



## Application Bulletin – Model 6.5 Solarmeter

Date: Oct 8, 2015

Model	Description	Yes	No
<p><b>6.5</b></p>	<p>UVI (UV Index)            Range 0-199.9 UVI</p> <p>Original erythema-effective (E<sub>eff</sub>/E<sub>ry</sub>) meter for measuring UV Index “sun burning rays” from both sun and UV lamps. Sensor/filter response closely follows the erythema action spectrum (EAS) which enables accurate readings from virtually any UV light sources.</p> <p>Application Notes:</p> <ol style="list-style-type: none"> <li>1. Measure UV Index from sun.</li> <li>2. Measure UV Index from reptile lamps.</li> <li>3. Check UVI forecast for accuracy.</li> </ol> <p>Procedure:</p> <p>Press and hold push button switch while aiming top sensor at light source, or for sun straight up standing in the clear away from walls and trees outdoors.</p> <p>The reading represents instantaneous UVI intensity at the distance meter sensor is being held from the source. Moving the meter closer to UV source will increase reading. For solar readings, high altitude will increase the readings.</p> <p>Many factors influence outdoor UVI readings, e.g., latitude, time of day, season/date, haze in atmosphere, even ozone the layer. Generally, a deep blue sky will have highest readings at any given date and time. Light pale blue sky readings are lower due primarily to humidity water vapor UV absorption.</p> <p>For UV lamps hold meter at location of exposure to determine intensity at the subject position of concern. When readings fall 25-30% below new readings the lamps need replacement.</p> <p>Note regarding scientific units: Although there is no conversion from UVI to broadband UV intensity (as Models 5.0 and 6.0 measure), it can be converted to erythema weighted units. For mW/m<sup>2</sup> multiply UVI by 25. Or for W/m<sup>2</sup> divide UVI by 40.</p>	<p>X</p> <p>X</p> <p>X</p>	