

The Northern-European Solar Energy Leader

MANUFACTURER OF GLASS GLASS SOLAR PANELS

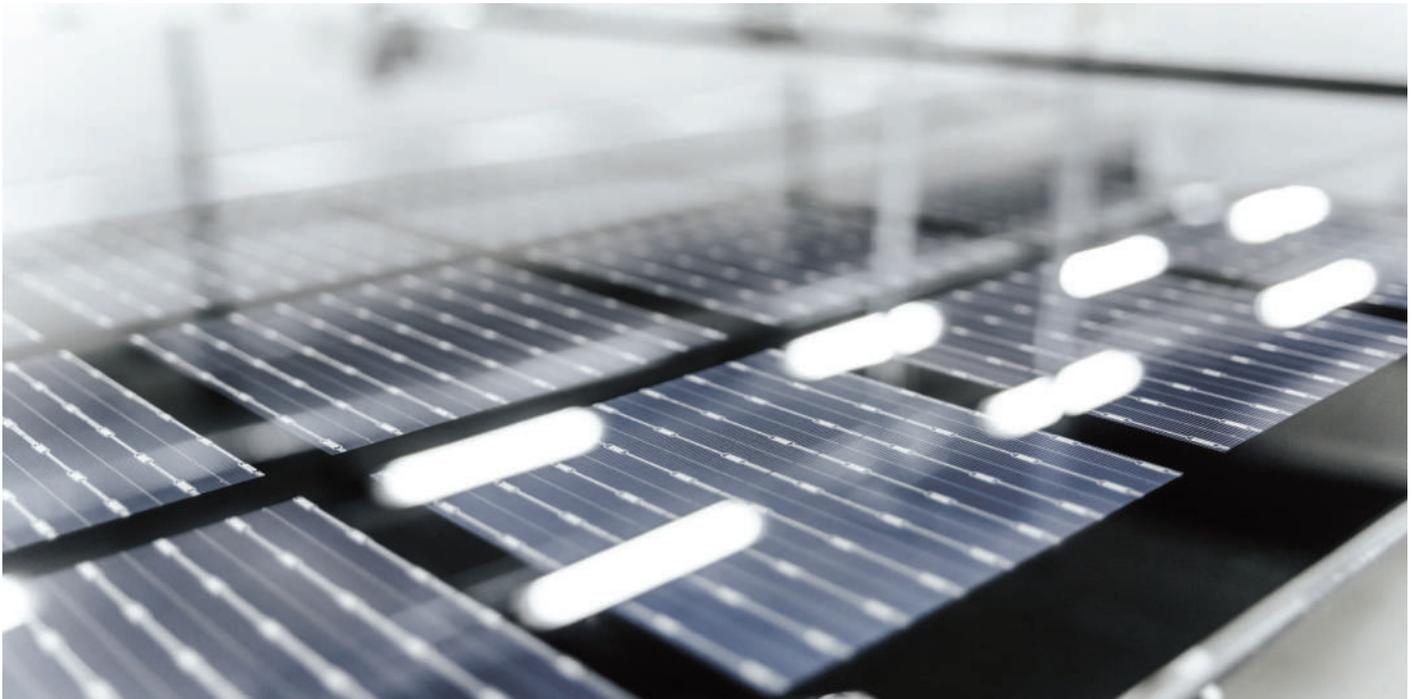


It's all about innovation

Implementing innovations into all products is DNA of SoliTek. In 14 years we have matured to offer the European market exceptional new products, that will please even the most refined and demanding customer.

