

Function Outline

Thanks for your selection of our digital video camera! Read carefully this manual before use.

With the camera, you can take digital photos of max. 3,100,000 pixels and short videos with 640×480 resolution. With the playback mode, you can replay the photos and videos you've taken.

The content contained in this manual refers to the latest information when it is created. The screen, illustrations etc adopted in this manual aim to illustrate the operation of the digital video camera in detail and vividly. Because of different technological developments and production batches, they may be slightly different from your actual digital video cameras.

Notices

General Notices:

1. Do not open the outer casing of the camera because some parts inside can cause electric shock.
2. Dampness, compression, collision and high heat can damage this product.

Memory and Save:

1. The SD/MMC card can be used (bought otherwise where necessary, max. 512MB).
2. When buying a SD/MMC card, you'd better take your camera with you in order to ensure compatibility.
3. When the SD/MMC card is inserted, the camera will stop using the memory.
4. The SD card has a write-protect switch for preventing data from being deleted by mistake. When you push the switch to the bottom of the card, the data in the card will be protected. However, when the card is in write-protect, it is impossible to take photos or videos or make deletions etc.
5. The memory card should not be used for storing data for long time. You must copy the files inside the digital video camera in a proper storage device.
6. When saving a file in the memory or memory card, you must note that the size of the file does not exceed the capacity of the memory card.



Maintenance and Care:

When not using, store the camera in dry and dark place with the battery taken out.

1. When in use, always wear the wrist belt to avoid sliding.
2. Use a proper protective casing to prevent the lens and display screen from being scraped.
3. If you want to clean the lens surface, blow away the dust on the surface and lightly mop with a cloth or paper towel applicable for the cleaning of optical devices. When necessary, use the lens cleanser. Do not use organic solvents to clean the camera.
4. Never use your fingers to touch the lens surface.

Other Notices:

1. When switching the image output between the LCD display screen and the video device, exit from the play or record state.
2. The digital video camera is applicable under temperatures between 0°C and 40°C (32°F and 104°F). Never place the digital video camera under high temperatures, for example, in cars parked under the burning sun or in the terrible dampness. When entering a warm place from a cold place, in order to prevent the digital video camera from condensing, put the digital video camera in a sealed plastic bag until its temperature reaches the room temperature and take it out from the bag.
3. TV programs, films, music, pictures and other resources may be protected by copyright, so taking/using these resources without permission may violate the copyright law. Note that resources protected by copyright can be used only under the condition that the copyright law is accorded with.

System Requirements

When operating and using the digital video camera, refer to the lowest computer system requirements for the camera. We strongly recommend you use good computer equipment to operate the camera so as to develop the best efficiency. The lowest system requirements are as follows:

System Requirements	
Operating system	Microsoft Windows 98 SE, Me, 2000, XP
CPU	Intel Pentium 166MHz above or CPU with equivalent capacity
Memory	128 MB above
Sound Card, video card	Sound card, video card supporting DirectX8 or higher version
CD driver	4X-Speed above
HD	above 500 MB free space
Others	A standard USB 1.1 or USB 2.0 interface

Begin to Use

1. Install Battery

1. Open the battery lid



2. Put 3 pieces of AAA (7#) batteries in according to the polarity instruction.

3. Insert the front end of the battery lid into the battery stack (Fig. 1), press the back end of the battery lid (Fig. 2) and then push the battery lid inwards to allow the battery lid to closely attach the body (Fig. 3).



2. Use SD Card

1. Push the SD card into the slot until it is completely inserted according to instructions.

2. Lightly press the card end inwards and the SD card will eject.



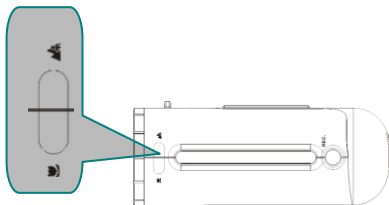
3. Power on and off

1. Power on: press the power key, light the screen and the unit will power on.
2. Power off: press the power key and loosen, then power is off.


If the automatic switch-off option of the digital video camera is set as 60s or 120s, after switch-on, the power will shut off automatically without any operation within 1min or 2min.

4. Choose Focus Mode

Press the macro switch on the top of the body and then you can switch between the macro and normal focus.



1. Macro: it is suitable for shooting objects 15cm ~ 25cm away from the lens; when using, push the macro switch to the end marked with .

