, 1minutes, 2minutes, 5minutes).

**Show Message:** Display the alarm messages on the screen when sensor is triggered.

**Send Email:** Set to send email to specified email when sensor is triggered.

**Full Screen:** When sensor is triggered, the corresponding channel will be switched to the full screen mode.

**FTP Upload:** To upload alarm images to FTP server when I/O alarm is triggered. To enable FTP, please view [5.4.4 FTP](#).

### 5.3.3 PTZ Linkage

If you have connected PTZ cameras, you can set the linkage between PTZ cameras and Motion Alarm and/or external I/O sensor alarm. With the linkage function, you can turn your PTZ cameras focus to the preset point when a motion or I/O alarm happens.

Channel	Switch	Motion	IO	PTZ1	PTZ2	PTZ3	PTZ4
CH17	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	ON	ON	ON	ON
CH18	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	ON	ON	ON	ON
CH19	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	ON	ON	ON	ON
CH20	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	ON	ON	ON	ON
CH21	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	ON	ON	ON	ON
CH22	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	ON	ON	ON	ON

**Switch:** Enable or disable the PTZ linkage function.

**Motion:** Motion detection alarm will trigger the PTZ linkage function it is checked.

**IO:** IO alarm will trigger the PTZ linkage function it is checked.

**PTZ:** Click icon to associate the PTZ cameras with preset points. View preset point at [4.3.2](#)

[PTZ control.](#)

### 5.3.4 Exception

This menu allows you to set the type of events that you want the NVR to inform you.

Event Type	Switch	Buzzer	Show Message	Send Email
No Space on Disk	<input checked="" type="checkbox"/>	10 s	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>
Disk Error	<input checked="" type="checkbox"/>	10 s	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>
Video Loss	<input checked="" type="checkbox"/>	10 s	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>

**Event Type:** Select the event type from below options:

- **No Space on Disk:** When an HDD is full.
- **Disk Error:** If the HDD is not detected properly.
- **Video Loss:** If a camera is not connected properly.

**Switch:** Check the box to enable the monitoring of the event.

**Buzzer:** Set the buzzer duration when the event occurs (Off/10s/20s/40s/60s). To disable buzzer, select **OFF**.

**Latch Time:** This is an optional function. Determine how long the external alarm device to sound (10s, 20s, 40s, 60s) if your NVR support to connect external alarm device.

**Alarm Out:** This is an optional function (NR532XA). Click to enable the external alarm device to sound. This is an optional function.

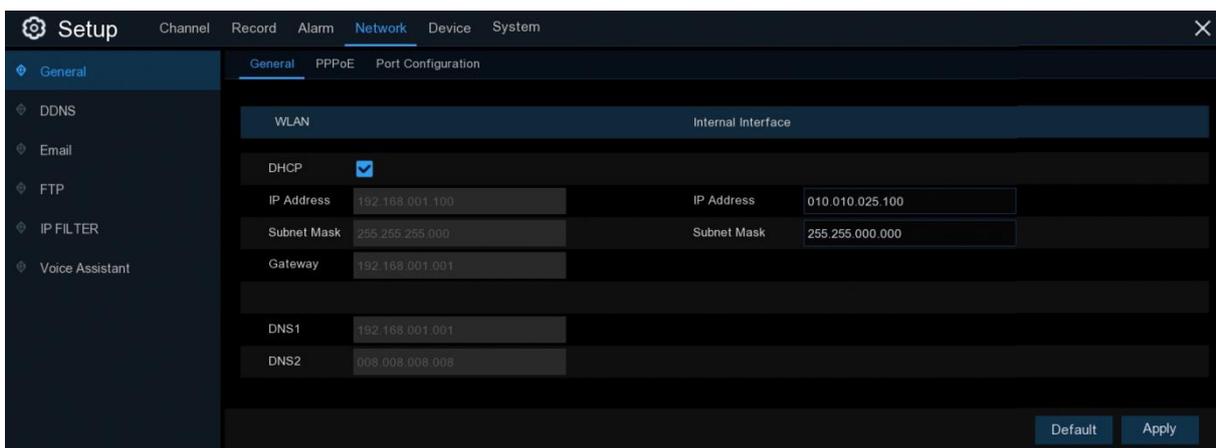
**Show Message:** Check the box to display a message on the screen when No Space on Disk, Disk Error, or Video Loss event happens.

**Send Email:** Let the NVR to send you an auto-email when an event occurs.

## 5.4 Network

This menu allows you to configure network parameters, such as PPPoE, DHCP. The most common types are DHCP. Most probably your network type is DHCP, unless the network is manually addressed. If you need an authentication user name and password to the Internet, then choose PPPoE.

### 5.4.1 General



If you connect to a router that uses DHCP, please check the **DHCP** box. The router will assign automatically all the network parameters for your NVR. Unless the network is manually addressed below parameters:

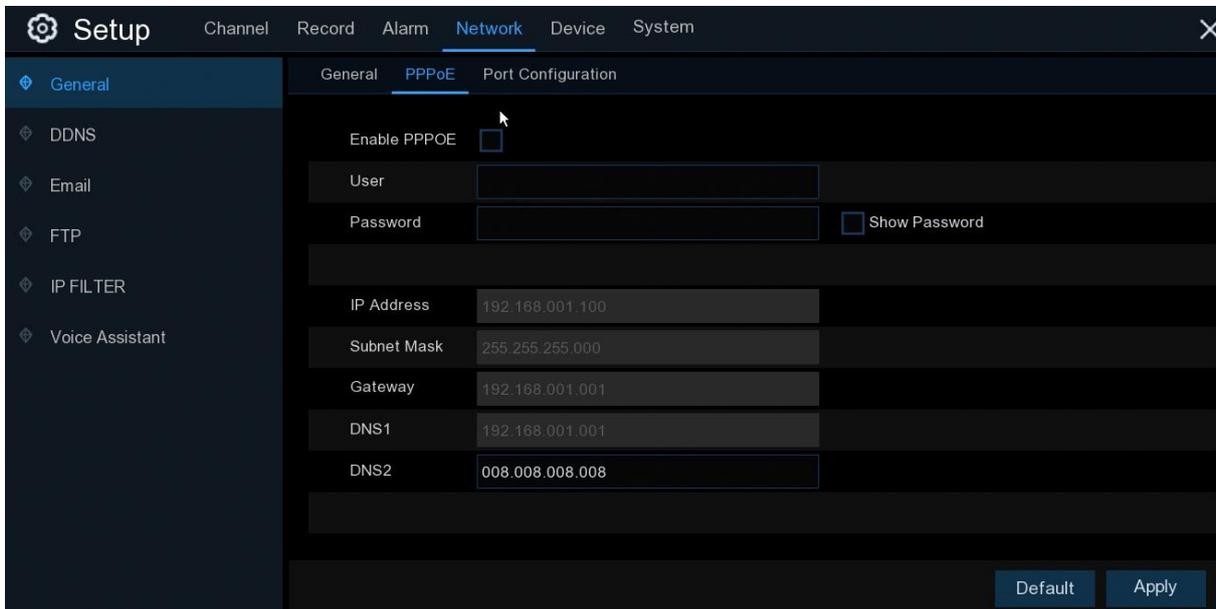
**IP Address:** The IP address identifies the NVR in the network. It consists of four groups of numbers between 0 to 255, separated by periods. For example, “192.168.001.100”.

**Subnet Mask:** Subnet mask is a network parameter which defines a range of IP addresses that can be used in a network. If IP address is like a street where you live then subnet mask is like a neighborhood. The subnet address also consists of four groups of numbers, separated by periods. For example, “255.255.000.000”.

**Gateway:** This address allows the NVR to access the Internet. The format of the **Gateway** address is the same as the **IP Address**. For example, “192.168.001.001”.

**DNS1/DNS2:** DNS1 is the primary DNS server and DNS2 is a backup DNS server. Usually should be enough just to enter the DNS1 server address.

### 5.4.1.2 PPPoE

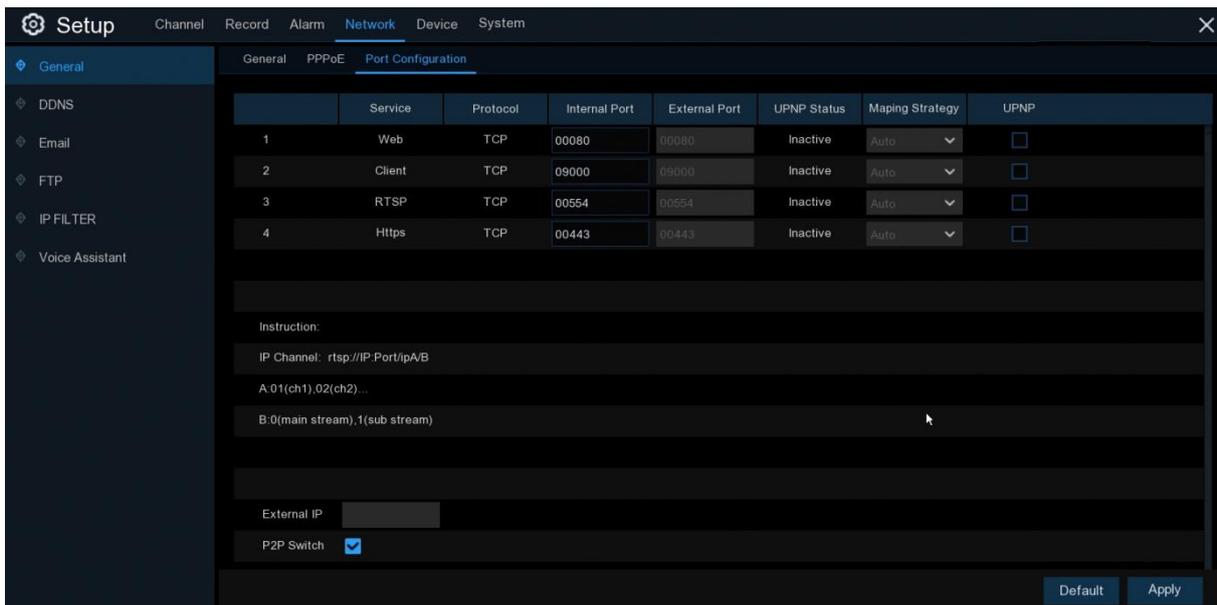


This is an advanced protocol that allows the NVR to connect to the network more directly via DSL modem.

Check the “Enable PPPOE” box, and then enter the User name & Password of the PPPoE.

Click **Apply** to save, system will reboot to active the PPPoE setting.

### 5.4.1.3 Port Configuration



**Web Port:** This is the port that you will use to log in remotely to the NVR (e.g. using the Web Client). If the default port 80 is already taken by other applications, please change it.

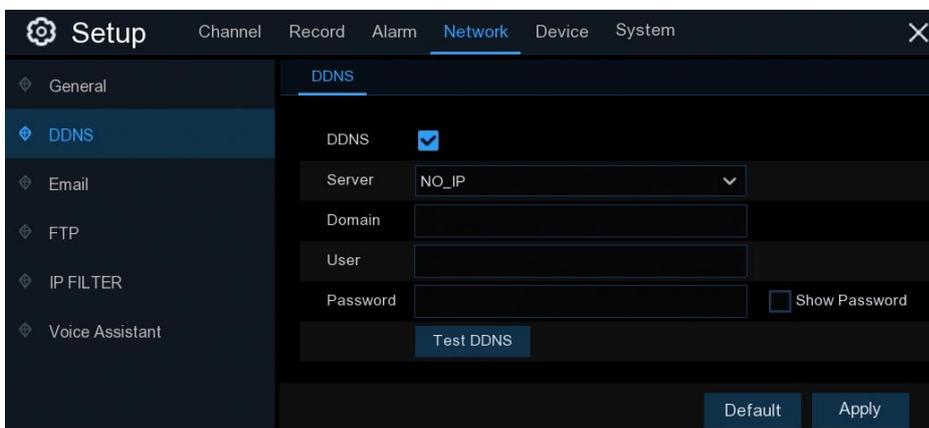
**Client Port:** This is the port that the NVR will use to send information through. If the default port 9000 is already taken by other applications, please change it.

**RTSP Port:** Default is 554, if the default port 554 is already taken by other applications, please change it.

**UPnP:** If you want to log in remotely to the NVR using Web Client, you need to complete the port forwarding. Enable this option if your router supports the UPnP. You need to enable UPnP both, on NVR and router. In this case, you do not need to configure manually port forwarding on your router. If your router does not support UPnP, make sure the port forwarding is completed manually

### 5.4.2 DDNS

This menu allows you to configure DDNS settings. The DDNS provides a static address to simplify remote connection to your NVR. To use the DDNS, you first need to open an account on the DDNS service provider's web page.



**DDNS:** Check to enable DDNS.

**Server:** Select the preferred DDNS server (DDNS\_3322, DYNDNS, NO\_IP, CHANGEIP, DNSEXIT).

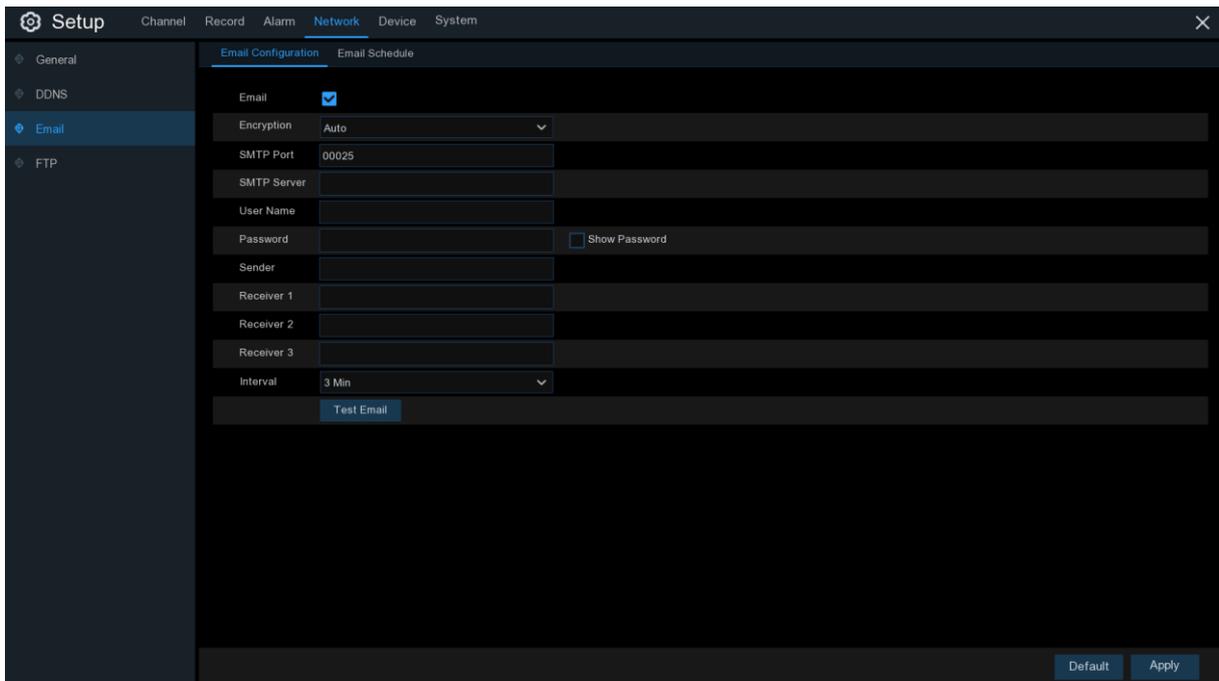
**Domain:** Enter the domain name you created on the DDNS service provider’s web page. This will be the address you type in the URL box when you want to connect remotely to the NVR via PC. For example: NVR.no-ip.org.

**User/Password:** Enter the user name and password you obtained when creating an account on the DDNS service provider’s web page.

After all parameters are entered, click **Test DDNS** to test the DDNS settings. If the test result is “Network is unreachable or DNS is incorrect”, please check whether the network works fine, or the DDNS information is correct or not.

### 5.4.3 Email

This menu allows you to configure email settings. Please complete these settings if you want to receive the system notifications on your email when an alarm is triggered, HDD becomes full, HDD is in error state, or Video Loss occurs.



### 5.4.3.1 Email Configuration

**Email:** Check to enable.

**Encryption:** Enable if your email server requires the SSL or TLS verification. If you are not sure, set to be **Auto**.

**SMTP Port:** Enter the SMTP port of your email server.

**SMTP Server:** Enter the SMTP server address of your email.

**User Name:** Enter your email address.

**Password:** Enter the password of your email.

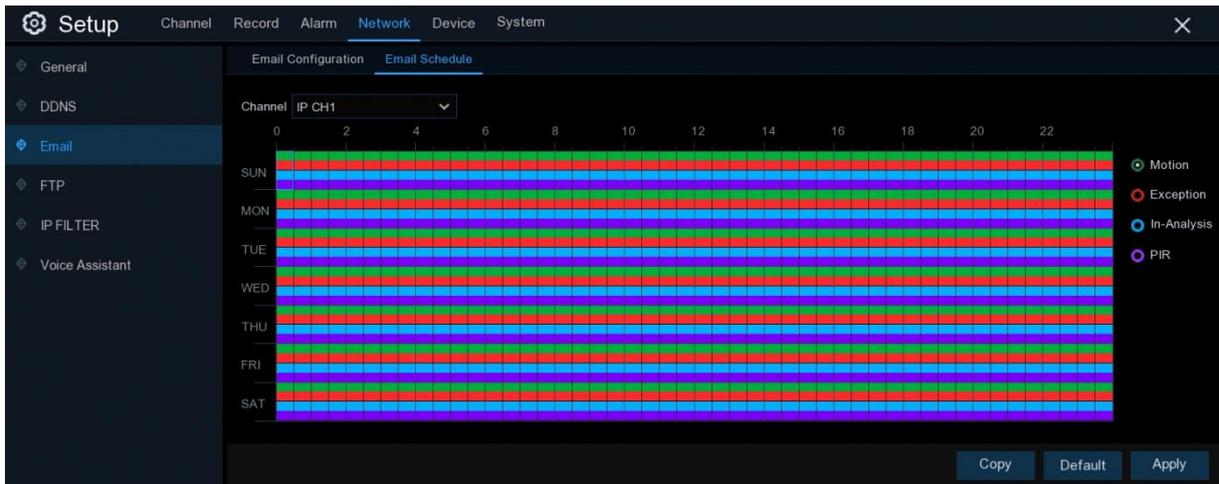
**Receiver 1~3:** Enter the email address where you want to receive the event notifications from the NVR.

**Interval:** Configure the length of the time interval between the notification emails from the NVR.

To make sure all settings are correct, click **Test Email**. The system sends an automated email message to your inbox. If you received the test email, it means the configuration parameters are correct.

### 5.4.3.2 Email Schedule

You need to configure the schedule to fully implement the Email notification.



The colour codes on email schedule have the following meanings:

**Green:** Slot for Motion detection.

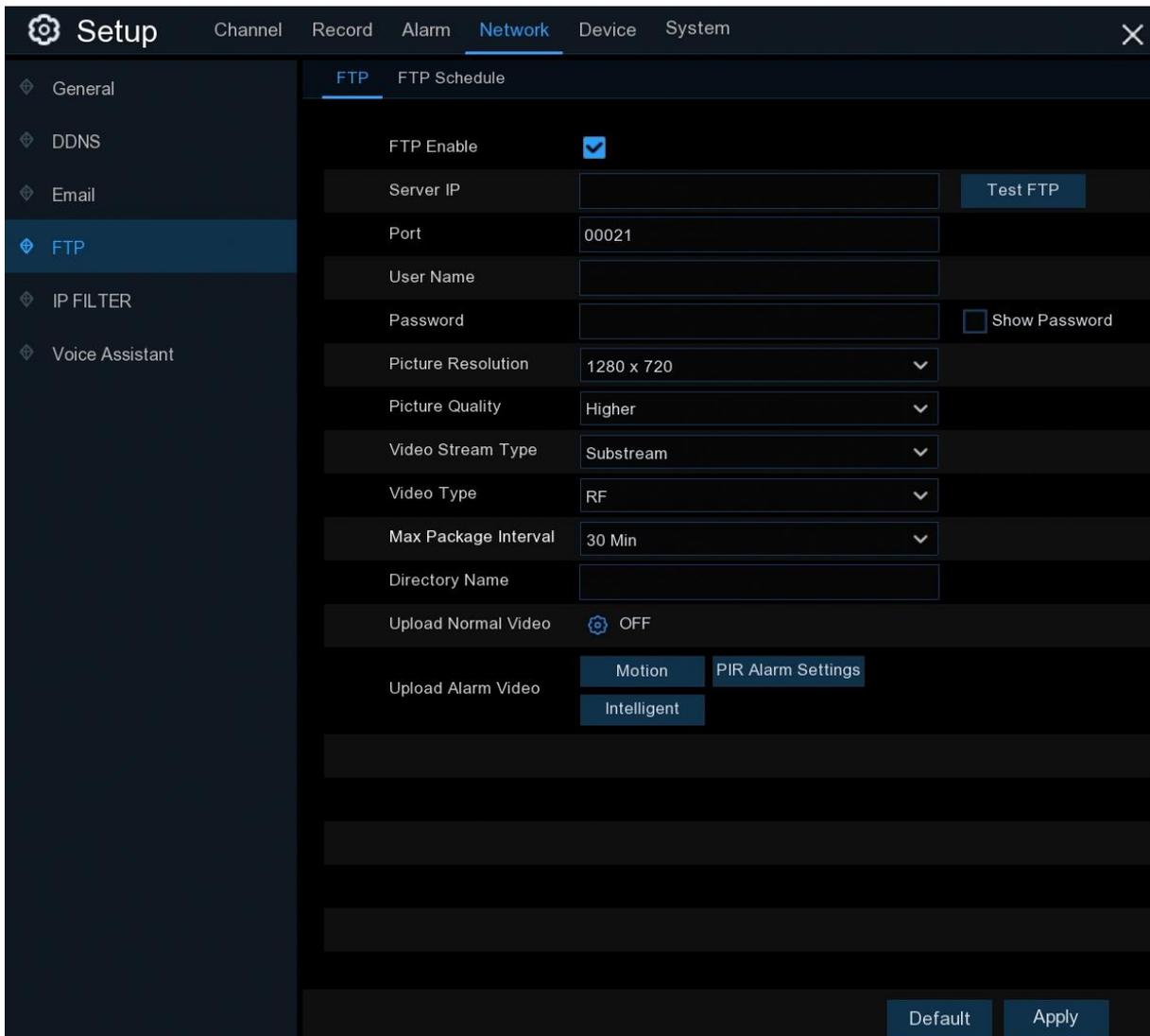
**Yellow:** Slot for I/O Alarm (optional).

