

UVION AIR ASEPTIZER®

CLINICAL AIR MANAGEMENT SYSTEM

CONVERT A ROOM
INTO A CONTROLLED
HYGIENIC CLINICAL
ENVIRONMENT.



HYGIENIC AMBIENT AIR CONDITIONING,
DECONTAMINATION & PRESSURE MANAGEMENT
PLATFORMU

WHAT IS ASEPTIZER®?

- It is a professional air hygiene platform that combines high-level microbiological protection, controlled air circulation, particulate management, filtration, and UVION atmospheric plasma-based biological decontamination mechanisms.
- It independently controls the pressure, humidity, temperature, and particulate level of its environment.
- With a single touch, the same system can provide both POSITIVE and NEGATIVE pressure, ensuring biological and particulate decontamination.
- It features different models (CW1350, CW1000, CW650, CW650 iO); fresh air intake, supply, air conditioning, and humidification features vary according to models and optional specifications.
- Uvion Air Aseptizer is designed for enclosed spaces where air quality is critical, such as operating rooms, intensive care areas, isolation rooms, reanimation areas, patient rooms, outpatient clinics, laboratories, waiting areas, sterile processing departments (CSSD), controlled production areas, cleanrooms, pharmaceutical production areas, microelectronics manufacturing areas, food production facilities, and clean zones requiring hygienic air; it is used for air conditioning, particulate removal, and air sterilization.
- The primary purpose of Aseptizer is not merely to filter air, but to create a continuous and controlled air hygiene cycle within an enclosed environment.
- By utilizing the system in operating rooms, intensive care, and reanimation units, hospital-acquired infections caused by contamination (such as MRSA, VRSA) are prevented, and patient hospitalization length is reduced.
- Unlike central HVAC systems, application areas can be controlled independently from one another. Thus, the risk of possible cross-contamination between units is minimized with the use of Aseptizers.
- The platforms provide an advantageous and economical solution, especially for hospitals, as they require no construction or ductwork, can be installed quickly, and can be easily relocated or remounted in another unit during internal architectural modifications. The Uvion Air Aseptizer Series can be easily utilized in areas with low ceiling heights.



NO CONSTRUCTION REQUIRED FOR INSTALLATION!



Basic Operating Principle

Through its automation infrastructure architecture, the device operates in two distinct pressure regimes. In Negative Pressure Mode, it draws in room air, renders it safe, and discharges the treated component outside, preventing infected air from escaping into the corridor. In Positive Pressure Mode, it filters fresh air and supplies it into the room, making it impossible for contaminated outside air to infiltrate.

Pathogen Ionizer: Prevents the spread of Avian Flu, Swine Flu, SARS, Ebola, Covid-19, and all other airborne viruses, microorganisms, and pathogens with mutated genomes.

CONVERT A ROOM INTO A CONTROLLED HYGIENIC CLINICAL ENVIRONMENT

Aseptizer reduces particulate and bioaerosol load through air conditioning, H14 HEPA filtration, UVION Atmospheric Plasma, active air pressure, and flow management.

It creates positive and negative pressure hygienic clinical environments. Thanks to its compact structure, it provides fast installation, low energy consumption, and high-performance safe air management.

UVION ATMOSPHERIC PLASMA ACTIVE BIODECONTAMINATION

Using atmospheric plasma and ion technology, it breaks down bioaerosols, rendering viruses, bacteria, fungi, spores, etc., ineffective.



PARTICULATE AND BIO-DECONTAMINATION PERFORMANCE

>%99,995	>2,3 LOG	>2,0 LOG	>1,8 LOG
PARTICLE REDUCTION (0.3 μm and above)	BACTERIA REDUCTION (within 1 hour)	VIRUS REDUCTION (within 1 hour)	FUNGI / SPORE REDUCTION

High efficacy in destroying airborne microorganisms and pathogenic agents through negative ion and atmospheric plasma generation.

ASEPTIZER®

KEY FEATURES



HEAT CONTROL

16-30 °C adjustable heating and cooling feature.



UVION ATMOSPHERIC PLASMA

Active Decontamination

Breaks down bioaerosols with reactive species; ensures inactivation of viruses, bacteria, fungi, and spores.



