FumeJet[®] Exhaust Systems Model FJ-M

- Pre-engineered
- Simplified installation





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Greenheck's FumeJet line of exhaust fans with integral stacks is designed to safely remove and disperse fumes and odors. FumeJet systems replace utility set fans with field-supplied intake ducts and exhaust stacks to ensure a safe roof deck area and aid in preventing re-entrainment of contaminated air into air intake systems.

Value Added Advantages of Greenheck's FumeJet System	FumeJet	Field Built-up
Compact design	\checkmark	
Single source responsibility – Eliminating component misapplication, performance and fit-up issues due to field-fabricated or sourced components	~	
Designed to match application	\checkmark	\checkmark
Known performance corrections for all system components	\checkmark	
Wind loading capacity designed and factory tested to withstand a force of 7.8 PSF (equivalent to 55 mph or 88 Km/h) without the need for guy wires	√	
All FumeJet systems have a minimum of 7 ft. (2.1 m) exhaust discharge height. Optional 10 ft. (3 m) height available	~	



Certifications



Greenheck India Pvt Ltd. certifies that the FJ-M models shown herein is licensed to bear the AMCA Seal. The ratings shown are based on tests and procedures performed in accordance with AMCA publication 211 and comply with the requirements of the AMCA Certified Ratings Program. The AMCA Certified Ratings Seal applies to air performance and FEI ratings only. **Performance** certified is for installation type B: Free inlet, Ducted outlet. Power rating (BHP/kW) does not include transmission losses. Performance ratings do not include the effects of appurtenances (accessories).





UL Listed Power ventilator UL File no. E529585 UL Power Ventilator for Smoke Control Systems (400°C for 2 hours) UL File no. E529585

Certified data may be found in Greenheck's Computer Aided Product Selection program CAPS®

Eliminate Inefficient, Complicated and Unsafe Field Built-up Installations









Field-built systems can lead to complicated installations, unsafe exhaust locations, and even excess energy usage due to the creation of system effects. FumeJet pre-engineered exhaust systems include the necessary mounting accessories to simplify installation because equipment supports, isolators and curbs are designed specifically for the system. Additionally, all FumeJet performance data includes losses associated with inlet boxes, dampers, and stacks to prevent unexpected performance issues, drive changes, or motor change-outs during test and balance.

Building Segments & Application Types



We are known worldwide as a leading manufacturer that provides high-quality air movement, control, conditioning and distribution products. Today, our HVAC (heating, ventilation, air-conditioning) products are efficiently moving air in a variety of commercial and industrial spaces.



Offices and hotels



Automotive facilities



Shopping centers



Food processing



Laboratory



Hospital isolation units



Chemical processing plants

Typical Applications

- General or fume exhaust
- Kitchen smoke and grease exhaust
- Stairwell pressurization
- Filtered exhaust
- Industrial process exhaust

Commercial Facilities

Smoke

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- Hospital / clinic
 - Sterilization
- Pharmacy

Industrial Facilities

- Food packaging
- Welding
- Paint systems
- Wastewater / odor
- Indoor horticulture

Standard Construction Accessories



Standard Construction and Configuration

- Volume up to 28,883 cmh •
- Static pressure up to 1,443 Pa •
- Galvanized steel •
- Greenheck's Permalock[™] lock seam scroll
- Steel or aluminum backward-inclined (BI) wheels •

Accessories



- Inlet connection - Slip-fit flange
- Punched flange



Extended warranty (1 to 5 years)



Punched Flange

Housing

Constructed of galvanized steel with Zinc GSM275, the highest protection in the industry, providing improved corrosion protection, extending product life and increasing long-term savings.



Fan Shaft

Turned and polished steel that is sized so the first critical speed is at least 25% over the maximum operating speed for each pressure class.

Premium Bearings

Single-width centrifugal products are manufactured with "air handling quality" self-aligning bearings with insert or housed pillow block type. The adapter sleeve collar lock ensures smooth operation and provides superior grip force between the bearing collar and fan shaft. All bearings are selected for a basic rating fatigue life of L₁₀ in excess of 40,000 hours at the maximum RPM for the selected pressure class.

