

## **Key features**

\*High module efficiency and stable power output based on leading process technology

\*Outstanding electrical performance under high temperature conditions or low irradiance conditions.

\* Easy of installation and all-weather applications \*5 years product warranty (materials and workmanship)

20 years module power output warranty

\*Peak power of single module is guranteed in ±5% power tolerance

\*Strong framed module, passing load test of 5400 Pa (IEC61215 2nd)

\*The manufacturer is certified for ISO 9001:2000

# **SUNNY**BATT®

## **SY-S20W-12**

High Efficiency, High Quality PV Module.

## **All-purpose Module**

SUNNY BATT Solar module is a robust all-purpose solar module with high efficiency solar cell. These modules can be used for off-grid residential or commercial applications. Our meticulous design and production techniques ensure a high-yield, long term performance for every module. Our rigorous QC and testing facilities guarantee our modules meet highest quality standards possible.

## **Applications**

\*Off grid residential roof-tops \*off grid commercial/industrial roof-tops \*rural area applications \*Solar power system \*Other off-grid applications

## **Product's Guarantee**

5 years products life warranty 15 years module power output no less 90% 20 years module power output no less 80%



# **SUNNY**BATT®

## **SY-S20W-12**

High Efficiency, High Quality PV Module.

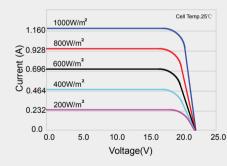
Electrical Characteristics	SY-S20W-12
Maximum power (Pmax)	20W
Voltage at Pmax (Vmp)	17.2V
Current at Pmax (Imp)	1.16A
Open-circuit voltage (Voc)	21.6V
Short-circuit current (Isc)	1.31A
Temperature coefficient of Voc	-(0.40 ± 0.05)%/ °C
Temperature coefficient of Isc	(0.065 ±0.01) % /°C
Temperature coefficient of power	-(0.5±0.05)%/ °C
NOCT (Air 20°C; Sun 0.8kW/m wind 1m/s)	47±2°C
Operating temperature	-40°C to 85°C
Maximum system voltage	600V DC
Power tolerance	+ 5%
Cells	Monocrystalline silicon solar cell
No. of cells and connections	36(2X18)
Module Dimension	646[25.43in.]x290mm[11.42in.]x30mm[1.18in.]
Weight	2.6kg[5.88lbs]
3	

\* STC:Irradiance 1000W/m<sup>2</sup>, AM1.5 spectrum, module temperature 25°C

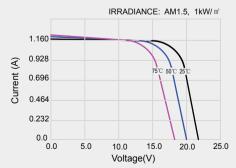
\* Specifications are subject to change without notice at any time.

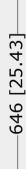
## I-V Curves

#### I-V Curves of PV module SY-S20W



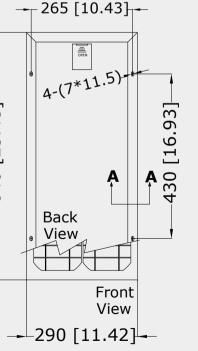
I-V Curves of module SY-S20W at various cell temperatures

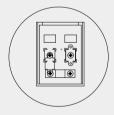




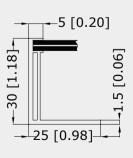
### Module Diagram

- Dimensions in brackets are in inches.
- Un-bracketed dimensions are in millimeters.
- Unit:mm[in.]





Junction Box Top View (Lid open)



## HIGH QUALITY, LONG GUARANTEE