

# microAIR® 3500S



OWNER'S OPERATOR AND MAINTENANCE MANUAL

#### **SPECIAL NOTES**

WARNING/CAUTION notices used in this manual apply to hazards or unsafe practices which could result in personal injury or property damage.

#### **NOTICE**

THE INFORMATION CONTAINED IN THIS DOCUMENT IS SUBJECT TO CHANGE WITHOUT NOTICE.

#### **WARNING**

DO NOT OPERATE THIS EQUIPMENT WITHOUT FIRST READING AND UNDERSTANDING THIS MANUAL. IF YOU ARE UNABLE TO UNDERSTAND THE WARNINGS, CAUTIONS AND INSTRUCTIONS, CONTACT A HEALTHCARE PROFESSIONAL, DEALER OR TECHNICAL PERSONNEL IF APPLICABLE BEFORE ATTEMPTING TO USE THIS EQUIPMENT. OTHERWISE INJURY OR DAMAGE MAY RESULT.

#### **SAVE THESE INSTRUCTIONS**

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#### **SAFETY SUMMARY**

#### **WARNING**

#### CONTRAINDICATIONS

Always consult the patient's physician before using the microAIR 3500S system. Certain medical conditions preclude use of a low air loss mattress replacement system. e.g., unstable spinal cord, traction, etc.

#### **INSTALLATION**

The microAIR 3500S must be installed on medical bed frames with side rails. After placing the patient on the mattress, verify the side rails provide adequate protection for the patient. The side rails must be in the raised position, whenever a patient is on the bed.

Controls on the footboard may be obstructed by the Power Unit on a few bed frames. It may be necessary to relocate the Power Unit. See Non-Standard Operation Section for alternate Power Unit locations.

Check that Air Hoses and Power Cord are clear of moving bed components before placing a patient on the bed. Operate all bed frame motorized functions through their full range of motion to verify there is no pulling, interference, or pinching.

The Therapy Pad is essential for skin moisture control. Do not place a patient directly on the Mattress without a Therapy Pad. The Therapy Pad protects the Mattress components from contamination.

#### SMOKING IN THE PATIENT ENVIRONMENT

Smoking by the patient is not permitted and should be strongly discouraged. microAIR 3500S systems use room air for circulation through the mattress. Smoking by visitors in the bedroom will contaminate the system. Visitor smoking is not permitted.

#### OXYGEN AND ANESTHESIA EQUIPMENT

Explosion risk if used with flammable anesthetics. There is a possible fire hazard when used with an oxygen tent around the power unit or below mattress support level. A standard oxygen canula or nasal mask is acceptable.

#### **ELECTRICAL**

Disconnect the Power Cord from the wall outlet before performing any maintenance to the Power Unit. Refer servicing to qualified personnel only. Grounding reliability depends upon a properly grounded wall outlet (three prongs). Always use the 18-foot hospital grade Power Cord provided with your product.

#### **SERVICING**

The air filter element and mattress assembly are the only user-serviceable parts. Do not open the Power Unit. Refer all repair questions to Technical Customer Service at 1-407-328-1969. The system must be maintained, inspected and tested according to the schedule in the maintenance section of this manual to deliver consistent performance. If your system requires factory service, contact Customer Service for a Return Authorization number (RA). Package systems in the original shipping box. Clean all system components before shipment. UNSANITARY SYSTEMS WILL BE RETURNED WITHOUT SERVICING.

