## **Supine Stander**

E420 & E430 Product Manual



E420 Small Supine stander





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## **IMPORTANT**

Please save this product manual for future reference. Additional copies are available

# Key for users Use this key to determine which sections of this product manual apply to you. Image: Technical Users For professionals who order and set up Rifton products. Image: Home Users For care-givers who use Rifton products on a regular basis.

**Maintenance Personnel** For anyone who is responsible for service or re-ordering of Rifton products and parts.





- Thoroughly read and understand the information in this product manual before attempting to use this product. If the procedures and instructions in this product manual are not followed, serious injury or death could occur.
- A qualified professional must assess the appropriateness and safety of all equipment for each user.
- This product is intended for use by clients of unreliable judgment. Adult supervision is required at all times.
- To prevent falls and injuries:
  - Do not use this product on rough and uneven terrain, around swimming pools, or near stairways.
  - Ensure the appropriate use of straps and supports at all times. Straps and supports are provided for the safety of the user and must be carefully adjusted for comfort and security.
  - Tighten all adjustment knobs before use and immediately after making any adjustments.
- Do not use this product for clients outside the height and weight limits specified in this manual.
- To prevent structural failure, which may result in serious injury or death:
  - Inspect this product and accessories regularly for loose or missing screws, metal fatigue, cracks, broken welds, missing attachments, general instability or other signs of excessive wear.
  - Immediately remove this product from use when any condition develops that might make operation unsafe.
  - $\circ~$  Do not use Rifton components or products for any purpose other than their intended use.

## Recommended use 1 🕯 Y

#### **A**WARNING

## To prevent falls and injury, do not use the Supine Stander as a transportation device.

The Rifton Supine Stander is a Class 1 medical device. It supports the user in the standing position. The Supine Stander differs from a tilt table in that it allows much greater control of the head, trunk, pelvis, knees and feet while allowing variable weight-bearing. It is especially suitable for users who lack sufficient anti-gravity control of the head and shoulder girdle.

For users who have sufficient head and upper trunk control, the headboard folds down to encourage independence.

The E430 large Supine Stander is recommended for children/adults between 46''-72'' (117 cm -183 cm) tall and up to 250 lbs (114 kg).

The E420 small Supine Stander is recommended for children/adults between 30'' - 50'' (75 cm - 25 cm) tall and up to 100 lbs (45 kg).

## User and item dimensions 1 🕯 💡

User dir	nensions–inches (cm)	small	large
Height		30-50 (76-127)	46-72 (117-183)
	<b>Key user dimension: height</b> Select the appropriate Stander by t Choose the model that allows for g		
	<b>Important:</b> User's weight must not exceed the maximum working load.		

Item dimensions-inches (cm)	small	large
Board length and width	53 x 16½ (135 x 42)	73 x 19 (185 x 48)
Distance between laterals	7–13 (18–33)	9-16 (23-41)
Height when horizontal	281/2 (72)	21-30 (53-76)
Height when vertical	54½ (138)	74 (188)
Base length and width	37½ x 27 (95×69)	46½ x 29½ (118x75)
Max. working load in lbs. (kg)	100 (45)	250 (114)



## Check your order 👤 🟦 🖞

This product comes in a single carton, containing:

- 1. Supine Stander (includes padding, footboard, adjustable armrests, hip strap, chest strap, leg straps, one pair of laterals, one pair of head blocks and double-locking casters).
- 2. Accessories for the Supine Stander.

You may not have ordered all of the available accessories, but use the diagrams that follow to confirm that your order is complete.

## Basic components 1 🔒

Headboard (see Figures 6a and 6b)

**WARNING** To prevent spinal injury, ensure the headboard is in place before tilting the client to a horizontal position.

To prevent pinching or crushing, ensure that all body parts are clear of the joint between headboard and mainboard during adjustment.

#### Attaching headboard:

Lift the headboard, slide the cleat (A) into frame slot, and tighten the cleat knob (B) (see Figure 7a).

#### Attaching head blocks:

- 1. Loosen two knobs (C) on the head block adjusting clamp.
- Remove the lateral with curved bracket (D), turn upright, and insert bracket into clamp.
- Slide curved bracket into clamp past the safety dimples to desired spacing. Brackets must overlap if spacing of less than 8" is required.
- 4. Tighten both knobs (C) to secure the head block.
- 5. Repeat this procedure on the second head block.

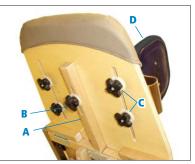


Figure 6a



Figure 6b. Headboard with headblocks attached.

#### Adjusting headboard: (see Figure 6a)

Position headboard by raising it and sliding cleat (A) into the frame slot. Tighten cleat knob (B). If headboard is not needed, slide cleat up, tighten knob, and fold the headboard down.

