



ATOLL SOLUTIONS



## AR-501RM

### Rugged Monitoring Unit

#### FULL FEATURED, RUGGED MONITORING UNIT

Atoll's GSM/GPRS Monitor and Control platform enables customers to monitor and control various assets. This can be used for Monitoring and control of equipment's like Street light, Motors, Energy meters and Drives, Compressors etc. Its small, rugged, lightweight aluminum design makes it easy to install and use in multitude of applications. Numerous I/O's in this platform allows customers to monitor and control a range of external hardware like: RFID, Meters, sensors, solenoid, relay etc.

Some key application areas include:

- Solar Drive Monitoring
- Industrial M2M communications
- Remote Monitoring and Control
- Point of Sale Terminals
- Metering
- Warehousing
- Logistics and Freight Management

Messages are transported across the cellular network using GPRS Messaging providing a reliable communications link between the device and customers application servers. The AR-501RM has rugged Aluminum enclosure to support demands of rough environment. The AR-501RM has external antenna option that allows customers to place the device in isolated locations. The AR-501RM is designed to dramatically reduce cost of ownership while providing excellent field reliability.

#### SALIENT FEATURES

- Supports upto 6 Modbus RTU devices.
- Configurable Digital inputs, Digital Outputs and Analog inputs
- Configurable server end points (IP Address,port,URL)
- Supports cloud communication protocols (TCP,HTTP and HTTPS)
- Superior cellular performance with external Antennas
- Configurable FLASH memory capacity to support message logging.
- Internal battery backup.
- Unique Firmware update Over-The-Air (FOTA) and Configuration Over-The-Air (COTA) features.
- RS485 interface is provided to integrate Modbus peripherals.
- Rugged Aluminum Enclosure.
- Configurable with ATOLLCONFIX



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# AR-501RM Specifications

## GENERAL

- Supports cloud communication protocols (TCP, HTTP and HTTPS)
- Configurable server end points (IP Address, port, URL)
- Superior cellular performance with external Antennas
- Rechargeable Internal back-up battery
- Over-The-Air Firmware and Configuration Update.

## CELLULAR

- GSM/GPRS (option for 3G)
- DUAL Band EGSM 900 / 1800 MHz (QUAD Band option also available)
- Transmitting Power of GSM/GPRS
  - o 900MHz - 33dBm
  - o 1800 MHz - 30dBm

## PHYSICAL

- Dimensions - 67mm x 92mm x 28mm
- Rugged Aluminum Enclosure

## About Atoll Solutions

Atoll Solutions is a company focused on enabling customers in Machine to Machine (M2M) / Internet of Things (IOT) area. We encourage and support product designs based on ready to use wireless modules. We also make these modules and solutions Affordable and Available to all customers. We provide series of products, solutions and tools for customers developing IOT products. Some of the offerings are: Evaluation Boards, Modules, Reference Platforms, White Label Products and Product development and customization services. For more Information, please visit us at: [www.atollsolutions.com](http://www.atollsolutions.com)

## COMPREHENSIVE I/Os

- 4 Digital Inputs and 4 Digital Outputs
- 4 ADC Inputs(0-30v)
- 1 RS232 Serial Port (For configuring the parameters using Atoll Confix)
- 1 RS485 Serial Port for ModBus Communication

## ELECTRICAL

- Wide operating voltage of 9-30V with protection
- Rechargeable Internal battery backup (option for 650 and 1100 mAh)
- Voltage monitoring and low battery notification

## APPLICATION SPECIFIC

- Configurable with ATOLLCONFIX.
- Supports upto 6 Modbus RTU devices.
- Configurable Digital inputs, Digital Outputs And Analog inputs
- Configurable FLASH memory capacity to support message logging.
- Internal battery backup.
- Unique Firmware update Over-The-Air (FOTA) And Configuration Over-The-Air(COTA) features

## ENVIRONMENTAL

- Operating Temperature - 0 to 70<sup>0</sup> C
- Operational Relative Humidity - 10% - 90%

## Atoll Solutions Pvt. Ltd

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All specifications are typical and subject to  
Change without notice



