

Model: FI8910W

Quick Installation Guide

(For Windows OS)

(For MAC OS please go to page 17) Indoor MJPEG Pan/Tilt Wireless IP Camera



FOSCAM

Black

White

Package Contents

 IP Camera FI8910W with IR-Cut 	x 1
 DC Power Adapter (5V-2.0A) 	x 1
Network Cable	x 1
 Wi-Fi Antenna 	x 1
 Mounting Bracket 	x 1
 Quick Installation Guide 	x 1
 CD-ROM with Setup Software 	x 1

Quick Installation Guide For Windows OS

Package Contents	
 IP Camera FI8910W 	x 1
 DC Power Adapter (5V-2.0A) 	x 1
Network Cable	x 1
 Wi-Fi Antenna 	x 1
 Mounting Bracket 	x 1
Quick Installation Guide	x 1
 CD-ROM with Setup Software 	x 1

Quick Installation Diagram



Start Installation

1. Hardware Installation

- 1) **Open the package**. Take the camera out of the box carefully.
- 2) **Mount the antenna.** Then take the Wi-Fi antenna, mount it on the SMA connector on the back of the camera, screw the antenna into the port, and make the antenna stand vertically.



Mount the antenna



Plug in the network cable

3) Get the camera connected to the router, and insert the power plug.

Use the network cable to connect the camera to the router or the switch in the LAN network at your home or your office. Plug in the power. The green network light at the rear of the camera will blink and the camera will automatically pan/tilt. The red power light will also turn on.

2. Software Installation

Insert the CD into the CD drive of your computer and find the folder "For Windows OS". Copy the IP camera tool to your computer and start the program or double click on the setup file to install.



IP Camera Tool icon

3. Login to the Camera

Once the IP camera tool software is installed, double click the icon on the desktop and the following screen should appear.



The IP camera tool should find your camera's IP address automatically (your IP address may be different) after you plug in the network cable. If not, please make sure that DHCP is enabled on your router and that MAC address filtering, firewalls and anti-virus are disabled temporarily until the camera is set up.

Double click the IP address of the camera; your default browser will open to the camera login page.

	Windows Securit	y and an	-	×	
	The server 10.4 and password	44.82.147 at ipcamera_000C	SDDDFE50 require	s a username	
		server is requesting that yo cure manner (basic authen			
		User name Password Remember my crede	entials		
			ОК	Cancel]
Language	English 💌				DSCAM
		ActiveX M	lode	0	
		Server Pusi	n Mode)	
		Mobile Pr	none	0	
	e note that there a	are three login methods: f <, Google Chrome, please the third mode.			

This What

If it is your first time logging into the camera using **Internet Explorer**, click the "ActiveX Mode" button. This mode is used for Internet Explorer. It will then prompt you to download the ActiveX plugin.

OSD disabled Add OSD on record disable Resolution 320*240 Mode 50 HZ 50 HZ 7 Fps 20 fps Brightness++ ++ Preset 2++ Default Fip Minor +++ +++ +++ ++++ ++++++++++++++++++++++++++++++++++		Indoor Pan/Tilt IP Camera
Device Management	OSD disabled → Add OSD on record disable → Resolution 320°240 → Mode 50 HZ → Fps 20 fps → Brightness + Contrast + Preset Set 1 → Go DefaultAll Flip Mirror	

In the above screenshot, we see a grey screen for camera video and a red "X" in the top left corner. This indicates that our ActiveX controls are not configured properly.

Usually in Internet Explorer versions 8 or later, you will see a pop up box at the bottom of the screen, which asks if you would like to allow the ActiveX control module to run for the camera. Click "Allow." Once you login again, you should be able to see live camera video.



If you are logging into the camera using a server-push browser like **Google Chrome** or **Mozilla Firefox**, you would click on the "Server Push Mode" button, which is used for these browsers.

	Authentication Requi	ired	l	_ 22]	
		.108:80 requires a username /er says: ipcamera_000DC5D			
	User Name: Password:	admin			
		Log In	Cance		
Languag	e English 💌				SCAM oscam.us
		ActiveX Mode			
		Server Push Mode			
		Mobile Phone			
	se note that there are thre	e login methods: for IE browser, le Chrome, please choose Serve d mode.			

In **Chrome** or **Firefox** you will need to push the second login button on the login page. From there, you will be prompted to enter the username and password for the camera. Type in admin for the username, and leave the password field blank. Then push enter or click "Log In."

