

# Digital Video Camera Specification



**RoHS** **FCC** **CE**



## How to Install the Battery and Charge It?

1. First, please place the battery in the battery slot and ensure that the guide rail of the battery is stuck in the slot. Then you should push it up until the battery is caught.



2. After turning on the screen, please connect the USB port to the camera to charge it.
3. The "CHG" indicator on the back of the camera will turn red when charging and turn off when the camera is fully charged.
4. Please replace the battery. To remove the battery, you should press the battery button and push it down.



## How to Install and Charge the External Microphone?

1. Please use the USB in the package to connect the external microphone for charging.
2. When charging, the microphone indicator will turn blue and go out when the microphone is fully charged.
3. After charging, you should install the external microphone on the hot shoe interface of the camera and tighten it with the screws.
4. Please use the 3.5mm earphone cable in the package to connect the microphone and camera, namely the "MIC" port.
5. After opening the external microphone or you are using it, if the battery is low, the indicator of the external microphone will be red, and you should charge it in time.

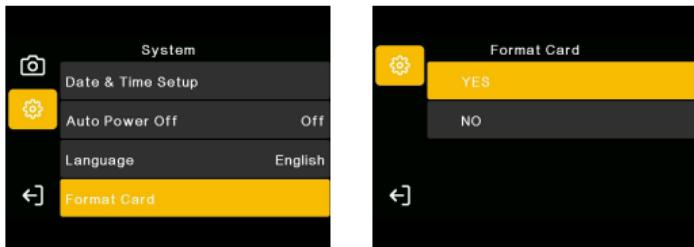


## How to Turn on and Turn off the Screen?

1. When you turn on the screen and the camera will work automatically, and you can turn on the screen by pressing the "Power button".
2. When you turn off the screen and the camera will automatically shut down, and you also can press the "Power button" to turn off the screen.

## How to Install and Format an SD Card?

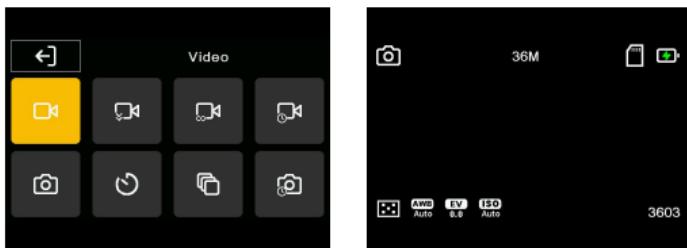
1. This camera applies SDXC C10 U1 grade and above SD card (4-256GB).
2. We recommend you to use the SD cards brand of Samsung or San Disk.
3. Please format the SD card for the first time. A card only needs to be formatted once. Pressing the "Menu" key and "Mode" key to enter "  ". Pressing the "Up /Down" keys to find "Format". Pressing the "OK" key to confirm formatting, and finally press the "Menu" key to exit.



## How to Take, Play Back, and Delete Photos?

1. Take photos: ① you should press the "Take photos" button so that you can take photos quickly. ② Please enter the "photo" MODE first: Press "Mode" to enter "Mode Selection" after startup, then use the "UP" and "DOWN" keys to find "Photo", and press "OK" to confirm. When you are in "PHOTO" mode, you should press the "Photo" key at the top of the camera to take a photo
2. If you want to play back the photo, please press "MODE" twice.
3. If you want to delete a photo, please press the "MENU" key in "PLAYBACK" mode to enter the file deletion operation then you can delete the things you want.

4. If you want to change the digital zoom, you should use the focus stick (W/T) on the top of the camera to adjust it.



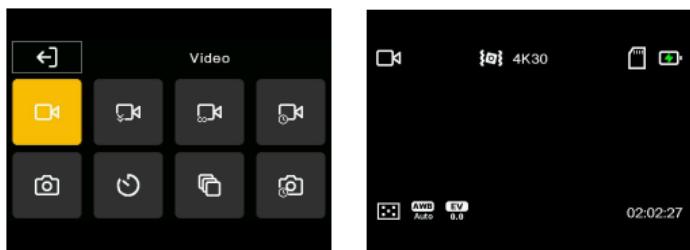
## How to Record, Play Back, and Delete Videos?

