MOD-U-BLAST®

POWERED BY ALLREDI™

HORIZONTAL FILTER DUST COLLECTORS

M2000-4C, M3000-6C, M6000-12C, M9000-18C & M12000-24C

OPERATOR'S MANUAL



SUPERIOR PERFORMANCE

AND QUALITY IN BLAST CLEANING EQUIPMENT

WARNING

READ MANUAL

Failure to read, understand & follow all safety and operation procedures in this manual can cause injury or death. Manuals that are lost, incomplete, or damaged, must be replaced immediately.

Manual #RPDC2507

PH: +1 (800) 661-3842

WWW.ALLREDI.COM

Allredi™ and Mod-U-Blast® are registered trademarks of Allredi, LLC.

TABLE OF CONTENTS

Important Notice 3
Warnings 4
Horizontal Filter Dust Collector Models 5
Operational Diagram . . . . . 6 & 7
Important Safety Items 8
Dust Collector Start-up and Operation 9
Magnehelic Gauge Operation 9
Dust Disposal 10
Dust Collector Maintenance 10
Filter Removal and Installation . . . . . 11 & 12
Replacement Filters & Parts List 13
Dust Collector Troubleshooting 14
Warranty Coverage 15

MOD-U-BLAST®

Copyright® 2025 Mod-U-Blast®, All Rights Reserved



IMPORTANT NOTICE

TO DISTRIBUTORS, PURCHASERS AND END USERS OF MOD-U-BLAST PRODUCTS
The information provided described and illustrated in this material is intended for experienced, knowledgeable users of abrasive blasting equipment and supplies (products).

The products described in this material may be combined as determined solely by the user in a variety of ways and purposes. However no representations are made as to intended use, performance standards, engineering suitability, safe practices or compliance with government regulations and laws that apply to these products, products of others, or a combination of various products chosen by the user or others. It is the responsibility of the users of these products, products of third parties, and a combination of various products, to exercise caution and familiarize themselves with all applicable laws, government regulations and safety requirements.

Nor are representations made or intended as to the useful life, maintenance cycles, efficiency or performance of the referenced products of any combination of products. This material must not be used for estimating purposes. Production rates, labour performance or surface finishes are the sole responsibility of the user based on the user's expertise, experience and knowledge of industry variables.

It is the responsibility of the user to insure that proper and comprehensive training of operators has been performed and all environmental and safety precautions observed.

Allredi provides a variety of excellent products to the surface preparation industry, and we are confident that all proficient users, operators and contractors in this industry will continue to use our products in a safe and knowledgeable manner.

Before using this product, read all instructions, literature, labels, specifications and warnings sent with and affixed to the unit.

If operation of the unit is unclear after reading this manual, contact your supervisor for instructions. It is the responsibility of the employer to read the following instructions to users of this equipment. Periodic inspection at the work site should be made by supervisory personnel to ensure the blast machine is being properly used and maintained. A copy of this owner's manual must be kept with the blast machine and readily accessible to the blast machine operators at all times.

Copyright® 2025 Mod-U-Blast®, All Rights Reserved

WARNINGS

Over time, exposure to any dust could result in lung medical issues or death. Use a reverse pulse dust collector with HEPA filters if lead or other toxic materials are removed from items during the blasting process.

Do not disconnect air hoses while the system is under pressure, this could cause serious injury or death.

Use proper respirator and eye protection when servicing the dust collector.

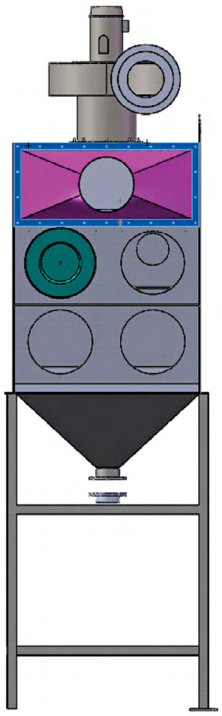
When servicing the dust collector disconnect and lock out the electrical supply and disconnect the air line from the compressor.