Once logged in, click the "Live Video" button on the left side of the page and it will take you to the live video feed for the camera.



Congratulations! You have succeeded in accessing the camera by a wired connection. Be sure to leave all other menu options alone until finishing the rest of the installation.



USE THIS QR CODE WITH YOUR PHONE TO SEE OUR VIDEO SETUP GUIDES FOR PC ON BASIC SETUP, WIRELESS SETUP, PORT FORWARDING, AND MORE!

4. Wireless Connection Setup

4.1 Infrastructure Mode

<u>Step 1:</u> Choose "For Administrator" or "Device Management" on the live video page, and then click on the "Wireless LAN Settings" option on the left side of the screen. You can click "Scan" here to scan for wireless networks, which should display your own network. Make sure you are not hiding your SSID, or it will not be detected.

-Wireless LAN Settings	
thickee Ernt ootange	
	DOD-TEC[20aa4bea61ed] infra
	Foscam1-DSL021[20aa4bea4f27] infra
Wireless Network List	Foscam's Wi-Fi Network[20c9d0a23ff2] infra ≡
	Foscam2-DSL015[20aa4be52177] infra
	Scan
Using Wireless LAN	
SSID	Foscam1-DSL021
Network Type	Infra 💌
Encryption	WPA2 Personal (AES)
Share Key	
	Submit Refresh

<u>Step 2:</u> Click the SSID (name of your router) in the list, the corresponding information related to your network, such as the name and the encryption, will be filled into the relevant fields automatically.

NOTE: Sometimes the information filled in may differ from your true network settings. If you are unable to connect wirelessly make sure the encryption within your router is correct and the encryption selected on the page for your wireless network is correct. Try using different encryptions if you aren't able to connect with a certain type of encryption.

You will only need to fill in the password of your network. This is listed as "Share Key" on the wireless settings page. If your password to connect to the internet for your router is 1234567890, you would put 1234567890 in the "Share Key" field. On the same note, if your password is something like foscam12345, you would put in foscam12345 in the field. Again, make sure that the SSID, Encryption and the password you filled in are exactly the same for your router.

-Wireless LAN Settings	
Wireless Network List	DOD-TEC[20aa4bea61ed] infra Foscam1-DSL021[20aa4bea4f27] infra Foscam's Wi-Fi Network[20c9d0a23ff2] infra Foscam2-DSL015[20aa4be52177] infra Scan
Using Wireless LAN	
SSID	Foscam1-DSL021 — Case Sensitive!
Network Type	Infra 💌 🥒 Double check within
Encryption	WPA2 Personal (AES) vour router
Share Key	The password you use
	Submit Refresh to connect to your network

Wireless Settings

<u>Step 3:</u> Click on the **Submit** button after all settings have been entered. The camera will restart after 30 seconds. Once the countdown ends, take the network cable out of the camera. Never shut down the power of the camera until the IP camera is able to connect to the wireless network.

The LAN IP address will disappear on the window of IP Camera Tool when the camera is configuring a wireless connection. Wait about 1 minute, the camera should obtain a wireless connection, and the LAN IP of the camera will show again on the window of the IP Camera Tool. The IP address may have changed after the camera receives a wireless connection; we recommend setting a static local IP address if this IP address changes by right clicking the camera in IP Camera Tools, setting a static IP, and pushing OK (see Page 11). Congratulations! You have set up the wireless connection of the camera successfully.

If you fail to make a wireless connection, please refer to your seller or contact us directly for assistance.



USE THIS QR CODE WITH YOUR PHONE TO SEE OUR VIDEO SETUP GUIDES FOR PC ON BASIC SETUP, WIRELESS SETUP, PORT FORWARDING, AND MORE!

4.2 WPS (Wi-Fi Protected Set-up)

WPS allows you to set up wireless connectivity automatically if you have a WPS-compatible router. The WPS button on the Foscam camera is shared with the reset button. Use the small end of a paperclip or a toothpick to press and hold the RESET button for **four seconds and let go.**



Next, press the WPS button on your router **within 60 seconds**. The WPS button is usually on the back or on the side of your router. On some routers, you may need to log in to the web interface and click on an on-screen button to activate the WPS feature. If you are not sure where the WPS button is on your router, please refer to your router's User Manual.

