UV-T Cube Integrator

+ 3D measuring
+ UV-Intensity mW/cm²
+ UV-Dose mJ/cm²
+ temperature measuring °C/°F
+ various UV-ranges available
+ permanent or „triggered“ measuring mode*
+ SD-Card Slot (option)
+ graphic and numerical chart on computer (option)

The *UV-T Cube Integrator* is a self-contained, high quality UV measuring instrument. It is designed to measure and display peak UV intensity and UV dosage in the UV curing process.

It is equipped with one UV sensor and one temperature for the measuring of:

Full UV 230 – 410 nm
Temp. 0 – 115 °C / 32 – 232 °F

With this total UV band peak intensity and dose measuring, most of the measuring requirements of UV curing applications can be covered.
Due to its UV sensor and the integrated microprocessor the *UVT -Cube Integrator* can measure and display the peak UV-intensity of the total UV spectrum (mW/cm²).

Additionally, this *UV-T Cube Integrator* is calculating the UV-dosage (mJ/cm²) of the UV energy supplied during the time of exposure of one measuring cycle. The UV-dosage is calculated as the total Integral of UV-dosage over the full UV spectral bands.
Equipped with an extra sensor for measuring temperatures from 0 to 230° F / 0 to 110° C.

*This Integrator features a selectable „triggered mode“, i.e. the 30 sec recording cycle starts within a 120 second readiness phase not before the incident UV-intensity exceeds 2 mW/cm².

The sensor is on one side of the unit, while the display is on the opposite side. After completion of the measuring cycle the measuring results can be scrolled through on the built in 2 x 16 digit LCD display.
A special AUTO-OFF feature that turns off the unit automatically after one minute serves as energy saving and extension of the battery service life.

The *UV-T Cube Integrator* is optionally available equipped with an SD-Card Slot and an evaluation software for downloading the data to a computer to show, edit and store a history of the measuring results of the entire measuring cycle as graphic charts (mW/cm²) and (mJ cm²)

The *UV-T Cube Integrator* is available in six different measuring ranges:

Item 52.3.1 UV-T Cube Integrator, Type 1 Diazo 350 – 460 nm
Item 52.3.2 UV-T Cube Integrator, Type 2 UV-A 315 – 400 nm
Item 52.3.3 UV-T Cube Integrator, Type 3 UV 230 – 410 nm (Standard)
Item 52.3.4 UV-T Cube Integrator, Type 4 UV-B 280 – 315 nm
Item 52.3.5 UV-T Cube Integrator, Type 5 UV-C 230 – 280 nm
Item 52.3.6 UV-T Cube Integrator, Type 6 UV-V 395 – 445 nm

Also available with 2, 3 or 4 sensors and temperature measuring

UV-DESIGN *** Triebstrasse 3 *** 63636 Brachttal *** GERMANY
Tel.: +49 (0)6053 619824 *** Fax: +49 (0)6053 619820
www.uv-design.de *** mail: info@uv-design.de

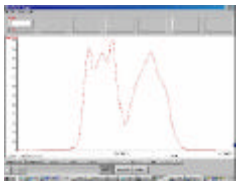
UV-T Cube Integrator

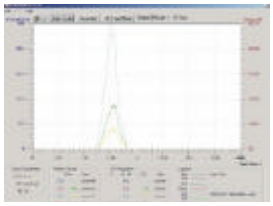
In the standard version
it is measuring an integral
in the spectral range
from 230-410 nm,
with a peak
at the area of 330 nm.

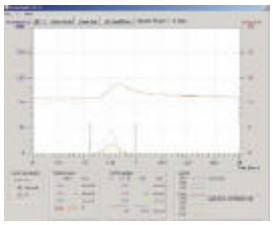
Technical Data:

Spectral range:	UV 230 – 410 nm (Standard)
Max. Power Input	0 to 5,000 mW/cm^2
Display:	LCD, 2x16 digits
Display range:	0 to 36,000 mJ/cm^2
Measuring range:	0 to 2,000 mW/cm^2
Measuring range:	0 to 115°C / 32 to 232°F
Sampling rate:	0.005 sec (200/sec)
Measuring period:	30 sec.
Readiness phase:	120 sec.
Power source:	7.2 V NiMH Accu-Pack, 70 mA, re-chargeable
Power consumption:	20 µA
Battery service life:	1,000 charging cycles
Dimensions:	2.4” x 2.4” x 2.4” (60 x 60 x 60 mm)
Weight:	approx. 17.5 ounce (500 g)
Operating temperature:	0 to 113° F / 0 to 45° C
Heat protection:	Heat shield
Base Accuracy:	± 5 %

Option:
Stores data on
SD-Memory Card
for the download
of data
to a Computer







While on the conveyer belt, the *UV-T Cube Integrator* can withstand max. 230° F / 110° C for up to 10 seconds. The temperature of the housing should not exceed 113° F / 45° C.

Because of uneven radiation distribution of the UV light source and different type of construction of the measuring devices by different manufacturers, different readings may appear under the same measurement conditions.

Calibration:
In order to keep its full function and precision it is recommended to have re-calibration done once per year. Re-calibration will also be necessary after change of battery. PTB traceable calibration acc. to DIN EN ISO / IEC 17025 with certificate

UV-DESIGN *** Triebstrasse 3 *** 63636 Brachttal *** GERMANY
Tel.: +49 (0)6053 619824 *** Fax: +49 (0)6053 619820
www.uv-design.de *** mail: info@uv-design.de