#### **SPECIFICATIONS**

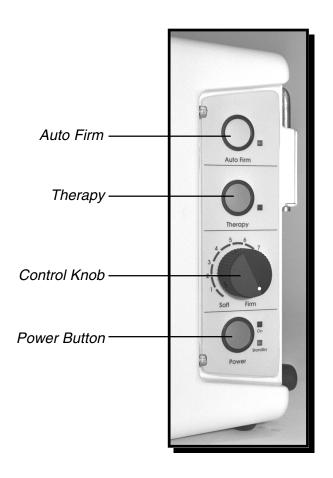
	microAIR 3500S
AIR SACKS	
Washable:	Yes
Waterproof:	Yes
Quantity:	3 sacks
Pressure Zones: Sack Seam Bonding:	3 RF welded
_	Til Welded
PATIENT/MATTRESS INTERFACE	
Vapor Permeable:	Yes
Microporous:	No None
Latex Components:	None
FILTERS	
Air Filter:	Yes
Noise filter:	Yes
WEIGHTS/CAPACITY	
Patient Weight:	350 lb. maximum
System Weight	
Mattress:	32 lb.
Power Unit:	20 lb.
AIR BLOWER	
Service Life (est.):	24,000 hr.
DIMENSIONS	
Mattress Width:	84 x 37-inches Standard width
	84 x 32-inches Narrow width
ELECTRICAL	
Power:	115 VAC, 50/60 Hz, 2A (operating)
SAFETY	
Listing Agency:	Underwriters Laboratories
Listing Specification:	UL 544
Fire:	California 106
MATTRESS SANITATION	
Fluid Entrapment:	No (seamless)
Detergent. Resist:	Yes
REGISTRATION	
FDA Reg. No:	K914674
PATENTS	
US:	5,216,768

#### **FEATURES**

#### **QUICK REFERENCE - MICROAIR 3500S**

#### **Control Panel Features (FIGURE 1)**

- 1. **Power Button -** Press the button to turn on the Power Unit. Press the button again to turn off the Power Unit. The control panel power is always on, as indicated by the Stand By light.
- 2. **Control Knob -** Rotate the knob clockwise to increase mattress pressure.
- 3. Auto Firm Press the Auto Firm Button to engage auto firm. The Mattress will become firm for nursing procedures. An indicator lights to notify Auto Firm mode is on. A timer will cancel auto firm in 30 Minutes. Should the nurse be called away, an unattended patient will not be left on a firm surface.
- 4. **Therapy -** Press the Therapy Button to cancel Auto Firm mode.



#### **Side Panel Features - Left (FIGURE 2)**

 Couplers - Three color coded quick connect fittings that connect to the hoses. Push in the sliding collar release and insert the hose coupler until the collar snaps back to it's original position.

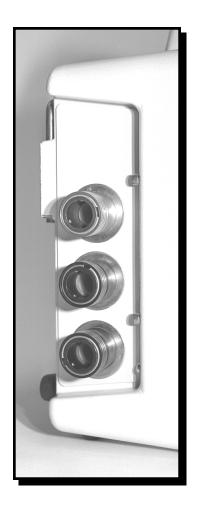


FIGURE 2 - SIDE PANEL FEATURES - LEFT

FIGURE 1 - CONTROL PANEL FEATURES

#### **Rear Panel Features (FIGURE 3)**

- 1. **Power Connector** Push in the cord plug to install the Power Cord. Use only the 18 foot hospital grade cord to insure safety ground.
- 2. **Filter Door -** Open the Filter Door to change the Air Filter. Rotate counterclockwise to remove.
- 3. **Mounting Brackets -** Narrow and wide swing-out Brackets fit most bed footboards.
- 4. Range Switch Inside the filter compartment is a switch to control the patient weight range. High for 150-350 lbs. Low for 0-180 lbs. The 3500S has enough power to produce excess mattress firmness for small patients. The Range Switch is hidden in the filter compartment to prevent unauthorized power adjustment.