The camera will automatically create a secure wireless connection to your router. If you have plugged in the network cable, you can disconnect it at this time. While connecting, the green network light will blink quickly and the wireless settings will take effect. The IP Camera Tool will search for the camera's LAN IP address. Make sure that the PC and the camera share the same subnet.

NOTE: When setting up the WPS Settings, you must press the Reset button only for **four seconds**, or else the camera may reset itself back to factory default settings if you press and hold the reset button for 10 seconds or more.

For WPS, the security mode of the router **cannot** be WEP, or else the WPS settings may fail.

5. Remote Access Setup

We have been able to access the camera within the LAN network, and have set up a wireless connection, but how do we access the camera via WAN or from outside networks through the internet to view from anywhere in the world or on our smart phones?

We have to set up Remote Access via Port Forwarding before we can access the camera outside of our own local area network.

What is the HTTP Port?

The HTTP Port is used to access the camera remotely. All cameras have the default HTTP port of 80. For example, if the LAN IP address of the camera is <u>http://192.168.8.102</u>, this means that the camera's HTTP port is 80. Since port 80 is set by default, if you input the IP address at <u>http://192.168.8.102:80</u>, with a colon and 80 at the end, it will default back to <u>http://192.168.8.102</u>. This is because it is understood that any time you are entering an IP address without a colon and port number at the end, it is defaulting to port 80 no matter what, so the colon and port 80 are taken out of the end of the link because of this.

It is recommended to change port 80 to a different port, usually in the 4 digit range. The reason for this is because some other devices, such as your router, also share port 80. If this is the case you may experience slow speeds on the camera, or you may not even be able to connect at all. It is best to assign a specific port to your camera so that only your camera is using that specified port number. We usually suggest changing your port to 8080, 8090, or any type of 4 digit number, just as long as it is not at port 80. You can set the port anywhere between 1000 and 20000.

How do you assign a new HTTP port and a Static Local IP Address?

Open the IP Camera Tool, and select the camera you would like to change the port for. Right click on the IP address, and click on "Network Configuration", this brings up the network configuration box as shown:

🔊 IP Camera Tool	
anonymous	Http://192.168.8.10 Basic Properties Network Configuration Upgrade Firmware Refresh Camera List Flush Arp By
	About IP Ca you'd like to change the port for, and right click

Click on "Network Configuration"

찯 IP Camera Tool			
IPCAL	IPCAE Network Co	onfiguration 🔀	Н
	🔲 Obtain IP from 1	DHCP server	
	IP Address	192 .168 . 8 .102	
	Subnet Mask	255 .255 .255 . 0	
	Gateway	192 .168 . 8 . 1	Modify the HTTP Port to
	DNS Server	192.168.8.1	a four digit number
	Http Port	2000	other than 80
	User	admin	
	Password	****	Enter the Username
	OK	Cancel	and Password, and then click OK

Changing the port in IP Camera Tool

Enter the username and password of the Administrator (default username is admin with a blank password), and click "OK" to apply changes.

Wait around 10 seconds or wait for the camera to reboot; you'll see that the camera's LAN IP address has changed. In our example it was changed to 2000, so we see http://192.168.8.102:2000 in IP Camera Tool. Also, the LAN IP address is now fixed at a static IP address of http://192.168.8.102:2000. This IP address will not change even if the camera is powered off and back on, the camera will remain on this LAN IP address. This is very important that a static LAN IP address is set, or you may have problems later with remote access and seeing the camera remotely if the camera loses power and reconnects on a different LAN IP address. Make sure you set a static LAN IP address!



Static IP address and port 2000 set in IP Camera Tool

Setting up Remote Access

First, check to see if your ISP (Internet Service Provider) provides a Static WAN IP address service or a Dynamic WAN IP address service. This guide has been divided into two different sections of setting up remote access, one for Static IP addresses and one for Dynamic IP addresses.

If your ISP provides a Static WAN IP Address, continue reading below.

If your ISP provides Dynamic WAN IP Address please go to Chapter 5.2 directly (Page 14).

5.1 Static IP Addresses

Users who have static IP addresses do not need to set DDNS service settings for remote access. When you have finished connecting the camera using the LAN IP address and port forwarding, you can access the camera directly from the Internet using the WAN IP address and port number.

