

wek-tec 1L-RepRate-V2 Intense Pulsed Light System User Manual

Home » wek-tec » wek-tec 1L-RepRate-V2 Intense Pulsed Light System User Manual ™



1L-RepRate-V2 Intense Pulsed Light System User Manual



INTENSE PULSED LIGHT SYSTEM XeMaticA-1L-RepRate-V2 automatic R&D system with one water-cooled flash lamp

Contents

- 1 1L-RepRate-V2 Intense Pulsed Light System
- 2 User friendly advantages:
- 3 Safety features:
- 4 Highlights:
- **5 Documents / Resources**
- **6 Related Posts**

1L-RepRate-V2 Intense Pulsed Light System

for evaluation tests in food, pharmaceutical, cosmetic, bio-medical, and tech. applications:

User friendly advantages:

- 1. Selecting most common UV intensities to samples by varying 3 pulse energies, 3 pulse repetition rates and distance between a sample and the lamp, tabulated in the manual;
- 2. Timer starts and stops pulsing from 1 sec (the single pulse at 1 Hz) to 1 hour of pulsing;
- 3. Controlling UV intensities by a UVC sensor with outputs to a digital scope, included.
- 4. Friendly controls with LED lighted rotary switchers:
- 5. based on pre-programmed chips to last for many years without software or hardware upgrades.

Safety features:

- 6. Flash lamps are filled with Xe-gas (no Mercury), water cooled, no ozone neither heat to samples.
- 7. The large red button is the emergency stop.
- 8. The chamber door is automatically locked and sealed during pulsing.
- 9. No EM waves or UV leaks outside during pulsing.

El connection:

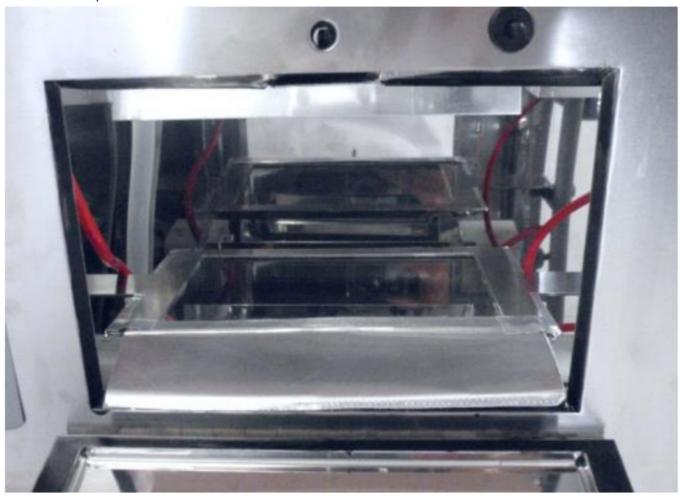
208-240 VAC, 1-phase, 50-60 Hz, max 2kw. Size, Weight, Enclosure Material: 60 cm wide x 40 cm high x 53 cm deep, Polished stainless-steel, weight 42 kg.

Highlights:

- Pulse energies 200J, 350J, 500J.
- Max spectral output on request UVC to IR,
- Repetition rates 1Hz, 2Hz and 3Hz.
- Timed burst pulsing 1-60s + single pulsing.
- 180° sample exposure.
- water-cooled by an internal water system, which also takes most of IR out of the lamp spectra.

PL chamber:

- -18 cm wide x 16 cm high x 18 cm deep,
- distance between edges of lamp reflectors and the sample shelf can be from 2 to 8 cm.
- provides 180° sample exposure with ca. 20% uniformity due to 98% reflectors over lamps and on all sides around the sample shelf.



Sterilization UV Efficiency:

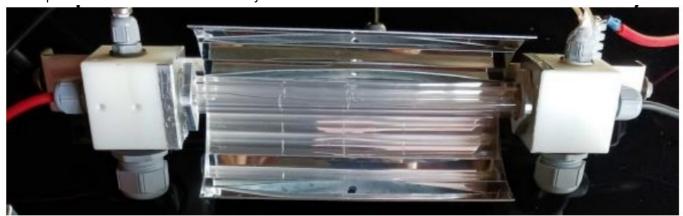
up to 6 logs /pulse for common bacteria,

up to 3 logs /pulse for common spores.

Option:

adjusting the lamp spectra to a desired maximum output in UV, visible and IR spectra plus using respective filters. **Industrial version:**

the lamp module is mounted over a conveyer



and connected by cables with the controller.

This is our novel Pulsed Light system, other our PL R&D systems are in use in universities and production labs worldwide.



© 2023 Wek-Tec e. K. Kronenstr.3

D-78244 Gottmadingen +49 (0)172 70844 37,

dr.alex.wekhof@wek-tec.de www.wek-tec.de

Documents / Resources



wek-tec 1L-RepRate-V2 Intense Pulsed Light System [pdf] User Manual 1L-RepRate-V2 Intense Pulsed Light System, 1L-RepRate-V2, Intense Pulsed Light System, Pulsed Light System, Light System

Manuals+,