Infrared Digital Scouting Camera User Manual SG520 Series



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1. Getting Started







External AC/DC Connector 4*1.7mm (Sold Separately)

This camera is a digital scouting camera with four 940nm black IR LEDs with a digital infrared surveillance camera that can triggered by any animal or human movements. These movements are monitored by a high sensitive Passive Infrared (PIR) motion sensor, which then automatically captures high quality pictures or records video clips according to default settings or preset customer settings.

This camera captures color pictures or videos under sufficient daylight, and black and white pictures or videos at night.

This camera supports WiFi functionalities with the use of a WiFi-SD card. You may also preview and download pictures and videos via WiFi from the WiFi-SD card to your Mobile Device or PC.

2. Camera Operation

2.1 Batteries / Power Supply

The camera is powered by four AA batteries. High-density and high-performance alkaline, rechargeable Alkaline or NiMH batteries are recommended. When battery power is low, the camera will beep twice and automatically shut down.

A DC 6V/2A external power supply adapter (not included) can also be used to power the camera.

2.2 SD Card Information

To take full advantage of the latest technologies, we recommend Class 10 SD cards or better, which have fast transfer speeds and long durability for extensive shooting in the most extreme outdoor conditions. Some SD cards are deemed Secure Digital High Capacity (SDHC) PRO cards, which work with SDHC compatible devices only. Please check that your product is compatible with SDHC cards.

• Insert the SD card into the camera before turning on the camera

This camera supports up to a 32GB capacity SD card and has no built-in internal memory. The camera will not function without the SD card properly inserted into the camera.

• Make sure the SD card is in the unlocked position

before inserting the SD card into the camera

The camera will operate normally with a locked SD card inserted, but the card will not be able to store captured images or videos taken by the camera.

• Do not remove the SD card while the camera is on

Removing the SD card while the camera is on risks damaging the internal components of the camera.

• If you experience any problems with an inserted SD card

Try reformatting the SD card by utilizing the camera's main settings option.

• Please insert the WiFi SD card if you want to use the WiFi function (Only available for SG520-W)

2.3 Camera Modes

The different modes are accessed by pressing the OK button, marked on the camera.

• SETUP Mode/Test Mode

To turn on the camera, press and hold the OK button until the display screen activates. In this mode you can customize the camera settings or play back pictures and videos the camera had taken on the LCD display. If the camera is left idle for more than 20 seconds, it will automatically switch to *Hunting Mode*, as described below.

• On Mode/Hunting Mode

The camera will take pictures or video when motion is detected and/or at specific time intervals, according to the programmed settings. Hunting mode is automatically activated if the camera is turned on and left alone for 20 seconds or more. Before entering Hunting Mode, the front (red) LED light will continuously blink for approximately 10 seconds and then turn off. This delay time allows you to adjust the camera's position if needed, before the camera becomes active. To "wake" the camera and access the camera's menu functions, press and hold the OK button until the display becomes active.

• OFF Mode

To turn off the camera when the display screen is active, press and hold the OK button until the screen powers off. The camera will still consume a small amount of battery power while in OFF mode. It is recommended to remove the batteries if the camera will not be used for a long period of time.

2.4 Trigger Modes

There are 3 different trigger modes for the camera.

• PIR Trigger/Sensitivity

In this trigger mode, the camera will activate when motion is detected. If the PIR Trigger/Sensitivity option is set to OFF, the camera will not respond to any motion within the camera's trigger detection range.

• Time Lapse

The default setting is OFF, which means timer triggering is disabled. Users need to set the PIR sensitivity to OFF and timer triggering interval to a non-zero value if they want the camera to work only at preset intervals.

In this camera mode, the camera will activate at the set time interval regardless of motion detection.

• PIR and Timer Triggering

For both PIR triggering and Timer triggering, user need to set PIR sensitivity to low, normal, or high according to the external environment, and set the Timer interval to a desired non-zero value. The camera will capture pictures or videos in a preset time interval even if there is no motion detected and also capture pictures and videos if motion is detected.

Additional PIR settings to note:

• PIR Interval

This setting indicates how long the PIR sensor will be disabled after each camera triggering. During this interval time, the camera will not react to any detected motion or activate at the scheduled Time Lapse interval.

<u>3. Camera Setup Settings and</u> <u>**Display**</u>

3.1 Interface & Display Settings

To update the camera settings, turn the camera on to activate the display screen.

OK/Power: Save parameter settings and view pictures Menu: Switch between Test/Setup and On mode
▶/Right: Capture a photo or record a video manually

When the camera is in SETUP mode, the screen will activate and display the following:



3.2 Manual Image / Video Capturing

Place the camera in TEST/SETUP mode and press ► to manually capture photos or record video. Press ► again to stop capturing video.

3.3 Manage Images and/or Videos

Place the camera in TEST/SETUP mode and press OK/POWER button to view images or videos.

The latest image or video will be shown on the LCD screen. Press the \blacktriangleright or OK/POWER button to cycle through the pictures and videos taken.

NOTE: Video cannot be viewed directly through the camera.

3.4 WiFi Functionality (Model SG520-W only)

Only the SG520-W supports this function. It can be connected to your mobile device or PC by WiFi. Step 1: Insert the WiFi SD card (up to 32GB are supported). Step 2: Install the 'ez Share' APP in your device or PC. You can then preview or download the images and videos from the camera via your device or PC.

