

MedSurg Bed

Model FL23SM
(Manual)

stryker[®]

Operations Manual



For Parts or Technical Assistance:
USA: 1-800-327-0770 (option 2)
Canada: 1-888-233-6888

CE

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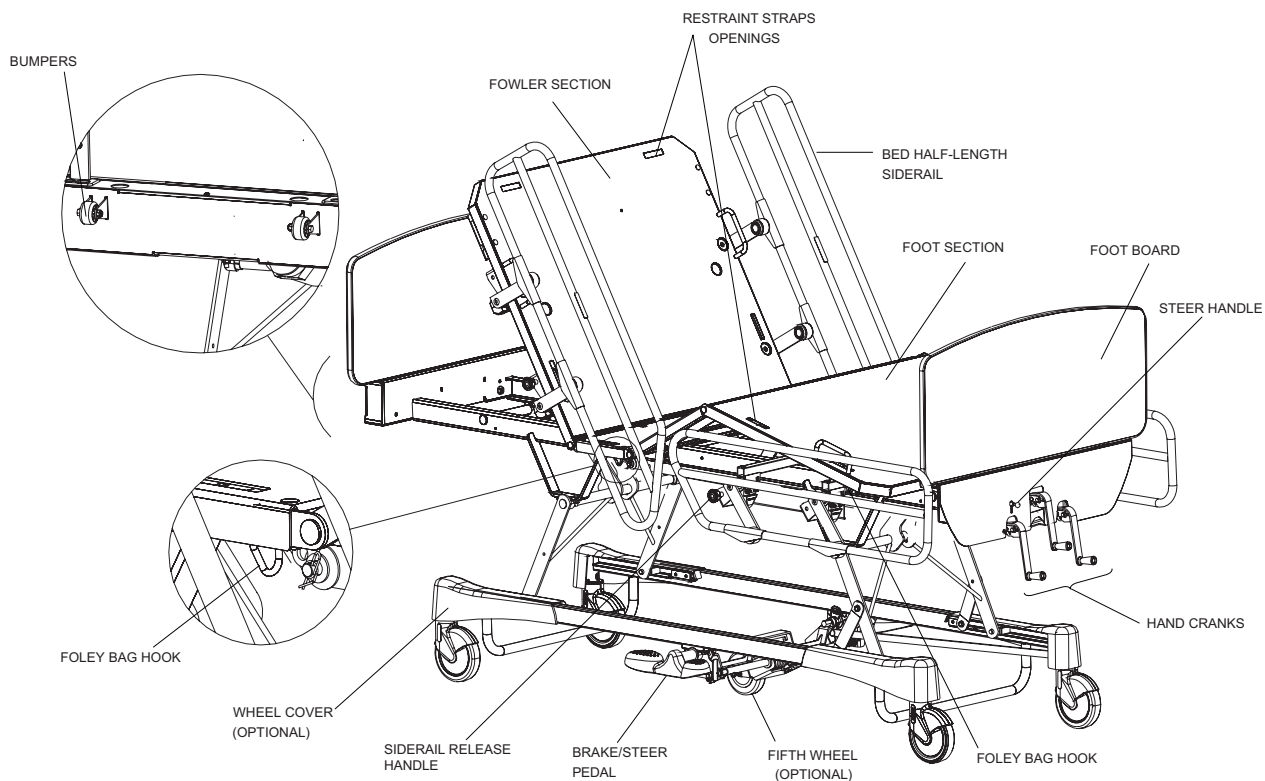
 International Warranty Clause 35

Introduction

INTENDED USE


This manual is designed to assist you with the operation of the Stryker MedSurg Bed Model FL23SM (Manual). Carefully read this manual thoroughly before using the equipment. To ensure safe operation of this equipment, it is recommended that methods and procedures be established for educating and training staff on the safe operation of this bed.

PRODUCT ILLUSTRATION



Introduction

SPECIFICATIONS

	Safe Working Load*		500 lb	227 kg
	Note: Safe Working Load indicates the sum of the patient, mattress, and accessory weight.			
Overall Length/Width	Half-Length Siderails Raised		90.4 x 41.3"	2296 x 1049 mm
	Full-Length Siderails Raised		90.4 x 39.9"	2296 x 1013 mm
Weight with Boards			390 lb	176 kg
Patient Sleep Surface			35 x 78"	89 x 198 cm
Recommended Mattress Size	Length/Width		36 x 78" or 80"	89 x 198 cm or 203 cm
	Maximum Thickness		6"	15.24 cm
Minimum/Maximum Bed Height			15" to 29"	38.1 to 73.66 cm
Fowler Angle			0 to 62°	
Knee Gatch Angle			0 to 32°	
Trendelenburg/Reverse Trendelenburg			+14° to -14°	

Stryker reserves the right to change specifications without notice.

Specifications listed are approximate and may vary slightly from unit to unit.

Note

* The Safe Working Load for the beds with the BNQ Standard is 390 lb (176 kg).

WARNING / CAUTION / NOTE DEFINITION

The words WARNING, CAUTION, and NOTE carry special meanings and should be carefully reviewed.

WARNING

Alerts the reader about a situation, which if not avoided, could result in death or serious injury. It may also describe potential serious adverse reactions and safety hazards.

CAUTION

Alerts the reader of a potentially hazardous situation, which if not avoided, may result in minor or moderate injury to the user or patient or damage to the equipment or other property. This includes special care necessary for the safe and effective use of the device and the care necessary to avoid damage to a device that may occur as a result of use or misuse.

Note

This provides special information to make maintenance easier or important instructions clearer.

Symbols



Warning, consult accompanying documentation



Safe Working Load Symbol

Summary of Safety Precautions

Before operating the bed, it is important to read and understand all information in this manual. Carefully read and strictly follow the safety guidelines listed below.

WARNING

- This bed is not intended for pediatric use i.e., for any patient measuring 90 cm (35") or less.
- The mattress thickness should never exceed 15.24 cm (6").
- The hand cranks must be retracted under the bed after use to avoid injury to people walking around the foot end of the bed.
- Do not use an accessory that slides under the bed frame when the bed is in low position or remove it before lowering the bed. Failure to conform to this safety precaution could result in patient injury and/or equipment damage.
- Always apply the brakes when a patient is on the bed or entering/exiting the bed. Serious injury could result if the bed moves while a patient is getting on or off the bed. After the brake pedal is engaged, push on the bed to ensure the brakes are securely applied.
- When the patient is unattended and unless the patient's medical condition dictates otherwise, keep the sleep surface horizontal in its lowest position and the siderails fully raised. When raising the siderails, be sure that you hear the "click" that signals the locked condition. Pull firmly on the siderail to ensure it is locked into position.
- When the sleep surface sections are articulated, ensure that all the patient's limbs are within the raised siderails to avoid patient injury.
- When a patient's condition requires greater safety measures for his/her security install protective pads (optional) on the siderails.
- Improperly adjusted restraint straps can cause serious injury to a patient. It is the responsibility of the attending medical personnel to determine proper use of restraint straps and restraint strap locations. **Stryker is not responsible for the type and/or use of restraint straps on any of Stryker's products.**
- Siderails, with or without their padded covers, are not intended to serve as restraint devices to keep a patient from exiting the bed. Siderails are designed to keep a patient from inadvertently rolling off the bed. It is the responsibility of the attending personnel to determine the degree of restraint necessary to ensure a patient will remain safely in bed. Failure to use the siderails properly could result in serious patient injury.
- To reduce risk of injury, ensure the sleep surface is horizontal and in the lowest position with the siderails fully raised and locked when moving the bed with a patient in it.
- To avoid injury to the patient and/or user, do not attempt to move the bed laterally with the steer mode (optional) engaged.
- Inspect the mattress after each use. Discontinue use if any cracks or rips, which may allow fluid to enter the mattress, are found in the mattress cover. Failure to properly clean the mattress, or dispose of it if defective, may increase the risk of exposure to pathogenic substances and may bring about diseases to the patient and user.
- Preventative maintenance should be performed at least once a year to ensure all bed features are operating properly. Ensure that any bed malfunction is promptly reported to your service personnel for immediate attention.
- To avoid damage to the siderail mechanisms, do not move the bed using the raised siderails. Use the head or foot board to move the bed.
- When servicing, use only identical replacement parts provided by Stryker.

