

# Live Streaming Camera GV-LS2 / GV-LS1 **Connection Guide**

This PDF will give you the steps in order to connect the Live Streaming Camera to your network and digital devices.

Other information can be found in the Reference Manual.

Connecting wirelessly to the camera (Wi-Fi direct)  $\Rightarrow$  Go to page 2

Connecting wirelessly via a Wi-Fi LAN router  $\Rightarrow$  Go to page 7

Connecting to the camera from outside the house  $\Rightarrow$  Go to page 16

Distribution on Ustream  $\Rightarrow$  Go to page 24

# Connecting wirelessly to the camera (Wi-Fi direct)

Android and iOS devices (e.g. iPhone, iPad) can be connected to the camera directly without a Wi-Fi router.

\* Before connecting to the camera, install the JVC CAM Control app. (When connected to the camera, your devices will not be able to access the Internet.)

1. Switch the network mode to 'DIRECT'.



2. Connect the AC adapter.



Once you start the camera, the WPS button will blink slowly.

# Connecting with Android devices

1. Tap on 'Settings' on the application menu screen.



2. Tap on 'Wireless & networks'.



3. Tap on 'Wi-Fi settings'.





5. Tap on 'DIRECT-\*\*JVCCAM' (where \*\* indicates alphanumeric characters).



The default name is 'DIRECT-\*\*JVCCAM' (where \*\* indicates alphanumeric characters).

#### 6. Enter your password.



The default password is 'password'.

#### 7. Wait until connection is complete.



Connection is complete when 'Connected' appears on the display.

Now you can launch the app.

#### Note

Screen images, names and/or steps may differ depending on the device.

# Connecting with iOS Devices (iPhone, iPad, etc.)

1. Tap on 'Settings' in the application menu.



2. Tap on 'Wi-Fi'.



3.Turn 'Wi-Fi' to ON.



4. Tap on 'DIRECT-\*\*JVCCAM' (where \*\* indicates alphanumeric characters).



The default name is 'DIRECT-\*\*JVCCAM' (where \*\* indicated alphanumeric characters).

5. Enter the password.



The default password is 'password'.

## 6. Tap 🜔 .



\* Step6 and Step7 are required only for iOS6.

7. Tap on 'DNS' and enter '192.168.1.1'.



8. Return to the Home screen by pressing the Home button.



Connection is complete when the complete when the complete when the display.

Now you can launch the app.

#### Note

Screen images, names and/or steps may differ depending on the iOS version.

# Connecting Wirelessly via a Wi-Fi LAN Router

Please check the packaging or user manual to confirm that your Wi-Fi router supports Wi-Fi Protected Setup (WPS).

If WPS is supported  $\Rightarrow$  Go to page 8

If WPS is not supported  $\Rightarrow$  Go to page 9

If connection fails  $\Rightarrow$  Go to Page 15

# If WPS is Supported

1. Switch the network mode to 'WLAN'.



2. Connect the AC adapter.



#### 3. Activate WPS on the wireless LAN router.

Refer to your wireless LAN router's user manual for how to activate WPS.

### 4. Hold down the WPS button.

Once the WPS button stops blinking, connection is complete.

#### Note

WPS button does not work during start up.

(The Record button will blink red during start up.

Wait for the Record button to stop blinking, then hold down the WPS button.)

# If WPS is Not Supported

1. Use the supplied LAN cable to connect your camera to the computer: (1) Connect the LAN cable to the camera.



- A LAN cable cannot be used when the network mode is switched to 'DIRECT' or 'WLAN'.
- Settings will not be changed unless you turn the power OFF before switching the network mode.

#### 2. Change the network settings on your computer:

#### **Under Windows 7:**

\* For changing settings on OS versions other than Windows 7, please refer to your computer's user manual.

