

VORTEX 4000

HEPA FILTRATION AIR CLEANING DEVICE



PRODUCT DESCRIPTION

AIRBOX Vortex 4000 is a versatile, multi-use, dual compliant, industrial-grade air cleaning system which uses a 4-Stage Filtration System, including Advanced Molecular Adsorbent filtration for heavier concentrations of unwanted gases, to provide Equivalent Clean Airflow (V_{ACS}) for indoor install types. The Vortex 4000 can be integrated into an existing ventilation system or as an independent air cleaning system. The Vortex 4000 utilizes a multi-stage filtration configuration designed to target and reduce high levels of airborne particulates/aerosols and molecular contaminants such as VOCs (volatile organic compounds) in commercial and industrial environments. The AIRBOX Vortex 4000 is equipped with the AIRBOX Advanced Operating System (AOS) platform, which allows AIRBOX units to run on differing schedules and keeps track of actual filter life and other maintenance needs, such as the direct drive ECM Fans used for maximized efficiency. In addition, the Vortex 4000 qualifies the space for ASHRAE Standard 62.1-2022 IAQP (Indoor Air Quality Procedure) by cleaning the air with recirculation, which could allow for a reduction in the amount of outdoor air required and HVAC energy if all specified Design Compounds (DCs) are maintained below their design limits specified in ASHRAE Standard 62.1-2022, as well as ASHRAE Standard 241 – Control of Infectious Aerosols Infection Risk Management Mode (IRMM).

COMPLIANCE AND PERFORMANCE SPECIFICATIONS

ASHRAE 241-2023	Compliant*
UL Listed	Listing in Progress
IEST-RP-CC007	Certified 99.99% @ 0.3 microns HEPA Filter
US DOE-STD-3020-2015	
UL900	
Bioaerosol Testing	Available upon Request
Efficacy Testing	Available upon Request

*Compliance Testing and Certification in progress



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TECHNICAL SPECIFICATIONS

Unit Size	26"H x 24"W x 63.5"L
Weight	260 lbs
Maximum Nominal Air Flow Rate	4,000 CFM (IAQP: 2,000 CFM)
Controls	Standard manual control and AirBox Advanced Operating System (IOT) allowing for remote adjustment.
Enclosure Material and Finish	Aircraft Grade Aluminum Alloy Outside Skin with Structural Steel Frame
	Powder Coat Finish
Additional Features	Differential Pressure and TVOC sensors for concentration and filter life monitoring.
Warranty	Transferable Limited Lifetime Warranty. Lifetime Warranty on material and workmanship. 5 Year warranty on fan and motor package inclusive of electrical.

ELECTRICAL SPECIFICATIONS

Operating Voltage	3~ 230 VAC
ECM Fan	3~ 230VAC, 50/60HZ, Ball Bearing, IP54 Rated UL Listed: File Number E319742
Connectors	Deutsch DT, IP68 Rated

FILTRATION SPECIFICATIONS

First Stage	Antimicrobial Filter
	MERV 9 4" Radial Pleated Polyester Filters treated with Microban Aegis Microbe Shield®
Second Stage	Molecular Adsorbent Media Filter
	Filter with Proprietary Blend of Adsorbent Media
Third Stage	Antimicrobial Filter
	MERV 9 4" Radial Pleated Polyester Treated with Microban Aegis Microbe Shield®
Fourth Stage	HEPA Filter
	Certified 99.99% Effective 12" Pleated Glass Media Treated with Microban Aegis Microbe Shield®

AIRBOX is regulated by the US Environmental Protection Agency and state governments as a pesticidal device. Accordingly, our air cleaners are packaged and labeled in accordance with EPA regulations under FIFRA section 2(q)(1) and 40 CFR Part 156.
EPA Registered Establishment No.: 97081-NC-1

