



Powering connections

Mobility Router 4000 Series Hardware Installation Guide

November, 2020

Trademarks

© Copyright 2020, Mitel Networks Corporation. All Rights Reserved. The Mitel word and logo are trademarks of Mitel Networks Corporation. Any reference to third-party trademarks is for reference only and Mitel makes no representation of ownership of these marks.

Patents

Mobility Router 2000 is covered by patents as listed at <https://www.mitel.com/legal/patents>.

Version Information

Mobility Router 2000 Series Hardware Installation Guide

Date: September 2017

Company Information

Mitel Networks Corporation

4000 Innovation Drive

Kanata, Ontario K2K 3K1

Canada

+1 613 592 2122

Mobility Router 4000 Installation

1.1 Overview

This Hardware Installation Guide provides the following instructions for installing and initially configuring the Mobility Router 4000.



Tip

Visit <https://www.mitel.com/document-center> to view related Mobility Router documentation.

This document is intended for network administrators who install and manage network equipment, and contains the following sections:

- “Specifications” on page 2
- “Unpacking a Mobility Router” on page 4
- “Installation Requirements and Recommendations” on page 5
- “Installing the Mobility Router” on page 6
- “Connecting to the Network” on page 7
- “Connecting to the Console Port” on page 8
- “Connecting Power” on page 9
- “Using the Initial Configuration Wizard” on page 10

1.2 Specifications

The Mobility Router is one rack unit (RU) high and installed in a standard 19-inch (48.26-cm) rack.

Figure 1-1. Front View of RoamAnywhere Mobility Router 4000 Series



Figure 1-2. Rear View of RoamAnywhere Mobility Router 4000 Series

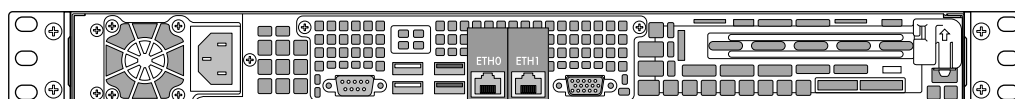


Table 1-1 Mobility Router Connection Specifications

Model	Port	Connection
Mobility Router 4000 Series	Ethernet	1 ea. ETH0
		1 ea. ETH1
	Console	Serial

Table 1-2 Mobility Router Power Specifications

Model	Power Supply
Mobility Router 4000 Series	100-240 VAC (auto-range), 200 W, 3A, 50-60 Hz

Table 1-3 Mobility Router Physical Specifications

Model	Dimensions (WxHxD)	Weight
Mobility Router 4000 Series	16.8 x 1.7 x 14 inches (427 x 43 x 356 mm)	17.7 lb (7.7 kg)

Table 1-4 Mobility Router Operating Environment

Model	Temperature	Humidity
Mobility Router 4000 Series	Operating: 10° to 35° C (50° to 95° F) Non-operating: -40° to 70° C (-40° to 158° F)	Operating: 8% to 90% (non-condensing) Non-operating: 5 to 95% (non-condensing)

Table 1-5 Status LEDs

LED	Appearance	Meaning
Power	On continuously	Indicates that power is supplied to power supply unit.
Hard drive activity	Blinking yellow	Indicates hard drive activity.
LAN activity (eth1)	Blinking	Indicates network activity on the eth1 port.
LAN activity (eth0)	Blinking	Indicates network activity on the eth0 port.
Overheating/fan failure	Blinking	Indicates fan failure.
	On continuously	Indicates that the Mobility Router is overheated.

Regulatory compliance:

- **Electromagnetic Emissions:** FCC Class A, EN 55022 Class A, EN 61000-3-2/-3-3, CISPR 22 Class A
- **Electromagnetic Immunity:** EN 55024/CISPR 24, (EN 61000-4-2, EN 61000-4-3, EN 61000-4-4, EN 61000-4-5, EN 61000-4-6, EN 61000-4-8, EN 61000-4-11)
- **Safety:** CSA/EN/IEC/UL 60950-1 Compliant, UL or CSA Listed (USA and Canada), CE Marking (Europe)

1.3 Unpacking a Mobility Router

The carton for a Mobility Router contains the following:

- One Mobility Router
- End-user license agreement (EULA)
- One power cord
- One serial cable for serial console connection
- One straight-through Ethernet cable
- A copy of this document

Before starting the installation:

- 1** Open the carton and remove the contents.
- 2** If any contents are missing or damaged, contact Technical Support at +1.408.962.4550 or <https://www.mitel.com/support>.
- 3** Keep the packing materials and save the carton.

1.4 Installation Requirements and Recommendations

Before installing a Mobility Router, follow these requirements and recommendations.

