**Quick Guide** 



# XX271-20-00



# **V920B Series Bullet Cameras**



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Vicon Industries Inc. does not warrant that the functions contained in this equipment will meet your requirements or that the operation will be entirely error free or perform precisely as described in the documentation. This system has not been designed to be used in life-critical situations and must not be used for this purpose.

# www.vicon-security.com

Document Number: 8009-8271-20-00 Product specifications subject to change without notice. **V920B Series Quick Installation Guide** 

# 1. Description

The information in this manual provides quick installation and setup procedures for the Roughneck® V920B Series of Bullet Cameras. These units should only be installed by a qualified technician using approved materials in conformance with federal, state, and local codes. Read these instructions thoroughly before beginning an installation. Always refer to Vicon's website to assure you have the most up-to-date manual, www.vicon-security.com.

The V920B Series of HD IP cameras is designed for demanding security installations. It offers a number of fixed network camera versions that deliver crisp clear images to fit any installation need. The V920B cameras are fully compatible with all ViconNet® systems; its ONVIF certification provides an open-platform for integration into other video management systems.

The housing is designed for easy installation. PoE eliminates the need for power cables, providing a cost-effective method of installation. The V920B features an auto iris lens that adapts to changing outdoor lighting; the true day/night camera includes a removable IR cut filter. 32 IR LED illuminators provide lighting up to 82 ft (25 m). The camera is IP67 rated with that withstands rain.

#### Installation Steps

Follow these steps to install the network camera on your local network (LAN):

- 1. Check the package contents against the list that follows.
- 2. Connect the network camera.
- 3. Set an IP address.
- 4. Set the password.

#### Package Component

The system comes with the following components:











Accessory Kit

Installation Quick Guide T emplate Sheet

Camera unit

Installation CD

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**Optional OSD Controller** 

Check your package to make sure that you received the complete system, including all components shown above.

**Note:** Adapter for12 VDC is not supplied; the optional V920D-OSD OSD Controller can be purchased separately.

# 2. Installation

For the network camera to operate, it is necessary to connect a network cable for data transmission and power connection from customer-supplied power supply (if not using PoE).

### 2.1 Camera Installation

#### • Camera Dimensions

See the diagrams below for the exact dimensions of the network camera.



Unit Dimensions: mm

#### 8 \* Part List 7 ① Template Sheet ② Accessory Kit 6 ③ Cable Ass'y ht ④ Stand Ass'y (5) lo Body Case Front Case -(4) Lens Module ③ Sunshield \* Accessory Kit 3 2 ③ PTS1 M5 × 20mm(4x) Plastic Anchors(4x) 1 **(B)**

#### Parts and Description

#### Sunshield Installation

The unit is shipped without the sunshi eld installed. Use the bolt supplied to secure the sunshield to the body of the camera.

Base Installation

There are two ways of installing the camera.



#### 1) Installation1 (Cable through the wall with the mount base)



- A. Drill the mounting hole locations, using the template sheet (or the bottom of the mount base) as a guide.
- B. Insert the supplied plastic anchors into the holes.
- C. Connect power cable and network line.
- D. Align the screw holes of the mount base with the plastic anchors.
- E. Use the mounting screws (M5x20) provided to secure the camera.
- F. To adjust the camera position, loosen the mount screw (M6x16) to move the camera. Retighten the screw when adjustment is complete.

![](_page_5_Figure_1.jpeg)

#### 2) Installation 2 (Using the cable knockout tab in mount base)

- A. Drill the mounting hole locations, using the template sheet (or the bottom of the mount base) as a guide.
- B. Insert the plastic anchors into the hole which has just drilled.
- C. Connect connection cable and network lines.
- D. Fit the screw holes of the mount base into the plastic anchors.
- E. Remove the cable knockout tab for the cable entry.
- F. Screw up the mount screws (M5x20).
- G. To adjust the camera position, loosen the mount screw (M6x16) to move the camera. Retighten the screw when adjustment is complete.

