



USER GUIDE 2025





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Specifications subject to change without notice.

INTRODUCTION

During construction, maintenance or when inspections are performed in an area that may contain dust, dirt or biological contaminants, there is always the possibility for those contaminants to be released into the room and picked up by the air currents and spread to additional areas.

When major remodeling or repairs are performed it has been standard practice to install a long term, but temporary containment area with spring poles and plastic film using HEPA air scrubbers to filter out the contaminants and exhaust clean air out of the contained area and provide a **NEGATIVE PRESSURE** in the work area to prevent particulates from escaping from any tiny holes or seams in the structure.

Installing this type of containment creates dust hazard during the installation and removal so the area immediately around it must be evacuated of sensitive individuals during that time.

If the work to be done is a simple re-lamping or running a new IT cable, the time to evacuate, build and remove a temporary containment room is much greater than the time to do the actual work. A more efficient way to provide HEPA containment with Negative Pressure for normal work, without evacuation, was needed, therefore the Portable Containment Cart was developed. It is rolled into place, plugged in to start the HEPA Air Scrubber, which will immediately start filtering out dust and exhausting clean air while the top is raised up to seal off the area of the ceiling where the work is to be done in a very short period. The area is protected while the work is performed, the ceiling tiles or light diffusers replaced. The Top of the cart is lowered just enough to clear the ceiling while it is transported to the next work area. If the next work area is in another room or on a different floor, the top can be fully retracted to move the cart through doors or into an elevator to reach that area.

The Bio Cart HEPA-UVC 15 has added features that make this process even more efficient and safe. The top is raised and lowered with one finger on the Power Lift switch or keyfob remote. The HEPA chamber for the Bio Cart HEPA-UVC 15 has UVGI lights to neutralize captured biological contaminants, the clean air is exhausted out the bottom in a diffused pattern to prevent disturbing paperwork on tables and desks in the area, the ladder lowers inside the cart so it can be moved without making a second trip to move a step ladder that may be too tall to remain inside the Bio Cart while moved.



UNPACKING

DO NOT ACCEPT A PALLET THAT SHOWS VISIBLE DAMAGE.

- Report damage to driver, Delivery Company
 - Take photos of the damage
 - Refuse the shipment
 - Contact Air-Care at 702.454-5515 or cs@air-care.com.

Remove packing from exterior of Bio Cart HEPA-UVC 15 and pallet. Do not dispose of packing until you have completed your inspection of the Bio Cart HEPA-UVC 15 inside and out. If the Bio Cart HEPA-UVC 15 needs to be returned due to damage, you will need the packaging to repack.

Carefully lift the Bio Cart from Pallet with an appropriate Fork Lift and place on a smooth, level surface. Ensure brakes are set on wheels before leaving the Bio Cart unattended.

Once unpacked, inspect the interior of the Bio Cart for any signs of damage. Please take photographs of any damage and report it to Air Care and your Freight Company immediately.

Control Panel

1. Run/Stop Switch
2. Remote Control or Manual Operation
3. Bellows Up or Down (Manual)



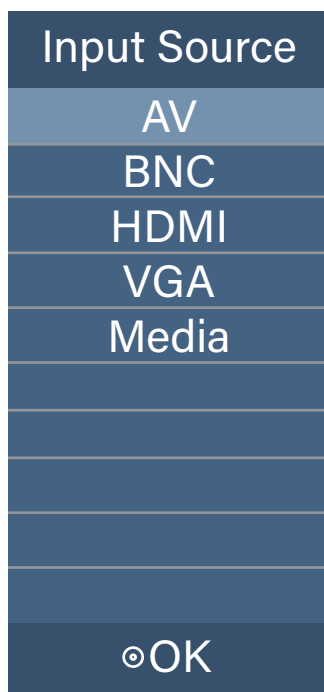
VIDEO CAMERA/MONITOR

A front facing camera (Image 1) is mounted on the exterior, so the operator can see what is directly in the path of the Bio Cart HEPA-UVC 15 as it navigated down hallways. The HD image is displayed on the 10" display (Image 2) on the door.

