



# Multistage Centrifugal Exhauster 751 Series

Hoffman and Lamson present state-of-the-art technology in Multistage Centrifugal Exhauster. This model offers a wide range of design features and incorporates energy efficiency improvements, complying with the strictest operational requirements of a variety of applications. Multistage blowers are ideally suited for operations where a variable flow at constant vacuum is required. Hoffman and Lamson are worldwide leaders in Multistage Centrifugal Blower technology with thousands of units installed around the globe.

## Technical Data

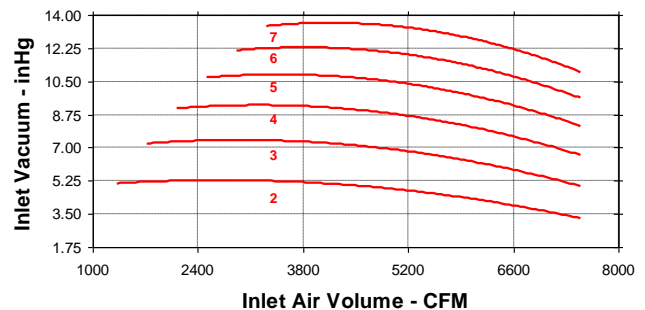
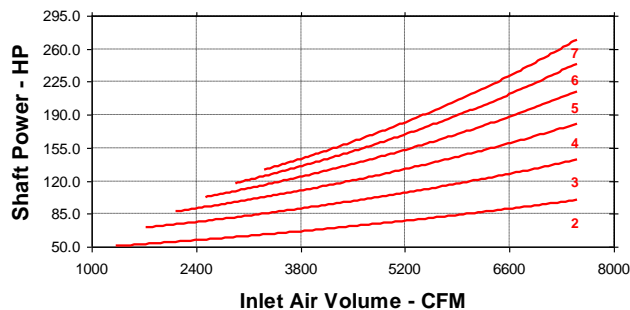
- Number of Stages: 2-7 (60 Hz Cast or 50 Hz Fab Impellers)  
2-6 (60 Hz Cast Impellers) 2-8 (50Hz Fabricated Impellers)
- Inlet Connection: 12" Flange, ANSI 125# Drilling
- Outlet Connection: 12" Flange, ANSI 125# Drilling
- Operating Speed: 3550 RPM (60 Hz), 2960 RPM (50 Hz)
- Casing: Pressure 25 PSIG (1.73 bar)
- Air Seals: Labyrinth Type - Carbon Ring Optional
- Bearings: Anti-friction, designed for extended L10 life
- Lubrication: AEON® CF Oil
- Impeller: 25.0 inches (635 millimeters) Diameter (statically balanced)
- Impeller Tip: Speed 387 feet/second (118 meters/second)
- Drive: Type Direct Coupled (Inlet drive is standard)
- Drive Shaft: 2.375 inches (60.33 millimeters) Diameter
- Vibration: .235 in/sec. (5.97 mm/sec.) Peak Velocity
- Rotor: Balanced Per ISO 1940, ANSI S2.19

## Material Standard

- Casing: ASTM A48 Class 30 Cast Iron - HT200 equivalent
- Bearing Housings: ASTM A48 Class 30 Gray Cast Iron
- Bearing Cap: ASTM A48 Class 30 Gray Cast Iron
- Tie Rods: ASTM F1554 GR.36 Zinc Plated Thrd. Rod
- Labyrinth Seal: ASTM B86 Z35631 Alloy Zinc Aluminum 12
- Carbon Ring Seal: Optional ASTM C695 Fine Grain Molded Graphite
- Joint Sealing: RTV Silicone Compound
- Baffle Rings: ASTM A240 Grade 304 Stainless Steel
- Shaft: ASTM A108 Grade 1045 HRS - Stainless Steel Optional
- Impeller: ASTM SC64C Sr-319 Cast Aluminum or ASTM 6061- T6 Fabricated Aluminum
- Blower Base: ASTM A36 Hot Rolled Structural Steel
- Motor Pedestal: ASTM A36 Hot Rolled Structural Steel
- Isolation Base Pads: Suitable Resilient Material
- Finish: Universal Primer - Acrylic Topcoat