1. Video recording: ① If you want to have a quick recording, you should press the "Record" key. ② First, you should enter the recording mode: When you start the device, you should enter the "Mode Selection" by pressing the "Mode" key, and then use the "Up" and "Down" keys to find the "Recording" key, and press the "OK" key to confirm it. After entering the recording mode, please press the red dot button (START/STOP) at the end of the camera to start your recording. During recording, if you want to pause your recording, you can press "PHOTO", and press "PHOTO" again to continue your recording. Finally, you can press the red dot button (START/STOP) to end your recording.

2. If you want to play back the video, you should press "MODE" twice, select the video file, and then press the "OK" key to play your video.

3. If you want to delete some photos, press the "Menu" key in playback mode to enter the file deletion operation and you can delete something you want.

4. If you want to change the digital zoom, you should use the focus stick (W/T) on the top of the camera to adjust it.



## How to Enter Night Vision Mode?

1. After booting, please press the "OK" key to enter the night vision mode.
2. When you are in the night vision the photos and videos will in black and white.
3. If you want to exit night vision mode, you can press the "OK" key.

## How to Enter Webcam Mode?

1. Connect your camera to the computer by using the USB.
2. After the computer finishes recognition, the camera dialog box will pop up. Then you should select "Camera".
3. The computer will automatically recognize the camera when you open social media. You should select "General UVC Camera" from the external camera settings of the social media software.

4. When you want to exit camera mode, you should press and hold the "Power" button until it shuts down.



## How to Upload Photos/Videos to Computer?

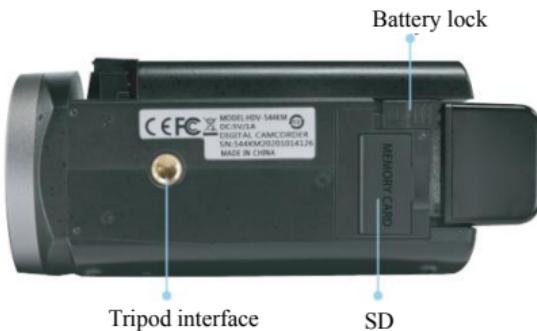
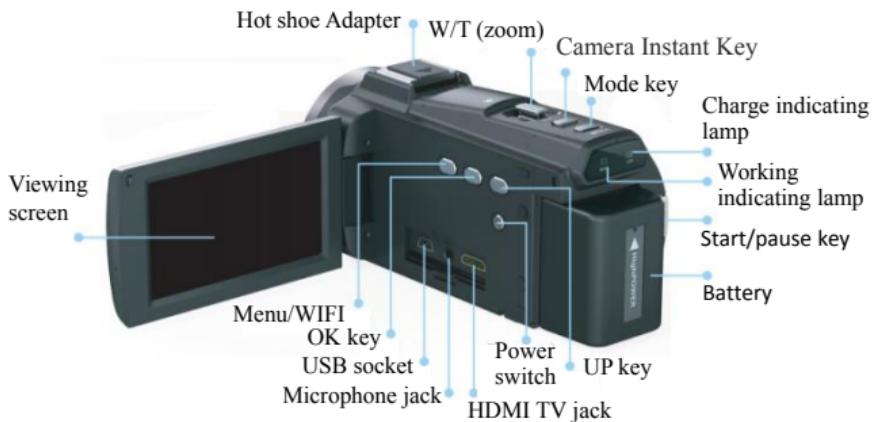
1. Please connect the camera to the computer by using a USB.
2. After connecting the computer, you should select "Portable Hard Disk" and press "OK" to confirm it.
3. After finishing your connecting, you can upload your camera files to your computer. When you want to exit you can press the "Power button" until it shut down.
4. You can also connect the SD card of your camera to the card reader, you can facilitate the operation of videos and photos in the SD card on your computer, and it is very convenient.



