Swann
Advanced Security Made Easy

Digital Video Recorder

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

- Make sure product is fixed correctly and stable if fastened in place
- Do not operate if wires and terminals are exposed
- Do not cover vents on the back of the device and allow adequate space for ventilation
- Only use the power adapter supplied with the DVR

Password Information

To ensure your privacy, this device supports password protection. The default all-access username is **admin**, the default password is **12345**.

To ensure your on-going privacy, we strongly recommend setting a password as soon as possible. Choose something that you'll remember, but that others would be unlikely to guess.

Important Notice - Do <u>not</u> lose or forget your password. To ensure that your DVR has the best security possible, password recovery has been designed to be a complicated and time consuming process. Only a select number of staff at Swann Helpdesk & Technical Support can assist. Password retrieval can take several days, which means you will not be able to access your DVR during this time.

Contents

# Contents (cont.)

Menu

The Menu is where you control the various actions and options that are available on the DVR. You can access previously recorded video for playback which you can also export to a USB storage device such as a 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 the DVR.
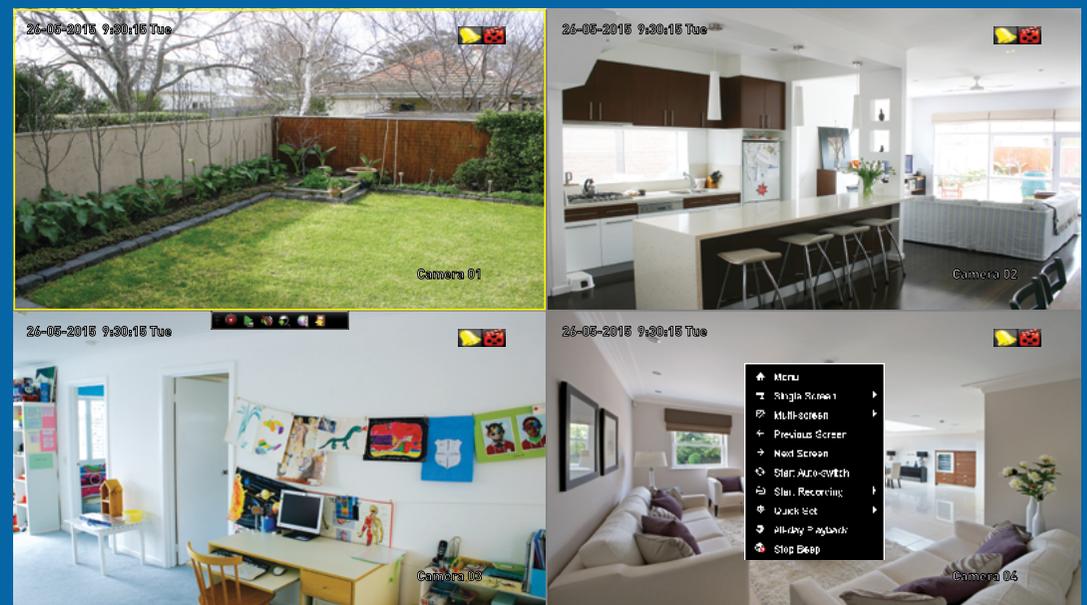
Menu Layout
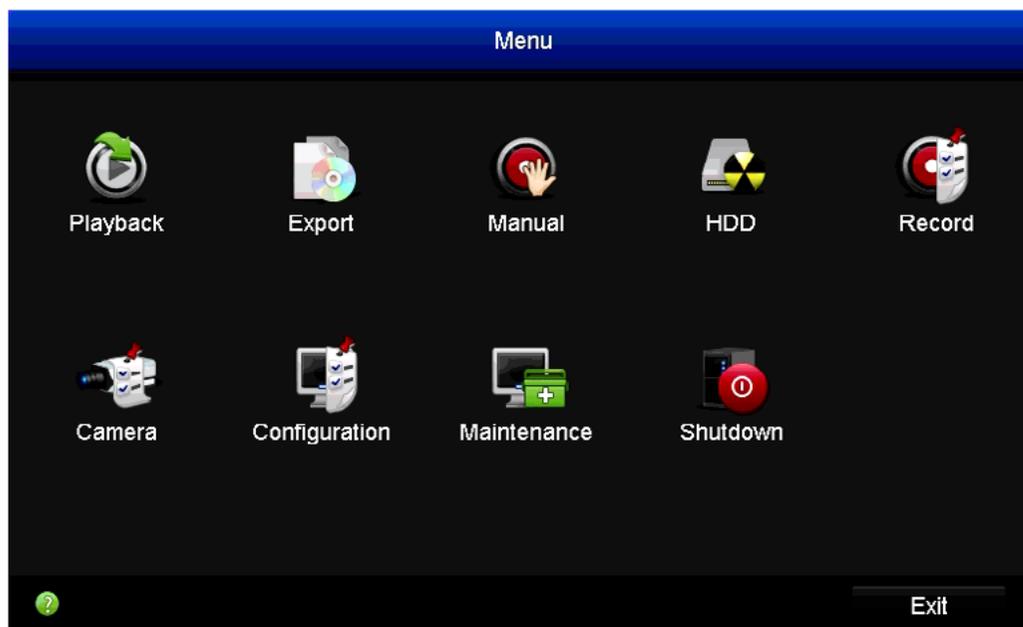
Playback: Click this to access video files stored on the hard drive. There are several modes to choose from, such as Normal, Event, Tag and Smart. You can also play files that have been exported to a USB storage device such as a flash drive.

Export: Click this to copy or backup footage from the DVR. You'll need a compatible USB storage device such as a flash drive to export the files to.

Manual: Access manual controls for the recording functions of the DVR.

HDD: Where you'll be able to access information about and adjust the settings of your hard drive.

Record: Access recording options, such as quality, resolution, bitrate and the recording schedule.

Camera: Adjust image settings such as brightness and contrast and access to Video Quality Diagnostics to alert you to blurred images and abnormal brightness. Controls for Motion Detection, Privacy Mask and Video Tampering are also available here.

Configuration: Access and configure many settings of the DVR, including network settings, adjusting the time & date and creating or altering user accounts.

Maintenance: For accessing system information, log information and to upgrade the firmware.

Shutdown: To shutdown, reboot or log out of the DVR.

Camera Configuration

The camera configuration options are available in the "Record" and "Camera" menus that are accessible from the Menu. You can change the resolution and bitrate settings as well as image settings for brightness and contrast. The DVR has several controls for Motion Detection, Tamper-proof and Video Loss as well as the ability to apply one or more Privacy Masks.
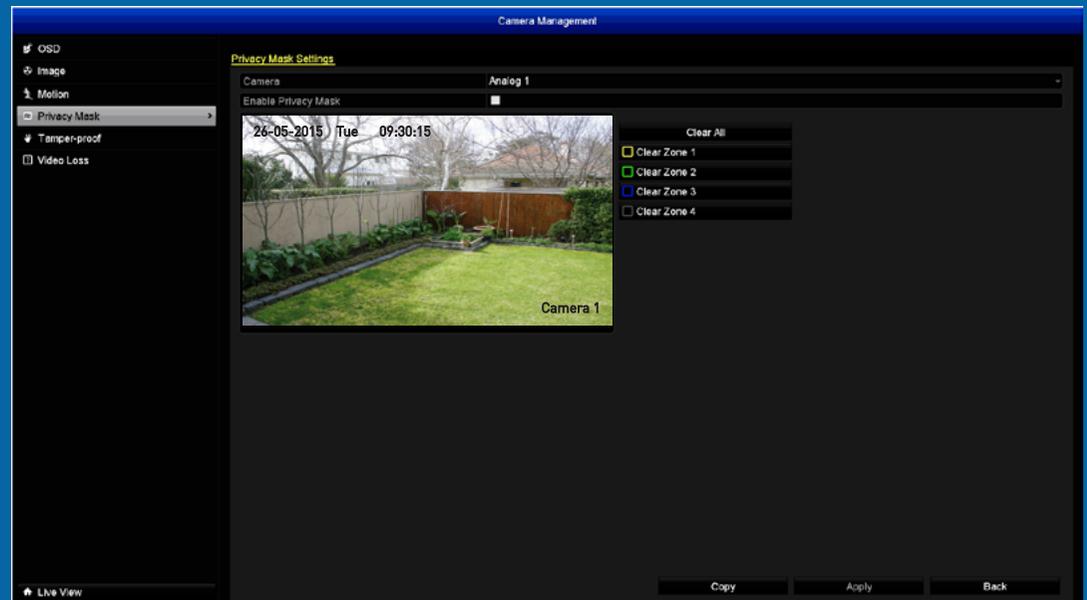
Record: Encoding - Record

The Encoding function allows you to change the resolution and bitrate for each camera connected. By default the recording resolution is automatically selected to fit in with the capabilities of the provided cameras.

Camera: Select a camera that you would like to edit.

Resolution: Displays the Main Stream resolution for both Continuous and Event recording (we recommend to have the same settings for both).

Stream Type: By default "Video" is selected. Select "Video & Audio" if you have an audio source connected to the DVR's audio input.

Frame Rate: The frame rate is determined by the cameras included with the DVR as well as the number of video inputs available. For 960H (960 x 576 PAL, 960 x 480 NTSC) cameras, 10fps is the maximum frame rate available. Full Frame (25 or 30fps) is available on the lower resolution (720 x 576 PAL, 720 x 480 NTSC).

Video Quality: The amount of data the DVR will use to record video. Lowering the quality reduces the file size of each video saved.

Pre-record: The Pre-record function reduces the chance of an Event not being recorded. It is recommended to change this to 10 seconds (10s).

Post-record: Same as above but the DVR will continue recording after an Event has occurred. 30 seconds (30s) is the recommended length.

Expired Time (day): Determines how long the video footage will remain on the hard drive without it being overwritten.

Record Audio: Click the checkbox to enable when selecting "Video & Audio" for the Stream Type.

- Use the "Copy" function to apply all settings to the other cameras.
- Click the "Restore" button to revert back to default settings.
- Don't forget to click "Apply" to save settings.
- Click the "Back" button to go back to the Menu.

Record: Encoding - Substream

The Substream tab gives you control on how video is streamed to your mobile device or computer using the SwannView Plus app and Windows software. You can change the resolution and bitrate if you're having issues streaming live video from your DVR.

Camera: Select a camera that you would like to edit.

Stream Type: By default "Video" is selected. Select "Video & Audio" if you have an audio source connected to the DVR's audio input.

Resolution: The streaming resolution is 352 x 288 (CIF) and cannot be changed.

Frame Rate: The streaming frame rate is 6fps and cannot be changed.

Video Quality: The amount of data the DVR will use to stream live video. When viewing multiple cameras at a single time, a fast upstream connection is required between your DVR and your mobile device. Lowering the quality reduces the amount of data required.

