

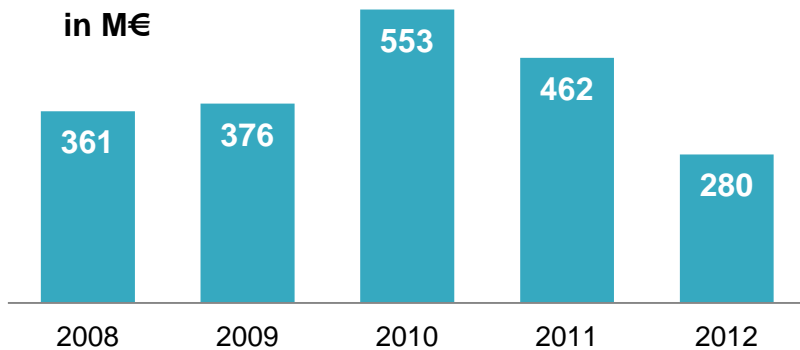
# Company Presentation

aleo

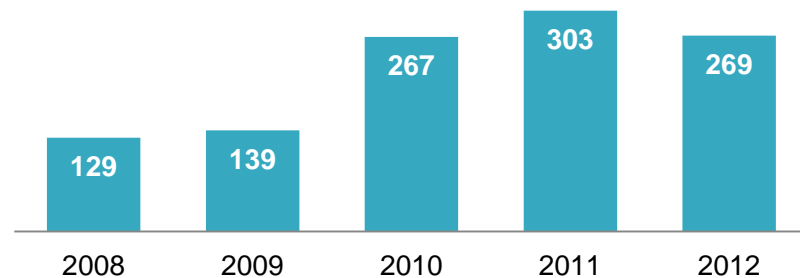


Patra, Greece  
July 2013

income  
in M€



production  
in MW



## General Information

- ◆ Foundation year 2001
- ◆ 2012: income 279,9 M €  
920 employees
- ◆ PV module manufacturer with our own sales network
- ◆ Capacity 280 MW
- ◆ Factory: Prenzlau (DE)
- ◆ Branches in Italy , USA, UK & Australia
- ◆ Offices in France, Greece, Belgium, Czech Republic



Production Capacity: 280 MW  
(Prenzlau Germany)

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# aleo production line in Prenzlau (Germany)

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- ◆ **High Efficiency module:** Maximum efficiency in the minimum area
- ◆ **High Yield module:** Energy production from „front & back“
- ◆ **Hybrid module:** Hot water and electricity production
- ◆ **Low reflection module:** For installations near airport and facades
- ◆ **Frameless module:** Glass to glass module for aesthetic building integration
- ◆ **AC module :** ac directly from the PV module

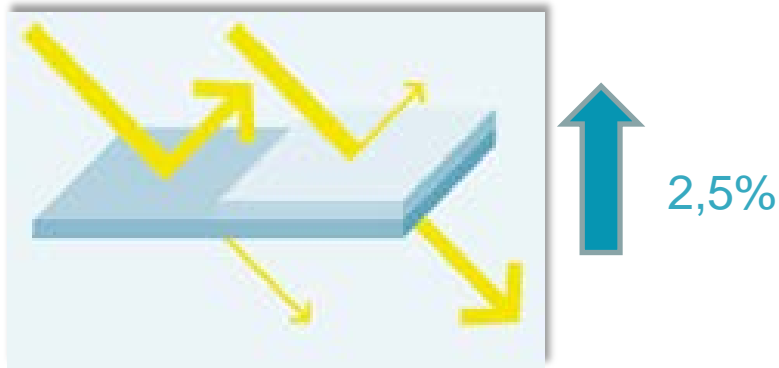


- ◆ With the product series “High Efficiency” aleo solar provides PV modules up to 290W
- ◆ Due to the solar glass with low reflection properties, the EVA foil of high transparency and the state of the art solar cell connection , the aleo PV modules utilize solar energy more efficiently
- ◆ Efficiency is even higher with the use of «Light Harvesting String» (LHS) for solar cell connection