The camera will be most effective while the cart is being moved within the building. The on board battery will provide 2 hours of operation if fully charged. The "Battery Switch" near the control Panel must be ON to start the camera and display. The battery switch must be "OFF" to charge the battery, and when the Bio Cart is not plugged in.



(Image 2)



(Image 3)



(Image 1)

1. The Bio Cart battery switch must be on for the monitor to work. If the battery is not charged the Bio Cart must be plugged in.

2. If the monitor does not come on automatically, press the POWER BUTTON (A) on the remote.

3. If no image displays (blue screen), press the SOURCE (B) button.

4. A menu will appear (Img A). Press the down/up arrows (C) on the remote to move highlighted input to "AV" if not already selected. (Image 3)

5. You should now see the camera view.

6. Press OK to save the "AV" setting.

Note: None of the other controls on the remote are needed to operate the Bio Cart camera or screen.

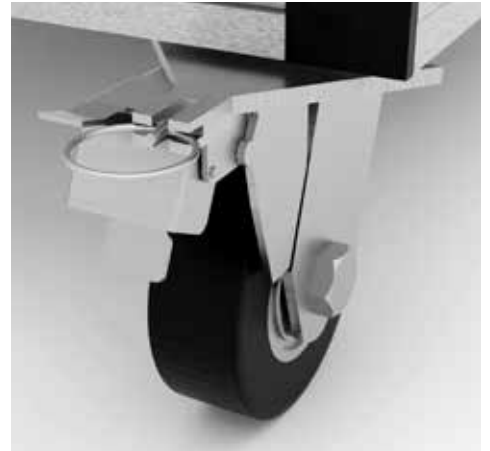


TESTING

The Bio Cart HEPA-UVC 15 has mechanical, electronic, camera and display functions to test. If any of these tests fail, contact Air-Care Immediately. 800-322-9919 or cs@air-care.com. The Bio Cart HEPA-UVC 15 may require the ladder to be removed to perform some of the tests.

Turn off all switches in the Bio Cart HEPA-UVC 15 before connecting to AC power.

1. Test the brakes on the 2 FRONT (Image 4) wheels with brakes to ensure they will secure the cart in working position.
2. Test the swivel locks on the 2 BACK caster wheels . Lock the swivel and engage a wheel brake at the same time.



(Image 4)

3. The "IN USE" light Switch is on the right side of the "In Use" light. It also controls the brightness. The Bio Cart must be plugged in for the "In Use" light to work.



(Image 5)

4. Inspect the power plug for damage.
5. Insert the power cord into the socket located above the HEPA door. (Image 6)
6. Plug the other end into a GFI outlet.



(Image 6)

TESTING

7. The last control to be tested on the panel is the power lift. The lift can be operated manually from the control panel rocker switch or with the keyfob remote. The operator **MUST** select “manual” or “remote” on the panel to select which control is active.

The Bio Cart HEPA-UVC 15 has a maximum height of over 15 feet, so you may not be able to fully raise it at this time.

Press the UP (TOP) of the Rocker switch on the control panel. The top of the Bio Cart HEPA-UVC 15 will begin to rise with the yellow and black bellows. **RELEASE** the switch and it will stop. When raising it to the ceiling, release the button just as the foam touches the ceiling to prevent any damage to the ceiling or the cart.

Press the DOWN (Bottom) of the rocker switch and the top will lower back to the transporting position. Release the button when the bellows are fully down.



WARNING!!

Unshielded UVC light can cause eye damage, so there is an interlock switch on the external HEPA door that will turn them off when changing the HEPA filter, even if the operator forgets to turn them off. Go to the outside of the cart and open the HEPA access door at the bottom of the rear panel by turning the latches and lowering it to be sure the UVC lights and the Air Scrubber Fan turn off as it is opened.

OPERATION

The Bio Cart HEPA-UVC 15 is the simplest portable containment cart to operate, and offers more features than other carts.

The Bio Cart HEPA-UVC 15 should first be moved to the area to be contained. Position under a ceiling tile or light fixture so that all 4 sides of the Bio Cart HEPA- UVC 15 are outside that area. The wheel brakes should be set.

