

Guide for selecting a compatible solar panel for your Futurepump

If you have not purchased solar panels from Futurepump directly, the following guidelines will help you choose solar panels for the most efficient functioning of your solar pump.

Details of panel provided by Futurepump

Situation	Standard light conditions	Low light (<600 W/m ²)
Panel type	60W Futurepump panel	60W Futurepump panel
Nominal Voltage	18V	18V
Panel Rated Voltage	29.68V	29.68V
Panel Rated Current	2.03A	2.03A
Open circuit Voltage	35.22V	35.22V
Open circuit Current	2.14A	2.14A
Number of panels needed for SF2/SF2H	2 panels connected in series (29 x 2 = 58V)	4 panels. Arranged as 2 sets of panels connected in parallel (58V) Each set is made of 2 panels in series (29*2=58V))
Number of panels needed for SE1	1 panel of 29V	2 panels connected in parallel = 29V

Futurepump solar panels are specifically designed for optimal functioning of the solar pump. They are not readily available in most markets. However, there are alternative panels which are available and selecting the right panel will give you the best efficiency.

What to specify when looking for a solar panel

Situation	High radiation	Average radiation	Low light (<600 W/m ²)	
Panel type	40W	60W	80W	100W
Nominal Voltage	12V	12V	12V	12V
Panel Rated Voltage	18V	18V	18V	18V
Panel Rated Current	2.23A	3.33A	4.44A	5.56A
Open circuit Voltage	21.6V	21.6V	21.6V	21.6V
Open circuit Current	2.4A	3.53A	4.64A	5.86A
Number of panels needed for SE1	2 x matching panels connected in series 18Vmp x 2 = 36Vmp			N/A
Number of panels needed for SF2/SF2H	3 x matching panels connected in series 18Vmp x 3 = 54Vmp			

Maximum voltage and amps which should not be exceeded:

	Maximum pump voltage	Maximum motor current
Futurepump SF2	64V DC	3 amps DC
Futurepump SE1	36V DC	2.5 amps DC

Where to find panel information:

The details of the panel are found on the sticker on the back of the panel. You should look for a sticker similar to the example below:

