Quick Start Guide

Blackjack® DX™

PoE Servers Powered by DW Spectrum

State of the art hyper-optimized video management platform designed for ease, speed and efficiency.

Blackjack DX Linux Slim Desktop Server — Up to 80Mbps

DW-BJDX11XXT-LX

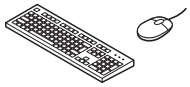
Default Login Information for DW Spectrum

Username: **admin**	Password: **admin12345**

Default login information for the server's OS

Username: **dwuser**	Password: **Dw5pectrum**

WHAT'S IN THE BOX

Blackjack DX™ server		1	Keyboard and mouse		1 set
Quick start guide		1	Power cable		1

NOTE: Download all your support materials and tools in one place.

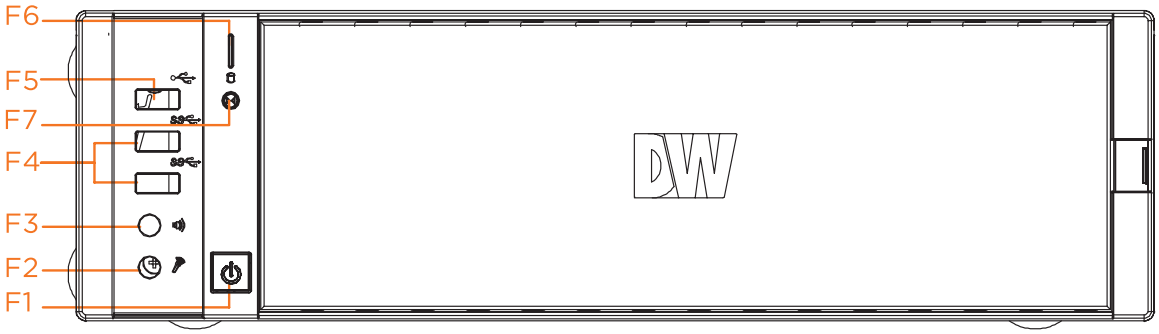
1. Go to: **http://www.digital-watchdog.com/support-download/.**
2. Search your product by entering the part number in the '**Search by Product**' search bar. Results for applicable part numbers will populate automatically based on the part number you enter.
3. Click '**Search**'. All supported materials, including manuals, Quick start guides (QSG), software and firmware will appear in the results.

Attention: This document is intended to serve as a quick reference for initial setup.
See the DW Spectrum® full manual for more information on features and functionality.

Tel: +1 (866) 446-3595 / (813) 888-9555
Technical Support Hours: 9:00AM – 8:00PM EST, Monday through Friday
digital-watchdog.com

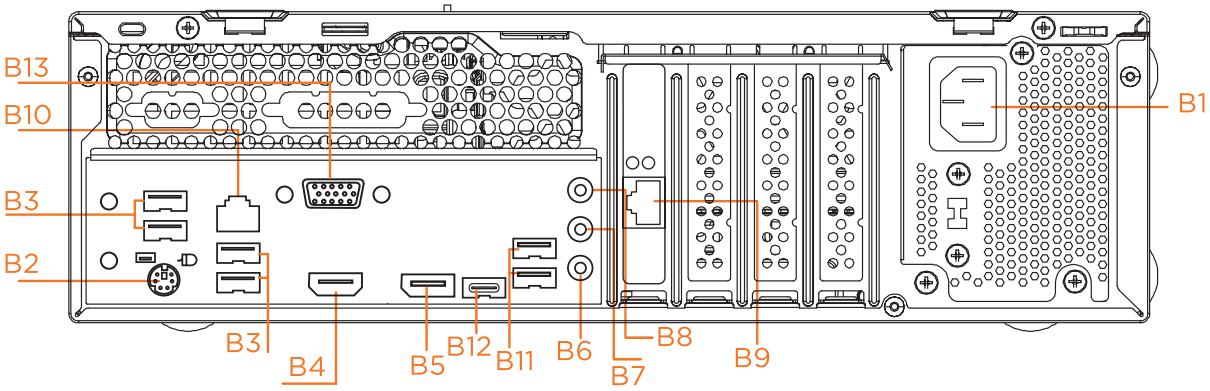
Blackjack® DX™

FRONT PANEL



F1	Power button
F2	Microphone jack
F3	Headphone jack
F4	2x USB 3.0 ports
F5	USB 2.0 ports
F6	System health LED
F7	Reset button

REAR PANEL



B1	AC power socket
B2	PS/2 keyboard and PS/2 mouse ports
B3	2x USB 2.0 ports
B4	True HD port
B5	DP port
B6	Mic in (pink)
B7	Line out (green)
B8	Line in (blue)
B9	Ethernet port to the camera network
B10	Ethernet port to the local network
B11	USB 3.0 ports
B12	USB 3.0 ports (Type-C)
B13	D-Sub port

Default Login Information for DW Spectrum

Username: **admin**	Password: **admin12345**

Default login information for the server's OS

Username: **dwuser**	Password: **Dw5pectrum**

SPECIFICATIONS

MODEL		DW-BJDX11xxT-LX
Included IP licenses		4
Form factor		Slim Desktop
Operating system		Linux Ubuntu
CPU		Intel Processor
Memory		8GB
Ethernet port		2x 1G Ethernet (RJ45)
System	Max video storage rate	80 Mbps
Storage	Maximum HDD	2 x SATA HDD
	Maximum storage	40TB
Video-out	Outputs	1x true HD, 1 x DisplayPort, 1x D-Sub for system configuration. 1 display output at a time.
	Resolution	True HD: 4K @60Hz, DisplayPort: 4K @60Hz, D-Sub: 1920x1280 @60Hz
Preloaded VMS software		DW Spectrum Server
Keyboard and mouse		Included
Power supply		300W**
Operating temperature and humidity		41°F~104°F (5°C~40°C), 20~90% RH
Dimension (WxDxH)		13.1" x 3.8" x 15.6" (334 x 97 x 402 mm)
Other certification		NDAA, TAA
Warranty		5 year limited

* UPS recommended

Specifications and components mentioned are subject to change without notice.