Connect the power cord to reach a nearby power outlet. Always use a grounded outlet. Turn the battery switch to "OFF to charge the internal battery while The Bio Cart is plugged into the wall.

Step inside the door, close it. On the power control (image 7) select RUN to start the unit.

To raise the bellows, first select how you would like to control the bellows, either by using the included remote control, or manually using the control panel.

press the UP button on the control panel located near the door on the left wall (or use the remote). When the foam seal touches the ceiling, release the button. If the top is raised too far, the ceiling may be damaged.

The UVC lamps will turn on when the blower is powered up.

Before opening the ceiling, put on your PPE (safety glasses, dust mask, disposable clothing, etc.).



(Image 7)

Shelf Wall

- A) Pre-Filter
- B) Power Outlet
- C) Battery
- D) Control Panel
- E) UVC Light Box



OPERATION

Ladder Set-Up

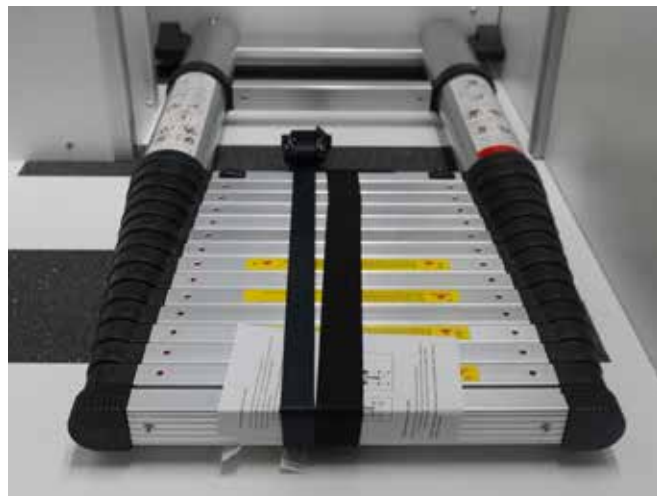
Your Bio Cart comes with a telescoping extension ladder. During shipping the ladder is secured to the bottom of the unit (Image 8).

To use the ladder, unstrap the ladder and slowly extend the ladder to your desired length (the ladder can fully extend up to 15 feet). Also unstrap the cross-bar support strap (Image 9).

Position the ladder so it is placed on the non-skid pad at the bottom of the unit (Image 10), and rest the upper part on the cross-bar at the top.

The bottom of the ladder is secured using bottom strap (Image 11).

The top strap should extend across the ladder and secured firmly in place with the top strap (Image 12).



(Image 8)



(Image 9)



(Image 10)



(Image 11)



(Image 12)

OPERATION

Climb the ladder and move the ceiling tile out of the way and store it to the side of the opening. For re-lamping light fixtures, you will not normally need to remove any ceiling tiles.

If power tools are required, plug them in to the power outlet located on the control panel.

KEEP THE AIR SCRUBBER RUNNING DURING THE ENTIRE PROJECT AND EVEN WHEN YOU EXIT THE Bio CART. This will maintain Negative Pressure in the Bio Cart HEPA-UVC 15 and prevent any airborne particles from escaping into the area around the cart.

Once the job is complete, leave the air scrubber on while the ladder is lowered and secured with the strap. You can then safely lower the bellows.

Remove any protective clothing that may be contaminated with debris and store in a plastic bag inside the cart.

Step outside the Bio Cart HEPA-UVC 15 and close the door securely. It can be locked using the key provided with your Bio Cart HEPA-UVC 15.

Unplug the 25 ft extension cord and put it into the Bio Cart.

Unlock the wheel brakes and carefully move the Bio Cart to the next work area. You can utilize the camera feature when moving your Bio Cart.

SAFETY INFORMATION

Air-Care Bio Carts are designed to minimize hazards from dust and debris released from the Ceiling area when work is performed there. The Bio Cart HEPA-UVC 15 has electrical power and components around which common sense and normal safety procedures must be followed to minimize exposure to any possible dangers.