## How to Connect the TV and Play Back?

1. Please use the HD cable in the package to connect your TV and camera.
2. After connecting the camera to the TV, you should press the "Mode" button twice so that you can enter "Play" mode. You can also press the "Up /Down" keys to select a video to play.
3. After finding your video, please press the "OK" button to play the video.
4. To exit the TV, you should press the "Power" button then you can do it.

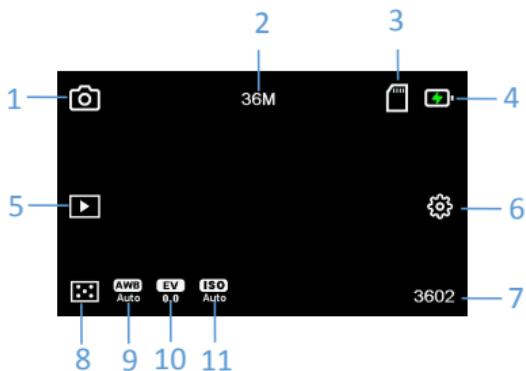
# Structure of Camera



## Button and Indicator Function

Key/indicator light	Function
Power button/Down arrow key	Start/shut down/Menu select/EV-/turn down the sound (play mode)
Up arrow key	Menu select, EV+, long press to hide or display all ICONS on the screen, turn up the sound (play mode)
OK key	Turn on/off red light (video/photo mode), pause/continue playing (while playing video), Confirm (other situations)
Menu	Open and exit menus
Start/pause	Start/stop shooting
Mode key	Selective mode of operation
Photograph	photograph
W	Zoom out, fast back (while playing the video)
T	Zoom in and fast forward (while playing the video)
Indicator light (Power & charge)	The blue light is the working indicator light
	The red light is the charging indicator, which is steady on when connecting the charger. The red light will go out when the battery is full.
Hot shoe Adapter	Install external camera accessories

## Photo Mode



NO.	Icon name	Detailed description
1	Current Mode	Press Mode to switch modes
2	Current pixel	Current video pixel
3	SD card	Whether to install an SD card
4	Electric quantity	Battery state
5	Playback	Click this icon on the touch screen to enter playback mode (this icon will be automatically hidden within 3 seconds, and if you click the screen it will be displayed again)
6	Menu	Click this icon on the touch screen to enter the menu (This icon will be automatically hidden within 3 seconds, and if you click the screen it will be displayed again)
7	Number of photographs available	How many photos can be taken in the camera's current memory
8	Photo metric mode	Current metering mode

9	White balance	Current white balance settings
10	Exposure compensation	Current exposure compensation value
11	Photo sensibility	Current sensitivity

### Recording mode



NO.	Icon name	Detailed description
1	Current Mode	Press Mode to switch modes
2	Shake Reduction	Reduce video blur caused by hand shaking
3	Current pixel	Current video pixel
4	SD card	Whether to install an SD card
5	Electric quantity	Battery state
6	Available space	Video available space
7	Photo metric mode	Current metering mode
8	White balance	Current white balance Settings
9	Exposure compensation	Current exposure compensation value

## Product Parameter

Image pixel	48M,36M,24M,20M,16M,12M,8M,5M
Video resolution	5K 30FPS; 4K 30FPS; 2.7K 30FPS; 1080P 60FPS; 1080P 30FPS; 720P 60FPS; 720P 30FPS
Memory card	4-256GB SD card, Support SDXC C10 U1 grade and above
Picture format	JPG
Video format	MP4
Digital zoom	16X
USB interface	USB2.0
Screen size	The 3-inch IPS display supports the touch function
Battery	2 blocks
Focusing	Aperture F=2.2, focal length f=3.37mm
Optimum shooting distance	1 meter to infinity
Hot boot seat jack	External microphone and fill light (please use our products)
TV Output	Support HDMI
Tripod interface	Standard 1/4 inch screw opening
Built-in microphone	Yes, an external microphone is recommended for a better experience.
Night vision	Infrared night vision
Focus Mode	Fixed-focus
input	5V/1A
Hot shoe interface	Yes
Operating system	Windows XP、Windows Vista、Windows7、 Windows 8 、Windows 10、Windows 11、 Mac 10.2