(1) Click on the Windows Start Menu. 🚺



(2) Click on [Control Panel] ⇒ Click on [View Network Status and Tasks]



(3) Click on [Local Area Connection]

\* Button names may differ depending on your computer



#### (4) Click on [Properties].

Connection		
IPv4 Connectivi	:y:	No Internet access
IPv6 Connectivi	:y:	No network access
Media State:		Enabled
Duration:		00:25:04
Speed:		100.0 Mbps
Details		
Activity		
	Sent —	Received
Packets:	529	0
Properties	Disable	Diagnose

(5) Double click [Internet Protocol Version 4]

Networking Sharing
Connect using:
Intel(R) 82579 V Gigabit Network Connection
Configure
This connection uses the following items:
Virtual PC Network Filter Driver
🗹 🚚 QoS Packet Scheduler —
✓ Prile and Printer Sharing for Microsoft Networks
Internet Protocol Version 4 (TOP/IPv4)
Install Uninstall Properties
Description
Transmission Control Protocol/Internet Protocol. The default wide area network protocol that provides communication across diverse interconnected networks.

(6) Change the IP address and subnet mask as shown below: IP address: 192.168.1.101, Subnet mask: 255.255.255.0

r the appropriate IP settings.	
Obtain an IP address automa	atically
Use the following IP address	
IP address:	192 . 168 . 1 . 101
Sybnet mask:	255 . 255 . 255 . 0
Default gateway:	
Obtain DNS server address a	eutomatically
Use the following DNS server	
Preferred DNS server:	
Alternate DNS server:	
Encinate prio server.	
Validate settings upon exit	

#### Important

Once you finish setting up the device, write down the current computer settings before making any changes so you can revert to your original settings if necessary. 11

#### 3. Register a Wi-Fi router from your camera's Settings screen:

(1) Open Internet Explorer and enter the following URL:

http://192.168.1.100:8000/



#### (2) Enter the administrator username and password.

The default username is 'root', and the default password is 'password'.

(3) Select [Wireless Network] in [Network].

Live Streaming Camera	SETTING			
NETWORK	WIRELESS NETWORK			_
WIRED NETWORK	DIRECT CONNECTION	SAVE		<u>^</u>
WIRELESS NETWORK	SSID DIREC	T-25 JVCCAM		
MONITORING SETTINGS	PASSWORD			
STREAM SETTINGS	PASSWORD (CONFIRM)	•••••		=
CAMERA/PAN TILTER	ENFORCED GROUP OWNER	OFF O ON		
H MANAGE	MAC ADDRESS			
	5C:33:8E:B2:F7:CF			
	ACCESS POINT CONNECTION			
	REGISTERED ACCES	S POINT		
				÷
SETTINGS COMPLETED			Ø 2012 JVC KENWO	OOD Corporation

(4) Click on [Search].

Live Streaming Camera	SETTINGS	
E NETWORK	WIRELESS NETWORK	
WIRED NETWORK	REGISTERED ACCESS POINT	^
WIRELESS NETWORK		
MONITORING SETTINGS		
STREAM SETTINGS		
H CAMERA/PAN TILTER		
H MANAGE		
	SELECT DELETE UPDATE	
	ADD	
	SEARCH MANUAL WPS PIN	
	MAC ADDRESS	
	5C:338E:82:F7:CE	
C		

#### (5) Select the Access Point you will connect to.

	SETTIN	GS	
Live Streaming Camera	SETTIN ADD (SEARCH) AUTHENTICATE METHICO PASSWORD NETWORK SETTINOS © AUTO IP ADDRESS SUBJETTINSK	GS SEARCH AG MANUAL D.0.0 D.0.0	JVC
	DEFAULT GATEWAY PRIMARY DNS	0.0.0.0	• DOD Corporation

#### (6) Enter your password.

	SETTIN	GS		
NETWORK	ADD (SEARCH)			
WIRED NETWORK		*		<u>^</u>
	No. of Concession, Name		-	
MONITORING SETTINGS	Chiefs.	SEARCH AGAIN		
STREAM SETTINGS	10000			
CAMERA/PAN TILTER	AUTHENTICATE METHOD	WPA2		
H MANAGE	PASSWORD			
	NETWORK SETTINGS			
	O AUTO	MANUAL		
	IP ADDRESS	0.0.0.0		
	SUBNET MASK	0.0.0.0		11
	DEFAULT GATEWAY	0.0.0.0		
	PRIMARY DNS	0.0.0		*

Please refer to your Wi-Fi router's user manual for information on Access Point name and password. (Some routers may have stickers on them with the default settings.)