The Electrical Plug should be plugged into a GFI (Ground Fault Interrupter) to shut down power if there is a defective device with improper ground plugged in to the Bio Cart power. Do NOT remove the ground pin on the plug. Always plug the power cord into a grounded electrical outlet.

When the Bio Cart is located in the work area, set the Wheel Brakes and swivel locks before stepping inside the Cart to prevent movement that May cause the technician to lose their balance.

The Ladder MUST be fully secured at the top and bottom supports with the ratchet straps provided prior to the technician stepping on to the Ladder. When moving the Ladder, it must be secured.



The Bio Cart is equipped with a UVC/UVGI lamp above the HEPA. When changing the HEPA filter, an interlock turns off the UVC/UVGI lamps and the Air Scrubber fan motor. DO NOT BY PASS this interlock.

Observe all electrical safety procedures when using lights, Power Tools or other electrical devices in the Bio Cart. 120 Volts AC is present in all the outlets. All power wires are enclosed in protective, insulated tracks or coiled cords. If any wire or covering appears to be damaged, it must be repaired immediately.

The top of the Bio Cart is raised and lowered with a powered actuator. As with all mechanical devices, use caution when operating it and keep all materials clear of the moving parts of the actuator.



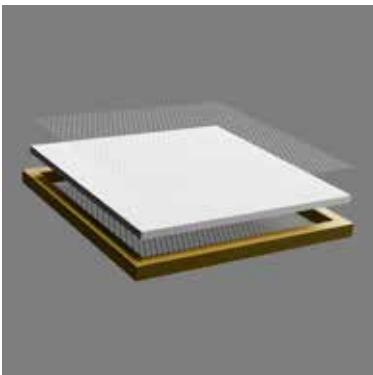
If you have any questions regarding the safe and reliable operation of the Bio Cart, contact Air-Care, 800-322-9919 or cs@air-care.com.

REPLACEMENT PARTS

HEPA Filter
SKU #: F0059



Disposeable
Pre-filter Pad
(Package of 5)
SKU: SABIO0409



UV-C Lamp Re-
placement Blub
SKU: ACC0180



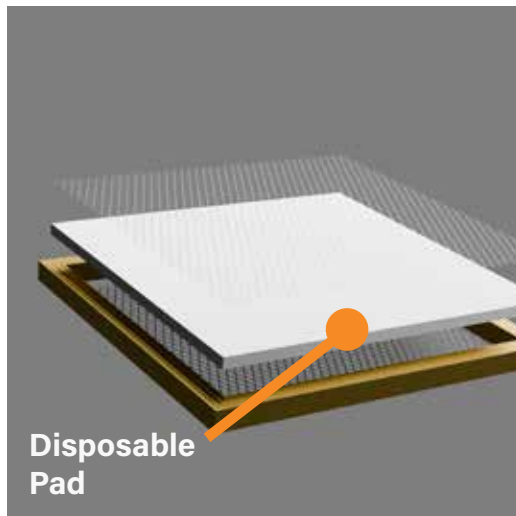
MAINTENANCE

The single most important maintenance activity for the Bio Cart 15 is keeping them clean. Since the Bio Cart will be used in a variety of environments, the degree of cleaning will vary with each environment.

The cleaning protocol for each area that the Bio Cart will be used must be understood prior to transporting it to those areas. In Operating Room environments, the cart must be totally wiped down with the proper sanitizer inside and out and all wheel surfaces. In other areas, lesser measures are required. Consult with the staff in the planned work areas for detailed Infection Control procedures. Contact Air-Care if you have questions about how to meet specific requirements.

Generally, cleaning the inside of the cart after each use is recommended. With the Air Scrubber running, the air in the Bio Cart HEPA-UVC 15 is HEPA filtered. It is recommended that the air scrubber is left running while vacuuming debris off the floor, shelf, ladder and other surfaces.

Wiping down the pleats in the bellows with a damp cloth, inside and out, between all pleated surfaces is recommended. A suitable biocide can also be used.



The wall surfaces should also be wiped down regularly.

Replacing the Pre-Filter

The pre-filter in the frame is 1", non-woven, white polyester. This is disposable and should be replaced when soiled.

