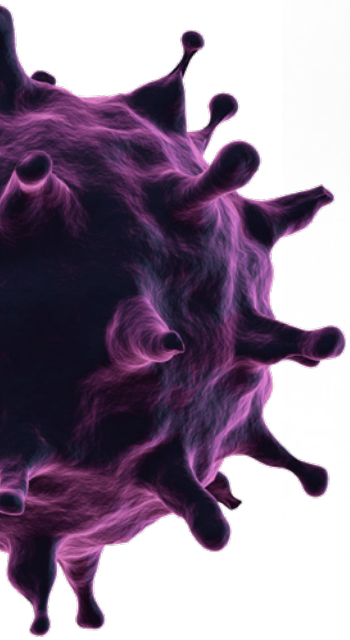
UV222™ Effective and safe disinfection for everyday life



uvmedico

UV Medico

Innovative solutions for a safer and healthier future

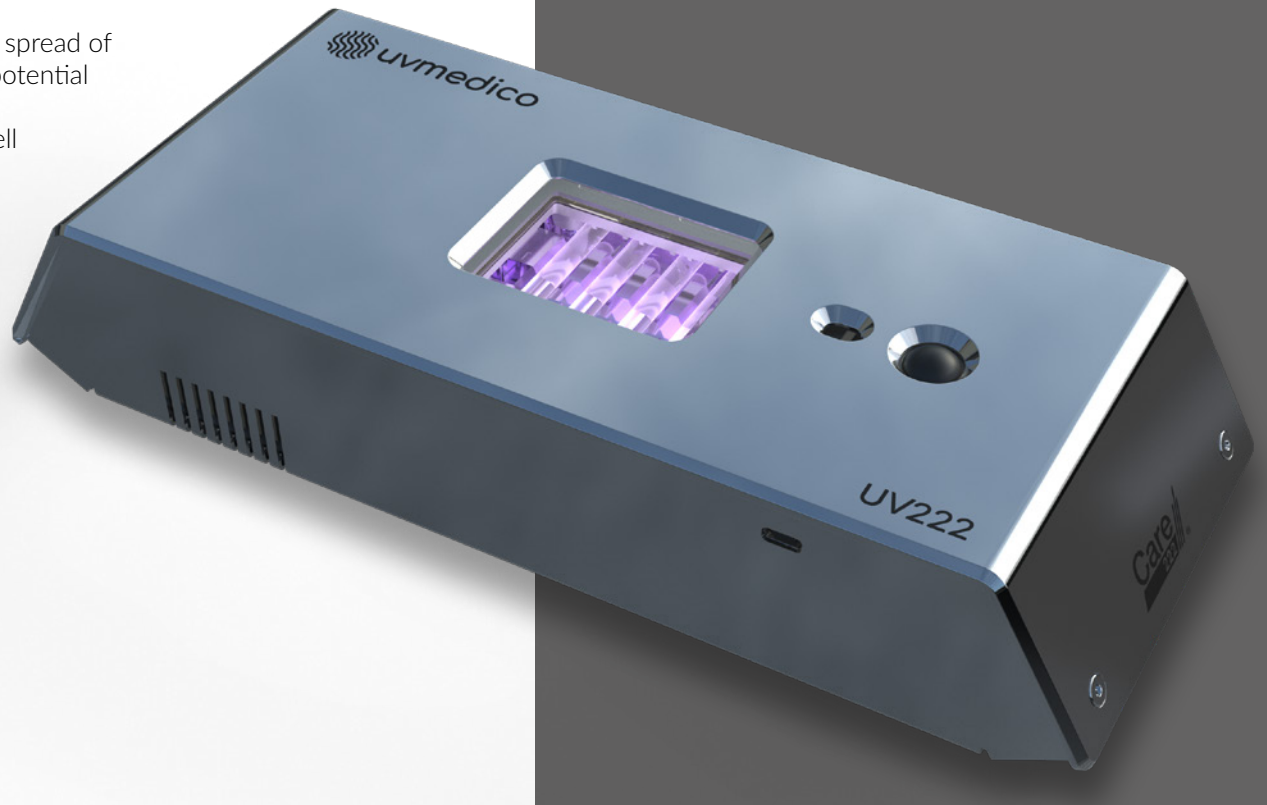
The wavelengths of Far UV-C rapidly inactivate SARS-CoV-2, the virus that causes COVID-19, as well as other common airborne and surface pathogens such as bacteria, mold, mites, spores, fungi, and even antibiotic-resistant superbacteria like MRSA.

