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TECHNICAL DATASHEET · HELIPORT LIGHTING · PORTABLE LIGHTS WITH INTEGRATED SOLAR PANELS

Polaris V3 – Solar Portable Heliport Lights

EcoSolaris code **ECO-AL-3618**

Ordering code **AL-201/202/203/204-01-XX**

Made in Romania Manufactured in the EU



Portable LED lights with four integrated solar panels and a LiFePO4 battery for heliport approach, TLOF, FATO and taxi. They install directly on the ground, on a base plate or on a ground screw, with no foundation.

APPROACH	TLOF
AL-201-01-WH	**AL-204-01-GR**
FATO	TAXI
AL-202-01-WH	**AL-203-01-BL**

Price on request

EcoSolaris technical support · Dubai

Technical specifications

Approach	AL-201-01-WH
TLOF	AL-204-01-GR
FATO	AL-202-01-WH
Taxi	AL-203-01-BL
Horizontal output	360°
Brightness steps	1%, 3%, 10%, 30%, 100%
AL-201 measured at 5° / 6°	367.1 cd / 378.6 cd (min. 350 cd)
AL-202 measured at 3° / 10°	241.2 cd / 259.7 cd (min. 100 cd)
Max. power at 100%	8.5 W / 4 W / 0.5 W / 0.2 W (approach / FATO / TLOF / taxi)
Battery	LiFePO4 3.6 V – 12 Ah
Solar panels	4 × 2 W integrated
External charging	DC connector
Approach autonomy	5 h at 100% / 50 h at 10% / 500 h at 1%
FATO autonomy	10 h at 100% / 100 h at 10% / 1000 h at 1%
TLOF autonomy	85 h at 100% / 283 h at 30% / 850 h at 10%
Radio	LoRa 868 / 915 MHz, optional 433 MHz; up to 10 km
Ingress protection	IP67
Temperature	-20 °C … +55 °C
Humidity	0–100%
Weight	4 kg

Features

- Four integrated solar panels, one on each side
- LiFePO4 battery with DC connector for external charging
- Direct ground placement, no fasteners required
- Local control, LoRa remote or Polaris portal
- Day/night photocell, GPS and ARCAL (optional)
- 1 or 2 IR LEDs for NVG (optional)
- Battery disconnect for transport, zero consumption

Standards and compliance

- ICAO Annex 14, Vol. 2 – Heliports
- ICAO Annex 14, Vol. 1, Fig. A1-1b – colours
- IEC TS 61827

Materials and construction

- Powder-coated aluminium housing, RAL 1004
- Hardened glass diffuser
- Nickel-plated brass cable gland
- Stainless steel fasteners
- Anti-condensation valve

Configuration options

- IR LEDs (NVG)
- Photocell
- One- or two-way radio control, 868 / 915 / 433 MHz
- Built-in GPS
- ARCAL activation
- Ground, base plate with frangible coupling, or ground screw mounting

Ordering code structure

AL - 201 - 01 - WH / IR

AL	Airfield lighting series
201	Product indicator (201 approach; 202 FATO; 203 taxi; 204 TLOF)
01	Number of LEDs: 01 without IR, 02 with one IR LED, 03 with two IR LEDs
WH	Colour: WH white, GR green, BL blue
IR	Optional: IR LED

Compatible accessories

AL-165-AX	Polaris remote control
AL-232-AX	Fixing system for Polaris V3
AL-229-AX	Ground mounting screw

Applications

Hospital helipads · **Temporary and emergency helipads** · **Remote helipads without mains power** · **Offshore platforms and oil & gas sites** · **Military NVG operations**