**Red:** Slot for Exception (HDD full, HDD error, or Video Loss).

**Blue:** Slot for Intelligent Analysis detection.

### 5.4.4 FTP

This menu allows you to enable FTP function to view and load captured snapshots from NVR to your storage device over FTP.



**FTP Enable:** Click to enable FTP function.

**Server IP:** Enter your FTP server IP address or domain name.

**Port:** Enter the FTP port for file exchanges.

**Name/ Password:** Enter your FTP server user name and password.

**Directory Name:** Enter the default directory name for the FTP file exchanges.

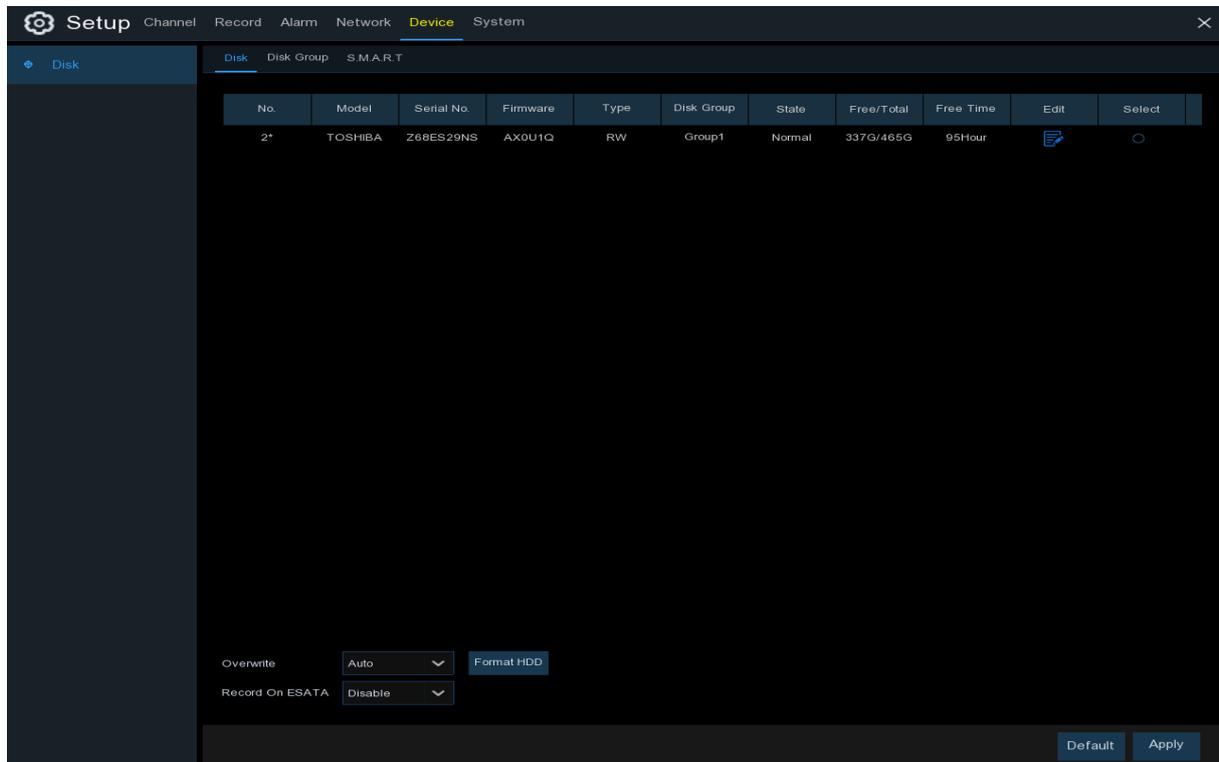
**Test FTP:** Click to test the FTP settings.

## 5. 5 Device

In this section, you can configure the internal HDD function.

## 5. 5.1 Disk

This menu allows you to check & configure the internal HDD(s). You need to format the HDD only at the first startup and if you replace a new HDD.

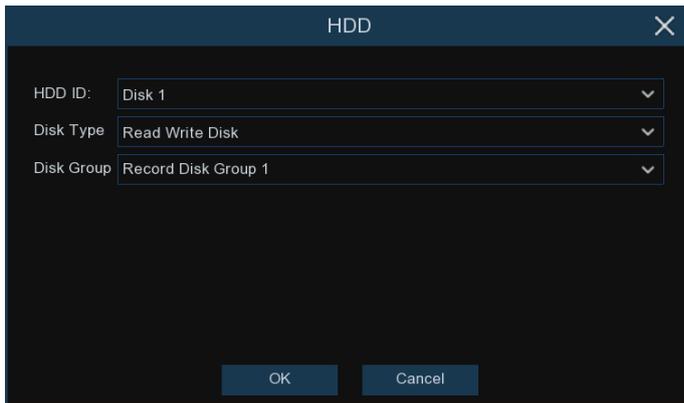


**Format HDD:** Select the HDD you want to format and then click **Format HDD**. To start formatting, you need to enter your user name and password and then click **OK** to confirm to continue formatting.

**Overwrite:** Use this option to overwrite the old recordings on the HDD when the HDD is full. For example, if you choose the option 7 days then only the last 7 days recordings are kept on the HDD. To prevent overwriting any old recordings, select **OFF**. If you have disabled this function, please check the HDD status regularly, to make sure the HDD is not full. Recording will be stopped if HDD is full.

**Record on ESATA:** This menu only displayed when your NVR is coming with an e-SATA port on the rear panel. It will allow you to record the video to external e-SATA HDD to enhance your HDD capacity. If the e-SATA recording function is enabled, e-SATA backup function will be disabled.

If your NVR supports to install multiple HDDs, the edit icon appears in your system, you can click it to edit the HDD as below:



**Disk Type:** Read-write, read-only, and redundant.

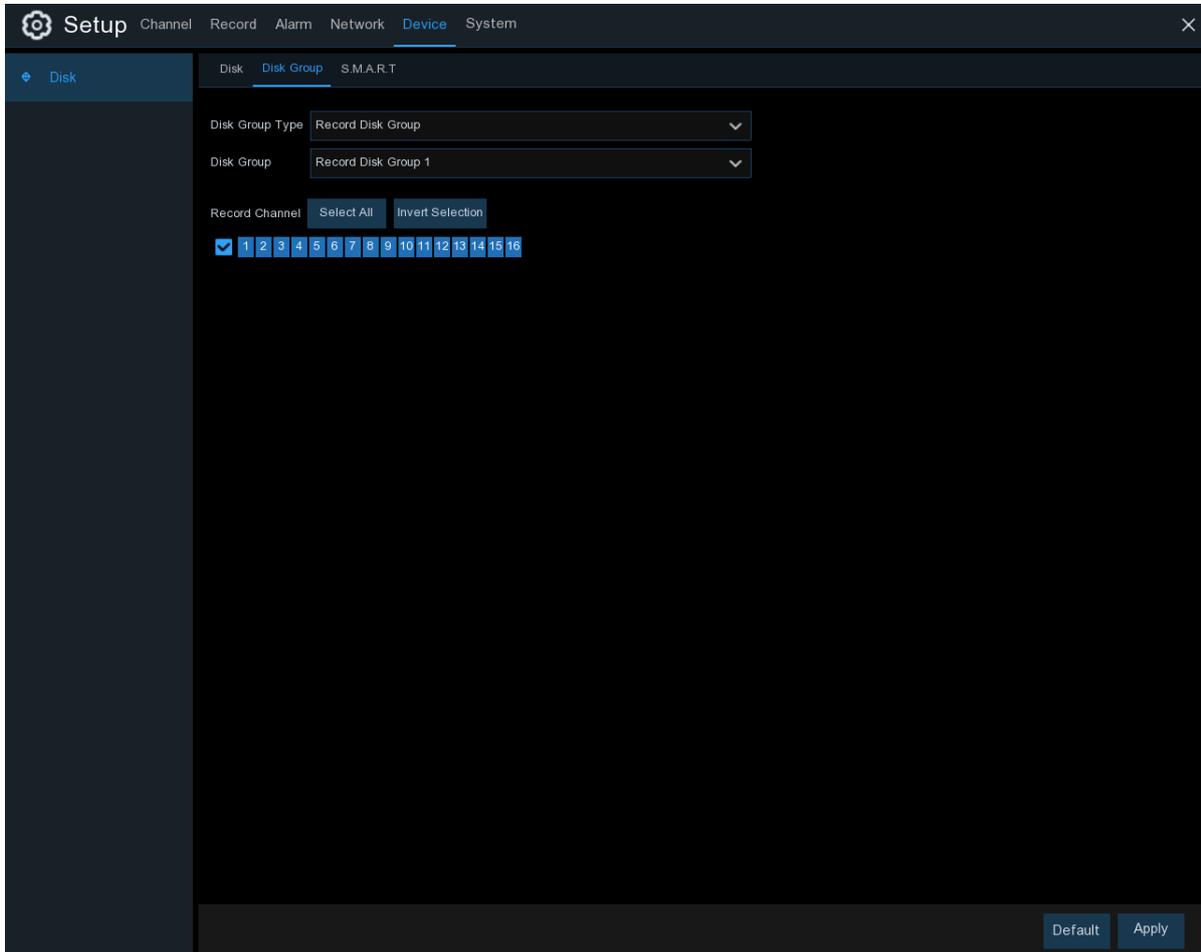
Read-write mode is the normal status for a HDD to save recording or search recording to play.

To prevent important video data from being overwritten during cyclic recording, the HDD can be set as **Read-only** mode. New recording will be not able to save into this read-only HDD. You can still search recording from this read-only HDD to play.

A **Redundant** HDD can be used to automatically backup video footage on the recording (read-write) hard drive. When a redundant HDD is set, the system can be set to record cameras in parallel to both the recording hard drive and the redundant hard drive in case of hard drive failure.

## 5.5.2 Disk Group

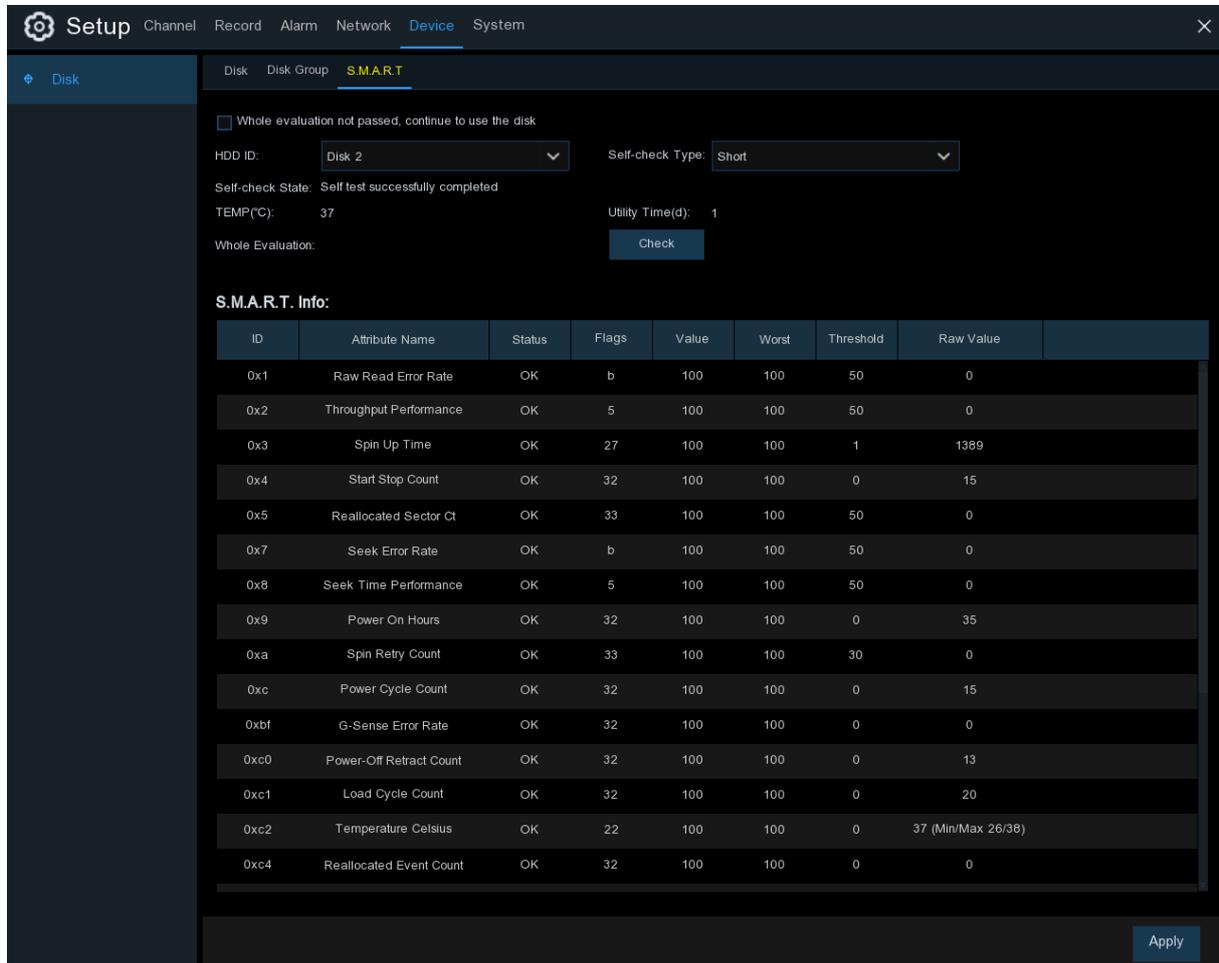
If your NVR supports to install multiple HDDs, you can configure the HDD to be different groups. HDD groups allow you to balance recordings across multiple hard drives. For example, you can record channels 1~4 to one hard drive and 5~8 to a second hard drive. This can reduce the amount of wear on the hard drives and may extend the life of the hard drives.



1. Use the dropdown next to **Disk Group Type** to select the type of group to configure.
2. Use the dropdown next to **Disk Group** to select the specific group within the selected group type.
3. Click the numbered boxes representing channels to record channels to HDDs in the selected group.
4. Click **Apply** to save.

### 5. 5.3 SMART

This function can be used to display technical information on the hard drive installed inside your NVR. You can also perform a test (there are three types available) to evaluate and detect potential drive errors.



**Whole Evaluation not passed, continue to use the disk:** If for some reason the hard drive has developed a fault (such as one or more bad sectors), you can instruct your NVR to continue saving to the drive.

**Self-check Type:** There are three types available:

**Short:** This test verifies major components of the hard drive such as read/write heads, electronics and internal memory.

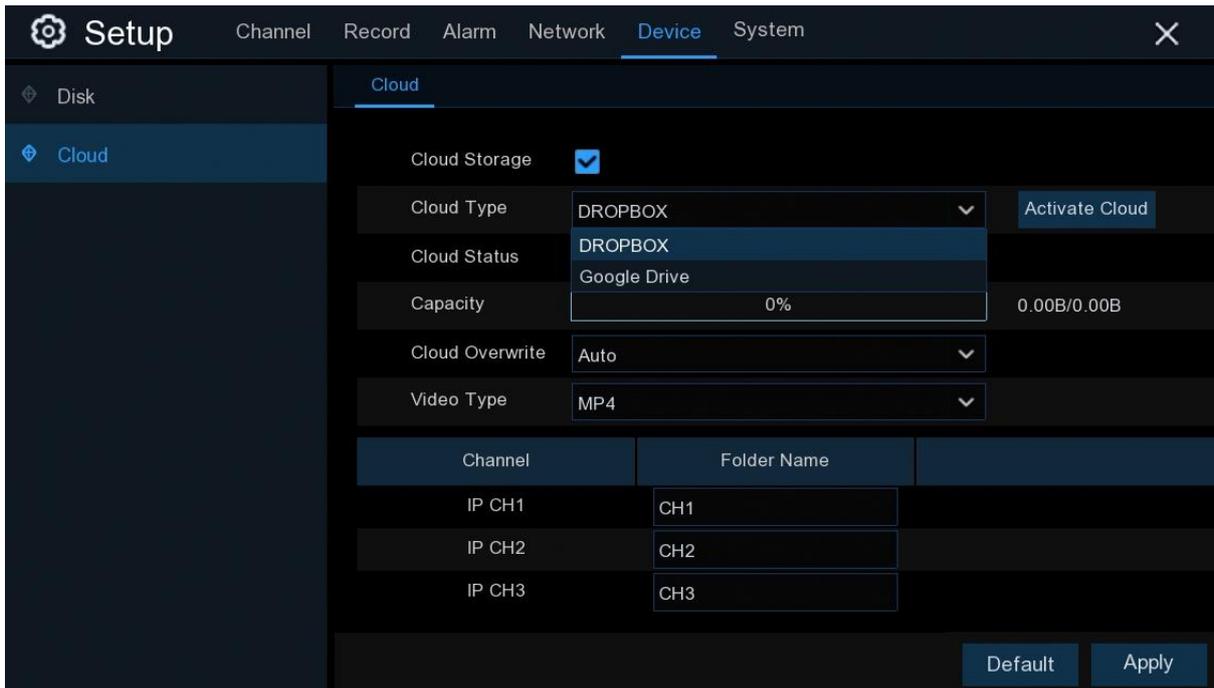
**Long:** This is a longer test that verifies the above as well as performing a surface scan to reveal problematic areas (if any) and forces bad sector relocation

**Conveyance:** This is a very quick test that verifies the mechanical parts of the hard drive are working.

**Note:** When performing a test, your NVR will continue to work as normal. If an HDD S.M.A.R.T error found, the HDD can be continued to use, but there will be a risk to lose recording data. It is recommended to replace a new HDD.

### 5. 5.4 Cloud Storage

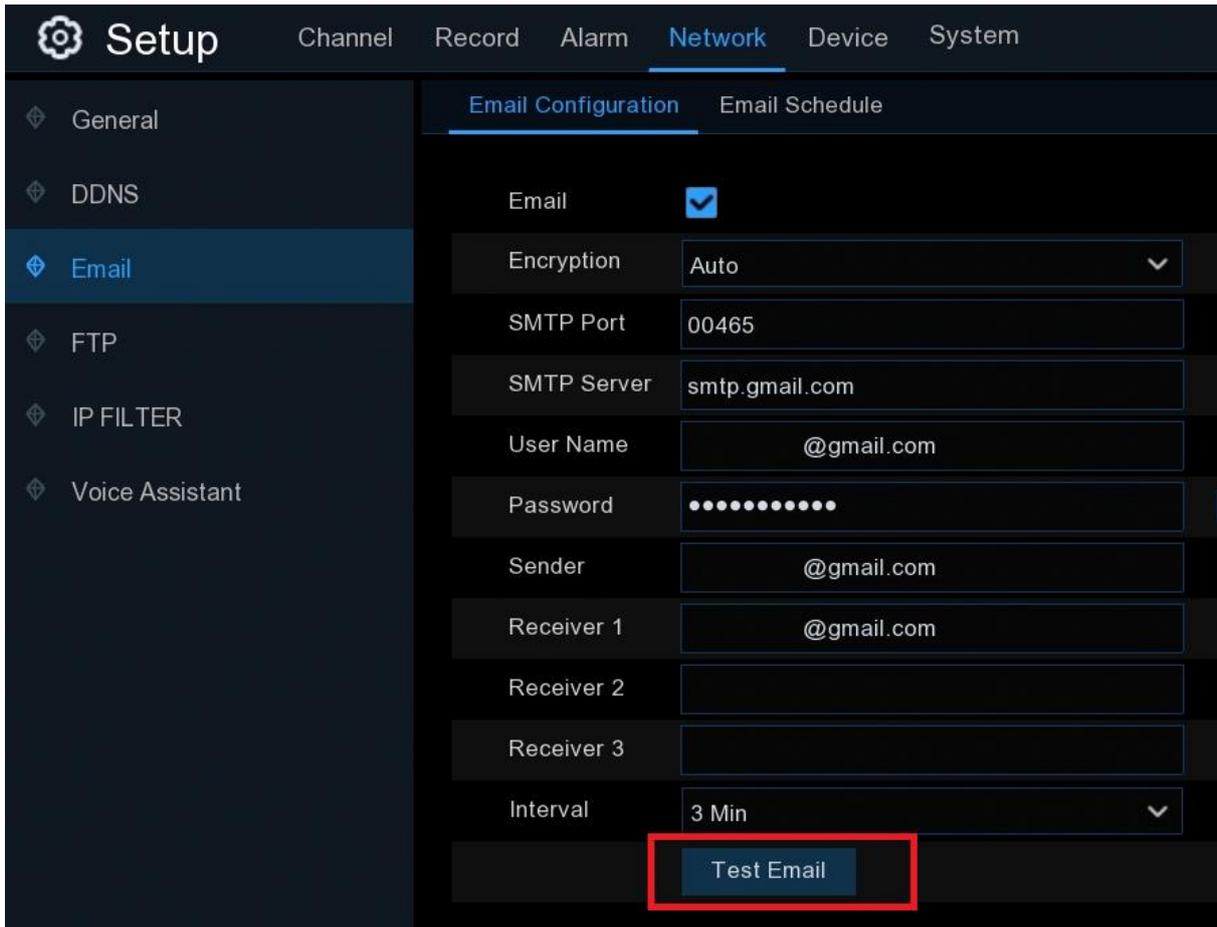
Dropbox or Google Drive are available Cloud storage options. Ensure that you have your email address configured in Setup – Network – Email before trying to enable cloud storage



**Cloud Type:** Select Dropbox or Google Drive. Click “Activate Cloud”



Error “SMTP server cannot be empty! Please enter” will appear if you have not configured your email address in Setup – Network – Email



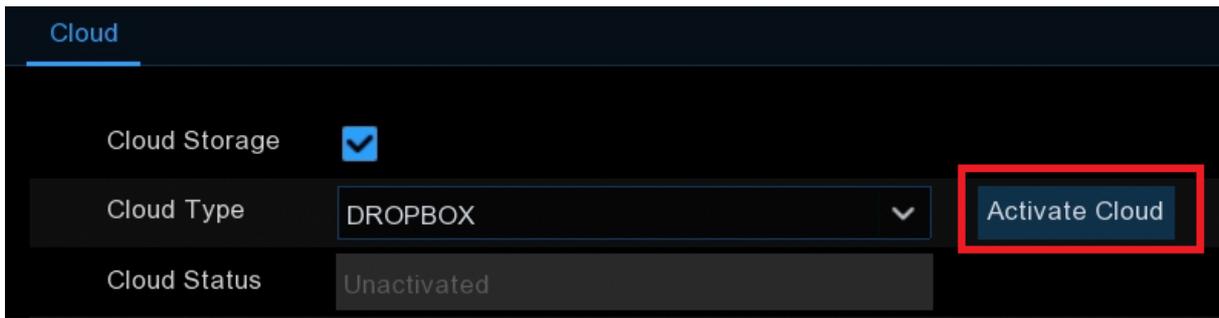
If you are using a Gmail account and all the settings you entered are correct and you haven't received an email or you have received an email from Google with "Sign-in attempt was blocked" you will need to go to [myaccount.google.com/security](https://myaccount.google.com/security) and set "Allow less secure apps" to "ON".