In partnership with Ushio, and based on the patented technology Care222®, the UV222 lamp from UV Medico harnesses this game changing technology and thus offers a highly effective solution for surface and air disinfection. The UV222 can be used in all spaces and is safe to use in presence of people.

UV222 is an essential tool to prevent the spread of existing and emerging viruses and other potential infections. The lamp is an answer to the challenges we face from COVID-19 as well as to similar threats in the future.

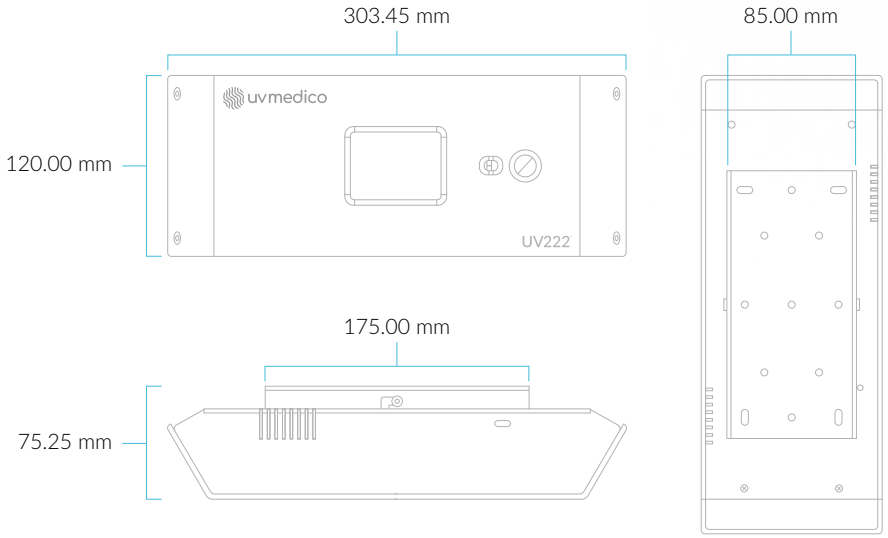
Facts about UV222

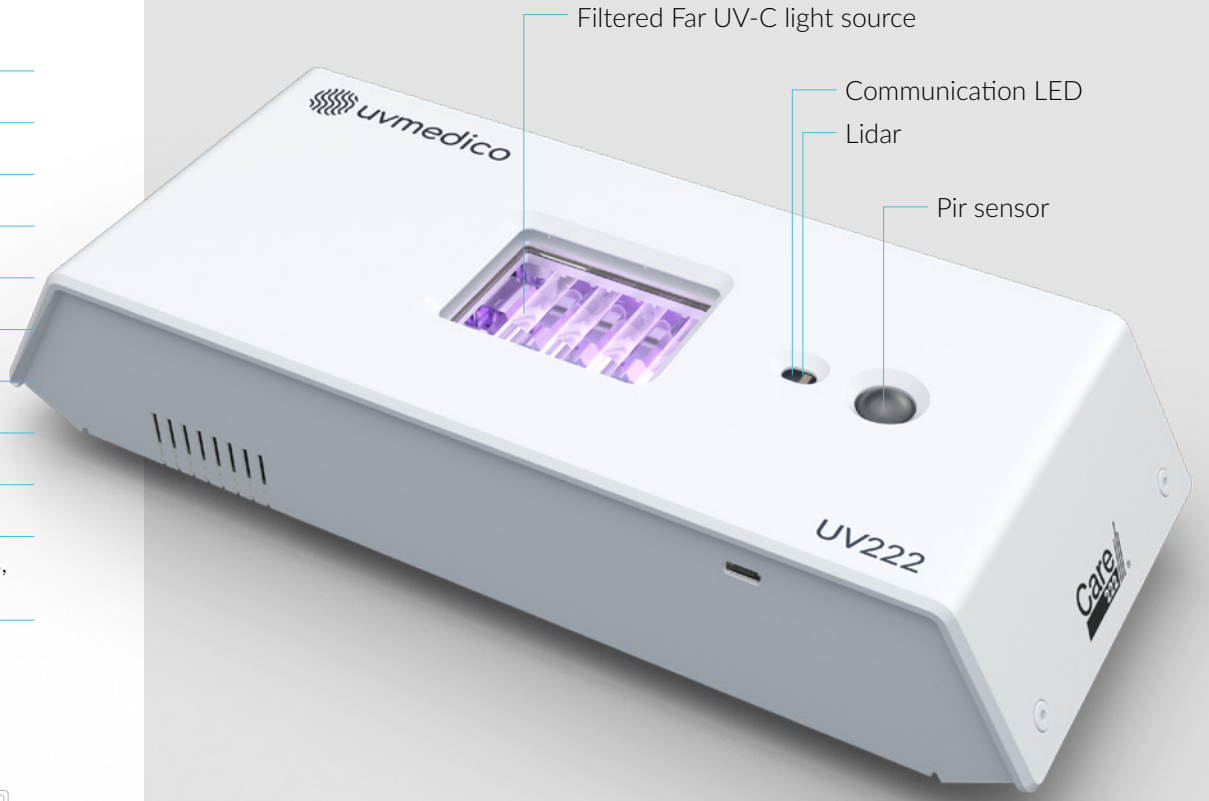
Safety	UV222 is 100% safe to use in presence of humans and animals, and fully complies with the international standards of UV radiation.
Efficacy	222nm is an effective disinfection method with immediate proven results. Research from across the world has proven 222nm germicidal effect.
Knowledge	UV222 is developed and engineered in cooperation with several universities and is thoroughly tested and documented. UV222 can only be installed by authorised installers.
Ecological	Does not contain mercury. Disinfection without chemicals or residue.



UV222™ specifications

Light source	Krypton Chloride Excimer Lamp
Wavelength	222 nm
Output	130 mW (Typical)
Input voltage	85-305V AC 50/60HZ
Max power consumption	17W
Weight	1.9 kg
Dimensions	303.45 x 120 x 75.25 mm
Power lead	3 x 0.75 mm²
Operating temperature	0° to +50°C
Content	UV222, Measurement report, Safety Regulations, Technical & Installation Manual.





Colours

Standard colour: White (RAL 9010)
Custom colour on request.

Case Café Dan Turèll

Serving in safe surroundings

Café Dan Turèll became the first restaurant in Copenhagen to install our human-safe far-UVC lamp, UV222, for continuous and efficient disinfection of the air and surfaces.

The preliminary results from Café Dan Turèll showed that it was possible to deactivate more than 99% of bacteria - matching previous results on viruses such as SARS-CoV-2.

This significantly reduces the spread of infectious diseases and provides safe surroundings for both customers and staff.

The UV222 is delivered in a custom yellow, ensuring a perfect match to the iconic styling in Café Dan Turèll.

Case Aarhus University Hospital

Protecting vulnerable patients

Our lamps are installed in the waiting area of the Department of Respiratory Diseases and Allergy at Aarhus University Hospital (AUH), for the protection of vulnerable patients.