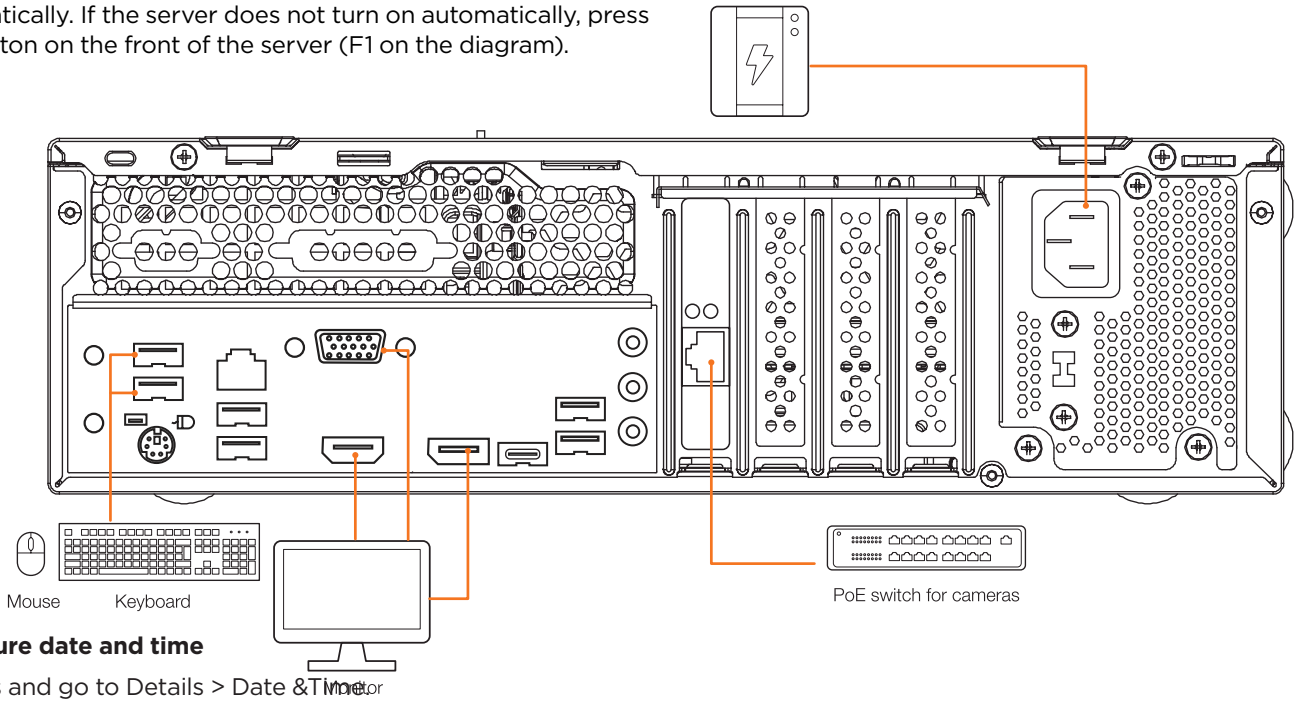
SETTING UP THE SERVER

STEP 1: Connect external devices, power and network.

1. Connect a monitor, USB keyboard, USB mouse and network cable to one of the Ethernet ports (B9 on the diagram). Configure the camera's network first, then configure the server's local network.

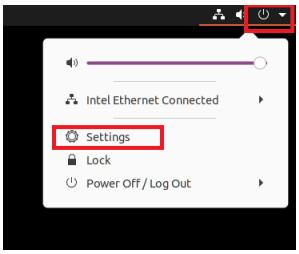
NOTE See page 2 for detailed back panel breakdown for each model.

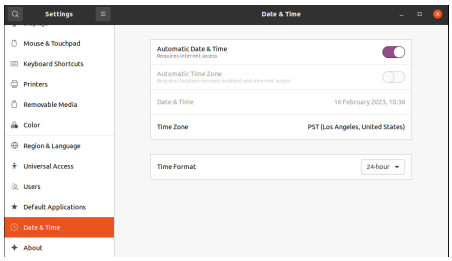
2. Connect the server to an appropriate power source. A UPS system rated for 750VA or higher per PSU is recommended.
3. Connecting the power cable to a live power source may turn on the server automatically. If the server does not turn on automatically, press the power button on the front of the server (F1 on the diagram).



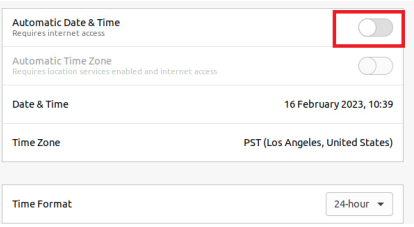
STEP 2: Configure date and time

1. Open Settings and go to Details > Date & Time

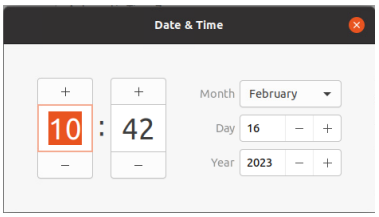




2. Turn OFF Automatic Date & Time and Automatic Time Zone



3. Click Date & Time and set correct date and time.



4. Click Time Zone and set to correct Time zone. (Type one of the largest cities in the time zone).

5. Close Settings.

STEP 3: Configure network

Please have the following information ready before starting the network configuration.