Note

Throughout this operations manual, the words "right" and "left" refer to the right and left sides of a patient lying face up on the bed.

Setup Procedures

CHECKLIST

It is important to ensure that the bed is working properly before it is put into service. The following list will help ensure that each part of the bed is checked.

- Install and remove the head and foot boards. Ensure their installation and removal is smooth. See “Head and Foot Boards Operation”, [pg. 15](#).
- On both sides of the bed, depress fully down the side of the pedal identified with a red sticker and ensure that the brakes are applied and the bed immobilized. Toggle the pedal to neutral and ensure the brakes are released. See “Applying the Brakes”, [pg. 12](#).
- On both sides of the bed, depress fully down the side of the pedal identified with a green sticker and ensure that the steer mode (bed steer caster or optional fifth wheel) is engaged. Toggle the pedal to neutral and ensure that the steer mode disengages. See “Moving the Bed”, [pg. 13](#).
- Ensure that the siderails raise, latch in the up position and lower smoothly. Ensure the release levers work properly and return to their initial position when released. See “Positioning Siderails”, [pg. 14](#).
- Fully raise the bed and fully lower it. Movement should be smooth. See “Bed and Sleep Surface Section Elevation”, [pg. 10](#).
- Ensure the Trendelenburg positioning mechanism is working properly. See “Trendelenburg Positioning”, [pg. 11](#).
- Raise and lower the Fowler and Knee Gatch sections. Ensure they operate smoothly and return to flat position. See “Bed and Sleep Surface Section Elevation”, [pg. 10](#).
- Verify the optional equipment for proper operation (see documentation accompanying each accessory or the “Optional Bed Accessories”, [pg. 18](#)).

If any problems are found during the bed setup procedure, contact our Technical Service department.

Operation Guide

BED AND SLEEP SURFACE SECTION ELEVATION

The three hand cranks at the foot end of the bed allow the setting of the bed height and the mattress support sections. The hand cranks are retracted under the bed between uses.

Also available is an optional single hand crank not attached permanently to the bed. The crank replaces the three standard cranks. It has to be removed and stored after each use.

WARNING

- When the sleep surface sections are articulated, ensure that all the patient's extremities are within the raised siderails to avoid patient injury.
- Hand cranks must be retracted under the bed after use to avoid injury to people walking around the foot end of the bed.

CAUTION

Ensure that the clutch is retracted before using the hand crank.

STANDARD OR SINGLE (OPTIONAL) HAND CRANK USAGE

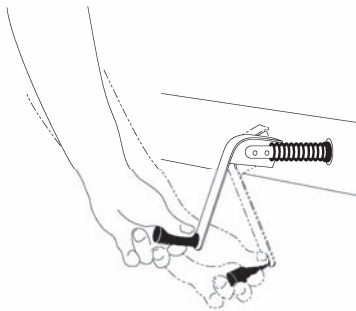


Figure 2.1A

The difference between the single (optional) and the standard crank lies in the fact that the former is not permanently attached to the bed. The principle of use is the same in both cases, except that the single crank must first be inserted in the suitable opening to raise or lower the desired section.

- **To extract a retracted standard hand crank (Figure 2.1A):**
Pull the hand crank handle toward you. The crank is ready to use.

- **To set the bed height or a mattress support section:**
Turn the appropriate hand crank in the direction indicated on the pictogram located over the hand cranks.

To raise or lower
the bed: use the middle hand crank.
the Fowler: use the left hand crank.
the Knee Gatch: use the right hand crank.

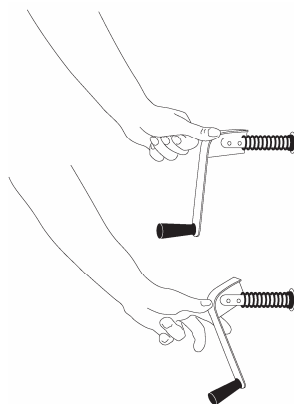


Figure 2.1B

- **To retract a standard hand crank (Figure 2.1B):**
With the hand crank handle facing down, push on top of the crank, where "PUSH" is written. The hand crank will retract smoothly under the bed.

Operation Guide

TRENDELENBURG POSITIONING

The Trendelenburg and Reverse Trendelenburg positions are achieved through the use of a clutch lever (see Product Illustration, [pg. 5](#)), in conjunction with the middle hand crank. The head of the bed will be lowered (Trendelenburg) or raised (Reverse Trendelenburg). The sleep surface inclination can reach 14°.

If the bed angle is less than 14°, the sleep surface may be lowered or raised to maximum range while preserving the bed angle.

TRENDELENBURG POSITION (FIGURE 2.2A)

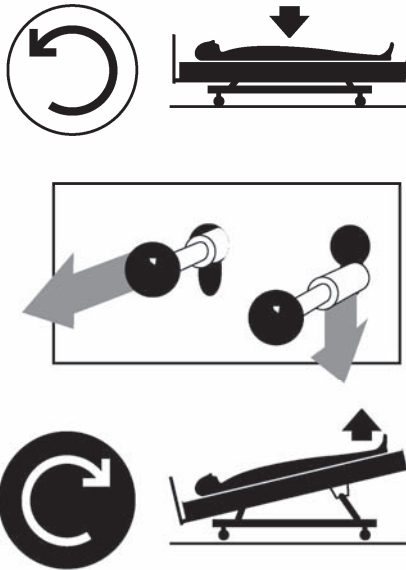




Figure 2.2A

1.  Lower the bed using the middle hand crank.
2. Pull the clutch lever beside the left hand crank and lower it. A structure in the slot will maintain the lever position.
3.  Raise the bed using the middle hand crank.
4. To put the bed back in horizontal position, lower the bed using the middle crank, replace the lever to its original position, and raise the bed to the desired height.

REVERSE TRENDELENBURG POSITION (FIGURE 2.2B)

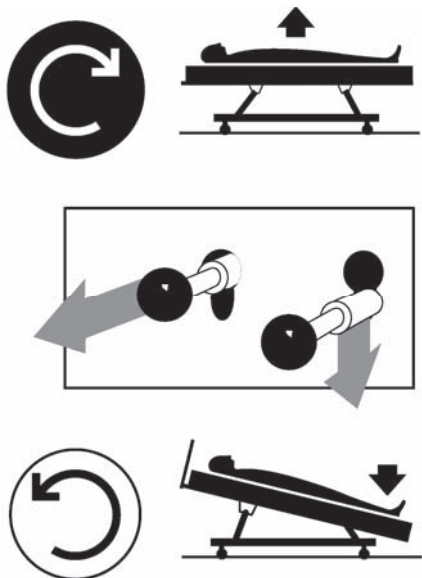




Figure 2.2B

1.  Raise the bed using the middle hand crank.
2. Pull the lever beside the left hand crank and lower it. A structure in the slot will maintain the lever in position.
3.  Lower the bed using the middle hand crank.
4. To put the bed back in horizontal position, raise the bed using the middle crank, replace the lever to its original position, and lower the bed to the desired height.

