

# U-Space Controller | OM-UD-A102



The OM-UD-A102 is a 1U rack-mounted U-Space Controller designed for accurate and efficient asset management in data centers and IT environments. Featuring an integrated HTTP protocol interface, it enables seamless data upload to third-party platforms for flexible integration. The device supports comprehensive Web-based remote configuration, including IP address management, security settings such as user accounts and IP whitelists, asset strip ID configuration, status LED control, and system operations like reset and reboot. Performance highlights include 100% detection accuracy, response time of less than 1000ms from command to data return, and real-time status updates within 2000ms. The front panel LED indicators provide clear operational status at a glance. Designed for high availability, it supports hot-swapping and online maintenance without service disruption. With an industrial-grade design life exceeding 10 years, the OM-UD-A102 delivers reliable, long-term performance for mission-critical asset tracking applications.

## Specifications

### System Specifications

Processor	ARM9
Operating System	RTOS

### Network Interface

Upstream Interface	1 x 100M Ethernet
Communication Protocol	HTTP

### Downstream Serial Ports

Quantity	4 x RS485 serial ports
Connector Type	RJ45 (each port provides power for connected asset strips)
Function	Supports both communication and power supply for asset strips

### Asset Strip Capacity

Per Serial Port	Up to 10 asset strips daisy-chained
Total System	Up to 40 asset strips

### Power Supply

Input Voltage	AC 220V or DC 240V
Power Consumption	< 2W (self-consumption, excluding external power supply)

### Protection

Overcurrent Protection	RS485 signal: 200mA; RS485 power: 3A
Overvoltage Protection	RS485: 5V
Surge Protection	Network & RS485 ports: 2KV / 1KA

### Operating Environment

Operating Temperature	-40°C ~ 85°C
Relative Humidity	5% ~ 95% RH (non-condensing)

### Mechanical Specifications

Form Factor	1U rack mount
Dimensions (W×D×H)	482.2 × 286.7 × 44.4 mm (±2 mm)