WARNING

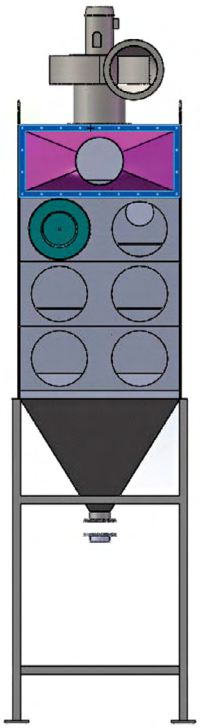
Mod-U-Blast Dust Collection Systems are not designed for filtration/extraction of combustible or explosive materials. If you are unsure of your dust particulate, please contact a Mod-U-Blast representative for more information.

Copyright® 2025 Mod-U-Blast®, All Rights Reserved

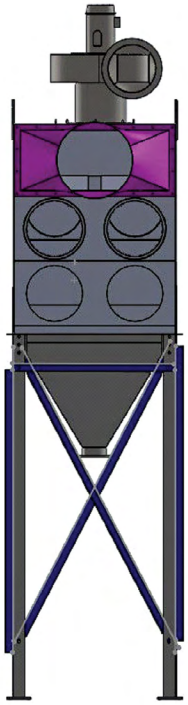
HORIZONTAL FILTER DUST COLLECTOR MODELS



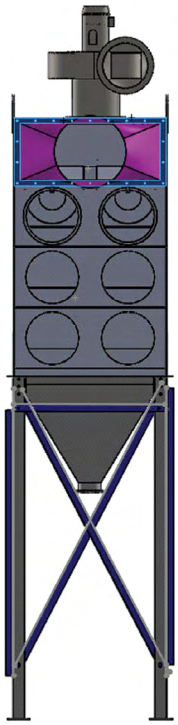
M2000-4C



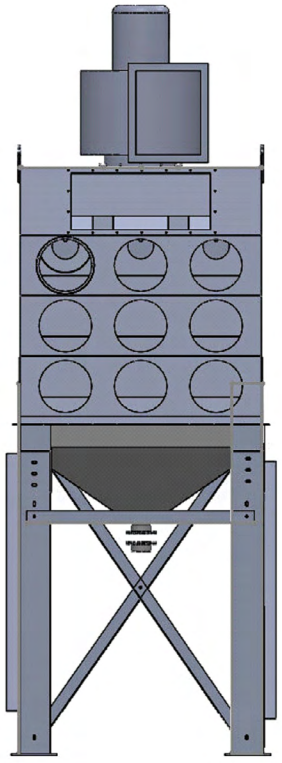
M3000-6C