UVC/UVGI Lamps Replacement

The UVC/UVGI lamps have a useful life of 10,000 hours. This is just over 12 months of 24/7 illumination. In the Bio Cart, they will not be on continuously, but turning them OFF and ON can sometimes reduce their useful life. Use the observation window in the Bottom of the Air Scrubber section to verify that the bulbs are both operating. Register your Bio Cart and receive reminders to replace the filters and UVC lamps.



To replace the UVC/UVGI:

1. Unplug to Bio Cart
2. Open the HEPA access door
3. Remove the HEPA filter
4. Reach in and unscrew the UVC bulb
5. **IMPORTANT:** When installing a new bulb, use a cotton glove to avoid touching the glass tubes
6. Install the new bulb and reinstall the HEPA filter.
7. Close the access door

MAINTENANCE

DO NOT TOUCH THE GLASS on the new bulb with your hands. Oil from your fingers will cause local heating and early failure of the bulb. Use rubber gloves or other means to hold the new bulb, screw it into the socket and be sure it is secure.

HEPA Filter Replacement

DO NOT replace the HEPA while on a work site. Unplug the Bio Cart HEPA-UVC 15 and open the HEPA door by turning the 2 latches on the Door. Slide the old HEPA out and dispose in the proper manner. It is best to place it in a plastic bag and seal it with Tape before removing it from the area. Some contaminants require the HEPA be Doubled Bagged in 6 mil plastic bags and labeled – check your local regulations for disposing of contaminated materials.

Routine Inspection of Electrical Wiring and Interlock Observe the wires that are visible such as the Power Lift wires and the "IN USE" light wired and if the insulation appears compromised, have it repaired or replaced immediately. The Interlock switch on the HEPA Filter Door must turn off the UVC light and the Air Scrubber Fan when the door is opened. Contact Air-Care if there are any questions on how to replace or adjust it.

Routine Inspection of the Ladder and its supports

Inspect the ladder itself for any missing or loose parts. Look for cracks in the side rails and the steps. If these are present, replace the ladder.

The Ladder Supports in the Bio Cart HEPA-UVC 15 must be in good working order with no missing or damaged parts. Check the pictures of the ladder supports if there is any question how it should look when in good operating condition.

Routine Inspection of the Wheels

The 4 caster wheels must not be broken or loose. Be sure the locking mechanisms work.

Handles, Door Lock, Hinges, Window and Cart Frame

Test the Door Handle for secure latching when closed and verify that the lock works from both inside and outside. The hinges must not be damaged or missing parts.

Check the window and frame for loose or missing screws and replace immediately. If the windows become so scratched that the operator cannot see through them clearly, call Air-Care and order replacement panels.

COMPLIANCE

Bio Cart HEPA-UVC 15 complies with all relevant health and safety guidelines for portable, negative air, dust containment carts used in healthcare facilities such as ICRA 1 through 4, and others listed below.

Because the occupants of healthcare facilities are often more susceptible to contaminants introduced into the air by routine maintenance work to and above the ceilings, the Center for Disease Control (CDC) has created strict guidelines for how this work must be performed while minimizing the risks to sensitive individuals in its guidelines for Infection Control in Healthcare Facilities (ICRA).

Activities such as testing fire and smoke sensors, adding or rerouting wires and fiber optic lines for IT equipment, cleaning air system components, changing electrical wiring, all must include consideration for controlling the amount of dust and infectious particles that might be disturbed and introduced into the air.

The Bio Cart HEPA-UVC 15 is a portable containment cart that extends to any ceiling up to 15 feet in height, with a ladder that remains inside to reach the work area. The Bio Cart HEPA-UVC 15 provides negative pressure and air exchange rates to comply with CDC guidelines to contain dust and infectious particles. Bio Cart HEPA-UVC 15 adds UVGI irradiation in the HEPA Filter compartment to neutralize infectious particles captured by the 99.97% HEPA filter. The clean air is then exhausted out the bottom as a diffused flow so it cannot disturb documents on desks. The Bio Cart HEPA-UVC 15 complies with the CDC's ICRA 1-4 Guidelines, and also meets fire control guides for using flame retardant materials and is able to quickly be relocated from fire evacuation routes.

