

Biospherical Instruments Inc.

CALIBRATION CERTIFICATE

Calibration Date 04/30/13
Model Number QSR2150A Firmware Version v 2.06
Serial Number 50172
Operator TPC
Standard Lamp V-031(3/7/12)
Sensor Operating Voltage Range: 6 to 15 VDC (+)
Output Polarity: Positive

Sensor Output Voltage:

Sensor Illuminated 118.5 mV
Sensor Dark 9.9 mV
Sensor Net Response 108.6 mV
RG780 9.9 mV

Corrected Lamp Output:

Output In Air (same condition as calibration):

1.733E-02 $\mu\text{E}/\text{cm}^2\text{sec}$
1.044E+16 Quanta/ cm^2sec

Calibration Scale Factor:

(To calculate irradiance, divide the net voltage reading in Volts by this value.)

6.268E+00 Volts/ $(\mu\text{E}/\text{cm}^2\text{sec})$

6.268E-04 Volts/ $(\mu\text{E}/\text{m}^2\text{sec})$

Notes:

1. Annual calibration is recommended.
2. Calibration is performed using a Standard of Spectral Irradiance traceable to the National Institute of Standards and Technology (NIST).
3. To approximate the sensor's saturating irradiance, multiply the calibration factor by the sensor power supply voltage, minus one volt.
4. The collector should be cleaned frequently with alcohol.