

Ceraun 1 and Ceraun 2

Outdoor power supply and battery backup unit



The Ceraun 1 and Ceraun 2 outdoor power supply and battery backup units provide reliable PoE (power over Ethernet) power for Tropos outdoor mesh routers, wired clients and network backhaul equipment.

Ceraun 1 is designed to power a Tropos mesh router and a wired client such as a video camera or AMI collector. Ceraun 2 is designed to power a Tropos mesh router and a network backhaul device such as a point-to-point radio, point-to-multipoint radio or fiber multiplexer.

The battery in either Ceraun 1 or Ceraun 2 will provide backup power to both the Tropos router and the wired client or network backhaul device.

If the AC power input to the Ceraun 1 or Ceraun 2 fails, it provides 24 VDC to the connected Tropos router and 48 VDC to the wired client. The transition from 48 VDC to 24 VDC is detected by the Tropos router, which sends an alarm trap to the Supros network management system indicating AC power has failed.

The length of time that the unit can power the router and its client depends on a number of factors, including the duty cycle of the attached Tropos router, the actual power consumption of the client, the age of the battery and the ambient temperature of the installation. The Ceraun's internal battery is field replaceable.

Expected backup time (battery capacity and backup time decreases as ambient temperature increases or decreases)

Technical data

Scenario	Devices	Power consumption	Backup time at +20° C
Worst case (router plus wired client)	Router	18W	2.44 hours
	Wired client	15W	
Expected case (router plus wired client)	Router	8W	4.02 hours
	Wired client	15W	
Worst case (router only)	Router	18W	3.47 hours
Expected case (router only)	Router	8W	7.80 hours
Power			
Input voltage	120-240VAC 50/60Hz		
Output voltage on AC power	48 VDC		
Output voltage on battery	24 VDC to router, 48 VDC to wired client		
Dimensions			
Dimensions (without mounting bracket)	9.8" x 8.19" x 4" (248 mm x 207 mm x 101 mm)		
Dimensions (without mounting bracket)	9.8" x 8.19" x 6.29" (248 mm x 207 mm x 159 mm)		
Weight	5.10 lbs. (2.32 kg)		
Environmental specifications			
Operating temperature range	-40°C to 60°C (-40°F to +140°F)		
Storage temperature range	-40°C to 85°C (-40°F to +185°F)		
Weather rating	UL579/IEC 60529 IP54/ NEMA 4X		
Wind survivability	>165 mph (264 kph)		
Wind loading (165 mph/264 kph)	<300 Newtons		
Salt fog rust resistance	ASTM B117		
Shock & vibration	ETSI 300-19-2-4 spec T4.1E class 4M3		
Transportation	ISTA 2A		
Interfaces			
Two IEEE 802.3u autosensing 10/100BASE-T Ethernet ports with RJ-45 connectors			
Batteries			
Type	Lithium ion		
Voltage	24 VDC		
Capacity	2.6 Ampere hours		

ABB Power Grids
3055 Orchard Drive
San Jose, CA 95134

Phone: 408-331-6800
Email: wireless.sales@nam.abb.com
abb.com/unwired

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