How to Obtain the WAN IP address from a public website

To obtain your WAN IP address, you can go to Google at <u>www.google.com</u> and search "What is my IP address. It will offer you your public IP address, which is your WAN (External) IP address. You can also use <u>http://www.whatismyip.com</u> if needed.

what is my ip address						
Web	Images	Maps	Shopping	Applications	More 👻	Search tools
About 125,000,000 results (0.31 seconds)						
Your public IP address is 12.69.124.226 Learn more						
This is your public WAN IP address (external IP address).						

5.2 Dynamic IP Addresses

DDNS is a service that allows your IP Camera, especially when assigned with a dynamic IP address, to have a fixed host and domain name. This means that even though your WAN IP address is constantly changing, you will have a fixed hostname you can use to access your cameras at all times. You can access the camera directly from the Internet using the hostname and port number.

Foscam offers many different DDNS providers, the most popular being No-IP and DynDNS. You can sign up for the following DDNS providers at the below websites:

http://www.no-ip.com/ http://dyn.com/dns/dyndns-pro-free-trial/

What is Port Forwarding?

If you have never done port forwarding before, you can open and view the following link to understand the basic concept. Port forwarding allows for outside connections to access a specific device on your network from anywhere in the world. Every router automatically blocks any incoming connections for safety purposes. Using port forwarding, you are telling your router to allow a connection through a certain port (you can think of it as a gateway) into your router. You set this port to a specific device, in our case an IP Camera, so it can be accessed from anywhere in the world.

Click this link to learn more about port forwarding: <u>http://portforward.com/help/portforwarding.htm</u>

How do we configure Port Forwarding?

For this section, we will be using an example:

Let's say the camera's LAN IP address is http://192.168.8.100:2000

Login to the router, and go to your router's port forwarding or port triggering menu. Sometimes this is also under the name of Virtual Server or NAT.

Using the Linksys brand router as an example, we would log into the router, and go to the Applications & Gaming menu. We would then click on the "Single Port Forwarding" sub-menu.

Create a new column using the LAN IP address & HTTP Port of the camera within the router as shown below, and then push **OK** or **Submit** to save your settings:

				Wireless-I	N Home Router	WRT120N
Applications & Gaming	Setup Wireless Security	Acces	ss Restrictions	Applications Gaming	Administration	status
(Single Port Forwarding Port Range Fo	rwarding	Port Range Triggeri	ing	DMZ	QoS
Single Port Forwarding						
Application Name	External Port Internal Port	Protocol	To IP Address	Enabled	11-1-	
None 💌			192.168.8.		Help	
None 💌	Fill the HTTP Port of	the	192.168.8.			
None 💙	camera in the column		192.168.8.			
Assign a name for the	External Port and Intel Port. Example: 2000	ernal	192.168.8.			
port forward setting here			192.168.8.		Fill in this s	ection with the
Foscam Cam	2000 2000	Both 💌	192.168.8. 100		LAN IP of th	ne camera; we
		Both 💌	192.168.8.		would enter example.	"100" for our
		Both 💌	192.168.8.		example.	

Port forwarding in a Linksys Router

Using the embedded DDNS to access the camera via the Internet

Some Foscam cameras have an embedded unique DDNS domain name, the format of this domain name is <u>xxxxx.myfoscam.org</u>. On the bottom of the camera, you can see the domain name sticker with this information on it, or it should appear on the DDNS Settings page in your camera.

DDNS Service Settings	
Manufacturer's DDNS	
Enable	
Manufacturer's Domain	ad6016.myfoscam.org
Validity Queries	
Third Party DDNS	
DDNS Service	None 💙
	Submit Refresh

DDNS Settings page

So for example, once port forwarding is set up correctly and you have a DDNS (optional) you can use the three following methods to access the camera remotely:

Foscam's DDNS: http://Domain:HTTP Port- For example: http://ad6016.myfoscam.org:2000

Using Third Party DDNS (No-IP, DynDNS) – For example:: <u>http://foscamusa1.no-ip.org:2000</u>

Using External IP: http://IP Address:HTTP Port - For example: http://12.69.124.226:2000

If you do not have a DDNS set up, you can use the third method to log into your camera.

NOTE: If you are still unable to access the camera remotely, try checking to see if your port forwarding is working correctly by going to <u>www.canyouseeme.org</u>. Input your port number and click check to see if the port is opened properly. If you have done port forwarding correctly, but the port is being blocked you may need to contact your ISP and request the port be unblocked for your usage.

If you want to use a Third Party Domain like DynDNS or No-IP, please read the DDNS Service Settings section in the User Manual on how to set it up.



