

RV Peplink MAX BR1 Pro 5G & Poynting “Badger” 4x4 MIMO Antenna Quick Setup Guide

TS007109

Setup overview

The RV Peplink MAX BR1 Pro 5G converts cellular internet data to WiFi signal that can be used by laptops, tablets, smart TVs, and other WiFi-enabled devices.

The Poynting “Badger” 4x4 MIMO antenna is a dual antenna that both *receives* cellular signal from cell towers and *broadcasts* WiFi signal throughout your RV, motorhome, motor coach, fifth wheel, trailer, or van.

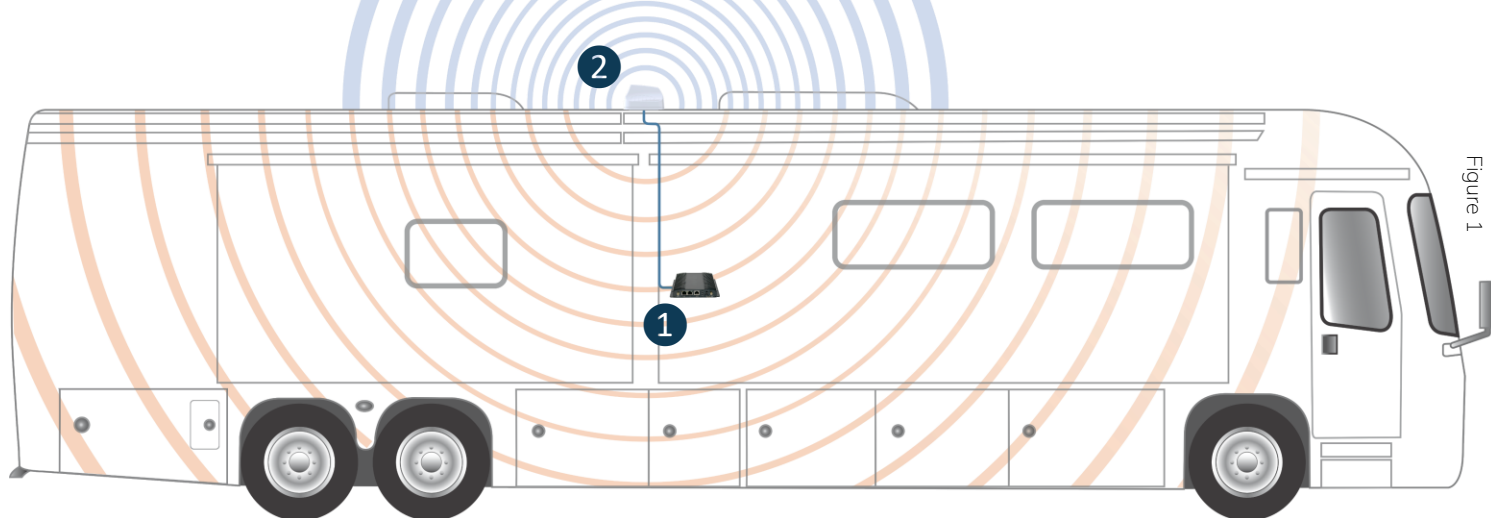


Figure 1

1 Router

The **Peplink MAX BR1 Pro 5G** (Figure 2) converts cellular signal into WiFi. It must be installed where it has access to a 120V AC power socket (or the RV's battery terminals, if using the optional 12V DC hardwire power supply). It must also be installed close enough to the entry point for the Poynting antenna's cables to reach the router.



Figure 2

2 Antenna

The **Poynting MIMO-3-17 “Badger” 7-in-1 4x4 MIMO** antenna (Figure 3) receives cellular and GPS signals and transmits WiFi signal. It has a 6.6' bundle of seven thin coax cables that attach to the Peplink router; the entry point for these cables must be close enough to reach the router inside your RV or trailer.

The Poynting Badger antenna mounts on the roof of your RV or trailer with one of two mounting options:

1. The **spigot mount** attaches through a 0.9" (22 mm) hole, using either the 0.4" (10 mm) or 2.0" (50 mm) two-piece threaded spigot post and nut. This option requires a drilled entry point in the roof below the center of the antenna to run the coax cables.
2. The **surface mount** attaches securely to the roof with the double-sided foam adhesive pad. This option uses a rear-exit channel for the coax cables.