#### (7) Click on [Save].

Live Streaming Camera	SETTIN	IGS		
HIGHNAN HIGHNAN	ADD (SEARCH) AUD (SEARCH) AUTHENTICATE METHOD PASSWORD NETWORK SETTINGS OF AUTO IF ADDRESS SUBJECT MASK DEFAULT GATEWARY PREMARY DIAS SECONDARY DIAS	IGS WPA2 	100 001	
(				

#### 4. Reboot the camera:

- (1) Turn off the camera and remove the LAN cable.
- (2) Switch the network mode to 'WLAN'.



#### (3) Turn the camera on.

When the WPS button light stops blinking and remains lit, connection is complete.

# If Connection Fails

If connection fails, check the following:

● If you are unable to locate the router
 ⇒ Check your router name (SSID).
 Refer to the user manual or, in some cases, default settings may be printed on a sticker on the router itself.

⇒ Make sure the router is not set to Stealth Mode. (This Mode hides the SSID)

If you are unable to connect to WPS:

⇒ Follow the steps described in your router's user manual to connect with WPS. (Some devices have specific steps that need to be followed to activate WPS.)

If you are unable to connect even after entering the password:

- $\Rightarrow$  Check that the password for the router is correct.
- ⇒ Make sure that the Network Mode is switched to WLAN. (Always turn the camera power OFF before switching the Mode. The Mode will not be switched if you move it while the camera is still ON.)

# Connecting to the Camera from Outside Your Home

Using a smartphone or other device, you can control your camera and stream images even outside.

(Your camera must be connected to a Wi-Fi router that is connected to the Internet to use this feature.

For how to connect the camera to a wireless LAN router, see Connecting Wirelessly to Wi-Fi LAN Router on page 7.)

## **Required Settings**

# Obtain a DDNS account.

Obtaining a DDNS account gives you a URL to access the camera  $\Rightarrow$  See page 17.

- **2** Set up the DDNS account on your camera  $\Rightarrow$  Go to page 20.
- Change the camera's IP address setting to 'AUTO'.
   (This applies only when connecting with LAN cable)
   ⇒ Go to page 22.
- **4.** Register the URL in JVC CAM Control  $\Rightarrow$  Go to page 23.

# **Obtaining a DDNS Account**

(1) Open Internet Explorer and enter the following URL:

https://dd3.jvckenwood.com/user/



## (2) Click on [Member Registration].

JVC	Contact/Er	iglish Only) (	Blobal
Welcome to JVC DDNS Service!!		_	
	Display Language	English	•
After registering with the JVC DDNS tervice, you can obtain a URL address that allows you to ac at home or other locations through the Internet. To view the registered information or change your password, please login.	tess your camera installed		
Registered users of this service Login			
Member Registration			

© 2012 JVC KENWOOD Corporation

## (3) Read the User Agreement and click [Yes].





(4) Enter your email address (username), product serial number, and password, and click [Confirm].

Member Inf	ormation Entry			
	Enter the necessary ir	nformation.		
	Your email address will be your user name.			
	Enter the product serial number in alp	ohanumeric characters.		
		-digit number starting with 0 or 1. It is printed on the warranty and the back of the		
	product, etc.			
	The product serial number will be use	d when you reset the password.		
	Mail Address			
	Product Serial No.	12345678 Enter the product serial number in alphanumeric characters.		
	Password	Enter a password between eight to 31 single-byte alphanumeric characters (case- sensitive).		
	Password(Confirmation)	•••••		
		Cancel		

For the product serial number, check the sticker attached to where the camera's battery is located.

