Data sheet

DST1-QMOD-GB0 RWMMO / 18.1.21 - V 4.2

Q module 5.5 water Modularis

Add-on radio module for QUNDIS water meters and external water meters prepared for wireless transmission.

The add-on radio module records and processes the counting pulses of mechanical water meters prepared for wireless transmission and transmits the data to a readout system. The add-on radio module is equipped with an optical interface for parameter setting.

Application

The add-on radio modules **Q module 5.5 water Modularis** are part of the Q AMR and Q walk-by systems. They are used where mechanical water meters prepared for wireless transmission are available, the data of which are to be recorded within one of these systems. These can be meters for hot or cold water.

Functions

- Recording the counting pulses of the mechanical water meter prepared for wireless transmission the add-on module is fixed to
- Detection of reverse flow
- Monitoring pulse recording
- Processing the pulses and storing current consumption data, statistics values and due date values
- Readout via radio and transmission of the consumption values to a readout unit without direct access to the device
- The radio module does not have its own display
- The transmission period is always given as CET (winter time) the whole year round

In Q AMR (C-Mode) the add-on radio modules Q module 5.5 water Modularis transmits OMS telegrams (OMS = Open Metering System) parallel to the walk-by telegrams. The OMS telegrams meet the “Open Metering System Specification” and can thus be received by all OMS-compatible devices.

Radio (wireless) features S-Mode

- Radio system – parallel transmission of Q walk-by and Q AMR data telegrams
- Increased radio capacity
- Transmission delay (offset)
  Time delay for sending telegrams after the due date or at the beginning of the moth in days (standard = 0 days)
- Transmission-free day
  A maximum of 2 days from Friday, Saturday and Sunday can be defined as transmission-free days
  At least 1 day must be set (standard = Sunday).
- Switching from S-Mode to C-Mode possible in both directions

Q walk-by [1]	**Q AMR**
every 128 seconds	every 4 hours
10 hours per day (8 a.m. - 6 p.m.)	24 hours per day
monthly: 4 readout days from the first of each month	7 days per week
annually: 48 hours after due date	365 days per year
Transmitted data: current consumption value with date last month’s value with date and values from previous 12 months due date value with date **device status:** error code and error date	Transmitted data: current consumption value with date last month’s value with date due date value with date **device status:** error code and error date

1) Compatible with WFZ16x / transmission delay or transmission-free days for walk-by only available in S-Mode.

Radio (wireless) features C-Mode

- Radio system – parallel transmission of Q walk-by and OMS(*)-compliant data telegrams
- Increased radio capacity

Q walk-by	Q AMR
every 112 seconds	every 450 seconds (7.5 minutes)
10 hours per day (8 a.m. - 6 p.m.)	24 hours per day
365 days per year	365 days per year
Transmitted data: current consumption value with date last month's value with date and values from previous 12 months due date value with date **device status:** error code and error date	Transmitted data: current consumption value with date last month's value with date due date values with date **device status:** error code and error date

(*) OMS "Open Metering System" manufacturer- and branch-independent communication architecture for intelligent meters.

Ordering (type overview)

The complete article number must be given for the order. The due date 31.12. is set as standard. Other due dates are possible on request.

System	Article number
S-Mode (Q AMR, Q walk-by)	RWM5 000N 0000 0000 0
C-Mode (Q AMR, Q walk-by)	RWM5 000T 0000 0000 0

Delivery

The Q module 5.5 water Modularis is delivered as a standard QUNDIS unit set to the following parameters:

	C-Mode	S-Mode
Due date	31.12.	31.12.
Type of readout	365 days	annually, 48 days after due date
Transmission delay	none	0 days
Transmission period	8 a.m. - 6 p.m., daily	8 a.m. - 6 p.m., daily
Transmission-free days	none	Sunday

Device combination

One add-on radio module is required per mechanical water meter prepared for wireless transmission.
The Modularis counter is used both by QUNDIS and by other water meter manufacturers, which means that the Q module 5.5 water Modularis can also be used for these.

Manufacturer	Water meter series
Deltamess DWWF GmbH 1)	Koax 2" Radio V
Wasser-Geräte GmbH 1)	Unimeter flush-mounted counter
QUNDIS GmbH	Q water 4

1) There are no tests and certificates. A functional guarantee is not given.

Technical data

Standards

QUNDIS GmbH hereby declares that the Q module 5.5 water add-on radio module complies with the directives 2014/53/EU and 2011/65/EU. The complete text of the EU Declaration of Conformity is available at the following internet address: www.qundis.com

RoHS compliant	EN 50581

Ambient environment

Protection type	IP68 according to EN 60529
Protection class	III according to EN 61140
Transport	-25 °C to +70 °C, < 95 % relative humidity (without condensation)
Storage	-5 °C to +45 °C, < 95 % relative humidity (without condensation)
Operation	+5 °C to +55 °C, < 95 % relative humidity (without condensation)
Pulse value	1 litre/pulse

Radio

Radio mode	S-Mode (Q AMR, Q walk-by) C-Mode (Q AMR, Q walk-by)
Radio frequency	S-Mode (868,30 +/- 0,30) MHz C-Mode (868,95 +/- 0,25) MHz
Transmission power	S-Mode (max. 14 dBm / typ. 11 dBm) C-Mode (max. 14 dBm / typ. 11 dBm)
Wireless protocol	Wireless M-Bus according to EN 13757-4

Electromagnetic compatibility

Interference resistance and emitted interference	EN 301489-1, EN 301489-3
Safety of IT equipment	EN 62368-1

Power supply

Battery type	Lithium metal
Operating voltage	DC 3 V
Battery service life	12 years operation + 1 year reserve + 6 months storage

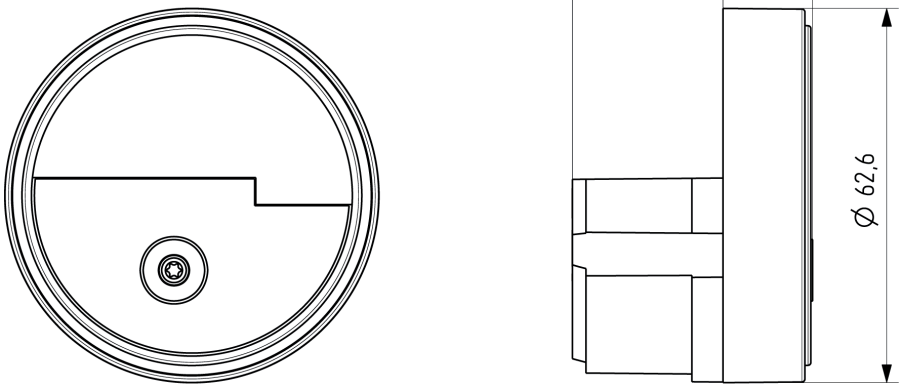
Material

Dimensions (DxW)	Ø 63 x 40 mm
Weight	75 g
Housing material	Polycarbonate (PC)
Housing colours	Transparent

Disposal information

For the purposes of disposal, the device is considered a used electronics device in the sense of European directive 2012/19/EU and shall not be disposed of with household waste.
- Dispose of the device through the appropriate channels.
- Comply with local and currently valid legislation.
- Dispose of used batteries at a dedicated collection point.

Dimensional drawing



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