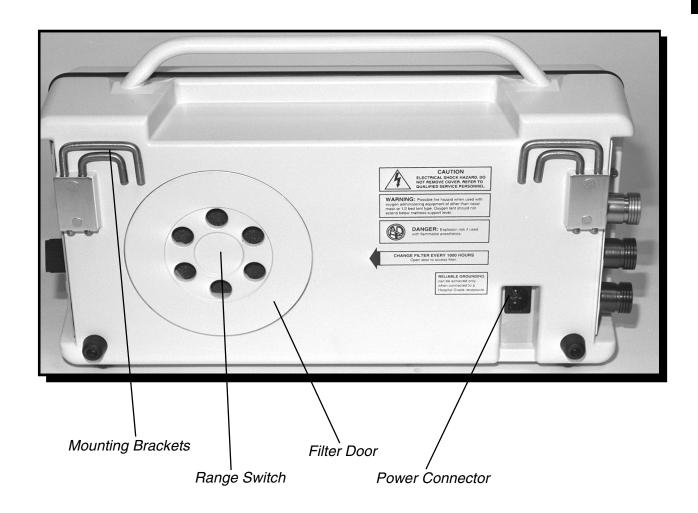


FIGURE 3 - REAR PANEL FEATURES

#### UNPACKING

#### UNPACKING AND INSPECTION

Each microAIR 3500S is shipped in two (2) boxes. One contains the Power Unit. The other contains the Mattress Assembly. Verify that no components are damaged or missing. Report any damage to the transport carrier immediately.

# COMPONENTS SUPPLIED IN THE POWER UNIT PACKAGE

- 1 Power Unit
- 1 Operation and Maintenance Manual
- 1 Power Cord

# COMPONENTS SUPPLIED IN THE MATTRESS ASSEMBLY PACKAGE

- 1 Mattress Assembly with Air Hoses Red, Blue, and Green
- Nylon Duffel Bag

#### SYSTEM PREPARATION

#### **BED FRAME PREPARATION**

The bed frame must be a standard hospital bed or medical-grade home care bed. For patient safety, the bed frame must have side rails. The side rails must be in the up position when the patient is lying on the bed. Remove the original bed mattress and place it in storage.

#### POWER UNIT INSTALLATION

The standard Power Unit installation is on the upper edge of the footboard. Select the appropriate width swing-out Mounting Brackets (two [2] sizes are available on the rear panel) and place the Power Unit on the footboard. Run the Power Cord under the center of the bed.

#### PRE-ASSEMBLED MATTRESS INSTALLATION (FIGURES 1 AND 2)

The Mattress and Therapy Pad come pre-assembled from the factory (**FIGURE 1**). In dealer service, the pre-assembly point should be at the cleaning facility.



FIGURE 1 - PRE-ASSEMBLED MATTRESS INSTALLATION

Lower the bed frame side rails. Roll out the Mattress onto the bed frame. Strap the mattress to the bed frame at convenient locations. Thread the strap ends through the buckles provided **(FIGURE 2)** and take up excess slack. A minimum of two secured straps are required in the center, head, and foot ends. Check that side rails move freely after inflation. To release strap tension, lift the tab on the buckle.

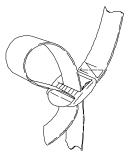


FIGURE 2 - PROPER METHOD OF THREADING FRICTION BUCKLES

#### **AIR HOSE CONNECTION**

Connect the color coded hoses to the Power Unit. Push in the snap ring at the Power Unit. Insert the hose fitting. Release the snap ring to lock the fitting. If the ring does not snap back, push the hose fitting in until it does.

# **CPR PLUG INSTALLATION** (FIGURE 3)

Insert the rubber plug into the end of the tee that attaches to the head Air Sack. Moisten if necessary to ease installation. Extend the CPR flag outside the Mattress Assembly to hang down beside the bed frame.

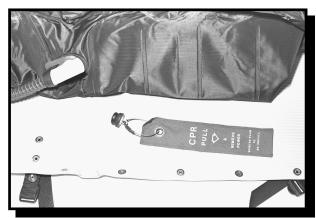




FIGURE 3 - CPR PLUG INSTALLATION

#### THERAPY PAD INSTALLATION

Starting at the foot end of the bed, lay the Therapy Pad (quilted side down) on top of the Mattress. Connect the Therapy Pad snaps to the corresponding snaps on the straps located on the Mattress (near the bed frame). A patient should not be placed directly on the Mattress without a Therapy Pad. A loose (non fitted) cotton sheet between the patient and Therapy Pad is optional. A tightly fitted cotton sheet may increase skin friction and shear.

