Swann
Security Made Smarter

PRO-SERIES HD

# Professional HD Security System

## INSTRUCTION MANUAL

# Important Information

## FCC Verification

This equipment has been tested and found to comply with the limits for Class B digital device, pursuant to part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna
- Increase the separation between the equipment and the receiver
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected
- Consult the dealer or an experienced radio/TV technician for help

These devices comply with part 15 of the FCC Rules. Operation is subject to the following two conditions:

- These devices may not cause harmful interference
- These devices must accept any interference received, including interference that may cause undesired operation

**Important Notice:** All jurisdictions have specific laws and regulations relating to the use of cameras. Before using any camera for any purpose, it is the buyer's responsibility to be aware of all applicable laws and regulations that prohibit or limit the use of cameras and to comply with the applicable laws and regulations.

## FCC Regulation (for USA): Prohibition against eavesdropping

Except for the operations of law enforcement officers conducted under lawful authority, no person shall use, either directly or indirectly, a device operated pursuant to the provisions of this Part for the purpose of overhearing or recording the private conversations of others unless such use is authorized by all of the parties engaging in the conversation.

**Warning:** Changes or modifications made to this device not approved expressly by the party responsible for compliance could void the user's authority to operate the equipment.

## Important Safety Instructions

- Do not operate if wires and terminals are exposed
- Do not cover vents on the side of your device and allow adequate space for ventilation
- Only use the power adapter supplied with your DVR

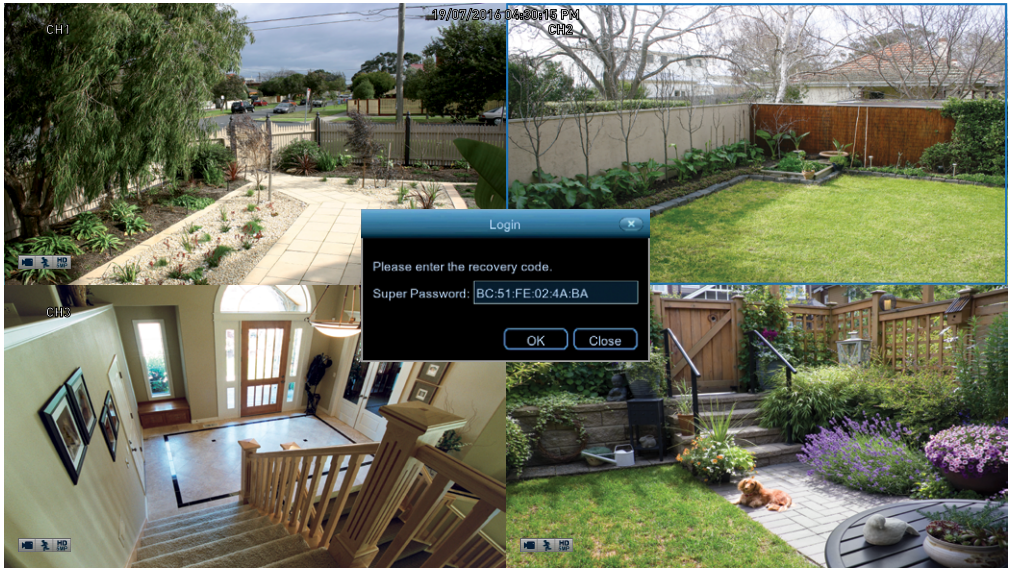
## About this Instruction Manual

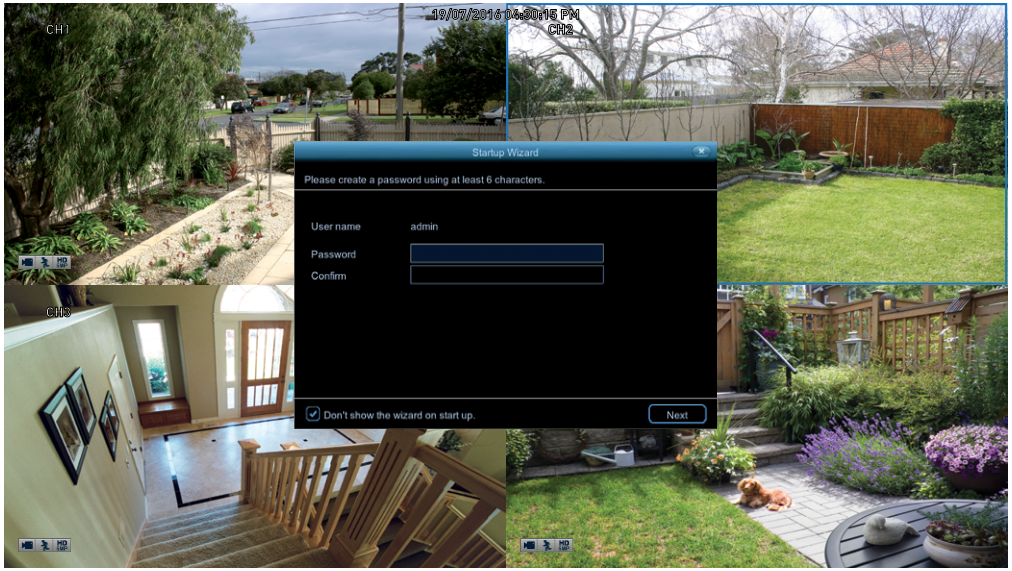
This instruction manual is written for the DVR-4980 series and was accurate at the time it was completed. However, because of our on-going efforts to constantly improve our products, additional features and functions may have been added since that time.

**Important Password Information**

This DVR does not have a default password. A password is created during the Startup Wizard. If password protection has been enabled and you have forgotten your password, your DVR's MAC address can be used to create a new password (see page 3 - Password Recovery).

# Password Recovery




**Forgotten your password? Please do the following:**

**1.** Right-click the mouse on the Live View screen to display the Menu Bar then click "Main Menu".

**2.** At the password login screen click "Forgot Password" then click "Yes".

**3.** After a short moment, you will receive a password reset request email containing your DVR's MAC address (if it's not in your inbox, check your junk or spam folder).

**4.** Input the MAC address including the semicolons (see left example) then click "OK".

**5.** A message will appear on-screen stating that your password has been reset. Click "OK" to continue.

**6.** Enter a new password (see bottom left example). The password has to be a minimum of six characters and can contain a mixture of numbers and letters. Use a password that you are familiar with, but is not easily known to others.

**7.** Write down your password in the space provided below for safe keeping.

**8.** Complete the Startup Wizard as normal (the settings that you previously selected in the Startup Wizard will remain unchanged).

**Don't forget to write down your password:** _____

**I haven't created an email for my DVR, what can I do?** Don't worry, we're here to help. Please contact Swann Helpdesk & Technical Support (phone numbers located on page 74) for assistance.

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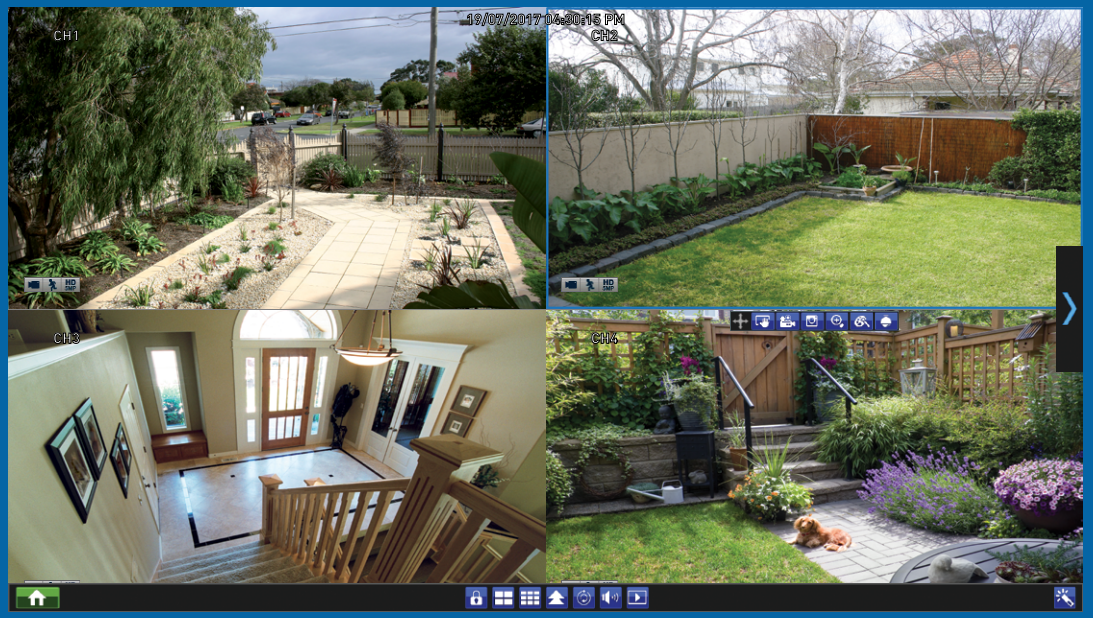

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## Live View

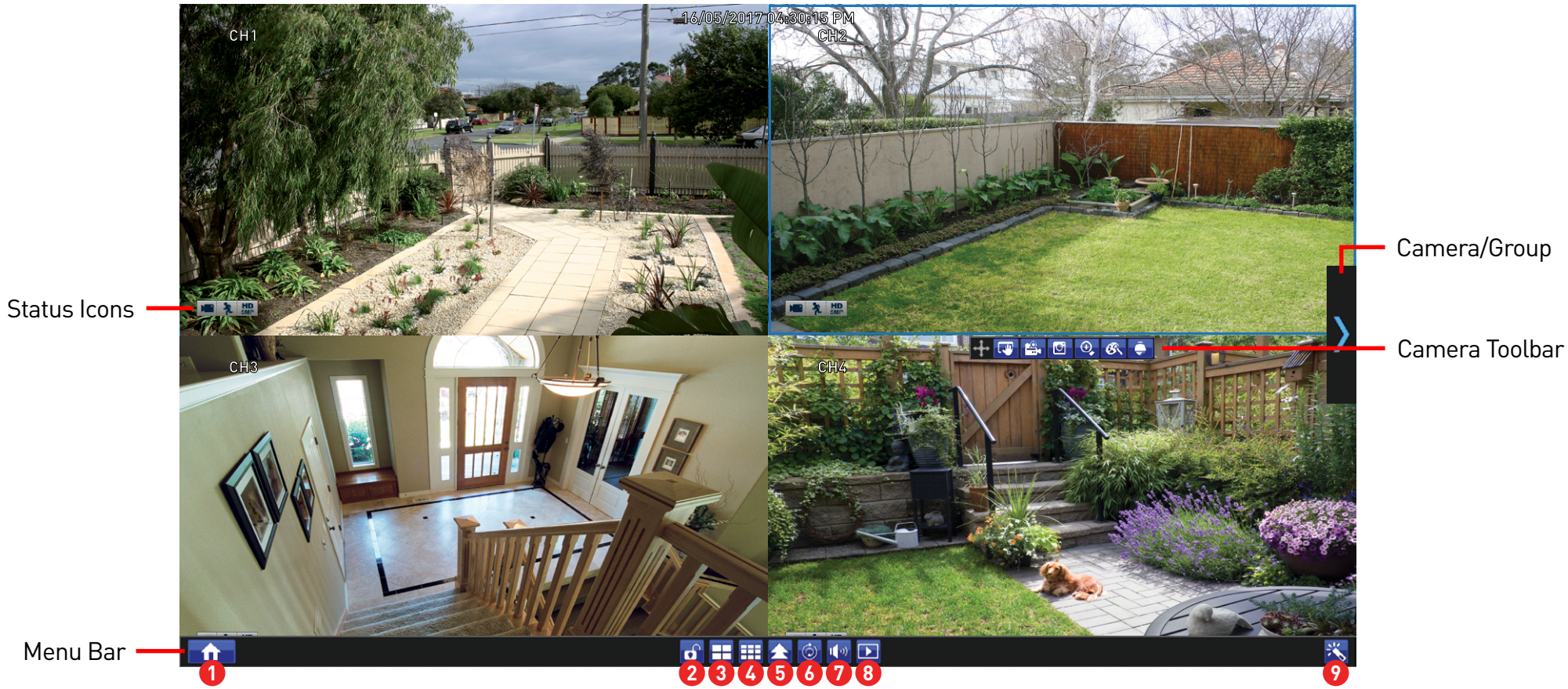
Live View is the default display mode for your DVR. Each camera connected will be displayed on-screen. You can check the status or operation of your DVR and cameras using the icons and Menu Bar on the Live View screen. Right-click the mouse to access the Menu Bar.






# Live View Mode

Live View mode is the default display for your DVR. Each camera connected will be displayed (multiple view modes available). You can check the operation of your DVR by using the status icons on the Live View screen. The date and time as well as the name for each camera is also displayed.




Double-click a live video channel to view full screen.

Click & drag a live video channel to reposition it.

Right-click the mouse in Live View mode to display the Menu Bar (see page 8 more information).

Left-click a camera to access the Camera Tool-bar. This provides access to functions such as instant playback and to change image settings.

# Live View Icons & Controls

## Menu Bar

**1.** Click this to open the Main Menu.

**2.** Lock your DVR to prevent access to the Main Menu when "Menu Timeouts" is turned off.

**3.** Four camera view.

**4.** Nine camera view (this will display eight cameras on the 8 channel model).

**5.** Click this to select from one of the multi-screen viewing modes available.

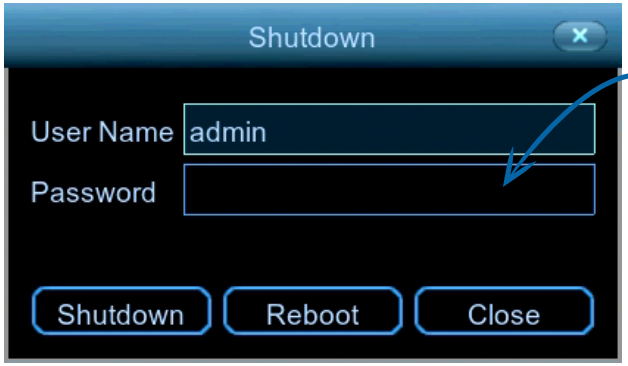
**6.** Click this to repeatedly cycle through each video channel full screen. Each video channel will be displayed for five seconds.

**7.** Click this to change the volume or mute the audio (click the speaker icon to mute).

**8.** Click this to access the Search menu. From here you can play previously recorded videos.

**9.** Click this to enter the Startup Wizard.

**Please note:** The 16 channel model will have additional camera views available on the Menu Bar (twelve camera and sixteen camera views).




To ensure the integrity of your recordings, enter your password and click "Shutdown" when powering off your DVR.

**Camera/Group:** When viewing a single camera or a group of cameras, move the mouse to the far left or right to reveal the camera/group button. Click to cycle through each camera or group of cameras.

## Status Icons



This icon indicates that the camera is being recorded (either manually or by motion).



This icon indicates that your DVR is detecting motion from the camera.




This icon indicates that your DVR is recording at 5 megapixel resolution.




This icon indicates that the PIR camera has detected one or more warm objects.



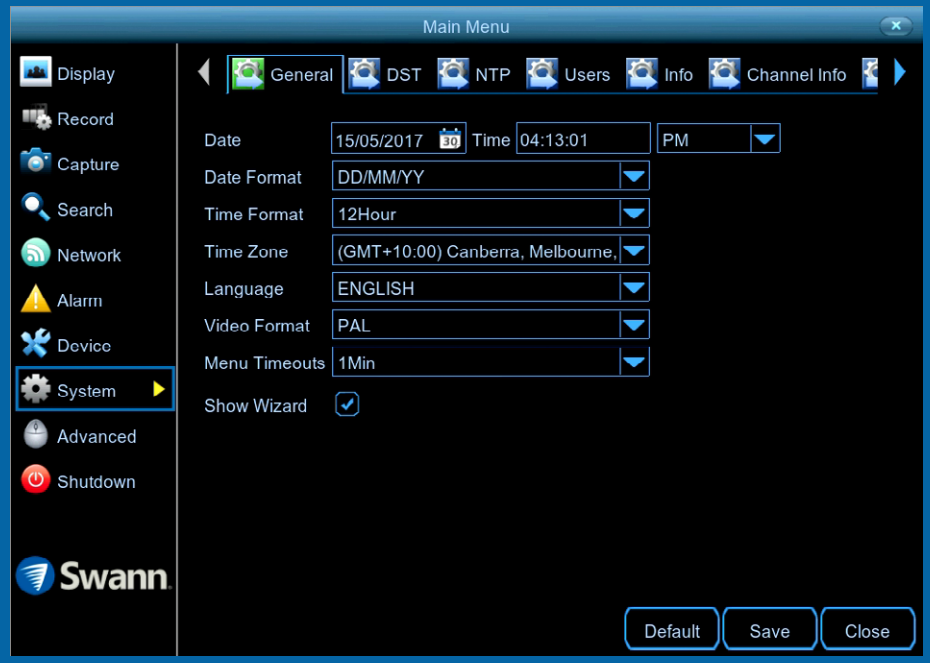

This icon indicates that your DVR does not have a hard drive or it fails to detect the drive that is installed.

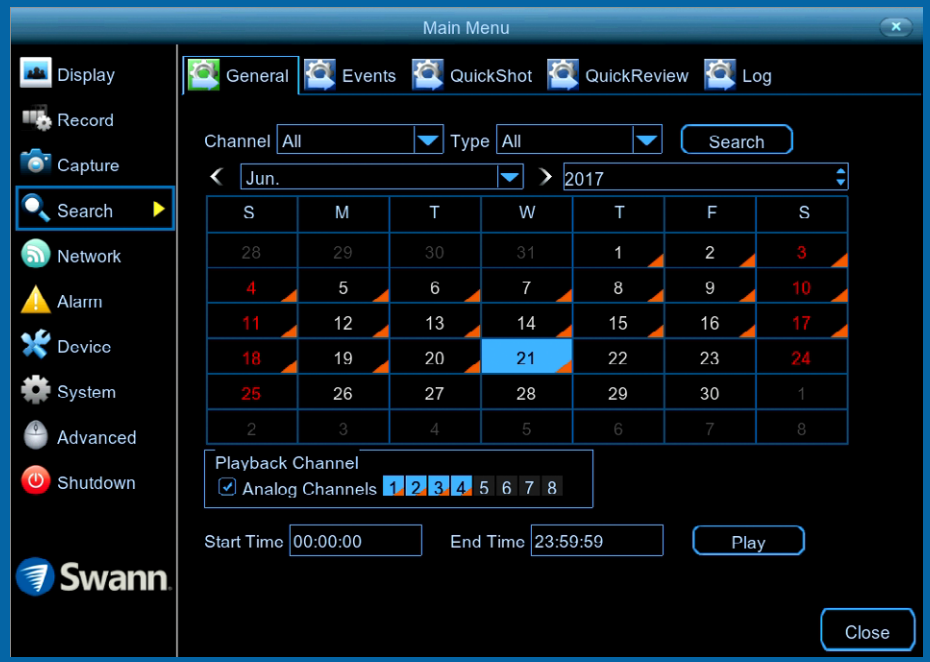



This icon indicates that the channel has lost the feed from its camera.

## Main Menu

The “Main Menu” is where you control the various actions and options that are available on your DVR. You can also access previously recorded video for playback and to copy to a storage device such as a USB flash drive. To maintain system integrity, a firmware upgrade can be performed when available and access to the “Shutdown” menu to restart or safely turn off your DVR.

