

The Leading Innovator in Air Transfer Technology for over 20 years

<u>Users</u> Manual





MEDICAL ELECTRICAL EQUIPMENT WITH RESPECT TO ELECTRICAL SHOCK, FIRE AND MECHANICAL HAZARDS ONLY IN ACCORDANCE WITH UL60601-1 86UD

UL COVERAGE IS FOR THE AIR SUPPLY ONLY

Power Requirements: 115Vac 10%, 60HZ, 9.0A or 1100 W max.



DANGER Risk of explosion if used in the presence of flammable anesthetics

Indications

Patients weighing up to 1,200 lbs.

Patients whose body weight and size pose a significant risk or care management issue to the patient or staff during performance

of routine nursing care.

Patients requiring a lateral transfer.

Contraindications

Patients with total weight in excess of 1,200 lbs. Unstable cervical, thoracic and/or lumbar fracture

Precautions

Ensure side rail of the opposite side of the receiving surface, ie; bed/gurney, is raised and locked and that caster brakes are engaged

prior to transfer.

Rev. 2-16-05

System Description

Each AirPal® System consists of the following components: The patient transfer Transfer Pad, the air supply, and the Sani Liner.

- 1. Pull straps
- 2. Patient restraint straps
- 3 Air entry positions
- 4. Flexible air hose
- 5. Air supply motor and canister
- 6. Air supply power cord
- 7. Stand



Transfer Pad

The Transfer Pad is sewn construction consisting of a vapor permeable nylon twill fabric which has been treated with the following: A bacteria check coating, which prevents the growth of bacteria; a urethane coating, making the material water-proof; and a stat check coating, which prevents the build up of static electricity. The total length of the Transfer Pad is approximately 78 inches. The underside is perforated for air release. Upon inflation, a frictionless surface, literally a "cushion" of air is formed, upon which the patient is moved almost effortlessly.

UL 60601-1 Approved Air Supply

The low pressure air supply is connected to any standard wall outlet with a hospital approved plug. It is equipped with a two micron filter which may be washed, sterilized and reused. It comes with a flexible hose which is easily connected to the Transfer Pad. Also included is a hanging device which permits the air supply to be attached to, and transported with, any stretcher.

Sani-Liner

The Sani-Liner is a nylon twill type fabric which has been treated with the following: A bacteria check coating, which prevents the growth of bacteria; a urethane coating, making the material water-proof; and a stat check coating, which prevents the build up of static electricity. The Sani-Liner is used to facilitate a patient transfer either on or off an eggcrate. It may also be placed between the patient and the Transfer Pad for infection control purposes.

Operating Instructions

Placing the patient on the AirPal® Transfer Pad

Generally the patient is placed on the Transfer Pad while in the hospital bed. Roll the Transfer Pad lengthwise toward the center. Note: Care must be taken to ensure that the patient is placed on the non-perforated side of the Transfer Pad with the feet at the air entry end. The patient may be approached from either side and log rolled toward the attendant. The rolled section of the Transfer Pad is now placed against the patient where his body comes in contact with the bed. Roll the patient back and slightly to his



opposite side. Proceed to unroll the Transfer Pad as you would when changing a sheet. To ensure the safest and most efficient transfer, the patient should be on the center of the Transfer Pad. If the patient is off to one side, repositioning of the Transfer Pad will be necessary.

After placement on the Transfer Pad, the patient should be secured by the restraint straps, The restraint straps should be in gentle contact with the patient, not drawn up tight.

After the patient is secured, the air hose is inserted in the Transfer Pad.



Setting up the Air Supply

Plug the power cord into the nearest standard wall receptacle where the AirPal® is to be used. One end of the flexible air hose is already attached to the unit. The other end is inserted into the opening at the foot of the Transfer Pad. Align the snap fitting on the air hose with the snap closure on the flap of the Transfer Pad, close the snap and secure in place. The Transfer Pad has two openings for the air hose, both at the foot of the Transfer Pad, one on each side. Choose the side which will permit free travel of the hose without binding. If the air supply is not attached to the stretcher, it should be located next to the attendant making the transfer. This provides easy access to turn the unit on for transfer and off immediately after transfer. The air supply is turned on and off by depressing the on/off switch on the canister.