#### **POWER CORD**

Plug the Power Cord into a wall outlet. Verify that Air Hoses and Power Cord are clear of moving bed components. Operate all bed motorized functions through their full range. Check for pulling, interference or pinching, and correct any problems.

#### SYSTEM OPERATION

Press the Power Button to start the Power Unit. The Mattress will start to fill slowly. Press the Auto Firm Button to inflate the Mattress quickly. Press the Therapy Button when inflated. The foot air sack section will inflate slowly. If the Mattress does not inflate, refer to the **TROUBLE-SHOOTING** section of this manual.

PATIENT SETUP PROCEDURE 2

#### PATIENT SETUP

#### **PATIENT SETUP (FIGURE 1)**

#### Install system on a medical bed frame with side rails and inflate.

- Check patient weight. If patient weight is between 0-180lbs., set the power Range Switch inside the filter door, to LOW range. If between 150 - 350lbs., set the switch to HIGH range (the blower runs faster when you switch the toggle to HIGH). Adjust pressure Control Knob fully clockwise. Push the Therapy Button.
- 3. Ask the nursing staff to place the patient on the bed. Center the patient on the bed from side-to-side and head-to-foot. Use a regular pillow under the head for comfort and to control head position. Special positioning may be required with contracted patients to provide comfortable positions.
- 4. Gradually lower (counterclockwise) the control knob every three (3) minutes until approximately 3-inches of the patients body is immersed into the mattress top surface. The goal is to achieve flotation of the body for minimum skin contact pressure.
- 5. After stabilization, insert your hand as if shaking hands with someone with your thumb pointing up, between the head and seat air sack.

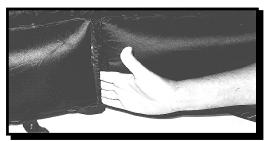


FIGURE 1 - PATIENT SETUP

Reach in under the patients body until the hand is directly below the spinal area. Place the heel of the hand on the mat assembly and raise the thumb. If the patient is too high, the thumb will not touch the patient's body. If the patient is too low, you will not be able to raise the thumb. Adjust the control Knob until the proper floatation level is achieved. Wait at least three minutes between each adjustment for the pressure to stabilize.

- Raise the bed frame knee section and head section 30 degrees. Observe if the patient bottoms out against the frame. If so, the Control Knob pressure is adjusted too low. Raise the pressure and retest the patient flotation level with the bed frame lowered.
- Check the Auto Firm function for proper mattress firmness.
- 8. The foot air sack section will always be soft to reduce pressure in the heel section.

#### PATIENT MANAGEMENT

After placing the patient, make certain no objects will fall under the patient, such as feeding tubes, IV's etc. Use a regular pillow to help support and stabilize the patient's head. Make sure the patient's limbs assume natural positions without pinching. Use pillows, foam or sheepskin appliances as required to cushion potential body to body contact areas.

#### **HEAD RAISED POSITION**

When elevating the head of the bed, elevate the knee section first. The Therapy Pad is slippery to minimize skin friction. Head elevation without knee elevation may cause the patient to slide toward the foot of the bed.

The head of the bed should be maintained at the lowest degree of elevation consistent with medical conditions (AHCPR Pub. 92-0047, P.24). The lowest skin pressure is maintained with 0° to 20° head raise angle. Angles above 30° place more body weight over the seat area, reducing pressure relief. Instruct the care-giver to avoid head angles over 30° for extended periods, unless medically necessary (US Department of Health and Human Services publication No. 92-0048).

# PATIENT TRANSFER FROM/TO A GURNEY

Press Auto Firm to achieve maximum mattress pressure. Raise or lower the bed to match the gurney height. In two to three minutes the Mattress will become very firm so the patient can be slid onto the gurney. Always secure the bed and gurney during patient transfers. Press therapy to return mattress pressure to the original setting.

# PATIENT TRANSFER FROM/TO A WHEELCHAIR

Turn "**OFF**" the unit to deflate the Mattress so the patient is on the same level as the wheelchair. After transferring to a 3500s, have the patient lie on their back and raise the bed side rails to the safety position. Press the Power Button "**ON**". Press the Auto Firm Button and wait until the Mattress is inflated. Press the Therapy Button to return the patient to floatation.