1.4.1 Installation Location Guidelines

The Mobility Router should be installed in an environment sufficient for normal operation of network appliances (50-95°F). Make sure that the area allows for enough ventilation after the Mobility Router is installed. The appliance should be installed in an area that does not exceed the following humidity range: 8-90% non-condensing.

1.4.2 Rack Requirements

The Mobility Router must be installed in a standard 19-inch rack. Make sure that the Mobility Router is installed in the rack so that the Mobility Router is level in the rack and is fastened by screws on both sides. Refer to [“Installing the Mobility Router” on page 6](#) for installation instructions.

1.4.3 Required Equipment for Installation

The following equipment is required for rack installation (and depends on the type of rack):

- Mounting screws to rack mount the Mobility Router (not provided)
- Screwdriver (not provided)

1.4.4 Uninterruptible Power Supply

We recommend installing the Mobility Router in an existing Uninterruptible Power Supply (UPS) infrastructure.

1.5 Installing the Mobility Router

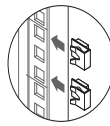
Required Tools:

- 4 each “cage” type mounting nuts (not included)
- 4 each Pan Head screws, typically 10-32 thread size (not included)

To connect the Mobility Router to the rack:

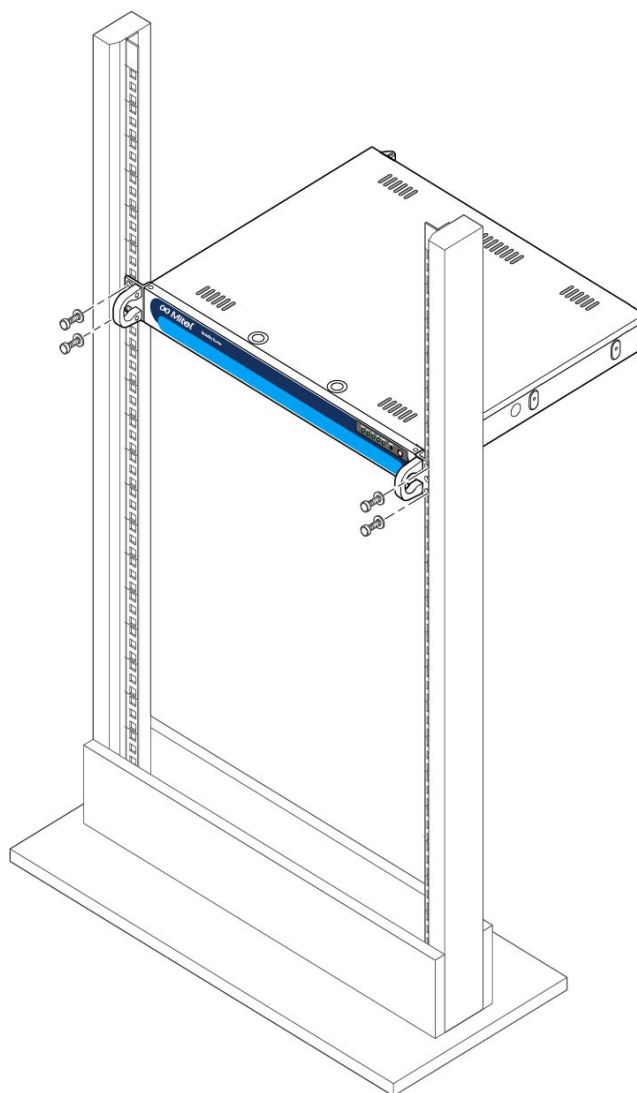
- 1 Snap the mounting nuts into the rack at the desired mounting point.

Figure 1-3. Insert Mounting Nuts into Rack



- 2 Lift the Mobility Router to the desired rack position.
- 3 Install each Pan Head screw through the Mobility Router's mounting ears into the mounting nuts.

Figure 1-4. Fastening the Mobility Router to the Rack



- 4** Tighten to 30 inch-lbs. Do not over-tighten.

