

240-140 & 240-150 Silicon Cell Pyranometer

The **Model 240-140 Silicon Cell Pyranometer** measures global solar radiation. When used with the 240-152 Shadow Band, it will measure diffuse radiation. This pyranometer is low cost, lightweight, and easy to install. The 240-150 includes a mounting and leveling plate. The sensor is a silicon photovoltaic cell that absorbs radiation from 0.35 to 1.15 microns. The silicon cell converts this light energy into electrical energy and the output voltage (approximately 80 mV/1000 W/m²) is essentially linear with light intensity. Because the instrument is light sensitive, not heat sensitive, full scale response time is less than one millisecond. If the output is integrated over a daily period, the accuracy of the value is within $\pm 3\%$. Accuracy of instantaneous values is $\pm 5\%$.



240-150 Silicon Cell Pyranometer with Mounting and Leveling Plate

Specifications

Sensor: Silicon photovoltaic cell
Spectral response: 0.35 to 1.15 microns
Sensitivity: Approx 80 mV/1000 W/m²
Full scale response time: < 1 millisecond
Impedance: 1 ohm
Accuracy: $\pm 5\%$
Temperature compensation: +4° to +60°C
Windshield: Pyrex glass dome
Leveling: Circular level and 3 threaded feet
Size: 5" Dia x 2" H
Weight/shipping: 1 lb/2 lbs

Ordering Information

240-140	Silicon Cell Pyranometer, 10' cable
240-140/20	Silicon Cell Pyranometer, 20' cable
240-140LM	Leveling/Mounting Plate Kit
240-150	Silicon Cell Pyranometer, with leveling/mounting plate, 10' cable
240-153	Tower Mount, 1' boom with tower mounting hardware
330-0224	Cable, 2-conductor, 24 AWG shielded