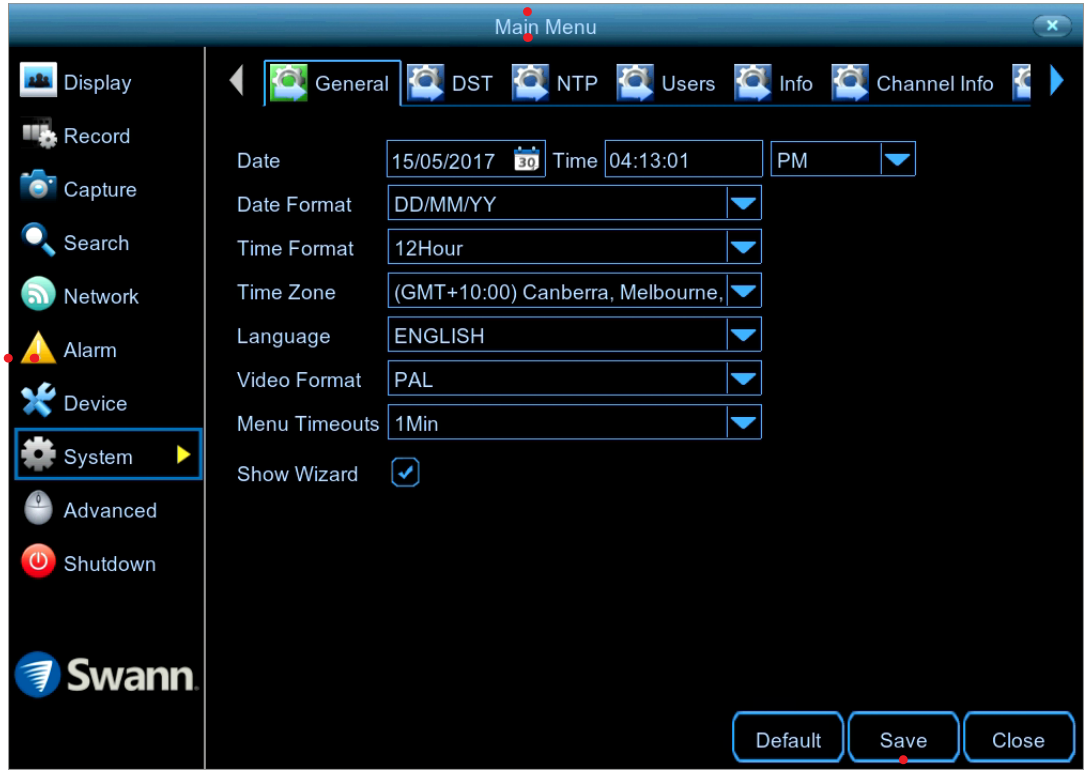


# Menu Layout

The various functions and options available, are categorised on the left-hand side of the Menu.

Clicking each category will reveal a number of tabs or sub-categories that can be changed from their default setting.



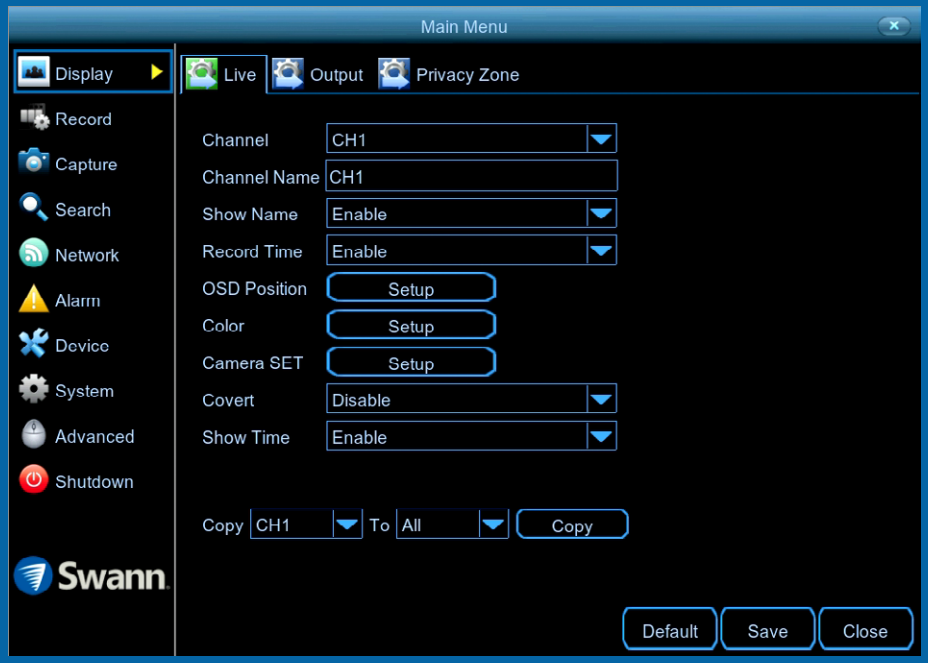

To exit or access the previous menu, right-click the mouse.

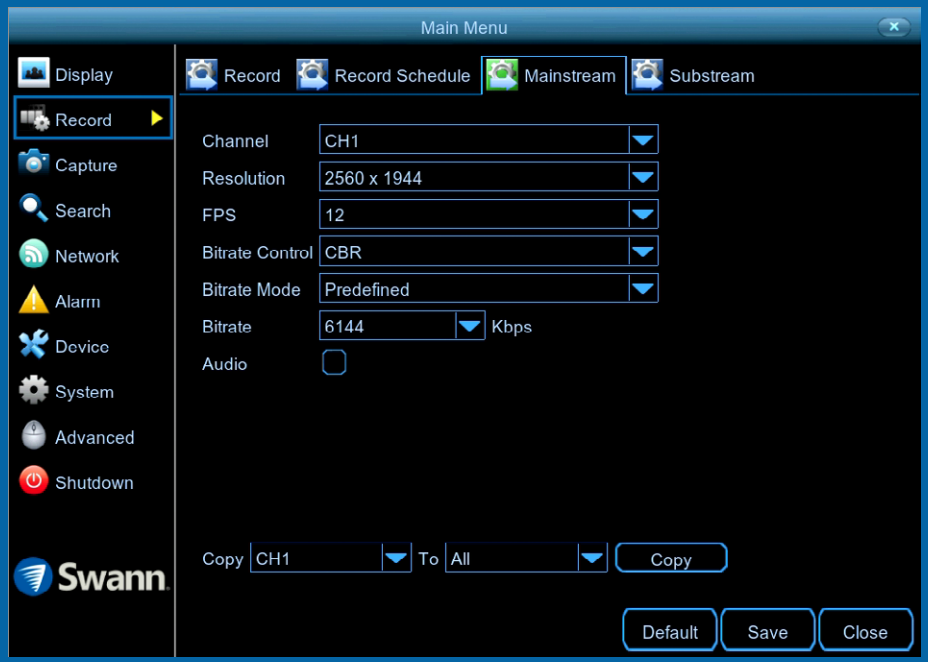


Save changes that have been made or restore default settings.

## Camera Configuration

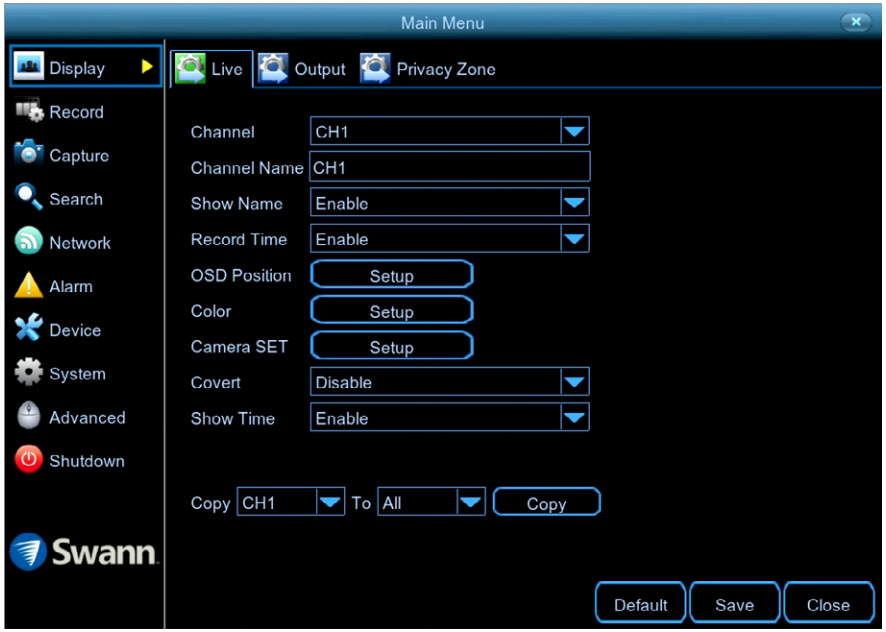
The camera configuration options are available in the “Display”, “Record”, “Alarm” and “Device” menus that are accessible from the Main Menu. You can change the resolution, bitrate, OSD (on-screen display) position as well as image settings for hue, brightness, contrast and saturation. Your DVR has controls for detecting motion, allowing you to define specific areas to alert you to a potential threat in and around your home. You also have the ability to create one or more zones for privacy.



# Display: Live

The configuration options available allow you to name each camera relevant to where it has been installed as well as the ability to adjust image settings such as brightness and contrast. You can also enable covert mode to hide the camera's image in Live View mode.




- Don't forget to click "Save" to apply settings.
- Use the "Copy" function to apply all settings to the other cameras.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

**Channel:** Select a camera that you would like to edit.

**Channel Name:** Enter a name for the camera you've selected. It can be up to 8 characters in length.

**Show Name:** Leave this enabled to display the camera name in Live View mode, otherwise click the drop down menu to disable.

**Record Time:** It's recommended to leave this enabled, as a timestamp will be embedded on all video recordings. This allows you to easily identify when events have occurred. You can disable this if you wish.

**OSD Position:** Allows you to change the position of the camera name on the Live View screen. Click the "Setup" button then use the mouse to reposition the camera name. Right-click the mouse then click "Save".

**Color:** Click the "Setup" button to access the image adjustment tools:

**Hue:** This changes the color mix of the image.

**Bright:** This changes how light the image appears to be.

**Contrast:** This increases the difference between the blackest black and the whitest white in the image.

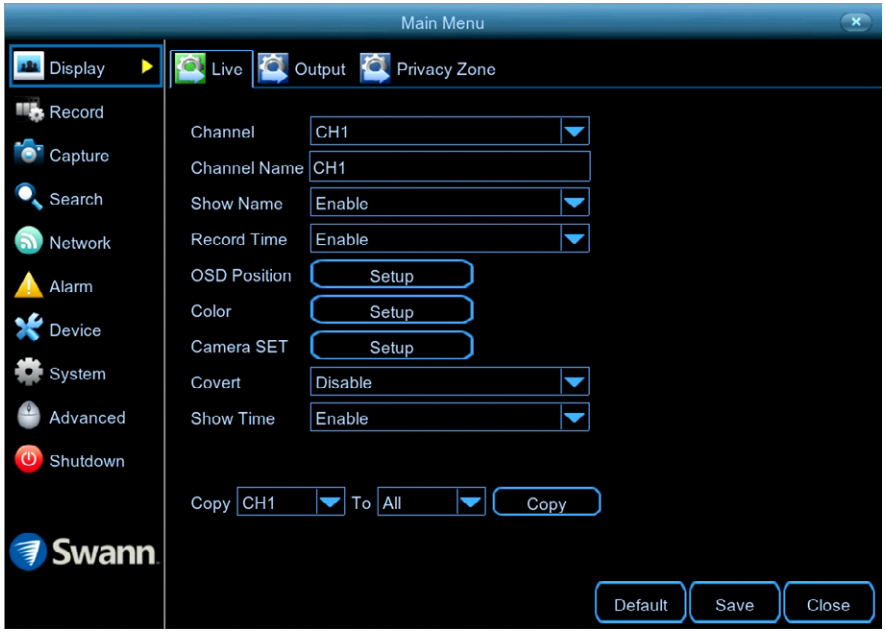
**Saturation:** This alters how much color is displayed in the image.

Use the slider to adjust each setting. When finished, click the "Save" button then click "Close" to exit.

**Please note:** Any changes made to the image settings available will affect your recordings.

*(continued on next page)*

# Display: Live




- Don't forget to click "Save" to apply settings.
- Use the "Copy" function to apply all settings to the other cameras.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

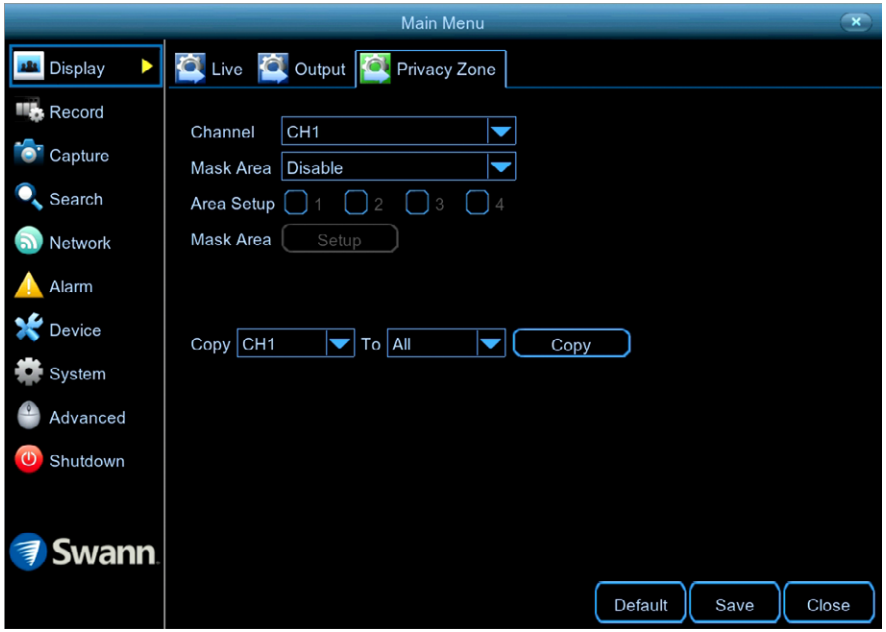
**Camera SET:** This setting is used to instruct your DVR on the camera type connected. For the cameras included with your DVR, leave the default setting. However, if you are connecting cameras that you have purchased previously or upgrading from an older security system and the image is black & white, change this to TVI or AHD, depending on your camera type. Click the "Setup" button then select the camera type for your camera. If the image is in color, the correct camera type has been selected.

**Covert:** When enabled, the camera will detect motion and trigger your DVR to record, but you will not see an image of the camera in Live View mode. This may be suitable if your DVR and TV are displayed in a public area (shop, warehouse, school, etc.), but you don't want others to see an image from the camera.

**Show Time:** By default, the date and time is displayed in Live View mode. You can disable this if you wish.

# Display: Privacy Zone

This function can be used to obscure all or part of your image for privacy (up to four privacy masks can be created per camera). You can also use this to minimize false triggers when motion is detected. Areas obscured by a mask won't be shown live or recorded.




- Don't forget to click "Save" to apply settings.
- Use the "Copy" function to apply all settings to the other cameras.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

**Channel:** Select a camera that you would like to edit.

**Mask Area:** To create a mask, click the drop down menu to enable.

**Area Setup:** Click the checkbox on the number of privacy masks that you want to create. Up to four privacy masks can be created per camera.

**Mask Area:** Click the "Setup" button to create one or more masks (see page 15 - Creating a Privacy Mask).

# Creating a Privacy Mask







**1.** Depending on the number of masks that you want to create, each mask will be numbered. To reposition the mask, click and hold the mask number then move the mask to the desired location.

**2.** To resize the mask, click and hold the bottom right corner of the mask then resize to the desired size. You can reposition and resize each mask to overlap each other.

In the example provided on the left, two masks have been created to block out cars and pedestrians adjacent to the front yard of the house. This will minimise false triggers and block movement that is not relevant to entry via the front entrance.

**3.** When finished, right-click to exit then click "Save" to apply. Areas obscured by a mask won't be shown live or recorded (see below left).

To remove a mask, uncheck the relevant checkbox next to "Area Setup" then click "Save" to apply.

# Record: Mainstream

The functions available here allow you to change the resolution, frame rate and bitrate for each camera connected. By default the recording resolution is automatically selected to fit in with the capabilities of the provided cameras.




- Don't forget to click "Save" to apply settings.
- Use the "Copy" function to apply all settings to the other cameras.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

**Channel:** Select a camera that you would like to edit.

**Resolution:** By default the recording resolution is automatically selected to match the capabilities of the provided cameras. If you have an older analogue camera connected, lower the resolution to "960 x 480" for NTSC and "960 x 576" for PAL, to match the camera's recording capability.

**FPS:** The number of frames per second (fps) that your DVR will record. The default is 12fps, however you can change this if needed. In the HomeSafe View app, you can select "Mainstream" in Live mode to view your cameras. Lower the frame rate if you're having issues streaming to your mobile device (lowering the frame rate to 6fps for example, will reduce the bandwidth required without sacrificing image quality).

**Bitrate Control:** CBR (Constant Bitrate) utilises a fixed bitrate and bandwidth to record video. This means your DVR will use the same number of bits throughout the entire recording, regardless of what is happening on-screen. VBR (Variable Bitrate) utilises a bitrate and bandwidth that changes when your DVR is recording. The bitrate will increase or decrease depending on how complex the scene is.

**Which method should I choose?** Scene complexity can vary significantly over several hours of recorded video, and the bitrate you select for recording will have an effect on image quality, bandwidth consumption, and hard drive storage. A complex scene with moving action, such as traffic on a city street, or a scene with a lot of contrasting colors, will affect image quality and bandwidth consumption more than a less complex scene with little action or movement.

*(continued on next page)*

# Record: Mainstream




- Don't forget to click "Save" to apply settings.
- Use the "Copy" function to apply all settings to the other cameras.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

**CBR:** This is the default method of control that your DVR will use to record video. If you have cameras placed in high traffic areas, CBR is the recommended control method. As the bitrate is fixed, the image quality will be consistent throughout the entire recording. This will assist when identifying people or objects.

**VBR:** If you have cameras placed in low traffic areas, VBR is the recommended control method. As the bitrate is variable, your DVR can use a lower bitrate if there is little to no movement detected. This will result in a lower recording size as well as a lower bandwidth requirement.

When choosing VBR, you can select the recording quality that will define the variable bitrate used. You can select from lowest to highest.

**Bitrate Mode:** You have the choice of selecting a predefined or user-defined bitrate. For most instances, the default selection will be suitable.

**Bitrate:** The amount of data that your DVR will use to record video. The higher the bitrate, the more space each recording will consume on the hard drive. The default bitrate is 6144Kbps. Change the bitrate if you're having issues streaming to your mobile device via the HomeSafe View app (when selecting "Mainstream" in Live mode to view your cameras). Decreasing this will consume less bandwidth when streaming.

**Audio:** Click the checkbox if you have an audio source connected to the DVR's audio input(s) (for 8 channel models, this option is on camera input 1 only).

**Please note:** Selecting the appropriate recording settings is dependent on camera location, lighting conditions and the level of quality required. Some experimentation is recommended to select the best settings.

# Record: Substream

The functions available here allow you to control how video is streamed to your mobile device using the HomeSafe View app. You can change the frame rate and bitrate if you're having issues streaming live video from your DVR.




- Don't forget to click "Save" to apply settings.
- Use the "Copy" function to apply all settings to the other cameras.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

**Channel:** Select a camera that you would like to edit.

**Resolution:** The default resolution is 432 x 320. You can select a lower resolution if you're having issues streaming to your mobile device via the HomeSafe View app (especially when viewing multiple cameras).

**FPS:** The number of frames per second (fps) that your DVR will process when streaming to your mobile device via the HomeSafe View app. For most instances, the default frame rate will be suitable. Change this to 10fps or 15fps for cameras that monitor medium to high traffic areas. This results in smoother motion, but just be aware this will increase the bandwidth required.

**Bitrate Control:** Change this to VBR. This will result in a lower recording size as well as a lower bandwidth requirement. You can select the recording quality that will define the variable bitrate used, from lowest to highest.

**Bitrate Mode:** You have the choice of selecting a predefined or user-defined bitrate. For most instances, the default selection will be suitable.

