RADWIN Smart-Node

Smart-Node with input power of 40-57 VDC





RW-8019-3200

Product Description

RADWIN Smart-Node is an outdoor communications and power solution that reduces costs and accelerates the roll-out of smart-city, IoT and telecom projects. The all-in-one Smart-Node solution offers a wide variety of power and networking interfaces including fiber and an array of radio technologies to connect multiple devices such as CCTV cameras, Wi-Fi access points and IoT sensors.

Bridging the gap between broadband and IoT applications, Smart-Node enables easy integration with 3rd party devices to support multiple applications ranging from city surveillance, smart-lighting, waste management, smart-metering and more.

Smart-Node is a remarkably compact, IP-67 protection grade solution that guarantees low visual impact for street level deployments and high reliability when exposed to extreme temperatures and tough environments.

Product Highlights

- External DC input 40-57VDC (Solar, Street light or battery power system)
- Managed switch: 5 Gigabit PoE ports (802.3 af/at, at+(60W) and Passive PoE 24V/56V)
- Fiber/copper combo port (SFP/RJ-45)
- Communications and power management
- DC output for external devices (12V/24V)
- Alarms IN/OUT (Dry contacts)
- Internal interfaces for 3rd party devices integration (Cellular, Wi-Fi, IoT gateways, etc.)
- Weather proof enclosure IP67



Product Specifications:

| Power | |
|---------------------------------|--|
| Power Supply | External DC Input 40-57VDC, up to 240W (to enable PoE power output DC input should be > 44V) |
| Power Protections | - Over/under voltage |
| Tower Froteedons | - Short circuit |
| | - Reverse polarity |
| | - 10kV/5kA and IEEE C62.41.2 max power surge protection |
| | - Discharge current, 8/20µs 10kA max Ethernet surge protection |
| Ports | Bischarge darrent, of 2000 1000 max Ethernet surge protection |
| PoE1 | - RJ-45 |
| TOLI | - Ethernet |
| | - 802.3 af/at/+(60W)or 56V Passive PoE |
| PoE2 | - RJ-45 |
| | - Ethernet |
| | - 802.3 af/at/at+(60W)or 56V Passive PoE |
| PoE3 | - RJ-45 |
| | - Ethernet |
| | |
| D= F4 | - 802.3 af/at(56V-15/30W) or 24V passive PoE |
| PoE4 | - RJ-45 |
| | - Ethernet |
| Deff (see the see that the CED) | - 802.3 af/at(56V-15/30W) or 24V passive PoE |
| PoE5 (combo port with SFP) | - RJ-45 |
| | - Ethernet |
| | - 802.3 af/at/at+(60W)or 56V Passive PoE |
| SFP (combo port with PoE5) | SFP, Fiber |
| DC | 12/24V output power |
| ALM-IN | 2 dry contacts - input (triggered by short circuit) |
| ALM-OUT | 2 dry contacts - output (up to 60VDC, up to 1A load) |
| Audio (RJ12) | Not supported in this version. Contact RADWIN for more information |
| Serial (RJ45) | Not supported in this version. Contact RADWIN for more information |
| ANT | N-Type antenna port for 3rd party equipment |
| Networking | |
| Switch Configuration | - IEEE 802.3: 10BASE-T, IEEE 802.3u: 100BASE-T, IEEE 802.3ab: 1000BASE-T |
| 0 | - VLAN (Transparent/Aware, Port VLAN mode: Access/Trunk, port VLAN ID) |
| | - SNTP, NTP client |
| | - MAC Addresses: 1k |
| | - SNMP polling of traffic, including read / write |
| | - Report traffic per second, per port |
| | - Watchdog on IP (ping), reset port if not responding |
| Management and Configuration | |
| Interface | Web Management interface, SNMP V1 |
| Configuration | - Switch PoE port On/Off |
| comparation | - Graceful power degradation by priority |
| | - DC-OUT port power configuration (12V/ 24V) |
| | - Trap destinations |
| | - Alarms In/Out management |
| Monitoring | - Ports status: connected ports, PoE on/off, power consumption, voltage (56V, 24V), priority, VLAN and traffic |
| Withittoring | - Power management information: power source, supplied current and voltage and temperature |
| | - Events |
| | - Tamper sensor (trap) |
| Management and maintenance | |
| Management and maintenance | - Remote monitoring and management |
| | - SW update |
| | - Backup and Restore |
| | - Factory default |
| | - Hard reset |
| | - Power source status LED |
| | - Remote reset of PoE ports |



| Internal Interfaces for 3rd Party Devices Integration | |
|---|--|
| Power and communication | - RJ-45, Ethernet |
| interfaces available for 3rd party | - 802.3 af/at or 24V passive PoE |
| devices | - 12V/15W output power |
| Internal Space for 3rd party | 47(h)x116(w)x160(d)mm |
| Equipment | |
| Maximum power consumption | 15W (under full Smart-Node power consumption load) |
| for 3rd party Equipment | |
| Antenna Port | N-Type antenna port (SMA internal interface) |
| IoT Port | General purpose port |
| 3G/4G Cellular module and micro SIM slot | Not supported in this version. Contact RADWIN for more information |
| Mini PCI express | Not supported in this version. Contact RADWIN for more information |
| SD Card | Not supported in this version. Contact RADWIN for more information |
| USB 3.0 | Not supported in this version. Contact RADWIN for more information |
| Mechanical | |
| Dimensions | 379(h) x 309(w) x 115(d) mm |
| Weight | 5.6 Kg |
| | |
| Installation types | Pole mount, Wall mount |
| Environmental | |
| Operating Temperatures | -40° to 60°C / -40° to 140°F |
| Degrees of Protection | EN/IEC 60529, IP67 (NEMA 4) |
| Safety | |
| US/CAN (cTUVus) | UL 60950-1, UL 60950-22, CAN/CSA C22.2 60950-1, CAN/CSA C22.2 60950-22 |
| CE/IEC | EN/IEC 60950-1, EN/IEC 60950-22 |
| EMC | |
| FCC | 47 CFR Part15, Subpart B, Class B |
| CE | EN 301 489-1, EN 301 489-4, EN 301 489-17, EN 300 386 |
| CAN/CSA-CEI/IEC | CISPR 32:2015, Class B |
| AS/NZS | CISPR 32:2015, Class B |

Ordering Info

Part Number: RW-8019-3200

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This data sheet shall be used only for information purpose.

The products and specifications described herein are subject to availability and may change without prior notice.