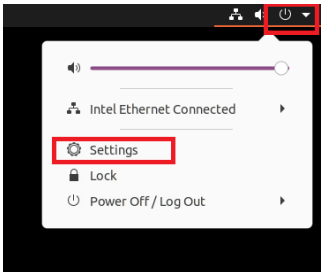
	Camera network	Local network (LAN)
IP address		
Subnet mask / Netmask		
Default gateway / Gateway	N/A	
DNS servers	N/A	

* Camera network and local network cannot be on the same network.

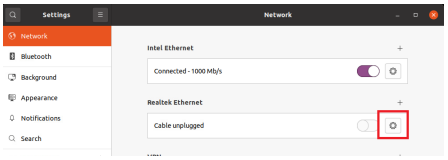
NOTE The Blackjack server's network settings are set to DHCP by default.

NOTE If you are not sure what information to enter, contact your Network Administrator or Internet Service Provider.

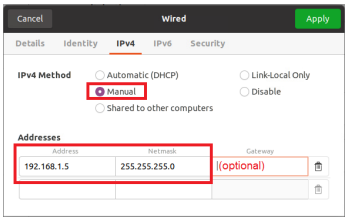
1. Open Settings > Network



2. Click Setting of the Realtek Ethernet.



3. Change to Manual then enter Address, Netmask , Gateway.
   * Do not enter Gateway information if there is no Gateway in this network.
4. Click Apply to save.



5. Restart the connection by switching OFF then turn ON. If the connection is off, connect the network cable.

6. Click Settings of the Intel Ethernet.
7. Change the settings if needed to access the Internet and for remote access from a local network.
8. Click Apply to save.
9. Restart the connection by switching OFF then turn ON. If the connection is off, connect the network cable.

NOTE If you are not connecting to the Blackjack® from the same network, you may be required to perform port forwarding on your router to access the server. Contact your Network Administrator or Installer for additional information

CONFIGURE CAMERAS USING DW IP FINDER

Refer to the camera's QSG to configure any DW® IP camera's IP address using DW IP finder.

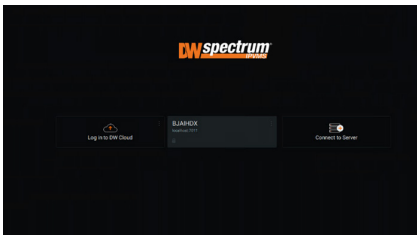
SETTING UP DW SPECTRUM® MEDIA SERVER

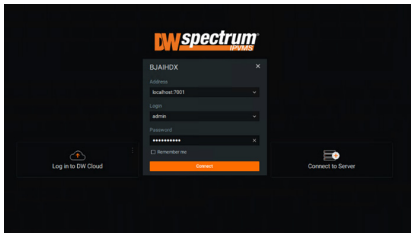
Login: **admin**
Password: **admin12345**

STEP 1: Login from the Blackjack server

1. Open the DW Spectrum client.

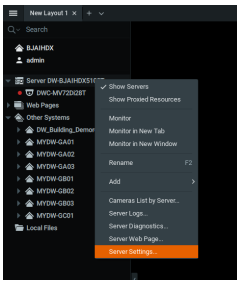
2. Click on the pre-configured server.
3. If it does not log in automatically, enter the default password and click **Connect**.

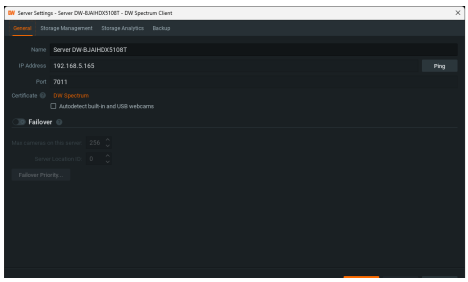




STEP 2: To rename the server

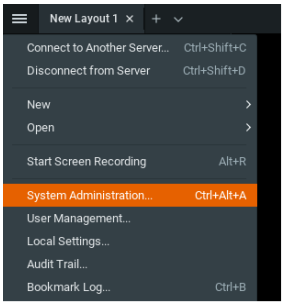
1. Right click on the server name in the resource list on the left side and click **Server Settings...**
2. Enter the new server name in the name field and click **OK**.

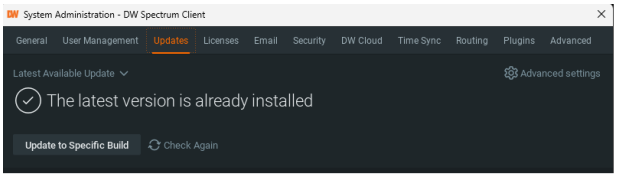




STEP 3: To check for updates

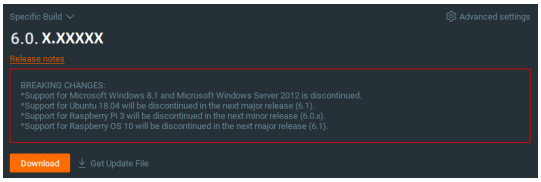
1. Click the **main menu icon** in the upper-left corner of the DW Spectrum window, and click **System Administration...**
2. Click the **Updates** tab. If the system needs to be updated, click on the **Update** button.

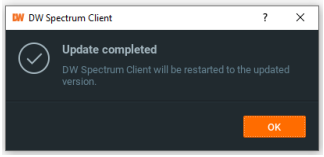




* If the latest version is already installed, the message "The latest version is already installed" will be visible at the top.