Note

If the bed is equipped with the optional single hand crank, use it at steps 3 and 4 of the above procedures. Simply insert it in the middle hand crank opening.

Operation Guide

BRAKE/STEER PEDAL

The bed is equipped with two lateral pedals. They control the brakes and the steer mode. The following illustrations, appearing on the frame, illustrate the operation of the pedals.

Note

On some beds, casters are replaced by legs (optional). These beds permanently rest on their legs and cannot therefore be moved. Consequently, you will not find brake/steer pedals on these beds.

Left Side



Right Side



Figure 2.3

APPLYING THE BRAKES

Except for a bed permanently resting on its legs (optional), this bed is equipped with a central locking system activated by either lateral brake/steer pedals (see Product Illustration, [pg. 5](#)).

WARNING

Always apply the brakes when a patient is on the bed or entering/exiting the bed. Serious injury could result if the bed moves while a patient is getting on or off the bed. After the brake pedal is engaged, push on the bed to ensure the brakes are securely applied.

BRAKE PEDAL OPERATION

To engage the brakes, fully depress the side of the pedal identified with a red label and represented by the BRAKE red arrow (Figure 2.3 above).

To disengage the brakes, toggle the pedal to neutral position.

Operation Guide

MOVING THE BED

Except for a bed permanently resting on its legs (optional), this bed is equipped with a steer mode using a bed steer caster or an optional fifth wheel. The steer mode is activated by either lateral pedal (see Product Illustration, [pg. 5](#)). The steer mode helps in guiding the bed along a straight line and helps the bed pivot around corners.

WARNING

- To reduce the risk of injury, ensure the sleep surface is horizontal and in the lowest position with the siderails fully raised and locked when moving the bed with a patient in it.
- To avoid injury to the patient and/or user, do not attempt to move the bed laterally with the steer mode engaged.

CAUTION

To avoid damage to the siderail mechanisms, do not move the bed using the raised siderails. Rather use the head or foot board to move the bed.

STEER MODE OPERATION

To engage the steer mode, fully depress the side of the pedal identified with a green label and represented by the STEER green arrow (Figure 2.3, [pg. 12](#)).

To disengage the steer mode, toggle the pedal to neutral position.

FOLEY BAG HOOK USAGE

The four Foley bag hooks (see Product Illustration, [pg. 5](#)) are located on both sides of the bed under the edges of the mattress support foot section.

PATIENT RESTRAINT STRAP LOCATIONS

The bed has 12 locations on the mattress support for installing patient restraint straps. Ten of them are located on the mattress support edges directly across from each other and the remaining two are located on the top edge of the head section (see Product Illustration, [pg. 5](#)).

WARNING

Improperly adjusted restraint straps can cause serious injury to a patient. It is the **responsibility of the attending medical personnel** to determine proper use of restraint straps and restraint strap locations. **Stryker is not responsible for the type and/or use of restraint straps on any of Stryker's products.**

Operation Guide

POSITIONING SIDERAILS

WARNING

- Siderails, with or without their padded covers, are not intended to serve as restraint devices to keep a patient from exiting the bed. Siderails are designed to keep a patient from inadvertently rolling off the bed. It is the responsibility of the attending medical personnel to determine the degree of restraint necessary to ensure a patient will remain safely in bed. Failure to use the siderails properly could result in serious patient injury.
- When the patient is unattended and unless the patient's medical condition dictates otherwise, keep the sleep surface horizontal in its lowest position and the siderails fully raised. When raising the siderails, be sure that you hear the "click" that signals the up and locked condition. Pull firmly on the siderail to ensure it is locked into position.
- To avoid damage to the siderail mechanisms, do not move the bed using the raised siderails. Rather use the head or foot board to move the bed.

HALF-LENGTH SIDERAIL

To lower the head siderail, grasp the rail in its centre and rotate the siderail downward toward the head end of the bed until it is completely lowered.

To lower the foot siderail, the same procedure is required as for the head siderail, however, the siderail rotates toward the foot end of the bed.

To engage the head siderail, grasp the rail in its centre and rotate the rail upward toward the head end of the bed until it locks in the completely raised position.

To engage the foot siderail, the same procedure is required as for the head siderail, however, the siderail rotates to the foot end of the bed.

FULL-LENGTH SIDERAIL

To lower: grasp the siderail in its centre and raise it slightly, pull the yellow release handle and lower the siderail completely while holding it.

To raise: grasp the rail in its centre and completely raise the siderail until it locks in place.

Operation Guide

HEAD AND FOOT BOARD OPERATION

The head and foot boards may be removed and replaced easily. The removal of the head board enables quick access to the patient's head.

Board Removal/Installation

To Remove Boards

Lift boards to remove their braces from the vertical posts of the bed.

To Replace Boards

Head Board: The head board braces must be oriented toward the outside of the bed (A).

Foot Board: The foot board braces must be oriented toward the inside of the bed (B).

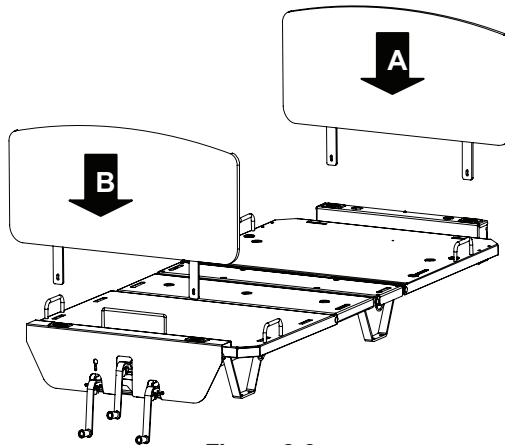


Figure 2.9

Operation Guide

ATTACHING THE BOARDS PERMANENTLY

The head and/or foot board may be installed permanently (optional) using the fasteners provided with this option.

Required Tools:

- 7/16" Wrench

For Head Board:

- Two 1/4" Flat Washers
- Two 1/4" Spring Washers
- Two 1/4-20 x 1 3/4" Hexagon Bolts

For Foot Board:

- Two 1/4" Flat Washers
- Two 1/4" Spring Washers
- Two 1/4-20 x 2 1/4" Hexagon Bolts

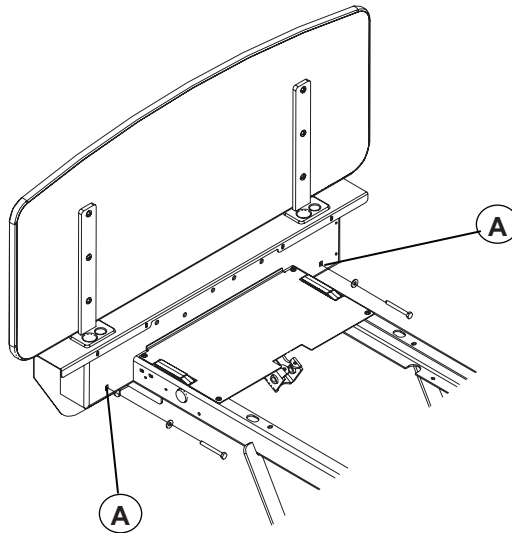


Figure 2.10

Procedure:

Simply insert the appropriate bolt and two types of washer in the factory-installed nut accessible through holes (A) located on the inner sides of the foot end and the head end casings. Tighten using the 7/16" wrench.

