

DIGI INTERNATIONAL

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XBee XR 868 Release Notes

XBee XR 868

Version A003 - (February 28, 2025)

INTRODUCTION

These release notes document changes made to the DigiMesh firmware on the XBee XR MMT 868 modules.

- Product Information
- Documentation
- Support

SUPPORTED PRODUCTS

- XBee-XR868 XBee XR 868 MHz radio module
 - Micro (MMT)

KNOWN ISSUES

- 1. The Diagnostic counts for transmissions (**EA** and **TR**) are not always as expected because sometimes there is an extra network retry. [XBHAWKDM-200]
- 2. The FT flow control threshold may not be calculating number of bytes properly. If FT is set to too low of a value (less than 0x20), CTS will assert indefinitely. [XBHAWKDM-611]
- 3. Duplicate packets can occur if streaming unicast data across multiple synchronous sleep cycles. [XBHAWKDM-739]

UPDATE CONSIDERATIONS

XCTU (XBee Configuration and Test Utility) is recommended for updating the firmware of your radio module to the latest firmware version: www.digi.com/xctu

The following files are included in XBee XR 868 firmware releases:

- Firmware
 - .gbl: Firmware image for OTA/serial updates. This image will also upload the bootloader if the
 included version is newer than what is currently installed on the device. It is recommended to use
 this file for most updates.
 - apponly.gbl: Firmware image for serial updates, excluding bootloader updates. This image contains
 the firmware, but no bootloader upgrade data. This image may be used when a bootloader
 upgrade is not desired. Note that it is not recommended to use any firmware image with a
 bootloader version older than what the image was released with.
- Configuration
 - .mxi: Legacy X-CTU configuration file
 - .xml: XCTU-NG configuration file

UPDATE BEST PRACTICES

Digi recommends the following best practices:

- 1. Test the new release in a controlled environment with your application before you update production devices.
- 2. Unless otherwise noted, apply updates in the following order:
 - 1. Device firmware
 - 2. Modem firmware
 - 3. Configuration
 - 4. Application

Digi recommends Digi Remote Manager for automated device updates. For more information, go to https://www.digi.com/products/iot-software-services/digi-remote-manager.

TECHNICAL SUPPORT

Get the help you need via our Technical Support team and online resources. Digi offers multiple support levels and professional services to meet your needs. All Digi customers have access to product documentation. firmware, drivers, knowledge base and peer-to-peer support forums.

Visit us at https://www.digi.com/support to find out more.

CHANGE LOG

A003 - XBee XR 868 (February 28, 2025)

- This is a recommended release
- Bootloader version: 1.11.9
- Hardware revisions
 - XB-8XR-DMUT, XB-8XR-DMUS, XB-8XR-DMST, XB-8XR-DMRS, XB-8XR-DMCS
 - Rev A
 - XB-8XR-DMUM, XB-8XR-DMRM
 - Rev B

NEW FEATURES

• N/A

ENHANCEMENTS

• N/A

SECURITY FIXES

N/A

BUG FIXES

• Lowered the LBT threshold to -80 dBm

A002 - XBee XR 868 (March 15, 2024)

- This is a recommended release
- Bootloader version: 1.11.9
- Hardware revisions
 - XB-8XR-DMUT, XB-8XR-DMUS, XB-8XR-DMST, XB-8XR-DMRS, XB-8XR-DMCS
 - Rev A
 - XB-8XR-DMUM, XB-8XR-DMRM
 - Rev B

NEW FEATURES

N/A

ENHANCEMENTS

 Reduced the power on reset startup time to 300 ms and soft reset startup time to 150 ms [XB3LR868-125]

SECURITY FIXES

N/A

BUG FIXES

• N/A

A001 - XBee XR 868 (August 25, 2023)

- This is a recommended release
- Bootloader version: 1.11.7
- Hardware revisions
 - XB-8XR-DMUT, XB-8XR-DMUS, XB-8XR-DMST, XB-8XR-DMRS, XB-8XR-DMCS
 - Rev A
 - XB-8XR-DMUM, XB-8XR-DMRM
 - Rev B

NEW FEATURES

• N/A

ENHANCEMENTS

• Added support for rev B hardware variant.

SECURITY FIXES

• N/A

BUG FIXES

- Fixed a bug that could cause the module to enter the bootloader, requiring a power cycle to recover when attempting to update from version A000 to an invalid firmware image. Care should be taken when upgrading from version A000 to only use a valid XR 868 firmware image. [XB3LR-206]
- Fixed a bug that caused the module to experience reduced receive senstivity after waking from sleep. [XB3LR868-122]
- Fixed a problem with MAC ACKs being ignored on the sender. This caused a successful transmission to report an error in the transmission status that indicated that no MAC ACK message was received. The fix allows the sender to recognize received MAC ACKs and to report success in the transmission status. [XBX-465]

A000 - XBee XR 868 (September 30, 2022)

- This is the initial release
- Bootloader version: 1.11.7
- Hardware revision A

NEW FEATURES

• N/A

ENHANCEMENTS

N/A

SECURITY FIXES

• N/A

BUG FIXES

N/A

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