# 2.2 Connections

• Cable Connections

![](_page_6_Figure_3.jpeg)

NO	Wire Color	Description
1	Red: 12 VDC White: GND	Main Power; 2 pin terminal, 12 VDC 2A (24W) with heater, or 12 VDC 320mA (3.8W) without heater
2	Black	Ethernet; RJ-45 port compatible with 10/100Mbps having PoE functionality. Modular jack.

Note: Heater requires 12 VDC. If using PoE, the heater will not operate.

#### • Connecting to the RJ-45

Connect a standard RJ-45 cable to the network port of the network camera. Generally a cross-over cable is used for direct connection to PC, while a direct cable is used for connection to a hub.

A router featuring PoE (Power over Ethernet) can be used to supply power to the camera.

#### • Micro SD memory slot

Remove the rear cap on the camera to insert the SD memory card.

![](_page_6_Picture_11.jpeg)

Remove the rear cap

![](_page_6_Picture_13.jpeg)

SD memory card slot

#### • Connecting the Power

Connect the power of 12 VDC for the network camera. Connect the positive (+) pole to the `+' position (red) and the negative (-) pole to the `-' position (white) for the DC power.

- Be careful not to reverse the polarity when connecting the power cable.
- A router featuring PoE (Power over Ethernet) can be used to supply power to the camera.
- The heater only operates when using the power source of 12 VDC.
- If using PoE, the heater will not operate.
- If PoE and 12 VDC are both applied, the camera will be supplied with power from PoE.

#### Connecting Service Monitor Port

Service monitor port is used for easy OSD setup. To make changes from the OSD menu, use the optional OSD controller.

![](_page_7_Figure_3.jpeg)

#### ► ID & IP assignment

To make changes in the OSD menu, the optional OSD controller (V920D-OSD) can be used to set Camera Title and IP Address.

- 1. Connect the OSD Controller to the Service Monitor port of the network camera.
- 2. Connect Service Monitor and the Video Output port of the OSD Controller.
- 3. Press the SET button on the controller to access the Main Menu.
- Change camera ID and IP address as needed. Additionally, the Name (or title) of the camera can be changed. Use the ↑↓←→ buttons on the controller to change the parameters.
- 5. Select SAVE or CANCEL to exit the Main Menu.

![](_page_7_Figure_11.jpeg)

The Video Output can also be used for easy zoom and focus control when adjusting the lens. Video Output is restricted to 704x480 (576) resolution.

#### Zoom & Focus Control (Models with motorized lens only)

The camera enters Zoom and Focus control mode when the OSD Controller is connected to the Service Monitor port.

- -. Zoom Control:  $\uparrow$  (Zoom In),  $\downarrow$  (Zoom Out)
- -. Focus Control:  $\leftarrow$  (Focus Near),  $\rightarrow$  (Focus Far)
- -. Fine Focus: Press and hold the SET button for at least 2 seconds. The camera readjusts focus automatically.

*Note:* The optional V920D-OSD OSD Controller can be purchased separately.

### 2.3 Network Connection and IP assignment

The network camera is designed for use on an Ethernet network and requires an IP address for access. Most networks today have a DHCP server that automatically assigns IP addresses to connected devices. By the factory default, your camera is set to obtain the IP address automatically via DHCP server. If your network does not have a DHCP server the network camera will use 192.168.1.100 as the default IP address.

If DHCP is enabled and the product cannot be accessed, run the "Smart Manager" utility on the CD to search and allocate an IP address to your products, or reset the product to the factory default settings and then perform the installation again.

- 1. Connect the network camera to the network and power up.
- 2. Start SmartManager utility (Start>All Programs>SmartManager>SmartManager); the main window displays. After a short while any network devices connected to the network will be displayed in the list.