USE THIS QR CODE WITH YOUR PHONE TO SEE OUR VIDEO SETUP GUIDES FOR PC ON BASIC SETUP, WIRELESS SETUP, PORT FORWARDING, AND MORE!

Congratulations!

You have finished the quick installation guide of the camera for PC. <u>Please refer to the electronic</u> <u>user manual in the CD-ROM</u> for other settings such as <u>Alarm Settings</u>, <u>Email Settings</u>, <u>User</u> <u>Settings</u>, and much more!

> Foscam Digital Technologies LLC 14027 Memorial Dr. #132, Houston, TX 77079 Telephone: 1-800-930-0949

Sales: <u>sales@foscam.us</u> Support: <u>support@foscam.us</u>





Model: FI8910W

Quick Installation Guide

(For Mac OS)

Indoor MJPEG Pan/Tilt Wireless IP Camera



Black

FOSCAM

White

Package Contents

 IP Camera FI8910W with IR-Cut 	x 1
 DC Power Adapter (5V-2.0A) 	x 1
 Network Cable 	x 1
 Wi-Fi Antenna 	x 1
 Mounting Bracket 	x 1
 Quick Installation Guide 	x 1
 CD-ROM with Setup Software 	x 1

Quick Installation Guide For Mac OS

Package Contents• IP Camera FI8910Wx 1• DC Power Adapter (5V-2.0A)x 1• Network Cablex 1• Wi-Fi Antennax 1• Mounting Bracketx 1• Quick Installation Guidex 1• CD-ROM with Setup Softwarex 1

Quick Installation Diagram



Start Installation

1. Hardware Installation

- 1) **Open the package**. Take the camera out of the box carefully.
- 2) **Mount the antenna.** Take the Wi-Fi antenna, and mount it on the SMA connector on the back of the camera, screw in the antenna, and make the antenna stand vertically.



Mount the antenna



Plug in the network cable

3) Get the camera connected to the router, and insert the power plug.

Use the network cable to connect the camera to the router or the switch in the LAN network at your home or your office. Plug in the power. The green network light at the rear of the camera will blink and the camera will automatically pan/tilt. The red power light will also turn on.

2. Software Installation

Insert the CD into the CD drive of your Mac and find the folder "For MAC OS". Copy the IP camera tool to your MAC and start the program.



IP Camera Tool Icon for Mac

3. Login to the Camera

Double click the IP Camera Tool icon and the following screen should appear.

0	IP Camera Tool	
anonymous	http://192.168.8.100:2000	
	IP Camera Tool for Mac	

The IP camera tool should find the camera's IP address automatically after you plug in the network cable. If not, please make sure that DHCP is enabled on your router and that MAC address filtering, firewalls and anti-virus are disabled temporarily until the camera is set up.

Double click the IP address of the camera; Safari will prompt you for a username and a password. Enter the username **admin** and leave the password field blank. This is the default login information. You will then see the camera's login page.

Authentication Requ	ired	23
	.108:80 requires a username and /er says: ipcamera_000DC5DB3733.	
User Name:	admin	
Password:		
	Log In Canc	el



The Login Screen

Since ActiveX mode is not compatible on Mac, you will always click the **Server Push Mode** option to access the camera, whether you are on Safari, Chrome, or Firefox.

Once you click on Server Push Mode, you should be taken to the live video screen immediately.



The Live Video Page

4. Wireless Connection Setup

4.1 Infrastructure Mode

<u>Step 1</u>: Choose "For Administrator" or "Device Management" on the live video page, and then click on the "Wireless LAN Settings" option on the left side of the screen. You can click "Scan" here to scan for wireless networks, which should display your own network. Make sure you are not hiding your SSID, or it will not be detected.

Wireless LAN Settings	
·····j·	
	DOD-TEC[20aa4bea61ed] infra
	Foscam1-DSL021[20aa4bea4f27] infra
Wireless Network List	Foscam's Wi-Fi Network[20c9d0a23ff2] infra ≡
	Foscam2-DSL015[20aa4be52177] infra
	Scan
Using Wireless LAN	
SSID	Foscam1-DSL021
Network Type	Infra 💌
Encryption	WPA2 Personal (AES)
Share Key	
	Submit Refresh

<u>Step 2:</u> Click the SSID (name of your router) in the list, the corresponding information related to your network, such as the name and the encryption, will be filled into the relevant fields automatically.