Insert bearings on sizes up to 710 and pillow block bearings for sizes 800 to 1250. Standard bearing life is L₁₀ life in excess of 40,000 hours.

L₁₀ life implies a 90% reliability or a 10% failure rate after the stated hours. L₁₀ life of 40,000 hours is equal to the average life of 200,000 hours.

Permalock[™] Housing

Permalock housings use a mechanically fastened seam instead of welding. This airtight and watertight housing construction uses the same structural support as the all-welded housings. Permalock construction is an excellent engineering option for applications up to 8.5 in. wg (2.1 kPa).



Wheels

Greenheck's single width, single inlet, backwardinclined wheels provide high efficiency with low sound levels. Wheels are balanced statically and dynamically to AMCA G2.5 standard/AMCA Standard 204-05 for smooth vibration-free operation.

	Backward-Inclined (BI)		
Wheel Type	Aluminum Steel		
Application	General purpose, clean air, restaurant and grease, or severe environments		
Temperature	Aluminum: Up to 148°C (300°F) Steel: Up to 250°C (482°F)		

Spark-Resistant Construction

The fan wheel is constructed of a non-ferrous Spark material (usually aluminum). A non-ferrous В (aluminum) rub ring surrounds the fan shaft where it passes through the fan housing. Spark

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The inlet cone is constructed of non-ferrous material (usually aluminum). A non-ferrous (aluminum) rub ring surrounds the fan shaft where it passes through the fan housing.



Configurations



Arrangement 10 – Belt Drive

- Recommended as first choice configuration for belt drive applications
- Most compact belt drive arrangement
- Bearings are mounted out of the airstream
- Motor is mounted beneath the drive frame
- Available with a weatherhood to cover motor, drives and bearings

CCW UB

• Moderate dirt and heat tolerance





Discharge Positions and Rotatable Housings

Rotation and discharge is always determined from the drive side of the fan.





Class of Construction

Fan class refers to a construction level designed to handle a given fan outlet velocity and pressure. As the fan performance requirements increase, the fan construction (material gauge, shaft diameter, motor size) must also increase to handle the new workload. FJ-M models target Class 0 & I performance ranges for backward-inclined fans, as defined by AMCA pressure class.



Class	Class	Class	Class	Class
0	I.	II	III	IV

Application Information



Fumes are exhausted above the working area for a safe roof deck and over any make-up air or air intakes to prevent re-entrainment back into the building. Designed per ANSI Z9.2 standard for local exhaust systems, model FJ-M provides a compact footprint, complementary accessories for quick and trouble-free installation, and configurable mounting options to suit different building layouts.



Pre-Engineered Discharge, Intake, and Easy Installation



Greenheck's FumeJet systems are designed for quick installation and pre-engineered to eliminate component misapplication and fit-up issues. Build an application-specific FumeJet by selecting from multiple stack, discharge and intake options.



Design and Selection Support

Enjoy Greenheck's extraordinary service, before, during and after the sale.

Greenheck offers added value to our wide selection of top performing, energyefficient products by providing unique Greenheck service programs.



Greenheck's free Computer Aided Product Selection program CAPS is rated by many as the best in the industry. CAPS helps you conveniently and efficiently select the right products for the challenge at hand.

Greenheck continues to take an industry-wide leadership position to affect positive global sustainability. We believe that providing education on products we offer contributes to reducing energy consumption and improving healthier indoor environments.

Find out more about these special Greenheck services at greenheck.com or greenheck.co.in



Building Value in Air

Greenheck delivers value to mechanical engineers by helping them solve virtually any air quality challenges their clients face with a comprehensive selection of top quality, innovative airrelated equipment. We offer extra value to contractors by providing easy-to-install, competitively priced, reliable products that arrive on time. And building owners and occupants value the energy efficiency, low maintenance and quiet dependable operation they experience long after the construction project ends.



















Our Commitment

As a result of our commitment to continuous improvement, Greenheck reserves the right to change specifications without notice.



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