#### Adjusting head blocks:

Loosen the two knobs on the clamp, slide the block to the desired position, and tighten knobs securely.

#### Footboard

To prevent falls, ensure the footboard tilting the client to a

is in place before tilting the client to a vertical position.

To prevent pinching or crushing, correctly position the footboard at the appropriate height before placing the client on the footboard.

To prevent injury, lock all four casters at all times, regardless of whether or not the product is occupied, except when moving the stander from one location to another.

Attaching sandals: (see Figure 7a)

Either large or medium sandals can be attached to the footboard.

- 1. Insert carriage bolts with bushings through the bottom of the footboard.
- Insert sandal base onto bolts and adjust sandal before tightening knobs (A) securely.
- 3. Place sandal onto base and lock into place with latch (B).



Figure 7a



#### Adjusting sandals:

To adjust sandals, loosen knobs (A), move sandals to the desired position, and tighten knobs. Sandal height can be built up or a toe/heel angle achieved by using one or more wedges (see Figures 8a and 8b).

#### Attaching sandal wedges:

To add a wedge, unlatch and remove sandal from the base, place wedge over the base and latch it into place; any number of wedges can be added. Place and latch the sandal on top of the wedges.

#### Adjusting footboard:

The footboard can be adjusted to accommodate users of varying heights. Loosen the clamp knobs (C), move board to the desired height, and tighten knobs securely. For the user's security, footboard is best left as close as possible to the floor (see Figure 8b).

#### Adjusting the casters:

Swivel casters allow the Supine Stander to be moved easily. The foot-operated brake, locks both the wheel and the swivel simultaneously.



Figure 8a



Figure 8b

# Small Supine Stander mainboard (E420) 1

#### Adjusting the mainboard:

The hand crank (A) controls the transfer height adjustment and the tilt angle of the mainboard. By turning the crank, the board will begin to tilt. Continue to turn the crank until the desired angle is reached (see Figure 9a).

Tilt angle is indicated on the board angle label. This can be used to record the correct angle setting for each user.

#### **Attaching laterals:**

Laterals (B) ship unassembled. Follow instructions below to attach them.

- 1. Remove knob and plastic washer, leaving rubber washer on the lateral.
- 2. Slide the bolt of the lateral through the slot in the board.
- Replace knob (C) and plastic washer on bolt on back of board, and tighten knob (C) securely (see Figure 9b).

#### Adjusting laterals and straps:

Any lateral or strap can be adjusted in and out or up and down. To adjust in or out, loosen the appropriate knobs, slide the lateral or strap to the desired position, and tighten the knobs securely.

To adjust up and down or to completely remove a lateral or strap, loosen the knob(s) completely and remove the lateral or strap. The lateral or strap can then be moved to a different set of slots, and the knobs tightened securely.



Figure 9a



Figure 9b



#### Adjusting hip and leg straps:

#### 

To prevent falls and injury, secure the strap

#### safety closures (A) when in use.

To adjust height of hip and leg straps, pull back of strap away from hook-and-loop fabric at back of the mainboard, slide strap to the desired height, and secure hook-and-loop fabric (see Figure 10a).

#### Adjusting armrests:

#### **A**WARNING

#### To prevent pinching or crushing, ensure body

parts are clear of potential crush points while adjusting armrest.

To adjust height of armrest, loosen both knobs (B), slide armrest to desired position, and tighten knobs securely. To adjust angle of armrest, loosen the bottom knob only, lift or lower front of armrest to desired position, and tighten knob securely (see Figure 10a).

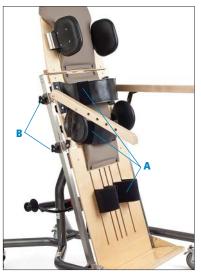


Figure 10a

## Large Supine Stander mainboard (E430) 1 🔒

#### Adjusting the mainboard:

The hand crank (A) controls transfer height adjustment and the tilt angle of the mainboard. By turning the crank, the board in its horizontal position will move vertically from 21" to 30"(53cm to 76cm) and then begin to tilt. Continue to turn the hand crank until desired angle is reached (see Figure 11a).

Tilt angle is indicated on the board angle label (B). This can be used to record the correct angle setting for each user.

#### **Attaching laterals:**

Laterals (B) ship in reverse position.

To reposition laterals:

- Loosen knobs (C) and slide laterals out from under the clamp.
- Rotate laterals into correct position and replace them under the clamp.
- Tighten knobs (see Figure 11c).

Use knobs (C) to adjust the laterals laterally and vertically.