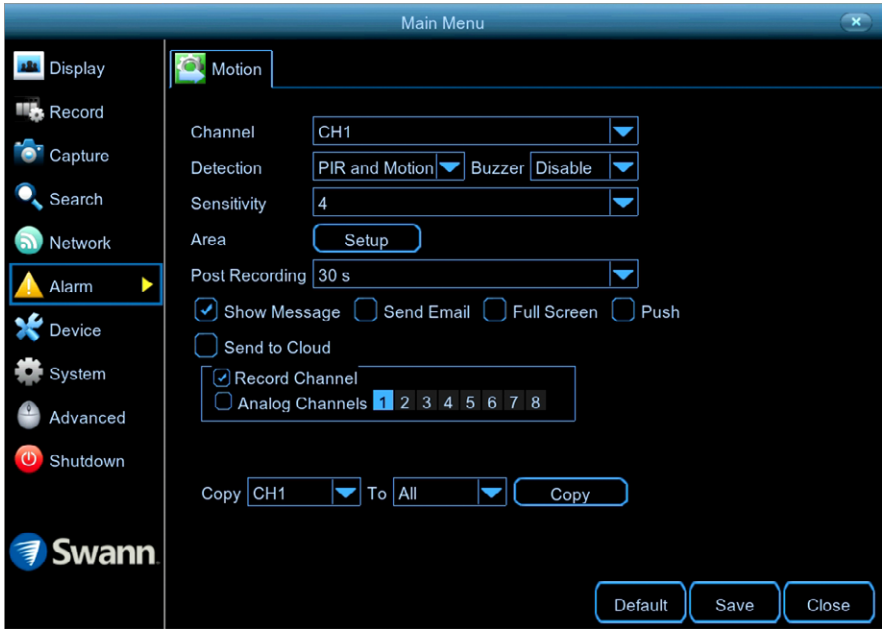
**Bitrate:** The amount of data that your DVR will use to stream video to your mobile device. For cameras that monitor medium to high traffic areas, increase the bitrate to add more detail to the camera's image, but just be aware this will increase the bandwidth required. Increase the bitrate in small doses until you are satisfied with the image quality.

**Audio:** Click the checkbox if you have an audio source connected to the DVR's audio input(s) (for 8 channel models, this option is on camera input 1 only).

**Please note:** When streaming live video, the quality is dependent on your internet connection and the Substream settings utilised. This is important when streaming multiple cameras at the same time.

# Alarm: Motion

When motion has been detected by one or more cameras, your DVR will alert you to a potential threat at your home. It does this by sending you an email alert with an attached image from the camera to use as a reference (if this option is enabled) and/or sending push notifications via the HomeSafe View app.




- Don't forget to click "Save" to apply settings.
- Use the "Copy" function to apply all settings to the other cameras.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

**Channel:** Select a camera that you would like to edit.

**Detection:** By default, your DVR will record motion only if one or more objects have been detected by the camera and the camera's built-in PIR sensor. This provides more accurate motion detection by eliminating false triggers due to wind, leaves falling and rain (see page 23 - Thermal-Sensing Camera Tips). If you're monitoring an area that doesn't require objects to be detected by the camera's built-in PIR sensor, such as a busy walkway or a building entrance, change this to "Motion".

**Buzzer:** When motion has been detected, you can enable the DVR's buzzer to alert you for a predetermined amount of time.

**Sensitivity:** This option allows you to change the sensitivity level. The higher the number, the more sensitive your DVR will be when detecting motion. For most instances, the default selection will be suitable, however it's recommended to conduct a test to see if the sensitivity level is correct for the camera's location (see page 22 - Motion Detection Tips).

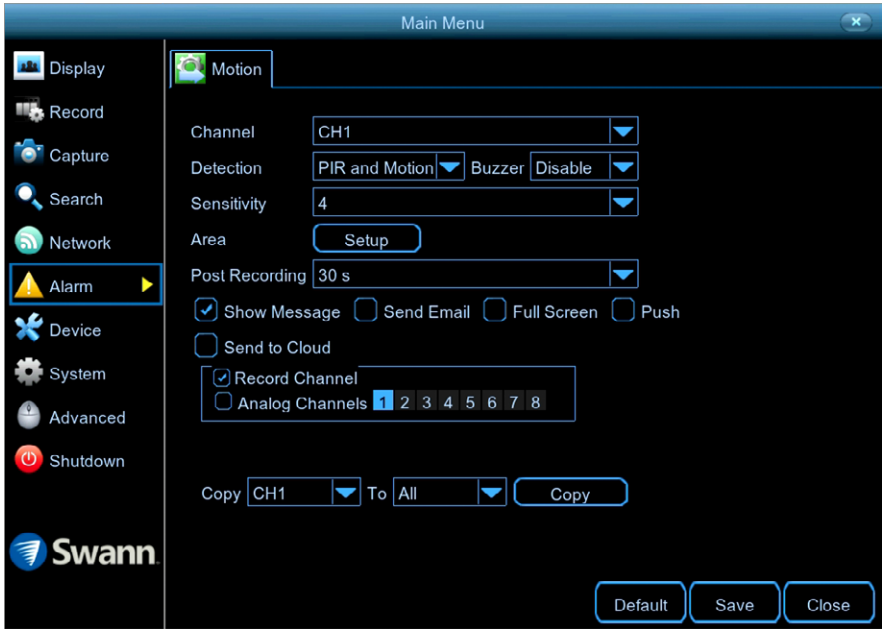
**Area:** Click the "Setup" button to change the default motion detection area. The entire view of the camera is enabled for motion detection, however you can select certain areas if you wish (see page 21 - Motion Detection Setup).

**Post Recording:** This option instructs your DVR to record for a set period of time after an event has occurred. For most instances, the default selection will be suitable, however you can change this if you wish.

**Show Message:** When motion has been detected, the motion icon will appear on-screen. Click the checkbox if you want to disable this.

*(continued on next page)*

# Alarm: Motion




- Don't forget to click "Save" to apply settings.
- Use the "Copy" function to apply all settings to the other cameras.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

**Send Email:** Click the checkbox to enable your DVR to send an email alert when motion has been detected.

**Full Screen:** Click the checkbox if you would like to view the camera full screen in Live View mode when motion has been detected.

**Push:** Click the checkbox to enable push notifications via the HomeSafe View app (alarm notification has to be enabled within the app - see "Alarm Mode" in the HomeSafe View manual for more information).

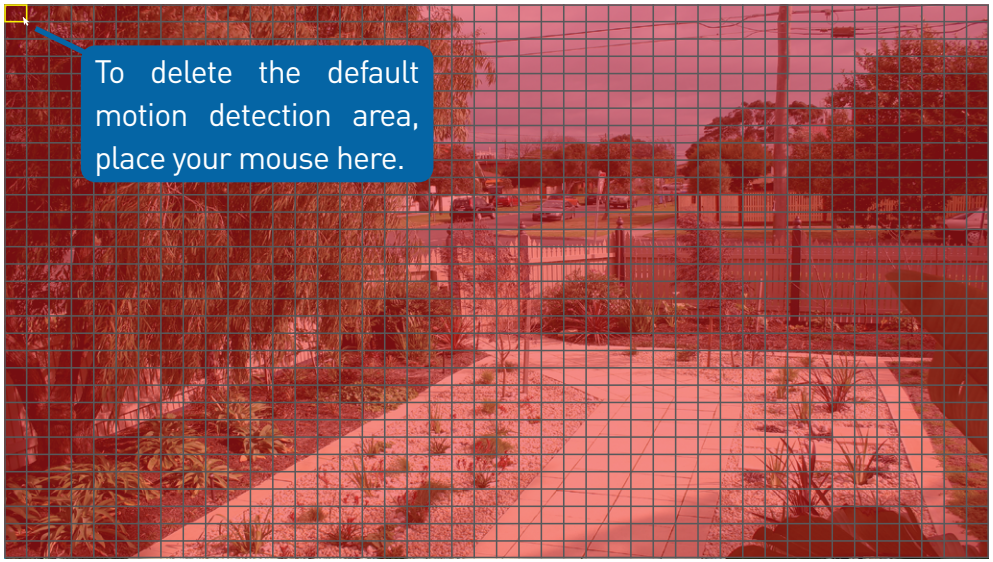
**Send to Cloud:** Click the checkbox to copy snapshots to the cloud via Dropbox (see page 55 - Device: Cloud).

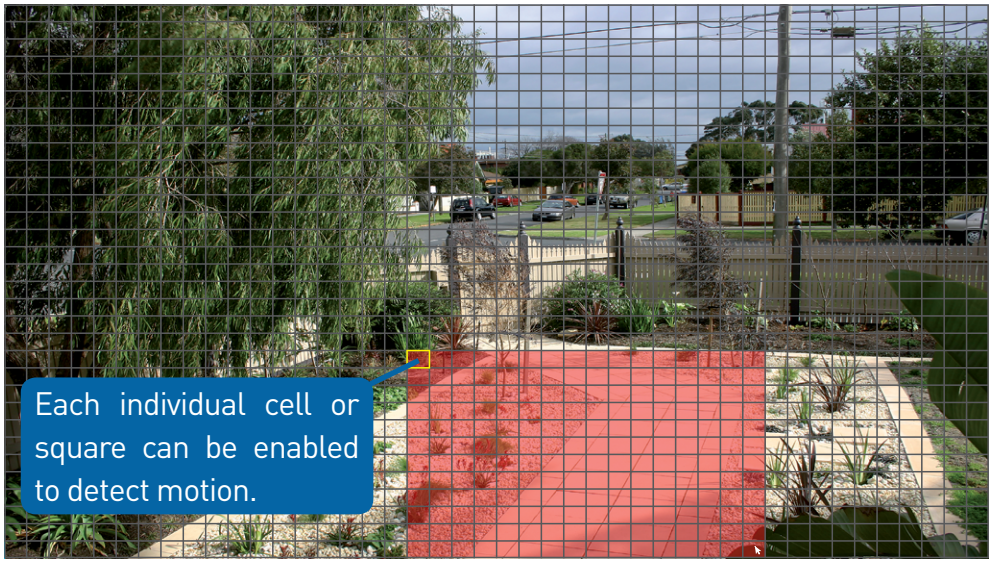
**Record Channel:** You can instruct your DVR to disable recording when motion has been detected. Your DVR will still alert you by displaying the motion icon and by email if this option has been enabled. Click the checkbox to disable.

**Analog Channels:** This option instructs your DVR to trigger additional cameras to start recording when motion has been detected. Click the checkbox to select all cameras or click on the individual camera number that you want to trigger for recording.

**Please note:** The "Push" and "Send to Cloud" options are only available when thermal-sensing cameras are connected to your DVR. When selecting "Motion" for the detection type, these two options are not available to select.

# Motion Detection Setup




**1.** Place the mouse inside the cell or square surrounded by a yellow border (as illustrated on the left). Press and hold the left mouse button, click and drag to the bottom right-hand corner then release the mouse. This will delete the default motion detection area.

**2.** To create a new motion detection area, select the cell or square that you want to start at. Press and hold the left mouse button, click and drag to select the area that you want to create then release the mouse.

**3.** Multiple areas can be created. Each individual cell or square can be enabled to detect motion. The same action also applies to delete an area that has been created.

In the example provided, a motion detection area has been created for the front yard but excludes objects such as trees as well as cars and pedestrians adjacent to the front yard of the house. Anyone who walks along the path via the front entrance and approaches the front door will be detected.

Movement outside of the motion detection areas will not be detected so will not trigger recordings or event notifications.

**4.** Right-click the mouse to exit. Adjust the sensitivity if required.

**5.** Click the "Save" button to save changes made.

# Motion Detection Tips

## Placement of the cameras

**1.** Place cameras so they are facing areas where people have to walk through to approach your home regardless of where they are headed. A good idea is to place a camera overlooking your front door to capture an image of anyone approaching it for later reference. This is great if you have parcels delivered to your door or if the potential burglar knocks or rings the doorbell to see if anyone is home.

**2.** Walk around your house and assess where intruders are most likely to approach to enter, and what path they would take. Most burglars enter the home through a front or back door, so it's advisable to place the cameras near those areas so that you get the best amount of detail of anyone who approaches.

**3.** When installing cameras outside, it's important to keep your front and backyard as well-lit as possible for ideal night vision and the ability to detect motion. It's common for intruders to enter a home through an unlocked garage or by using a garage door opener in an unlocked car located in the driveway. Positioning your cameras to overlook cars in the driveway and similar locations can be very useful.

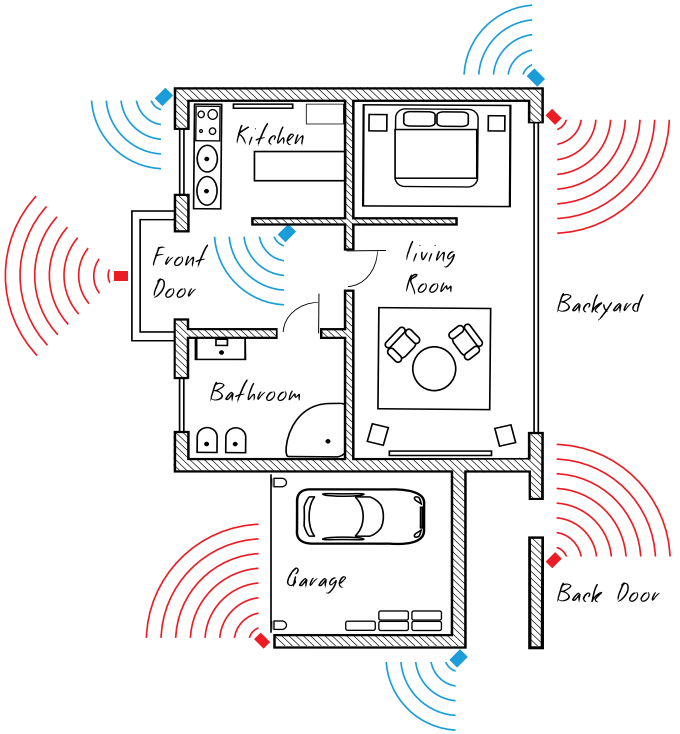
## Avoiding False Triggers

**1.** A tree, shrub or foliage that is blown by the wind - angle the camera so wind-blown objects are out of the camera's view or use the camera motion detection area settings to exclude these areas from detection.

**2.** People moving along sidewalks or streets that are close to your home, aim your cameras and use the motion detection area settings to ensure only legitimate threats are triggering events.

**3.** Vehicles moving in the background - angle the camera so as to avoid movement in the background or use the motion detection area settings to stop detection of cars in the street.

**4.** Movement or light reflected off smooth surfaces such as glass - adjust the sensitivity level and/or avoid pointing the camera directly at glass surfaces.




The **red cameras** illustrated (see above) are your primary locations. Place your cameras close to the front door, back door, garage entrance and overlooking the backyard.

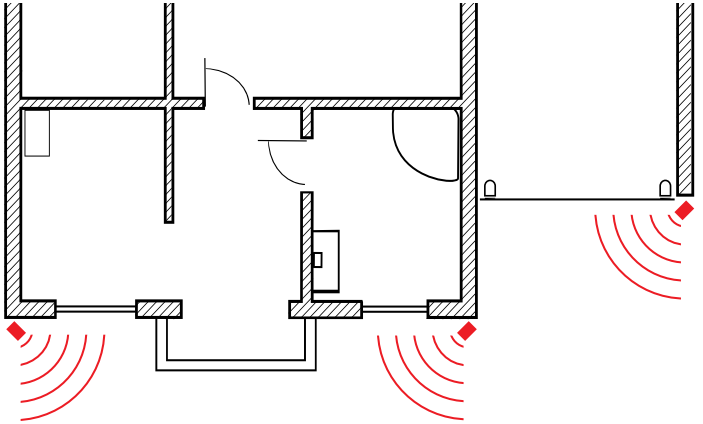
The **blue cameras** illustrated are your secondary locations. If your DVR includes additional cameras, place these at the front entrance inside the home, the front of the house (this could overlook the front garden or driveway), a side gate or if you have multiple entrances to the backyard.

# Thermal-Sensing Camera Tips

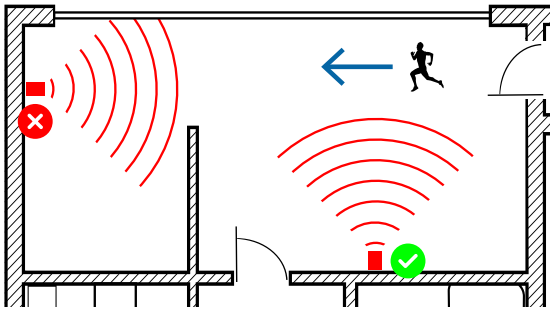
If thermal-sensing cameras have been included with your DVR or you have purchased them separately, the following tips will help you in getting the best results from your security system.

Your cameras have a built-in PIR (passive infrared motion detector) sensor. This means they can sense movement of warm objects including people, cars and animals. The advantage over cameras that don't have a PIR sensor, is they are very resistant to false triggers from changes in the image.

- PIR sensors work best when an intruder walks parallel or is passing across their "field of view" as opposed to walking directly at them. For example, in a hallway or path around the house you tend to walk parallel to the walls, not directly toward them. Position your cameras so that anyone approaching your home will cross the camera's view and trigger an event.
- For a recording to occur, the PIR must sense a warm object moving in front of it and the camera's image sensor must detect movement in the image. If either of these triggers has not occurred, no video will be recorded.
- When the PIR is triggered, the PIR icon (red box) will flash on-screen. If PIR and motion are triggered, the "running man" icon will be shown on-screen indicating that an event has occurred and that a recording is happening.
- The 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.
- The PIR can reliably detect movement up to 30ft/9m, movement beyond this range may or may not be detected.
- Be aware that sudden changes in temperature of paths, roads, etc., can cause some minor false alerts to occur when there is also movement in the image such as trees and shadows.
- If some false triggering is occurring, use the motion area setup to remove moving objects from being detected, and to further refine your alerts (see page 21 - Motion Detection Setup).
- When used indoors, keep the cameras away from heating vents, heaters and other heat sources as they can trigger the PIR. However if there is no movement in the image, a false alert is unlikely.



When installing cameras outside, mount them where intruders are most likely to enter (front & back doors, garage entrance). Angle the camer-as so the intruder walks parallel to the sensor.



PIR sensors work best when an intruder walks parallel or is passing across their "field of view" as opposed to walking directly at them.

# Device: PTZ




- Don't forget to click "Save" to apply settings.
- Use the "Copy" function to apply all settings to the other cameras.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

If you have a compatible PTZ camera connected to your DVR, you can use the PTZ controls to move the camera as well as the ability to zoom into an object and to control the level of focus (if available). You can create multiple preset positions, which can be recalled to focus the camera's view to a different position. Cruise mode can also be used to move the camera to different preset positions that have been created.

To configure your PTZ camera, consult the instruction manual included with your device then match those settings here.

**Please note:** Each channel has a unique address assigned to it, channel 1 is 001, channel 2 is 002, etc. Most PTZ cameras have their address or ID set to 001, therefore when connecting to a channel other than channel 1, the channel address will have to be changed to match the same address used by the camera. For example, if the camera is connected to channel 3, click the drop down menu, select "CH3" and change the address to 001. Select "CH1" and change the address to 003. Click the "Save" button to apply settings.

For instructions on how to control your PTZ camera and creating preset positions (see page 25 - Controlling your PTZ Camera).

# Controlling your PTZ Camera




A Swann Pro-852 PTZ camera has been used in the example provided. This model is compatible with the 4980 series of DVRs.

To control your PTZ camera, in Live View mode click on the channel the camera is connected to then click the "PTZ" button located on the camera toolbar. The channel will go full screen and the PTZ controls will be visible (as shown on the left).

**1.** If you have multiple PTZ cameras connected, click this to select a different camera.

**2.** Click this to start cruise mode (preset positions must be created first). Cruise mode instructs your DVR to automatically move the camera according to the preset positions that have been created. Click again to stop cruise mode.