# Camera System Setup

Push "Menu Button" >Push "Mode Button" > 

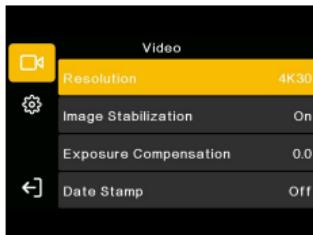


Internet	On/off default off
Photo metric mode	Center/multi-point/dot
white balance	Automatic, daylight, cloudy day, incandescent lamp, fluorescent lamp (H), fluorescent lamp (L)
light frequency	50 Hertz /60 Hertz
Sound settings	Shutter sound/startup sound/keystroke sound/volume
Date and time setting	The W/T focusing rod can switch the year/month/day/hour/minute, and the "Up" or "Down" key can adjust the date and time number
Auto power-off	You can choose 1/3/5 minutes after the automatic shutdown
Language	multiple languages
Formatting	Use this function to format the SD card before using it for the first time
Restore factory defaults	Restore the camera default settings
Version	Displays the device version number

# Video Mode's Menu Introduction

You can press the "Mode key" to enter the mode selection, then use the "up" or "down" key to find the "Video", If you want to enter the video mode, you should press the "OK" key

You can press the Menu key, and you will see three screens "  ", representing video Settings, "  " represents camera system Settings, and "  " exits the menu. The Mode key toggles settings/exits between video Settings/camera systems. The "Up" or "Down" keys can be used to switch the secondary menu Settings.



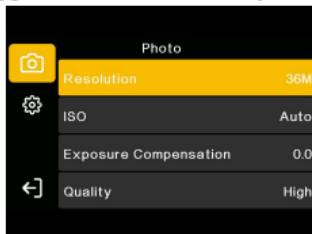
## Video Setting

Image size	5K 30FPS; 4K 30FPS; 2.7K 30FPS; 1080P 60FPS; 1080P 30FPS; 720P 60FPS; 720P 30FPS
Shake Reduction	Open/close
Exposure compensation	EV+2.0/EV+1.0/EV0/EV-1.0/EV-2.0/,Default EV0
Time watermarking	Close/Date/Date and time

# Menu in Photo Mode

First, please enter the photo mode:

1. After the device is powered on, you can press "Mode" to select "Photo", and press "OK" to enter the photo mode.
2. You should note the "📷" in the upper left corner of the camera display, it indicating that the camera is in photo mode.
3. After switching to the photo mode, you should press the "Menu" key and three interfaces will be displayed. "📷" refers to photo setting, "⚙️" represents camera system setting, and "⬅️" exits the menu. The "Mode button" toggles between photo Settings and camera system Settings. The "Up" or "Down" keys toggle between secondary menu Settings.

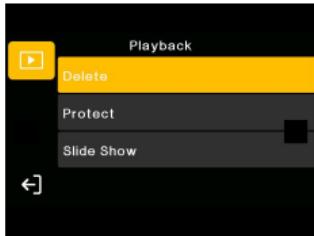


## Photo Setting

Size of the picture	48M,36M,24M,20M,16M,12M,8M,5M
Photo sensibility	Automatically/ISO 100/ISO200/ISO400/ISO800/ISO1600/ISO3200
Exposure compensation	EV+2.0/EV+1.0/EV0/EV-1.0/EV-2.0/,Default EV0
Image quality	High/Medium/Low
Time watermarking	Close/Date/Date and time

## The menu in playback mode

1. You should press "MODE" twice to enter playback mode. Click the touch screen, the playback icon "▶" appears on the left of the screen, and then click this icon to enter the playback mode.
2. After entering the playback mode, you can press the menu key to enter the menu interface. Clicking the touch screen, the setting icon "⚙️" appears on the right side of the screen, and if you want to enter the menu interface you should click it.
3. After the menu is displayed, you can select File Delete to delete a single file or all files. And you can select the File lock to lock and protect files. Select Slideshow, it can let photos and videos play in 2 or 5 seconds.



