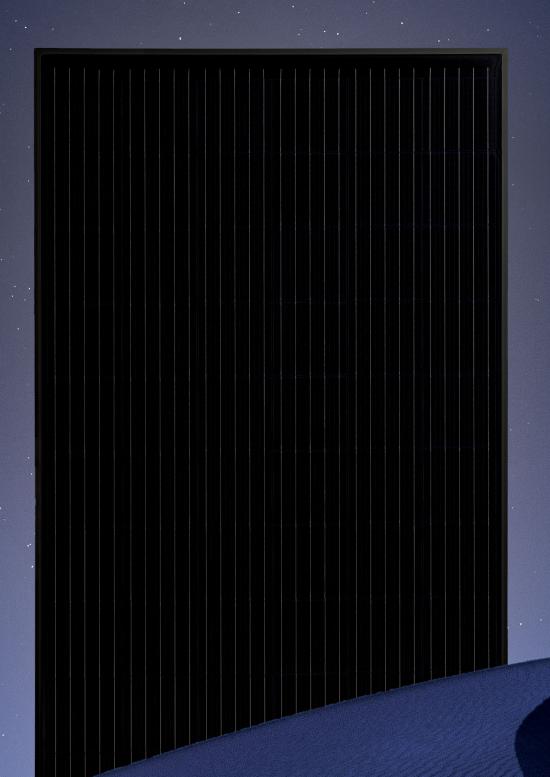
## BLACKSTAR

Icon of a solar future



**SOLISTEK** 

## SoliTek BLACKSTAR

### The New Star is Born

Manufacturing innovation is SoliTek DNA.

In 10 years we have matured to offer the
European market an exceptional new product.

We are introducing our new flagship **BLACKSTAR** solar panel, that will please even the most refined and demanding customer. At the core of this innovative product lie 3 major elements:

- Bifacial monocrystalline solar cells
- | Premium tempered glass
- Flawless industrial design

This allows us to deliver a totally new user experience, when **BLACKSTAR** solar panel is installed on any rooftop. It's esthetically pleasing 100% black face looks sleek and breathes luxury; the **BLACKSTAR** panels can be installed framed on any possible roof surface.

For a decade SoliTek is researching, developing & manufacturing solar panels only in Europe and only from trusted component suppliers.

The highest production standards & quality of BLACKSTAR panels is approved by 100% circular economy compatible Cradle to Cradle Certified™ Products Program Silver Award - one of its kind in the world.



## Rarely a product can be advertised looking at it from the back side.

**BLACKSTAR** is different, because of exceptional industrial design. Yes, and the solar cells absorb the light from the back, too.



Product warranty



Efficiency guarantee



Power guarantee

## All the greatest features in one product



100% Recycable



Salt mist resistance



Ammonia resistance



Dust & sand resistance



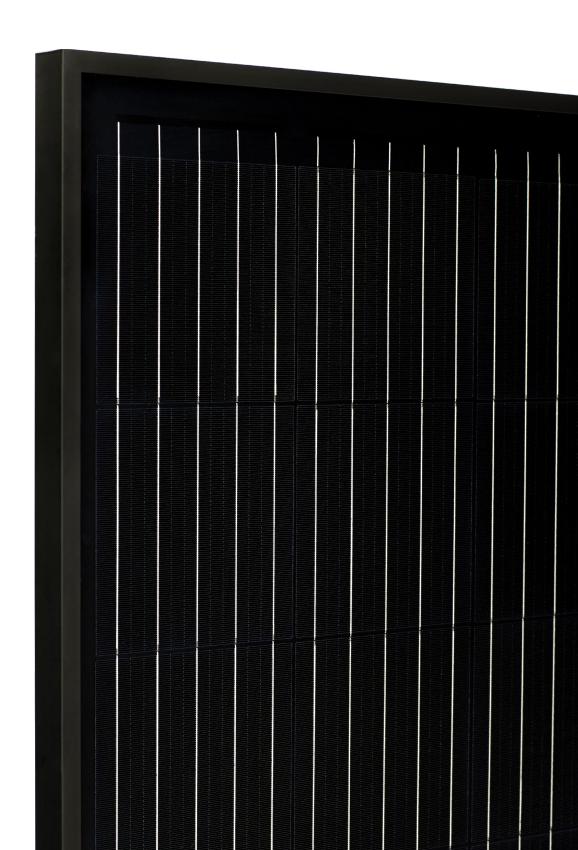
Extreme load resistance



Self-cleaning effect



Fire class A

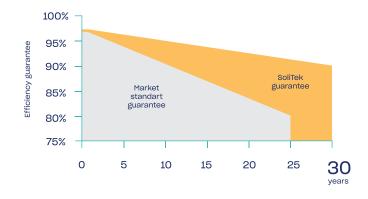


## BLACKSTAR - a part of SOLID full glass panel series

Our SOLID series of full glass panels are manufactured with 3 top priorities:

- Longest lifetime in the market
- Highest reliability
- 100% recyclable

BLACKSTAR panels are designed for even roughest cold, hot, windy and salty environments, they are 100% fireproof (class A) and totally recyclable. We have thoroughly tested and selected all our parts & materials suppliers. Because even the strongest chain is only as strong as its weakest link.