😣 SmartManager	1	and the local day	Service Married		8.	Connect New rolling	
E File View Help							
P Device Only	P Fiter:		5 2 2	Apply			
9	💋 Model Name	Name	MAC Address	IP Address	Wireless IP Address	Zero Conf. IP	Version
All Devices (1) a)  V9218BRS9M (1) O ONVIF Group	V9218-IR39M	H 264 Network Bullet Cam	AC:DE:48:DD:13:0E	192.168.50.27	0.0.0.0	169.254.105.204	19.41-T4_VICONTest
Ready							CAP NUM SCRL

3. Select the camera on the list and click right button of the mouse. The pop-up menu below displays.

🚷 SmartManager										
File View Help										
Pevice Only	IP Filter:	· · · · ·			Apply					
ļ ,	🗲 Model Name	Name	MAC Addr	ess	IP Address	Wireless IP Address	Zero Conf. IP	Version		
C All Devices (1)	🌠 V921B-IR39M	H.264 Network Bullet C	am AC:DE:48:0	10.12	THE 102 168 50 27	0.0.0.0	169.254.105.204	1.9.41-T4_VICONTest		
₩ V921B-IR39M (1)				-	Remote Setup					
ONVIF					Quick View					
逼 Group				0	Assign IP					
					Maintenance	1				
				t	Upgrade Firmware					
				2	Log In					
Ready				-	Open Web Page			CAP NUM SCRI		
neody					Restore			CAP HOM SCIL		

4. Select Assign IP. The Assign IP window displays. Enter the required IP address.

![](_page_8_Picture_10.jpeg)

**Note:** For more information, refer to the Smart Manager User's Manual.

# 3. Operation

The network camera can be used with Windows® operating system and browsers. The recommended browsers are Internet Explorer®, Safari®, Firefox®, Opera® and Google® Chrome® with Windows.

**Note:** To view streaming video in Microsoft® Internet Explorer, set your browser to allow ActiveX controls.

**Note:** Some screens may appear different (i.e., color scheme) depending on the firmware version, but the functionality is the same or similar.

#### 3.1 Access from a Browser

- 1. Start a browser (i.e., Internet Explorer).
- 2. Enter the IP address or host name of the network camera in the Location/Address field of the browser.
- 3. A starting page displays. Click Live View, Playback or Setup to select corresponding web page.

![](_page_9_Picture_9.jpeg)

4. Click Live View for the network camera's Live View page to appear in the browser.

![](_page_9_Picture_11.jpeg)

### 3.2. Access from the Internet

Once connected, the network camera is accessible on your local network (LAN). To access the network camera from the Internet you must configure your broadband router to allow incoming data traffic to the network camera. To do this, enable the NAT-traversal feature, which will attempt to automatically configure the router to allow access to the network camera. This is enabled from Setup > System > Network > NAT.

For more information, refer to section "3.5.5 System>Network>NAT" of User's Manual.

### 3.3 Setting the Admin Password over a Secure Connection

To gain access to the camera, the password for the default administrator user must be set. Thi s is done in the "Admin Password " dialog, which is displayed when the n etwork camera is accessed for setup th e first tim e. Enter y our admin name and password, set by the administrator.

**Note:** The default admi nistrator username is "ADMIN" an d passwor d is "1234" . If the password is lost, the netw ork ca mera must be reset to the factory default settings. See s ection "3.5 Resetting to the Factory Default Settings" for more details.

![](_page_10_Picture_7.jpeg)

To prevent network eavesdropping when setting the admin password, it can be done via an encrypted HTTPS connection, which requires an HTTPS certificate (see note below).

To set the password via a standard HTTP connection, enter it directly in the first dialog shown below. To set the password via an encrypted HTTPS connection, see "3.5.5 System > Security > HTTPS" of User's Manual.

**Note:** HTTPS (Hypertext Transfer Protocol over SSL) is a protocol used to encrypt the traffic between web browsers and servers. The HTTPS certificate controls the encrypted exchange of information.

#### 3.4 Live View Page

The Live View page provides several screen modes (camera model dependant): 2048x1536, 1920x1080, 1280x1024, 1280x720, 704x480 (576), 640x480, 352x240 (288), and 320x240. Select the most suitable mode in accordance with your PC specifications and monitoring purposes.