## Eight Modes to Choose

After powering on, you should press "MODE" to enter "Mode Selection", and then you can use the "UP" and "DOWN" keys (or the W/T zoom lever) to select the mode you want to switch, and finally press "OK".

**Eight modes:** 1. Recording, 2. Slow Motion recording, 3. cyclic recording, 4. Time-lapse recording, 5. Take photos, 6. Timer mode, 7. Continuous photos, 8. Time-lapse photos.

### 1. Recording

In recording mode, you should press the red dot button (START/STOP) to

start recording the video, and then you can press the red dot button (START/STOP) to stop recording the video.

## **2. Slow motion recording**

In slow motion recording mode, you can press the red dot button (START/STOP) to start slow motion recording. For slow recording, a moving object may leave a moving image on your video when it is exposed. When you shoot a video at a higher than normal frequency, it will produce a longer film that reflects slower action than it is actually in the normal.

## **3. Cyclic recording**

In cyclic recording mode, you can press the red dot button (START/STOP) to start recording. The video will be shot with the video file. Once the video duration is over, the shooting of this video will be stopped and a new video will be automatically recorded immediately.

## **4. Time-lapse recording**

In the time-lapse recording mode, you can press the red dot button (START/STOP) to start recording. Time-lapse video recording, also known as time-lapse video recording, is a shooting technique that can compress the long recording time to make it shorter and turn a long video in slow motion into a short one with snap actions.

## **5. Take photos**

In the photo mode, you can press the "Shoot" button to take photos.

## **6. Timer mode**

In the timer mode, you can press the timer button and the camera will take a countdown photo according to the timer you have set.

## **7. Continuous photo**

In continuous photo mode, you can press the "Photo" button and the camera will take continuous photos at the setting of 3/5/10 photos per second according to your settings.

## **8. Time-delay photos**

In the time-delay mode, you can press the photo button to start taking time-delay photos and then press the photo button to stop taking time-delay photos. According to the interval and duration you have set, the system takes pictures at an interval of 3s, 5s, 10s, 30s, and 1 minute.

## **WIFI Setting**

### **Download and install application software**

1. For Android users, please search google play and install the "iSmart DV2" APP.
2. For iPhone users, please search for and install the iSmart DV2 App in App Store.

### **Open WIFI connection**

Through the WIFI connection, the APP can control the camera, it involves previewing, browsing albums and downloading files from the camera to a

phone or tablet for sharing, as well as commanding remote control via APP.



WIFI signal open

1. After the camera starts, you should keep it in a standby state. Press and hold the "Menu button" for 3 seconds, or press the "Menu button" first, and then press the left or right button to select System Settings to open the WIFI signal source. The camera screen displays the WIFI name and password.
2. Check the WIFI settings on your phone or tablet, and you should locate the WIFI source name "5K-XXXXXX" displayed on the camera, click "Connect", and enter the WIFI password displayed on the camera.

### **The APP connects to the camera**

Users can operate the camera via APP to preview, browse albums and download files from the camera to their phone or tablet for sharing after the connection is successful. It can also be controlled remotely via APP operation.

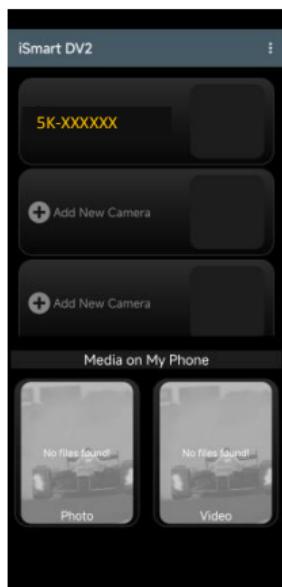
### **Close WIFI function**

In the WIFI connection state, you can press the MENU key to cut off the WIFI source of the camera, to exit the WIFI mode, and the camera will return