Operation Guide

FOOT SECTION PROP ROD

A prop rod located under the foot section of the mattress support allows this section to be set in a horizontal position. Simply lift the foot section and place the prop rod in the safety catches located on the frame.

Note

It is always possible to change the angle of the Knee Gatch section at a later time, no matter what position the foot section is in.

Optional Bed Accessories

Accessory	Part Number	Page Reference
Half-Length Siderails Protective Pads	DM64232	See page 19
Full-Length Siderails Protective Pads	DM64176	See page 20
Half-Length Siderails Protective Pads	DM64233	See page 21
Full-Length Siderails Protective Pads	DM64178	See page 22
One Inch Diameter Removable I.V. Pole	FA61002-G	See page 23
Oxygen Bottle Holder	FA64036-G	See page 24
Upright Oxygen Bottle Holder	FA64117	See page 25
Overhead Trapeze	FA64145	See page 26
Monitor Tray	FA64153	See page 28
One Inch Diameter Fixed I.V. Pole	FA64157	See page 29
Removable I.V. Pole	FDTSH	See page 31

Half-Length Siderails Protective Pads - DM64232

Protective pads for half-length siderails are designed to prevent patients from injuring themselves with the siderails. They are made of “Champion” imitation leather stuffed with foam. They are fixed using zip and snap fasteners.

INSTALLATION

WARNING

Remove the patient from the bed before installing the accessory.

Necessary Tools: None

Procedure:

Head Siderail Pads:

1. Flatten the mattress support sections.
2. Lower the foot siderails and raise the head ones.
3. Open the zip fastener located at the end of each pad.
4. Slip the head pad over the head siderail to wrap it completely.

Note

Note the shape of the head siderail in order to properly position the pad over the siderail.

5. Close the zip fastener.
6. Close the lower part of the pad by snapping together the two flaps.

Foot Siderail Pads:

1. Lower the head siderails and raise the foot ones.
2. Open the zip fastener located at the end of each pad.
3. Slip the foot pad over the foot siderail to wrap it completely.

Note

Note the shape of the foot siderail in order to properly position the pad over the siderail.

4. Close the zip fastener.
5. Close the lower part of the pad by snapping together the two flaps.

WARNING

- Before using the siderail pads, ensure by a thorough inspection that they are properly installed on the siderails.
- Siderails, with or without their padded covers or nets, are not intended to serve as restraint devices to keep a patient from exiting the bed. Siderails are designed to keep a patient from inadvertently rolling off the bed. It is the responsibility of the attending medical personnel to determine the degree of restraint necessary to ensure a patient will remain safely in bed. Failure to utilize the siderails properly could result in serious patient injury.
- Protective pads should be maintained as indicated on the label sewed on the inner face of the pad flap.
- If the pad is damaged, it must be repaired before use or removed from service if any cracks or rips are found on the imitation leather cover. If the pad is soiled, have it cleaned and disinfected before use.

Full-Length Siderails Protective Pads - DM64176

Protective pads for full-length siderails are designed to prevent patients from injuring themselves with the siderails. They are made of "Champion" imitation leather stuffed with foam. They are fixed using zip and snap fasteners.

INSTALLATION

WARNING

Remove the patient from the bed before installing the accessory.

Necessary Tools: None

Procedure:

1. Fully raise the siderail.
2. Open the zip fastener located at one end of the pad.
3. Slip the pad over the siderail to wrap it completely.

Note

Place the pad on the siderail so that the zipped end faces the foot end of the bed.

4. Close the zip fastener.
5. Close the lower part of the pad by snapping together the two flaps.

WARNING

- Before using the siderail pads, ensure by a thorough inspection that they are properly installed on the siderails.
- Siderails, with or without their padded covers or nets, are not intended to serve as restraint devices to keep a patient from exiting the bed. Siderails are designed to keep a patient from inadvertently rolling off the bed. It is the responsibility of the attending medical personnel to determine the degree of restraint necessary to ensure a patient will remain safely in bed. Failure to utilize the siderails properly could result in serious patient injury.
- Protective pads should be maintained as indicated on the label sewed on the inner face of the pad flap.
- If the pad is damaged, it must be repaired before use or removed from service if any cracks or rips are found on the imitation leather cover. If the pad is soiled, have it cleaned and disinfected before use.

Half-Length Siderails Protective Pads - DM64233

Protective pads for half-length siderails are designed to prevent patients from injuring themselves with the siderails. They are made of “Champion” imitation leather stuffed with foam. They are fixed using zip and snap fasteners.

INSTALLATION

WARNING

Remove the patient from the bed before installing the accessory.

Necessary Tools: None

Procedure:

Head Siderail Pads:

1. Flatten the mattress support sections.
2. Lower the foot siderails and raise the head ones.
3. Open the zip fastener located at the end of each pad.
4. Slip the head pad over the head siderail to wrap it completely.

Note

Note the shape of the head siderail in order to properly position the pad over the siderail.

5. Close the zip fastener.
6. Close the lower part of the pad by snapping together the two flaps.

Foot Siderail Pads:

1. Lower the head siderails and raise the foot ones.
2. Open the zip fastener located at the end of each pad.
3. Slip the foot pad over the foot siderail to wrap it completely.

Note

Note the shape of the foot siderail in order to properly position the pad over the siderail.

4. Close the zip fastener.
5. Close the lower part of the pad by snapping together the two flaps.

WARNING

- Before using the siderail pads, ensure by a thorough inspection that they are properly installed on the siderails.
- Siderails, with or without their padded covers or nets, are not intended to serve as restraint devices to keep a patient from exiting the bed. Siderails are designed to keep a patient from inadvertently rolling off the bed. It is the responsibility of the attending medical personnel to determine the degree of restraint necessary to ensure a patient will remain safely in bed. Failure to utilize the siderails properly could result in serious patient injury.
- Protective pads should be maintained as indicated on the label sewed on the inner face of the pad flap.
- If the pad is damaged, it must be repaired before use or removed from service if any cracks or rips are found on the imitation leather cover. If the pad is soiled, have it cleaned and disinfected before use.

Full-Length Siderails Protective Pads - DM64178

Protective pads for full-length siderails are designed to prevent patients from injuring themselves with the siderails. They are made of "Champion" imitation leather stuffed with foam. They are fixed using zip and snap fasteners.

INSTALLATION

WARNING

Remove the patient from the bed before installing the accessory.

Necessary Tools: None

Procedure:

1. Fully raise the siderail.
2. Open the zip fastener located at one end of the pad.
3. Slip the pad over the siderail to wrap it completely.

Note

Place the pad on the siderail so that the zipped end faces the foot end of the bed.

