EverGen-L
SOLAR STREETLIGHT
HIGH POWER

SUNNA DESIGN — l'intelligence solaire solar intelligence

MADE IN FRANCE

EverGen-L is a **modular kit solution**, designed to adapt to a wide variety of environments and uses. Available in three solar panel formats (200, 300, or 400 Wp) and four battery capacities (512, 1,024, 1,536, or 2048 Wh), the system enables **customized energy sizing**. The solution also incorporates **native monitoring** functionality via a local Bluetooth application, SunnAPP, requiring no communicating nodes.

General

Structure material	Galvanized steel
Effective Projected Area	200 Wp: 0.42 m² (4.52ft²); 25° / 0.70 m² (7.53 ft²); 45° 300 Wp: 0.58 m² (6.24 ft²); 25° / 0.98 m² (10.55 ft²); 45° 400 Wp: 0.77 m² (8.29); 25° / 1.29 m² (13.88 ft²); 45°
Recommended pole*	Galvanized steel; Top mounting: Ø89 mm (3.5 in)
Weight (excluding pole)	Between 47.6 kg (103.6 lbs) and 68.5 kg (149.9 lbs) *(depending on PV and battery power)*
Options	Remote supervision / Motion sensor (individual and group) / Hybrid mode (solar/grid) / External device power supply
Carbon footprint	94.13 kg CO2 eq.
System warranty	6 years included *(can be extended to 10 years)*
Certificates	CE, FCC, IP65, IK08 *(in the process of certification)*

* Included depending on project

Solar panel

Technology	Photovoltaic module (monocrystalline N-Type TOPCon cells)
Power	200 Wp, 300 Wp, 400 Wp
Electrical characteristics (per panel)	200 Wp: Voc = 47.26 V / Vmp = 41.65 V / Isc = 5.17 A / Imp = 4.95A / Cells number = 66
	300 Wp: Voc = 47.26 V / Vmp = 41.65 V / Isc = 7.76 A / Imp = 7.42 A / Cells number = 66
	400 Wp: Voc = 47.26 V / Vmp = 41.65 V / Isc = 10.34 A / Imp = 9.89 A / Cells number = 66
Tilt angle	25°, 45°
Structure	Anodized aluminum alloy
Lifespan	> 30 years at 82% of initial power
Recyclability rate	Up to 96%

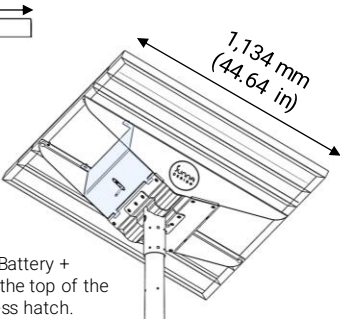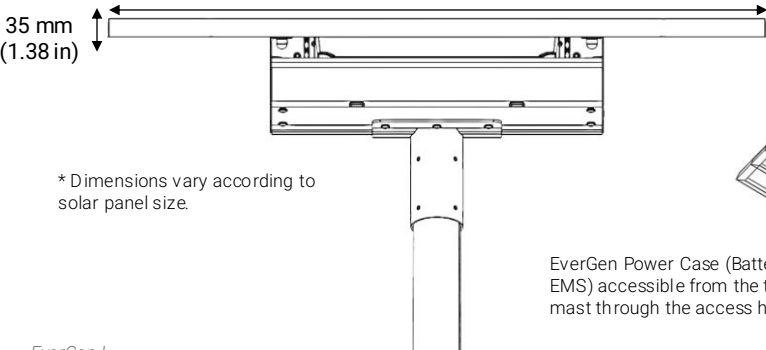## Battery

Technology	LiFePO4
Voltage	25.6 V
Capacity	512 Wh, 1,024 Wh, 1,536 Wh, 2,048 Wh
Operating temperature range	-20°C to +60°C (-4°F / +140°F)
Lifespan	> 10 years
Recyclability rate	Up to 65%

SunnaCore EMS

|	
LED output power	20 at 150 W (or 2 x 80 W)
LED output voltage range	32-50 V (or 50-120 V optional SunnaCore EMS Max)
Operating T° range	-40°C to +70°C (-40°F / +158°F)
Charging technology	Integrated MPPT
Lifespan	> 10 years
Recyclability rate	100% for precious and base metals

Dimensions

840 / 1,220 / 1,610 mm*
(33.07 / 48.03 / 63.38 in)

35 mm
(1.38 in)

1,134 mm
(44.64 in)

* Dimensions vary according to solar panel size.