### What is bifacial?

**Bifacial** is called an advanced double-sided solar panel that transforms sunlight into electrical energy on both - its top and bottom - sides.

This is made possible using double sided solar cells and protective tempered glass on both - top and bottom - sides of the panel. It is very different from conventional solar panel with opaque backing.

The bottom solar cell side absorbs light that is reflected off the ground. This light is called albedo light. The white surface beneath the panel can reflect up to 80% of reflected sunlight.

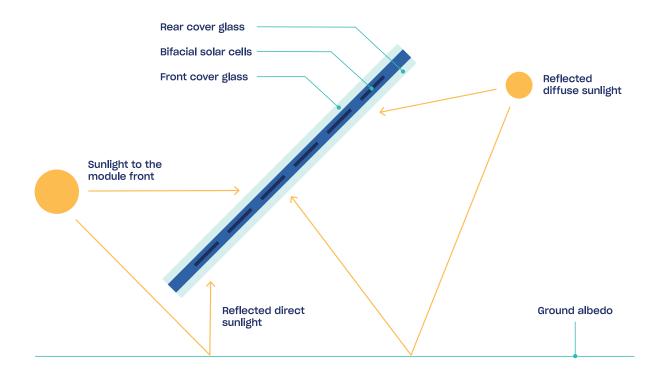
At ideal circumstances bifacial solar panel can generate up to 40% more electricity, compared with conventional solar panel.



Traditional cell back



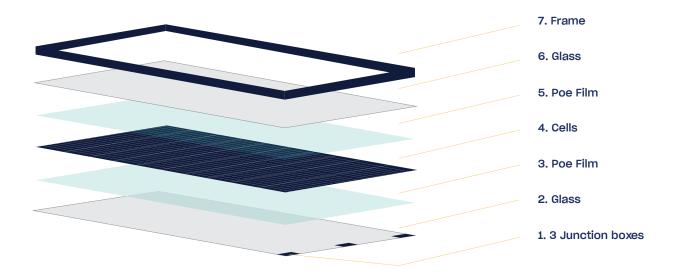
Bifacial cell back



## Anatomy of BLACKSTAR

At heart of every BLACKSTAR solar panel resides top quality components.

Each component plays an important role in the lifetime and performance of our panels. By using only the highest grade materials we are able to offer industry-leading product warranties.



### **Product test**

To test our product for extreme durability, BLACKSTAR test-modules are placed in an industrial grade "test oven" to undergo 250 Thermal Cycles (up to +70C) and 50 Humidity Freeze Cycles (down to -50C), totaling to 5000 hours of hard tests, that simulate 50 years of "ordinary life on earth".

## Poe is the key

Most manufacturers are using EVA encapsulants. **We use POE.** 

	POE	EVA
No Acetic acids	+	-
100% Waterproof	+	-
No browning	+	-
Eliminated PID	+	-
Maximum Lifetime	50 years	25 years

# 100% environmentally safe product

SoliTek has been manufacturing solar panels sustainably for years, using both solar and geothermal energy in the process, sourcing only trusted parts and materials and recycling majority of the waste generated during manufacturing.

In 2020 a globally renown Cradle to Cradle Products Innovation Institute certified SoliTek SOLID module range with a unique Silver level certificate, approving SoliTek glass panels to be 100% compatible with European circular economy requirements.

Cradle to Cradle Certified™ is a globally recognized measure of safer, more sustainable products made for the circular economy. Product designers and manufacturers around the world rely on the Cradle to Cradle Certified Product Standard as a transformative pathway for designing and making products with a positive impact on people and planet.

### Cradle to Cradle Certified™ Assessment Categories









#### MATERIAL HEALTH

The material health category helps to ensure products are made using chemicals that are as safe as possible for humans and the environment by leading designers and product developers through a process of inventorying, assessing and optimizing material chemistries



#### MATERIAL REUTILIZATION

The material reutilization category aims to eliminate the concept of waste by helping to ensure products remain in perpetual cycles of use and reuse from one product use cycle to the next.



#### RENEWABLE ENERGY & CARBON MANAGEMENT

The renewable energy & carbon management category helps to ensure products are manufactured using renewable energy so that the impact of climate changing greenhouse gases due to the manufacturing of the product is eliminated.



#### WATER STEWARDSHIP

The water stewardship category helps ensure water is recognized as a valuable resource, watersheds are protected, and clean water is available to people and all other organisms.



#### **SOCIAL FAIRNESS**

The social fairness category helps ensure business operations that honor all people and natural systems affected by the manufacture of a product.

## Blackstar

blæk- sta:(r)

A unique star, that absorbs maximum amount of solar radiation and thus appears as a totally black sky object with a slight, mystical aura around it.