Our latest products have 3 major elements:

- Bifacial solar cells
- Premium tempered glass to glass lamination
- Flawless industrial design





- 1998 ● CD replication business is born
- 2002 ▬ CD factory opened in Vilnius
- 2009 ● Solar energy business is born
- 2013 ▬ Production of solar cells and modules started
- 2014 ● Eyeglass lenses business is born
- 2020 ▬ New automated solar modules production line launched
- 2021 ▬ CD replication business sold
- 2023 ▬ Solar batteries factory in Vilnius opened
- 2024 ▬ Solar modules factory in Italy launch
- 2025 ▬ Solar batteries factory in Italy launch

Partner in researches

Cerificates:



Deutsches
Institut
für
Bautechnik



PRODUCED USING 100%
RENEWABLE ENERGY

Memberships:



Svensk
Solenergi



Programs:



CABRISS

2015.06 – 2018.06
partner



2015.10 – 2018.10
partner



2018.05 – 2022.10
coordinator



2018.06 – 2022.11
partner



2019.10 – 2022.09
partner



2021.07 – 2024.04
participant



2023.10 – 2026.03
participant



2023.06 – 2026.05
participant



2023.01.01 – 2026.12.31
participant

Universities:



kauno
technologijos
universitetas

1922



International Solar Energy
Research Center Konstanz



Vilnius
universitetas

Danmarks
Tekniske
Universitet



Fraunhofer



INES
INSTITUT NATIONAL
DE L'ENERGIE SOLAIRE



SINTEF

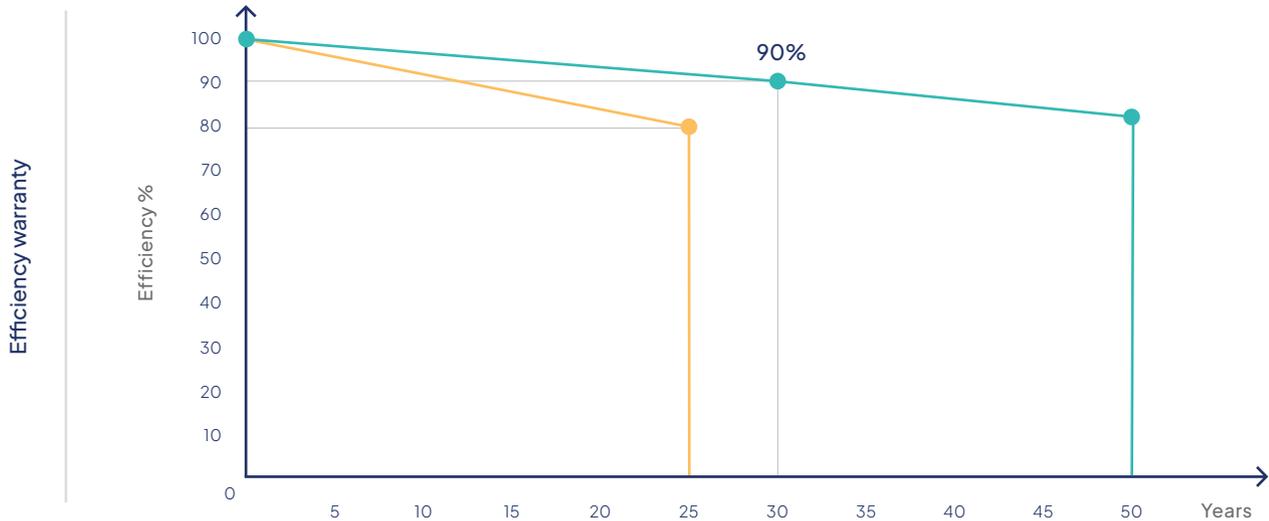
Certified by Cradle to Cradle

The Cradle to Cradle certification defines 5 components for circular economy compatible product:

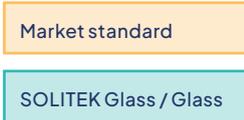
| Cradle to Cradle Certified® Product scorecard | |
|--------------------------------------------------|----------|
| Material health | Gold |
| Material reutilization | Gold |
| Renewable energy & carbon management | Gold |
| Water stewardship | Platinum |
| Social fairness | Gold |



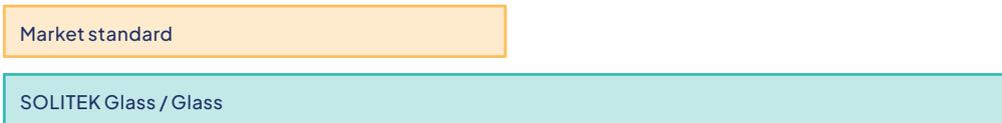
Longer warranty for higher efficiency



Product warranty



Lifetime



Market standard of 12 year product warranty and 25 year efficiency warranty sounds good only on paper. This means that if the panel fails completely after 13 years it is not covered by any warranty.

