

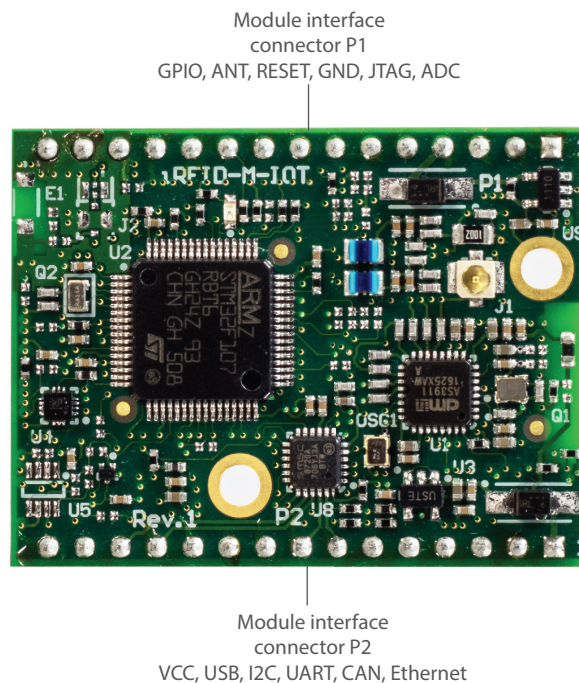
RFID HF-Reader module with WiFi and Ethernet interfaces

## iRFID-M-IOT

- Very small form factor
- Industry leading read / write distance
- Ultra low standby current
- Up to 5 GPIOs and up to 3 ADC channels
- Battery buffered RTC and 3-axis MEMS and Temperature sensor
- Supports USB, I<sup>2</sup>C, UART, CAN, SPI, WiFi and Ethernet interfaces
- Powerful software tools, incl. APIs and SDKs
- Designed, Engineered and Manufactured in Germany



## RFID HF-Reader module with WiFi and Ethernet interfaces iRFID-M-IOT



### Description

The iRFID-M-IOT is a highly integrated RFID HF-reader module with WiFi or Ethernet connectivity and eCLOUD-interface to design fully featured cloud-based RFID applications.

Standard firmware supports all major industry standard protocols and interfaces.

A Software Development Kit (SDK), Firmware compatibility and extensive documentation will allow smooth integration into a variety of software environments and ease migration of platforms over a long term product lifecycle.

### Typical Verticals

Point of Sales (POS):	Ticketing, Inventory Control
Point of Information (POI):	Portable Readers
Industrial Automation:	Access Control
Medical & Healthcare:	Authorization & Identification
Transportation:	Supply Chain Management

## RFID HF-Reader module with WiFi and Ethernet interfaces

### iRFID-M-IOT

#### Technical Information

Protocols	<ul style="list-style-type: none"> <li>ISO15693, ISO14443A/B, ISO18092, DES-Fire, Felica, EMVCo</li> </ul>
Antenna	<ul style="list-style-type: none"> <li>External: UMC antenna connector (RFID, WiFi)</li> </ul>
Transmitting Power	<ul style="list-style-type: none"> <li>Up to 1000mW, Software configurable</li> </ul>
Operating Frequency	<ul style="list-style-type: none"> <li>13.56 Mhz</li> </ul>
Read Distance	<ul style="list-style-type: none"> <li>Up to 18 cm (controlled by antenna type and environmental conditions)</li> </ul>
Write Distance	<ul style="list-style-type: none"> <li>Approx. 100 % of reading distance</li> </ul>
I/O Pins	<ul style="list-style-type: none"> <li>Up to 5 software controllable and configurable GPIO pins</li> <li>Up to 3 ADC channels</li> <li>Battery buffered RTC</li> <li>3-axis MEMS and Temperature sensor</li> </ul>
Software Support	<ul style="list-style-type: none"> <li>arm mbed OS powered</li> <li>SDK &amp; libraries for Windows &amp; Linux</li> </ul>
Host Interface	<ul style="list-style-type: none"> <li>WiFi</li> <li>I<sup>2</sup>C, UART, USB HID, USB CDC (Virtual Serial Port), Default: 115200 Baud</li> <li>Optional: SPI, CAN, Ethernet</li> </ul>
Connectivity	<ul style="list-style-type: none"> <li>10/100 Mbit Ethernet (optional), CAN-Bus</li> <li>WiFi Transceiver according 802.11b/g/n</li> <li>Radio Frequency Regulations, ETSI (Europe), IC (Canada), FCC (USA), ARIB STD-T66 (Japan), JATE (Japan)WiFi IEEE 802.X</li> </ul>
Cloud Platform Connectors	<ul style="list-style-type: none"> <li>eCOUNT eCLOUD</li> <li>Microsoft Azure</li> <li>Amazon AWS</li> </ul>
Voltage Input	<ul style="list-style-type: none"> <li>+3.3 V DC <math>\pm</math> 5 % , Reverse and Overvoltage protection</li> <li>Power consumption measurement</li> </ul>
Form Factor	<ul style="list-style-type: none"> <li>Dimension (Module) WxLxH: 31.0 mm x 41.0 mm x 3.0 mm , 8.5 mm incl. pin headers</li> <li>Mounting holes for rugged environments</li> <li>Industrial grade 2.54 mm pitch connectors</li> </ul>
Temperature Range	<ul style="list-style-type: none"> <li>Commercial: 0 °C to +60 °C</li> <li>Industrial: -20 °C to +70 °C</li> </ul>

### Ordering Information

Article	Part.-No.	Description
iRFID-M-IOT-W-CT	10025E-00-01-01	WiFi RFID HF-reader module, Commercial Temperature: 0 °C to +60 °C, male pin headers bottom side
iRFID-M-IOT-W-IT	10025E-01-01-01	WiFi RFID HF-reader module, Industrial Temperature: -20 °C to +70 °C, male pin headers bottom side