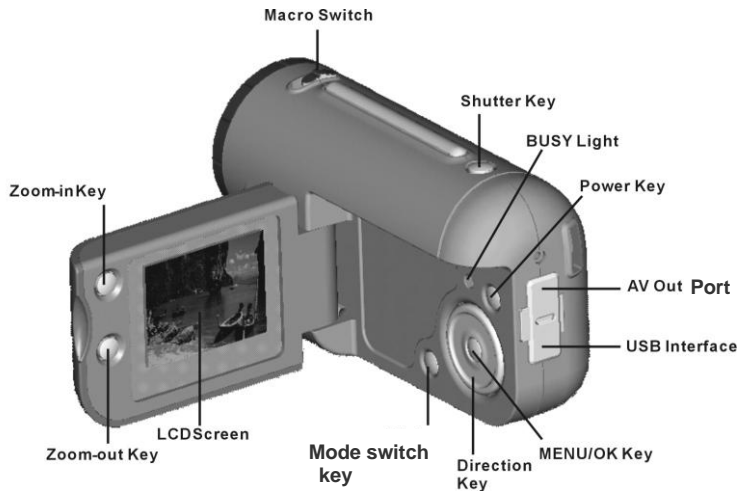
2. Normal focus: it is suitable for shooting objects 1.4m away from the lens; when using, push the macro switch to the end marked with .

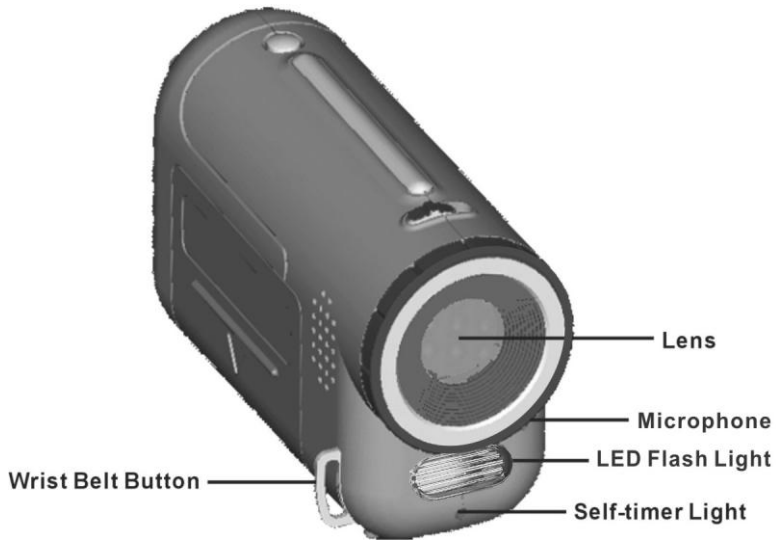
5 Adjust the wrist belt length

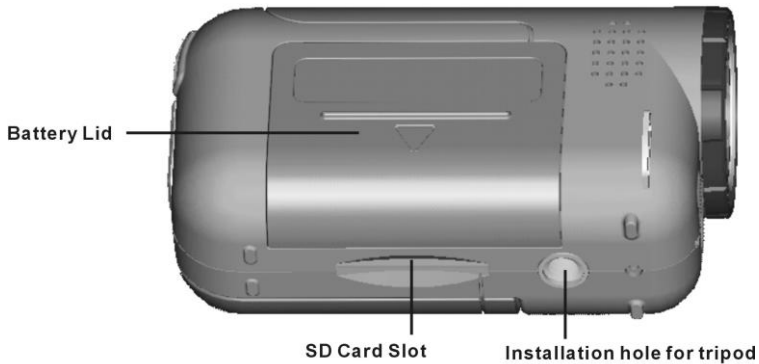
1. Pull the magic sticker on the wrist belt.
2. Pull the nylon strap stuck on the magic sticker.
3. Adjust the bending length of the wrist belt.
4. Fasten the nylon strap on the magic sticker.
5. Fold and nip tightly the magic sticker.