(5) Click on [OK].



# (6) After reading the email sent to your registered email address, click on the URL to confirm registration.

Notification on New Member Registration

Thank you for registering with J/C DDNS Service. Member registration is not complete yet. Please follow the steps below to complete the registration procedure.

[Step 1]

https://dd3.jvckenwood.com/user/users/confirmation?confirmation\_token=

[Step 2]

#### Note

You must access your account within 3 days of registration. Your account will be invalidated after 3 days without access.

#### (7) Make a copy of the URL (WAN) for accessing your account.

	Logout	Unsubscribe membership
Account Information		
<ul> <li>Member information is registered.</li> <li>Please act the registered user name and password.</li> <li>After setting is complete, access the Dynamic D</li> <li>For more details on setting please refer to the is</li> <li>for provisional registration is valid for three de</li> <li>please register again from the start.</li> </ul>	NS Server from your camera. Instruction manual of your camera.	npleted within this period,
Mail Address (User Name) Access URL (WAN) Latest IP Address	jvckenwood.com	
Latest Access Status		

# 2 Setting Up You Camera's DDNS Account

## (1) Using Internet Explorer, go into your camera's Settings.

URL to access Settings: http://(camera's IP address):8000 Ex. Enter http://192.168.1.100:8000 into the address bar.

€ • http://192.168.1.100:8000/	<ul> <li>→ ×</li> <li>P Bing</li> </ul>	• م
ファイル(F) 構実(E) 衣示(V) お丸に入り(	AT ツール(T) ヘルプ(H)	
👷 お気に入り 🏾 🍘 空白のページ	🍈 ▼ 🗟 ▼ 🖃 🖶 ▼ ページ(P)▼ セーフティ(S)▼ ツール(0	D) ▼
		*

### Note

The camera's IP address varies depending on your network environment. Use the following method if you do not know your camera's IP address:

- (i) Open JVC CAM Control on your computer.
- (ii) Check the camera's IP address displayed on the right.

ち カメラ登録	
1	
	· · · · · · · · · · · · · · · · · · ·
2	
3	
4	カメラ追加

- JVC CAM Control must be installed on your computer in advance. The computer and camera should be connected to the same Wi-Fi router.
- If you cannot find your camera's IP address (if it is not displayed) even when using JVC CAM Control, refer to the Settings screen on your router.

## (2) Click on [Monitoring Settings].

Live Streaming Camera	SETTI	VGS	
■ ネットワーク	有線ネットワーク		
有線ネットワーク	ネットワーク設定		保存
無線ネットワーク	● 自動	◎ 手動	
モニタリング設定	IP7FUA	192.168.1.100	
ストリーム設定	サブネットマスク	255.255.255.0	
	デフォルトゲートウェイ	192.168.1.1	
표 함권	プライマリDNS	192.168.1.1	
	セカンダリDNS	0.0.0.0	
	MAC7FLZ		
	00-00-86-08-00		

(3) Turn DDNS to ON. After entering your username and password, click [Save].

Live Streaming Camera	S	ETTINGS		ログアウト	
■ ネットワーク 有線ネットワーク 無線ネットワーク 年二タリング設定	モニタリング設定 ユーザー一覧 (JVC CAM driv camuser	er)			-
ストリーム設定 語 カメラ 語 管理	追加 ポート書号 UPnP	波通 PNBA 80 ● tJ	<u>• .</u>		E
	DDNS ユーザー名 パスワード	● 切  保存	• .		•

# (4) After setting is complete, reboot the camera.

### Note

If your DDNS is not accessed for one year after the completion of this registration, your account will be invalidated.

# Changing the Camera's IP Address Setting to Automatic (only necessary when connected to a wired LAN)

This step is not necessary when the camera is wirelessly connected to a Wi-Fi LAN router because the IP address is set to Automatic by default.

