Thank you for choosing a MityCAM-C8000 from Critical Link.

The MityCAM-C8000 Hardware Setup Guide will introduce you to the hardware components of your camera. Once completed, you should be able to follow the MityCAM-C8000 MityViewer Quick Start Guide (included), which will guide you through your first image acquisition using the MityCAM and the MityViewer software application from Critical Link on a PC. Each camera features either a dual Camera Link interface, for use with PC based frame grabber cards, or Gigabit Ethernet, for use with MityViewer, for optimal throughput and complete functionality.

Provided Hardware:
- MityCAM-C8000 Camera
    - CMOSIS CMV8000 sensor board
    - Cyclone V based CPU platform
    - Acquisition electronics
    - Dual Camera Link or Gigabit Ethernet Interface
    - USB 2.0 Image Capture Capabilities (MityViewer Application)
    - Housing for C-mount lens
- USB Cable
- Ethernet Cable (Gigabit Ethernet Models only)
- IO Connector breakout cable
- 100V-240V AC/DC 12V 1.2A (or similar) power adapter and connector
- Standard Lens and EOS to C-mount mounting adapter

Printed Documents:
- MityCAM-C8000 Hardware Setup Guide (this document)
- MityCAM-C8000 MityViewer Quick Start Guide

Software and Documentation:
Available at https://support.criticallink.com/redmine/projects/mityvision/ (account required for downloads)
- MityViewer PC (Windows) software
- MityCAM-C8000 DataSheet
- MityCAM-C8000 Firmware
- MityCAM-C8000 Camera Link Interface
- MityCAM-C8000 User Manual
- MityCAM-C8000 Hardware Setup Guide
- MityCAM-C8000 Mityviewer Quick Start Guide
- Supported Framegrabbers CMV8000

Additional Hardware (not provided):
- Laptop / PC to host the MityViewer software or Camera Link frame grabber

Hardware Setup

Figure 1 – MityCAM-C8000 Camera Link (Left) and Gigabit Ethernet (Right)

1) Ensure that power to the AC/DC adapter is "off" prior to connecting it to the camera.

2) Insert the DC (4-pin) power connector into the "Power" connector on the back panel of the MityCAM-C8000 camera. (Identifier #1)

3) Note that there is an indicator light that can be seen through the fan/fan-grill.

4) Insert the USB cable into the Mini B type connector. (Identifier #2)

5) Thread supplied lens (included lens may vary) into front plate assembly; outlined with red below.

6) (Optionally) You can connect the MityCAM-C8000 camera through the Camera Link or Gigabit Ethernet connectors (Identifier #3). Steps 7 through 18 of this document are for USB image acquisition support only. Please consult the "MityCAM-C8000 Camera Link Interface Document" or "MityViewer Quick Start Guide" (Gigabit Ethernet) for further details.

7) Connect the USB cable to a PC, RNDIS drivers will automatically be installed through Windows update on the PC if necessary. Drivers may be required for Windows XP.

8) Record Kit S/N (Identifier #4). This will be used later in the "MityViewer" application when connecting to the camera.

9) Plug the AC/DC power into an outlet. The fan will turn on immediately followed by a green status LED that can be seen through the fan grill.

10) The following steps were done with Win 7, but Win XP is similar.

11) Your PC should detect the USB RNDIS device (camera) and begin installing/downloading the driver.
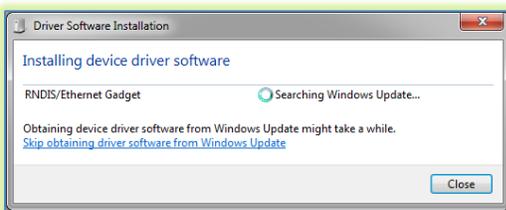
12) Open the Network Connections dialog; it may be found by selecting Control Panel -> Network and Internet -> Network Connections.

13) Select and 'right-click' the "USB Ethernet/RNDIS Gadget #X" icon (underlined in red) and then select "Properties" from the pop-up menu.

14) Select "Internet Protocol Version 4 (TCP/IPv4) and then press the "Properties" button.
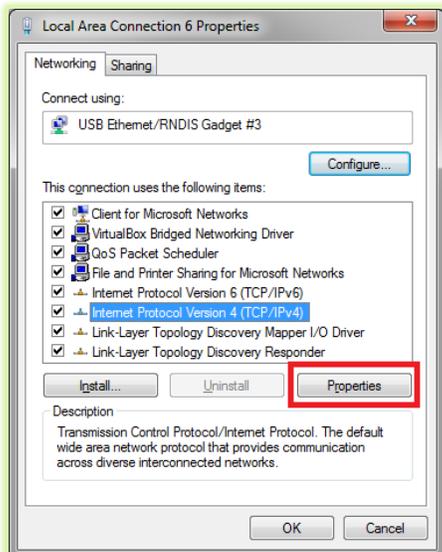
15) Enable static IP for the USB by NIC by setting the following parameters:
   a. Select "Use the following IP address"
   b. Enter IP address: 10.1.47.1
   c. Enter subnet mask 255.255.255.0
   d. Leave Default Gateway blank
   e. Select "Use the following DNS server addresses" radio button and leave blank
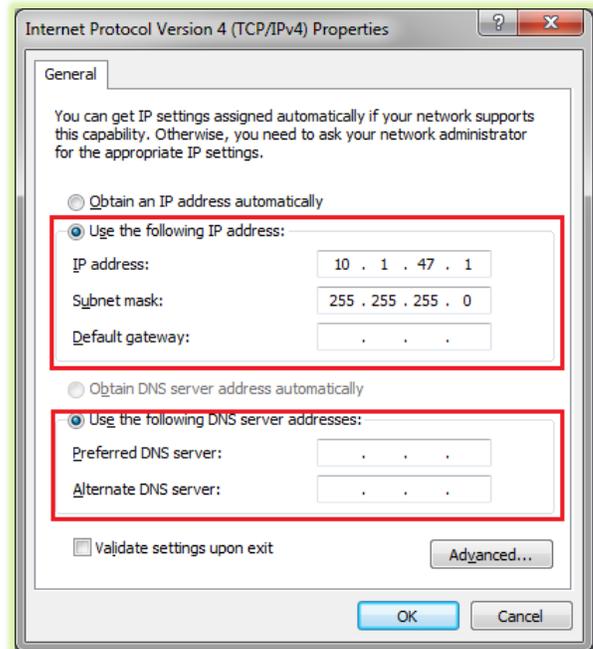
16) The USB RNDIS device is now configured for use with the MityCAM-C8000. Note that you can connect to the camera using SSH and SCP protocols. The User Name is "root" and there is no password by default.

17) Note that the "I/O" connector (Identifier #5) is currently not used, but a flying lead assembly is available separately; please contact your Critical Link account representative for details.

18) Please continue on to the "MityCAM-C8000 MityViewer Quick Start Guide" to setup the software for your first image acquisition.

Thank you!

MityCAM-C8000

Hardware Setup Guide

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