



**POLYTROPIC**  
• POOL HEATING SOLUTIONS •

# POLYSOLAR ENERGY SYSTEM

the photovoltaic solution



## INNOVATION !

Make the most of your heat pump by combining it with the PolySolar Energy System photovoltaic panel kit.

Electricity consumption is then optimised by being partially independent of the electricity distribution network and allowing self-consumption: up to 100% of the consumption required for your heat pump to operate properly can be supplied\*.

*\*over the season depending on the model and number of panels*



# Reduced electricity bills and energy savings

Combining the Polytropic heat pump with the PolySolar Energy system photovoltaic system is already a worthwhile investment, and offers numerous advantages.

By converting the sun's rays into electricity, the photovoltaic panels produce and optimally supply the pool heat pump with up to the full power required (depending on the number of panels, exposure and geographical location), while the remaining consumption is covered by the conventional electricity grid.

*Electricity consumption is then optimised by being partially independent of the grid and allowing self-production and self-consumption.*

As soon as the water in the pool reaches 28°, the excess of energy produced supplies the rest of the pool house equipment, as well as the rest of the house!

The user can also choose to keep the heat pump running to use the pool as an indirect energy store in the form of calories.

## Installation

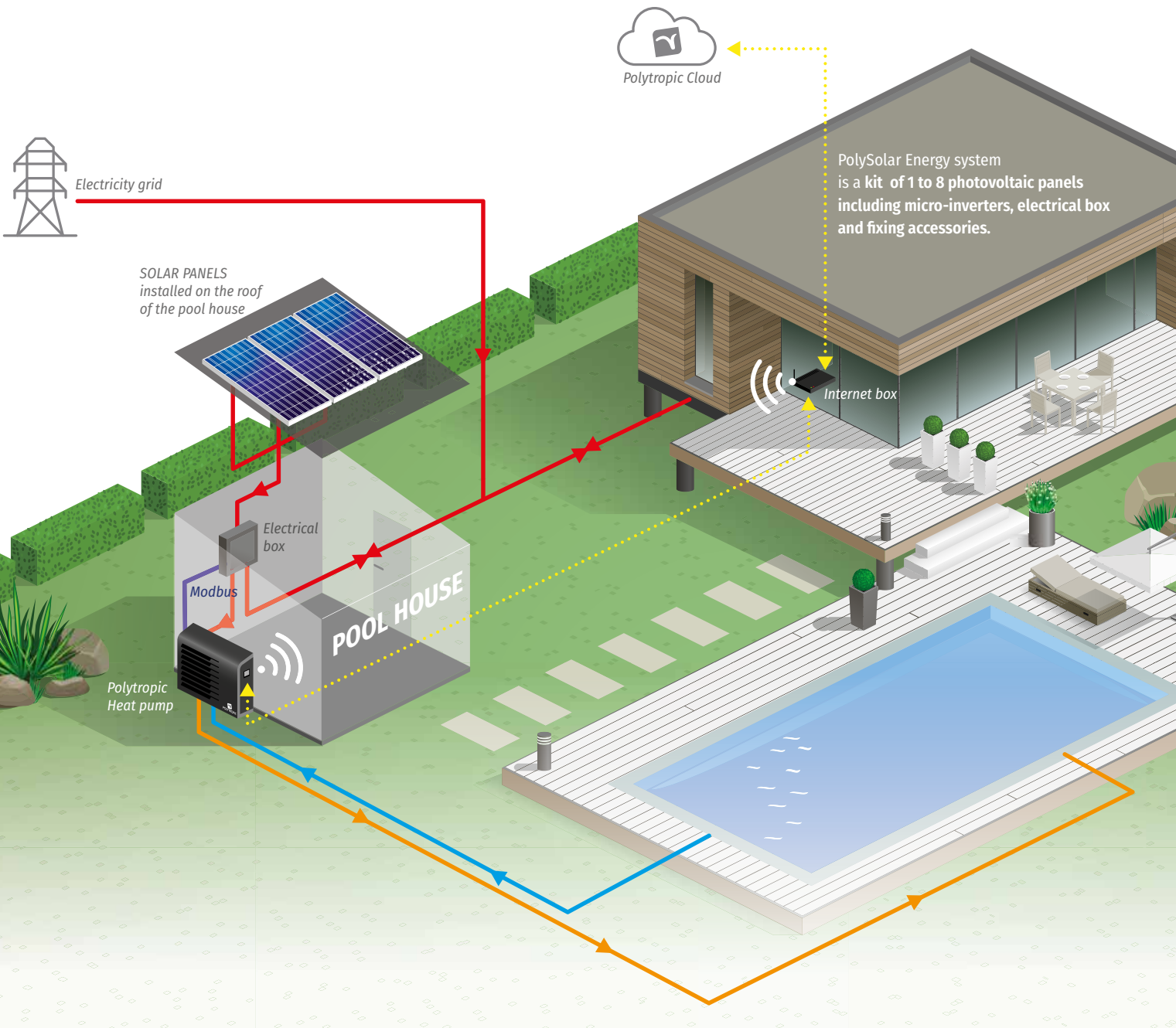
Installed on the roof of the pool house or in the south-facing garden, the system is very easy to connect with standard electrical authorization.



Roofing installation accessories



Accessories for floor or flat-roof installation



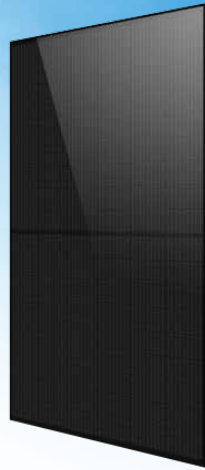
# Features and **benefits**



**Financial gain** : the PolySolar Energy system can produce up to 100% of the energy required over the season to run the pool heat pump. When the pool water is at the desired temperature, the energy supplied by the panels is consumed by the other electrical appliances in the house, contributing to the overall profitability of the system.