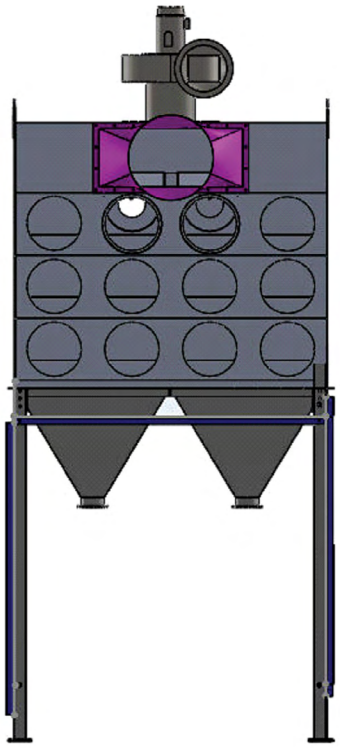
M4000-8C



M6000-12C



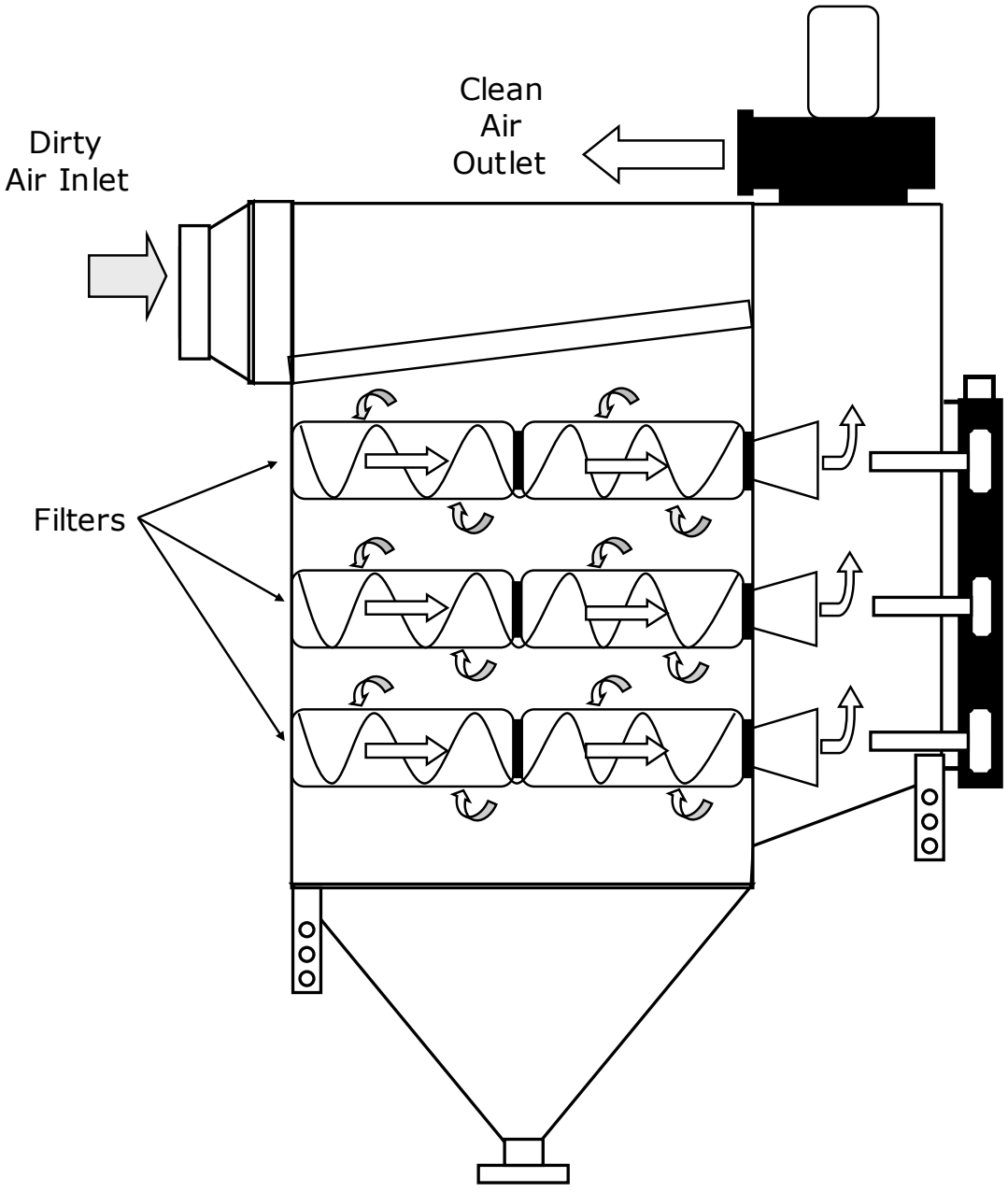
M9000-18C



M12000-24C

Copyright® 2025 Mod-U-Blast®, All Rights Reserved

OPERATIONAL DIAGRAM

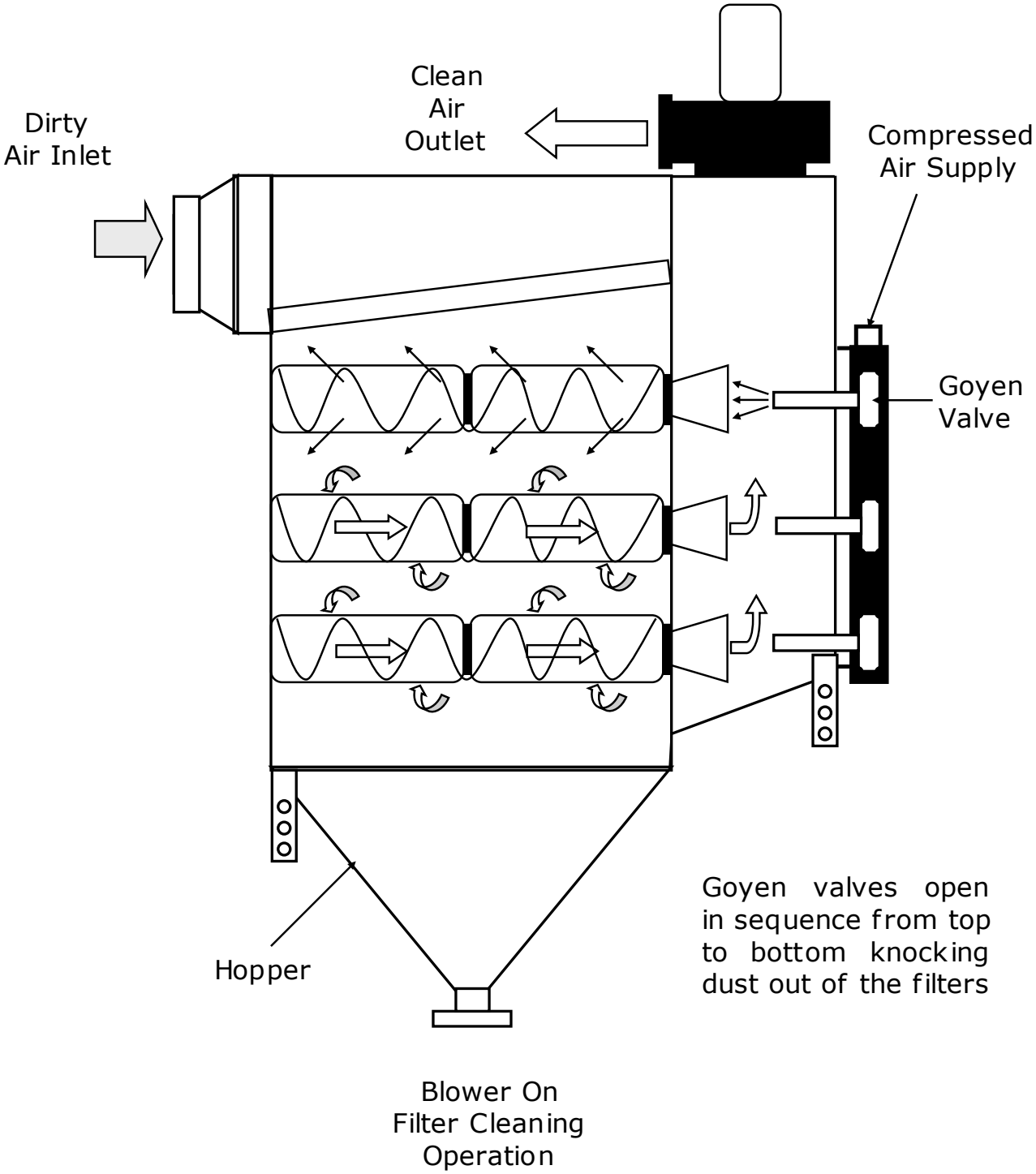


Blower On
Normal Operation

Throughout normal operation, the dust laden air enters the dust collector through the dirty air inlet plenum. The dirty air flows downward towards the hopper and the filters remove the fine dust allowing clean filtered air to pass through the filters and out past the blower fan.

Copyright® 2025 Mod-U-Blast®, All Rights Reserved

OPERATIONAL DIAGRAM



Filter cleaning occurs when a signal from the dust collector control panel is sent to open the goyen valves allowing a rush of air to go through the filter bank knocking the dust out of the filters and down into the hopper.

Copyright® 2025 Mod-U-Blast®, All Rights Reserved

IMPORTANT SAFETY ITEMS

Read all instructions before using this equipment. For efficient and safe production reference the OSHA requirements.