## ← Less secure app access

Some apps and devices use less secure sign-in technology, which makes your account vulnerable. You can turn off access for these apps, which we recommend, or turn it on if you want to use them despite the risks. Google will automatically turn this setting OFF if it's not being used. [Learn more](#)



Once less secure app access has been turned on. Click "Test Email" again from NVR. If you receive your test email then continue the cloud activation process.

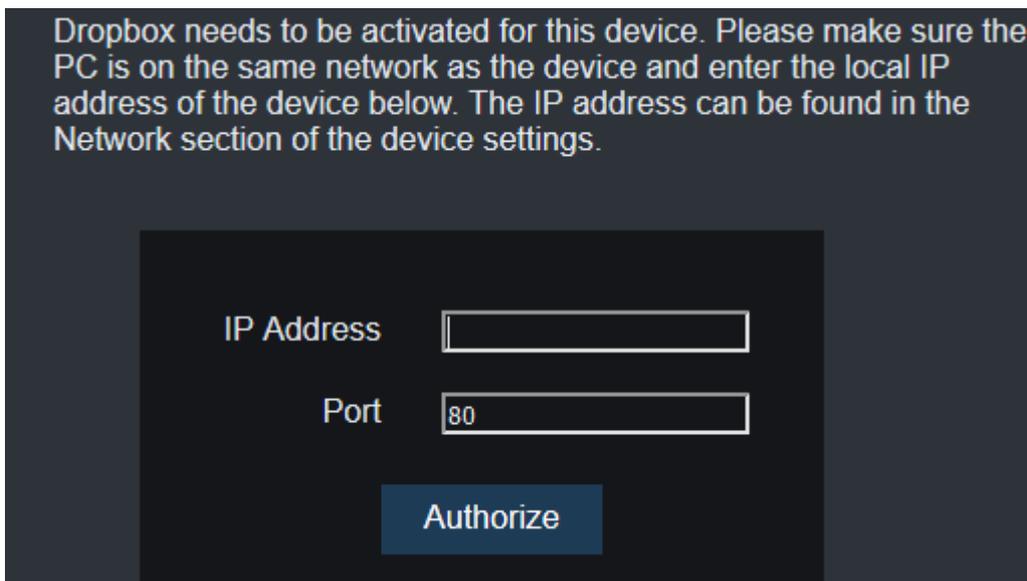


Click Activate Cloud

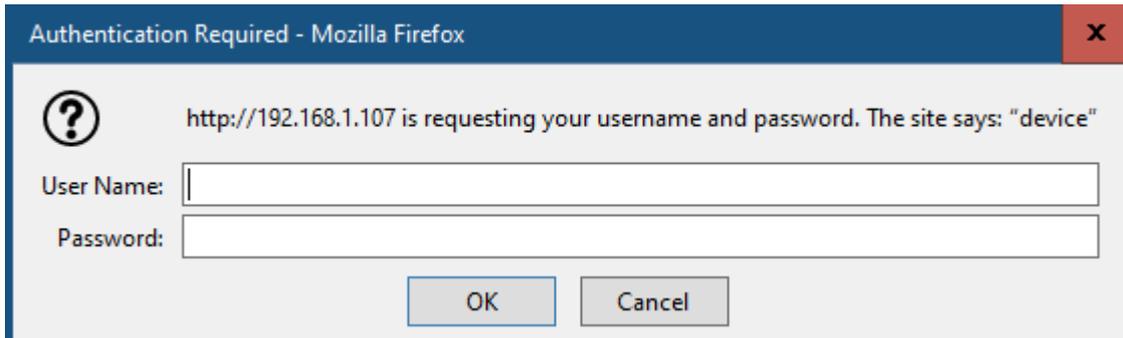


Click on the link sent to your email.

Login to Dropbox. You will receive the message below. Enter the IP address of the NVR (Located from Setup – Network - General). Click “Authorize”



**Authentication Required:** Enter the username and password of your NVR. Click OK



Authorized success! Return [Dropbox](#).  
(Automatic jump after 1 seconds)

**Cloud:** Click “Activate Cloud”.

**Cloud Status:** “Activated” will appear if successful

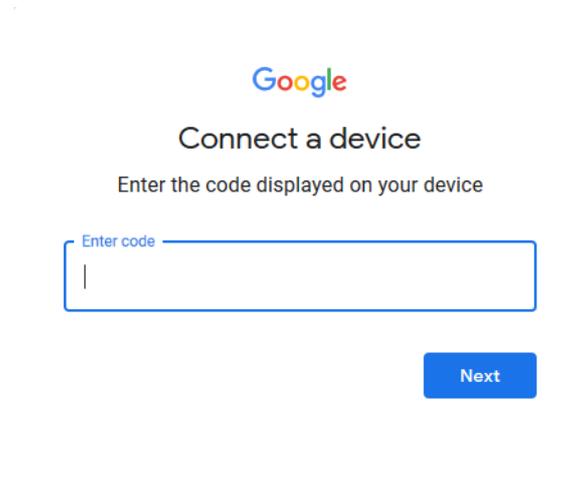
Cloud

Cloud Storage	<input checked="" type="checkbox"/>	
Cloud Type	DROPBOX	<a href="#">Activate Cloud</a>
Cloud Status	Activated	
Capacity	22%	457.22MB/2.00GB
Cloud Overwrite	Auto	
Video Type	MP4	

Channel	Folder Name
IP CH1	CH1
IP CH2	CH2
IP CH3	CH3

For Google Drive copy the activation code sent to your email and click on the link

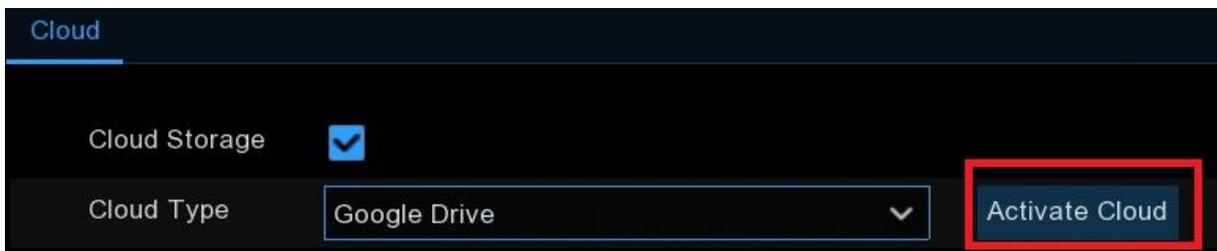
<https://www.google.com/device>



Follow the prompts to authorize Google Drive connection to the NVR

**Cloud:** Click “Activate Cloud”.

**Cloud Status:** “Activated” will appear if successful

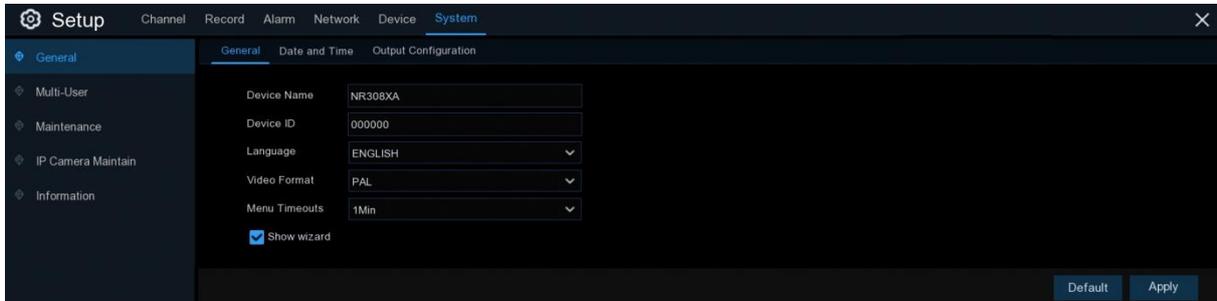


NOTE: Maximum of 2 channels are selectable at any time when selecting “Video to Cloud”. Please refer to **5.1.9 Alarm**.

## 5.6 System

Change general system information such as date, time and region, edit passwords and permissions.

### 5.6.1 General



**Device Name:** Enter the desired name for your NVR. The name can include both letters and numbers.

**Device ID:** Enter the desired ID for your NVR. The device ID is used to identify the NVR, and can only be composed of numbers. For example, 2pcs NVRs are installed in the same place, the Device ID is 000000 for one of the NVRs, and 111111 for another NVR. When you want to operate the NVR with a remote controller, both of the NVR may receive the signal from controller & act at the same time. If you want to control only the NVR with ID 111111, you can input the Device ID 111111 in login page with remote controller for further operations.

**Language:** Select a language you would like the system menus to be displayed in. Multiple languages are available.

**Video Format:** Select the correct video standard for your region.

**Menu Timeouts:** Click the drop-down menu to select the time your NVR will exit the Main Menu when idle. You can also disable this by selecting "OFF" (password protection will be temporarily disabled).

**Show Wizard:** Click the checkbox if you would like to display the Startup Wizard each time you turn on or reboot your NVR.

## 5.6.2 Date and Time

The screenshot shows the 'Date and Time' configuration page. The interface includes a sidebar with navigation options like 'General', 'Multi-User', 'Maintenance', 'IP Camera Maintain', and 'Information'. The main content area is divided into sections: 'Date and Time', 'NTP Settings', and 'DST Settings'. Each section contains various input fields, dropdown menus, and checkboxes. The 'Date and Time' section is currently active and shows the following values: Date: 29/03/2020, Time: 14:17:12, Date Format: DD/MM/YYYY, Time Format: 24Hour, and Time Zone: GMT+10:00. The 'NTP Settings' section has 'Enable NTP' unchecked and 'Server Address' set to pool.ntp.org. The 'DST Settings' section has 'Enable DST' unchecked, 'Time Offset' set to 1Hour, 'DST Mode' set to Week, and 'Start Time' set to Oct. The 1st Sun. 02:00:00 and 'End Time' set to Apr. The 1st Sun. 03:00:00. Buttons for 'Default' and 'Apply' are located at the bottom right of the page.

### Date & Time

**Date:** Click the calendar icon to change the date.

**Time:** Click the dialogue box to change the time.

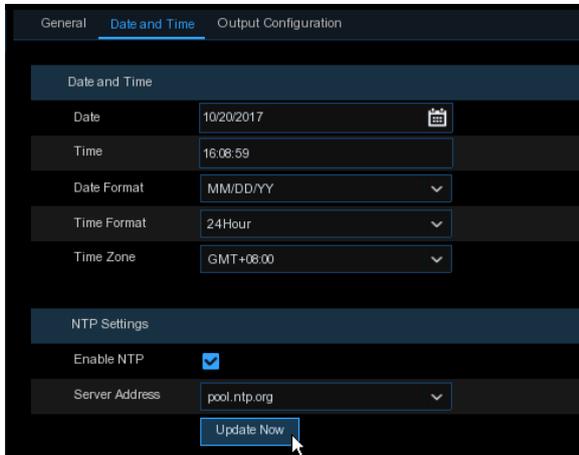
**Date Format:** Select the preferred date format.

**Time Format:** Select the preferred time format.

**Time Zone:** Select a time zone relevant to your region or city.

### 5.6.3 NTP Settings

The NTP (Network Time Protocol) function allows your NVR to automatically sync its clock with a time server. This gives it the ability to constantly have an accurate time setting (your NVR will periodically sync automatically).



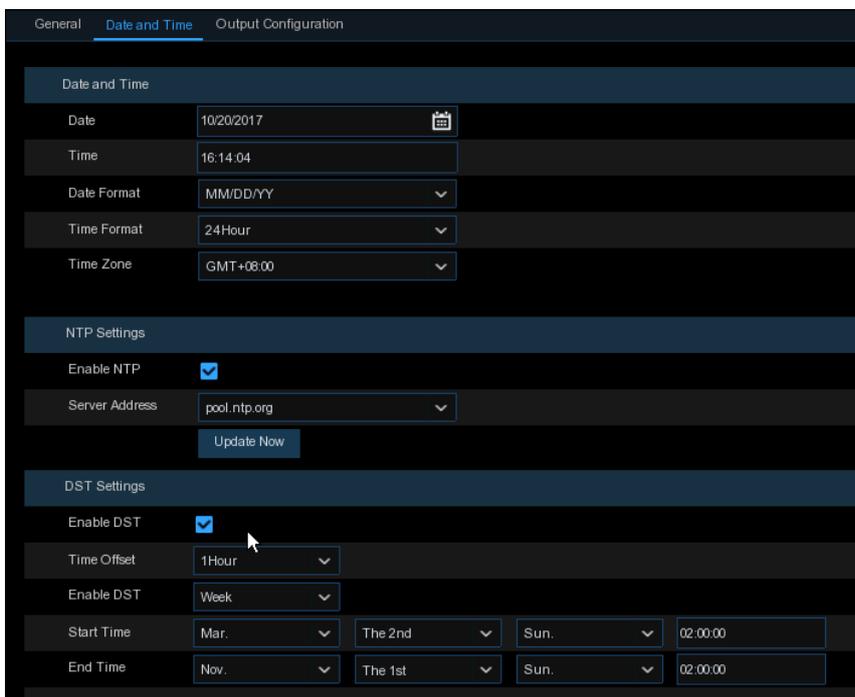
Check to enable the **NTP**, and select a **Server Address**, click Update Now to manually sync the date & time.

Click **Apply** to save your settings.

When NTP function is enabled, system will update the system time at 00:07:50 per day, or every time when the system is starting up.

### 5.6.4 DST Settings

The DST (Daylight Saving Time) function allows you to select the amount of time that Daylight Saving has increased by in your particular time zone or region.



**Enable DST:** If Daylight Saving applies to your time zone or region, check this option to enable.

**Time Offset:** Select the amount of time that Daylight Saving has increased by in your time zone.

This refers to the difference in minutes, between Coordinated Universal Time (UTC) and the local time.

**Enable DST:** You can select how Daylight Saving starts and ends:

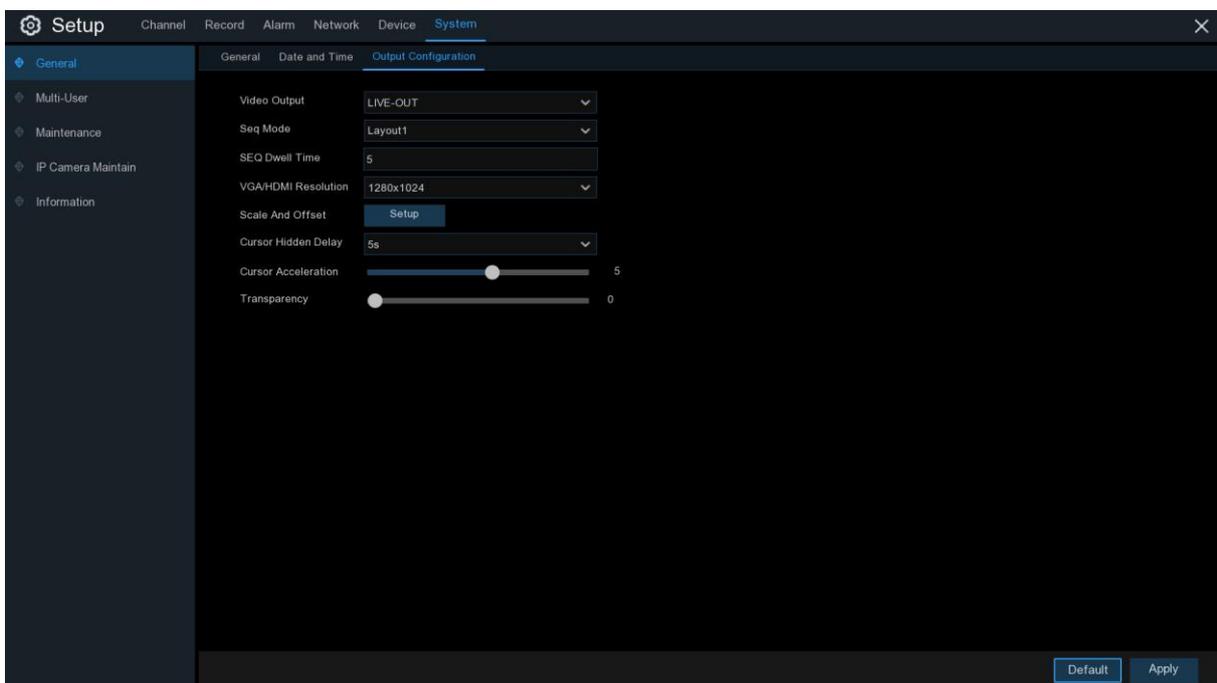
**Week:** Select the month, a particular day and time when Daylight Saving starts and ends. For example, 3 a.m. on the first Sunday of a particular month.

**Date:** Select the start date (click the calendar icon), end date and time when Daylight Saving starts and ends.

**Start Time / End Time:** Set the start time and end time for Daylight Saving.

## 5.6.5 Output Configuration

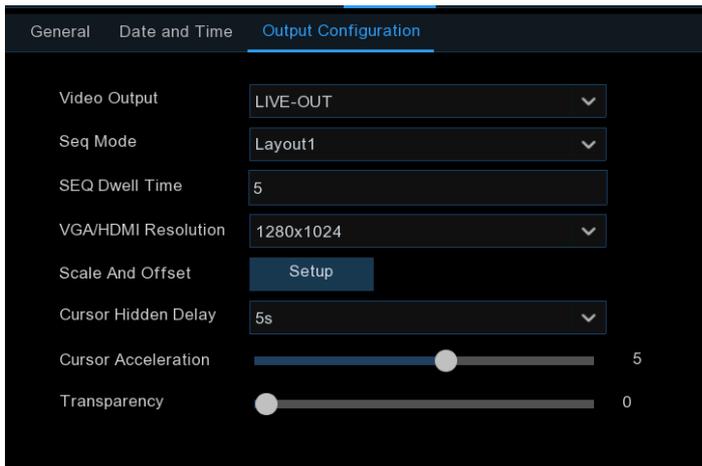
This menu allows you to configure video output parameters.



**Video Output:** To choose the output options:

**LIVE-OUT** is used to configure the main output parameters.

### 5.6.5.1 LIVE-OUT



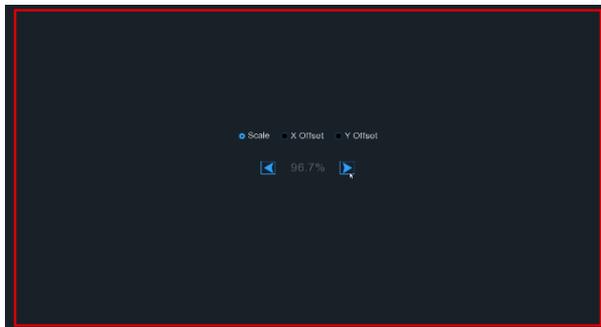
Choose **LIVE-OUT** from the Video Output drop-down menu.

**SEQ Mode:** Select how many video channels you would like to display when your NVR is in sequence mode.

**SEQ Dwell Time:** Enter in seconds the maximum length of time you would like to display a video channel in sequence mode before displaying the next video channel (300 seconds is the maximum).

**Output Resolution:** Select a display resolution that is suitable for your TV. 1920 x 1080 will suit most TVs. If your NVR supports 4K output resolution, you can select either 2K (2560 x 1440) or 4K (3840 x 2160) to take advantage of the higher resolution that your 4K TV provides.

**Scale and Offset:** The NVR supports to adjust the size & position of the display screen to match your monitor or TV. Click **Setup** button to adjust.



**Scale:** To adjust the size of the displayed screen by scale.

**X Offset:** To move the displayed screen to left or right.

**Y Offset:** To move the displayed screen to up or down.

Click once or long press the left button of your mouse on the arrow to adjust the size and position, or you can scroll the wheel of the mouse to adjust. Click the right button of your mouse to exit, and click **Apply** to save your modifications.

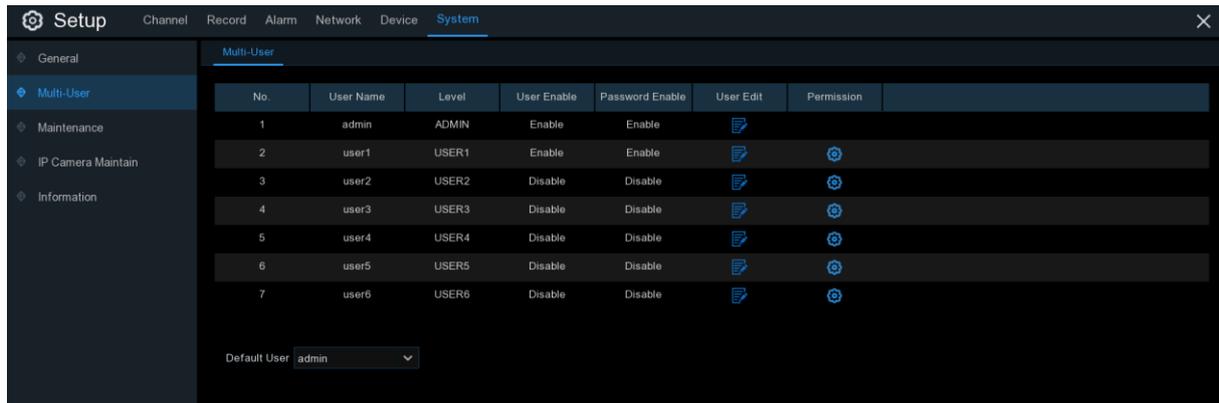
**Cursor Hidden Delay:** Click the drop-down menu to select the time your NVR will hide the mouse cursor when idle. You can also disable this by selecting "OFF" (password protection will be temporarily disabled).