Appearance Introduction







Key Functions:

Keys	Shooting Mode Functions	Playback Mode Functions
Power key	Power on/off	Power on/off
Shutter key	Shooting	Begin/stop playing videos
Mode switch key	Circular switch of shooting and video modes	/
MENU/OK key	Display/exit from menus and confirm	Display/exit from the menu and confirm
UP key	Enter playback mode, select menus upwards and adjust time	Exit from playback mode, select menus upwards and adjust time
DOWN key	Select menus downwards and adjust time	Short-cut deletion, select menus downwards and adjust time
LEFT key	Select menus leftwards, adjust the LED flash light setting	Select menus or files leftwards
RIGHTT key	Select menus rightwards, switch self-timer shooting	Select menus or files rightwards
Zoom-in key	Zoom in	Photos zoom in
Zoom-out key	Zoom out	Photos zoom-out

Basic Operations

Choose Modes:

There are 3 modes such as shooting, recording and playback. You will enter the record mode after switch-on and you can press the mode key to switch between the shooting mode and record mode.

In the shooting or record modes, press UP key to enter the playback mode; in the playback mode, press UP key to enter the record mode.

Indicator Light:

BUSY light: it will light in such working states as recording, play, connecting PC and TV output etc.

Self-timer light: it will flicker for indication in the process of self-timer countdown.

Connect PC:

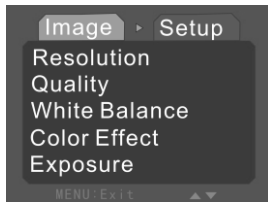
Connecting PC: after the USB cable is connected to PC, the camera will enter the corresponding USB mode set in the setup menu. In the process of connecting PC, press the mode switch key to switch between PC Camera mode and Mass Storage mode.

Power saving mode: according to setting, the camera will automatically shut down without operations within 1min or 2 min.

Menu Settings:

Press MENU/OK key to open menu; press UP/DOWN key to select menu option; press RIGHT key to enter submenu; press MENU/OK key to confirm; press LEFT key back to the previous menu.

Menu is divided into 2 categories: mode menu and setup menu (as the right Fig.). Press MENU key to open mode menu. When selecting menu title, press LEFT key or RIGHT key to switch between mode menu and setup menu.



Shooting:

After power-on, the record mode will be entered. Press the mode switch key to switch to the shooting mode.

In the shooting mode, press RIGHT key to switch to the self-timer mode. In the “Image” menu, you can also select the shooting mode.

Recording:

Switch to the record mode; press the shutter key to start recording and again press the shutter key to stop recording.

Playback:

In the playback mode, press LEFT or RIGHT key to select files.

When a photo is now displayed, the zoom-in key or zoom-out key can be used to enlarge or reduce photos.

When a video is now displayed, press the shutter key to start playing, press OK key to suspend playing and press again MENU/OK key to continue playing.
















Step Operation

Record Mode

In the record mode, only press the shutter key to start recording. During recording, the calculagraph will be displayed on the left top of the screen. Press again the shutter key to stop recording.

◆Information displayed on the screen



	Icons displayed on the screen	Instructions
①		In the record mode, idle state
②		640×480 resolution
		320×240 resolution
③	AWB	Auto white balance
		Daylight white balance
		Tungsten white balance
		Fluorescent white balance
		Cloudy white balance
④		Open microphone
⑤		Battery full.
		Battery moderate.
		Battery low.
		Battery empty.
⑥		LED flash light is on.
⑦		Memory card used.
		The card write protected.
⑧	×1.0	Digital zoom ratio

◆Use digital zoom

Before shooting or video recording, using digital zoom can enlarge the menu by max. 4 multiples. To zoom in, please press the zoom-in key. To zoom out, please press the zoom-out key.

◆Use the LED flash light

Use the LED flash light to illuminate subjects in dark environments. Press the LEFT key to turn on/off the LED flash light. An icon displays on the screen when activated.

◆Menu options

Video menu:

Video Menu	Submenu
Resolution	640×480
	320×240
Frame Rate	30FPS
	15FPS
White Balance	Auto
	Day Light
	Tungsten
	Fluorescent
	Cloudy
Audio	Enable
	Disable

Setup menu:

Setup menu	Submenu
Language (Abc)	English
	Français
	Deutsch
	Italiano
	Español
	Portuguese
	中文
Auto Power off	Disable
	60Sec.
	120Sec.
TV Output	NTSC
	PAL
Play Logo	Enable
	Disable

Light Frequency	50Hz
	60Hz
Date/Time	2007 / 09 / 05
	20 : 08
Buzzer	Enable
	Disable
Format	Yes
	No
Default Settings	Load
	No
USB Mode	Mass Storage
	PC Camera
Firmware Version	Version number: Last update date: Upgrade

◆Menu operation

Press MENU key to open video menu. At the time, press LEFT key or RIGTH key to switch between video menu and setup menu. Press DOWN key to enter the items of video menu or setup menu.