- Use the "Copy" function to apply all settings to the other cameras.
- Click the "Restore" button to revert back to default settings.
- Don't forget to click "Apply" to save settings.
- Click the "Back" button to go back to the Menu.

Camera: OSD
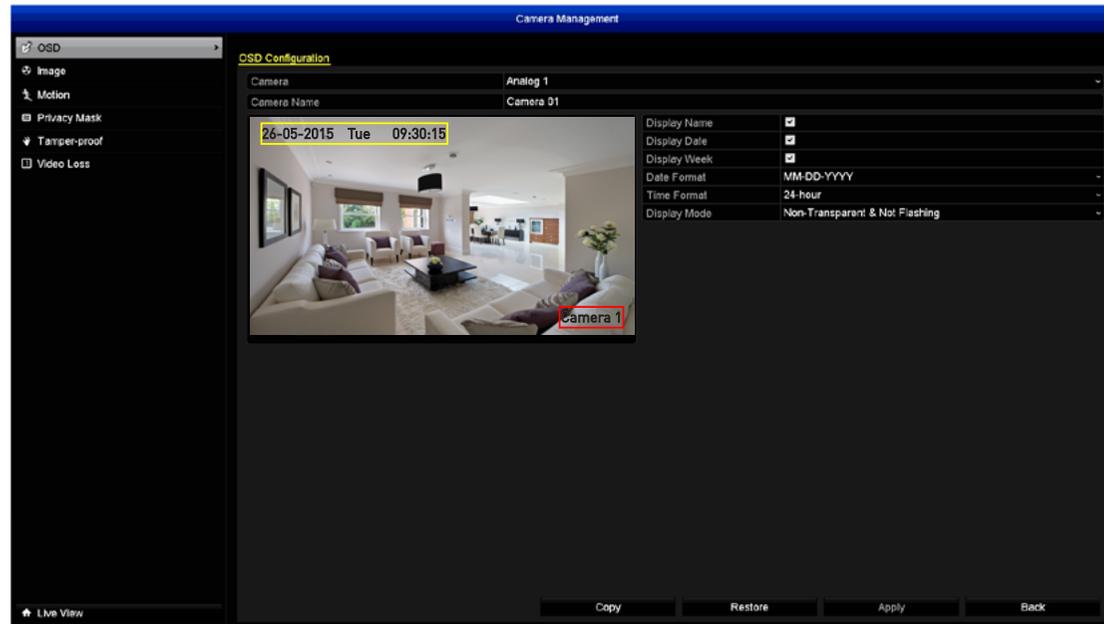
Camera: Select a camera that you would like to edit.

Camera Name: Select a name for the camera you've selected. It can be up to 32 characters in length.

Display Name: This is enabled by default. Click the checkbox if you don't want the camera name displayed.

Display Date: This is enabled by default. Click the checkbox if you don't want the date displayed.

Display Week: This is enabled by default. Click the checkbox if you don't want the day displayed.

Date Format: Select how you would like the date to be displayed.

Time Format: Choose between "12-hour" and "24-hour" time.

Display Mode: Select how you would like the on-screen display to ap-pear on-screen. It's worth having a look at the different settings available to see what best fits.

Use the mouse to click and drag the display name and date to the desired position.

- Use the "Copy" function to apply all settings to the other cameras.
- Click the "Restore" button to revert back to default settings.
- Don't forget to click "Apply" to save settings.
- Click the "Back" button to go back to the Menu.

Camera: Image

You can adjust the various image settings available to help fine-tune your Motion Detection sensitivity. At night, images that you see from the camera may seem to flicker or have increased noise. By tweaking these settings, you can eliminate noise and increase image quality.
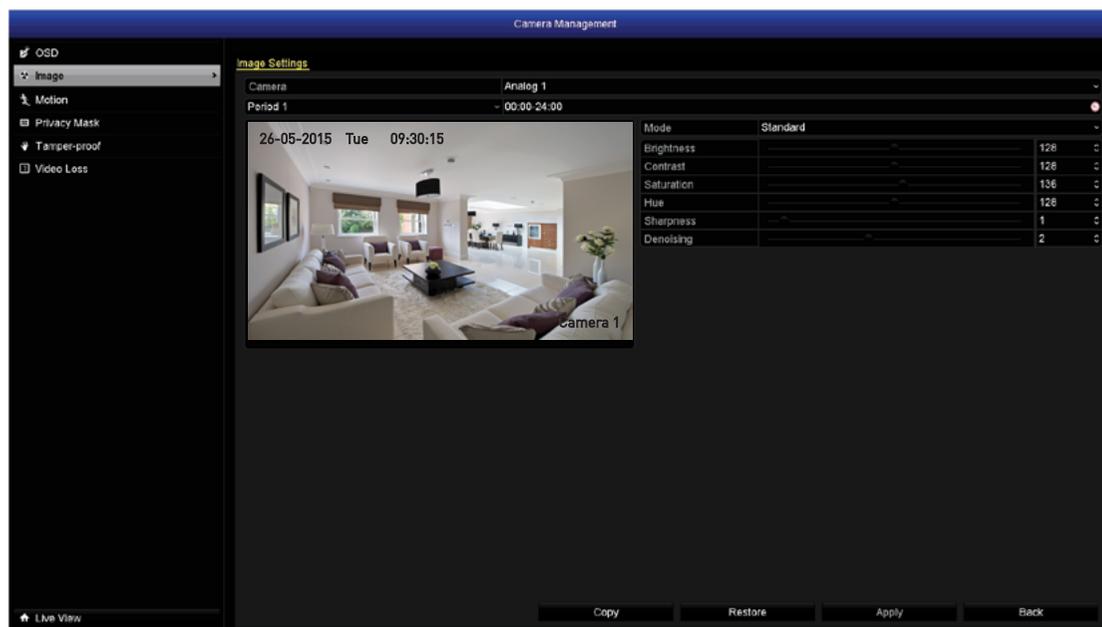
Camera: Select a camera that you would like to edit.

Period 1 & 2: This function gives you the ability to assign a particular pre-set mode or customised settings for two time segments. For example, one time segment for day time and the second time segment for night time.

Mode: You can select from a number of different pre-set modes.

Brightness: 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. Don't set the contrast too high as it will degrade the image quality.

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

Hue: This changes the colour mix of the image.

Sharpness: Increase or decrease the overall sharpness of the image. Increasing the sharpness will also increase the level of video noise that is visible.

**Denoising:** This will reduce the overall noise content in the image.

- Use the "Copy" function to apply all settings to the other cameras.
- Click the "Restore" button to revert back to default settings.
- Don't forget to click "Apply" to save settings.
- Click the "Back" button to go back to the Menu.

Please note, any changes made to Image Settings will affect your recordings.

Camera: Motion

> Whether you're waiting for an expected Event, hoping you don't spot an unwelcome visitor, or just curious about what happens when you're not around, Motion Detection has been configured to alert you and record video when the DVR detects motion.
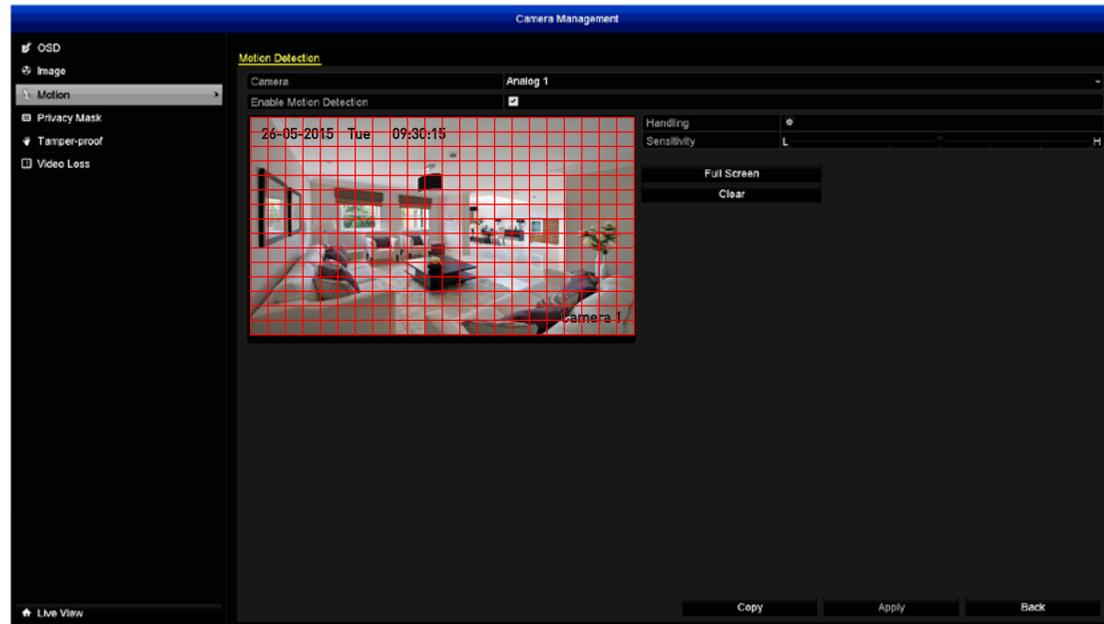
Camera: Select a camera that you would like to edit.

Enable Motion Detection: Click the checkbox to enable.

Handling: Here you can define what will happen when the camera you've selected has detected an Event -

Trigger Channel: Select additional cameras to start recording.

Arming Schedule: Adjust your arming schedule by selecting a start day and a time period (24-hour time). Use the "Copy" function to apply all settings to the other cameras. Don't forget to click "Apply" to save settings. Click "OK" to exit.

Handling: Options available are Full Screen Monitoring, Audible Warning (enabling the DVR's internal buzzer), Alert CMS software (send alerts to the SwannView Plus Windows software) and to send an email. Don't forget to click "Apply" to save settings. Click "OK" to exit.

Sensitivity: The sensitivity setting is controlled by a slider, allowing you to set a value between L (low) and H (high). The closer to H the slider is set, the more sensitive the DVR will be when detecting motion.

The entire view of the camera is enabled to detect motion, however you can select certain areas if you wish. Using the mouse, click the "Clear" button then click and drag to select the area that you want to enable for motion. To enable the entire view of the camera for motion, click the "Full Screen" button.

- Use the "Copy" function to apply all settings to the other cameras.
- Don't forget to click "Apply" to save settings.
- Click the "Back" button to go back to the Menu.

Motion Detection Tips

Motion Detection is an essential part of your security system and is the main method that detects when someone is in your home. When motion has been detected, a signal is sent to your DVR that alerts you to a potential threat in your home. It does this in several ways such as activating its internal buzzer, sending an email and sending an alert to your mobile device or computer. You can also trigger the other cameras to start recording.

Placement of the cameras

1. Keep cameras 10 to 15 feet (3 to 4 metres) away from heating vents, where the sunlight shines in, and radiators. If a camera detects a swift change in motion, even that of a cloud passing quickly over direct sunlight shining into your living room, motion detection could be activated.

