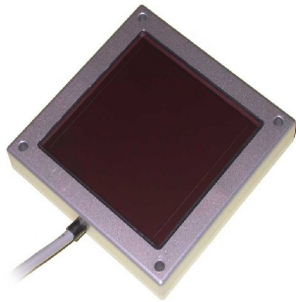


Light-meter: technical data



General

Plug'n'Play – weather-proof and ready for outdoor mounting
 Voltage supply 5V DC (via USB)
 Current max 10mA
 Housing special glas, Aluminum anodised
 Length x width x height 92 x 92 x 15 mm
 Weight 370 g (270 g sensor + 100 g USB-cable)
 Measurement range 500 mikro-Lux to 200 000 Lux
 Noise 20 mikro-Lux at 1 mLux
 Recording rate adjustable from 1 per s to 1 per hour
 Detection limit 50 – 100 mikro-Lux
 Operating temperature -25°C to 80°C
 Storage temperature -30°C to 110°C
 Maintainance maintainaince free

Installation

The sensor is weather-proof;
 Four holes with 4.2mm diameter;
 Mount on isolating material (e.g. Wood);
 Computer within about 20m of sensor.

System Requirements

1. Computer with operating system, one of:
 - Windows XP/NT/2000, or
 - Linux with Virtualbox2 + Windows virtual machine;
2. USB port;
3. 18 MB disk-space for lightmeter software.

Typical data-rates

1.5 MB/month for 1 measurement per minute
 350 kB/week for 1 measurement per minute
 3 MB/day for 1 measurement per second

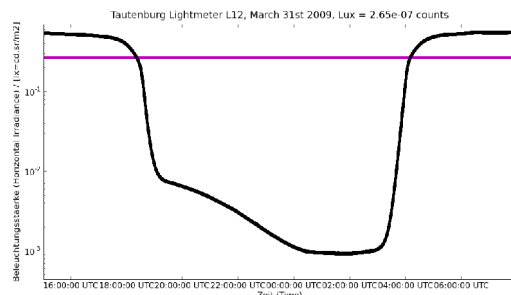
Software-download and further information:

<http://lightmeter.astronomy2009.at>

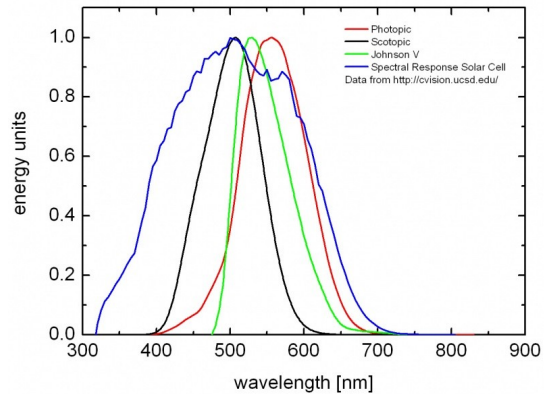
Login: Guest IYA2009

Requests: lightmeter@astronomy2009.at

Technical changes may occur, version of May 18th, 2009



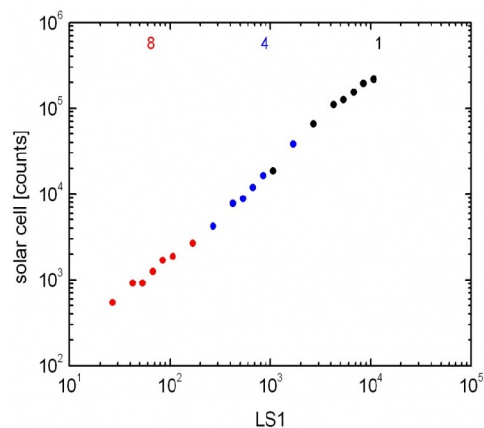
Lightmeter at Tautenburg. Photometric night with half-moon before local midnight and decreasing to one mlx later. Note the nonlinear daylight part above the full-moon brightness (magenta horizontal line).



Spectral sensitivity and bands relevant to the human eye.



Lightmeter and USB-cable compared to 1 Euro coin.



Sensor linearity checked by calibrated and varied light source.