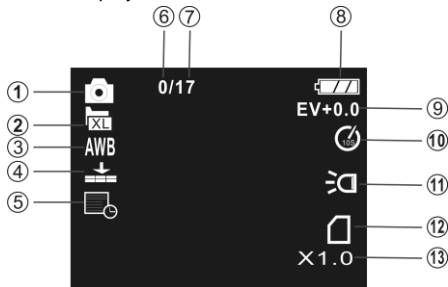
Press UP key and DOWN key to choose menu items and the background of the menu item selected will become green. Press RIGTH key to enter submenu. Press MENU/OK key to confirm; press LEFT key back to previous menu.













After setting, press MENU/OK key to close menu.











Clock Settings: select "Date/Time". Press RIGHT key to enter Date/Time setting submenu. Press UP/DOWN key to make adjustments and press RIGHT key to select adjusted items (Year/Month/Day, Hour/Minute). After adjustments, press MENU/OK key to confirm.

Shooting Mode

◆Information displayed on the screen



	Icons displayed on the screen	Instructions
①		In shooting mode
②		2048×1536 resolution
		1600×1200 resolution
		1280×960 resolution
		640×480 resolution
③	AWB	Auto white balance
		Daylight white balance
		Tungsten white balance
		Fluorescent white balance
		Cloudy white balance
④		Image quality: Super
		Image quality: Fine
		Image quality: Normal

⑤		Date imprint start
⑥	0	Photos taken
⑦	017	Photos able to be taken
⑧		Battery full.
		Battery moderate.
		Battery low.
		Battery empty.
⑨	EV+0.0	Exposure compensation value
⑩		10s delay self-timer shooting
		20s delay self-timer shooting
⑪		LED flash light is on.
⑫		Memory card used
		Card write protected.
⑬	×1.0	Digital zoom ratio

◆Menu options
Image menu:

Image Menu	Submenu
Resolution	2048×1536
	1600×1200
	1280×960
	640×480
Quality	Super
	Fine
	Normal
White Balance	Auto
	Day Light
	Tungsten
	Fluorescent
	Cloudy
Color Effect	Color
	Sepia
	Monochrome
Exposure	+0.0
DateStamp	Enable
	Disable
Selftimer	Disable
	10SEC
	20SEC

Setup menu:
The same as video mode.

◆Menu operation

Enter exposure submenu. Press LEFT key and RIGHT key to enter “Adjust”. After adjustments, press MENU/OK key to confirm.

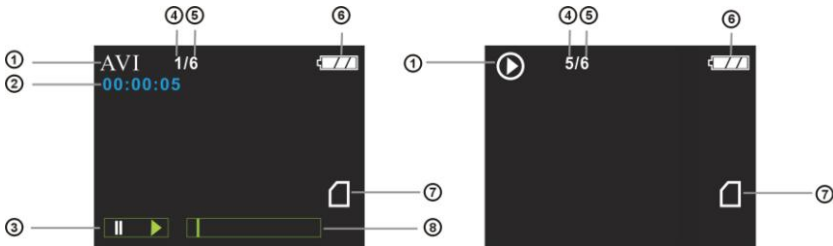
Others are the same as those of video mode.










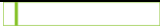
Playback Mode

In record or shooting mode, press UP key to enter playback mode.

In playback mode, press LEFT key or RIGHT key to choose photos. When you choose different files, different information will be displayed on the screen.

◆Information displayed on the screen



	Icons displayed on the screen	Instructions
①	AVI	Video playback
		Photos playback
②	00:00:05	Video play time
③		Under play
		Play/ pause
④	1	Current file location
⑤	6	Total files
⑥		Battery full.
		Battery moderate.
		Battery low.
		Battery empty.
⑦		Memory card used.
		Card write-protected.
⑧		Play process

◆Video play

Press LEFT key or RIGHT key to choose video files, press shutter key to start playing and press MENU/OK key during play to suspend playing. Press MENU/OK key again to continue playing. Press shutter key to stop playing during play.

◆Zoom in photos

Choose photos; press zoom-in key to enlarge them with navigation window displayed on the left bottom of the screen.

◆Menu options

Playback menu:

Playback Menu	Submenu
Delete current	/
Delete all	/
Lock	Lock current
	Lock all
	Unlock current
	Unlock all
Set Logo	Yes
	No
Set DPOF	Enable
	Disable

Setup menu:

The same as record mode.