**3.** Adjust the speed control to alter how fast or slow the camera will pan or tilt. Move the slider to decrease or increase the speed.

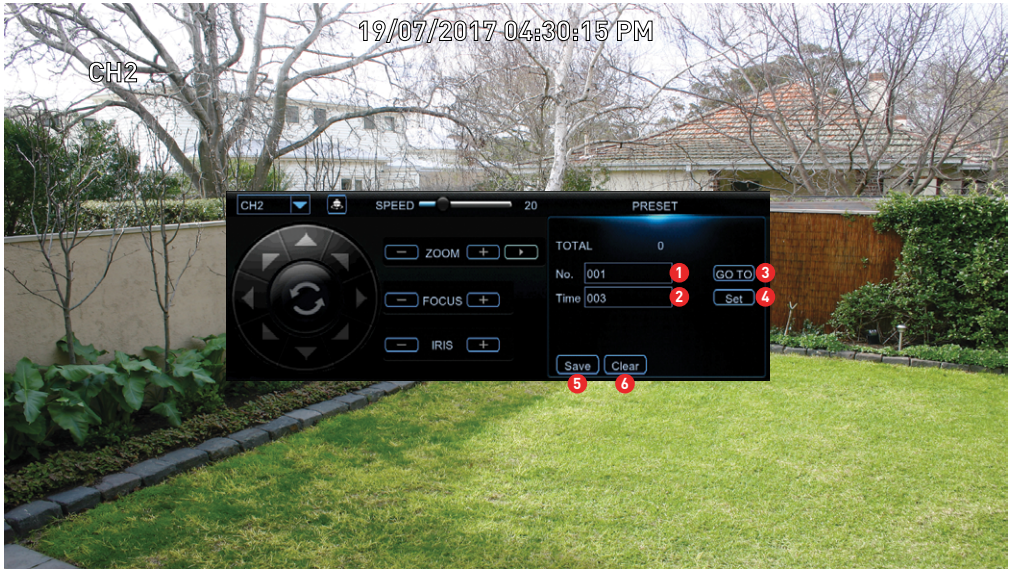
**4.** Click this to access the Preset panel. This allows you to create multiple preset positions and to access the camera's on-screen display. Click again to close.

**5.** This allows you to zoom into an object and to control the level of focus (depending on the camera you have, the iris control may not be available).

**6.** Click the directional buttons to move the camera in the direction selected (the middle button has no function).

For instructions on how to create a preset and to access the camera's on-screen display (see page 26 - Creating a Preset).

# Creating a Preset




**1.** Each preset position will have a different number assigned to it. To recall a particular position, click the dialogue box, input a number then click "GO TO". The camera will then move to that particular position. When creating a preset position, you may want to make note which position is assigned to each number.

**2.** Click the dialogue box to change the length of time (in seconds) the camera will stay at a particular position, before moving to the next position.

**3.** Click this to go to a particular preset position.

**4.** Click this to create a preset.

**5.** Click this to save any changes made.

**6.** Click this to clear a preset.

## Creating a Preset

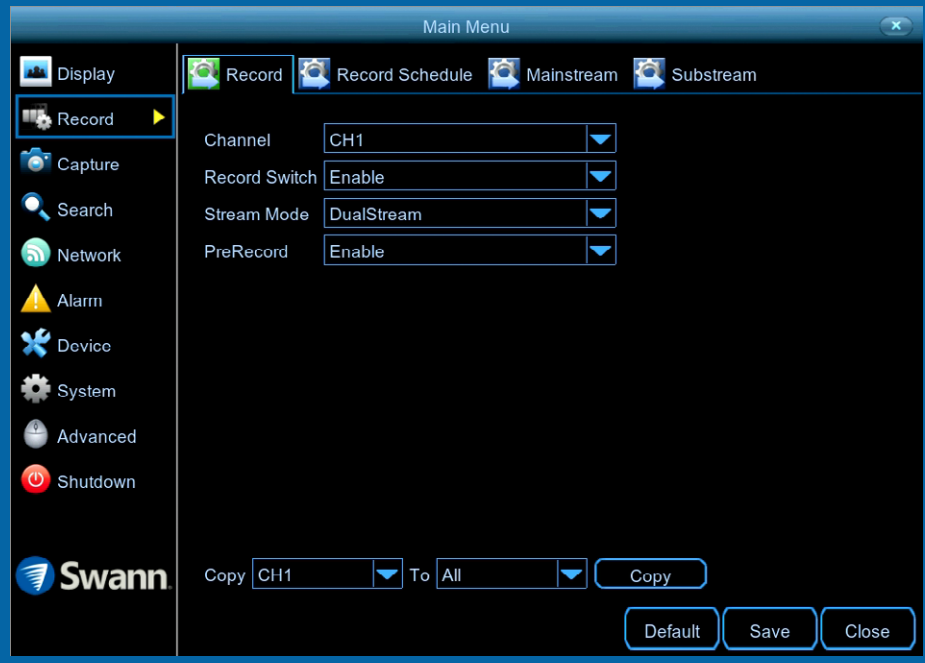
- To create a preset, use the PTZ controls to move the camera to the desired focal position. The zoom and focus controls can also be used. Use the speed control to alter how fast or slow the camera will move.
- Change the length of time the camera will stay at this position.
- Click the "Set" button to create the preset. You will notice that the preset position will increase each time a preset is created. The total number of presets created will also be displayed. Up to 255 different preset positions can be created.
- Repeat these steps to create multiple preset positions. When finished, click the "Save" button to save. Right-click to exit.
- Click the "Start Cruise" button to continually cycle through each preset created. Click again to stop.

## Accessing your Camera's On-screen Display

- Click the preset position dialogue box (1) then click the backspace button twice. Enter "95", click the enter button then click the "GO TO" button.
- To navigate the on-screen display, click the up and down directional buttons. The hyphen indicates which option or setting has been selected.
- Click the right directional button to confirm selection. Click the left and right directional buttons to change settings within sub-menus.
- Consult the camera's instruction manual for information about the functions available in the on-screen display.

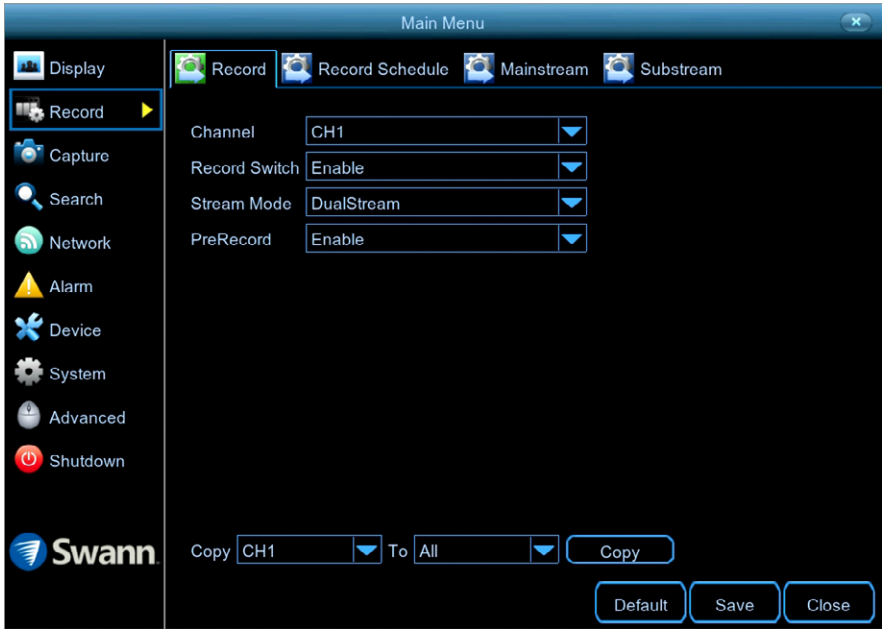
## Recording Configuration

The recording configuration options are available in the "Record" and "Capture" menus that are accessible from the Main Menu. From here you can access and change the default recording schedule (presented as a 24 hour 7 days a week grid and is color coded) for each camera connected. You can also enable and set a schedule for your DVR to take a snapshot each time an event occurs.






# Record: Record




- Don't forget to click "Save" to apply settings.
- Use the "Copy" function to apply all settings to the other cameras.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

**Channel:** Select a camera that you would like to edit.

**Record Switch:** When disabled, your DVR will detect motion but it will not record (manual record is also disabled).

**Stream Mode:** By default, your DVR will record both Mainstream and Sub-stream video (known as DualStream). This is especially useful when using "Playback" mode via the HomeSafe View app, as Substream video will be used. This requires less bandwidth to stream the video from your DVR to your mobile device. Mainstream video is used for playback when using your DVR directly. If remote playback is not required, you can select Mainstream recording only.

**PreRecord:** Allows your DVR to record for a number of seconds before an event occurs. It's recommended to leave this enabled.

Click for contents

# Record: Schedule

By default, a Motion schedule has been enabled for each camera connected, however you can change the schedule to suit your needs. The schedule is presented as a 24-hour 7 days a week grid and is color coded to represent the event type.




- Don't forget to click "Save" to apply settings.
- Use the "Copy" function to apply all settings to the other cameras.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

**Channel:** Select a camera that you would like to edit.

**Normal:** Your DVR will constantly record for a set period of time.

**Motion:** Your DVR will only record when motion has been detected from one or more cameras.

Each square represents 30 minutes. Using the mouse, select the desired recording mode then click on a particular square to change or click and drag the mouse over the squares corresponding to your desired time period. The same action can also be applied if Normal or Motion recording is not required (on one or more sections that have recording enabled).

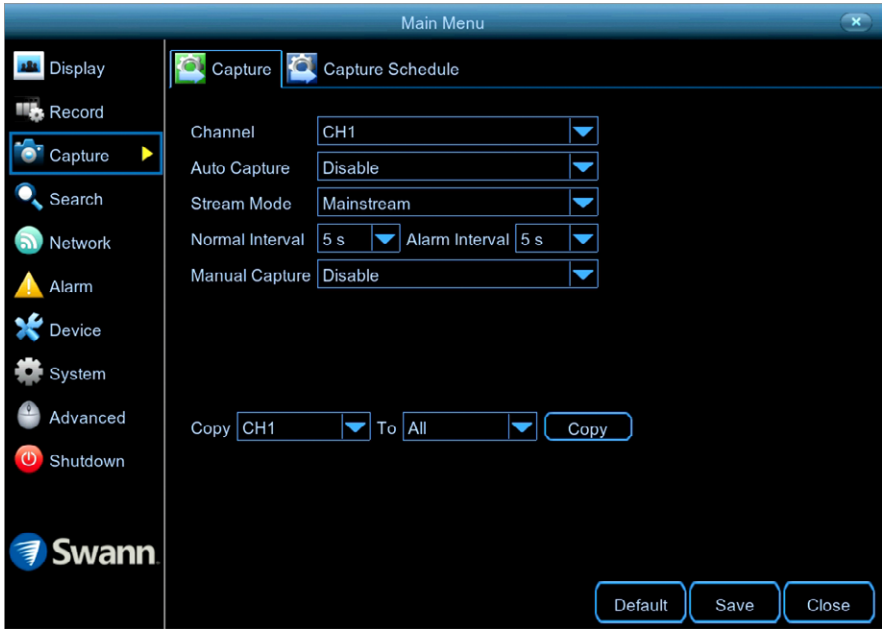
In the above example, a Motion recording schedule has been created for 12:00 a.m. to 06:00 p.m. and a Normal recording schedule for 06:00 p.m. to 12:00 a.m. Sunday to Saturday.

To search for and play previous Normal and Motion recordings (see page 33 - Search: General).

Click for contents

# Capture: Capture

As an added feature, you can enable and set a schedule for your DVR to take a snapshot each time an event occurs. This is particularly useful for finding motion events quickly and can also be used for different purposes such as time lapse photography.




- Don't forget to click "Save" to apply settings.
- Use the "Copy" function to apply all settings to the other cameras.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

**Channel:** Select a camera that you would like to edit.

**Auto Capture:** When enabled, your DVR will take a snapshot each time an event occurs.

**Stream Mode:** Leave the default selection. This will save each snapshot at the camera's native resolution.

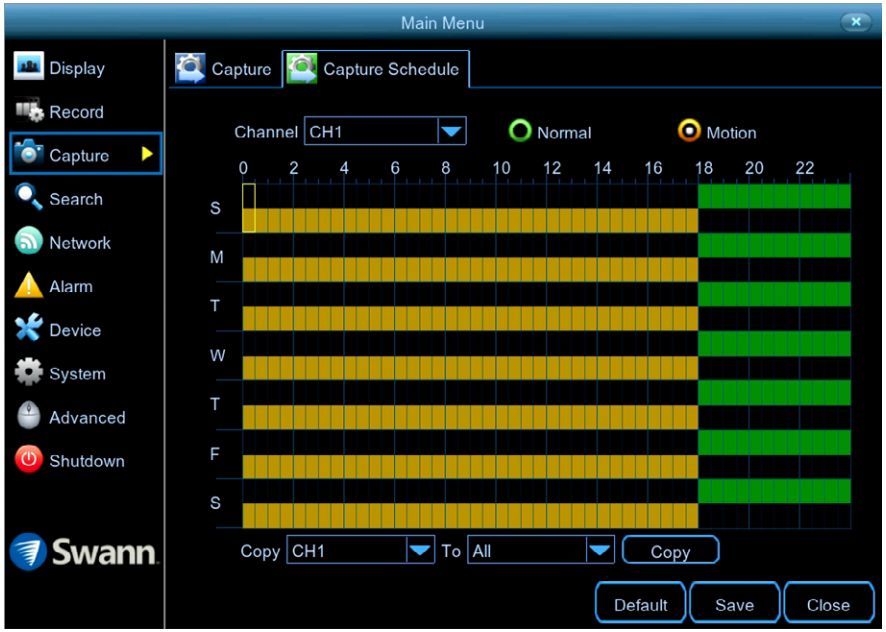
**Normal Interval:** The length of time that must elapse before a snapshot is taken. For example, when setting a Normal capture schedule, a snapshot will be taken every 5 seconds using the default selection. Adjust accordingly.

**Alarm Interval:** When setting a Motion capture schedule, a snapshot will be taken each time motion has been detected according to the interval selected. Adjust accordingly.

**Manual Capture:** Enable this feature if you would like to manually take a snapshot using the Manual Capture button on the camera toolbar.

As this is an added feature, a capture schedule is not enabled by default. To enable this (see page 31 – Capture: Schedule).

# Capture: Schedule




- Don't forget to click "Save" to apply settings.
- Use the "Copy" function to apply all settings to the other cameras.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

**Channel:** Select a camera that you would like to edit.

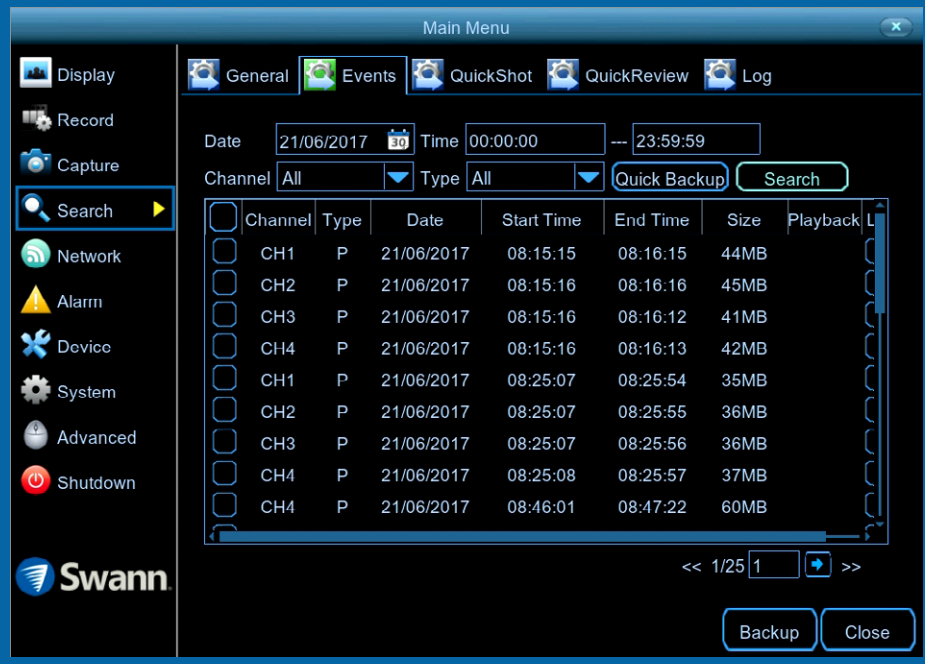
Each square represents 30 minutes. Using the mouse, select the desired capture mode then click on a particular square to change or click and drag the mouse over the squares corresponding to your desired time period. The same action can also be applied if Normal or Motion capture mode is not required (on one or more sections that have been enabled).

In the above example, a Motion capture schedule has been created for 12:00 a.m. to 06:00 p.m. and a Normal capture schedule for 06:00 p.m. to 12:00 a.m. Sunday to Saturday.

## 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 DVR'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.



# Search: General







**1.** Click the drop down menu to select the month that you would like to search on.

**2.** Click the drop down menu to select the year that you would like to search on.

**3.** Click the drop down menu to select from one or all cameras that you would like to search on and display for playback.

**4.** Click the drop down menu to select the video type that you want to search on. In most circumstances "Motion" would be selected but you can leave this on "All" if you want to search for all video types. Adjust accordingly.

**5.** Click the "Search" button to filter your search criteria.

**6.** The orange triangles indicate there are recordings on those particular dates that match your search criteria. Click on a date that you want to select for playback.

**7.** When selecting all cameras for playback, this will indicate the channels that match your search (each channel will be highlighted in blue with an orange triangle). You can leave the default selection or you can select specific cameras for playback (click the checkbox then select the channel required).

**8.** You can leave the default selection or you can click the dialogue box to enter a specific start time.

**9.** You can leave the default selection or you can click the dialogue box to enter a specific end time.

**10.** Click the "Play" button to start playing.

You will now see the playback interface (see page 34 - Playback Interface).

# Playback Interface




**Calendar:** You can select a different date without exiting to the previous screen.

**Playback Mode:** You have the option of selecting a different playback mode (a message will appear on-screen when changing modes).

**Camera List:** Select from one or more cameras to display for playback. The blue icon indicates which cameras match your search criteria.

**Time Period:** This represents the time period that is visible. Click on a different time period to zoom in for precise control.

**1.** Click this to hide the playback interface so you can maximise your viewing area. Right-click to restore.

**2.** From left to right, these are your reverse, slow motion, play, pause, stop and fast forward controls. Subsequent presses of the reverse, slow motion and fast forward buttons will increase the speed of each action.

**3.** Select a camera, click this button then click and drag an area to get a close up view. Use the picture-in-picture screen to select a different area to view. Right-click to exit.

