

Introduction

An RFID Reader is a radio frequency transmitter and receiver that can read and write information of an RFID tag. RFID Readers can also be fixed or portable. Portable, or mobile, RFID readers can be carried almost anywhere. RFID devices use electromagnetic fields to automatically identify and track compatible RFID tags. The tags contain unique electronically stored information, which is read by the RFID readers.

Handheld RFID readers are a great option for reading tags on the go and where the mobility of the reader is necessary. Handheld readers have integrated antennas, for easy operation and immediate interaction with the data.

Features

- AJEEVI designed GPRS based RFID device that provides data transfer function by GPRS network.
- This device automatically pushes encrypted data to a secure server.
- RFID Tag ID with IMEI number can be sent to server on Real-time basis.
- This device is powered by Li-polymer 4000 MAH battery with 3.7v, enables uninterrupted use over long periods.
- LED indicators: - RFID, GPRS & Power
- IP65 enclosure to sustain in harsh environment
- Ergonomic, balanced design provides extended use in different usage scenarios, Geiger counting.



Technical Specifications:

Sr.No	Parameter	Value
A	General	
1	Microcontroller	Arm 32-bit Microcontroller, 64 kb Program memory 20 kb RAM.
2	I/O pins	Total 48 pins, Low power consumption 3.3V
3	Device Identification	Every device has unique registered IMEI (International Mobile Equipment Identity) number
4	Device critical zone	In absence of GPRS network, the device can store up to 1000 tags data. On receiving adequate GPRS signal strength, data is passed to the server
B	Communication	
1	GSM / GPRS Band	2G Band GSM: 900 MHz, 1800 MHz ,Narrow band
2	RF Data Rate	6 level,(0.3、 0.6、 1.0、 1.8、 3.1、 5.5Kbps), Channels : 32 , Max Serial Buffer Size : 4K Bytes
3	Multi Internet Protocols	TCP / UDP / FTP / PPP / HTTP / NITZ / NTP / PING / HTTPS / SSL / MQTT
4	RFID Reader	Frequency 13.56 MHz, Power supply 3.3v, Support ISO/ ICE 14443 / NFC standard.
5	Data transfer rate and reading distance	10 Mbit/S, 50 MM tags read, Internally CRC (cyclic redundancy check) checking to validate tags data.
C	Antenna	
1	2G antenna	On board antenna
2	Interface	UART Data bits: 8 ,Stop bits: 1, 2 , Checksum: none, odd, even Baud rate: 300, 600, 1200, 2400, 4800, 9600, 19200, 38400, 57600
3	Antenna connector	SMA female / Antenna Pad/U.FL, the characteristic impedance of 50 ohms
D	Operating Temperature	
1	Operating Temperature	-25°C to +75°C
2	Battery Charging Voltage /Current	4.2 ± 0.03 V / 0.5 C / 5 A ,weight 45.0 ± 2.0 g

3	Buzzer	Sound Level 85 dB, beep Tone ,Hear Distance 2m
E	Physical	
1	Dimension	110mm x 70mm x 40 mm
2	Weight	210 g
F	Certification	
1	Product Certification	CE, RoHS