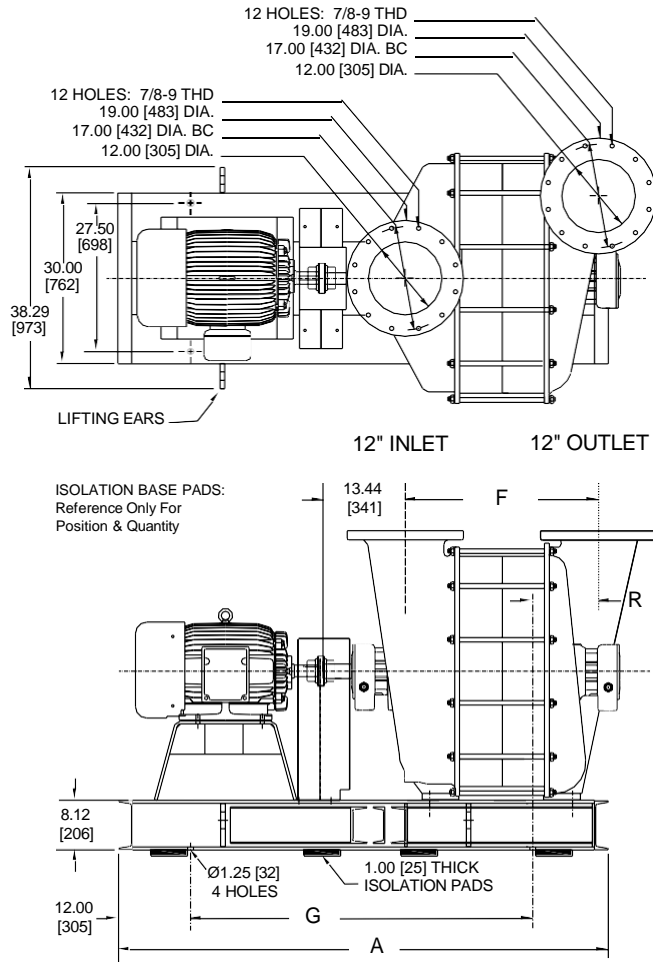
## VACUUM PERFORMANCE

29.9 inHg [1 Bar], 68°F [20°C],  
36% RH, Speed: 3550 RPM

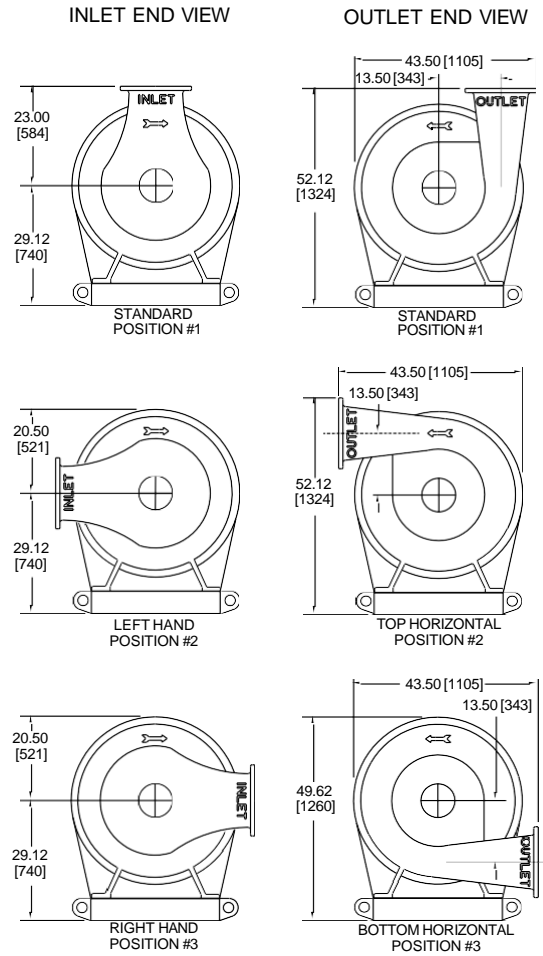


STANDARD CONDITIONS: 14.7 PSIA [1 Bar], 68°F [20°C], 36% RH, Speed: 3550 RPM

## General Arrangement



## Flange Orientation



## Dimensional Data - inches [millimeters]

FRAME	A	F	G	R
75102	84.00 [2134]	24.75 [629]	60.00 [1524]	10.25 [260]
75103	84.00 [2134]	31.25 [794]	60.00 [1524]	10.25 [260]
75104	108.00 [2743]	37.75 [959]	84.00 [2134]	10.25 [260]
75105	108.00 [2743]	44.25 [1124]	84.00 [2134]	10.25 [260]
75106	114.00 [2896]	50.75 [1289]	90.00 [2286]	10.25 [260]
75107	126.00 [3200]	57.25 [1454]	102.00 [2591]	10.25 [260]

## Weight – lb [kg] & Inertia – lb-ft<sup>2</sup> [kg-m<sup>2</sup>]

FRAME	PKG. LESS MOTOR	BARE UNIT	WK2
75102	4050 [1837]	2550 [1157]	31 [1.31]
75103	4450 [2018]	2950 [1338]	46 [1.95]
75104	5050 [2291]	3350 [1520]	62 [2.60]
75105	5450 [2472]	3750 [1701]	77 [3.25]
75106	5850 [2654]	4150 [1882]	92 [3.90]
75107	6300 [2858]	4600 [2087]	44 [1.83]

## Product Notes

- Information is approximate, subject to change without notice, and not for construction use unless certified
- Position #1 is standard inlet & outlet orientation
- A and G dimensions may vary depending on motor frame size
- Performances noted are typical and not job specific
- Consult authorized sales representative for job specific blower or exhauster performance sizing
- Factory ASME PTC-10 test offered for performance verification
- For components that exceed 4,000 lb., machined pads are used. Height of the components on the base frame increase by 0.88 inches due to the use of machined pads