**Cursor Acceleration:** To adjust the speed to move the mouse cursor.

**Transparency:** Click and hold the slider left or right to change how transparent the Menu Bar and Main Menu will appear on-screen. Adjust accordingly.

## 5.6.6 Multi-user

This menu allows you to configure the user name, password and user permission.

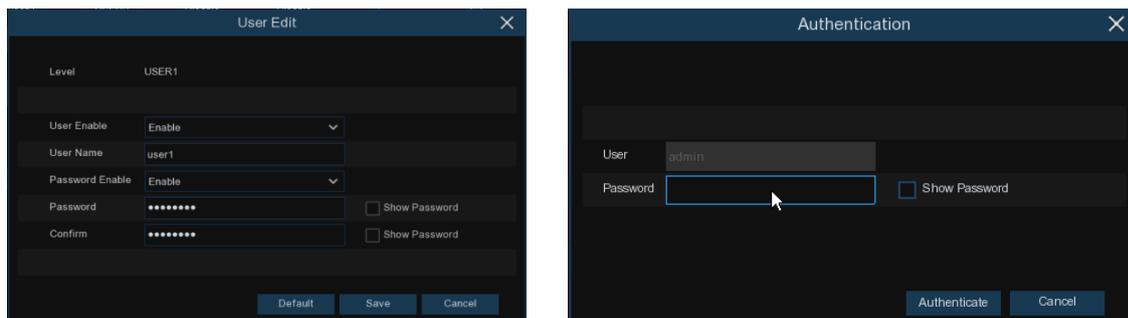


The system supports the following account types:

- **ADMIN — System Administrator:** The administrator has full control of the system, and can change both administrator and user passwords and enable/disable password protection.
- **USER — Normal User:** Users only have access to live viewing, search, playback, and other functions. You may set up multiple user accounts with varying levels of access to the system.

### 5.6.3.1 Changing Password

To change the password for the administrator or other user accounts, click the User Edit icon . The password has to be a minimum of 8 characters and can contain a mixture of numbers and letters. Enter your new password again to confirm, and then click **Save** to save your new password. You will be required to input your old password to authenticate.



**Password Enable:** It's strongly recommended to enable the password to protect your privacy. If you want to disable the password protection, please ensure your NVR is placed in a secure place.

### 5.6.3.2 Add New Users

No.	User Name	Level	User Enable	Password Enable	User Edit	Permission
1	admin	ADMIN	Enable	Enable		
2	user1	USER1	Enable	Enable		
3	user2	USER2	Disable	Disable		
4	user3	USER3	Disable	Disable		
5	user4	USER4	Disable	Disable		
6	user5	USER5	Disable	Disable		
7	user6	USER6	Disable	Disable		

Default User:

1. Select one of the user accounts that are currently disabled, click the User Edit icon .

**User Edit** ✕

---

Level: USER1

---

User Enable: Enable

User Name:

Password Enable: Enable

Password:   Show Password

Confirm:   Show Password

---

2. Select **Enable** from the drop-down next to **User Enable**.
3. Click the field next to **User Name** to change the user name for the account.
4. Select **Enable** from the drop-down next to **Password Enable**.
5. Click the field next to **Password** to enter the desired password.
6. Click the field next to **Confirm** to reenter the password.
7. Click **Save**. You will be required to input your Admin password to authenticate.

### 5.6.3.3 Setting User Permissions

The administrator account is the only account that has full control of all system functions. You can enable or disable access to certain menus and functions of each user account.

No.	User Name	Level	User Enable	Password Enable	User Edit	Permission
1	admin	ADMIN	Enable	Enable		
2	user1	USER1	Enable	Enable		
3	user2	USER2	Disable	Disable		
4	user3	USER3	Disable	Disable		
5	user4	USER4	Disable	Disable		
6	user5	USER5	Disable	Disable		
7	user6	USER6	Disable	Disable		

Default User:

1. Click the edit icon under Permission tab.

User Permission ✕

User Name:

<input checked="" type="checkbox"/> Log Search	<input checked="" type="checkbox"/> Parameter	<input checked="" type="checkbox"/> Maintain	<input checked="" type="checkbox"/> Manual Record
<input checked="" type="checkbox"/> Disk	<input checked="" type="checkbox"/> Remote Login	<input checked="" type="checkbox"/> SEQ Control	<input checked="" type="checkbox"/> Manual Capture

Backup

Analog Channels  1  2  3  4  5  6  7  8

IP Camera  1  2  3  4  5  6  7  8  9  10  11  12

Live

Analog Channels  1  2  3  4  5  6  7  8

IP Camera  1  2  3  4  5  6  7  8  9  10  11  12

Playback

Analog Channels  1  2  3  4  5  6  7  8

IP Camera  1  2  3  4  5  6  7  8  9  10  11  12

PTZ

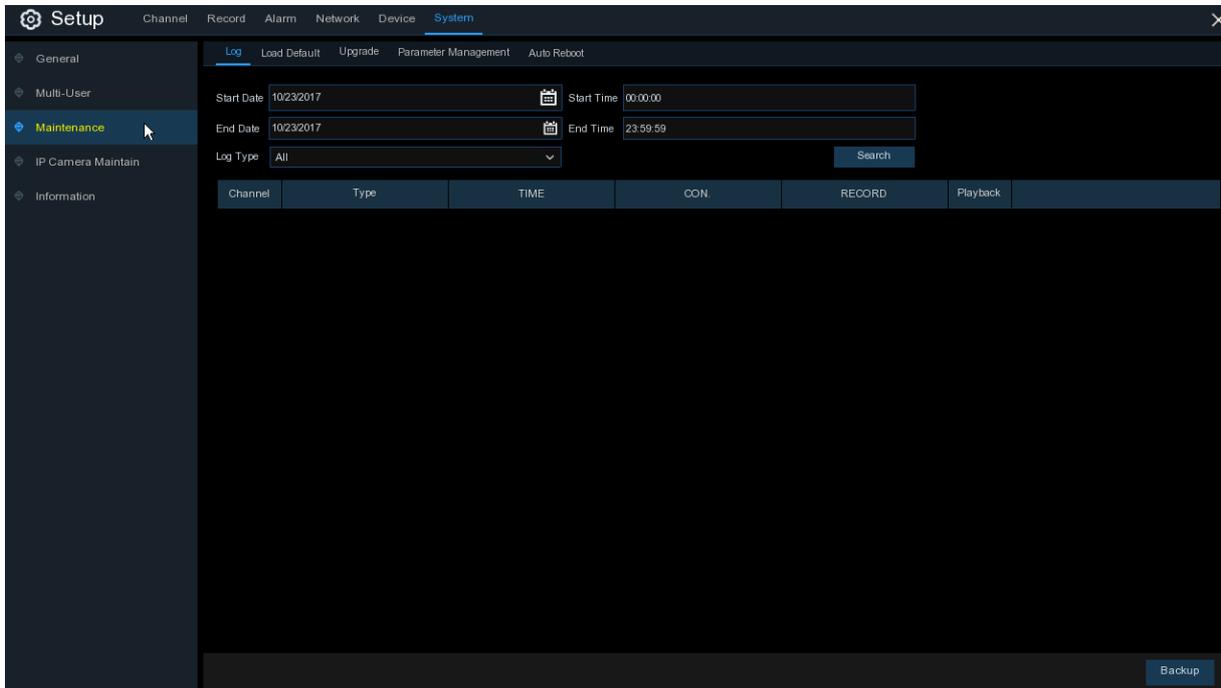
Analog Channels  1  2  3  4  5  6  7  8

IP Camera  1  2  3  4  5  6  7  8  9  10  11  12

2. Check the boxes next to any system menus or capabilities you would like the user to access. Click **All** to check all boxes. Click **Clear** to check none of the boxes.
3. Click **Save** to save your modifications.

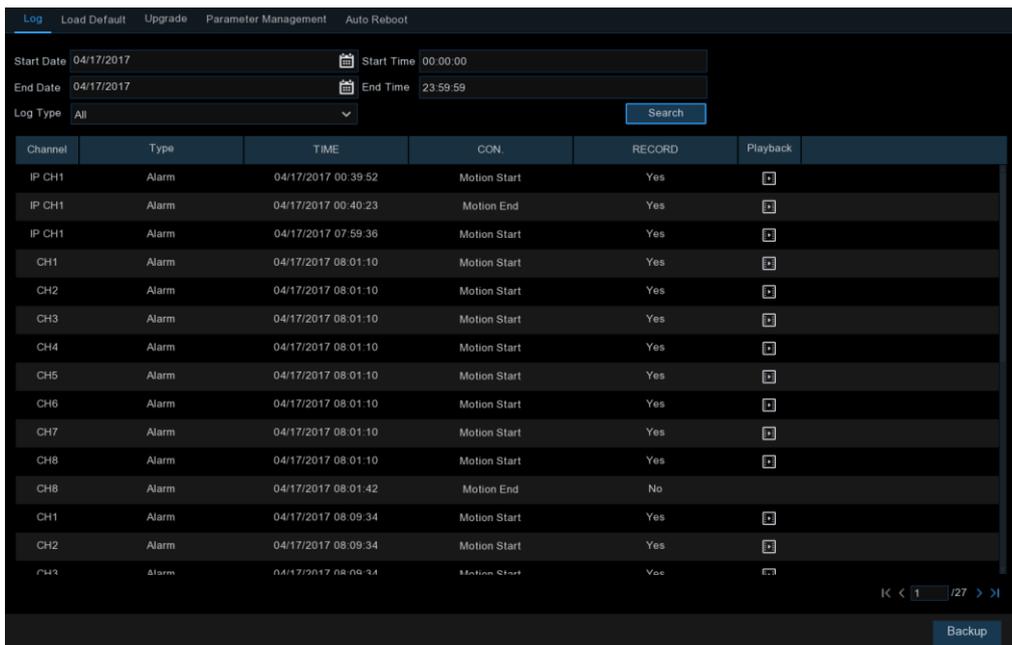
## 5.6.7 Maintenance

In this section, you will be able to search & view the system log, load default settings, upgrade the system, export & import system parameters and manager system auto reboot.



### 5.6.4.1 Log

The system log shows you important system events, such as motion alarms and system warnings. You can easily create a backup file of the system log for a set time period to a USB flash drive.

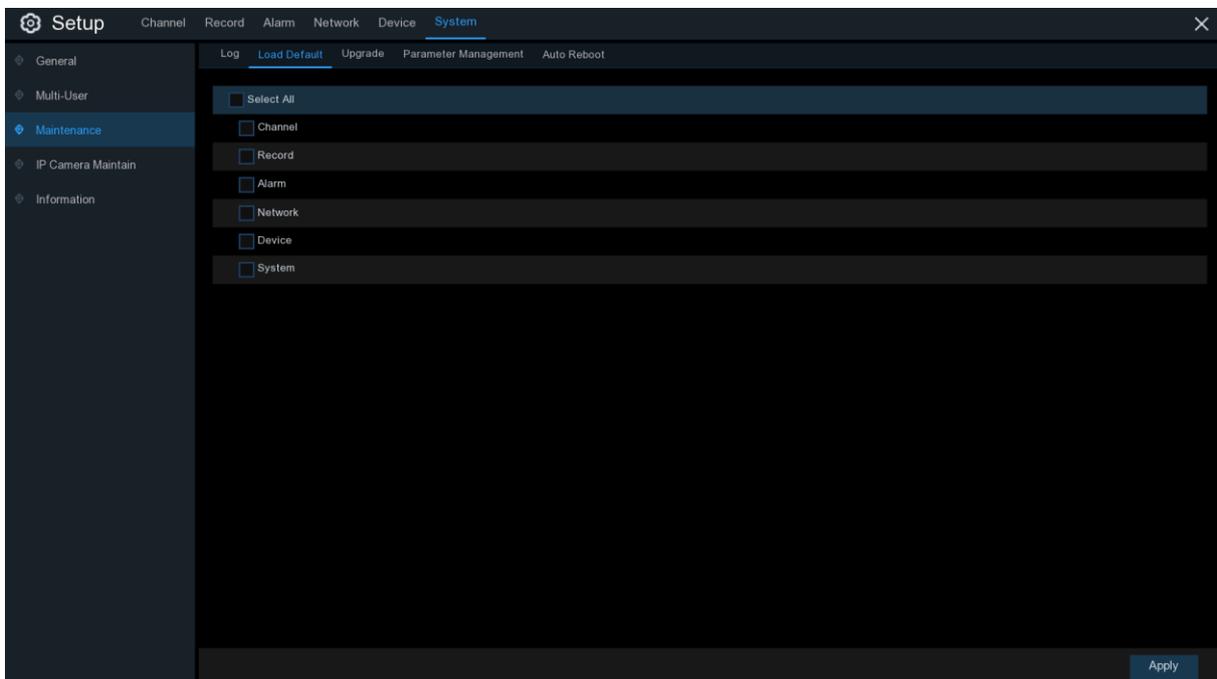


**Log Searching and Backing Up:**

1. Click the field next to **Start Date & Start Time** to choose the starting date & time for your search from the on-screen calendar.
2. Click the field next to **End Date & End Time** to choose the end date & time for your search from the on-screen calendar.
3. Select the type of events you would like to search for from the dropdown next to **Log Type**, or select **All** to see the entire system log for the selected time period.
4. Click **Search**.
5. Browse system log events from your search period:
  - Video events can be played back instantly by clicking in the **Playback** column. Right-click to return to your search results.
  - Use the **<< / >>** buttons in the bottom-right corner of the menu to move between pages of system log events.
6. Click **Backup** to create a backup of the system log for your search period. Please make sure your flash derive has been connected to the NVR's USB port.
7. The backup drive menu appears. Navigate to the folder you want the backup file to be saved in, then click **OK** to begin.

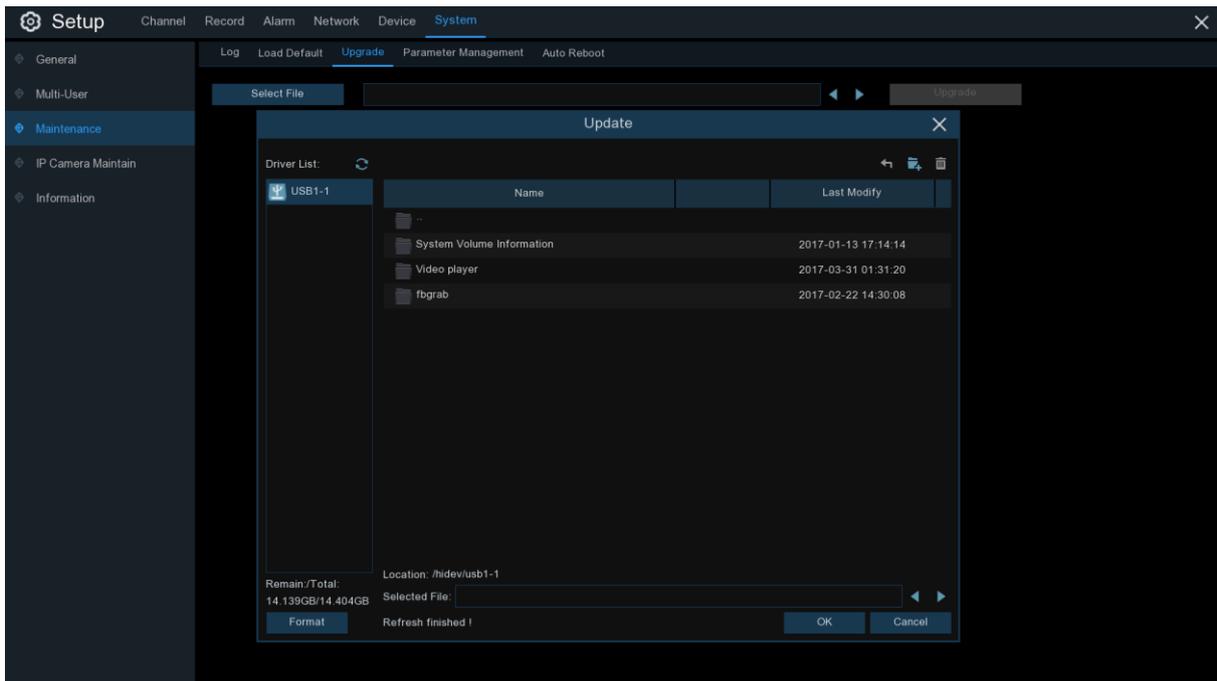
**5.6.4.2 Load Default**

Reset the NVR settings to its out-of-box state. You can choose to reset all settings at once, or just settings on specific menus. Restoring default settings will not delete recordings and snapshots saved to the hard drive.



Check the items you want restore, or check **Select All** to choose all items. Click **Apply** to load default settings of your chosen items.

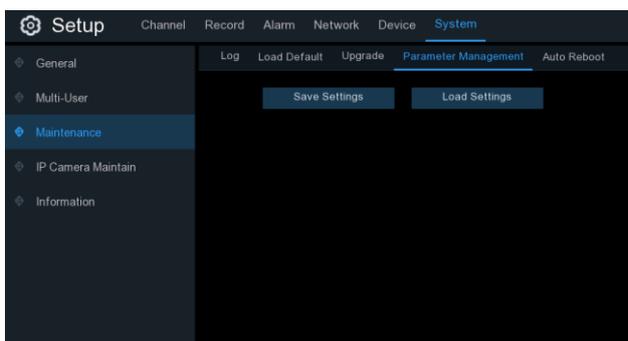
### 5.6.4.3 Upgrade



1. Copy the firmware file (.sw file) to your USB drive, and insert the USB flash drive into the NVR's USB port.
2. Click Select File button to choose the firmware file in your USB flash drive, then Click **OK**.
3. Click **Upgrade** button to start system upgrade. The system upgrade will last around 5-10 minutes, please do **NOT** power off the NVR or remove the USB from NVR during firmware upgrade.

### 5.6.4.4 Parameter Management

You can export the main menu settings you have configured to a USB flash drive, or import an exported setting file from USB flash drive to the NVR.

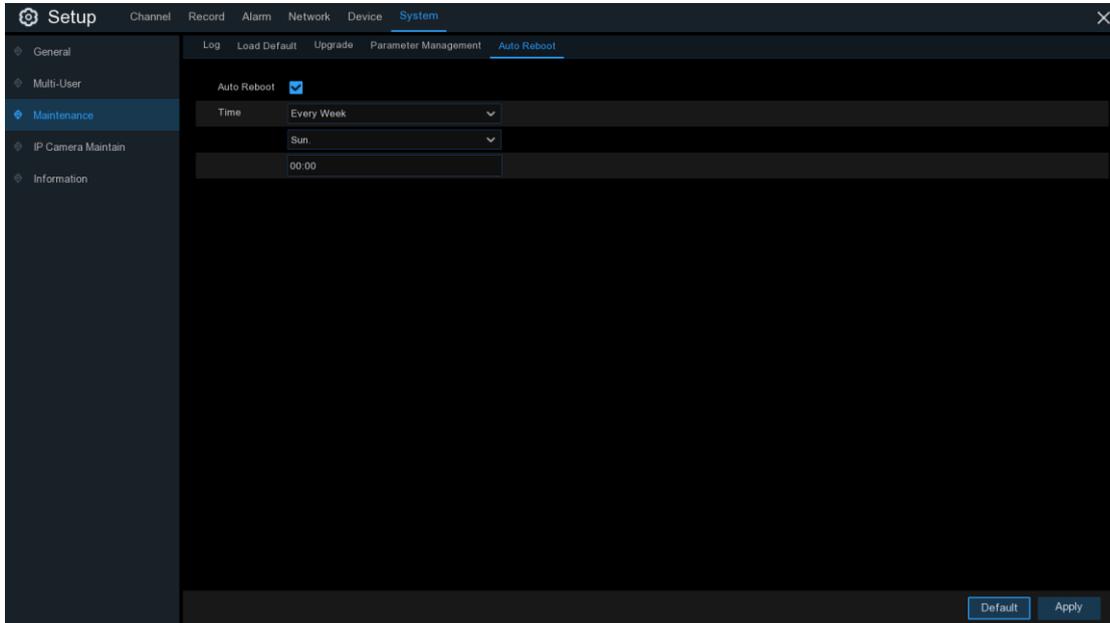


**Save Settings:** Click to save the NVR current system settings to the USB device. You will be required to input the Admin password to authenticate.

**Load Settings:** Once you have created a system settings export, you can import the settings on another NVR. Click **Load Settings** button to navigate to the system settings file you want to import from your USB flash driver. You will be required to input the Admin password to authenticate.

### 5.6.4.5 Auto Reboot

This menu allows the system to auto reboot the NVR regularly. It is recommended to leave this function enabled, as it maintains the operational integrity of your NVR.