3. Click **OK** when the update is complete.

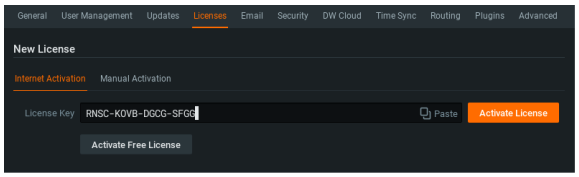


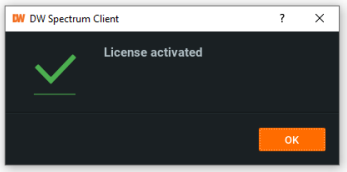


STEP 4: Activate licenses

NOTE An active Internet connection is required.

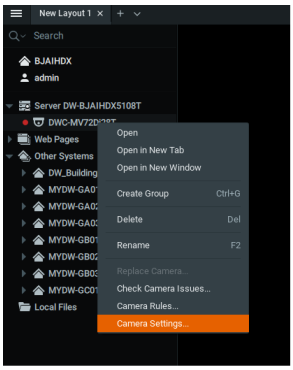
1. Click the **main menu icon** in the upper-left corner of the DW Spectrum window, and click **System Administration...**
2. Click the **Licenses** tab. Enter the license key and click **Activate License**.
   * Click **Activate Free License** to use a free, four channel license for 30 days.
3. Click **OK** when all necessary license keys are activated.

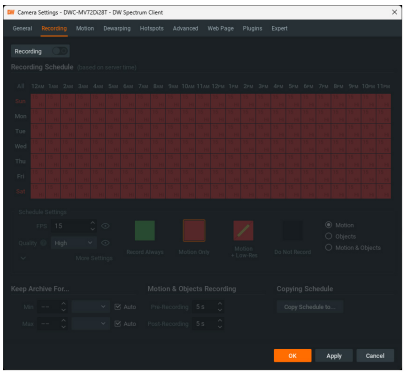




STEP 5: Configure recording

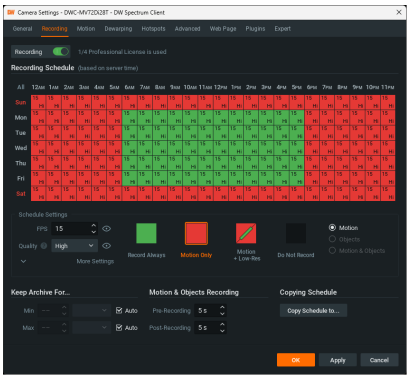
1. Right click a camera in the resource list on the left side and click **Camera Settings...**
2. Click the **Recording** tab.



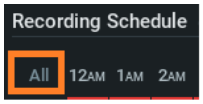


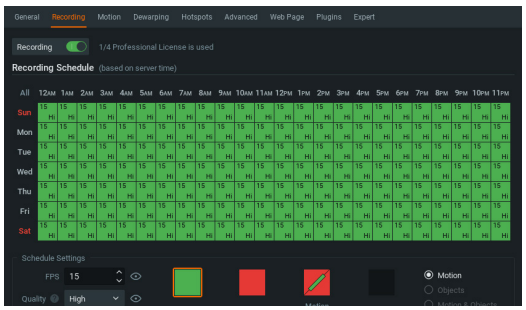
3. Click the **Recording** toggle to activate recording for that camera.
4. Set quality, FPS, and recording type.

5. Click and drag over the recording schedule to apply the settings to any number of days and times.



* Click **All** to apply the recording settings to the entire schedule.





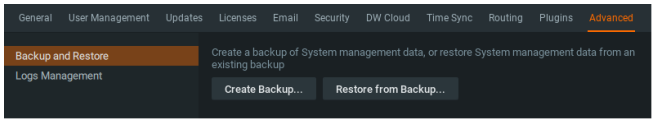
6. Click **OK** when the necessary recording schedule is set. A red circle will appear next to the camera in the resource list.

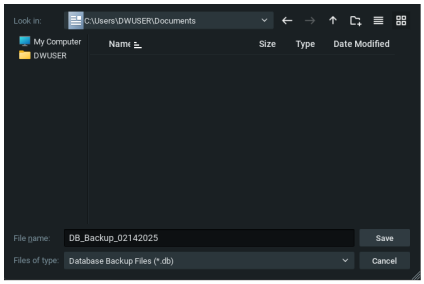
NOTE: A Recording License is required to allow a camera to record to the archive.

STEP 6: Backup database

1. Click the **main menu icon** in the upper-left corner of the DW Spectrum window, and click **System Administration...**
2. Click the **Advanced** tab. Click **Create Backup...**
3. Select the location to save the database, and enter a name for the backup file. Click **Save**.

   * Creating a database backup to external storage before and after every update is strongly recommended.





NOTE: More information and instructions are available in the DW Spectrum user manual.

NOTE: This products is covered by one or more claims of the HEVC Patents listed at patentlist.accessadvance.com.