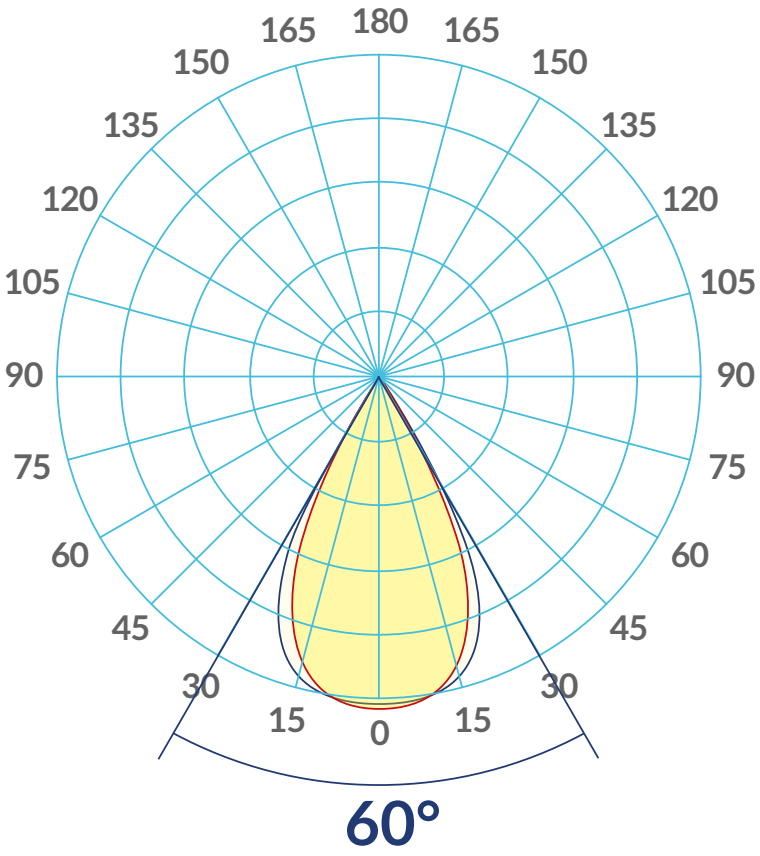
In a joint effort between Aarhus University and AUH, disinfection of surfaces in the area has been tested. Results show that UV222 exposure significantly reduces the overall bacterial load and eliminates pathological bacterial species in this out-patient clinic daily.

Søren Helbo,
Ward Doctor at the
Lung Clinic in Aarhus
University Hospital.

Facts about hospital waiting room

Dimensions	W: 3000 mm x L: 3000 mm x H: 2800 mm
Space	9 m^2 - 8 persons
Inventory	8 chairs
Number of UV222	2