Figure 3

Quick Setup continued:

Kit contents

Peplink router



Peplink MAX
BR1 Pro 5G
router



AC/DC
wall outlet
power supply



4 x LTE
paddle antennas
(flat end)
(not used)



2 x WiFi
paddle antennas
(rounded end)
(not used)



Active GPS
antenna with
15' coax cable
(not used)

Tip:

Keep the product documentation and (if possible) the packaging from the manufacturer. These have important information for technical support and reordering.

Poynting antenna



Poynting
MIMO-3-17
"Badger" 4x4
antenna



10 mm
spigot



80 mm
spigot



Spigot
nut



Spigot
seal



Adhesive
foam pad



Adhesive
foam discs
(x6)



Cable clips
(x2)



SMA-female to
RP-SMA-male
adapters (x2)



M4 x 12 mm
screws (x2)

Jumper cables



18" SMA-female
to RP-SMA-male
coax cables (x2)

Quick Setup continued:

IMPORTANT!

Before drilling or mounting your Poynting antenna, We *strongly* recommend that you do a “soft installation” in your RV, trailer, or van:

Place the antenna on the roof of your vehicle and bring the cables in through an open window or door. Connect the antenna to the router, then power up the router. Check the WiFi signal you receive inside your vehicle. If necessary, adjust the locations of the antenna and router.

After you are satisfied that the router and antenna perform to your expectations, then proceed to permanently install the components.

For specific information about installing the Poynting MIMO-3-17 antenna, follow the manufacturers’ instructions in the user guide included with your antenna.



Poynting “Badger” antenna setup (general information)

The Poynting MIMO-3-17 “Badger” 7-in-1 4x4 MIMO antenna is installed to a flat surface on the roof of your RV or trailer. It should be mounted in a vertical position with as much clearance from other roof-mounted items (like an air conditioning unit) as possible.

There are two options for installing the Poynting antenna:

A Spigot mount (see *User Guide*, pp. 7–9)

The most secure and efficient way to install your antenna is by drilling a 0.9” (22 mm) hole in the roof of your RV or trailer with a metal hole saw, inserting one of the two spigots included with the antenna, and threading the coax cable bundle through the spigot into your vehicle to attach to the router. (Figure 4)

Download and print the drilling template from powerfulsignal.com/badger-template

Helpful sample installation videos are available at powerfulsignal.com/badger-video-1 and powerfulsignal.com/badger-video-2

Do not pinch, kink, loop, or coil the cables.



Figure 4

B Surface mount (see *User Guide*, p. 10)

This option is available if you already have an entry point in your vehicle that will accept the cable bundle. The antenna attaches to the top of your RV or trailer with a strong adhesive foam pad. The cable bundle runs through the channel on the bottom of the antenna and out the back. (Figure 5)

Place the antenna as close to the entry point as possible so you’ll have the maximum length of cable available inside your RV or trailer to reach the router.

Do not pinch, kink, loop, or coil the cables.



Figure 5

Quick Setup continued:

Peplink MAX BR1 Pro 5G router setup

1 Install your SIM card

- Use a small Phillips screwdriver to loosen the **Cellular SIM cover** at the end of the router. Rotate the cover to expose the SIM slots. (Figure 6)
- Insert an activated nano SIM card into **Slot A**, beveled corner first and the gold circuit side facing down. Push the card into the slot with your fingernail until it clicks into place. (Figure 7)
*If you use a second card in **Slot B**, insert it beveled corner first with the gold circuit side facing up. Push until it clicks into place.*
- Rotate the Cellular SIM cover back into position over the SIM slots. Hand-tighten the cover with a Phillips screwdriver.



Figure 6



Figure 7

2 Attach the antenna connectors (Figure 11)

- Attach the Poynting antenna's four purple LTE connectors to the router's threaded **Cellular A** through **Cellular D** connectors and hand tighten them. (Figure 8)
- Attach the Poynting antenna's blue GPS connector to the router's threaded **GPS** connector and hand tighten it.
- Attach the SMA-female ends of the 18" jumper cables to the Poynting antenna's two green WiFi connectors. Attach the RP-SMA-male ends of the jumper cables to the router's threaded **Wi-Fi Antenna A** (left) and **Wi-Fi Antenna B** (right) connectors and hand tighten them. (Figure 9)



Figure 8



Figure 9

3 Power up the router

- Connect the power supply to the router's **DC IN** port. (Figure 10) The release clip must be facing up for the connector to click into place. Plug the other end of the power supply into an AC wall outlet.
- Once the router is connected to a power source, the **Status** light will turn red. Within 3 to 5 minutes, all three lights—**Status**, **Wi-Fi**, and **Cellular**—should turn green, indicating that the router is functioning properly.



