



# SR30-L

## Secondary Standard Pyranometer with RS-485 Modbus Communications and Integrated Heating and Ventilation



### Overview

The SR30, manufactured by Hukseflux, features Recirculating Ventilation and Heating (RVH™) technology. As a standalone unit, the SR30 is fully compliant with IEC 61724-1 standards,

whereas other pyranometers would require external ventilation/heating units to be compliant. The SR30 is an ideal instrument for solar resource and PV performance monitoring.

### Benefits and Features

- › Heated for high data availability, featuring RVH™ technology
- › Compliant with IEC 61724-1:2017 Class A
- › Remote sensor diagnostics

### Specifications

Hemispherical Solar Radiation	
Heater	RVH™ (Recirculating Ventilation and Heating)
ISO 9060:2018 Classification	Class A (secondary standard)
IEC 61724-1:2017 Compliance	Class A
Calibration Uncertainty	< 1.2% (k = 2)
Heating	Included
Ventilation	Included
Technology Employed	Recirculating Ventilation and Heating (RVH™)
Standard Operating Mode	Heated and ventilated

Power Consumption @ 12 Vdc	< 2.3 W
Zero Offset A	< 2 W/m <sup>2</sup>
Calibration Traceability	To WRR
Calibration Registers	Accessible to users
Spectral Range	285 to 3000 x 10 <sup>-9</sup> m
Rated Operating Temperature Range	-40 to +80°C
Temperature Response	< ±0.4% (-30 to +50°C)
Temperature Response Test Report included of Individual Instrument	
Directional Response Test of Individual Instrument	Report included

Rated Operating Voltage Range 5 to 30 Vdc

Power Consumption @ 12 Vdc < 0.1 W

### Sensor Tilt Angle

Tilt Measurement Uncertainty  $\pm 1^\circ$  (0 to 90°)

Tilt Sensor Test of Individual Report included Instrument

### Operation in Low-Power Mode

Operating Condition Heater and ventilator [OFF]

Zero Offset A  $5 \text{ W/m}^2$  (unventilated)

### Digital Output

Output

- › Modbus RS-485
- › Irradiance in  $\text{W/m}^2$
- › Instrument body temperature in  $^\circ\text{C}$
- › Tilt angle in  $^\circ$
- › Internal humidity in %
- › Ventilator speed in RPM

Communication Protocol Modbus over two-wire RS-485

Transmission Mode RTU

For comprehensive details, visit: [www.campbellsci.com/sr30-l](http://www.campbellsci.com/sr30-l) 



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