2. Place cameras in areas where people have to walk through, like the stairwell, main hallway or entry door. That way, an intruder will activate motion detection regardless of where they are headed. Intruders usually go right for the master bedroom, so put a camera near that room or other rooms where you have valuables, like the study.

3. Walk through your house and assess where intruders are most likely 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.

4. When installing cameras outside, it's important to keep your front and backyard well-lit for ideal night vision and motion detection. 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.

Avoiding False Triggers

1. A flag or foliage that is blown by the wind - angle the camera so wind-blown objects are out of the camera's view.

2. Pets moving in front of the camera - lower the sensitivity level and/or point the camera into areas that are not particular high-traffic for your pets.

3. Vehicles moving in the background - angle the camera so as to avoid movement in the background.

4. Moving air from a heater or air conditioner - angle the camera away from these sources.

5. Movement reflected off smooth surfaces - lower the sensitivity level and/or avoid pointing the camera directly at glass surfaces.

Bedroom   Backdoor

Hallways

Frontdoor
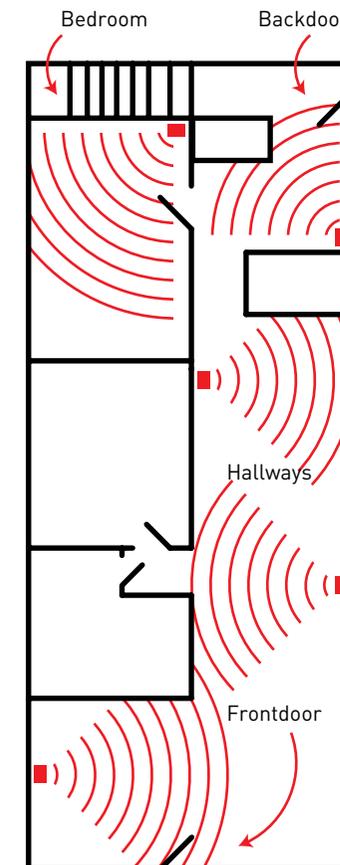
Camera: Privacy Mask

A Privacy Mask can be used if you want to obscure part of your image. You can also use this to minimize false triggers when detecting motion. You can define up to four areas per camera to mask. Areas obscured by a Privacy Mask won't be shown live or recorded.
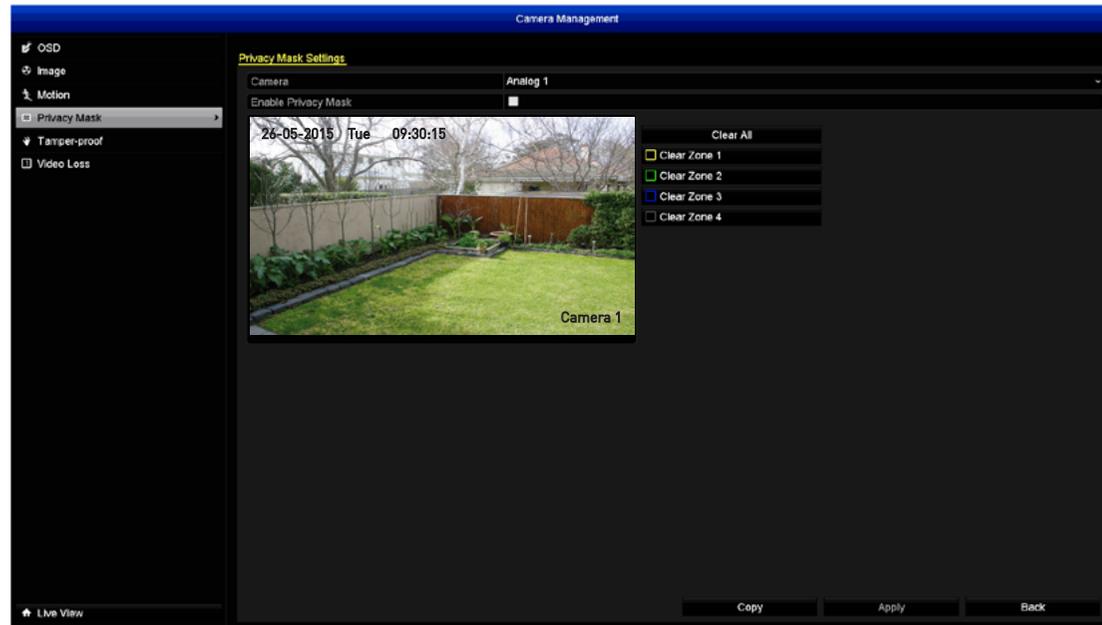
Camera: Select a camera that you would like to edit.

Enable Privacy Mask: Click the checkbox to enable.

Using the mouse, click and drag to select the area that you want to obscure (as shown above). Up to four Privacy Masks can be enabled (each mask is colour coded).

Click the "Clear All" button to clear all Privacy Masks or click on a particular mask to clear.

- Use the "Copy" function to apply all settings to the other cameras.
- Don't forget to click "Apply" to save settings.
- Click the "Back" button to go back to the Menu.

Camera: Tamper-proof

Any security system can be vulnerable to attack or image failure. Tamper-proof can be used in scenarios where someone may cover up the camera's field of view or if they are attempting to tamper with the video signal.
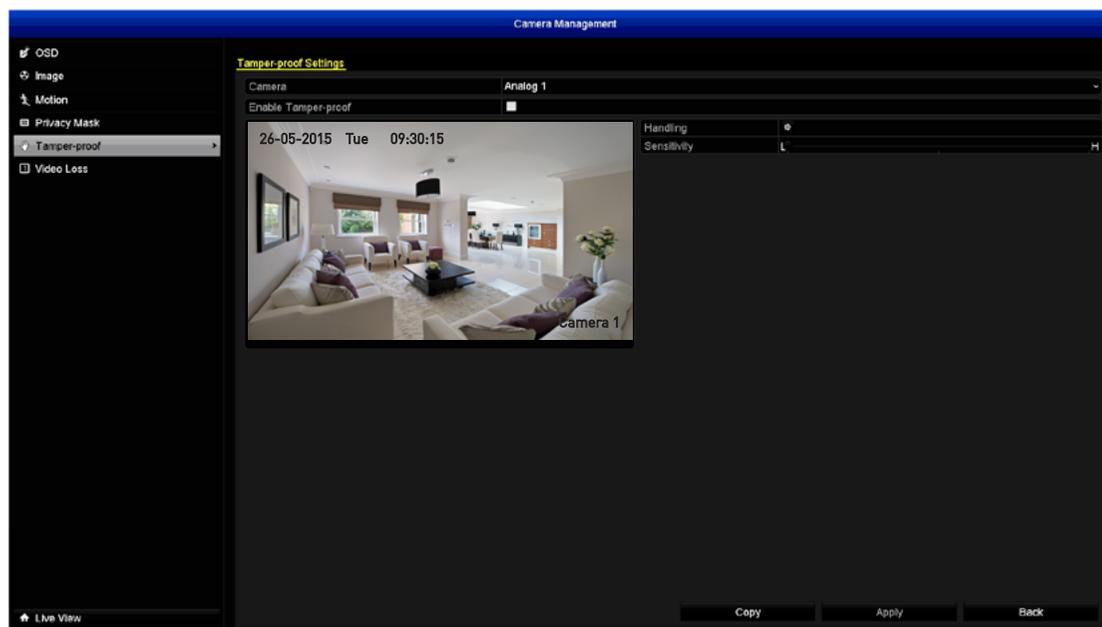
Camera: Select a camera that you would like to edit.

Enable Tamper-proof: Click the checkbox to enable.

Handling: Here you can define what will happen when the camera you've selected is being tampered with -

Arming Schedule: Adjust your arming schedule by selecting a start day and a time period (24-hour time). Use the "Copy" function to apply all settings to the other cameras. Don't forget to click "Apply" to save settings. Click "OK" to exit.

Handling: Options available are Full Screen Monitoring, Audible Warning (enabling the DVR's internal buzzer), Alert CMS software (send alerts to the SwannView Plus Windows software) and to send an email. Don't forget to click "Apply" to save settings. Click "OK" to exit.

Sensitivity: The sensitivity setting is controlled by a slider, allowing you to set a value between L (low) and H (high). The closer to H the slider is set, the more sensitive the video tampering detection will be.

• Use the "Copy" function to apply all settings to the other cameras.

• Don't forget to click "Apply" to save settings.

• Click the "Back" button to go back to the Menu.

Camera: Video Loss

Video Loss is regarded as a potential Event and is considered to occur any time the DVR doesn't receive an active video signal on any of its inputs. When an input has no incoming video signal, a "NO VIDEO" message will appear on-screen.

Camera: Select a camera that you would like to edit.

Enable Video Loss Alarm: Click the checkbox to enable.

Handling: Here you can define what will happen when the camera you've selected has no incoming video signal -

Arming Schedule: Adjust your arming schedule by selecting a start day and a time period (24-hour time). Use the "Copy" function to apply all settings to the other cameras. Don't forget to click "Apply" to save settings. Click "OK" to exit.
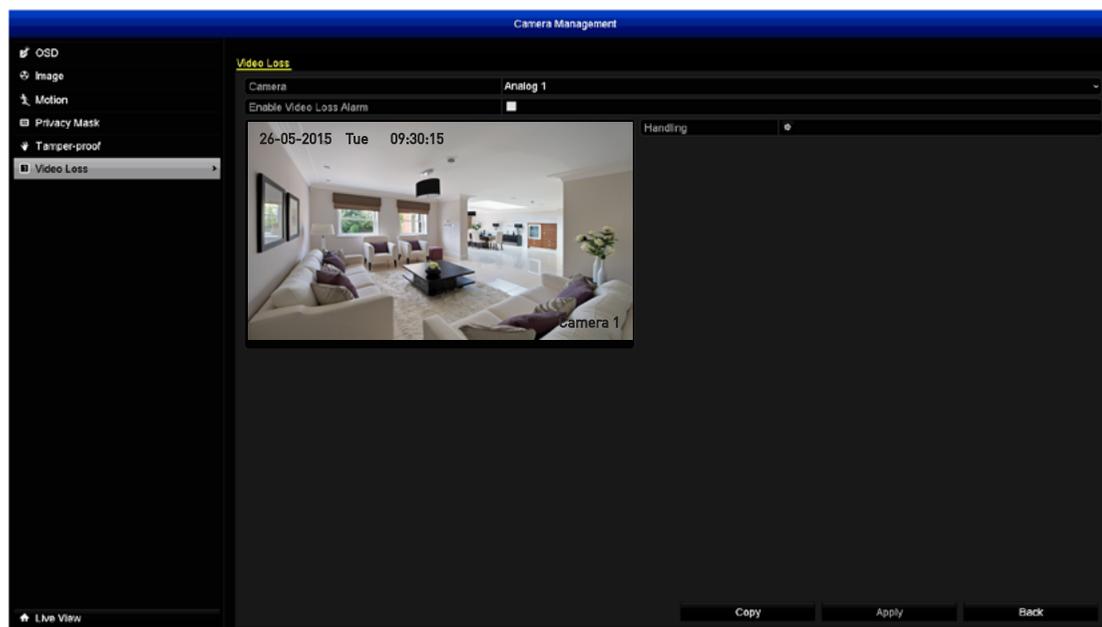
Handling: Options available are Full Screen Monitoring, Audible Warning (enabling the DVR's internal buzzer), Alert CMS software (send alerts to the SwannView Plus Windows software) and to send an email. Don't forget to click "Apply" to save settings. Click "OK" to exit.

