

PS1200 HR/C



Solar-operated Submersible Pump System, 4" Helical Rotor (HR) or Centrifugal (C) Pump Unit

Characteristics

- lift up to 240m
- flow rate up to 21m³/h
- simple installation
- maintenance-free
- high reliability and life expectancy
- cost-efficient pumping

Applications

- drinking water supply
- livestock watering
- pond management
- irrigation
- etc.

Components

Controller PS1200

- controlling of the pump system and monitoring of the operating states
- mounted at surface (no electronic parts submerged)
- two control inputs for well probe (dry running protection), float or pressure switches, remote control etc.
- automatic reset 20 minutes after well probe turns pump off
- protected against reverse polarity, overload and high temperature
- speed control, max. pump speed adjustable to reduce flow rate to c. 30%
- solar operation: integrated MPPT (Maximum Power Point Tracking)
- battery operation: low voltage disconnect and restart after battery has recovered
- max. efficiency 92% (motor + controller)
- enclosure: IP 54 (sealed, weatherproof)

Motor ECDRIVE 1200HR/C

- brushless DC motor
- no electronics inside motor
- water filled
- IP68, pressure balanced, unlimited submersion
- dynamic slide bearings, material: carbon/ceramic
- wetted material: stainless steel (AISI 316), POM, rubber, cable drinking water approved

Pump End (PE)

- high life expectancy
- none-return valve
- dry running protection (optional)
- material: stainless steel (AISI 316), rubber

HR Pumps Only

- helical rotor pump (positive displacement pump)
- two main parts only: stator and rotor, field serviceable
- stator: geometry made of abrasion resistant rubber
- rotor: stainless steel, hard chrome plated, abrasion resistant
- more resistant to damage by sand than other pump types
- self-cleaning

Performance

| | | | | | |
|------------------------------------|--|----------|----------|----------|----------|
| PS1200 | HR-03 | HR-03H | HR-04 | HR-04H | HR-07 |
| article # | 1228-X | 1230-X | 1235-X | 1240-X | 1245-X |
| lift [m] | 0-140 | 140-240 | 0-80 | 80-160 | 40-120 |
| max. flow rate [m ³ /h] | 0.5 | 0.5 | 0.8 | 0.8 | 1.2 |
| max. efficiency [%] | 60 | 64 | 60 | 65 | 64 |
| solar operation | nominal voltage 72-96V DC, open circuit voltage max. 200V DC | | | | |
| solar generator [Wp] | 350-480 | 420-900 | 350-420 | 420-1200 | 420-1200 |
| battery operation | nominal voltage 72-96 V DC | | | | |
| PS1200 | HR-10 | HR-14 | C-SJ5-8 | C-SJ8-5 | C-SJ12-3 |
| article # | 1250-X | 1255-X | 1222 | 1223 | 1224 |
| lift [m] | 30-80 | 0-60 | 0-40 | 0-24 | 0-15 |
| max. flow rate [m ³ /h] | 1.9 | 2.7 | 7.5 | 11 | 21 |
| max. efficiency [%] | 64 | 65 | 48 | 48 | 48 |
| solar operation | nominal voltage 72-96V DC, open circuit voltage max. 200V DC | | | | |
| solar generator [Wp] | 420-1200 | 350-1200 | 350-1200 | 350-1200 | 350-1200 |
| battery operation | nominal voltage 72-96 V DC | | | | |