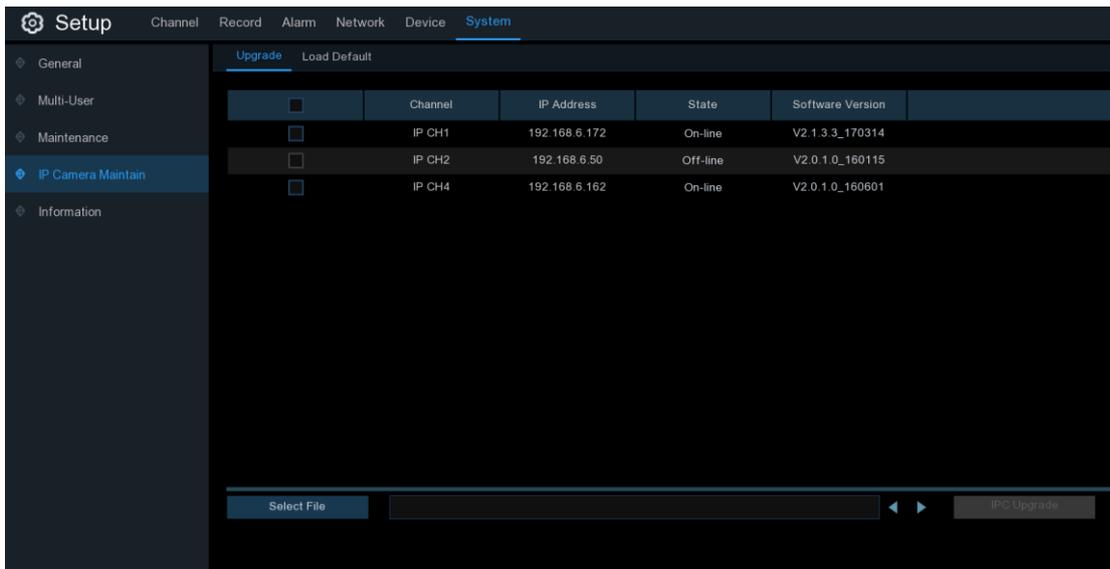


**Auto Reboot:** Check to enable.

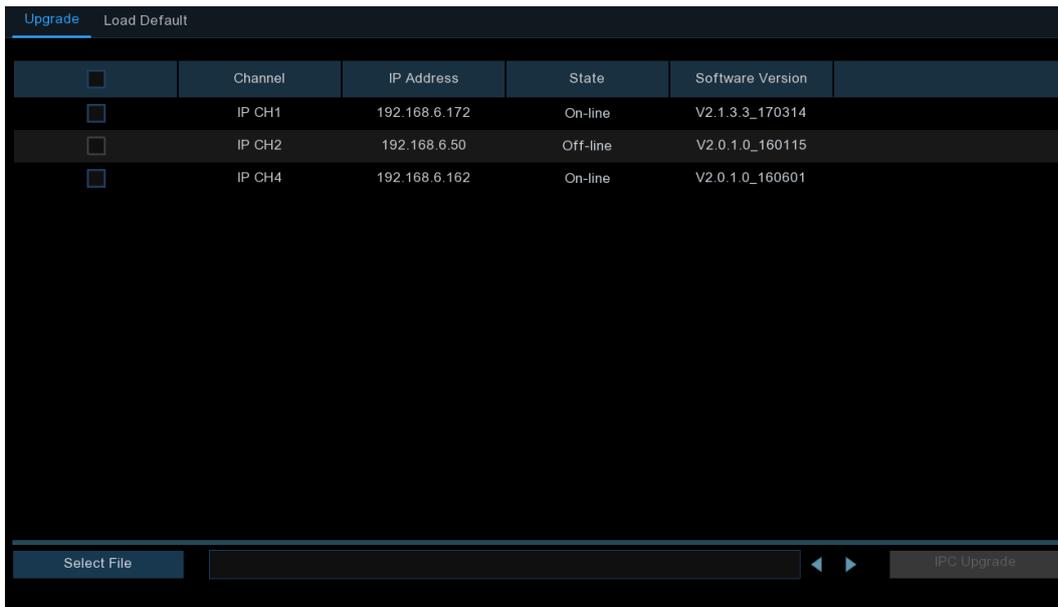
**Time:** You can set the NVR to reboot by day, week or month.

### 5.6.8 IP Camera Maintain

This menu allows you to upgrade the IP camera’s firmware and restore default settings of IP camera.

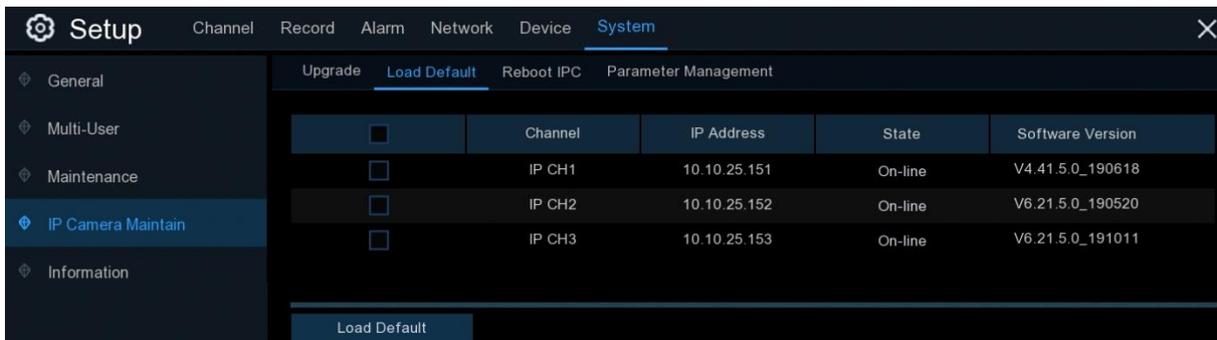


### 5.6.8.1 Upgrade IP Camera



1. Choose one of the IP cameras you want to upgrade firmware.
2. Click **Select File** select the update file from your USB flash drive, then click **OK**.
3. Click IPC Upgrade button to start upgrading. You will be required to input the Admin password to authenticate. Please do **NOT** power off the NVR and IP camera or remove the USB during the upgrading.

### 5.6.8.2 Load Default Settings for IP Camera



1. Choose the IP cameras you want to restore.
2. Click **Load Default** to restore settings. You will be required to input the Admin password to authenticate.

## 5.6.9 System Information

This menu allows you to view the system information, channel information, record information & network status.

### 5.6.9.1 Information

View system information such as device ID, device model name, IP address, MAC address, firmware version and more.

Parameter	Value
Device ID	000000
Device Name	NR308XA
Device Type	NR308XA
Hardware Version	DM-357
Software Version	V8.1.0-20191024
IE Client Version	V2.0.0.301
Video Format	PAL
HDD Volume	465G
IP Address	192.168.1.100
Web	80.80
Client	9000.9000
MAC Address	58-E8-76-58-E8-7E
Network State	not connect
P2P ID	RSV1802003200397

If your NVR supports P2P function, you will find the P2P ID & P2P QR code in the information page. You can scan this QR code with mobile app to remote view the NVR.

### 5.6.9.2 Channel Information

Channel	Alias	State	Mainstream	Substream	Mobilestream	Motion Detection	Privacy Zone
IP CH1	IP CH1	On-line	3840x2160, 15Fps, 6Mbps	640x 480, 10Fps, 512Kbps	640x 480, 10Fps, 512Kbps	Support	Support
IP CH2	IP CH2	On-line	2592x1944, 15Fps, 4Mbps	640x 480, 10Fps, 512Kbps	Nonsupport	Support	Support
IP CH3	IP CH3	On-line	2592x1944, 15Fps, 4Mbps	640x 480, 10Fps, 512Kbps	Nonsupport	Support	Support

View channel information for each connected camera such as alias, mainstream and substream recording specifications, motion detection status & privacy zone.

### 5.6.9.3 Record Information

Information	Channel Information	Record Info	Network State			
Channel	Record State	Record Switch	Stream Type	Resolution	FPS	Bitrate
IP CH1	ON	Enable	DualStream	3840x2160   640x480	15Fps   10Fps	6Mbps   512Kbps
IP CH2	ON	Enable	DualStream	2592x1944   640x480	15Fps   10Fps	4Mbps   512Kbps
IP CH3	ON	Enable	DualStream	2592x1944   640x480	15Fps   10Fps	4Mbps   512Kbps

View recording information for each connected camera such as bitrate, stream type, recording resolution and frame rate (FPS).

### 5.6.9.4 Network State

Information	Channel Information	Record Info	Network State
Attribute		Value	
WLAN			
IP Address		192.168.1.100	
Subnet Mask		255.255.255.0	
Gateway		192.168.1.1	
MAC Address		58-E8-76-58-E8-76	
DHCP		Enable	
Internal Interface			
IP Address		10.10.25.100	
Subnet Mask		255.255.0.0	
DNS1		192.168.1.1	
DNS2		8.8.8.8	
PPPoE		Disable	
Port			
Web		80,80,Inactive,Disable	
Client		9000,9000,Inactive,Disable	
RTSP		554,554,Inactive,Disable	
Https		443,443,Inactive,Disable	
Total Band Width:		80Mbps	
Used Band Width:		16Mbps	

View network information.

**Total Band Width:** It shows the NVR's total input band width for IP cameras.

**Used Band Width:** It shows the used bandwidth of the IP cameras.

# Chapter 6 Search, Playback & Backup

The Search function gives you the ability to search for and play previously recorded videos as well as snapshots that are stored on your NVR's hard drive. You have the choice of playing video that matches your recording schedule, manual recordings or motion events only. The Backup function gives you the ability to save important events (both video and snapshots) to a USB flash drive.

## 6.1 Using Search Function

Click  **Search** button in the Start Menu to enter search section.



1. **Search Options:** the system provides various search & playback methods: General, Events, Sub-periods, Smart, Tag, External File, Pictures and Slice
2. **Search Date:** search by a date to play back.
3. **Search Type:** the system provides different search types to narrow your search.
4. **Channel Selection:** to choose the channels you want to search & play.
5. **Video Playback Controls:** to control the video playback.



 Enlarge the video playback to full screen

 Rewind, x2, x4, x8 and x16

-  Slow Play, 1/2, 1/4 and 1/8, 1/16 speed
-  Play
-  Pause
-  Play frame by frame. Click once to play a frame of the video
-  Stop
-  Fast Forward, x2, x4, x8 and x16
-  Digital Zoom: Click to zoom in then click-and-drag on a camera image during playback to zoom in on the selected area. Right-click to return to regular playback.
-  Video Clip. Quickly save a section of video to a USB flash drive. View more on [6.1.1.1 Video Clip Backup](#)
-  Save Video Clip.
-  Volume Control: scroll the slider bar to increase or decrease volume.
-  Snapshots: to capture a snapshot image to your USB flash drive. If the video playback is in split-screen view, move the mouse cursor to the channel you want to capture, and then click the  icon to save the snapshot.

**6. Timeline:** Continuous recordings are shown with coloured bars to represent different types of recording (legend shown in the bottom-right corner of the display). Use the timeframe options () to view a smaller or larger time period.

**Different types of recording shown in different colours:**

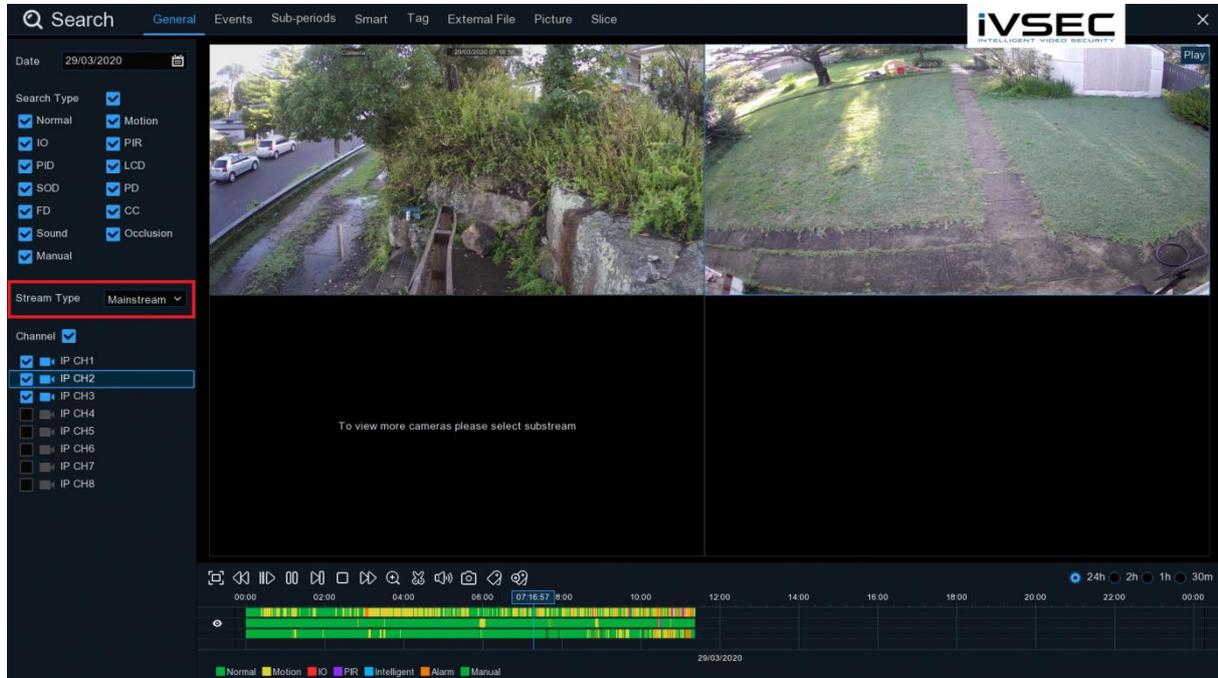
- Continuous Recording in **Green** colour;
- Motion Recording in **Yellow** colour;
- PIR Recording in **Purple** colour;
- Motion & PIR Recording in **Orange** colour;
- Intelligent Recording in **Blue** colour;

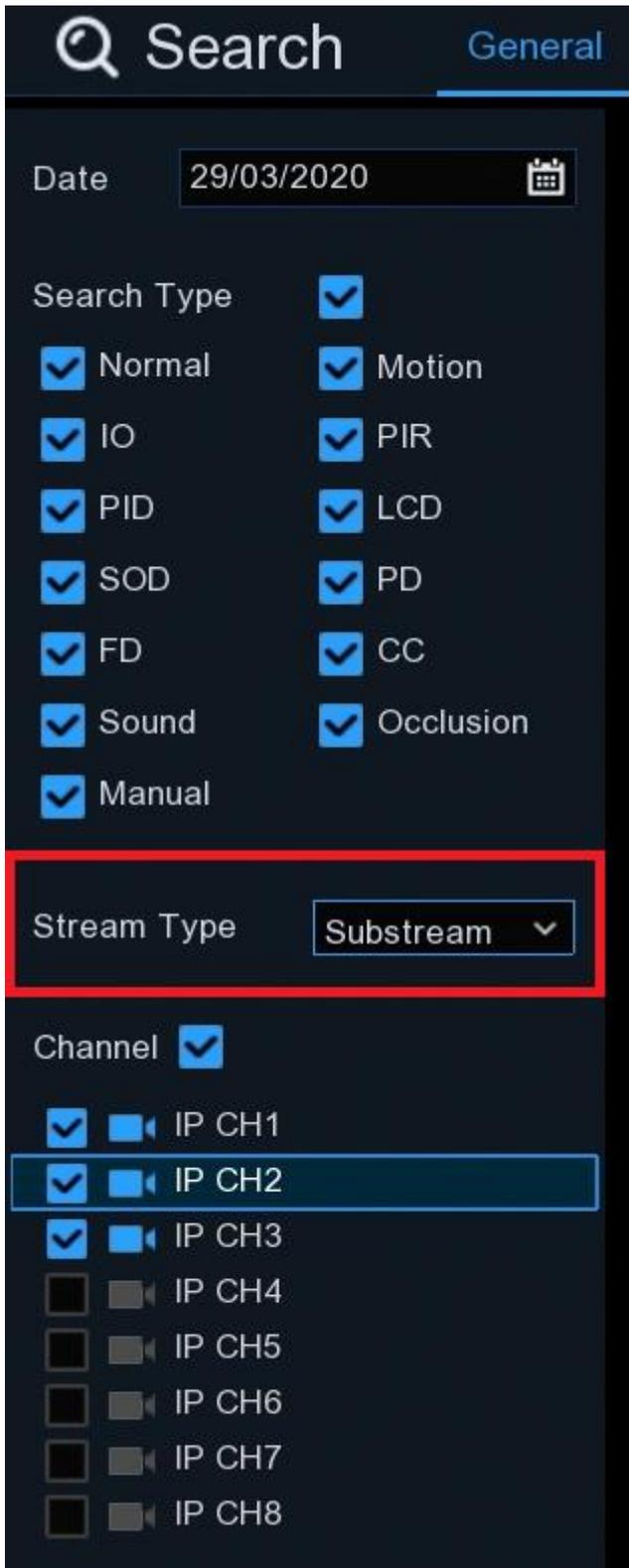
**7. Playback Status:** display the video play status.

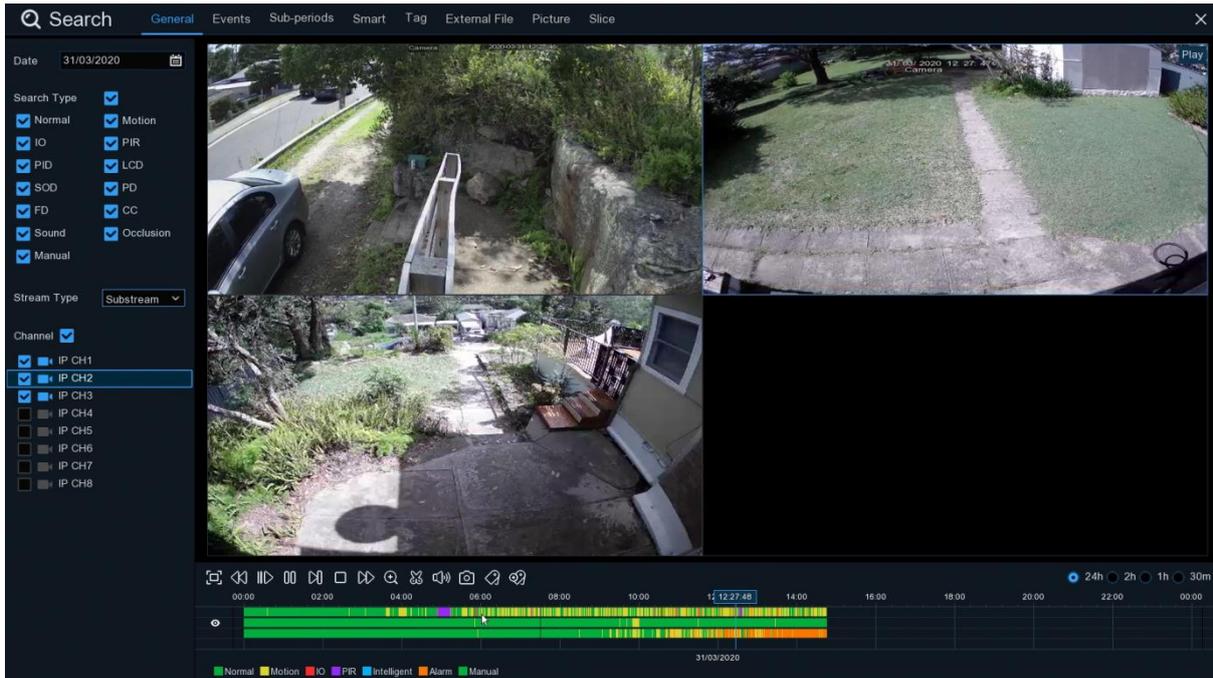
## 6.1.1 Search & Play Video in General

This menu gives an option to search & play recording for a selected date.

“Resource is not enough” or “To view more cameras please select substream”

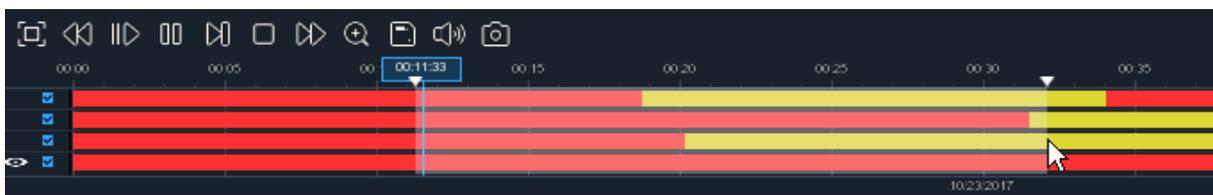






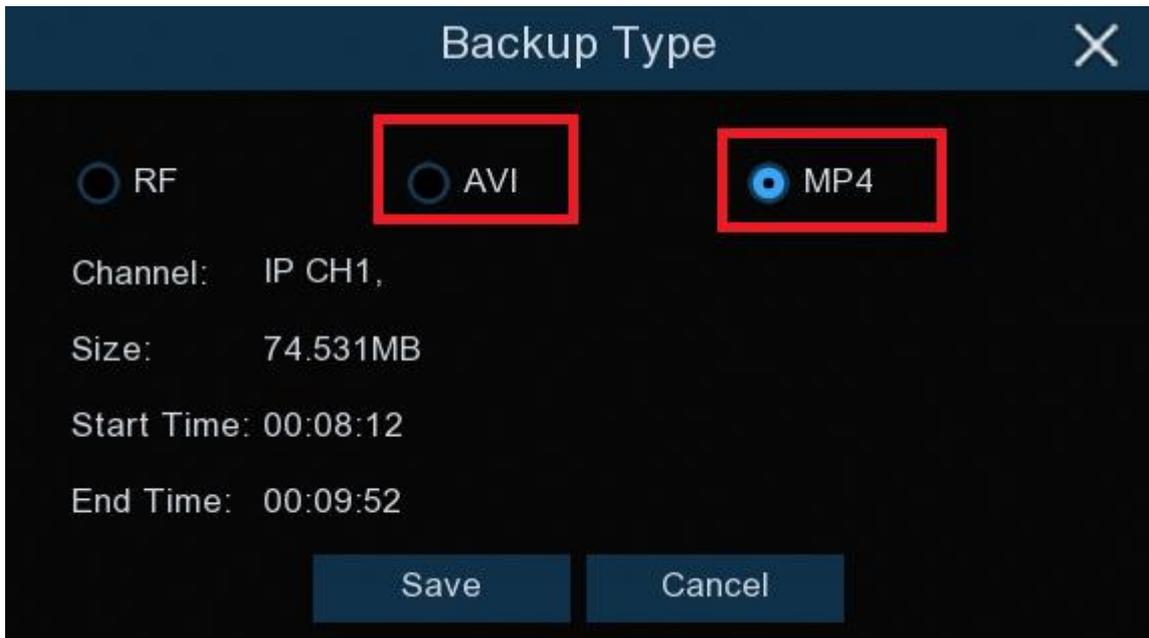
1. Select a date to search for video recording from the calendar.
2. Choose a search type.
3. Check channels you would like to search, or check **Channel** to search all connected channels.
4. The search result will display on the timeline from 00:00 to 24:00.
5. Click **▶** button to start playback.
6. Control the playback with buttons on **Video Playback Controls**.
7. Use the timeframe options (**24h** **2h** **1h** **30m**) to view a smaller or larger time period.
8. If you want to quickly save a section of video during playing back to a USB flash drive, use the **Video Clip** backup function.

