Durablow MFB M1D

Durablow MFB M1D Crawl Space Vent Fan

INSTRUCTION MANUAL

1. Introduction

This manual provides essential information for the safe and effective installation, operation, and maintenance of your Durablow MFB M1D Crawl Space Vent Fan. This fan is designed to improve air quality and manage humidity in crawl spaces, basements, attics, and garages.
Key benefits include:

- Reduces moisture in crawl spaces and foundations.
- Increases air circulation to prevent condensation and wood rot.
- Exhausts radon gas, treated wood gases, and odors.
- Enhances indoor and outdoor air quality by controlling humidity.

2. Safety Information

Read all instructions carefully before installation and operation. Failure to follow these instructions may result in electric shock, fire, or property damage.

- Always disconnect power before servicing or cleaning the unit.
- Ensure the power source matches the fan's voltage requirements (120 Volts AC).
- Do not operate the fan with a damaged cord or plug.
- Keep fingers and other objects away from moving fan blades.
- This appliance is not intended for use by persons (including children) with reduced physical, sensory, or mental capabilities, or lack of experience and knowledge, unless they have been given supervision or instruction concerning use of the appliance by a person responsible for their safety.
- UL-certified fan ensures continuous operation safety.

3. Package Contents

Verify that all components are present:

- Durablow MFB M1D Crawl Space Vent Fan (Stainless Steel, Air-Out, Single Fan with Dehumidistat)
- 7-feet grounded power cord

4. Product Overview

4.1 Key Features

- **Airflow:** 110 Cubic Feet Per Minute (CFM)
- **Ventilation Type:** Air-Out (exhausts air from the space)
- **Material:** 100% Stainless Steel 304 Grade panel & housing box for high corrosion resistance.
- **Built-in Dehumidistat:** Automatically operates within 20%-80% Relative Humidity (RH) range.
- **Freeze Protection Thermostat:** Stops operation when outdoor temperature drops below 35°F (3°C).
- **Noise Level:** 45-57 Decibels
- **Control Method:** Knob (manual setting for humidity)

4.2 Components

The Durablow MFB M1D fan consists of a stainless steel panel, a single axial fan, and a control box with a dehumidistat knob.



Figure 1: Durablow MFB M1D Crawl Space Vent Fan. This image shows the overall view of the stainless steel fan unit with its single fan and control box.