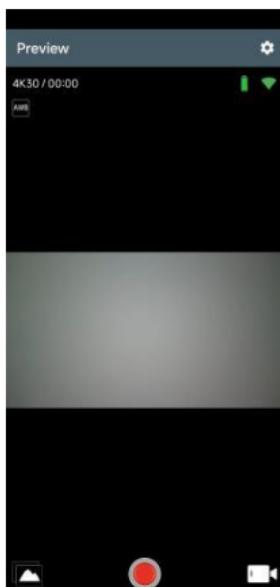
to its normal state.

**Notice:** 1. The camera resolution should be set to 2K or below before using the APP. If the resolution is set to 5K, the file will be too large to transfer and the application may not run.

2. Special note: Please download the file to the mobile phone to play, then make sure that the mobile phone has enough space and speed to play the file. Otherwise, the video may not play smoothly.



APP preview under WIFI connection



Preview videos and photos on the APP

## Warm Tips of Frequently Asked Questions

The camera fails to start after the battery is installed	For low battery power, please charge it and try again. Battery packaging is not removed. Reverse installation of battery, ensuring that the battery is installed correctly
You can't take pictures or videos by pressing the shutter button	If the memory is full, please save the shot file to another storage. The memory card may be write protected. Take out the memory card and turn off the write protection switch.
The resulting picture is blurry	Hands shake when taking pictures. Please hold the camera with both hands, or use a tripod or other object to stabilize the camera. Do not shake the camera when taking pictures.
The resulting photos or videos is dull	There was not enough light in the shooting environment. Shoot in a well-lit area or use lights to increase the brightness of the light.
Camera automatically shutdown	The battery is low, please replace the battery. To save power, if there is no operation for more than 3 minutes (5 minutes or 10 minutes, depending on the menu settings), the camera will automatically turn off according to the settings.
Files in the camera cannot be deleted	File protection in the camera menu is enabled. Turn this feature off in the menu.
Camera crashes or screen splashes	The format of the SD card is incorrect. Please format the SD card in the camera or on the computer before using it. The connection bar of the screen is loose (needs to be repaired).
Unable to charge	The battery is not installed properly. Please ensure that the battery is installed properly.

	<p>The metal contact of the battery has oil film, which leads to poor contact. You can gently scrape off the oil film with a blade and then load it into the machine for charging.</p>
	<p>The USB charging cable is not plugged in properly or the power adapter is not plugged in properly. Please confirm it.</p>
	<p>The red light indicates the charging status: If the red light blinks, the battery is not installed properly; If the red light keeps on, it indicates that it is charging; If the red light is off, it means that the battery is fully charged.</p>
	<p>The battery IC is bad (needs to be repaired).</p>
Do not read the SD card	<p>The SD card contains incompatible files. Please format the SD card in the camera or computer before using it.</p>
	<p>The booth is damaged (needs to be repaired).</p>
The recording time is too short when WiFi is connected	<p>The battery is low, please charge it and try again. Do not use WiFi and infrared night vision at the same time if the red light is turned on at the same time for recording, the power consumption is too large and the recording time is too short in WiFi connection.</p>
The camera interface cannot be opened in the image card or APP during WiFi connection	<p>If the resolution is too high and the files are too large, the files will not be transferred to the mobile phone or tablet when the camera resolution is set to 5K. Please set the resolution below 2K (or 2K).</p>
	<p>Please shorten the distance between it and the camera if the mobile phone or tablet is too far away from the camera.</p>
Flash back or crash when APP is opened	<p>Please download the latest software that matches the current device when the current software is incompatible with the device.</p>

## FCC Warning Statement

Changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment. This equipment has been tested and found to comply with the limits for a 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 communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does 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 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.

This device complies with part 15 of the FCC Rules. Operation is subject to the following two conditions: (1) This device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

The device has been evaluated to meet general RF exposure requirement. The device can be used in portable exposure condition without restriction.