# M-Bus Master MA Wireless M-Bus

#### DEVICE

The mains powered M-Bus master LAN-WMBUS-MA is a plug-and-play Wired M-Bus to Wireless M-Bus converter to read out Wired M-Bus meters and transmit the data wirelessly using the Wireless M-Bus protocol. The device is mounted with an AC/DC-adapter in combined enclosure.

#### **ANTENNA**

The repeater can either make use of two high performance internal antennas or one external antenna, depending on the model. to take advantage of both horizontal and vertical polarizations for maximum range while minimizing multipath problems. The antenna diversity is important to prevent losses due to different polarization, especially indoors.

Models with external SMA interface are suited when large antennas are desirable to cover larger areas or long distances.

#### STATUS MESSAGE

The device will, as default, on regular interval transmit a status message containing information of the current M-Bus load, number of connected meters, overloads, supported meters etc.

#### **FIRMWARE**

MODE T1

READ OUT INTERVAL Refer technical document

ENCRYPTION Default AES128 encryption OMS 5. Profile A

MBUS DATA Refer technical document

# POWER/LIFETIME

POWER SUPPLY 230 VAC

RADIO 14 dBM (25mW) output power to antennas

ANTENNAS Two antennas for true differential transmission or

one external antenna

MAXIMUM LOADS

MA-16 16 mbus loads MA-64 32 mbus loads

STANDARDS 2014/53/EU (RED)

**GENERAL INFORMATION** 

EN 13757-3/4:2013, OMS 4.0.2

EN61000-6-2:2005 EN61000-6-1:2007

MATERIAL RAL 9003 (signal white)

IP 67

SIZE (W x H x D) 150 x 150 x 53 mm

CONNECTOR 2 cable srew mount connectors

INDICATION LED Power (green), TX (blue), RX (green), overload (red)

### **USAGE**

When the device is powered up the devices starts scanning the M-Bus for connected meters. It search for secondary addresses on baudrate 2400 (other baudrate on request).

Each time a device is found, a short sound will be heard. After the scanning is completed, the device will make short sounds as many times as there are number of devices found. The maximum number of devices supported depends on the model. It is possible to trigger a new search by using a magnet and hold it by the reed contact where the label of the device is located.

The search takes about 5-10 minutes, depending on number of meters on the bus. After the search have been completed, the device will ask each meter every X minutes for new data and transmit the recieved data using the Wireless MBUS protocol using the long packet format (0x72). The device by default encrypts all payloads.



## DEVICES

LAN-WMBUS-MA-16-A2 MBUS master 230V max 16 logical devices

LAN-WMBUS-MA-16-A2-X MBUS master 230V max 16 logical devices with external anten

LAN-WMBUS-MA-64-A2 MBUS master 230V max 64 logical devices

LAN-WMBUS-MA-64-A2-X MBUS master 230V max 64 logical devices with external anten