1.6 Connecting to the Network

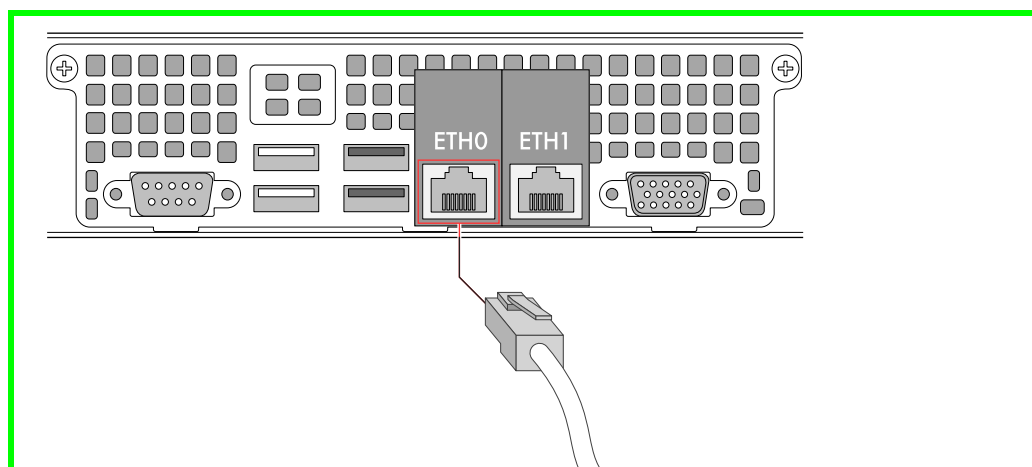
Connect the Mobility Router to a network device, such as a switch, using the straight-through Ethernet cable provided with the Mobility Router.

To connect the Mobility Router to the network:

- 1 Insert one end of the Ethernet cable to the network device.
- 2 Insert the other end of the Ethernet cable to the left Ethernet port (ETH0) on the rear of the Mobility Router.

NOTE If using the Secure Remote Voice feature, connect the second Ethernet port (ETH1) to the external network.

Figure 1-5. Connecting the Ethernet Cable to the Mobility Router



1.7 Connecting to the Console Port

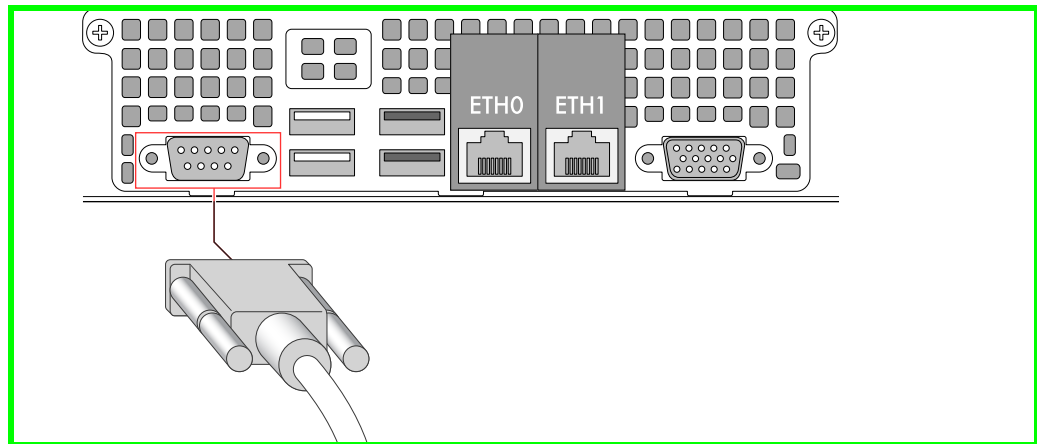
The Mobility Router uses a serial console port to provide a direct connection to the command-line interface (CLI) Wizard for initial configuration the Mobility Router. After completing the initial configuration, access to the console port is no longer necessary.

To initially configure the Mobility Router, connect the management PC or laptop to the serial console port of the Mobility Router. If there is no serial port, use a 9-pin serial to USB adapter to connect to the serial cable.

To connect the PC or laptop to the serial console port:

- 1** Insert one end of the serial cable into the PC or laptop serial port.
- 2** Insert the other end of the cable into the serial console port of the Mobility Router.

