LAB SPECTRORADIOMETERS
PS-100, PS-200, and PS-300

**Absolute spectral measurement across a wide wavelength range**

PS-100

PS-200/ PS-300

Product Specifications

	PS-100	PS-200	PS-300
Irradiance Calibration Range	350 to 1000 nm	300 to 850 nm	300 to 1000 nm
Wavelength Sensitivity	350 to 1150 nm	190 to 850 nm	220 to 1100 nm
Wavelength Resolution	1 nm	0.85 nm	1.5 nm
Detector Type	CCD, 2048 pixel		
Grating Type	Holographic & Ruled, 600 g/nm	Holographic and aberration-corrected, 590 g/nm	
Digitizer	16-bit		
Signal to Noise Ratio	1000:1		
Stray Light	0.1 % at 435 nm, 0.5 % at 600 nm	0.02 % at 435 nm, 0.2 % at 200 nm	0.02 % at 435 nm, 0.2 % at 220 nm
Measurement Repeatability	Less than 1 %		
Irradiance Calibration Uncertainty	± 10 %		
Detector Integration (Exposure) Range	1 ms to 65 s		
Directional (Cosine) Response	± 5 % at 80° zenith angle		
Software	Windows compatible, included		
Computer Interface	USB 2.0		
Power Requirement	100 mA at 5 V DC, supplied via USB code		
Operating Temperature	0 to 60 C		
Optical Cable	2 m armored fiber-optic		
Base Unit Size	25 mm x 75 mm x 125 mm	69 mm x 100 mm x 150 mm	
Mass	500 g	900 g	
Warranty	1 year against defects in materials and workmanship		
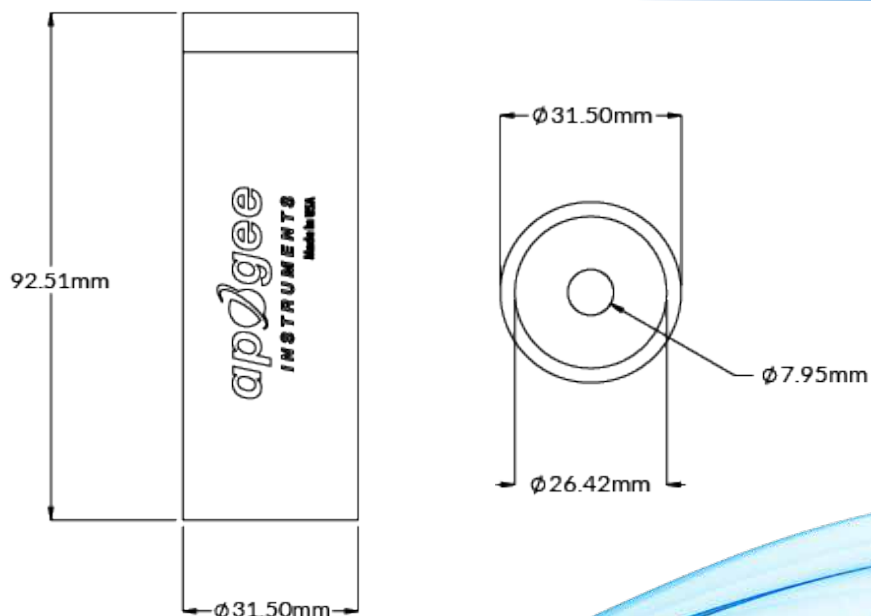
Features

TYPICAL APPLICATIONS
- Measurement of spectral output of radiation sources for plant or human lighting
- Reflectance and transmittance measurements of natural and synthetic surfaces and materials
- Absorptance measurements of chemical samples

THREE WAVELENGTH OPTIONS
350 to 1000 nm, 300 to 830 nm, or 300 to 1000 nm.

PORTABLE FIELD MEASUREMENTS
Features a small and lightweight design with a rugged housing and no moving parts. Spectroradiometer is powered through the USB port on a computer allowing mobile field measurements.

COMPLETE PACKAGE
Includes spectroradiometer, two meter fiber-optic cable, cosine-corrected detector, USB cable, USB drive with required drivers and software (compatible with all 32-bit and 64-bit Windows operating systems), and shoulder bag (functions as a carrying case and field measurement pack). A reflectance probe and reflectance standard are available as accessories.

SpectraWiz Software

The detector collects light for the spectroradiometer via fiber-optic cable. The spectroradiometer then transmits its measurements to a PC where custom software (included) displays the spectrum of the light source. Live data can be saved as a data file suitable for work in other programs, such as Excel or SigmaPlot.