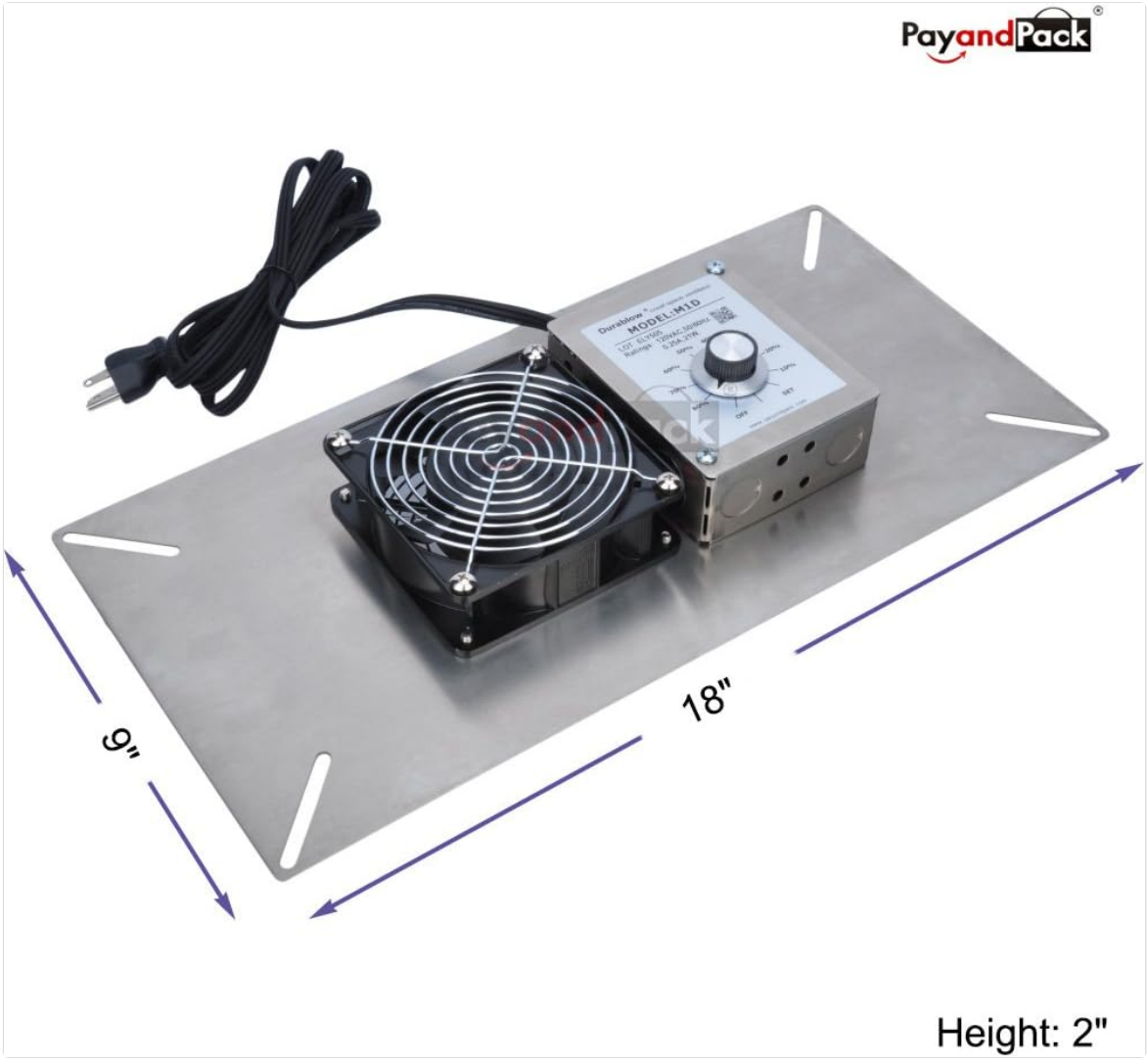


Figure 2: Durablow MFB M1D Fan Dimensions. The image illustrates the fan's dimensions: 18 inches (width), 9 inches (depth), and 2 inches (height).



Figure 3: Durablow MFB M1D Control Panel. A close-up view of the control box showing the dehumidistat knob with humidity percentage settings (OFF, 10% to 80% SET).



Figure 4: Durablow MFB M1D Side View with Power Cord. This image shows the side profile of the fan unit, highlighting the attached 7-foot grounded power cord.

5. Setup and Installation

The Durablow MFB M1D is designed for straightforward installation. Ensure you measure your crawl space vent opening size before purchasing to ensure proper fit.

1. **Location:** Install the fan in a crawl space, foundation vent, or other suitable area where air needs to be exhausted. This model is an 'Air-Out' type, meaning it pulls air from the interior space and expels it outside.
2. **Mounting:** Secure the fan unit to the vent opening. The stainless steel panel is designed to fit standard vent sizes. Use appropriate fasteners (not included) for your specific mounting surface.
3. **Power Connection:** Plug the 7-foot grounded power cord into a standard 120V AC electrical outlet.

5.1 Sizing Chart for Ventilation

Refer to the following chart to determine the appropriate number of fans for your crawl space size. This chart suggests 6 Air Changes per Hour (ACH) for crawl spaces.