HEPA H14 FILTRATION

High Efficiency

With an H14 filter compliant with EN 1822 standards, it provides high filtration efficiency up to 99.995% (0.3 - 0.5



VERIFIABLE PERFORMANCE

Flow Rate, ACH, Pressure, Temperature, and Humidity Control

Delivers clinically verifiable performance through biological load and particle measurements.



SMART MANAGEMENT AND SENSORS

Automatic Control

Automatic control and continuous monitoring with pressure, flow rate, temperature, humidity, air velocity,



LOW ENERGY CONSUMPTION

High Efficiency

Provides low energy consumption with high-efficiency fans and smart operating modes.



FAST INSTALLATION

Without construction work and without interrupting active facility operations. Thanks to its compact design, it can be installed quickly, easily transported, and repositioned.



**CONTROLS TEMPERATURE, HUMIDITY, PRESSURE,
AND PARTICLE LEVEL IN ITS ENVIRONMENT!**

THREE-IN-ONE CLINICAL AIR MANAGEMENT

Combines filtration, pressure control, and air conditioning in a single system to deliver fast, flexible, reliable, and hygienic solutions.

ISOLATION (NEGATIVE PRESSURE)

Aseptizer CW650 IO; is used in negative pressure isolation rooms to prevent airborne infections from spreading outside the room (to corridors, other patients, and healthcare personnel).

Operating Principle:

The air pressure inside the room is maintained lower (negative) than the pressure in the corridor and adjacent rooms. Thus, when the door is opened, infected air in the room does not leak outside; instead, clean air in the corridor is drawn into the room. The dirty air in the room is passed through pre-filters, specialized HEPA filters, UVC, and atmospheric plasma to be purified of viruses and bacteria; part of it is recirculated inside the room, and part of it is safely exhausted outside the building.

FLEX Operation with Both Negative / Positive Pressure - Flexible Use

Featuring a Flexible Environmental Pressure Architecture, the Aseptizer CW1000 Platform provides bidirectional airflow control with 3 Positive, 1 Negative, and 1 Automatic operating program.

ASEPTIZER CW1000 combines pre-filtering and H14 final filtration, UVC, UVION atmospheric plasma, fresh air or exhaust management, pressure tracking, and 24,000 BTU/h air conditioning in an integrated system with a total flow rate of 2,000 m³/h. It operates electronically in both Negative and Positive Pressure modes with a single touch.

Operating Principle:

The device operates in two different pressure regimes with its architecture hosted in the automation infrastructure. In Negative Pressure Mode, it draws room air, renders it safe, and discharges the treated component outside, preventing infected air from escaping into the corridor. In Positive Pressure Mode, it filters fresh air and supplies it into the room, making it impossible for dirty outside air to infiltrate.

PROTECTION (Positive Pressure / Cleanroom)

The Aseptizer CW1350 Platform combines a total airflow rate of 2,500 m³/h with H14 final filtration, UVC, UVION atmospheric plasma, positive pressure management, and 24,000 BTU/h air conditioning in a single system.

Operating Principle:

Provides a safe environment in sensitive and large areas. The air pressure inside the room is maintained higher (positive) than the pressure in the outside environment, corridor, and adjacent rooms. Thus, when the door is opened, dirty air in the corridor cannot enter; instead, sterile air in the room flows outward. The device draws fresh outside air and room air, passes it through pre-filters, H14 HEPA filters, UVC, and atmospheric plasma, and supplies high-purity air into the room. It is manufactured as an alternative and support to central systems in all positive pressure environments. Due to its compact structure, it requires no construction.

ASEPTIZER® ÜRÜN AİLESİ



ISOLATION

ASEPTIZER CW650 IO

Compact solution for negative pressure rooms. Integrated system focused on isolation requirements.

Air Flow Rate	1.200 m ³ /h
Effective Volume (Class 10,000)	80 m ³
Effective Volume (Class 100,000)	110 m ³
Theoretical ACH	12 - 25
Pressure Mode (Pa)	Negative
Dimensions (cm)	78 × 56 × 225
Weight	147 kg
Final Filter	H14
Air Conditioning Capacity	10.000 BTU/h
Fresh Air or Exhaust	600 m ³ /h
Noise Level	55 dB 1 m

APPLICATION AREAS?

Isolates the source of infection and prevents spread. (Emergency service isolation rooms, intensive care isolation rooms, tuberculosis isolation rooms, respiratory tract infection rooms, bronchoscopy and aerosol procedures, areas with suspected infection).



