

DEDPV-705 UL Listed Ventilator

Dryer Exhaust Duct Power Ventilator, listed to UL705

Item #: 499195

Variant: 120V 1~ 60Hz



DEDPV 705 is a dryer exhaust duct power ventilator. It helps your dryer run more efficiently by assisting it in overcoming pressure losses caused by long or restricting exhaust duct designs and effects of high altitudes; higher exhaust rate means faster dry time. The product complies with the UL standard related to dryer exhaust (UL 705) and is suitable for gas and electric clothes dryers.

- Dryer exhaust duct power ventilator
- Certified by UL (Underwriters Laboratories) to the DEDPV requirements of UL705
- UL-Listed for use with Gas and Electric clothes dryers
- Duct runs up to 125 linear feet
- Suitable for high altitude applications

The DEDPV-705 may be added to the dryer exhaust duct system when the equivalent duct length is between 25 feet and 125 feet. Each 90 degree elbow is equivalent to 5 feet of duct and each 45 degree elbow is equivalent to 2.5 feet.

The DEDPV-705 is a cord connected product that features a pressure switch to automatically sense when the dryer is on. A wall-mounted indicator panel with a 50 ft cable is provided to indicate proper operation of the exhaust fan. In the event of a problem, the LED light will inform the homeowner of the nature of the problem. Four mounting clamps and two cleanouts that come with the product ease installation of the fan on the ductwork. An integrated thermal fuse is built into the DEDPV-705 as a safety device and will de-energize the fan in the event of abnormal exhaust temperatures.

Performance certified by **HVI**; safety certified by **UL** to the DEDPV supplement of **UL705**; suitable for use with gas and electric clothes dryers.

Some helpful tips to take into account while installing the dryer exhaust fan DEDPV 705:

- Avoid using rigid PVC pipes or flexible ducts. Use only steel or aluminum ducts rated for dryer use. These ducts have smooth walls, so lint is less likely to build up.
- If you are running your dryer duct through an unconditioned space, make sure you wrap it in insulation. If the duct stays warm, it will be less likely to form condensation and collect lint.
- To avoid clogging lint over the exhaust fan impeller, install a secondary lint trap DBLT 4W. It filters the air, catches the lint and protects the fan and ductwork. The less lint accumulation, the better your dryer performs.

Technical parameters



Nominal data		
Voltage (nominal)	120	V
Voltage type	AC	
Frequency	60	Hz
Phase(s)	1~	
Input power	70	W
Input current	0.75	A
Impeller speed	2,600	r.p.m.
Air flow	max 161	cfm
Temperature of transported air	max 167	°F

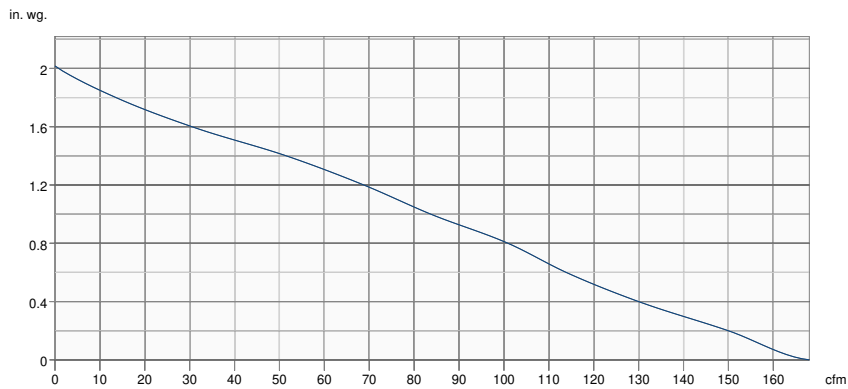
Protection/Classification		
Enclosure class, motor	IP44	
Insulation class	B	
Certificate	HVI, UL to the DEDPV supplement to UL 705, UL to CSA C22.2 No. 113	