Operating Instructions

Positioning the transfer stretcher

After patient is placed upon the AIRPAL®, the transfer stretcher is brought alongside. Securely engage the brakes. Raise stretcher side rail on opposing side. Location should be such that after transfer, the patient will be centered longitudinally on the stretcher.

Typical transfer of patient

Confirm that no handrail, accessory or sharp object obstructs the area over which the Transfer Pad will pass, and that the air hose is free of obstructions to move with the Transfer Pad while transferring.

Make sure that any patient support systems such as I.V. lines or oxygen hoses are free to move with the patient.

Turn on the air supply, grasp the pull straps and with one firm continuous pull, move the patient towards attendant to the desired surface. Raise the side rail of the stretcher. With certain patients it may be desired to have a slower rate of inflation for the Transfer Pad. In this event, place the heel of your hand on the Transfer Pad directly in front of the air input and depress as the air supply is turned on. The amount of pressure determines the flow of air which is permitted into the Transfer Pad.

Turn off the air supply. Never leave your patient unattended with the air supply on. The AirPal® can move so easily on some surfaces that with the air applied, movement could take place without assistance from attendants.





Typical transfer conditions

Conditions vary with the many surfaces the AirPal® is designed to accommodate. Surface textures, space between adjacent transfer surfaces, and different elevations are the most important considerations.

a. In general, the harder and smoother the surface, the easier the AirPal® glides. It is therefore necessary to use caution when transferring onto such surfaces as x-ray tables or smooth cushioned stretchers, to prevent the patient from traveling too far. The transferring attendant should always pull the patient toward him, using his body as additional assurance of controlling the transfer. When possible a second attendant on the opposite side of the patient assisting with the transfer provides additional security for both staff and patient. Whenever possible, it is advantageous to have the surface you are transferring to, lower than the surface you are transferring from. This way gravity works with you for an easier move.

Caution: Always have the side rail of the receiving stretcher on the opposite side of the bed in the raised and locked position and the wheel locks must be engaged prior to transfer.

b Use a Diagonal Transfer Method The preferred method of lateral transfer is accomplished by first pulling the patient's upper torso so that it leads the foot section by 16-24 inches. As the upper torso nears the desired location, diminish the pull on the upper torso while continuing to pull the foot section to the final position. This assists the transfer and adds to the patient's sense of security and comfort in the transfer.

Location and Storage

General Transportation

The AirPal® may be used wherever a lateral transfer is necessary throughout the hospital. Hospitals vary in their system of transporting patients. Two suggested ways of introducing the AirPal® into a transport system are:

If the stretchers are kept in a central location or at a central transport station - the AirPal® Transfer Mattress and Air Supply can be kept with the stretcher and can be dispatched with the transporter upon request. The stretcher and AirPal® unit are then returned to the central location when transport is completed.

If the stretchers are kept in areas other than one central location - The equipment should be located near each nurse station or in a convenient storage area. When the stretcher arrives for transport, the AirPal® equipment is placed on it, and taken to the patient's room. The patient is placed upon the transfer Transfer Pad, is transported and can remain on the Transfer Pad for scheduled procedures until the return to his bed at which time the AirPal® is removed, cleaned and returned to the designated storage area.

Departments

If the equipment is to be used exclusively for certain departments, and not hospital-wide, the product should be stored within the department itself or in a convenient storage area on each of the nursing floors

Utilization by Department

Nursing

Nursing should be well aware of procedures within this manual indicating proper use of the AirPal® system. The AirPal® virtually accommodates all patients and all departmental procedures (i.e. x-ray, CT Scan, nuclear medicine, radiation therapy, OR, and cardiac catheterization). The Sani-Liner accommodates transfers on and off of porous surfaces.

Radiology, CT Scan, Nuclear Medicine and MRI

X-Ray and Nuclear Medicine - Occasionally procedure tables impose certain restrictions not found in other areas of the hospital. These tables sometimes have narrow or extra wide surfaces or the equipment itself prohibits the technician from being able to reach across to assist with the transfer. In this event, it is desirable to utilize two staff members to make the transfer, one at the head and one at the foot. Always have the side rail in the raised position on the opposite side of the receiving stretcher. When the air supply is turned on, each attendant grasps the pad, one hand on each corner of the AirPal®, transferring the patient to the desired location before turning the air supply off. One advantage of this technique is that total control is maintained over the patient as he is transferred onto the hard and slippery surface of the table. This method may be used in other hospital applications and is also advantageous with heavy patients or acute patients with high pain levels.

