

PHOTOMETRIC AND RADIOMETRIC PROBES



HIGHLIGHTS:

- Psoriasis light treatment by UVB lamps

UVB IRRADIANCE

**LP 471-UVB**

Art. no. 700068

Probe for the measure of UVB irradiance

**General:**

Radiometric probe for measuring the irradiance in the UVB spectral range 280 ... 315 nm, peak at 305 ... 310 nm, quartz diffuser for cosine correction.  
Measuring range: 1.0·10<sup>-3</sup> W/m<sup>2</sup> ... 2.000 W/m<sup>2</sup>.

**Application:**

Polymerization of varnishes, resins, adhesives. Quality control by UV Lamps. For Offset and lithography & electronic, Casting and welding control, Timing light to ward off eye problems

**Specifications:**

<b>Measuring range (W/m<sup>2</sup>):</b>	1.0·10 <sup>-3</sup> ... 999.9·10 <sup>-3</sup> 1.000 ... 19.999 20.00 ... 199.99 200.0 ... 1.999.9
<b>Resolution (W/m<sup>2</sup>):</b>	0.1·10 <sup>-3</sup> 0.001    0.01    0.1
<b>Spectral range:</b>	280 ... 315 nm (Peak 305 nm ... 310 nm)
<b>Calibration uncertainty:</b>	<5 %
<b>f<sub>3</sub> (linearity):</b>	<2 %
<b>f<sub>4</sub> (instrument reading error):</b>	±1 digit
<b>f<sub>5</sub> (fatigue):</b>	<0.5 %
<b>Drift after 1 year:</b>	<2 %
<b>Working temperature:</b>	0 ... 50 °C



HIGHLIGHTS:

- Control of UV Lamps during pasteurization, air and water sterilization

UVC IRRADIANCE

**LP 471-UVC**

Art. no. 700069

Probe for the measure of UVC irradiance

**General:**

For measuring in the UVC spectral range 220 ... 280 nm, peak at 260 nm, quartz diffuser for cosine correction.  
Measuring range: 1.0·10<sup>-3</sup> W/m<sup>2</sup> ... 2.000 W/m<sup>2</sup>.

**Specifications:**

<b>Measuring range (W/m<sup>2</sup>):</b>	1.0·10 <sup>-3</sup> ... 999.9·10 <sup>-3</sup> 1.000 ... 19.999 20.00 ... 199.99 200.0 ... 1.999.9
<b>Resolution (W/m<sup>2</sup>):</b>	0.1·10 <sup>-3</sup> 0.001    0.01    0.1
<b>Spectral range:</b>	220 ... 280 nm (Peak 260 nm)
<b>Calibration uncertainty:</b>	<5 %
<b>f<sub>3</sub> (linearity):</b>	<1 %
<b>f<sub>4</sub> (instrument reading error):</b>	±1 digit
<b>f<sub>5</sub> (fatigue):</b>	<0.5 %
<b>Drift after 1 year:</b>	<2 %
<b>Working temperature:</b>	0 ... 50 °C



IRRADIANCE IN SPECTRAL BAND OF BLUE LIGHT

**LP 471-BLUE**

Art. no. 700070

Probe for the measure of irradiance in spectral band of blue light

**General:**

The radiometric probe LP471-BLUE measures irradiance (W/m<sup>2</sup>) in spectral band of blue light. The probe consists of a photodiode plus an appropriate filter and it is provided with diffuser for proper measure in accordance with the cosine law.

**Application:**

The spectral response curve of the probe allows to measure the radiation effective for damages caused by blue light (curve B(λ)) according to the standards ACGIH / ICNIRP in the spectral range from 380 ... 550 nm. The radiation optics in this portion of the spectrum can produce photochemical damage to the retina. Another field of application is the monitoring of the probe irradiance from blue light used in the treatment of neonatal jaundice.

**Specifications:**

<b>Measuring range (W/m<sup>2</sup>):</b>	1.0·10 <sup>-3</sup> ... 999.9·10 <sup>-3</sup> 1.000 ... 19.999 20.00 ... 199.99 200.0 ... 1.999.9
<b>Resolution (W/m<sup>2</sup>):</b>	0.1·10 <sup>-3</sup> 0.001    0.01    0.01
<b>Spectral range:</b>	380 ... 550 nm. Action curve for damages of Blue light B(λ)
<b>Calibration uncertainty:</b>	<10 %
<b>f<sub>2</sub> (response according to the cosine law):</b>	<6 %
<b>f<sub>3</sub> (linearity):</b>	<3 %
<b>f<sub>4</sub> (instrument reading error):</b>	±1 digit
<b>f<sub>5</sub> (fatigue):</b>	<0.5 %
<b>Drift after 1 year:</b>	<2 %
<b>Working temperature:</b>	0 ... 50 °C