Dimensions and weights		
Duct dimension; Circular, inlet	4	in.
Duct dimension; Circular, outlet	4	in.
Weight	13.3	lb

Optional		
Duct connection type	Circular	
Altitude	0 to ; 10,000;	ft

Performance

Performance curve



Hydraulic data		
Required air flow		-
Required static pressure		-
Working air flow		-
Working static pressure		-
Air density		0.075 lb/ft³
Power		-
Fan control - RPM		-
Current		-
Airflow efficiency		-
Control voltage		-
Supply voltage		-

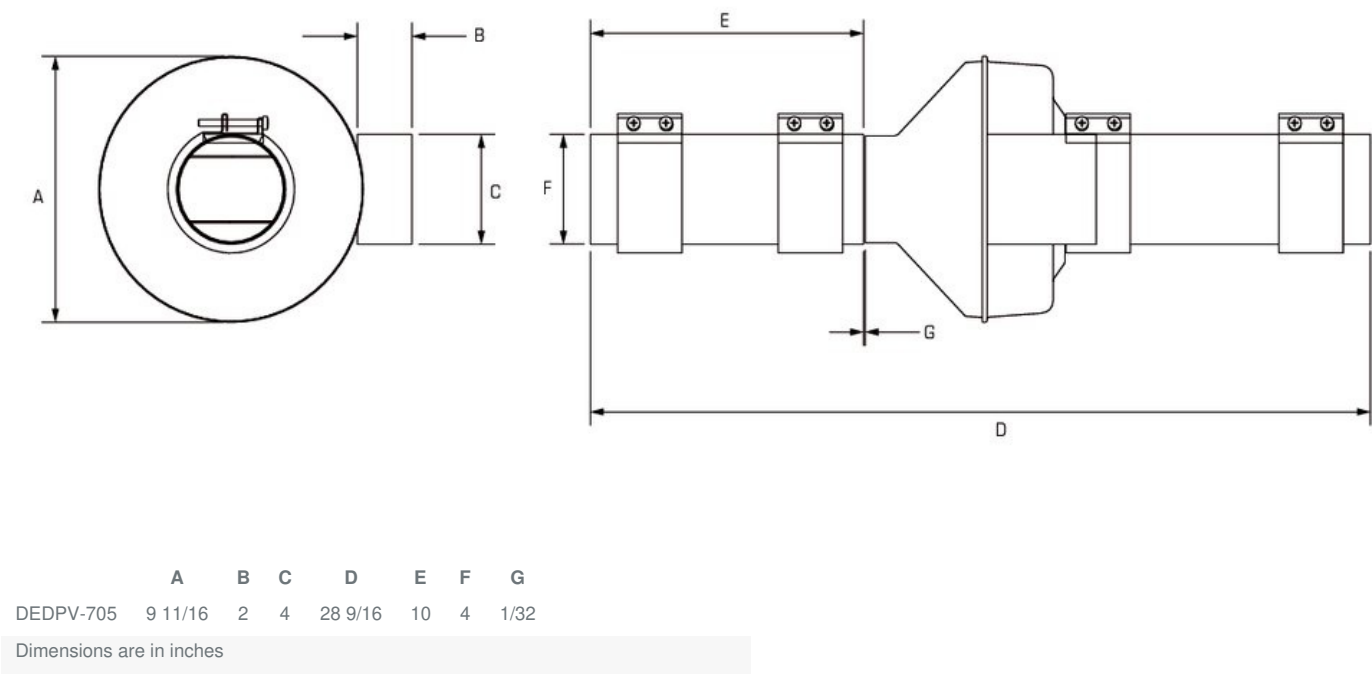
Performances

Elevation	Max. Eq. Duct Length (ft.)
Sea Level	125
2,000	114
4,000	106
6,000	98
8,000	92
10,000	85
12,000	80

HVI Certified Rating(s)

Static Pressure (In. Wg.)	Rated Airflow (CFM)	Rated Power (Watts)
0.20"	150	68

Dimensions



Accessories

- DBLT4W Secd Lint Trap (46000)
- HS 4W External Louver Exhaust (45151)