4. Close the zip fastener.
5. Close the lower part of the pad by snapping together the two flaps.

WARNING

- Before using the siderail pads, ensure by a thorough inspection that they are properly installed on the siderails.
- Siderails, with or without their padded covers or nets, are not intended to serve as restraint devices to keep a patient from exiting the bed. Siderails are designed to keep a patient from inadvertently rolling off the bed. It is the responsibility of the attending medical personnel to determine the degree of restraint necessary to ensure a patient will remain safely in bed. Failure to utilize the siderails properly could result in serious patient injury.
- Protective pads should be maintained as indicated on the label sewed on the inner face of the pad flap.
- If the pad is damaged, it must be repaired before use or removed from service if any cracks or rips are found on the imitation leather cover. If the pad is soiled, have it cleaned and disinfected before use.

One Inch Diameter Removable I.V. Pole - FA61002-G

The removable I.V. Pole is a one inch removable anodized aluminum I.V. Pole. The base of the pole is equipped with a lock pin to prevent the pole from rotating in the socket.

INSTALLATION

Necessary Tools: None

Procedure:

1. Install the pole at any of the four receptacles located at the head or foot end of the bed.
2. Slightly rotate the pole to properly engage the lock pin in the socket base. Once correctly positioned, the pole will not rotate in the receptacle.

OPERATION

1. To adjust the height of the pole, turn the lock actuator counterclockwise and raise the telescoping portion of the pole to the desired height. Tighten the lock actuator.
2. Hang the I.V. bag(s).

 **CAUTION**

The weight of the I.V. bags should not exceed 11 lb (5 kg) per hook.

Oxygen Bottle Holder - FA64036-G

The Oxygen Bottle Holder will accept a 4" diameter and 31" long oxygen bottle as well as the dial. The holder can be installed on the head board or foot board.

INSTALLATION

Necessary Tools: None

Procedure:

1. Hook the support to a head or foot board using the hooks. (See Figure below).

Note

On the 9" high boards of the FL23SM series bed, the holder can only be placed on the outer side of the board.

2. Tighten the lock screw properly to maintain in place the support.

OPERATION

1. Insert the oxygen bottle in the holder.

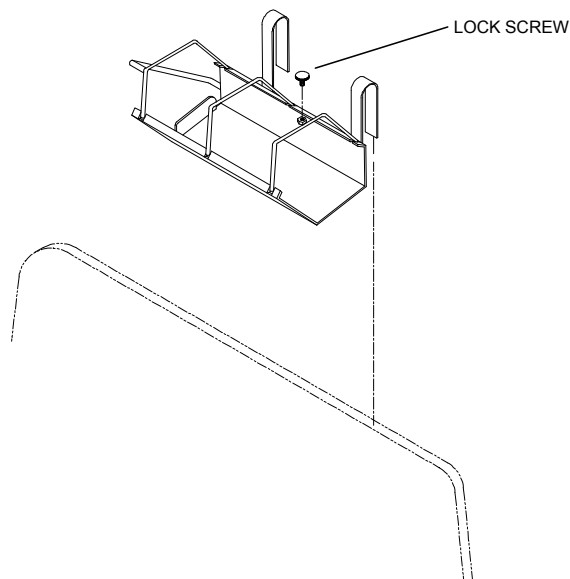


Figure 1

Upright Oxygen Bottle Holder - FA64117

The Upright Oxygen Bottle Holder will accept a 4" diameter oxygen bottle. It can be installed at the foot end or head end of the bed.

INSTALLATION

Necessary Tools: None

Procedure:

See Figures 1-4 below.

1. Remove the lock pin from the holder support rod.
2. Insert the support rod in the hole provided on the I.V. pole holder at the head end or foot end of the bed.
3. Bring the chain under the head end or foot end casing and insert the lock pin in the hole provided on the holder rod.

WARNING

The bottle holder installation must be finalized by installing the lock pin. The function of the pin is to prevent the bottle holder from coming out its position when an oxygen bottle is removed from it.

OPERATION

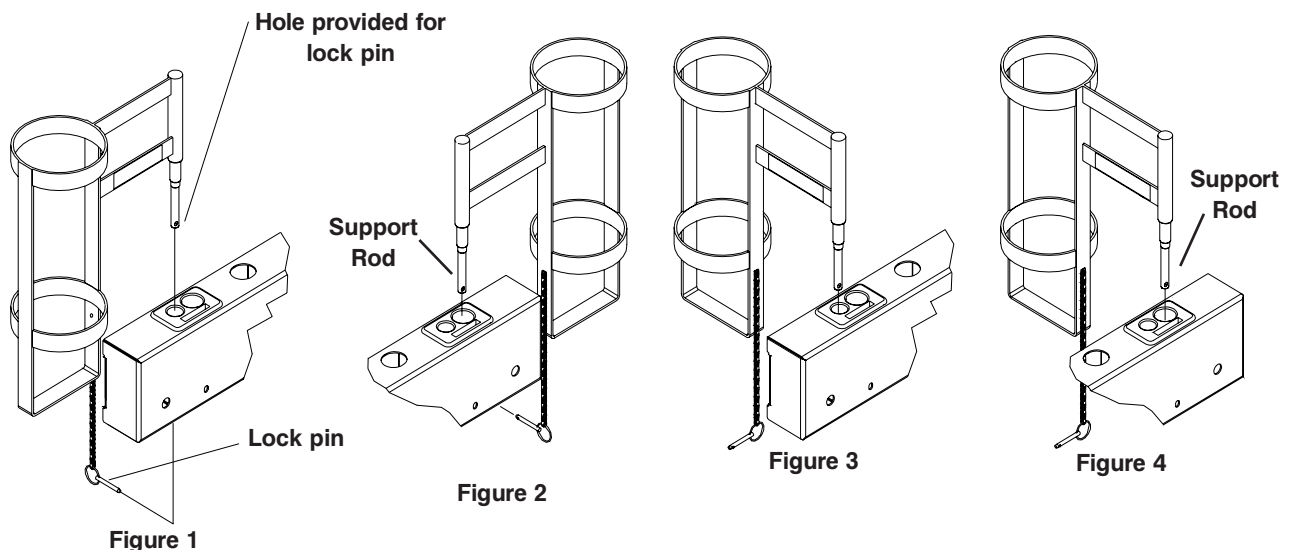
1. Insert the oxygen bottle in the holder and adjust the holder to the desired position.

CAUTION

Maximum working load: 34 kg (75 lb).

The holder can be installed in four different ways at the head end or foot end of the bed.

- To the right of the head or foot casing. (See Figure 1)
- To the left of the head or foot casing. (See Figure 2)
- Facing the right end of the head or foot casing. (See Figure 3)
- Facing the left end of the head or foot casing. (See Figure 4)



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Overhead Trapeze - FA64145

The Overhead Trapeze provides a support that allows the patient to raise himself/herself and change his/her position in the bed. The system features a lower fixed section, an upper movable section and a trapeze. When in use, the upper movable section is centered over the patient. When not in use, it can be stored on either side of the bed by rotating it.

INSTALLATION

WARNING

Remove the patient from the bed before installing the accessory.

Necessary Tools: None

Procedure:

Refer to Figure 1 following the Operation section.

1. Insert the lower section posts (A) into the slots (the largest ones) provided on the bed head end casing. Ensure they are completely inserted.
2. Insert the hitch pins (B) in the holes (C) provided on both post ends.
3. Place the nylon washer (D) on the pivot pin (E) of the lower section.
4. Attach the triangular handle (H) to the storage hook (K).
5. While pulling on the lock pin (G), install the upper section onto the pivot pin (E) and release the lock pin.
6. Pull on the positioning lock pin (F) and pivot the upper section to either side completely. Release the lock pin and ensure that it is properly engaged. This position is the overhead trapeze storing position when not in use.

