### SP155-PS, SP160-PS, SP165-PS, SP170-PS, SP175-PS



# SOLLATEK SP155-PS, SP160-PS, SP165-PS, SP170-PS, SP175-PS 24V PHOTOVOLTAIC MODULES

#### Models:

SP155-PS, SP160-PS, SP165-PS, SP170-PS, SP175-PS

#### **General:**

Solar cells directly convert sunlight into electricity by means of the photovoltaic effect. This occurs when photons are absorbed by a solar cell which generates a voltage across it terminals. Cells are connected in series within a solar module to provide sufficient voltage to operate a system. Modules can be connected in series and parallel to increase the system power. This solid state process provides a clean, silent, non-polluting and reliable source of electrical energy.

Sollatek's high efficiency solar modules are constructed for 72 multicrystalline cells. The cells are individually tested and matched for optimum performance before being built into the protective module structure. A Tedlar® base is used and ethylene vinyl acetate encapsulant. High transmission tempered glass protects the cells from the front and a high strength polymer sheet at the rear. A reinforced aluminium frame completes the laminate structure which is fully sealed against moisture and protected from environmental and mechanical damage.



- High efficiency modules
- 72 off 5 inch (125.5 x 125.5 mm) cells
- Reinforced anodised aluminium frame
- Protected by 2 schottky by-pass diodes
- Universal junction box
- Pre-drilled frame for easy mounting
- Product warranty: 5 years\*
- Efficiency warranty: 25 years\*
- Quality assurance: ESTI (61215), TÜV (Safety Class II), PVGap, ISO 9001.



#### **Applications:**

- Telecommunications
- Rural electrification
- Grid connected large scale system
- Power plants
- Commercial buildings
- Cathodic protection
- Water pumping



SP155-PS







 ${\it *According to general warranty conditions}$ 

## SP155-PS, SP160-PS, SP165-PS, SP170-PS, SP175-PS

Model		SP155-PS	SP160-PS	SP165-PS	SP170-PS	SP175-PS
Size of cells	mm	125 x 125				
Number of cells	pcs	72	72	72	72	72
Typical power	Wp	155	160	165	170	175
Nominal battery voltage	V	24	24	24	24	24
Open circuit voltage	V	42.2	42.4	42.6	42.8	43.2
Optimum operating Voltage	V	33.3	33.5	33.8	34.1	34.2
Short circuit current	А	5.08	5.12	5.23	5.32	5.4
Optimum operating current	А	4.65	4.78	4.88	4.99	
Noct (0.8kW/m_ 20°C 1m/s)	°C	48°C ± 2°C				
Connection		Plug type IV				
Diodes		yes	yes	yes	yes	yes
Frame dimensions (LxWxD)	mm	1580 x 808 x 35				
Depth with junction box	mm	45	45	45	45	45
Weight (net)	Kg	15.5	15.5	15.5	15.5	15.5
Operational & storage temperature	°C	-40 to +85°C				
Warranty	years	25	25	25	25	25

These are the most popular sizes. Other sizes available on request.