- Use the "Copy" function to apply all settings to the other cameras.
- Don't forget to click "Apply" to save settings.
- Click the "Back" button to go back to the Menu.

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Recording Configuration

The recording configuration options are available in the "Record" menu that is accessible from the Menu. From here you can access and change the recording schedule (default is 24/7 Motion Detection recording) for each camera connected as well as enabling a schedule when holidays are taken.
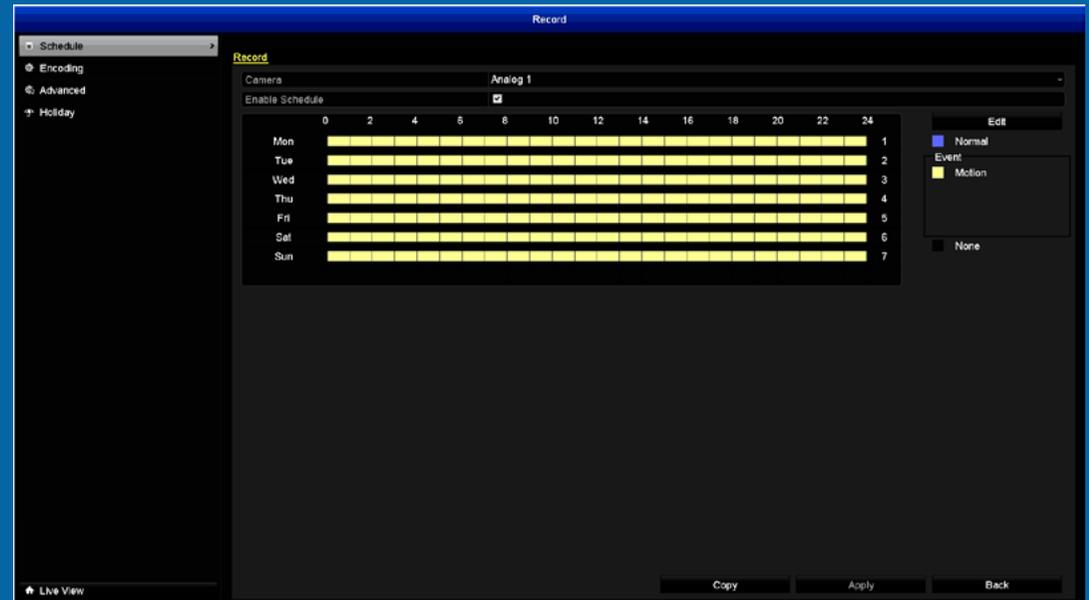
Record: Schedule

> By default, a Motion Detection recording schedule has been enabled for each connected camera. You can change the Schedule according to what fits in with your needs. The Schedule is presented as a 24-hour 7 days a week grid and is colour coded to represent the Event type.

Select an Event, click and hold the mouse then drag the pen tool over the time segments that you want to change.

Camera: Select a camera that you would like to edit.

Enable Schedule: This is enabled by default.

Edit: Click this to edit. You can edit the Schedule for one or more days and different starting and ending times. You also have the choice of selecting from multiple Event types.

Normal: The DVR will continuously record regardless of what is happening.

Motion: The DVR will only record when it detects something moving in front of one or more cameras.

To edit, select the Event type then move the pen tool over the Schedule. Click and hold the mouse then drag the pen tool over the time segments that you want to change. You can also edit a single time segment.

In the above example, Motion has been enabled for 012:00 a.m. to 04:00 p.m. and Normal has been enabled for 04:00 p.m. to 12:00 a.m. Monday to Sunday.

None: As the name suggests, the DVR will not record anything.

- Use the "Copy" function to apply all settings to the other cameras.
- Don't forget to click "Apply" to save settings.
- Click the "Back" button to go back to the Menu.

Record: Advanced

With the Overwrite function enabled, the DVR will record over previously saved files stored on the hard drive. The DVR will always record over the oldest files on your hard drive first.

It's advisable to leave this function enabled as the DVR will always be able to record Events as they happen. However it does mean that you'll need to get important Events backed up before they are overwritten.

- Don't forget to click "Apply" to save settings.
- Click the "Back" button to go back to the Menu.

Record: Holiday

There are times when you don't want the DVR to record using its default recording Schedule. Perhaps you require it to record more, or less, or just at different times. The Holiday function allows you to define periods of time where the DVR will employ an alternative recording mode.

Up to 32 Holiday periods can be created. These periods can be created by date, week or by the month. When creating multiple Holiday periods, the period with the highest priority must be created first.

Edit: Click this to begin.

Holiday Name: Choose a title for the period in question.

Enable: Click the checkbox to enable.

Mode: Select by date, week or month.

Start Date: Select a start date.

End Date: Select an end date.

Click "Apply" to save settings then click "OK" to exit.

- Click the "Back" button to go back to the Menu.

Manual: Record

> The Record function allows you to override the default recording Schedule that you have in place. You can select to record continuously or to turn off recording for one or more cameras connected.
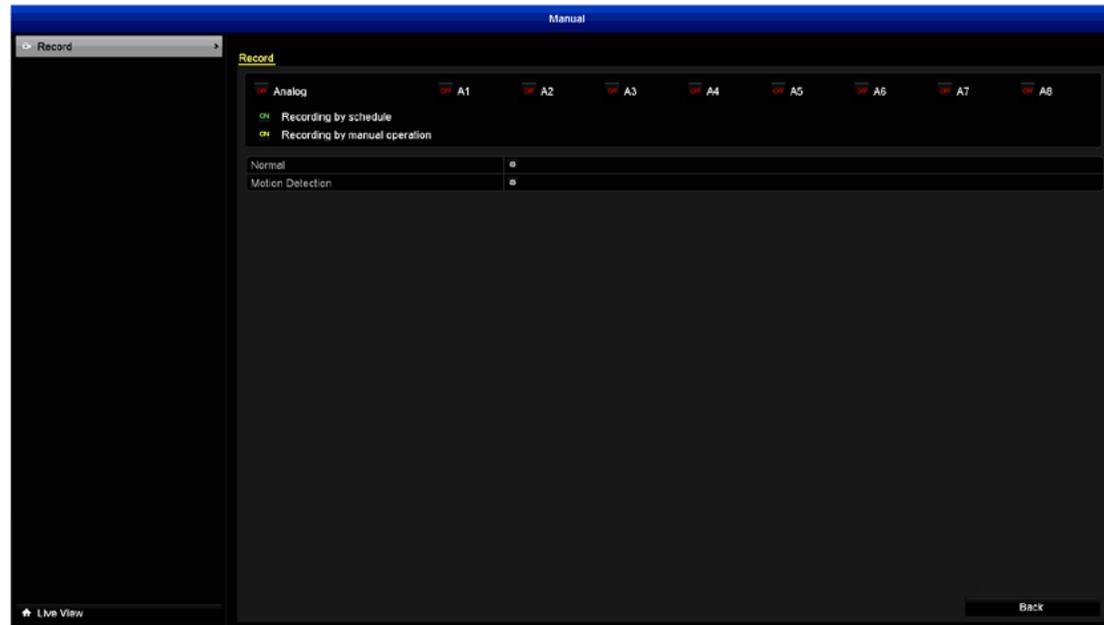
The green "ON" button indicates that the camera has the recording Schedule enabled. The red "OFF" button indicates that the camera has stopped recording and the yellow "ON" button indicates that the camera is continuously recording. Click the button next to each camera to change the recording status.

Continuous: The DVR will record continually for any given period.

Motion Detection: This is the default recording Schedule.

Please note, rebooting the DVR will override any changes made and will revert back to the recording Schedule in place.

- Click the "Back" button to go back to the Menu.

Playback

The Playback function gives you the ability to search and play previously recorded videos that are stored on the DVR's hard drive. You have the choice of selecting either Normal, Event, Tag or Smart Playback. When playing videos, you can add Tags to help you identify people or objects and you can then do a search on those Tags.
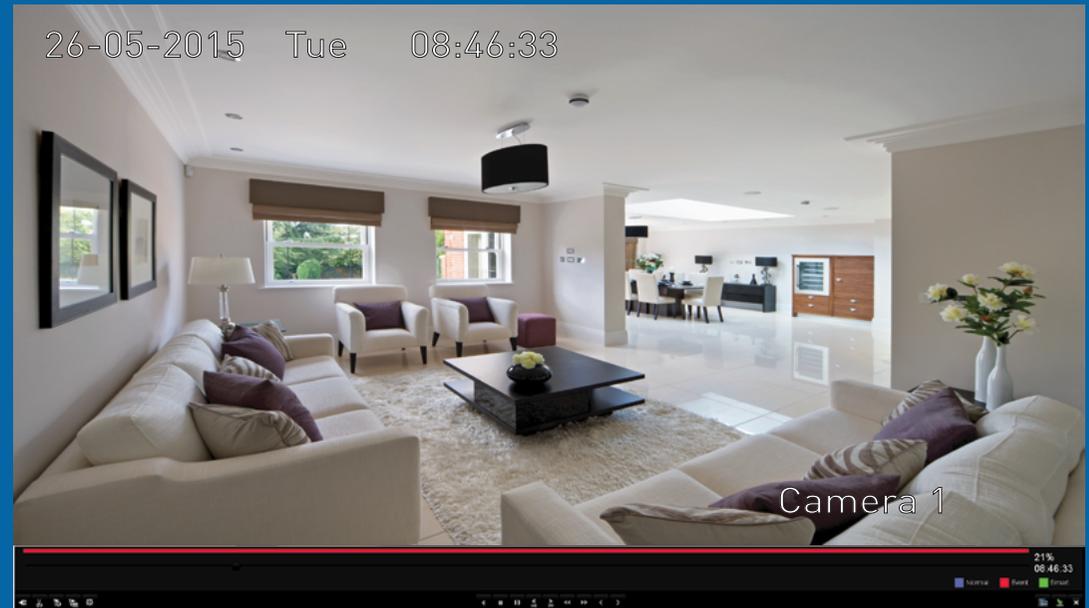
Playback: Normal

Normal Playback gives you the ability to play video from one or more camera(s) on a given day. The blue segments located on the timeline (underneath the video) indicate a Normal recording and the red segments indicate an Event recording.

