



Robust  
Silent  
Reliable

## LE-v50

The perfect silent turbine  
for **trickle charging** batteries

MADE IN  
BRITAIN



# LE-v50 - Features



## LE-v50

The perfect **wind turbine** for trickle charging batteries

### Features:

#### **Silent**

Noise produced is below that of background level

#### **Compact and lightweight**

Can be installed in a variety of positions with ease

#### **Cross flow ventilated rotor**

Far higher output than similar vertical axis turbines

#### **Robust design**

Survives gusts of 27 m/s (60 mph)

#### **Output**

Up to 70W

#### **Marine quality finish**

High quality components and lasting performance

## Designed and proven to survive gusts of 60mph

**The LE-v50 vertical axis wind turbine is a compact, silent and lightweight turbine designed to trickle charge marine batteries or for low power electronic devices such as data-loggers, radio and telemetry equipment.**

The LE-v50 delivers power outputs of up to 70W in absolute silence. Compared to similar vertical axis turbines, the LE-v50 delivers far higher output thanks to the cross-ventilated 'savourious' vertical axis rotor. This is coupled with the well proven axial flux alternator design that has been successfully used on all our turbines. With only 1 moving part, there is little to go wrong.

The small footprint and lightweight design allows the turbine to be installed in places where space is a premium. The turbine will receive the wind from 360 degrees without the need to yaw into position. The LE-v50 can self-regulate without the need for external charge controllers and the turbine's double bearing arrangement is superior to cantilever designs found in other vertical axis turbines.

# LE-v50 - Technical Overview

**Rotor diameter** - 270mm **Height** - 456mm

**Rotor type** - 3-Blade savonius

**Blade material** - Aluminium

**Rated output** - 10W at 12m/s (26mph)

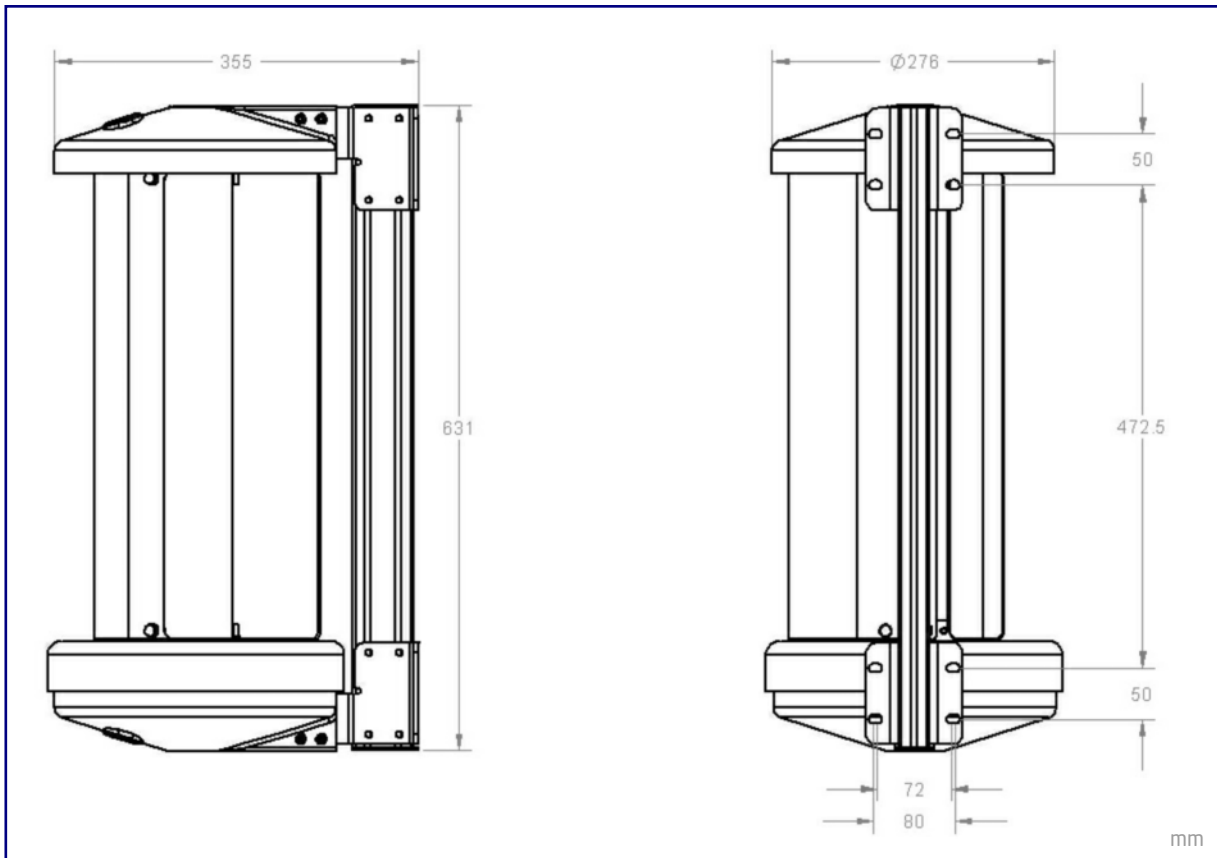
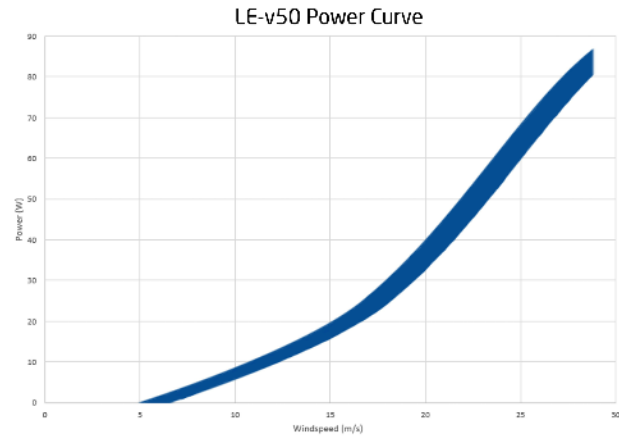
**Peak output** - 70W