CT Scan - Of particular advantage to the CT department is the flexibility of the Transfer Pad while inflated. After the patient is transferred into the body tray, the head region of the AirPal® can be folded under and by cradling the head with one hand, the patient can be easily moved longitudinally into the headrest to complete a head scan. The air is turned off, the scan is completed, reverse the procedure to place the patient back onto the stretcher. The Transfer Pad accommodates all CT Scanners and does not produce artifacts.

MRI - There is no metal in the Transfer Pad, however the air supply does have metal parts. For this reason, the AirPal® system may be specially fitted to accommodate this department with a hose length so that the air supply can be left outside the room, if desired.

Emergency Room

The AirPal® Transfer Pad is placed on a stretcher awaiting the emergency case. The trauma victim is placed directly on the AirPal® upon his arrival. If the victim arrives on a hard board, it can be placed directly on the AirPal® until the patient is stabilized The patient can then be transported to X-Ray, CT Scan, fracture table or other procedures without further turning or aggravating their condition.

Portable X-Rays - The AirPal® is radio lucent and permits simple and accurate placement of X- ray cassettes eliminating the need to rotate the patient. With the AirPal® inflated, slide the x-ray cassette underneath the Transfer Pad near the desired location. The patient now can now be easily be positioned over the cassette for precise placement. Turn off the air supply and proceed. Re-inflate the Transfer Pad to remove the cassette.

The Sani-Liner is used to prevent excessive amounts of blood or body secretions from coming in contact with the Transfer Pad, as in the case of a trauma patient. The Sani-Liner is placed between the patient and the Transfer Pad and under what is to be transferred with the patient (chucks, incontinent pads etc.). After use, when the Sani-Liner and Transfer Pad are removed, both are to be sterilized by laundering or cleaning with the approved appropriate cleaning fluid.

Operating Room and Recovery Room

The AirPal® may be used on the OR table during procedures. The Sani liner is also used sometimes to further limit fluid contact with the AirPal® by placing it under the patient and on top of the AirPal®. In the event the AirPal® is not used on the table, it may be placed on the recovery litter to assist though out recovery and transfer to the Med - Surg. Unit

Oncology - Radiation Therapy

The properties of the materials that make up the AirPal® Transfer Pad allow it to be used during Radiation Therapy procedures. However, if the opinion of the department suggest otherwise, the Transfer Pad may still be used during transfers and then just folded away from the area of the body which is to receive treatment.

Cleaning/Laundry Instructions

Transfer Pad and Air Supply:

Wipe down after each use utilizing a properly diluted EPA approved germicidal cleaning solution, quaternaries, alcohol (70% isopropyl of Ethyl) or bleach solution diluted 1:10, or your hospital approved solution.

Procedure:

- 1. Protective clothing must be worn when handling contaminated items.
- 2. Apply approved solution to transfer pad per your hospital protocol
- 3. Remove ALL visible soiling and wipe off excess solution
- 4. Disinfect the clean surface with proper mixed concentrations of chlorine solution.
- 5. Allow to air dry.

Soils and Stains:

- 1. Soils or Stains: Wipe fabric clean with neutral suds and lukewarm water. Rinse with water
- 2. Hard to Clean Spots: Use standard liquid household/vinyl cleaners and/or soft bristle brush. Pre-soak as needed
- 3. Disinfection: Dilute disinfectants and/or germicides as specified on manufacturer's product label

Laundry Procedure Transfer Pad and "Sani-Liner":

- 1. Pre-rinse to loosen soil
- 2. Place in washing machine with proper concentrated detergent, stain away bleach, anti-chlorine. Rinse cycle, add anti-chlorine liquid and neutralizer to control final pH.. The use of bleach (1 cup) during the washing cycle is strongly recommended.
- 3. When cycle is completed, remove to tumble dryer and dry at optimum temperature recommended for fabric (not to exceed 140 degrees F temperature).

DO NOT IRON

Strict adherence to above described laundry procedures must be maintained. Failure to follow recommended procedures may prove harmful to fabrics resulting in loss of expected useful life and voiding of the warranty.