60° beam angle



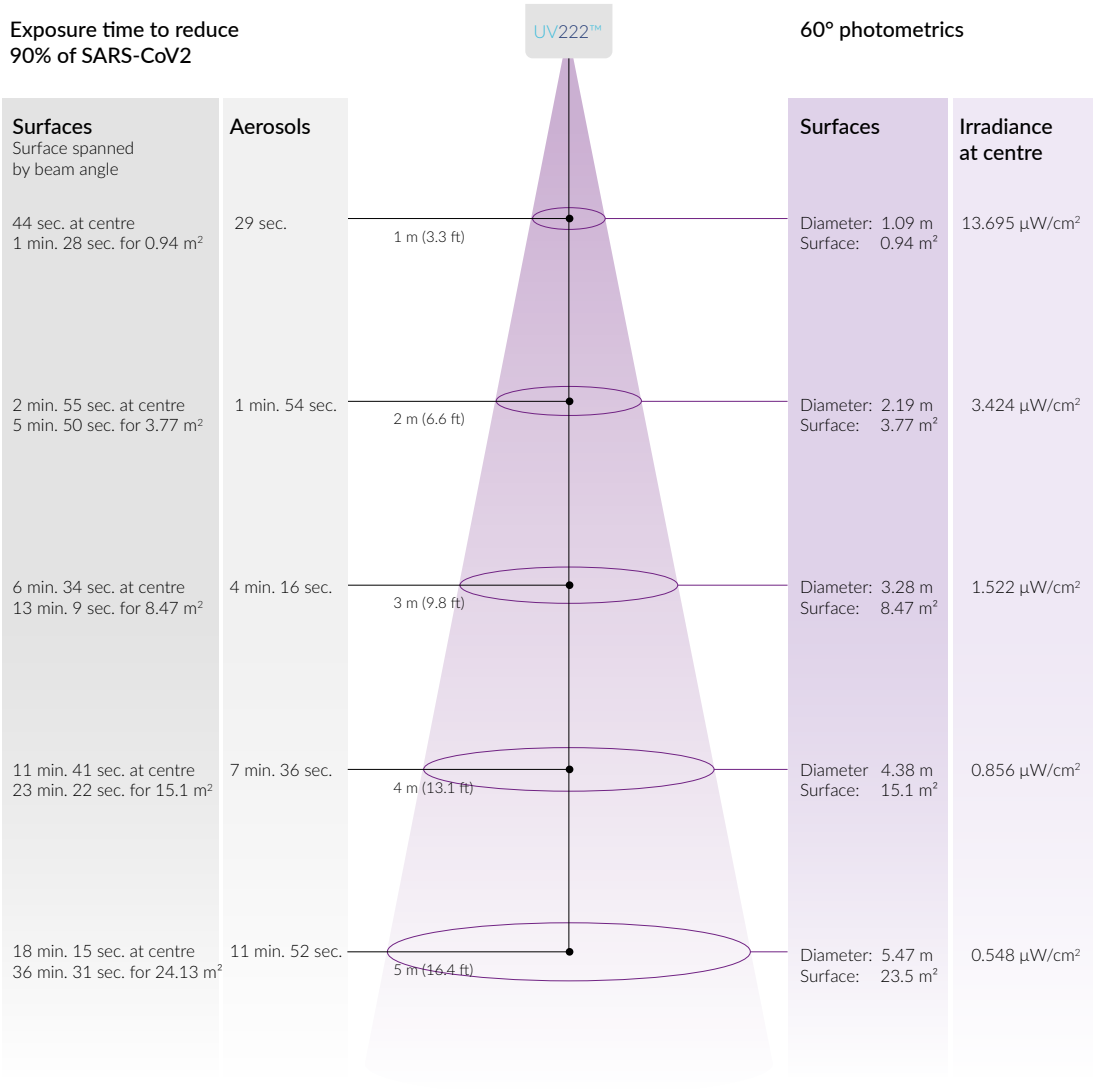
Light measurement results

Output - total optical power flux, 200 nm - 850 nm	126.92	mW
Far UV-C 200 nm - 230 nm	120.79	mW
VIS-IR: 400 nm - 850 nm	6.81	mW
Radiated power/lamp power	0.926	%
Peak emission wavelength	222	nm
UV irradiance at 222 nm (distance 1 m)	13.7	µW/cm²
Beam angle	60	°