NOTE: Sometimes the information filled in may differ from your actual network settings. If you are unable to connect wirelessly make sure the encryption within your router is correct and the encryption selected on the page for your wireless network is correct. Try using different encryptions if you aren't able to connect with a certain type of encryption.

You will only need to fill in the password of your network. This is listed as "Share Key" on the wireless settings page. If your password to connect to the internet for your router is 1234567890, you would put 1234567890 in the "Share Key" field. On the same note, if your password is something like foscam12345, you would put in foscam12345 in the field. Again, make sure that the SSID, Encryption and the password you filled in are exactly the same for your router.

-Wireless LAN Settings	
Wireless Network List	DOD-TEC[20aa4bea61ed] infra Foscam1-DSL021[20aa4bea4f27] infra Foscam's Wi-Fi Network[20c9d0a23ff2] infra Foscam2-DSL015[20aa4be52177] infra
Using Wireless LAN	
SSID	Foscam1-DSL021 —— Case Sensitive!
Network Type	Infra 💌 🥒 Double check within
Encryption	WPA2 Personal (AES) vour router
Share Key	The password you use
	Submit Refresh to connect to your network

Wireless Settings

<u>Step 3:</u> Click on the **Submit** button after all settings have been entered. The camera will restart after 30 seconds. Once the countdown ends, take the network cable out of the camera. Never shut down the power of the camera until the IP camera is able to connect to the wireless network.

The LAN IP address will disappear on the window of IP Camera Tool when the camera is configuring a wireless connection. Wait about 1 minute, the camera should obtain a wireless connection, and the LAN IP of the camera will show again on the window of the IP Camera Tool. The IP address may have changed after the camera receives a wireless connection; we recommend setting a static local IP address if this IP address changes by right clicking the camera in IP Camera Tools, setting a static IP, and pushing OK (see Page 11). Congratulations! You have set up the wireless connection of the camera successfully.

If you fail to make a wireless connection, please refer to your seller or contact us directly for assistance.



USE THIS QR CODE WITH YOUR PHONE TO SEE OUR VIDEO SETUP GUIDES FOR MAC ON BASIC SETUP, WIRELESS SETUP, PORT FORWARDING, AND MORE!

4.2 WPS (Wi-Fi Protected Set-up)

WPS allows you to set up wireless connectivity automatically if you have a WPS-compatible router. The WPS button on the Foscam camera is shared with the reset button. Use the small end of a paperclip or a toothpick to press and hold the RESET button for **four seconds and let go.**



Next, press the WPS button on your router **within 60 seconds**. The WPS button is usually on the back or on the side of your router. On some routers, you may need to log in to the web interface and click on an on-screen button to activate the WPS feature. If you are not sure where the WPS button is on your router, please refer to your router's User Manual.

The camera will automatically create a secure wireless connection to your router. If you have plugged in the network cable, you can disconnect it at this time. While connecting, the green network light will blink quickly and the wireless settings will take effect. The IP Camera Tool will search for the camera's LAN IP address. Make sure that the PC and the camera share the same subnet.

NOTE: When setting up the WPS Settings, you must press the Reset button only for **four seconds**, or else the camera may reset itself back to factory default settings if you press and hold the reset button for 10 seconds or more.

For WPS, the security mode of the router **cannot** be WEP, or else the WPS settings may fail.

5. Remote Access Setup

We have been able to access the camera within the LAN network, and have set up a wireless connection, but how do we access the camera via WAN or from outside networks through the internet to view from anywhere in the world or on our smart phones?

We have to set up Remote Access via Port Forwarding before we can access the camera outside of our own local area network.

What is the HTTP Port?

The HTTP Port is used to access the camera remotely. All cameras have the default HTTP port of 80. For example, if the LAN IP address of the camera is <u>http://192.168.8.102</u>, this means that the camera's HTTP port is 80. Since port 80 is set by default, if you input the IP address at <u>http://192.168.8.102:80</u>, with a colon and 80 at the end, it will default back to <u>http://192.168.8.102</u>. This is because it is understood that any time you are entering an IP address without a colon and port number at the end, it is defaulting to port 80 no matter what, so the colon and port 80 are taken out of the end of the link because of this.

It is recommended to change port 80 to a different port, usually in the 4 digit range. The reason for this is because some other devices, such as your router, also share port 80. If this is the case you may experience slow speeds on the camera, or you may not even be able to connect at all. It is best to assign a specific port to your camera so that only your camera is using that specified port number. We usually suggest changing your port to 8080, 8090, or any type of 4 digit number, just as long as it is not at port 80. You can set the port anywhere between 1000 and 20000.