FLEX

ASEPTIZER CW1000

High performance for positive or negative pressure. Same infrastructure. Two different engineering applications.

Air Flow Rate	2.000 m ³ /h
Effective Volume (Class 10,000)	110 m ³
Effective Volume (Class 100,000)	150 m ³
Theoretical ACH	10 - 20
Pressure Mode (Pa)	Positive / Negative
Dimensions (cm)	108,5 × 56 × 225
Weight	190 kg
Final Filter	H14
Air Conditioning Capacity	24.000 BTU/h
Fresh Air or Exhaust	600 m ³ /h
Noise Level	55 dB 1 m

APPLICATION AREAS?

Used for hybrid purposes in places where both Positive and Negative use are required in the same area. (Intensive care and reanimation areas, operating rooms, isolation rooms, container & field hospitals, cleanrooms, chemical & clinical areas).



PROTECTION

ASEPTIZER CW1350 / CW1350 W / CW650

Positive pressure air management for large volumes. Integrated air management for positive controlled areas.

Air Flow Rate	2.500 m ³ /h
Effective Volume (Class 10,000)	130 m ³
Effective Volume (Class 100,000)	170 m ³
Theoretical ACH	8 - 20
Pressure Mode (Pa)	Positive
Dimensions (cm)	139 × 56 × 225
Weight	217 kg
Final Filter	H14
Air Conditioning Capacity	24.000 BTU/h
Fresh Air or Exhaust	700 m ³ /h
Noise Level	55 dB 1 m

APPLICATION AREAS?

Provides a safe environment in sensitive and large areas. (Operating rooms, intensive care rooms, immunosuppressed patient rooms, neonatal units, cleanrooms and laboratories, container & field hospitals, pharmaceutical and medical production areas).

ASEPTIZER CW1350 HAS NATO STOCK NUMBER: 4140KK0540139

Approximate Area Recommended by the Manufacturer for Effective Use
(Assuming ~3 m Ceiling Height):

Aseptizer CW 1350	2500 m ³ /h	42-48 m ²
Aseptizer CW 1000	2000 m ³ /h	32-36 m ²
Aseptizer CW 650	1200 m ³ /h	20-25 m ²

WHERE IS ASEPTIZER® USED?



Hospitals



Isolation Rooms



Intensive Care
Units



Operating Rooms



Laboratories



Cleanrooms

Uvion Air Aseptizer is used wherever high hygiene and air conditioning are required, such as:

- Operating rooms
- Isolation rooms
- Intensive care areas (Neonatal, Pediatric, Adult)
- Patient rooms
- Burn Treatment Units, Emergency Units, Dialysis Units, Blood Bank Units, Organ and Bone Marrow Transplant Services
- Contamination (Tuberculosis, etc.) Laboratories
- Microtechnology and Nanotechnology laboratories
- Production facilities such as electronics and microelectronics (Food, Pharmaceutical, Medical Device)
- Cleanrooms, Veterinary Clinics, etc.

AREAS WHERE ASEPTIZER CAN BE APPLIED

Aseptizer can be used especially in environments without a central HVAC system, in environments where the HVAC system is insufficient, in areas with low ceiling height where air ducting cannot be routed, in areas where an independent environment from the general central system is desired, and in all types of areas where existing ventilation must be supported, the indoor air must be continuously reprocessed, or local air hygiene must be strengthened. It is also successfully used in the hygienic air modernization of old buildings without altering the building architecture.

Although Aseptizer Clinical Air Management System is used in medicine, it does not fall within the scope of the “Medical Device Regulation.”



Operating Room



Operating Room



Resuscitation Room



Intensive Care Unit



Neonatal Unit



Isolation Room



Laboratory



Cleanroom

TEKNOMAR®

Since 1993 GROUP

For Your Intensive Care, Isolation Rooms, Operating Rooms, MSU, CSSD, Cleanrooms, and Production Areas:

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- ✓ Air Disinfection
- ✓ Particulate & Bio-Decontamination
- ✓ Air Conditioning Solutions
- ✓ Positive & Negative Pressure Areas

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Daha Fazlasını Keşfedin.

Due to technological developments and changes, our company reserves the right to make changes to the specifications and design of the devices it manufactures.