Exposure time with 60° UV222 - SARS-CoV2/COVID-19

Peak emission wavelength	222.00 nm
Output power in range (200-230 nm)	120 mW
Dose needed (222 nm, COVID-19) 90% deactivation for aerosols	390 µJ/cm²
Dose needed (222 nm, COVID-19) 90% deactivation for surfaces	600 µJ/cm²

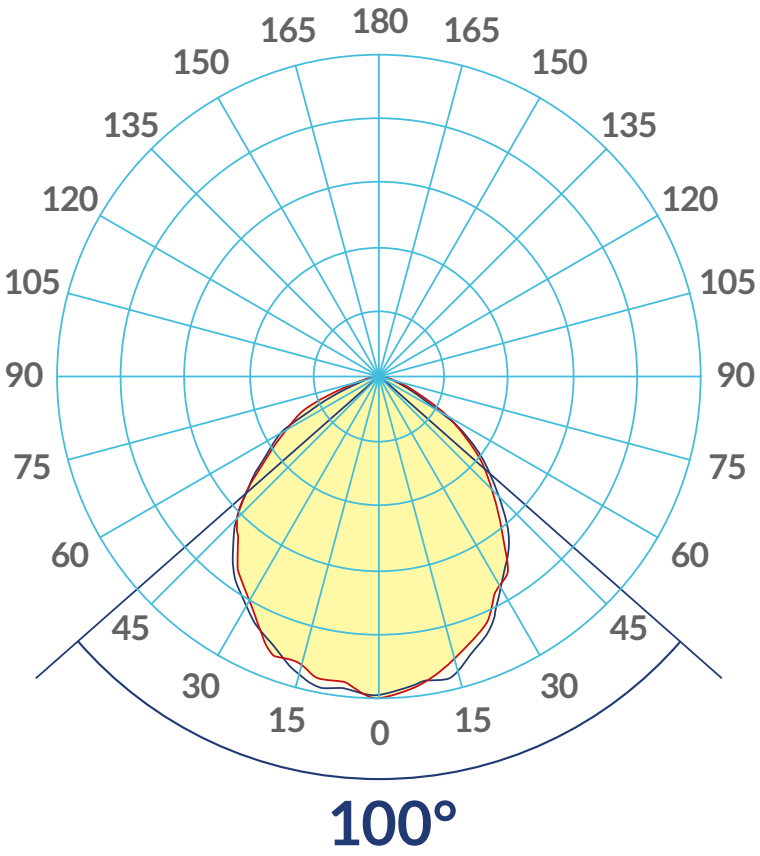
Exposure time to reduce 90% of SARS-CoV2



