



## TECHNICAL SHEET





**SBskin**  
smart building skin

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Multifunctional, high-customizable façade and roof components  
for unique architectural applications

### **SolarGBPanel**

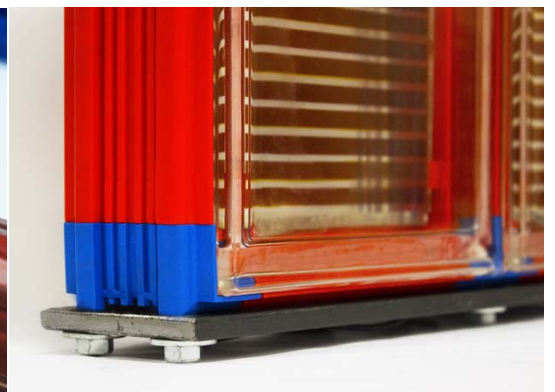
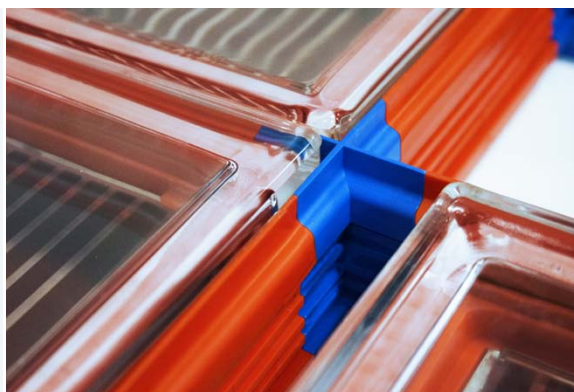
Panels made of PV-integrated glass blocks for outdoor applications

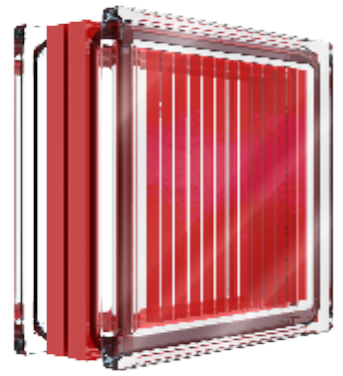
### **ThermoSolarGBPanel**

Panels made of highly-insulating and PV-integrated glass blocks for outdoor applications

#### **MAIN FEATURES:**

- Several colour combinations of solar cell and thermal belt
- Solar cells efficiency not affected by high temperatures
- Energy production also in diffuse light conditions
- Bifacial PV technology
- Adaptable panel size
- Anchoring system to the building structure customizable according to customers' requests





# TECHNICAL DATA | GLASS BLOCK

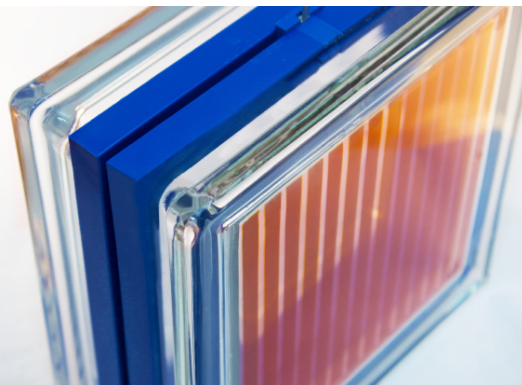
		SolarGBPanel	ThermoSolarGBPanel
Glass block dimension	(cm)	19x19x8	19x19x8
Joint dimension	(cm)	0.2	0.2
Weight	(kg/m <sup>2</sup> )	100	112
U-Value*	(W/m <sup>2</sup> K)	2.9	1.0-2.0
Tvis	(%)	● 10-24	
		● 16-30	
g-value	(%)	● 25-35	
		● 20-38	
Nominal Peak Power**	(Wp/m <sup>2</sup> )	● 12.47	
		● 11.74	
Nominal Efficiency (1 sun)	(%)	● 3.6	
		● 3.4	
Nominal Efficiency (0.5 sun)	(%)	● 4.7	
		● 4.4	

\* According to EN 1051 e EN 673

\*\* Electrical data standard test conditions (STC)

● red solar cell

● green solar cell



# TECHNICAL DATA | PANEL

N° of glass blocks			25	50	75	100
	<i>n° per row</i>		5	10	15	20
	<i>n° per column</i>		5	5	5	5
PV Performance*						
Nominal peak power	(Wp)	●	11.50	22.99	34.49	45.99
		●	10.82	21.64	32.46	43.28
Open-circuit voltage	(V)	●	40.00	80.00	120.00	160
		●	40.00	80.00	120.00	160
Short-circuit current	(A)	●	0.511	0.511	0.511	0.511
		●	0.519	0.519	0.519	0.519
Voltage at nominal power	(V)	●	28.85	57.70	86.55	115.40
		●	27.05	54.10	81.15	108.20
Current at nominal power	(A)	●	0.40	0.40	0.40	0.40
		●	0.40	0.40	0.40	0.40
Transparency	(%)	●	29.00	29.00	29.00	29.00
		●	32.00	32.00	32.00	32.00

\* Electrical data standard test conditions (STC)

● red solar cell      ● green solar cell

- Each module is equipped with by-pass diode in order to avoid hot-spot and guarantee the best functioning of panel.
- Blocking diodes avoid reverse current to flow back through the panel. A junction box allows for a simpler and more effective connection of panels.
- Panels can be connected either in series or in parallel, based on the needs of each installation, in order to reach the input voltage and current of the chosen inverter.
- Based on the needs of each project, more opaque and more efficient modules might be used.
- SBskin provides technical support and detailed instructions for the panel installation and for optimal integration.