

ProZone

Smart Solar Festoon Lighting



Intelligent, energy-saving festoon lighting for safer, cleaner, more efficient sites.

ProZone is our next-generation modular solar-powered festoon lighting system. Engineered to deliver up to 150m of smart, reliable, low-voltage illumination powered directly from our portable solar battery storage unit. Built for construction, infrastructure, highways, utilities and temporary public environments, ProZone provides a safer, cleaner and more cost-effective alternative to conventional diesel or mains-powered festoon lighting.

Designed to bring intelligent control, exceptional energy efficiency and plug-and-play scalability to any site. Each 30-metre run includes 15 high-efficiency 1.5W LEDs and dual PIR motion sensors, ensuring only the sections with activity brighten to 100% while the rest remain in an energy-saving dimmed state. This dramatically reduces power consumption, maximises battery autonomy and maintains safe visibility exactly where it's needed.

Through full integration with the Prolectric Hub and Smart Remote Portal, users gain remote control over brightness levels, schedules and energy profiles, enabling verifiable carbon and cost savings across the entire lighting setup. Whether lighting walkways, compounds, access routes, or event spaces, ProZone delivers zero-emission, silent operation with the intelligence and flexibility modern sites demand.

Challenge

Solution

High energy use & short battery autonomy

Section-by-section PIR activation ensures only occupied areas go to full brightness, significantly reducing overall consumption.

Poor visibility and safety risks on walkways and access routes

Dual-direction PIR sensors detect approach from either end of each run, maintaining safe, responsive illumination.

Inefficient temporary lighting installations with limited scalability

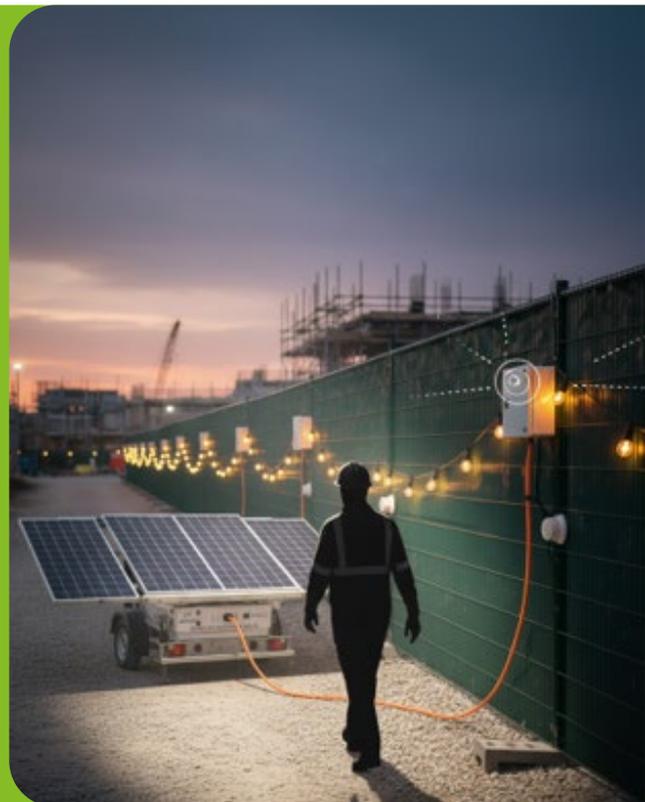
Modular 30m plug-and-play units daisy-chain runs up to 150m, enabling scalable coverage and straightforward reconfiguration.

Difficulty managing lighting schedules and power use

Integrated 0-10V dimming provides full remote control through the Smart Remote Portal, giving precise command over brightness, timers and energy-saving modes.

Need to eliminate diesel, noise and emissions

100% solar-powered operation delivers silent, clean lighting that supports net-zero goals.



TECHNICAL SPECIFICATIONS

Solar Battery Storage Unit

PV module	1,520W - 4x 380W
Battery bank	14.1 kWh - 12x 100Ah 12V
System voltage	24V DC
Output supply	110V AC, 16A socket (max. load 300W)
Deployed dimensions	3600 (L) x 4106 (W) x 2032 (H) mm
Stowed dimensions	3600 (L) x 2100 (W) x 2032 (H) mm
Net weight	1210 kg

Link Box

AC in	110V
PIR	2 x PIR for light activation (each end of run)
Dimming socket	0-10V DC
Festoon output socket	24V DC

Festoon Lighting

Light voltage	24V DC
Power per light	1.5W
Colour temperature	2700K
Luminous flux	80LM
Rating	IP65
Cable type	BS 6004 Artic Yellow
Spacing	2-meter spacing for lamp holders
Runs	30m per run - up to a maximum of 150m
Bulb cage	Yellow

PIR

Operating voltage	2.4-4V DC
Motion sensor	8 meter detection
Rating	IP65