Dust Collector Manual >

This manual contains important instructions for the safe operation of this dust collector and some of its related equipment. Before attempting to operate this dust collector all personnel intending on using this equipment must read this of the complete manual and familiarize themselves with the operation and parts.

Safety Considerations >

- Dust collectors require high pressure air to pulse the filters
- Dust collected by a reverse pulse collector and must not be allowed to become concentrated in areas where workers are exposed. This requires proper maintenance of the dust collection & HEPA components. (If used)
- When selecting a location for the dust collector take into consideration wind, seismic zone and all load conditions.
- Electrical installation, service and maintenance must be performed by a qualified electrician.

Operator's Responsibilities Before Starting >

- Inspect fittings, valves and hoses for damage and wear. Repair any air leaks before operating.
- Clean the dust collector filters as needed and empty the dust collector hopper daily

IMPORTANT NOTE: When using this dust collector the filters need to be seasoned before pulsing. Do not turn on the auto pulse until 4-5 hours of blasting and/or one cycle of reclaiming media has occurred.

Cautions >

- The compressed air supply to the pressure system needs to be oil & moisture free.
- Working air pressure of the dust collector pulse system must not exceed 80 P.S.I.

Maintenance >

- Disconnect the power and air supply from the dust collector before servicing.
- Keep all components in good repair. Use Mod-U-Blast parts only and do not substitute or modify.

Copyright® 2025 Mod-U-Blast®, All Rights Reserved

DUST COLLECTOR START-UP AND OPERATION

Initial Start-Up Check >

1. Check for proper fan rotation as noted on the fan or the housing. CW from top.
2. All access doors should be sealed and secure.
3. Check that the dust hopper is properly sealed.
4. Remove any loose items in or near the inlet or outlet of the dust collector.
5. Set the air pressure on the regulator to 80 psi. (Do not turn on the auto pulse box - see below)
6. Turn dust collector blower motor ON.

Operation Checklist >

NOTE: DO NOT TURN THE FILTER AUTO PULSE ON UNTIL AFTER 4-5 HOURS OF RUNNING THE DUST COLLECTOR TO RECLAIM MEDIA AND/OR REMOVE DUST FROM THE BLASTROOM WHILE BLASTING . THIS IS TO SEASON THE FILTERS & TO PREVENT ANY PERFORATIONS IN THE FILTER MATERIAL.

1. Monitor the physical condition of the dust collector and repair or replace any damaged components.
2. Check the compressed air components for leaks.
3. Monitor pressure drop across filters. Changes in pressure drop may indicate a change in operating conditions. (See Magnehelic Gauge below)
4. Check the exhaust
5. Check the dust disposal.

Magnehelic Gauge Operation: Model 2015 >

The Magnehelic gauge measures differential pressure between the clean air and dirty air plenums of the dust collector and provides timely information of filter change requirements.

When the Magnehelic reading is between 5-6 on the gauge the filters need pulsing.
To check the condition of the filters using the Magnehelic reading, pulse the filters with the blower fan off for 4 hours and then start the dust collector blower fan. If the reading continually stays between 5-6 on the Magnehelic gauge it is time to change the filters. (See filter removal and installation)

NOTE: AFTER THE FILTERS ARE SEASONED THE AUTO PULSE CAN BE TURNED ON AND STAY ON. THE FILTERS CLEAN BETTER WHEN PULSED WHILE THE BLOWER FAN IS OFF.

Copyright® 2025 Mod-U-Blast®, All Rights Reserved

Dust Disposal >

1. Empty the dust container (s) as required to minimize the amount of dust in the hopper.
2. Whatever type of dust container is used under the hopper to collect the dust, care should be given to make sure it does not over fill - empty the container when it is about 2/3 full or less.
3. Reinstall the dust container.

NOTE: If the 6" butterfly valve is left open during operation of the dust collector it must be sealed to the waste container.

DUST COLLECTOR MAINTENANCE



When servicing the dust collector disconnect and lock out the electrical supply and disconnect the air supply from the compressor.