More details of the operation:

3.4.1 For Mobile Device 3.4.1 For Mobile Device 3.4.1 Download the "ez Share" App to your mobile device from the Apple store (IOS) or Google Play (Android);

3.4.1.2 Install the APP in your device.

3.4.1.3 Turn on the WiFi button. When the camera is turned on (in any modes), press the "ON" button on the wireless WiFi remote control;



3.4.1.4 Find your WiFi name on your device and enter the WiFi password to connect. (Default password is 888888888); 3.4.1.5 Open the APP. All operations can be done through the APP once WiFi is successfully connected to mobile device.





In WiFi mode, the indication LED (red) will be steady until WiFi is turned off.

3.5 Camera Setup Options

To view the camera settings menu, press OK to wake up the camera. When the screen is active, press MENU to enter into the menu settings. Use the RIGHT key to select the different options, press OK to save the setting and press MENU to exit the camera settings menu.

After changing EACH setting in the Setup menu, you must press OK or the camera will retain the previous setting.

Menu	Description	
Language	Choose your desired language: English, Suomi, Deutsch, French, Spanish, Czech, Svenska Default: English	
Camera Mode	There are three camera modes: Photo, Video and Pic+Video.	
	Default: PhotoSet camera date and time. The date format is	
Set Clock	month/day/year, and the time format is hour: minute: second.	
Photo Size	Choose the image size. SG520-24mHD: 24(D)/18(N)MP, 16(D)/12(N)MP, 10(D)/8(N)MP (D for Day,N for Night) SG520-W: 12MP, 10MP, 5MP Default: 24(D)/18(N)MP (SG520-24mHD) 12MP (SG520-W)	

	Choose the number of photos taken after the camera is
	triggered: 1 Photo, 2 Photos, or 3 Photos. If Pic+Video
Photo Burst	is selected, photo burst defaults to 1 photo regardless of
	entered value.
	Default: 1 Photo
	Choose the video size: 1920x1080 (not applicable to
Video Size	<i>SG520-W</i>), 1280x720 or 640x480.
video Size	Default: 1920x1080 (SG520-24mHD)
	1280x720 (SG520-W)
	Choose the duration of the video recording: Valid
	values extend from 5-60 seconds with a one second
Video Length	delay.
	Default: 10Secs
	The camera can capture images or videos at a preset
	time interval regardless of motion detection. Changing
	this setting to a non-zero value turns on Time Lapse
	mode and the camera will take photos at the set
Time Lapse	interval time – Values range from 5 minutes to a
A	maximum of 8 hours.
	NOTE: If the PIR Trigger is set to off, then Time
	Lapse can't be set to off.
	Default: OFF
	This setting is for the sensitivity of the PIR sensor.
	There are four sensitivity parameters: High, Normal,
	Low and Off. It is recommended to use HIGH
	sensitivity in areas with little environmental
PIR Trigger	interference or warmer, humid climates. Use LOW
	sensitivity for areas that have a lot of interference. The
	sensitivity of the PIR is affected by temperature.
	Higher temperatures leads to a lower sensitivity.
	NOTE: If the Time Lapse is set to off, then PIR

	Trigger can't be set to off.	
	Default: Normal	
PIR Interval	 This setting indicates how long the PIR sensor will be disabled after each camera triggering. During this time the PIR sensor will not react to any detected motion or scheduled timer functions. Default: 5 Secs 	
Recycle Storage	If the SD card is full in hunting mode, the first images or videos will be overridden by new pictures or videos.	
Format SD	All information on the SD card will be deleted. Make sure you backup important data on the SD card before using this mode.	
Version	Version information.	
Default Settings	Restore all camera settings to default values.	

4. Troubleshooting

Q: There is something in front of the camera lens. Is the camera broken?



A: The camera is not broken. It is an IR-Cut filter. When the camera is powered on, the IR-Cut will be reset and cover the lens. Only when the camera is powered off will the IR-Cut move to a random place.

Q: The camera is not working anymore.

A: The most likely cause of this is that no SD card was inserted into the camera before turning it on.

Q: The display screen is suddenly black.

A: The camera has entered into hunting mode. Press "OK" to wake it up if you want to continue to setup the camera.

5. PIR Detection Zone

This camera has a new patented design of PIR which has a detection range that can reach to 85ft in good environments. The following picture shows the compared detection zone between normal PIR and the new patented PIR.



The PIR detection angle (α) is just smaller than the field of view (FOV) angle (β). The advantage of this design is to reduce empty picture rate and capture most, if not all, motions.



6. Technical Specifications

Image Sensor	5MP CMOS Sensor	
Lens	F/NO=2.2	
Lelis	FOV(Field of View)=55°	
PIR detection range	85ft	
Display Screen of Remote Control	1.44" LCD	
Memory Card	Up to 32 GB	
	SG520-W :12/10/5 MP	
Image Resolution	$SG_{520}-24mHD:24(D)/18(N)MP,16(D)/12(N)MP,$	
	10(D)/8(N)MP	
	(D for Day, N for Night)	
Video Resolution	1920×1080(Not applicable to SG520-W)	
	1280x720	
	640×480	
LED Type	940nm	
LED Number	4pcs	
PIR Sensitivity	Adjustable (High/Normal/Low/Off)	
Trigger Time	<0.7s	
Weight	180g(without battery)	
Operation/Storage Tem.	-20 - +60°C / -30 - +70°C	
Power Supply	4×AA or 6V/2A external power supply	
Sound Recording	Available	
Mounting	Rope/Belt/Python lock	
Dimensions	107 x76 x40 mm	
Operation Humidity	5% - 90%	
Security Authentication	FCC, CE, RoHS	

7. Parts List

Part Name	Quantity
Camera	1
Belt	1
User Manual	1
Warranty Card	1

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