TROUBLESHOOTING TIPS

Problem	Possible solutions
My camera does not auto-discover	1. Is the camera in the same LAN network as the media server? 2. Is your camera compatible with DW Spectrum? (Refer to our website for full list of supported cameras.) 3. Is the camera updated to its latest firmware? 4. If your camera is integrated with DW Spectrum via ONVIF, make sure ONVIF is enabled on your camera. 5. Try adding the camera manually. 6. Try rebooting the server after installation. Allow up to 2 minutes for the server to map your network and detect all supported devices.
Videos are slow	1. Are you accessing the same cameras from multiple clients? (LAN and WAN) 2. Do you have a Gigabit network? Check your network speed.
My camera appears disconnected	1. Under camera settings, make sure the user name and password are correct. 2. Under the camera settings, use the 'Ping' button to make sure the camera is connected to the network properly. 3. If you can connect to the camera's web viewer, try rebooting the camera and/or restore it to factory default. 4. Make sure your camera is using the latest firmware available. 5. Make sure that the camera is connected to the same network as the server. 6. If you are connecting to a camera that is integrated with DW Spectrum via the ONVIF protocol (see list), make sure ONVIF is enabled. 7. Make sure your user has permissions to view that specific camera.
I cannot get playback video from my camera	1. Do you have network connection between client and server (in case server and client are not on the same machine)? 2. Make sure your user has playback viewing permissions for the selected channel. 3. Make sure the camera is set to a recording mode that would provide recorded video for the selected time and environment. 4. On the server side, check the media server log to make sure the camera you are trying to watch has not been unexpectedly disconnected.
I get 'unauthorized' message on my camera	1. Make sure the camera's user name and password are properly entered in the camera's general information under the camera settings menu. 2. If necessary, try rebooting the camera to apply the camera's user name and password.

DW SPECTRUM SYSTEM REQUIREMENTS

Recommended specs for the full client

	Minimum	Recommended
Processor	Intel i5 8th gen processor (or higher)	Intel Core i7 8th gen processor (or higher)
System RAM	8GB RAM	16GB RAM
Video card	Integrated Intel® graphics	GeForce GTX 1650 or better
Network interface	2 x 1 Gbps	2 x 1 Gbps
OS Drive	256GB HDD	Dedicated 256GB SSD or larger
OS supported	**Microsoft Windows OS** (supported by both DW Spectrum® Server and Client). • Windows 10 • Windows 11 • Windows Server 2016 • Windows Server 2019 • Windows Server 2022 **NOTE: DW Spectrum for Windows can be installed as a software bundle, or the Server and Client software can be installed separately.	
	Ubuntu (Debian-based Linux) OS (supported by both DW Spectrum Server and Client). • Ubuntu 18.04 LTS "Bionic Beaver" • Ubuntu 20.04 LTS: "Focal Fossa" • Ubuntu 22.04 LTS: "Jammy Jellyfish" **NOTE: DW Spectrum for Ubuntu is only available for separate installations (not bundled).	
	Macintosh OS (supported only by the DW Spectrum Client. DW Spectrum Server is not available for macOS). • macOS 11.0, 11.1, 11.2 "Big Sur" • macOS 12 "Monterey" • macOS 12 "Monterey" • macOS 12 "Monterey" **NOTE: DW Spectrum for macOS is only supported by the DW Spectrum Client.	

* Except Storage Server version
Important: OS not listed will be not be supported by DW® Tech Support.

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www.digital-watchdog.com
sales@digital-watchdog.com

Rev: 07/25

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Specifications and pricing are subject to change without notice.

MEGApix® IP Cameras

DWC-VSTB04BI – White housing model.

Default Login Information: admin | admin

When logging into the camera for the first time, you will be prompted to set up a new password. You can set the new password using the DW® IP Finder™ software or directly from the camera's browser menu.

WHAT'S IN THE BOX

Quick Setup and Installation Guides	1 set	Tapping Screws – 3pcs	1 set
Mounting Template	1	Plastic Plugs – 3pcs	1 set
Waterproof Cap	1 set	Rubber Plug	1
Hexagonal Wrench 0.07" (2mm)	1		

NOTE: Download all your support materials and tools in one place

1. Go to: **http://www.digital-watchdog.com/resources**
2. Search your product by entering the part number in the **'Search by Product'** search bar. Results for applicable part numbers will populate automatically based on the part number you enter.
3. Click **'Search'**. All supported materials, including manuals and quick start guide (QSGs) will appear in the results.

Attention: This document is intended to serve as a quick reference for the initial set-up. It is recommended that the user read the entire instruction manual for complete and proper installation and usage.

SAFETY AND WARNING INFORMATION

Read through this Installation Guide carefully before installing the product. Keep the Installation Guide for future reference. See the user manual for more information on the proper installation, use and care of the product.
These instructions are intended to ensure that users can use the product correctly to avoid danger or property loss.
Warnings: Serious injury or death may occur if any of the warnings are neglected.
Cautions: Injury or equipment damage may occur if any of the cautions are neglected.

WARNING

1. In the use of the product, you must be strict compliance with the electrical safety regulations of the nation and region. When the product is mounted on a wall or ceiling, the device shall be firmly fixed.
2. Be sure to use only the standard adapter specified in the specification sheet. Using any other adapter could cause fire, electrical shock, or damage to the product.
3. Make sure the power supply voltage is correct before using the camera.
4. Incorrectly connecting the power supply or replacing the battery may cause an explosion, fire, electric shock, or damage to the product.
5. Do not connect multiple cameras to a single adapter. Exceeding the capacity may cause excessive heat generation or fire.
6. Securely plug the power cord into the power source. An insecure connection may cause a fire.
7. When installing the camera, fasten it securely and firmly. A falling camera may cause personal injury.
8. Do not install in a location subject to elevated temperature, low temperature, or high humidity. Doing so may cause fire or electric shock.
9. Do not place conductive objects (e.g. screwdrivers, coins, metal items, etc.) or containers filled with water on top of the camera. Doing so may cause personal injury due to fire, electric shock, or falling objects.
10. Do not install in humid, dusty, or sooty locations. Doing so may cause fire or electric shock.
11. Do not install near any heat sources such as radiators, heat registers, or other products (including amplifiers) that produce heat.
12. Keep out of direct sunlight and heat radiation sources. It may cause a fire.
13. If any unusual smells or smoke come from the unit, stop using the product at once. Immediately disconnect the power source and contact the service center. Continued use in such a condition may cause fire or electric shock.
14. If this product does not operate normally, contact the nearest service center. Never disassemble or change this product in any way.
15. When cleaning the product, do not spray water directly onto parts of the product. Doing so may cause fire or electric shock.