*(continued on next page)*

# Playback Interface



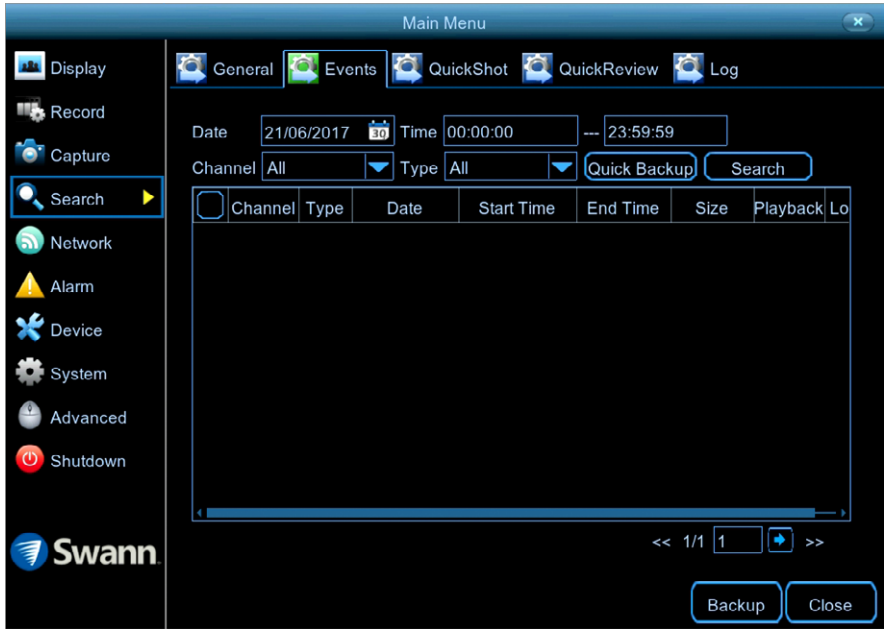

**4.** This button allows you to edit the video by setting mark in and out points on your video which you can then copy to a USB flash drive. When you have selected a video to play, press this button at the mark in point and press it again at the mark out point. Press the button again to save (a disk icon will be shown). For the backup type, leave the default selection or change to AVI or MP4 for wider playback compatibility on your computer (we recommend VLC media player software, you can download a free copy from www.videolan.org). Insert a USB flash drive to your DVR then click "Save". You have the choice of formatting the flash drive or creating a new folder if required. Click "OK" to save then click "Close" when finished.

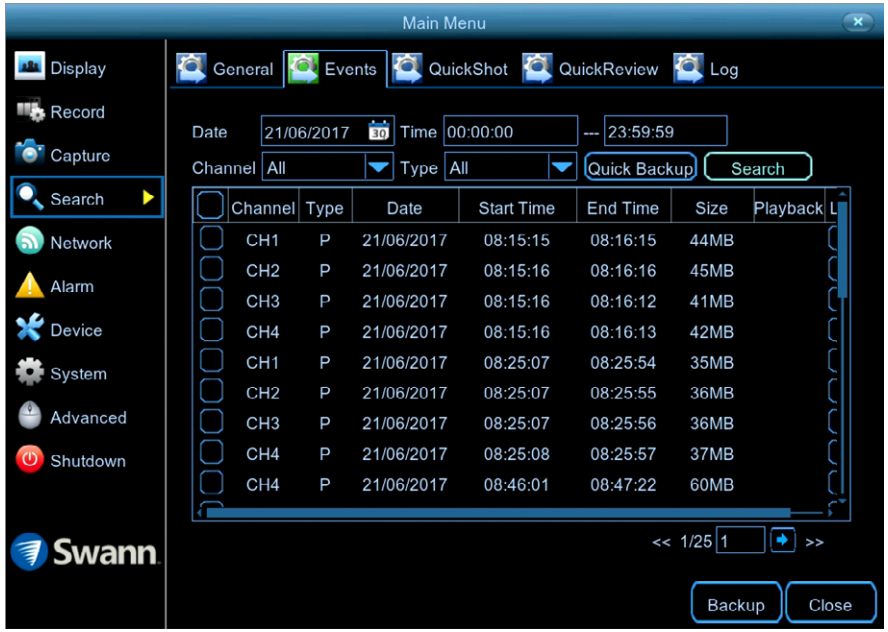
**5.** Click this button to mute or unmute the audio.

**6.** Click and hold the slider left or right to change the volume level.

**Video Type:** Indicates the video type on the timeline.

# Search: Events




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

**Date:** Click the calendar icon to select the month, year and date that you would like to search on.

**Time:** You can leave the default selection or you can click the dialogue box to enter a specific start and end time.

**Channel:** Click the drop down menu to select from one or all cameras that you would like to search on.

**Type:** Leave the default selection.

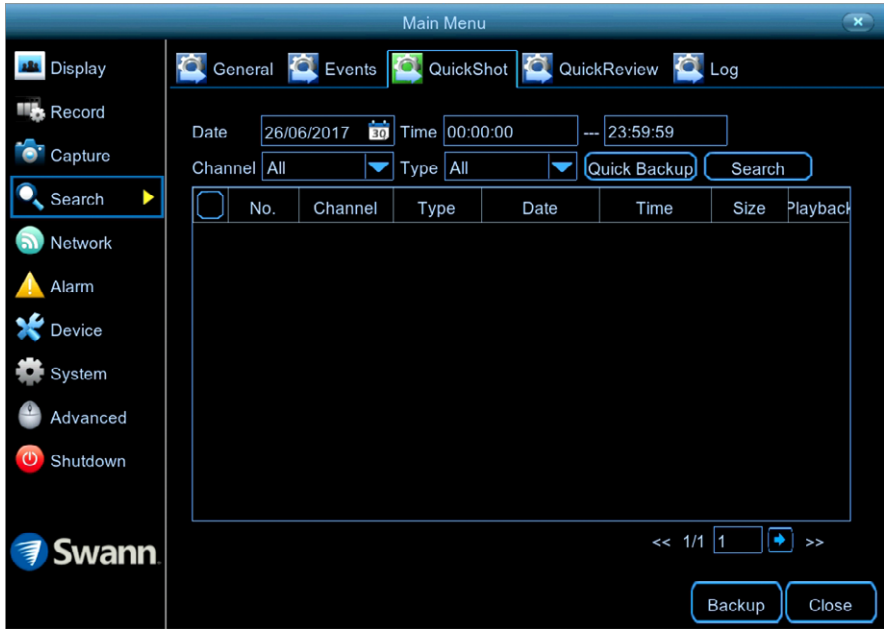
**Quick Backup:** Click this to copy all motion events that match your search criteria.

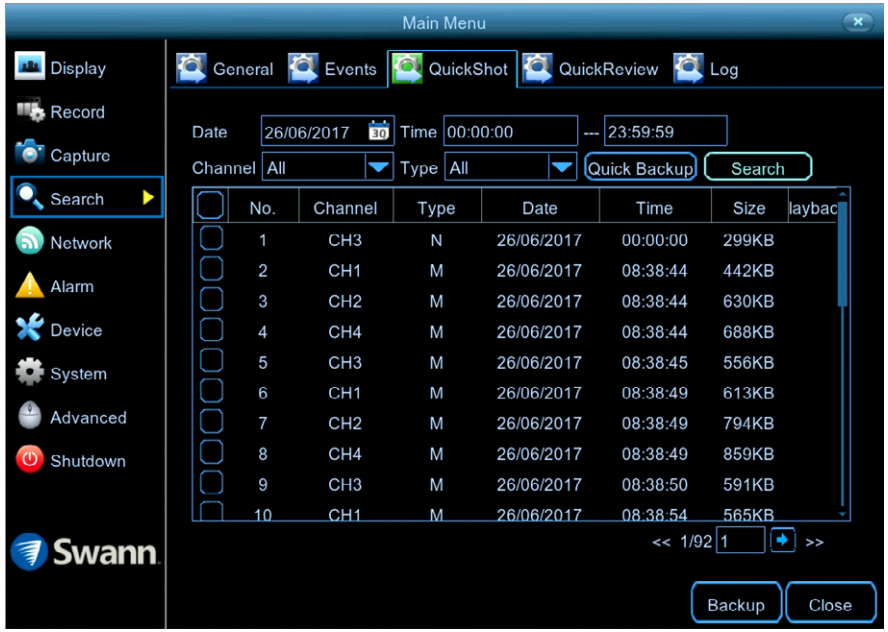
**Search:** Click this to display a list of motion events that match your search criteria (as shown above). Double-click an event to play (the event will play full screen). Click the checkbox next to each event to select it.

**Backup:** Click this to copy selected motion events. For the backup type, leave the default selection or change to AVI or MP4 for wider playback compatibility on your computer (we recommend VLC media player software, you can download a free copy from www.videolan.org). Insert a USB flash drive to your DVR then click "Save". You have the choice of formatting the flash drive or creating a new folder if required. Click "OK" to save then click "Close" when finished.

**Close:** Click this to exit.

# Search: QuickShot




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

**Date:** Click the calendar icon to select the month, year and date that you would like to search on.

**Time:** You can leave the default selection or you can click the dialogue box to enter a specific start and end time.

**Channel:** Click the drop down menu to select from one or all cameras that you would like to search on.

**Type:** You can leave the default selection or you can click the dialogue box to select the type of snapshot you would like to search on.

**Quick Backup:** Click this to copy all snapshots matching your search criteria.

**Search:** Click this to display a list of snapshots that match your search criteria (as shown above). Double-click a snapshot to display it full screen. You can also play a slideshow (see page 38 - Playing a Slideshow). Click the checkbox next to each event to select it (a maximum of 5000 snapshots can be displayed at any one time).

**Backup:** Click this to copy selected snapshots. Insert a USB flash drive to your DVR then click "Save". You have the choice of formatting the flash drive or creating a new folder if required. Click "OK" to save then click "Close" when finished.

**Close:** Click this to exit.

# Playing a Slideshow




**1.** Click this to play the slideshow in reverse.

**2.** Click this to play the slideshow.

**3.** Click this to stop the slideshow.

**4.** Click this to display the previous snapshot or group of snapshots.

**5.** Click this to display the next snapshot or group of snapshots.

**6.** Click this to view a single snapshot at a time.

**7.** Click this to view four snapshots at a time.

**8.** Click this to view eight snapshots at a time.

Right-click to exit.

# Search: QuickReview




QuickReview 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.

**1.** Click the drop down menu to select the month that you would like to search on.

**2.** Click the drop down menu to select the year that you would like to search on.

**3.** Click the drop down menu to select the camera that you would like to display for playback (only one camera can be selected).

**4.** Click the drop down menu to select the video type that you want to search on. In most circumstances "Motion" would be selected but you can leave this on "All" if you want to search for all video types. Adjust accordingly.

**5.** Click the "Search" button to filter your search criteria.

**6.** The orange triangles indicate there are recordings on those particular dates that match your search criteria. Click on a date that you want to select for playback.

**7.** You can leave the default selection or you can click the dialogue box to enter a specific start time.

**8.** You can leave the default selection or you can click the dialogue box to enter a specific end time.

**9.** Up to eight split-screens can be enabled for playback.

**10.** Click the "Play" button to start playing.

*(continued on next page)*

# QuickReview Playback




**Split-screens:** Click the drop down menu to select the preferred split-screen mode for playback.

**Time Period:** This represents the time period that is visible. Click on a different time period to zoom in for precise control.

**1.** Click this to hide the playback interface so you can maximise your viewing area. Right-click to restore.

**2.** From left to right, these are your reverse, slow motion, play, pause, stop and fast forward controls. Subsequent presses of the reverse, slow motion and fast forward buttons will increase the speed of each action.

**3.** Select a particular split-screen, click this button then click and drag an area to get a close up view. Use the picture-in-picture screen to select a different area to view. Right-click to exit.

*(continued on next page)*

# QuickReview Playback




**4.** This button allows you to edit the video by setting mark in and out points on your video which you can then copy to a USB flash drive. When you have selected a video to play, press this button at the mark in point and press it again at the mark out point. Press the button again to save (a disk icon will be shown). For the backup type, leave the default selection or change to AVI or MP4 for wider playback compatibility on your computer (we recommend VLC media player software, you can download a free copy from www.videolan.org). Insert a USB flash drive to your DVR then click "Save". You have the choice of formatting the flash drive or creating a new folder if required. Click "OK" to save then click "Close" when finished.

**5.** Click this button to mute or unmute the audio.

**6.** Click and hold the slider left or right to change the volume level.

**Video Type:** Indicates the video type on the timeline.

# Playback: Smart







Smart mode allows you to define one or more specific areas of the video which then makes it easier to find what you are searching for. For example, you may have movement on the left-hand side of the yard, but you want to see what is happening on the right-hand side. Define one or more areas where required then search to play video based on those defined areas.

**1.** To commence Smart mode, click the drop down menu and select "Smart". A message will appear on-screen, click "OK" to continue.

**2.** Click the checkbox to select a camera that you would like to search on. When selected, the video will start playing automatically.

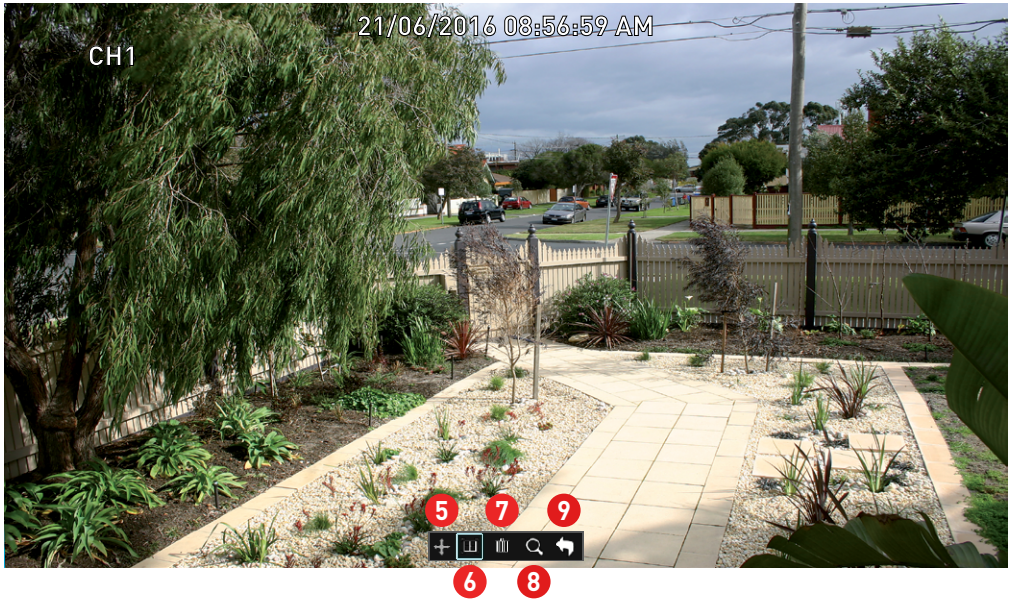
**3.** You can leave the default selection or you can click each dialogue box to enter a specific start and end time.

**4.** Click this button to define one or more areas that you want to search for.

The camera will be shown full screen and the Smart mode controls will be visible.

*(continued on next page)*

# Playback: Smart







**5.** To move the controls, click and hold here then reposition it.

**6.** Click this to define a full screen detection area.

**7.** Click this to delete all areas created.

**8.** Click this to search and play video based on the areas defined.

**9.** Click this to return to the playback interface.

To define one or more specific areas, please do the following:

**10.** Click and drag to select the area that you want to define. Multiple areas can be defined. You can also use the same action to remove sections of the defined area or to delete it entirely.

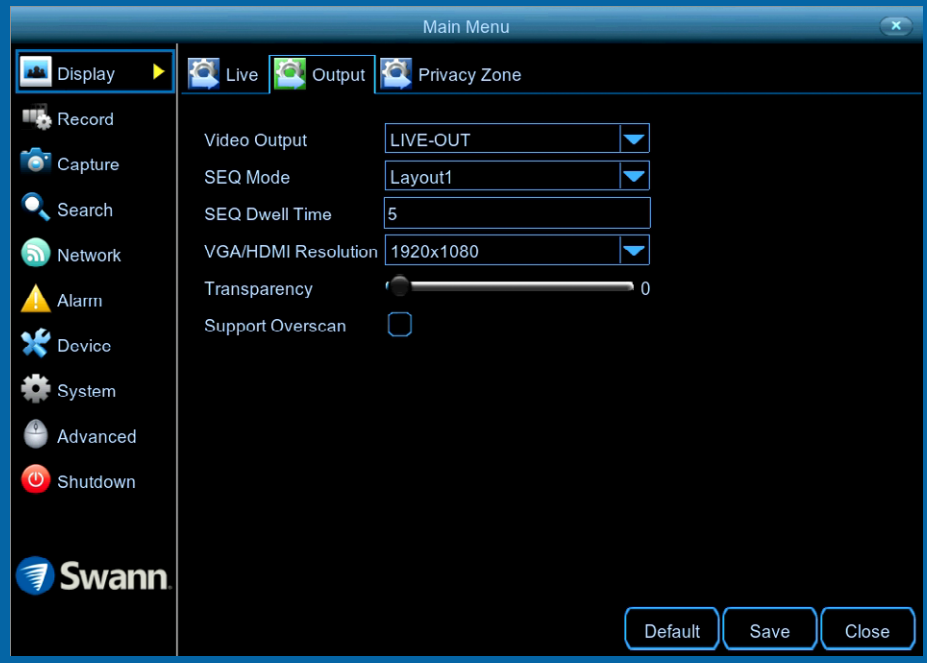
**11.** When finished, click the search button to play video based on the areas defined.

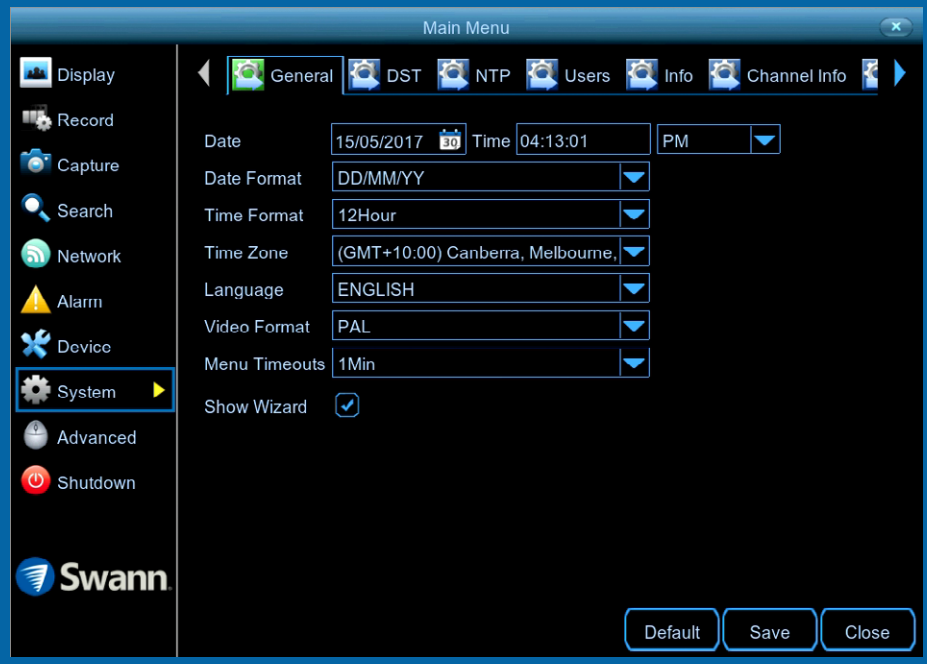
You'll be returned back to the playback interface. Segments matching your search criteria will be shown on the timeline in dark green.

**Can I use Smart mode on multiple cameras at the same time?** Due to the complexities and processing power required, you can only use Smart mode on one camera at a time.

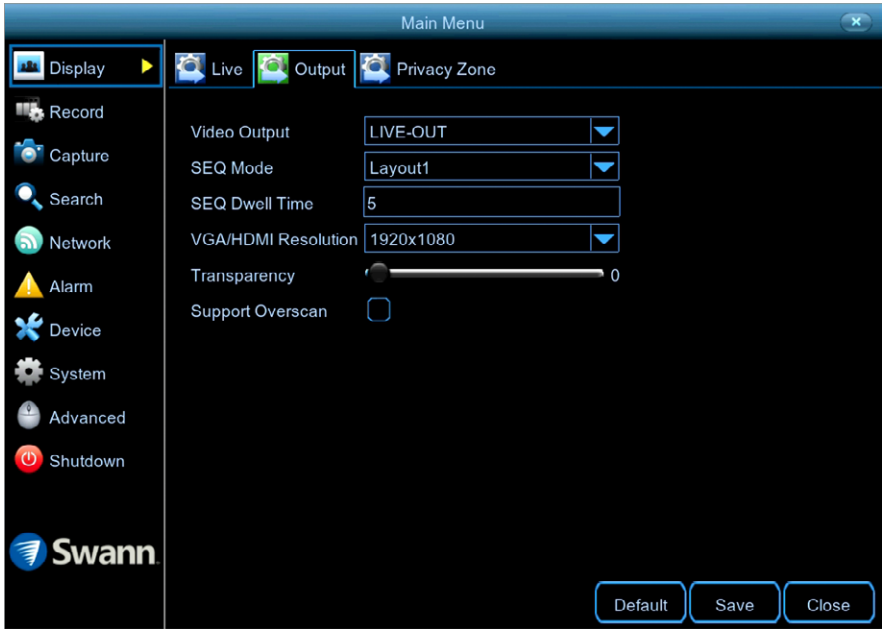
## System Configuration

The options available give you complete control on how your DVR is configured and how it operates. Some of the options such as display resolution, time zone, email configuration, Daylight Saving and password creation are configured during the Startup Wizard. For experienced network users, your DVR provides options that can be configured to suit your particular requirements. You can also perform a firmware upgrade when available.