How do you assign a new HTTP port and a Static Local IP Address?

Open the IP Camera Tool, and select the camera you would like to change the port for. Right click on the IP address, and click on "Network Configuration", this brings up the network configuration box as shown:

8 0 0	IP Camera Tool		
anonymous	http://192.16	Basic Properties Network Configuration Upgrade Refresh Flush Ar About IP Port for, and right click	

Click on Network Configuration

000	anonyn	ous Network Configuration	
anonym	Obtain IP fre	om DHCP server	н
	IP Address	192.168.8.100	
	Subnet Mask	255.255.255.0	
	Gateway	192.168.8.1	
	DNS Server	192.168.8.1	
	Http Port	2000	Modify the HTTP port.
	User	admin	Enter the Username and
	Password		password, click OK.
	ОК	Cancel	
	- On	Cancer	

Changing the port in IP Camera Tool

Enter the username and password of the Administrator (default username is admin with a blank password), and click "OK" to apply changes.

Wait around 10 seconds or wait for the camera to reboot; you'll see that the camera's LAN IP address has changed. In our example it was changed to 2000, so we see http://192.168.8.100:2000 in IP Camera Tool. Also, the LAN IP address is now fixed at a static IP address of http://192.168.8.100:2000. This IP address will not change even if the camera is powered off and back on, the camera will remain on this LAN IP address. This is very important that a static LAN IP address is set, or you may have problems later with remote access and seeing the camera remotely if the camera loses power and reconnects on a different LAN IP address. Make sure you set a static LAN IP address!



Static IP address and port 2000 set in IP Camera Tool

Setting up Remote Access

First, check to see if your ISP (Internet Service Provider) provides a Static WAN IP address service or a Dynamic WAN IP address service. This guide has been divided into two different sections of setting up remote access, one for Static IP addresses and one for Dynamic IP addresses.

If your ISP provides a Static WAN IP Address, continue reading below.

If your ISP provides Dynamic WAN IP Address please go to Chapter 5.2 directly (Page 28).

5.1 Static IP Addresses

Users who have static IP addresses do not need to set DDNS service settings for remote access. When you have finished connecting the camera using the LAN IP address and port forwarding, you can access the camera directly from the Internet using the WAN IP address and port number.

How to Obtain the WAN IP address from a public website

To obtain your WAN IP address, you can go to Google at <u>www.google.com</u> and search "What is my IP address. It will offer you your public IP address, which is your WAN (External) IP address. You can also use <u>http://www.whatismyip.com</u> if needed.

Web Images Maps Shopping Appli	cations More 🔻 Search tools
--------------------------------	-----------------------------

This is your public WAN IP address (external IP address).

5.2 Dynamic IP Addresses

DDNS is a service that allows your IP Camera, especially when assigned with a dynamic IP address, to have a fixed host and domain name. This means that even though your WAN IP address is constantly changing, you will have a fixed hostname you can use to access your cameras at all times. You can access the camera directly from the Internet using the hostname and port number.

Foscam offers many different DDNS providers, the most popular being No-IP and DynDNS. You can sign up for the following DDNS providers at the below websites:

http://www.no-ip.com/ http://dyn.com/dns/dyndns-pro-free-trial/

What is Port Forwarding?

If you have never done port forwarding before, you can open and view the following link to understand the basic concept. Port forwarding allows for outside connections to access a specific device on your network from anywhere in the world. Every router automatically blocks any incoming connections for safety purposes. Using port forwarding, you are telling your router to allow a connection through a certain port (you can think of it as a gateway) into your router. You set this port to a specific device, in our case an IP Camera, so it can be accessed from anywhere in the world.

Click this link to learn more about port forwarding: <u>http://portforward.com/help/portforwarding.htm</u>

How do we configure Port Forwarding?

For this section, we will be using an example:

For our Linksys example, let's say the camera's IP address is <u>http://192.168.8.100:2000</u>

For our Apple Router example, let's say the camera's IP address is <u>http://10.0.1.100:2000</u>

Login to the router, and go to your router's port forwarding or port triggering menu. Sometimes this is also under the name of Virtual Server or NAT.

Using an Airport Express router as an example, we would open the "Airport Utility" program, and then edit our Apple router's information as seen in the following screenshots

First we will go over how to port forward within a Linksys router in case you do not have an Apple brand router.