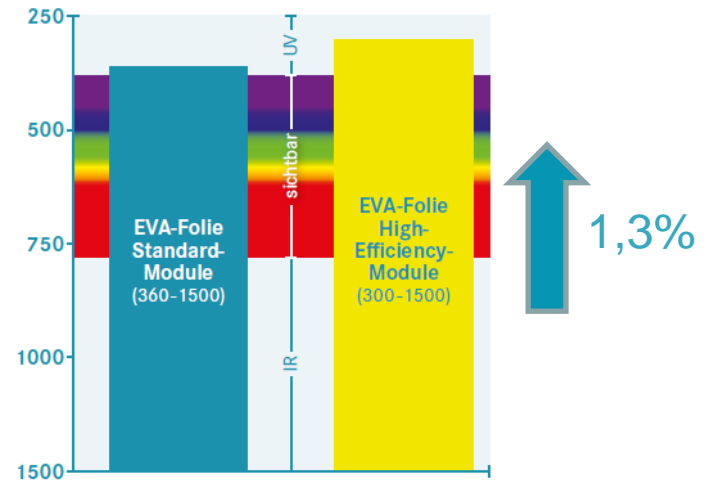


# High Efficiency module

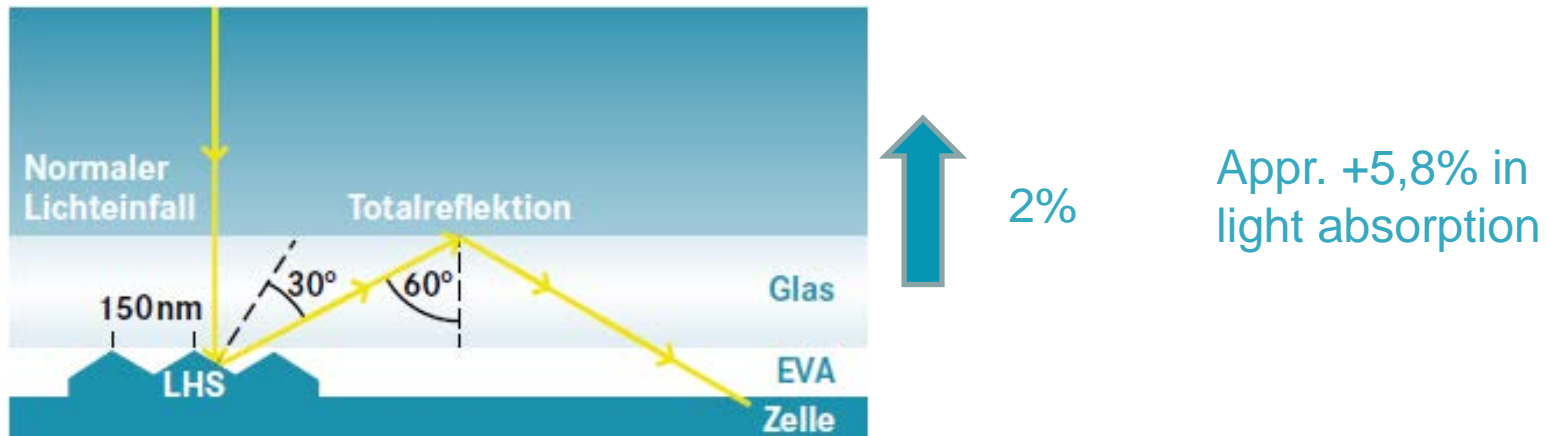
### AR - Glass



### New EVA foil

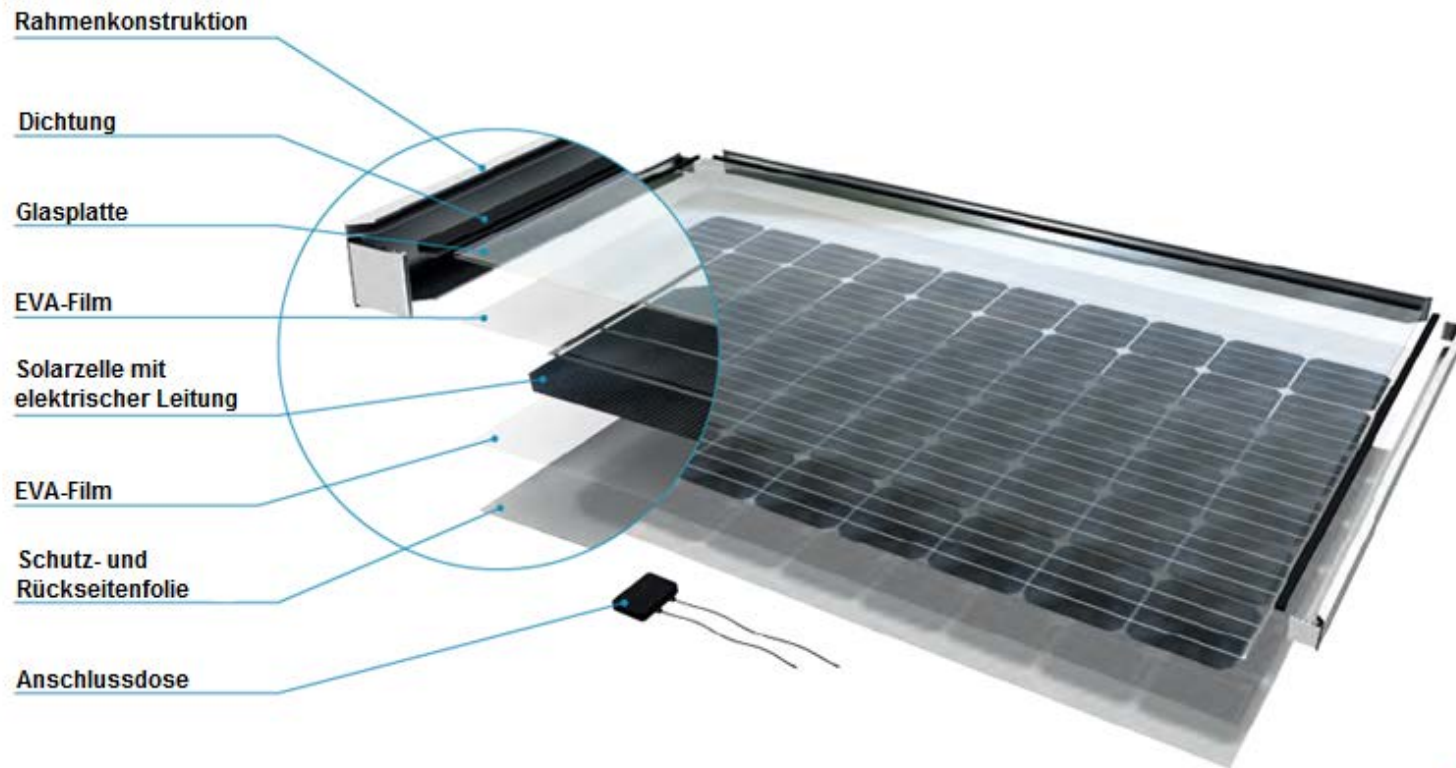


### Light Harvesting String (LHS)



# High Efficiency module

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- ◆ aleo solar brings a module fitted with photovoltaic cells capable