![](_page_10_Picture_13.jpeg)

#### 1) General controls

![](_page_11_Picture_2.jpeg)

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Search & Playback Page 🛛 🔯 Setup Page 📝 Help Page

Stream 1 V The video drop-down list allows the selection of a customized or preprogrammed video stream on the Live View page. Stream profiles are configured under Setup > Basic Configuration > Video & Image. For more information, see section "3.5.1 Basic Configuration > Video & Image" of this manual.

The resolution drop-down list allows the selection of the most suitable 1280x720 video resolutions to be displayed on Live View page.

HTTP. The protocol drop-down list allows the selection of the combination of protocols and methods to use depending on your viewing requirements and on the properties of the network.

#### 2) Control toolbar

The live viewer toolbar is available on the web browser page only. It displays the following buttons:

![](_page_11_Picture_12.jpeg)

The Stop button stops the video stream being played. Pressing the key again toggles the start and stop. The Start button connects to the network camera or starts playing a stream.

![](_page_11_Picture_14.jpeg)

The Pause button temporarily stops (pauses) the video stream being played.

![](_page_11_Picture_16.jpeg)

The Snapshot button takes a picture (snapshot) of the current image. The location where image is saved can be specified.

![](_page_11_Picture_18.jpeg)

The Digital Zoom button activates a zoom-in or zoom-out function for the video image on the live screen.

![](_page_11_Picture_20.jpeg)

The Full Screen button causes the video image to fill the entire screen area. No other windows will be visible. Press the 'Esc' button on the computer keyboard to cancel full een view.

![](_page_11_Picture_22.jpeg)

The Manual Trigger button activates a pop-up window to manually start or stop the event.

![](_page_11_Picture_24.jpeg)

The Remote Focus button enables users to adjust focus and zoom remotely via network (motorized lens models only).

![](_page_11_Picture_26.jpeg)

The Fine Focus (one push focus) button readjusts focus automatically to set the focus to the optimum position (motorized lens models only).

#### 3) Video Streams

The network camera provides several image and video stream formats. Your requirements and the properties of your network will determine the type you use.

The Live View page of the network camera provides access to H.264, MPEG-4 and Motion JPEG video streams and to the list of available video streams. Other applications and clients can also access these video streams/images directly, without going via the Live View page.

#### 4) Focus and Zoom Control (Motorized Lens models only)

You can control Zoom and Focus from the Live View screen. Press the obstant button on the left top in the Live View screen to activate the Zoom and Focus control panel.

![](_page_12_Picture_6.jpeg)

• Adjusting Zoom:

Click "<" button to zoom out and click ">" button to zoom in. The focus is moved slightly after adjusting zoom; adjust the focus again, as necessary.

• Adjusting Focus:

Click ">" button for far focus and click "<" button to near focus.

• Fine Focus:

Click "Fine Focus" to fine tune and readjust focus automatically.

Note: Click the 🜐 button in the Live View screen to set the focus to the optimum position.

### 3.5 Resetting to the factory default settings

To reset the network camera to the original factory settings, go to the Setup>System> Maintenance web page (described in "3.5.5 System > Maintenance" of User's Manual) or use the Reset button on network camera, as described below:

![](_page_13_Figure_3.jpeg)

# Using the Reset Button

Follow the instructions below to reset the network camera to the factory default settings using the Reset button.

- 1. Switch off the network camera by disconnecting the power adapter.
- 2. Remove the rear cap of the camera.
- 3. Press and hold the Reset button with a straightened paperclip while reconnecting the power.
- 4. Keep the Reset button pressed for about 2 seconds.
- 5. Release the Reset button.
- 6. The network camera resets to factory defaults and restarts after completing the factory reset. The unit now obtains the IP address automatically via DHCP.
  - 7. Replace the rear cap.
- **CAUTION**: When performing a Factory Reset, you will lose any settings you have saved. (Default IP 192.168.1.100)

#### 3.6 More Information

For more information, refer to the n etwork camera User's manual, which i s available on the CD included in this package.

![](_page_14_Picture_0.jpeg)

Internet Address: www.vicon-security.com

![](_page_14_Picture_2.jpeg)

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