### 6.1.1.1 Video Clip Backup

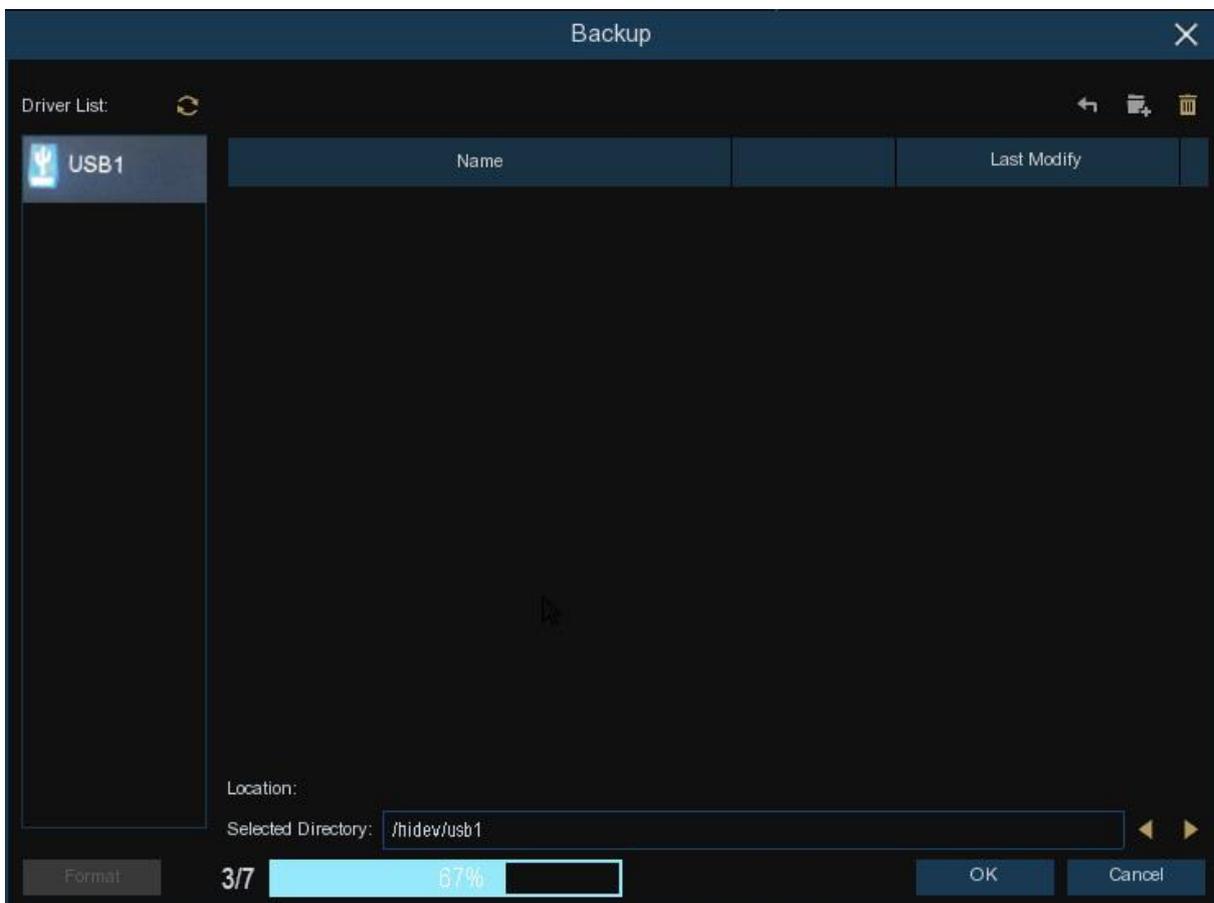


1. Insert your USB flash drive to the NVR.
2. Start a video recording playback.
3. Click **Video Clip** icon.
4. Check the channel(s) you want to make a video clip backup.
5. Move the mouse cursor to the timeline where you want to start the video clip.
6. Press and hold the left button of your mouse, and drag the drag the cursor to the timeline where you want to end the video clip.
7. The **Video Clip** icon has been changed to **Video Clip** icon, click **Video Clip** to save the video clip.

8. **Important:** If you need to backup footage that will be provided to Police or other authorities please select **MP4** or **AVI** video format. Click **Save** button to save the video clips. Please make sure your USB device has enough space to save the video clips.



9. The backup drive menu appears. Navigate to the folder you want the backup files to save in.  
 10. Click **OK** to begin. The progress bar at the bottom of the window shows you the progress of the backup.



## 6.1.2 Event Search, Playback & Backup

Event search lets you view a list of video recordings with the channel, start and end time, and recording type conveniently summarized. You can also quickly back up events to a USB flash drive.



### To search, play & back up for events:

1. Choose the date & time you want to search.
2. Check the recording types you want to search, or check **Search Type** to choose all.
3. Choose the channels you want to search, or check **Channel** to choose all channels.
4. Click icon to start search.
5. Events fitting your search criteria are displayed in list form. You can double click the left button of your mouse upon one of the events to play the video immediately.
6. Click icons in the bottom-right corner of the menu to browse between pages of events, or input the page you want to browse.
7. You can switch the view of list form in by clicking below icons which is show at the right bottom corner of the screen:

**Thumbnails view.** You can view the snapshots of the events.

**List view.** The events will be displayed in list.

<input type="checkbox"/> 1 CH1 00:00:00	<input type="checkbox"/> 2 CH1 00:00:45	<input type="checkbox"/> 3 CH1 00:18:30	<input type="checkbox"/> 4 CH1 00:44:03	<input type="checkbox"/> 5 CH1 01:10:48	<input type="checkbox"/> 6 CH1 01:19:22	<input type="checkbox"/> 7 CH1 01:35:37	<input type="checkbox"/> 8 CH1 01:43:32
<input type="checkbox"/> 9 CH1 02:01:12	<input type="checkbox"/> 10 CH1 02:25:38	<input type="checkbox"/> 11 CH1 02:43:17	<input type="checkbox"/> 12 CH1 03:02:08	<input type="checkbox"/> 13 CH1 03:08:37	<input type="checkbox"/> 14 CH1 03:10:01	<input type="checkbox"/> 15 CH1 03:14:54	<input type="checkbox"/> 16 CH1 03:42:12
<input type="checkbox"/> 17 CH1 04:07:23	<input type="checkbox"/> 18 CH1 04:19:35	<input type="checkbox"/> 19 CH1 04:36:40	<input type="checkbox"/> 20 CH1 05:00:20	<input type="checkbox"/> 21 CH1 05:24:12	<input type="checkbox"/> 22 CH1 05:45:55	<input type="checkbox"/> 23 CH1 06:04:07	<input type="checkbox"/> 24 CH1 06:14:27
<input type="checkbox"/> 25 CH1 06:41:12	<input type="checkbox"/> 26 CH1 06:44:25	<input type="checkbox"/> 27 CH1 07:01:42	<input type="checkbox"/> 28 CH1 07:20:43	<input type="checkbox"/> 29 CH1 07:31:23	<input type="checkbox"/> 30 CH1 07:48:04	<input type="checkbox"/> 31 CH1 08:17:33	<input type="checkbox"/> 32 CH1 08:40:16
<input type="checkbox"/> 33 CH1 08:50:34	<input type="checkbox"/> 34 CH1 09:07:05	<input type="checkbox"/> 35 CH1 09:25:12	<input type="checkbox"/> 36 CH1 09:44:07	<input type="checkbox"/> 37 CH1 09:49:08	<input type="checkbox"/> 38 CH1 10:00:52	<input type="checkbox"/> 39 CH1 10:14:18	<input type="checkbox"/> 40 CH1 10:34:42
<input type="checkbox"/> 41 CH1 10:45:57	<input type="checkbox"/> 42 CH1 11:12:48	<input type="checkbox"/> 43 CH1 11:20:27	<input type="checkbox"/> 44 CH1 11:48:18	<input type="checkbox"/> 45 CH1 12:07:25	<input type="checkbox"/> 46 CH1 12:30:12	<input type="checkbox"/> 47 CH1 12:44:43	<input type="checkbox"/> 48 CH1 12:55:49
<input type="checkbox"/> 49 CH1 13:06:48	<input type="checkbox"/> 50 CH1 13:30:45	<input type="checkbox"/> 51 CH1 13:37:51	<input type="checkbox"/> 52 CH1 13:57:01	<input type="checkbox"/> 53 CH1 14:10:24	<input type="checkbox"/> 54 CH1 14:11:16	<input type="checkbox"/> 55 CH1 14:18:12	<input type="checkbox"/> 56 CH1 14:35:26
<input type="checkbox"/> 57 CH1 14:40:31	<input type="checkbox"/> 58 CH1 14:44:42	<input type="checkbox"/> 59 CH1 14:48:38	<input type="checkbox"/> 60 CH1 15:15:44	<input type="checkbox"/> 61 CH1 15:39:06	<input type="checkbox"/> 62 CH1 16:01:07	<input type="checkbox"/> 63 CH1 16:16:00	<input type="checkbox"/> 64 CH1 16:24:41
<input type="checkbox"/> 65 CH1 16:27:29	<input type="checkbox"/> 66 CH1 16:43:47	<input type="checkbox"/> 67 CH1 16:45:43	<input type="checkbox"/> 68 CH1 17:01:14	<input type="checkbox"/> 69 CH1 17:05:03	<input type="checkbox"/> 70 CH1 17:28:30	<input type="checkbox"/> 71 CH1 17:54:23	<input type="checkbox"/> 72 CH1 18:08:49
<input type="checkbox"/> 73 CH1 18:36:07	<input type="checkbox"/> 74 CH1 18:44:14	<input type="checkbox"/> 75 CH1 18:57:14	<input type="checkbox"/> 76 CH1 19:07:37	<input type="checkbox"/> 77 CH1 19:12:12	<input type="checkbox"/> 78 CH1 19:36:50	<input type="checkbox"/> 79 CH1 19:50:34	<input type="checkbox"/> 80 CH1 20:01:42
<input type="checkbox"/> 81 CH1 20:25:40	<input type="checkbox"/> 82 CH1 20:34:32	<input type="checkbox"/> 83 CH1 20:49:48	<input type="checkbox"/> 84 CH1 21:04:51	<input type="checkbox"/> 85 CH1 21:21:09	<input type="checkbox"/> 86 CH1 21:42:12	<input type="checkbox"/> 87 CH1 21:47:36	<input type="checkbox"/> 88 CH1 22:02:49
<input type="checkbox"/> 89 CH1 22:29:59	<input type="checkbox"/> 90 CH1 22:39:14	<input type="checkbox"/> 91 CH1 22:54:42	<input type="checkbox"/> 92 CH1 22:57:45	<input type="checkbox"/> 93 CH1 23:08:03	<input type="checkbox"/> 94 CH1 23:22:59	<input type="checkbox"/> 95 CH1 23:35:50	

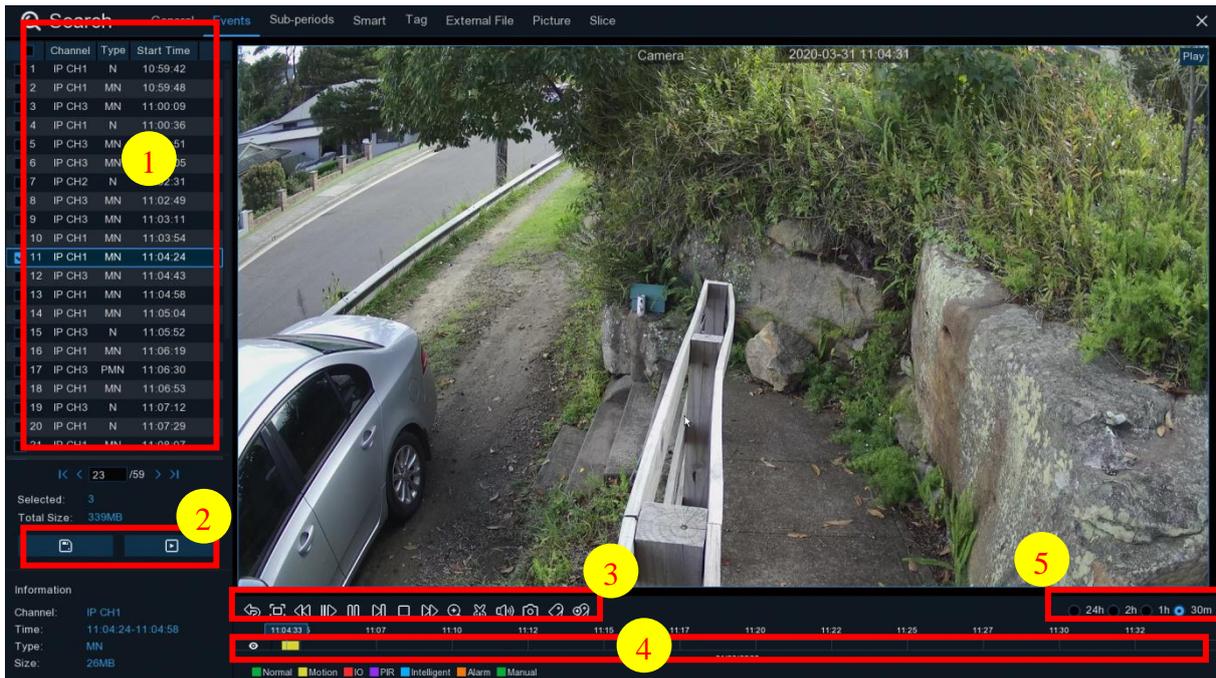
 **Detailed view.** You can view the details of the events.

<input type="checkbox"/>	Channel	Type	Date	Start Time	End Time	Size	Playback	Lock
<input type="checkbox"/> 1	CH1	MINS	10/23/2017	00:00:00	00:00:45	6MB		
<input type="checkbox"/> 2	CH1	MINS	10/23/2017	00:00:45	00:18:30	150MB		
<input type="checkbox"/> 3	CH1	MINS	10/23/2017	00:18:30	00:44:03	217MB		
<input type="checkbox"/> 4	CH1	MINS	10/23/2017	00:44:03	01:10:48	227MB		
<input type="checkbox"/> 5	CH1	MINS	10/23/2017	01:10:48	01:19:22	72MB		
<input type="checkbox"/> 6	CH1	MINS	10/23/2017	01:19:22	01:35:37	138MB		
<input type="checkbox"/> 7	CH1	MINS	10/23/2017	01:35:37	01:43:32	67MB		
<input type="checkbox"/> 8	CH1	MINS	10/23/2017	01:43:32	02:01:12	150MB		
<input type="checkbox"/> 9	CH1	MINS	10/23/2017	02:01:12	02:25:38	207MB		
<input type="checkbox"/> 10	CH1	MINS	10/23/2017	02:25:38	02:43:17	150MB		
<input type="checkbox"/> 11	CH1	MINS	10/23/2017	02:43:17	03:02:08	160MB		
<input type="checkbox"/> 12	CH1	MINS	10/23/2017	03:02:08	03:08:37	55MB		

In the detailed view mode, you can lock the video events to keep events from being overwritten in the hard drive. Click the  icon to lock or click  to unlock the events.

- When you click the left button of your mouse upon one of the event, system will show the event information on the left bottom corner of the screen.
- Check the box next the number of the event to select files, or check the box next **Select** to select all events in the page.
- The number of selected files, total size information will be displayed at the right bottom of the screen.
- After selecting file, you can click  icon to save the video to USB flash drive. Or click  icon into event playback control window to play the video.

### 6.1.2.1 Event Playback Control



1. Event List, you can select the events here.
2. Click icon to save your selected event videos to USB flash drive. Click icon to play video.
3. Control the playback with buttons on **Video Playback Controls**. You can click icon or click right button of your mouse to exit the playback and return to event search window.
4. The event you are playing now will be displayed on the timeline.
5. Use the timeframe options ( 24h  2h  1h  30m) to view a smaller or larger time period.

### 6.1.3 Sub-periods Playback

Sub-periods playback allows you to play multiple normal recordings and motion events simultaneously from a single channel. With normal and event recordings, the video is divided evenly depending on the split-screen mode that has been selected. For example, if the video is an hour long and you have selected Split-screens x 4, each split-screen will play for 15 minutes.



**To search & play video in sub-periods:**

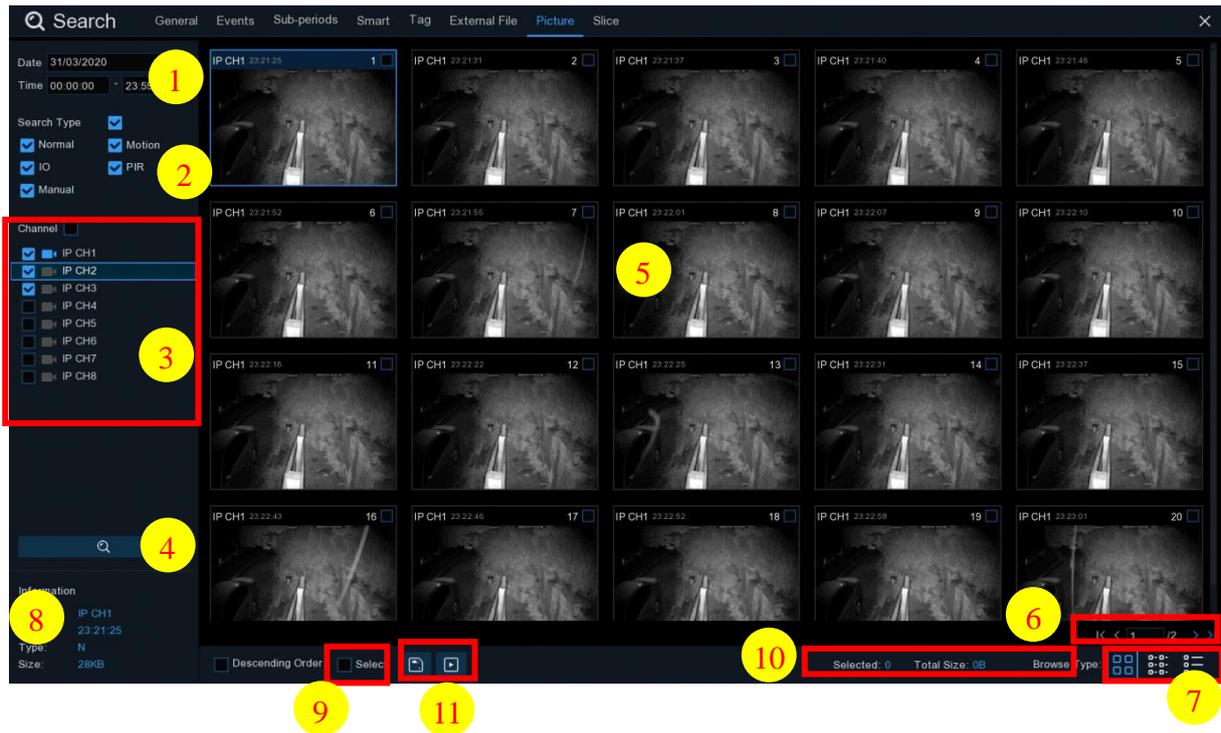
1. Choose the date & time you want to search.
2. Choose the split-screens you want the videos to be played in.
3. Check the recording types you want to search, or check **Search Type** to choose all.
4. Choose the channels you want to search. Please note that this function only supports to search & play one channel at a time.
5. Click the play button to start playing. Control the playback with buttons on **Video Playback Controls**.
6. Videos are being played in split-screens.
7. Click the left button of your mouse upon a particular split-screen, the time period of the video split-screen will be displayed on the timeline. The colour bar on the top of the timeline indicates the time span of the video split-screen you have clicked. The colour bar on the bottom of the timeline indicates the time span for the whole videos you have searched.



8. Use the timeframe options () to view a smaller or larger time period.

**6.1.4 Picture Search & View**

This function can be used to search, play and copy snapshots to a USB flash drive.



**To search, play & back up pictures:**

1. Choose the date & time you want to search.
2. Check the picture capture types you want to search, or check **Search Type** to choose all.
3. Choose the channels you want to search, or check **Channel** to choose all channels.
4. Click button to start search.
5. Pictures fitting your search criteria are displayed in list form. You can double click one of the pictures to get a larger view.
6. Click icons in the bottom-right corner of the menu to browse between pages of pictures, or input the page you want to browse.
7. You can switch the view of list form in by clicking below icons which is show at the right bottom corner of the screen:

Thumbnails view. You can view the snapshots of the events.

List view. The events will be displayed in list.

1	CH1	00:00:00	2	CH1	00:00:45	3	CH1	00:18:30	4	CH1	00:44:03	5	CH1	01:10:48	6	CH1	01:19:22	7	CH1	01:35:37
9	CH1	02:01:12	10	CH1	02:25:38	11	CH1	02:43:17	12	CH1	03:02:08	13	CH1	03:08:37	14	CH1	03:10:01	15	CH1	03:14:54
17	CH1	04:07:23	18	CH1	04:19:35	19	CH1	04:36:40	20	CH1	05:00:20	21	CH1	05:24:12	22	CH1	05:45:55	23	CH1	06:04:07
25	CH1	06:41:12	26	CH1	06:44:25	27	CH1	07:01:42	28	CH1	07:20:43	29	CH1	07:31:23	30	CH1	07:48:04	31	CH1	08:17:33
33	CH1	08:50:34	34	CH1	09:07:05	35	CH1	09:25:12	36	CH1	09:44:07	37	CH1	09:46:08	38	CH1	10:00:52	39	CH1	10:14:18
41	CH1	10:45:57	42	CH1	11:12:48	43	CH1	11:20:27	44	CH1	11:48:18	45	CH1	12:07:25	46	CH1	12:30:12	47	CH1	12:44:43
49	CH1	13:06:48	50	CH1	13:30:46	51	CH1	13:37:51	52	CH1	13:57:01	53	CH1	14:10:24	54	CH1	14:11:16	55	CH1	14:18:12
57	CH1	14:40:31	58	CH1	14:44:42	59	CH1	14:48:38	60	CH1	15:15:44	61	CH1	15:30:06	62	CH1	16:01:07	63	CH1	16:16:00

Detailed view. You can view the details of the events.

	Channel	Type	Date	Time	Size	Playback	
<input type="checkbox"/>	1	CH1	MIN	10/24/2017	00:00:00	160KB	<input type="checkbox"/>
<input type="checkbox"/>	2	CH1	MIN	10/24/2017	00:12:01	201KB	<input type="checkbox"/>
<input type="checkbox"/>	3	CH1	MIN	10/24/2017	00:21:20	401KB	<input type="checkbox"/>
<input type="checkbox"/>	4	CH1	MIN	10/24/2017	00:24:38	111KB	<input type="checkbox"/>
<input type="checkbox"/>	5	CH1	MIN	10/24/2017	00:37:25	167KB	<input type="checkbox"/>
<input type="checkbox"/>	6	CH1	MIN	10/24/2017	00:55:58	210KB	<input type="checkbox"/>

- When you click the left button of your mouse upon one of the pictures, system will show the picture information on the left bottom corner of the screen.
- Check the box next the number of the event to select files, or check the box next **Select** to select all pictures in the page.
- The number of selected files, total size information will be displayed at the right bottom of the screen.
- After selecting file, you can click  button to save the pictures to USB flash drive. Or click  button to go into picture preview control window.