Click "Search" to display video files fitting your search criteria. A thumbnail is visible displaying the first frame of the file.

Analog: Select from one or more camera(s) that you would like to display for playback. Please note, the Smart Search function is only available when you select a single camera for playback. See page 27 for more information.

Start/End time of record: This displays the start time and date and end time and date from when the DVR was first configured to record video. This will typically be the first time that you turned on the DVR and ran through the Setup Wizard. If you have recently formatted the hard drive, the start time and date will be displayed from that day.

Record Type: Select the type of video you would like for playback. The options are Normal, Motion, Manual and All.

File Type: Select from Unlocked, Locked and All.

Start Time: Set your start date and time.

End Time: Set your end date and time.

Detail: Click this to display a graphical representation of the type of video recorded. Each record type is colour coded, for example Normal is blue and Motion is yellow.

Playback: Click this to play all videos that match your search criteria sequentially. You can forward, rewind and pause playback as well as set mark in and out points and to add one or more Tags. See page 26 for more information.

Search: Click this to display a list of video files that match your search criteria (see above right). Select a file and click the Play button to play the video. If you would like to keep the video so it isn't deleted, click the Lock button. Click again to unlock.

- Click the "Back" button to go back to the Menu.

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Playback Interface

Move the mouse to the far right to display a list of video files that match your search criteria. Select a file and click the Play button to play the video.

If you clicked Playback instead of Search, a camera list will appear here instead, giving you the option of selecting multiple cameras for playback.
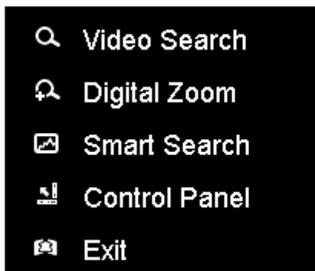
Hover the mouse over the video then right-click to access Digital Zoom and Smart Search.

1. Mute: Mutes audio playback (if audio has been recorded).

2. Start clipping: When playing a video, press this button at the mark in point and press it again at the mark out point. Multiple points can be created. When you exit, the DVR will prompt you to save your video clip(s). Insert your flash drive then click "Yes" to save.

3. Add default tag: Tagging helps you to identify people or objects within the video. Multiple Tags can be added.

4. Add customized tag: As above but you can choose your own Tag name.

5. Tag management: Click this to edit or delete Tags.

6. Play controls: These are your Play, Pause, Reverse, Forward and Speed controls.

7. Video Search: Click this to do a new search.

8. Hide: Click this to hide the on-screen controls. To access the controls again, right-click the mouse then click "Control Panel" (see above left).

9. Exit: Click this to exit playback.

Digital Zoom: Click this to enter digital zoom mode (see above left). Use the PIP (picture-on-picture) screen on the bottom right to select a different area to zoom in to. Right-click to exit.

Playback: Event

The Event function gives you the ability to search for video footage that has one or more Events over a set period of time. For example, from September to October with a start and end time of your choice.

Event Type: Only Motion is available.

Start Time: Set your start date and time.

End Time: Set your end date and time.

Analog: Select from one or more camera(s) that you would like to search on. Please note, Smart Search is not available when playing Events.

Search: Click this to display a list of Events that match your search criteria. You can change the Pre-play and Post-play times according to your needs. Select an Event then click "Details" to display the file size and thumbnail displaying the first frame. Click the Play button to play.

- Click the "Back" button to go back to the Menu.

Playback: Tag

Tag Playback will isolate Events based on the Tag information that has been applied. You can apply Tags in both Normal and Event Playback modes. For example, each time a particular person appears within the video, a Tag can be applied to make it easier to find videos with that person.

Analog: Select from one or more camera(s) that you would like to search on.

Tag Type: Click "All" if you have used the default Tag name or "Tag Keyword" if you have customized the Tag name.

Tag Keyword: Input your customized Tag name (be careful as it is case sensitive).
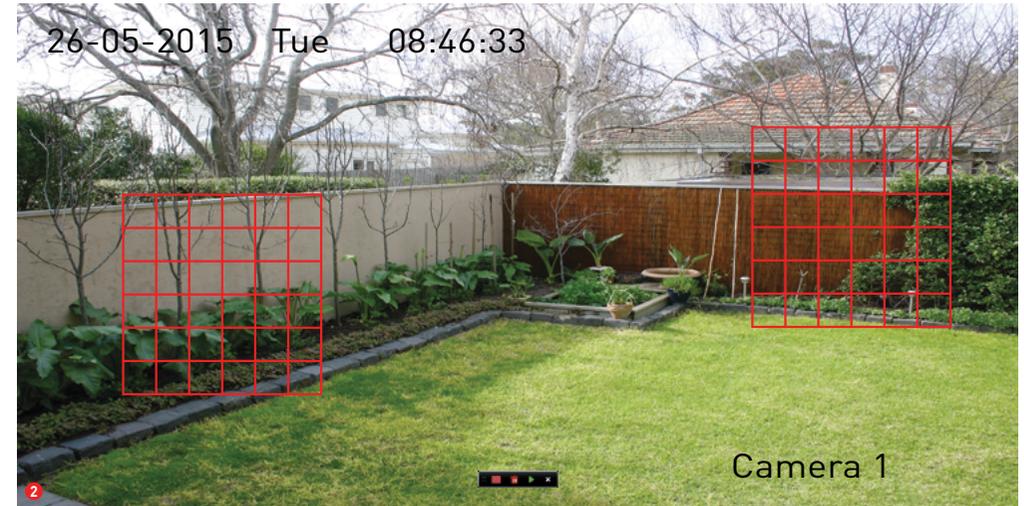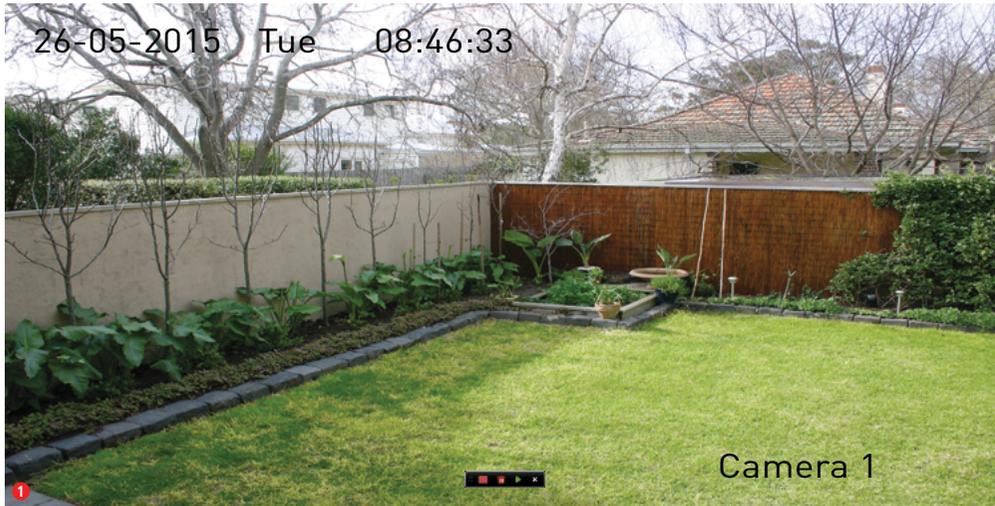
Start Time: Set your start date and time.

End Time: Set your end date and time.

Search: Click this to display a list of videos that you have applied a Tag to. Click "Edit" to change the Tag name. Click "Delete" to delete the Tag (only the Tag is deleted, not the video). Click the Play button to play.

• Click the "Back" button to go back to the Menu.

Smart Search

Smart Search allows you to define a specific area of the video which then makes it easier to find what you are searching for.

1. Hover the mouse over the video, right-click the mouse then click "Smart Search". The Smart Search controls will appear as shown above. Here are descriptions for each button from left to right -

Full Screen Detection: Click to enable the entire view for Smart Search.

Delete All: Click to delete all areas selected.

Search: Click to perform a Smart Search.

Exit: Click to exit Smart Search.

2. Click and drag to select the area that you want to search for. You will see a grid of red boxes. Multiple areas can be defined. Click the "Search" button to start searching.

The video will automatically start playing. The green sections on the timeline indicate movement that matches your search criteria. Repeat the above steps to define a new area to search for.
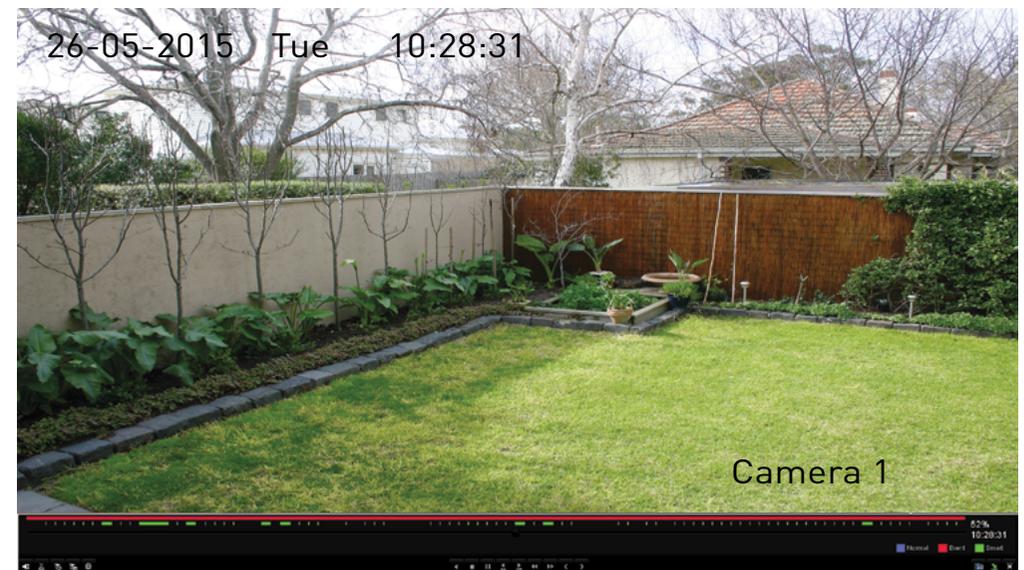
Use the play controls to Play, Pause, Reverse and Forward. Click the Previous and Next buttons to play a different Smart Search result.

Export

The Export function gives you the ability to save important Events to a USB storage device such as a flash drive. As the Overwrite option is enabled by default, it's important to back-up these important Events before they are overwritten. You can play these video files either on your DVR or your computer.

