

DESCRIPTION

The SOLABEL is a thoroughly tested solar powered Belisha beacon, designed for reliable off-grid installation. Featuring a low impact design solar panel, advanced technology batteries and a low energy LED beacon light engine, the SOLABEL is designed to operate all year round. The SOLABEL is supplied complete with pre-finished post, beacon and solar engine.

SOLAR ENGINE

Solar Panel	750 mm diameter, mono crystalline panel with 12 V, 60 Watt output. Impact resistance IK10. Solar panel set at 22°.
Solar Panel Housing	Rotationally moulded U.V stabilised (UV8) black polyethylene moulding with galvanised steel support pillar powder coated black.
Battery	4 x 12 V / 9 Ah Absorbent Glass Mat (AGM) batteries mounted in the base compartment of the post.
Regulator	High efficiency PWM regulator mounted in post base.
Ingress Protection	IP54

LED BEACON

Beacon	335mm diameter, self coloured, rotationally moulded, U.V stabilised (UV15), low density polyethylene, 2.5mm nominal wall thickness.
Gallery	Die Cast LM6-M aluminium, acid cleaned, chromate primed and polyester powder coated black (150µm min). High performance gasket at beacon interface. All threads stainless steel bushed. Pre-fitted stainless steel shroud fixing points.
Light Engine	Custom LED driver driving LED's with a consumption of 3.4 watts when lit. LED driver efficiency 90%. Integrated flash controller. Short circuit and open circuit protection.
Light Output	350 cd/m ² with uniformity > 0.66 .
Ingress Protection	IP54 .

POST

Construction	76mm x 140mm mild steel large base post, galvanised after manufacture, conforming to BS EN 40. Finished black with three white reflective bands.
Fixing	Rooted or Flanged post available.

GENERAL

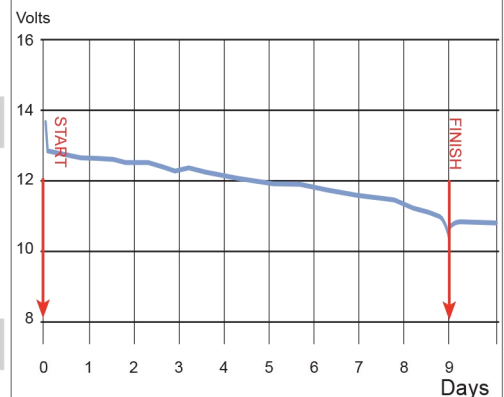
Beacon Shroud (fitted as standard)	3mm black self-colour polycarbonate with stainless steel fittings.
Fasteners	Stainless Steel.



BS8442:2015

AUTONOMY

Battery Discharge over time



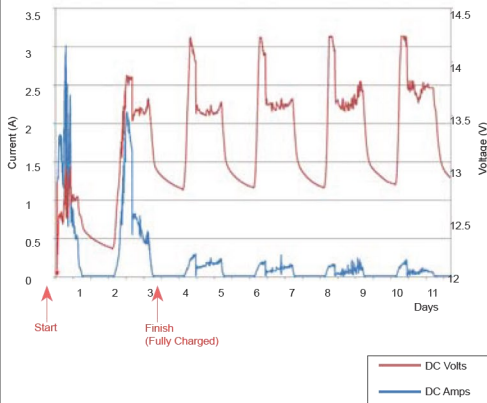
Measurements taken with beacon connected and Solar Panel disconnected

System autonomy > 9 days,
(Should charge not be received).

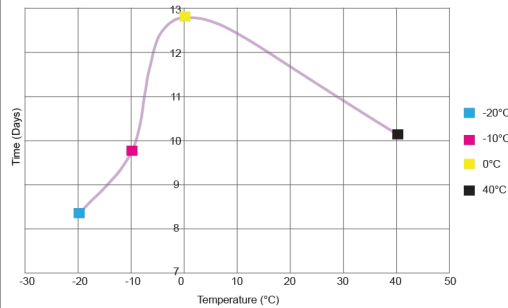
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PERFORMANCE