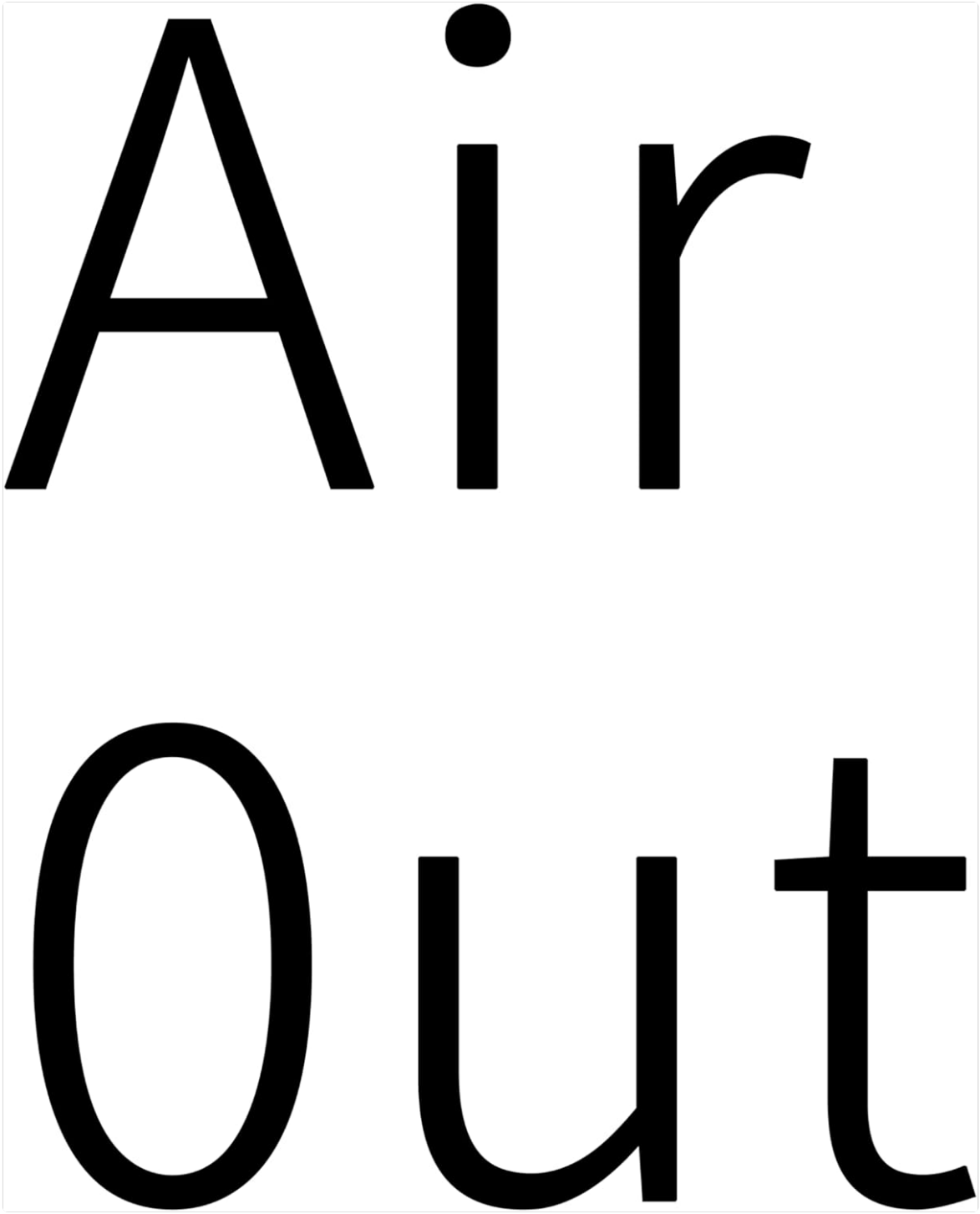


Figure 5: Durablow Crawl Space Ventilator Fan Sizing Chart. This table provides guidance on the number of M1 or M1D (110 CFM) or M2D (220 CFM) fans needed based on room size in cubic feet to achieve 6 Air Changes per Hour (ACH).