CAUTION

1. Use proper safety gear when installing and wiring the product.
2. Do not drop objects on the product or apply strong shock to it. Keep away from a location subject to excessive vibration or magnetic interference.
3. Do not use this product near water.
4. The product shall not be exposed to dripping or splashing and no objects filled with liquids, such as vases, shall be placed on the product.
5. Avoid aiming the camera directly towards extremely bright objects such as the sun, as this may damage the image sensor.
6. The Main plug is used as a disconnect device and shall stay readily operable at any time.
7. Remove the power adapter from the outlet when then there is lightning. Neglecting to do so may cause fire or damage to the product.
8. Do not block any ventilation openings. Install following the manufacturer's instructions.
9. A polarized or grounding-type plug is recommended for this product. A polarized plug has two blades with one wider than the other. A grounding-type plug has two blades and a third grounding prong. If the provided plug does not fit into your outlet, consult an electrician for replacement.
10. Protect the power cord from being walked on or pinched particularly at plugs, convenience receptacles, and the point where they exit from the product.
11. If any laser equipment is used near the product, make sure the surface of the sensor is not exposed to the laser beam as that may damage the sensor module.
12. If you want to move the already installed product, be sure to turn off the power and then move or reinstall it.
13. Proper configuration of all passwords and other security settings is the responsibility of the installer and/or end-user.
14. If cleaning is necessary, please use a clean cloth to wipe it gently. If the device will not be used for a long time, please cover the lens cap to protect the device from dirt.
15. Do not touch the camera's lens or sensor module with fingers. If cleaning is necessary, please use a clean cloth to wipe it gently. If the device will not be used for a long time, please cover the lens cap to protect the device from dirt.
16. Use only attachments/accessories specified by the manufacturer.
17. Always use hardware (e.g. screws, anchors, bolts, locking nuts, etc.) compatible with the mounting surface and of sufficient length and construction to ensure a secure mount.
18. Use only with cart, stand, tripod, bracket, or table specified by the manufacturer, or sold with the product.
19. Unplug this product when a cart is used. Use caution when moving the cart/product combination to avoid injury from tip-over.
20. Refer all servicing to qualified service personnel. Servicing is needed when the product has been damaged in any way, such as power supply cord or plug is damaged, liquid has been spilled or objects have fallen into the product, the product has been exposed to rain or moisture, does not operate normally, or has been dropped.

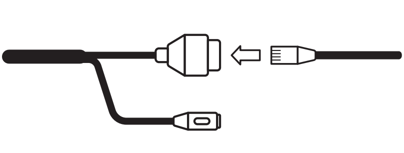
STEP 1 – PREPARING TO MOUNT THE CAMERA

Using the mounting template sheet or the camera itself, mark and drill the necessary holes in the wall or ceiling.

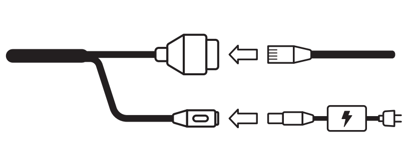
STEP 2 – POWERING THE CAMERA

Pass the wires through and make all necessary connections.

Use a PoE Switch or PoE Injector to connect data and power to the camera using a single Ethernet cable.



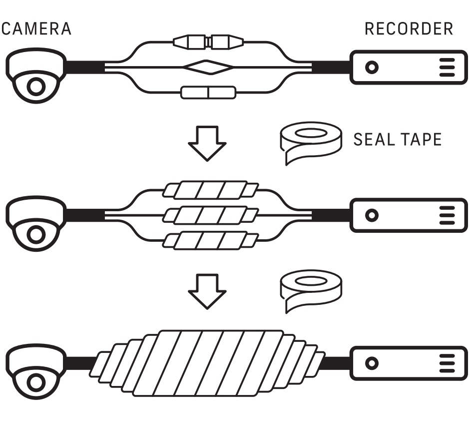
Use a non-PoE Switch to connect data using an Ethernet cable and use a power adapter to power the camera.

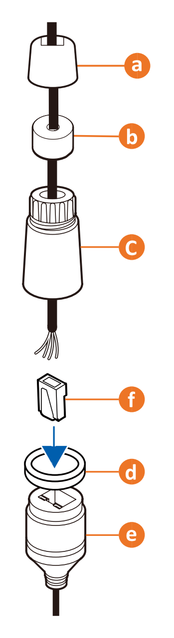


Power requirements	Power consumption
DC12V, PoE (IEEE 802.3af class 2). Adapter not Included.	<5W

If needed, install the waterproof cap.