- | 30 years product warranty
- | 30 years of 90% efficiency warranty
- | 50 years predicted lifetime

Best choice for your wallet. 30 year savings

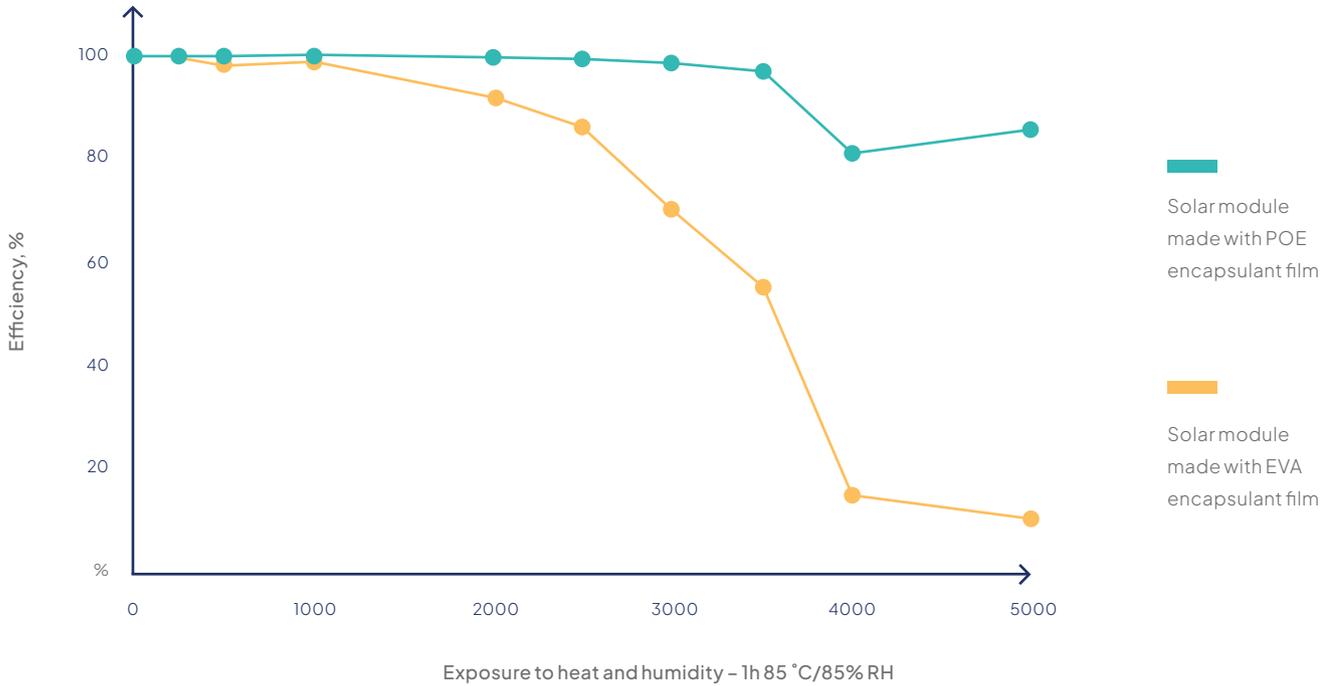
A house with a solar power plant system increases by ~3% in value and sells 20% faster! It makes sense to invest in a PV system that lasts!

23% more savings!



* Levelized cost of electricity (LCOE) calculated for a 30 year period.