For Linksys:

Create a new column using the LAN IP address & HTTP Port of the camera within the router as shown below, and then push **OK** or **Submit** to save your settings:



Port forwarding in a Linksys Router

For Apple Routers:



Open Airport Utility as shown above, then click on your Apple router, and click "Edit"

Base Station Inter	net Wireless Netwo	ork AirPlay
Router Mode:	DHCP and NAT	\$
DHCP Range:	10.0.1.2 to 10.0.1.200	
DHCP Reservations:	Description	IP Address
		_
	+ -	Edit
Port Settings:	Description	Туре
	+ -	Edit
Enable Access Control:	Timed Access Control	
	Network Options	
		Cancel Update

Click on the "**Network**" tab at the top, we will be editing the "**Port Settings**" section of the **Network** page which is where port forwarding is done. Click the **+** symbol which will add a port forwarding rule.

Firewall Entry Type:	IPv4 Port Mapping	*
	DHCP and NAT	
Description:	Foscam Cam 1	Ŧ
Public UDP Ports:	2000	
Public TCP Ports:	2000	
Private IP Address:	10.0.1.100	
Private UDP Ports:	2000	
Private TCP Ports:	2000	
	Can	cel Save

As you can see, we are inputting the port forwarding information such as the port, IP address, and the name of the port forwarding rule. Fill these fields in accordingly based on what information you would like to include in terms of the port you want to forward, your local IP address of the camera, and the custom name you would like to provide.

Foscam Digital Technologies LLC

0 0 0		AirPort Utility	
Ot	temporarily unav continue?	ts network services will b ailable. Are you sure you	want to
	Do not show this warning	again Cancel	Continue
	Port Settings:	+ – Description Foscam Cam 1	Edit Type IPv4
	Enable Access Control:	+ – Timed Access Control Network Options	Edit
		[Cancel Update

Once the port forwarding rule has been created, you will see it in the list where the Port Settings section is. This confirms that you have successfully added a port forwarding rule. Next, click **Update**. You will be prompted if you would like to continue, the router will most likely update its settings for a few seconds and come back online. Once it comes back online your port forwarding settings will be confirmed. Congratulations, port forwarding should now be done!

Using the embedded DDNS to access the camera via the Internet

Some Foscam cameras have an embedded unique DDNS domain name, the format of this domain name is <u>xxxxxx.myfoscam.org.</u> On the bottom of the camera, you can see the domain name sticker with this information on it, or it should appear on the DDNS Settings page in your camera.

DDNS Service Settings	
Manufacturer's DDNS	
Enable	
Manufacturer's Domain	ad6016.myfoscam.org
Validity Queries	
Third Party DDNS	
DDNS Service	None 🗸
	Submit Refresh

DDNS Settings page

So for example, once port forwarding is set up correctly and you have a DDNS (optional) you can use the three following methods to access the camera remotely:

Foscam's DDNS: http://Domain:HTTP Port- For example: http://ad6016.myfoscam.org:2000

Using Third Party DDNS (No-IP, DynDNS) – For example: <u>http://foscamusa1.no-ip.org:2000</u>

Using External IP: http://IP Address:HTTP Port - For example: http://12.69.124.226:2000

If you do not have a DDNS set up, you can use the third method to log into your camera.

NOTE: If you are still unable to access the camera remotely, try checking to see if your port forwarding is working correctly by going to <u>www.canyouseeme.org</u>. Input your port number and click check to see if the port is opened properly. If you have done port forwarding correctly, but the port is being blocked you may need to contact your ISP and request the port be unblocked for your usage.

If you want to use a Third Party Domain like DynDNS or No-IP, please read the DDNS Service Settings section in the User Manual on how to set it up.



USE THIS QR CODE WITH YOUR PHONE TO SEE OUR VIDEO SETUP GUIDES FOR MAC ON BASIC SETUP, WIRELESS SETUP, PORT FORWARDING, AND MORE!

Congratulations!

You have finished the quick installation guide of the camera. Please refer to the electronic user manual in the CD-ROM for other settings such as Alarm Settings, Email Settings, User Settings, and much more!

Foscam Digital Technologies LLC

14027 Memorial Dr. #132, Houston, TX 77079

Telephone: 1-800-930-0949

Sales: <u>sales@foscam.us</u> Support: <u>support@foscam.us</u>