For more information on Air Changes per Hour, you can visitWikipedia's Air Changes per Hour page.

5.2 Ventilation Principle



Figure 6: Crawl Space Ventilation Diagram. This diagram illustrates how air flows through a crawl space, with fresh air entering and stale, moist air being exhausted.

Figure 7: Air Out Indicator. This image visually confirms the fan's 'Air Out' functionality, indicating it exhausts air from the space.

6. Operating Instructions

The Durablow MFB M1D fan features a built-in dehumidistat and freeze protection thermostat for automatic operation.

1. **Setting Humidity Level:** Use the knob on the control panel (refer to Figure 3) to set the desired humidity percentage. The fan will automatically turn ON when the humidity level in the crawl space rises above the set percentage and turn OFF when it falls below. The operating range is 20% to 80% RH.
2. **Freeze Protection:** The integrated thermostat will automatically stop the fan's operation if the outdoor temperature drops below 35°F (3°C) to prevent cold air from entering the crawl space during freezing conditions.
3. **Continuous Operation:** To turn the fan OFF, rotate the knob to the 'OFF' position.

6.1 Noise Level Information

The fan operates with a noise level between 45-57 Decibels. For reference, a normal conversation is typically around 60 dB.

Your browser does not support the video tag.

Video 1: Durablow Crawl Space Ventilation Fan Noise Test. This video demonstrates the operational noise level of a Durablow crawl space fan, measured by a digital sound level meter, showing readings around 59-60 dB.

7. Maintenance

Regular maintenance ensures optimal performance and longevity of your Durablow fan.

- **Cleaning:** Periodically inspect the fan blades and grille for dust and debris accumulation. Disconnect power before cleaning. Use a soft cloth or brush to gently remove any buildup. Do not use harsh chemicals or abrasive cleaners.
- **Inspection:** Annually check the power cord for any signs of damage or wear. Ensure all mounting screws are secure.

8. Troubleshooting

If you encounter issues with your Durablow MFB M1D fan, refer to the following common

troubleshooting steps:

- **Fan Not Operating:**
  - Check if the power cord is securely plugged into a working outlet.
  - Verify that the dehumidistat knob is set to a humidity level that is currently exceeded in the crawl space.
  - Confirm that the outdoor temperature is above 35°F (3°C) if the freeze protection thermostat is active.
  - Check your circuit breaker or fuse box.
- **Reduced Airflow:**
  - Inspect the fan blades and grille for any obstructions or excessive dust buildup. Clean as necessary (refer to Maintenance section).
- **Unusual Noise:**
  - Ensure the fan is securely mounted and not vibrating against the vent opening or surrounding structure.
  - Check for any loose debris or foreign objects that may be interfering with the fan blades.

If problems persist after attempting these steps, contact customer support.

9. Specifications

Specification	Value
Brand	Durablow
Model Name	MFB M1D
Electric Fan Design	Exhaust Fan
Power Source	AC
Style	Air-Out
Product Dimensions (L x W x H)	9"D x 18"W x 2"H
Special Feature	Dehumidistat
Noise Level	45-57 Decibels
Wattage	21 watts
Finish Type	Metallic (Stainless Steel 304)
Number of Blades	7
Air Flow Capacity	110 Cubic Feet Per Minute (CFM)
Voltage	120 Volts
Item Weight	4.9 Pounds
Included Components	Cord

Indoor/Outdoor Usage	Indoor
Specification Met	UL
Control Method	Touch (Knob)
Efficiency	5.24 CFM/W
Number of Power Levels	3
UPC	789542260287, 601393749523

10. Warranty and Support

For warranty information, please refer to the product packaging or the official Durablow website. Durablow is a producer and retailer of high-quality aftermarket fireplace blowers, fans, motors, air movement, and remote control systems.
For technical support or further assistance, please visit the official Durablow website: www.payandpack.com