OPERATION

WARNING

- The overhead trapeze is designed to help the patient change position in the bed. It must not be used as a support to get in or leave the bed.
 - Injuries could result from an improper use of the overhead trapeze.
 - Medical advice may be necessary to determine if the use of an overhead trapeze is adequate for the patient's condition or the treatment given.
 - The maximum load capacity of the overhead trapeze is 68 kg (150 lb).
1. To position the trapeze over the patient, make sure first that the handle (H) is attached to the storage hook (K). Then pull the lock pin (F) and pivot the upper section towards the centre of the bed. Release the lock pin and ensure that it is properly engaged.
 2. Remove the handle from the hook and adjust its height by shortening or lengthening its strap (J).
 3. To store a trapeze not in use, attach the handle to the hook (K), pull the lock pin (F) and pivot the upper part to the storing position (30°) on either side of the bed. Release the lock pin and ensure that it is properly engaged.

WARNING

- The overhead trapeze should not be used when stored at the 30° position. The bed could tip over as a result.
- To avoid injury, always store the trapeze on its storage hook before pivoting.

Overhead Trapeze - FA64145

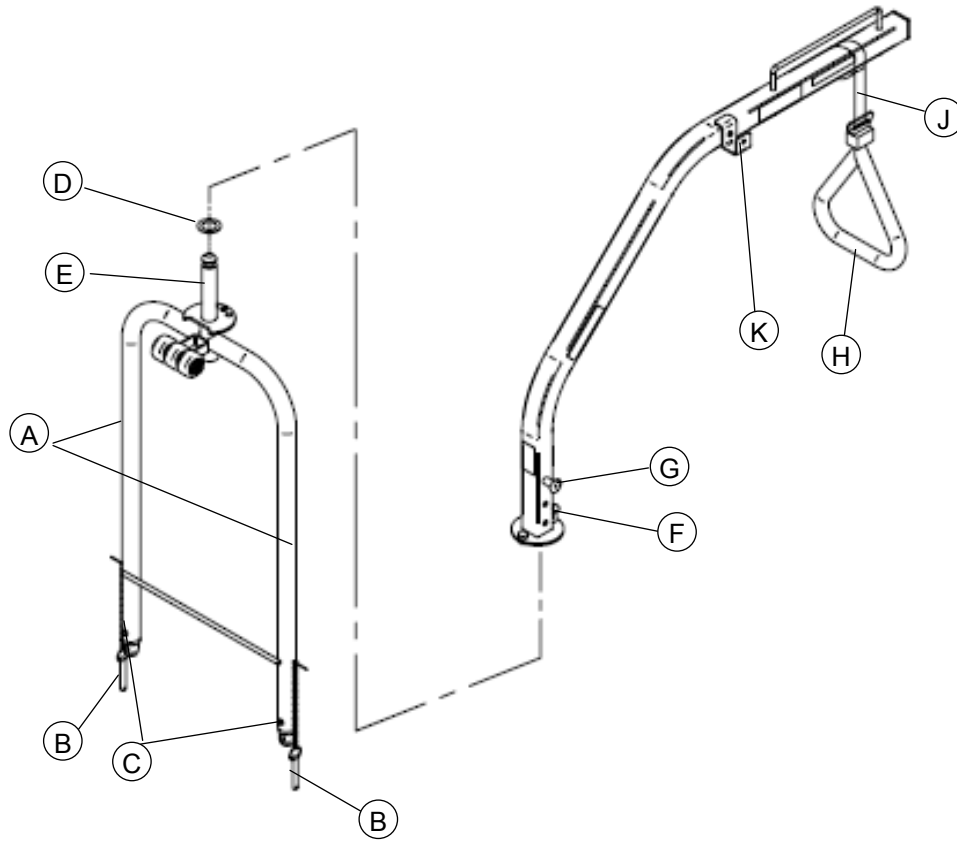


Figure 1

Monitor Tray - FA64153

The monitor tray is designed to hold and secure a monitor using a Velcro strap. The tray can also be used as a writing support. It folds down completely in the stored position.

INSTALLATION

Necessary Tools: None

Procedure:

1. Insert the monitor tray posts into the I.V. pole holders located on the foot end casing (see Figure 1).

OPERATION

CAUTION

- Do not use the monitor tray as a push/pull device.
- Do not use an I.V. pole at the foot end of a bed equipped with this accessory.

1. Pull the lock pin (A) maintaining the tray in the stored position (Figure 1) and lift the tray to the desired position:
2. For the writing support position (Figure 2), lift the tray approximately 30° and release the lock pin.
3. To support a monitor (Figure 3), completely fold back the tray towards the inside of the bed and release the lock pin.

Note

Secure the monitor to the tray using the Velcro strap.

WARNING

The maximum load capacity of the tray is 40 lb (18 kg).

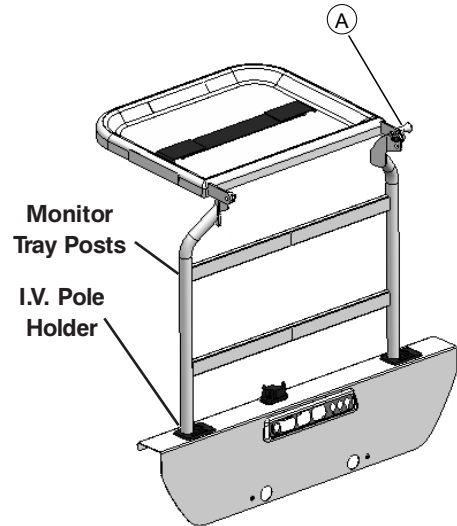


Figure 1

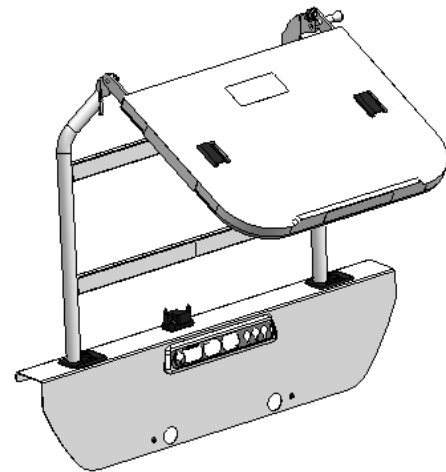


Figure 2

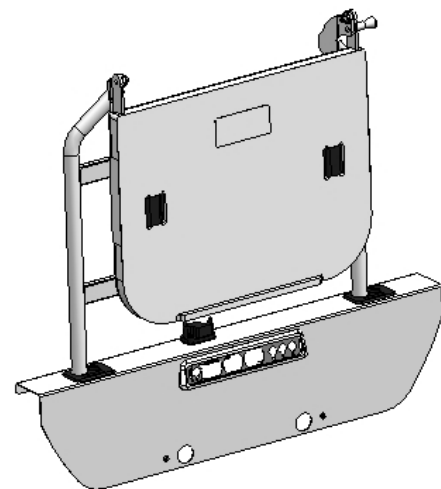


Figure 3

1" Diameter Fixed I.V. Pole - FA64157

The Fixed I.V. Pole is a one inch fixed anodized aluminum I.V. pole. The pole can be folded and stored when not in use.

