

EFFICIENT AND SAFE DISINFECTION IN JUST THREE STEPS

1 I Diffusion

Microdrop phase

Microdrop Technology®*: Biocide is sprayed in microdroplets, forming a nonwetting fog that covers all accessible and non-accessible surfaces, with excellent distribution.

2 I Contact time Vapor phase

Evaporation of small droplets on contact with surfaces. Penetration of the biocide into the microbial cell and irreversible lethal action (full biocide spectrum).

3 I Aeration

Low H_2O_2 concentration: fast ventilation.



Why choose Phileas® Airlock?

Minimal space requirement

Inside the airlock Flush-mounted diffuser module (high, above the load) and return air outlet (low)

Outside the airlock Control console (500 x 600 x 900 mm), Dräger display

Maximum safety

Integrated H₂O₂ probe, high and low concentration (Dräger)

Security before start Notification if biocide quantity insufficient

Biocide tanks 2 x 2 L canisters, weight sensor under each canister

Integrated process

Modbus communication RJ45 connection Industrial PLC Siemens screen

Traceability, data integrity

Audited compliant to 21CFR Part 11 and GMP Annex 11 operator identification at start-up, profiles and associated rights, audit trail Diffusion reports in pdf, with confirmation of compliance

Technical characteristics

Volume processed up to 40 m3 Flow rate 1200 mL/h

Integrated airborne surface disinfection unit (DSVA), using patented non-wetting centrifugal fog technology. In compliance with EN 17-272. Marketing Authorization N° AMM FR-2019-0071 obtained with O2SAFE7.4® disinfectant.

PERFORMANCE, SAFETY & TRACEABILITY FOR THE FOLLOWING APPLICATIONS AND SECTORS:

- · Pharmaceutical industry, animal research facilities
- · Controlled zones, production areas in sterile environments

^{*}Microdrop Technology: micro-droplets resulting from the centrifugation technique.

PERFORMANCE

- Reduces microorganisms by 4, 5 and 6 log10 depending on target (Geobacillus stearothermophilus spores)
- Effectiveness validated by Marketing Authorization N°FR-2019-0071 and in compliance with standard EN 17-272
- Siemens PLC, touch interface and industrial environment
- Preventive maintenance contract: performance assurance with every disinfection

SAFETY

- Air intake by H_2O_2 probe inside or outside the airlock depending on the phase: during contact time outside (if risk of leakage), then at the end of aeration inside to coordinate door opening when $H_2O_2 < 1ppm$
- Operator safety: no handling of biocide, full use of canisters
- Safety of cleanroom equipment and materials: treatment with low concentrations of H₂O₂, non-corrosive, respectful of installations.
- Safety absence of biocide or insufficient quantity, before diffusion
- · Operator identification on the equipment
- Easy, automatic programming, reducing the risk of errors
- · Compact equipment inside the airlock, no risk of damage

EASE OF USE

- · Simple centrifugation technology, easy maintenance
- Robust, reliable equipment
- · Easy operator training
- Durability



INTEGRATION E TRACEABILITY

- Ethernet connection (RJ45 port), modbus communication with PLC and building management system: data integration, communication with HVAC and doors.
- H₂O₂ concentration during cycle: additional cycle compliance data
- Weight sensor under each canister: integration of diffusion data

Traceability, data integrity:

- Signed diffusion report, audit trail
- Audited equipment in compliance with GMP Annex 11 and 21CFR Part 11

WHY CHOOSE DEVEA?

- Biodecontamination expertise recognized in the most demanding sectors
- Range of products and services adapted to all configurations
- · Market Authorization issued

Devea Biodecontamtion Services offer:

- Qualifications (IQ, OQ)
- Cycle development, protocol support & performance qualification
- Training
- · Disinfection service provision
- Annual preventive maintenance contract
- Biological and chemical indicators supply
- After-sales service & equipment diagnostics within 48 hours
- Designed, manufactured and maintained in France