Maintenance Schedule For Blastroom Pneumatic System >

Daily Maintenance

- Report and / or fix any operational problems
- Correct and safety issues
- Pulse dust filters (after seasoning)
- Empty dust collector hopper

Six Month Maintenance

- Check dust collector filters - if the Magnehelic gauge on the DC reads 5- 6 inches even after pulsing then the filters need replacing (see filter removal and installation)
- Check for leaks in dust hoses

Copyright® 2025 Mod-U-Blast®, All Rights Reserved

FILTER REMOVAL AND INSTALLATION

Be sure to use proper safety and protective equipment when removing the dust contaminants and dirty filters.

Turn off electrical power source and lock out before performing service or maintenance.

Turn off compressed air supply and bleed the dust collector storage tank before performing service or maintenance.

Start by removing the top row of filters first and replace. This will limit the amount of dust during replacement.

Do not operate the dust collector with missing or damaged filters.



Remove the knob by turning counter clockwise



While removing the knob hold the filter lid in place until fully unscrewed and remove the lid.

Copyright® 2025 Mod-U-Blast®, All Rights Reserved

FILTER REMOVAL AND INSTALLATION CONT'D

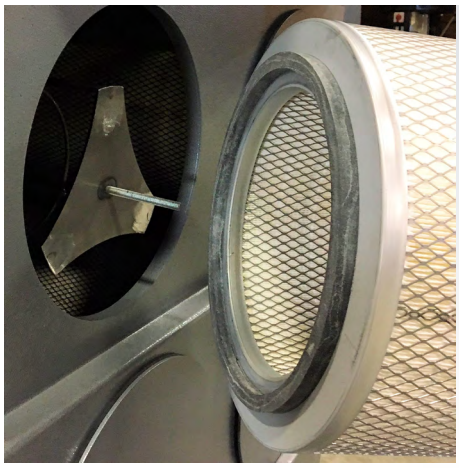


Removing the lid exposes the filters



Grab the filter as shown and pull out to remove. Most of the dust collectors will have 2 filters except the M2000 and the M3000 which are singles.

NOTE: Dirty filters may be heavier than they appear. Safe measures should be taken when removing



When replacing the filters note that the end with the foam rubber seal ALWAYS goes in first whether it's a single or double filter configuration.

FILTER INSTALLATION >

Reverse the above procedures when installing new filters

Copyright® 2025 Mod-U-Blast®, All Rights Reserved

Horizontal Filter Requirements

DUST COLLECTOR	NO. OF FILTERS REQUIRED	STOCK NUMBER	FILTER TYPE
M2000-4C	4	11543-00	Cartridge
M3000-6C	6	19136	Cartridge
M6000-12C	12	11543-00	Cartridge
M9000-18C	18	11543-00	Cartridge
M12000-24C	24	11543-00	Cartridge

HEPA Filters (if required)

STOCK NUMBER	DESCRIPTION
11516HF	Filter, Hepa, Large
11516PF	Pre-Filter, Hepa, 24" x 24" x 1"

Dust Collector Parts

STOCK NUMBER	DESCRIPTION
50350	Regulator
16424	Magnehelic Gauge
SP-RCAC25DD	Goyen Valve
16440	Electric Coil for Goyen Valve
SP-RCAC25	Goyen Valve Repair Kit