Export: Normal
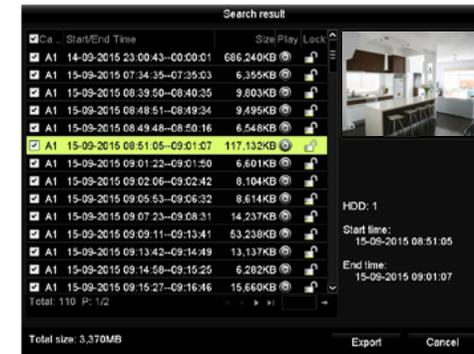
Video files fitting your search criteria will be displayed. A thumbnail is visible displaying the first frame of the file.

Analog: Click this to select all cameras or select one or more cameras to search on.

Record Type: Select the type of video that you would like to export. For Event types, select "Motion" or leave the default selection.

File Type: Select if you would like to export "Unlocked" or "Locked" video files or leave the default selection.

Start Time: Select your start date & time.

End Time: Select your end date & time.

Click "Search" to display files matching your search criteria.

1. Double-click a file to play.

2. Use the checkbox to select files that you want to export.

3. Click "Export", select a save location then click "Export" again.

4. The selected files will now transfer to your USB device. Click "OK" to finish and right-click to exit.

- Click the "Back" button to go back to the Menu.

Export: Event

This function is specific to exporting Motion Events only.

Event Type: Motion is the only Event type available.

Start Time: Select your start date & time.

End Time: Select your end date & time.

Analog: Click this to select all cameras or select one or more cameras to search on.

Click "Search" to display files matching your search criteria.

1. Click the checkbox to select a video. You can click "Details" to display a thumbnail of the video. Double-click the file to play.

2. Click "Quick Export", select a save location then click "Export".

3. The selected files will now transfer to your USB device. Click "OK" to finish and right-click to exit.

- Click the "Back" button to go back to the Menu.

Configuration

The options available give you complete control on how the DVR is configured and how it operates. Some of the options such as Resolution, Time Zone, Email, Password creation and Daylight Saving are configured during the Setup Wizard. For experienced network users, the DVR provides options that can be configured to suite your particular requirements.

Configuration: General - General

The settings for Language, Resolution, Time Zone, System Date & Time and Daylight Saving (DST) are configured during the Setup Wizard.

Language: The language that the DVR's menus, alerts and other communications will use. Multiple languages are available.

Resolution: Set the output resolution of the DVR according to the display that is connected. Check the documentation included with your display to see the maximum resolution supported.

Time Zone: Set this to the Time Zone where you happen to be. For example, people in the Australian Eastern Time zone (Canberra, Sydney and Melbourne) choose GMT+10:00, whilst the Eastern Standard Time zone (USA and Canada) choose GMT-05:00 (GMT stands for Greenwich Mean Time - it's the baseline that keeps all the different time zones in sync).

Date Format: The format the date will be displayed.

System Date: You can manually set the date if it is incorrect.

System Time: You can manually set the time if it is incorrect.

Mouse Pointer Speed: Move the slider to increase or decrease the mouse pointer speed.

Enable Wizard: When checked, the DVR will automatically run the Setup Wizard when it is switched on. The Setup Wizard itself contains the option to disable it.

Enable ID Authentication: When enabled, the DVR will require a password to access the Menu.

- Don't forget to click "Apply" to save settings.
- Click the "Back" button to go back to the Menu.

Configuration: General - DST Settings

Enable DST (check box): Enable this setting if you would like the DVR to adjust the time when Daylight Saving begins.

From & To: Here you can define when Daylight Saving applies to your location. There are many different standards for Daylight Saving, which can vary dramatically even in the same time zone, so you'll need to tell the DVR when it applies to you.

DST Bias: This refers to the difference in minutes, between Coordinated Universal Time (UTC) and the local time. Select the time that Daylight Saving has increased by in your time zone.

• Don't forget to click "Apply" to save settings.

• Click the "Back" button to go back to the Menu.

Configuration: General - More Settings

Device Name: The name that the DVR considers to be its own and what it will use to register an IP address with your router. You can change this to something more relevant or leave the default name.

Device No.: The device number of the DVR. We recommend that you leave the default setting.

Operation Timeout: Here you can change the time the DVR will exit the Menu if there is no activity.

- Don't forget to click "Apply" to save settings.

- Click the "Back" button to go back to the Menu.

Configuration: Network - General

Network configuration is not required when using Swann-Link P2P for local or remote access. All that is required is a physical connection to your router or wireless access point. Most of the settings here are recommended for advanced users only.
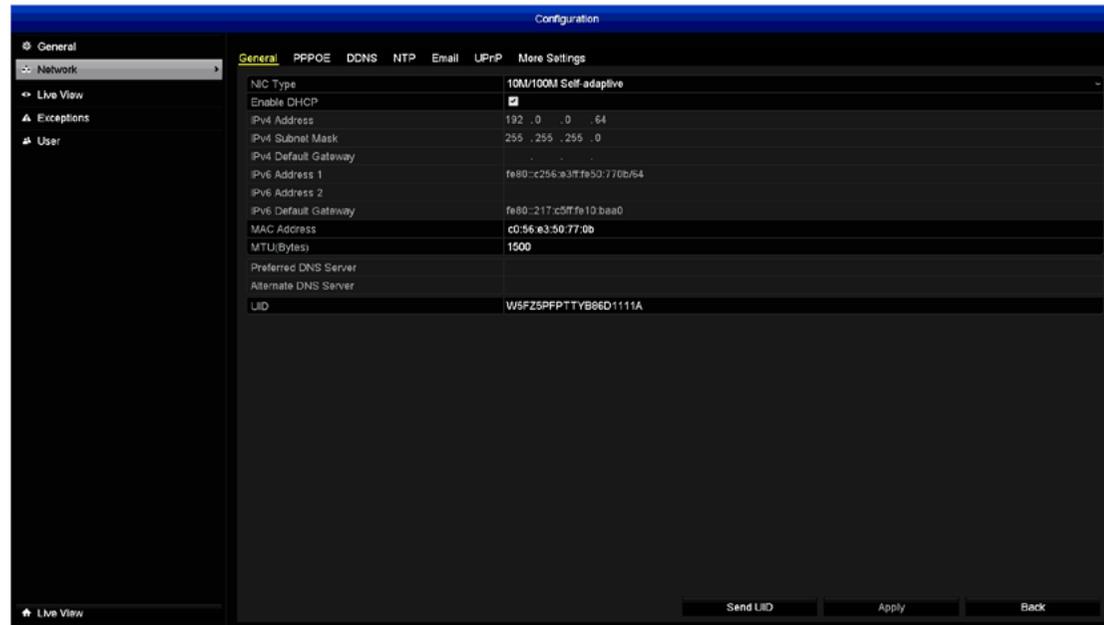
NIC Type: The DVR has the ability to connect to your network at various speeds and can adjust itself accordingly.

Enable DHCP: Your router will automatically assign an IP address.

IPv4 Address: The DVR uses IPv4 addressing, which consists of four groups of numbers between 0 and 255, separated by periods.

IPv4 Subnet Mask: This will be formatted in a similar way to the IP address. For example, four numbers up to 255 separated by periods.

IPv4 Default Gateway: This allows the DVR to connect to the Internet.

IPv6 Address 1/2 & Default Gateway: IPv6 is the latest revision of the Internet Protocol (IP). It will eventually replace the older IPv4 system.

MAC Address: The MAC (Media Access Control) address is hardwired into the hardware and can't be changed.

MTU(Bytes): The MTU (Maximum Transmission Unit) is the size of the largest datagram that can be sent over a network.

Preferred DNS Server: A DNS (Domain Name System) server is used to translate a website address to its IP address.

Alternate DNS Server: A backup DNS server.

UID: The UID is used to access the DVR from SwannView Plus on your mobile device or computer.

Send UID: Click this to send the UID to your email address.

- Don't forget to click "Apply" to save settings.
- Click the "Back" button to go back to the Menu.

Configuration: Network - PPPOE
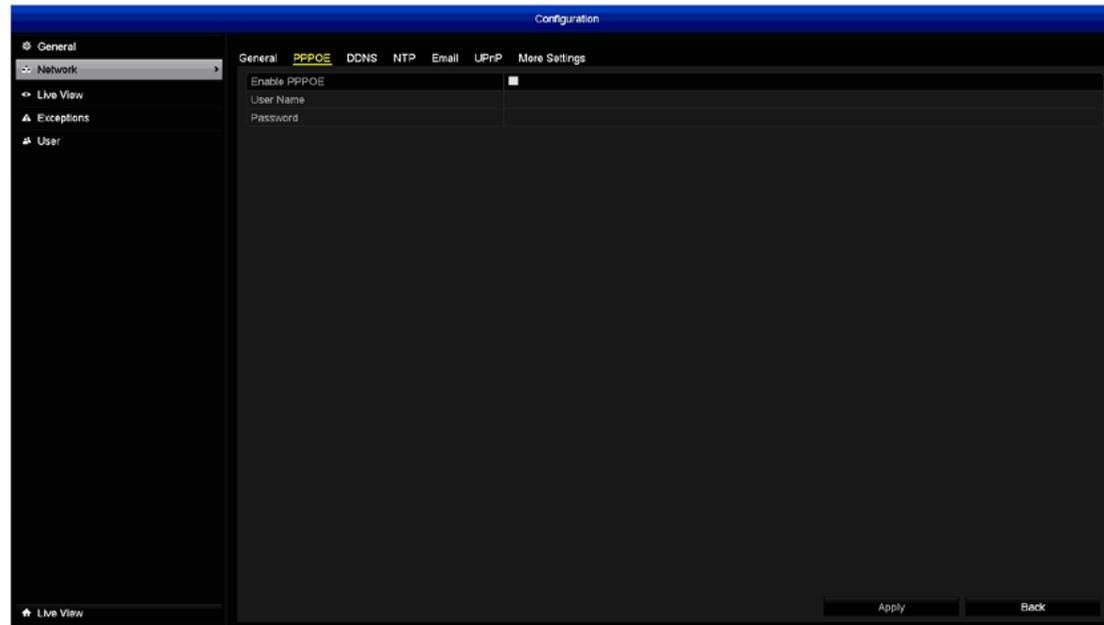
PPPOE is an advanced protocol that allows the DVR to be directly connected to the Internet via a DSL modem. This is an option for advanced users only.

Enable PPPOE (check box): Click this to enable.

Username: Enter the username for your DSL account provider.

Password: Enter the password for your DSL account provider.

- Don't forget to click "Apply" to save settings.
- Click the "Back" button to go back to the Menu.

Configuration: Network - DDNS

> Prior to developing our SwannLink P2P 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.

For now, ignore the "Current State:ERROR" message that appears. This will change when the DVR has confirmed your account details.

To create an account, go to (www.swanndvr.com) and click the "Registration" button. Follow the prompts to create your account.

Enable DDNS (check box): Click this to enable.