# Display: Output




- Don't forget to click "Save" to apply settings.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

**Video Output:** This option cannot be changed.

**SEQ Mode:** Select how many video channels you would like to display when your DVR is in sequence mode. You can select from one, four or six cameras to display at a time.

**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).

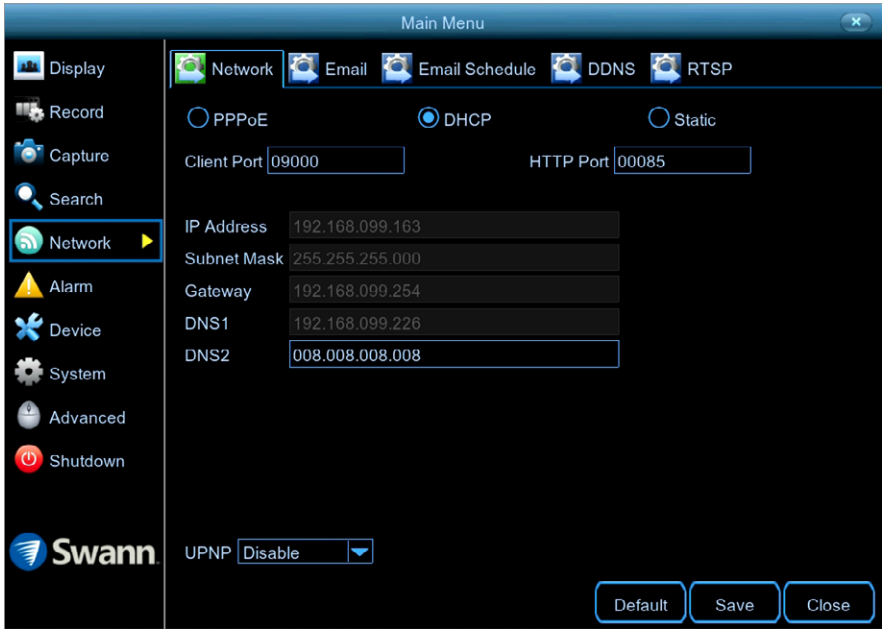
**VGA/HDMI Resolution:** Select a display resolution that is suitable for your TV. 1920 x 1080 will suit most TVs. If you have a 4K capable TV, you can select either 2K (2560 x 1440) or 4K (3840 x 2160) to take advantage of the higher resolution that your TV provides (the 4 channel model supports a maximum display resolution of 1920 x 1080 only).

**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.

**Support Overscan:** Is mainly used on older television sets to display the entire viewable area correctly on-screen. It does this by cutting off the edges of the picture. This is not required for modern Plasma and LCD TVs as the image is digitally processed to display the correct aspect ratio.

# Network: Network

As SwannLink Peer-to-Peer technology is utilised to communicate with your network and mobile device, configuration of the network settings is not required. If you have networking expertise and require specific settings for your network, you do have the ability to change them.




- Don't forget to click "Save" to apply settings.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

**PPPoE:** Allows your DVR to be directly connected to a DSL modem. When selecting this option, you need to input the user name, password and DNS settings for your internet service provider.

**DHCP (Dynamic Host Configuration Protocol):** Your router will automatically assign an IP address to each device connected to your network. This is enabled by default.

**Static:** All devices on your network have their IP address manually defined.

**Client Port:** This port number is used by your DVR to send information through. The default number will work in most situations.

**HTTP Port:** This port number is used to log into your DVR from a remote location. The default number will work in most situations.

The following five options can be changed when selecting Static:

**IP Address:** Each device on your network must have a unique IP address. A typical address might be "192.168.1.24" or something similar.

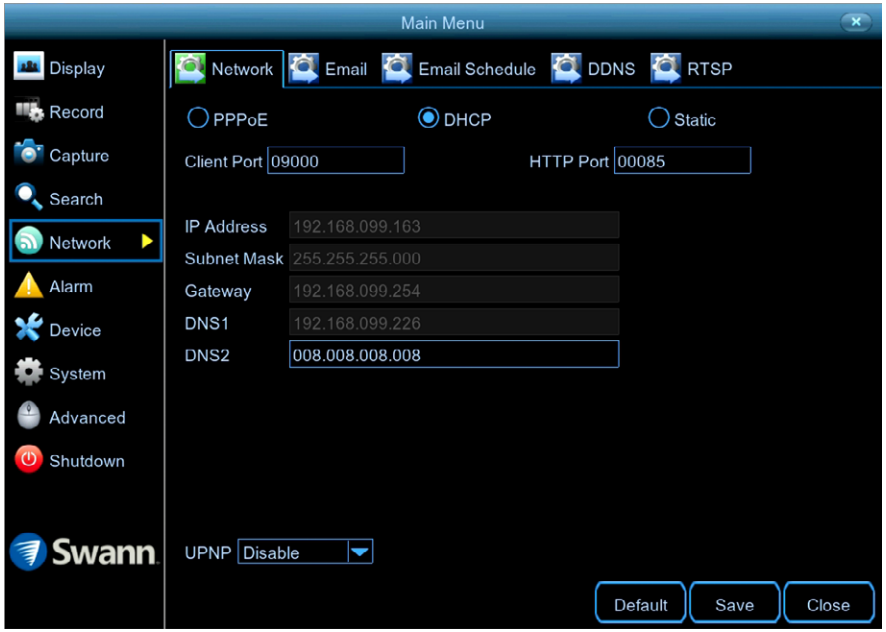
**Subnet Mask:** This allows the flow of network traffic between hosts to be segregated based on a network configuration. A typical address might be "255.255.255.0" or something similar.

**Gateway:** This allows your DVR to connect to the internet. This is typically the same IP address as your modem or router.

**DNS (Domain Name System)1/2:** Input the DNS settings for your internet service provider.

*(continued on next page)*

# Network: Network

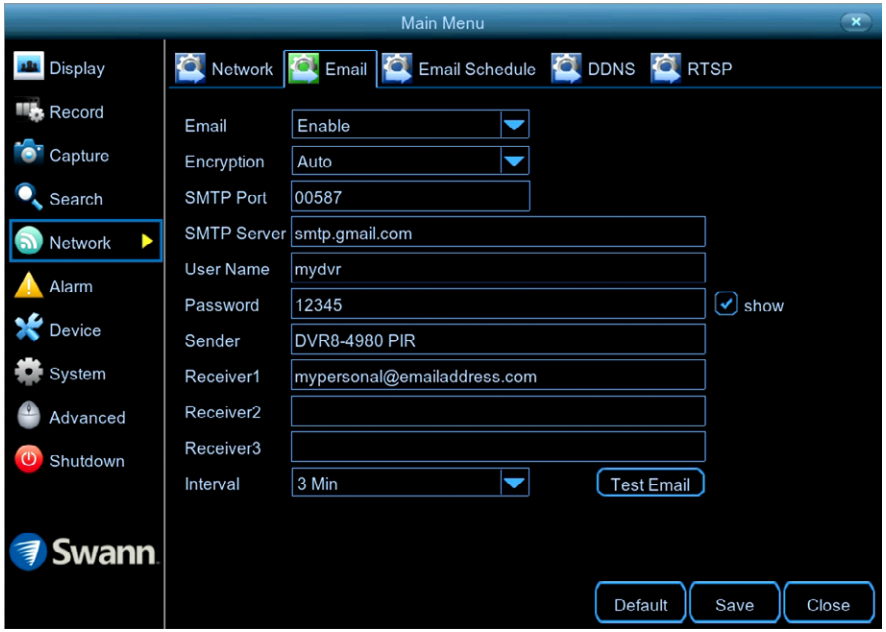



- Don't forget to click "Save" to apply settings.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

**UPNP:** A network protocol designed to allow network connected devices to automatically configure the router for the purposes of remote access. This is not required when using UID to access your DVR via the HomeSafe View app. You can enable UPNP if required.

# Network: Email

The following email providers are supported - Gmail gmail.com and Outlook outlook.com. On your computer or mobile device, go to the relevant website to create an account. When finished, input those details here.




- Don't forget to click "Save" to apply settings.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

**Why do I need to create an email for my DVR?** So your DVR can send you email alerts and to send you a password reset request if you have forgotten your password.

**Email:** Click "Enable" to input your email details.

**Encryption:** Leave this on "Auto". This ensures your DVR will always use the correct encryption for your email provider.

**SMTP Port:** Gmail input 00587. Outlook input 00587.

**SMTP Server:** Gmail input "smtp.gmail.com". Outlook input "smtp.live.com".

**User Name:** Input the email user name for the account you created.

**Password:** Input the email password for the account you created. Click the "show" checkbox if you would like to hide your password.

**Sender:** Input a name for your email account, for example DVR8-4980 PIR.

**Receiver1:** Input the email address that you want to send email alerts to.

**Interval:** This is the length of time that must elapse after your DVR sends an email alert before it will send another. Adjust accordingly.

**Test Email:** Click to verify the information is correct then click "OK". A message will appear if the test has been successful. Click "OK" to continue.

If the test email is not in your inbox, check your junk or spam folder.

**Email not working? Please try the following:**

**1.** Check that your email user name and password are correct.

**2.** Located at the back of your DVR, you should see one or two flashing LEDs (above the Ethernet port). If you don't see this, disconnect then reconnect the Ethernet cable or try a different port on your router.

**3.** Search "less secure apps" at support.swann.com.

# Network: Email Schedule




- Don't forget to click "Save" to apply settings.
- Use the "Copy" function to apply all settings to the other cameras.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

**Channel:** Select a camera that you would like to edit.

**Motion:** If email alerts have been enabled for motion detection, you can change the schedule on when your DVR can send those alerts. For example, you may only want to receive motion alerts during the day but not in the evening. A different schedule can be created for each camera.

**Exception:** There are three event types that your DVR will detect as an exception - no space left on the hard drive, a hard drive error and if one or more channels has lost the feed from its camera (see page 60 - Advanced: Events). It's recommended to leave the default schedule in place in case there is an exception that you need to be alerted to.

Each square represents 30 minutes. Using the mouse, click on a particular square to change or click and drag the mouse over the squares corresponding to your desired time period.

In the above example, a Motion email alert schedule has been created for 08:00 a.m. to 07:00 p.m Monday to Friday. Motion alerts outside of these times will not be emailed.

# Network: DDNS

Prior to developing our SwannLink Peer-to-Peer technology, our SwannDNS service was used to connect to your DVR remotely. This service is still active and we recommend creating an account as a means of backup.




- Don't forget to click "Save" to apply settings.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

Go to www.swanndvr.com and click the "Registration" button. Follow the prompts to create your account.

**DDNS:** Click the drop down menu to enable.

**Server:** SWANNDVR is automatically selected.

**Domain:** Enter the domain name that is hosted on your account. For example, (username.swanndvr.net).

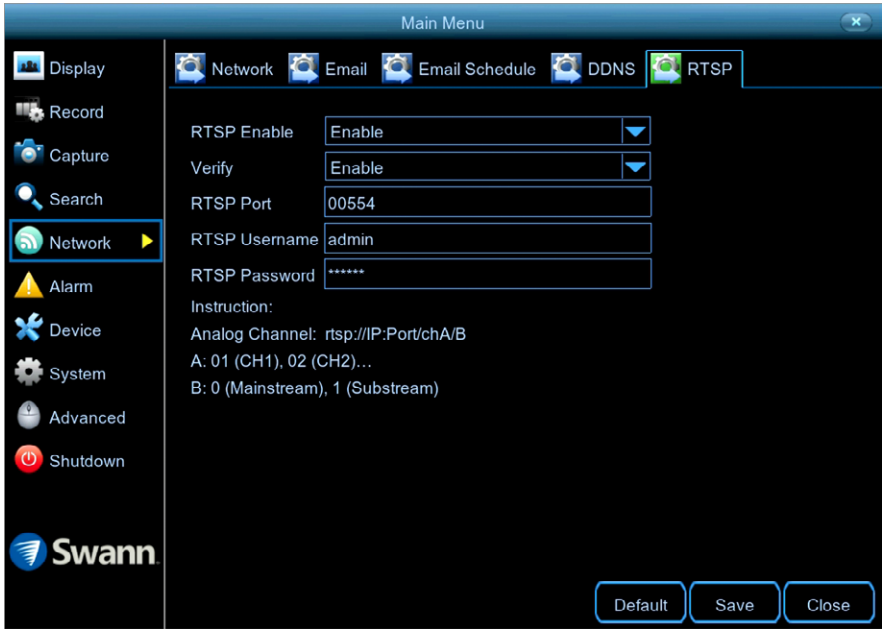
**User:** Enter the username (host name) for your account.

**Password:** Enter the password for your account.

**Test DDNS:** Click this button then click "OK" to confirm your account details. After a short moment you will see "DDNS test is successful!". Click "OK" to close.

# Network: RTSP

The RTSP function can be used to stream a camera's live view image to your computer, using video streaming software such as VLC media player. Multiple cameras can be streamed at the same time. You can also record each stream if required.




- Don't forget to click "Save" to apply settings.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

The following instructions are for the VLC media player software (you can download a free copy from www.videolan.org). After download, double click the file then follow the on-screen instructions for installation.

**RTSP Enable:** Click the drop down menu to enable.

**Verify:** Leave the default selection if you would like VLC to verify your username and password for access, otherwise click the drop down menu to disable.

**RTSP Port:** The default port number will work in most circumstances.

**RTSP Username:** This is the user name that you enter if verification has been enabled. You can leave the default name or you can enter a new name.

**RTSP Password:** Enter a new password if verification has been enabled.

**1.** On your computer, load the VLC media player software. Click "Media" then click "Open Network Stream".

**2.** Enter the IP address of your DVR (on your DVR click "Network" in the Main Menu to display the IP address) into VLC. The following is an example of what you need to enter - (rtsp://192.168.99.160:554/ch01/0).

***rtsp://192.168.99.160:*** This is the IP address of your DVR.

***554:*** This is the RTSP port of your DVR.

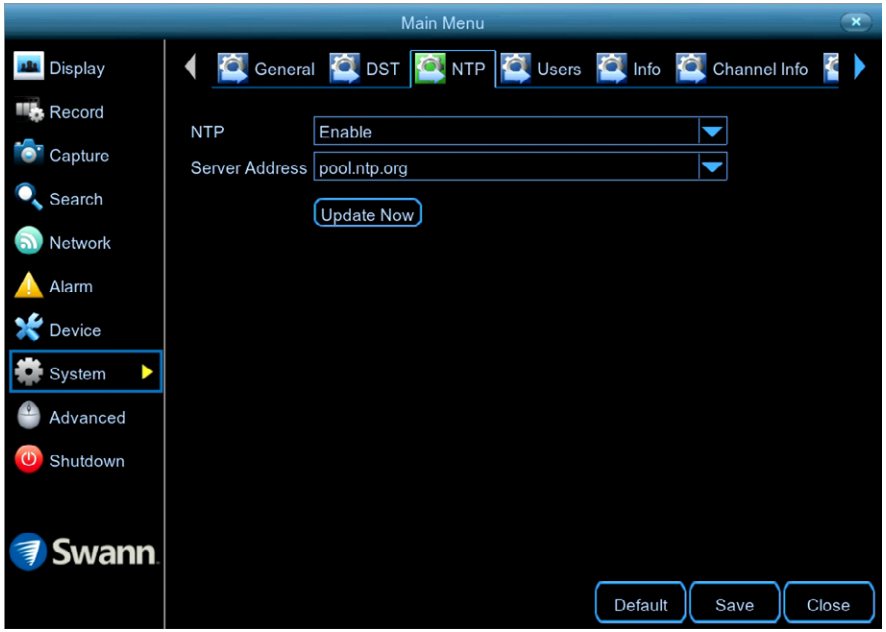
***ch01:*** This represents channel 1. To display channel 2 enter ch02, etc.

***0:*** This represents Mainstream. For Substream enter 1 instead.

**3.** Click "Play" then enter the user name and password (if required). You will now see a live view image from your camera.

# System: NTP

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



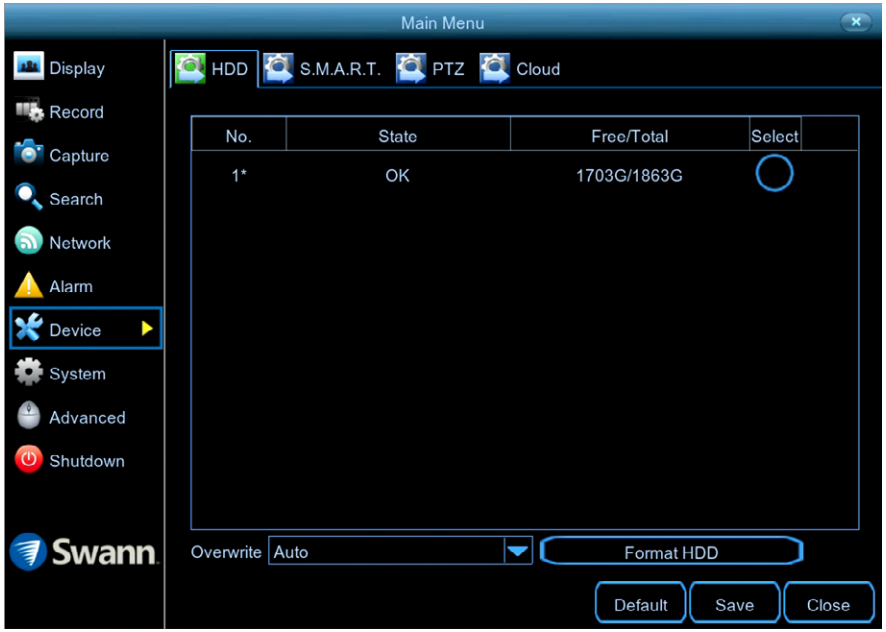

- Don't forget to click "Save" to apply settings.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

**NTP:** This is enabled by default.

**Server Address:** The default time server will work in most circumstances. If for some reason the DVR's clock is not syncing, select a different time server.

**Update Now:** If for some reason the date and time are not correct, click this button to update then click "OK" to continue.

# Device: HDD




- Don't forget to click "Save" to apply settings.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

This function gives you the option of formatting your DVR's hard drive, and it will be listed here for selection.

**Overwrite:** This instructs your DVR to overwrite the oldest video files as the hard drive becomes full. You also have the option of disabling this or selecting the amount of days events are kept before they are overwritten. It's recommended to leave the default selection as this prevents your DVR from running out of storage space.

**Format HDD:** Click the checkbox to select the hard drive then click this button to format. A message will appear noting that all data will be erased. Click "OK" to continue.

**Please note:** From time to time, we recommend that you format the hard drive. This ensures that your DVR maintains system integrity.

Connect a USB flash drive to copy events that you want to save. Remember, formatting the hard drive erases all your recordings.

*If a new hard drive has been installed inside your DVR, you need to format the drive before it can be used.

# Device: S.M.A.R.T.

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




- Don't forget to click "Save" to apply settings.
- Click the "Close" button to exit the Main Menu.

