

Independent Testing

Clean Room Particle & Odour Control



NPBI Purification: 89.7% Particle Reduction & Odours Eliminated

Clean Room Application - Pathogen, Particle & Odour Control System

A Cleanroom is a controlled environment that needs to regulate and minimise pollutants such as dust, microbes, particles and VOCs, typically used in the manufacturing or scientific research industries.

Challenge

A new chemical introduced into the manufacturing process was creating odour issues for the employees working in clean rooms and adjoining spaces that shared the same air handling system.

The noxious odour needed to be contained or eliminated to improve the indoor air quality and working conditions for the employees.

Solution

The client investigated a number of possible solutions and discovered BiPolar Ionisation technologies as part of their research.

After reviewing a variety of existing installations and case studies, the client specified the in-duct NPBI™ system, for its high level of air and surface protection, as well as its low capital cost.

Results

Within 24 hours all the problem odours in the spaces were eliminated. Additionally, the annual clean room certification process revealed that the total particle count had been reduced by 89.7%. This new low particle count was the lowest the manufacturer had experienced in 10 years.

- 89.7% particle reduction
- Provides pathogen neutralisation
- No replacement purification parts required
- Odours eliminated in 24 hours
- Ozone free
- Airborne & surface protection



**PURE
AIR⁺**

What is the PureAir⁺ NPBI Series

The Airius PureAir⁺ Series is an air and surface purification and airflow circulation fan system, designed to deliver the highest level of pathogen, particle and odour elimination in any type of indoor commercial or community environment.

Featuring the latest in Needlepoint BiPolar Ionisation (NPBI™) technology from one of the world's leading manufacturers of indoor air quality systems - Global Plasma Solutions, the PureAir⁺ Series uses the power of ions to provide continuous round-the-clock sterilisation, neutralising up to 99%+ of all known pathogens, VOCs and odours, in both the air and on surfaces.

The PureAir⁺ also provides all the features and benefits of the world's most popular destratification and airflow circulation fan, balancing temperatures, improving comfort, reducing heating and cooling costs and cutting carbon emissions.

How does it work?

The PureAir⁺ Series integrated GPS NPBI™ system emits a high concentration of positive (+) and negative (-) ions, which are circulated into spaces via the fan.

The polarity of the ions attracts them to all particles within the space, causing the particles to cluster together and make them filterable. They also bond with and neutralise pathogens, VOCs and odours by removing them of a hydrogen atom, breaking them down into their basic, harmless and odourless compounds, such as O₂, CO₂, N₂ and H₂O.



Independent Testing

Clean Room Particle & Odour Control



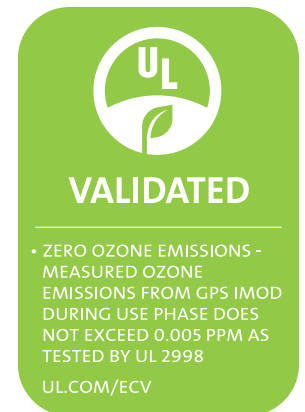
Tested and Approved by Leading Agencies



Multiple studies have been conducted on the NPBI™ technology integrated into the Airius PureAir+ Series range, supporting the efficacy and effectiveness of NPBI™ systems for pathogen neutralisation, particle reduction and odour elimination.

- Installed through out all industries, including Healthcare, Aviation, Manufacturing, Offices, Education, Arenas, Retail outlets and many more.
- Approved by the RTCA to meet the DO-160 standard for Airborne Equipment
- One of the first purification systems to be tested on a live strain of SARS-CoV-2
- Testing carried out by:

Innovative Bioanalysis
Harvard School of Public Health
Retroscreen Virology
Kitasato Institute Medical Centre
EMSL Analytical Inc
Green Clean Air
Calgary Int. Airport, NAV Canada
Aachen University of Applied Sciences
Medical School of Luebeck
Shanghai Municipal Center for Disease Control
School of Advanced Sciences, Hiroshima University



Contact Airius

Airius fans are commonly used to purify air and balance temperatures for both heating and cooling applications in a wide variety of environments – from offices to aircraft hangars.

Adding an Airius PureAir+ Series air purification, infection and odour control ventilation fan is a simple way to continually clean your air and surfaces, creating a safer and healthier environment for you, your staff and your building.

Contact Airius to learn more >>