DDNS Type: SwannDNS is automatically selected.

Device Domain Name: Enter the domain name that is hosted on your account. For example, username.swanndvr.net.

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

Password: Enter the password for your account.

Click the "Test" button to confirm your account details. After a short moment you should see "Current State:OK".

- Don't forget to click "Apply" to save settings.
- Click the "Back" button to go back to the Menu.

Configuration: Network - NTP

The NTP (Network Time Protocol) function allows the DVR to automatically sync its clock with an on-line server and gives it the ability to constantly have an accurate time setting. Obviously this is very important for a security system and is enabled by default. We don't recommend changing any of the default settings.

- Don't forget to click "Apply" to save settings.
- Click the "Back" button to go back to the Menu.

Configuration: Network - Email

As you would have configured an email account for the DVR during the Setup Wizard, an explanation of the various functions available will not be covered here. However, there are two options that were not available to select during the configuration.

Enable Attached Picture: When enabled, the DVR will attach three small images when sending an email, each time there is an Event alert such as Motion Detection.

Interval: The length of time that must elapse after the DVR sends an email before it will send another. Adjust accordingly.

- Don't forget to click "Apply" to save settings.
- Click the "Back" button to go back to the Menu.

Configuration: Network - UPnP

In most circumstances there is no need to change the settings here. The following is for advanced users only.

Enable UPnP (check box): Click this to enable.

Server Port: This is the internal port that the DVR will use to send information through. This particular port number (8000) is not used by many devices, however if you have another DVR-like device, you may need to change it. An alternative port number to use is 9000. Make sure that the number used for the "External Port" <u>and</u> "Internal Port" both match, otherwise the UPnP function will not work.

HTTP Port: This port is used to log into your DVR via your network or remotely. The default port number (85) is seldom used by other devices, however if you have another device using this port, you may need to change it. An alternative port number to use is 90. Make sure that the number used for the "External Port" <u>and</u> "Internal Port" both match, otherwise the UPnP function will not work.

RTSP Port: This port is used to stream real-time images to your mobile device. If you're having issues streaming video to your mobile device or your mobile service provider is blocking access, we recommend to change this to 5554. Do not change this if everything is working ok.

- Don't forget to click "Apply" to save settings.
- Click the "Back" button to go back to the Menu.

Configuration: Network - More Settings

Alarm Host IP: This feature is not supported.

Alarm Host Port: This feature is not supported.

Multicast IP: This feature is not supported.

Any changes to the "Server Port", "HTTP Port" and "RTSP Port" on the previous tab will be reflected here.

- Don't forget to click "Apply" to save settings.
- Click the "Back" button to go back to the Menu.

Configuration: Live View - General

Video Output Interface: As the DVR has a VGA and HDMI output, this cannot be changed.

Live View Mode: 2 x 2 is the default mode for the 4CH model (display up to 4 video channels on-screen), and 3 x 3 for the 8CH model (display up to 9 video channels on-screen). Selecting 1 x 1 will display the first video channel full-screen. Other views available (8CH model only) are 2 x 2, 1 + 5 and 1 + 7.

Dwell Time: The time in seconds to dwell on a video channel when enabling "Start Auto-switch" on the Live View Menu Bar. This only works when Live View mode is set to 1 x 1.
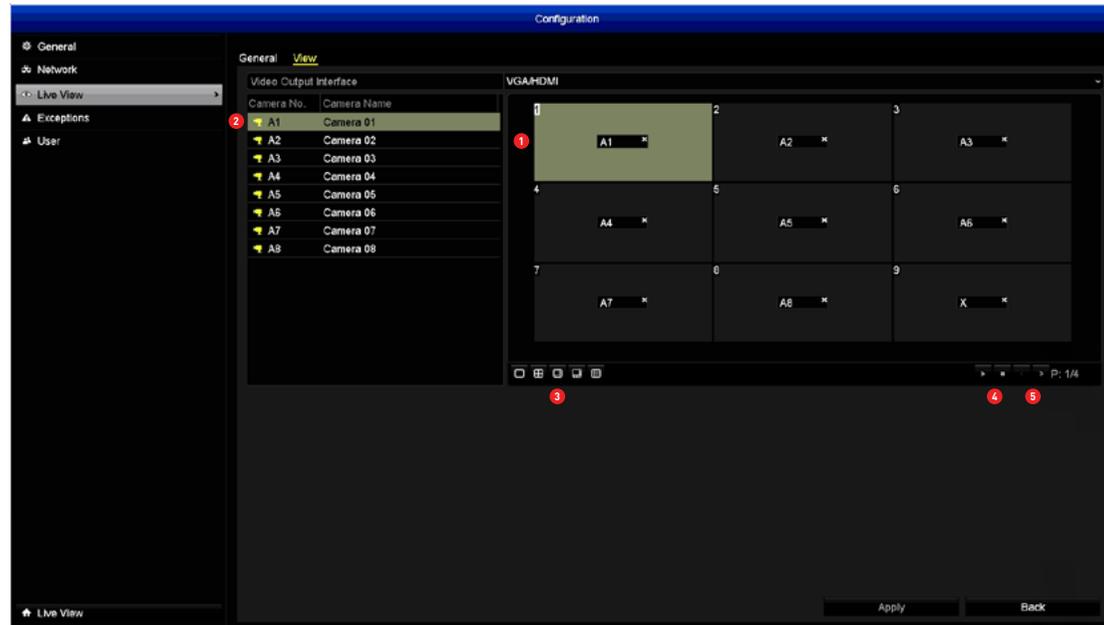
Enable Audio Output: Click the checkbox to enable the audio output connection on the DVR.

Event Output: As the DVR has a VGA and HDMI output, this cannot be changed.

Full Screen Monitoring Dwell Time: The time in seconds to display an Event full screen.

- Don't forget to click "Apply" to save settings.
- Click the "Back" button to go back to the Menu.

Configuration: Live View - View

In the View tab, you can change the display order of each camera connected.

1. Select an available viewing window on the right-hand side.

2. Double-click one of the cameras available. That camera will be placed in the viewing window that you selected.

3. Select the Live View mode that you would like to change.

4. Press the "Start live view of all channels" button to start the Live View of all cameras connected to the DVR. Press the "Stop live view of all channels" button to stop the Live View of all cameras connected to the DVR. Please note, pressing the "Stop live view of all channels" button means you will not see a real-time image in Live View mode.

5. When selecting different Live View modes, you can click the "Next" and "Previous" buttons to change the viewing windows available. The page numbers displayed will change depending on which Live View mode you have selected.

- Don't forget to click "Apply" to save settings.
- Click the "Back" button to go back to the Menu.

Configuration: Exceptions

An Exception is any deviation from the DVR's normal behaviour. The DVR can alert you in multiple ways such as sending an email, alerting you via the SwannView Plus Windows software and activating its internal buzzer.

Exception Type: Select the Event type you'd like the DVR to react to -

HDD Full: As the name suggests, this Event occurs when the hard drive has run out of space. This Event type becomes redundant as "Overwrite" is enabled by default. See page 19 for more information.

HDD Error: This occurs when the DVR has difficulties accessing the hard drive.

Network Disconnected: This will occur if the DVR has difficulty connecting to the Internet.

IP Conflicted: This will occur if the DVR detects another device on the same network with a conflicting IP address.

Illegal Login: This will occur if the DVR detects an incorrect login.

Input/recording resolution mismatch: This will occur if the camera connected is not capable of matching the recording resolution selected.

Record Exception: This will occur if there are errors during capture such as a hard drive failure or if the hard drive quota has been changed.

Audible Warning: This will activate an audio warning using the DVR's internal buzzer.

Alert CMS Software: This will alert the SwannView Plus Windows software that's installed on your computer. Please note, the software must be running to receive the alert.

Send Email: The DVR will send an email alert.

- Don't forget to click "Apply" to save settings.
- Click the "Back" button to go back to the Menu.

Configuration: User

We recommend enabling password protection for the admin account as it has access to all aspects of the DVR's operation.

1. Click "Edit" to change the password. Input your old password, enable "Change Password" and then input your new password. Click "OK" to save.

2. If multiple user accounts have been created that are no longer required, click "Delete" to remove them.

3. Click the "Add" button to set up additional users. Multiple admin or guest accounts can be created. Guest accounts are restricted to a limited amount of options only.

• Don't forget to click "Apply" to save settings.

• Click the "Back" button to go back to the Menu.

System Maintenance

System Maintenance gives you an overview of the various settings and options that have been selected for the DVR to function. Each action that the DVR performs as well as Events detected are logged, which you can search, view and export. You can also install a firmware upgrade when available, format the hard drive and perform a factory reset in case of error.

System Maintenance: System Info
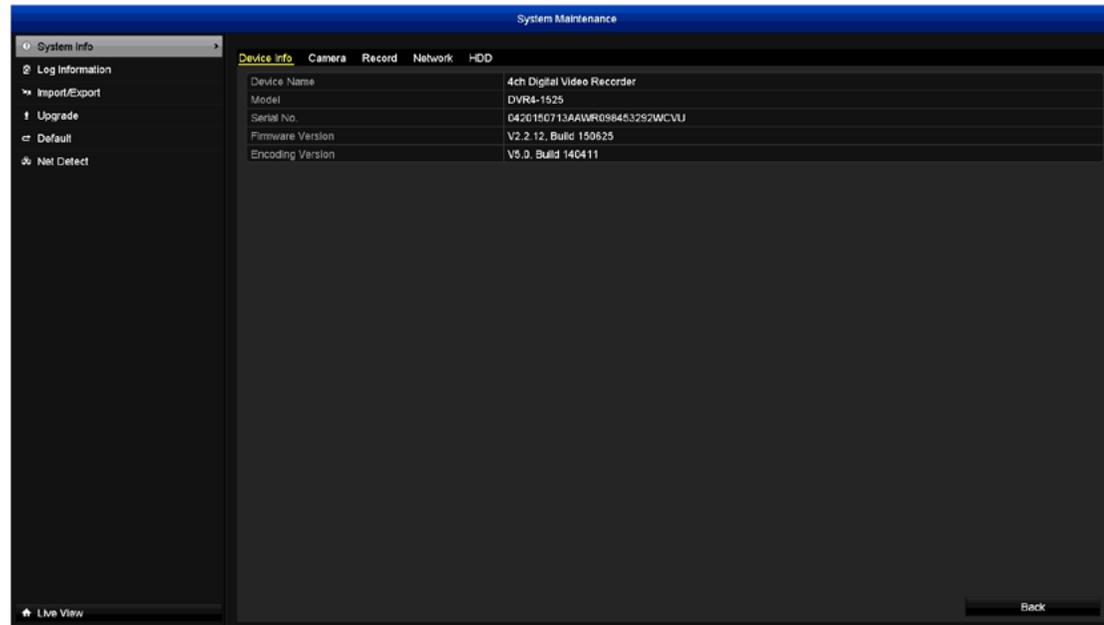
In most circumstances, the information here and in the subsequent tabs will not be needed for general use of the DVR, however one of our Swann Helpdesk & Technical Support staff may ask you to access this if you call for assistance.