of producing electricity on both sides for an added increase in performance
- ◆ Just how much? **10%-25%** more yield with identical Balance of System costs as for standard modules
- ◆ It can be seen as regular 60-cell module with output power of about **300W**



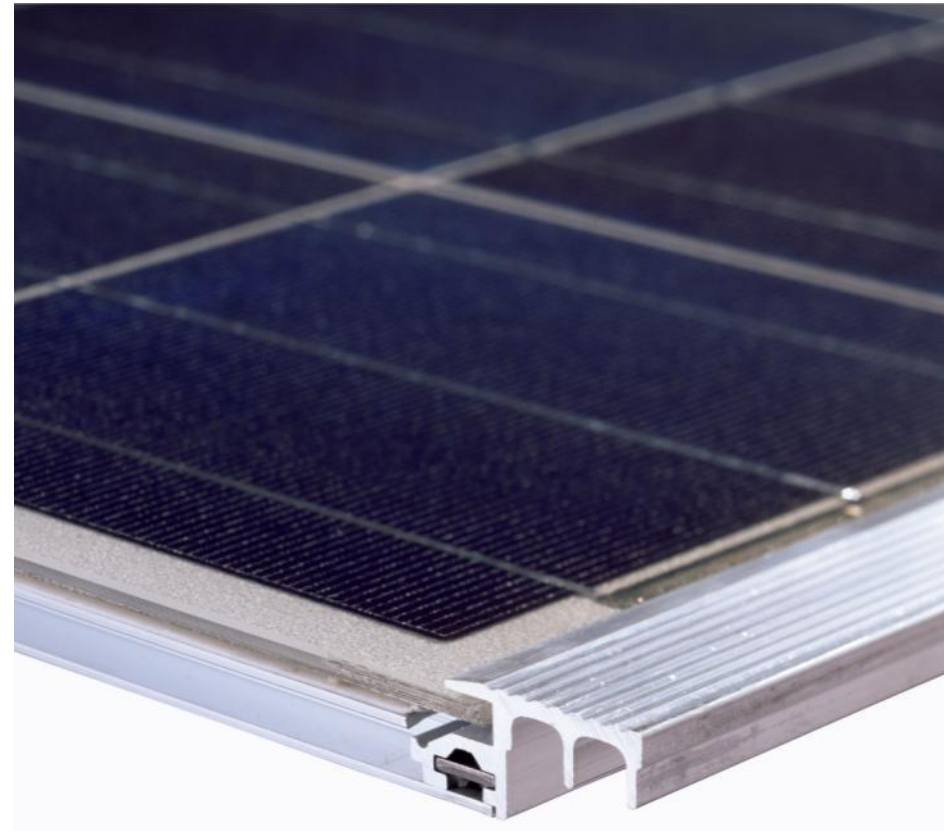
# High Yield Modules are suitable for every solar application

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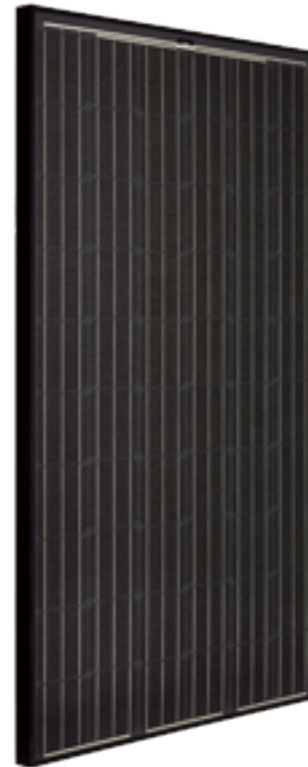
...where  
the back  
side is  
not  
covered

- ◆ Since 2009 aleo offer a BIPV product series - Solrif
- ◆ Solrif is easily installed in every roof type
- ◆ The system replaces the existing roof covering, and saves the cost of a new roof
- ◆ Solrif module create elegant solutions that meet demanding requirements
- ◆ Weatherproof and absolutely rain-tight replacement of bricks
- ◆ Beautiful optics even despite partial replacement

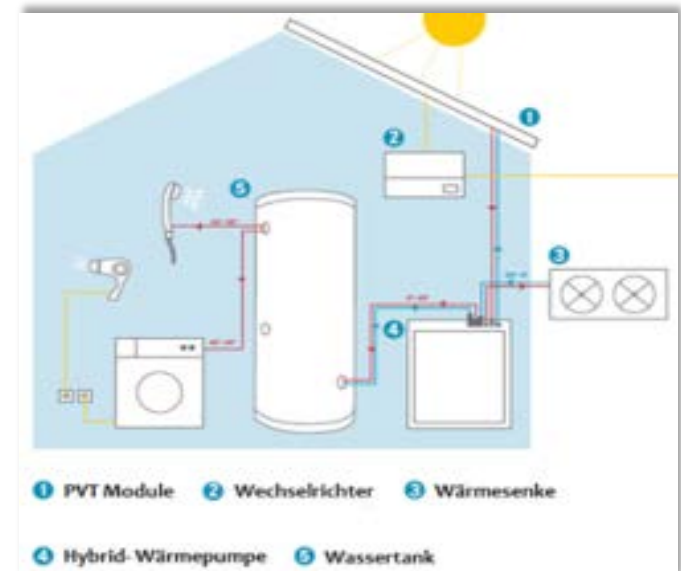




- ◆ High quality aleo module
- ◆ Backside: Thermal component of Fototherm
- ◆ Components perfectly complement each other: Improved performance, increased efficiency
- ◆ Partial/full integration in heating system possible
- ◆ Suitable for ground heating, swimming pools, and other commercial and private systems
- ◆ Components are oriented at durability, wearout and maintenance are minimized
- ◆ Approved aleo quality
- ◆ Uniform, elegant black design



- ◆ Autonomous and eco-friendly energy supply of buildings
- ◆ Integrated energy systems
- ◆ Option for partial/full integration into the heating system
- ◆ Highly efficient PV and thermal systems
- ◆ Easy, cost-efficient drafting and realization of a PV and thermal solution
- ◆ Uniform design of both systems





- ◆ Very small installations (up to ~1kW) and systems, which are adjusted for self-consumption (e.g. up to 3,68kW in Germany)
- ◆ Systems to be planned and to be built up very quickly
- ◆ Monitoring of each individual PV module
- ◆ Easy covering of even problematic roofs
- ◆ Pure AC cabling after micro inverter





# Storage systems: Solar Energy all day long

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**Power Tec  
VS 5 Hybrid**

**E3/DC  
S10**



- ◆ Ideal for domestic and small commercial applications
- ◆ Energy supply for 70-80% of the energy demand
- ◆ Fully automated equipment combining grid connection – storage system – PV s
- ◆ DC bus connection and full integration, including the system monitoring
- ◆ Developed lithium ion storage units
- ◆ No change in the electric grid of residence

## Today: PV Systems & Services



- ◆ Modules
- ◆ Inverters
- ◆ Mounting systems
- ◆ Storage Systems
- ◆ Services

## Tomorrow: PV based solutions for energy supply independency



- ◆ Modules
- ◆ Inverters
- ◆ Mounting Systems
- ◆ Storage Systems
- ◆ Services
- ◆ Smart Home
- ◆ Energy Management
- ◆ Building automations
- ◆ Integrated systems for energy independence



energy for tomorrow by **aleo**

Thank you for your attention

For more information please contact me @

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