# **Steca Solarix PRS** PRS 1010, PRS 1515, PRS 2020, PRS 3030

The simplicity and high performance of the Steca Solarix PRS solar charge controller make it particularly appealing. At the same time, it offers a modern design and a convenient display, all at an extremely attractive price.

Several LEDs in various colours emulate a tank display, which gives information on the battery's state of charge. Here, Steca's latest algorithms are employed, resulting in optimal battery maintenance. The Solarix PRS charge controllers are equipped with an electronic fuse, thus making optimal protection possible. They operate on the serial principle, and separate the solar module from the battery in order to protect it against overcharging.

For larger projects, the charge controllers can also be equipped with special functions: e.g. with night light function and selectable charging plateau and deep-discharge protection voltages.

# **Product features**

- · Series controller
- · Automatic detection of voltage
- · Voltage and current regulation
- · PWM control
- · Multistage charging technology
- · Current compensated load disconnection
- · Automatic load reconnection
- · Temperature compensation
- · Common positive grounding or negative grounding on one terminal
- · Integrated self test
- · Monthly maintenance charge

### **Electronic protection functions**

- · Overcharge protection
- · Deep discharge protection
- · Reverse polarity protection of module, load and battery
- · Automatic electronic fuse
- Overvoltage protection at module input
- · Open circuit protection without battery
- · Reverse current protection at night
- · Overtemperature and overload protection
- · Battery overvoltage shutdown

- Displays

  · Multifunction LED display
- · Multi-coloured LED
- 5 LEDs show operating states
  - for operation, state of charge, fault messages

- · Night light function pre-set in the factory or adjustable via Steca PA RC 100

## Certificates

- · Compliant with European Standards (CE)
- · RoHS compliant
- · Developed in Germany
- · Manufactured according to ISO 9001 and ISO 14001



Steca PA RC100

















| 10 A30 A       | 5                                    | 10  | 20 | 40    | 80 | 160 |
|----------------|--------------------------------------|-----|----|-------|----|-----|
|                |                                      | 187 |    | 45    |    |     |
| · menomentum & | \$\\ \&\\ \(\ell_{\text{\colored}}\) | 177 |    | 16 60 | 98 |     |

|   | PRS 1010                               | PRS 1515 | PRS 2020 | PRS 3030 |  |  |  |  |  |
|---|--|----------|----------|----------|--|--|--|--|--|
| Characterisation of the operating performance |  |          |          |          |  |  |  |  |  |
| System voltage                                | 12 V (24 V)                            |          |          |          |  |  |  |  |  |
| Own consumption                               | < 4 mA                                 |          |          |          |  |  |  |  |  |
| DC input side                                 |  |          |          |          |  |  |  |  |  |
| Open circuit voltage solar module             | < 47 V                                 |          |          |          |  |  |  |  |  |
| Module current                                | 10 A                                   | 15 A     | 20 A     | 30 A     |  |  |  |  |  |
| DC output side                                |  |          |          |          |  |  |  |  |  |
| Battery voltage                               | 9 V 17 V (17.1 V 34 V)                 |          |          |          |  |  |  |  |  |
| Load current                                  | 10 A                                   | 15 A     | 20 A     | 30 A     |  |  |  |  |  |
| End of charge voltage                         | 13.9 V (27.8 V)                        |          |          |          |  |  |  |  |  |
| Boost charge voltage                          | 14.4 V (28.8 V)                        |          |          |          |  |  |  |  |  |
| Equalisation charge                           | 14.7 V (29.4 V)                        |          |          |          |  |  |  |  |  |
| Reconnection voltage (LVR)                    | 12.4 V 12.7 V (24.8 V 25.4 V)          |          |          |          |  |  |  |  |  |
| Deep discharge protection (LVD)               | 11.2 V 11.6 V (22.4 V 23.2 V)          |          |          |          |  |  |  |  |  |
| Operating conditions                          |  |          |          |          |  |  |  |  |  |
| Ambient temperature                           | -25 °C +50 °C                          |          |          |          |  |  |  |  |  |
| Fitting and construction                      |  |          |          |          |  |  |  |  |  |
| Set battery type                              | liquid (adjustable via Steca PA RC100) |          |          |          |  |  |  |  |  |
| Terminal (fine / single wire)                 | 16 mm² / 25 mm² - AWG 6 / 4            |          |          |          |  |  |  |  |  |
| Degree of protection                          | IP 32                                  |          |          |          |  |  |  |  |  |
| Dimensions (X x Y x Z)                        | 187 x 96 x 45 mm                       |          |          |          |  |  |  |  |  |
| Weight  | 345 g                                  |          |          |          |  |  |  |  |  |

Technical data at 25 °C / 77 °F