◆Menu operation

Main operations are the same as those of record mode menu.

When choosing “Delete current” or “Delete all” menu, press RIGHT key directly to confirm.

“Set Logo” and “Set DPOF” is only valid to photos.

Set Logo: using the option can set current photo as logo. To cancel the set, choose one image in playback mode and then press MENU/OK key to open the playback menu, choose “Set Logo” submenu, choose “No”, then press MENU/OK key to confirm. When the camera is switched on a second time, the logo will be restored to be default image.

Set DPOF: This function needs the support of SD card. The information in relation to this setting will be saved onto the SD card for printing use. Choose the photo to be printed, set “Set DPOF” as “Enable”, then insert the SD card saving photos and printing information into the printer conforming to DPOF standard, or print the photo via the photo developing company. The photo to be printed under such setting can be printed one piece.

Note: What is DOPF?

DPOF refers to Digital Print Order Format. Write the photo printing information onto the SD card, then the SD card can be used in a system supporting DPOF.

Tip: 1. When the menu turns gray, it indicates that this menu cannot be used in the current state.

Connect PC




Before connecting with the computer, please install the driver (refer to the instructions in the driver Installation part).

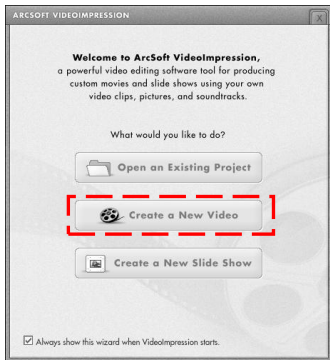
Before connecting the camera with the computer, set “USB Mode” in the setup menu. According to the actual demand, set as “PC Camera” (used as PC Camera) or “Mass Storage” (as removable disc).

Connect the USB cable into the USB port and the other end to the USB port of the camera, and then the camera enters the corresponding work mode. In the process of connecting, press the mode switch to switch between “Mass Storage” and “PC Camera”.

Mass Storage Mode: If the camera sets “USB Mode” as “Memory”, after connecting to the computer, the LCD screen of the camera will show “Mass Storage”, a “removable disc” in “My Computer” window will appear. The photos or videos are saved in the \DCIM\ 100COACH folder in the removable disc. Choose the desired photo/video in the 100COACH folder and copy (drag with mouse) it into the target folder in the HD of the computer.

PC Camera Mode: If the camera sets “USB Mode” as “PC Camera”, after connecting to the computer, the LCD screen of the camera will show “PC Camera”. In such case, with the help of VideoImpression software attached, you can display the images in real time on the computer corresponding to the lens.

Open VideoImpression 2, in “What would you like to do”(Fig. I), choose , then chose  (Fig. II), or in “Media ” window (Fig. III), click  button; then the real-time view like Fig. IV will occur.



▲ Fig. I




▲ Fig. II



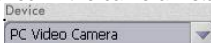
◀ Fig. III



▲ Fig. IV

After use, click  button to exit.

Note:
If images cannot be displayed, check if the camera installs the driver and confirm whether the device chosen in the window is:



About the use of VideoImpression 2, please refer to “**VideoImpression 2 Installation and Use**”.

Software Installation and Use

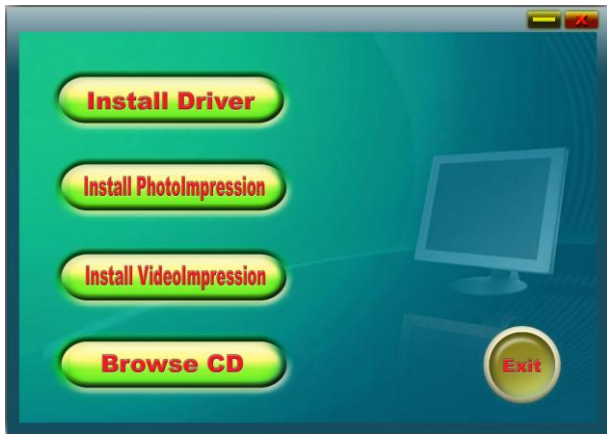
Driver Installation:

You can use and operate the Mass Storage and PC camera function provided by the digital video camera via personal computer. Before use, please install the necessary driver as required according to the following steps.

Note: Before installing the driver to the computer, do not connect the camera with the USB port on the computer so as to prevent wrong driver.