POE is the key



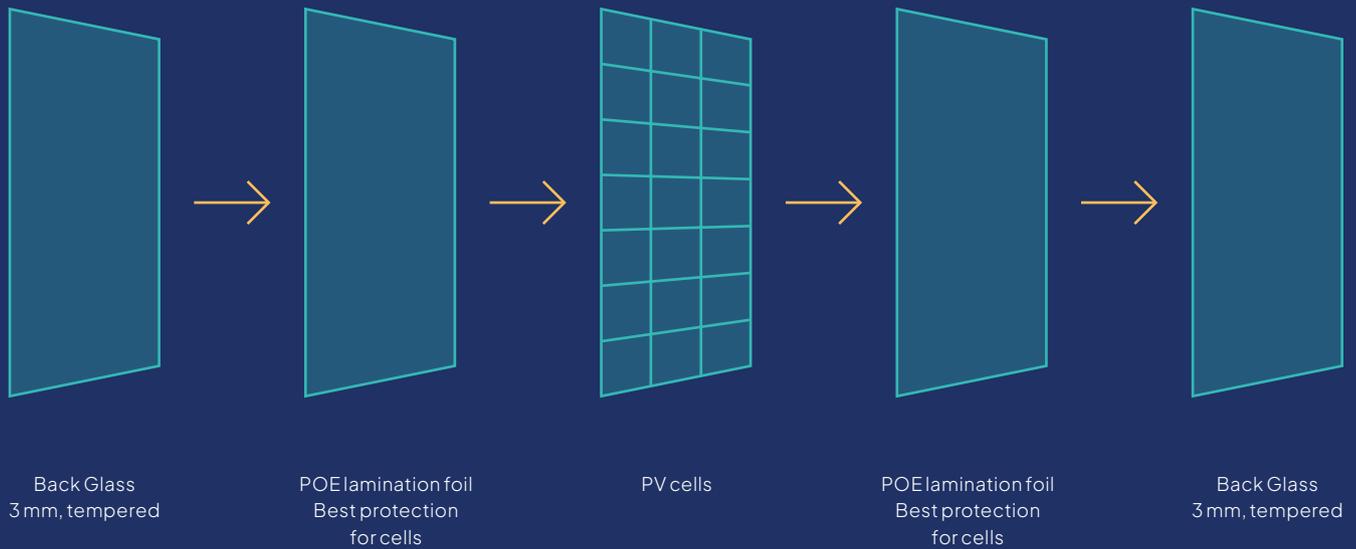
● Glass leaching caused drop in Short Circuit Current; no film or panel degradation.

● Following 1000 h Damp Heat, both panels underwent 50 Thermal Cycles and 10 Humidity Freeze Cycles. Both panels were then placed back into Damp Heat.

Most manufacturers are using EVA encapsulants.
We use POE.

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

Glass Glass anatomy



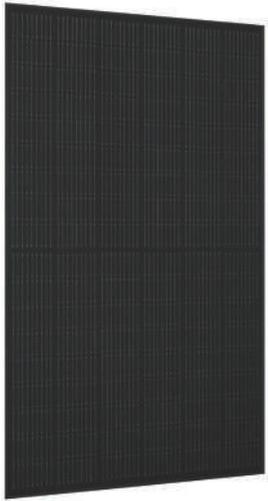
Highest grade materials

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.

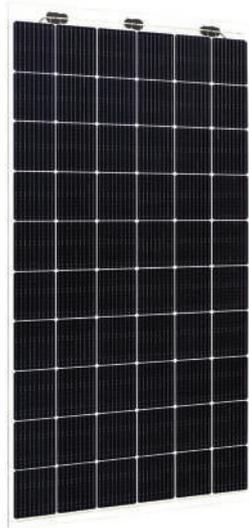
No backsheet - no weak spot

Backsheet is a 0.4 mm plastic sheet used in most of the panels on the market today. By eliminating this we are able to dramatically reduce the rate of the panel failure.

Premium Products



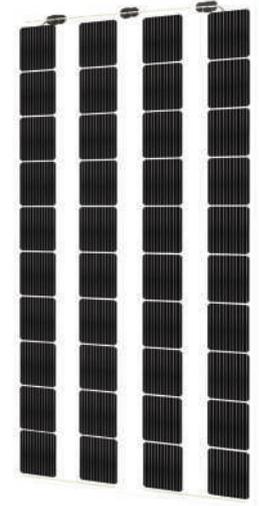
BLACKSTAR
420W



SOLID Bifacial
370W



SOLID Solrif
370W



SOLID Agro
245W



50 years
Expected lifetime



30 years
Product & Efficiency guarantee



90%
After 30 years
Efficiency guarantee



Fire class A



35% of recycled
glass content



98,8% recyclable



Original Staubli
MC4-EVOII
connectors

Certifications



Product assessed in
SundaHus Material Data



PRODUCED USING 100%
RENEWABLE ENERGY

Resisting (almost) everything

SOLID Bifacial 370W and SOLID Agro 245W are two solar modules which have especially high resistant level to environmental and mechanical influence.