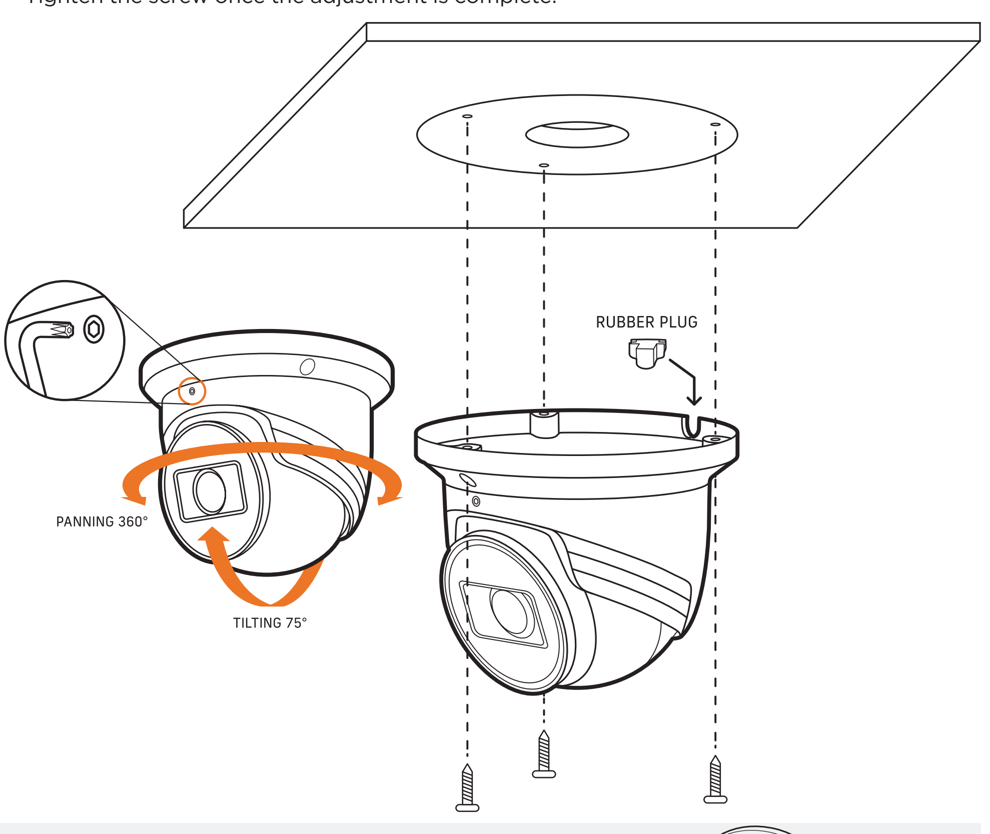
NOTE: In extreme environments use of an outdoor rated sealer is recommended.



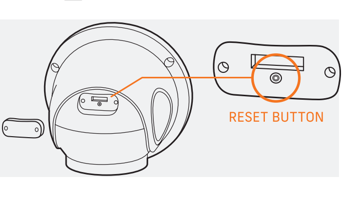


STEP 3 – INSTALLING THE CAMERA

1. Mount the camera to the mounting surface using the included screws and anchors.
2. Adjust the camera's pan and tilt by loosening the lock screw at the base of the camera. Tighten the screw once the adjustment is complete.

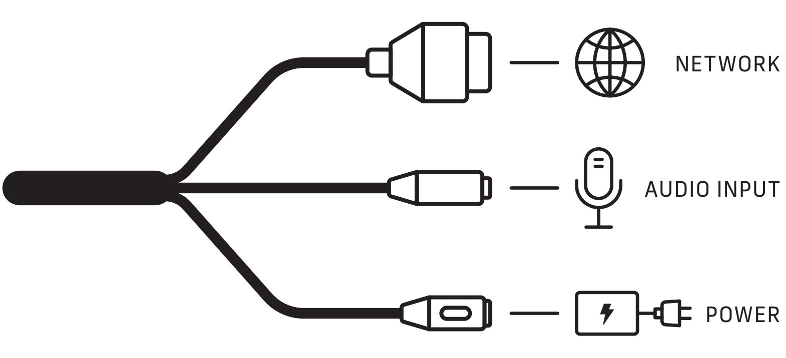


Resetting the camera: Press the reset button at the base of the camera for five (5) seconds to initiate a camera-wide reset of all the settings, including network settings.



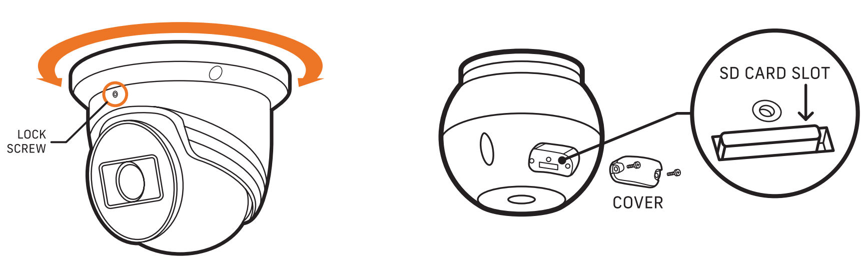
STEP 4 – CABLING

Use the diagram below to properly connect power, network, alarm input and outputs and audio to the camera.



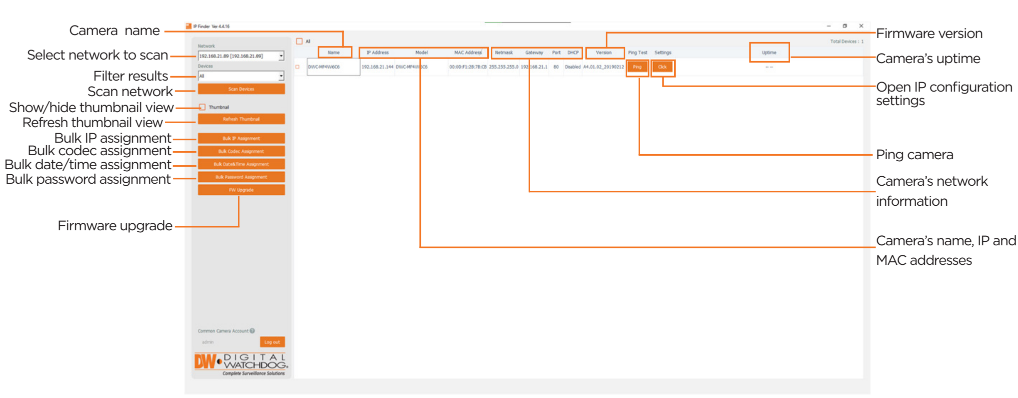
STEP 5 – MANAGING THE SD CARD (OPTIONAL)

1. Loosen the fixed screw at the base of the camera to rotate the camera module and remove the control panel cover to access the SD card slot at the base of the camera.
2. Insert class 10 SD/SDHC/SDXC card into the SD card slot (max 256GB).
3. Press the card inward until it clicks to release from the card slot.