©Introduction interface for software installation

1. Put the installation CD among the accessories into the CD drive of the computer.
2. Then the system will carry out the installation program on the CD and the screen will display the following introduction window:



- If the CD driver does not automatically carry out or close such function, please click **autorun.exe** program under the root directory of the CD.

©Driver Installation

Click **"Install Driver"** button and complete the installation as per the tips. After the installation is over, restart the computer.

Set the camera PC mode to connect it to the computer. When the following window occurs, choose "Yes" to finish the installation.



The driver is applicable for Windows 98 SE, Winows2000, Windows ME and Windows XP operation system.

PhotoImpression 5 Installation and Use:

Install PhotoImpression5:

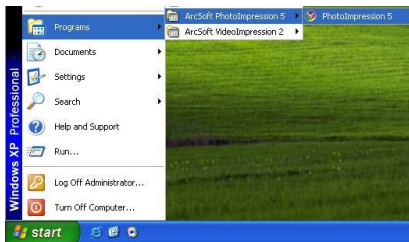
Click “Install PhotoImpression” button, complete the installation as per the tips.

After installation, please restart the computer.

After the installation is over, restart the computer.

Run PhotoImpression5:

Double click  icon on the desktop, or open PhotoImpression 5 via “Start→ Programs”.



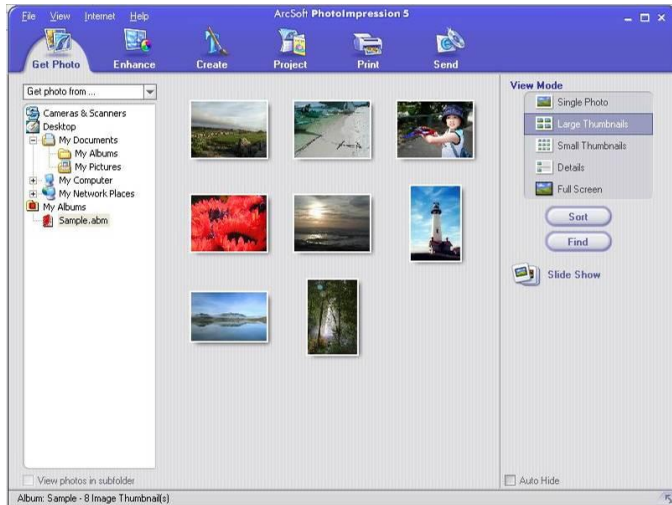
When PhotoImpression5 is opened, the following window will occur. Click the center of the widow with the left key of the mouse to shut the window. After the window is off, you can open PhotoImpression.



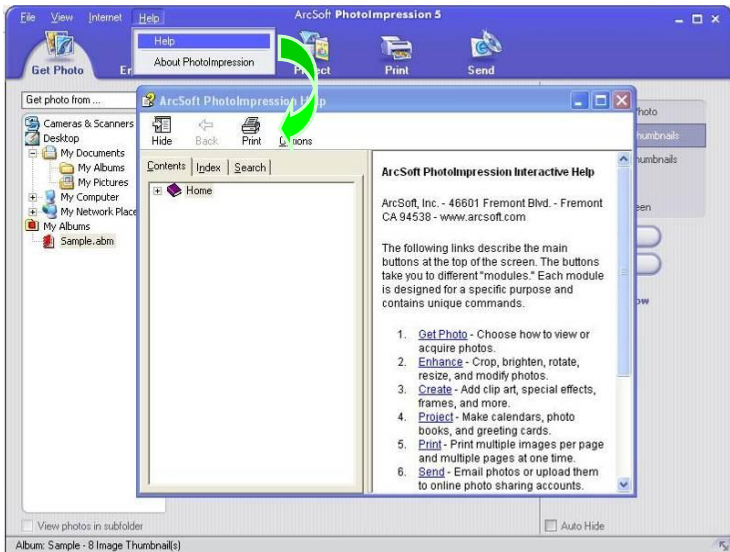
After PhotoImpression is open, “Get Photo” window will occur:



After choosing and opening photos in the “Get Photo”, the chosen photo will be displayed in the central area of the program. And then you can edit the chosen photo.



For the detailed instructions of PhotoImpression, please refer to Help in the program (as the following figure).