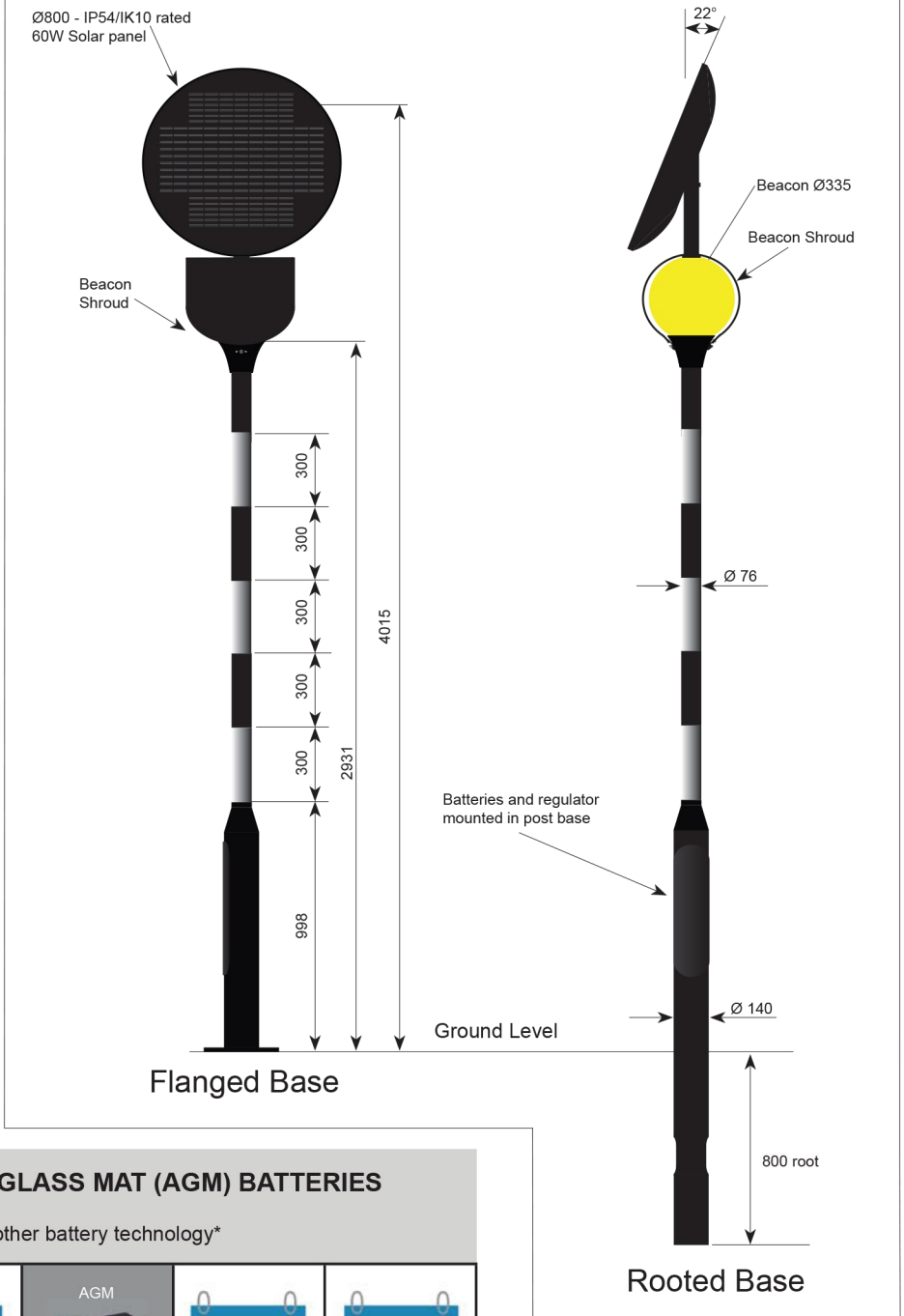
Charge recovery from flat battery



Autonomy variance with temperature



DIMENSIONS



Why we use ABSORBENT GLASS MAT (AGM) BATTERIES

Comparison with other battery technology*

BATTERY	Lead Acid	Gel	AGM	Lithium	Ni-cad
Product Life span (Years)	2 - 3	2 - 4	8 - 12	5 - 6	4 - 5
Temperature Range	-18°C to 45°C	-18°C to 50°C	-40°C to 65°C	-20°C to 65°C	-20°C to 65°C
No. Discharge Cycles @80%	450	500	1500	1300	1100
Transportation Safety	Medium Risk	Low risk	No Risk	High Risk	Medium Risk

* Manufacturers data

PACKING

All items are shipped on one pallet :

- Solar panel assembly
- LED Beacon with shroud
- Post
- Battery packs x 2
- Regulator assembly
- All cables included.

Total weight : 58kg

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