**Cut-in speed** - 5m/s (11mph)

**Weight** - 9Kg

**Warranty** - 2 years

**DC Output voltage** - 12V, 24V, 48V

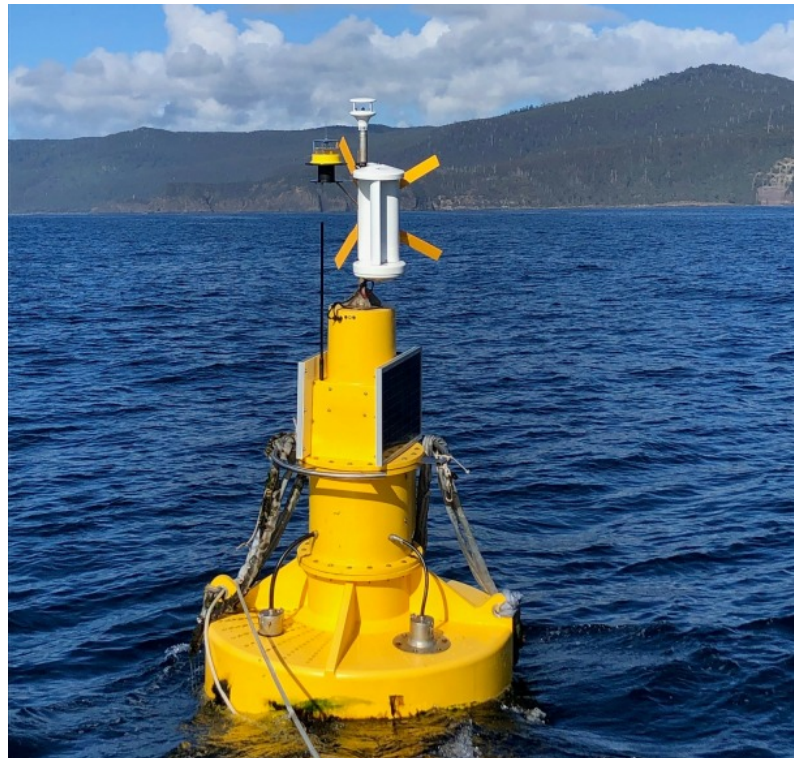


## Pure Performance

The LE-v150 wind turbine uses a proven 'Savonius' rotor design which gives silent and effective performance. Using the latest solid modelling and Computational Fluid Dynamic simulations, an elegant 'cross-ventilated' rotor provides good power conversion for a vertical axis wind turbine of this size.

The rotor is then coupled to our specially designed low inertia, zero 'cogging' axial flux permanent magnet alternator. Using Neodymium rare earth magnets, this alternator design has become one of the most field proven alternators that is deployed across the entire range of Leading Edge Turbines.

# LE-v50 - Applications



- Marine
- Telemetry
- Trickle Charging
- LED lighting systems
- Off-grid

Our LE-v50 vertical axis turbine will trickle charge your batteries or provide energy for low power electronic devices such as data-logging and telemetry equipment.

Wind turbine performance is subject to many factors. All output data contained in this document is indicative and actual turbine outputs will depend on the prevailing site and installation conditions.

Your local distributor



Leading Edge Turbines  
Skyrrid Farm | Pontrilas  
Herefordshire | HR2 0BW  
[www.leadingedgepower.com](http://www.leadingedgepower.com)

Tel +44 (0)1981 241668  
Email [info@leadingedgepower.com](mailto:info@leadingedgepower.com)  
Copyright © 2020 Leading Edge Turbines