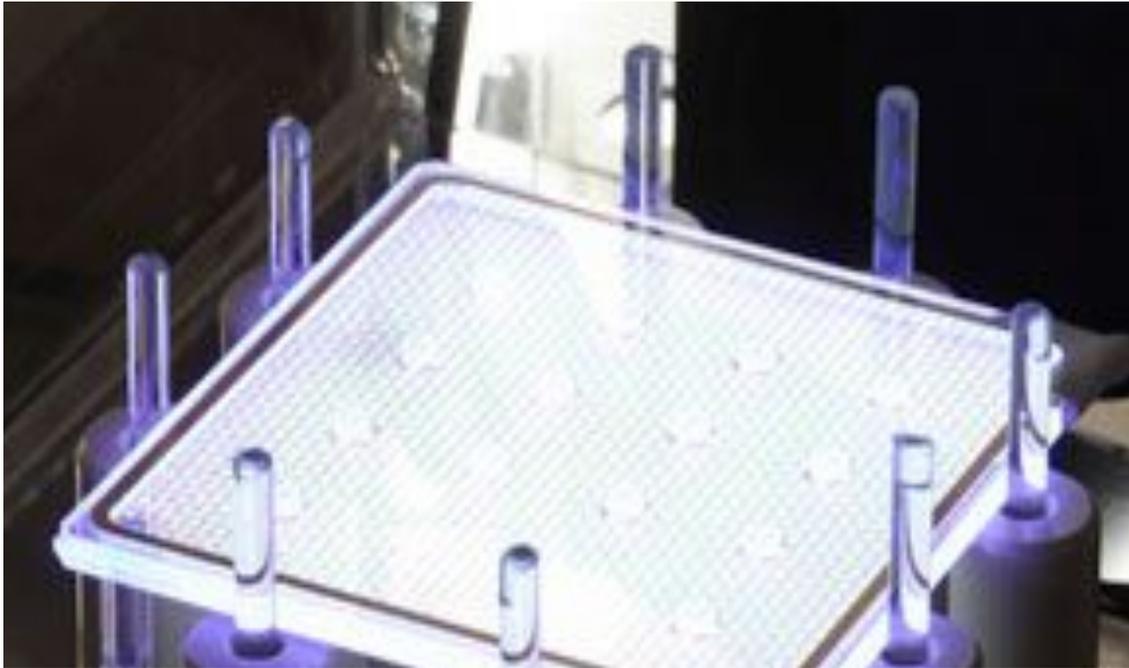


Far-UVC (222 nm) Light:

A new solution to prevent pandemics such as COVID-19



The Problem... the Solution

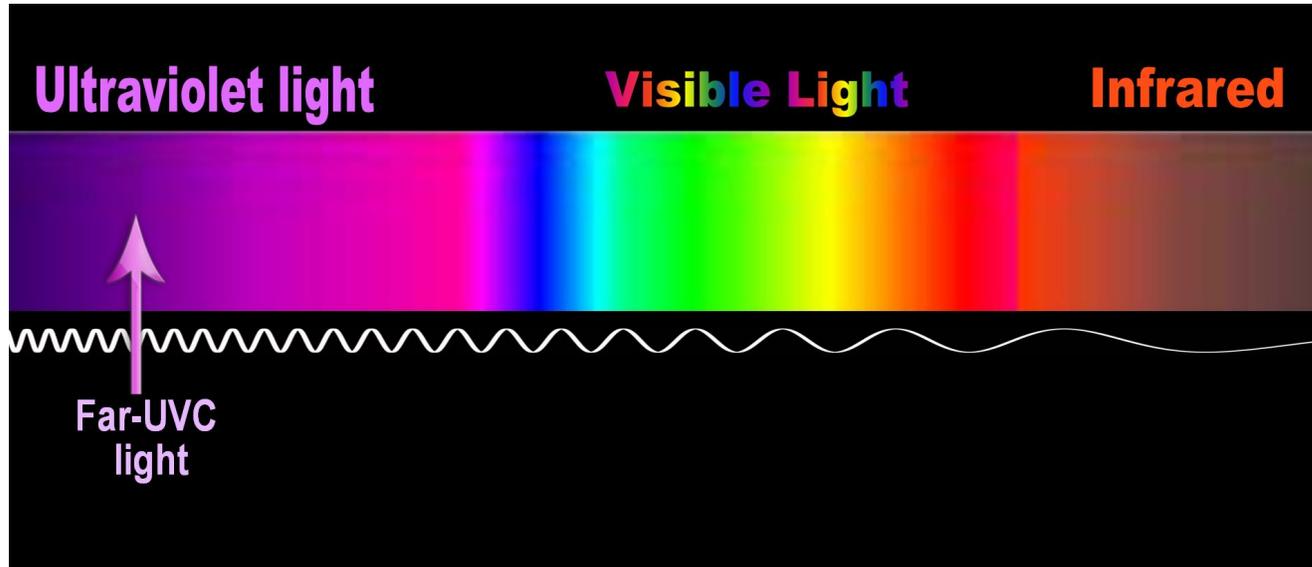
*We face a pandemic that has already killed more than 200,000 people and devastated our economy
Unless we take a new approach, it will happen again.*



Far-UVC light provides a practical solution to killing the virus in the air, shortly after it has been produced by a cough or a sneeze.