60° photometrics

Surfaces	Irradiance at centre
Diameter: 1.09 m Surface: 0.94 m²	13.695 µW/cm²
Diameter: 2.19 m Surface: 3.77 m²	3.424 µW/cm²
Diameter: 3.28 m Surface: 8.47 m²	1.522 µW/cm²
Diameter 4.38 m Surface: 15.1 m²	0.856 µW/cm²
Diameter: 5.47 m Surface: 23.5 m²	0.548 µW/cm²

100° beam angle

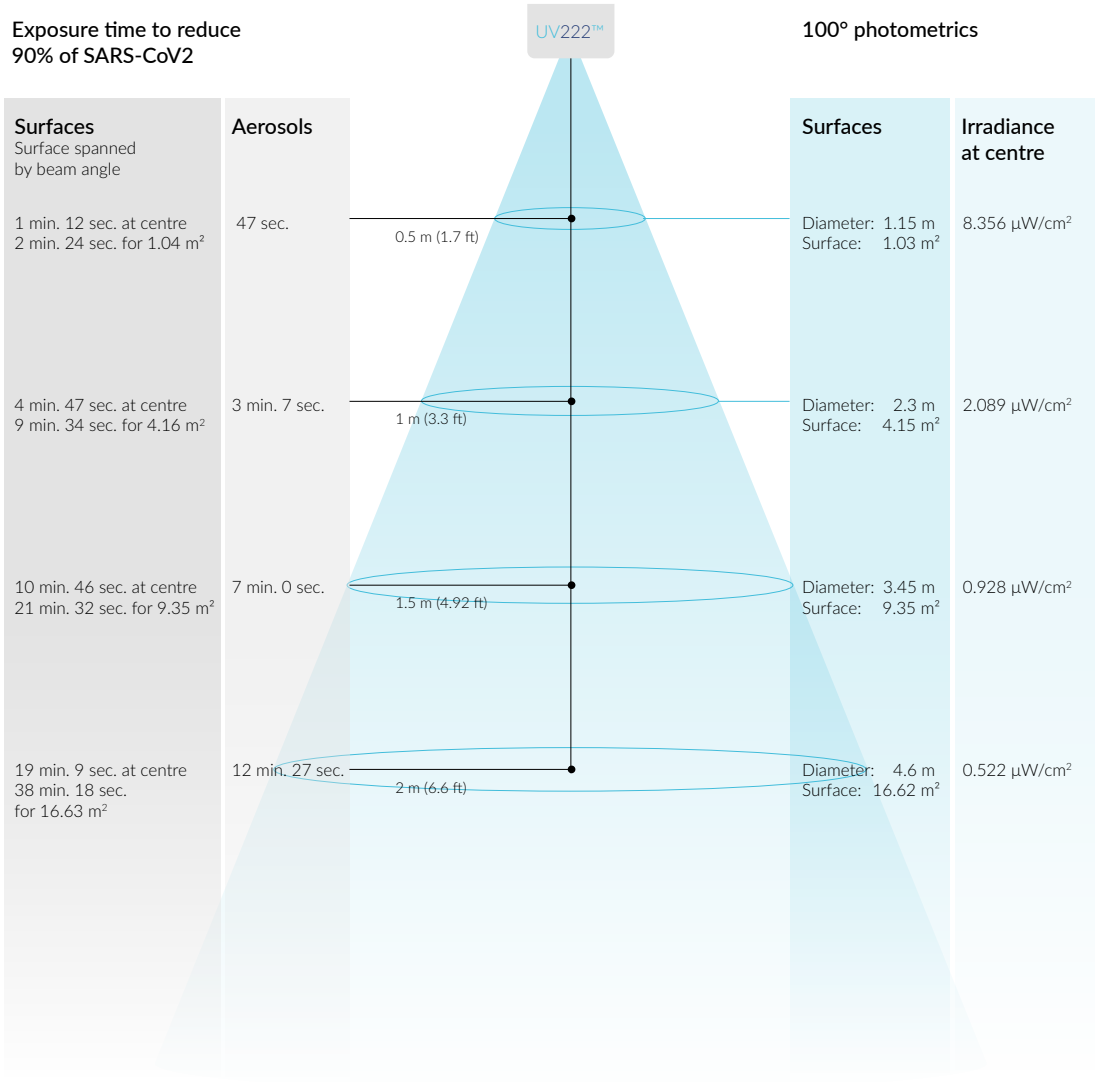


Light measurement results

Output - total optical power flux, 200 nm - 850 nm	75.72	mW
Far UV-C 200 nm - 230 nm	58.79	mW
VIS-IR: 400 nm - 850 nm	10.71	mW
Radiated power/lamp power	0.57	%
Peak emission wavelength	222	nm
UV irradiance at 222 nm (distance 1 m)	2.69	µW/cm²
Beam angle	100	°

Exposure time with 100° UV222 - SARS-CoV2/COVID-19

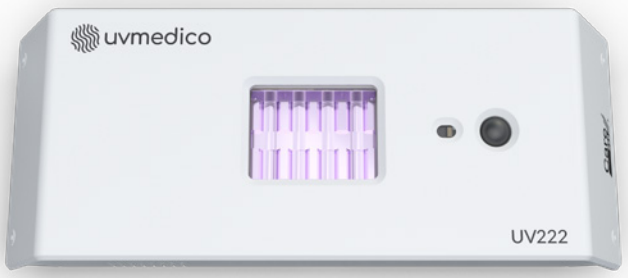
Peak emission wavelength	222.00 nm
Output power in range (200-230 nm)	60 mW
Dose needed (222 nm, COVID-19) 90% deactivation for aerosols	390 µJ/cm²
Dose needed (222 nm, COVID-19) 90% deactivation for surfaces	600 µJ/cm²