#### Adjusting laterals and straps:

Any lateral or strap can be adjusted in and out, or up and down. Loosen the two knobs on the appropriate clamp, slide lateral or strap to the desired position, and tighten knobs securely.

To completely remove a lateral or strap, loosen clamp knobs enough to slide bracket out past the safety dimples (D). The lateral or strap can then be moved to a different set of clamps and the knobs tightened securely (see Figure 11c).

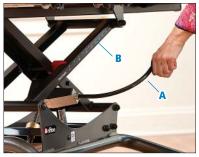


Figure 11a

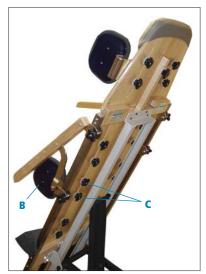


Figure 11b

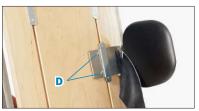


Figure 11c



#### Adjusting laterals and straps cont.

If you are using the large Supine Stander for a client whose head does not extend above the mainboard, remove the head blocks and the two clamps. Remount the clamps in the top slots of the mainboard. Attach the head blocks as described on page 6.

#### Adjusting hip strap:

**AWARNING** To prevent falls and injury, secure the strap safety closures (C) when in use (see Figure 12a).

It is possible to place the hip strap (A) in line with the laterals. Loosen the clamp knobs enough to allow the hip strap's metal bracket to lie on top of the lateral. Tighten clamp knobs securely.

#### Adjusting leg straps:

To adjust height of leg strap, pull back of strap away from hook-and-loop fabric at back of the mainboard, slide strap to the desired height, and secure hook-and-loop fabric.

#### Adjusting armrests:



To prevent pinching or crushing, ensure body

parts are clear of potential crush points while adjusting armrest.

To adjust height of armrest, loosen both knobs (B), slide armrest to desired position, and tighten knobs securely. To adjust angle of armrest, loosen the bottom knob only, lift or lower front of armrest to desired position, and tighten knob securely (see Figure 12a).

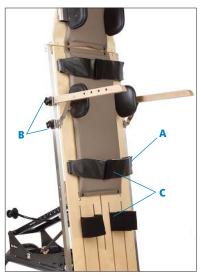


Figure 12a

## Accessories 1 🔒

#### Tray

#### Attaching the tray:

A tray can be fitted to the armrests. Position both armrests at the same height and angle. Attach tray by inserting the tray latches into appropriate armrest holes (see Figure 13a and 13b).

#### Adjusting the tray:

The tray can be adjusted in and out by opening the tray latches and moving them to a different set of holes in the armrests (see Figure 13b).



Figure 13a



Figure 13b



#### **Hand Anchors**



To prevent falls and

resulting injury, do not use Rifton Anchors as a primary support or as a standing support. Suction cups may release.

To prevent falls and cuts, do not use Rifton Anchors on thin glass.

#### **Recommended use**

Hand Anchors can be used on any of our available trays. They give the client an anchor to control excessive movement of the arms and encourage stabilization of the shoulder girdle. The client may hold on with both hands for stabilization training or with one hand, keeping the other hand free.

#### Operation

On a clean smooth table or tray, press down on suction cup and turn handhold clockwise until secure. To remove, turn handhold counterclockwise.

**Tip:** Surface must be very smooth and completely clean to get a strong seal. If suction cup does not hold well, wipe with a damp cloth or apply a thin layer of petroleum jelly around the rim of the rubber pad to enhance the vacuum.



Figure 14a

#### **Arm Anchors**



To prevent falls and

resulting injury, do not use Rifton Anchors as a primary support or as a standing support. Suction cups may release.

To prevent falls and cuts, do not use Rifton Anchors on thin glass.

#### **Recommended use**

The arm Anchor is intended to stabilize one arm on a table or tray, or as a pair to stabilize both arms. Providing increased stability to the forearm, arm Anchors may be beneficial for head and trunk control to allow functional use of the free arm.

#### Adjustment

Arm and wrist straps can be adjusted and secured with hook-and-loop fasteners. Move handhold backward and forward or rotate by loosening the knob.

#### Operation

On a clean smooth table or tray, press down on suction cup, and lower lever. Place arm on arm Anchor pad and secure it with arm and wrist straps. If suction cup does not hold well, wipe with a damp cloth or apply a thin layer of petroleum jelly around the rim of the rubber pad to enhance the vacuum.



Figure 15a



## Adjustable abduction wedge

(see Figure 16a)

#### Attaching

Remove the knobs (A) and one washer off each threaded stud.

- Place abduction wedge in appropriate slot with one plastic washer on each threaded stud between wedge and stander.
- Put the second washer on each of the threaded studs between knobs and stander.
- 3. Thread and tighten knobs securely.