Videolmpression 2 Installation and Use:

Install VideoImpression 2:

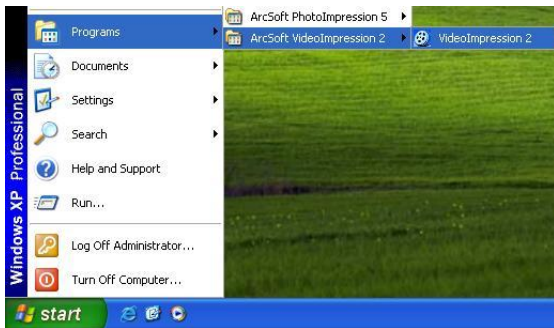
Click “Install VideoImpression” button and complete the installation as per the tips.
After installation, please restart the computer.

Run VideoImpression 2:

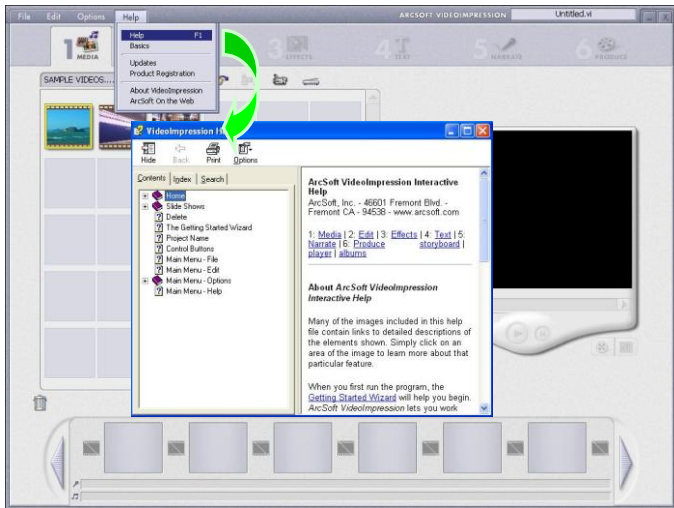


Double click the Video Impression 2 icon on the desktop or follow “Start → Programs” to open

VideoImpression 2.



For the detailed instructions of VideoImpression 2, please refer to Help in the program (as the following figure).



Technical Parameters

Image Sensor	1.3Mega pixels	
Main Functions	Video recording, shooting, photos/video playback, removable disk and camera	
Lens	F3.1 f=6.5mm	
Focus Range	140cm~ unlimited (normal mode) 15cm~25cm (macro mode)	
Digital Zoom	4×	
Shutter	Electronic	
LCD Display Screen	1.5" TFT LCD	
Photo Resolutions	2048×1536; 1600×1200; 1024×768; 640×480	
Video Resolutions	VGA 640×480, 30fps/15fps; QVGA 320×240, 30fps/15fps	
White Balance	Auto, day light, tungsten, fluorescent, cloudy	
Exposure	Auto/manual (-2.0EV~+2.0EV, 0.5EV/steps)	
Self Time	10s delay, 20s delay	
File Format	Video	AVI
	Photo	JPEG
Video Output	PAL / NTSC	
Storage Media	Built-in flash (32MB), SD/MMC card	
USB Interface	Mini USB1.1 interface	
Power Supply	3 pieces of AAA alkaline batteries	

After the battery is installed, the camera cannot be switched on.	The battery power is not enough, please replace it.
	The plastic package of the battery is not completely removed.
	The battery is installed inversely. Please confirm the proper installation.
Pressing the shutter key cannot shoot and record videos.	The memory or SD/MMC memory card is full. Please transfer or delete some files so as to release space.
	The SD card in the camera is write-protected. Please take out the SD card and pull the write-protected switch to release protection.
Photos and videos can not be replayed and files in the computer can not found in the memory.	Because the SD/MMC memory card is inserted into the camera, the memory is forbidden for use. Please switch off to take out the memory card.
Unclear photos	The focus of the camera is not correct. Please adjust it.

	The hands are shivering during shooting. Please hold the camera firmly and stably or use other object to stabilize the camera; during snapping, do not shake the camera.
Dark photos or videos	Rays in the environment are not sufficient. Please take photos in the place with enough rays or use lamps to promote the rays in dark environment.
The camera switches off automatically.	The battery power is not enough, please replace it.
	When automatic switch-off is set as 1min or 2min, the camera will automatically switch off without any operation within 1min or 2min according to setting.
Files in the camera can not be deleted.	Files are write-protected. Please cancel the protection first.
	The SD card in the camera is write-protected. Please take out the SD card and pull the write-protected switch to release protection.