### 6.1.5.1 Picture Preview Control



- Picture List, you can select the pictures here.
- Click  button to save your selected pictures to a USB flash drive. Click  button to view the pictures in slideshow.
- Press  button to exit preview control window and go back to picture search window.  
 Press  button to pause, press  to resume slideshow.  
 Press  button to display previous snapshot or group of snapshots, press  to display the next snapshot or group of snapshots.  
 Click  button to view a single snapshot at a time, click  button to view four snapshots at a time, press  buttons to view nine snapshots at a time.

# Chapter 7 Remote Access via Web Client

Access the NVR using a web browser by downloading and installing the plugin. Ensure that the internet settings of the NVR are configured correctly.

## 7.1 Basic System Environment Requirements

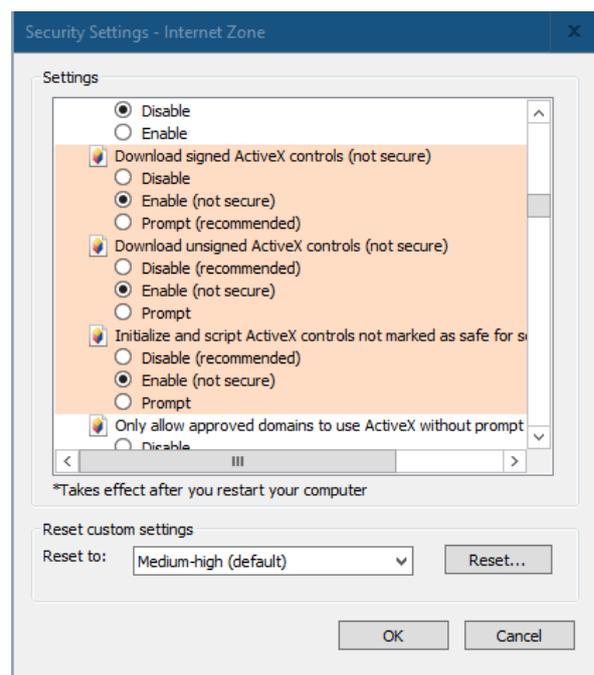
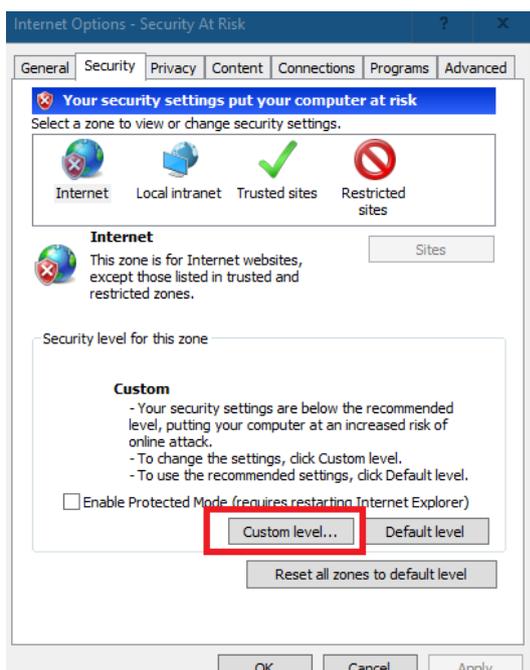
The minimum requirements for hardware and OS required to run Web Client:

Item	Minimum	Recommended
CPU	Intel® Core™ i5 CPU	Intel® Core™ i5 CPU or higher
RAM	4G or more	8G or more
Hard Drive	500G or more	1000G or more
Display RAM	2G or more	4G or more
Display Resolution	1280*1024	1920*1080
OS	Windows 7 or above Mac OS X® 10.9 or above	
Ethernet Adapter	10/100/1000M Ethernet Adapter	
Internet Explorer	Internet Explorer (Ver. 11, 10 or 9). Edge Chromium not supported.	
Google Chrome	Only when using the IE Tab Chrome extension (Windows only)	
Mac (Safari)	V5.1 or above. Use the Surveillance Client application for MAC	
Mozilla Firefox	V51 or below. V52 or above not supported	

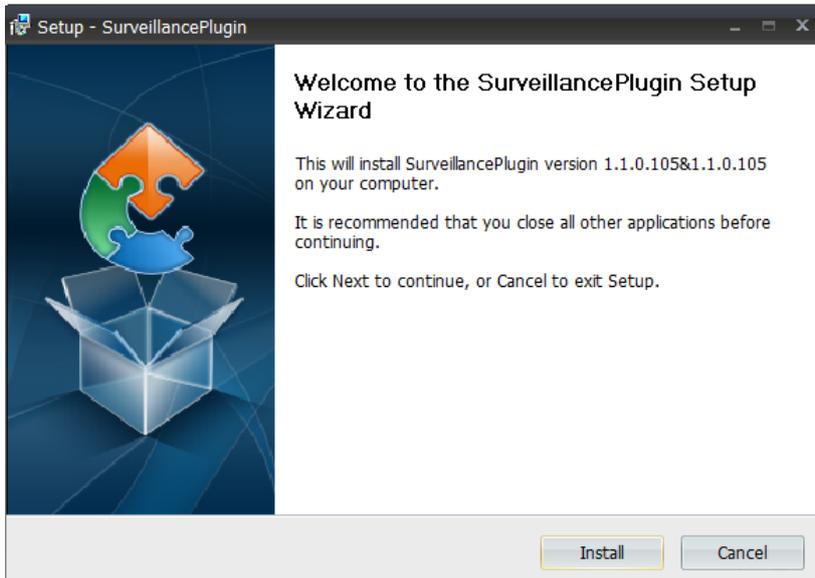
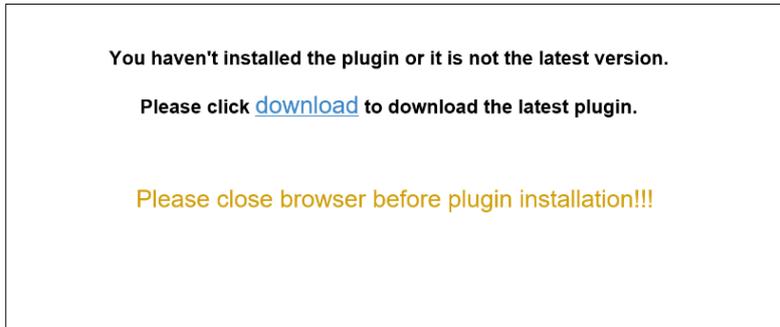
## 7.2 Web Plugin Download and Installation

### For Internet Explorer:

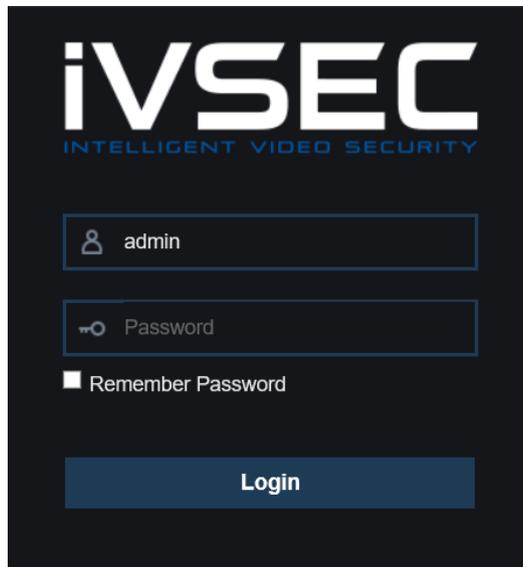
1. Launch Internet Explorer. Click the “Tools” tab – “Internet Options” – “Security” Tab – “Custom Level”. Modify the security settings as shown and click “OK”.



2. Enter the NVR IP address or DDNS domain name (Host Name) into address bar of Internet Explorer
- 3.
4. For the first time you run the web client, system will require to install the web client plugin. Click **download** to download the plugin and install onto your computer. Close any open Internet Explorer Windows during the Surveillance plugin installation



2. After installing the plug-in, open Internet Explorer and repeat step 1 to open the login page. You may be prompted to allow the Plugin to run. Click "Allow" . Enter your user name and password to login the web client.



### For Chrome (Windows)

1. Watch the video below which demonstrates how to access the NVR through Chrome using the IE Tab Extension

<https://youtu.be/H-3uULjk0Lk>

[Click here to download Chrome IE Tab Extension \(Windows\)](#)

### For Mac Users:

1. Watch the video below which demonstrates how to install Surveillance Client on a MAC

[https://www.youtube.com/watch?v=\\_sJovaT-oD8&feature=youtu.be](https://www.youtube.com/watch?v=_sJovaT-oD8&feature=youtu.be)

[Click here to download Surveillance Client for MAC](#)

2. Watch the video which demonstrates how to playback and export footage from the Surveillance Client on a MAC

<https://www.youtube.com/watch?v=gOwoQZA9CRY>

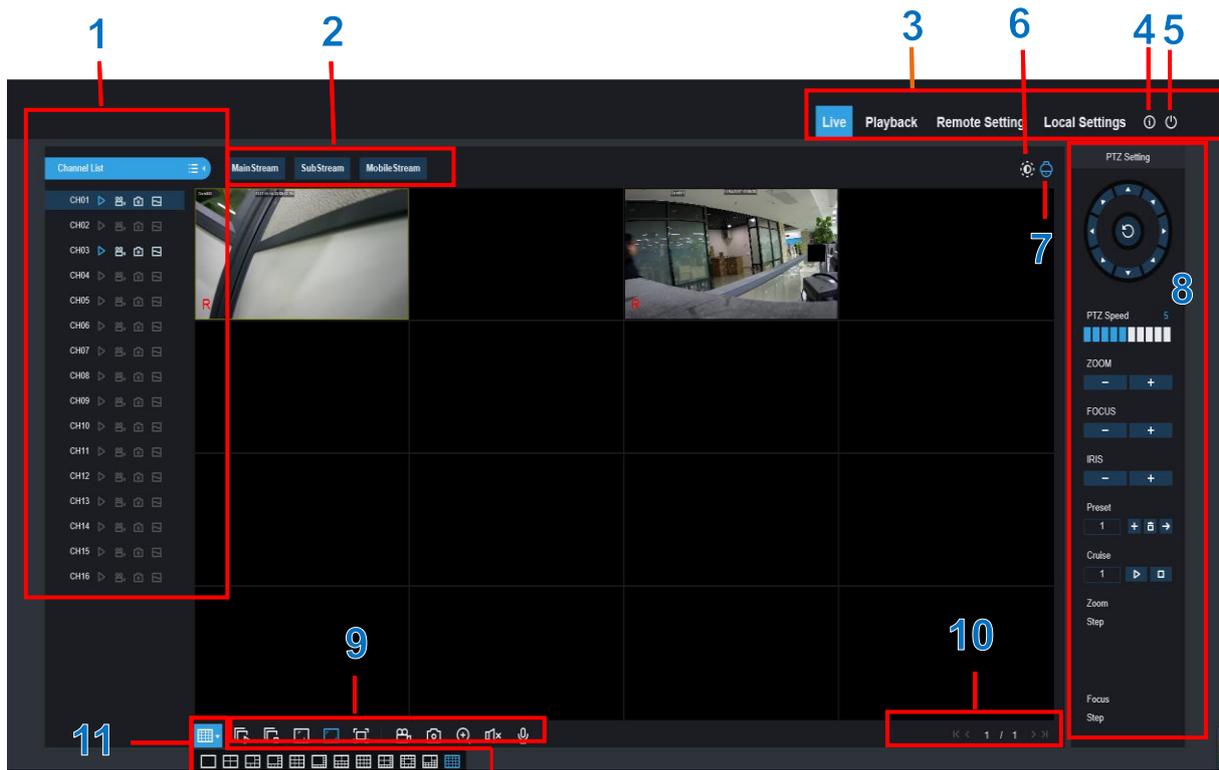
[Click here to download video player for MAC](#)

## 7.3 Web Client Manager

The web client supports to fully control the NVR with administrator account. Please make sure to protect your user name & password for preventing illegal login.

### 7.3.1 Live Interface

This is the first screen that opens after you have logged in to the Web Client. Here you can open or close live preview, record video to local computer manually, take snapshots of the screens, PTZ control, colour adjustment, etc.



#### 1- Channel List: Open the channel list for quick camera function

Click button to display the Channel List.

Click button to hide the Channel List.

- Turn the Live video stream on/off. The button is in blue colour if the live video stream is on.
- Manual Recording buttons. Click to start manually recording live stream video. Click again to stop recording. Manual recordings are saved to your computer. While in recording, the button is in blue colour.
- Manual snapshot button. Click to save a snapshot of the current live display to your computer.
- Bitrate button. Set camera to use mainstream, substream or mobile stream video settings. Mobile stream is available for IP channels only.

**2- Live Video Stream Options:**

**Mainstream:** View all live videos using high-quality mainstream video settings.

**Substream:** View all live videos using middle-quality substream video settings.

**Mobile Stream:** View all live video using lower-quality mobile stream video settings to conserve bandwidth. Available for IP channels only.

**3- Main Menus:**

**Live:** View live video from cameras.

**Playback:** View recorded video which is saved in NVR's HDD.

**Remote Setting:** Access functions of the NVR setting menus.

**Local Settings:** Set download locations for recordings and snapshots taken using Web Client, and choose file type for video files.

**4- Information:** Hover over to see system details.

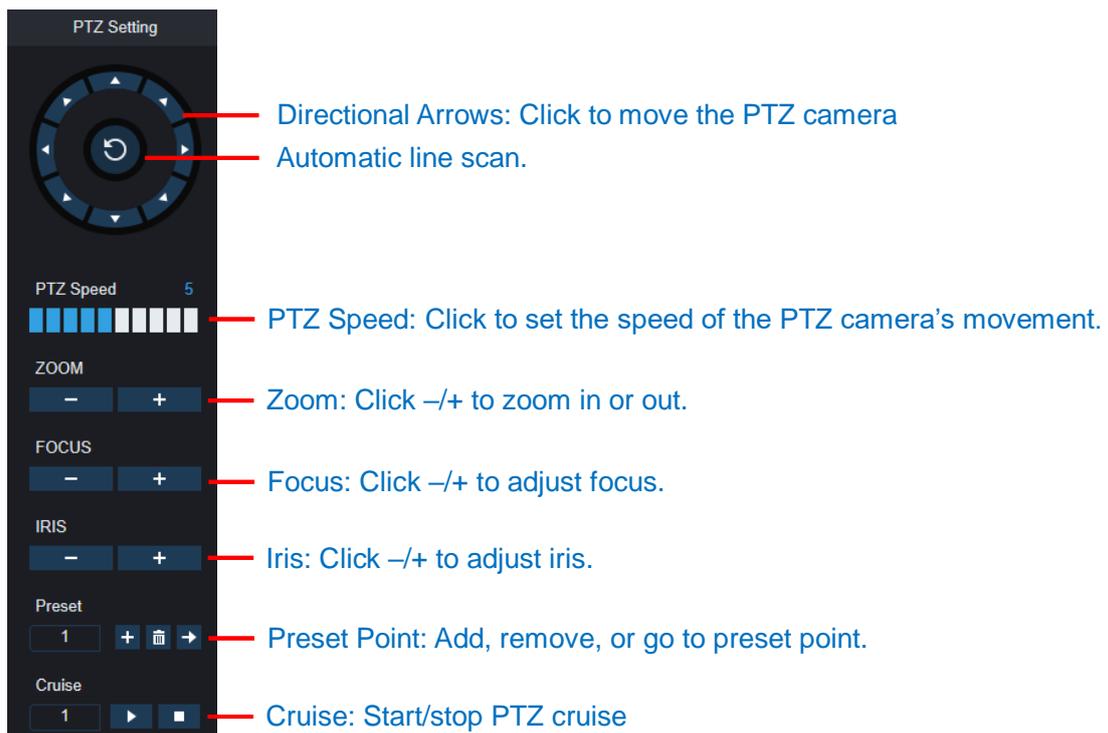
**5- Exit.**

**6- Colour Controls.** Click to display or hide the colour controls.



**7- PTZ Controls:** Click to display or hide the PTZ controls for using PTZ cameras.

**8- PTZ Controls**



9- Live View Control Buttons:



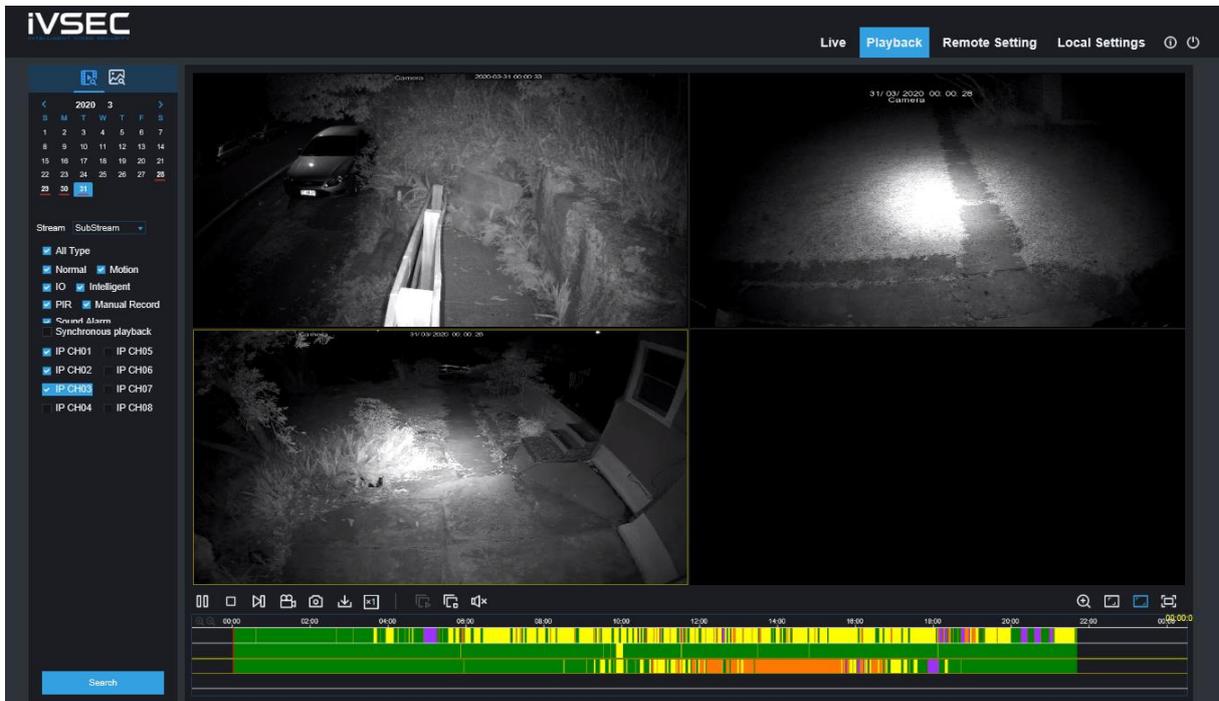
- Open the images on Live window.
- Close all the Live channels
- Original Proportions: Shows live video at the original proportions
- Stretch: Stretch live video to fit the full area for each channel on screen.
- To enlarge the web client to full screen.
- Manual Recording: Click to start manually recording for all displayed channels. Click again to stop recording. Manual recordings are saved to your computer.
- Snapshot: Click to save snapshots of all current displayed channels to your computer.
- Digital Zoom: Click upon on a live image, then click-and-drag over an area of the live image to enlarge. Right-click to return to the normal display.
- Volume Control. Volume is mute.

**10- Navigation:** Shows current page number for the channels shown on screen. Use the arrow keys to switch between pages.

**11- Page View:** Click to select how many channels appear on screen at a time.

### 7.3.2 Playback

You can search & play recording videos stored in the HDD inside the NVR, and download the videos to your computer.



**To search recordings:**

1. Click **Playback** in the top-right corner of the window.
2. Select a day on the calendar to search for recordings from. Days with recordings appear with a red underline.
3. Select the recording type to search for from the dropdown next to **Type**, or select **All** to search for all recordings.
4. To choose the video stream you want to search & play. If you want to play Substream recordings, please make sure you had set the NVR to record with Dualstream at [5.2.2.1 Record](#).
5. Check the channels you would like to search for recordings from. Check **Synchronous playback** to play all channels at once.
6. Click **Search**.
7. Recordings that fit your search will be displayed in the timeline. Click a section of video where you would like to begin playback and click the ▶ play button.

### 7.3.2.1 Playback Control Buttons



 **Play the recordings**

 **Pause**

 **Stop**

 **Go Forward One Frame:** Move frame-by-frame through playback. Only available when the **Synchronous playback** option is not checked.

 Click upon one of the channels which are being played and then click record button to record current video to your computer. Click again to stop recording.

 Click upon one of the channels which are being played and then click capture button to take a snapshot and save to your computer.

 Opens the Download menu, which allows you to download several video recordings at once.

	<input type="checkbox"/>	Start Time	End Time	Status	File Size
1	<input type="checkbox"/>	2020-03-31 00:00:00	2020-03-31 00:35:58	Not Downloaded	150.88M
2	<input type="checkbox"/>	2020-03-31 00:35:52	2020-03-31 00:36:28	Not Downloaded	2.63M
3	<input type="checkbox"/>	2020-03-31 00:36:22	2020-03-31 00:42:01	Not Downloaded	24.02M
4	<input type="checkbox"/>	2020-03-31 00:42:01	2020-03-31 01:42:30	Not Downloaded	253.96M
5	<input type="checkbox"/>	2020-03-31 01:42:30	2020-03-31 02:39:31	Not Downloaded	241.00M
6	<input type="checkbox"/>	2020-03-31 02:39:28	2020-03-31 02:40:01	Not Downloaded	2.46M
7	<input type="checkbox"/>	2020-03-31 02:39:58	2020-03-31 02:42:25	Not Downloaded	10.48M
8	<input type="checkbox"/>	2020-03-31 02:42:25	2020-03-31 03:05:05	Not Downloaded	95.65M
9	<input type="checkbox"/>	2020-03-31 03:05:02	2020-03-31 03:05:35	Not Downloaded	2.51M
10	<input type="checkbox"/>	2020-03-31 03:05:32	2020-03-31 03:37:03	Not Downloaded	133.11M

10 | 1 / 83 | Show from 1 to 10, total 821. Per page : 10

Choose the files you want to download, press **Start Download** button to begin, you will see the download status. Press **Stop Download** button to stop.

