

UV air cleaners make control centers safer Fraport AG's critical airport infrastructure benefits from UVC

Viruses, bacteria and other microorganisms spread through the air in tiny droplets of water, so-called aerosols. They can survive there for a long time and easily spread from host to host. The risk is particularly high in rooms where many people meet. Often, the situation is aggravated by the fact that these spaces cannot be well ventilated or not at all: ideal conditions for viruses.

Fraport AG is one of the leading international companies in the airport business operating 31 airports on four continents. As a major international air traffic hub, the Frankfurt home base is one of the leading airports in Europe in terms of passenger and cargo traffic.

Many thousands of employees ensure the safe operation of Frankfurt Airport and at many points these employees have to be onsite and work together in teams. In control centers and security centers, they manage the complex processes essential for smooth operations. In some cases, up to 50 employees come together in one large room for this purpose. And in winter, up to 250 members of the winter services team gather in waiting rooms so they can then start the clearing service in a targeted manner. Many employees in one room increase the risk of infection with Corona, but these critical safety services cannot be cancelled.

Therefore, at an early stage Fraport AG relied on additional protection using HEPA air filter devices that collect viruses from the air. However, it quickly became apparent that maintenance was extremely costly. The prescribed filter changes and cleaning steps took a lot of time and caused considerable additional costs.

Ferdinand Lutz, Head of Campus Facilities: "We have been using UVC light to clean the air in some air ducts for some time. The thought was obvious to use UVC air purifiers in the rooms of our critical infrastructure as well!" At Fraport AG, they did the math and concluded that the higher initial cost of UV air purifiers would be quickly offset by much longer service lives and significantly lower operating costs. In the meantime, more than 60 wall-mounted Soluva® Air F units provide permanent protection in the control centers, winter service rooms and occupational medicine at Frankfurt Airport. UVC light inactivates the viruses inside the units, so no filters are needed. The UV lamps are reliable and long-lasting, and all these advantages have not only impressed colleagues in Frankfurt, but other Fraport AG sites have also learned about the benefits of UVC air purifiers from Heraeus Noblelight.



For the first time the renowned Fraunhofer Institute for Building Physics (FBP) confirmed the effectiveness of air disinfection with a self-contained UV-C air purification device. Using a sophisticated scientific test to simulate real classroom conditions FBP verified Heraeus UV-C air purification devices can reduce the virus load in closed rooms by over 99%. Additional tests with the Hygiene Institute biotec and the University Hospital in Tübingen, also confirmed the disinfecting capability of UV-C light.

Advantages of UV-C air purification with Heraeus Soluva equipment:

- ✓ Chemical-free
- ✓ Filter-free - no hazardous filter removal
- ✓ Low maintenance
- ✓ Environmentally friendly: no ozone or by-products
- ✓ Safe to use in occupied areas
- ✓ Germs can't build up resistance to UV-C