**Performance** : High-efficiency solar cells convert all the sun's rays thanks to their high-performance coating.



**Easy** : plug & play installation on any pool house roof or south-facing garden. The kit is very easy to connect, and only requires electrical clearance.



**Guarantee** : French photovoltaic panel manufacturer, 25-year product guarantee, 85% photovoltaic yield guaranteed after 25 years.

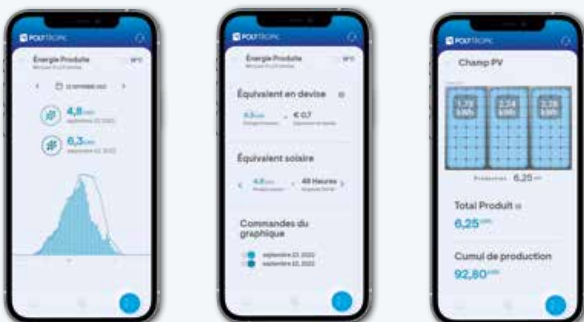
## Technical specifications

ROOF Installation			
Ref.	Name	Kit contents	Peak power
PS010001	Pack PolySolar Energy System 1 panel ROOF	1 PV panel, 1 micro-inverter, 1 box, fixings: 2 rails 4 hooks 4 clamps (+ accessories)	0,375 kWc
PS010002	Pack PolySolar Energy System 2 panels ROOF	2 PV panels, 1 micro-inverter, 1 box, fixings: 2 rails 4 hooks 6 clamps (+ accessories)	0,75 kWc
PS010003	Pack PolySolar Energy System 3 panels ROOF	3 PV panels, 1 micro-inverter, 1 box, fixings: 2 rails 6 hooks 8 clamps (+ accessories)	1,125 kWc
PS010004	Pack PolySolar Energy System 4 panels ROOF	4 PV panels, 1 micro-inverter, 1 box, fixings: 4 rails 2 junctions 8 hooks 12 clamps (+ accessories)	1,5 kWc
PS010006	Pack PolySolar Energy System 6 panels ROOF	6 PV panels, 2 micro-inverters, 1 box, fixings: 4 rails 2 junctions 12 hooks 16 clamps (+ accessories)	2,25 kWc
PS010008	Pack PolySolar Energy System 8 panels ROOF	8 PV panels, 2 micro-inverters, 1 box, fixings: 8 rails 4 junctions 16 hooks 22 clamps (+ accessories)	3 kWc

DECK Installation			
Ref.	Name	Kit contents	Peak power
PS020001	Pack PolySolar Energy System 1 panel FLOOR	1 PV panel, 1 micro-inverter, 1 box, 1 ballast tray (+ accessories)	0,375 kWc
PS020002	Pack PolySolar Energy System 2 panels FLOOR	2 PV panels, 1 micro-inverter, 1 box, 2 ballast trays (+ accessories)	0,75 kWc
PS020003	Pack PolySolar Energy System 3 panels FLOOR	3 PV panels, 1 micro-inverter, 1 box, 3 ballast trays (+ accessories)	1,125 kWc
PS020004	Pack PolySolar Energy System 4 panels FLOOR	4 PV panels, 1 micro-inverter, 1 box, 4 ballast trays (+ accessories)	1,5 kWc
PS020006	Pack PolySolar Energy System 6 panels FLOOR	6 PV panels, 2 micro-inverters, 1 box, 6 ballast trays (+ accessories)	2,25 kWc
PS020008	Pack PolySolar Energy System 8 panels FLOOR	8 PV panels, 2 micro-inverters, 1 box, 8 ballast trays (+ accessories)	3 kWc

## The app

Thanks to the PolyConnect 2.0 app, you can view your self-generation/ consumption quota in real time.



# PolySolar Energy system is **compatible with** :



## Every installation is **different!**

2 examples of installations completed in 2023:



- 8 m x 4 m covered swimming pool
- in the **Rhône area**
- heated to a set **temperature of 28°C**
- by a Master-Inverter S heat pump
- **from 15 May to 15 September**

### WITH A 4-PANEL PACK

Productivity: 1950 kwh/year  
 Potential savings\*: €443.82  
 Return on investment (10 years)\*\*: €5,322.94  
 Return on investment (25 years)\*\*\*: €19,102.75

> **100% of the electricity consumed by the heat pump, variable-speed filtration pump AND water treatment system over the season is generated by the photovoltaic panel kit.**

- 7 m x 4 m covered swimming pool
- in the Dordogne
- heated to a set **temperature of 28°C**
- by a Morpheo S heat pump
- **from 15 May to 15 September**

### WITH AN 8-PANEL PACK

Productivity: 4200 kwh/year  
 Potential savings\*: €955.92  
 Return on investment (10 years)\*\*: €11,465  
 Return on investment (25 years)\*\*\*: €41,144

> **100% of the electricity consumed by the heat pump, water treatment system AND filtration pump over the season is generated by the photovoltaic panel kit.**

Over this period, after powering the swimming pool, **a surplus of €300 of energy produced is available to power the rest of the electrical appliances in the house.**



\* calculation based on the price of a customer kWh - EDF base rate on 08/2023: €0.2276  
 \*\* taking into account a 5% annual increase in electricity prices  
 \*\*\*Decrease in module performance of 0.5% per year (manufacturer)