Documents

- 411958 DEDPV White paper Fantech EN.pdf
- 450608 DEDPV-705 Submittal Sheet EN.pdf
- Case Study Chicago Resident Dryer Fire
- E1939 Ventilation Solutions Laundries
- 483443 DEDPV OIPM EN.pdf
- 499195.DXF
- 499195.RFA
- UL Certification of Compliance - E165879

Specification

GUIDE SPECIFICATION

Specifier Notes: This guide specification is written in Construction Specifications Institute (CSI) 3-Part Format in accordance with The CSI Construction Specifications Practice Guide, MasterFormat, SectionFormat, and PageFormat.

Specifier Notes: This Section must be carefully reviewed and edited by the Architect or Engineer to meet the requirements of the Project and local building code. Coordinate this Section with Division 01, other specification sections, and the Drawings. Delete all Specifier Notes after editing this Section.

Section numbers and titles are based on MasterFormat 2014 Update.

SECTION 23 34 00

HVAC FANS

Specifier Notes: This Section covers Fantech "DEDPV-705" dryer exhaust duct power ventilator. Consult Fantech for assistance in editing this Section as required for the Project.

Specifier Notes: Use of DEDPV-705 dryer exhaust duct power ventilator complies with the UL standard related to dryer exhaust (the DEDPV supplement of UL705) and is suitable for gas and electric clothes dryers. Consult Fantech for more information.

PART 1. GENERAL

1.1 SECTION INCLUDES

- A. Dryer Exhaust Duct Power Ventilators
 - 1. DEDPV-705

1.2 RELATED REQUIREMENTS

Specifier Notes: Edit the following list of related sections as required for the Project. Limit the list to sections with specific information that the reader might expect to find in this Section, but is specified elsewhere.

- A. Section 23 31 00 – HVAC Ducts and Casings.
- B. Section 26 05 00 – Common Work Results for Electrical.

1.3 PREINSTALLATION MEETINGS

Specifier Notes: Edit the Preinstallation Meetings article as required for the Project. Delete article if not required.

- A. Convene preinstallation meeting [1 week] [2 weeks] before start of Work of this Section.
- B. Require attendance of parties directly affecting Work of this Section, including Contractor, Architect, installer, and manufacturer's representative.
- C. Review the Following:
 - 1. Materials
 - 2. Installation
 - 3. Adjusting
 - 4. Protection
 - 5. Coordination with other Work

1.4 SUBMITTALS

Specifier Notes: Edit the Submittals article as required for the Project. Delete submittals not required.

- A. Comply with Division 01.
- B. Product Data: Submit manufacturer's product data, including installation instructions.
- C. Shop Drawings: Submit manufacturer's shop drawings, including plans, elevations, sections, and details.
 - 1. Wiring Diagrams: Indicate wiring for each item of equipment and interconnections between items of equipment.
 - 2. Include manufacturer's names, model numbers, ratings, power requirements, equipment layout, device arrangement, complete wiring point-to-point diagrams, and conduit layouts.
- D. Manufacturer's Certification: Submit manufacturer's certification that materials comply with specified requirements and are suitable for intended application.
- E. Operation and Maintenance Data:
 - 1. Submit manufacturer's operation and maintenance manual; including the following:

- a. Operation, maintenance, adjustment, and cleaning instructions.
 - b. Troubleshooting guide
 - c. Parts list
 - d. Electrical wiring diagrams if required.
2. Provide detailed information required for Owner to properly operate and maintain equipment.
- F. Warranty Documentation: Submit manufacturer's standard warranty.

1.5 QUALITY ASSURANCE

- A. Manufacturer's Qualifications: Manufacturer regularly engaged in the manufacturing of dryer exhaust duct power ventilators to that specified for a minimum of 5 years.
- B. Installer's Qualifications:
 1. Installer regularly engaged in installation of circular inline duct fans of similar type to that specified for a minimum of 5 years.
 2. Use persons trained for installation of circular inline duct fans.