Figure 10

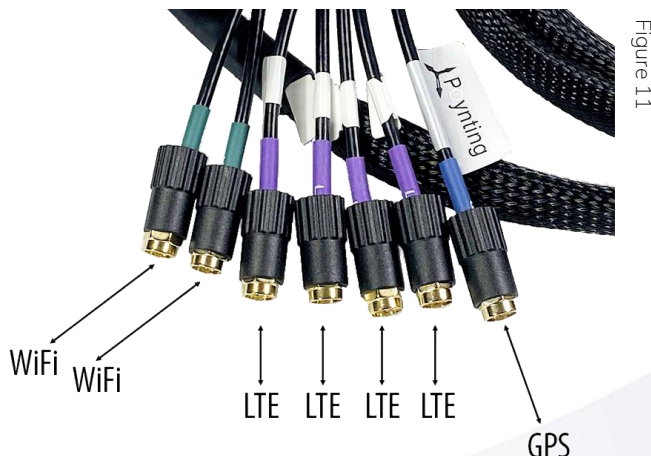


Figure 11

Quick Setup continued:

4 Connect to the router's default WiFi network

- Open the WiFi settings on your computer, tablet, or smartphone. Find and connect to the **PEPLINK_xxxx** network, where xxxx is the last 4 digits of the router's serial number found on the label on the bottom of the router. (Figure 12)
- Use the **AP Password** on the label on the bottom of the router to connect to the WiFi network. The password is all uppercase with no dashes or spaces.

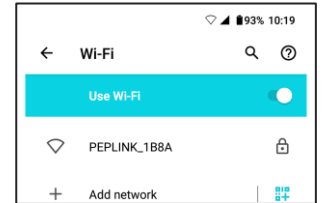


Figure 12

5 Log into the router and change the passwords

The router is administered through a web-based dashboard.

- Open a web browser (like Google Chrome, Apple Safari, Mozilla Firefox, or Microsoft Edge) on your computer, tablet, or smartphone. In the address bar at the top of the browser, type **192.168.50.1** and press *Enter*. (The browser may warn you that you're connecting to an insecure link; allow it to proceed anyway.)
- At the Peplink login screen (Figure 13), enter the default username **admin** and default password **admin** and click *Login*. Both entries are lowercase.
- You'll be prompted to change the password you'll use to log into the dashboard and administer the router. (Figure 14) Choose a strong password (passwords-generator.org can help), write it down, and keep it in a secure place. Do not give this password to anyone.
- You'll next be prompted to change your WiFi AP password. (Figure 15) This is the password you'll use to connect computers, tablets, and smartphones to the router's WiFi network. Choose a strong password; share it only with others who are authorized to use your WiFi network (which is created from your cellular data plan).
- After you change the WiFi AP password, the router will reboot, and your device will be disconnected from the WiFi network. Open the WiFi settings on your device and remove (or "forget") the Peplink network. (See powerfulsignal.com/forget for instructions on how to do this.)
- After the router has rebooted (see Step 3), connect your device to the Peplink WiFi network using your new WiFi AP password (see Step 4).

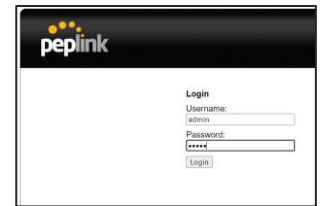


Figure 13

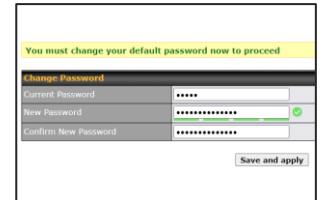


Figure 14

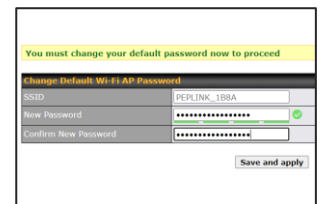


Figure 15

Advanced settings & resetting your router


- Advanced router settings are available via the router's web-based dashboard. Connect your device to the router's WiFi network, open a web browser, and go to **192.168.50.1**. Log in with the admin password you created in Step 5.
Modify these settings only if you are familiar with them and how they work.
- To perform a factory reset on your router, insert the opened end of a paperclip into the hole above the  symbol next to the power connector. (Figure 16) Push the paperclip into the hole and hold it there until the **Wi-Fi** and **Cellular** lights have gone out and the **Status** light has turned solid red. The router will reboot in its original, default configuration; follow the instructions in Steps 4 and 5 to set it up again.



Figure 16