(1) Open Settings in your camera via Internet Explorer.

URL for Settings: http://(camera's IP address):8000. Ex. Enter http://192.168.1.100:8000 into the address bar.



(2) Change the NETWORK SETTINGS on WIRED NETWORK to [AUTO], then click [SAVE].

	SETTING	3		
NETWORK	WIRED NETWORK		_	
	NETWORK SETTINGS		SAVE	
WIRELESS NETWORK	AUTO	MANUAL		
MONITORING SETTINGS	IP ADDRESS	192.168.1.100		
STREAM SETTINGS	SUBNET MASK	255.255.255.0		
CAMERA/PAN TILTER	DEFAULT GATEWAY	192.168.1.1		
CAMERA SETTINGS	PRIMARY DNS	192.168.1.1		
PAN TILTER SETTINGS	SECONDARY DNS	0.0.0.0		
MANAGE	MAC ADDRESS			
COMMON SETTINGS	00.80.88 FF.FF.FF			
MEDIA MANAGEMENT				
TURN OFF CAMERA				

# 4 Registering URL in JVC CAM Control

The following is an example using JVC CAM Control for Android, but the same applies for iOS (iPad) and Windows.

- (1) Open JVC CAM Control.
- (2) Tap on Camera Registration.



## (3) Tap on Add Camera.

ATION			
		JVCCAM http://192.168.1.100:80	LAN
CONNE		ADD CAMERA	
VIDE0			
AUDIO	+		
CAMERA RELEASE			

(4) Enter a camera name (any name) and URL, and tap [OK].

ADD CA	AMERA TO LIS	T(WAN)	DD CAMERA	
JVCCAN				
URL http://				
	ок	CANCEL		
STREAM	A SETTING		•	

# Distribution on Ustream

Once JVC CAM Control is installed onto a computer running Windows, JVC CAM Driver is installed at the same time.

Images from the camera can be streamed via Ustream using JVC CAM Driver and Ustream Producer (http://ustream.tv/producer/) together.

# Preparation

- Install JVC CAM Driver (for Windows) and Ustream Producer onto your computer.
- Connect your camera to the Wi-Fi LAN router. Make sure your camera and computer are connected to the same router.
- For how to connect your camera to the router, see 'Connecting Wirelessly to Wi-Fi LAN Router' on page 7.
- To connect 2 or more cameras via ethernet, you should change the IP addresses of each cameras to the value that does not overlap. Or you may use 'AUTO' setting(DHCP). In that case, cameras obtain IP addresses from your router automatically. See 'Change the camera's IP address setting to 'AUTO'' on page 22.

# See 'Change the camera's IP address setting to 'AUTO" on page

# **Required Settings**



# **Changing the Streaming setting**

 $\Rightarrow$  Go to page 25.



# Registering your camera in JVC CAM driver

 $\Rightarrow$  Go to page 27.



# Changing the Streaming setting

- (1) Start [JVC CAM Control] on your computer.
- (2) Click on the camera that is displayed on the right.

D CAMERA REGISTR	ΑΤΙΟΝ	I			JVCCAM http://192.168.1.100:80	LAN
		CONNEC	TION		ADD CAMERA	
		VIDEO				
	40			•		
	·÷·	CONTROL				
		STREAM SETTING				
		CAMERA RELEASE				

(3) Enter your username and password, then click [OK].

LOG IN CAMERA					
USERNAME (ADMINISTRATOR)					
root					
PASSWORD					
•••••					
SAVE THESE INFORMATION					
OK CANCEL					

At the time of purchase, the default username is 'root' and password is 'password'.

(4) Click on [STREAM SETTING].

CAMERA REGIST	ATION			
	D JVCCAM http://192.168.1.100:80		VCCAM	LAN
	CONNEC	TION	ADD CAMERA	
	D VIDEO			
	AUDIO			
	↔ CONTROL			
	STREAM SETTING			
	CAMERA RELEASE			

(5) Select [MPEG-2 TS(SD) + MotionJPEG], then click [OK].