1.6 DELIVERY, STORAGE, AND HANDLING

- A. Delivery Requirements: Deliver materials to site in manufacturer's original, unopened containers and packaging, with labels clearly identifying product name and manufacturer.
- B. Storage and Handling Requirements:
 1. Store and handle materials in accordance with manufacturer's instructions.
 2. Keep materials in manufacturer's original, unopened containers and packaging until installation.
 3. Store materials in clean, dry area indoors.
 4. Keep materials from freezing.
 5. Protect materials during storage, handling, and installation to prevent damage.

1.7 WARRANTY

Warranty Period: 5 years

PART 2. PRODUCTS

2.1 MANUFACTURERS

- A. Manufacturer: Fantech Inc., 10048 Industrial Blvd., Lenexa, Kansas 66215. Phone 800-747-6217. www.fantech.net. ussupport@fantech.net.
Specifier Notes: Specify if substitutions will be permitted.
- B. Substitutions: [Not permitted] [Comply with Division 01].
- C. Single Source: Provide materials from single manufacturer.

2.2 HVAC FANS

- A. Dryer Exhaust Duct Power Ventilator (DEDPV-705)
 1. Listed to the DEDPV supplement of UL705

Specifier Notes: Specify circular inline duct fan models as required for the Project. Delete models not required.

- B. Model: "DEDPV-705".
 1. Inlet Diameter: 4 inches.
 2. Outlet Diameter: 4 inches.
 3. Casing Diameter: 9-11/16 inches.
 4. Inlet and Outlet Connection Collars: 1 inch.
 5. Casing Material: Galvanized Metal with air-tight, folded seam construction. A housing seam joined with screws or rivets is unacceptable.
 6. Motors: External-rotor AC motor.
 7. Integral pressure switch for altitude range of 0-10,000 ft above sea level
 8. Motor Protection: Thermal overload protection with automatic reset.
 9. Air Temperature Limit Safety Cutoff: Integral thermal fuse
 10. Voltage: 120 V.
 11. Frequency: 50/60 Hz.
 12. Nominal Voltage Range: 100 to 130 V.
 13. Phase: 1.
 14. Maximum Airflow: 161 cfm.
 15. RPM: 2,601
 16. Power Rating, Motors: 69 W.
 17. Current: 0.58 A.
 18. Operational Temperature: max 167 degrees F.
 19. Weight: 13.3 lbs.
 20. Motor Insulation Class: B.
 21. Motor Enclosure Class: IP44.

2.3 ACCESSORIES

- A. Secondary lint trap
 1. Model: "DBLT4W"
 2. Inlet Diameter: 4 inches
 3. Outlet Diameter: 4 inches
 4. Weight: 2.3 lbs.
- B. External Louver Exhaust:
 1. Model: "HS4W".

2. Plastic louvered shutter with duct connection
3. Inlet Diameter: 4 inches
4. Exterior Dimension: 6 inches x 6 Inches
5. Length: 11 inches.

PART 3. EXECUTION

3.1 EXAMINATION

- A. Examine areas to receive a dryer exhaust duct power ventilator.
- B. Notify Architect of conditions that would adversely affect installation or subsequent use.
- C. Do not begin installation until unacceptable conditions are corrected.

3.2 INSTALLATION

- A. Install dryer exhaust duct power ventilators in accordance with manufacturer's instructions at locations indicated on the Drawings.
- B. Attach duct work to inlet and outlet connection collars of dryer exhaust duct power ventilators in accordance with manufacturer's instructions.
- C. Electrical: Install electrical power to dryer exhaust duct power ventilators fans as specified in Section 26 05 00.

3.3 ADJUSTING

- A. Adjust dryer exhaust duct power ventilators for proper operation in accordance with manufacturer's instructions.

3.4 PROTECTION

- A. Protect installed dryer exhaust duct power ventilators from damage during construction.

END OF SECTION