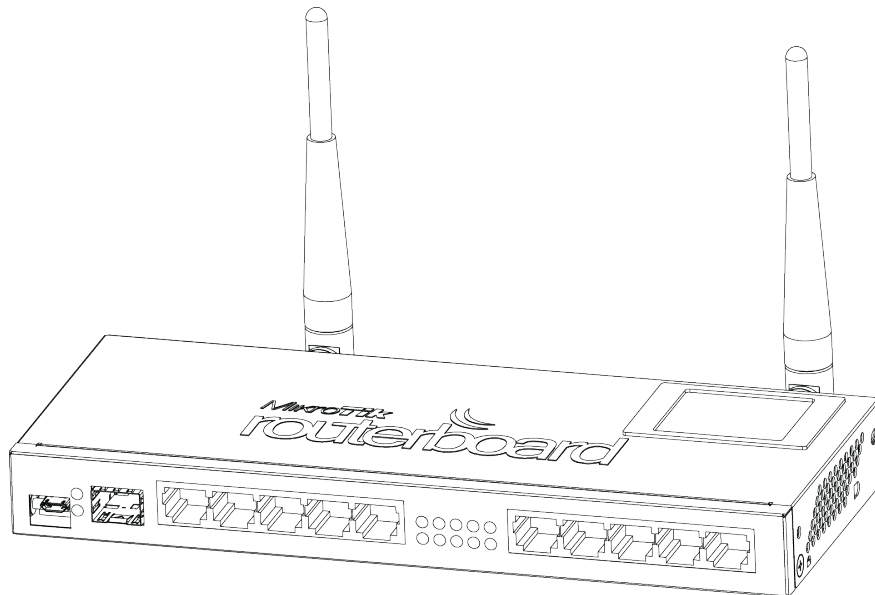


RouterBOARD 2011U series

Quick Setup Guide and Warranty Information

The RB2011 is a small form factor ethernet router with 5 Gigabit Ethernet ports and 5 Fast Ethernet ports. The RB2011U series includes four models **RB2011UAS-IN** (USB, SFP, indoor case), **RB2011UAS-RM** (USB, SFP, rackmount), **RB2011UAS-2HnD** (adds wireless functionality) and **RB2011UAS-2HnD-IN** (adds indoor case and indoor antennas).



First use

The device comes preinstalled with RouterOS and is ready to use. RB2011 is compatible with RouterOS v5.9 and newer, if your device comes preinstalled with an earlier version, please upgrade before using it.

The Ethernet ports 2-10 have a default IP address for connecting: **192.168.88.1** username is **admin** and there is **no password**. Please connect with your web browser to this IP address and choose Webfig to configure it. **Ether1** is configured as a DHCP client, for connecting to your ISP.

See this page for connection and configuration guides: <http://wiki.mikrotik.com/wiki/Category:Manual>

Powering

The device accepts powering from either the power jack, or from the LAN1 Ethernet port:

- Direct-input power jack (5.5mm outside and 2mm inside diameter, female, pin positive plug) accepts 8-30V DC (overvoltage protection starts at 30V).
- Eth1 port accepts 8-30V DC input (at the board; higher voltage needed to compensate for power loss on long cables) from non-standard (passive) Power over Ethernet injectors. The board **does not** work with IEEE802.3af compliant 48V power injectors
- The IN and RM models include a 110/220V PSU which is already plugged into the power jack inside the case

Extension Slots and Ports

- Five 10/100/1000 (Gigabit) Ethernet ports (Auto MDI/X)
- Five 10/100 (Fast) Ethernet ports (Auto MDI/X)
- One 8-30V DC power jack
- SFP port for SFP module (module not included)
- *(on RB2011US-2HnD-IN) built in 2GHz wireless device with external antennas, 802.11 b/g/n modes supported.*

Resetting the device

In case you wish to return the device to its original configuration, you can use the RESET button (image Reset1). Hold this button during boot time until LED lights start flashing, then release the button to **reset RouterOS configuration**. You can use this procedure if you have forgotten the password to access the device, or simply wish to return the unit to its default configuration state.

Buttons and Jumpers

- RouterBOOT reset button (back side of the case) has several functions:
 - ✓ Hold the button before powering on the device, and at power up, the button will force load the backup boot-loader. Continue holding the button for the other two functions of this button:
 - ✓ Release the button when green LED starts flashing, to reset RouterOS configuration. To not load backup boot-loader, you can start holding the button after power is already applied
 - ✓ Release the button after LED is no longer flashing (~20 seconds) to cause device to look for Netinstall servers (required for reinstalling RouterOS over network)
- RouterOS reset jumper hole (bottom of the case): **resets RouterOS** software to defaults. Hold screwdriver pressed to this reset hole, and boot the device. Hold screwdriver in place until RouterOS configuration is cleared (10 seconds).

Operating System Support

Currently tested operating system is MikroTik RouterOS (starting from version 5.9).

Warranty

Copyright and Trademarks. Copyright MikroTik SIA. This manual contains information protected by copyright law. No part of it may be reproduced or transmitted in any form without prior written permission from the copyright holder. RouterBOARD, RouterOS, RouterBOOT and MikroTik are trademarks of MikroTik SIA. All trademarks and registered trademarks appearing in this manual are the property of their respective holders.

Hardware. MikroTik warrants all RouterBOARD series equipment for the term of fifteen (15) months from the shipping date to be free of defects in materials and workmanship under normal use and service, except in case of damage caused by mechanical, electrical or other accidental or intended damages caused by improper use or due to wind, rain, fire or other acts of nature.

To return failed units to MikroTik, you must perform the following RMA (Return Merchandise Authorization) procedure. Follow the instructions below to save time, efforts, avoid costs, and improve the speed of the RMA process.

1. If you have purchased your product from a MikroTik Reseller, please contact the Reseller company regarding all warranty and repair issues, the following instructions apply **ONLY** if you purchased your equipment directly from MikroTik in Latvia.
2. We do not offer repairs for products that are not covered by warranty. Exceptions can be made for RB1000, RB1100 and RB1200.
3. Out-of-warranty devices and devices not covered by warranty sent to MikroTik will be returned to the sender at sender's cost.

RMA Instructions are located on our webpage here: <http://rma.mikrotik.com>

Manual. This manual is provided "as is" without a warranty of any kind, expressed or implied, including, but not limited to, the implied warranty of merchantability and fitness for a particular purpose. The manufacturer has made every effort to ensure the accuracy of the contents of this manual, however, it is possible that it may contain technical inaccuracies, typographical or other errors. No liability is assumed for any inaccuracy found in this publication, nor for direct or indirect, incidental, consequential or other damages that may result from such an inaccuracy, including, but not limited to, loss of data or profits. Please report any inaccuracies found to support@mikrotik.com

Federal Communication Commission Interference Statement

(FCC ID: TV7RB2011-2HND)

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation.

This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

FCC Caution: Any changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate this equipment.

This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions: (1) This device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

This device and its antenna must not be co-located or operation in conjunction with any other antenna or transmitter.

IMPORTANT: Exposure to Radio Frequency Radiation.

20 cm minimum distance has to be maintained between the antenna and the occupational user and 45 cm to general public. Under such configuration, the FCC radiation exposure limits set forth for a population/uncontrolled environment can be satisfied.