SOLID Bifacial / SOLID Agro Glass-Glass advantages



Self-Cleaning effect



Extreme load resistance



Hail resistance



The toughest of the toughest



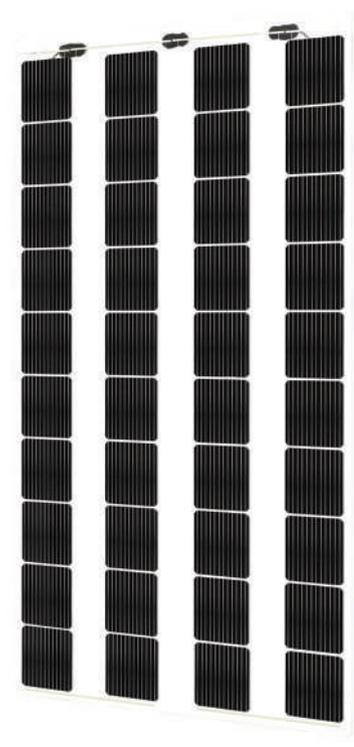
Extreme wind resistance



Officially approved for overhead use by DIBt



SOLID Bifacial
370W



SOLID Agro
245W

Obtaining the MAXIMUM

BLACKSTAR, the epitome of cutting-edge solar technology, proudly made in the EU. These full black N-type, TOPCon bifacial solar panels are offering exceptional efficiency and striking aesthetics.

BLACKSTAR Glass-Glass 420W N-Type, TOPCon advantages



8100 Pa
Extreme load
resistance



90% Efficiency
guarantee
after 30 years



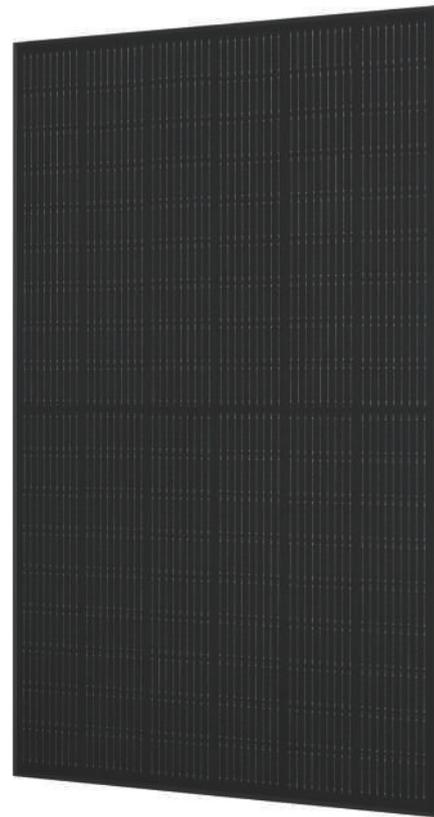
Full black
design



TOPCon cells



420 W
The Most
powerful



BLACKSTAR
420W

Combining Elegance & Practicality

SOLID Solrif® module specially designed for integration into the rooftop where the glass/glass module acts as a large, strong and safe photovoltaic roof tile.

The standard of durability - SOLID Solrif



Self-Cleaning
effect



Extreme load
resistance



Hail resistance



The toughest of
the toughest



Extreme wind
resistance



Aluminium
composite-dummie
panels



SOLID Solrif
370W

SOLID Solrif® – solar power plant as a roof

It became possible when we connected our fire class A Glass-Glass solar module SOLID Pro with Solrif® system from Ernst Schweizer AG. We call this system SOLID Solrif®.

SOLID Solrif® is valued for its ability to generate electricity, for its simplicity of mounting and design.