Figure 1-6. Connecting to the Serial Console Port



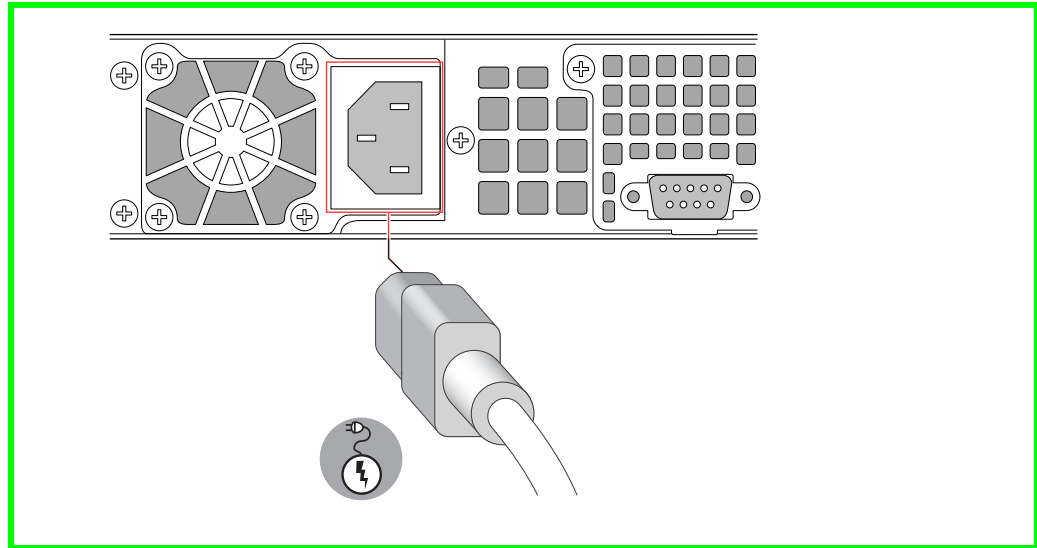
- 3** On the PC or laptop, start terminal emulation software (such as Microsoft HyperTerminal) and select the appropriate COM port.
- 4** Configure the port using the following settings:
 - Baud rate: 9600 bps
 - Data bits: 8
 - Parity: None
 - Stop bits: 1
 - Flow control: None

1.8 Connecting Power

To connect AC power:

- 1 Insert the female end of the power cord into the back of the Mobility Router.
- 2 Connect the other end of the power cord into an appropriate AC power source.

Figure 1-7. Connecting Power



- 3 The Mobility Router automatically powers on. As the Mobility Router starts up, messages display in the terminal emulation software window. Use the initial configuration wizard to initially configure the Mobility Router with [“Using the Initial Configuration Wizard” on page 11](#).

1.9 Using the Initial Configuration Wizard

In the terminal emulation software window, use the initial configuration wizard to initially configure the Mobility Router. After initially configuring and restarting the Mobility Router, access the RoamAnywhere Administration Portal to configure, manage, monitor, and troubleshoot the Mobility Router.



Tip

You can use the USB ports to connect a USB mouse and/or keyboard to assist in configuration.

Before starting the wizard, have the following information available:

- Mobility Router hostname
- If not using DHCP:
 - Mobility Router IP address
 - Subnet mask
 - Default gateway for Mobility Router
 - IP address of primary DNS server
 - Domain name for the Mobility Router
- Password for administrative access to Mobility Router

To use the initial configuration wizard:

- 1** At the login prompt, type `admin` and press **Enter**.
 - 2** When prompted to accept the End User License Agreement, enter `YES` to accept. The initial configuration wizard starts.
 - 3** Enter `Y` to use the wizard.
 - 4** Enter the DNS hostname of the Mobility Router. The hostname can be in short-name format or a fully qualified domain name.
 - 5** At the 'Use DHCP on ETH0' interface prompt, do one of the following:
 - To use DHCP, enter `Y`, and go to Step 11.
 - Enter `N` if DHCP is not desired. Continue to step 6.
- NOTE** We recommend using a static IP address so that the IP address of the Mobility Router does not change. If using DHCP, make sure to reserve an IP address for the Mobility Router.
- 6** Enter the Mobility Router's primary IP address.

NOTE A secondary IP address can be configured using the Administration Portal.
 - 7** Enter the subnet mask in the format of a 32-bit mask or classless interdomain routing (CIDR) notation.
 - 8** Enter the IP address of the default gateway for the Mobility Router.

- 9** Enter the IP address of the primary DNS server.
- 10** Enter the domain name in the format *domain-name.com*. This suffix is appended to all DNS queries.
- 11** Assign a password to the default Admin account for future access to the RoamAnywhere Administration Portal.

NOTE We do not recommend leaving the password field blank.
- 12** Confirm the password for the default Admin account.
- 13** After completing the initial configuration wizard, a summary list of the information appears.

To make any changes, enter the number associated with the line to be changed. Verify the information and press **Enter** to save the configuration.
- 14** At the prompt, enter *enable*.
- 15** Enter *reload* to restart the Mobility Router. Wait for the login prompt in the terminal emulation software window, which indicates that the Mobility Router has finished restarting.
- 16** Verify a network connection to the Mobility Router can be established by accessing the Administration Portal. To access the Administration Portal, enter the Mobility Router hostname or IP address in a Web browser:

`http://hostname.domain.com/adm`

`http://a.b.c.d/adm`
- 17** After verifying access to the Administration Portal, disconnect the serial cable. (Console access is no longer required.)

The Mobility Router is now ready to be configured using the Administration Portal. For more information, see the *RoamAnywhere Mobility Router Administrator's Guide*.