 **Playback Speed.** Click to choose the playing speed.

 **Play All Channels:** Click to play all channels you have chosen to searched. Only available when the **Synchronous playback** option is not checked.

 **Stop All Channels:** Click to stop playing all channels. Only available when the **Synchronous playback** option is not checked.

 **Digital Zoom:** Click upon on a playing video, then click-and-drag over an area of the video to enlarge. Right-click to return to the normal display.

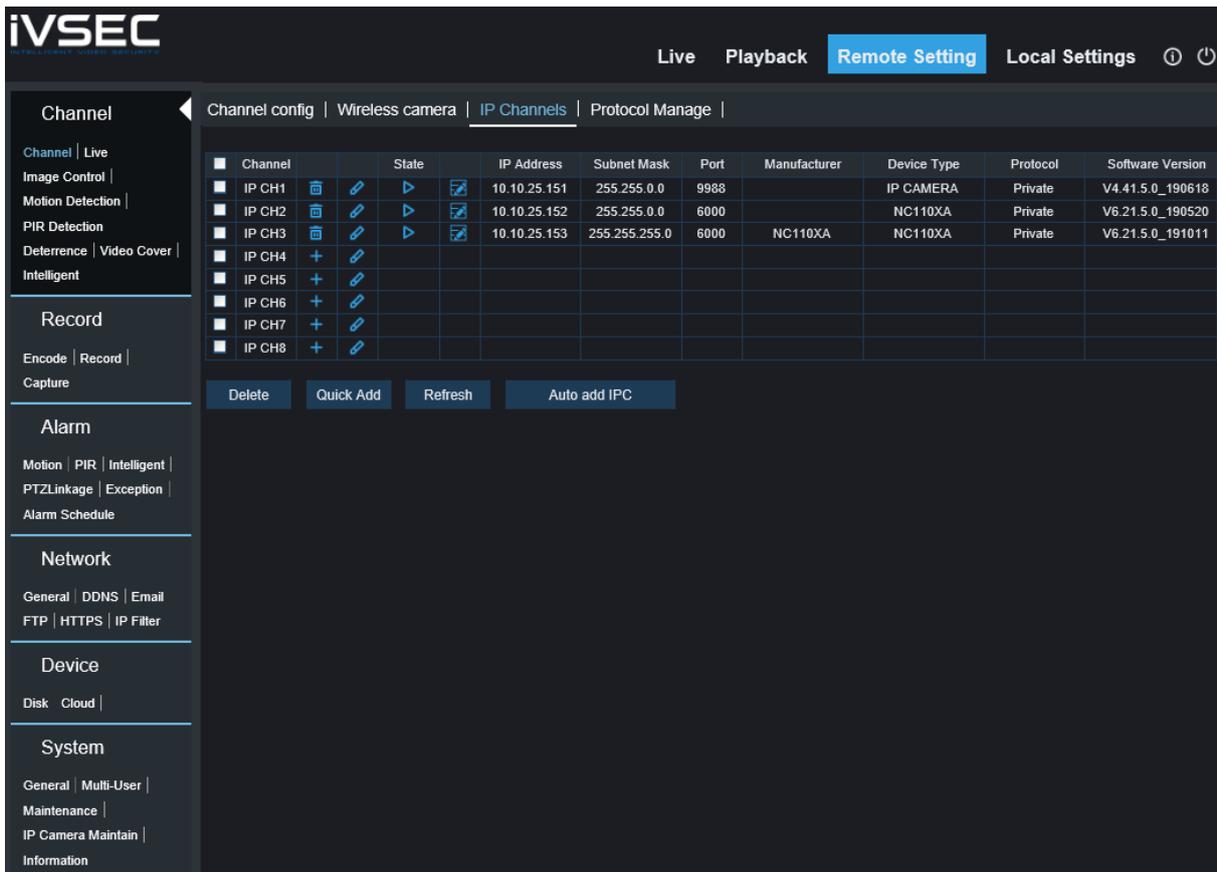
 **Original Proportions:** Shows the playing video at the original proportions

 **Stretch:** Stretch the playing video to fit the full area for each channel on screen.

 **To enlarge the web client to full screen.**

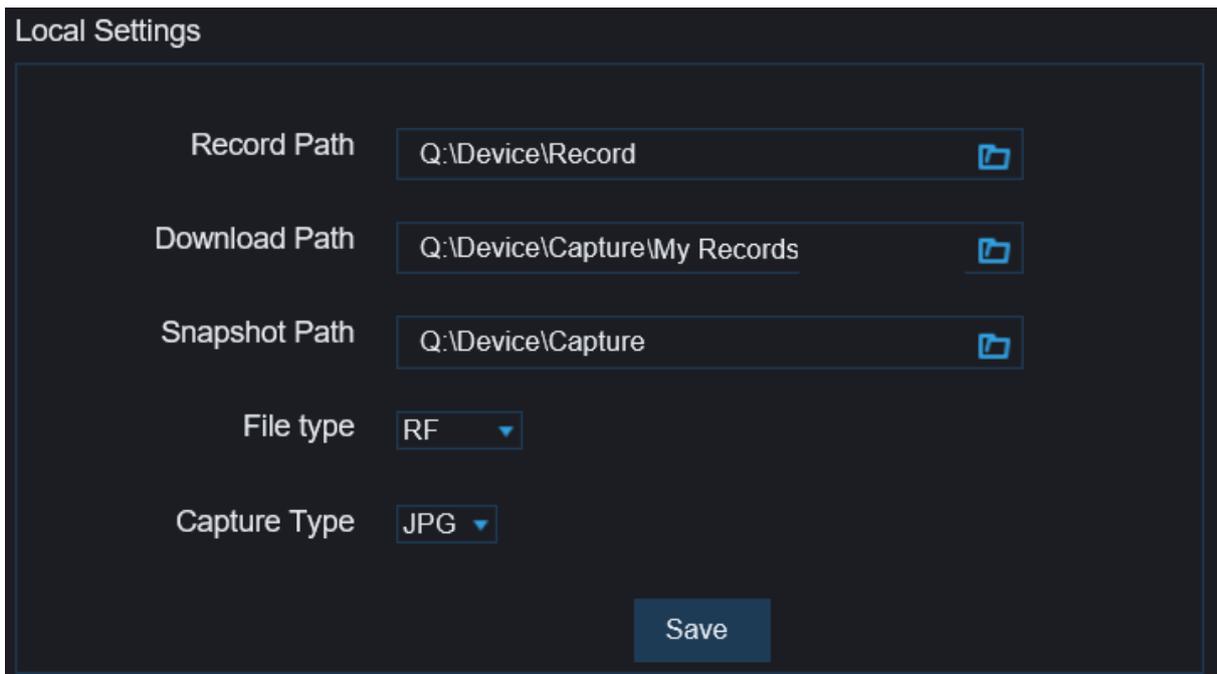
### 7.3.3 Remote Setting

Here you can remotely configure the settings of the NVR. Please see "[Chapter 5 NVR System Setup](#)" for more details on the NVR settings.



### 7.3.4 Local Setting

Set download locations for recordings and snapshots taken using Internet Explorer or Chrome using IE Tab extension, and choose file type for video files.



**Record Path:** Click  to browse for and select the folder where you would like the manual video recordings to be saved on your computer.

**Download Path:** Click  to browse for and select the folder where you would like to save the download video recordings to your computer.

**Snapshot Path:** Click  to browse for and select the folder where you would like the manual capture snapshots to be saved on your computer.

**File Type:** Choose your preferred file type for manual recordings. (RF, AVI or MP4)

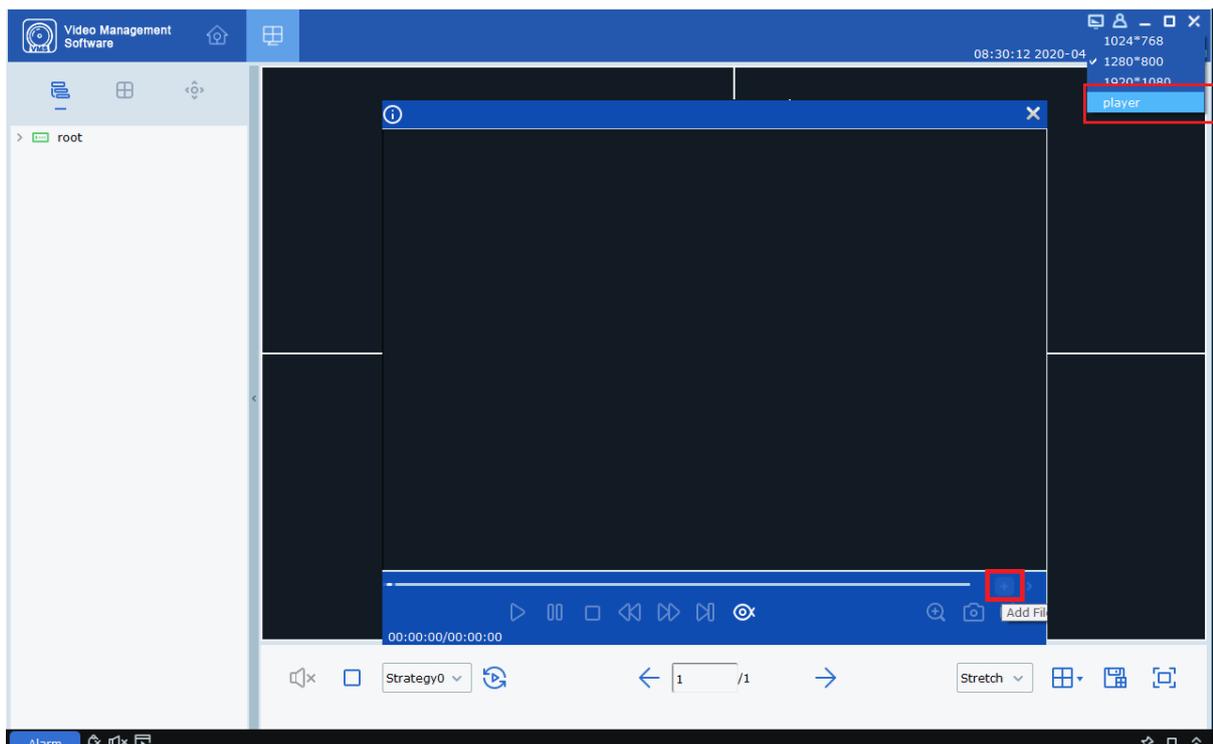
**Capture Type:** Choose your preferred snapshot file type (JPG, BMP or PNG)

**Save:** Click to save the modifications.

## Chapter 8 Viewing Backed Up Video on PC/Mac

To view footage that has been exported in AVI or MP4 format simply download and install VLC media player (available for Windows and MAC) <https://www.videolan.org>

Alternatively, you can review RF, AVI and MP4 footage using the inbuilt VMS player. [Click here to download](#). For VMS installation instructions please refer to <https://youtu.be/jy5cYr93bUY>



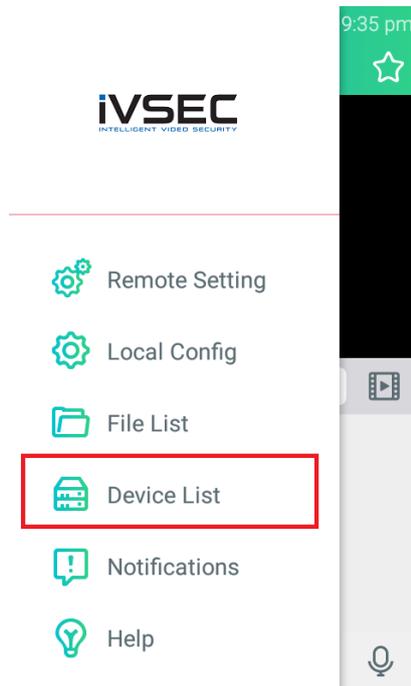
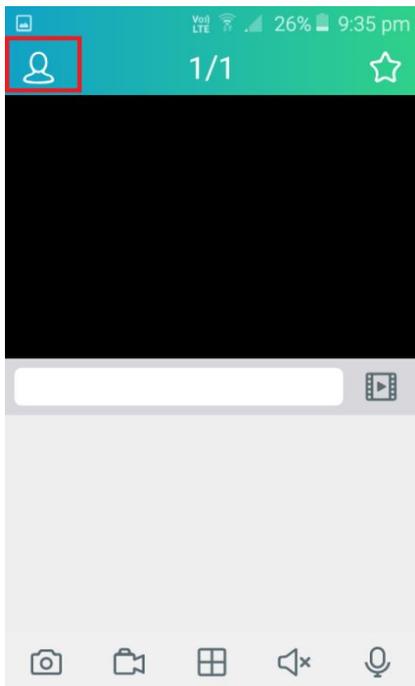
# Chapter 9 Remote Access via Mobile Devices

**Prerequisites:** The NVR must be connected to an active Internet connection.

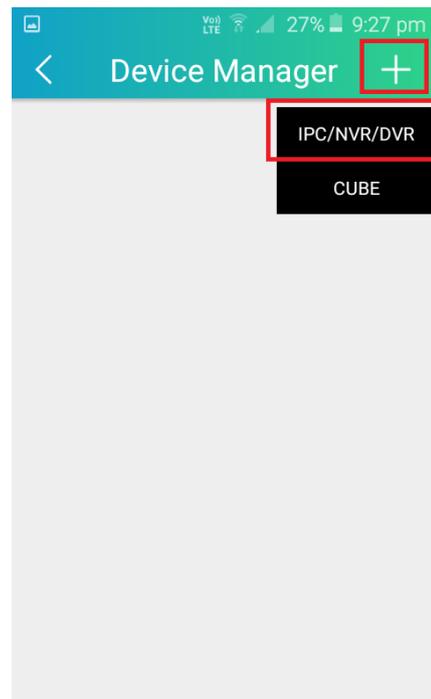
The NVR can be accessed remotely via the IVSEC X mobile application

1) Download IVSEC X from Google Play Store Apple Store

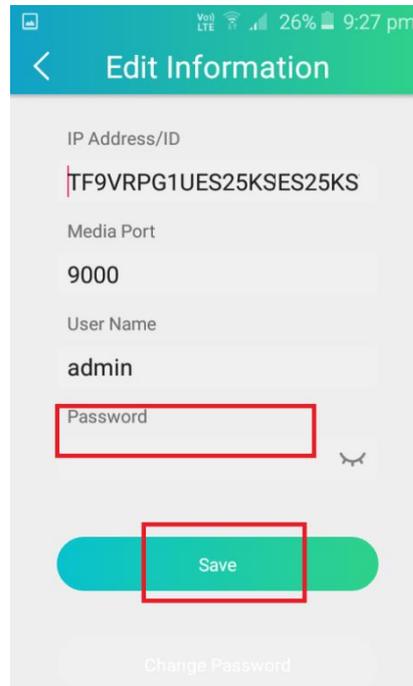
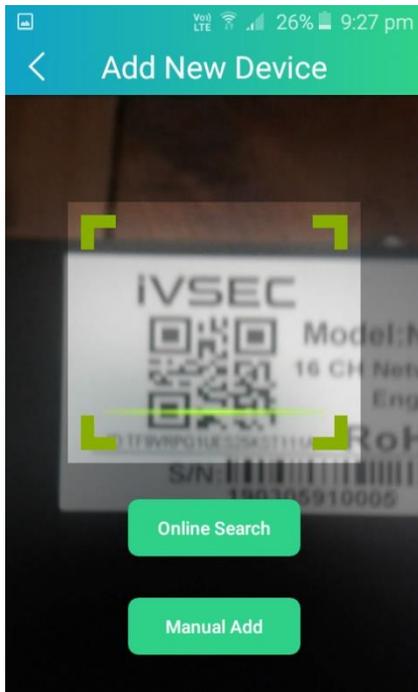
2) Open the app, click on  or , then click on  **Device List**



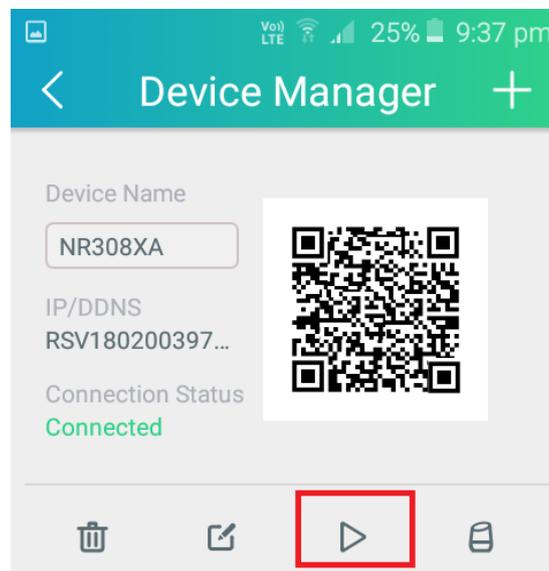
3) Touch the  icon, then touch 



- 4) Scan the QR code on top of the NVR. Then, enter the NVR password and press “Save”



- 5) Connection Status should be **Connected**. Click on the  to view the cameras



If the Connection Status shows: **Connect Close** ensure that DHCP is enabled in the Network settings of the NVR and that your Internet connection is working.

# Chapter 10 Appendix

## 10.1 FAQ

1. Q: How to setup the IVSEC X app on my Smartphone  
A: Please refer to YouTube link: <https://youtu.be/71mvg5QdsfY>  
Scan the appropriate QR code below to download the IVSEC X app



2. How to reduce camera buffering when accessing IVSEC cameras on the mobile app  
A: Please refer to YouTube link: <https://youtu.be/fPismrsE3q8>
3. Q: Where can I download the IVSEC X-Range NVR User manual  
A: [Click here to download IVSEC X User Manual](#)
4. Q: Where can I download the IVSEC X NVR / Camera Quick User Guide  
A: [Click here to download IVSEC X NVR Quick User Guide](#)  
[Click here to download IVSEC X Camera Quick User Guide](#)
5. Q: How to setup motion detection on an IVSEC X-Range NVR  
A: Please refer to YouTube link: <https://www.youtube.com/watch?v=HpR8Jvz2iD8>
6. Q: How to configure Event Triggered Recording  
A: [Click here to download ETR Instructions](#)
7. Q: How to export footage from an IVSEC X-Range NVR  
A: Please refer to YouTube link: <https://www.youtube.com/watch?v=NYxL970aR6E>
8. Q: How to factory default an IVSEC X-Range NVR  
A: Please refer to YouTube link: <https://www.youtube.com/watch?v=JJdXepypFI>
9. Q: How to login to an IVSEC NVR or camera using Internet Explorer or Chrome  
A: Please refer to YouTube link: <https://youtu.be/H-3uULjk0Lk>  
[Click here to download Chrome IE Tab Extension \(Windows\)](#)

10. Q: How can I search for IVSEC devices on a network or change an IP address  
A: Please refer to YouTube link: <https://youtu.be/2mVoYhTRmRo>  
[Click here to download device config tool for Windows](#)
  
11. Q: How to install the VMS application for Windows  
A: Please refer to YouTube link: <https://youtu.be/jy5cYr93bUY>  
[Click here to download VMS \(Windows\)](#)
  
12. Q: How to remotely access your NVR / cameras using the Windows VMS application  
A: Please refer to YouTube link: <https://youtu.be/GIbMN6PiAJc>  
[Click here to download VMS \(Windows\)](#)
  
13. Q: How to add 2N IP Verso Intercom camera to an IVSEC NVR:  
A: Please refer to YouTube link: [https://youtu.be/bS47s8fYx\\_o](https://youtu.be/bS47s8fYx_o)
  
14. Q: How to Setup 3rd Party cameras onto an IVSEC X-Range NVR  
A: Please refer to YouTube link: <https://www.youtube.com/watch?v=bUwHHjlbZWg>  
[Click here to download Device manager tool](#)  
[Click here to download IVSEC PTZ Search Tool](#)
  
15. Q: Where can I download the previous version of Surveillance Client for Windows  
[Click here for Surveillance client \(Win 32-bit\)](#)  
[Click here for Surveillance client \(Win 64-bit\)](#)
  
16. Q: How to setup the surveillance client on Windows  
A: Please refer to YouTube link: <https://youtu.be/tbakdNGsKsw>
  
17. Q: Where can I download the Surveillance client, device config tool & video player for MAC  
[Click here for Surveillance client \(MAC\)](#)  
[Click here for Device Config Tool \(MAC\)](#)  
[Click here to download video player \(MAC\)](#)
  
18. Q: How to setup the surveillance client on MAC  
A: Please refer to YouTube link: [https://youtu.be/\\_sJovaT-oD8](https://youtu.be/_sJovaT-oD8)
  
19. Q: How to playback and export footage from surveillance client on a MAC  
A: Please refer to YouTube link: <https://youtu.be/gOwoQZA9CRY>
  
20. Q: How to reset my NVR password?  
A: [Click here to download IVSEC Password Reset Procedure](#)
  
21. Q: Where can I find additional support  
A: Scan the QR code below or go to [www.ivsecurity.com.au/FAQ](http://www.ivsecurity.com.au/FAQ)



Please note that the first point of contact should be your original System Installer  
Alternatively, email [service@ivsecurity.com.au](mailto:service@ivsecurity.com.au) or call 1300 368 348.

**Note:** When emailing or calling for Technical Support please provide:

- Model and serial number of your IVSEC product
- Where was the equipment purchased from (Business name and contact number)
- Description of the issue you are experiencing

## 10.2 Usage Maintenance

1. To shut down NVR, please firstly shut down the system and then turn off the power. Do not turn off the power directly or HDD data will be lost or damaged.
2. Please keep NVR away from heat sources or direct sunlight.
3. Clean dust around the NVR. Make sure the good ventilation of NVR so as to ensure the good heat dissipation.
4. Do not plug audio or video cables into the NVR while it is turned on (hot plugging). Best practice is to have all required cables connected before powering on the NVR.
5. If you live in an area that experiences regular brown outs or black outs it is recommended that you connect the NVR to an Uninterruptable Power Supply (UPS) that has surge protection. Contact your for information regarding this product