What is far-UVC?

Background: UV light is well known to kill all viruses and bacteria but it can't be used in public places because it's a health hazard



- Far-UVC light kills viruses, including coronavirus, equally well, but it's safe
- So it can be safely used when people are around

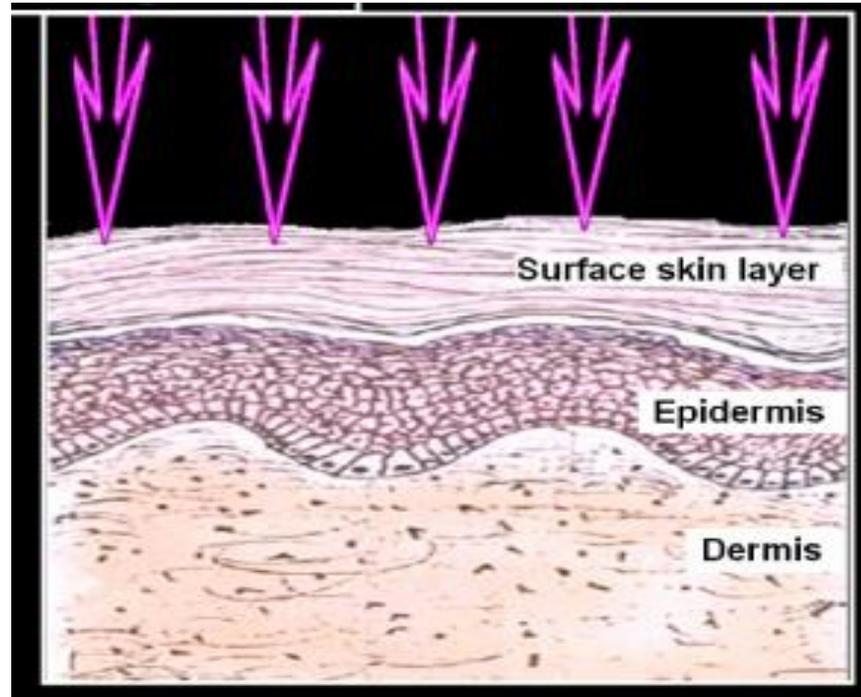
Far-UVC light safely kill viruses in occupied public spaces

- ➡ Designed for use in occupied public places to prevent person-to-person virus transmission
- ➡ Kills at least 99.9% of coronavirus indoor air
- ➡ Safe for use in occupied public locations
- ➡ Operates within all regulatory guidelines (ACGIH, OSHA, etc)



How Far-UVC (222 nm) Light Works

- 👉 Far-UVC light can only penetrate extremely short distances in biological material
- 👉 So far-UVC light cannot get through the dead cell layer at the surface of our skin, so it can't reach the skin's living cells.
- 👉 Likewise 222 nm light is absorbed in the tear layer at the surface of our eyes, so it can't reach the living cells in our eyes.
- 👉 However viruses are very much smaller, and 222 nm light can penetrate and kill them