#### Note

• When streaming HD video, select MPEG-2 TS(HD) + Motion JPEG.

(You will need to have Ustream Producer Pro or Ustream Producer Studio, which are paid services).

- Photos cannot be taken while the Stream setting MPEG-2 TS  $\sim$  .
- (6) Close JVC CAM Control.

# **2** Registering Your Camera to JVC CAM Driver

- (1) Start [JVC CAM driver setup] on your computer.
- (2) Click the number on the left,

and then click on the camera displayed on the right.

JVC CAM driver setu	P	
1	IMAGE QUALITY SETTING	JVCCAM (http://192.168.1.100/)
2	CAMERA RELEASE	•
3		
4		ADD CAMERA

- If you select the number 1 on the left. your camera will be registered as 'JVC CAM Video 1'.
- To register 2 or more cameras, select a number from 2 to 4, and then click the camera.
- (3) Enter your username and password (for JVC CAM Driver), then click [OK].

log in camera	
USERNAME (JVC CAM driver)	camuser
PASSWORD	•••••
✓ :	SAVE THESE INFORMATION
	OK CANCEL

 At the time of purchase, the default username is 'camuser' and password is 'password'.

(Please note that the username differs from JVC CAM Control.)

(4) Select [MPEG-2 TS (SD)], then click [OK].



- When streaming HD video, select MPEG-2 TS(HD). (You will need to have Ustream Producer Pro or Ustream Producer Studio, which are paid services).
- (5) Close JVC CAM driver setup.

JVC CAM driver set	up	
JVCCAM	IVCCAM IMAGE QUALITY SETTING	JVCCAM LAN
2	CAMERA RELEASE	
3		
4		ADD CAMERA

Your camera is now registered as JVC CAM Video 1.

# **3** Adding Your Camera to Ustream Producer

- (1) Start [Ustream Producer] on your computer.
- (2) Enter your username and password, then click [Login].

USTREAM PRODUCER					
Sign In					
Username					
Password					
Login Later Forgot Username   Forgot Forgot Username   Forgot Forgot Username   Forgot Forgot Forgot Forgot Forgot Username   Remember Password	'assword				
Don't have an account? Sign up!					

- If you do not have a Ustream account, register an account from the [Sign up!] button.
- If you will not be streaming immediately and would like to only set up the camera, then proceed by clicking on [Later].



	at are you broadcasting	?		Update
Bandwidth			🕒 Social Stream 🖉	🗭 Chat 🖾
		Datarate:		
				• ₽ ¢
	Cut	Smooth Bowstri	ing 🔘 🔍	30
••	_			□, ◀, ⊡,
ブラングジョット Camera	Microphone			*

## (4) Select [Add JVC CAM Video 1 Shot].



# (5) Click again and select [Add JVC CAM Audio 1 Shot].



• You can skip this step if you are not streaming the camera's audio.

(6) Select the camera that has been added.



# (7) Click and select [JVC CAM Audio 1].

	at are you broadcasting?	🛛 🕒 🛛 🚰 Update	
Bandwidth [[[[]]		🖿 Social Stream 🖾 🗭 Chat 🖻	
<u>1</u>			
	FPS: CPU: Datarate:	Time:	
		*	*
•, 1, 9,	Cut Smooth	Bowstring Go	
プランウジョット Camera	Mcrophone	JVC CAL	M Audio 1 M Audio 2
77597397 Galiela		Add au	iio file from disk
- choose a channel -			
- choose a channel -	Broadcast Settings	Start Broadcasting Start Recording	
choose an event -		Record To: 🗹 Ustream 🗌 My Computer	

• You can skip this step if you are not streaming the camera's audio.

(8) Click on [Start Streaming] to begin streaming.



#### Note

• These steps are applicable as of February 2013. Operation methods may differ depending on the version of Ustream Producer.