Replacement Auto Pulse Control Box Complete

DC MODEL	STOCK NUMBER
M2000	16997
M3000	16995
M6000	16998
M9000	16996
M12000	16994

FOR SUPPLIES AND PARTS CALL - 1-800-661-3842

Copyright® 2025 Mod-U-Blast®, All Rights Reserved

DUST COLLECTOR TROUBLESHOOTING

PROBLEM	POSSIBLE CAUSE	REMEDY
Fan blower and motor don't start	Not wired correctly	Check and correct the motor wiring.
	Electrical supply circuit down	Check power supply circuit. Check for fuse or circuit breaker fault
Fan blower and motor start - do not stay running	Incorrect motor controller installed	Check for proper motor controller and replace if required
	Electrical circuit overload	Check that the power supply circuit has sufficient power to run the dust collector
Clean air outlet discharging dust	Filters not installed properly	See filter installation
	Filter damage, gasket damage or holes in filters	Replace filters if necessary - See filter installation
	Access cover (s) loose	Tighten door (s)
Insufficient Airflow	Blower fan rotation backwards	Proper fan rotation is clockwise when looking down at the motor top - Electrician will have to change wiring in the motor controller or the control panel
	Access doors open or not closed tight	Check all access doors for tightness. Check the hopper discharge opening is closed unless sealed to a waste container.
	Exhaust area restricted	Check all exhaust areas for obstructions. Adjust where available. Adjust any damper flow controls if available
	Filters need replacing	Remove and replace filters. See filter removal and installation
	Lack of compressed air for filter pulsing	Check the dust collector regulator is set to 80 psi and for any air leaks and repair
	Pulse valves not working	Check to see if the auto pulse box is plugged into a 110 volt receptacle and that the switch is turned to the ON position.

Copyright® 2025 Mod-U-Blast®, All Rights Reserved

WARRANTY COVERAGE POLICY

Mod-U-Blast warrants all equipment listed in this manual that is manufactured by Mod-U-Blast to be free of defects in material and workmanship from the date of sale to the end-user. Not withstanding any special, extended or limited warranty published by Mod-U-Blast will, for a period of TWELVE (12) months from the date of sale, repair or replace any part of the equipment determined by Mod-U-Blast to be defective.

This warranty applies only when the equipment is installed, operated and maintained in accordance with Mod-U-Blast's written recommendations.

This warranty does not cover, and Mod-U-Blast will not be liable for general wear and tear, or any malfunction, damage or wear caused by faulty installation, misapplication, abrasion, corrosion, inadequate or improper maintenance, negligence, accident, tampering, or substitution of non-Mod-U-Blast component parts.

This warranty is conditional upon the prepaid return of the equipment or part claimed to be defective to an authorized Mod-U-Blast distributor for verification of the claimed defect. (Proof of purchase may be required) If found to be defective then the Mod-U-Blast distributor will repair or replace free of charge any defective part. The equipment will be returned to the original purchaser, transportation prepaid. If the inspection of the equipment does not disclose any defect in material workmanship, repairs will be made at a reasonable charge, which charges may include the costs of parts, labor, and transportation.

THIS WARRANTY IS EXCLUSIVE, AND IS IN LIEU OF ANY OTHER WARRANTIES, EXPRESSED OR IMPLIED, INCLUDING BUT NOT LIMITED TO WARRANTY OF MERCHANTABILITY OR WARRANTY OF FITNESS FOR A PARTICULAR PURPOSE.

Mod-U-Blast's obligation and buyer's remedy for any breach of warranty shall be as set forth above. The buyer agrees that no other remedy (including, but not limited to, incidental or consequential damages for lost profits, lost sales, injury to person or property, or any other incidental or consequential loss) shall be available. Any action for breach or warranty must be brought forward within one (1) year of the date of sale.

Items sold, but not manufactured by Mod-U-Blast are subject to the warranty, if any, of their manufacturer. Mod-U-Blast will provide the purchaser with reasonable assistance in making any claim for the breach of these warranties.

The following items are <u>not covered</u> under the Mod-U-Blast Warranty policy:

- Any component or body of this equipment determined by Mod-U-Blast to be normal wear and tear.
- The misuse, neglect, or lack of maintenance of the equipment or parts. Parts considered consumables.

Claims will be honored only if the warranty card is returned within a period of two months from the factory shipping date.

The card can be returned to your Mod-U-Blast salesperson or mailed to the address below.

ALLREDI BLAST & ABRASIVES
6602-45 Street, Leduc, AB Canada, T9E 7C9
PH: (780) 468-2588 • FAX: (780) 465-7317

In the event of failure of this equipment Please contact an Allredi/Mod-U-Blast service centre

ALLREDI™ MOD-U-BLAST®

Copyright® 2025 Mod-U-Blast®, All Rights Reserved