Built to Complies, Standards, and Recommendations

ASHRAE 52.2:2007

ICRA Class 1-4 Compliant

OSHA 1910.1000 Air Contaminants: Nuisance Dust OSHA IMIS

- 9135, 9130

OSHA/ACGIH Respirable Dust Compliant

CDC/HICPAC Guidelines for Environmental Infection Control in Health-Care Facilities

- 3.b, 3.b, 3.d.iii, 3.d.iv

- Part IV Appendix B. Air,

VI.C.1. Environmental controls

- VI.C.1.a, VI.C.2, VI.E.

SPECIFICATIONS

SPECIFICATION	DESCRIPTION
Air Scrubber Fan	880 CFM@300 watt • 62 Db at maxspeed reaching up to 6 air changes per minute
Bellows	Fire retardant black and yellow vinyl that is 3 Inches high when collapsed with a total unit height of 15 feet when extended
Cable Pass Through	Cable feed through
Caution Sign	Externally visible LED "IN USE" light
Construction	Extruded aluminum frame and walls made of white melamine with a thermal coating skin provide a durable and easy to clean surface
Control Panel	Control panel with manual lift up/down switch
Remote Control	Remote Control for ease of use
Document Protection	Document holder on door
Door	Aluminum frame with a white thermal bonded skin that is 29 Inches W, 62.5 Inches H, locking from inside or outside
Filtration	Electrostatic disposable pad pre-filter, and a 99.97% 0.3 Micron HEPA filter
Ladder	15 ft. telescoping ladder
Lighting	Interior white LED lighting
Power Cord	25 ft. long power cord with grounded plug
Power Outlets	Duplex power outlet
Size Collapsed	73 L, 32 W, 77 inches H
Size Fully Extended	73 L, 32 W, 182 Inches H
Top Lifting Mechanis	Power lift with foam seal at top, for ceilings from 7 ft to 15 ft. in height
Weight	480 lbs. with ladder and all air scrubber filters installed
Wheels	4 Inches dia. x 2 Inches wide non-marking. Two with wheel brakes and two with swivel locks
Windows	Front window
Camera/Monitor	Rear mounted camera with front mounted viewing monitor
Portable Vacuum	Portable Vacuum

LIMITED WARRANTY

Bio Cart Premium HEPA-UVC 15

Air-Care warrants this product to be free from defects in materials and workmanship to the original purchaser for a period of Five (5) years from the date of purchase. Components listed below are excluded from this Five year period and are covered for periods described below:

PART	COVERAGE	PART	COVERAGE
All wiring, control panels and electrical components	1 Year	Ladder	1 Year
Bellows	1 Year	LED Lighting	1 Year
Camera	1 Year	Lift Motor Assembly	1 Year
Blower Motor	1 Year	UV Light Assemblies	1 Year
		Wheels and Filters	No Warranty

Warranty covers both parts and labor (labor is to be performed at Air-Care's facility located at 3868 E. Post Road; Las Vegas, Nevada).

Warranty is extended to the original purchaser and is NOT transferrable.

This warranty does not extend to any damage to a product caused by or attributable to freight damage, abuse, misuse, improper or abnormal usage. Warranty is also void if the product has been modified or altered in any way.

The purchaser is responsible for the cost of shipping the equipment to Air-Care's facility for evaluation. If found to be defective and covered by the terms of this warranty, Air-Care will pay FedEx ground shipping charges on the repaired or replaced item back to the purchaser's location. Any additional expedited service charges for quicker shipping shall be born by the purchaser. If the product or component is not found to be a warranty issue, the purchaser will be responsible for return shipping charges.

Air-Care is not responsible or liable for indirect, special, or consequential damages arising out of or in connection with the use or performance of the product; damages with respect to any economic loss, loss of property, loss of revenues or profits, loss of use, or other incidental or consequential damages of whatsoever nature.

The warranty extended hereunder is in lieu of any and all other warranties, and any implied warranties of any type.

This warranty gives you specific rights. These rights and others vary from state to state.

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