- Click the "Back" button to go back to the Menu.

System Maintenance: Log Information

Each action that the DVR performs as well as Events detected are logged, which you can search, view and export to a USB storage device.

Log Search

1. Select the search conditions to refine your search including the start & end time, Major Type and Minor Type.

2. Click the "Search" button to start searching the log files.

3. The matched log files will be displayed. Up to 2000 log files will be displayed first.

4. Double-click a file to view detailed information contained in the log.

5. Insert your USB storage device to the rear USB port.

6. Click "Export", select a save location then click "Export" again.

Log Export

1. To export all log files without searching, click the "Log Export" tab.

2. Select your hard drive then click "Export".

3. Insert your USB storage device to the rear USB port.

4. Select a save location then click "Export" again.

• Click the "Back" button to go back to the Menu.

System Maintenance: Import/Export

This function gives you the option to import or export your current configuration settings. This comes in handy as it will save you time configuring the DVR after performing a factory reset.

Exporting your configuration settings

1. Insert your USB storage device to the rear USB port.

2. Select a save location then click "Export".

Importing your configuration settings

1. Insert your USB storage device to the rear USB port.

2. Select the location of the file then click "Import". The DVR will now restart to apply your settings.

- Click the "Back" button to go back to the Menu.

System Maintenance: Upgrade
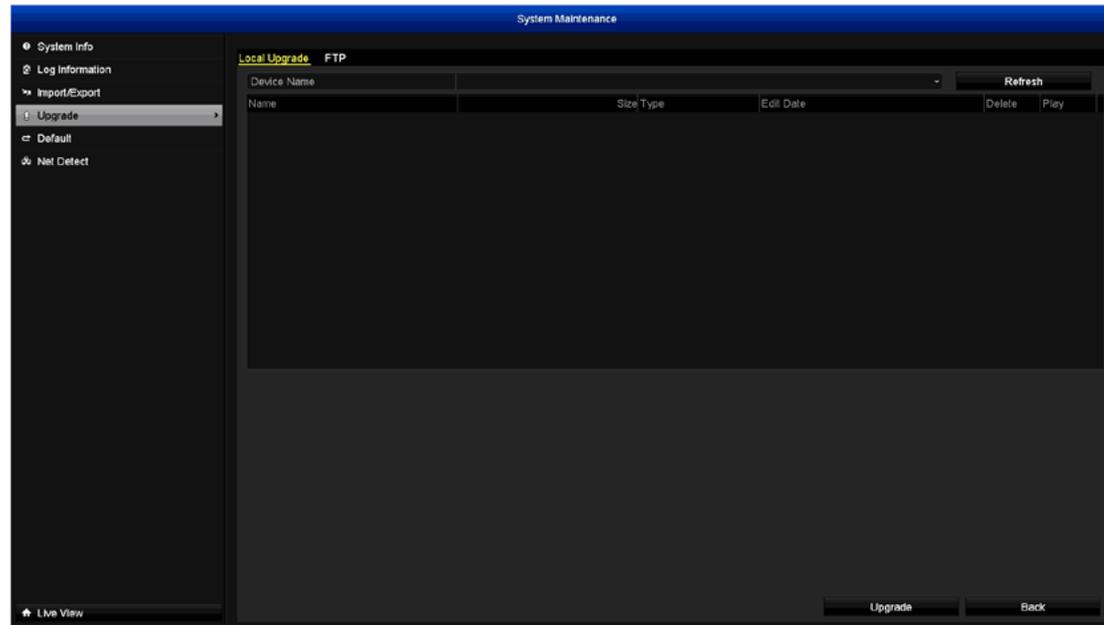
When new firmware is released, you can use this function to install the upgrade.

1. Insert your USB storage device to the rear USB port.

2. Select the location of the file then click "Upgrade". The DVR will restart when finished.

FTP: We don't recommend using this option in case the DVR is disconnected from your network during the upgrade.

- Click the "Back" button to go back to the Menu.

System Maintenance: Default
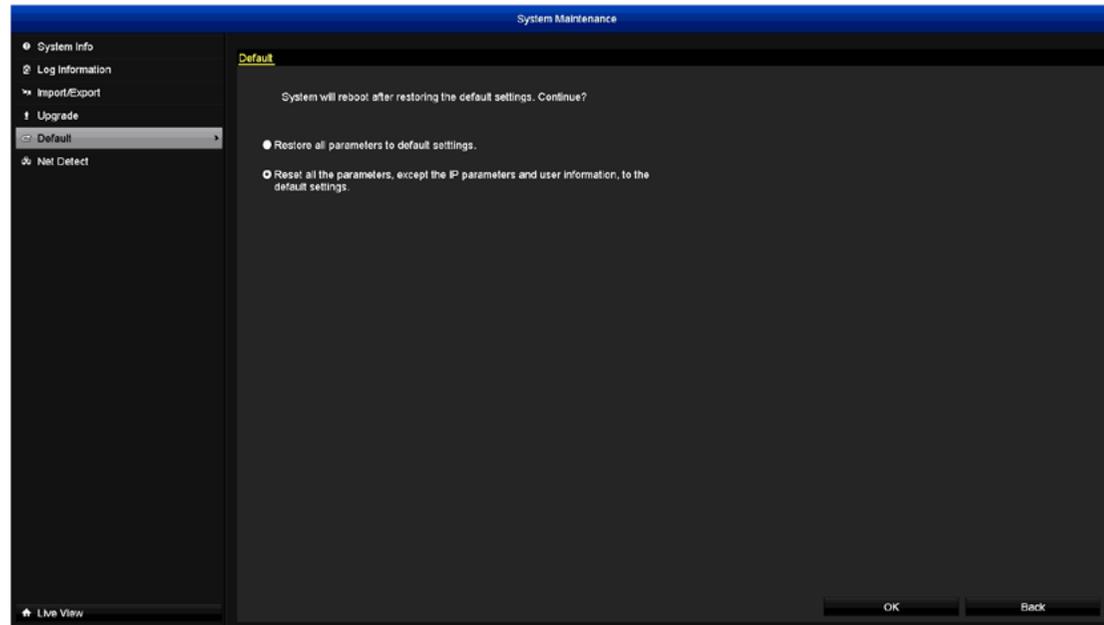
This functions allows you to factory reset the DVR in case of error. There are two options available.

1. The first option will reset all parameters including network and user settings.

2. The second option will reset all parameters except network and user settings.

The DVR will restart after pressing the "OK" button.

- Click the "Back" button to go back to the Menu.

System Maintenance: Net Detect

The Net Detect function allows you to check network traffic and to obtain real-time information from the DVR such as network detection, network status and sending and receiving network traffic.

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

- Click the "Back" button to go back to the Menu.

HDD: General

The HDD General function allows you to initialize the hard drive inside the DVR. Initializing will format the drive and erase any data that is on there.
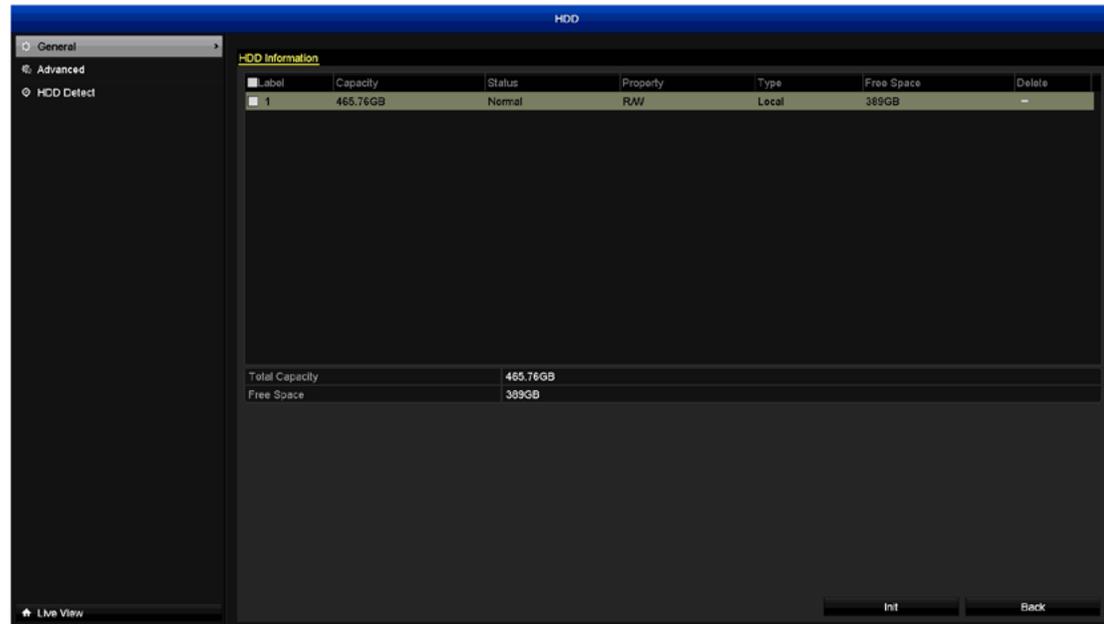
Init: Click the hard drive's checkbox to select then click this button to format. A message will appear noting that all data will be erased. Make sure you backup your hard drive if required before formatting. Click "OK" to continue.

- Click the "Back" button to go back to the Menu.

Please note, the hard drive has been pre-formatted during manufacture. If adding a replacement drive, use the "Init" button to format.

HDD: Advanced

This function allows you to configure a quota on the hard drive for each camera that is connected to the DVR. The advantage of this is that you can allocate more hard drive space to cameras monitoring a high traffic area and decrease space to cameras monitoring less frequented areas.

Mode: The default selection is "Quota".

Camera: Select the camera you want to change.

Max. Record Capacity (GB): Select in gigabytes the space you want to allocate, for example 50 gigabytes for camera 1, 50 gigabytes for camera 2. The free quota space will decrease each time an allocation is made.

- Use the "Copy" function to apply all settings to the other cameras.
- Don't forget to click "Apply" to save settings.
- Click the "Back" button to go back to the Menu.

HDD: HDD Detect

The HDD Detect function displays technical information of the hard drive installed as well as the ability to detect bad sectors.

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

- Don't forget to click "Apply" to save settings.
- Click the "Back" button to go back to the Menu.

Warranty Information

USA	Australia	United Kingdom
Swann Communications USA Inc.	Swann Communications	Swann Communications LTD.
12636 Clark Street	Unit 13, 331 Ingles Street	Stag Gates House 63/64 The Avenue
Santa Fe Springs CA 90670	Port Melbourne Vic 3207	SO171XS
USA	Australia	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 the 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

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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