**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 DVR to continue saving to the drive.

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

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

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

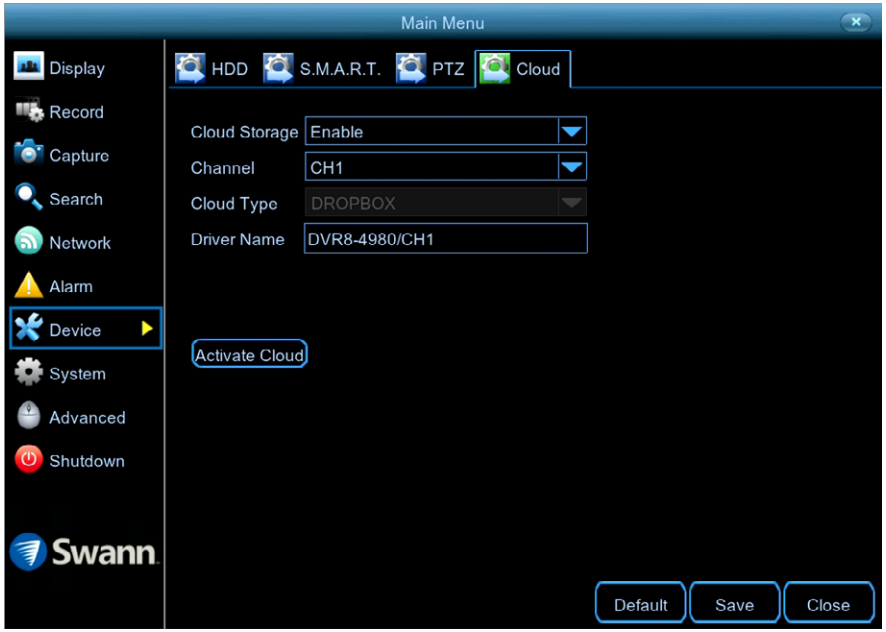
**Long:** This is a longer test that verifies the above as well as performing a surface scan to reveal problematic areas (if any) and forces bad sector relocation.

When performing a test, your DVR will continue to work as normal.

In most circumstances, the information here will not be needed for general use of your DVR, however one of our Swann Helpdesk & Technical Support staff may ask you to access this if you call for assistance.

# Device: Cloud

When the "Capture" function has been enabled, your DVR has the ability to copy snapshots to the cloud via Dropbox. Dropbox is a free service that allows you to easily store and share snapshots and always have them on hand when you need them.




- Don't forget to click "Save" to apply settings.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

Before activating the cloud function, we recommend that you create a Dropbox account using the same email address and password used for your DVR. Go to www.dropbox.com, input your name, email address and password, agree to the terms & conditions then click the sign up button.

**Cloud Storage:** Click the drop down menu to enable.

**Channel:** Select a camera that you would like to enable for cloud storage.

**Activate Cloud:** Click this to activate then click "OK" to confirm.

After a short moment, you will see a message on-screen. An activation link has been sent to your email (the email address used to receive email alerts). Check your email then click the link to activate. You will be taken to the Dropbox website. Click "Allow" to finalise the activation. Repeat these steps if you would like to enable cloud storage for the other cameras available.

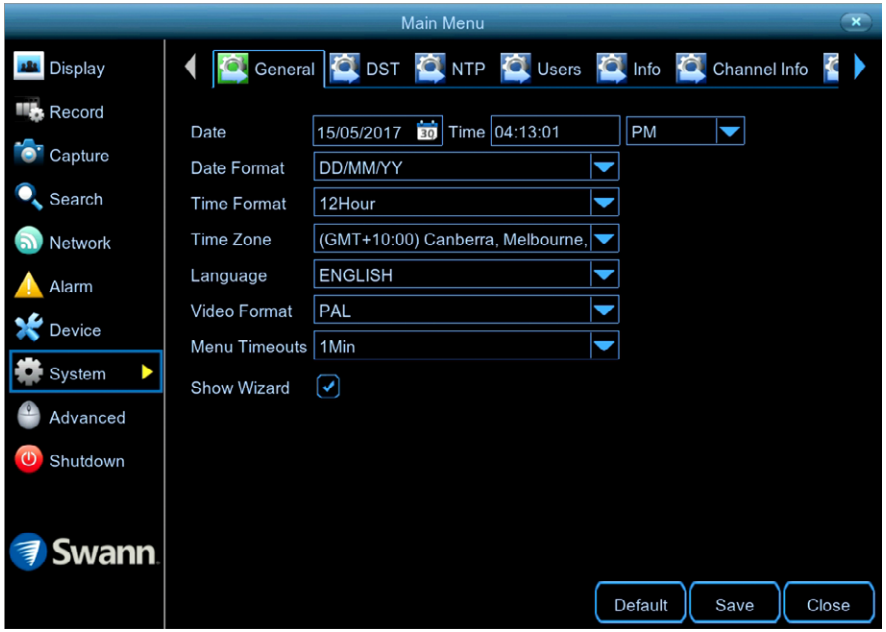
With the cloud function enabled, you need to instruct your DVR to send alerts to the cloud:

1. In the Main Menu, click "Alarm".
2. Click the drop down menu to select the camera that you enabled for cloud storage.
3. Click the "Send to Cloud" checkbox then click "Save".

Use the "Copy" function to apply cloud alerts to the other cameras available.

When browsing your files in Dropbox, you will see a "DVR8-4980" folder. Click this then click the folder for the camera that you enabled for cloud storage. Your snapshots will be saved here. Click a snapshot to display.

# System: General




- Don't forget to click "Save" to apply settings.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

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

**Time:** Click the dialogue box to change the time. Click the drop down menu to select AM or PM.

As NTP is enabled by default, the date and time should always remain accurate.

**Date Format:** Click the drop down menu to select the preferred date format.

**Time Format:** Click the drop down menu to select the preferred time format (the playback interface will display in 24-hour time only).

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

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

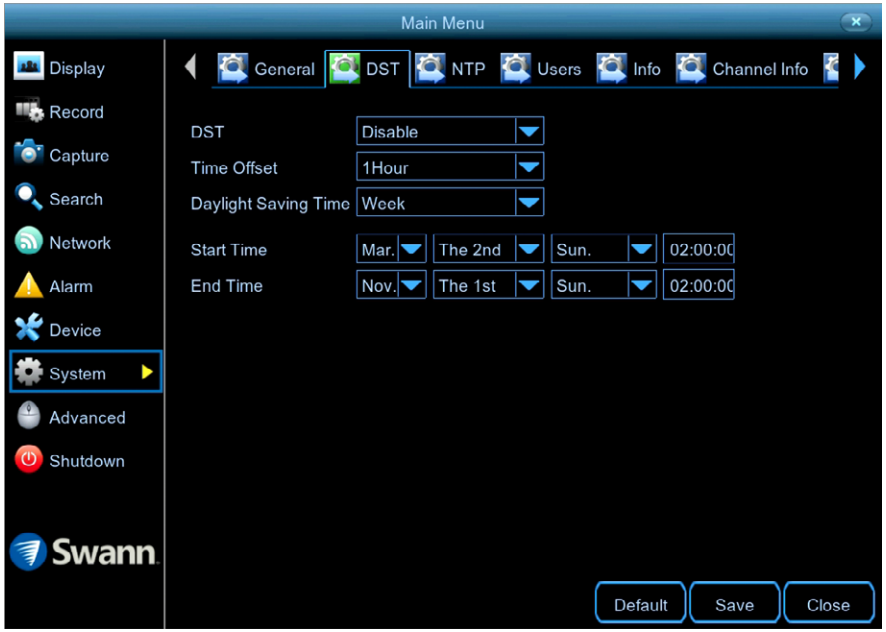
**Video Format:** Select the correct video standard for your country. USA and Canada are NTSC. UK, Australia and New Zealand are PAL.

**Menu Timeouts:** Click the drop down menu to select the time your DVR 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 DVR.

# System: DST

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.




- Don't forget to click "Save" to apply settings.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

**DST:** If Daylight Saving applies to your time zone or region, click the drop down menu 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.

**Daylight Saving Time:** 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, 2 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.

# System: Users




To change your DVR's password, click the "Edit" button. The password has to be a minimum of six characters and can contain a mixture of numbers and letters. Enter your new password again to confirm.

Additional user accounts can also be enabled:

**1.** Select "user1" then click the "Edit" button.

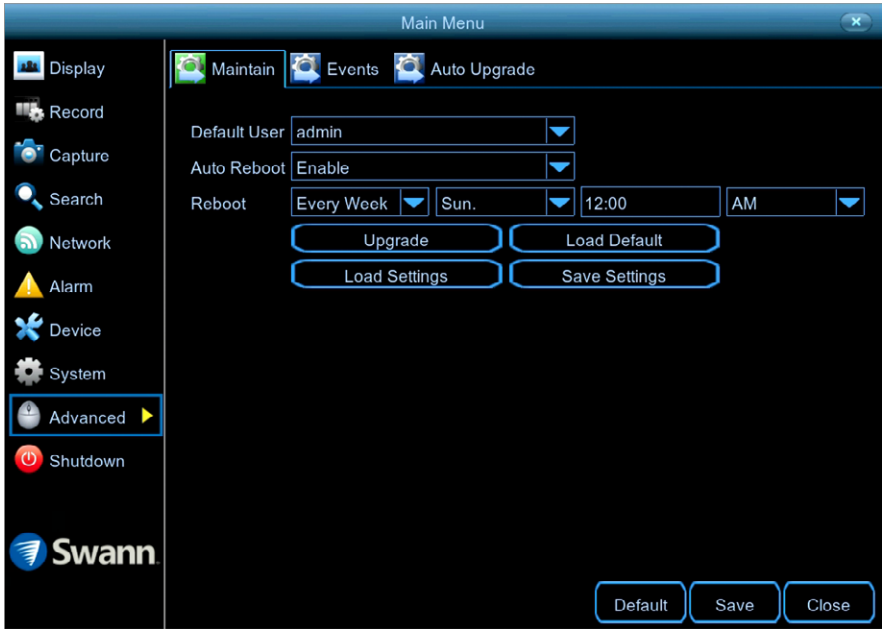
**2.** Click the drop down menu to enable.

**3.** Enter a user name and password.

**4.** Click the "Save" button, enter the admin password then click "OK" to confirm.

To change permissions, click the "Permission" button then select which options you would like to enable. Click the "All" button to select all options. Click the "Save" button then click "OK" to confirm.

# Advanced: Maintain




- Don't forget to click "Save" to apply settings.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

**Default User:** Admin is the default user account. If multiple user accounts have been created, click the drop down menu to disable.

**Auto Reboot:** It is recommended to leave this enabled, as it maintains the operational integrity of your DVR.

**Reboot:** Choose an appropriate day and time to reboot your DVR.

**Upgrade:** Click this button to upgrade the firmware from a USB flash drive. Select the firmware file then "OK" to confirm. When the firmware upgrade has completed, your DVR will reboot automatically.

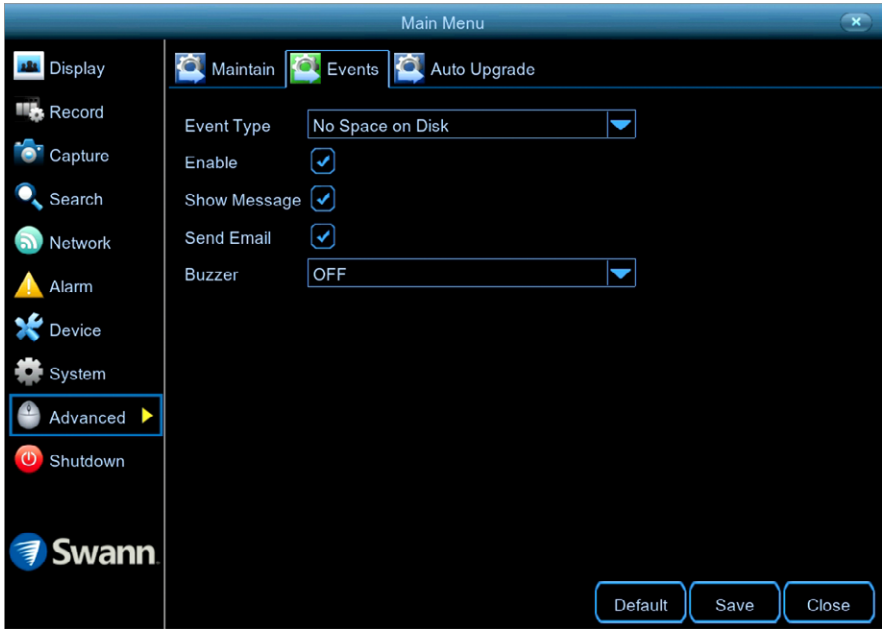
**Load Settings:** Click this button to import a configuration file containing all the settings that you have customised.

**Load Default:** Click this button to restore factory default settings. Click "All" then click "Save". Your DVR will reboot and the Startup Wizard will appear on-screen.

**Save Settings:** Click this button to export a configuration file containing all the settings that you have customised.

# Advanced: Events

Whenever there is an event or if your DVR displays unusual behaviour, you can be alerted to in multiple ways such as receiving an email, displaying a message on-screen, receiving an alert in the HomeSafe View app and activating its internal buzzer. There are three event types that your DVR will detect as an exception.




- Don't forget to click "Save" to apply settings.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

**Event Type:** Select the event type that you would like to change.

**Enable:** Click the checkbox if you would like to disable alerts for the event selected.

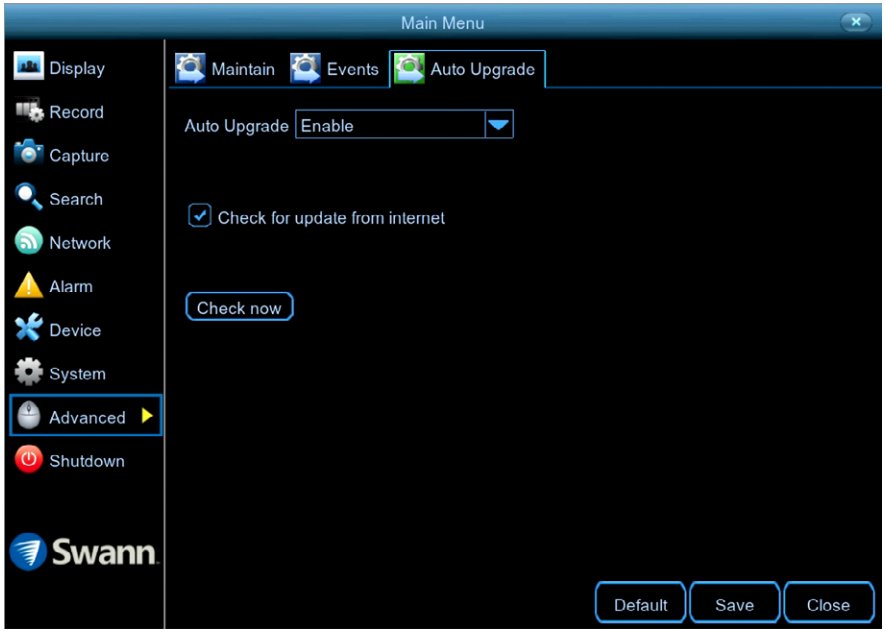
**Show Message:** Click the checkbox if you like to disable the on-screen message for the event selected.

**Send Email:** Click the checkbox if you would like to disable email alerts for the event selected.

**Buzzer:** Click the drop down menu and select the time period for the internal buzzer to activate for the event selected.

**Please note:** When your DVR detects an exception, it will automatically send an alert to the HomeSafe View app (alarm notification has to be enabled within the app - see "Alarm Mode" in the HomeSafe View manual for more information).

# Advanced: Auto Upgrade




- Don't forget to click "Save" to apply settings.
- Click the "Default" button to revert back to default settings.
- Click the "Close" button to exit the Main Menu.

**Auto Upgrade:** By default, your DVR will automatically download and install new firmware when available. Click the drop down menu if you would like to disable this feature.

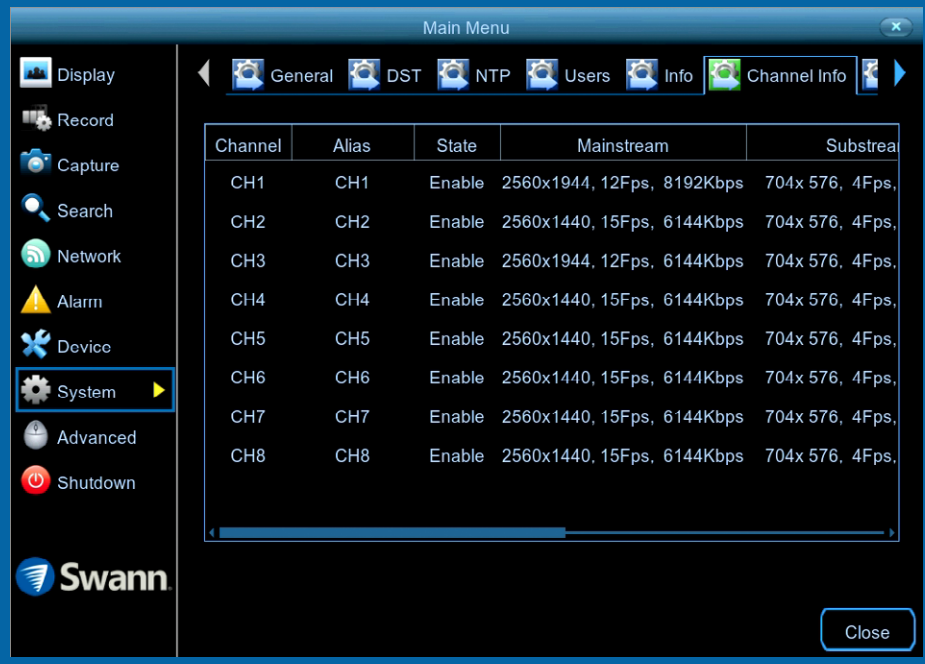
**Check for update from internet:** By default, your DVR will automatically check and alert you if new firmware is available for download. Click the checkbox if you would like to disable this feature.

**Check now:** Click this button to check if new firmware is available. If new firmware is available, follow the on-screen instructions.

## System Status

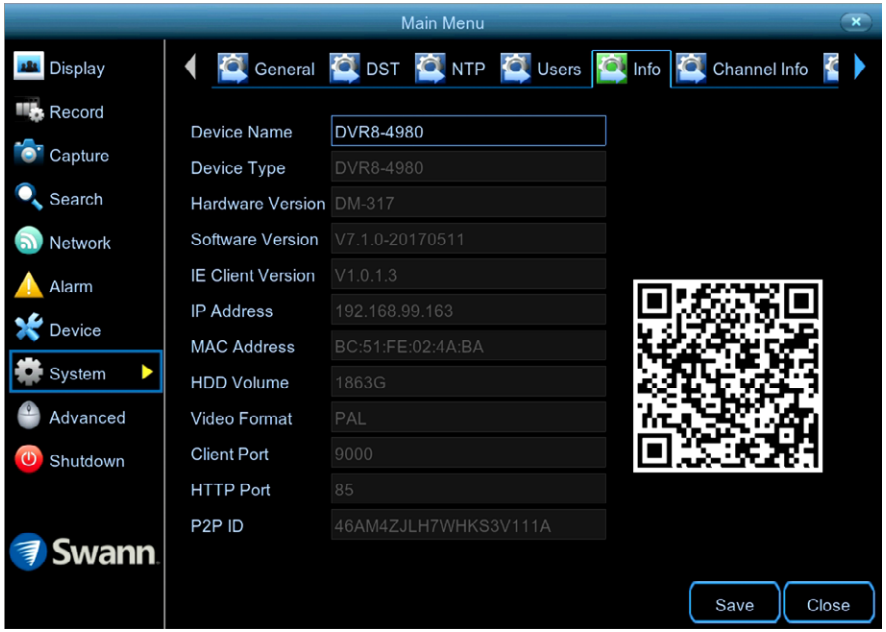
The various status tabs give you an overview of the various settings and options that have been selected for your DVR to function. Each action that your DVR performs as well as events detected are logged, which you can search and view. If you call our helpdesk for assistance, our staff may ask you to access these tabs to assist them in solving any technical issues that you may be having.