EverGen Power Case (Battery + EMS) accessible from the top of the mast through the access hatch.

Colors
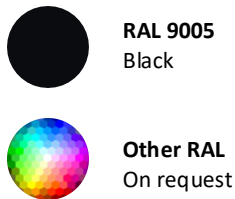
RAL 9005
Black

Other RAL
On request

Elektra

IP66 | IK10 | CE | ZZ

PLUS 15 / 15

Lighting

LED module	High-efficiency LEDs - Geometry according to Zhaga (Book 15)
Luminous flux	4,200 to 29,600 lm
Power	60 W, 80 W, 150 W
Lighting efficacy	Up to 210 lm/W after optical losses
Color temperatures	Amber (< 2% blue light), 2200 K, 2700 K, 3000 K, 4000 K
Options	Backlight shield
Material	Cast aluminum luminaire with tempered protective glass
Weight	Elektra S: 4.8 kg (10.58 lbs) / Elektra M: 7.9 kg (15.43 lbs) / Elektra L: 9.2 kg (19.84 lbs)
Lifespan	Over 100,000 hours (L80B50)
Mechanical resistance	IK10, IP66, corrosion resistance 1,500 hours according to ISO 9227
Recyclability rate	Up to 95%
Certificates	EN 60598, ENEC, ENEC+, Dark Sky, CEE

Dimensions

ELEKTRA S / M / L

Ø 63 mm (2.48 in)

89 mm (3.5 in)

570 / 660 / 760 mm (22.44 / 25.98 / 29.92 in)

280 / 330 / 365 mm (11.02 / 12.99 / 14.37 in)
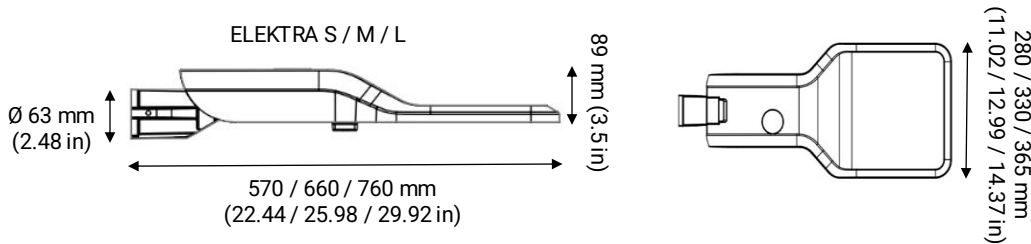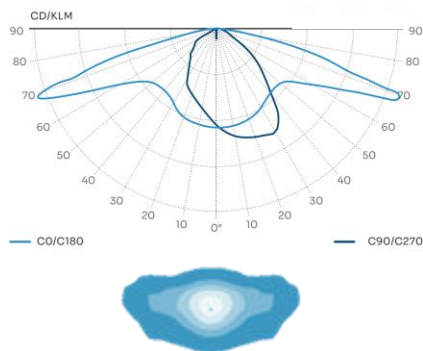
Colors

