

R-NIU+ Ruggedized PoE Switch

QUICK LOOK:

R-NIU+ PoE Switch is designed and built to handle harsh mission-critical environments in noisy electrical conditions. This MIL-SPEC, IP67-rated PoE switch is capable of 90 watts per port across 4 gigabit ports. Choices of fiber/copper backhaul ports are available. One device interconnects and powers the PTP 700 radio, TD 90, and third-party devices, such as video camera and sensors.

- Rugged plug-and-play switch for Cambium 18-meter auto-point system
- Single rugged device providing PoE to up to:
 - 2 pairs of auto-point PTP 700 TD 90 setup
 - 4 PTP 700 radios for a hub-site deployment with high-capacity backhaul



Physical/Environment

Physical	15-3/8 x 10-7/8 x 4-1/2 in
Weight	19.8 lb
Material Finish	Stainless steel hardware with powder or MIL-SPEC coating
Enclosure Color	Available in black, white, green, or desert tan
Mounting	Universal mounting positions allow tower, pole, vehicle, or no mounting
Temperature	-40°C to +60°C operational -40°C to +85°C storage
Environmental	IP66/IP67
Certifications	MIL-STD-810 MIL-STD-461 CE Mark, RoHS compliant UL 62368-1 US/CAN
Connectors	AC: Phoenix Contact ST-3EP1N8ACK02S w/Cap DC In: Amphenol D38999/20ZB98PN w/Cap DC Out: Amphenol D38999/20ZB98SA w/Cap Ethernet: RJ45 21ZN w/Cap Fiber: TFOCA-II 2-Channel w/Cap
Indicators	AC Power: Green LED; DC Power: Green LED Status: Green - Normal operation Amber - Minor fault Red - Critical fault

Electrical

AC Input	Global AC input: 90–264VAC, 47–63 Hz
DC Input	10–60VDC @ 30A ¹
PoE	56VDC @ 15W, 30W, 60W, 90W, 802.3af/at/bt
Power Control	Regulated 56VDC PoE output Automatically adjustable load current 0.25A 2A (5W to 100W) per port Automatic (voltage/current) input and/or output power reset
Max Power Output	300W ²

*1: For input voltages less than 18VDC, 2-pair DC input is required.

*2: Max current is 30A; at 10VDC, the max output power is 250W–270W; minimum of 300W input required during unit bootup.

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Ethernet Switch	
PoE Ports	QTY: 4 10/100/1000 Ethernet Cat-5e
Backhaul Ports	Model A QTY: 1 10/100/1000 multimode fiber 50/125 2-channel TVOCA-II QTY: 1 10/100/1000 copper Ethernet port Model B QTY: 2 10/100/1000 multimode fiber 50/125 2-channel TFOCA-II Model C QTY: 2 10/100/1000 copper Ethernet port Model S QTY: 2 10/100/1000 single-mode fiber 9/125 2-channel TFOCA-II
Features	Network broadcast storm protection Network redundancy support: RSTP/MSTP, and G.8032 ERPS (recovery time <50ms) LACP/LAG for link aggregation Configuration: Web console or CLI command Supports: • IGMP v1/v2 • QoS (IEEE 802.1p) and CoS/ToS • IEEE 802.1Q VLAN, QinQ, SNMP v1/v2c/v3 • RMON function for efficient network monitoring • Port mirroring for online diagnostics
Switch Architecture	Back-plane (switching fabric): 16.0 Gbps
Protocol	IGMPv1/v2, SNMPv1/v2c/v3, TFTP, SNTP, SMTP, RMON, HTTP, HTTPS, Telnet, Syslog, DHCP option 66/67/82, SSH/SSL, Modbus/TCP, LLDP, IPv4/IPv6
Data Process Store & Forward	Transfer rate: • 14,880 pps for 10Base-T Ethernet • 148,800 pps for 100Base-T fast Ethernet • 1,488,000 pps for Gigabit Ethernet
Packet Buffer	4 Mbits
MAC Table	8K
Jumbo Frame	9.6K
Flow Control	IEEE 802.3x for full duplex mode Back pressure for half duplex mode
VLAN	0 to 4094
IGMP	Up to 256 Groups
Security	Enhanced Network Security with IEEE802.1X, SNMPv3, HTTPS, and SSH/SSL RADIUS for management

Part Numbers	
CK-RNIUB02A-WW	Black – 1 copper, 1 MM fiber backhaul port
CK-RNIUG02A-WW	Green – 1 copper, 1 MM fiber backhaul port
CK-RNIUT02A-WW	Desert tan - 1 copper, 1 MM fiber backhaul port
CK-RNIUW02A-WW	White - 1 copper, 1 MM fiber backhaul port
CK-RNIUB02B-WW	Black – Dual MM fiber backhaul ports
CK-RNIUG02B-WW	Green – Dual MM fiber backhaul ports
CK-RNIUT02B-WW	Desert tan – Dual MM fiber backhaul ports
CK-RNIUW02B-WW	White - Dual MM fiber backhaul ports
CK-RNIUB02C-WW	Black – Dual copper backhaul ports
CK-RNIUG02C-WW	Green – Dual copper backhaul ports
CK-RNIUT02C-WW	Desert tan - Dual copper backhaul ports
CK-RNIUW02C-WW	White - Dual copper backhaul ports
CK-RNIUB02S-WW	Black – Dual SM fiber backhaul ports
CK-RNIUG02S-WW	Green – Dual SM fiber backhaul ports
CK-RNIUT02S-WW	Desert tan - Dual SM fiber backhaul ports
CK-RNIUW02S-WW	White - Dual SM fiber backhaul ports

ABOUT CAMBIUM NETWORKS

Cambium Networks enables service providers, enterprises, industrial organizations, and governments to deliver exceptional digital experiences and device connectivity with compelling economics. Our ONE Network platform simplifies management of Cambium Networks' wired and wireless broadband and network edge technologies. Our customers can focus more resources on managing their business rather than the network. We make connectivity that just works.

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