INSTALLATION

Necessary Tools:

- 1/2" Wrench
- Medium Strength Thread Locker (Blue)

Procedure:

See Figure 1 on next page.

Note

The fixed I.V. pole can be installed at either end of the bed. However, if the bed is equipped with a control panel on the foot board, it will not be possible to fold the pole to store it.

1. Install the base of the pole in one of the two receptacles located on the bed head end or foot end casing.
2. Turn the pole so that the storage pin (A) faces the opposite pole holder and ensure that the lock pin (B) at the base of the pole is engaged in the slots of the receptacle base. The pole should not pivot any more in the receptacle.
3. Using a 1/2" wrench, screw the bolt (C) completely in the base of the pole to permanently attach it to the bed.

Note

- We recommend that you apply medium strength thread locker on the bolt threads before installing it.
- Check regularly that the bolt (C) is properly tightened.

OPERATION

1. Lift the pole from the storage position and push it down into the receptacle.
2. Open the hooks.
3. To adjust the height of the pole, turn the lock actuator (D) counterclockwise and raise the telescoping portion of the pole to the desired height. Tighten the lock actuator.
4. Hang the I.V. bag(s).
5. To store the pole:
 - Loosen the lock actuator and lower the telescoping portion. Tighten the lock actuator.
 - Fold the hooks.
 - Lift the pole from the receptacle, fold it toward the opposite side and lay it on the head end casing while ensuring that the storage pin rests in the orifice provided.

CAUTION

The weight of the I.V. bags should not exceed 11 lb (5 kg) per hook.

1" Diameter Fixed I.V. Pole - FA64157

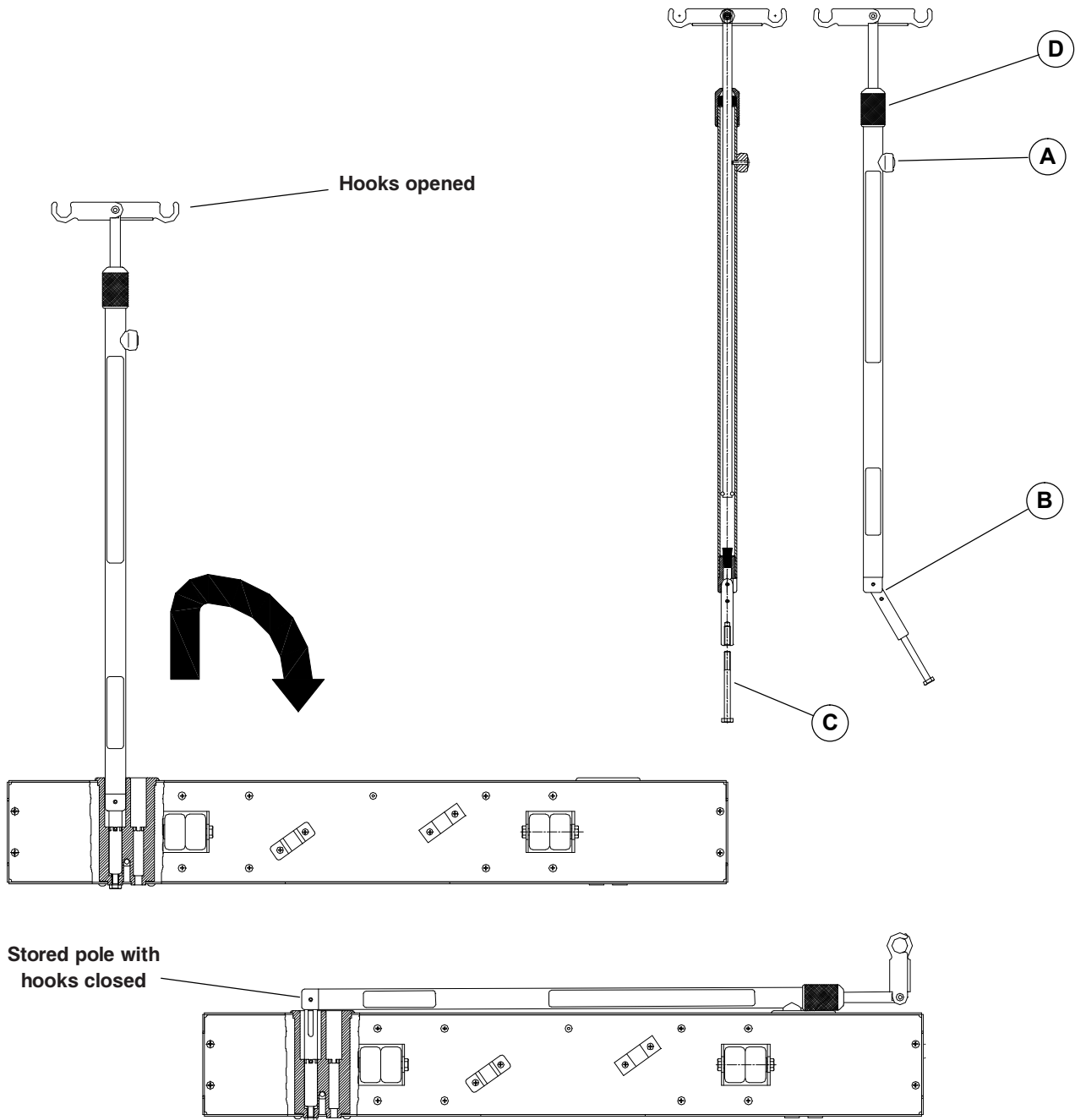


Figure 1

Removable I.V. Pole - FDTSH

The Removable I.V. Pole is a 1/2" diameter I.V. pole with an adjustable height.

INSTALLATION

Necessary Tools: None

Procedure:

1. Insert the I.V. pole in one of the sockets found at both ends of the bed.

OPERATION

 **CAUTION**

Do not use the I.V. pole as a push/pull device.

1. To adjust the height of the pole, turn the lock actuator counterclockwise and raise the telescoping portion of the pole to the desired height. Tighten the lock actuator.
2. Hang the I.V. bag(s).

 **WARNING**

The weight of the I.V. bags should not exceed 11 lb (5 kg).

Cleaning

BED CLEANING

CAUTION

- Do not use harsh cleaners, solvents or detergents; equipment damage could occur.
- Do not steam clean, hose off or ultrasonically clean the bed.
- Do not immerse any part of the bed.
- Germicidal disinfectant, used as directed, and/or Chlorine Bleach products are not considered mild detergents. These products are corrosive in nature and may cause damage to your bed if used improperly. If these types of products are used, ensure the beds are wiped with clean water and thoroughly dried following cleaning. Failure to properly rinse and dry the beds will leave a corrosive residue on the surface of the bed, possibly causing premature corrosion of critical components.
- Failure to follow the above directions when using these types of cleaners may void this product's warranty.

Bed Cleaning

1. Hand wash all surfaces of the bed with a soft cloth moistened with a solution of lukewarm water and a mild detergent.
2. Wipe the bed clean and dry thoroughly to avoid build up of cleaning solution.

MATTRESS CARE

WARNING

- Inspect the mattress after each use.
- Discontinue use if any cracks or rips, which may allow fluid to enter the mattress, are found in the mattress cover.
- Failure to properly clean the mattress, or dispose of it if defective, may increase the risk of exposure to pathogenic substances and may bring about diseases to the patient and user.