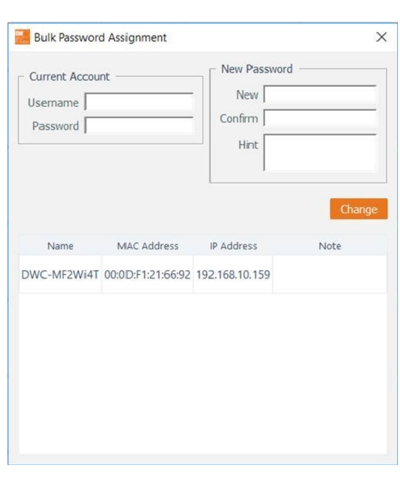
STEP 6 – DW® IP FINDER™

Use the DW® IP Finder™ software to scan the network and detect all MEGApix® cameras, set the camera's network settings or access the camera's web client.

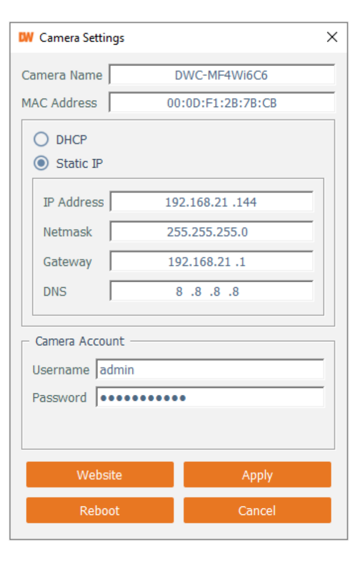


Network Setup

1. To install the DW IP Finder, go to: http://www.digital-watchdog.com
2. Enter "DW IP Finder" on the search box at the top of the page.
3. Go to the "Software" tab on the DW IP Finder page to download and install the installation file.
4. Open the DW IP Finder and click 'Scan Devices'. It will scan the selected network for all supported devices and list the results in the table. During the scan, the DW® logo will turn gray.
5. When connecting to the camera for the first time, a password must be set.
   a. Check the box next to the camera in the IP Finder's search results. You can select multiple cameras.
   b. Click "Bulk Password Assign" on the left.
   c. Enter admin/admin for the current username and password. Enter a new username and password to the right.
   Passwords must have a minimum of eight (8) characters and at least four (4) combinations of uppercase and lowercase letters, numbers and special characters. Passwords cannot contain the user ID.
   d. Click "change" to apply all changes.



6. Select a camera from the list by double-clicking on the camera's name or clicking on the 'Click' button. The pop-up window will show the camera's current network settings. Admin users can adjust the settings as needed. The camera's network settings are set to DHCP by default.
7. To access the camera's web page, click on the 'Website' button.
8. To save changes made to the camera's settings, enter the username and password of the camera's admin account and click 'Apply'.



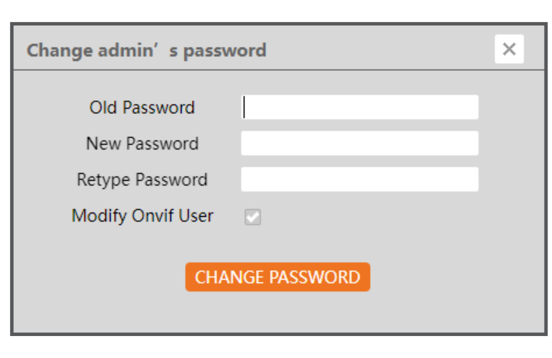
- Select 'DHCP' for the camera to automatically receive its IP address from the DHCP server.
- Select 'Static' to manually enter the camera's IP address, (Sub)Netmask, Gateway and DNS information.
- The camera's IP must be set to static if connecting to Spectrum® IPVMS.
- Contact your network administrator for more information.

- To access the camera from an external network, port forwarding must be set in your network's router.

STEP 7 – WEB VIEWER

The GUI display may differ by camera models.

1. Find the camera using the DW IP Finder.
2. Double-click on the camera's view in the results table.
3. Press the 'Website' button. The camera's web viewer will open up in your default web browser.
4. Enter the camera's username and password you setup in the DW IP Finder. If you did not setup a new username and password via the DW IP Finder, a message will direct you to setup a new password for the camera before gaining access.



To open the camera using the web browser:

1. Open a web browser.
2. Enter the camera's IP address and port in the address bar. Example: http://<ipaddress>:<port>. Port forwarding may be necessary to access the camera from a different network. Contact your network administrator for more information.
3. Enter the camera's username and password you setup in the DW IP Finder.

NOTE: Some menu options may not be available based on the camera model. See the full manual for more information.

NOTE: Please see the full product manual for web viewer setup, functions and camera settings options.

NOTE: This products is covered by one or more claims of the HEVC Patents listed at patentlist.accessadvance.com.

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