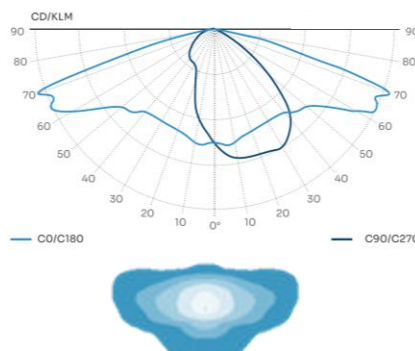**RAL 9005** Black

Other RAL On request

Photometry

0% light emitted upwards with all optics (ULOR = 0).
Optional backlight shield available. IES / LDT files available on request.
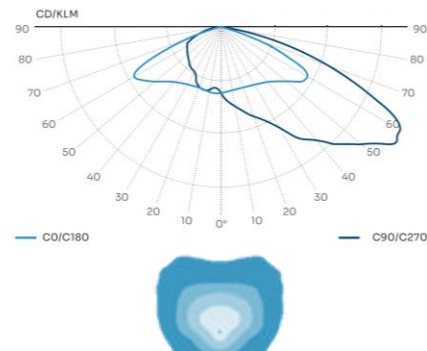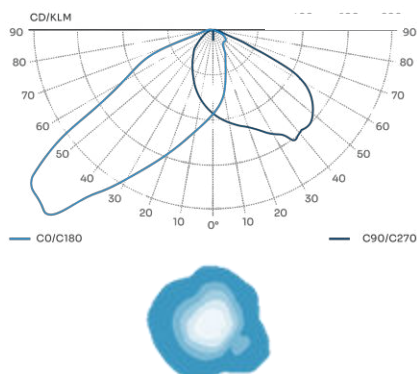
☑ NR-T2SH *(asymmetrical narrow lighting)*

CD/KLM — C0/C180 — C90/C270

☑ MR-T2ME *(asymmetrical medium lighting)*

CD/KLM — C0/C180 — C90/C270

☑ AWR-T4ME *(asymmetrical wide lighting)*

CD/KLM — C0/C180 — C90/C270

☑ CL *(crosswalk on the left)*

CD/KLM — C0/C180 — C90/C270

☑ CR *(crosswalk on the right)*

CD/KLM — C0/C180 — C90/C270

Nano

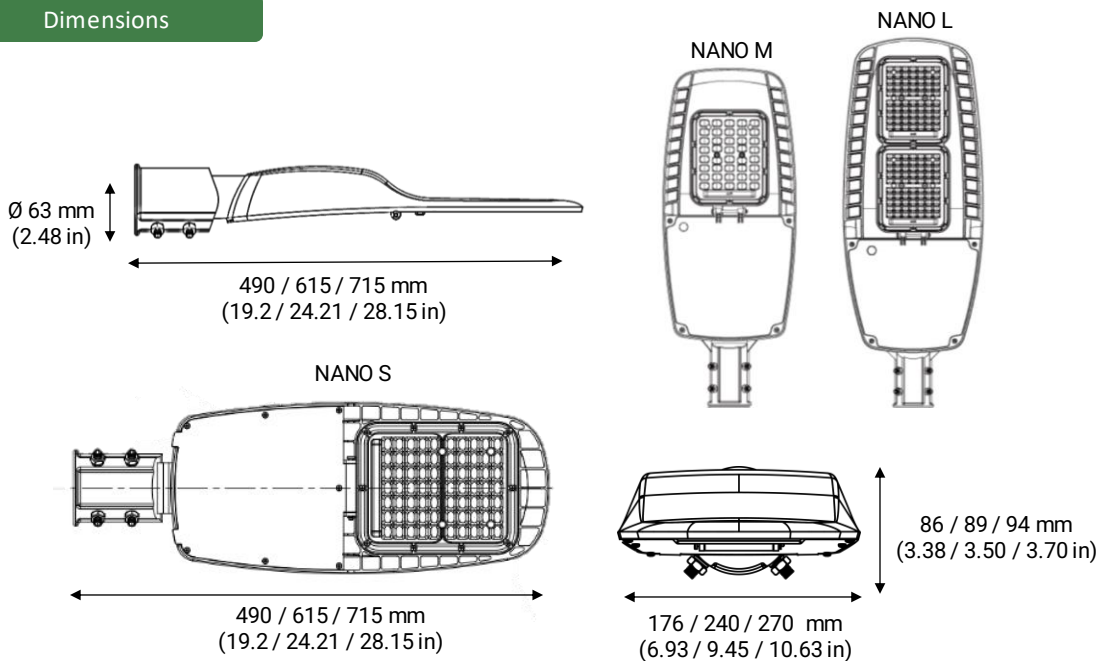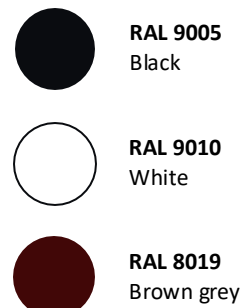IP66 | IK10 | CEE | CE | EK18
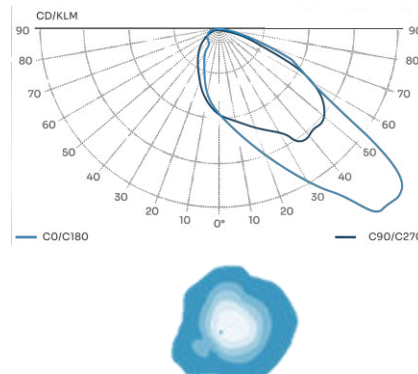
Lighting