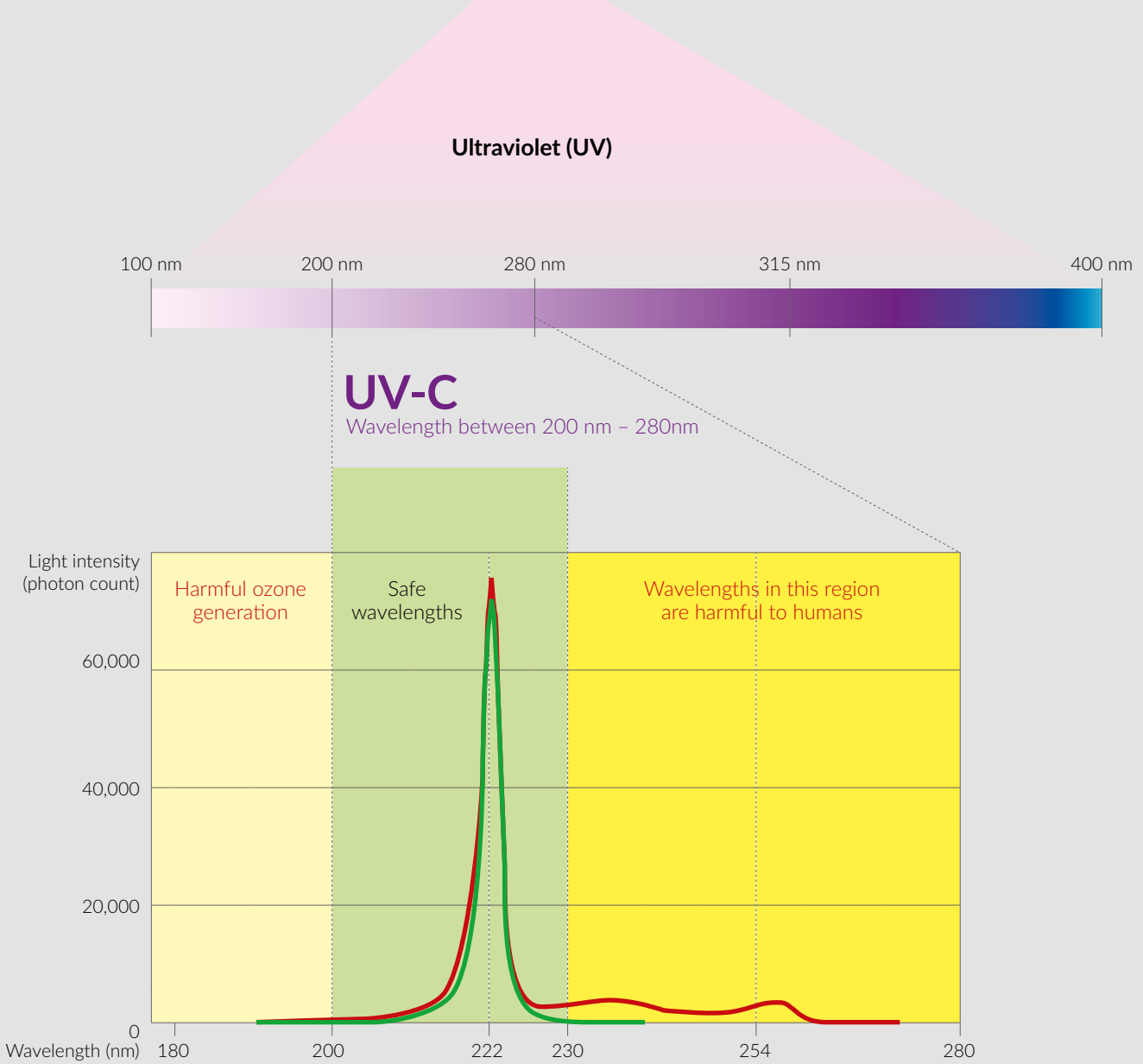
Why is UV222™ safe?

- Thanks to the unique filter technology Care222® patented by Ushio, UV222 emits at a narrow UV spectrum safe of human exposure.
- UV222 complies with the UL867 regulation on maximum concentration of ozone generation.

UV222 does not generate harmful wavelengths.



WARNING!
Unfiltered Far UV-C will cause cancer and cataract!



UV222 Far UV-C excimer lamp **with** an optical band-pass filter
A typical krypton-chloride excimer lamp **without** an optical band-pass filter

Exposure to harmful wavelengths is eliminated by an exclusive, patented optical band-pass filter.

Contact

UV Medico A/S
Søren Frichs Vej 40E
8230 Åbyhøj
Denmark

+45 20 90 71 30

info@uvmedico.com
www.uvmedico.com

In compliance with

International Standard:

ISO 15858	UV-C Devices – Safety information – permissible human exposure.
IEC 62471	Photobiological safety of lamps and lamp systems.
IEC PAS 63313 ED1	Position statement on germicidal UV-C irradiation - UV-C safety guidelines (see Global Lighting Association).

International Guidelines:

ACGIH® (American Conference of Governmental Industrial Hygienists)	2021 TLV (Threshold Limit Values) & BEI (Biological Exposure Indices) for chemical substances and physical agents.