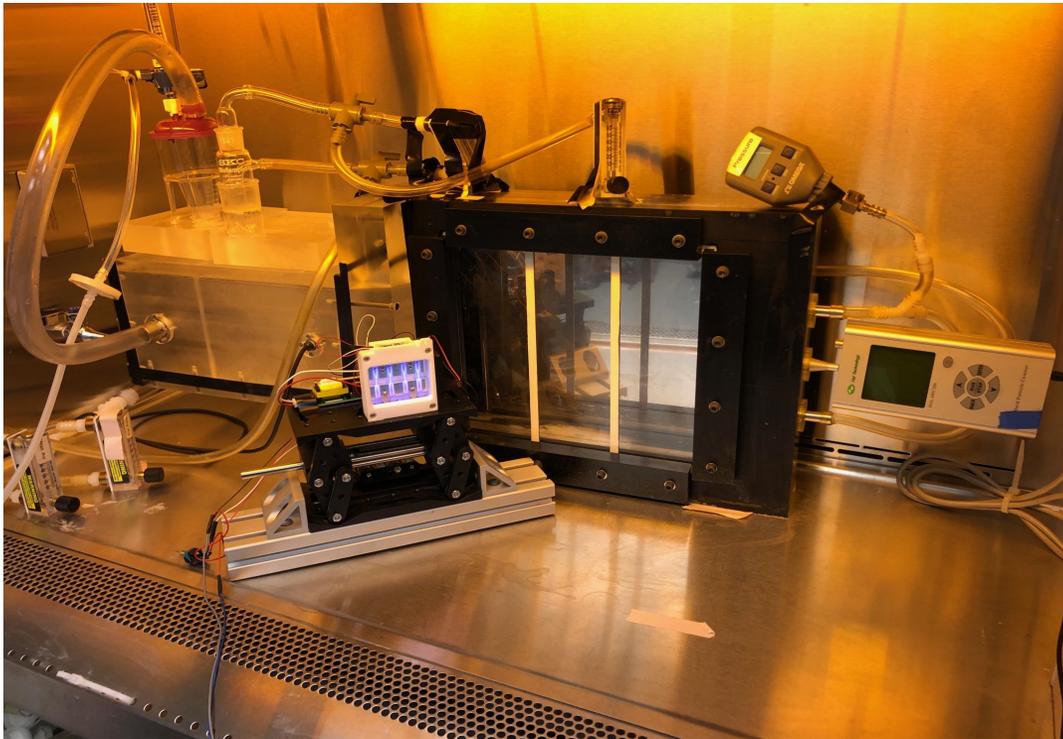
~ 222 nm UV Light

~ Layer of dead cells on the surface of our skin

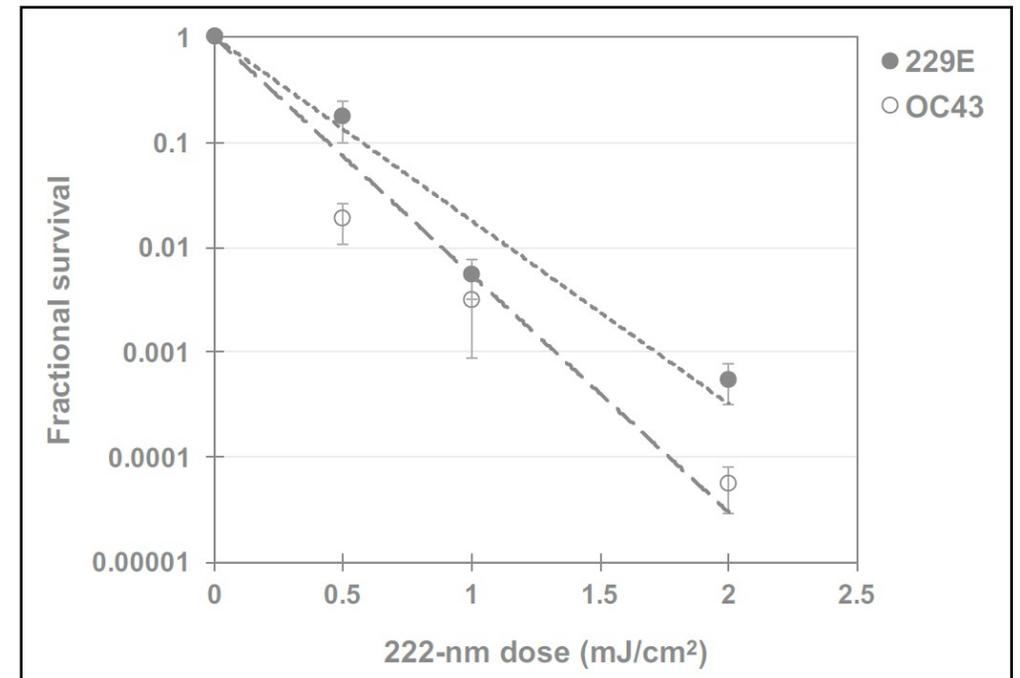
~ 222 nm light can't reach the living cells in our skin or our eyes

Far UVC: 99.9% Effective in Killing Airborne Coronavirus

Very low exposures to far-UVC light result in 99.9% killing of airborne coronaviruses and H1N1 influenza virus.



Apparatus for exposing airborne virus to a far-UVC lamp



Two different airborne coronaviruses
From Buonanno, Welch & Brenner, 2020

Far UVC Safety:

Multiple studies have shown that it is safe for human exposure

As expected based on the physics, extensive studies over recent years, with animals and with human skin, have shown that far-UVC is safe



So far-UVC kills 99.9% of coronavirus in air
and it is safe for use in public spaces



Far-UVC use: Wherever people get together and can potentially infect each other



TRANSPORTATION

Transportation Hubs
Subway Cars
Airplanes
Buses
TAXI/UBER/LYFT
School Buses
Trains
Ambulances



HEALTHCARE

Hospitals: Recovery Rooms, Waiting Rooms, Procedure Rooms
Maternity Wards, Physical Therapy
Restrooms, Waiting Areas
Dentist Offices
Doctor Offices
Assisted Living Facilities
Physical Therapy



COMMERCIAL

Restaurants, Cafes, Clubs
Grocery Stores and Retail Shops
Offices, Studios, Co-working Spaces
Sports Arenas,
Concert Venues, Theaters
Warehouses, Manufacturing &
Distribution Centers.
Conference Centers
Hotels & Resorts, Fitness Centers



INSTITUTIONAL

Government Buildings: City Hall, Courthouses, Post Offices, Libraries
Transportation Hubs: Airports, Train Stations, Bus Terminals
Universities, Schools, Dorms, Dining Halls, Gymnasiums
Museums, Religious Houses: