

# PSk Surface Solar Pump Systems

## Centrifugal Pump Systems



LORENTZ PSk-CS surface pumps are vertical multi stage pumps designed to efficiently deliver the highest volumes of water from a solar power source. PSk-CS surface pumps are typically used in irrigation projects and for wide area drinking water applications where they reliably meet the most demanding requirements, economically, without pollution and without a grid connection or diesel generator.

These highly efficient pumps can achieve flow rates of up to 500 m<sup>3</sup>/hour and pump up to a 90m head. Each system consists of a pump, pump motor and a controller. All components are carefully designed for use with direct solar connections. The modular concept allows for simple servicing and a low cost of ownership.

### Benefits

- Very strong ROI against diesel powered pumping, reducing water production costs and reducing carbon footprint
- Long life expectancy and proven in service record
- Designed for use in remote and harsh conditions
- Smart modular design for simple and cost effective servicing and repair
- Cost effective spare parts philosophy
- Large range of pumps to closely match each application and optimise efficiency

### Features

- Engineered in Germany
- High quality non corrodible materials used
- Solar direct connect with AC connection options
- MPPT technology to maximise power use from PV modules
- 3-phase air cooled high efficiency motor
- Data logger integrated into the controller



pump system		PS 7k-CS	PS 9k-CS	PS 15k-CS	PS 21k-CS	PS 25k-CS
motor power	[kW]	5.5	7.5	11	15	23
max. total dynamic head (TDH)	[m]	90	80	80	80	80
max. flow rate	[m <sup>3</sup> /h]	79	110	240	306	500
solar operation:						
max. power voltage (Vmp)*	[VDC]	> 500	> 500	> 500	> 500	> 500
open circuit voltage (Voc)	[VDC]	max. 800	max. 800	max. 800	max. 800	max. 800

\*) PV modules at standard test condition: AM = 1.5, E = 1,000W/m<sup>2</sup>, cell temperature: 25 °C

To find out more visit [www.lorentz.de](http://www.lorentz.de)

BERNT LORENTZ GmbH & Co. KG

Kroegerskoppel 7, 24558 Henstedt-Ulzburg, Germany, Tel. +49 (0) 4193 7548-0

All specifications and information are given with good intent, errors are possible and products may be subject to change without notice. Pictures may differ from actual products depending on local market requirements and regulations. A pump system consists of a controller, motor and pump end. Multiple pumps/pump ends are shown to represent the wide range of pumps (over 70) that LORENTZ has.

**Sun. Water. Life.**