#### ADJUSTABLE WIDTH SIDE RAILS

Some home care beds have adjustable width side rails. Set the side rail width so the rails touch the Mattress. Avoid a gap between the mattress and side rail.

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#### SERVICING/CLEANING/LAUNDRY

#### **SERVICING**

#### **Dress Standards**

Standard clothing consists of street clothes, lab coat, and two pairs of gloves (one pair is a spare). Gloves should be worn when touching the patient, dressings or body fluids. Proper procedures for donning and removal of protective clothing should be observed.

#### **Unit Setup**

The 3500S system is made patient-ready at the dealership before delivery to the installation site. The Mattress is pre-assembled and Power Unit tested according to the maintenance schedule.

Ask the caregiver or nursing staff what isolation precautions are required when performing adjustments with the patient on the bed. Typically, if protective clothing is required, the institution will provide it to all health care workers.

#### **Routine Maintenance**

Disposable gloves are worn on all maintenance visits. They are disposed of after visiting each patient. Hand washing is required before and after gloves are worn.

Filter replacement should be scheduled very 9 weeks or 1,500 hours. For light soil, the Therapy Pad can be cleaned by topical wipe down with a pH balanced soap and water solution normally used to wash the patient. Rinse with water. If soiled, the Therapy Pad should be laundered.

#### Collecting

When collecting the 3500S system, put on gloves and other protective equipment if required. Turn "ON" the Power Unit. Check the underside of the Therapy Pad and mattress folds for sharps (e.g. scissors, needles, etc.). Discard before proceeding. Examine the surface of the Power Unit, Therapy Pad and Mattress Assembly components for visible blood or body fluids. If blood is present, decontaminate. Insure that bedding is bagged and labeled before removal from the patient site.

If blood is not present, remove excess soil from the Therapy Pad with paper towels. Dispose of towels according to institutional policy. Wipe the top (patient) surface down with a dilute detergent solution, quaternary cleaner disinfectant, or other germicidal detergent solution. Turn "OFF" the Power Unit. Clean any soiled areas

of the Power Unit and Hose Fittings with the detergent solution.

Disconnect hoses from the Power Unit and allow air to vent from the Mattress. **Gently** roll up the Mattress with minimal agitation. Check the Therapy Pad surface is inside the roll. Place the used bedding in a laundry transport bag, appropriately labeled. Verify the bag is sealed before removing it from the room. **Never place used bedding or soiled components in the microAIR duffel bag because it will become contaminated.** The used gloves should be disposed of properly according to institutional policy. Move the entire microAIR system from the patient's room to the transport vehicle.

#### **CLEANING**

microAIR equipment should be inspected. Any item that is visibly soiled with the patient's blood or other body fluids should be properly cleaned.

#### **Recommended Cleaning Materials**

Disinfectant chemicals should be EPA registered hospital grade type with effectiveness claims for destruction of harmful microorganisms. Hospital grade disinfectant chemicals are available from many manufacturers. Use the manufacturer's recommended dilution. Never mix different chemicals together in the same container.

Phenolic disinfectants supplied in highly concentrated form are effective in decontaminating blood spills. Quaternary cleaner disinfectants are usually capable of cleaning, deodorizing and disinfecting in a single operation. They are especially suitable for cleaning equipment at the patient site where low level disinfection or odor control is needed. Laundry disinfectant presoaks can be either phenol or quaternary chemicals.

#### **Cleaning At the Patient Site**

Whenever the Therapy Pad is visibly soiled, clean with a pH balanced soap and water solution normally used to wash the patient. Rinse with water. Cleaning with the patient on the bed is not recommended.

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## **Cleaning and Decontaminating Spills of Body Fluids**

Cleaning blood spills must be done with protective clothing, due to the risk of contracting HIV and hepatitis. Gloves must be worn during cleanup. Hands should be washed thoroughly after completion. First, all visible soil should be removed with disposable paper towels. Next, the area should be scrubbed with freshly prepared phenolic detergent disinfectant solution. In general, chemical germicides that are EPA registered for use as hospital disinfectants can be used to decontaminate blood spills.