#### Adjusting

To adjust the amount of abduction, raise one wing of the wedge to expose the adjustment screw (B). Turn screw out to increase abduction. Raise the second wing, and adjust it in the same way.

## **Round abductor**

(see Figure 16b)

#### Attaching

To attach the round abductor, remove the knob and place where appropriate. Re-tighten knobs securely.

## Collar

(see Figure 16c)

#### Attaching

To attach the collar, wrap it around the round abductor, and fasten snaps.

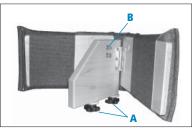


Figure 16a



Figure 16b



Figure 16c

## Operation 1

- 1. To prevent falls and injury, lock all four casters.
- 2. Crank the Supine Stander to desired horizontal height for ease of transfer.
- 3. Slide the armrest and the lateral away from the transfer area. Open the chest, hip and leg straps.
- 4. Make sure that both the headboard and footboard are in place before transferring the user.
- 5. Transfer the user onto the Supine Stander in a horizontal position, and make final adjustments to all straps, ensuring that the safety closures on the straps are secure.
- 6. Adjust the head block and laterals.
- 7. Secure the user's feet in the sandals and adjust positioning.
- 8. Adjust the armrests to the user's elbow height, and set to the appropriate angle.
- 9. Make any final adjustments, ensuring that everything is in place, and that all knobs are tight and secure.
- 10. Crank the Supine Stander to the desired angle as indicated on the board angle label.
- 11. Attach tray on armrests if desired.



## Maintenance ¥

This product is designed and tested for an expected life of 5 years when used and maintained in accordance with this manual. At all times, users must ensure that the product remains in a safe and useable condition, including regular maintenance and inspections as specified in the manual.

To prevent structural failure, which may result in serious injury or death:

- Inspect this product and accessories regularly for loose or missing screws, metal fatigue, cracks, broken welds, missing attachments, general instability or other signs of excessive wear.
- Immediately remove this product from use when any condition develops that might make operation unsafe.
- Do not use Rifton components or products for any purpose other than their intended use.
- Replace or repair components or products that are damaged or appear to be unstable.
- Use only Rifton authorized replacement parts. Order information for replacement parts is provided on the back of this product manual.

**Twice a year** lubricate all four casters. Apply a drop of light oil to the ball bearings and to the axle on each side of the caster wheel.

**Once a year,** check the lubrication of the threaded rod. If it seems dry, apply a general purpose grease to the length of the rod.

## Cleaning 1 🔒 Y

Clean with disinfectant wipes or a solution of up to 10% bleach. Do not use excessive water on pads and wooden surfaces.

Clean tray with mild soap or detergent. Avoid abrasive cleaners and aromatic spirits. Disinfectants can be used, but no solvents. Never scrape with razor blades or other sharp instruments. Do not clean in hot sun or at elevated temperatures. Do not send through a dishwasher.

The components of the arm Anchor can be removed for cleaning. Wipe clean with disinfectant wipes or a solution of up to 10% bleach.

## Warranty Statement 1 🕈 🕈

If a Rifton product breaks or fails in service during the first year, we will replace it free of charge.

## Materials ¥

- Steel hardware items (nuts, bolts, screws, etc) are typically zinc or nickel plated, or stainless steel.
- Upholstery items (pads, support blocks, padded prompts, etc) are typically polyurethane foam with a fire-retardant cover made from expanded vinyl.
- Frames are typically steel or aluminum tubing, welded together, and coated with a baked-on paint finish. Some frame components may also be stainless steel.
- Straps are typically made of polypropylene or nylon webbing.
- Wooden components are typically birch plywood, solid maple, or laminated hardwood veneers, finished with a clear polyurethane lacquer.
- Plastic components are typically injection molded from a variety of industrial resins.

All materials are latex, lead and phthalates free.

## User modifications 👤 🔒 💡

**WARNING** To prevent serious injury or death, do not modify or alter Rifton products or components, or use Rifton products or components in conjunction with products from other manufacturers. Rifton does not accept responsibility for any modifications or alterations made to our components or products after they leave our premises. Customers modifying or altering our components or products, or using them in conjunction with products from other manufacturers, do so at their own risk.



## To order replacement parts

- 1. Locate the ID number of the product on the small white label.
- 2. Have this number available when you call **800.571.8198** for your customer service representative.

#### Use only replacement parts supplied by Rifton Equipment.

We are glad to supply replacement parts. Although Rifton makes every effort to supply correct parts and instructions for repairing or refurbishing your equipment, you are responsible to make sure that the repairs or modifications are correctly and safely completed.