# System: Info

This tab displays technical information about your DVR as well as your device ID and QR code. If you call our help-desk for assistance, our staff may ask you to access this tab to assist them in solving any technical issues that you may be having.



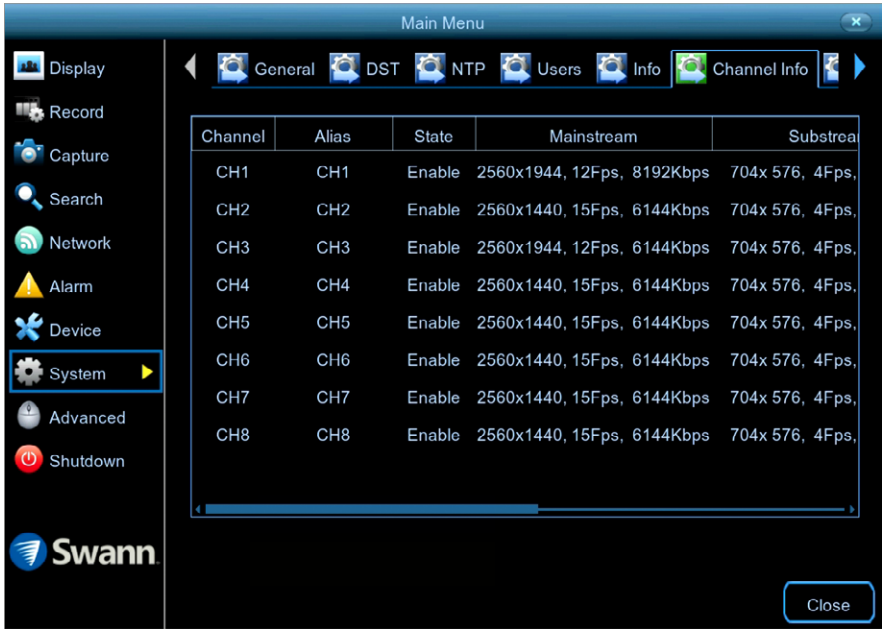

- Don't forget to click "Save" to apply settings.
- Click the "Close" button to exit the Main Menu.

**Device Name:** Click the dialogue box to rename your DVR (if required).

**MAC Address:** You can use this as a recovery password if you have forgotten your current password.

If you call our helpdesk for assistance, our staff may ask you to access this tab to assist them in solving any technical issues that you may be having.

# System: Channel Info




Displays the Mainstream and Substream settings used for each camera connected.

If you call our helpdesk for assistance, our staff may ask you to access this tab to assist them in solving any technical issues that you may be having.

- Click the "Close" button to exit the Main Menu.

# System: Record Info



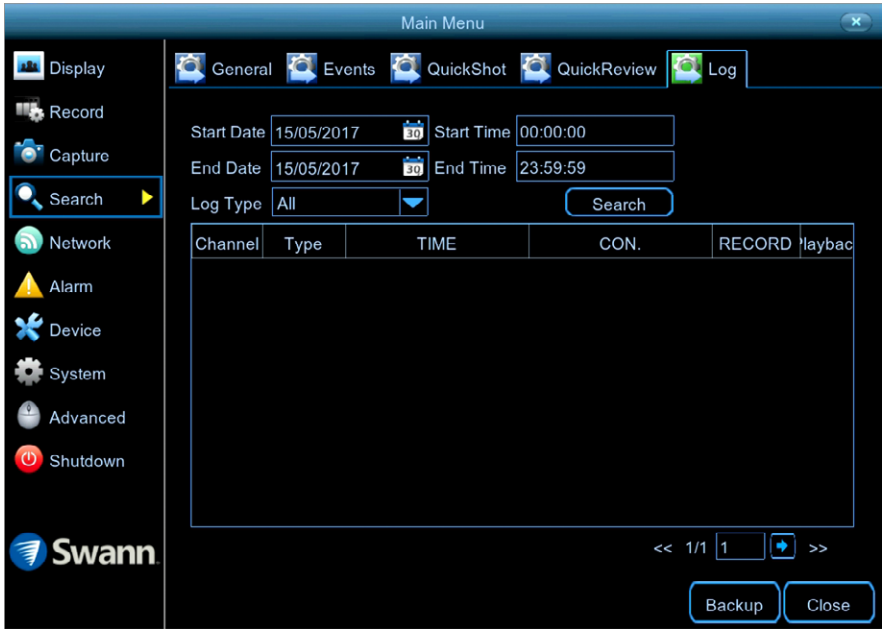

Displays the recording settings for each camera connected.

If you call our helpdesk for assistance, our staff may ask you to access this tab to assist them in solving any technical issues that you may be having.

- Click the "Close" button to exit the Main Menu.

# Search: Log

Each action that your DVR performs as well as events detected are logged. These log files can be searched, viewed and copied to a USB flash drive for safe keeping.




**Start/End Date:** Click the calendar icon to select the month, year and date that you would like to search on.

**Start/End Time:** You can leave the default selection or you can click the dialogue box to enter a specific start and end time.

**Log Type:** Leave the default selection or click the drop down menu to select a specific action that you would like to search for.

**Search:** Click this to display a list of log files that match your search criteria. Double-click a file to display information about that log.

**Backup:** Click this to copy the log files that match your search criteria. Insert a USB flash drive to your DVR then click "Save". You have the choice of formatting the flash drive or creating a new folder if required. Click "OK" to save then click "Close" when finished.

Click for contents

# Glossary

**3D-Noise Filter:** Is an enhanced form of digital noise reduction. The advancement in technology enables noise to be filtered even more effectively from the image, even in low light conditions.

**50Hz:** Is the mains frequency used in the UK, Australia and most European countries.

**60Hz:** Is the mains frequency used in the United States, Canada and some Latin American countries.

**AGC (Automatic Gain Control):** In low light conditions, the camera will automatically boost the gain control so that people and objects can be seen more clearly. The advantage of this technique is that your camera will produce images in much lower light conditions. The downside is that the amplification will increase the video noise visible.

**AHD:** Is an analogue high definition closed-circuit television video surveillance standard that uses coax cable to transmit HD video from security cameras to DVRs. AHD supports 720p and 1080p HD video resolutions.

**Anti-flicker:** As fluorescent lighting operates at the same frequency as your mains power, this will cause luminance flicker when viewed through the camera. Enabling the anti-flicker options available can reduce or eliminate the flicker that is visible.

**Anti-smearing:** A smear effect means that a bright vertical line originating from a bright light source appears in the image. This happens especially with back lighting. Enabling this allows people and objects to be seen correctly against a very bright background.

**Auto DNS (Domain Name System):** A service that stores domain names and translates them into internet protocol addresses. For example, www.google.com will have a DNS server address that is equivalent to 74.125.224.72. The DNS server is automatically provided by your internet service provider.

**Auto-focus:** Will adjust the lens of your camera to focus on an object being viewed.

**Bandwidth:** In computer networks, bandwidth is used as a synonym for data transfer rate, the amount of data that can be carried from one point to another in a given time period (usually a second). Network bandwidth is usually expressed in bits per second (bps).

**Bitrate:** The amount of data that your DVR or NVR will use to record video. The higher the bitrate, the more space each recording will consume on the hard drive. Increasing this will also consume more bandwidth when streaming. Unit of measurement is either Mbps (megabits per second) or kbps (kilobits per second).

**BLC (Back Light Compensation):** Improves exposure of an object that is in front of a light source. It does this by splitting the whole image into different regions, and then applying separate exposure levels to those regions.

**Brightness:** This changes how light the image appears to be. Its value is different in darkness to that in daylight. For example, the lights from car headlights appears to be brighter at night.

**CDS:** This allows the image to be set by the camera's light sensor. A CDS sensor is basically a resistor that changes its resistive value (in ohms) depending on how much light is shining onto the sensor.

**Cloud:** Cloud computing is a model for delivering information technology services in which resources are retrieved from the internet through web-based tools and applications rather than a direct connection to a server. Services such as Dropbox, Google Drive and Microsoft OneDrive are just some of the examples of cloud computing.

# Glossary

**Compound Stream:** Indicates that your DVR or NVR is recording video and audio at the same time.

**Contrast:** This increases the difference between the blackest black and the whitest white in the image. Without contrast you wouldn't have an image because there wouldn't be any differentiation between light and dark.

**Covert:** The camera will detect motion and trigger your DVR or NVR to record, but you will not see an image of the camera in Live View mode.

**DDNS (Dynamic DNS):** Is a service that converts IP addresses into host names (a host name is a lot easier than trying to remember an IP address). It also supports dynamic IP addresses, such as those assigned by a DHCP server. This makes DDNS a good fit for home networks, which normally receives an IP address from the ISP that will change occasionally.

**DHCP (Dynamic Host Configuration Protocol):** Uses an appropriate server or router to enable dynamic assignment of an IP address to a device connected to the network.

**Display Resolution:** Is the number of pixels supported by your TV or VGA monitor or the output signal of a viewing device, e.g. your DVR or NVR.

**DNS Server:** Is a standard technology for managing public names of web sites and other internet domains. DNS technology allows you to type names into your web browser which your computer will automatically find the address on the internet.

**DST (Daylight Saving Time):** Is the period of the year when clocks are moved one hour ahead.

**DualStream:** A process where your DVR or NVR will record both Mainstream and Substream video at the same time.

**Format:** Is a command that prepares a storage device such as a USB flash drive or hard drive to hold data.

**Firmware:** The software that operates a discrete device (e.g. your smartphone). It is referred to in this way rather than software as it is integral to the operation of the device.

**Frame Rate:** The measurement of the rate that pictures are displayed to create a video feed. The unit of measurement is frames per second (fps).

**Gateway:** Is a node or router that routes traffic from a device on your home network to the outside network that is providing access to the internet.

**H.264+:** Mass video data requires increased storage capacity. To resolve this issue, video compression technologies are used to reduce the data while maintaining image quality. H.264+ is an innovative encoding technology aimed at surveillance video.

**Hardware:** A physical device such as your DVR or NVR.

**HDD (Hard Disk Drive):** Is a storage device located inside your DVR or NVR. It is where all data is kept, saved and stored.

**HTTP Port (Hypertext Transfer Protocol):** This port is used to log into the web browser interface of your DVR or NVR (if available) using a web client, such as Internet Explorer.

**Hue:** Is somewhat synonymous to what is usually referred to as colors. By altering the hue, you can change the color mix of the image.

**IP Address:** The address of a device attached to the network. Each device on the network must use a unique address. IP addresses range from 0.0.0.0 to 255.255.255.255.

**Live View:** Is the default display mode for your DVR or NVR. Each camera connected will be displayed on-screen.

# Glossary

**MAC Address:** Is a unique identifier for network hardware. Can also be used as a super password if you have forgotten your current password.

**Mainstream:** Is the video stream that your DVR or NVR will display and record.

**Mask:** Is used to obscure part of your image for privacy. It can also be used to minimise false triggers when your DVR or NVR detects motion. Any area obscured won't be shown live or recorded.

**Menu:** Is where you control the various actions and options that are available on your DVR or NVR.

**Motion Detection:** Is the main method used by your DVR or NVR to detect motion and is an essential part of your security system. It does this by comparing one frame of video with the next. A certain amount of difference between these two frames is interpreted as motion.

**NAS (Network Attached Storage):** A network device with one or more HDDs that other network devices can use as if the storage was connected directly.

**NIC (Network Interface Controller):** The hardware component that allows a device to connect to a network. Both wired and wireless NICs exist for these respective purposes.

**NTP (Network Time Protocol):** Is used to synchronize your DVR or NVR's clock automatically with a network time server. Most time servers are on the internet.

**NTSC:** Is the video system used in North America, Canada and some Latin American countries. In NTSC, 30 frames are transmitted each second.

**Optical Zoom:** Is a true zoom feature. It allows you to zoom in (or out) on an object to get a closer view by using the camera's lens.

**OSD (On-screen Display):** Display information from the camera such as time, date and camera name on-screen.

**Overscan:** Is mainly used on older television sets to display the entire viewable area correctly on-screen. It does this by cutting off the edges of the picture. This is not required for modern Plasma and LCD TVs as the image is digitally processed to display the correct aspect ratio.

**Pack Duration:** Instructs your DVR or NVR to split recordings into discrete units. Each unit can be a maximum of 60 minutes in length. Your DVR or NVR will play these as one continual video.

**PAL:** Is the video system used in the United Kingdom, Australia and most European countries. In PAL, 25 frames are transmitted each second.

**Post-record:** Instructs your DVR or NVR to record for a set period of time after an event has occurred.

**PPPoE (Point-to-Point Protocol over Ethernet):** Is the most common method that your router uses to login to your ISP to enable your internet connection. This setting also exists on the DVR or NVR, but is only for advanced users as the configuration required is difficult to complete and requires a modem-only device (or a modem/router set to modem-only).

**Pre-record:** Allows your DVR or NVR to record for a number of seconds before an event occurs.

**Privacy Zone:** See Mask for information.

**Resolution:** The measure of detail that can be seen in an image. The higher the number, the greater the detail available.

**RTSP (Real Time Streaming Protocol):** A network protocol designed to transmit video and audio information over networks and the internet in real time.

# Glossary

**Saturation:** This alters how much color is displayed in the image. The higher the saturation, the more bright and vivid colors will appear.

**Server Port:** Is a logical connection place and specifically, using the internet protocol TCP/IP, the way a client program specifies a particular server program on a computer in a network.

**SEQ:** Puts the DVR or NVR in sequence mode. This will repeatedly cycle through each video channel for a predetermined time in Live View mode.

**S.M.A.R.T. (Self-Monitoring, Analysis & Reporting Technology):** This is an automatic system on modern HDDs and SSDs to detect potential drive errors before they occur.

**SMTP (Simple Mail Transfer Protocol):** This is used to send an outbound email (e.g. from you DVR or NVR to an email address).

**SMTP Port:** Is the port number used by a SMTP server to listen for email send requests. This is specified by your email provider.

**SMTP Server:** This is the address of the server used for SMTP. Usually in the form of a web address (e.g. smtp.gmail.com).

**Software:** A set of instructions that runs on a computing device.

**SSID:** Is the technical term for a wireless network name. When you setup a wireless network, you give it a name to distinguish it from other networks in your neighbourhood.

**SSL (Secure Socket Layer):** A secure method for connecting to servers. In the context of the DVR or NVR, primarily used for email server connections.

**Static:** When referring to IP addresses, this is where a device's IP address has been manually entered. Sometimes used on older devices without UIDs to prepare for internet access.

**Static DNS:** In some circumstances, your internet service provider may require you to use a static DNS instead of an auto DNS on your router.

**Substream:** Is the video stream that your DVR or NVR will send to remote devices via the network or internet. Video quality is reduced to make it easier to send.

**Subnet Mask:** Used to define which part of the IP address refers to the network location.

**Time Server:** Is a server that reads the actual time from a reference clock and distributes the information to its clients on the network.

**Time Zone:** Is a region that observes a uniform standard time for legal, commercial, and social purposes. It is convenient for areas in close communication to keep the same time.

**Timestamp:** Is a sequence of characters or encoded information identifying when a certain event occurred, usually giving date and time of day, sometimes accurate to a small fraction of a second.

**TVI:** Is a digital signal processing and transport technology for video used in HD security cameras. TVI cameras currently support 1080p video resolution using the same coaxial cabling techniques used by traditional analogue CCTV cameras.

**UID (Unique Identifier):** Is an alphanumeric string that is associated with a single entity within a given system. By entering your UID into the mobile app or computer software, this allows you to communicate with your DVR or NVR without having to remember IP addresses or port numbers.

**UPnP (Universal Plug and Play):** A network protocol designed to allow network connected devices to automatically configure the router for the purposes of remote access. Not required to be enabled when using UID.

# Glossary

**VCA (Video Content Analysis):** Is a new method for triggering recording and events. This uses the image processing system of the DVR or NVR & camera to set specific triggers for recording (such as line crossing or intrusion). This system does use more processing power, therefore it may not be available on all devices.

**Video Loss:** Is regarded as a potential alarm event and is considered to occur any time your DVR or NVR doesn't receive an active video signal from any one of its video inputs.

**Video Quality Diagnostics:** Enables your DVR or NVR to alert you if the camera has a blurred image, abnormal brightness or unwanted tint in the image due to the lighting and white balance of the camera (known as Color Cast).

**Video Stream:** Indicates that your DVR or NVR is recording a video stream only.

**WDR (Wide Dynamic Range):** Is technology to balance out images that have a large dynamic range. An example of this situation would be if an indoor camera were pointing towards a window or building entrance. The image produced by the camera during the day would be extremely washed out due to the high brightness of the incoming light.

# Frequently Asked Questions

### Can I play video(s) on my DVR that I have copied to a USB flash drive?

No, your DVR doesn't have the option to play video(s) from a USB flash drive. You will have to play them on your computer or mobile device.

### What is the largest hard drive that I can install inside my DVR?

The largest hard drive you can install is 6TB (terabyte). We recommend that you purchase a drive that is surveillance rated such as the Western Digital Purple™ and Seagate Skyhawk™ range of drives.

### Can I connect and record to a portable USB hard drive?

No, your DVR will only record to the internal hard drive that is installed.

### Can I connect and copy videos to a portable USB hard drive?

Due to the nature of how portable USB hard drives operate, there is no guarantee that your drive, when connected to the DVR's USB port, will work. You'll have to give it a try. For backup purposes, we recommend using a USB flash drive.

### How do I save video recordings that are on my DVR?

To copy video recordings to a USB flash drive, use the Search: Events function (see page 36).

### Can I use my own email address and server instead of creating a new one?

You can providing you have the settings required for the SMTP port and server. If you don't have this, you will have to contact your internet service provider to get this information.

# Warranty Information


**USA**

Swann Communications USA Inc.
12636 Clark Street
Santa Fe Springs CA 90670
USA

**Australia**

Swann Communications
Unit 13, 331 Ingles Street
Port Melbourne Vic 3207
Australia

**United Kingdom**

Swann Communications LTD.
Stag Gates House 63/64 The Avenue
SO171XS
United Kingdom


## Warranty Terms & Conditions

Swann Communications warrants this product against defects in workmanship and material for a period of one (1) year from its original purchase date. You must present your receipt as proof of date of purchase for warranty validation. Any unit which proves defective during the stated period will be repaired without charge for parts or labour or replaced at the sole discretion of Swann. The end user is responsible for all freight charges incurred to send the product to Swann's repair centres. The end user is responsible for all shipping costs incurred when shipping from and to any country other than the country of origin.

The warranty does not cover any incidental, accidental or consequential damages arising from the use of or the inability to use this product. Any costs associated with the fitting or removal of this product by a tradesman or other person or any other costs associated with its use are the responsibility of the end user. This warranty applies to the original purchaser of the product only and is not transferable to any third party. Unauthorized end user or third party modifications to any component or evidence of misuse or abuse of your device will render all warranties void.

By law some countries do not allow limitations on certain exclusions in this warranty. Where applicable by local laws, regulations and legal rights will take precedence.

**For Australia:** Our goods come with guarantees which cannot be excluded under Australian Consumer Law. You are entitled to a replacement or refund for a major failure and for compensation for any other reasonably foreseeable loss or damage. You are also entitled to have the goods repaired or replaced if the goods fail to be of acceptable quality and the failure does not amount to major failure.

# Helpdesk & Technical Support

| | |
|---|---|
| **Technical Support E-mail:** | tech@swann.com |
| **Technical Support Website:** | support.swann.com |
| **Telephone Helpdesk** | |
| **USA Toll Free** | 1-800-627-2799 |
| **USA Parts & Warranty** | 1-800-627-2799 |
| | (M-F, 9am-5pm US PT) |
| **AUSTRALIA** | 1800 788 210 |
| **NEW ZEALAND Toll Free** | 0800 479 266 |
| **UK** | 0808 168 9031 |

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