#### **Field Cleaning of microAIR Power Units**

Turn "OFF" the Power Unit and remove the Power Cord. Wipe down the Power Unit with a quaternary disinfectant solution. A nylon brush may be useful since crevices can harbor microorganisms. All treated surfaces should be allowed to air dry before connecting the Power Cord and restarting the system.

#### **LAUNDRY**

Laundry workers should treat all soiled bedding as if it were contaminated with pathogenic microorganisms. Laundry workers should wear gloves, gowns and additional protective equipment as needed. Separate soiled and clean bedding areas should be designated so that cross contamination cannot occur. Soiled bedding should not be placed on the floor. Space should be provided for sorting, folding, bagging of clean bedding and to reassemble the Mattress.

#### **Mattress Disassembly**

Place the Mattress Assembly on a suitable work table. Remove the Therapy Pad. Follow the laundry procedure for Therapy Pad. Wipe down the Mattress and air hose assembly with a properly diluted solution of quaternary cleaner disinfectant and air dry.

#### **Presoak**

Remove Therapy Pad to be laundered from the bag. Place in a washing machine. Fill the tub with warm water (below 120°F). Add presoak disinfectant. Follow manufacturer's dilution directions.

#### **Washing Cycle**

Place laundry into a washing machine. Do not overload the machine. Wash Therapy Pads separate from Air Sacks. Wash with warm water (120°F max.) and detergent. Follow manufacturer's directions. Do not use concentrated bleach because it may damage the fabric coating.

#### **Machine Drying Method**

Laundry workers should always wash their hands before working with clean bedding. Dry Therapy Pads below 120°F in a clothes dryer with accurate controls. (High air temperatures will damage the fabrics and void the Invacare warranty.)

#### **Mattress Assembly (FIGURE 1)**

Place the Mat Assembly on a clean work table. Snap three Air Sacks to the Mat along the far left side (viewed from foot end). Note the two snaps closer together at the junction of the foot and seat section Air Sacks. Attach hoses and secure retainer velcro straps. The short hose goes to the foot, middle hose to the seat, and the long hose with CPR flag to the head Air Sacks. Snap the other side of the Air Sacks to the Mat. The CPR flag must extend outside the assembly. The hoses should extend out the foot end on the left side. Connect the hoses to the Power Unit and turn on power. Check for abnormal leaks or misalignment. Cover the Mattress with the Therapy Pad and snap in place. Roll up the mattress and store in the duffel bag.



FIGURE 1 - MATTRESS ASSEMBLY

#### NON-STANDARD OPERATION

The majority of installations are successfully handled using the procedures detailed in this manual. When a difficult situation arises, call your Technical customer service representative for assistance. 407-328-1969

#### POWER UNIT RELOCATION

Some bed frames have controls that are obstructed by the standard Power Unit installation. It will be necessary to relocate the Power Unit if essential control functions are not duplicated elsewhere on the bed.

The Power Unit can be installed on the headboard, a night stand, or on the floor using optional extended hose sets. Call your Invacare customer service representative.

#### NARROW WIDTH BEDS

Invacare offers an optional narrow width mattress assembly for use with 32-inch wide ICU type bed frames. Whatever the application, the side rails should touch the Mattress.

#### **MAINTENANCE**

The microAIR 3500S system is equipped with an Air Filter. The filter can be changed without moving the patient or turning "**OFF**" the unit. Regular servicing will insure the blower operates at maximum power.

# AIR FILTER REPLACEMENT (FIGURE 1)

The Air Filter should be changed every 1,500 hours (9 weeks) of continuous operation, or before the next patient is placed on the system. If the filter becomes excessively dirty, the system pressure will decrease.