Inspection

1. Implement local policies to address regular care, maintenance, and cleaning of mattresses and covers. The cover cleaning procedure can be found below and on the bed label.
2. Inspect mattress cover surface (also zip fasteners and cover inner surface if mattresses have zip fasteners) regularly for signs of damage. If the mattress cover is heavily stained or soiled, or is torn, remove the mattress from service.

Cleaning

Stains: Wash with lukewarm water using a mild detergent. Rinse with water and let dry. For tough stains, use bleach diluted with ten parts of water.

Preventative Maintenance

PREVENTATIVE MAINTENANCE PROGRAM

 **WARNING**

- Preventative maintenance should be performed at least once a year to ensure all bed features are operating properly. Ensure that any bed malfunction is promptly reported to your service personnel for immediate attention.
- When servicing, use only identical replacement parts provided by Stryker.

ANNUAL CHECKLIST

- _____ All fasteners secure.
- _____ Inspect for excessive wear the oil-impregnated bronze shoulder spacers found at the bed hinge points. Do not lubricate these spacers; replace as needed.
- _____ Inspect the whole mechanism of each siderail; ensure that all mobile and fixed parts are properly fastened. A siderail that is difficult to operate, does not latch in high position or latches with difficulty, is often due to loose fasteners. Tighten bolts and nuts properly.
- _____ Check the operation of each siderail: they must remain totally still and offer solid support; they must drop only when the release lever is used. See “Positioning Siderails”, [pg. 14](#).
- _____ On both sides of the bed, completely depress the side of the pedal identified with a red sticker and ensure that the brakes are applied and the bed immobilized. Toggle the pedal to neutral and ensure the brakes are released. See “Moving the Bed”, [pg. 13](#).
- _____ On both sides of the bed, completely depress the side of the pedal identified with a green sticker and ensure that the steer mode - bed steer caster or optional fifth wheel - is engaged. Toggle the pedal to neutral and ensure that the steer mode disengages. See “Moving the Bed”, [pg. 13](#).
- _____ Check the Trendelenburg and Reverse Trendelenburg positioning. Refer to the “Trendelenburg Positioning” section in this manual, [pg. 11](#) to engage these positions.
- _____ Check the foot prop rod for proper operation.
- _____ No cracks or splits in the boards.
- _____ Bumpers tightly secured to frame and working properly.
- _____ No rips or cracks in mattress cover. Replace if so.
- _____ All casters roll properly. Check casters for cuts, wear, etc. Remove accumulated grime.
- _____ Inspect and lubricate, if necessary, the bed lubrication points described and illustrated in the “Actuators Lubrication” section of the Maintenance Manual.

Note

Preventative maintenance may need to be performed more frequently based on the usage level of the bed.

Bed Serial Number:		

Completed by: _____

Date: _____

Warranty

LIMITED WARRANTY

Stryker Medical Division, a division of Stryker Corporation, warrants to the original purchaser the Manual MedSurg Bed, Model FL23SM to be free from defects in material and workmanship for a period of one (1) year after date of delivery. Stryker's obligation under this warranty is expressly limited to supplying replacement parts and labor for, or replacing, at its option, any product which is, in the sole discretion of Stryker, found to be defective. If requested by Stryker, products or parts for which a warranty claim is made shall be returned prepaid to the factory. Any improper use or any alteration or repair by others in such manner as in Stryker's judgment affects the product materially and adversely shall void this warranty. Any repair of Stryker products using parts not provided or authorized by Stryker shall void this warranty. No employee or representative of Stryker is authorized to change this warranty in any way.

Stryker Medical bed products are designed for a 15 year expected service life under normal use, conditions, and with appropriate periodic maintenance as described in the maintenance manual for each device. Stryker warrants to the original purchaser that the welds on its bed products will be free from structural defects for the expected 15 year life of the bed product as long as the original purchaser owns the product.

This statement constitutes Stryker's entire warranty with respect to the aforesaid equipment. **Stryker makes no other warranty or representation, either expressed or implied, except as set forth herein. There is no warranty of merchantability and there are no warranties of fitness for any particular purpose. In no event shall Stryker be liable here under for incidental or consequential damages arising from or in any manner related to sales or use of any such equipment.**

TO OBTAIN PARTS AND SERVICE

Stryker products are supported by a nationwide network of dedicated Stryker Field Service Representatives. These representatives are factory trained, available locally, and carry a substantial spare parts inventory to minimize repair time. Simply call your local representative, or call Stryker Customer Service USA at 1-800-327-0770, Canada 1-888-233-6888.

SERVICE CONTRACT COVERAGE

Stryker has developed a comprehensive program of service contract options designed to keep your equipment operating at peak performance at the same time it eliminates unexpected costs. We recommend that these programs be activated before the expiration of the new product warranty to eliminate the potential of additional equipment upgrade charges.

A Service Contract helps to:

- Ensure equipment reliability
- Stabilize maintenance budgets
- Diminish downtime
- Establish documentation for JCAHO
- Increase product life
- Enhance trade-in value
- Address risk management and safety

Warranty

SERVICE CONTRACT PROGRAMS

Stryker offers the following service contract programs:

Service Agreement Options *	Gold	Silver	Parts	Labor	PM
Annually scheduled preventative maintenance	X				X
All parts	X	X	X		
All labor and travel	X	X		X	
Unlimited emergency service calls	X	X		X	
Priority one contact: two hour phone response	X	X	X	X	
Most repairs completed within 3 days	X	X		X	
JCAHO documentation	X	X		X	X
On-site record of PM & emergency service	X				X
Factory-trained Stryker service technician	X	X		X	X
Stryker authorized parts used	X	X	X	X	X
Service during regular business hours (8–5)	X	X	X	X	X

* Does not include maintenance due to abuse or for any disposable items. Stryker reserves the right to change options without notice.

Stryker Medical also offers personalized service contracts.
Pricing is determined by age, location, model and condition of product.

**For more information on our service contracts,
please call your local representative.**

RETURN AUTHORIZATION

Merchandise cannot be returned without approval from the Stryker Customer Service Department. An authorization number will be provided which must be printed on the returned merchandise. Stryker reserves the right to charge shipping and restocking fees on returned items. **Special, modified, or discontinued items not subject to return.**

DAMAGED MERCHANDISE

ICC Regulations require that claims for damaged merchandise must be made with the carrier within fifteen (15) days of receipt of merchandise. **Do not accept damaged shipments unless such damage is noted on the delivery receipt at the time of receipt.** Upon prompt notification, Stryker will file a freight claim with the appropriate carrier for damages incurred. Claim will be limited in amount to the actual replacement cost. In the event that this information is not received by Stryker within the fifteen (15) day period following the delivery of the merchandise, or the damage was not noted on the delivery receipt at the time of receipt, the customer will be responsible for payment of the original invoice in full. Claims for any short shipment must be made within thirty (30) days of invoice.

INTERNATIONAL WARRANTY CLAUSE

This warranty reflects U.S. domestic policy. Warranty outside the U.S. may vary by country. Please contact your local Stryker Medical representative for additional information.

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UNITED STATES
Stryker Medical
3800 E. Centre Ave.,
Portage, Michigan USA
49002

CANADA
Stryker Canada
45 Innovation Drive
Hamilton, Ontario Canada
L9H 7L8

EC	REP
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European Representative
Stryker France
ZAC Satolas Green Pusignan
Av. De Satolas Green
69881 MEYZIEU Cedex
France

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