LED module	High efficiency LED - Multichip Technology (IP66)
Luminous flux	3,320 to 26,560 lm
Power	40 W, 80 W, 150 W
Lighting efficacy	Up to 165 lm/W after optical losses
Color temperatures	2200 K, 2700 K, 3000 K, 4000 K
Options	Backlight shield / Motion sensor (individual or grouped)
Material	Aluminum
Weight	Nano S: 1.5 kg (2.20 lbs) / Nano M: 2.8 kg (4.41 lbs) / Nano L: 5 kg (11.02 lbs)
Lifespan	Over 100,000 hours (L80B10)
Mechanical resistance	IK10, IP66
Recyclability rate	Up to 95%
Certificates	EN 60598, CEE, ENEC

Dimensions

NANO M

NANO L

Ø 63 mm
(2.48 in)

490 / 615 / 715 mm
(19.2 / 24.21 / 28.15 in)

NANO S

490 / 615 / 715 mm
(19.2 / 24.21 / 28.15 in)

86 / 89 / 94 mm
(3.38 / 3.50 / 3.70 in)

176 / 240 / 270 mm
(6.93 / 9.45 / 10.63 in)

Colors

RAL 9005
Black

RAL 9010
White

RAL 8019
Brown grey

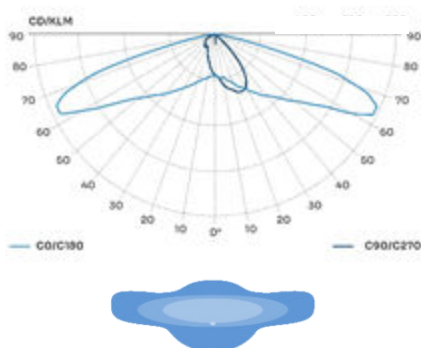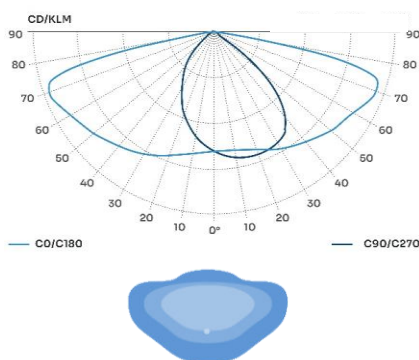## Photometry

Optional backlight shield available. IES / LDT files available on request.

NR-T2SH *(asymmetrical narrow lighting)*

CD/KLM
— C0/C180   — C90/C270

MR-T2ME *(asymmetrical medium lighting)*

CD/KLM
— C0/C180   — C90/C270

AWR-T4ME *(asymmetrical wide lighting)*

CD/KLM
— C0/C180   — C90/C270