The Air Filter is located behind the Filter Door (inside the Power Unit). The element is replaced as follows:

- 1. Open Filter Door by counterclockwise rotation.
- 2. Remove the used filter element and discard.
- 3. Install a new Air Filter element.
- 4. Close the Filter Door by clockwise rotation.



FIGURE 1 - AIR FILTER REPLACEMENT

# RECOMMENDED INSPECTION, MAINTENANCE AND TEST INTERVALS FOR MICROAIR 3500S LOW AIR LOSS THERAPY SYSTEMS

The following procedures are to be performed by the designated service organization, dealer, or institutional Biomed department:

Time Interval	Description of Recommended Activity
1,500 hours (9 weeks of continuous operation)	- Remove and replace Air Filter cartridge - Inspect Air Hose connections & Mattress Assembly function - Inspect Power Unit and Power Cord
After decontamination of system	<ul> <li>Perform general physical inspection of Mattress Assembly, Hoses, Power Unit and Power Cord.</li> <li>Perform electrical line leakage test.</li> <li>Perform electrical ground integrity test.</li> </ul>
Annually, or after 8,000 hours of operation	<ul> <li>Perform general physical inspection of Mattress Assembly, Hoses, Power Unit and Power Cord.</li> <li>Perform electrical line leakage test (for acute care hospitals)</li> <li>Perform electrical ground integrity test (for acute care hospitals)</li> <li>Remove and replace Air Filter cartridge - Check for loose hardware or physical damage which might affect operation or safety</li> </ul>

#### OPTIONAL INSPECTION AND TEST REPORT MICROAIR 3500S SERIES LOW AIR LOSS THERAPY SYSTEMS

System serial #		Date:	
Service person:			
	Print	Name	
Service performed:	1,500 hour Repair	Post-decontamination Annual or 8000 hour	
Components replaced:	Air Filter	Other (specify)	
		Other (specify)	

#### PHYSICAL INSPECTION CHECKLIST

It a see	01/		Comments
Item	OK	Bad	Comments
Therapy Pad			
Mat Assembly			
Air Sacks			
CPR Flag			
Air Hoses			
Power Unit			
Power Cord			
Mounting Hardware			
Control Panel			
Markings & Labels			
Other			

# INSPECTION AND TEST REPORT FOR SYSTEMS USED IN AN ACUTE CARE ENVIRONMENT MICROAIR 3500S SERIES LOW AIR LOSS THERAPY SYSTEMS

#### **ELECTRICAL TEST CHECKLIST**

Item	Parameter	Requirements
Electrical leakage: Normal Reverse Ground connected	µа µа µа	No reading shall exceed 100 microamps ( a)
Ground resistance from plug to Power Unit chassis:	milliohms	Resistance shall not exceed 100 milliohms
-	ed failed the above inspections. pairs corrections are required	
certify that this unit conformations been performed as indicated	s to the inspection and test criteria, an ted.	d that scheduled maintenance has
I certify that this unit is validat	ted for service.	
Signature of servi	ce person	 Date

#### **TROUBLESHOOTING**

If you experience operational problems with the microAIR 3500S, the following check points may be helpful:

PROBLEM	WHAT TO CHECK FOR
No inflation; blower cannot be heard	Check the Power Switch is ON and the Power Cord is plugged into a 3 prong receptacle. If the Power Switch does not light, check the electrical outlet for line voltage.
One Air Sack doesn't fully inflate or is totally deflated	Check the Sack for cuts, tears or material separation. Check the hose couplings are fully latched to the Power Unit and Air Sack. Check Hose for leaks.
All Air Sacks are too soft	Increase the weight setting. Listen and feel for air leaks in the system. Follow the setup instructions on page 10. The Air filter may require replacement. Refer to the MAINTENANCE Procedure of this manual.
All Air Sacks are uninflated; the blower is running	Check for air flow from the Power Unit. Check Hose connections.

# SPARE PARTS

#### **OPTIONAL EQUIPMENT**

#### **OPTIONAL EQUIPMENT**

Contact your Invacare customer service representative for supplies and applications assistance.

Air Supply Hoses - Hoses can be supplied for any length.