House owner saves money twice: at first on roof tiles, and later - on smaller bills for electricity at least for 30 years. All we need to provide the offer is building location and roof dimensions.

Solrif® frame – Ernst Schweizer AG

- 2 decades of development and improvement
- 1920: Company founded
- 1999: Launch of Solrif® frame and mounting system



SOLID Wall – smart and environment friendly solution for facade

Modern outlook of the building

Sustainable and effective

Shows your point of view to environment and global warming issues

Increases the level of energy efficiency of the building

Decreases temperature inside the building on hot season

And generates electricity as well!



Carport with integrated solar panels

Carports eliminate the need for a surface on which solar panels could be mounted. Dependent on the number of places of parking required, carports are typically one, two or three places wide. Installing a solar carport can power your home, or it can turn a wide-open stretch of pavement into a major electricity generator.

Wood construction

With bifacial panels

5.92 kW

One car



11.84 kW

Two cars



Ground mounted solar plants

Electricity delivered to
1100 homes

4.6 MW ✓

Turkey

Solar park with SOLID Bifacial modules, single axis sun tracking system and white covering on the ground - 40% more effective solar park.

2 MW ✓

Ukraine

3.4 MW ✓

Lithuania

1.7 MW ✓

Lithuania



AgroPV – the future of agriculture

Agrivoltaics or agrophotovoltaics is the simultaneous use of areas of land for both solar photovoltaic power generation and agriculture.

Combining food and energy production together, dramatically increases the net revenue output from the same piece of land - additional annual financial benefit up to 80%.

3 types of agro-solar power plants:

- Farming under the agrivoltaic system
- Farming between the agrivoltaic system
- Greenhouses



The advantages of Agro-solar compared to traditional agriculture

- Growing fruit and generating green energy at the same time, at the same place.
- Durable and robust protection for your crops, resistant to all types of weather. No more worries about storms or hail showers and less affected by extreme heat.
- More stable microclimate - lower maximum temperatures and higher minimum temperatures.
- No labor to assemble and disassemble the plastic/foil.
- Conserves moisture in the ground - less irrigation, saving water resources.
- Smartly installed agro-power plant protects the soil from erosion.
- No investment in expensive (conventional) cultivation support facilities.
- Give your company a more sustainable look.



Sound barriers with integrated PV solutions: saving the construction costs – producing energy – safeguarding the population

- Applicable to roads and railways.
- Currently the efficiency of the PV and integration modes offers competitive and saving costs solutions.
- Large surface areas are needed to generate electricity from PV modules. Therefore, PV Noise barriers offers additional area over and above the land on which PV modules can be installed and which can provide a better land use ratio for energy production than conventional solar PV farms.

Possible noise barriers height

2.5 – 7 m 



Proud to be green and innovative from very beginning

Recognized as the “Greenest Industrial Building in Europe” in 2013 by the German Chamber of Commerce. All production is powered by 100% renewable energy.

Most of our power demand is satisfied by our own patented PV-Geothermal heating and cooling system, which consists of 1MW of Geothermal power and 150 kW of PV power.

Due to our use of renewable energy use in manufacturing, we save over 400 tons of CO² from emission each year. That's the equivalent of planting 2000 trees every year.



Energy storage solution

SoliTek, Avesta Battery & Energy Engineering (ABEE) and IMECAR Elektronik have signed a joint venture agreement for the set up of a new battery pack production in Lithuania (Vilnius). The battery pack factory will be fully operational by June 2023.

The new factory will have a starting production capacity of 350 MW, which will later be scaled up towards 1 GW. The produced battery packs will be designed for home storage, industrial and renewable applications.

R&D Battery Equipment

2023 Vilnius Lithuania



Strengthening market presence in Europe

SoliTek is set to expand its operations into Italy with its largest investment of nearly 50 million euros in Benevento. The project is expected to take three years.

The facility will have a solar panel production capacity of 600 MW and a residential battery line of 1 GW. The production line will focus on agro-installations (AgroPV), which is ideal for Italy's favourable climate.

50 million Euro investment

300 jobs created

3 years project

Fully Solar powered





solitek.eu

