HEPA Filtration Solutions from Rayshen

Introduction to HEPA

<u>HEPA</u> (High-Efficiency Particulate Air) filters are highly efficient air filtration units capable of trapping 99.97% of particles as small as 0.3 microns. They are widely used in cleanrooms, laboratories, healthcare facilities, and manufacturing environments that require high-level airborne contamination control.

Rayshen offers state-of-the-art **hepa** housing modules designed for integration with HVAC systems to supply clean, filtered air into sterile spaces. These systems ensure compliance with ISO, GMP, and other cleanroom standards across various industries.

Each **hepa** module by Rayshen is manufactured with premium-grade materials and precision-engineered for high performance, long-term reliability, and seamless installation.

Features of Rayshen HEPA Housing Modules

Rayshen's **hepa** housing modules are designed to hold and seal **hepa** filters within cleanroom HVAC systems. The housing plays a crucial role in directing airflow through the filter while preventing bypass and leakage.

Key Features:

- Compatible with **hepa** and ULPA filters
- Robust construction with aluminum, GI powder coated, or SS 304 finish
- Top or side entry for flexible duct connection
- Leak-proof gaskets for airtight sealing
- Pre-filters and diffusers available as optional attachments
- Knife-edge or gel seal design to ensure no leakage
- Designed to accommodate terminal filters securely
- Integrated damper control for airflow regulation

These housing modules are vital for controlled environments where unfiltered air must not compromise sterility or product safety.

Technical Specifications of HEPA Housing

Rayshen's **hepa** housing units are available in standard and customized sizes, based on cleanroom design requirements and airflow volume.

Technical Specifications:

Parameter Specification

Filter Compatibility HEPA / ULPA

Construction Material SS 304 / GI Powder Coated / Aluminum

Seal Type Knife-edge / Gel Seal

Installation Ceiling-mounted / Duct-mounted

Inlet Type Top or Side Entry

Optional Accessories Damper, Diffuser, Pre-filter Filter Efficiency Supported $\geq 99.97\%$ @ 0.3 microns Frame Design Gasket type / Knife-edge Custom Sizes Available on request

Each **hepa** housing unit undergoes strict quality checks, including DOP (Dispersed Oil Particulate) testing, to ensure leak-free operation and optimal performance in critical applications.

Applications and Benefits of HEPA Housing

Rayshen's **hepa** housing modules are engineered for a wide range of clean air applications. They are designed to integrate seamlessly with centralized ventilation systems or be used as terminal filter modules in cleanrooms.

Applications:

- Pharmaceutical manufacturing
- Operating theaters and ICUs
- Biotechnology labs
- Food and beverage processing areas
- Electronic component assembly
- Research and testing laboratories
- Microelectronics and semiconductor manufacturing

Benefits of Using Rayshen HEPA Housing:

- Secure and leak-proof filter mounting
- Efficient airflow distribution
- Customizable design for different environments
- Easy maintenance and filter replacement



• Supports compliance with cleanroom standards like ISO 14644, WHO-GMP, and US FDA

These benefits make Rayshen's **hepa** solutions essential for critical contamination control in various industries.

Ordering Process and Contact Details

Rayshen offers end-to-end support for selecting, customizing, and installing **hepa** housing systems.

Whether you are designing a new cleanroom or upgrading an existing HVAC setup, Rayshen provides expert solutions tailored to your needs.

Steps to Order HEPA Housing Modules:

- 1. Define airflow volume, installation layout, and cleanroom classification
- 2. Choose suitable filter grade and seal type
- 3. Select inlet orientation and material of construction
- 4. Confirm optional accessories like dampers or diffusers
- 5. Receive custom design drawing and quotation
- 6. Installation guidance and performance validation offered on request

Why Choose Rayshen:

- Experienced cleanroom solutions provider
- High-quality, durable materials
- Custom-engineered for different applications
- Tested for leakage and airflow efficiency
- Competitive pricing and timely delivery

Contact Information:

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For reliable, certified, and durable **hepa** housing modules, trust Rayshen to deliver solutions that protect your critical environments with performance and precision.