Incontinence Pads - microAIR incontinence pads are breathable pads used when patients are constantly soiling the bed. The pads are laid on top of the Therapy Pad with the white surface up and the blue surface down. The patient is placed on the white surface. Breathable pads are different from standard, plastic lined products, because they do not interfere with the skin moisture removal capability of the system.

Narrow Mattress Assembly - This Mattress is specifically designed for use with narrow, intensive care beds.

#### **SPARE PARTS**

#### **SPARE PARTS**

A list of available parts is shown below. Contact your Invacare customer representative for supplies and service.

- Air Filter
- Therapy Pad Standard or narrow width
- Air Sacks 28-inches
- Mat Assembly
- Air Supply Hoses standard lengths, color coded: Yellow, Blue, and Green
- Nylon Duffel Bag (for Mattress Assembly)
- Operation and Maintenance Manual
- Power Cord
- CPR Flag/Plug assembly
- Power Unit

#### **APPENDIX**

#### SOURCES FOR GERMICIDAL CHEMICALS

The following companies offer germicidal chemicals through distributors:

Note: Lysol, MadaCide, LpHse, and TBQ are registered trademarks.

#### INFECTION CONTROL INFORMATION RESOURCES

The following resources may be used for additional information:

For US Government documents:	
National Technical Information Service	703-487-4650
The US Government Printing Office	202-512-1803

For HIV and HBV information:

For information regarding chemical germicides and disinfectants:

EPA(Environmental Protection Agency), Antimicrobial Branch........ 202-260-7751

NOTES

#### **WARRANTY**

#### LIMITED PRODUCT WARRANTY

Invacare warrants the microAIR 3500S Power Units to be free of defects in material and workmanship for two (2) years from the date of initial shipment to the Original Purchaser (Purchaser). No warranty shall apply if the goods have been damaged by accident, abuse, misuse, misapplication or as a result of unauthorized or improper service or modifications. Invacare's liability under this warranty, and Purchaser's exclusive remedy, is limited to the cost of materials to repair the defective goods, or to their replacement, and in no event shall exceed the purchase price.

Replacement or repair of defective Power Units under this warranty will be made only upon prepaid return of the defective Power Unit to Invacare. Purchaser shall receive prior return authorization (RA number) and instructions from Invacare before returning goods. Upon receipt of goods under warranty, Invacare will notify Purchaser of the extent of replacement or repair that Invacare will supply under warranty, which shall be conclusive of Invacare's liability.

Invacare warrants Soft Goods for the above referenced microAIR systems to be free of defects in material and workmanship for one half year (180 days) from the date of initial shipment to the Purchaser. Soft Goods means all system components excluding the Power Unit. No warranty shall apply if the goods have been damaged by accident, abuse, misuse, misapplication or because of unauthorized or improper service or modifications. Misuse includes laundering and cleaning of Soft Goods using chemicals that attack the materials. Invacare's liability under this warranty, and Purchaser's exclusive remedy, is limited to the cost of materials to repair the defective goods, or to their replacement, and in no event shall exceed the purchase price.

Replacement or repair of defective Soft Goods under this warranty will be made only upon prepaid return of the defective goods to Invacare. Purchaser shall receive prior return authorization (RA number) and instructions from Invacare before returning goods. Upon receipt of goods under warranty, Invacare will notify Purchaser of the extent of replacement or repair that Invacare will supply under warranty, which shall be conclusive of Invacare's liability.

If your microAIR system requires factory service, always ship in the original shipping box and packing. Thoroughly clean all system components before shipment. Unsanitary systems will be returned without servicing. Invacare is not responsible for incidental or consequential damages resulting from the breech of any expressed or implied warranty, including damage to property and, to the extent permitted by law, damages for personal injury. The warranty contained herein is in lieu of all other warranties, expressed or implied, including implied warranties of merchantability and fitness for a particular purpose. No statement of any Invacare representative shall extend Invacare's liability as herein established or limited.



# INVACARE CORPORATION ONE INVACARE WAY • Elyria, OH 44036-2125

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